284 Sheffield Street, Mountainside, New Jersey 07092, Phone : 908 789 8900,
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DATA PACKAGE

VOLATILE ORGANICS

PROJECT NAME : AE1-CTY 3.2.Z-PR-DOCK-DES-ODC - 60693795-1719206

AECOM

605 3rd Avenue

29th Floor

New York, NY - 10158

Phone No: 212-973-2900

ORDER ID : Q3424

ATTENTION : Rob Forstner

Laboratory Certification ID # 20012

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Cover Page

Order ID : Q3424

Project ID : AE1-CTY 3.2.Z-PR-DOCK-Des-ODC - 60693795-1719206

Client : AECOM

Lab Sample Number	Client Sample Number
Q3424-01	PR132-DP3-20251021
Q3424-02	PR132-S11-010080-20251021
Q3424-03	PR132-S14-000094-20251021

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: 10/29/2025

NYDOH CERTIFICATION NO - 11376

NJDEP CERTIFICATION NO - 20012

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CASE NARRATIVE

AECOM
Project Name: AE1-CTY 3.2.Z-PR-DOCK-Des-ODC - 60693795-1719206
Project # N/A
Order ID # Q3424
Test Name: VOC-TCLVOA-10

A. Number of Samples and Date of Receipt:
3 Solid samples were received on 10/21/2025.
B. Parameters
According to the Chain of Custody document, the following analyses were requested: VOC-TCLVOA-10. This data package contains results for VOC-TCLVOA-10.

C. Analytical Techniques:
The analysis performed on instrument MSVOA_Y were done using GC column Rxi-624SIL MS 30m, 0.25mm, 1.4 um, Cat. #13868.The analysis of VOC-TCLVOA-10 was based on method 8260D.

D. QA/ QC Samples:
The Holding Times were met for all analysis.
The Surrogate recoveries were met for all analysis.
The Internal Standards Areas were met for all analysis.
The Retention Times were met for all analysis.

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

E. Additional Comments:
Samples for MS/MSD for VOC analysis were not provided with this set of samples. The Blank Spike Duplicate is reported with the data.

The Sample #PR132-DP3-20251021, PR132-S11-010080-20251021 and PR132-S14-000094-20251021 have the concentration of target compound below Method detection limits, therefore it is not reported as Hit in Form1.

Trip Blank was not provided with this set of samples.

The soil samples results are based on a dry weight basis.

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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

GC/MS VOA CONFORMANCE/NON-CONFORMANCE SUMMARY

ORDER ID: Q3424 MATRIX: Solid

METHOD: 8260D

		NA	NO	YES
1.	Chromatograms Labeled/Compounds Identified. (Field samples and Method Blanks)			✓
2.	GC/MS Tuning Specifications BFB Meet Criteria (NOTE THAT THERE ARE DIFFERENT CRITERIA FOR NY ASP CLP, CLP AND NJ)			✓
3.	GC/MS Tuning Frequency - Performed every 24 hours for 600 series and 12 hours for 8000 Series.			✓
4.	GC/MS Calibration - Initial Calibration performed before sample analysis and continuing calibration performed within 24 hours of sample analysis for 600 series and 12 hours for 8000 series.			✓
5.	GC/MS Calibration Requirements. The Initial Calibration met the requirements. The Continuous Calibration met the requirements.			✓
6.	Blank Contamination - If yes, list compounds and concentrations in each blank:		✓	
7.	Surrogate Recoveries Meet Criteria If not met, list those compounds and their recoveries which fall outside the acceptable ranges.			✓
8.	Matrix Spike/Matrix Spike Duplicate Recoveries Meet Criteria If not met, list those compounds and their recoveries which fall outside the acceptable range.			✓
9.	Internal Standard Area/Retention Time Shift Meet Criteria Comments:			✓
10.	Analysis Holding Time Met If not met, list number of days exceeded for each sample:			✓

ADDITIONAL COMMENTS:

Samples for MS/MSD for VOC analysis were not provided with this set of samples. The Blank Spike Duplicate is reported with the data.

The Sample #PR132-DP3-20251021, PR132-S11-010080-20251021 and PR132-S14-000094-20251021 have the concentration of target compound below Method detection limits, therefore it is not reported as Hit in Form1.

GC/MS VOA CONFORMANCE/NON-CONFORMANCE SUMMARY (CONTINUED)

	NA	NO	YES

Trip Blank was not provided with this set of samples.

The soil samples results are based on a dry weight basis.

_____ _____

QA REVIEW Date

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APPENDIX A

QA REVIEW GENERAL DOCUMENTATION

Project #: Q3424

	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:** 10/29/2025

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LAB CHRONICLE

OrderID:	Q3424	**OrderDate:**	10/22/2025 11:34:00 AM
Client:	AECOM	**Project:**	AE1-CTY 3.2.Z-PR-DOCK-Des-ODC - 60693795 17 9206
Contact:	Rob Forstner	**Location:**	D31, VOA Ref. #2 Soil

LabID	ClientID	Matrix	Test	Method	Sample Date	Prep Date	Anal Date	Received
Q3424-01	**PR132-DP3-20251021**	**SOIL**			**10/21/25**			**10/21/25**
			VOC-TCLVOA-10	8260D			10/22/25	
Q3424-02	**PR132-S11-010080-20251021**	**SOIL**			**10/21/25**			**10/21/25**
			VOC-TCLVOA-10	8260D			10/22/25	
Q3424-03	**PR132-S14-000094-20251021**	**SOIL**			**10/21/25**			**10/21/25**
			VOC-TCLVOA-10	8260D			10/22/25	

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Hit Summary Sheet
SW-846

SDG No.: Q3424

Client: AECOM

Sample ID	Client ID	Matrix	Parameter		Concentration	C	MDL	RDL	Units
Client ID:	**PR132-DP3-20251021**								
Q3424-01	PR132-DP3-202510	SOIL	Acetone		33.0	J	12.3	64.7	ug/Kg
Q3424-01	PR132-DP3-202510	SOIL	Carbon Disulfide		16.2		2.70	12.9	ug/Kg
Q3424-01	PR132-DP3-202510	SOIL	Methylcyclohexane		2.80	J	2.40	12.9	ug/Kg
			Total Voc :		52.0				
Q3424-01	PR132-DP3-202510	SOIL	3-Heptene, 2,2,4,6,6-pentameth	*	21.2	J	0	0	ug/Kg
Q3424-01	PR132-DP3-202510	SOIL	2-tert-Butyltoluene	*	21.9	J	0	0	ug/Kg
Q3424-01	PR132-DP3-202510	SOIL	Heptane, 3-ethyl-2-methyl-	*	25.6	J	0	0	ug/Kg
			Total Tics :		68.7				
			Total Concentration:		121				
Client ID:	**PR132-S11-010080-20251021**								
Q3424-02	PR132-S11-010080	SOIL	Acetone		25.7	J	8.20	43.2	ug/Kg
Q3424-02	PR132-S11-010080	SOIL	Carbon Disulfide		10.0		1.80	8.60	ug/Kg
Q3424-02	PR132-S11-010080	SOIL	Methylcyclohexane		2.50	J	1.60	8.60	ug/Kg
			Total Voc :		38.2				
Q3424-02	PR132-S11-010080	SOIL	3-Heptene, 2,2,4,6,6-pentameth	*	21.3	J	0	0	ug/Kg
Q3424-02	PR132-S11-010080	SOIL	Benzene, 1-(1,1-dimethylethyl)	*	22.3	J	0	0	ug/Kg
Q3424-02	PR132-S11-010080	SOIL	Tert butyl alcohol	*	34.2	J	23.7	43.2	ug/Kg
			Total Tics :		77.8				
			Total Concentration:		116				
Client ID:	**PR132-S14-000094-20251021**								
Q3424-03	PR132-S14-000094	SOIL	Acetone		210		10.3	54.5	ug/Kg
Q3424-03	PR132-S14-000094	SOIL	Carbon Disulfide		4.90	J	2.30	10.9	ug/Kg
Q3424-03	PR132-S14-000094	SOIL	2-Butanone		43.5	J	14.3	54.5	ug/Kg
Q3424-03	PR132-S14-000094	SOIL	Methylcyclohexane		5.70	J	2.00	10.9	ug/Kg
Q3424-03	PR132-S14-000094	SOIL	Benzene		5.40	J	1.70	10.9	ug/Kg
Q3424-03	PR132-S14-000094	SOIL	m/p-Xylenes		6.30	J	2.70	21.8	ug/Kg
Q3424-03	PR132-S14-000094	SOIL	o-Xylene		11.4		1.80	10.9	ug/Kg
			Total Voc :		287				
Q3424-03	PR132-S14-000094	SOIL	3-Heptene, 2,2,4,6,6-pentameth	*	22.0	J	0	0	ug/Kg
Q3424-03	PR132-S14-000094	SOIL	Heptane, 2,2,6,6-tetramethyl-4-	*	25.3	J	0	0	ug/Kg
Q3424-03	PR132-S14-000094	SOIL	Naphthalene, decahydro-2-metl	*	17.3	J	0	0	ug/Kg
Q3424-03	PR132-S14-000094	SOIL	Dodecane, 2,6,10-trimethyl-	*	24.5	J	0	0	ug/Kg
Q3424-03	PR132-S14-000094	SOIL	Undecane, 2,6-dimethyl-	*	16.8	J	0	0	ug/Kg
Q3424-03	PR132-S14-000094	SOIL	Tert butyl alcohol	*	160	J	29.9	54.5	ug/Kg
Q3424-03	PR132-S14-000094	SOIL	1,3,5-Trimethylbenzene	*	4.00	J	1.80	10.9	ug/Kg
Q3424-03	PR132-S14-000094	SOIL	1,2,4-Trimethylbenzene	*	9.30	J	1.40	10.9	ug/Kg
			Total Tics :		279				

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Hit Summary Sheet
SW-846

SDG No.: Q3424

Client: AECOM

Sample ID	Client ID	Matrix	Parameter	Concentration	C	MDL	RDL	Units
			Total Concentration:	566				

QC SUMMARY

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Surrogate Summary

SDG No.: Q3424

Client: AECOM

Analytical Method: SW8260D

Lab Sample ID	Client ID	Parameter	Spike	Result	Recovery (%)	Qual	Limits (%) Low	Limits (%) High
Q3424-01	PR132-DP3-20251021	1,2-Dichloroethane-d4	50	53.2	106		63	155
		Dibromofluoromethane	50	50.5	101		70	134
		Toluene-d8	50	49.8	100		74	123
		4-Bromofluorobenzene	50	45.5	91		17	146
Q3424-02	PR132-S11-010080-20251021	1,2-Dichloroethane-d4	50	58.0	116		63	155
		Dibromofluoromethane	50	51.2	102		70	134
		Toluene-d8	50	49.7	99		74	123
		4-Bromofluorobenzene	50	47.3	95		17	146
Q3424-03	PR132-S14-000094-20251021	1,2-Dichloroethane-d4	50	51.1	102		63	155
		Dibromofluoromethane	50	50.8	102		70	134
		Toluene-d8	50	49.9	100		74	123
		4-Bromofluorobenzene	50	44.3	89		17	146
VY1022SBL01	VY1022SBL01	1,2-Dichloroethane-d4	50	48.3	97		63	155
		Dibromofluoromethane	50	49.8	100		70	134
		Toluene-d8	50	48.6	97		74	123
		4-Bromofluorobenzene	50	41.1	82		17	146
VY1022SBS01	VY1022SBS01	1,2-Dichloroethane-d4	50	45.7	91		63	155
		Dibromofluoromethane	50	49.3	99		70	134
		Toluene-d8	50	49.8	100		74	123
		4-Bromofluorobenzene	50	49.3	99		17	146
VY1022SBSD01	VY1022SBSD01	1,2-Dichloroethane-d4	50	45.1	90		63	155
		Dibromofluoromethane	50	49.3	99		70	134
		Toluene-d8	50	48.6	97		74	123
		4-Bromofluorobenzene	50	48.7	97		17	146

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Laboratory Control Sample/Laboratory Control Sample Duplicate Summary

SW-846

SDG No.: Q3424 **Analytical Method:** SW8260D

Client: AECOM **Datafile :** VY023545.D

Lab Sample ID	Parameter	Spike	Result	Unit	Rec	RPD	Qual	Limits Low	Limits High	RPD
VY1022SBS01	Dichlorodifluoromethane	20	20.0	ug/Kg	100			64	136	
	Chloromethane	20	18.0	ug/Kg	90			52	151	
	Vinyl chloride	20	18.7	ug/Kg	94			56	148	
	Bromomethane	20	20.0	ug/Kg	100			58	141	
	Chloroethane	20	19.8	ug/Kg	99			69	130	
	Trichlorofluoromethane	20	20.2	ug/Kg	101			69	134	
	1,1,2-Trichlorotrifluoroethane	20	21.3	ug/Kg	106			81	123	
	1,1-Dichloroethene	20	20.7	ug/Kg	104			79	121	
	Acetone	100	130	ug/Kg	130			40	171	
	Carbon disulfide	20	19.3	ug/Kg	97			59	130	
	Methyl tert-butyl Ether	20	19.8	ug/Kg	99			77	129	
	Methyl Acetate	20	17.3	ug/Kg	86			69	149	
	Methylene Chloride	20	18.4	ug/Kg	92			72	131	
	trans-1,2-Dichloroethene	20	20.4	ug/Kg	102			80	123	
	1,1-Dichloroethane	20	20.5	ug/Kg	103			82	123	
	Cyclohexane	20	19.3	ug/Kg	97			76	122	
	2-Butanone	100	110	ug/Kg	110			69	131	
	Carbon Tetrachloride	20	21.4	ug/Kg	107			76	129	
	cis-1,2-Dichloroethene	20	21.2	ug/Kg	106			82	123	
	Bromochloromethane	20	19.3	ug/Kg	97			80	127	
	Chloroform	20	21.2	ug/Kg	106			82	125	
	1,1,1-Trichloroethane	20	21.3	ug/Kg	106			80	126	
	Methylcyclohexane	20	20.7	ug/Kg	104			77	123	
	Benzene	20	21.2	ug/Kg	106			84	121	
	1,2-Dichloroethane	20	19.8	ug/Kg	99			81	126	
	Trichloroethene	20	21.9	ug/Kg	110			83	122	
	1,2-Dichloropropane	20	21.0	ug/Kg	105			83	122	
	Bromodichloromethane	20	21.2	ug/Kg	106			82	123	
	4-Methyl-2-Pentanone	100	96.0	ug/Kg	96			70	135	
	Toluene	20	22.0	ug/Kg	110			83	122	
	t-1,3-Dichloropropene	20	21.0	ug/Kg	105			78	124	
	cis-1,3-Dichloropropene	20	20.9	ug/Kg	104			81	122	
	1,1,2-Trichloroethane	20	21.6	ug/Kg	108			82	125	
	2-Hexanone	100	110	ug/Kg	110			66	138	
	Dibromochloromethane	20	21.4	ug/Kg	107			79	125	
	1,2-Dibromoethane	20	21.2	ug/Kg	106			80	125	
	Tetrachloroethene	20	22.9	ug/Kg	115			83	125	
	Chlorobenzene	20	21.4	ug/Kg	107			84	122	
	Ethyl Benzene	20	21.2	ug/Kg	106			82	124	
	m/p-Xylenes	40	43.3	ug/Kg	108			83	124	
	o-Xylene	20	21.6	ug/Kg	108			83	123	
	Styrene	20	21.3	ug/Kg	106			82	124	
	Bromoform	20	20.5	ug/Kg	103			75	127	
	Isopropylbenzene	20	21.7	ug/Kg	109			82	124	
	1,1,2,2-Tetrachloroethane	20	19.2	ug/Kg	96			77	127	
	1,3-Dichlorobenzene	20	21.3	ug/Kg	106			83	122	
	1,4-Dichlorobenzene	20	21.1	ug/Kg	106			84	121	
	1,2-Dichlorobenzene	20	21.3	ug/Kg	106			83	124	

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Laboratory Control Sample/Laboratory Control Sample Duplicate Summary

SW-846

SDG No.:	**Q3424**	**Analytical Method:**	**SW8260D**
Client:	**AECOM**	**Datafile :**	VY023545.D

Lab Sample ID	Parameter	Spike	Result	Unit	Rec	RPD	Qual	Limits Low	Limits High	RPD
VY1022SBS01	1,2-Dibromo-3-Chloropropane	20	18.8	ug/Kg	94			66	134	
	1,2,4-Trichlorobenzene	20	20.4	ug/Kg	102			78	127	
	1,2,3-Trichlorobenzene	20	19.8	ug/Kg	99			70	137	

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Laboratory Control Sample/Laboratory Control Sample Duplicate Summary

SW-846

SDG No.:	**Q3424**	**Analytical Method:**	**SW8260D**
Client:	**AECOM**	**Datafile :**	VY023546.D

Lab Sample ID	Parameter	Spike	Result	Unit	Rec	RPD	Qual	Limits Low	Limits High	RPD
VY1022SBSD01	Dichlorodifluoromethane	20	19.5	ug/Kg	98	2		64	136	20
	Chloromethane	20	17.5	ug/Kg	88	2		52	151	20
	Vinyl chloride	20	18.3	ug/Kg	92	2		56	148	20
	Bromomethane	20	19.0	ug/Kg	95	5		58	141	20
	Chloroethane	20	18.9	ug/Kg	95	4		69	130	20
	Trichlorofluoromethane	20	19.5	ug/Kg	98	3		69	134	20
	1,1,2-Trichlorotrifluoroethane	20	20.4	ug/Kg	102	4		81	123	20
	1,1-Dichloroethene	20	19.9	ug/Kg	100	4		79	121	20
	Acetone	100	120	ug/Kg	120	8		40	171	20
	Carbon disulfide	20	18.8	ug/Kg	94	3		59	130	20
	Methyl tert-butyl Ether	20	19.3	ug/Kg	97	2		77	129	20
	Methyl Acetate	20	16.0	ug/Kg	80	7		69	149	20
	Methylene Chloride	20	18.0	ug/Kg	90	2		72	131	20
	trans-1,2-Dichloroethene	20	20.1	ug/Kg	101	1		80	123	20
	1,1-Dichloroethane	20	19.9	ug/Kg	100	3		82	123	20
	Cyclohexane	20	18.5	ug/Kg	93	4		76	122	20
	2-Butanone	100	110	ug/Kg	110	0		69	131	20
	Carbon Tetrachloride	20	20.5	ug/Kg	103	4		76	129	20
	cis-1,2-Dichloroethene	20	20.7	ug/Kg	104	2		82	123	20
	Bromochloromethane	20	19.3	ug/Kg	97	0		80	127	20
	Chloroform	20	20.6	ug/Kg	103	3		82	125	20
	1,1,1-Trichloroethane	20	20.7	ug/Kg	104	2		80	126	20
	Methylcyclohexane	20	20.0	ug/Kg	100	4		77	123	20
	Benzene	20	20.7	ug/Kg	104	2		84	121	20
	1,2-Dichloroethane	20	19.4	ug/Kg	97	2		81	126	20
	Trichloroethene	20	21.2	ug/Kg	106	4		83	122	20
	1,2-Dichloropropane	20	20.3	ug/Kg	102	3		83	122	20
	Bromodichloromethane	20	20.7	ug/Kg	104	2		82	123	20
	4-Methyl-2-Pentanone	100	91.4	ug/Kg	91	5		70	135	20
	Toluene	20	21.2	ug/Kg	106	4		83	122	20
	t-1,3-Dichloropropene	20	20.1	ug/Kg	101	4		78	124	20
	cis-1,3-Dichloropropene	20	20.4	ug/Kg	102	2		81	122	20
	1,1,2-Trichloroethane	20	21.2	ug/Kg	106	2		82	125	20
	2-Hexanone	100	100	ug/Kg	100	10		66	138	20
	Dibromochloromethane	20	20.7	ug/Kg	104	3		79	125	20
	1,2-Dibromoethane	20	20.5	ug/Kg	103	3		80	125	20
	Tetrachloroethene	20	22.3	ug/Kg	112	3		83	125	20
	Chlorobenzene	20	21.0	ug/Kg	105	2		84	122	20
	Ethyl Benzene	20	20.8	ug/Kg	104	2		82	124	20
	m/p-Xylenes	40	42.2	ug/Kg	106	2		83	124	20
	o-Xylene	20	21.1	ug/Kg	106	2		83	123	20
	Styrene	20	21.2	ug/Kg	106	0		82	124	20
	Bromoform	20	20.3	ug/Kg	102	1		75	127	20
	Isopropylbenzene	20	20.8	ug/Kg	104	5		82	124	20
	1,1,2,2-Tetrachloroethane	20	19.2	ug/Kg	96	0		77	127	20
	1,3-Dichlorobenzene	20	20.8	ug/Kg	104	2		83	122	20
	1,4-Dichlorobenzene	20	20.7	ug/Kg	104	2		84	121	20
	1,2-Dichlorobenzene	20	20.9	ug/Kg	104	2		83	124	20

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Laboratory Control Sample/Laboratory Control Sample Duplicate Summary

SW-846

SDG No.:	**Q3424**	**Analytical Method:**	**SW8260D**
Client:	**AECOM**	**Datafile :**	VY023546.D

Lab Sample ID	Parameter	Spike	Result	Unit	Rec	RPD	Qual	Limits Low	Limits High	RPD
VY1022SBSD01	1,2-Dibromo-3-Chloropropane	20	19.0	ug/Kg	95	1		66	134	20
	1,2,4-Trichlorobenzene	20	20.2	ug/Kg	101	1		78	127	20
	1,2,3-Trichlorobenzene	20	19.5	ug/Kg	98	1		70	137	20

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VOLATILE METHOD BLANK SUMMARY

Client ID: VY1022SBL01

Lab Name: Alliance | Contract: AECO02

Lab Code: ACE | SDG NO.: Q3424

Lab File ID: VY023544.D | Lab Sample ID: VY1022SBL01

Date Analyzed: 10/22/2025 | Time Analyzed: 10:00

GC Column: RXI-624 ID: 0.25 (mm) | Heated Purge: (Y/N) Y

Instrument ID: MSVOA_Y

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

EPA SAMPLE NO.	LAB SAMPLE ID	LAB FILE ID	DATE ANALYZED
VY1022SBS01	VY1022SBS01	VY023545.D	10/22/2025
VY1022SBSD01	VY1022SBSD01	VY023546.D	10/22/2025
PR132-DP3-20251021	Q3424-01	VY023555.D	10/22/2025
PR132-S11-010080-20251021	Q3424-02	VY023556.D	10/22/2025
PR132-S14-000094-20251021	Q3424-03	VY023557.D	10/22/2025

COMMENTS:

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VOLATILE ORGANIC INSTRUMENT PERFORMANCE CHECK
BROMOFLUOROBENZENE (BFB)

Lab Name: Alliance | Contract: AECO02

Lab Code: ACE | SDG NO.: Q3424

Lab File ID: VY023383.D | BFB Injection Date: 10/07/2025

Instrument ID: MSVOA_Y | BFB Injection Time: 08:43

GC Column: RXI-624 ID: 0.25 (mm) | Heated Purge: Y/N Y

m/e	ION ABUNDANCE CRITERIA	% RELATIVE ABUNDANCE
50	15.0 - 40.0% of mass 95	16.9
75	30.0 - 60.0% of mass 95	48.1
95	Base Peak, 100% relative abundance	100
96	5.0 - 9.0% of mass 95	6.6
173	Less than 2.0% of mass 174	0.9 (0.9) 1
174	50.0 - 100.0% of mass 95	99.1
175	5.0 - 9.0% of mass 174	7.3 (7.4) 1
176	95.0 - 101.0% of mass 174	95.4 (96.2) 1
177	5.0 - 9.0% of mass 176	6.3 (6.6) 2

1-Value is % mass 174

2-Value is % mass 176

THIS CHECK APPLIES TO THE FOLLOWING SAMPLES, MS, MSD, BLANKS, AND STANDARDS:

CLIENT ID	LAB SAMPLE ID	LAB FILE ID	DATE ANALYZED	TIME ANALYZED
VSTDICC005	VSTDICC005	VY023384.D	10/07/2025	09:17
VSTDICC010	VSTDICC010	VY023385.D	10/07/2025	10:02
VSTDICC020	VSTDICC020	VY023386.D	10/07/2025	11:24
VSTDICCC050	VSTDICCC050	VY023387.D	10/07/2025	11:47
VSTDICC100	VSTDICC100	VY023388.D	10/07/2025	12:09
VSTDICC150	VSTDICC150	VY023389.D	10/07/2025	12:32

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VOLATILE ORGANIC INSTRUMENT PERFORMANCE CHECK
BROMOFLUOROBENZENE (BFB)

Lab Name: Alliance
Contract: AECO02
Lab Code: ACE
SDG NO.: Q3424
Lab File ID: VY023542.D
BFB Injection Date: 10/22/2025
Instrument ID: MSVOA_Y
BFB Injection Time: 09:00
GC Column: RXI-624 ID: 0.25 (mm)
Heated Purge: Y/N Y

m/e	ION ABUNDANCE CRITERIA	% RELATIVE ABUNDANCE
50	15.0 - 40.0% of mass 95	15.8
75	30.0 - 60.0% of mass 95	47.5
95	Base Peak, 100% relative abundance	100
96	5.0 - 9.0% of mass 95	6.6
173	Less than 2.0% of mass 174	1 (1) 1
174	50.0 - 100.0% of mass 95	99.3
175	5.0 - 9.0% of mass 174	7.2 (7.2) 1
176	95.0 - 101.0% of mass 174	97.5 (98.2) 1
177	5.0 - 9.0% of mass 176	6.3 (6.4) 2

1-Value is % mass 174
2-Value is % mass 176

THIS CHECK APPLIES TO THE FOLLOWING SAMPLES, MS, MSD, BLANKS, AND STANDARDS:

CLIENT ID	LAB SAMPLE ID	LAB FILE ID	DATE ANALYZED	TIME ANALYZED
VSTDCCC050	VSTDCCC050	VY023543.D	10/22/2025	09:30
VY1022SBL01	VY1022SBL01	VY023544.D	10/22/2025	10:00
VY1022SBS01	VY1022SBS01	VY023545.D	10/22/2025	10:28
VY1022SBSD01	VY1022SBSD01	VY023546.D	10/22/2025	10:51
PR132-DP3-20251021	Q3424-01	VY023555.D	10/22/2025	16:46
PR132-S11-010080-20251021	Q3424-02	VY023556.D	10/22/2025	17:10
PR132-S14-000094-20251021	Q3424-03	VY023557.D	10/22/2025	17:35

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VOLATILE INTERNAL STANDARD AREA AND RT SUMMARY

Lab Name: Alliance Contract: AECO02

Lab Code: ACE SDG NO.: Q3424

Lab File ID: VY023543.D Date Analyzed: 10/22/2025

Instrument ID: MSVOA_Y Time Analyzed: 09:30

GC Column: RXI-624 ID: 0.25 (mm) Heated Purge: (Y/N) Y

	IS1 AREA #	RT #	IS2 AREA #	RT #	IS3 AREA #	RT #
12 HOUR STD	557873	7.71	806690	8.62	720008	11.42
UPPER LIMIT	1115750	8.213	1613380	9.116	1440020	11.92
LOWER LIMIT	278937	7.213	403345	8.116	360004	10.92
EPA SAMPLE NO.						
PR132-DP3-20251021	829968	7.71	1363938	8.62	1163621	11.41
PR132-S11-010080-20251021	807599	7.71	1343623	8.62	1154123	11.41
PR132-S14-000094-20251021	766523	7.71	1219443	8.62	1038965	11.41
VY1022SBL01	890059	7.71	1434768	8.62	1180185	11.42
VY1022SBS01	546555	7.71	794303	8.62	700136	11.41
VY1022SBSD01	542616	7.71	794200	8.62	691787	11.41

IS1 = Pentafluorobenzene
IS2 = 1,4-Difluorobenzene
IS3 = Chlorobenzene-d5

AREA UPPER LIMIT = +100% of internal standard area
AREA LOWER LIMIT = -50% of internal standard area
RT UPPER LIMIT = +0.50 minutes of internal standard RT
RT LOWER LIMIT = -0.50 minutes of internal standard RT

Column used to flag values outside QC limits with an asterisk.
* Values outside of QC limits.

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VOLATILE INTERNAL STANDARD AREA AND RT SUMMARY

Lab Name: Alliance Contract: AECO02

Lab Code: ACE SDG NO.: Q3424

Lab File ID: VY023543.D Date Analyzed: 10/22/2025

Instrument ID: MSVOA_Y Time Analyzed: 09:30

GC Column: RXI-624 ID: 0.25 (mm) Heated Purge: (Y/N) Y

	IS4 AREA #	RT #				
12 HOUR STD	373234	13.346				
UPPER LIMIT	746468	13.846				
LOWER LIMIT	186617	12.846				
EPA SAMPLE NO.						
PR132-DP3-20251021	482166	13.35				
PR132-S11-010080-20251021	478051	13.35				
PR132-S14-000094-20251021	408239	13.35				
VY1022SBL01	484557	13.35				
VY1022SBS01	365280	13.35				
VY1022SBSD01	364513	13.35				

IS4 = 1,4-Dichlorobenzene-d4

AREA UPPER LIMIT = +100% of internal standard area
AREA LOWER LIMIT = -50% of internal standard area
RT UPPER LIMIT = +0.50 minutes of internal standard RT
RT LOWER LIMIT = -0.50 minutes of internal standard RT

Column used to flag values outside QC limits with an asterisk.
* Values outside of QC limits.

SAMPLE DATA

Alliance TECHNICAL GROUP
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Report of Analysis

Client:	AECOM	Date Collected:	10/21/25
Project:	AE1-CTY 3.2.Z-PR-DOCK-Des-ODC - 60693795-1719206	Date Received:	10/21/25
Client Sample ID:	PR132-DP3-20251021	SDG No.:	Q3424
Lab Sample ID:	Q3424-01	Matrix:	SOIL
Analytical Method:	8260D	Level : LOW	% Solid: 45.9
Sample Wt/Vol:	4.21 g	Final Vol: 5000 uL	Test: VOC-TCLVOA-10

CAS Number	Parameter	Conc.	Qua.	DF	MDL	LOQ / CRQL	Units	Date Ana.	BatchID
TARGETS									
75-71-8	Dichlorodifluoromethane	12.9	U	1	2.90	12.9	ug/Kg	10/22/25 16:46	VY102225
74-87-3	Chloromethane	12.9	U	1	2.90	12.9	ug/Kg	10/22/25 16:46	VY102225
75-01-4	Vinyl Chloride	12.9	U	1	2.00	12.9	ug/Kg	10/22/25 16:46	VY102225
74-83-9	Bromomethane	12.9	U	1	2.80	12.9	ug/Kg	10/22/25 16:46	VY102225
75-00-3	Chloroethane	12.9	U	1	3.30	12.9	ug/Kg	10/22/25 16:46	VY102225
75-69-4	Trichlorofluoromethane	12.9	U	1	3.10	12.9	ug/Kg	10/22/25 16:46	VY102225
76-13-1	1,1,2-Trichlorotrifluoroethane	12.9	U	1	2.70	12.9	ug/Kg	10/22/25 16:46	VY102225
75-35-4	1,1-Dichloroethene	12.9	U	1	2.60	12.9	ug/Kg	10/22/25 16:46	VY102225
67-64-1	Acetone	33.0	J	1	12.3	64.7	ug/Kg	10/22/25 16:46	VY102225
75-15-0	Carbon Disulfide	16.2		1	2.70	12.9	ug/Kg	10/22/25 16:46	VY102225
1634-04-4	Methyl tert-butyl Ether	12.9	U	1	1.90	12.9	ug/Kg	10/22/25 16:46	VY102225
79-20-9	Methyl Acetate	12.9	U	1	4.00	12.9	ug/Kg	10/22/25 16:46	VY102225
75-09-2	Methylene Chloride	25.9	U	1	9.10	25.9	ug/Kg	10/22/25 16:46	VY102225
156-60-5	trans-1,2-Dichloroethene	12.9	U	1	2.20	12.9	ug/Kg	10/22/25 16:46	VY102225
75-34-3	1,1-Dichloroethane	12.9	U	1	2.10	12.9	ug/Kg	10/22/25 16:46	VY102225
110-82-7	Cyclohexane	12.9	U	1	2.00	12.9	ug/Kg	10/22/25 16:46	VY102225
78-93-3	2-Butanone	64.7	U	1	16.9	64.7	ug/Kg	10/22/25 16:46	VY102225
56-23-5	Carbon Tetrachloride	12.9	U	1	2.50	12.9	ug/Kg	10/22/25 16:46	VY102225
156-59-2	cis-1,2-Dichloroethene	12.9	U	1	1.90	12.9	ug/Kg	10/22/25 16:46	VY102225
74-97-5	Bromochloromethane	12.9	U	1	3.00	12.9	ug/Kg	10/22/25 16:46	VY102225
67-66-3	Chloroform	12.9	U	1	2.20	12.9	ug/Kg	10/22/25 16:46	VY102225
71-55-6	1,1,1-Trichloroethane	12.9	U	1	2.40	12.9	ug/Kg	10/22/25 16:46	VY102225
108-87-2	Methylcyclohexane	2.80	J	1	2.40	12.9	ug/Kg	10/22/25 16:46	VY102225
71-43-2	Benzene	12.9	U	1	2.00	12.9	ug/Kg	10/22/25 16:46	VY102225
107-06-2	1,2-Dichloroethane	12.9	U	1	2.00	12.9	ug/Kg	10/22/25 16:46	VY102225
79-01-6	Trichloroethene	12.9	U	1	2.10	12.9	ug/Kg	10/22/25 16:46	VY102225
78-87-5	1,2-Dichloropropane	12.9	U	1	2.40	12.9	ug/Kg	10/22/25 16:46	VY102225
75-27-4	Bromodichloromethane	12.9	U	1	2.00	12.9	ug/Kg	10/22/25 16:46	VY102225
108-10-1	4-Methyl-2-Pentanone	64.7	U	1	9.30	64.7	ug/Kg	10/22/25 16:46	VY102225
108-88-3	Toluene	12.9	U	1	2.00	12.9	ug/Kg	10/22/25 16:46	VY102225
10061-02-6	t-1,3-Dichloropropene	12.9	U	1	1.70	12.9	ug/Kg	10/22/25 16:46	VY102225
10061-01-5	cis-1,3-Dichloropropene	12.9	U	1	1.60	12.9	ug/Kg	10/22/25 16:46	VY102225
79-00-5	1,1,2-Trichloroethane	12.9	U	1	2.40	12.9	ug/Kg	10/22/25 16:46	VY102225
591-78-6	2-Hexanone	64.7	U	1	9.50	64.7	ug/Kg	10/22/25 16:46	VY102225
124-48-1	Dibromochloromethane	12.9	U	1	2.30	12.9	ug/Kg	10/22/25 16:46	VY102225
106-93-4	1,2-Dibromoethane	12.9	U	1	2.30	12.9	ug/Kg	10/22/25 16:46	VY102225
127-18-4	Tetrachloroethene	12.9	U	1	2.70	12.9	ug/Kg	10/22/25 16:46	VY102225
108-90-7	Chlorobenzene	12.9	U	1	2.40	12.9	ug/Kg	10/22/25 16:46	VY102225
100-41-4	Ethyl Benzene	12.9	U	1	1.70	12.9	ug/Kg	10/22/25 16:46	VY102225
179601-23-1	m/p-Xylenes	25.9	U	1	3.20	25.9	ug/Kg	10/22/25 16:46	VY102225
95-47-6	o-Xylene	12.9	U	1	2.10	12.9	ug/Kg	10/22/25 16:46	VY102225
100-42-5	Styrene	12.9	U	1	1.80	12.9	ug/Kg	10/22/25 16:46	VY102225
75-25-2	Bromoform	12.9	U	1	2.20	12.9	ug/Kg	10/22/25 16:46	VY102225

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Report of Analysis

Client:	AECOM	Date Collected:	10/21/25
Project:	AE1-CTY 3.2.Z-PR-DOCK-Des-ODC - 60693795-1719206	Date Received:	10/21/25
Client Sample ID:	PR132-DP3-20251021	SDG No.:	Q3424
Lab Sample ID:	Q3424-01	Matrix:	SOIL
Analytical Method:	8260D Level : LOW	% Solid:	45.9
Sample Wt/Vol:	4.21 g Final Vol: 5000 uL	Test:	VOC-TCLVOA-10

CAS Number	Parameter	Conc.	Qua.	DF	MDL	LOQ / CRQL	Units	Date Ana.	BatchID
98-82-8	Isopropylbenzene	12.9	U	1	2.00	12.9	ug/Kg	10/22/25 16:46	VY102225
79-34-5	1,1,2,2-Tetrachloroethane	12.9	U	1	3.10	12.9	ug/Kg	10/22/25 16:46	VY102225
541-73-1	1,3-Dichlorobenzene	12.9	U	1	4.40	12.9	ug/Kg	10/22/25 16:46	VY102225
106-46-7	1,4-Dichlorobenzene	12.9	U	1	4.00	12.9	ug/Kg	10/22/25 16:46	VY102225
95-50-1	1,2-Dichlorobenzene	12.9	U	1	3.80	12.9	ug/Kg	10/22/25 16:46	VY102225
96-12-8	1,2-Dibromo-3-Chloropropane	12.9	U	1	4.80	12.9	ug/Kg	10/22/25 16:46	VY102225
120-82-1	1,2,4-Trichlorobenzene	12.9	U	1	7.70	12.9	ug/Kg	10/22/25 16:46	VY102225
87-61-6	1,2,3-Trichlorobenzene	12.9	U	1	8.20	12.9	ug/Kg	10/22/25 16:46	VY102225
SURROGATES									
17060-07-0	1,2-Dichloroethane-d4	53.2			63 - 155	106%	SPK: 50		
1868-53-7	Dibromofluoromethane	50.5			70 - 134	101%	SPK: 50		
2037-26-5	Toluene-d8	49.8			74 - 123	100%	SPK: 50		
460-00-4	4-Bromofluorobenzene	45.5			17 - 146	91%	SPK: 50		
INTERNAL STANDARDS		**Area Count**							
363-72-4	Pentafluorobenzene	830000							
540-36-3	1,4-Difluorobenzene	1360000							
3114-55-4	Chlorobenzene-d5	1160000							
3855-82-1	1,4-Dichlorobenzene-d4	482000							
TENTATIVE IDENTIFIED COMPOUNDS									
014676-29-0	Heptane, 3-ethyl-2-methyl-	25.6	J			12.2	ug/Kg		
000123-48-8	3-Heptene, 2,2,4,6,6-pentamethyl-	21.2	J			12.9	ug/Kg		
001074-92-6	2-tert-Butyltoluene	21.9	J			13.9	ug/Kg		

U = Not Detected
LOQ = Limit of Quantitation
MDL = Method Detection Limit
LOD = Limit of Detection
E = Value Exceeds Calibration Range
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
() = Laboratory InHouse Limit
A = Aldol-Condensation Reaction Products

Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY102225\
Data File : VY023555.D
Acq On : 22 Oct 2025 16:46
Operator : SY/MD
Sample : Q3424-01
Misc : 4.21g/5.0mL/MSVOA_Y/SOIL/A
ALS Vial : 15 Sample Multiplier: 1

Instrument :
MSVOA_Y
ClientSampleId :
PR132-DP3-20251021

Quant Time: Oct 24 02:37:12 2025
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260
QLast Update : Wed Oct 08 05:12:50 2025
Response via : Initial Calibration

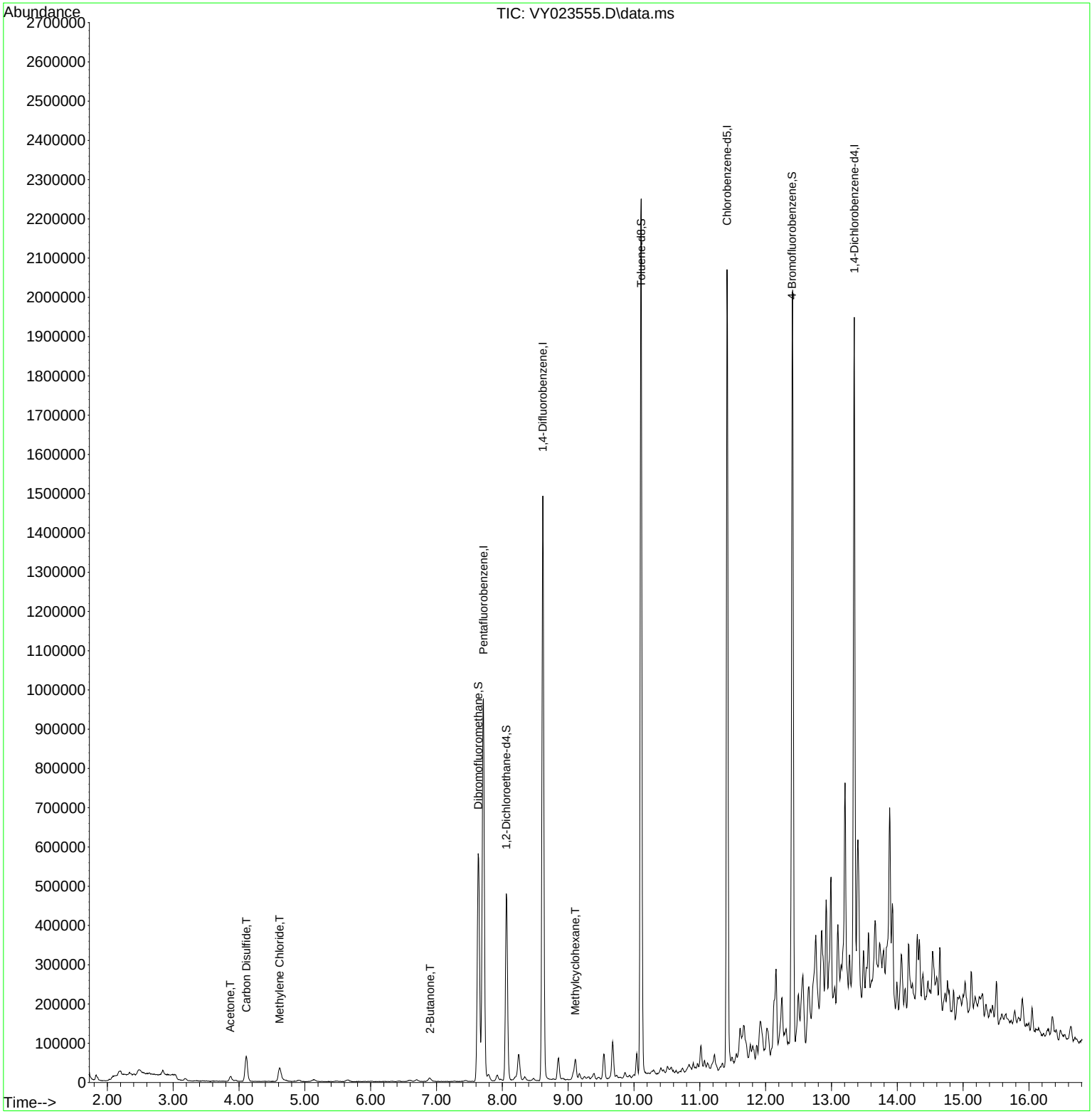
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Pentafluorobenzene	7.713	168	829968	50.000	ug/l	0.00
34) 1,4-Difluorobenzene	8.615	114	1363938	50.000	ug/l	0.00
63) Chlorobenzene-d5	11.414	117	1163621	50.000	ug/l	0.00
72) 1,4-Dichlorobenzene-d4	13.346	152	482166	50.000	ug/l	0.00
System Monitoring Compounds						
33) 1,2-Dichloroethane-d4	8.061	65	369134	53.187	ug/l	0.00
Spiked Amount 50.000	Range 50 - 163		Recovery = 106.380%			
35) Dibromofluoromethane	7.634	113	422949	50.467	ug/l	0.00
Spiked Amount 50.000	Range 54 - 147		Recovery = 100.940%			
50) Toluene-d8	10.109	98	1553916	49.788	ug/l	0.00
Spiked Amount 50.000	Range 58 - 134		Recovery = 99.580%			
62) 4-Bromofluorobenzene	12.401	95	469265	45.541	ug/l	0.00
Spiked Amount 50.000	Range 30 - 143		Recovery = 91.080%			
Target Compounds						Qvalue
16) Acetone	3.866	43	21104	12.773	ug/l	94
17) Carbon Disulfide	4.110	76	132696	6.262	ug/l	96
20) Methylene Chloride	4.616	84	26951	3.017	ug/l	98
25) 2-Butanone	6.902	43	6810	3.376	ug/l	95
39) Methylcyclohexane	9.109	83	15649	1.083	ug/l #	72

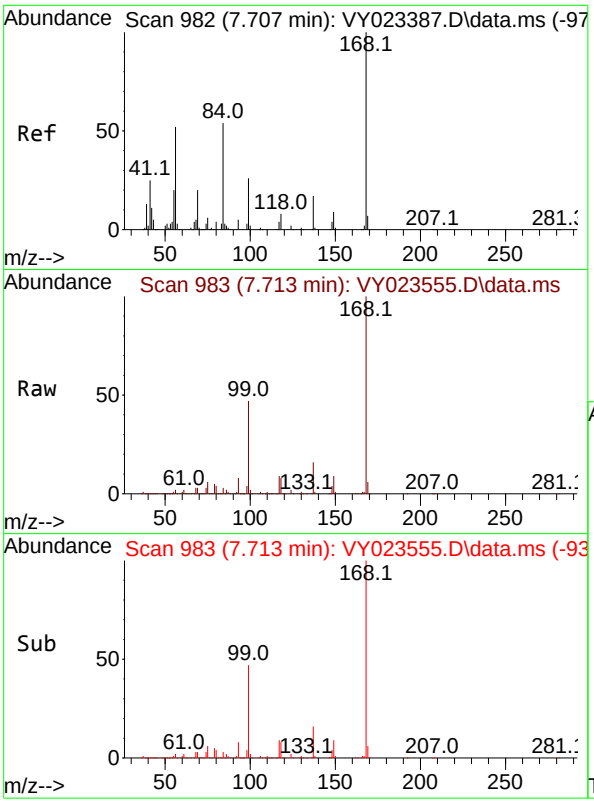
(#) = qualifier out of range (m) = manual integration (+) = signals summed

Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY102225\
Data File : VY023555.D
Acq On : 22 Oct 2025 16:46
Operator : SY/MD
Sample : Q3424-01
Misc : 4.21g/5.0mL/MSVOA_Y/SOIL/A
ALS Vial : 15 Sample Multiplier: 1

Instrument :
MSVOA_Y
ClientSampleId :
PR132-DP3-20251021

Quant Time: Oct 24 02:37:12 2025
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260
QLast Update : Wed Oct 08 05:12:50 2025
Response via : Initial Calibration



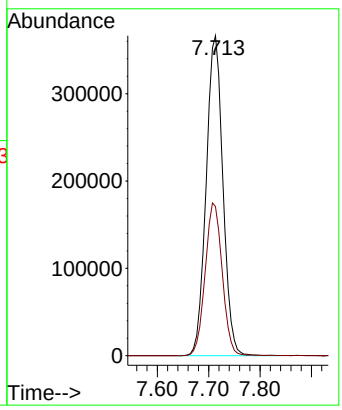


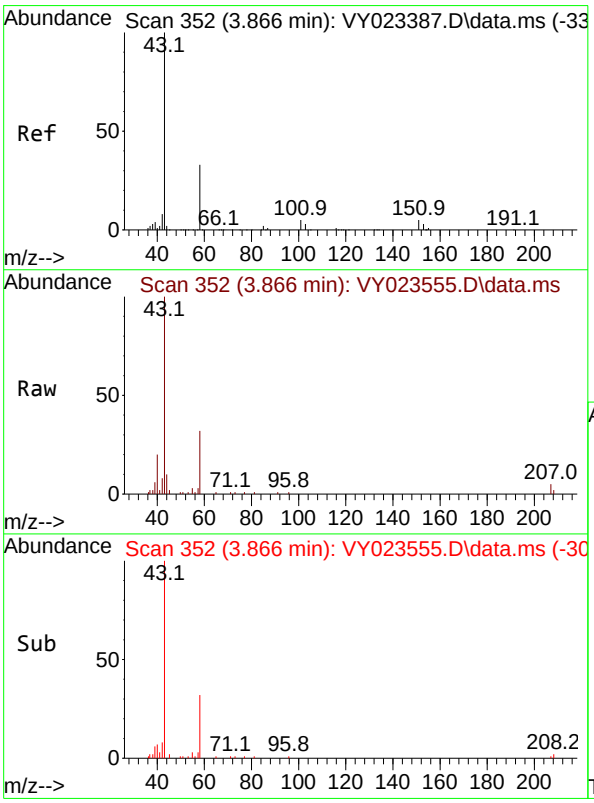
#1
Pentafluorobenzene
Concen: 50.000 ug/l
RT: 7.713 min Scan# 9
Delta R.T. 0.006 min
Lab File: VY023555.D
Acq: 22 Oct 2025 16:46

Instrument :
MSVOA_Y
ClientSampleId :
PR132-DP3-20251021

Tgt Ion:168 Resp: 829968

Ion	Ratio	Lower	Upper
168	100		
99	46.6	39.7	59.5

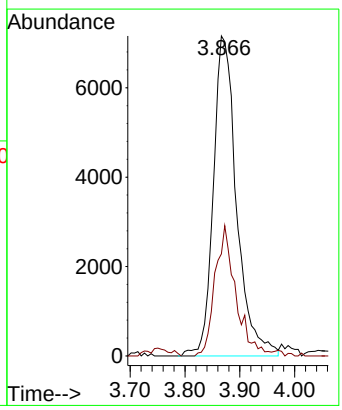


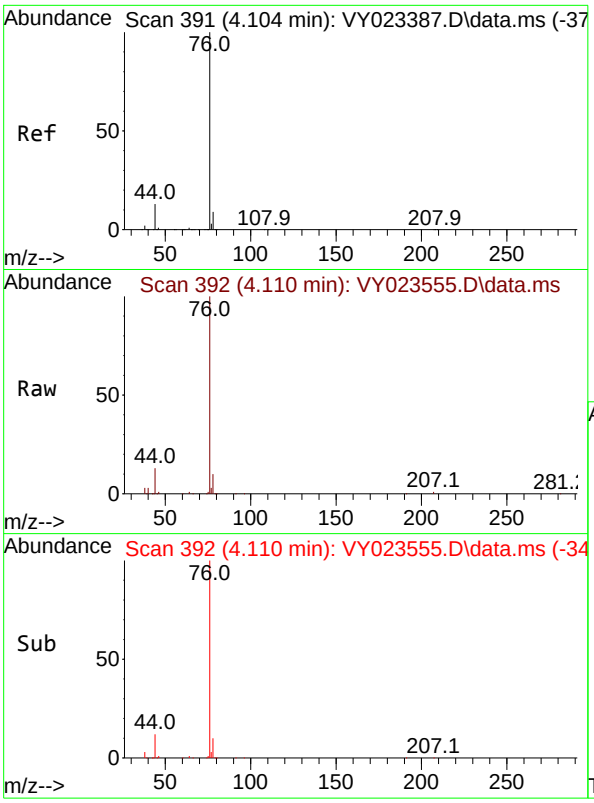


#16
Acetone
Concen: 12.773 ug/l
RT: 3.866 min Scan# 352
Delta R.T. -0.000 min
Lab File: VY023555.D
Acq: 22 Oct 2025 16:46

Tgt Ion: 43 Resp: 21104

Ion	Ratio	Lower	Upper
43	100		
58	31.1	27.7	41.5



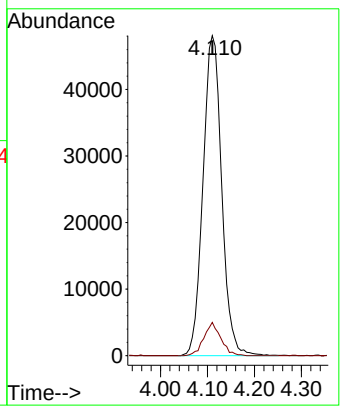


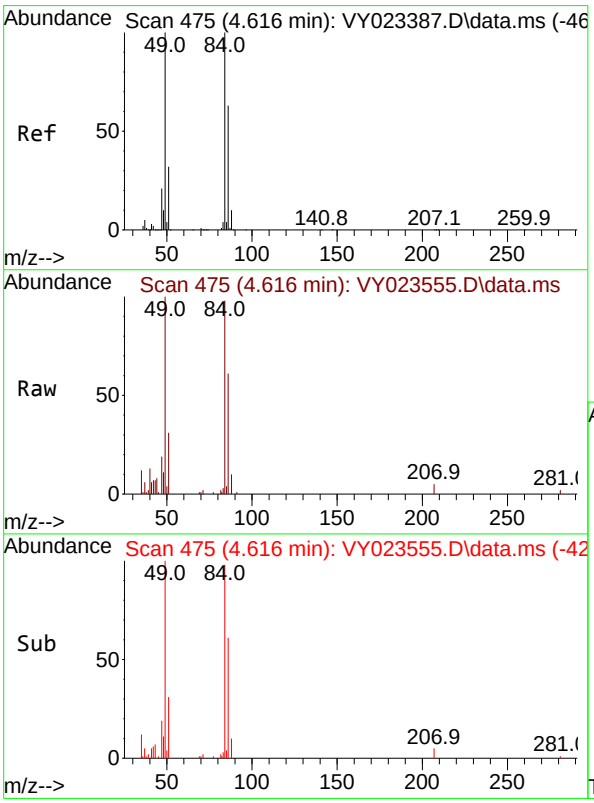
#17
Carbon Disulfide
Concen: 6.262 ug/l
RT: 4.110 min Scan# 3
Delta R.T. 0.006 min
Lab File: VY023555.D
Acq: 22 Oct 2025 16:46

Instrument :
MSVOA_Y
ClientSampleId :
PR132-DP3-20251021

Tgt Ion: 76 Resp: 132696

Ion	Ratio	Lower	Upper
76	100		
78	10.4	7.3	10.9

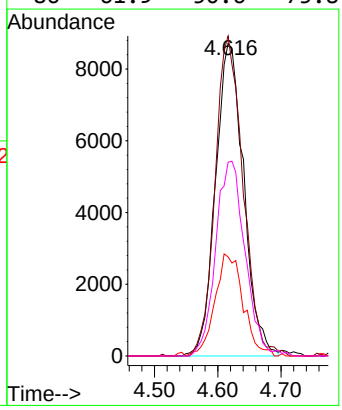


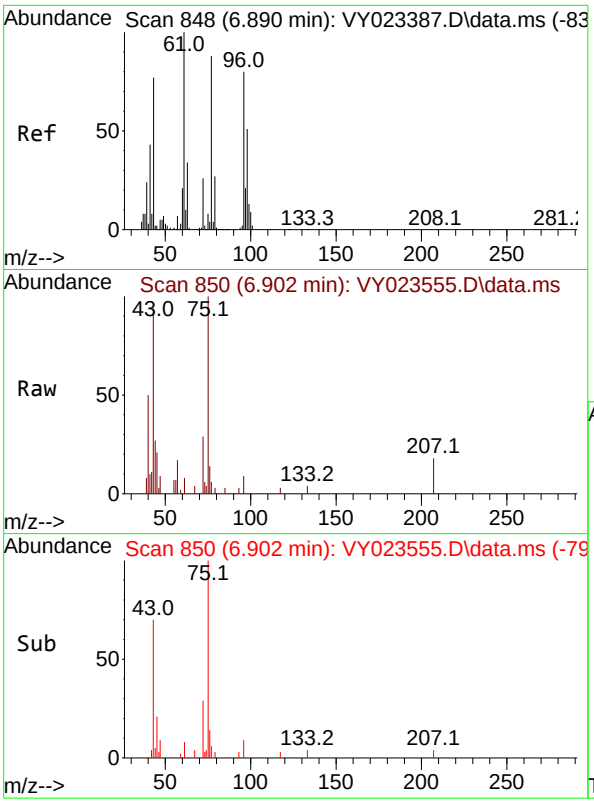


#20
Methylene Chloride
Concen: 3.017 ug/l
RT: 4.616 min Scan# 475
Delta R.T. -0.000 min
Lab File: VY023555.D
Acq: 22 Oct 2025 16:46

Tgt Ion: 84 Resp: 26951

Ion	Ratio	Lower	Upper
84	100		
49	102.3	80.2	120.4
51	31.7	25.9	38.9
86	61.9	50.6	75.8



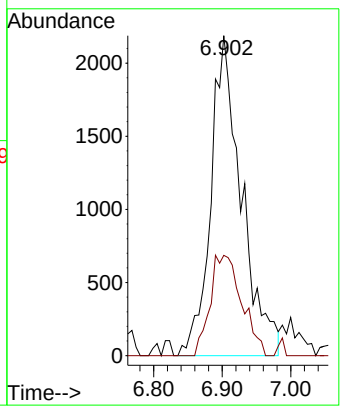


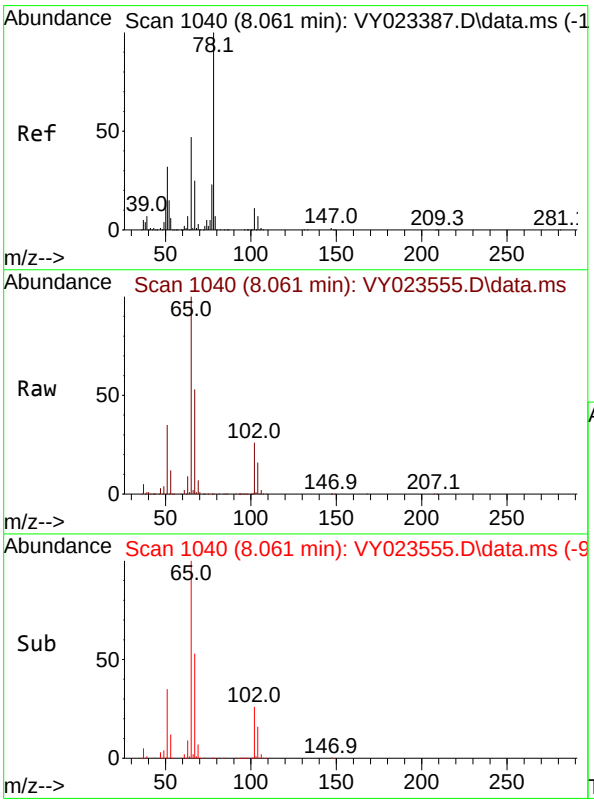
#25
2-Butanone
Concen: 3.376 ug/l
RT: 6.902 min Scan# 8
Delta R.T. 0.012 min
Lab File: VY023555.D
Acq: 22 Oct 2025 16:46

Instrument :
MSVOA_Y
ClientSampleId :
PR132-DP3-20251021

Tgt Ion: 43 Resp: 6810

Ion	Ratio	Lower	Upper
43	100		
72	31.4	27.4	41.2

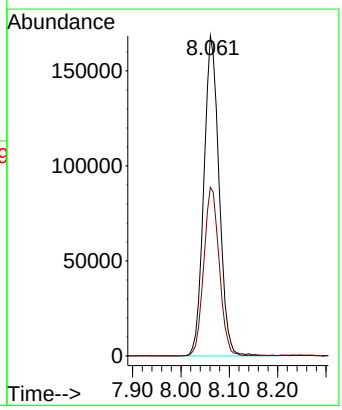


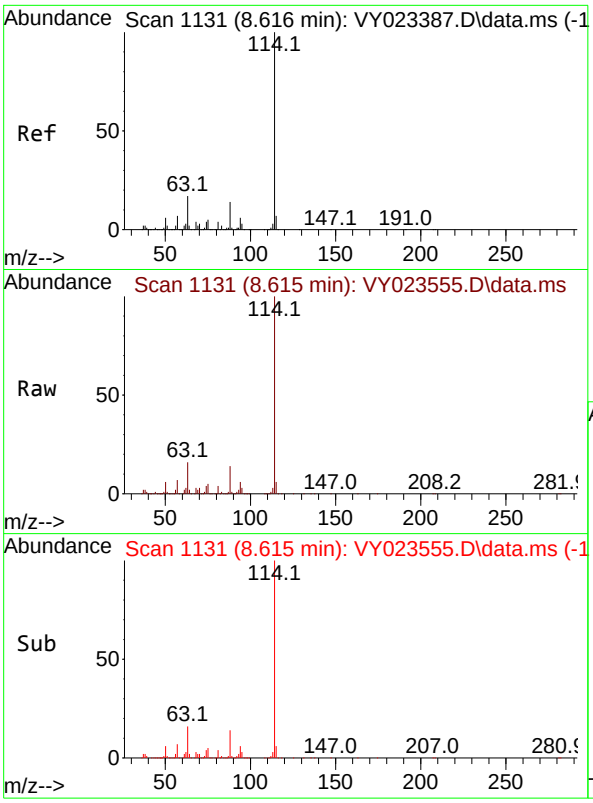


#33
1,2-Dichloroethane-d4
Concen: 53.187 ug/l
RT: 8.061 min Scan# 1040
Delta R.T. -0.000 min
Lab File: VY023555.D
Acq: 22 Oct 2025 16:46

Tgt Ion: 65 Resp: 369134

Ion	Ratio	Lower	Upper
65	100		
67	53.3	0.0	105.8



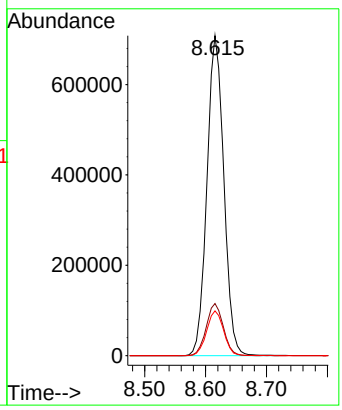


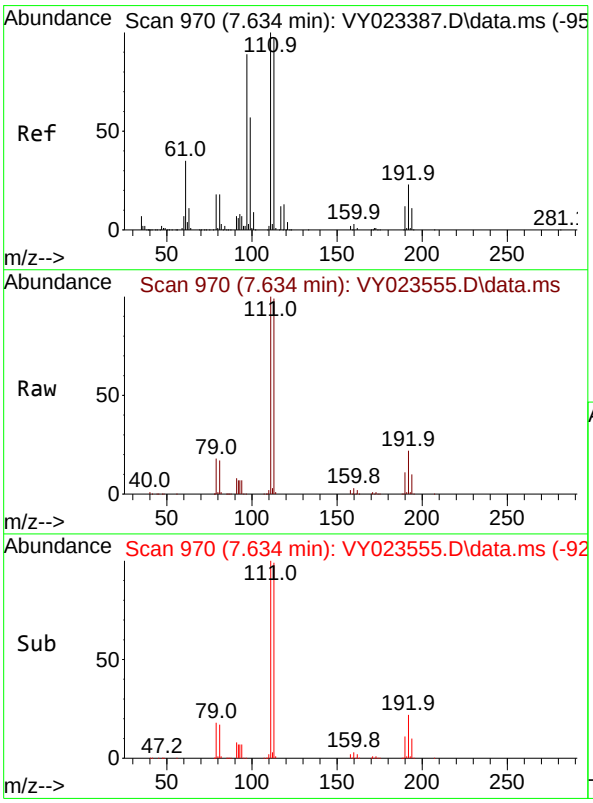
#34
1,4-Difluorobenzene
Concen: 50.000 ug/l
RT: 8.615 min Scan# 11
Delta R.T. -0.000 min
Lab File: VY023555.D
Acq: 22 Oct 2025 16:46

Instrument :
MSVOA_Y
ClientSampleId :
PR132-DP3-20251021

Tgt Ion:114 Resp: 1363938

Ion	Ratio	Lower	Upper
114	100		
63	16.3	0.0	34.2
88	14.0	0.0	28.4

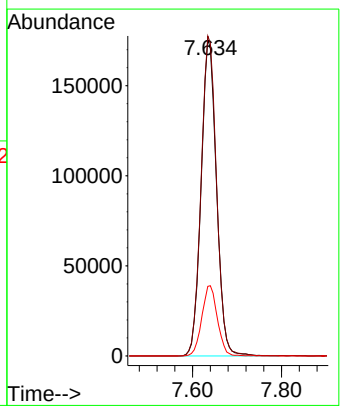


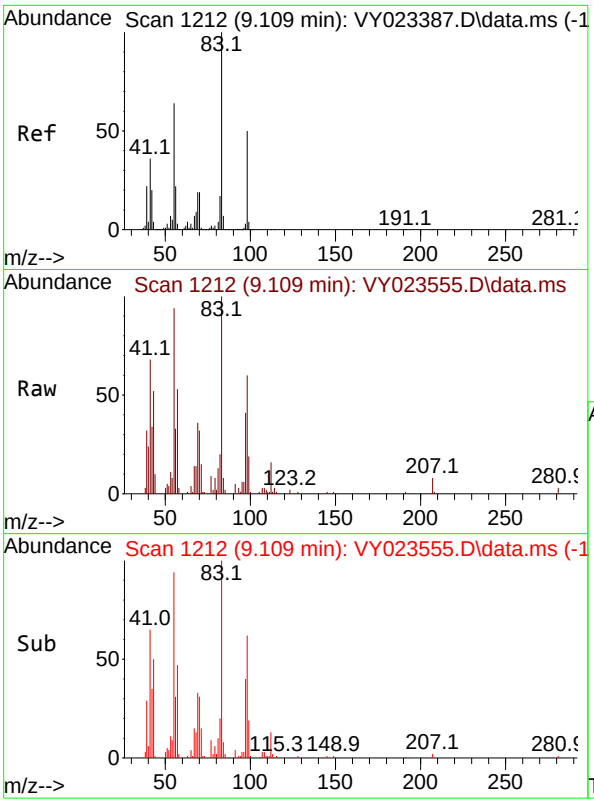


#35
Dibromofluoromethane
Concen: 50.467 ug/l
RT: 7.634 min Scan# 970
Delta R.T. -0.000 min
Lab File: VY023555.D
Acq: 22 Oct 2025 16:46

Tgt Ion:113 Resp: 422949

Ion	Ratio	Lower	Upper
113	100		
111	101.9	81.8	122.6
192	22.4	18.0	27.0



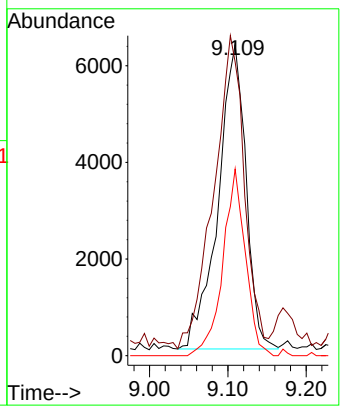


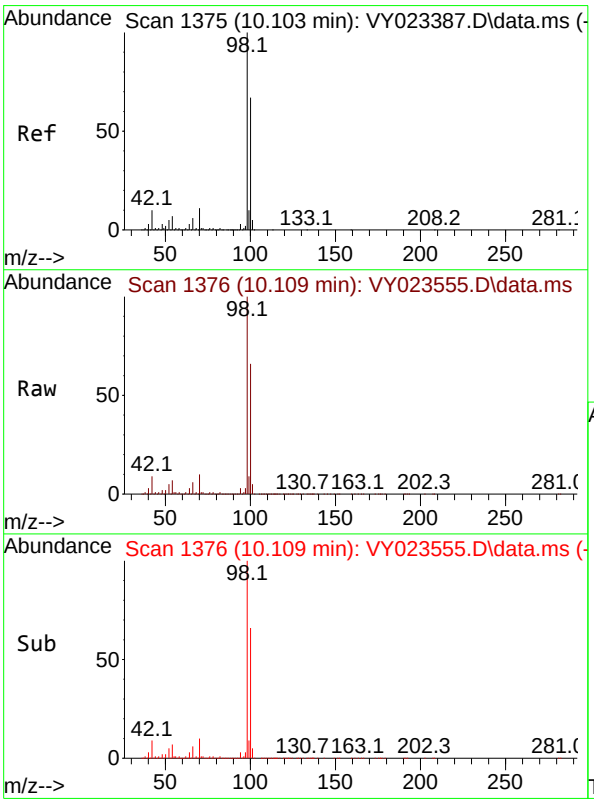
#39
Methylcyclohexane
Concen: 1.083 ug/l
RT: 9.109 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023555.D
Acq: 22 Oct 2025 16:46

Instrument :
MSVOA_Y
ClientSampleId :
PR132-DP3-20251021

Tgt Ion: 83 Resp: 15649

Ion	Ratio	Lower	Upper
83	100		
55	94.2	51.4	77.2#
98	61.3	40.4	60.6#

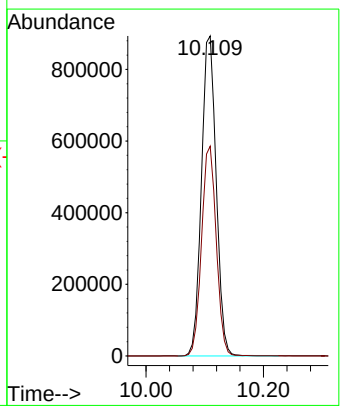


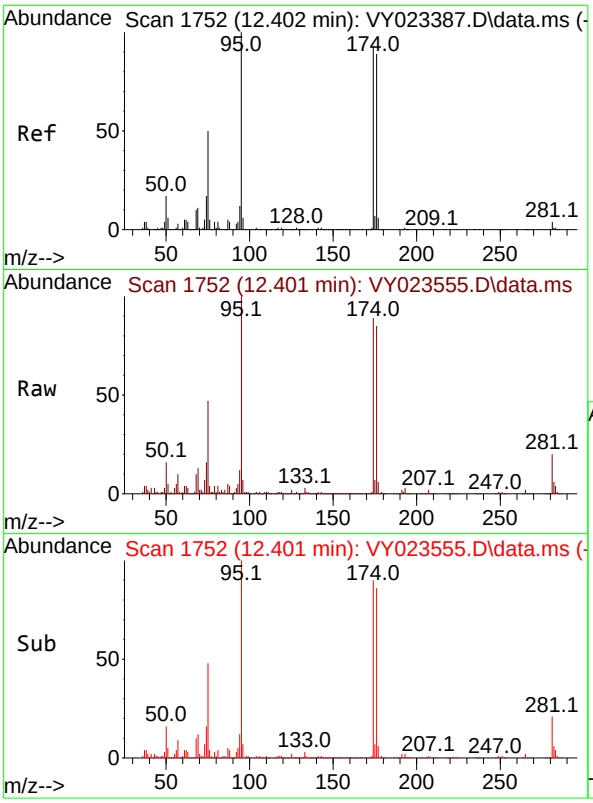


#50
Toluene-d8
Concen: 49.788 ug/l
RT: 10.109 min Scan# 1376
Delta R.T. 0.006 min
Lab File: VY023555.D
Acq: 22 Oct 2025 16:46

Tgt Ion: 98 Resp: 1553916

Ion	Ratio	Lower	Upper
98	100		
100	65.5	53.0	79.4



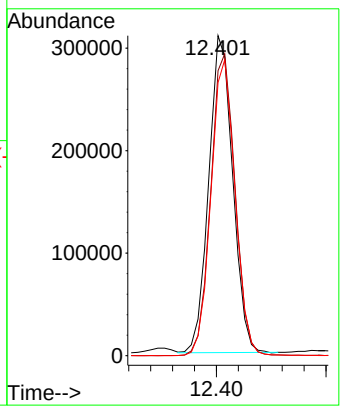


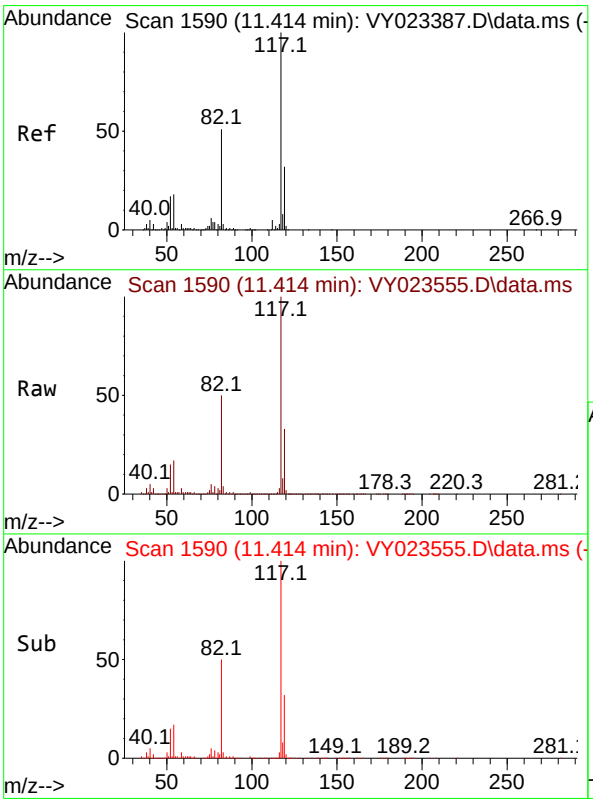
#62
4-Bromofluorobenzene
Concen: 45.541 ug/l
RT: 12.401 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023555.D
Acq: 22 Oct 2025 16:46

Instrument :
MSVOA_Y
ClientSampleId :
PR132-DP3-20251021

Tgt Ion: 95 Resp: 469265

Ion	Ratio	Lower	Upper
95	100		
174	96.9	0.0	192.8
176	94.1	0.0	187.6

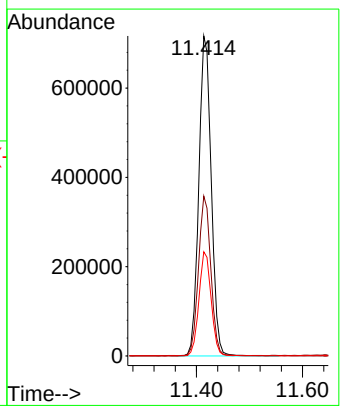


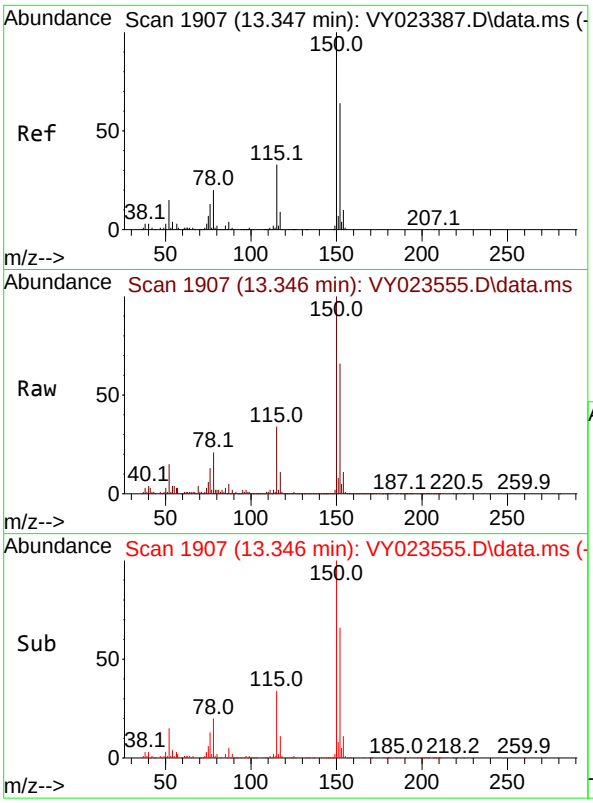


#63
Chlorobenzene-d5
Concen: 50.000 ug/l
RT: 11.414 min Scan# 1590
Delta R.T. -0.000 min
Lab File: VY023555.D
Acq: 22 Oct 2025 16:46

Tgt Ion:117 Resp: 1163621

Ion	Ratio	Lower	Upper
117	100		
82	49.8	41.0	61.4
119	32.5	25.6	38.4



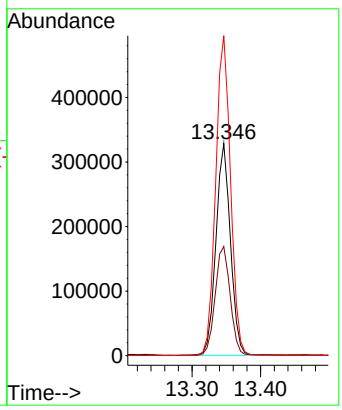


#72
1,4-Dichlorobenzene-d4
Concen: 50.000 ug/l
RT: 13.346 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023555.D
Acq: 22 Oct 2025 16:46

Instrument :
MSVOA_Y
ClientSampleId :
PR132-DP3-20251021

Tgt Ion:152 Resp: 482166

Ion	Ratio	Lower	Upper
152	100		
115	53.0	27.1	81.2
150	153.7	0.0	347.4



Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY102225\
Data File : VY023555.D
Acq On : 22 Oct 2025 16:46
Operator : SY/MD
Sample : Q3424-01
Misc : 4.21g/5.0mL/MSVOA_Y/SOIL/A
ALS Vial : 15 Sample Multiplier: 1

Instrument :
MSVOA_Y
ClientSampleId :
PR132-DP3-20251021

Integration Parameters: RTEINT.P
Integrator: RTE
Smoothing : ON Filtering: 5
Sampling : 1 Min Area: 3 % of largest Peak
Start Thrs: 0.2 Max Peaks: 100
Stop Thrs : 0 Peak Location: TOP

If leading or trailing edge < 100 prefer < Baseline drop else tangent >
Peak separation: 5

Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Title : SW846 8260

Signal : TIC: VY023555.D\data.ms

peak #	R.T. min	first scan	max scan	last scan	PK TY	peak height	corr. area	corr. % max.	% of total
1	4.110	383	392	402	rBV	63527	171726	4.39%	0.509%
2	4.616	463	475	491	rBV2	34820	124919	3.19%	0.370%
3	7.634	959	970	976	rBV	580952	1401881	35.83%	4.155%
4	7.713	976	983	992	rVV	974247	2274026	58.12%	6.740%
5	7.786	992	995	1006	rVB6	16626	41664	1.06%	0.123%
6	8.061	1032	1040	1052	rBV	475501	1053834	26.93%	3.123%
7	8.250	1063	1071	1080	rVB2	64302	165426	4.23%	0.490%
8	8.615	1122	1131	1145	rBV	1489721	2905409	74.25%	8.611%
9	8.853	1162	1170	1177	rBV	54633	116422	2.98%	0.345%
10	9.109	1200	1212	1219	rBV5	50714	142966	3.65%	0.424%
11	9.542	1276	1283	1292	rBV2	63901	134880	3.45%	0.400%
12	9.676	1295	1305	1311	rBV2	93042	198667	5.08%	0.589%
13	10.042	1360	1365	1369	rBV	55924	91075	2.33%	0.270%
14	10.109	1369	1376	1387	rVB	2229089	3912770	100.00%	11.597%
15	11.017	1520	1525	1530	rBV2	53624	90498	2.31%	0.268%
16	11.225	1549	1559	1568	rVB4	40899	124840	3.19%	0.370%
17	11.414	1584	1590	1599	rBV	2030334	3316682	84.77%	9.830%
18	11.615	1618	1623	1626	rBV3	62481	120575	3.08%	0.357%
19	11.664	1629	1631	1642	rVB4	82309	216045	5.52%	0.640%
20	11.767	1644	1648	1651	rBV2	33379	52330	1.34%	0.155%
21	11.865	1660	1664	1667	rBV	34681	56992	1.46%	0.169%
22	11.920	1667	1673	1682	rVV6	89431	285567	7.30%	0.846%
23	12.017	1685	1689	1698	rVB6	68039	187817	4.80%	0.557%
24	12.158	1698	1712	1717	rBV4	218865	656186	16.77%	1.945%
25	12.249	1723	1727	1731	rVB4	94658	154264	3.94%	0.457%
26	12.407	1745	1753	1760	rBV3	1915568	3619437	92.50%	10.727%
27	12.499	1760	1768	1772	rBV3	121236	287110	7.34%	0.851%
28	12.566	1772	1779	1786	rVB5	172636	479153	12.25%	1.420%
29	12.657	1786	1794	1800	rBV6	142912	433173	11.07%	1.284%
30	12.761	1800	1811	1819	rVV7	214229	720878	18.42%	2.137%
31	12.853	1820	1826	1832	rVV2	198819	529966	13.54%	1.571%
32	12.920	1833	1837	1841	rVV2	264680	450808	11.52%	1.336%
33	12.993	1841	1849	1853	rVB	308893	603412	15.42%	1.788%
34	13.096	1861	1866	1871	rBV2	200061	384134	9.82%	1.139%
35	13.206	1880	1884	1892	rVB3	521350	864584	22.10%	2.562%
36	13.273	1892	1895	1899	rVV2	83619	101932	2.61%	0.302%

Sample Results: **VY023555.D**

Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY102225\
Data File : VY023555.D
Acq On : 22 Oct 2025 16:46
Operator : SY/MD
Sample : Q3424-01
Misc : 4.21g/5.0mL/MSVOA_Y/SOIL/A
ALS Vial : 15 Sample Multiplier: 1

Instrument :
MSVOA_Y
ClientSampleId :
PR132-DP3-20251021

Integration Parameters: RTEINT.P
Integrator: RTE
Smoothing : ON Filtering: 5
Sampling : 1 Min Area: 3 % of largest Peak
Start Thrs: 0.2 Max Peaks: 100
Stop Thrs : 0 Peak Location: TOP

If leading or trailing edge < 100 prefer < Baseline drop else tangent >
Peak separation: 5

Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Title : SW846 8260

37	13.346	1900	1907	1912	rVV	1708333	2744059	70.13%	8.133%
38	13.401	1912	1916	1925	rVB	401868	876882	22.41%	2.599%
39	13.487	1926	1930	1934	rBV4	117246	182509	4.66%	0.541%
40	13.560	1940	1942	1946	rVB3	140394	177657	4.54%	0.527%
41	13.663	1956	1959	1966	rVB7	118584	185093	4.73%	0.549%
42	13.883	1991	1995	1999	rVV	347595	518700	13.26%	1.537%
43	13.926	1999	2002	2009	rVB2	268095	463784	11.85%	1.375%
44	13.993	2010	2013	2017	rVB3	71033	90742	2.32%	0.269%
45	14.060	2021	2024	2030	rVB5	127947	242797	6.21%	0.720%
46	14.169	2038	2042	2050	rBV5	161465	368426	9.42%	1.092%
47	14.303	2060	2064	2067	rBV3	140294	239746	6.13%	0.711%
48	14.389	2074	2078	2084	rVB6	66472	119553	3.06%	0.354%
49	14.535	2099	2102	2108	rBV5	90216	164687	4.21%	0.488%
50	14.645	2117	2120	2127	rVB2	160743	264277	6.75%	0.783%
51	14.761	2137	2139	2142	rBV3	43662	47709	1.22%	0.141%
52	14.852	2152	2154	2158	rVB4	74259	96191	2.46%	0.285%
53	15.120	2195	2198	2204	rVB2	93271	146930	3.76%	0.435%
54	15.504	2258	2261	2266	rVB3	110514	178446	4.56%	0.529%
55	16.047	2347	2350	2356	rVB3	60175	94460	2.41%	0.280%
56	16.358	2397	2401	2405	rVB7	37299	65433	1.67%	0.194%

Sum of corrected areas: 33740129

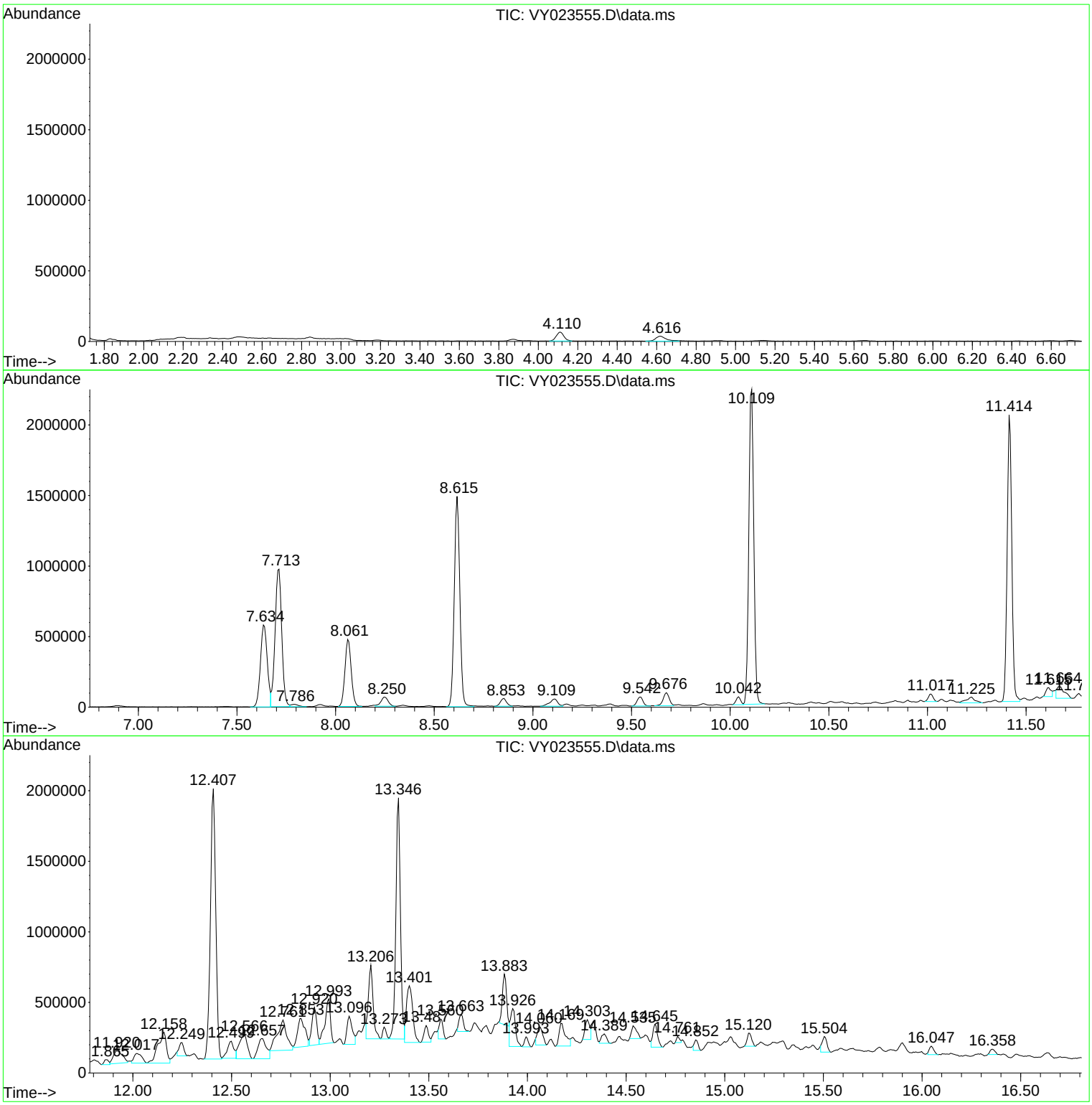
Sample Results: **VY023555.D**

Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY102225\
Data File : VY023555.D
Acq On : 22 Oct 2025 16:46
Operator : SY/MD
Sample : Q3424-01
Misc : 4.21g/5.0mL/MSVOA_Y/SOIL/A
ALS Vial : 15 Sample Multiplier: 1

Instrument :
MSVOA_Y
ClientSampleId :
PR132-DP3-20251021

Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260

TIC Library : C:\Database\NIST20.L
TIC Integration Parameters: LSCINT.P



Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY102225\
Data File : VY023555.D
Acq On : 22 Oct 2025 16:46
Operator : SY/MD
Sample : Q3424-01
Misc : 4.21g/5.0mL/MSVOA_Y/SOIL/A
ALS Vial : 15 Sample Multiplier: 1

Instrument :
MSVOA_Y
ClientSampleId :
PR132-DP3-20251021

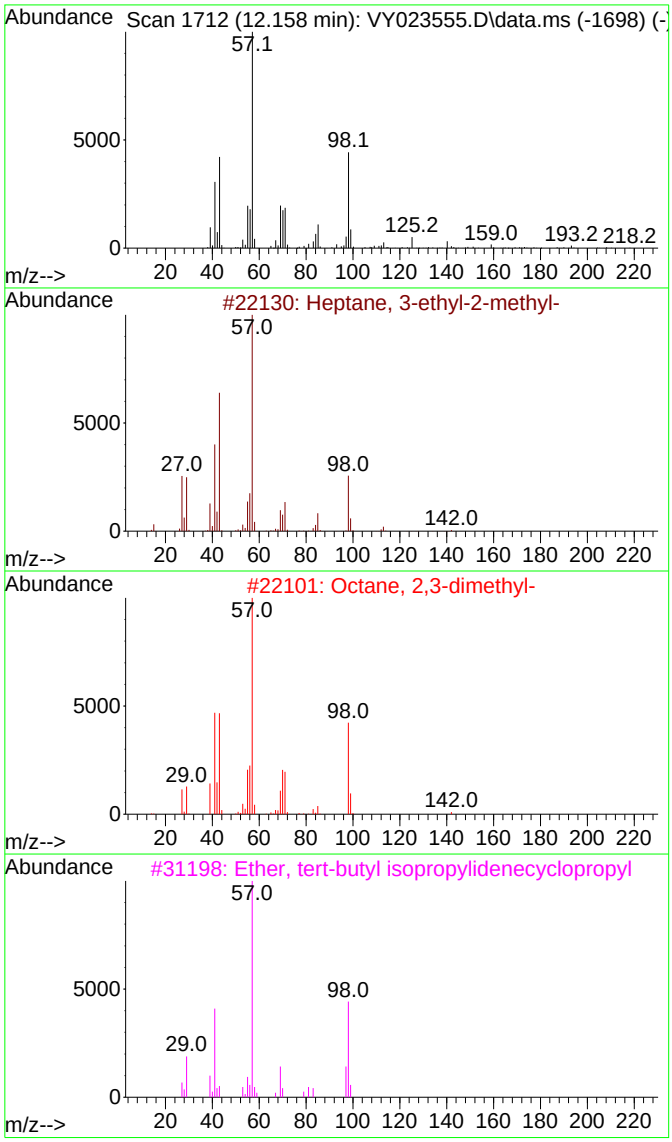
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260

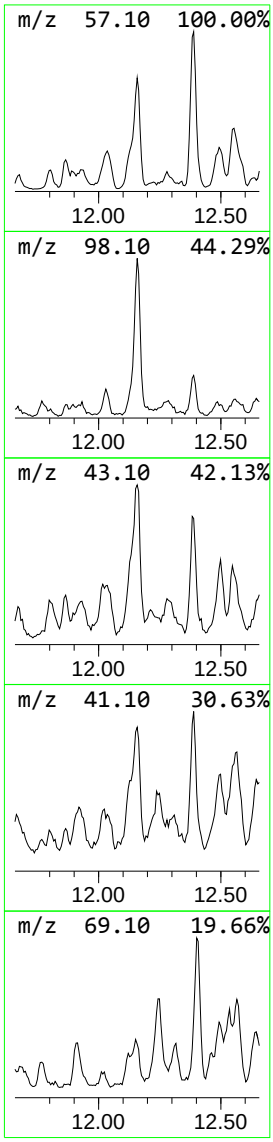
TIC Library : C:\Database\NIST20.L
TIC Integration Parameters: LSCINT.P

****
Peak Number 1 Heptane, 3-ethyl-2-methyl- Concentration Rank 5

R.T.	EstConc	Area	Relative to ISTD	R.T.
12.158	9.89 ug/l	656186	Chlorobenzene-d5	11.414

Hit# of 5	Tentative ID	MW	MolForm	CAS#	Qual
1	Heptane, 3-ethyl-2-methyl-	142	C10H22	014676-29-0	90
2	Octane, 2,3-dimethyl-	142	C10H22	007146-60-3	81
3	Ether, tert-butyl isopropylidene...	154	C10H18O	024524-56-9	47
4	Heptane, 4-propyl-	142	C10H22	003178-29-8	46
5	Heptane, 4-(1-methylethyl)-	142	C10H22	052896-87-4	43





Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY102225\
Data File : VY023555.D
Acq On : 22 Oct 2025 16:46
Operator : SY/MD
Sample : Q3424-01
Misc : 4.21g/5.0mL/MSVOA_Y/SOIL/A
ALS Vial : 15 Sample Multiplier: 1

Instrument :
MSVOA_Y
ClientSampleId :
PR132-DP3-20251021

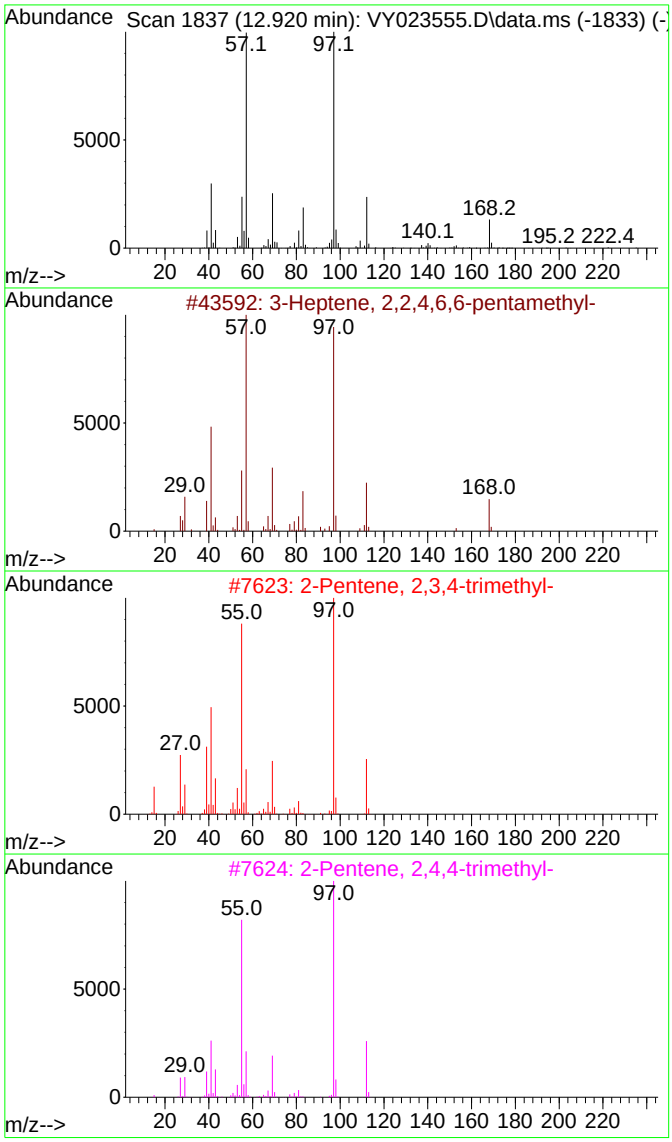
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260

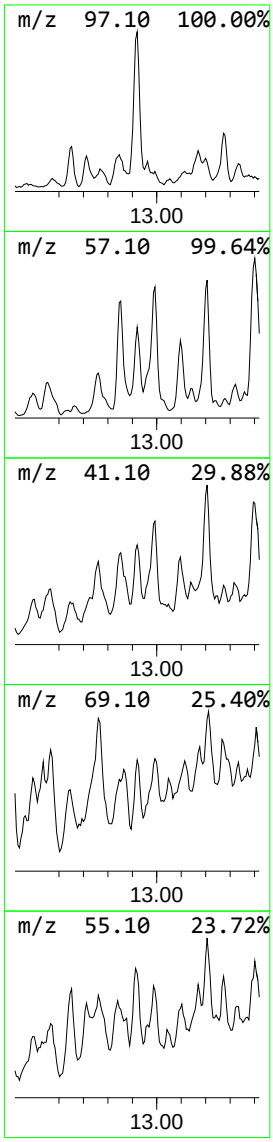
TIC Library : C:\Database\NIST20.L
TIC Integration Parameters: LSCINT.P

****
Peak Number 5 3-Heptene, 2,2,4,6,6-pentam... Concentration Rank 10

R.T.	EstConc	Area	Relative to ISTD	R.T.
12.920	8.21 ug/l	450808	1,4-Dichlorobenzene-d4	13.346

Hit# of 5	Tentative ID	MW	MolForm	CAS#	Qual
1	3-Heptene, 2,2,4,6,6-pentamethyl-	168	C12H24	000123-48-8	90
2	2-Pentene, 2,3,4-trimethyl-	112	C8H16	000565-77-5	58
3	2-Pentene, 2,4,4-trimethyl-	112	C8H16	000107-40-4	58
4	Cyclohexane, 1,3-dimethyl-, cis-	112	C8H16	000638-04-0	53
5	2-Pentene, 3,4,4-trimethyl-	112	C8H16	000598-96-9	53





Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY102225\
Data File : VY023555.D
Acq On : 22 Oct 2025 16:46
Operator : SY/MD
Sample : Q3424-01
Misc : 4.21g/5.0mL/MSVOA_Y/SOIL/A
ALS Vial : 15 Sample Multiplier: 1

Instrument :
MSVOA_Y
ClientSampleId :
PR132-DP3-20251021

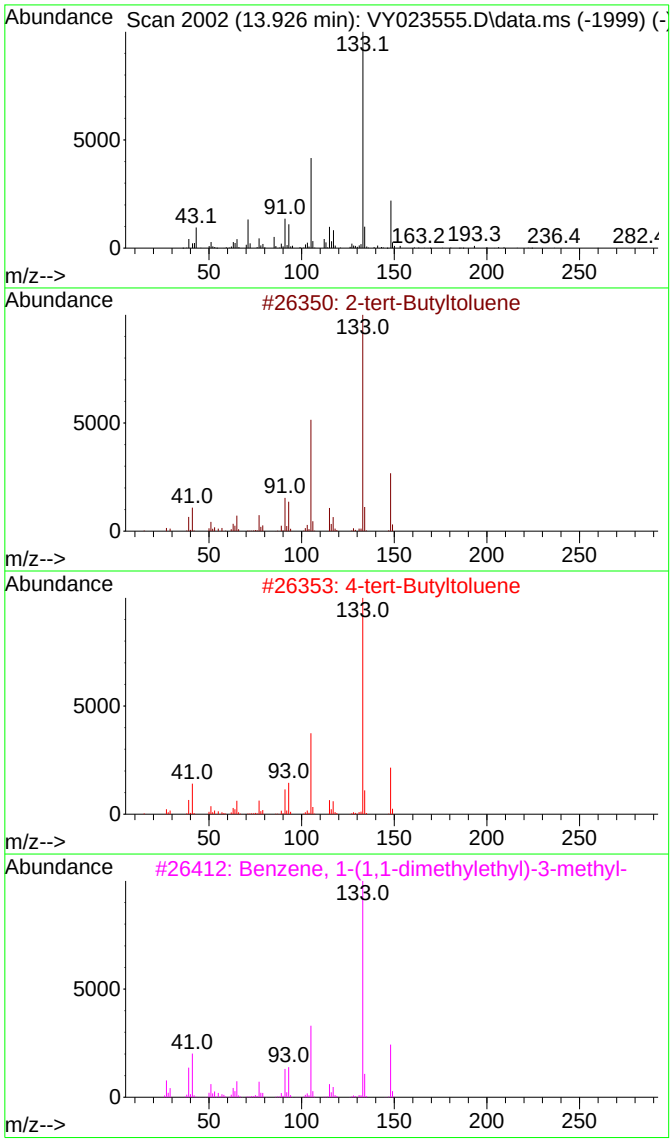
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260

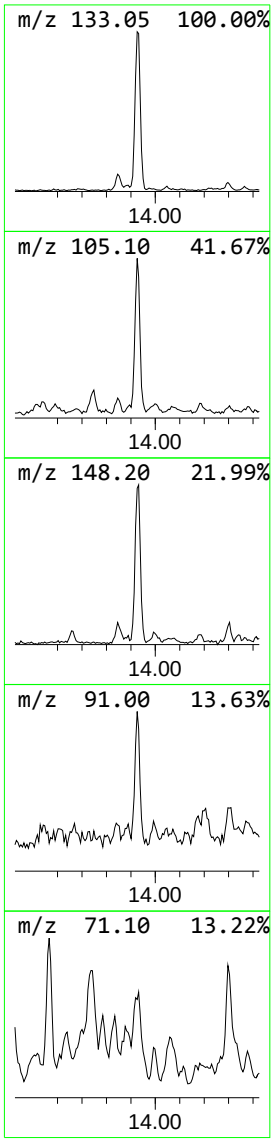
TIC Library : C:\Database\NIST20.L
TIC Integration Parameters: LSCINT.P

****
Peak Number 10 2-tert-Butyltoluene Concentration Rank 9

R.T.	EstConc	Area	Relative to ISTD	R.T.
13.926	8.45 ug/l	463784	1,4-Dichlorobenzene-d4	13.346

Hit# of 5	Tentative ID	MW	MolForm	CAS#	Qual
1	2-tert-Butyltoluene	148	C11H16	001074-92-6	96
2	4-tert-Butyltoluene	148	C11H16	000098-51-1	95
3	Benzene, 1-(1,1-dimethylethyl)-3...	148	C11H16	001075-38-3	93
4	3,4-Dimethylcumene	148	C11H16	1000370-34-1	87
5	Benzene, 2,4-dimethyl-1-(1-methy...	148	C11H16	004706-89-2	83





Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY102225\
Data File : VY023555.D
Acq On : 22 Oct 2025 16:46
Operator : SY/MD
Sample : Q3424-01
Misc : 4.21g/5.0mL/MSVOA_Y/SOIL/A
ALS Vial : 15 Sample Multiplier: 1

Instrument :
MSVOA_Y
ClientSampleId :
PR132-DP3-20251021

Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260

TIC Library : C:\Database\NIST20.L
TIC Integration Parameters: LSCINT.P

					--Internal Standard---			
TIC Top Hit name	RT	EstConc	Units	Response	#	RT	Resp	Conc
Heptane, 3-ethy...	12.158	9.9	ug/l	656186	3	11.414	3316680	50.0
3-Heptene, 2,2,...	12.920	8.2	ug/l	450808	4	13.346	2744060	50.0
2-tert-Butyltol...	13.926	8.4	ug/l	463784	4	13.346	2744060	50.0

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

Report of Analysis

Client:	AECOM	Date Collected:	10/21/25
Project:	AE1-CTY 3.2.Z-PR-DOCK-Des-ODC - 60693795-1719206	Date Received:	10/21/25
Client Sample ID:	PR132-S11-010080-202510	SDG No.:	Q3424
Lab Sample ID:	Q3424-02	Matrix:	SOIL
Analytical Method:	8260D	Level : LOW	% Solid: 50.1
Sample Wt/Vol:	5.78 g	Final Vol: 5000 uL	Test: VOC-TCLVOA-10

CAS Number	Parameter	Conc.	Qua.	DF	MDL	LOQ / CRQL	Units	Date Ana.	BatchID
TARGETS									
75-71-8	Dichlorodifluoromethane	8.60	U	1	2.00	8.60	ug/Kg	10/22/25 17:10	VY102225
74-87-3	Chloromethane	8.60	U	1	2.00	8.60	ug/Kg	10/22/25 17:10	VY102225
75-01-4	Vinyl Chloride	8.60	U	1	1.40	8.60	ug/Kg	10/22/25 17:10	VY102225
74-83-9	Bromomethane	8.60	U	1	1.80	8.60	ug/Kg	10/22/25 17:10	VY102225
75-00-3	Chloroethane	8.60	U	1	2.20	8.60	ug/Kg	10/22/25 17:10	VY102225
75-69-4	Trichlorofluoromethane	8.60	U	1	2.10	8.60	ug/Kg	10/22/25 17:10	VY102225
76-13-1	1,1,2-Trichlorotrifluoroethane	8.60	U	1	1.80	8.60	ug/Kg	10/22/25 17:10	VY102225
75-35-4	1,1-Dichloroethene	8.60	U	1	1.70	8.60	ug/Kg	10/22/25 17:10	VY102225
67-64-1	Acetone	25.7	J	1	8.20	43.2	ug/Kg	10/22/25 17:10	VY102225
75-15-0	Carbon Disulfide	10.0		1	1.80	8.60	ug/Kg	10/22/25 17:10	VY102225
1634-04-4	Methyl tert-butyl Ether	8.60	U	1	1.30	8.60	ug/Kg	10/22/25 17:10	VY102225
79-20-9	Methyl Acetate	8.60	U	1	2.70	8.60	ug/Kg	10/22/25 17:10	VY102225
75-09-2	Methylene Chloride	17.3	U	1	6.10	17.3	ug/Kg	10/22/25 17:10	VY102225
156-60-5	trans-1,2-Dichloroethene	8.60	U	1	1.50	8.60	ug/Kg	10/22/25 17:10	VY102225
75-34-3	1,1-Dichloroethane	8.60	U	1	1.40	8.60	ug/Kg	10/22/25 17:10	VY102225
110-82-7	Cyclohexane	8.60	U	1	1.40	8.60	ug/Kg	10/22/25 17:10	VY102225
78-93-3	2-Butanone	43.2	U	1	11.3	43.2	ug/Kg	10/22/25 17:10	VY102225
56-23-5	Carbon Tetrachloride	8.60	U	1	1.70	8.60	ug/Kg	10/22/25 17:10	VY102225
156-59-2	cis-1,2-Dichloroethene	8.60	U	1	1.30	8.60	ug/Kg	10/22/25 17:10	VY102225
74-97-5	Bromochloromethane	8.60	U	1	2.00	8.60	ug/Kg	10/22/25 17:10	VY102225
67-66-3	Chloroform	8.60	U	1	1.50	8.60	ug/Kg	10/22/25 17:10	VY102225
71-55-6	1,1,1-Trichloroethane	8.60	U	1	1.60	8.60	ug/Kg	10/22/25 17:10	VY102225
108-87-2	Methylcyclohexane	2.50	J	1	1.60	8.60	ug/Kg	10/22/25 17:10	VY102225
71-43-2	Benzene	8.60	U	1	1.40	8.60	ug/Kg	10/22/25 17:10	VY102225
107-06-2	1,2-Dichloroethane	8.60	U	1	1.40	8.60	ug/Kg	10/22/25 17:10	VY102225
79-01-6	Trichloroethene	8.60	U	1	1.40	8.60	ug/Kg	10/22/25 17:10	VY102225
78-87-5	1,2-Dichloropropane	8.60	U	1	1.60	8.60	ug/Kg	10/22/25 17:10	VY102225
75-27-4	Bromodichloromethane	8.60	U	1	1.30	8.60	ug/Kg	10/22/25 17:10	VY102225
108-10-1	4-Methyl-2-Pentanone	43.2	U	1	6.20	43.2	ug/Kg	10/22/25 17:10	VY102225
108-88-3	Toluene	8.60	U	1	1.30	8.60	ug/Kg	10/22/25 17:10	VY102225
10061-02-6	t-1,3-Dichloropropene	8.60	U	1	1.10	8.60	ug/Kg	10/22/25 17:10	VY102225
10061-01-5	cis-1,3-Dichloropropene	8.60	U	1	1.10	8.60	ug/Kg	10/22/25 17:10	VY102225
79-00-5	1,1,2-Trichloroethane	8.60	U	1	1.60	8.60	ug/Kg	10/22/25 17:10	VY102225
591-78-6	2-Hexanone	43.2	U	1	6.40	43.2	ug/Kg	10/22/25 17:10	VY102225
124-48-1	Dibromochloromethane	8.60	U	1	1.50	8.60	ug/Kg	10/22/25 17:10	VY102225
106-93-4	1,2-Dibromoethane	8.60	U	1	1.50	8.60	ug/Kg	10/22/25 17:10	VY102225
127-18-4	Tetrachloroethene	8.60	U	1	1.80	8.60	ug/Kg	10/22/25 17:10	VY102225
108-90-7	Chlorobenzene	8.60	U	1	1.60	8.60	ug/Kg	10/22/25 17:10	VY102225
100-41-4	Ethyl Benzene	8.60	U	1	1.20	8.60	ug/Kg	10/22/25 17:10	VY102225
179601-23-1	m/p-Xylenes	17.3	U	1	2.10	17.3	ug/Kg	10/22/25 17:10	VY102225
95-47-6	o-Xylene	8.60	U	1	1.40	8.60	ug/Kg	10/22/25 17:10	VY102225
100-42-5	Styrene	8.60	U	1	1.20	8.60	ug/Kg	10/22/25 17:10	VY102225
75-25-2	Bromoform	8.60	U	1	1.50	8.60	ug/Kg	10/22/25 17:10	VY102225

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

Report of Analysis

Client:	AECOM	Date Collected:	10/21/25
Project:	AE1-CTY 3.2.Z-PR-DOCK-Des-ODC - 60693795-1719206	Date Received:	10/21/25
Client Sample ID:	PR132-S11-010080-202510	SDG No.:	Q3424
Lab Sample ID:	Q3424-02	Matrix:	SOIL
Analytical Method:	8260D Level : LOW	% Solid:	50.1
Sample Wt/Vol:	5.78 g Final Vol: 5000 uL	Test:	VOC-TCLVOA-10

CAS Number	Parameter	Conc.	Qua.	DF	MDL	LOQ / CRQL	Units	Date Ana.	BatchID
98-82-8	Isopropylbenzene	8.60	U	1	1.30	8.60	ug/Kg	10/22/25 17:10	VY102225
79-34-5	1,1,2,2-Tetrachloroethane	8.60	U	1	2.10	8.60	ug/Kg	10/22/25 17:10	VY102225
541-73-1	1,3-Dichlorobenzene	8.60	U	1	3.00	8.60	ug/Kg	10/22/25 17:10	VY102225
106-46-7	1,4-Dichlorobenzene	8.60	U	1	2.70	8.60	ug/Kg	10/22/25 17:10	VY102225
95-50-1	1,2-Dichlorobenzene	8.60	U	1	2.50	8.60	ug/Kg	10/22/25 17:10	VY102225
96-12-8	1,2-Dibromo-3-Chloropropane	8.60	U	1	3.20	8.60	ug/Kg	10/22/25 17:10	VY102225
120-82-1	1,2,4-Trichlorobenzene	8.60	U	1	5.10	8.60	ug/Kg	10/22/25 17:10	VY102225
87-61-6	1,2,3-Trichlorobenzene	8.60	U	1	5.50	8.60	ug/Kg	10/22/25 17:10	VY102225
SURROGATES									
17060-07-0	1,2-Dichloroethane-d4	58.0			63 - 155	116%	SPK: 50		
1868-53-7	Dibromofluoromethane	51.2			70 - 134	102%	SPK: 50		
2037-26-5	Toluene-d8	49.7			74 - 123	99%	SPK: 50		
460-00-4	4-Bromofluorobenzene	47.3			17 - 146	95%	SPK: 50		
INTERNAL STANDARDS		**Area Count**							
363-72-4	Pentafluorobenzene	808000							
540-36-3	1,4-Difluorobenzene	1340000							
3114-55-4	Chlorobenzene-d5	1150000							
3855-82-1	1,4-Dichlorobenzene-d4	478000							
TENTATIVE IDENTIFIED COMPOUNDS									
75-65-0	Tert butyl alcohol	34.2	J			4.87	ug/Kg		
000123-48-8	3-Heptene, 2,2,4,6,6-pentamethyl-	21.3	J			12.9	ug/Kg		
001075-38-3	Benzene, 1-(1,1-dimethylethyl)-3-m	22.3	J			13.9	ug/Kg		

U = Not Detected
LOQ = Limit of Quantitation
MDL = Method Detection Limit
LOD = Limit of Detection
E = Value Exceeds Calibration Range
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
() = Laboratory InHouse Limit
A = Aldol-Condensation Reaction Products

Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY102225\
Data File : VY023556.D
Acq On : 22 Oct 2025 17:10
Operator : SY/MD
Sample : Q3424-02
Misc : 5.78g/5.0mL/MSVOA_Y/SOIL/A
ALS Vial : 16 Sample Multiplier: 1

Instrument :
MSVOA_Y
ClientSampleId :
PR132-S11-010080-20251021

Quant Time: Oct 24 02:37:33 2025
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260
QLast Update : Wed Oct 08 05:12:50 2025
Response via : Initial Calibration

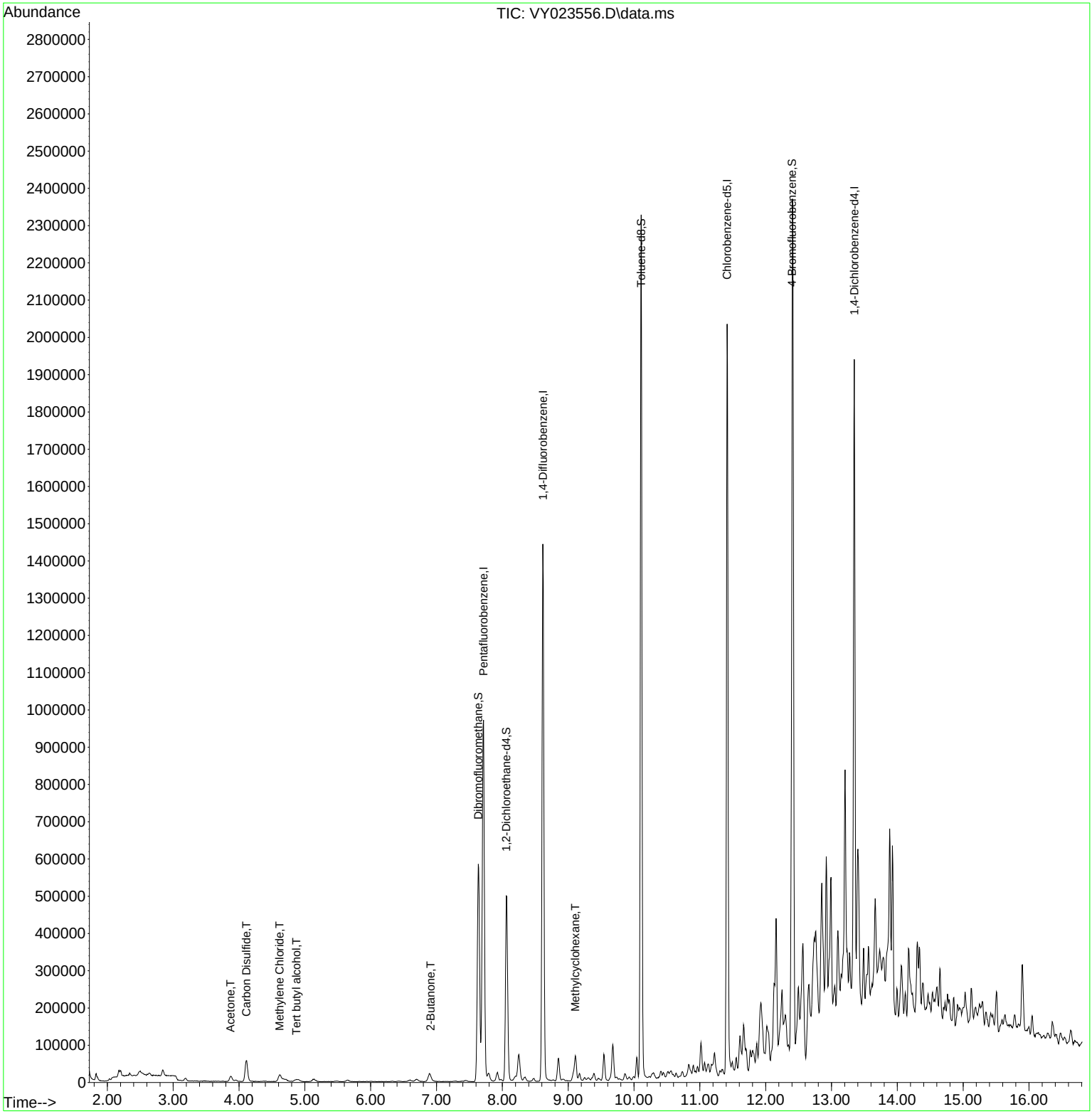
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Pentafluorobenzene	7.713	168	807599	50.000	ug/l	0.00
34) 1,4-Difluorobenzene	8.615	114	1343623	50.000	ug/l	0.00
63) Chlorobenzene-d5	11.414	117	1154123	50.000	ug/l	0.00
72) 1,4-Dichlorobenzene-d4	13.346	152	478051	50.000	ug/l	0.00
System Monitoring Compounds						
33) 1,2-Dichloroethane-d4	8.061	65	391601	57.987	ug/l	0.00
Spiked Amount 50.000	Range 50 - 163		Recovery = 115.980%			
35) Dibromofluoromethane	7.634	113	423023	51.239	ug/l	0.00
Spiked Amount 50.000	Range 54 - 147		Recovery = 102.480%			
50) Toluene-d8	10.109	98	1528592	49.717	ug/l	0.00
Spiked Amount 50.000	Range 58 - 134		Recovery = 99.440%			
62) 4-Bromofluorobenzene	12.401	95	480302	47.317	ug/l	0.00
Spiked Amount 50.000	Range 30 - 143		Recovery = 94.640%			
Target Compounds						Qvalue
11) Tert butyl alcohol	4.872	59	9939	19.783	ug/l	96
16) Acetone	3.872	43	23931	14.885	ug/l #	88
17) Carbon Disulfide	4.110	76	119319	5.787	ug/l	99
20) Methylene Chloride	4.616	84	13216	1.520	ug/l	95
25) 2-Butanone	6.908	43	8536	4.349	ug/l	95
39) Methylcyclohexane	9.109	83	20603	1.448	ug/l #	67

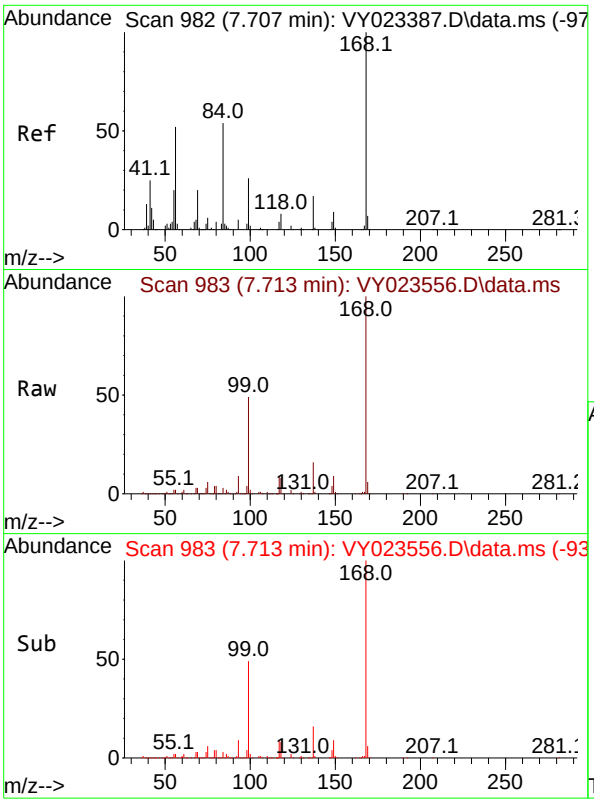
(#) = qualifier out of range (m) = manual integration (+) = signals summed

Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY102225\
Data File : VY023556.D
Acq On : 22 Oct 2025 17:10
Operator : SY/MD
Sample : Q3424-02
Misc : 5.78g/5.0mL/MSVOA_Y/SOIL/A
ALS Vial : 16 Sample Multiplier: 1

Instrument :
MSVOA_Y
ClientSampleId :
PR132-S11-010080-20251021

Quant Time: Oct 24 02:37:33 2025
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260
QLast Update : Wed Oct 08 05:12:50 2025
Response via : Initial Calibration



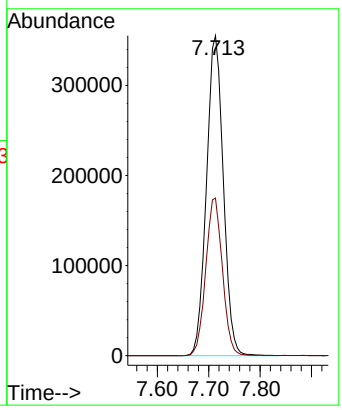


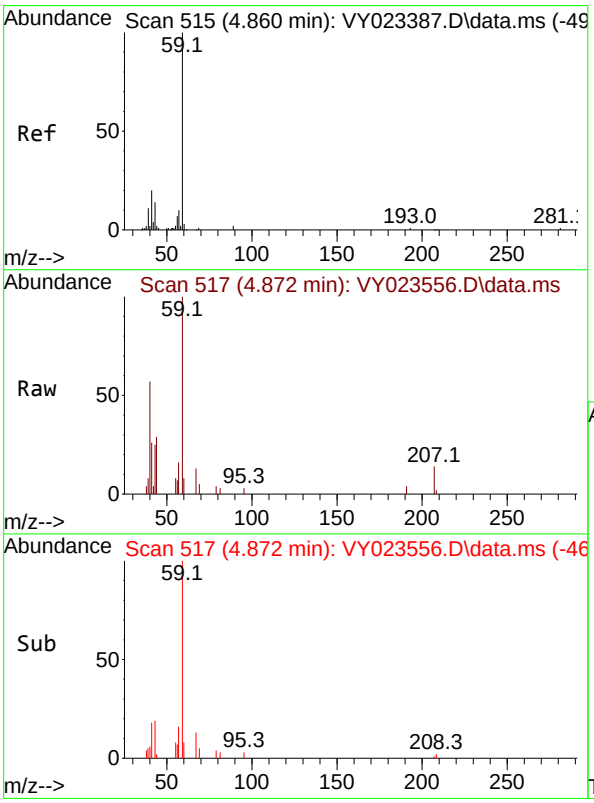
#1
Pentafluorobenzene
Concen: 50.000 ug/l
RT: 7.713 min Scan# 9
Delta R.T. 0.006 min
Lab File: VY023556.D
Acq: 22 Oct 2025 17:10

Instrument :
MSVOA_Y
ClientSampleId :
PR132-S11-010080-20251021

Tgt Ion:168 Resp: 807599

Ion	Ratio	Lower	Upper
168	100		
99	49.2	39.7	59.5

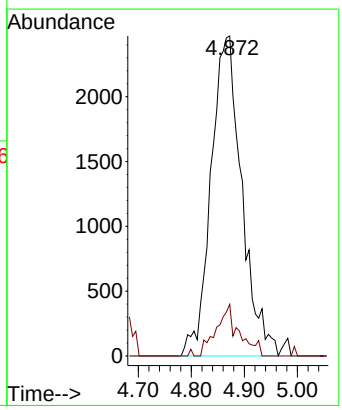


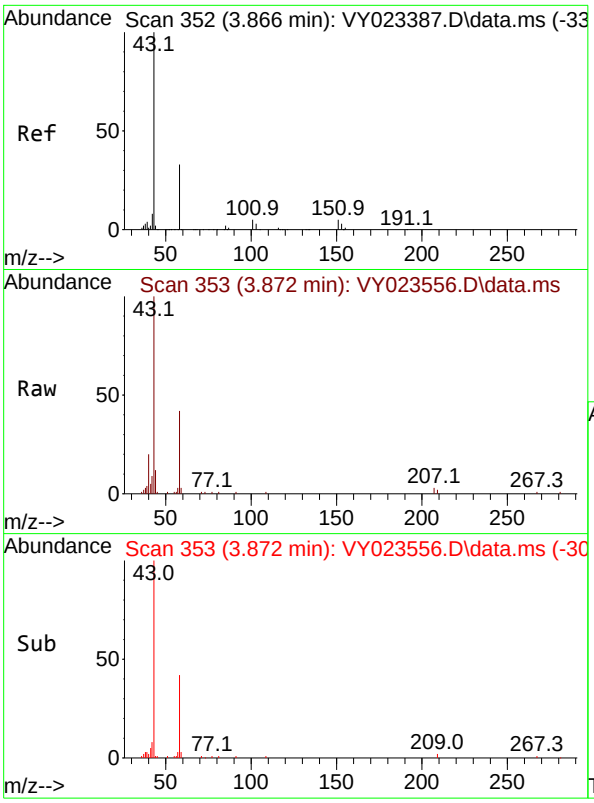


#11
Tert butyl alcohol
Concen: 19.783 ug/l
RT: 4.872 min Scan# 517
Delta R.T. 0.012 min
Lab File: VY023556.D
Acq: 22 Oct 2025 17:10

Tgt Ion: 59 Resp: 9939

Ion	Ratio	Lower	Upper
59	100		
57	11.8	8.3	12.5



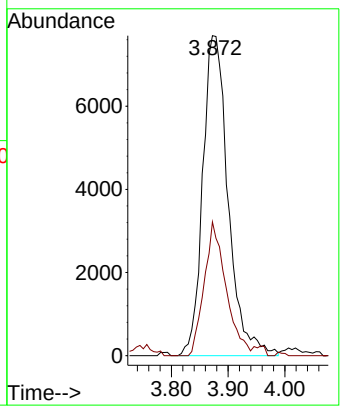


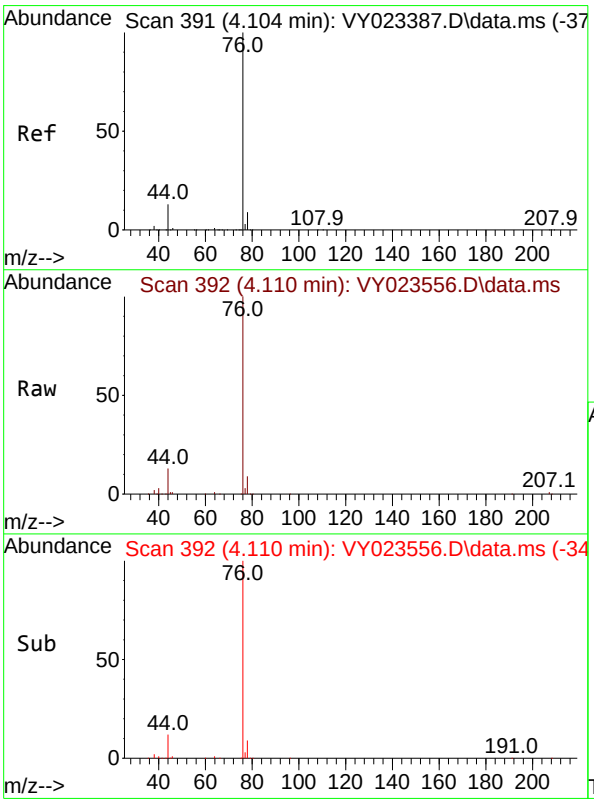
#16
Acetone
Concen: 14.885 ug/l
RT: 3.872 min Scan# 3
Delta R.T. 0.006 min
Lab File: VY023556.D
Acq: 22 Oct 2025 17:10

Instrument :
MSVOA_Y
ClientSampleId :
PR132-S11-010080-20251021

Tgt Ion: 43 Resp: 23931

Ion	Ratio	Lower	Upper
43	100		
58	41.8	27.7	41.5#

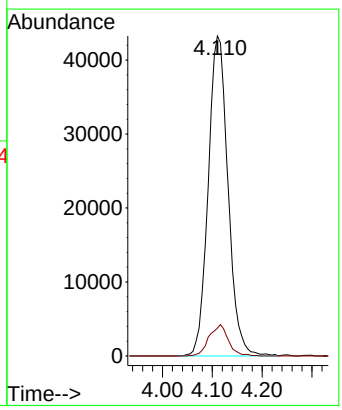


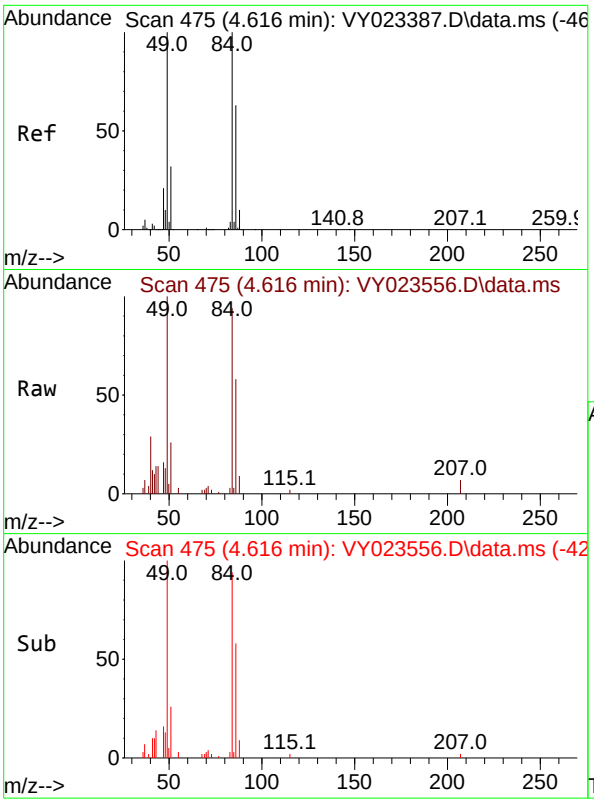


#17
Carbon Disulfide
Concen: 5.787 ug/l
RT: 4.110 min Scan# 392
Delta R.T. 0.006 min
Lab File: VY023556.D
Acq: 22 Oct 2025 17:10

Tgt Ion: 76 Resp: 119319

Ion	Ratio	Lower	Upper
76	100		
78	8.7	7.3	10.9



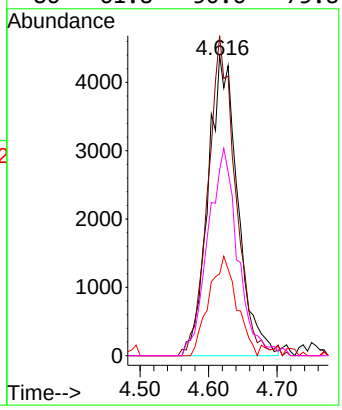


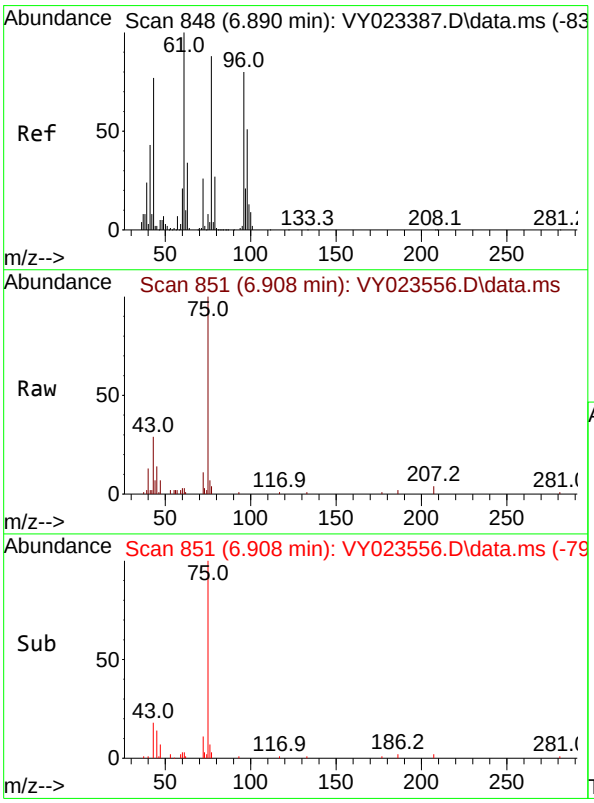
#20
Methylene Chloride
Concen: 1.520 ug/l
RT: 4.616 min Scan# 4
Delta R.T. -0.000 min
Lab File: VY023556.D
Acq: 22 Oct 2025 17:10

Instrument :
MSVOA_Y
ClientSampleId :
PR132-S11-010080-20251021

Tgt Ion: 84 Resp: 13216

Ion	Ratio	Lower	Upper
84	100		
49	106.5	80.2	120.4
51	27.2	25.9	38.9
86	61.8	50.6	75.8

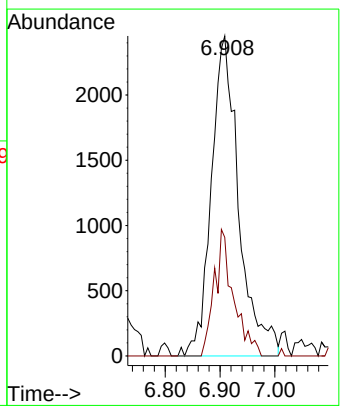


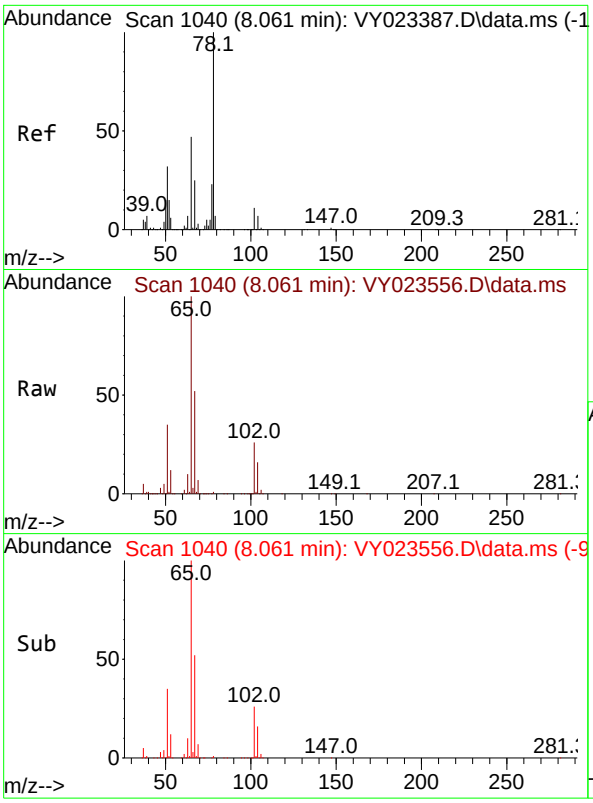


#25
2-Butanone
Concen: 4.349 ug/l
RT: 6.908 min Scan# 851
Delta R.T. 0.018 min
Lab File: VY023556.D
Acq: 22 Oct 2025 17:10

Tgt Ion: 43 Resp: 8536

Ion	Ratio	Lower	Upper
43	100		
72	37.1	27.4	41.2



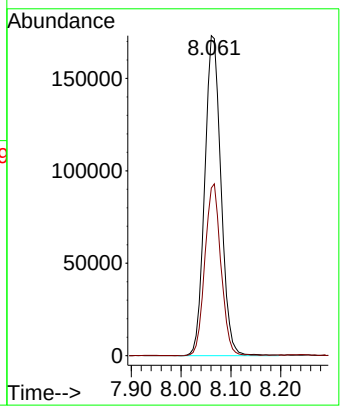


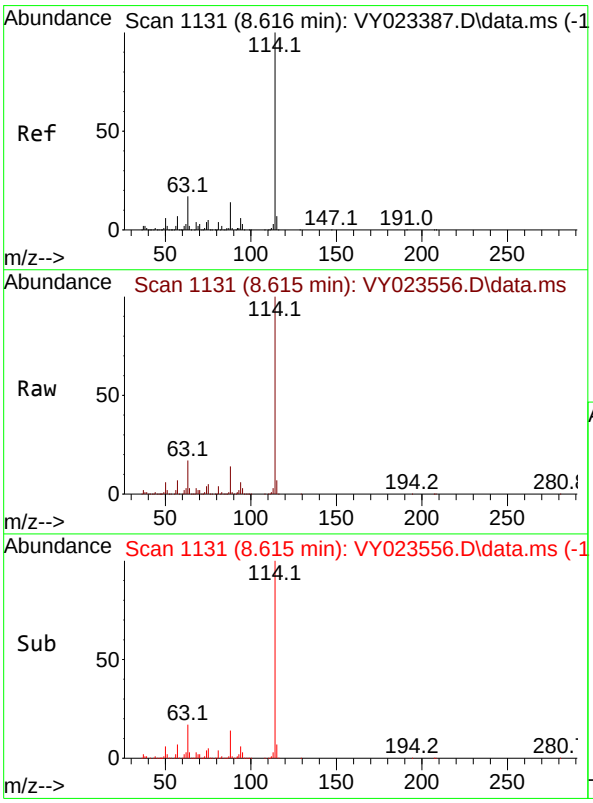
#33
1,2-Dichloroethane-d4
Concen: 57.987 ug/l
RT: 8.061 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023556.D
Acq: 22 Oct 2025 17:10

Instrument :
MSVOA_Y
ClientSampleId :
PR132-S11-010080-20251021

Tgt Ion: 65 Resp: 391601

Ion	Ratio	Lower	Upper
65	100		
67	53.0	0.0	105.8

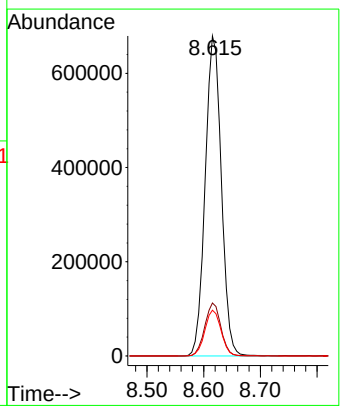


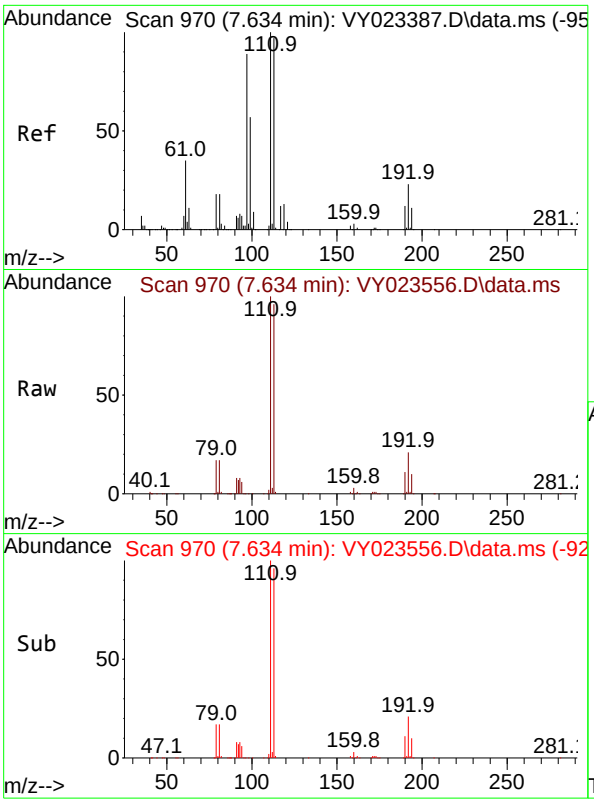


#34
1,4-Difluorobenzene
Concen: 50.000 ug/l
RT: 8.615 min Scan# 1131
Delta R.T. -0.000 min
Lab File: VY023556.D
Acq: 22 Oct 2025 17:10

Tgt Ion:114 Resp: 1343623

Ion	Ratio	Lower	Upper
114	100		
63	16.5	0.0	34.2
88	14.3	0.0	28.4



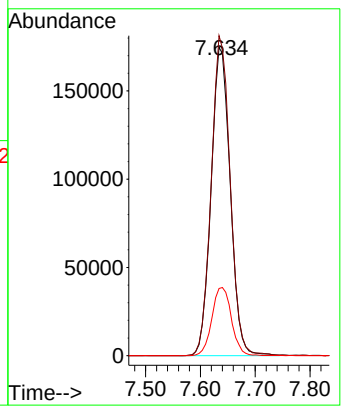


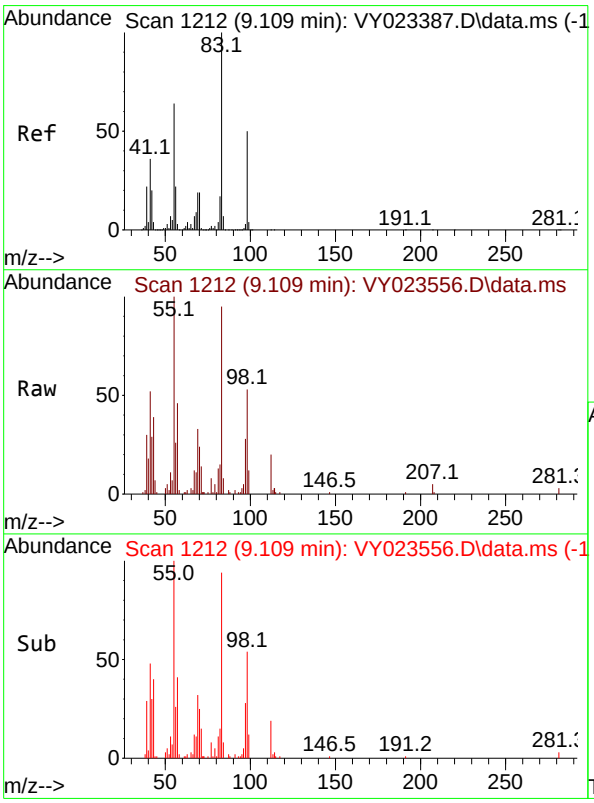
#35
Dibromofluoromethane
Concen: 51.239 ug/l
RT: 7.634 min Scan# 9
Delta R.T. -0.000 min
Lab File: VY023556.D
Acq: 22 Oct 2025 17:10

Instrument :
MSVOA_Y
ClientSampleId :
PR132-S11-010080-20251021

Tgt Ion:113 Resp: 423023

Ion	Ratio	Lower	Upper
113	100		
111	103.0	81.8	122.6
192	22.6	18.0	27.0

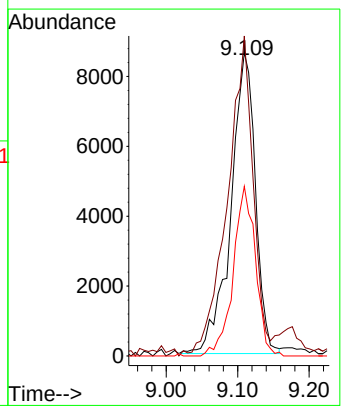


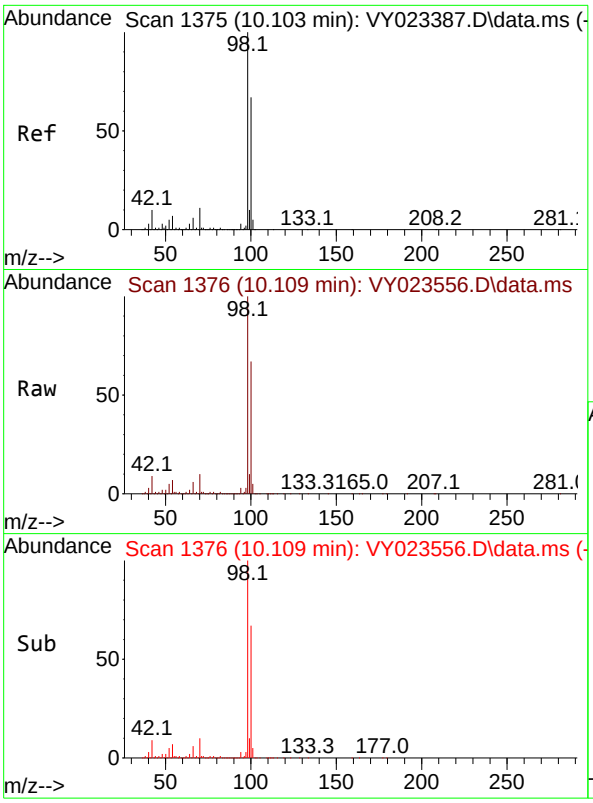


#39
Methylcyclohexane
Concen: 1.448 ug/l
RT: 9.109 min Scan# 1212
Delta R.T. -0.000 min
Lab File: VY023556.D
Acq: 22 Oct 2025 17:10

Tgt Ion: 83 Resp: 20603

Ion	Ratio	Lower	Upper
83	100		
55	106.3	51.4	77.2#
98	55.6	40.4	60.6



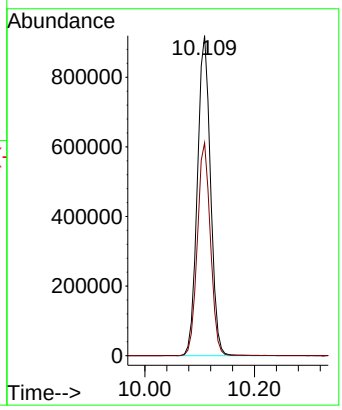


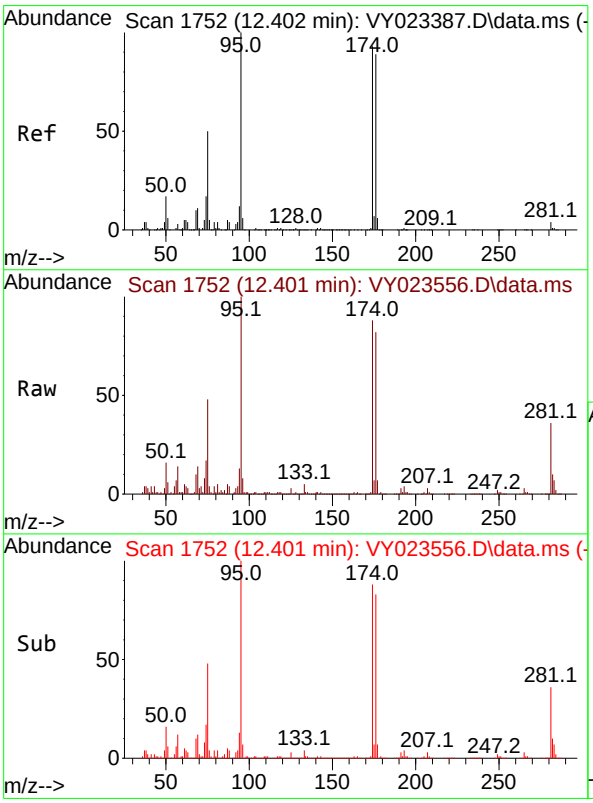
#50
Toluene-d8
Concen: 49.717 ug/l
RT: 10.109 min Scan# 1
Delta R.T. 0.006 min
Lab File: VY023556.D
Acq: 22 Oct 2025 17:10

Instrument :
MSVOA_Y
ClientSampleId :
PR132-S11-010080-20251021

Tgt Ion: 98 Resp: 1528592

Ion	Ratio	Lower	Upper
98	100		
100	66.2	53.0	79.4

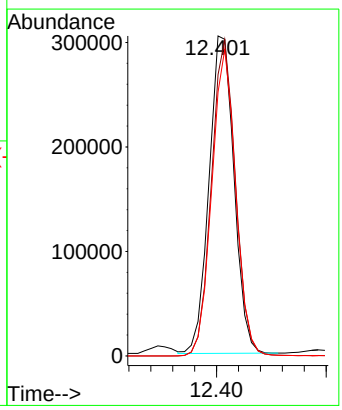


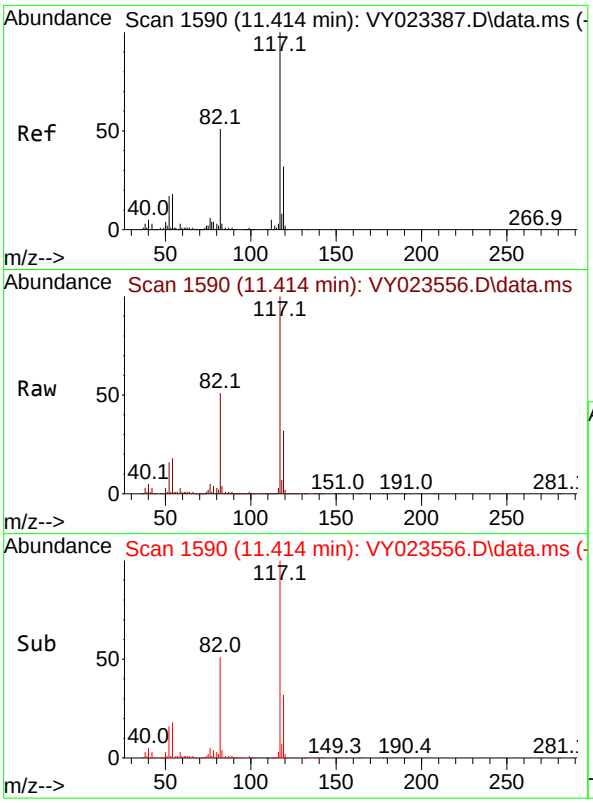


#62
4-Bromofluorobenzene
Concen: 47.317 ug/l
RT: 12.401 min Scan# 1752
Delta R.T. -0.000 min
Lab File: VY023556.D
Acq: 22 Oct 2025 17:10

Tgt Ion: 95 Resp: 480302

Ion	Ratio	Lower	Upper
95	100		
174	96.3	0.0	192.8
176	92.8	0.0	187.6



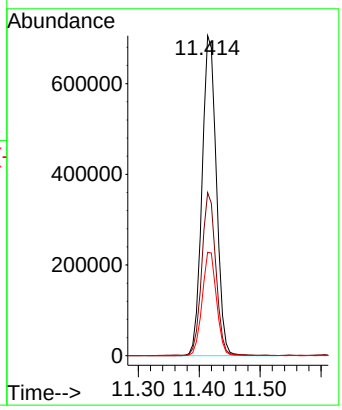


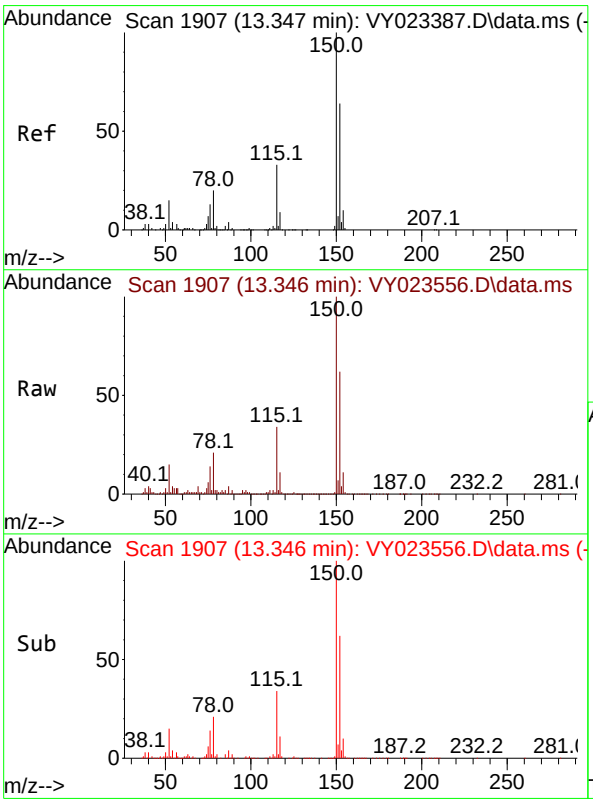
#63
Chlorobenzene-d5
Concen: 50.000 ug/l
RT: 11.414 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023556.D
Acq: 22 Oct 2025 17:10

Instrument :
MSVOA_Y
ClientSampleId :
PR132-S11-010080-20251021

Tgt Ion:117 Resp: 1154123

Ion	Ratio	Lower	Upper
117	100		
82	50.9	41.0	61.4
119	32.3	25.6	38.4

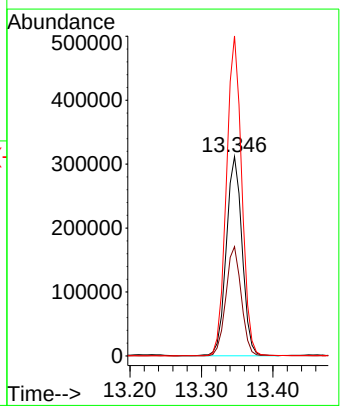




#72
1,4-Dichlorobenzene-d4
Concen: 50.000 ug/l
RT: 13.346 min Scan# 1907
Delta R.T. -0.000 min
Lab File: VY023556.D
Acq: 22 Oct 2025 17:10

Tgt Ion:152 Resp: 478051

Ion	Ratio	Lower	Upper
152	100		
115	53.4	27.1	81.2
150	155.7	0.0	347.4



Sample Results: **VY023556.D**

Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY102225\
Data File : VY023556.D
Acq On : 22 Oct 2025 17:10
Operator : SY/MD
Sample : Q3424-02
Misc : 5.78g/5.0mL/MSVOA_Y/SOIL/A
ALS Vial : 16 Sample Multiplier: 1

Instrument :
MSVOA_Y
ClientSampleId :
PR132-S11-010080-20251021

Integration Parameters: RTEINT.P
Integrator: RTE
Smoothing : ON Filtering: 5
Sampling : 1 Min Area: 3 % of largest Peak
Start Thrs: 0.2 Max Peaks: 100
Stop Thrs : 0 Peak Location: TOP

If leading or trailing edge < 100 prefer < Baseline drop else tangent >
Peak separation: 5

Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Title : SW846 8260

Signal : TIC: VY023556.D\data.ms

peak #	R.T. min	first scan	max scan	last scan	PK TY	peak height	corr. area	corr. % max.	% of total
1	4.110	380	392	404	rBV	56152	157583	3.42%	0.415%
2	4.616	464	475	484	rBV4	18308	68299	1.48%	0.180%
3	6.890	834	848	862	rBV2	21688	73443	1.59%	0.193%
4	7.634	960	970	976	rBV	583870	1409931	30.61%	3.710%
5	7.713	976	983	992	rVV	968713	2244193	48.72%	5.906%
6	7.792	992	996	1008	rVB4	21194	52732	1.14%	0.139%
7	7.927	1008	1018	1023	rBV2	23659	55263	1.20%	0.145%
8	8.061	1032	1040	1052	rBV	496807	1121491	24.34%	2.951%
9	8.250	1064	1071	1080	rVB	68816	175647	3.81%	0.462%
10	8.615	1118	1131	1146	rBV	1442108	2857232	62.02%	7.519%
11	8.853	1162	1170	1177	rBV2	60889	134811	2.93%	0.355%
12	9.109	1199	1212	1218	rBV4	67382	183341	3.98%	0.482%
13	9.542	1276	1283	1294	rVB	70097	136626	2.97%	0.360%
14	9.676	1294	1305	1311	rBV2	96250	218442	4.74%	0.575%
15	10.042	1360	1365	1369	rBV2	54567	88466	1.92%	0.233%
16	10.109	1369	1376	1391	rVB	2316201	3899657	84.65%	10.262%
17	10.828	1486	1494	1502	rBV3	32558	90714	1.97%	0.239%
18	11.017	1520	1525	1530	rVV2	84826	160832	3.49%	0.423%
19	11.072	1530	1534	1538	rVV2	31091	52147	1.13%	0.137%
20	11.127	1538	1543	1547	rVV5	25611	55837	1.21%	0.147%
21	11.225	1555	1559	1568	rVB	61909	131685	2.86%	0.347%
22	11.414	1583	1590	1600	rBV	2013172	3345703	72.63%	8.804%
23	11.609	1616	1622	1627	rBV3	87653	186395	4.05%	0.491%
24	11.664	1627	1631	1636	rVV2	78480	133527	2.90%	0.351%
25	11.767	1643	1648	1651	rBV3	53925	102916	2.23%	0.271%
26	11.804	1651	1654	1660	rVB3	41620	82339	1.79%	0.217%
27	11.865	1660	1664	1667	rBV2	50990	72750	1.58%	0.191%
28	11.926	1667	1674	1683	rVV4	147450	454548	9.87%	1.196%
29	12.017	1685	1689	1698	rVB7	91922	260085	5.65%	0.684%
30	12.127	1698	1707	1709	rBV4	206822	411438	8.93%	1.083%
31	12.157	1709	1712	1717	rVB	339953	539594	11.71%	1.420%
32	12.249	1718	1727	1730	rBV7	145695	325663	7.07%	0.857%
33	12.407	1745	1753	1760	rBV3	2284163	4606761	100.00%	12.123%
34	12.499	1760	1768	1771	rBV5	153453	324263	7.04%	0.853%
35	12.566	1772	1779	1786	rVB5	307731	814355	17.68%	2.143%
36	12.657	1786	1794	1799	rBV7	197875	596296	12.94%	1.569%

Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY102225\
Data File : VY023556.D
Acq On : 22 Oct 2025 17:10
Operator : SY/MD
Sample : Q3424-02
Misc : 5.78g/5.0mL/MSVOA_Y/SOIL/A
ALS Vial : 16 Sample Multiplier: 1

Instrument :
MSVOA_Y
ClientSampleId :
PR132-S11-010080-20251021

Integration Parameters: RTEINT.P
Integrator: RTE
Smoothing : ON Filtering: 5
Sampling : 1 Min Area: 3 % of largest Peak
Start Thrs: 0.2 Max Peaks: 100
Stop Thrs : 0 Peak Location: TOP

If leading or trailing edge < 100 prefer < Baseline drop else tangent >
Peak separation: 5

Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Title : SW846 8260

37	12.737	1800	1807	1809	rBV4	205392	473067	10.27%	1.245%
38	12.852	1820	1826	1832	rBV	344839	792227	17.20%	2.085%
39	12.920	1833	1837	1841	rVV	404816	660920	14.35%	1.739%
40	12.993	1841	1849	1853	rVB2	339628	687232	14.92%	1.808%
41	13.096	1862	1866	1872	rBV2	198043	382624	8.31%	1.007%
42	13.206	1880	1884	1888	rBV2	491506	675087	14.65%	1.777%
43	13.273	1893	1895	1900	rVB4	96390	112503	2.44%	0.296%
44	13.346	1900	1907	1912	rBV	1688341	2679264	58.16%	7.051%
45	13.401	1912	1916	1925	rVB	416147	917299	19.91%	2.414%
46	13.487	1926	1930	1934	rBV3	143629	195365	4.24%	0.514%
47	13.535	1934	1938	1939	rBV3	65386	91559	1.99%	0.241%
48	13.560	1940	1942	1947	rVB3	130074	165959	3.60%	0.437%
49	13.663	1955	1959	1964	rVB3	198364	312563	6.78%	0.823%
50	13.883	1985	1995	1999	rBV3	414379	905298	19.65%	2.382%
51	13.925	1999	2002	2010	rVB	454122	691660	15.01%	1.820%
52	13.993	2010	2013	2017	rVB3	74569	102239	2.22%	0.269%
53	14.060	2019	2024	2030	rVB6	129293	278008	6.03%	0.732%
54	14.169	2038	2042	2051	rBV5	179951	458942	9.96%	1.208%
55	14.303	2059	2064	2067	rBV2	177305	323965	7.03%	0.853%
56	14.334	2067	2069	2074	rVB4	153415	208414	4.52%	0.548%
57	14.535	2099	2102	2105	rBV5	47407	73827	1.60%	0.194%
58	14.645	2117	2120	2127	rVB3	133480	226002	4.91%	0.595%
59	14.858	2151	2155	2158	rVB5	75978	114947	2.50%	0.302%
60	15.120	2195	2198	2204	rVB2	80906	127116	2.76%	0.335%
61	15.504	2257	2261	2266	rVB3	107567	193503	4.20%	0.509%
62	15.901	2321	2326	2333	rVB2	177254	351962	7.64%	0.926%
63	16.047	2346	2350	2356	rVB3	55710	99595	2.16%	0.262%
64	16.352	2397	2400	2407	rBV7	40047	74461	1.62%	0.196%

Sum of corrected areas: 38000613

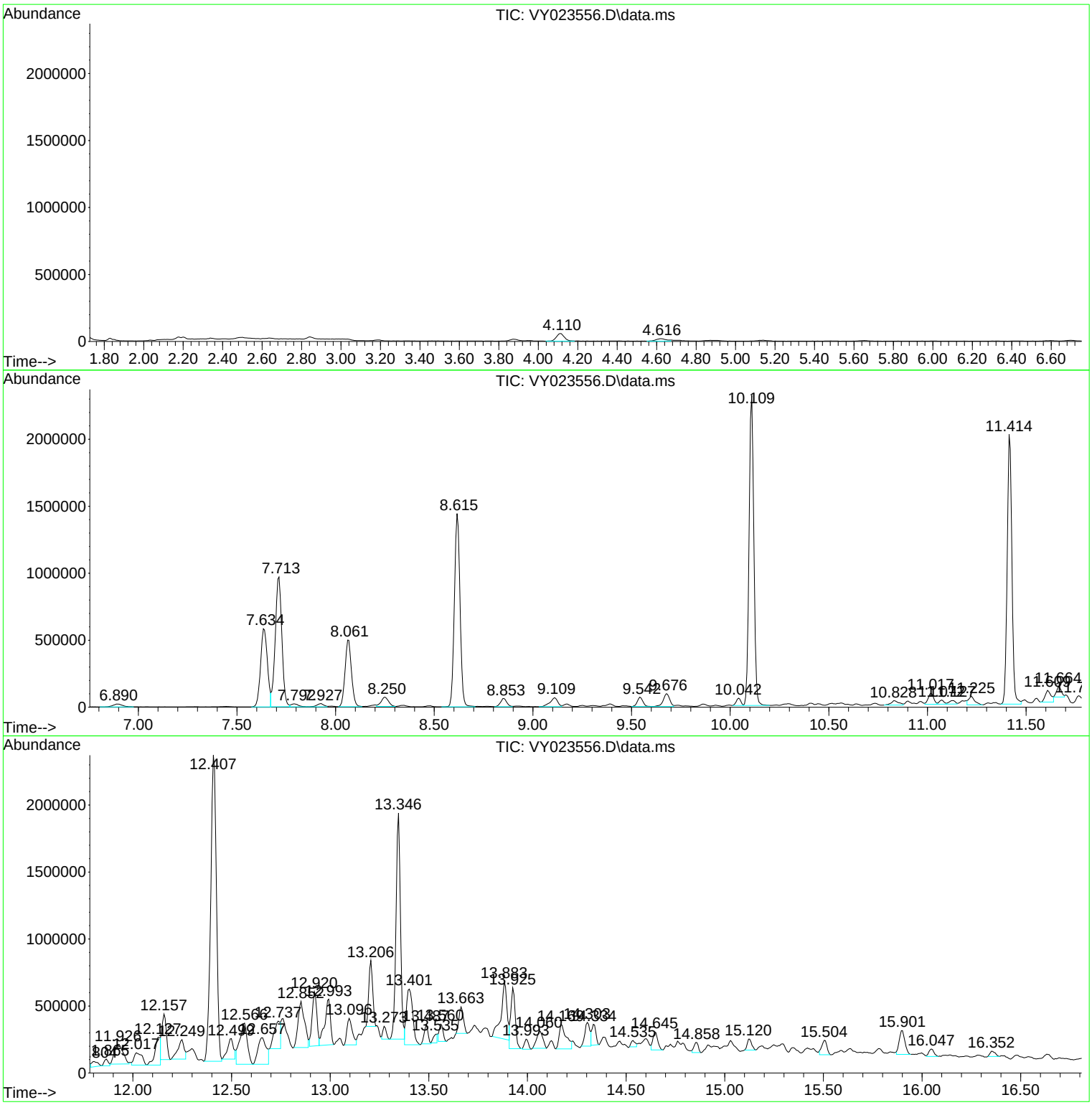
Sample Results: **VY023556.D**

Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY102225\
Data File : VY023556.D
Acq On : 22 Oct 2025 17:10
Operator : SY/MD
Sample : Q3424-02
Misc : 5.78g/5.0mL/MSVOA_Y/SOIL/A
ALS Vial : 16 Sample Multiplier: 1

Instrument :
MSVOA_Y
ClientSampleId :
PR132-S11-010080-20251021

Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260

TIC Library : C:\Database\NIST20.L
TIC Integration Parameters: LSCINT.P



Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY102225\
Data File : VY023556.D
Acq On : 22 Oct 2025 17:10
Operator : SY/MD
Sample : Q3424-02
Misc : 5.78g/5.0mL/MSVOA_Y/SOIL/A
ALS Vial : 16 Sample Multiplier: 1

Instrument :
MSVOA_Y
ClientSampleId :
PR132-S11-010080-20251021

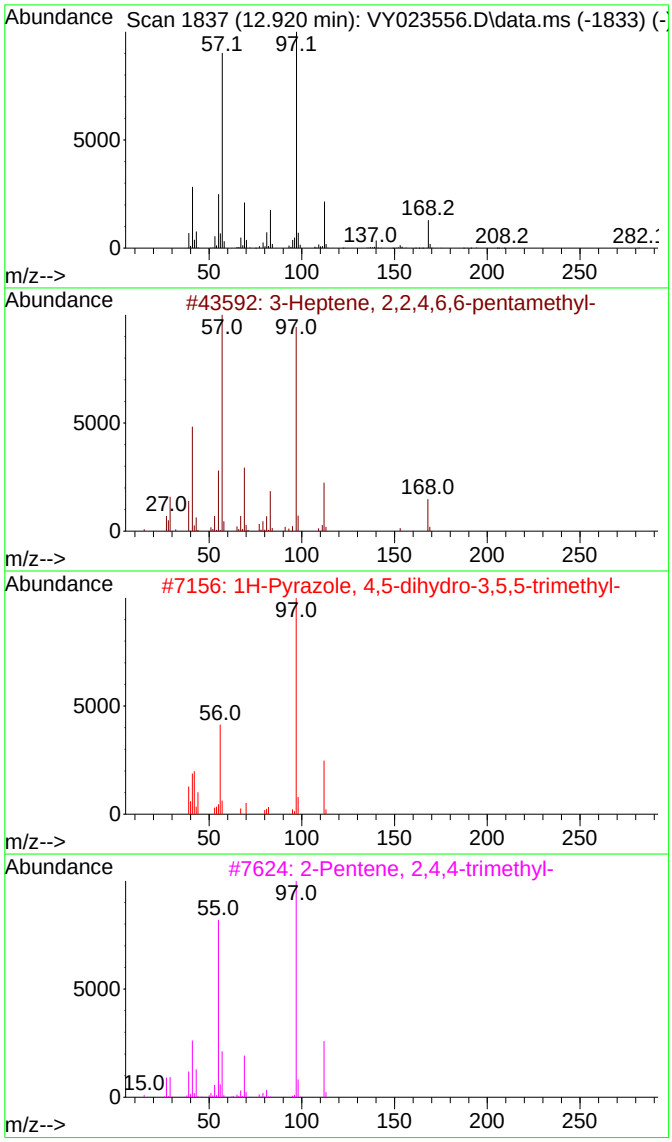
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260

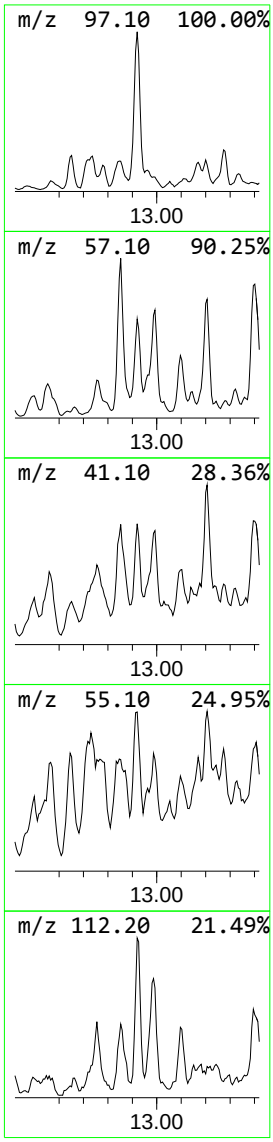
TIC Library : C:\Database\NIST20.L
TIC Integration Parameters: LSCINT.P

****
Peak Number 5 3-Heptene, 2,2,4,6,6-pentam... Concentration Rank 8

R.T.	EstConc	Area	Relative to ISTD	R.T.
12.919	12.33 ug/l	660920	1,4-Dichlorobenzene-d4	13.346

Hit# of 5	Tentative ID	MW	MolForm	CAS#	Qual
1	3-Heptene, 2,2,4,6,6-pentamethyl-	168	C12H24	000123-48-8	93
2	1H-Pyrazole, 4,5-dihydro-3,5,5-t...	112	C6H12N2	003975-85-7	58
3	2-Pentene, 2,4,4-trimethyl-	112	C8H16	000107-40-4	53
4	Z-3,4,4-Trimethyl-2-pentene	112	C8H16	039761-64-3	53
5	2-Pyrazoline, 1,4,5-trimethyl-	112	C6H12N2	007423-11-2	53





Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY102225\
Data File : VY023556.D
Acq On : 22 Oct 2025 17:10
Operator : SY/MD
Sample : Q3424-02
Misc : 5.78g/5.0mL/MSVOA_Y/SOIL/A
ALS Vial : 16 Sample Multiplier: 1

Instrument :
MSVOA_Y
ClientSampleId :
PR132-S11-010080-20251021

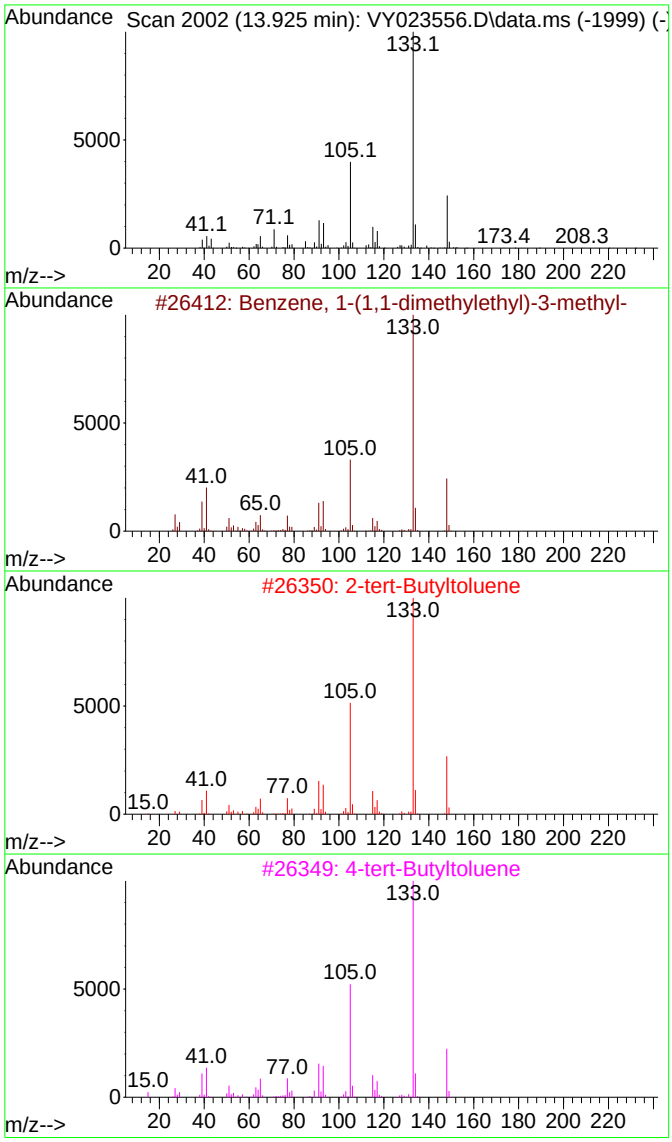
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260

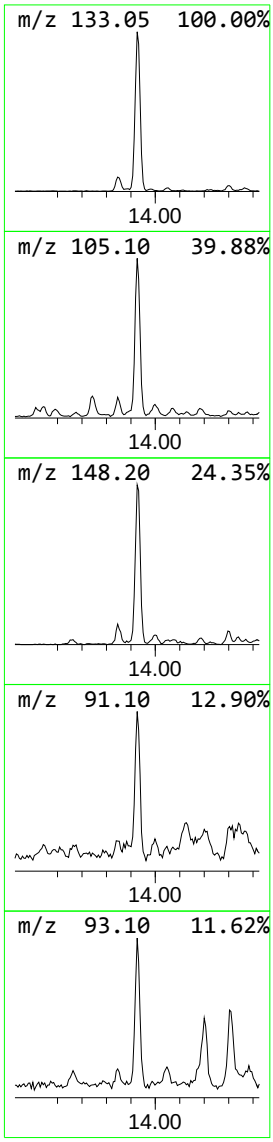
TIC Library : C:\Database\NIST20.L
TIC Integration Parameters: LSCINT.P

****
Peak Number 10 Benzene, 1-(1,1-dimethyleth... Concentration Rank 5

R.T.	EstConc	Area	Relative to ISTD	R.T.
13.926	12.91 ug/l	691660	1,4-Dichlorobenzene-d4	13.346

Hit# of 5	Tentative ID	MW	MolForm	CAS#	Qual
1	Benzene, 1-(1,1-dimethylethyl)-3...	148	C11H16	001075-38-3	96
2	2-tert-Butyltoluene	148	C11H16	001074-92-6	94
3	4-tert-Butyltoluene	148	C11H16	000098-51-1	94
4	Benzene, 2,4-dimethyl-1-(1-methy...	148	C11H16	004706-89-2	90
5	Benzene, 1,3-dimethyl-5-(1-methy...	148	C11H16	004706-90-5	87





Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY102225\
Data File : VY023556.D
Acq On : 22 Oct 2025 17:10
Operator : SY/MD
Sample : Q3424-02
Misc : 5.78g/5.0mL/MSVOA_Y/SOIL/A
ALS Vial : 16 Sample Multiplier: 1

Instrument :
MSVOA_Y
ClientSampleId :
PR132-S11-010080-20251021

Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260

TIC Library : C:\Database\NIST20.L
TIC Integration Parameters: LSCINT.P

					--Internal Standard---			
TIC Top Hit name	RT	EstConc	Units	Response	#	RT	Resp	Conc
3-Heptene, 2,2,...	12.919	12.3	ug/l	660920	4	13.346	2679260	50.0
Benzene, 1-(1,1...	13.926	12.9	ug/l	691660	4	13.346	2679260	50.0

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

Report of Analysis

Client:	AECOM	Date Collected:	10/21/25
Project:	AE1-CTY 3.2.Z-PR-DOCK-Des-ODC - 60693795-1719206	Date Received:	10/21/25
Client Sample ID:	PR132-S14-000094-202510	SDG No.:	Q3424
Lab Sample ID:	Q3424-03	Matrix:	SOIL
Analytical Method:	8260D	Level : LOW	% Solid: 50.1
Sample Wt/Vol:	4.58 g	Final Vol: 5000 uL	Test: VOC-TCLVOA-10

CAS Number	Parameter	Conc.	Qua.	DF	MDL	LOQ / CRQL	Units	Date Ana.	BatchID
TARGETS									
75-71-8	Dichlorodifluoromethane	10.9	U	1	2.50	10.9	ug/Kg	10/22/25 17:35	VY102225
74-87-3	Chloromethane	10.9	U	1	2.50	10.9	ug/Kg	10/22/25 17:35	VY102225
75-01-4	Vinyl Chloride	10.9	U	1	1.70	10.9	ug/Kg	10/22/25 17:35	VY102225
74-83-9	Bromomethane	10.9	U	1	2.30	10.9	ug/Kg	10/22/25 17:35	VY102225
75-00-3	Chloroethane	10.9	U	1	2.70	10.9	ug/Kg	10/22/25 17:35	VY102225
75-69-4	Trichlorofluoromethane	10.9	U	1	2.60	10.9	ug/Kg	10/22/25 17:35	VY102225
76-13-1	1,1,2-Trichlorotrifluoroethane	10.9	U	1	2.30	10.9	ug/Kg	10/22/25 17:35	VY102225
75-35-4	1,1-Dichloroethene	10.9	U	1	2.20	10.9	ug/Kg	10/22/25 17:35	VY102225
67-64-1	Acetone	210		1	10.3	54.5	ug/Kg	10/22/25 17:35	VY102225
75-15-0	Carbon Disulfide	4.90	J	1	2.30	10.9	ug/Kg	10/22/25 17:35	VY102225
1634-04-4	Methyl tert-butyl Ether	10.9	U	1	1.60	10.9	ug/Kg	10/22/25 17:35	VY102225
79-20-9	Methyl Acetate	10.9	U	1	3.40	10.9	ug/Kg	10/22/25 17:35	VY102225
75-09-2	Methylene Chloride	21.8	U	1	7.70	21.8	ug/Kg	10/22/25 17:35	VY102225
156-60-5	trans-1,2-Dichloroethene	10.9	U	1	1.90	10.9	ug/Kg	10/22/25 17:35	VY102225
75-34-3	1,1-Dichloroethane	10.9	U	1	1.70	10.9	ug/Kg	10/22/25 17:35	VY102225
110-82-7	Cyclohexane	10.9	U	1	1.70	10.9	ug/Kg	10/22/25 17:35	VY102225
78-93-3	2-Butanone	43.5	J	1	14.3	54.5	ug/Kg	10/22/25 17:35	VY102225
56-23-5	Carbon Tetrachloride	10.9	U	1	2.10	10.9	ug/Kg	10/22/25 17:35	VY102225
156-59-2	cis-1,2-Dichloroethene	10.9	U	1	1.60	10.9	ug/Kg	10/22/25 17:35	VY102225
74-97-5	Bromochloromethane	10.9	U	1	2.50	10.9	ug/Kg	10/22/25 17:35	VY102225
67-66-3	Chloroform	10.9	U	1	1.80	10.9	ug/Kg	10/22/25 17:35	VY102225
71-55-6	1,1,1-Trichloroethane	10.9	U	1	2.00	10.9	ug/Kg	10/22/25 17:35	VY102225
108-87-2	Methylcyclohexane	5.70	J	1	2.00	10.9	ug/Kg	10/22/25 17:35	VY102225
71-43-2	Benzene	5.40	J	1	1.70	10.9	ug/Kg	10/22/25 17:35	VY102225
107-06-2	1,2-Dichloroethane	10.9	U	1	1.70	10.9	ug/Kg	10/22/25 17:35	VY102225
79-01-6	Trichloroethene	10.9	U	1	1.80	10.9	ug/Kg	10/22/25 17:35	VY102225
78-87-5	1,2-Dichloropropane	10.9	U	1	2.00	10.9	ug/Kg	10/22/25 17:35	VY102225
75-27-4	Bromodichloromethane	10.9	U	1	1.70	10.9	ug/Kg	10/22/25 17:35	VY102225
108-10-1	4-Methyl-2-Pentanone	54.5	U	1	7.80	54.5	ug/Kg	10/22/25 17:35	VY102225
108-88-3	Toluene	10.9	U	1	1.70	10.9	ug/Kg	10/22/25 17:35	VY102225
10061-02-6	t-1,3-Dichloropropene	10.9	U	1	1.40	10.9	ug/Kg	10/22/25 17:35	VY102225
10061-01-5	cis-1,3-Dichloropropene	10.9	U	1	1.40	10.9	ug/Kg	10/22/25 17:35	VY102225
79-00-5	1,1,2-Trichloroethane	10.9	U	1	2.00	10.9	ug/Kg	10/22/25 17:35	VY102225
591-78-6	2-Hexanone	54.5	U	1	8.00	54.5	ug/Kg	10/22/25 17:35	VY102225
124-48-1	Dibromochloromethane	10.9	U	1	1.90	10.9	ug/Kg	10/22/25 17:35	VY102225
106-93-4	1,2-Dibromoethane	10.9	U	1	1.90	10.9	ug/Kg	10/22/25 17:35	VY102225
127-18-4	Tetrachloroethene	10.9	U	1	2.30	10.9	ug/Kg	10/22/25 17:35	VY102225
108-90-7	Chlorobenzene	10.9	U	1	2.00	10.9	ug/Kg	10/22/25 17:35	VY102225
100-41-4	Ethyl Benzene	10.9	U	1	1.50	10.9	ug/Kg	10/22/25 17:35	VY102225
179601-23-1	m/p-Xylenes	6.30	J	1	2.70	21.8	ug/Kg	10/22/25 17:35	VY102225
95-47-6	o-Xylene	11.4		1	1.80	10.9	ug/Kg	10/22/25 17:35	VY102225
100-42-5	Styrene	10.9	U	1	1.50	10.9	ug/Kg	10/22/25 17:35	VY102225
75-25-2	Bromoform	10.9	U	1	1.90	10.9	ug/Kg	10/22/25 17:35	VY102225

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

Report of Analysis

Client:	AECOM	Date Collected:	10/21/25
Project:	AE1-CTY 3.2.Z-PR-DOCK-Des-ODC - 60693795-1719206	Date Received:	10/21/25
Client Sample ID:	PR132-S14-000094-202510	SDG No.:	Q3424
Lab Sample ID:	Q3424-03	Matrix:	SOIL
Analytical Method:	8260D	Level : LOW	% Solid: 50.1
Sample Wt/Vol:	4.58 g	Final Vol: 5000 uL	Test: VOC-TCLVOA-10

CAS Number	Parameter	Conc.	Qua.	DF	MDL	LOQ / CRQL	Units	Date Ana.	BatchID
98-82-8	Isopropylbenzene	10.9	U	1	1.70	10.9	ug/Kg	10/22/25 17:35	VY102225
79-34-5	1,1,2,2-Tetrachloroethane	10.9	U	1	2.60	10.9	ug/Kg	10/22/25 17:35	VY102225
541-73-1	1,3-Dichlorobenzene	10.9	U	1	3.70	10.9	ug/Kg	10/22/25 17:35	VY102225
106-46-7	1,4-Dichlorobenzene	10.9	U	1	3.40	10.9	ug/Kg	10/22/25 17:35	VY102225
95-50-1	1,2-Dichlorobenzene	10.9	U	1	3.20	10.9	ug/Kg	10/22/25 17:35	VY102225
96-12-8	1,2-Dibromo-3-Chloropropane	10.9	U	1	4.00	10.9	ug/Kg	10/22/25 17:35	VY102225
120-82-1	1,2,4-Trichlorobenzene	10.9	U	1	6.50	10.9	ug/Kg	10/22/25 17:35	VY102225
87-61-6	1,2,3-Trichlorobenzene	10.9	U	1	6.90	10.9	ug/Kg	10/22/25 17:35	VY102225
SURROGATES									
17060-07-0	1,2-Dichloroethane-d4	51.1			63 - 155	102%	SPK: 50		
1868-53-7	Dibromofluoromethane	50.8			70 - 134	102%	SPK: 50		
2037-26-5	Toluene-d8	49.9			74 - 123	100%	SPK: 50		
460-00-4	4-Bromofluorobenzene	44.3			17 - 146	89%	SPK: 50		
INTERNAL STANDARDS		**Area Count**							
363-72-4	Pentafluorobenzene	767000							
540-36-3	1,4-Difluorobenzene	1220000							
3114-55-4	Chlorobenzene-d5	1040000							
3855-82-1	1,4-Dichlorobenzene-d4	408000							
TENTATIVE IDENTIFIED COMPOUNDS									
75-65-0	Tert butyl alcohol	160	J			4.87	ug/Kg		
108-67-8	1,3,5-Trimethylbenzene	4.00	J			12.7	ug/Kg		
000141-70-8	Heptane, 2,2,6,6-tetramethyl-4-met	25.3	J			12.9	ug/Kg		
000123-48-8	3-Heptene, 2,2,4,6,6-pentamethyl-	22.0	J			12.9	ug/Kg		
95-63-6	1,2,4-Trimethylbenzene	9.30	J			13.0	ug/Kg		
002958-76-1	Naphthalene, decahydro-2-methyl-	17.3	J			14.2	ug/Kg		
017301-23-4	Undecane, 2,6-dimethyl-	16.8	J			14.6	ug/Kg		
003891-98-3	Dodecane, 2,6,10-trimethyl-	24.5	J			16.0	ug/Kg		

U = Not Detected
LOQ = Limit of Quantitation
MDL = Method Detection Limit
LOD = Limit of Detection
E = Value Exceeds Calibration Range
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
() = Laboratory InHouse Limit
A = Aldol-Condensation Reaction Products

Quantitation Report (QT/LSC Reviewed)

Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY102225\
Data File : VY023557.D
Acq On : 22 Oct 2025 17:35
Operator : SY/MD
Sample : Q3424-03
Misc : 4.58g/5.0mL/MSVOA_Y/SOIL/A
ALS Vial : 17 Sample Multiplier: 1

Instrument :
MSVOA_Y
ClientSampleId :
PR132-S14-000094-20251021

Quant Time: Oct 24 02:37:56 2025
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260
QLast Update : Wed Oct 08 05:12:50 2025
Response via : Initial Calibration

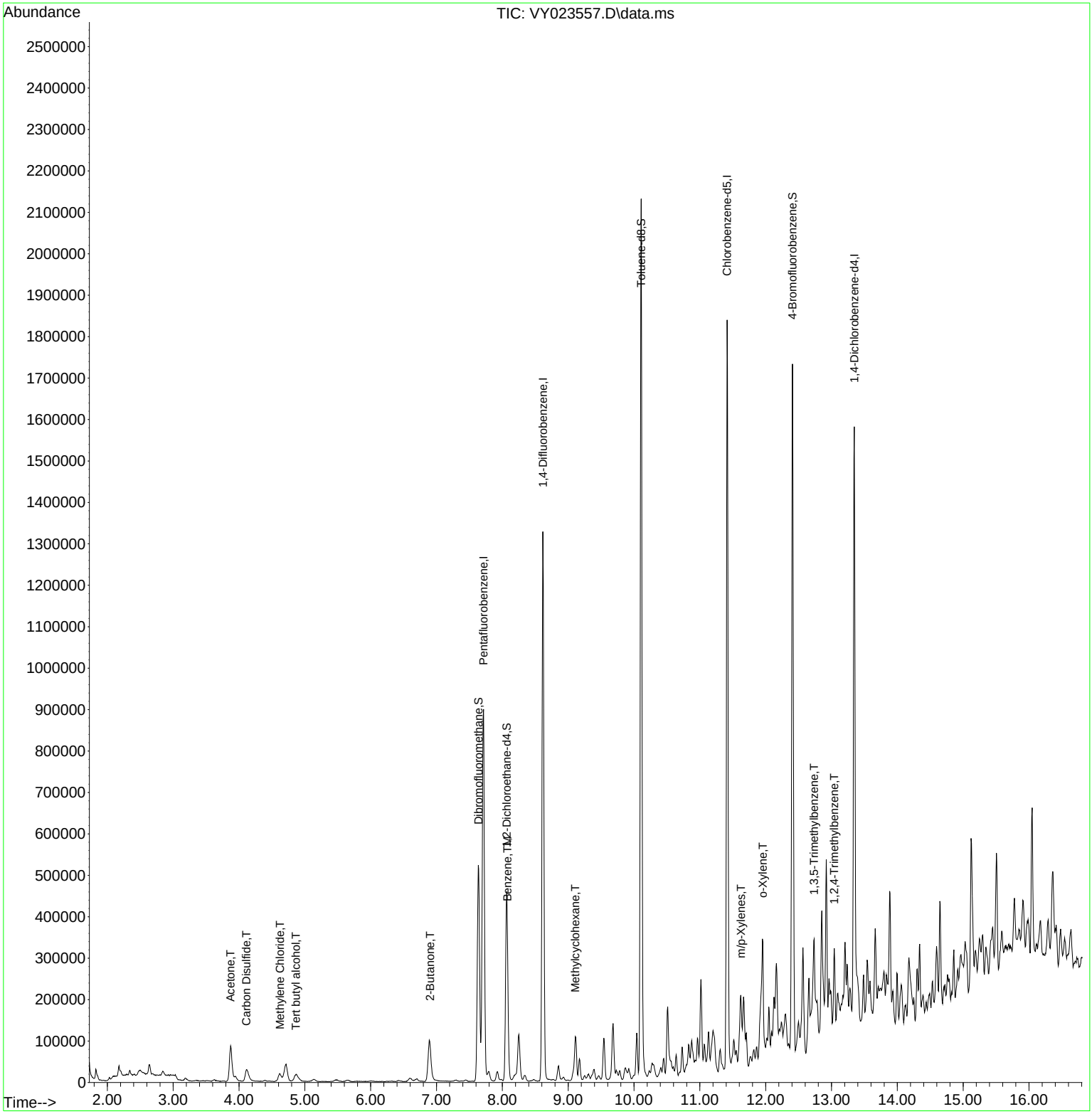
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Pentafluorobenzene	7.713	168	766523	50.000	ug/l	0.00
34) 1,4-Difluorobenzene	8.616	114	1219443	50.000	ug/l	0.00
63) Chlorobenzene-d5	11.414	117	1038965	50.000	ug/l	0.00
72) 1,4-Dichlorobenzene-d4	13.346	152	408239	50.000	ug/l	0.00
System Monitoring Compounds						
33) 1,2-Dichloroethane-d4	8.067	65	327571	51.105	ug/l	0.00
Spiked Amount 50.000	Range 50 - 163		Recovery = 102.200%			
35) Dibromofluoromethane	7.640	113	380304	50.755	ug/l	0.00
Spiked Amount 50.000	Range 54 - 147		Recovery = 101.520%			
50) Toluene-d8	10.109	98	1391193	49.856	ug/l	0.00
Spiked Amount 50.000	Range 58 - 134		Recovery = 99.720%			
62) 4-Bromofluorobenzene	12.408	95	408169	44.306	ug/l	0.00
Spiked Amount 50.000	Range 30 - 143		Recovery = 88.620%			
Target Compounds						Qvalue
11) Tert butyl alcohol	4.866	59	35373	74.180	ug/l #	81
16) Acetone	3.872	43	148073	97.036	ug/l	92
17) Carbon Disulfide	4.110	76	44448	2.271	ug/l	95
20) Methylene Chloride	4.622	84	14233	1.725	ug/l	90
25) 2-Butanone	6.902	43	37182	19.959	ug/l	97
39) Methylcyclohexane	9.109	83	33569	2.599	ug/l #	89
40) Benzene	8.079	78	77924	2.480	ug/l	97
68) m/p-Xylenes	11.627	106	42421	2.891	ug/l	97
69) o-Xylene	11.956	106	72102	5.240	ug/l	99
80) 1,3,5-Trimethylbenzene	12.737	105	40212	1.850	ug/l	100
84) 1,2,4-Trimethylbenzene	13.042	105	92667	4.271	ug/l	99

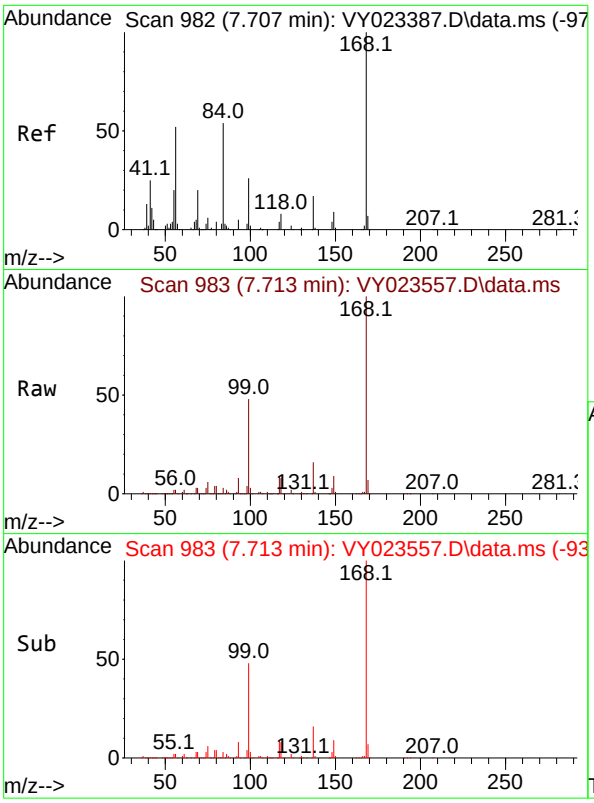
(#) = qualifier out of range (m) = manual integration (+) = signals summed

Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY102225\
Data File : VY023557.D
Acq On : 22 Oct 2025 17:35
Operator : SY/MD
Sample : Q3424-03
Misc : 4.58g/5.0mL/MSVOA_Y/SOIL/A
ALS Vial : 17 Sample Multiplier: 1

Instrument :
MSVOA_Y
ClientSampleId :
PR132-S14-000094-20251021

Quant Time: Oct 24 02:37:56 2025
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260
QLast Update : Wed Oct 08 05:12:50 2025
Response via : Initial Calibration



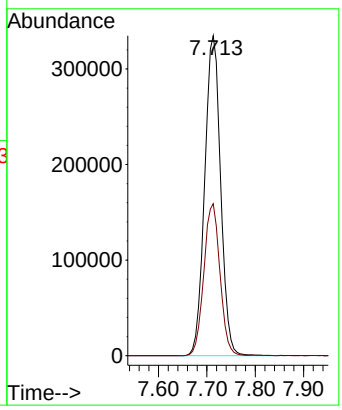


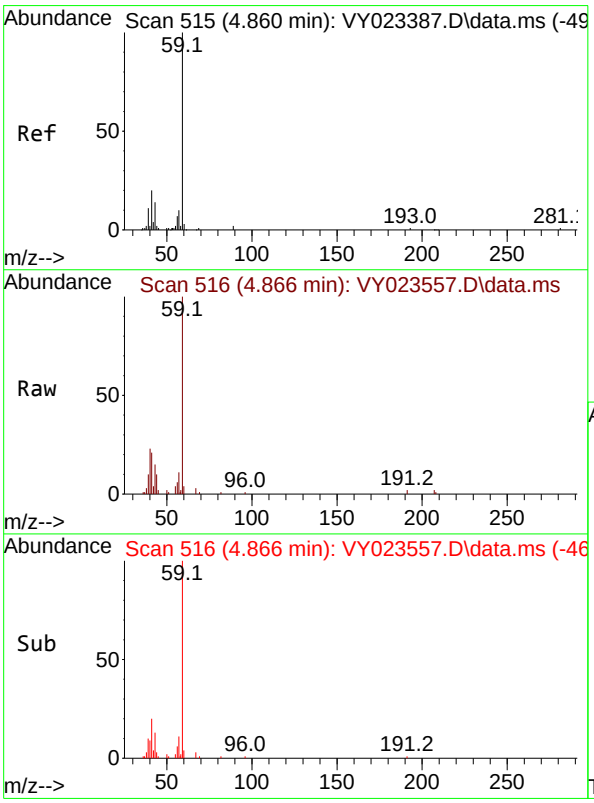
#1
Pentafluorobenzene
Concen: 50.000 ug/l
RT: 7.713 min Scan# 9
Delta R.T. 0.006 min
Lab File: VY023557.D
Acq: 22 Oct 2025 17:35

Instrument :
MSVOA_Y
ClientSampleId :
PR132-S14-000094-20251021

Tgt Ion:168 Resp: 766523

Ion	Ratio	Lower	Upper
168	100		
99	47.5	39.7	59.5

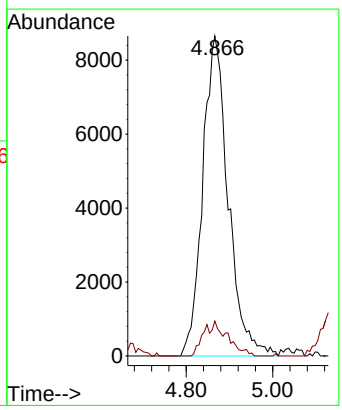


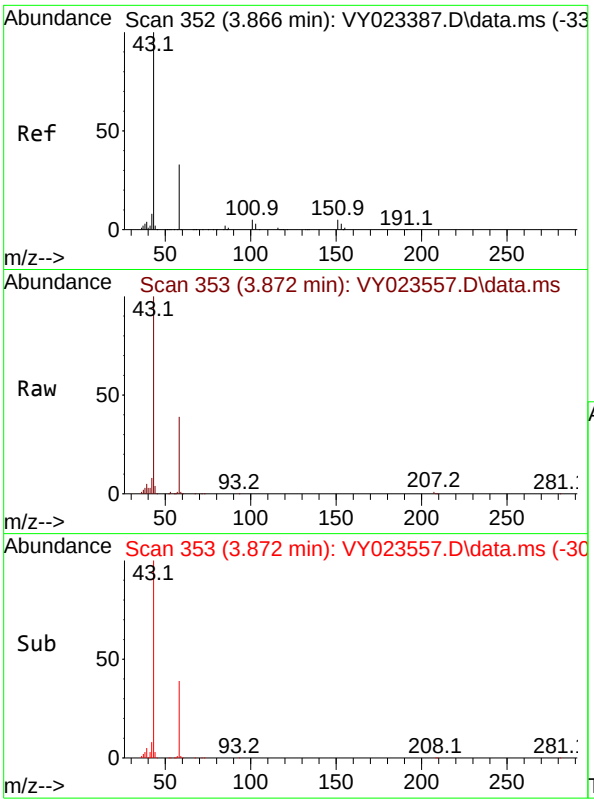


#11
Tert butyl alcohol
Concen: 74.180 ug/l
RT: 4.866 min Scan# 516
Delta R.T. 0.006 min
Lab File: VY023557.D
Acq: 22 Oct 2025 17:35

Tgt Ion: 59 Resp: 35373

Ion	Ratio	Lower	Upper
59	100		
57	3.4	8.3	12.5#



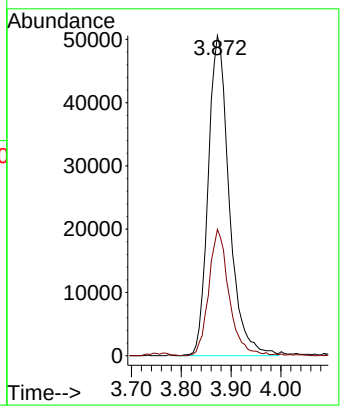


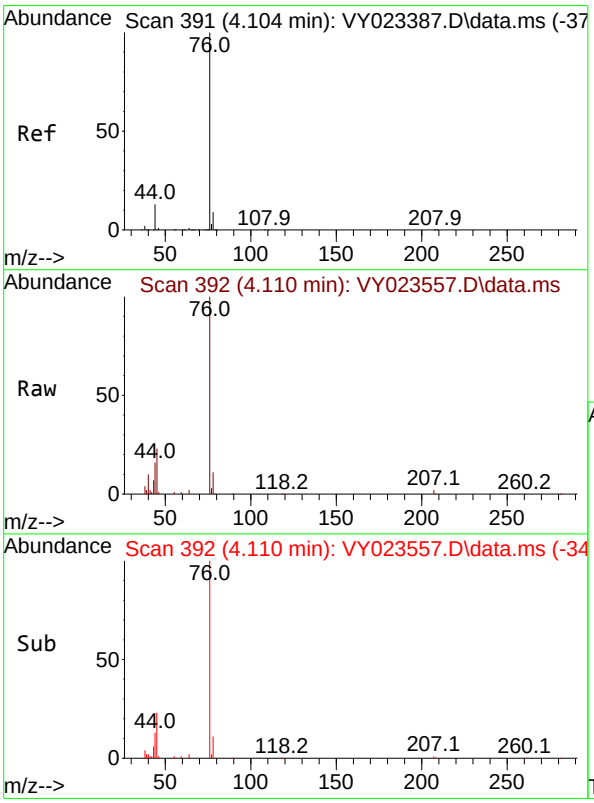
#16
Acetone
Concen: 97.036 ug/l
RT: 3.872 min Scan# 3
Delta R.T. 0.006 min
Lab File: VY023557.D
Acq: 22 Oct 2025 17:35

Instrument :
MSVOA_Y
ClientSampleId :
PR132-S14-000094-20251021

Tgt Ion: 43 Resp: 148073

Ion	Ratio	Lower	Upper
43	100		
58	39.3	27.7	41.5

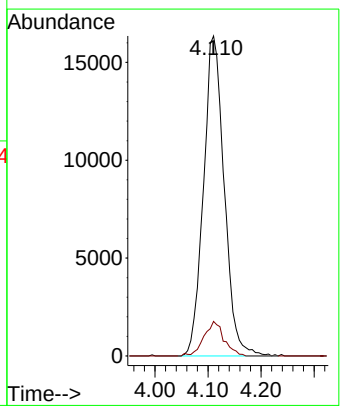


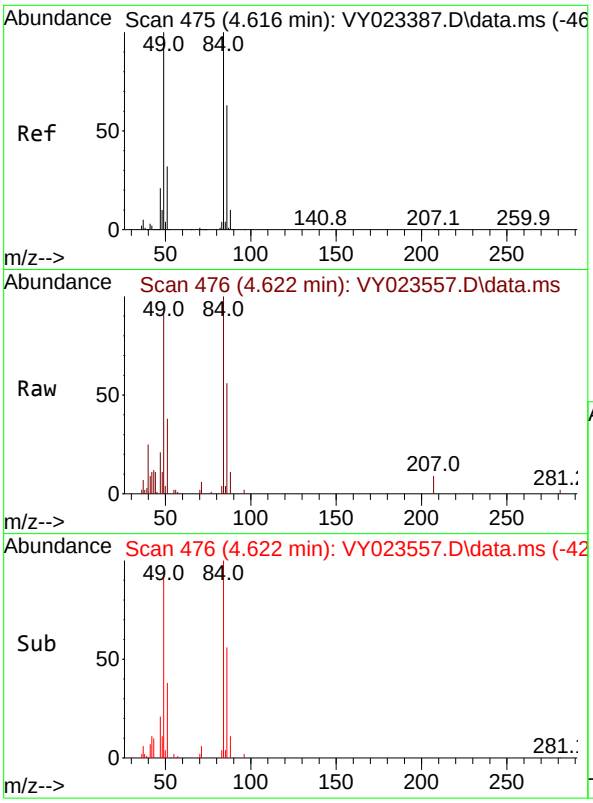


#17
Carbon Disulfide
Concen: 2.271 ug/l
RT: 4.110 min Scan# 392
Delta R.T. 0.006 min
Lab File: VY023557.D
Acq: 22 Oct 2025 17:35

Tgt Ion: 76 Resp: 44448

Ion	Ratio	Lower	Upper
76	100		
78	10.8	7.3	10.9



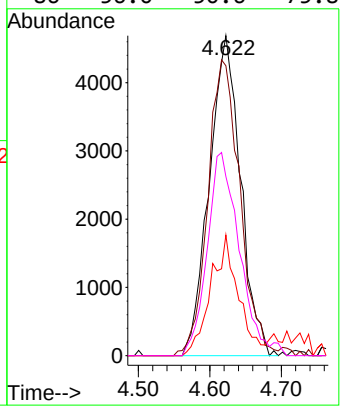


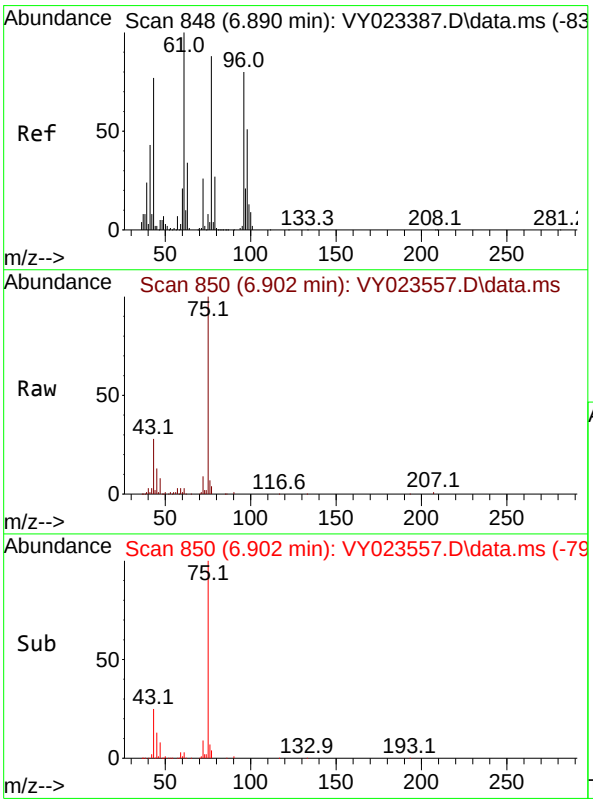
#20
Methylene Chloride
Concen: 1.725 ug/l
RT: 4.622 min Scan# 4
Delta R.T. 0.006 min
Lab File: VY023557.D
Acq: 22 Oct 2025 17:35

Instrument :
MSVOA_Y
ClientSampleId :
PR132-S14-000094-20251021

Tgt Ion: 84 Resp: 14233

Ion	Ratio	Lower	Upper
84	100		
49	89.1	80.2	120.4
51	37.7	25.9	38.9
86	56.0	50.6	75.8

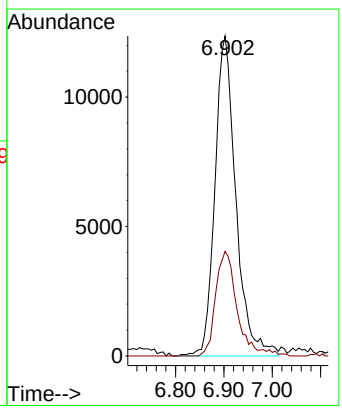


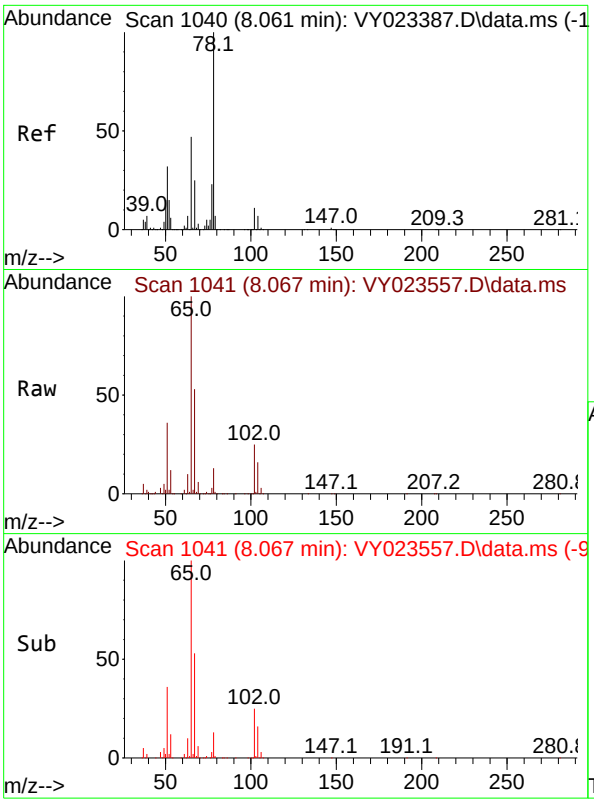


#25
2-Butanone
Concen: 19.959 ug/l
RT: 6.902 min Scan# 850
Delta R.T. 0.012 min
Lab File: VY023557.D
Acq: 22 Oct 2025 17:35

Tgt Ion: 43 Resp: 37182

Ion	Ratio	Lower	Upper
43	100		
72	32.7	27.4	41.2



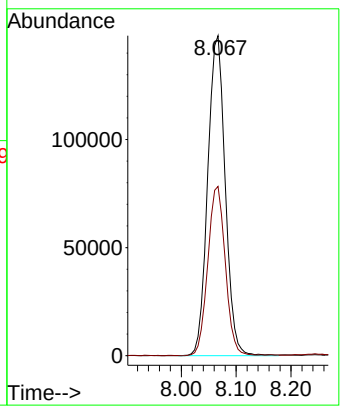


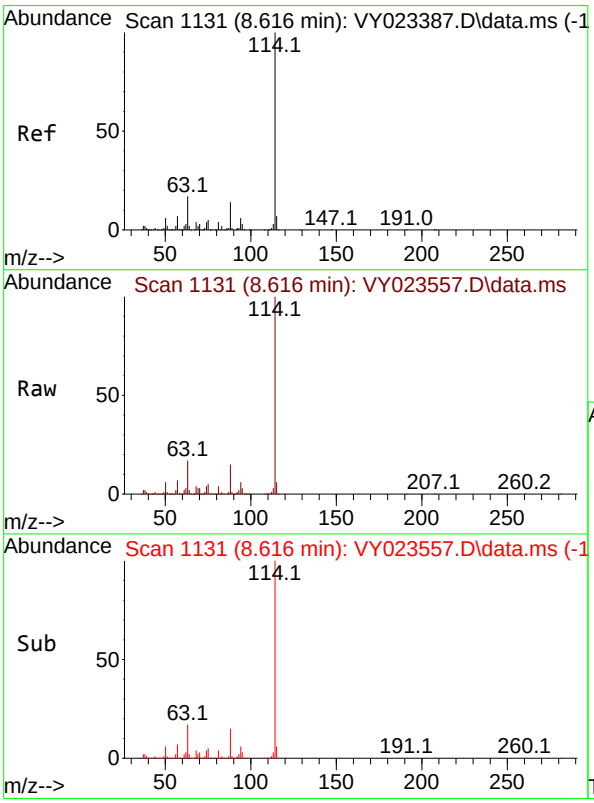
#33
1,2-Dichloroethane-d4
Concen: 51.105 ug/l
RT: 8.067 min Scan# 1
Delta R.T. 0.006 min
Lab File: VY023557.D
Acq: 22 Oct 2025 17:35

Instrument :
MSVOA_Y
ClientSampleId :
PR132-S14-000094-20251021

Tgt Ion: 65 Resp: 327571

Ion	Ratio	Lower	Upper
65	100		
67	53.0	0.0	105.8

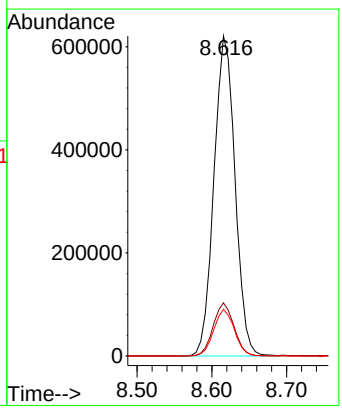


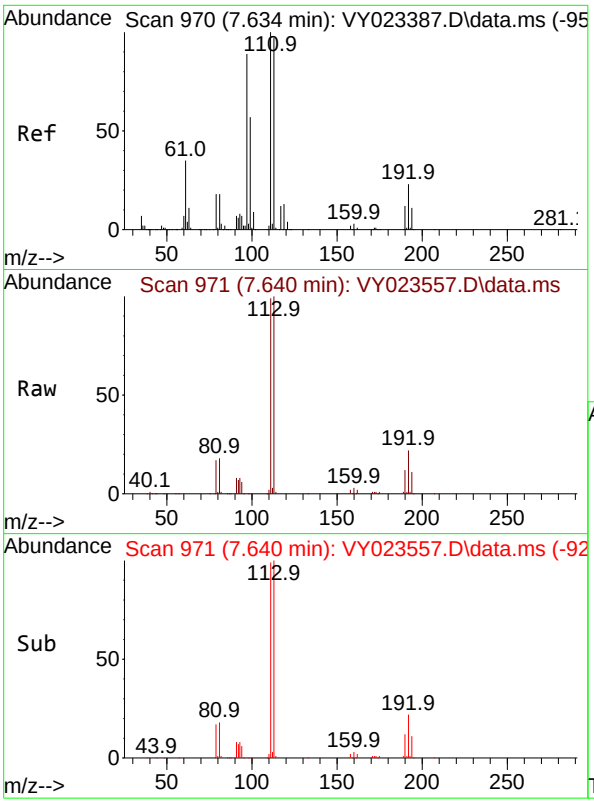


#34
1,4-Difluorobenzene
Concen: 50.000 ug/l
RT: 8.616 min Scan# 1131
Delta R.T. -0.000 min
Lab File: VY023557.D
Acq: 22 Oct 2025 17:35

Tgt Ion:114 Resp: 1219443

Ion	Ratio	Lower	Upper
114	100		
63	16.6	0.0	34.2
88	14.6	0.0	28.4



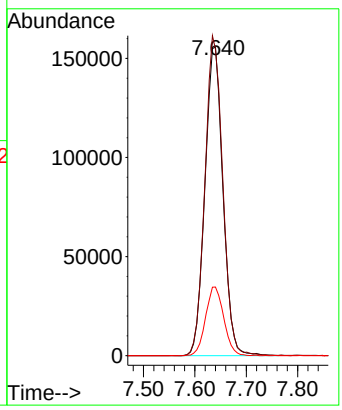


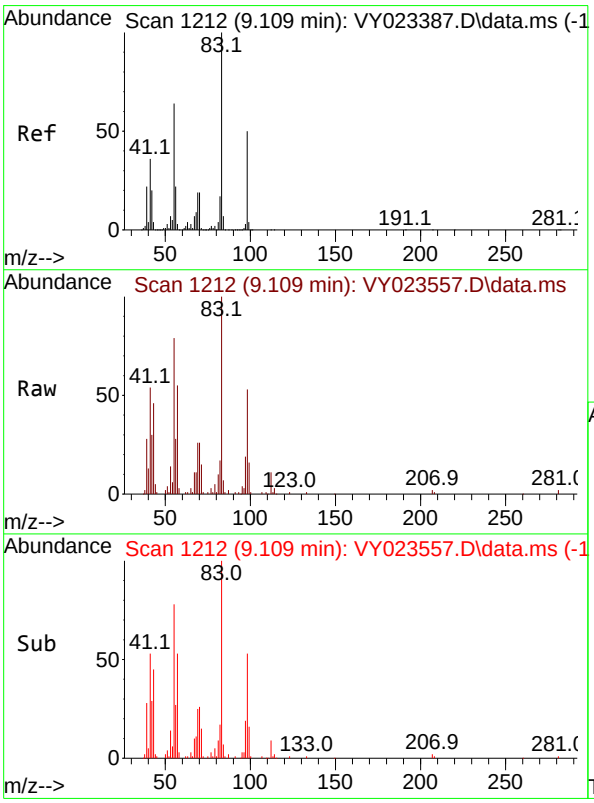
#35
Dibromofluoromethane
Concen: 50.755 ug/l
RT: 7.640 min Scan# 9
Delta R.T. 0.006 min
Lab File: VY023557.D
Acq: 22 Oct 2025 17:35

Instrument :
MSVOA_Y
ClientSampleId :
PR132-S14-000094-20251021

Tgt Ion:113 Resp: 380304

Ion	Ratio	Lower	Upper
113	100		
111	102.7	81.8	122.6
192	22.4	18.0	27.0

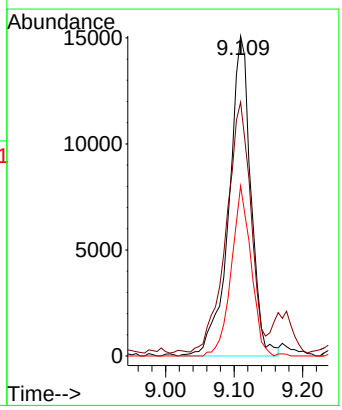


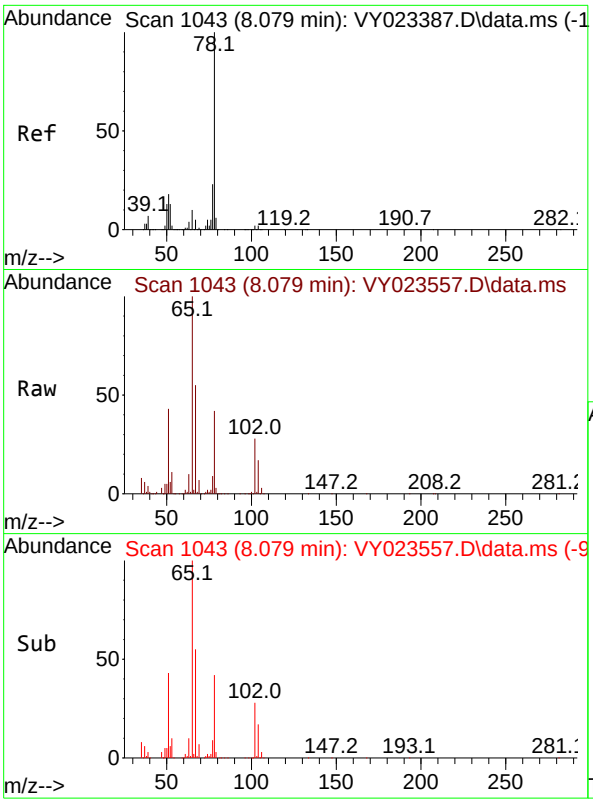


#39
Methylcyclohexane
Concen: 2.599 ug/l
RT: 9.109 min Scan# 1212
Delta R.T. -0.000 min
Lab File: VY023557.D
Acq: 22 Oct 2025 17:35

Tgt Ion: 83 Resp: 33569

Ion	Ratio	Lower	Upper
83	100		
55	77.5	51.4	77.2#
98	53.1	40.4	60.6



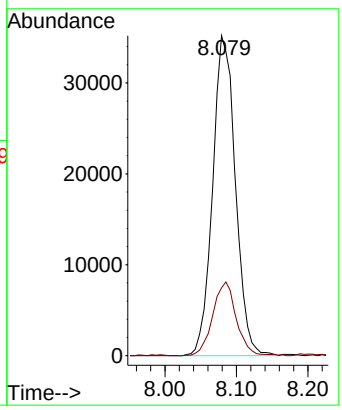


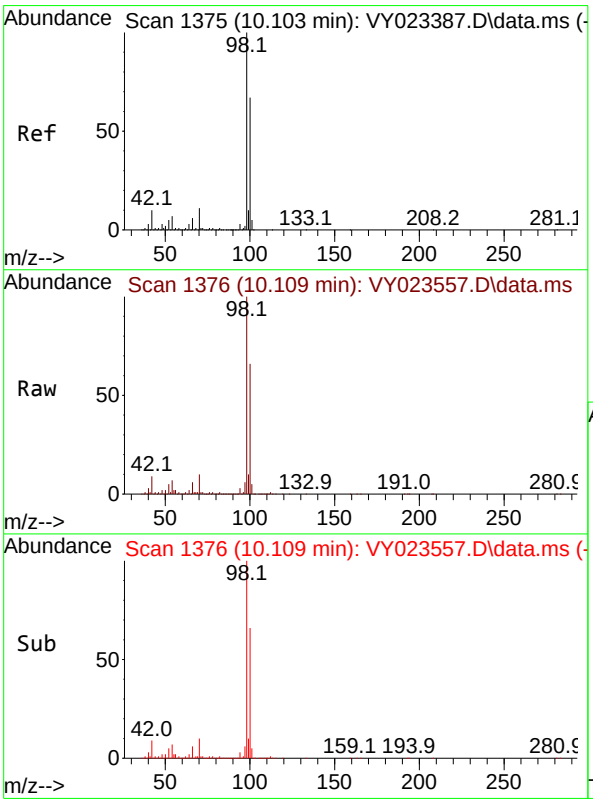
#40
Benzene
Concen: 2.480 ug/l
RT: 8.079 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023557.D
Acq: 22 Oct 2025 17:35

Instrument :
MSVOA_Y
ClientSampleId :
PR132-S14-000094-20251021

Tgt Ion: 78 Resp: 77924

Ion	Ratio	Lower	Upper
78	100		
77	21.2	18.3	27.5

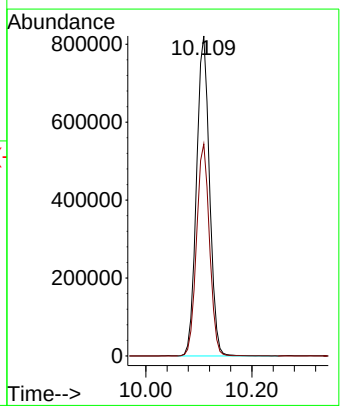


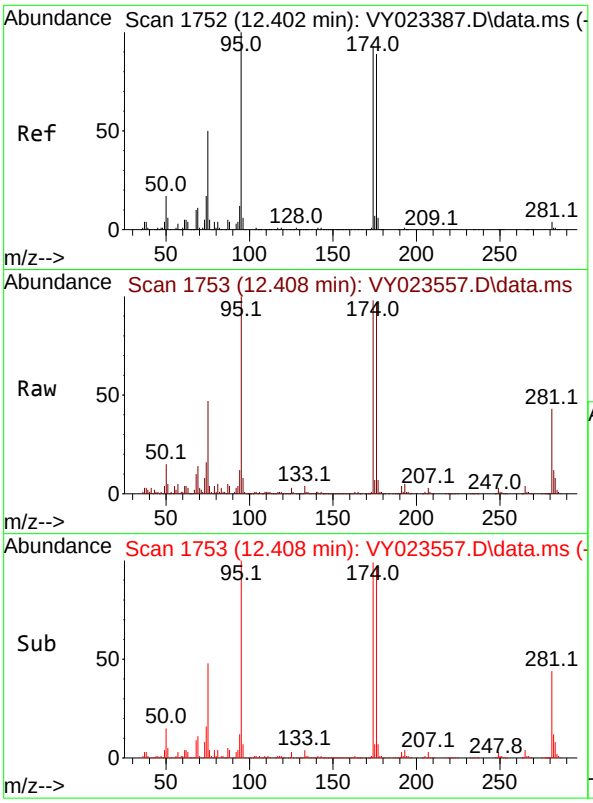


#50
Toluene-d8
Concen: 49.856 ug/l
RT: 10.109 min Scan# 1376
Delta R.T. 0.006 min
Lab File: VY023557.D
Acq: 22 Oct 2025 17:35

Tgt Ion: 98 Resp: 1391193

Ion	Ratio	Lower	Upper
98	100		
100	66.3	53.0	79.4



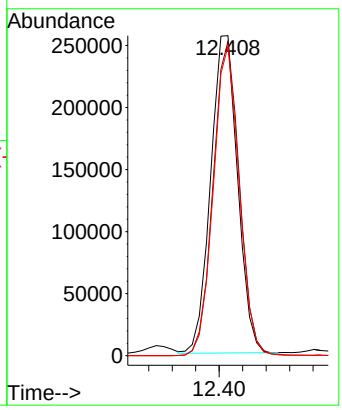


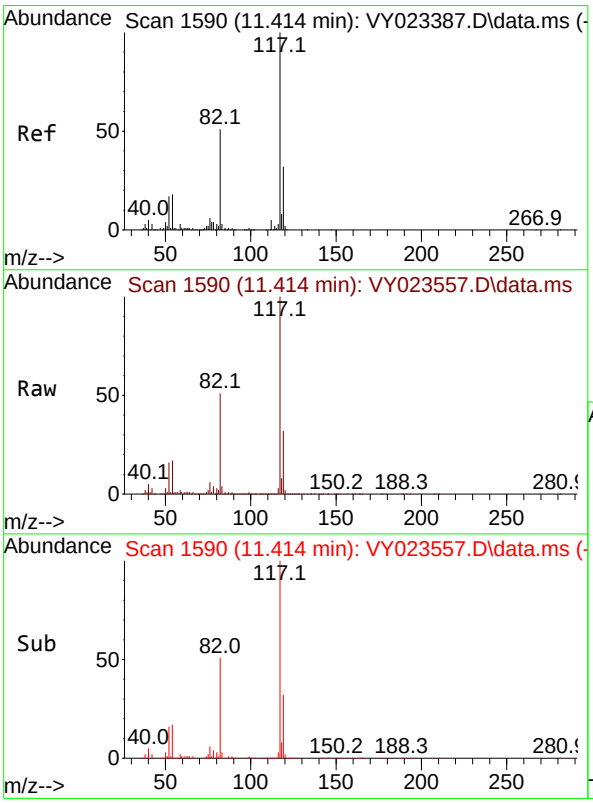
#62
4-Bromofluorobenzene
Concen: 44.306 ug/l
RT: 12.408 min Scan# 1
Delta R.T. 0.006 min
Lab File: VY023557.D
Acq: 22 Oct 2025 17:35

Instrument :
MSVOA_Y
ClientSampleId :
PR132-S14-000094-20251021

Tgt Ion: 95 Resp: 408169

Ion	Ratio	Lower	Upper
95	100		
174	96.4	0.0	192.8
176	93.6	0.0	187.6

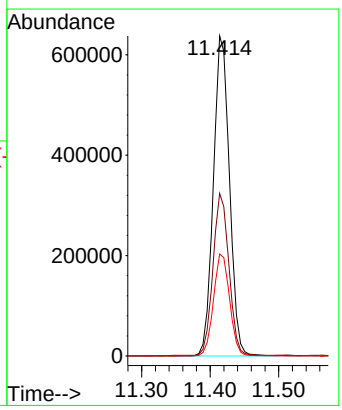


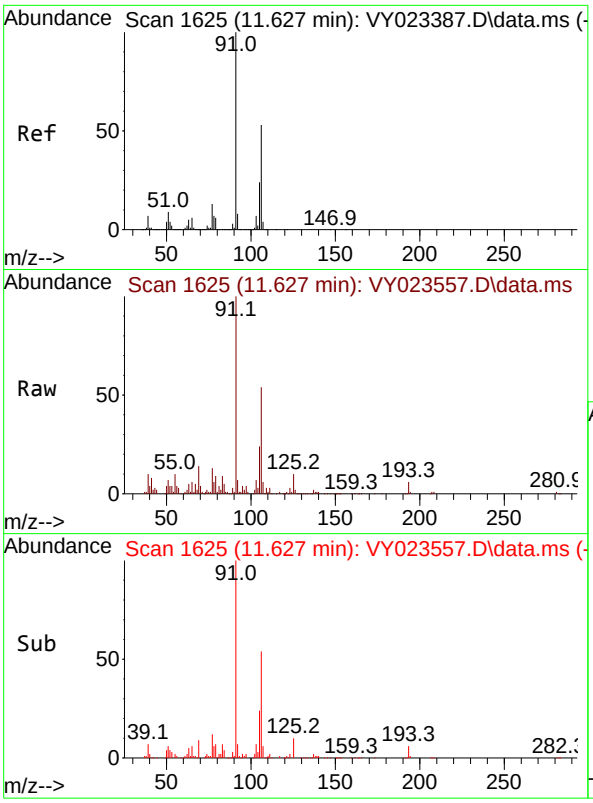


#63
Chlorobenzene-d5
Concen: 50.000 ug/l
RT: 11.414 min Scan# 1590
Delta R.T. -0.000 min
Lab File: VY023557.D
Acq: 22 Oct 2025 17:35

Tgt Ion:117 Resp: 1038965

Ion	Ratio	Lower	Upper
117	100		
82	50.6	41.0	61.4
119	31.8	25.6	38.4



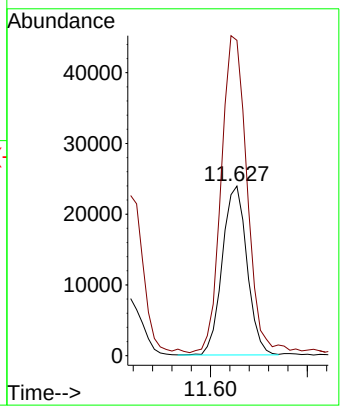


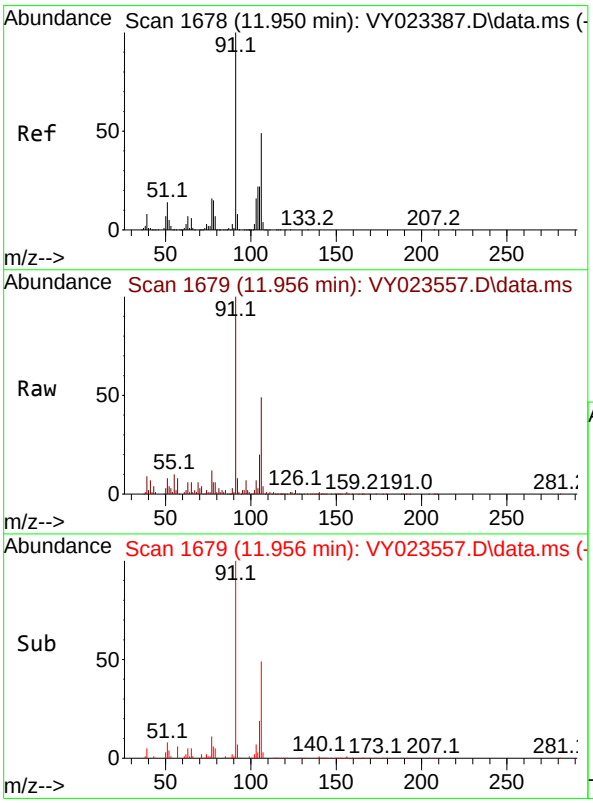
#68
m/p-Xylenes
Concen: 2.891 ug/l
RT: 11.627 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023557.D
Acq: 22 Oct 2025 17:35

Instrument :
MSVOA_Y
ClientSampleId :
PR132-S14-000094-20251021

Tgt Ion:106 Resp: 42421

Ion	Ratio	Lower	Upper
106	100		
91	195.6	152.6	229.0

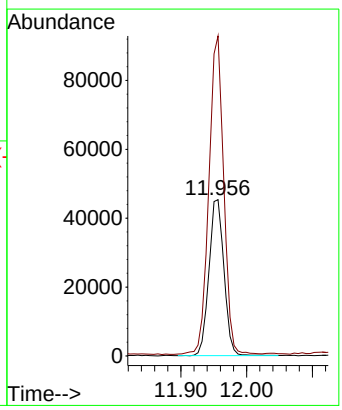


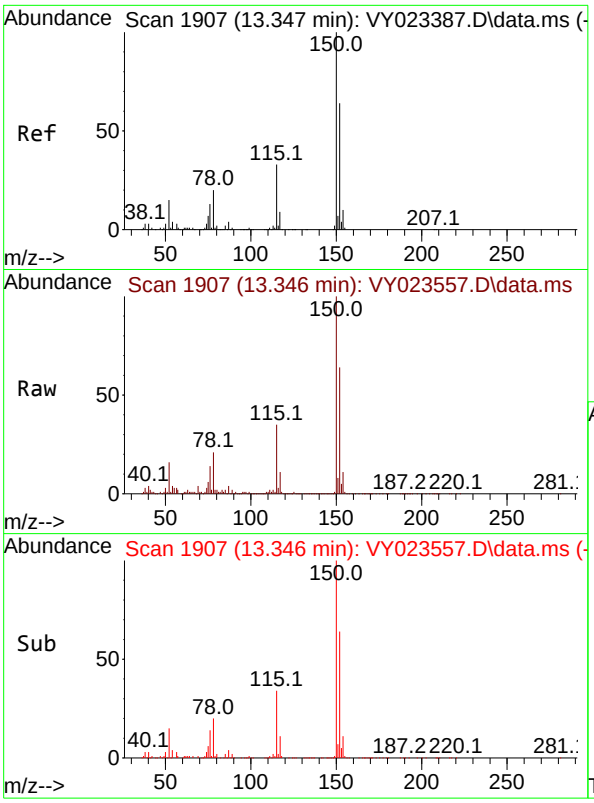


#69
o-Xylene
Concen: 5.240 ug/l
RT: 11.956 min Scan# 1679
Delta R.T. 0.006 min
Lab File: VY023557.D
Acq: 22 Oct 2025 17:35

Tgt Ion:106 Resp: 72102

Ion	Ratio	Lower	Upper
106	100		
91	201.0	101.4	304.1



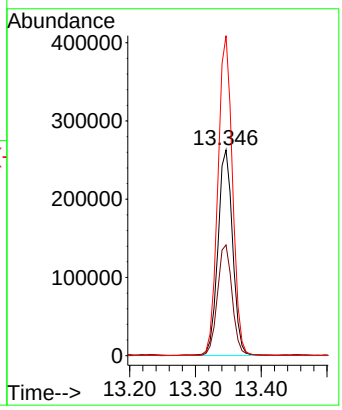


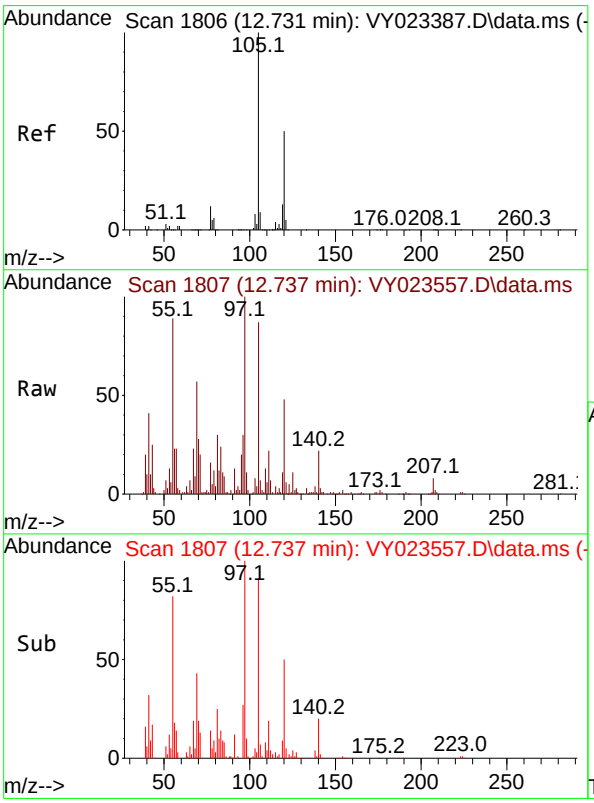
#72
1,4-Dichlorobenzene-d4
Concen: 50.000 ug/l
RT: 13.346 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023557.D
Acq: 22 Oct 2025 17:35

Instrument :
MSVOA_Y
ClientSampleId :
PR132-S14-000094-20251021

Tgt Ion:152 Resp: 408239

Ion	Ratio	Lower	Upper
152	100		
115	53.8	27.1	81.2
150	153.9	0.0	347.4

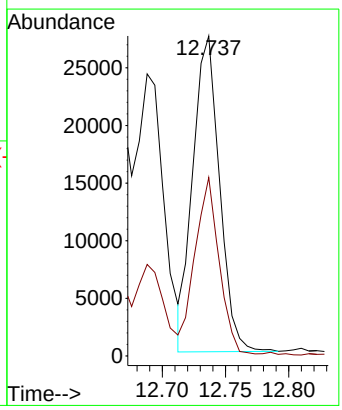


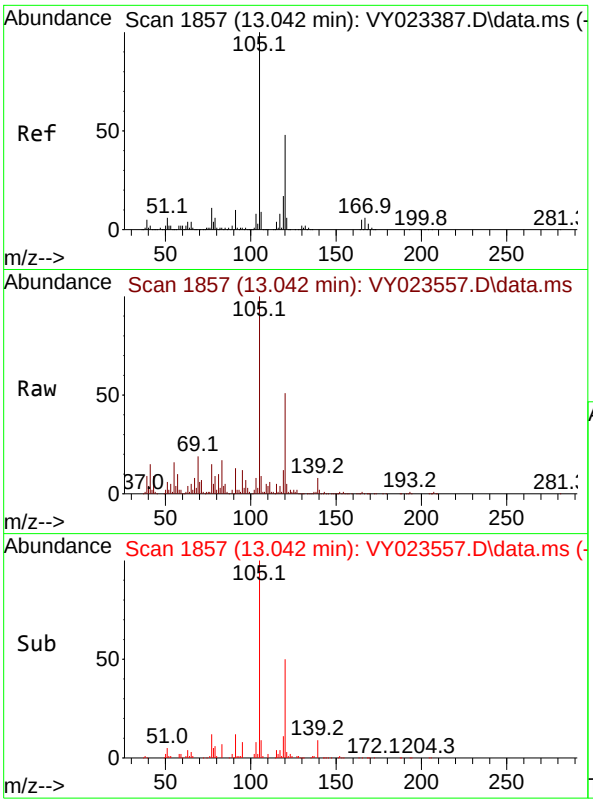


#80
1,3,5-Trimethylbenzene
Concen: 1.850 ug/l
RT: 12.737 min Scan# 1807
Delta R.T. 0.006 min
Lab File: VY023557.D
Acq: 22 Oct 2025 17:35

Tgt Ion:105 Resp: 40212

Ion	Ratio	Lower	Upper
105	100		
120	50.7	25.4	76.4



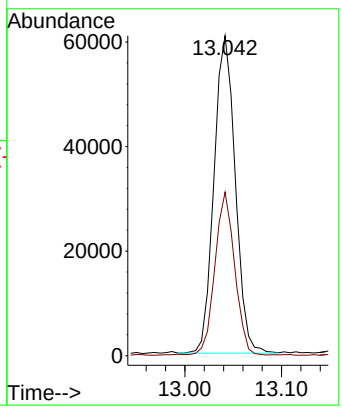


#84
1,2,4-Trimethylbenzene
Concen: 4.271 ug/l
RT: 13.042 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023557.D
Acq: 22 Oct 2025 17:35

Instrument :
MSVOA_Y
ClientSampleId :
PR132-S14-000094-20251021

Tgt Ion:105 Resp: 92667

Ion	Ratio	Lower	Upper
105	100		
120	48.0	23.8	71.2



LSC Area Percent Report

Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY102225\
Data File : VY023557.D
Acq On : 22 Oct 2025 17:35
Operator : SY/MD
Sample : Q3424-03
Misc : 4.58g/5.0mL/MSVOA_Y/SOIL/A
ALS Vial : 17 Sample Multiplier: 1

Instrument :
MSVOA_Y
ClientSampleId :
PR132-S14-000094-20251021

Integration Parameters: RTEINT.P
Integrator: RTE
Smoothing : ON Filtering: 5
Sampling : 1 Min Area: 3 % of largest Peak
Start Thrs: 0.2 Max Peaks: 100
Stop Thrs : 0 Peak Location: TOP

If leading or trailing edge < 100 prefer < Baseline drop else tangent >
Peak separation: 5

Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Title : SW846 8260

Signal : TIC: VY023557.D\data.ms

peak #	R.T. min	first scan	max scan	last scan	PK TY	peak height	corr. area	corr. % max.	% of total
1	1.824	14	17	26	rVB2	26697	49928	1.35%	0.140%
2	2.178	70	75	85	rBV2	25280	58343	1.58%	0.164%
3	2.641	146	151	156	rVB	23083	44981	1.22%	0.126%
4	3.872	342	353	362	rBV	85384	243617	6.58%	0.683%
5	4.116	383	393	415	rVB3	27957	105093	2.84%	0.295%
6	4.616	462	475	481	rBV3	19281	64048	1.73%	0.180%
7	4.714	482	491	500	rVV2	41708	144942	3.92%	0.407%
8	4.866	503	516	530	rVV2	16584	71252	1.93%	0.200%
9	6.890	836	848	861	rBV2	99903	319933	8.64%	0.897%
10	7.634	959	970	976	rBV	521528	1260769	34.06%	3.536%
11	7.713	976	983	992	rVV	897086	2101621	56.78%	5.895%
12	7.793	993	996	1007	rVB4	23160	52597	1.42%	0.148%
13	7.927	1010	1018	1025	rBV3	22240	55642	1.50%	0.156%
14	8.067	1031	1041	1053	rBV2	456536	1095541	29.60%	3.073%
15	8.250	1054	1071	1080	rVV2	112041	332264	8.98%	0.932%
16	8.335	1080	1085	1096	rVB4	14135	37925	1.02%	0.106%
17	8.616	1122	1131	1142	rBV	1326035	2600751	70.27%	7.295%
18	8.853	1162	1170	1177	rBV	35463	77794	2.10%	0.218%
19	9.109	1199	1212	1218	rBV4	105843	269596	7.28%	0.756%
20	9.170	1218	1222	1229	rVB2	50099	94284	2.55%	0.264%
21	9.390	1249	1258	1264	rVB3	24011	65355	1.77%	0.183%
22	9.542	1276	1283	1295	rVB2	99988	199891	5.40%	0.561%
23	9.682	1295	1306	1312	rBV3	135308	305313	8.25%	0.856%
24	9.786	1319	1323	1329	rVB3	21428	39077	1.06%	0.110%
25	9.871	1329	1337	1342	rBV5	28216	80015	2.16%	0.224%
26	9.920	1342	1345	1352	rVB3	24267	46048	1.24%	0.129%
27	10.042	1359	1365	1369	rBV	102231	165349	4.47%	0.464%
28	10.109	1369	1376	1391	rVB	2118062	3701250	100.00%	10.382%
29	10.408	1417	1425	1428	rBV5	21786	47866	1.29%	0.134%
30	10.451	1428	1432	1436	rVB2	36730	56113	1.52%	0.157%
31	10.512	1436	1442	1454	rBV	160020	378061	10.21%	1.060%
32	10.640	1459	1463	1468	rVB2	49997	82877	2.24%	0.232%
33	10.731	1468	1478	1484	rBV2	69241	139128	3.76%	0.390%
34	10.829	1490	1494	1498	rVV2	48995	81338	2.20%	0.228%
35	10.877	1498	1502	1508	rVB2	52827	104349	2.82%	0.293%
36	10.963	1513	1516	1520	rVV	65704	108889	2.94%	0.305%

Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY102225\
Data File : VY023557.D
Acq On : 22 Oct 2025 17:35
Operator : SY/MD
Sample : Q3424-03
Misc : 4.58g/5.0mL/MSVOA_Y/SOIL/A
ALS Vial : 17 Sample Multiplier: 1

Instrument :
MSVOA_Y
ClientSampleId :
PR132-S14-000094-20251021

Integration Parameters: RTEINT.P
Integrator: RTE
Smoothing : ON Filtering: 5
Sampling : 1 Min Area: 3 % of largest Peak
Start Thrs: 0.2 Max Peaks: 100
Stop Thrs : 0 Peak Location: TOP

If leading or trailing edge < 100 prefer < Baseline drop else tangent >
Peak separation: 5

Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Title : SW846 8260

37	11.018	1520	1525	1530	rVV	204907	354440	9.58%	0.994%
38	11.066	1530	1533	1538	rVV3	45356	69059	1.87%	0.194%
39	11.133	1539	1544	1548	rVV3	73209	117794	3.18%	0.330%
40	11.200	1548	1555	1568	rVB5	99836	368076	9.94%	1.032%
41	11.310	1568	1573	1582	rBV4	54469	131616	3.56%	0.369%
42	11.414	1584	1590	1600	rBV	1806498	2977097	80.43%	8.351%
43	11.517	1600	1607	1610	rBV2	56243	111597	3.02%	0.313%
44	11.621	1616	1624	1628	rBV3	160688	377767	10.21%	1.060%
45	11.664	1628	1631	1636	rVB3	107906	183978	4.97%	0.516%
46	11.767	1644	1648	1652	rBV4	22429	47831	1.29%	0.134%
47	11.822	1652	1657	1660	rVV5	29808	52935	1.43%	0.148%
48	11.865	1660	1664	1667	rVB4	28715	38329	1.04%	0.108%
49	11.950	1667	1678	1686	rBV3	289031	797889	21.56%	2.238%
50	12.048	1691	1694	1698	rVB	92654	115072	3.11%	0.323%
51	12.091	1698	1701	1703	rBV	32919	43876	1.19%	0.123%
52	12.127	1703	1707	1709	rVV3	98551	157889	4.27%	0.443%
53	12.164	1709	1713	1718	rVB3	170306	317597	8.58%	0.891%
54	12.304	1732	1736	1741	rVB6	77199	157127	4.25%	0.441%
55	12.408	1746	1753	1760	rVB2	1656720	2930999	79.19%	8.221%
56	12.499	1763	1768	1771	rBV6	53673	94973	2.57%	0.266%
57	12.566	1772	1779	1786	rVB5	255416	524206	14.16%	1.470%
58	12.657	1786	1794	1797	rBV3	181740	365981	9.89%	1.027%
59	12.737	1801	1807	1813	rBV8	169199	312420	8.44%	0.876%
60	12.853	1820	1826	1832	rBV	290742	607832	16.42%	1.705%
61	12.920	1832	1837	1841	rVB	362143	526744	14.23%	1.478%
62	12.962	1841	1844	1846	rBV3	69491	83021	2.24%	0.233%
63	13.042	1852	1857	1861	rBV	181161	270936	7.32%	0.760%
64	13.096	1862	1866	1872	rBV7	62025	141460	3.82%	0.397%
65	13.206	1880	1884	1887	rBV3	132816	185220	5.00%	0.520%
66	13.237	1887	1889	1893	rVB2	102050	123389	3.33%	0.346%
67	13.279	1893	1896	1901	rVB4	55166	89544	2.42%	0.251%
68	13.346	1901	1907	1923	rVB	1434972	2614024	70.63%	7.332%
69	13.487	1926	1930	1933	rBV2	102663	143105	3.87%	0.401%
70	13.541	1935	1939	1943	rBV	115989	198196	5.35%	0.556%
71	13.663	1954	1959	1964	rBV3	196701	348332	9.41%	0.977%
72	13.834	1985	1987	1991	rBV4	45443	73981	2.00%	0.208%
73	13.883	1991	1995	2000	rVB2	268100	436753	11.80%	1.225%
74	13.993	2009	2013	2018	rBV5	121702	190998	5.16%	0.536%
75	14.060	2019	2024	2030	rVB7	91806	219203	5.92%	0.615%
76	14.127	2031	2035	2038	rBV5	33692	57447	1.55%	0.161%

LSC Area Percent Report

Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY102225\
Data File : VY023557.D
Acq On : 22 Oct 2025 17:35
Operator : SY/MD
Sample : Q3424-03
Misc : 4.58g/5.0mL/MSVOA_Y/SOIL/A
ALS Vial : 17 Sample Multiplier: 1

Instrument :
MSVOA_Y
ClientSampleId :
PR132-S14-000094-20251021

Integration Parameters: RTEINT.P
Integrator: RTE
Smoothing : ON Filtering: 5
Sampling : 1 Min Area: 3 % of largest Peak
Start Thrs: 0.2 Max Peaks: 100
Stop Thrs : 0 Peak Location: TOP

If leading or trailing edge < 100 prefer < Baseline drop else tangent >
Peak separation: 5

Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Title : SW846 8260

77	14.176	2038	2043	2053	rBV5	141858	414235	11.19%	1.162%
78	14.304	2059	2064	2066	rBV3	125388	205353	5.55%	0.576%
79	14.340	2066	2070	2074	rVB2	156041	232229	6.27%	0.651%
80	14.535	2098	2102	2106	rBV4	63476	98969	2.67%	0.278%
81	14.596	2107	2112	2117	rVV5	143941	301466	8.14%	0.846%
82	14.645	2117	2120	2127	rVB2	247918	402523	10.88%	1.129%
83	14.858	2151	2155	2158	rVB3	115457	149356	4.04%	0.419%
84	15.120	2194	2198	2206	rBV3	348274	724317	19.57%	2.032%
85	15.505	2256	2261	2266	rVB4	281190	496790	13.42%	1.394%
86	16.047	2345	2350	2358	rBV2	351062	588444	15.90%	1.651%
87	16.358	2396	2401	2407	rBV5	177661	396174	10.70%	1.111%

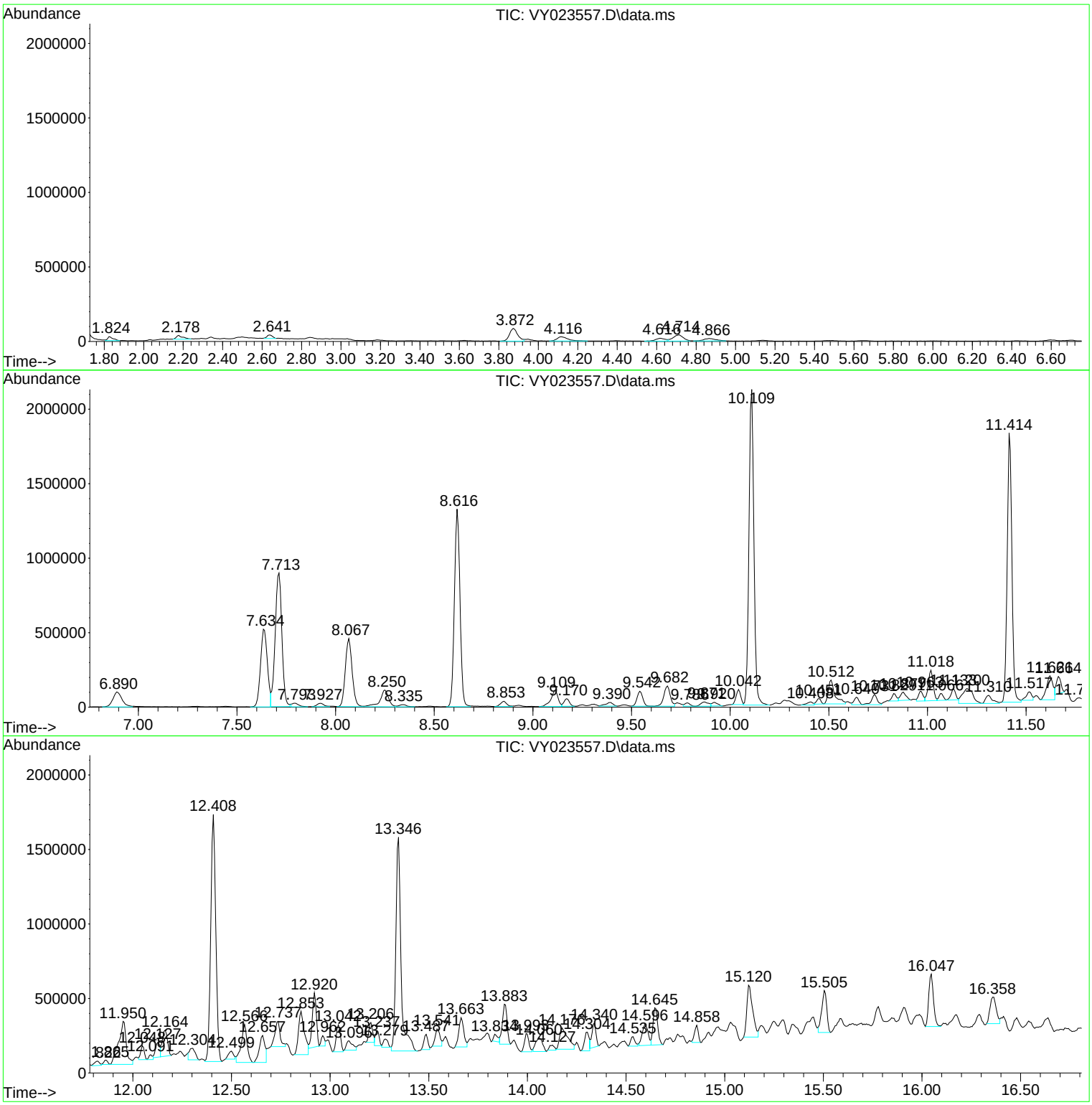
Sum of corrected areas: 35650429

Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY102225\
Data File : VY023557.D
Acq On : 22 Oct 2025 17:35
Operator : SY/MD
Sample : Q3424-03
Misc : 4.58g/5.0mL/MSVOA_Y/SOIL/A
ALS Vial : 17 Sample Multiplier: 1

Instrument :
MSVOA_Y
ClientSampleId :
PR132-S14-000094-20251021

Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260

TIC Library : C:\Database\NIST20.L
TIC Integration Parameters: LSCINT.P



Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY102225\
Data File : VY023557.D
Acq On : 22 Oct 2025 17:35
Operator : SY/MD
Sample : Q3424-03
Misc : 4.58g/5.0mL/MSVOA_Y/SOIL/A
ALS Vial : 17 Sample Multiplier: 1

Instrument :
MSVOA_Y
ClientSampleId :
PR132-S14-000094-20251021

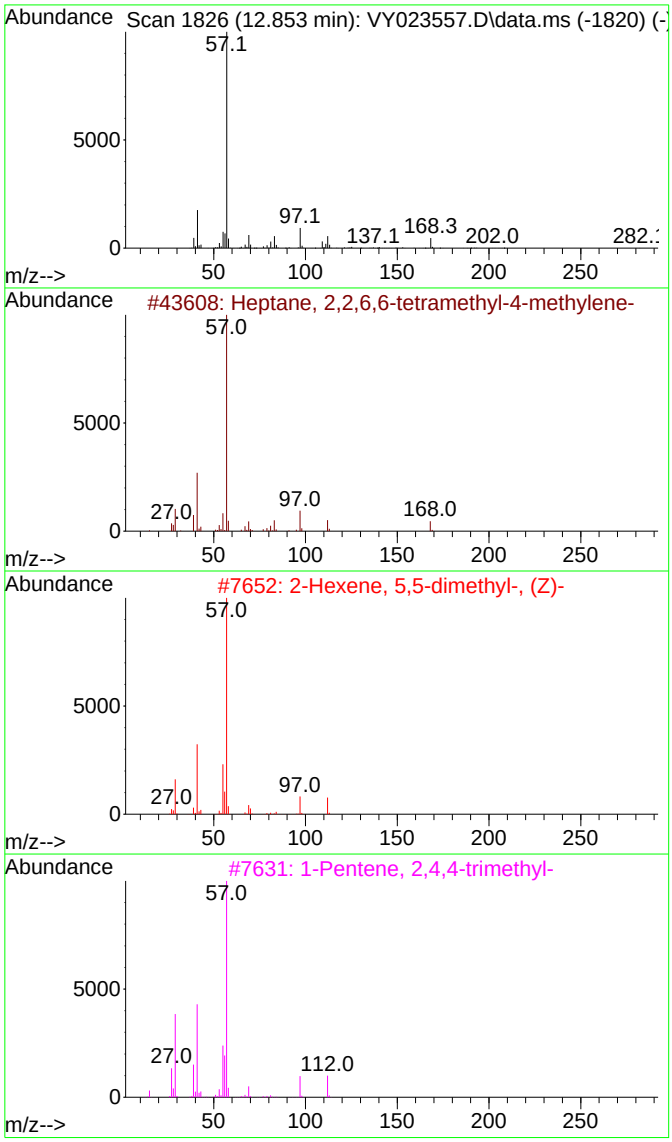
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260

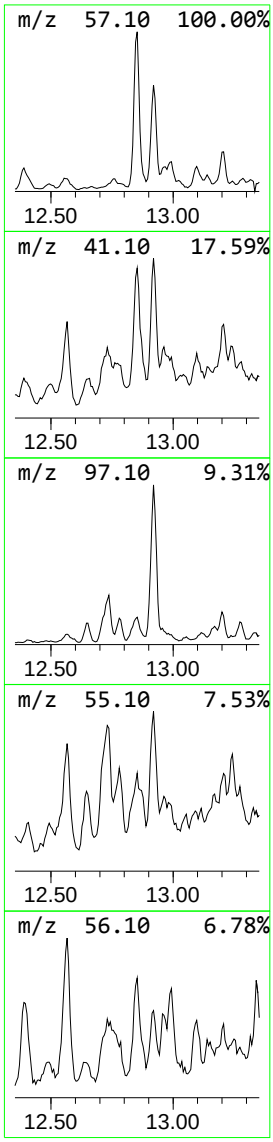
TIC Library : C:\Database\NIST20.L
TIC Integration Parameters: LSCINT.P

****
Peak Number 2 Heptane, 2,2,6,6-tetramethy... Concentration Rank 2

R.T.	EstConc	Area	Relative to ISTD	R.T.
12.853	11.63 ug/l	607832	1,4-Dichlorobenzene-d4	13.346

Hit# of 5	Tentative ID	MW	MolForm	CAS#	Qual
1	Heptane, 2,2,6,6-tetramethyl-4-m...	168	C12H24	000141-70-8	87
2	2-Hexene, 5,5-dimethyl-, (Z)-	112	C8H16	039761-61-0	53
3	1-Pentene, 2,4,4-trimethyl-	112	C8H16	000107-39-1	47
4	Carbonic acid, but-2-yn-1-yl oct...	366	C23H42O3	1000383-21-3	47
5	4-Decene, 2,2-dimethyl-, (E)-	168	C12H24	055534-69-5	40





Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY102225\
Data File : VY023557.D
Acq On : 22 Oct 2025 17:35
Operator : SY/MD
Sample : Q3424-03
Misc : 4.58g/5.0mL/MSVOA_Y/SOIL/A
ALS Vial : 17 Sample Multiplier: 1

Instrument :
MSVOA_Y
ClientSampleId :
PR132-S14-000094-20251021

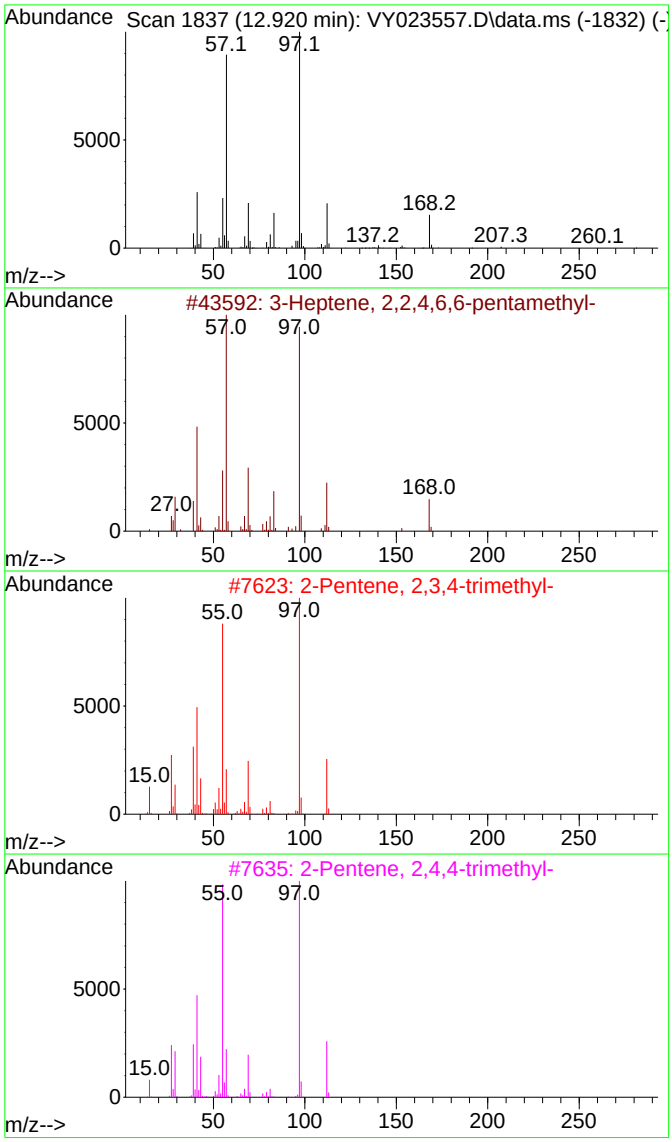
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260

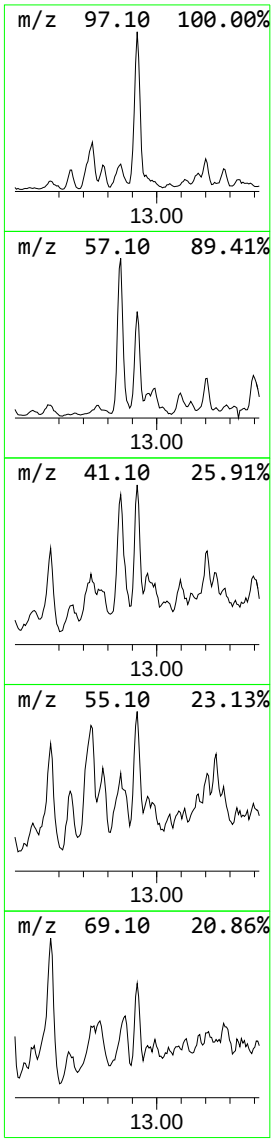
TIC Library : C:\Database\NIST20.L
TIC Integration Parameters: LSCINT.P

****
Peak Number 3 3-Heptene, 2,2,4,6,6-pentam... Concentration Rank 4

R.T.	EstConc	Area	Relative to ISTD	R.T.
12.920	10.08 ug/l	526744	1,4-Dichlorobenzene-d4	13.346

Hit# of 5	Tentative ID	MW	MolForm	CAS#	Qual
1	3-Heptene, 2,2,4,6,6-pentamethyl-	168	C12H24	000123-48-8	91
2	2-Pentene, 2,3,4-trimethyl-	112	C8H16	000565-77-5	59
3	2-Pentene, 2,4,4-trimethyl-	112	C8H16	000107-40-4	58
4	Sulfurous acid, cyclohexylmethyl...	402	C23H46O3S	1000309-22-4	53
5	Sulfurous acid, cyclohexylmethyl...	332	C18H36O3S	1000309-21-9	53





Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY102225\
Data File : VY023557.D
Acq On : 22 Oct 2025 17:35
Operator : SY/MD
Sample : Q3424-03
Misc : 4.58g/5.0mL/MSVOA_Y/SOIL/A
ALS Vial : 17 Sample Multiplier: 1

Instrument :
MSVOA_Y
ClientSampleId :
PR132-S14-000094-20251021

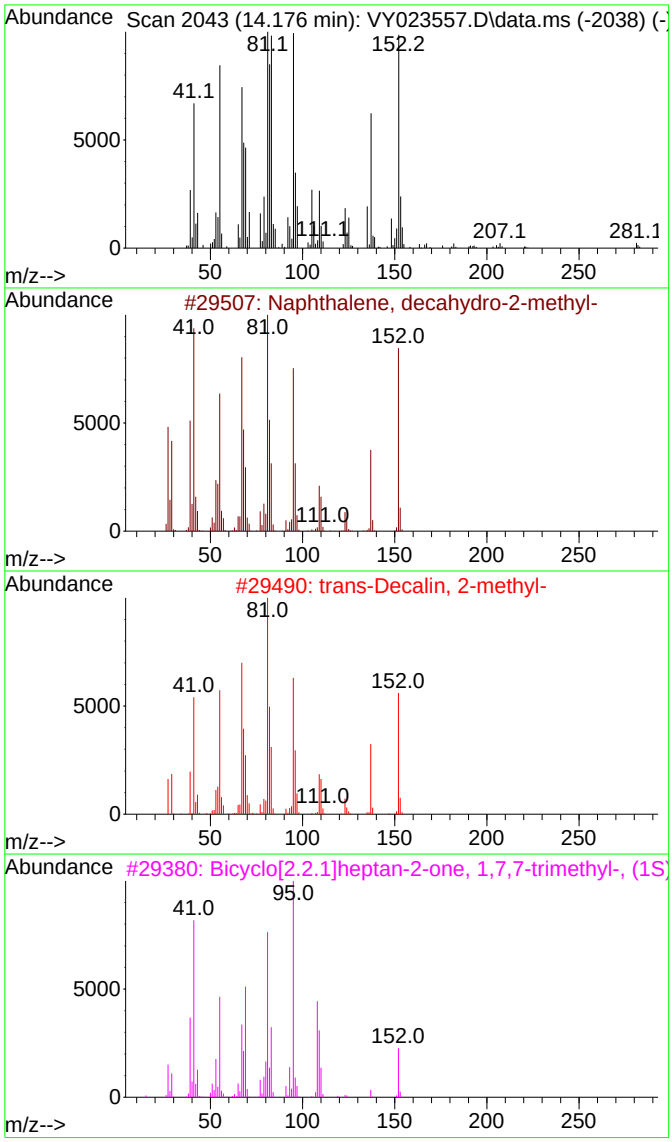
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260

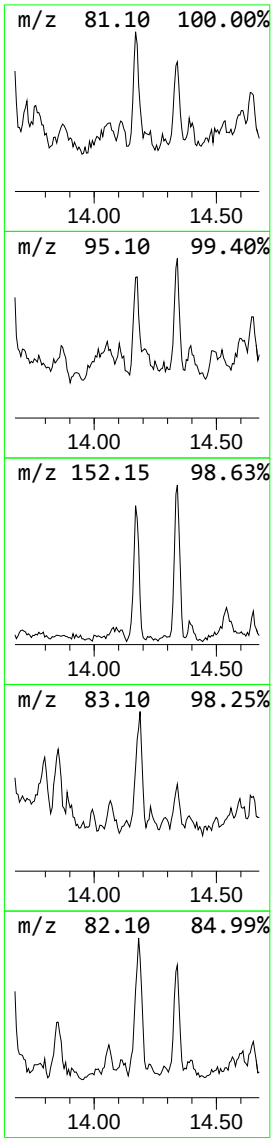
TIC Library : C:\Database\NIST20.L
TIC Integration Parameters: LSCINT.P

****
Peak Number 5 Naphthalene, decahydro-2-me... Concentration Rank 8

R.T.	EstConc	Area	Relative to ISTD	R.T.
14.176	7.92 ug/l	414235	1,4-Dichlorobenzene-d4	13.346

Hit# of 5	Tentative ID	MW	MolForm	CAS#	Qual
1	Naphthalene, decahydro-2-methyl-	152	C11H20	002958-76-1	89
2	trans-Decalin, 2-methyl-	152	C11H20	1000152-47-3	76
3	Bicyclo[2.2.1]heptan-2-one, 1,7,...	152	C10H16O	000464-48-2	60
4	Bicyclo[3.3.2]decan-9-one	152	C10H16O	028054-91-3	58
5	cis-Decalin, 2-syn-methyl-	152	C11H20	1000155-85-6	52





Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY102225\
Data File : VY023557.D
Acq On : 22 Oct 2025 17:35
Operator : SY/MD
Sample : Q3424-03
Misc : 4.58g/5.0mL/MSVOA_Y/SOIL/A
ALS Vial : 17 Sample Multiplier: 1

Instrument :
MSVOA_Y
ClientSampleId :
PR132-S14-000094-20251021

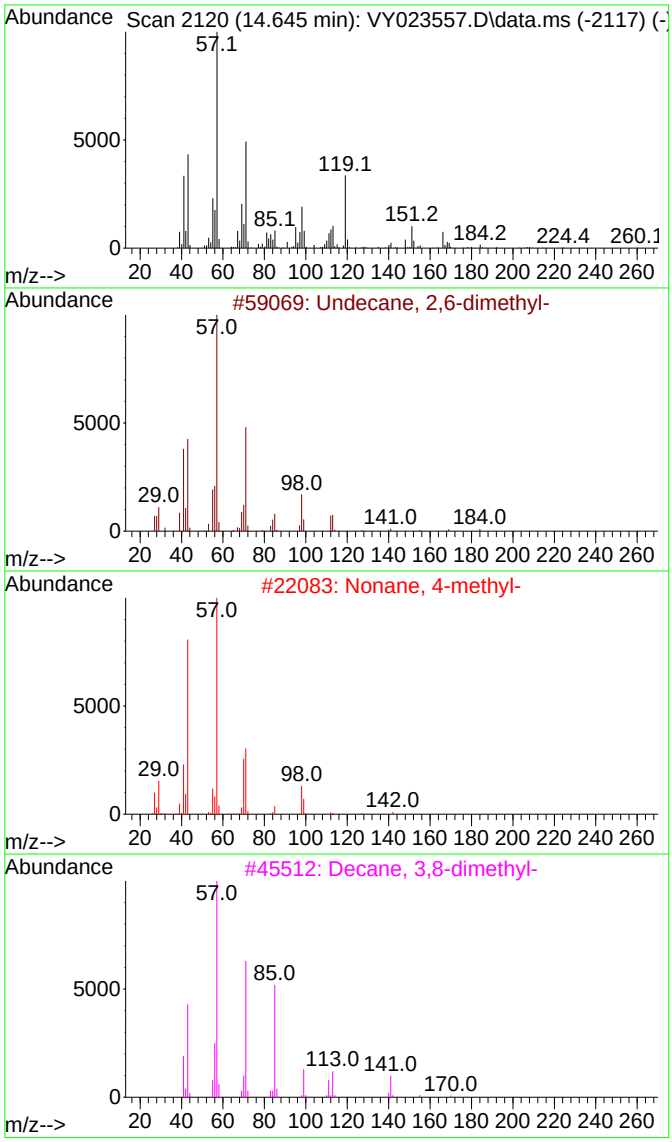
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260

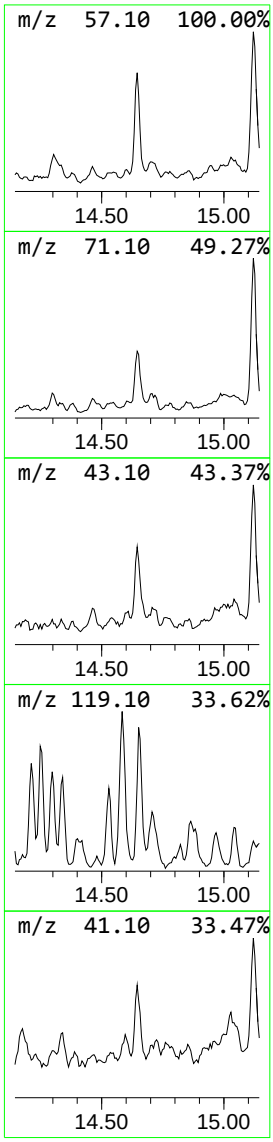
TIC Library : C:\Database\NIST20.L
TIC Integration Parameters: LSCINT.P

****
Peak Number 6 Undecane, 2,6-dimethyl- Concentration Rank 9

R.T.	EstConc	Area	Relative to ISTD	R.T.
14.645	7.70 ug/l	402523	1,4-Dichlorobenzene-d4	13.346

Hit# of 5	Tentative ID	MW	MolForm	CAS#	Qual
1	Undecane, 2,6-dimethyl-	184	C13H28	017301-23-4	91
2	Nonane, 4-methyl-	142	C10H22	017301-94-9	43
3	Decane, 3,8-dimethyl-	170	C12H26	017312-55-9	42
4	Undecane, 2,5-dimethyl-	184	C13H28	017301-22-3	42
5	Sulfurous acid, 2-ethylhexyl oct...	446	C26H54O3S	1000309-20-1	38





Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY102225\
Data File : VY023557.D
Acq On : 22 Oct 2025 17:35
Operator : SY/MD
Sample : Q3424-03
Misc : 4.58g/5.0mL/MSVOA_Y/SOIL/A
ALS Vial : 17 Sample Multiplier: 1

Instrument :
MSVOA_Y
ClientSampleId :
PR132-S14-000094-20251021

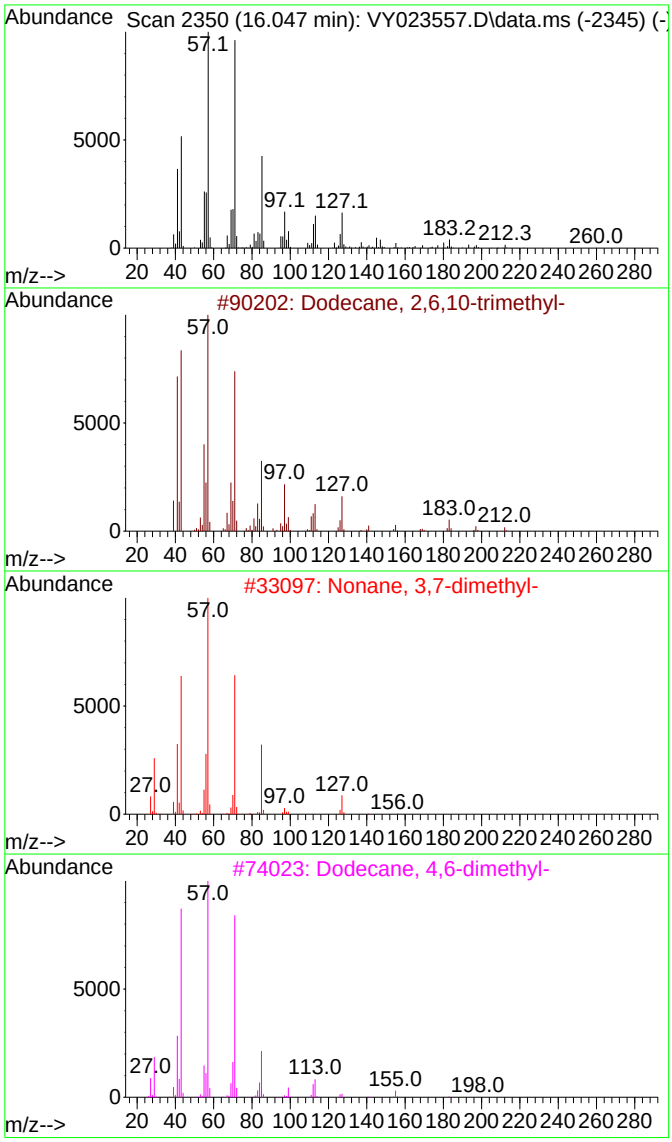
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260

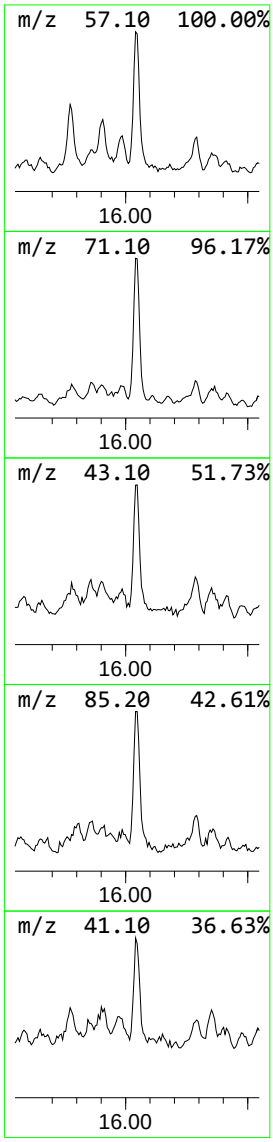
TIC Library : C:\Database\NIST20.L
TIC Integration Parameters: LSCINT.P

****
Peak Number 9 Dodecane, 2,6,10-trimethyl- Concentration Rank 3

R.T.	EstConc	Area	Relative to ISTD	R.T.
16.047	11.26 ug/l	588444	1,4-Dichlorobenzene-d4	13.346

Hit# of 5	Tentative ID	MW	MolForm	CAS#	Qual
1	Dodecane, 2,6,10-trimethyl-	212	C15H32	003891-98-3	90
2	Nonane, 3,7-dimethyl-	156	C11H24	017302-32-8	83
3	Dodecane, 4,6-dimethyl-	198	C14H30	061141-72-8	81
4	Hexadecane, 2,6,10,14-tetramethyl-	282	C20H42	000638-36-8	80
5	Decane, 5-propyl-	184	C13H28	017312-62-8	74





Tentatively Identified Compound (LSC) summary

Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY102225\
Data File : VY023557.D
Acq On : 22 Oct 2025 17:35
Operator : SY/MD
Sample : Q3424-03
Misc : 4.58g/5.0mL/MSVOA_Y/SOIL/A
ALS Vial : 17 Sample Multiplier: 1

Instrument :
MSVOA_Y
ClientSampleId :
PR132-S14-000094-20251021

Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260

TIC Library : C:\Database\NIST20.L
TIC Integration Parameters: LSCINT.P

					--Internal Standard---			
TIC Top Hit name	RT	EstConc	Units	Response	#	RT	Resp	Conc
Heptane, 2,2,6,...	12.853	11.6	ug/l	607832	4	13.346	2614020	50.0
3-Heptene, 2,2,...	12.920	10.1	ug/l	526744	4	13.346	2614020	50.0
Naphthalene, de...	14.176	7.9	ug/l	414235	4	13.346	2614020	50.0
Undecane, 2,6-d...	14.645	7.7	ug/l	402523	4	13.346	2614020	50.0
Dodecane, 2,6,1...	16.047	11.3	ug/l	588444	4	13.346	2614020	50.0

CALIBRATION SUMMARY

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

VOLATILE ORGANICS INITIAL CALIBRATION DATA

Lab Name: Alliance Contract: AECO02

Lab Code: ACE SDG No.: Q3424

Instrument ID: MSVOA_Y Calibration Date(s): 10/07/2025 10/07/2025

Heated Purge: (Y/N) Y Calibration Time(s): 09:17 12:32

GC Column: RXI-624 ID: 0.25 (mm)

LAB FILE ID: RRF005 = VY023384.D RRF010 = VY023385.D RRF020 = VY023386.D
RRF050 = VY023387.D RRF100 = VY023388.D RRF150 = VY023389.D

COMPOUND	RRF005	RRF010	RRF020	RRF050	RRF100	RRF150	$\overline{RRF}$	% RSD
Dichlorodifluoromethane	0.397	0.399	0.400	0.321	0.310	0.333	0.360	12
Chloromethane	0.518	0.557	0.512	0.449	0.438	0.467	0.490	9.4
Vinyl Chloride	0.660	0.684	0.659	0.598	0.597	0.633	0.639	5.6
Bromomethane	0.601	0.596	0.548	0.469	0.483	0.518	0.536	10.4
Chloroethane	0.441	0.462	0.453	0.414	0.413	0.429	0.435	4.7
Trichlorofluoromethane	0.884	0.920	0.946	0.842	0.850	0.877	0.887	4.5
1,1,2-Trichlorotrifluoroethane	0.484	0.486	0.479	0.437	0.429	0.445	0.460	5.6
1,1-Dichloroethene	0.449	0.475	0.456	0.427	0.426	0.443	0.446	4.1
Acetone	0.128	0.117	0.094	0.084	0.085	0.089	0.100	18.7
Carbon Disulfide	1.291	1.367	1.320	1.225	1.210	1.246	1.277	4.7
Methyl tert-butyl Ether	1.006	1.075	1.075	1.020	1.091	1.165	1.072	5.3
Methyl Acetate	0.244	0.265	0.260	0.245	0.266	0.286	0.261	6
Methylene Chloride	0.625	0.634	0.576	0.458	0.463	0.473	0.538	15.4
trans-1,2-Dichloroethene	0.494	0.504	0.507	0.470	0.478	0.494	0.491	2.9
1,1-Dichloroethane	0.800	0.835	0.827	0.759	0.765	0.792	0.796	3.9
Cyclohexane	0.797	0.717	0.697	0.643	0.644	0.676	0.696	8.3
2-Butanone	0.133	0.134	0.115	0.105	0.115	0.126	0.122	9.6
Carbon Tetrachloride	0.483	0.501	0.504	0.481	0.487	0.503	0.493	2.1
cis-1,2-Dichloroethene	0.542	0.584	0.582	0.542	0.563	0.591	0.567	3.8
Bromochloromethane	0.332	0.323	0.320	0.267	0.270	0.273	0.297	10.2
Chloroform	0.886	0.912	0.901	0.835	0.842	0.874	0.875	3.5
1,1,1-Trichloroethane	0.808	0.814	0.822	0.767	0.764	0.796	0.795	3.1
Methylcyclohexane	0.491	0.486	0.537	0.527	0.554	0.583	0.530	7
Benzene	1.253	1.302	1.322	1.259	1.281	1.312	1.288	2.2
1,2-Dichloroethane	0.328	0.346	0.343	0.315	0.324	0.338	0.332	3.6
Trichloroethene	0.380	0.381	0.386	0.367	0.372	0.376	0.377	1.8
1,2-Dichloropropane	0.276	0.289	0.292	0.274	0.283	0.293	0.285	2.9
Bromodichloromethane	0.440	0.463	0.459	0.439	0.449	0.468	0.453	2.7
4-Methyl-2-Pentanone	0.141	0.159	0.161	0.159	0.180	0.196	0.166	11.6
Toluene	0.777	0.818	0.855	0.827	0.855	0.885	0.836	4.5

* Compounds with required minimum RRF and maximum %RSD values.
All other compounds must meet a minimum RRF of 0.010.
RRF of 1,4-Dioxane = Value should be divide by 1000.

Alliance TECHNICAL GROUP
284 Sheffield Street, Mountainside, New Jersey 07092, Phone : 908 789 8900,
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VOLATILE ORGANICS INITIAL CALIBRATION DATA

Lab Name: Alliance Contract: AECO02

Lab Code: ACE SDG No.: Q3424

Instrument ID: MSVOA_Y Calibration Date(s): 10/07/2025 10/07/2025

Heated Purge: (Y/N) Y Calibration Time(s): 09:17 12:32

GC Column: RXI-624 ID: 0.25 (mm)

LAB FILE ID: RRF005 = VY023384.D RRF010 = VY023385.D RRF020 = VY023386.D
RRF050 = VY023387.D RRF100 = VY023388.D RRF150 = VY023389.D

COMPOUND	RRF005	RRF010	RRF020	RRF050	RRF100	RRF150	$\overline{RRF}$	% RSD
t-1,3-Dichloropropene	0.357	0.380	0.390	0.385	0.415	0.438	0.394	7.2
cis-1,3-Dichloropropene	0.424	0.460	0.465	0.455	0.481	0.505	0.465	5.9
1,1,2-Trichloroethane	0.234	0.247	0.241	0.231	0.244	0.254	0.242	3.5
2-Hexanone	0.108	0.117	0.110	0.112	0.126	0.138	0.119	9.9
Dibromochloromethane	0.319	0.337	0.340	0.327	0.347	0.365	0.339	4.7
1,2-Dibromoethane	0.215	0.229	0.231	0.223	0.237	0.249	0.231	5.2
Tetrachloroethene	0.538	0.517	0.561	0.523	0.502	0.456	0.516	6.9
Chlorobenzene	1.086	1.095	1.092	1.053	1.083	1.116	1.087	1.9
Ethyl Benzene	1.606	1.711	1.753	1.777	1.824	1.891	1.760	5.5
m/p-Xylenes	0.632	0.675	0.715	0.719	0.734	0.763	0.706	6.5
o-Xylene	0.588	0.623	0.653	0.670	0.701	0.738	0.662	8.1
Styrene	0.902	1.026	1.098	1.109	1.166	1.233	1.089	10.5
Bromoform	0.225	0.242	0.238	0.230	0.244	0.262	0.240	5.4
Isopropylbenzene	2.967	3.153	3.353	3.317	3.425	3.555	3.295	6.3
1,1,2,2-Tetrachloroethane	0.530	0.548	0.502	0.499	0.543	0.611	0.539	7.6
1,3-Dichlorobenzene	1.667	1.698	1.718	1.657	1.701	1.794	1.706	2.9
1,4-Dichlorobenzene	1.703	1.703	1.694	1.624	1.653	1.732	1.685	2.3
1,2-Dichlorobenzene	1.485	1.498	1.511	1.446	1.490	1.543	1.496	2.1
1,2-Dibromo-3-Chloropropane	0.087	0.093	0.083	0.083	0.088	0.096	0.088	6.2
1,2,4-Trichlorobenzene	0.846	0.867	0.901	0.918	1.007	1.054	0.932	8.7
1,2,3-Trichlorobenzene	0.719	0.753	0.795	0.793	0.866	0.920	0.808	9.1
1,2-Dichloroethane-d4	0.455	0.436	0.429	0.392	0.392	0.405	0.418	6.2
Dibromofluoromethane	0.311	0.314	0.317	0.298	0.299	0.303	0.307	2.6
Toluene-d8	1.132	1.170	1.177	1.129	1.122	1.135	1.144	2
4-Bromofluorobenzene	0.401	0.370	0.373	0.365	0.372	0.386	0.378	3.5

* Compounds with required minimum RRF and maximum %RSD values.
All other compounds must meet a minimum RRF of 0.010.
RRF of 1,4-Dioxane = Value should be divide by 1000.

Response Factor Report GCVOA_Y

Method Path : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\
Method File : 82Y100725S.M
Title : SW846 8260
Last Update : Wed Oct 08 05:12:50 2025
Response Via : Initial Calibration

Calibration Files
5 =VY023384.D 10 =VY023385.D 20 =VY023386.D 50 =VY023387.D 100 =VY023388.D 150 =VY023389.D

		Compound	5	10	20	50	100	150	Avg	%RSD
1)	I	Pentafluorobenzene	----------ISTD----------							
2)	T	Dichlorodifluo...	0.397	0.399	0.400	0.321	0.310	0.333	0.360	11.97
3)	P	Chloromethane	0.518	0.557	0.512	0.449	0.438	0.467	0.490	9.45
4)	C	Vinyl Chloride	0.660	0.684	0.659	0.598	0.597	0.633	0.639	5.59#
5)	T	Bromomethane	0.601	0.596	0.548	0.469	0.483	0.518	0.536	10.42
6)	T	Chloroethane	0.441	0.462	0.453	0.414	0.413	0.429	0.435	4.67
7)	T	Trichlorofluor...	0.884	0.920	0.946	0.842	0.850	0.877	0.887	4.54
8)	T	Diethyl Ether	0.240	0.239	0.236	0.215	0.224	0.237	0.232	4.42
9)	T	1,1,2-Trichlor...	0.484	0.486	0.479	0.437	0.429	0.445	0.460	5.57
10)	T	Methyl Iodide	0.404	0.503	0.518	0.538	0.547	0.562	0.512	11.09
11)	T	Tert butyl alc...	0.033	0.037	0.030	0.025	0.029	0.033	0.031	13.08
12)	CM	1,1-Dichloroet...	0.449	0.475	0.456	0.427	0.426	0.443	0.446	4.14#
13)	T	Acrolein	0.045	0.043	0.042	0.042	0.044	0.048	0.044	5.27
14)	T	Allyl chloride	0.540	0.555	0.546	0.526	0.535	0.560	0.544	2.33
15)	T	Acrylonitrile	0.088	0.093	0.086	0.082	0.088	0.095	0.089	5.52
16)	T	Acetone	0.128	0.117	0.094	0.084	0.085	0.089	0.100	18.67
17)	T	Carbon Disulfide	1.291	1.367	1.320	1.225	1.210	1.246	1.277	4.74
18)	T	Methyl Acetate	0.244	0.265	0.260	0.245	0.266	0.286	0.261	6.00
19)	T	Methyl tert-bu...	1.006	1.075	1.075	1.020	1.091	1.165	1.072	5.30
20)	T	Methylene Chlo...	0.625	0.634	0.576	0.458	0.463	0.473	0.538	15.41
21)	T	trans-1,2-Dich...	0.494	0.504	0.507	0.470	0.478	0.494	0.491	2.95
22)	T	Diisopropyl ether	1.107	1.238	1.255	1.163	1.195	1.257	1.202	4.95
23)	T	Vinyl Acetate	0.594	0.646	0.651	0.625	0.667	0.722	0.651	6.65
24)	P	1,1-Dichloroet...	0.800	0.835	0.827	0.759	0.765	0.792	0.796	3.90
25)	T	2-Butanone	0.133	0.134	0.115	0.105	0.115	0.126	0.122	9.56
26)	T	2,2-Dichloropr...	0.752	0.771	0.731	0.705	0.699	0.726	0.731	3.74
27)	T	cis-1,2-Dichlo...	0.542	0.584	0.582	0.542	0.563	0.591	0.567	3.81
28)	T	Bromochloromet...	0.332	0.323	0.320	0.267	0.270	0.273	0.297	10.22
29)	T	Tetrahydrofuran	0.066	0.070	0.067	0.064	0.070	0.078	0.069	7.25
30)	C	Chloroform	0.886	0.912	0.901	0.835	0.842	0.874	0.875	3.54#
31)	T	Cyclohexane	0.797	0.717	0.697	0.643	0.644	0.676	0.696	8.27
32)	T	1,1,1-Trichlor...	0.808	0.814	0.822	0.767	0.764	0.796	0.795	3.08
33)	S	1,2-Dichloroet...	0.455	0.436	0.429	0.392	0.392	0.405	0.418	6.21
34)	I	1,4-Difluorobenzene	----------ISTD----------							
35)	S	Dibromofluorom...	0.311	0.314	0.317	0.298	0.299	0.303	0.307	2.62
36)	T	1,1-Dichloropr...	0.395	0.413	0.413	0.397	0.405	0.417	0.407	2.20
37)	T	Ethyl Acetate	0.148	0.162	0.163	0.150	0.164	0.179	0.161	6.94
38)	T	Carbon Tetrach...	0.483	0.501	0.504	0.481	0.487	0.503	0.493	2.14
39)	T	Methylcyclohexane	0.491	0.486	0.537	0.527	0.554	0.583	0.530	7.03
40)	TM	Benzene	1.253	1.302	1.322	1.259	1.281	1.312	1.288	2.22
41)	T	Methacrylonitrile	0.082	0.085	0.091	0.080	0.089	0.096	0.087	7.09
42)	TM	1,2-Dichloroet...	0.328	0.346	0.343	0.315	0.324	0.338	0.332	3.59
43)	T	Isopropyl Acetate	0.297	0.313	0.313	0.302	0.335	0.369	0.321	8.32
44)	TM	Trichloroethene	0.380	0.381	0.386	0.367	0.372	0.376	0.377	1.81
45)	C	1,2-Dichloropr...	0.276	0.289	0.292	0.274	0.283	0.293	0.285	2.89#
46)	T	Dibromomethane	0.172	0.182	0.183	0.173	0.181	0.188	0.180	3.43
47)	T	Bromodichlorom...	0.440	0.463	0.459	0.439	0.449	0.468	0.453	2.70
48)	T	Methyl methacr...	0.125	0.139	0.149	0.148	0.165	0.181	0.151	12.98
49)	T	1,4-Dioxane	0.002	0.002	0.002	0.002	0.002	0.002	0.002	10.06
50)	S	Toluene-d8	1.132	1.170	1.177	1.129	1.122	1.135	1.144	2.03
51)	T	4-Methyl-2-Pen...	0.141	0.159	0.161	0.159	0.180	0.196	0.166	11.55
52)	CM	Toluene	0.777	0.818	0.855	0.827	0.855	0.885	0.836	4.49#
53)	T	t-1,3-Dichloro...	0.357	0.380	0.390	0.385	0.415	0.438	0.394	7.24
54)	T	cis-1,3-Dichlo...	0.424	0.460	0.465	0.455	0.481	0.505	0.465	5.86
55)	T	1,1,2-Trichlor...	0.234	0.247	0.241	0.231	0.244	0.254	0.242	3.52
56)	T	Ethyl methacry...	0.219	0.248	0.262	0.279	0.321	0.345	0.279	16.80

Method Path : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\
Method File : 82Y100725S.M

57)	T	1,3-Dichloropr...	0.361	0.381	0.383	0.374	0.392	0.409	0.383	4.26
58)	T	2-Chloroethyl ...	0.093	0.112	0.112	0.129	0.145	0.159	0.125	19.35
59)	T	2-Hexanone	0.108	0.117	0.110	0.112	0.126	0.138	0.119	9.86
60)	T	Dibromochlorom...	0.319	0.337	0.340	0.327	0.347	0.365	0.339	4.69
61)	T	1,2-Dibromoethane	0.215	0.229	0.231	0.223	0.237	0.249	0.231	5.16
62)	S	4-Bromofluorob...	0.401	0.370	0.373	0.365	0.372	0.386	0.378	3.51
63)	I	Chlorobenzene-d5	----------ISTD----------							
64)	T	Tetrachloroethene	0.538	0.517	0.561	0.523	0.502	0.456	0.516	6.92
65)	PM	Chlorobenzene	1.086	1.095	1.092	1.053	1.083	1.116	1.087	1.89
66)	T	1,1,1,2-Tetrac...	0.388	0.389	0.390	0.373	0.384	0.402	0.388	2.44
67)	C	Ethyl Benzene	1.606	1.711	1.753	1.777	1.824	1.891	1.760	5.54#
68)	T	m/p-Xylenes	0.632	0.675	0.715	0.719	0.734	0.763	0.706	6.54
69)	T	o-Xylene	0.588	0.623	0.653	0.670	0.701	0.738	0.662	8.15
70)	T	Styrene	0.902	1.026	1.098	1.109	1.166	1.233	1.089	10.55
71)	P	Bromoform	0.225	0.242	0.238	0.230	0.244	0.262	0.240	5.41
72)	I	1,4-Dichlorobenzen...	----------ISTD----------							
73)	T	Isopropylbenzene	2.967	3.153	3.353	3.317	3.425	3.555	3.295	6.30
74)	T	N-amyl acetate	0.477	0.535	0.556	0.581	0.665	0.738	0.592	15.95
75)	P	1,1,2,2-Tetrac...	0.530	0.548	0.502	0.499	0.543	0.611	0.539	7.60
76)	T	1,2,3-Trichlor...	0.406	0.399	0.484	0.433	0.455	0.469	0.441	7.76
77)	T	Bromobenzene	0.849	0.880	0.885	0.845	0.877	0.921	0.876	3.14
78)	T	n-propylbenzene	3.373	3.676	3.906	3.883	3.955	4.086	3.813	6.64
79)	T	2-Chlorotoluene	2.095	2.208	2.282	2.227	2.249	2.338	2.233	3.66
80)	T	1,3,5-Trimethy...	2.309	2.557	2.736	2.706	2.772	2.896	2.663	7.70
81)	T	trans-1,4-Dich...	0.171	0.175	0.176	0.169	0.185	0.203	0.180	7.04
82)	T	4-Chlorotoluene	2.173	2.266	2.362	2.276	2.316	2.404	2.300	3.52
83)	T	tert-Butylbenzene	2.199	2.363	2.465	2.522	2.533	2.668	2.458	6.55
84)	T	1,2,4-Trimethy...	2.301	2.552	2.701	2.706	2.782	2.903	2.657	7.86
85)	T	sec-Butylbenzene	3.175	3.388	3.571	3.583	3.664	3.778	3.527	6.08
86)	T	p-Isopropyltol...	2.575	2.804	3.032	3.087	3.183	3.334	3.003	9.09
87)	T	1,3-Dichlorobe...	1.667	1.698	1.718	1.657	1.701	1.794	1.706	2.85
88)	T	1,4-Dichlorobe...	1.703	1.703	1.694	1.624	1.653	1.732	1.685	2.33
89)	T	n-Butylbenzene	2.279	2.428	2.626	2.682	2.778	2.904	2.616	8.76
90)	T	Hexachloroethane	0.667	0.631	0.647	0.625	0.643	0.662	0.646	2.54
91)	T	1,2-Dichlorobe...	1.485	1.498	1.511	1.446	1.490	1.543	1.496	2.13
92)	T	1,2-Dibromo-3-...	0.087	0.093	0.083	0.083	0.088	0.096	0.088	6.18
93)	T	1,2,4-Trichlor...	0.846	0.867	0.901	0.918	1.007	1.054	0.932	8.75
94)	T	Hexachlorobuta...	0.590	0.571	0.572	0.577	0.587	0.590	0.581	1.52
95)	T	Naphthalene	1.206	1.281	1.346	1.466	1.722	1.887	1.485	17.98
96)	T	1,2,3-Trichlor...	0.719	0.753	0.795	0.793	0.866	0.920	0.808	9.14

(#) = Out of Range

Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY100725\
Data File : VY023384.D
Acq On : 07 Oct 2025 09:17
Operator : SY/MD
Sample : VSTDICC005
Misc : 5.00g/5.0mL/MSVOA_Y/SOIL
ALS Vial : 2 Sample Multiplier: 1

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC005

Manual Integrations APPROVED
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

Quant Time: Oct 08 04:39:47 2025
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260
QLast Update : Wed Oct 08 04:39:16 2025
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units		Dev(Min)
Internal Standards							
1) Pentafluorobenzene	7.707	168	585717	50.000	ug/l		0.00
34) 1,4-Difluorobenzene	8.615	114	882488	50.000	ug/l		0.00
63) Chlorobenzene-d5	11.414	117	753398	50.000	ug/l		0.00
72) 1,4-Dichlorobenzene-d4	13.346	152	378104	50.000	ug/l		0.00
System Monitoring Compounds							
33) 1,2-Dichloroethane-d4	8.061	65	26670	5.258	ug/l		0.00
Spiked Amount 50.000	Range 50 - 163		Recovery = 10.520%#				
35) Dibromofluoromethane	7.634	113	27455	5.126	ug/l		0.00
Spiked Amount 50.000	Range 54 - 147		Recovery = 10.260%#				
50) Toluene-d8	10.103	98	99905	4.946	ug/l		0.00
Spiked Amount 50.000	Range 58 - 134		Recovery = 9.900%#				
62) 4-Bromofluorobenzene	12.401	95	35355	5.548	ug/l		0.00
Spiked Amount 50.000	Range 30 - 143		Recovery = 11.100%#				
Target Compounds							Qvalue
2) Dichlorodifluoromethane	1.867	85	23245	5.038	ug/l		92
3) Chloromethane	2.074	50	30346	4.627	ug/l		94
4) Vinyl Chloride	2.202	62	38657	4.668	ug/l		95
5) Bromomethane	2.598	94	35214	5.184	ug/l		94
6) Chloroethane	2.732	64	25848	4.597	ug/l		98
7) Trichlorofluoromethane	3.055	101	51797	4.869	ug/l		98
8) Diethyl Ether	3.452	74	14079	5.060	ug/l		96
9) 1,1,2-Trichlorotrifluo...	3.818	101	28368	4.989	ug/l		99
10) Methyl Iodide	4.007	142	23692	3.606	ug/l		99
11) Tert butyl alcohol	4.854	59	9774	32.746	ug/l	#	80
12) 1,1-Dichloroethene	3.787	96	26290	4.806	ug/l		94
13) Acrolein	3.653	56	13176	26.054	ug/l		100
14) Allyl chloride	4.385	41	31614	4.616	ug/l		98
15) Acrylonitrile	5.055	53	25891	23.754	ug/l		99
16) Acetone	3.866	43	37573	32.940	ug/l		96
17) Carbon Disulfide	4.104	76	75645	4.432	ug/l		99
18) Methyl Acetate	4.391	43	14279	4.926	ug/l		98
19) Methyl tert-butyl Ether	5.116	73	58919	4.600	ug/l		95
20) Methylene Chloride	4.616	84	36598	5.917	ug/l		100
21) trans-1,2-Dichloroethene	5.110	96	28923	4.754	ug/l		99
22) Diisopropyl ether	6.018	45	64833	4.269	ug/l		94
23) Vinyl Acetate	5.964	43	173851	20.824	ug/l		99
24) 1,1-Dichloroethane	5.909	63	46850	4.679	ug/l		100
25) 2-Butanone	6.890	43	38990	27.656	ug/l		93
26) 2,2-Dichloropropane	6.884	77	44062	4.953	ug/l		98
27) cis-1,2-Dichloroethene	6.884	96	31743	4.600	ug/l		98
28) Bromochloromethane	7.244	49	19445	5.006	ug/l		99
29) Tetrahydrofuran	7.262	42	19296	23.059	ug/l		98
30) Chloroform	7.421	83	51887	4.806	ug/l		97
31) Cyclohexane	7.707	56	46675	5.279	ug/l	#	79
32) 1,1,1-Trichloroethane	7.616	97	47305	4.881	ug/l		99
36) 1,1-Dichloropropene	7.835	75	34888	4.617	ug/l		98
37) Ethyl Acetate	6.982	43	13082	4.379	ug/l	#	93
38) Carbon Tetrachloride	7.817	117	42654	4.859	ug/l		95
39) Methylcyclohexane	9.109	83	43329	4.479	ug/l		98
40) Benzene	8.079	78	110551	4.693	ug/l		100

Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY100725\
Data File : VY023384.D
Acq On : 07 Oct 2025 09:17
Operator : SY/MD
Sample : VSTDICC005
Misc : 5.00g/5.0mL/MSVOA_Y/SOIL
ALS Vial : 2 Sample Multiplier: 1

Quant Time: Oct 08 04:39:47 2025
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260
QLast Update : Wed Oct 08 04:39:16 2025
Response via : Initial Calibration

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC005

Manual Integrations APPROVED

Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

Compound	R.T.	QIon	Response	Conc	Units		Dev(Min)
41) Methacrylonitrile	7.225	41	7226m	4.658	ug/l		
42) 1,2-Dichloroethane	8.158	62	28940	4.828	ug/l		100
43) Isopropyl Acetate	8.201	43	26166	4.503	ug/l		99
44) Trichloroethene	8.859	130	33564	5.077	ug/l		99
45) 1,2-Dichloropropane	9.140	63	24358	4.595	ug/l		92
46) Dibromomethane	9.231	93	15179	4.682	ug/l		97
47) Bromodichloromethane	9.420	83	38813	4.756	ug/l		93
48) Methyl methacrylate	9.219	41	11038	4.071	ug/l		98
49) 1,4-Dioxane	9.219	88	3255	96.953	ug/l	#	86
51) 4-Methyl-2-Pentanone	9.999	43	62279	20.925	ug/l		98
52) Toluene	10.170	92	68550	4.585	ug/l		99
53) t-1,3-Dichloropropene	10.396	75	31477	4.491	ug/l		99
54) cis-1,3-Dichloropropene	9.853	75	37392	4.463	ug/l		96
55) 1,1,2-Trichloroethane	10.572	97	20641	4.786	ug/l		97
56) Ethyl methacrylate	10.438	69	19324	3.891	ug/l		94
57) 1,3-Dichloropropane	10.719	76	31831	4.560	ug/l		96
58) 2-Chloroethyl Vinyl ether	9.713	63	41054m	18.894	ug/l		
59) 2-Hexanone	10.761	43	47778	23.185	ug/l		97
60) Dibromochloromethane	10.908	129	28135	4.783	ug/l		97
61) 1,2-Dibromoethane	11.017	107	18957	4.673	ug/l		97
64) Tetrachloroethene	10.646	164	40570	5.383	ug/l		98
65) Chlorobenzene	11.444	112	81802	4.997	ug/l		98
66) 1,1,1,2-Tetrachloroethane	11.517	131	29222	5.075	ug/l		97
67) Ethyl Benzene	11.517	91	121005	4.529	ug/l		99
68) m/p-Xylenes	11.633	106	95176	8.887	ug/l		100
69) o-Xylene	11.956	106	44280	4.466	ug/l		98
70) Styrene	11.969	104	67960	4.152	ug/l		99
71) Bromoform	12.133	173	16988	4.929	ug/l	#	99
73) Isopropylbenzene	12.255	105	112194	4.455	ug/l		99
74) N-amyl acetate	12.066	43	18041	3.833	ug/l	#	96
75) 1,1,2,2-Tetrachloroethane	12.505	83	20052	4.773	ug/l		100
76) 1,2,3-Trichloropropane	12.554	75	15359m	4.118	ug/l		
77) Bromobenzene	12.529	156	32106	4.967	ug/l		99
78) n-propylbenzene	12.596	91	127521	4.305	ug/l		99
79) 2-Chlorotoluene	12.676	91	79199	4.631	ug/l		99
80) 1,3,5-Trimethylbenzene	12.737	105	87297	4.264	ug/l		100
81) trans-1,4-Dichloro-2-b...	12.304	75	6474	4.680	ug/l		98
82) 4-Chlorotoluene	12.779	91	82155	4.600	ug/l		100
83) tert-Butylbenzene	12.999	119	83151	4.457	ug/l		100
84) 1,2,4-Trimethylbenzene	13.042	105	86988	4.294	ug/l		99
85) sec-Butylbenzene	13.176	105	120061	4.443	ug/l		99
86) p-Isopropyltoluene	13.291	119	97377	4.264	ug/l		99
87) 1,3-Dichlorobenzene	13.285	146	63027	4.936	ug/l		100
88) 1,4-Dichlorobenzene	13.365	146	64389	5.085	ug/l		95
89) n-Butylbenzene	13.615	91	86179	4.274	ug/l		99
90) Hexachloroethane	13.877	117	25204	5.084	ug/l		97
91) 1,2-Dichlorobenzene	13.657	146	56167	5.041	ug/l		99
92) 1,2-Dibromo-3-Chloropr...	14.273	75	3305	4.964	ug/l		95
93) 1,2,4-Trichlorobenzene	14.919	180	32000	4.875	ug/l		99
94) Hexachlorobutadiene	15.023	225	22316	5.456	ug/l		99
95) Naphthalene	15.145	128	45598	4.360	ug/l		99
96) 1,2,3-Trichlorobenzene	15.328	180	27176	4.772	ug/l		99

ICAL Form

Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY100725\
Data File : VY023384.D
Acq On : 07 Oct 2025 09:17
Operator : SY/MD
Sample : VSTDICC005
Misc : 5.00g/5.0mL/MSVOA_Y/SOIL
ALS Vial : 2 Sample Multiplier: 1

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC005

Manual Integrations APPROVED

Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

Quant Time: Oct 08 04:39:47 2025
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260
QLast Update : Wed Oct 08 04:39:16 2025
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)

(#) = qualifier out of range (m) = manual integration (+) = signals summed

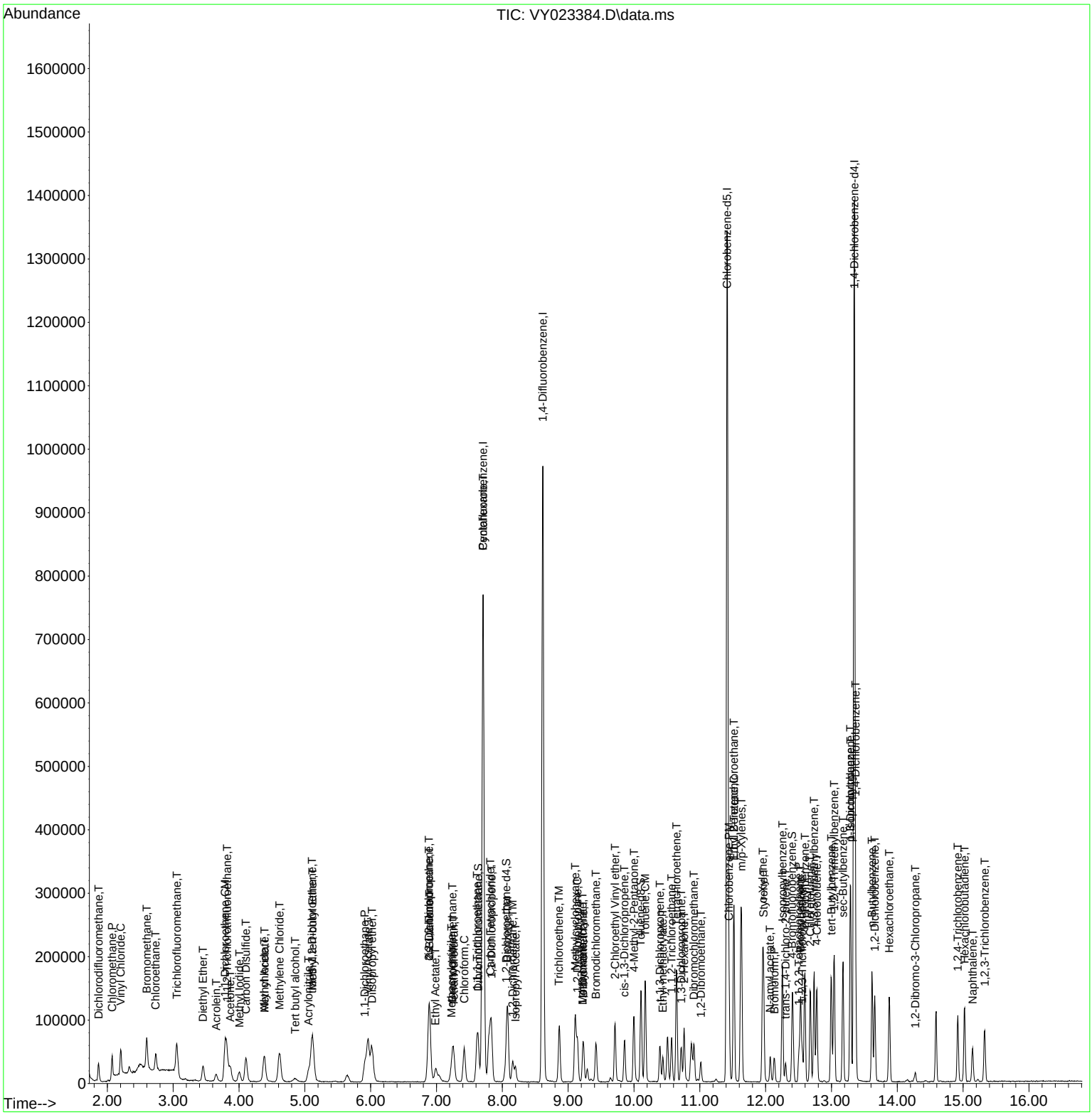
Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY100725\
Data File : VY023384.D
Acq On : 07 Oct 2025 09:17
Operator : SY/MD
Sample : VSTDICC005
Misc : 5.00g/5.0mL/MSVOA_Y/SOIL
ALS Vial : 2 Sample Multiplier: 1

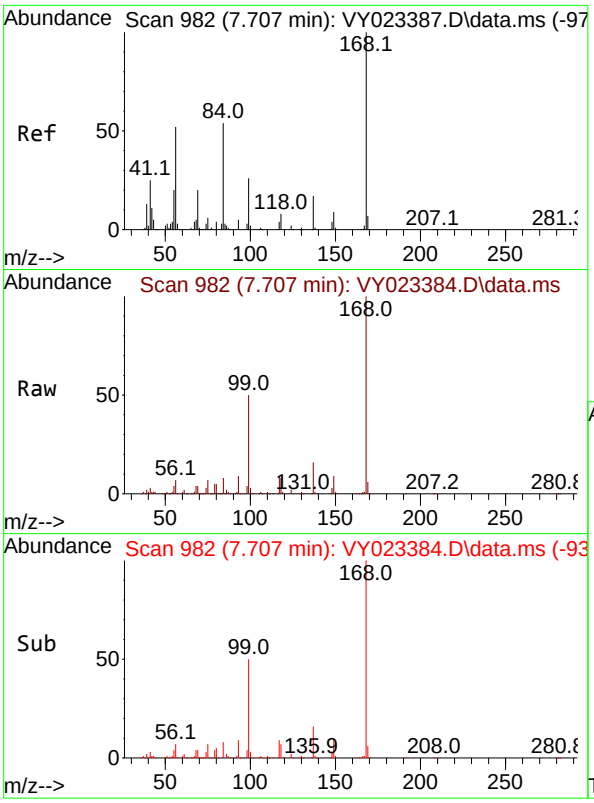
Quant Time: Oct 08 04:39:47 2025
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260
QLast Update : Wed Oct 08 04:39:16 2025
Response via : Initial Calibration

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC005

Manual Integrations APPROVED

Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

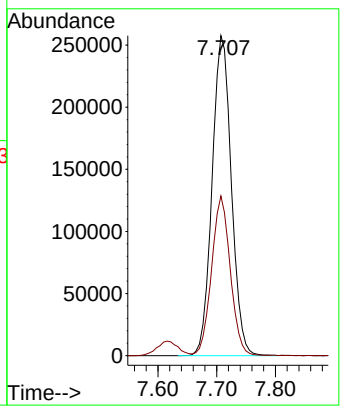




#1
Pentafluorobenzene
Concen: 50.000 ug/l
RT: 7.707 min Scan# 9
Delta R.T. 0.000 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion:168 Resp: 58571

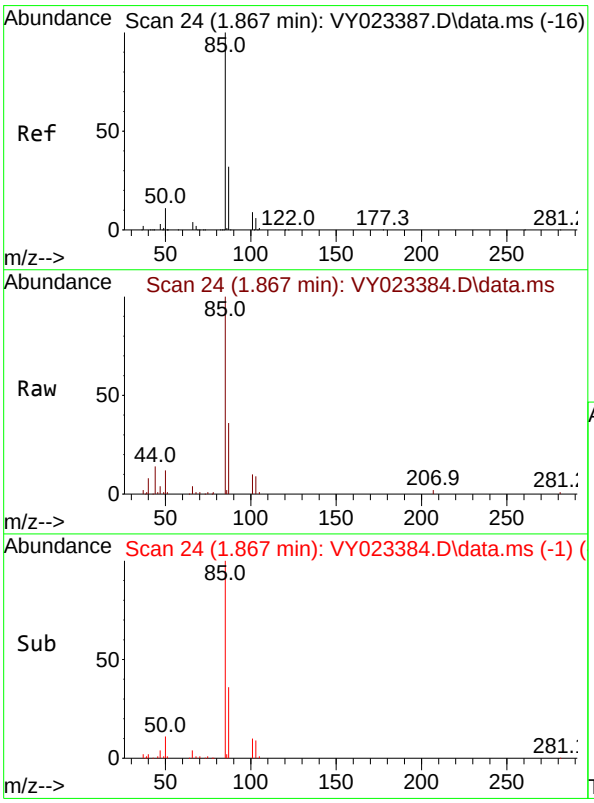
Ion	Ratio	Lower	Upper
168	100		
99	49.8	39.7	59.5



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC005

Manual Integrations
APPROVED

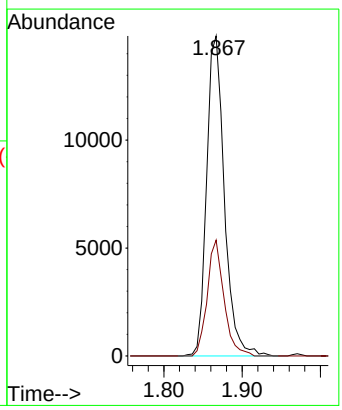
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

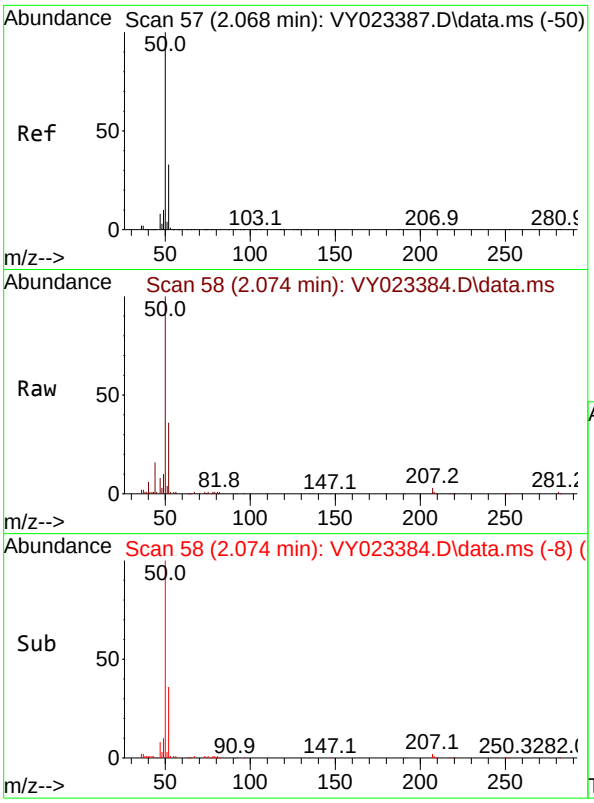


#2
Dichlorodifluoromethane
Concen: 5.038 ug/l
RT: 1.867 min Scan# 24
Delta R.T. -0.000 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion: 85 Resp: 23245

Ion	Ratio	Lower	Upper
85	100		
87	36.2	16.0	47.9

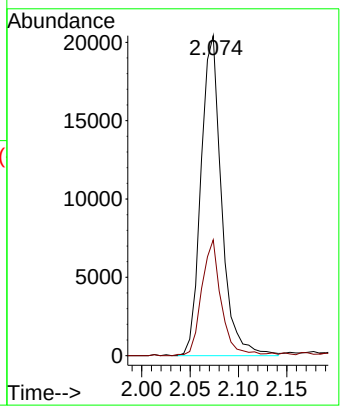




#3
Chloromethane
Concen: 4.627 ug/l
RT: 2.074 min Scan# 5
Delta R.T. 0.006 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion: 50 Resp: 3034

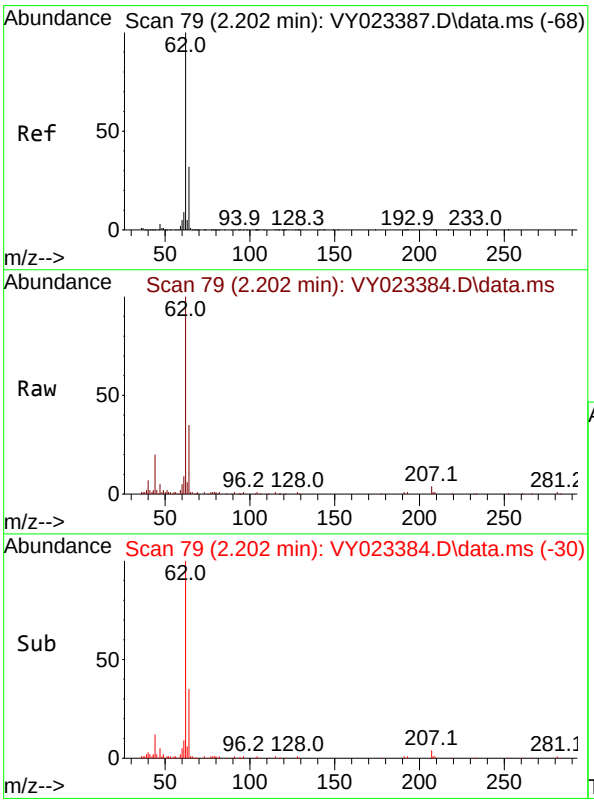
Ion	Ratio	Lower	Upper
50	100		
52	35.8	26.2	39.2



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC005

Manual Integrations
APPROVED

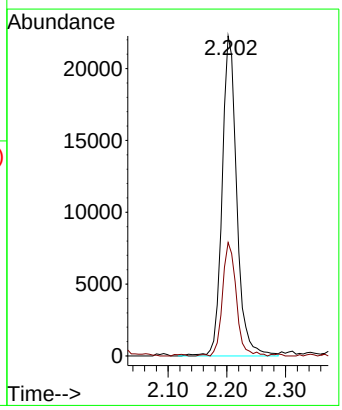
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

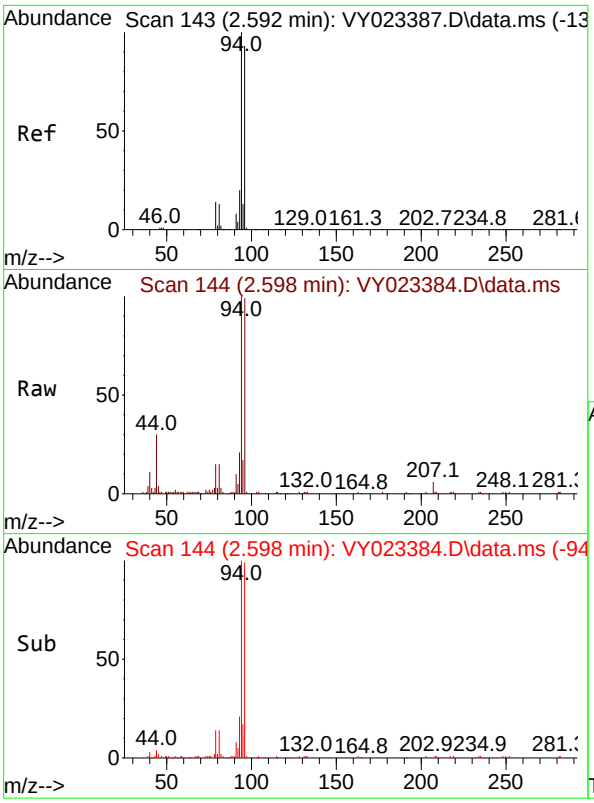


#4
Vinyl Chloride
Concen: 4.668 ug/l
RT: 2.202 min Scan# 79
Delta R.T. -0.000 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion: 62 Resp: 38657

Ion	Ratio	Lower	Upper
62	100		
64	35.0	25.8	38.8

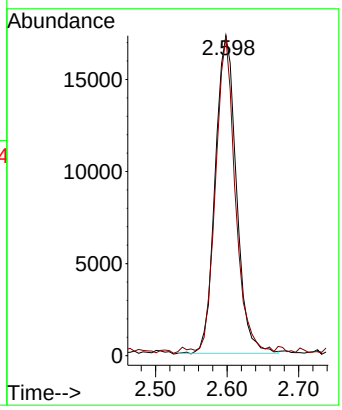




#5
Bromomethane
Concen: 5.184 ug/l
RT: 2.598 min Scan# 14
Delta R.T. 0.006 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion: 94 Resp: 3521

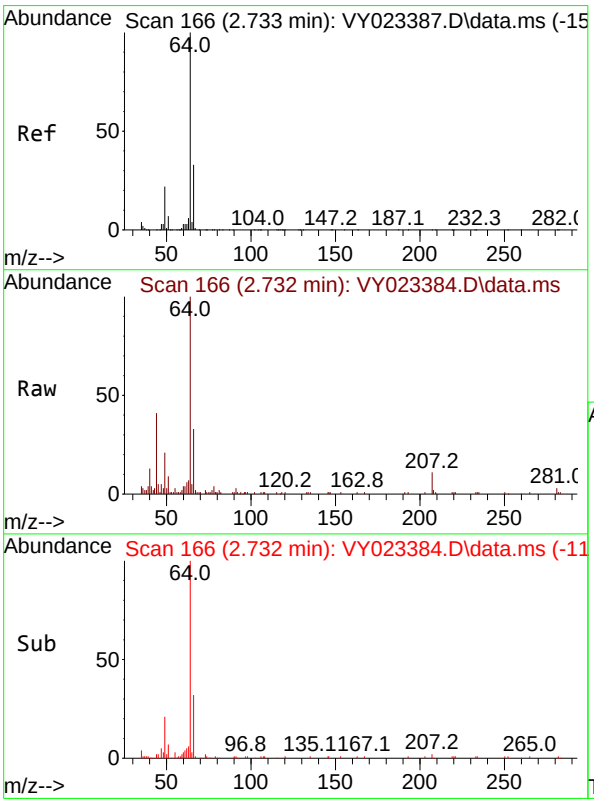
Ion	Ratio	Lower	Upper
94	100		
96	99.0	74.5	111.7



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC005

Manual Integrations
APPROVED

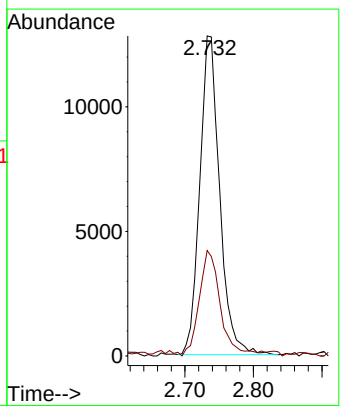
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

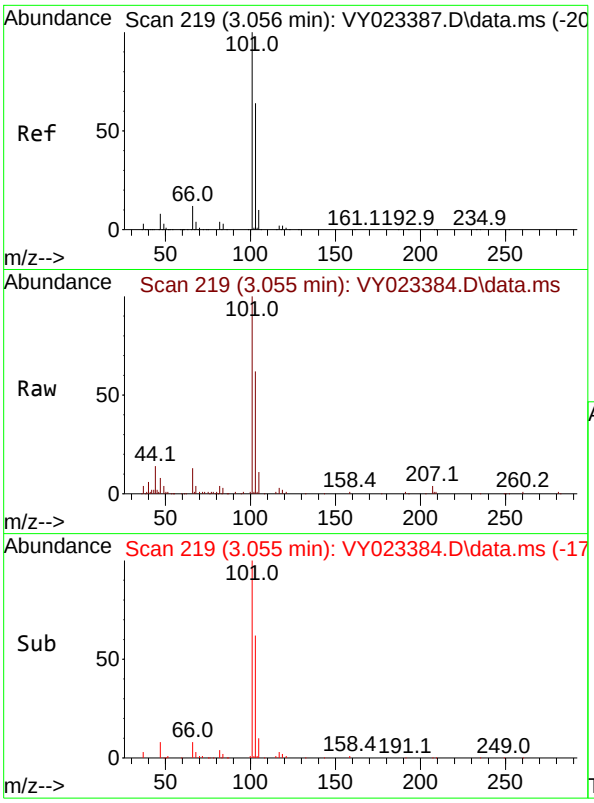


#6
Chloroethane
Concen: 4.597 ug/l
RT: 2.732 min Scan# 166
Delta R.T. -0.000 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion: 64 Resp: 25848

Ion	Ratio	Lower	Upper
64	100		
66	31.9	26.2	39.4

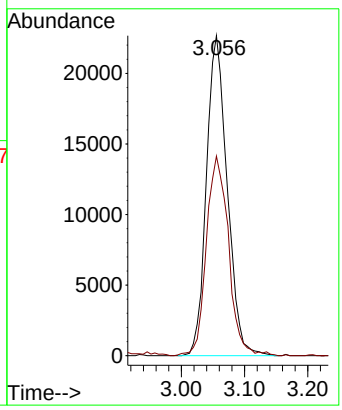




#7
Trichlorofluoromethane
Concen: 4.869 ug/l
RT: 3.055 min Scan# 21
Delta R.T. -0.000 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion:101 Resp: 5179

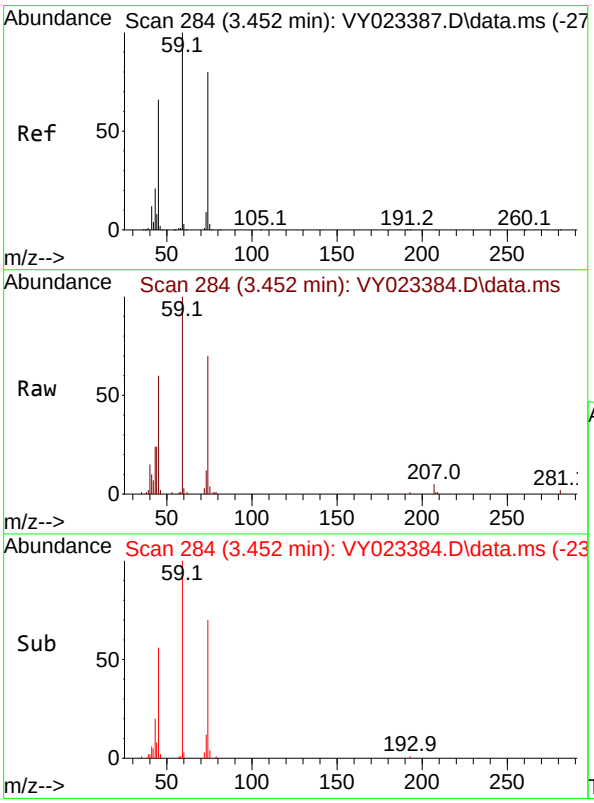
Ion	Ratio	Lower	Upper
101	100		
103	62.4	51.3	76.9



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC005

Manual Integrations
APPROVED

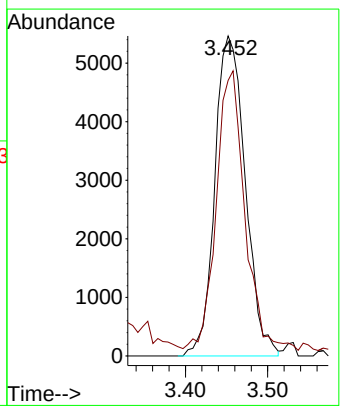
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

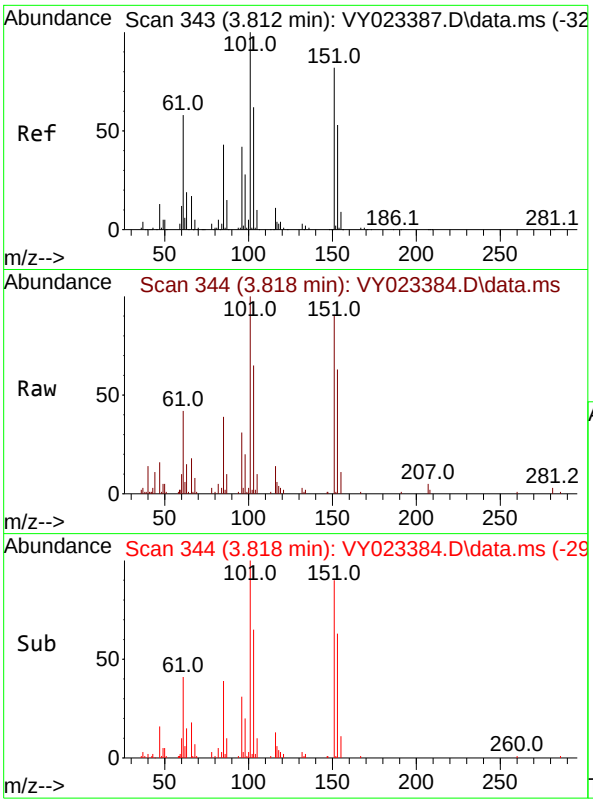


#8
Diethyl Ether
Concen: 5.060 ug/l
RT: 3.452 min Scan# 284
Delta R.T. -0.000 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion: 74 Resp: 14079

Ion	Ratio	Lower	Upper
74	100		
45	82.9	39.9	119.7





#9
1,1,2-Trichlorotrifluoroethane
Concen: 4.989 ug/l
RT: 3.818 min Scan# 34
Delta R.T. 0.006 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

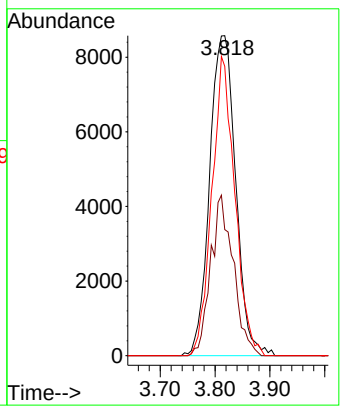
Tgt Ion:101 Resp: 2836

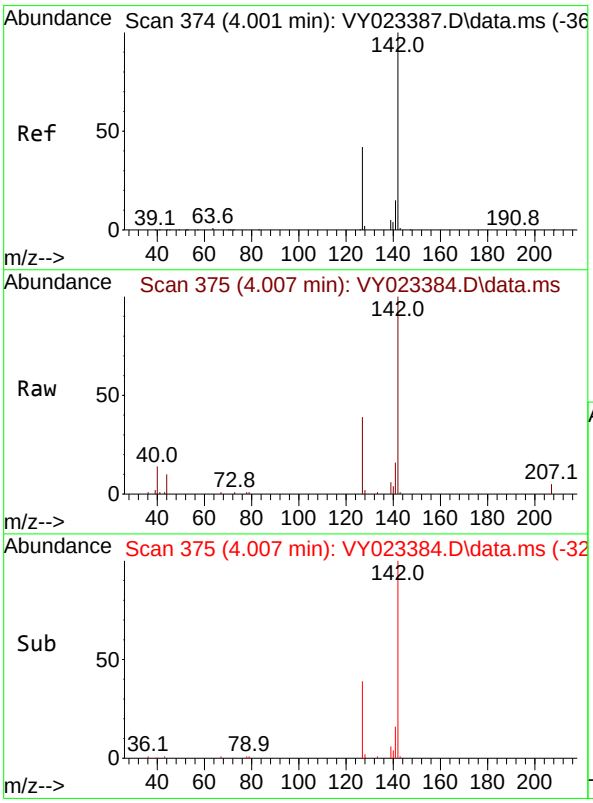
Ion	Ratio	Lower	Upper
101	100		
85	43.5	34.6	51.8
151	82.3	67.0	100.6

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC005

Manual Integrations
APPROVED

Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

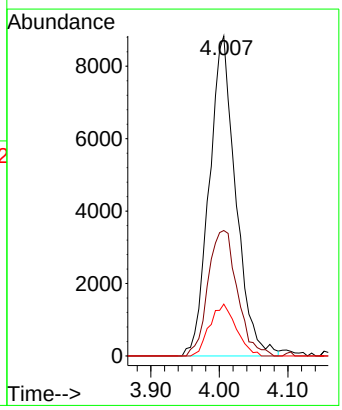


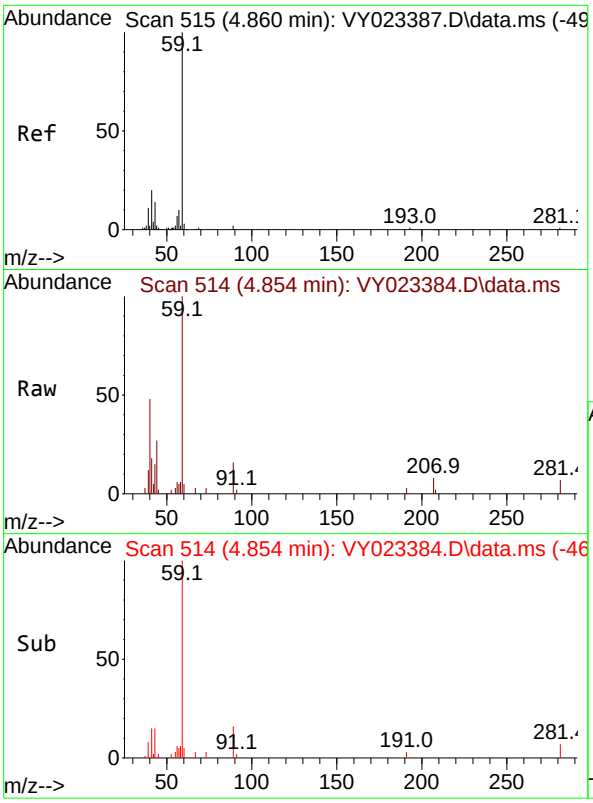


#10
Methyl Iodide
Concen: 3.606 ug/l
RT: 4.007 min Scan# 375
Delta R.T. 0.006 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion:142 Resp: 23692

Ion	Ratio	Lower	Upper
142	100		
127	43.3	34.8	52.2
141	16.2	11.6	17.4

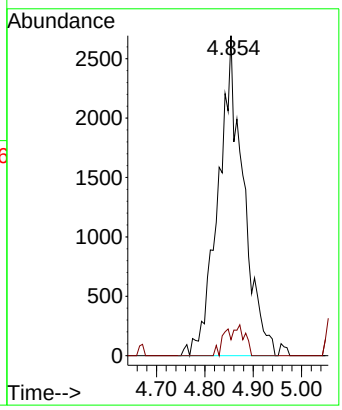




#11
Tert butyl alcohol
Concen: 32.746 ug/l
RT: 4.854 min Scan# 5
Delta R.T. -0.006 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion: 59 Resp: 977

Ion	Ratio	Lower	Upper
59	100		
57	3.0	8.3	12.5#



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC005

Manual Integrations
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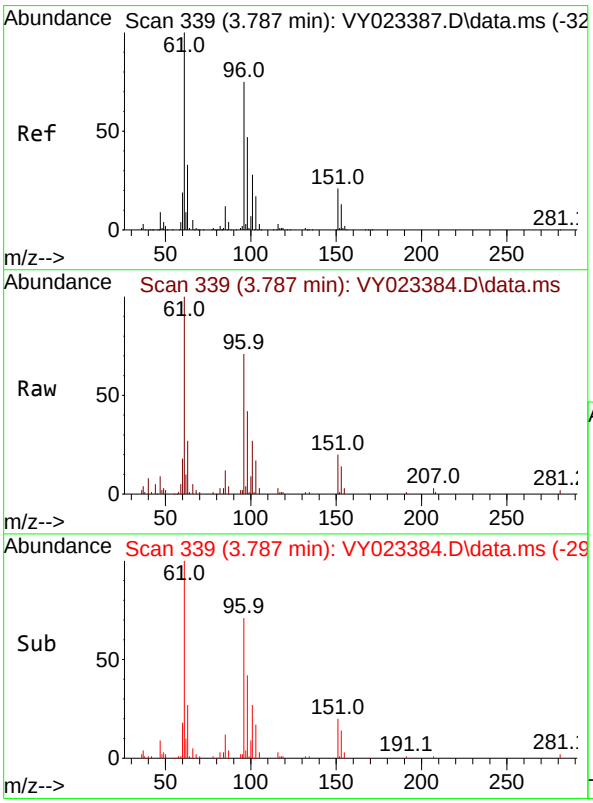
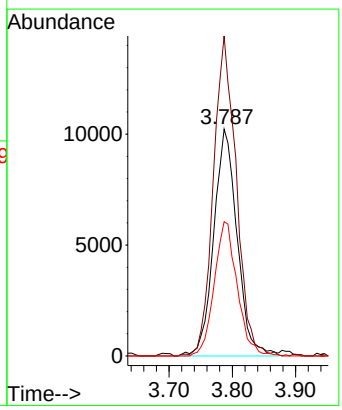
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

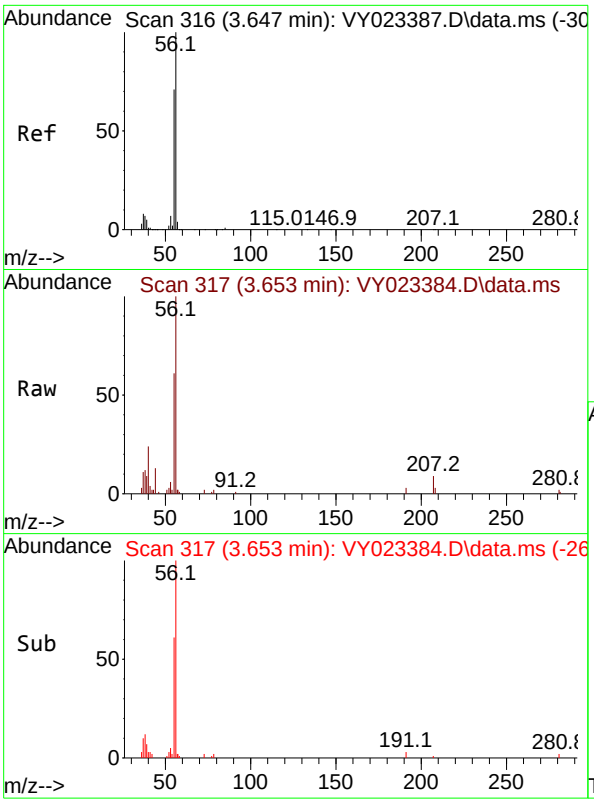


#12
1,1-Dichloroethene
Concen: 4.806 ug/l
RT: 3.787 min Scan# 339
Delta R.T. -0.000 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion: 96 Resp: 26290

Ion	Ratio	Lower	Upper
96	100		
61	141.0	106.7	160.1
98	59.1	50.2	75.4

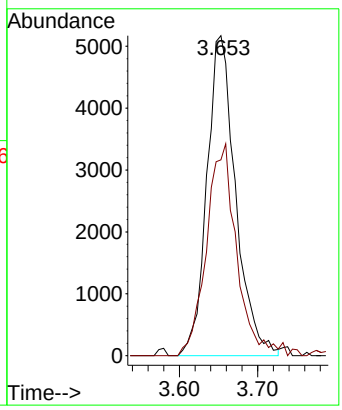




#13
Acrolein
Concen: 26.054 ug/l
RT: 3.653 min Scan# 3
Delta R.T. 0.006 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion: 56 Resp: 1317

Ion	Ratio	Lower	Upper
56	100		
55	70.1	56.1	84.1



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC005

Manual Integrations
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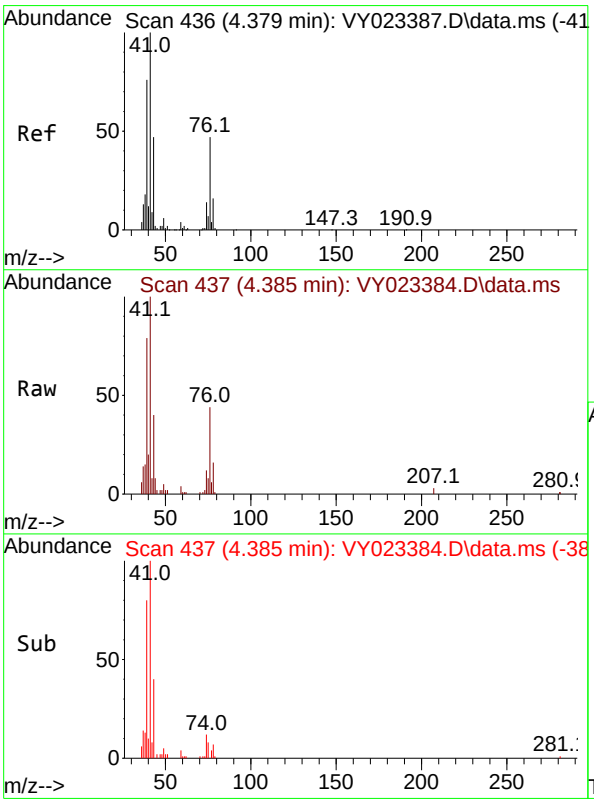
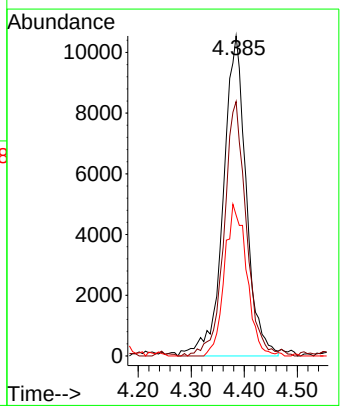
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

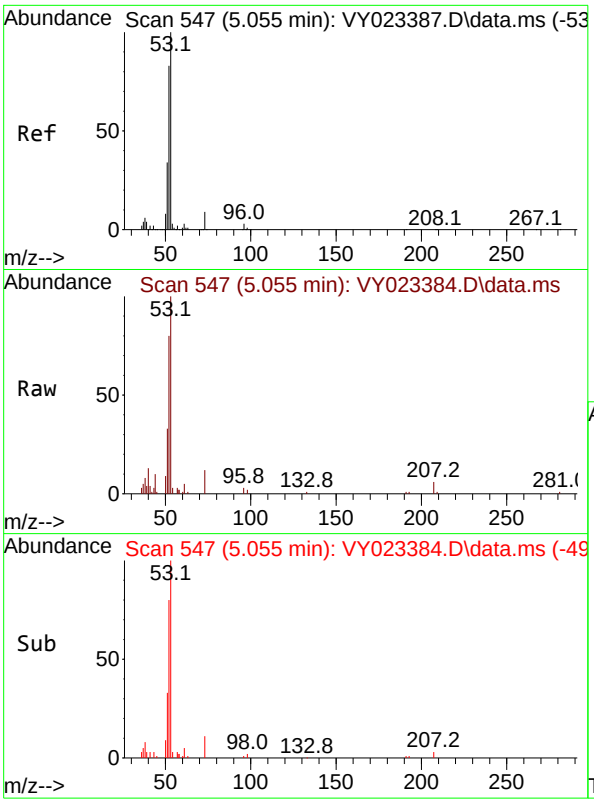


#14
Allyl chloride
Concen: 4.616 ug/l
RT: 4.385 min Scan# 437
Delta R.T. 0.006 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion: 41 Resp: 31614

Ion	Ratio	Lower	Upper
41	100		
39	76.6	59.9	89.9
76	46.2	38.0	57.0

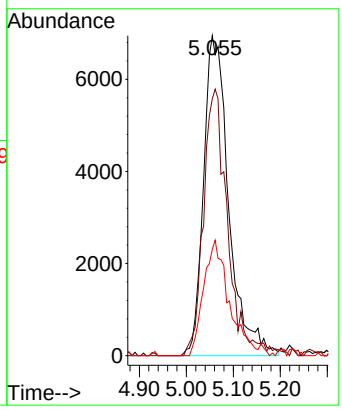




#15
Acrylonitrile
Concen: 23.754 ug/l
RT: 5.055 min Scan# 54
Delta R.T. -0.000 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion: 53 Resp: 2589

Ion	Ratio	Lower	Upper
53	100		
52	79.7	64.6	97.0
51	36.3	29.5	44.3



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC005

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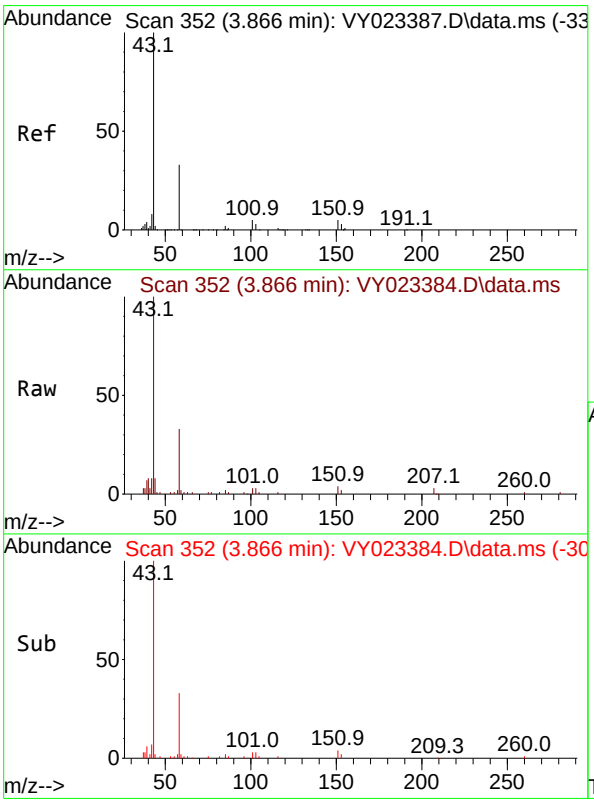
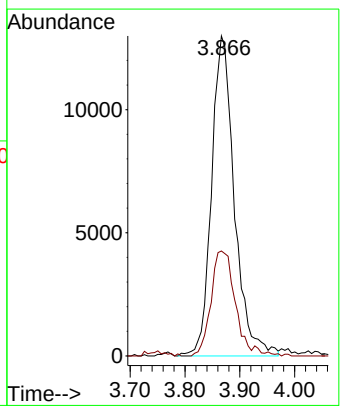
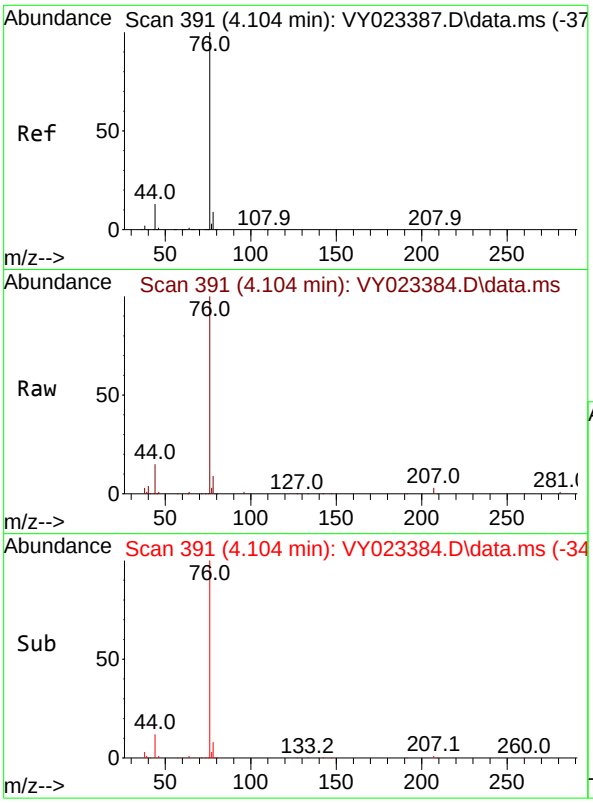


#16
Acetone
Concen: 32.940 ug/l
RT: 3.866 min Scan# 352
Delta R.T. -0.000 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion: 43 Resp: 37573

Ion	Ratio	Lower	Upper
43	100		
58	32.1	27.7	41.5

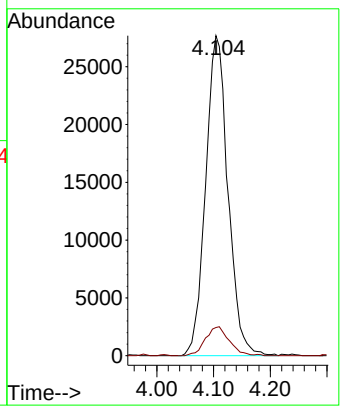




#17
Carbon Disulfide
Concen: 4.432 ug/l
RT: 4.104 min Scan# 3
Delta R.T. -0.000 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion: 76 Resp: 7564

Ion	Ratio	Lower	Upper
76	100		
78	8.8	7.3	10.9



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC005

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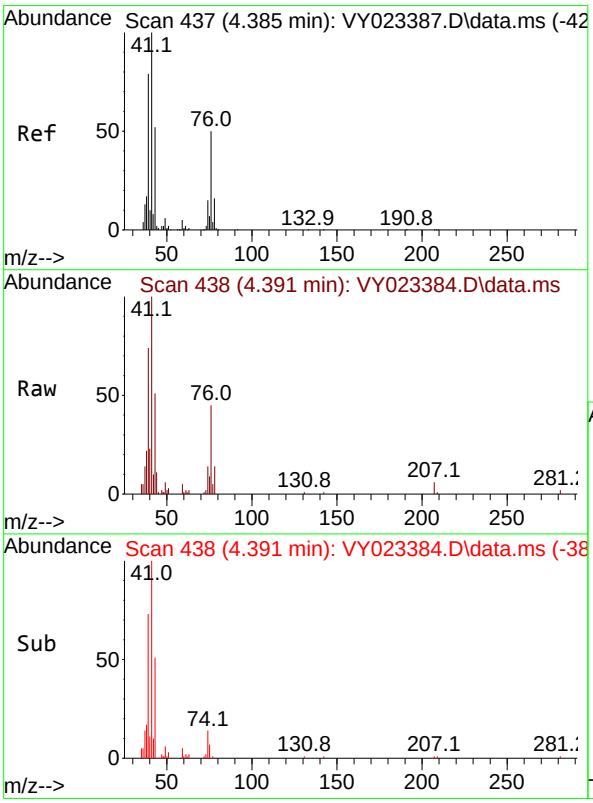
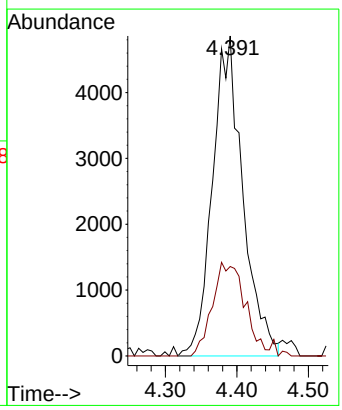
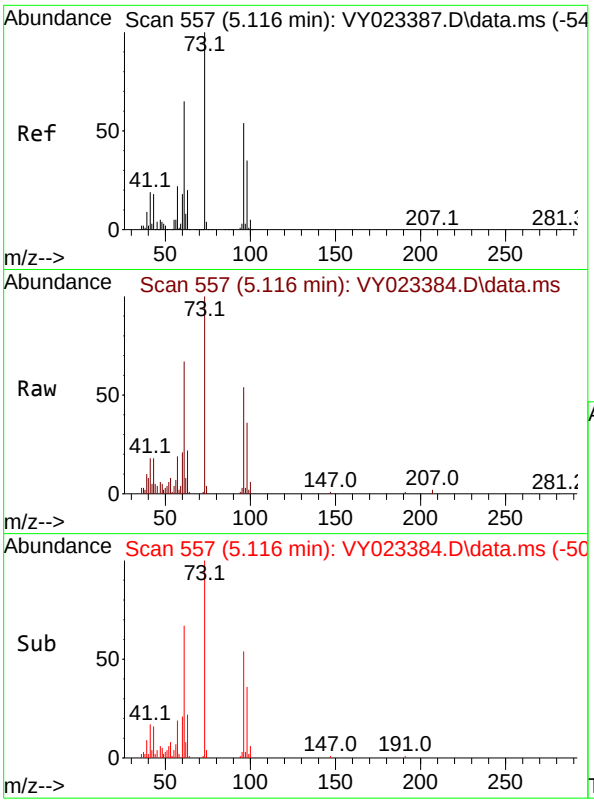


#18
Methyl Acetate
Concen: 4.926 ug/l
RT: 4.391 min Scan# 438
Delta R.T. 0.006 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion: 43 Resp: 14279

Ion	Ratio	Lower	Upper
43	100		
74	31.4	24.2	36.4

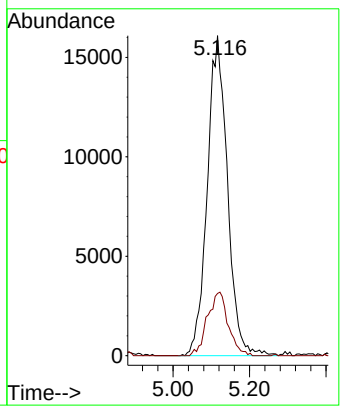




#19
Methyl tert-butyl Ether
Concen: 4.600 ug/l
RT: 5.116 min Scan# 5
Delta R.T. -0.000 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion: 73 Resp: 5891

Ion	Ratio	Lower	Upper
73	100		
57	19.4	17.4	26.0



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC005

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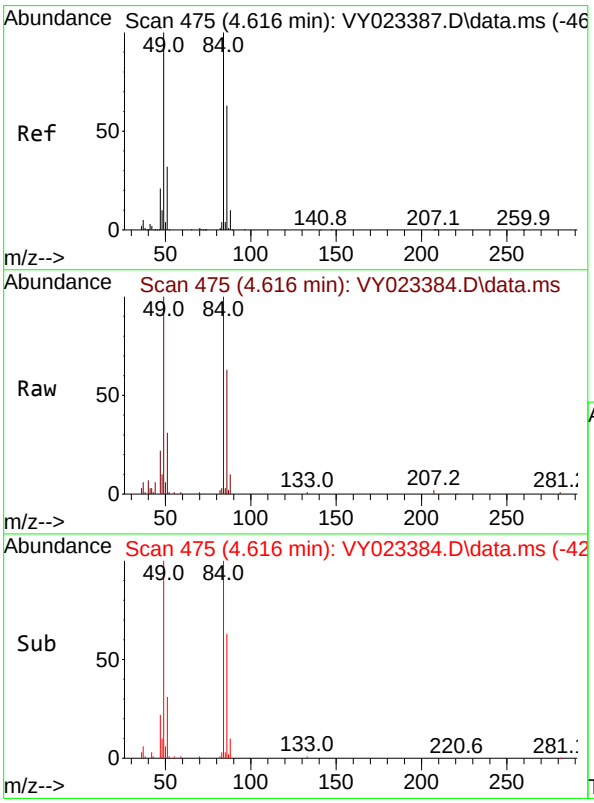
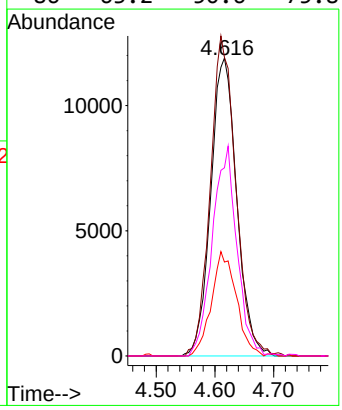
Supervised By :Mahesh Dadoda 10/10/2025

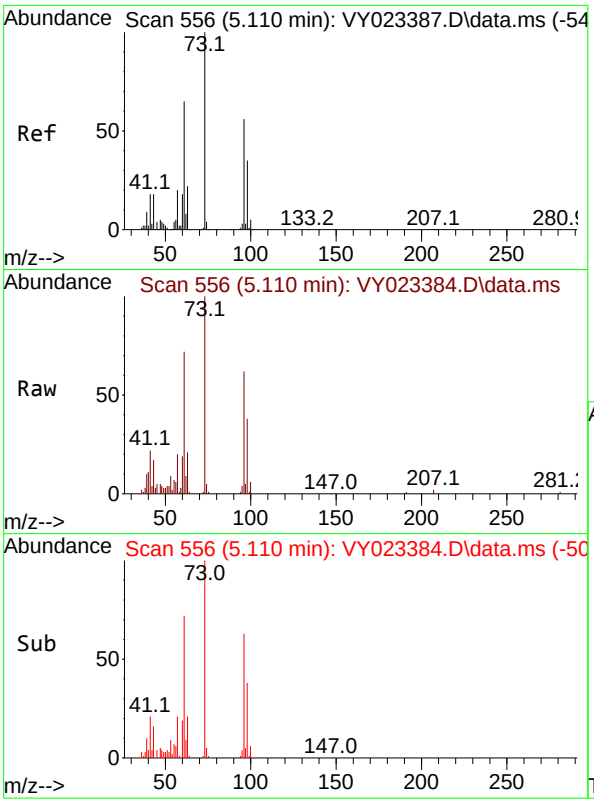


#20
Methylene Chloride
Concen: 5.917 ug/l
RT: 4.616 min Scan# 475
Delta R.T. -0.000 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion: 84 Resp: 36598

Ion	Ratio	Lower	Upper
84	100		
49	100.3	80.2	120.4
51	31.6	25.9	38.9
86	63.2	50.6	75.8

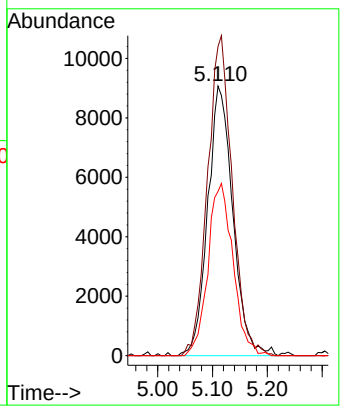




#21
trans-1,2-Dichloroethene
Concen: 4.754 ug/l
RT: 5.110 min Scan# 5
Delta R.T. -0.000 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion: 96 Resp: 2892

Ion	Ratio	Lower	Upper
96	100		
61	114.7	92.7	139.1
98	61.0	49.7	74.5



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC005

Manual Integrations
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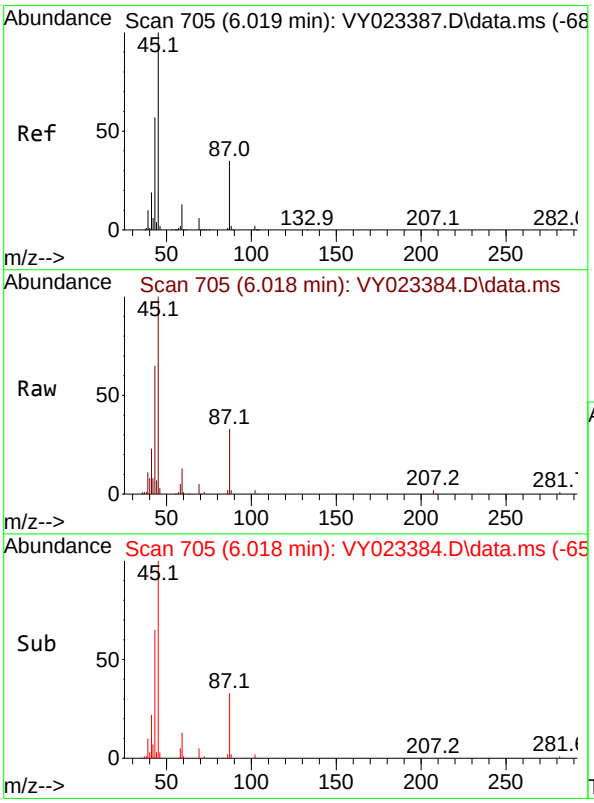
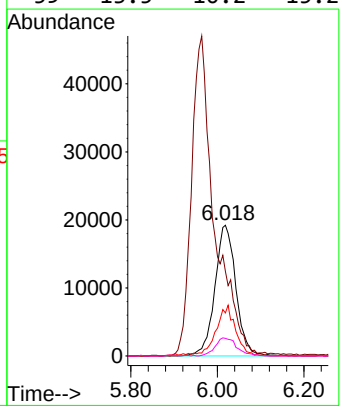
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

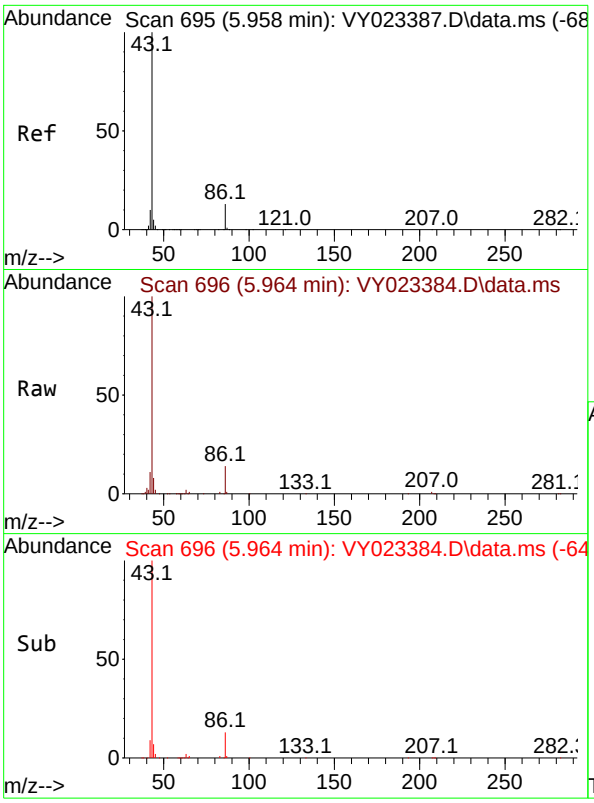


#22
Diisopropyl ether
Concen: 4.269 ug/l
RT: 6.018 min Scan# 705
Delta R.T. -0.000 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion: 45 Resp: 64833

Ion	Ratio	Lower	Upper
45	100		
43	63.0	45.6	68.4
87	32.9	28.1	42.1
59	13.5	10.2	15.2





#23
Vinyl Acetate
Concen: 20.824 ug/l
RT: 5.964 min Scan# 6
Delta R.T. 0.006 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion: 43 Resp: 17385

Ion	Ratio	Lower	Upper
43	100		
86	13.6	10.6	15.8

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC005

Manual Integrations
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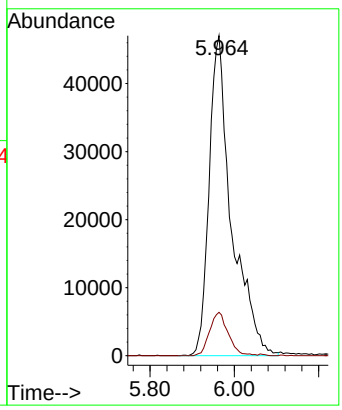
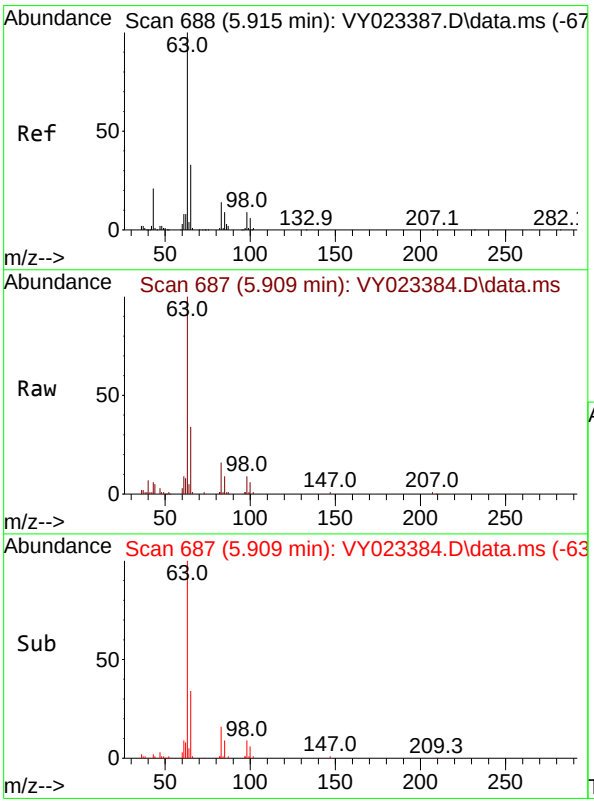
Supervised By :Mahesh Dadoda 10/10/2025

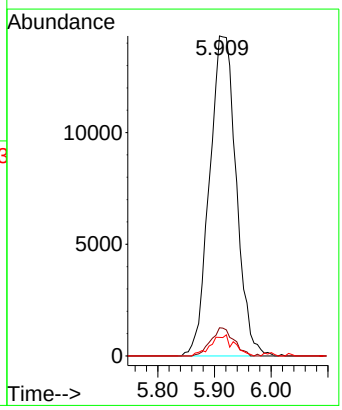


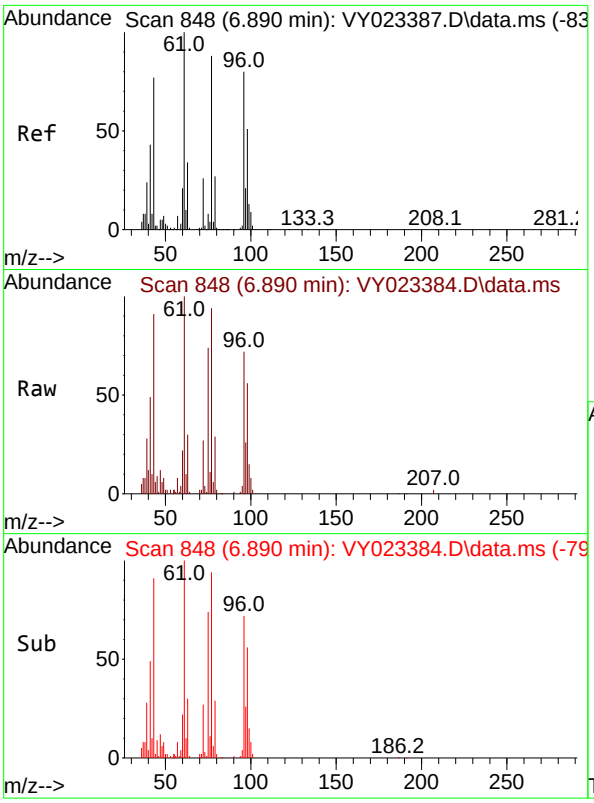


#24
1,1-Dichloroethane
Concen: 4.679 ug/l
RT: 5.909 min Scan# 687
Delta R.T. -0.006 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion: 63 Resp: 46850

Ion	Ratio	Lower	Upper
63	100		
98	8.8	4.3	13.1
100	5.8	2.8	8.4





#25
2-Butanone
Concen: 27.656 ug/l
RT: 6.890 min Scan# 84
Delta R.T. -0.000 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion: 43 Resp: 3899

Ion	Ratio	Lower	Upper
43	100		
72	30.0	27.4	41.2

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC005

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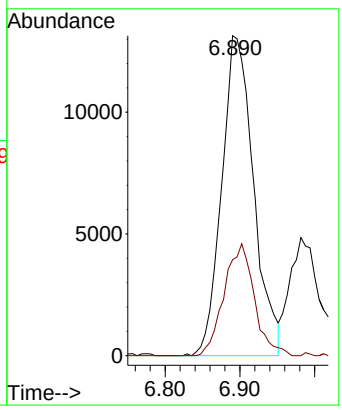
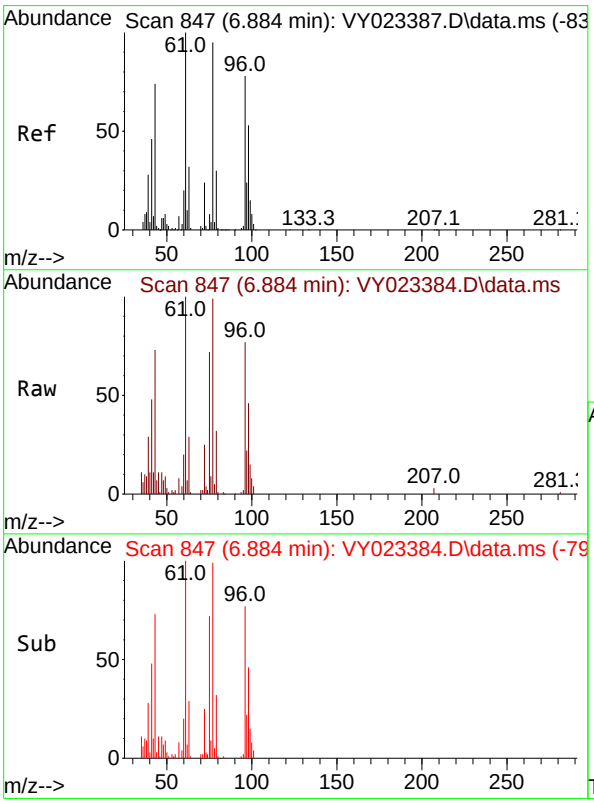
Supervised By :Mahesh Dadoda 10/10/2025

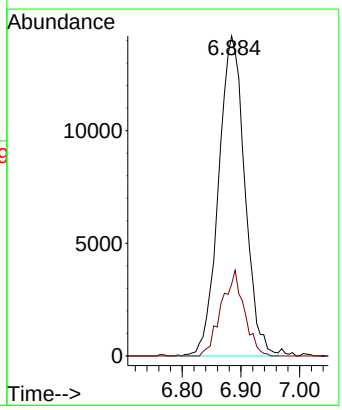


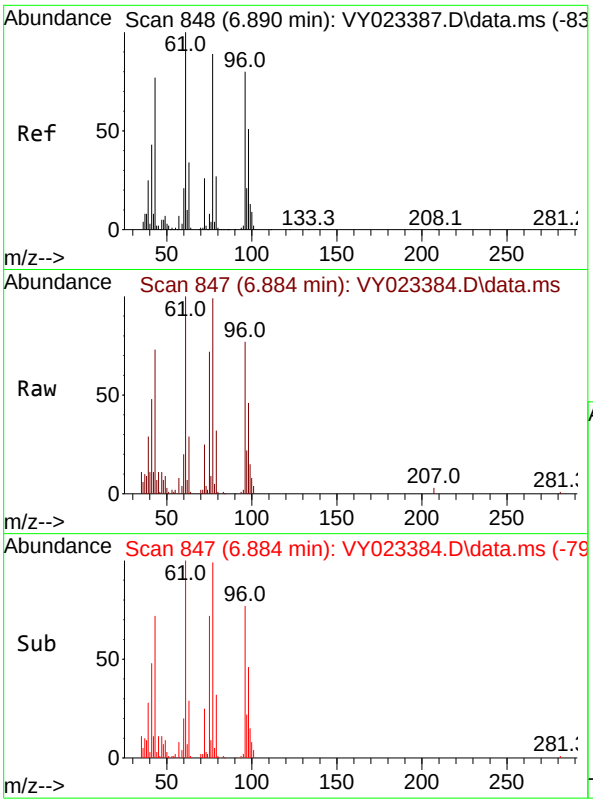


#26
2,2-Dichloropropane
Concen: 4.953 ug/l
RT: 6.884 min Scan# 847
Delta R.T. -0.000 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion: 77 Resp: 44062

Ion	Ratio	Lower	Upper
77	100		
97	23.4	12.1	36.3





#27
cis-1,2-Dichloroethene
Concen: 4.600 ug/l
RT: 6.884 min Scan# 84
Delta R.T. -0.006 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion: 96 Resp: 3174

Ion	Ratio	Lower	Upper
96	100		
61	133.3	0.0	258.2
98	66.1	0.0	132.0

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC005

Manual Integrations
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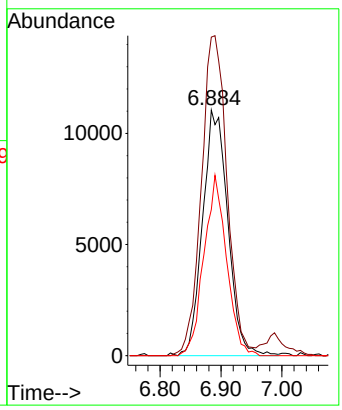
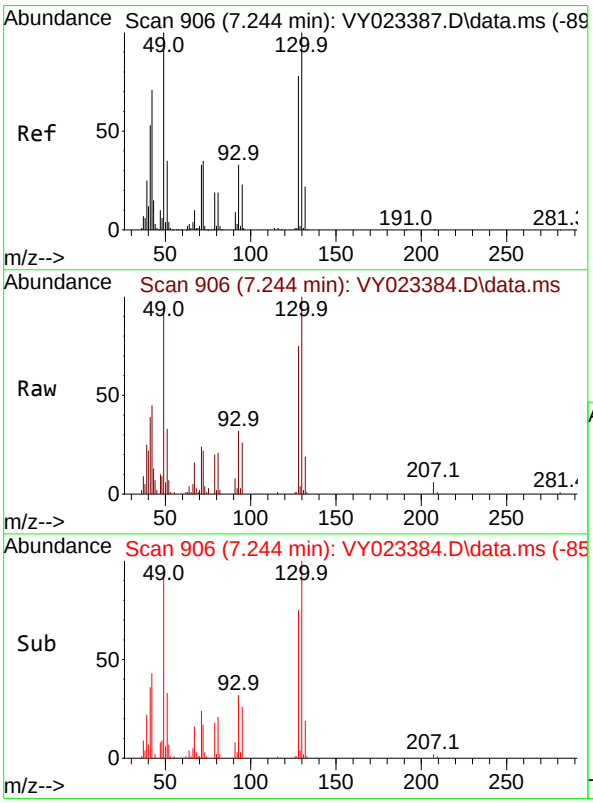
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

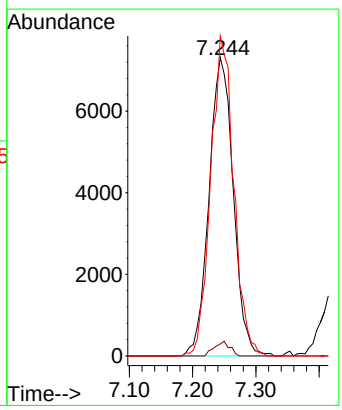


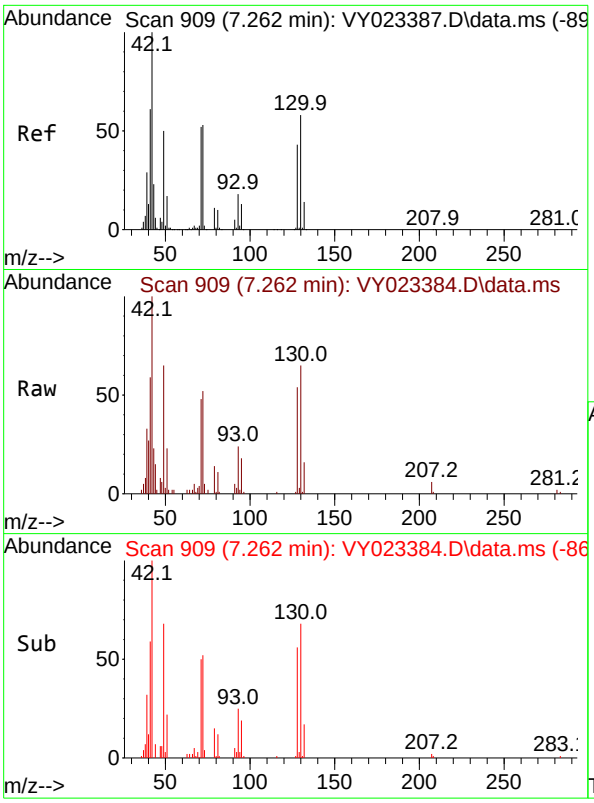


#28
Bromochloromethane
Concen: 5.006 ug/l
RT: 7.244 min Scan# 906
Delta R.T. -0.000 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion: 49 Resp: 19445

Ion	Ratio	Lower	Upper
49	100		
129	3.1	0.0	5.6
130	101.5	81.9	122.9

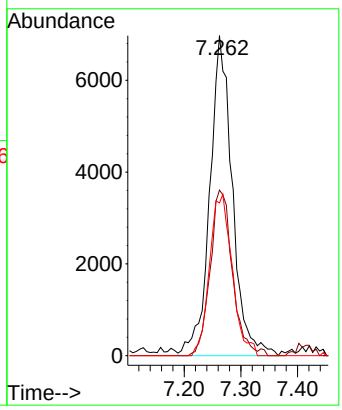




#29
Tetrahydrofuran
Concen: 23.059 ug/l
RT: 7.262 min Scan# 9(
Delta R.T. -0.000 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion: 42 Resp: 1929(

Ion	Ratio	Lower	Upper
42	100		
72	51.0	43.0	64.6
71	50.4	40.1	60.1



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC005

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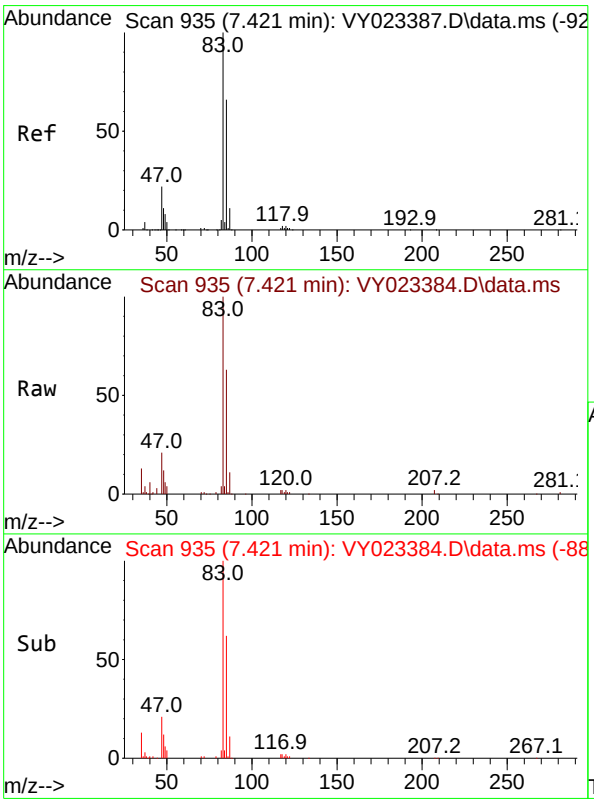
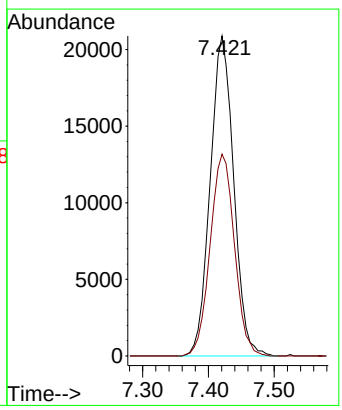
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

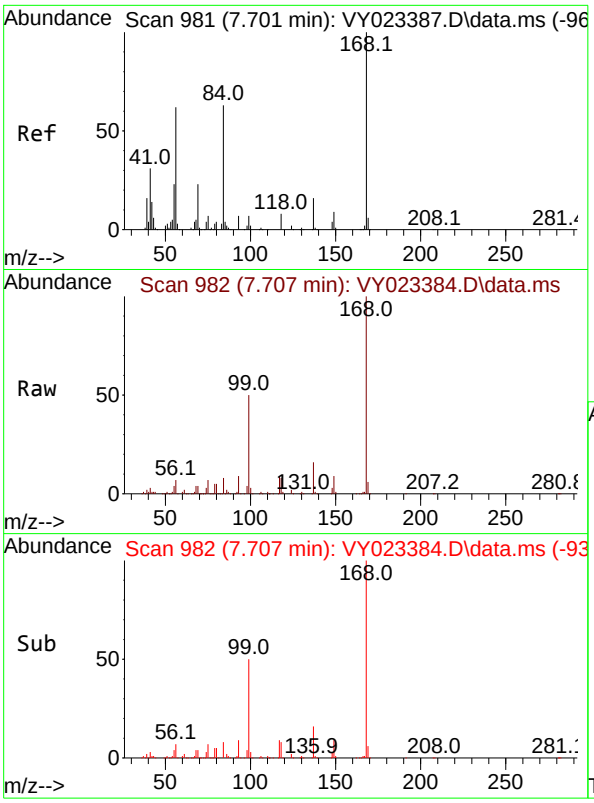


#30
Chloroform
Concen: 4.806 ug/l
RT: 7.421 min Scan# 935
Delta R.T. -0.000 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion: 83 Resp: 51887

Ion	Ratio	Lower	Upper
83	100		
85	63.0	52.5	78.7

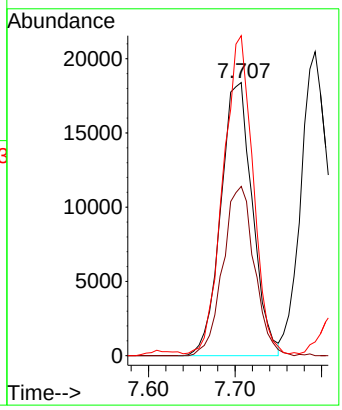




#31
Cyclohexane
Concen: 5.279 ug/l
RT: 7.707 min Scan# 9
Delta R.T. 0.006 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion: 56 Resp: 4667

Ion	Ratio	Lower	Upper
56	100		
69	62.0	30.0	45.0
84	115.8	81.2	121.8



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC005

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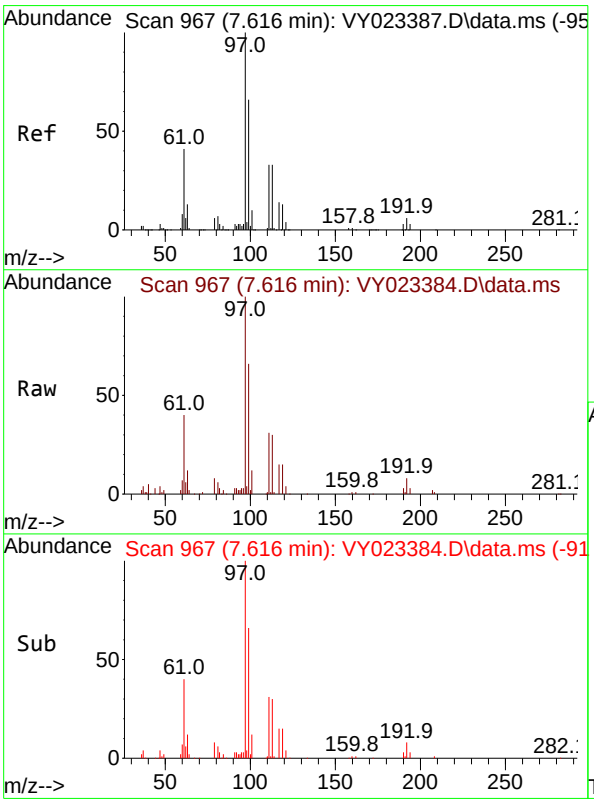
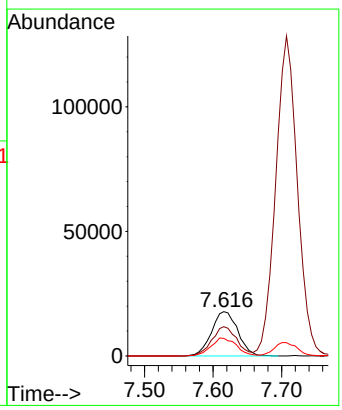
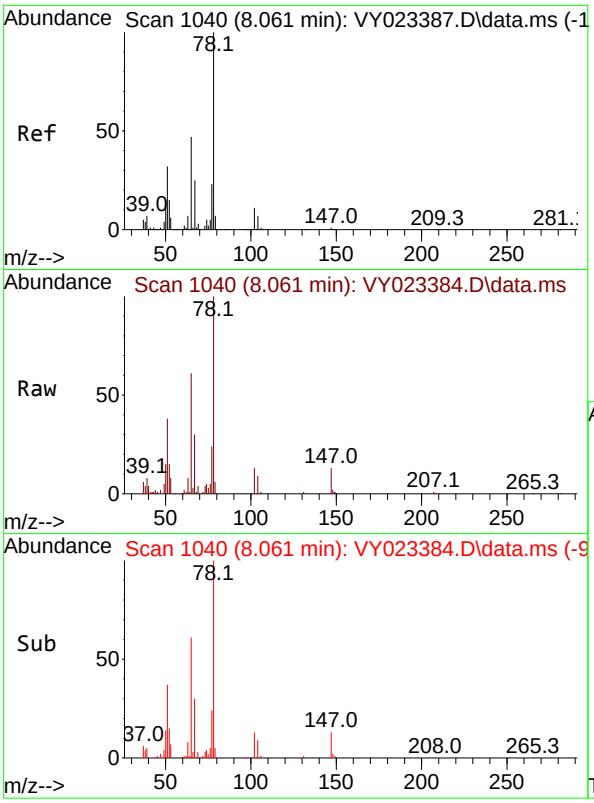


#32
1,1,1-Trichloroethane
Concen: 4.881 ug/l
RT: 7.616 min Scan# 967
Delta R.T. -0.000 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion: 97 Resp: 47305

Ion	Ratio	Lower	Upper
97	100		
99	63.1	51.4	77.2
61	39.4	31.9	47.9

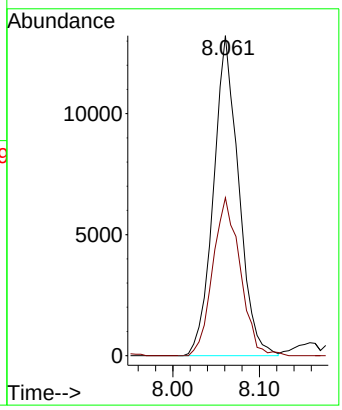




#33
1,2-Dichloroethane-d4
Concen: 5.258 ug/l
RT: 8.061 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion: 65 Resp: 2667

Ion	Ratio	Lower	Upper
65	100		
67	53.7	0.0	105.8



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC005

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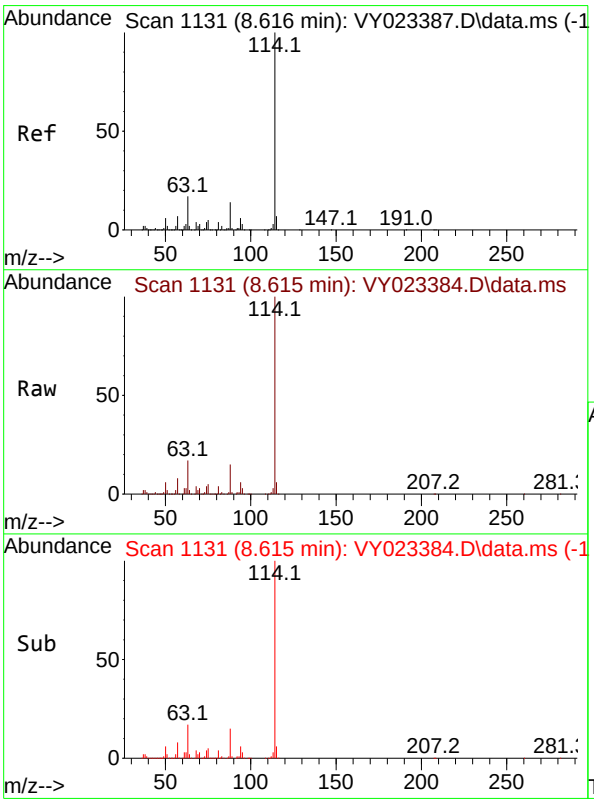
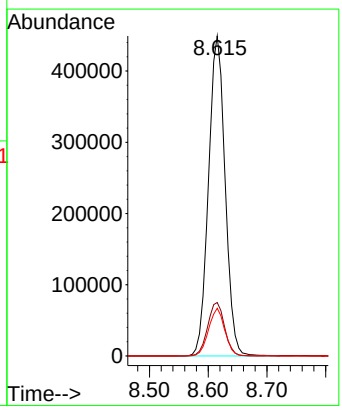
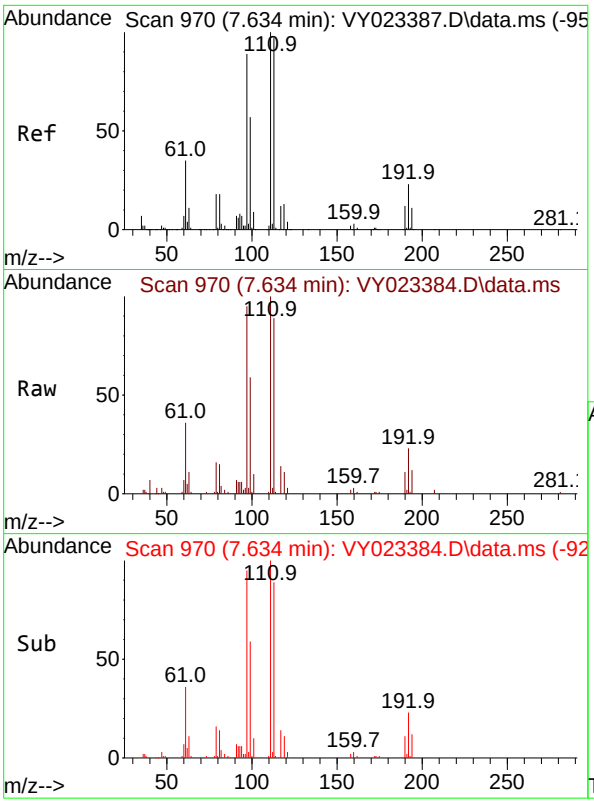


#34
1,4-Difluorobenzene
Concen: 50.000 ug/l
RT: 8.615 min Scan# 1131
Delta R.T. -0.000 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion:114 Resp: 882488

Ion	Ratio	Lower	Upper
114	100		
63	16.7	0.0	34.2
88	14.9	0.0	28.4

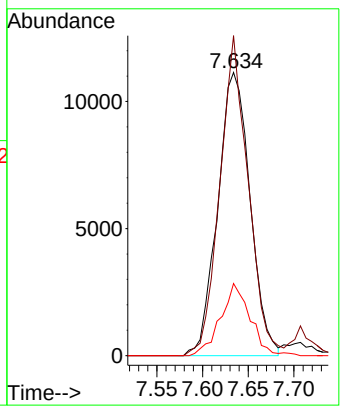




#35
Dibromofluoromethane
Concen: 5.126 ug/l
RT: 7.634 min Scan# 9
Delta R.T. -0.000 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion:113 Resp: 2745

Ion	Ratio	Lower	Upper
113	100		
111	99.0	81.8	122.6
192	23.4	18.0	27.0



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC005

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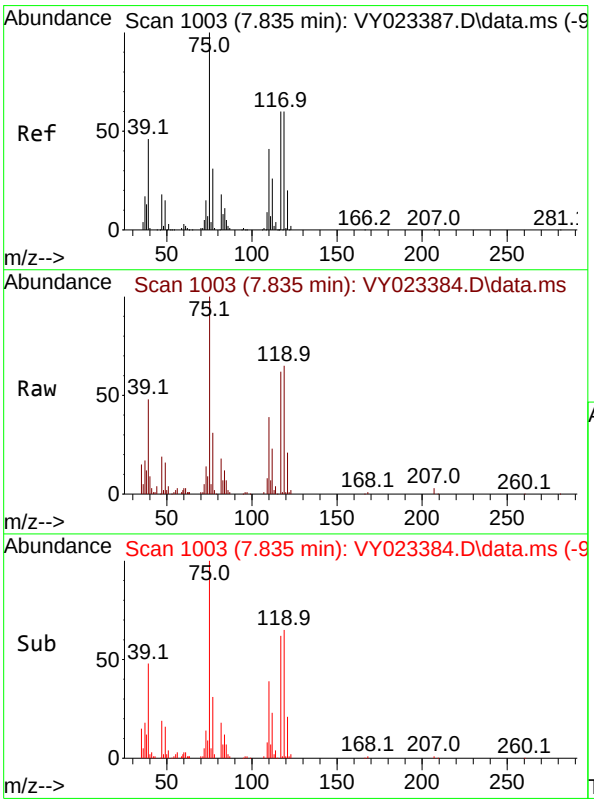
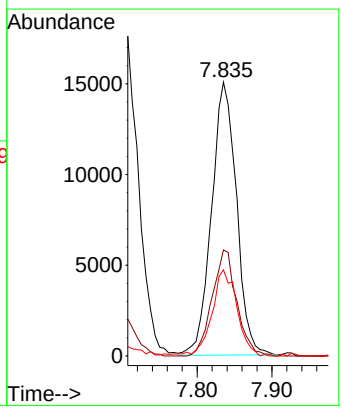
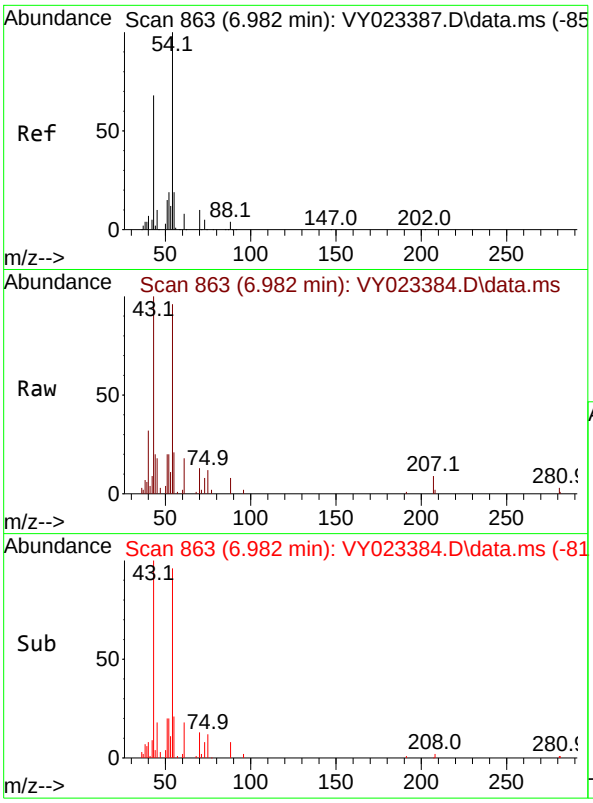


#36
1,1-Dichloropropene
Concen: 4.617 ug/l
RT: 7.835 min Scan# 1003
Delta R.T. -0.000 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion: 75 Resp: 34888

Ion	Ratio	Lower	Upper
75	100		
110	38.3	19.9	59.7
77	32.1	25.0	37.6

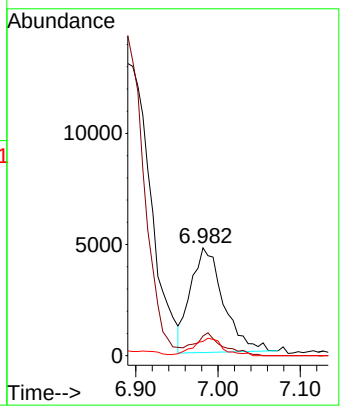




#37
Ethyl Acetate
Concen: 4.379 ug/l
RT: 6.982 min Scan# 8
Delta R.T. -0.000 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion: 43 Resp: 1308

Ion	Ratio	Lower	Upper
43	100		
61	18.2	11.8	17.8
70	15.0	10.5	15.7



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC005

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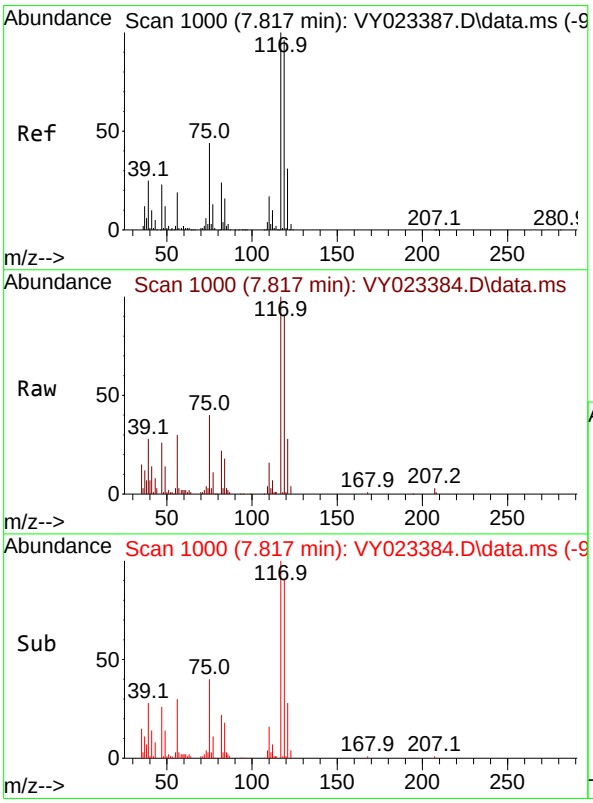
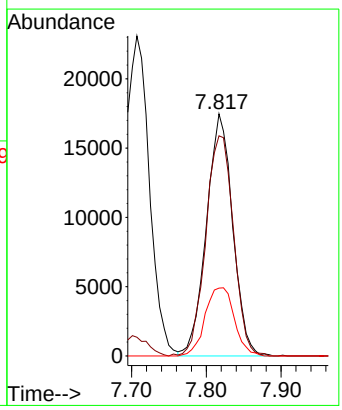
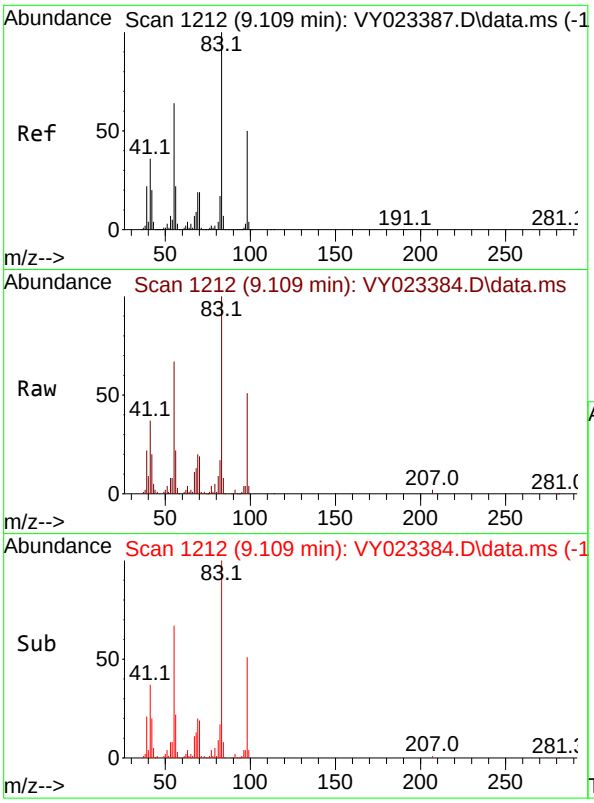


#38
Carbon Tetrachloride
Concen: 4.859 ug/l
RT: 7.817 min Scan# 1000
Delta R.T. -0.000 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion:117 Resp: 42654

Ion	Ratio	Lower	Upper
117	100		
119	91.0	76.8	115.2
121	28.0	24.5	36.7

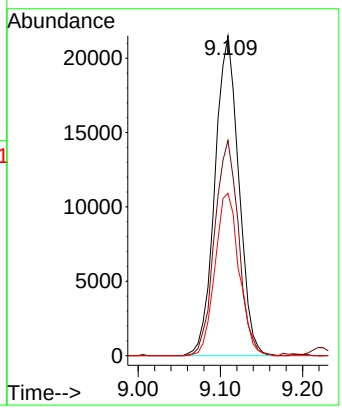




#39
Methylcyclohexane
Concen: 4.479 ug/l
RT: 9.109 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion: 83 Resp: 4332

Ion	Ratio	Lower	Upper
83	100		
55	67.2	51.4	77.2
98	50.8	40.4	60.6



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC005

Manual Integrations
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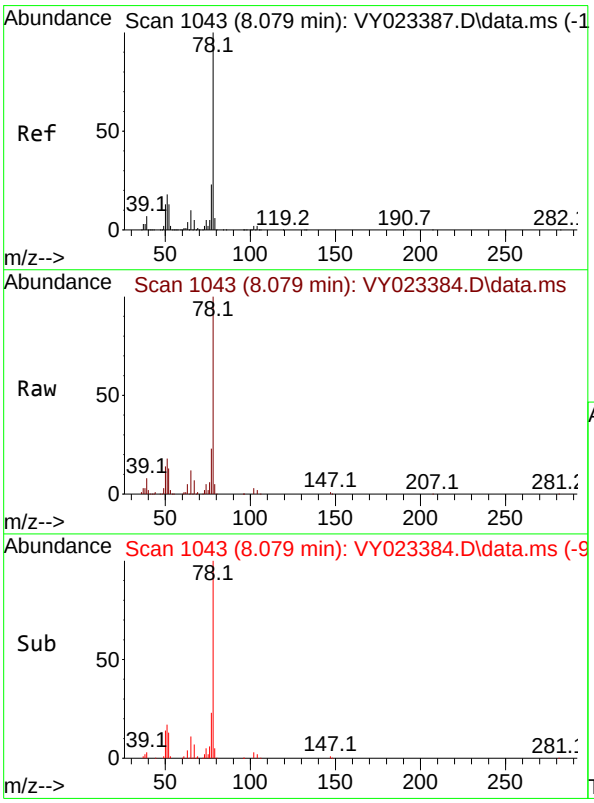
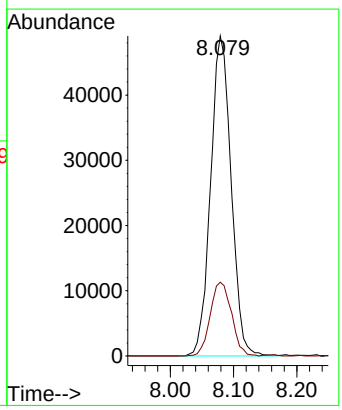
Supervised By :Mahesh Dadoda 10/10/2025

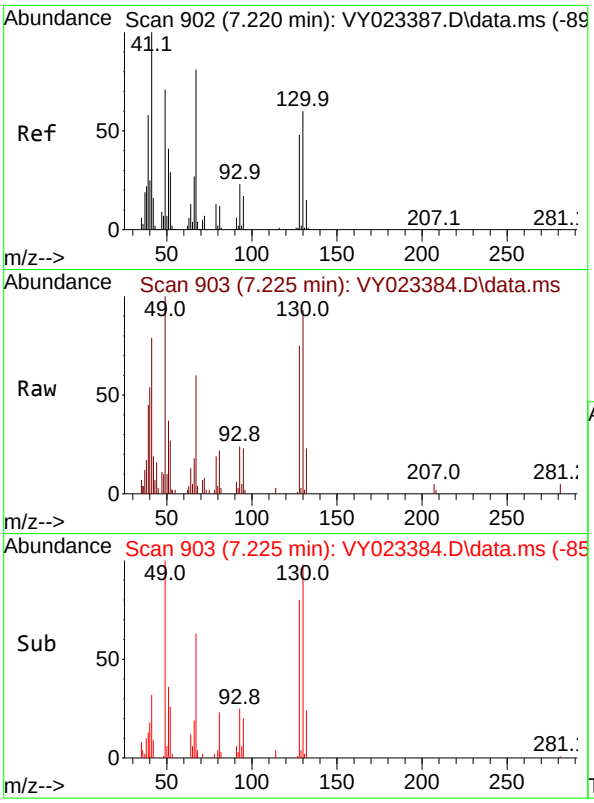


#40
Benzene
Concen: 4.693 ug/l
RT: 8.079 min Scan# 1043
Delta R.T. -0.000 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion: 78 Resp: 110551

Ion	Ratio	Lower	Upper
78	100		
77	23.0	18.3	27.5

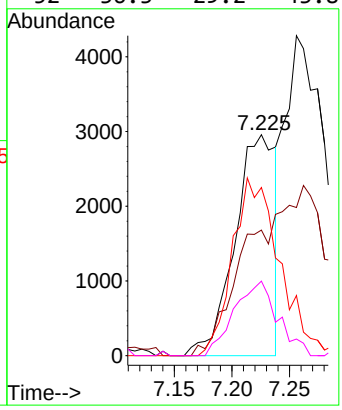




#41
Methacrylonitrile
Concen: 4.658 ug/l m
RT: 7.225 min Scan# 9
Delta R.T. 0.006 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion: 41 Resp: 722

Ion	Ratio	Lower	Upper
41	100		
39	0.0	52.2	78.4
67	95.1	74.9	112.3
52	36.3	29.2	43.8



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC005

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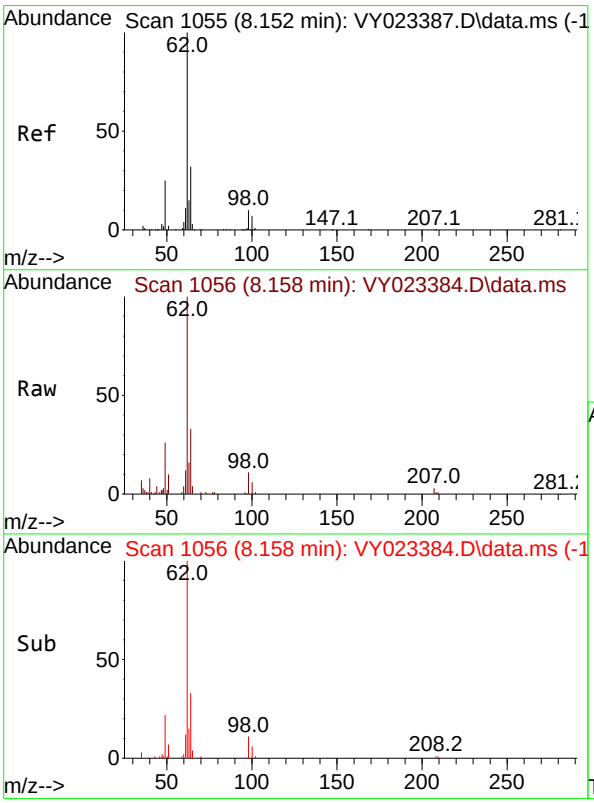
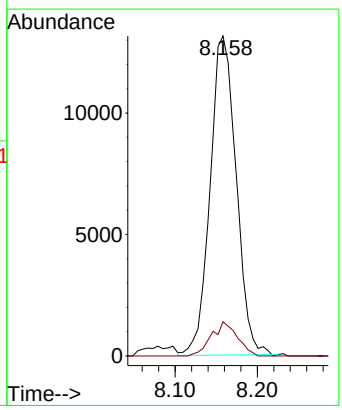
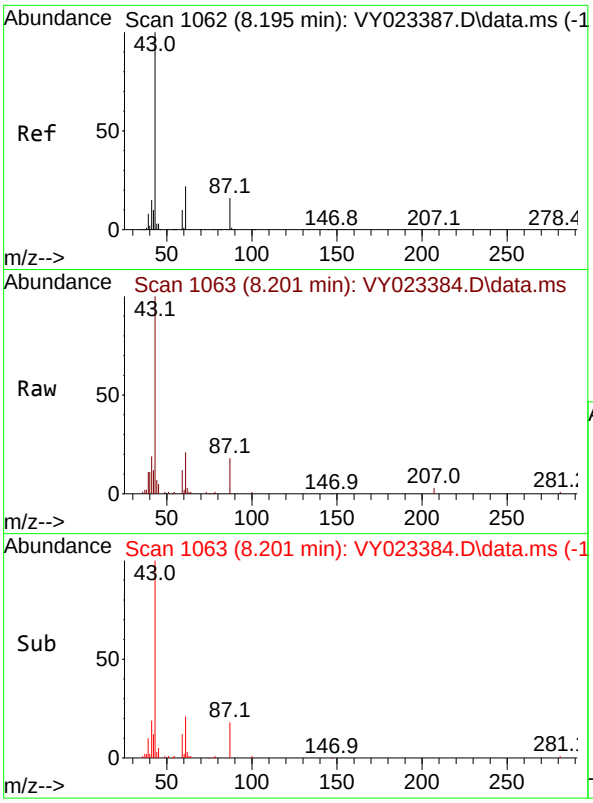


#42
1,2-Dichloroethane
Concen: 4.828 ug/l
RT: 8.158 min Scan# 1056
Delta R.T. 0.006 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion: 62 Resp: 28940

Ion	Ratio	Lower	Upper
62	100		
98	10.6	0.0	21.6





#43
Isopropyl Acetate
Concen: 4.503 ug/l
RT: 8.201 min Scan# 1
Delta R.T. 0.006 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion: 43 Resp: 2616

Ion	Ratio	Lower	Upper
43	100		
61	22.6	18.1	27.1
87	15.9	13.5	20.3

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC005

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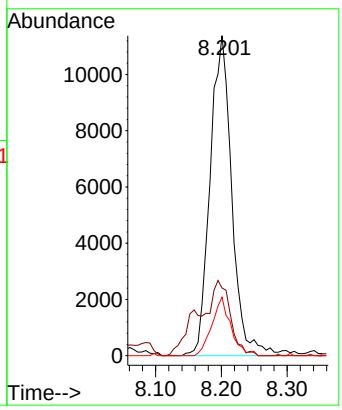
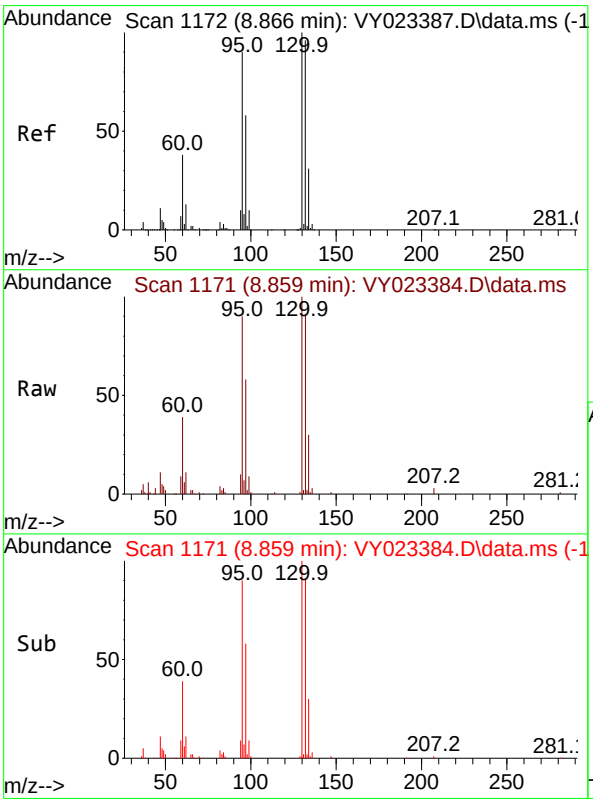
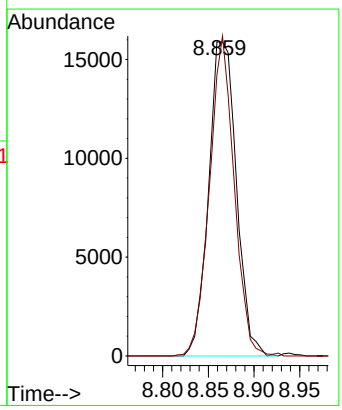


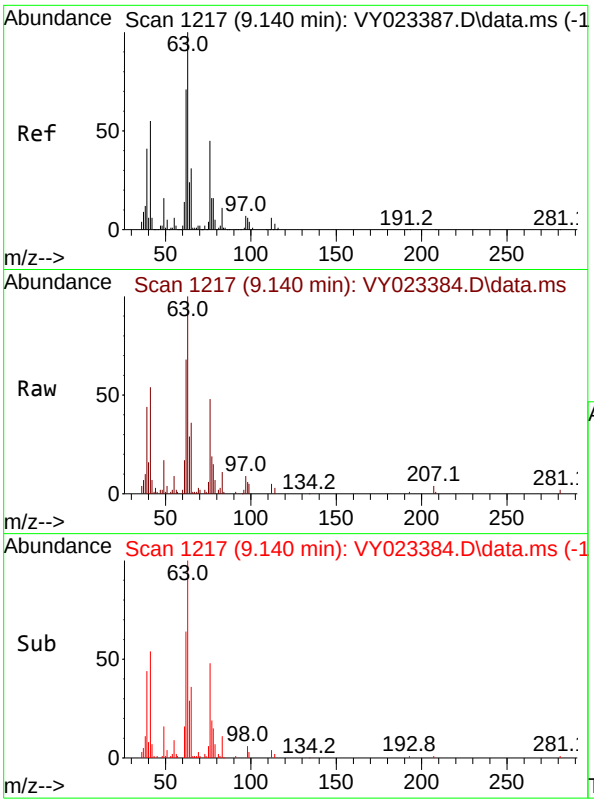


#44
Trichloroethene
Concen: 5.077 ug/l
RT: 8.859 min Scan# 1171
Delta R.T. -0.006 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion:130 Resp: 33564

Ion	Ratio	Lower	Upper
130	100		
95	89.2	0.0	180.6

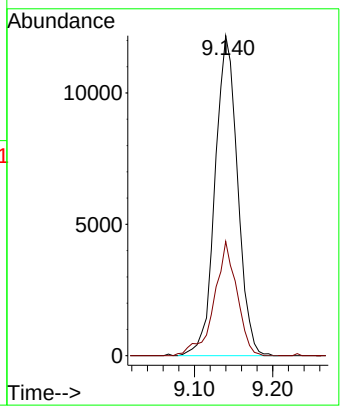




#45
1,2-Dichloropropane
Concen: 4.595 ug/l
RT: 9.140 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion: 63 Resp: 2435

Ion	Ratio	Lower	Upper
63	100		
65	35.7	24.9	37.3



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC005

Manual Integrations
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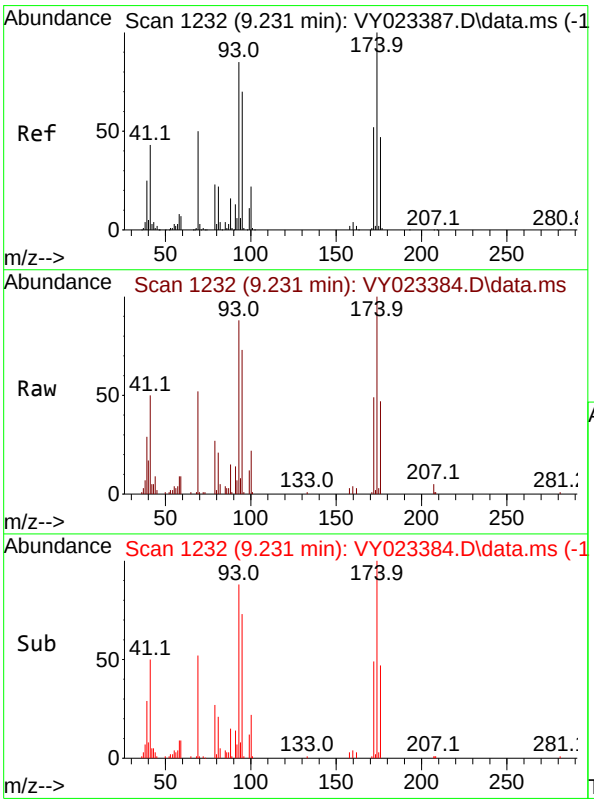
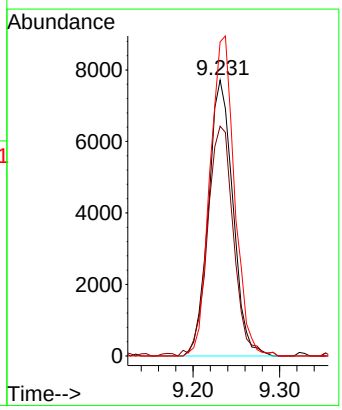
Supervised By :Mahesh Dadoda 10/10/2025

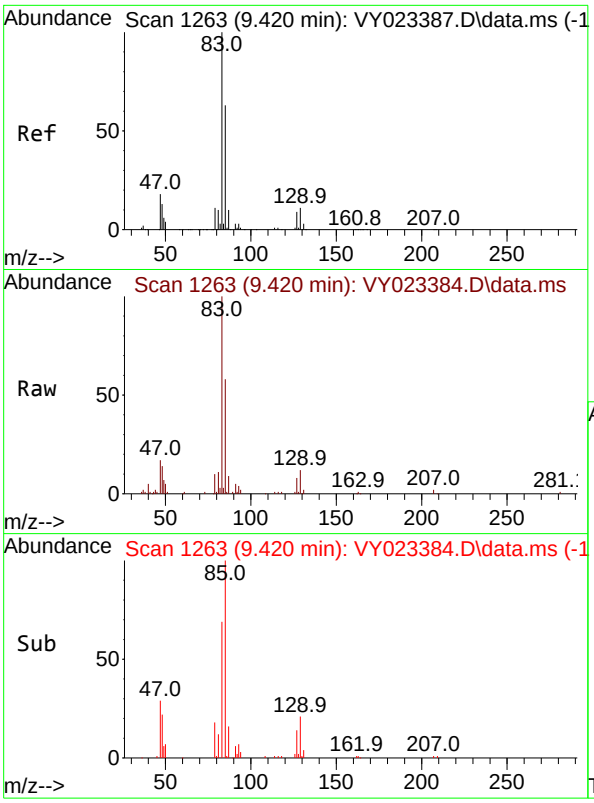


#46
Dibromomethane
Concen: 4.682 ug/l
RT: 9.231 min Scan# 1232
Delta R.T. -0.000 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion: 93 Resp: 15179

Ion	Ratio	Lower	Upper
93	100		
95	87.6	65.4	98.0
174	116.2	92.9	139.3

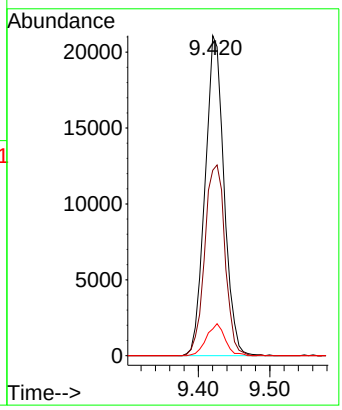




#47
Bromodichloromethane
Concen: 4.756 ug/l
RT: 9.420 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion: 83 Resp: 3881

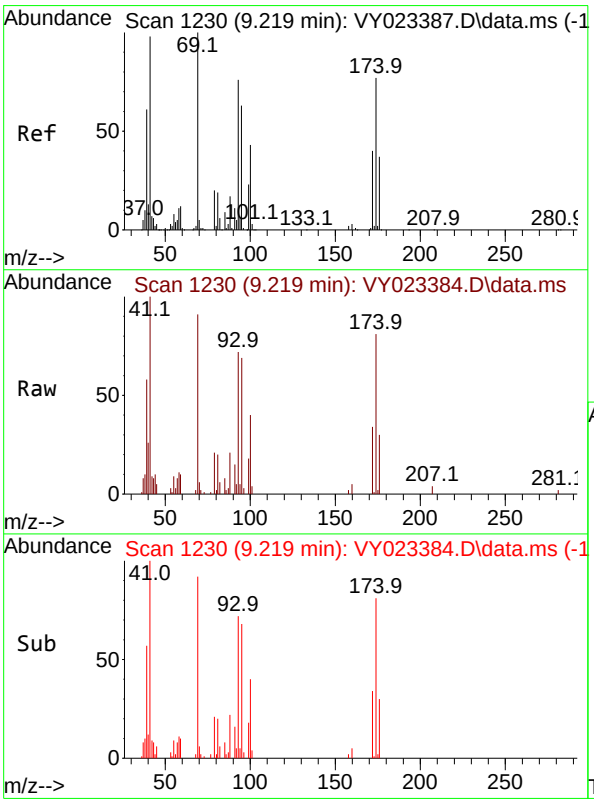
Ion	Ratio	Lower	Upper
83	100		
85	57.9	50.8	76.2
127	8.4	7.4	11.2



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC005

Manual Integrations APPROVED

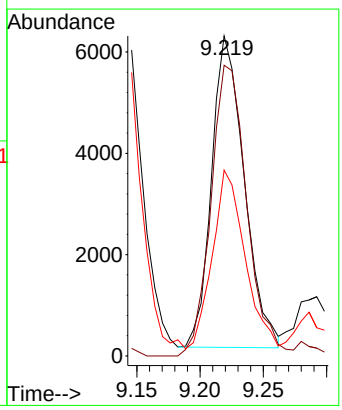
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

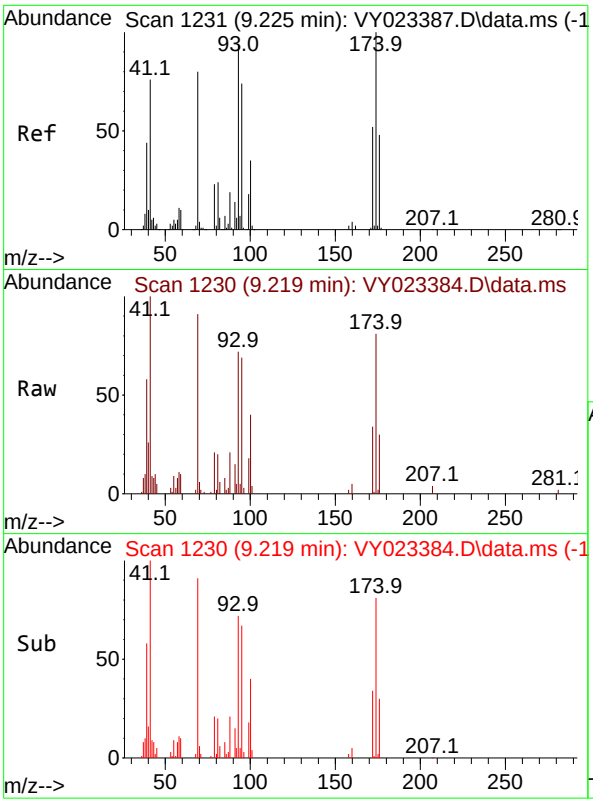


#48
Methyl methacrylate
Concen: 4.071 ug/l
RT: 9.219 min Scan# 1230
Delta R.T. -0.000 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion: 41 Resp: 11038

Ion	Ratio	Lower	Upper
41	100		
69	102.5	81.0	121.4
39	62.4	48.2	72.4





#49
1,4-Dioxane
Concen: 96.953 ug/l
RT: 9.219 min Scan# 1
Delta R.T. -0.006 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion: 88 Resp: 325

Ion	Ratio	Lower	Upper
88	100		
43	43.1	21.8	32.8
58	63.4	46.8	70.2

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC005

Manual Integrations
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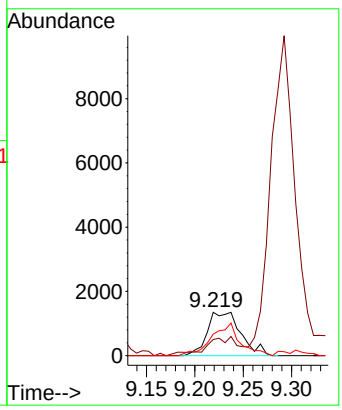
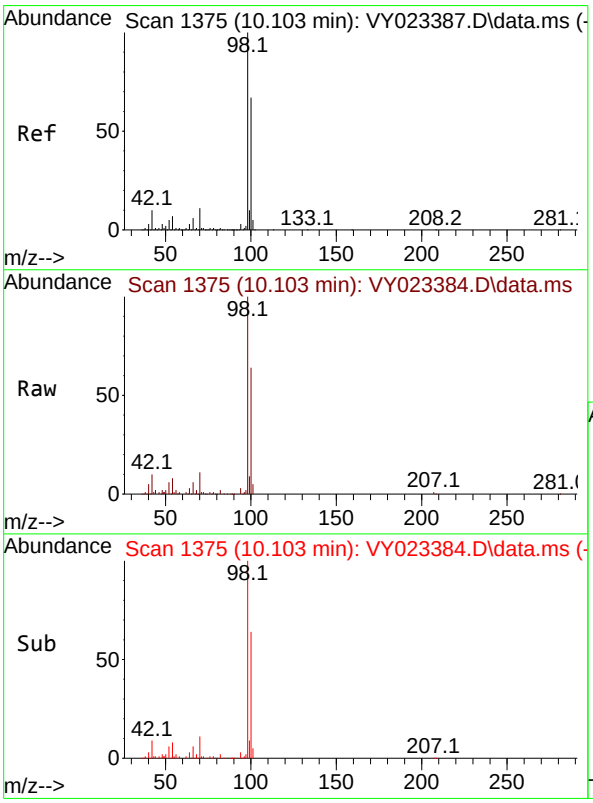
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

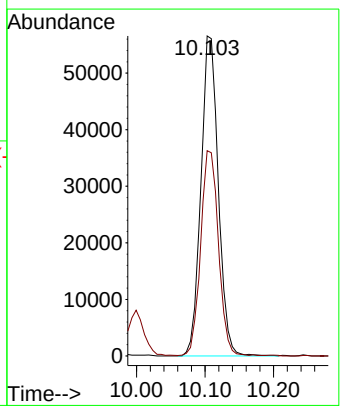


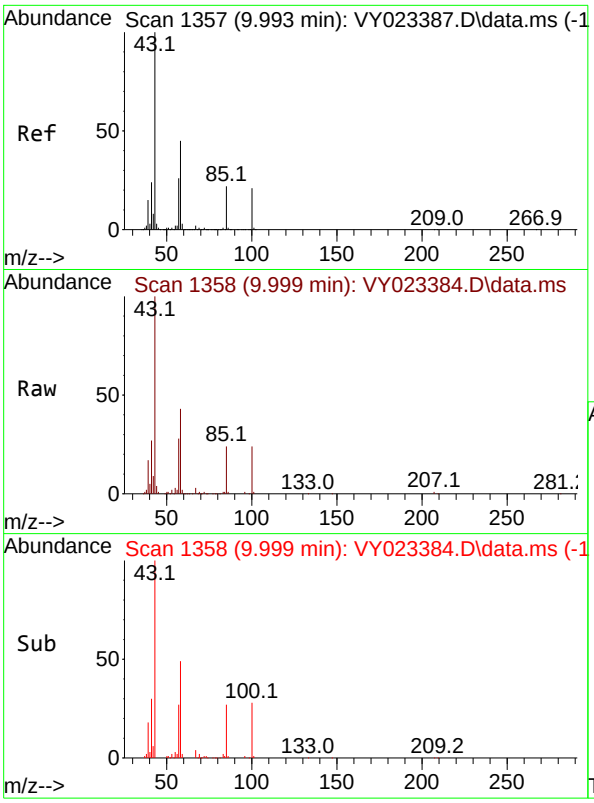


#50
Toluene-d8
Concen: 4.946 ug/l
RT: 10.103 min Scan# 1375
Delta R.T. -0.000 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion: 98 Resp: 99905

Ion	Ratio	Lower	Upper
98	100		
100	65.3	53.0	79.4

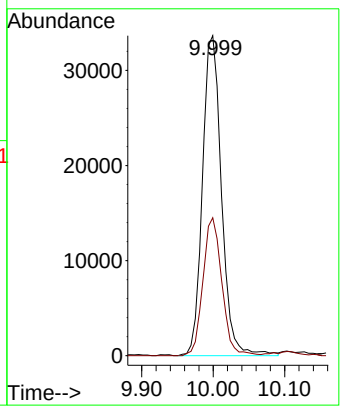




#51
4-Methyl-2-Pentanone
Concen: 20.925 ug/l
RT: 9.999 min Scan# 1
Delta R.T. 0.006 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion: 43 Resp: 6227

Ion	Ratio	Lower	Upper
43	100		
58	42.7	35.3	52.9



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC005

Manual Integrations
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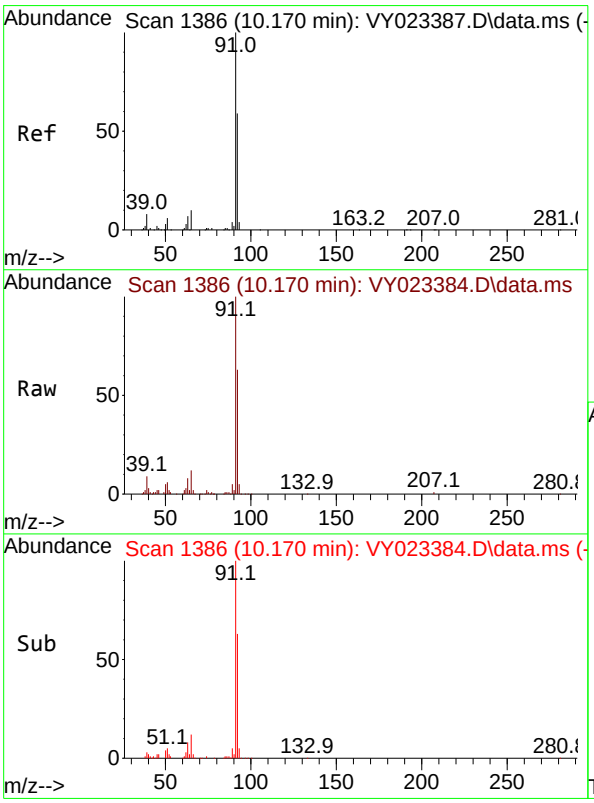
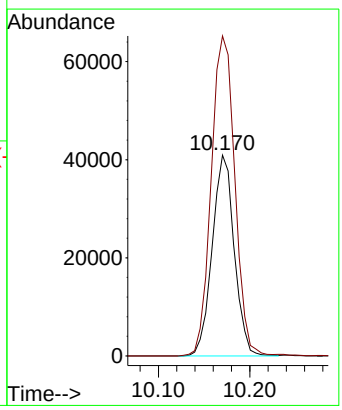
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

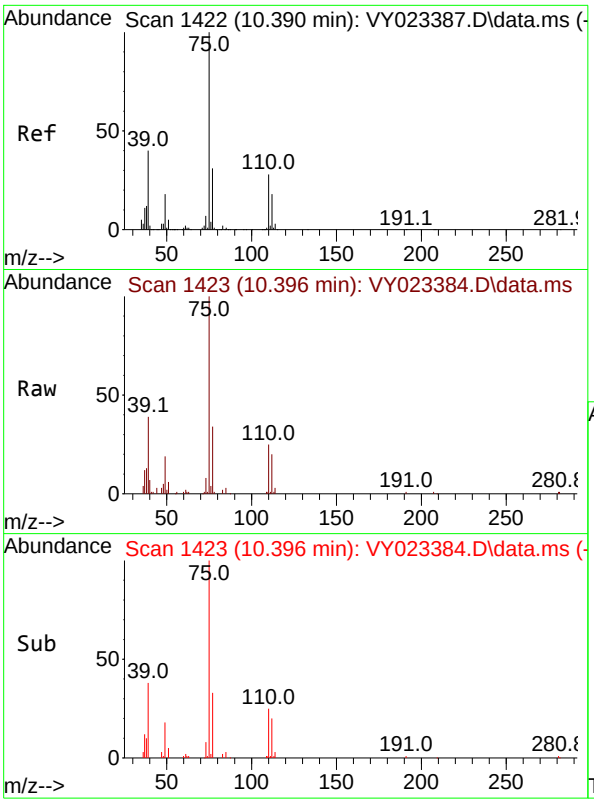


#52
Toluene
Concen: 4.585 ug/l
RT: 10.170 min Scan# 1386
Delta R.T. -0.000 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion: 92 Resp: 68550

Ion	Ratio	Lower	Upper
92	100		
91	171.2	136.4	204.6

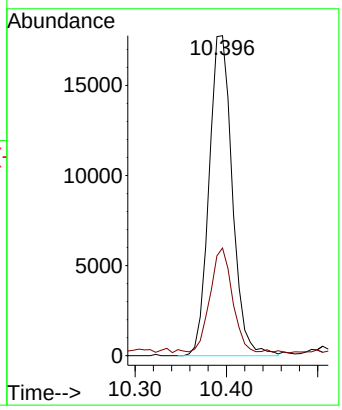




#53
t-1,3-Dichloropropene
Concen: 4.491 ug/l
RT: 10.396 min Scan# 14
Delta R.T. 0.006 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion: 75 Resp: 3147

Ion	Ratio	Lower	Upper
75	100		
77	32.1	25.1	37.7



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC005

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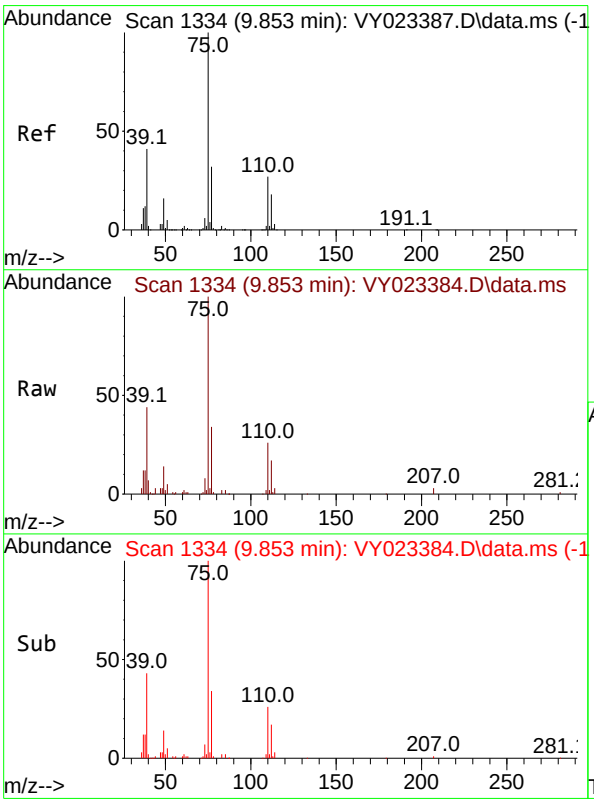
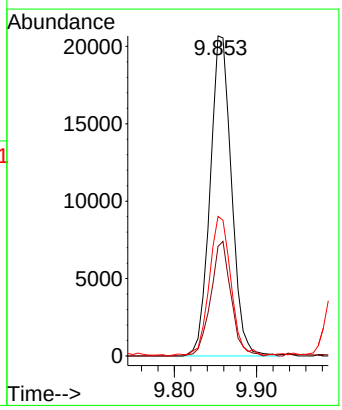
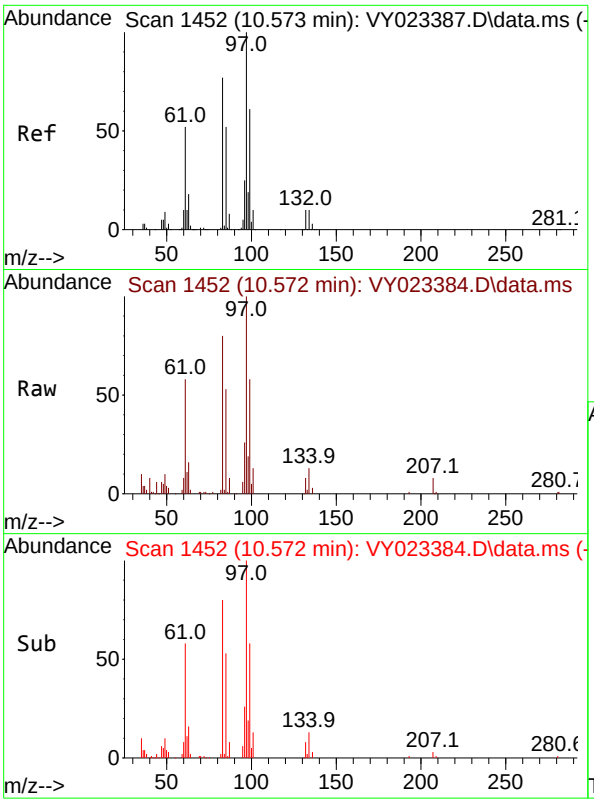


#54
cis-1,3-Dichloropropene
Concen: 4.463 ug/l
RT: 9.853 min Scan# 1334
Delta R.T. -0.000 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion: 75 Resp: 37392

Ion	Ratio	Lower	Upper
75	100		
77	34.2	25.4	38.0
39	43.0	32.8	49.2

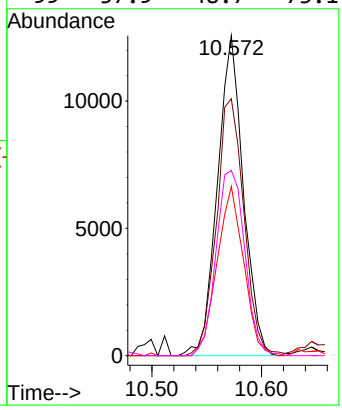




#55
1,1,2-Trichloroethane
Concen: 4.786 ug/l
RT: 10.572 min Scan# 14
Delta R.T. -0.000 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion: 97 Resp: 2064

Ion	Ratio	Lower	Upper
97	100		
83	80.3	61.8	92.6
85	52.8	41.3	61.9
99	57.9	48.7	73.1



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC005

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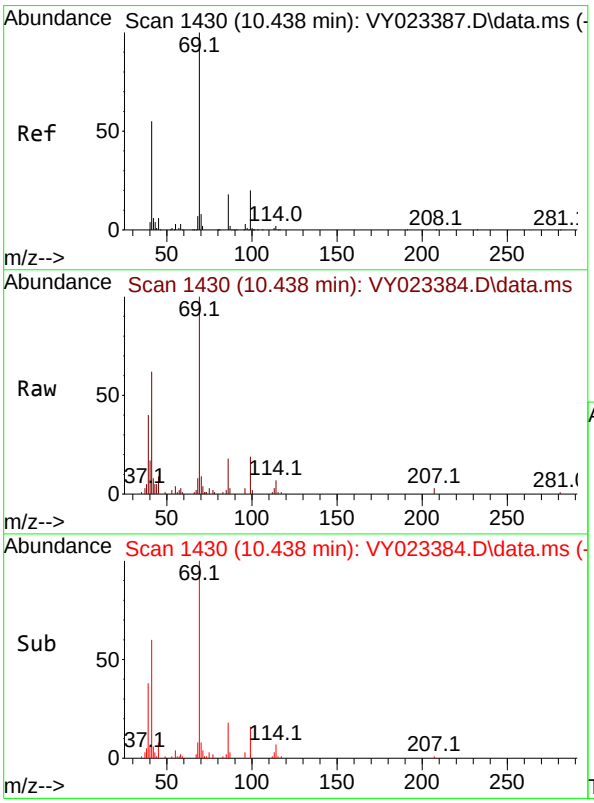
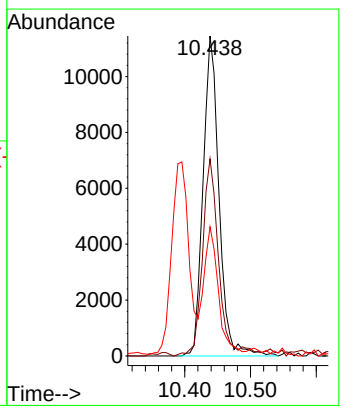
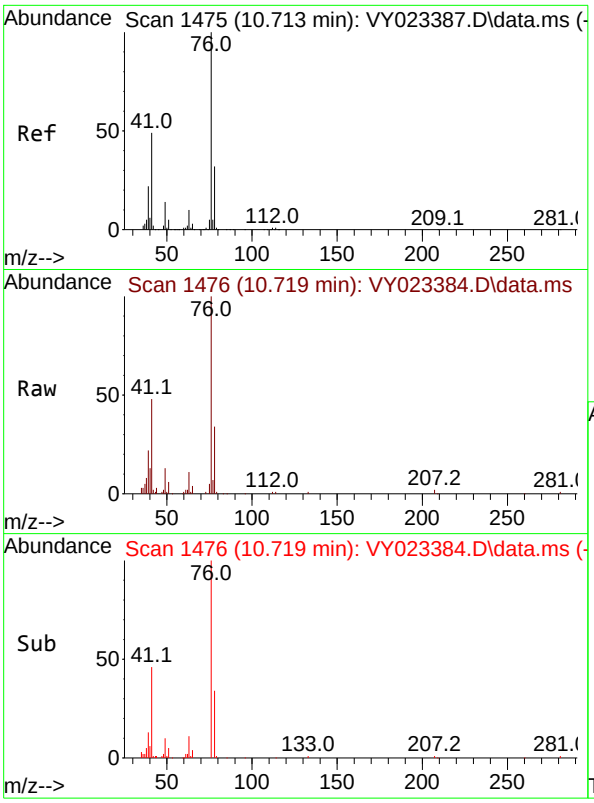


#56
Ethyl methacrylate
Concen: 3.891 ug/l
RT: 10.438 min Scan# 1430
Delta R.T. -0.000 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion: 69 Resp: 19324

Ion	Ratio	Lower	Upper
69	100		
41	60.6	44.6	67.0
39	36.2	27.0	40.4

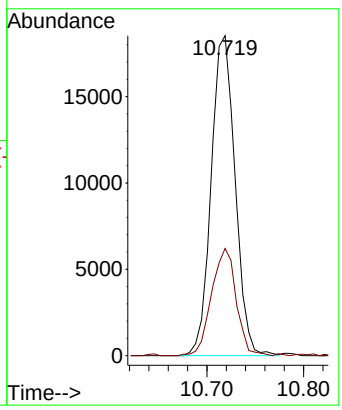




#57
1,3-Dichloropropane
Concen: 4.560 ug/l
RT: 10.719 min Scan# 14
Delta R.T. 0.006 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion: 76 Resp: 3183

Ion	Ratio	Lower	Upper
76	100		
78	34.4	25.9	38.9



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC005

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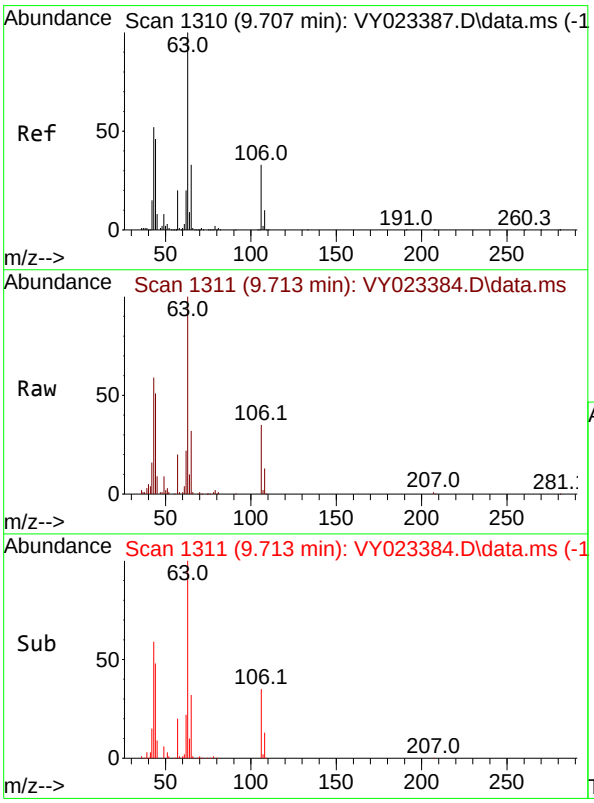
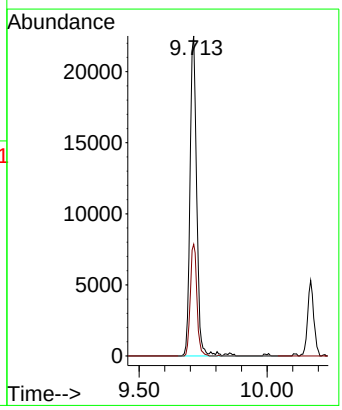
Supervised By :Mahesh Dadoda 10/10/2025

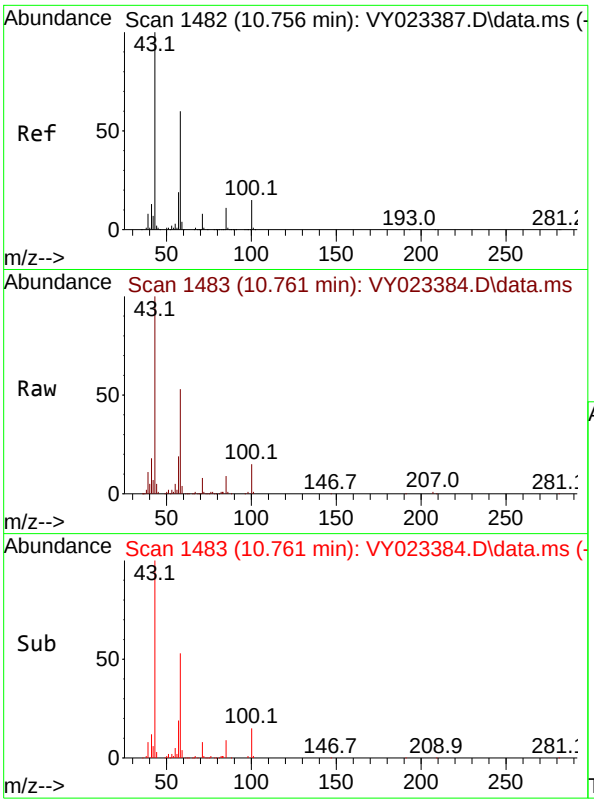


#58
2-Chloroethyl Vinyl ether
Concen: 18.894 ug/l m
RT: 9.713 min Scan# 1311
Delta R.T. 0.006 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion: 63 Resp: 41054

Ion	Ratio	Lower	Upper
63	100		
106	34.1	26.6	39.8





#59
2-Hexanone
Concen: 23.185 ug/l
RT: 10.761 min Scan# 14
Delta R.T. 0.006 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion: 43 Resp: 4777

Ion	Ratio	Lower	Upper
43	100		
58	58.4	30.5	91.5

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC005

Manual Integrations
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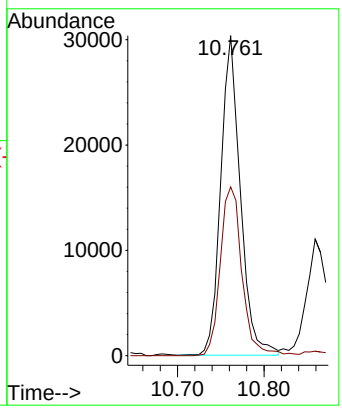
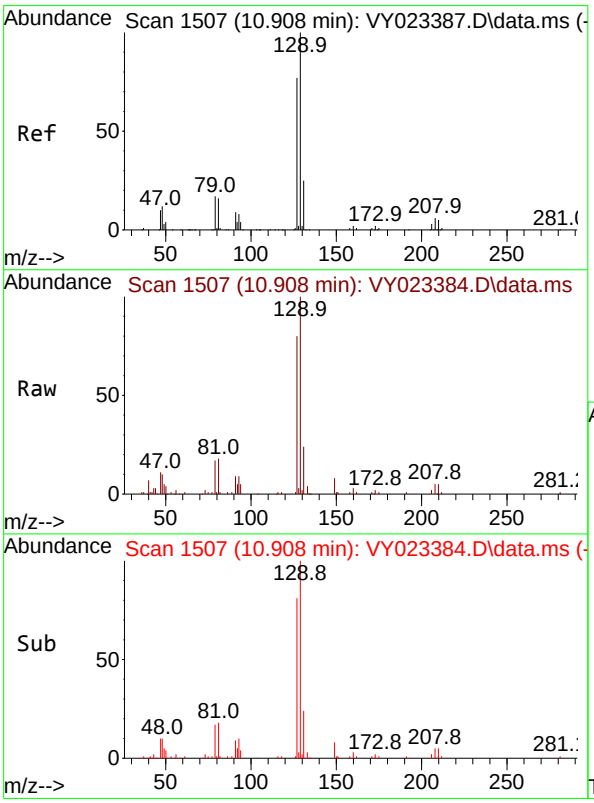
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

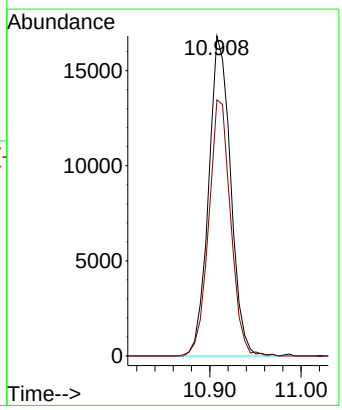


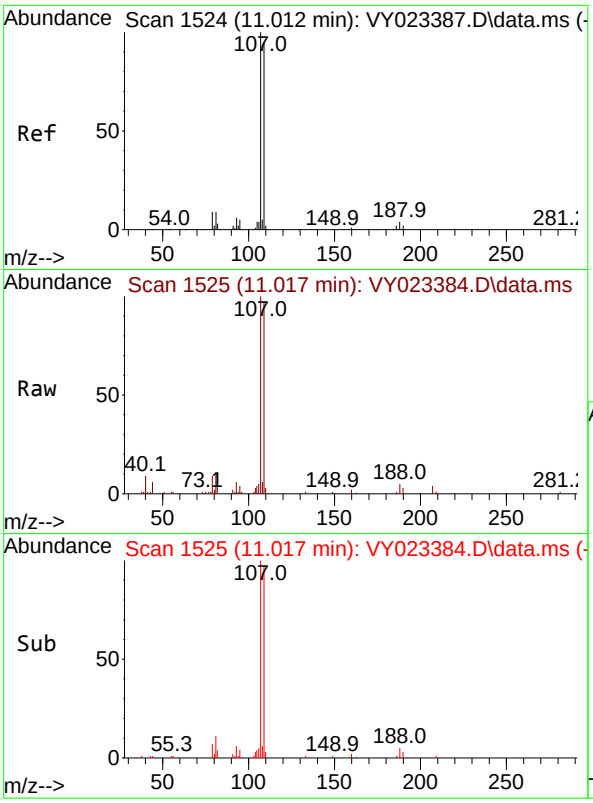


#60
Dibromochloromethane
Concen: 4.783 ug/l
RT: 10.908 min Scan# 1507
Delta R.T. -0.000 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion:129 Resp: 28135

Ion	Ratio	Lower	Upper
129	100		
127	79.7	38.6	115.7

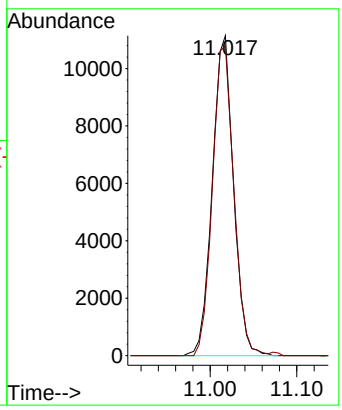




#61
1,2-Dibromoethane
Concen: 4.673 ug/l
RT: 11.017 min Scan# 1
Delta R.T. 0.006 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion:107 Resp: 1895

Ion	Ratio	Lower	Upper
107	100		
109	97.6	76.1	114.1



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC005

Manual Integrations
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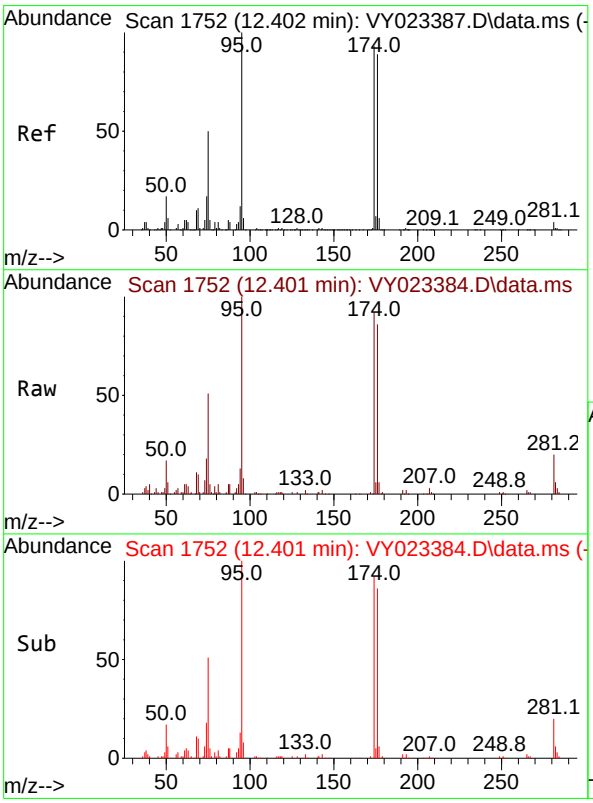
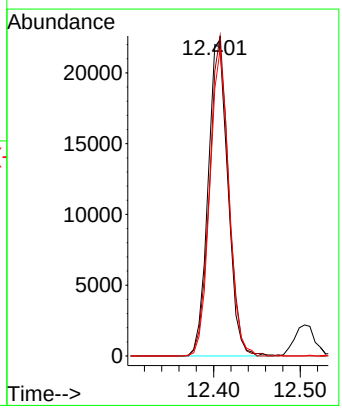
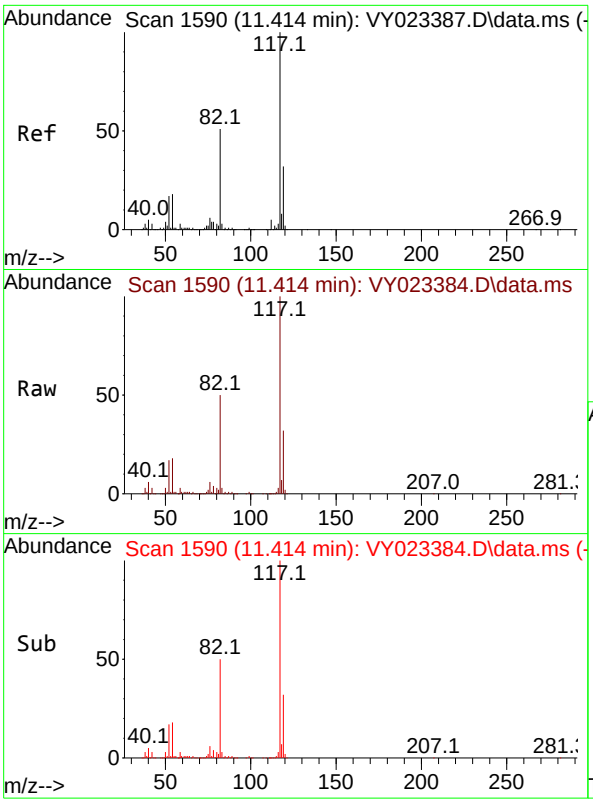


#62
4-Bromofluorobenzene
Concen: 5.548 ug/l
RT: 12.401 min Scan# 1752
Delta R.T. -0.000 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion: 95 Resp: 35355

Ion	Ratio	Lower	Upper
95	100		
174	97.9	0.0	192.8
176	94.0	0.0	187.6

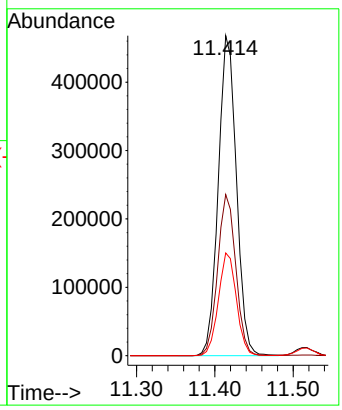




#63
Chlorobenzene-d5
Concen: 50.000 ug/l
RT: 11.414 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion:117 Resp: 75339

Ion	Ratio	Lower	Upper
117	100		
82	50.3	41.0	61.4
119	32.1	25.6	38.4



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC005

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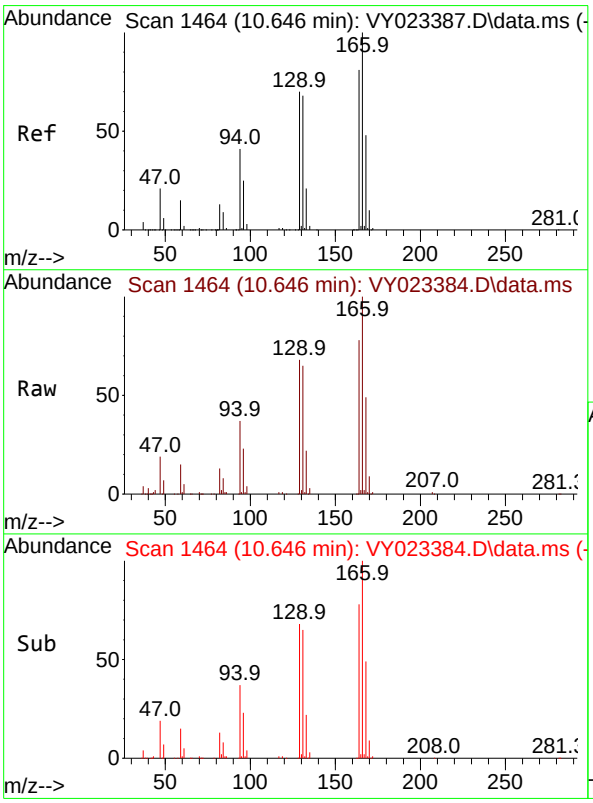
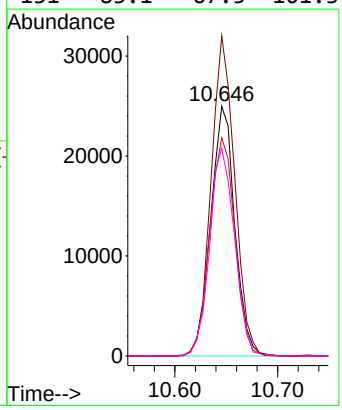
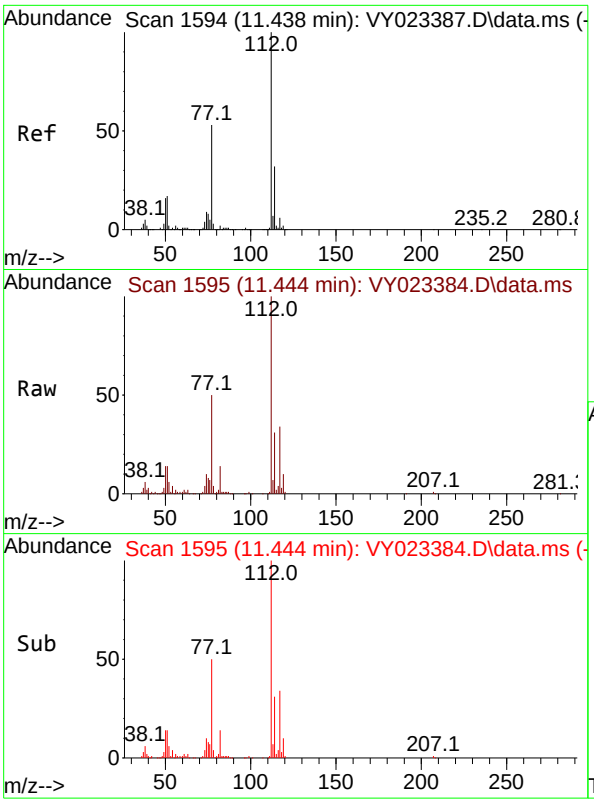


#64
Tetrachloroethene
Concen: 5.383 ug/l
RT: 10.646 min Scan# 1464
Delta R.T. -0.000 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion:164 Resp: 40570

Ion	Ratio	Lower	Upper
164	100		
166	128.1	99.4	149.0
129	87.4	69.4	104.2
131	83.1	67.5	101.3

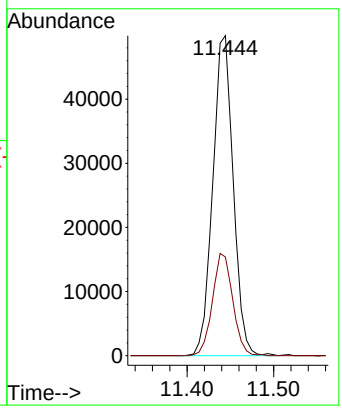




#65
Chlorobenzene
Concen: 4.997 ug/l
RT: 11.444 min Scan# 1
Delta R.T. 0.006 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion:112 Resp: 8180

Ion	Ratio	Lower	Upper
112	100		
114	30.8	25.6	38.4



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC005

Manual Integrations
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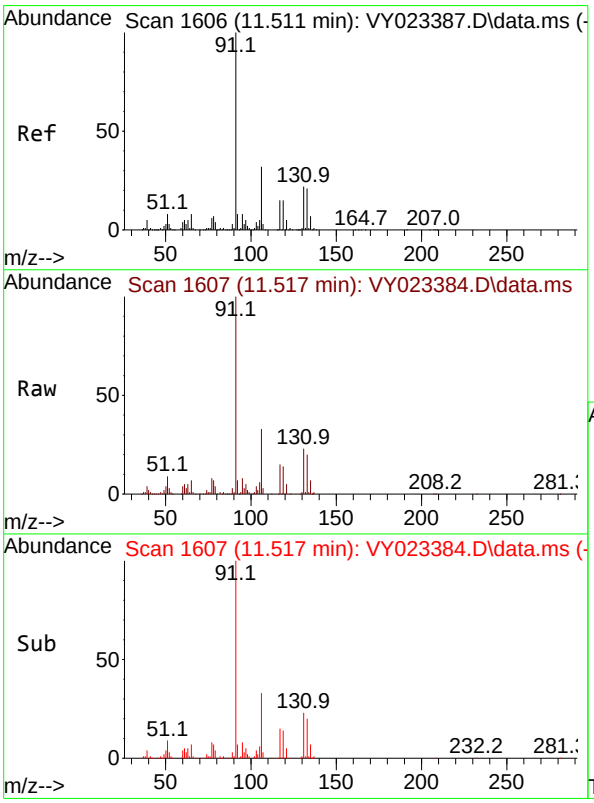
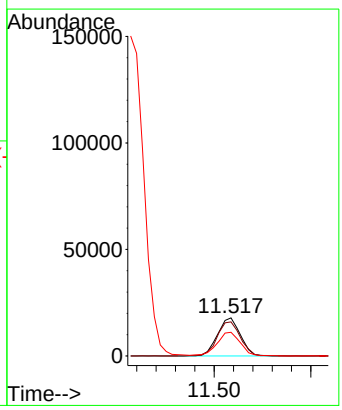
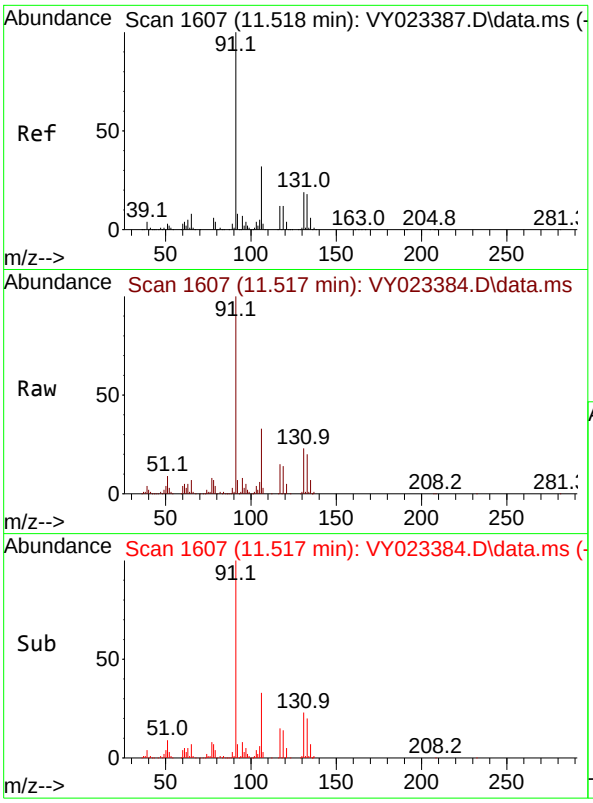


#66
1,1,1,2-Tetrachloroethane
Concen: 5.075 ug/l
RT: 11.517 min Scan# 1607
Delta R.T. 0.006 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion:131 Resp: 29222

Ion	Ratio	Lower	Upper
131	100		
133	91.7	48.4	145.2
119	64.1	32.4	97.2

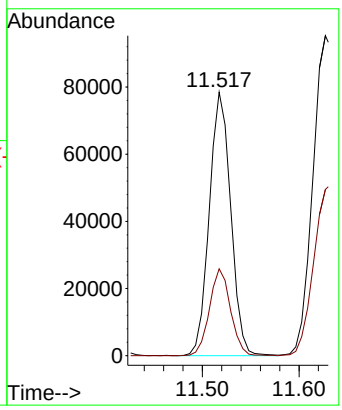




#67
Ethyl Benzene
Concen: 4.529 ug/l
RT: 11.517 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion: 91 Resp: 12100

Ion	Ratio	Lower	Upper
91	100		
106	33.0	25.8	38.8



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC005

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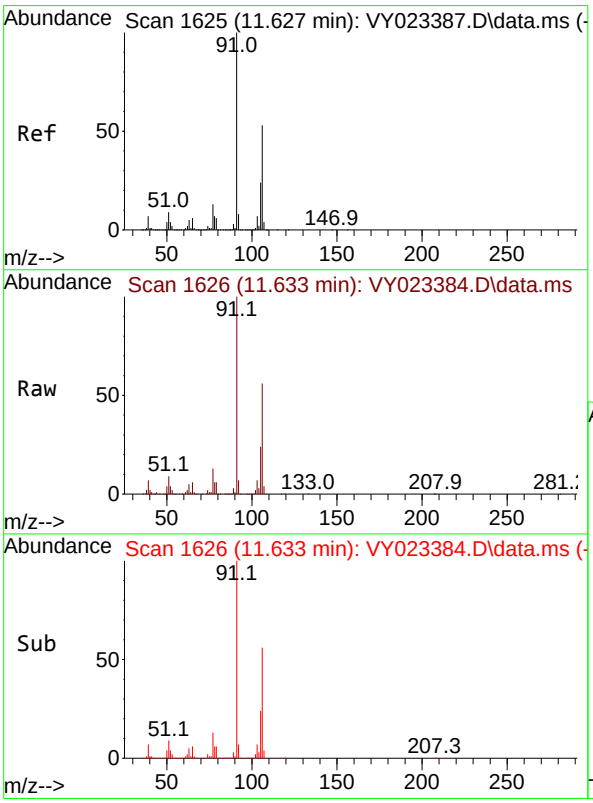
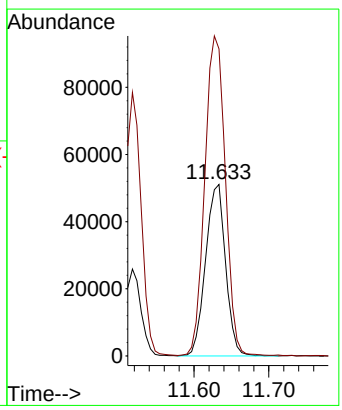
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

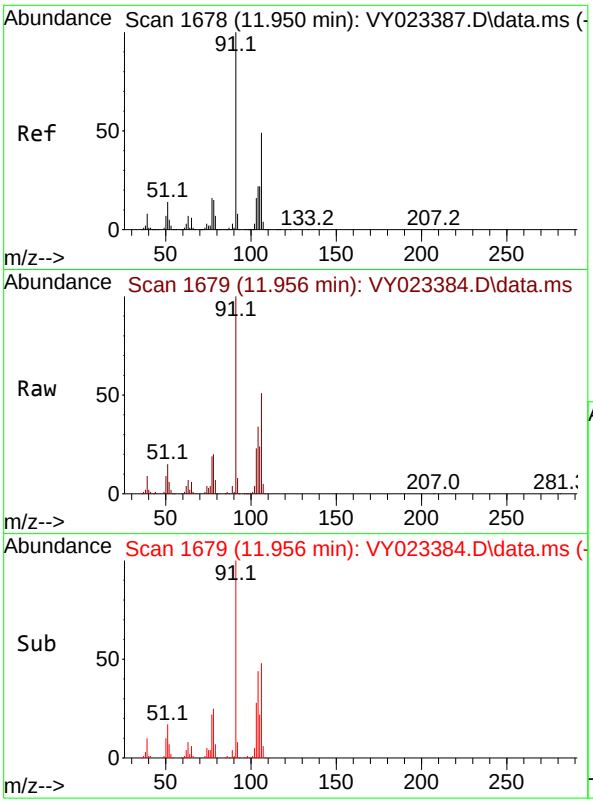


#68
m/p-Xylenes
Concen: 8.887 ug/l
RT: 11.633 min Scan# 1626
Delta R.T. 0.006 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion:106 Resp: 95176

Ion	Ratio	Lower	Upper
106	100		
91	190.5	152.6	229.0





#69
o-Xylene
Concen: 4.466 ug/l
RT: 11.956 min Scan# 1
Delta R.T. 0.006 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion:106 Resp: 4428

Ion	Ratio	Lower	Upper
106	100		
91	199.7	101.4	304.1

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC005

Manual Integrations
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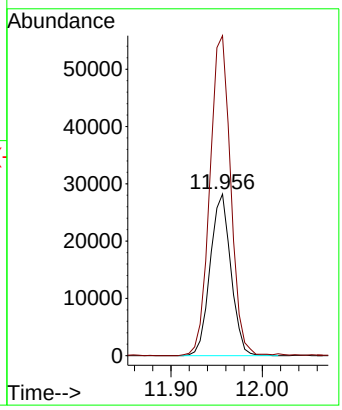
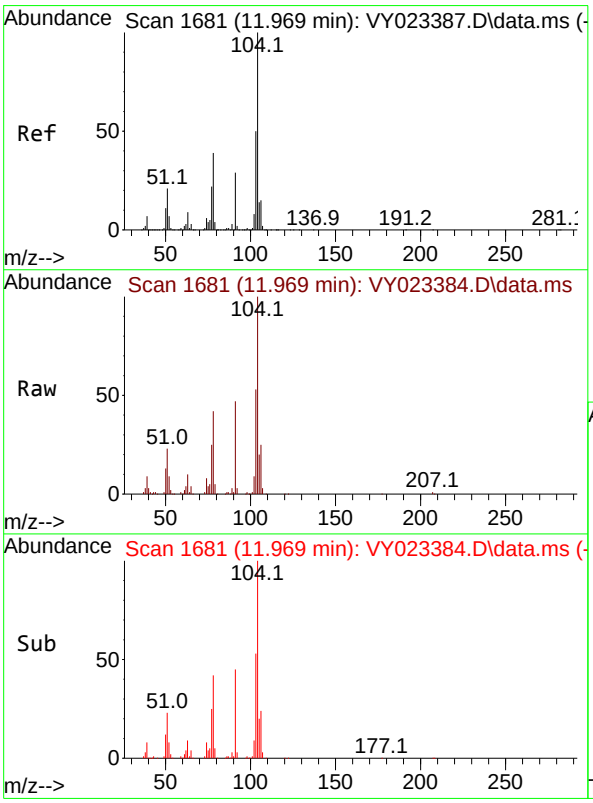
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

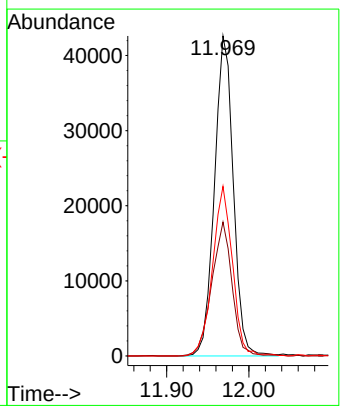


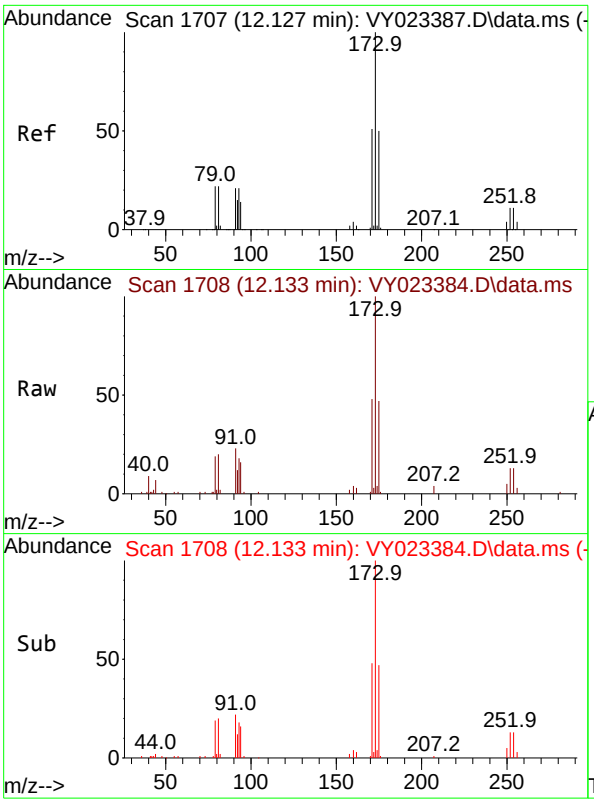


#70
Styrene
Concen: 4.152 ug/l
RT: 11.969 min Scan# 1681
Delta R.T. -0.000 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion:104 Resp: 67960

Ion	Ratio	Lower	Upper
104	100		
78	45.1	36.1	54.1
103	55.9	43.2	64.8

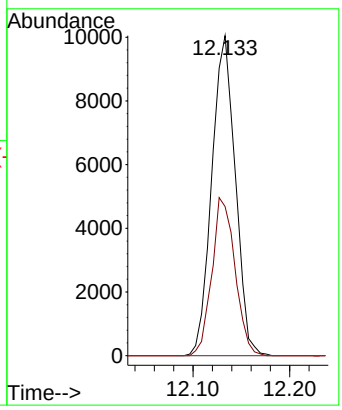




#71
Bromoform
Concen: 4.929 ug/l
RT: 12.133 min Scan# 1
Delta R.T. 0.006 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion:173 Resp: 1698

Ion	Ratio	Lower	Upper
173	100		
175	48.5	24.8	74.3
254	0.0	0.1	0.1



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC005

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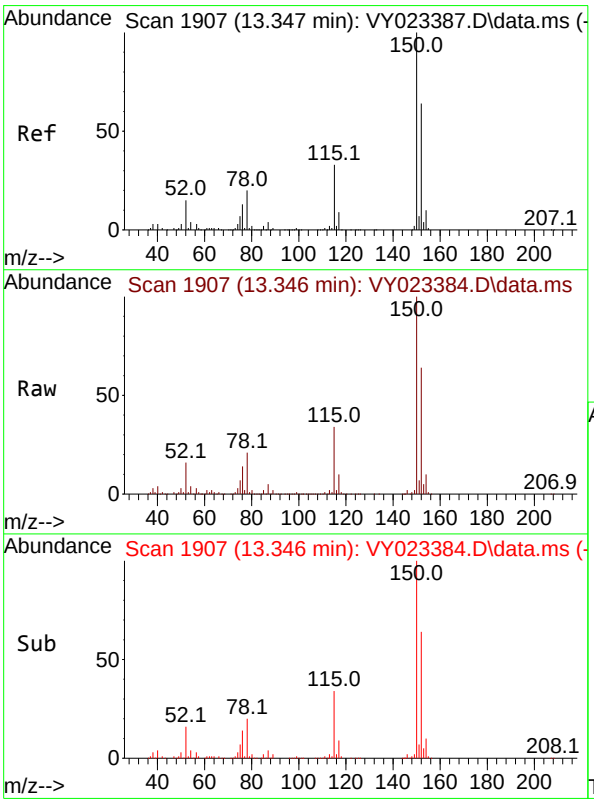
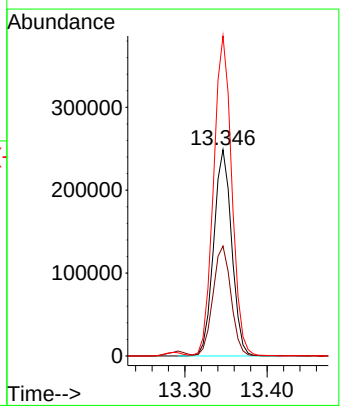
Supervised By :Mahesh Dadoda 10/10/2025

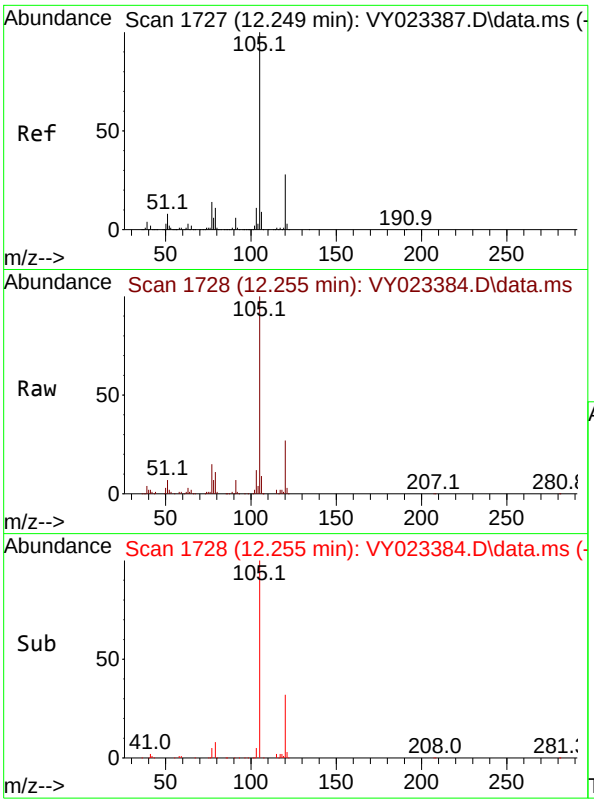


#72
1,4-Dichlorobenzene-d4
Concen: 50.000 ug/l
RT: 13.346 min Scan# 1907
Delta R.T. -0.000 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion:152 Resp: 378104

Ion	Ratio	Lower	Upper
152	100		
115	53.5	27.1	81.2
150	156.6	0.0	347.4

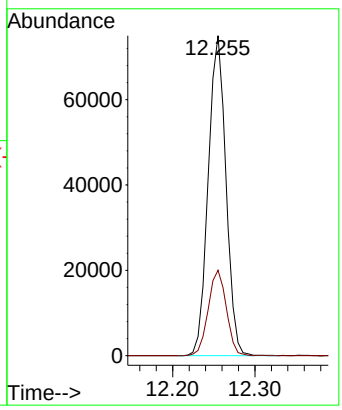




#73
Isopropylbenzene
Concen: 4.455 ug/l
RT: 12.255 min Scan# 1
Delta R.T. 0.006 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion:105 Resp: 11219

Ion	Ratio	Lower	Upper
105	100		
120	27.2	13.9	41.7



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC005

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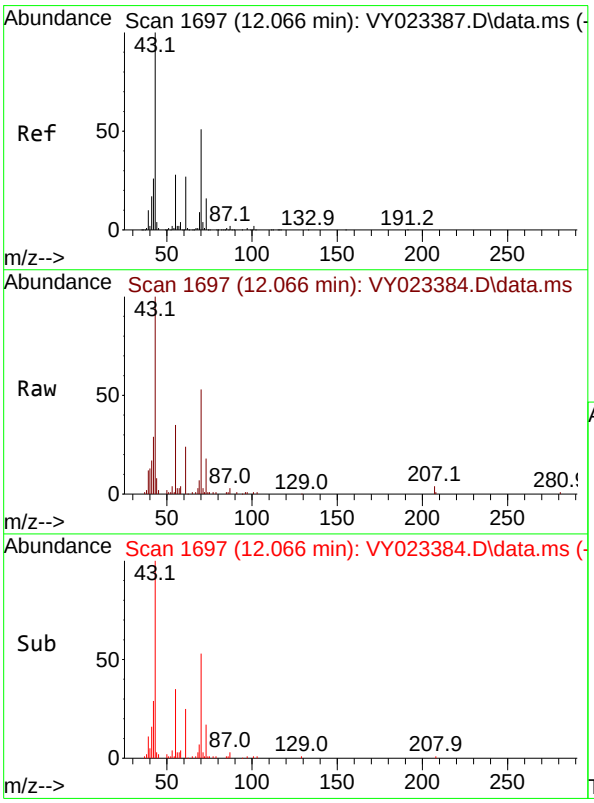
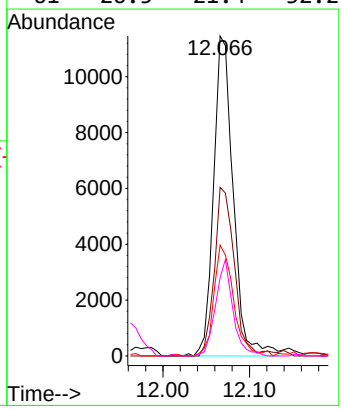
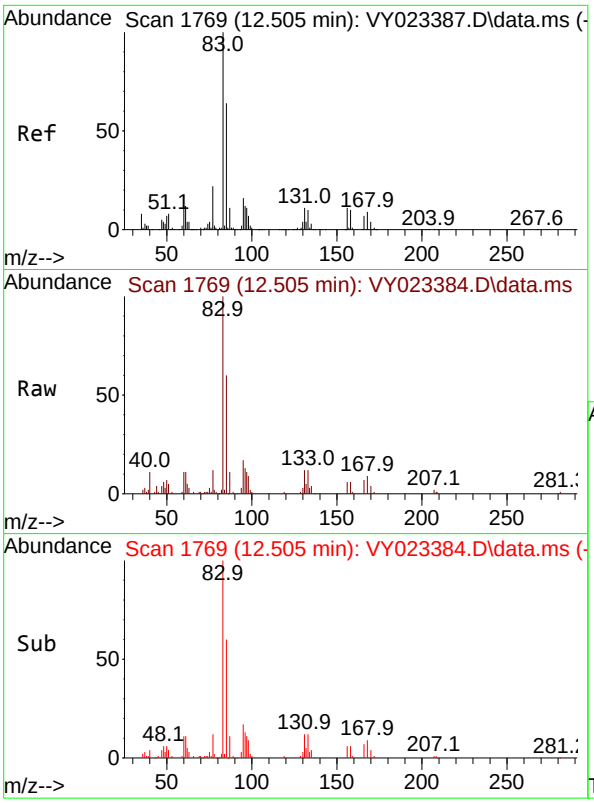


#74
N-amyl acetate
Concen: 3.833 ug/l
RT: 12.066 min Scan# 1697
Delta R.T. -0.000 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion: 43 Resp: 18041

Ion	Ratio	Lower	Upper
43	100		
70	53.0	41.1	61.7
55	35.3	23.0	34.6#
61	26.5	21.4	32.2

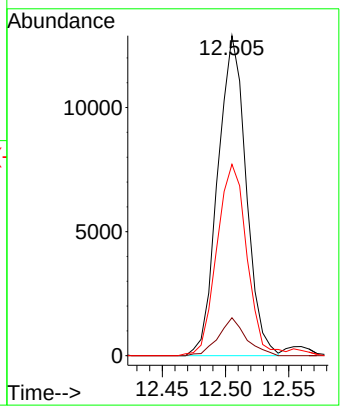




#75
1,1,2,2-Tetrachloroethane
Concen: 4.773 ug/l
RT: 12.505 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion: 83 Resp: 2005

Ion	Ratio	Lower	Upper
83	100		
131	11.6	5.9	17.6
85	63.4	31.8	95.3



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC005

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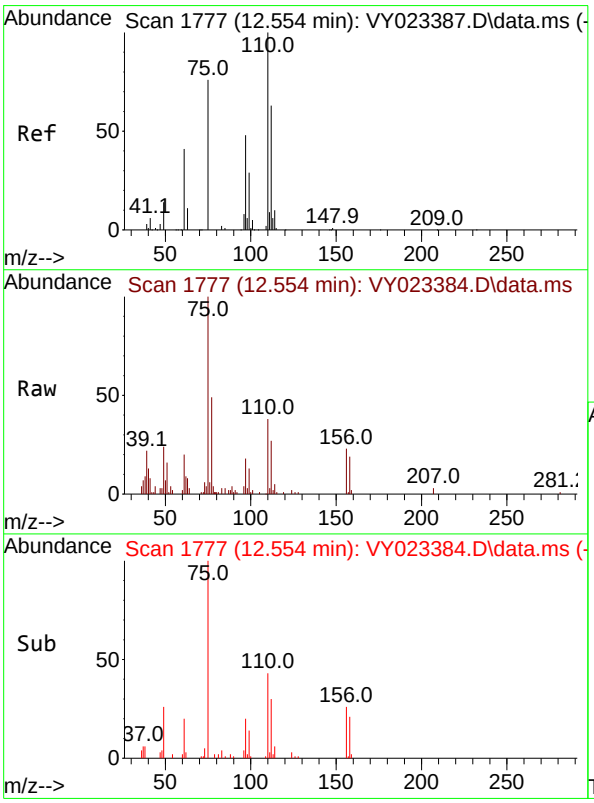
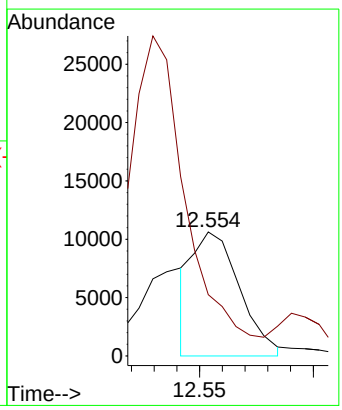
Supervised By :Mahesh Dadoda 10/10/2025

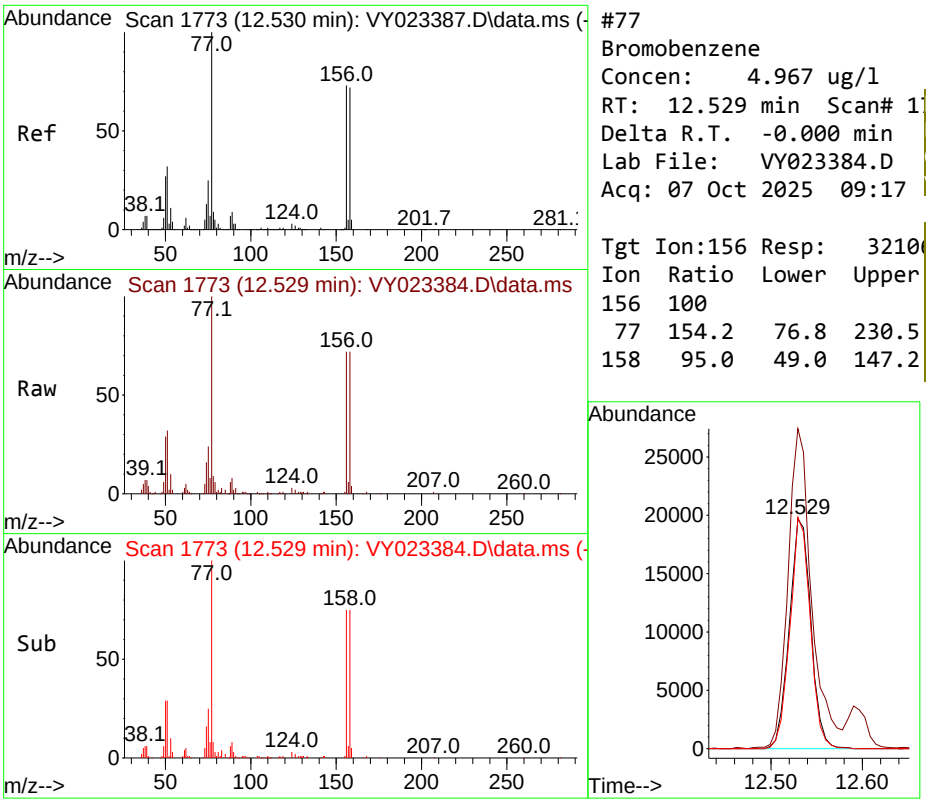


#76
1,2,3-Trichloropropane
Concen: 4.118 ug/l m
RT: 12.554 min Scan# 1777
Delta R.T. -0.000 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion: 75 Resp: 15359

Ion	Ratio	Lower	Upper
75	100		
77	0.0	0.0	0.0





#77
Bromobenzene
Concen: 4.967 ug/l
RT: 12.529 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion:156 Resp: 3210

Ion	Ratio	Lower	Upper
156	100		
77	154.2	76.8	230.5
158	95.0	49.0	147.2

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC005

Manual Integrations
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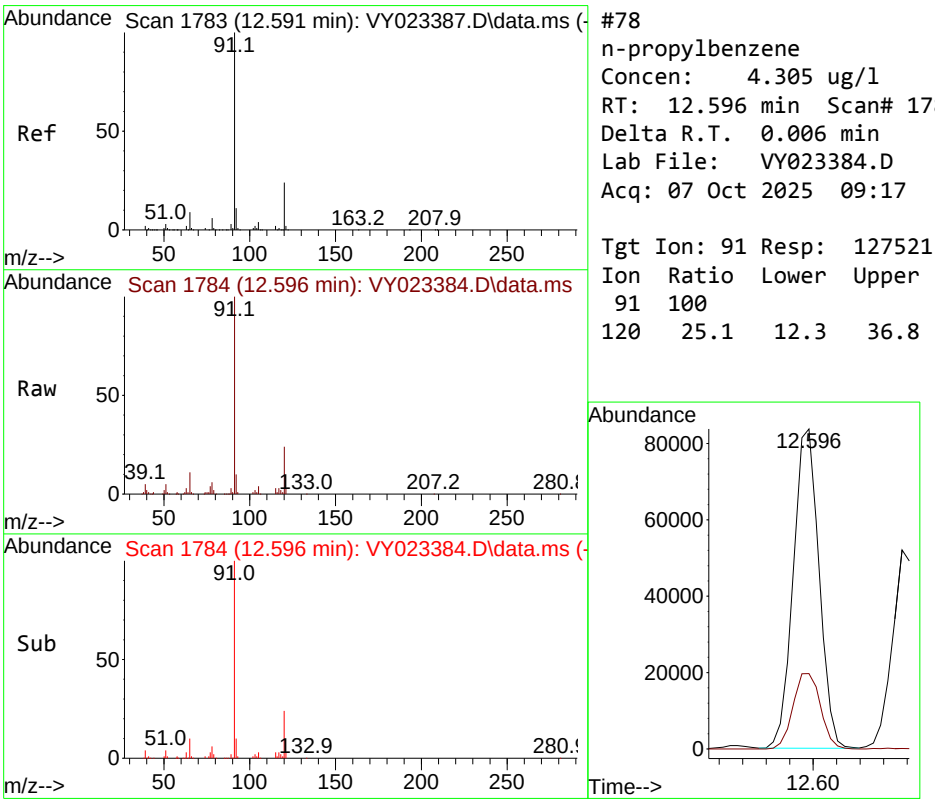
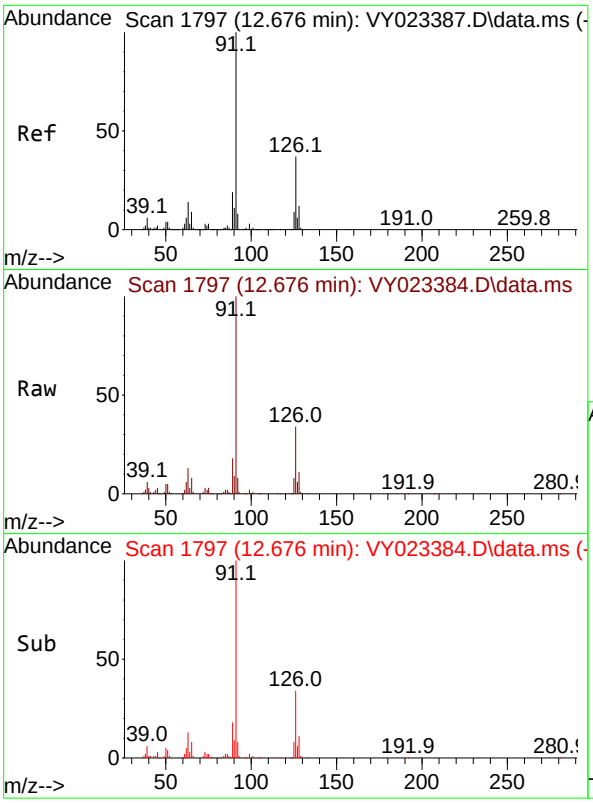
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025



#78
n-propylbenzene
Concen: 4.305 ug/l
RT: 12.596 min Scan# 1784
Delta R.T. 0.006 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion: 91 Resp: 127521

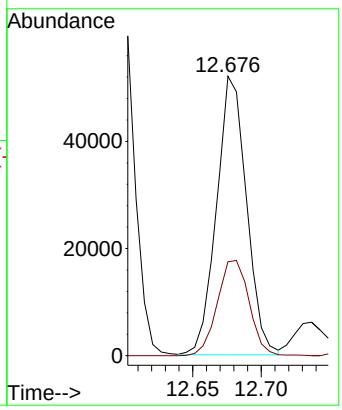
Ion	Ratio	Lower	Upper
91	100		
120	25.1	12.3	36.8



#79
2-Chlorotoluene
Concen: 4.631 ug/l
RT: 12.676 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion: 91 Resp: 7919

Ion	Ratio	Lower	Upper
91	100		
126	36.4	18.5	55.5



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC005

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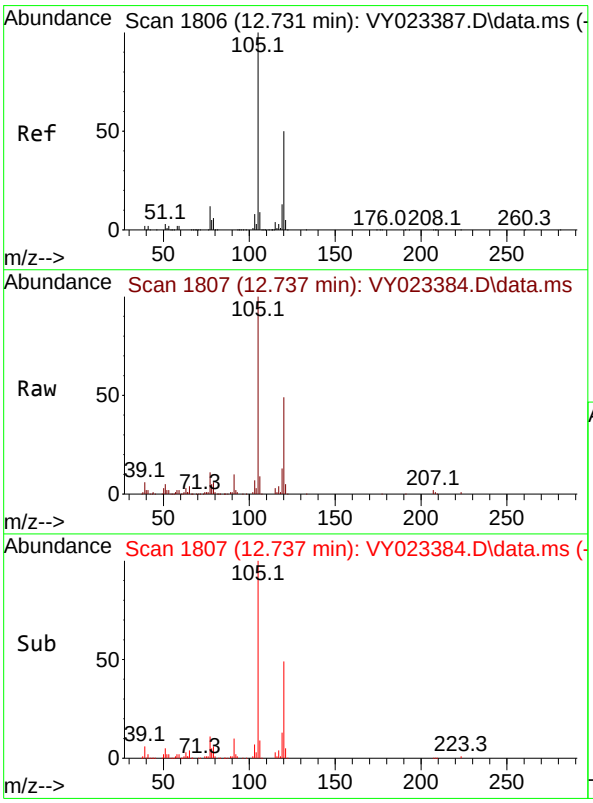
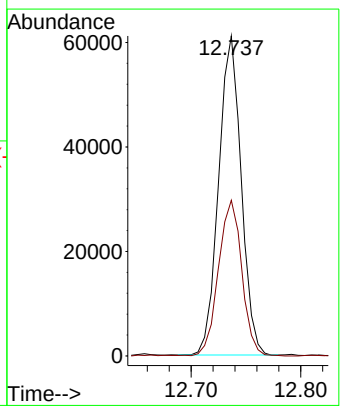
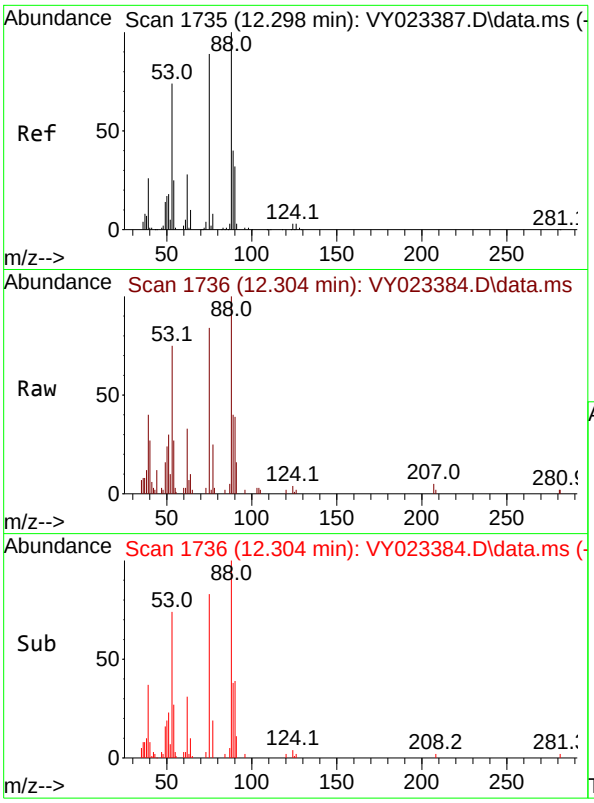


#80
1,3,5-Trimethylbenzene
Concen: 4.264 ug/l
RT: 12.737 min Scan# 1807
Delta R.T. 0.006 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion:105 Resp: 87297

Ion	Ratio	Lower	Upper
105	100		
120	50.6	25.4	76.4

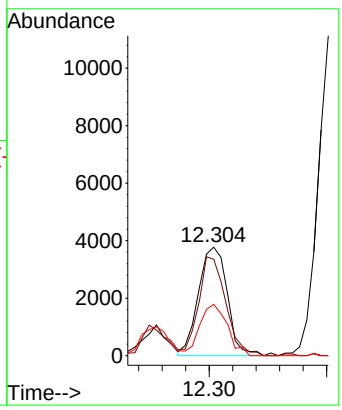




#81
trans-1,4-Dichloro-2-butene
Concen: 4.680 ug/l
RT: 12.304 min Scan# 1
Delta R.T. 0.006 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion: 75 Resp: 647

Ion	Ratio	Lower	Upper
75	100		
53	85.6	68.6	102.8
89	44.4	39.0	58.4



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC005

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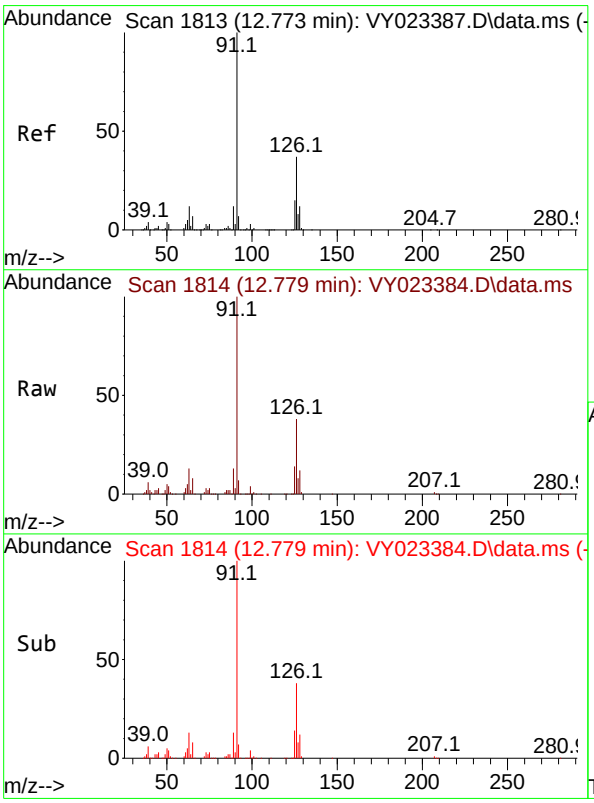
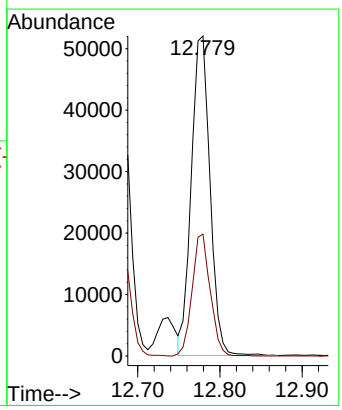
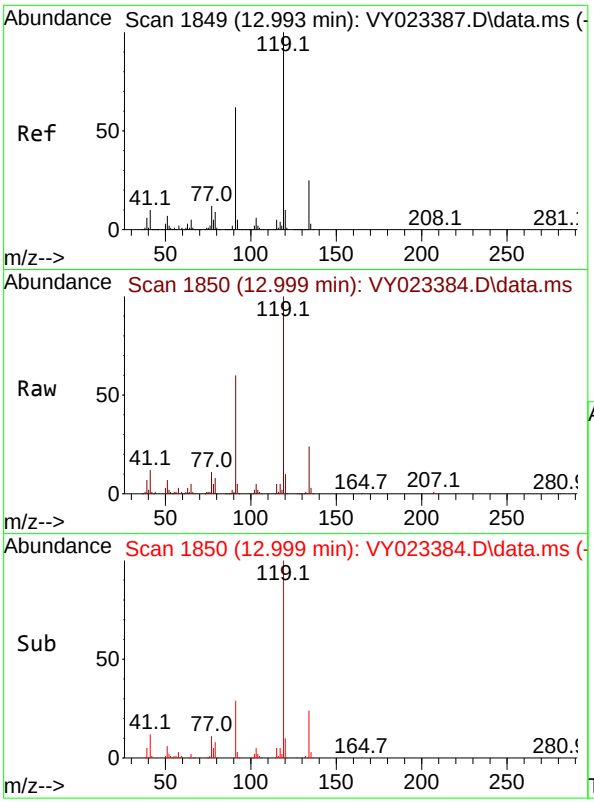


#82
4-Chlorotoluene
Concen: 4.600 ug/l
RT: 12.779 min Scan# 1814
Delta R.T. 0.006 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion: 91 Resp: 82155

Ion	Ratio	Lower	Upper
91	100		
126	36.9	18.4	55.4

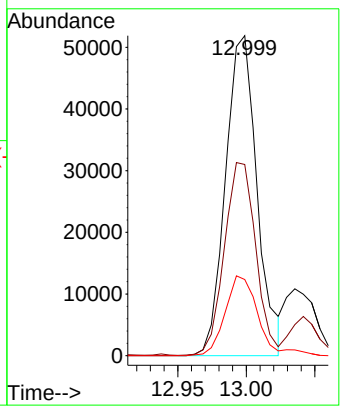




#83
tert-Butylbenzene
Concen: 4.457 ug/l
RT: 12.999 min Scan# 1
Delta R.T. 0.006 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion:119 Resp: 8315

Ion	Ratio	Lower	Upper
119	100		
91	60.0	29.9	89.8
134	26.2	12.9	38.7



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC005

Manual Integrations
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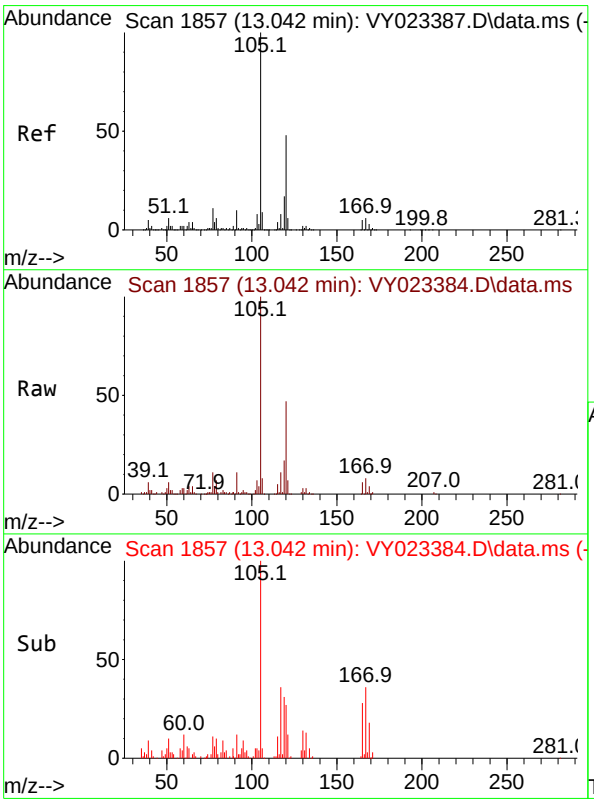
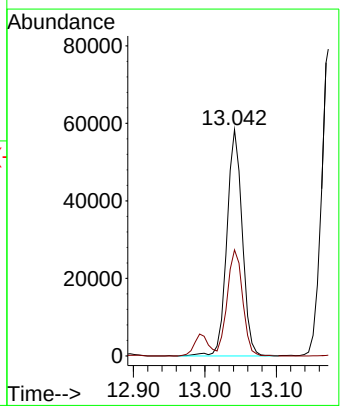
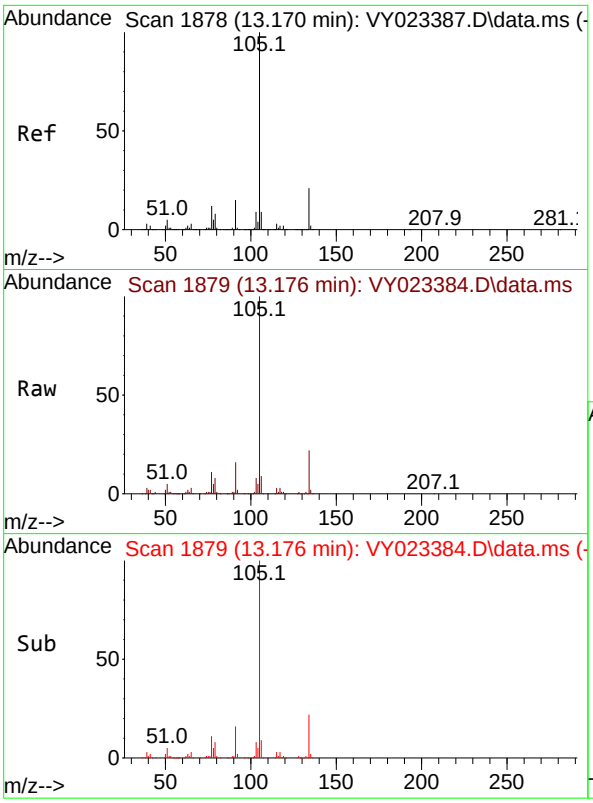


#84
1,2,4-Trimethylbenzene
Concen: 4.294 ug/l
RT: 13.042 min Scan# 1857
Delta R.T. -0.000 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion:105 Resp: 86988

Ion	Ratio	Lower	Upper
105	100		
120	46.8	23.8	71.2

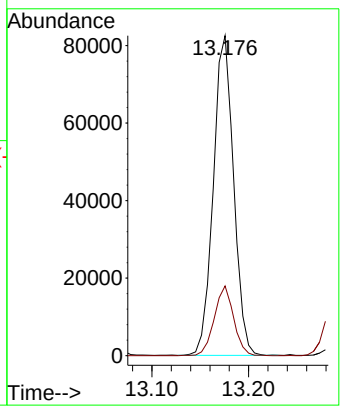




#85
sec-Butylbenzene
Concen: 4.443 ug/l
RT: 13.176 min Scan# 1
Delta R.T. 0.006 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion:105 Resp: 12006

Ion	Ratio	Lower	Upper
105	100		
134	20.9	10.7	32.1



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC005

Manual Integrations
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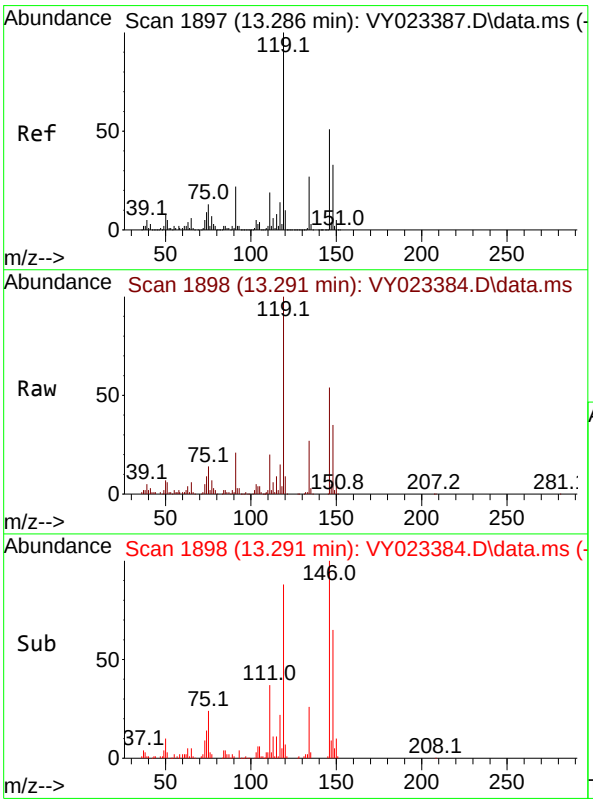
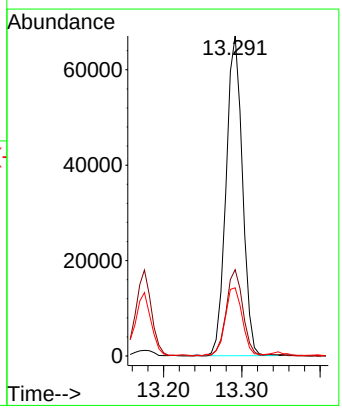
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

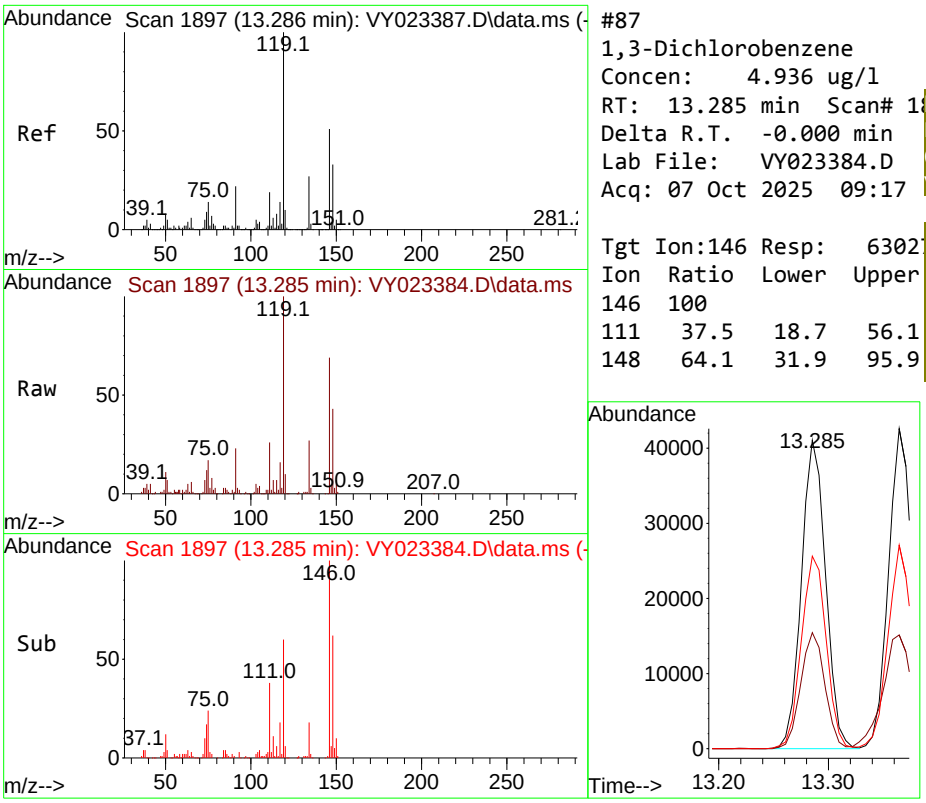


#86
p-Isopropyltoluene
Concen: 4.264 ug/l
RT: 13.291 min Scan# 1898
Delta R.T. 0.006 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion:119 Resp: 97377

Ion	Ratio	Lower	Upper
119	100		
134	27.5	13.6	40.7
91	22.7	10.9	32.9





#87
1,3-Dichlorobenzene
Concen: 4.936 ug/l
RT: 13.285 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

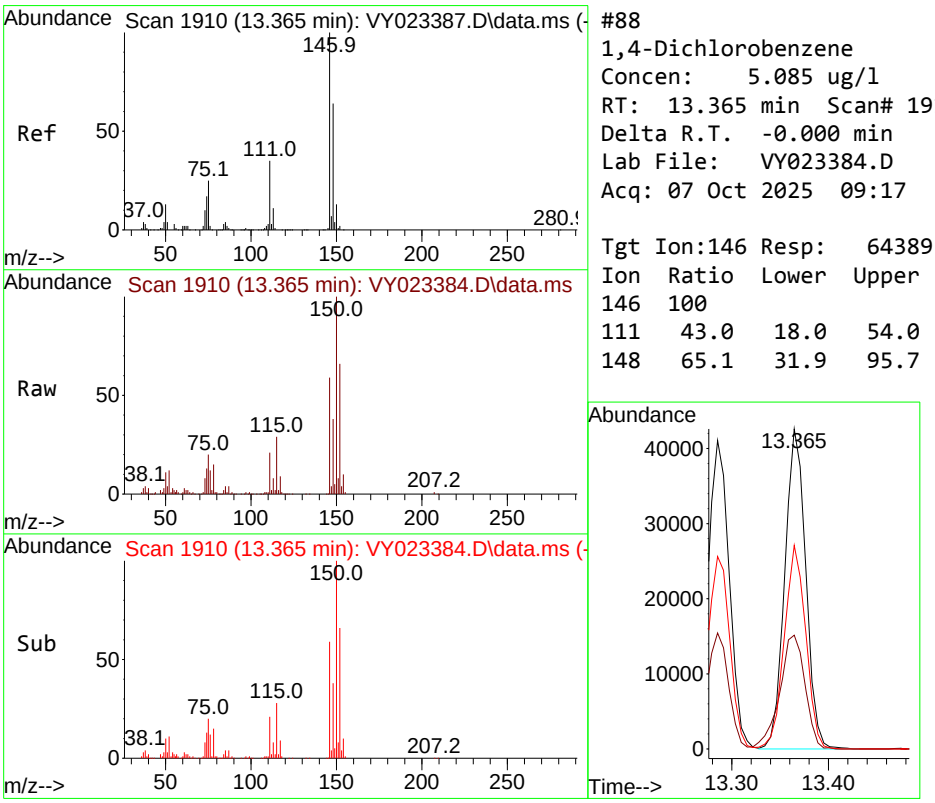
Tgt Ion:146 Resp: 6302

Ion	Ratio	Lower	Upper
146	100		
111	37.5	18.7	56.1
148	64.1	31.9	95.9

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC005

Manual Integrations APPROVED

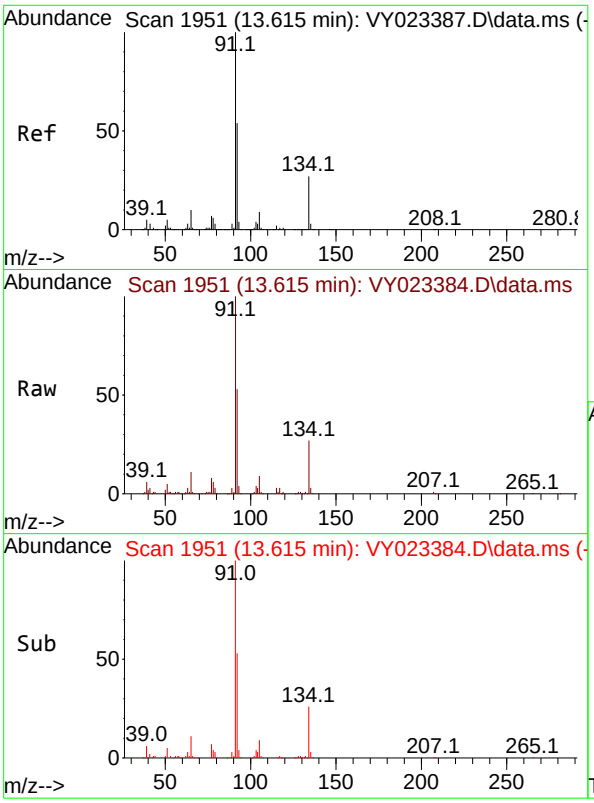
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025



#88
1,4-Dichlorobenzene
Concen: 5.085 ug/l
RT: 13.365 min Scan# 1910
Delta R.T. -0.000 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion:146 Resp: 64389

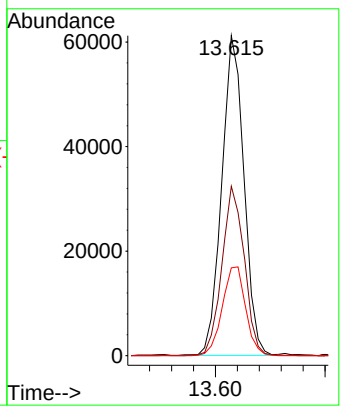
Ion	Ratio	Lower	Upper
146	100		
111	43.0	18.0	54.0
148	65.1	31.9	95.7



#89
n-Butylbenzene
Concen: 4.274 ug/l
RT: 13.615 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion: 91 Resp: 8617

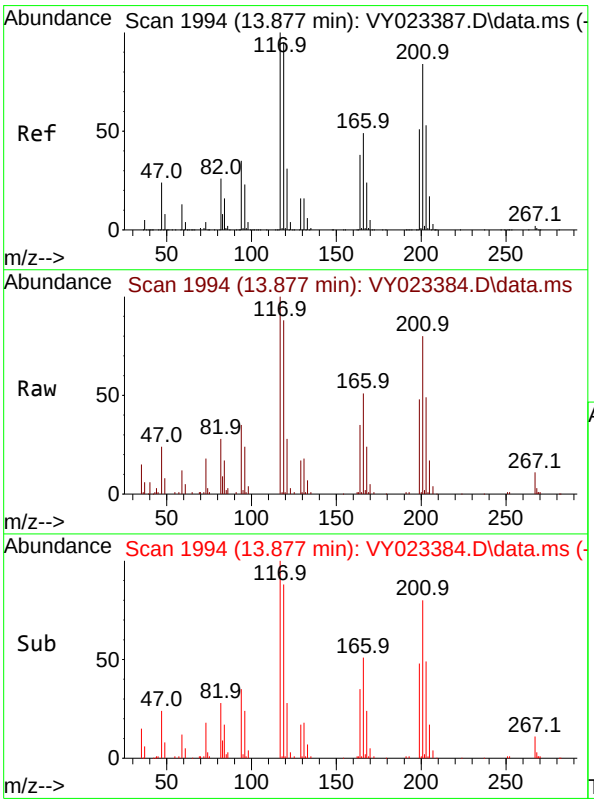
Ion	Ratio	Lower	Upper
91	100		
92	53.3	27.0	80.8
134	29.2	14.1	42.2



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC005

Manual Integrations
APPROVED

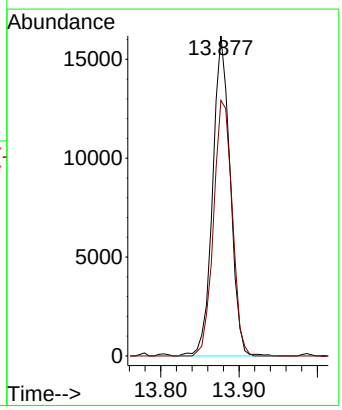
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

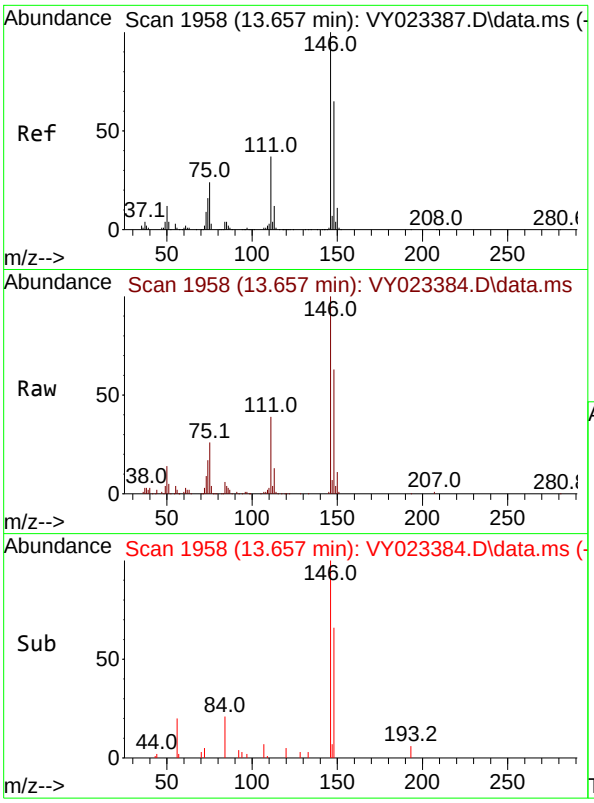


#90
Hexachloroethane
Concen: 5.084 ug/l
RT: 13.877 min Scan# 1994
Delta R.T. -0.000 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion:117 Resp: 25204

Ion	Ratio	Lower	Upper
117	100		
201	84.7	43.8	131.4

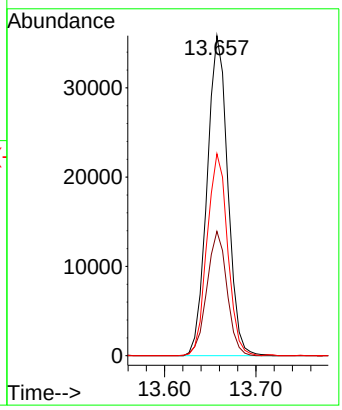




#91
1,2-Dichlorobenzene
Concen: 5.041 ug/l
RT: 13.657 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion:146 Resp: 5616

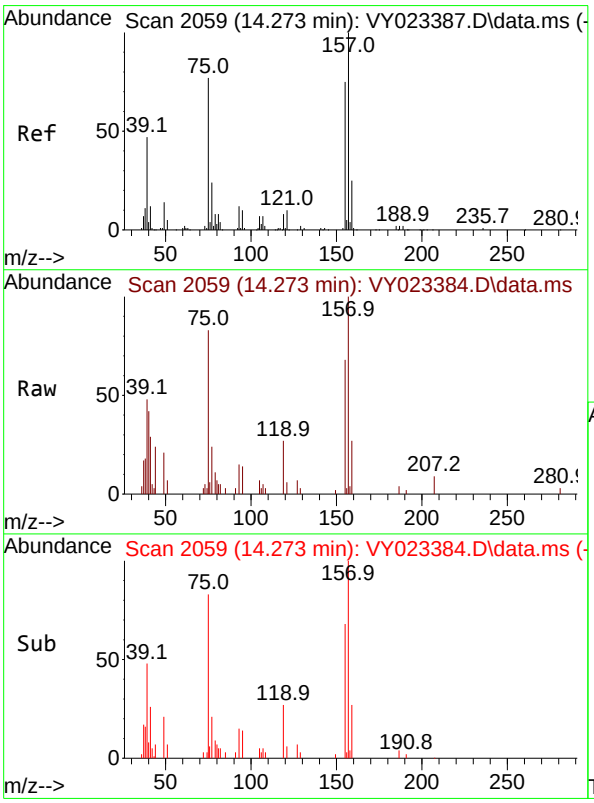
Ion	Ratio	Lower	Upper
146	100		
111	37.8	19.0	57.0
148	63.0	32.1	96.3



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC005

Manual Integrations
APPROVED

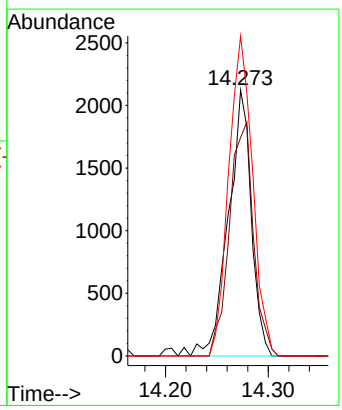
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

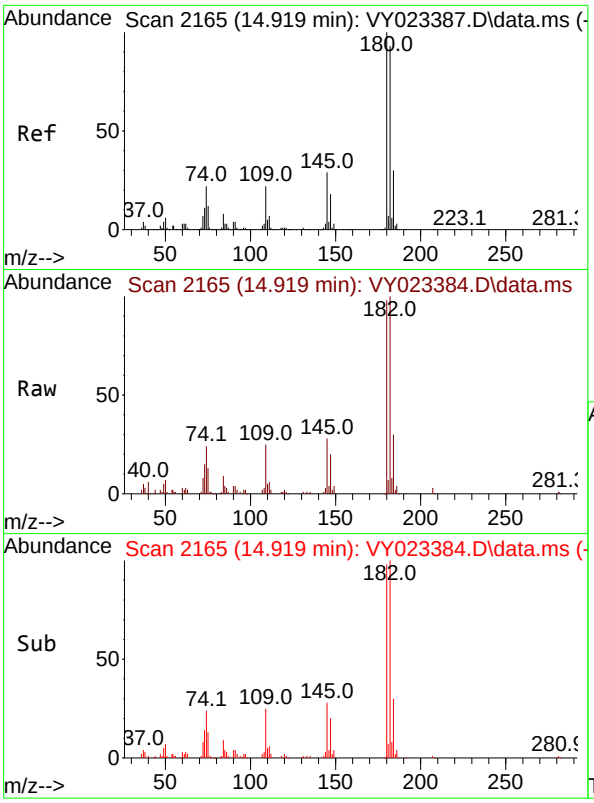


#92
1,2-Dibromo-3-Chloropropane
Concen: 4.964 ug/l
RT: 14.273 min Scan# 2059
Delta R.T. -0.000 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion: 75 Resp: 3305

Ion	Ratio	Lower	Upper
75	100		
155	91.7	50.0	150.0
157	124.4	63.8	191.5

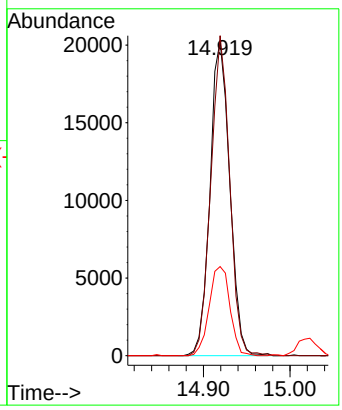




#93
1,2,4-Trichlorobenzene
Concen: 4.875 ug/l
RT: 14.919 min Scan# 21
Delta R.T. -0.000 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion:180 Resp: 3200

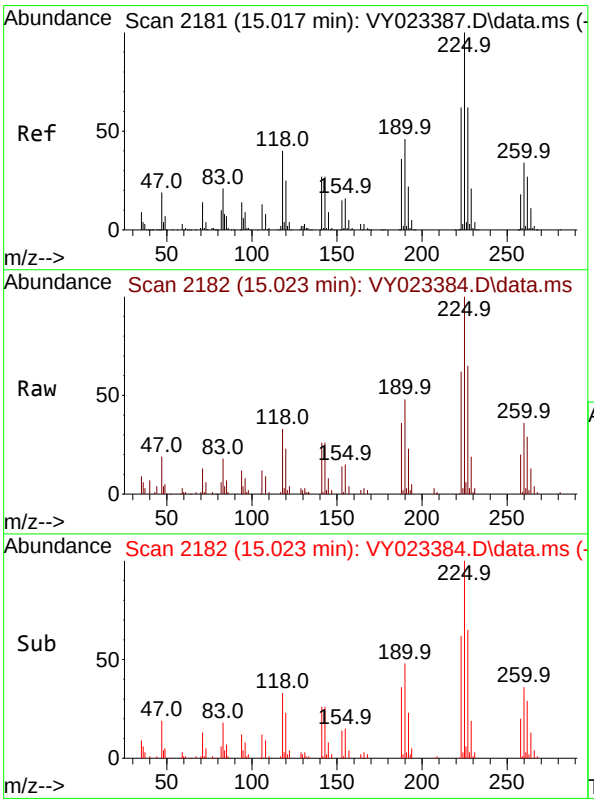
Ion	Ratio	Lower	Upper
180	100		
182	97.1	47.9	143.6
145	29.9	14.7	44.1



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC005

Manual Integrations APPROVED

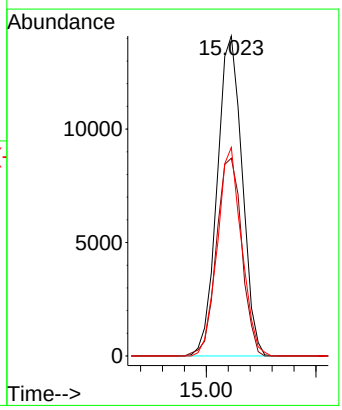
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

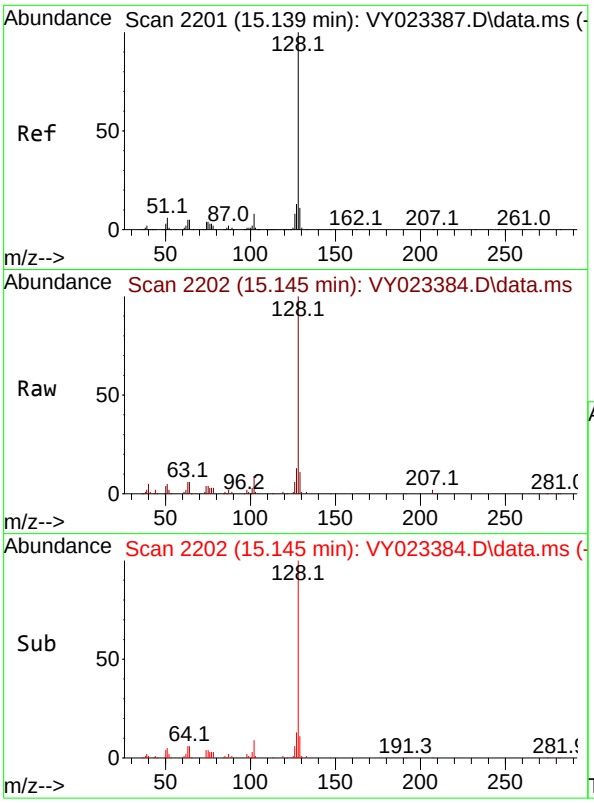


#94
Hexachlorobutadiene
Concen: 5.456 ug/l
RT: 15.023 min Scan# 2182
Delta R.T. 0.006 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion:225 Resp: 22316

Ion	Ratio	Lower	Upper
225	100		
223	62.8	30.8	92.3
227	63.1	31.9	95.7

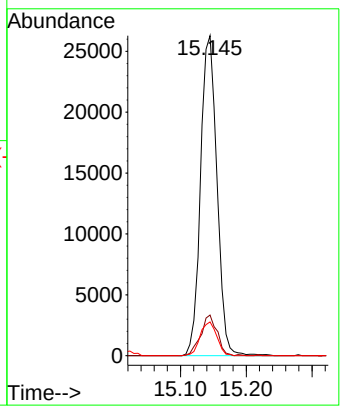




#95
Naphthalene
Concen: 4.360 ug/l
RT: 15.145 min Scan# 2
Delta R.T. 0.006 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion:128 Resp: 4559

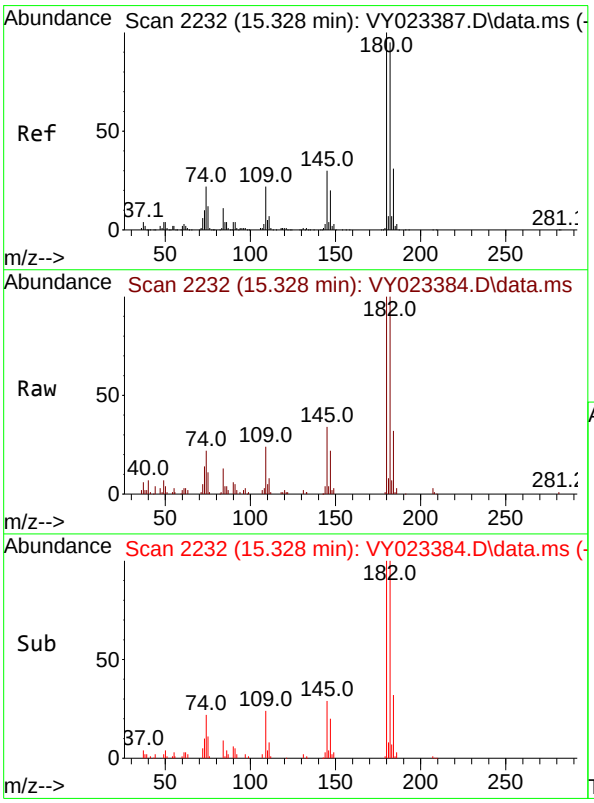
Ion	Ratio	Lower	Upper
128	100		
127	12.7	10.4	15.6
129	10.7	8.9	13.3



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC005

Manual Integrations APPROVED

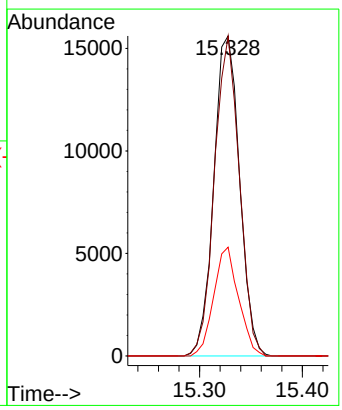
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025



#96
1,2,3-Trichlorobenzene
Concen: 4.772 ug/l
RT: 15.328 min Scan# 2232
Delta R.T. -0.000 min
Lab File: VY023384.D
Acq: 07 Oct 2025 09:17

Tgt Ion:180 Resp: 27176

Ion	Ratio	Lower	Upper
180	100		
182	96.3	47.9	143.8
145	32.7	15.3	45.9



Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY100725\
Data File : VY023385.D
Acq On : 07 Oct 2025 10:02
Operator : SY/MD
Sample : VSTDICC010
Misc : 5.00g/5.0mL/MSVOA_Y/SOIL
ALS Vial : 4 Sample Multiplier: 1

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC010

Manual Integrations APPROVED

Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

Quant Time: Oct 08 04:40:53 2025
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260
QLast Update : Wed Oct 08 04:39:16 2025
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units		Dev(Min)
Internal Standards							
1) Pentafluorobenzene	7.713	168	559828	50.000	ug/l		0.00
34) 1,4-Difluorobenzene	8.615	114	847077	50.000	ug/l		0.00
63) Chlorobenzene-d5	11.414	117	736152	50.000	ug/l		0.00
72) 1,4-Dichlorobenzene-d4	13.346	152	374998	50.000	ug/l		0.00
System Monitoring Compounds							
33) 1,2-Dichloroethane-d4	8.067	65	48826	10.071	ug/l		0.00
Spiked Amount 50.000	Range 50 - 163		Recovery = 20.140%#				
35) Dibromofluoromethane	7.634	113	53279	10.364	ug/l		0.00
Spiked Amount 50.000	Range 54 - 147		Recovery = 20.720%#				
50) Toluene-d8	10.109	98	198242	10.225	ug/l		0.00
Spiked Amount 50.000	Range 58 - 134		Recovery = 20.460%#				
62) 4-Bromofluorobenzene	12.401	95	62601	10.235	ug/l		0.00
Spiked Amount 50.000	Range 30 - 143		Recovery = 20.460%#				
Target Compounds							Qvalue
2) Dichlorodifluoromethane	1.867	85	44666	10.129	ug/l		97
3) Chloromethane	2.068	50	62413	9.957	ug/l		97
4) Vinyl Chloride	2.202	62	76587	9.676	ug/l		99
5) Bromomethane	2.592	94	66689	10.271	ug/l		90
6) Chloroethane	2.732	64	51757	9.632	ug/l		92
7) Trichlorofluoromethane	3.055	101	102972	10.128	ug/l		99
8) Diethyl Ether	3.458	74	26719	10.047	ug/l		96
9) 1,1,2-Trichlorotrifluo...	3.818	101	54405	10.011	ug/l		99
10) Methyl Iodide	4.007	142	56313	8.967	ug/l		99
11) Tert butyl alcohol	4.854	59	20540	71.998	ug/l	#	89
12) 1,1-Dichloroethene	3.793	96	53191	10.173	ug/l		98
13) Acrolein	3.653	56	24014	49.681	ug/l		94
14) Allyl chloride	4.385	41	62154	9.494	ug/l		99
15) Acrylonitrile	5.061	53	51937	49.854	ug/l		99
16) Acetone	3.872	43	65410	59.997	ug/l		94
17) Carbon Disulfide	4.104	76	153055	9.382	ug/l		100
18) Methyl Acetate	4.391	43	29725	10.728	ug/l		100
19) Methyl tert-butyl Ether	5.116	73	120347	9.830	ug/l		100
20) Methylene Chloride	4.616	84	71034	12.016	ug/l		96
21) trans-1,2-Dichloroethene	5.116	96	56465	9.710	ug/l		97
22) Diisopropyl ether	6.024	45	138589	9.547	ug/l		98
23) Vinyl Acetate	5.963	43	361478	45.300	ug/l		99
24) 1,1-Dichloroethane	5.915	63	93512	9.772	ug/l		98
25) 2-Butanone	6.890	43	75171	55.784	ug/l		92
26) 2,2-Dichloropropane	6.890	77	86325	10.153	ug/l		99
27) cis-1,2-Dichloroethene	6.896	96	65335	9.905	ug/l		99
28) Bromochloromethane	7.244	49	36132	9.733	ug/l		99
29) Tetrahydrofuran	7.262	42	38990	48.749	ug/l		99
30) Chloroform	7.421	83	102058	9.890	ug/l		99
31) Cyclohexane	7.701	56	80245	9.495	ug/l	#	88
32) 1,1,1-Trichloroethane	7.622	97	91186	9.844	ug/l		99
36) 1,1-Dichloropropene	7.835	75	69913	9.639	ug/l		99
37) Ethyl Acetate	6.988	43	27388	9.551	ug/l		96
38) Carbon Tetrachloride	7.817	117	84799	10.065	ug/l		99
39) Methylcyclohexane	9.109	83	82275	8.860	ug/l		95
40) Benzene	8.079	78	220629	9.758	ug/l		100

Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY100725\
Data File : VY023385.D
Acq On : 07 Oct 2025 10:02
Operator : SY/MD
Sample : VSTDICC010
Misc : 5.00g/5.0mL/MSVOA_Y/SOIL
ALS Vial : 4 Sample Multiplier: 1

Quant Time: Oct 08 04:40:53 2025
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260
QLast Update : Wed Oct 08 04:39:16 2025
Response via : Initial Calibration

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC010

Manual Integrations APPROVED

Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

Compound	R.T.	QIon	Response	Conc	Units		Dev(Min)
41) Methacrylonitrile	7.225	41	14344	9.632	ug/l	#	92
42) 1,2-Dichloroethane	8.158	62	58541	10.174	ug/l		99
43) Isopropyl Acetate	8.201	43	53042	9.510	ug/l		98
44) Trichloroethene	8.865	130	64537	10.171	ug/l		96
45) 1,2-Dichloropropane	9.140	63	49009	9.632	ug/l		100
46) Dibromomethane	9.231	93	30780	9.890	ug/l		99
47) Bromodichloromethane	9.426	83	78392	10.007	ug/l		99
48) Methyl methacrylate	9.225	41	23484	9.023	ug/l		97
49) 1,4-Dioxane	9.231	88	6822	211.693	ug/l		94
51) 4-Methyl-2-Pentanone	9.999	43	134746	47.165	ug/l		99
52) Toluene	10.170	92	138662	9.661	ug/l		100
53) t-1,3-Dichloropropene	10.396	75	64315	9.559	ug/l		96
54) cis-1,3-Dichloropropene	9.853	75	77905	9.687	ug/l		98
55) 1,1,2-Trichloroethane	10.572	97	41881	10.118	ug/l		92
56) Ethyl methacrylate	10.438	69	42096	8.830	ug/l		98
57) 1,3-Dichloropropane	10.719	76	64537	9.633	ug/l		98
58) 2-Chloroethyl Vinyl ether	9.713	63	94970m	45.535	ug/l		
59) 2-Hexanone	10.761	43	99175	50.138	ug/l		96
60) Dibromochloromethane	10.908	129	57151	10.123	ug/l		97
61) 1,2-Dibromoethane	11.011	107	38861	9.979	ug/l		99
64) Tetrachloroethene	10.646	164	76110	10.335	ug/l		98
65) Chlorobenzene	11.438	112	161155	10.074	ug/l		96
66) 1,1,1,2-Tetrachloroethane	11.517	131	57233	10.173	ug/l		98
67) Ethyl Benzene	11.517	91	251958	9.651	ug/l		98
68) m/p-Xylenes	11.627	106	198866	19.004	ug/l		99
69) o-Xylene	11.950	106	91710	9.467	ug/l		100
70) Styrene	11.969	104	151094	9.446	ug/l		99
71) Bromoform	12.133	173	35681	10.595	ug/l	#	94
73) Isopropylbenzene	12.249	105	236489	9.467	ug/l		99
74) N-amyl acetate	12.066	43	40098	8.590	ug/l		97
75) 1,1,2,2-Tetrachloroethane	12.505	83	41130	9.871	ug/l		97
76) 1,2,3-Trichloropropane	12.554	75	29944m	8.095	ug/l		
77) Bromobenzene	12.529	156	66002	10.295	ug/l		99
78) n-propylbenzene	12.590	91	275671	9.384	ug/l		100
79) 2-Chlorotoluene	12.676	91	165582	9.762	ug/l		100
80) 1,3,5-Trimethylbenzene	12.731	105	191799	9.445	ug/l		100
81) trans-1,4-Dichloro-2-b...	12.298	75	13110	9.556	ug/l		99
82) 4-Chlorotoluene	12.773	91	169968	9.595	ug/l		100
83) tert-Butylbenzene	12.993	119	177250	9.579	ug/l		99
84) 1,2,4-Trimethylbenzene	13.041	105	191423	9.528	ug/l		98
85) sec-Butylbenzene	13.170	105	254134	9.483	ug/l		100
86) p-Isopropyltoluene	13.285	119	210320	9.287	ug/l		100
87) 1,3-Dichlorobenzene	13.285	146	127377	10.058	ug/l		99
88) 1,4-Dichlorobenzene	13.365	146	127757	10.172	ug/l		98
89) n-Butylbenzene	13.615	91	182116	9.107	ug/l		98
90) Hexachloroethane	13.877	117	47355	9.630	ug/l		97
91) 1,2-Dichlorobenzene	13.657	146	112325	10.165	ug/l		99
92) 1,2-Dibromo-3-Chloropr...	14.273	75	7005	10.608	ug/l		94
93) 1,2,4-Trichlorobenzene	14.919	180	65050	9.992	ug/l		98
94) Hexachlorobutadiene	15.023	225	42813	10.554	ug/l		97
95) Naphthalene	15.139	128	96092	9.264	ug/l		99
96) 1,2,3-Trichlorobenzene	15.328	180	56499	10.004	ug/l		99

ICAL Form

Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY100725\
Data File : VY023385.D
Acq On : 07 Oct 2025 10:02
Operator : SY/MD
Sample : VSTDICC010
Misc : 5.00g/5.0mL/MSVOA_Y/SOIL
ALS Vial : 4 Sample Multiplier: 1

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC010

Manual Integrations APPROVED

Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

Quant Time: Oct 08 04:40:53 2025
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260
QLast Update : Wed Oct 08 04:39:16 2025
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY100725\
Data File : VY023385.D
Acq On : 07 Oct 2025 10:02
Operator : SY/MD
Sample : VSTDICC010
Misc : 5.00g/5.0mL/MSVOA_Y/SOIL
ALS Vial : 4 Sample Multiplier: 1

Quant Time: Oct 08 04:40:53 2025
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260
QLast Update : Wed Oct 08 04:39:16 2025
Response via : Initial Calibration

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC010

Manual Integrations APPROVED

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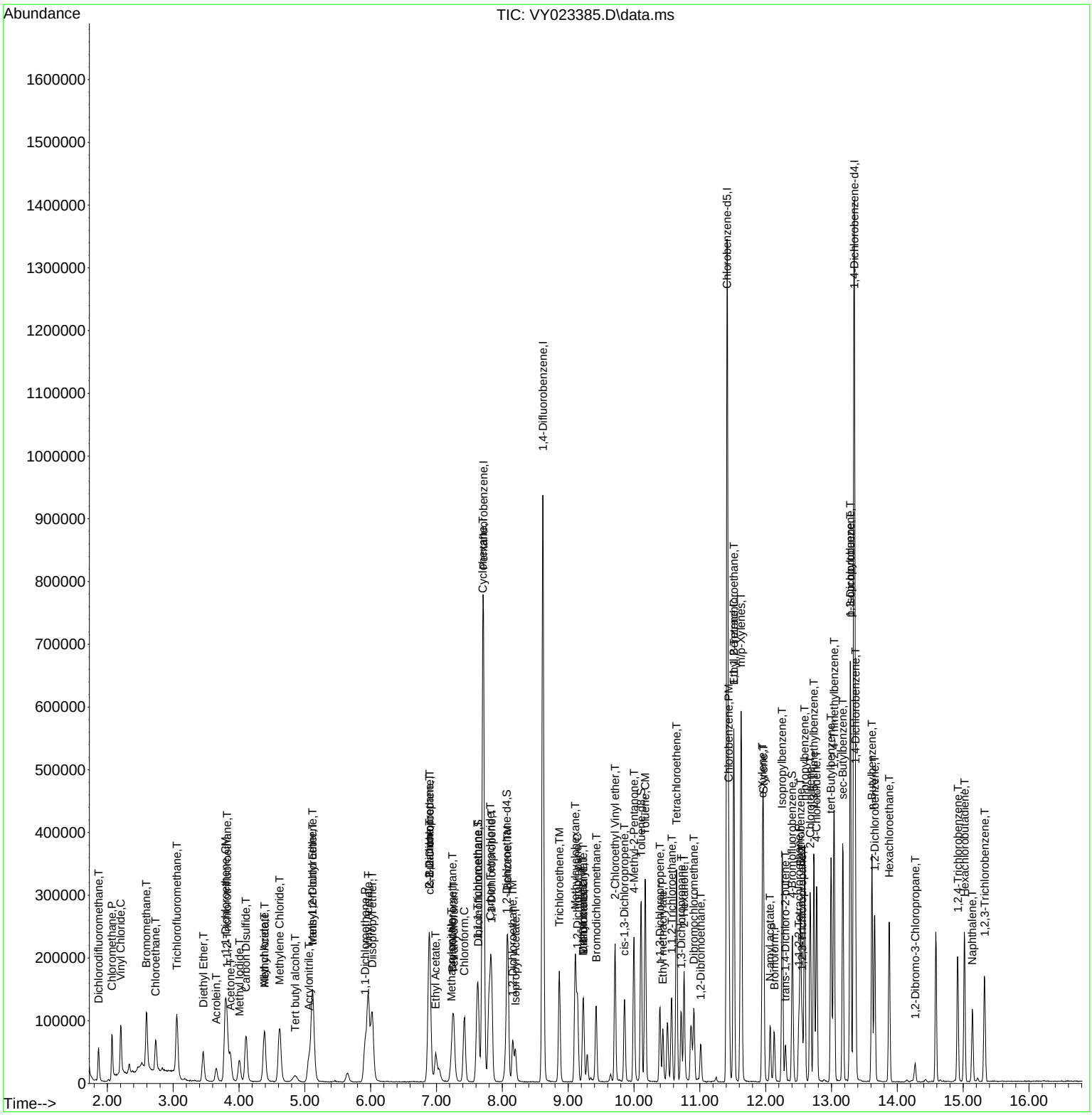
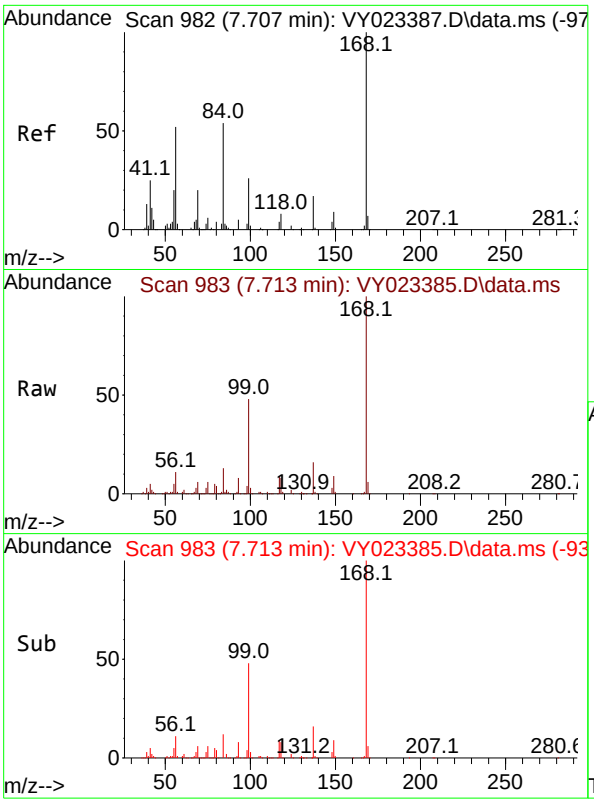
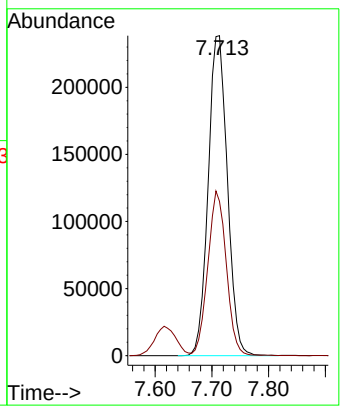




#1
Pentafluorobenzene
Concen: 50.000 ug/l
RT: 7.713 min Scan# 9
Delta R.T. 0.006 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion:168 Resp: 55982

Ion	Ratio	Lower	Upper
168	100		
99	48.2	39.7	59.5



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC010

Manual Integrations APPROVED

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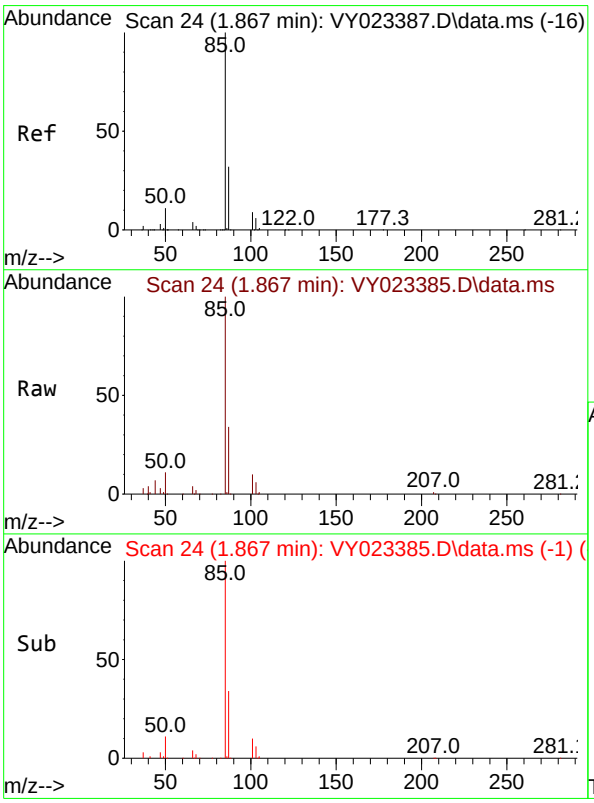
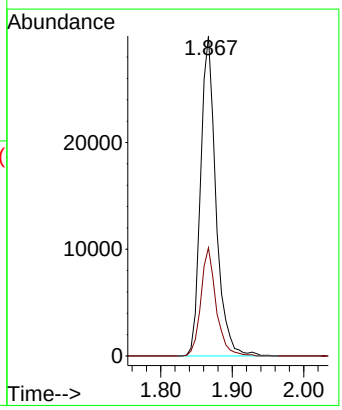
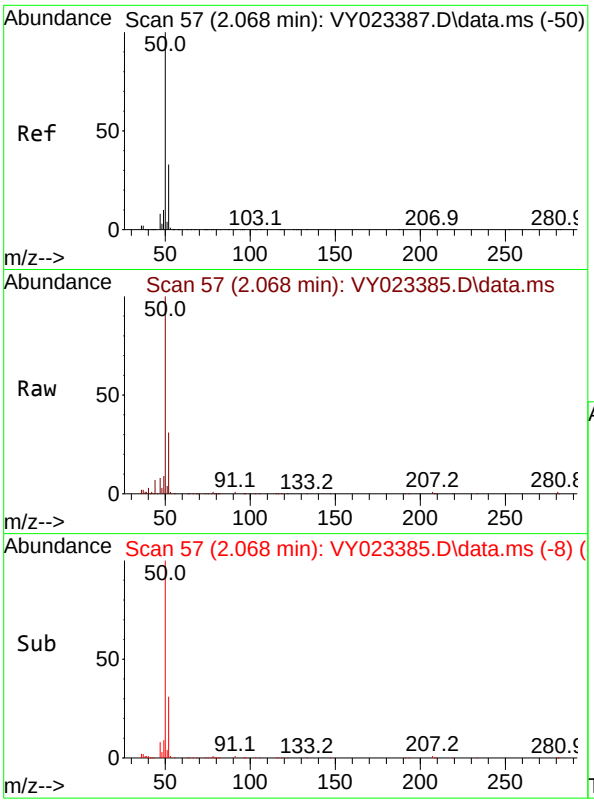


#2
Dichlorodifluoromethane
Concen: 10.129 ug/l
RT: 1.867 min Scan# 24
Delta R.T. -0.000 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion: 85 Resp: 44666

Ion	Ratio	Lower	Upper
85	100		
87	33.8	16.0	47.9





#3
Chloromethane
Concen: 9.957 ug/l
RT: 2.068 min Scan# 5
Delta R.T. -0.000 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion: 50 Resp: 6241

Ion	Ratio	Lower	Upper
50	100		
52	31.2	26.2	39.2

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC010

Manual Integrations
APPROVED

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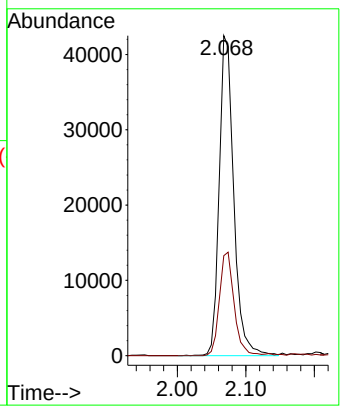
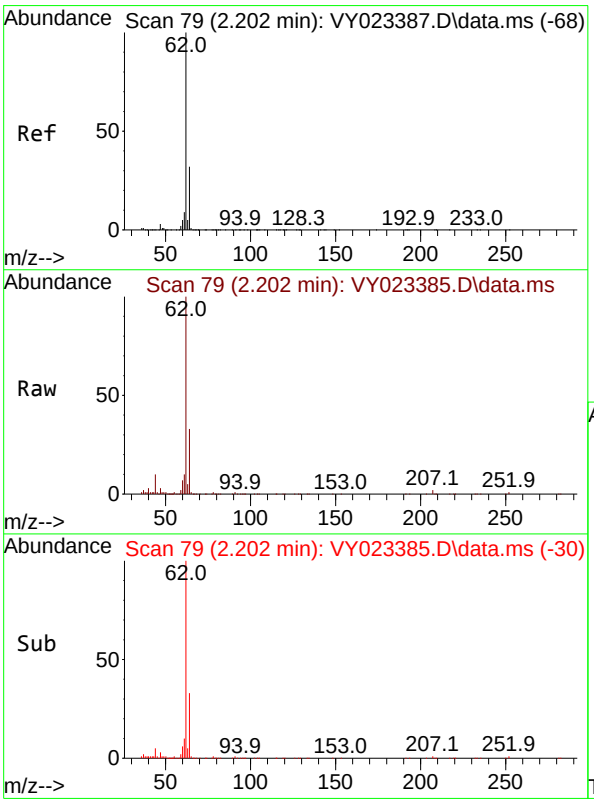
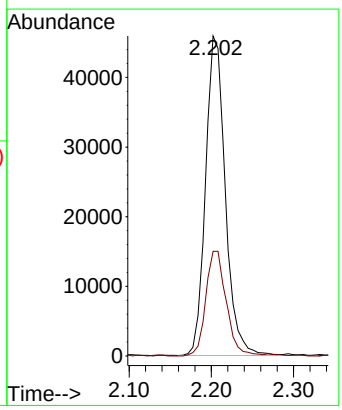


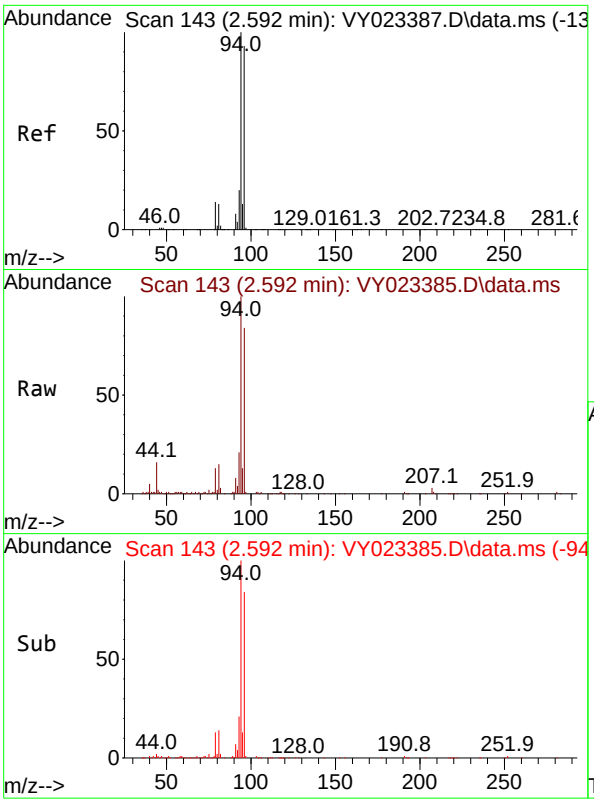


#4
Vinyl Chloride
Concen: 9.676 ug/l
RT: 2.202 min Scan# 79
Delta R.T. -0.000 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion: 62 Resp: 76587

Ion	Ratio	Lower	Upper
62	100		
64	32.7	25.8	38.8





#5
Bromomethane
Concen: 10.271 ug/l
RT: 2.592 min Scan# 14
Delta R.T. -0.000 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion: 94 Resp: 6668

Ion	Ratio	Lower	Upper
94	100		
96	83.4	74.5	111.7

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC010

Manual Integrations
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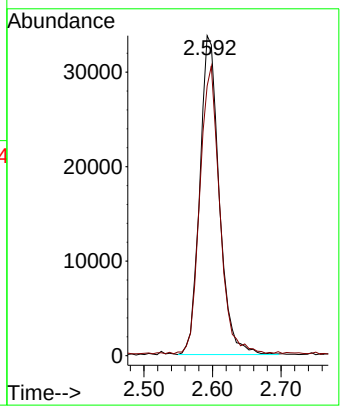
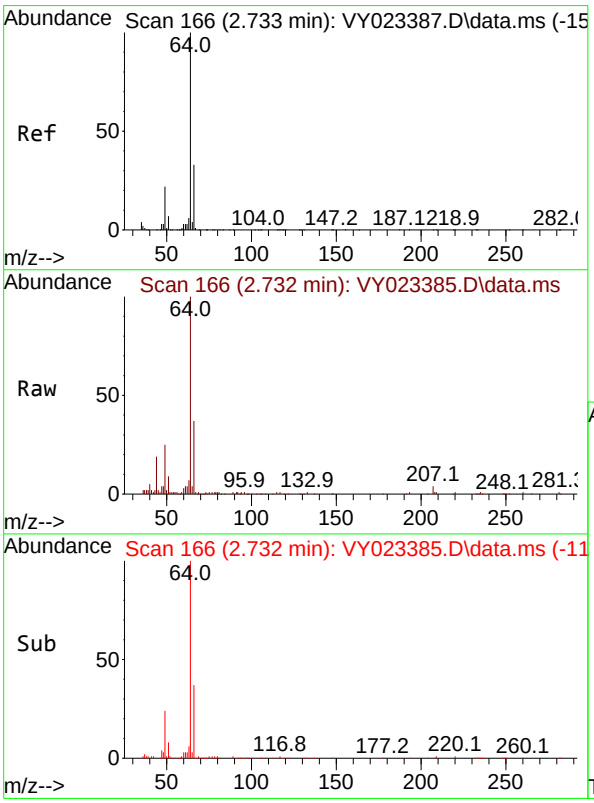
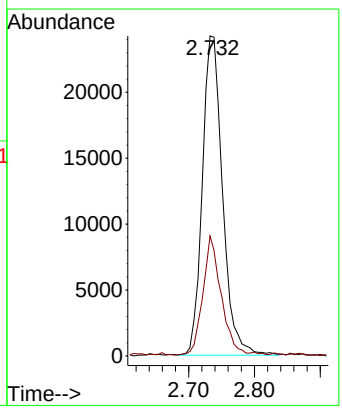


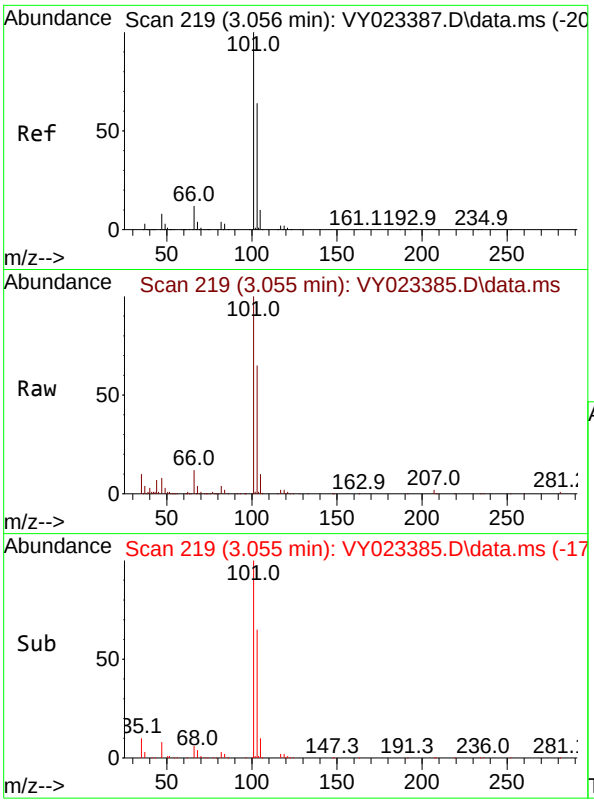


#6
Chloroethane
Concen: 9.632 ug/l
RT: 2.732 min Scan# 166
Delta R.T. -0.000 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion: 64 Resp: 51757

Ion	Ratio	Lower	Upper
64	100		
66	37.2	26.2	39.4

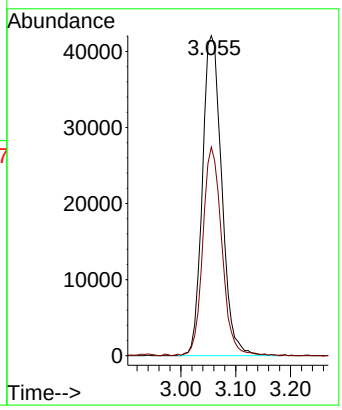




#7
Trichlorofluoromethane
Concen: 10.128 ug/l
RT: 3.055 min Scan# 21
Delta R.T. -0.000 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion:101 Resp: 10297

Ion	Ratio	Lower	Upper
101	100		
103	65.1	51.3	76.9



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC010

Manual Integrations
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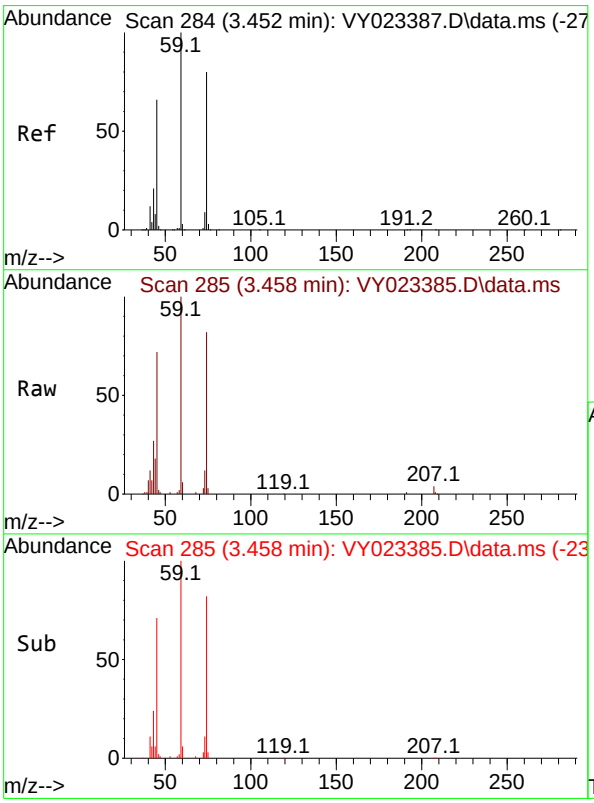
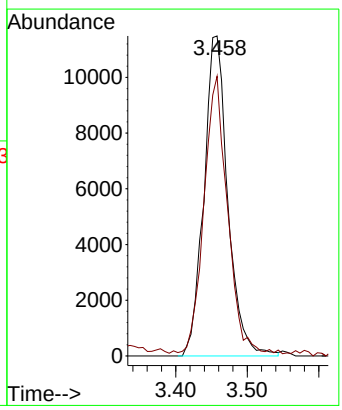
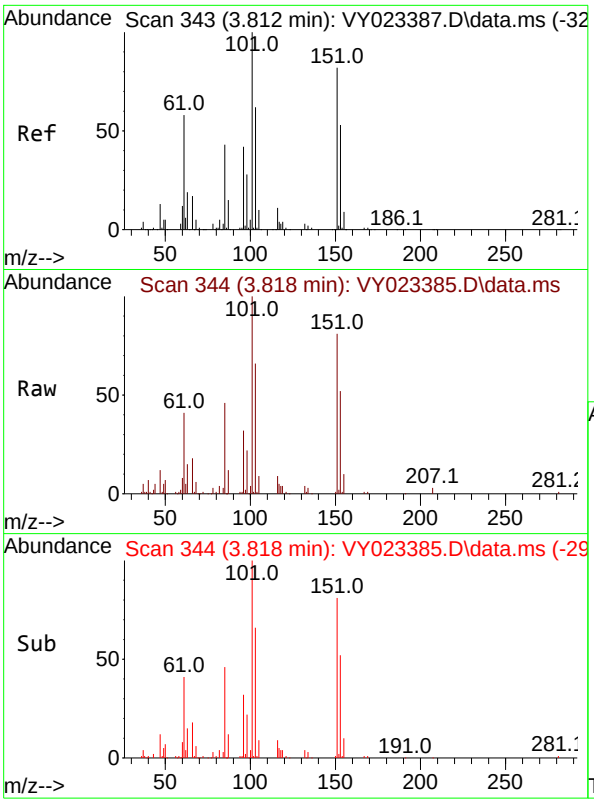


#8
Diethyl Ether
Concen: 10.047 ug/l
RT: 3.458 min Scan# 285
Delta R.T. 0.006 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion: 74 Resp: 26719

Ion	Ratio	Lower	Upper
74	100		
45	83.5	39.9	119.7





#9
1,1,2-Trichlorotrifluoroethane
Concen: 10.011 ug/l
RT: 3.818 min Scan# 34
Delta R.T. 0.006 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion:101 Resp: 5440

Ion	Ratio	Lower	Upper
101	100		
85	42.2	34.6	51.8
151	82.7	67.0	100.6

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC010

Manual Integrations
APPROVED

Reviewed By :Semsettin Yesilyurt 10/10/2025
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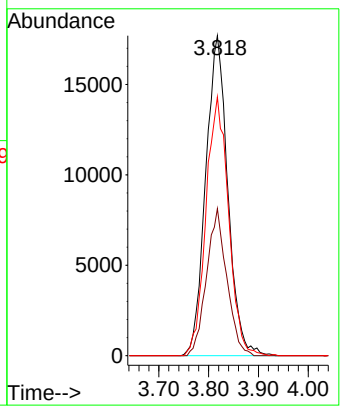
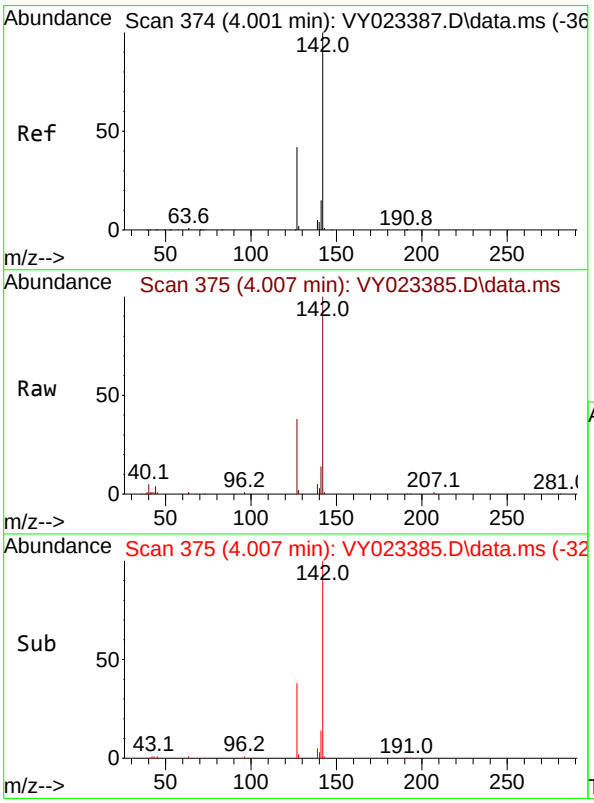
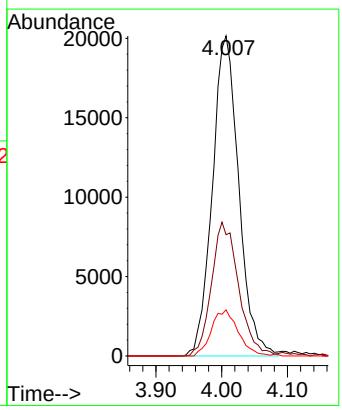


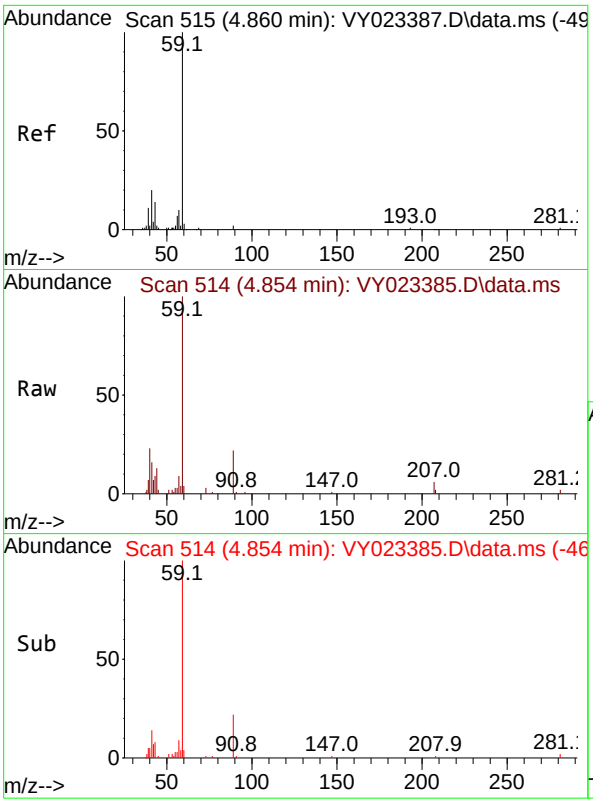


#10
Methyl Iodide
Concen: 8.967 ug/l
RT: 4.007 min Scan# 375
Delta R.T. 0.006 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion:142 Resp: 56313

Ion	Ratio	Lower	Upper
142	100		
127	42.9	34.8	52.2
141	14.6	11.6	17.4

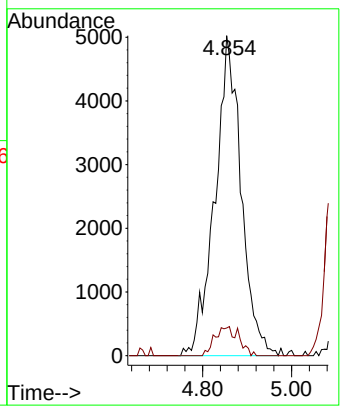




#11
Tert butyl alcohol
Concen: 71.998 ug/l
RT: 4.854 min Scan# 5
Delta R.T. -0.006 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion: 59 Resp: 2054

Ion	Ratio	Lower	Upper
59	100		
57	6.3	8.3	12.5#



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC010

Manual Integrations
APPROVED

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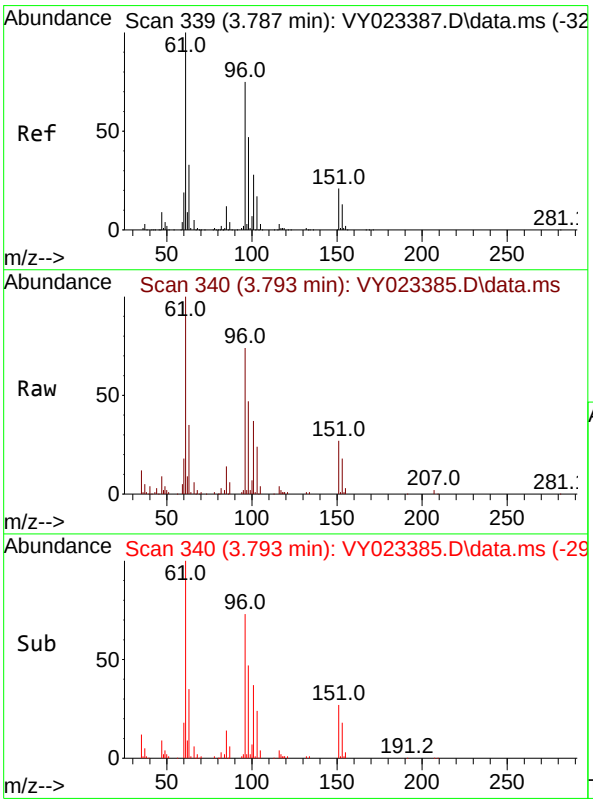
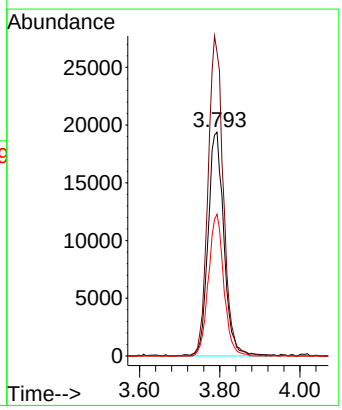
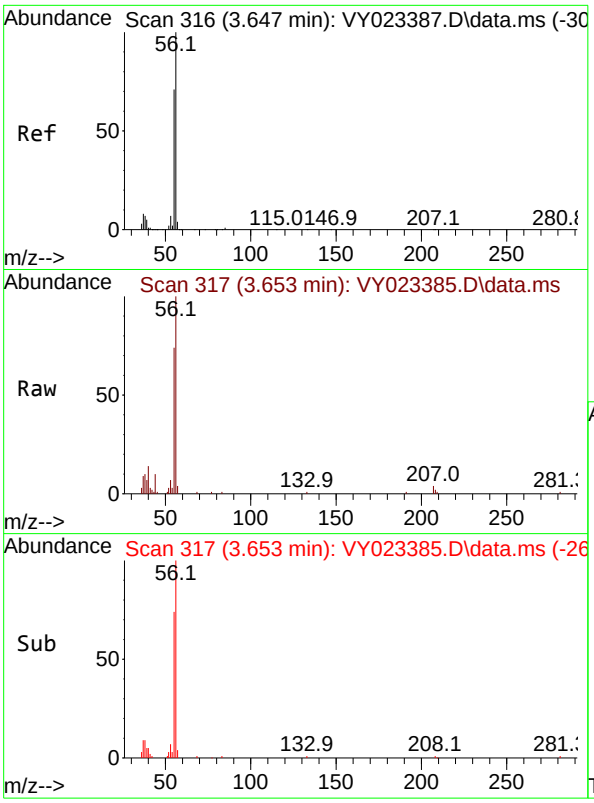


#12
1,1-Dichloroethene
Concen: 10.173 ug/l
RT: 3.793 min Scan# 340
Delta R.T. 0.006 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion: 96 Resp: 53191

Ion	Ratio	Lower	Upper
96	100		
61	135.7	106.7	160.1
98	63.4	50.2	75.4

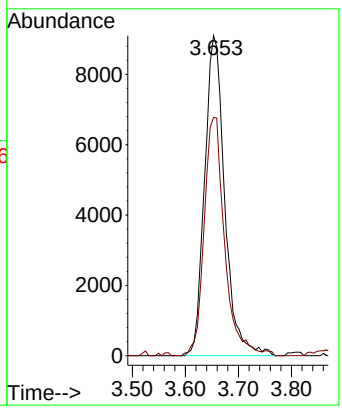




#13
Acrolein
Concen: 49.681 ug/l
RT: 3.653 min Scan# 3
Delta R.T. 0.006 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion: 56 Resp: 2401

Ion	Ratio	Lower	Upper
56	100		
55	75.2	56.1	84.1



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC010

Manual Integrations APPROVED

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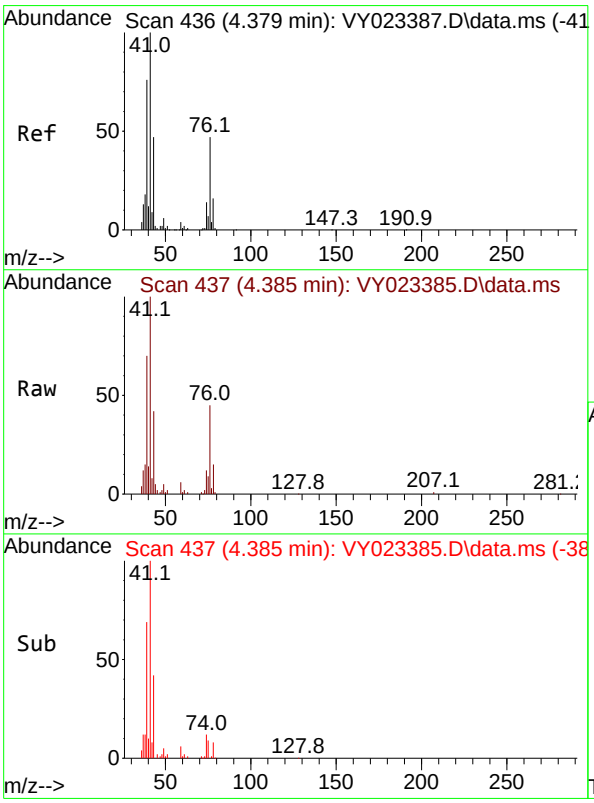
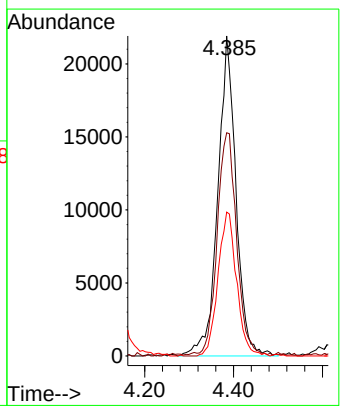
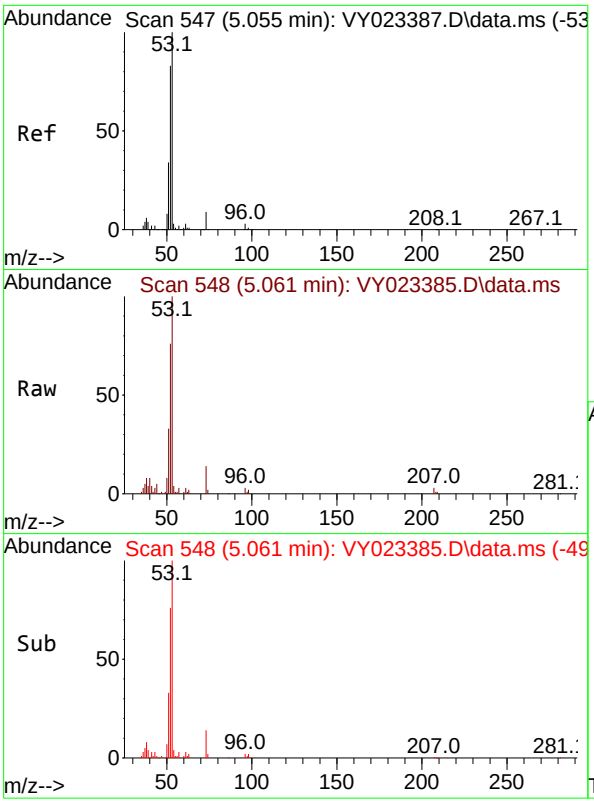


#14
Allyl chloride
Concen: 9.494 ug/l
RT: 4.385 min Scan# 437
Delta R.T. 0.006 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion: 41 Resp: 62154

Ion	Ratio	Lower	Upper
41	100		
39	74.2	59.9	89.9
76	45.9	38.0	57.0

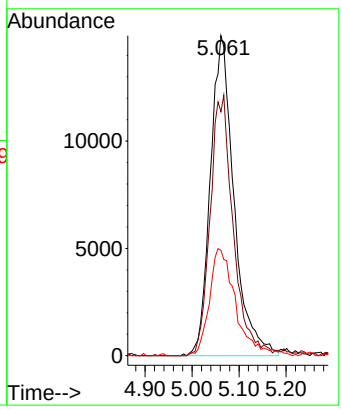




#15
Acrylonitrile
Concen: 49.854 ug/l
RT: 5.061 min Scan# 54
Delta R.T. 0.006 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion: 53 Resp: 5193

Ion	Ratio	Lower	Upper
53	100		
52	79.5	64.6	97.0
51	37.4	29.5	44.3



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC010

Manual Integrations APPROVED

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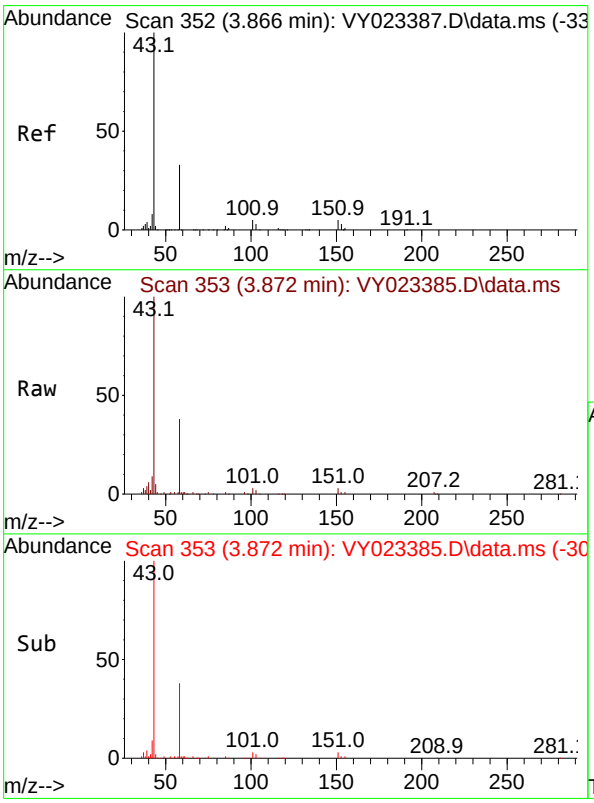
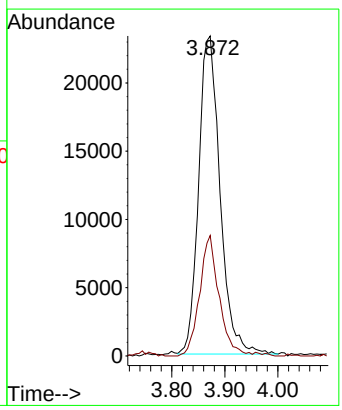
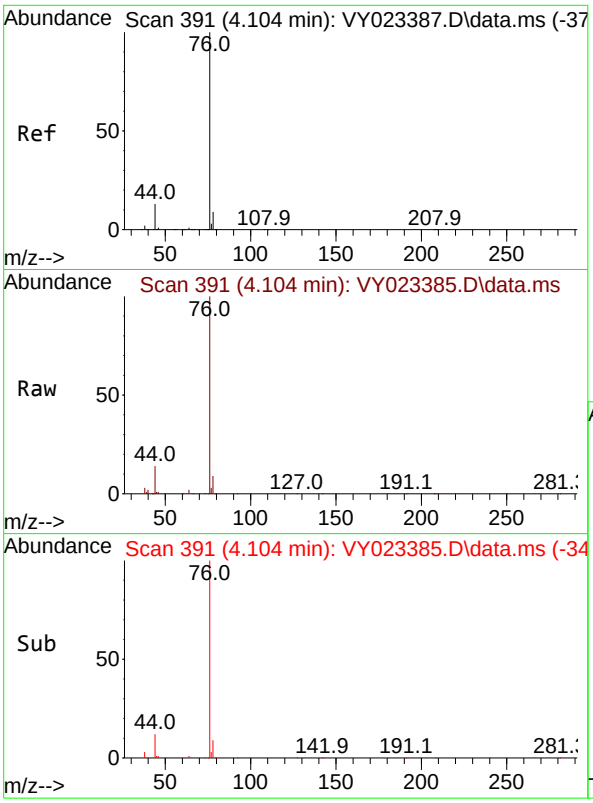


#16
Acetone
Concen: 59.997 ug/l
RT: 3.872 min Scan# 353
Delta R.T. 0.006 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion: 43 Resp: 65410

Ion	Ratio	Lower	Upper
43	100		
58	37.9	27.7	41.5

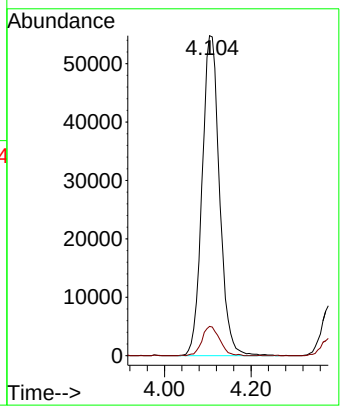




#17
Carbon Disulfide
Concen: 9.382 ug/l
RT: 4.104 min Scan# 3
Delta R.T. -0.000 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion: 76 Resp: 15305

Ion	Ratio	Lower	Upper
76	100		
78	9.2	7.3	10.9



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC010

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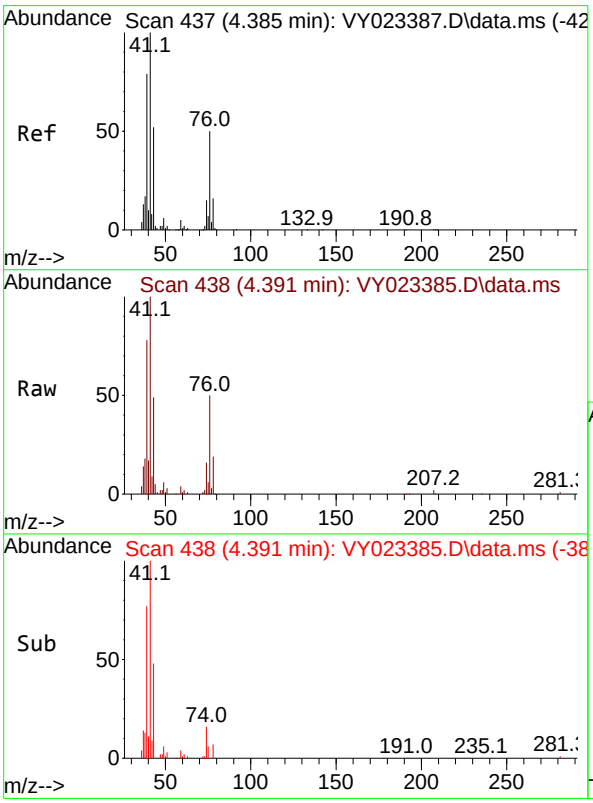
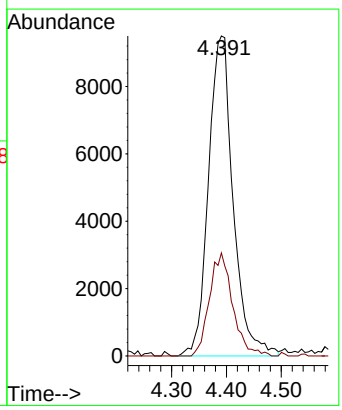
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

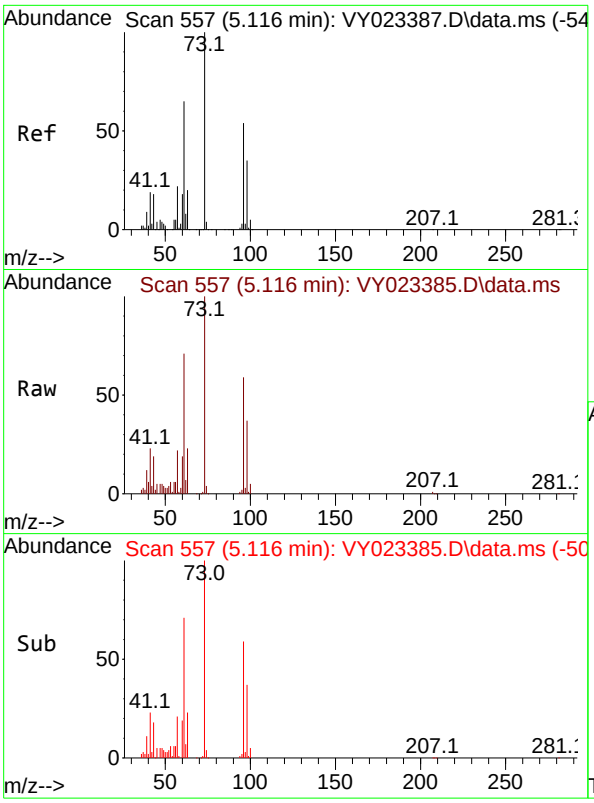


#18
Methyl Acetate
Concen: 10.728 ug/l
RT: 4.391 min Scan# 438
Delta R.T. 0.006 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion: 43 Resp: 29725

Ion	Ratio	Lower	Upper
43	100		
74	30.3	24.2	36.4

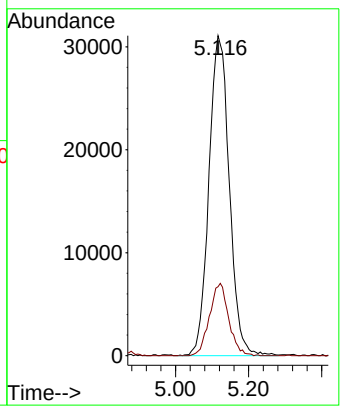




#19
Methyl tert-butyl Ether
Concen: 9.830 ug/l
RT: 5.116 min Scan# 5
Delta R.T. -0.000 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion: 73 Resp: 12034

Ion	Ratio	Lower	Upper
73	100		
57	21.5	17.4	26.0



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC010

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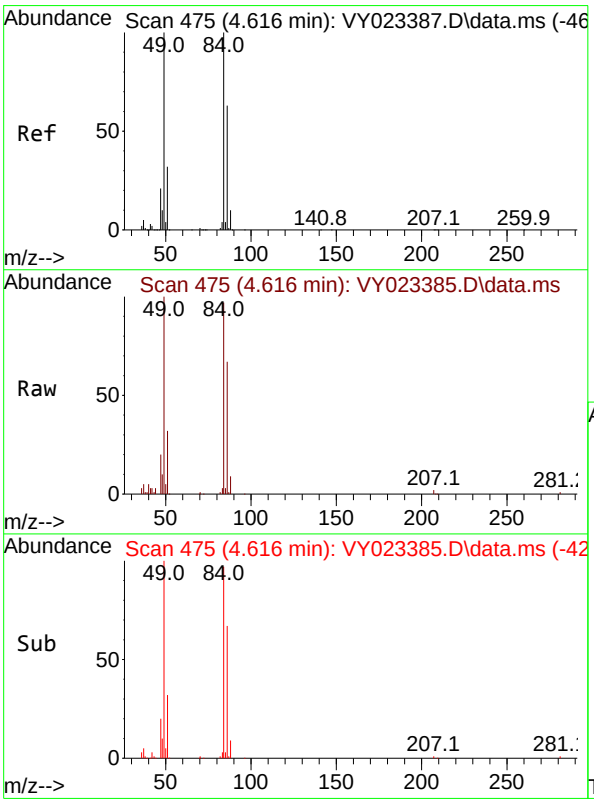
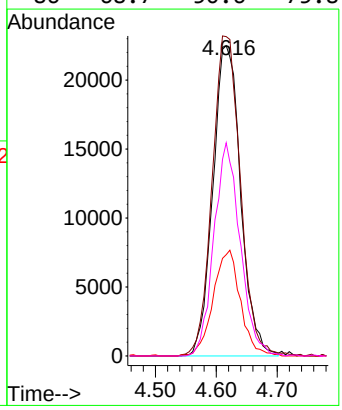
Supervised By :Mahesh Dadoda 10/10/2025

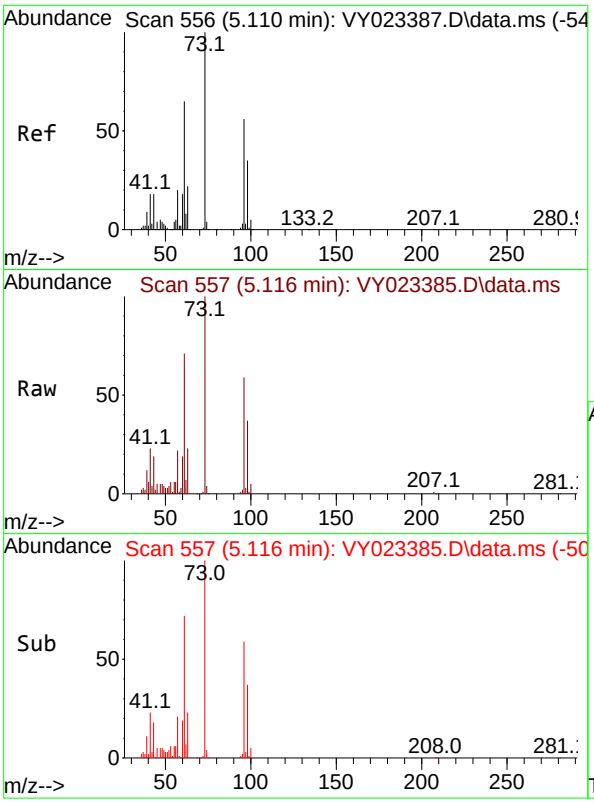


#20
Methylene Chloride
Concen: 12.016 ug/l
RT: 4.616 min Scan# 475
Delta R.T. -0.000 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion: 84 Resp: 71034

Ion	Ratio	Lower	Upper
84	100		
49	102.9	80.2	120.4
51	32.6	25.9	38.9
86	68.7	50.6	75.8

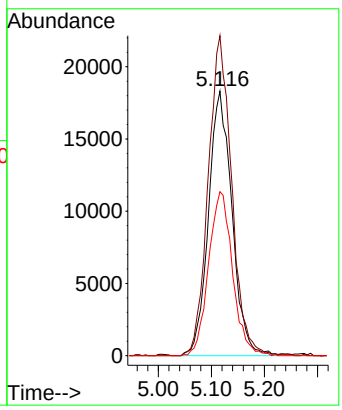




#21
trans-1,2-Dichloroethene
Concen: 9.710 ug/l
RT: 5.116 min Scan# 5
Delta R.T. 0.006 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion: 96 Resp: 5646

Ion	Ratio	Lower	Upper
96	100		
61	121.0	92.7	139.1
98	62.0	49.7	74.5



Instrument :
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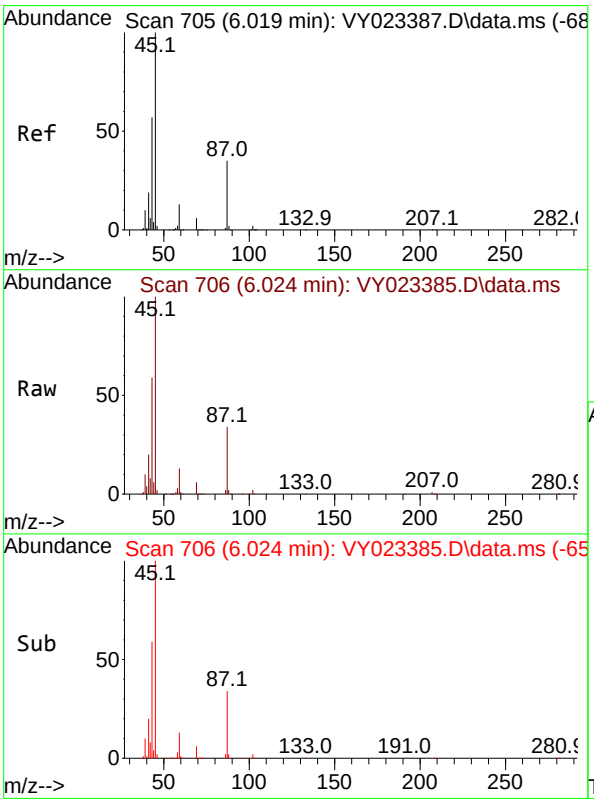
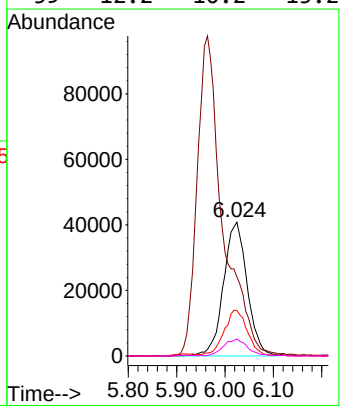
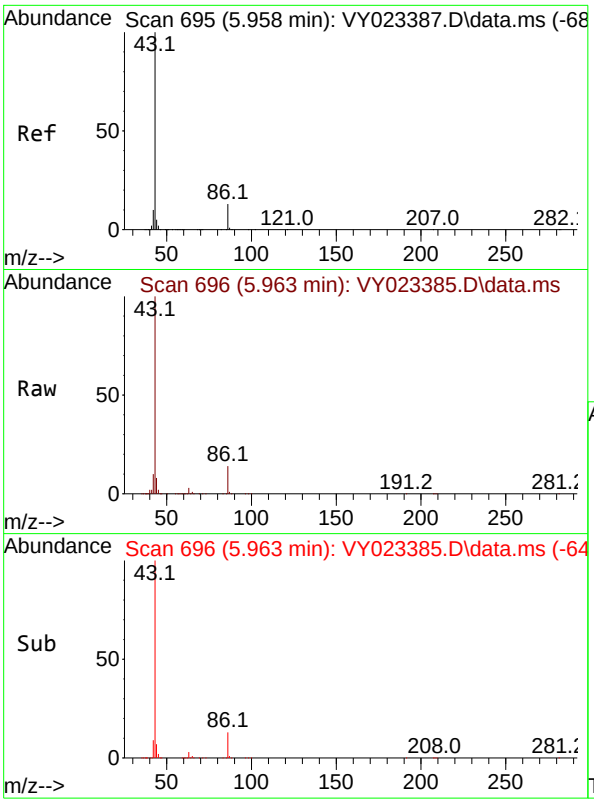


#22
Diisopropyl ether
Concen: 9.547 ug/l
RT: 6.024 min Scan# 706
Delta R.T. 0.006 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion: 45 Resp: 138589

Ion	Ratio	Lower	Upper
45	100		
43	58.2	45.6	68.4
87	33.7	28.1	42.1
59	12.2	10.2	15.2

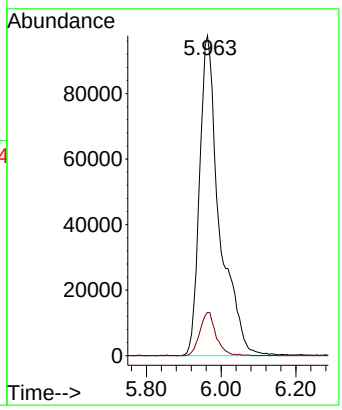




#23
Vinyl Acetate
Concen: 45.300 ug/l
RT: 5.963 min Scan# 6
Delta R.T. 0.006 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion: 43 Resp: 36147

Ion	Ratio	Lower	Upper
43	100		
86	13.5	10.6	15.8



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC010

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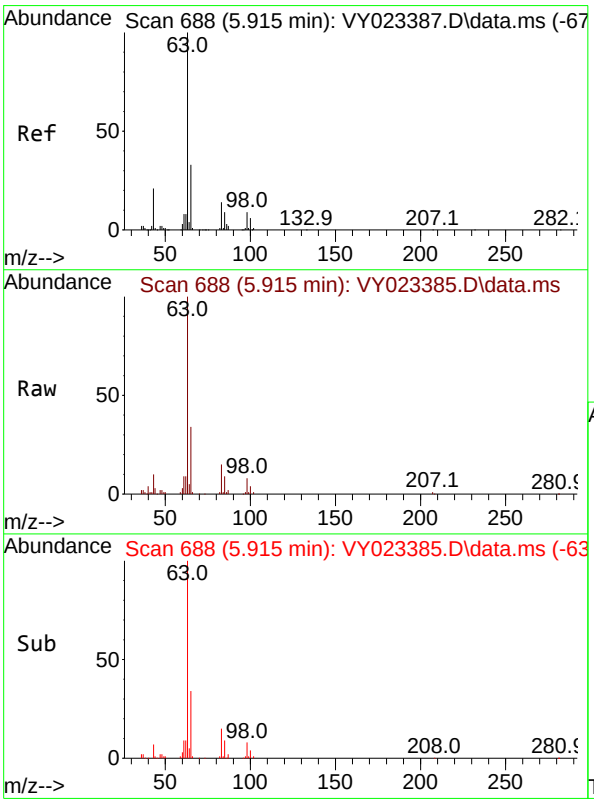
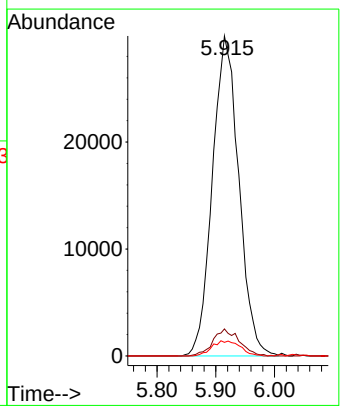
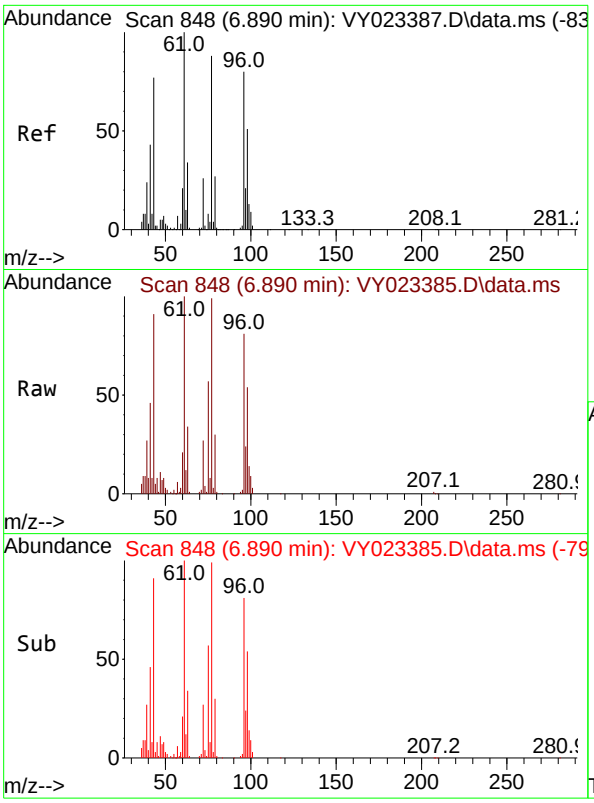


#24
1,1-Dichloroethane
Concen: 9.772 ug/l
RT: 5.915 min Scan# 688
Delta R.T. -0.000 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion: 63 Resp: 93512

Ion	Ratio	Lower	Upper
63	100		
98	8.4	4.3	13.1
100	4.3	2.8	8.4





#25
2-Butanone
Concen: 55.784 ug/l
RT: 6.890 min Scan# 84
Delta R.T. -0.000 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion: 43 Resp: 7517

Ion	Ratio	Lower	Upper
43	100		
72	29.4	27.4	41.2

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC010

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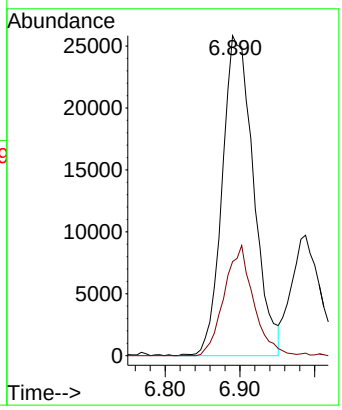
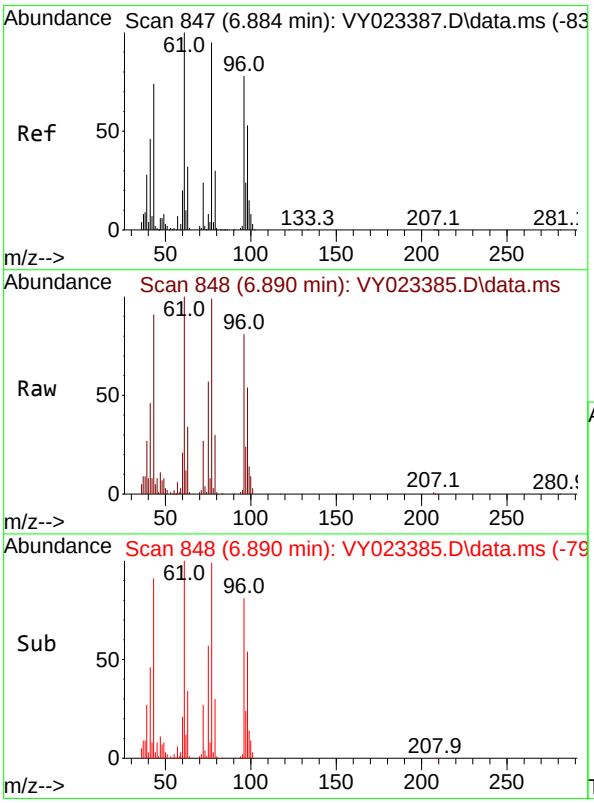
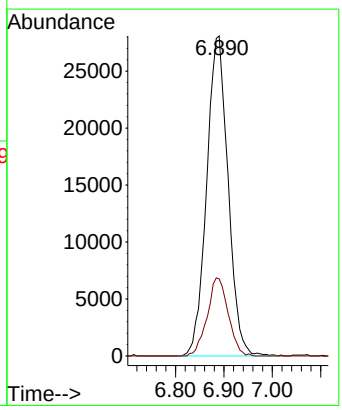


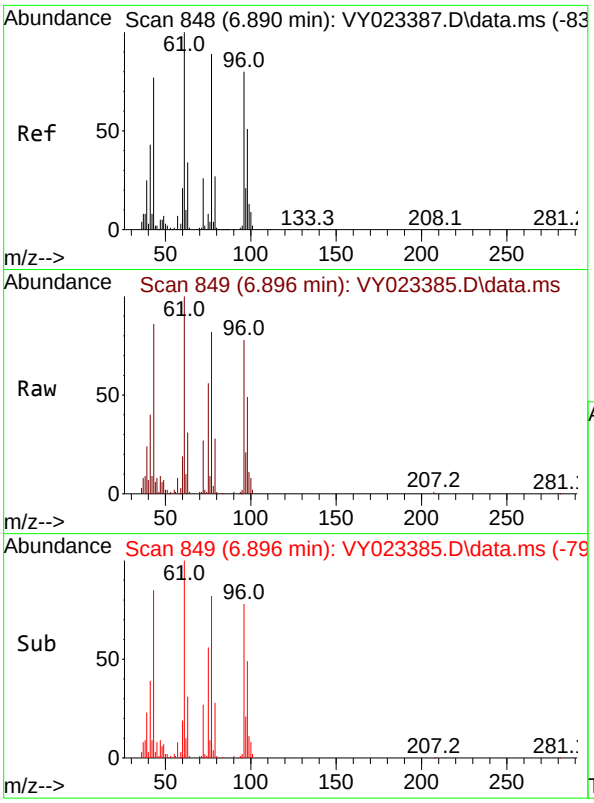


#26
2,2-Dichloropropane
Concen: 10.153 ug/l
RT: 6.890 min Scan# 848
Delta R.T. 0.006 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion: 77 Resp: 86325

Ion	Ratio	Lower	Upper
77	100		
97	23.9	12.1	36.3





#27
cis-1,2-Dichloroethene
Concen: 9.905 ug/l
RT: 6.896 min Scan# 84
Delta R.T. 0.006 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion: 96 Resp: 6533

Ion	Ratio	Lower	Upper
96	100		
61	129.1	0.0	258.2
98	64.5	0.0	132.0

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC010

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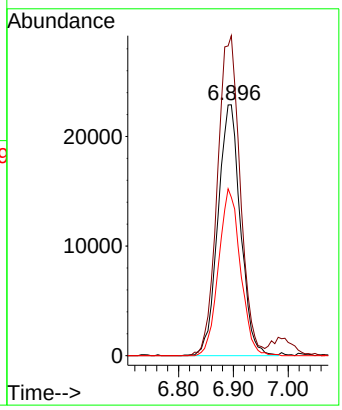
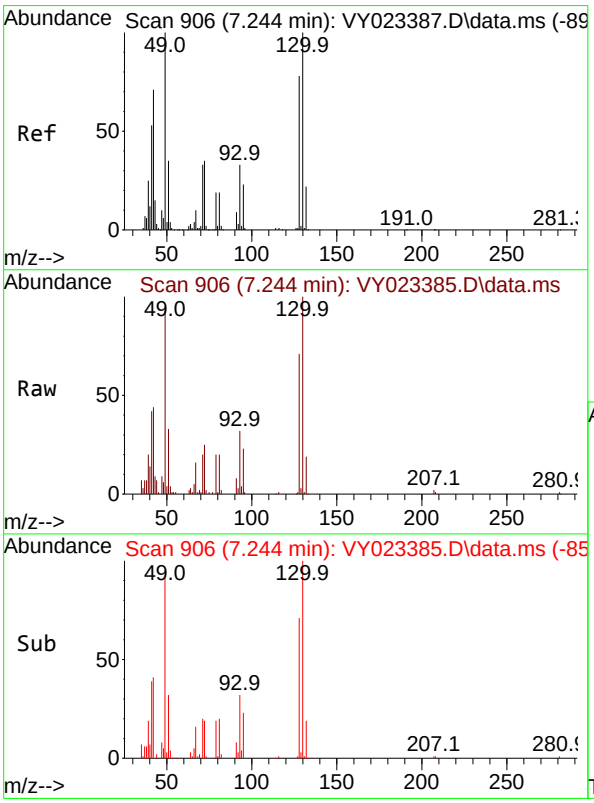
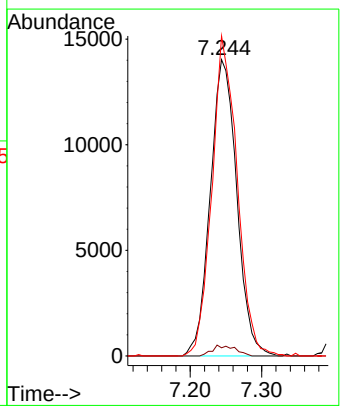


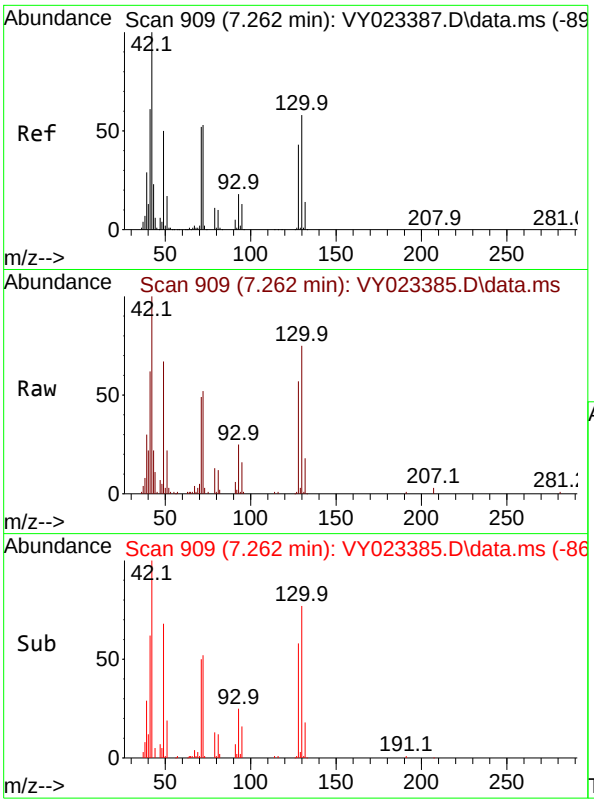


#28
Bromochloromethane
Concen: 9.733 ug/l
RT: 7.244 min Scan# 906
Delta R.T. -0.000 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion: 49 Resp: 36132

Ion	Ratio	Lower	Upper
49	100		
129	3.1	0.0	5.6
130	103.0	81.9	122.9

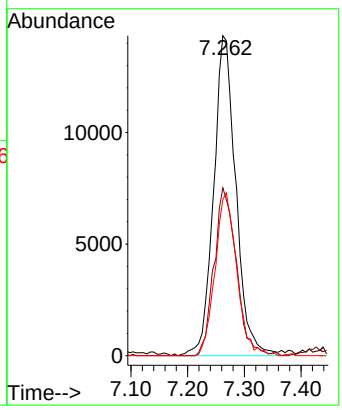




#29
Tetrahydrofuran
Concen: 48.749 ug/l
RT: 7.262 min Scan# 9(
Delta R.T. -0.000 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion: 42 Resp: 3899(

Ion	Ratio	Lower	Upper
42	100		
72	52.6	43.0	64.6
71	49.8	40.1	60.1



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC010

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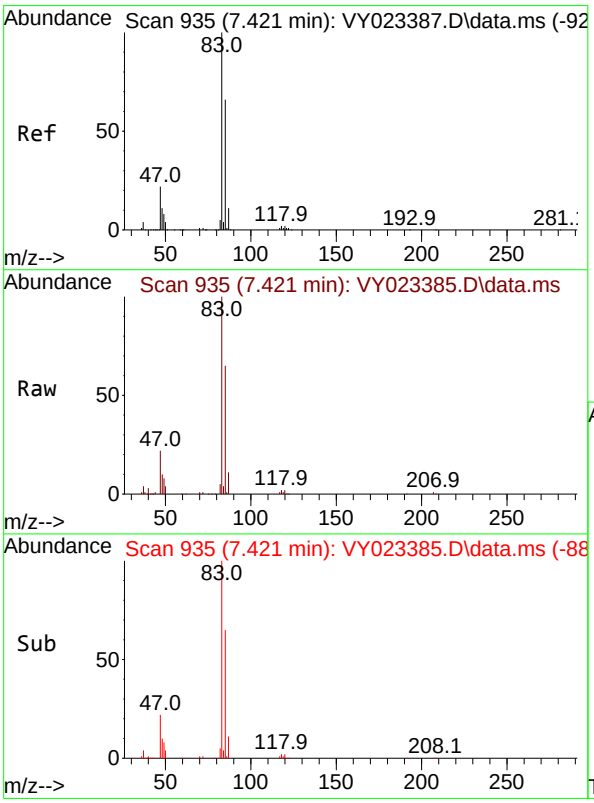
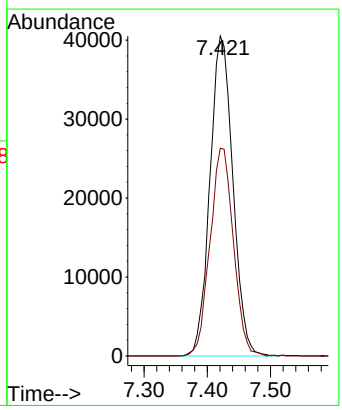
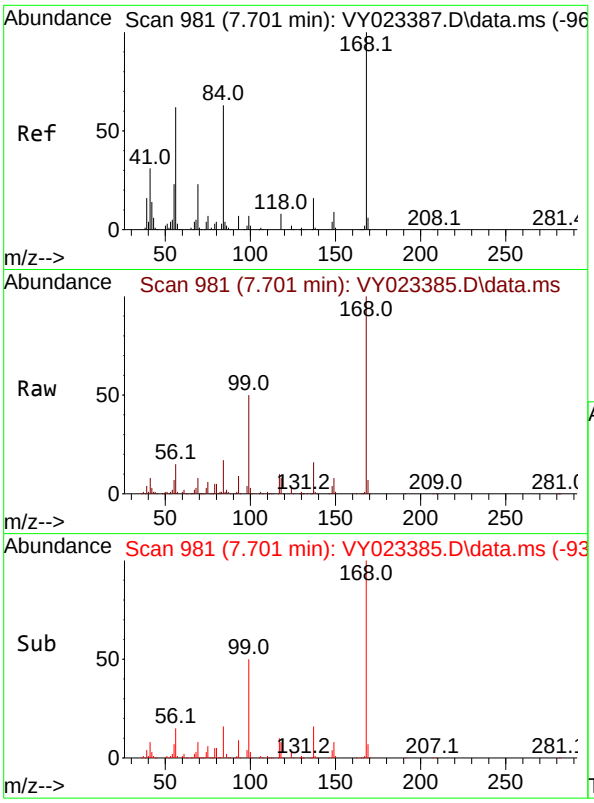


#30
Chloroform
Concen: 9.890 ug/l
RT: 7.421 min Scan# 935
Delta R.T. -0.000 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion: 83 Resp: 102058

Ion	Ratio	Lower	Upper
83	100		
85	64.9	52.5	78.7

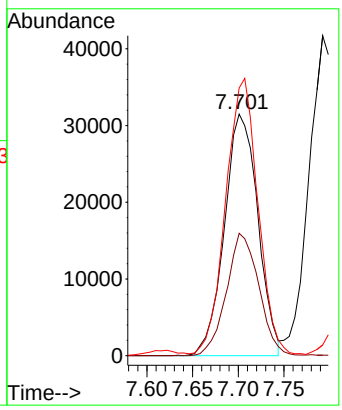




#31
Cyclohexane
Concen: 9.495 ug/l
RT: 7.701 min Scan# 9
Delta R.T. -0.000 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion: 56 Resp: 8024

Ion	Ratio	Lower	Upper
56	100		
69	50.5	30.0	45.0
84	109.7	81.2	121.8



Instrument :
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ClientSampleId :
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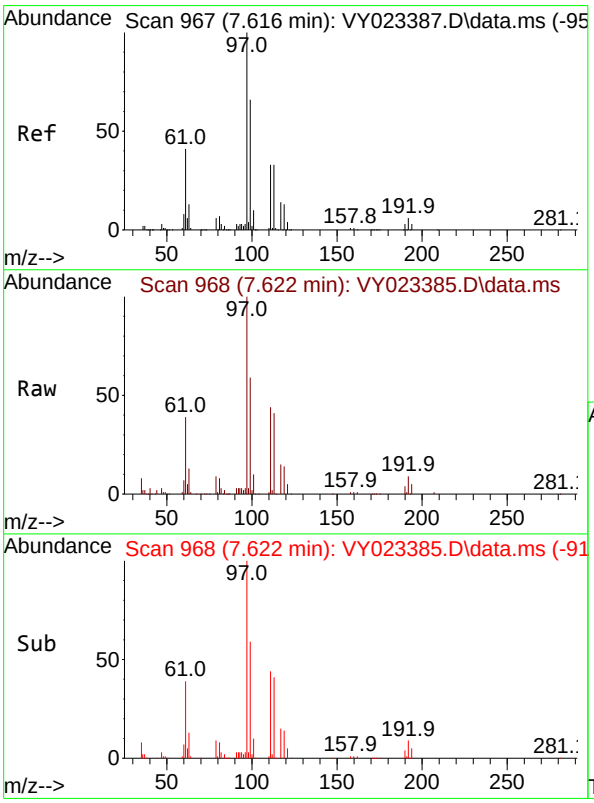
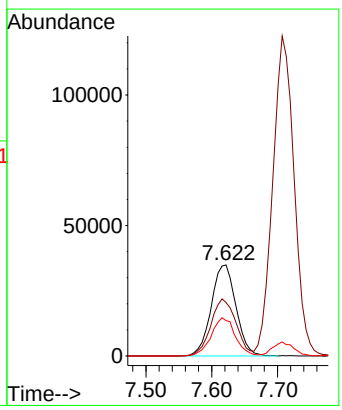
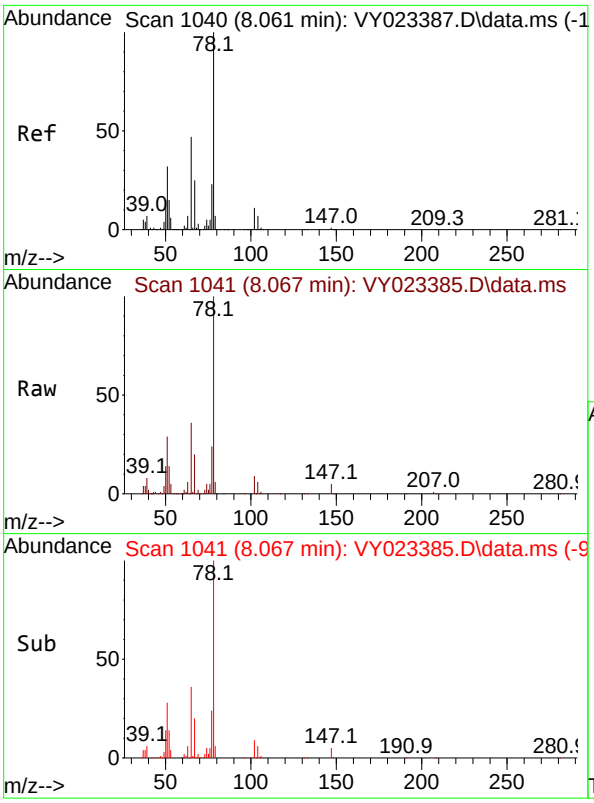


#32
1,1,1-Trichloroethane
Concen: 9.844 ug/l
RT: 7.622 min Scan# 968
Delta R.T. 0.006 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion: 97 Resp: 91186

Ion	Ratio	Lower	Upper
97	100		
99	64.2	51.4	77.2
61	41.0	31.9	47.9

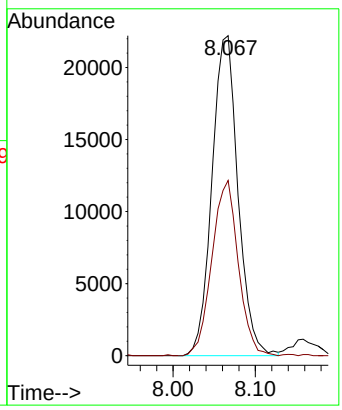




#33
1,2-Dichloroethane-d4
Concen: 10.071 ug/l
RT: 8.067 min Scan# 1
Delta R.T. 0.006 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion: 65 Resp: 4882

Ion	Ratio	Lower	Upper
65	100		
67	55.4	0.0	105.8



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC010

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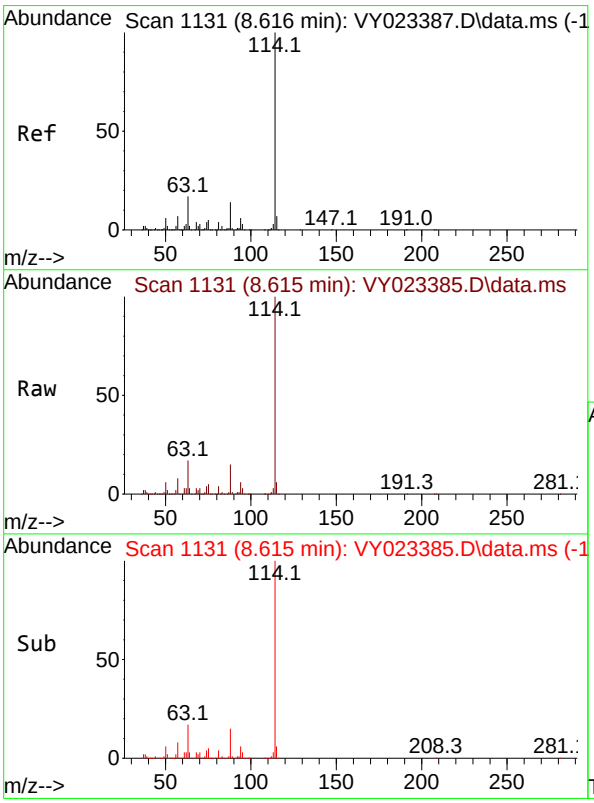
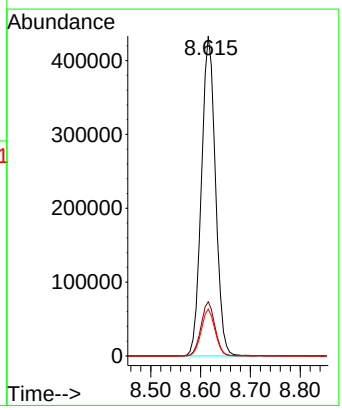
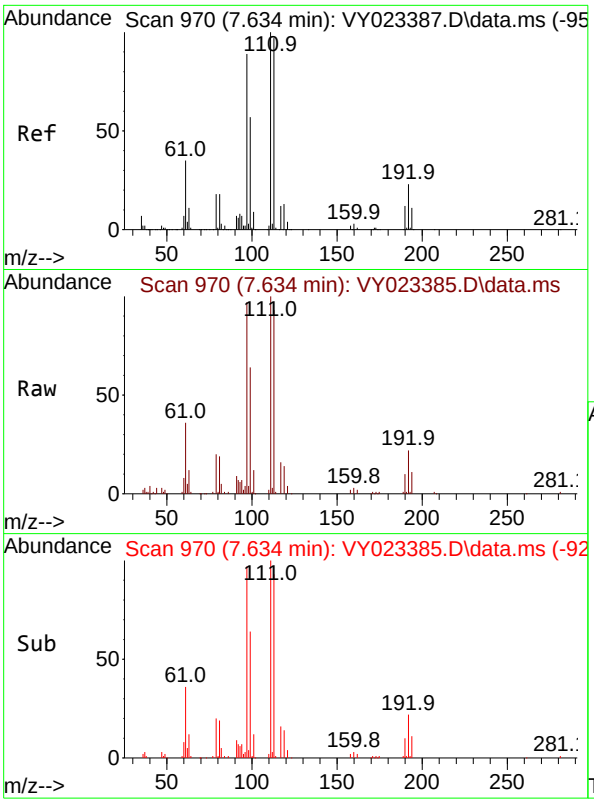


#34
1,4-Difluorobenzene
Concen: 50.000 ug/l
RT: 8.615 min Scan# 1131
Delta R.T. -0.000 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion:114 Resp: 847077

Ion	Ratio	Lower	Upper
114	100		
63	16.9	0.0	34.2
88	14.7	0.0	28.4

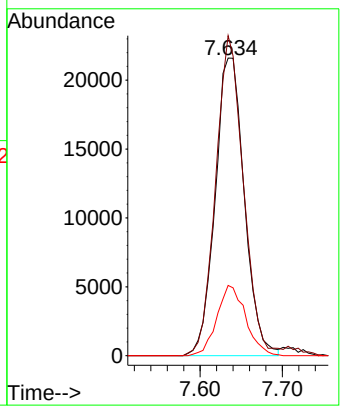




#35
Dibromofluoromethane
Concen: 10.364 ug/l
RT: 7.634 min Scan# 9
Delta R.T. -0.000 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion:113 Resp: 5327

Ion	Ratio	Lower	Upper
113	100		
111	102.1	81.8	122.6
192	23.3	18.0	27.0



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC010

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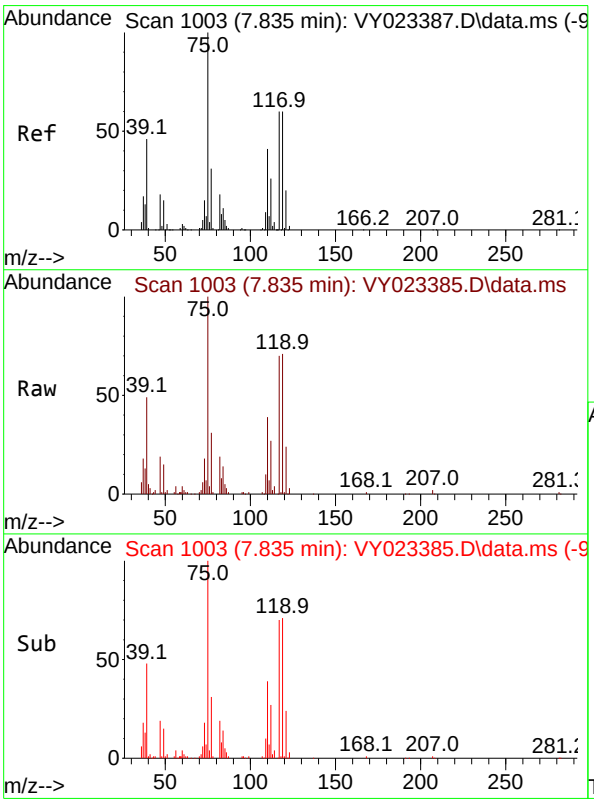
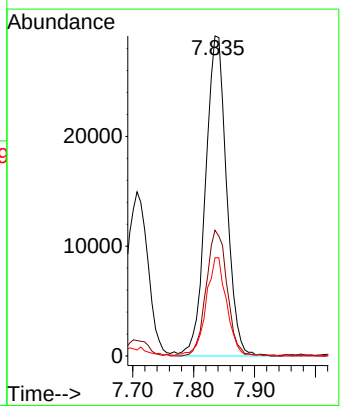
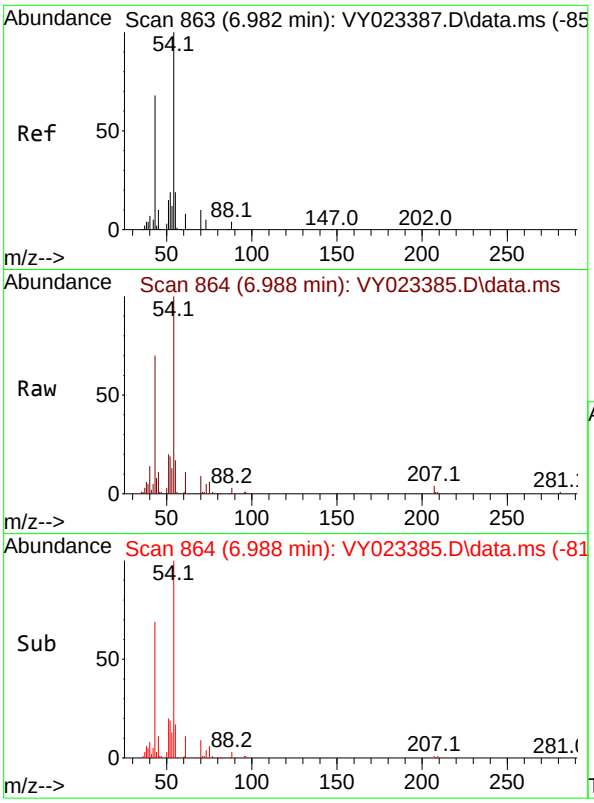


#36
1,1-Dichloropropene
Concen: 9.639 ug/l
RT: 7.835 min Scan# 1003
Delta R.T. -0.000 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion: 75 Resp: 69913

Ion	Ratio	Lower	Upper
75	100		
110	39.2	19.9	59.7
77	30.4	25.0	37.6

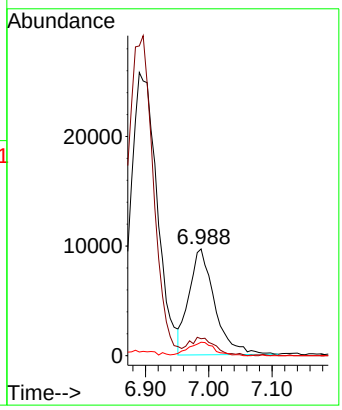




#37
Ethyl Acetate
Concen: 9.551 ug/l
RT: 6.988 min Scan# 8
Delta R.T. 0.006 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion: 43 Resp: 2738

Ion	Ratio	Lower	Upper
43	100		
61	17.3	11.8	17.8
70	12.8	10.5	15.7



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC010

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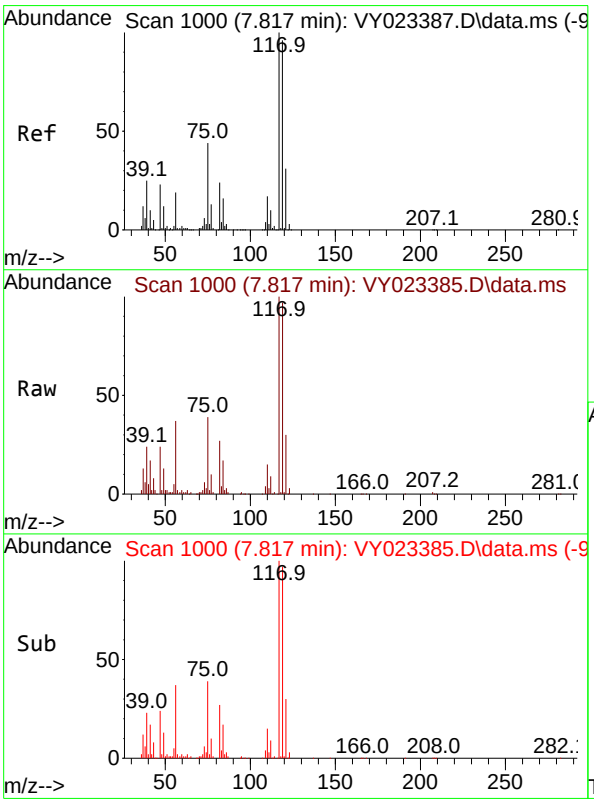
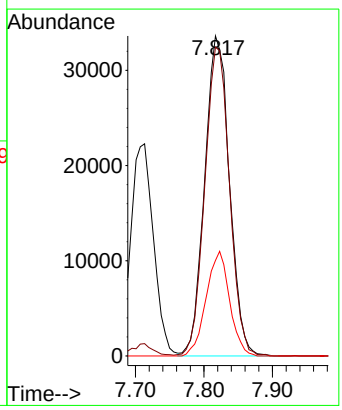
Supervised By :Mahesh Dadoda 10/10/2025

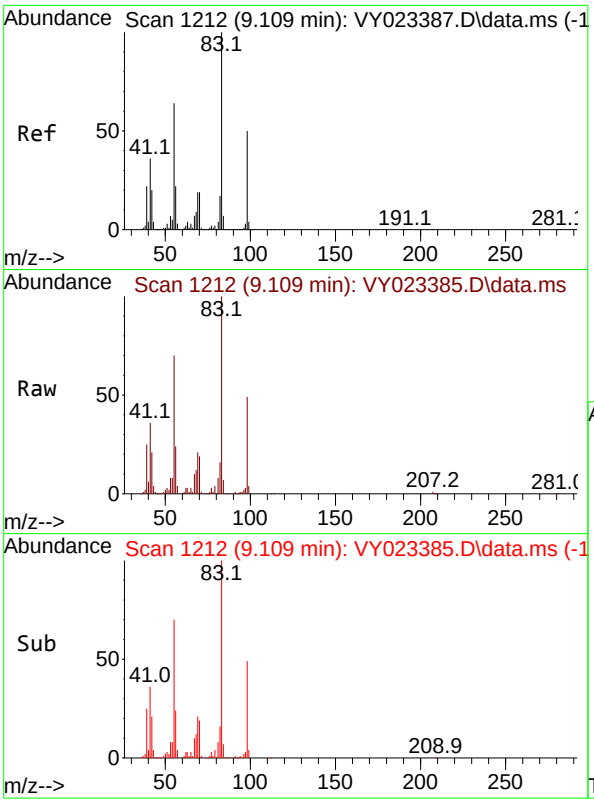


#38
Carbon Tetrachloride
Concen: 10.065 ug/l
RT: 7.817 min Scan# 1000
Delta R.T. -0.000 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion:117 Resp: 84799

Ion	Ratio	Lower	Upper
117	100		
119	96.5	76.8	115.2
121	29.9	24.5	36.7

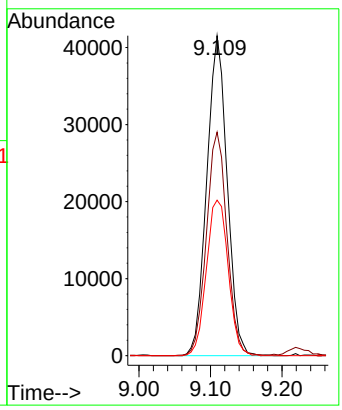




#39
Methylcyclohexane
Concen: 8.860 ug/l
RT: 9.109 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion: 83 Resp: 8227

Ion	Ratio	Lower	Upper
83	100		
55	69.7	51.4	77.2
98	48.6	40.4	60.6



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC010

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Reviewed By :Semsettin Yesilyurt 10/10/2025
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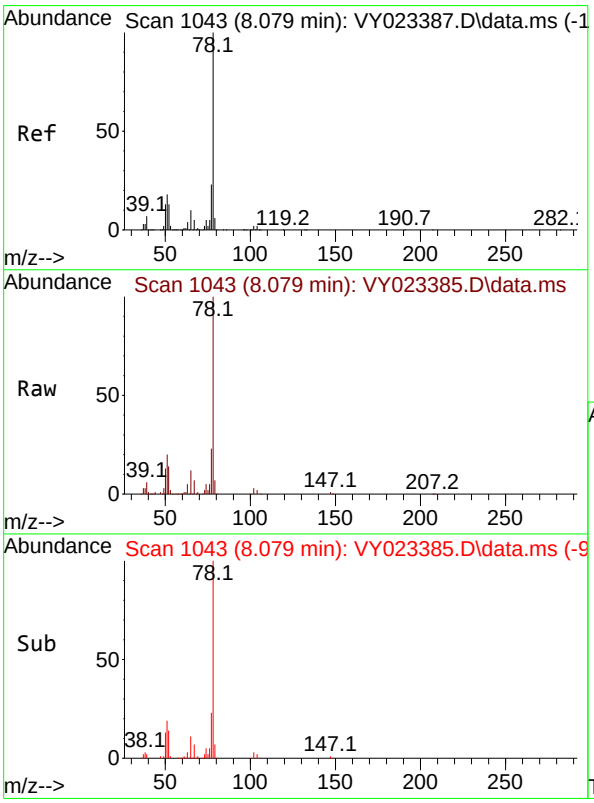
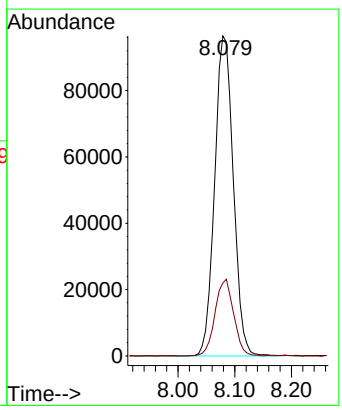
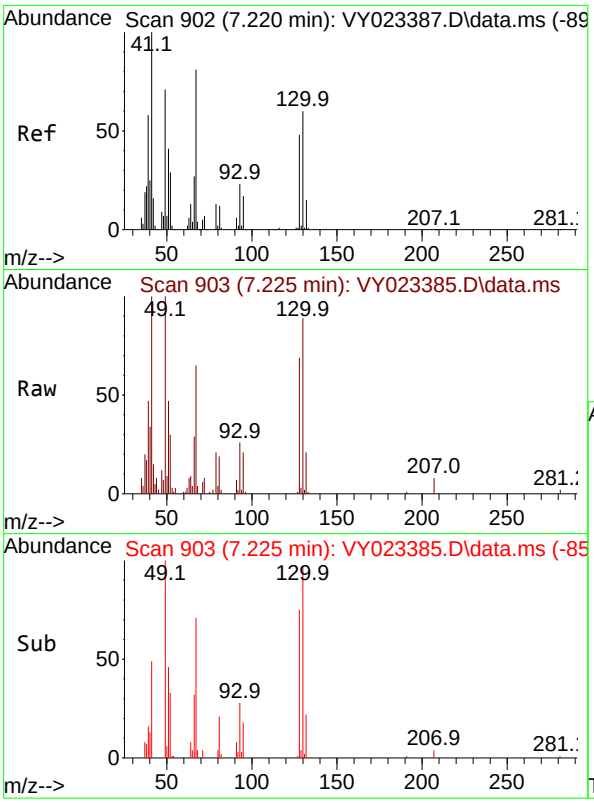


#40
Benzene
Concen: 9.758 ug/l
RT: 8.079 min Scan# 1043
Delta R.T. -0.000 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion: 78 Resp: 220629

Ion	Ratio	Lower	Upper
78	100		
77	22.8	18.3	27.5

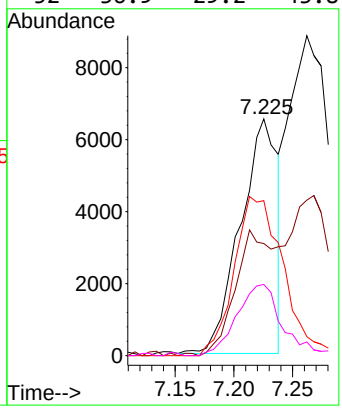




#41
Methacrylonitrile
Concen: 9.632 ug/l
RT: 7.225 min Scan# 9
Delta R.T. 0.006 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion: 41 Resp: 1434

Ion	Ratio	Lower	Upper
41	100		
39	49.9	52.2	78.4
67	90.2	74.9	112.3
52	36.9	29.2	43.8



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC010

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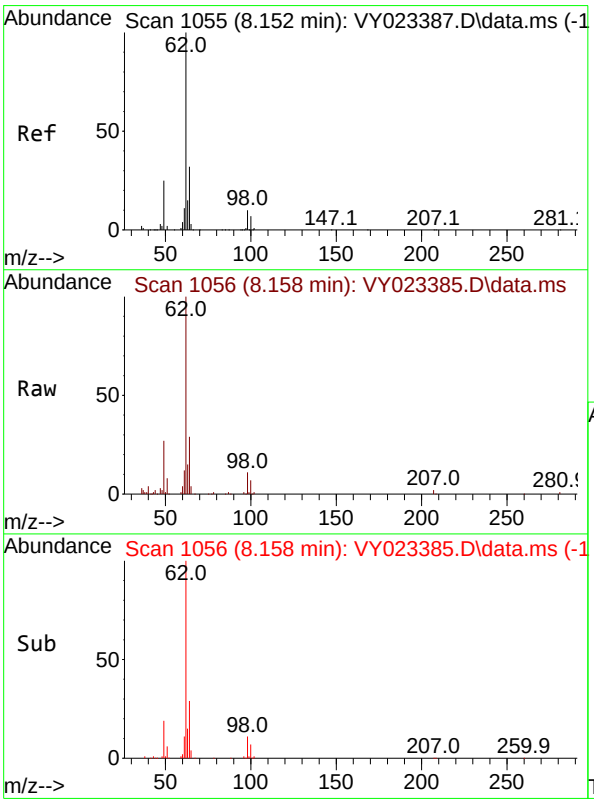
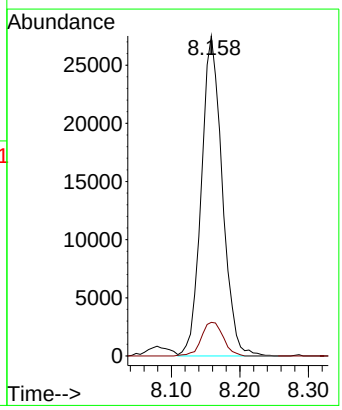
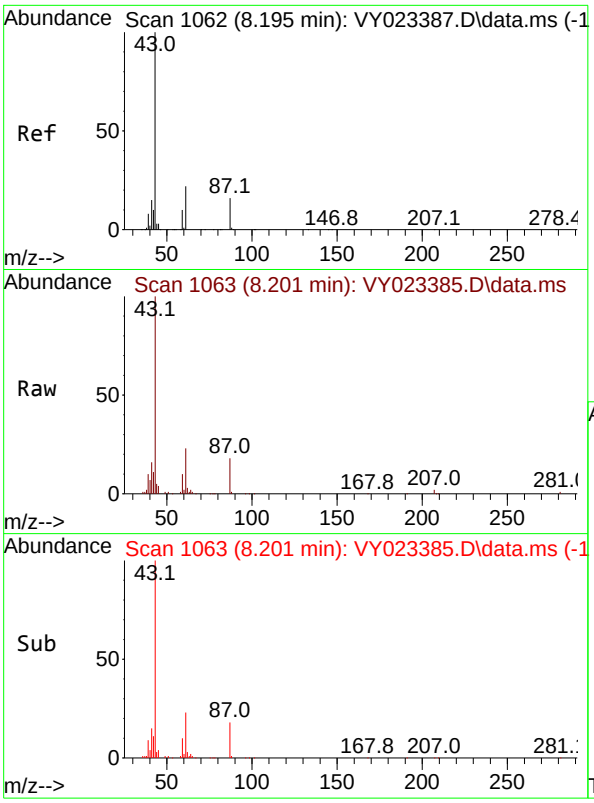


#42
1,2-Dichloroethane
Concen: 10.174 ug/l
RT: 8.158 min Scan# 1056
Delta R.T. 0.006 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion: 62 Resp: 58541

Ion	Ratio	Lower	Upper
62	100		
98	11.0	0.0	21.6

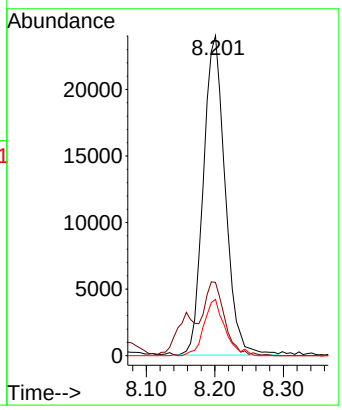




#43
Isopropyl Acetate
Concen: 9.510 ug/l
RT: 8.201 min Scan# 1
Delta R.T. 0.006 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion: 43 Resp: 5304

Ion	Ratio	Lower	Upper
43	100		
61	21.4	18.1	27.1
87	17.0	13.5	20.3



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC010

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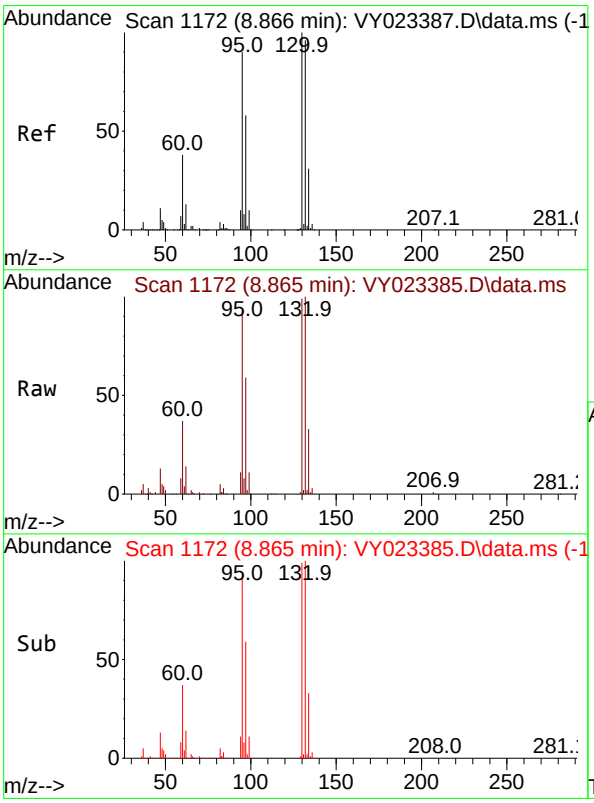
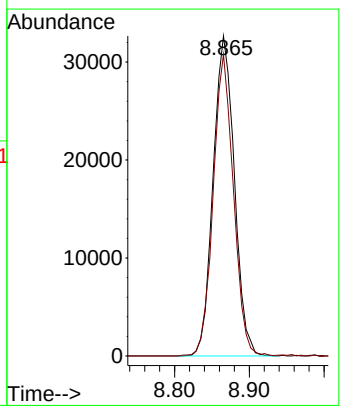
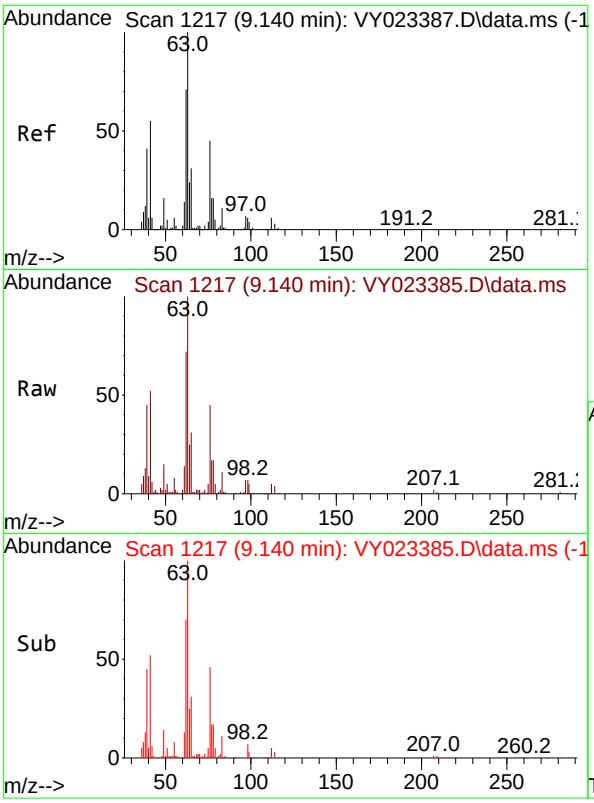


#44
Trichloroethene
Concen: 10.171 ug/l
RT: 8.865 min Scan# 1172
Delta R.T. -0.000 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion:130 Resp: 64537

Ion	Ratio	Lower	Upper
130	100		
95	94.2	0.0	180.6

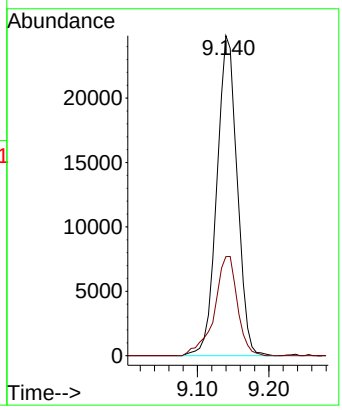




#45
1,2-Dichloropropane
Concen: 9.632 ug/l
RT: 9.140 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion: 63 Resp: 4900

Ion	Ratio	Lower	Upper
63	100		
65	31.0	24.9	37.3



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC010

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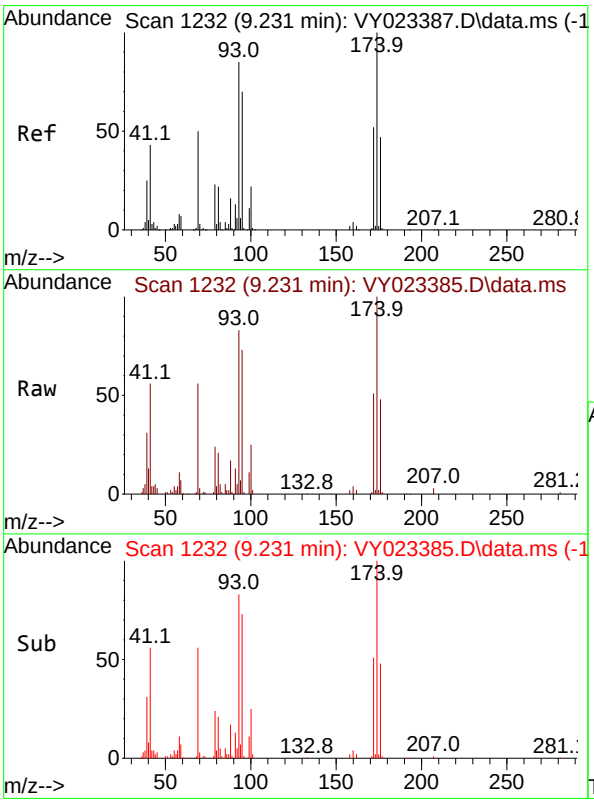
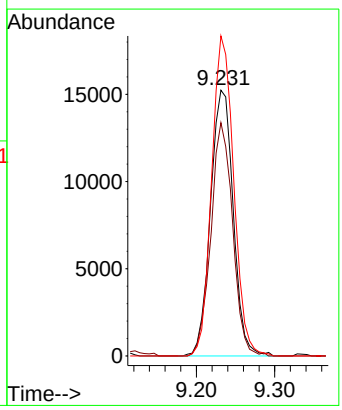
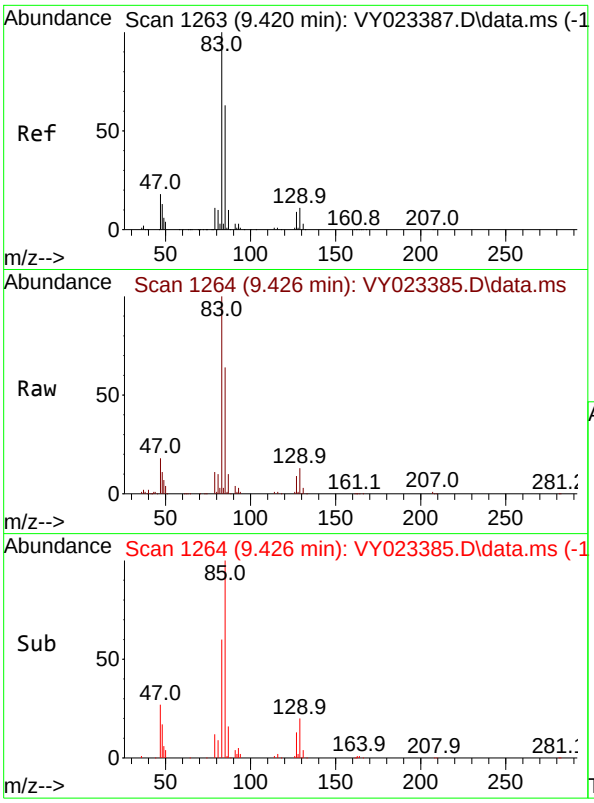


#46
Dibromomethane
Concen: 9.890 ug/l
RT: 9.231 min Scan# 1232
Delta R.T. -0.000 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion: 93 Resp: 30780

Ion	Ratio	Lower	Upper
93	100		
95	83.7	65.4	98.0
174	116.7	92.9	139.3

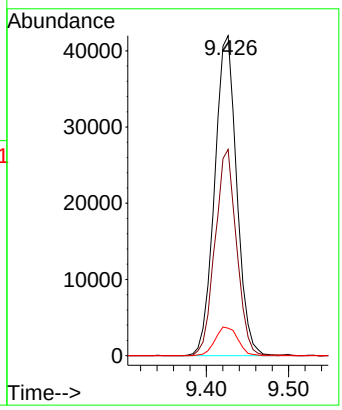




#47
Bromodichloromethane
Concen: 10.007 ug/l
RT: 9.426 min Scan# 1
Delta R.T. 0.006 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion: 83 Resp: 7839

Ion	Ratio	Lower	Upper
83	100		
85	64.5	50.8	76.2
127	8.6	7.4	11.2



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC010

Manual Integrations
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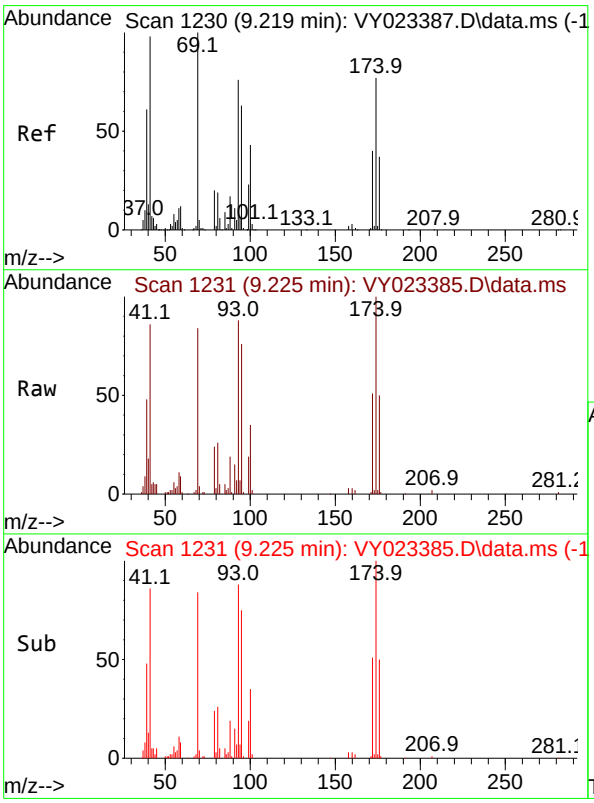
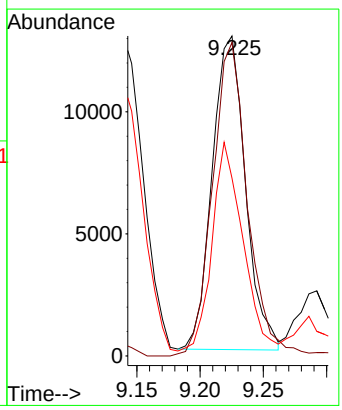
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

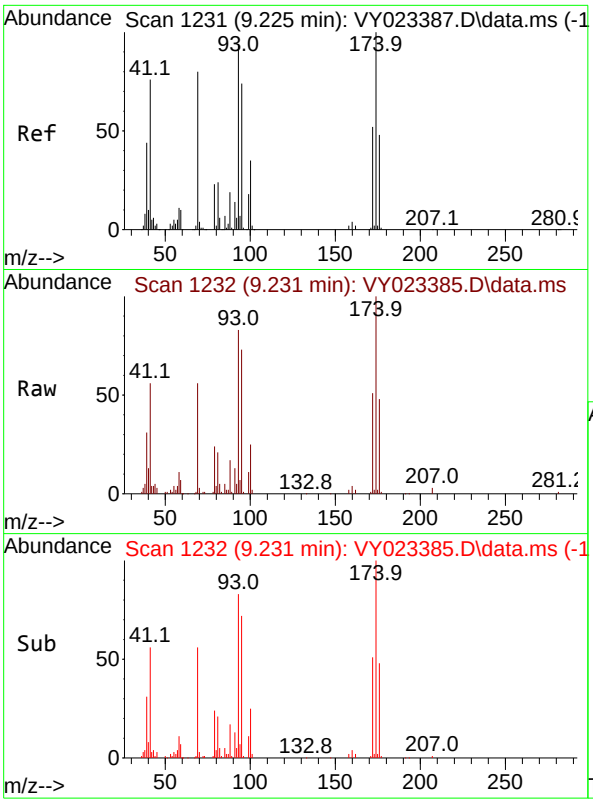


#48
Methyl methacrylate
Concen: 9.023 ug/l
RT: 9.225 min Scan# 1231
Delta R.T. 0.006 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion: 41 Resp: 23484

Ion	Ratio	Lower	Upper
41	100		
69	105.8	81.0	121.4
39	61.4	48.2	72.4

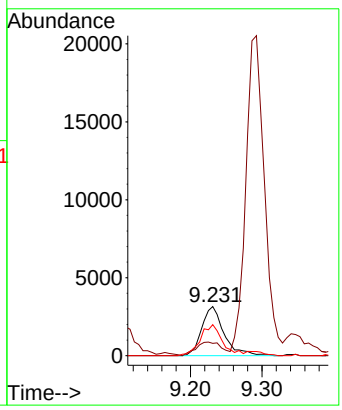




#49
1,4-Dioxane
Concen: 211.693 ug/l
RT: 9.231 min Scan# 1
Delta R.T. 0.006 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion: 88 Resp: 682

Ion	Ratio	Lower	Upper
88	100		
43	32.1	21.8	32.8
58	62.0	46.8	70.2



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC010

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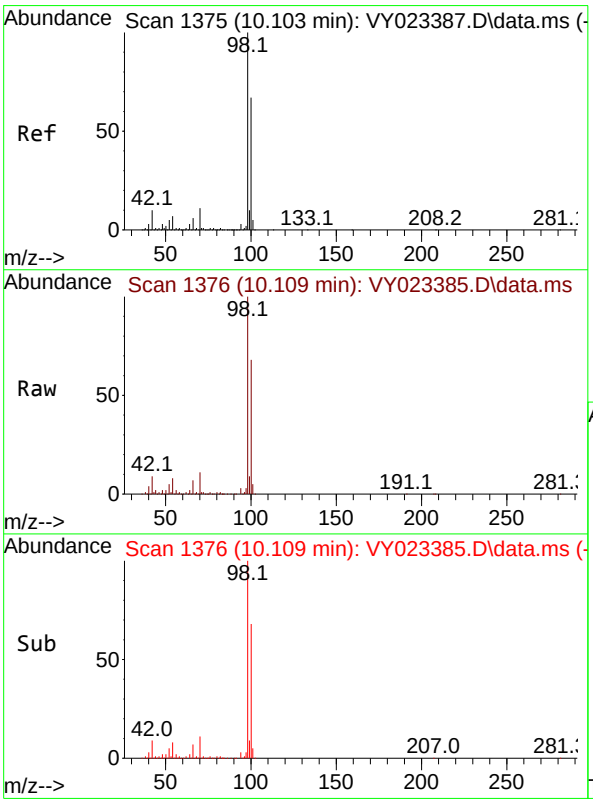
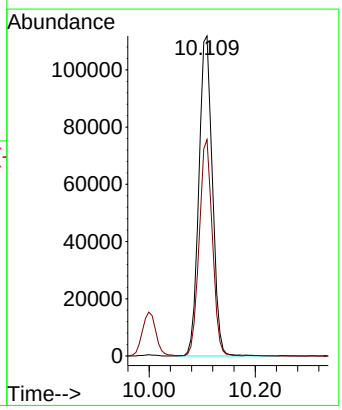
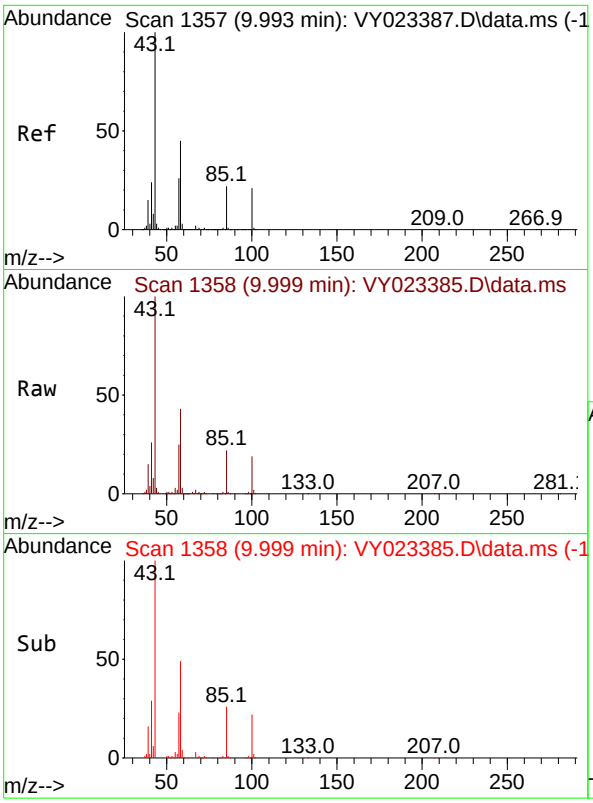


#50
Toluene-d8
Concen: 10.225 ug/l
RT: 10.109 min Scan# 1376
Delta R.T. 0.006 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion: 98 Resp: 198242

Ion	Ratio	Lower	Upper
98	100		
100	65.6	53.0	79.4

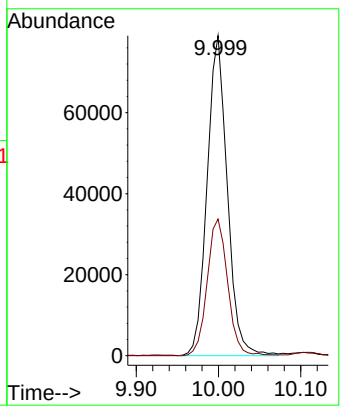




#51
4-Methyl-2-Pentanone
Concen: 47.165 ug/l
RT: 9.999 min Scan# 1
Delta R.T. 0.006 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion: 43 Resp: 13474

Ion	Ratio	Lower	Upper
43	100		
58	43.5	35.3	52.9



Instrument :
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ClientSampleId :
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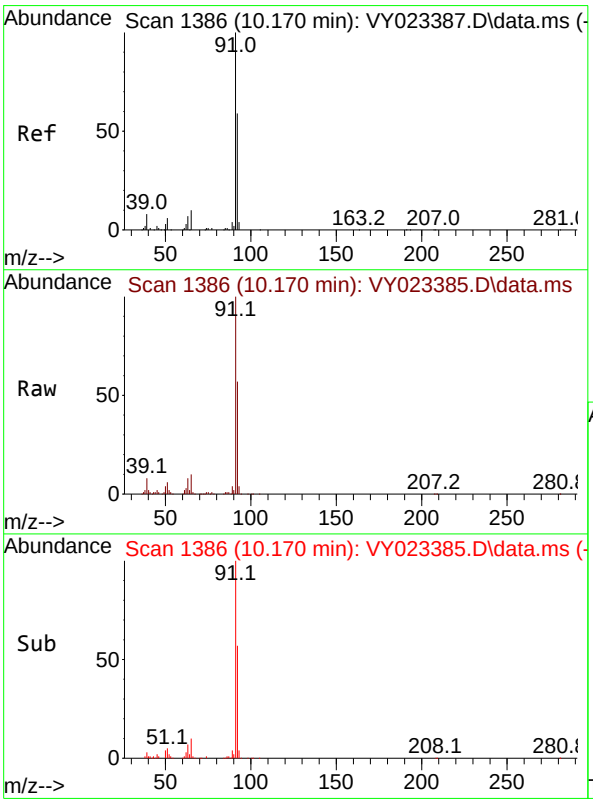
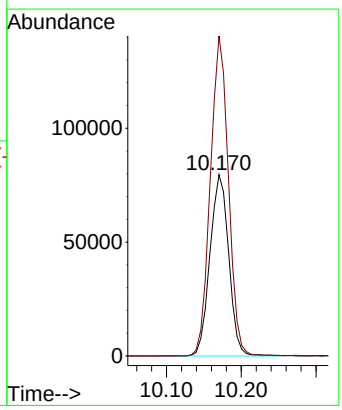
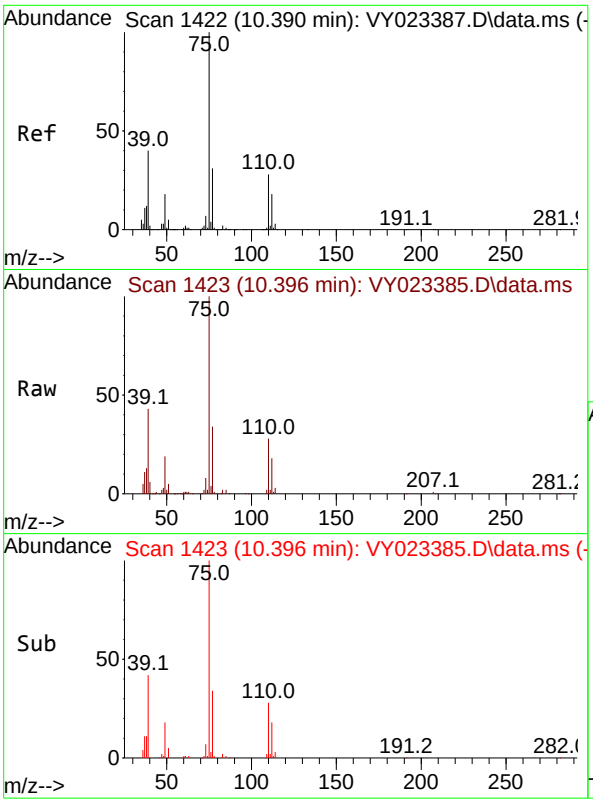


#52
Toluene
Concen: 9.661 ug/l
RT: 10.170 min Scan# 1386
Delta R.T. -0.000 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion: 92 Resp: 138662

Ion	Ratio	Lower	Upper
92	100		
91	170.6	136.4	204.6

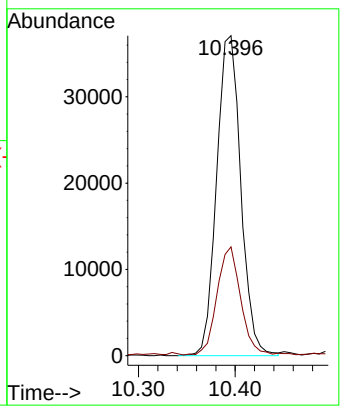




#53
t-1,3-Dichloropropene
Concen: 9.559 ug/l
RT: 10.396 min Scan# 14
Delta R.T. 0.006 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion: 75 Resp: 6431

Ion	Ratio	Lower	Upper
75	100		
77	33.4	25.1	37.7



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC010

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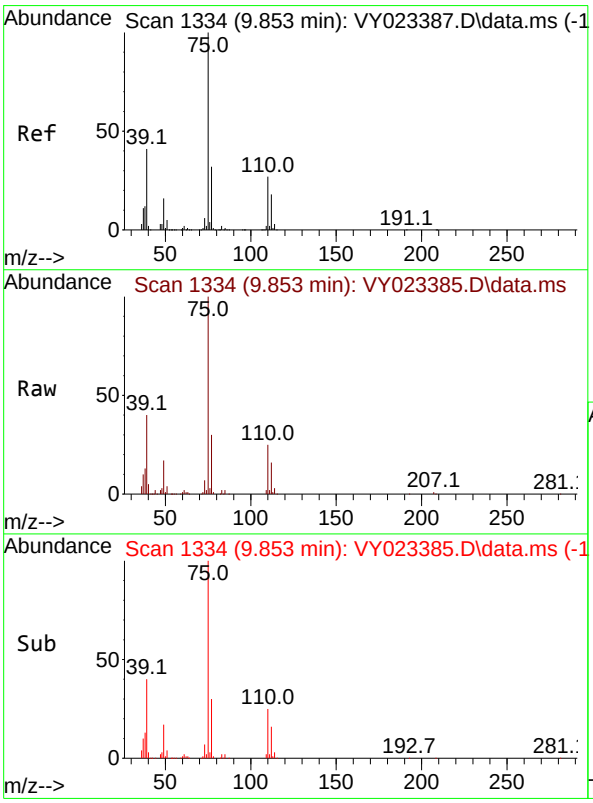
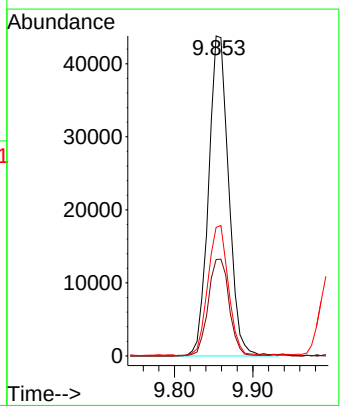
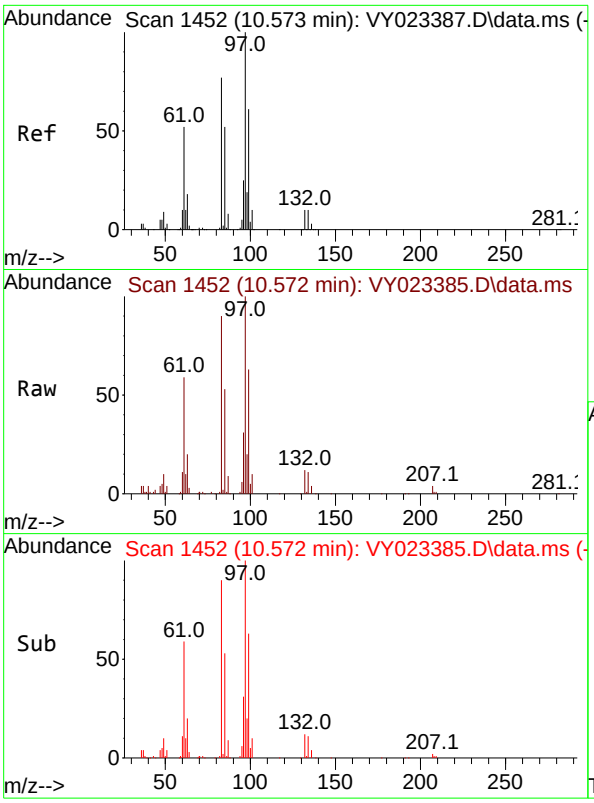


#54
cis-1,3-Dichloropropene
Concen: 9.687 ug/l
RT: 9.853 min Scan# 1334
Delta R.T. -0.000 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion: 75 Resp: 77905

Ion	Ratio	Lower	Upper
75	100		
77	30.0	25.4	38.0
39	40.2	32.8	49.2

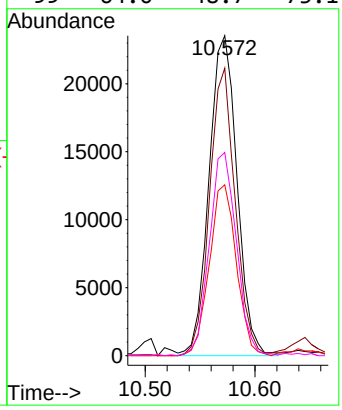




#55
1,1,2-Trichloroethane
Concen: 10.118 ug/l
RT: 10.572 min Scan# 14
Delta R.T. -0.000 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion: 97 Resp: 4188

Ion	Ratio	Lower	Upper
97	100		
83	90.6	61.8	92.6
85	53.8	41.3	61.9
99	64.0	48.7	73.1



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC010

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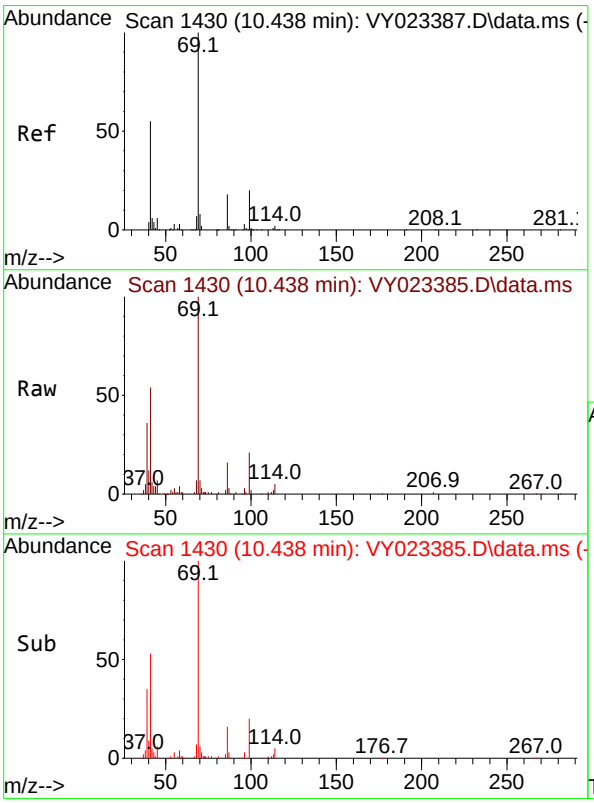
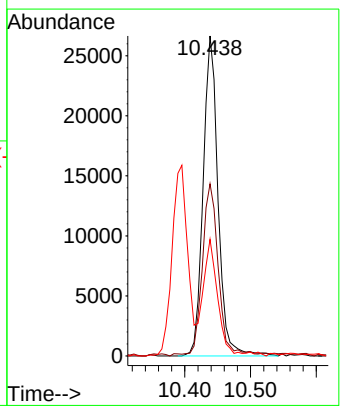
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

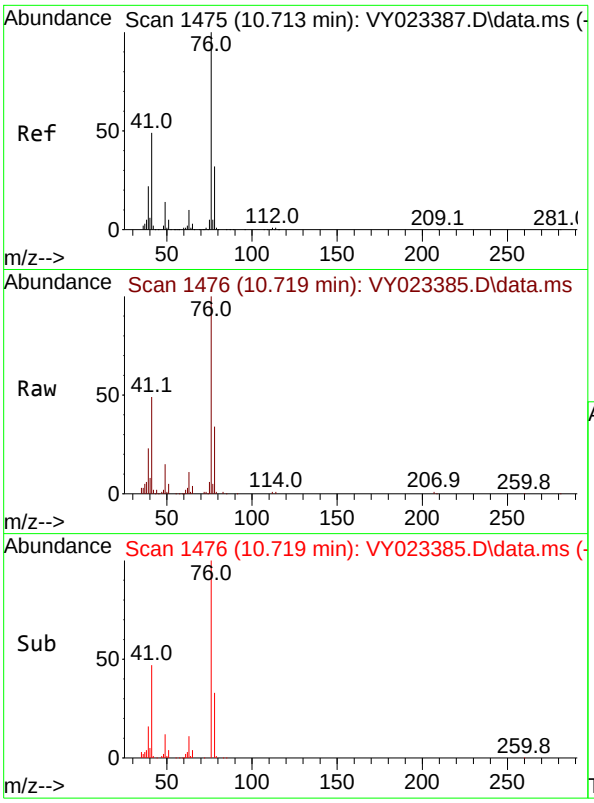


#56
Ethyl methacrylate
Concen: 8.830 ug/l
RT: 10.438 min Scan# 1430
Delta R.T. -0.000 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion: 69 Resp: 42096

Ion	Ratio	Lower	Upper
69	100		
41	58.1	44.6	67.0
39	34.5	27.0	40.4

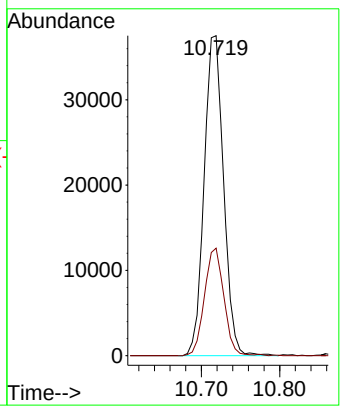




#57
1,3-Dichloropropane
Concen: 9.633 ug/l
RT: 10.719 min Scan# 14
Delta R.T. 0.006 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion: 76 Resp: 6453

Ion	Ratio	Lower	Upper
76	100		
78	33.6	25.9	38.9



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC010

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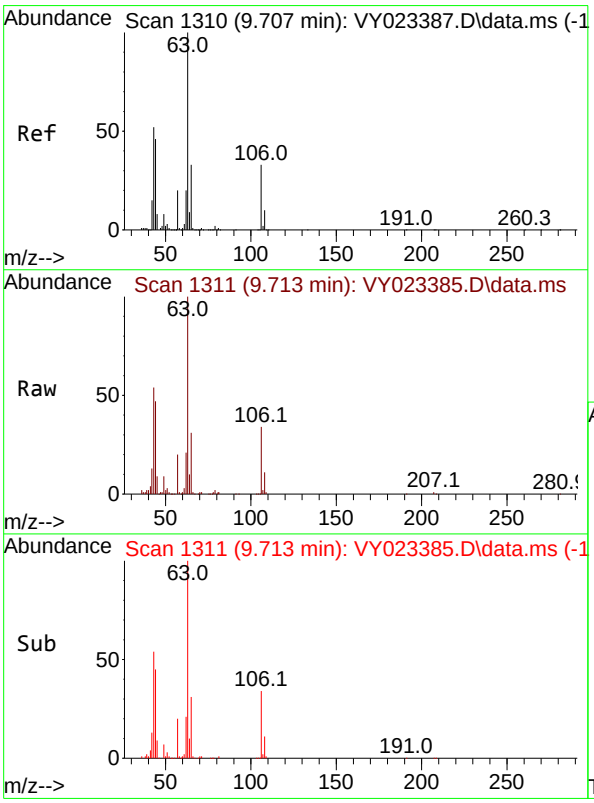
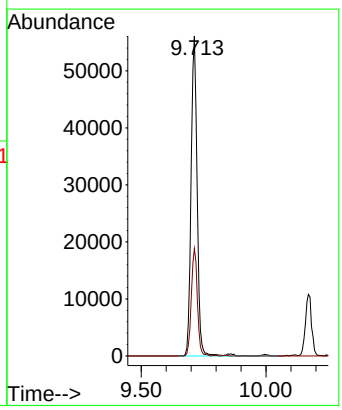
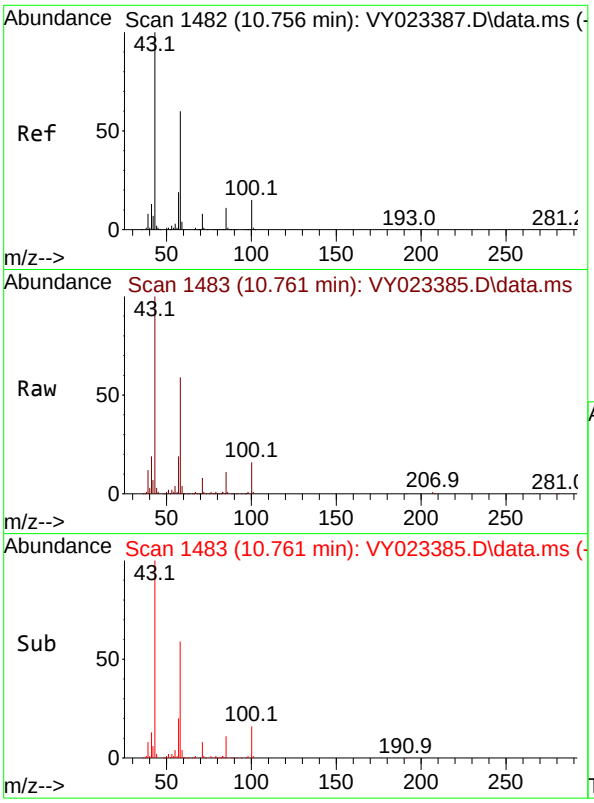


#58
2-Chloroethyl Vinyl ether
Concen: 45.535 ug/l m
RT: 9.713 min Scan# 1311
Delta R.T. 0.006 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion: 63 Resp: 94970

Ion	Ratio	Lower	Upper
63	100		
106	33.4	26.6	39.8

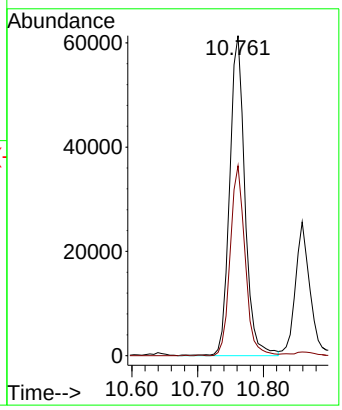




#59
2-Hexanone
Concen: 50.138 ug/l
RT: 10.761 min Scan# 14
Delta R.T. 0.006 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion: 43 Resp: 9917

Ion	Ratio	Lower	Upper
43	100		
58	58.0	30.5	91.5



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC010

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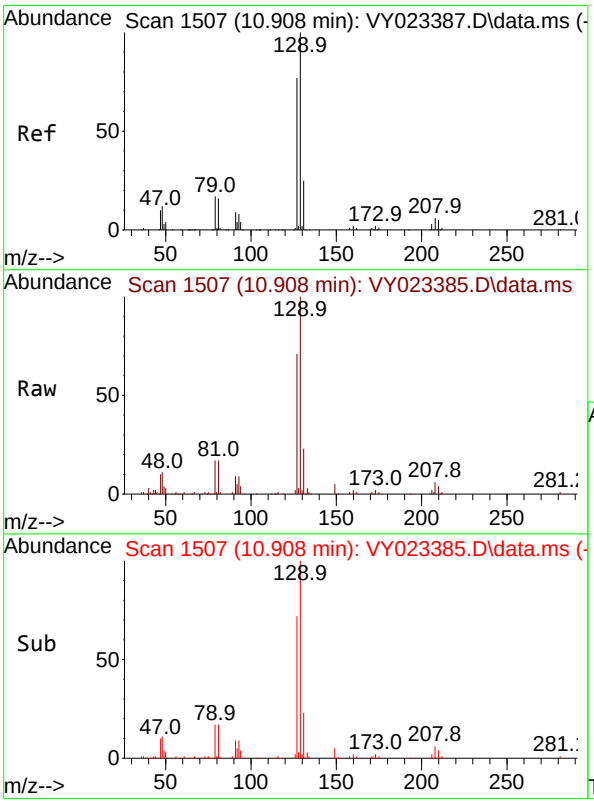
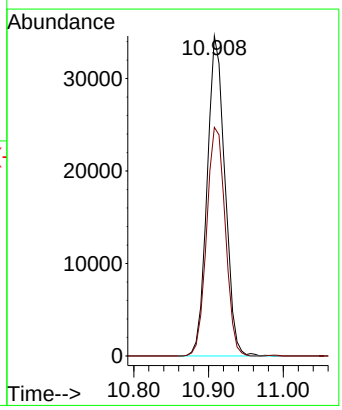
Supervised By :Mahesh Dadoda 10/10/2025

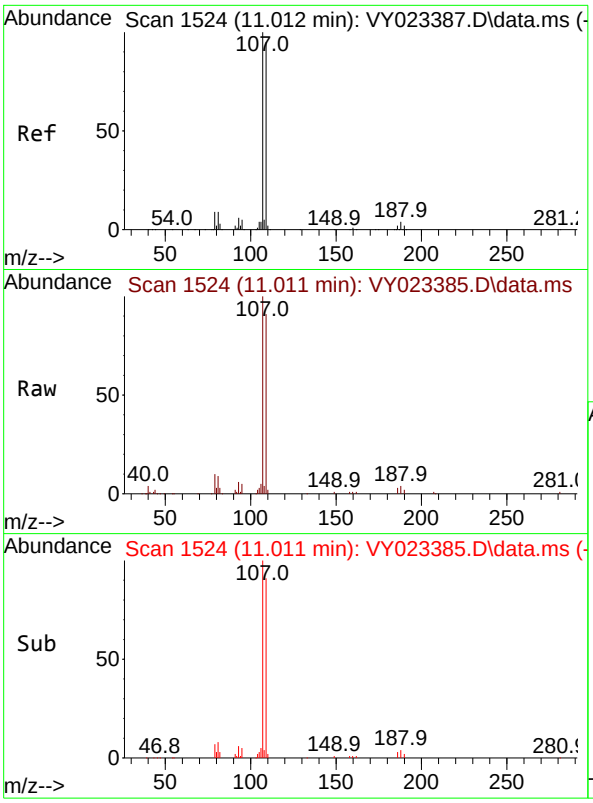


#60
Dibromochloromethane
Concen: 10.123 ug/l
RT: 10.908 min Scan# 1507
Delta R.T. -0.000 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion:129 Resp: 57151

Ion	Ratio	Lower	Upper
129	100		
127	74.9	38.6	115.7

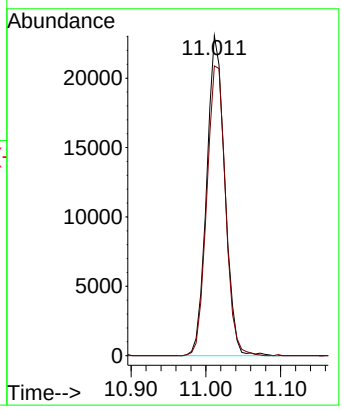




#61
1,2-Dibromoethane
Concen: 9.979 ug/l
RT: 11.011 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion:107 Resp: 3886

Ion	Ratio	Lower	Upper
107	100		
109	93.8	76.1	114.1



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC010

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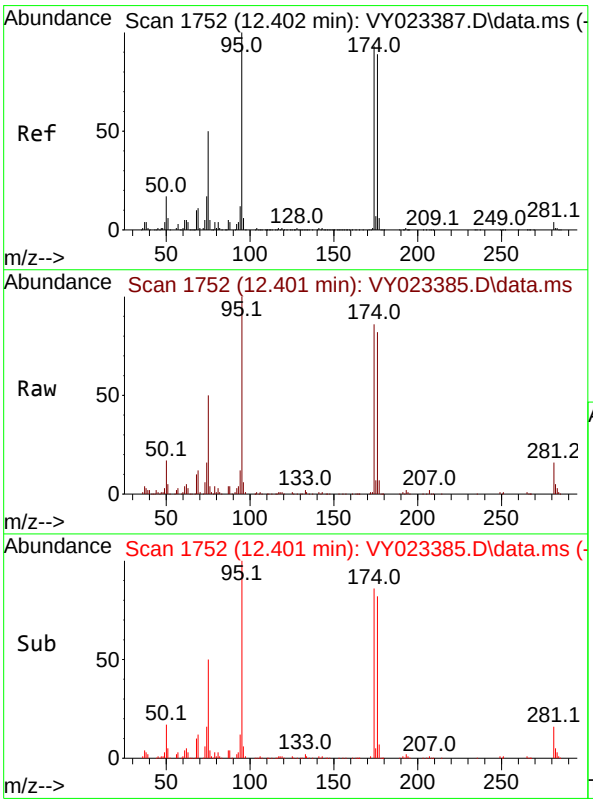
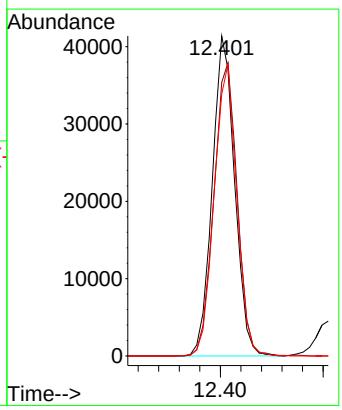
Supervised By :Mahesh Dadoda 10/10/2025

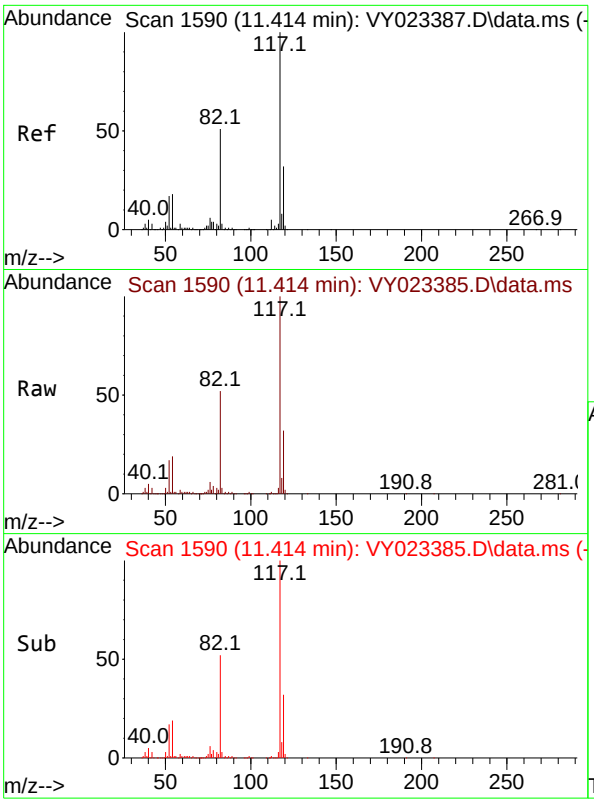


#62
4-Bromofluorobenzene
Concen: 10.235 ug/l
RT: 12.401 min Scan# 1752
Delta R.T. -0.000 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion: 95 Resp: 62601

Ion	Ratio	Lower	Upper
95	100		
174	94.6	0.0	192.8
176	92.1	0.0	187.6

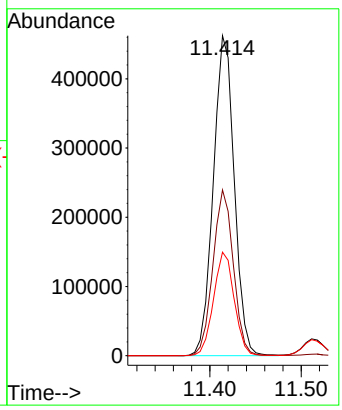




#63
Chlorobenzene-d5
Concen: 50.000 ug/l
RT: 11.414 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion:117 Resp: 73615

Ion	Ratio	Lower	Upper
117	100		
82	51.8	41.0	61.4
119	32.3	25.6	38.4



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC010

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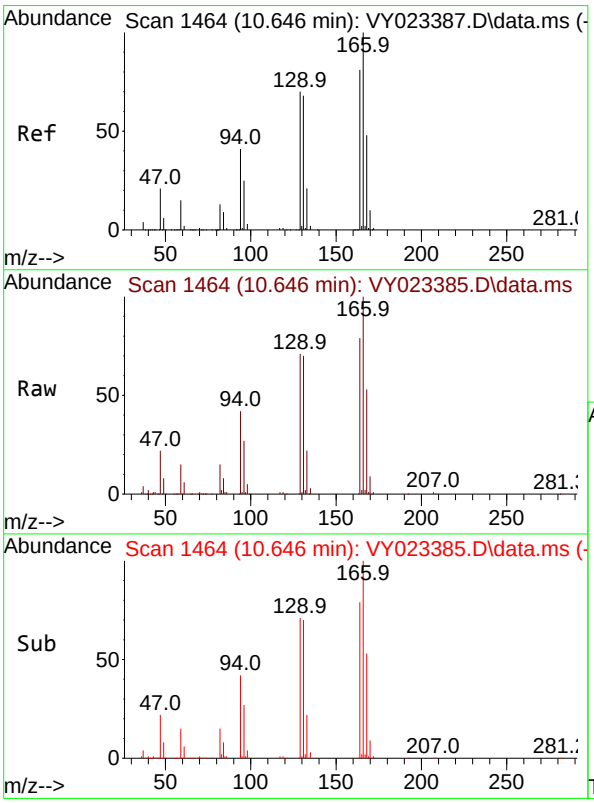
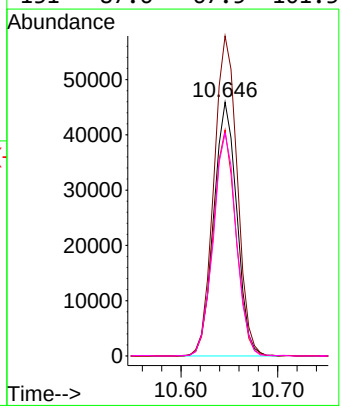
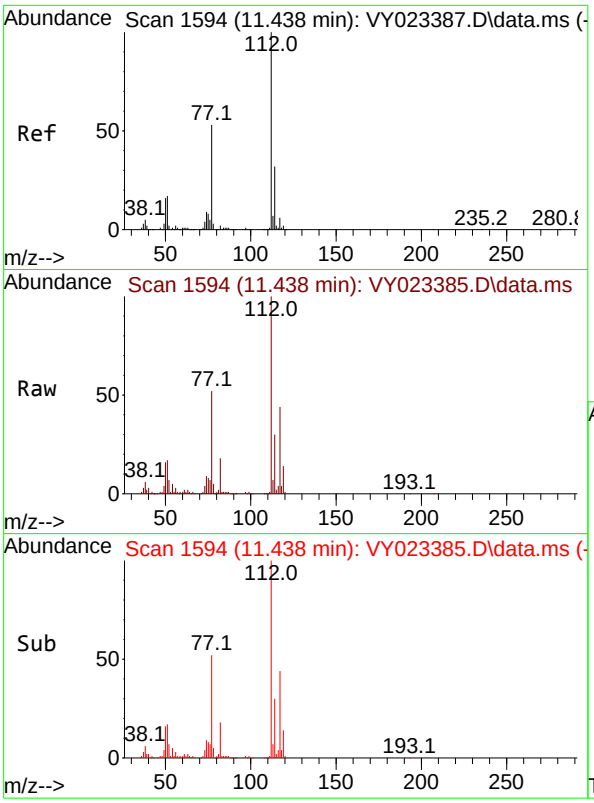


#64
Tetrachloroethene
Concen: 10.335 ug/l
RT: 10.646 min Scan# 1464
Delta R.T. -0.000 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion:164 Resp: 76110

Ion	Ratio	Lower	Upper
164	100		
166	126.1	99.4	149.0
129	89.0	69.4	104.2
131	87.6	67.5	101.3

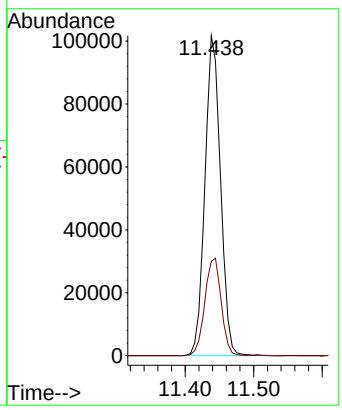




#65
Chlorobenzene
Concen: 10.074 ug/l
RT: 11.438 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion:112 Resp: 16115

Ion	Ratio	Lower	Upper
112	100		
114	29.5	25.6	38.4



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC010

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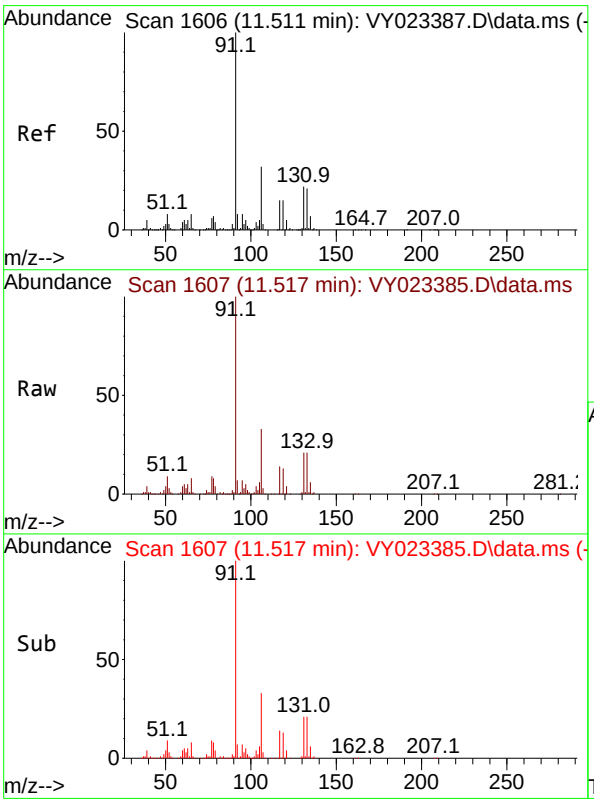
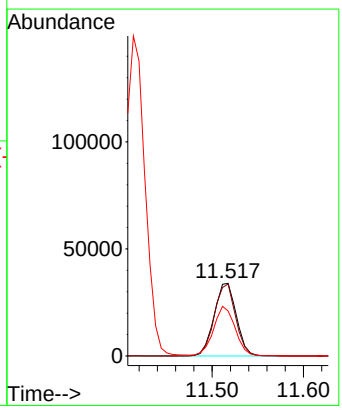
Supervised By :Mahesh Dadoda 10/10/2025

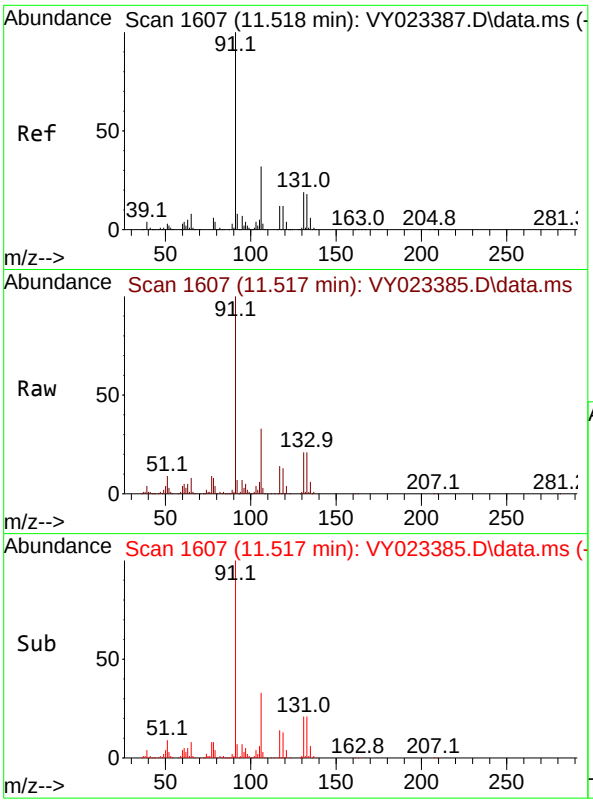


#66
1,1,1,2-Tetrachloroethane
Concen: 10.173 ug/l
RT: 11.517 min Scan# 1607
Delta R.T. 0.006 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion:131 Resp: 57233

Ion	Ratio	Lower	Upper
131	100		
133	95.8	48.4	145.2
119	66.9	32.4	97.2

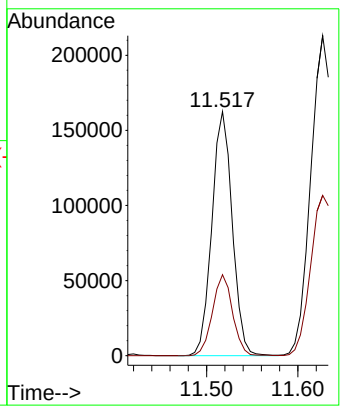




#67
Ethyl Benzene
Concen: 9.651 ug/l
RT: 11.517 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion: 91 Resp: 25195

Ion	Ratio	Lower	Upper
91	100		
106	33.1	25.8	38.8



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC010

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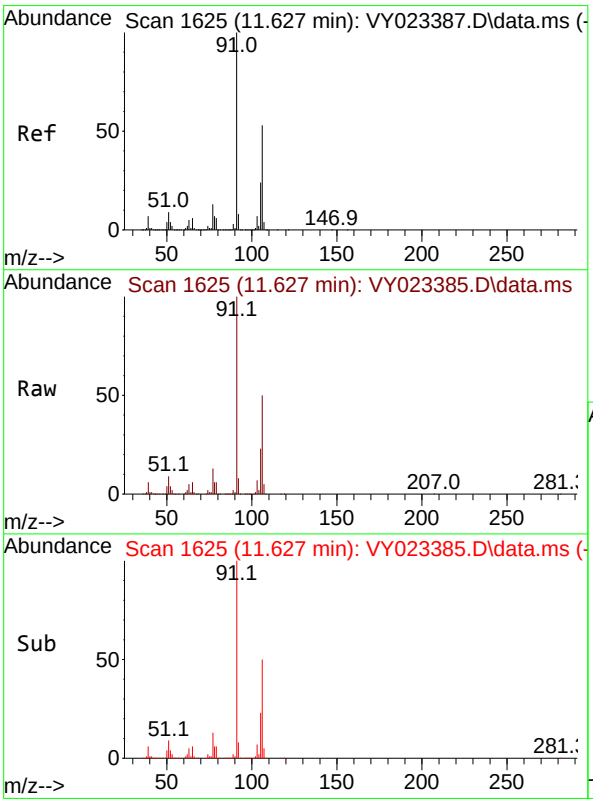
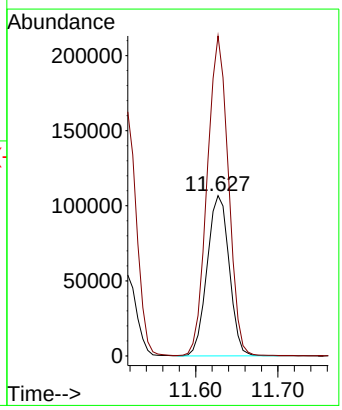
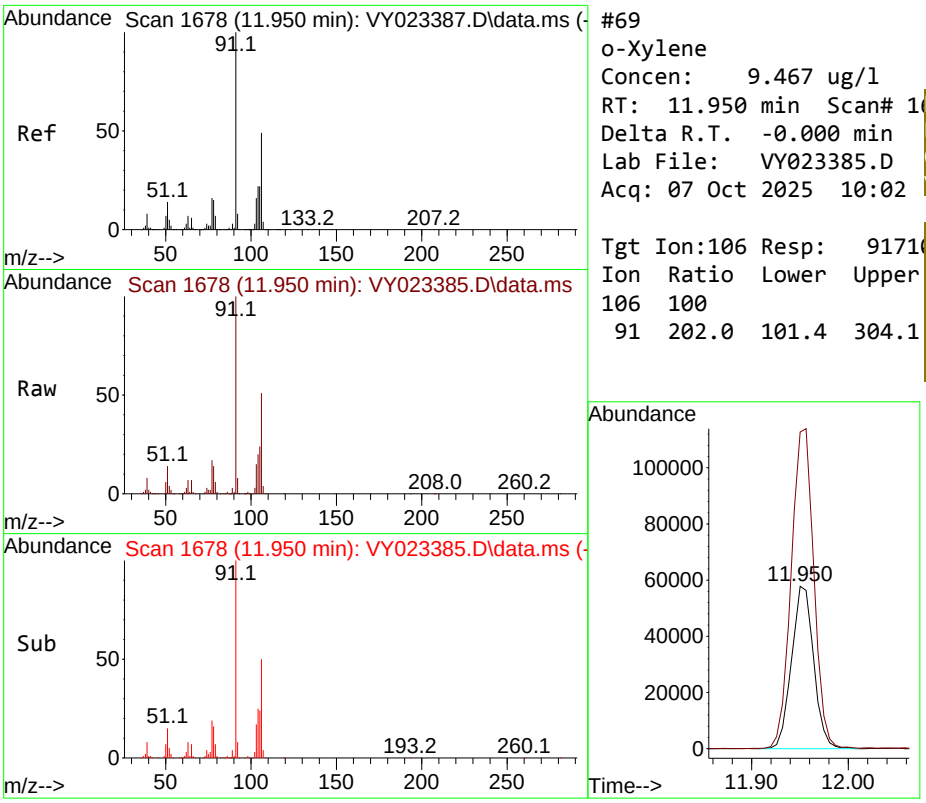


#68
m/p-Xylenes
Concen: 19.004 ug/l
RT: 11.627 min Scan# 1625
Delta R.T. -0.000 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion:106 Resp: 198866

Ion	Ratio	Lower	Upper
106	100		
91	192.3	152.6	229.0





#69
o-Xylene
Concen: 9.467 ug/l
RT: 11.950 min Scan# 1(
Delta R.T. -0.000 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion:106 Resp: 9171(

Ion	Ratio	Lower	Upper
106	100		
91	202.0	101.4	304.1

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC010

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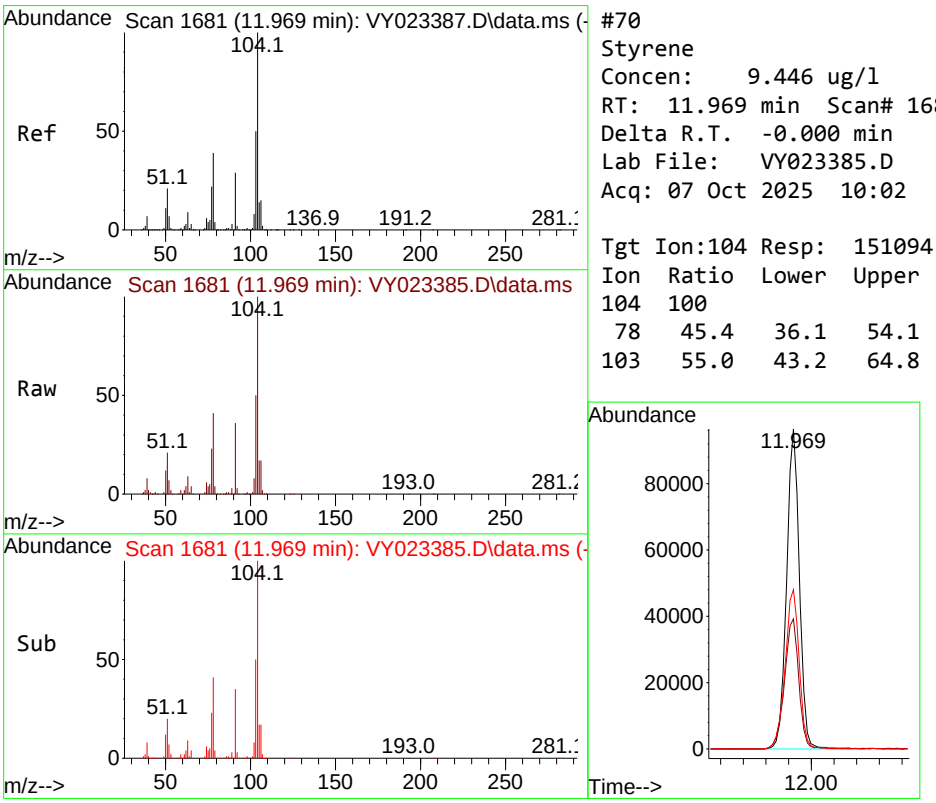
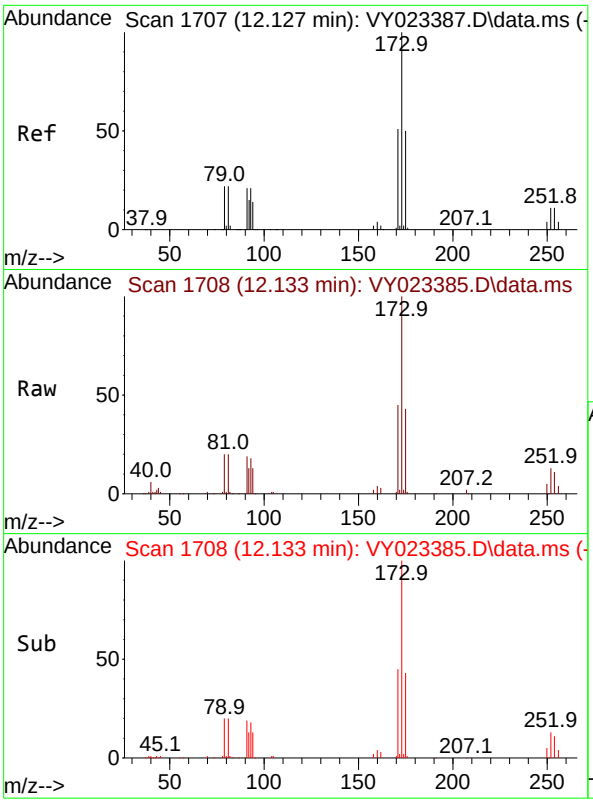


#70
Styrene
Concen: 9.446 ug/l
RT: 11.969 min Scan# 1681
Delta R.T. -0.000 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion:104 Resp: 151094

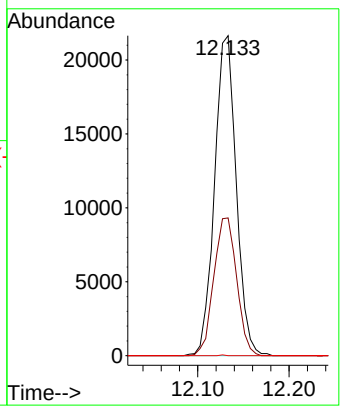
Ion	Ratio	Lower	Upper
104	100		
78	45.4	36.1	54.1
103	55.0	43.2	64.8



#71
Bromoform
Concen: 10.595 ug/l
RT: 12.133 min Scan# 1
Delta R.T. 0.006 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion:173 Resp: 3568

Ion	Ratio	Lower	Upper
173	100		
175	45.5	24.8	74.3
254	0.1	0.1	0.1



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC010

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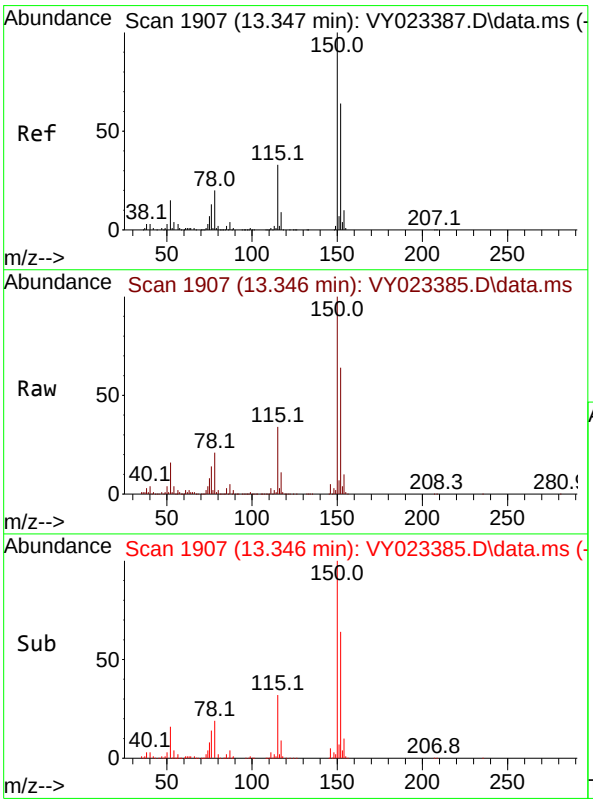
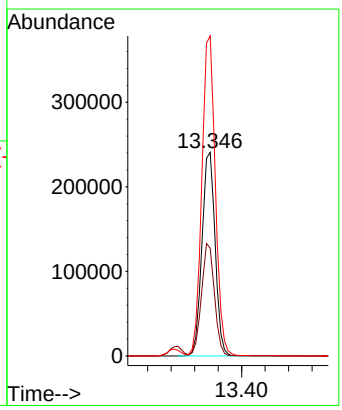
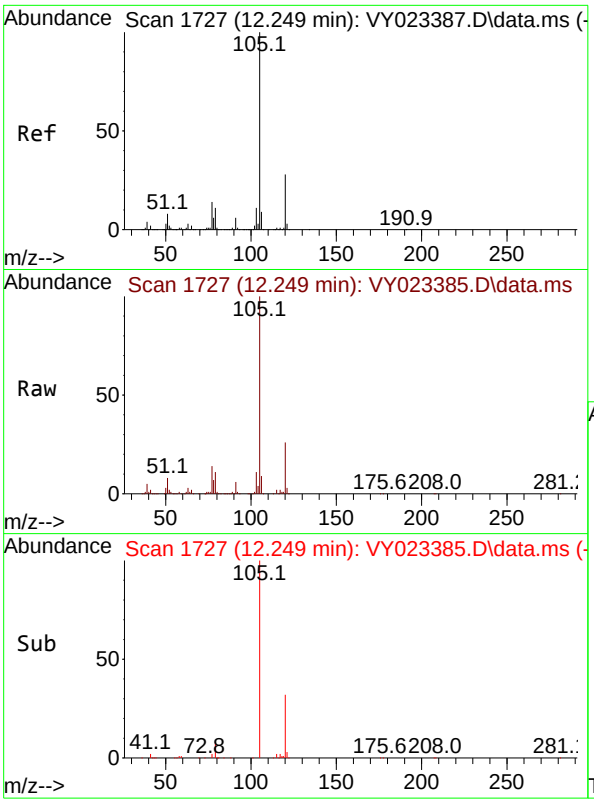


#72
1,4-Dichlorobenzene-d4
Concen: 50.000 ug/l
RT: 13.346 min Scan# 1907
Delta R.T. -0.000 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion:152 Resp: 374998

Ion	Ratio	Lower	Upper
152	100		
115	54.2	27.1	81.2
150	160.7	0.0	347.4

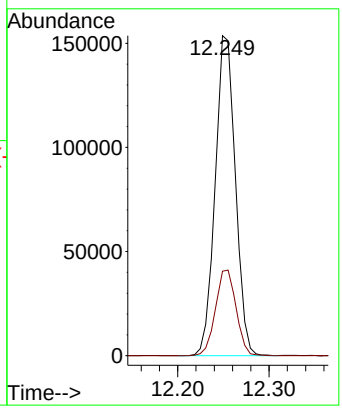




#73
Isopropylbenzene
Concen: 9.467 ug/l
RT: 12.249 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion:105 Resp: 23648

Ion	Ratio	Lower	Upper
105	100		
120	27.3	13.9	41.7



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC010

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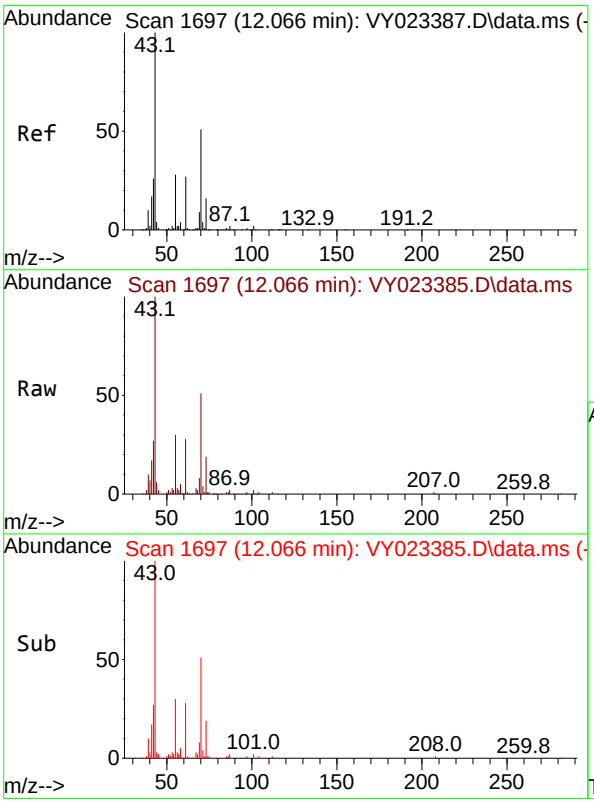
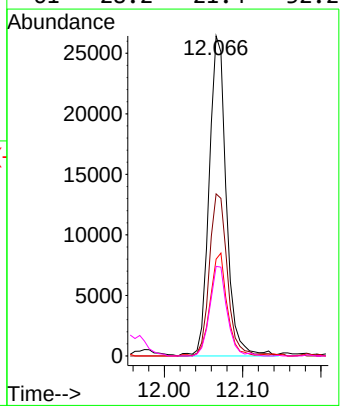
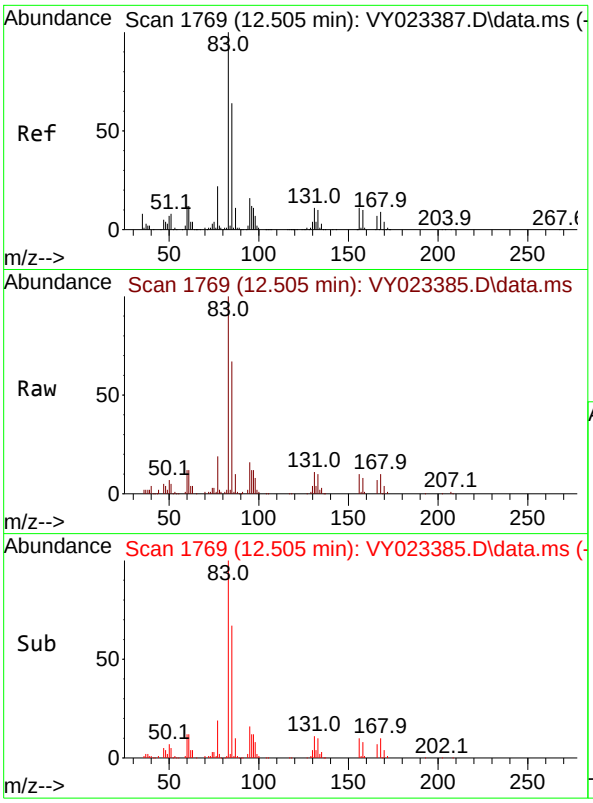


#74
N-amyl acetate
Concen: 8.590 ug/l
RT: 12.066 min Scan# 1697
Delta R.T. -0.000 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion: 43 Resp: 40098

Ion	Ratio	Lower	Upper
43	100		
70	52.7	41.1	61.7
55	31.6	23.0	34.6
61	28.2	21.4	32.2

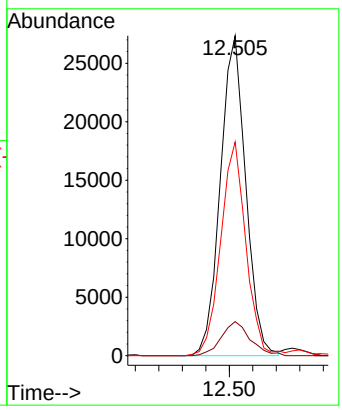




#75
1,1,2,2-Tetrachloroethane
Concen: 9.871 ug/l
RT: 12.505 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion: 83 Resp: 4113

Ion	Ratio	Lower	Upper
83	100		
131	12.0	5.9	17.6
85	66.1	31.8	95.3



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC010

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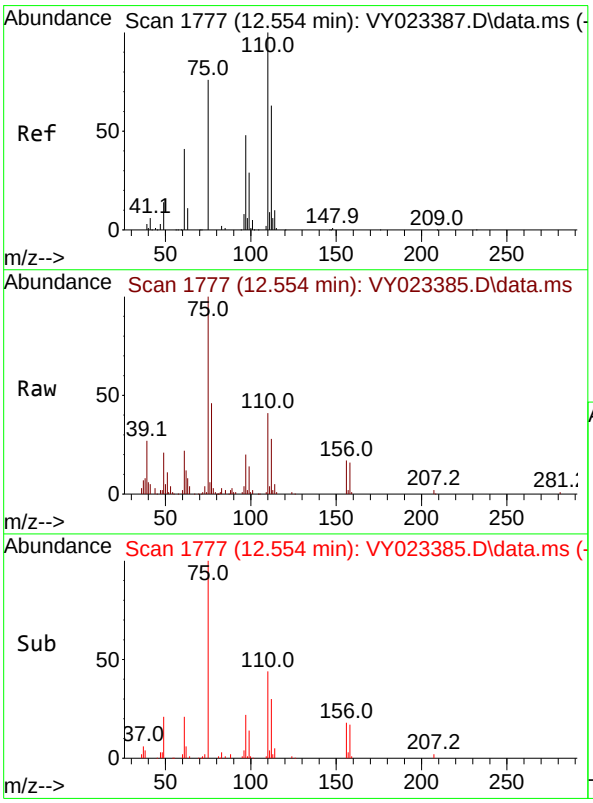
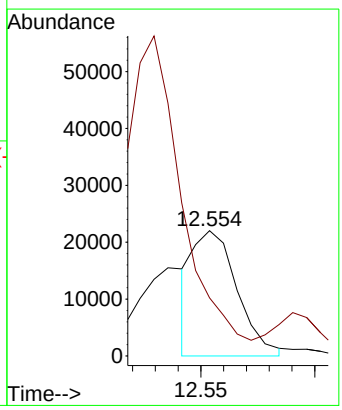
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

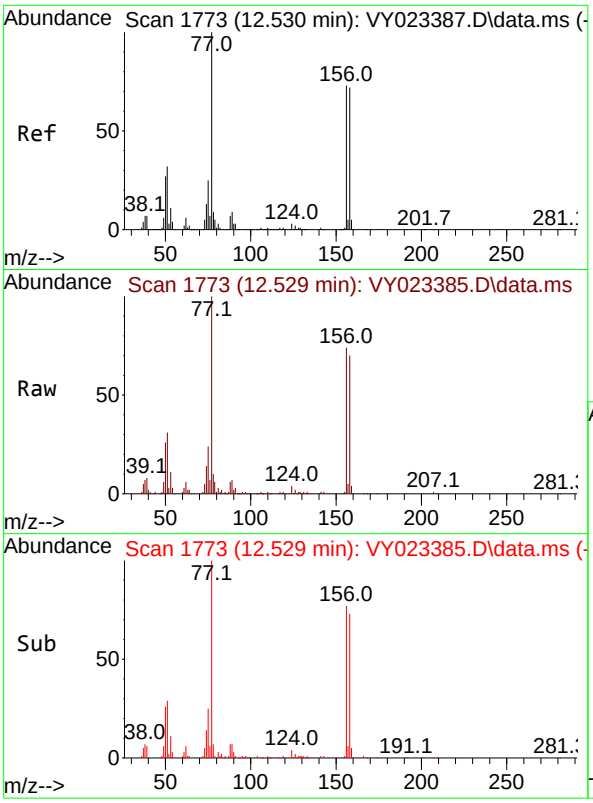


#76
1,2,3-Trichloropropane
Concen: 8.095 ug/l m
RT: 12.554 min Scan# 1777
Delta R.T. -0.000 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion: 75 Resp: 29944

Ion	Ratio	Lower	Upper
75	100		
77	0.0	0.0	0.0

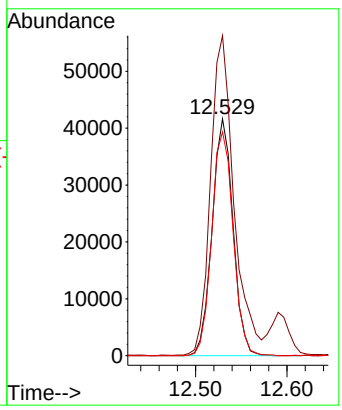




#77
Bromobenzene
Concen: 10.295 ug/l
RT: 12.529 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion:156 Resp: 6600

Ion	Ratio	Lower	Upper
156	100		
77	151.8	76.8	230.5
158	97.0	49.0	147.2



Instrument :
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ClientSampleId :
VSTDICC010

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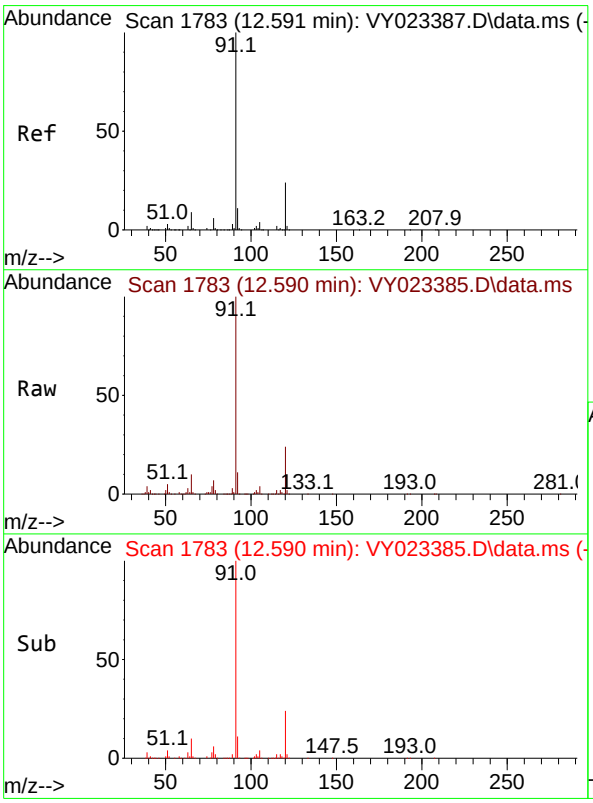
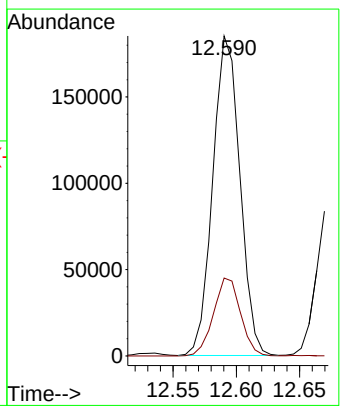
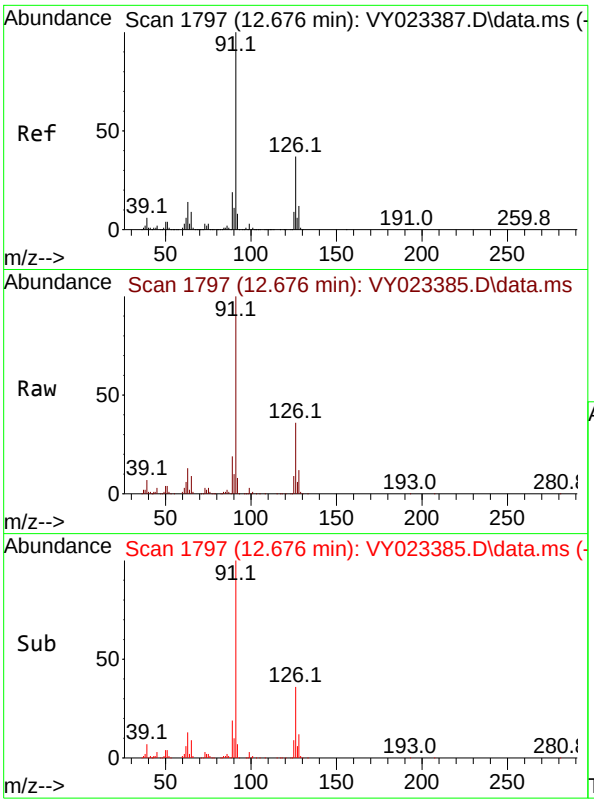


#78
n-propylbenzene
Concen: 9.384 ug/l
RT: 12.590 min Scan# 1783
Delta R.T. -0.000 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion: 91 Resp: 275671

Ion	Ratio	Lower	Upper
91	100		
120	24.4	12.3	36.8





#79
2-Chlorotoluene
Concen: 9.762 ug/l
RT: 12.676 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion: 91 Resp: 16558

Ion	Ratio	Lower	Upper
91	100		
126	36.9	18.5	55.5

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC010

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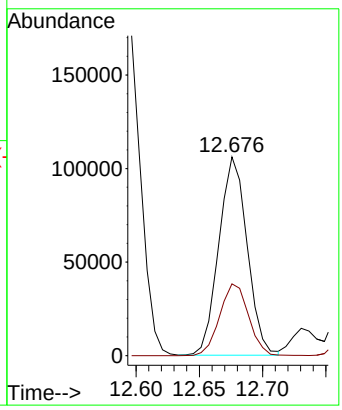
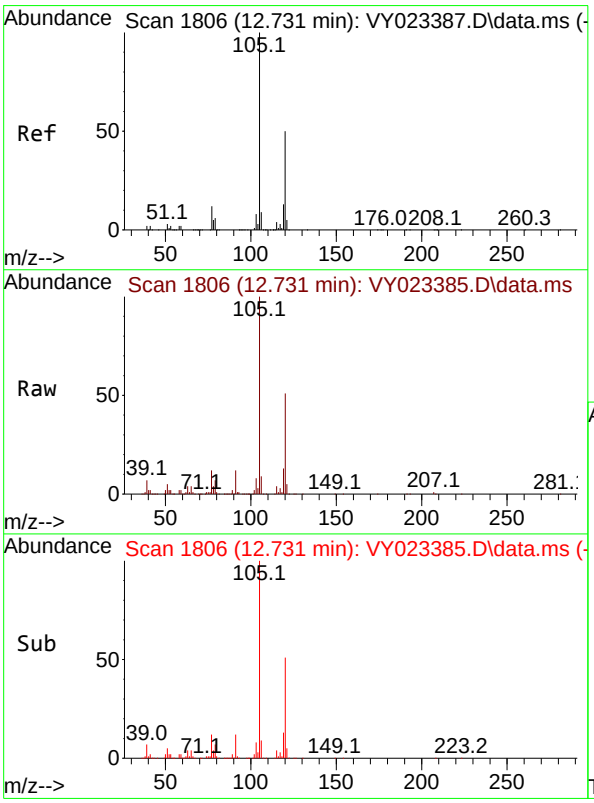
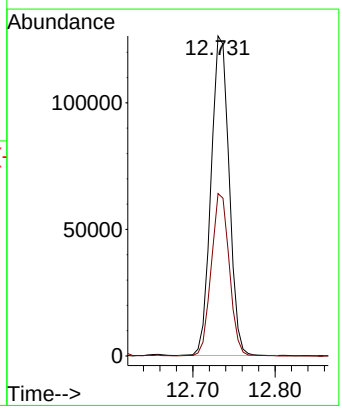


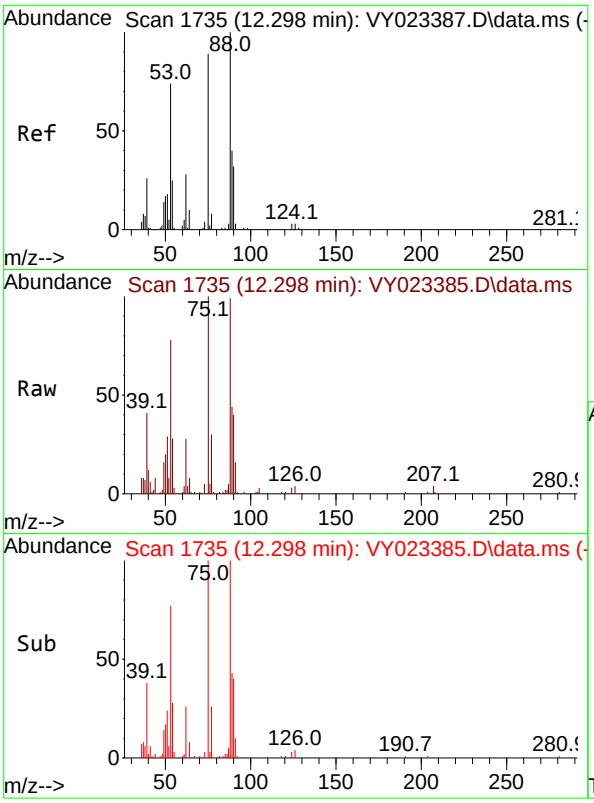


#80
1,3,5-Trimethylbenzene
Concen: 9.445 ug/l
RT: 12.731 min Scan# 1806
Delta R.T. -0.000 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion:105 Resp: 191799

Ion	Ratio	Lower	Upper
105	100		
120	50.9	25.4	76.4

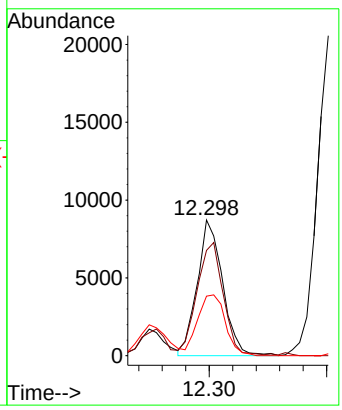




#81
trans-1,4-Dichloro-2-butene
Concen: 9.556 ug/l
RT: 12.298 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion: 75 Resp: 1311

Ion	Ratio	Lower	Upper
75	100		
53	84.6	68.6	102.8
89	48.5	39.0	58.4



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC010

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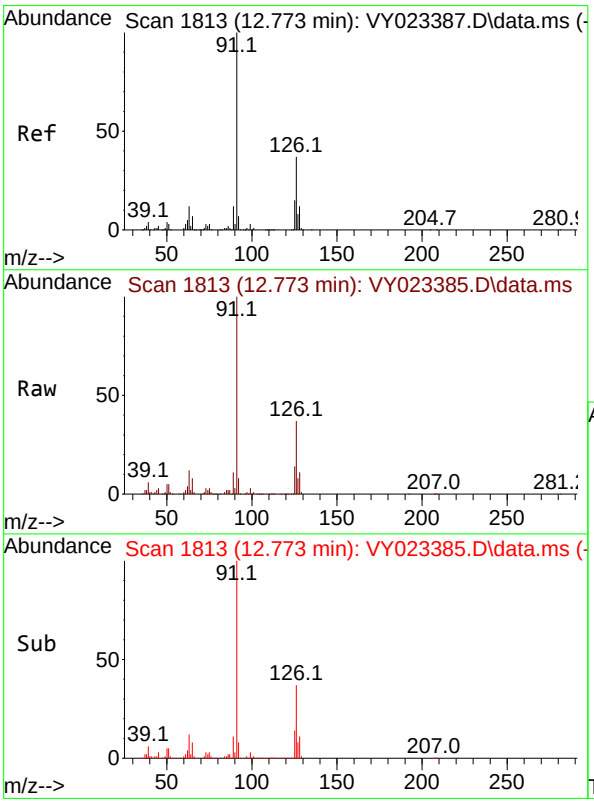
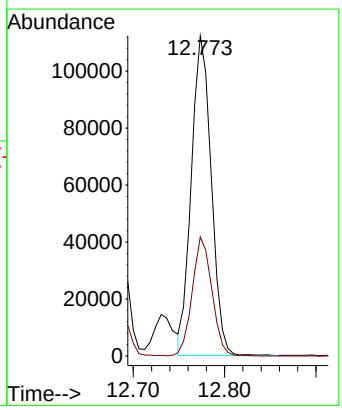
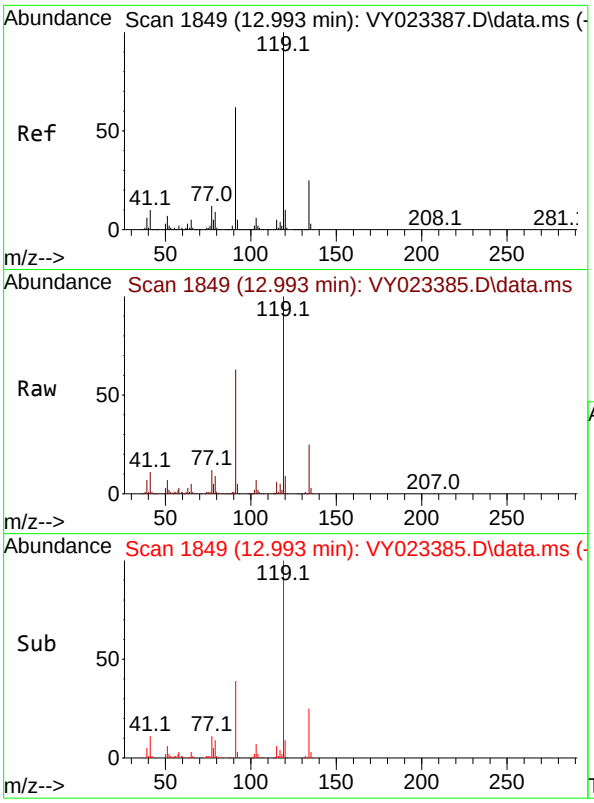


#82
4-Chlorotoluene
Concen: 9.595 ug/l
RT: 12.773 min Scan# 1813
Delta R.T. -0.000 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion: 91 Resp: 169968

Ion	Ratio	Lower	Upper
91	100		
126	36.8	18.4	55.4

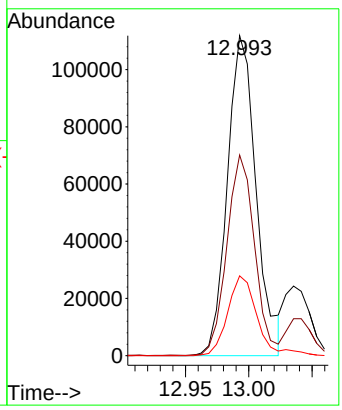




#83
tert-Butylbenzene
Concen: 9.579 ug/l
RT: 12.993 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion:119 Resp: 17725

Ion	Ratio	Lower	Upper
119	100		
91	60.5	29.9	89.8
134	25.6	12.9	38.7



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC010

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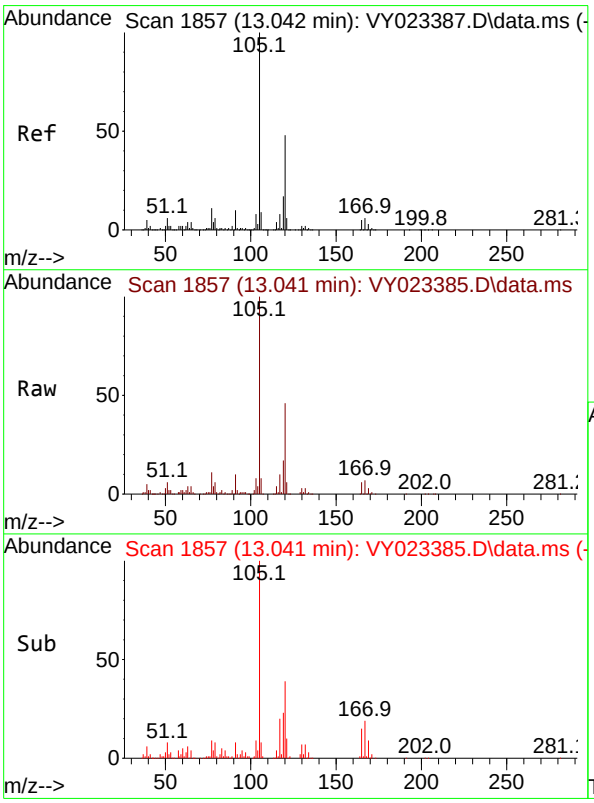
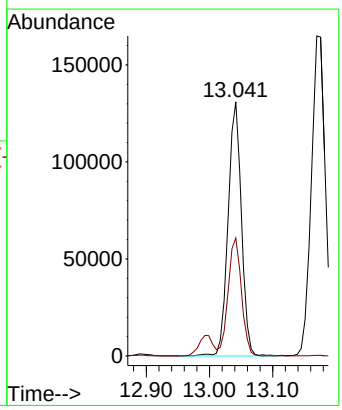
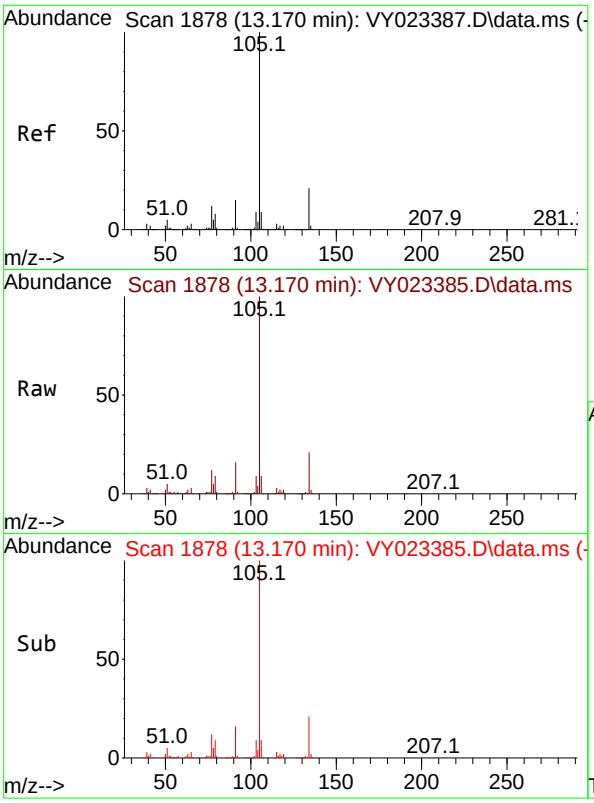


#84
1,2,4-Trimethylbenzene
Concen: 9.528 ug/l
RT: 13.041 min Scan# 1857
Delta R.T. -0.000 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion:105 Resp: 191423

Ion	Ratio	Lower	Upper
105	100		
120	46.4	23.8	71.2

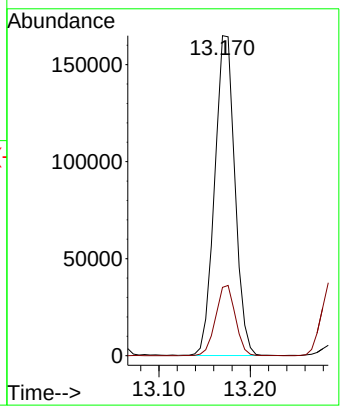




#85
sec-Butylbenzene
Concen: 9.483 ug/l
RT: 13.170 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion:105 Resp: 25413

Ion	Ratio	Lower	Upper
105	100		
134	21.4	10.7	32.1



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC010

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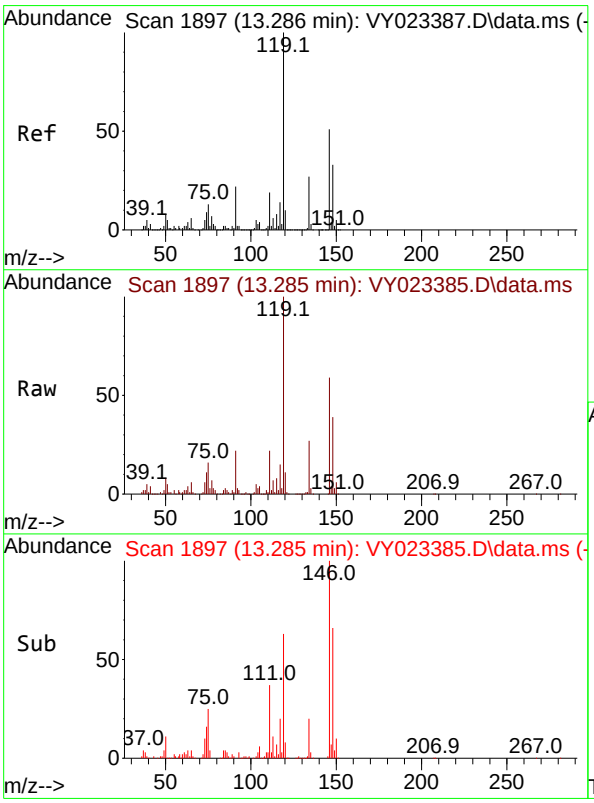
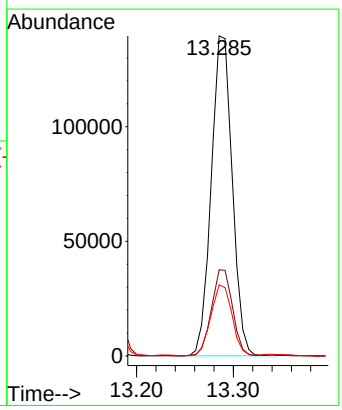
Supervised By :Mahesh Dadoda 10/10/2025

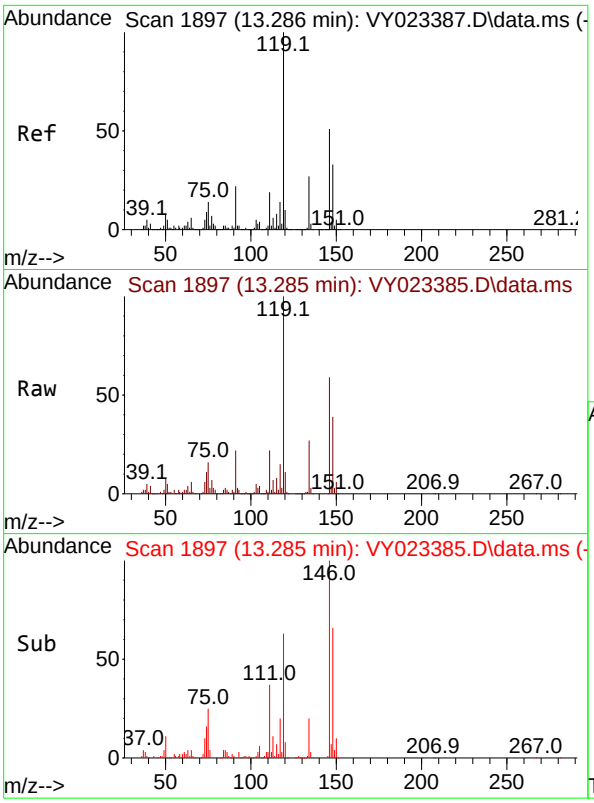


#86
p-Isopropyltoluene
Concen: 9.287 ug/l
RT: 13.285 min Scan# 1897
Delta R.T. -0.000 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion:119 Resp: 210320

Ion	Ratio	Lower	Upper
119	100		
134	27.0	13.6	40.7
91	22.3	10.9	32.9

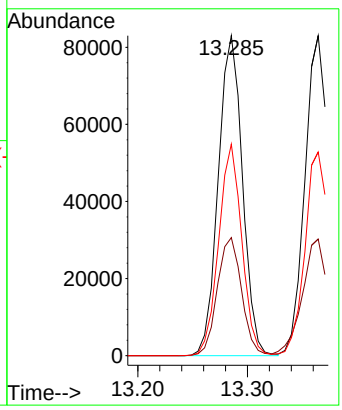




#87
1,3-Dichlorobenzene
Concen: 10.058 ug/l
RT: 13.285 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion:146 Resp: 12737

Ion	Ratio	Lower	Upper
146	100		
111	37.1	18.7	56.1
148	63.2	31.9	95.9



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC010

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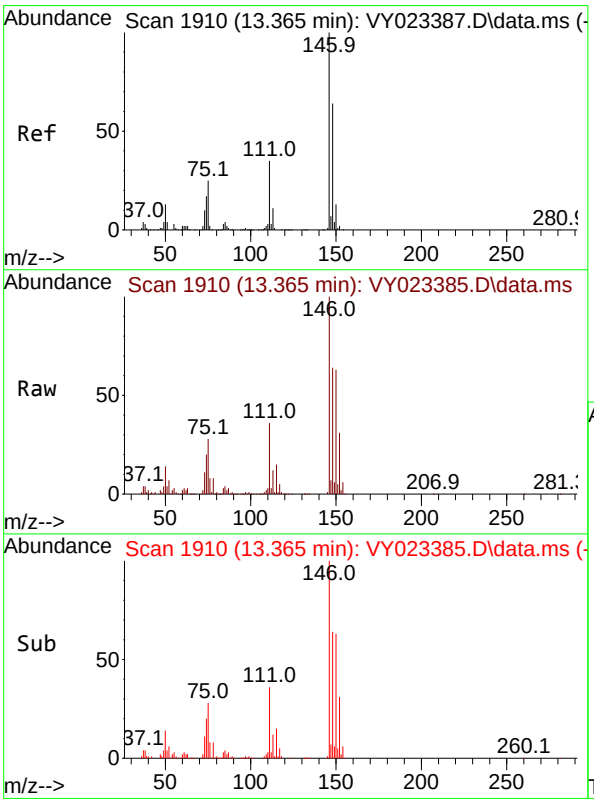
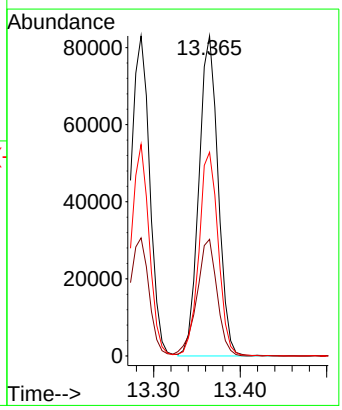
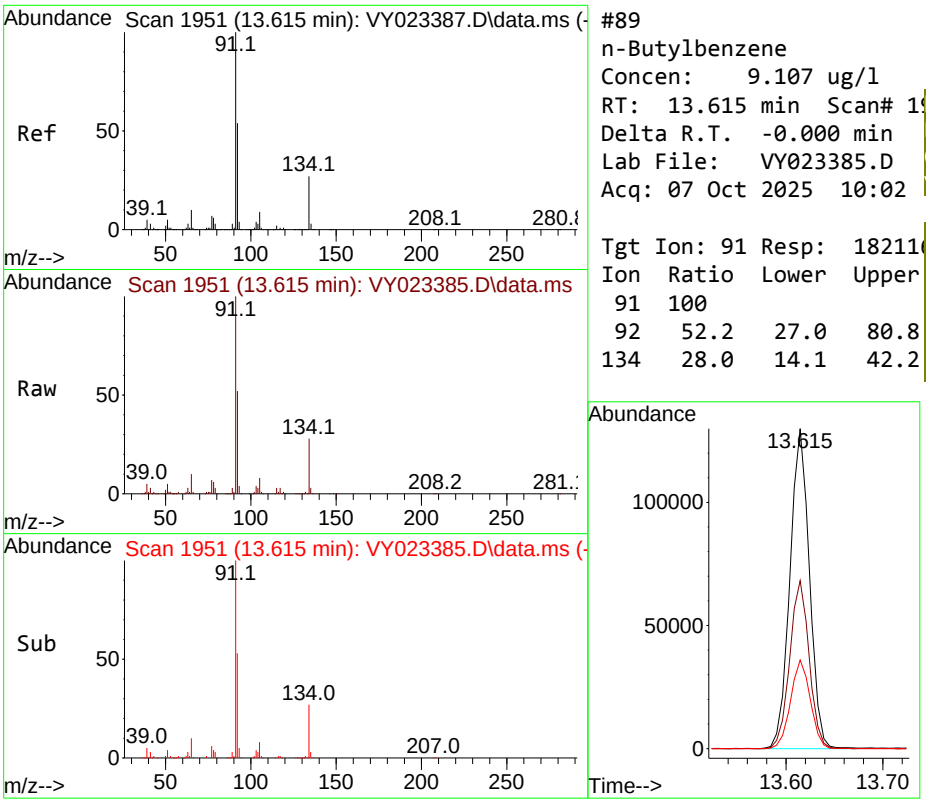


#88
1,4-Dichlorobenzene
Concen: 10.172 ug/l
RT: 13.365 min Scan# 1910
Delta R.T. -0.000 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion:146 Resp: 127757

Ion	Ratio	Lower	Upper
146	100		
111	38.6	18.0	54.0
148	64.2	31.9	95.7





#89
n-Butylbenzene
Concen: 9.107 ug/l
RT: 13.615 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion: 91 Resp: 18211

Ion	Ratio	Lower	Upper
91	100		
92	52.2	27.0	80.8
134	28.0	14.1	42.2

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC010

Manual Integrations
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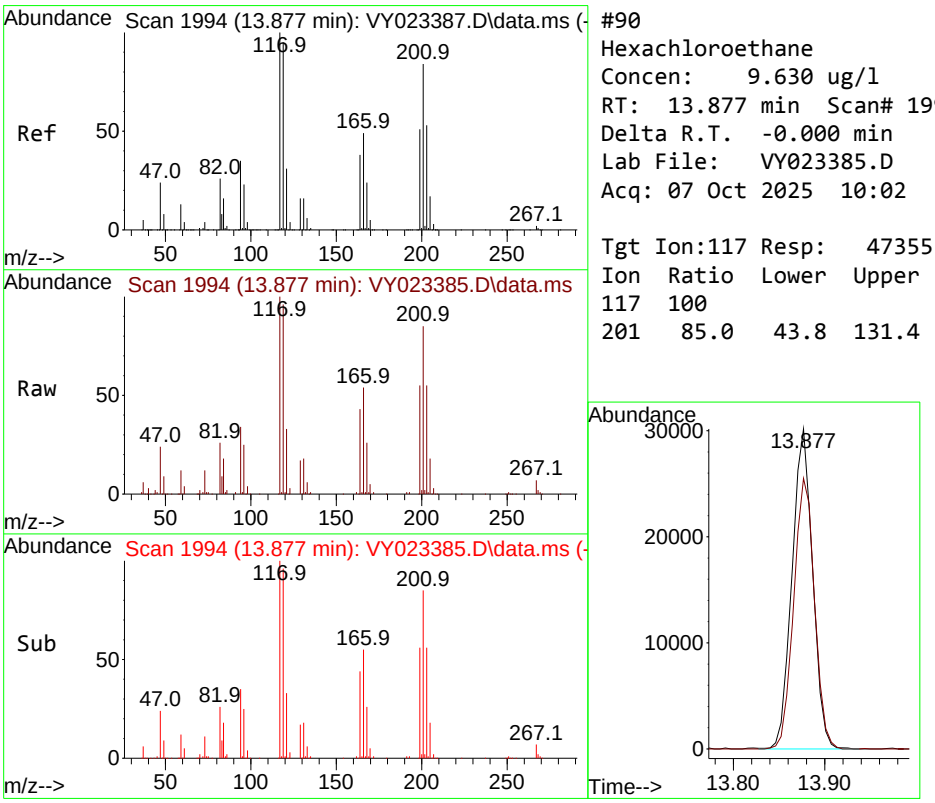
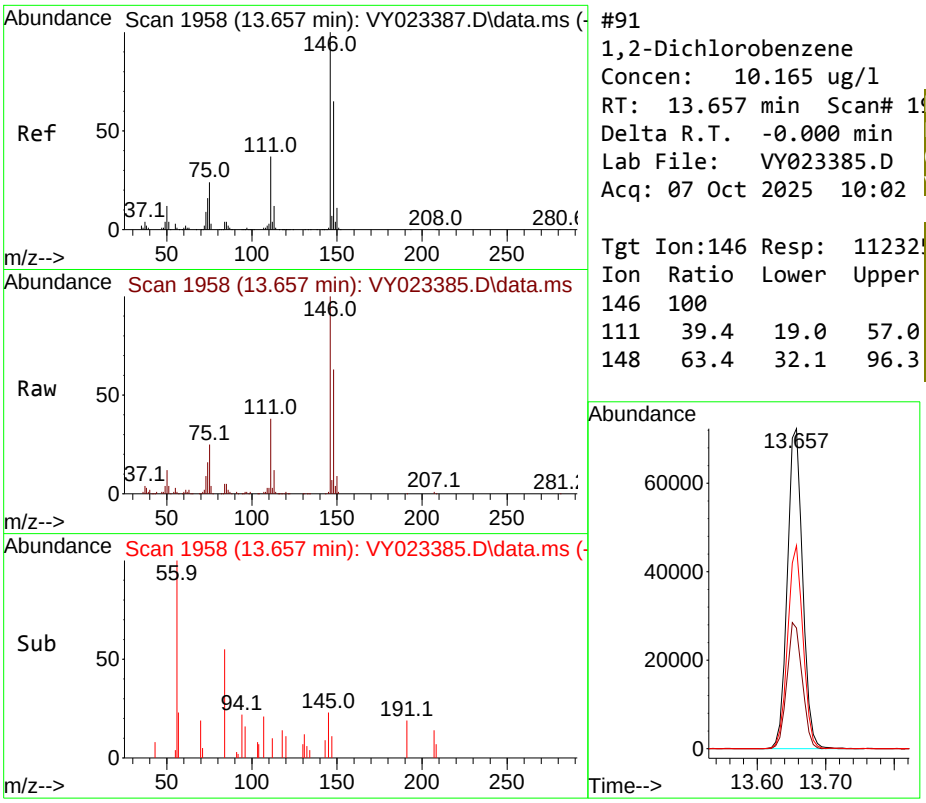


#90
Hexachloroethane
Concen: 9.630 ug/l
RT: 13.877 min Scan# 1994
Delta R.T. -0.000 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion:117 Resp: 47355

Ion	Ratio	Lower	Upper
117	100		
201	85.0	43.8	131.4



#91
1,2-Dichlorobenzene
Concen: 10.165 ug/l
RT: 13.657 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion:146 Resp: 11232

Ion	Ratio	Lower	Upper
146	100		
111	39.4	19.0	57.0
148	63.4	32.1	96.3

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC010

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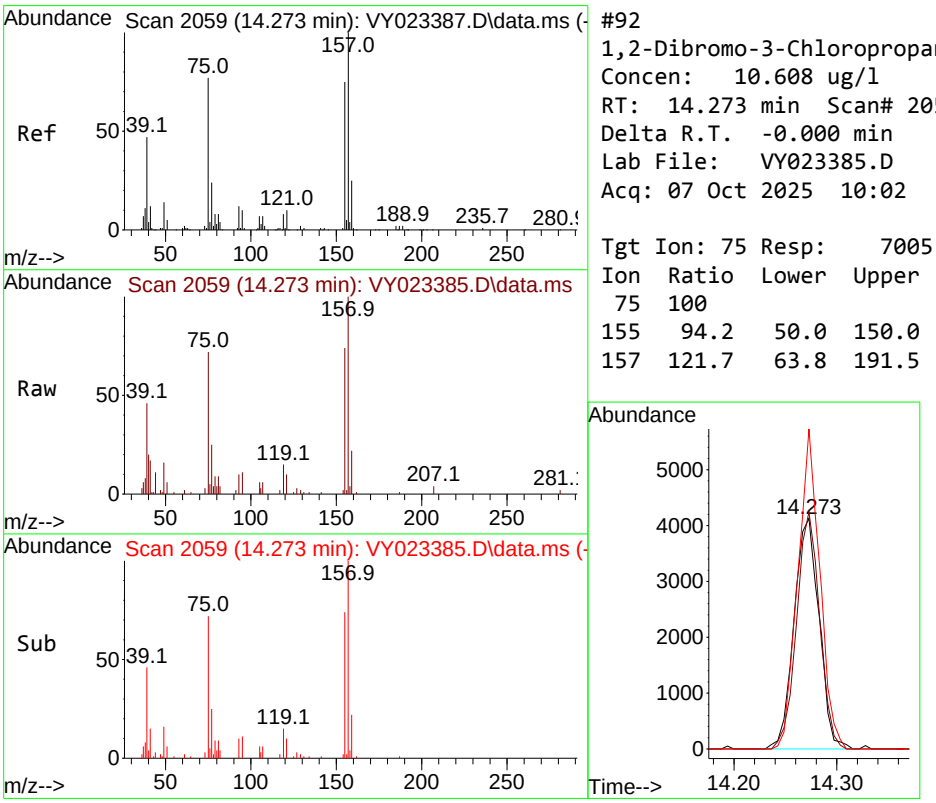
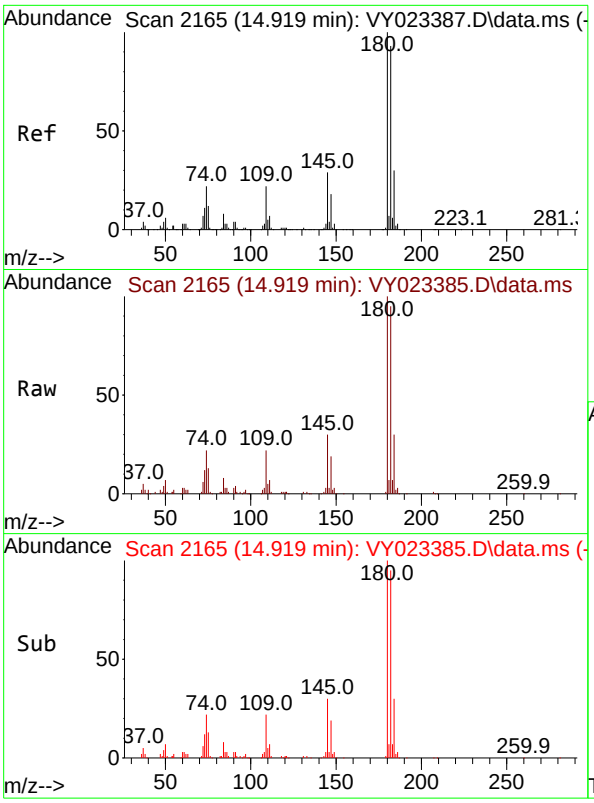


#92
1,2-Dibromo-3-Chloropropane
Concen: 10.608 ug/l
RT: 14.273 min Scan# 2059
Delta R.T. -0.000 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion: 75 Resp: 7005

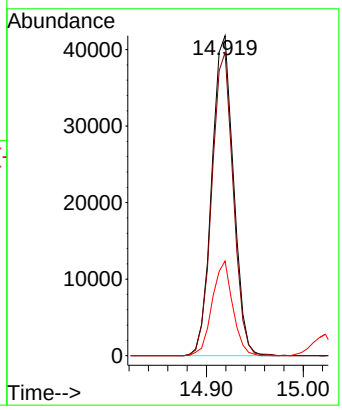
Ion	Ratio	Lower	Upper
75	100		
155	94.2	50.0	150.0
157	121.7	63.8	191.5



#93
1,2,4-Trichlorobenzene
Concen: 9.992 ug/l
RT: 14.919 min Scan# 2
Delta R.T. -0.000 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion:180 Resp: 6505

Ion	Ratio	Lower	Upper
180	100		
182	93.5	47.9	143.6
145	27.9	14.7	44.1



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC010

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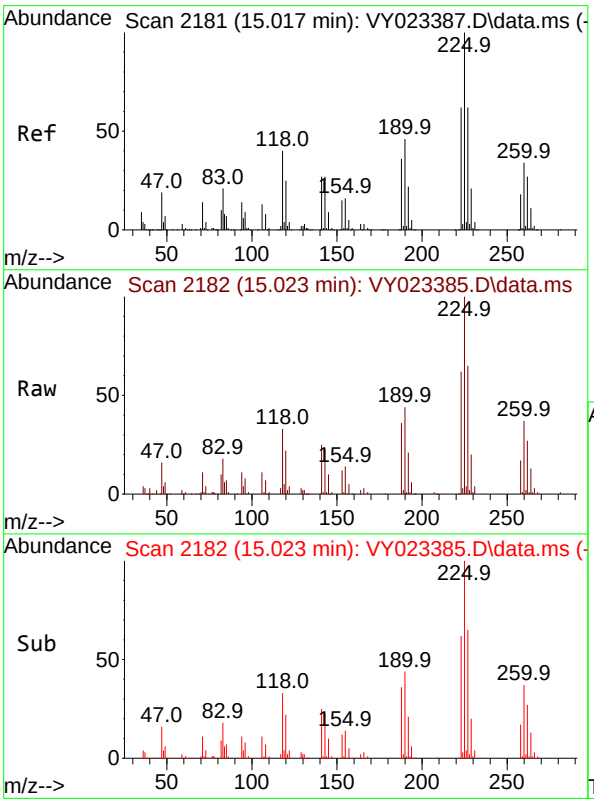
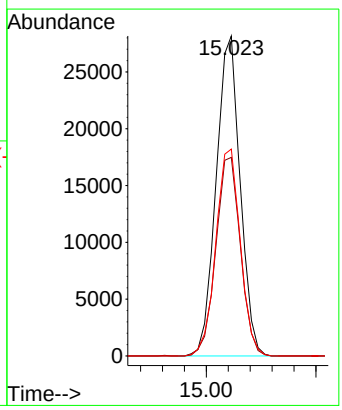
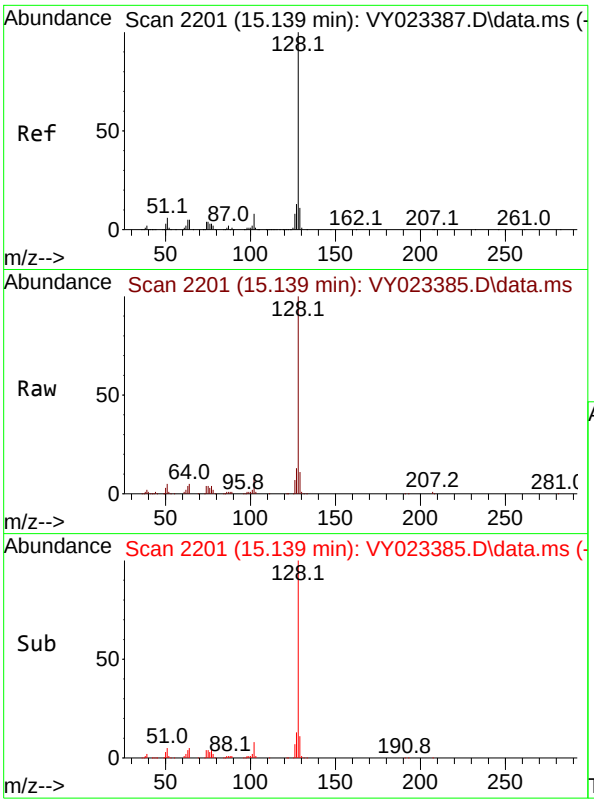


#94
Hexachlorobutadiene
Concen: 10.554 ug/l
RT: 15.023 min Scan# 2182
Delta R.T. 0.006 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion:225 Resp: 42813

Ion	Ratio	Lower	Upper
225	100		
223	63.4	30.8	92.3
227	66.0	31.9	95.7

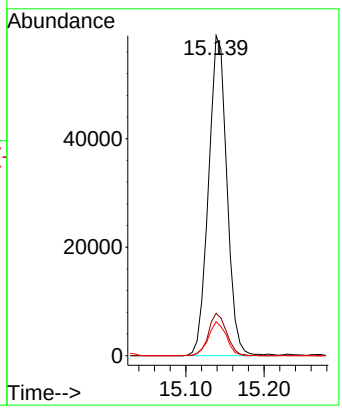




#95
Naphthalene
Concen: 9.264 ug/l
RT: 15.139 min Scan# 2
Delta R.T. -0.000 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion:128 Resp: 9609

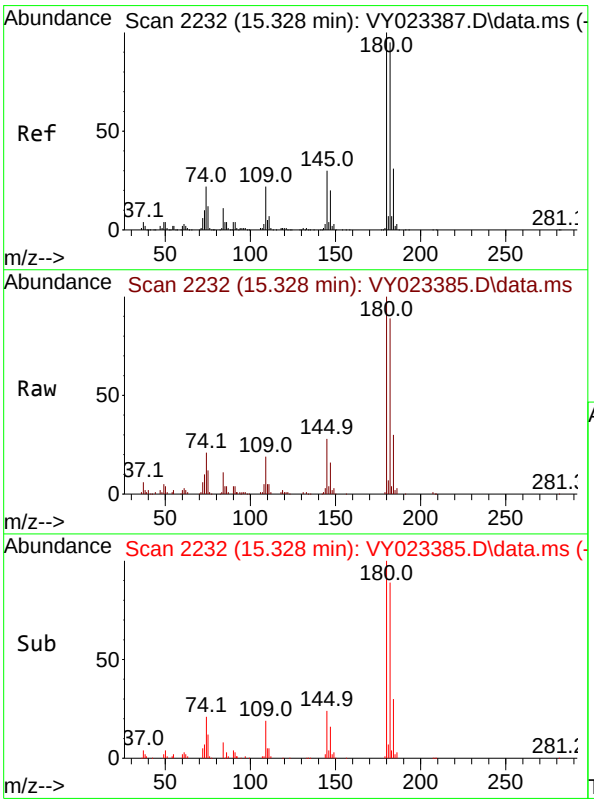
Ion	Ratio	Lower	Upper
128	100		
127	13.0	10.4	15.6
129	10.4	8.9	13.3



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC010

Manual Integrations
APPROVED

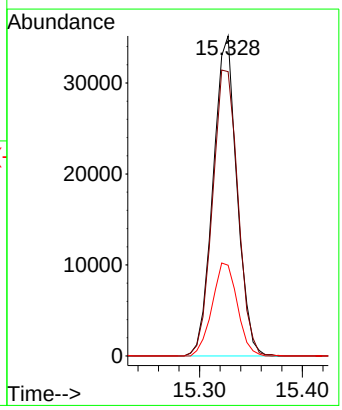
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025



#96
1,2,3-Trichlorobenzene
Concen: 10.004 ug/l
RT: 15.328 min Scan# 2232
Delta R.T. -0.000 min
Lab File: VY023385.D
Acq: 07 Oct 2025 10:02

Tgt Ion:180 Resp: 56499

Ion	Ratio	Lower	Upper
180	100		
182	95.1	47.9	143.8
145	30.8	15.3	45.9



Quantitation Report (QT Reviewed)

Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY100725\
Data File : VY023386.D
Acq On : 07 Oct 2025 11:24
Operator : SY/MD
Sample : VSTDICC020
Misc : 5.00g/5.0mL/MSVOA_Y/SOIL
ALS Vial : 5 Sample Multiplier: 1

Quant Time: Oct 08 04:41:57 2025
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260
QLast Update : Wed Oct 08 04:39:16 2025
Response via : Initial Calibration

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC020

Manual Integrations APPROVED

Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Pentafluorobenzene	7.707	168	574363	50.000	ug/l	0.00
34) 1,4-Difluorobenzene	8.615	114	851961	50.000	ug/l	0.00
63) Chlorobenzene-d5	11.414	117	746872	50.000	ug/l	0.00
72) 1,4-Dichlorobenzene-d4	13.346	152	382604	50.000	ug/l	0.00
System Monitoring Compounds						
33) 1,2-Dichloroethane-d4	8.061	65	98481	19.798	ug/l	0.00
Spiked Amount 50.000	Range 50 - 163		Recovery = 39.600%#			
35) Dibromofluoromethane	7.634	113	108034	20.895	ug/l	0.00
Spiked Amount 50.000	Range 54 - 147		Recovery = 41.800%#			
50) Toluene-d8	10.103	98	401067	20.568	ug/l	0.00
Spiked Amount 50.000	Range 58 - 134		Recovery = 41.140%#			
62) 4-Bromofluorobenzene	12.401	95	127216	20.680	ug/l	0.00
Spiked Amount 50.000	Range 30 - 143		Recovery = 41.360%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.867	85	91924	20.318	ug/l	98
3) Chloromethane	2.074	50	117585	18.284	ug/l	100
4) Vinyl Chloride	2.202	62	151460	18.652	ug/l	99
5) Bromomethane	2.586	94	125948	18.907	ug/l	97
6) Chloroethane	2.732	64	103973	18.859	ug/l	94
7) Trichlorofluoromethane	3.049	101	217452	20.846	ug/l	99
8) Diethyl Ether	3.452	74	54124	19.837	ug/l	99
9) 1,1,2-Trichlorotrifluo...	3.811	101	109936	19.718	ug/l	99
10) Methyl Iodide	4.007	142	119083	18.482	ug/l	99
11) Tert butyl alcohol	4.854	59	34346	117.345	ug/l	98
12) 1,1-Dichloroethene	3.787	96	104778	19.531	ug/l	98
13) Acrolein	3.653	56	48115	97.023	ug/l	98
14) Allyl chloride	4.384	41	125424	18.674	ug/l	98
15) Acrylonitrile	5.055	53	99018	92.641	ug/l	100
16) Acetone	3.866	43	108209	96.742	ug/l	96
17) Carbon Disulfide	4.104	76	303284	18.121	ug/l	99
18) Methyl Acetate	4.384	43	59704	21.002	ug/l	97
19) Methyl tert-butyl Ether	5.116	73	247030	19.667	ug/l	97
20) Methylene Chloride	4.616	84	132229	21.801	ug/l	98
21) trans-1,2-Dichloroethene	5.110	96	116410	19.512	ug/l	95
22) Diisopropyl ether	6.018	45	288429	19.366	ug/l	98
23) Vinyl Acetate	5.957	43	748048	91.373	ug/l	99
24) 1,1-Dichloroethane	5.915	63	190012	19.354	ug/l	99
25) 2-Butanone	6.896	43	132159	95.593	ug/l	93
26) 2,2-Dichloropropane	6.884	77	167903	19.247	ug/l	99
27) cis-1,2-Dichloroethene	6.890	96	133634	19.747	ug/l	99
28) Bromochloromethane	7.244	49	73407	19.273	ug/l	98
29) Tetrahydrofuran	7.262	42	76502	93.229	ug/l	99
30) Chloroform	7.421	83	207096	19.562	ug/l	100
31) Cyclohexane	7.701	56	160159	18.472	ug/l	97
32) 1,1,1-Trichloroethane	7.616	97	188861	19.873	ug/l	100
36) 1,1-Dichloropropene	7.835	75	140912	19.317	ug/l	100
37) Ethyl Acetate	6.982	43	55705	19.315	ug/l	98
38) Carbon Tetrachloride	7.817	117	171925	20.289	ug/l	99
39) Methylcyclohexane	9.109	83	182831	19.576	ug/l	99
40) Benzene	8.079	78	450471	19.809	ug/l	99

Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY100725\
Data File : VY023386.D
Acq On : 07 Oct 2025 11:24
Operator : SY/MD
Sample : VSTDICC020
Misc : 5.00g/5.0mL/MSVOA_Y/SOIL
ALS Vial : 5 Sample Multiplier: 1

Quant Time: Oct 08 04:41:57 2025
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260
QLast Update : Wed Oct 08 04:39:16 2025
Response via : Initial Calibration

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC020

Manual Integrations APPROVED

Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

Compound	R.T.	QIon	Response	Conc	Units		Dev(Min)
41) Methacrylonitrile	7.225	41	31129m	20.783	ug/l		
42) 1,2-Dichloroethane	8.158	62	116941	20.206	ug/l		99
43) Isopropyl Acetate	8.195	43	106595	19.002	ug/l	#	87
44) Trichloroethene	8.865	130	131459	20.598	ug/l		98
45) 1,2-Dichloropropane	9.140	63	99363	19.417	ug/l		98
46) Dibromomethane	9.231	93	62277	19.896	ug/l		98
47) Bromodichloromethane	9.420	83	156426	19.854	ug/l		98
48) Methyl methacrylate	9.219	41	50661	19.352	ug/l		99
49) 1,4-Dioxane	9.225	88	13636	420.712	ug/l		99
51) 4-Methyl-2-Pentanone	9.999	43	274059	95.378	ug/l		100
52) Toluene	10.170	92	291453	20.191	ug/l		100
53) t-1,3-Dichloropropene	10.390	75	132848	19.632	ug/l		99
54) cis-1,3-Dichloropropene	9.853	75	158580	19.606	ug/l		95
55) 1,1,2-Trichloroethane	10.572	97	82183	19.740	ug/l		96
56) Ethyl methacrylate	10.438	69	89244	18.613	ug/l		99
57) 1,3-Dichloropropane	10.719	76	130650	19.389	ug/l		98
58) 2-Chloroethyl Vinyl ether	9.713	63	190850m	90.982	ug/l		
59) 2-Hexanone	10.761	43	187387	94.190	ug/l		99
60) Dibromochloromethane	10.908	129	115907	20.412	ug/l		100
61) 1,2-Dibromoethane	11.011	107	78579	20.062	ug/l		100
64) Tetrachloroethene	10.646	164	167648	22.438	ug/l		97
65) Chlorobenzene	11.438	112	326360	20.109	ug/l		99
66) 1,1,1,2-Tetrachloroethane	11.517	131	116412	20.396	ug/l		99
67) Ethyl Benzene	11.517	91	523606	19.768	ug/l		99
68) m/p-Xylenes	11.627	106	426913	40.211	ug/l		100
69) o-Xylene	11.956	106	195021	19.843	ug/l		96
70) Styrene	11.968	104	327934	20.208	ug/l		99
71) Bromoform	12.133	173	71119	20.814	ug/l	#	99
73) Isopropylbenzene	12.255	105	513183	20.136	ug/l		99
74) N-amyl acetate	12.072	43	85063	17.860	ug/l		98
75) 1,1,2,2-Tetrachloroethane	12.505	83	76821	18.069	ug/l		99
76) 1,2,3-Trichloropropane	12.554	75	74100m	19.634	ug/l		
77) Bromobenzene	12.529	156	135402	20.700	ug/l		98
78) n-propylbenzene	12.596	91	597829	19.945	ug/l		100
79) 2-Chlorotoluene	12.676	91	349203	20.179	ug/l		100
80) 1,3,5-Trimethylbenzene	12.737	105	418684	20.208	ug/l		100
81) trans-1,4-Dichloro-2-b...	12.304	75	26922	19.234	ug/l		98
82) 4-Chlorotoluene	12.773	91	361458	20.000	ug/l		99
83) tert-Butylbenzene	12.993	119	377277	19.983	ug/l		99
84) 1,2,4-Trimethylbenzene	13.041	105	413292	20.162	ug/l		100
85) sec-Butylbenzene	13.176	105	546582	19.990	ug/l		100
86) p-Isopropyltoluene	13.291	119	464005	20.081	ug/l		100
87) 1,3-Dichlorobenzene	13.285	146	262901	20.347	ug/l		99
88) 1,4-Dichlorobenzene	13.365	146	259217	20.230	ug/l		99
89) n-Butylbenzene	13.615	91	401893	19.697	ug/l		98
90) Hexachloroethane	13.877	117	98983	19.730	ug/l		97
91) 1,2-Dichlorobenzene	13.657	146	231199	20.507	ug/l		100
92) 1,2-Dibromo-3-Chloropr...	14.273	75	12668	18.802	ug/l		99
93) 1,2,4-Trichlorobenzene	14.919	180	137963	20.770	ug/l		99
94) Hexachlorobutadiene	15.023	225	87575	21.159	ug/l		99
95) Naphthalene	15.145	128	206017	19.467	ug/l		100
96) 1,2,3-Trichlorobenzene	15.328	180	121656	21.113	ug/l		98

Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY100725\
Data File : VY023386.D
Acq On : 07 Oct 2025 11:24
Operator : SY/MD
Sample : VSTDICC020
Misc : 5.00g/5.0mL/MSVOA_Y/SOIL
ALS Vial : 5 Sample Multiplier: 1

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC020

Manual Integrations APPROVED

Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

Quant Time: Oct 08 04:41:57 2025
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260
QLast Update : Wed Oct 08 04:39:16 2025
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY100725\
Data File : VY023386.D
Acq On : 07 Oct 2025 11:24
Operator : SY/MD
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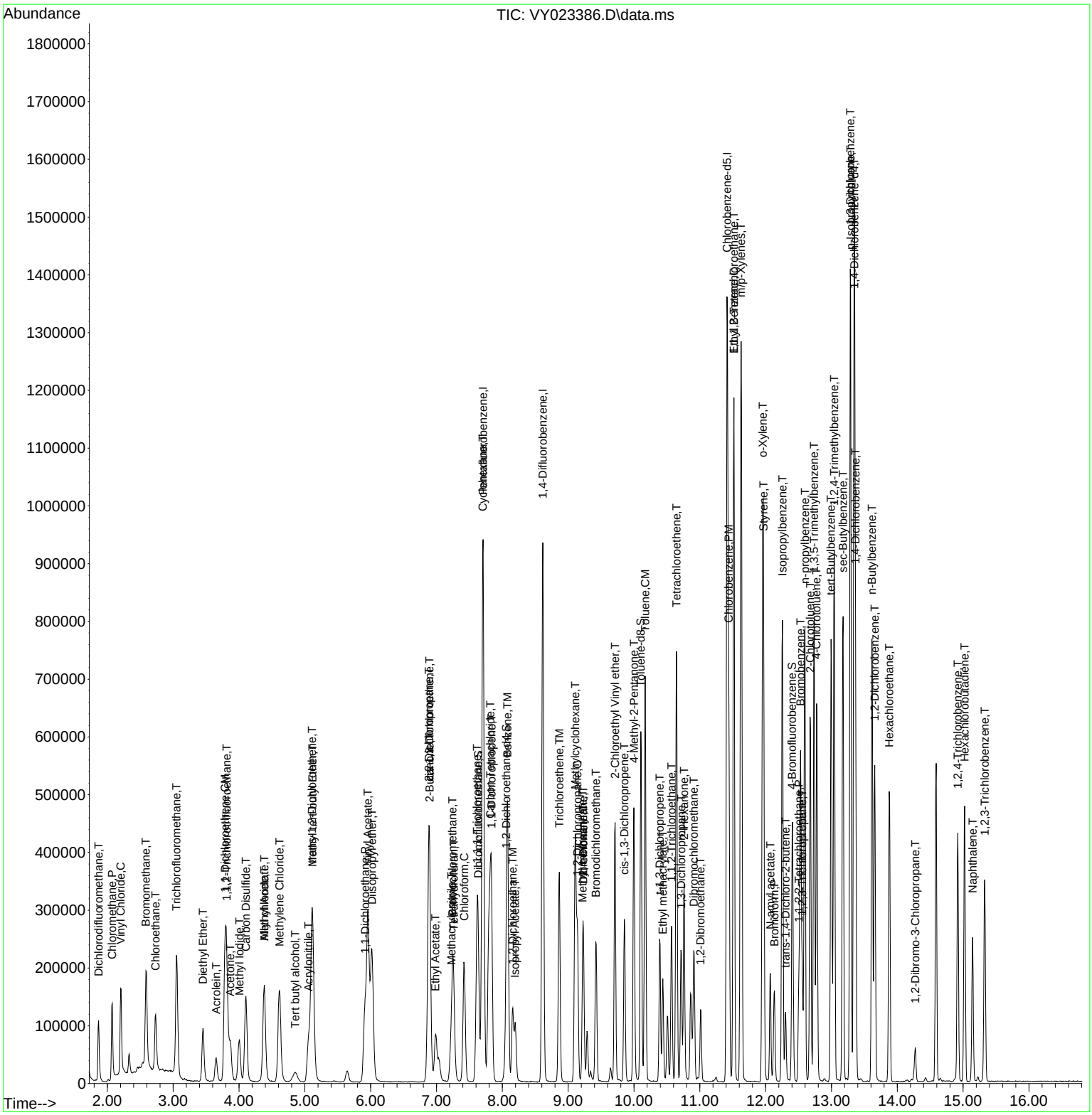
Misc : 5.00g/5.0mL/MSVOA_Y/SOIL
ALS Vial : 5 Sample Multiplier: 1

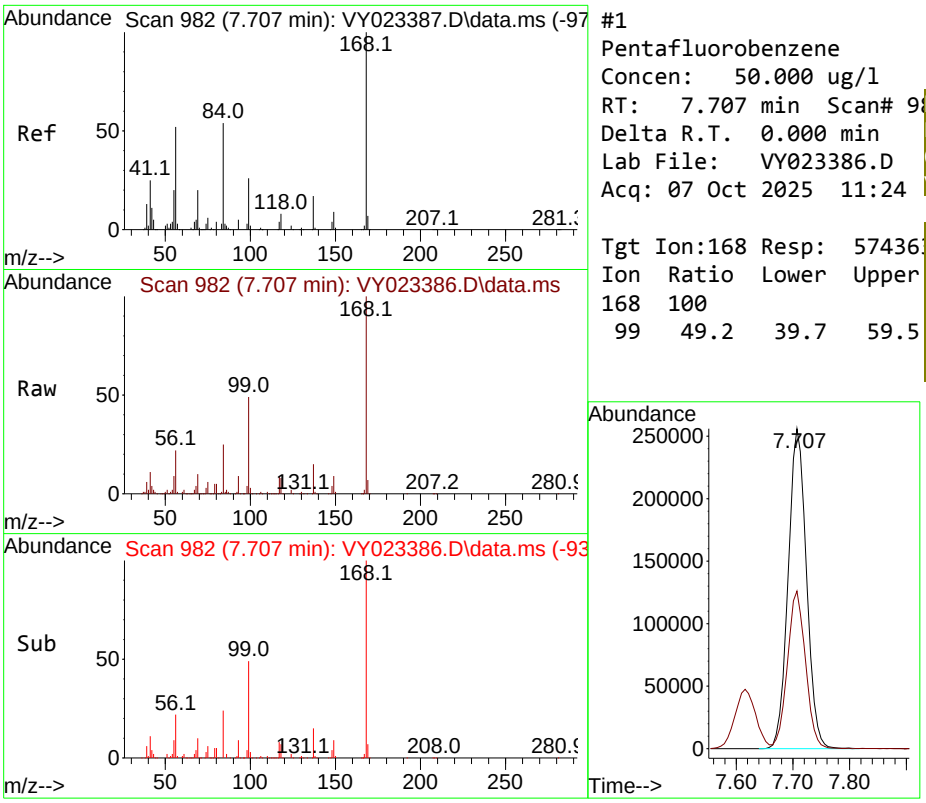
Quant Time: Oct 08 04:41:57 2025
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260
QLast Update : Wed Oct 08 04:39:16 2025
Response via : Initial Calibration

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC020

Manual Integrations APPROVED

Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025





#1
Pentafluorobenzene
Concen: 50.000 ug/l
RT: 7.707 min Scan# 9
Delta R.T. 0.000 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion:168 Resp: 57436

Ion	Ratio	Lower	Upper
168	100		
99	49.2	39.7	59.5

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC020

Manual Integrations APPROVED

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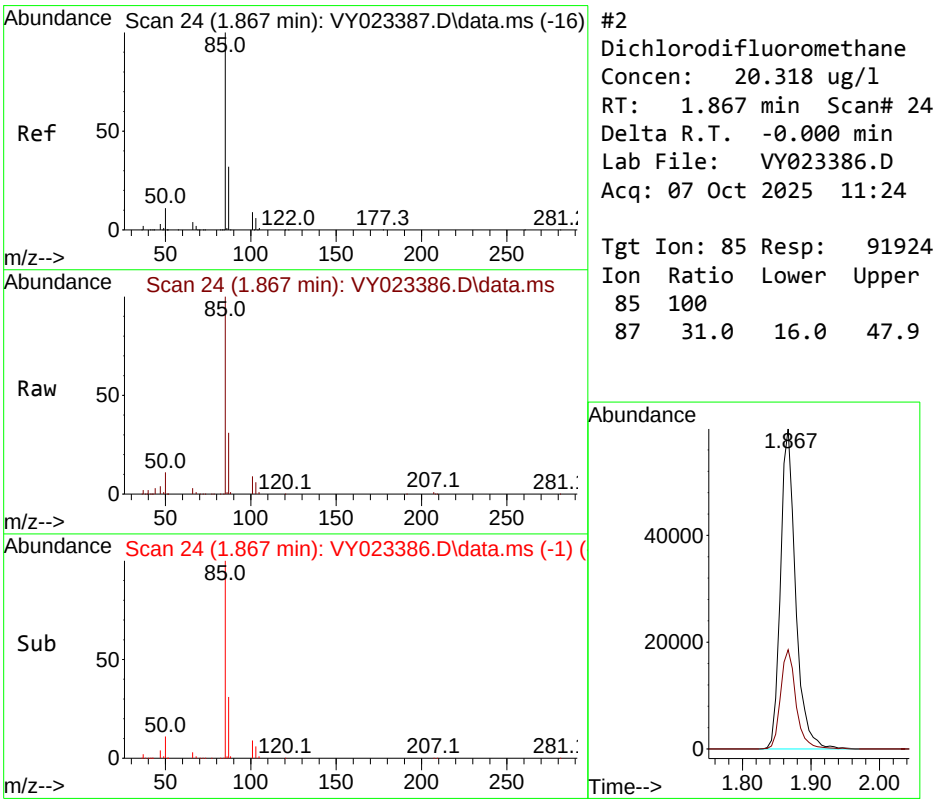
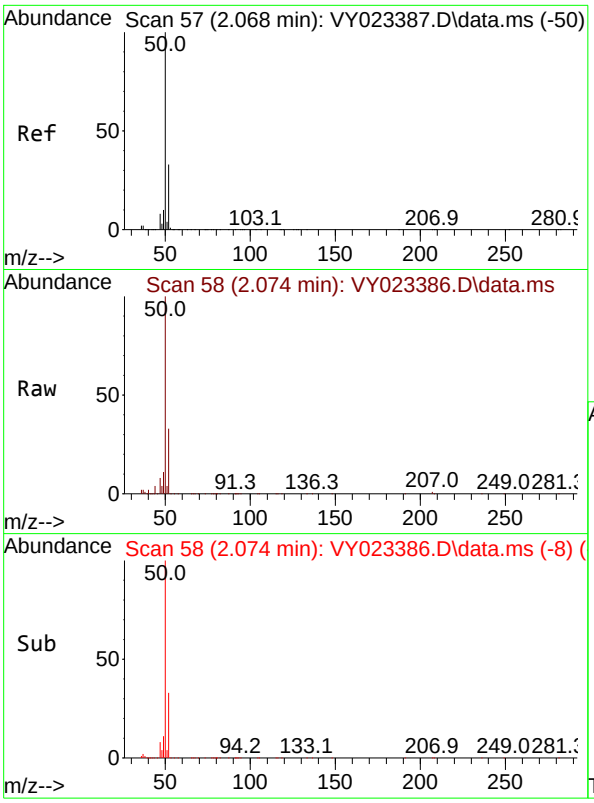


#2
Dichlorodifluoromethane
Concen: 20.318 ug/l
RT: 1.867 min Scan# 24
Delta R.T. -0.000 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion: 85 Resp: 91924

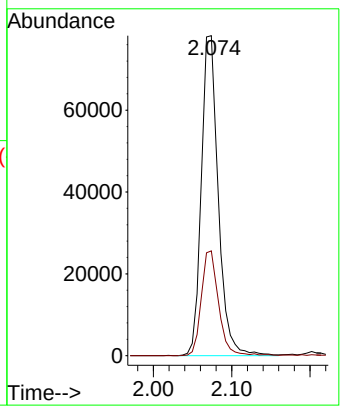
Ion	Ratio	Lower	Upper
85	100		
87	31.0	16.0	47.9



#3
Chloromethane
Concen: 18.284 ug/l
RT: 2.074 min Scan# 5
Delta R.T. 0.006 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion: 50 Resp: 11758

Ion	Ratio	Lower	Upper
50	100		
52	32.7	26.2	39.2



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC020

Manual Integrations
APPROVED

Reviewed By :Semsettin Yesilyurt 10/10/2025
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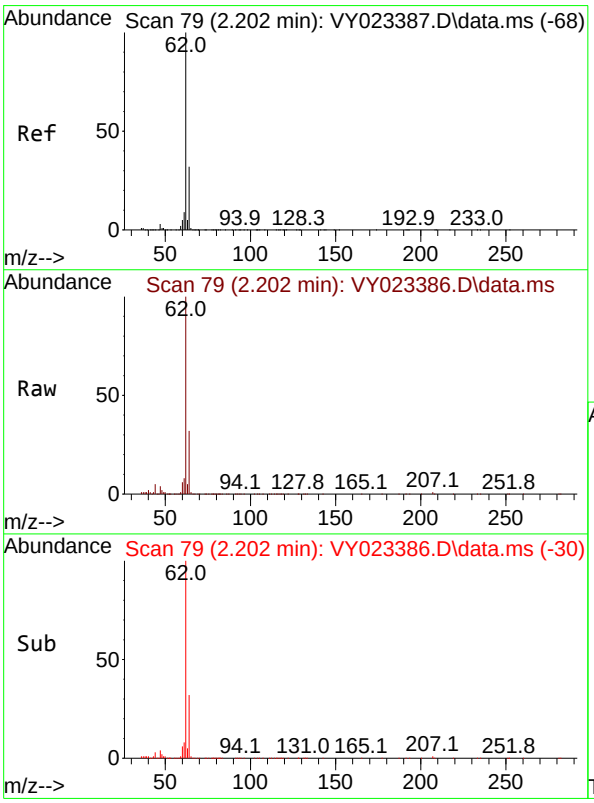
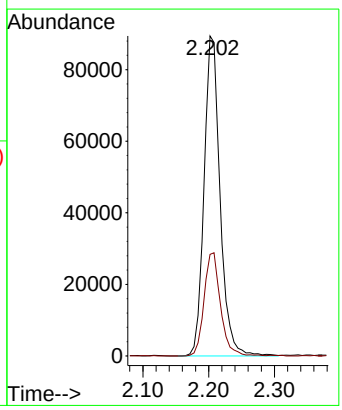
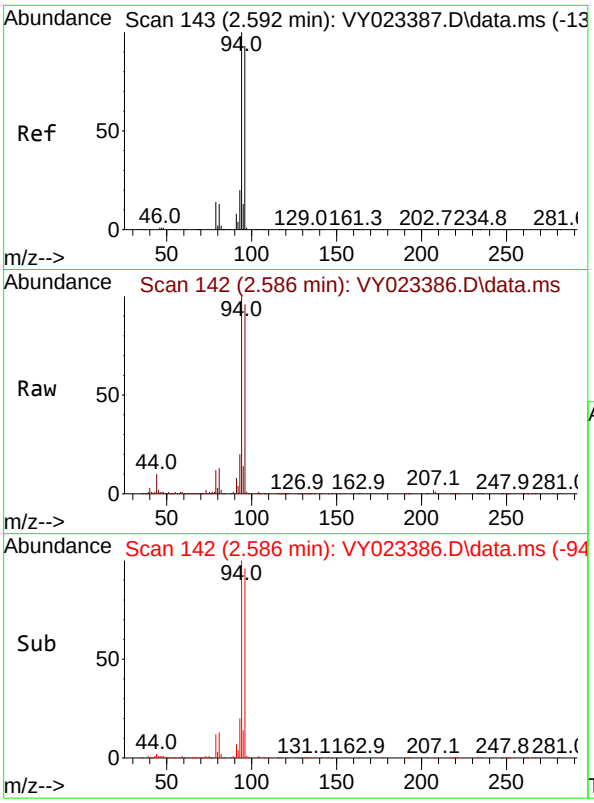


#4
Vinyl Chloride
Concen: 18.652 ug/l
RT: 2.202 min Scan# 79
Delta R.T. -0.000 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion: 62 Resp: 151460

Ion	Ratio	Lower	Upper
62	100		
64	31.7	25.8	38.8

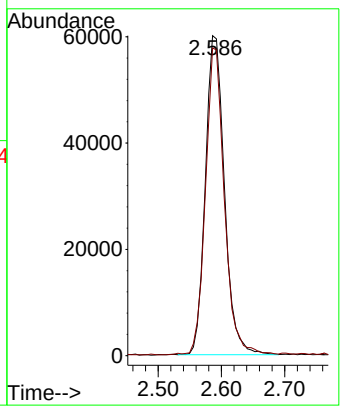




#5
Bromomethane
Concen: 18.907 ug/l
RT: 2.586 min Scan# 14
Delta R.T. -0.006 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion: 94 Resp: 12594

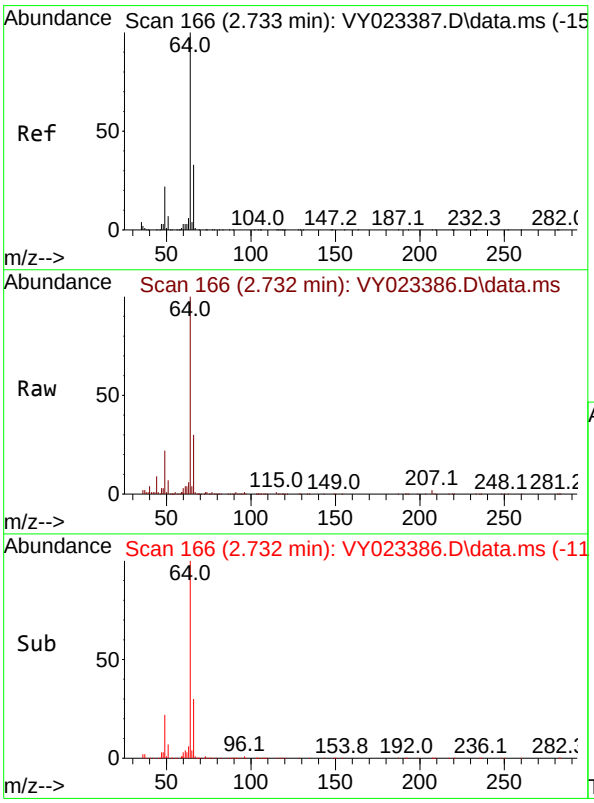
Ion	Ratio	Lower	Upper
94	100		
96	95.9	74.5	111.7



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC020

Manual Integrations
APPROVED

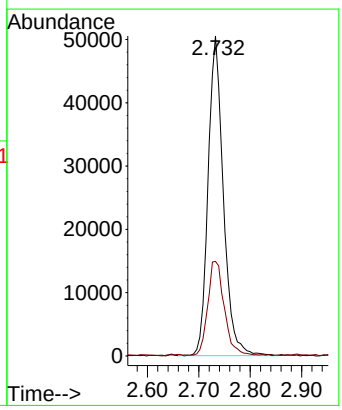
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

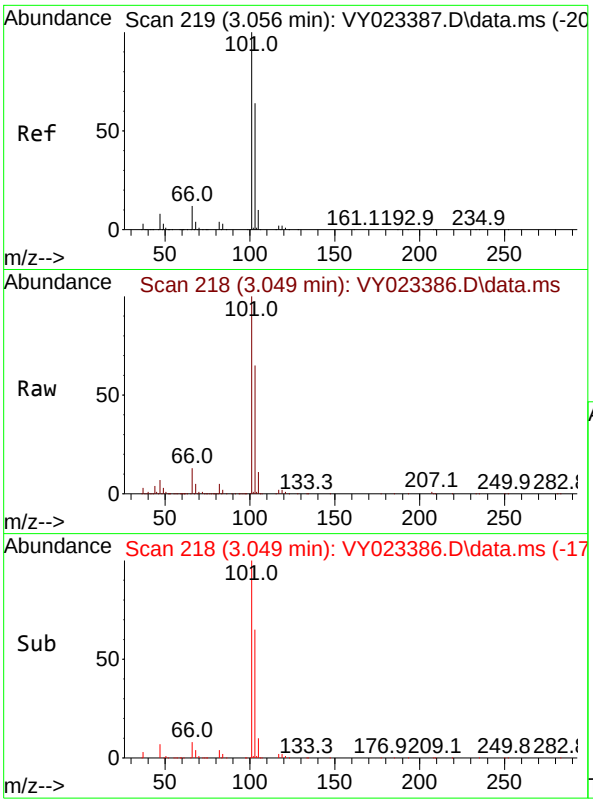


#6
Chloroethane
Concen: 18.859 ug/l
RT: 2.732 min Scan# 166
Delta R.T. -0.000 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion: 64 Resp: 103973

Ion	Ratio	Lower	Upper
64	100		
66	29.3	26.2	39.4

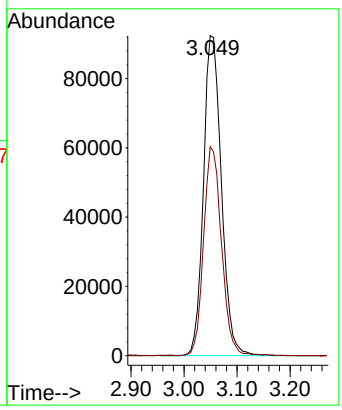




#7
Trichlorofluoromethane
Concen: 20.846 ug/l
RT: 3.049 min Scan# 21
Delta R.T. -0.006 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion:101 Resp: 21745

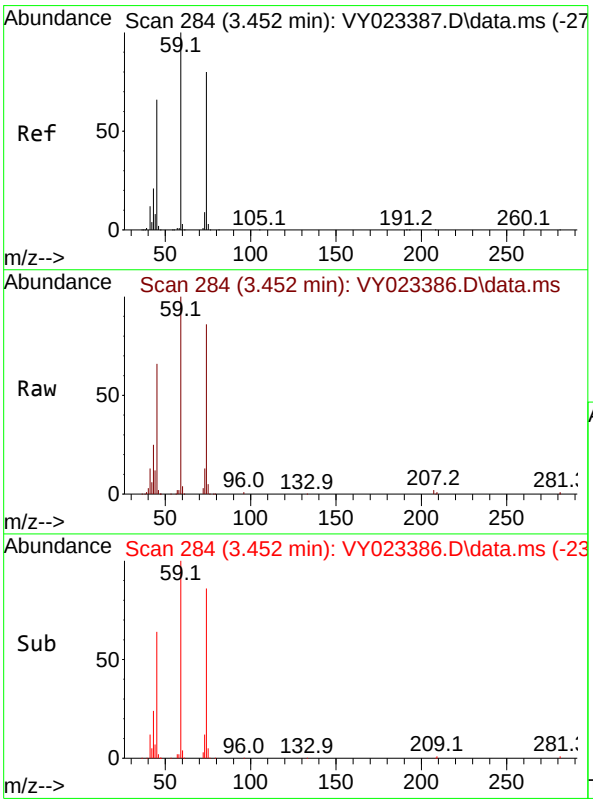
Ion	Ratio	Lower	Upper
101	100		
103	65.2	51.3	76.9



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC020

Manual Integrations
APPROVED

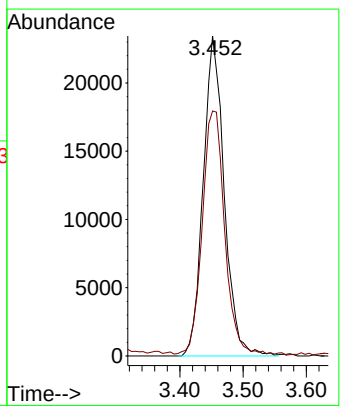
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

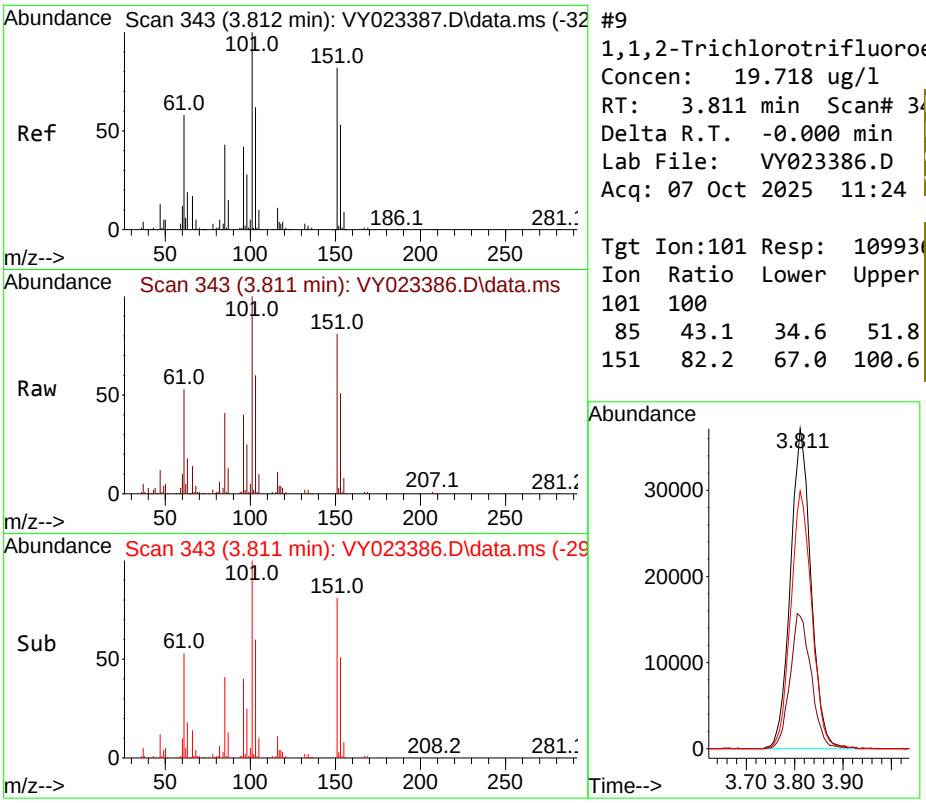


#8
Diethyl Ether
Concen: 19.837 ug/l
RT: 3.452 min Scan# 284
Delta R.T. -0.000 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion: 74 Resp: 54124

Ion	Ratio	Lower	Upper
74	100		
45	80.6	39.9	119.7





#9
1,1,2-Trichlorotrifluoroethane
Concen: 19.718 ug/l
RT: 3.811 min Scan# 34
Delta R.T. -0.000 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion:101 Resp: 10993

Ion	Ratio	Lower	Upper
101	100		
85	43.1	34.6	51.8
151	82.2	67.0	100.6

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC020

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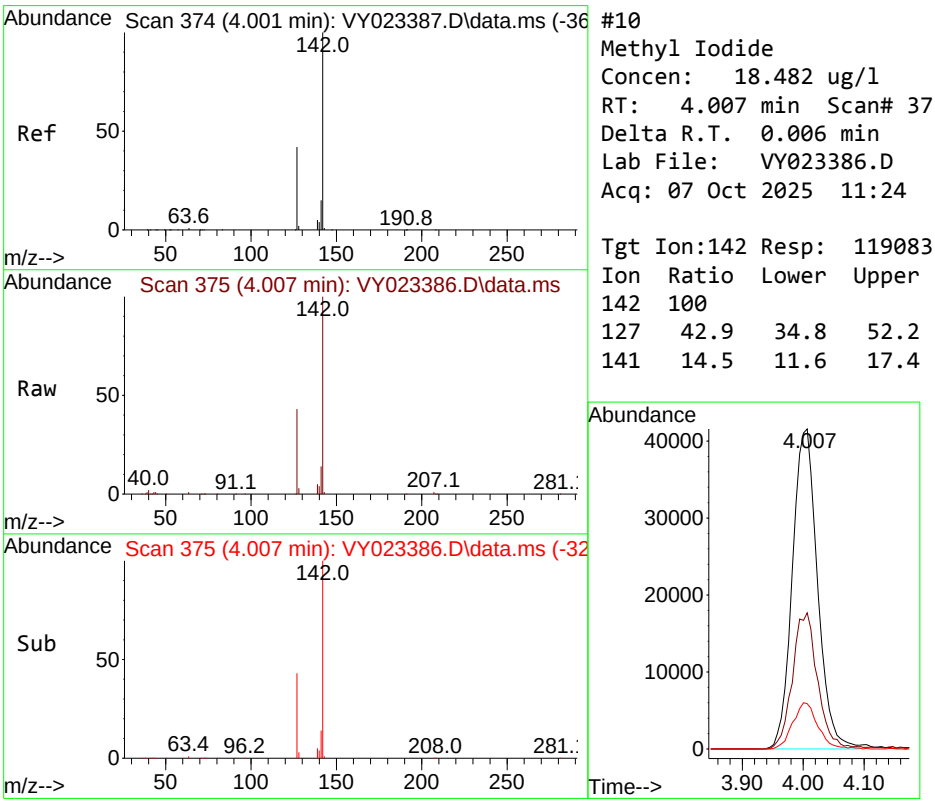
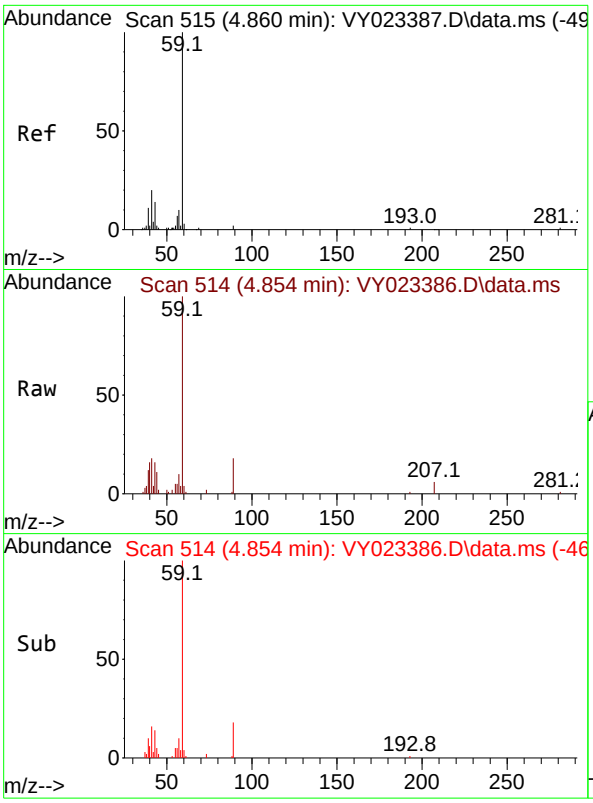
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025



#10
Methyl Iodide
Concen: 18.482 ug/l
RT: 4.007 min Scan# 375
Delta R.T. 0.006 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion:142 Resp: 119083

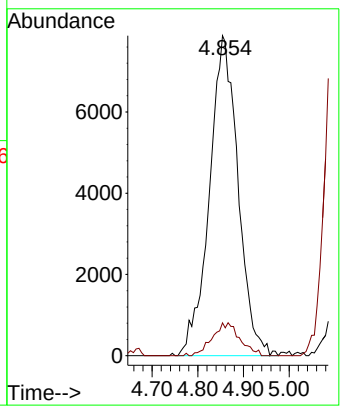
Ion	Ratio	Lower	Upper
142	100		
127	42.9	34.8	52.2
141	14.5	11.6	17.4



#11
Tert butyl alcohol
Concen: 117.345 ug/l
RT: 4.854 min Scan# 5
Delta R.T. -0.006 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion: 59 Resp: 3434

Ion	Ratio	Lower	Upper
59	100		
57	9.8	8.3	12.5



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC020

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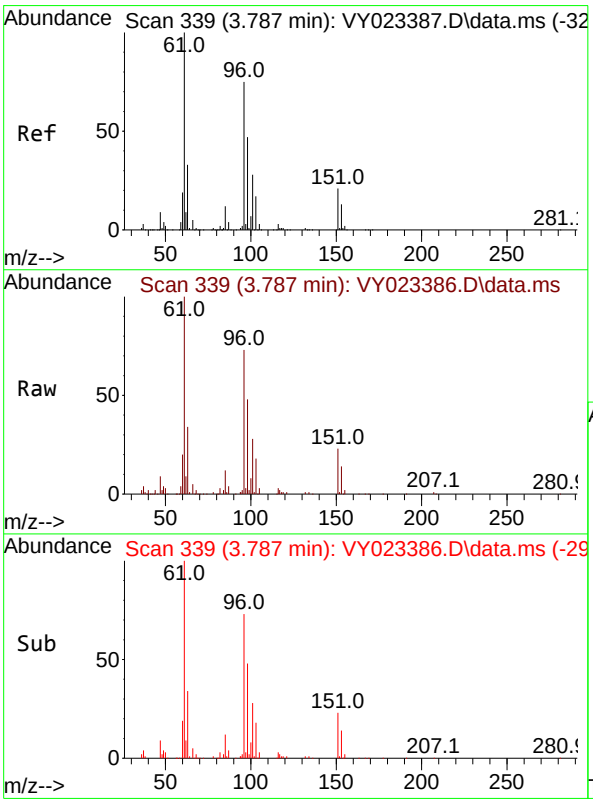
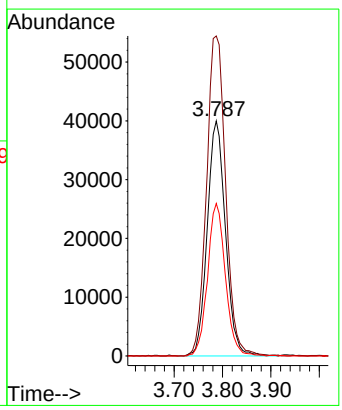
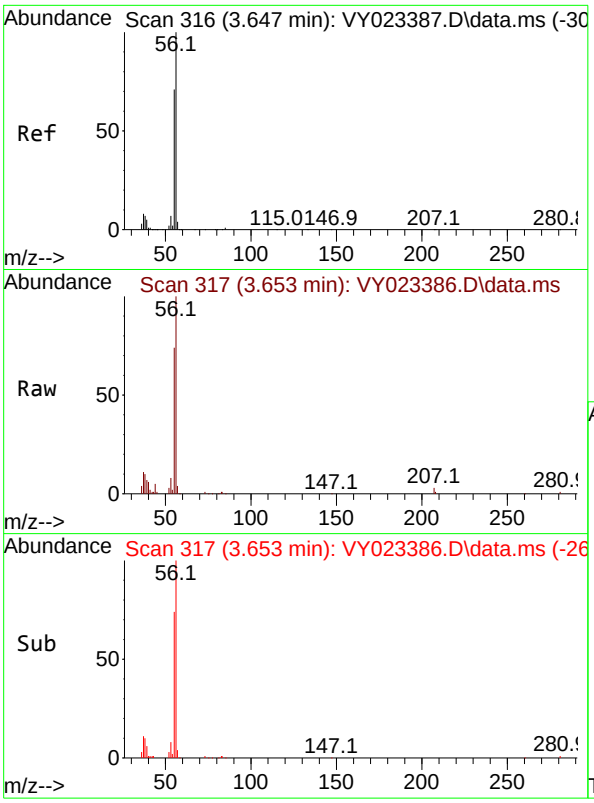


#12
1,1-Dichloroethene
Concen: 19.531 ug/l
RT: 3.787 min Scan# 339
Delta R.T. -0.000 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion: 96 Resp: 104778

Ion	Ratio	Lower	Upper
96	100		
61	136.2	106.7	160.1
98	64.9	50.2	75.4

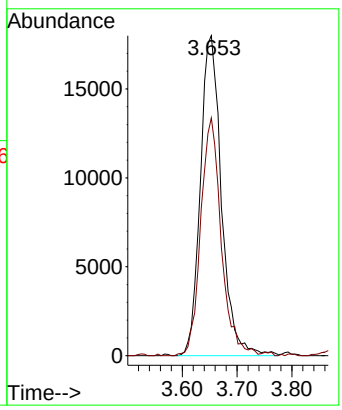




#13
Acrolein
Concen: 97.023 ug/l
RT: 3.653 min Scan# 3
Delta R.T. 0.006 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion: 56 Resp: 4811

Ion	Ratio	Lower	Upper
56	100		
55	72.0	56.1	84.1



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC020

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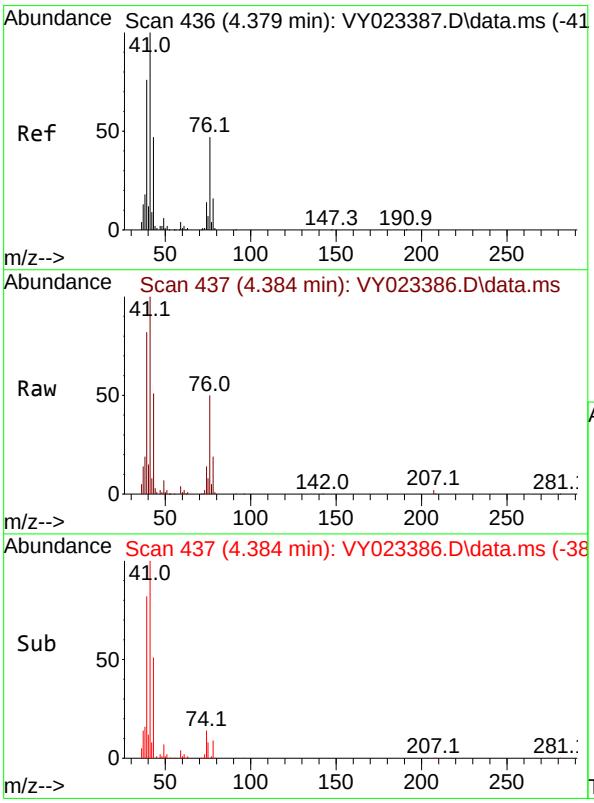
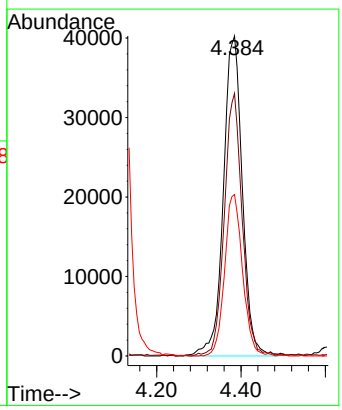
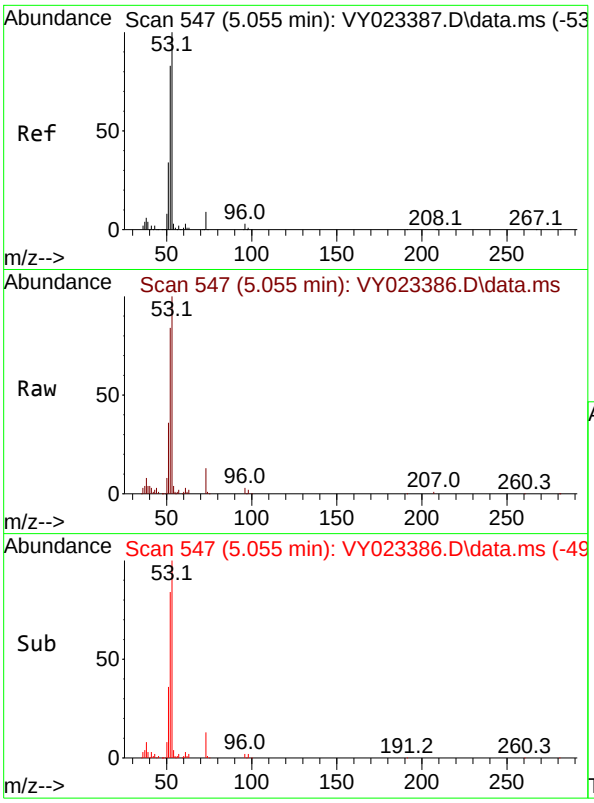


#14
Allyl chloride
Concen: 18.674 ug/l
RT: 4.384 min Scan# 437
Delta R.T. 0.006 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion: 41 Resp: 125424

Ion	Ratio	Lower	Upper
41	100		
39	77.6	59.9	89.9
76	47.9	38.0	57.0

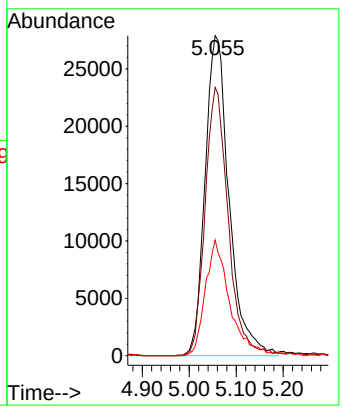




#15
Acrylonitrile
Concen: 92.641 ug/l
RT: 5.055 min Scan# 54
Delta R.T. -0.000 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion: 53 Resp: 9901

Ion	Ratio	Lower	Upper
53	100		
52	80.7	64.6	97.0
51	36.6	29.5	44.3



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC020

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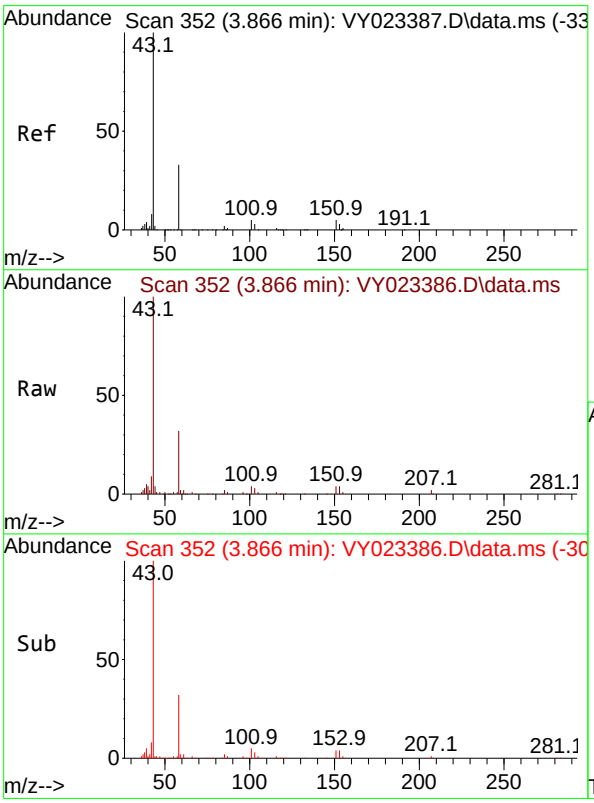
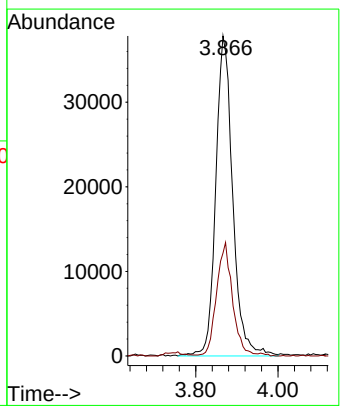
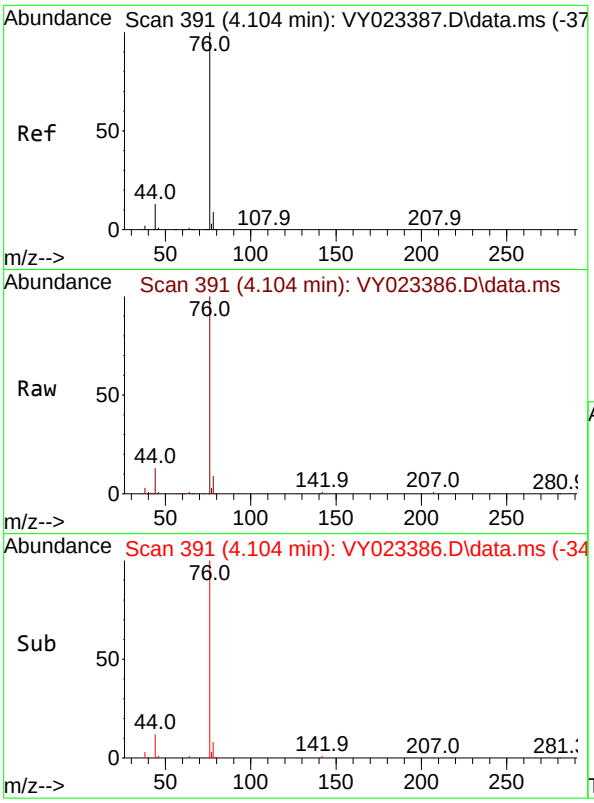


#16
Acetone
Concen: 96.742 ug/l
RT: 3.866 min Scan# 352
Delta R.T. -0.000 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion: 43 Resp: 108209

Ion	Ratio	Lower	Upper
43	100		
58	32.1	27.7	41.5

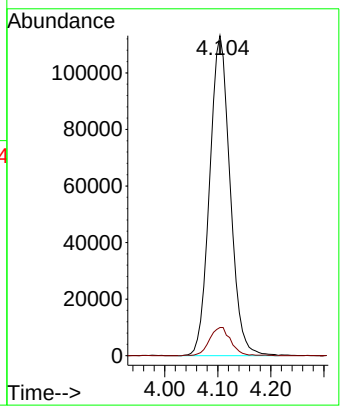




#17
Carbon Disulfide
Concen: 18.121 ug/l
RT: 4.104 min Scan# 3
Delta R.T. -0.000 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion: 76 Resp: 30328

Ion	Ratio	Lower	Upper
76	100		
78	8.8	7.3	10.9



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC020

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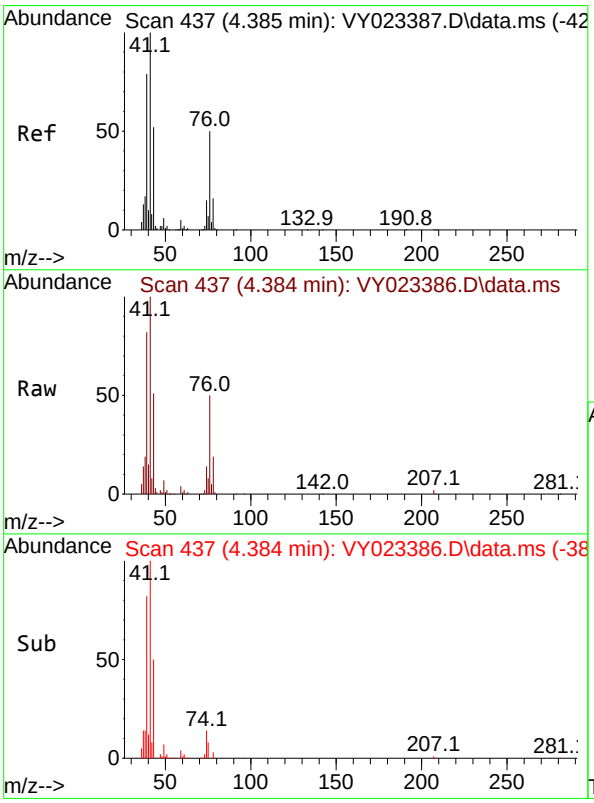
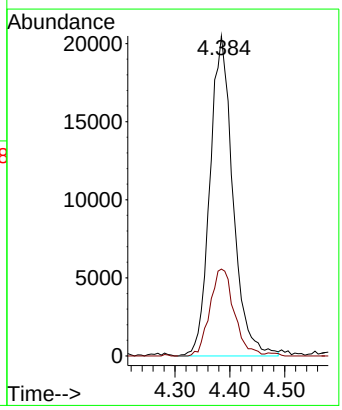
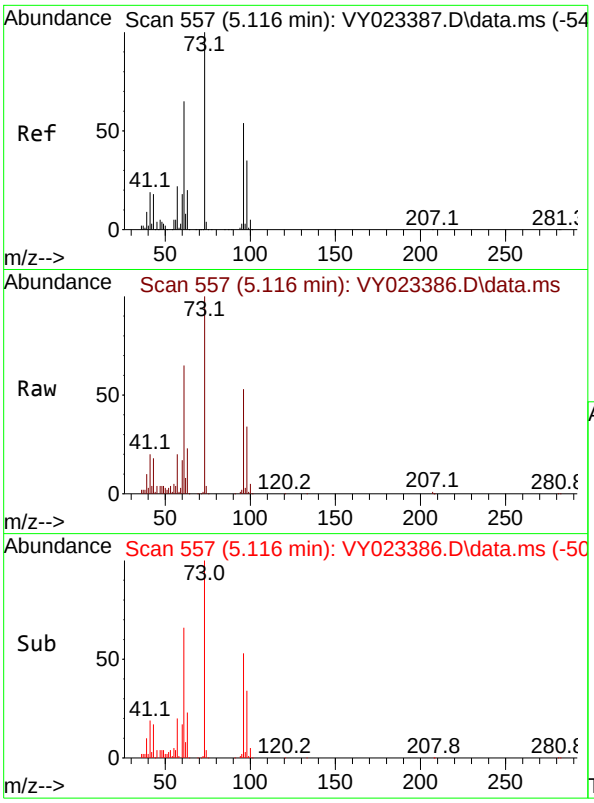


#18
Methyl Acetate
Concen: 21.002 ug/l
RT: 4.384 min Scan# 437
Delta R.T. -0.000 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion: 43 Resp: 59704

Ion	Ratio	Lower	Upper
43	100		
74	28.7	24.2	36.4

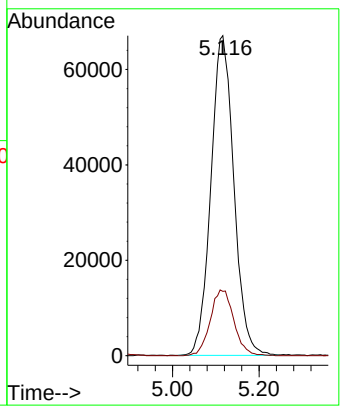




#19
Methyl tert-butyl Ether
Concen: 19.667 ug/l
RT: 5.116 min Scan# 5
Delta R.T. -0.000 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion: 73 Resp: 24703

Ion	Ratio	Lower	Upper
73	100		
57	20.1	17.4	26.0



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC020

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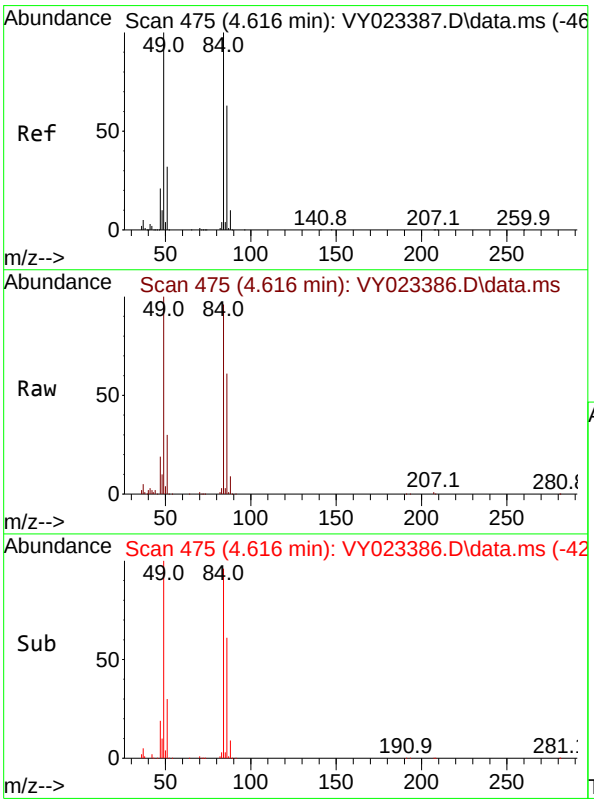
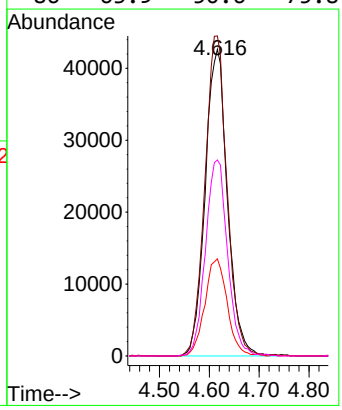
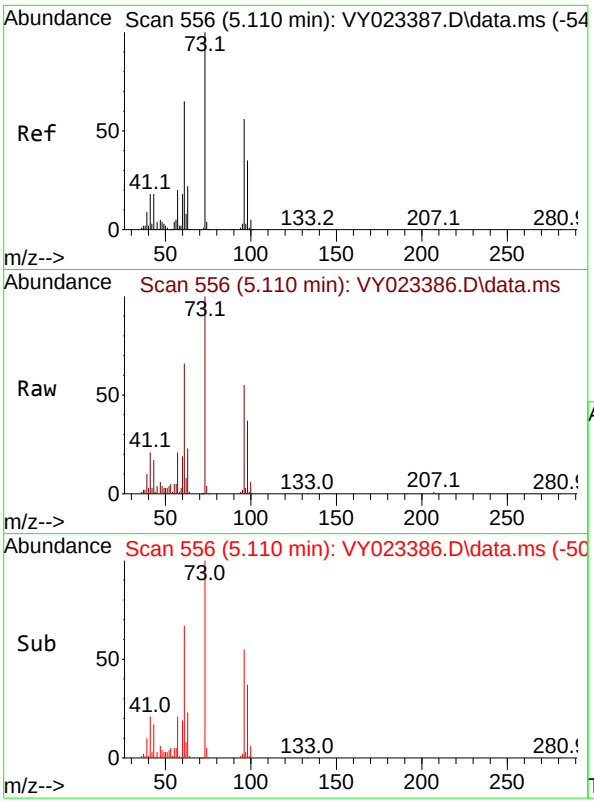


#20
Methylene Chloride
Concen: 21.801 ug/l
RT: 4.616 min Scan# 475
Delta R.T. -0.000 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion: 84 Resp: 132229

Ion	Ratio	Lower	Upper
84	100		
49	104.2	80.2	120.4
51	31.7	25.9	38.9
86	63.9	50.6	75.8





#21
trans-1,2-Dichloroethene
Concen: 19.512 ug/l
RT: 5.110 min Scan# 5
Delta R.T. -0.000 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion: 96 Resp: 11641

Ion	Ratio	Lower	Upper
96	100		
61	120.5	92.7	139.1
98	66.7	49.7	74.5

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC020

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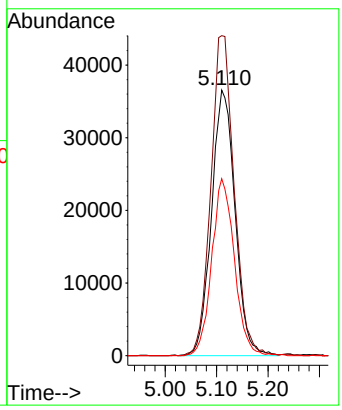
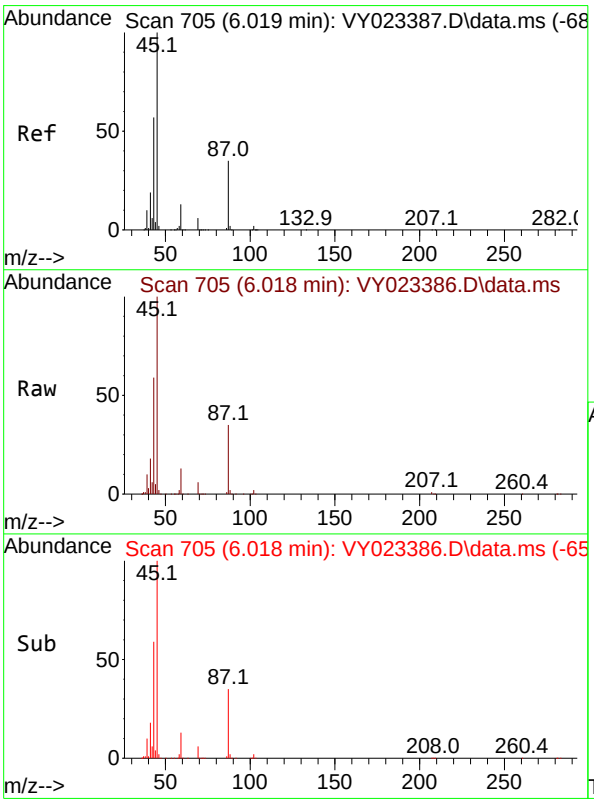
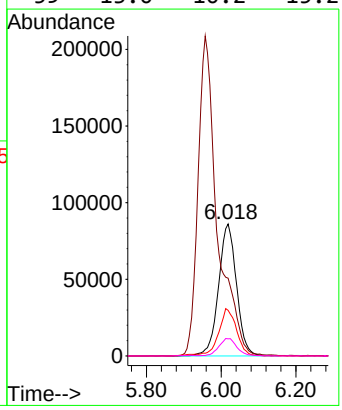


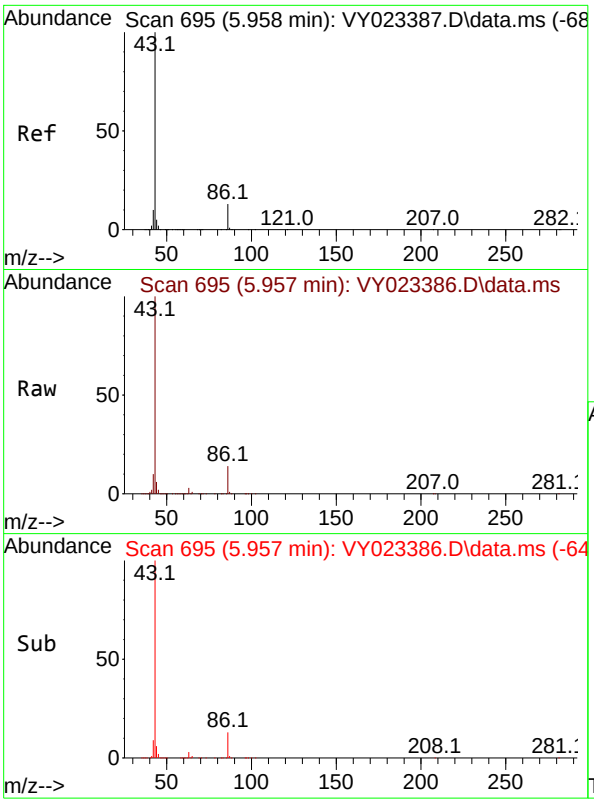


#22
Diisopropyl ether
Concen: 19.366 ug/l
RT: 6.018 min Scan# 705
Delta R.T. -0.000 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion: 45 Resp: 288429

Ion	Ratio	Lower	Upper
45	100		
43	58.8	45.6	68.4
87	34.5	28.1	42.1
59	13.0	10.2	15.2

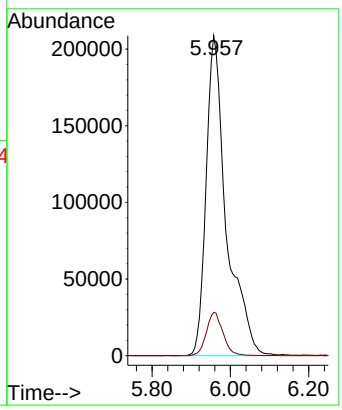




#23
Vinyl Acetate
Concen: 91.373 ug/l
RT: 5.957 min Scan# 6
Delta R.T. -0.000 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion: 43 Resp: 74804

Ion	Ratio	Lower	Upper
43	100		
86	13.5	10.6	15.8



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC020

Manual Integrations
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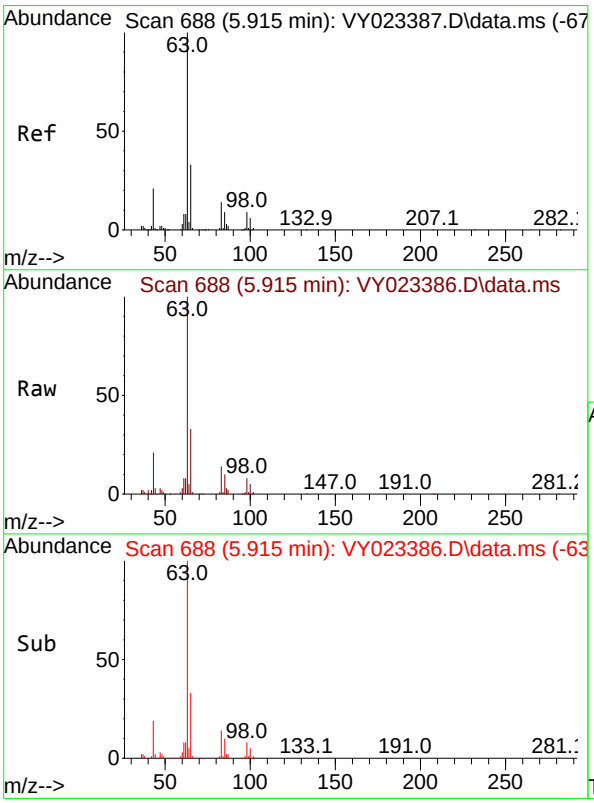
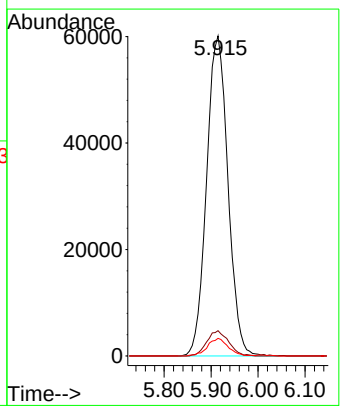
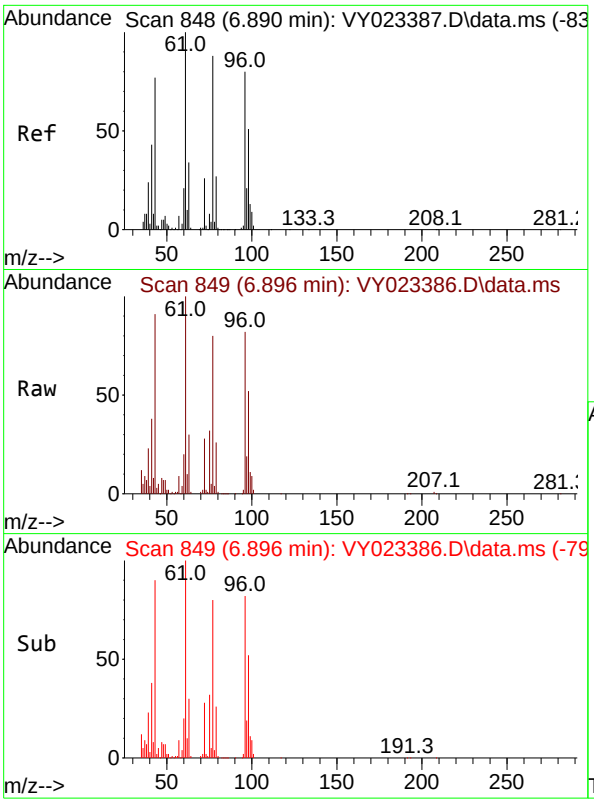


#24
1,1-Dichloroethane
Concen: 19.354 ug/l
RT: 5.915 min Scan# 688
Delta R.T. -0.000 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion: 63 Resp: 190012

Ion	Ratio	Lower	Upper
63	100		
98	7.9	4.3	13.1
100	5.5	2.8	8.4

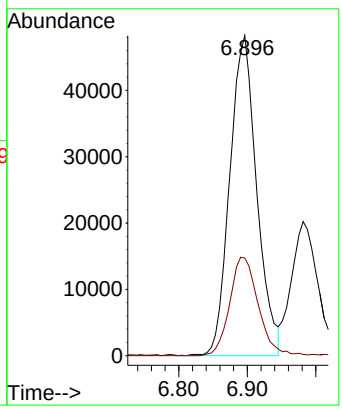




#25
2-Butanone
Concen: 95.593 ug/l
RT: 6.896 min Scan# 84
Delta R.T. 0.006 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion: 43 Resp: 13215

Ion	Ratio	Lower	Upper
43	100		
72	30.5	27.4	41.2



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC020

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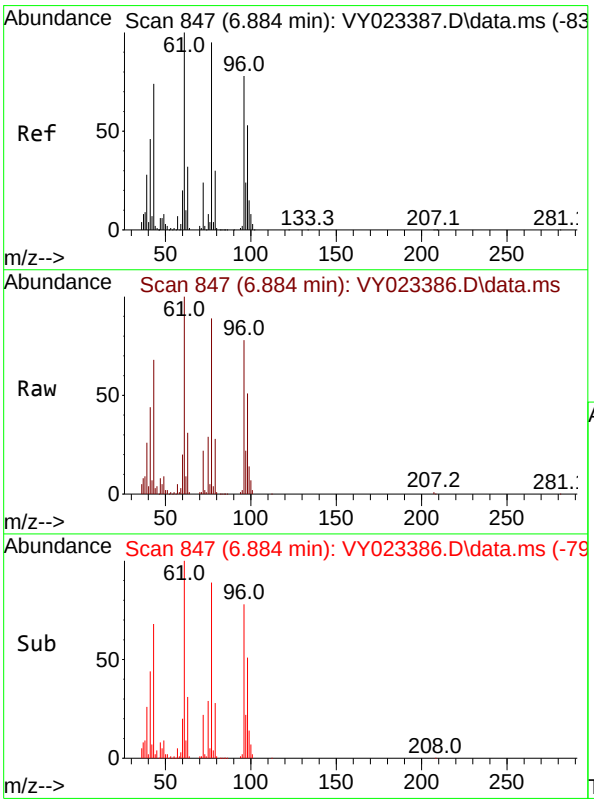
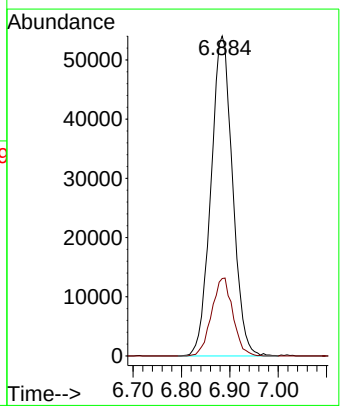
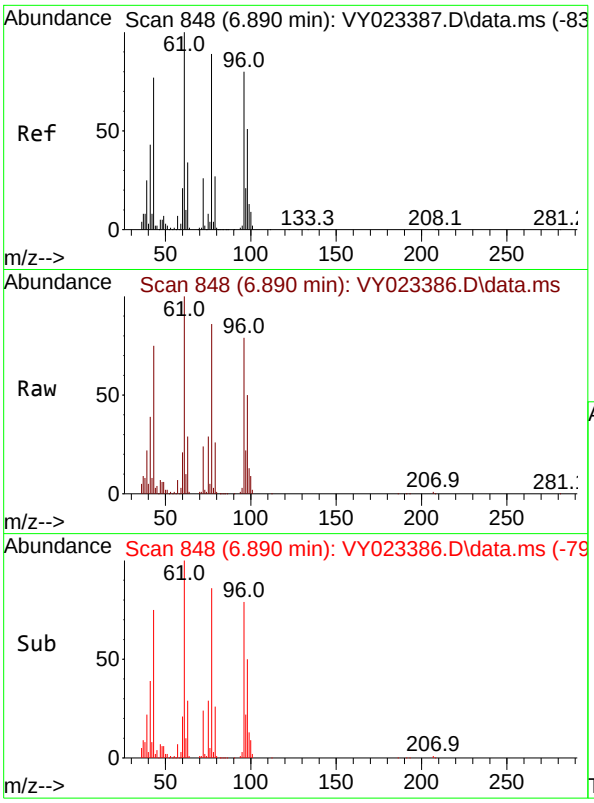


#26
2,2-Dichloropropane
Concen: 19.247 ug/l
RT: 6.884 min Scan# 847
Delta R.T. -0.000 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion: 77 Resp: 167903

Ion	Ratio	Lower	Upper
77	100		
97	23.9	12.1	36.3





#27
cis-1,2-Dichloroethene
Concen: 19.747 ug/l
RT: 6.890 min Scan# 84
Delta R.T. -0.000 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion: 96 Resp: 13363

Ion	Ratio	Lower	Upper
96	100		
61	128.1	0.0	258.2
98	65.3	0.0	132.0

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC020

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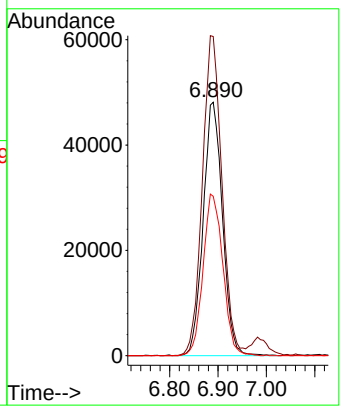
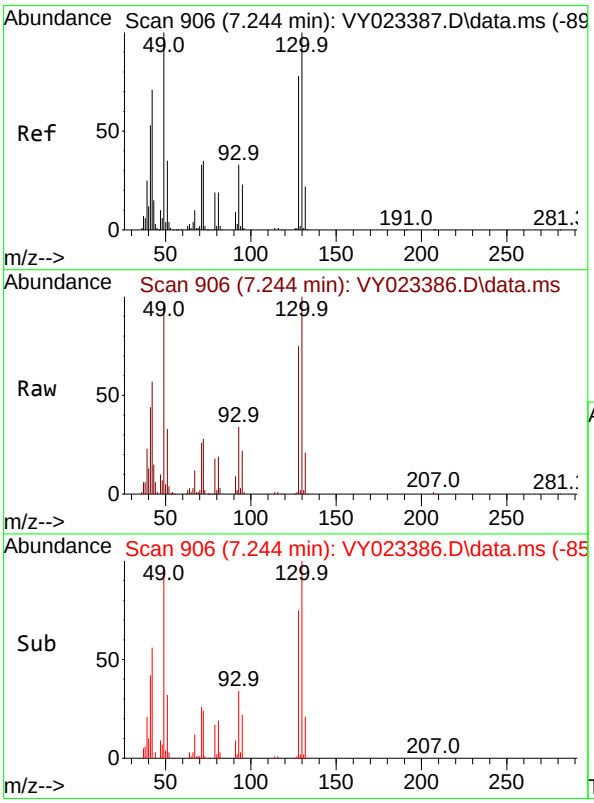
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

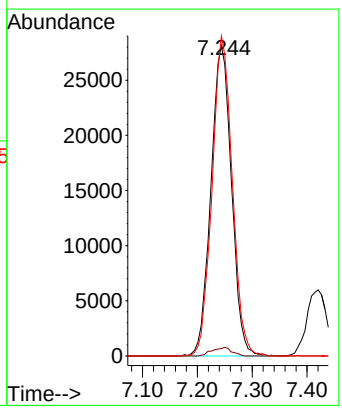


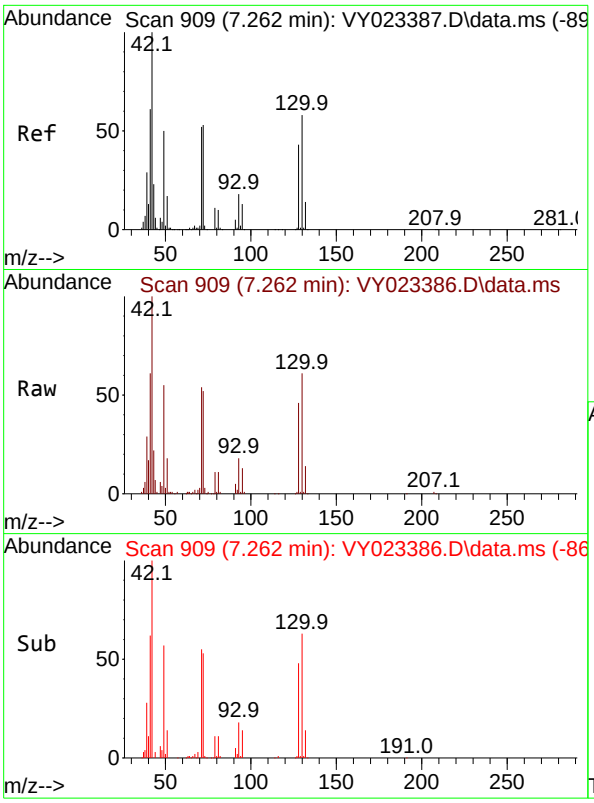


#28
Bromochloromethane
Concen: 19.273 ug/l
RT: 7.244 min Scan# 906
Delta R.T. -0.000 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion: 49 Resp: 73407

Ion	Ratio	Lower	Upper
49	100		
129	2.7	0.0	5.6
130	100.8	81.9	122.9

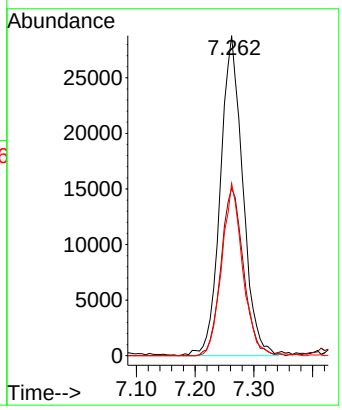




#29
Tetrahydrofuran
Concen: 93.229 ug/l
RT: 7.262 min Scan# 9(
Delta R.T. -0.000 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion: 42 Resp: 7650

Ion	Ratio	Lower	Upper
42	100		
72	52.7	43.0	64.6
71	50.6	40.1	60.1



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC020

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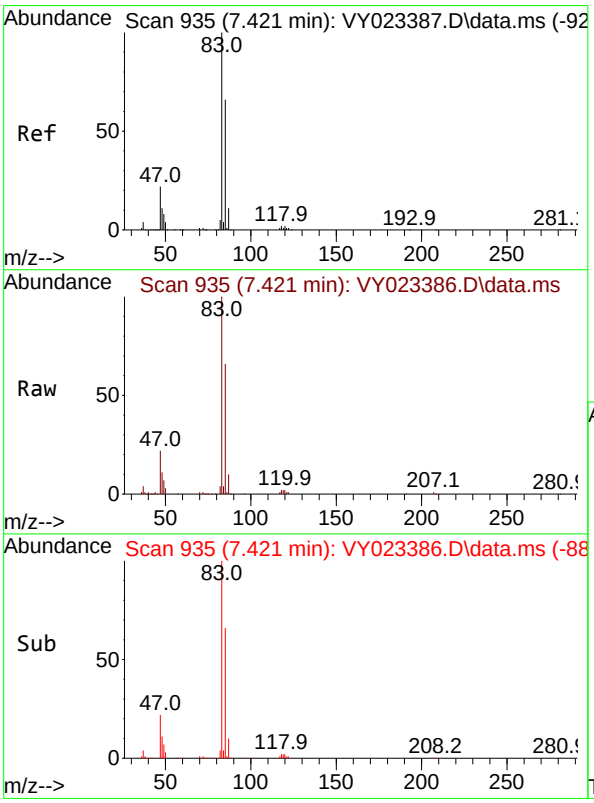
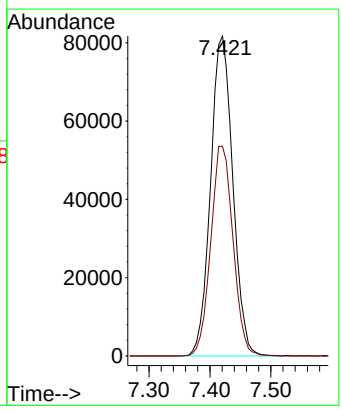
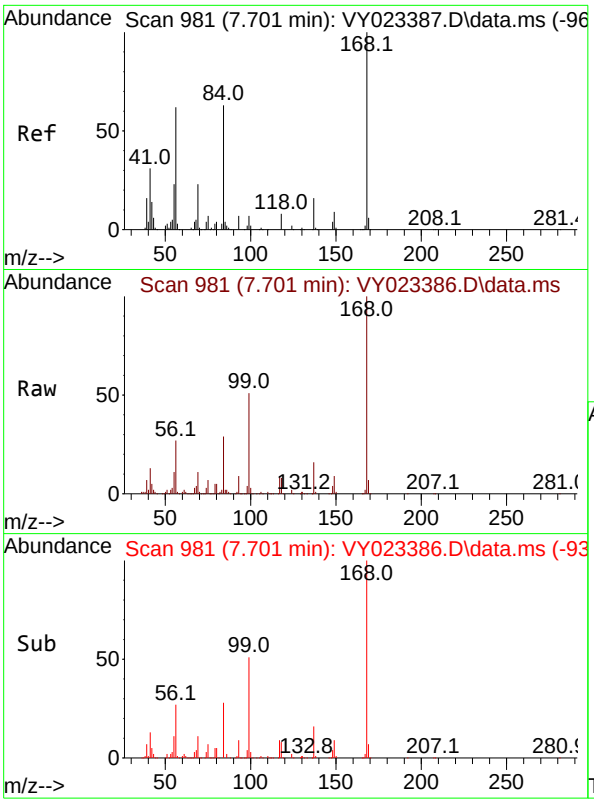


#30
Chloroform
Concen: 19.562 ug/l
RT: 7.421 min Scan# 935
Delta R.T. -0.000 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion: 83 Resp: 207096

Ion	Ratio	Lower	Upper
83	100		
85	65.5	52.5	78.7

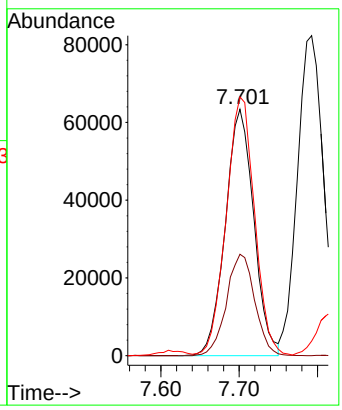




#31
Cyclohexane
Concen: 18.472 ug/l
RT: 7.701 min Scan# 9
Delta R.T. -0.000 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion: 56 Resp: 16015

Ion	Ratio	Lower	Upper
56	100		
69	41.2	30.0	45.0
84	103.3	81.2	121.8



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC020

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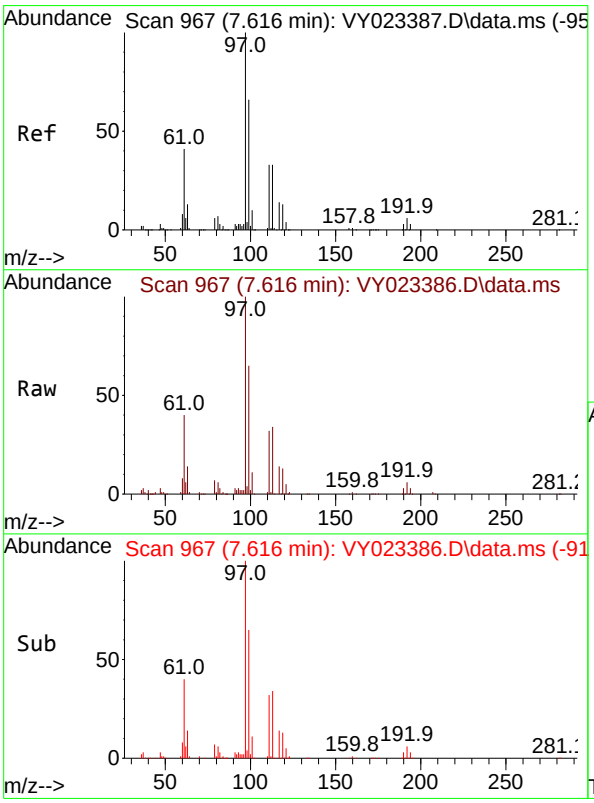
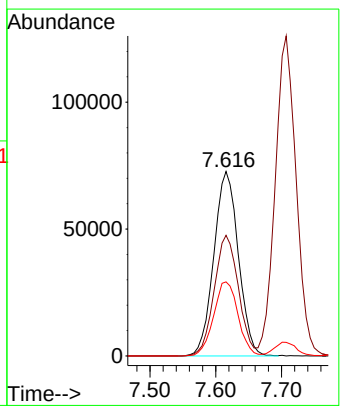
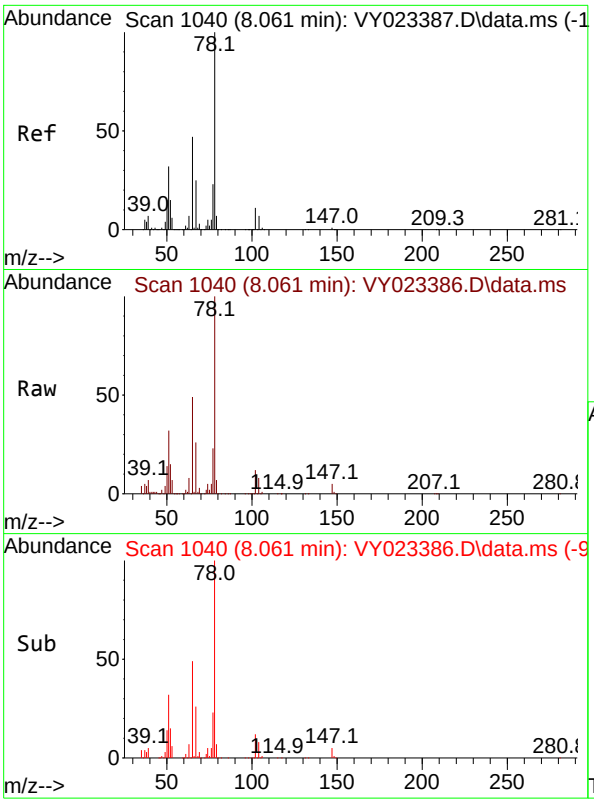


#32
1,1,1-Trichloroethane
Concen: 19.873 ug/l
RT: 7.616 min Scan# 967
Delta R.T. -0.000 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion: 97 Resp: 188861

Ion	Ratio	Lower	Upper
97	100		
99	64.4	51.4	77.2
61	40.1	31.9	47.9

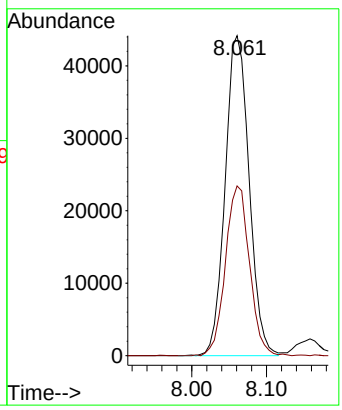




#33
1,2-Dichloroethane-d4
Concen: 19.798 ug/l
RT: 8.061 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion: 65 Resp: 9848

Ion	Ratio	Lower	Upper
65	100		
67	53.3	0.0	105.8



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC020

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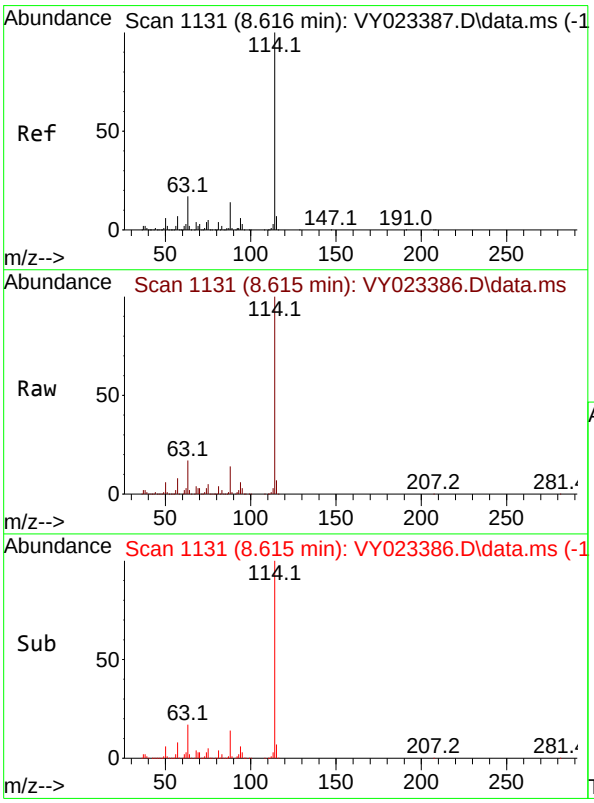
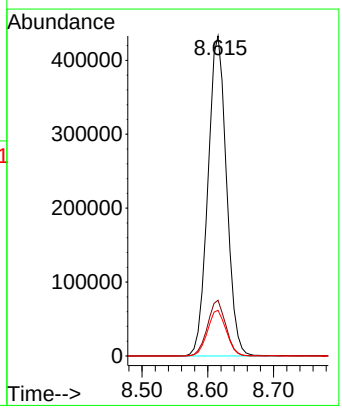
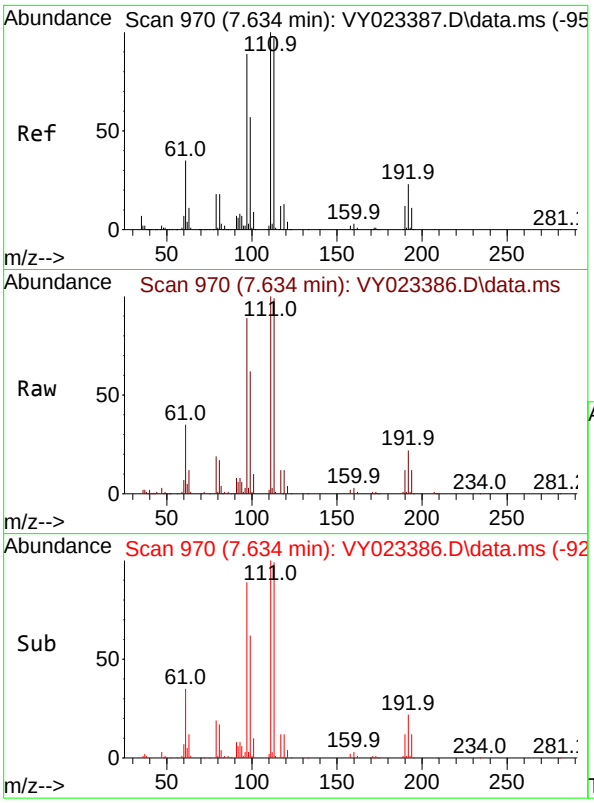


#34
1,4-Difluorobenzene
Concen: 50.000 ug/l
RT: 8.615 min Scan# 1131
Delta R.T. -0.000 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion:114 Resp: 851961

Ion	Ratio	Lower	Upper
114	100		
63	17.4	0.0	34.2
88	14.3	0.0	28.4

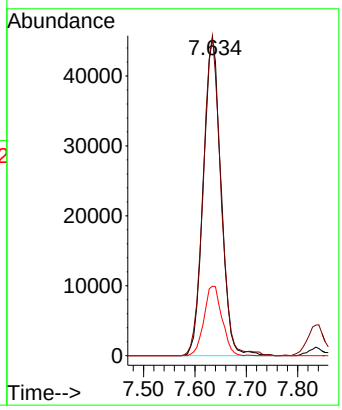




#35
Dibromofluoromethane
Concen: 20.895 ug/l
RT: 7.634 min Scan# 9
Delta R.T. -0.000 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion:113 Resp: 10803

Ion	Ratio	Lower	Upper
113	100		
111	100.9	81.8	122.6
192	22.3	18.0	27.0



Instrument :
MSVOA_Y
ClientSampleId :
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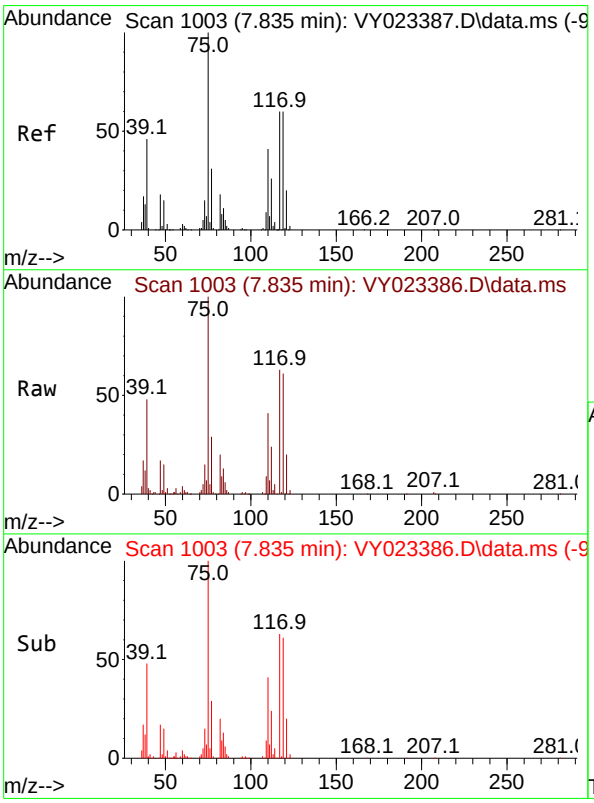
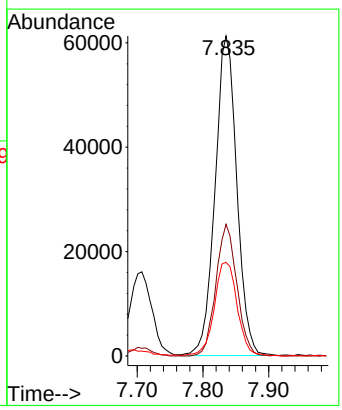
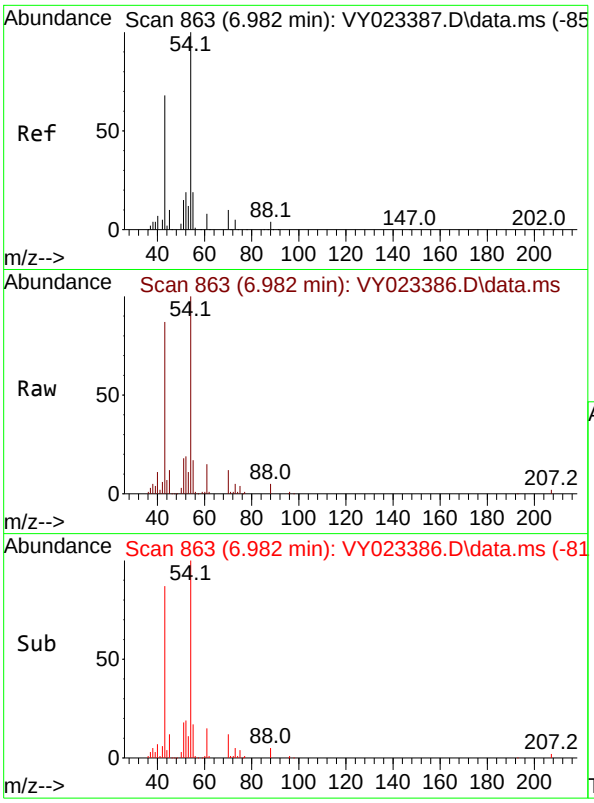


#36
1,1-Dichloropropene
Concen: 19.317 ug/l
RT: 7.835 min Scan# 1003
Delta R.T. -0.000 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion: 75 Resp: 140912

Ion	Ratio	Lower	Upper
75	100		
110	39.7	19.9	59.7
77	31.0	25.0	37.6

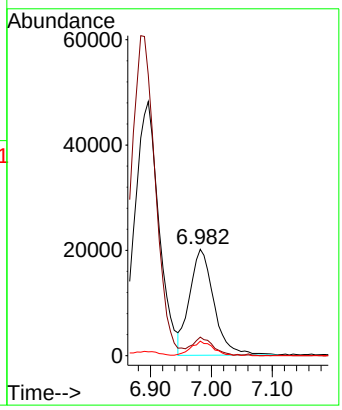




#37
Ethyl Acetate
Concen: 19.315 ug/l
RT: 6.982 min Scan# 8
Delta R.T. -0.000 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion: 43 Resp: 5570

Ion	Ratio	Lower	Upper
43	100		
61	13.9	11.8	17.8
70	12.7	10.5	15.7



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC020

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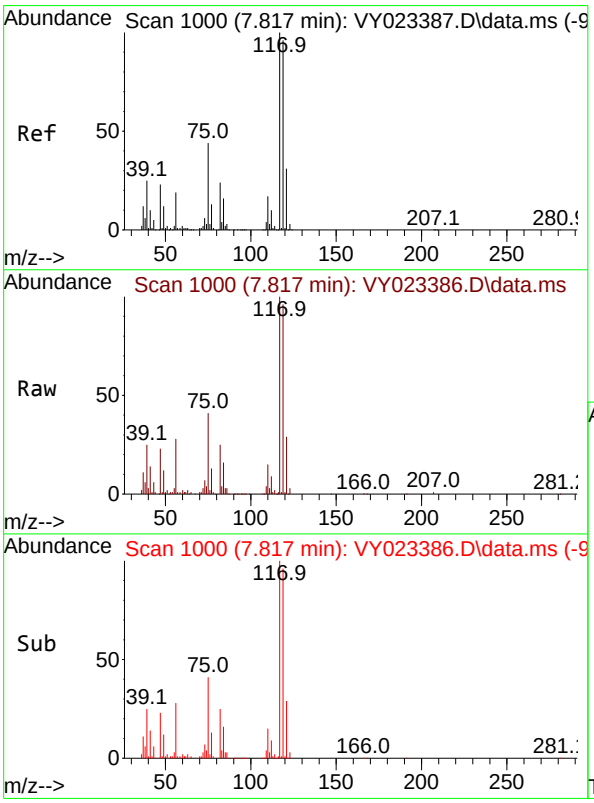
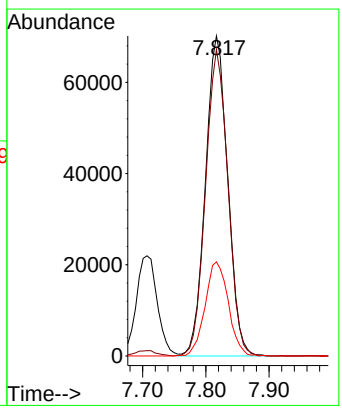
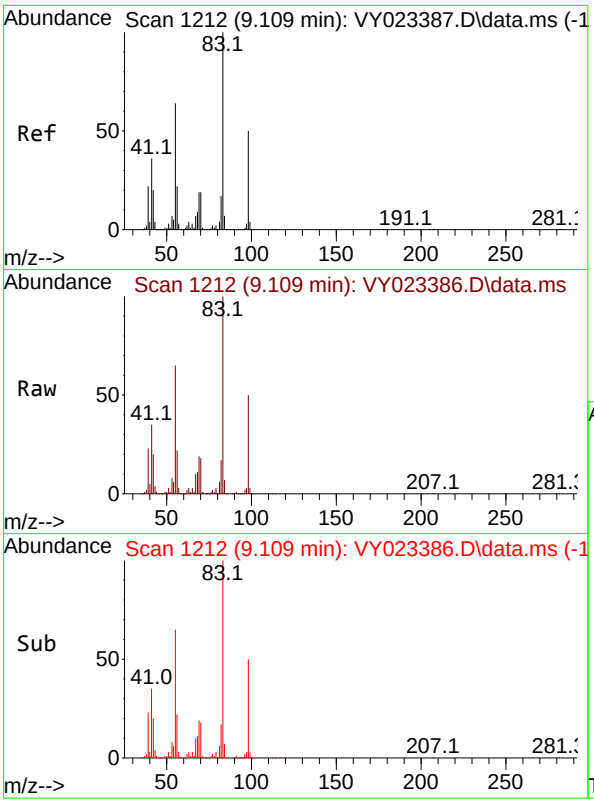


#38
Carbon Tetrachloride
Concen: 20.289 ug/l
RT: 7.817 min Scan# 1000
Delta R.T. -0.000 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion:117 Resp: 171925

Ion	Ratio	Lower	Upper
117	100		
119	95.8	76.8	115.2
121	29.4	24.5	36.7

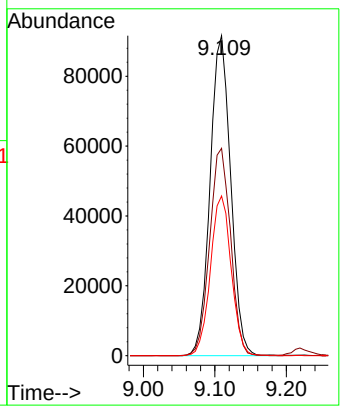




#39
Methylcyclohexane
Concen: 19.576 ug/l
RT: 9.109 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion: 83 Resp: 18283

Ion	Ratio	Lower	Upper
83	100		
55	64.8	51.4	77.2
98	49.9	40.4	60.6



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC020

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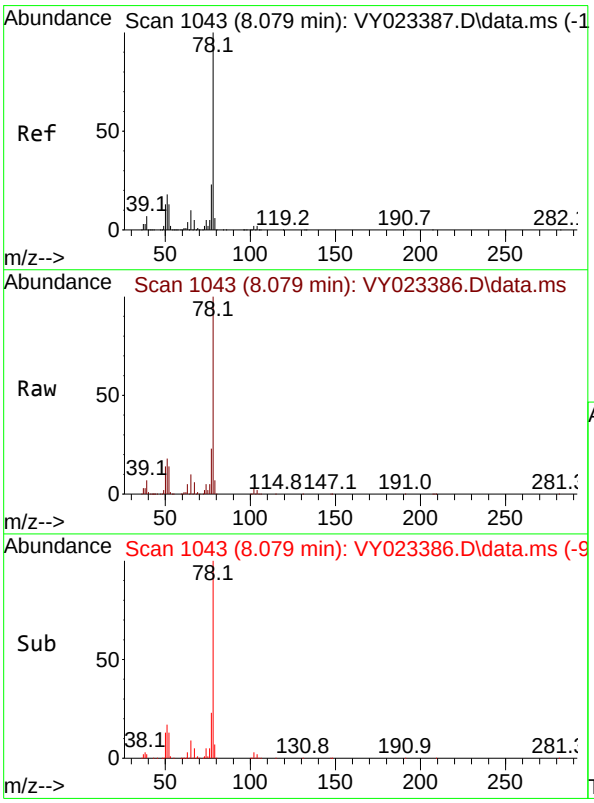
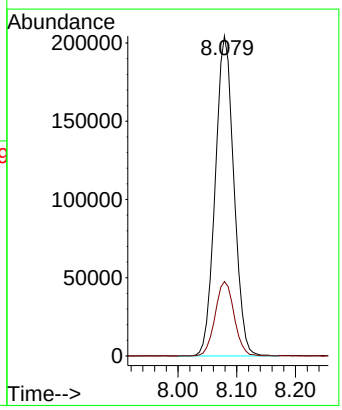
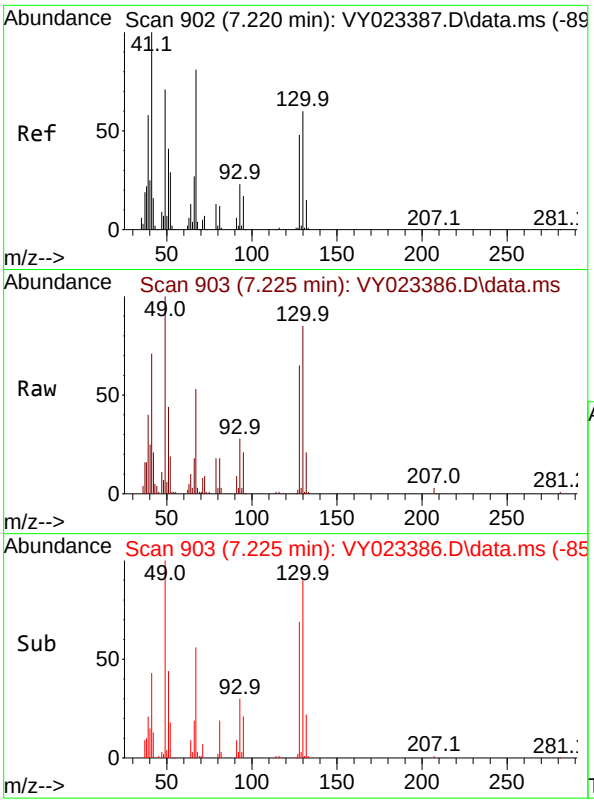


#40
Benzene
Concen: 19.809 ug/l
RT: 8.079 min Scan# 1043
Delta R.T. -0.000 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion: 78 Resp: 450471

Ion	Ratio	Lower	Upper
78	100		
77	23.2	18.3	27.5

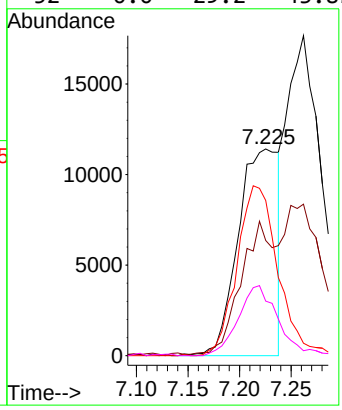




#41
Methacrylonitrile
Concen: 20.783 ug/l m
RT: 7.225 min Scan# 9
Delta R.T. 0.006 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion: 41 Resp: 3112

Ion	Ratio	Lower	Upper
41	100		
39	68.6	52.2	78.4
67	0.0	74.9	112.3#
52	0.0	29.2	43.8#



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC020

Manual Integrations
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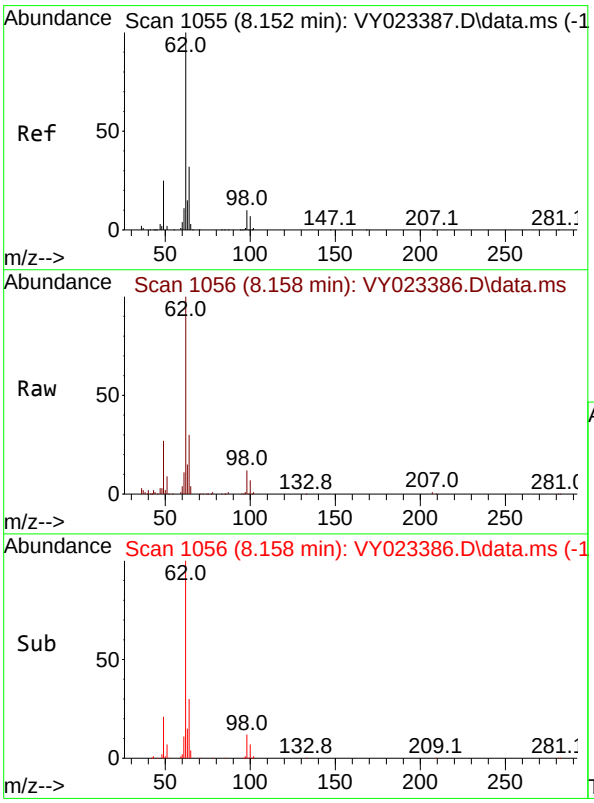
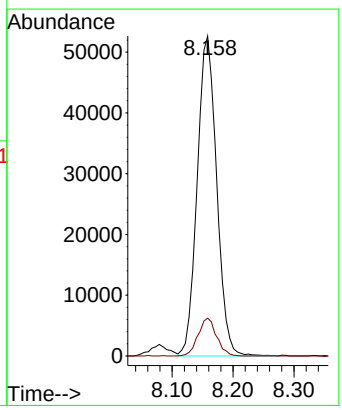
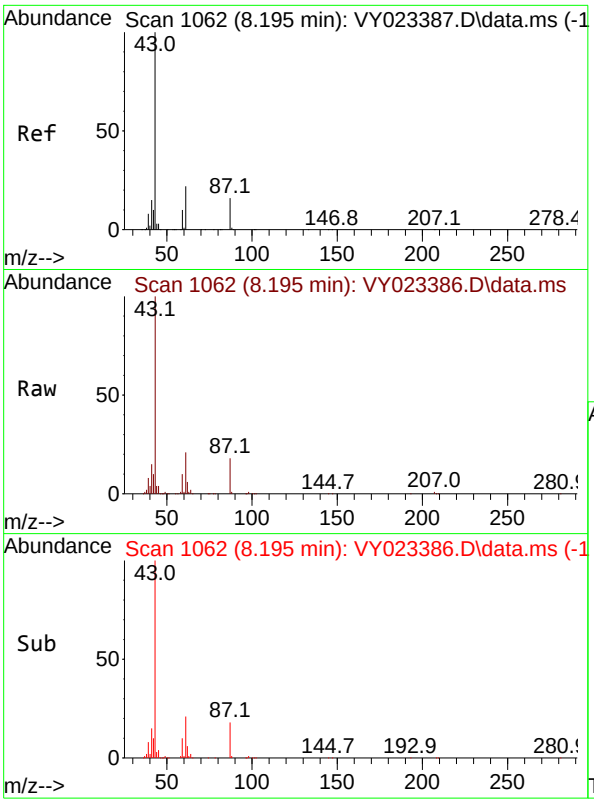


#42
1,2-Dichloroethane
Concen: 20.206 ug/l
RT: 8.158 min Scan# 1056
Delta R.T. 0.006 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion: 62 Resp: 116941

Ion	Ratio	Lower	Upper
62	100		
98	11.2	0.0	21.6





#43
Isopropyl Acetate
Concen: 19.002 ug/l
RT: 8.195 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion: 43 Resp: 10659

Ion	Ratio	Lower	Upper
43	100		
61	33.1	18.1	27.1
87	16.9	13.5	20.3

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC020

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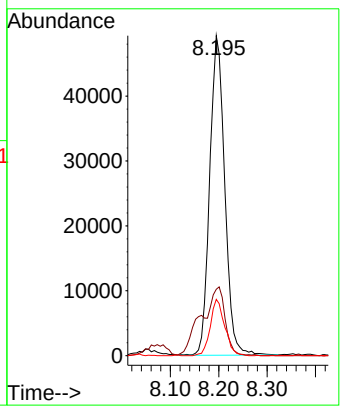
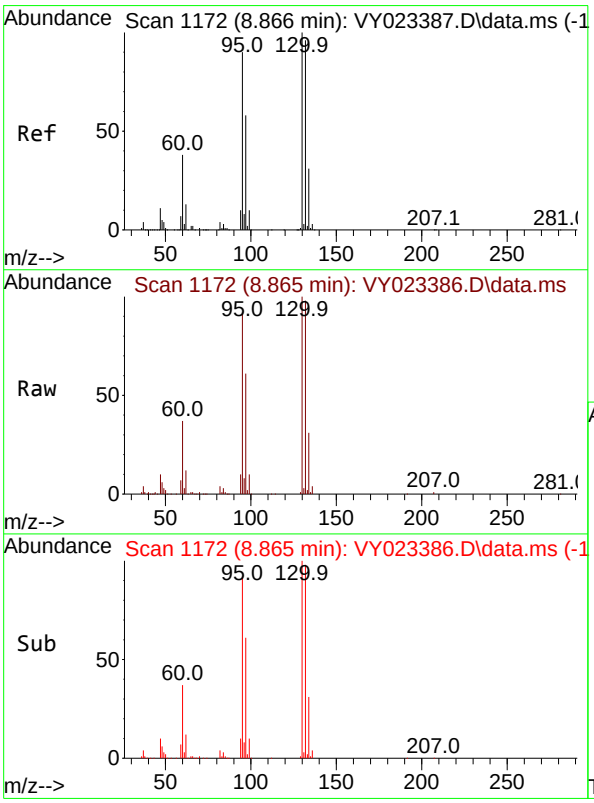
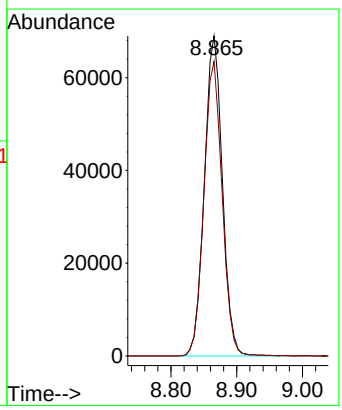


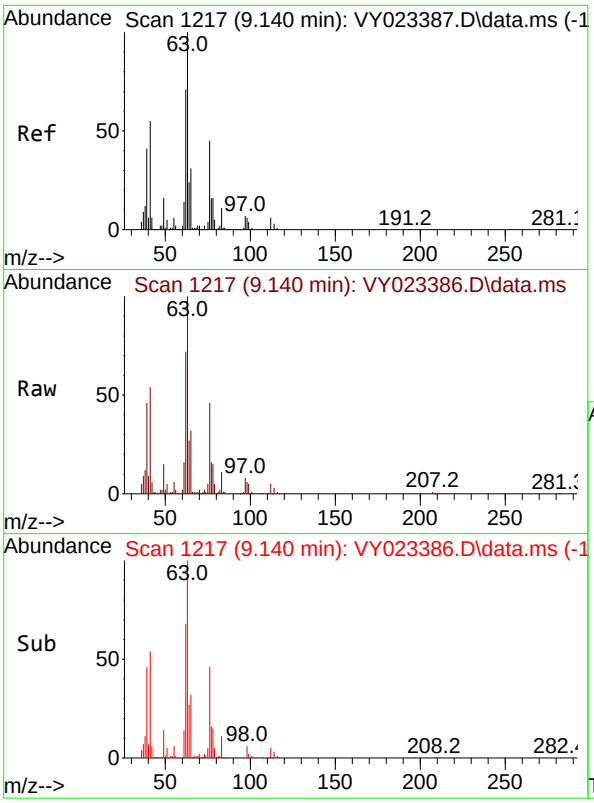


#44
Trichloroethene
Concen: 20.598 ug/l
RT: 8.865 min Scan# 1172
Delta R.T. -0.000 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion:130 Resp: 131459

Ion	Ratio	Lower	Upper
130	100		
95	92.0	0.0	180.6

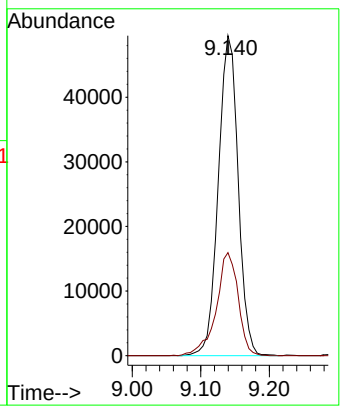




#45
1,2-Dichloropropane
Concen: 19.417 ug/l
RT: 9.140 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion: 63 Resp: 9936

Ion	Ratio	Lower	Upper
63	100		
65	32.2	24.9	37.3



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC020

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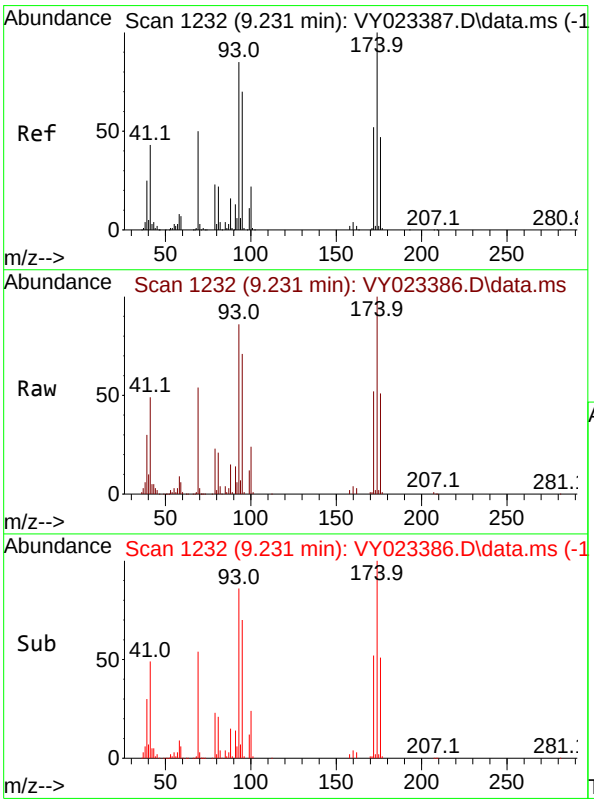
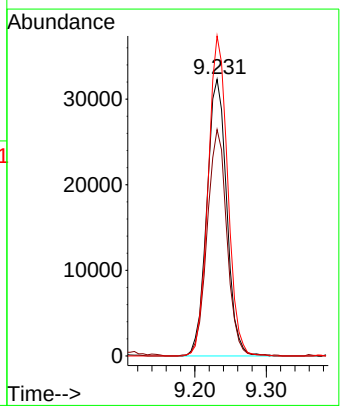
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

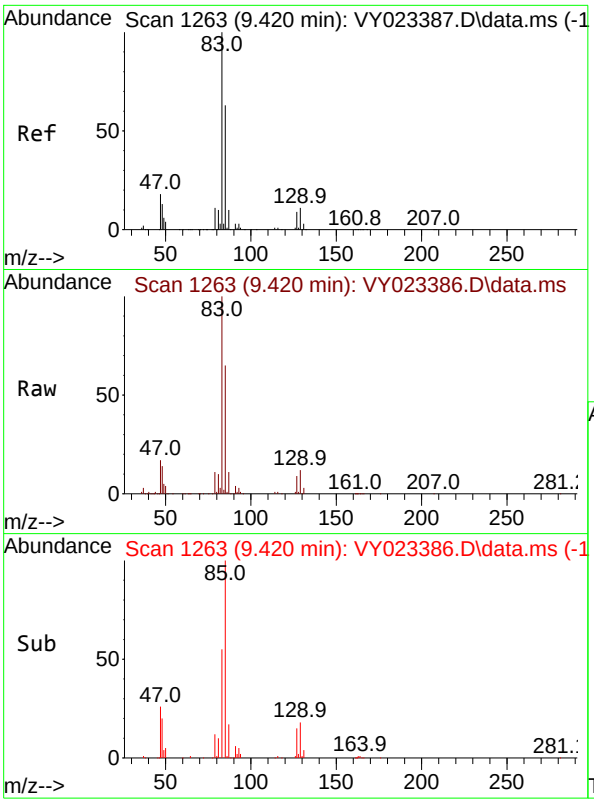


#46
Dibromomethane
Concen: 19.896 ug/l
RT: 9.231 min Scan# 1232
Delta R.T. -0.000 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion: 93 Resp: 62277

Ion	Ratio	Lower	Upper
93	100		
95	81.3	65.4	98.0
174	113.6	92.9	139.3

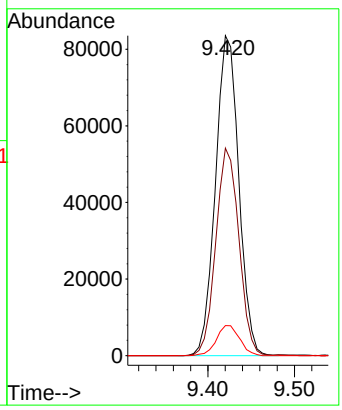




#47
Bromodichloromethane
Concen: 19.854 ug/l
RT: 9.420 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion: 83 Resp: 15642

Ion	Ratio	Lower	Upper
83	100		
85	64.9	50.8	76.2
127	9.4	7.4	11.2



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC020

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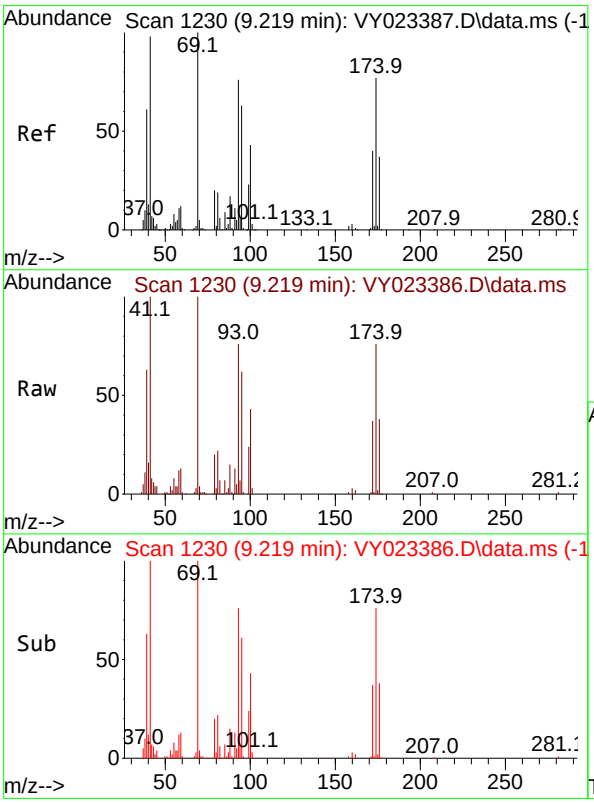
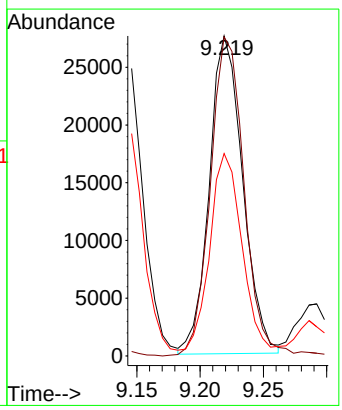
Supervised By :Mahesh Dadoda 10/10/2025

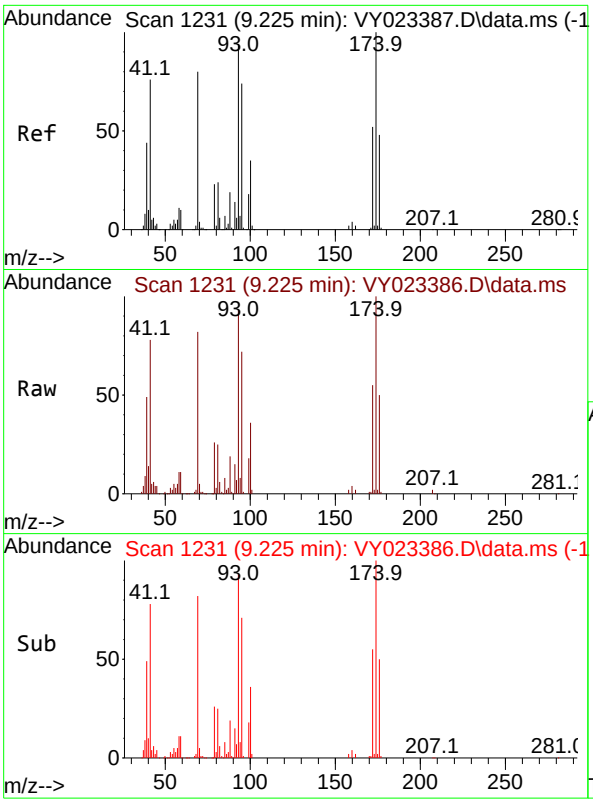


#48
Methyl methacrylate
Concen: 19.352 ug/l
RT: 9.219 min Scan# 1230
Delta R.T. -0.000 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion: 41 Resp: 50661

Ion	Ratio	Lower	Upper
41	100		
69	102.0	81.0	121.4
39	58.8	48.2	72.4

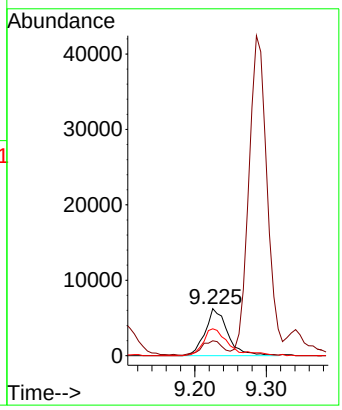




#49
1,4-Dioxane
Concen: 420.712 ug/l
RT: 9.225 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion: 88 Resp: 1363

Ion	Ratio	Lower	Upper
88	100		
43	28.9	21.8	32.8
58	58.1	46.8	70.2



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC020

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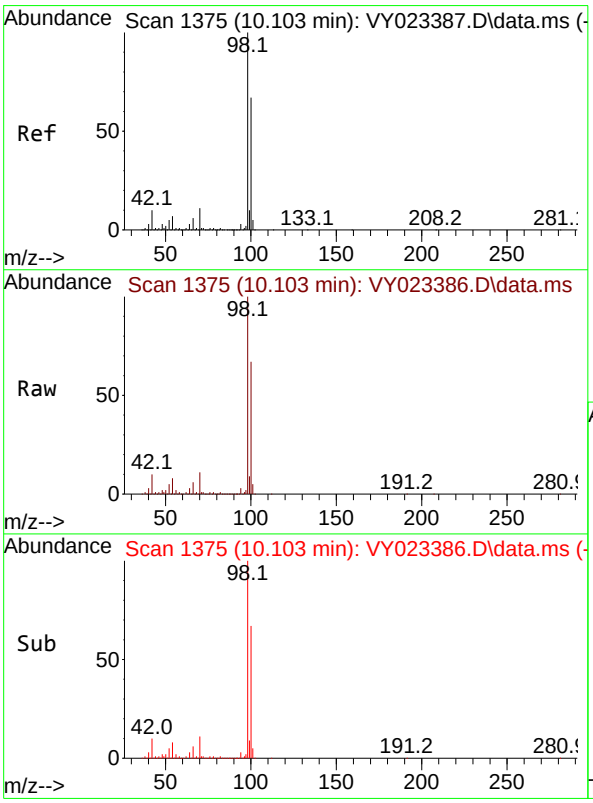
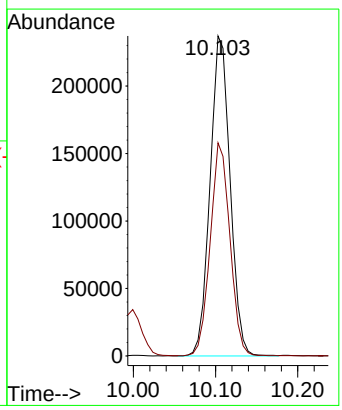
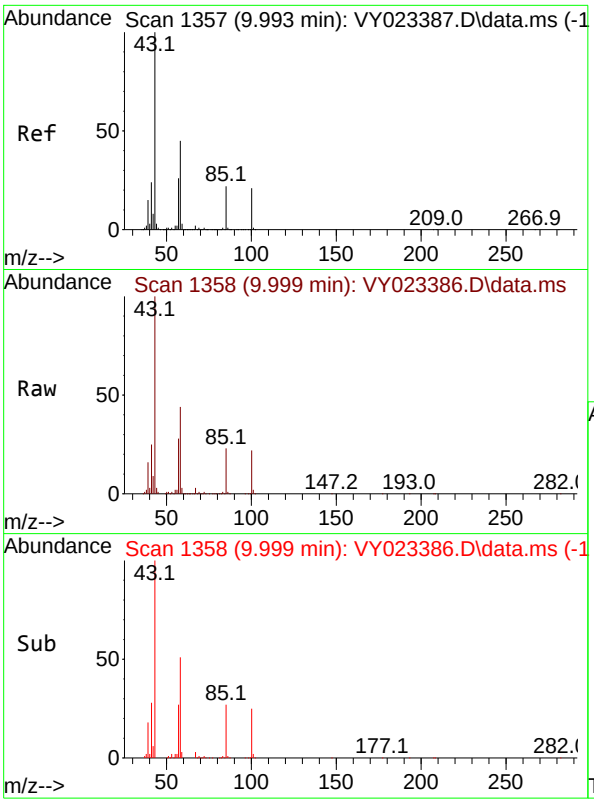


#50
Toluene-d8
Concen: 20.568 ug/l
RT: 10.103 min Scan# 1375
Delta R.T. -0.000 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion: 98 Resp: 401067

Ion	Ratio	Lower	Upper
98	100		
100	65.3	53.0	79.4

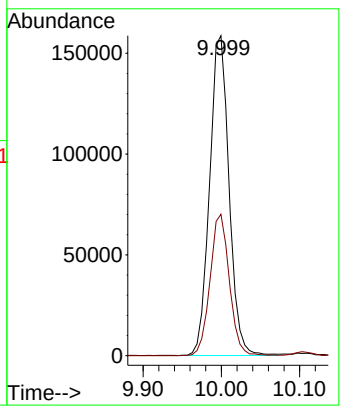




#51
4-Methyl-2-Pentanone
Concen: 95.378 ug/l
RT: 9.999 min Scan# 1
Delta R.T. 0.006 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion: 43 Resp: 27405

Ion	Ratio	Lower	Upper
43	100		
58	43.8	35.3	52.9



Instrument :
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ClientSampleId :
VSTDICC020

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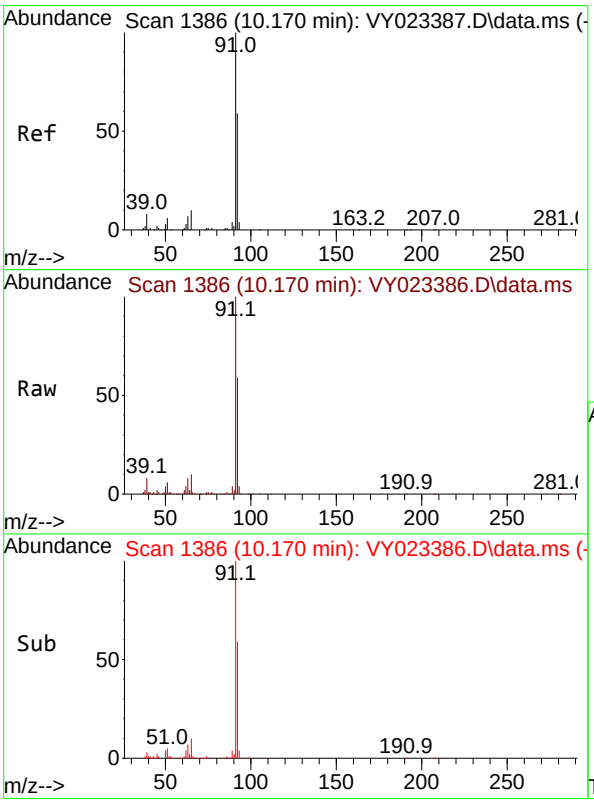
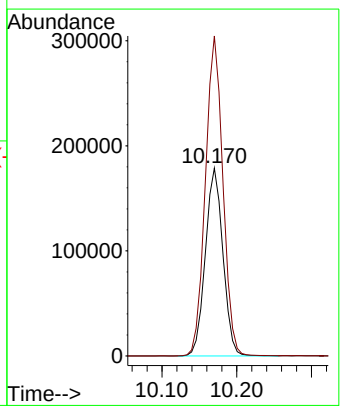
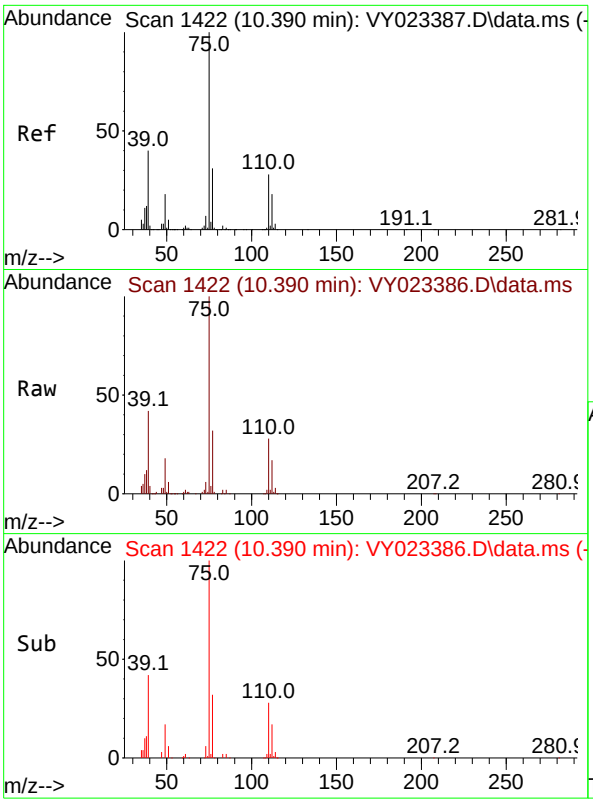


#52
Toluene
Concen: 20.191 ug/l
RT: 10.170 min Scan# 1386
Delta R.T. -0.000 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion: 92 Resp: 291453

Ion	Ratio	Lower	Upper
92	100		
91	170.0	136.4	204.6

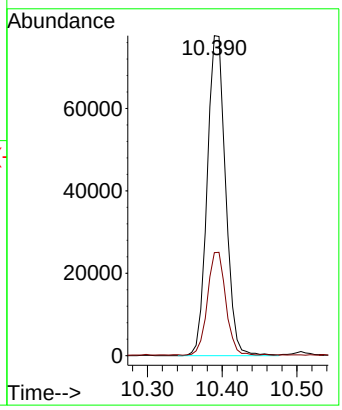




#53
t-1,3-Dichloropropene
Concen: 19.632 ug/l
RT: 10.390 min Scan# 14
Delta R.T. -0.000 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion: 75 Resp: 13284

Ion	Ratio	Lower	Upper
75	100		
77	31.9	25.1	37.7



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC020

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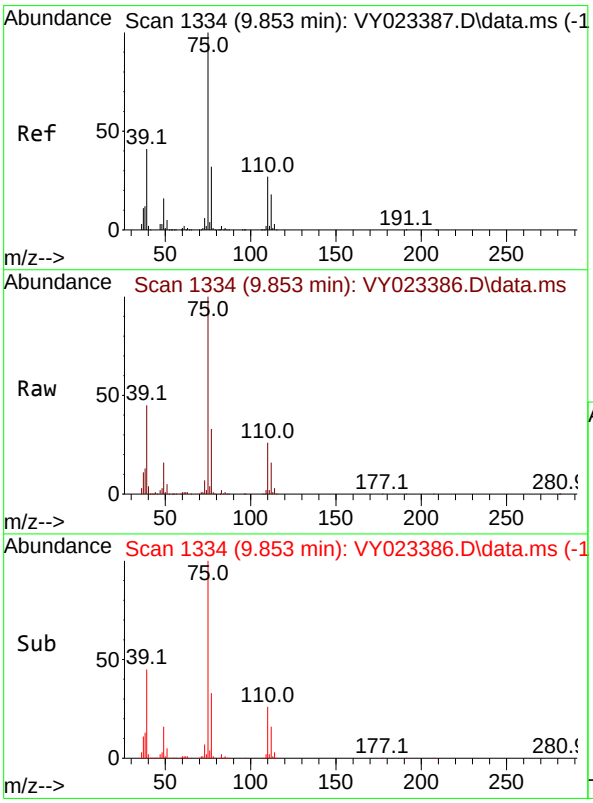
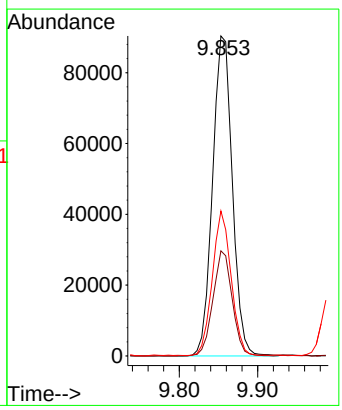
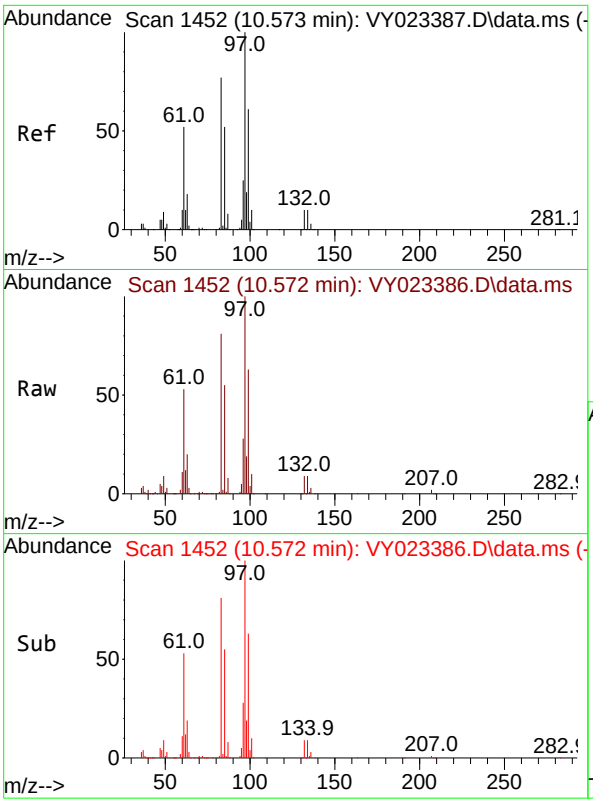


#54
cis-1,3-Dichloropropene
Concen: 19.606 ug/l
RT: 9.853 min Scan# 1334
Delta R.T. -0.000 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion: 75 Resp: 158580

Ion	Ratio	Lower	Upper
75	100		
77	32.8	25.4	38.0
39	45.1	32.8	49.2

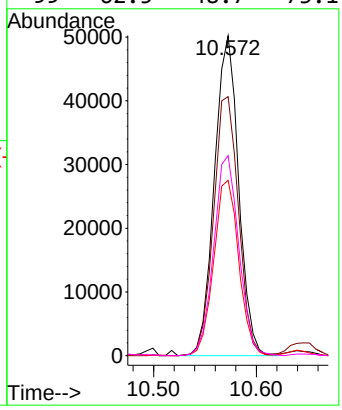




#55
1,1,2-Trichloroethane
Concen: 19.740 ug/l
RT: 10.572 min Scan# 14
Delta R.T. -0.000 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion: 97 Resp: 8218

Ion	Ratio	Lower	Upper
97	100		
83	80.9	61.8	92.6
85	54.8	41.3	61.9
99	62.5	48.7	73.1



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC020

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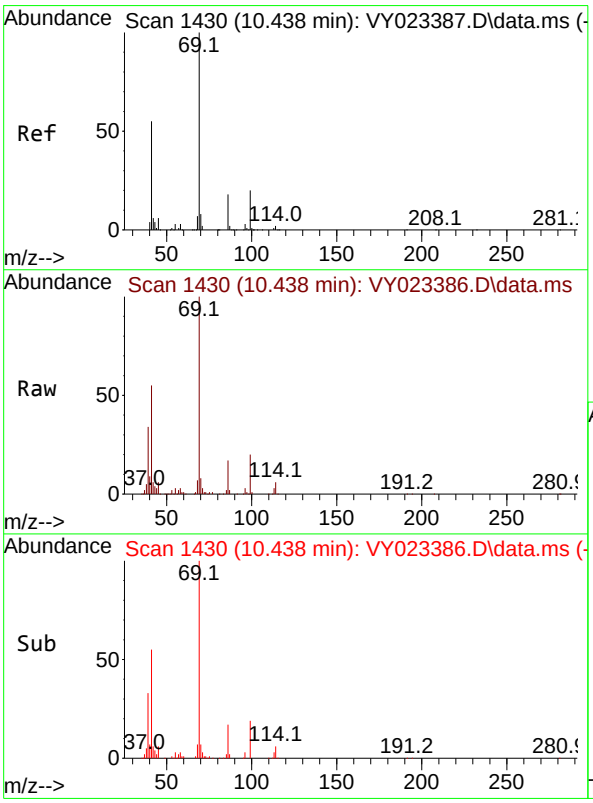
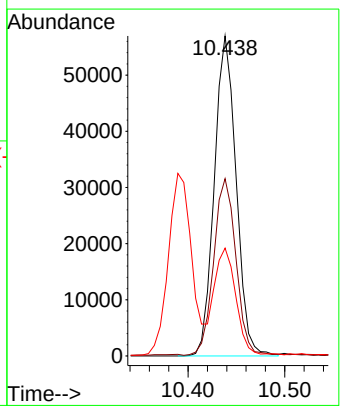
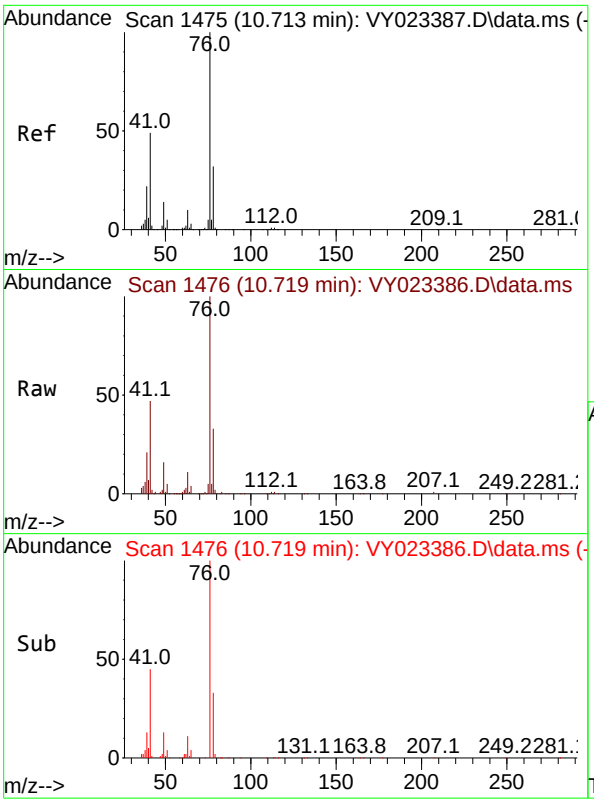


#56
Ethyl methacrylate
Concen: 18.613 ug/l
RT: 10.438 min Scan# 1430
Delta R.T. -0.000 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion: 69 Resp: 89244

Ion	Ratio	Lower	Upper
69	100		
41	56.5	44.6	67.0
39	34.5	27.0	40.4

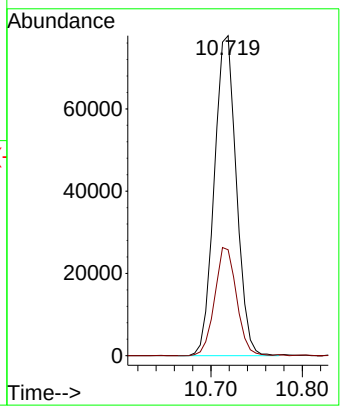




#57
1,3-Dichloropropane
Concen: 19.389 ug/l
RT: 10.719 min Scan# 14
Delta R.T. 0.006 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion: 76 Resp: 13065

Ion	Ratio	Lower	Upper
76	100		
78	33.5	25.9	38.9



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC020

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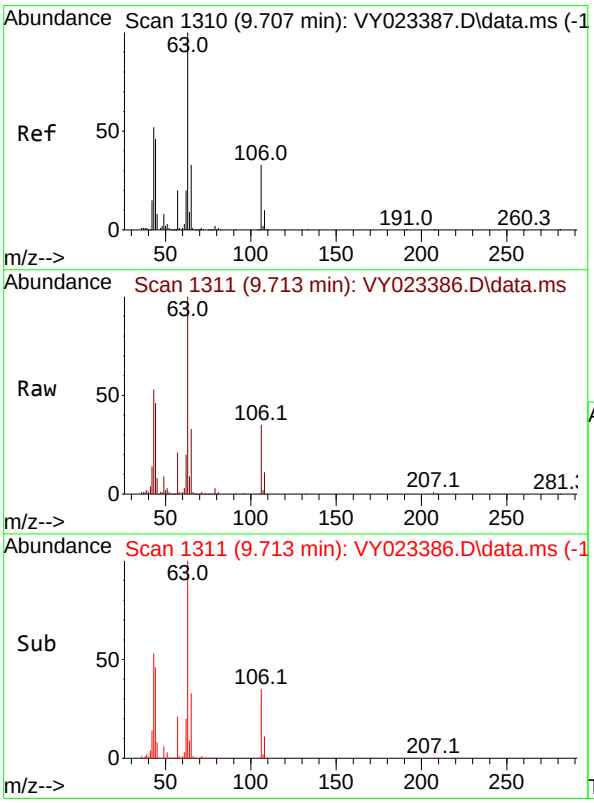
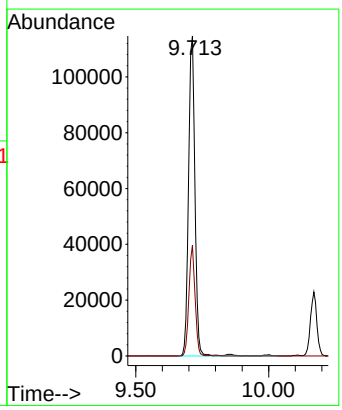
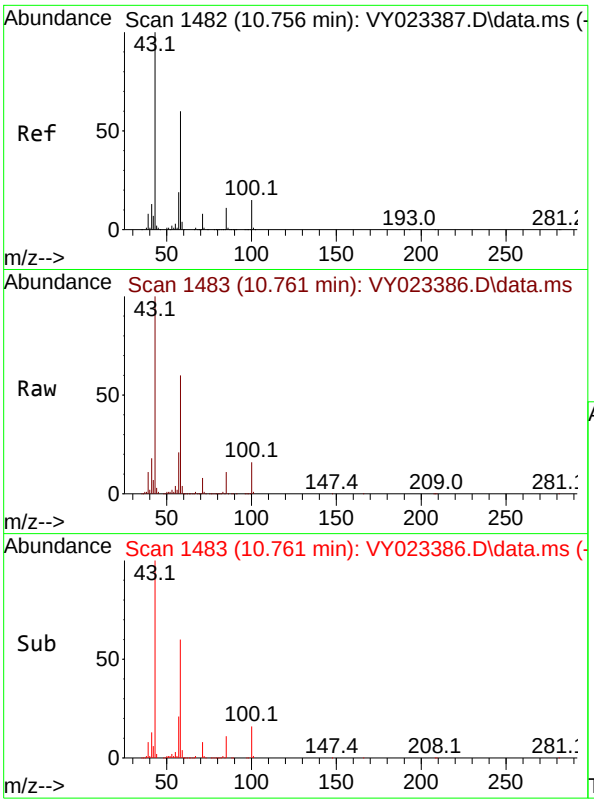


#58
2-Chloroethyl Vinyl ether
Concen: 90.982 ug/l m
RT: 9.713 min Scan# 1311
Delta R.T. 0.006 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion: 63 Resp: 190850

Ion	Ratio	Lower	Upper
63	100		
106	32.9	26.6	39.8

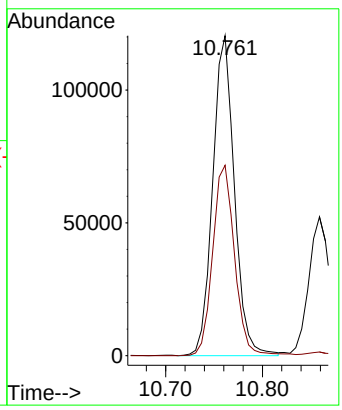




#59
2-Hexanone
Concen: 94.190 ug/l
RT: 10.761 min Scan# 14
Delta R.T. 0.006 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion: 43 Resp: 18738

Ion	Ratio	Lower	Upper
43	100		
58	60.2	30.5	91.5



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC020

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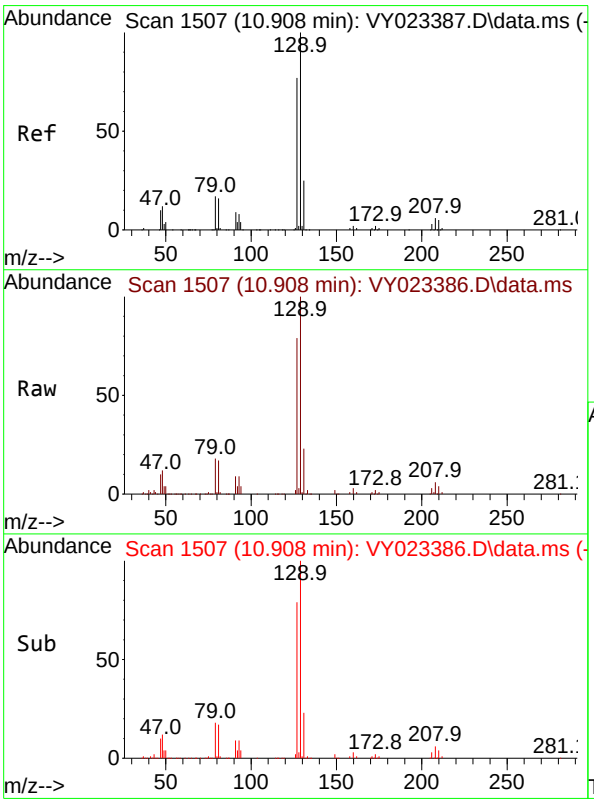
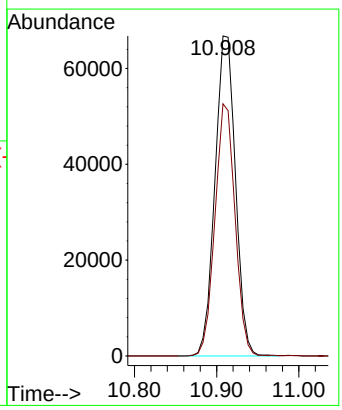
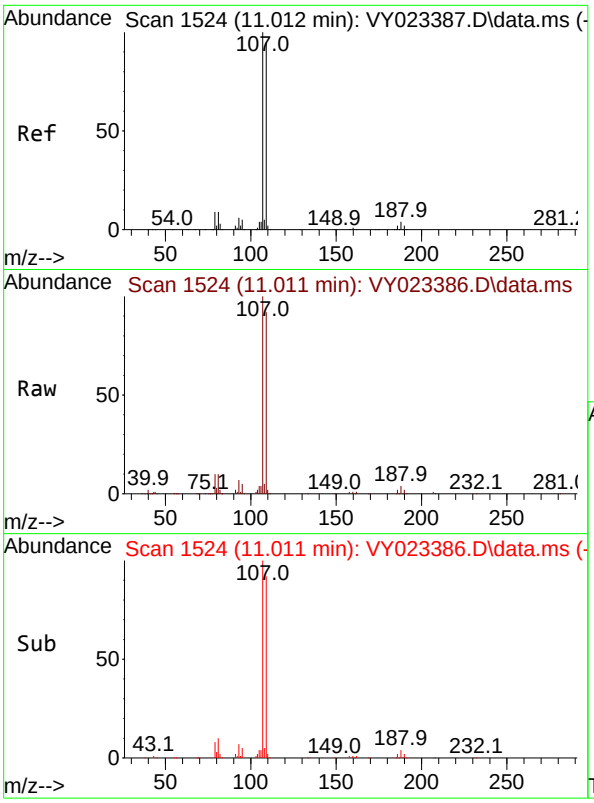


#60
Dibromochloromethane
Concen: 20.412 ug/l
RT: 10.908 min Scan# 1507
Delta R.T. -0.000 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion:129 Resp: 115907

Ion	Ratio	Lower	Upper
129	100		
127	77.1	38.6	115.7

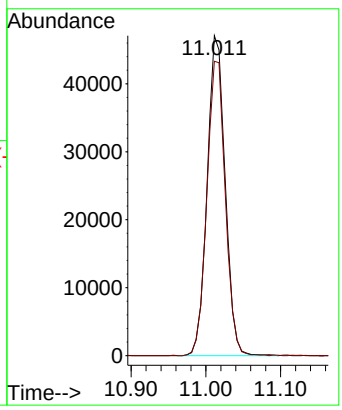




#61
1,2-Dibromoethane
Concen: 20.062 ug/l
RT: 11.011 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion:107 Resp: 7857

Ion	Ratio	Lower	Upper
107	100		
109	94.7	76.1	114.1



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC020

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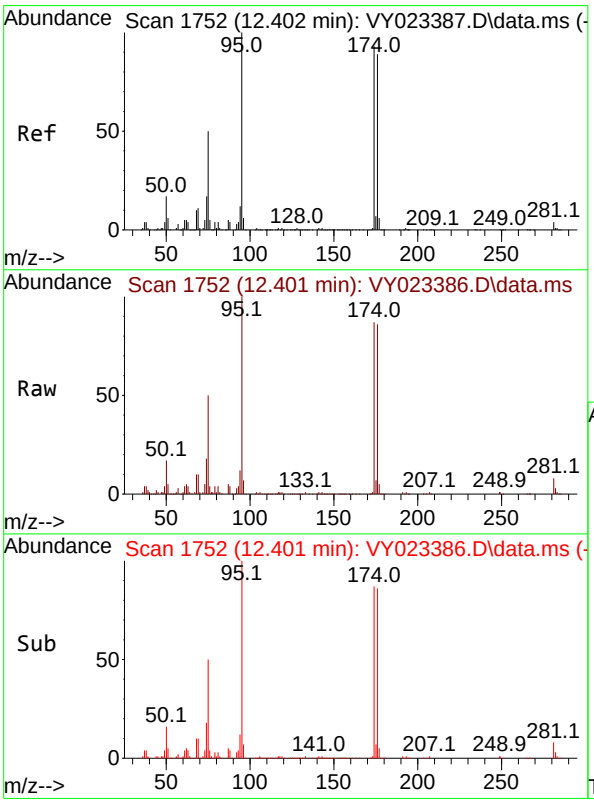
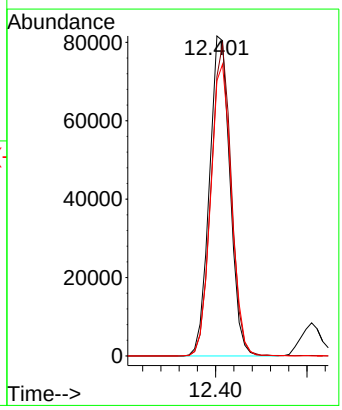
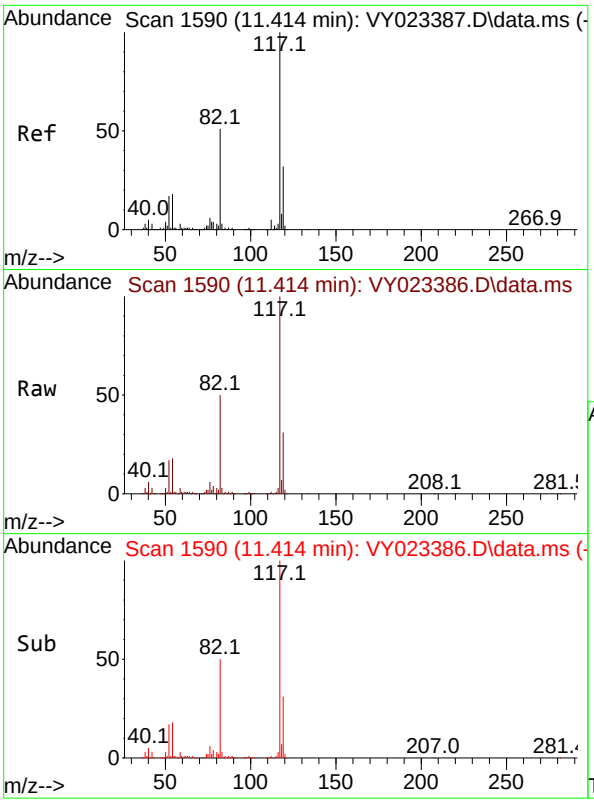


#62
4-Bromofluorobenzene
Concen: 20.680 ug/l
RT: 12.401 min Scan# 1752
Delta R.T. -0.000 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion: 95 Resp: 127216

Ion	Ratio	Lower	Upper
95	100		
174	95.8	0.0	192.8
176	92.7	0.0	187.6

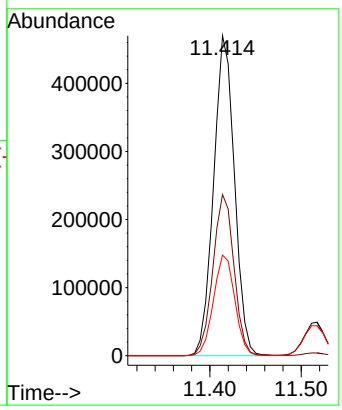




#63
Chlorobenzene-d5
Concen: 50.000 ug/l
RT: 11.414 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion:117 Resp: 74687

Ion	Ratio	Lower	Upper
117	100		
82	50.3	41.0	61.4
119	31.4	25.6	38.4



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC020

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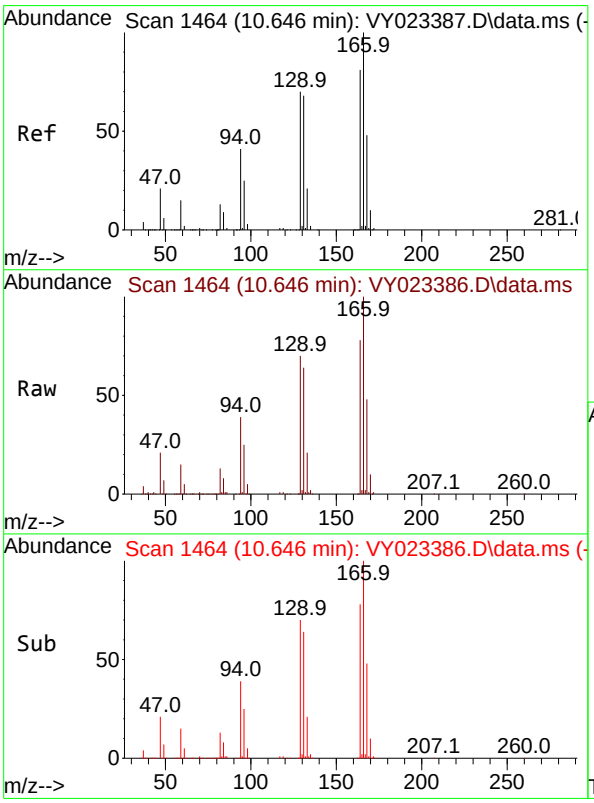
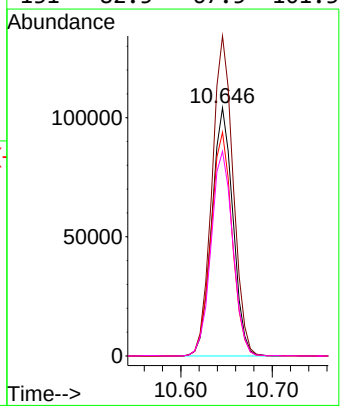
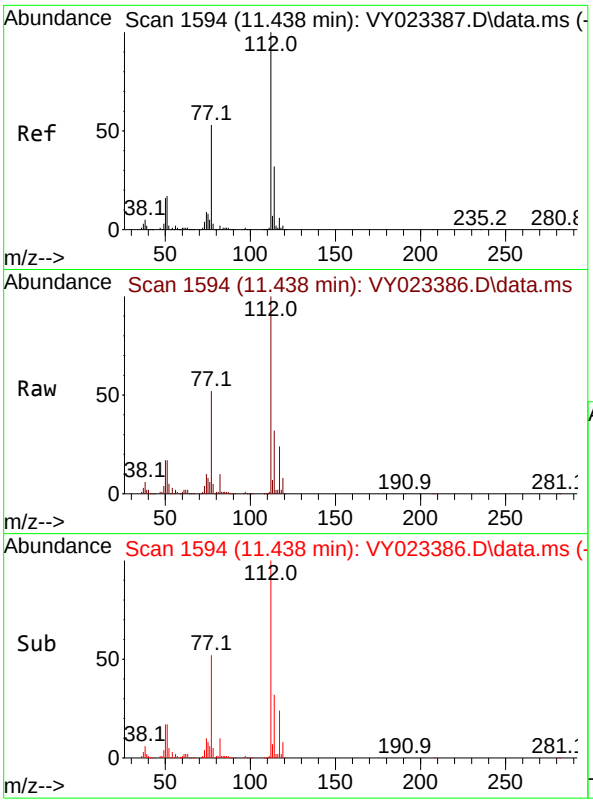


#64
Tetrachloroethene
Concen: 22.438 ug/l
RT: 10.646 min Scan# 1464
Delta R.T. -0.000 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion:164 Resp: 167648

Ion	Ratio	Lower	Upper
164	100		
166	128.9	99.4	149.0
129	90.1	69.4	104.2
131	82.5	67.5	101.3

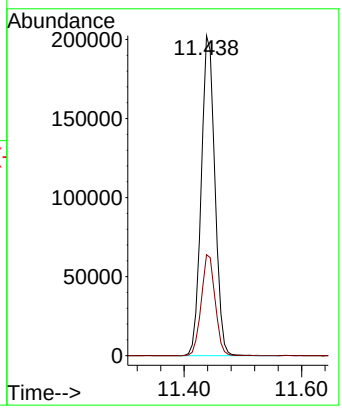




#65
Chlorobenzene
Concen: 20.109 ug/l
RT: 11.438 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion:112 Resp: 32636

Ion	Ratio	Lower	Upper
112	100		
114	31.6	25.6	38.4



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC020

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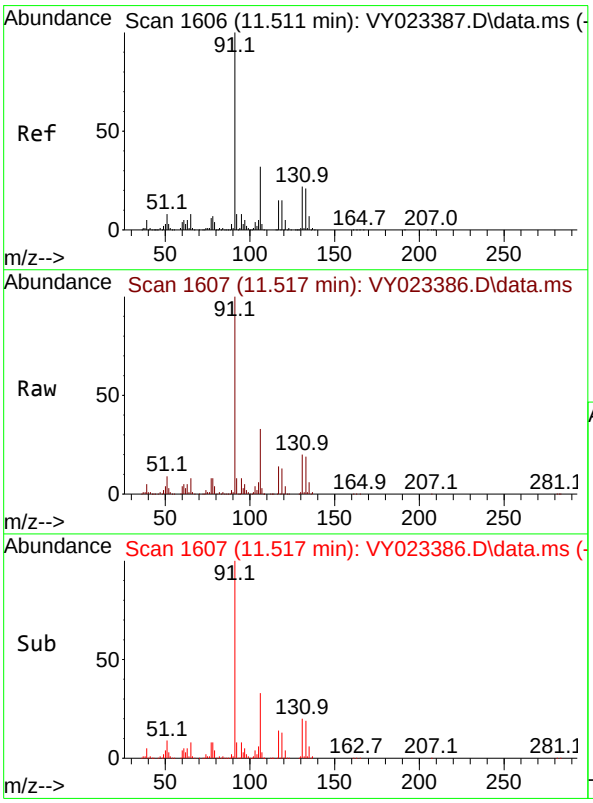
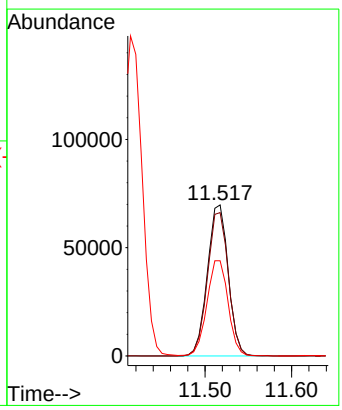
Supervised By :Mahesh Dadoda 10/10/2025

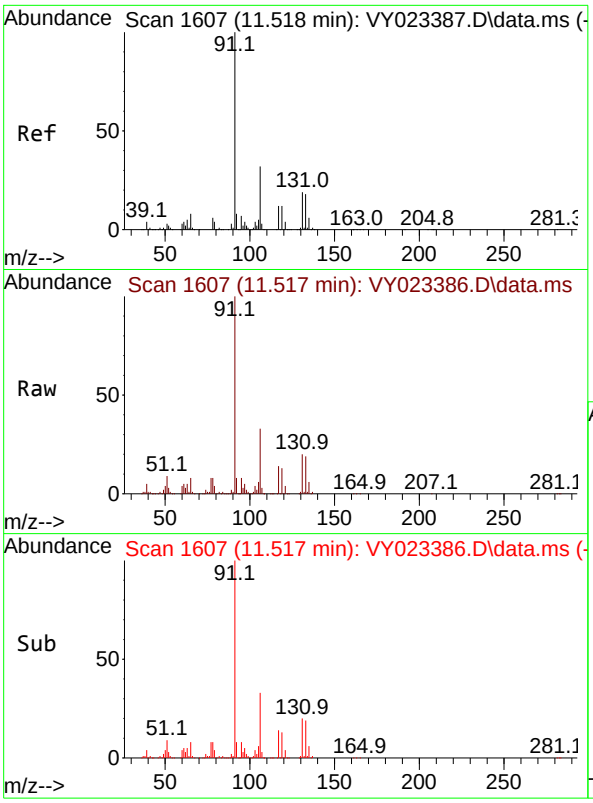


#66
1,1,1,2-Tetrachloroethane
Concen: 20.396 ug/l
RT: 11.517 min Scan# 1607
Delta R.T. 0.006 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion:131 Resp: 116412

Ion	Ratio	Lower	Upper
131	100		
133	95.9	48.4	145.2
119	64.4	32.4	97.2

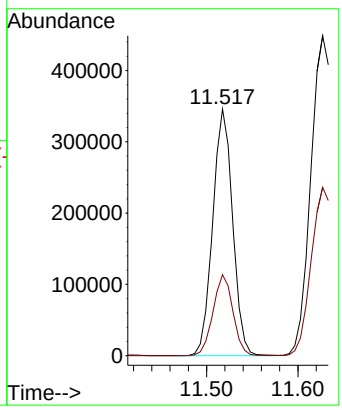




#67
Ethyl Benzene
Concen: 19.768 ug/l
RT: 11.517 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion: 91 Resp: 52360

Ion	Ratio	Lower	Upper
91	100		
106	32.8	25.8	38.8



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC020

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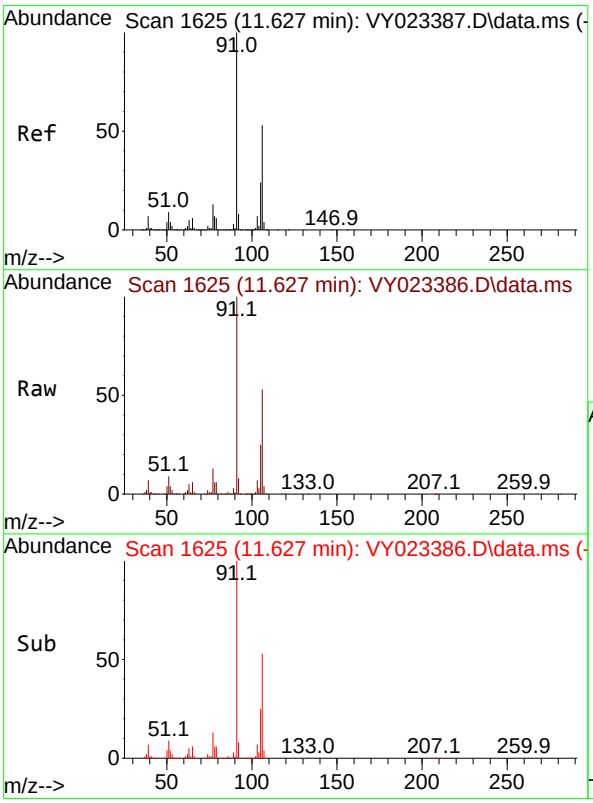
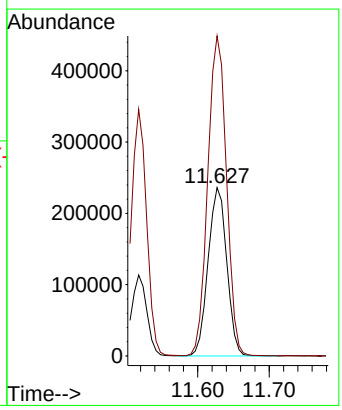
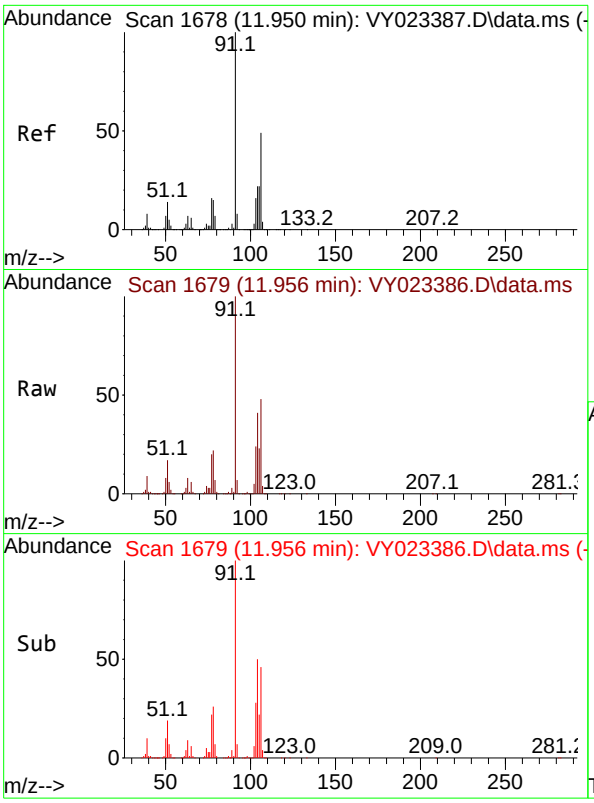


#68
m/p-Xylenes
Concen: 40.211 ug/l
RT: 11.627 min Scan# 1625
Delta R.T. -0.000 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion:106 Resp: 426913

Ion	Ratio	Lower	Upper
106	100		
91	190.8	152.6	229.0

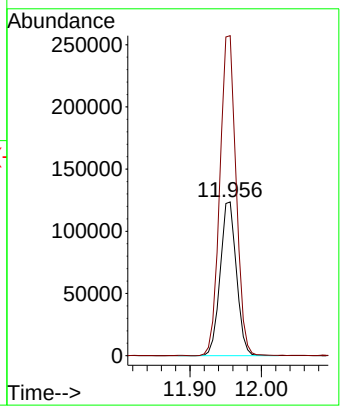




#69
o-Xylene
Concen: 19.843 ug/l
RT: 11.956 min Scan# 1
Delta R.T. 0.006 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion:106 Resp: 19502

Ion	Ratio	Lower	Upper
106	100		
91	208.5	101.4	304.1



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC020

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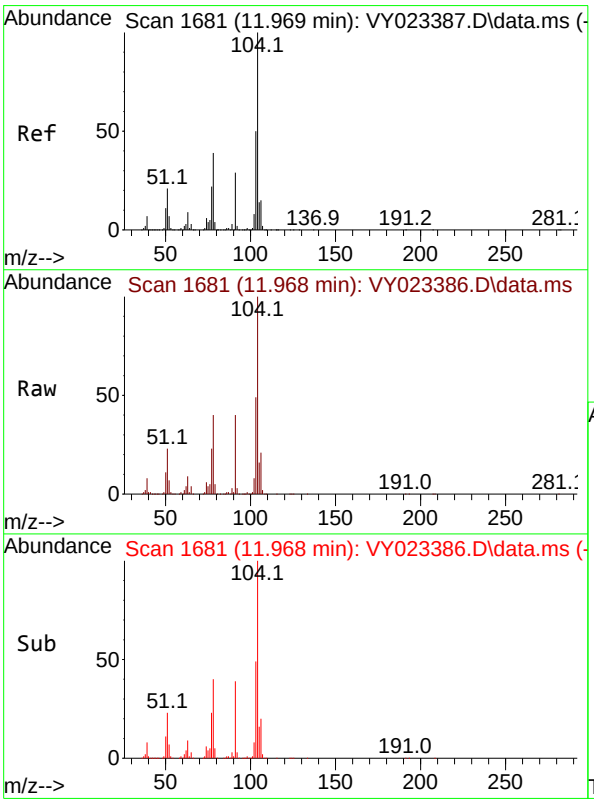
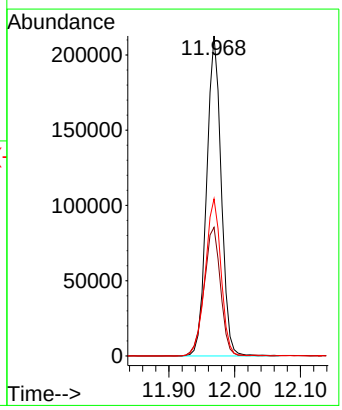
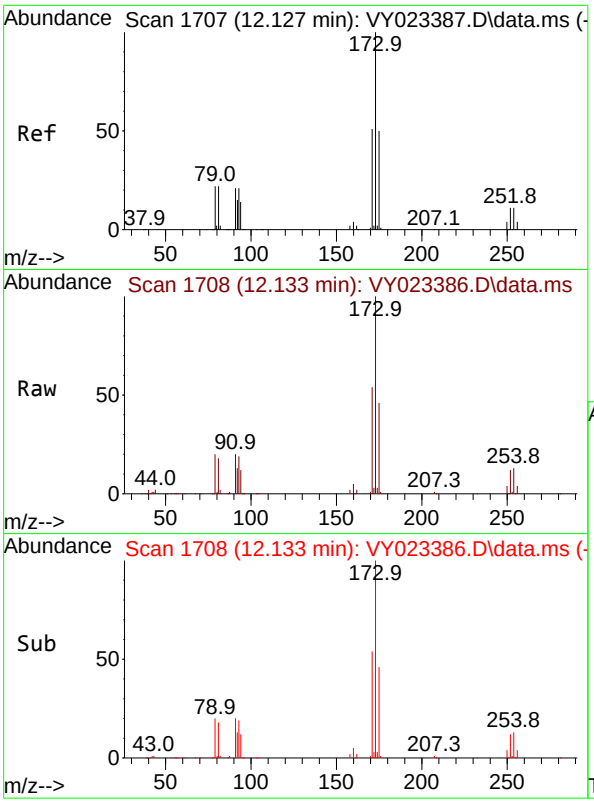


#70
Styrene
Concen: 20.208 ug/l
RT: 11.968 min Scan# 1681
Delta R.T. -0.000 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion:104 Resp: 327934

Ion	Ratio	Lower	Upper
104	100		
78	45.4	36.1	54.1
103	53.3	43.2	64.8

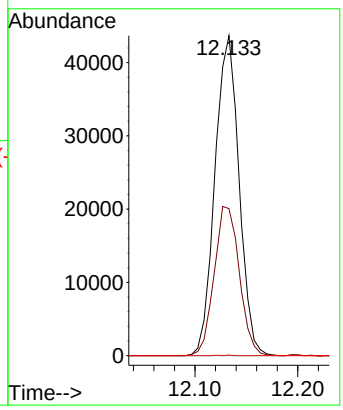




#71
Bromoform
Concen: 20.814 ug/l
RT: 12.133 min Scan# 1
Delta R.T. 0.006 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion:173 Resp: 7111

Ion	Ratio	Lower	Upper
173	100		
175	48.7	24.8	74.3
254	0.0	0.1	0.1



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC020

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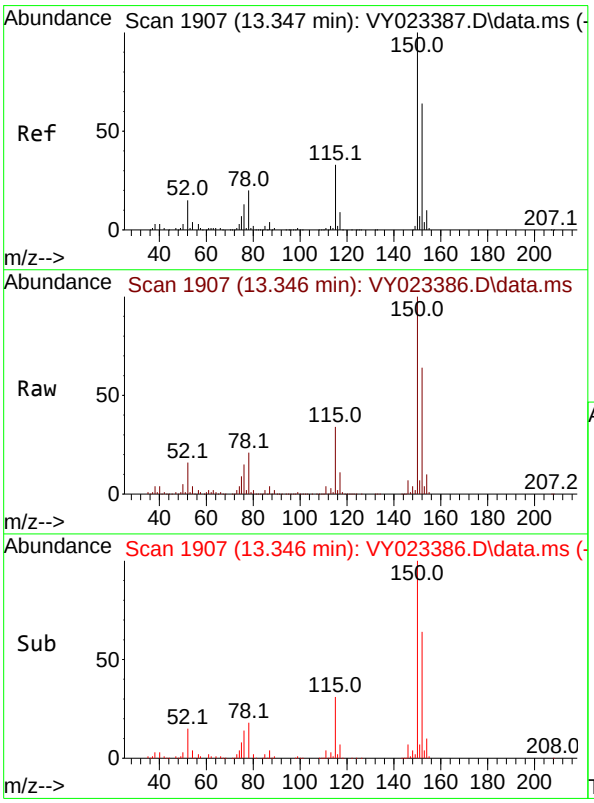
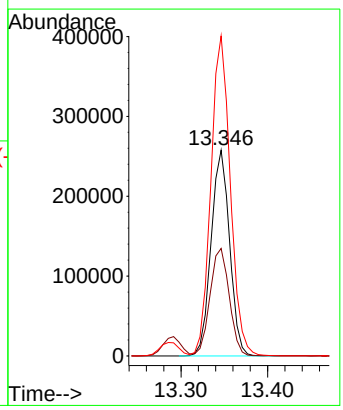
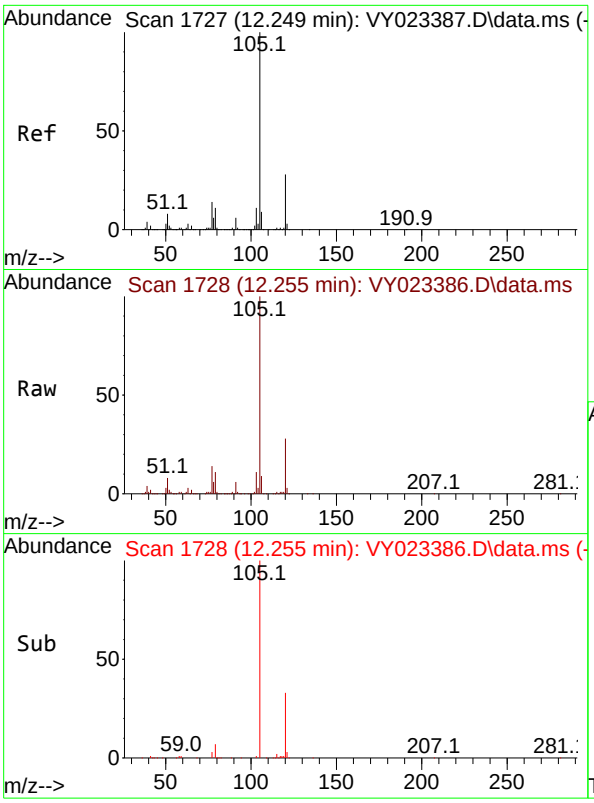


#72
1,4-Dichlorobenzene-d4
Concen: 50.000 ug/l
RT: 13.346 min Scan# 1907
Delta R.T. -0.000 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion:152 Resp: 382604

Ion	Ratio	Lower	Upper
152	100		
115	54.6	27.1	81.2
150	163.2	0.0	347.4

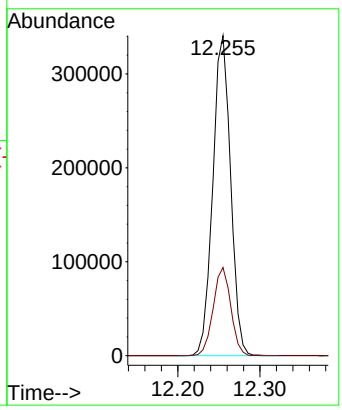




#73
Isopropylbenzene
Concen: 20.136 ug/l
RT: 12.255 min Scan# 1
Delta R.T. 0.006 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion:105 Resp: 51318

Ion	Ratio	Lower	Upper
105	100		
120	27.2	13.9	41.7



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC020

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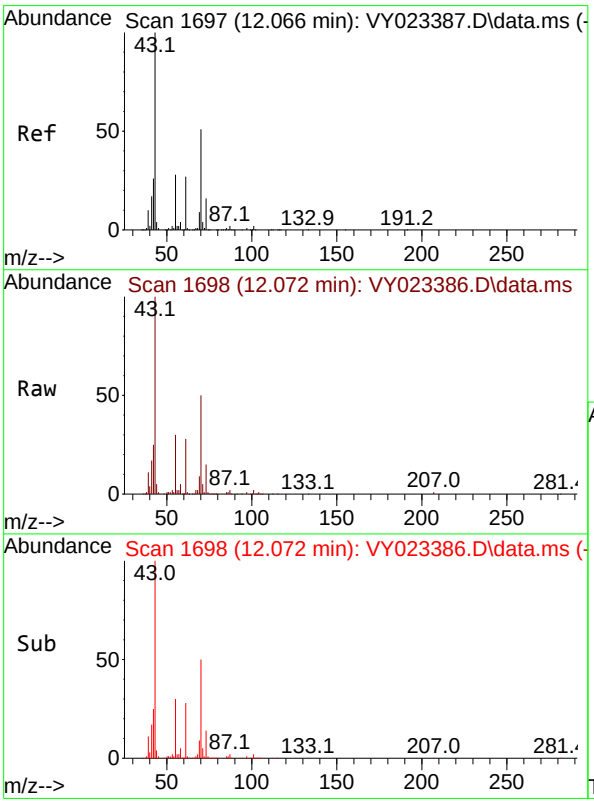
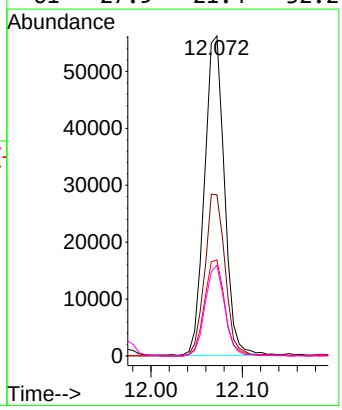
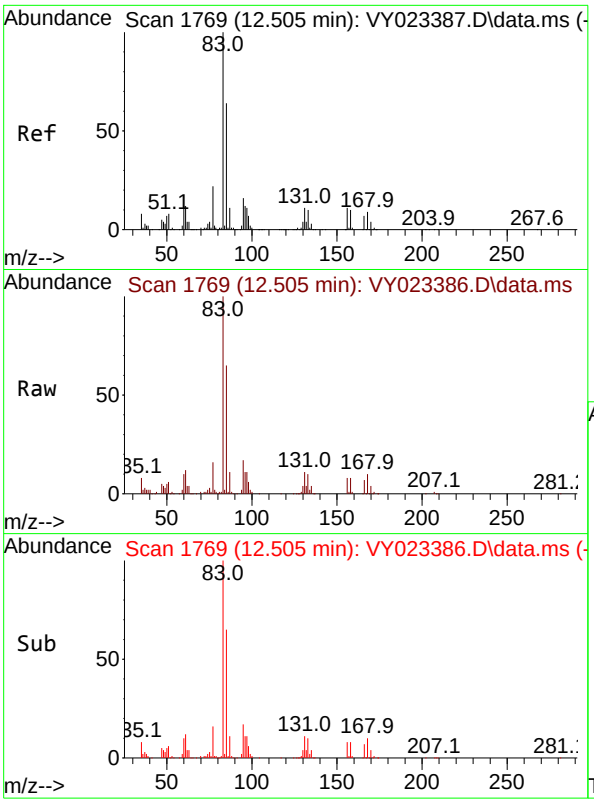


#74
N-amyl acetate
Concen: 17.860 ug/l
RT: 12.072 min Scan# 1698
Delta R.T. 0.006 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion: 43 Resp: 85063

Ion	Ratio	Lower	Upper
43	100		
70	51.8	41.1	61.7
55	30.6	23.0	34.6
61	27.9	21.4	32.2

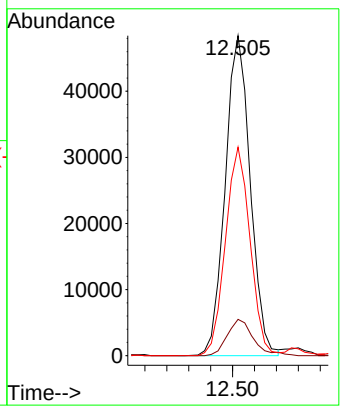




#75
1,1,2,2-Tetrachloroethane
Concen: 18.069 ug/l
RT: 12.505 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion: 83 Resp: 7682

Ion	Ratio	Lower	Upper
83	100		
131	11.8	5.9	17.6
85	64.1	31.8	95.3



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC020

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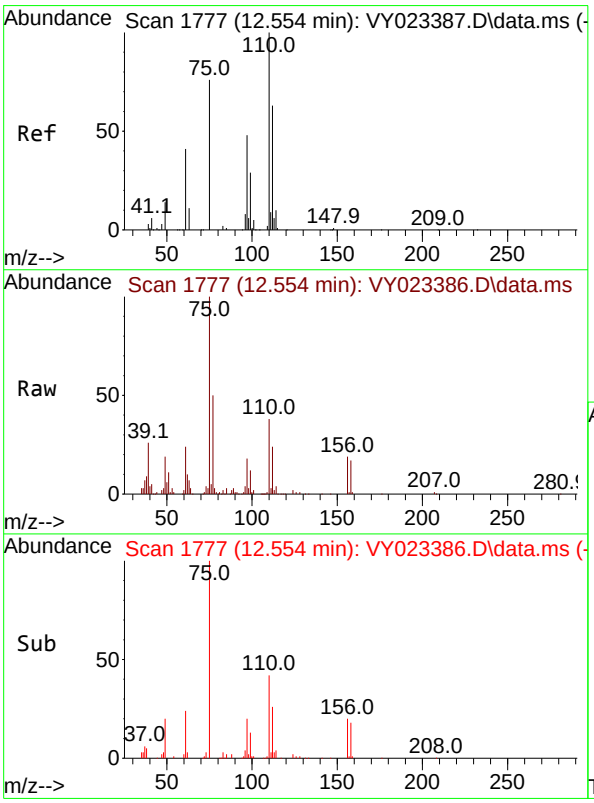
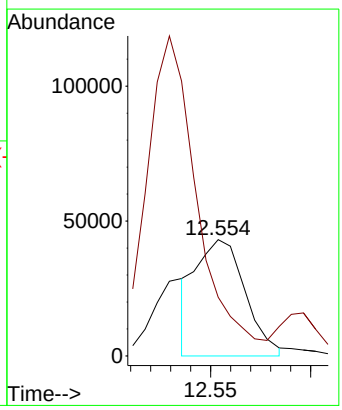
Supervised By :Mahesh Dadoda 10/10/2025

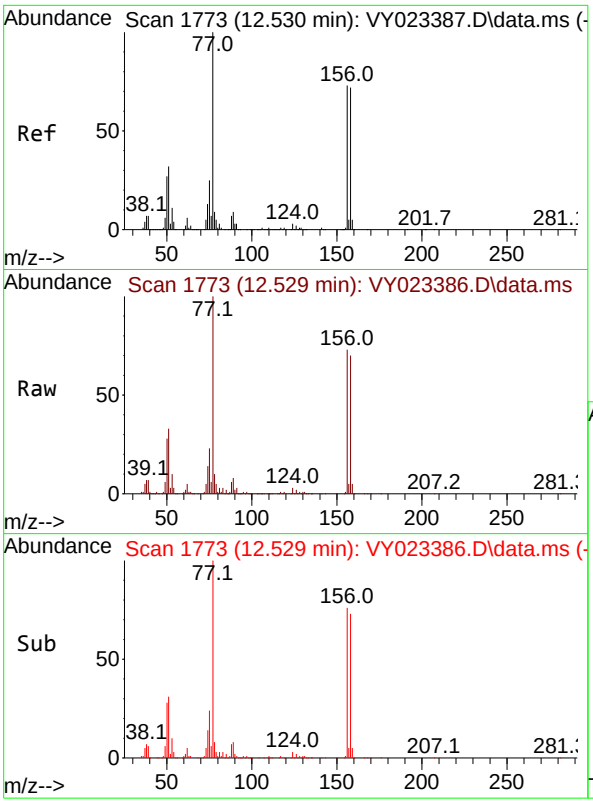


#76
1,2,3-Trichloropropane
Concen: 19.634 ug/l m
RT: 12.554 min Scan# 1777
Delta R.T. -0.000 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion: 75 Resp: 74100

Ion	Ratio	Lower	Upper
75	100		
77	0.0	0.0	0.0

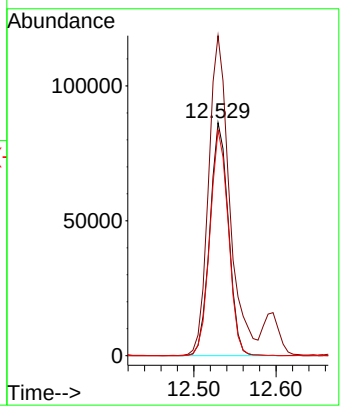




#77
Bromobenzene
Concen: 20.700 ug/l
RT: 12.529 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion:156 Resp: 13540

Ion	Ratio	Lower	Upper
156	100		
77	156.2	76.8	230.5
158	96.1	49.0	147.2



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC020

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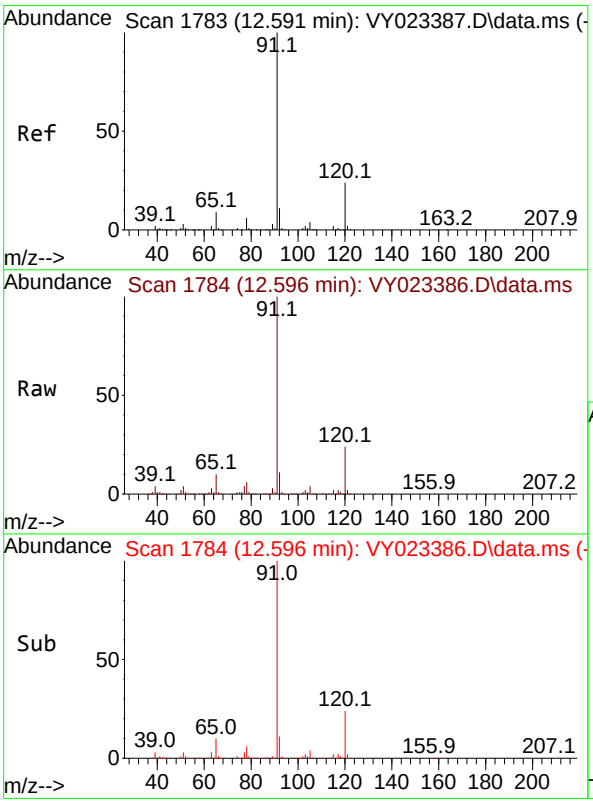
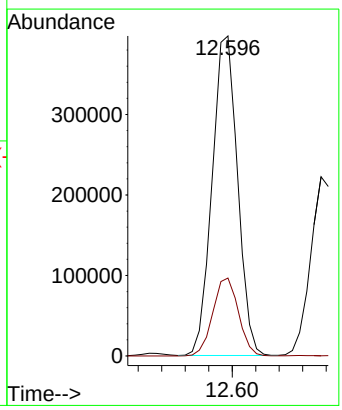
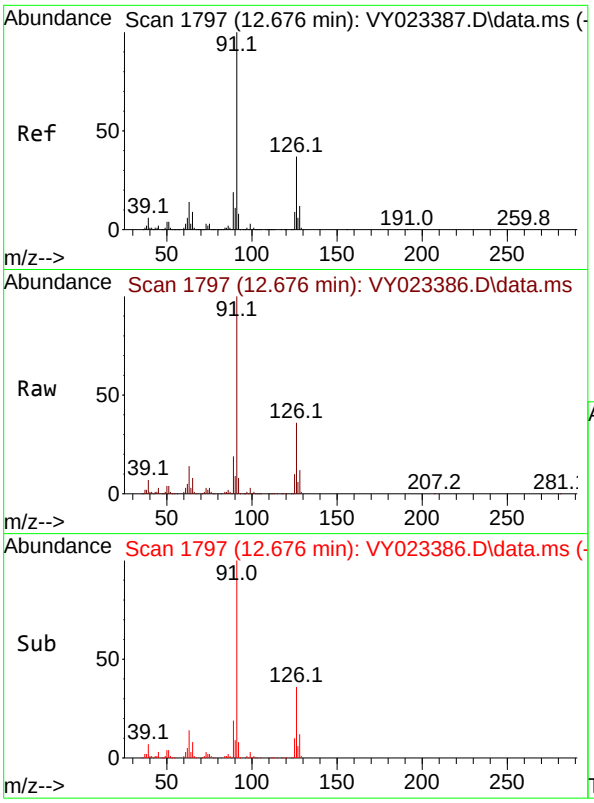


#78
n-propylbenzene
Concen: 19.945 ug/l
RT: 12.596 min Scan# 1784
Delta R.T. 0.006 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion: 91 Resp: 597829

Ion	Ratio	Lower	Upper
91	100		
120	24.6	12.3	36.8

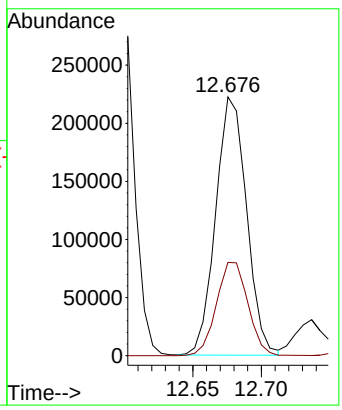




#79
2-Chlorotoluene
Concen: 20.179 ug/l
RT: 12.676 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion: 91 Resp: 34920

Ion	Ratio	Lower	Upper
91	100		
126	36.8	18.5	55.5



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC020

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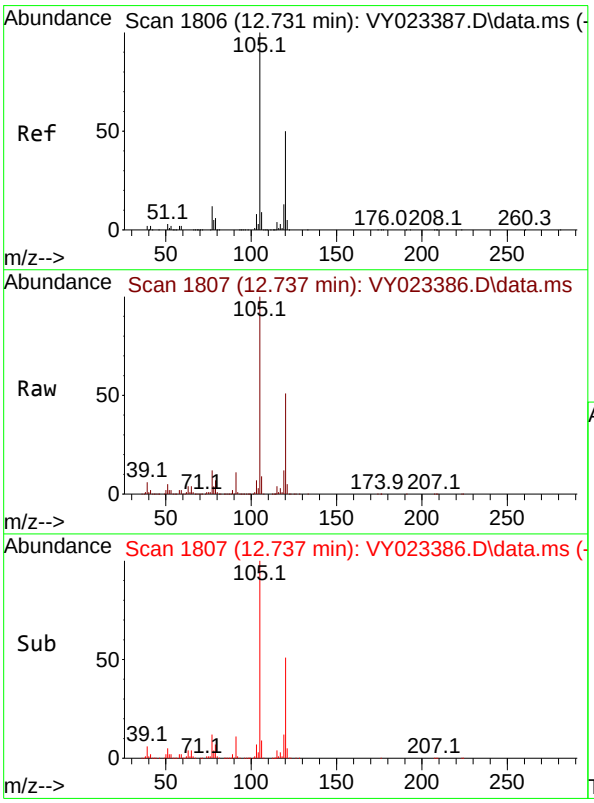
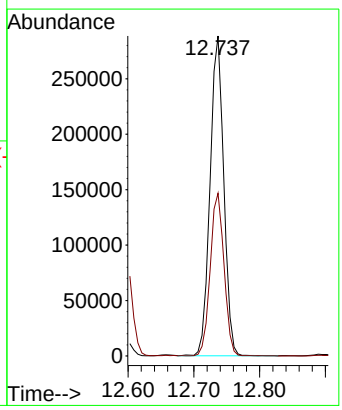
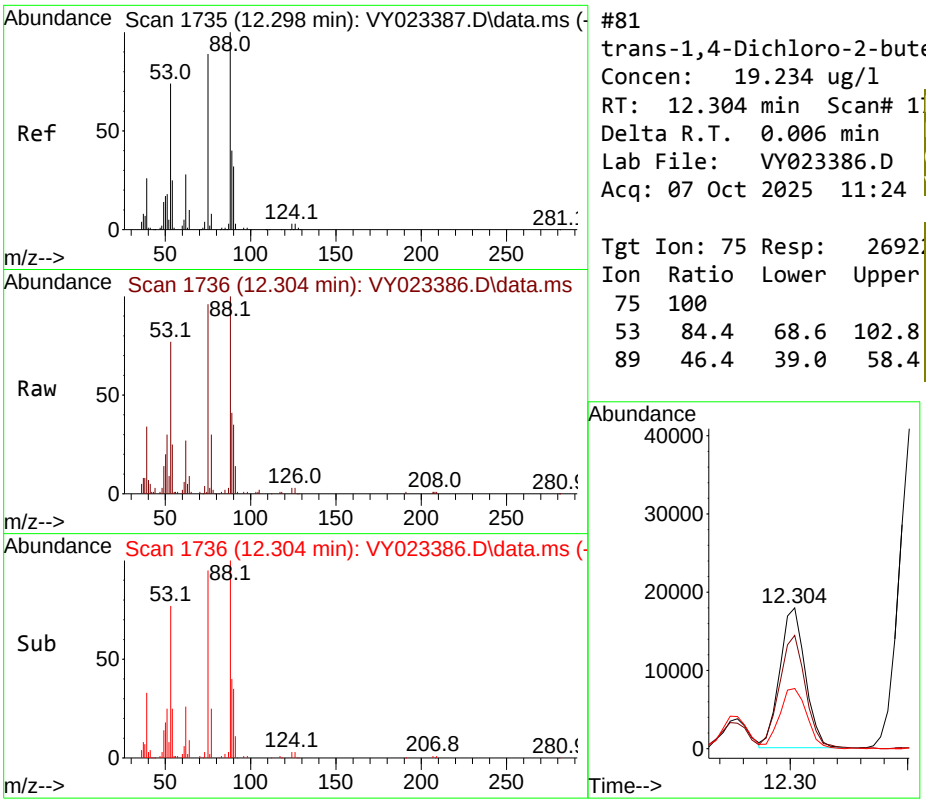


#80
1,3,5-Trimethylbenzene
Concen: 20.208 ug/l
RT: 12.737 min Scan# 1807
Delta R.T. 0.006 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion:105 Resp: 418684

Ion	Ratio	Lower	Upper
105	100		
120	51.1	25.4	76.4





#81
trans-1,4-Dichloro-2-butene
Concen: 19.234 ug/l
RT: 12.304 min Scan# 1
Delta R.T. 0.006 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion: 75 Resp: 2692

Ion	Ratio	Lower	Upper
75	100		
53	84.4	68.6	102.8
89	46.4	39.0	58.4

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC020

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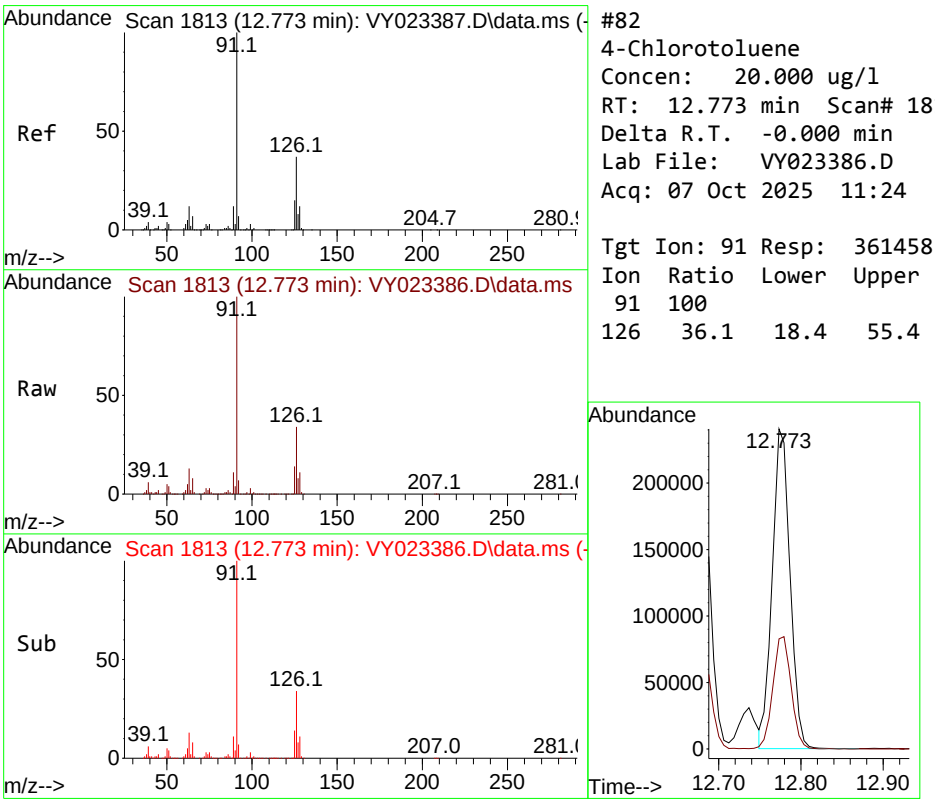
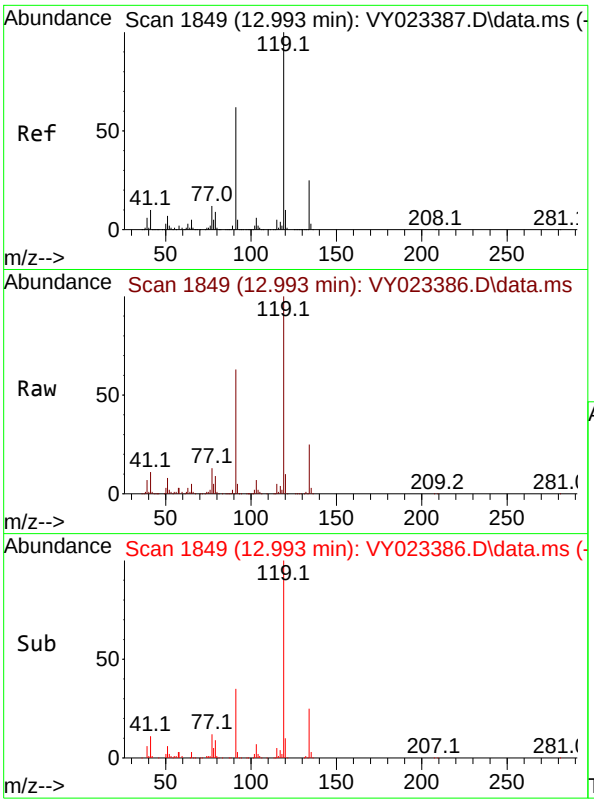


#82
4-Chlorotoluene
Concen: 20.000 ug/l
RT: 12.773 min Scan# 1813
Delta R.T. -0.000 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion: 91 Resp: 361458

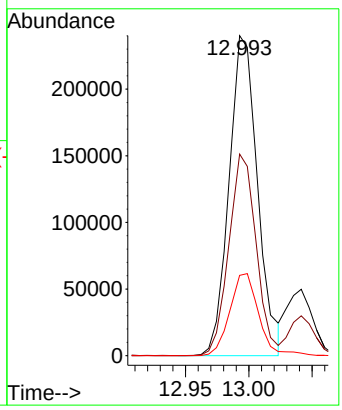
Ion	Ratio	Lower	Upper
91	100		
126	36.1	18.4	55.4



#83
tert-Butylbenzene
Concen: 19.983 ug/l
RT: 12.993 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion:119 Resp: 37727

Ion	Ratio	Lower	Upper
119	100		
91	60.4	29.9	89.8
134	26.1	12.9	38.7



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC020

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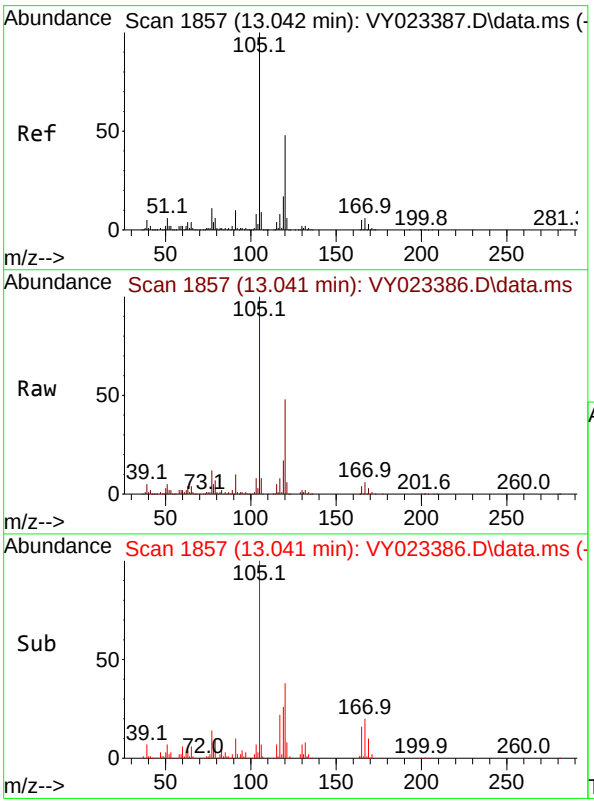
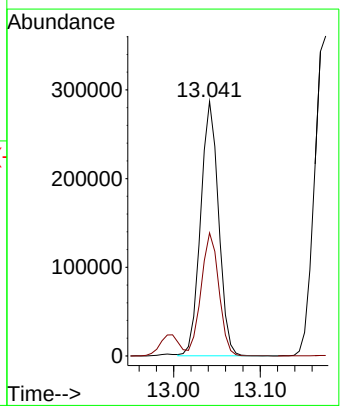
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

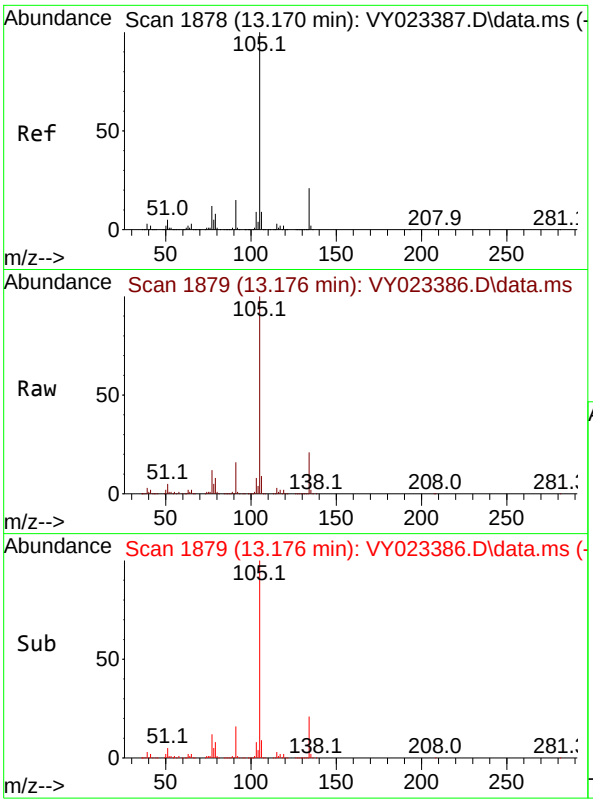


#84
1,2,4-Trimethylbenzene
Concen: 20.162 ug/l
RT: 13.041 min Scan# 1857
Delta R.T. -0.000 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion:105 Resp: 413292

Ion	Ratio	Lower	Upper
105	100		
120	47.6	23.8	71.2

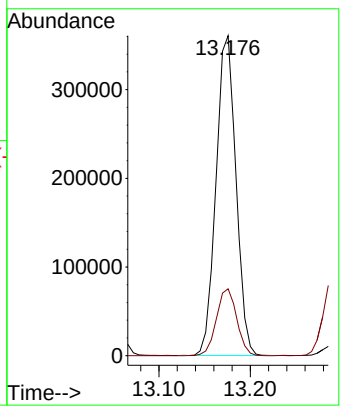




#85
sec-Butylbenzene
Concen: 19.990 ug/l
RT: 13.176 min Scan# 1
Delta R.T. 0.006 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion:105 Resp: 54658

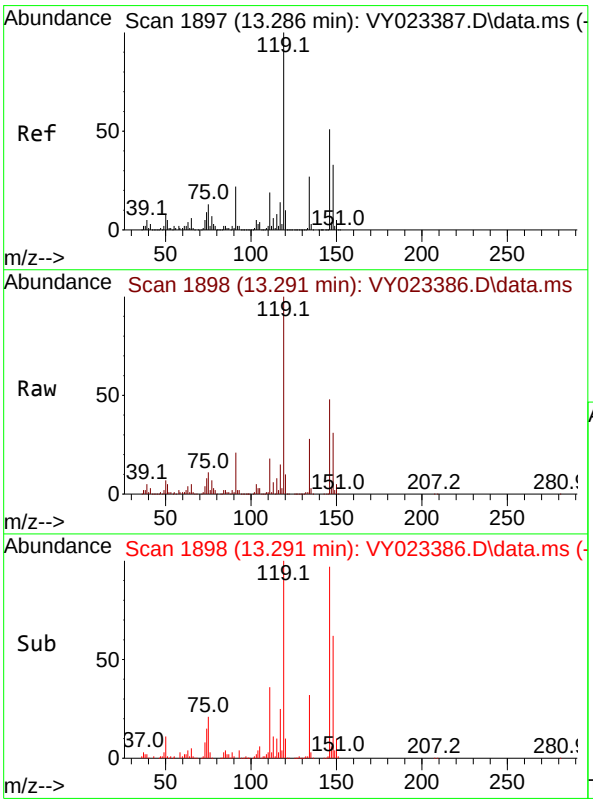
Ion	Ratio	Lower	Upper
105	100		
134	21.3	10.7	32.1



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC020

Manual Integrations
APPROVED

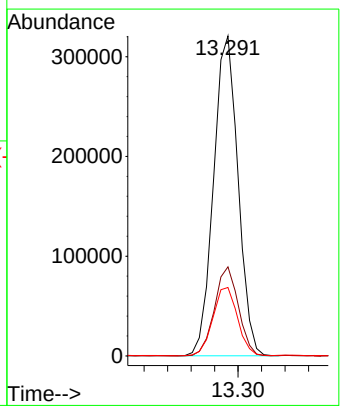
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

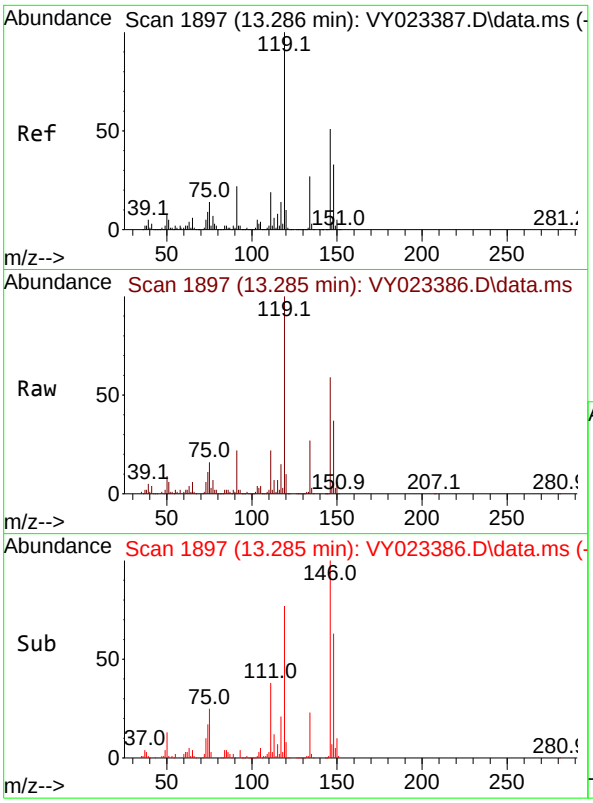


#86
p-Isopropyltoluene
Concen: 20.081 ug/l
RT: 13.291 min Scan# 1898
Delta R.T. 0.006 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion:119 Resp: 464005

Ion	Ratio	Lower	Upper
119	100		
134	27.2	13.6	40.7
91	21.6	10.9	32.9

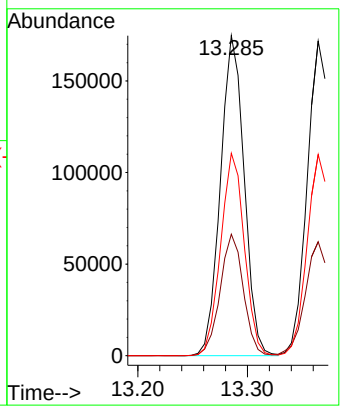




#87
1,3-Dichlorobenzene
Concen: 20.347 ug/l
RT: 13.285 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion:146 Resp: 26290

Ion	Ratio	Lower	Upper
146	100		
111	37.2	18.7	56.1
148	63.1	31.9	95.9



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC020

Manual Integrations
APPROVED

Reviewed By :Semsettin Yesilyurt 10/10/2025
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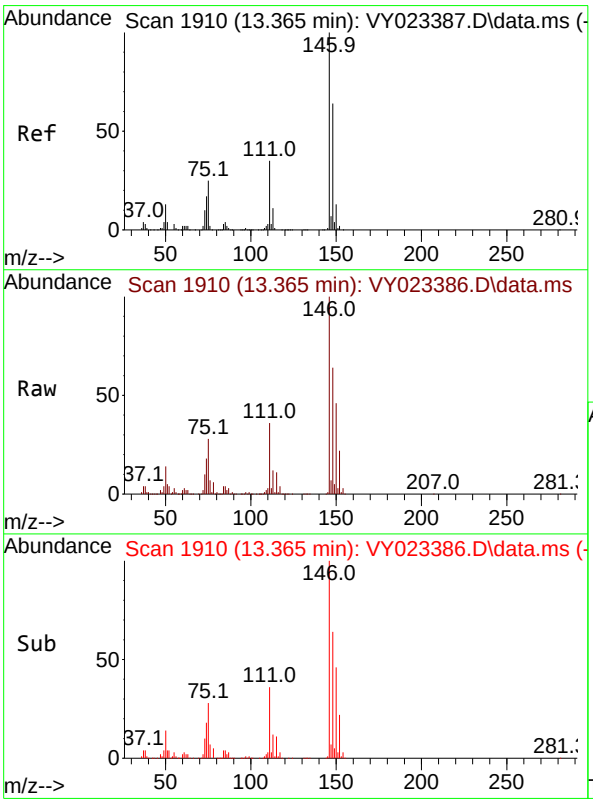
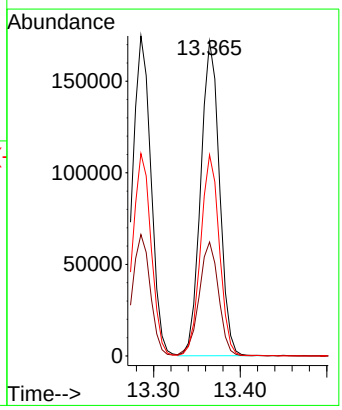
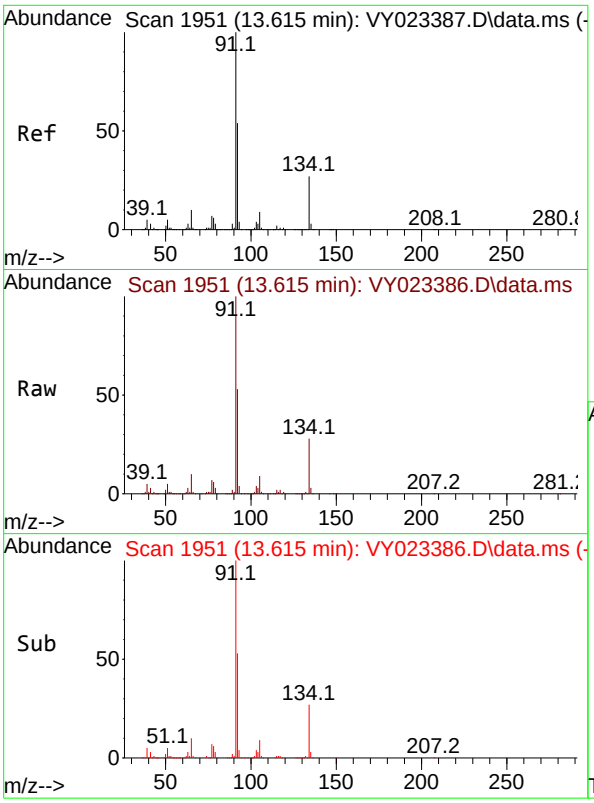


#88
1,4-Dichlorobenzene
Concen: 20.230 ug/l
RT: 13.365 min Scan# 1910
Delta R.T. -0.000 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion:146 Resp: 259217

Ion	Ratio	Lower	Upper
146	100		
111	37.3	18.0	54.0
148	63.6	31.9	95.7

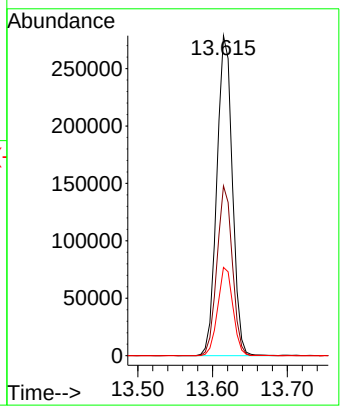




#89
n-Butylbenzene
Concen: 19.697 ug/l
RT: 13.615 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion: 91 Resp: 40189

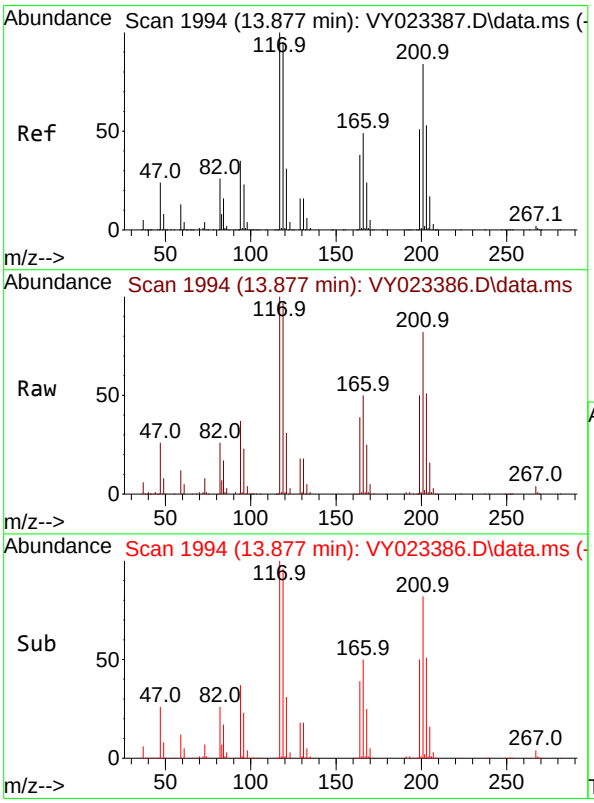
Ion	Ratio	Lower	Upper
91	100		
92	52.6	27.0	80.8
134	27.3	14.1	42.2



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC020

Manual Integrations APPROVED

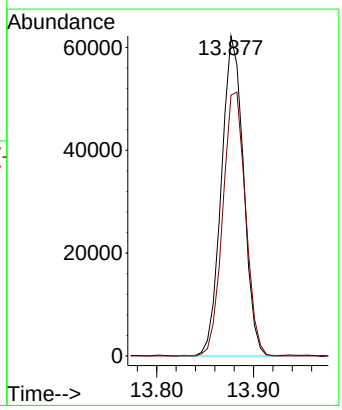
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

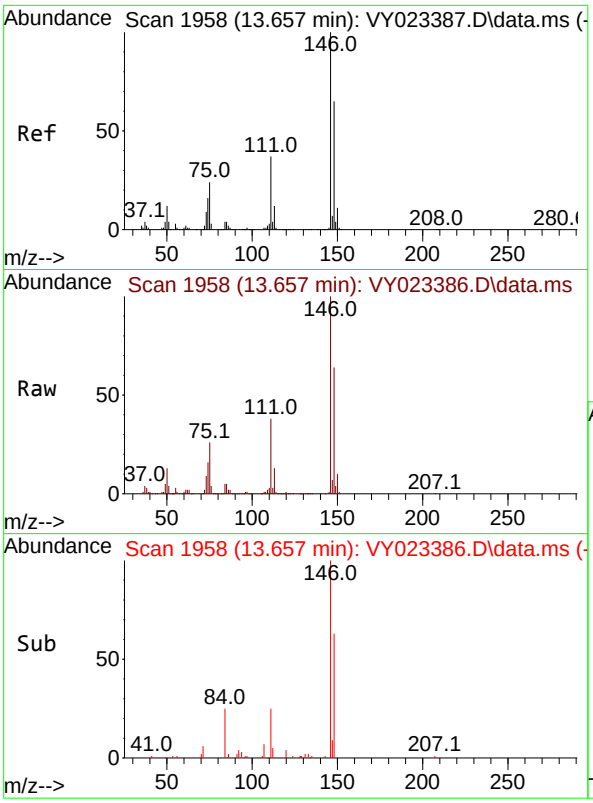


#90
Hexachloroethane
Concen: 19.730 ug/l
RT: 13.877 min Scan# 1994
Delta R.T. -0.000 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion:117 Resp: 98983

Ion	Ratio	Lower	Upper
117	100		
201	84.8	43.8	131.4

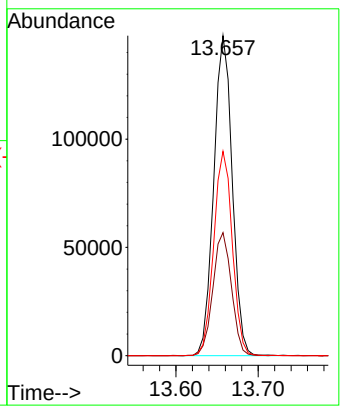




#91
1,2-Dichlorobenzene
Concen: 20.507 ug/l
RT: 13.657 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion:146 Resp: 23119

Ion	Ratio	Lower	Upper
146	100		
111	38.6	19.0	57.0
148	64.1	32.1	96.3



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC020

Manual Integrations
APPROVED

Reviewed By :Semsettin Yesilyurt 10/10/2025
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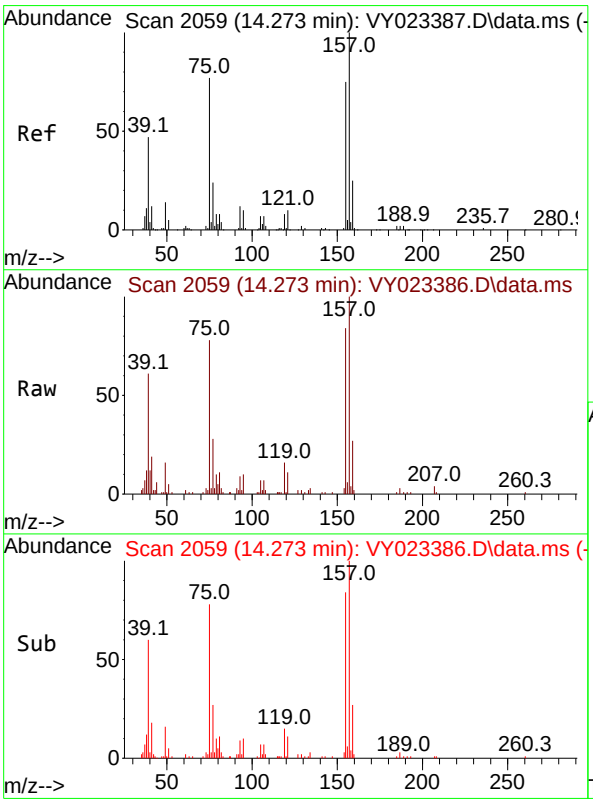
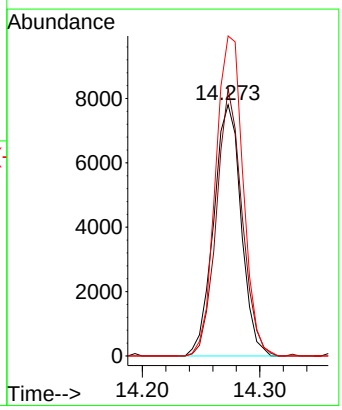
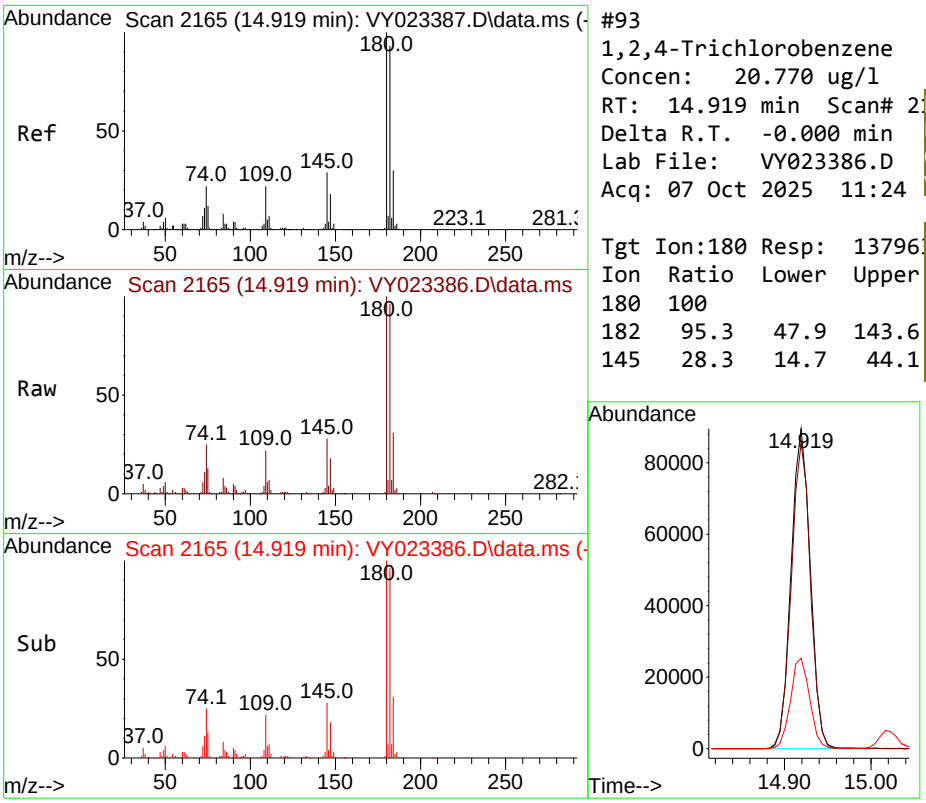


#92
1,2-Dibromo-3-Chloropropane
Concen: 18.802 ug/l
RT: 14.273 min Scan# 2059
Delta R.T. -0.000 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion: 75 Resp: 12668

Ion	Ratio	Lower	Upper
75	100		
155	99.1	50.0	150.0
157	127.9	63.8	191.5





#93
1,2,4-Trichlorobenzene
Concen: 20.770 ug/l
RT: 14.919 min Scan# 2
Delta R.T. -0.000 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

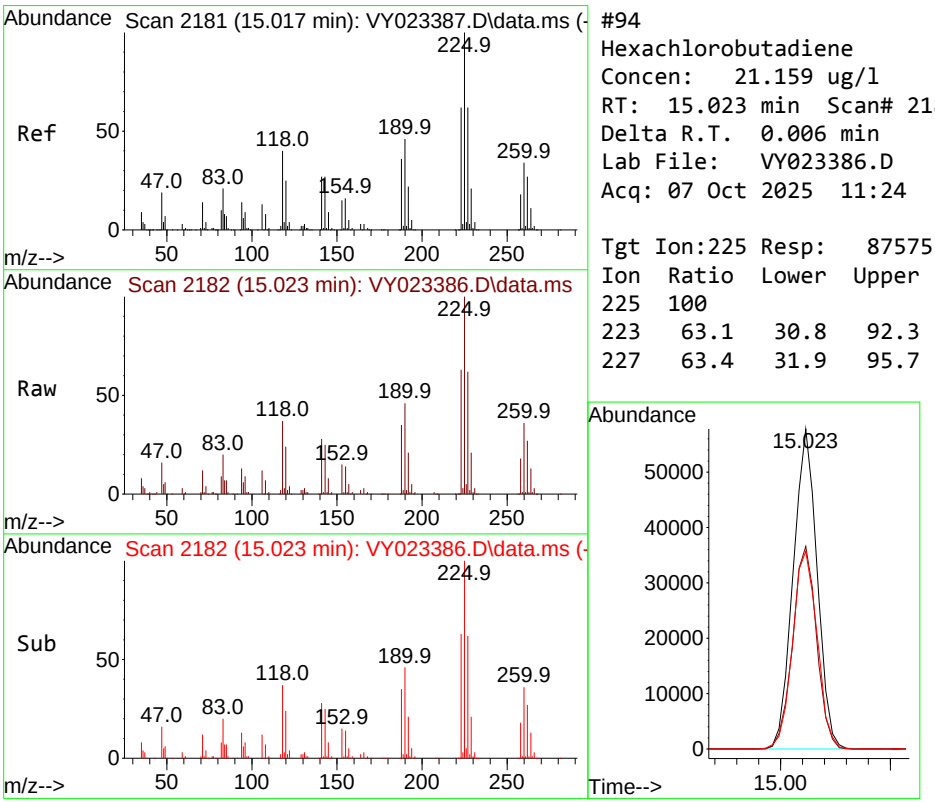
Tgt Ion:180 Resp: 13796

Ion	Ratio	Lower	Upper
180	100		
182	95.3	47.9	143.6
145	28.3	14.7	44.1

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC020

Manual Integrations APPROVED

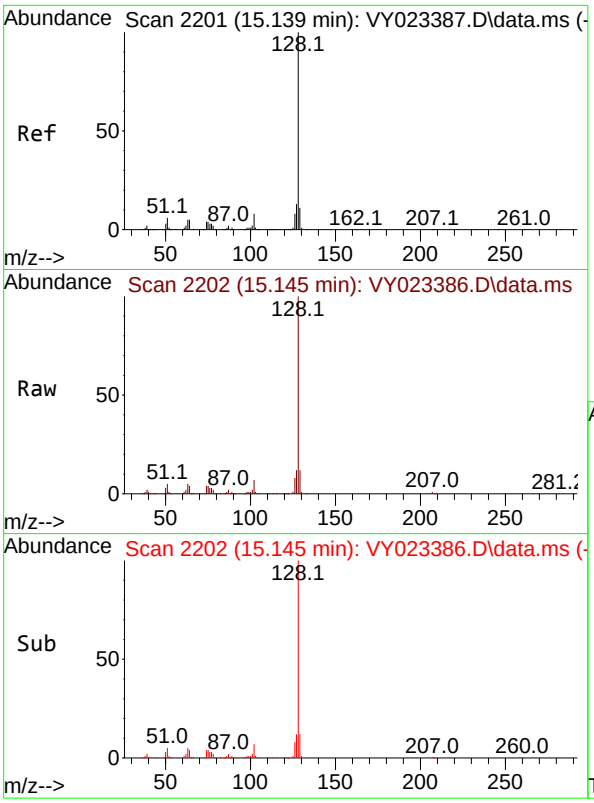
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025



#94
Hexachlorobutadiene
Concen: 21.159 ug/l
RT: 15.023 min Scan# 2182
Delta R.T. 0.006 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion:225 Resp: 87575

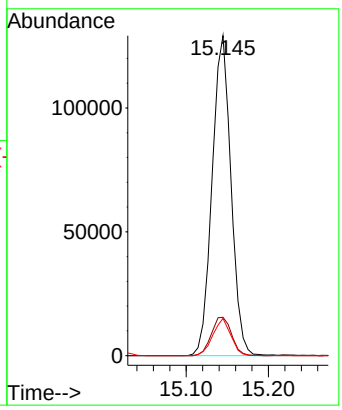
Ion	Ratio	Lower	Upper
225	100		
223	63.1	30.8	92.3
227	63.4	31.9	95.7



#95
Naphthalene
Concen: 19.467 ug/l
RT: 15.145 min Scan# 2
Delta R.T. 0.006 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion:128 Resp: 20601

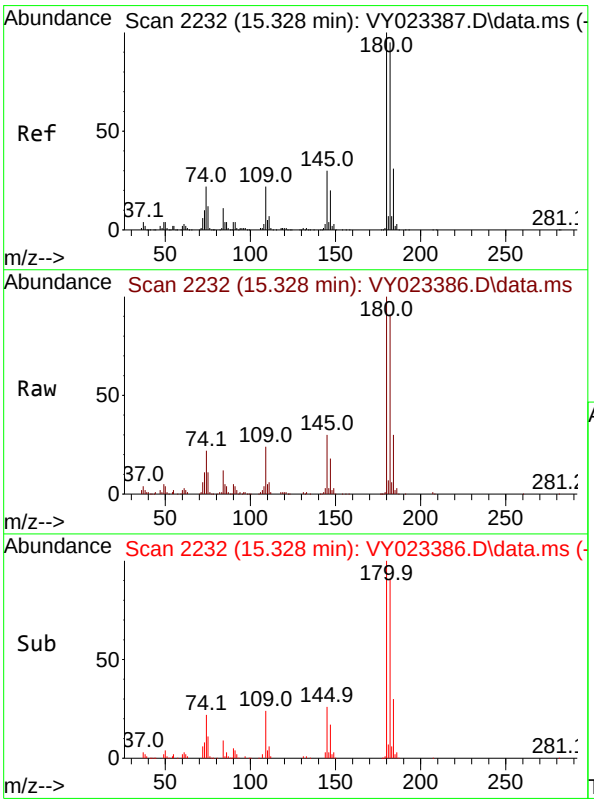
Ion	Ratio	Lower	Upper
128	100		
127	12.9	10.4	15.6
129	11.1	8.9	13.3



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC020

Manual Integrations
APPROVED

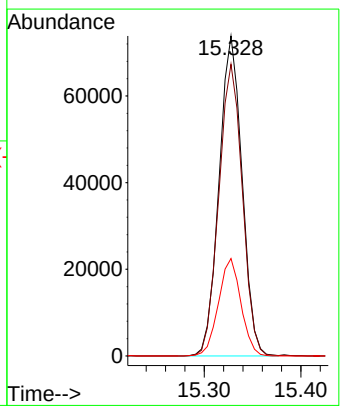
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025



#96
1,2,3-Trichlorobenzene
Concen: 21.113 ug/l
RT: 15.328 min Scan# 2232
Delta R.T. -0.000 min
Lab File: VY023386.D
Acq: 07 Oct 2025 11:24

Tgt Ion:180 Resp: 121656

Ion	Ratio	Lower	Upper
180	100		
182	93.3	47.9	143.8
145	29.8	15.3	45.9



Quantitation Report (QT Reviewed)

Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY100725\
Data File : VY023387.D
Acq On : 07 Oct 2025 11:47
Operator : SY/MD
Sample : VSTDICCC050
Misc : 5.00g/5.0mL/MSVOA_Y/SOIL
ALS Vial : 6 Sample Multiplier: 1

Quant Time: Oct 08 04:43:02 2025
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260
QLast Update : Wed Oct 08 04:39:16 2025
Response via : Initial Calibration

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICCC050

Manual Integrations APPROVED
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Pentafluorobenzene	7.707	168	590340	50.000	ug/l	0.00
34) 1,4-Difluorobenzene	8.616	114	858767	50.000	ug/l	0.00
63) Chlorobenzene-d5	11.414	117	749869	50.000	ug/l	0.00
72) 1,4-Dichlorobenzene-d4	13.347	152	392169	50.000	ug/l	0.00
System Monitoring Compounds						
33) 1,2-Dichloroethane-d4	8.061	65	231295	45.240	ug/l	0.00
Spiked Amount 50.000	Range 50 - 163		Recovery = 90.480%			
35) Dibromofluoromethane	7.634	113	256331	49.185	ug/l	0.00
Spiked Amount 50.000	Range 54 - 147		Recovery = 98.360%			
50) Toluene-d8	10.103	98	969649	49.334	ug/l	0.00
Spiked Amount 50.000	Range 58 - 134		Recovery = 98.660%			
62) 4-Bromofluorobenzene	12.402	95	313426	50.546	ug/l	0.00
Spiked Amount 50.000	Range 30 - 143		Recovery = 101.100%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.867	85	189467	40.745	ug/l	100
3) Chloromethane	2.068	50	265142	40.113	ug/l	100
4) Vinyl Chloride	2.202	62	352993	42.293	ug/l	100
5) Bromomethane	2.592	94	277005	40.458	ug/l	100
6) Chloroethane	2.733	64	244551	43.157	ug/l	100
7) Trichlorofluoromethane	3.056	101	496981	46.354	ug/l	100
8) Diethyl Ether	3.452	74	126634	45.158	ug/l	100
9) 1,1,2-Trichlorotrifluo...	3.812	101	258100	45.039	ug/l	100
10) Methyl Iodide	4.001	142	317731	47.979	ug/l	100
11) Tert butyl alcohol	4.860	59	73642	244.793	ug/l	100
12) 1,1-Dichloroethene	3.787	96	252190	45.738	ug/l	100
13) Acrolein	3.647	56	123642	242.575	ug/l	100
14) Allyl chloride	4.379	41	310569	44.989	ug/l	100
15) Acrylonitrile	5.055	53	240668	219.075	ug/l	100
16) Acetone	3.866	43	247122	214.955	ug/l	100
17) Carbon Disulfide	4.104	76	722982	42.028	ug/l	100
18) Methyl Acetate	4.385	43	144816	49.563	ug/l	100
19) Methyl tert-butyl Ether	5.116	73	601934	46.626	ug/l	100
20) Methylene Chloride	4.616	84	270612	43.409	ug/l	100
21) trans-1,2-Dichloroethene	5.110	96	277516	45.256	ug/l	100
22) Diisopropyl ether	6.019	45	686481	44.844	ug/l	100
23) Vinyl Acetate	5.958	43	1843784	219.119	ug/l	100
24) 1,1-Dichloroethane	5.915	63	448267	44.423	ug/l	100
25) 2-Butanone	6.890	43	310237	218.327	ug/l	100
26) 2,2-Dichloropropane	6.884	77	416391	46.440	ug/l	100
27) cis-1,2-Dichloroethene	6.890	96	320028	46.010	ug/l	100
28) Bromochloromethane	7.244	49	157414	40.211	ug/l	100
29) Tetrahydrofuran	7.262	42	187787	222.653	ug/l	100
30) Chloroform	7.421	83	493098	45.316	ug/l	100
31) Cyclohexane	7.701	56	379644	42.602	ug/l	100
32) 1,1,1-Trichloroethane	7.616	97	452713	46.347	ug/l	100
36) 1,1-Dichloropropene	7.835	75	341353	46.424	ug/l	100
37) Ethyl Acetate	6.982	43	129053	44.394	ug/l	100
38) Carbon Tetrachloride	7.817	117	413187	48.374	ug/l	100
39) Methylcyclohexane	9.109	83	452959	48.113	ug/l	100
40) Benzene	8.079	78	1080883	47.154	ug/l	100

Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY100725\
Data File : VY023387.D
Acq On : 07 Oct 2025 11:47
Operator : SY/MD
Sample : VSTDICCC050
Misc : 5.00g/5.0mL/MSVOA_Y/SOIL
ALS Vial : 6 Sample Multiplier: 1

Quant Time: Oct 08 04:43:02 2025
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260
QLast Update : Wed Oct 08 04:39:16 2025
Response via : Initial Calibration

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICCC050

Manual Integrations APPROVED

Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

Compound	R.T.	QIon	Response	Conc	Units		Dev(Min)
41) Methacrylonitrile	7.220	41	68542	45.399	ug/l		100
42) 1,2-Dichloroethane	8.152	62	270387	46.350	ug/l		100
43) Isopropyl Acetate	8.195	43	259041	45.811	ug/l		100
44) Trichloroethene	8.866	130	315104	48.982	ug/l		100
45) 1,2-Dichloropropane	9.140	63	234978	45.555	ug/l		100
46) Dibromomethane	9.231	93	148914	47.198	ug/l		100
47) Bromodichloromethane	9.420	83	377084	47.482	ug/l		100
48) Methyl methacrylate	9.219	41	126732	48.027	ug/l		100
49) 1,4-Dioxane	9.225	88	34053	1042.312	ug/l		100
51) 4-Methyl-2-Pentanone	9.993	43	682879	235.772	ug/l		100
52) Toluene	10.170	92	710404	48.824	ug/l		100
53) t-1,3-Dichloropropene	10.390	75	330392	48.438	ug/l		100
54) cis-1,3-Dichloropropene	9.853	75	390619	47.910	ug/l		100
55) 1,1,2-Trichloroethane	10.573	97	198478	47.296	ug/l		100
56) Ethyl methacrylate	10.438	69	239407	49.535	ug/l		100
57) 1,3-Dichloropropane	10.713	76	321276	47.301	ug/l		100
58) 2-Chloroethyl Vinyl ether	9.707	63	553816	261.921	ug/l		100
59) 2-Hexanone	10.756	43	479606	239.162	ug/l		100
60) Dibromochloromethane	10.908	129	281047	49.103	ug/l		100
61) 1,2-Dibromoethane	11.012	107	191356	48.468	ug/l		100
64) Tetrachloroethene	10.646	164	392056	52.264	ug/l		100
65) Chlorobenzene	11.438	112	789650	48.460	ug/l		100
66) 1,1,1,2-Tetrachloroethane	11.511	131	279583	48.788	ug/l		100
67) Ethyl Benzene	11.518	91	1332350	50.099	ug/l		100
68) m/p-Xylenes	11.627	106	1077583	101.092	ug/l		100
69) o-Xylene	11.950	106	502722	50.946	ug/l		100
70) Styrene	11.969	104	831908	51.059	ug/l		100
71) Bromoform	12.127	173	172315	50.229	ug/l	#	100
73) Isopropylbenzene	12.249	105	1301009	49.803	ug/l		100
74) N-amyl acetate	12.066	43	227684	46.640	ug/l		100
75) 1,1,2,2-Tetrachloroethane	12.505	83	195565	44.878	ug/l		100
76) 1,2,3-Trichloropropane	12.554	75	169814m	43.898	ug/l		
77) Bromobenzene	12.530	156	331331	49.419	ug/l		100
78) n-propylbenzene	12.591	91	1522965	49.572	ug/l		100
79) 2-Chlorotoluene	12.676	91	873335	49.235	ug/l		100
80) 1,3,5-Trimethylbenzene	12.731	105	1061112	49.966	ug/l		100
81) trans-1,4-Dichloro-2-b...	12.298	75	66299	46.212	ug/l		100
82) 4-Chlorotoluene	12.773	91	892764	48.192	ug/l		100
83) tert-Butylbenzene	12.993	119	988936	51.104	ug/l		100
84) 1,2,4-Trimethylbenzene	13.042	105	1061159	50.505	ug/l		100
85) sec-Butylbenzene	13.170	105	1405003	50.133	ug/l		100
86) p-Isopropyltoluene	13.286	119	1210644	51.115	ug/l		100
87) 1,3-Dichlorobenzene	13.286	146	649899	49.072	ug/l		100
88) 1,4-Dichlorobenzene	13.365	146	636694	48.476	ug/l		100
89) n-Butylbenzene	13.615	91	1051949	50.299	ug/l		100
90) Hexachloroethane	13.877	117	245108	47.664	ug/l		100
91) 1,2-Dichlorobenzene	13.657	146	567114	49.075	ug/l		100
92) 1,2-Dibromo-3-Chloropr...	14.273	75	32585	47.184	ug/l		100
93) 1,2,4-Trichlorobenzene	14.919	180	359833	52.852	ug/l		100
94) Hexachlorobutadiene	15.017	225	226316	53.346	ug/l		100
95) Naphthalene	15.139	128	575044	53.012	ug/l		100
96) 1,2,3-Trichlorobenzene	15.328	180	310831	52.628	ug/l		100

ICAL Form

Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY100725\
Data File : VY023387.D
Acq On : 07 Oct 2025 11:47
Operator : SY/MD
Sample : VSTDICCC050
Misc : 5.00g/5.0mL/MSVOA_Y/SOIL
ALS Vial : 6 Sample Multiplier: 1

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICCC050

Manual Integrations APPROVED

Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

Quant Time: Oct 08 04:43:02 2025
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260
QLast Update : Wed Oct 08 04:39:16 2025
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY100725\
Data File : VY023387.D
Acq On : 07 Oct 2025 11:47
Operator : SY/MD
Sample : VSTDICCC050
Misc : 5.00g/5.0mL/MSVOA_Y/SOIL
ALS Vial : 6 Sample Multiplier: 1

Quant Time: Oct 08 04:43:02 2025
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260
QLast Update : Wed Oct 08 04:39:16 2025
Response via : Initial Calibration

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICCC050

Manual Integrations APPROVED

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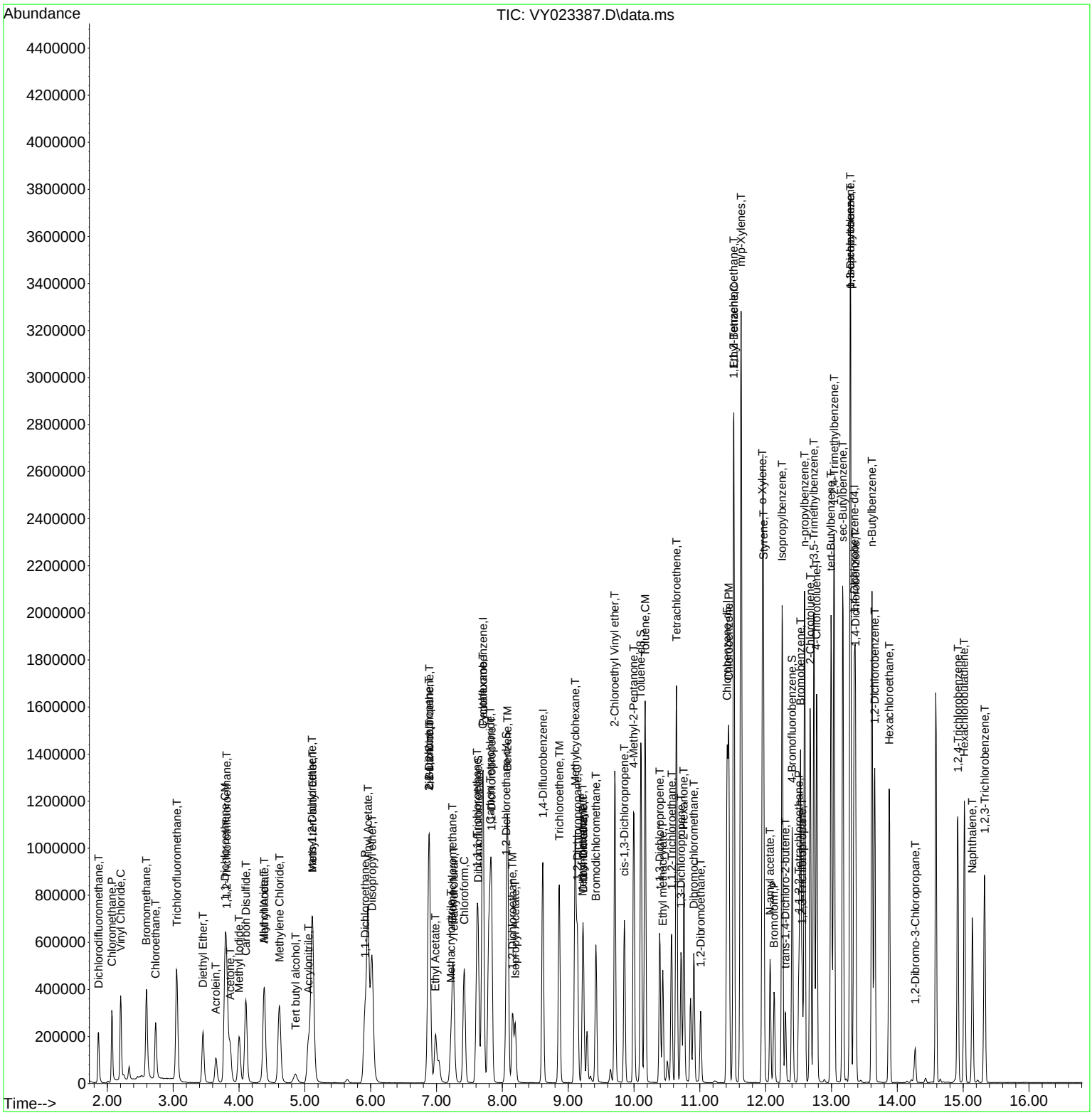
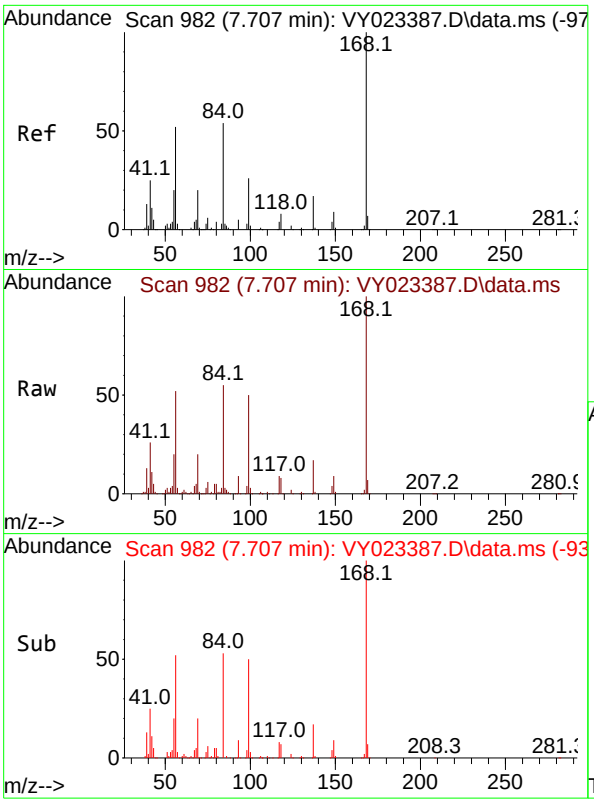
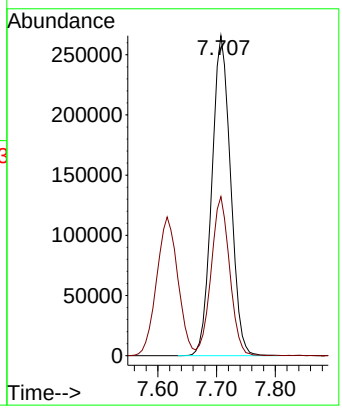




#1
Pentafluorobenzene
Concen: 50.000 ug/l
RT: 7.707 min Scan# 9
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion:168 Resp: 59034

Ion	Ratio	Lower	Upper
168	100		
99	49.6	39.7	59.5



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICCC050

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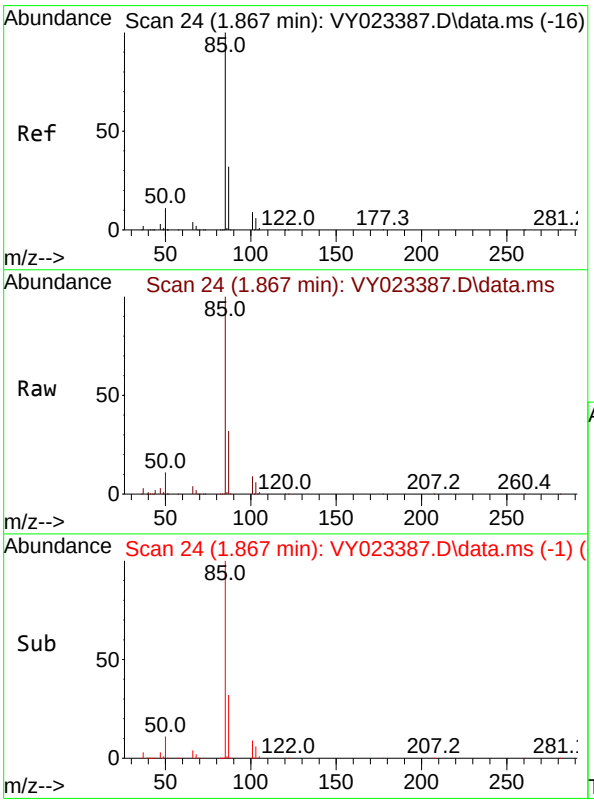
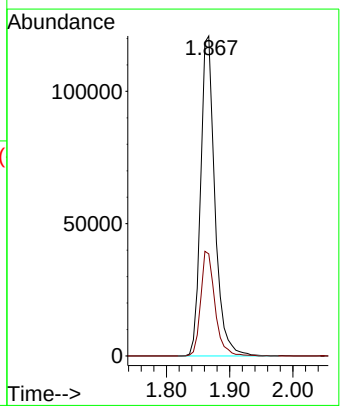
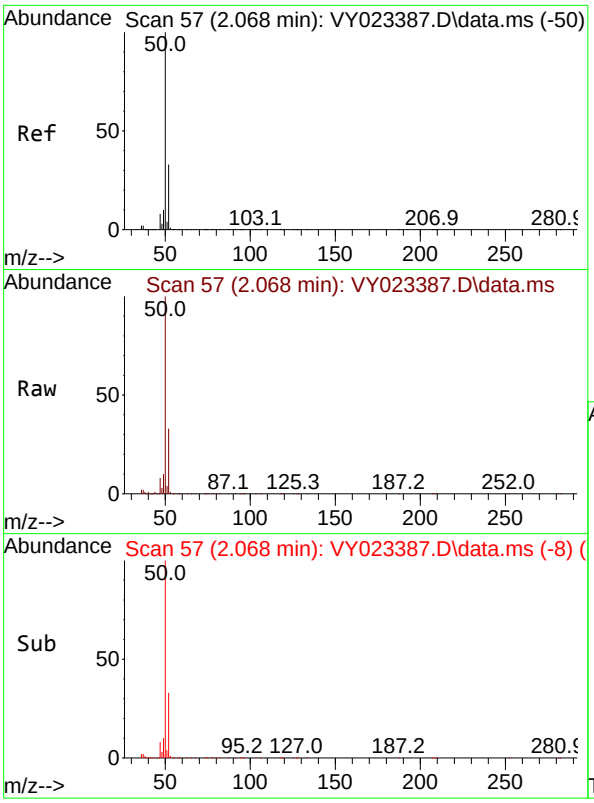


#2
Dichlorodifluoromethane
Concen: 40.745 ug/l
RT: 1.867 min Scan# 24
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion: 85 Resp: 189467

Ion	Ratio	Lower	Upper
85	100		
87	31.9	16.0	47.9

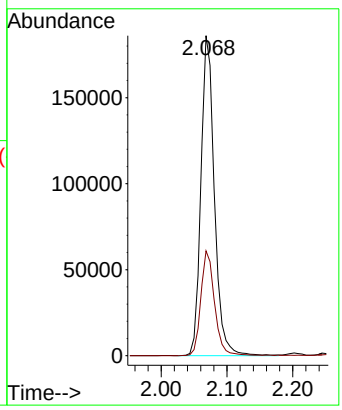




#3
Chloromethane
Concen: 40.113 ug/l
RT: 2.068 min Scan# 5
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion: 50 Resp: 26514

Ion	Ratio	Lower	Upper
50	100		
52	32.7	26.2	39.2



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICCC050

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APPROVED

Reviewed By :Semsettin Yesilyurt 10/10/2025
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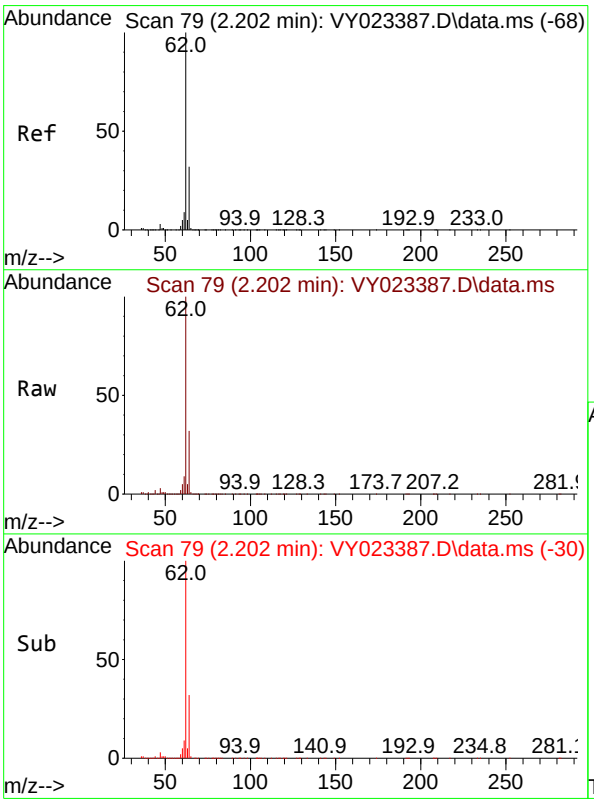
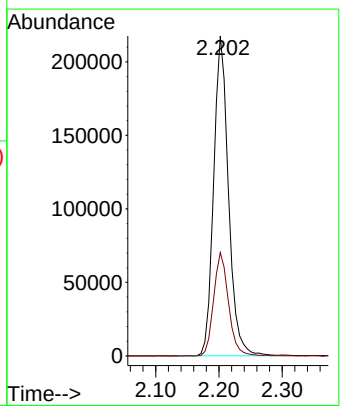
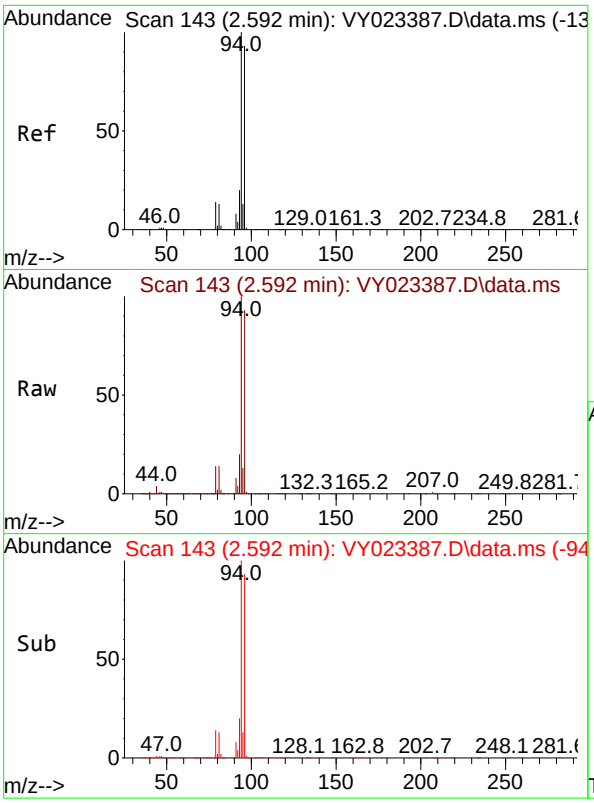


#4
Vinyl Chloride
Concen: 42.293 ug/l
RT: 2.202 min Scan# 79
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion: 62 Resp: 352993

Ion	Ratio	Lower	Upper
62	100		
64	32.3	25.8	38.8

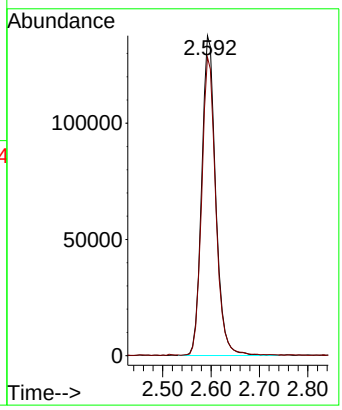




#5
Bromomethane
Concen: 40.458 ug/l
RT: 2.592 min Scan# 14
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion: 94 Resp: 27700

Ion	Ratio	Lower	Upper
94	100		
96	93.1	74.5	111.7



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICCC050

Manual Integrations
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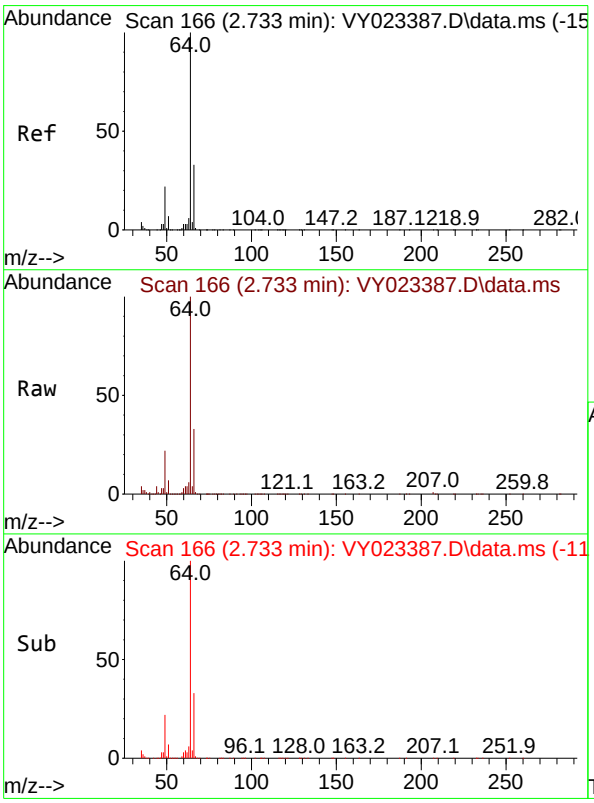
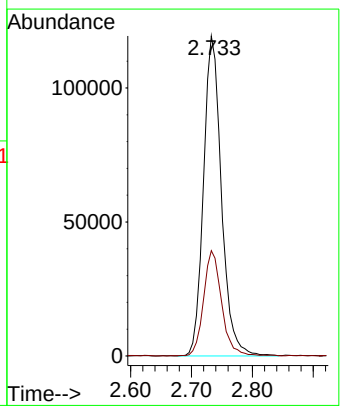
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

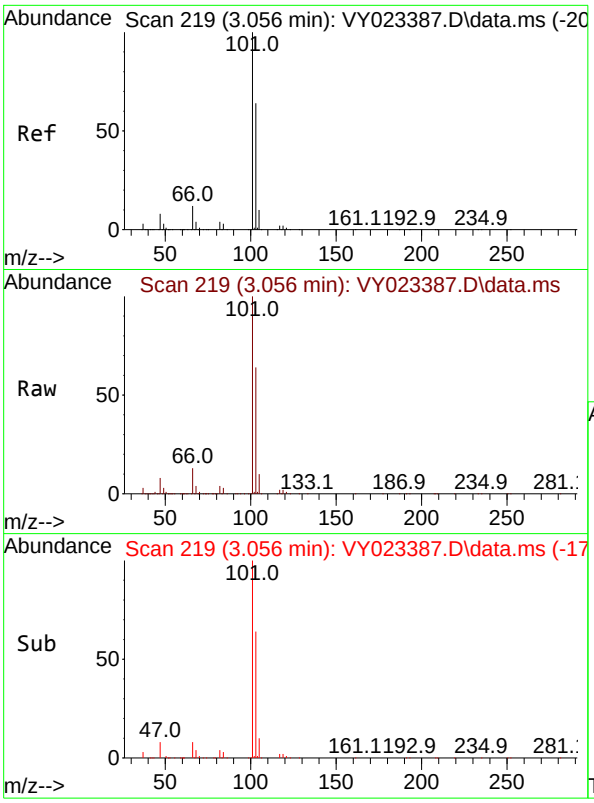


#6
Chloroethane
Concen: 43.157 ug/l
RT: 2.733 min Scan# 166
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion: 64 Resp: 244551

Ion	Ratio	Lower	Upper
64	100		
66	32.8	26.2	39.4

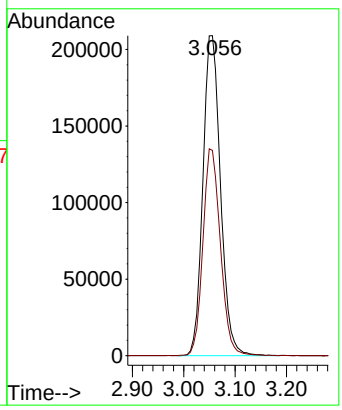




#7
Trichlorofluoromethane
Concen: 46.354 ug/l
RT: 3.056 min Scan# 21
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion:101 Resp: 49698

Ion	Ratio	Lower	Upper
101	100		
103	64.1	51.3	76.9



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICCC050

Manual Integrations
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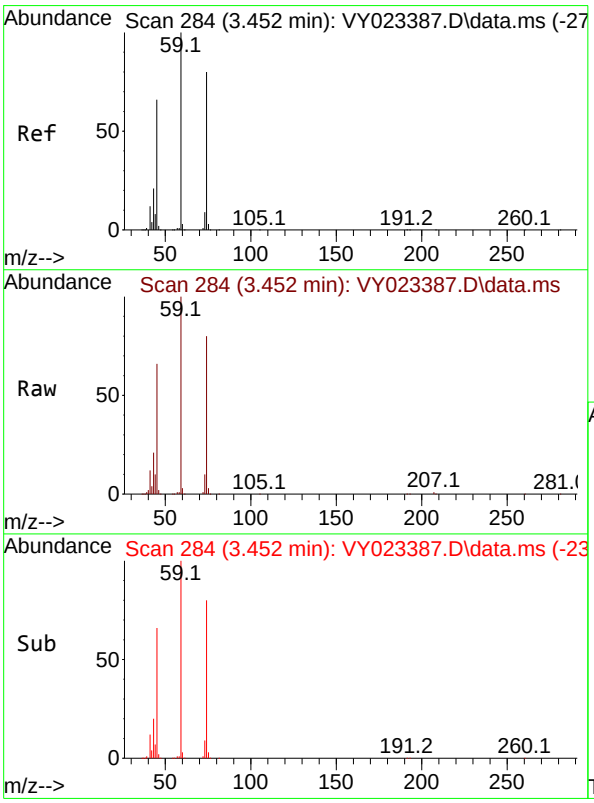
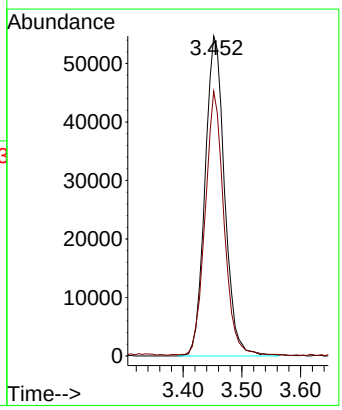
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

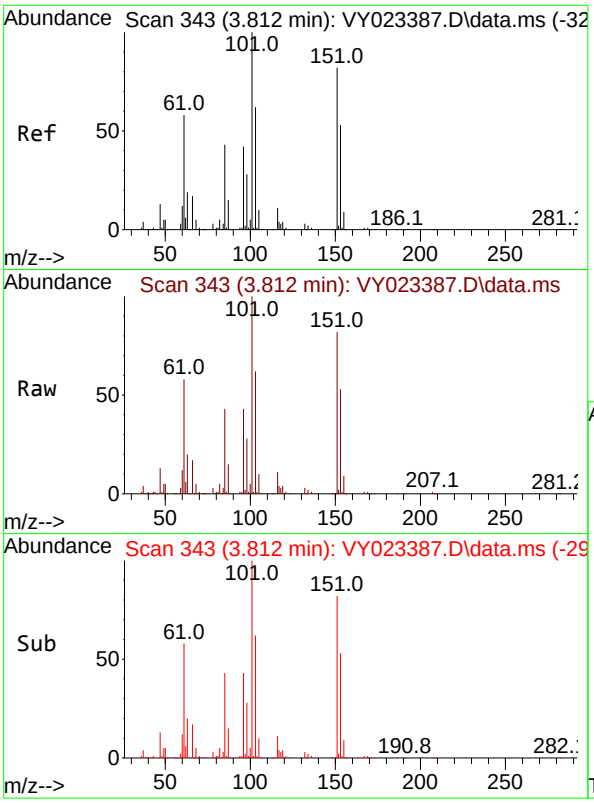


#8
Diethyl Ether
Concen: 45.158 ug/l
RT: 3.452 min Scan# 284
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion: 74 Resp: 126634

Ion	Ratio	Lower	Upper
74	100		
45	79.8	39.9	119.7

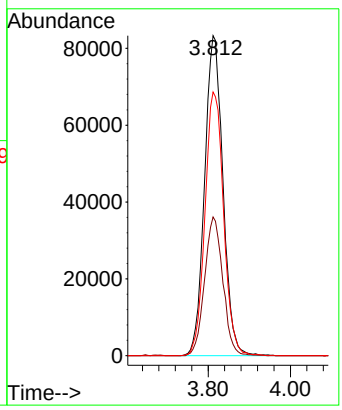




#9
1,1,2-Trichlorotrifluoroethane
Concen: 45.039 ug/l
RT: 3.812 min Scan# 34
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion:101 Resp: 25810

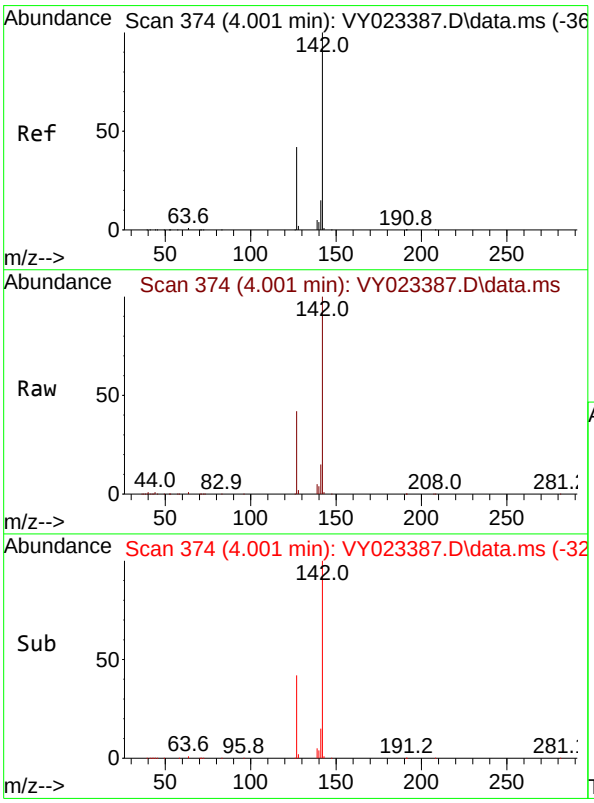
Ion	Ratio	Lower	Upper
101	100		
85	43.2	34.6	51.8
151	83.8	67.0	100.6



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICCC050

Manual Integrations
APPROVED

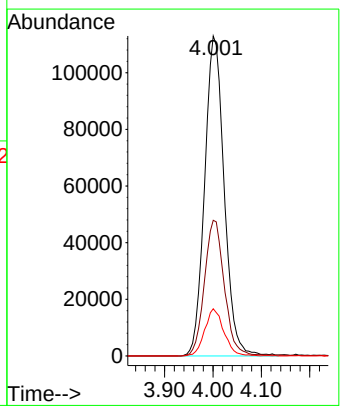
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

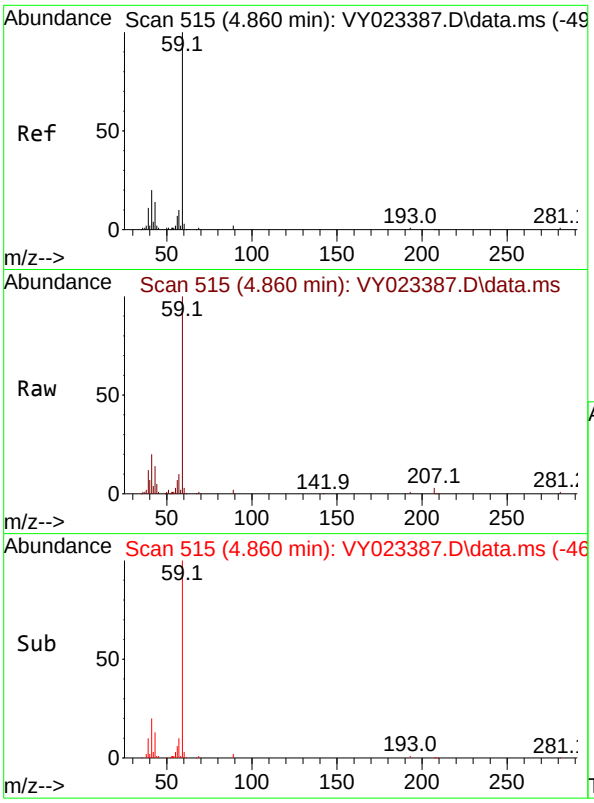


#10
Methyl Iodide
Concen: 47.979 ug/l
RT: 4.001 min Scan# 374
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion:142 Resp: 317731

Ion	Ratio	Lower	Upper
142	100		
127	43.5	34.8	52.2
141	14.5	11.6	17.4

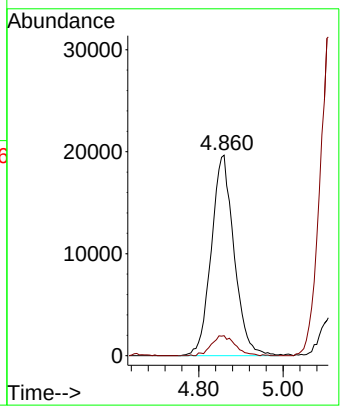




#11
Tert butyl alcohol
Concen: 244.793 ug/l
RT: 4.860 min Scan# 5
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion: 59 Resp: 7364

Ion	Ratio	Lower	Upper
59	100		
57	10.4	8.3	12.5



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICCC050

Manual Integrations
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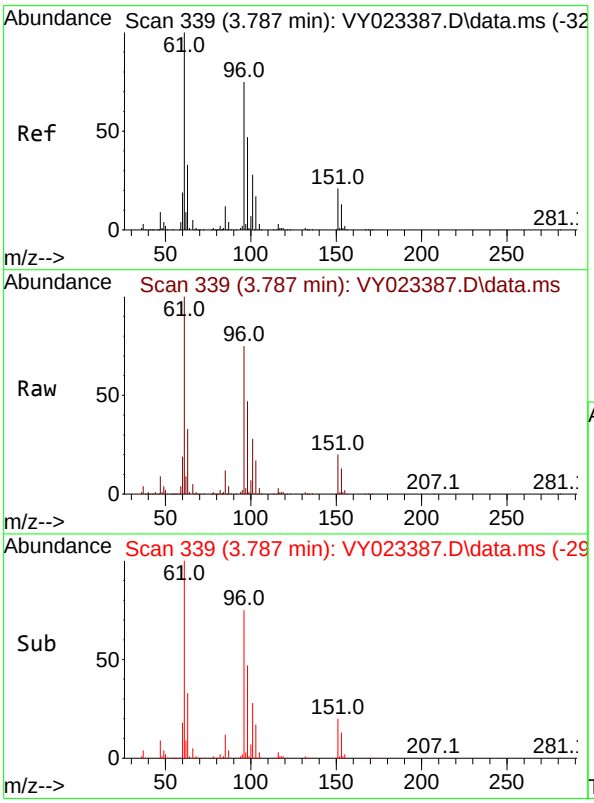
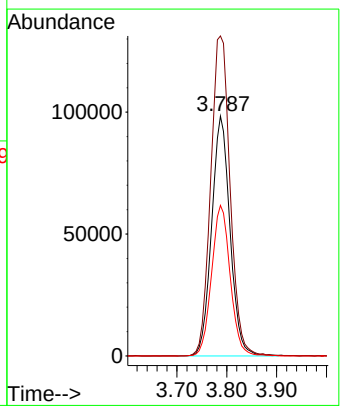
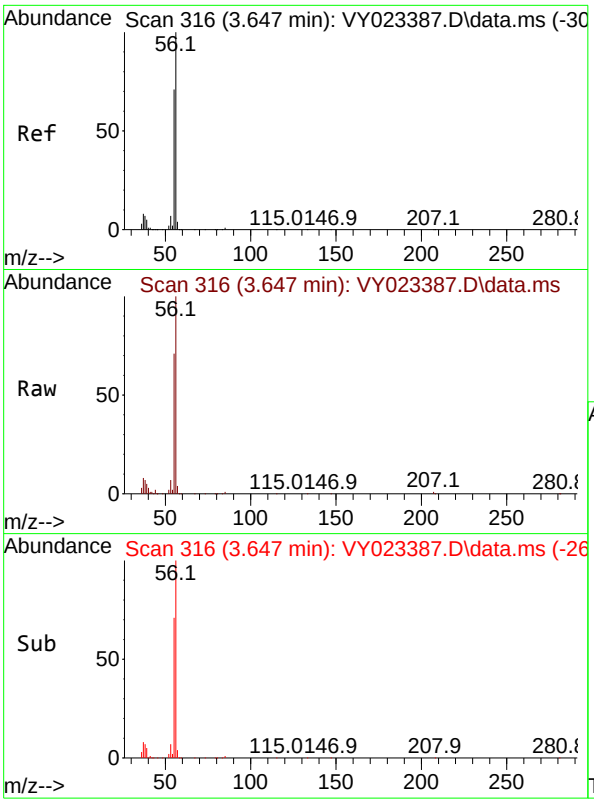


#12
1,1-Dichloroethene
Concen: 45.738 ug/l
RT: 3.787 min Scan# 339
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion: 96 Resp: 252190

Ion	Ratio	Lower	Upper
96	100		
61	133.4	106.7	160.1
98	62.8	50.2	75.4

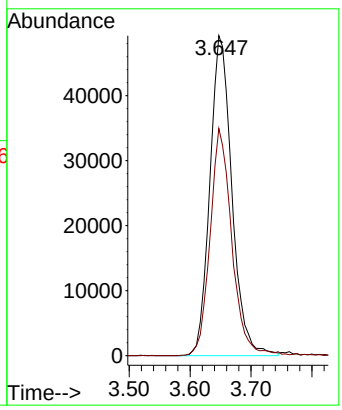




#13
Acrolein
Concen: 242.575 ug/l
RT: 3.647 min Scan# 3
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion: 56 Resp: 12364

Ion	Ratio	Lower	Upper
56	100		
55	70.1	56.1	84.1



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICCC050

Manual Integrations
APPROVED

Reviewed By :Semsettin Yesilyurt 10/10/2025
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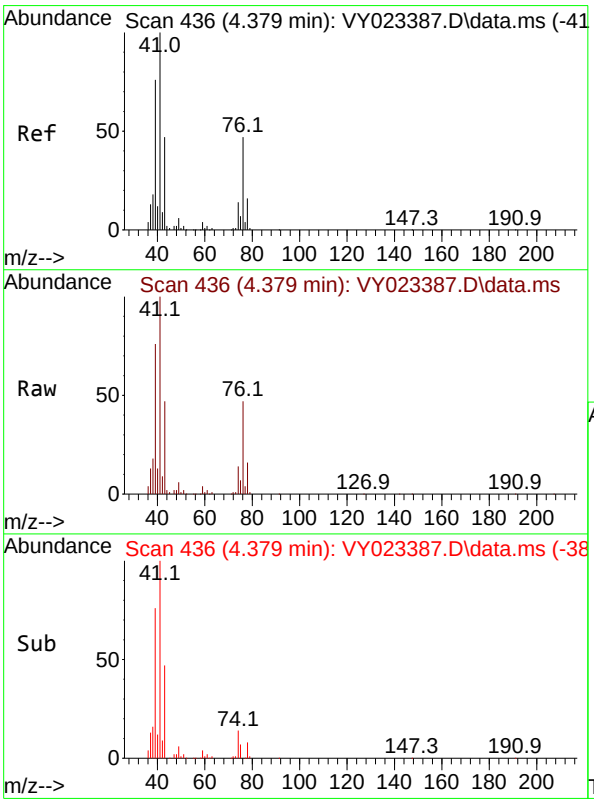
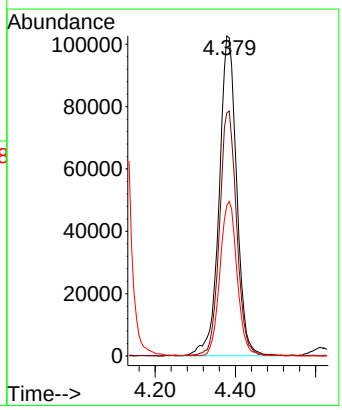
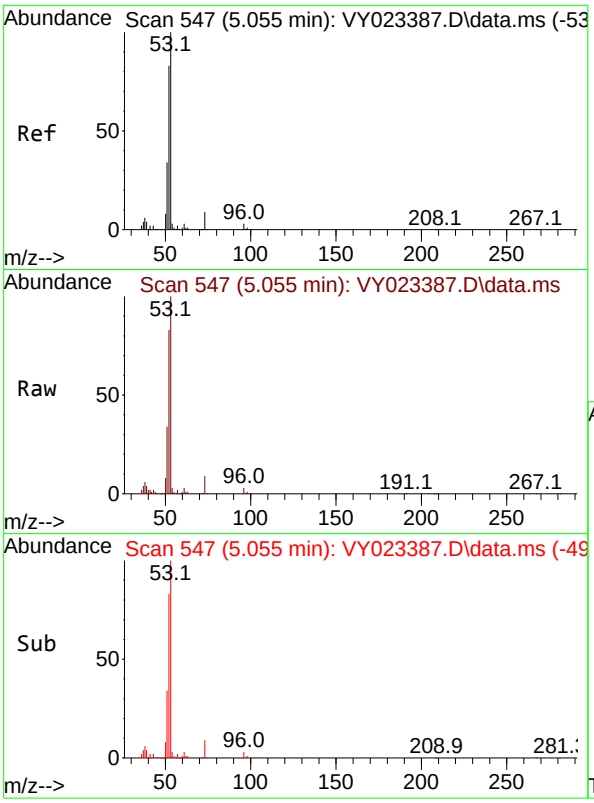


#14
Allyl chloride
Concen: 44.989 ug/l
RT: 4.379 min Scan# 436
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion: 41 Resp: 310569

Ion	Ratio	Lower	Upper
41	100		
39	74.9	59.9	89.9
76	47.5	38.0	57.0

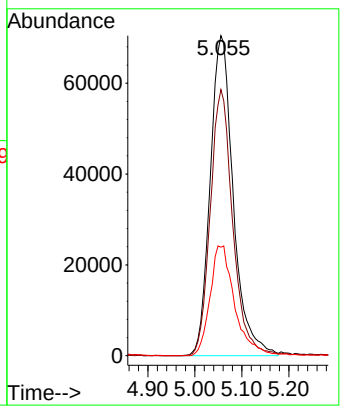




#15
Acrylonitrile
Concen: 219.075 ug/l
RT: 5.055 min Scan# 54
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion: 53 Resp: 24066

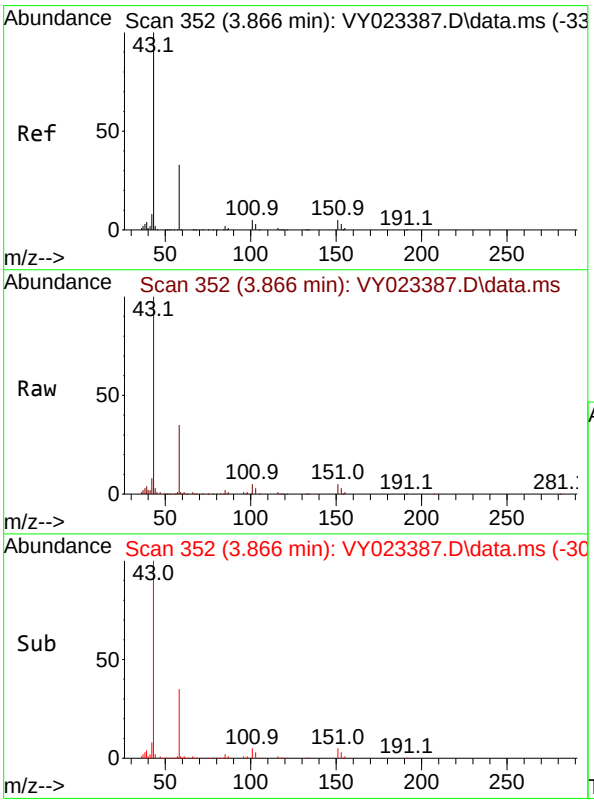
Ion	Ratio	Lower	Upper
53	100		
52	80.8	64.6	97.0
51	36.9	29.5	44.3



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICCC050

Manual Integrations APPROVED

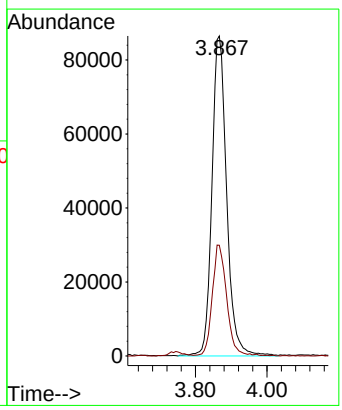
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

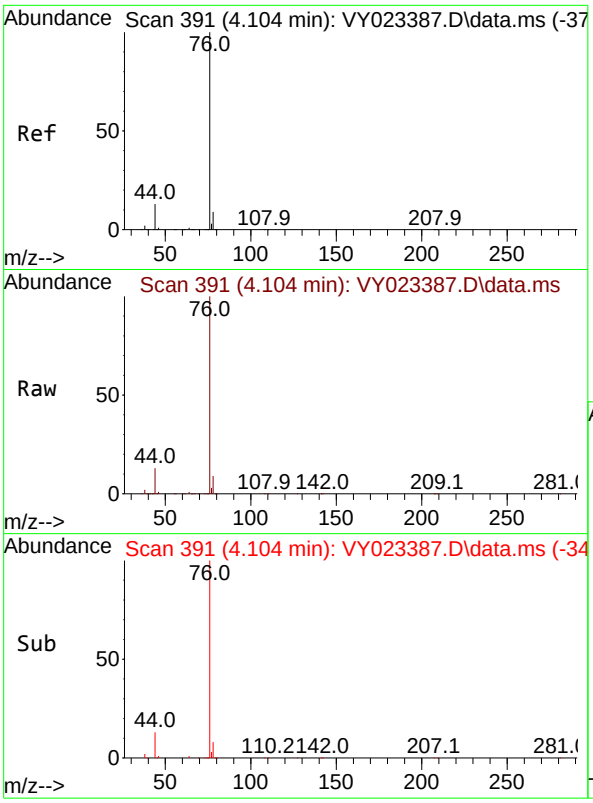


#16
Acetone
Concen: 214.955 ug/l
RT: 3.866 min Scan# 352
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion: 43 Resp: 247122

Ion	Ratio	Lower	Upper
43	100		
58	34.6	27.7	41.5

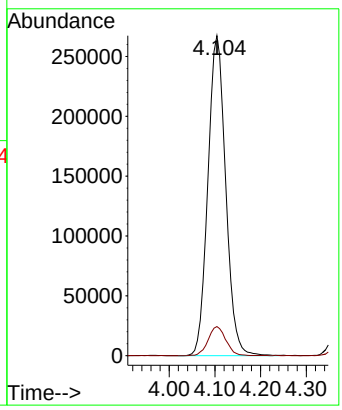




#17
Carbon Disulfide
Concen: 42.028 ug/l
RT: 4.104 min Scan# 3
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion: 76 Resp: 72298

Ion	Ratio	Lower	Upper
76	100		
78	9.1	7.3	10.9



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICCC050

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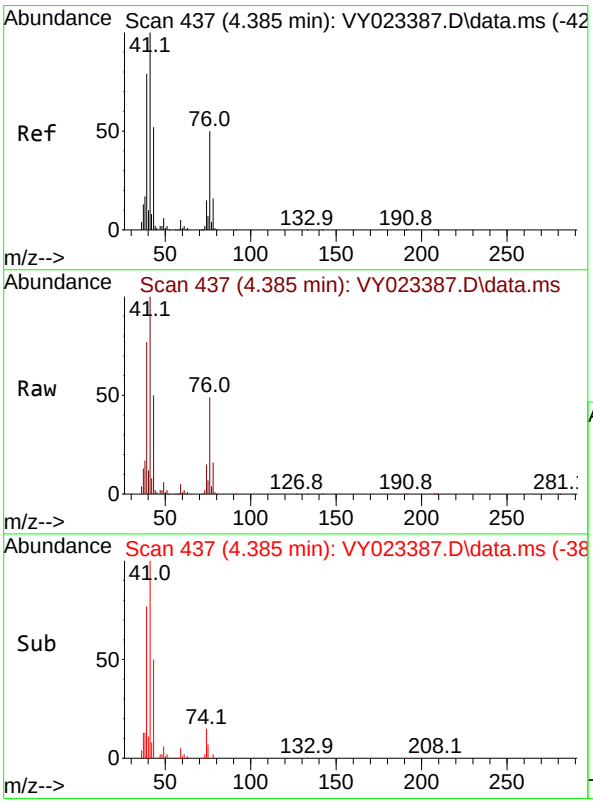
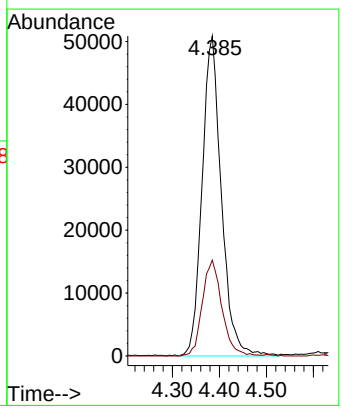
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

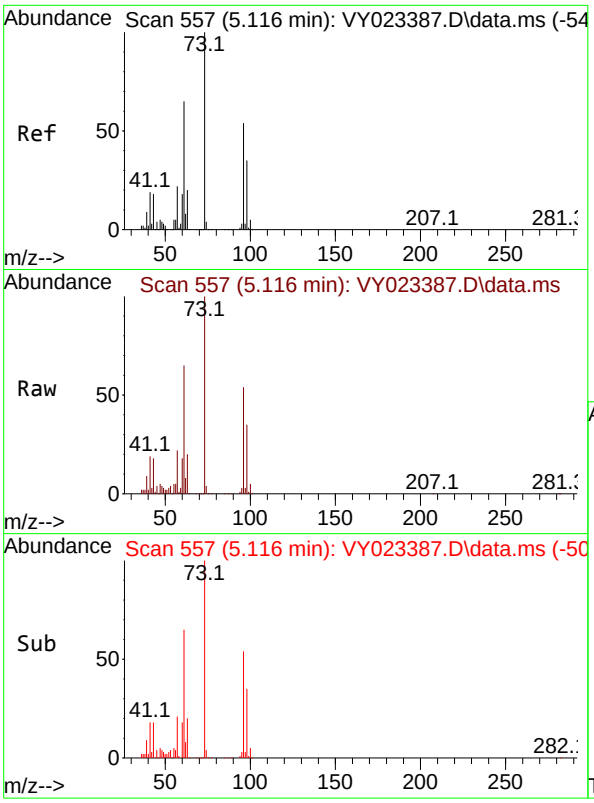


#18
Methyl Acetate
Concen: 49.563 ug/l
RT: 4.385 min Scan# 437
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion: 43 Resp: 144816

Ion	Ratio	Lower	Upper
43	100		
74	30.3	24.2	36.4

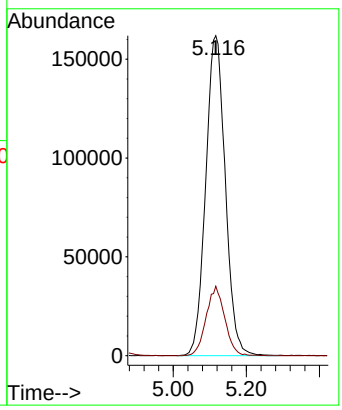




#19
Methyl tert-butyl Ether
Concen: 46.626 ug/l
RT: 5.116 min Scan# 5
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion: 73 Resp: 60193

Ion	Ratio	Lower	Upper
73	100		
57	21.7	17.4	26.0



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICCC050

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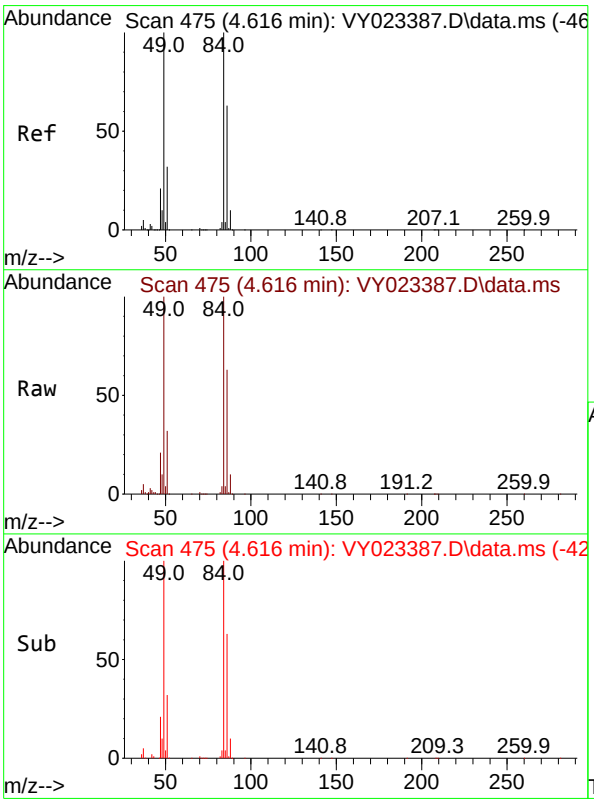
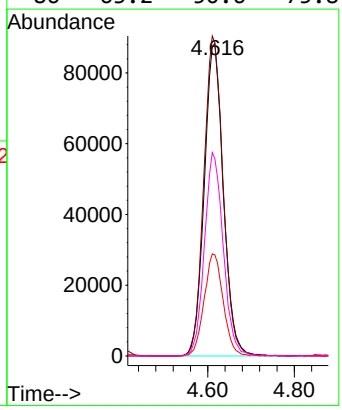
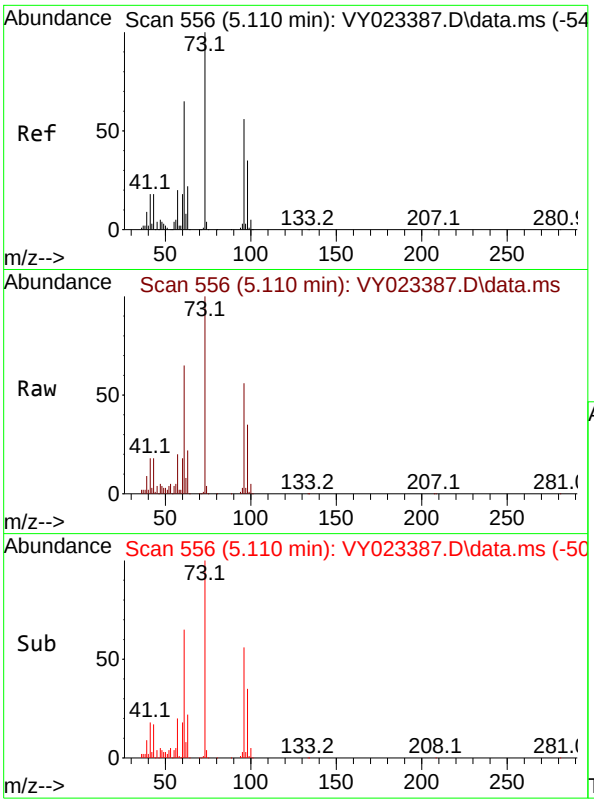


#20
Methylene Chloride
Concen: 43.409 ug/l
RT: 4.616 min Scan# 475
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion: 84 Resp: 270612

Ion	Ratio	Lower	Upper
84	100		
49	100.3	80.2	120.4
51	32.4	25.9	38.9
86	63.2	50.6	75.8

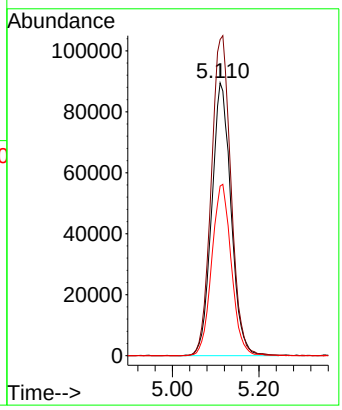




#21
trans-1,2-Dichloroethene
Concen: 45.256 ug/l
RT: 5.110 min Scan# 5
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion: 96 Resp: 27751(

Ion	Ratio	Lower	Upper
96	100		
61	115.9	92.7	139.1
98	62.1	49.7	74.5



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICCC050

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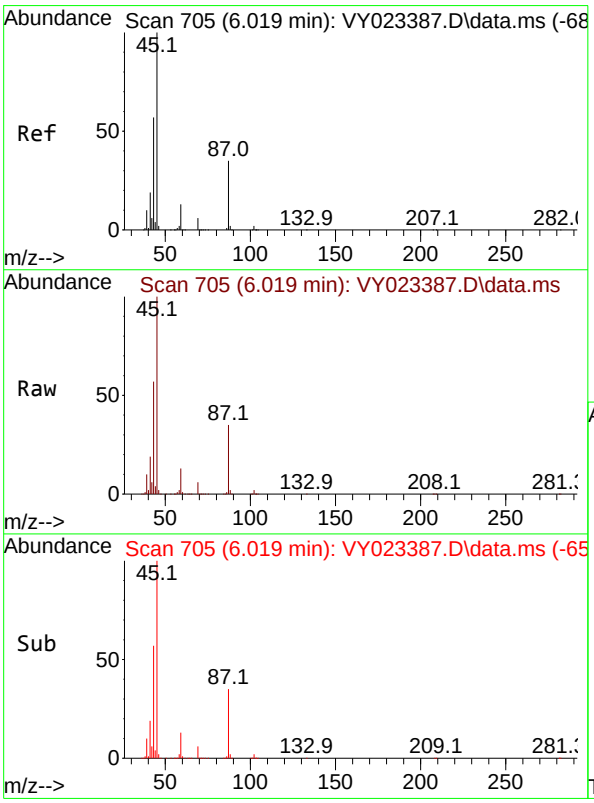
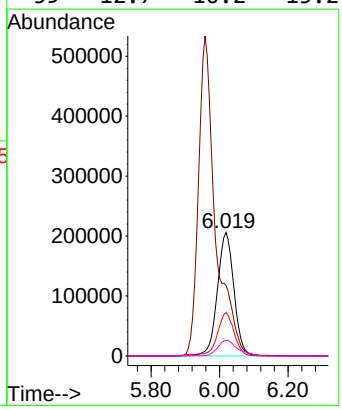
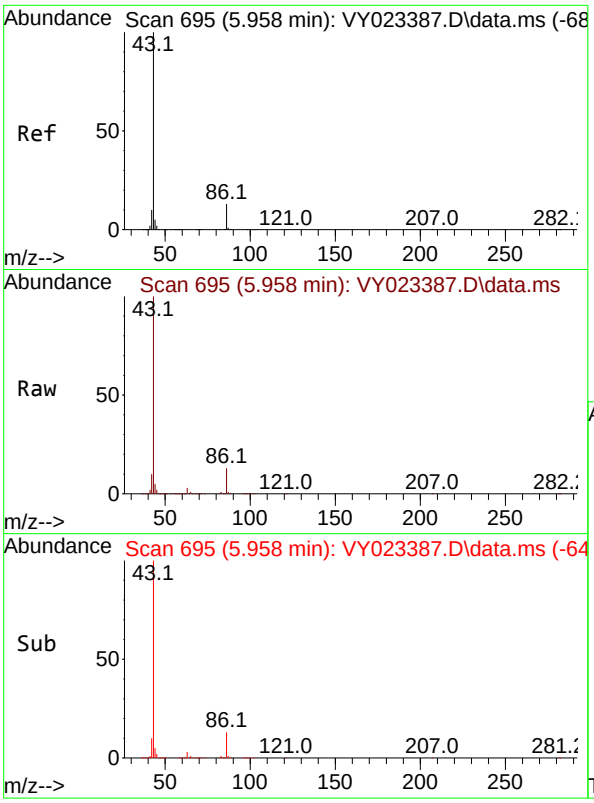


#22
Diisopropyl ether
Concen: 44.844 ug/l
RT: 6.019 min Scan# 705
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion: 45 Resp: 686481

Ion	Ratio	Lower	Upper
45	100		
43	57.0	45.6	68.4
87	35.1	28.1	42.1
59	12.7	10.2	15.2

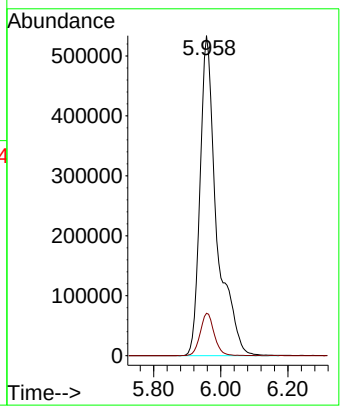




#23
Vinyl Acetate
Concen: 219.119 ug/l
RT: 5.958 min Scan# 6
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion: 43 Resp: 184378

Ion	Ratio	Lower	Upper
43	100		
86	13.2	10.6	15.8



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICCC050

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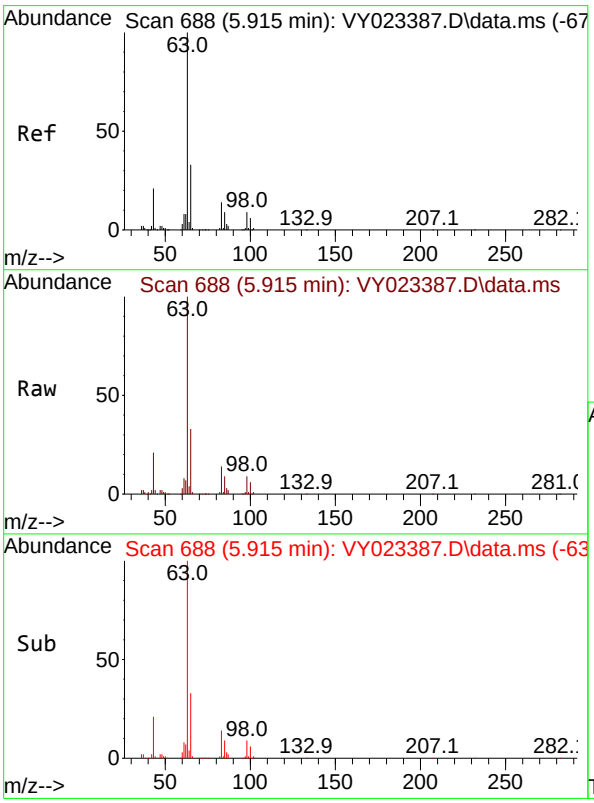
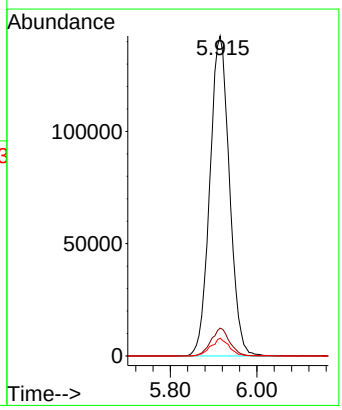
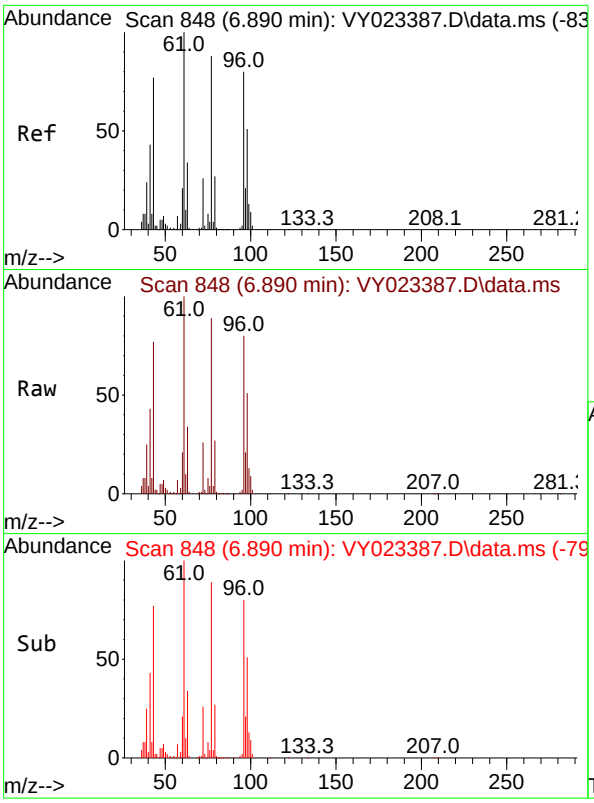


#24
1,1-Dichloroethane
Concen: 44.423 ug/l
RT: 5.915 min Scan# 688
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion: 63 Resp: 448267

Ion	Ratio	Lower	Upper
63	100		
98	8.7	4.3	13.1
100	5.6	2.8	8.4





#25
2-Butanone
Concen: 218.327 ug/l
RT: 6.890 min Scan# 84
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion: 43 Resp: 31023

Ion	Ratio	Lower	Upper
43	100		
72	34.3	27.4	41.2

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICCC050

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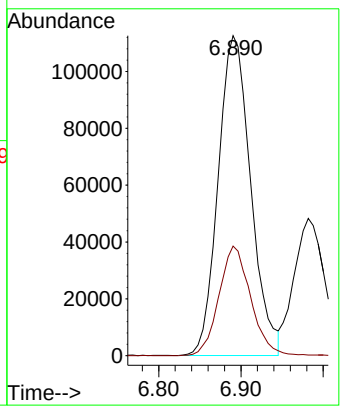
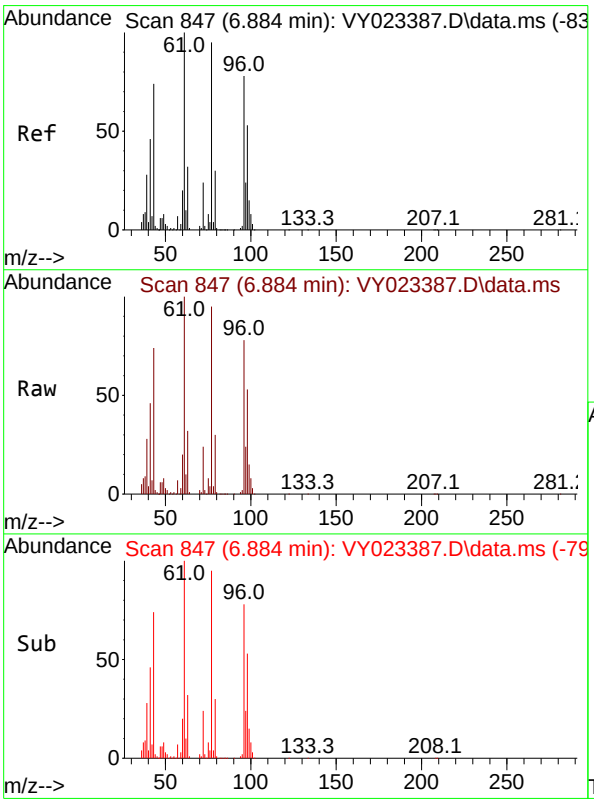
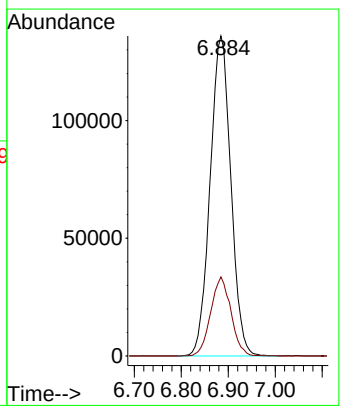


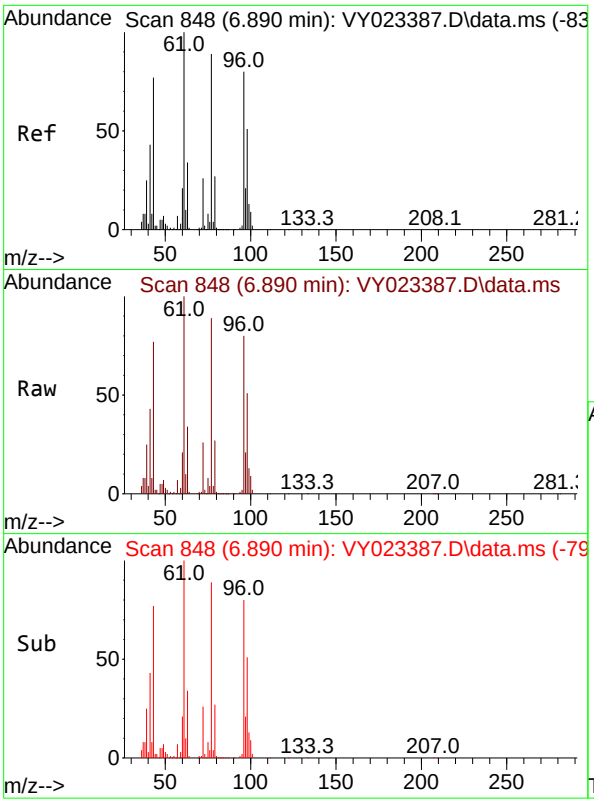


#26
2,2-Dichloropropane
Concen: 46.440 ug/l
RT: 6.884 min Scan# 847
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion: 77 Resp: 416391

Ion	Ratio	Lower	Upper
77	100		
97	24.2	12.1	36.3





#27
cis-1,2-Dichloroethene
Concen: 46.010 ug/l
RT: 6.890 min Scan# 84
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion: 96 Resp: 32002

Ion	Ratio	Lower	Upper
96	100		
61	129.1	0.0	258.2
98	66.0	0.0	132.0

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICCC050

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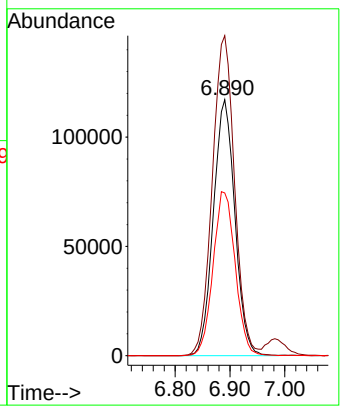
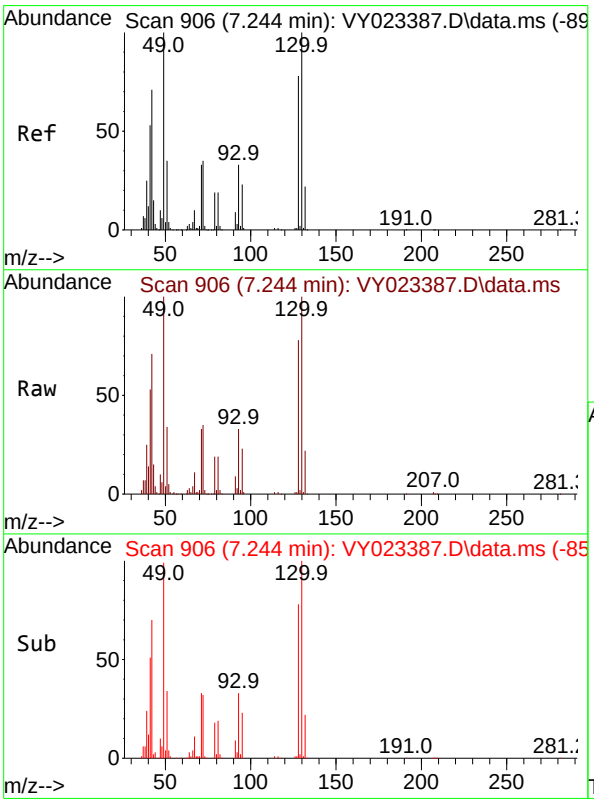
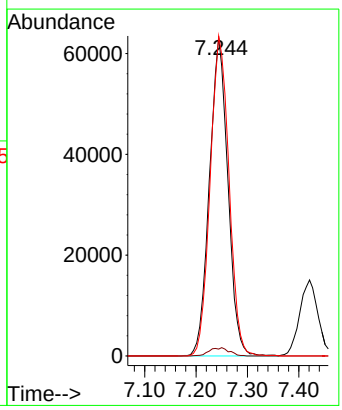


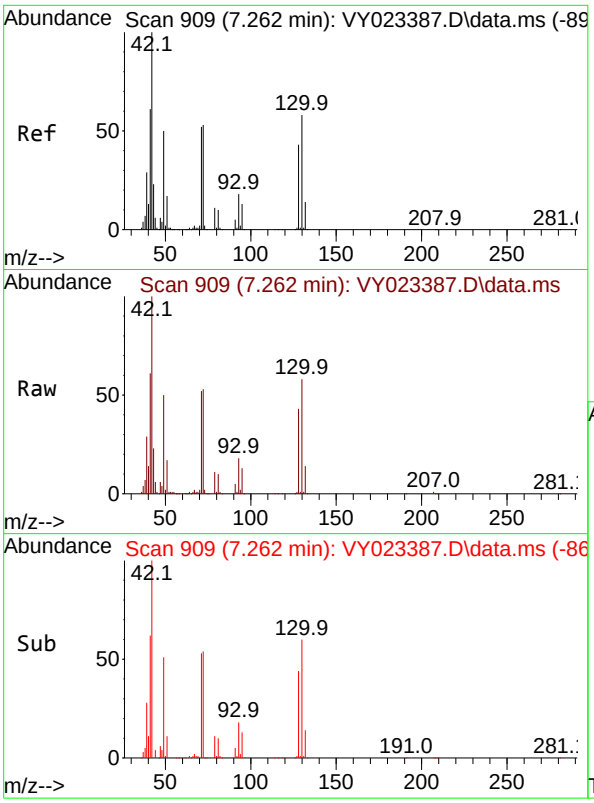


#28
Bromochloromethane
Concen: 40.211 ug/l
RT: 7.244 min Scan# 906
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion: 49 Resp: 157414

Ion	Ratio	Lower	Upper
49	100		
129	2.8	0.0	5.6
130	102.4	81.9	122.9

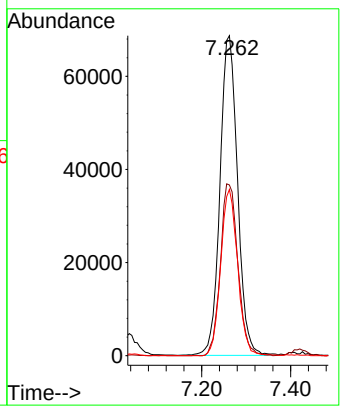




#29
Tetrahydrofuran
Concen: 222.653 ug/l
RT: 7.262 min Scan# 9(
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion: 42 Resp: 18778

Ion	Ratio	Lower	Upper
42	100		
72	53.8	43.0	64.6
71	50.1	40.1	60.1



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICCC050

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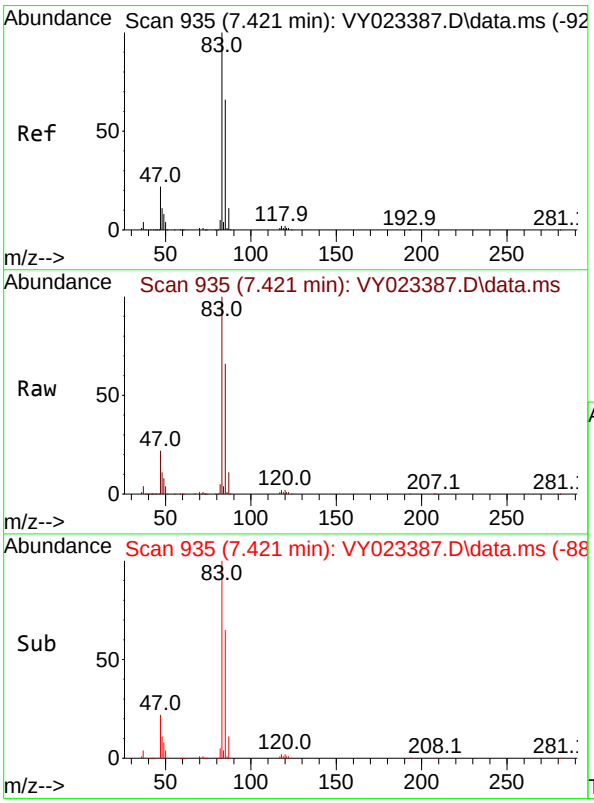
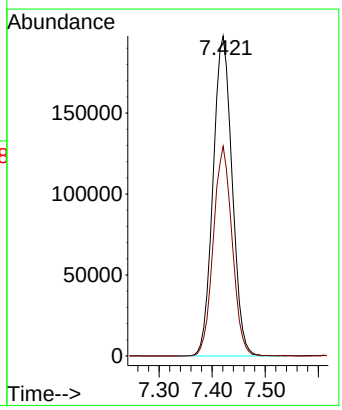
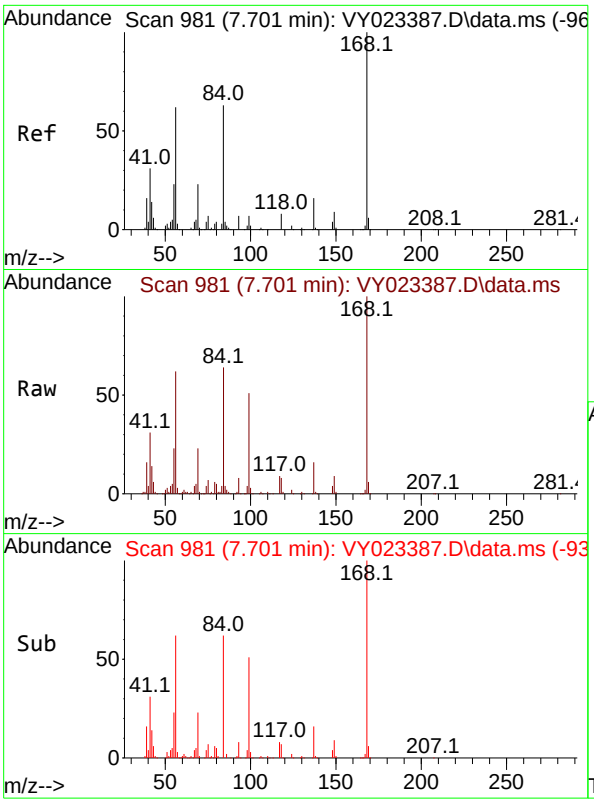


#30
Chloroform
Concen: 45.316 ug/l
RT: 7.421 min Scan# 935
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion: 83 Resp: 493098

Ion	Ratio	Lower	Upper
83	100		
85	65.6	52.5	78.7

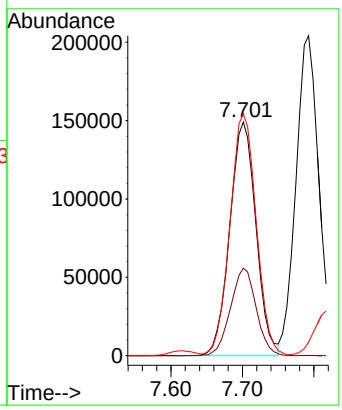




#31
Cyclohexane
Concen: 42.602 ug/l
RT: 7.701 min Scan# 9
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion: 56 Resp: 37964

Ion	Ratio	Lower	Upper
56	100		
69	37.5	30.0	45.0
84	101.5	81.2	121.8



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICCC050

Manual Integrations
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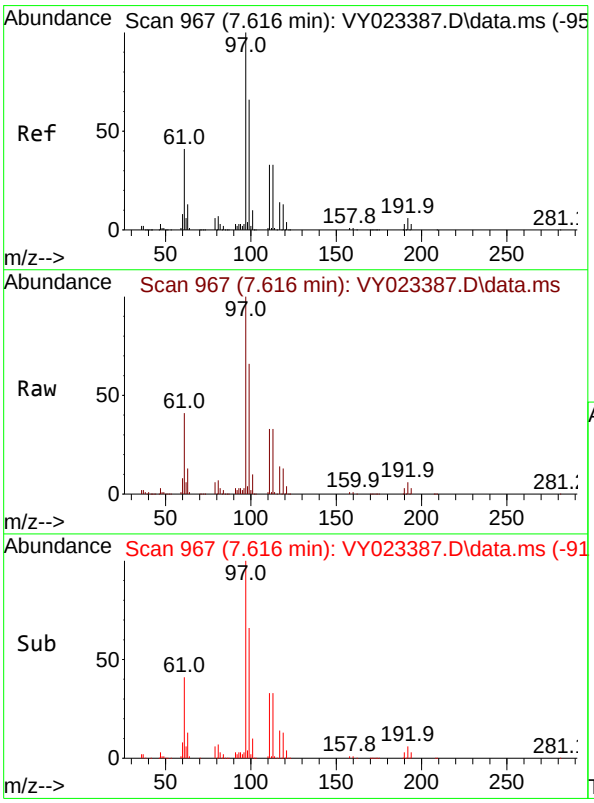
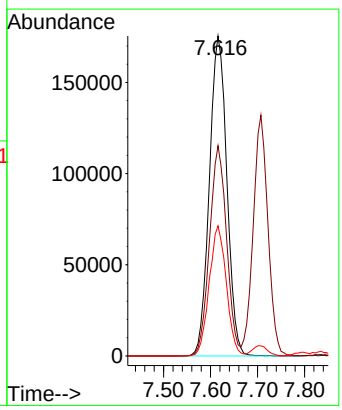
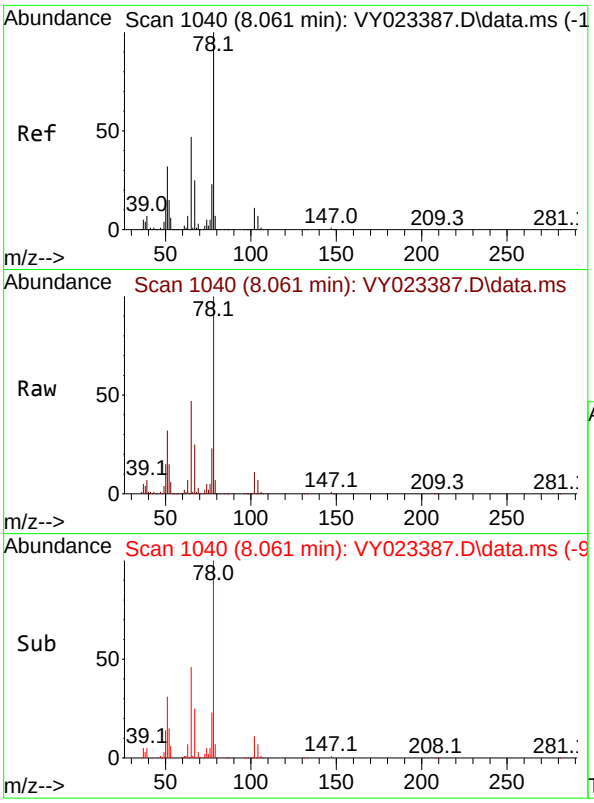


#32
1,1,1-Trichloroethane
Concen: 46.347 ug/l
RT: 7.616 min Scan# 967
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion: 97 Resp: 452713

Ion	Ratio	Lower	Upper
97	100		
99	64.3	51.4	77.2
61	39.9	31.9	47.9

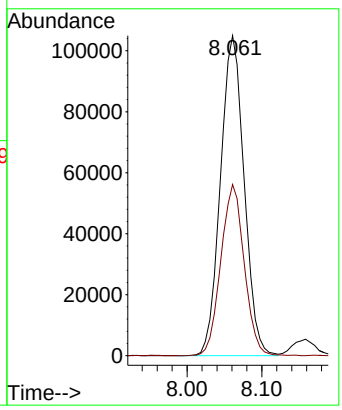




#33
1,2-Dichloroethane-d4
Concen: 45.240 ug/l
RT: 8.061 min Scan# 1
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion: 65 Resp: 23129

Ion	Ratio	Lower	Upper
65	100		
67	52.9	0.0	105.8



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICCC050

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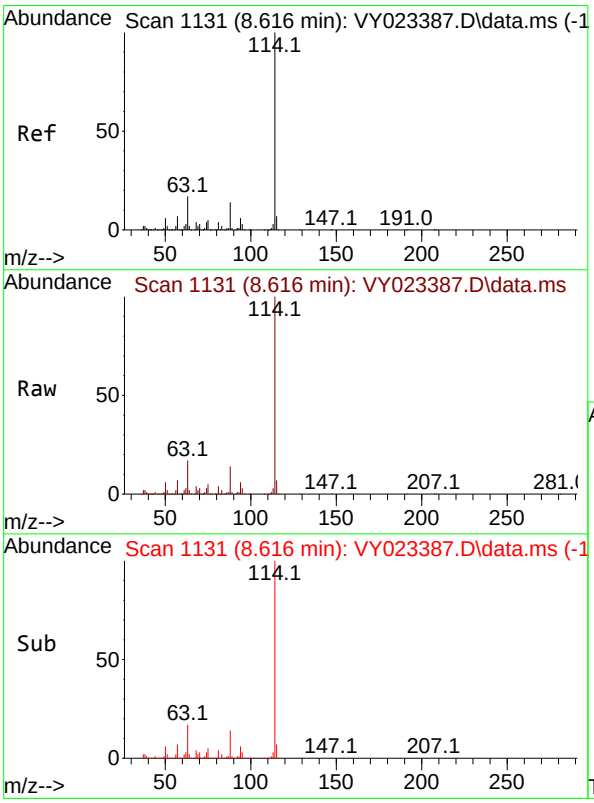
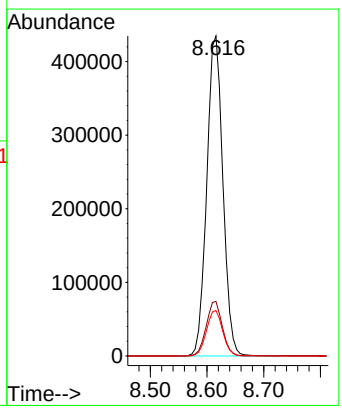
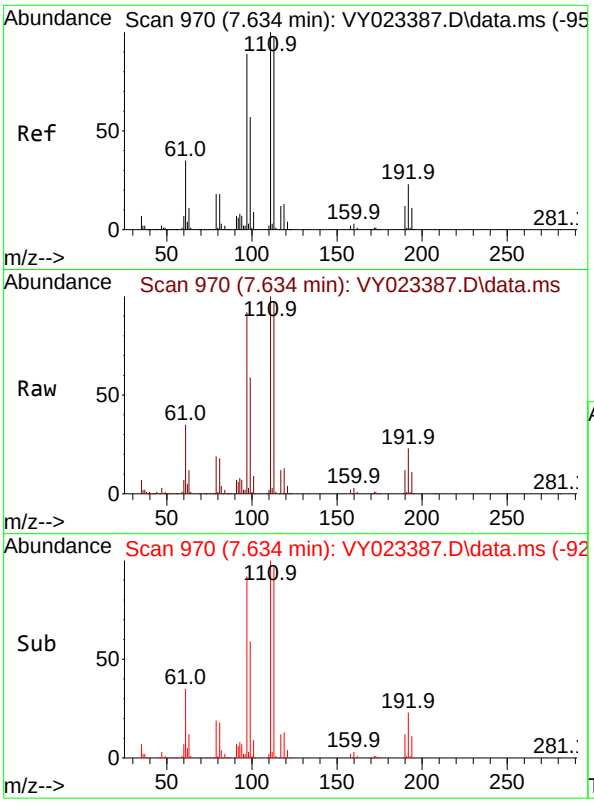


#34
1,4-Difluorobenzene
Concen: 50.000 ug/l
RT: 8.616 min Scan# 1131
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion:114 Resp: 858767

Ion	Ratio	Lower	Upper
114	100		
63	17.1	0.0	34.2
88	14.2	0.0	28.4

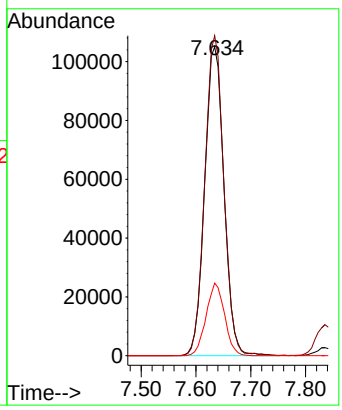




#35
Dibromofluoromethane
Concen: 49.185 ug/l
RT: 7.634 min Scan# 9
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion:113 Resp: 25633

Ion	Ratio	Lower	Upper
113	100		
111	102.2	81.8	122.6
192	22.5	18.0	27.0



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICCC050

Manual Integrations
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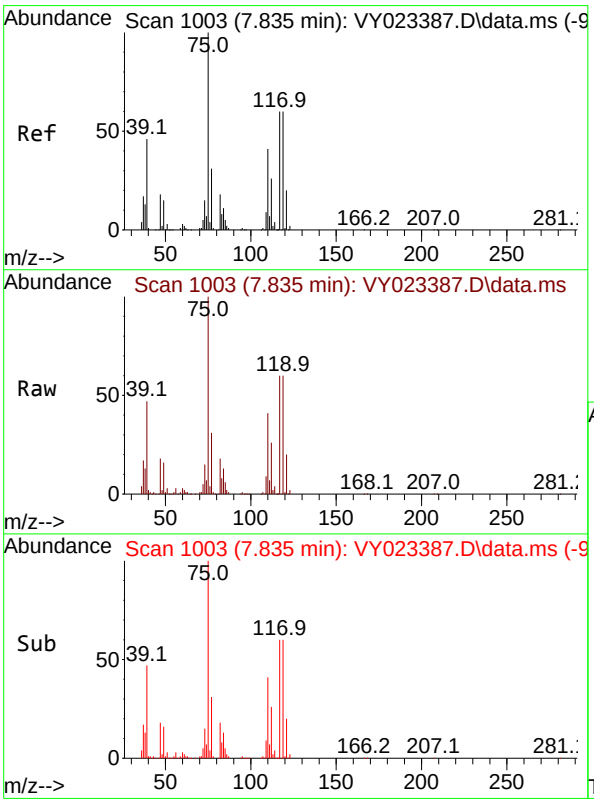
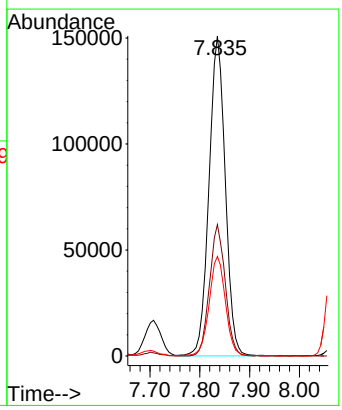
Supervised By :Mahesh Dadoda 10/10/2025

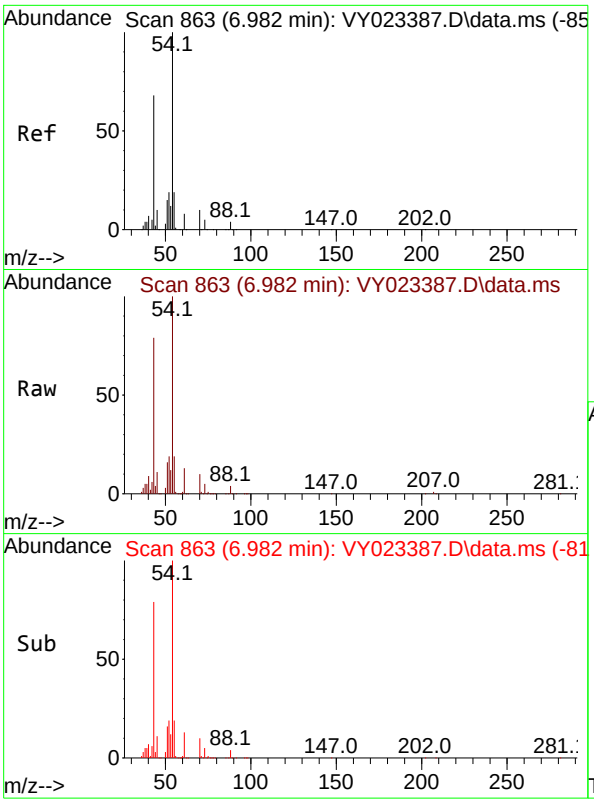


#36
1,1-Dichloropropene
Concen: 46.424 ug/l
RT: 7.835 min Scan# 1003
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion: 75 Resp: 341353

Ion	Ratio	Lower	Upper
75	100		
110	39.8	19.9	59.7
77	31.3	25.0	37.6

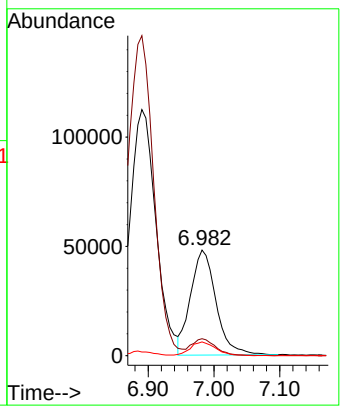




#37
Ethyl Acetate
Concen: 44.394 ug/l
RT: 6.982 min Scan# 8
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion: 43 Resp: 12905

Ion	Ratio	Lower	Upper
43	100		
61	14.8	11.8	17.8
70	13.1	10.5	15.7



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICCC050

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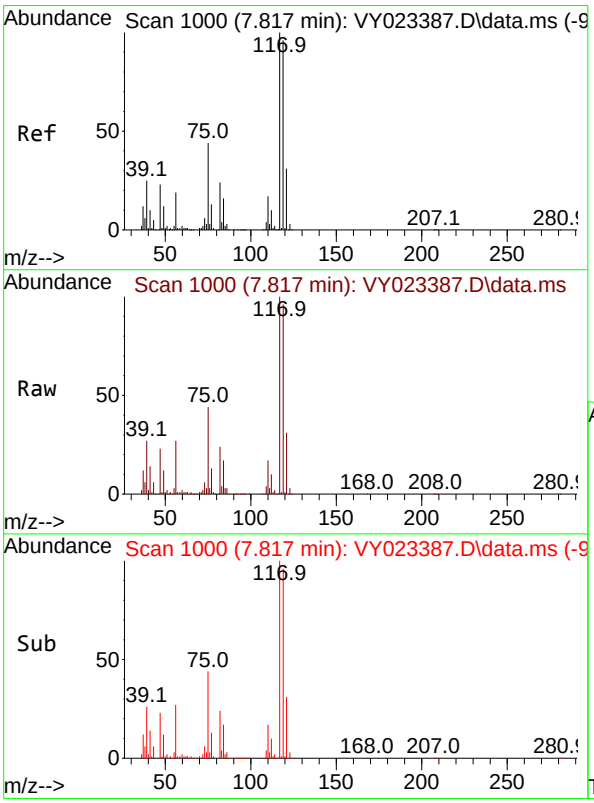
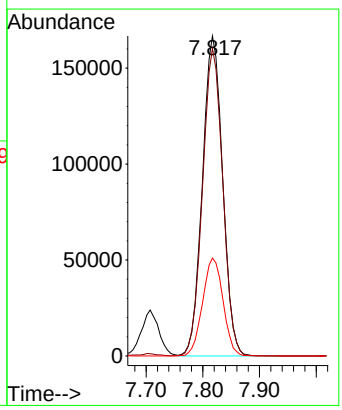
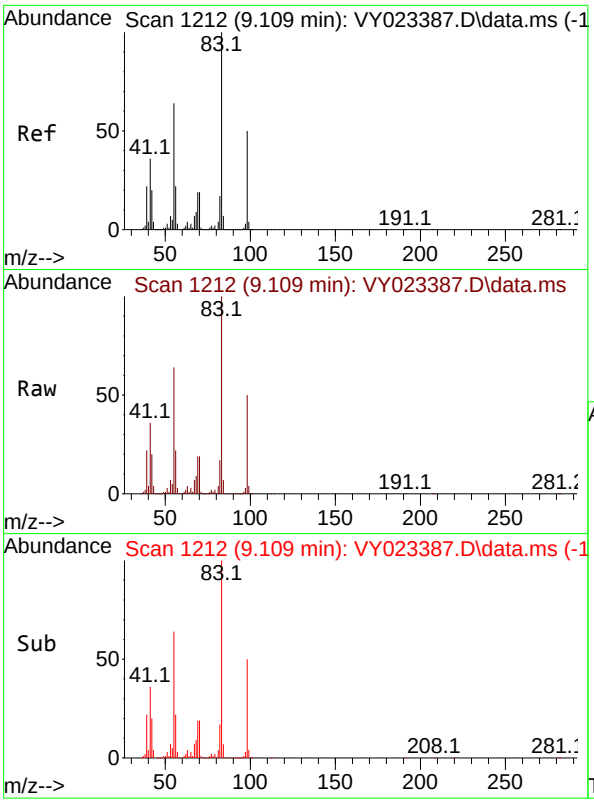


#38
Carbon Tetrachloride
Concen: 48.374 ug/l
RT: 7.817 min Scan# 1000
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion:117 Resp: 413187

Ion	Ratio	Lower	Upper
117	100		
119	96.0	76.8	115.2
121	30.6	24.5	36.7





#39
Methylcyclohexane
Concen: 48.113 ug/l
RT: 9.109 min Scan# 1
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion: 83 Resp: 45295

Ion	Ratio	Lower	Upper
83	100		
55	64.3	51.4	77.2
98	50.5	40.4	60.6

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICCC050

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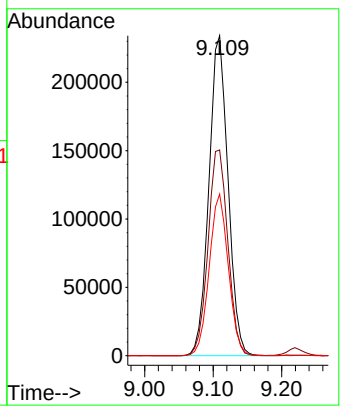
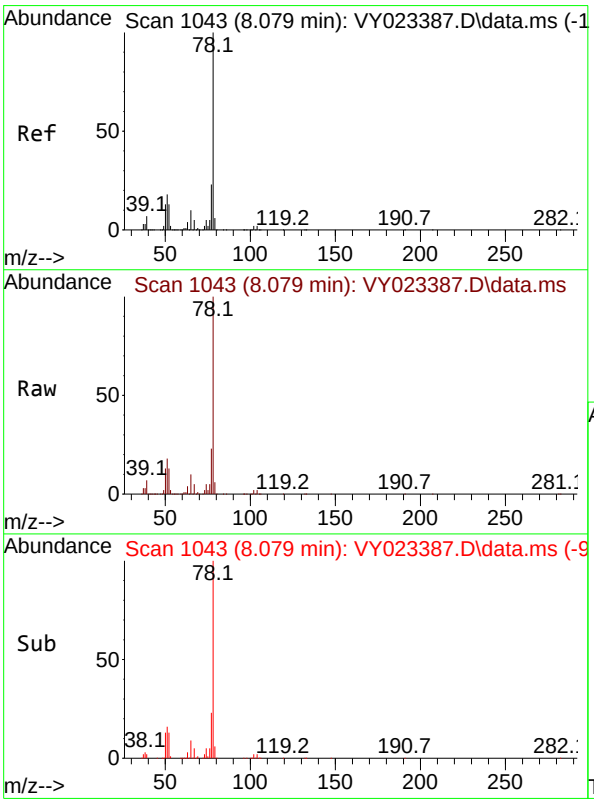
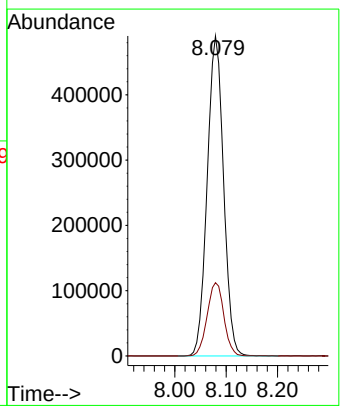


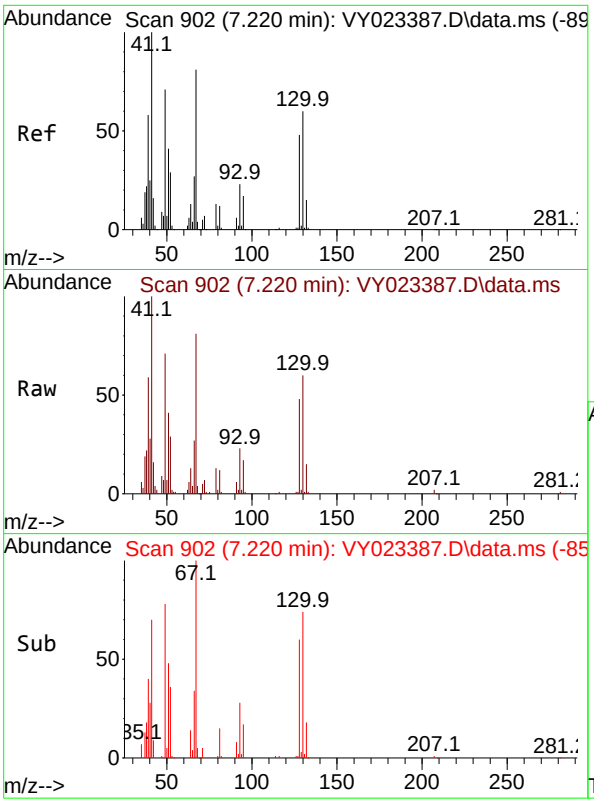


#40
Benzene
Concen: 47.154 ug/l
RT: 8.079 min Scan# 1043
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion: 78 Resp: 1080883

Ion	Ratio	Lower	Upper
78	100		
77	22.9	18.3	27.5

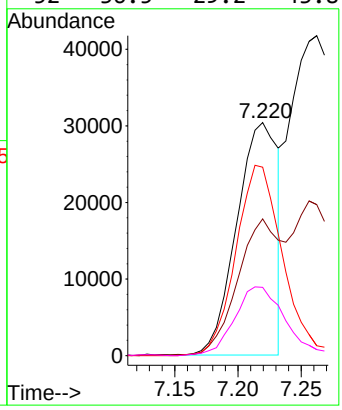




#41
Methacrylonitrile
Concen: 45.399 ug/l
RT: 7.220 min Scan# 9
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion: 41 Resp: 6854

Ion	Ratio	Lower	Upper
41	100		
39	65.3	52.2	78.4
67	93.6	74.9	112.3
52	36.5	29.2	43.8



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICCC050

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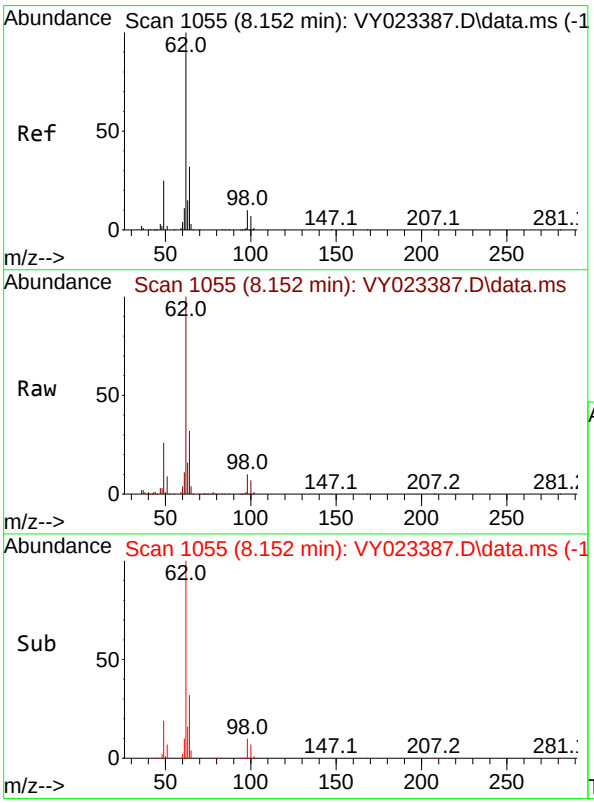
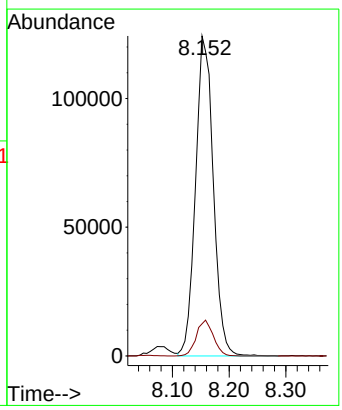
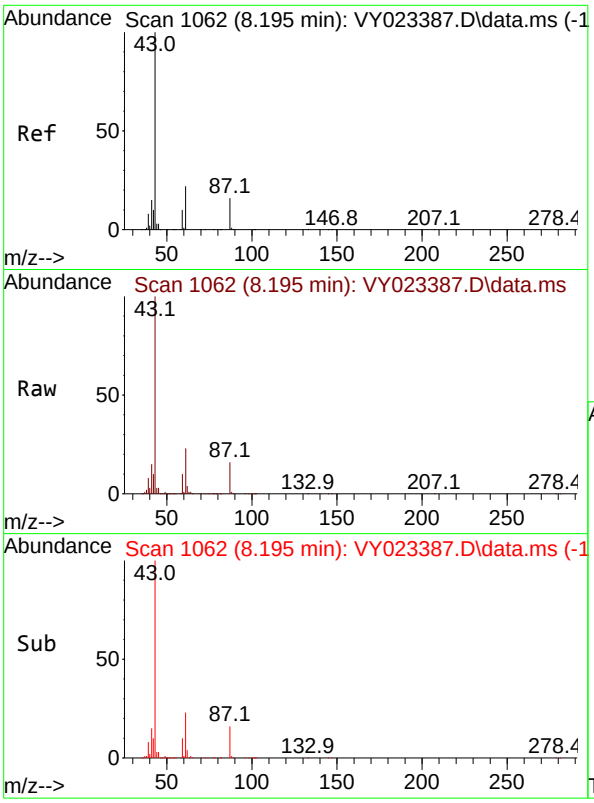


#42
1,2-Dichloroethane
Concen: 46.350 ug/l
RT: 8.152 min Scan# 1055
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion: 62 Resp: 270387

Ion	Ratio	Lower	Upper
62	100		
98	10.8	0.0	21.6





#43
Isopropyl Acetate
Concen: 45.811 ug/l
RT: 8.195 min Scan# 1
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion: 43 Resp: 25904

Ion	Ratio	Lower	Upper
43	100		
61	22.6	18.1	27.1
87	16.9	13.5	20.3

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICCC050

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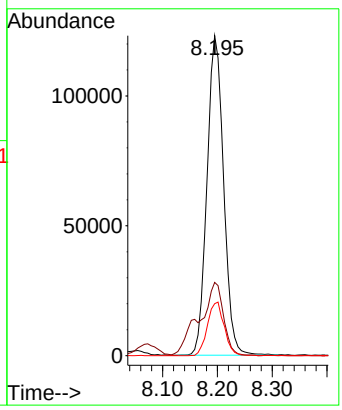
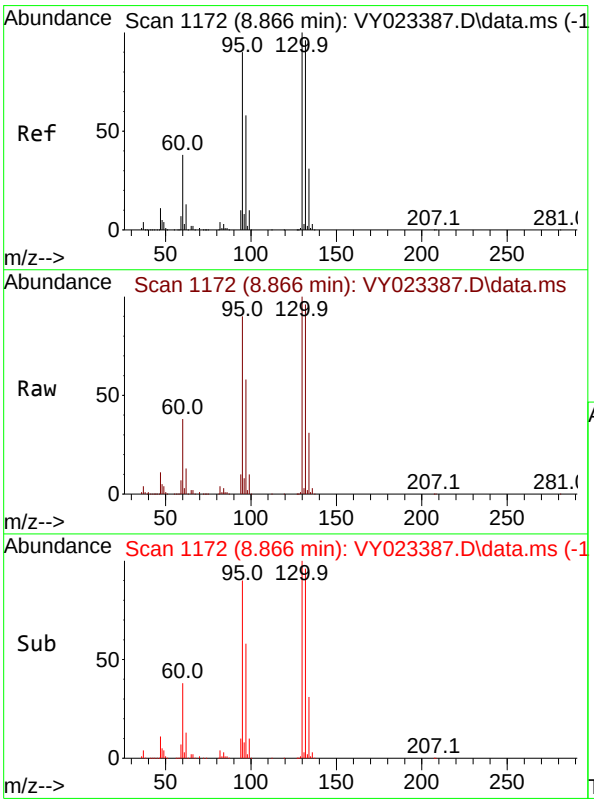
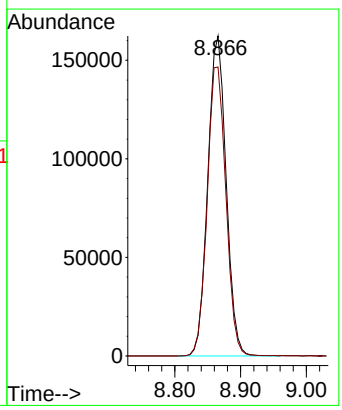


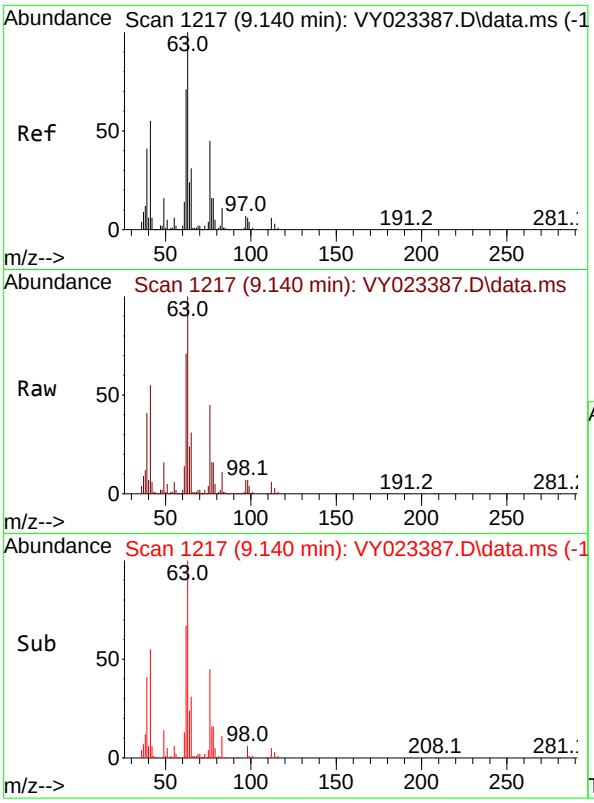


#44
Trichloroethene
Concen: 48.982 ug/l
RT: 8.866 min Scan# 1172
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion:130 Resp: 315104

Ion	Ratio	Lower	Upper
130	100		
95	90.3	0.0	180.6

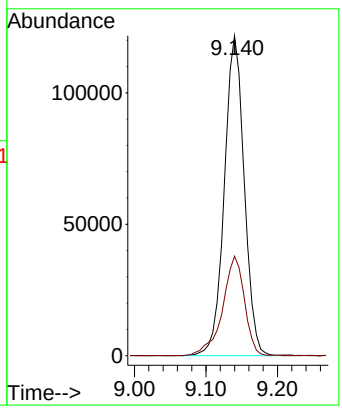




#45
1,2-Dichloropropane
Concen: 45.555 ug/l
RT: 9.140 min Scan# 1
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion: 63 Resp: 23497

Ion	Ratio	Lower	Upper
63	100		
65	31.1	24.9	37.3



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICCC050

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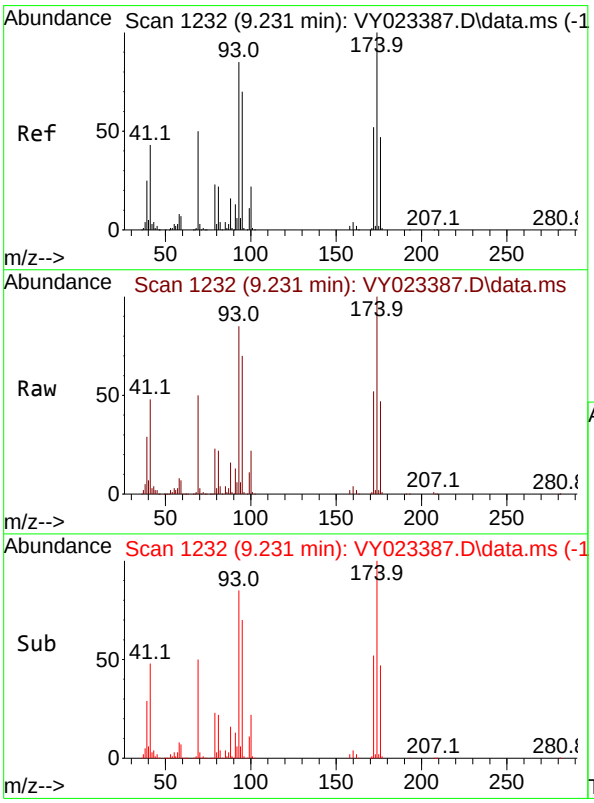
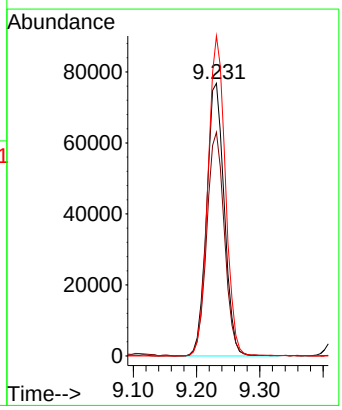
Supervised By :Mahesh Dadoda 10/10/2025

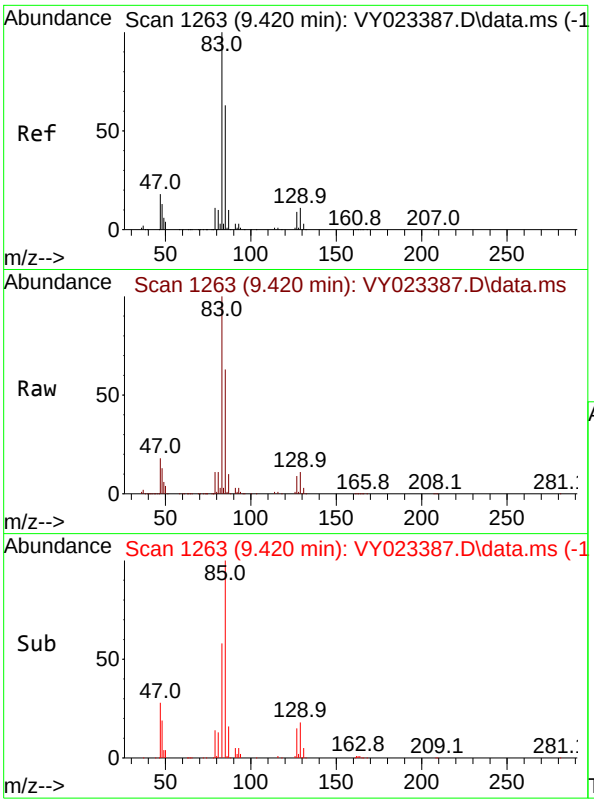


#46
Dibromomethane
Concen: 47.198 ug/l
RT: 9.231 min Scan# 1232
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion: 93 Resp: 148914

Ion	Ratio	Lower	Upper
93	100		
95	81.7	65.4	98.0
174	116.1	92.9	139.3

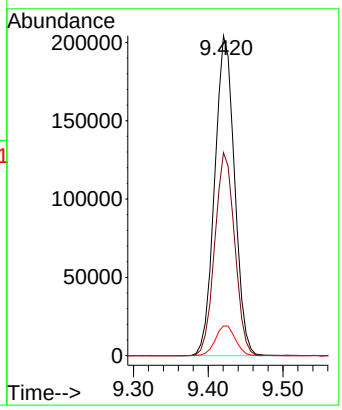




#47
Bromodichloromethane
Concen: 47.482 ug/l
RT: 9.420 min Scan# 1
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion: 83 Resp: 37708

Ion	Ratio	Lower	Upper
83	100		
85	63.5	50.8	76.2
127	9.3	7.4	11.2



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICCC050

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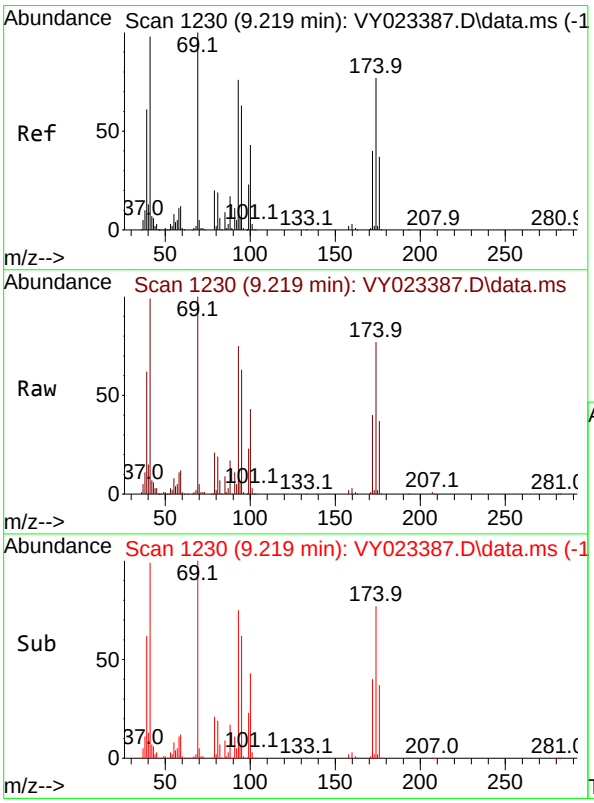
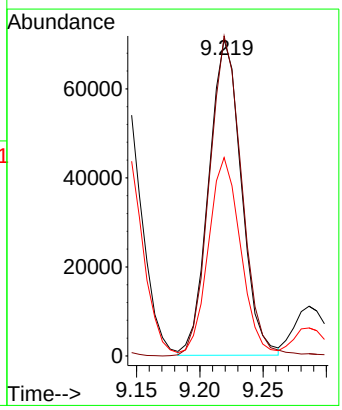
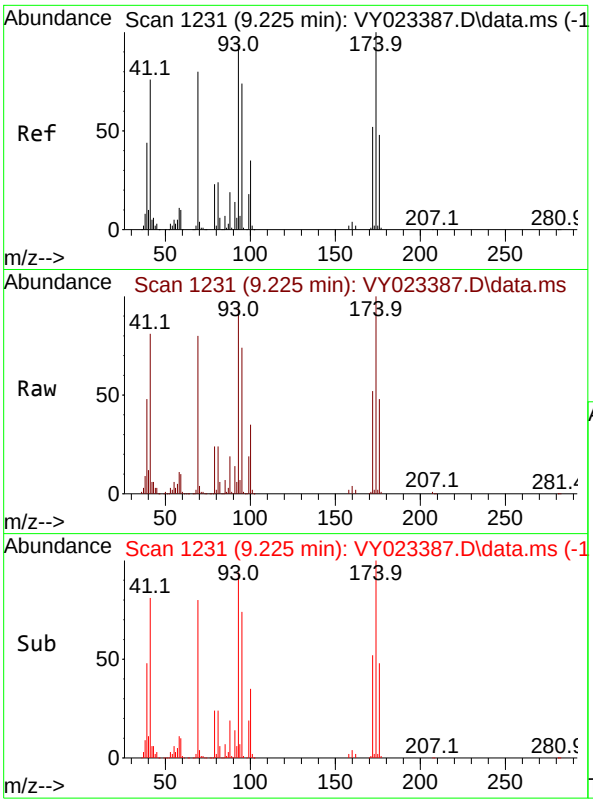


#48
Methyl methacrylate
Concen: 48.027 ug/l
RT: 9.219 min Scan# 1230
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion: 41 Resp: 126732

Ion	Ratio	Lower	Upper
41	100		
69	101.2	81.0	121.4
39	60.3	48.2	72.4





#49
1,4-Dioxane
Concen: 1042.312 ug/l
RT: 9.225 min Scan# 1
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion: 88 Resp: 3405

Ion	Ratio	Lower	Upper
88	100		
43	27.3	21.8	32.8
58	58.5	46.8	70.2

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICCC050

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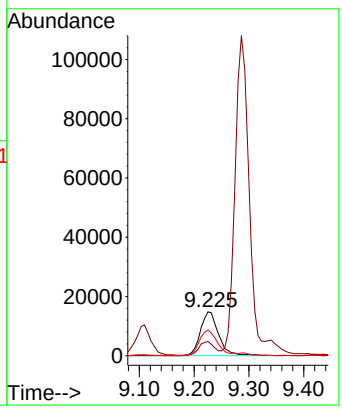
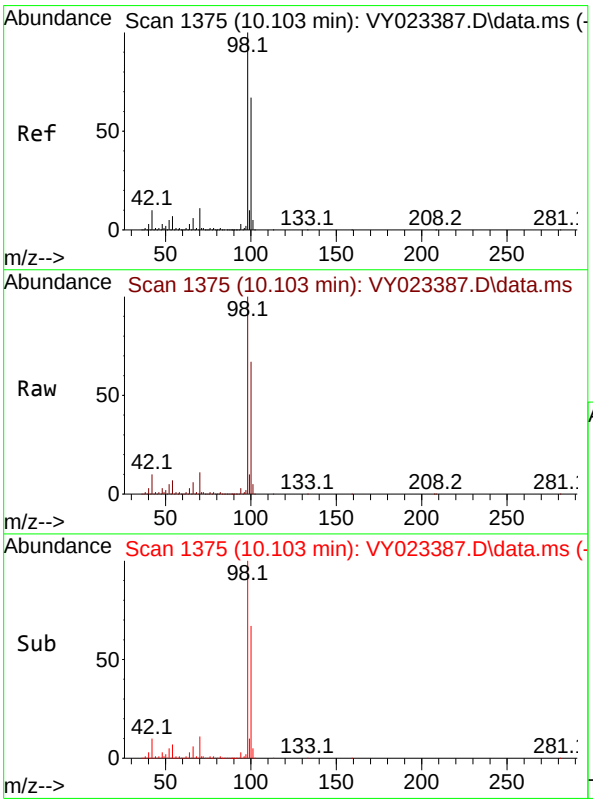
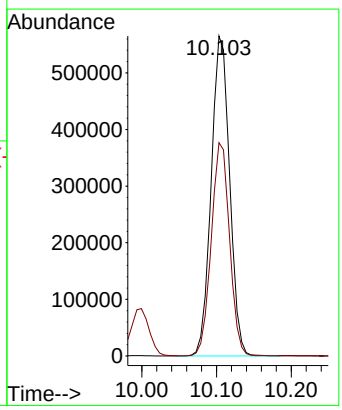


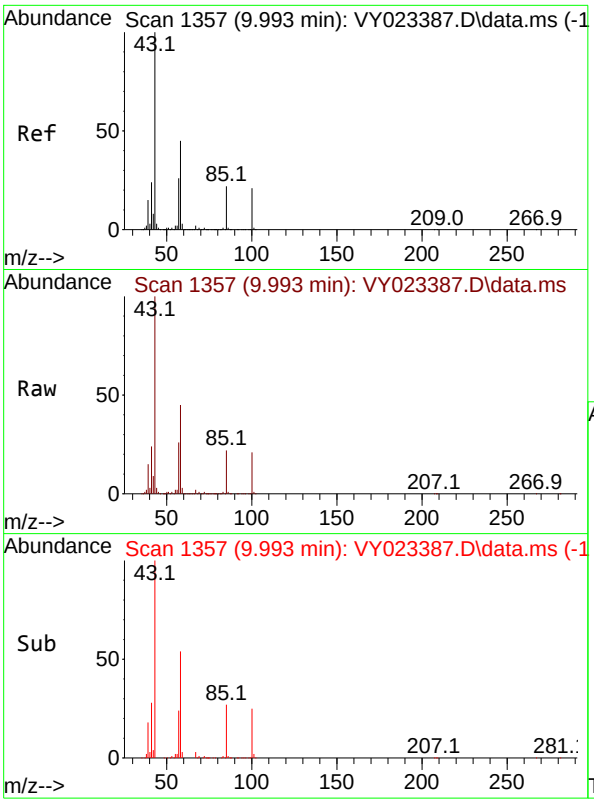


#50
Toluene-d8
Concen: 49.334 ug/l
RT: 10.103 min Scan# 1375
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion: 98 Resp: 969649

Ion	Ratio	Lower	Upper
98	100		
100	66.2	53.0	79.4

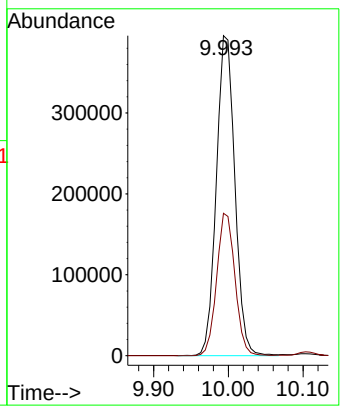




#51
4-Methyl-2-Pentanone
Concen: 235.772 ug/l
RT: 9.993 min Scan# 1
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion: 43 Resp: 68287

Ion	Ratio	Lower	Upper
43	100		
58	44.1	35.3	52.9



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICCC050

Manual Integrations
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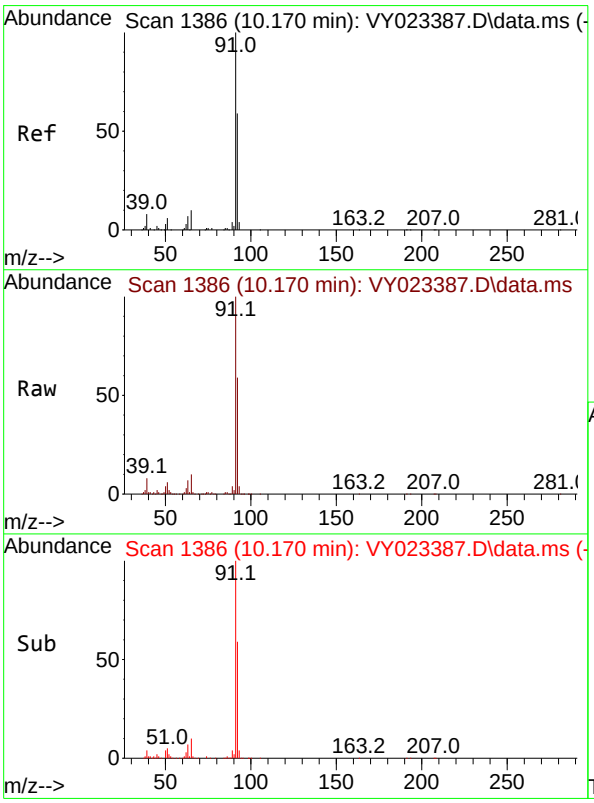
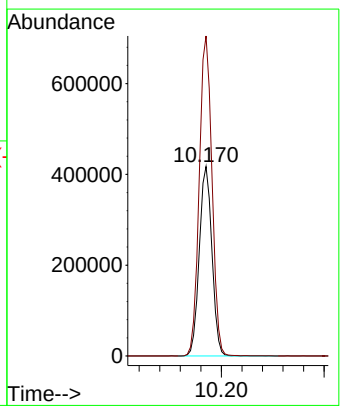
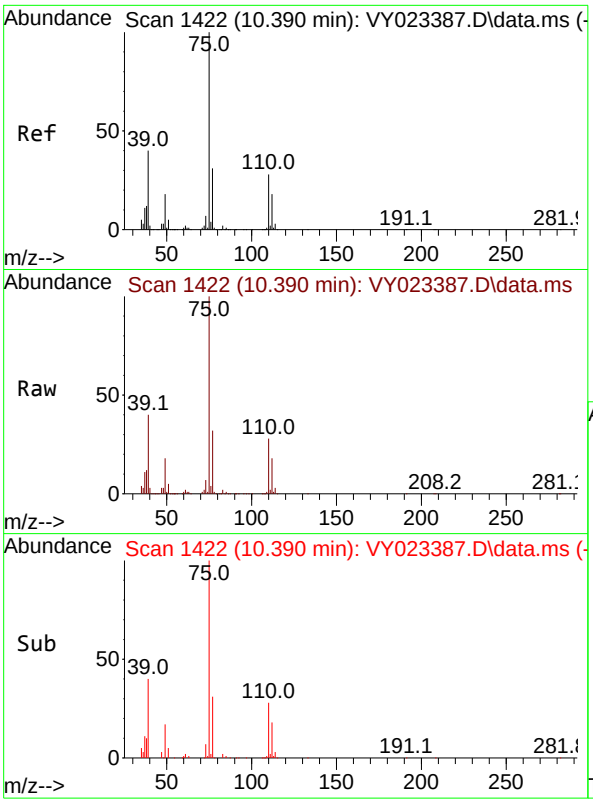


#52
Toluene
Concen: 48.824 ug/l
RT: 10.170 min Scan# 1386
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion: 92 Resp: 710404

Ion	Ratio	Lower	Upper
92	100		
91	170.5	136.4	204.6

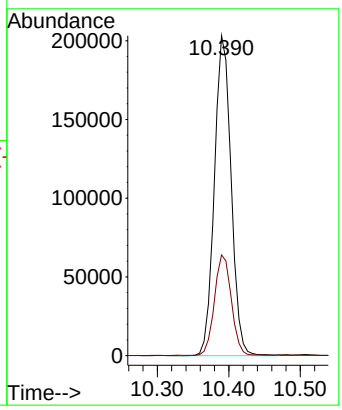




#53
t-1,3-Dichloropropene
Concen: 48.438 ug/l
RT: 10.390 min Scan# 14
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion: 75 Resp: 33039

Ion	Ratio	Lower	Upper
75	100		
77	31.4	25.1	37.7



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICCC050

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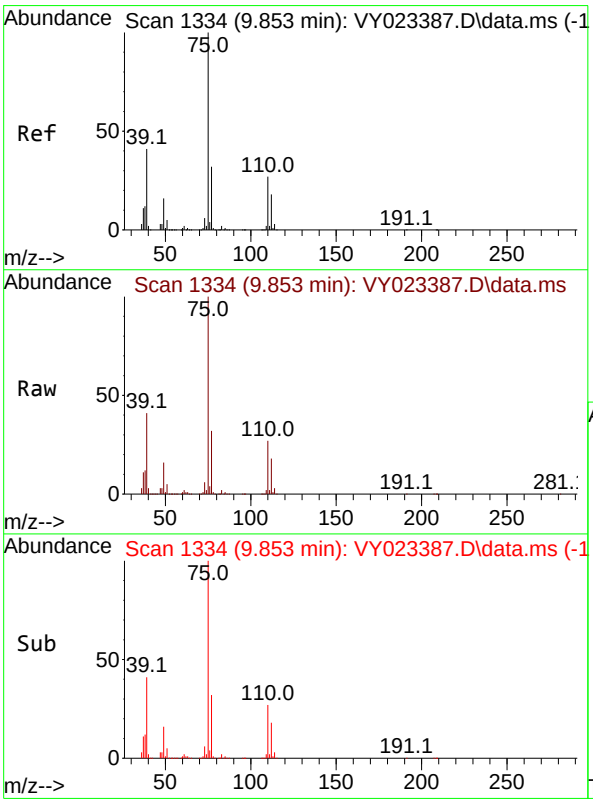
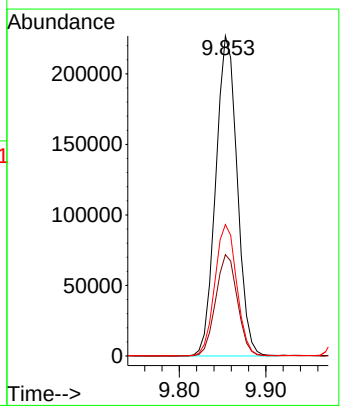
Supervised By :Mahesh Dadoda 10/10/2025

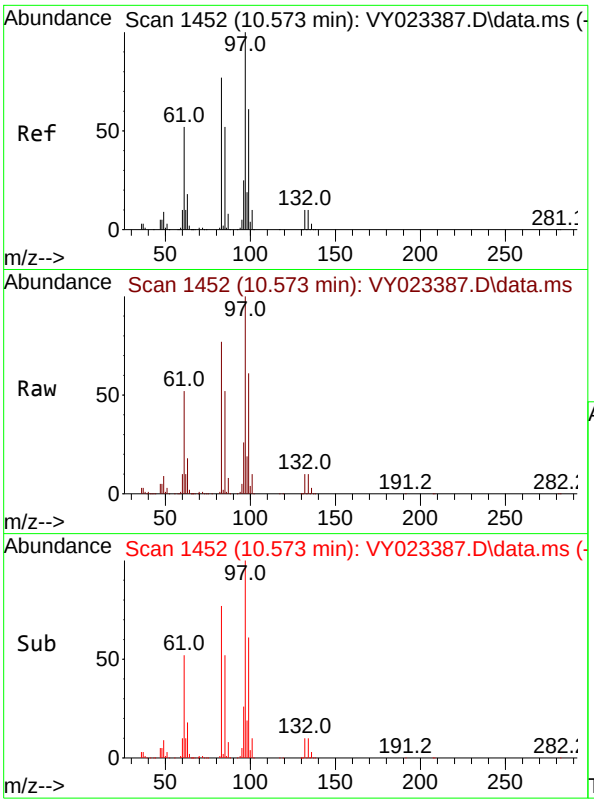


#54
cis-1,3-Dichloropropene
Concen: 47.910 ug/l
RT: 9.853 min Scan# 1334
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion: 75 Resp: 390619

Ion	Ratio	Lower	Upper
75	100		
77	31.7	25.4	38.0
39	41.0	32.8	49.2

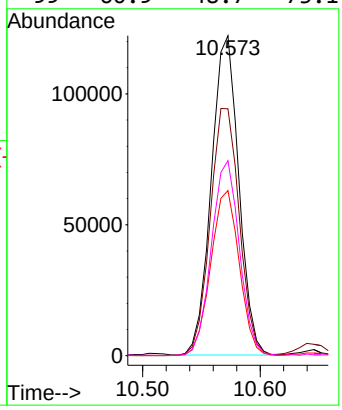




#55
1,1,2-Trichloroethane
Concen: 47.296 ug/l
RT: 10.573 min Scan# 14
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion: 97 Resp: 19847

Ion	Ratio	Lower	Upper
97	100		
83	77.2	61.8	92.6
85	51.6	41.3	61.9
99	60.9	48.7	73.1



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICCC050

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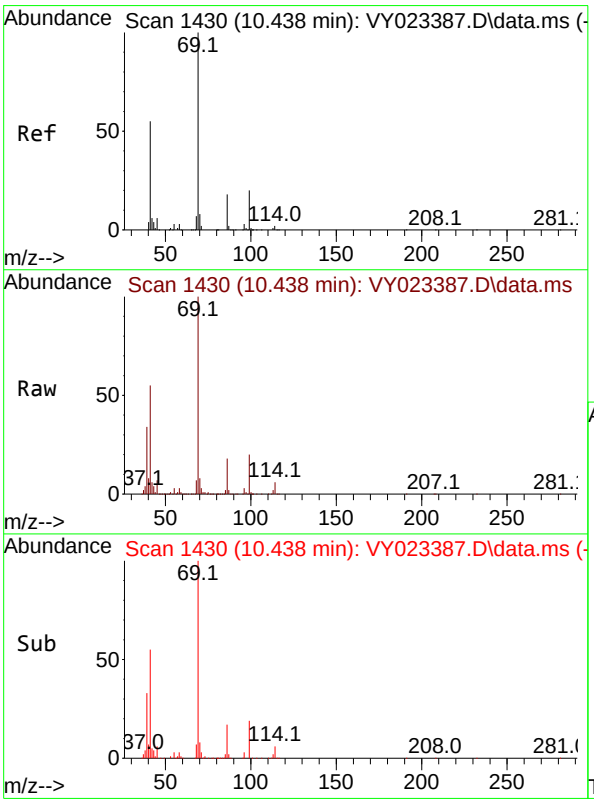
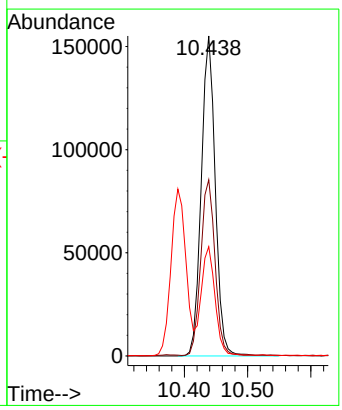
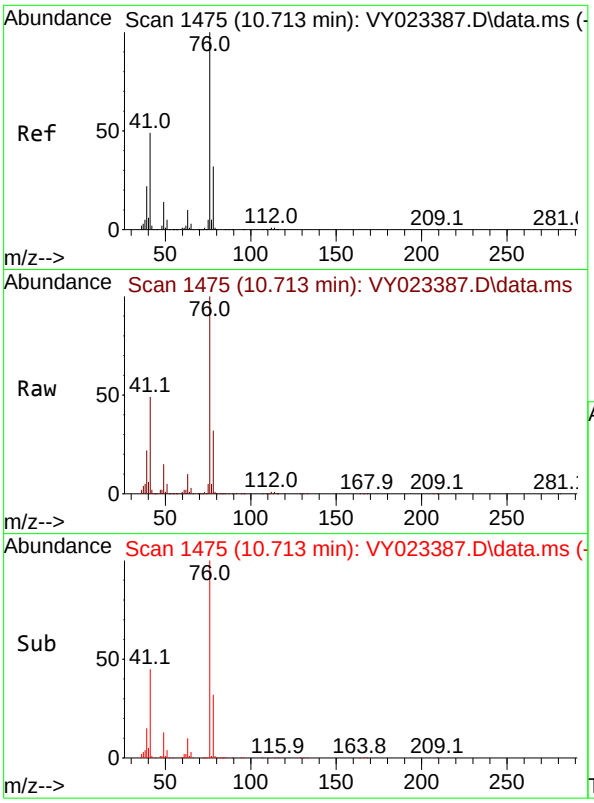


#56
Ethyl methacrylate
Concen: 49.535 ug/l
RT: 10.438 min Scan# 1430
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion: 69 Resp: 239407

Ion	Ratio	Lower	Upper
69	100		
41	55.8	44.6	67.0
39	33.7	27.0	40.4

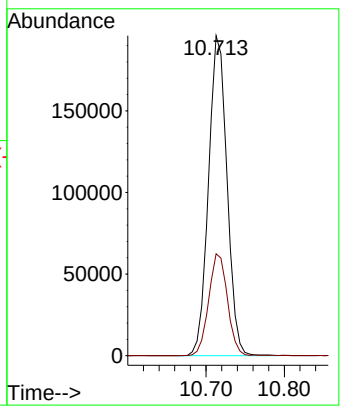




#57
1,3-Dichloropropane
Concen: 47.301 ug/l
RT: 10.713 min Scan# 14
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion: 76 Resp: 32127(

Ion	Ratio	Lower	Upper
76	100		
78	32.4	25.9	38.9



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICCC050

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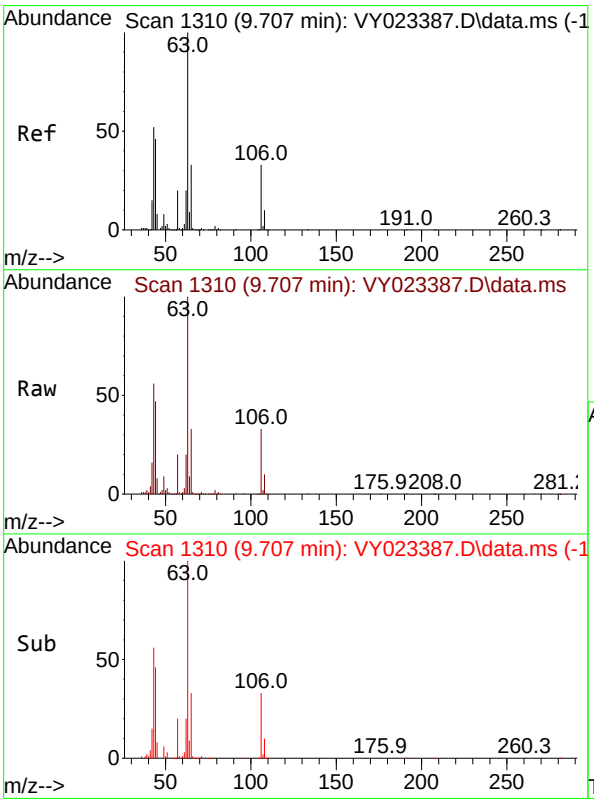
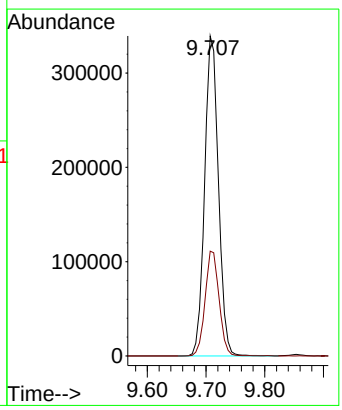
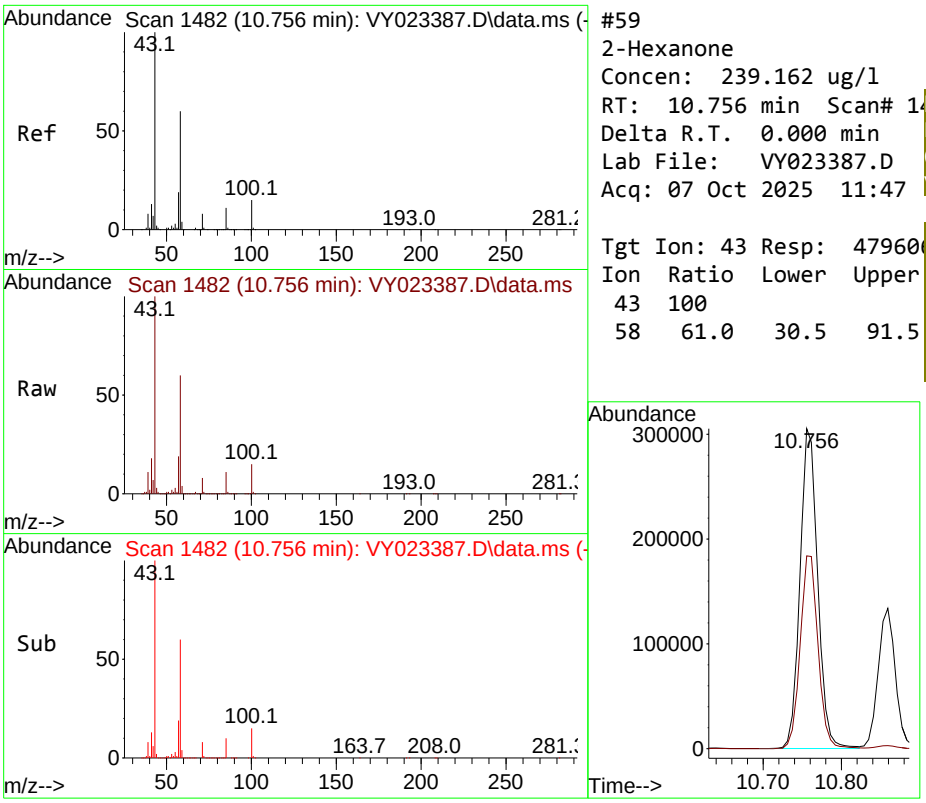


#58
2-Chloroethyl Vinyl ether
Concen: 261.921 ug/l
RT: 9.707 min Scan# 1310
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion: 63 Resp: 553816

Ion	Ratio	Lower	Upper
63	100		
106	33.2	26.6	39.8





#59
2-Hexanone
Concen: 239.162 ug/l
RT: 10.756 min Scan# 14
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion: 43 Resp: 47960

Ion	Ratio	Lower	Upper
43	100		
58	61.0	30.5	91.5

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICCC050

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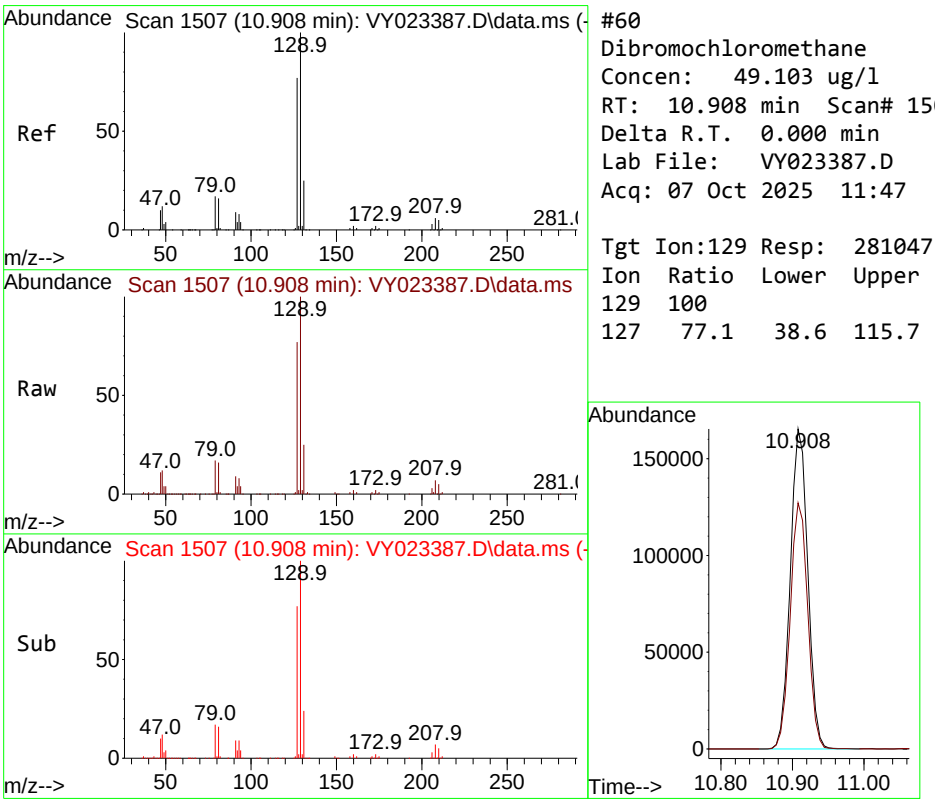
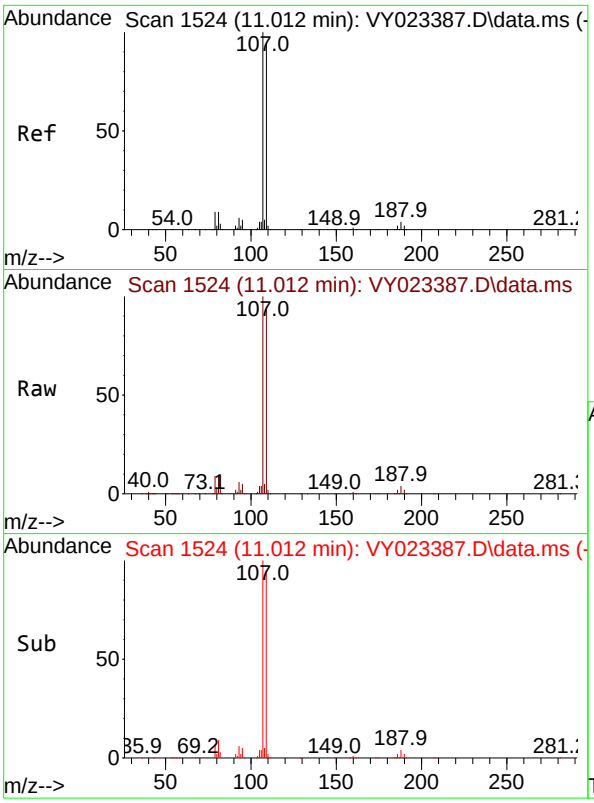


#60
Dibromochloromethane
Concen: 49.103 ug/l
RT: 10.908 min Scan# 1507
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion:129 Resp: 281047

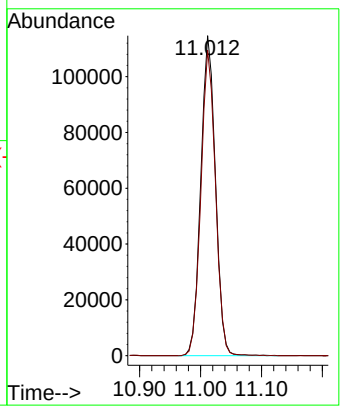
Ion	Ratio	Lower	Upper
129	100		
127	77.1	38.6	115.7



#61
1,2-Dibromoethane
Concen: 48.468 ug/l
RT: 11.012 min Scan# 1
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion:107 Resp: 19135

Ion	Ratio	Lower	Upper
107	100		
109	95.1	76.1	114.1



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICCC050

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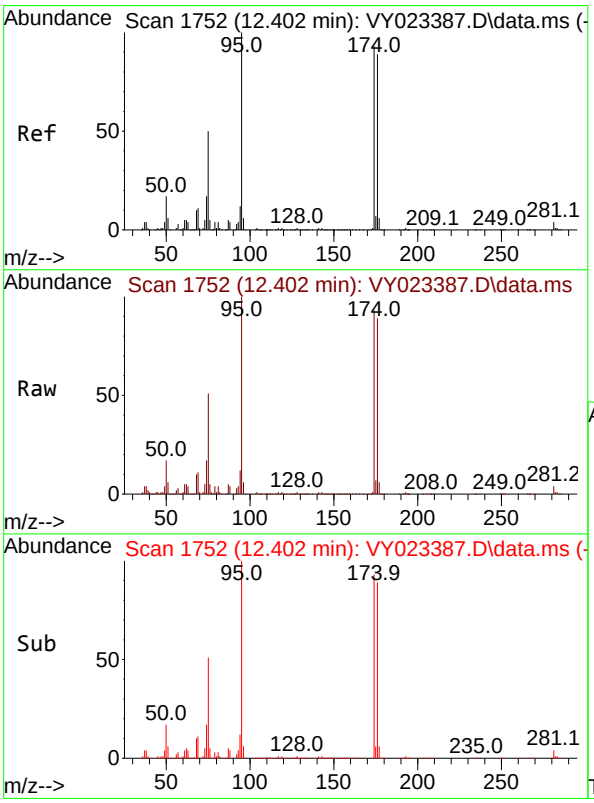
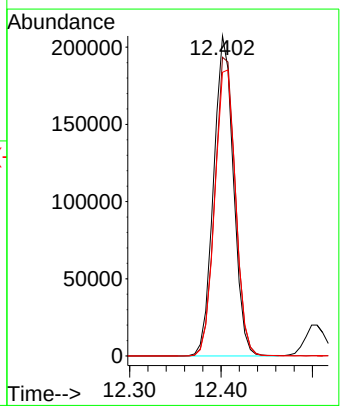
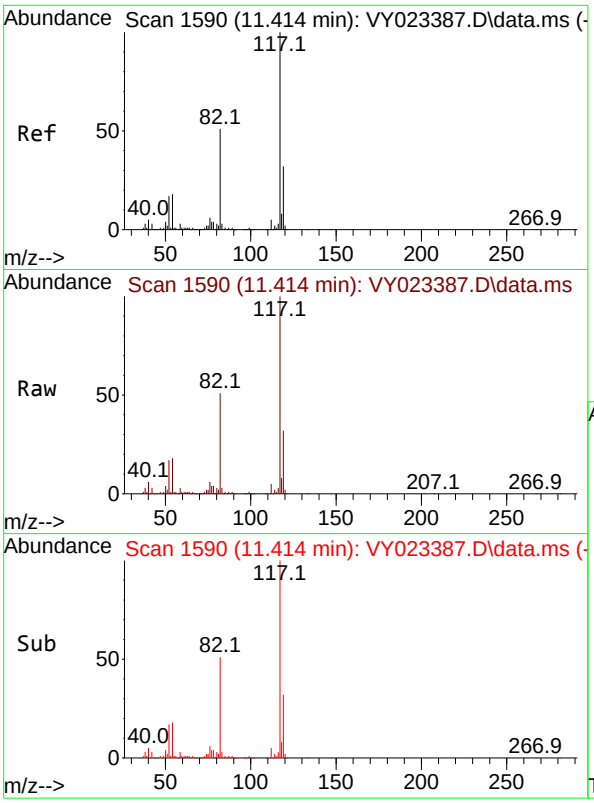


#62
4-Bromofluorobenzene
Concen: 50.546 ug/l
RT: 12.402 min Scan# 1752
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion: 95 Resp: 313426

Ion	Ratio	Lower	Upper
95	100		
174	96.4	0.0	192.8
176	93.8	0.0	187.6

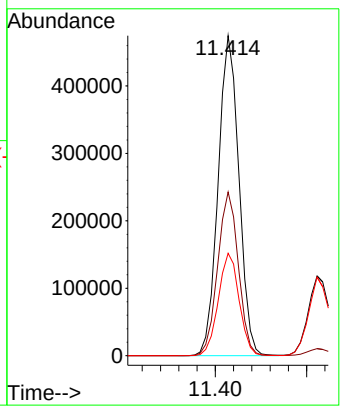




#63
Chlorobenzene-d5
Concen: 50.000 ug/l
RT: 11.414 min Scan# 1
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion:117 Resp: 74986

Ion	Ratio	Lower	Upper
117	100		
82	51.2	41.0	61.4
119	32.0	25.6	38.4



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICCC050

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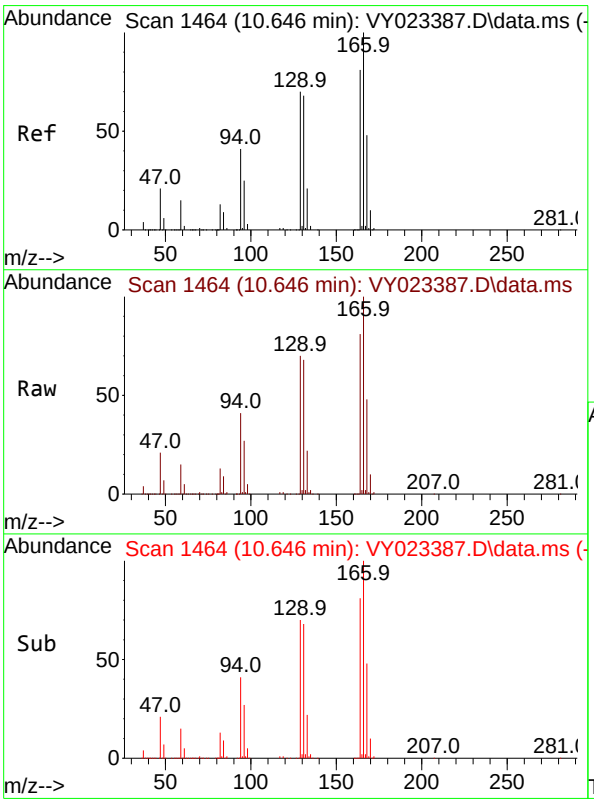
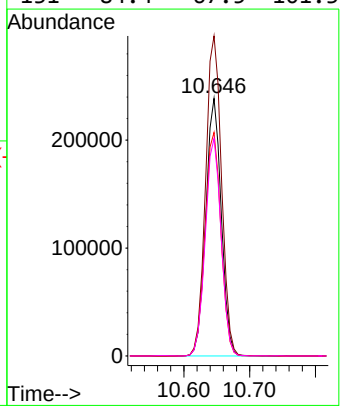
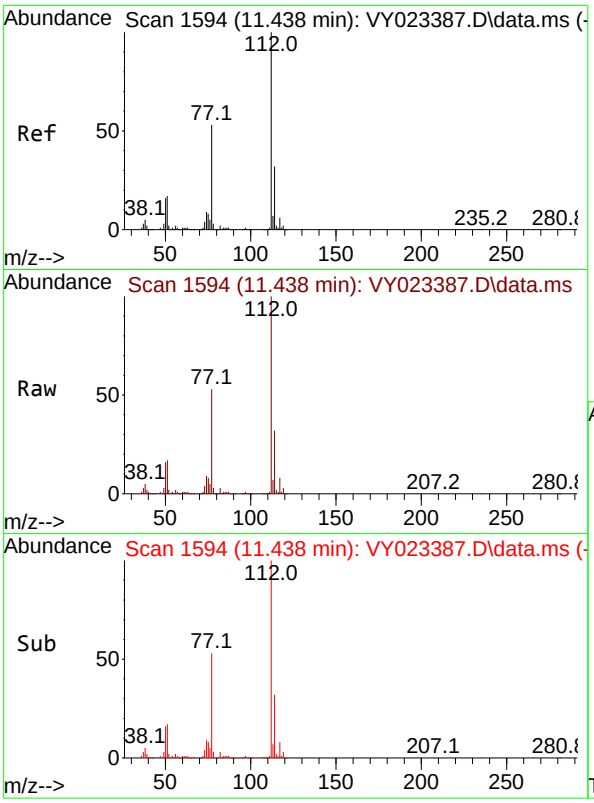


#64
Tetrachloroethene
Concen: 52.264 ug/l
RT: 10.646 min Scan# 1464
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion:164 Resp: 392056

Ion	Ratio	Lower	Upper
164	100		
166	124.2	99.4	149.0
129	86.8	69.4	104.2
131	84.4	67.5	101.3

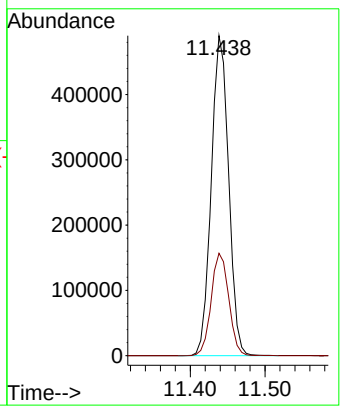




#65
Chlorobenzene
Concen: 48.460 ug/l
RT: 11.438 min Scan# 1
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion:112 Resp: 78965

Ion	Ratio	Lower	Upper
112	100		
114	32.0	25.6	38.4



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICCC050

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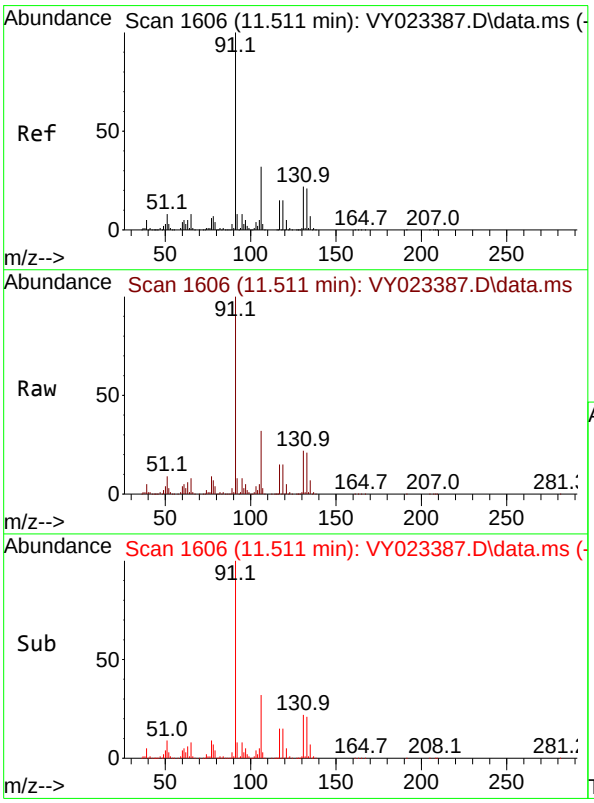
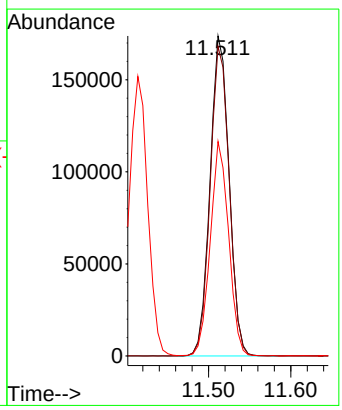
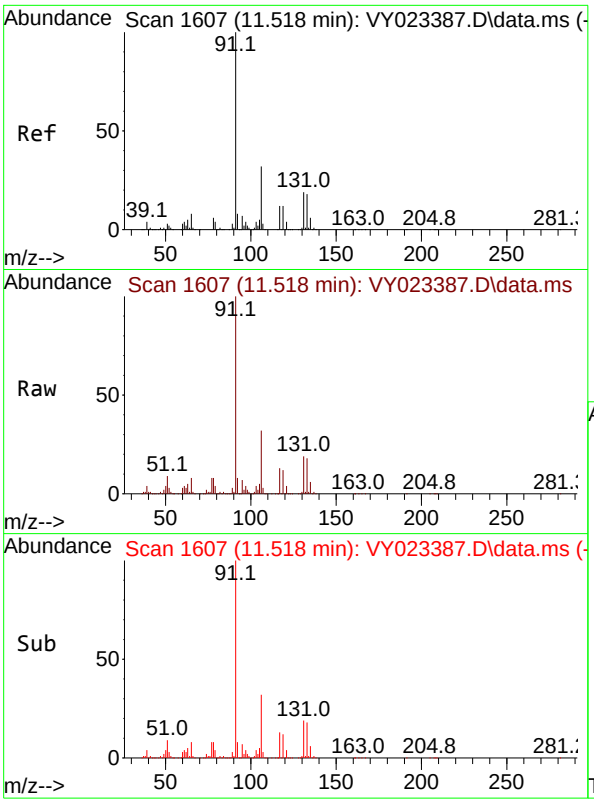


#66
1,1,1,2-Tetrachloroethane
Concen: 48.788 ug/l
RT: 11.511 min Scan# 1606
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion:131 Resp: 279583

Ion	Ratio	Lower	Upper
131	100		
133	96.8	48.4	145.2
119	64.8	32.4	97.2

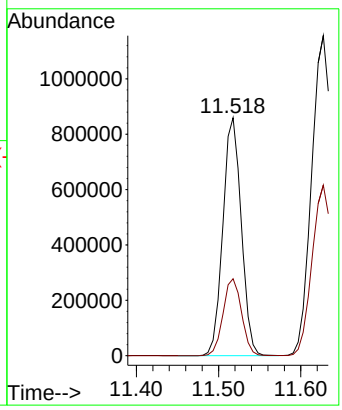




#67
Ethyl Benzene
Concen: 50.099 ug/l
RT: 11.518 min Scan# 1
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion: 91 Resp: 133235

Ion	Ratio	Lower	Upper
91	100		
106	32.3	25.8	38.8



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICCC050

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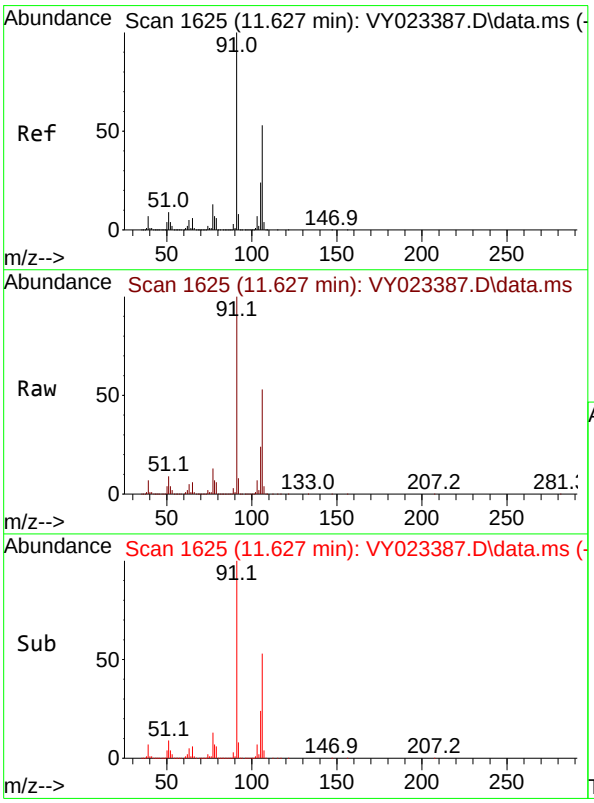
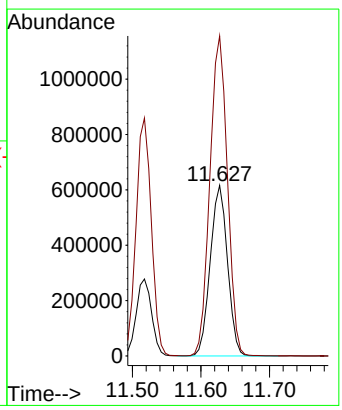
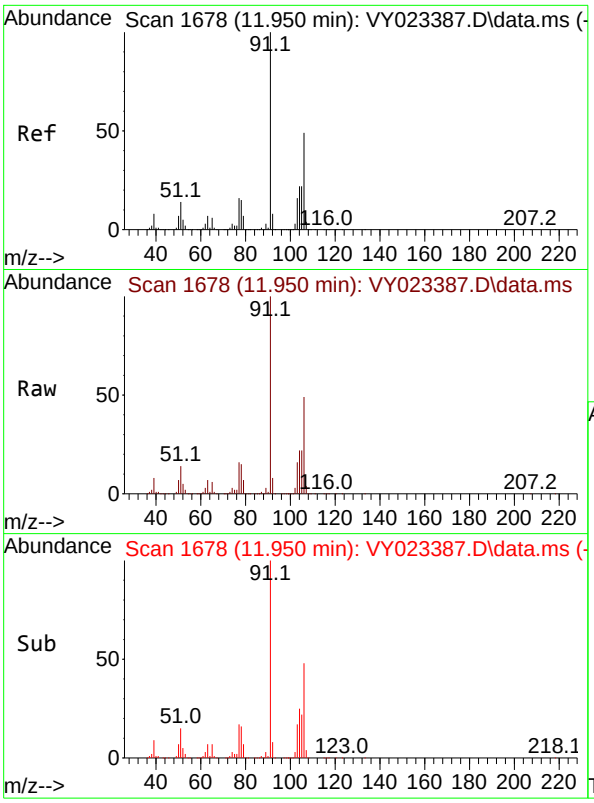


#68
m/p-Xylenes
Concen: 101.092 ug/l
RT: 11.627 min Scan# 1625
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion:106 Resp: 1077583

Ion	Ratio	Lower	Upper
106	100		
91	190.8	152.6	229.0





#69
o-Xylene
Concen: 50.946 ug/l
RT: 11.950 min Scan# 1
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion:106 Resp: 50272

Ion	Ratio	Lower	Upper
106	100		
91	202.7	101.4	304.1

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICCC050

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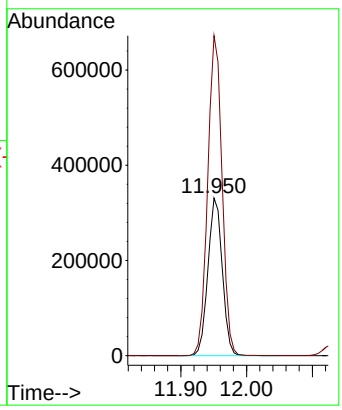
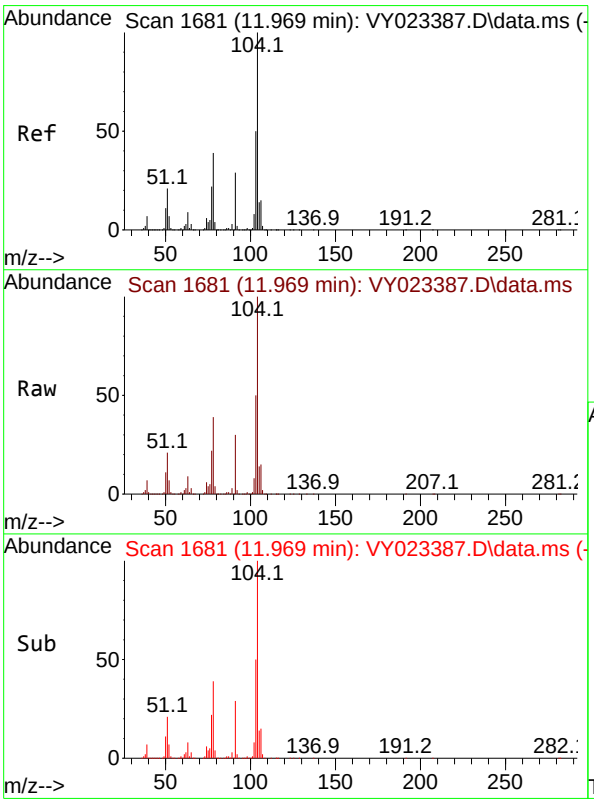
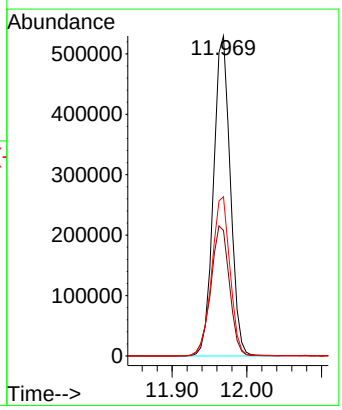


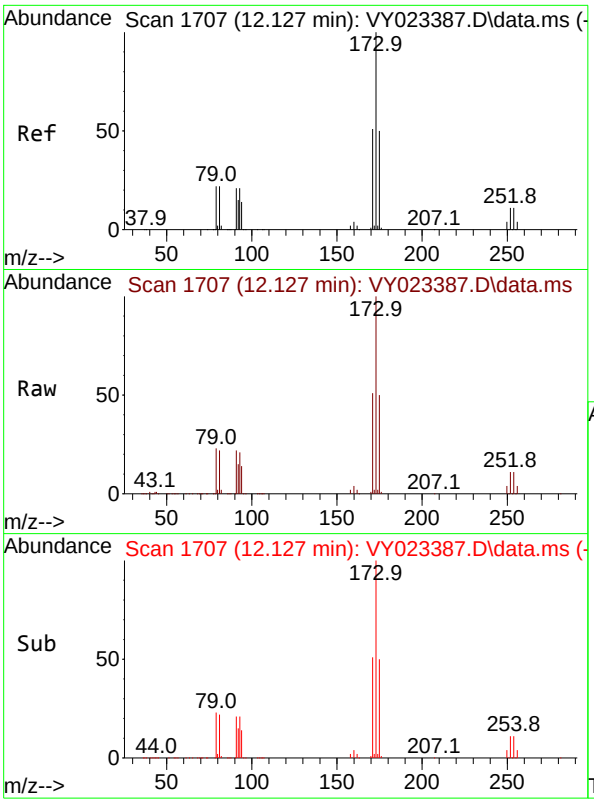


#70
Styrene
Concen: 51.059 ug/l
RT: 11.969 min Scan# 1681
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion:104 Resp: 831908

Ion	Ratio	Lower	Upper
104	100		
78	45.1	36.1	54.1
103	54.0	43.2	64.8

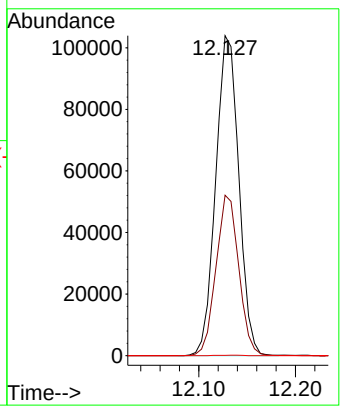




#71
Bromoform
Concen: 50.229 ug/l
RT: 12.127 min Scan# 1
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion:173 Resp: 17231

Ion	Ratio	Lower	Upper
173	100		
175	49.5	24.8	74.3
254	0.1	0.1	0.1



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICCC050

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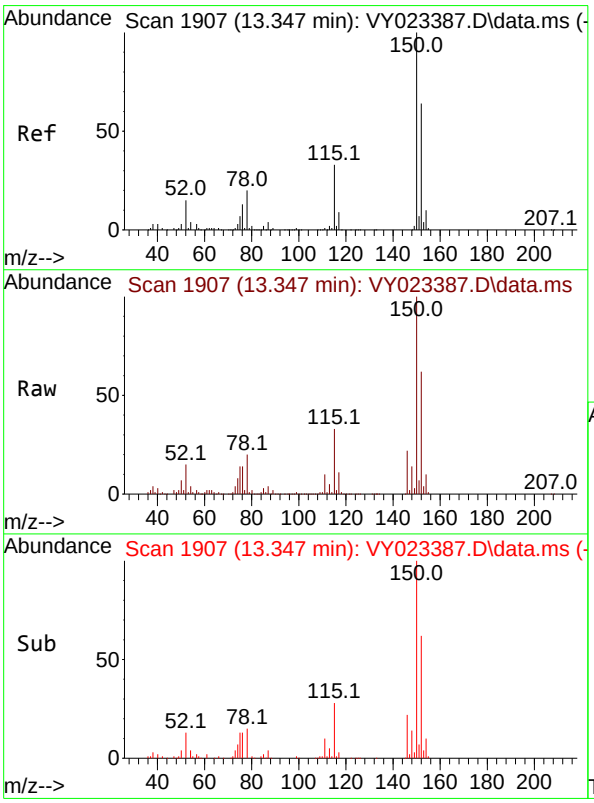
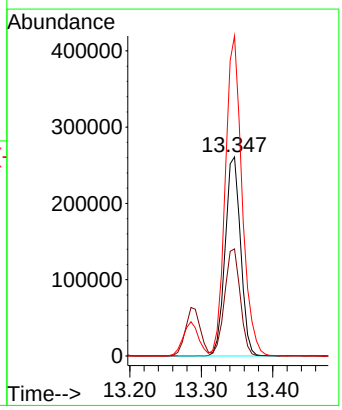
Supervised By :Mahesh Dadoda 10/10/2025

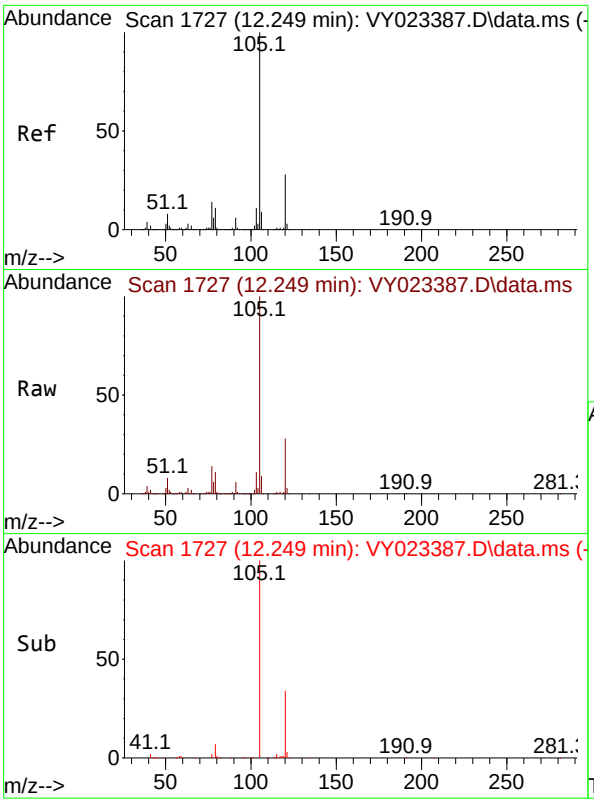


#72
1,4-Dichlorobenzene-d4
Concen: 50.000 ug/l
RT: 13.347 min Scan# 1907
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion:152 Resp: 392169

Ion	Ratio	Lower	Upper
152	100		
115	54.1	27.1	81.2
150	173.7	0.0	347.4

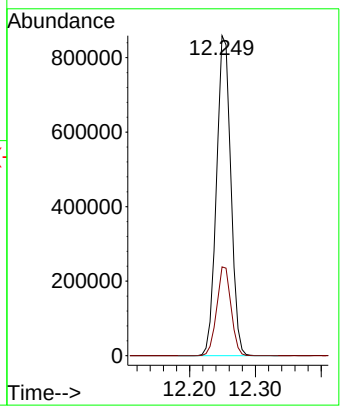




#73
Isopropylbenzene
Concen: 49.803 ug/l
RT: 12.249 min Scan# 1
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion:105 Resp: 130100

Ion	Ratio	Lower	Upper
105	100		
120	27.8	13.9	41.7



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICCC050

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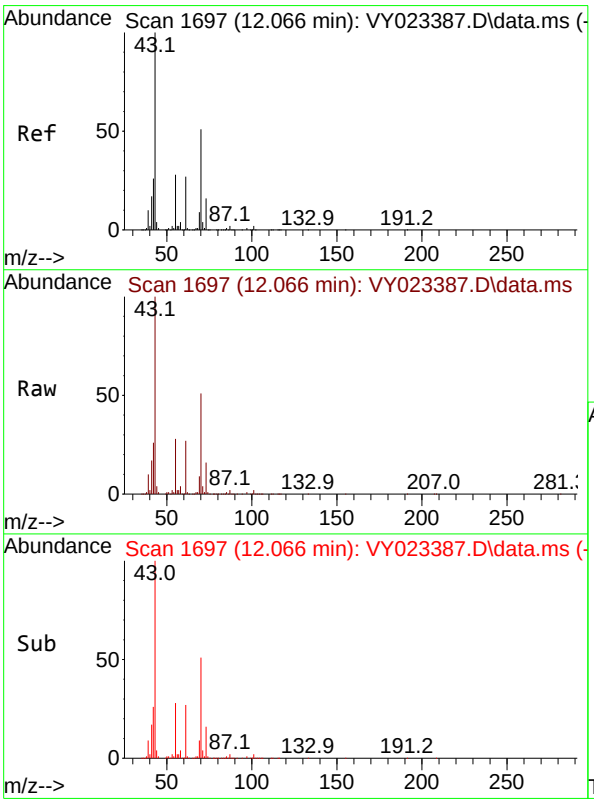
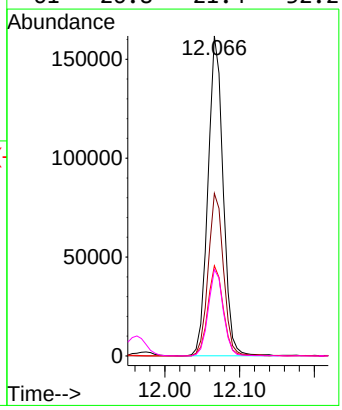
Supervised By :Mahesh Dadoda 10/10/2025

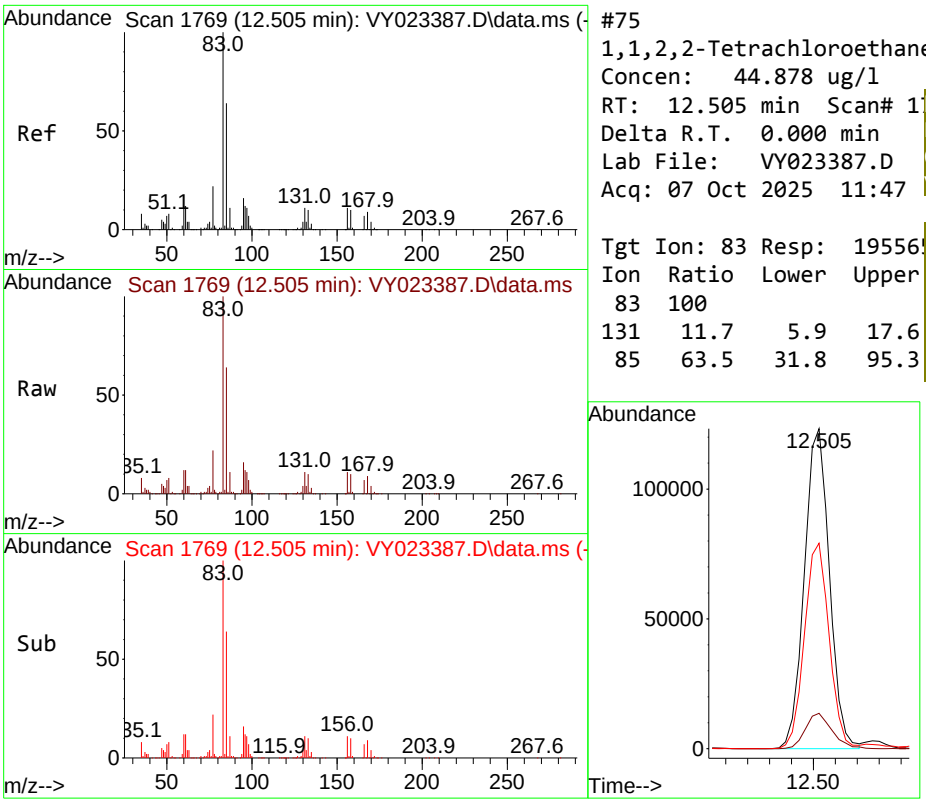


#74
N-amyl acetate
Concen: 46.640 ug/l
RT: 12.066 min Scan# 1697
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion: 43 Resp: 227684

Ion	Ratio	Lower	Upper
43	100		
70	51.4	41.1	61.7
55	28.8	23.0	34.6
61	26.8	21.4	32.2





#75
1,1,2,2-Tetrachloroethane
Concen: 44.878 ug/l
RT: 12.505 min Scan# 1
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion: 83 Resp: 19556

Ion	Ratio	Lower	Upper
83	100		
131	11.7	5.9	17.6
85	63.5	31.8	95.3

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICCC050

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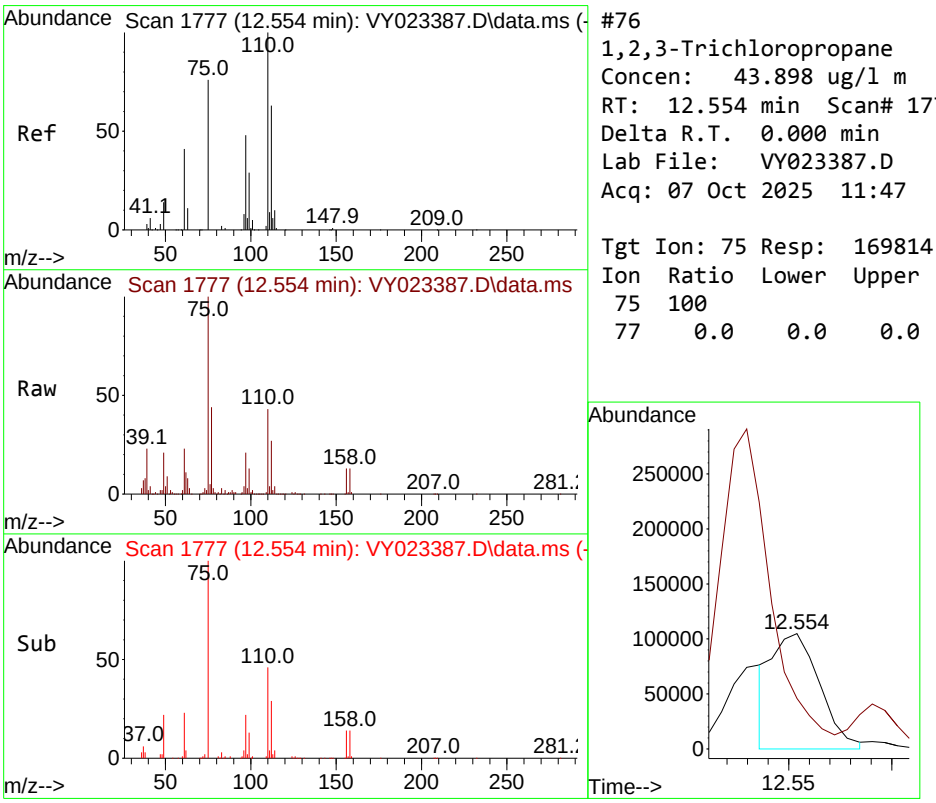
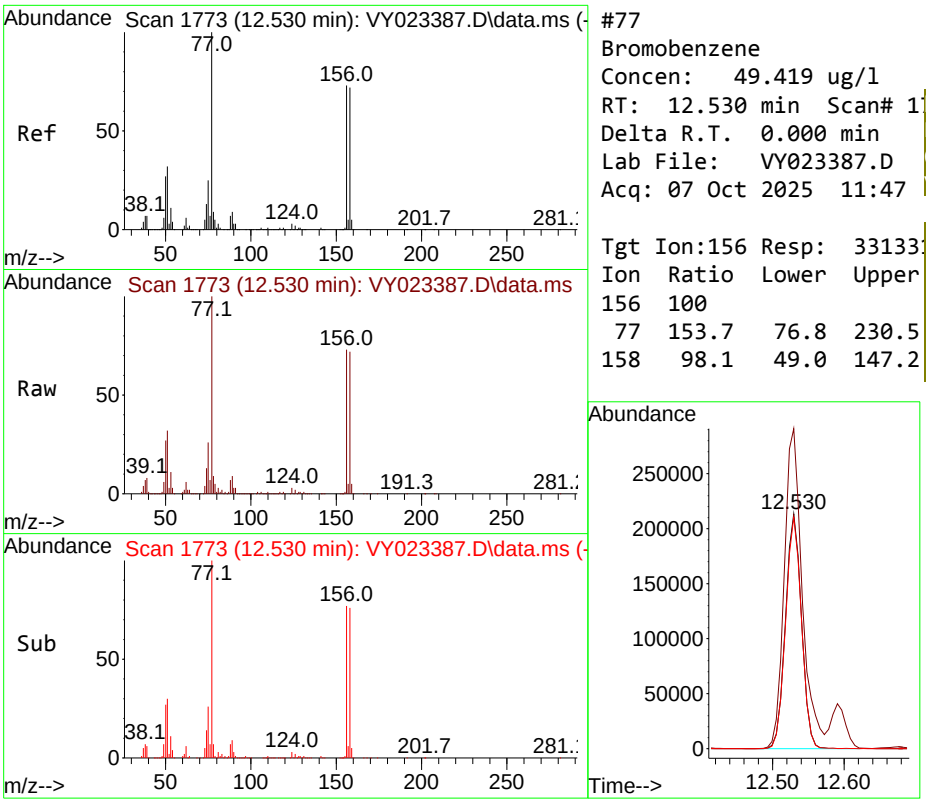
Supervised By :Mahesh Dadoda 10/10/2025



#76
1,2,3-Trichloropropane
Concen: 43.898 ug/l m
RT: 12.554 min Scan# 1777
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion: 75 Resp: 169814

Ion	Ratio	Lower	Upper
75	100		
77	0.0	0.0	0.0



#77
Bromobenzene
Concen: 49.419 ug/l
RT: 12.530 min Scan# 1
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion:156 Resp: 33133

Ion	Ratio	Lower	Upper
156	100		
77	153.7	76.8	230.5
158	98.1	49.0	147.2

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICCC050

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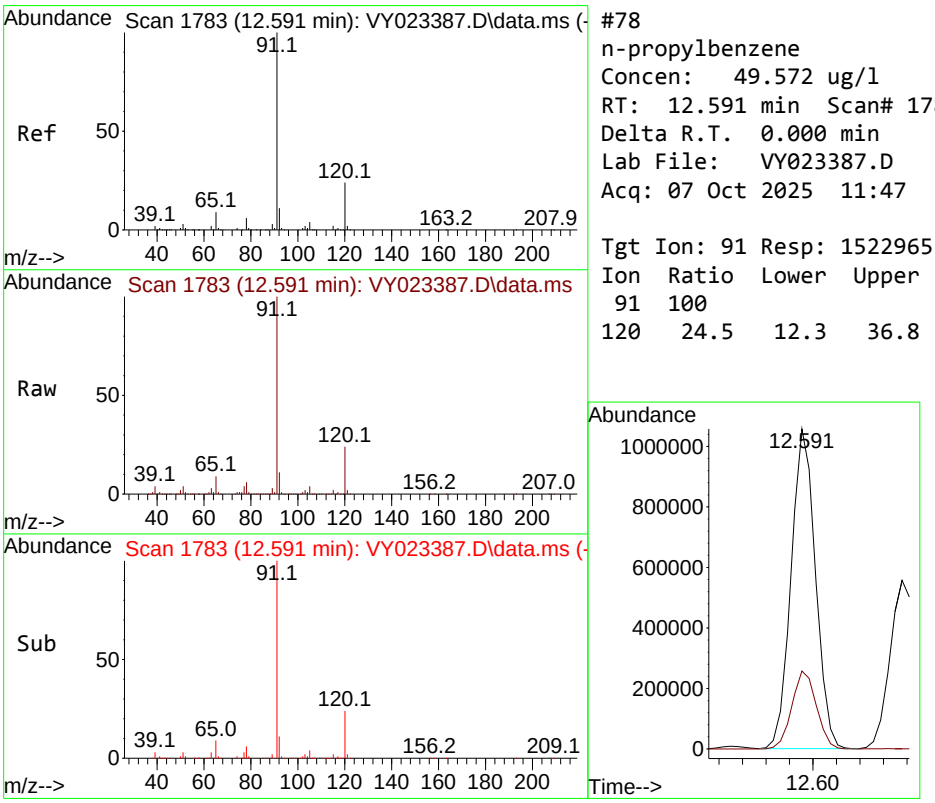
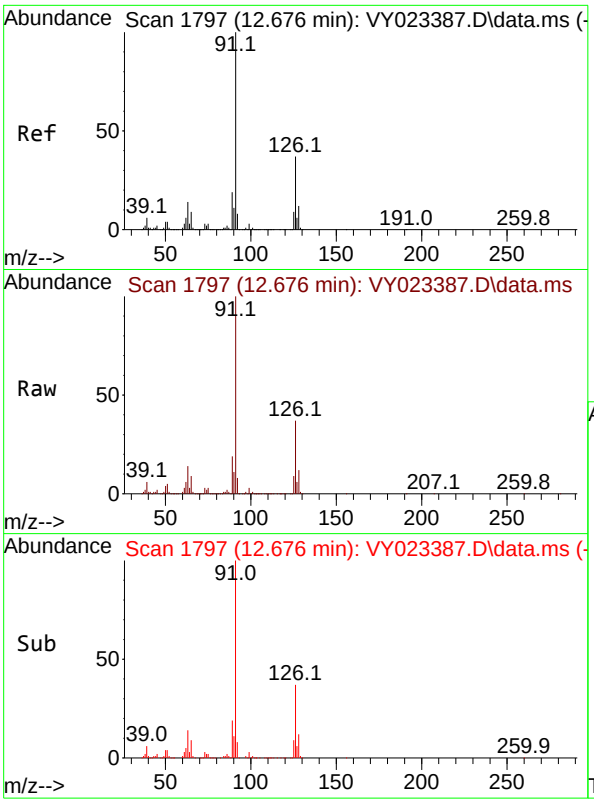
Supervised By :Mahesh Dadoda 10/10/2025



#78
n-propylbenzene
Concen: 49.572 ug/l
RT: 12.591 min Scan# 1783
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion: 91 Resp: 1522965

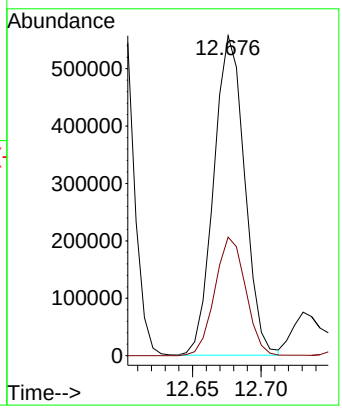
Ion	Ratio	Lower	Upper
91	100		
120	24.5	12.3	36.8



#79
2-Chlorotoluene
Concen: 49.235 ug/l
RT: 12.676 min Scan# 1
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion: 91 Resp: 87333

Ion	Ratio	Lower	Upper
91	100		
126	37.0	18.5	55.5



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICCC050

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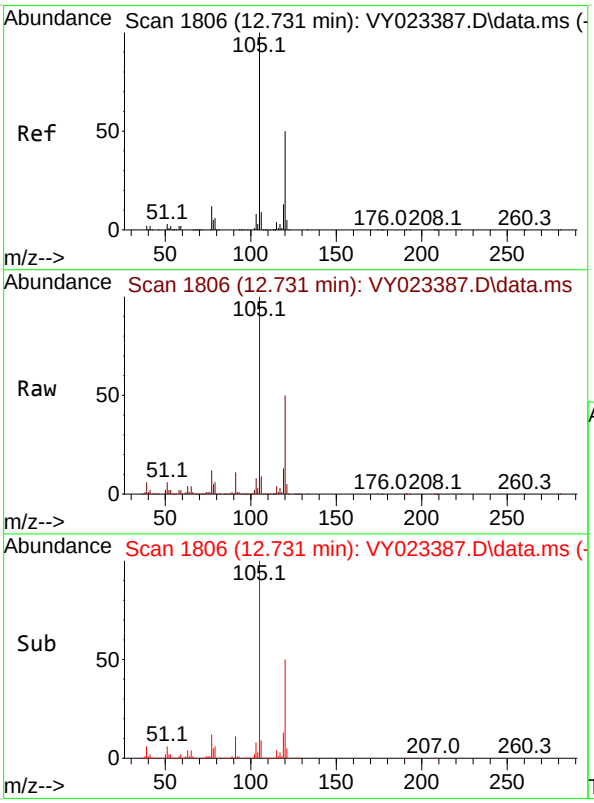
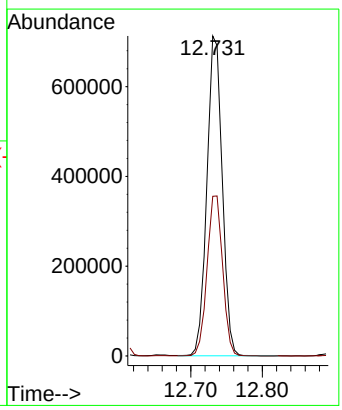
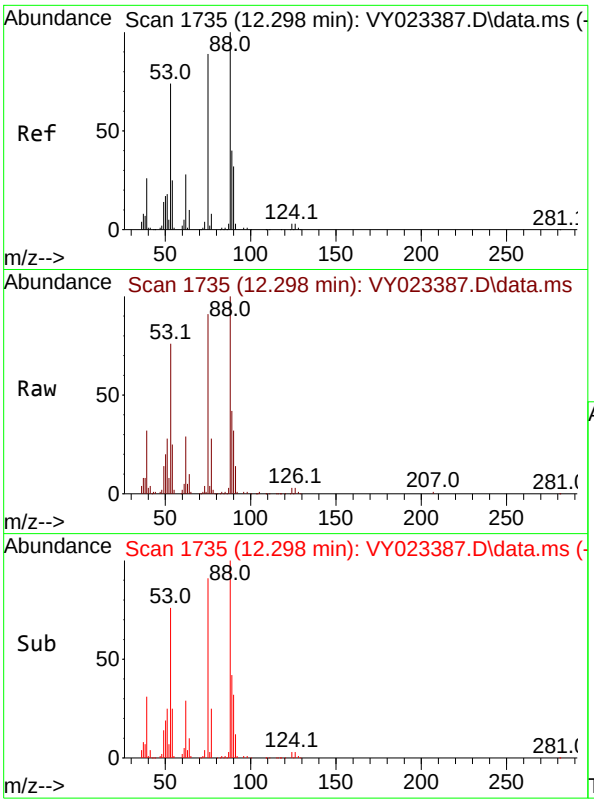


#80
1,3,5-Trimethylbenzene
Concen: 49.966 ug/l
RT: 12.731 min Scan# 1806
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion:105 Resp: 1061112

Ion	Ratio	Lower	Upper
105	100		
120	50.9	25.4	76.4





#81
trans-1,4-Dichloro-2-butene
Concen: 46.212 ug/l
RT: 12.298 min Scan# 1
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion: 75 Resp: 6629

Ion	Ratio	Lower	Upper
75	100		
53	85.7	68.6	102.8
89	48.7	39.0	58.4

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICCC050

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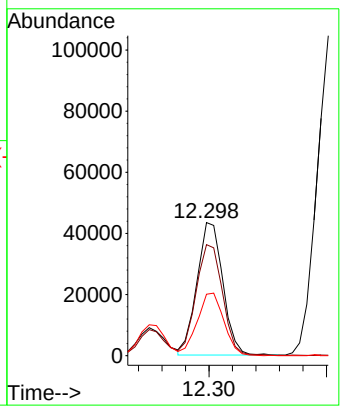
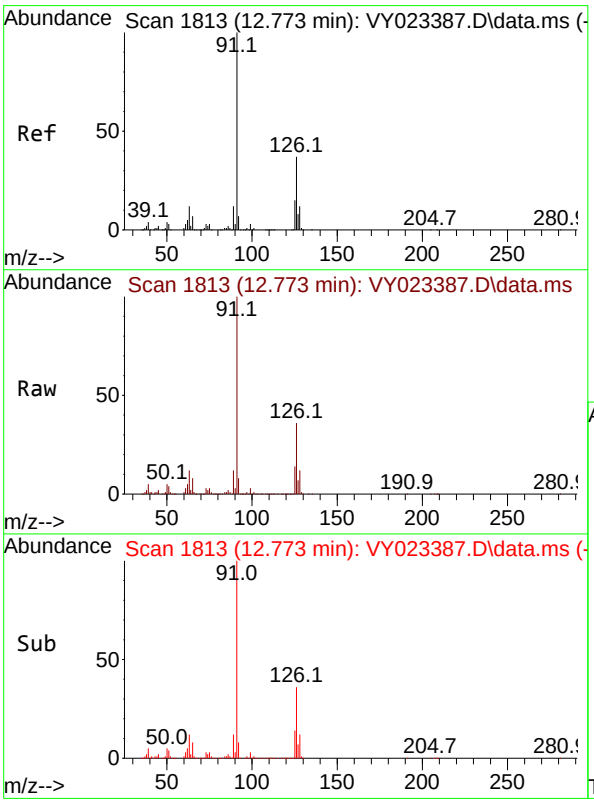
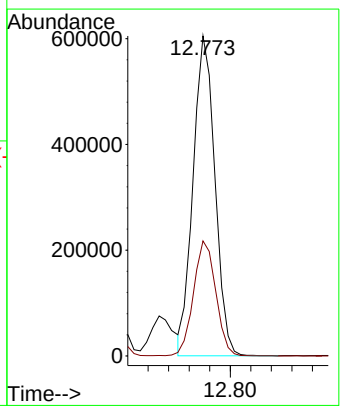


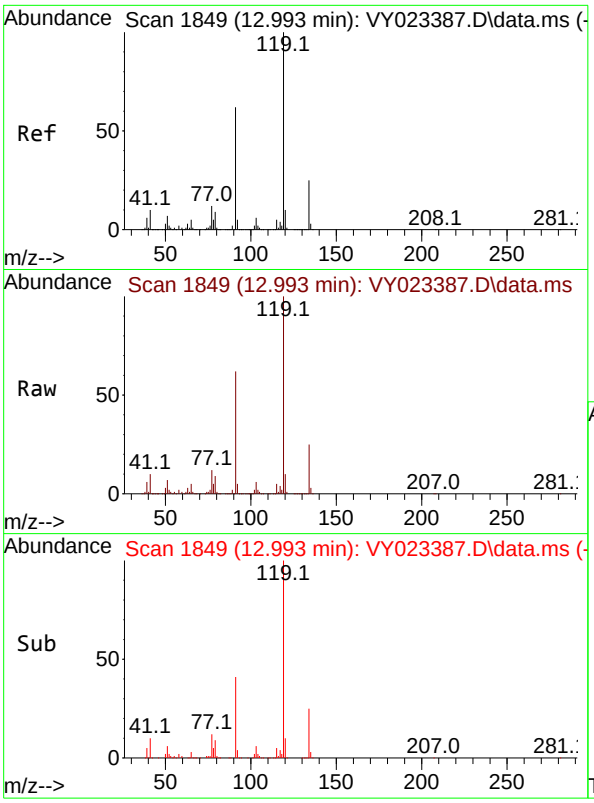


#82
4-Chlorotoluene
Concen: 48.192 ug/l
RT: 12.773 min Scan# 1813
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion: 91 Resp: 892764

Ion	Ratio	Lower	Upper
91	100		
126	36.9	18.4	55.4

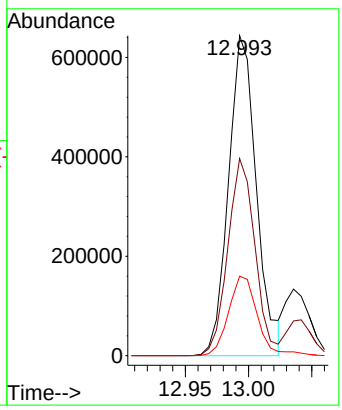




#83
tert-Butylbenzene
Concen: 51.104 ug/l
RT: 12.993 min Scan# 1
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion:119 Resp: 98893

Ion	Ratio	Lower	Upper
119	100		
91	59.9	29.9	89.8
134	25.8	12.9	38.7



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICCC050

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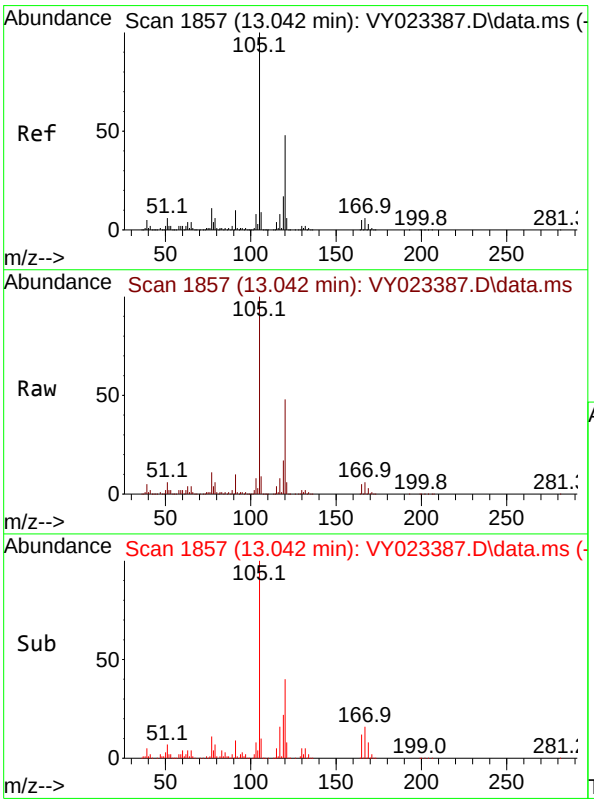
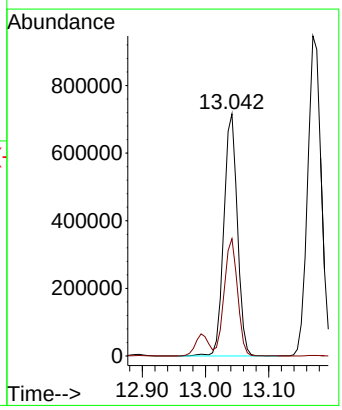
Supervised By :Mahesh Dadoda 10/10/2025

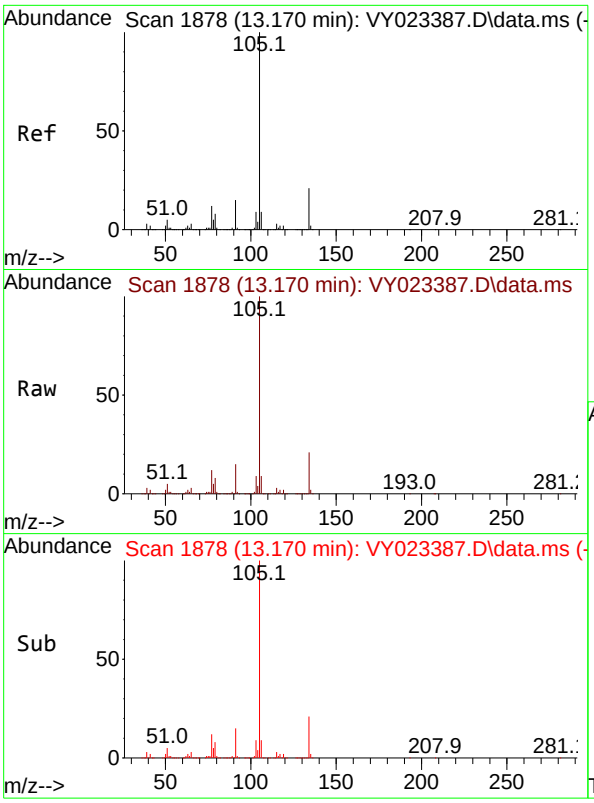


#84
1,2,4-Trimethylbenzene
Concen: 50.505 ug/l
RT: 13.042 min Scan# 1857
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion:105 Resp: 1061159

Ion	Ratio	Lower	Upper
105	100		
120	47.5	23.8	71.2

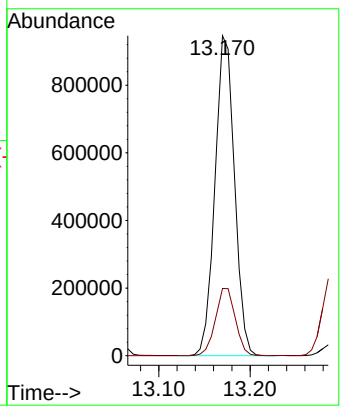




#85
sec-Butylbenzene
Concen: 50.133 ug/l
RT: 13.170 min Scan# 1
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion:105 Resp: 140500

Ion	Ratio	Lower	Upper
105	100		
134	21.4	10.7	32.1



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICCC050

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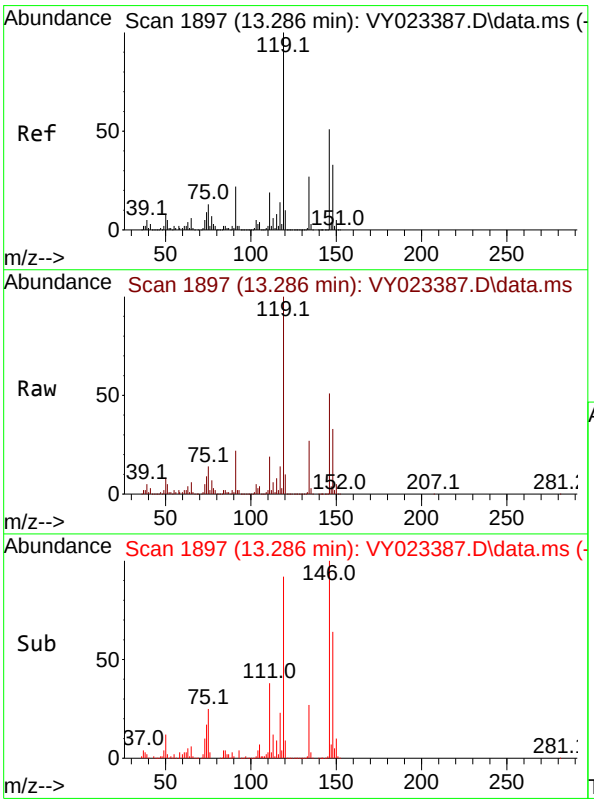
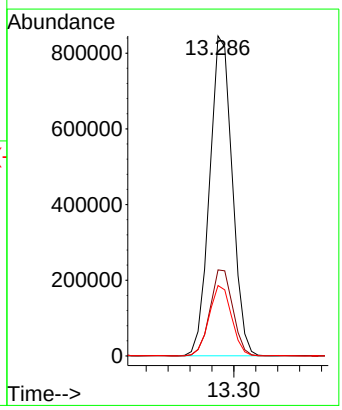
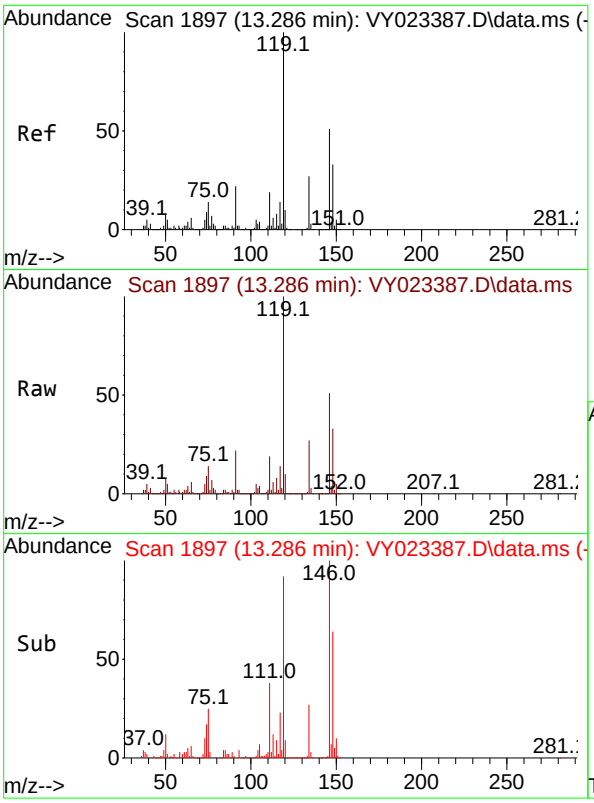


#86
p-Isopropyltoluene
Concen: 51.115 ug/l
RT: 13.286 min Scan# 1897
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion:119 Resp: 1210644

Ion	Ratio	Lower	Upper
119	100		
134	27.1	13.6	40.7
91	21.9	10.9	32.9

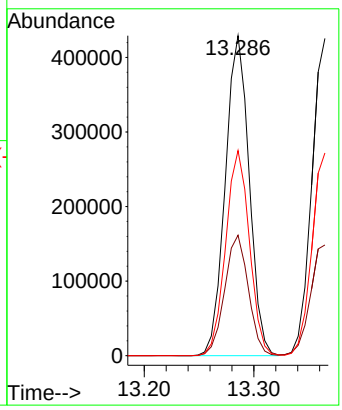




#87
1,3-Dichlorobenzene
Concen: 49.072 ug/l
RT: 13.286 min Scan# 1
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion:146 Resp: 64989

Ion	Ratio	Lower	Upper
146	100		
111	37.4	18.7	56.1
148	63.9	31.9	95.9



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICCC050

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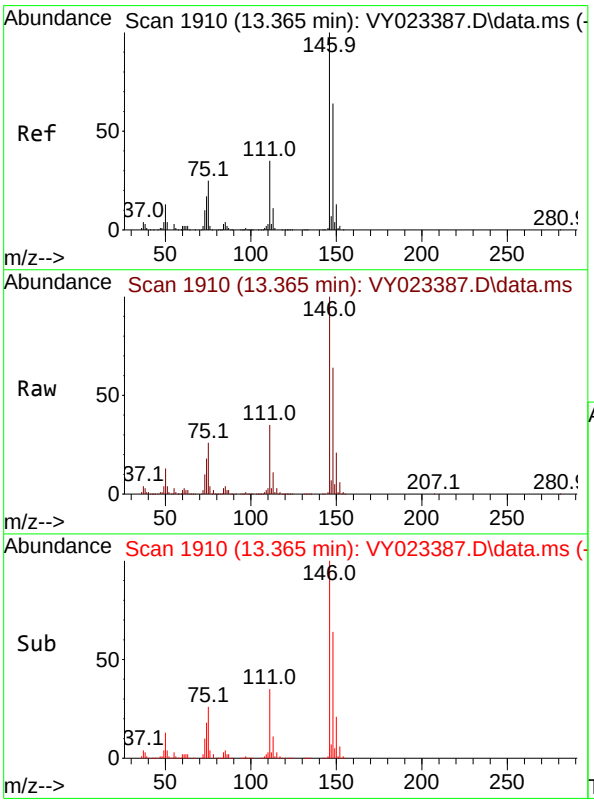
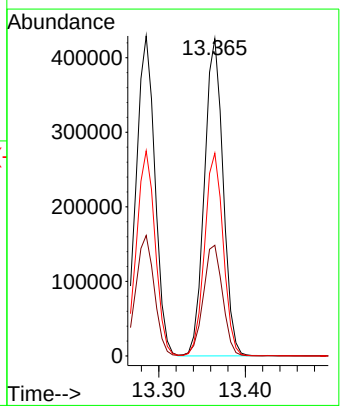
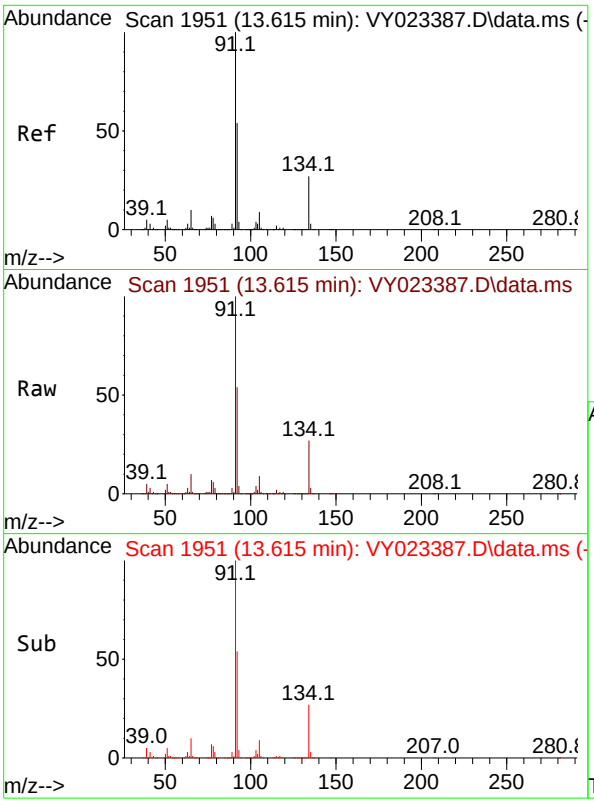


#88
1,4-Dichlorobenzene
Concen: 48.476 ug/l
RT: 13.365 min Scan# 1910
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion:146 Resp: 636694

Ion	Ratio	Lower	Upper
146	100		
111	36.0	18.0	54.0
148	63.8	31.9	95.7

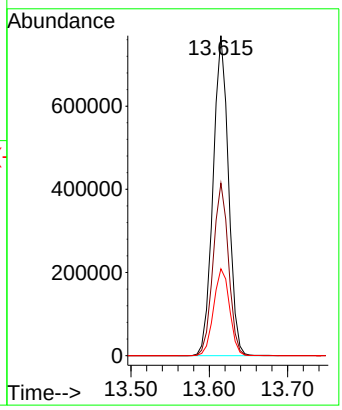




#89
n-Butylbenzene
Concen: 50.299 ug/l
RT: 13.615 min Scan# 1
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion: 91 Resp: 105194

Ion	Ratio	Lower	Upper
91	100		
92	53.9	27.0	80.8
134	28.1	14.1	42.2



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICCC050

Manual Integrations
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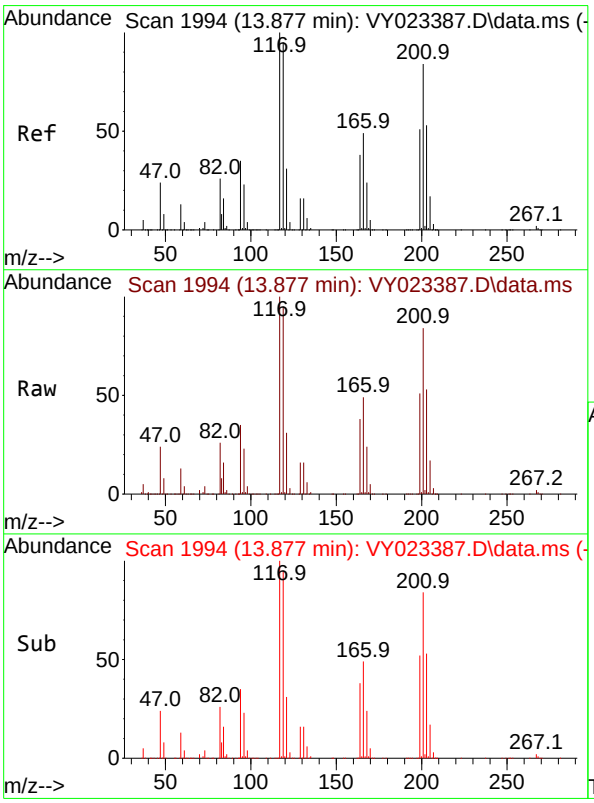
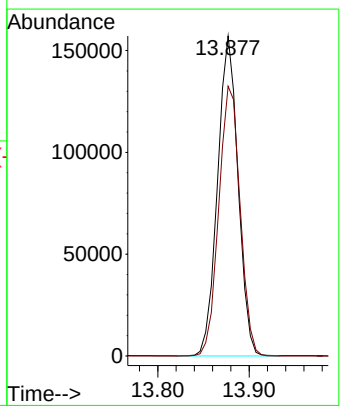
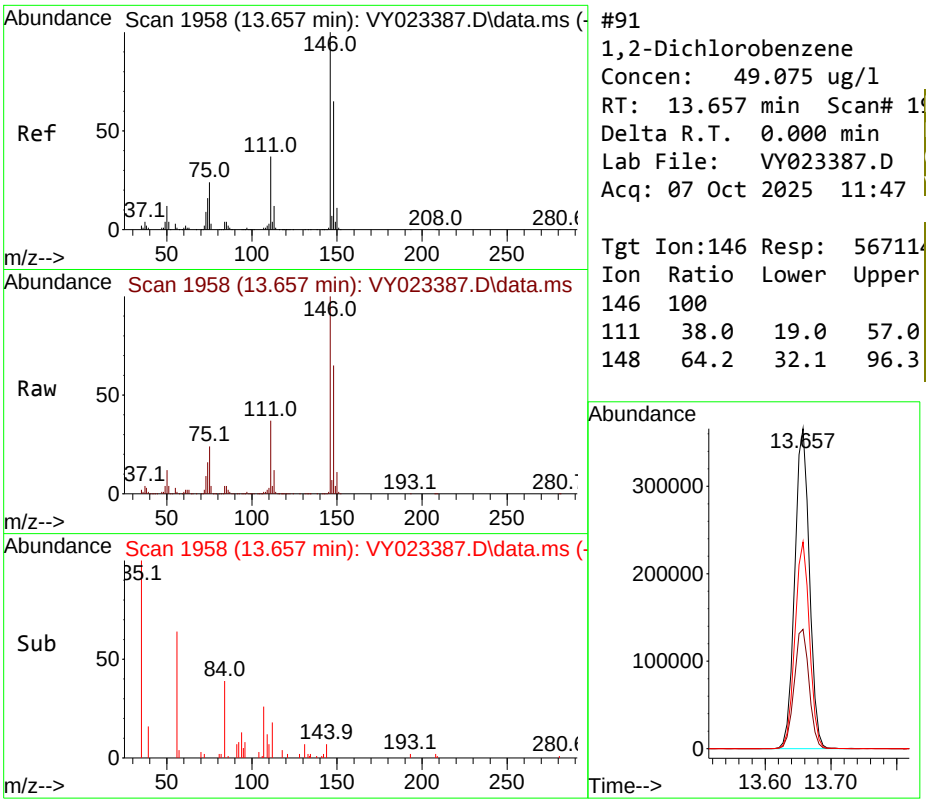


#90
Hexachloroethane
Concen: 47.664 ug/l
RT: 13.877 min Scan# 1994
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion:117 Resp: 245108

Ion	Ratio	Lower	Upper
117	100		
201	87.6	43.8	131.4





#91
1,2-Dichlorobenzene
Concen: 49.075 ug/l
RT: 13.657 min Scan# 1
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion:146 Resp: 56711

Ion	Ratio	Lower	Upper
146	100		
111	38.0	19.0	57.0
148	64.2	32.1	96.3

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICCC050

Manual Integrations
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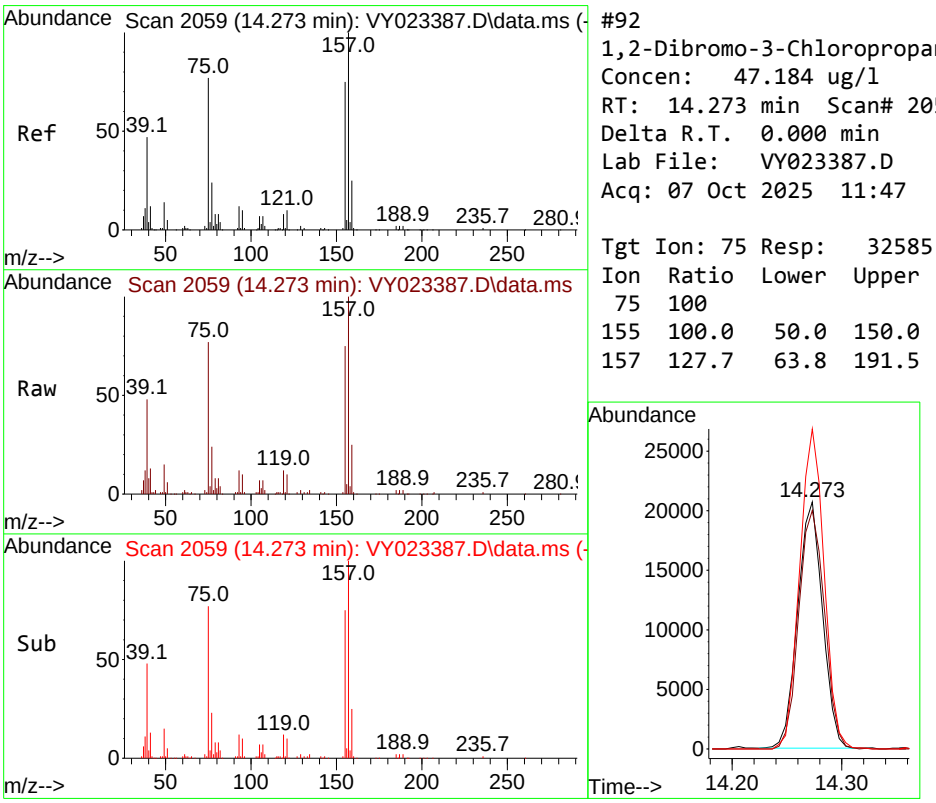
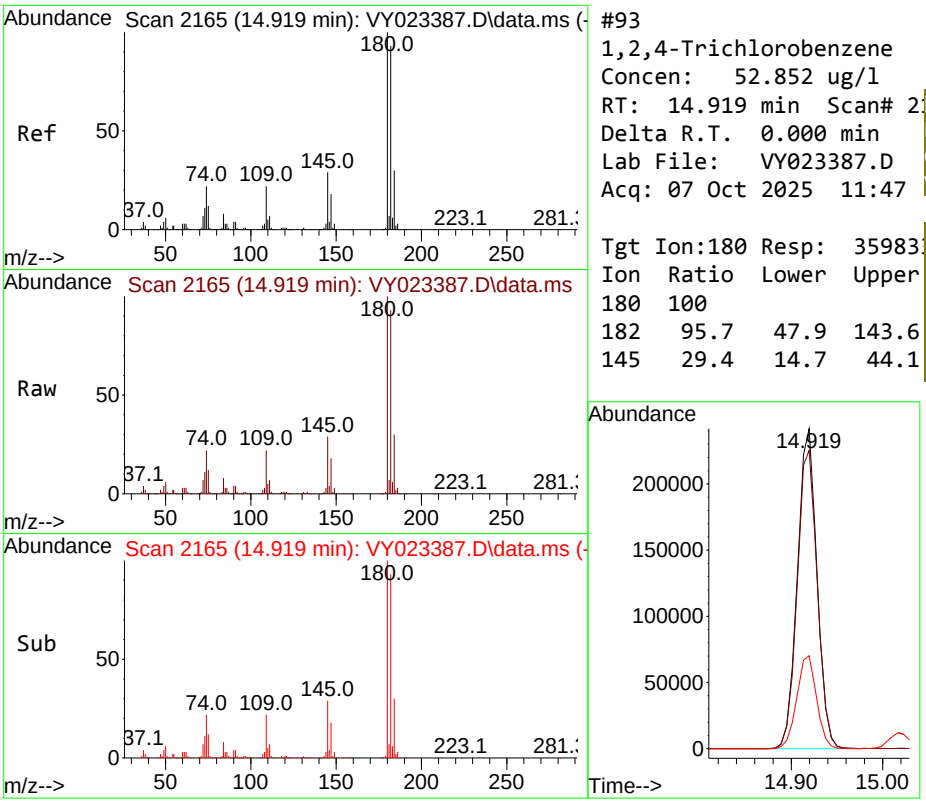


#92
1,2-Dibromo-3-Chloropropane
Concen: 47.184 ug/l
RT: 14.273 min Scan# 2059
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion: 75 Resp: 32585

Ion	Ratio	Lower	Upper
75	100		
155	100.0	50.0	150.0
157	127.7	63.8	191.5



#93
1,2,4-Trichlorobenzene
Concen: 52.852 ug/l
RT: 14.919 min Scan# 2
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

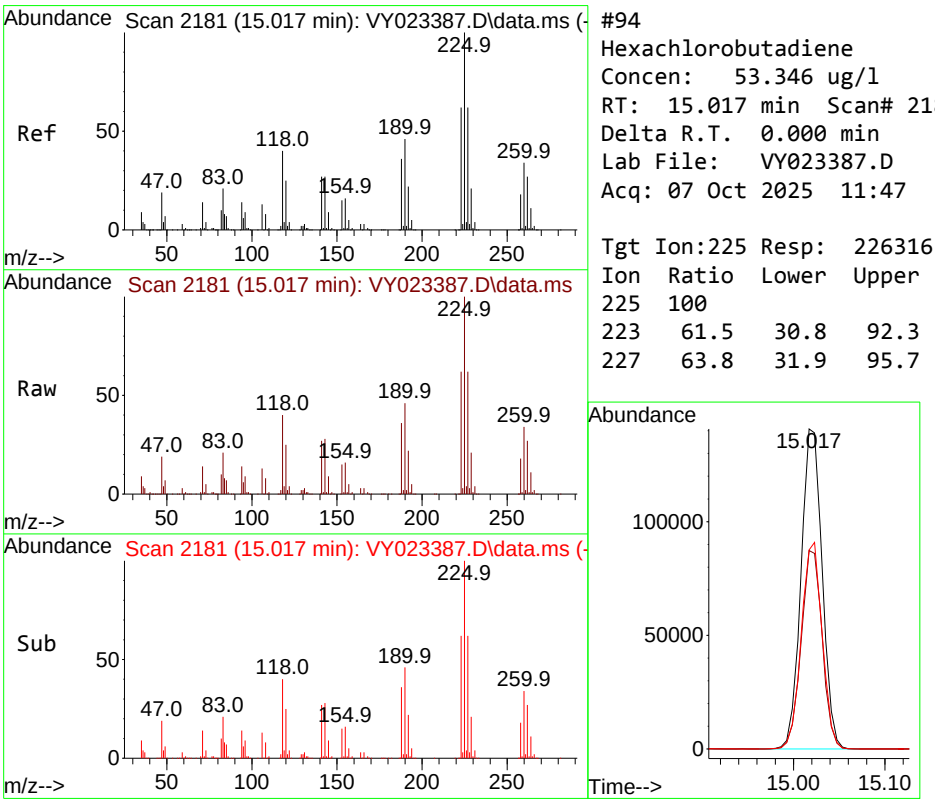
Tgt Ion:180 Resp: 35983

Ion	Ratio	Lower	Upper
180	100		
182	95.7	47.9	143.6
145	29.4	14.7	44.1

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICCC050

Manual Integrations APPROVED

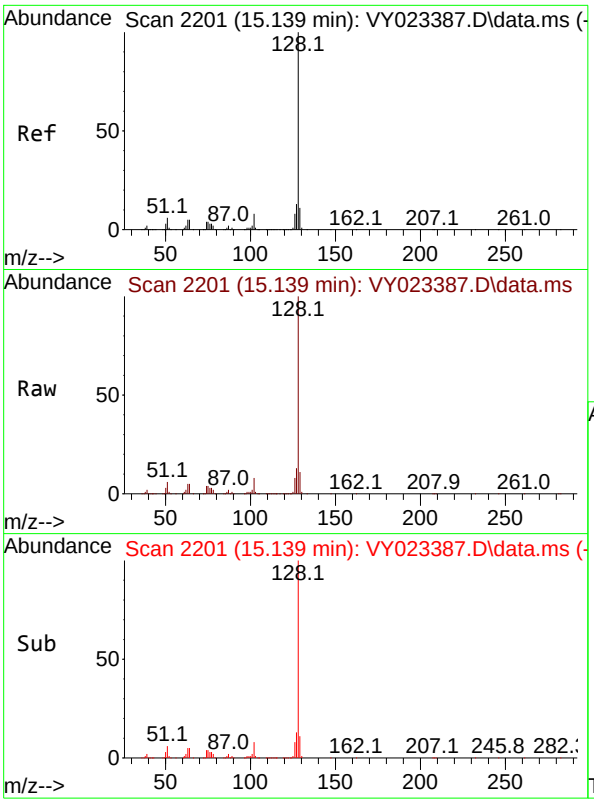
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025



#94
Hexachlorobutadiene
Concen: 53.346 ug/l
RT: 15.017 min Scan# 2181
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion:225 Resp: 226316

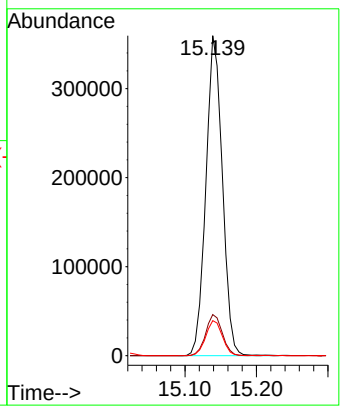
Ion	Ratio	Lower	Upper
225	100		
223	61.5	30.8	92.3
227	63.8	31.9	95.7



#95
Naphthalene
Concen: 53.012 ug/l
RT: 15.139 min Scan# 2
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion:128 Resp: 57504

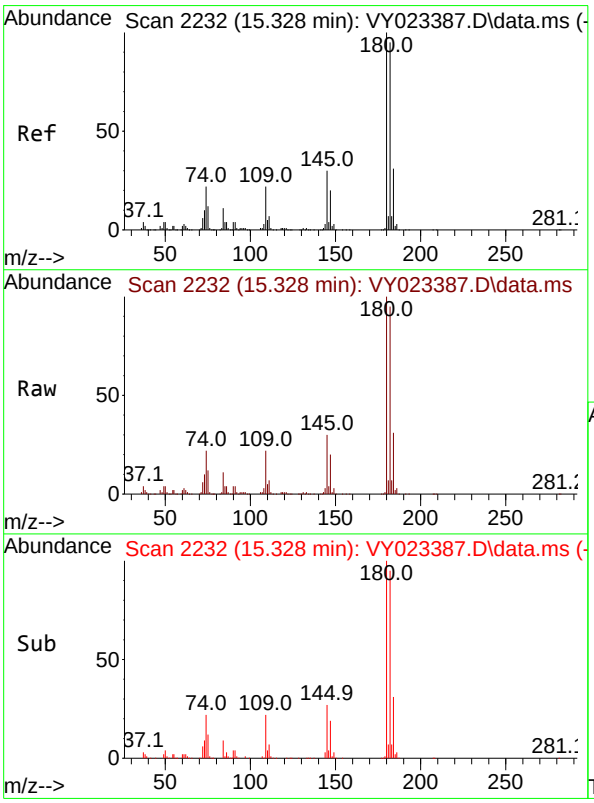
Ion	Ratio	Lower	Upper
128	100		
127	13.0	10.4	15.6
129	11.1	8.9	13.3



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICCC050

Manual Integrations
APPROVED

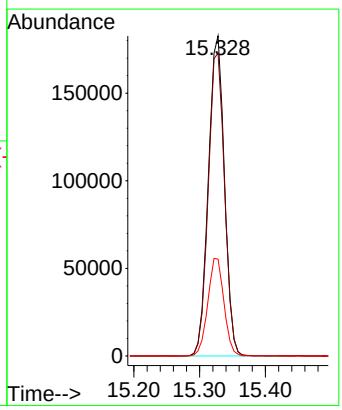
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025



#96
1,2,3-Trichlorobenzene
Concen: 52.628 ug/l
RT: 15.328 min Scan# 2232
Delta R.T. 0.000 min
Lab File: VY023387.D
Acq: 07 Oct 2025 11:47

Tgt Ion:180 Resp: 310831

Ion	Ratio	Lower	Upper
180	100		
182	95.9	47.9	143.8
145	30.6	15.3	45.9



Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY100725\
Data File : VY023388.D
Acq On : 07 Oct 2025 12:09
Operator : SY/MD
Sample : VSTDICC100
Misc : 5.00g/5.0mL/MSVOA_Y/SOIL
ALS Vial : 7 Sample Multiplier: 1

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC100

Manual Integrations APPROVED
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

Quant Time: Oct 08 04:44:07 2025
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260
QLast Update : Wed Oct 08 04:39:16 2025
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Pentafluorobenzene	7.707	168	595770	50.000	ug/l	0.00
34) 1,4-Difluorobenzene	8.616	114	855682	50.000	ug/l	0.00
63) Chlorobenzene-d5	11.414	117	764361	50.000	ug/l	0.00
72) 1,4-Dichlorobenzene-d4	13.340	152	400285	50.000	ug/l	0.00
System Monitoring Compounds						
33) 1,2-Dichloroethane-d4	8.061	65	467005	90.510	ug/l	0.00
Spiked Amount 50.000	Range 50 - 163		Recovery = 181.020%#			
35) Dibromofluoromethane	7.634	113	511478	98.497	ug/l	0.00
Spiked Amount 50.000	Range 54 - 147		Recovery = 197.000%#			
50) Toluene-d8	10.103	98	1919872	98.031	ug/l	0.00
Spiked Amount 50.000	Range 58 - 134		Recovery = 196.060%#			
62) 4-Bromofluorobenzene	12.401	95	636435	103.007	ug/l	0.00
Spiked Amount 50.000	Range 30 - 143		Recovery = 206.020%#			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.867	85	368985	78.627	ug/l	96
3) Chloromethane	2.068	50	521606	78.195	ug/l	96
4) Vinyl Chloride	2.202	62	711235	84.438	ug/l	100
5) Bromomethane	2.586	94	574957	83.210	ug/l	99
6) Chloroethane	2.732	64	491625	85.968	ug/l	99
7) Trichlorofluoromethane	3.049	101	1012851	93.610	ug/l	99
8) Diethyl Ether	3.452	74	266779	94.266	ug/l	100
9) 1,1,2-Trichlorotrifluo...	3.812	101	511482	88.441	ug/l	100
10) Methyl Iodide	4.001	142	651575	97.495	ug/l	99
11) Tert butyl alcohol	4.866	59	172718	568.898	ug/l	99
12) 1,1-Dichloroethene	3.787	96	508059	91.303	ug/l	96
13) Acrolein	3.647	56	262636	510.573	ug/l	99
14) Allyl chloride	4.378	41	637073	91.446	ug/l	99
15) Acrylonitrile	5.055	53	522511	471.296	ug/l	100
16) Acetone	3.866	43	504700	435.004	ug/l	98
17) Carbon Disulfide	4.104	76	1442005	83.061	ug/l	99
18) Methyl Acetate	4.385	43	316911	107.474	ug/l	98
19) Methyl tert-butyl Ether	5.116	73	1300206	99.797	ug/l	97
20) Methylene Chloride	4.610	84	552018	87.742	ug/l	98
21) trans-1,2-Dichloroethene	5.110	96	569334	91.999	ug/l	96
22) Diisopropyl ether	6.018	45	1423347	92.133	ug/l	97
23) Vinyl Acetate	5.957	43	3975052	468.098	ug/l	99
24) 1,1-Dichloroethane	5.915	63	911619	89.517	ug/l	99
25) 2-Butanone	6.890	43	685693	478.154	ug/l	99
26) 2,2-Dichloropropane	6.884	77	833452	92.108	ug/l	98
27) cis-1,2-Dichloroethene	6.890	96	670773	95.557	ug/l	98
28) Bromochloromethane	7.244	49	321657	81.418	ug/l	99
29) Tetrahydrofuran	7.262	42	415867	488.587	ug/l	99
30) Chloroform	7.421	83	1003722	91.401	ug/l	100
31) Cyclohexane	7.701	56	767083	85.293	ug/l	98
32) 1,1,1-Trichloroethane	7.616	97	910837	92.399	ug/l	100
36) 1,1-Dichloropropene	7.835	75	692477	94.516	ug/l	99
37) Ethyl Acetate	6.982	43	280560	96.859	ug/l	98
38) Carbon Tetrachloride	7.817	117	833170	97.894	ug/l	99
39) Methylcyclohexane	9.109	83	947664	101.024	ug/l	99
40) Benzene	8.079	78	2192645	96.000	ug/l	98

Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY100725\
Data File : VY023388.D
Acq On : 07 Oct 2025 12:09
Operator : SY/MD
Sample : VSTDICC100
Misc : 5.00g/5.0mL/MSVOA_Y/SOIL
ALS Vial : 7 Sample Multiplier: 1

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC100

Manual Integrations APPROVED
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

Quant Time: Oct 08 04:44:07 2025
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260
QLast Update : Wed Oct 08 04:39:16 2025
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units		Dev(Min)
41) Methacrylonitrile	7.219	41	152239	101.200	ug/l		98
42) 1,2-Dichloroethane	8.158	62	554810	95.449	ug/l		100
43) Isopropyl Acetate	8.195	43	573653	101.815	ug/l		99
44) Trichloroethene	8.866	130	636149	99.245	ug/l		100
45) 1,2-Dichloropropane	9.140	63	485084	94.381	ug/l		99
46) Dibromomethane	9.231	93	309964	98.596	ug/l		99
47) Bromodichloromethane	9.420	83	769238	97.210	ug/l		99
48) Methyl methacrylate	9.219	41	282582	107.476	ug/l		99
49) 1,4-Dioxane	9.225	88	77305	2374.722	ug/l		99
51) 4-Methyl-2-Pentanone	9.993	43	1539324	533.386	ug/l		100
52) Toluene	10.170	92	1462927	100.905	ug/l		99
53) t-1,3-Dichloropropene	10.390	75	710475	104.537	ug/l		98
54) cis-1,3-Dichloropropene	9.853	75	822967	101.302	ug/l		98
55) 1,1,2-Trichloroethane	10.573	97	417623	99.875	ug/l		96
56) Ethyl methacrylate	10.438	69	549366	114.077	ug/l		99
57) 1,3-Dichloropropane	10.713	76	670961	99.140	ug/l		100
58) 2-Chloroethyl Vinyl ether	9.707	63	1240361	588.731	ug/l		99
59) 2-Hexanone	10.755	43	1081568	541.284	ug/l		99
60) Dibromochloromethane	10.908	129	593878	104.133	ug/l		100
61) 1,2-Dibromoethane	11.011	107	406293	103.280	ug/l		99
64) Tetrachloroethene	10.646	164	767753	100.406	ug/l		99
65) Chlorobenzene	11.438	112	1655143	99.649	ug/l		99
66) 1,1,1,2-Tetrachloroethane	11.511	131	586878	100.470	ug/l		99
67) Ethyl Benzene	11.517	91	2788252	102.856	ug/l		98
68) m/p-Xylenes	11.627	106	2243033	206.437	ug/l		100
69) o-Xylene	11.950	106	1072335	106.611	ug/l		99
70) Styrene	11.969	104	1782757	107.344	ug/l		100
71) Bromoform	12.127	173	373208	106.727	ug/l	#	100
73) Isopropylbenzene	12.249	105	2741698	102.825	ug/l		100
74) N-amyl acetate	12.066	43	532255	106.818	ug/l		99
75) 1,1,2,2-Tetrachloroethane	12.505	83	434720	97.735	ug/l		98
76) 1,2,3-Trichloropropane	12.554	75	364622m	92.345	ug/l		
77) Bromobenzene	12.529	156	701741	102.545	ug/l		100
78) n-propylbenzene	12.590	91	3165894	100.958	ug/l		99
79) 2-Chlorotoluene	12.676	91	1800124	99.426	ug/l		100
80) 1,3,5-Trimethylbenzene	12.731	105	2219080	102.374	ug/l		99
81) trans-1,4-Dichloro-2-b...	12.298	75	148302	101.273	ug/l		98
82) 4-Chlorotoluene	12.773	91	1854165	98.060	ug/l		99
83) tert-Butylbenzene	12.993	119	2028198	102.684	ug/l		97
84) 1,2,4-Trimethylbenzene	13.042	105	2227197	103.853	ug/l		100
85) sec-Butylbenzene	13.170	105	2932949	102.530	ug/l		100
86) p-Isopropyltoluene	13.285	119	2548220	105.408	ug/l		100
87) 1,3-Dichlorobenzene	13.285	146	1361716	100.735	ug/l		100
88) 1,4-Dichlorobenzene	13.365	146	1323618	98.734	ug/l		100
89) n-Butylbenzene	13.615	91	2223744	104.174	ug/l		99
90) Hexachloroethane	13.877	117	514746	98.069	ug/l		99
91) 1,2-Dichlorobenzene	13.657	146	1193043	101.146	ug/l		100
92) 1,2-Dibromo-3-Chloropr...	14.267	75	70107	99.458	ug/l		94
93) 1,2,4-Trichlorobenzene	14.919	180	806328	116.031	ug/l		99
94) Hexachlorobutadiene	15.017	225	470072	108.557	ug/l		99
95) Naphthalene	15.139	128	1378291	124.485	ug/l		100
96) 1,2,3-Trichlorobenzene	15.322	180	693477	115.034	ug/l		100

ICAL Form

Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY100725\
Data File : VY023388.D
Acq On : 07 Oct 2025 12:09
Operator : SY/MD
Sample : VSTDICC100
Misc : 5.00g/5.0mL/MSVOA_Y/SOIL
ALS Vial : 7 Sample Multiplier: 1

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC100

Manual Integrations APPROVED

Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

Quant Time: Oct 08 04:44:07 2025
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260
QLast Update : Wed Oct 08 04:39:16 2025
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY100725\
Data File : VY023388.D
Acq On : 07 Oct 2025 12:09
Operator : SY/MD
Sample : VSTDICC100
Misc : 5.00g/5.0mL/MSVOA_Y/SOIL
ALS Vial : 7 Sample Multiplier: 1

Quant Time: Oct 08 04:44:07 2025
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260
QLast Update : Wed Oct 08 04:39:16 2025
Response via : Initial Calibration

Instrument :
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ClientSampleId :
VSTDICC100

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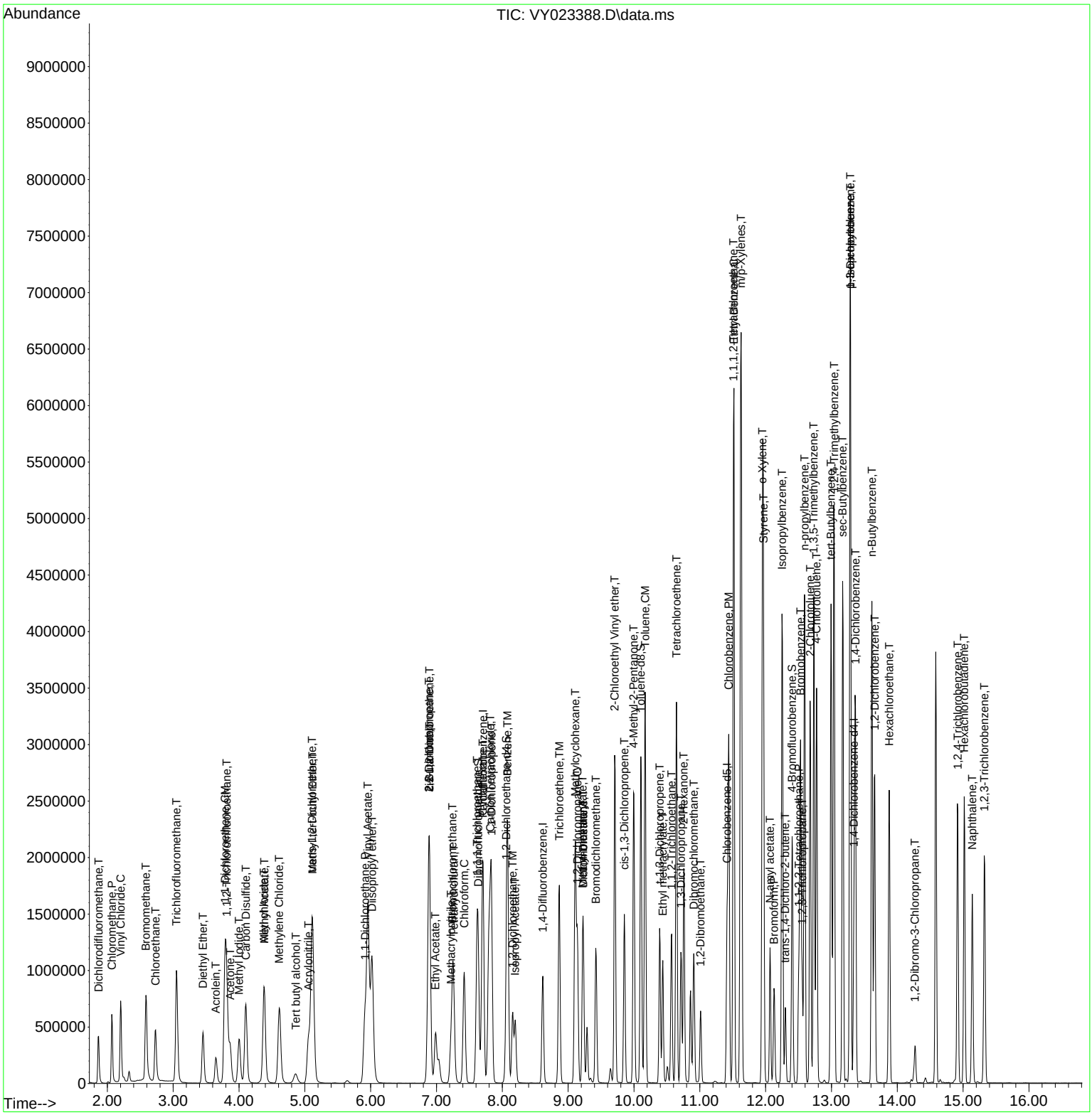

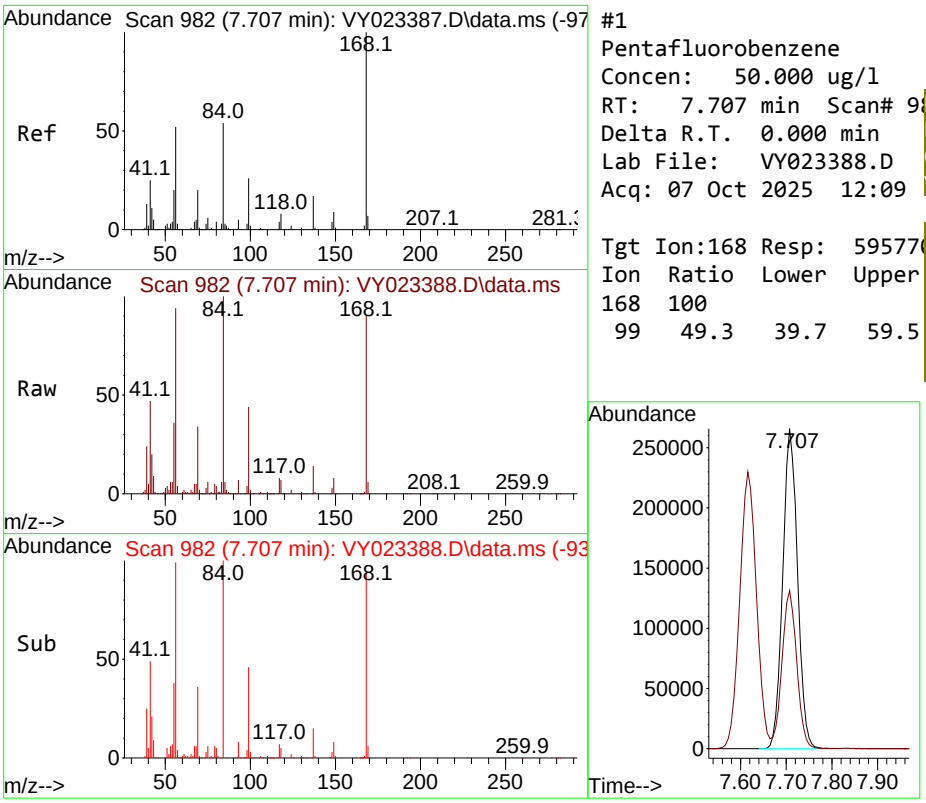

#1
Pentafluorobenzene
Concen: 50.000 ug/l
RT: 7.707 min Scan# 9
Delta R.T. 0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion:168 Resp: 59577

Ion	Ratio	Lower	Upper
168	100		
99	49.3	39.7	59.5

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC100

Manual Integrations APPROVED

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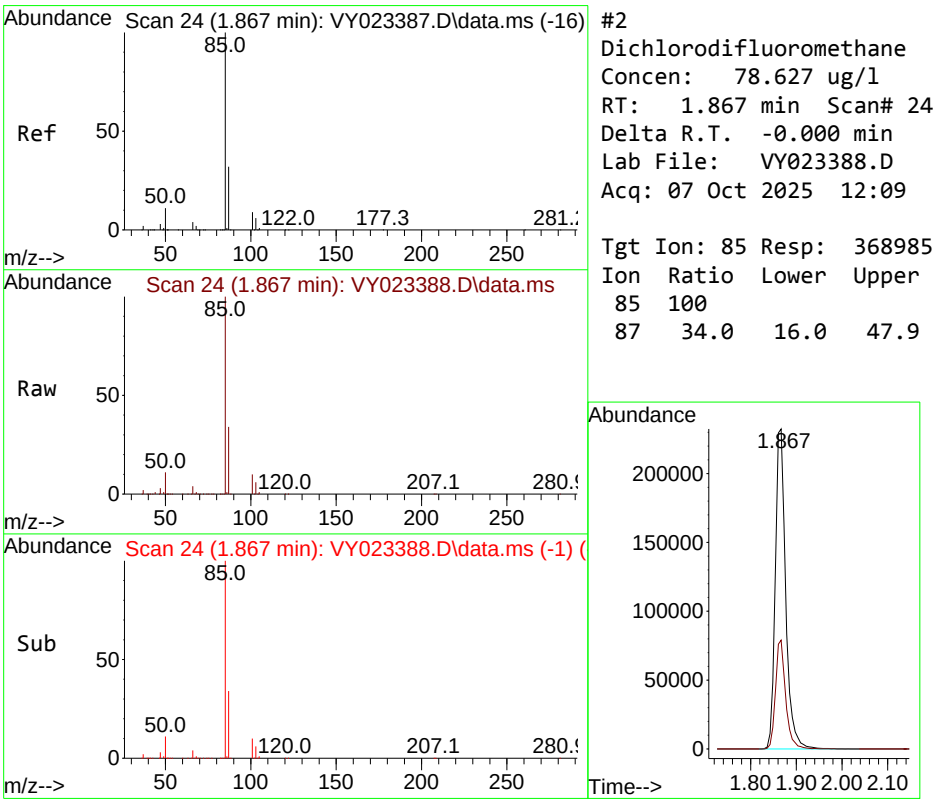
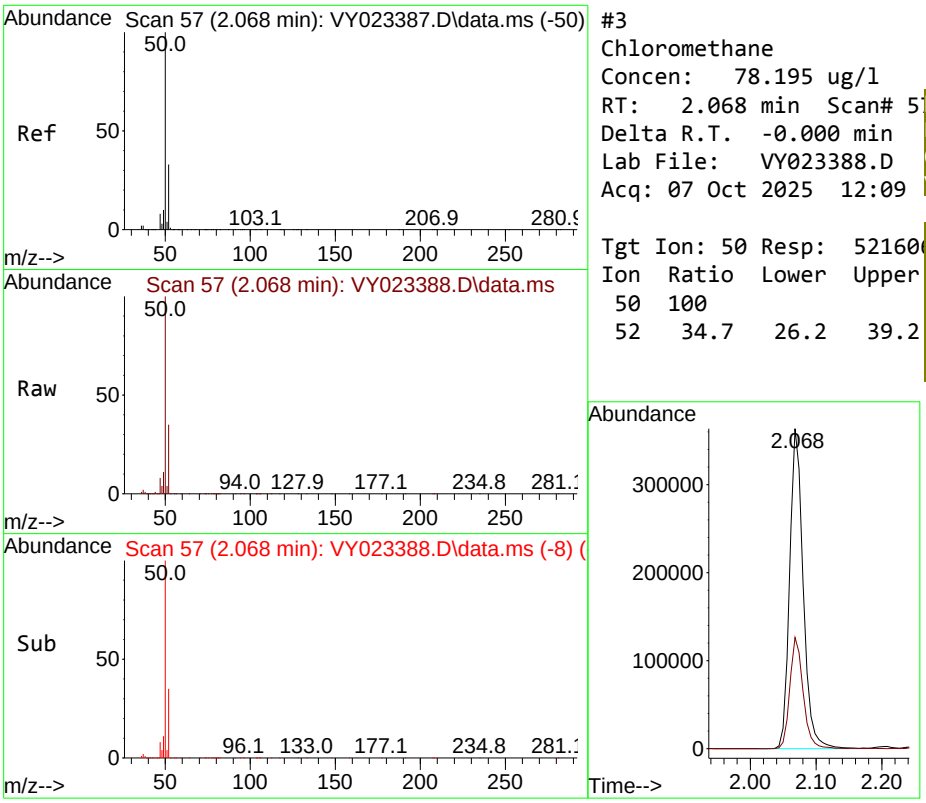


#2
Dichlorodifluoromethane
Concen: 78.627 ug/l
RT: 1.867 min Scan# 24
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion: 85 Resp: 368985

Ion	Ratio	Lower	Upper
85	100		
87	34.0	16.0	47.9



#3
Chloromethane
Concen: 78.195 ug/l
RT: 2.068 min Scan# 5
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion: 50 Resp: 52160

Ion	Ratio	Lower	Upper
50	100		
52	34.7	26.2	39.2

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC100

Manual Integrations
APPROVED

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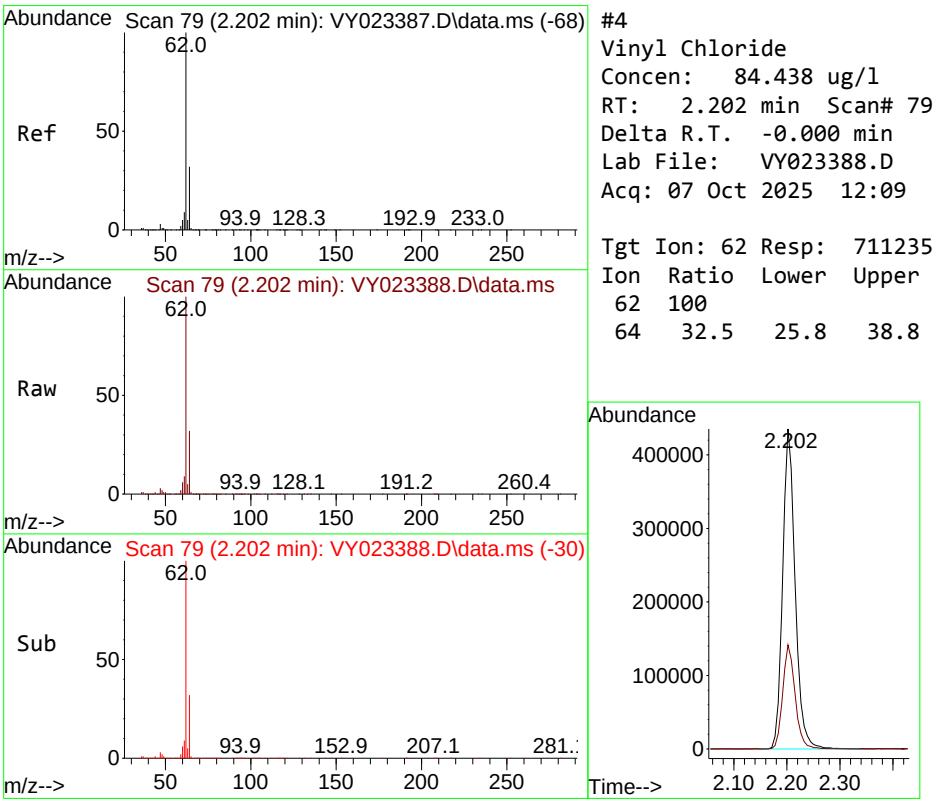
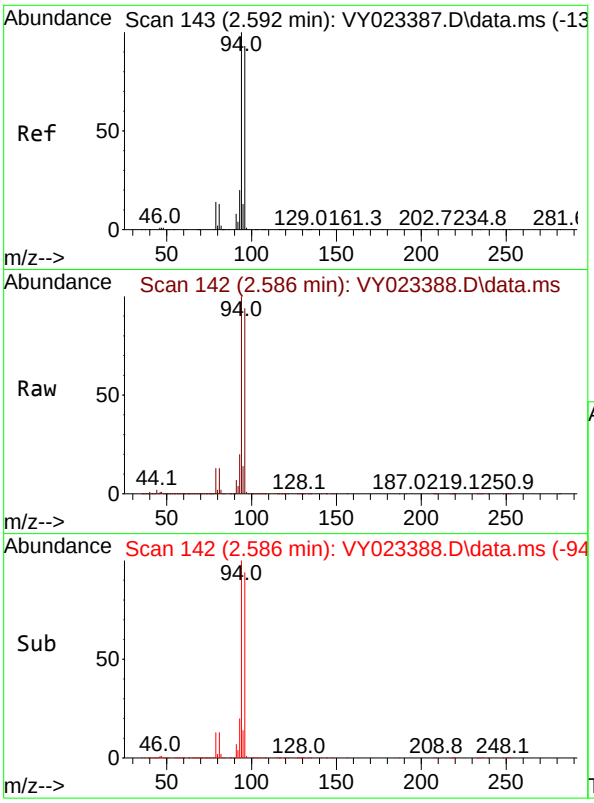


#4
Vinyl Chloride
Concen: 84.438 ug/l
RT: 2.202 min Scan# 79
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion: 62 Resp: 711235

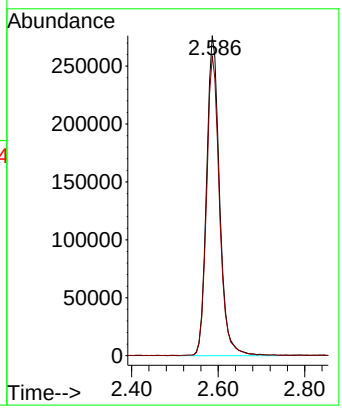
Ion	Ratio	Lower	Upper
62	100		
64	32.5	25.8	38.8



#5
Bromomethane
Concen: 83.210 ug/l
RT: 2.586 min Scan# 14
Delta R.T. -0.006 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion: 94 Resp: 57495

Ion	Ratio	Lower	Upper
94	100		
96	93.7	74.5	111.7



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC100

Manual Integrations APPROVED

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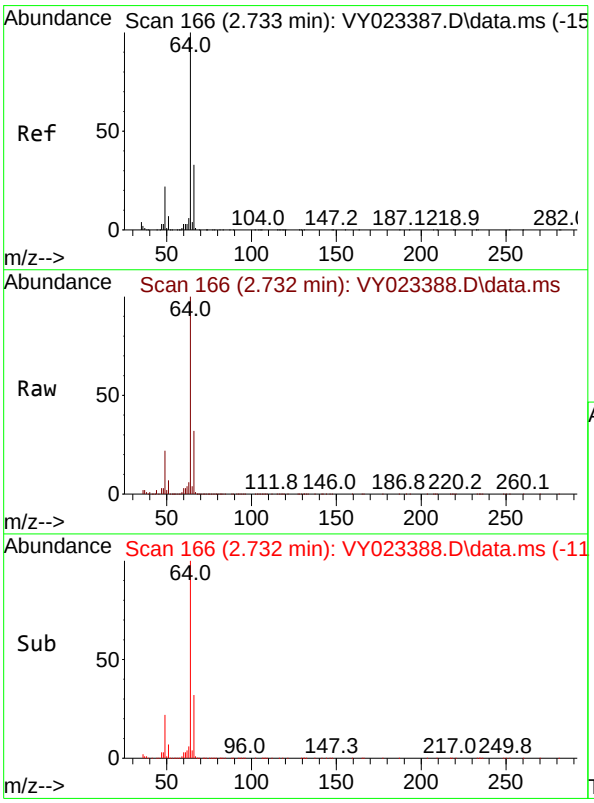
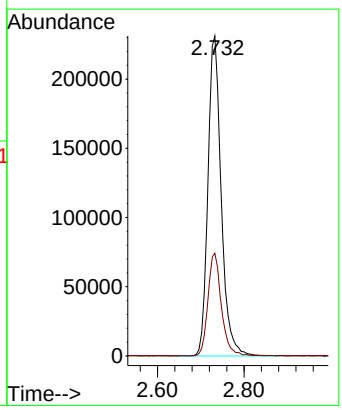
Supervised By :Mahesh Dadoda 10/10/2025

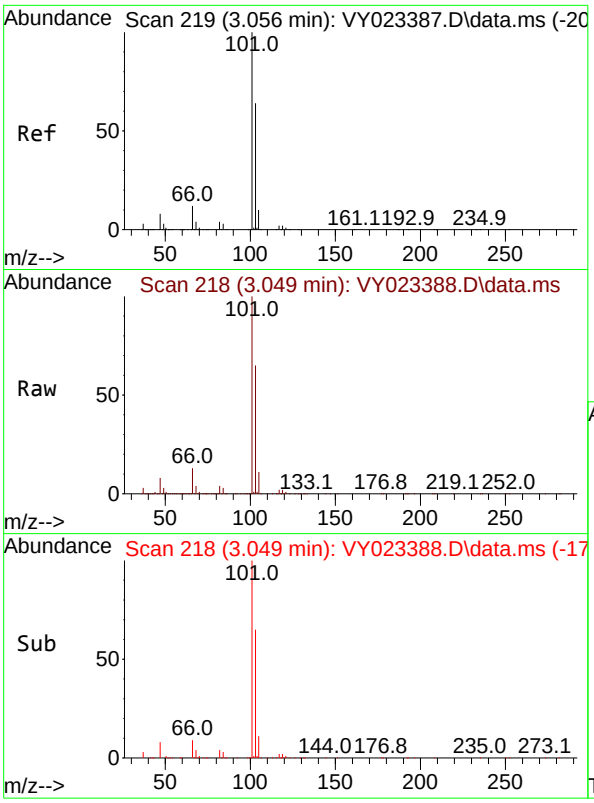


#6
Chloroethane
Concen: 85.968 ug/l
RT: 2.732 min Scan# 166
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion: 64 Resp: 491625

Ion	Ratio	Lower	Upper
64	100		
66	32.0	26.2	39.4

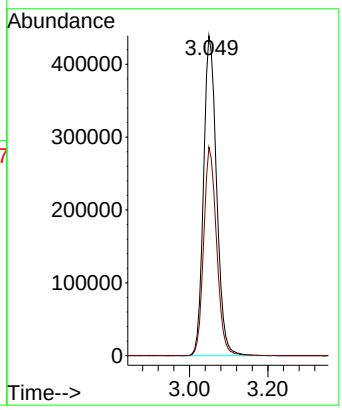




#7
Trichlorofluoromethane
Concen: 93.610 ug/l
RT: 3.049 min Scan# 2
Delta R.T. -0.006 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion:101 Resp: 101285

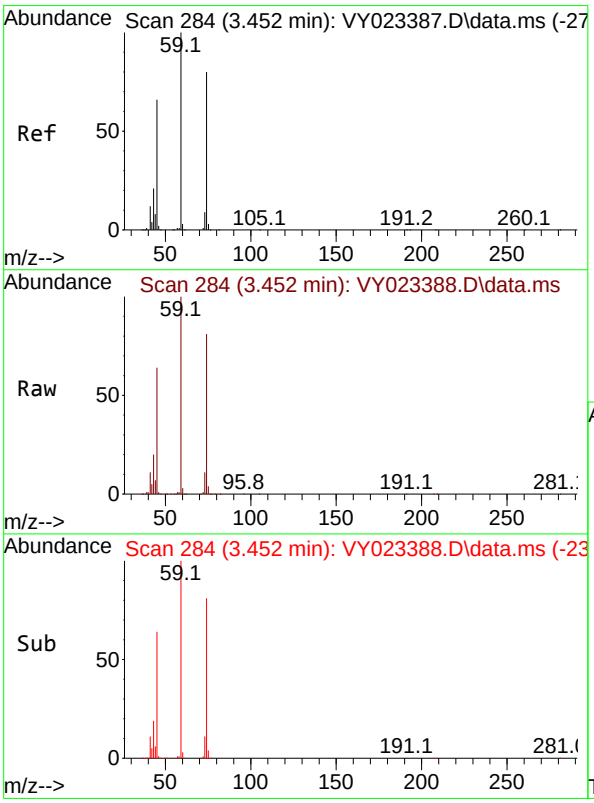
Ion	Ratio	Lower	Upper
101	100		
103	65.2	51.3	76.9



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC100

Manual Integrations
APPROVED

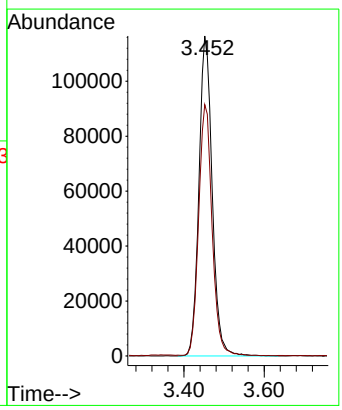
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

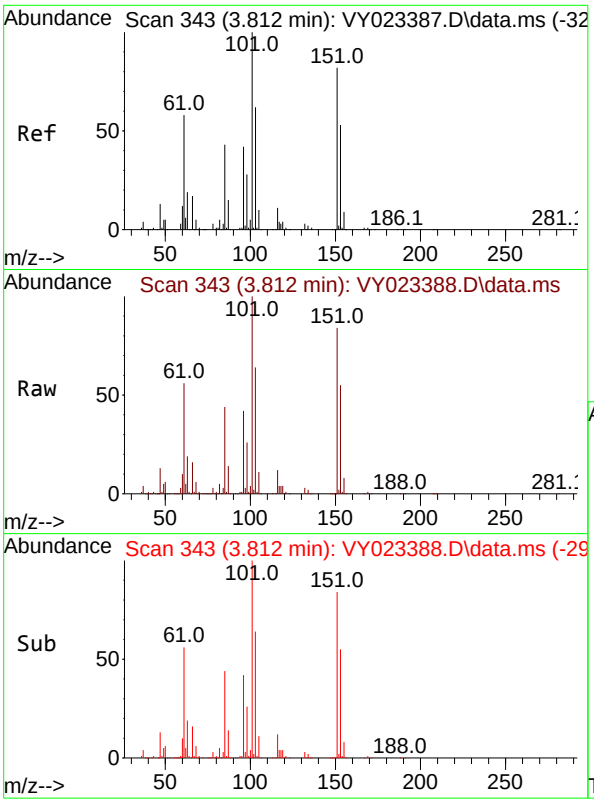


#8
Diethyl Ether
Concen: 94.266 ug/l
RT: 3.452 min Scan# 284
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion: 74 Resp: 266779

Ion	Ratio	Lower	Upper
74	100		
45	79.9	39.9	119.7





#9
1,1,2-Trichlorotrifluoroethane
Concen: 88.441 ug/l
RT: 3.812 min Scan# 34
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion:101 Resp: 51148

Ion	Ratio	Lower	Upper
101	100		
85	43.6	34.6	51.8
151	84.1	67.0	100.6

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC100

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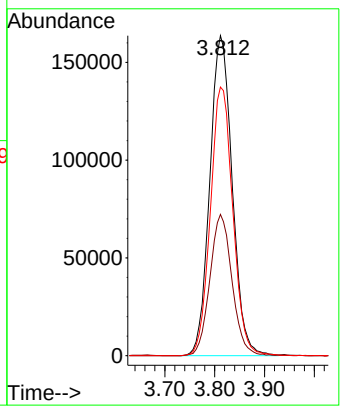
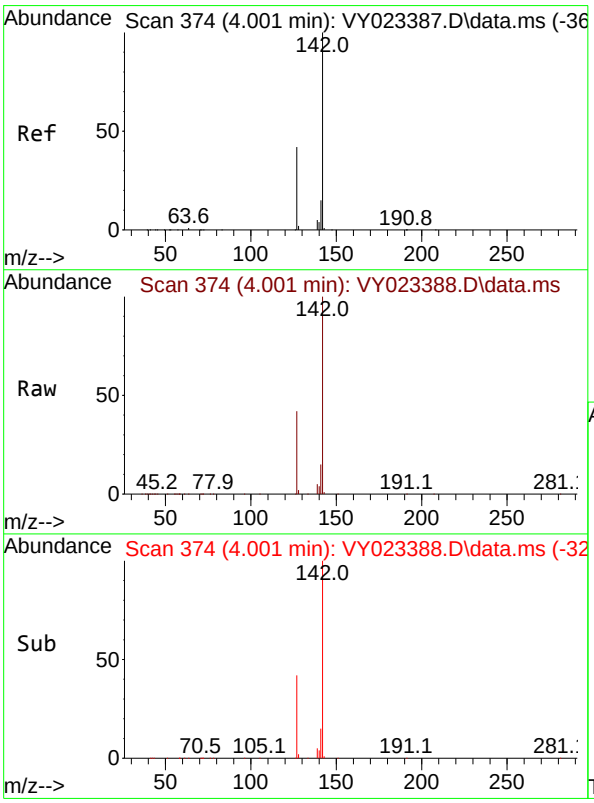
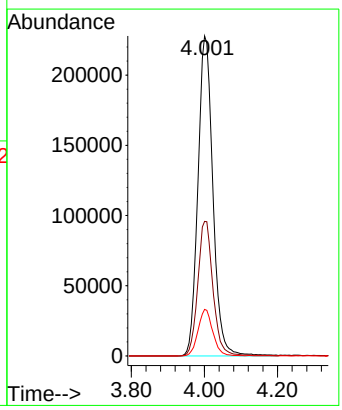


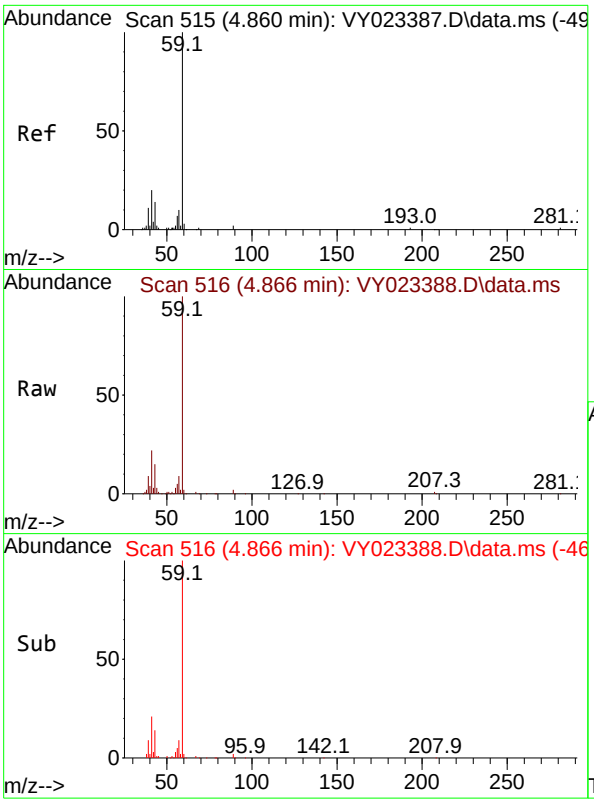


#10
Methyl Iodide
Concen: 97.495 ug/l
RT: 4.001 min Scan# 374
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion:142 Resp: 651575

Ion	Ratio	Lower	Upper
142	100		
127	42.7	34.8	52.2
141	14.3	11.6	17.4

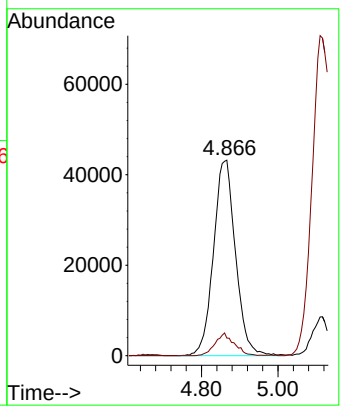




#11
Tert butyl alcohol
Concen: 568.898 ug/l
RT: 4.866 min Scan# 5
Delta R.T. 0.006 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion: 59 Resp: 17271

Ion	Ratio	Lower	Upper
59	100		
57	10.1	8.3	12.5



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC100

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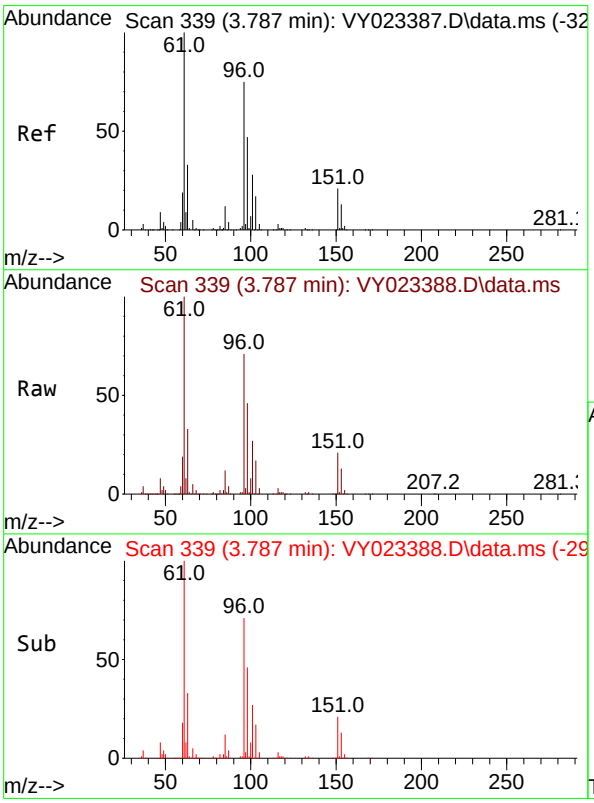
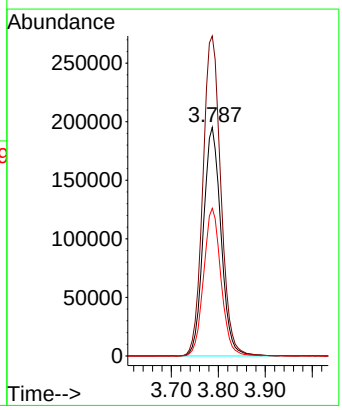
Supervised By :Mahesh Dadoda 10/10/2025

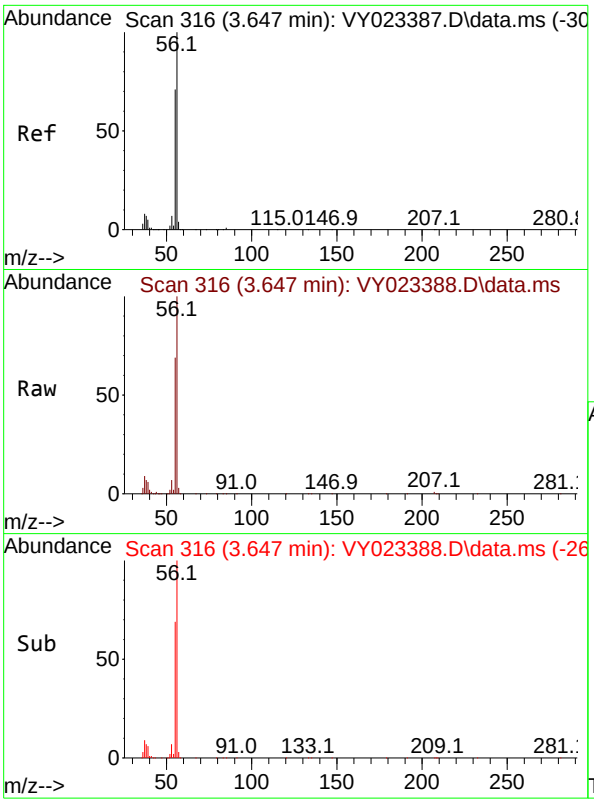


#12
1,1-Dichloroethene
Concen: 91.303 ug/l
RT: 3.787 min Scan# 339
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion: 96 Resp: 508059

Ion	Ratio	Lower	Upper
96	100		
61	139.9	106.7	160.1
98	64.6	50.2	75.4

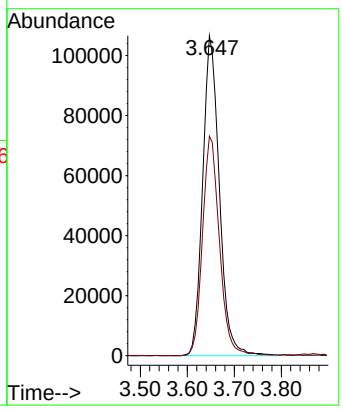




#13
Acrolein
Concen: 510.573 ug/l
RT: 3.647 min Scan# 3
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion: 56 Resp: 26263

Ion	Ratio	Lower	Upper
56	100		
55	69.6	56.1	84.1



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC100

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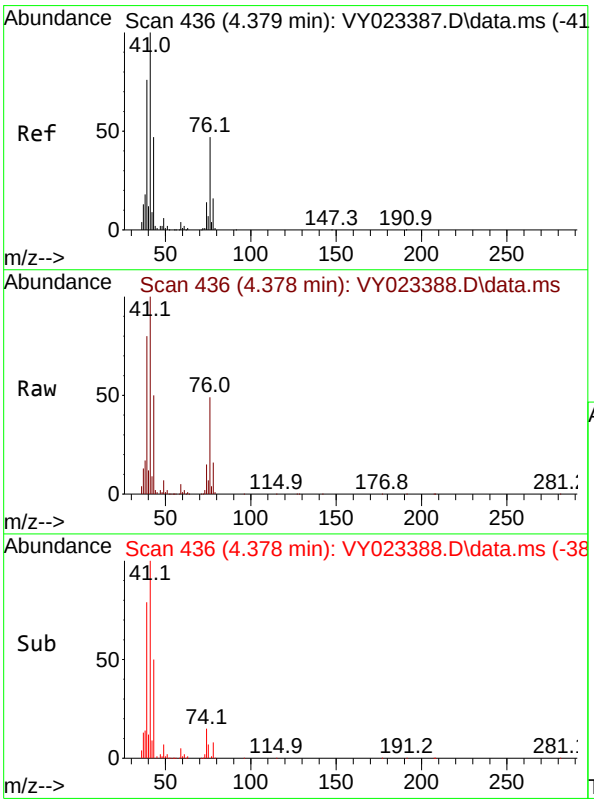
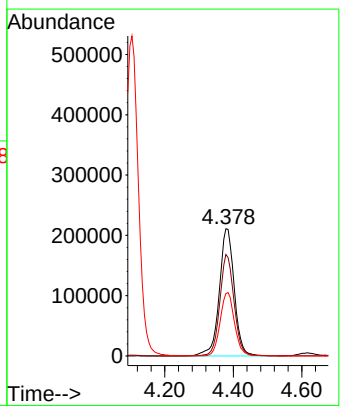
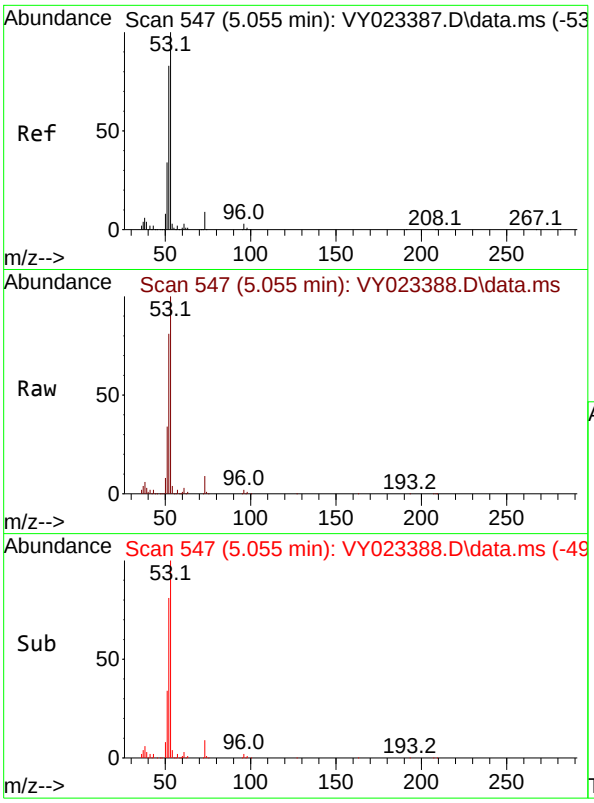


#14
Allyl chloride
Concen: 91.446 ug/l
RT: 4.378 min Scan# 436
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion: 41 Resp: 637073

Ion	Ratio	Lower	Upper
41	100		
39	75.8	59.9	89.9
76	47.5	38.0	57.0

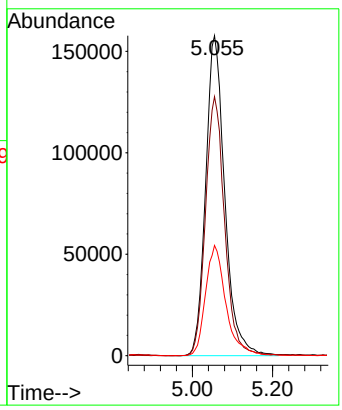




#15
Acrylonitrile
Concen: 471.296 ug/l
RT: 5.055 min Scan# 54
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion: 53 Resp: 52251

Ion	Ratio	Lower	Upper
53	100		
52	81.2	64.6	97.0
51	36.7	29.5	44.3



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC100

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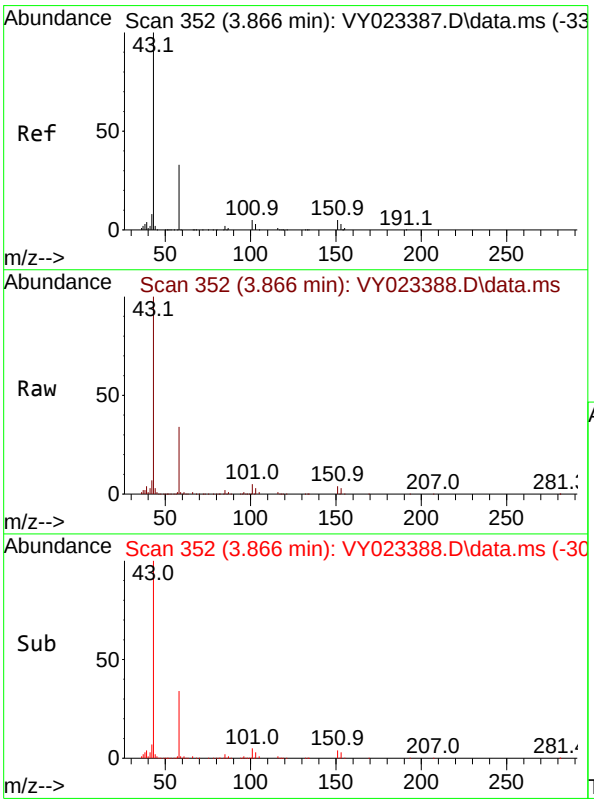
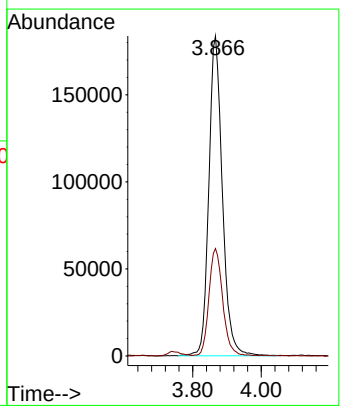
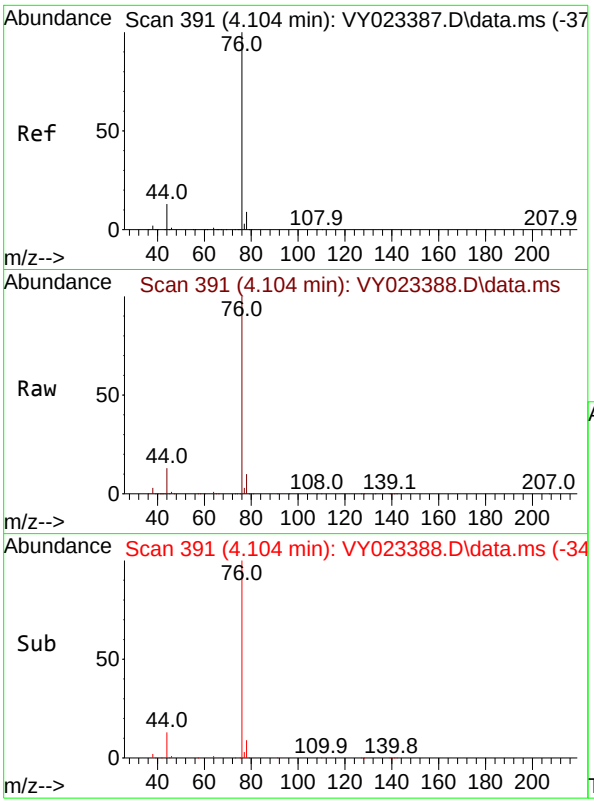


#16
Acetone
Concen: 435.004 ug/l
RT: 3.866 min Scan# 352
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion: 43 Resp: 504700

Ion	Ratio	Lower	Upper
43	100		
58	33.5	27.7	41.5

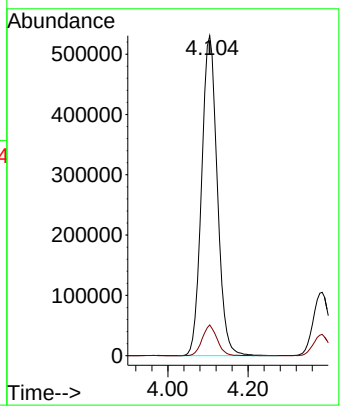




#17
Carbon Disulfide
Concen: 83.061 ug/l
RT: 4.104 min Scan# 3
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion: 76 Resp: 144200

Ion	Ratio	Lower	Upper
76	100		
78	9.6	7.3	10.9



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC100

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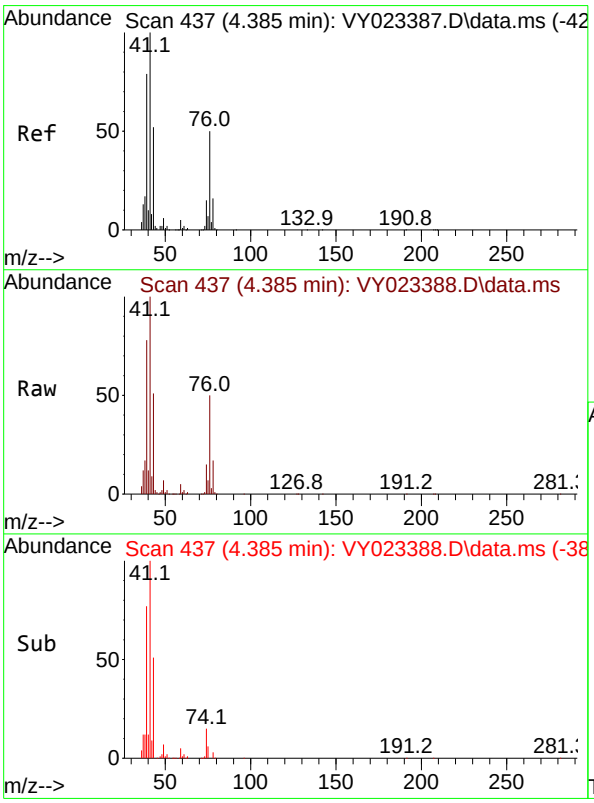
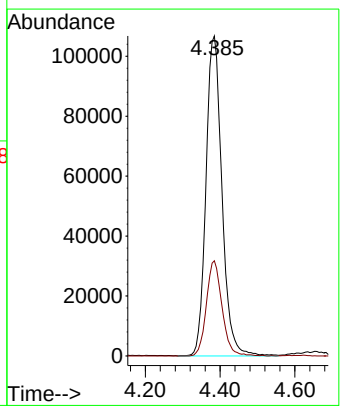
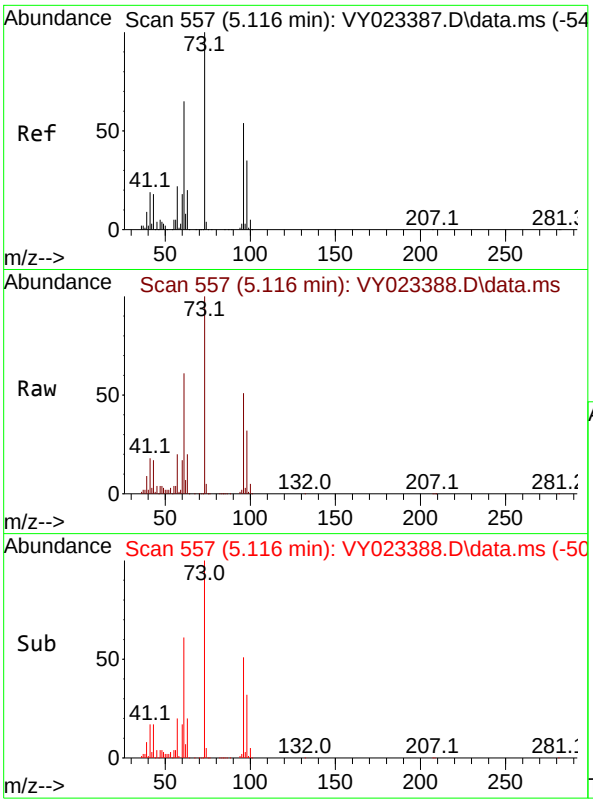


#18
Methyl Acetate
Concen: 107.474 ug/l
RT: 4.385 min Scan# 437
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion: 43 Resp: 316911

Ion	Ratio	Lower	Upper
43	100		
74	29.1	24.2	36.4

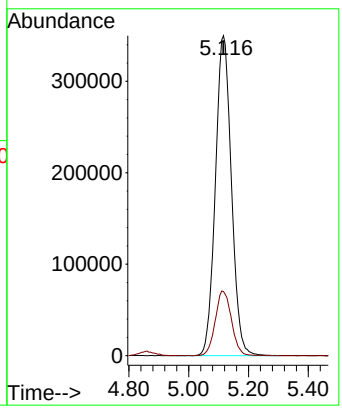




#19
Methyl tert-butyl Ether
Concen: 99.797 ug/l
RT: 5.116 min Scan# 5
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion: 73 Resp: 130020

Ion	Ratio	Lower	Upper
73	100		
57	20.1	17.4	26.0



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC100

Manual Integrations
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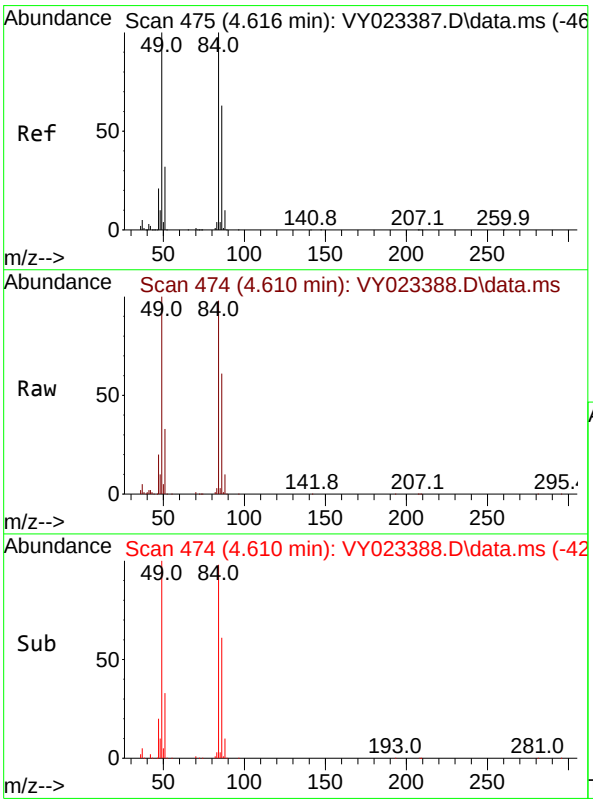
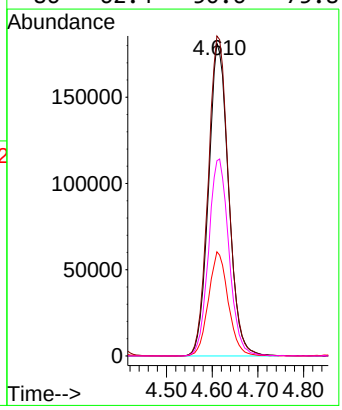
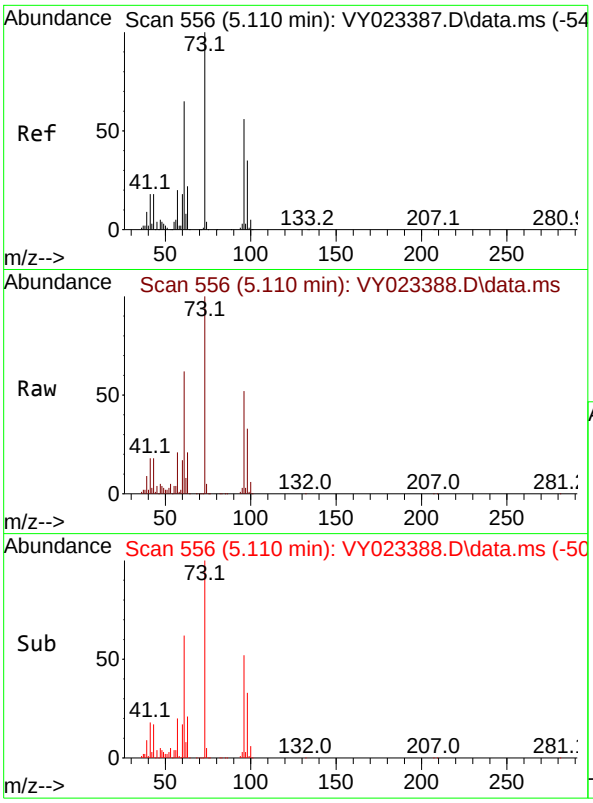


#20
Methylene Chloride
Concen: 87.742 ug/l
RT: 4.610 min Scan# 474
Delta R.T. -0.006 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion: 84 Resp: 552018

Ion	Ratio	Lower	Upper
84	100		
49	102.4	80.2	120.4
51	33.3	25.9	38.9
86	62.4	50.6	75.8

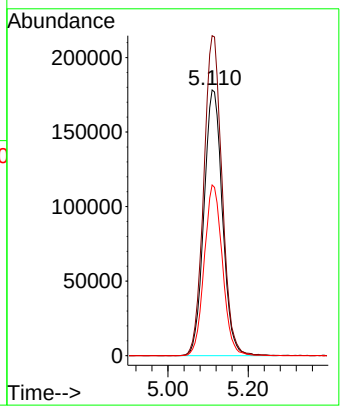




#21
trans-1,2-Dichloroethene
Concen: 91.999 ug/l
RT: 5.110 min Scan# 5
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion: 96 Resp: 56933

Ion	Ratio	Lower	Upper
96	100		
61	120.4	92.7	139.1
98	64.2	49.7	74.5



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC100

Manual Integrations
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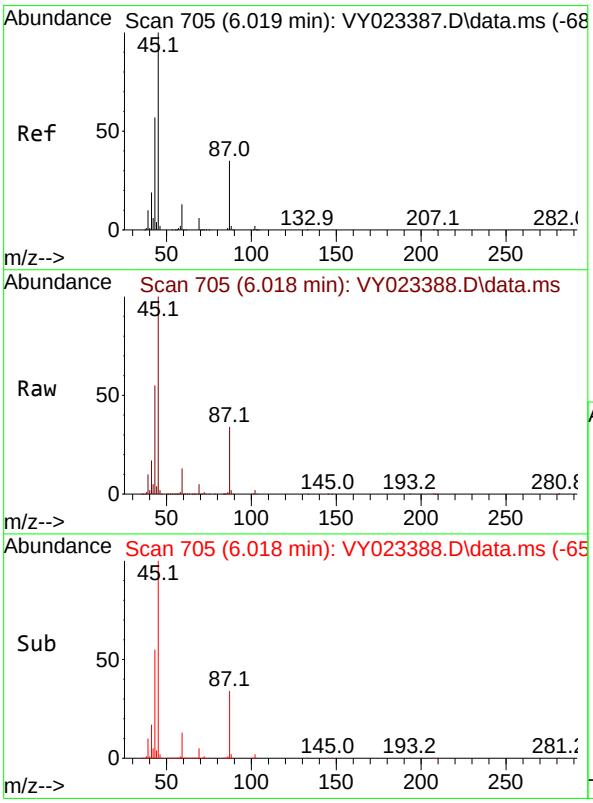
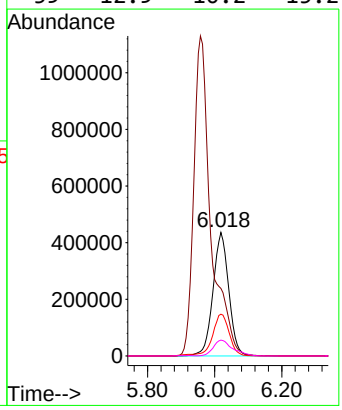
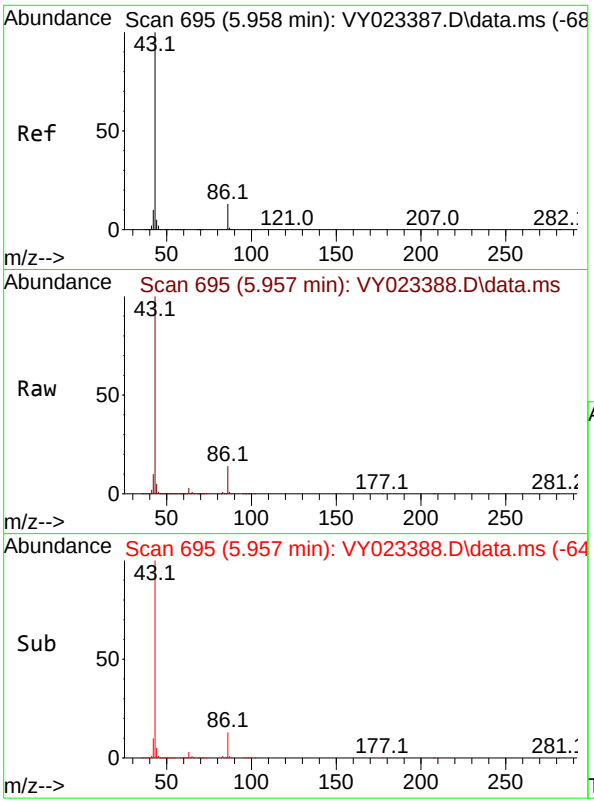


#22
Diisopropyl ether
Concen: 92.133 ug/l
RT: 6.018 min Scan# 705
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion: 45 Resp: 1423347

Ion	Ratio	Lower	Upper
45	100		
43	54.4	45.6	68.4
87	33.8	28.1	42.1
59	12.9	10.2	15.2





#23
Vinyl Acetate
Concen: 468.098 ug/l
RT: 5.957 min Scan# 6
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion: 43 Resp: 397505

Ion	Ratio	Lower	Upper
43	100		
86	13.5	10.6	15.8

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC100

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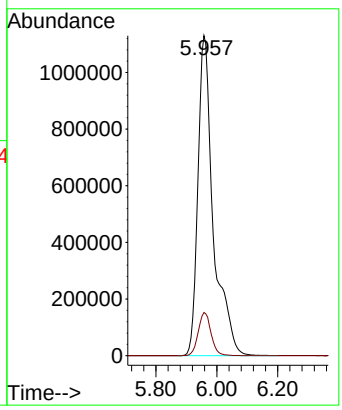
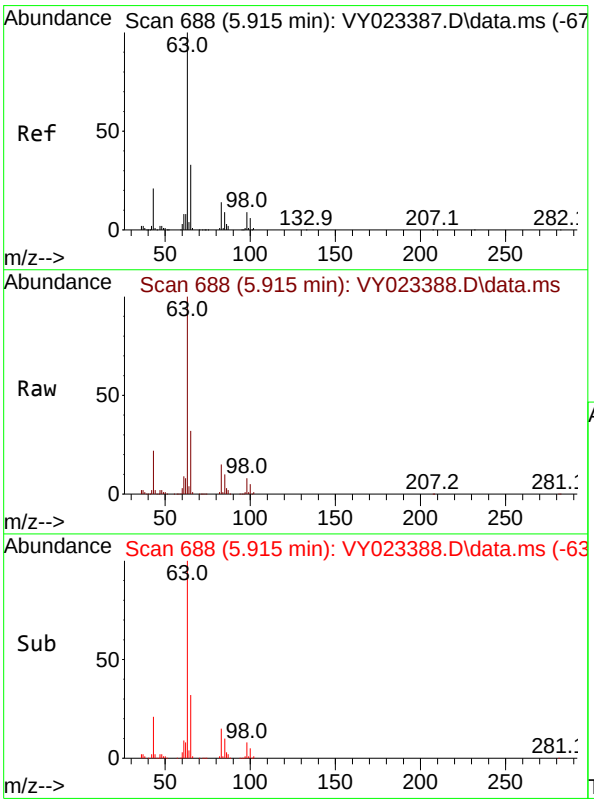
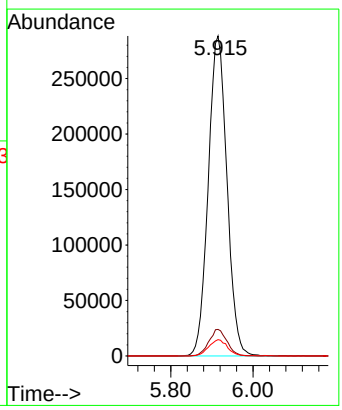


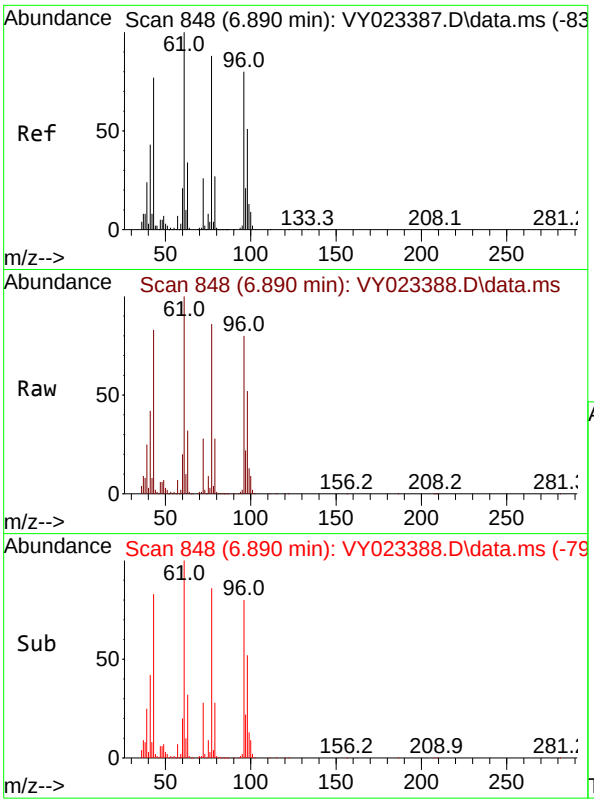


#24
1,1-Dichloroethane
Concen: 89.517 ug/l
RT: 5.915 min Scan# 688
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion: 63 Resp: 911619

Ion	Ratio	Lower	Upper
63	100		
98	8.3	4.3	13.1
100	5.1	2.8	8.4





#25
2-Butanone
Concen: 478.154 ug/l
RT: 6.890 min Scan# 84
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion: 43 Resp: 68569

Ion	Ratio	Lower	Upper
43	100		
72	33.9	27.4	41.2

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC100

Manual Integrations
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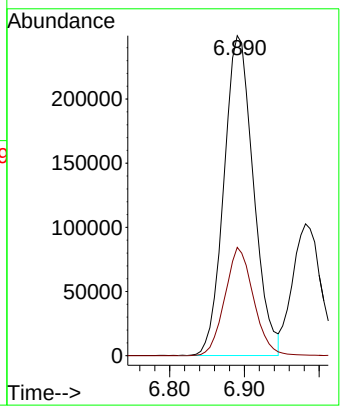
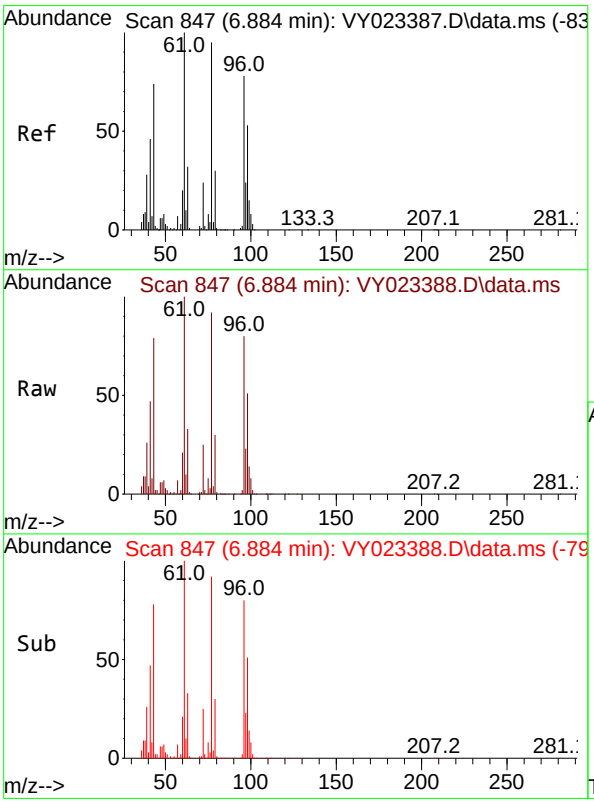
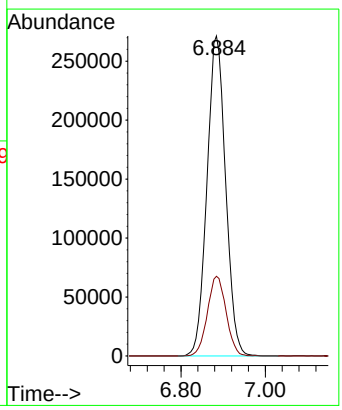


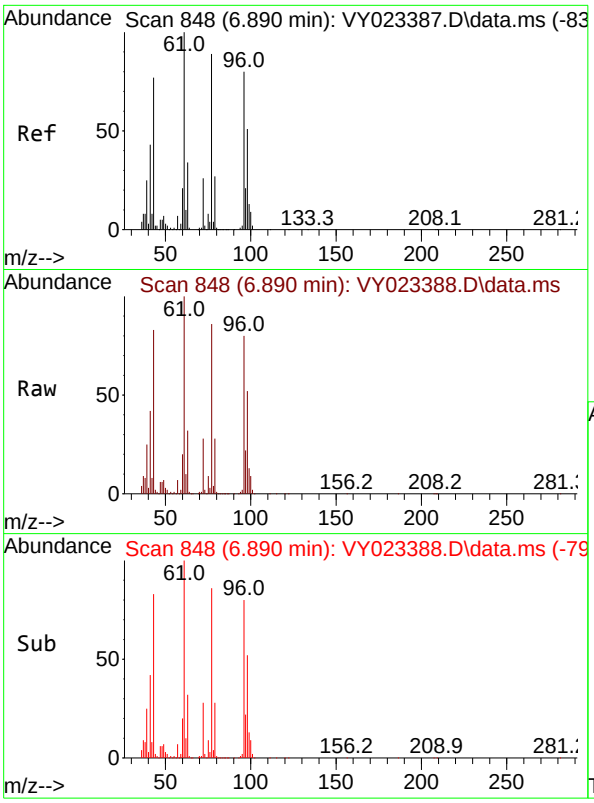


#26
2,2-Dichloropropane
Concen: 92.108 ug/l
RT: 6.884 min Scan# 847
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion: 77 Resp: 833452

Ion	Ratio	Lower	Upper
77	100		
97	25.0	12.1	36.3

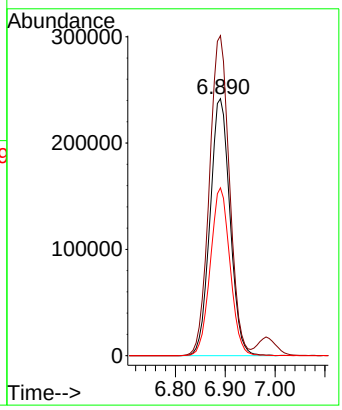




#27
cis-1,2-Dichloroethene
Concen: 95.557 ug/l
RT: 6.890 min Scan# 84
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion: 96 Resp: 67077

Ion	Ratio	Lower	Upper
96	100		
61	125.9	0.0	258.2
98	64.7	0.0	132.0



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC100

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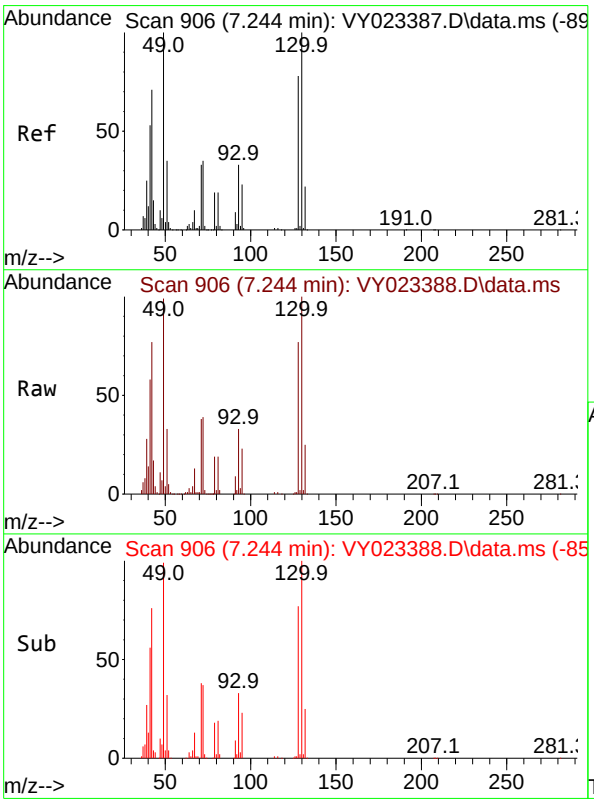
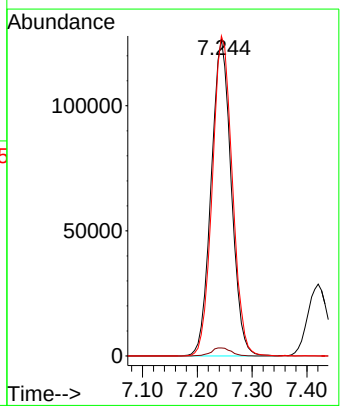
Supervised By :Mahesh Dadoda 10/10/2025

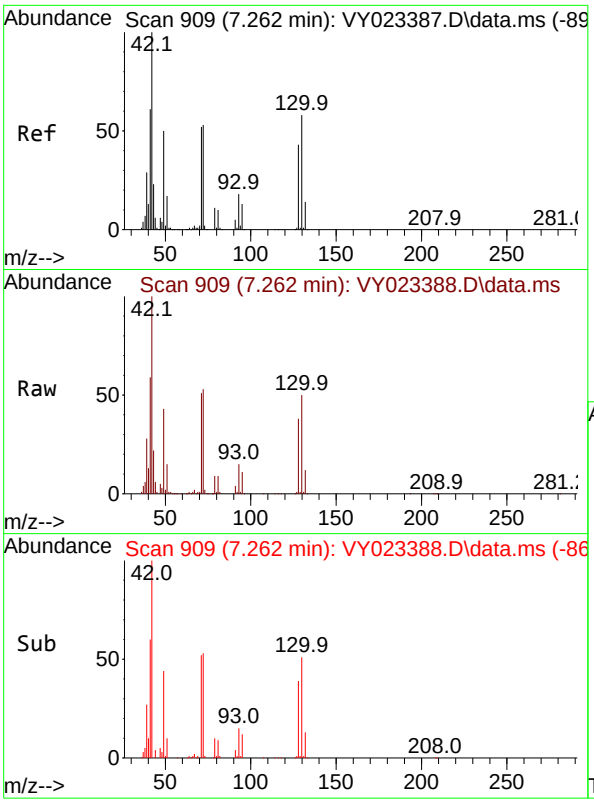


#28
Bromochloromethane
Concen: 81.418 ug/l
RT: 7.244 min Scan# 906
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion: 49 Resp: 321657

Ion	Ratio	Lower	Upper
49	100		
129	2.5	0.0	5.6
130	100.9	81.9	122.9

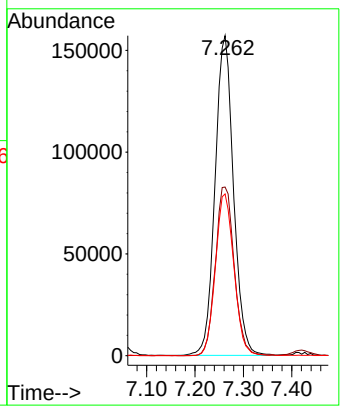




#29
Tetrahydrofuran
Concen: 488.587 ug/l
RT: 7.262 min Scan# 9
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion: 42 Resp: 41586

Ion	Ratio	Lower	Upper
42	100		
72	54.1	43.0	64.6
71	50.9	40.1	60.1



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC100

Manual Integrations
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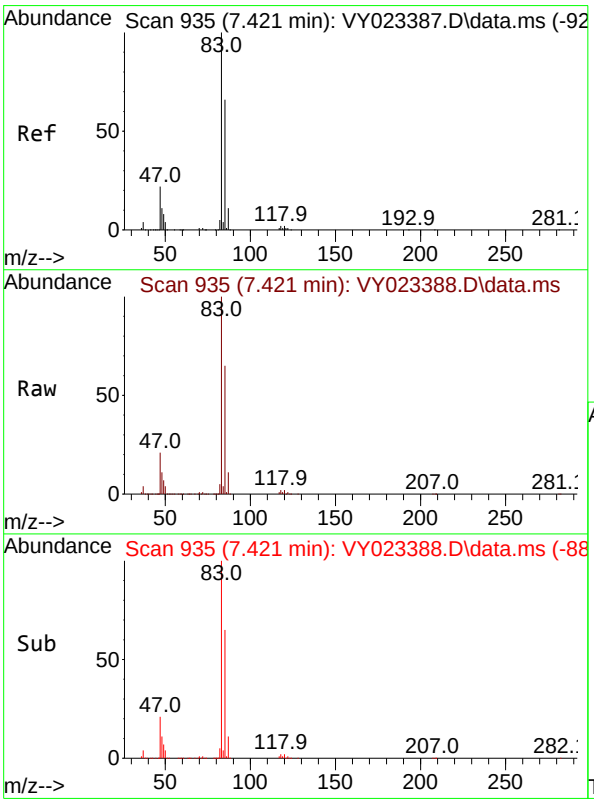
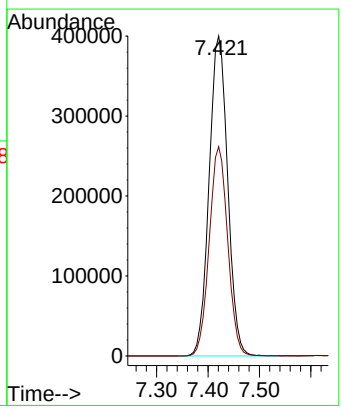
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

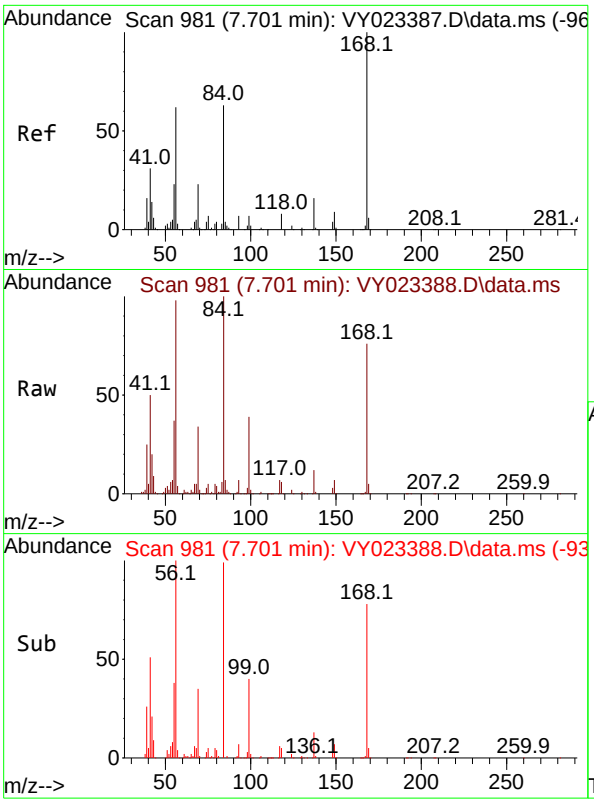


#30
Chloroform
Concen: 91.401 ug/l
RT: 7.421 min Scan# 935
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion: 83 Resp: 1003722

Ion	Ratio	Lower	Upper
83	100		
85	65.4	52.5	78.7

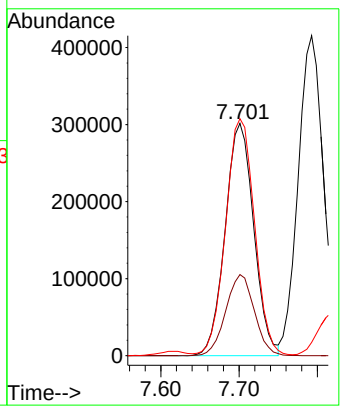




#31
Cyclohexane
Concen: 85.293 ug/l
RT: 7.701 min Scan# 9
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion: 56 Resp: 76708

Ion	Ratio	Lower	Upper
56	100		
69	34.9	30.0	45.0
84	100.2	81.2	121.8



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC100

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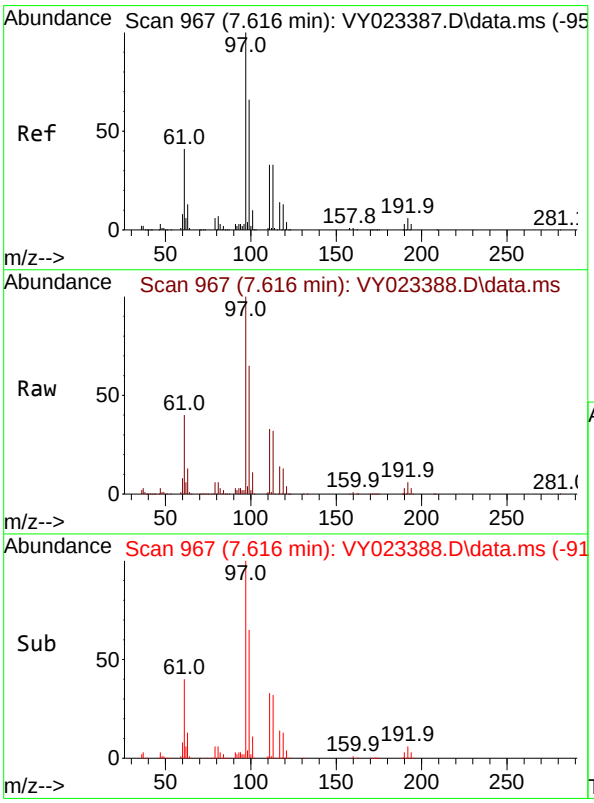
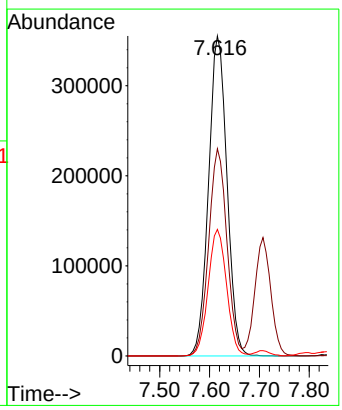
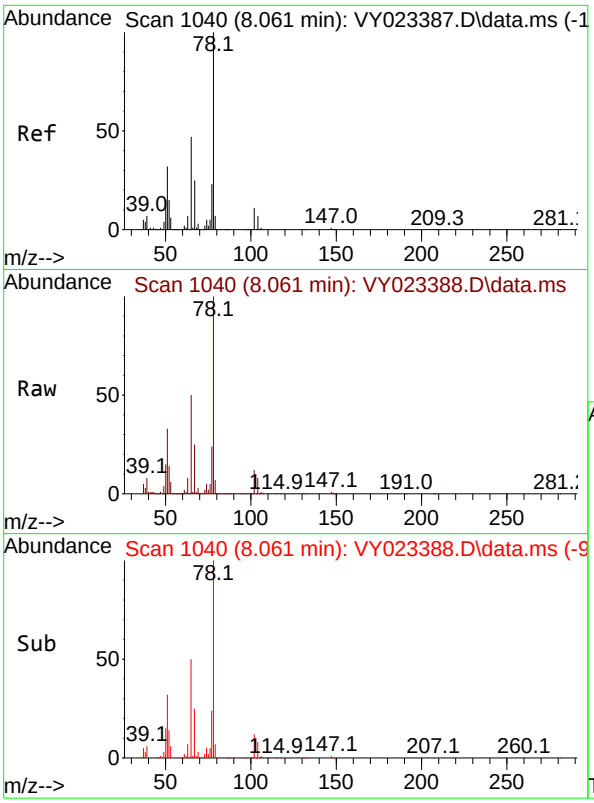


#32
1,1,1-Trichloroethane
Concen: 92.399 ug/l
RT: 7.616 min Scan# 967
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion: 97 Resp: 910837

Ion	Ratio	Lower	Upper
97	100		
99	64.3	51.4	77.2
61	39.7	31.9	47.9

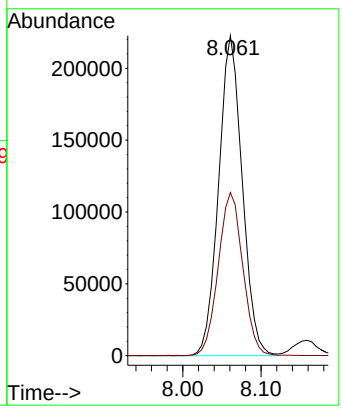




#33
1,2-Dichloroethane-d4
Concen: 90.510 ug/l
RT: 8.061 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion: 65 Resp: 46700

Ion	Ratio	Lower	Upper
65	100		
67	53.0	0.0	105.8



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC100

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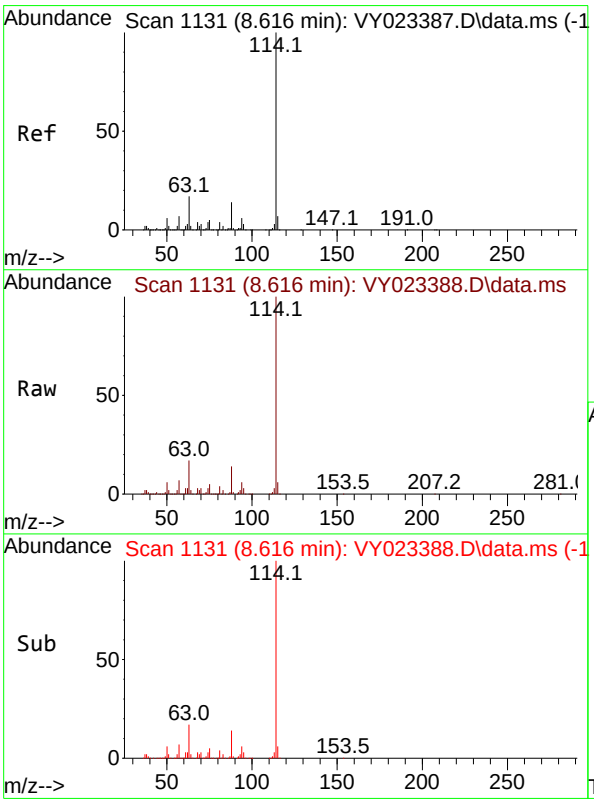
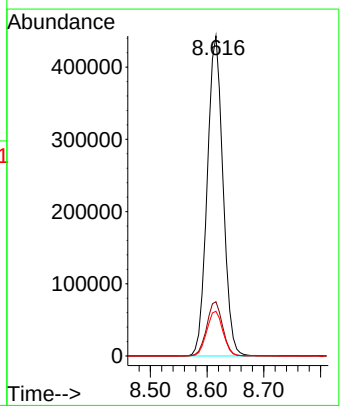
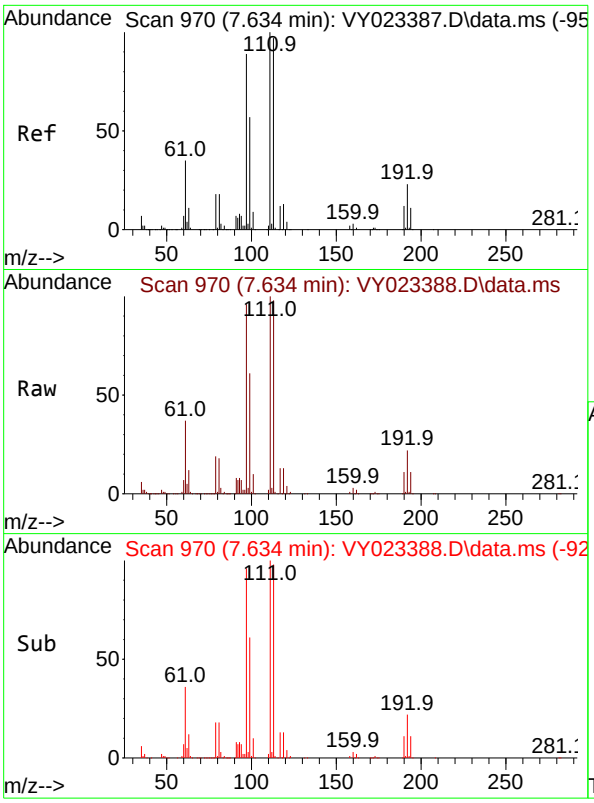


#34
1,4-Difluorobenzene
Concen: 50.000 ug/l
RT: 8.616 min Scan# 1131
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion:114 Resp: 855682

Ion	Ratio	Lower	Upper
114	100		
63	17.0	0.0	34.2
88	13.9	0.0	28.4





#35
Dibromofluoromethane
Concen: 98.497 ug/l
RT: 7.634 min Scan# 9
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion:113 Resp: 51147

Ion	Ratio	Lower	Upper
113	100		
111	102.4	81.8	122.6
192	22.5	18.0	27.0

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC100

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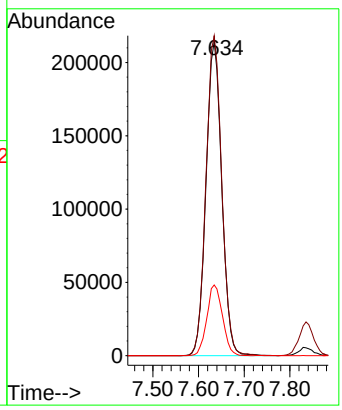
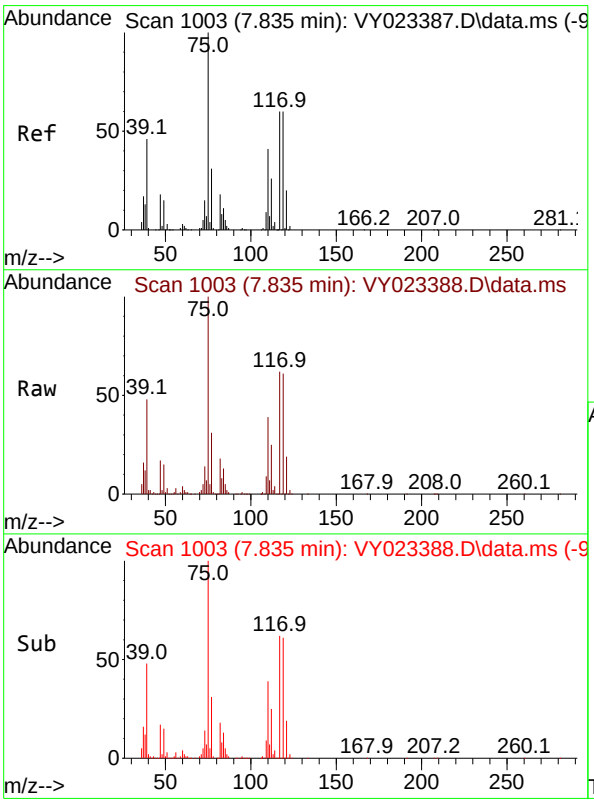
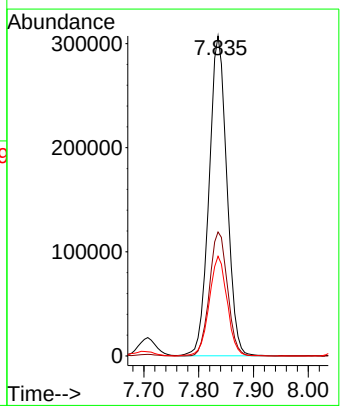


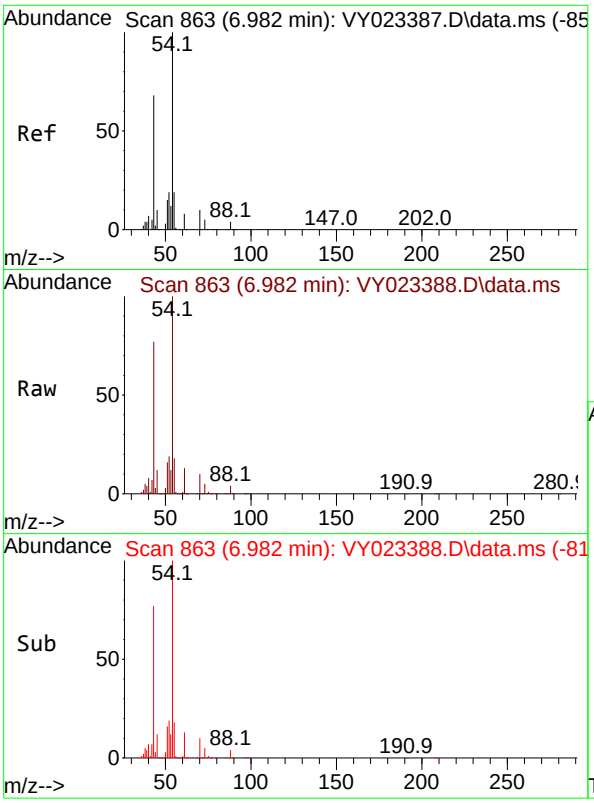


#36
1,1-Dichloropropene
Concen: 94.516 ug/l
RT: 7.835 min Scan# 1003
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion: 75 Resp: 692477

Ion	Ratio	Lower	Upper
75	100		
110	39.2	19.9	59.7
77	31.4	25.0	37.6

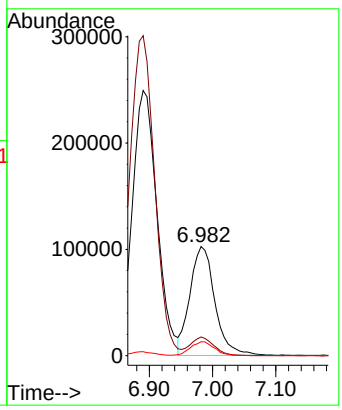




#37
Ethyl Acetate
Concen: 96.859 ug/l
RT: 6.982 min Scan# 8
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion: 43 Resp: 28056

Ion	Ratio	Lower	Upper
43	100		
61	15.9	11.8	17.8
70	12.4	10.5	15.7



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC100

Manual Integrations
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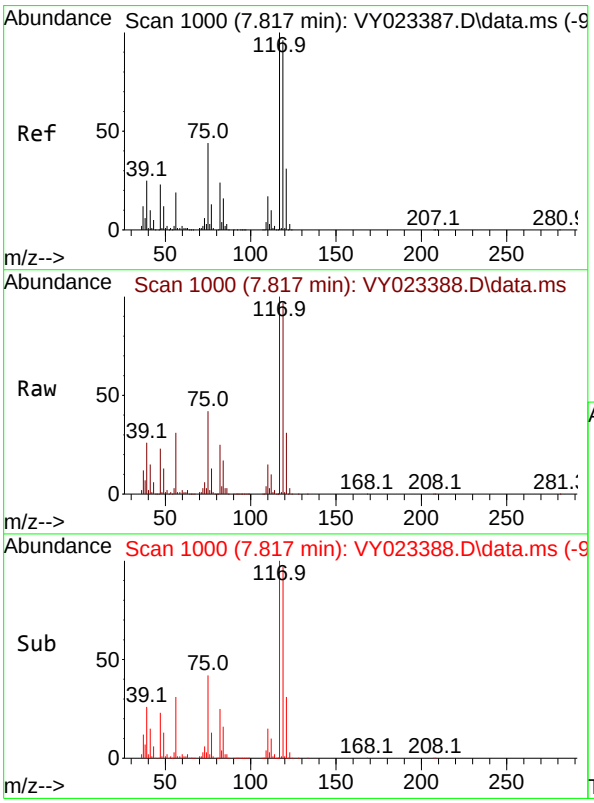
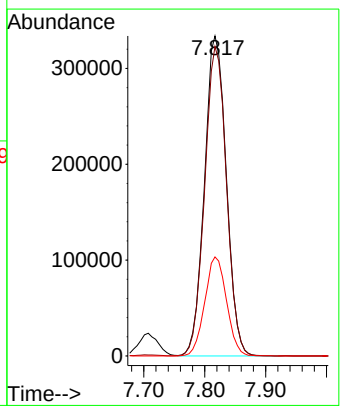
Supervised By :Mahesh Dadoda 10/10/2025

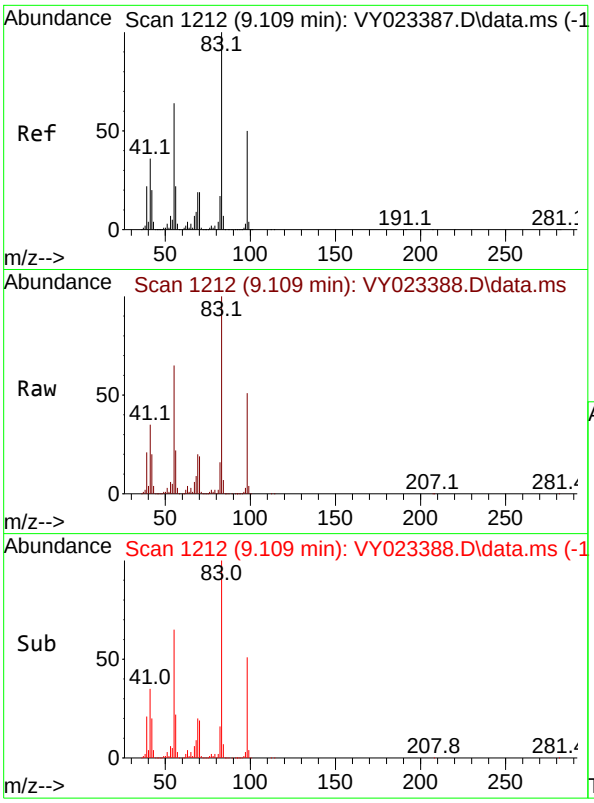


#38
Carbon Tetrachloride
Concen: 97.894 ug/l
RT: 7.817 min Scan# 1000
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion:117 Resp: 833170

Ion	Ratio	Lower	Upper
117	100		
119	96.7	76.8	115.2
121	30.9	24.5	36.7

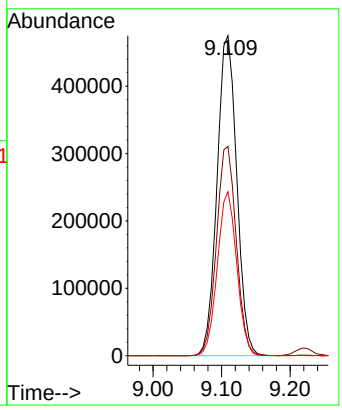




#39
Methylcyclohexane
Concen: 101.024 ug/l
RT: 9.109 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion: 83 Resp: 94766

Ion	Ratio	Lower	Upper
83	100		
55	65.4	51.4	77.2
98	51.3	40.4	60.6



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC100

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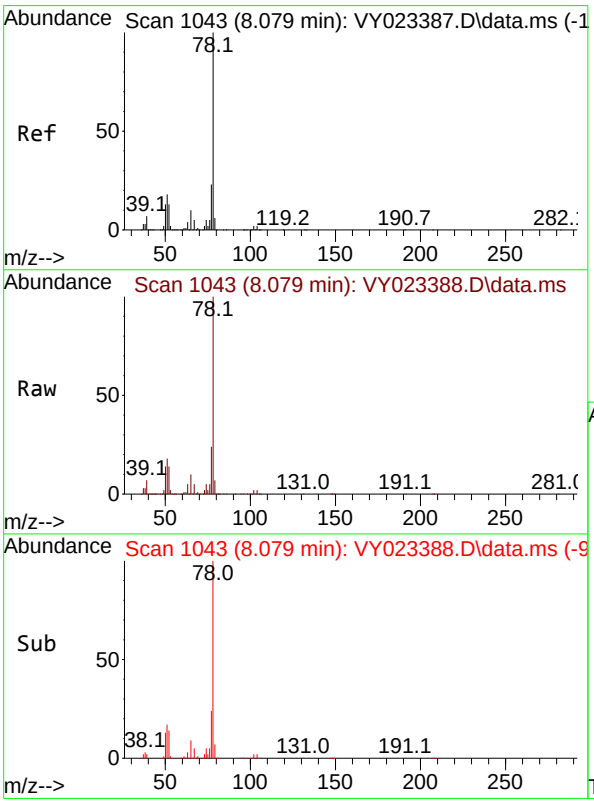
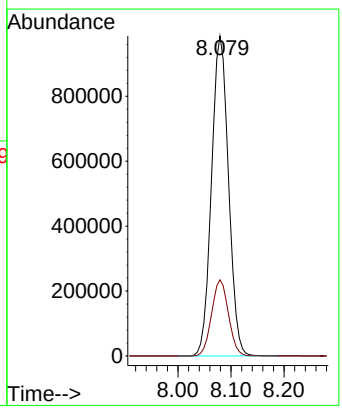
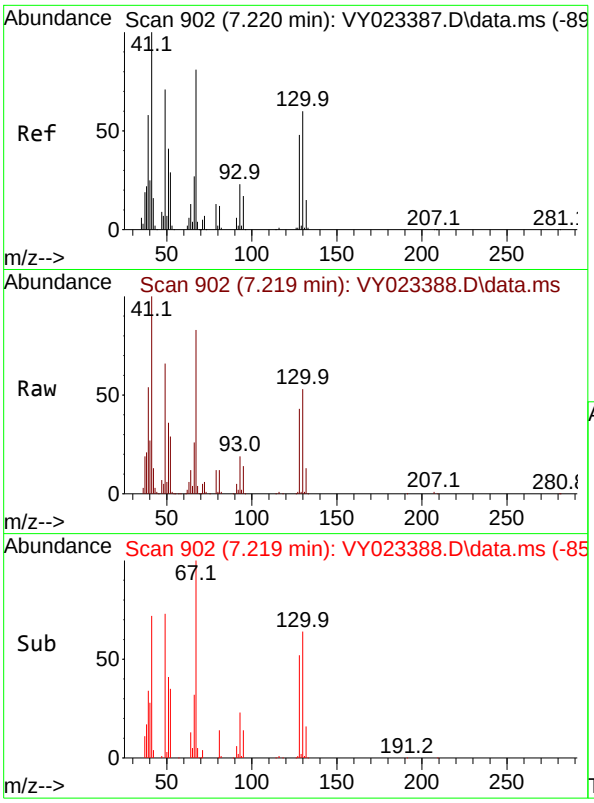


#40
Benzene
Concen: 96.000 ug/l
RT: 8.079 min Scan# 1043
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion: 78 Resp: 2192645

Ion	Ratio	Lower	Upper
78	100		
77	23.8	18.3	27.5

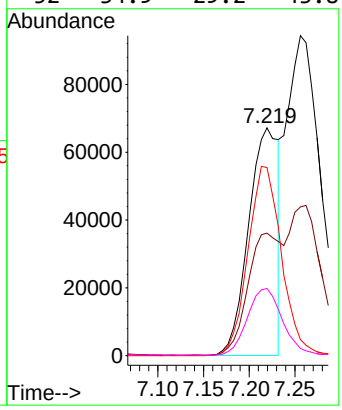




#41
Methacrylonitrile
Concen: 101.200 ug/l
RT: 7.219 min Scan# 9
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion: 41 Resp: 15223

Ion	Ratio	Lower	Upper
41	100		
39	62.6	52.2	78.4
67	93.9	74.9	112.3
52	34.9	29.2	43.8



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC100

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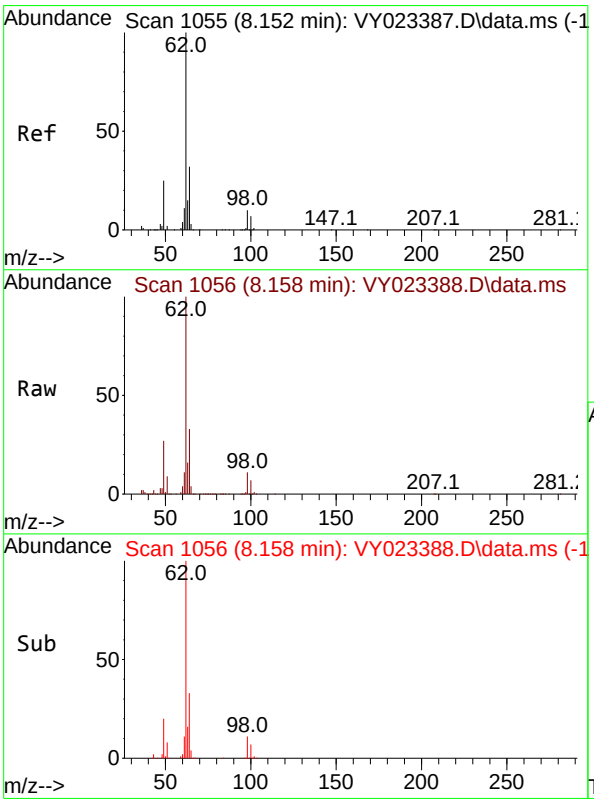
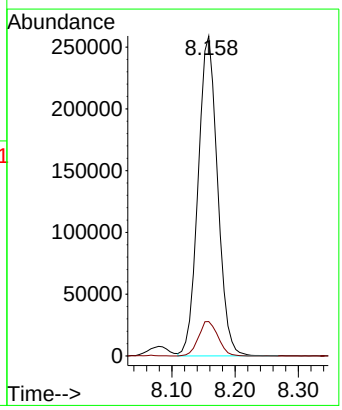
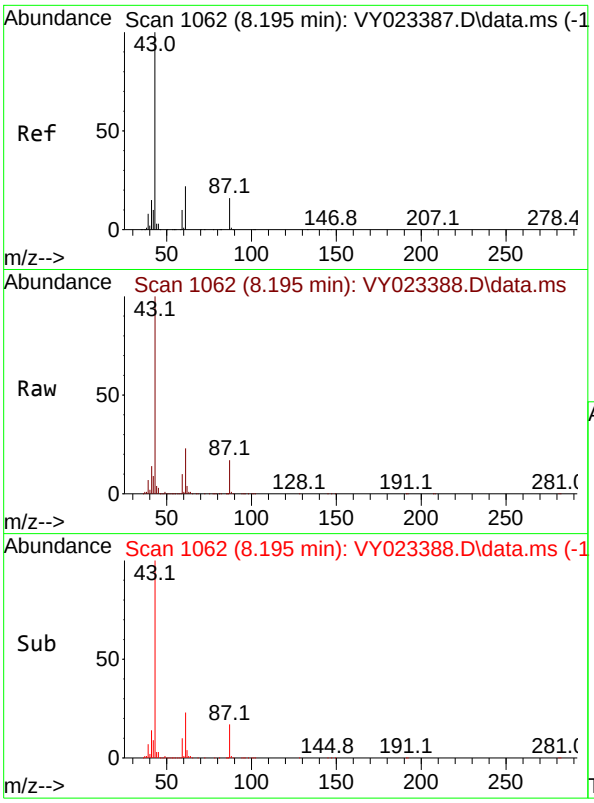


#42
1,2-Dichloroethane
Concen: 95.449 ug/l
RT: 8.158 min Scan# 1056
Delta R.T. 0.006 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion: 62 Resp: 554810

Ion	Ratio	Lower	Upper
62	100		
98	10.8	0.0	21.6

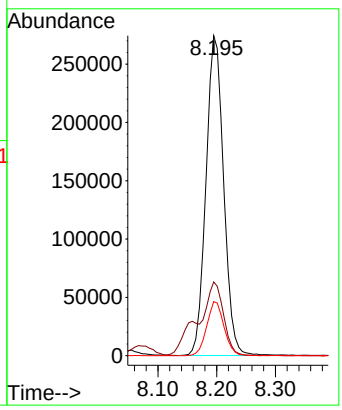




#43
Isopropyl Acetate
Concen: 101.815 ug/l
RT: 8.195 min Scan# 1(
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion: 43 Resp: 57365

Ion	Ratio	Lower	Upper
43	100		
61	23.0	18.1	27.1
87	16.6	13.5	20.3



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC100

Manual Integrations
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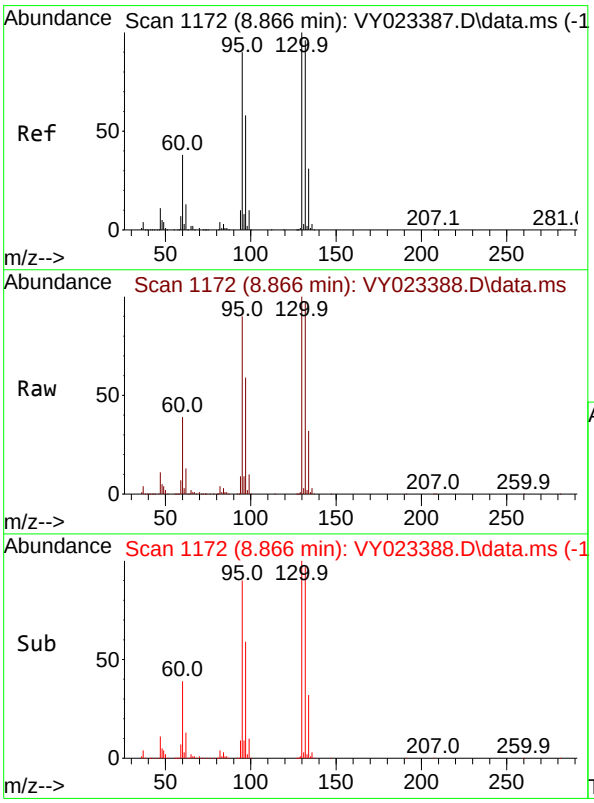
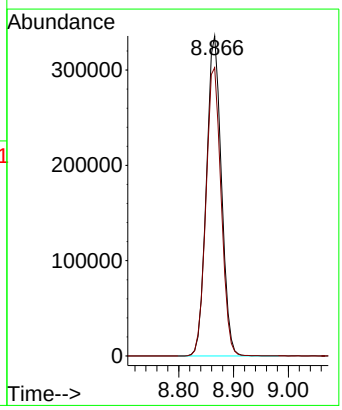
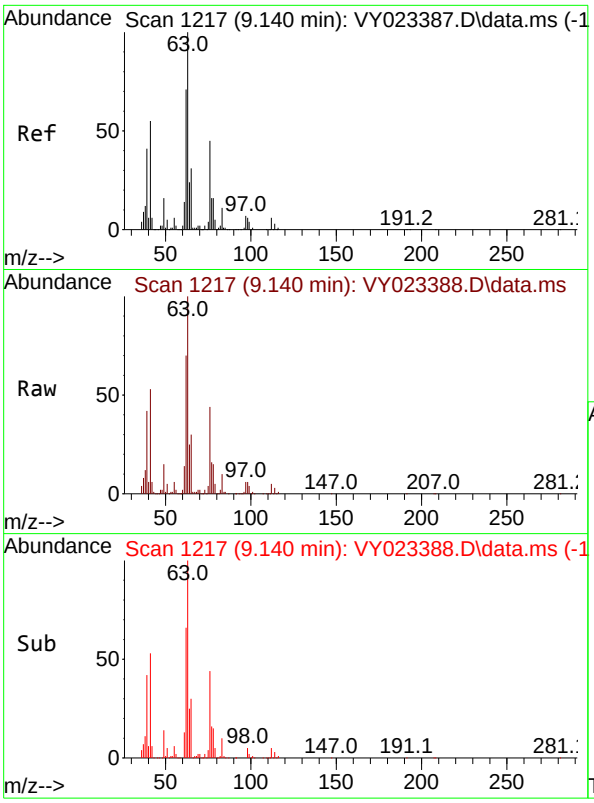


#44
Trichloroethene
Concen: 99.245 ug/l
RT: 8.866 min Scan# 1172
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion:130 Resp: 636149

Ion	Ratio	Lower	Upper
130	100		
95	90.1	0.0	180.6

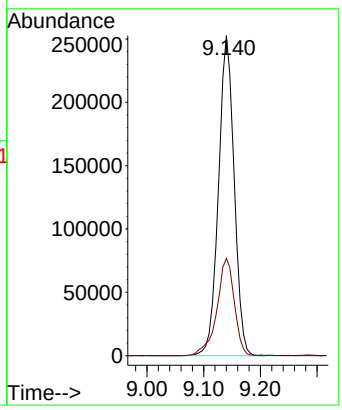




#45
1,2-Dichloropropane
Concen: 94.381 ug/l
RT: 9.140 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion: 63 Resp: 48508

Ion	Ratio	Lower	Upper
63	100		
65	30.3	24.9	37.3



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC100

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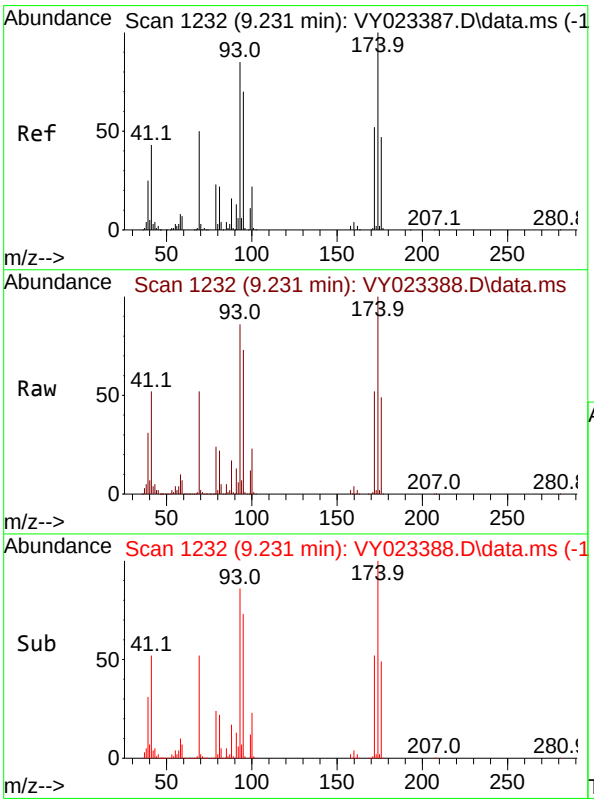
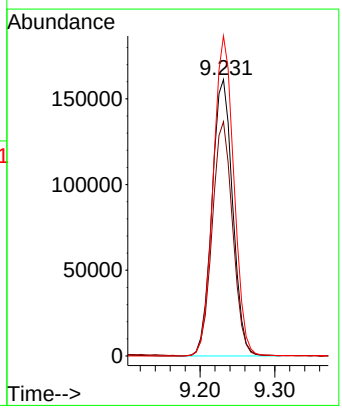
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

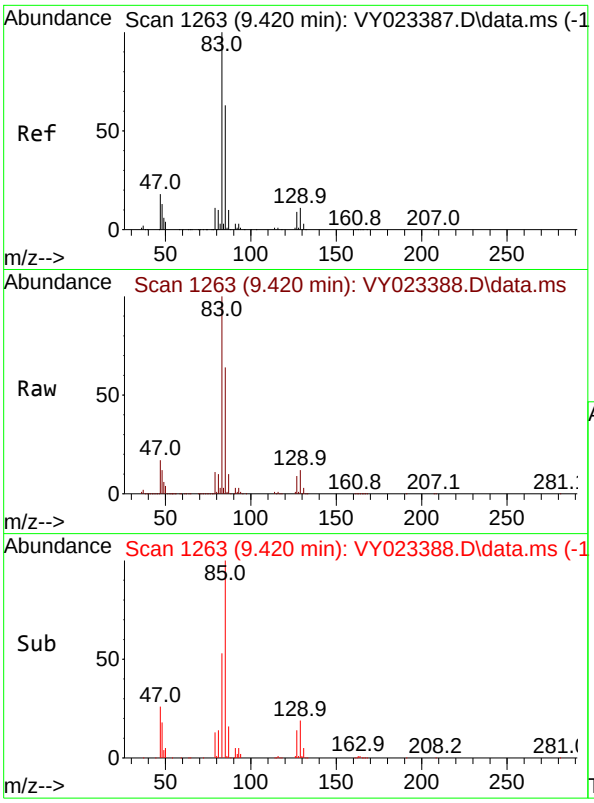


#46
Dibromomethane
Concen: 98.596 ug/l
RT: 9.231 min Scan# 1232
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion: 93 Resp: 309964

Ion	Ratio	Lower	Upper
93	100		
95	83.8	65.4	98.0
174	115.6	92.9	139.3

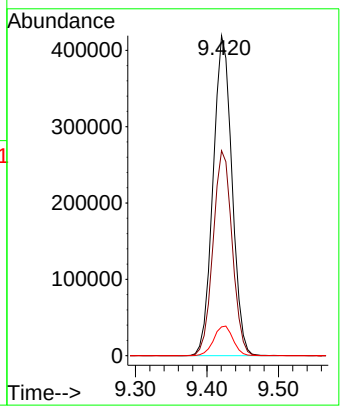




#47
Bromodichloromethane
Concen: 97.210 ug/l
RT: 9.420 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion: 83 Resp: 76923

Ion	Ratio	Lower	Upper
83	100		
85	64.1	50.8	76.2
127	9.0	7.4	11.2



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC100

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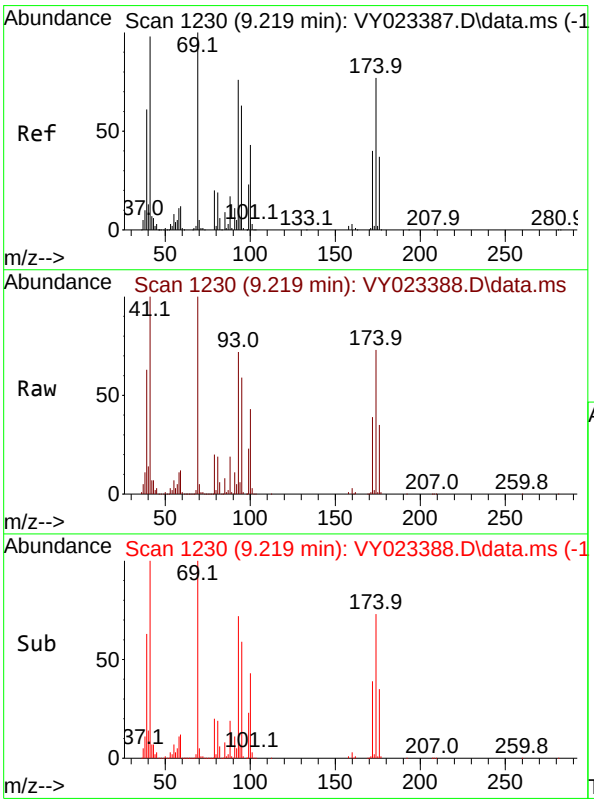
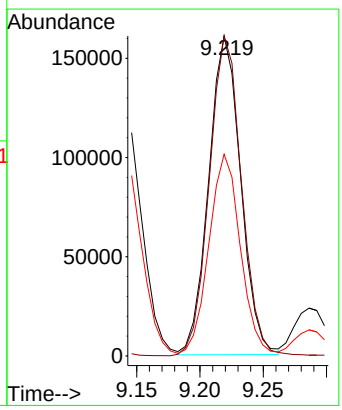
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

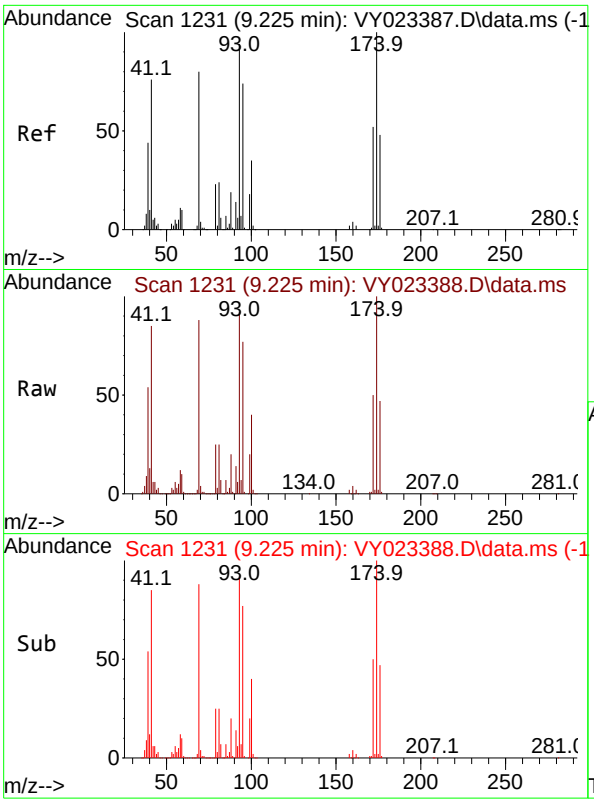


#48
Methyl methacrylate
Concen: 107.476 ug/l
RT: 9.219 min Scan# 1230
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion: 41 Resp: 282582

Ion	Ratio	Lower	Upper
41	100		
69	100.8	81.0	121.4
39	60.9	48.2	72.4

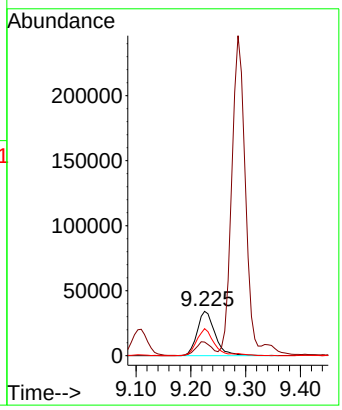




#49
1,4-Dioxane
Concen: 2374.722 ug/l
RT: 9.225 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion: 88 Resp: 7730

Ion	Ratio	Lower	Upper
88	100		
43	27.5	21.8	32.8
58	58.0	46.8	70.2



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC100

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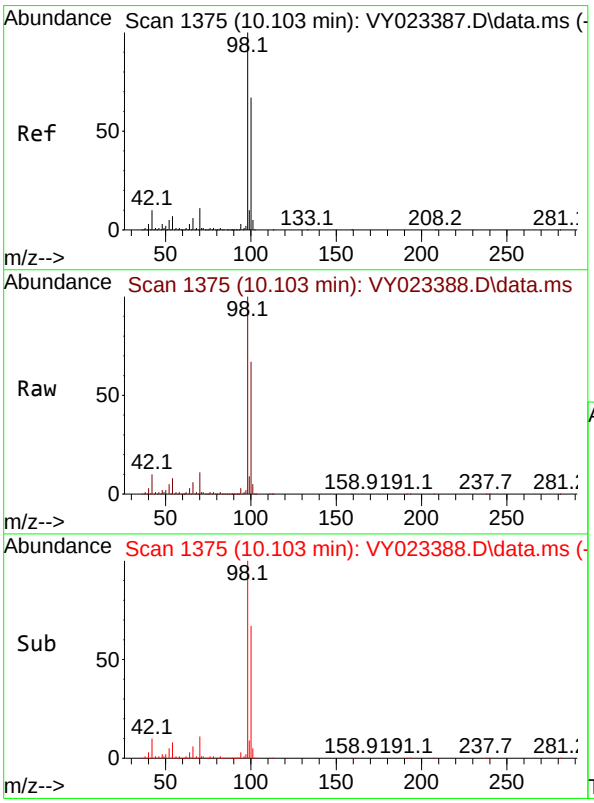
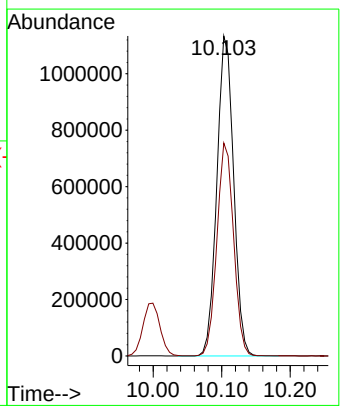
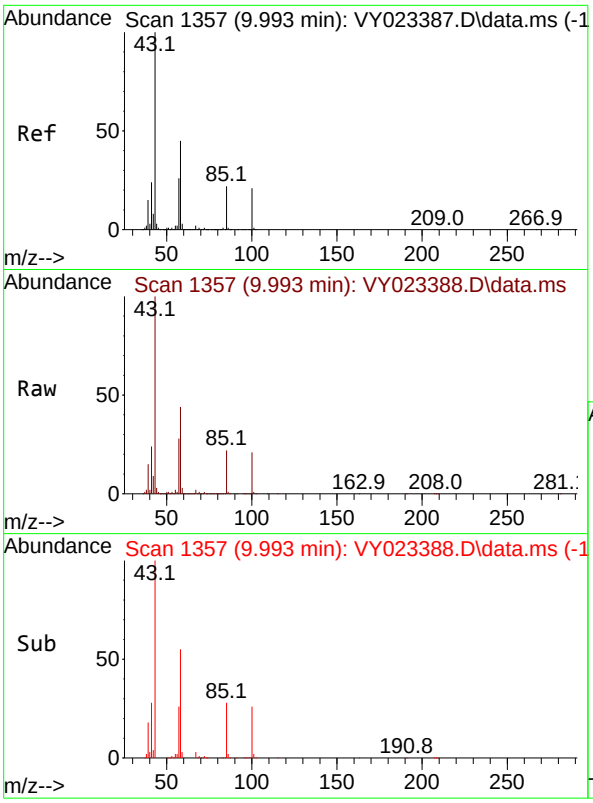


#50
Toluene-d8
Concen: 98.031 ug/l
RT: 10.103 min Scan# 1375
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion: 98 Resp: 1919872

Ion	Ratio	Lower	Upper
98	100		
100	66.3	53.0	79.4

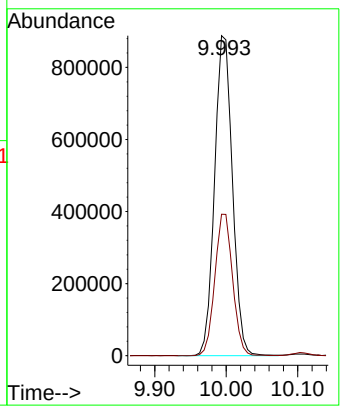




#51
4-Methyl-2-Pentanone
Concen: 533.386 ug/l
RT: 9.993 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion: 43 Resp: 153932

Ion	Ratio	Lower	Upper
43	100		
58	44.0	35.3	52.9



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC100

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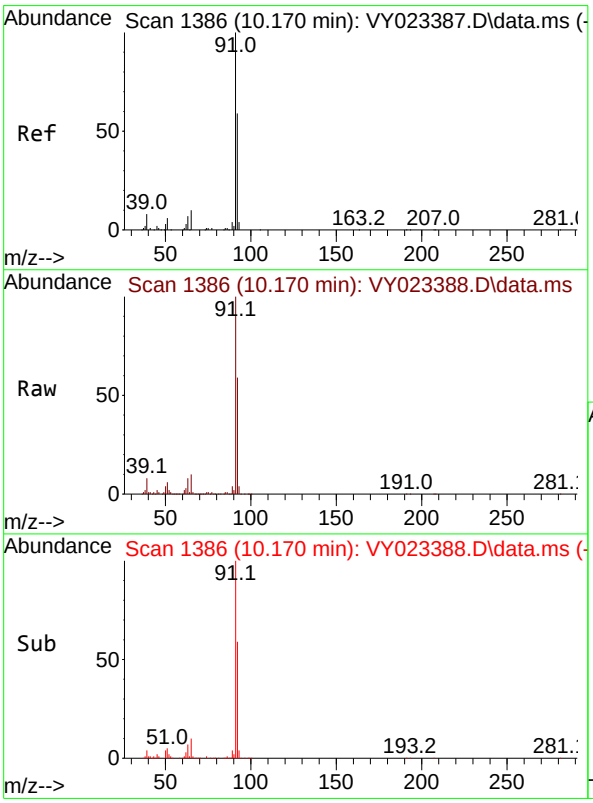
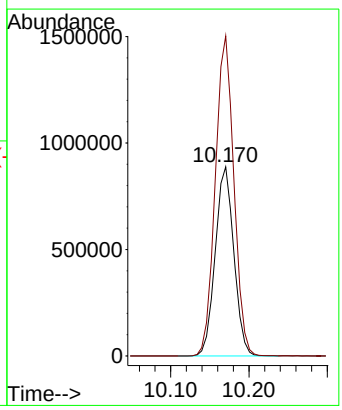
Supervised By :Mahesh Dadoda 10/10/2025

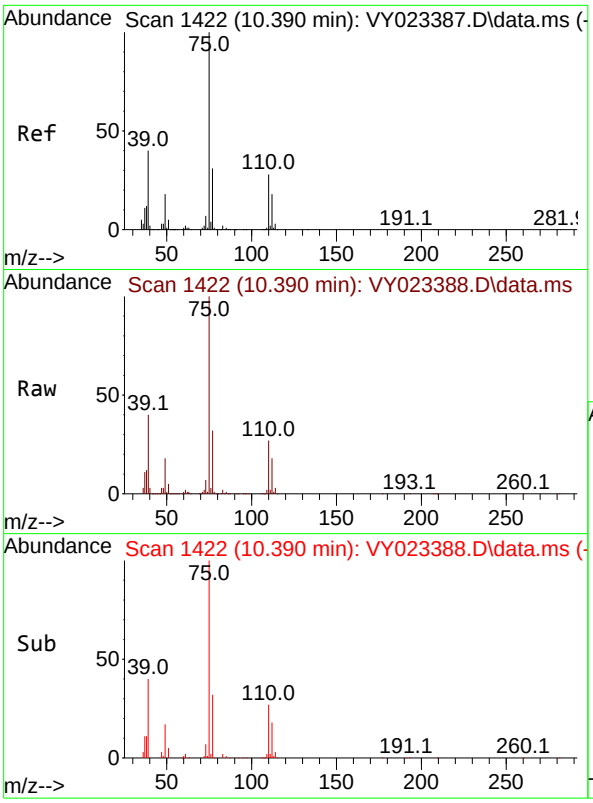


#52
Toluene
Concen: 100.905 ug/l
RT: 10.170 min Scan# 1386
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion: 92 Resp: 1462927

Ion	Ratio	Lower	Upper
92	100		
91	169.6	136.4	204.6

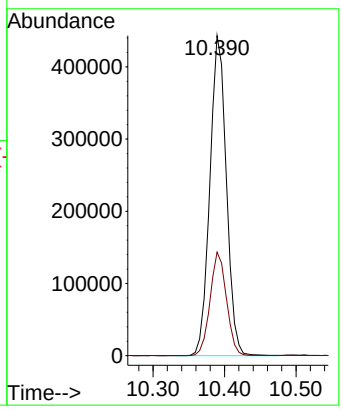




#53
t-1,3-Dichloropropene
Concen: 104.537 ug/l
RT: 10.390 min Scan# 14
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion: 75 Resp: 71047

Ion	Ratio	Lower	Upper
75	100		
77	32.3	25.1	37.7



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC100

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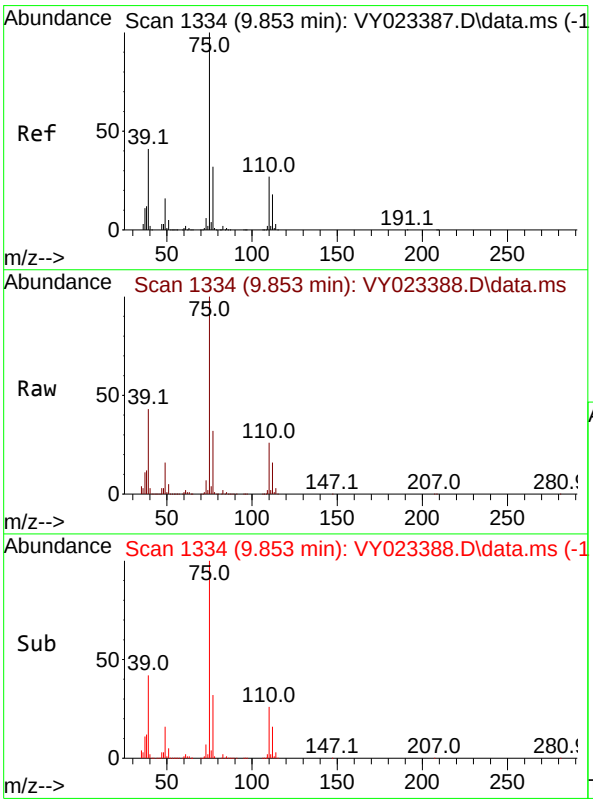
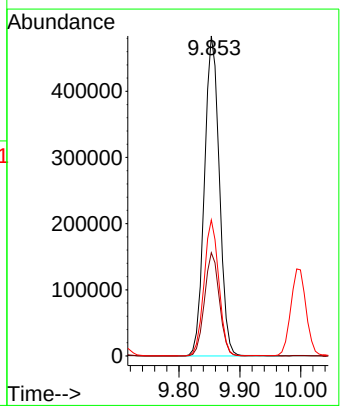
Supervised By :Mahesh Dadoda 10/10/2025

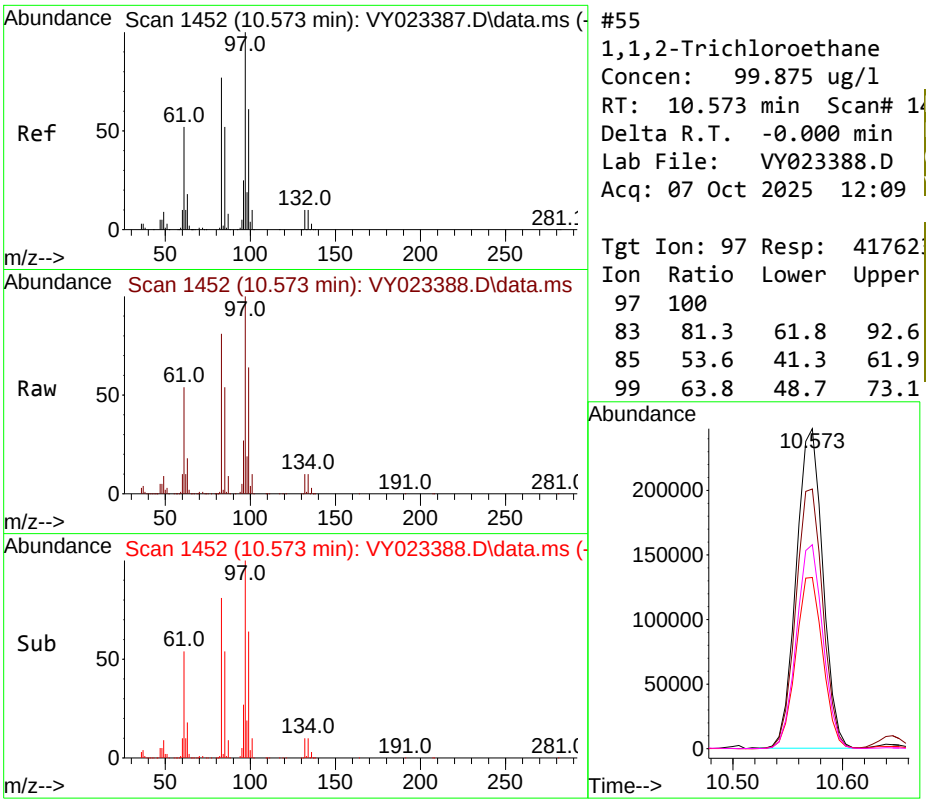


#54
cis-1,3-Dichloropropene
Concen: 101.302 ug/l
RT: 9.853 min Scan# 1334
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion: 75 Resp: 822967

Ion	Ratio	Lower	Upper
75	100		
77	32.2	25.4	38.0
39	42.5	32.8	49.2





#55
1,1,2-Trichloroethane
Concen: 99.875 ug/l
RT: 10.573 min Scan# 14
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion: 97 Resp: 41762

Ion	Ratio	Lower	Upper
97	100		
83	81.3	61.8	92.6
85	53.6	41.3	61.9
99	63.8	48.7	73.1

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC100

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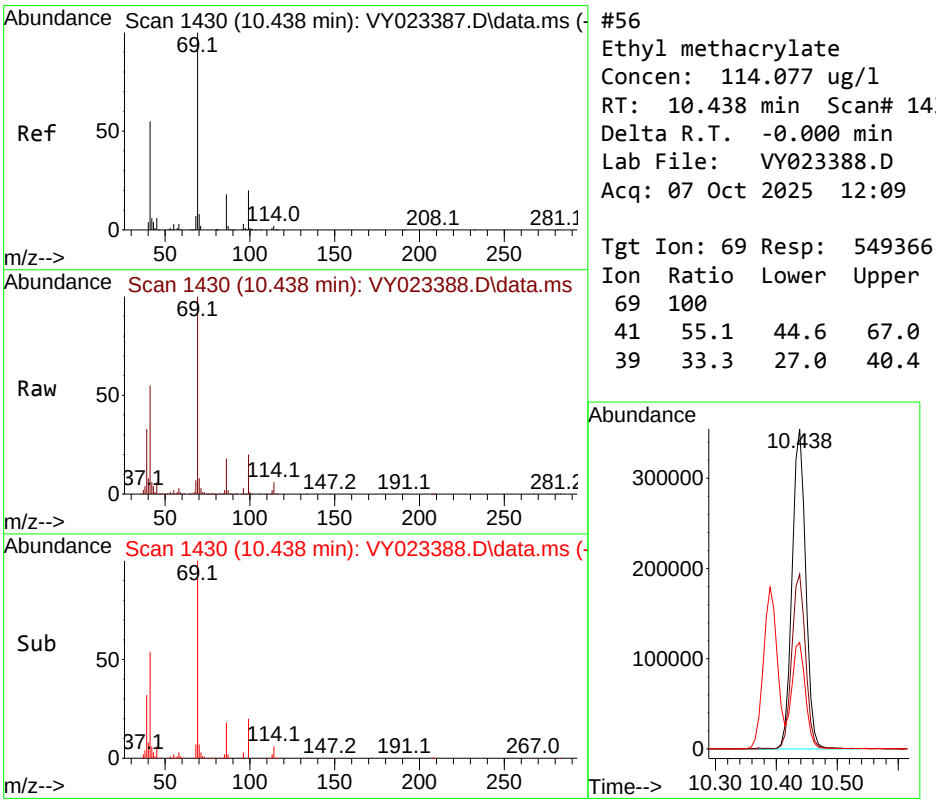
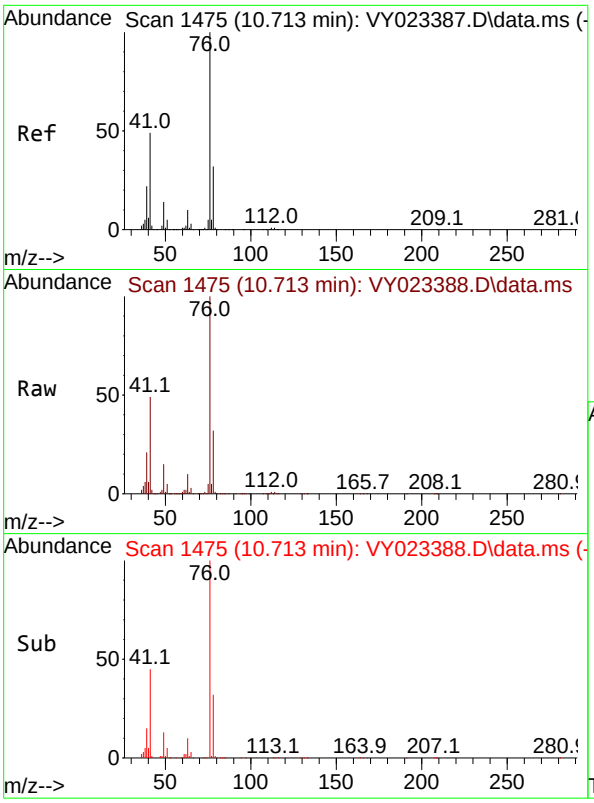
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025



#56
Ethyl methacrylate
Concen: 114.077 ug/l
RT: 10.438 min Scan# 1430
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion: 69 Resp: 549366

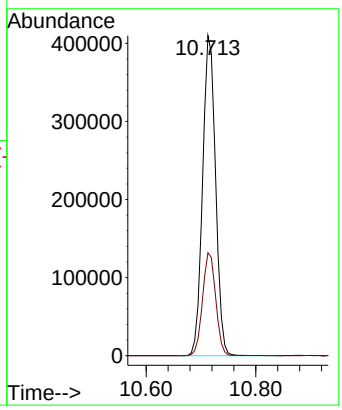
Ion	Ratio	Lower	Upper
69	100		
41	55.1	44.6	67.0
39	33.3	27.0	40.4



#57
1,3-Dichloropropane
Concen: 99.140 ug/l
RT: 10.713 min Scan# 14
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion: 76 Resp: 67096

Ion	Ratio	Lower	Upper
76	100		
78	32.6	25.9	38.9



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC100

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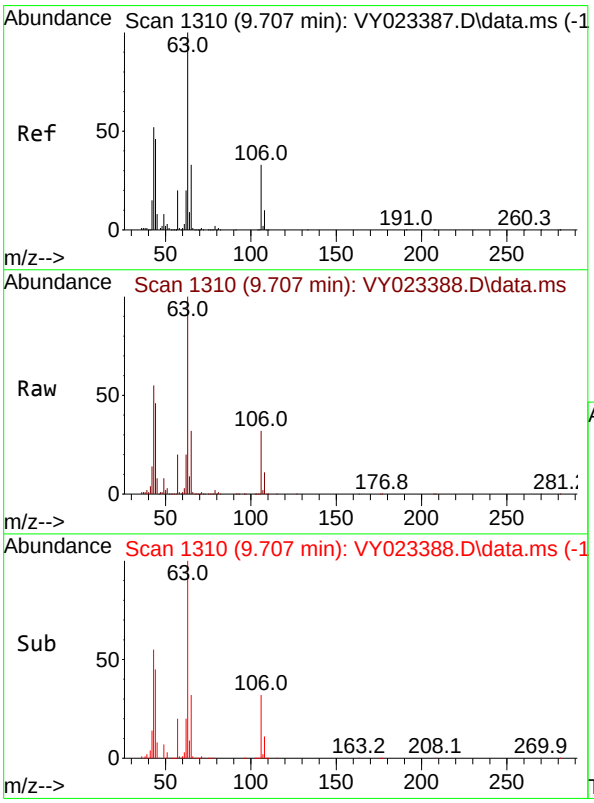
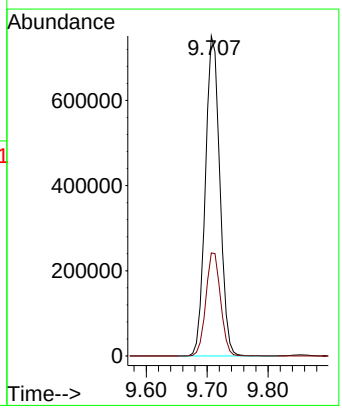
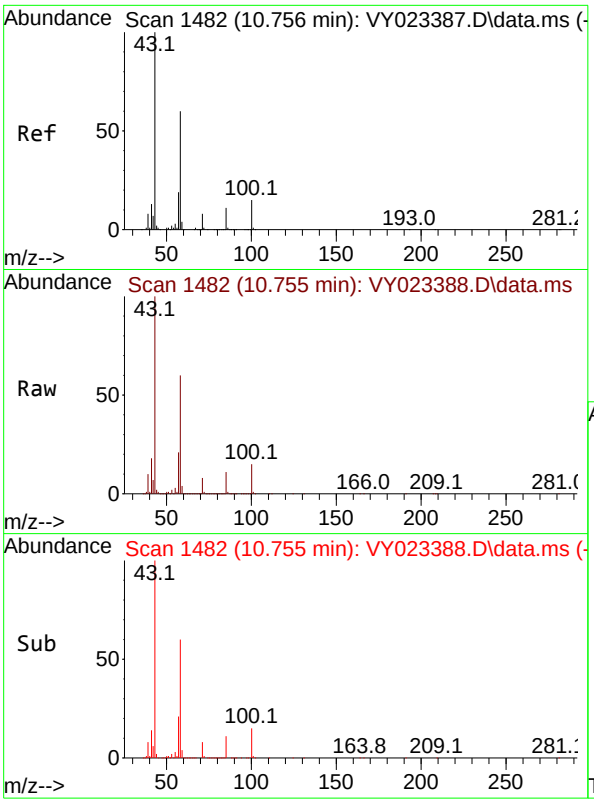


#58
2-Chloroethyl Vinyl ether
Concen: 588.731 ug/l
RT: 9.707 min Scan# 1310
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion: 63 Resp: 1240361

Ion	Ratio	Lower	Upper
63	100		
106	32.8	26.6	39.8

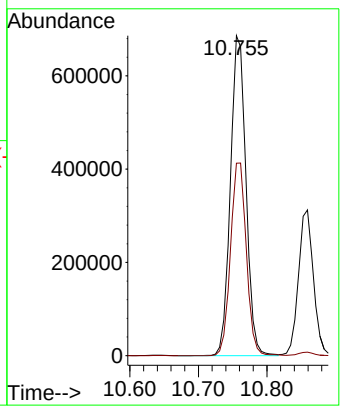




#59
2-Hexanone
Concen: 541.284 ug/l
RT: 10.755 min Scan# 14
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion: 43 Resp: 108156

Ion	Ratio	Lower	Upper
43	100		
58	61.5	30.5	91.5



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC100

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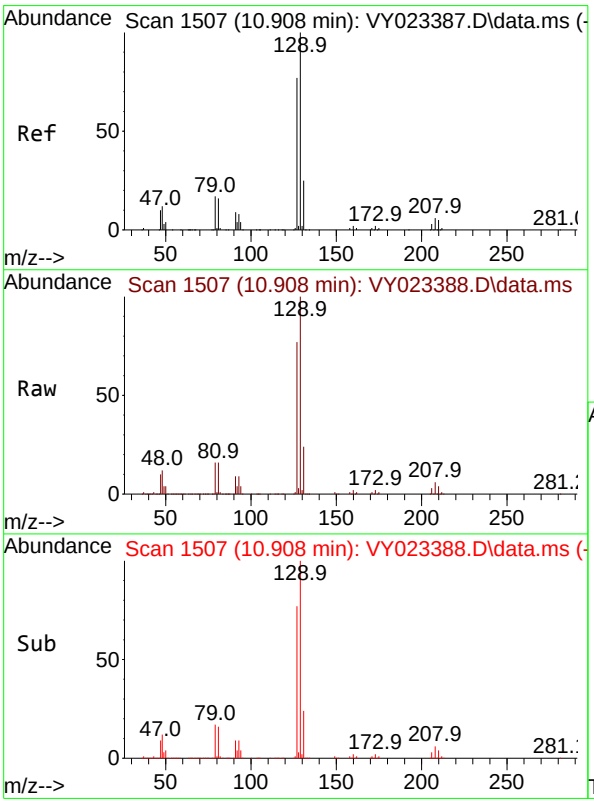
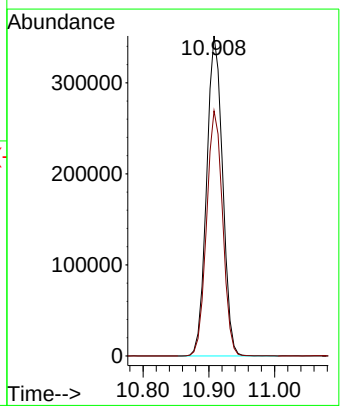
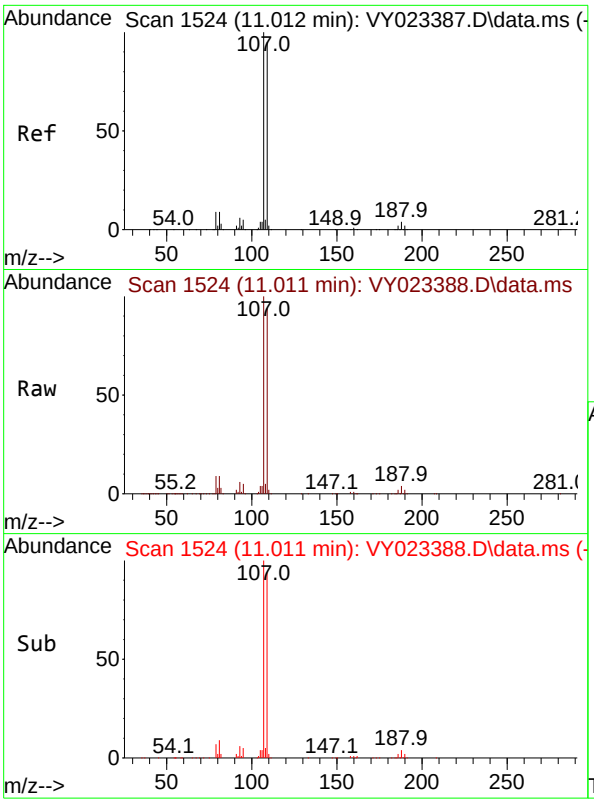


#60
Dibromochloromethane
Concen: 104.133 ug/l
RT: 10.908 min Scan# 1507
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion:129 Resp: 593878

Ion	Ratio	Lower	Upper
129	100		
127	76.9	38.6	115.7

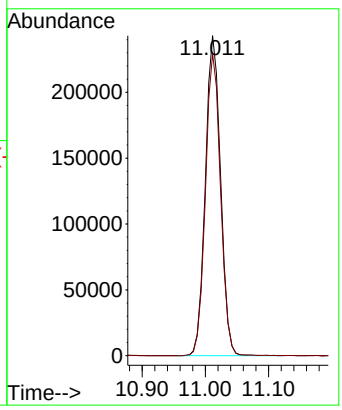




#61
1,2-Dibromoethane
Concen: 103.280 ug/l
RT: 11.011 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion:107 Resp: 40629

Ion	Ratio	Lower	Upper
107	100		
109	94.0	76.1	114.1



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC100

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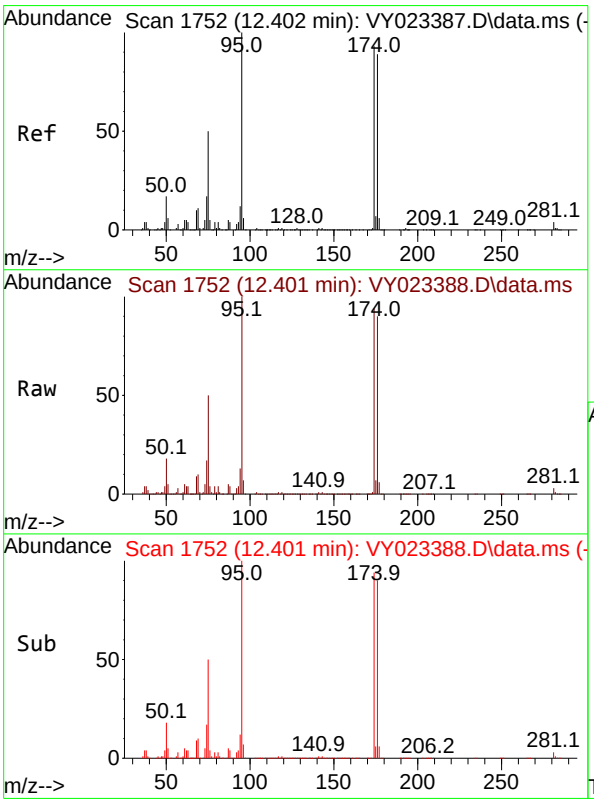
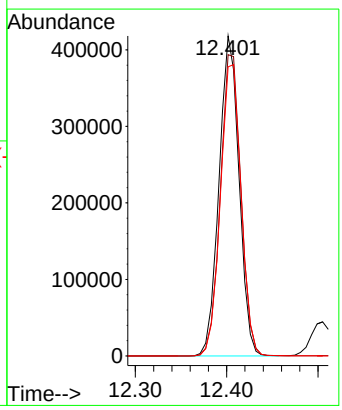
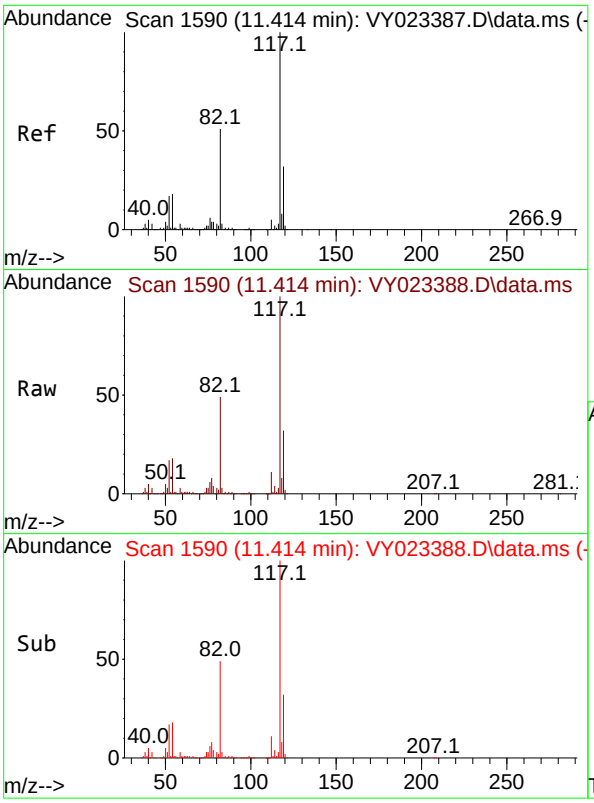


#62
4-Bromofluorobenzene
Concen: 103.007 ug/l
RT: 12.401 min Scan# 1752
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion: 95 Resp: 636435

Ion	Ratio	Lower	Upper
95	100		
174	96.7	0.0	192.8
176	94.1	0.0	187.6

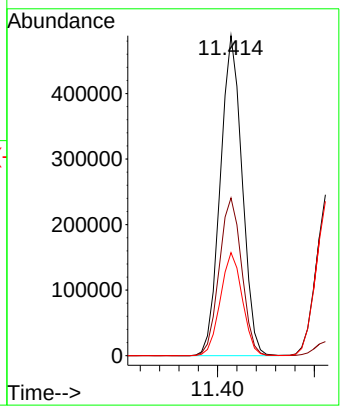




#63
Chlorobenzene-d5
Concen: 50.000 ug/l
RT: 11.414 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion:117 Resp: 76436

Ion	Ratio	Lower	Upper
117	100		
82	49.3	41.0	61.4
119	32.2	25.6	38.4



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC100

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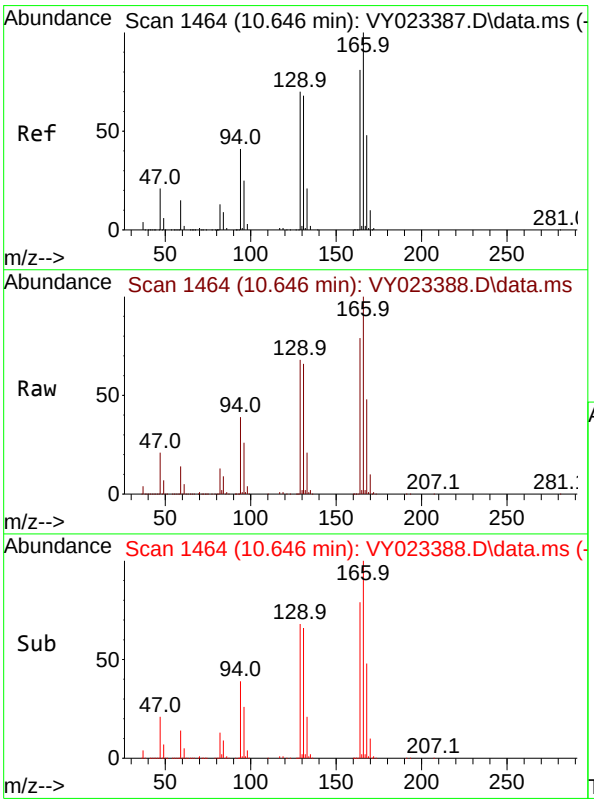
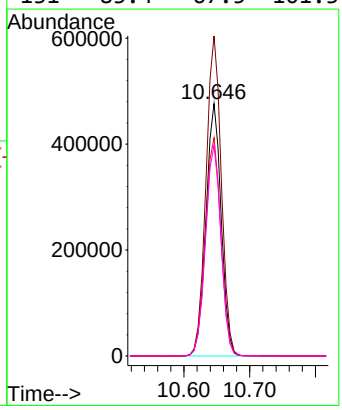
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

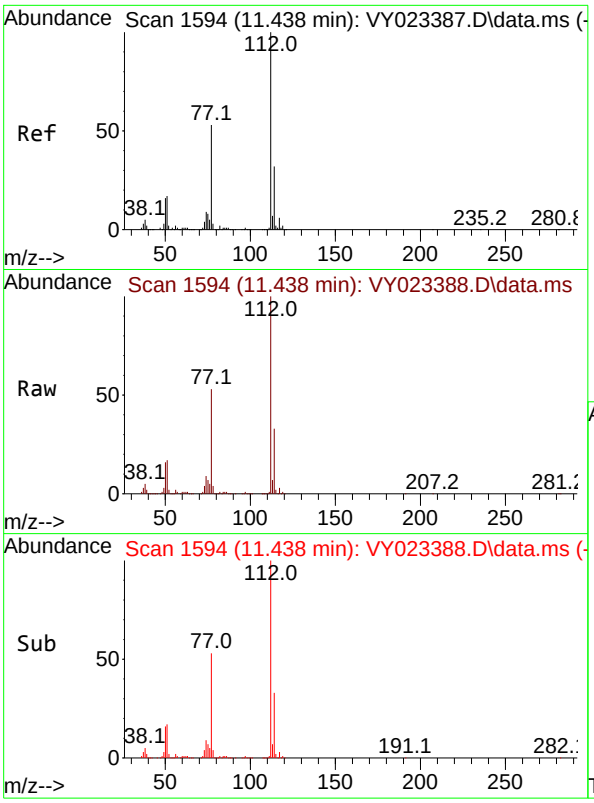


#64
Tetrachloroethene
Concen: 100.406 ug/l
RT: 10.646 min Scan# 1464
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion:164 Resp: 767753

Ion	Ratio	Lower	Upper
164	100		
166	126.9	99.4	149.0
129	86.5	69.4	104.2
131	83.4	67.5	101.3

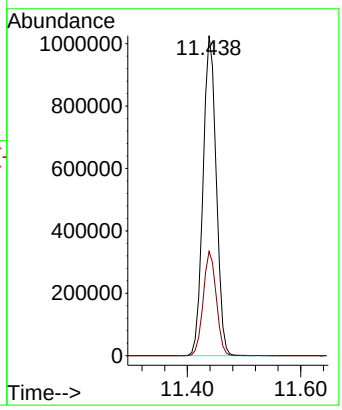




#65
Chlorobenzene
Concen: 99.649 ug/l
RT: 11.438 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion:112 Resp: 165514

Ion	Ratio	Lower	Upper
112	100		
114	32.6	25.6	38.4



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC100

Manual Integrations
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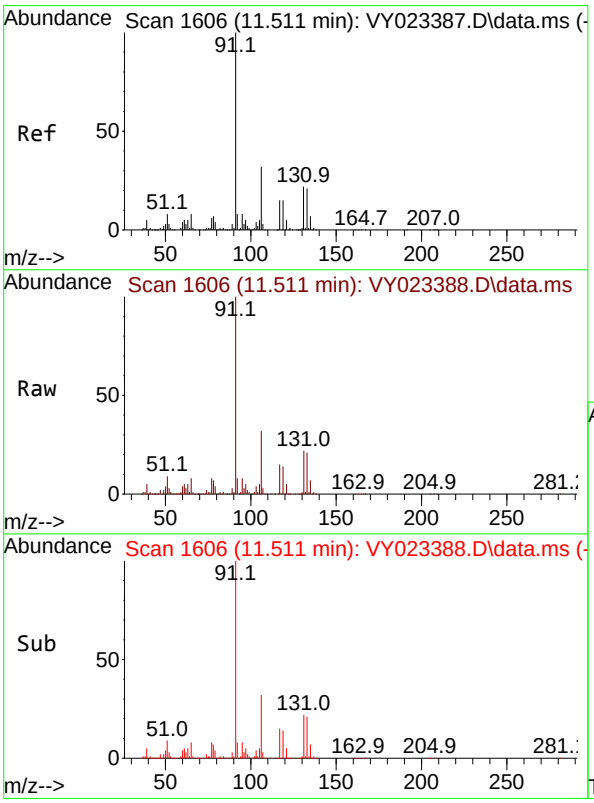
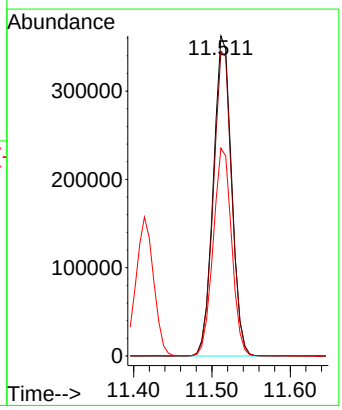
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

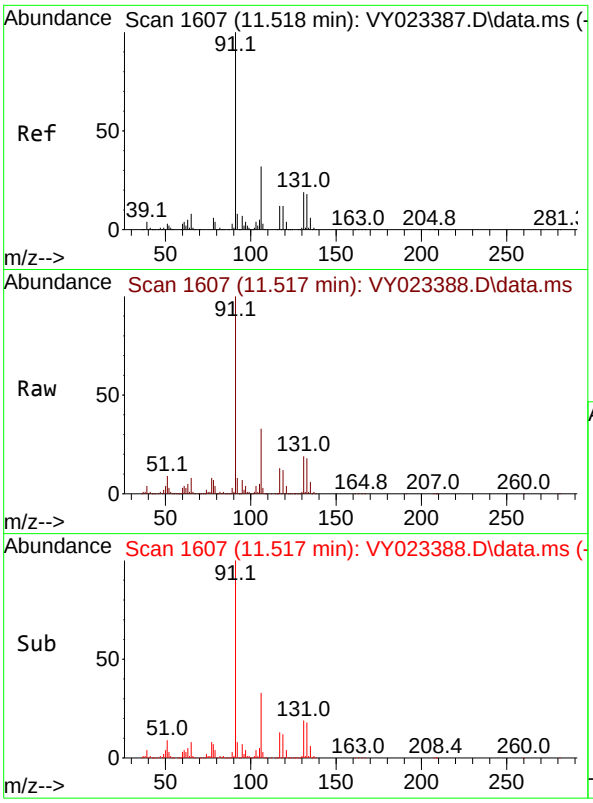


#66
1,1,1,2-Tetrachloroethane
Concen: 100.470 ug/l
RT: 11.511 min Scan# 1606
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion:131 Resp: 586878

Ion	Ratio	Lower	Upper
131	100		
133	96.0	48.4	145.2
119	65.7	32.4	97.2

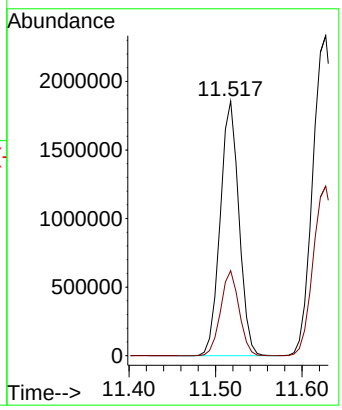




#67
Ethyl Benzene
Concen: 102.856 ug/l
RT: 11.517 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion: 91 Resp: 278825

Ion	Ratio	Lower	Upper
91	100		
106	33.4	25.8	38.8



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC100

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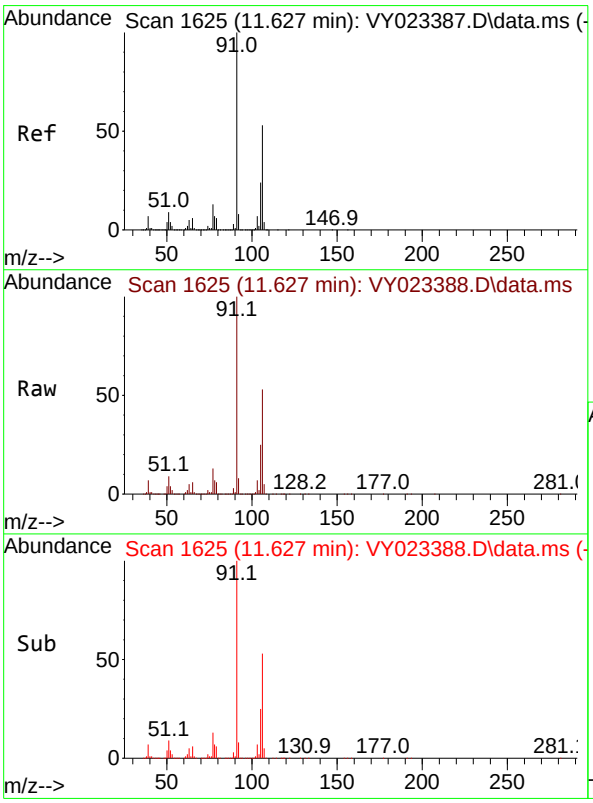
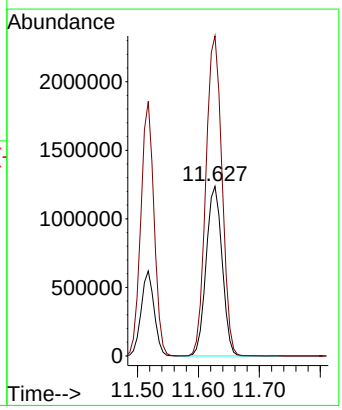
Supervised By :Mahesh Dadoda 10/10/2025

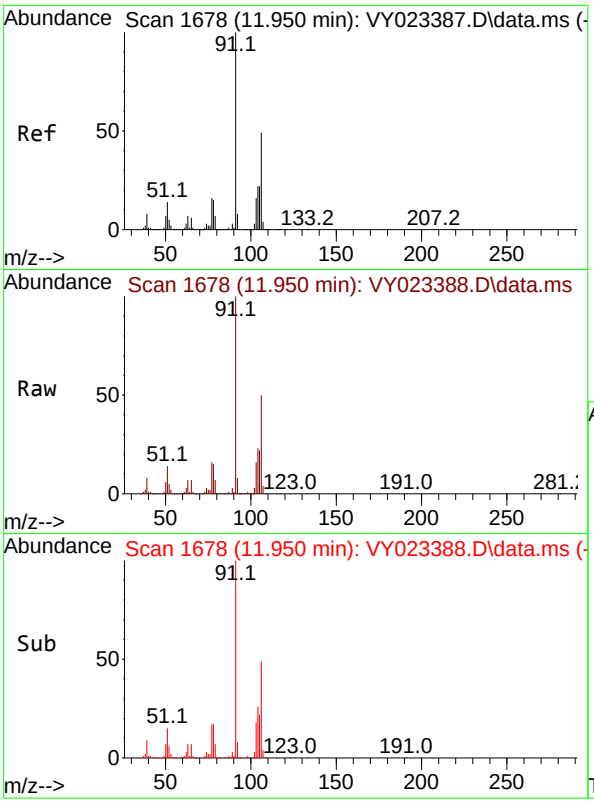


#68
m/p-Xylenes
Concen: 206.437 ug/l
RT: 11.627 min Scan# 1625
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion:106 Resp: 2243033

Ion	Ratio	Lower	Upper
106	100		
91	190.5	152.6	229.0

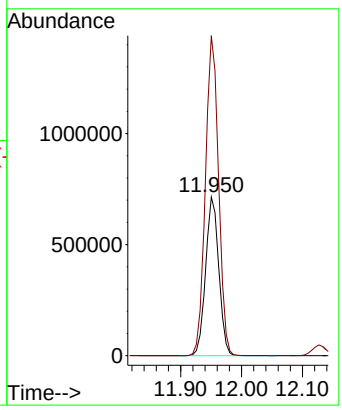




#69
o-Xylene
Concen: 106.611 ug/l
RT: 11.950 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion:106 Resp: 107233

Ion	Ratio	Lower	Upper
106	100		
91	201.8	101.4	304.1



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC100

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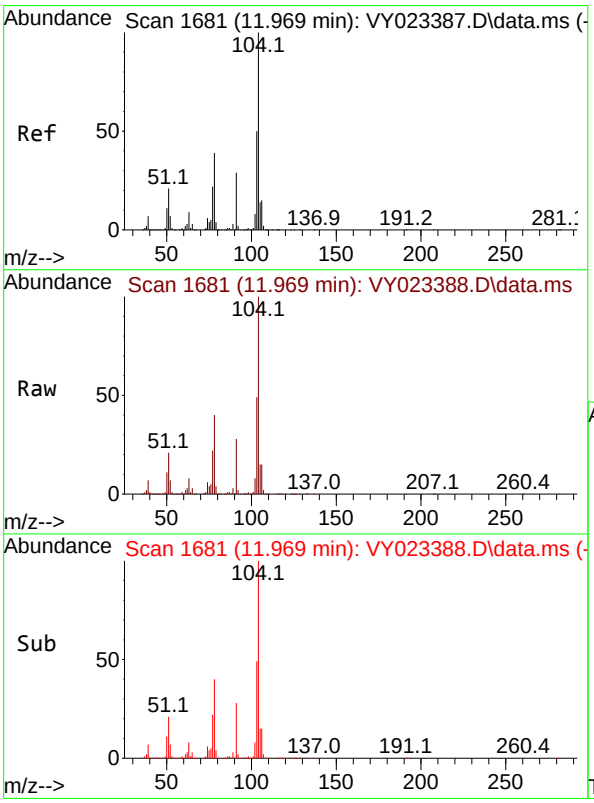
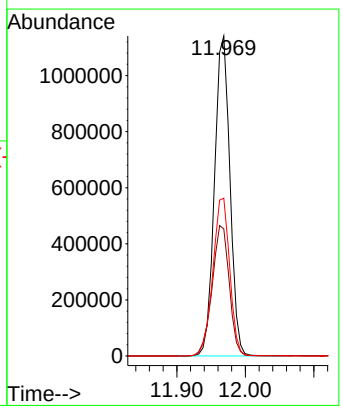
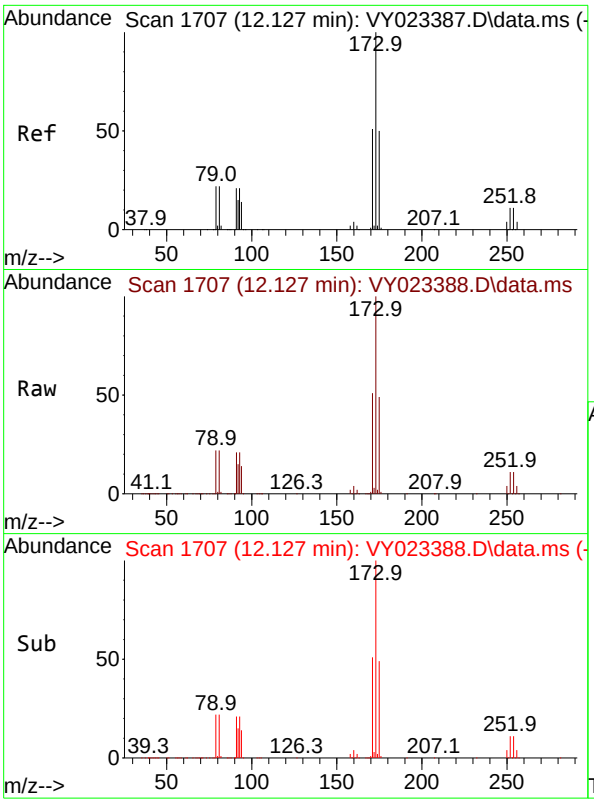


#70
Styrene
Concen: 107.344 ug/l
RT: 11.969 min Scan# 1681
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion:104 Resp: 1782757

Ion	Ratio	Lower	Upper
104	100		
78	45.3	36.1	54.1
103	53.9	43.2	64.8

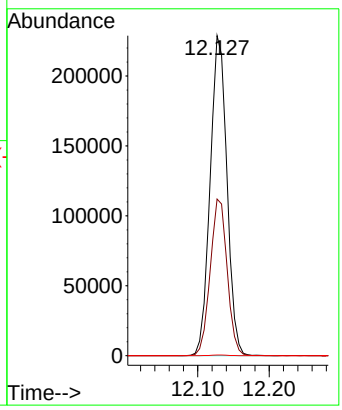




#71
Bromoform
Concen: 106.727 ug/l
RT: 12.127 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion:173 Resp: 37320

Ion	Ratio	Lower	Upper
173	100		
175	49.4	24.8	74.3
254	0.2	0.1	0.1



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC100

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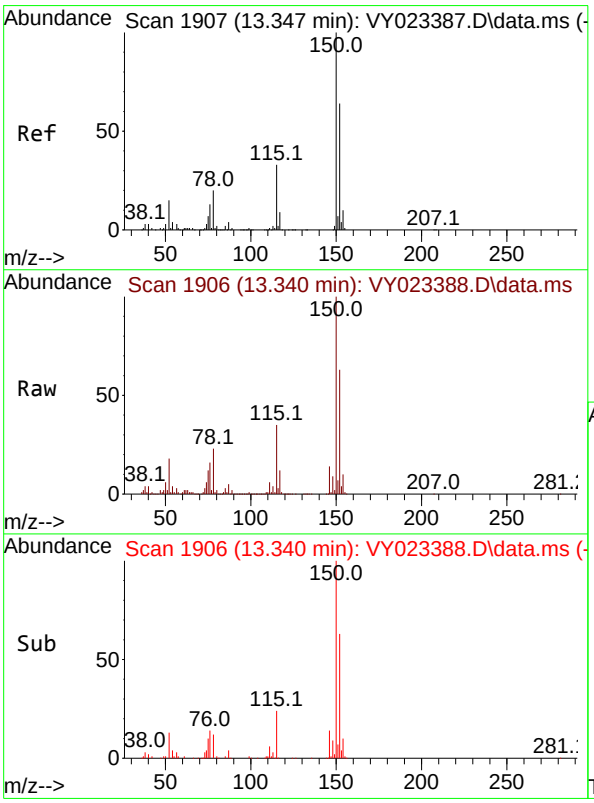
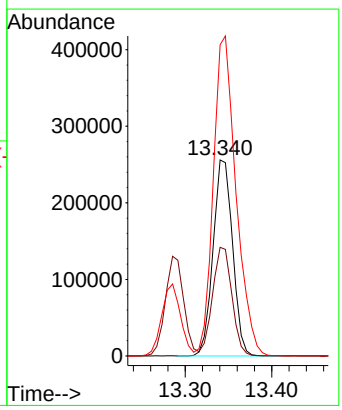
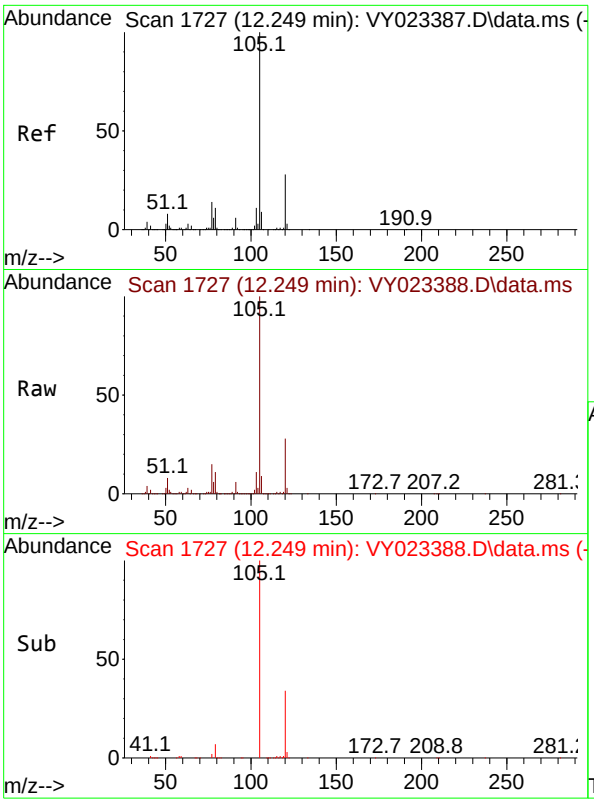


#72
1,4-Dichlorobenzene-d4
Concen: 50.000 ug/l
RT: 13.340 min Scan# 1906
Delta R.T. -0.006 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion:152 Resp: 400285

Ion	Ratio	Lower	Upper
152	100		
115	55.0	27.1	81.2
150	190.0	0.0	347.4

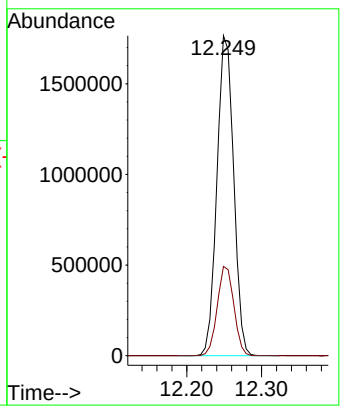




#73
Isopropylbenzene
Concen: 102.825 ug/l
RT: 12.249 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion:105 Resp: 274169

Ion	Ratio	Lower	Upper
105	100		
120	27.7	13.9	41.7



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC100

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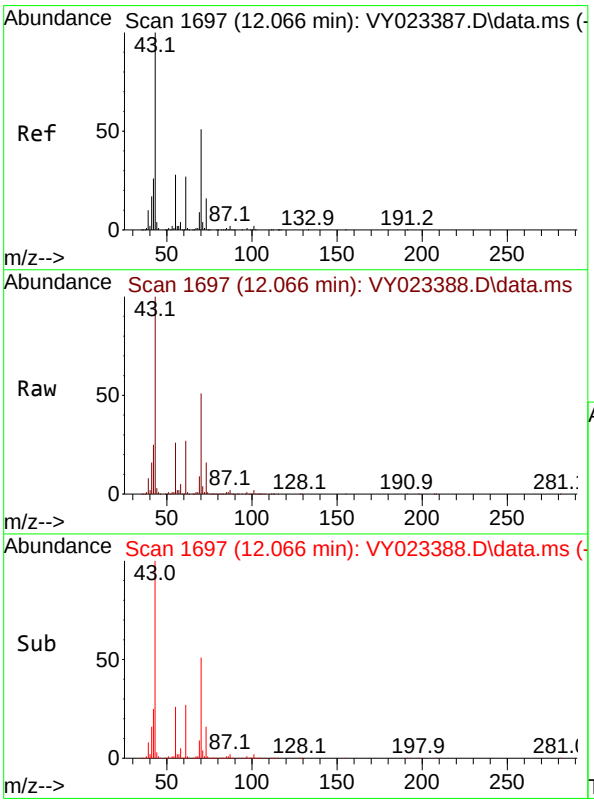
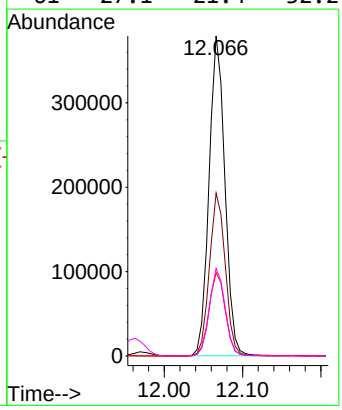
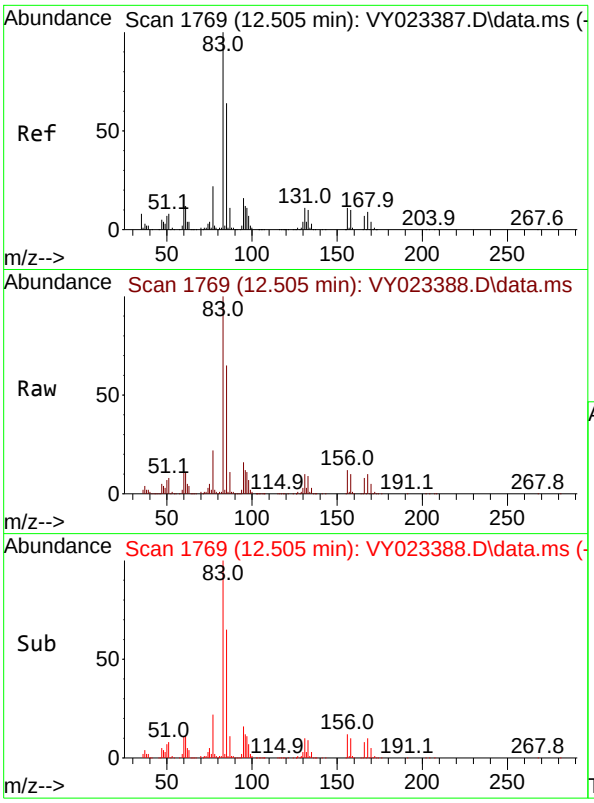


#74
N-amyl acetate
Concen: 106.818 ug/l
RT: 12.066 min Scan# 1697
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion: 43 Resp: 532255

Ion	Ratio	Lower	Upper
43	100		
70	51.0	41.1	61.7
55	26.8	23.0	34.6
61	27.1	21.4	32.2





#75
1,1,2,2-Tetrachloroethane
Concen: 97.735 ug/l
RT: 12.505 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion: 83 Resp: 43472

Ion	Ratio	Lower	Upper
83	100		
131	11.5	5.9	17.6
85	64.9	31.8	95.3

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC100

Manual Integrations
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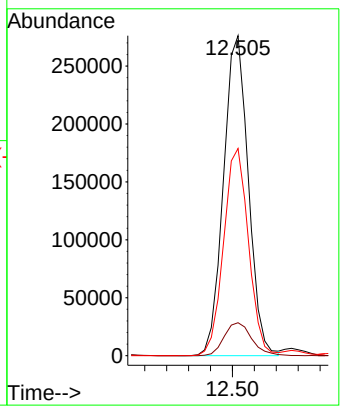
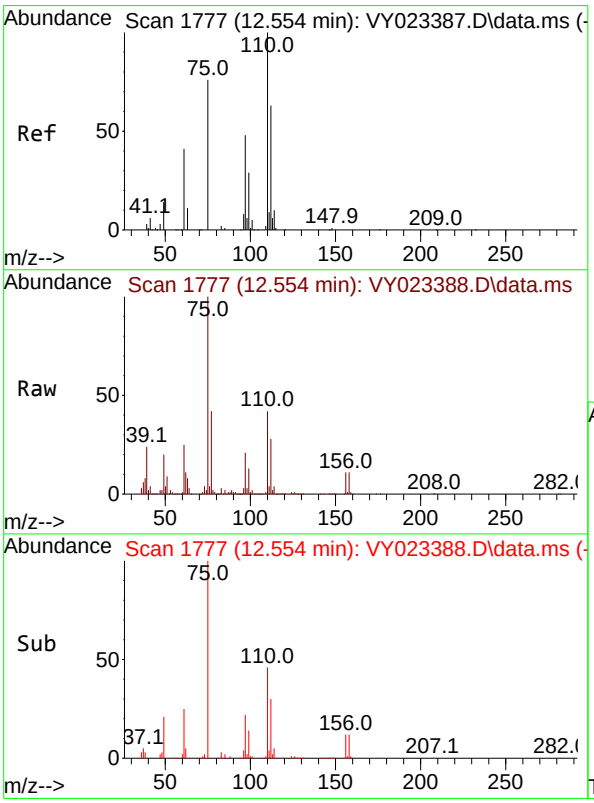
Supervised By :Mahesh Dadoda 10/10/2025

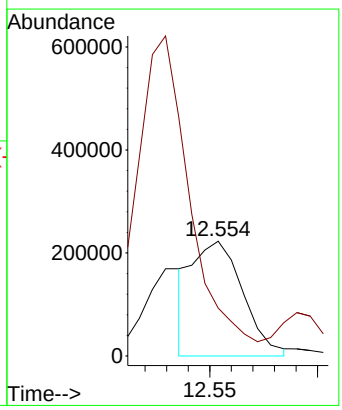


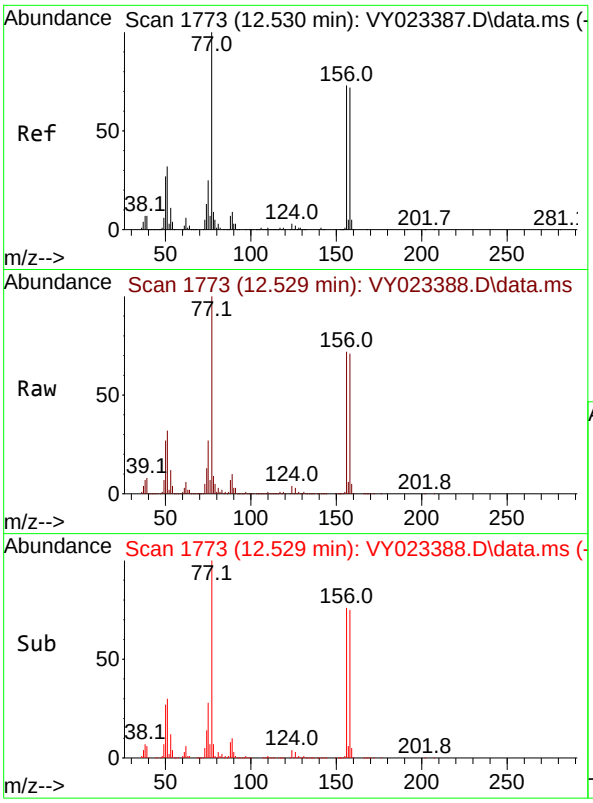


#76
1,2,3-Trichloropropane
Concen: 92.345 ug/l m
RT: 12.554 min Scan# 1777
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion: 75 Resp: 364622

Ion	Ratio	Lower	Upper
75	100		
77	0.0	0.0	0.0

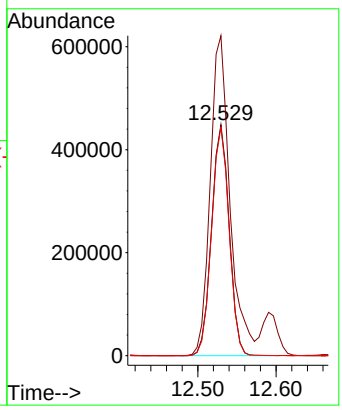




#77
Bromobenzene
Concen: 102.545 ug/l
RT: 12.529 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion:156 Resp: 70174

Ion	Ratio	Lower	Upper
156	100		
77	154.5	76.8	230.5
158	98.1	49.0	147.2



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC100

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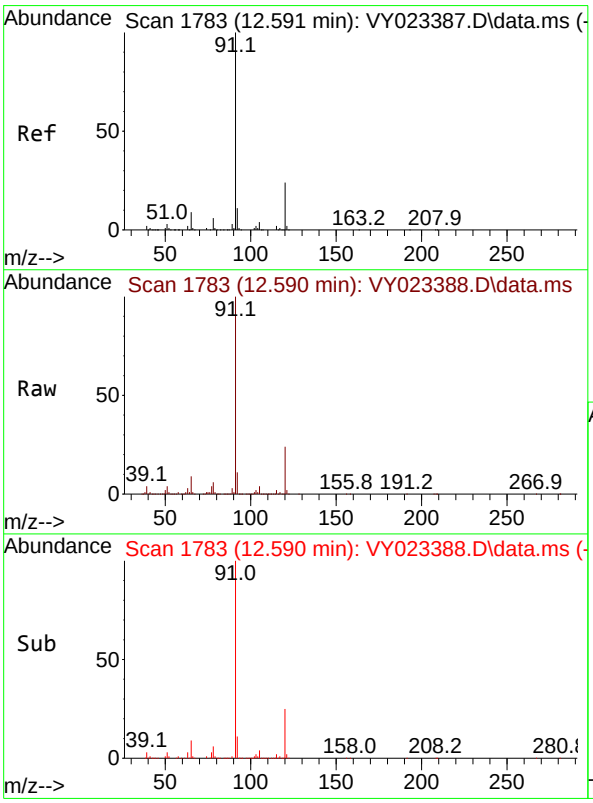
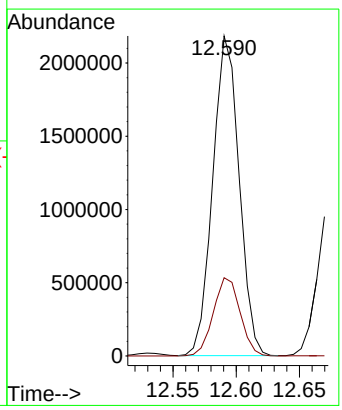
Supervised By :Mahesh Dadoda 10/10/2025

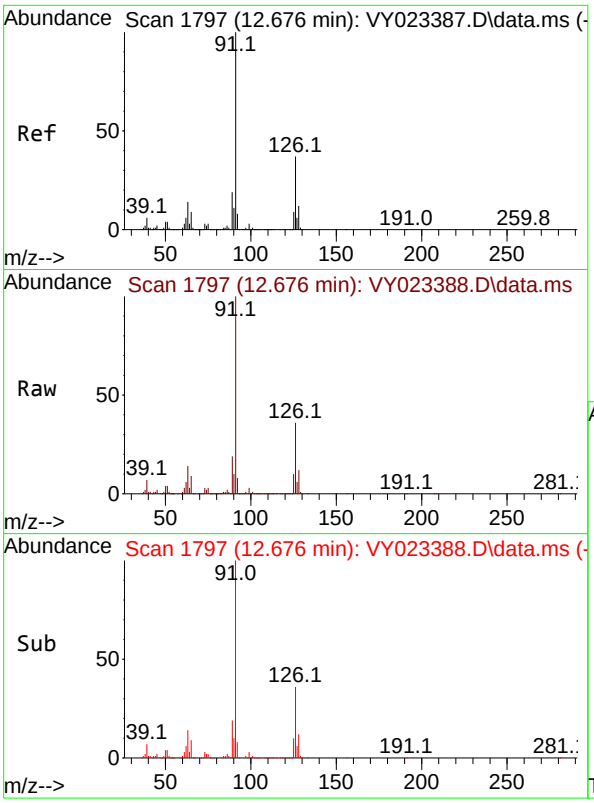


#78
n-propylbenzene
Concen: 100.958 ug/l
RT: 12.590 min Scan# 1783
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion: 91 Resp: 3165894

Ion	Ratio	Lower	Upper
91	100		
120	24.8	12.3	36.8

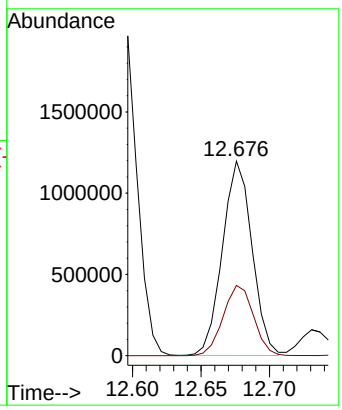




#79
2-Chlorotoluene
Concen: 99.426 ug/l
RT: 12.676 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion: 91 Resp: 180012

Ion	Ratio	Lower	Upper
91	100		
126	37.2	18.5	55.5



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC100

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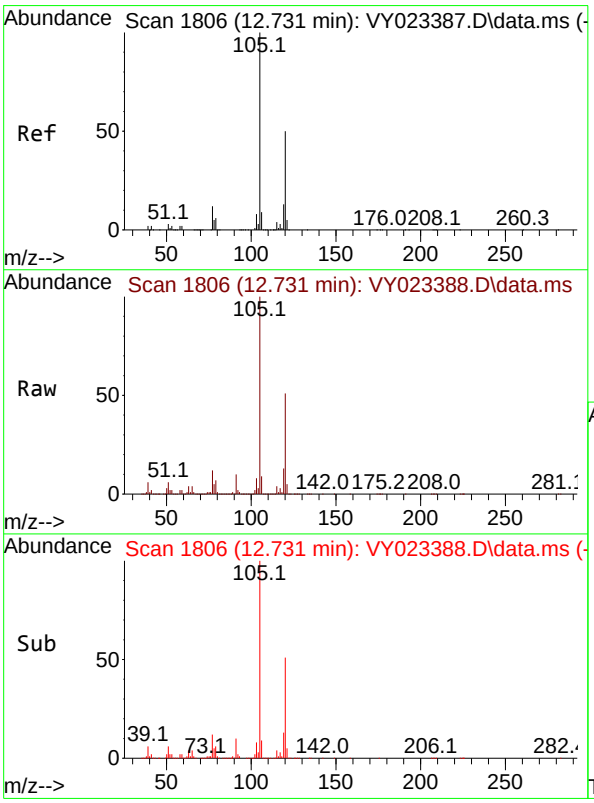
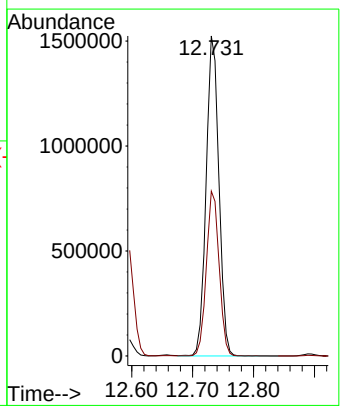
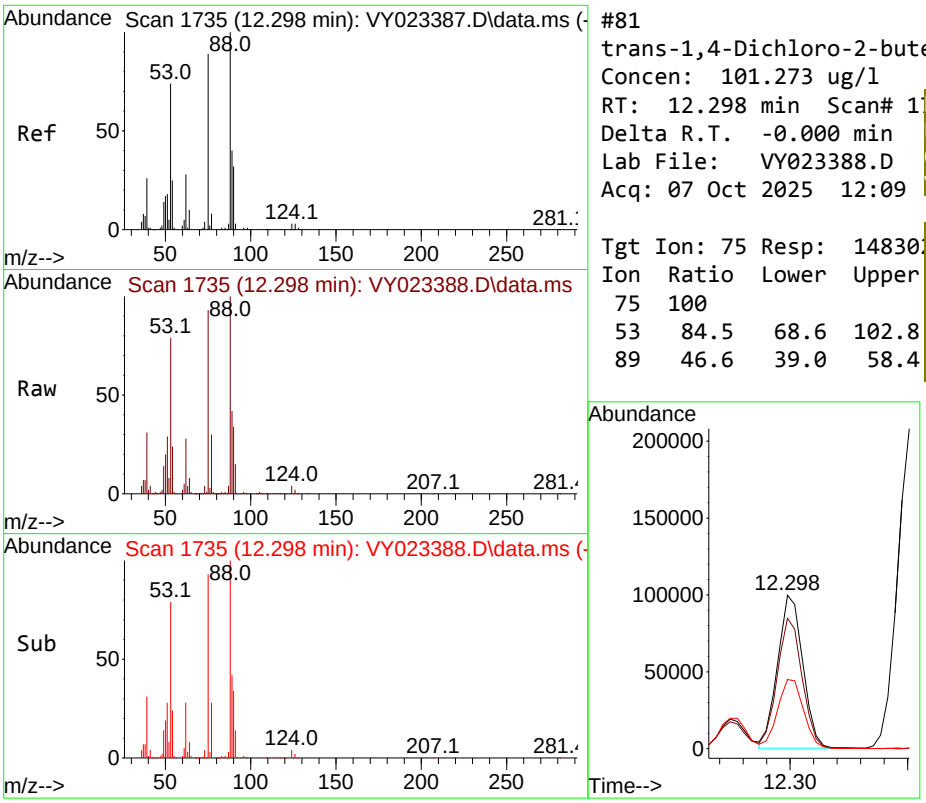


#80
1,3,5-Trimethylbenzene
Concen: 102.374 ug/l
RT: 12.731 min Scan# 1806
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion:105 Resp: 2219080

Ion	Ratio	Lower	Upper
105	100		
120	51.6	25.4	76.4





#81
trans-1,4-Dichloro-2-butene
Concen: 101.273 ug/l
RT: 12.298 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion: 75 Resp: 14830

Ion	Ratio	Lower	Upper
75	100		
53	84.5	68.6	102.8
89	46.6	39.0	58.4

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC100

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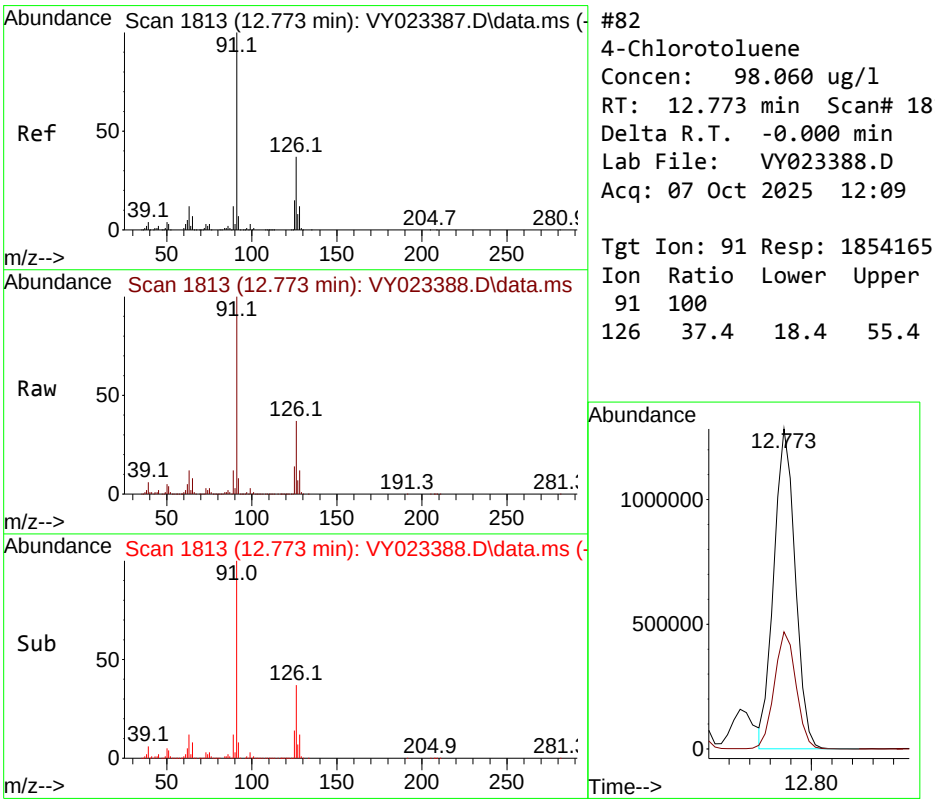
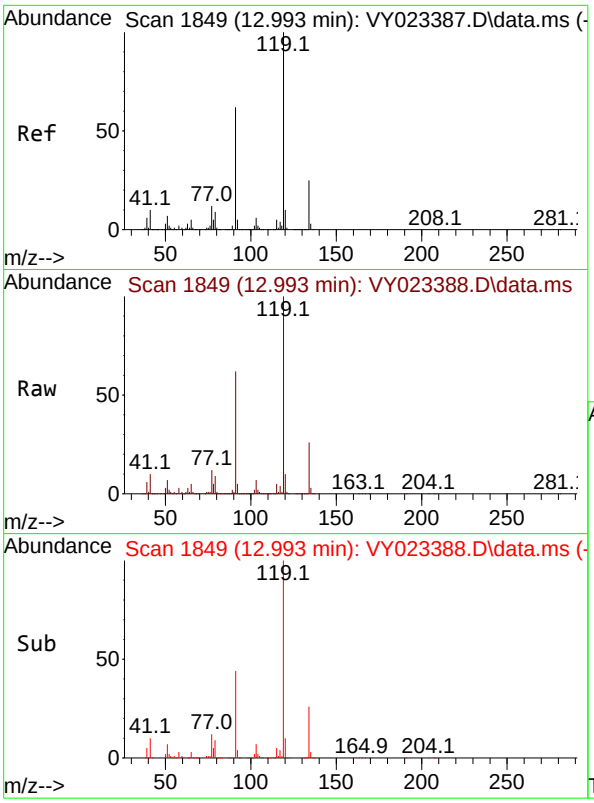


#82
4-Chlorotoluene
Concen: 98.060 ug/l
RT: 12.773 min Scan# 1813
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion: 91 Resp: 1854165

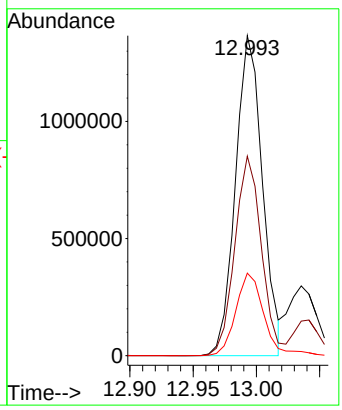
Ion	Ratio	Lower	Upper
91	100		
126	37.4	18.4	55.4



#83
tert-Butylbenzene
Concen: 102.684 ug/l
RT: 12.993 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion:119 Resp: 202819

Ion	Ratio	Lower	Upper
119	100		
91	61.9	29.9	89.8
134	26.9	12.9	38.7



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC100

Manual Integrations
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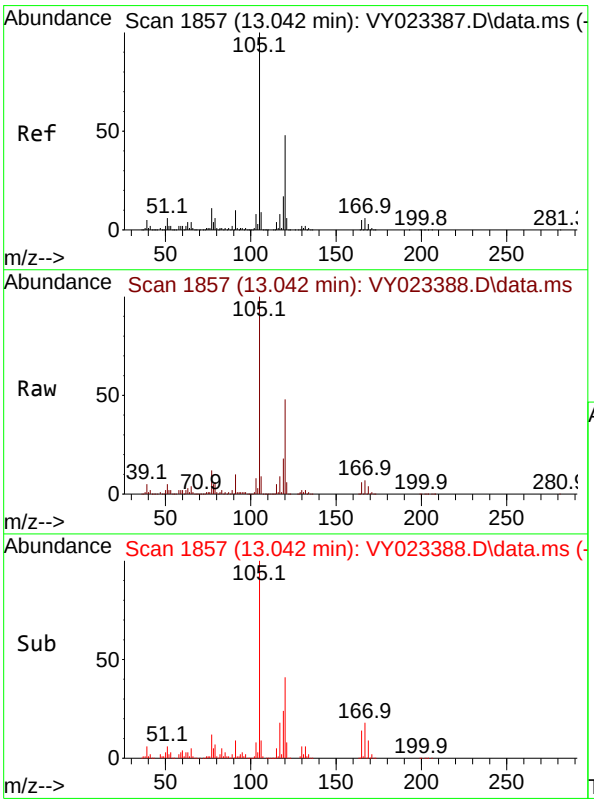
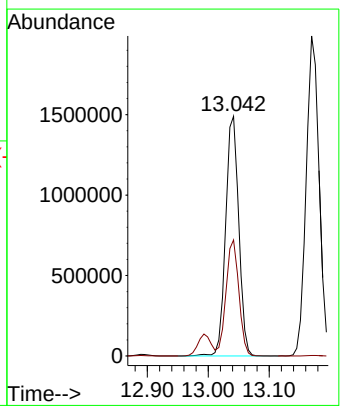
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

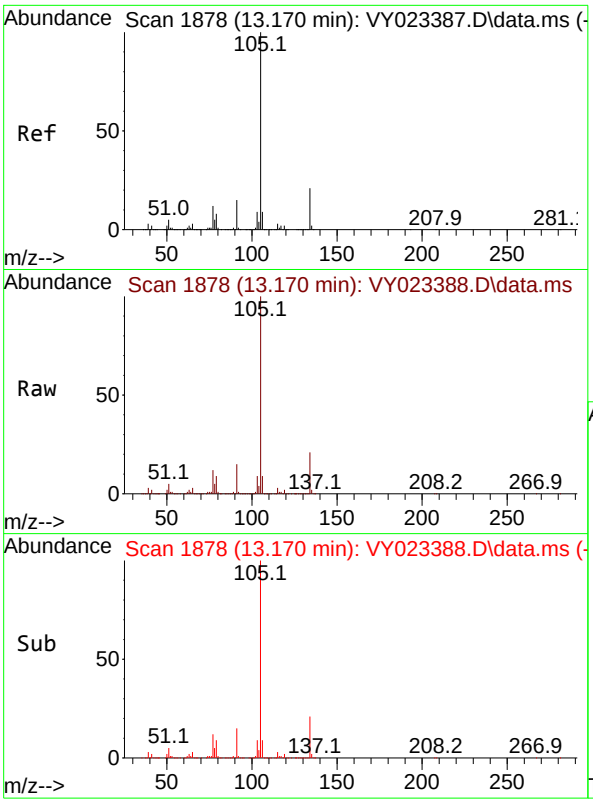


#84
1,2,4-Trimethylbenzene
Concen: 103.853 ug/l
RT: 13.042 min Scan# 1857
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion:105 Resp: 2227197

Ion	Ratio	Lower	Upper
105	100		
120	47.4	23.8	71.2

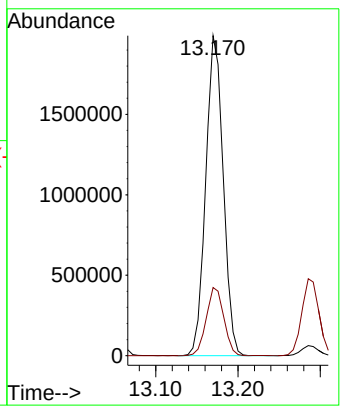




#85
sec-Butylbenzene
Concen: 102.530 ug/l
RT: 13.170 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion:105 Resp: 293294

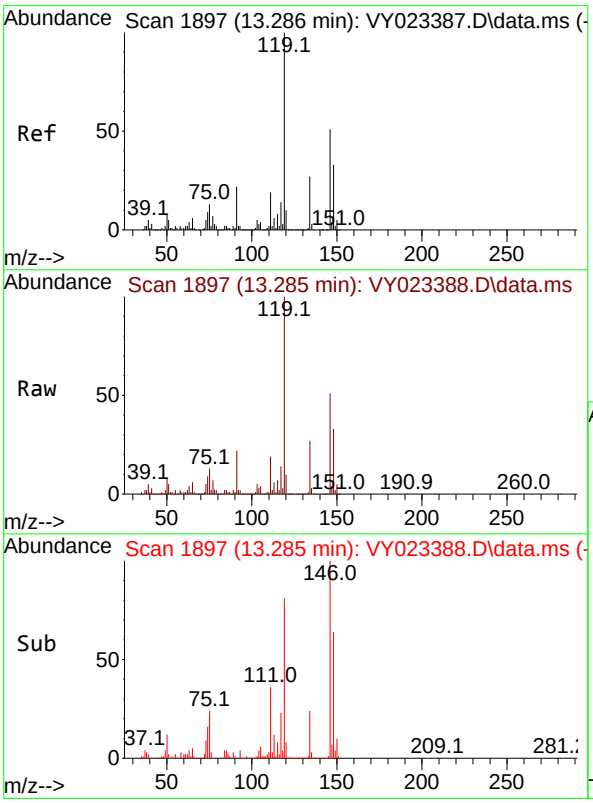
Ion	Ratio	Lower	Upper
105	100		
134	21.5	10.7	32.1



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC100

Manual Integrations
APPROVED

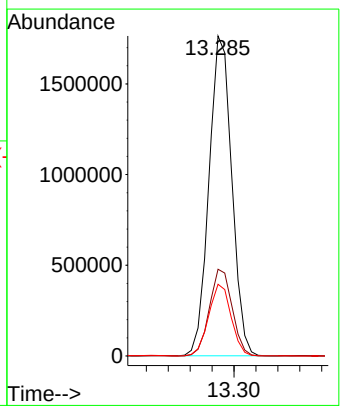
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

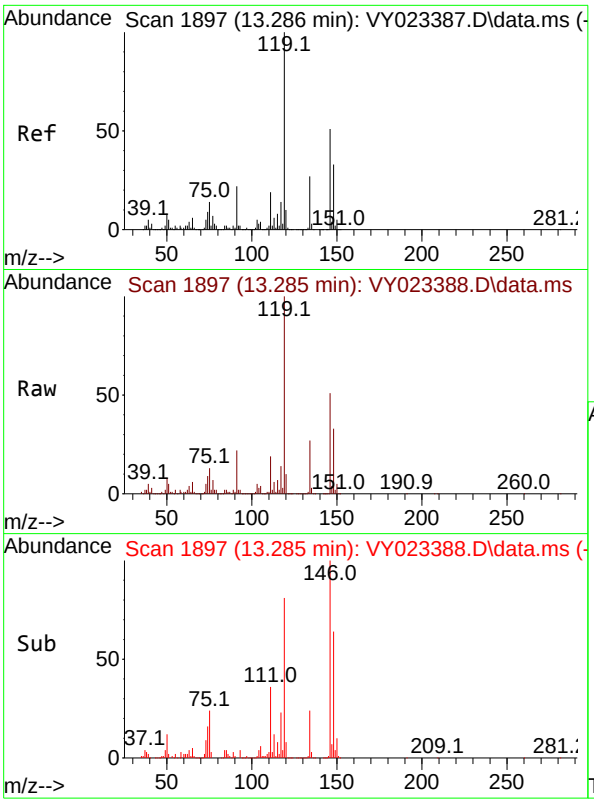


#86
p-Isopropyltoluene
Concen: 105.408 ug/l
RT: 13.285 min Scan# 1897
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion:119 Resp: 2548220

Ion	Ratio	Lower	Upper
119	100		
134	27.0	13.6	40.7
91	22.1	10.9	32.9

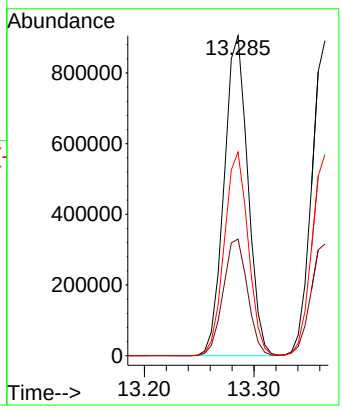




#87
1,3-Dichlorobenzene
Concen: 100.735 ug/l
RT: 13.285 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion:146 Resp: 136171

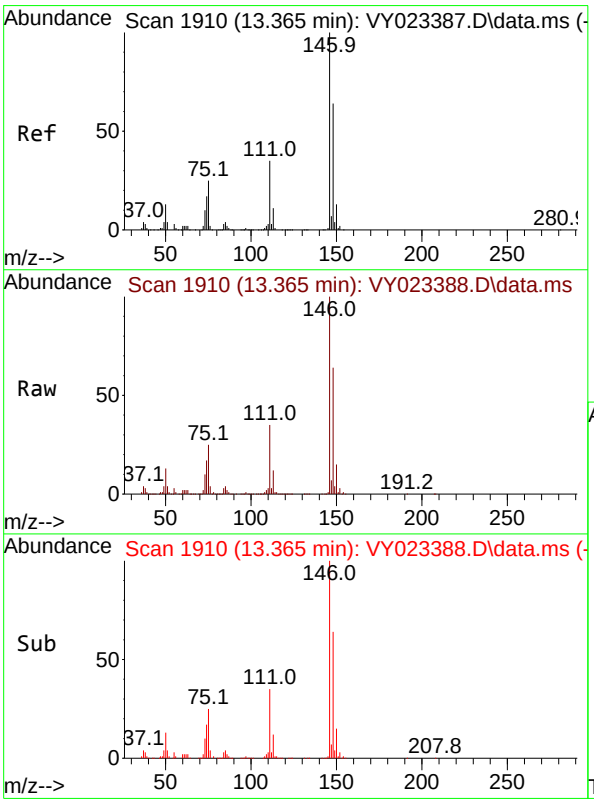
Ion	Ratio	Lower	Upper
146	100		
111	37.4	18.7	56.1
148	64.1	31.9	95.9



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC100

Manual Integrations
APPROVED

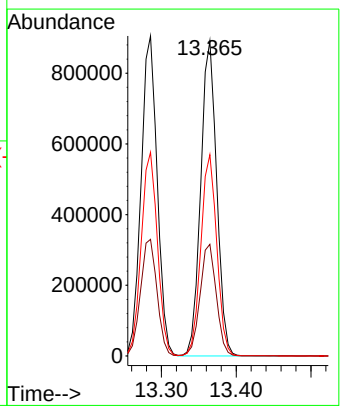
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

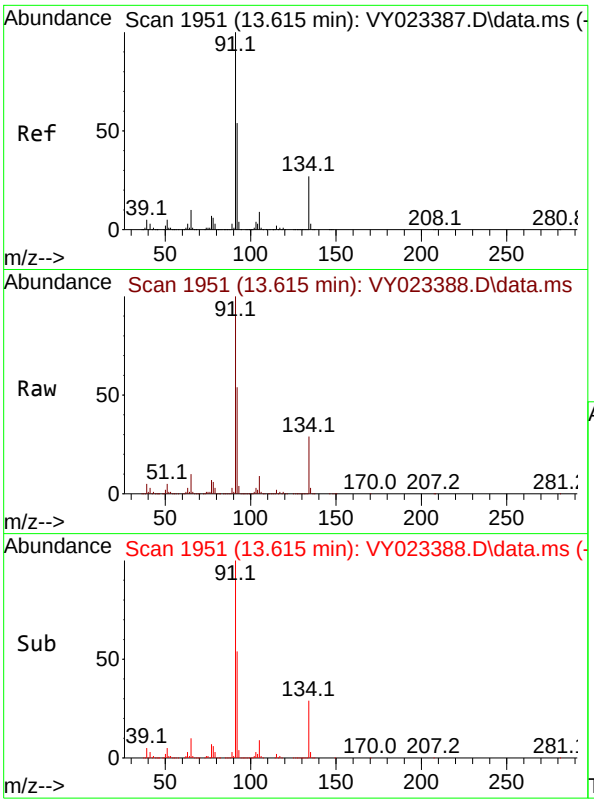


#88
1,4-Dichlorobenzene
Concen: 98.734 ug/l
RT: 13.365 min Scan# 1910
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion:146 Resp: 1323618

Ion	Ratio	Lower	Upper
146	100		
111	36.0	18.0	54.0
148	63.8	31.9	95.7

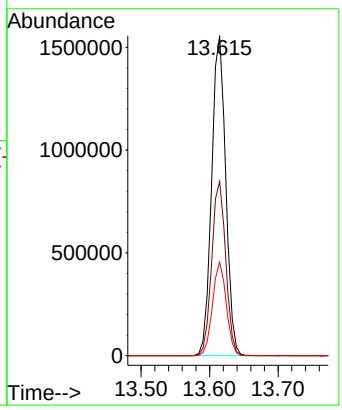




#89
n-Butylbenzene
Concen: 104.174 ug/l
RT: 13.615 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion: 91 Resp: 222374

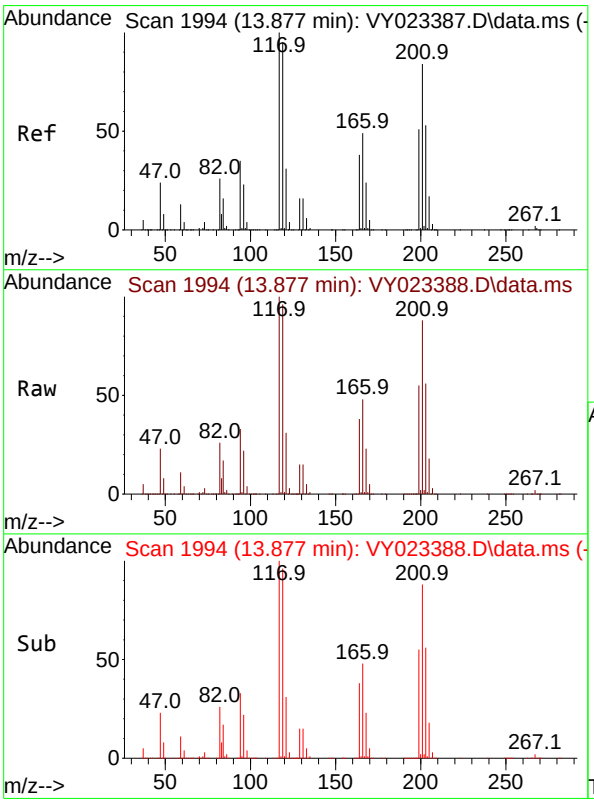
Ion	Ratio	Lower	Upper
91	100		
92	54.2	27.0	80.8
134	28.6	14.1	42.2



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC100

Manual Integrations APPROVED

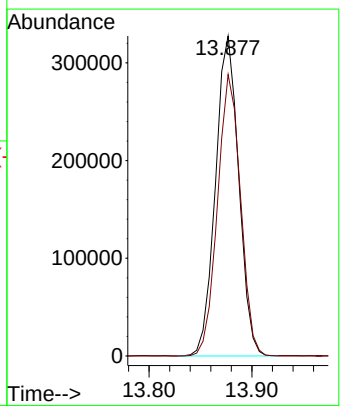
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

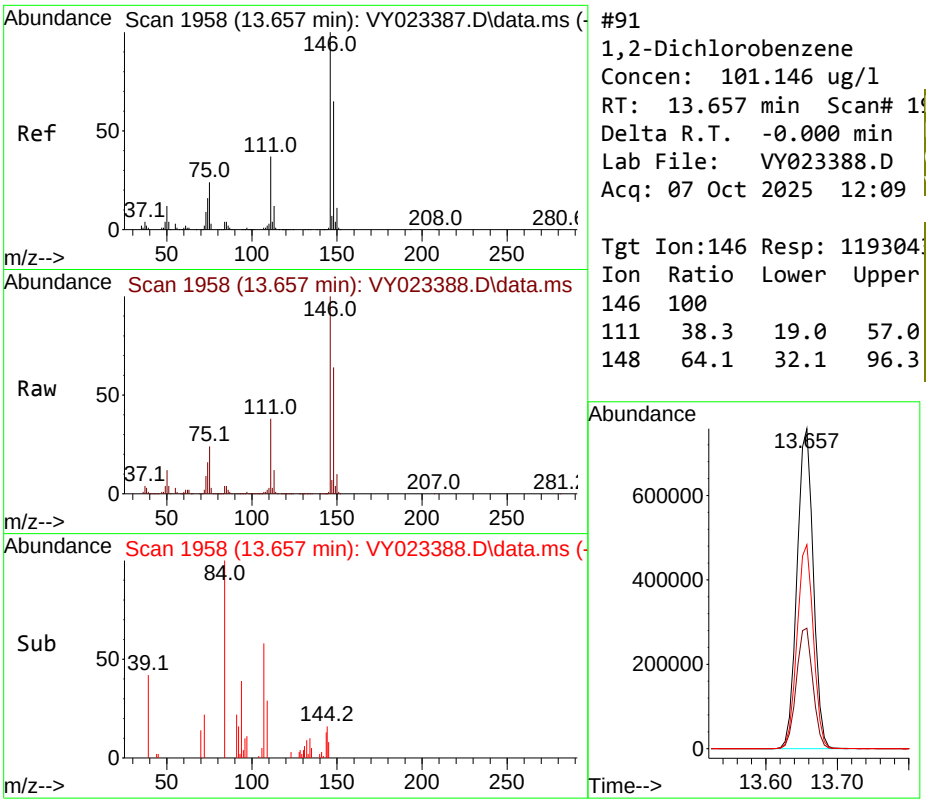


#90
Hexachloroethane
Concen: 98.069 ug/l
RT: 13.877 min Scan# 1994
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion:117 Resp: 514746

Ion	Ratio	Lower	Upper
117	100		
201	86.8	43.8	131.4





#91
1,2-Dichlorobenzene
Concen: 101.146 ug/l
RT: 13.657 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

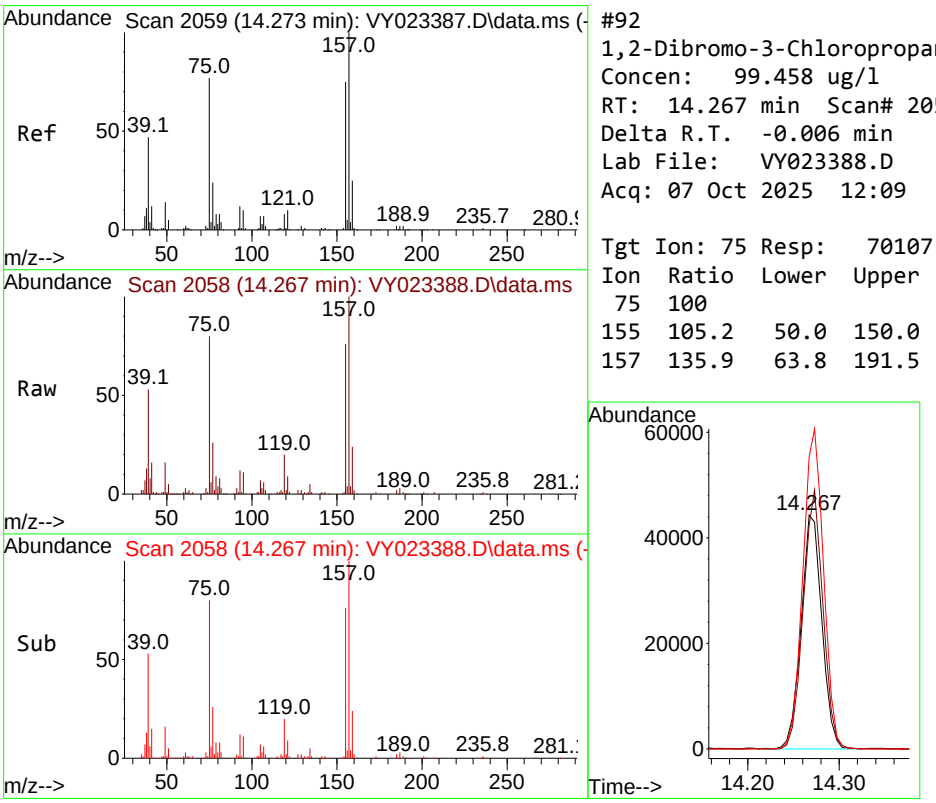
Tgt Ion:146 Resp: 119304

Ion	Ratio	Lower	Upper
146	100		
111	38.3	19.0	57.0
148	64.1	32.1	96.3

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC100

Manual Integrations
APPROVED

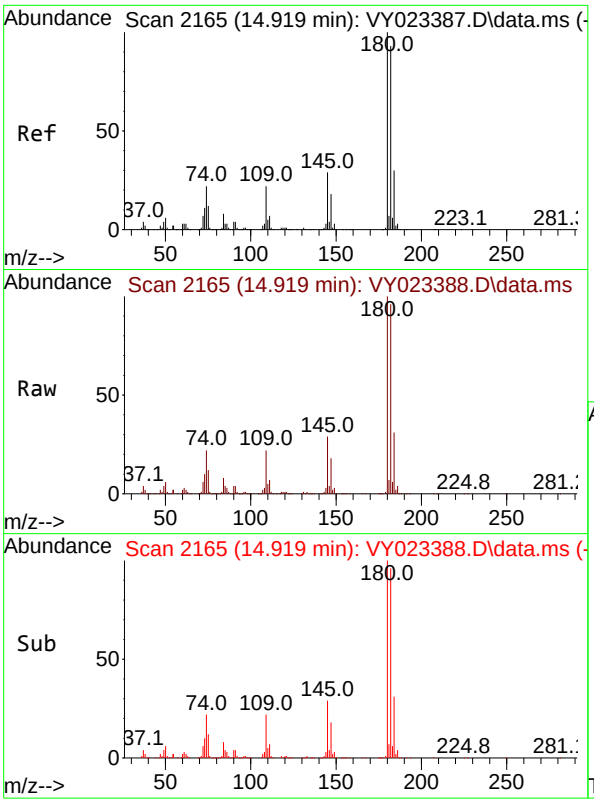
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025



#92
1,2-Dibromo-3-Chloropropane
Concen: 99.458 ug/l
RT: 14.267 min Scan# 2058
Delta R.T. -0.006 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion: 75 Resp: 70107

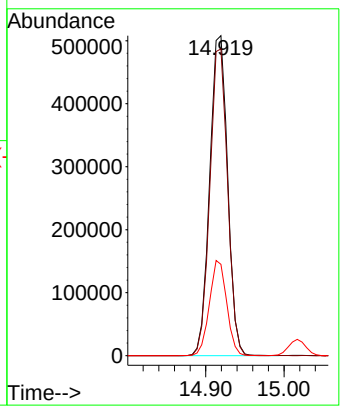
Ion	Ratio	Lower	Upper
75	100		
155	105.2	50.0	150.0
157	135.9	63.8	191.5



#93
1,2,4-Trichlorobenzene
Concen: 116.031 ug/l
RT: 14.919 min Scan# 21
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion:180 Resp: 80632

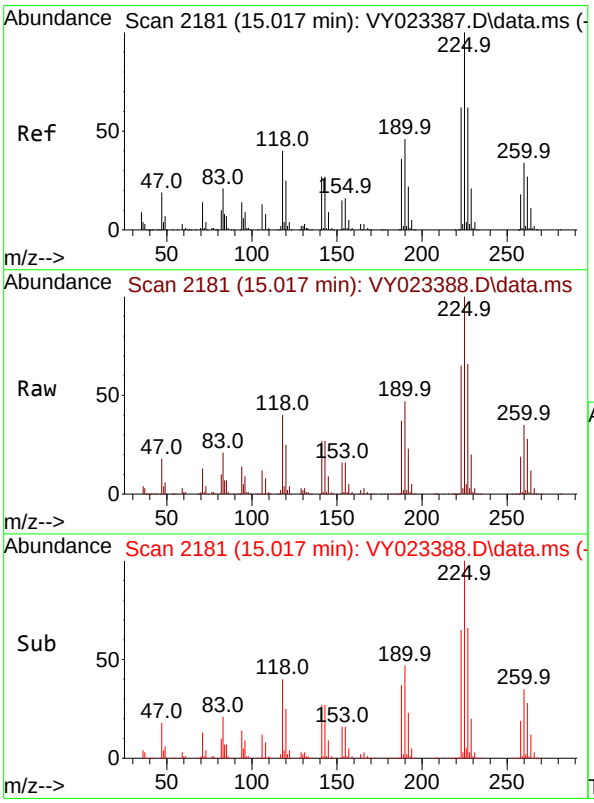
Ion	Ratio	Lower	Upper
180	100		
182	94.9	47.9	143.6
145	28.7	14.7	44.1



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC100

Manual Integrations APPROVED

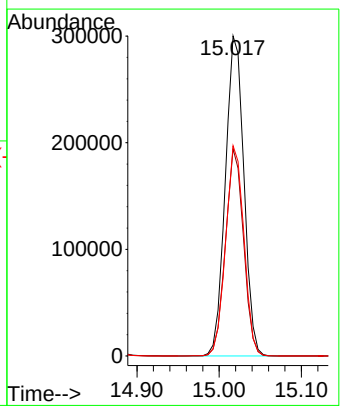
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

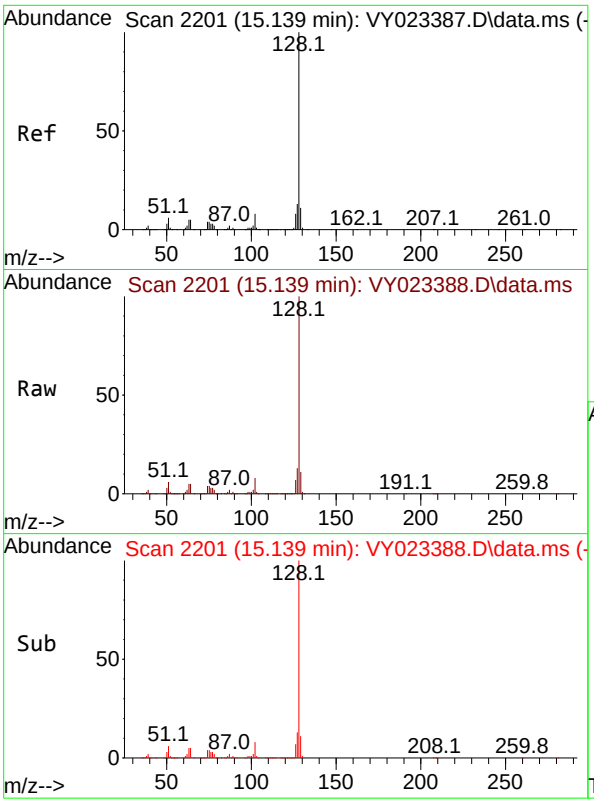


#94
Hexachlorobutadiene
Concen: 108.557 ug/l
RT: 15.017 min Scan# 2181
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion:225 Resp: 470072

Ion	Ratio	Lower	Upper
225	100		
223	62.9	30.8	92.3
227	64.6	31.9	95.7

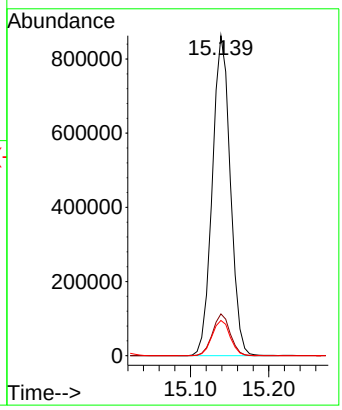




#95
Naphthalene
Concen: 124.485 ug/l
RT: 15.139 min Scan# 2
Delta R.T. -0.000 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion:128 Resp: 137829

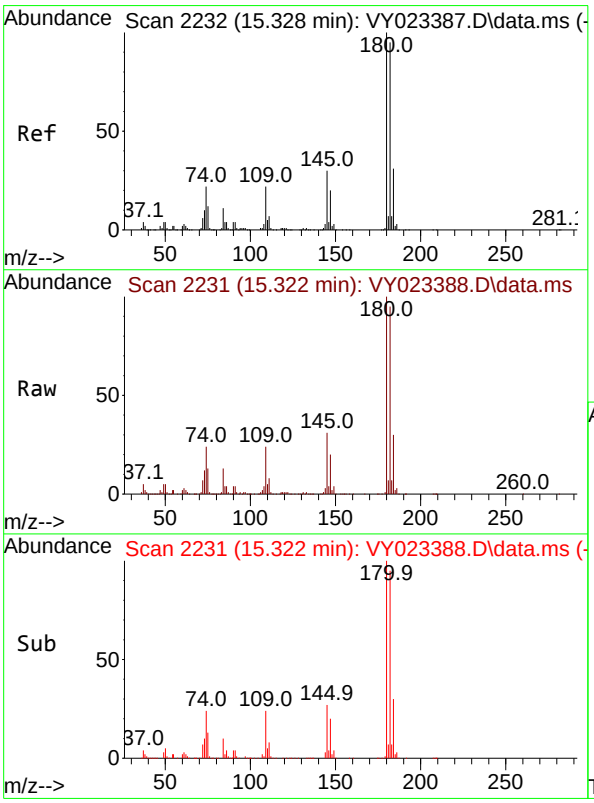
Ion	Ratio	Lower	Upper
128	100		
127	12.8	10.4	15.6
129	11.1	8.9	13.3



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC100

Manual Integrations
APPROVED

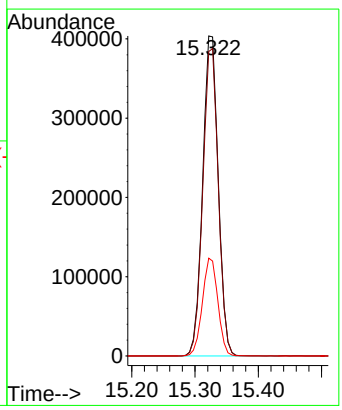
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025



#96
1,2,3-Trichlorobenzene
Concen: 115.034 ug/l
RT: 15.322 min Scan# 2231
Delta R.T. -0.006 min
Lab File: VY023388.D
Acq: 07 Oct 2025 12:09

Tgt Ion:180 Resp: 693477

Ion	Ratio	Lower	Upper
180	100		
182	95.6	47.9	143.8
145	30.3	15.3	45.9



Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY100725\
Data File : VY023389.D
Acq On : 07 Oct 2025 12:32
Operator : SY/MD
Sample : VSTDICC150
Misc : 5.00g/5.0mL/MSVOA_Y/SOIL
ALS Vial : 8 Sample Multiplier: 1

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC150

Manual Integrations APPROVED

Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

Quant Time: Oct 08 04:45:15 2025
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260
QLast Update : Wed Oct 08 04:39:16 2025
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Pentafluorobenzene	7.707	168	588489	50.000	ug/l	0.00
34) 1,4-Difluorobenzene	8.616	114	855488	50.000	ug/l	0.00
63) Chlorobenzene-d5	11.414	117	765357	50.000	ug/l	0.00
72) 1,4-Dichlorobenzene-d4	13.346	152	402368	50.000	ug/l	0.00
System Monitoring Compounds						
33) 1,2-Dichloroethane-d4	8.061	65	714730	140.236	ug/l	0.00
Spiked Amount 50.000	Range 50 - 163		Recovery = 280.480%#			
35) Dibromofluoromethane	7.634	113	778632	149.977	ug/l	0.00
Spiked Amount 50.000	Range 54 - 147		Recovery = 299.960%#			
50) Toluene-d8	10.103	98	2912319	148.741	ug/l	0.00
Spiked Amount 50.000	Range 58 - 134		Recovery = 297.480%#			
62) 4-Bromofluorobenzene	12.402	95	990964	160.423	ug/l	0.00
Spiked Amount 50.000	Range 30 - 143		Recovery = 320.840%#			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.867	85	587619	126.766	ug/l	97
3) Chloromethane	2.068	50	825167	125.233	ug/l	100
4) Vinyl Chloride	2.208	62	1118134	134.387	ug/l	100
5) Bromomethane	2.580	94	915389	134.118	ug/l	98
6) Chloroethane	2.726	64	756912	133.994	ug/l	99
7) Trichlorofluoromethane	3.050	101	1549160	144.948	ug/l	100
8) Diethyl Ether	3.452	74	418615	149.747	ug/l	100
9) 1,1,2-Trichlorotrifluo...	3.812	101	786278	137.639	ug/l	99
10) Methyl Iodide	4.007	142	992925	150.409	ug/l	99
11) Tert butyl alcohol	4.866	59	288878	963.279	ug/l	99
12) 1,1-Dichloroethene	3.787	96	781235	142.133	ug/l	97
13) Acrolein	3.653	56	423418	833.323	ug/l	100
14) Allyl chloride	4.385	41	988378	143.628	ug/l	99
15) Acrylonitrile	5.055	53	841857	768.735	ug/l	99
16) Acetone	3.866	43	789668	689.040	ug/l	99
17) Carbon Disulfide	4.104	76	2199339	128.252	ug/l	100
18) Methyl Acetate	4.385	43	505344	173.497	ug/l	99
19) Methyl tert-butyl Ether	5.116	73	2056533	159.802	ug/l	97
20) Methylene Chloride	4.616	84	835005	134.365	ug/l	98
21) trans-1,2-Dichloroethene	5.116	96	871380	142.549	ug/l	98
22) Diisopropyl ether	6.019	45	2218430	145.375	ug/l	99
23) Vinyl Acetate	5.958	43	6377047	760.246	ug/l	99
24) 1,1-Dichloroethane	5.915	63	1398477	139.024	ug/l	98
25) 2-Butanone	6.890	43	1116343	788.091	ug/l	97
26) 2,2-Dichloropropane	6.884	77	1281633	143.391	ug/l	99
27) cis-1,2-Dichloroethene	6.890	96	1043574	150.505	ug/l	98
28) Bromochloromethane	7.244	49	482210	123.567	ug/l	99
29) Tetrahydrofuran	7.262	42	687719	817.972	ug/l	100
30) Chloroform	7.421	83	1542715	142.221	ug/l	99
31) Cyclohexane	7.701	56	1192778	134.268	ug/l	98
32) 1,1,1-Trichloroethane	7.616	97	1405131	144.305	ug/l	100
36) 1,1-Dichloropropene	7.835	75	1069665	146.031	ug/l	100
37) Ethyl Acetate	6.982	43	460027	158.853	ug/l	98
38) Carbon Tetrachloride	7.817	117	1290353	151.646	ug/l	99
39) Methylcyclohexane	9.109	83	1496612	159.580	ug/l	99
40) Benzene	8.079	78	3366812	147.442	ug/l	98

Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY100725\
Data File : VY023389.D
Acq On : 07 Oct 2025 12:32
Operator : SY/MD
Sample : VSTDICC150
Misc : 5.00g/5.0mL/MSVOA_Y/SOIL
ALS Vial : 8 Sample Multiplier: 1

Quant Time: Oct 08 04:45:15 2025
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260
QLast Update : Wed Oct 08 04:39:16 2025
Response via : Initial Calibration

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC150

Manual Integrations APPROVED

Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

Compound	R.T.	QIon	Response	Conc	Units		Dev(Min)
41) Methacrylonitrile	7.220	41	246974	164.212	ug/l		98
42) 1,2-Dichloroethane	8.158	62	866250	149.063	ug/l		100
43) Isopropyl Acetate	8.195	43	946087	167.955	ug/l		100
44) Trichloroethene	8.866	130	966011	150.740	ug/l		99
45) 1,2-Dichloropropane	9.140	63	752286	146.403	ug/l		99
46) Dibromomethane	9.231	93	483702	153.895	ug/l		99
47) Bromodichloromethane	9.420	83	1202247	151.965	ug/l		98
48) Methyl methacrylate	9.219	41	463614	176.368	ug/l		100
49) 1,4-Dioxane	9.225	88	123991	3809.726	ug/l		97
51) 4-Methyl-2-Pentanone	9.993	43	2516107	872.045	ug/l		100
52) Toluene	10.170	92	2272574	156.786	ug/l		98
53) t-1,3-Dichloropropene	10.390	75	1123644	165.367	ug/l		100
54) cis-1,3-Dichloropropene	9.853	75	1296713	159.654	ug/l		99
55) 1,1,2-Trichloroethane	10.573	97	652242	156.020	ug/l		96
56) Ethyl methacrylate	10.438	69	886127	184.048	ug/l		100
57) 1,3-Dichloropropane	10.713	76	1049593	155.122	ug/l		100
58) 2-Chloroethyl Vinyl ether	9.707	63	2040136	968.559	ug/l		100
59) 2-Hexanone	10.755	43	1776032	889.038	ug/l		99
60) Dibromochloromethane	10.908	129	935577	164.084	ug/l		99
61) 1,2-Dibromoethane	11.012	107	639895	162.699	ug/l		99
64) Tetrachloroethene	10.646	164	1046931	136.739	ug/l		98
65) Chlorobenzene	11.438	112	2563176	154.117	ug/l		99
66) 1,1,1,2-Tetrachloroethane	11.511	131	923367	157.870	ug/l		99
67) Ethyl Benzene	11.518	91	4341801	159.957	ug/l		97
68) m/p-Xylenes	11.627	106	3502137	321.899	ug/l		99
69) o-Xylene	11.950	106	1694987	168.295	ug/l		98
70) Styrene	11.969	104	2830398	170.203	ug/l		99
71) Bromoform	12.127	173	602644	172.115	ug/l	#	99
73) Isopropylbenzene	12.249	105	4290662	160.084	ug/l		100
74) N-amyl acetate	12.066	43	890882	177.866	ug/l		98
75) 1,1,2,2-Tetrachloroethane	12.505	83	737773	165.010	ug/l		99
76) 1,2,3-Trichloropropane	12.554	75	565754m	142.542	ug/l		
77) Bromobenzene	12.530	156	1111318	161.555	ug/l		100
78) n-propylbenzene	12.591	91	4932015	156.465	ug/l		99
79) 2-Chlorotoluene	12.676	91	2822049	155.063	ug/l		100
80) 1,3,5-Trimethylbenzene	12.731	105	3496249	160.460	ug/l		99
81) trans-1,4-Dichloro-2-b...	12.298	75	245190	166.570	ug/l		98
82) 4-Chlorotoluene	12.773	91	2902371	152.701	ug/l		99
83) tert-Butylbenzene	12.993	119	3220384	162.197	ug/l		97
84) 1,2,4-Trimethylbenzene	13.042	105	3503639	162.527	ug/l		99
85) sec-Butylbenzene	13.170	105	4560715	158.609	ug/l		99
86) p-Isopropyltoluene	13.286	119	4024712	165.622	ug/l		100
87) 1,3-Dichlorobenzene	13.286	146	2165278	159.350	ug/l		100
88) 1,4-Dichlorobenzene	13.365	146	2090133	155.104	ug/l		100
89) n-Butylbenzene	13.615	91	3505715	163.379	ug/l		99
90) Hexachloroethane	13.877	117	799264	151.487	ug/l		99
91) 1,2-Dichlorobenzene	13.657	146	1862691	157.101	ug/l		99
92) 1,2-Dibromo-3-Chloropr...	14.267	75	116273	164.099	ug/l		96
93) 1,2,4-Trichlorobenzene	14.913	180	1272621	182.183	ug/l		100
94) Hexachlorobutadiene	15.017	225	711748	163.518	ug/l		98
95) Naphthalene	15.139	128	2277549	204.639	ug/l		100
96) 1,2,3-Trichlorobenzene	15.322	180	1110193	183.206	ug/l		100

Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY100725\
Data File : VY023389.D
Acq On : 07 Oct 2025 12:32
Operator : SY/MD
Sample : VSTDICC150
Misc : 5.00g/5.0mL/MSVOA_Y/SOIL
ALS Vial : 8 Sample Multiplier: 1

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC150

Manual Integrations APPROVED

Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

Quant Time: Oct 08 04:45:15 2025
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260
QLast Update : Wed Oct 08 04:39:16 2025
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY100725\
Data File : VY023389.D
Acq On : 07 Oct 2025 12:32
Operator : SY/MD
Sample : VSTDICC150
Misc : 5.00g/5.0mL/MSVOA_Y/SOIL
ALS Vial : 8 Sample Multiplier: 1

Quant Time: Oct 08 04:45:15 2025
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260
QLast Update : Wed Oct 08 04:39:16 2025
Response via : Initial Calibration

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC150

Manual Integrations APPROVED

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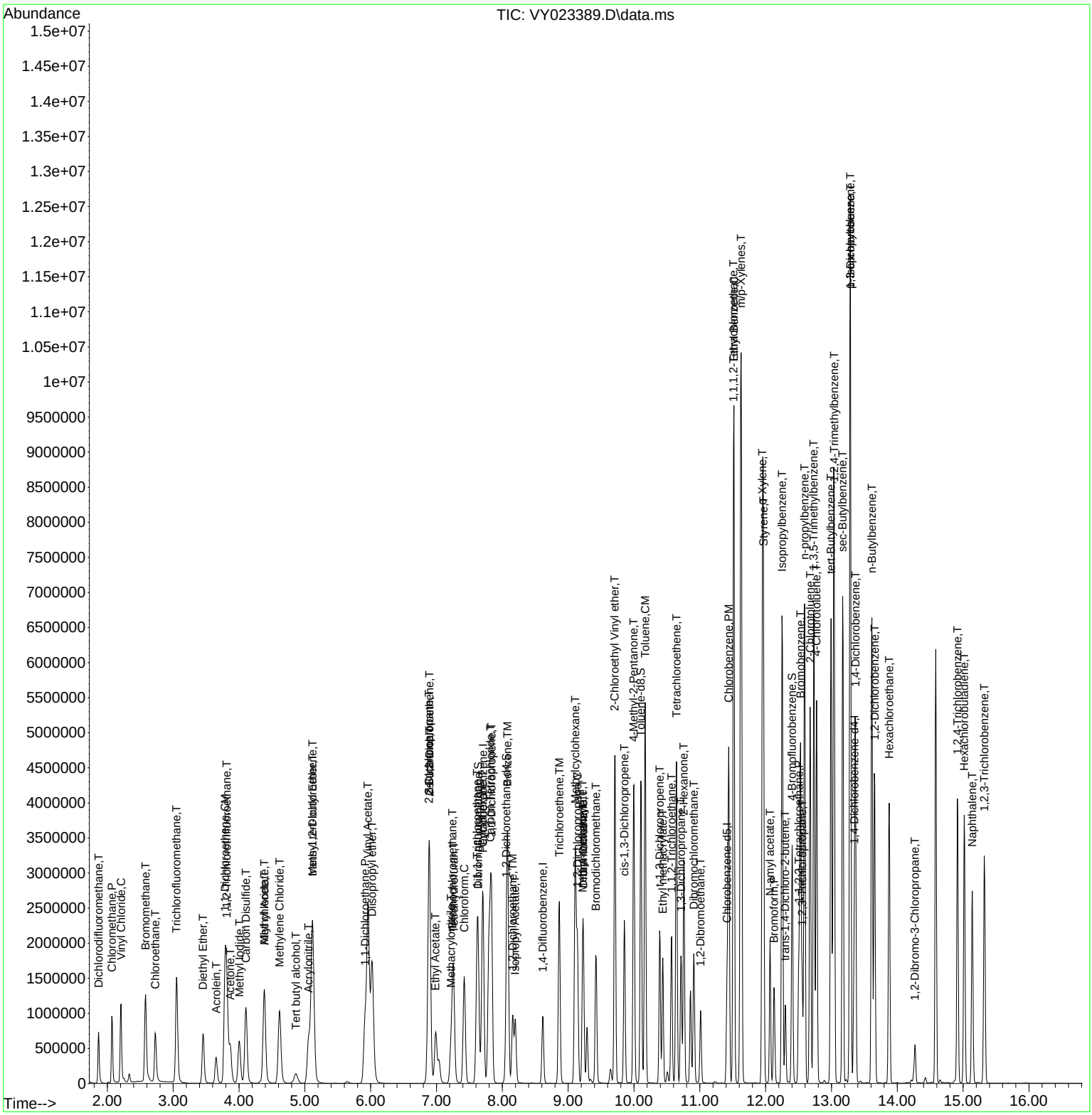

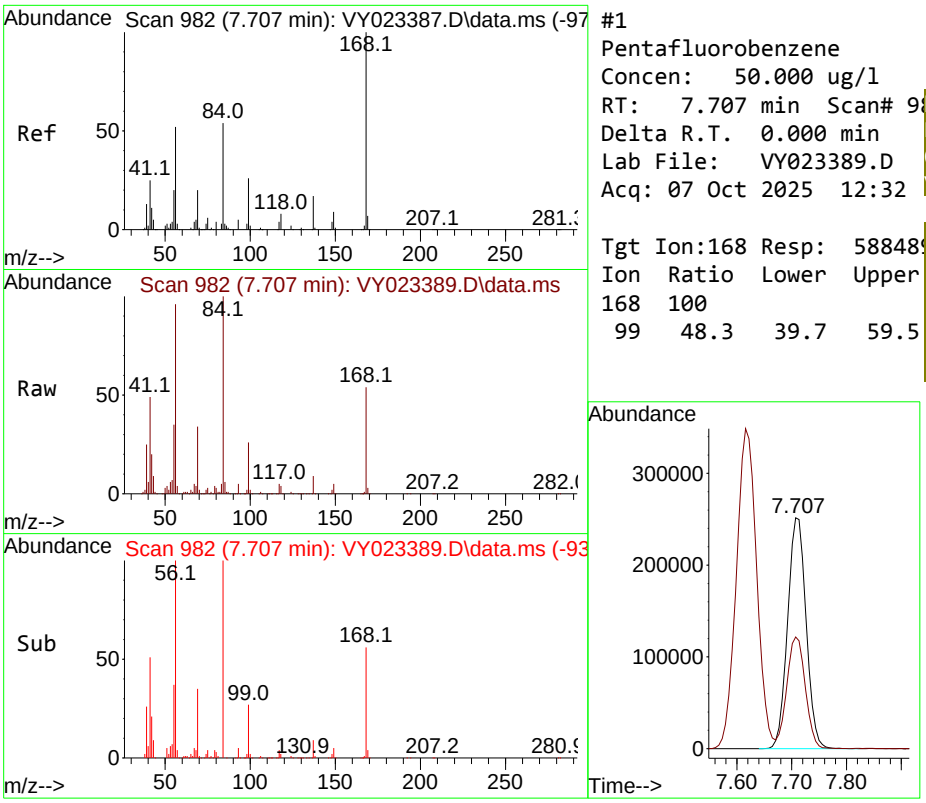

#1
Pentafluorobenzene
Concen: 50.000 ug/l
RT: 7.707 min Scan# 9
Delta R.T. 0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion:168 Resp: 58848

Ion	Ratio	Lower	Upper
168	100		
99	48.3	39.7	59.5

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC150

Manual Integrations APPROVED

Reviewed By :Semsettin Yesilyurt 10/10/2025
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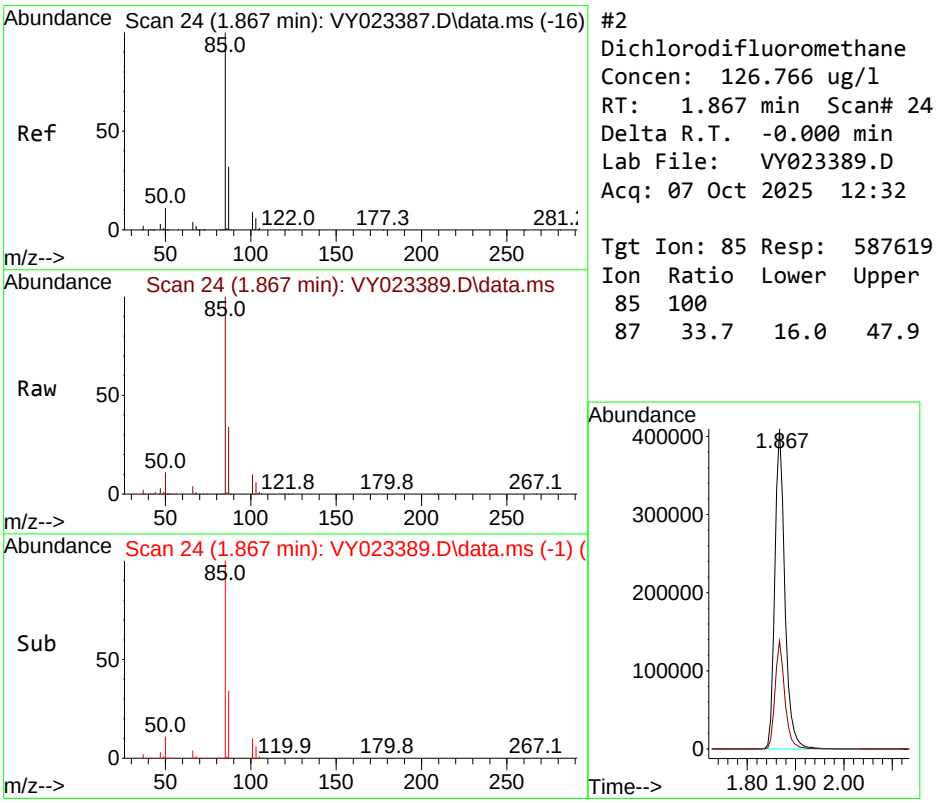
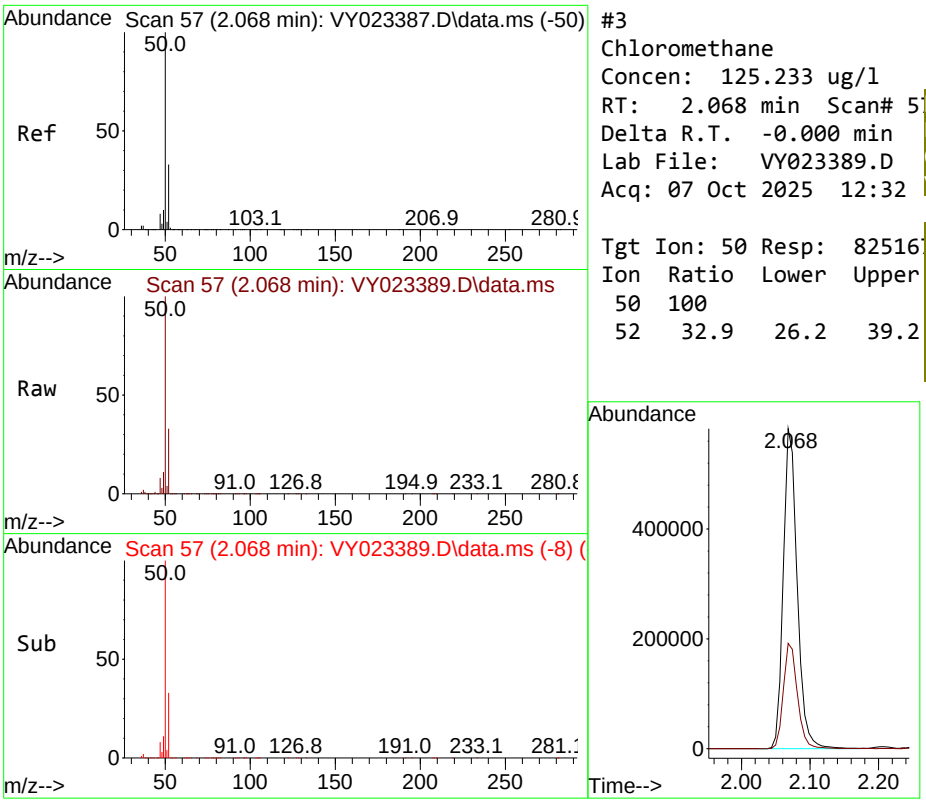


#2
Dichlorodifluoromethane
Concen: 126.766 ug/l
RT: 1.867 min Scan# 24
Delta R.T. -0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion: 85 Resp: 587619

Ion	Ratio	Lower	Upper
85	100		
87	33.7	16.0	47.9



#3
Chloromethane
Concen: 125.233 ug/l
RT: 2.068 min Scan# 5
Delta R.T. -0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

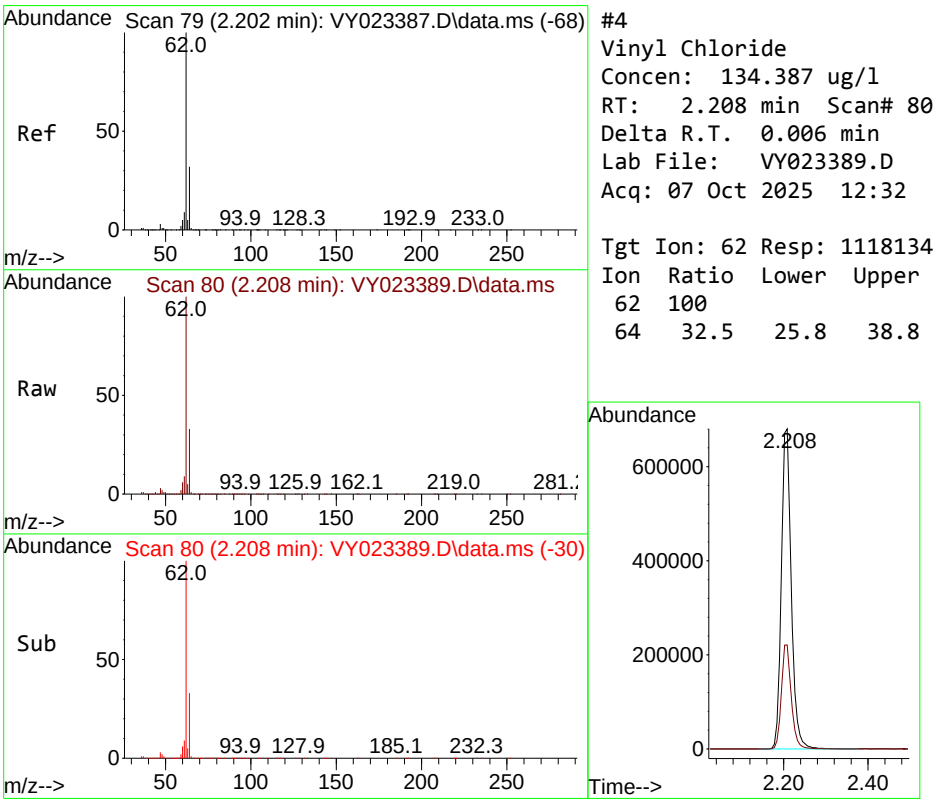
Tgt Ion: 50 Resp: 82516

Ion	Ratio	Lower	Upper
50	100		
52	32.9	26.2	39.2

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC150

Manual Integrations
APPROVED

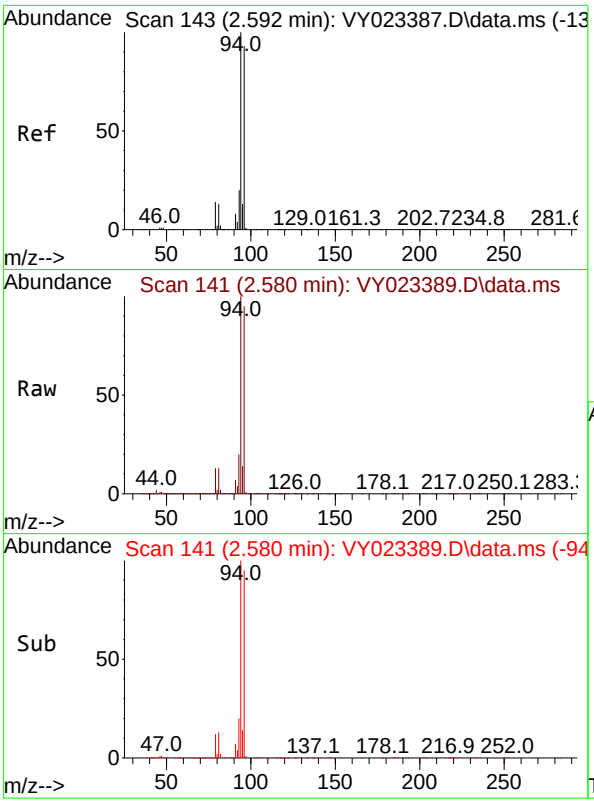
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025



#4
Vinyl Chloride
Concen: 134.387 ug/l
RT: 2.208 min Scan# 80
Delta R.T. 0.006 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion: 62 Resp: 1118134

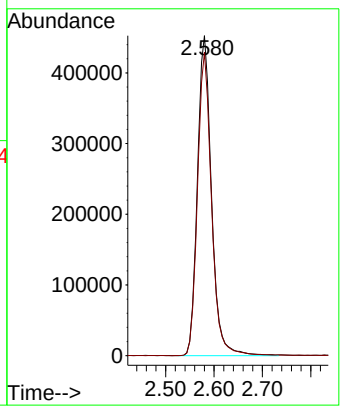
Ion	Ratio	Lower	Upper
62	100		
64	32.5	25.8	38.8



#5
Bromomethane
Concen: 134.118 ug/l
RT: 2.580 min Scan# 14
Delta R.T. -0.012 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion: 94 Resp: 91538

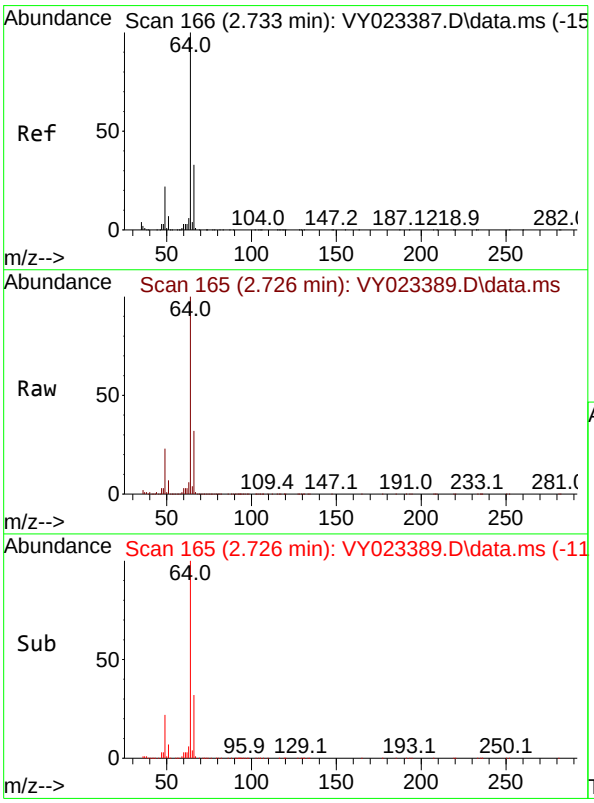
Ion	Ratio	Lower	Upper
94	100		
96	94.8	74.5	111.7



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC150

Manual Integrations
APPROVED

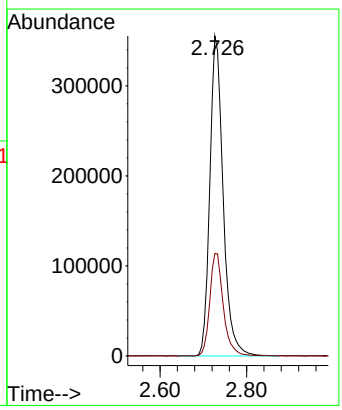
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

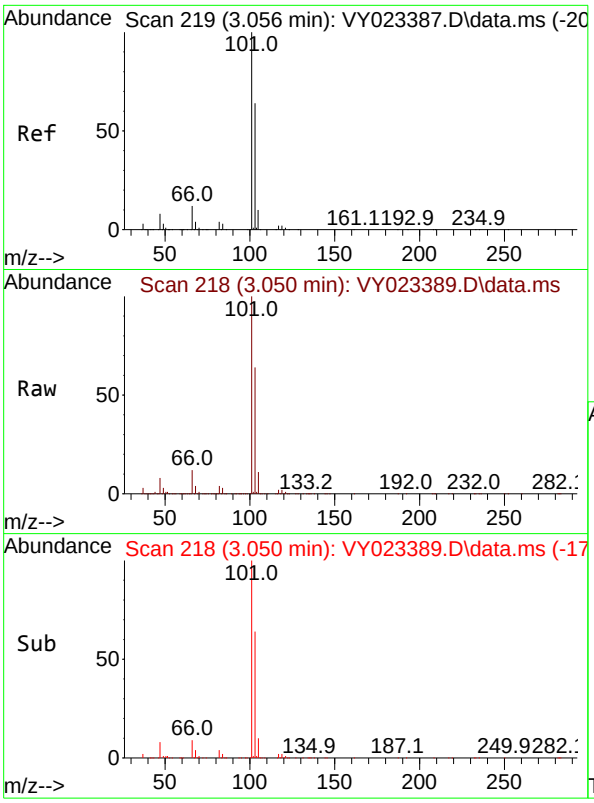


#6
Chloroethane
Concen: 133.994 ug/l
RT: 2.726 min Scan# 165
Delta R.T. -0.006 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion: 64 Resp: 756912

Ion	Ratio	Lower	Upper
64	100		
66	32.0	26.2	39.4

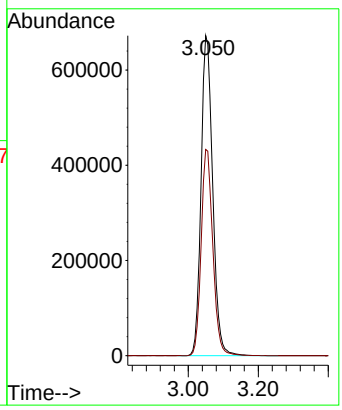




#7
Trichlorofluoromethane
Concen: 144.948 ug/l
RT: 3.050 min Scan# 2
Delta R.T. -0.006 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion:101 Resp: 154916

Ion	Ratio	Lower	Upper
101	100		
103	64.4	51.3	76.9



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC150

Manual Integrations
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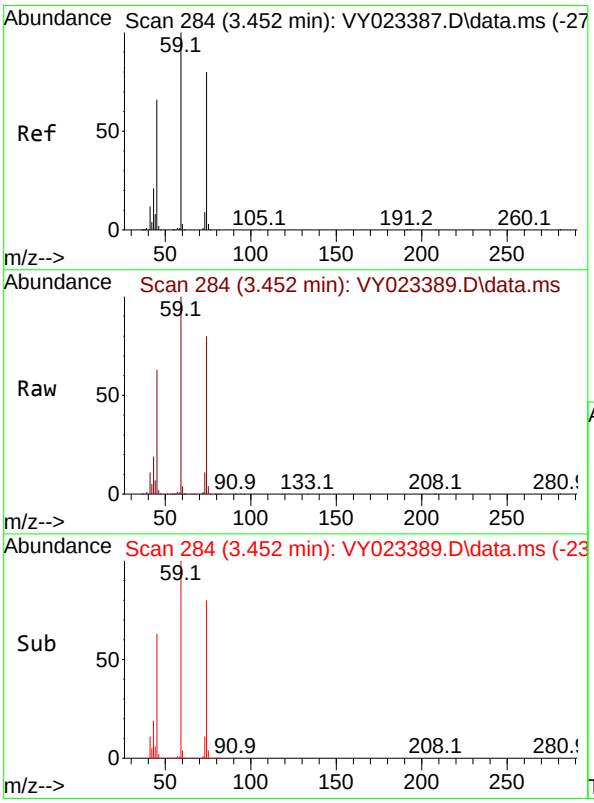
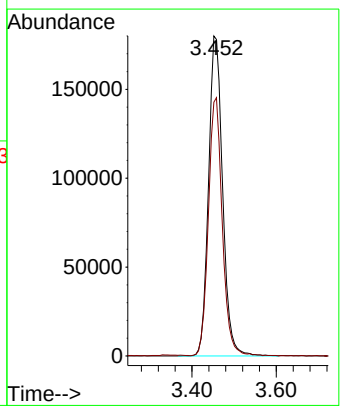
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

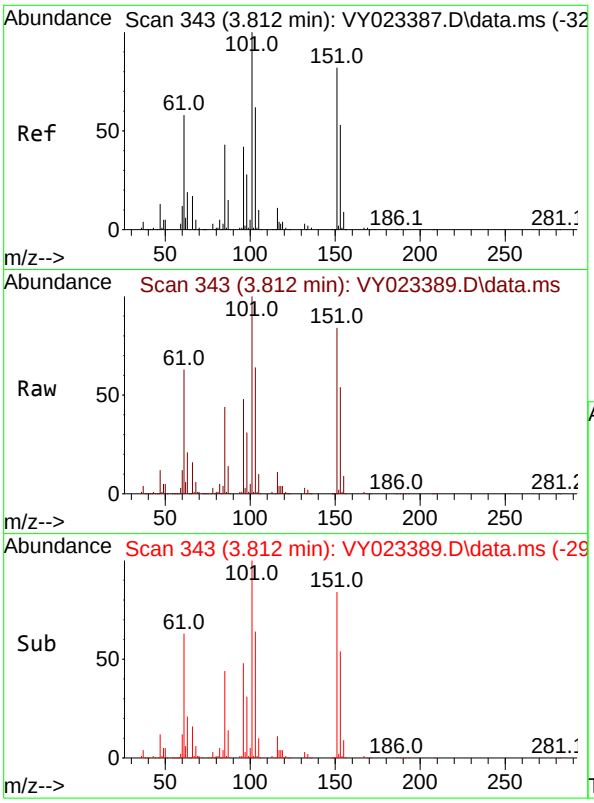


#8
Diethyl Ether
Concen: 149.747 ug/l
RT: 3.452 min Scan# 284
Delta R.T. -0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion: 74 Resp: 418615

Ion	Ratio	Lower	Upper
74	100		
45	79.7	39.9	119.7





#9
1,1,2-Trichlorotrifluoroethane
Concen: 137.639 ug/l
RT: 3.812 min Scan# 34
Delta R.T. 0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion:101 Resp: 78627

Ion	Ratio	Lower	Upper
101	100		
85	43.5	34.6	51.8
151	85.2	67.0	100.6

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC150

Manual Integrations
APPROVED

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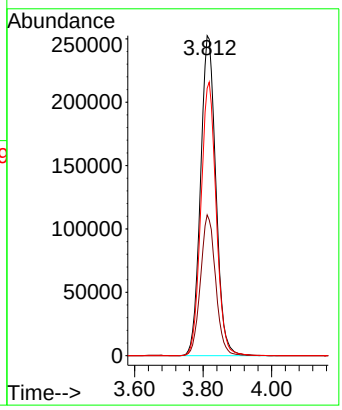
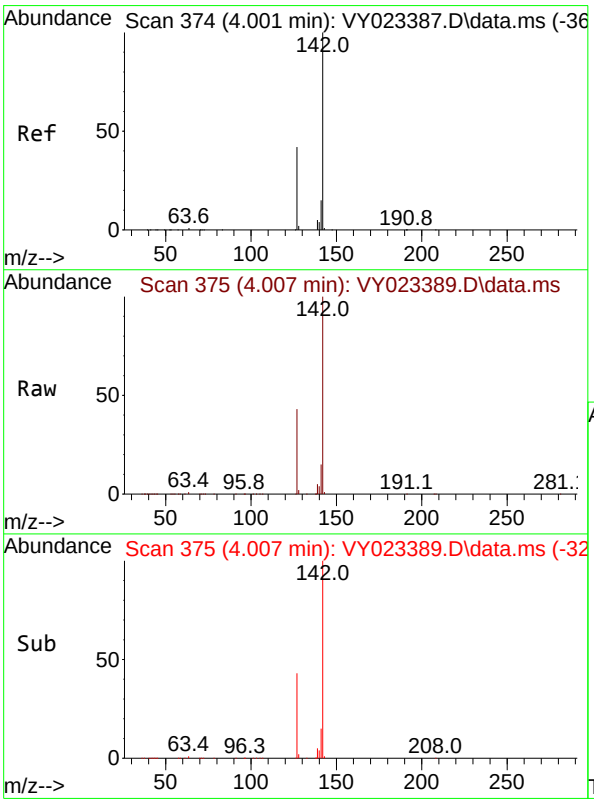
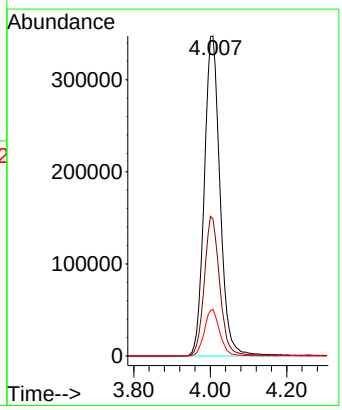


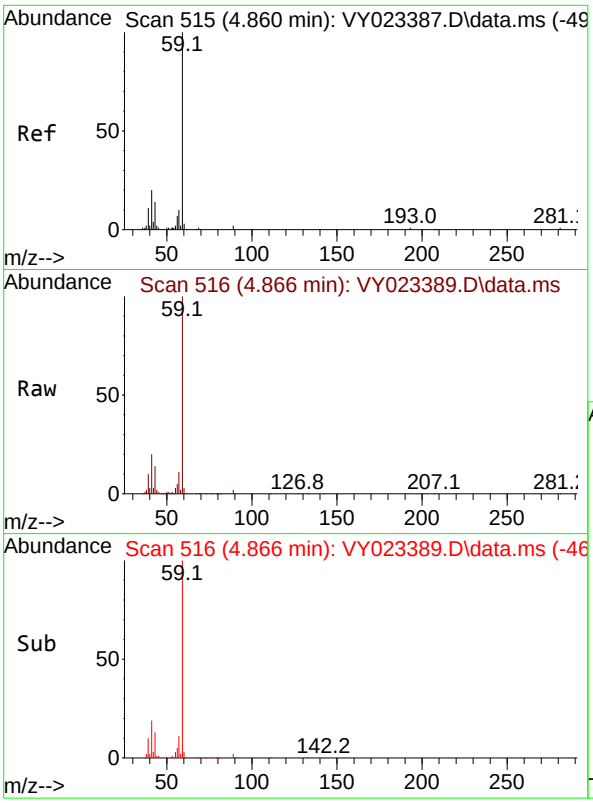


#10
Methyl Iodide
Concen: 150.409 ug/l
RT: 4.007 min Scan# 375
Delta R.T. 0.006 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion:142 Resp: 992925

Ion	Ratio	Lower	Upper
142	100		
127	42.8	34.8	52.2
141	14.1	11.6	17.4

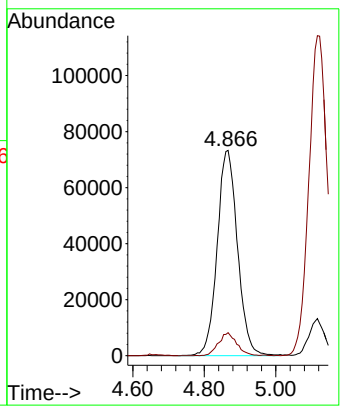




#11
Tert butyl alcohol
Concen: 963.279 ug/l
RT: 4.866 min Scan# 5
Delta R.T. 0.006 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion: 59 Resp: 28887

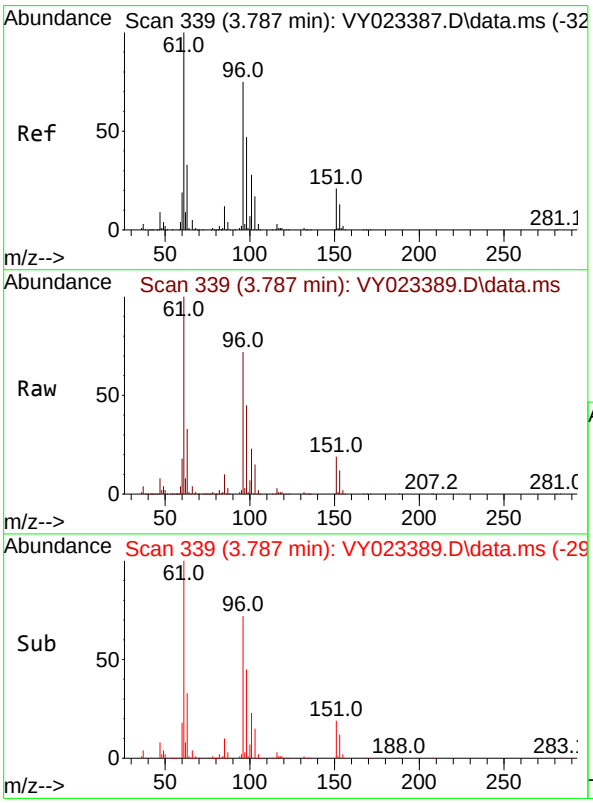
Ion	Ratio	Lower	Upper
59	100		
57	10.1	8.3	12.5



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC150

Manual Integrations APPROVED

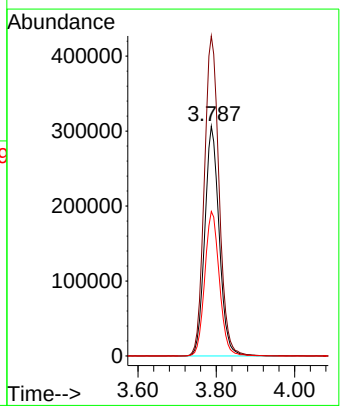
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

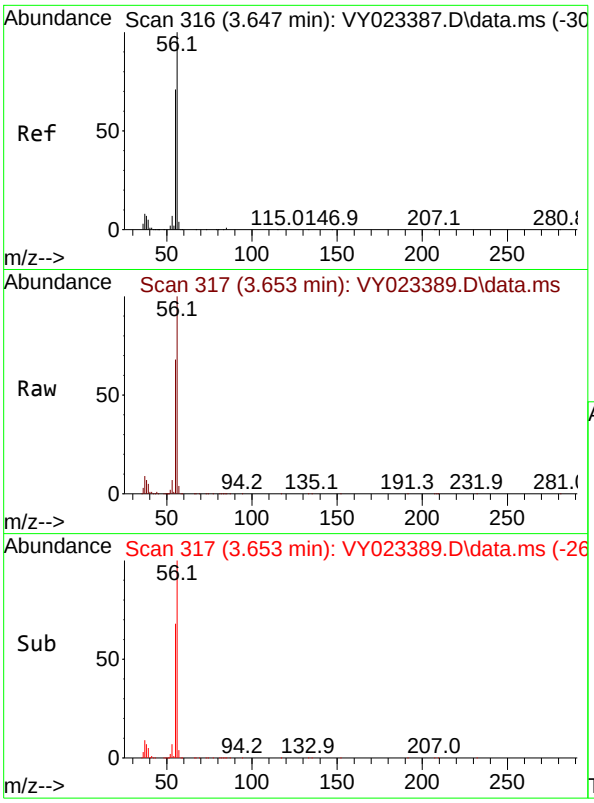


#12
1,1-Dichloroethene
Concen: 142.133 ug/l
RT: 3.787 min Scan# 339
Delta R.T. 0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion: 96 Resp: 781235

Ion	Ratio	Lower	Upper
96	100		
61	139.3	106.7	160.1
98	62.9	50.2	75.4

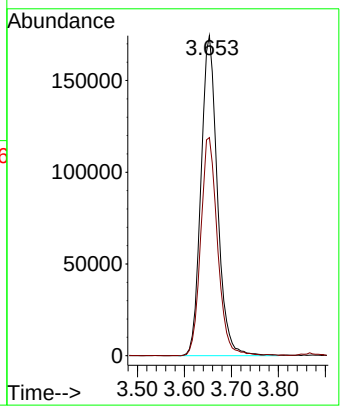




#13
Acrolein
Concen: 833.323 ug/l
RT: 3.653 min Scan# 3
Delta R.T. 0.006 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion: 56 Resp: 42341

Ion	Ratio	Lower	Upper
56	100		
55	69.7	56.1	84.1



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC150

Manual Integrations
APPROVED

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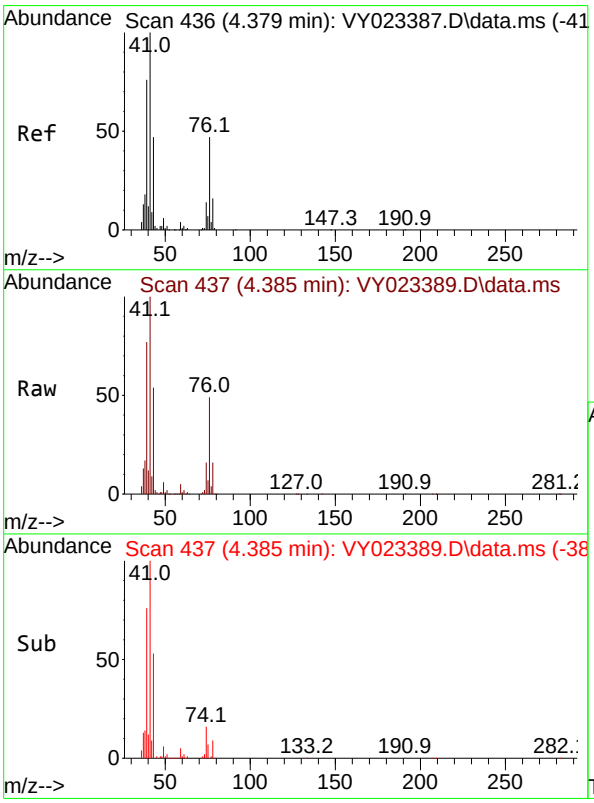
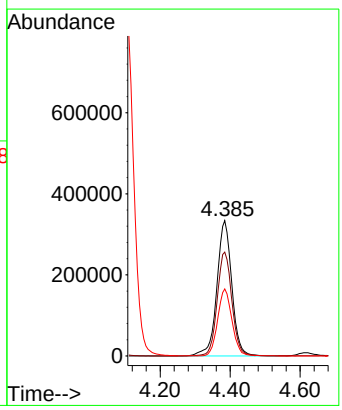
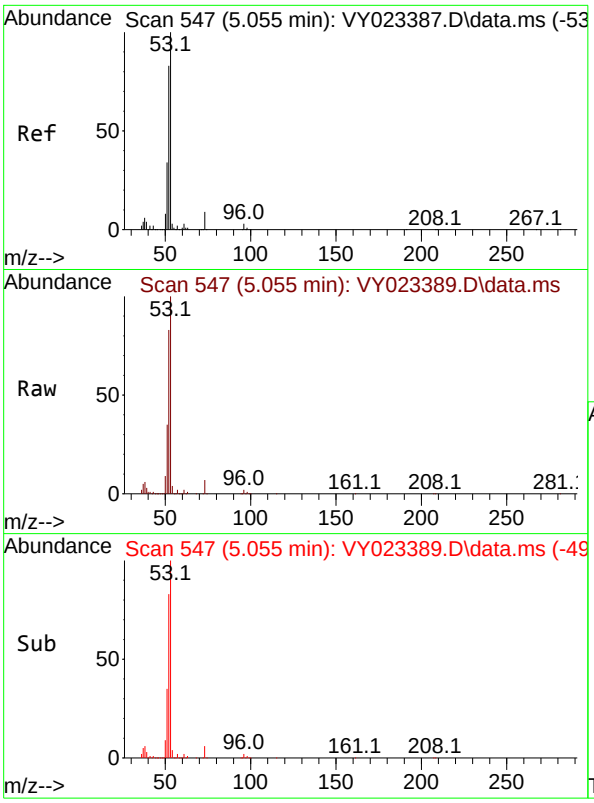


#14
Allyl chloride
Concen: 143.628 ug/l
RT: 4.385 min Scan# 437
Delta R.T. 0.006 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion: 41 Resp: 988378

Ion	Ratio	Lower	Upper
41	100		
39	75.6	59.9	89.9
76	47.2	38.0	57.0

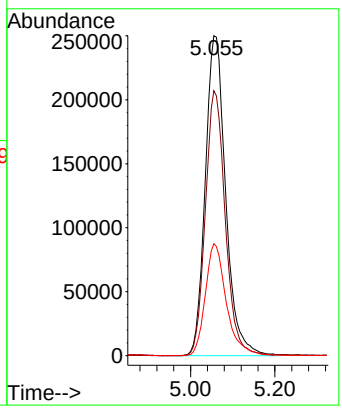




#15
Acrylonitrile
Concen: 768.735 ug/l
RT: 5.055 min Scan# 54
Delta R.T. 0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion: 53 Resp: 84185

Ion	Ratio	Lower	Upper
53	100		
52	80.9	64.6	97.0
51	36.0	29.5	44.3



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC150

Manual Integrations
APPROVED

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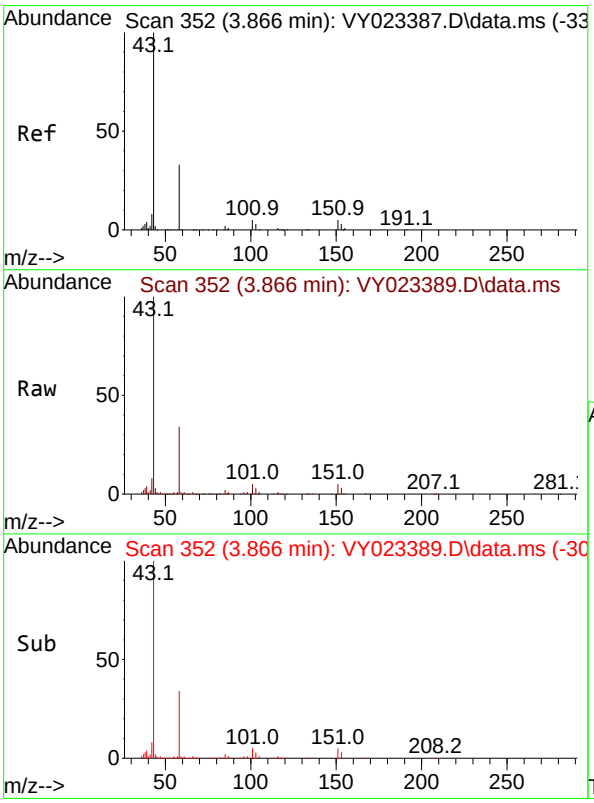
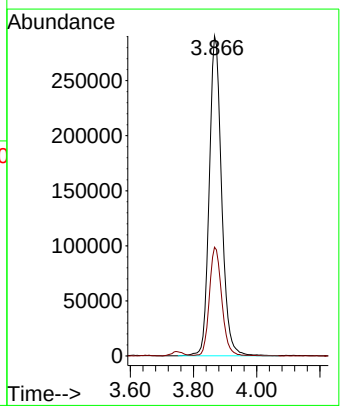
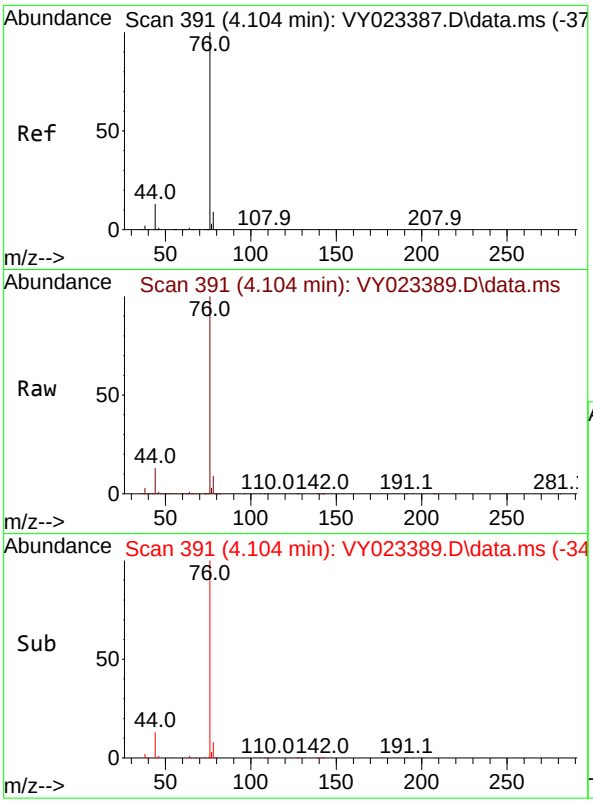


#16
Acetone
Concen: 689.040 ug/l
RT: 3.866 min Scan# 352
Delta R.T. -0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion: 43 Resp: 789668

Ion	Ratio	Lower	Upper
43	100		
58	34.0	27.7	41.5

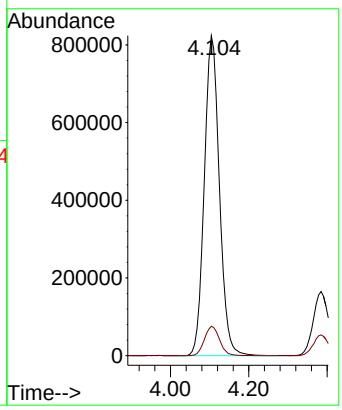




#17
Carbon Disulfide
Concen: 128.252 ug/l
RT: 4.104 min Scan# 3
Delta R.T. 0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion: 76 Resp: 219933

Ion	Ratio	Lower	Upper
76	100		
78	9.2	7.3	10.9



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC150

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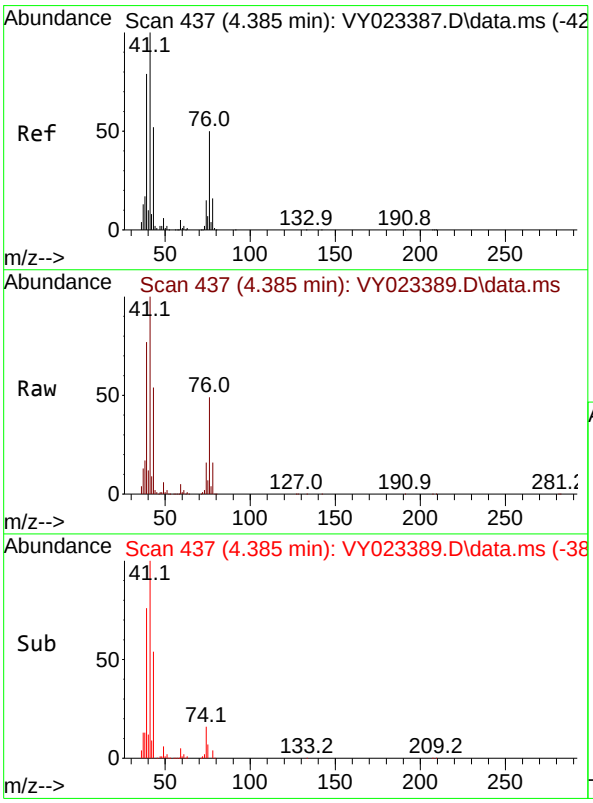
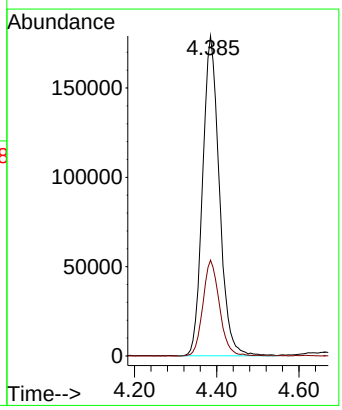
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

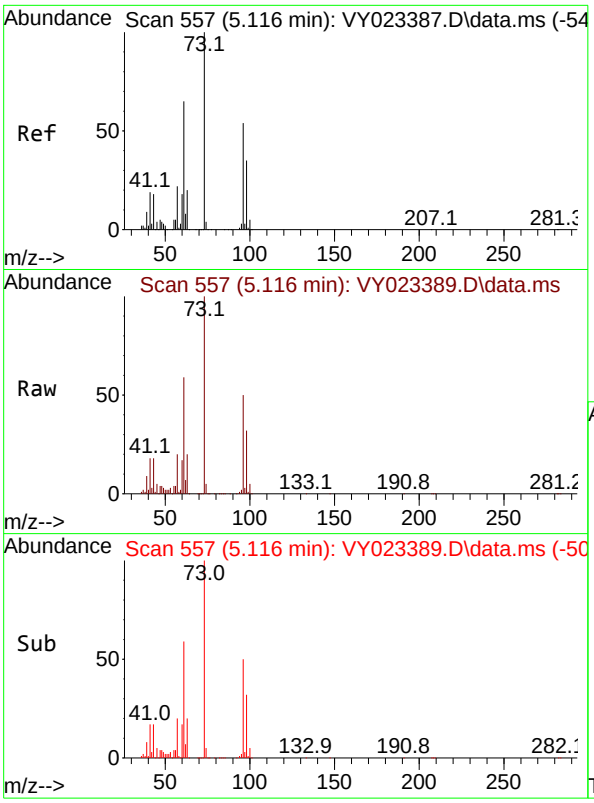


#18
Methyl Acetate
Concen: 173.497 ug/l
RT: 4.385 min Scan# 437
Delta R.T. -0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion: 43 Resp: 505344

Ion	Ratio	Lower	Upper
43	100		
74	29.7	24.2	36.4

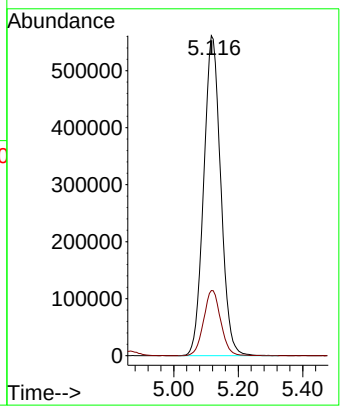




#19
Methyl tert-butyl Ether
Concen: 159.802 ug/l
RT: 5.116 min Scan# 5
Delta R.T. -0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion: 73 Resp: 205653

Ion	Ratio	Lower	Upper
73	100		
57	20.3	17.4	26.0



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC150

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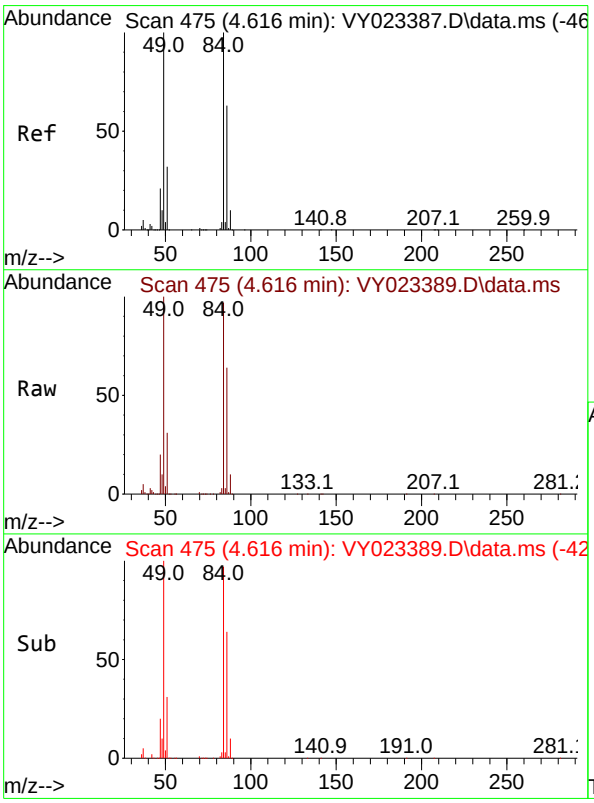
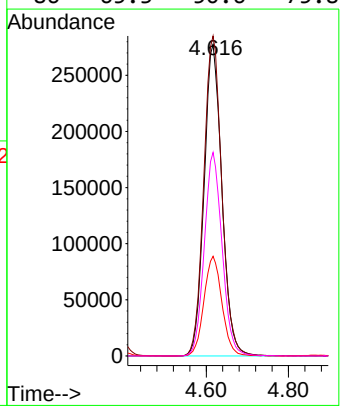
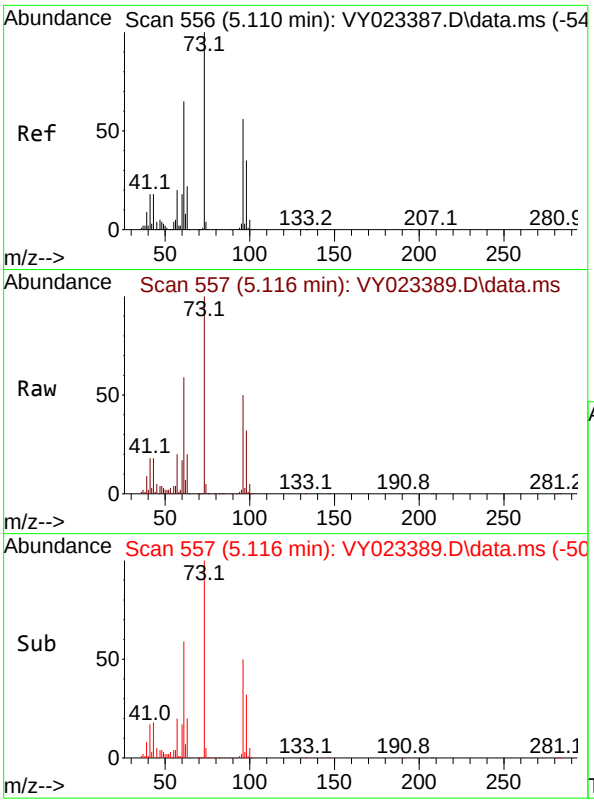


#20
Methylene Chloride
Concen: 134.365 ug/l
RT: 4.616 min Scan# 475
Delta R.T. 0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion: 84 Resp: 835005

Ion	Ratio	Lower	Upper
84	100		
49	102.7	80.2	120.4
51	31.9	25.9	38.9
86	65.3	50.6	75.8

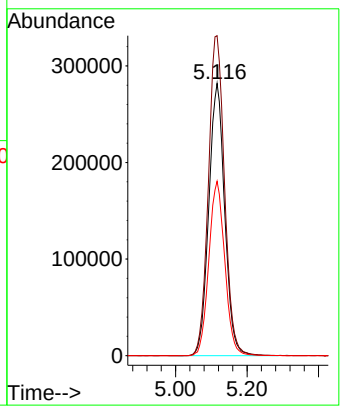




#21
trans-1,2-Dichloroethene
Concen: 142.549 ug/l
RT: 5.116 min Scan# 5
Delta R.T. 0.006 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion: 96 Resp: 87138

Ion	Ratio	Lower	Upper
96	100		
61	117.5	92.7	139.1
98	64.1	49.7	74.5



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC150

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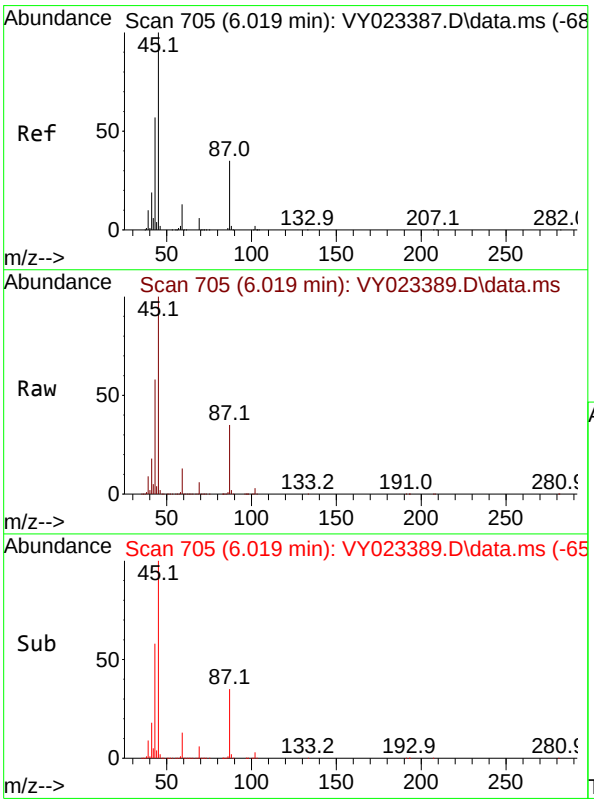
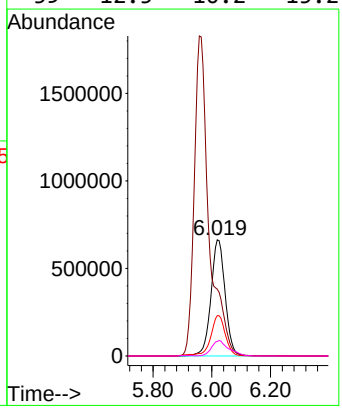
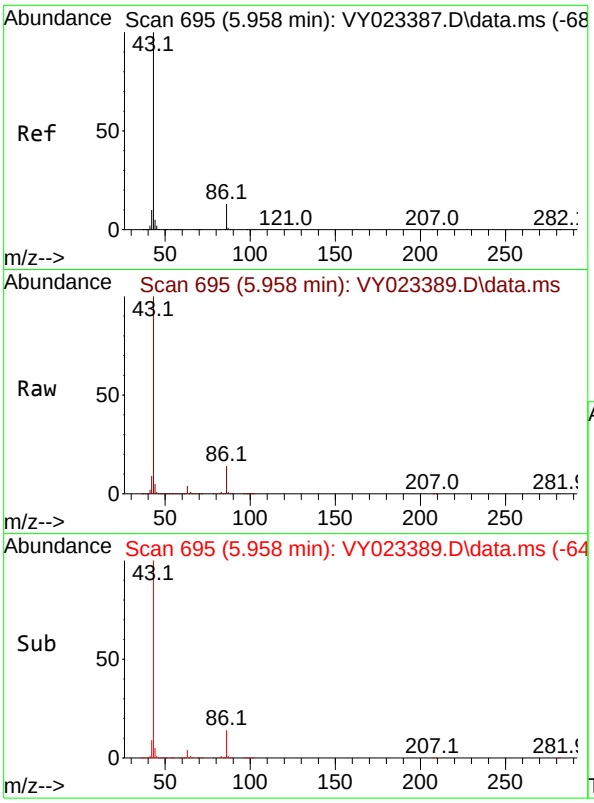


#22
Diisopropyl ether
Concen: 145.375 ug/l
RT: 6.019 min Scan# 705
Delta R.T. -0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion: 45 Resp: 2218430

Ion	Ratio	Lower	Upper
45	100		
43	57.6	45.6	68.4
87	34.7	28.1	42.1
59	12.5	10.2	15.2

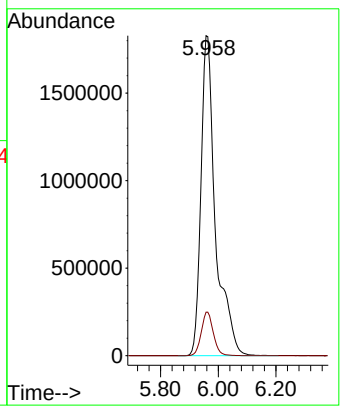




#23
Vinyl Acetate
Concen: 760.246 ug/l
RT: 5.958 min Scan# 6
Delta R.T. -0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion: 43 Resp: 637704

Ion	Ratio	Lower	Upper
43	100		
86	13.6	10.6	15.8



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC150

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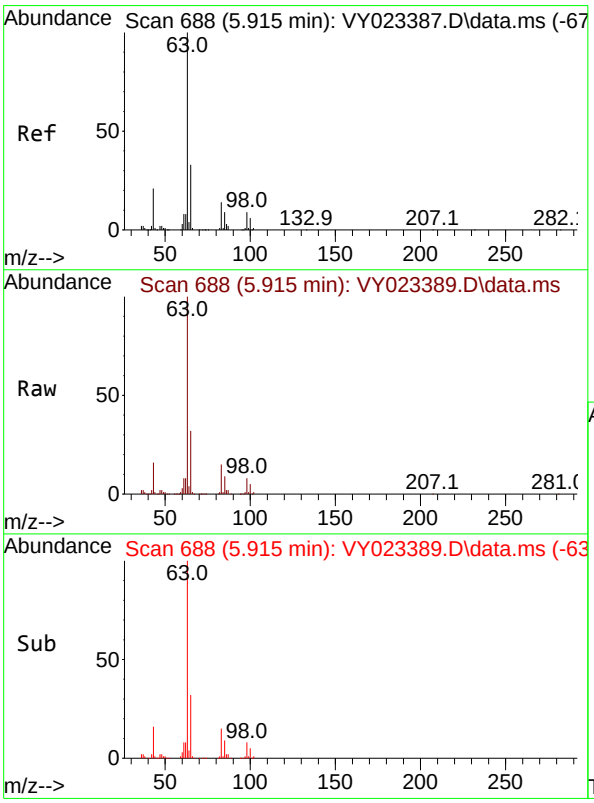
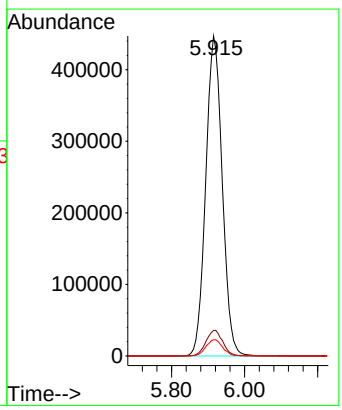
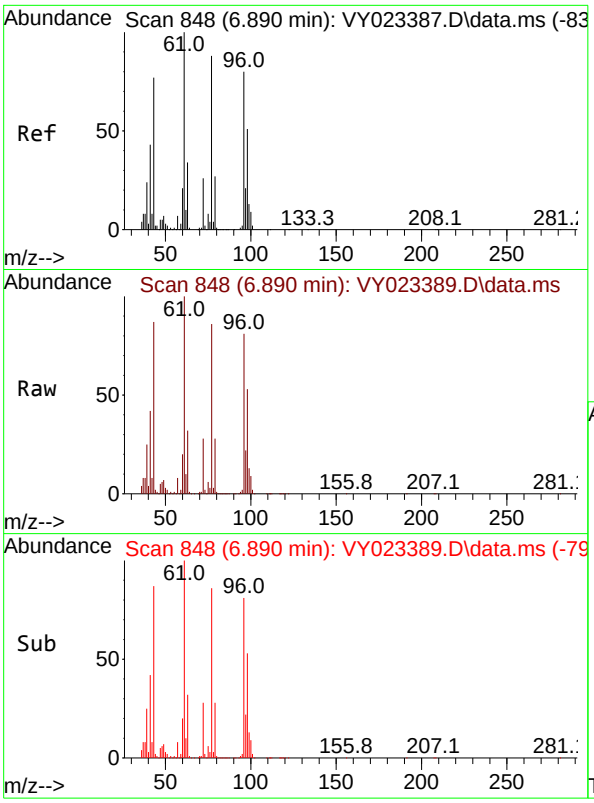


#24
1,1-Dichloroethane
Concen: 139.024 ug/l
RT: 5.915 min Scan# 688
Delta R.T. 0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion: 63 Resp: 1398477

Ion	Ratio	Lower	Upper
63	100		
98	8.0	4.3	13.1
100	5.0	2.8	8.4





#25
2-Butanone
Concen: 788.091 ug/l
RT: 6.890 min Scan# 84
Delta R.T. 0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion: 43 Resp: 111634

Ion	Ratio	Lower	Upper
43	100		
72	32.3	27.4	41.2

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC150

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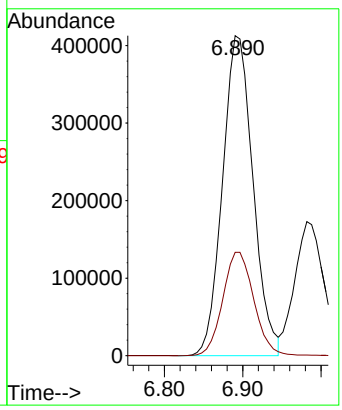
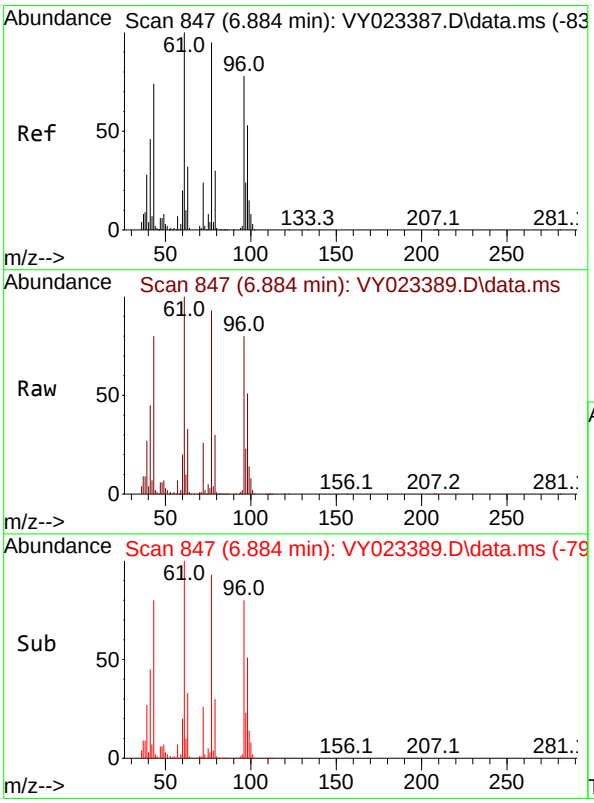
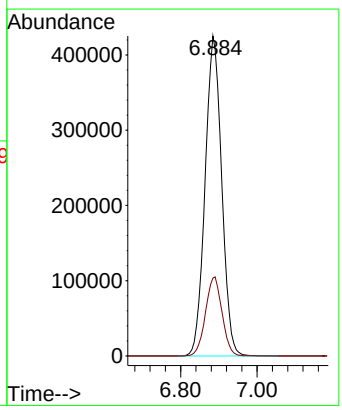


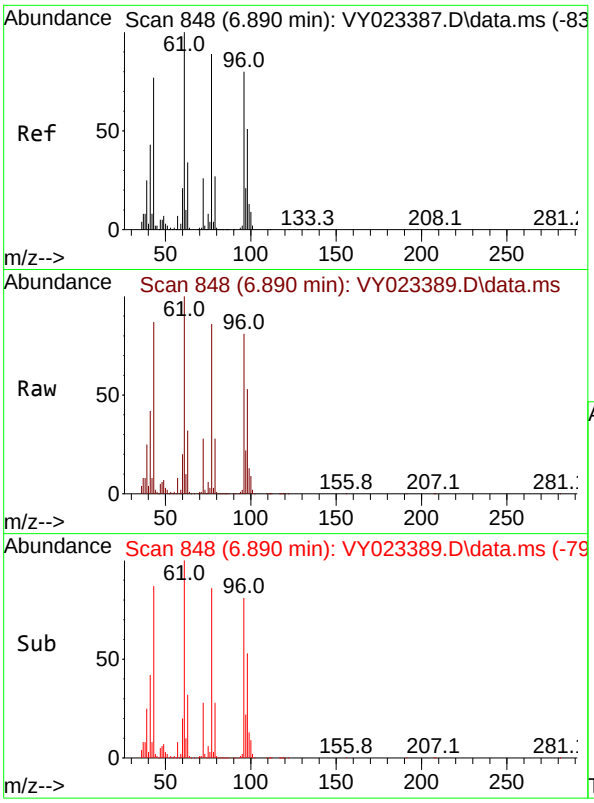


#26
2,2-Dichloropropane
Concen: 143.391 ug/l
RT: 6.884 min Scan# 847
Delta R.T. -0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion: 77 Resp: 1281633

Ion	Ratio	Lower	Upper
77	100		
97	24.6	12.1	36.3

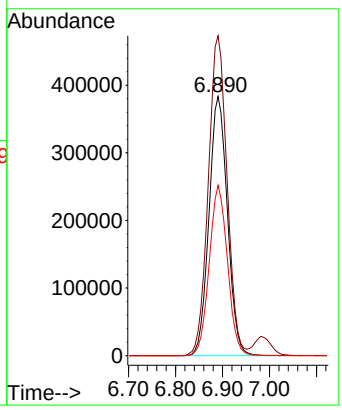




#27
cis-1,2-Dichloroethene
Concen: 150.505 ug/l
RT: 6.890 min Scan# 84
Delta R.T. 0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion: 96 Resp: 104357

Ion	Ratio	Lower	Upper
96	100		
61	125.7	0.0	258.2
98	65.0	0.0	132.0



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC150

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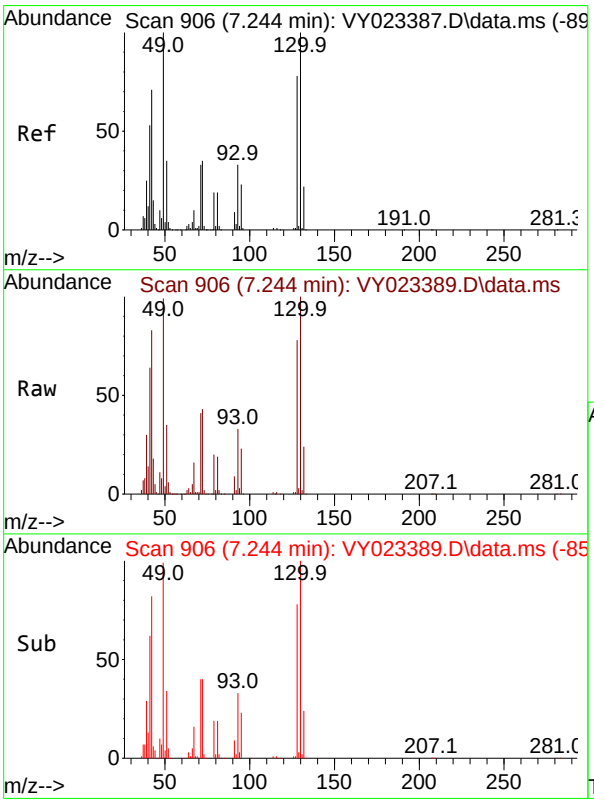
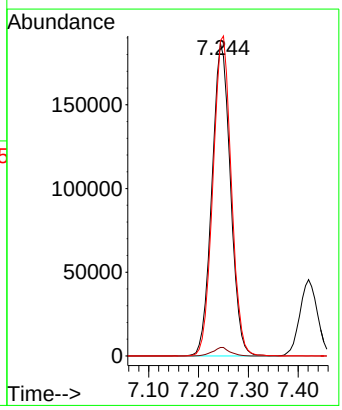
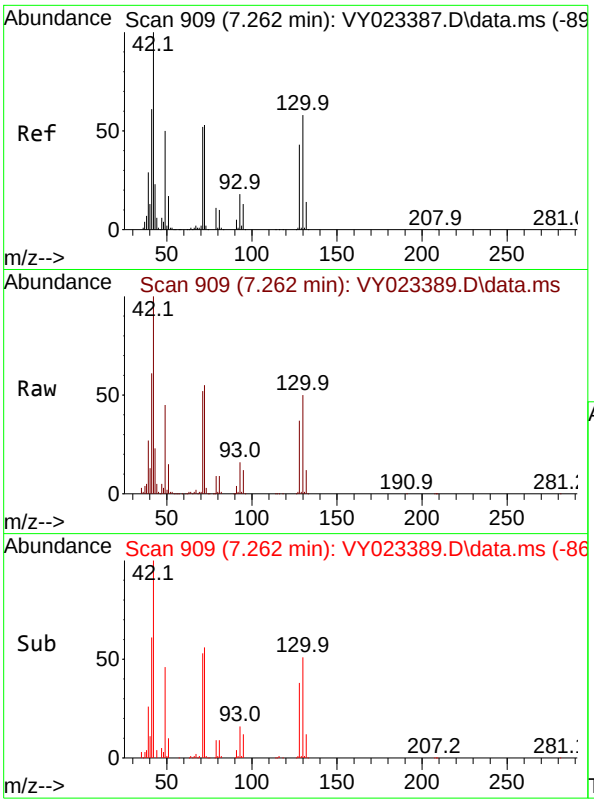


#28
Bromochloromethane
Concen: 123.567 ug/l
RT: 7.244 min Scan# 906
Delta R.T. -0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion: 49 Resp: 482210

Ion	Ratio	Lower	Upper
49	100		
129	2.5	0.0	5.6
130	101.2	81.9	122.9

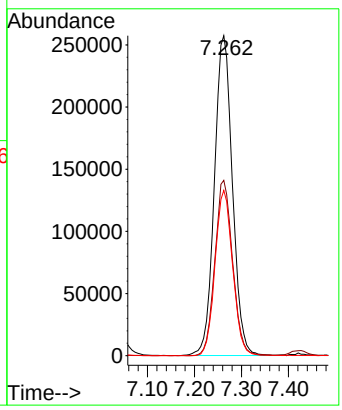




#29
Tetrahydrofuran
Concen: 817.972 ug/l
RT: 7.262 min Scan# 9(
Delta R.T. 0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion: 42 Resp: 68771(

Ion	Ratio	Lower	Upper
42	100		
72	53.9	43.0	64.6
71	50.4	40.1	60.1



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC150

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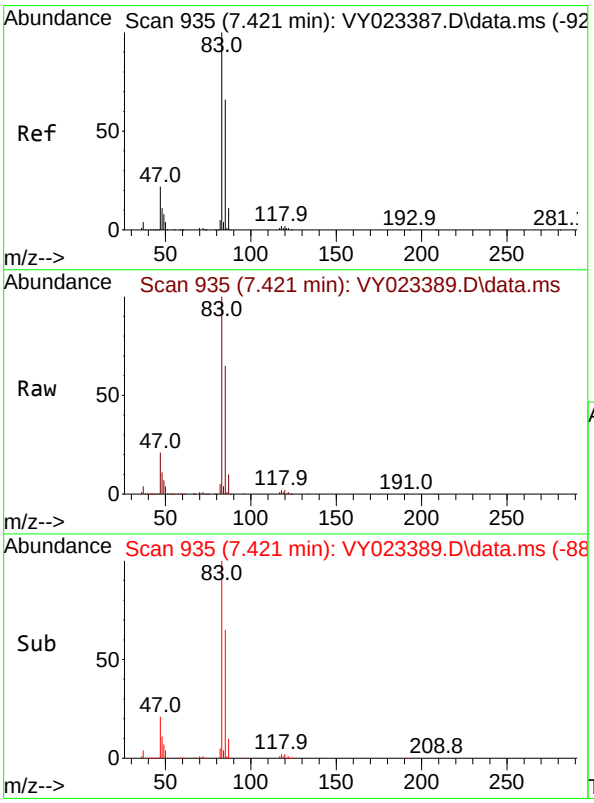
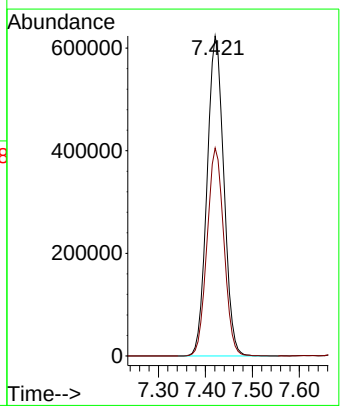
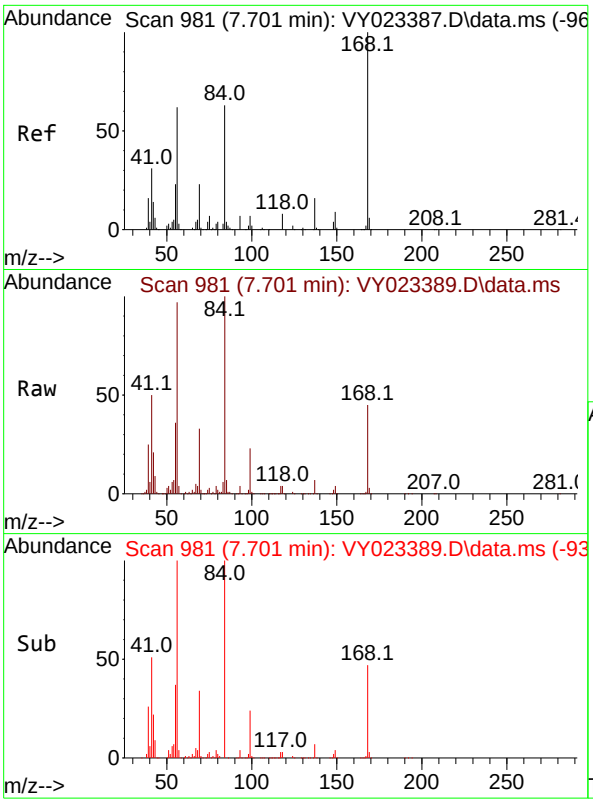


#30
Chloroform
Concen: 142.221 ug/l
RT: 7.421 min Scan# 935
Delta R.T. -0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion: 83 Resp: 1542715

Ion	Ratio	Lower	Upper
83	100		
85	65.0	52.5	78.7

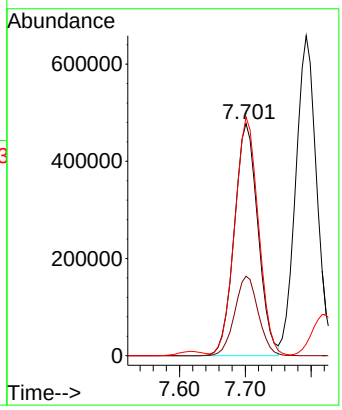




#31
Cyclohexane
Concen: 134.268 ug/l
RT: 7.701 min Scan# 9
Delta R.T. -0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion: 56 Resp: 119277

Ion	Ratio	Lower	Upper
56	100		
69	34.2	30.0	45.0
84	101.7	81.2	121.8



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC150

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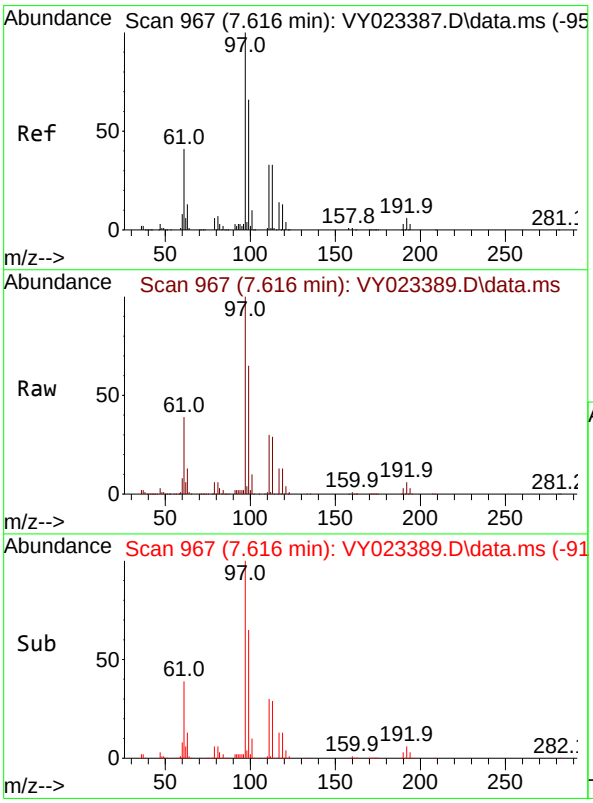
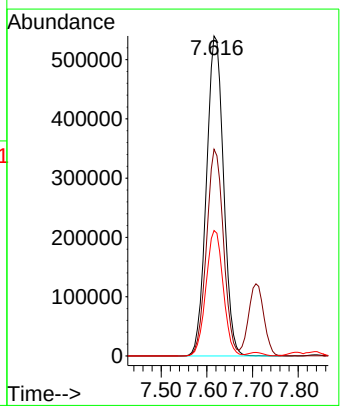
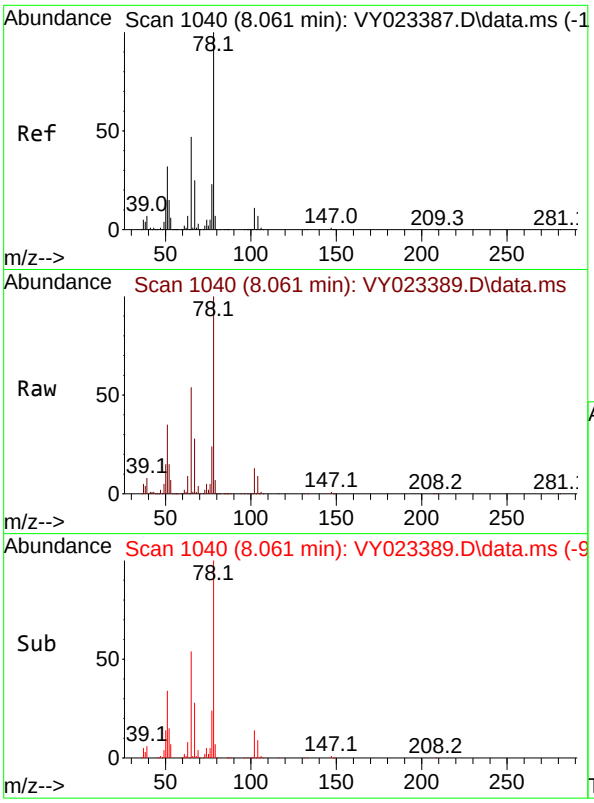


#32
1,1,1-Trichloroethane
Concen: 144.305 ug/l
RT: 7.616 min Scan# 967
Delta R.T. -0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion: 97 Resp: 1405131

Ion	Ratio	Lower	Upper
97	100		
99	64.3	51.4	77.2
61	39.5	31.9	47.9

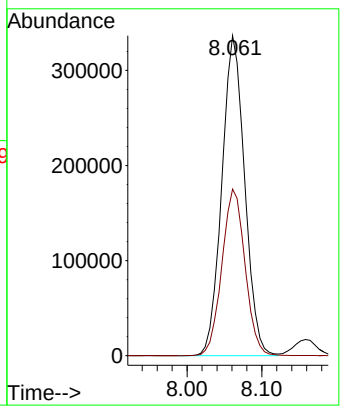




#33
1,2-Dichloroethane-d4
Concen: 140.236 ug/l
RT: 8.061 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion: 65 Resp: 71473

Ion	Ratio	Lower	Upper
65	100		
67	52.8	0.0	105.8



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC150

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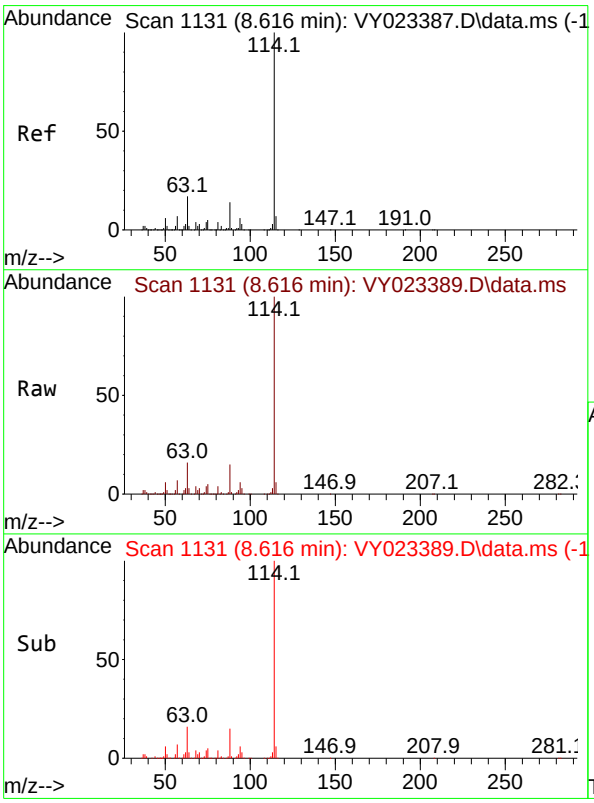
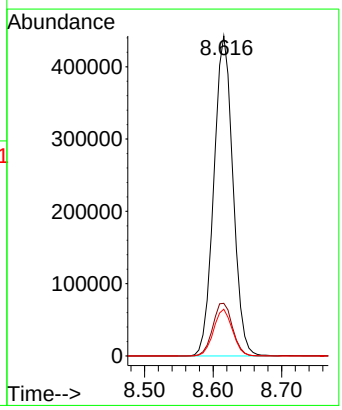
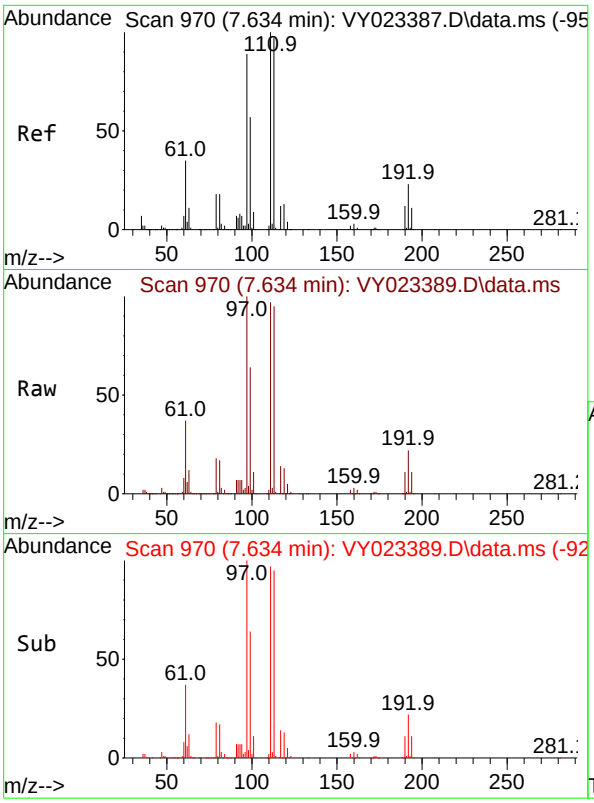


#34
1,4-Difluorobenzene
Concen: 50.000 ug/l
RT: 8.616 min Scan# 1131
Delta R.T. 0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion:114 Resp: 855488

Ion	Ratio	Lower	Upper
114	100		
63	16.4	0.0	34.2
88	14.6	0.0	28.4

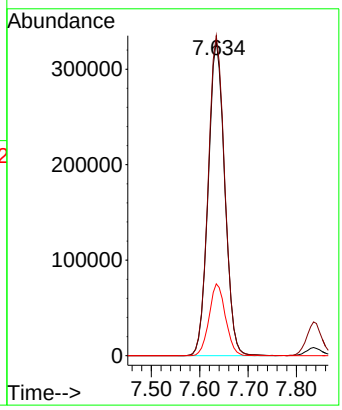




#35
Dibromofluoromethane
Concen: 149.977 ug/l
RT: 7.634 min Scan# 9
Delta R.T. 0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion:113 Resp: 77863

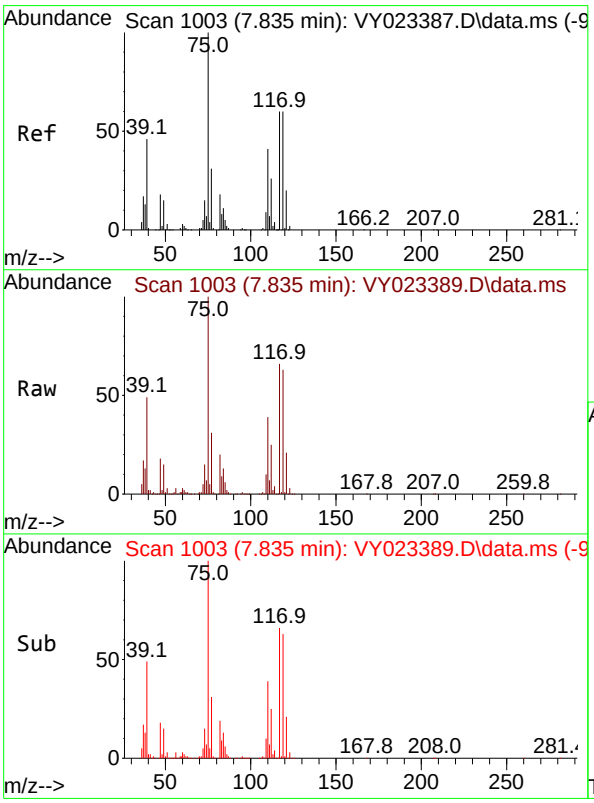
Ion	Ratio	Lower	Upper
113	100		
111	102.2	81.8	122.6
192	22.7	18.0	27.0



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC150

Manual Integrations APPROVED

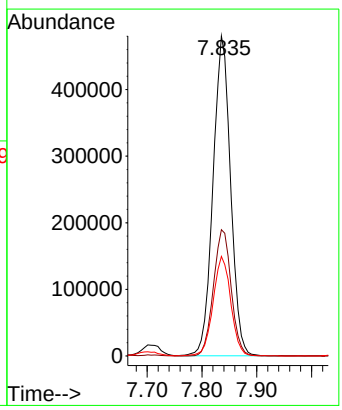
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

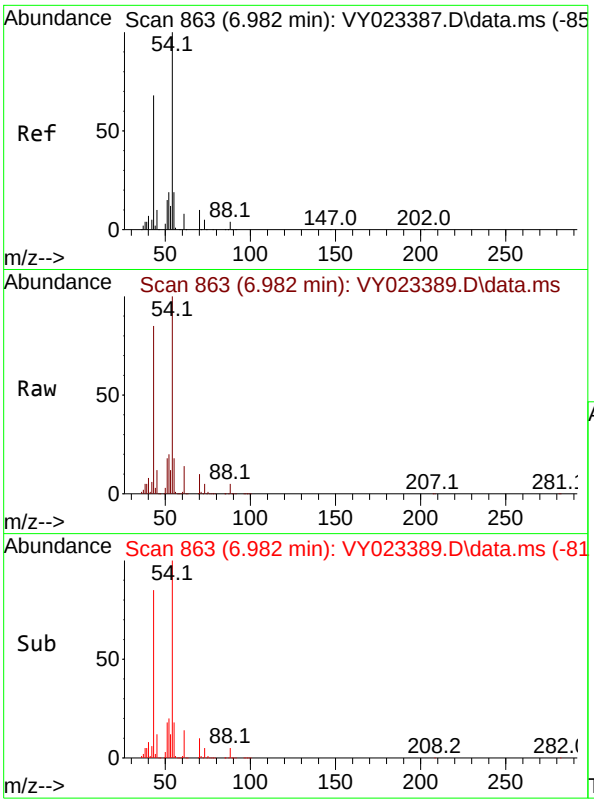


#36
1,1-Dichloropropene
Concen: 146.031 ug/l
RT: 7.835 min Scan# 1003
Delta R.T. 0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion: 75 Resp: 1069665

Ion	Ratio	Lower	Upper
75	100		
110	39.9	19.9	59.7
77	31.4	25.0	37.6

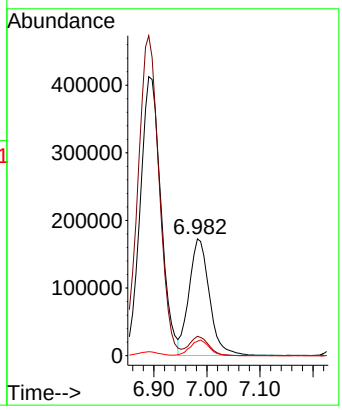




#37
Ethyl Acetate
Concen: 158.853 ug/l
RT: 6.982 min Scan# 8
Delta R.T. 0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion: 43 Resp: 46002

Ion	Ratio	Lower	Upper
43	100		
61	15.9	11.8	17.8
70	12.7	10.5	15.7



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC150

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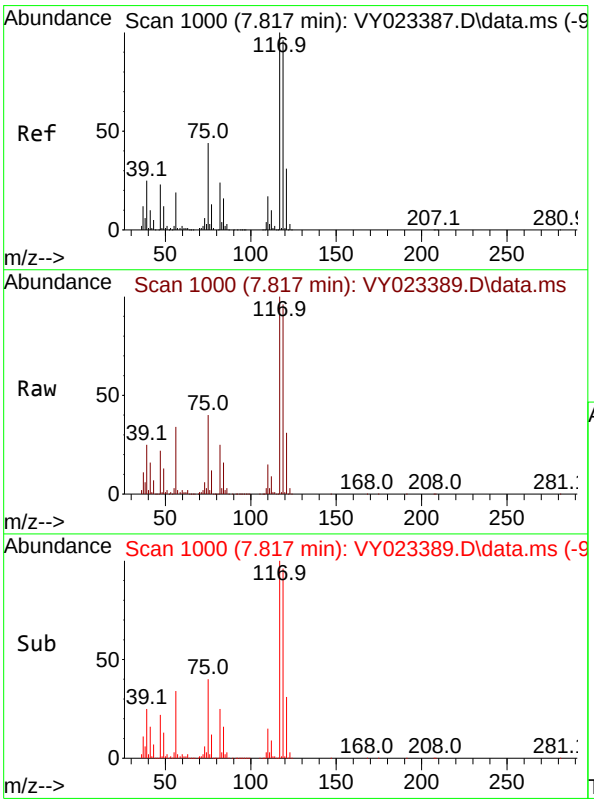
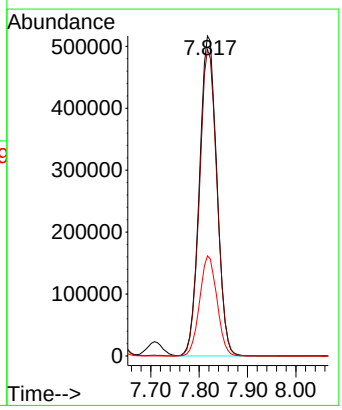
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

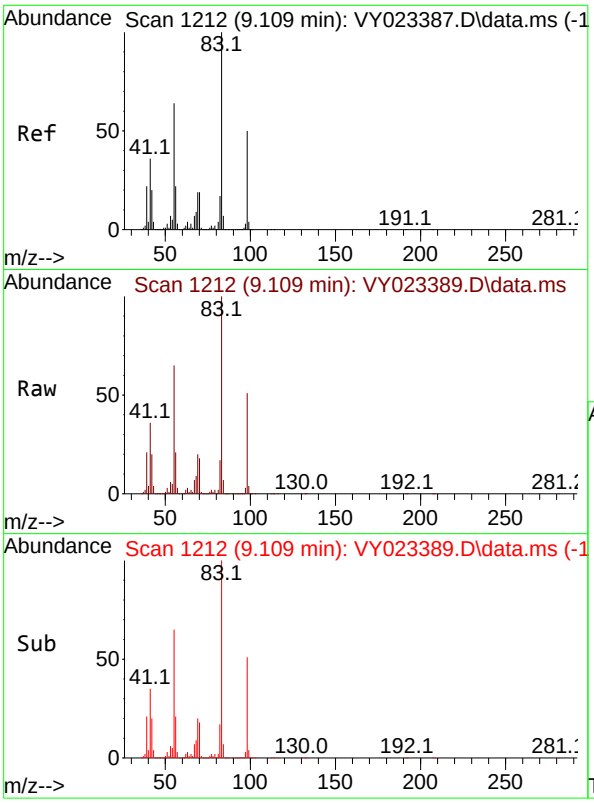


#38
Carbon Tetrachloride
Concen: 151.646 ug/l
RT: 7.817 min Scan# 1000
Delta R.T. -0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion:117 Resp: 1290353

Ion	Ratio	Lower	Upper
117	100		
119	95.8	76.8	115.2
121	31.3	24.5	36.7

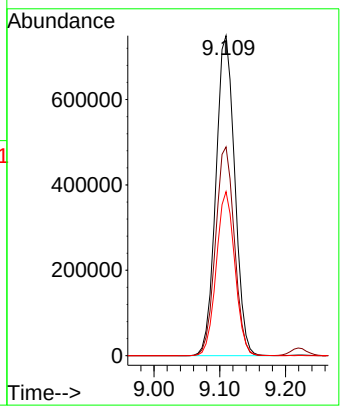




#39
Methylcyclohexane
Concen: 159.580 ug/l
RT: 9.109 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion: 83 Resp: 149661

Ion	Ratio	Lower	Upper
83	100		
55	65.2	51.4	77.2
98	51.2	40.4	60.6



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC150

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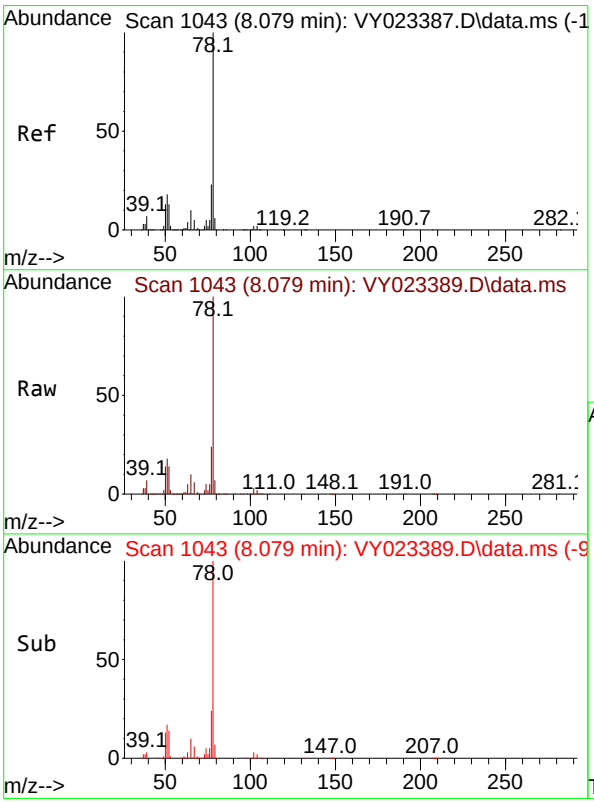
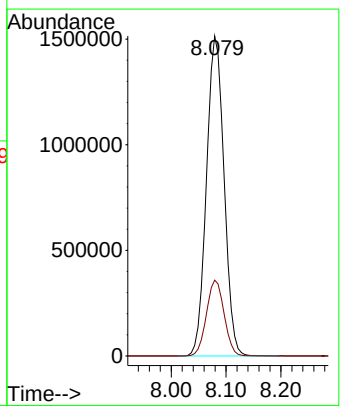
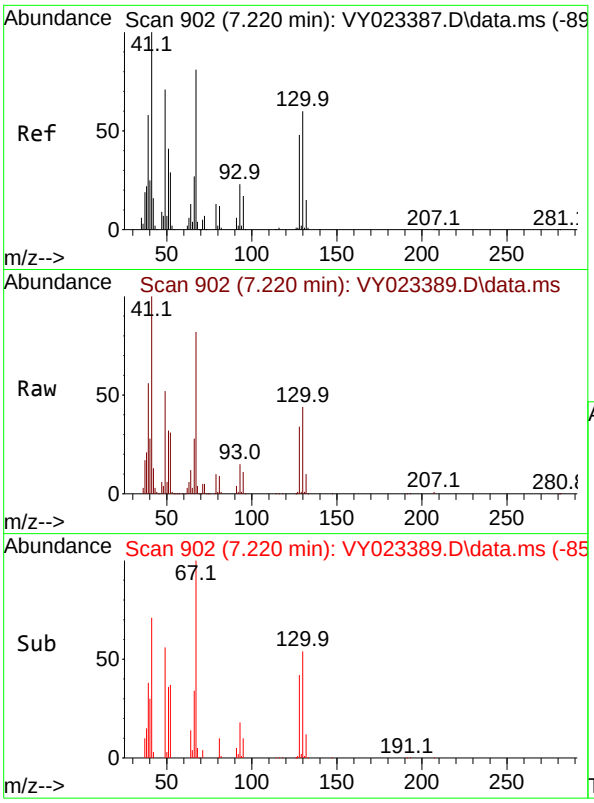


#40
Benzene
Concen: 147.442 ug/l
RT: 8.079 min Scan# 1043
Delta R.T. -0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion: 78 Resp: 3366812

Ion	Ratio	Lower	Upper
78	100		
77	23.7	18.3	27.5

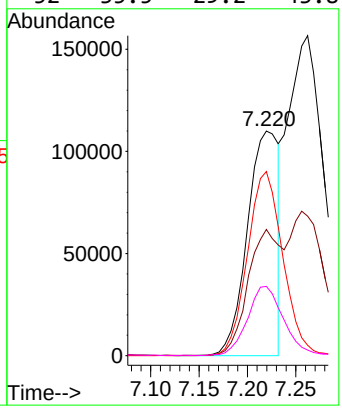




#41
Methacrylonitrile
Concen: 164.212 ug/l
RT: 7.220 min Scan# 9
Delta R.T. -0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion: 41 Resp: 24697

Ion	Ratio	Lower	Upper
41	100		
39	61.7	52.2	78.4
67	93.3	74.9	112.3
52	35.5	29.2	43.8



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC150

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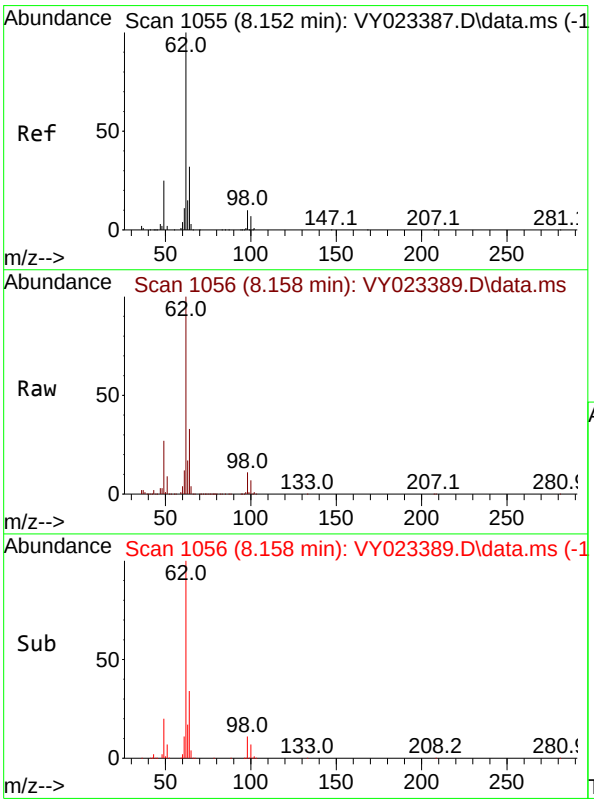
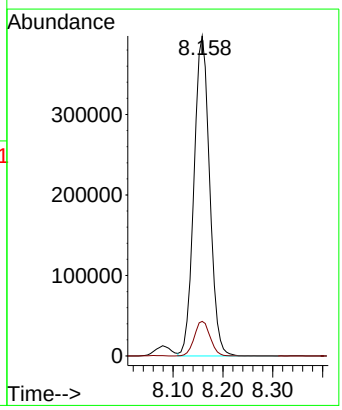
Supervised By :Mahesh Dadoda 10/10/2025

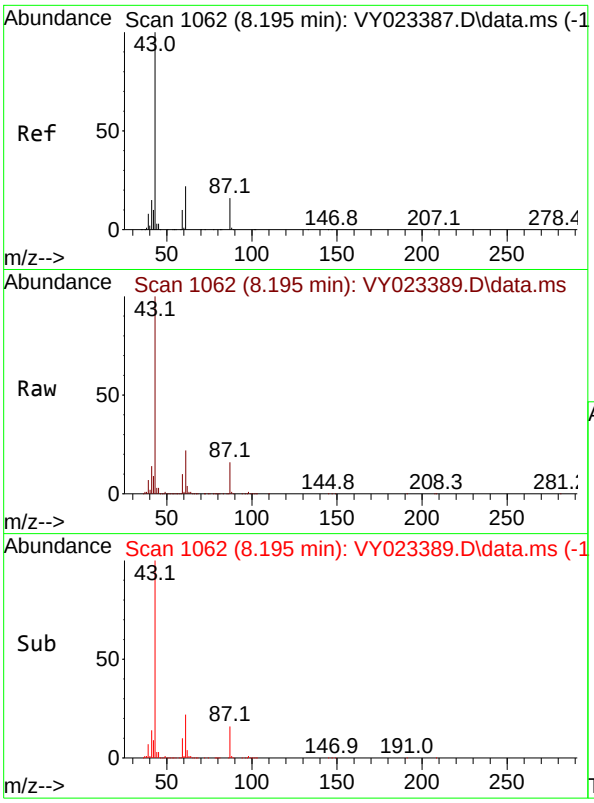


#42
1,2-Dichloroethane
Concen: 149.063 ug/l
RT: 8.158 min Scan# 1056
Delta R.T. 0.006 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion: 62 Resp: 866250

Ion	Ratio	Lower	Upper
62	100		
98	11.0	0.0	21.6

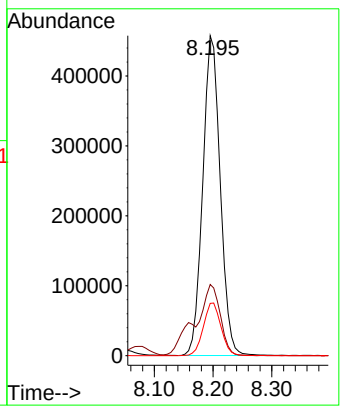




#43
Isopropyl Acetate
Concen: 167.955 ug/l
RT: 8.195 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion: 43 Resp: 94608

Ion	Ratio	Lower	Upper
43	100		
61	22.6	18.1	27.1
87	16.7	13.5	20.3



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC150

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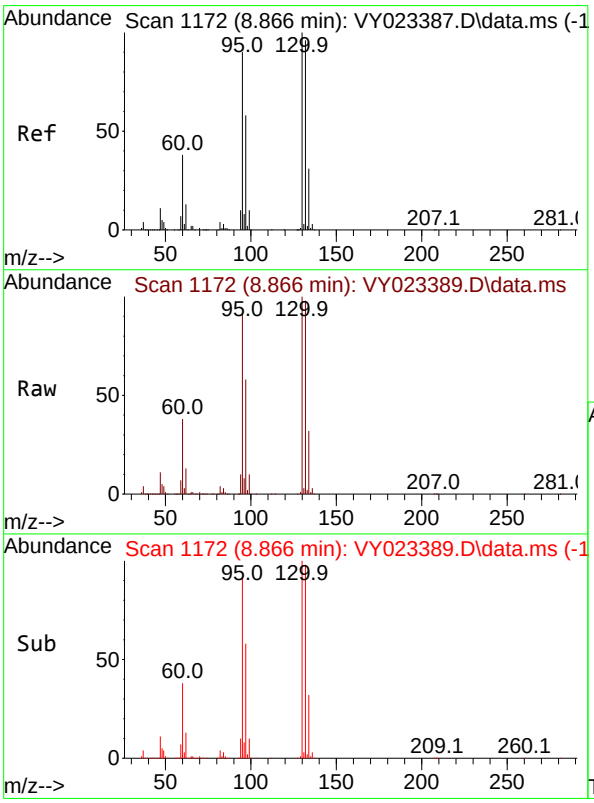
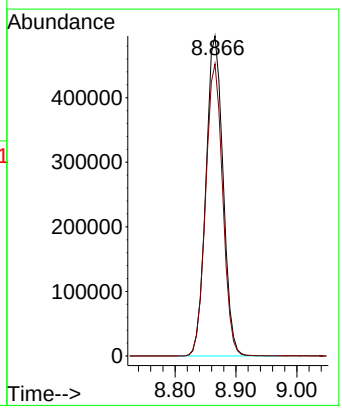
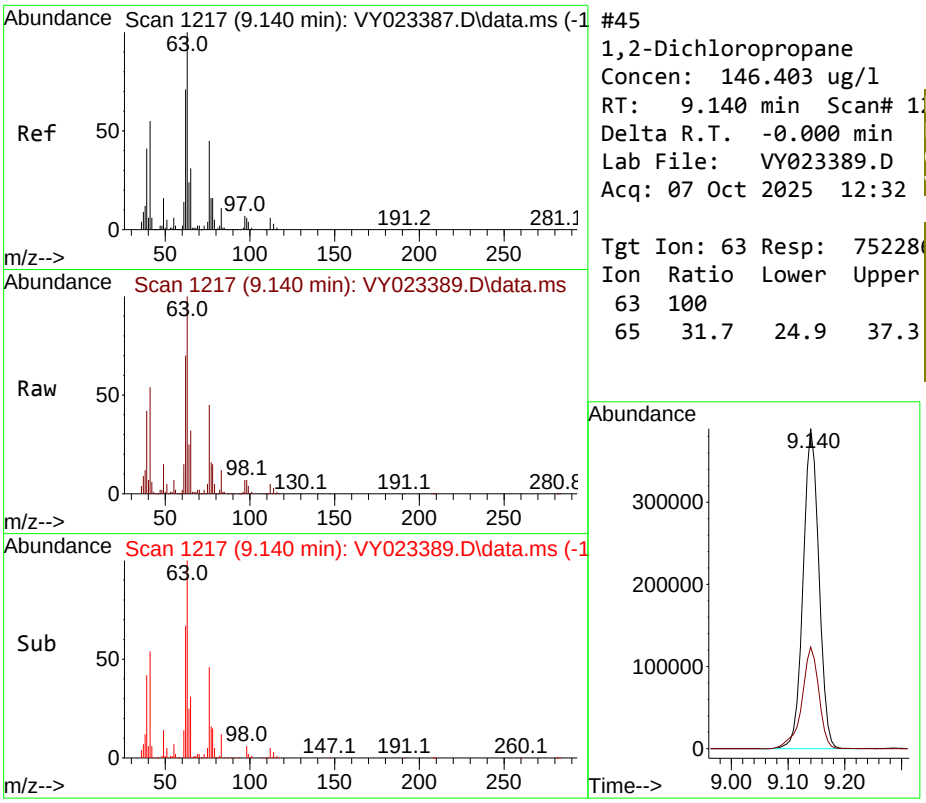


#44
Trichloroethene
Concen: 150.740 ug/l
RT: 8.866 min Scan# 1172
Delta R.T. -0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion:130 Resp: 966011

Ion	Ratio	Lower	Upper
130	100		
95	91.3	0.0	180.6





#45
1,2-Dichloropropane
Concen: 146.403 ug/l
RT: 9.140 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion: 63 Resp: 75228

Ion	Ratio	Lower	Upper
63	100		
65	31.7	24.9	37.3

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC150

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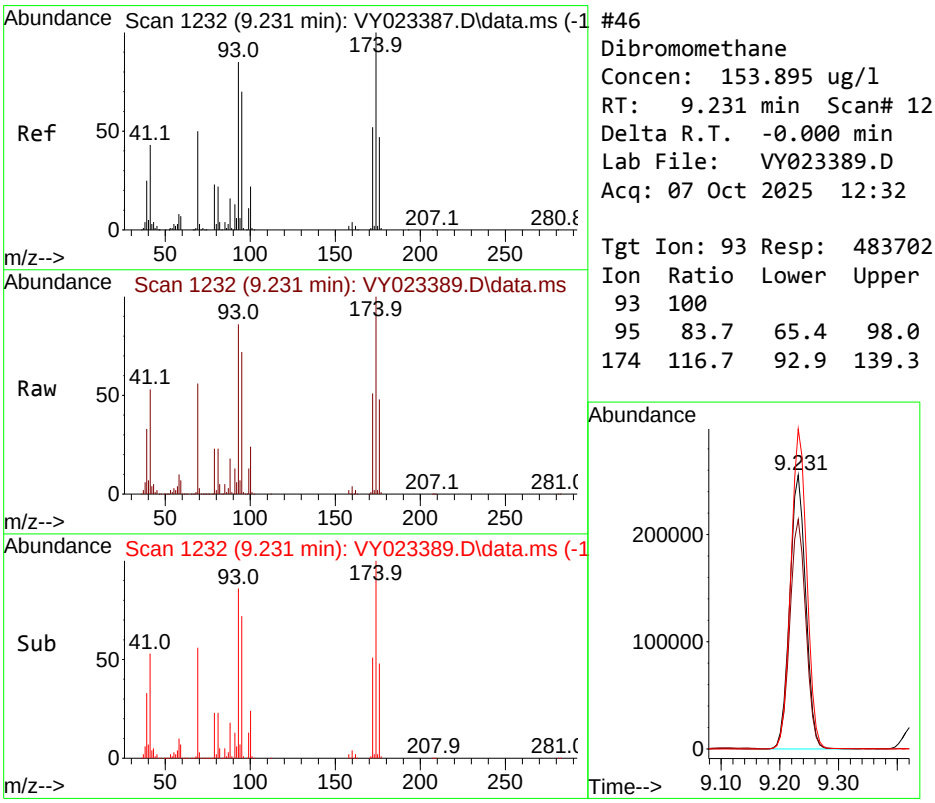
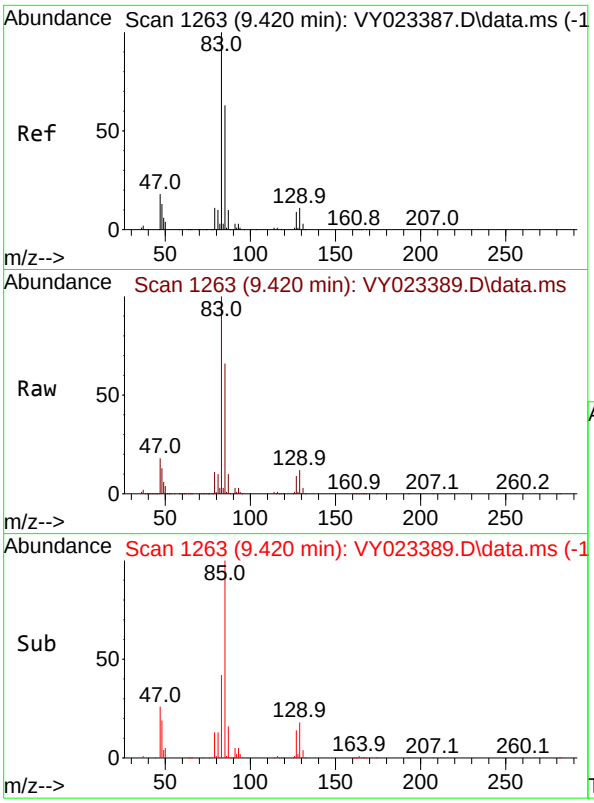


#46
Dibromomethane
Concen: 153.895 ug/l
RT: 9.231 min Scan# 1232
Delta R.T. -0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion: 93 Resp: 483702

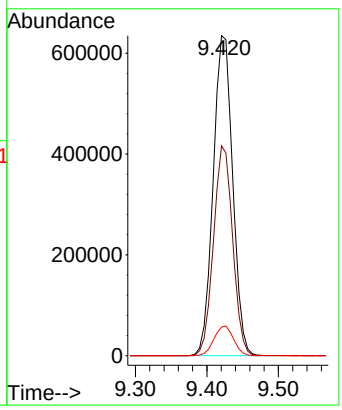
Ion	Ratio	Lower	Upper
93	100		
95	83.7	65.4	98.0
174	116.7	92.9	139.3



#47
Bromodichloromethane
Concen: 151.965 ug/l
RT: 9.420 min Scan# 1
Delta R.T. 0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion: 83 Resp: 120224

Ion	Ratio	Lower	Upper
83	100		
85	65.6	50.8	76.2
127	9.0	7.4	11.2



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC150

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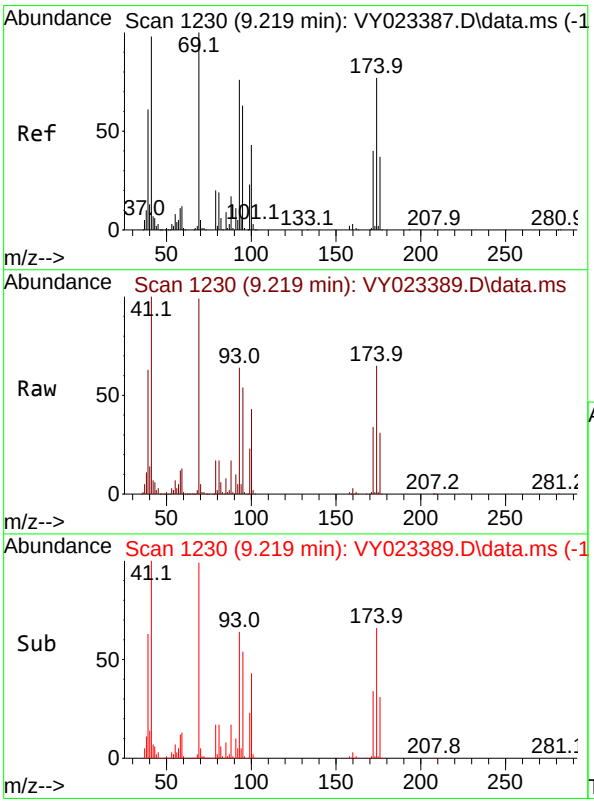
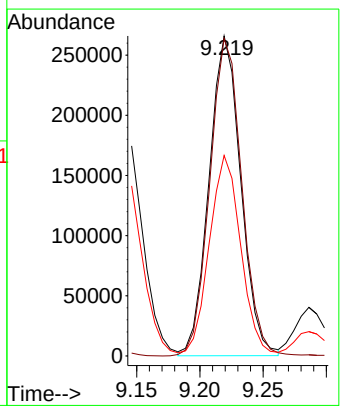
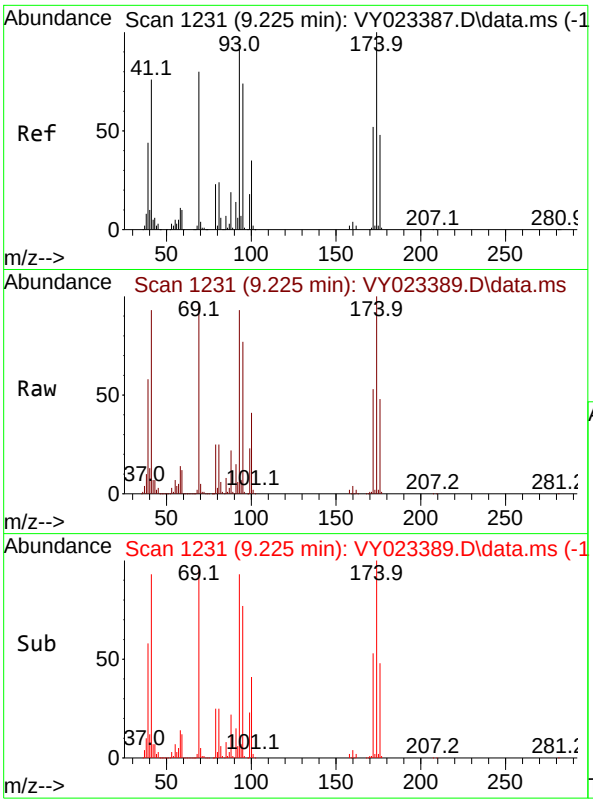


#48
Methyl methacrylate
Concen: 176.368 ug/l
RT: 9.219 min Scan# 1230
Delta R.T. 0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion: 41 Resp: 463614

Ion	Ratio	Lower	Upper
41	100		
69	100.4	81.0	121.4
39	60.3	48.2	72.4





#49
1,4-Dioxane
Concen: 3809.726 ug/l
RT: 9.225 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion: 88 Resp: 12399

Ion	Ratio	Lower	Upper
88	100		
43	27.5	21.8	32.8
58	62.1	46.8	70.2

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC150

Manual Integrations
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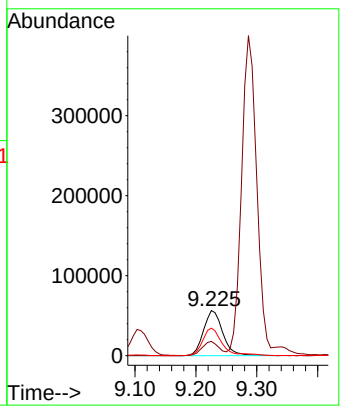
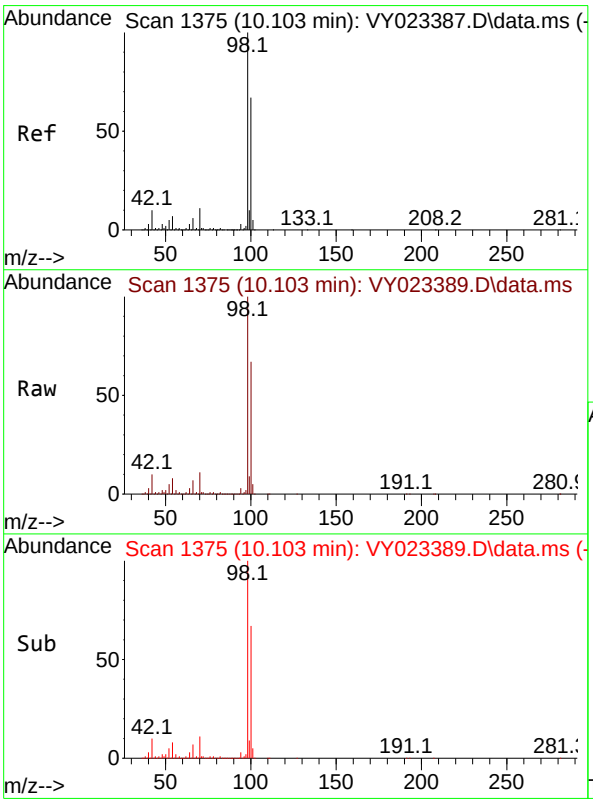
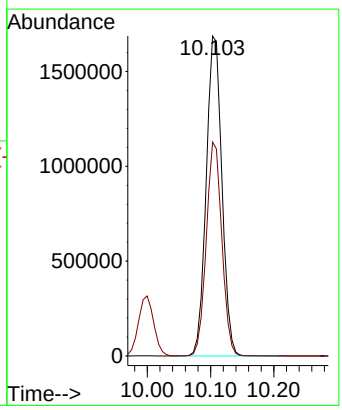


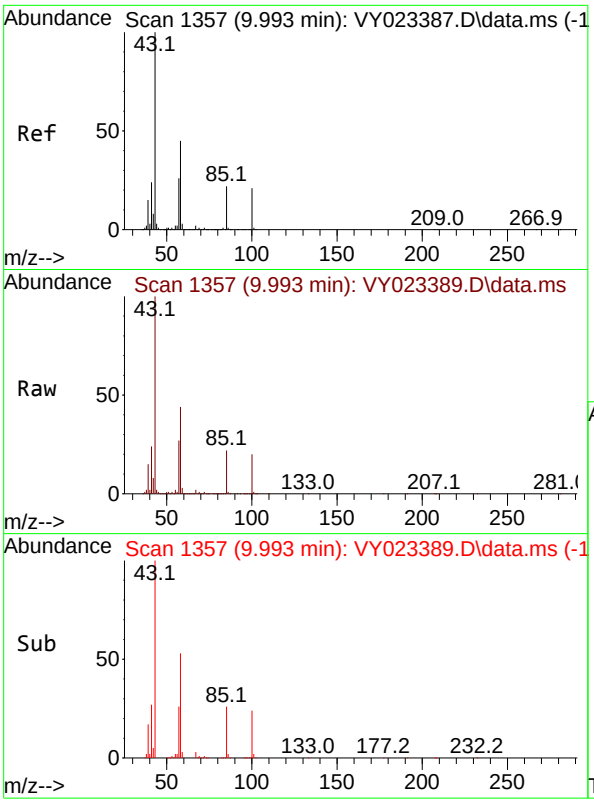


#50
Toluene-d8
Concen: 148.741 ug/l
RT: 10.103 min Scan# 1375
Delta R.T. -0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion: 98 Resp: 2912319

Ion	Ratio	Lower	Upper
98	100		
100	66.2	53.0	79.4

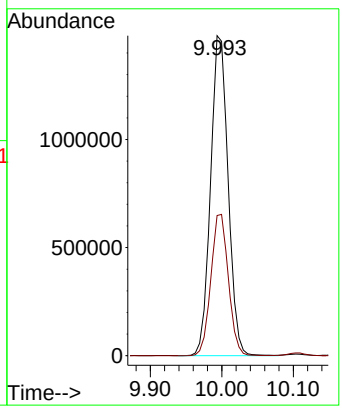




#51
4-Methyl-2-Pentanone
Concen: 872.045 ug/l
RT: 9.993 min Scan# 1
Delta R.T. 0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion: 43 Resp: 251610

Ion	Ratio	Lower	Upper
43	100		
58	44.1	35.3	52.9



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC150

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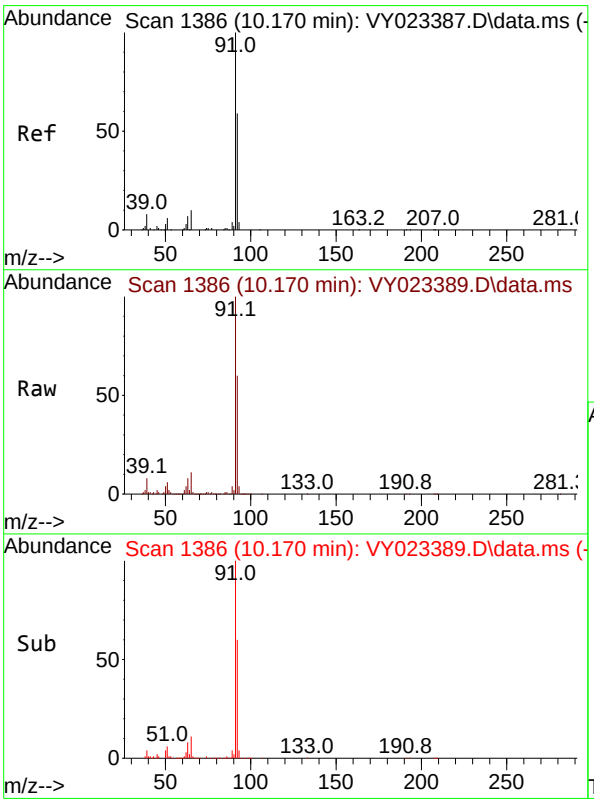
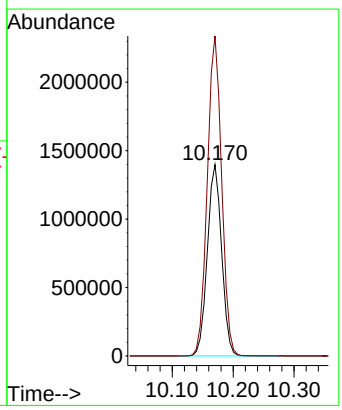
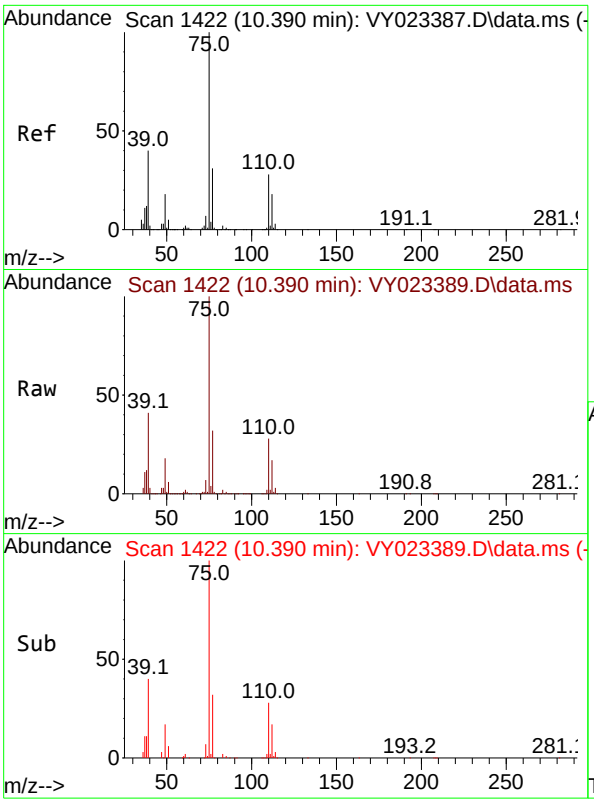


#52
Toluene
Concen: 156.786 ug/l
RT: 10.170 min Scan# 1386
Delta R.T. 0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion: 92 Resp: 2272574

Ion	Ratio	Lower	Upper
92	100		
91	168.3	136.4	204.6

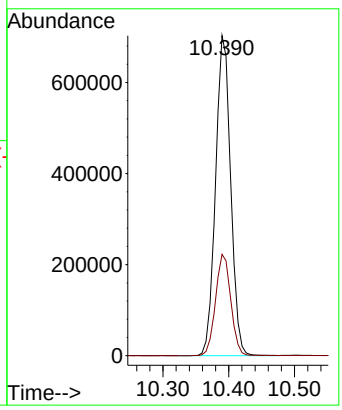




#53
t-1,3-Dichloropropene
Concen: 165.367 ug/l
RT: 10.390 min Scan# 14
Delta R.T. -0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion: 75 Resp: 112364

Ion	Ratio	Lower	Upper
75	100		
77	31.6	25.1	37.7



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC150

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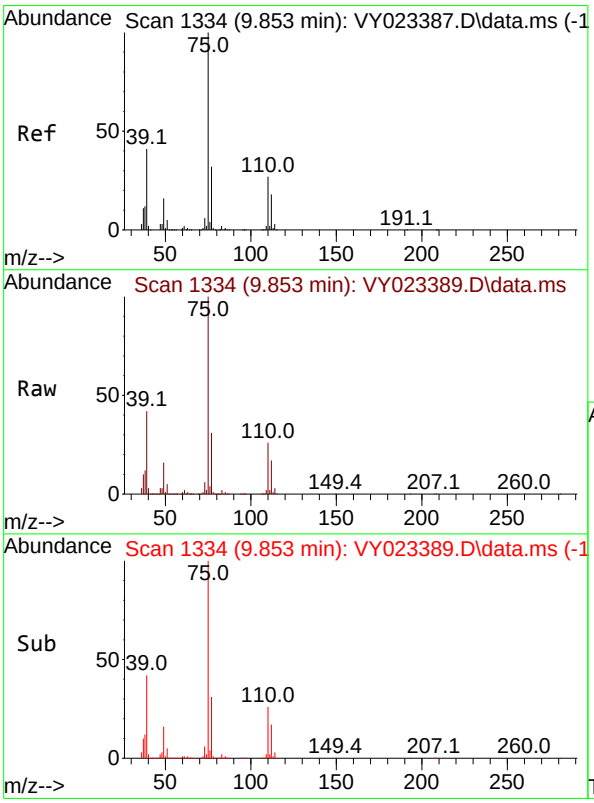
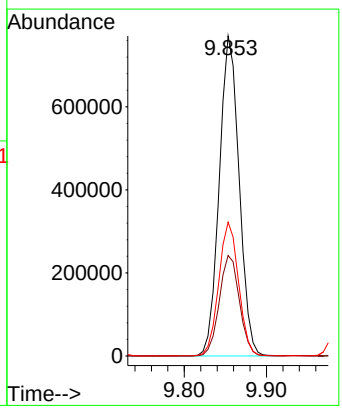
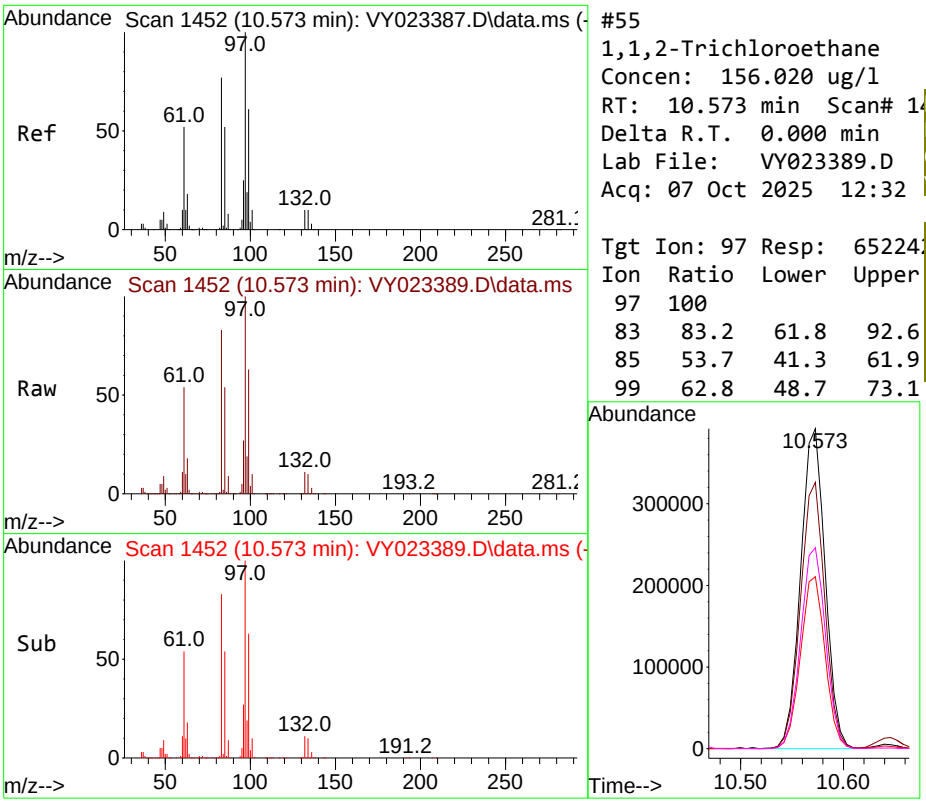


#54
cis-1,3-Dichloropropene
Concen: 159.654 ug/l
RT: 9.853 min Scan# 1334
Delta R.T. 0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion: 75 Resp: 1296713

Ion	Ratio	Lower	Upper
75	100		
77	31.4	25.4	38.0
39	41.7	32.8	49.2





#55
1,1,2-Trichloroethane
Concen: 156.020 ug/l
RT: 10.573 min Scan# 14
Delta R.T. 0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion: 97 Resp: 65224

Ion	Ratio	Lower	Upper
97	100		
83	83.2	61.8	92.6
85	53.7	41.3	61.9
99	62.8	48.7	73.1

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC150

Manual Integrations
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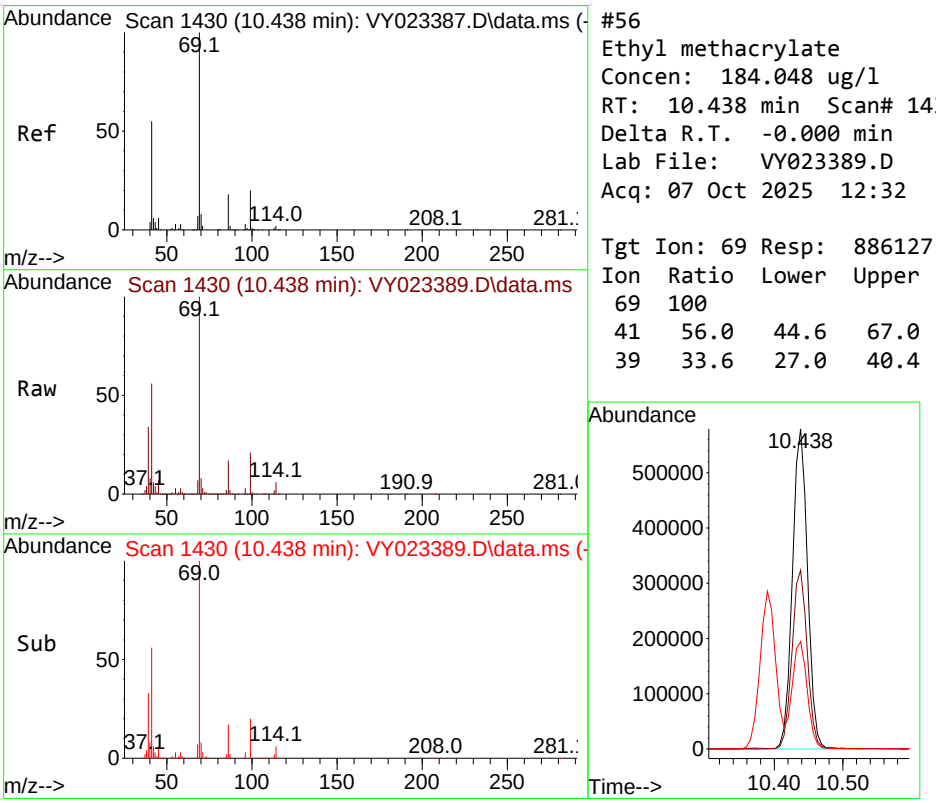
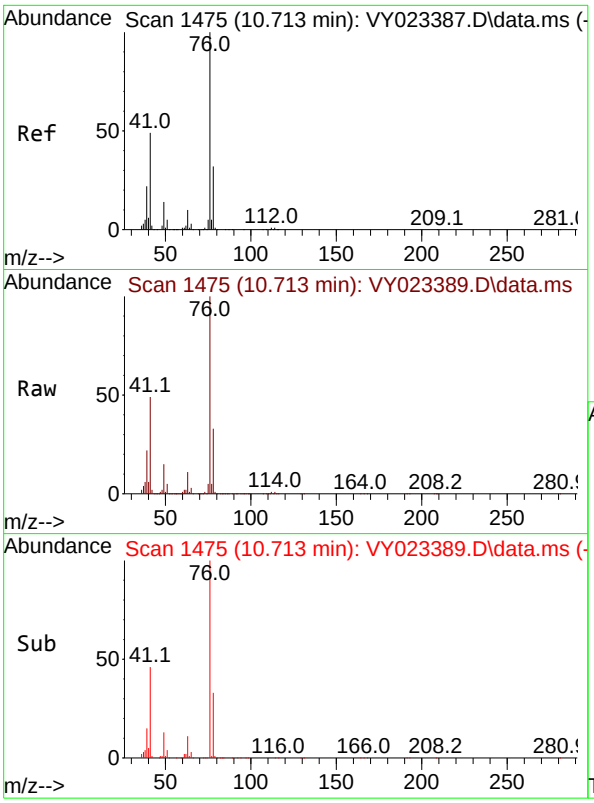
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025



#56
Ethyl methacrylate
Concen: 184.048 ug/l
RT: 10.438 min Scan# 1430
Delta R.T. -0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion: 69 Resp: 886127

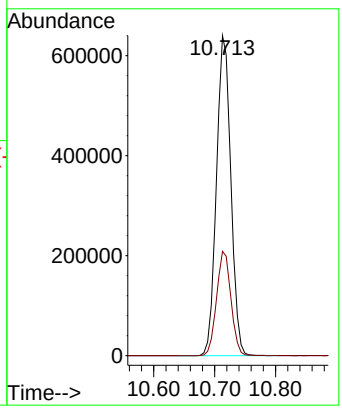
Ion	Ratio	Lower	Upper
69	100		
41	56.0	44.6	67.0
39	33.6	27.0	40.4



#57
1,3-Dichloropropane
Concen: 155.122 ug/l
RT: 10.713 min Scan# 14
Delta R.T. 0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion: 76 Resp: 104959

Ion	Ratio	Lower	Upper
76	100		
78	32.6	25.9	38.9



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC150

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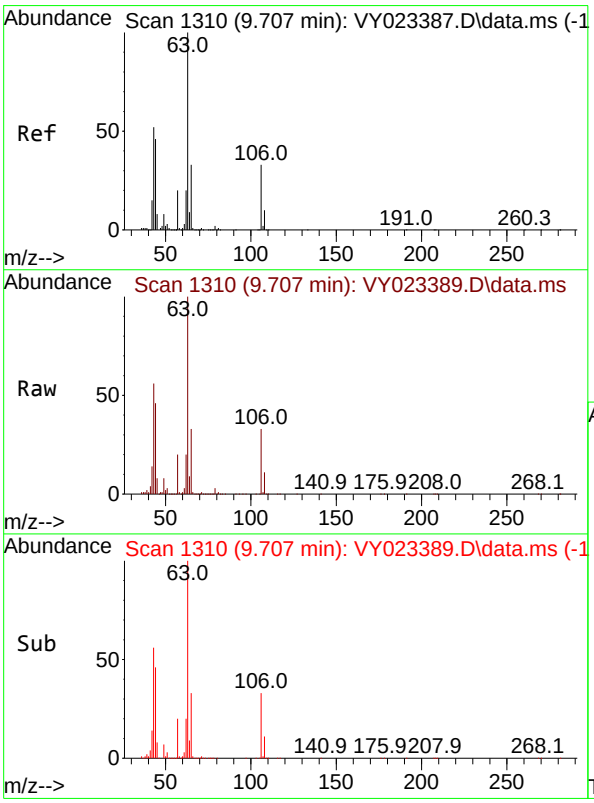
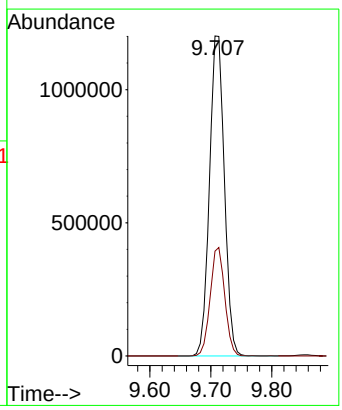
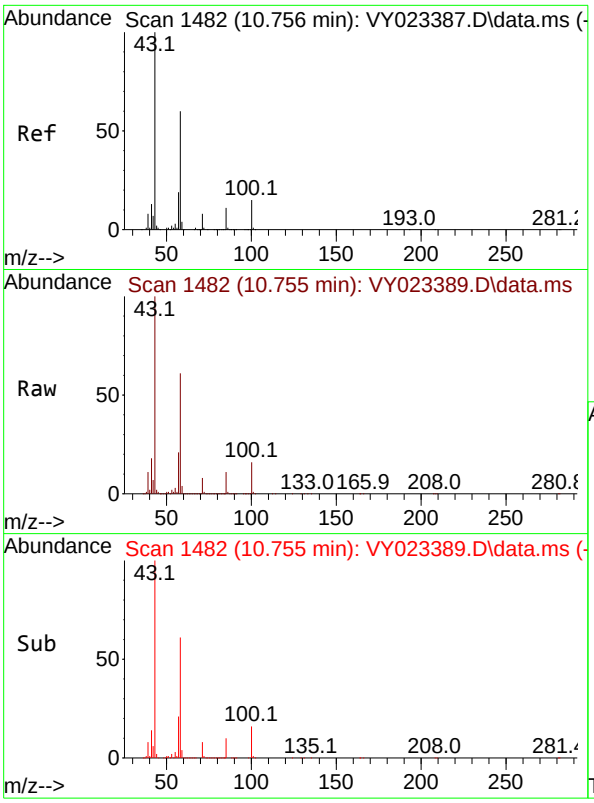


#58
2-Chloroethyl Vinyl ether
Concen: 968.559 ug/l
RT: 9.707 min Scan# 1310
Delta R.T. 0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion: 63 Resp: 2040136

Ion	Ratio	Lower	Upper
63	100		
106	33.2	26.6	39.8

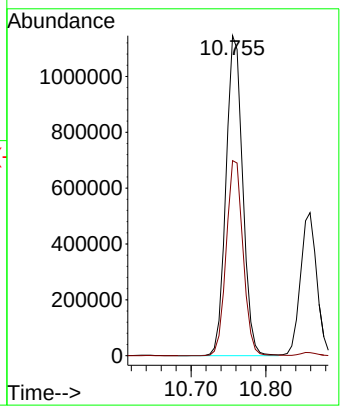




#59
2-Hexanone
Concen: 889.038 ug/l
RT: 10.755 min Scan# 14
Delta R.T. -0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion: 43 Resp: 177603

Ion	Ratio	Lower	Upper
43	100		
58	61.4	30.5	91.5



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC150

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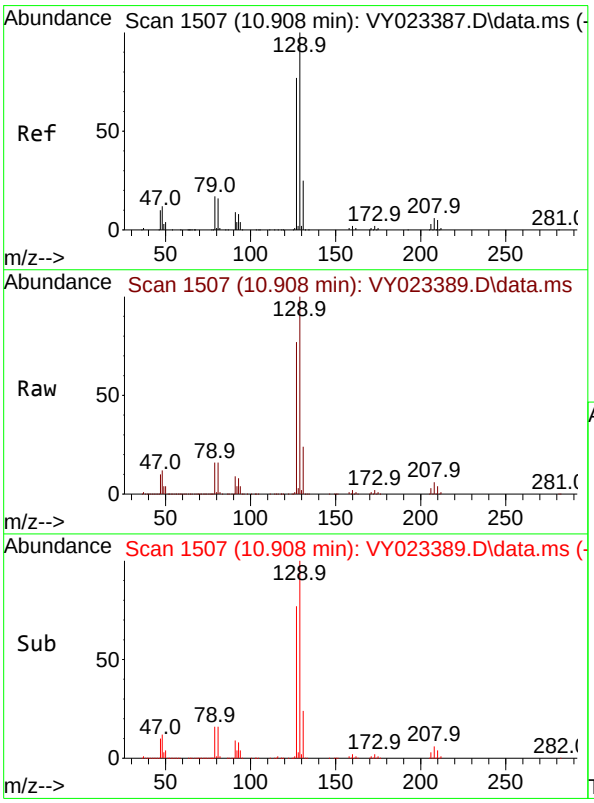
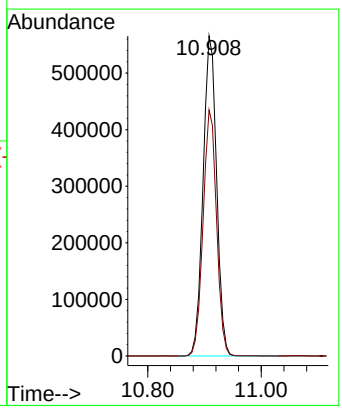
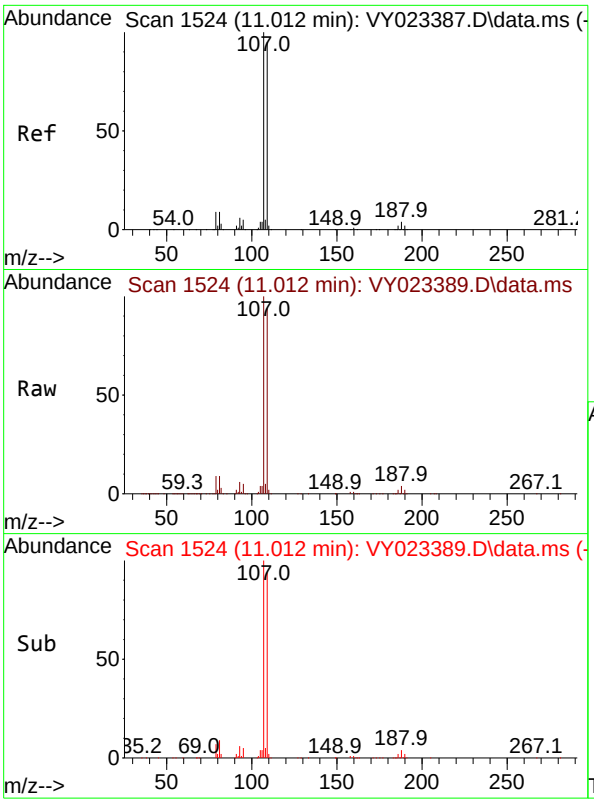


#60
Dibromochloromethane
Concen: 164.084 ug/l
RT: 10.908 min Scan# 1507
Delta R.T. -0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion:129 Resp: 935577

Ion	Ratio	Lower	Upper
129	100		
127	76.4	38.6	115.7

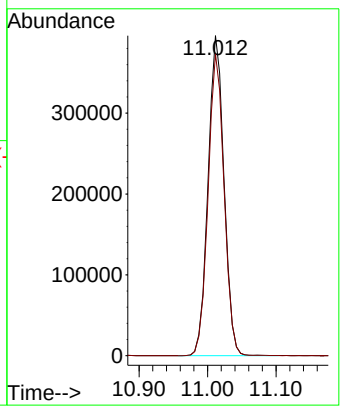




#61
1,2-Dibromoethane
Concen: 162.699 ug/l
RT: 11.012 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion:107 Resp: 63989

Ion	Ratio	Lower	Upper
107	100		
109	94.4	76.1	114.1



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC150

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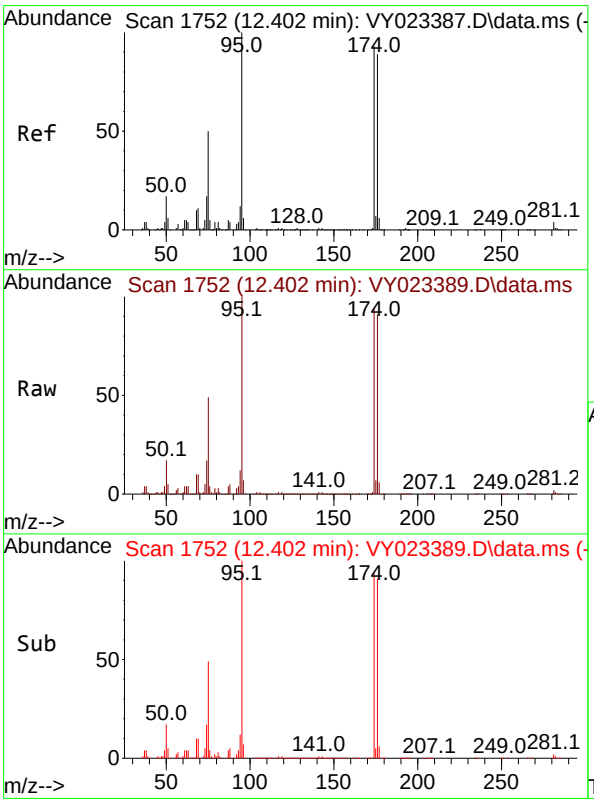
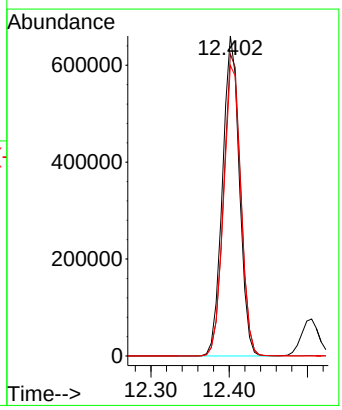
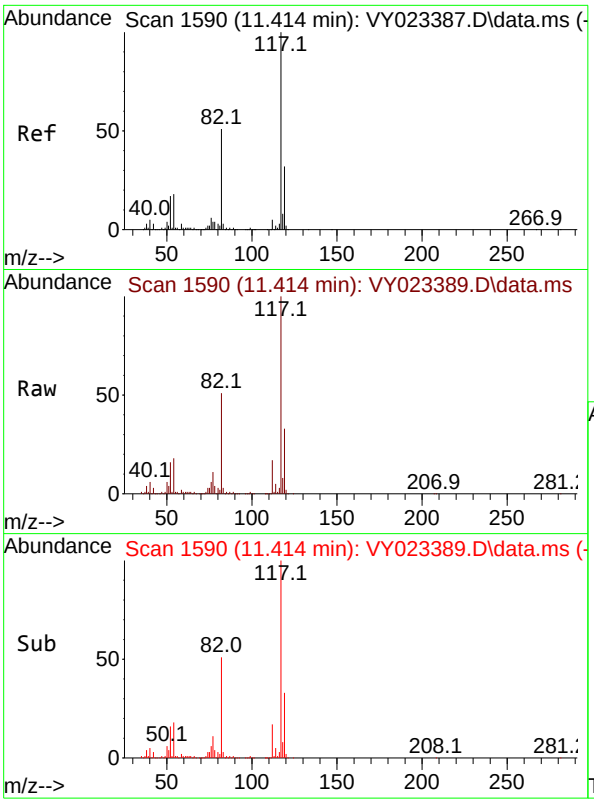


#62
4-Bromofluorobenzene
Concen: 160.423 ug/l
RT: 12.402 min Scan# 1752
Delta R.T. -0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion: 95 Resp: 990964

Ion	Ratio	Lower	Upper
95	100		
174	95.8	0.0	192.8
176	92.8	0.0	187.6

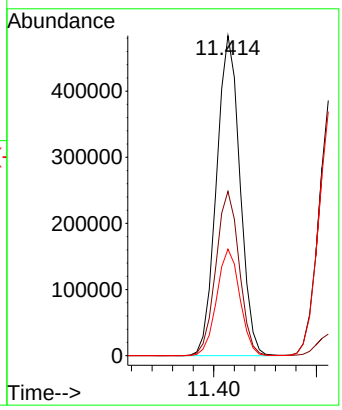




#63
Chlorobenzene-d5
Concen: 50.000 ug/l
RT: 11.414 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion:117 Resp: 76535

Ion	Ratio	Lower	Upper
117	100		
82	51.3	41.0	61.4
119	33.3	25.6	38.4



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC150

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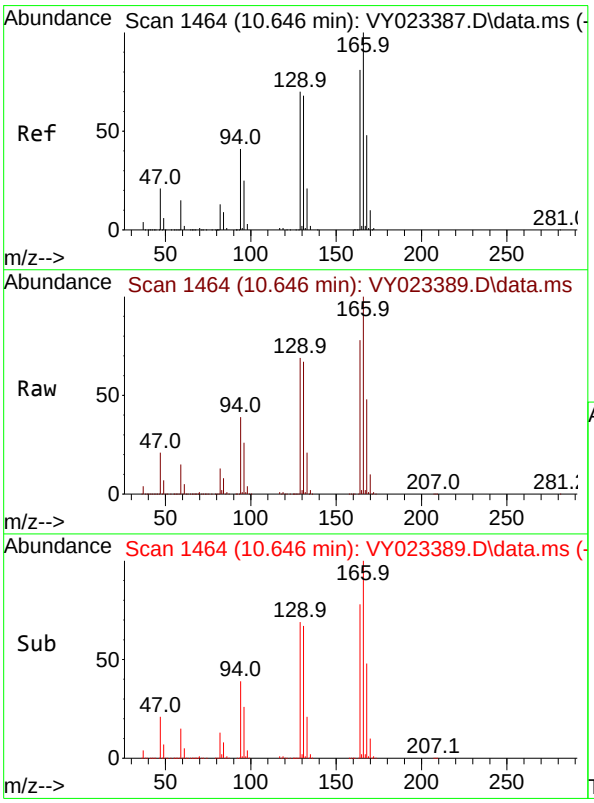
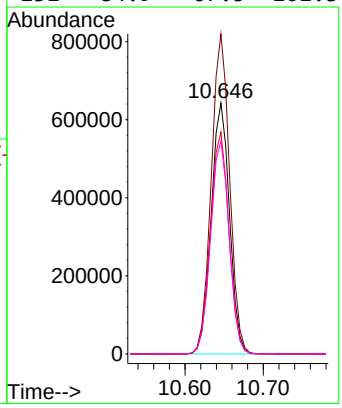
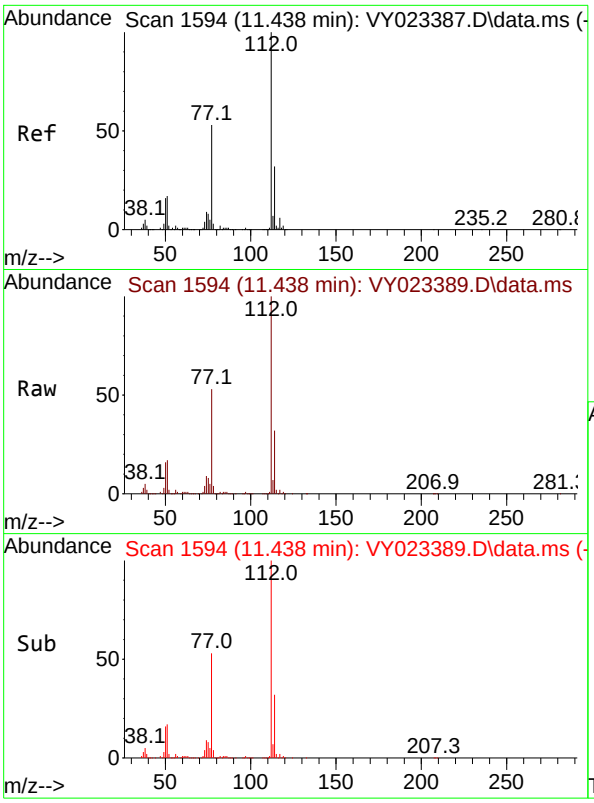


#64
Tetrachloroethene
Concen: 136.739 ug/l
RT: 10.646 min Scan# 1464
Delta R.T. -0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion:164 Resp: 1046931

Ion	Ratio	Lower	Upper
164	100		
166	127.5	99.4	149.0
129	88.4	69.4	104.2
131	84.9	67.5	101.3

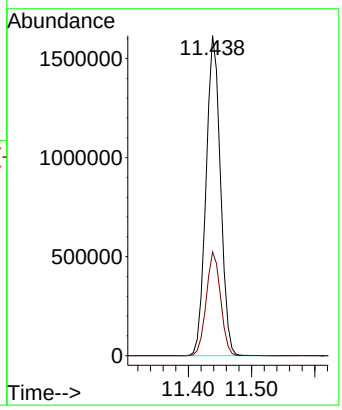




#65
Chlorobenzene
Concen: 154.117 ug/l
RT: 11.438 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion:112 Resp: 256317

Ion	Ratio	Lower	Upper
112	100		
114	32.4	25.6	38.4



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC150

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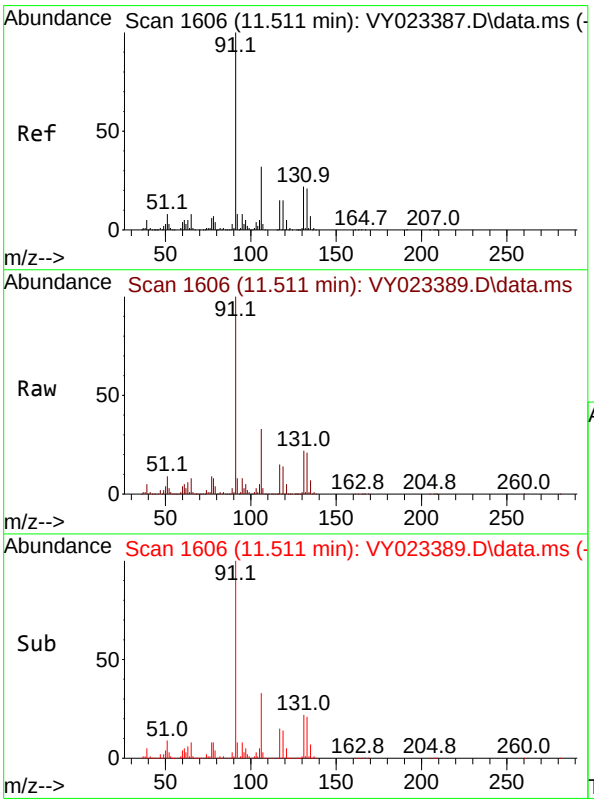
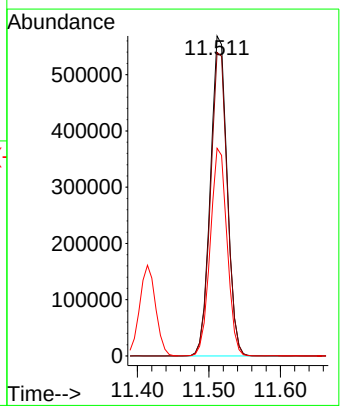
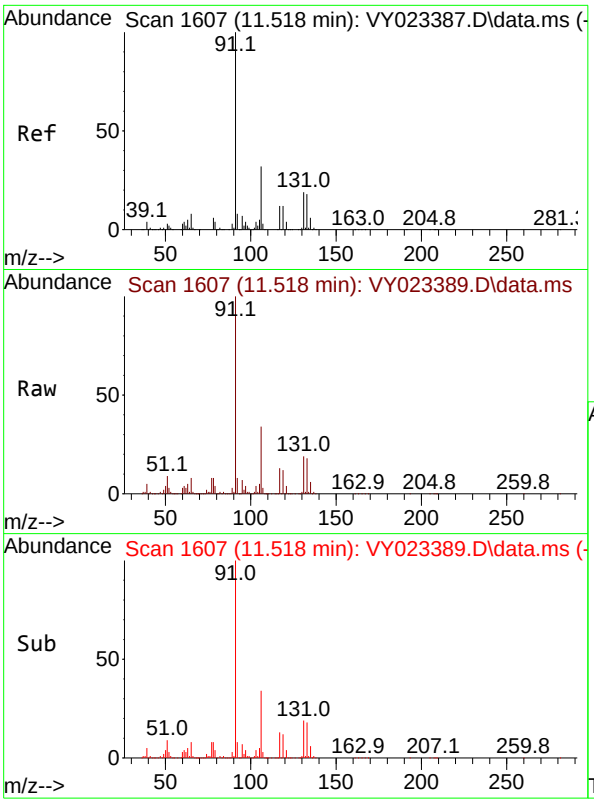


#66
1,1,1,2-Tetrachloroethane
Concen: 157.870 ug/l
RT: 11.511 min Scan# 1606
Delta R.T. -0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion:131 Resp: 923367

Ion	Ratio	Lower	Upper
131	100		
133	95.4	48.4	145.2
119	65.2	32.4	97.2





#67
Ethyl Benzene
Concen: 159.957 ug/l
RT: 11.518 min Scan# 1
Delta R.T. 0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion: 91 Resp: 434180

Ion	Ratio	Lower	Upper
91	100		
106	33.8	25.8	38.8

Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC150

Manual Integrations
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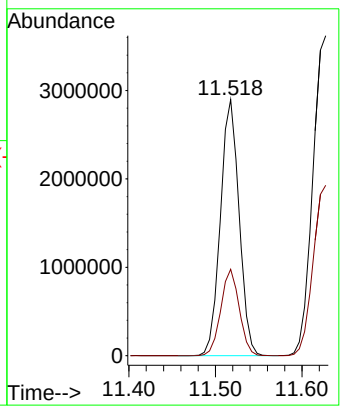
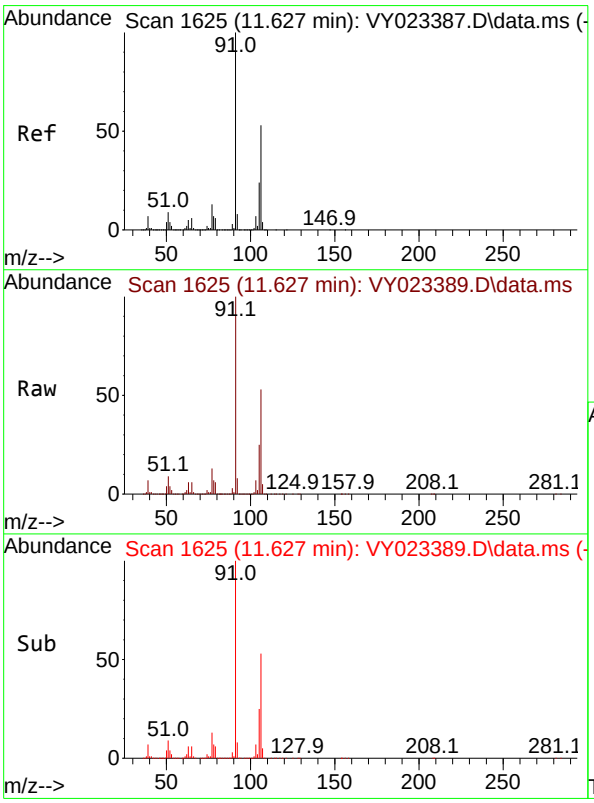
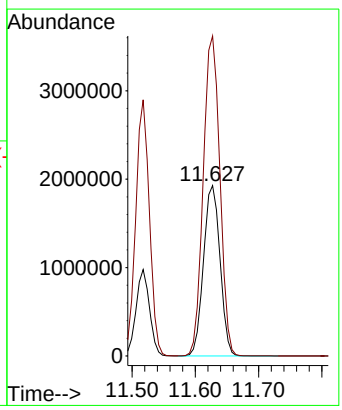


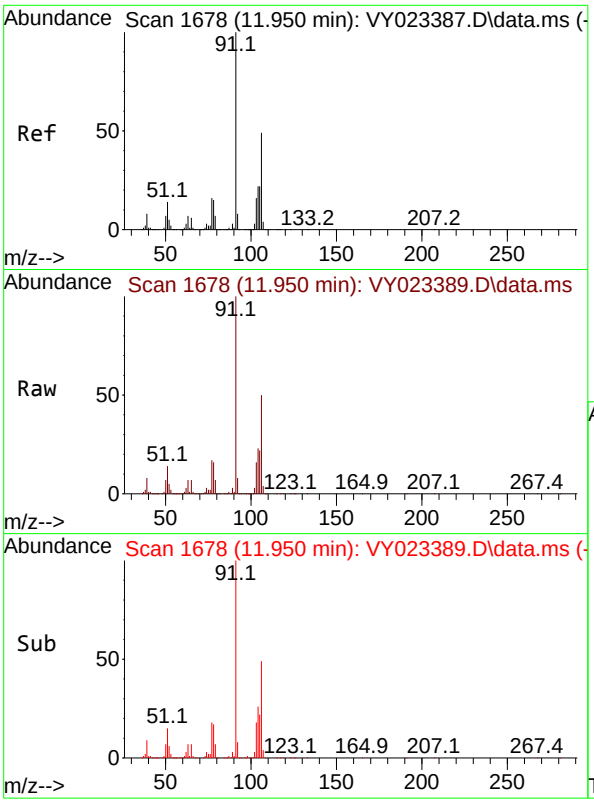


#68
m/p-Xylenes
Concen: 321.899 ug/l
RT: 11.627 min Scan# 1625
Delta R.T. -0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion:106 Resp: 3502137

Ion	Ratio	Lower	Upper
106	100		
91	189.2	152.6	229.0

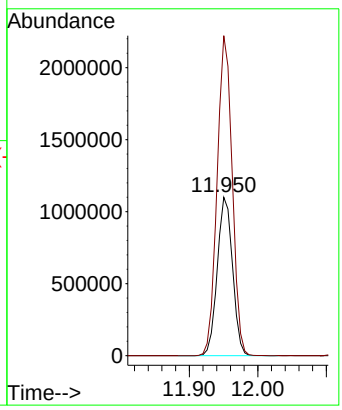




#69
o-Xylene
Concen: 168.295 ug/l
RT: 11.950 min Scan# 1
Delta R.T. 0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion:106 Resp: 169498

Ion	Ratio	Lower	Upper
106	100		
91	200.0	101.4	304.1



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC150

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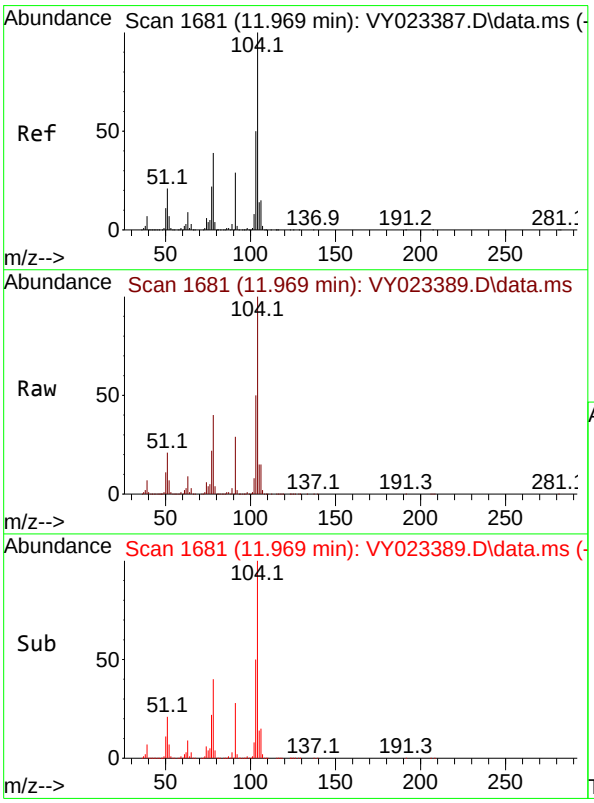
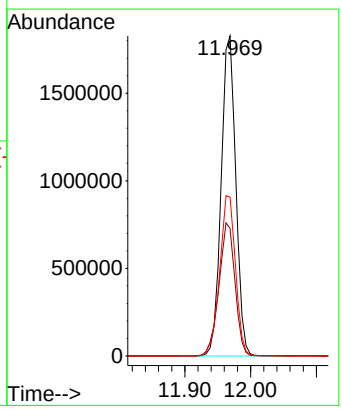
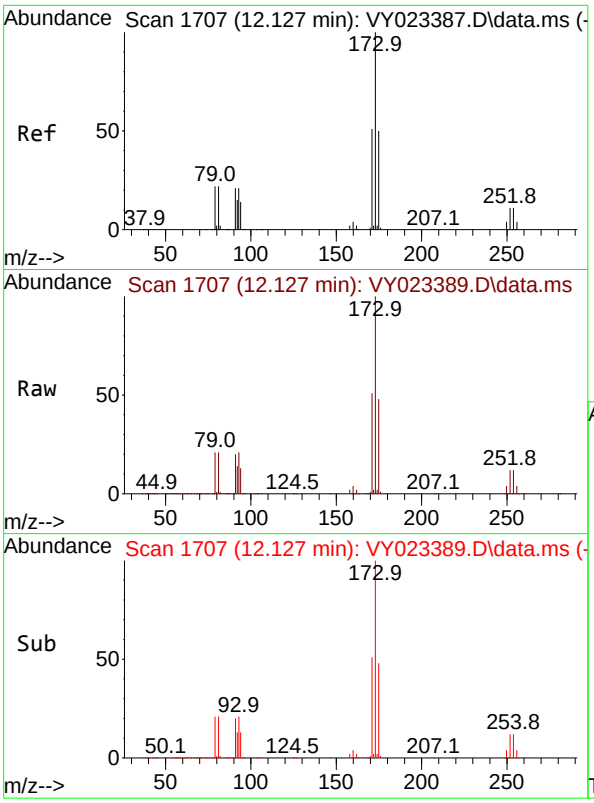


#70
Styrene
Concen: 170.203 ug/l
RT: 11.969 min Scan# 1681
Delta R.T. -0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion:104 Resp: 2830398

Ion	Ratio	Lower	Upper
104	100		
78	45.5	36.1	54.1
103	54.3	43.2	64.8

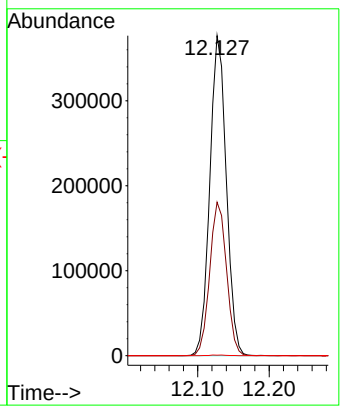




#71
Bromoform
Concen: 172.115 ug/l
RT: 12.127 min Scan# 1
Delta R.T. 0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion:173 Resp: 60264

Ion	Ratio	Lower	Upper
173	100		
175	48.9	24.8	74.3
254	0.2	0.1	0.1



Instrument :
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ClientSampleId :
VSTDICC150

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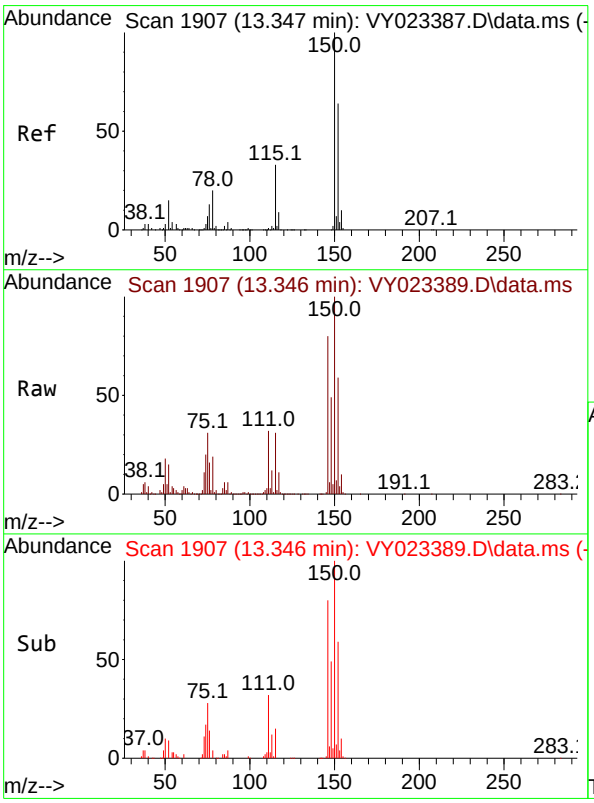
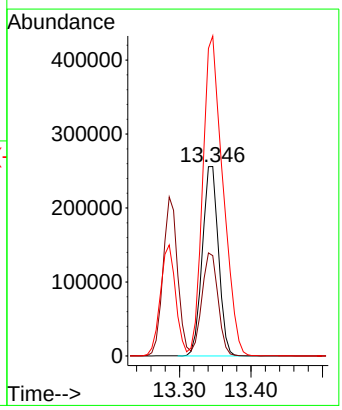
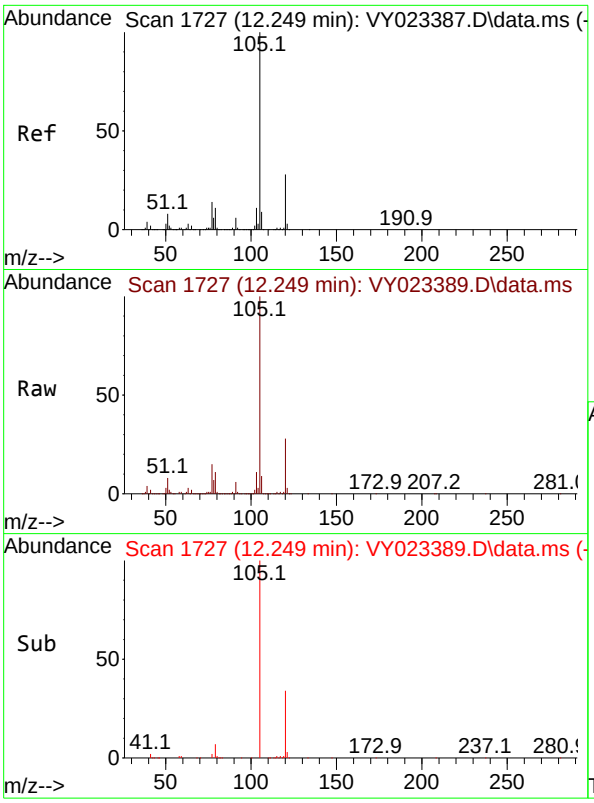


#72
1,4-Dichlorobenzene-d4
Concen: 50.000 ug/l
RT: 13.346 min Scan# 1907
Delta R.T. -0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion:152 Resp: 402368

Ion	Ratio	Lower	Upper
152	100		
115	54.1	27.1	81.2
150	210.4	0.0	347.4

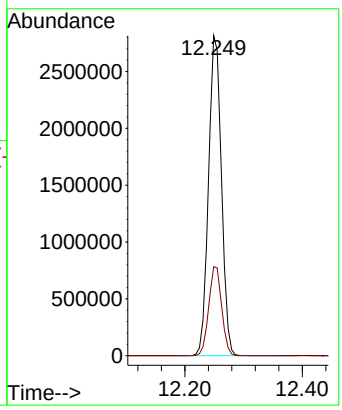




#73
Isopropylbenzene
Concen: 160.084 ug/l
RT: 12.249 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion:105 Resp: 429066

Ion	Ratio	Lower	Upper
105	100		
120	27.9	13.9	41.7



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC150

Manual Integrations
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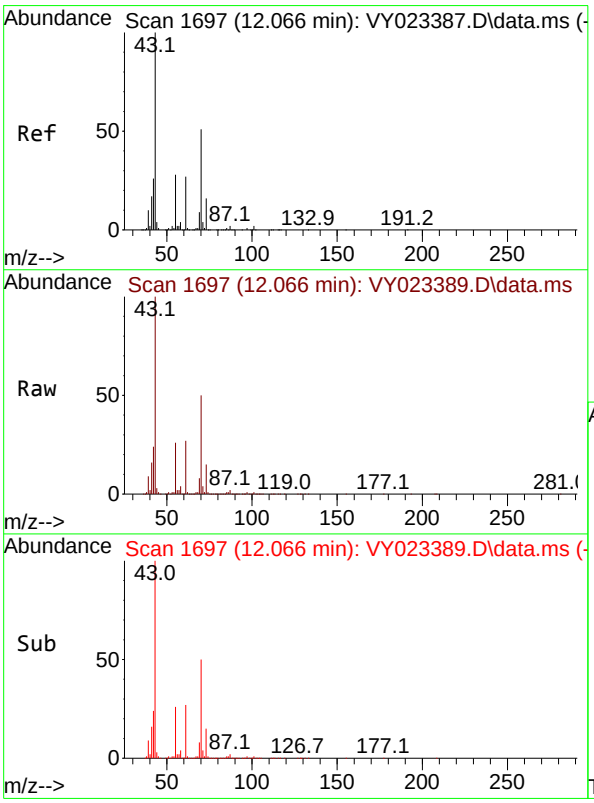
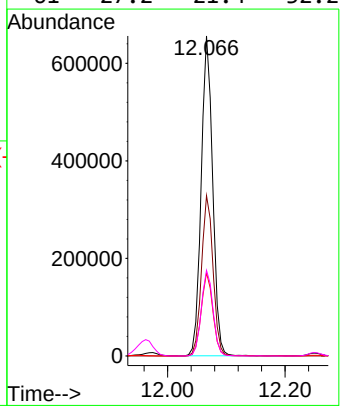
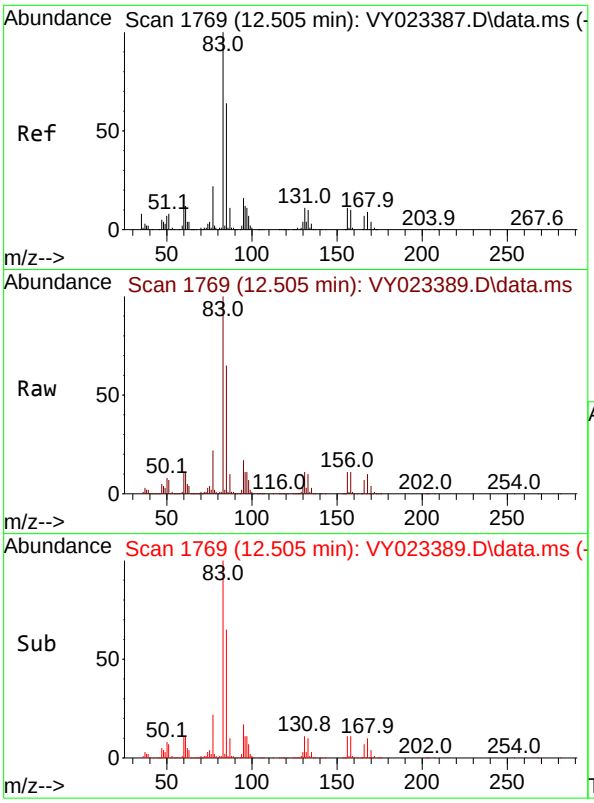


#74
N-amyl acetate
Concen: 177.866 ug/l
RT: 12.066 min Scan# 1697
Delta R.T. 0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion: 43 Resp: 890882

Ion	Ratio	Lower	Upper
43	100		
70	50.6	41.1	61.7
55	26.4	23.0	34.6
61	27.2	21.4	32.2

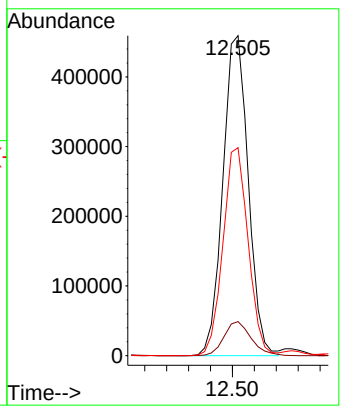




#75
1,1,2,2-Tetrachloroethane
Concen: 165.010 ug/l
RT: 12.505 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion: 83 Resp: 73777

Ion	Ratio	Lower	Upper
83	100		
131	11.4	5.9	17.6
85	64.4	31.8	95.3



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC150

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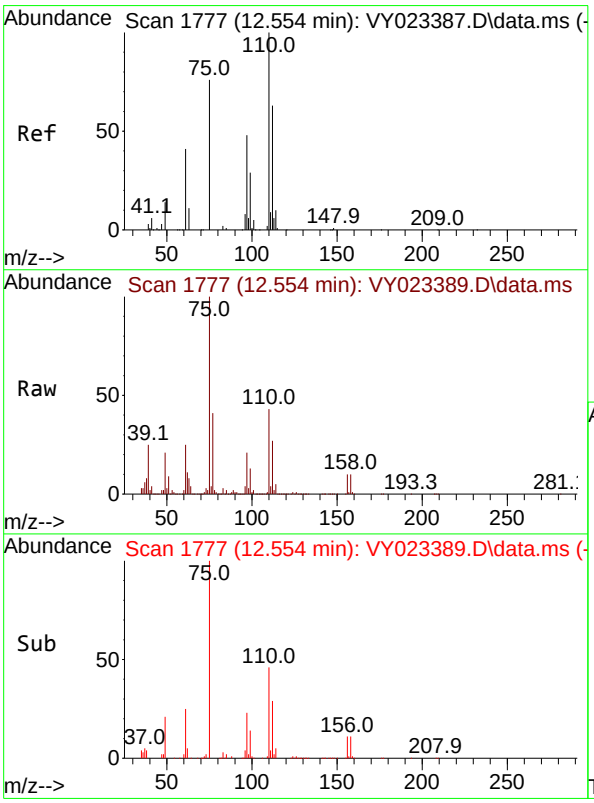
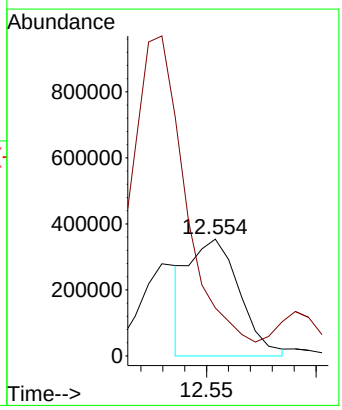
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

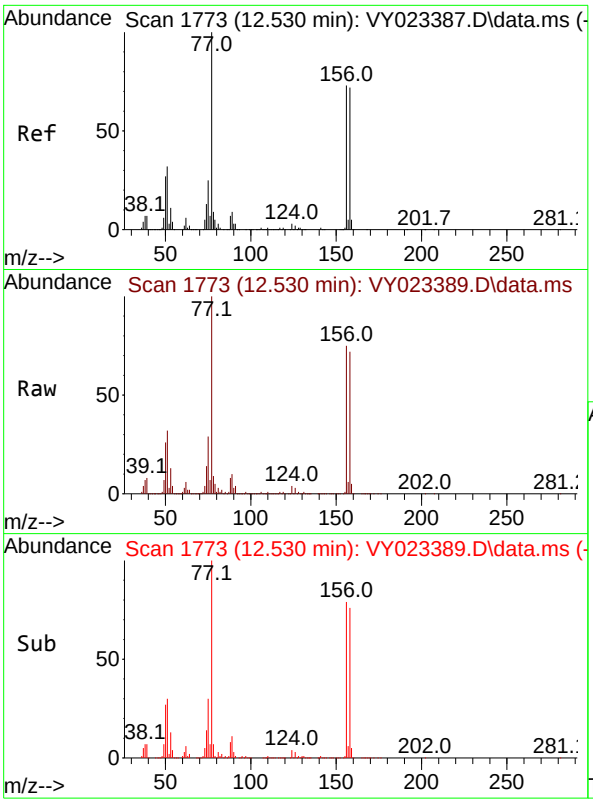


#76
1,2,3-Trichloropropane
Concen: 142.542 ug/l m
RT: 12.554 min Scan# 1777
Delta R.T. 0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion: 75 Resp: 565754

Ion	Ratio	Lower	Upper
75	100		
77	0.0	0.0	0.0

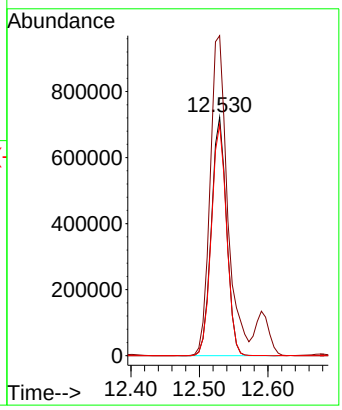




#77
Bromobenzene
Concen: 161.555 ug/l
RT: 12.530 min Scan# 1
Delta R.T. 0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion:156 Resp: 111131

Ion	Ratio	Lower	Upper
156	100		
77	153.9	76.8	230.5
158	97.4	49.0	147.2



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC150

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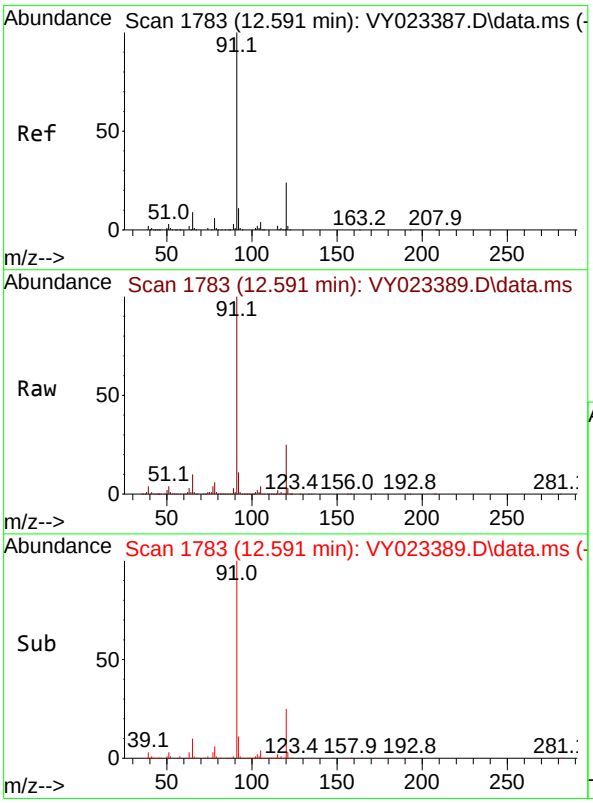
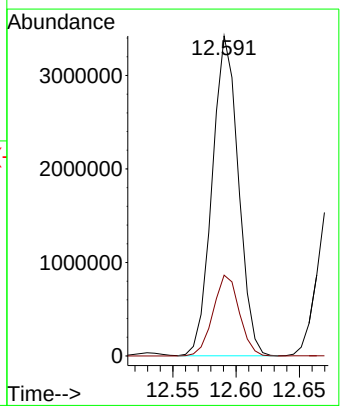
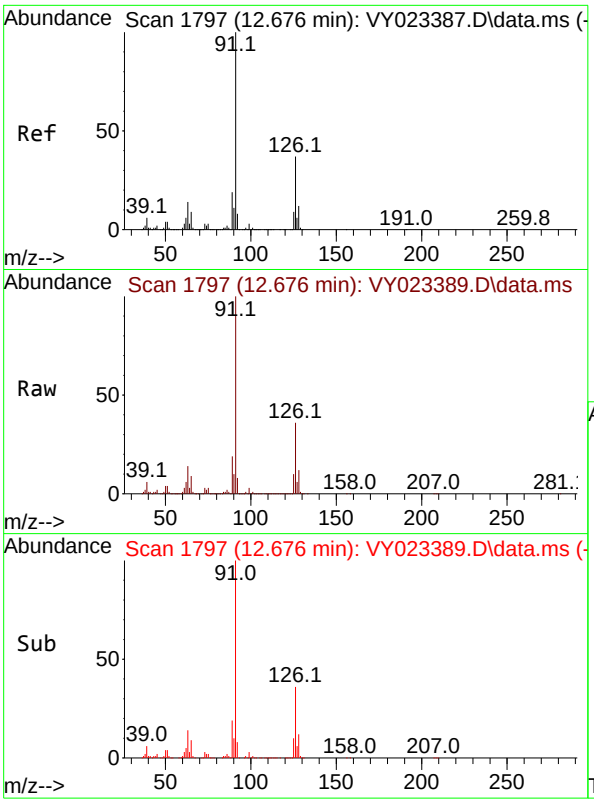


#78
n-propylbenzene
Concen: 156.465 ug/l
RT: 12.591 min Scan# 1783
Delta R.T. -0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion: 91 Resp: 4932015

Ion	Ratio	Lower	Upper
91	100		
120	25.1	12.3	36.8

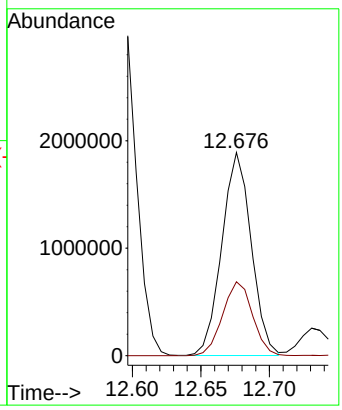




#79
2-Chlorotoluene
Concen: 155.063 ug/l
RT: 12.676 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion: 91 Resp: 282204

Ion	Ratio	Lower	Upper
91	100		
126	37.1	18.5	55.5



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC150

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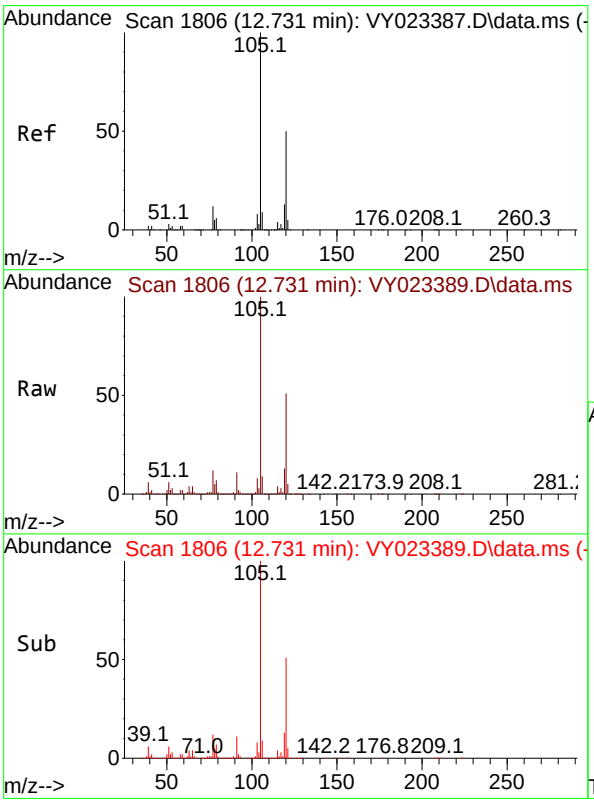
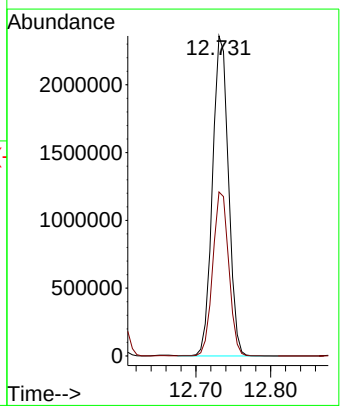
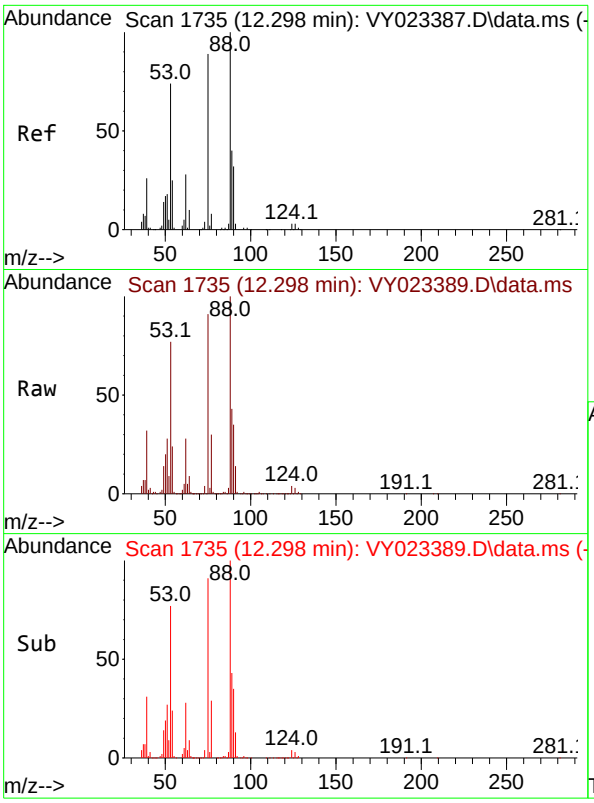


#80
1,3,5-Trimethylbenzene
Concen: 160.460 ug/l
RT: 12.731 min Scan# 1806
Delta R.T. 0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion:105 Resp: 3496249

Ion	Ratio	Lower	Upper
105	100		
120	51.4	25.4	76.4

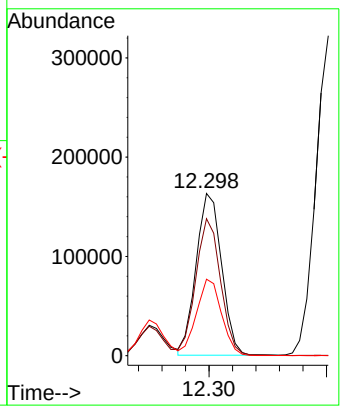




#81
trans-1,4-Dichloro-2-butene
Concen: 166.570 ug/l
RT: 12.298 min Scan# 1
Delta R.T. 0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion: 75 Resp: 24519

Ion	Ratio	Lower	Upper
75	100		
53	83.6	68.6	102.8
89	46.8	39.0	58.4



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC150

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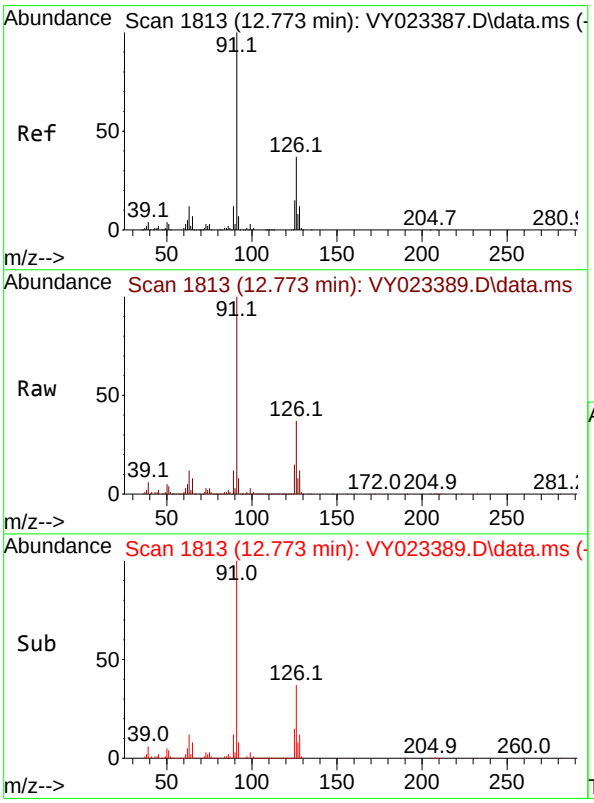
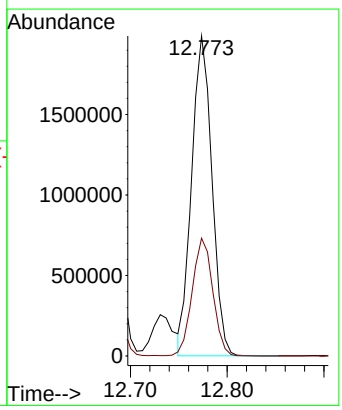
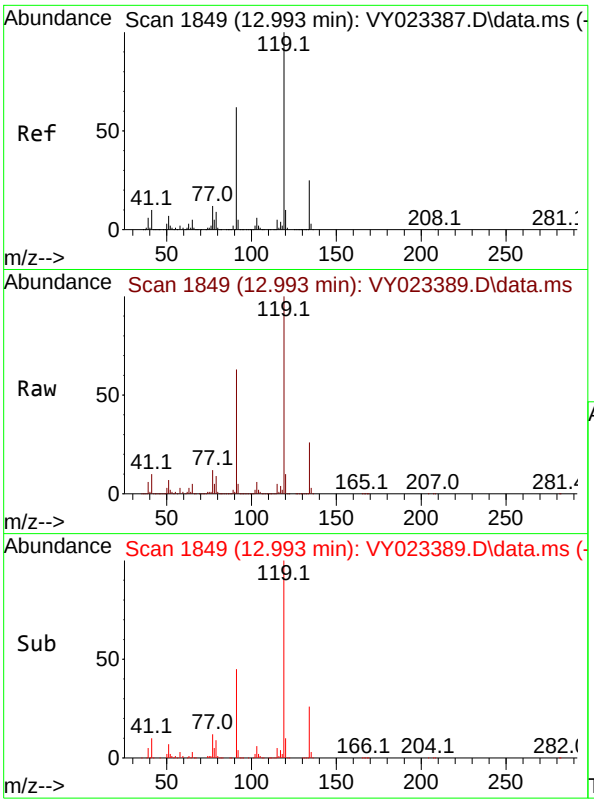


#82
4-Chlorotoluene
Concen: 152.701 ug/l
RT: 12.773 min Scan# 1813
Delta R.T. -0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion: 91 Resp: 2902371

Ion	Ratio	Lower	Upper
91	100		
126	37.3	18.4	55.4

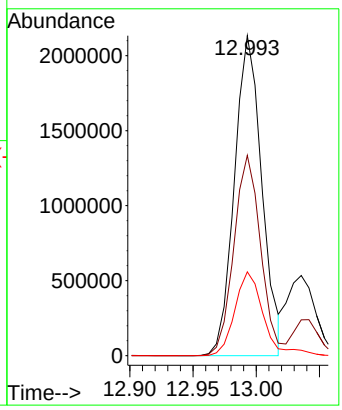




#83
tert-Butylbenzene
Concen: 162.197 ug/l
RT: 12.993 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion:119 Resp: 322038

Ion	Ratio	Lower	Upper
119	100		
91	61.6	29.9	89.8
134	27.4	12.9	38.7



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC150

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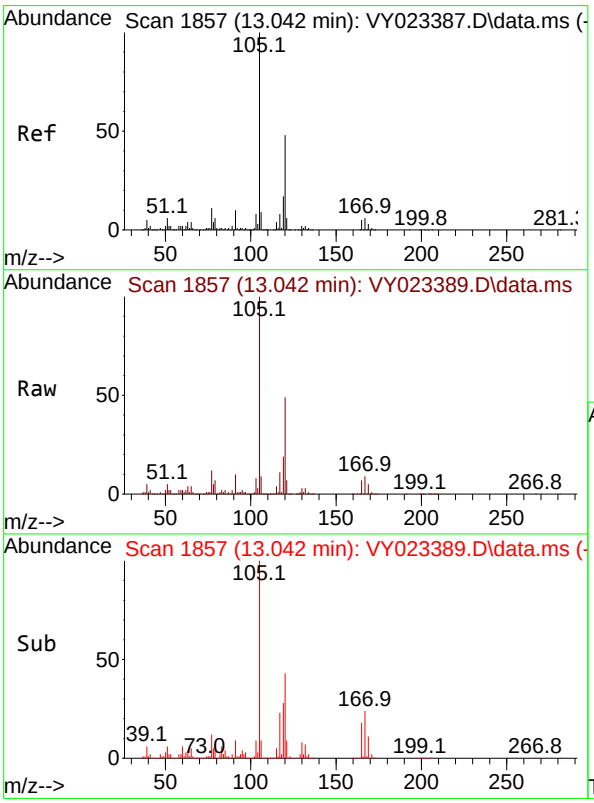
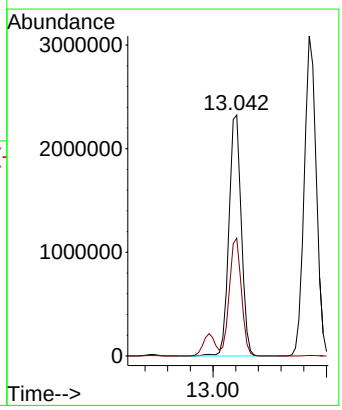
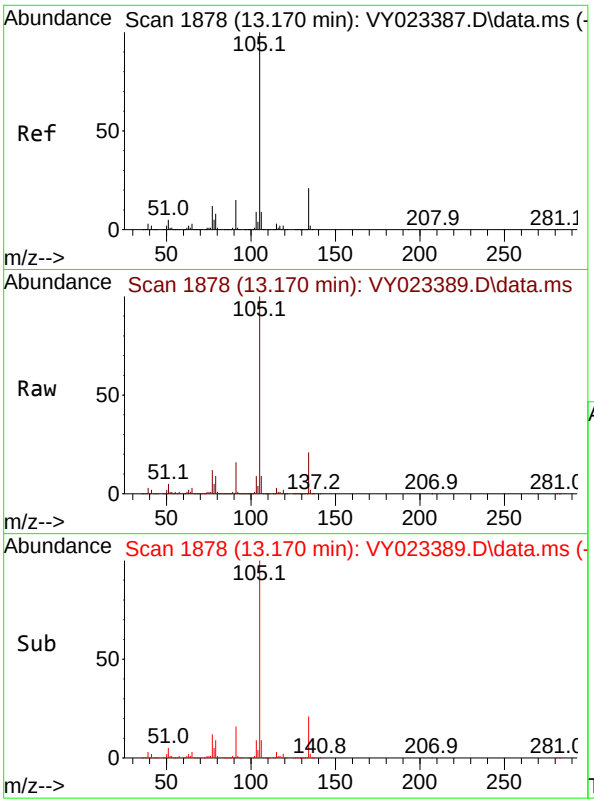


#84
1,2,4-Trimethylbenzene
Concen: 162.527 ug/l
RT: 13.042 min Scan# 1857
Delta R.T. 0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion:105 Resp: 3503639

Ion	Ratio	Lower	Upper
105	100		
120	47.9	23.8	71.2

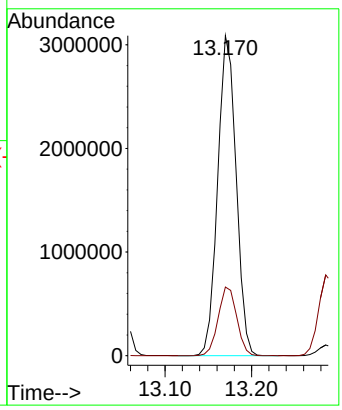




#85
sec-Butylbenzene
Concen: 158.609 ug/l
RT: 13.170 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion:105 Resp: 456071

Ion	Ratio	Lower	Upper
105	100		
134	21.6	10.7	32.1



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC150

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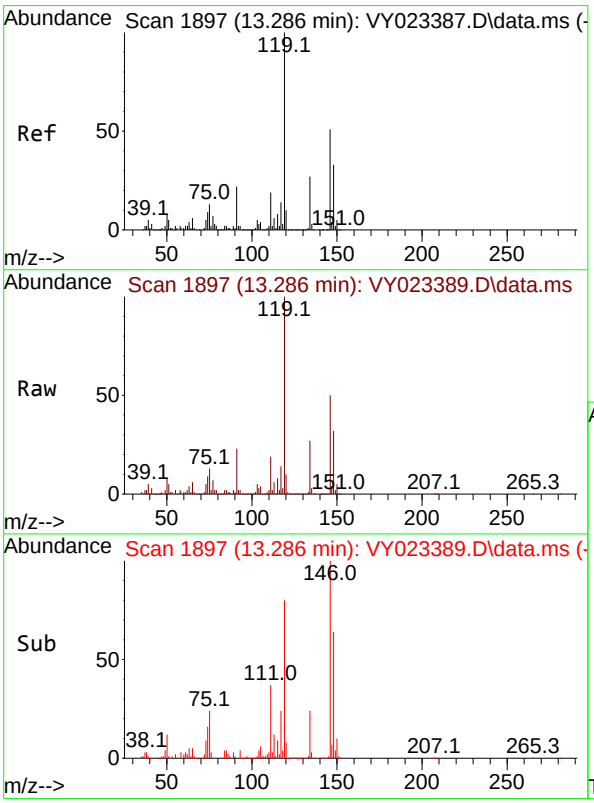
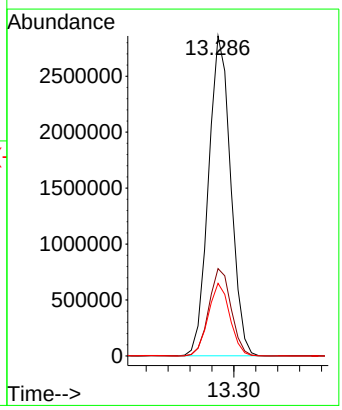
Supervised By :Mahesh Dadoda 10/10/2025

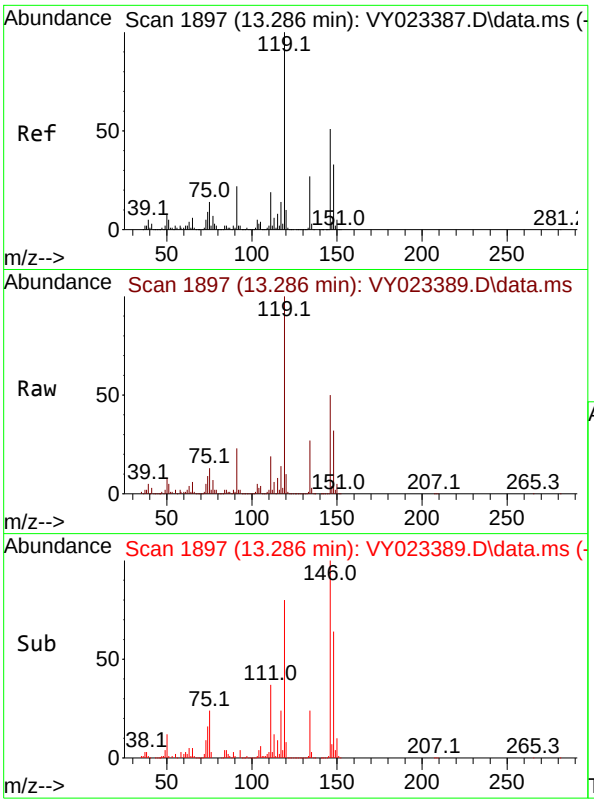


#86
p-Isopropyltoluene
Concen: 165.622 ug/l
RT: 13.286 min Scan# 1897
Delta R.T. -0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion:119 Resp: 4024712

Ion	Ratio	Lower	Upper
119	100		
134	27.4	13.6	40.7
91	22.1	10.9	32.9

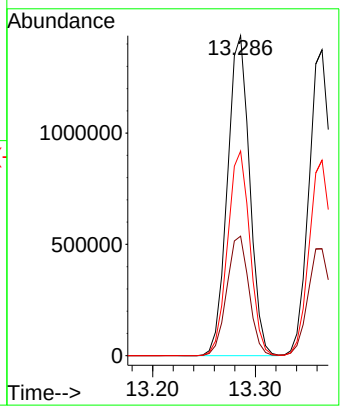




#87
1,3-Dichlorobenzene
Concen: 159.350 ug/l
RT: 13.286 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion:146 Resp: 216527

Ion	Ratio	Lower	Upper
146	100		
111	37.4	18.7	56.1
148	64.0	31.9	95.9



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC150

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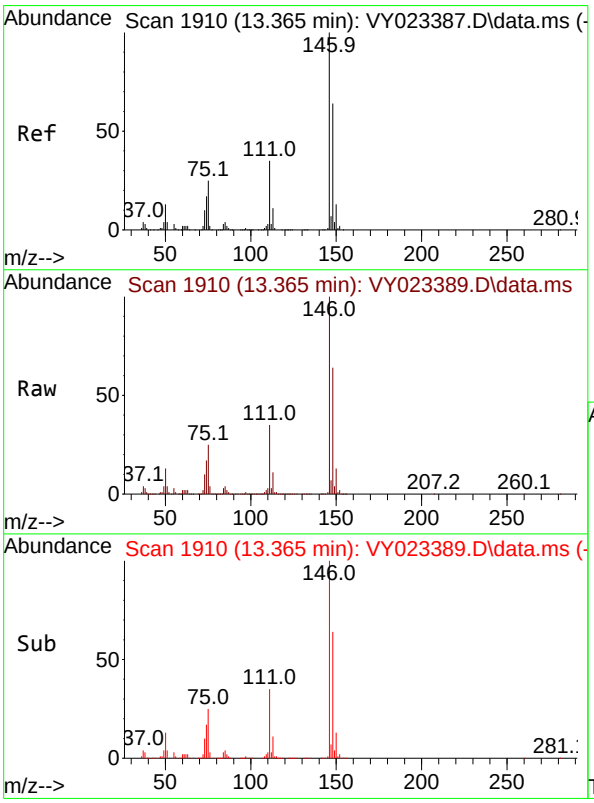
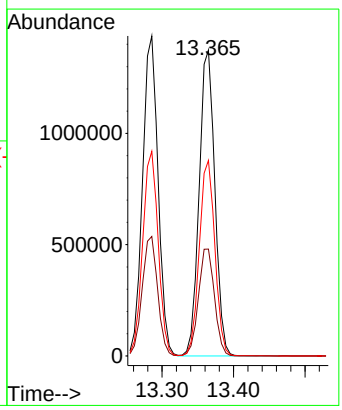
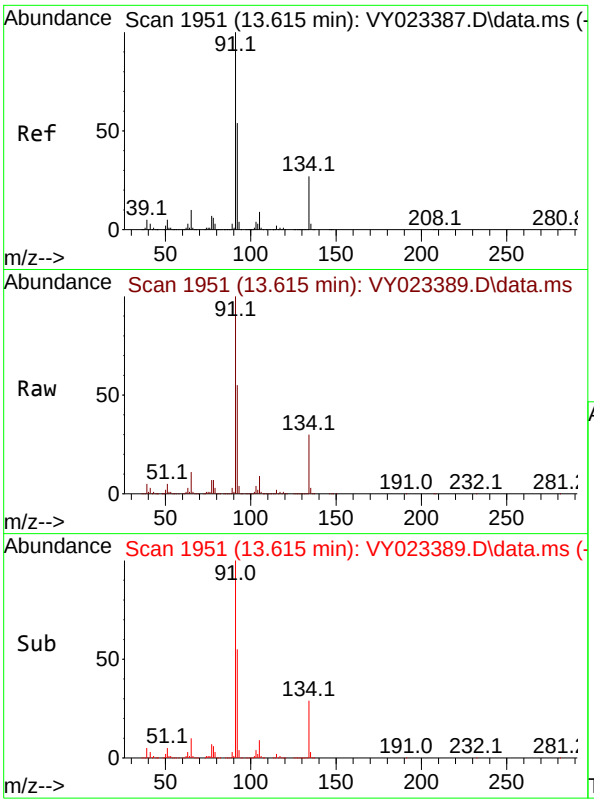


#88
1,4-Dichlorobenzene
Concen: 155.104 ug/l
RT: 13.365 min Scan# 1910
Delta R.T. -0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion:146 Resp: 2090133

Ion	Ratio	Lower	Upper
146	100		
111	35.8	18.0	54.0
148	63.6	31.9	95.7

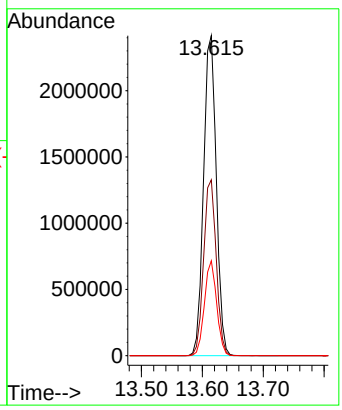




#89
n-Butylbenzene
Concen: 163.379 ug/l
RT: 13.615 min Scan# 1
Delta R.T. 0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion: 91 Resp: 350571

Ion	Ratio	Lower	Upper
91	100		
92	54.6	27.0	80.8
134	28.6	14.1	42.2



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC150

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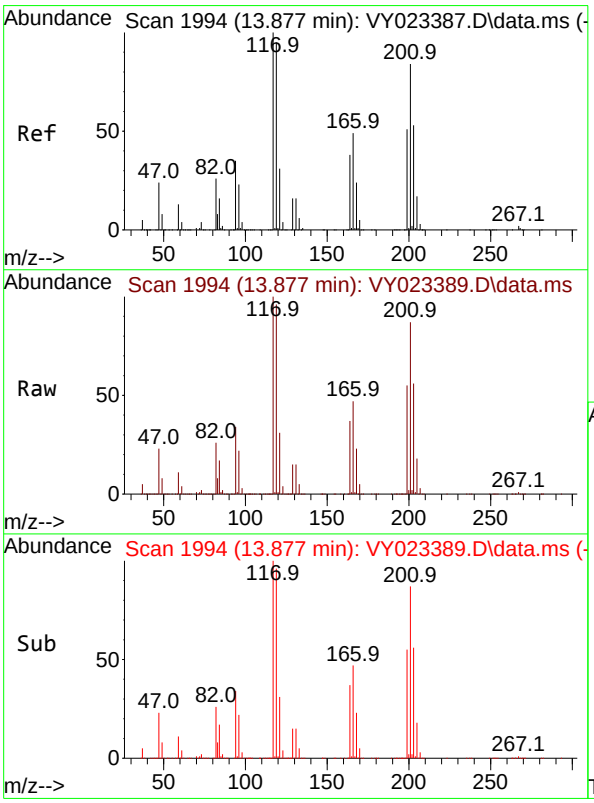
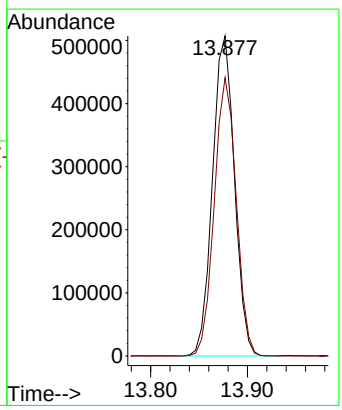
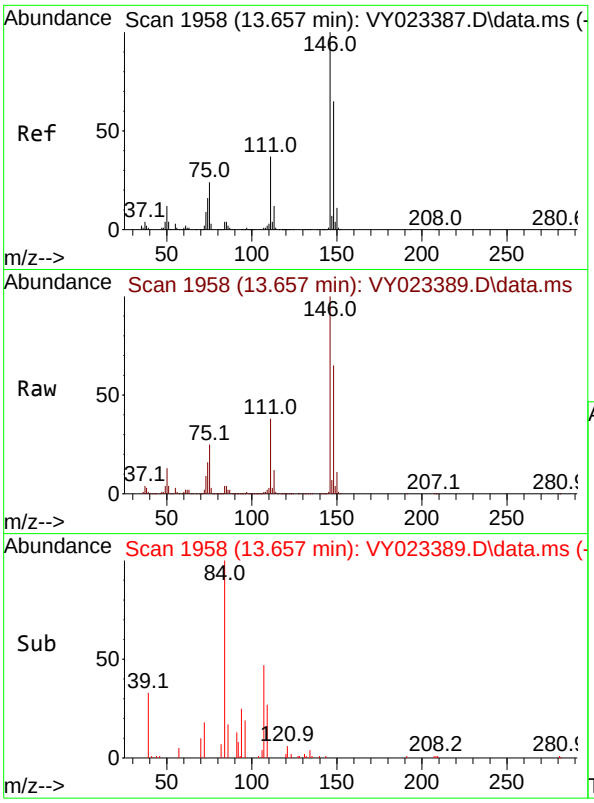


#90
Hexachloroethane
Concen: 151.487 ug/l
RT: 13.877 min Scan# 1994
Delta R.T. 0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion:117 Resp: 799264

Ion	Ratio	Lower	Upper
117	100		
201	86.8	43.8	131.4

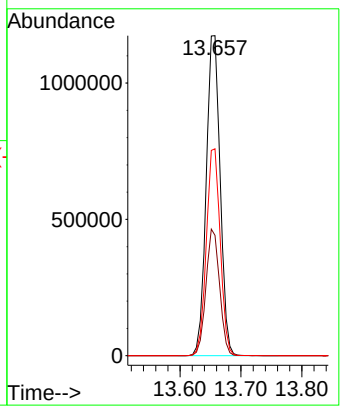




#91
1,2-Dichlorobenzene
Concen: 157.101 ug/l
RT: 13.657 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion:146 Resp: 186269

Ion	Ratio	Lower	Upper
146	100		
111	38.7	19.0	57.0
148	64.5	32.1	96.3



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC150

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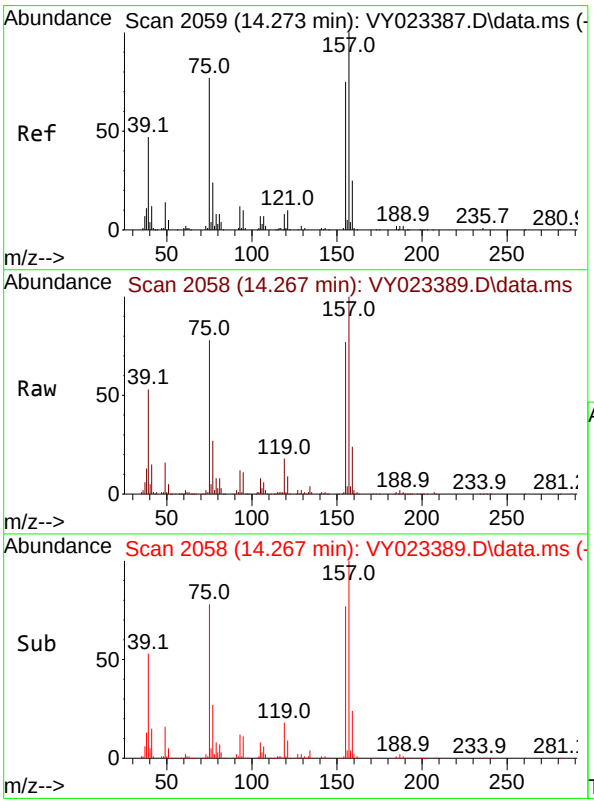
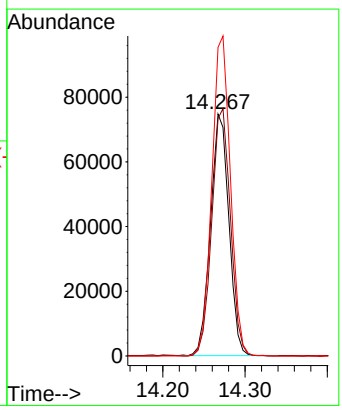
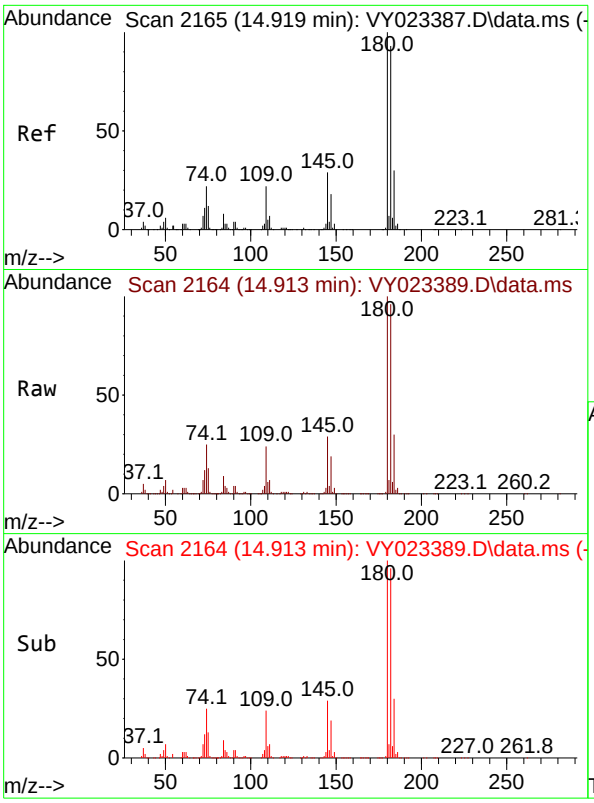


#92
1,2-Dibromo-3-Chloropropane
Concen: 164.099 ug/l
RT: 14.267 min Scan# 2058
Delta R.T. -0.006 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion: 75 Resp: 116273

Ion	Ratio	Lower	Upper
75	100		
155	103.6	50.0	150.0
157	133.4	63.8	191.5

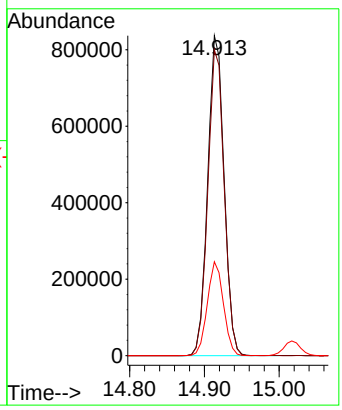




#93
1,2,4-Trichlorobenzene
Concen: 182.183 ug/l
RT: 14.913 min Scan# 2
Delta R.T. -0.006 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion:180 Resp: 127262

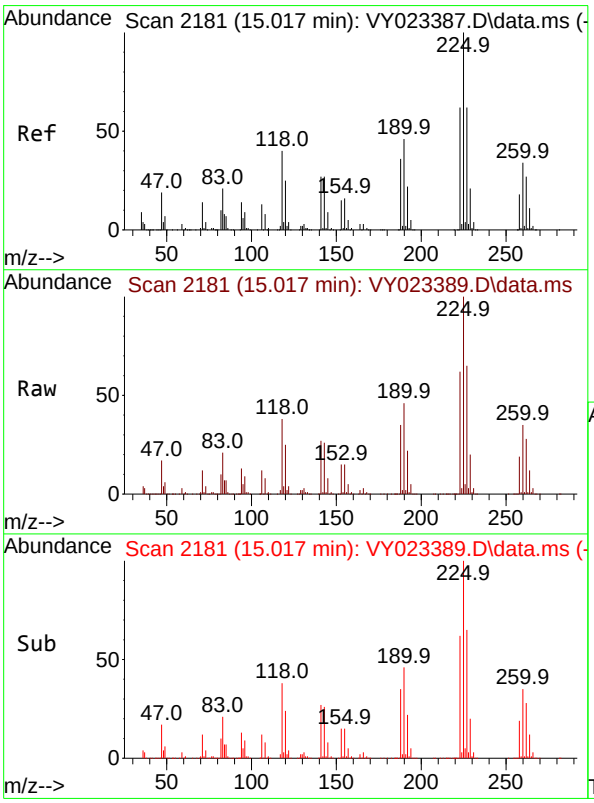
Ion	Ratio	Lower	Upper
180	100		
182	95.6	47.9	143.6
145	28.9	14.7	44.1



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC150

Manual Integrations APPROVED

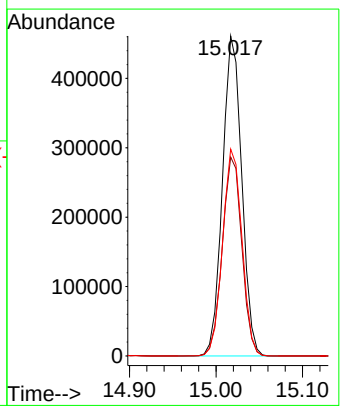
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

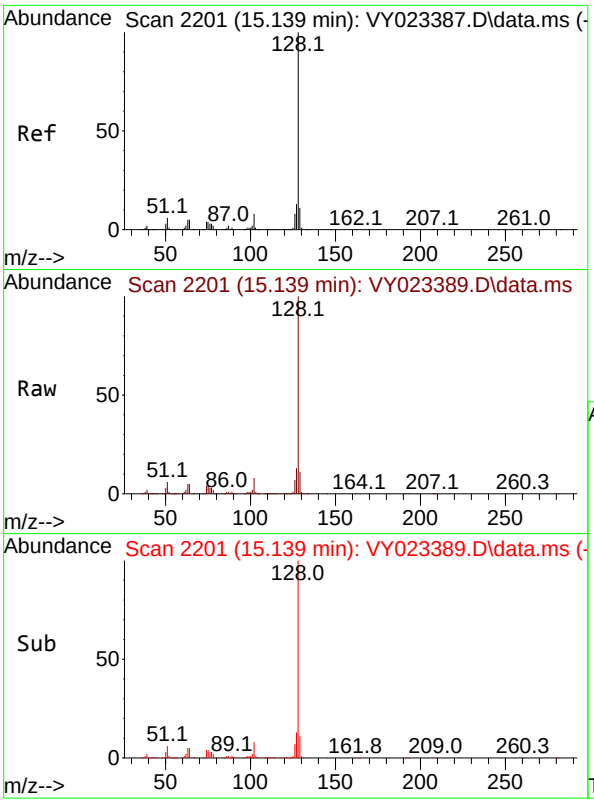


#94
Hexachlorobutadiene
Concen: 163.518 ug/l
RT: 15.017 min Scan# 2181
Delta R.T. -0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion:225 Resp: 711748

Ion	Ratio	Lower	Upper
225	100		
223	62.9	30.8	92.3
227	65.0	31.9	95.7

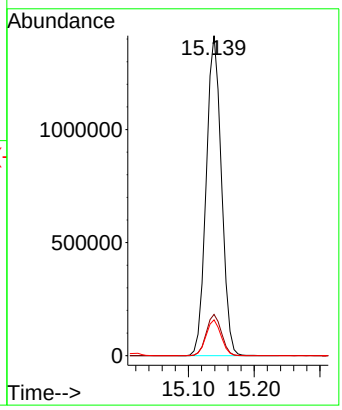




#95
Naphthalene
Concen: 204.639 ug/l
RT: 15.139 min Scan# 2
Delta R.T. 0.000 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion:128 Resp: 227754

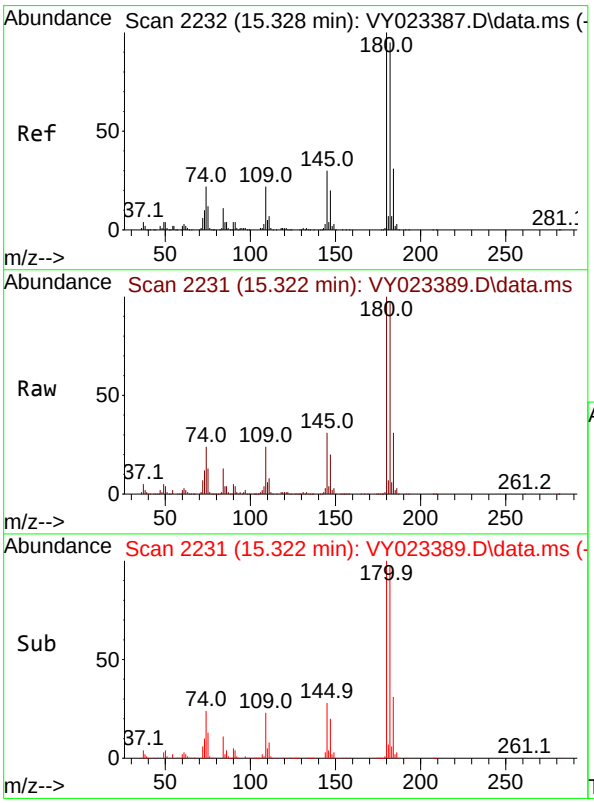
Ion	Ratio	Lower	Upper
128	100		
127	12.9	10.4	15.6
129	11.1	8.9	13.3



Instrument :
MSVOA_Y
ClientSampleId :
VSTDICC150

Manual Integrations
APPROVED

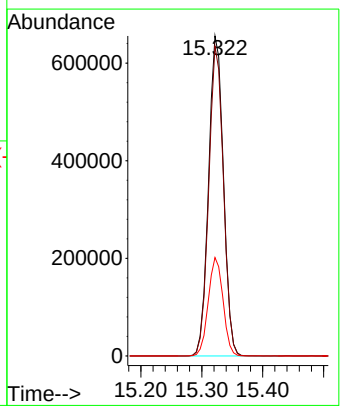
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025



#96
1,2,3-Trichlorobenzene
Concen: 183.206 ug/l
RT: 15.322 min Scan# 2231
Delta R.T. -0.006 min
Lab File: VY023389.D
Acq: 07 Oct 2025 12:32

Tgt Ion:180 Resp: 1110193

Ion	Ratio	Lower	Upper
180	100		
182	95.6	47.9	143.8
145	30.5	15.3	45.9



Quantitation Report (QT Reviewed)

Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY100725\
Data File : VY023391.D
Acq On : 07 Oct 2025 14:12
Operator : SY/MD
Sample : VSTDICV050
Misc : 5.00g/5.0mL/MSVOA_Y/SOIL
ALS Vial : 10 Sample Multiplier: 1

Quant Time: Oct 08 05:15:49 2025
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260
QLast Update : Wed Oct 08 05:12:50 2025
Response via : Initial Calibration

Instrument :
MSVOA_Y
ClientSampleId :
ICVVY100725

Manual Integrations APPROVED

Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Pentafluorobenzene	7.707	168	574332	50.000	ug/l	0.00
34) 1,4-Difluorobenzene	8.616	114	861639	50.000	ug/l	0.00
63) Chlorobenzene-d5	11.414	117	771372	50.000	ug/l	0.00
72) 1,4-Dichlorobenzene-d4	13.346	152	405636	50.000	ug/l	0.00
System Monitoring Compounds						
33) 1,2-Dichloroethane-d4	8.061	65	237493	49.450	ug/l	0.00
Spiked Amount 50.000	Range 50 - 163		Recovery = 98.900%			
35) Dibromofluoromethane	7.634	113	260038	49.116	ug/l	0.00
Spiked Amount 50.000	Range 54 - 147		Recovery = 98.240%			
50) Toluene-d8	10.103	98	970614	49.228	ug/l	0.00
Spiked Amount 50.000	Range 58 - 134		Recovery = 98.460%			
62) 4-Bromofluorobenzene	12.402	95	324700	49.881	ug/l	0.00
Spiked Amount 50.000	Range 30 - 143		Recovery = 99.760%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.867	85	185683	44.916	ug/l	99
3) Chloromethane	2.068	50	295766	52.519	ug/l	98
4) Vinyl Chloride	2.208	62	362714	49.449	ug/l	100
5) Bromomethane	2.598	94	300735	48.856	ug/l	98
6) Chloroethane	2.739	64	256831	51.367	ug/l	99
7) Trichlorofluoromethane	3.056	101	494789	48.582	ug/l	99
8) Diethyl Ether	3.458	74	135857	51.050	ug/l	100
9) 1,1,2-Trichlorotrifluo...	3.812	101	257524	48.728	ug/l	100
10) Methyl Iodide	4.007	142	305209	51.875	ug/l	98
11) Tert butyl alcohol	4.860	59	82562	231.079	ug/l	100
12) 1,1-Dichloroethene	3.787	96	254382	49.653	ug/l	97
13) Acrolein	3.653	56	124288	246.184	ug/l	99
14) Allyl chloride	4.385	41	316213	50.645	ug/l	99
15) Acrylonitrile	5.055	53	256219	251.575	ug/l	99
16) Acetone	3.866	43	243433	212.910	ug/l	98
17) Carbon Disulfide	4.104	76	733457	50.021	ug/l	100
18) Methyl Acetate	4.385	43	151281	50.439	ug/l	100
19) Methyl tert-butyl Ether	5.116	73	643111	52.230	ug/l	97
20) Methylene Chloride	4.616	84	324604	52.503	ug/l	97
21) trans-1,2-Dichloroethene	5.116	96	290384	51.482	ug/l	98
22) Diisopropyl ether	6.019	45	709381	51.364	ug/l	99
23) Vinyl Acetate	5.958	43	1950969	260.981	ug/l	99
24) 1,1-Dichloroethane	5.915	63	464207	50.742	ug/l	98
25) 2-Butanone	6.890	43	325351	233.083	ug/l	99
26) 2,2-Dichloropropane	6.884	77	416585	49.626	ug/l	99
27) cis-1,2-Dichloroethene	6.890	96	341964	52.485	ug/l	97
28) Bromochloromethane	7.244	49	155146	45.427	ug/l	100
29) Tetrahydrofuran	7.262	42	200513	253.317	ug/l	99
30) Chloroform	7.421	83	513997	51.137	ug/l	98
31) Cyclohexane	7.701	56	378819	47.416	ug/l	98
32) 1,1,1-Trichloroethane	7.616	97	456112	49.934	ug/l	100
36) 1,1-Dichloropropene	7.835	75	348786	49.761	ug/l	99
37) Ethyl Acetate	6.982	43	138119	49.740	ug/l	98
38) Carbon Tetrachloride	7.817	117	413653	48.671	ug/l	99
39) Methylcyclohexane	9.109	83	456031	49.970	ug/l	99
40) Benzene	8.079	78	1107790	49.906	ug/l	97

Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY100725\
Data File : VY023391.D
Acq On : 07 Oct 2025 14:12
Operator : SY/MD
Sample : VSTDICV050
Misc : 5.00g/5.0mL/MSVOA_Y/SOIL
ALS Vial : 10 Sample Multiplier: 1

Quant Time: Oct 08 05:15:49 2025
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260
QLast Update : Wed Oct 08 05:12:50 2025
Response via : Initial Calibration

Instrument :
MSVOA_Y
ClientSampleId :
ICVVY100725

Manual Integrations APPROVED

Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

Compound	R.T.	QIon	Response	Conc	Units		Dev(Min)
41) Methacrylonitrile	7.220	41	72100	48.008	ug/l		96
42) 1,2-Dichloroethane	8.158	62	282332	49.318	ug/l		99
43) Isopropyl Acetate	8.195	43	279887	50.548	ug/l		100
44) Trichloroethene	8.866	130	319131	49.120	ug/l		98
45) 1,2-Dichloropropane	9.140	63	246887	50.355	ug/l		100
46) Dibromomethane	9.231	93	157758	50.885	ug/l		98
47) Bromodichloromethane	9.420	83	393918	50.450	ug/l		99
48) Methyl methacrylate	9.219	41	128606	49.440	ug/l		95
49) 1,4-Dioxane	9.231	88	37356	1039.252	ug/l		97
51) 4-Methyl-2-Pentanone	10.000	43	724992	253.421	ug/l		100
52) Toluene	10.170	92	743055	51.556	ug/l		99
53) t-1,3-Dichloropropene	10.390	75	347336	51.160	ug/l		99
54) cis-1,3-Dichloropropene	9.853	75	413860	51.649	ug/l		99
55) 1,1,2-Trichloroethane	10.573	97	210245	50.430	ug/l		97
56) Ethyl methacrylate	10.438	69	256731	53.385	ug/l		99
57) 1,3-Dichloropropane	10.713	76	337673	51.113	ug/l		99
58) 2-Chloroethyl Vinyl ether	9.713	63	586266	272.133	ug/l		100
59) 2-Hexanone	10.762	43	501877	245.480	ug/l		99
60) Dibromochloromethane	10.908	129	297946	50.974	ug/l		99
61) 1,2-Dibromoethane	11.018	107	201415	50.658	ug/l		100
64) Tetrachloroethene	10.646	164	382998	48.087	ug/l		99
65) Chlorobenzene	11.438	112	828466	49.381	ug/l		100
66) 1,1,1,2-Tetrachloroethane	11.518	131	296157	49.537	ug/l		99
67) Ethyl Benzene	11.518	91	1380691	50.841	ug/l		100
68) m/p-Xylenes	11.627	106	1108386	101.757	ug/l		100
69) o-Xylene	11.950	106	526954	51.577	ug/l		100
70) Styrene	11.969	104	875709	52.122	ug/l		100
71) Bromoform	12.133	173	185682	50.070	ug/l	#	98
73) Isopropylbenzene	12.255	105	1345109	50.318	ug/l		100
74) N-amyl acetate	12.066	43	245291	51.087	ug/l		99
75) 1,1,2,2-Tetrachloroethane	12.505	83	217245	49.688	ug/l		99
76) 1,2,3-Trichloropropane	12.554	75	153438m	42.874	ug/l		
77) Bromobenzene	12.530	156	352420	49.590	ug/l		99
78) n-propylbenzene	12.591	91	1568180	50.694	ug/l		100
79) 2-Chlorotoluene	12.676	91	906610	50.047	ug/l		100
80) 1,3,5-Trimethylbenzene	12.737	105	1106664	51.231	ug/l		99
81) trans-1,4-Dichloro-2-b...	12.304	75	67959	46.566	ug/l		97
82) 4-Chlorotoluene	12.773	91	941314	50.455	ug/l		100
83) tert-Butylbenzene	12.993	119	1037510	52.019	ug/l		99
84) 1,2,4-Trimethylbenzene	13.042	105	1110672	51.520	ug/l		99
85) sec-Butylbenzene	13.176	105	1454774	50.848	ug/l		100
86) p-Isopropyltoluene	13.292	119	1263377	51.864	ug/l		99
87) 1,3-Dichlorobenzene	13.286	146	686854	49.632	ug/l		99
88) 1,4-Dichlorobenzene	13.365	146	671644	49.140	ug/l		100
89) n-Butylbenzene	13.615	91	1100086	51.829	ug/l		99
90) Hexachloroethane	13.877	117	257335	49.116	ug/l		98
91) 1,2-Dichlorobenzene	13.657	146	602989	49.698	ug/l		99
92) 1,2-Dibromo-3-Chloropr...	14.273	75	34928	48.687	ug/l		99
93) 1,2,4-Trichlorobenzene	14.919	180	386806	51.138	ug/l		100
94) Hexachlorobutadiene	15.023	225	236040	50.061	ug/l		99
95) Naphthalene	15.139	128	628190	52.154	ug/l		100
96) 1,2,3-Trichlorobenzene	15.328	180	335267	51.172	ug/l		100

ICAL Form

Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY100725\
Data File : VY023391.D
Acq On : 07 Oct 2025 14:12
Operator : SY/MD
Sample : VSTDICV050
Misc : 5.00g/5.0mL/MSVOA_Y/SOIL
ALS Vial : 10 Sample Multiplier: 1

Instrument :
MSVOA_Y
ClientSampleId :
ICVVY100725

Manual Integrations APPROVED

Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

Quant Time: Oct 08 05:15:49 2025
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260
QLast Update : Wed Oct 08 05:12:50 2025
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)

(#) = qualifier out of range (m) = manual integration (+) = signals summed

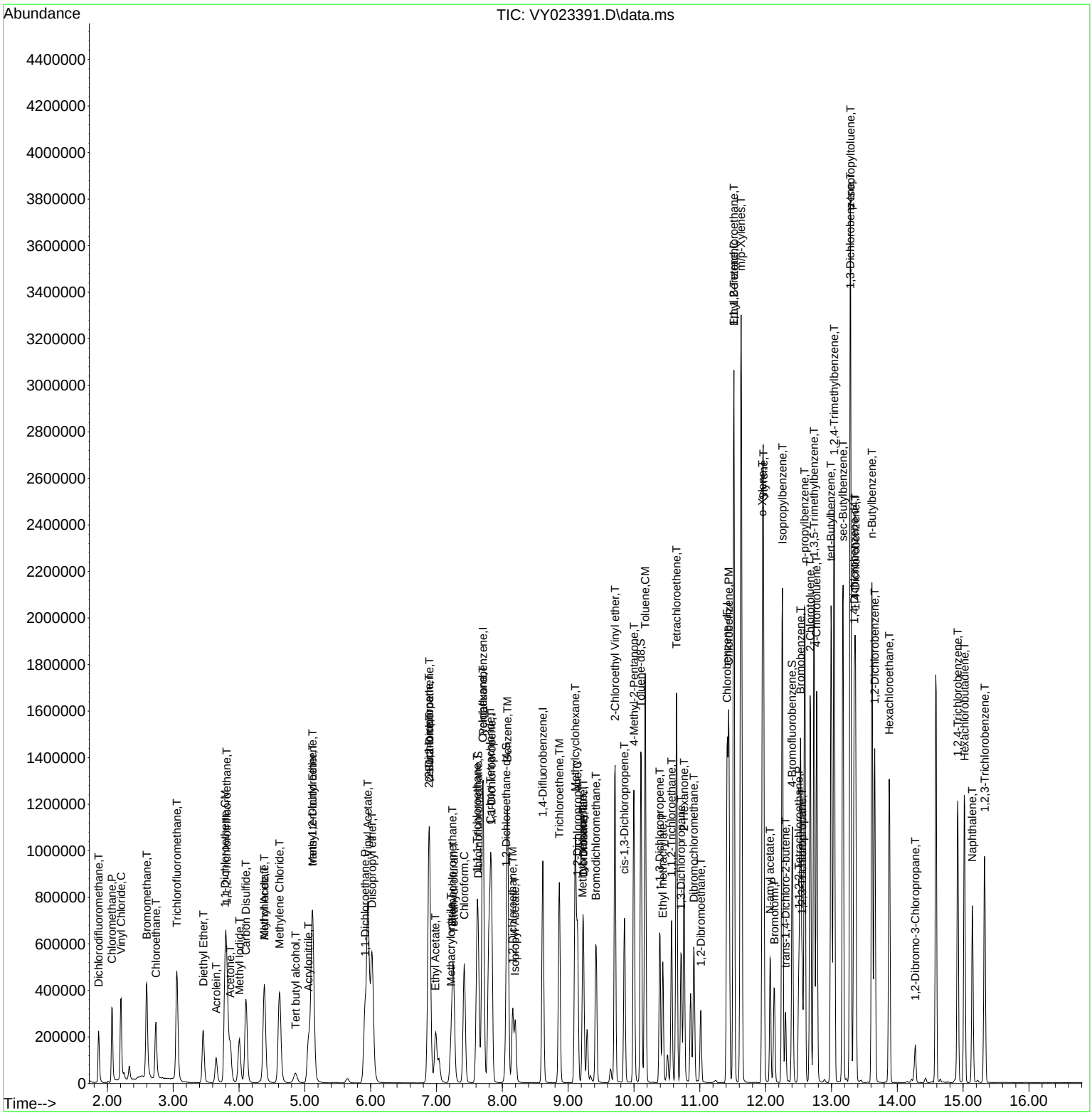
Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY100725\
Data File : VY023391.D
Acq On : 07 Oct 2025 14:12
Operator : SY/MD
Sample : VSTDICV050
Misc : 5.00g/5.0mL/MSVOA_Y/SOIL
ALS Vial : 10 Sample Multiplier: 1

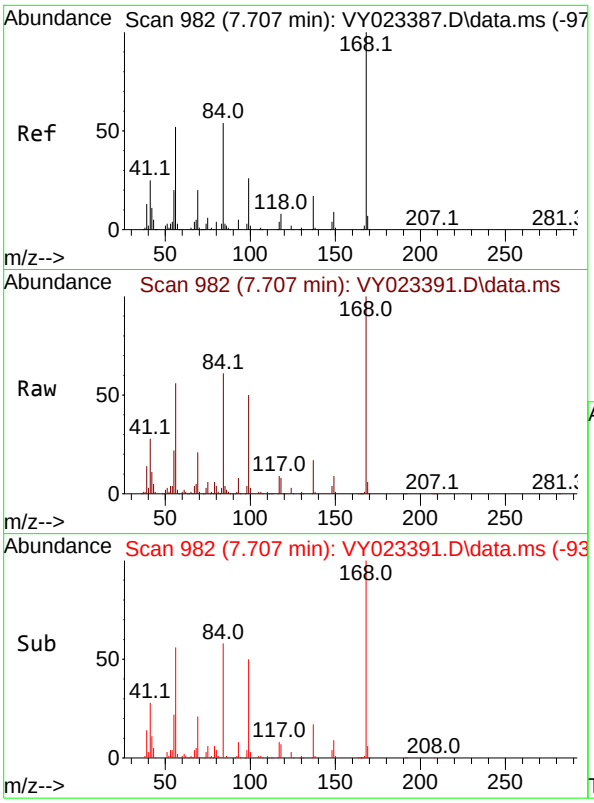
Quant Time: Oct 08 05:15:49 2025
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260
QLast Update : Wed Oct 08 05:12:50 2025
Response via : Initial Calibration

Instrument :
MSVOA_Y
ClientSampleId :
ICVVY100725

Manual Integrations APPROVED

Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

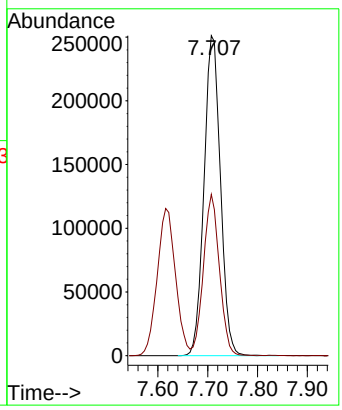




#1
Pentafluorobenzene
Concen: 50.000 ug/l
RT: 7.707 min Scan# 9
Delta R.T. 0.000 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion:168 Resp: 57433

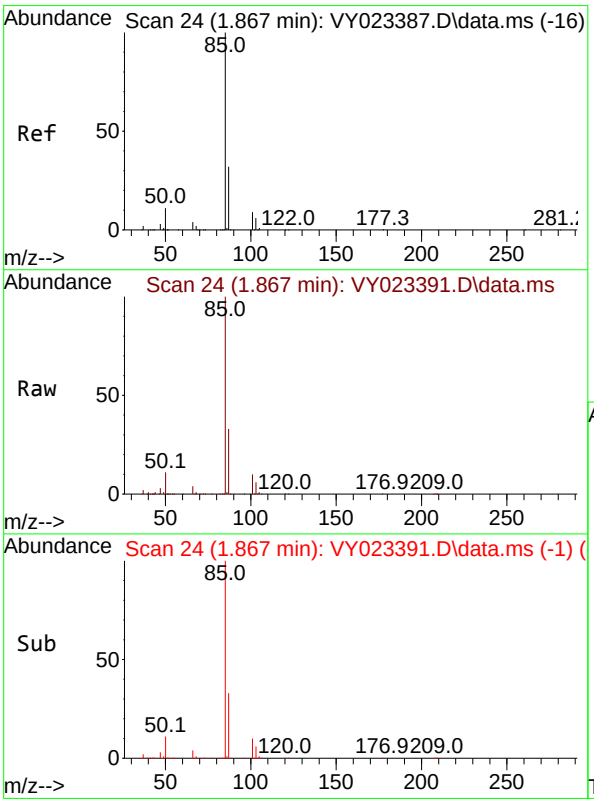
Ion	Ratio	Lower	Upper
168	100		
99	50.4	39.7	59.5



Instrument :
MSVOA_Y
ClientSampleId :
ICVVY100725

Manual Integrations
APPROVED

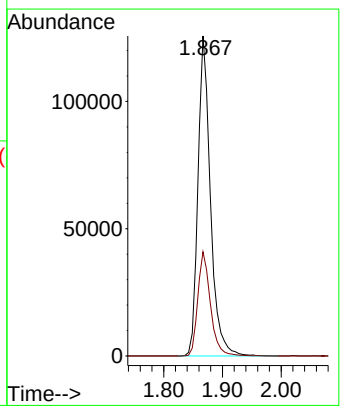
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

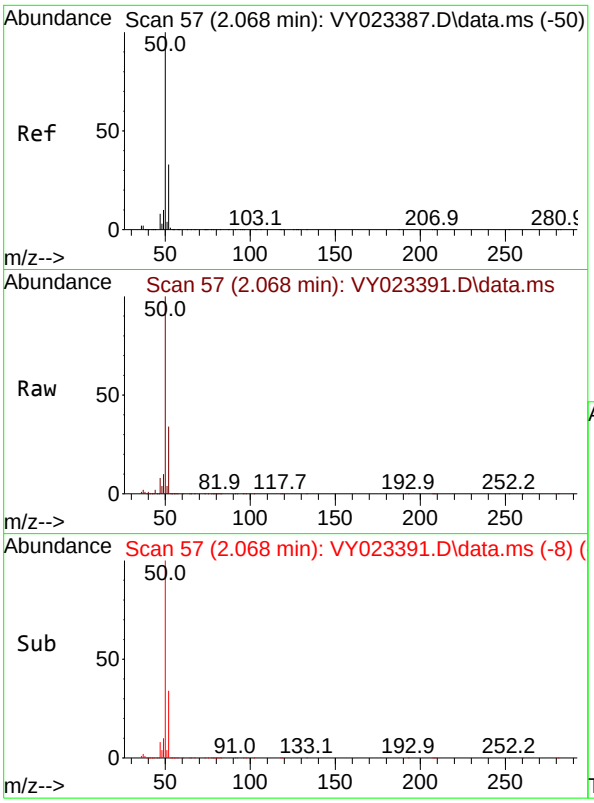


#2
Dichlorodifluoromethane
Concen: 44.916 ug/l
RT: 1.867 min Scan# 24
Delta R.T. -0.000 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion: 85 Resp: 185683

Ion	Ratio	Lower	Upper
85	100		
87	32.6	16.0	47.9

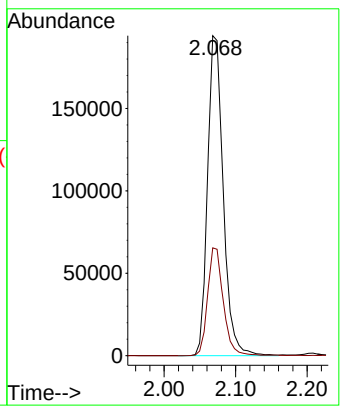




#3
Chloromethane
Concen: 52.519 ug/l
RT: 2.068 min Scan# 5
Delta R.T. -0.000 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion: 50 Resp: 29576

Ion	Ratio	Lower	Upper
50	100		
52	33.7	26.2	39.2



Instrument :
MSVOA_Y
ClientSampleId :
ICVVY100725

Manual Integrations
APPROVED

Reviewed By :Semsettin Yesilyurt 10/10/2025
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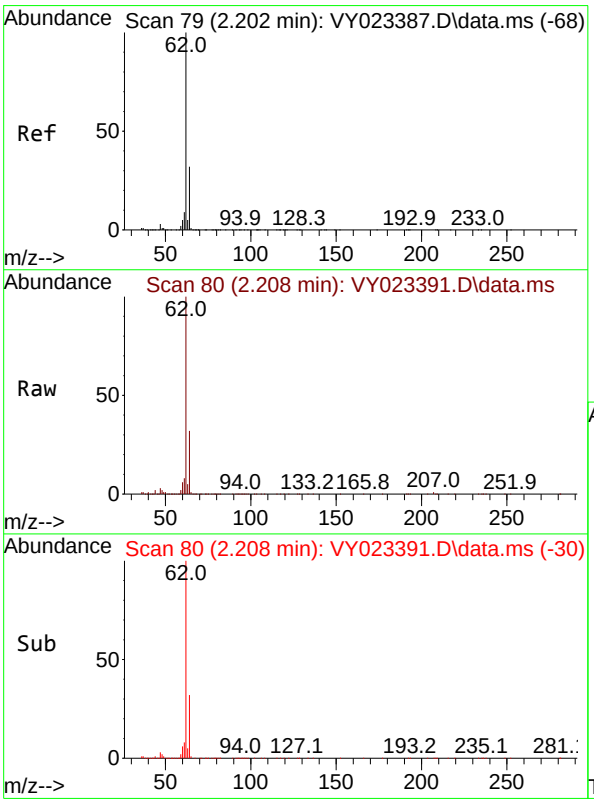
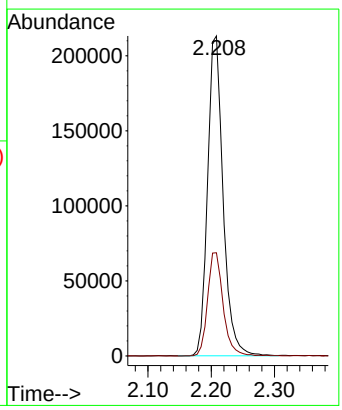
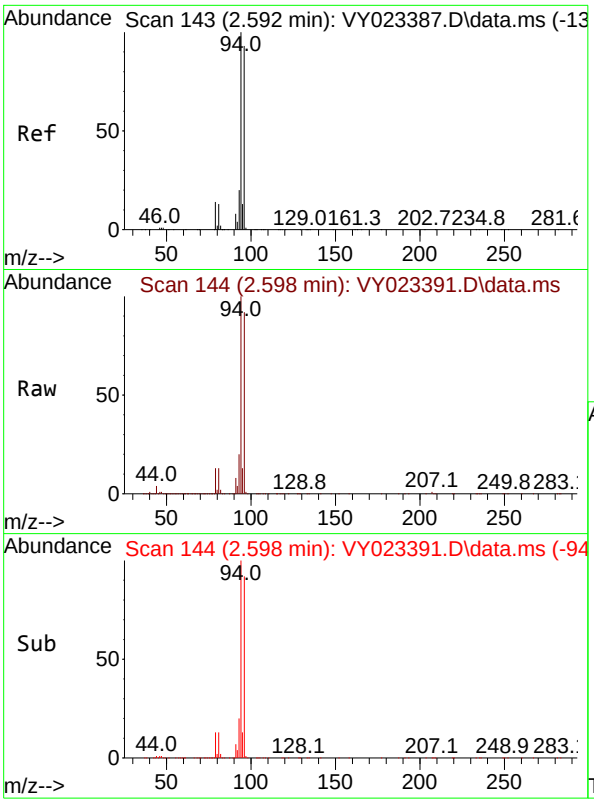


#4
Vinyl Chloride
Concen: 49.449 ug/l
RT: 2.208 min Scan# 80
Delta R.T. 0.006 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion: 62 Resp: 362714

Ion	Ratio	Lower	Upper
62	100		
64	32.3	25.8	38.8

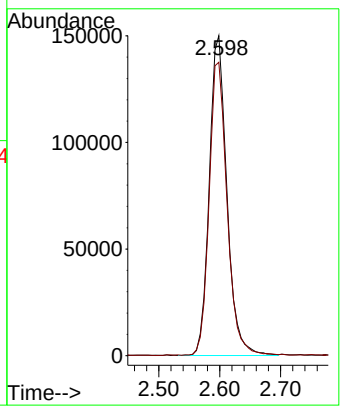




#5
Bromomethane
Concen: 48.856 ug/l
RT: 2.598 min Scan# 14
Delta R.T. 0.006 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion: 94 Resp: 30073

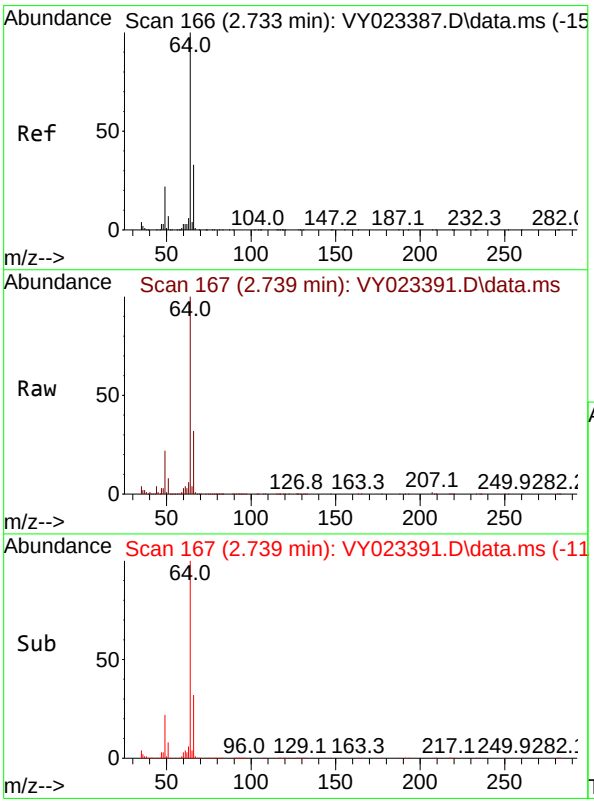
Ion	Ratio	Lower	Upper
94	100		
96	91.5	74.5	111.7



Instrument :
MSVOA_Y
ClientSampleId :
ICVVY100725

Manual Integrations
APPROVED

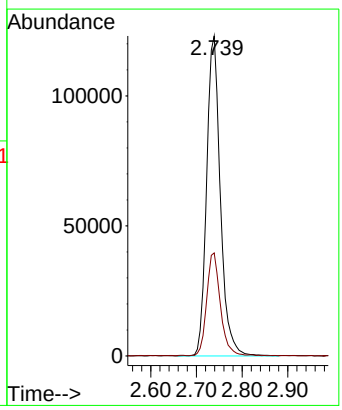
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

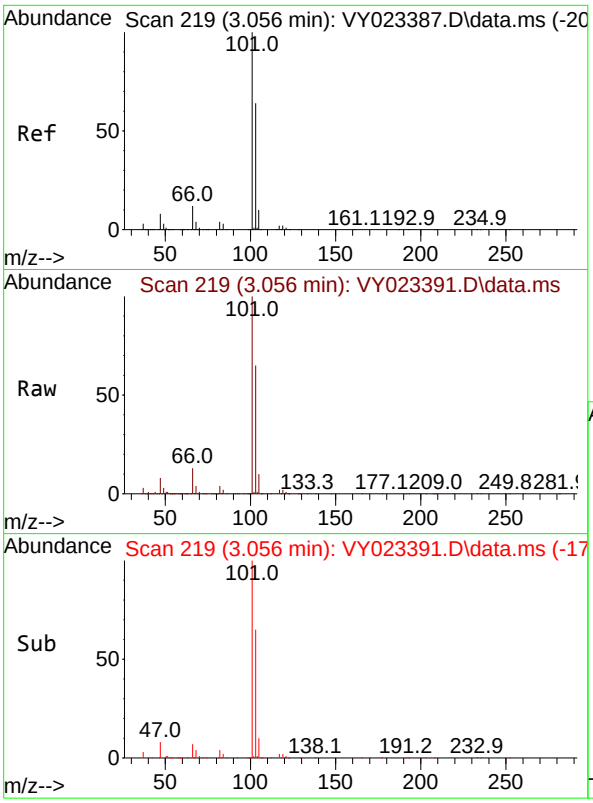


#6
Chloroethane
Concen: 51.367 ug/l
RT: 2.739 min Scan# 167
Delta R.T. 0.006 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion: 64 Resp: 256831

Ion	Ratio	Lower	Upper
64	100		
66	32.1	26.2	39.4

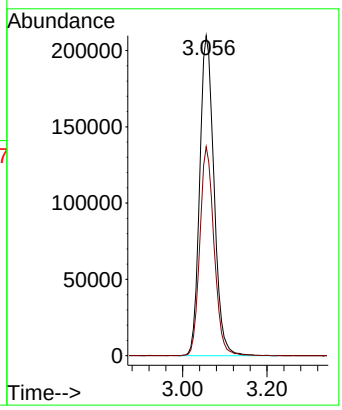




#7
Trichlorofluoromethane
Concen: 48.582 ug/l
RT: 3.056 min Scan# 21
Delta R.T. -0.000 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion:101 Resp: 49478

Ion	Ratio	Lower	Upper
101	100		
103	65.3	51.3	76.9



Instrument :
MSVOA_Y
ClientSampleId :
ICVVY100725

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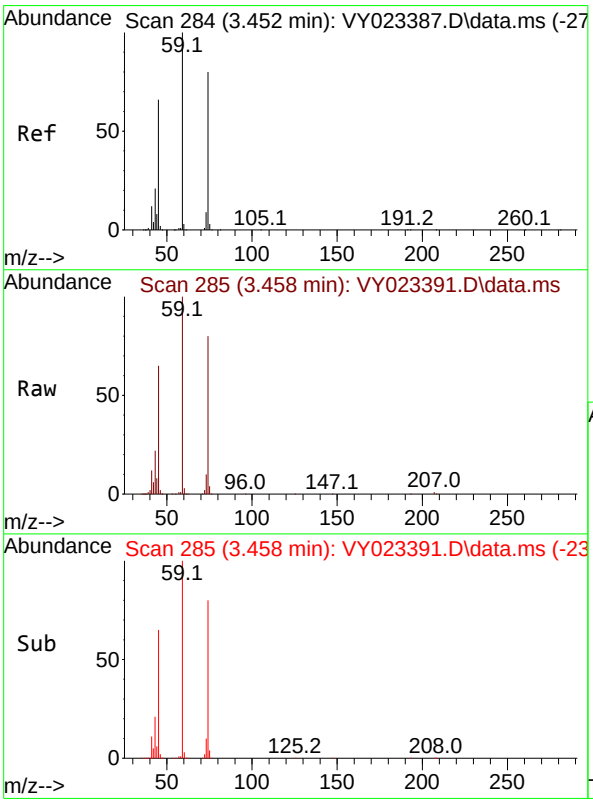
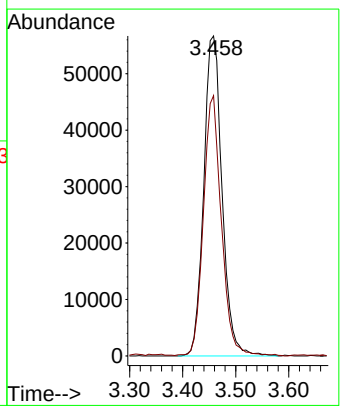
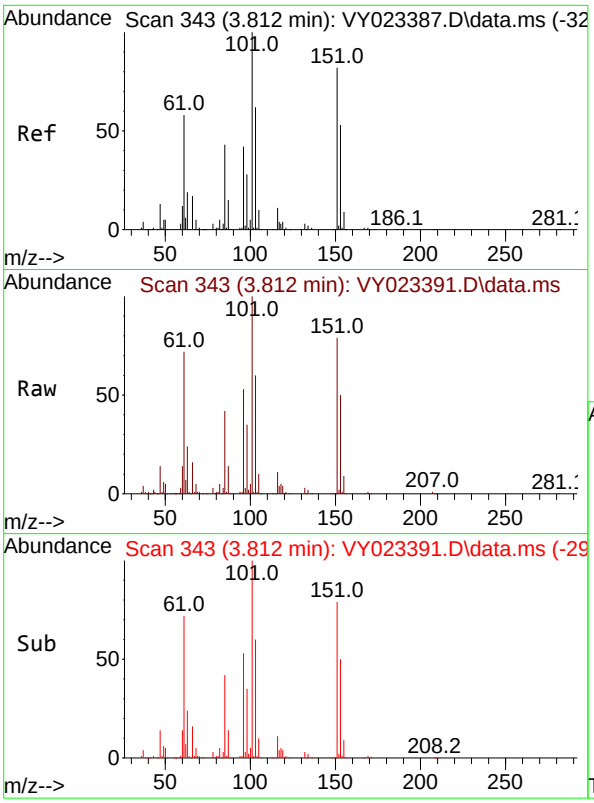


#8
Diethyl Ether
Concen: 51.050 ug/l
RT: 3.458 min Scan# 285
Delta R.T. 0.006 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion: 74 Resp: 135857

Ion	Ratio	Lower	Upper
74	100		
45	80.1	39.9	119.7





#9
1,1,2-Trichlorotrifluoroethane
Concen: 48.728 ug/l
RT: 3.812 min Scan# 34
Delta R.T. -0.000 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion:101 Resp: 25752

Ion	Ratio	Lower	Upper
101	100		
85	43.2	34.6	51.8
151	83.2	67.0	100.6

Instrument :
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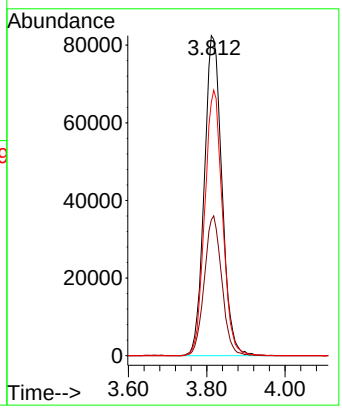
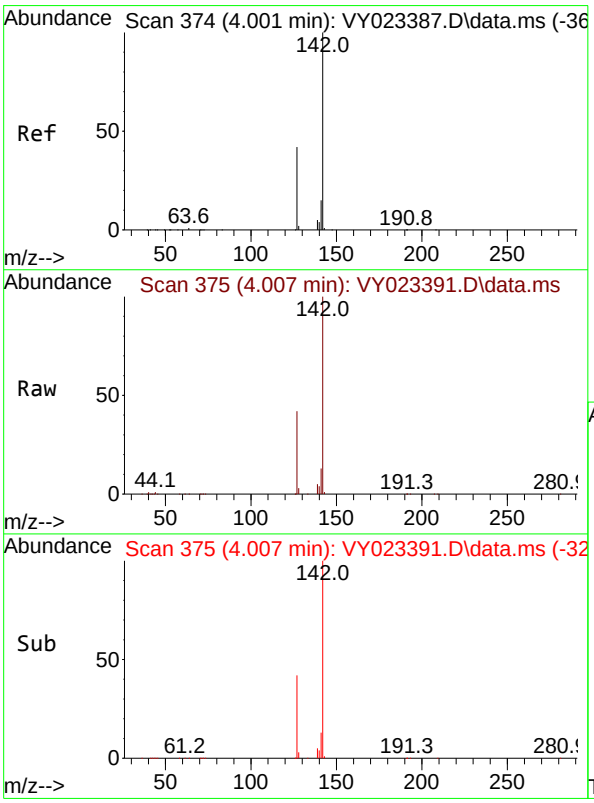
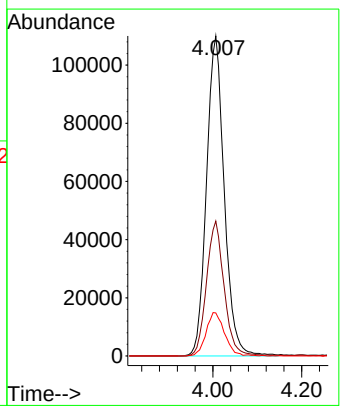


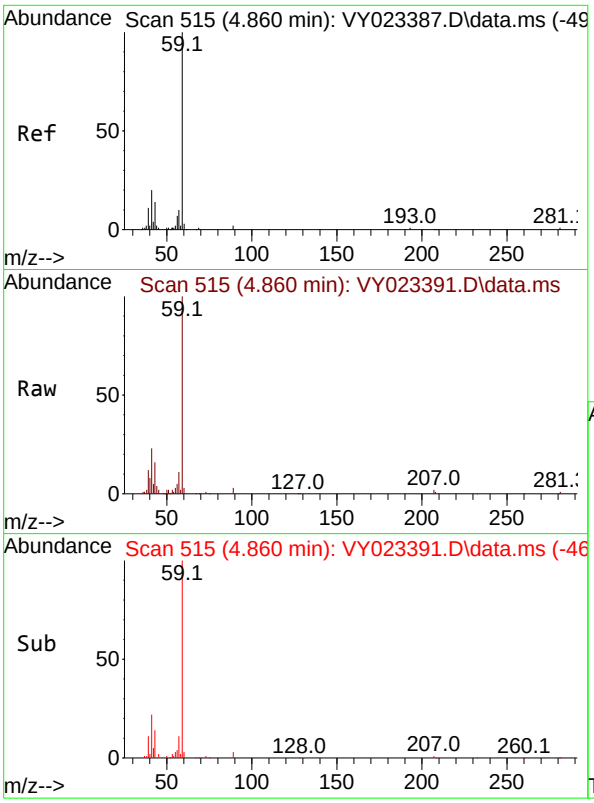


#10
Methyl Iodide
Concen: 51.875 ug/l
RT: 4.007 min Scan# 375
Delta R.T. 0.006 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion:142 Resp: 305209

Ion	Ratio	Lower	Upper
142	100		
127	41.8	34.8	52.2
141	14.1	11.6	17.4

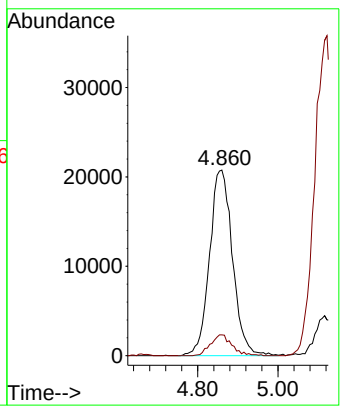




#11
Tert butyl alcohol
Concen: 231.079 ug/l
RT: 4.860 min Scan# 5
Delta R.T. -0.000 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion: 59 Resp: 8256

Ion	Ratio	Lower	Upper
59	100		
57	10.5	8.3	12.5



Instrument :
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ClientSampleId :
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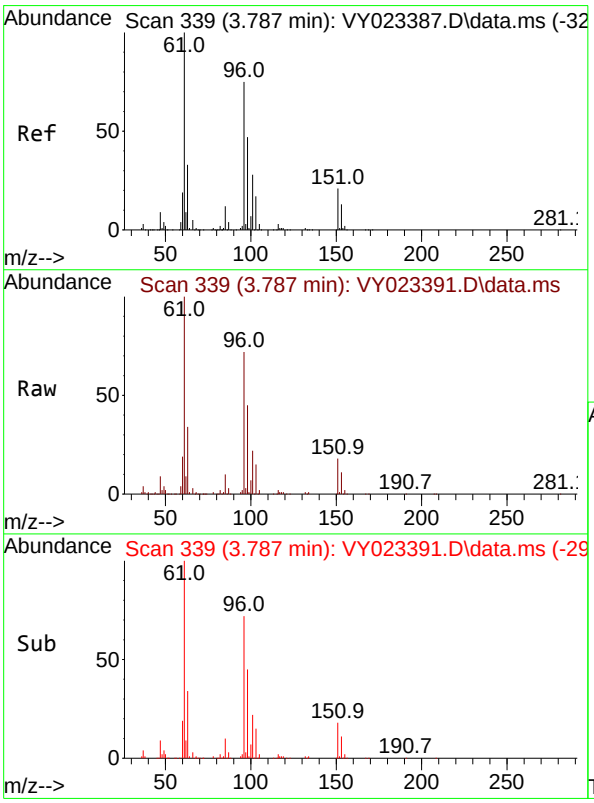
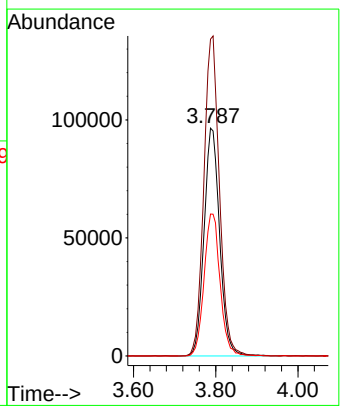
Supervised By :Mahesh Dadoda 10/10/2025

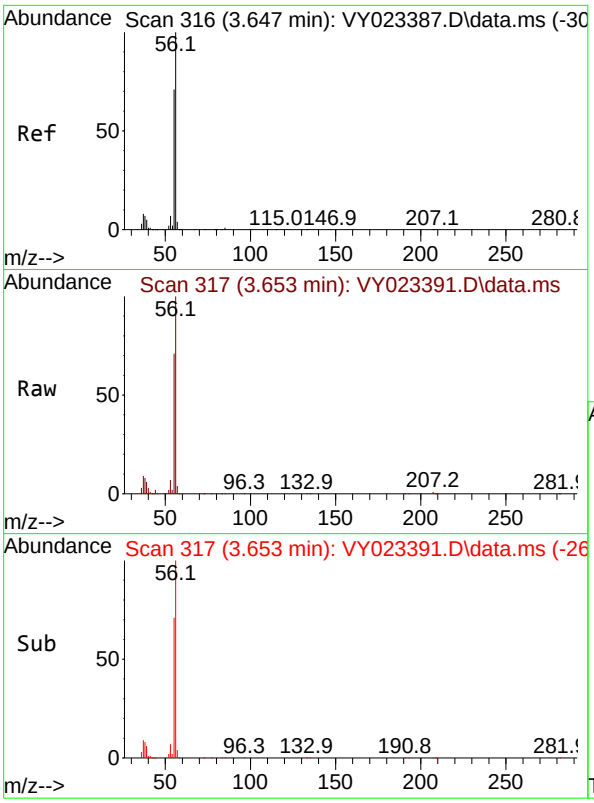


#12
1,1-Dichloroethene
Concen: 49.653 ug/l
RT: 3.787 min Scan# 339
Delta R.T. -0.000 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion: 96 Resp: 254382

Ion	Ratio	Lower	Upper
96	100		
61	139.1	106.7	160.1
98	62.3	50.2	75.4

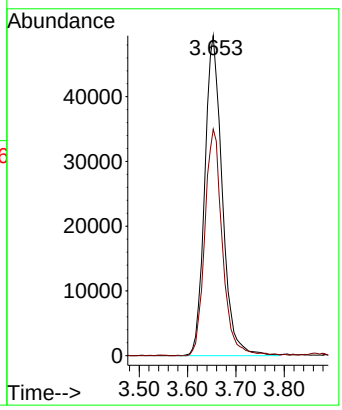




#13
Acrolein
Concen: 246.184 ug/l
RT: 3.653 min Scan# 3
Delta R.T. 0.006 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion: 56 Resp: 12428

Ion	Ratio	Lower	Upper
56	100		
55	71.1	56.1	84.1



Instrument :
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ClientSampleId :
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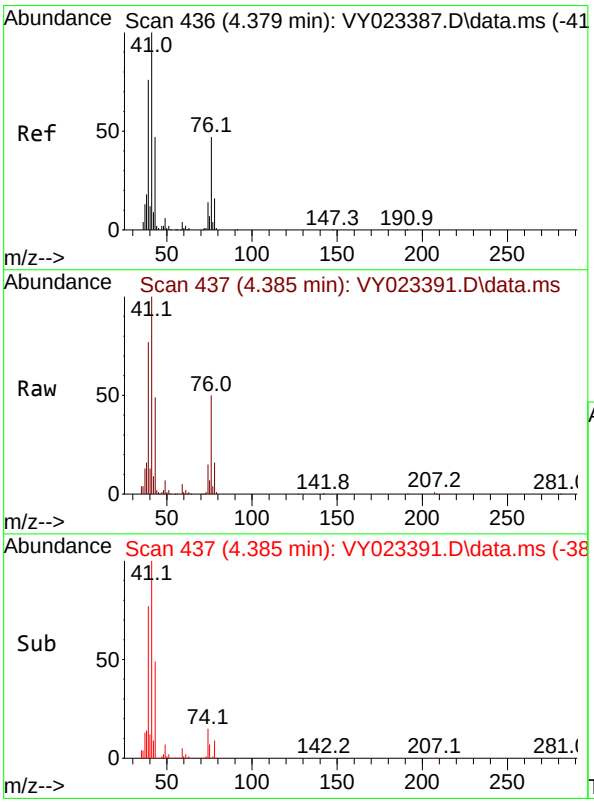
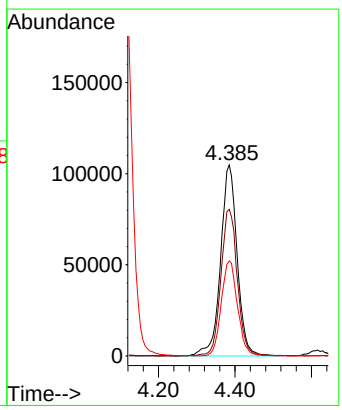
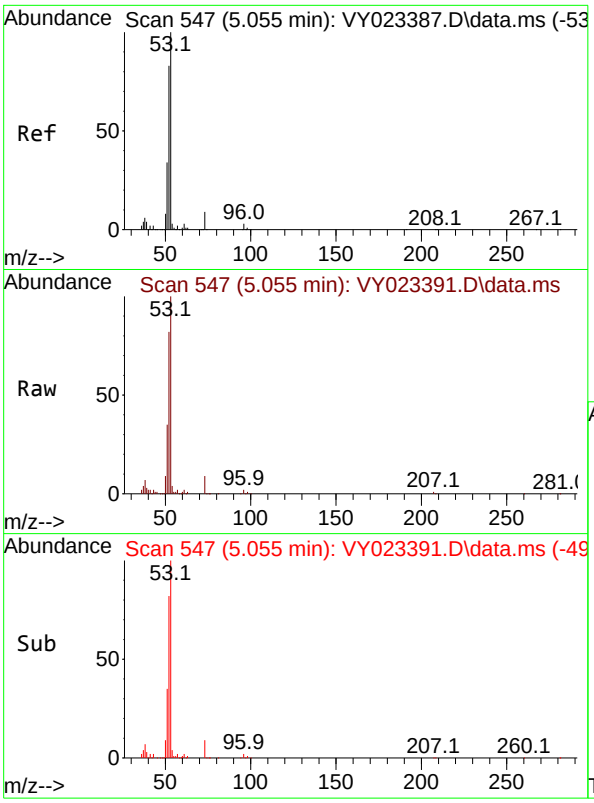


#14
Allyl chloride
Concen: 50.645 ug/l
RT: 4.385 min Scan# 437
Delta R.T. 0.006 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion: 41 Resp: 316213

Ion	Ratio	Lower	Upper
41	100		
39	76.2	59.9	89.9
76	48.1	38.0	57.0

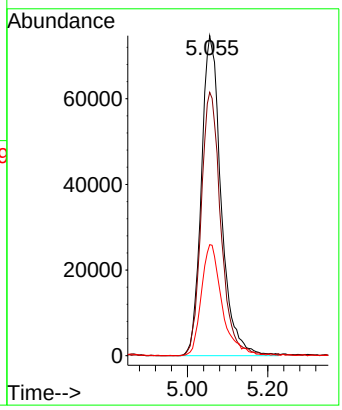




#15
Acrylonitrile
Concen: 251.575 ug/l
RT: 5.055 min Scan# 54
Delta R.T. -0.000 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion: 53 Resp: 25621

Ion	Ratio	Lower	Upper
53	100		
52	81.7	64.6	97.0
51	36.4	29.5	44.3



Instrument :
MSVOA_Y
ClientSampleId :
ICVVY100725

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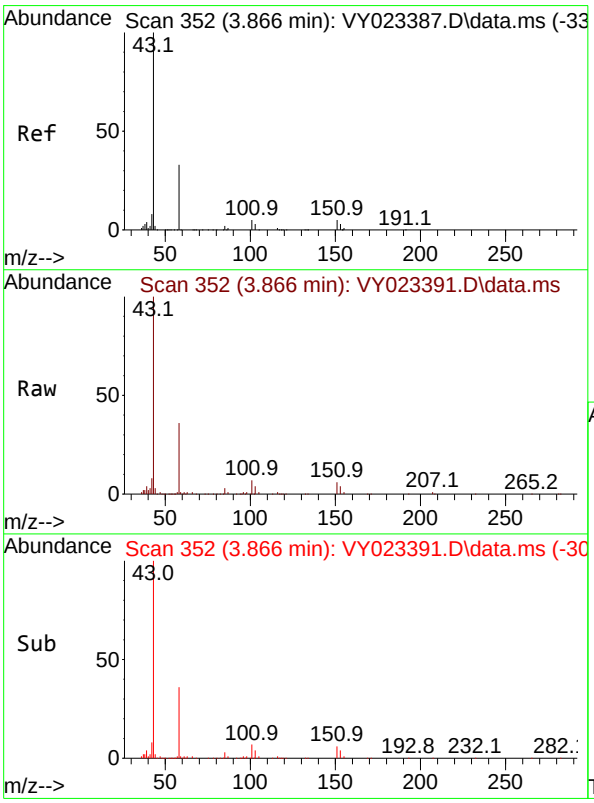
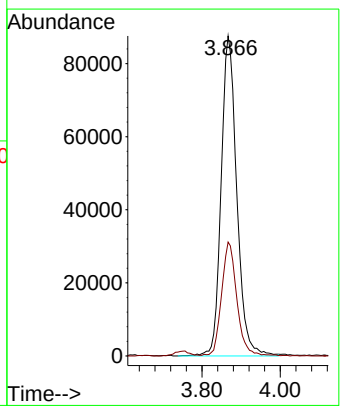
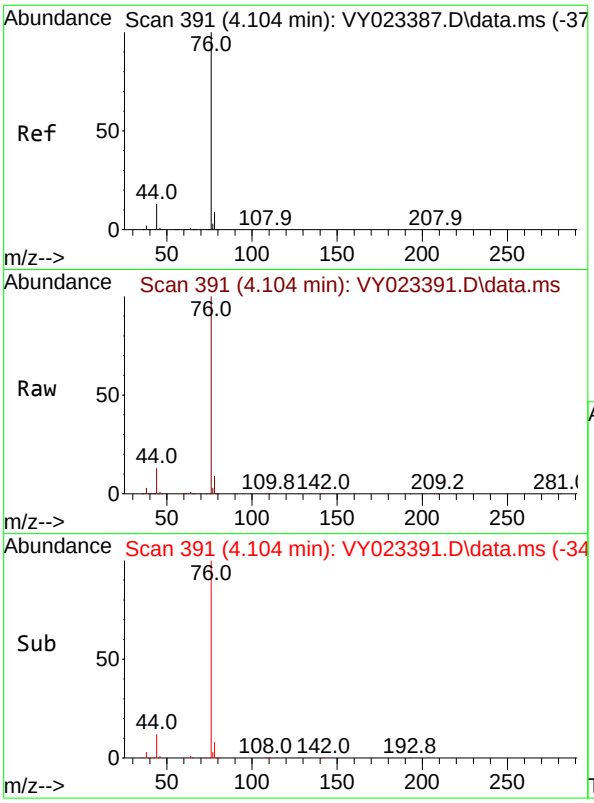


#16
Acetone
Concen: 212.910 ug/l
RT: 3.866 min Scan# 352
Delta R.T. -0.000 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion: 43 Resp: 243433

Ion	Ratio	Lower	Upper
43	100		
58	35.5	27.7	41.5

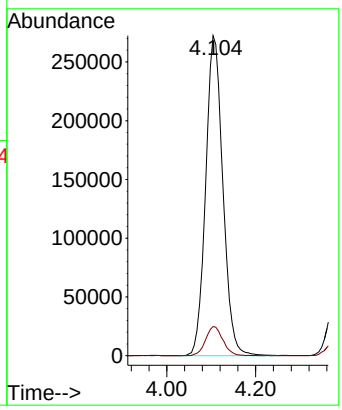




#17
Carbon Disulfide
Concen: 50.021 ug/l
RT: 4.104 min Scan# 3
Delta R.T. -0.000 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion: 76 Resp: 73345

Ion	Ratio	Lower	Upper
76	100		
78	9.1	7.3	10.9



Instrument :
MSVOA_Y
ClientSampleId :
ICVVY100725

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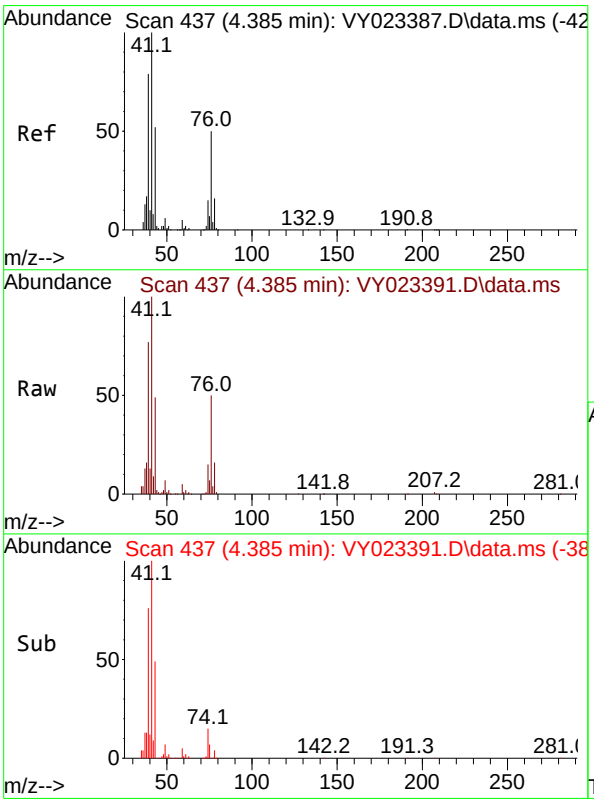
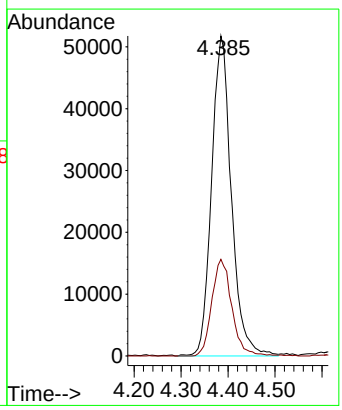
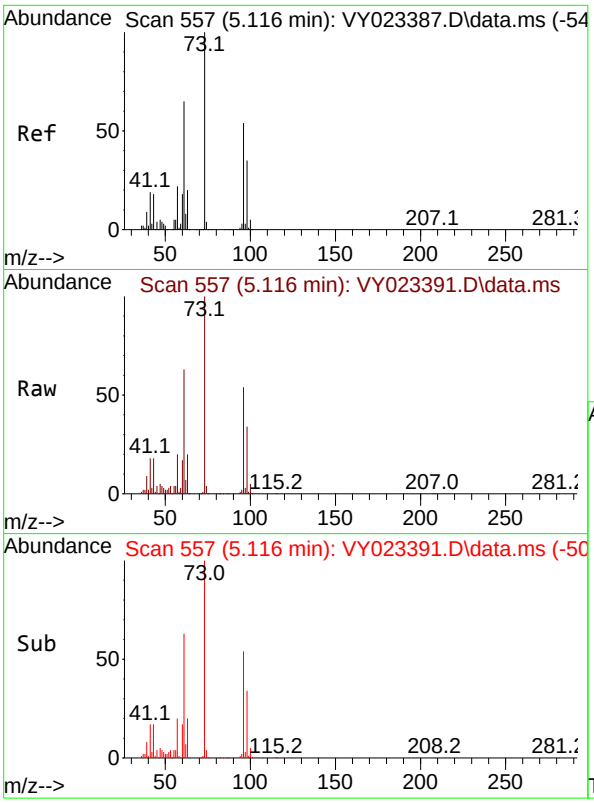


#18
Methyl Acetate
Concen: 50.439 ug/l
RT: 4.385 min Scan# 437
Delta R.T. -0.000 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion: 43 Resp: 151281

Ion	Ratio	Lower	Upper
43	100		
74	30.5	24.2	36.4

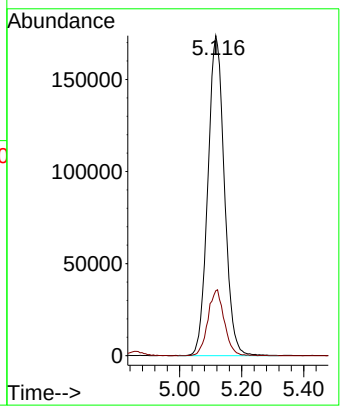




#19
Methyl tert-butyl Ether
Concen: 52.230 ug/l
RT: 5.116 min Scan# 5
Delta R.T. -0.000 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion: 73 Resp: 64311

Ion	Ratio	Lower	Upper
73	100		
57	20.3	17.4	26.0



Instrument :
MSVOA_Y
ClientSampleId :
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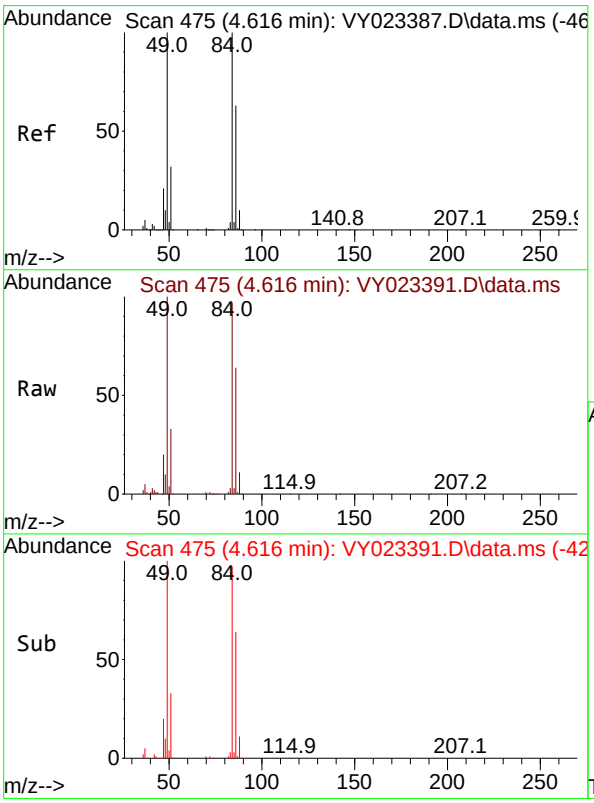
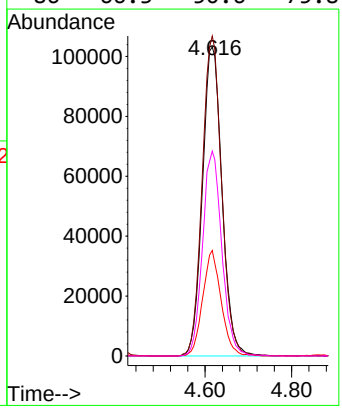
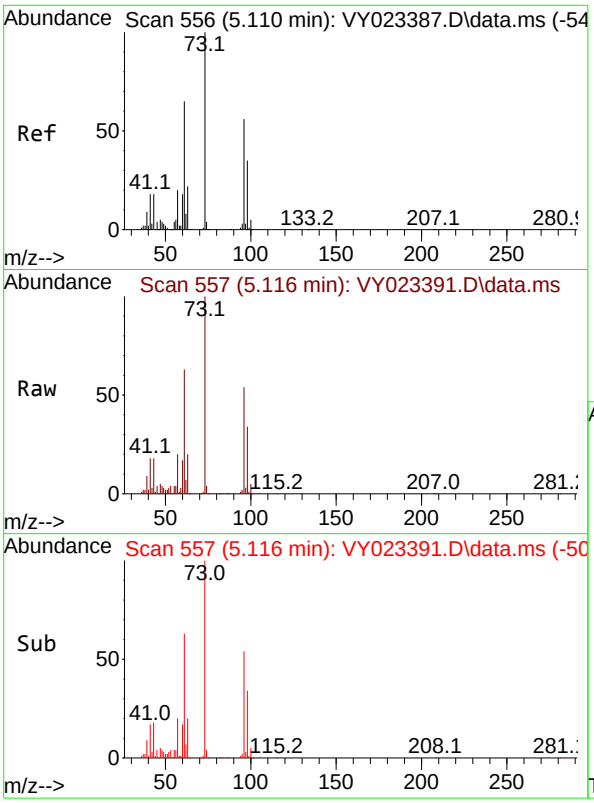


#20
Methylene Chloride
Concen: 52.503 ug/l
RT: 4.616 min Scan# 475
Delta R.T. -0.000 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion: 84 Resp: 324604

Ion	Ratio	Lower	Upper
84	100		
49	103.5	80.2	120.4
51	34.1	25.9	38.9
86	66.3	50.6	75.8

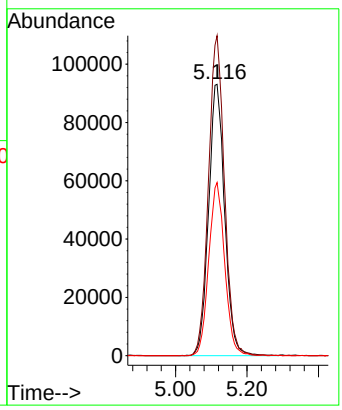




#21
trans-1,2-Dichloroethene
Concen: 51.482 ug/l
RT: 5.116 min Scan# 5
Delta R.T. 0.006 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion: 96 Resp: 29038

Ion	Ratio	Lower	Upper
96	100		
61	117.9	92.7	139.1
98	63.8	49.7	74.5



Instrument :
MSVOA_Y
ClientSampleId :
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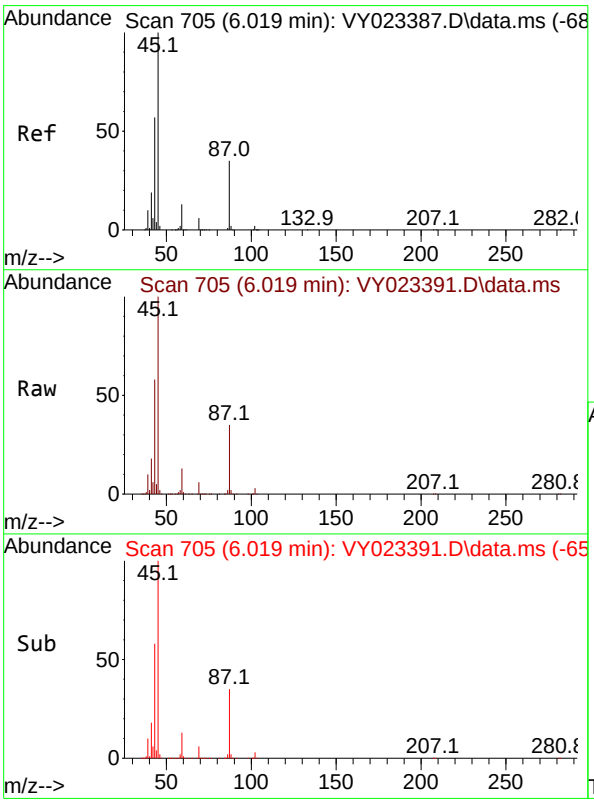
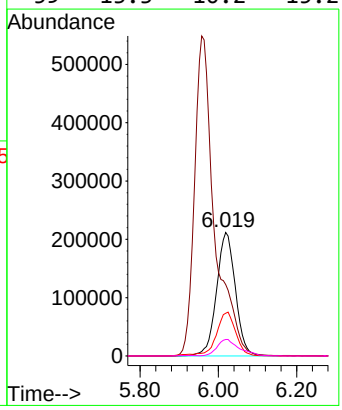
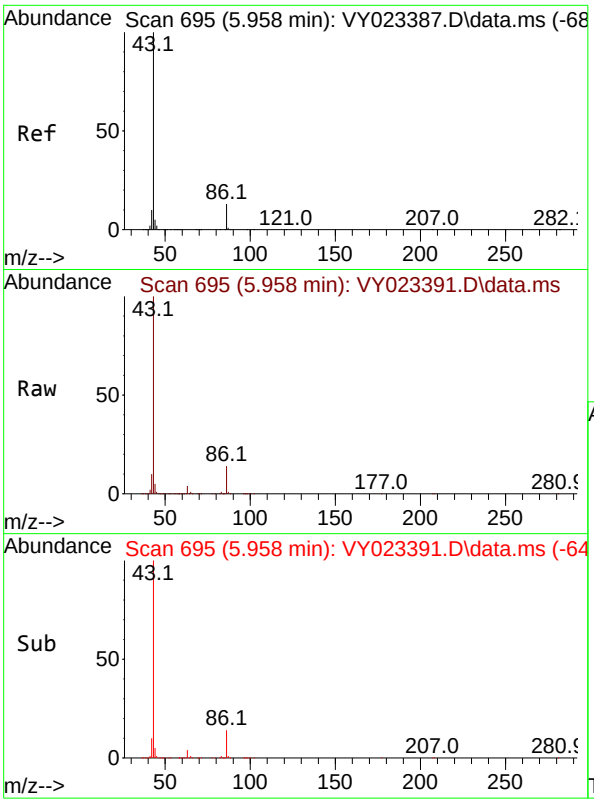


#22
Diisopropyl ether
Concen: 51.364 ug/l
RT: 6.019 min Scan# 705
Delta R.T. -0.000 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion: 45 Resp: 709381

Ion	Ratio	Lower	Upper
45	100		
43	57.4	45.6	68.4
87	34.6	28.1	42.1
59	13.3	10.2	15.2

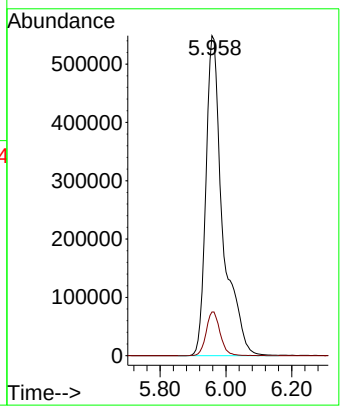




#23
Vinyl Acetate
Concen: 260.981 ug/l
RT: 5.958 min Scan# 6
Delta R.T. -0.000 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion: 43 Resp: 195096

Ion	Ratio	Lower	Upper
43	100		
86	13.7	10.6	15.8



Instrument :
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ClientSampleId :
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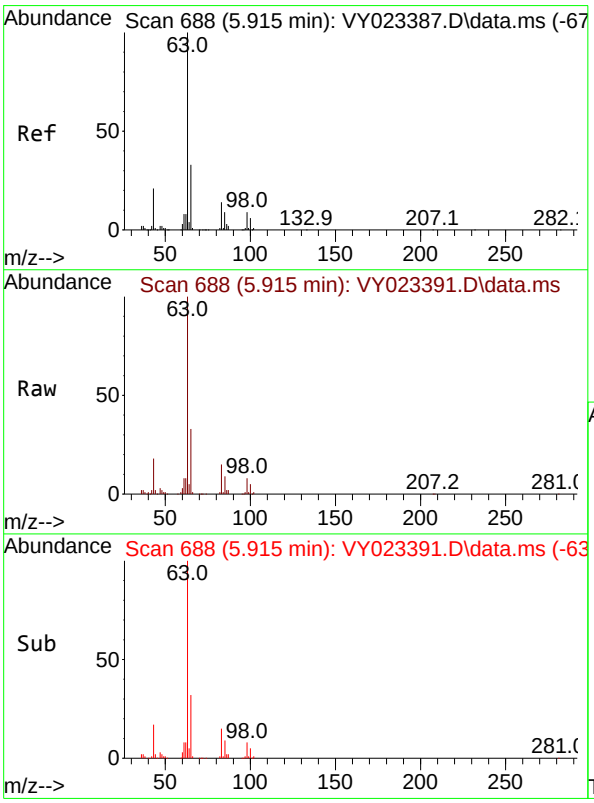
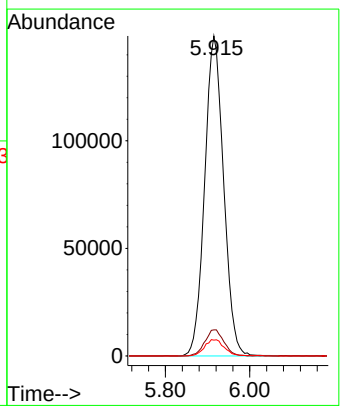
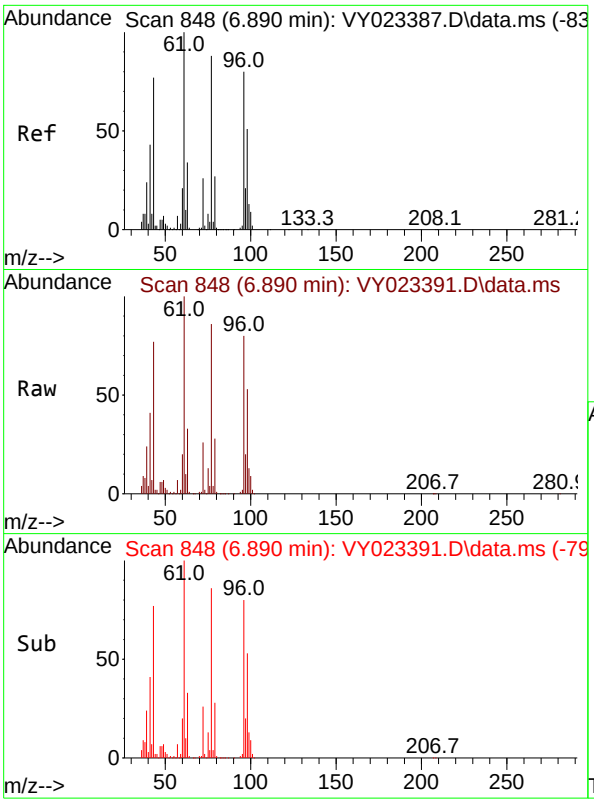


#24
1,1-Dichloroethane
Concen: 50.742 ug/l
RT: 5.915 min Scan# 688
Delta R.T. -0.000 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion: 63 Resp: 464207

Ion	Ratio	Lower	Upper
63	100		
98	8.1	4.3	13.1
100	5.0	2.8	8.4





#25
2-Butanone
Concen: 233.083 ug/l
RT: 6.890 min Scan# 84
Delta R.T. -0.000 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion: 43 Resp: 32535

Ion	Ratio	Lower	Upper
43	100		
72	33.8	27.4	41.2

Instrument :
MSVOA_Y
ClientSampleId :
ICVVY100725

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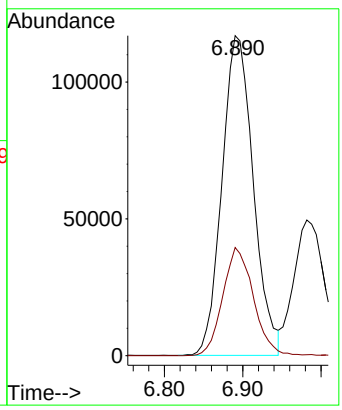
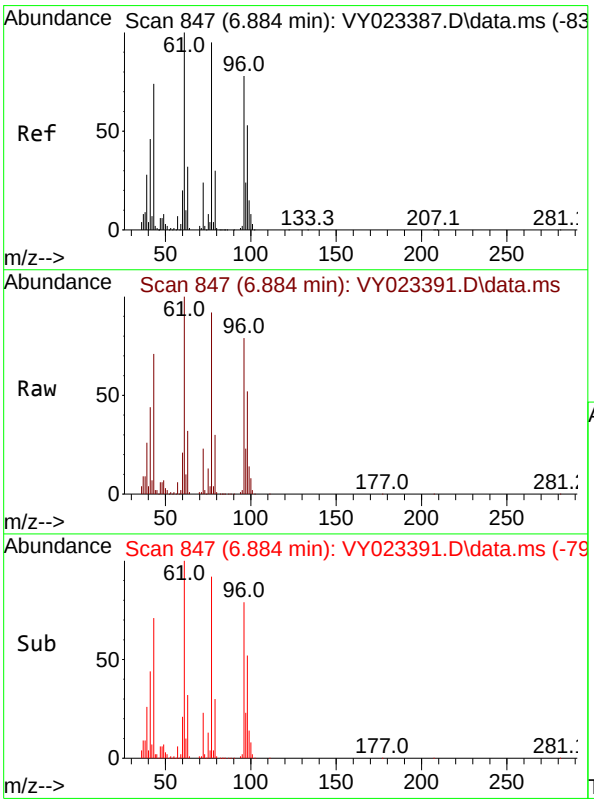
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

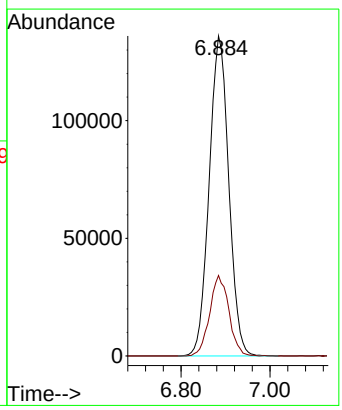


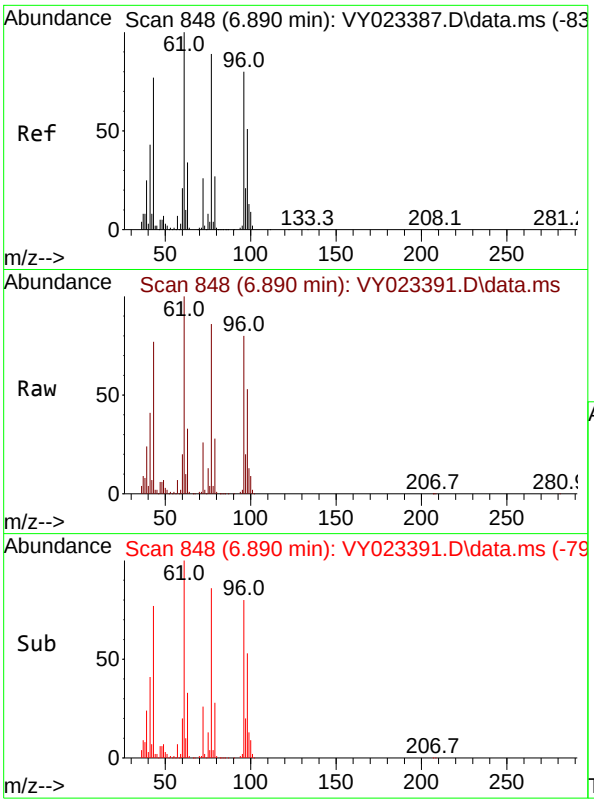


#26
2,2-Dichloropropane
Concen: 49.626 ug/l
RT: 6.884 min Scan# 847
Delta R.T. -0.000 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion: 77 Resp: 416585

Ion	Ratio	Lower	Upper
77	100		
97	24.6	12.1	36.3





#27
cis-1,2-Dichloroethene
Concen: 52.485 ug/l
RT: 6.890 min Scan# 84
Delta R.T. -0.000 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion: 96 Resp: 34196

Ion	Ratio	Lower	Upper
96	100		
61	125.5	0.0	258.2
98	64.3	0.0	132.0

Instrument :
MSVOA_Y
ClientSampleId :
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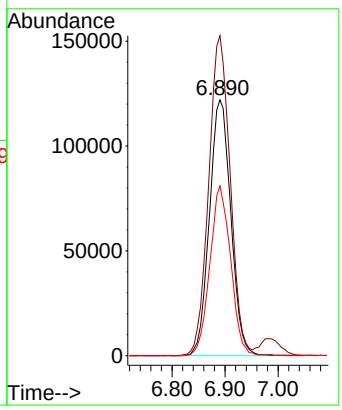
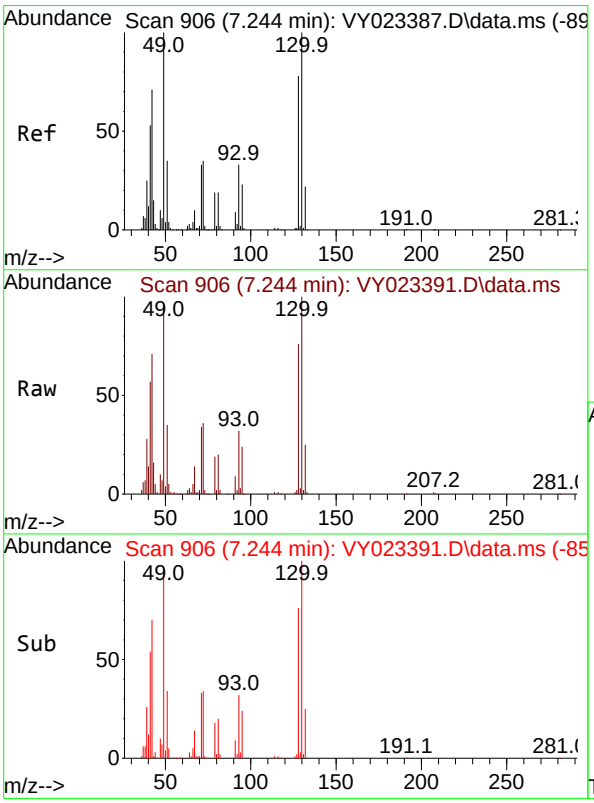
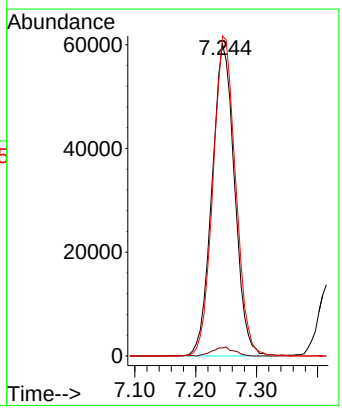


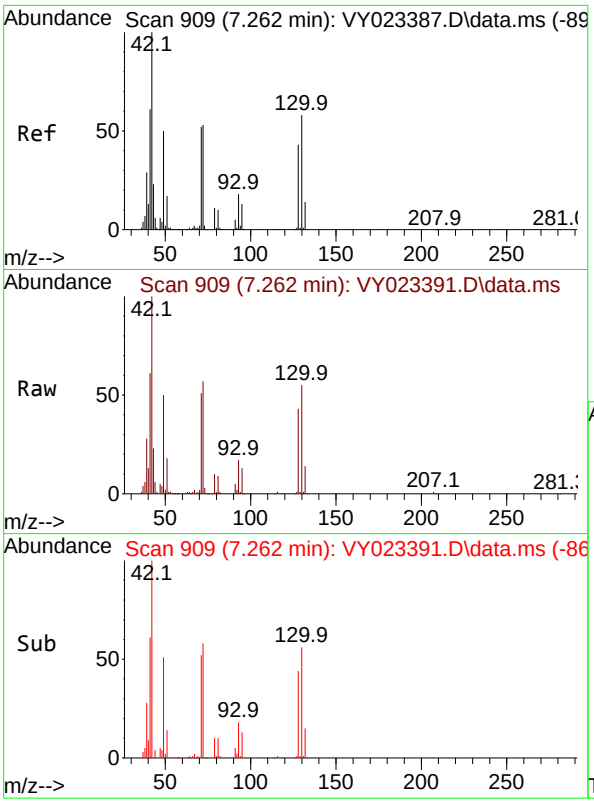


#28
Bromochloromethane
Concen: 45.427 ug/l
RT: 7.244 min Scan# 906
Delta R.T. -0.000 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion: 49 Resp: 155146

Ion	Ratio	Lower	Upper
49	100		
129	2.8	0.0	5.6
130	102.6	81.9	122.9

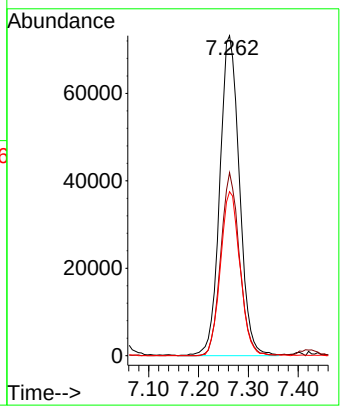




#29
Tetrahydrofuran
Concen: 253.317 ug/l
RT: 7.262 min Scan# 9
Delta R.T. -0.000 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion: 42 Resp: 20051

Ion	Ratio	Lower	Upper
42	100		
72	54.6	43.0	64.6
71	51.1	40.1	60.1



Instrument :
MSVOA_Y
ClientSampleId :
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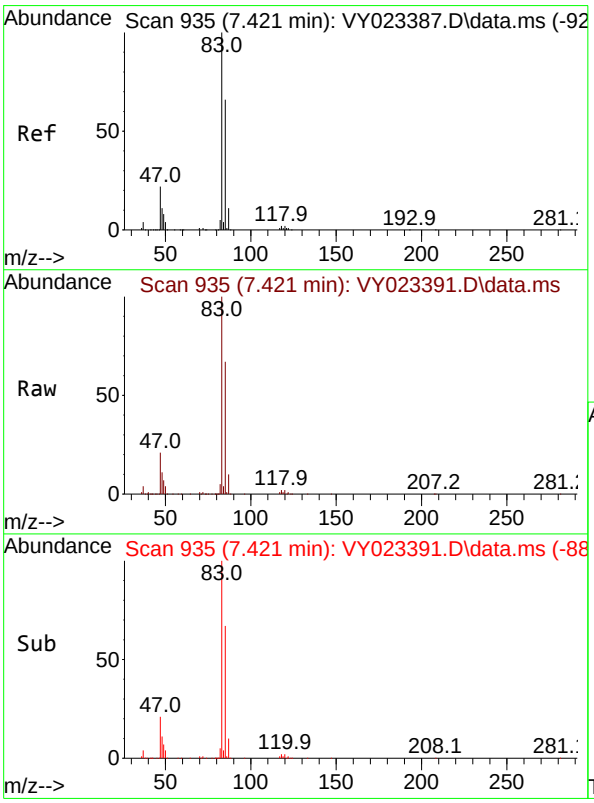
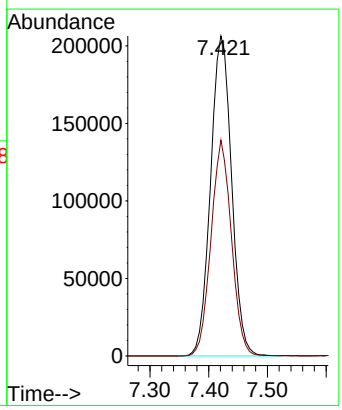
Supervised By :Mahesh Dadoda 10/10/2025

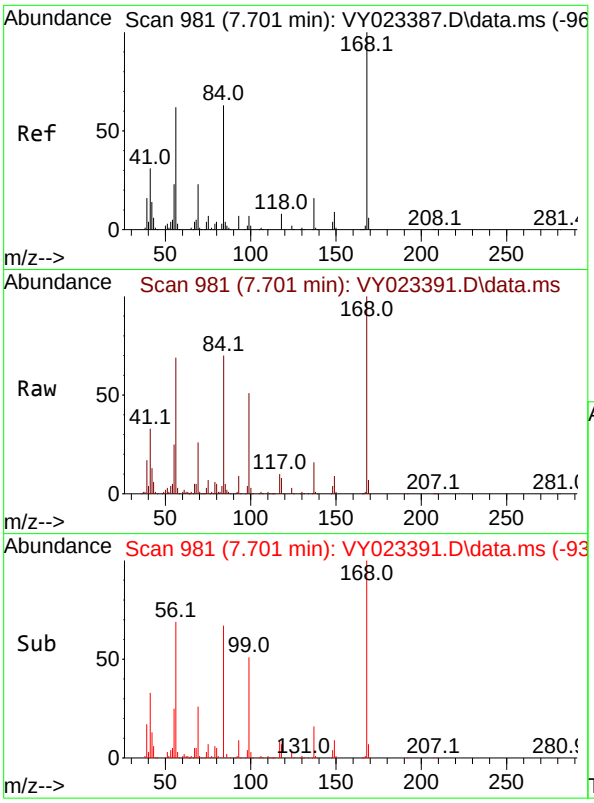


#30
Chloroform
Concen: 51.137 ug/l
RT: 7.421 min Scan# 935
Delta R.T. -0.000 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion: 83 Resp: 513997

Ion	Ratio	Lower	Upper
83	100		
85	67.5	52.5	78.7

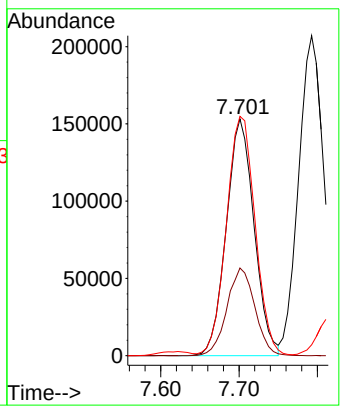




#31
Cyclohexane
Concen: 47.416 ug/l
RT: 7.701 min Scan# 9
Delta R.T. -0.000 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion: 56 Resp: 37881

Ion	Ratio	Lower	Upper
56	100		
69	37.1	30.0	45.0
84	99.4	81.2	121.8



Instrument :
MSVOA_Y
ClientSampleId :
ICVVY100725

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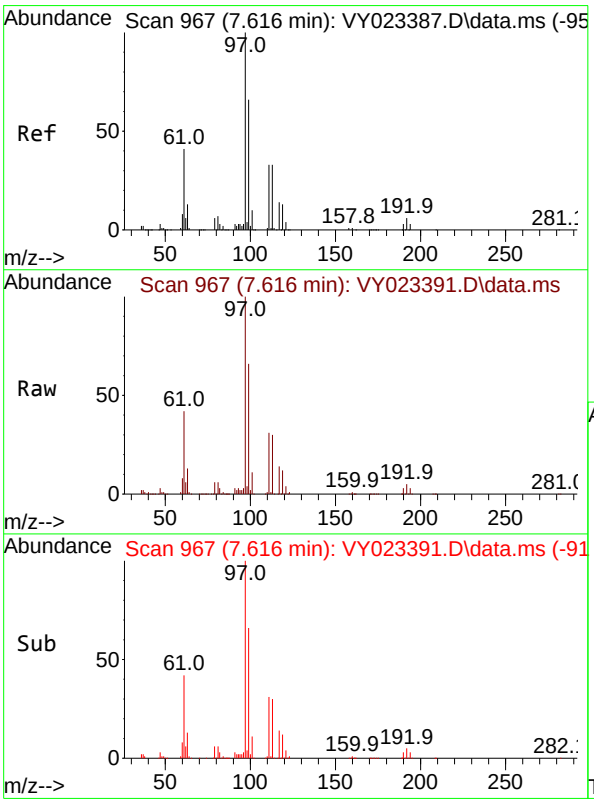
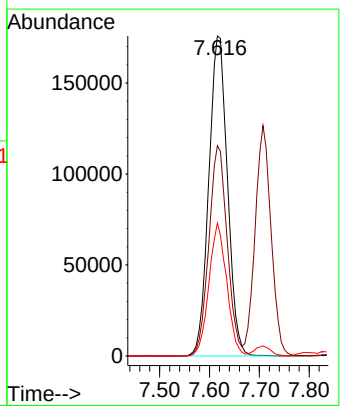
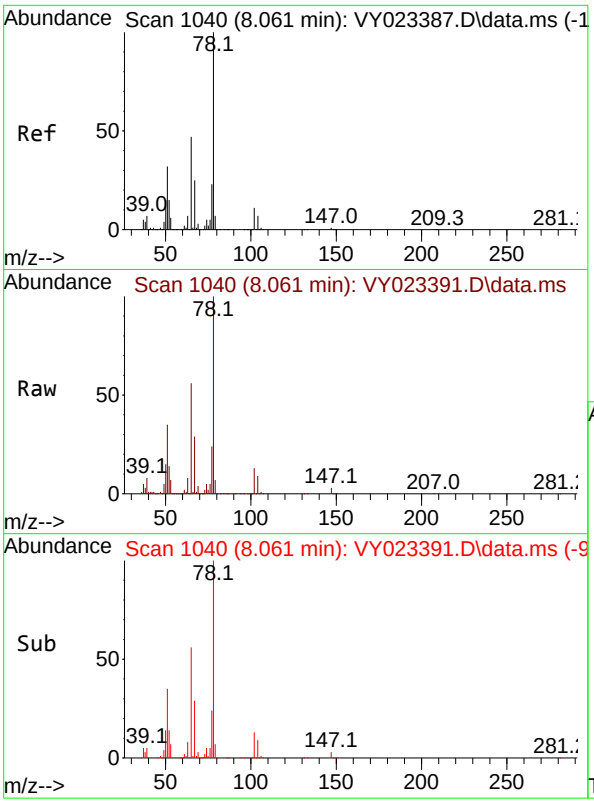


#32
1,1,1-Trichloroethane
Concen: 49.934 ug/l
RT: 7.616 min Scan# 967
Delta R.T. -0.000 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion: 97 Resp: 456112

Ion	Ratio	Lower	Upper
97	100		
99	64.7	51.4	77.2
61	39.8	31.9	47.9

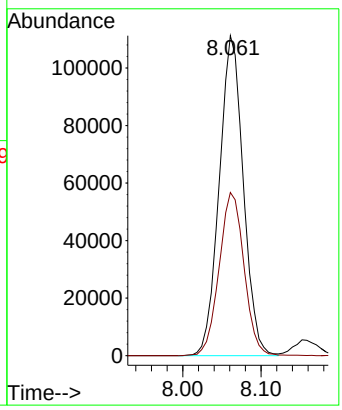




#33
1,2-Dichloroethane-d4
Concen: 49.450 ug/l
RT: 8.061 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion: 65 Resp: 23749

Ion	Ratio	Lower	Upper
65	100		
67	52.8	0.0	105.8



Instrument :
MSVOA_Y
ClientSampleId :
ICVVY100725

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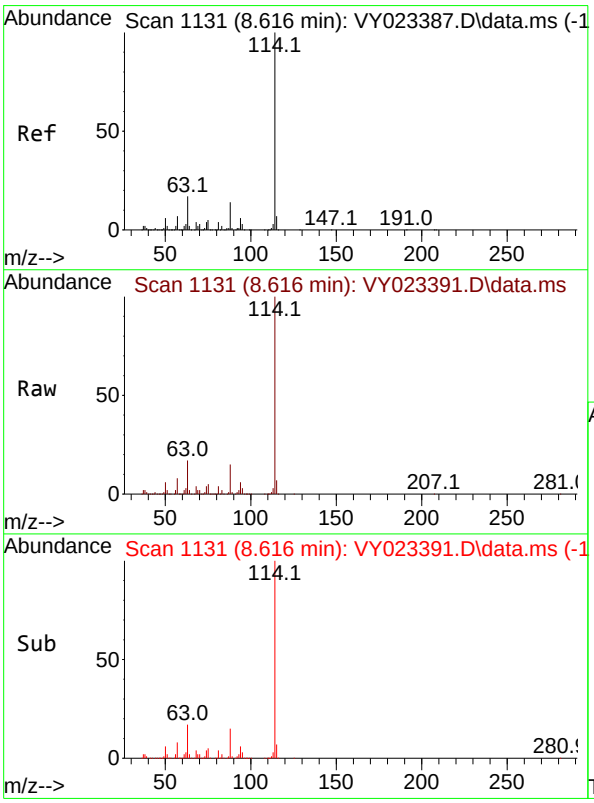
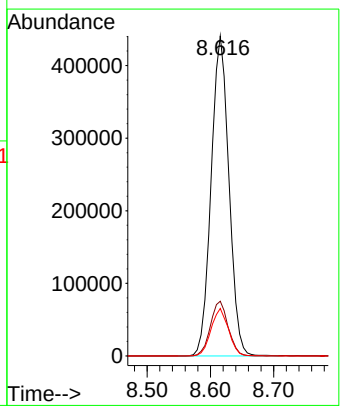
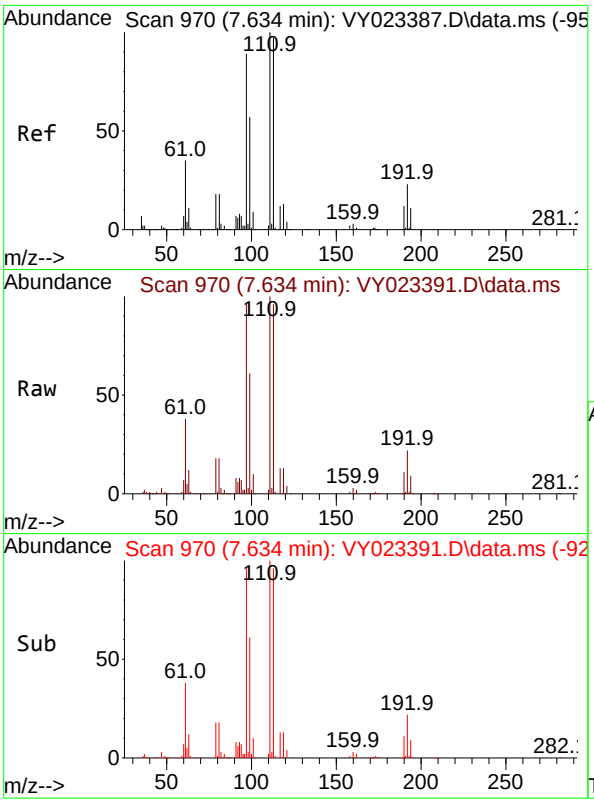


#34
1,4-Difluorobenzene
Concen: 50.000 ug/l
RT: 8.616 min Scan# 1131
Delta R.T. -0.000 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion:114 Resp: 861639

Ion	Ratio	Lower	Upper
114	100		
63	17.1	0.0	34.2
88	14.9	0.0	28.4

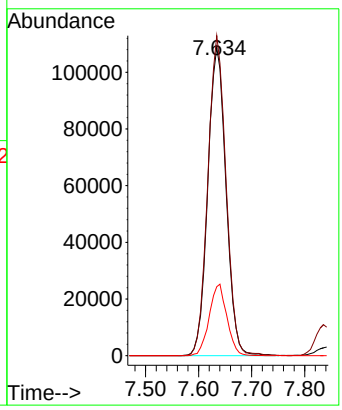




#35
Dibromofluoromethane
Concen: 49.116 ug/l
RT: 7.634 min Scan# 9
Delta R.T. -0.000 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion:113 Resp: 26003

Ion	Ratio	Lower	Upper
113	100		
111	103.5	81.8	122.6
192	22.5	18.0	27.0



Instrument :
MSVOA_Y
ClientSampleId :
ICVVY100725

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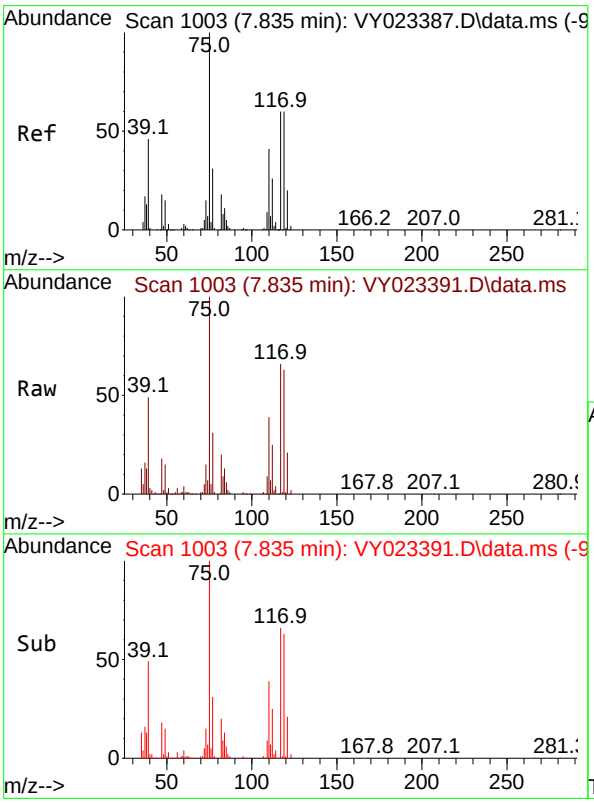
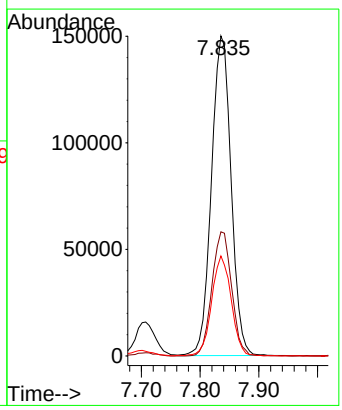
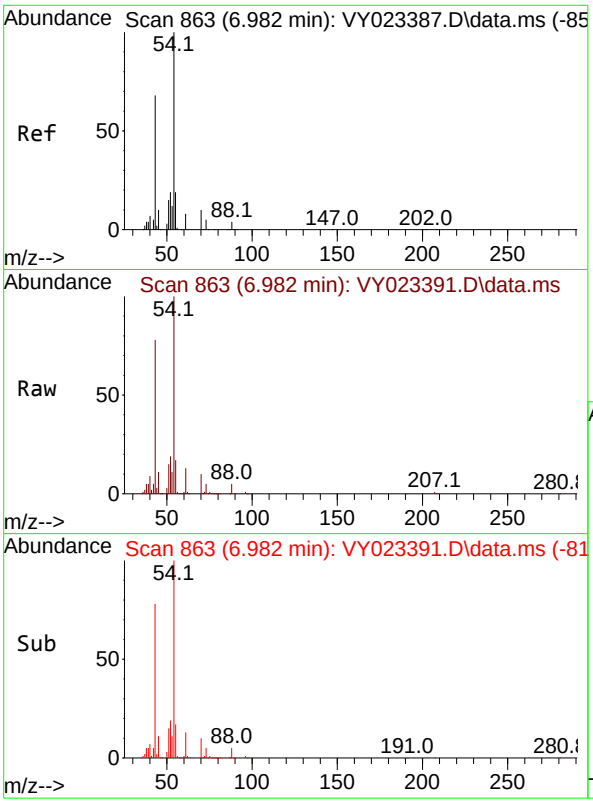


#36
1,1-Dichloropropene
Concen: 49.761 ug/l
RT: 7.835 min Scan# 1003
Delta R.T. -0.000 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion: 75 Resp: 348786

Ion	Ratio	Lower	Upper
75	100		
110	38.9	19.9	59.7
77	31.0	25.0	37.6





#37
Ethyl Acetate
Concen: 49.740 ug/l
RT: 6.982 min Scan# 8
Delta R.T. -0.000 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion: 43 Resp: 13811

Ion	Ratio	Lower	Upper
43	100		
61	15.8	11.8	17.8
70	12.7	10.5	15.7

Instrument :
MSVOA_Y
ClientSampleId :
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Manual Integrations
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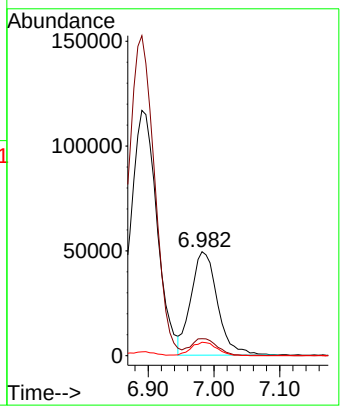
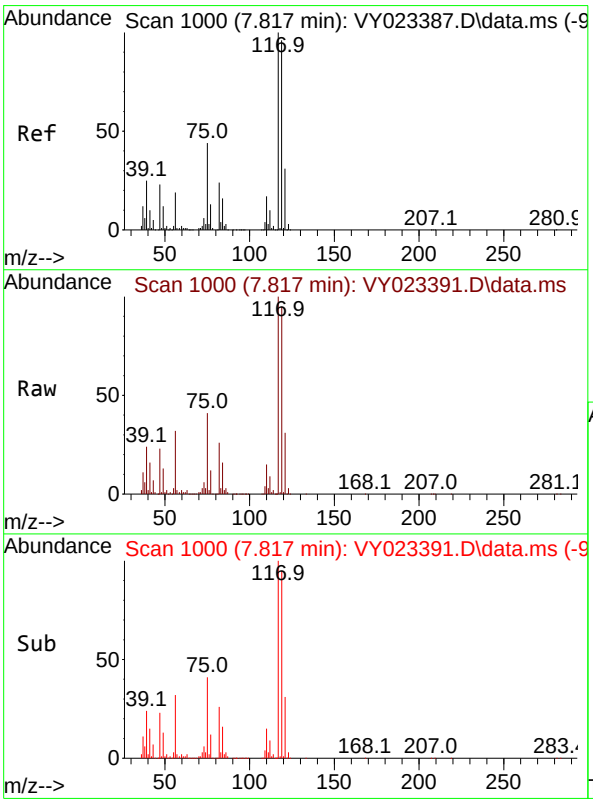
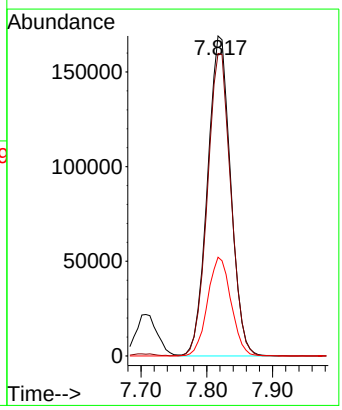


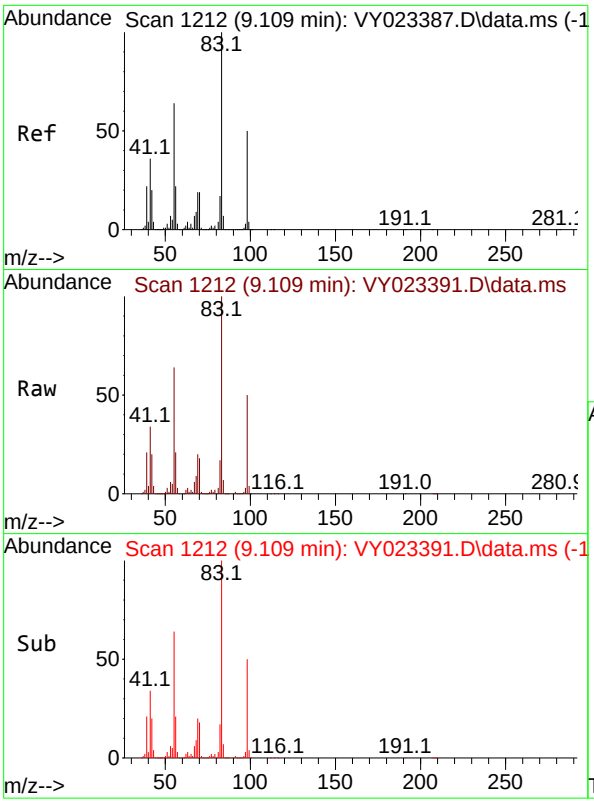


#38
Carbon Tetrachloride
Concen: 48.671 ug/l
RT: 7.817 min Scan# 1000
Delta R.T. -0.000 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion:117 Resp: 413653

Ion	Ratio	Lower	Upper
117	100		
119	94.5	76.8	115.2
121	30.8	24.5	36.7

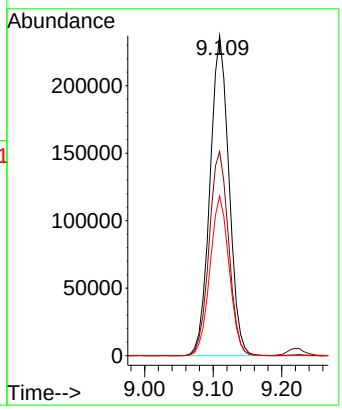




#39
Methylcyclohexane
Concen: 49.970 ug/l
RT: 9.109 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion: 83 Resp: 45603

Ion	Ratio	Lower	Upper
83	100		
55	63.8	51.4	77.2
98	49.9	40.4	60.6



Instrument :
MSVOA_Y
ClientSampleId :
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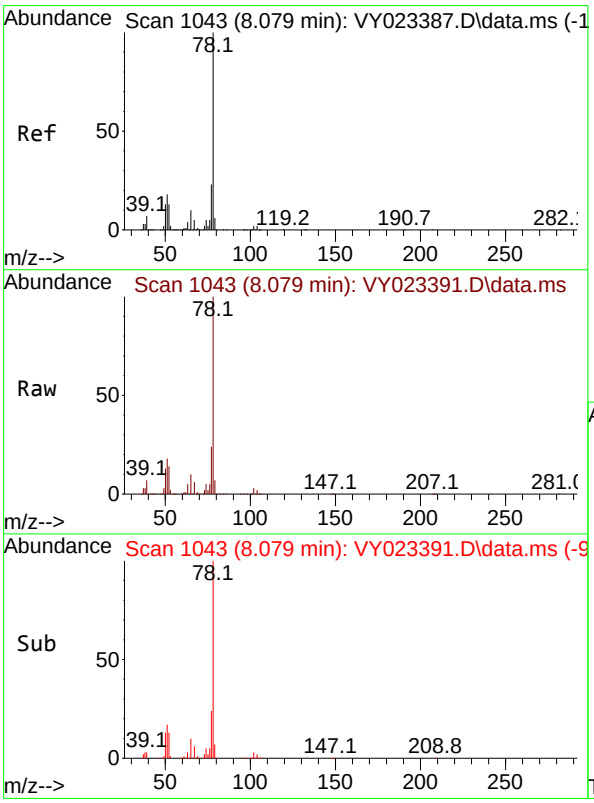
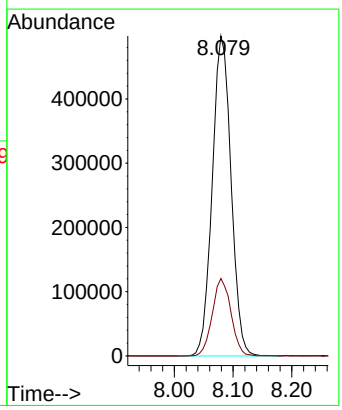
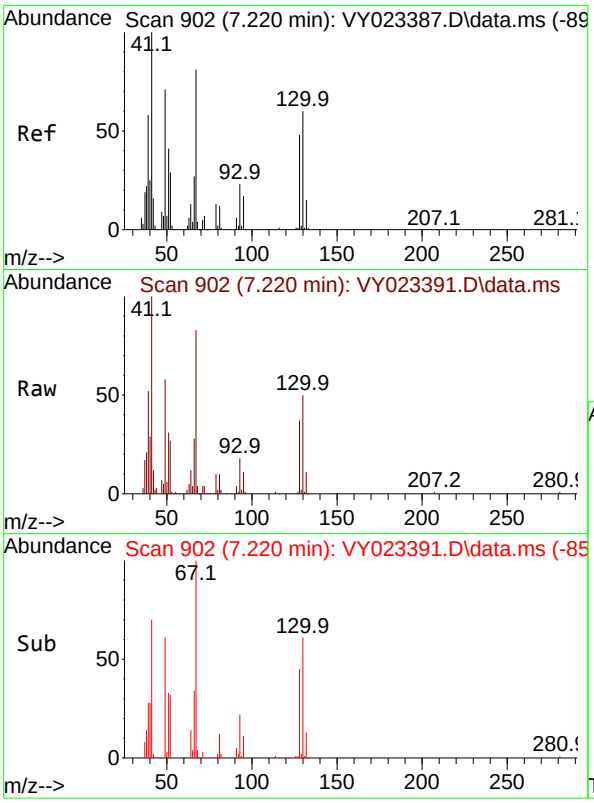


#40
Benzene
Concen: 49.906 ug/l
RT: 8.079 min Scan# 1043
Delta R.T. -0.000 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion: 78 Resp: 1107790

Ion	Ratio	Lower	Upper
78	100		
77	24.2	18.3	27.5

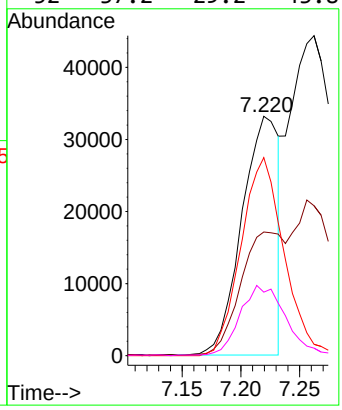




#41
Methacrylonitrile
Concen: 48.008 ug/l
RT: 7.220 min Scan# 9
Delta R.T. -0.000 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion: 41 Resp: 7210

Ion	Ratio	Lower	Upper
41	100		
39	62.2	52.2	78.4
67	97.9	74.9	112.3
52	37.2	29.2	43.8



Instrument :
MSVOA_Y
ClientSampleId :
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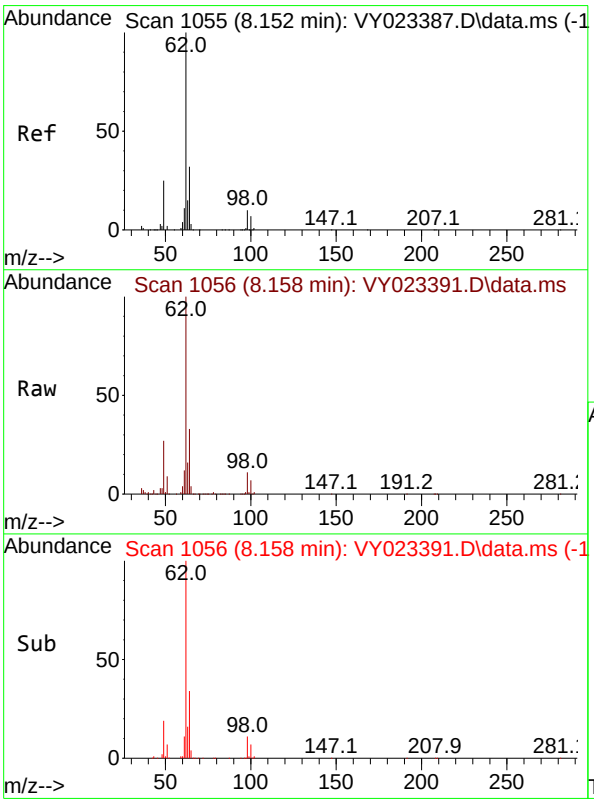
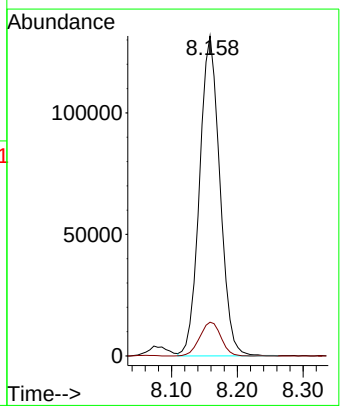
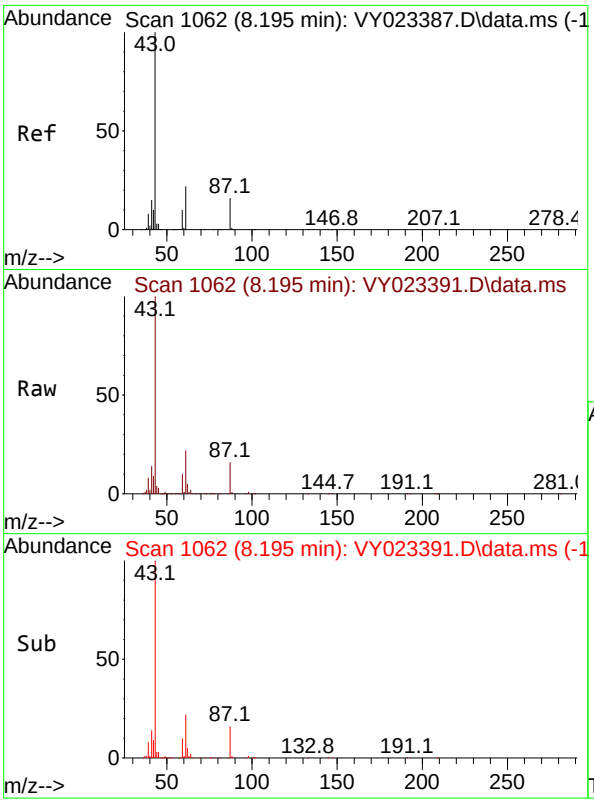


#42
1,2-Dichloroethane
Concen: 49.318 ug/l
RT: 8.158 min Scan# 1056
Delta R.T. 0.006 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion: 62 Resp: 282332

Ion	Ratio	Lower	Upper
62	100		
98	11.1	0.0	21.6

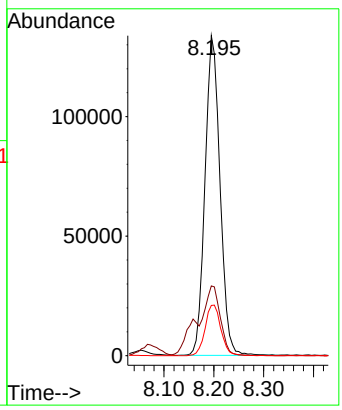




#43
Isopropyl Acetate
Concen: 50.548 ug/l
RT: 8.195 min Scan# 1(
Delta R.T. -0.000 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion: 43 Resp: 27988

Ion	Ratio	Lower	Upper
43	100		
61	22.8	18.1	27.1
87	16.7	13.5	20.3



Instrument :
MSVOA_Y
ClientSampleId :
ICVVY100725

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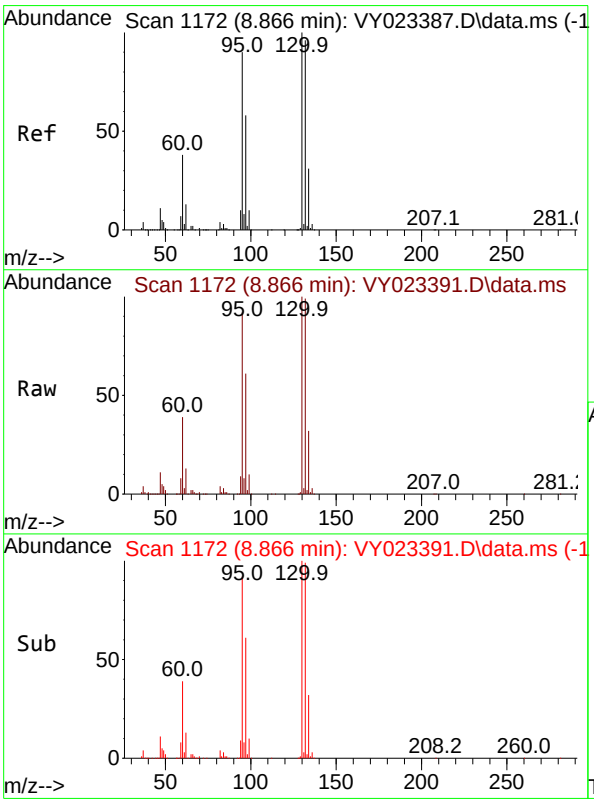
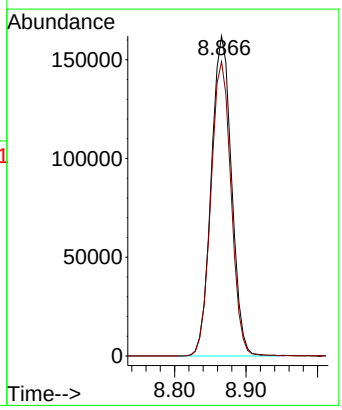
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

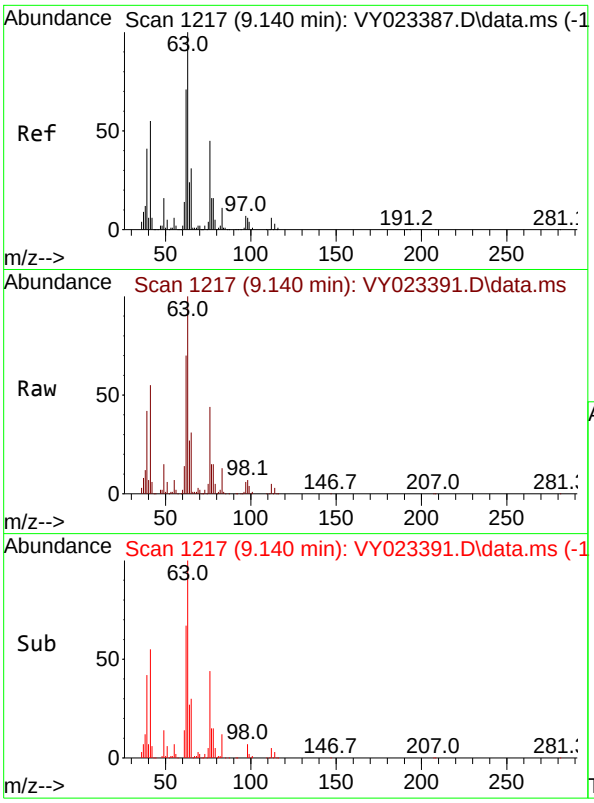


#44
Trichloroethene
Concen: 49.120 ug/l
RT: 8.866 min Scan# 1172
Delta R.T. -0.000 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion:130 Resp: 319131

Ion	Ratio	Lower	Upper
130	100		
95	91.9	0.0	180.6

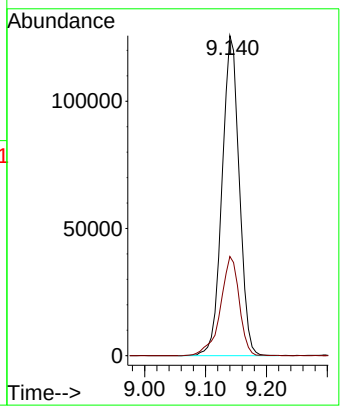




#45
1,2-Dichloropropane
Concen: 50.355 ug/l
RT: 9.140 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion: 63 Resp: 24688

Ion	Ratio	Lower	Upper
63	100		
65	31.0	24.9	37.3



Instrument :
MSVOA_Y
ClientSampleId :
ICVVY100725

Manual Integrations
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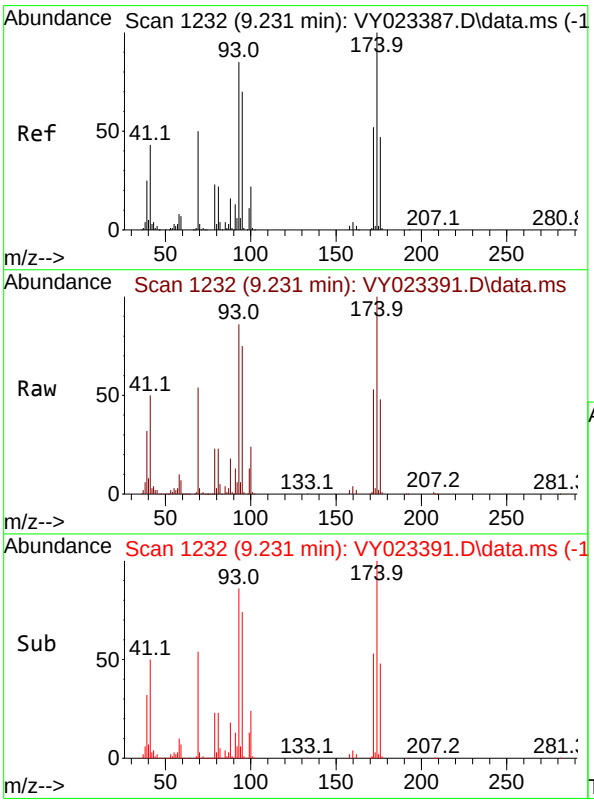
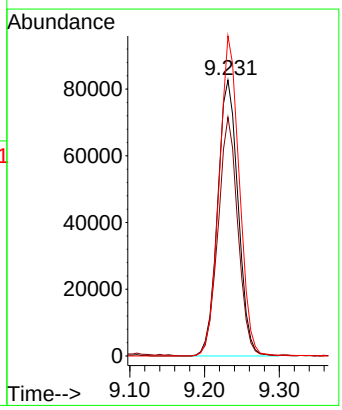
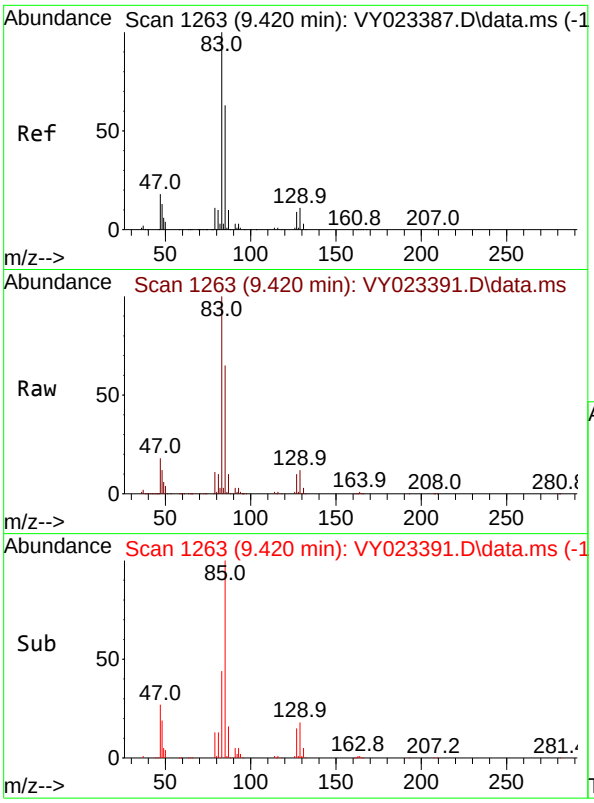


#46
Dibromomethane
Concen: 50.885 ug/l
RT: 9.231 min Scan# 1232
Delta R.T. -0.000 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion: 93 Resp: 157758

Ion	Ratio	Lower	Upper
93	100		
95	83.6	65.4	98.0
174	113.9	92.9	139.3

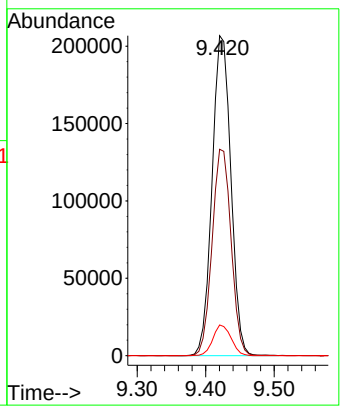




#47
Bromodichloromethane
Concen: 50.450 ug/l
RT: 9.420 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion: 83 Resp: 39391

Ion	Ratio	Lower	Upper
83	100		
85	64.5	50.8	76.2
127	9.6	7.4	11.2



Instrument :
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ClientSampleId :
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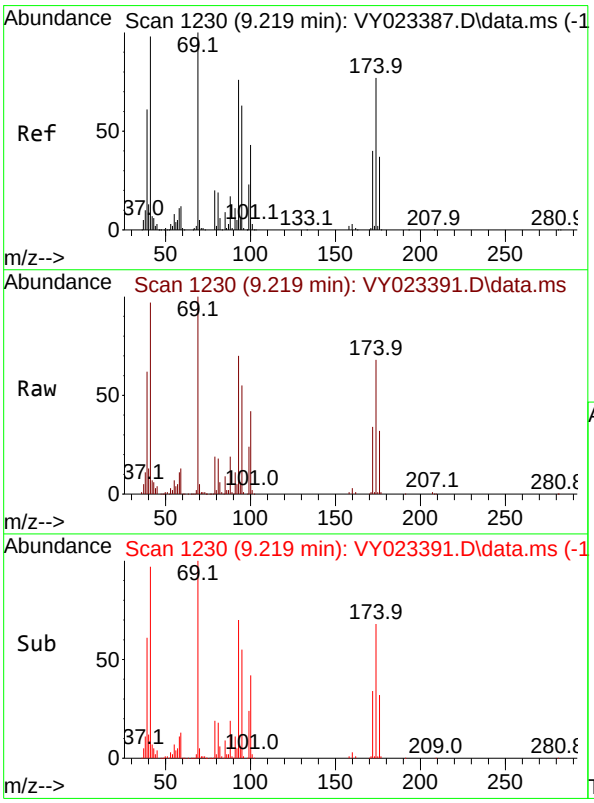
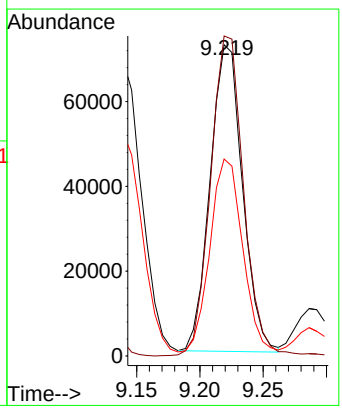
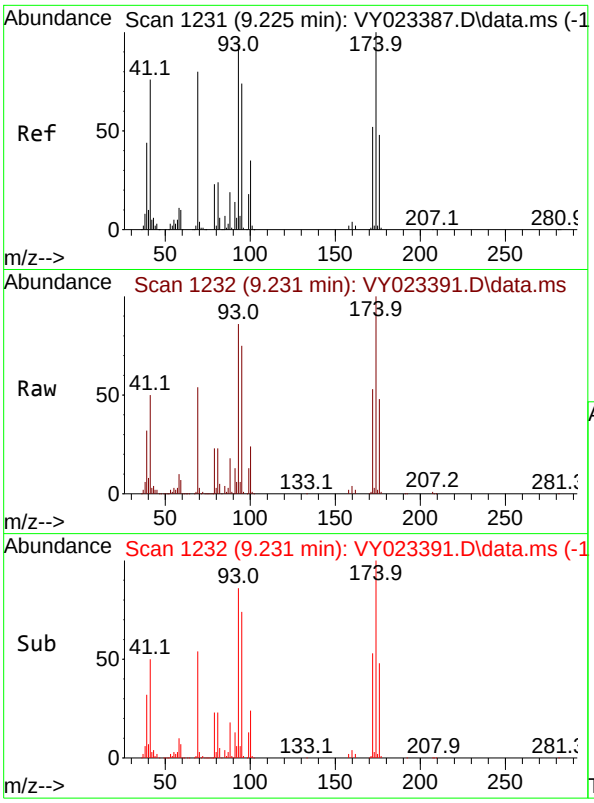


#48
Methyl methacrylate
Concen: 49.440 ug/l
RT: 9.219 min Scan# 1230
Delta R.T. -0.000 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion: 41 Resp: 128606

Ion	Ratio	Lower	Upper
41	100		
69	106.6	81.0	121.4
39	63.5	48.2	72.4

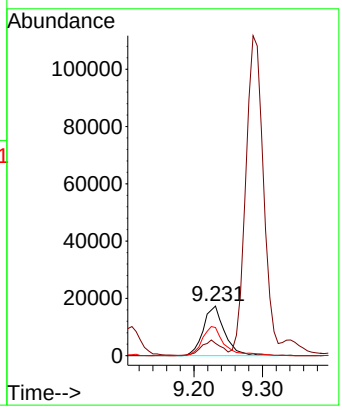




#49
1,4-Dioxane
Concen: 1039.252 ug/l
RT: 9.231 min Scan# 1
Delta R.T. 0.006 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion: 88 Resp: 3735

Ion	Ratio	Lower	Upper
88	100		
43	27.4	21.8	32.8
58	61.4	46.8	70.2



Instrument :
MSVOA_Y
ClientSampleId :
ICVVY100725

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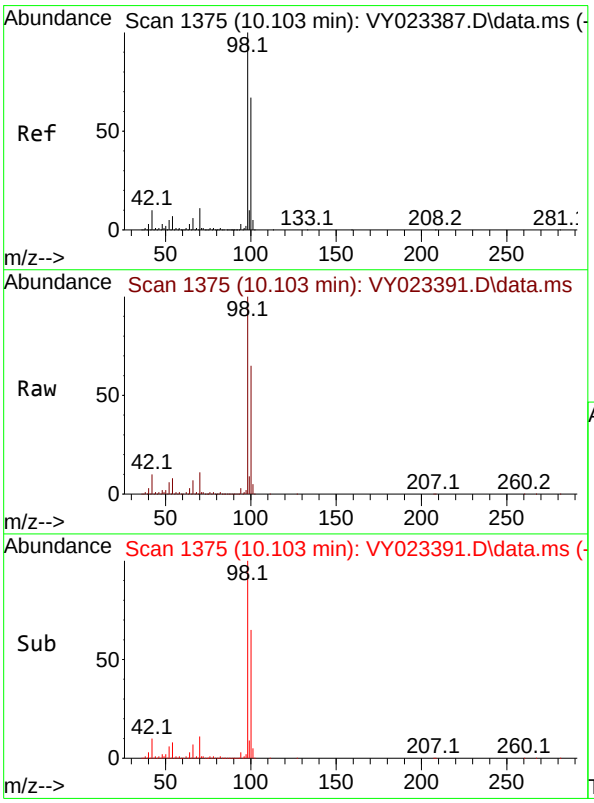
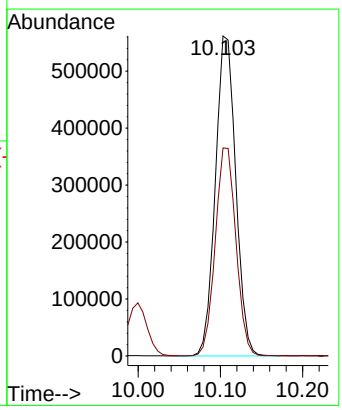
Supervised By :Mahesh Dadoda 10/10/2025

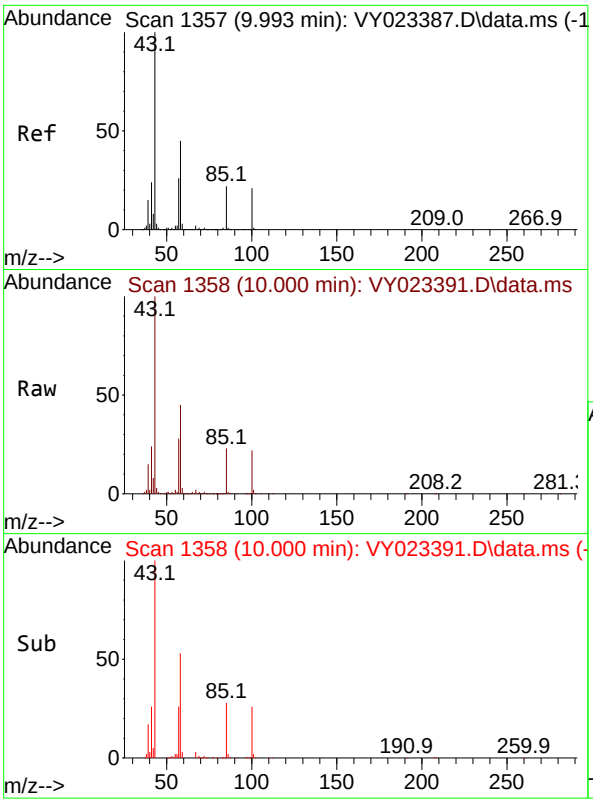


#50
Toluene-d8
Concen: 49.228 ug/l
RT: 10.103 min Scan# 1375
Delta R.T. -0.000 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion: 98 Resp: 970614

Ion	Ratio	Lower	Upper
98	100		
100	66.1	53.0	79.4

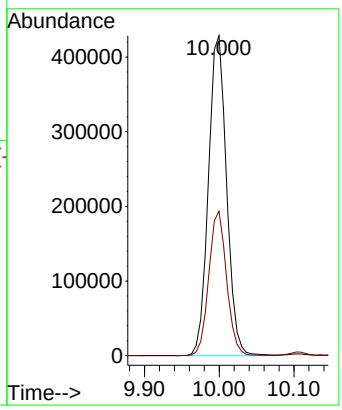




#51
4-Methyl-2-Pentanone
Concen: 253.421 ug/l
RT: 10.000 min Scan# 1
Delta R.T. 0.006 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion: 43 Resp: 72499

Ion	Ratio	Lower	Upper
43	100		
58	44.4	35.3	52.9



Instrument :
MSVOA_Y
ClientSampleId :
ICVVY100725

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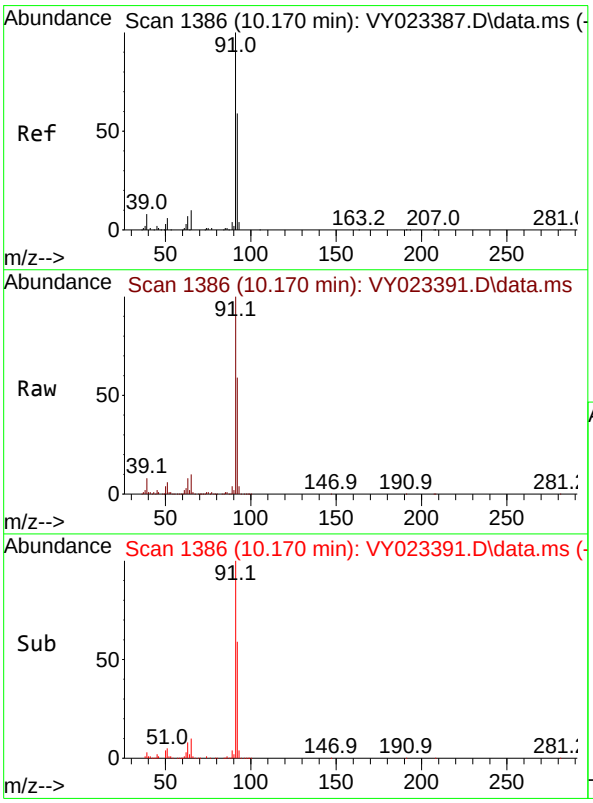
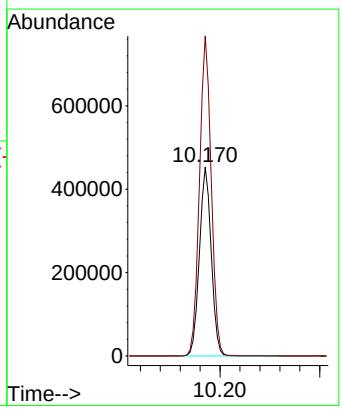
Supervised By :Mahesh Dadoda 10/10/2025

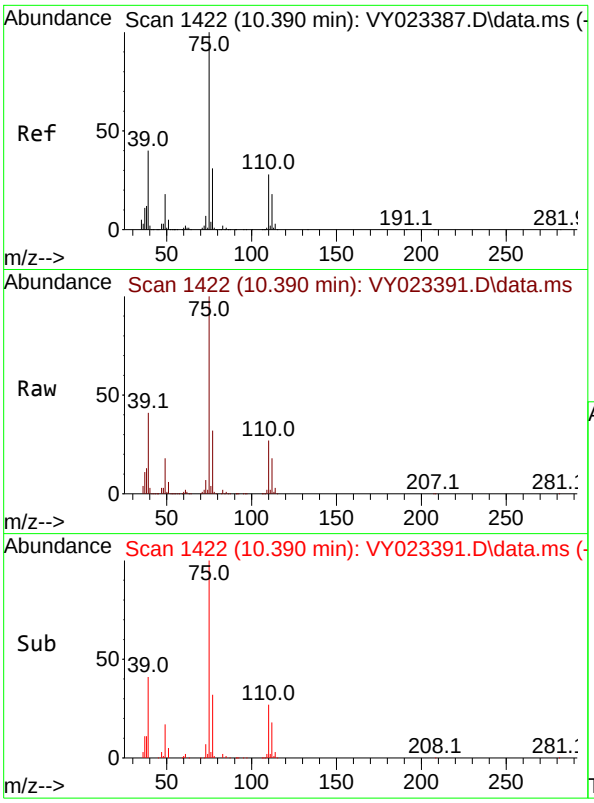


#52
Toluene
Concen: 51.556 ug/l
RT: 10.170 min Scan# 1386
Delta R.T. -0.000 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion: 92 Resp: 743055

Ion	Ratio	Lower	Upper
92	100		
91	168.9	136.4	204.6

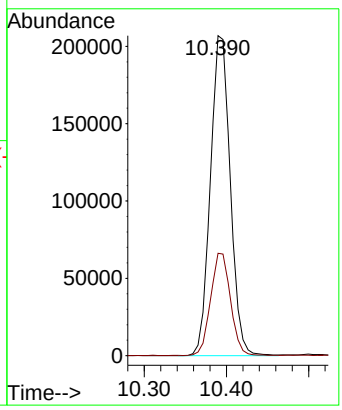




#53
t-1,3-Dichloropropene
Concen: 51.160 ug/l
RT: 10.390 min Scan# 14
Delta R.T. -0.000 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion: 75 Resp: 34733

Ion	Ratio	Lower	Upper
75	100		
77	31.9	25.1	37.7



Instrument :
MSVOA_Y
ClientSampleId :
ICVVY100725

Manual Integrations
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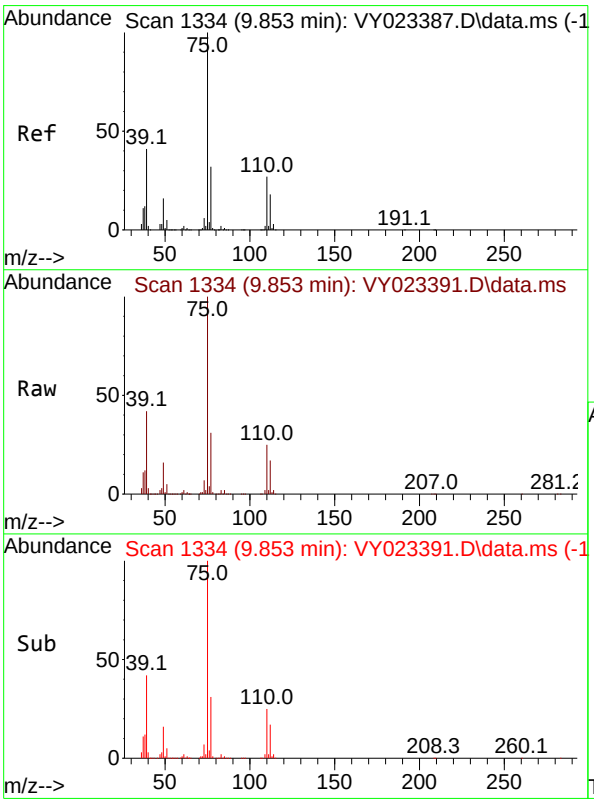
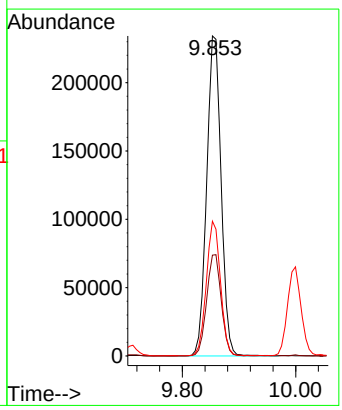
Supervised By :Mahesh Dadoda 10/10/2025

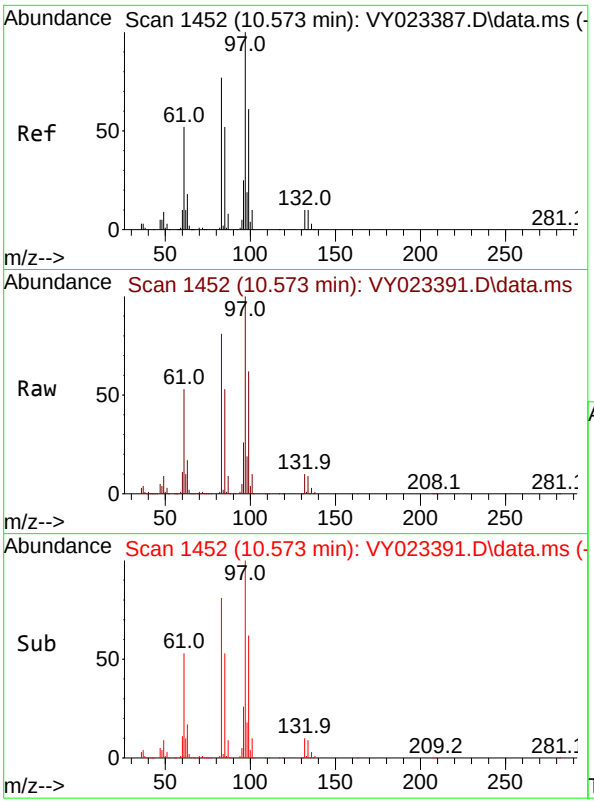


#54
cis-1,3-Dichloropropene
Concen: 51.649 ug/l
RT: 9.853 min Scan# 1334
Delta R.T. -0.000 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion: 75 Resp: 413860

Ion	Ratio	Lower	Upper
75	100		
77	31.5	25.4	38.0
39	42.1	32.8	49.2

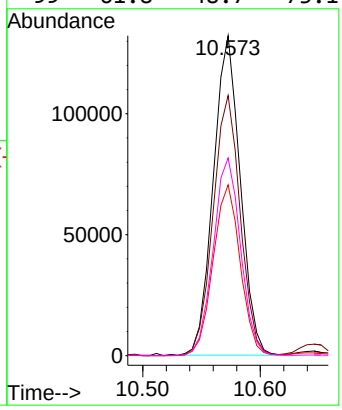




#55
1,1,2-Trichloroethane
Concen: 50.430 ug/l
RT: 10.573 min Scan# 14
Delta R.T. -0.000 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion: 97 Resp: 21024

Ion	Ratio	Lower	Upper
97	100		
83	81.4	61.8	92.6
85	53.5	41.3	61.9
99	61.8	48.7	73.1



Instrument :
MSVOA_Y
ClientSampleId :
ICVVY100725

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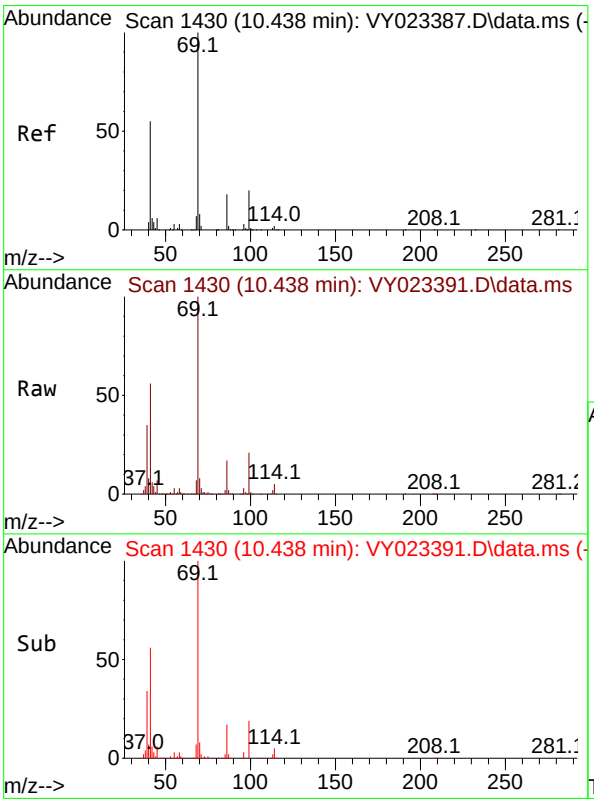
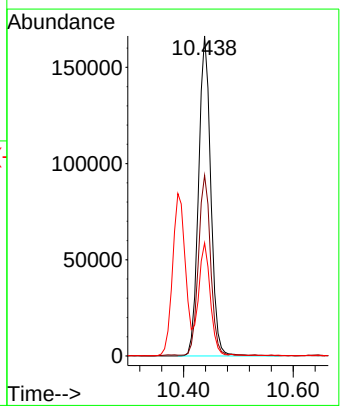
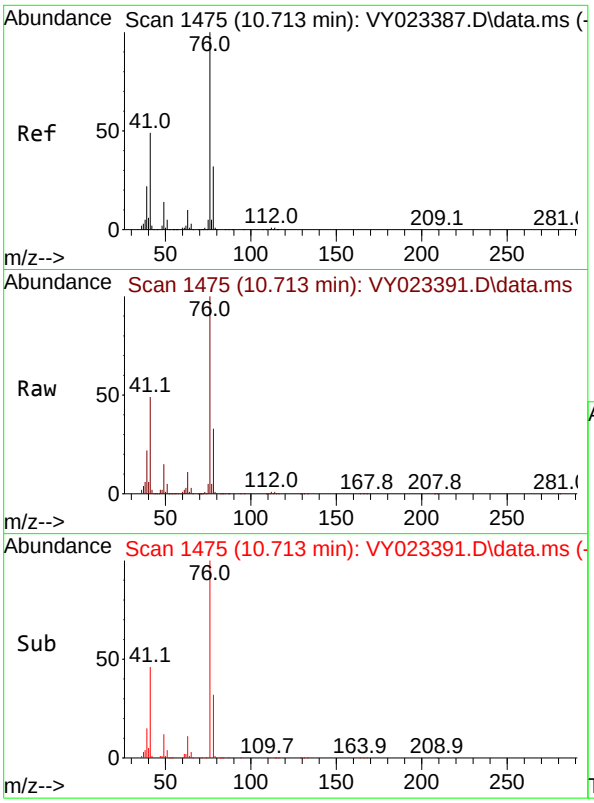


#56
Ethyl methacrylate
Concen: 53.385 ug/l
RT: 10.438 min Scan# 1430
Delta R.T. -0.000 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion: 69 Resp: 256731

Ion	Ratio	Lower	Upper
69	100		
41	56.1	44.6	67.0
39	34.2	27.0	40.4

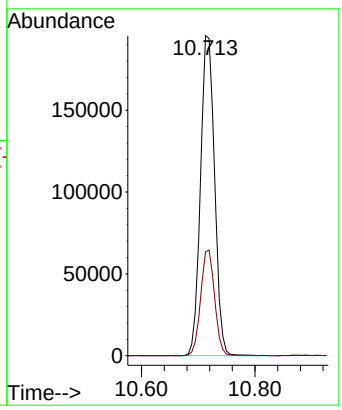




#57
1,3-Dichloropropane
Concen: 51.113 ug/l
RT: 10.713 min Scan# 14
Delta R.T. -0.000 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion: 76 Resp: 33767

Ion	Ratio	Lower	Upper
76	100		
78	32.8	25.9	38.9



Instrument :
MSVOA_Y
ClientSampleId :
ICVVY100725

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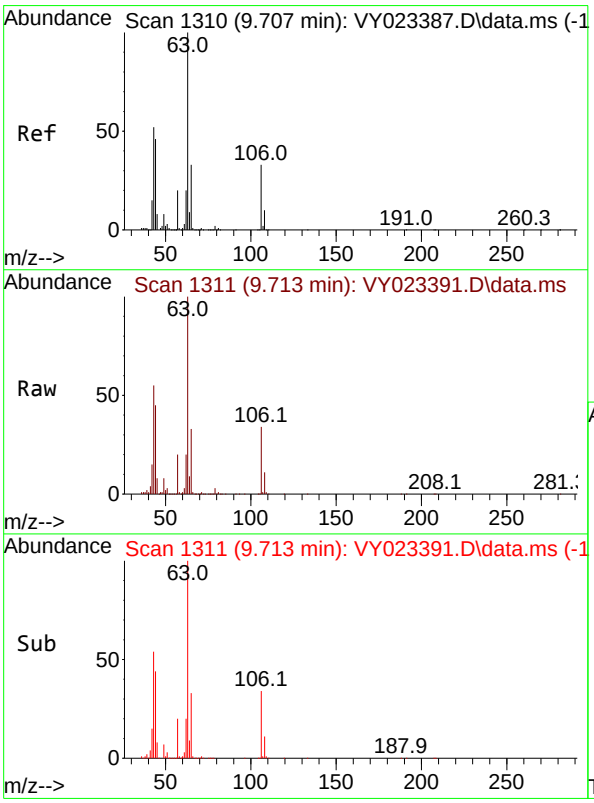
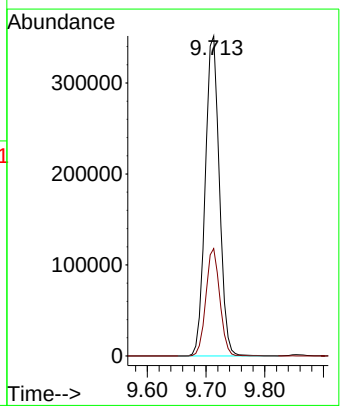
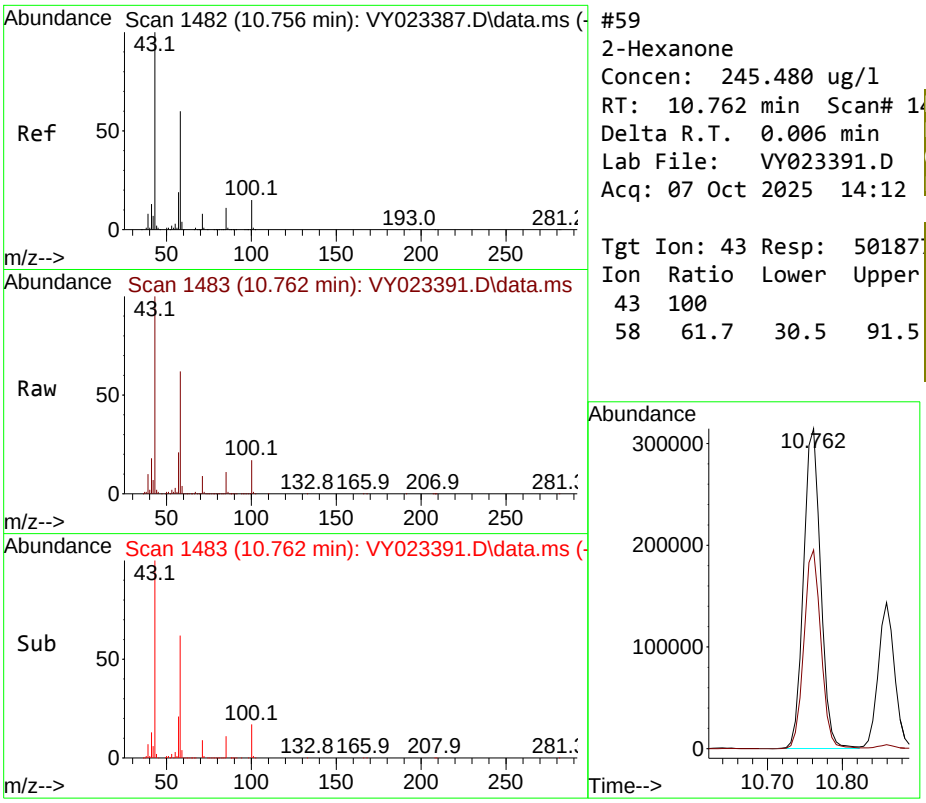


#58
2-Chloroethyl Vinyl ether
Concen: 272.133 ug/l
RT: 9.713 min Scan# 1311
Delta R.T. 0.006 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion: 63 Resp: 586266

Ion	Ratio	Lower	Upper
63	100		
106	33.2	26.6	39.8





#59
2-Hexanone
Concen: 245.480 ug/l
RT: 10.762 min Scan# 14
Delta R.T. 0.006 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion: 43 Resp: 50187

Ion	Ratio	Lower	Upper
43	100		
58	61.7	30.5	91.5

Instrument :
MSVOA_Y
ClientSampleId :
ICVVY100725

Manual Integrations
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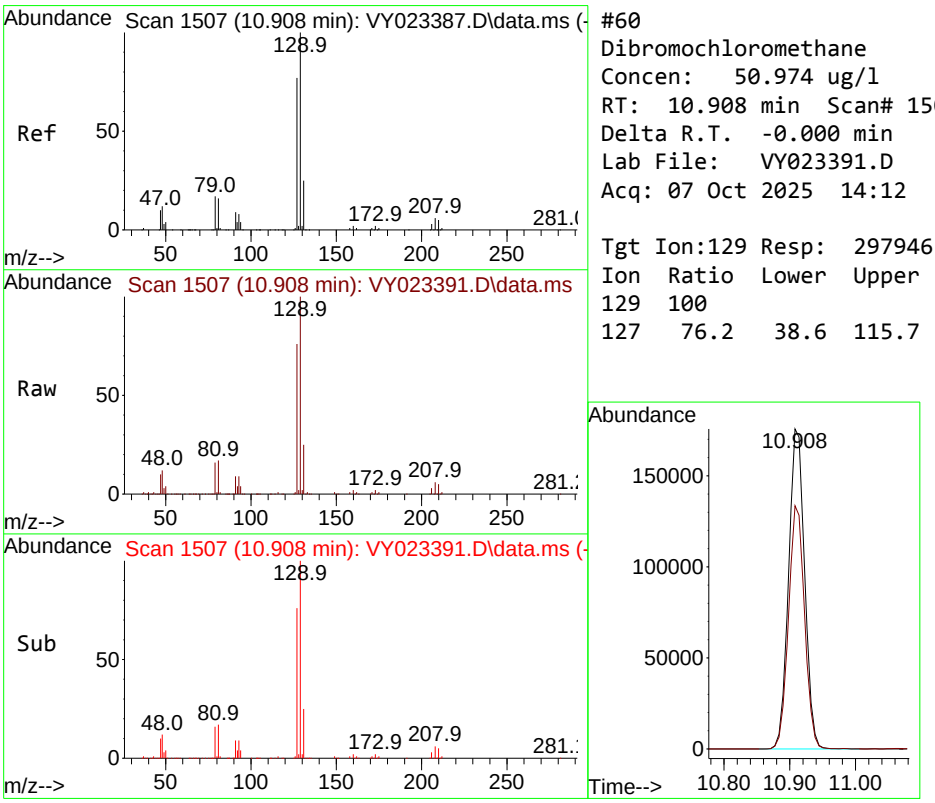
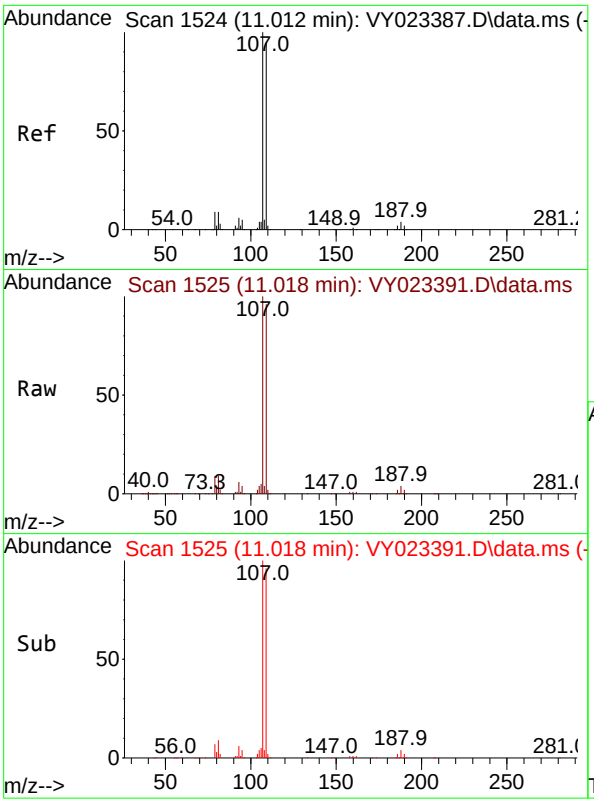


#60
Dibromochloromethane
Concen: 50.974 ug/l
RT: 10.908 min Scan# 1507
Delta R.T. -0.000 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion:129 Resp: 297946

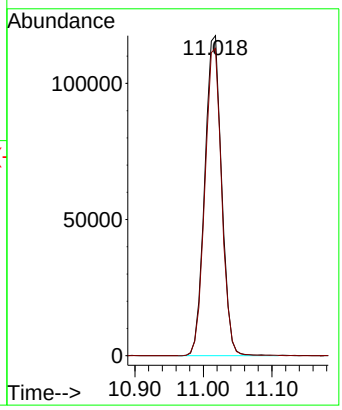
Ion	Ratio	Lower	Upper
129	100		
127	76.2	38.6	115.7



#61
1,2-Dibromoethane
Concen: 50.658 ug/l
RT: 11.018 min Scan# 1
Delta R.T. 0.006 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion:107 Resp: 20141

Ion	Ratio	Lower	Upper
107	100		
109	95.4	76.1	114.1



Instrument :
MSVOA_Y
ClientSampleId :
ICVVY100725

Manual Integrations
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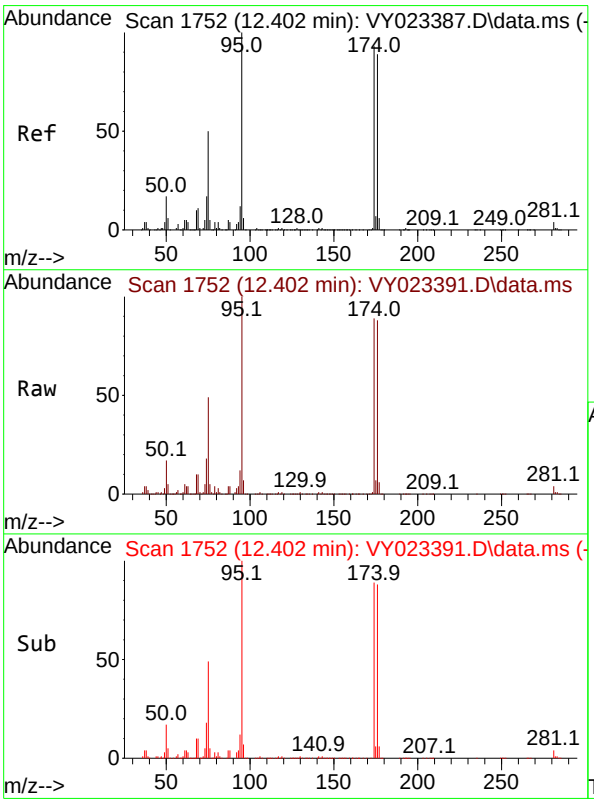
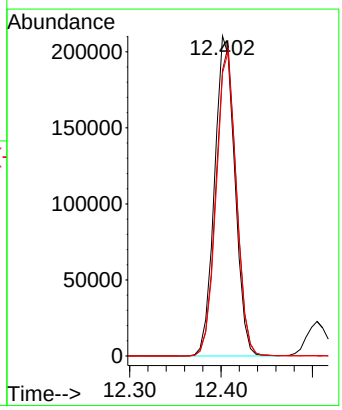
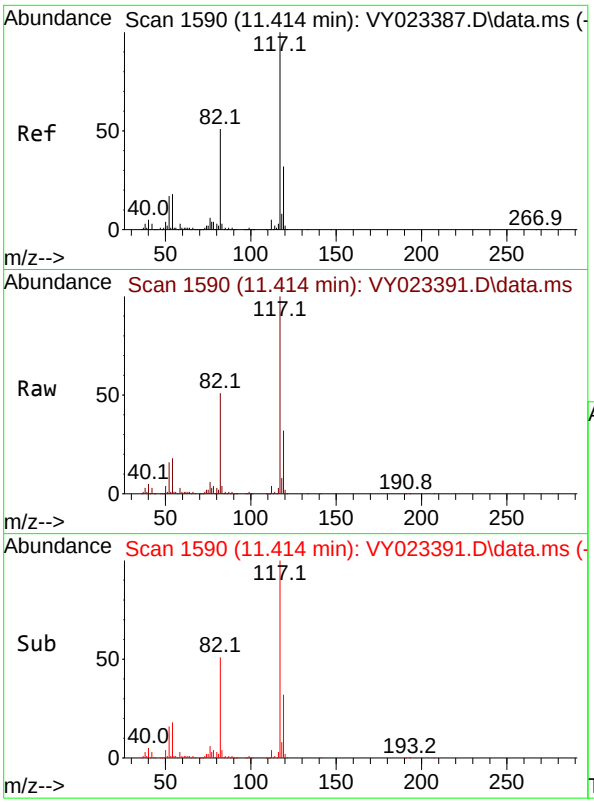


#62
4-Bromofluorobenzene
Concen: 49.881 ug/l
RT: 12.402 min Scan# 1752
Delta R.T. -0.000 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion: 95 Resp: 324700

Ion	Ratio	Lower	Upper
95	100		
174	96.3	0.0	192.8
176	93.9	0.0	187.6

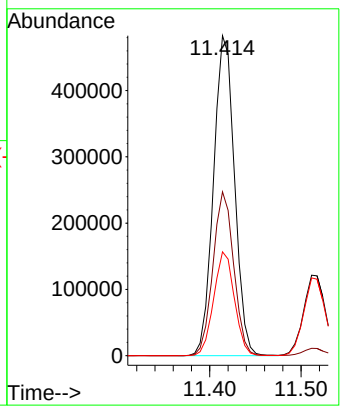




#63
Chlorobenzene-d5
Concen: 50.000 ug/l
RT: 11.414 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion:117 Resp: 77137

Ion	Ratio	Lower	Upper
117	100		
82	51.2	41.0	61.4
119	32.5	25.6	38.4



Instrument :
MSVOA_Y
ClientSampleId :
ICVVY100725

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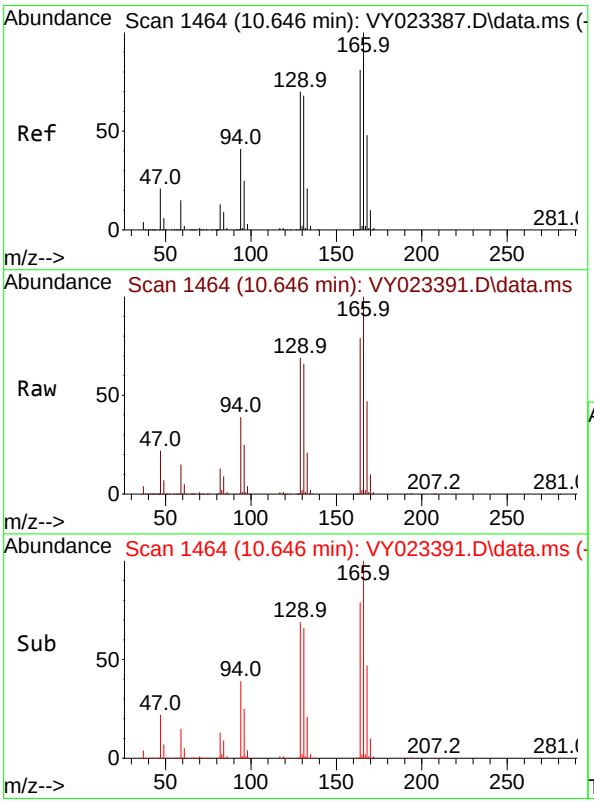
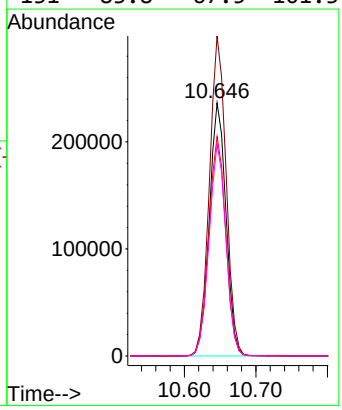
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

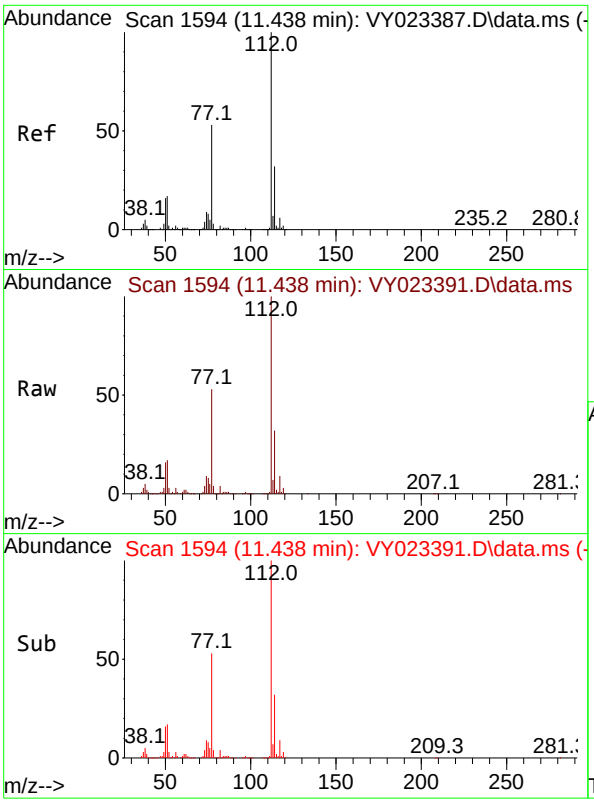


#64
Tetrachloroethene
Concen: 48.087 ug/l
RT: 10.646 min Scan# 1464
Delta R.T. -0.000 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion:164 Resp: 382998

Ion	Ratio	Lower	Upper
164	100		
166	126.4	99.4	149.0
129	86.7	69.4	104.2
131	83.8	67.5	101.3

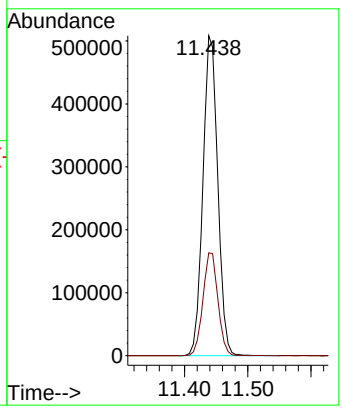




#65
Chlorobenzene
Concen: 49.381 ug/l
RT: 11.438 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion:112 Resp: 82846

Ion	Ratio	Lower	Upper
112	100		
114	32.2	25.6	38.4



Instrument :
MSVOA_Y
ClientSampleId :
ICVVY100725

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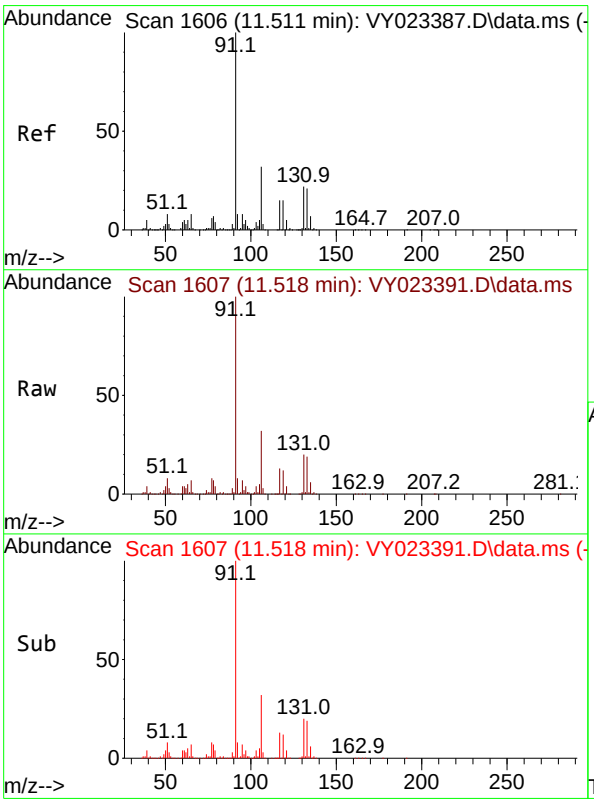
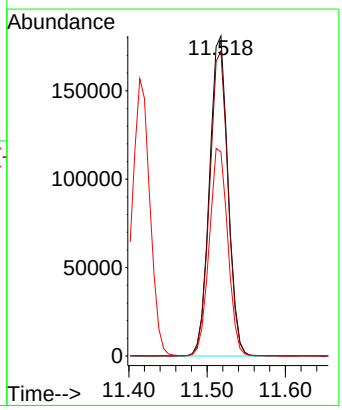
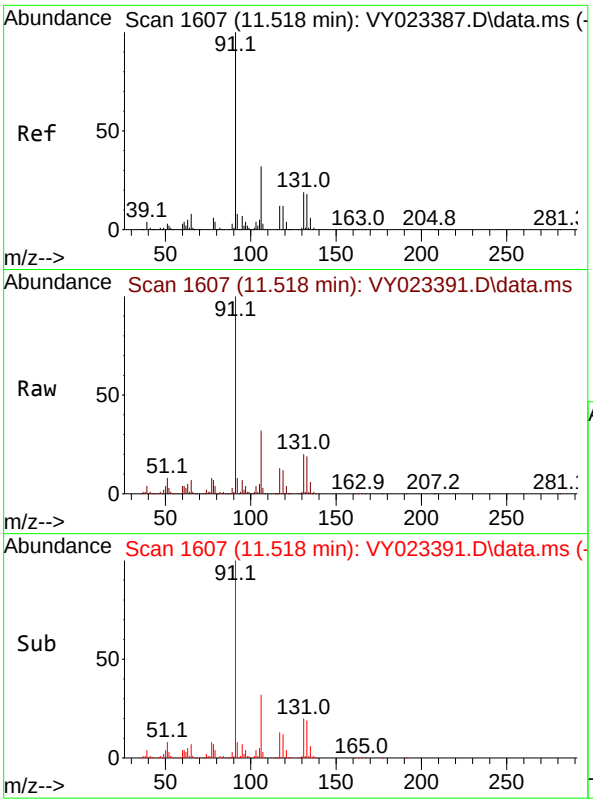


#66
1,1,1,2-Tetrachloroethane
Concen: 49.537 ug/l
RT: 11.518 min Scan# 1607
Delta R.T. 0.006 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion:131 Resp: 296157

Ion	Ratio	Lower	Upper
131	100		
133	95.1	48.4	145.2
119	65.2	32.4	97.2

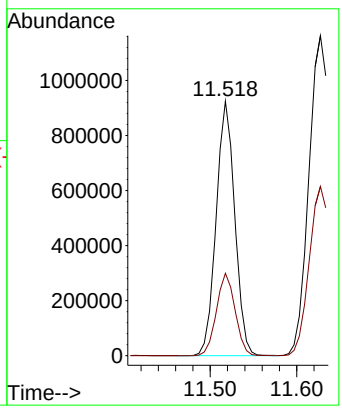




#67
Ethyl Benzene
Concen: 50.841 ug/l
RT: 11.518 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion: 91 Resp: 138069

Ion	Ratio	Lower	Upper
91	100		
106	32.4	25.8	38.8



Instrument :
MSVOA_Y
ClientSampleId :
ICVVY100725

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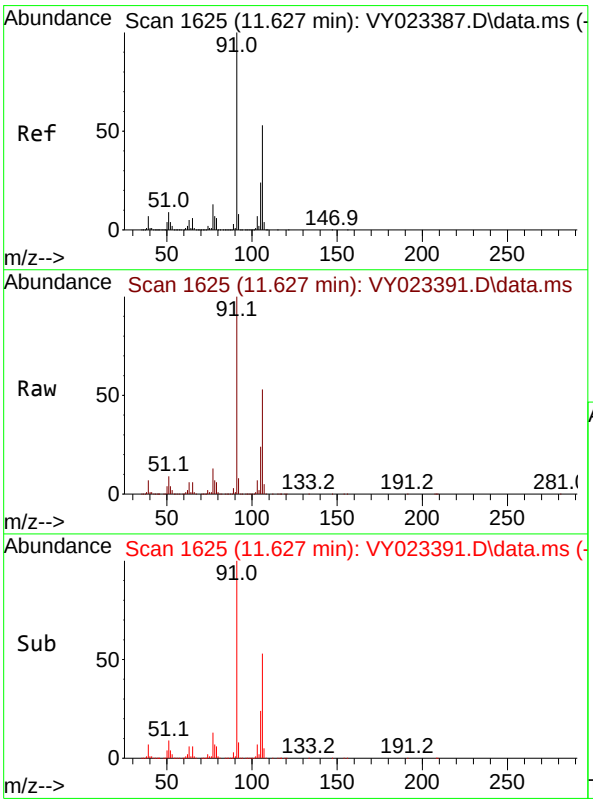
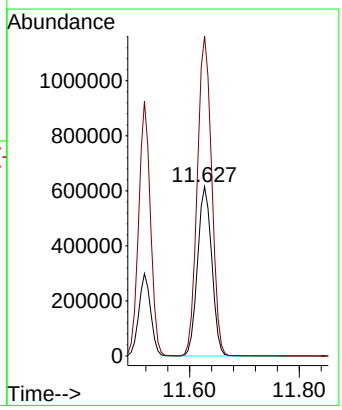
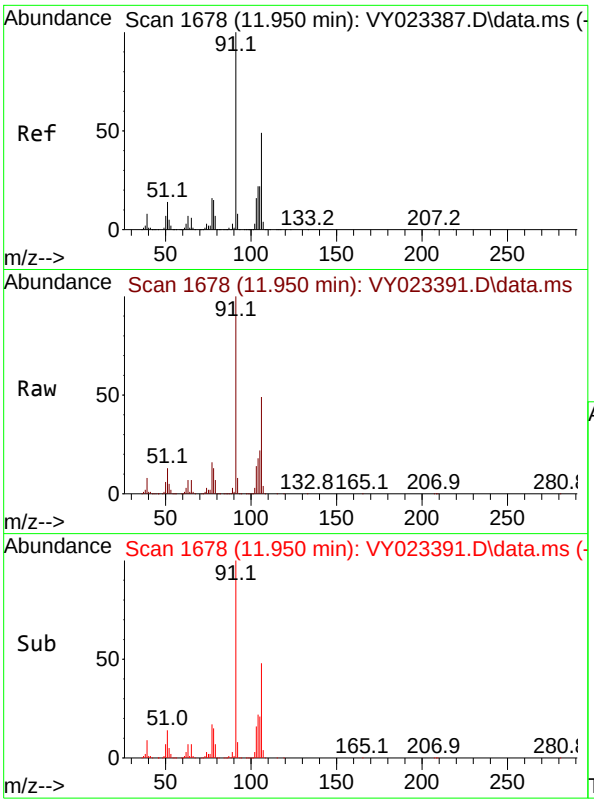


#68
m/p-Xylenes
Concen: 101.757 ug/l
RT: 11.627 min Scan# 1625
Delta R.T. -0.000 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion:106 Resp: 1108386

Ion	Ratio	Lower	Upper
106	100		
91	190.7	152.6	229.0

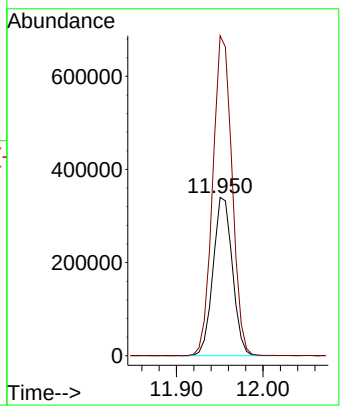




#69
o-Xylene
Concen: 51.577 ug/l
RT: 11.950 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion:106 Resp: 52695

Ion	Ratio	Lower	Upper
106	100		
91	202.1	101.4	304.1



Instrument :
MSVOA_Y
ClientSampleId :
ICVVY100725

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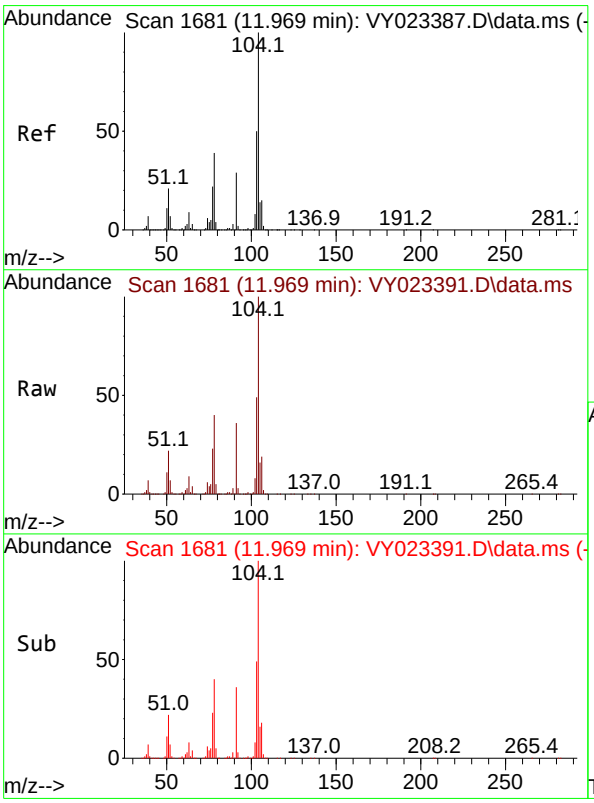
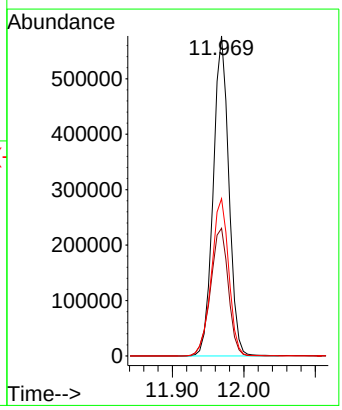
Supervised By :Mahesh Dadoda 10/10/2025

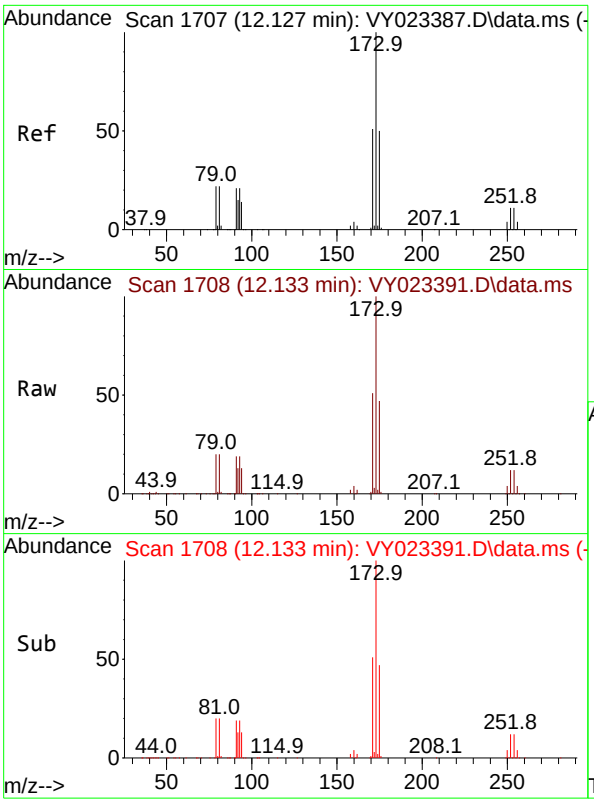


#70
Styrene
Concen: 52.122 ug/l
RT: 11.969 min Scan# 1681
Delta R.T. -0.000 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion:104 Resp: 875709

Ion	Ratio	Lower	Upper
104	100		
78	45.3	36.1	54.1
103	54.2	43.2	64.8

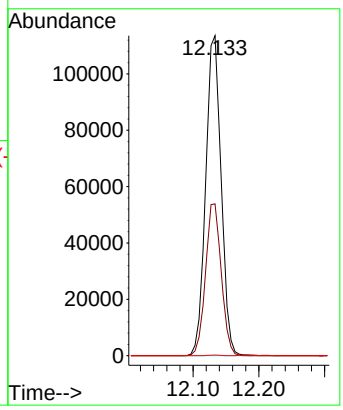




#71
Bromoform
Concen: 50.070 ug/l
RT: 12.133 min Scan# 1
Delta R.T. 0.006 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion:173 Resp: 18568

Ion	Ratio	Lower	Upper
173	100		
175	48.4	24.8	74.3
254	0.2	0.1	0.1#



Instrument :
MSVOA_Y
ClientSampleId :
ICVVY100725

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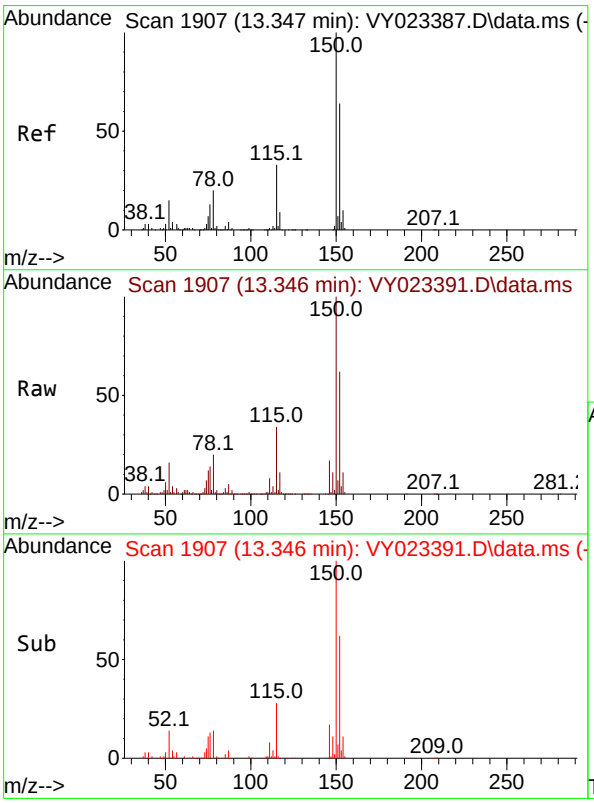
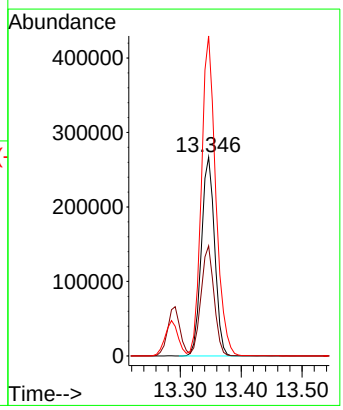
Supervised By :Mahesh Dadoda 10/10/2025

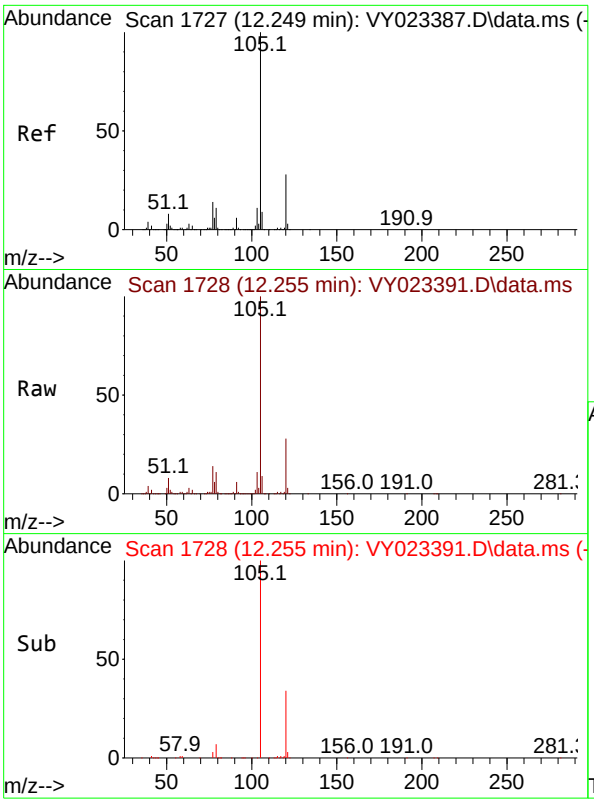


#72
1,4-Dichlorobenzene-d4
Concen: 50.000 ug/l
RT: 13.346 min Scan# 1907
Delta R.T. -0.000 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion:152 Resp: 405636

Ion	Ratio	Lower	Upper
152	100		
115	54.1	27.1	81.2
150	173.7	0.0	347.4

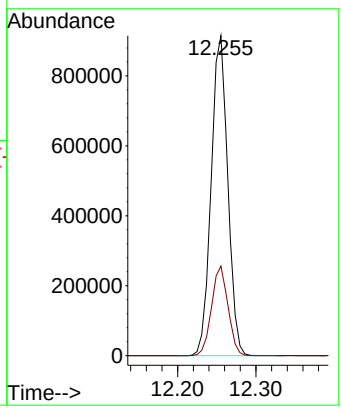




#73
Isopropylbenzene
Concen: 50.318 ug/l
RT: 12.255 min Scan# 1
Delta R.T. 0.006 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion:105 Resp: 134510

Ion	Ratio	Lower	Upper
105	100		
120	27.7	13.9	41.7



Instrument :
MSVOA_Y
ClientSampleId :
ICVVY100725

Manual Integrations
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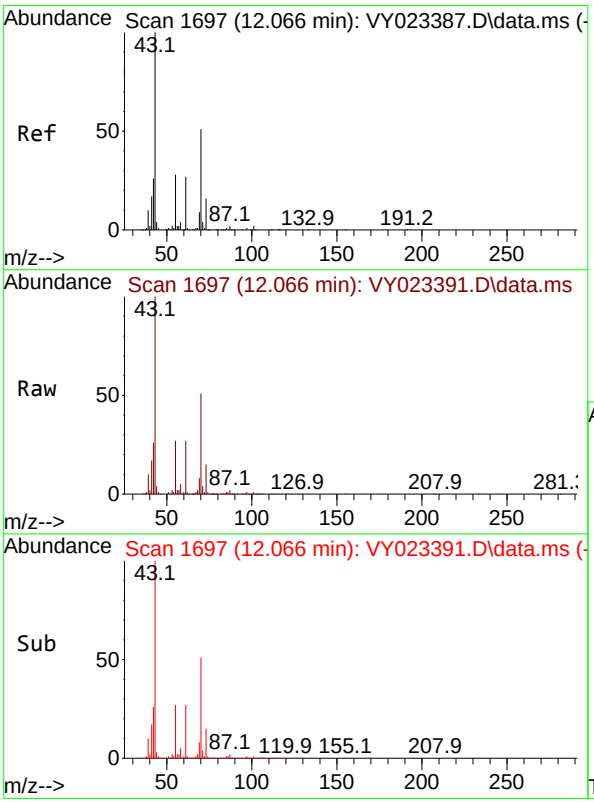
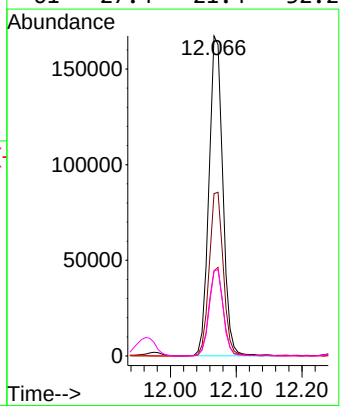
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

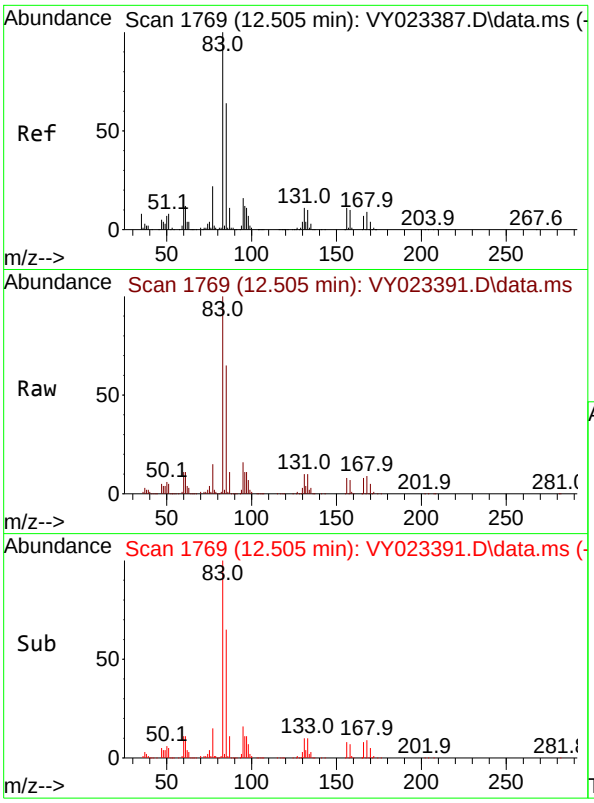


#74
N-amyl acetate
Concen: 51.087 ug/l
RT: 12.066 min Scan# 1697
Delta R.T. -0.000 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion: 43 Resp: 245291

Ion	Ratio	Lower	Upper
43	100		
70	51.8	41.1	61.7
55	28.3	23.0	34.6
61	27.4	21.4	32.2

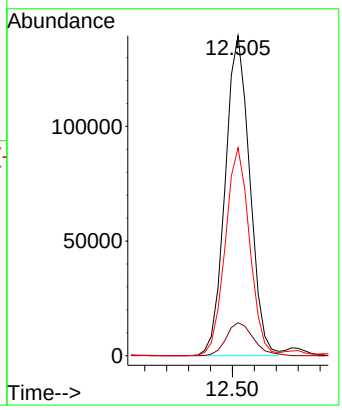




#75
1,1,2,2-Tetrachloroethane
Concen: 49.688 ug/l
RT: 12.505 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion: 83 Resp: 21724

Ion	Ratio	Lower	Upper
83	100		
131	11.4	5.9	17.6
85	64.4	31.8	95.3



Instrument :
MSVOA_Y
ClientSampleId :
ICVVY100725

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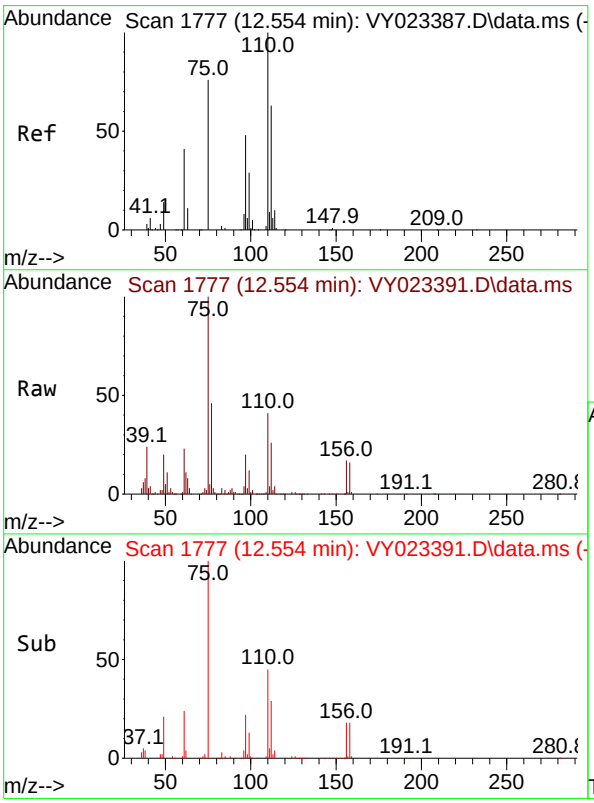
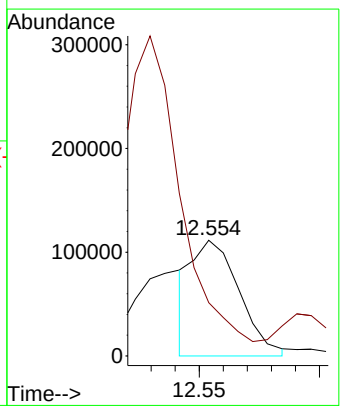
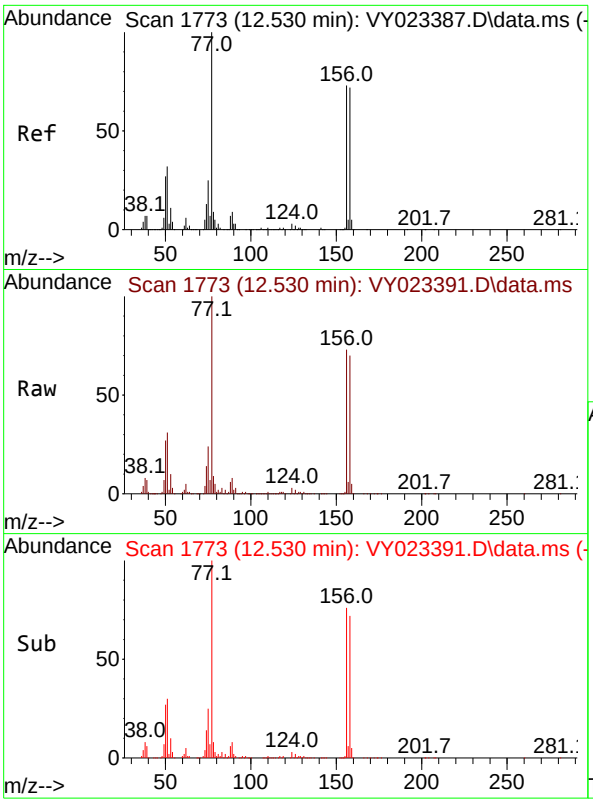


#76
1,2,3-Trichloropropane
Concen: 42.874 ug/l m
RT: 12.554 min Scan# 1777
Delta R.T. -0.000 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion: 75 Resp: 153438

Ion	Ratio	Lower	Upper
75	100		
77	0.0	0.0	0.0

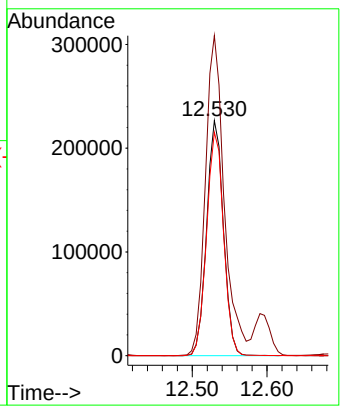




#77
Bromobenzene
Concen: 49.590 ug/l
RT: 12.530 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion:156 Resp: 35242

Ion	Ratio	Lower	Upper
156	100		
77	152.8	76.8	230.5
158	96.5	49.0	147.2



Instrument :
MSVOA_Y
ClientSampleId :
ICVVY100725

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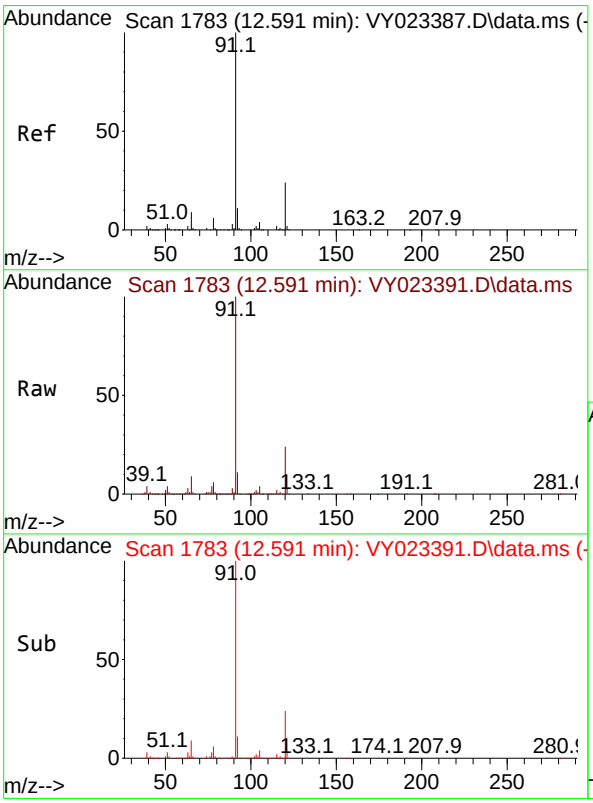
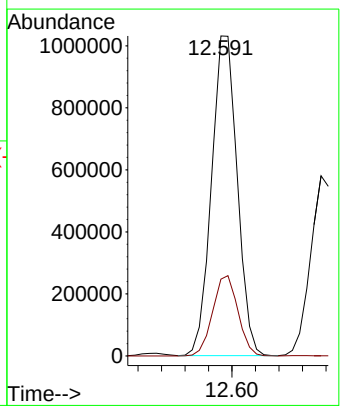
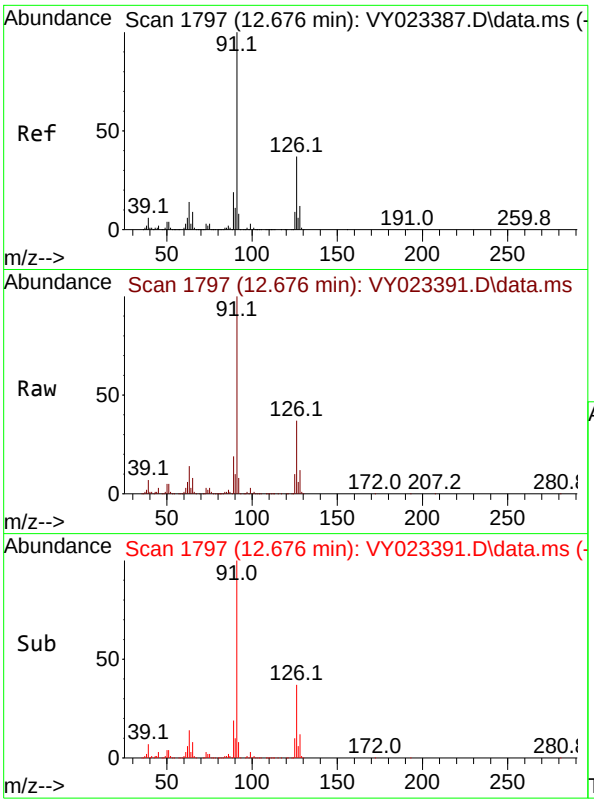


#78
n-propylbenzene
Concen: 50.694 ug/l
RT: 12.591 min Scan# 1783
Delta R.T. -0.000 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion: 91 Resp: 1568180

Ion	Ratio	Lower	Upper
91	100		
120	24.7	12.3	36.8

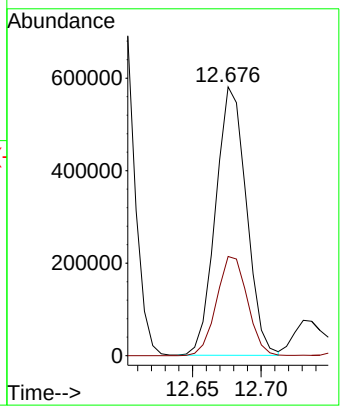




#79
2-Chlorotoluene
Concen: 50.047 ug/l
RT: 12.676 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion: 91 Resp: 90661

Ion	Ratio	Lower	Upper
91	100		
126	37.1	18.5	55.5



Instrument :
MSVOA_Y
ClientSampleId :
ICVVY100725

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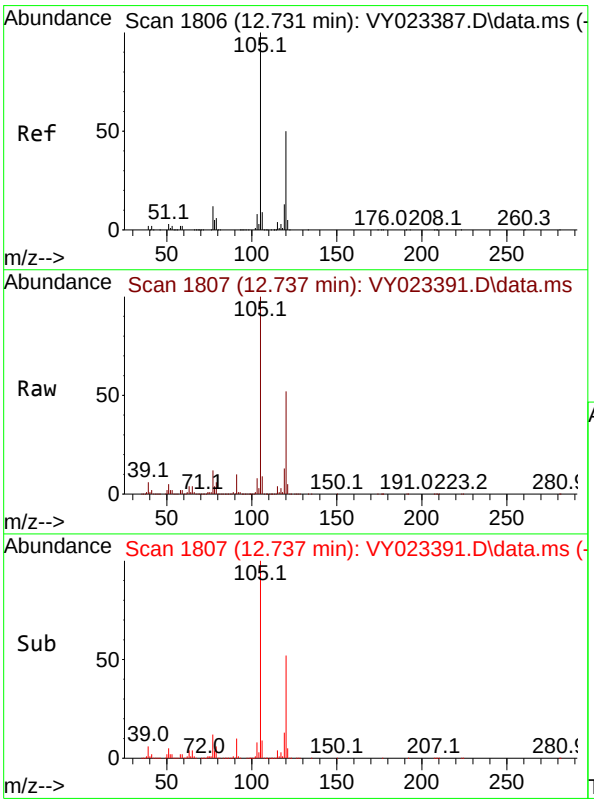
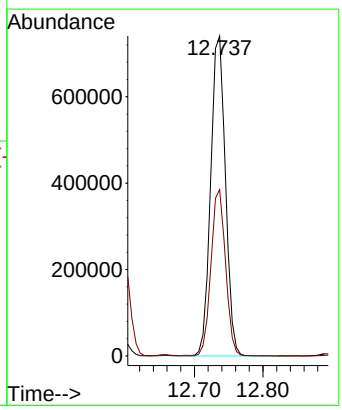
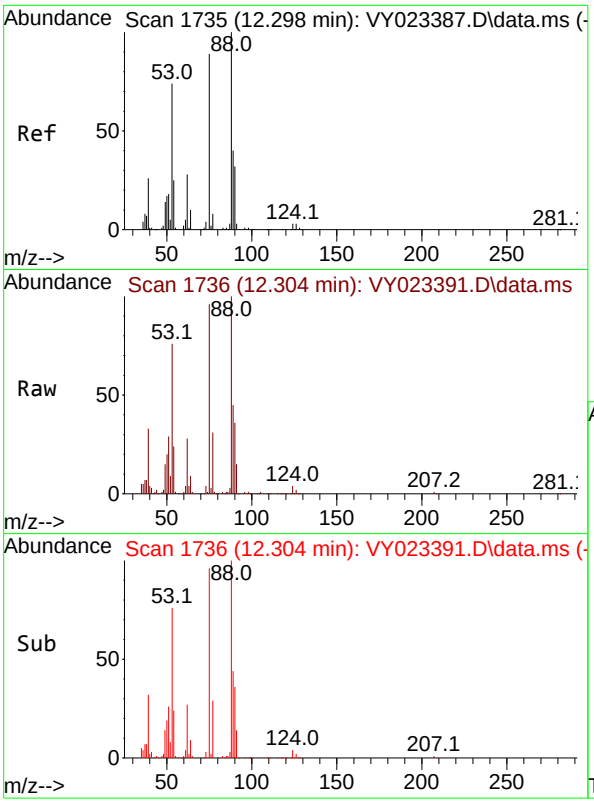


#80
1,3,5-Trimethylbenzene
Concen: 51.231 ug/l
RT: 12.737 min Scan# 1807
Delta R.T. 0.006 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion:105 Resp: 1106664

Ion	Ratio	Lower	Upper
105	100		
120	51.4	25.4	76.4

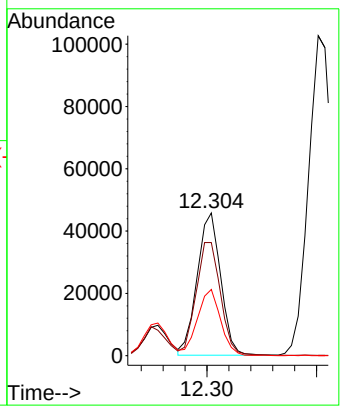




#81
trans-1,4-Dichloro-2-butene
Concen: 46.566 ug/l
RT: 12.304 min Scan# 1
Delta R.T. 0.006 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion: 75 Resp: 6795

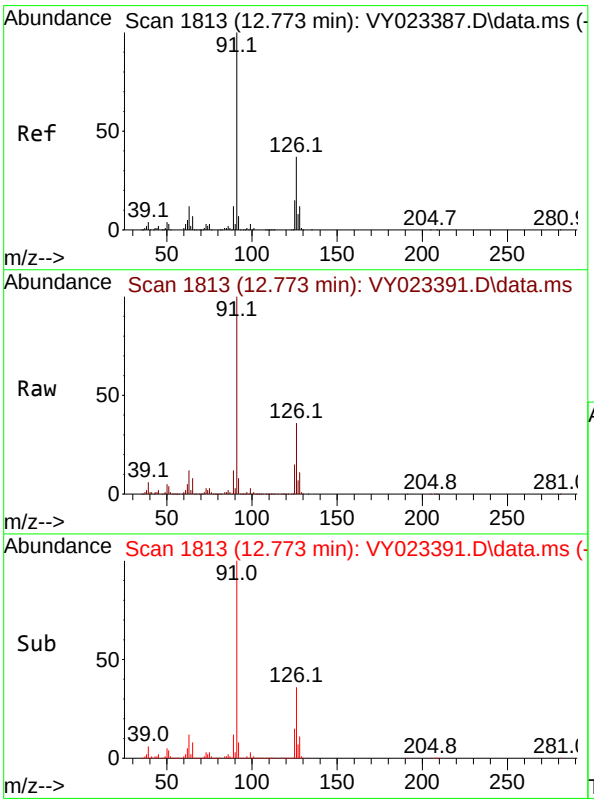
Ion	Ratio	Lower	Upper
75	100		
53	82.6	68.6	102.8
89	46.5	39.0	58.4



Instrument :
MSVOA_Y
ClientSampleId :
ICVVY100725

Manual Integrations
APPROVED

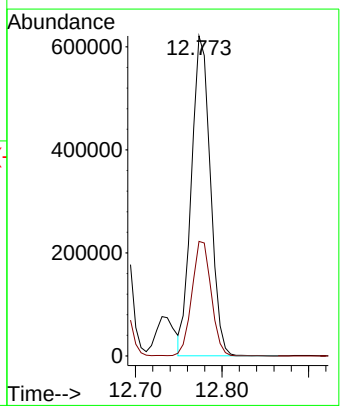
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

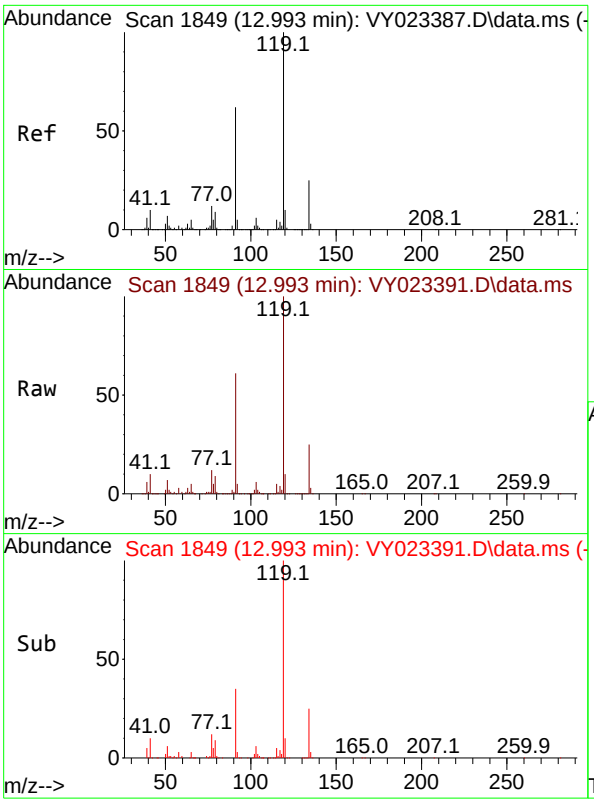


#82
4-Chlorotoluene
Concen: 50.455 ug/l
RT: 12.773 min Scan# 1813
Delta R.T. -0.000 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion: 91 Resp: 941314

Ion	Ratio	Lower	Upper
91	100		
126	36.7	18.4	55.4

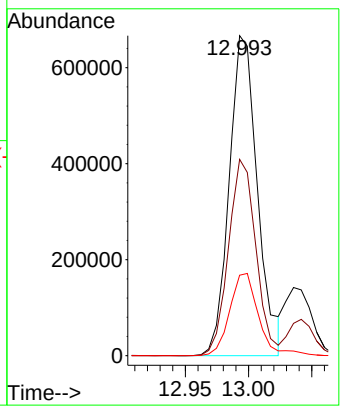




#83
tert-Butylbenzene
Concen: 52.019 ug/l
RT: 12.993 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion:119 Resp: 103751

Ion	Ratio	Lower	Upper
119	100		
91	59.5	29.9	89.8
134	26.3	12.9	38.7



Instrument :
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ClientSampleId :
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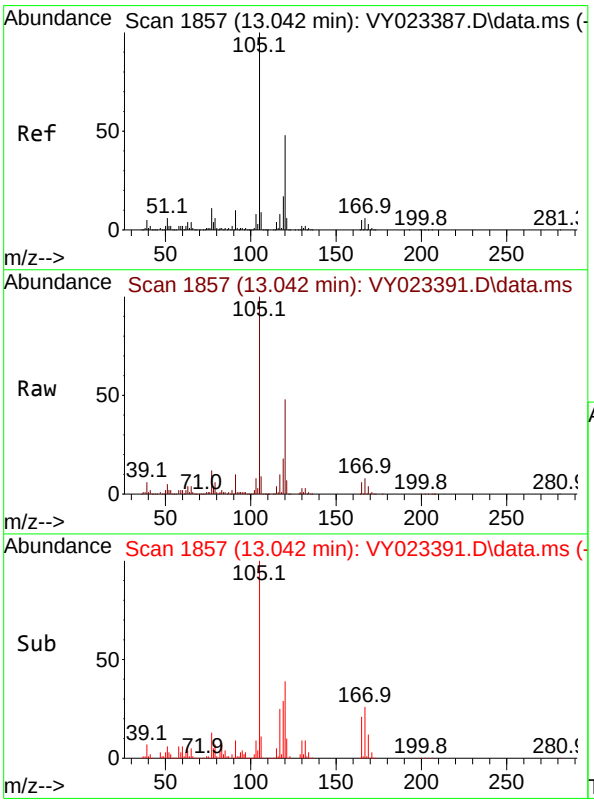
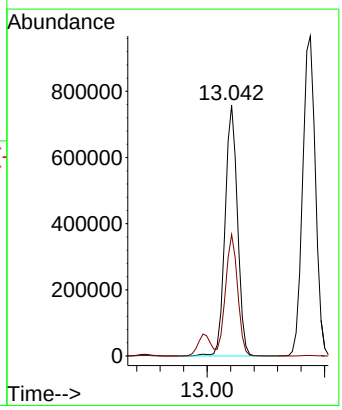
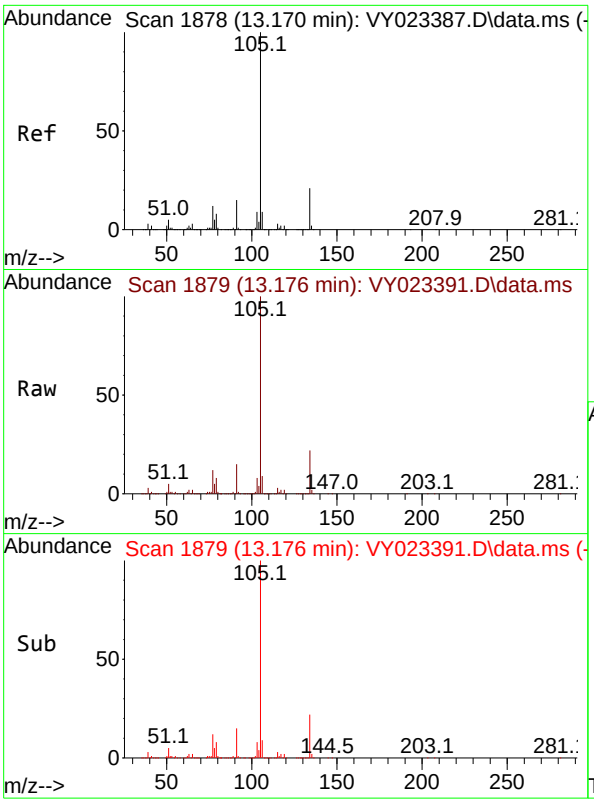


#84
1,2,4-Trimethylbenzene
Concen: 51.520 ug/l
RT: 13.042 min Scan# 1857
Delta R.T. -0.000 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion:105 Resp: 1110672

Ion	Ratio	Lower	Upper
105	100		
120	47.0	23.8	71.2

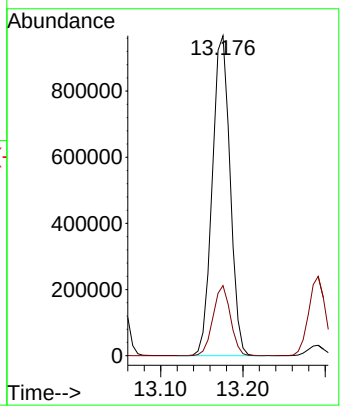




#85
sec-Butylbenzene
Concen: 50.848 ug/l
RT: 13.176 min Scan# 1
Delta R.T. 0.006 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion:105 Resp: 145477

Ion	Ratio	Lower	Upper
105	100		
134	21.4	10.7	32.1



Instrument :
MSVOA_Y
ClientSampleId :
ICVVY100725

Manual Integrations
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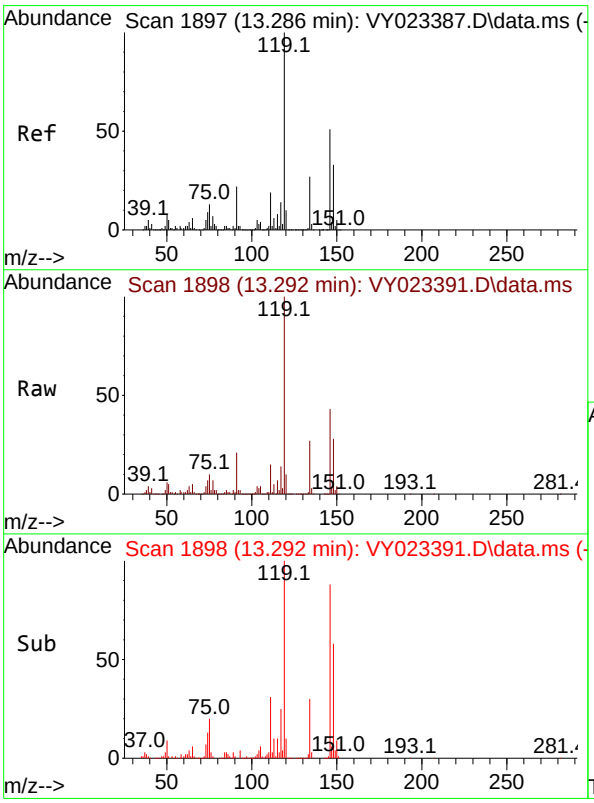
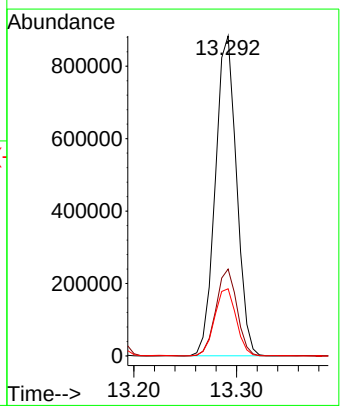
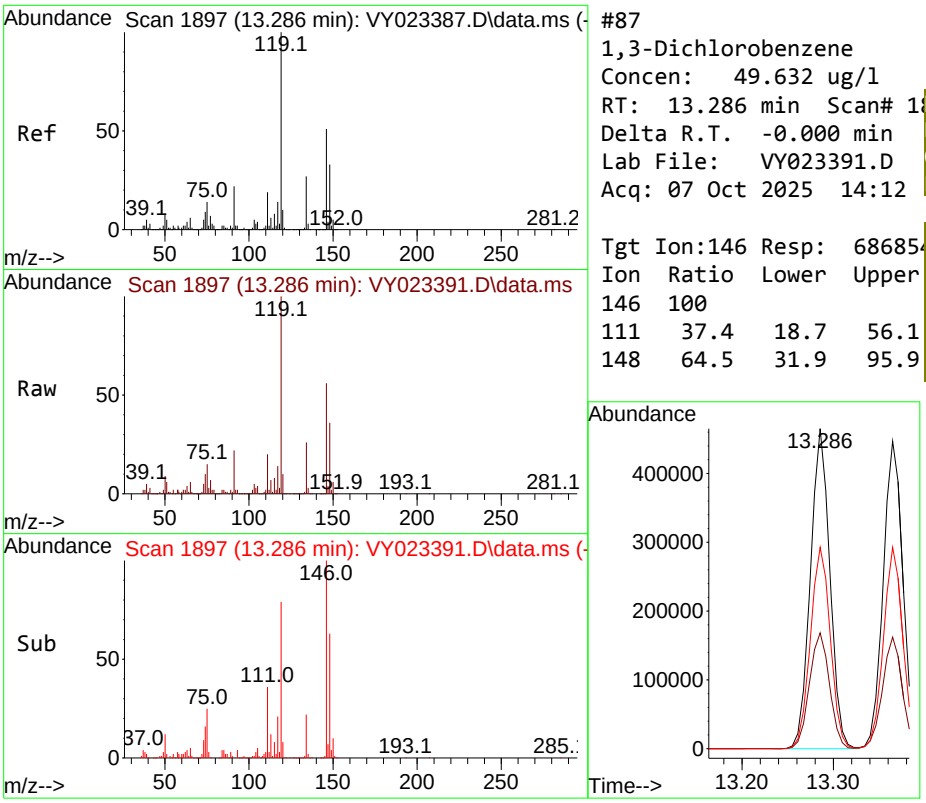


#86
p-Isopropyltoluene
Concen: 51.864 ug/l
RT: 13.292 min Scan# 1898
Delta R.T. 0.006 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion:119 Resp: 1263377

Ion	Ratio	Lower	Upper
119	100		
134	26.9	13.6	40.7
91	21.3	10.9	32.9





#87
1,3-Dichlorobenzene
Concen: 49.632 ug/l
RT: 13.286 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion:146 Resp: 68685

Ion	Ratio	Lower	Upper
146	100		
111	37.4	18.7	56.1
148	64.5	31.9	95.9

Instrument :
MSVOA_Y
ClientSampleId :
ICVVY100725

Manual Integrations
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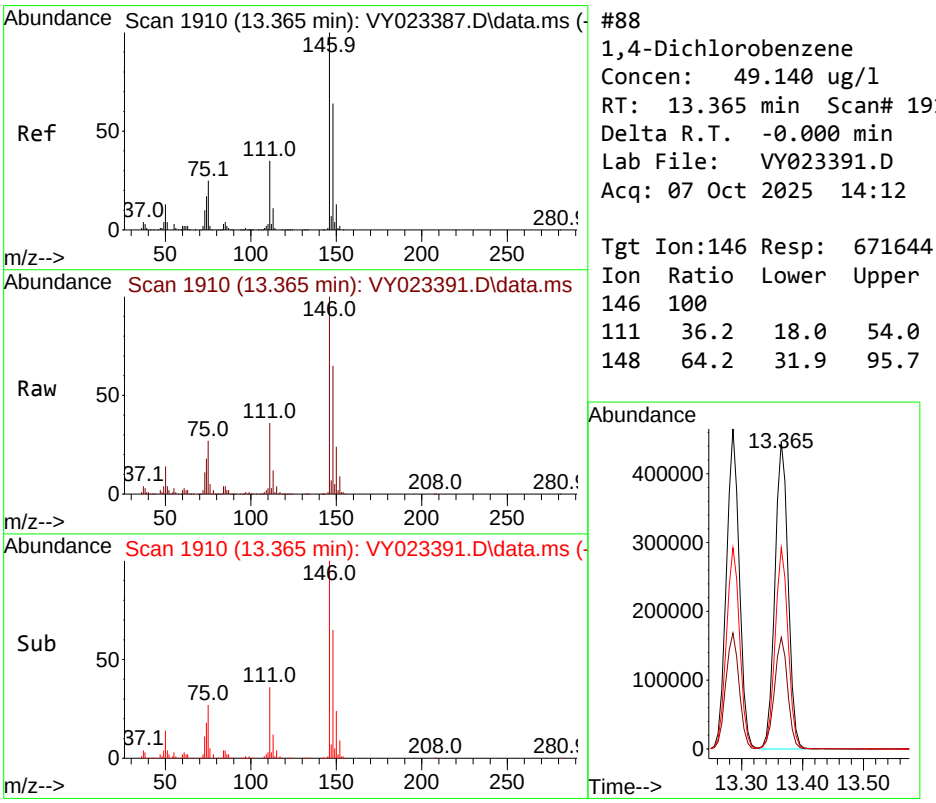
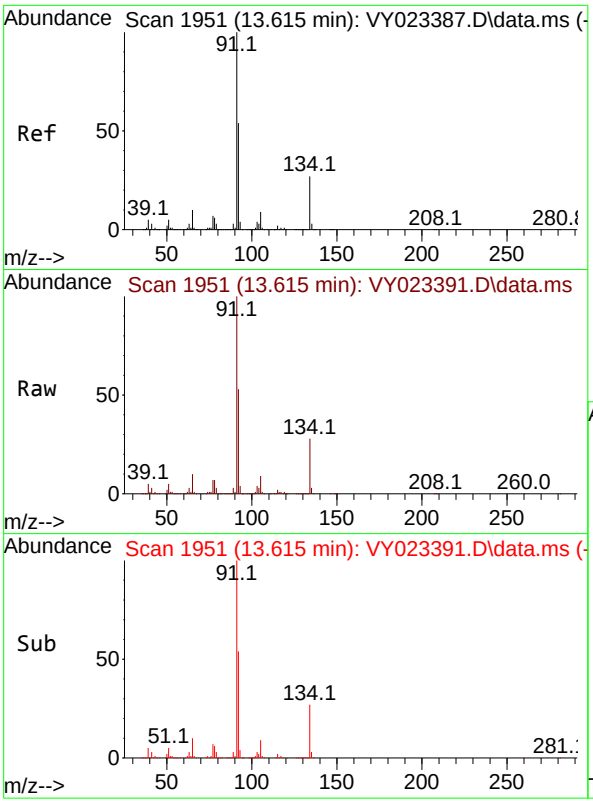
Supervised By :Mahesh Dadoda 10/10/2025



#88
1,4-Dichlorobenzene
Concen: 49.140 ug/l
RT: 13.365 min Scan# 1910
Delta R.T. -0.000 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion:146 Resp: 671644

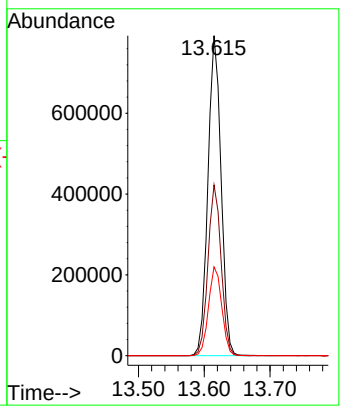
Ion	Ratio	Lower	Upper
146	100		
111	36.2	18.0	54.0
148	64.2	31.9	95.7



#89
n-Butylbenzene
Concen: 51.829 ug/l
RT: 13.615 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion: 91 Resp: 110008

Ion	Ratio	Lower	Upper
91	100		
92	53.4	27.0	80.8
134	28.1	14.1	42.2



Instrument :
MSVOA_Y
ClientSampleId :
ICVVY100725

Manual Integrations
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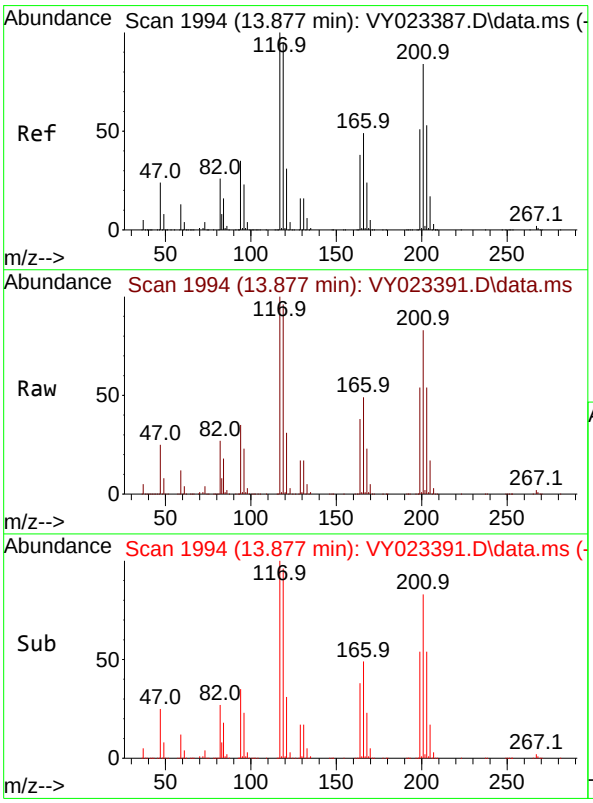
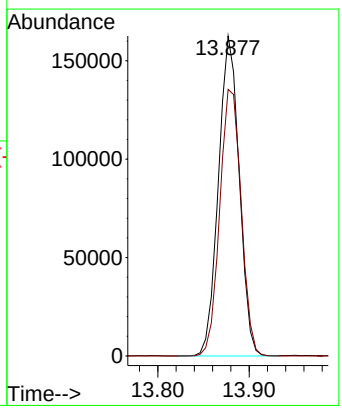
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

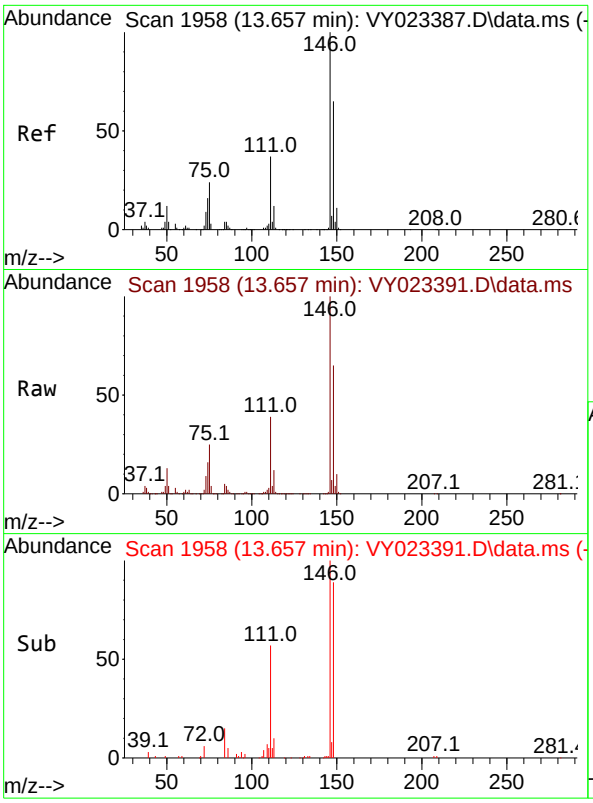


#90
Hexachloroethane
Concen: 49.116 ug/l
RT: 13.877 min Scan# 1994
Delta R.T. -0.000 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion:117 Resp: 257335

Ion	Ratio	Lower	Upper
117	100		
201	85.7	43.8	131.4

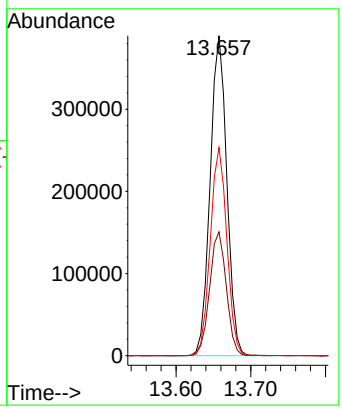




#91
1,2-Dichlorobenzene
Concen: 49.698 ug/l
RT: 13.657 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion:146 Resp: 60298

Ion	Ratio	Lower	Upper
146	100		
111	38.7	19.0	57.0
148	64.8	32.1	96.3



Instrument :
MSVOA_Y
ClientSampleId :
ICVVY100725

Manual Integrations
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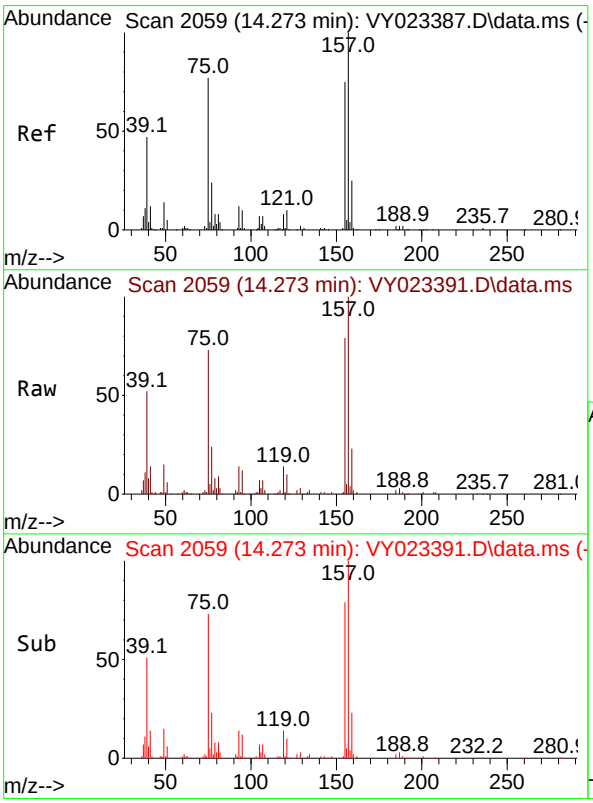
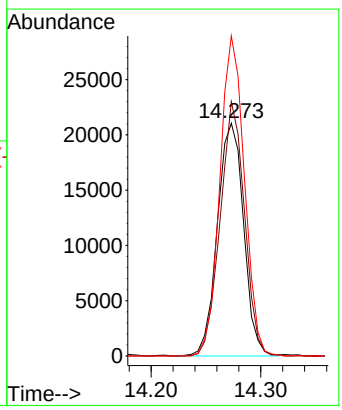
Reviewed By :Semsettin Yesilyurt 10/10/2025
Supervised By :Mahesh Dadoda 10/10/2025

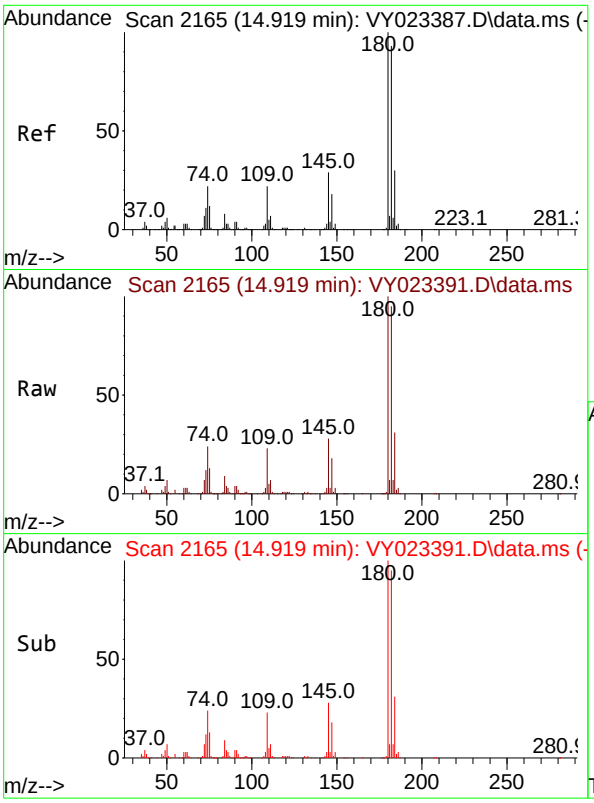


#92
1,2-Dibromo-3-Chloropropane
Concen: 48.687 ug/l
RT: 14.273 min Scan# 2059
Delta R.T. -0.000 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion: 75 Resp: 34928

Ion	Ratio	Lower	Upper
75	100		
155	101.5	50.0	150.0
157	128.5	63.8	191.5

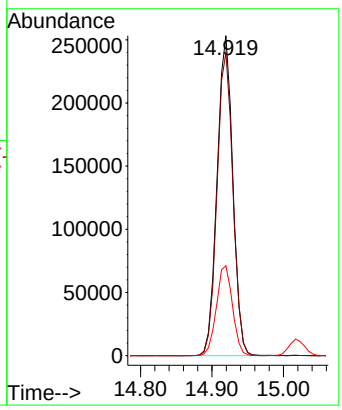




#93
1,2,4-Trichlorobenzene
Concen: 51.138 ug/l
RT: 14.919 min Scan# 2
Delta R.T. -0.000 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion:180 Resp: 38680

Ion	Ratio	Lower	Upper
180	100		
182	95.5	47.9	143.6
145	28.8	14.7	44.1



Instrument :
MSVOA_Y
ClientSampleId :
ICVVY100725

Manual Integrations APPROVED

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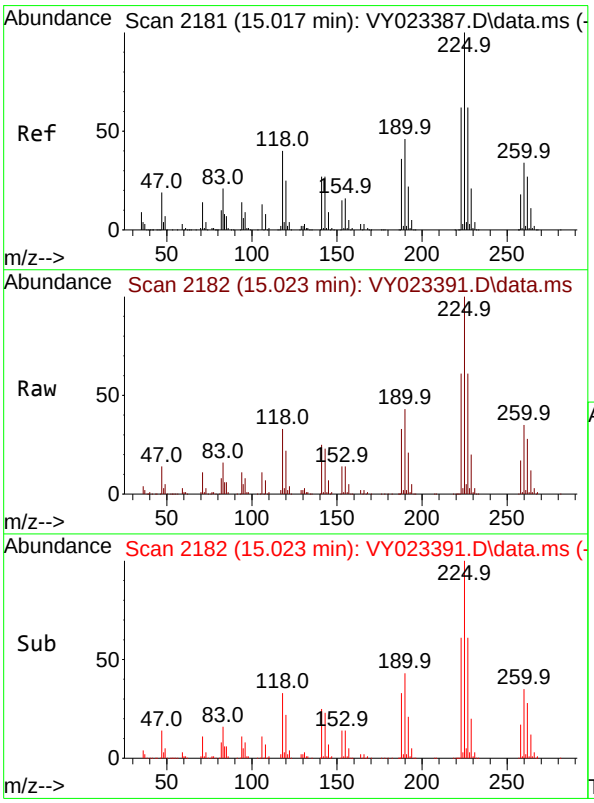
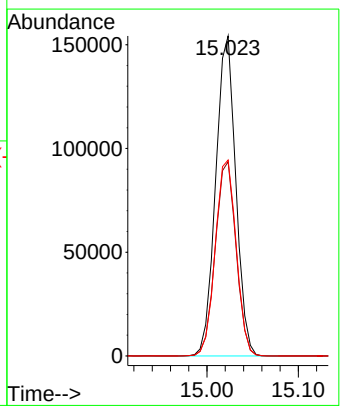
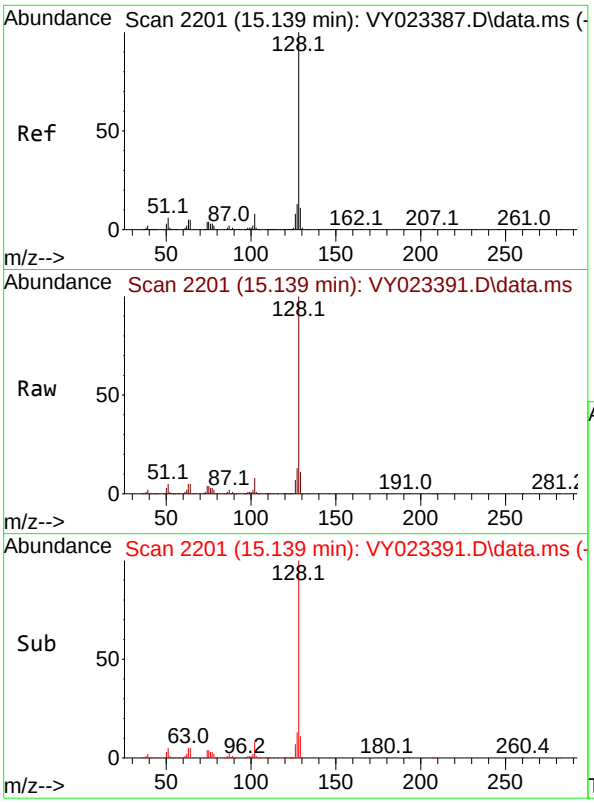


#94
Hexachlorobutadiene
Concen: 50.061 ug/l
RT: 15.023 min Scan# 2182
Delta R.T. 0.006 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion:225 Resp: 236040

Ion	Ratio	Lower	Upper
225	100		
223	62.6	30.8	92.3
227	63.6	31.9	95.7

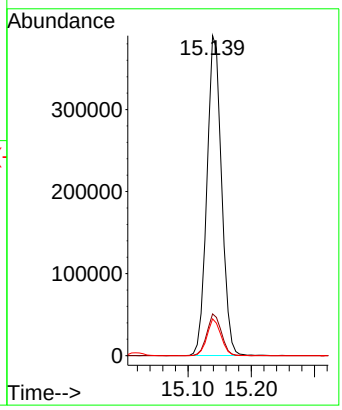




#95
Naphthalene
Concen: 52.154 ug/l
RT: 15.139 min Scan# 2
Delta R.T. -0.000 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion:128 Resp: 62819

Ion	Ratio	Lower	Upper
128	100		
127	12.9	10.4	15.6
129	11.0	8.9	13.3



Instrument :
MSVOA_Y
ClientSampleId :
ICVVY100725

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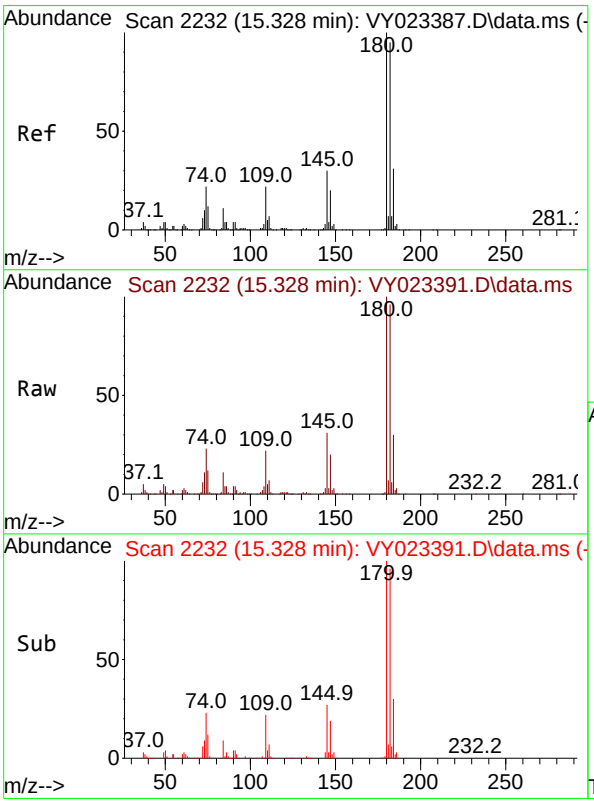
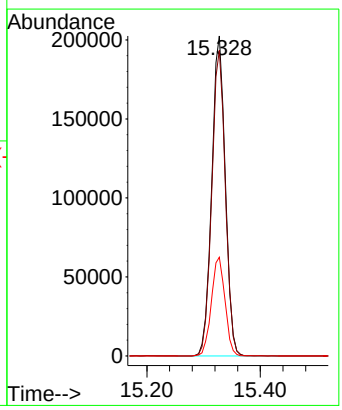


#96
1,2,3-Trichlorobenzene
Concen: 51.172 ug/l
RT: 15.328 min Scan# 2232
Delta R.T. -0.000 min
Lab File: VY023391.D
Acq: 07 Oct 2025 14:12

Tgt Ion:180 Resp: 335267

Ion	Ratio	Lower	Upper
180	100		
182	95.7	47.9	143.8
145	31.1	15.3	45.9



Evaluate Continuing Calibration Report

Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY100725\
Data File : VY023391.D
Acq On : 07 Oct 2025 14:12
Operator : SY/MD
Sample : VSTDICV050
Misc : 5.00g/5.0mL/MSVOA_Y/SOIL
ALS Vial : 10 Sample Multiplier: 1

Instrument :
MSVOA_Y
ClientSampleId :
ICVVY100725

Quant Time: Oct 08 05:15:49 2025
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260
QLast Update : Wed Oct 08 05:12:50 2025
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Pentafluorobenzene	50.000	50.000	0.0	97	0.00
2	T	Dichlorodifluoromethane	50.000	44.916	10.2	98	0.00
3	P	Chloromethane	50.000	52.519	-5.0	112	0.00
4	C	Vinyl Chloride	50.000	49.449	1.1#	103	0.00
5	T	Bromomethane	50.000	48.856	2.3	109	0.00
6	T	Chloroethane	50.000	51.367	-2.7	105	0.00
7	T	Trichlorofluoromethane	50.000	48.582	2.8	100	0.00
8	T	Diethyl Ether	50.000	51.050	-2.1	107	0.00
9	T	1,1,2-Trichlorotrifluoroeth	50.000	48.728	2.5	100	0.00
10	T	Methyl Iodide	50.000	51.875	-3.8	96	0.00
11	T	Tert butyl alcohol	250.000	231.079	7.6	112	0.00
12	CM	1,1-Dichloroethene	50.000	49.653	0.7#	101	0.00
13	T	Acrolein	250.000	246.184	1.5	101	0.00
14	T	Allyl chloride	50.000	50.645	-1.3	102	0.00
15	T	Acrylonitrile	250.000	251.575	-0.6	106	0.00
16	T	Acetone	250.000	212.910	14.8	99	0.00
17	T	Carbon Disulfide	50.000	50.021	-0.0	101	0.00
18	T	Methyl Acetate	50.000	50.439	-0.9	104	0.00
19	T	Methyl tert-butyl Ether	50.000	52.230	-4.5	107	0.00
20	T	Methylene Chloride	50.000	52.503	-5.0	120	0.00
21	T	trans-1,2-Dichloroethene	50.000	51.482	-3.0	105	0.00
22	T	Diisopropyl ether	50.000	51.364	-2.7	103	0.00
23	T	Vinyl Acetate	250.000	260.981	-4.4	106	0.00
24	P	1,1-Dichloroethane	50.000	50.742	-1.5	104	0.00
25	T	2-Butanone	250.000	233.083	6.8	105	0.00
26	T	2,2-Dichloropropane	50.000	49.626	0.7	100	0.00
27	T	cis-1,2-Dichloroethene	50.000	52.485	-5.0	107	0.00
28	T	Bromochloromethane	50.000	45.427	9.1	99	0.00
29	T	Tetrahydrofuran	250.000	253.317	-1.3	107	0.00
30	C	Chloroform	50.000	51.137	-2.3#	104	0.00
31	T	Cyclohexane	50.000	47.416	5.2	100	0.00
32	T	1,1,1-Trichloroethane	50.000	49.934	0.1	101	0.00
33	S	1,2-Dichloroethane-d4	50.000	49.450	1.1	103	0.00
34	I	1,4-Difluorobenzene	50.000	50.000	0.0	100	0.00
35	S	Dibromofluoromethane	50.000	49.116	1.8	101	0.00
36	T	1,1-Dichloropropene	50.000	49.761	0.5	102	0.00
37	T	Ethyl Acetate	50.000	49.740	0.5	107	0.00
38	T	Carbon Tetrachloride	50.000	48.671	2.7	100	0.00
39	T	Methylcyclohexane	50.000	49.970	0.1	101	0.00
40	TM	Benzene	50.000	49.906	0.2	102	0.00
41	T	Methacrylonitrile	50.000	48.008	4.0	105	0.00
42	TM	1,2-Dichloroethane	50.000	49.318	1.4	104	0.00
43	T	Isopropyl Acetate	50.000	50.548	-1.1	108	0.00
44	TM	Trichloroethene	50.000	49.120	1.8	101	0.00
45	C	1,2-Dichloropropane	50.000	50.355	-0.7#	105	0.00
46	T	Dibromomethane	50.000	50.885	-1.8	106	0.00
47	T	Bromodichloromethane	50.000	50.450	-0.9	104	0.00
48	T	Methyl methacrylate	50.000	49.440	1.1	101	0.00

Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY100725\
Data File : VY023391.D
Acq On : 07 Oct 2025 14:12
Operator : SY/MD
Sample : VSTDICV050
Misc : 5.00g/5.0mL/MSVOA_Y/SOIL
ALS Vial : 10 Sample Multiplier: 1

Instrument :
MSVOA_Y
ClientSampleId :
ICVVY100725

Quant Time: Oct 08 05:15:49 2025
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260
QLast Update : Wed Oct 08 05:12:50 2025
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
49	T	1,4-Dioxane	1000.000	1039.252	-3.9	110	0.00
50	S	Toluene-d8	50.000	49.228	1.5	100	0.00
51	T	4-Methyl-2-Pentanone	250.000	253.421	-1.4	106	0.00
52	CM	Toluene	50.000	51.556	-3.1#	105	0.00
53	T	t-1,3-Dichloropropene	50.000	51.160	-2.3	105	0.00
54	T	cis-1,3-Dichloropropene	50.000	51.649	-3.3	106	0.00
55	T	1,1,2-Trichloroethane	50.000	50.430	-0.9	106	0.00
56	T	Ethyl methacrylate	50.000	53.385	-6.8	107	0.00
57	T	1,3-Dichloropropane	50.000	51.113	-2.2	105	0.00
58	T	2-Chloroethyl Vinyl ether	250.000	272.133	-8.9	106	0.00
59	T	2-Hexanone	250.000	245.480	1.8	105	0.00
60	T	Dibromochloromethane	50.000	50.974	-1.9	106	0.00
61	T	1,2-Dibromoethane	50.000	50.658	-1.3	105	0.00
62	S	4-Bromofluorobenzene	50.000	49.881	0.2	104	0.00
63	I	Chlorobenzene-d5	50.000	50.000	0.0	103	0.00
64	T	Tetrachloroethene	50.000	48.087	3.8	98	0.00
65	PM	Chlorobenzene	50.000	49.381	1.2	105	0.00
66	T	1,1,1,2-Tetrachloroethane	50.000	49.537	0.9	106	0.00
67	C	Ethyl Benzene	50.000	50.841	-1.7#	104	0.00
68	T	m/p-Xylenes	100.000	101.757	-1.8	103	0.00
69	T	o-Xylene	50.000	51.577	-3.2	105	0.00
70	T	Styrene	50.000	52.122	-4.2	105	0.00
71	P	Bromoform	50.000	50.070	-0.1	108	0.00
72	I	1,4-Dichlorobenzene-d4	50.000	50.000	0.0	103	0.00
73	T	Isopropylbenzene	50.000	50.318	-0.6	103	0.00
74	T	N-amyl acetate	50.000	51.087	-2.2	108	0.00
75	P	1,1,2,2-Tetrachloroethane	50.000	49.688	0.6	111	0.00
76	T	1,2,3-Trichloropropane	50.000	42.874	14.3	90	0.00
77	T	Bromobenzene	50.000	49.590	0.8	106	0.00
78	T	n-propylbenzene	50.000	50.694	-1.4	103	0.00
79	T	2-Chlorotoluene	50.000	50.047	-0.1	104	0.00
80	T	1,3,5-Trimethylbenzene	50.000	51.231	-2.5	104	0.00
81	T	trans-1,4-Dichloro-2-butene	50.000	46.566	6.9	103	0.00
82	T	4-Chlorotoluene	50.000	50.455	-0.9	105	0.00
83	T	tert-Butylbenzene	50.000	52.019	-4.0	105	0.00
84	T	1,2,4-Trimethylbenzene	50.000	51.520	-3.0	105	0.00
85	T	sec-Butylbenzene	50.000	50.848	-1.7	104	0.00
86	T	p-Isopropyltoluene	50.000	51.864	-3.7	104	0.00
87	T	1,3-Dichlorobenzene	50.000	49.632	0.7	106	0.00
88	T	1,4-Dichlorobenzene	50.000	49.140	1.7	105	0.00
89	T	n-Butylbenzene	50.000	51.829	-3.7	105	0.00
90	T	Hexachloroethane	50.000	49.116	1.8	105	0.00
91	T	1,2-Dichlorobenzene	50.000	49.698	0.6	106	0.00
92	T	1,2-Dibromo-3-Chloropropane	50.000	48.687	2.6	107	0.00
93	T	1,2,4-Trichlorobenzene	50.000	51.138	-2.3	107	0.00
94	T	Hexachlorobutadiene	50.000	50.061	-0.1	104	0.00
95	T	Naphthalene	50.000	52.154	-4.3	109	0.00

Evaluate Continuing Calibration Report

Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY100725\
Data File : VY023391.D
Acq On : 07 Oct 2025 14:12
Operator : SY/MD
Sample : VSTDICV050
Misc : 5.00g/5.0mL/MSVOA_Y/SOIL
ALS Vial : 10 Sample Multiplier: 1

Instrument :
MSVOA_Y
ClientSampleId :
ICVVY100725

Quant Time: Oct 08 05:15:49 2025
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260
QLast Update : Wed Oct 08 05:12:50 2025
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

	Compound	Amount	Calc.	%Dev	Area%	Dev(min)
96 T	1,2,3-Trichlorobenzene	50.000	51.172	-2.3	108	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 6

Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY100725\
Data File : VY023391.D
Acq On : 07 Oct 2025 14:12
Operator : SY/MD
Sample : VSTDICV050
Misc : 5.00g/5.0mL/MSVOA_Y/SOIL
ALS Vial : 10 Sample Multiplier: 1

Instrument :
MSVOA_Y
ClientSampleId :
ICVVY100725

Quant Time: Oct 08 05:15:49 2025
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260
QLast Update : Wed Oct 08 05:12:50 2025
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
1	I	Pentafluorobenzene	1.000	1.000	0.0	97	0.00
2	T	Dichlorodifluoromethane	0.360	0.323	10.3	98	0.00
3	P	Chloromethane	0.490	0.515	-5.1	112	0.00
4	C	Vinyl Chloride	0.639	0.632	1.1#	103	0.00
5	T	Bromomethane	0.536	0.524	2.2	109	0.00
6	T	Chloroethane	0.435	0.447	-2.8	105	0.00
7	T	Trichlorofluoromethane	0.887	0.862	2.8	100	0.00
8	T	Diethyl Ether	0.232	0.237	-2.2	107	0.00
9	T	1,1,2-Trichlorotrifluoroeth	0.460	0.448	2.6	100	0.00
10	T	Methyl Iodide	0.512	0.531	-3.7	96	0.00
11	T	Tert butyl alcohol	0.031	0.029	6.5	112	0.00
12	CM	1,1-Dichloroethene	0.446	0.443	0.7#	101	0.00
13	T	Acrolein	0.044	0.043	2.3	101	0.00
14	T	Allyl chloride	0.544	0.551	-1.3	102	0.00
15	T	Acrylonitrile	0.089	0.089	0.0	106	0.00
16	T	Acetone	0.100	0.085	15.0	99	0.00
17	T	Carbon Disulfide	1.277	1.277	0.0	101	0.00
18	T	Methyl Acetate	0.261	0.263	-0.8	104	0.00
19	T	Methyl tert-butyl Ether	1.072	1.120	-4.5	107	0.00
20	T	Methylene Chloride	0.538	0.565	-5.0	120	0.00
21	T	trans-1,2-Dichloroethene	0.491	0.506	-3.1	105	0.00
22	T	Diisopropyl ether	1.202	1.235	-2.7	103	0.00
23	T	Vinyl Acetate	0.651	0.679	-4.3	106	0.00
24	P	1,1-Dichloroethane	0.796	0.808	-1.5	104	0.00
25	T	2-Butanone	0.122	0.113	7.4	105	0.00
26	T	2,2-Dichloropropane	0.731	0.725	0.8	100	0.00
27	T	cis-1,2-Dichloroethene	0.567	0.595	-4.9	107	0.00
28	T	Bromochloromethane	0.297	0.270	9.1	99	0.00
29	T	Tetrahydrofuran	0.069	0.070	-1.4	107	0.00
30	C	Chloroform	0.875	0.895	-2.3#	104	0.00
31	T	Cyclohexane	0.696	0.660	5.2	100	0.00
32	T	1,1,1-Trichloroethane	0.795	0.794	0.1	101	0.00
33	S	1,2-Dichloroethane-d4	0.418	0.414	1.0	103	0.00
34	I	1,4-Difluorobenzene	1.000	1.000	0.0	100	0.00
35	S	Dibromofluoromethane	0.307	0.302	1.6	101	0.00
36	T	1,1-Dichloropropene	0.407	0.405	0.5	102	0.00
37	T	Ethyl Acetate	0.161	0.160	0.6	107	0.00
38	T	Carbon Tetrachloride	0.493	0.480	2.6	100	0.00
39	T	Methylcyclohexane	0.530	0.529	0.2	101	0.00
40	TM	Benzene	1.288	1.286	0.2	102	0.00
41	T	Methacrylonitrile	0.087	0.084	3.4	105	0.00
42	TM	1,2-Dichloroethane	0.332	0.328	1.2	104	0.00
43	T	Isopropyl Acetate	0.321	0.325	-1.2	108	0.00
44	TM	Trichloroethene	0.377	0.370	1.9	101	0.00
45	C	1,2-Dichloropropane	0.285	0.287	-0.7#	105	0.00
46	T	Dibromomethane	0.180	0.183	-1.7	106	0.00
47	T	Bromodichloromethane	0.453	0.457	-0.9	104	0.00
48	T	Methyl methacrylate	0.151	0.149	1.3	101	0.00

Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY100725\
Data File : VY023391.D
Acq On : 07 Oct 2025 14:12
Operator : SY/MD
Sample : VSTDICV050
Misc : 5.00g/5.0mL/MSVOA_Y/SOIL
ALS Vial : 10 Sample Multiplier: 1

Instrument :
MSVOA_Y
ClientSampleId :
ICVVY100725

Quant Time: Oct 08 05:15:49 2025
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260
QLast Update : Wed Oct 08 05:12:50 2025
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
49	T	1,4-Dioxane	0.002	0.002	0.0	110	0.00
50	S	Toluene-d8	1.144	1.126	1.6	100	0.00
51	T	4-Methyl-2-Pentanone	0.166	0.168	-1.2	106	0.00
52	CM	Toluene	0.836	0.862	-3.1#	105	0.00
53	T	t-1,3-Dichloropropene	0.394	0.403	-2.3	105	0.00
54	T	cis-1,3-Dichloropropene	0.465	0.480	-3.2	106	0.00
55	T	1,1,2-Trichloroethane	0.242	0.244	-0.8	106	0.00
56	T	Ethyl methacrylate	0.279	0.298	-6.8	107	0.00
57	T	1,3-Dichloropropane	0.383	0.392	-2.3	105	0.00
58	T	2-Chloroethyl Vinyl ether	0.125	0.136	-8.8	106	0.00
59	T	2-Hexanone	0.119	0.116	2.5	105	0.00
60	T	Dibromochloromethane	0.339	0.346	-2.1	106	0.00
61	T	1,2-Dibromoethane	0.231	0.234	-1.3	105	0.00
62	S	4-Bromofluorobenzene	0.378	0.377	0.3	104	0.00
63	I	Chlorobenzene-d5	1.000	1.000	0.0	103	0.00
64	T	Tetrachloroethene	0.516	0.497	3.7	98	0.00
65	PM	Chlorobenzene	1.087	1.074	1.2	105	0.00
66	T	1,1,1,2-Tetrachloroethane	0.388	0.384	1.0	106	0.00
67	C	Ethyl Benzene	1.760	1.790	-1.7#	104	0.00
68	T	m/p-Xylenes	0.706	0.718	-1.7	103	0.00
69	T	o-Xylene	0.662	0.683	-3.2	105	0.00
70	T	Styrene	1.089	1.135	-4.2	105	0.00
71	P	Bromoform	0.240	0.241	-0.4	108	0.00
72	I	1,4-Dichlorobenzene-d4	1.000	1.000	0.0	103	0.00
73	T	Isopropylbenzene	3.295	3.316	-0.6	103	0.00
74	T	N-amyl acetate	0.592	0.605	-2.2	108	0.00
75	P	1,1,2,2-Tetrachloroethane	0.539	0.536	0.6	111	0.00
76	T	1,2,3-Trichloropropane	0.441	0.378	14.3	90	0.00
77	T	Bromobenzene	0.876	0.869	0.8	106	0.00
78	T	n-propylbenzene	3.813	3.866	-1.4	103	0.00
79	T	2-Chlorotoluene	2.233	2.235	-0.1	104	0.00
80	T	1,3,5-Trimethylbenzene	2.663	2.728	-2.4	104	0.00
81	T	trans-1,4-Dichloro-2-butene	0.180	0.168	6.7	103	0.00
82	T	4-Chlorotoluene	2.300	2.321	-0.9	105	0.00
83	T	tert-Butylbenzene	2.458	2.558	-4.1	105	0.00
84	T	1,2,4-Trimethylbenzene	2.657	2.738	-3.0	105	0.00
85	T	sec-Butylbenzene	3.527	3.586	-1.7	104	0.00
86	T	p-Isopropyltoluene	3.003	3.115	-3.7	104	0.00
87	T	1,3-Dichlorobenzene	1.706	1.693	0.8	106	0.00
88	T	1,4-Dichlorobenzene	1.685	1.656	1.7	105	0.00
89	T	n-Butylbenzene	2.616	2.712	-3.7	105	0.00
90	T	Hexachloroethane	0.646	0.634	1.9	105	0.00
91	T	1,2-Dichlorobenzene	1.496	1.487	0.6	106	0.00
92	T	1,2-Dibromo-3-Chloropropane	0.088	0.086	2.3	107	0.00
93	T	1,2,4-Trichlorobenzene	0.932	0.954	-2.4	107	0.00
94	T	Hexachlorobutadiene	0.581	0.582	-0.2	104	0.00
95	T	Naphthalene	1.485	1.549	-4.3	109	0.00

Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY100725\
Data File : VY023391.D
Acq On : 07 Oct 2025 14:12
Operator : SY/MD
Sample : VSTDICV050
Misc : 5.00g/5.0mL/MSVOA_Y/SOIL
ALS Vial : 10 Sample Multiplier: 1

Instrument :
MSVOA_Y
ClientSampleId :
ICVVY100725

Quant Time: Oct 08 05:15:49 2025
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260
QLast Update : Wed Oct 08 05:12:50 2025
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

	Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
96 T	1,2,3-Trichlorobenzene	0.808	0.827	-2.4	108	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 6

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

VOLATILE CONTINUING CALIBRATION CHECK

Lab Name: Alliance
Contract: AECO02
Lab Code: ACE
SDG No.: Q3424
Instrument ID: MSVOA_Y
Calibration Date/Time: 10/22/2025 09:30
Lab File ID: VY023543.D
Init. Calib. Date(s): 10/07/2025 10/07/2025
Heated Purge: (Y/N) Y
Init. Calib. Time(s): 09:17 12:32
GC Column: RXI-624 ID: 0.25 (mm)

COMPOUND	RRF	RRF050	MIN RRF	%D	MAX%D
Dichlorodifluoromethane	0.360	0.308		-14.44	20
Chloromethane	0.490	0.409	0.1	-16.53	20
Vinyl Chloride	0.639	0.552		-13.61	20
Bromomethane	0.536	0.456		-14.93	20
Chloroethane	0.435	0.403		-7.36	20
Trichlorofluoromethane	0.887	0.857		-3.38	20
1,1,2-Trichlorotrifluoroethane	0.460	0.469		1.96	20
1,1-Dichloroethene	0.446	0.456		2.24	20
Acetone	0.100	0.096		-4	20
Carbon Disulfide	1.277	1.206		-5.56	20
Methyl tert-butyl Ether	1.072	1.142		6.53	20
Methyl Acetate	0.261	0.294		12.64	20
Methylene Chloride	0.538	0.496		-7.81	20
trans-1,2-Dichloroethene	0.491	0.510		3.87	20
1,1-Dichloroethane	0.796	0.815	0.1	2.39	20
Cyclohexane	0.696	0.650		-6.61	20
2-Butanone	0.122	0.118		-3.28	20
Carbon Tetrachloride	0.493	0.522		5.88	20
cis-1,2-Dichloroethene	0.567	0.611		7.76	20
Bromochloromethane	0.297	0.257		-13.47	20
Chloroform	0.875	0.928		6.06	20
1,1,1-Trichloroethane	0.795	0.839		5.53	20
Methylcyclohexane	0.530	0.561		5.85	20
Benzene	1.288	1.371		6.44	20
1,2-Dichloroethane	0.332	0.340		2.41	20
Trichloroethene	0.377	0.411		9.02	20
1,2-Dichloropropane	0.285	0.303		6.32	20
Bromodichloromethane	0.453	0.487		7.51	20
4-Methyl-2-Pentanone	0.166	0.175		5.42	20
Toluene	0.836	0.926		10.77	20
t-1,3-Dichloropropene	0.394	0.433		9.9	20
cis-1,3-Dichloropropene	0.465	0.509		9.46	20
1,1,2-Trichloroethane	0.242	0.264		9.09	20
2-Hexanone	0.119	0.129		8.4	20
Dibromochloromethane	0.339	0.377		11.21	20
1,2-Dibromoethane	0.231	0.255		10.39	20
Tetrachloroethene	0.516	0.580		12.4	20
Chlorobenzene	1.087	1.168	0.3	7.45	20

All other compounds must meet a minimum RRF of 0.010.
RRF of 1,4-Dioxane = Value should be divide by 1000.

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

VOLATILE CONTINUING CALIBRATION CHECK

Lab Name:	Alliance	Contract:	AECO02
Lab Code:	ACE	SDG No.:	Q3424
Instrument ID:	MSVOA_Y	Calibration Date/Time:	10/22/2025 09:30
Lab File ID:	VY023543.D	Init. Calib. Date(s):	10/07/2025 10/07/2025
Heated Purge: (Y/N)	Y	Init. Calib. Time(s):	09:17 12:32

GC Column: RXI-624 ID: 0.25 (mm)

COMPOUND	RRF	RRF050	MIN RRF	%D	MAX%D
Ethyl Benzene	1.760	1.922		9.2	20
m/p-Xylenes	0.706	0.784		11.05	20
o-Xylene	0.662	0.739		11.63	20
Styrene	1.089	1.228		12.76	20
Bromoform	0.240	0.264	0.1	10	20
Isopropylbenzene	3.295	3.699		12.26	20
1,1,2,2-Tetrachloroethane	0.539	0.562	0.3	4.27	20
1,3-Dichlorobenzene	1.706	1.845		8.15	20
1,4-Dichlorobenzene	1.685	1.798		6.71	20
1,2-Dichlorobenzene	1.496	1.634		9.23	20
1,2-Dibromo-3-Chloropropane	0.088	0.092		4.55	20
1,2,4-Trichlorobenzene	0.932	1.020		9.44	20
1,2,3-Trichlorobenzene	0.808	0.876		8.42	20
1,2-Dichloroethane-d4	0.418	0.381		-8.85	20
Dibromofluoromethane	0.307	0.307		0	20
Toluene-d8	1.144	1.136		-0.7	20
4-Bromofluorobenzene	0.378	0.382		1.06	20

All other compounds must meet a minimum RRF of 0.010.
RRF of 1,4-Dioxane = Value should be divide by 1000.

Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY102225\
Data File : VY023543.D
Acq On : 22 Oct 2025 09:30
Operator : SY/MD
Sample : VSTDCCC050
Misc : 5.00g/5.0mL/MSVOA_Y/SOIL
ALS Vial : 3 Sample Multiplier: 1

Quant Time: Oct 24 02:25:18 2025
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260
QLast Update : Wed Oct 08 05:12:50 2025
Response via : Initial Calibration

Instrument :
MSVOA_Y
ClientSampleId :
VSTDCCC050

Manual Integrations APPROVED

Reviewed By :Amit Patel 10/24/2025
Supervised By :Mahesh Dadoda 10/24/2025

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Pentafluorobenzene	7.713	168	557873	50.000	ug/l	0.00
34) 1,4-Difluorobenzene	8.616	114	806690	50.000	ug/l	0.00
63) Chlorobenzene-d5	11.420	117	720008	50.000	ug/l	0.00
72) 1,4-Dichlorobenzene-d4	13.346	152	373234	50.000	ug/l	0.00
System Monitoring Compounds						
33) 1,2-Dichloroethane-d4	8.067	65	212794	45.615	ug/l	0.00
Spiked Amount 50.000	Range 50 - 163		Recovery = 91.220%			
35) Dibromofluoromethane	7.634	113	247459	49.924	ug/l	0.00
Spiked Amount 50.000	Range 54 - 147		Recovery = 99.840%			
50) Toluene-d8	10.109	98	916029	49.624	ug/l	0.00
Spiked Amount 50.000	Range 58 - 134		Recovery = 99.240%			
62) 4-Bromofluorobenzene	12.408	95	307868	50.517	ug/l	0.00
Spiked Amount 50.000	Range 30 - 143		Recovery = 101.040%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.867	85	172025	42.840	ug/l	99
3) Chloromethane	2.074	50	228434	41.760	ug/l	100
4) Vinyl Chloride	2.208	62	307788	43.199	ug/l	98
5) Bromomethane	2.598	94	254415	42.551	ug/l	99
6) Chloroethane	2.739	64	224891	46.306	ug/l	99
7) Trichlorofluoromethane	3.062	101	477889	48.307	ug/l	100
8) Diethyl Ether	3.458	74	129976	50.281	ug/l	97
9) 1,1,2-Trichlorotrifluo...	3.818	101	261411	50.922	ug/l	98
10) Methyl Iodide	4.007	142	341595	59.772	ug/l	99
11) Tert butyl alcohol	4.860	59	86872	250.315	ug/l	99
12) 1,1-Dichloroethene	3.793	96	254223	51.086	ug/l	98
13) Acrolein	3.653	56	38914	79.353	ug/l	99
14) Allyl chloride	4.385	41	291262	48.025	ug/l	97
15) Acrylonitrile	5.061	53	248616	251.312	ug/l	99
16) Acetone	3.873	43	266925	240.345	ug/l	99
17) Carbon Disulfide	4.110	76	672714	47.232	ug/l	100
18) Methyl Acetate	4.391	43	163801	56.225	ug/l	97
19) Methyl tert-butyl Ether	5.122	73	636893	53.251	ug/l	96
20) Methylene Chloride	4.616	84	276483	46.039	ug/l	97
21) trans-1,2-Dichloroethene	5.116	96	284466	51.921	ug/l	98
22) Diisopropyl ether	6.025	45	677959	50.537	ug/l	98
23) Vinyl Acetate	5.964	43	1757567	242.046	ug/l	96
24) 1,1-Dichloroethane	5.921	63	454590	51.156	ug/l	98
25) 2-Butanone	6.896	43	328971	242.629	ug/l	100
26) 2,2-Dichloropropane	6.890	77	428536	52.555	ug/l	98
27) cis-1,2-Dichloroethene	6.896	96	340754	53.843	ug/l	96
28) Bromochloromethane	7.250	49	143454	43.243	ug/l	95
29) Tetrahydrofuran	7.268	42	185249	240.938	ug/l	94
30) Chloroform	7.427	83	517452	53.000	ug/l	99
31) Cyclohexane	7.707	56	362890	46.762	ug/l	96
32) 1,1,1-Trichloroethane	7.622	97	467952	52.741	ug/l	99
36) 1,1-Dichloropropene	7.841	75	344096	52.436	ug/l	99
37) Ethyl Acetate	6.994	43	127273	48.956	ug/l	97
38) Carbon Tetrachloride	7.823	117	421482	52.970	ug/l	99
39) Methylcyclohexane	9.109	83	452406	52.949	ug/l	97
40) Benzene	8.085	78	1105993	53.219	ug/l	98

Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY102225\
Data File : VY023543.D
Acq On : 22 Oct 2025 09:30
Operator : SY/MD
Sample : VSTDCCC050
Misc : 5.00g/5.0mL/MSVOA_Y/SOIL
ALS Vial : 3 Sample Multiplier: 1

Quant Time: Oct 24 02:25:18 2025
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260
QLast Update : Wed Oct 08 05:12:50 2025
Response via : Initial Calibration

Instrument :
MSVOA_Y
ClientSampleId :
VSTDCCC050

Manual Integrations APPROVED

Reviewed By :Amit Patel 10/24/2025
Supervised By :Mahesh Dadoda 10/24/2025

Compound	R.T.	QIon	Response	Conc	Units		Dev(Min)
41) Methacrylonitrile	7.219	41	68071m	48.413	ug/l		
42) 1,2-Dichloroethane	8.158	62	274669	51.247	ug/l		98
43) Isopropyl Acetate	8.201	43	259676	50.092	ug/l		96
44) Trichloroethene	8.866	130	331676	54.528	ug/l		99
45) 1,2-Dichloropropane	9.140	63	244273	53.216	ug/l		98
46) Dibromomethane	9.231	93	157780	54.359	ug/l		98
47) Bromodichloromethane	9.426	83	392784	53.731	ug/l		100
48) Methyl methacrylate	9.219	41	125981	51.729	ug/l		95
49) 1,4-Dioxane	9.231	88	35080	1042.410	ug/l		97
51) 4-Methyl-2-Pentanone	9.999	43	705865	263.542	ug/l		98
52) Toluene	10.170	92	747259	55.380	ug/l		99
53) t-1,3-Dichloropropene	10.396	75	348965	54.901	ug/l		99
54) cis-1,3-Dichloropropene	9.859	75	410362	54.701	ug/l		97
55) 1,1,2-Trichloroethane	10.573	97	212638	54.478	ug/l		97
56) Ethyl methacrylate	10.438	69	260989	57.967	ug/l		94
57) 1,3-Dichloropropane	10.719	76	337668	54.594	ug/l		99
58) 2-Chloroethyl Vinyl ether	9.713	63	574517	284.845	ug/l		98
59) 2-Hexanone	10.762	43	518755	271.019	ug/l		97
60) Dibromochloromethane	10.914	129	304516	55.647	ug/l		99
61) 1,2-Dibromoethane	11.018	107	205601	55.233	ug/l		100
64) Tetrachloroethene	10.646	164	417270	56.127	ug/l		97
65) Chlorobenzene	11.444	112	841259	53.721	ug/l		100
66) 1,1,1,2-Tetrachloroethane	11.517	131	302769	54.255	ug/l		99
67) Ethyl Benzene	11.517	91	1383613	54.584	ug/l		100
68) m/p-Xylenes	11.627	106	1128353	110.980	ug/l		99
69) o-Xylene	11.956	106	532269	55.814	ug/l		99
70) Styrene	11.969	104	884177	56.380	ug/l		99
71) Bromoform	12.133	173	190201	54.947	ug/l	#	98
73) Isopropylbenzene	12.255	105	1380580	56.129	ug/l		100
74) N-amyl acetate	12.072	43	226427	51.252	ug/l		97
75) 1,1,2,2-Tetrachloroethane	12.505	83	209645	52.112	ug/l		99
76) 1,2,3-Trichloropropane	12.554	75	165233m	50.178	ug/l		
77) Bromobenzene	12.529	156	355320	54.338	ug/l		99
78) n-propylbenzene	12.597	91	1597439	56.123	ug/l		99
79) 2-Chlorotoluene	12.682	91	910692	54.637	ug/l		99
80) 1,3,5-Trimethylbenzene	12.737	105	1123341	56.518	ug/l		98
81) trans-1,4-Dichloro-2-b...	12.304	75	74591	55.547	ug/l		95
82) 4-Chlorotoluene	12.779	91	937415	54.609	ug/l		99
83) tert-Butylbenzene	12.999	119	1037184	56.518	ug/l		99
84) 1,2,4-Trimethylbenzene	13.042	105	1118689	56.397	ug/l		99
85) sec-Butylbenzene	13.176	105	1487514	56.506	ug/l		100
86) p-Isopropyltoluene	13.292	119	1282400	57.215	ug/l		100
87) 1,3-Dichlorobenzene	13.285	146	688741	54.089	ug/l		99
88) 1,4-Dichlorobenzene	13.365	146	671095	53.362	ug/l		99
89) n-Butylbenzene	13.615	91	1101186	56.385	ug/l		99
90) Hexachloroethane	13.877	117	255425	52.984	ug/l		100
91) 1,2-Dichlorobenzene	13.657	146	609689	54.613	ug/l		100
92) 1,2-Dibromo-3-Chloropr...	14.273	75	34265	51.910	ug/l		96
93) 1,2,4-Trichlorobenzene	14.919	180	380515	54.674	ug/l		100
94) Hexachlorobutadiene	15.023	225	233049	53.717	ug/l		100
95) Naphthalene	15.145	128	636726	57.452	ug/l		99
96) 1,2,3-Trichlorobenzene	15.328	180	326959	54.237	ug/l		99

Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY102225\
Data File : VY023543.D
Acq On : 22 Oct 2025 09:30
Operator : SY/MD
Sample : VSTDCCC050
Misc : 5.00g/5.0mL/MSVOA_Y/SOIL
ALS Vial : 3 Sample Multiplier: 1

Quant Time: Oct 24 02:25:18 2025
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260
QLast Update : Wed Oct 08 05:12:50 2025
Response via : Initial Calibration

Instrument :
MSVOA_Y
ClientSampleId :
VSTDCCC050

Manual Integrations APPROVED

Reviewed By :Amit Patel 10/24/2025
Supervised By :Mahesh Dadoda 10/24/2025

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY102225\
Data File : VY023543.D
Acq On : 22 Oct 2025 09:30
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Quant Time: Oct 24 02:25:18 2025
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260
QLast Update : Wed Oct 08 05:12:50 2025
Response via : Initial Calibration

Instrument :
MSVOA_Y
ClientSampleId :
VSTDCCC050

Manual Integrations APPROVED

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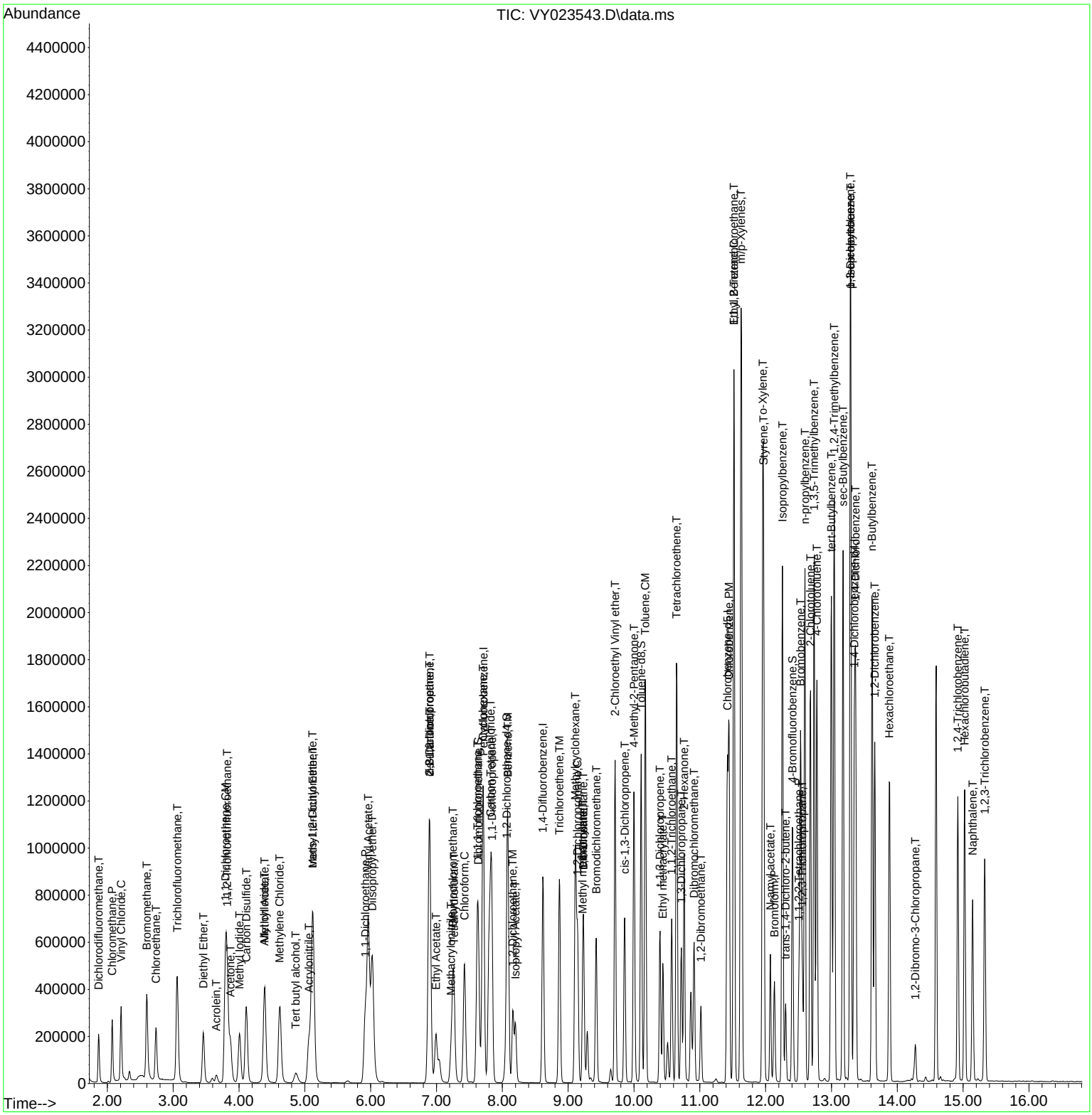
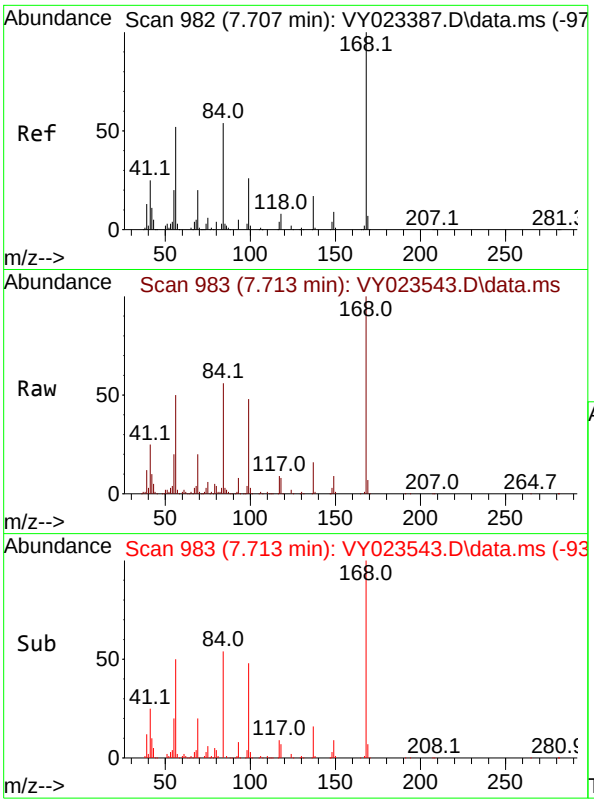
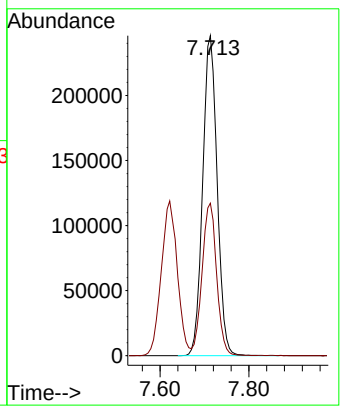




#1
Pentafluorobenzene
Concen: 50.000 ug/l
RT: 7.713 min Scan# 9
Delta R.T. 0.006 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion:168 Resp: 55787

Ion	Ratio	Lower	Upper
168	100		
99	47.6	39.7	59.5



Instrument :
MSVOA_Y
ClientSampleId :
VSTDCCC050

Manual Integrations
APPROVED

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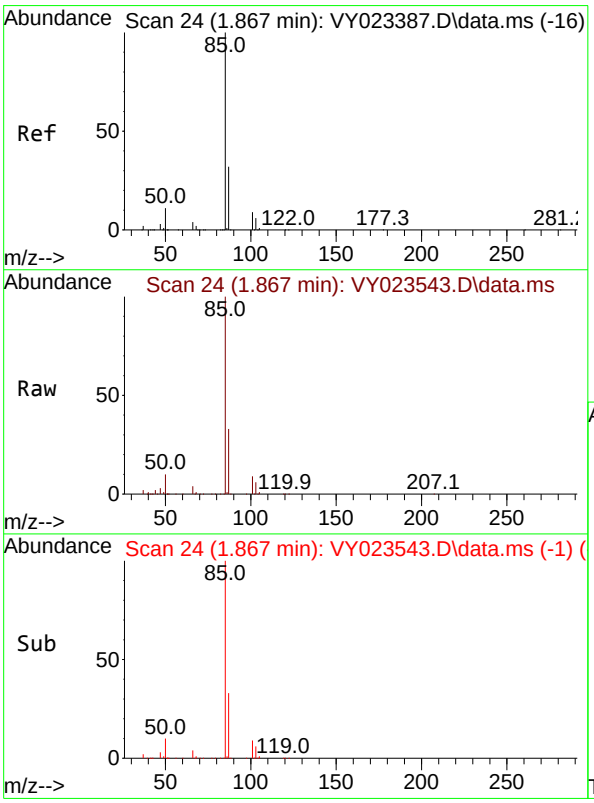
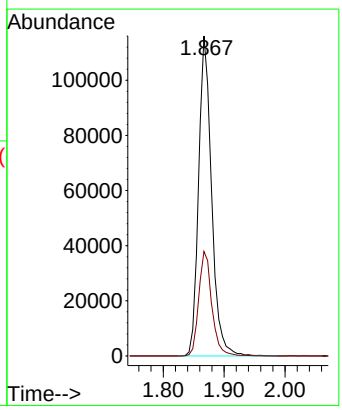
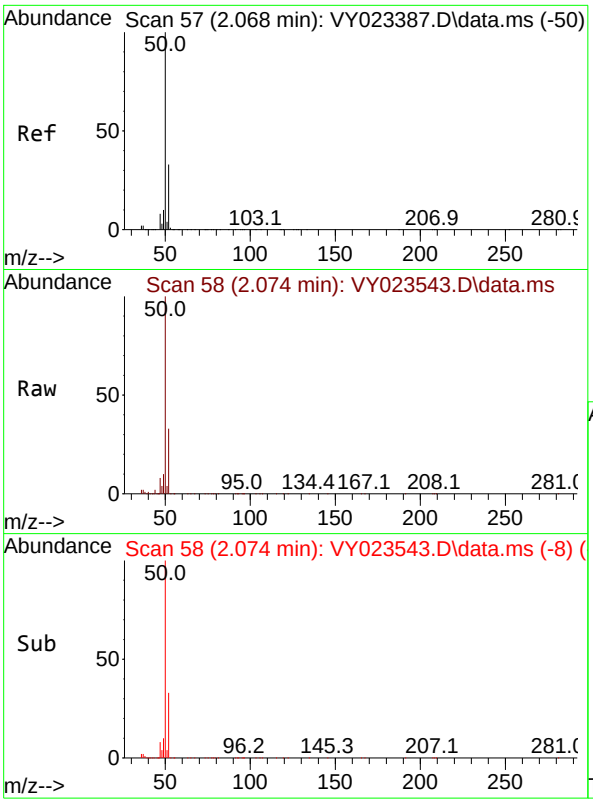


#2
Dichlorodifluoromethane
Concen: 42.840 ug/l
RT: 1.867 min Scan# 24
Delta R.T. -0.000 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion: 85 Resp: 172025

Ion	Ratio	Lower	Upper
85	100		
87	32.7	16.0	47.9

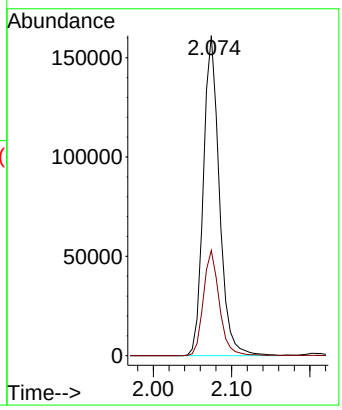




#3
Chloromethane
Concen: 41.760 ug/l
RT: 2.074 min Scan# 5
Delta R.T. 0.006 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion: 50 Resp: 22843

Ion	Ratio	Lower	Upper
50	100		
52	32.9	26.2	39.2



Instrument :
MSVOA_Y
ClientSampleId :
VSTDCCC050

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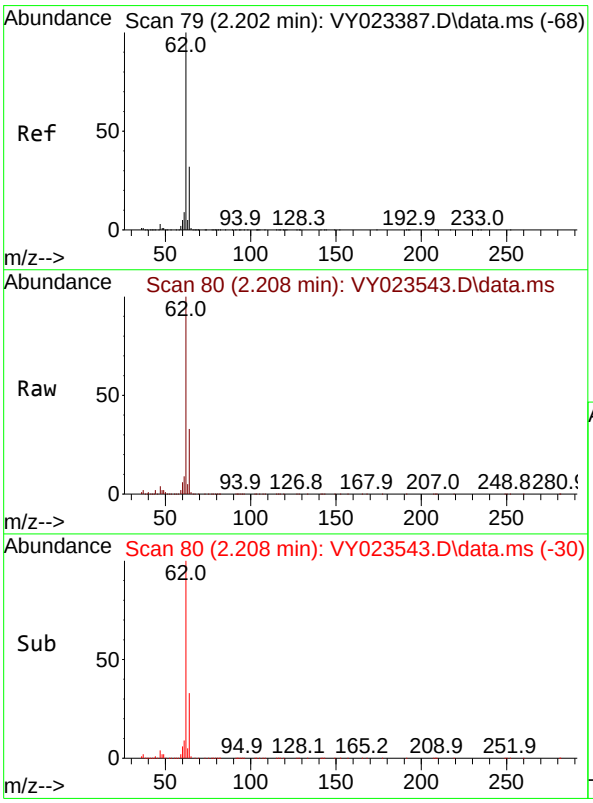
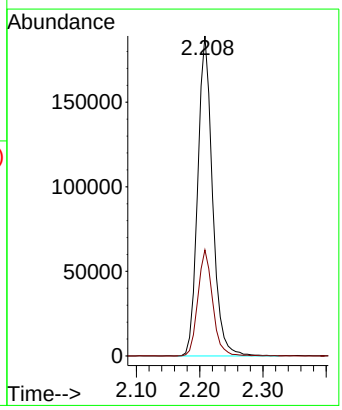
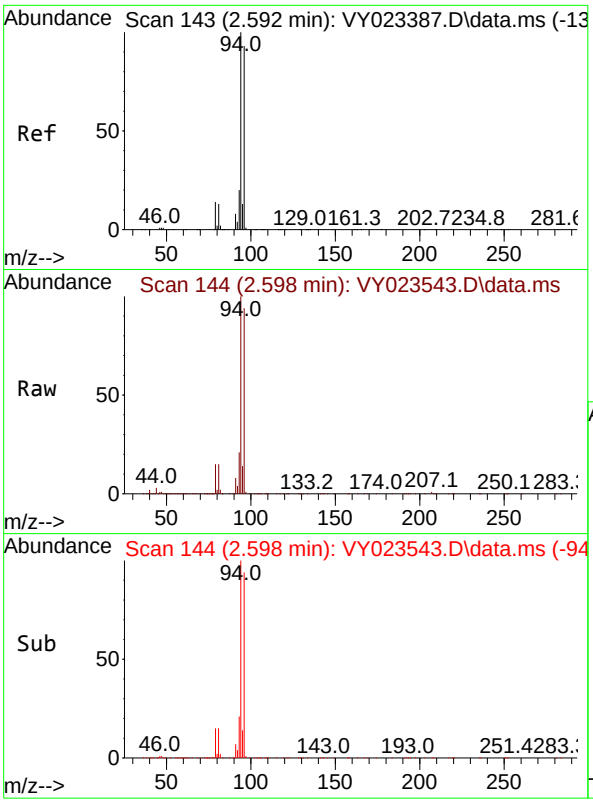


#4
Vinyl Chloride
Concen: 43.199 ug/l
RT: 2.208 min Scan# 80
Delta R.T. 0.006 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion: 62 Resp: 307788

Ion	Ratio	Lower	Upper
62	100		
64	33.1	25.8	38.8

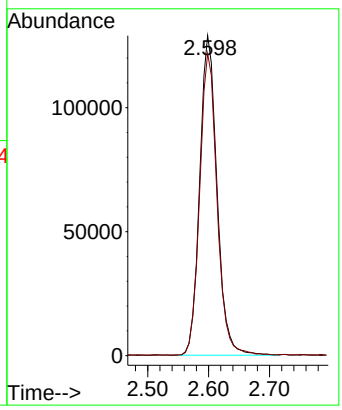




#5
Bromomethane
Concen: 42.551 ug/l
RT: 2.598 min Scan# 14
Delta R.T. 0.006 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion: 94 Resp: 25441

Ion	Ratio	Lower	Upper
94	100		
96	94.3	74.5	111.7



Instrument :
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VSTDCCC050

Manual Integrations
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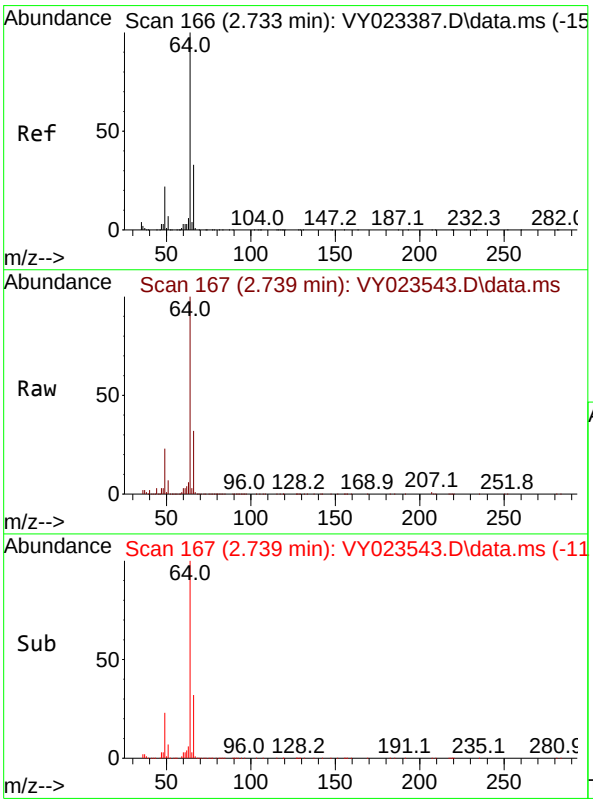
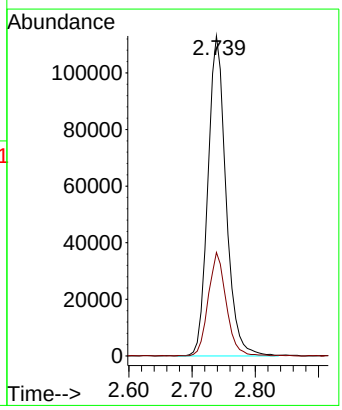
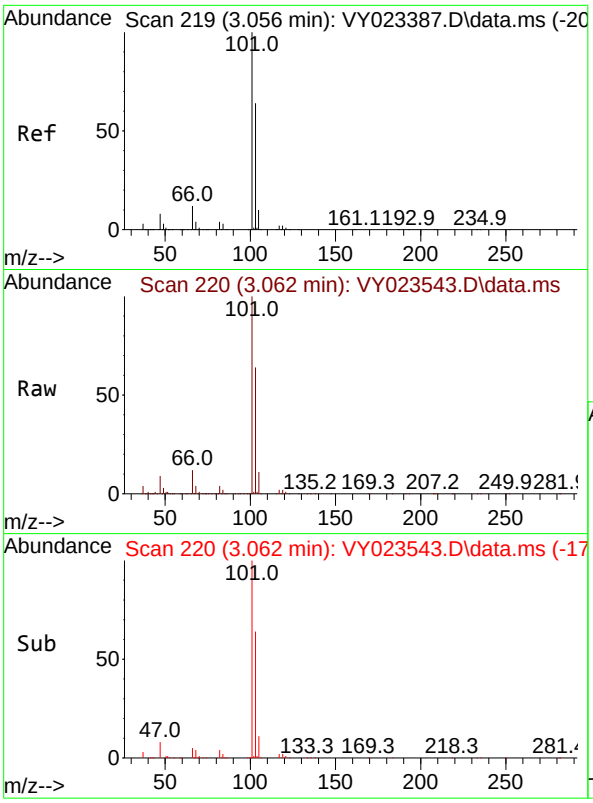


#6
Chloroethane
Concen: 46.306 ug/l
RT: 2.739 min Scan# 167
Delta R.T. 0.006 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion: 64 Resp: 224891

Ion	Ratio	Lower	Upper
64	100		
66	32.2	26.2	39.4

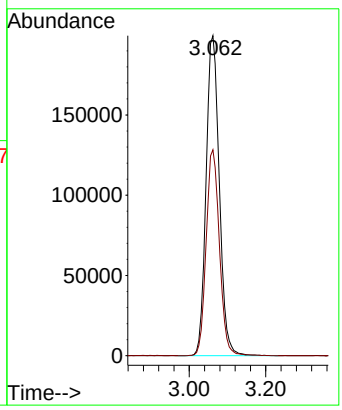




#7
Trichlorofluoromethane
Concen: 48.307 ug/l
RT: 3.062 min Scan# 2
Delta R.T. 0.006 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion:101 Resp: 47788

Ion	Ratio	Lower	Upper
101	100		
103	64.4	51.3	76.9



Instrument :
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VSTDCCC050

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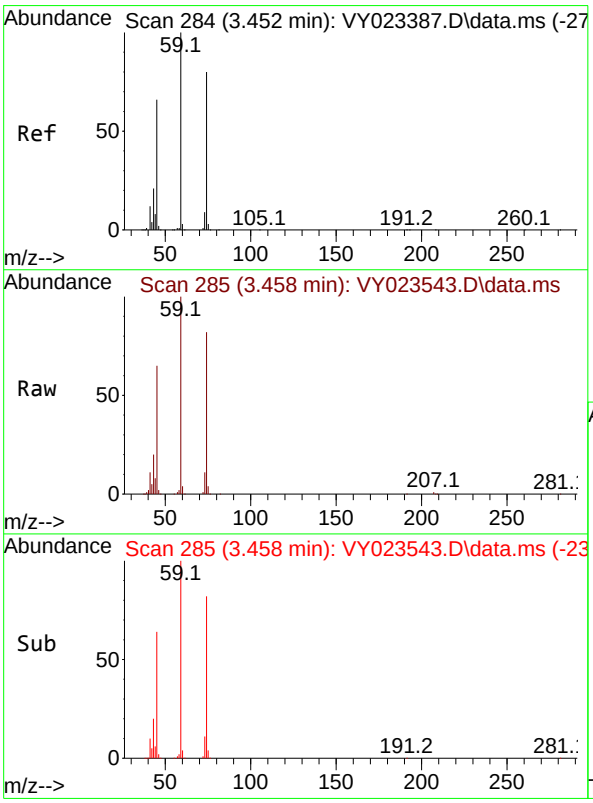
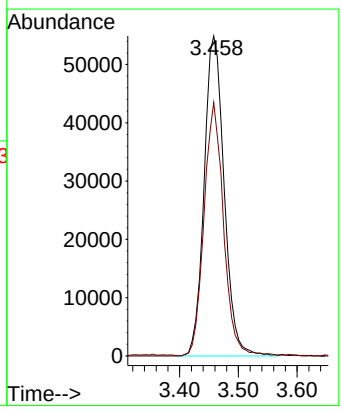
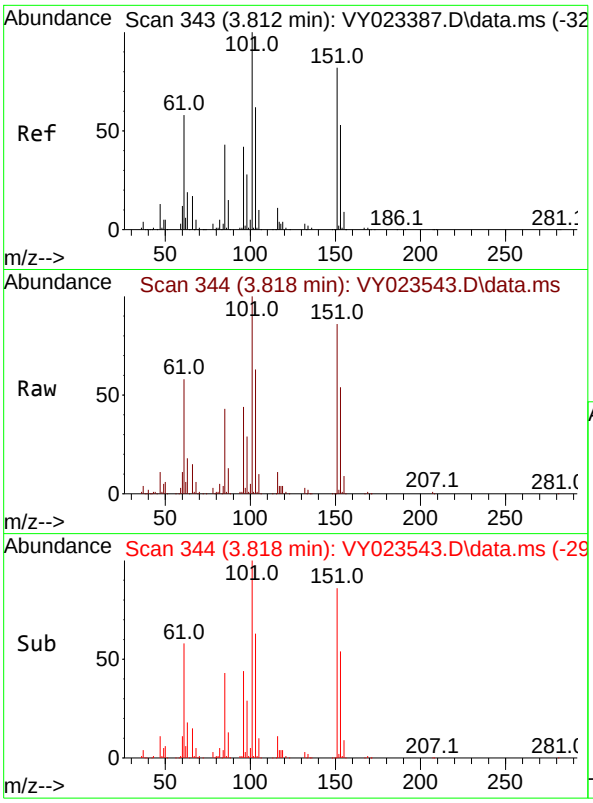


#8
Diethyl Ether
Concen: 50.281 ug/l
RT: 3.458 min Scan# 285
Delta R.T. 0.006 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion: 74 Resp: 129976

Ion	Ratio	Lower	Upper
74	100		
45	76.8	39.9	119.7





#9
1,1,2-Trichlorotrifluoroethane
Concen: 50.922 ug/l
RT: 3.818 min Scan# 34
Delta R.T. 0.006 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion:101 Resp: 26141

Ion	Ratio	Lower	Upper
101	100		
85	43.3	34.6	51.8
151	86.3	67.0	100.6

Instrument :
MSVOA_Y
ClientSampleId :
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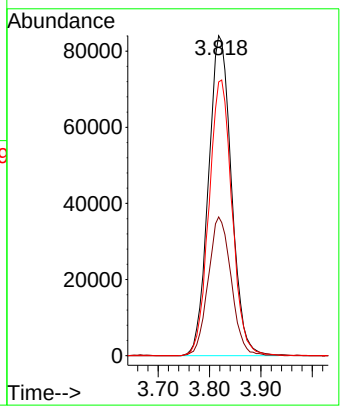
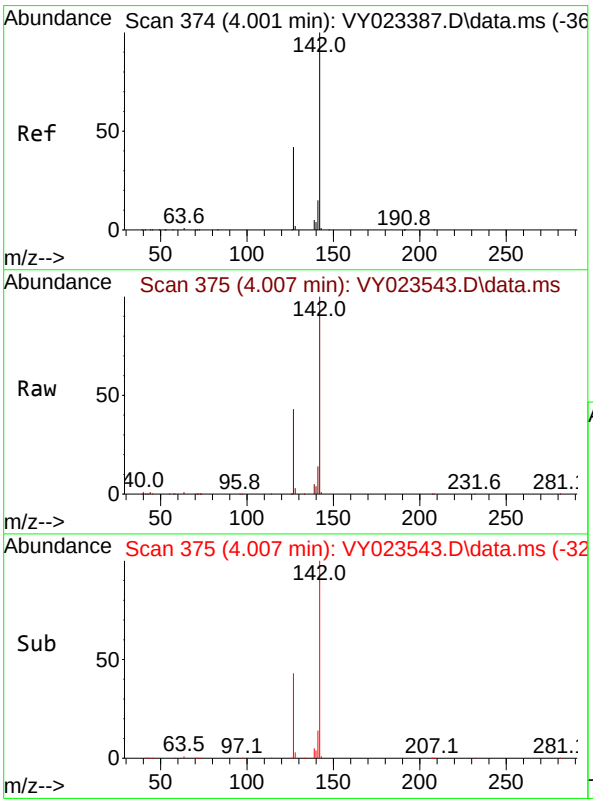
Supervised By :Mahesh Dadoda 10/24/2025

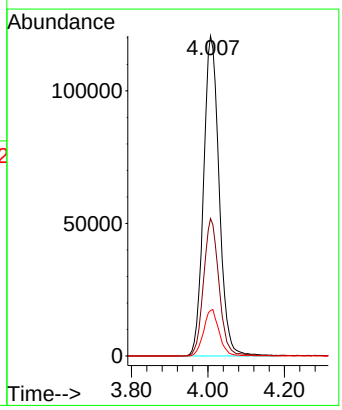


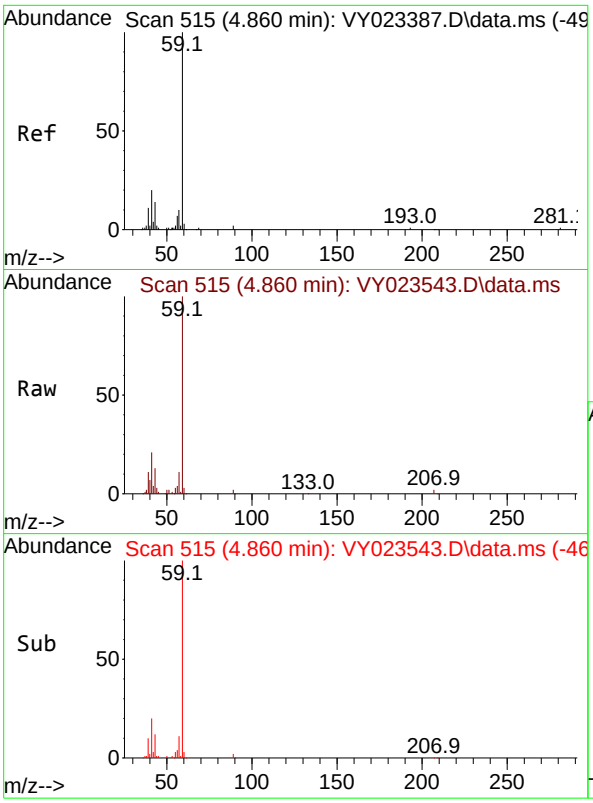


#10
Methyl Iodide
Concen: 59.772 ug/l
RT: 4.007 min Scan# 375
Delta R.T. 0.006 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion:142 Resp: 341595

Ion	Ratio	Lower	Upper
142	100		
127	42.5	34.8	52.2
141	14.3	11.6	17.4

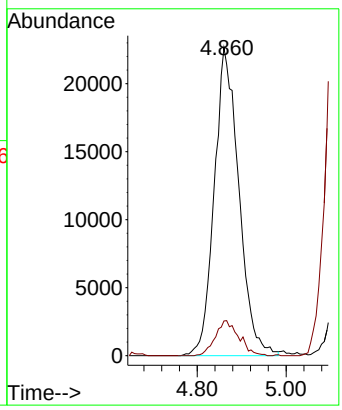




#11
Tert butyl alcohol
Concen: 250.315 ug/l
RT: 4.860 min Scan# 5
Delta R.T. -0.000 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion: 59 Resp: 8687

Ion	Ratio	Lower	Upper
59	100		
57	10.9	8.3	12.5



Instrument :
MSVOA_Y
ClientSampleId :
VSTDCCC050

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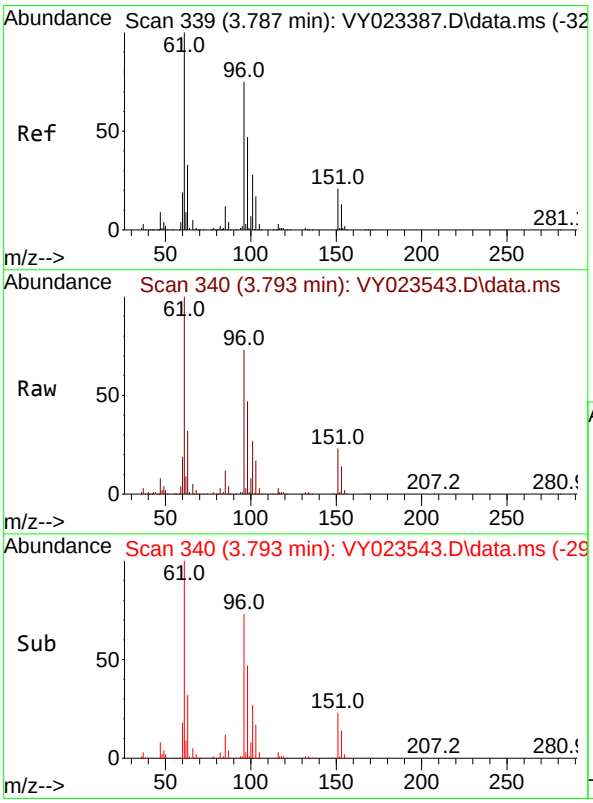
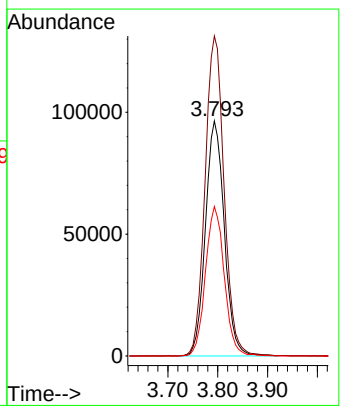
Supervised By :Mahesh Dadoda 10/24/2025

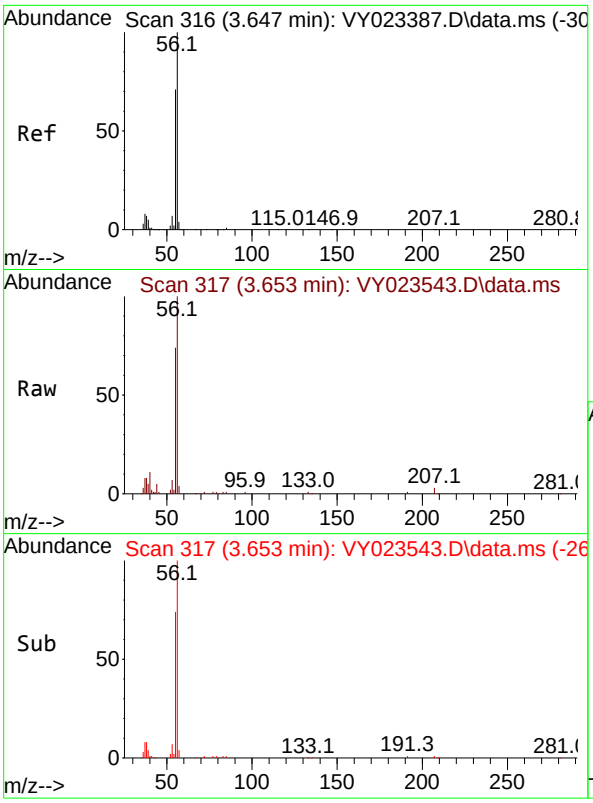


#12
1,1-Dichloroethene
Concen: 51.086 ug/l
RT: 3.793 min Scan# 340
Delta R.T. 0.006 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion: 96 Resp: 254223

Ion	Ratio	Lower	Upper
96	100		
61	136.2	106.7	160.1
98	63.6	50.2	75.4

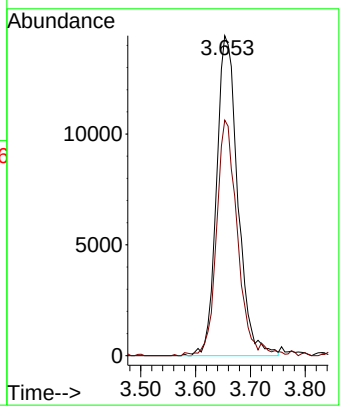




#13
Acrolein
Concen: 79.353 ug/l
RT: 3.653 min Scan# 3
Delta R.T. 0.006 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion: 56 Resp: 3891

Ion	Ratio	Lower	Upper
56	100		
55	68.9	56.1	84.1



Instrument :
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ClientSampleId :
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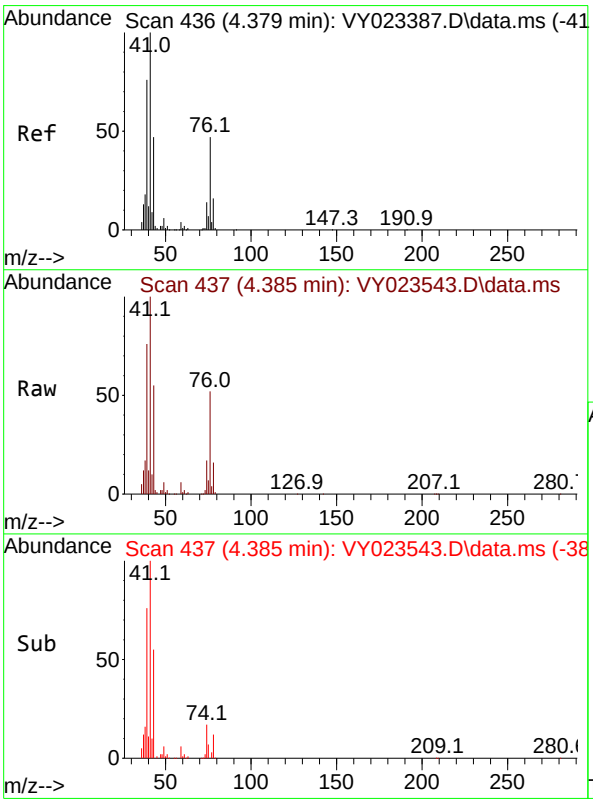
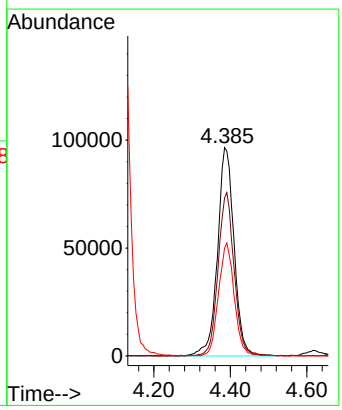
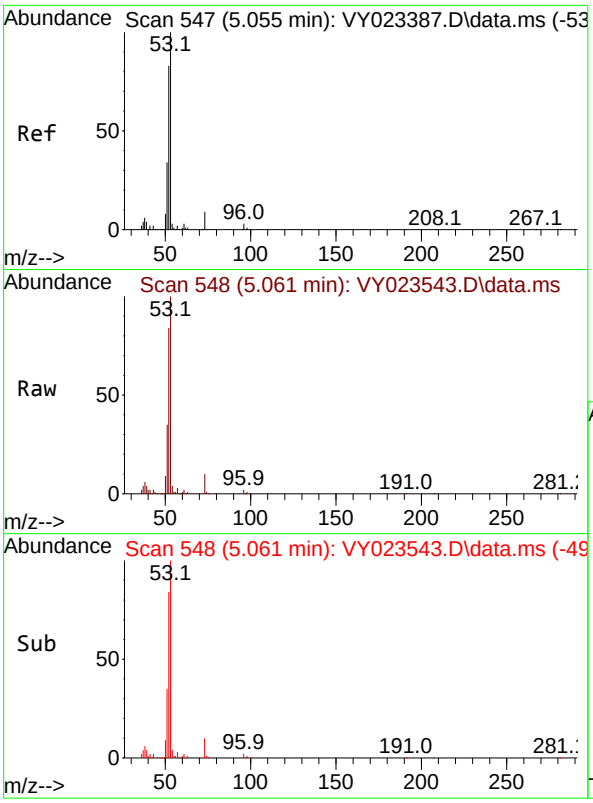


#14
Allyl chloride
Concen: 48.025 ug/l
RT: 4.385 min Scan# 437
Delta R.T. 0.006 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion: 41 Resp: 291262

Ion	Ratio	Lower	Upper
41	100		
39	76.0	59.9	89.9
76	51.3	38.0	57.0

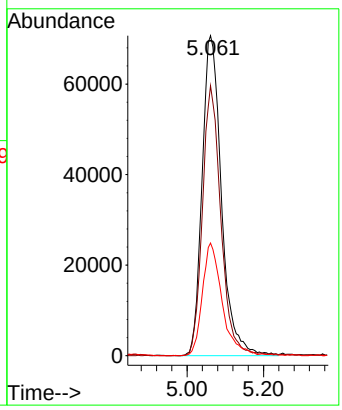




#15
Acrylonitrile
Concen: 251.312 ug/l
RT: 5.061 min Scan# 54
Delta R.T. 0.006 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion: 53 Resp: 24861

Ion	Ratio	Lower	Upper
53	100		
52	80.3	64.6	97.0
51	35.8	29.5	44.3



Instrument :
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ClientSampleId :
VSTDCCC050

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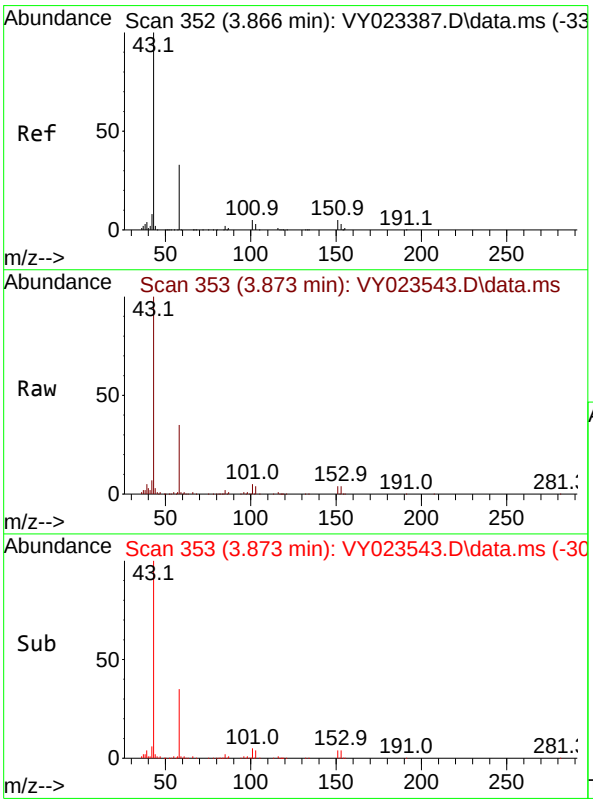
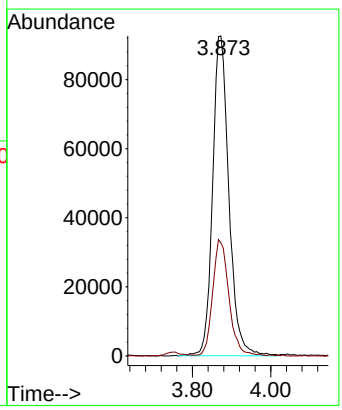
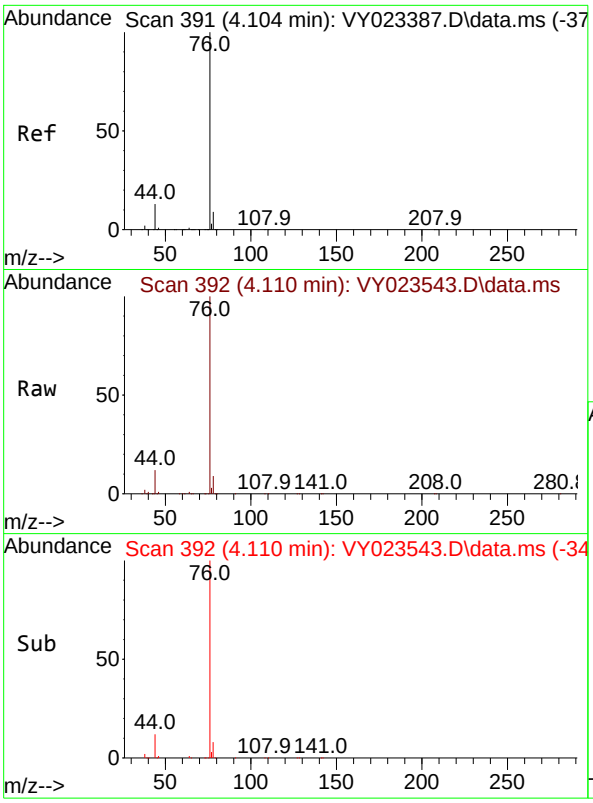


#16
Acetone
Concen: 240.345 ug/l
RT: 3.873 min Scan# 353
Delta R.T. 0.006 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion: 43 Resp: 266925

Ion	Ratio	Lower	Upper
43	100		
58	35.1	27.7	41.5

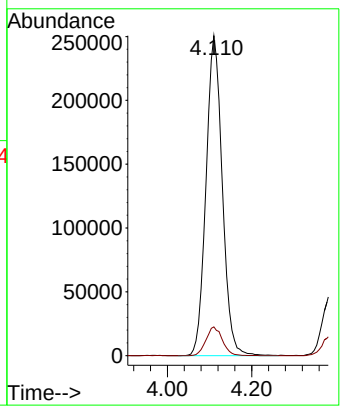




#17
Carbon Disulfide
Concen: 47.232 ug/l
RT: 4.110 min Scan# 3
Delta R.T. 0.006 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion: 76 Resp: 67271

Ion	Ratio	Lower	Upper
76	100		
78	9.0	7.3	10.9



Instrument :
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ClientSampleId :
VSTDCCC050

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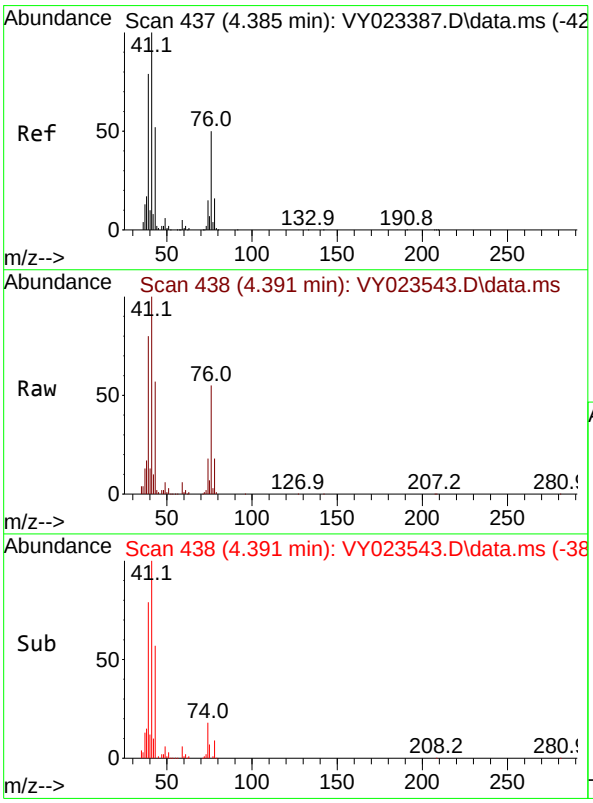
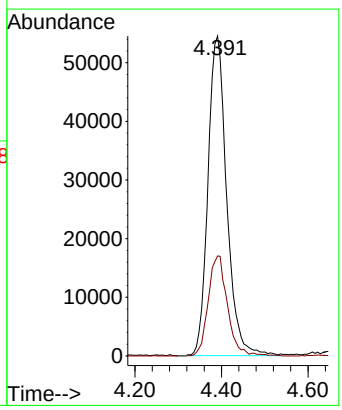
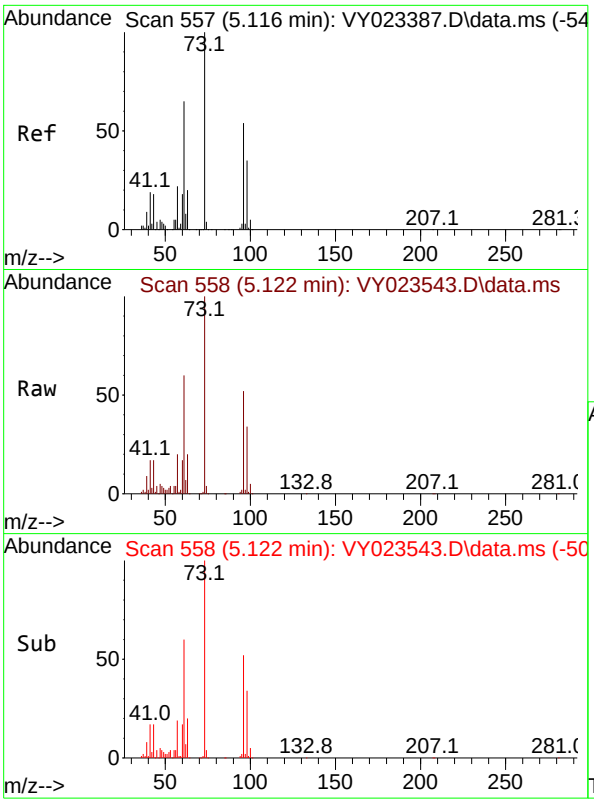


#18
Methyl Acetate
Concen: 56.225 ug/l
RT: 4.391 min Scan# 438
Delta R.T. 0.006 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion: 43 Resp: 163801

Ion	Ratio	Lower	Upper
43	100		
74	32.2	24.2	36.4

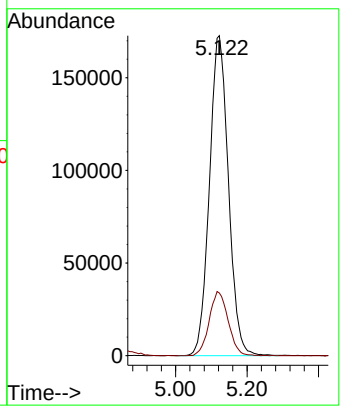




#19
Methyl tert-butyl Ether
Concen: 53.251 ug/l
RT: 5.122 min Scan# 5
Delta R.T. 0.006 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion: 73 Resp: 63689

Ion	Ratio	Lower	Upper
73	100		
57	19.6	17.4	26.0



Instrument :
MSVOA_Y
ClientSampleId :
VSTDCCC050

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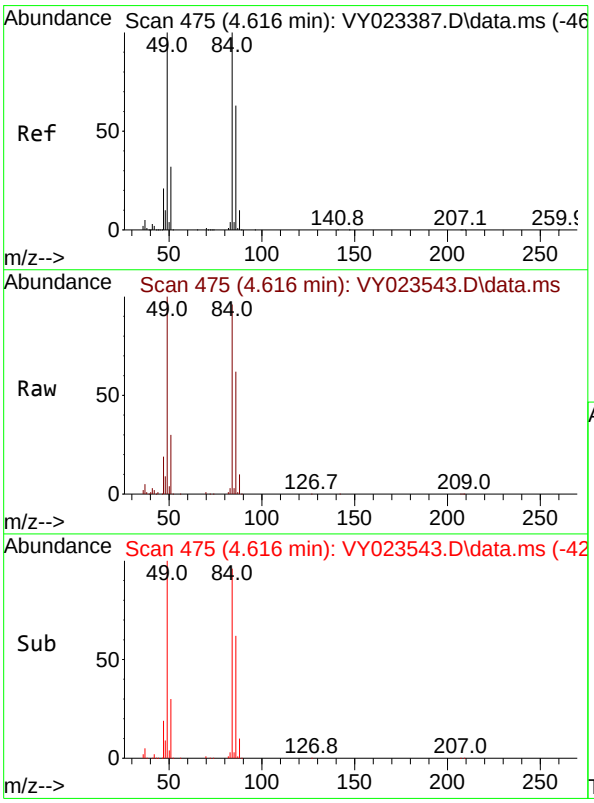
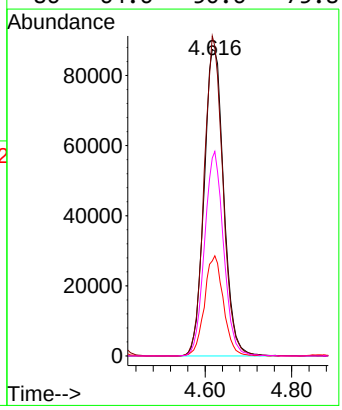
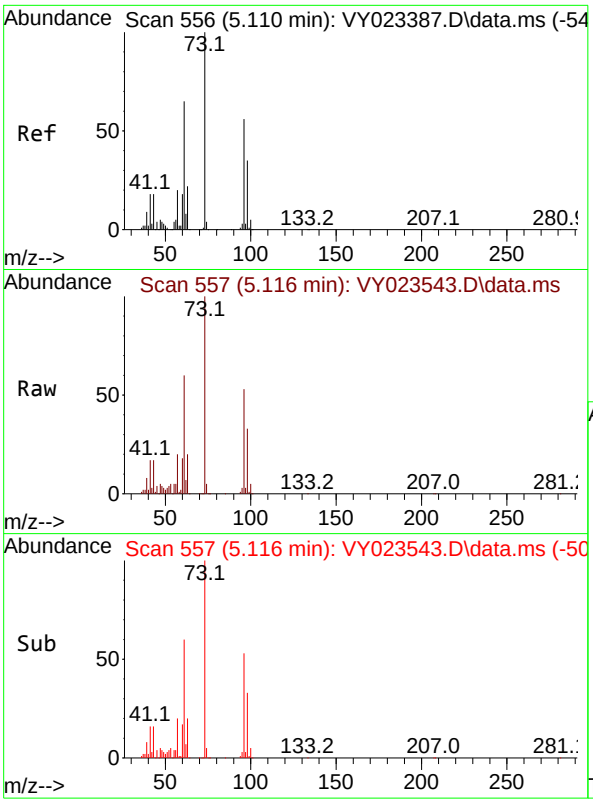


#20
Methylene Chloride
Concen: 46.039 ug/l
RT: 4.616 min Scan# 475
Delta R.T. -0.000 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion: 84 Resp: 276483

Ion	Ratio	Lower	Upper
84	100		
49	104.4	80.2	120.4
51	31.1	25.9	38.9
86	64.6	50.6	75.8

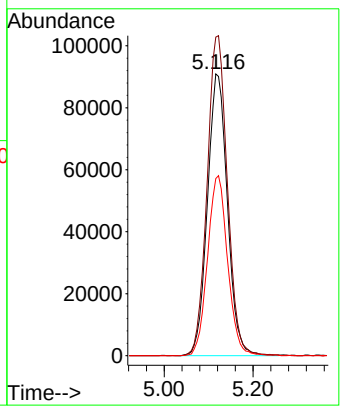




#21
trans-1,2-Dichloroethene
Concen: 51.921 ug/l
RT: 5.116 min Scan# 5
Delta R.T. 0.006 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion: 96 Resp: 28446

Ion	Ratio	Lower	Upper
96	100		
61	113.0	92.7	139.1
98	62.8	49.7	74.5



Instrument :
MSVOA_Y
ClientSampleId :
VSTDCCC050

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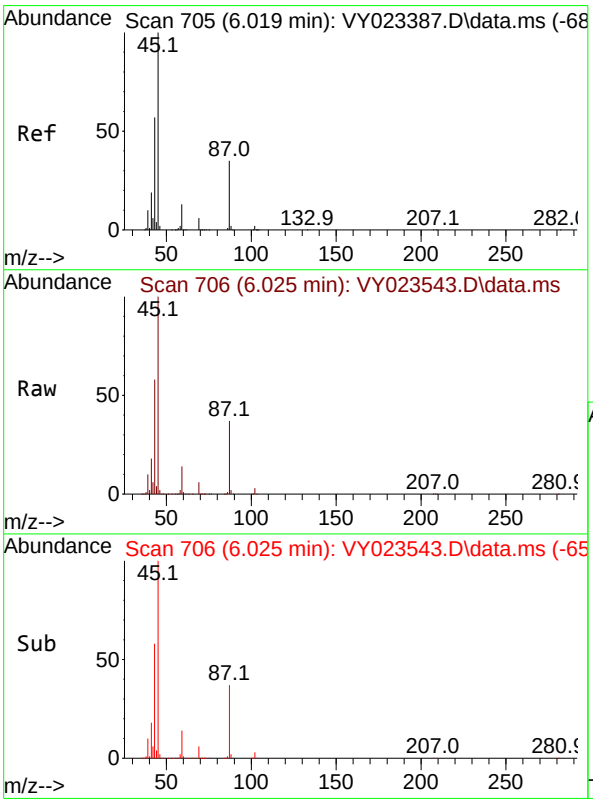
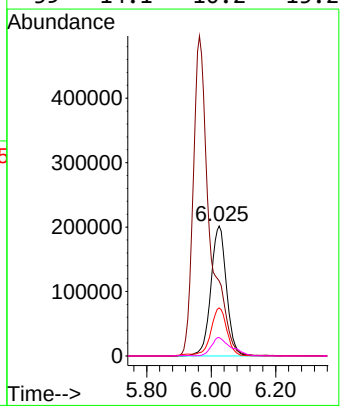
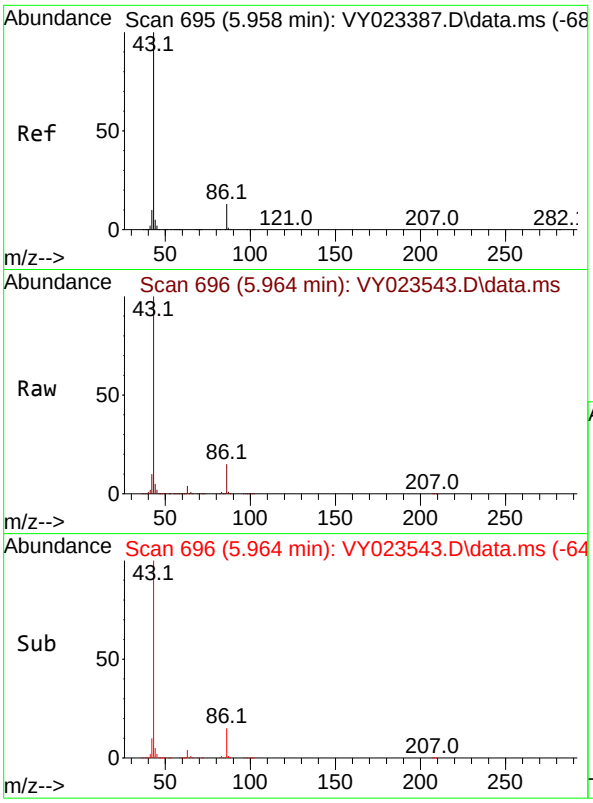


#22
Diisopropyl ether
Concen: 50.537 ug/l
RT: 6.025 min Scan# 706
Delta R.T. 0.006 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion: 45 Resp: 677959

Ion	Ratio	Lower	Upper
45	100		
43	57.6	45.6	68.4
87	37.0	28.1	42.1
59	14.1	10.2	15.2

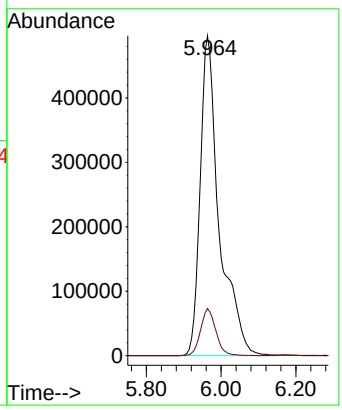




#23
Vinyl Acetate
Concen: 242.046 ug/l
RT: 5.964 min Scan# 6
Delta R.T. 0.006 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion: 43 Resp: 175756

Ion	Ratio	Lower	Upper
43	100		
86	14.7	10.6	15.8



Instrument :
MSVOA_Y
ClientSampleId :
VSTDCCC050

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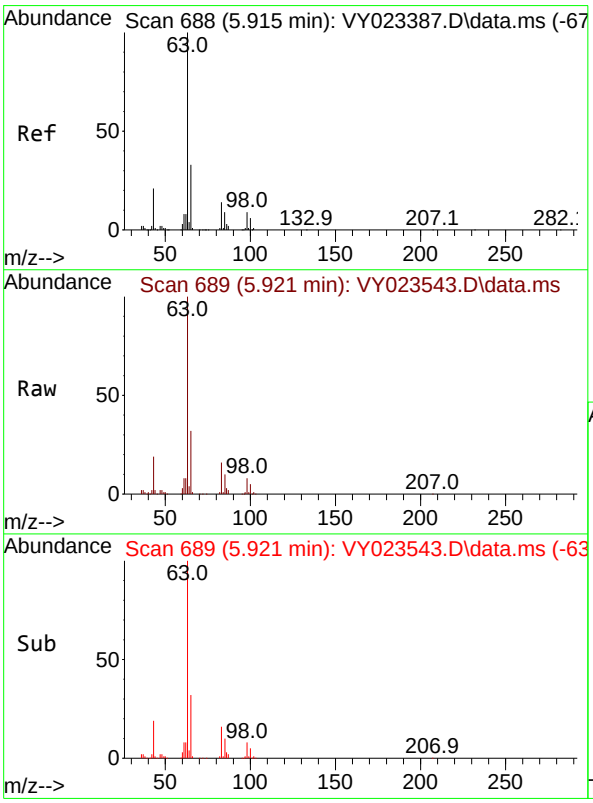
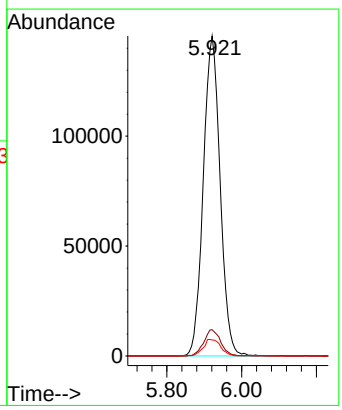
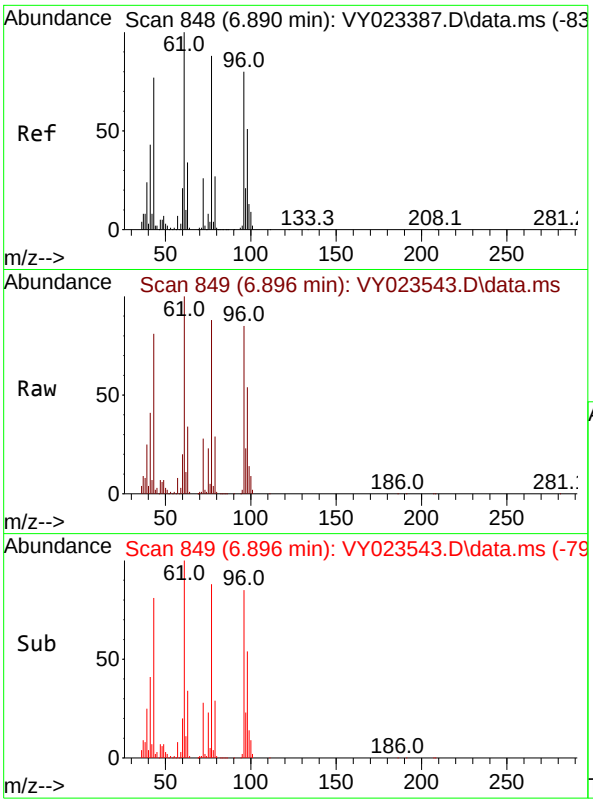


#24
1,1-Dichloroethane
Concen: 51.156 ug/l
RT: 5.921 min Scan# 689
Delta R.T. 0.006 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion: 63 Resp: 454590

Ion	Ratio	Lower	Upper
63	100		
98	8.2	4.3	13.1
100	5.0	2.8	8.4





#25
2-Butanone
Concen: 242.629 ug/l
RT: 6.896 min Scan# 84
Delta R.T. 0.006 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion: 43 Resp: 32897

Ion	Ratio	Lower	Upper
43	100		
72	34.4	27.4	41.2

Instrument :
MSVOA_Y
ClientSampleId :
VSTDCCC050

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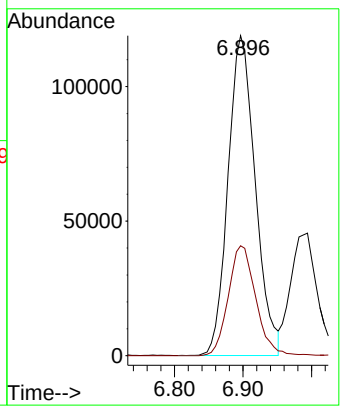
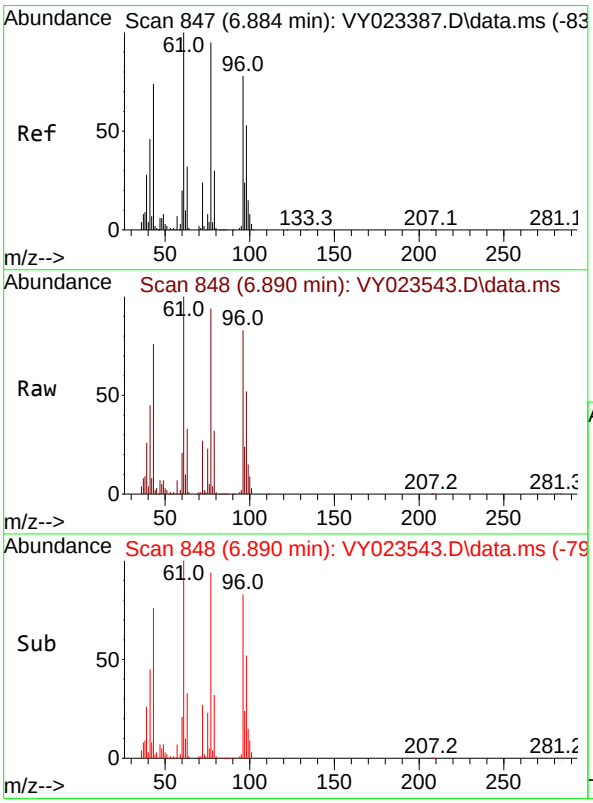
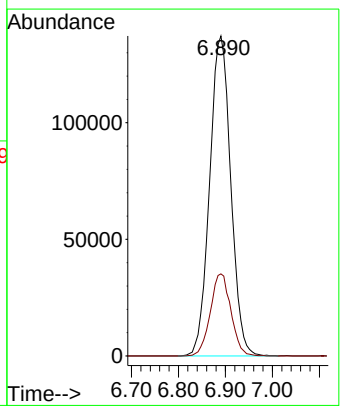


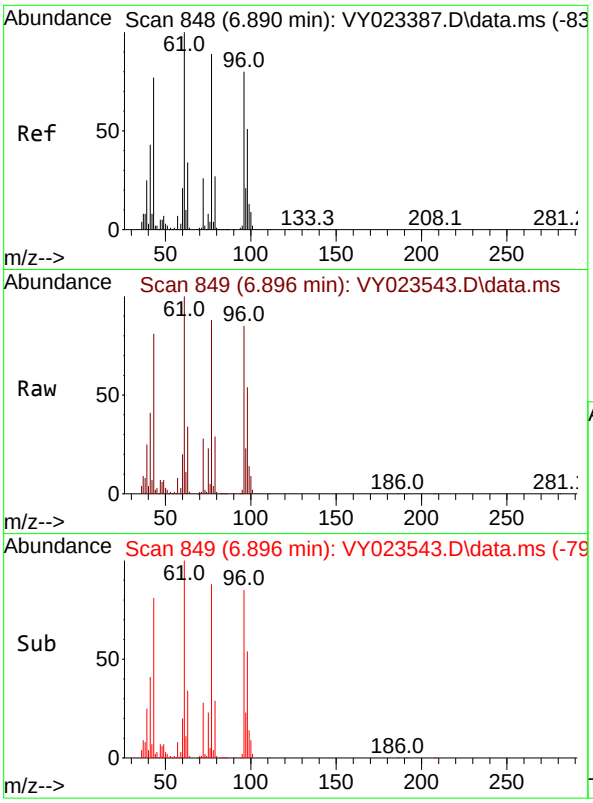


#26
2,2-Dichloropropane
Concen: 52.555 ug/l
RT: 6.890 min Scan# 848
Delta R.T. 0.006 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion: 77 Resp: 428536

Ion	Ratio	Lower	Upper
77	100		
97	25.0	12.1	36.3





#27
cis-1,2-Dichloroethene
Concen: 53.843 ug/l
RT: 6.896 min Scan# 84
Delta R.T. 0.006 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion: 96 Resp: 34075

Ion	Ratio	Lower	Upper
96	100		
61	122.7	0.0	258.2
98	65.1	0.0	132.0

Instrument :
MSVOA_Y
ClientSampleId :
VSTDCCC050

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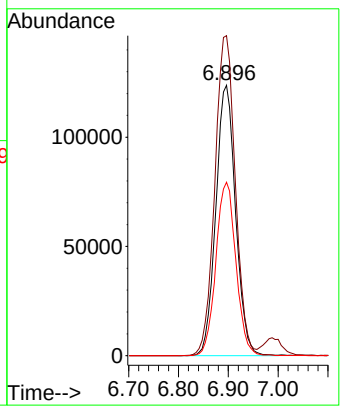
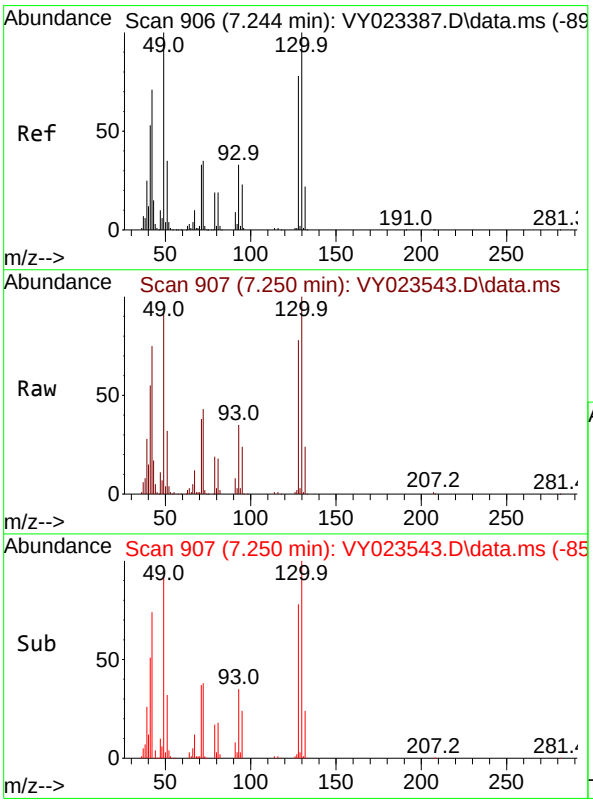
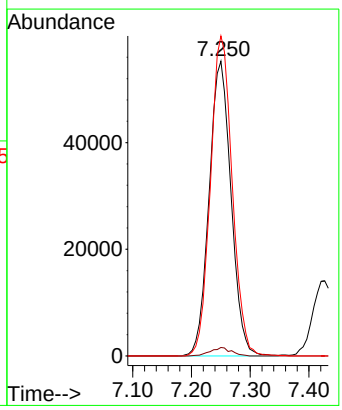


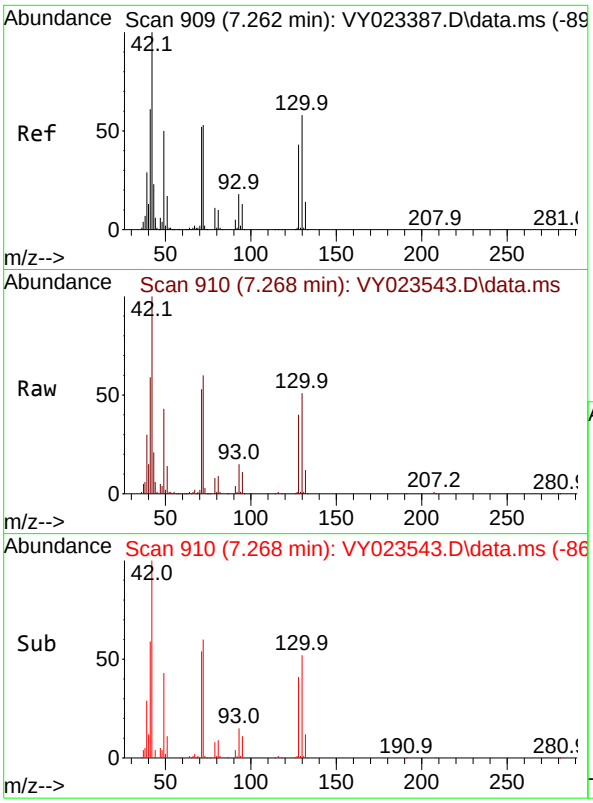


#28
Bromochloromethane
Concen: 43.243 ug/l
RT: 7.250 min Scan# 907
Delta R.T. 0.006 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion: 49 Resp: 143454

Ion	Ratio	Lower	Upper
49	100		
129	2.7	0.0	5.6
130	107.8	81.9	122.9

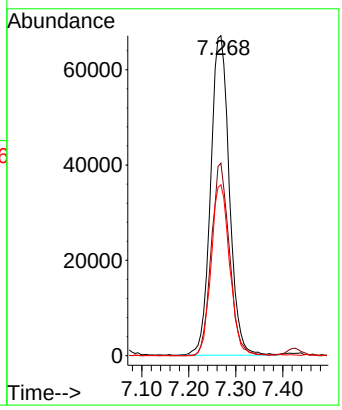




#29
Tetrahydrofuran
Concen: 240.938 ug/l
RT: 7.268 min Scan# 9
Delta R.T. 0.006 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion: 42 Resp: 18524

Ion	Ratio	Lower	Upper
42	100		
72	58.5	43.0	64.6
71	53.4	40.1	60.1



Instrument :
MSVOA_Y
ClientSampleId :
VSTDCCC050

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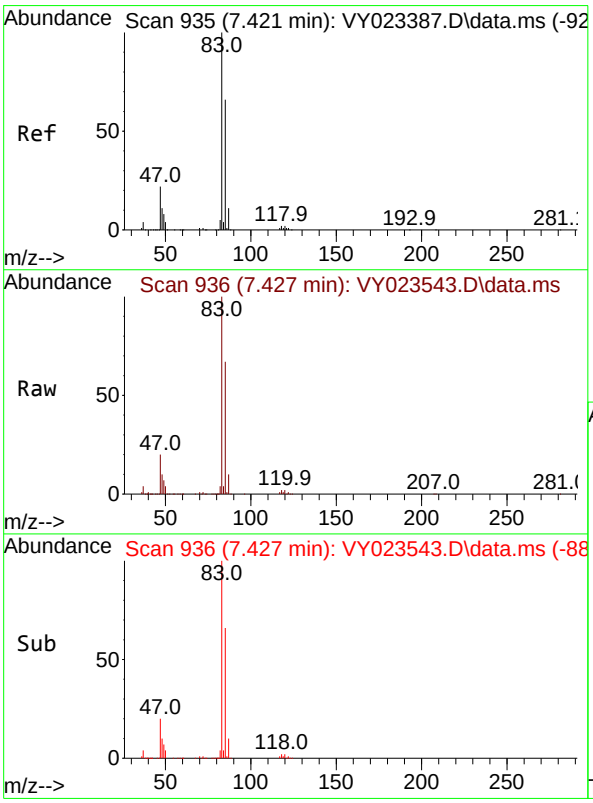
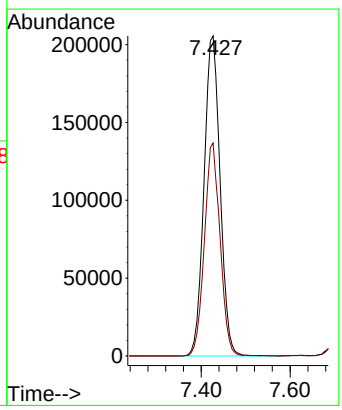
Supervised By :Mahesh Dadoda 10/24/2025

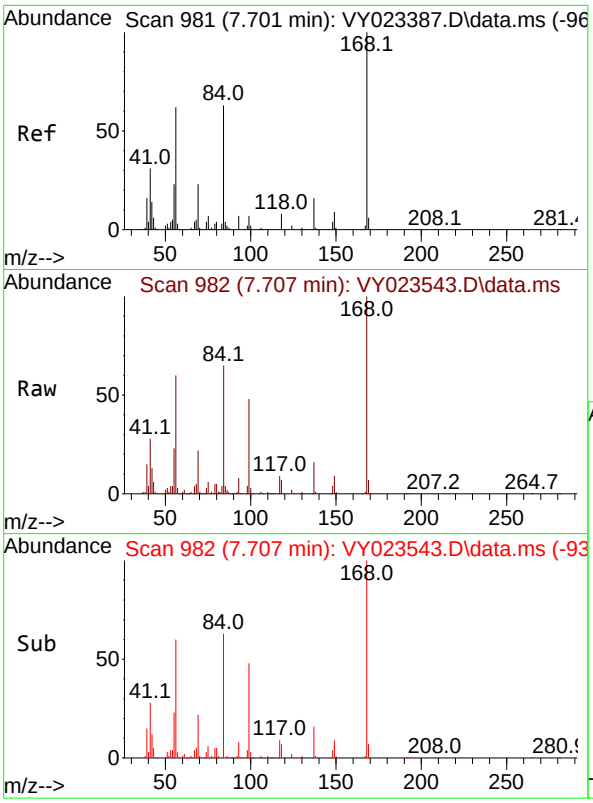


#30
Chloroform
Concen: 53.000 ug/l
RT: 7.427 min Scan# 936
Delta R.T. 0.006 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion: 83 Resp: 517452

Ion	Ratio	Lower	Upper
83	100		
85	66.6	52.5	78.7

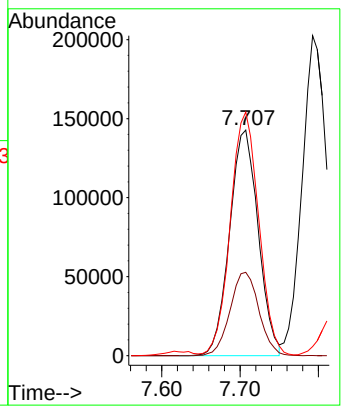




#31
Cyclohexane
Concen: 46.762 ug/l
RT: 7.707 min Scan# 9
Delta R.T. 0.006 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion: 56 Resp: 36289

Ion	Ratio	Lower	Upper
56	100		
69	37.0	30.0	45.0
84	106.3	81.2	121.8



Instrument :
MSVOA_Y
ClientSampleId :
VSTDCCC050

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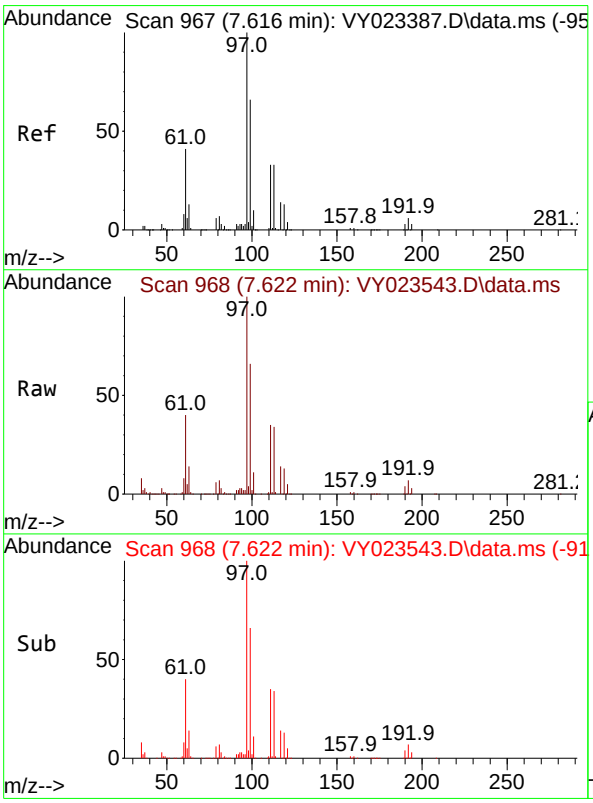
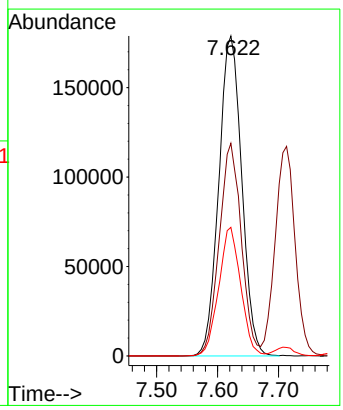
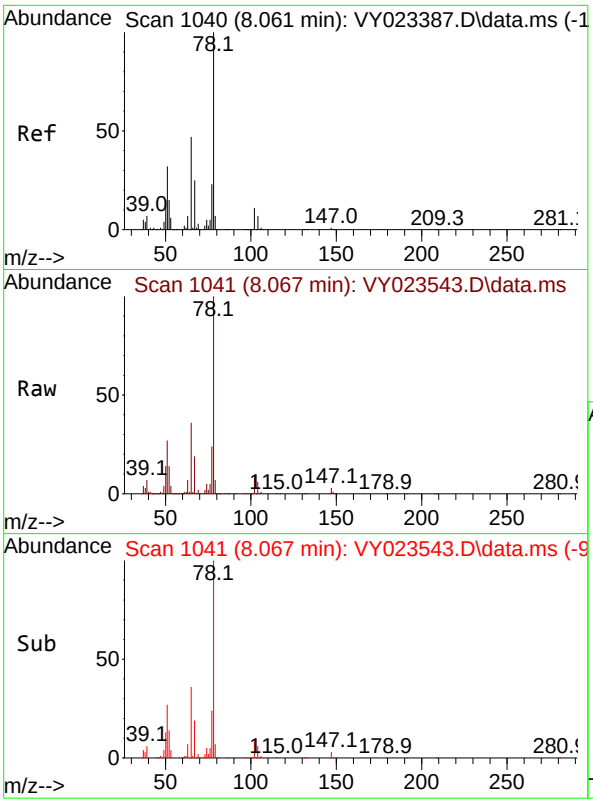


#32
1,1,1-Trichloroethane
Concen: 52.741 ug/l
RT: 7.622 min Scan# 968
Delta R.T. 0.006 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion: 97 Resp: 467952

Ion	Ratio	Lower	Upper
97	100		
99	64.3	51.4	77.2
61	38.7	31.9	47.9

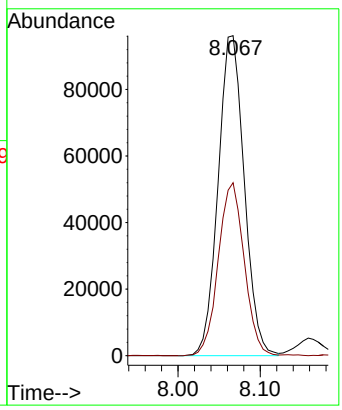




#33
1,2-Dichloroethane-d4
Concen: 45.615 ug/l
RT: 8.067 min Scan# 1
Delta R.T. 0.006 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion: 65 Resp: 21279

Ion	Ratio	Lower	Upper
65	100		
67	53.7	0.0	105.8



Instrument :
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ClientSampleId :
VSTDCCC050

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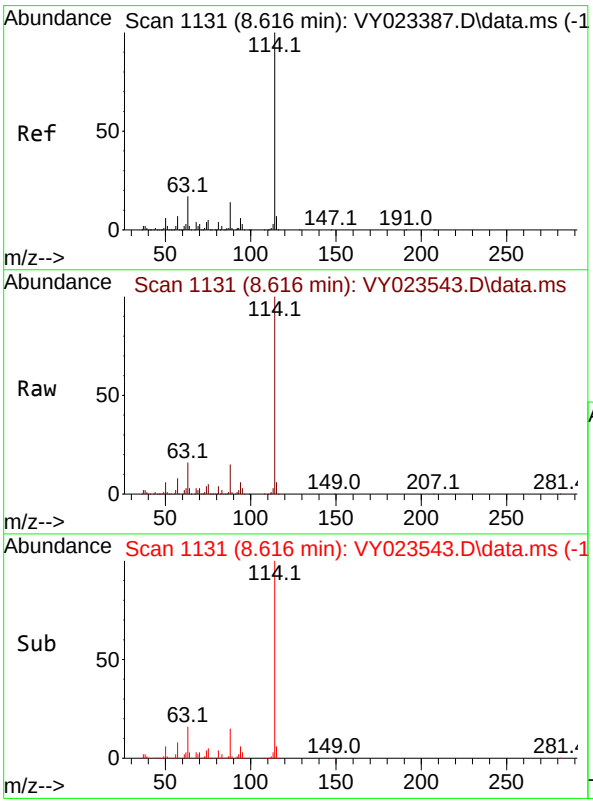
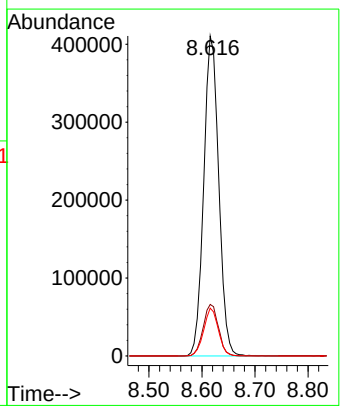
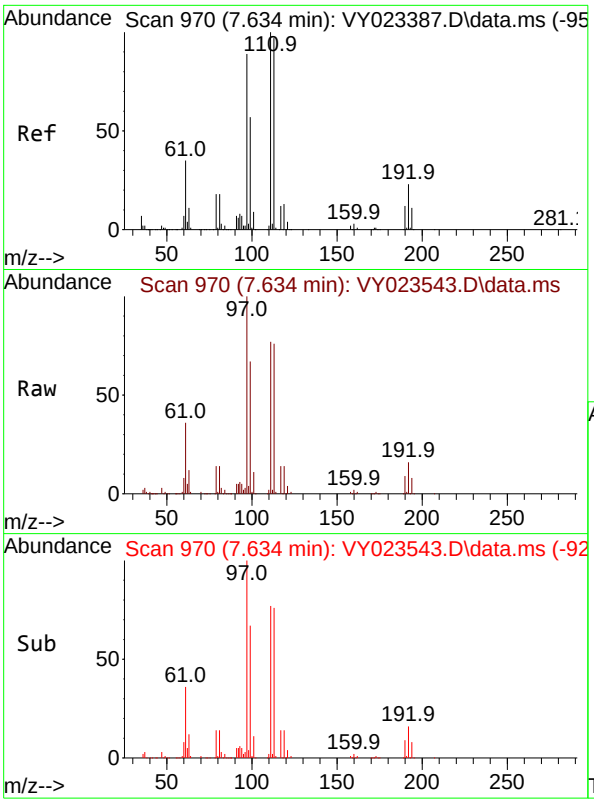


#34
1,4-Difluorobenzene
Concen: 50.000 ug/l
RT: 8.616 min Scan# 1131
Delta R.T. -0.000 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion:114 Resp: 806690

Ion	Ratio	Lower	Upper
114	100		
63	16.1	0.0	34.2
88	15.0	0.0	28.4

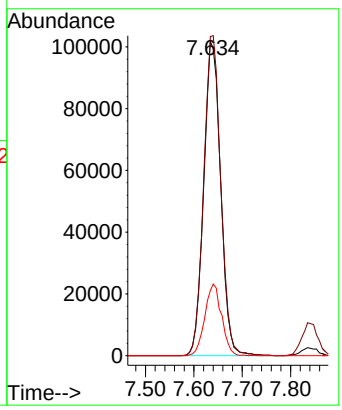




#35
Dibromofluoromethane
Concen: 49.924 ug/l
RT: 7.634 min Scan# 9
Delta R.T. -0.000 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion:113 Resp: 24745

Ion	Ratio	Lower	Upper
113	100		
111	102.5	81.8	122.6
192	22.6	18.0	27.0



Instrument :
MSVOA_Y
ClientSampleId :
VSTDCCC050

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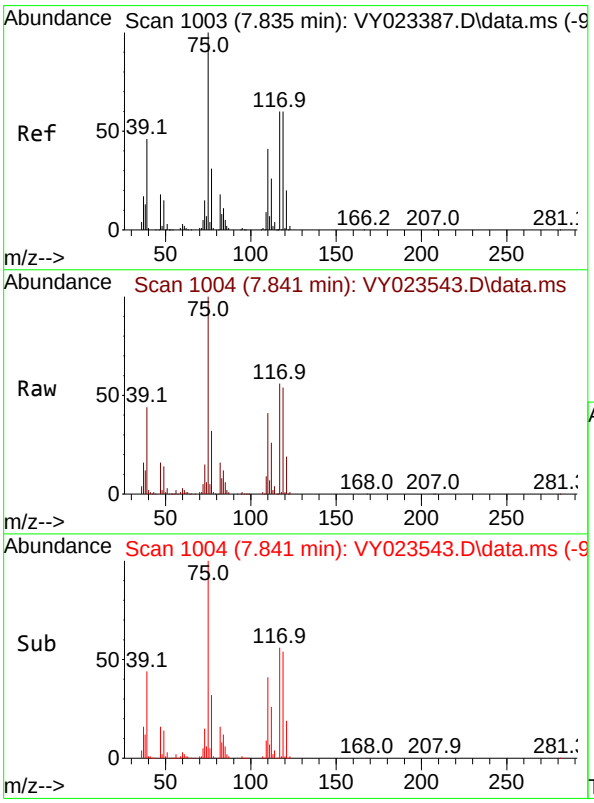
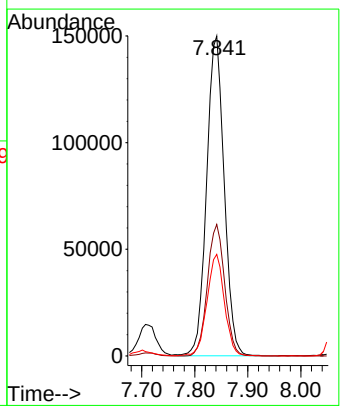
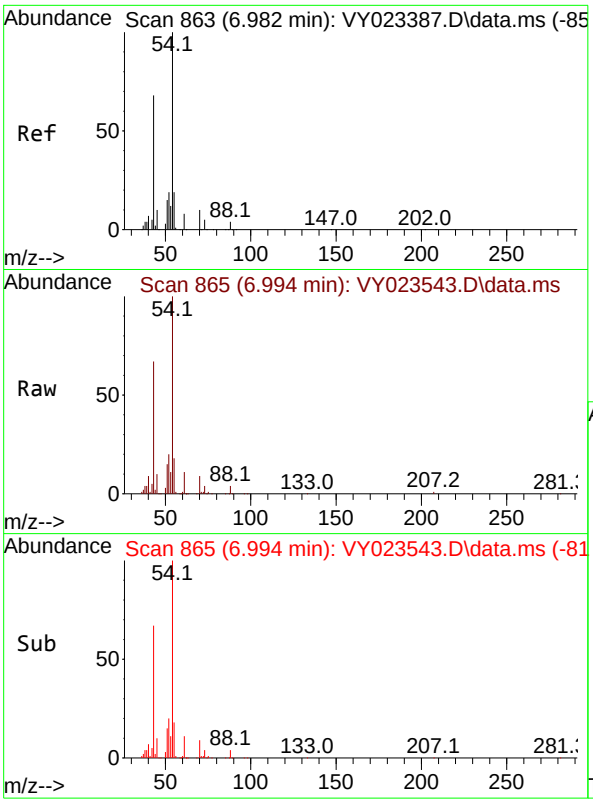


#36
1,1-Dichloropropene
Concen: 52.436 ug/l
RT: 7.841 min Scan# 1004
Delta R.T. 0.006 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion: 75 Resp: 344096

Ion	Ratio	Lower	Upper
75	100		
110	40.7	19.9	59.7
77	31.7	25.0	37.6





#37
Ethyl Acetate
Concen: 48.956 ug/l
RT: 6.994 min Scan# 8
Delta R.T. 0.012 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion: 43 Resp: 12727

Ion	Ratio	Lower	Upper
43	100		
61	17.2	11.8	17.8
70	13.2	10.5	15.7

Instrument :
MSVOA_Y
ClientSampleId :
VSTDCCC050

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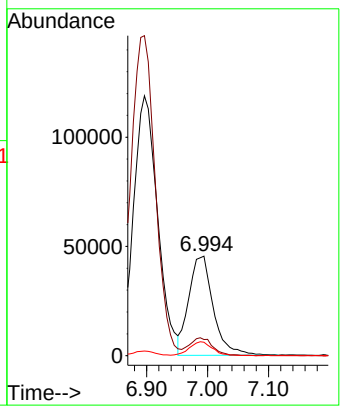
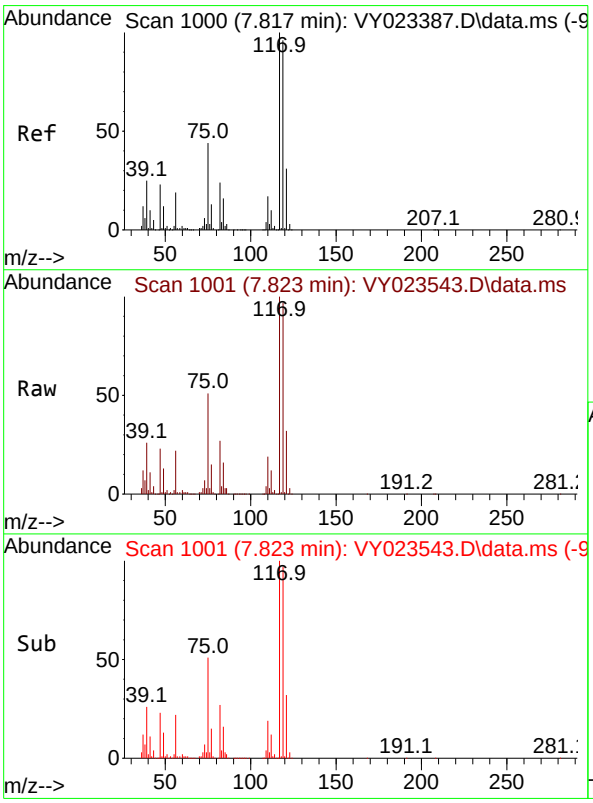
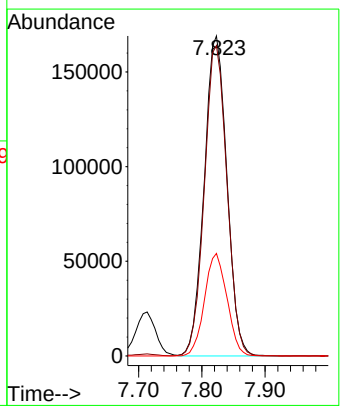


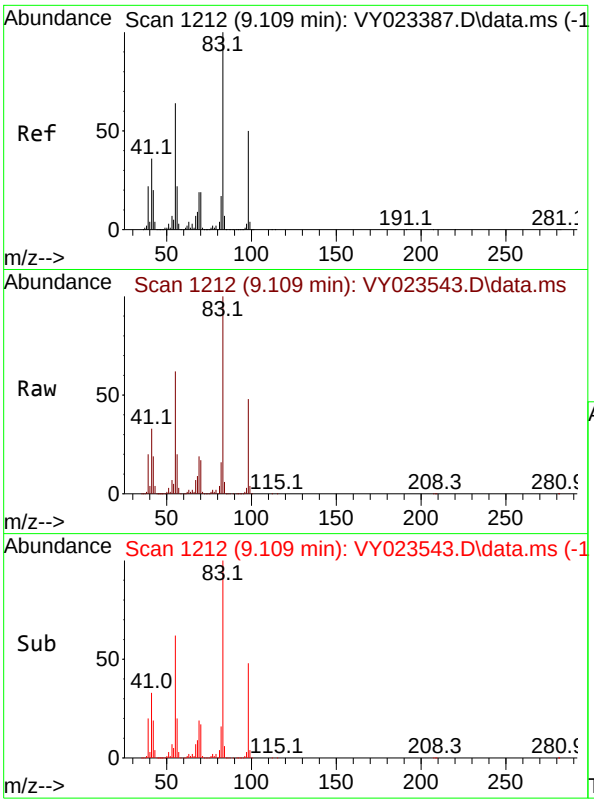


#38
Carbon Tetrachloride
Concen: 52.970 ug/l
RT: 7.823 min Scan# 1001
Delta R.T. 0.006 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion:117 Resp: 421482

Ion	Ratio	Lower	Upper
117	100		
119	97.0	76.8	115.2
121	32.1	24.5	36.7

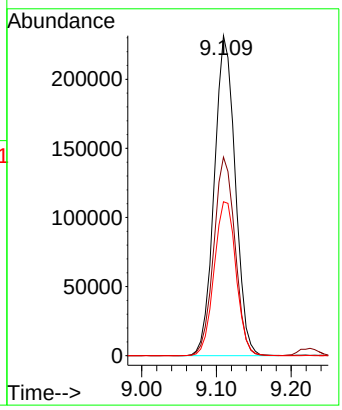




#39
Methylcyclohexane
Concen: 52.949 ug/l
RT: 9.109 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion: 83 Resp: 45240

Ion	Ratio	Lower	Upper
83	100		
55	62.1	51.4	77.2
98	48.1	40.4	60.6



Instrument :
MSVOA_Y
ClientSampleId :
VSTDCCC050

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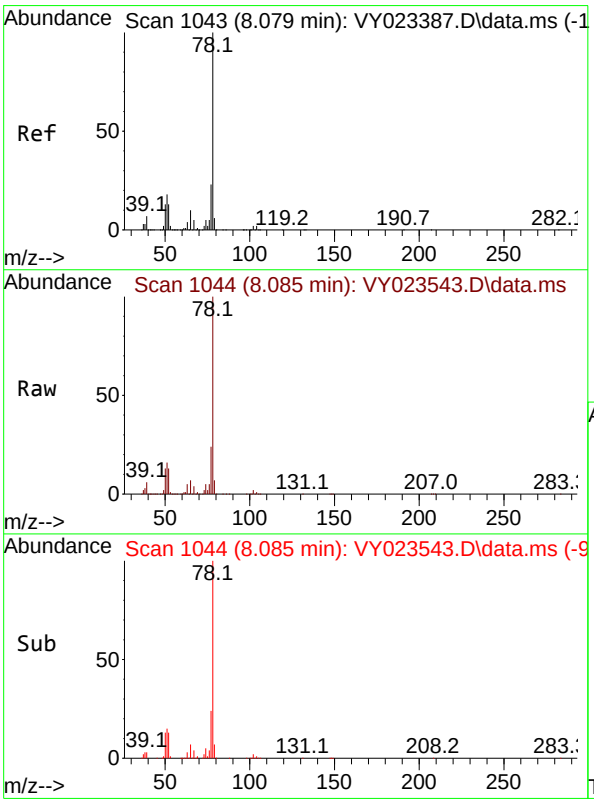
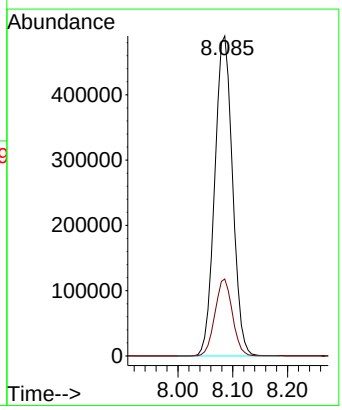
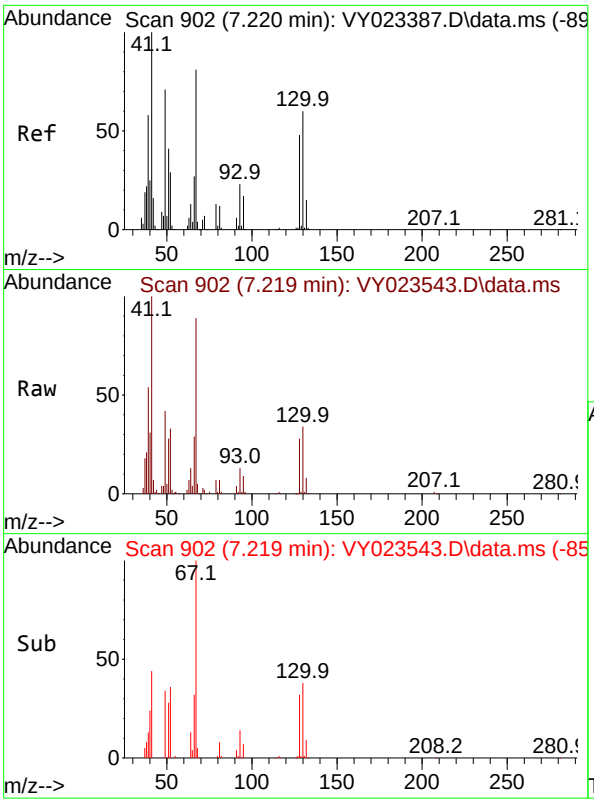


#40
Benzene
Concen: 53.219 ug/l
RT: 8.085 min Scan# 1044
Delta R.T. 0.006 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion: 78 Resp: 1105993

Ion	Ratio	Lower	Upper
78	100		
77	24.0	18.3	27.5

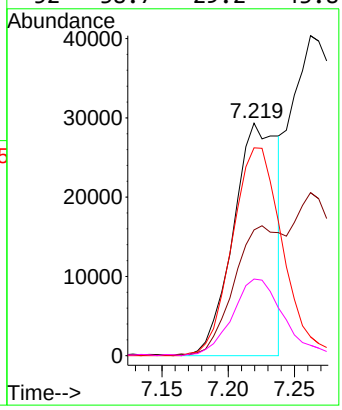




#41
Methacrylonitrile
Concen: 48.413 ug/l m
RT: 7.219 min Scan# 9
Delta R.T. -0.000 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion: 41 Resp: 6807

Ion	Ratio	Lower	Upper
41	100		
39	64.3	52.2	78.4
67	102.9	74.9	112.3
52	38.7	29.2	43.8



Instrument :
MSVOA_Y
ClientSampleId :
VSTDCCC050

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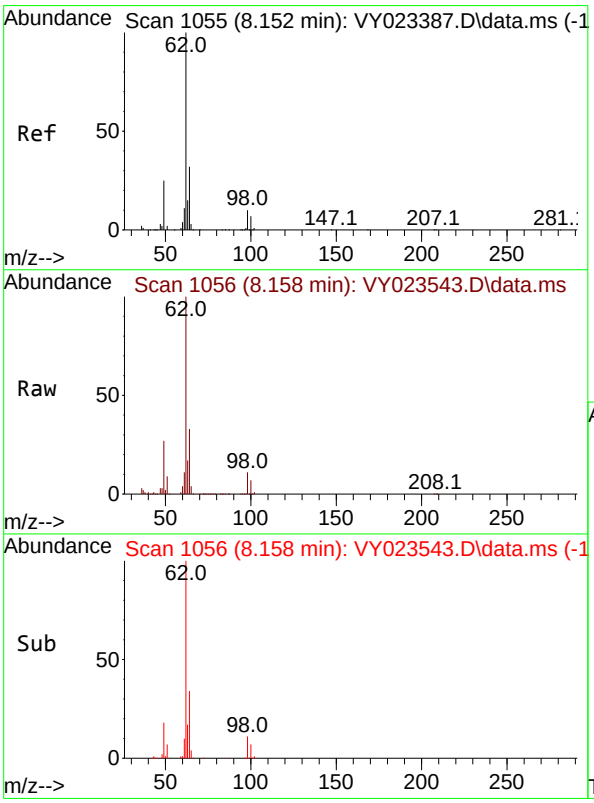
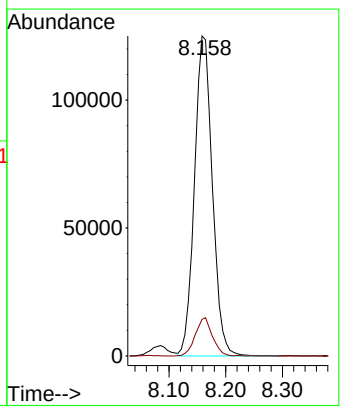
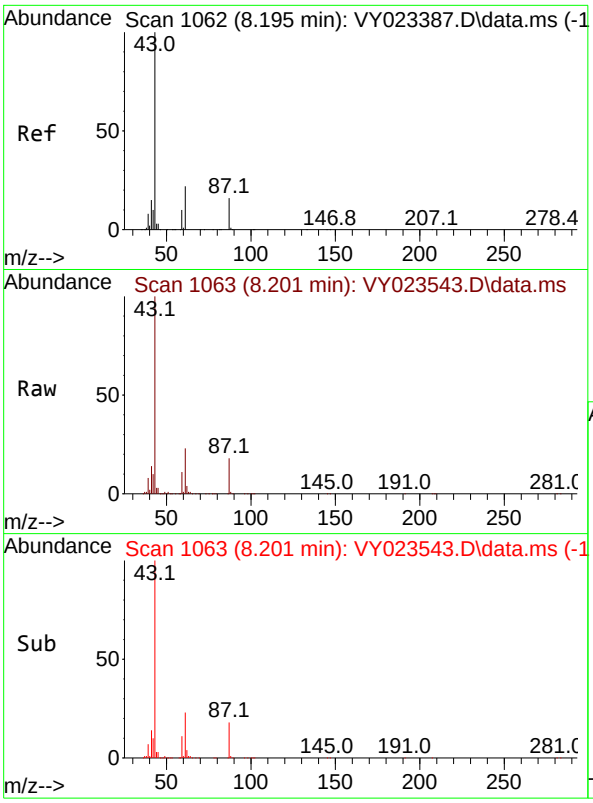


#42
1,2-Dichloroethane
Concen: 51.247 ug/l
RT: 8.158 min Scan# 1056
Delta R.T. 0.006 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion: 62 Resp: 274669

Ion	Ratio	Lower	Upper
62	100		
98	11.4	0.0	21.6





#43
Isopropyl Acetate
Concen: 50.092 ug/l
RT: 8.201 min Scan# 1
Delta R.T. 0.006 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion: 43 Resp: 25967

Ion	Ratio	Lower	Upper
43	100		
61	25.1	18.1	27.1
87	18.0	13.5	20.3

Instrument :
MSVOA_Y
ClientSampleId :
VSTDCCC050

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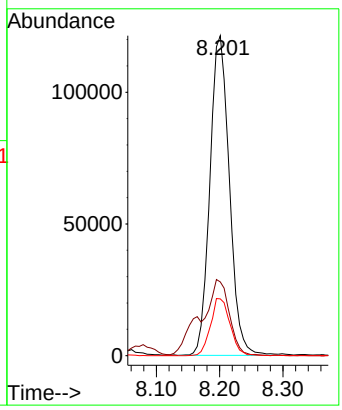
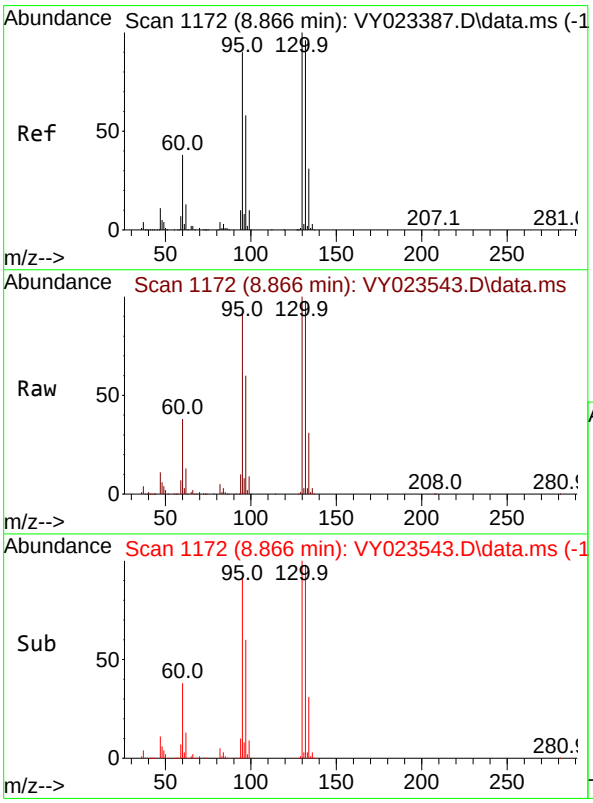
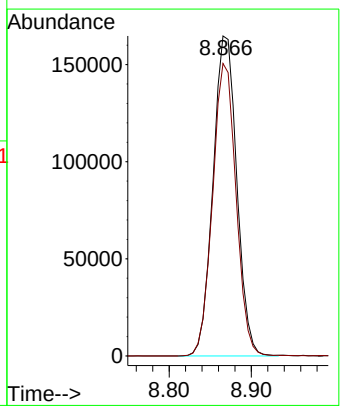


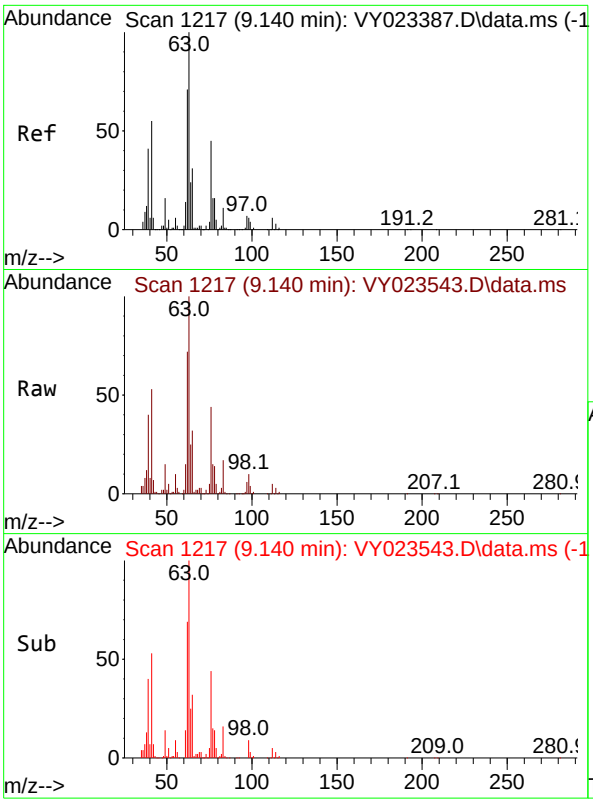


#44
Trichloroethene
Concen: 54.528 ug/l
RT: 8.866 min Scan# 1172
Delta R.T. -0.000 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion:130 Resp: 331676

Ion	Ratio	Lower	Upper
130	100		
95	91.4	0.0	180.6

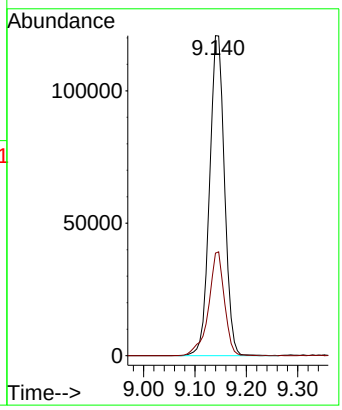




#45
1,2-Dichloropropane
Concen: 53.216 ug/l
RT: 9.140 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion: 63 Resp: 24427

Ion	Ratio	Lower	Upper
63	100		
65	32.0	24.9	37.3



Instrument :
MSVOA_Y
ClientSampleId :
VSTDCCC050

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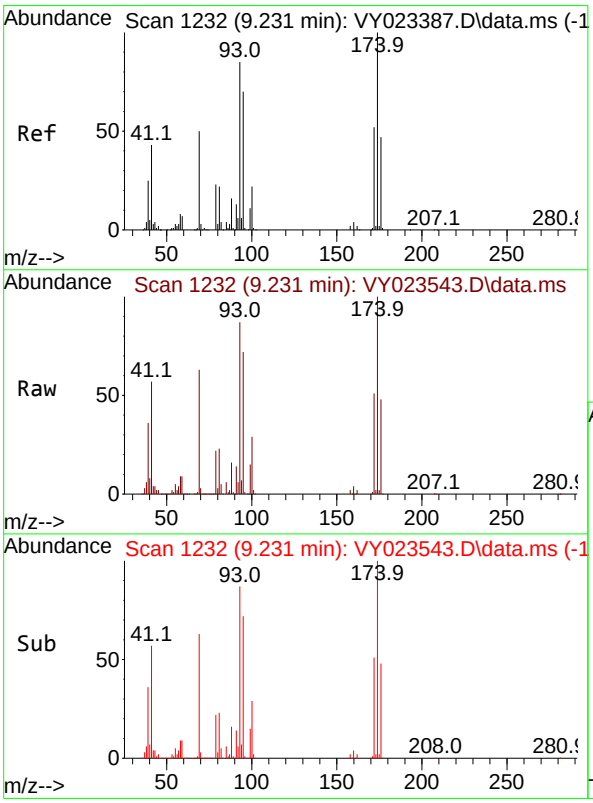
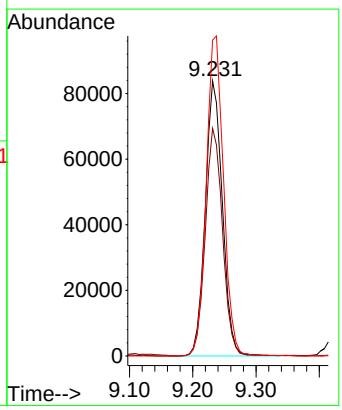
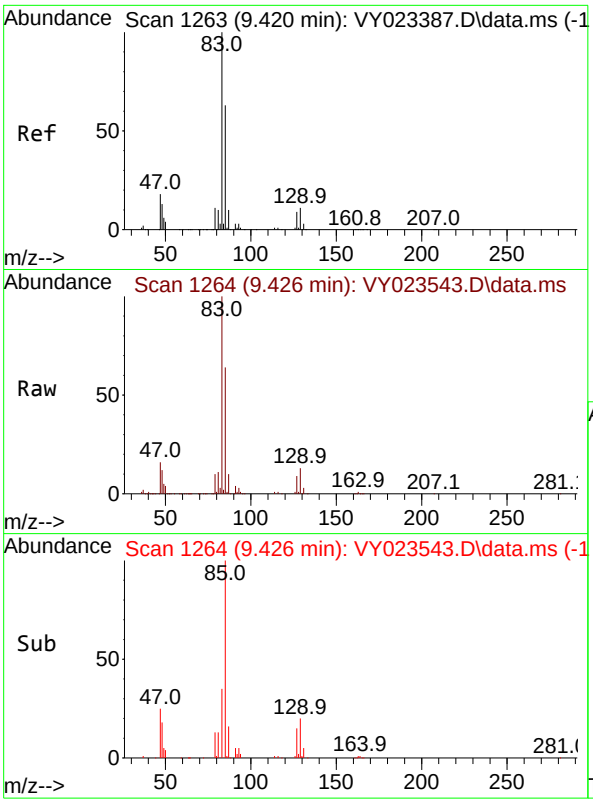


#46
Dibromomethane
Concen: 54.359 ug/l
RT: 9.231 min Scan# 1232
Delta R.T. -0.000 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion: 93 Resp: 157780

Ion	Ratio	Lower	Upper
93	100		
95	83.5	65.4	98.0
174	117.4	92.9	139.3

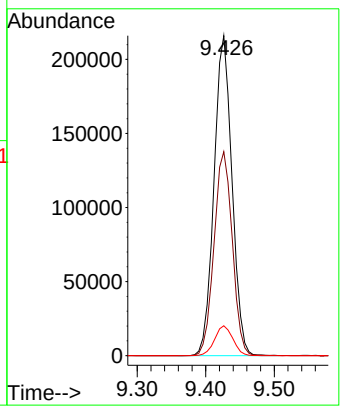




#47
Bromodichloromethane
Concen: 53.731 ug/l
RT: 9.426 min Scan# 1
Delta R.T. 0.006 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion: 83 Resp: 39278

Ion	Ratio	Lower	Upper
83	100		
85	63.7	50.8	76.2
127	9.3	7.4	11.2



Instrument :
MSVOA_Y
ClientSampleId :
VSTDCCC050

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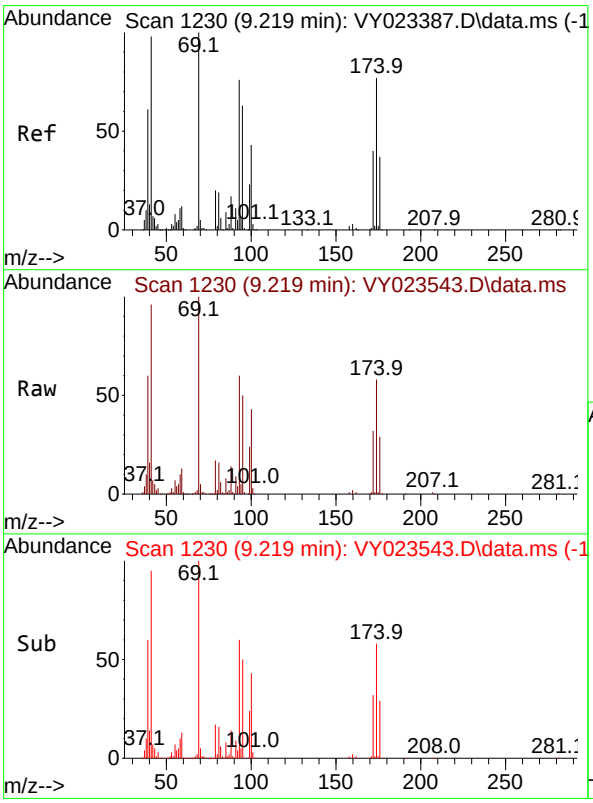
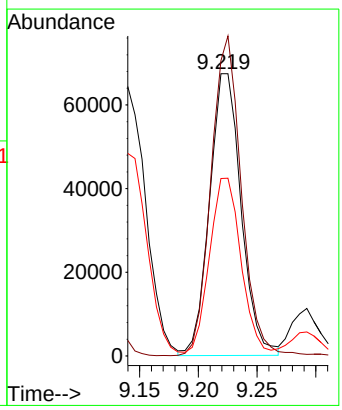
Supervised By :Mahesh Dadoda 10/24/2025

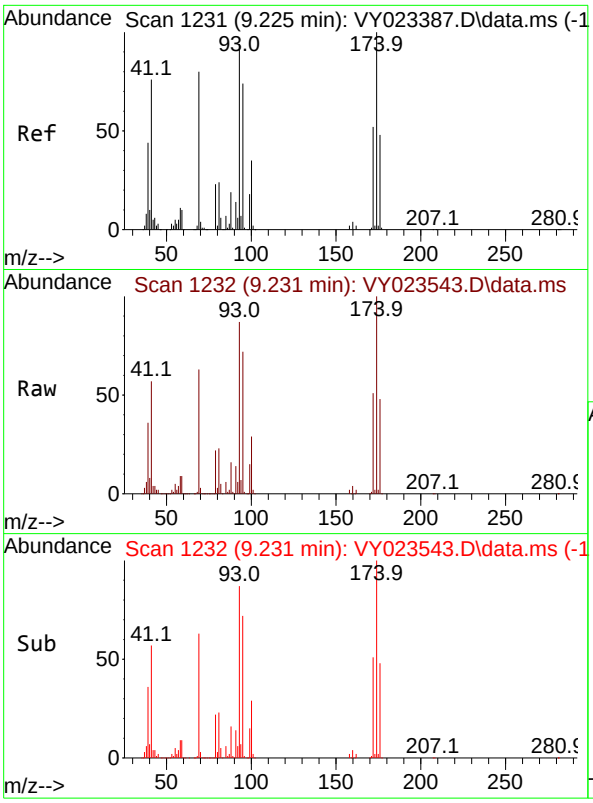


#48
Methyl methacrylate
Concen: 51.729 ug/l
RT: 9.219 min Scan# 1230
Delta R.T. -0.000 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion: 41 Resp: 125981

Ion	Ratio	Lower	Upper
41	100		
69	108.7	81.0	121.4
39	60.9	48.2	72.4

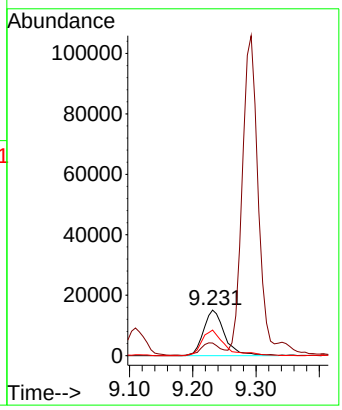




#49
1,4-Dioxane
Concen: 1042.410 ug/l
RT: 9.231 min Scan# 1
Delta R.T. 0.006 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion: 88 Resp: 3508

Ion	Ratio	Lower	Upper
88	100		
43	26.1	21.8	32.8
58	56.0	46.8	70.2



Instrument :
MSVOA_Y
ClientSampleId :
VSTDCCC050

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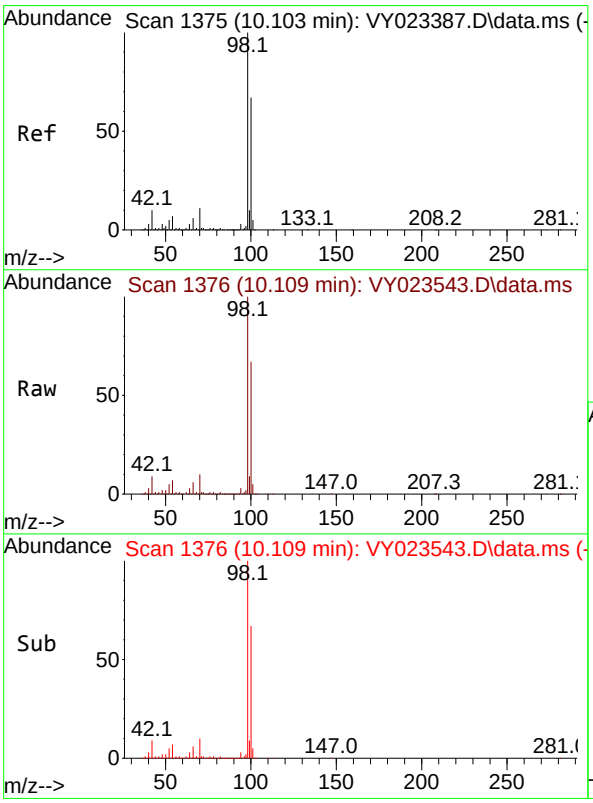
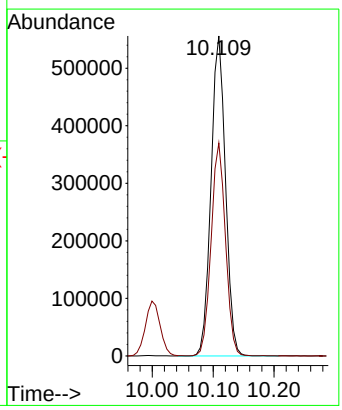
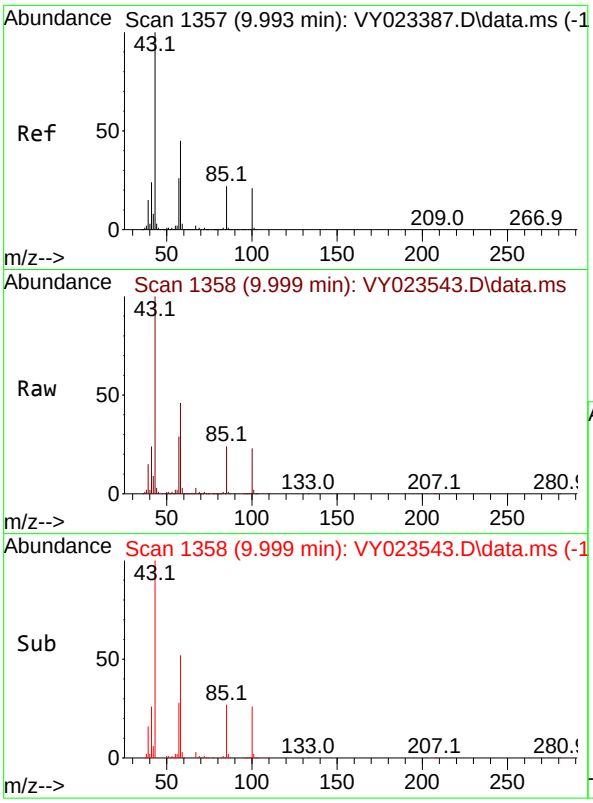


#50
Toluene-d8
Concen: 49.624 ug/l
RT: 10.109 min Scan# 1376
Delta R.T. 0.006 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion: 98 Resp: 916029

Ion	Ratio	Lower	Upper
98	100		
100	66.0	53.0	79.4

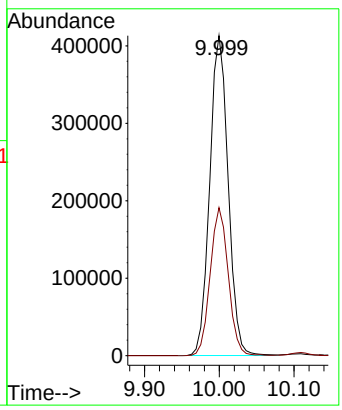




#51
4-Methyl-2-Pentanone
Concen: 263.542 ug/l
RT: 9.999 min Scan# 1
Delta R.T. 0.006 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion: 43 Resp: 70586

Ion	Ratio	Lower	Upper
43	100		
58	45.5	35.3	52.9



Instrument :
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ClientSampleId :
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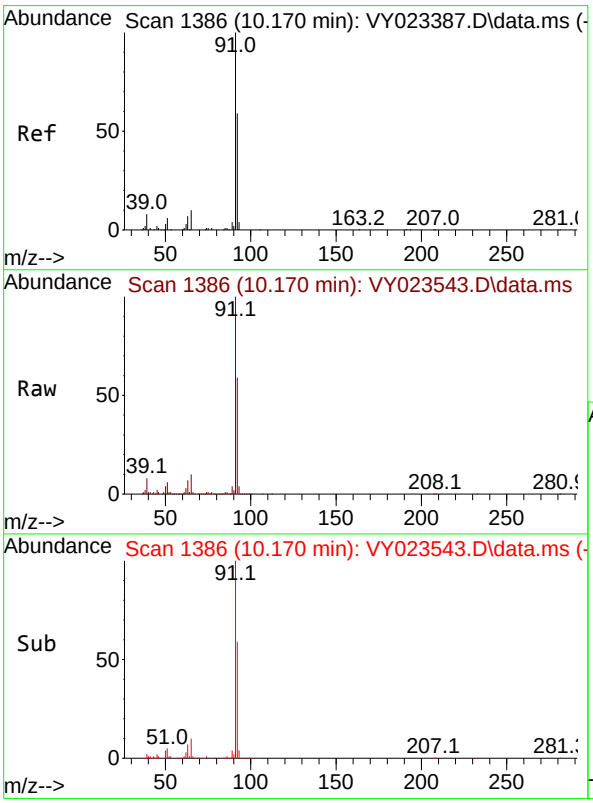
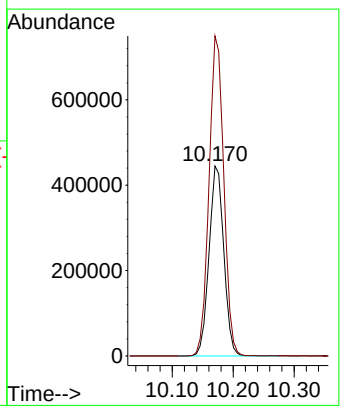
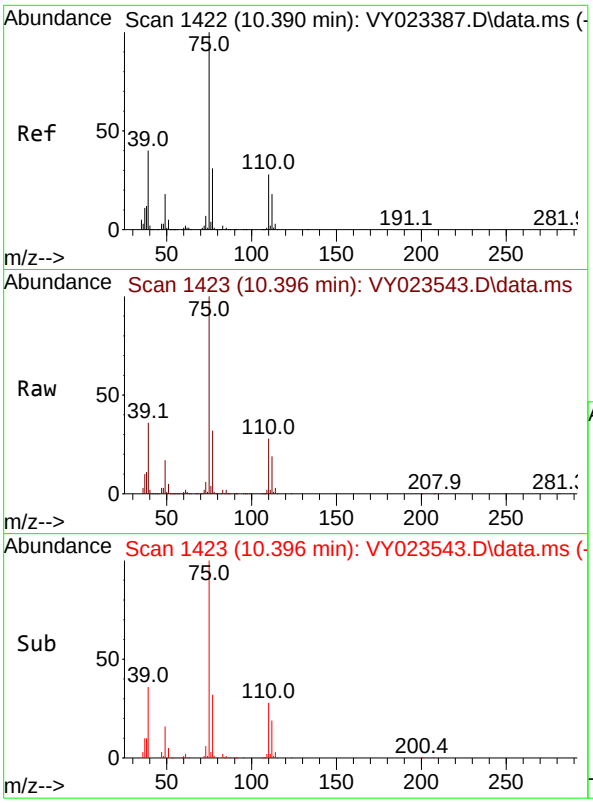


#52
Toluene
Concen: 55.380 ug/l
RT: 10.170 min Scan# 1386
Delta R.T. -0.000 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion: 92 Resp: 747259

Ion	Ratio	Lower	Upper
92	100		
91	168.7	136.4	204.6

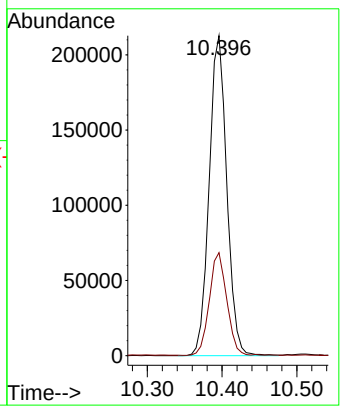




#53
t-1,3-Dichloropropene
Concen: 54.901 ug/l
RT: 10.396 min Scan# 14
Delta R.T. 0.006 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion: 75 Resp: 34896

Ion	Ratio	Lower	Upper
75	100		
77	32.0	25.1	37.7



Instrument :
MSVOA_Y
ClientSampleId :
VSTDCCC050

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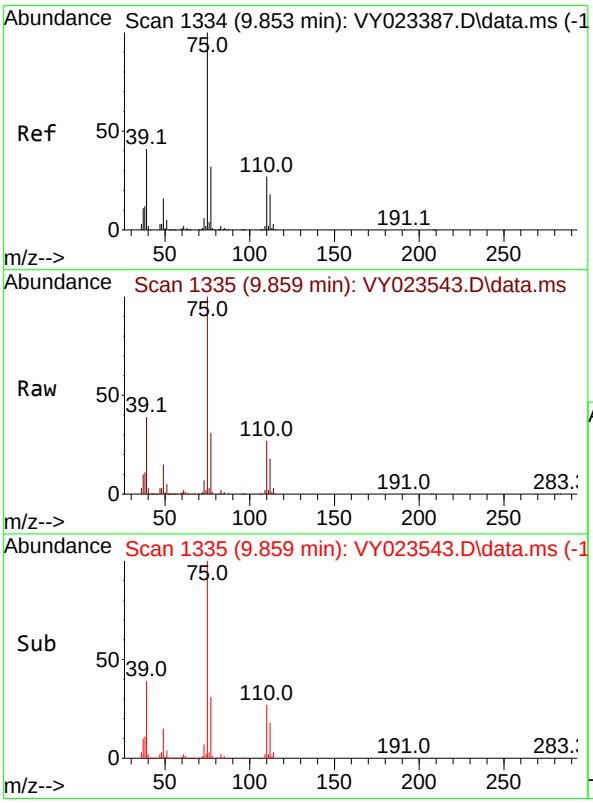
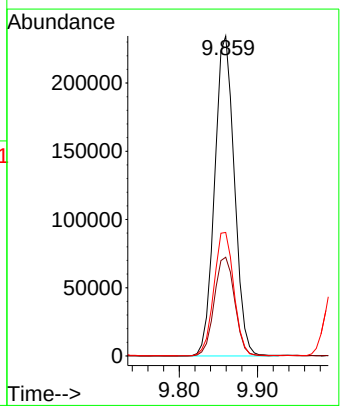
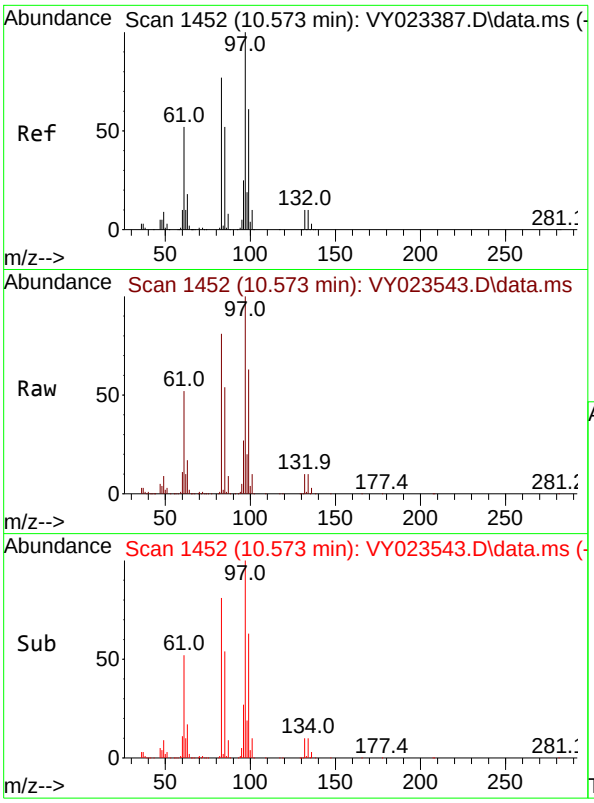


#54
cis-1,3-Dichloropropene
Concen: 54.701 ug/l
RT: 9.859 min Scan# 1335
Delta R.T. 0.006 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion: 75 Resp: 410362

Ion	Ratio	Lower	Upper
75	100		
77	30.9	25.4	38.0
39	38.6	32.8	49.2

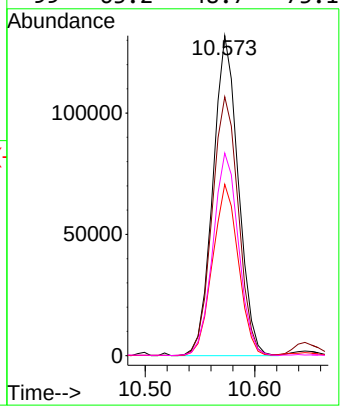




#55
1,1,2-Trichloroethane
Concen: 54.478 ug/l
RT: 10.573 min Scan# 14
Delta R.T. -0.000 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion: 97 Resp: 21263

Ion	Ratio	Lower	Upper
97	100		
83	80.8	61.8	92.6
85	53.5	41.3	61.9
99	63.2	48.7	73.1



Instrument :
MSVOA_Y
ClientSampleId :
VSTDCCC050

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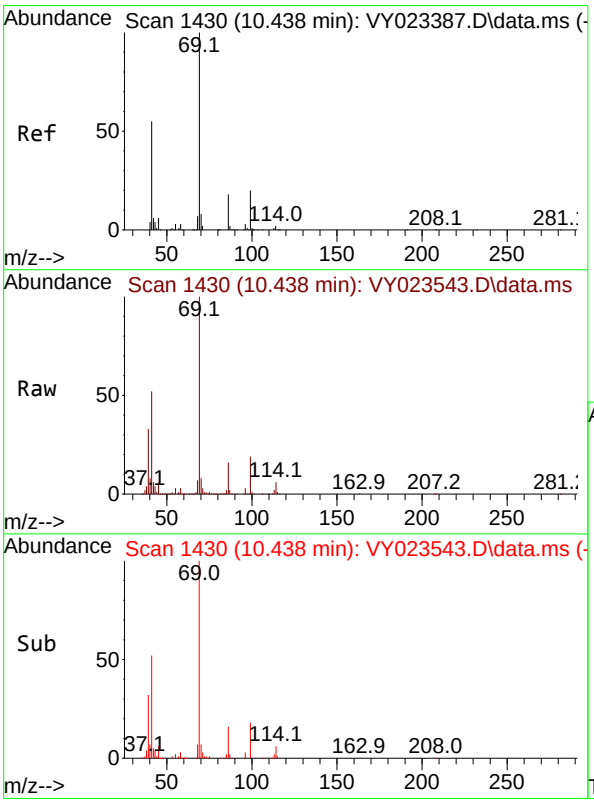
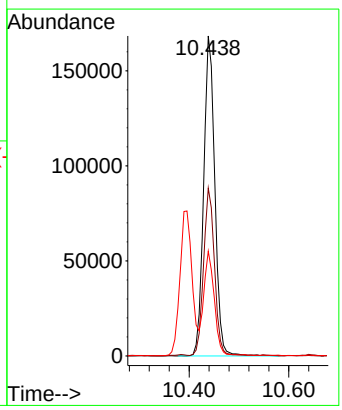
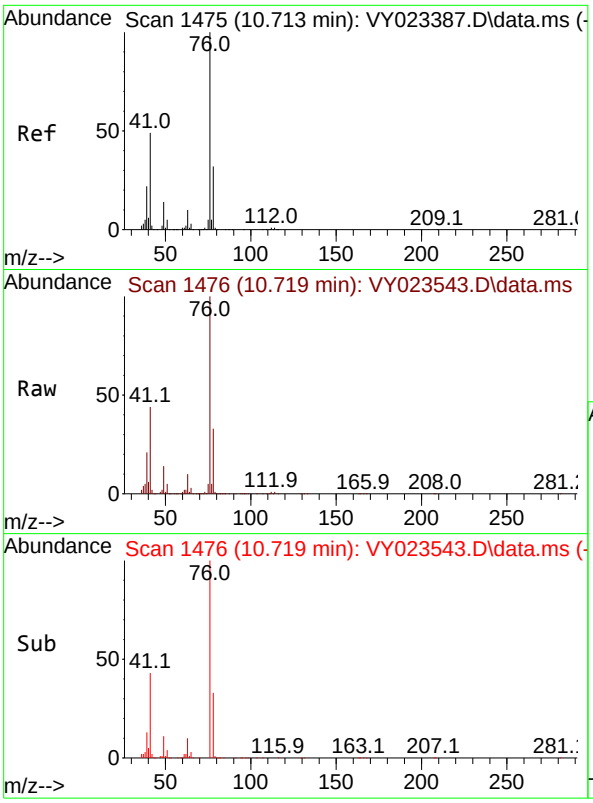


#56
Ethyl methacrylate
Concen: 57.967 ug/l
RT: 10.438 min Scan# 1430
Delta R.T. -0.000 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion: 69 Resp: 260989

Ion	Ratio	Lower	Upper
69	100		
41	51.2	44.6	67.0
39	30.1	27.0	40.4

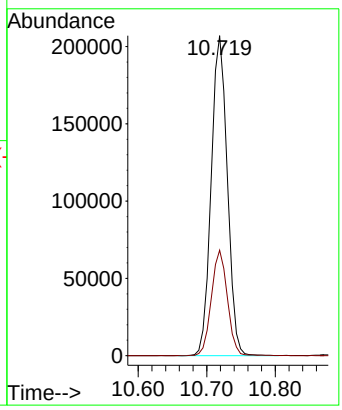




#57
1,3-Dichloropropane
Concen: 54.594 ug/l
RT: 10.719 min Scan# 14
Delta R.T. 0.006 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion: 76 Resp: 33766

Ion	Ratio	Lower	Upper
76	100		
78	32.7	25.9	38.9



Instrument :
MSVOA_Y
ClientSampleId :
VSTDCCC050

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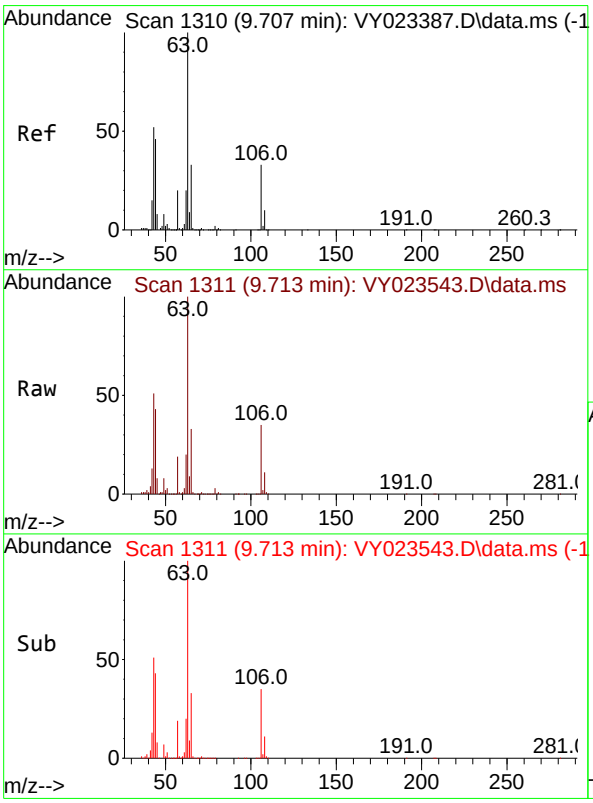
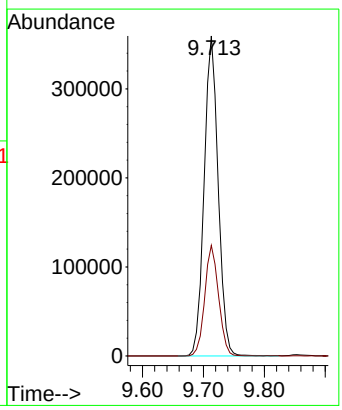
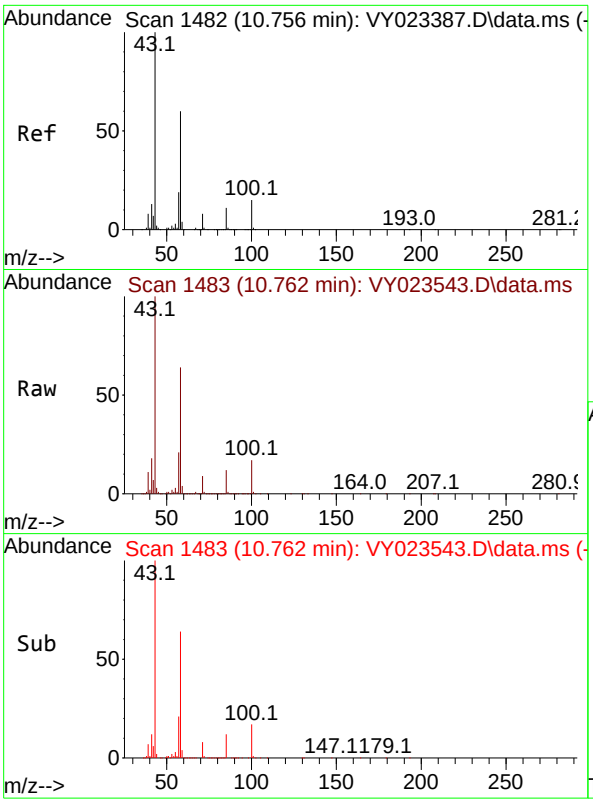


#58
2-Chloroethyl Vinyl ether
Concen: 284.845 ug/l
RT: 9.713 min Scan# 1311
Delta R.T. 0.006 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion: 63 Resp: 574517

Ion	Ratio	Lower	Upper
63	100		
106	34.1	26.6	39.8





#59
2-Hexanone
Concen: 271.019 ug/l
RT: 10.762 min Scan# 14
Delta R.T. 0.006 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion: 43 Resp: 51875

Ion	Ratio	Lower	Upper
43	100		
58	63.3	30.5	91.5

Instrument :
MSVOA_Y
ClientSampleId :
VSTDCCC050

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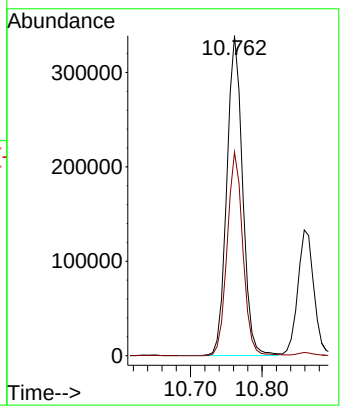
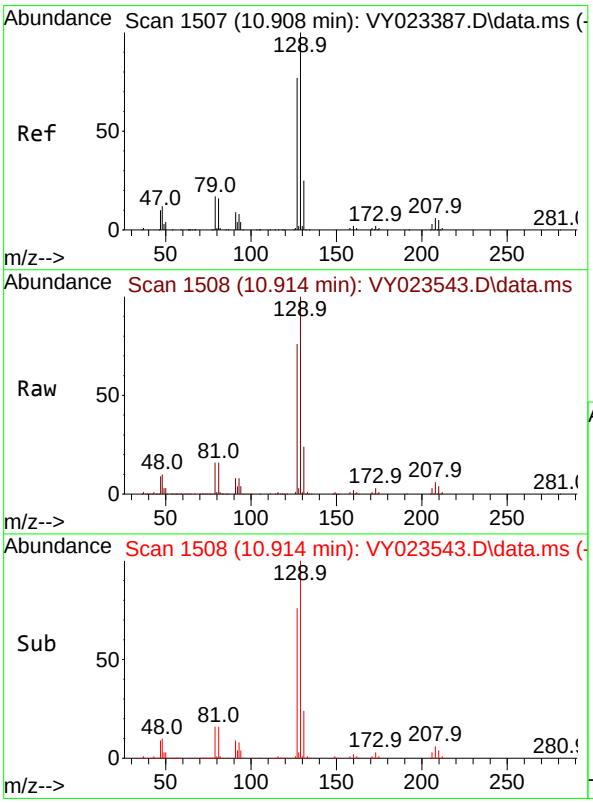
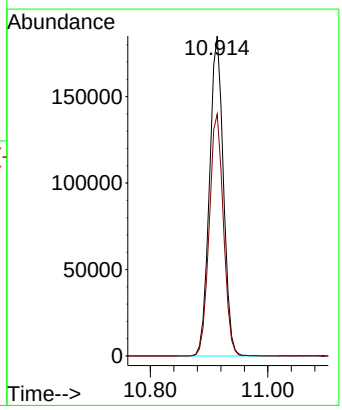


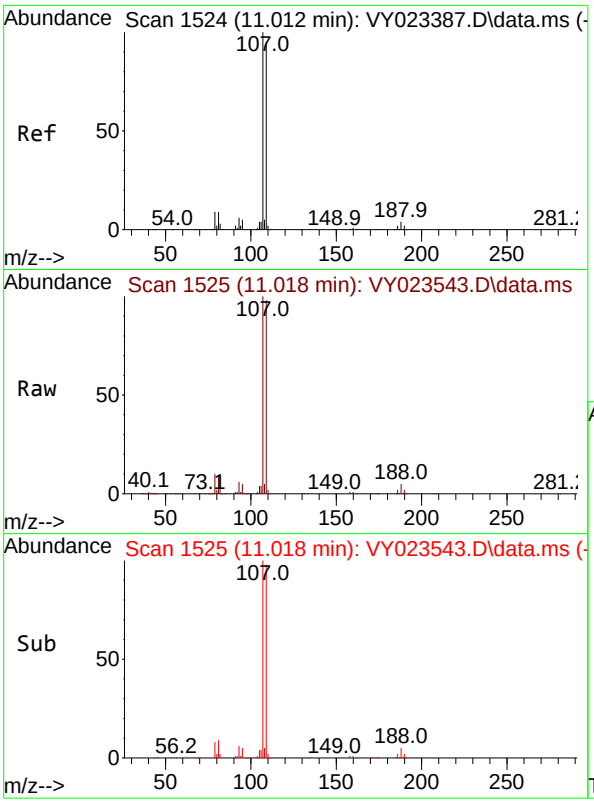


#60
Dibromochloromethane
Concen: 55.647 ug/l
RT: 10.914 min Scan# 1508
Delta R.T. 0.006 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion:129 Resp: 304516

Ion	Ratio	Lower	Upper
129	100		
127	76.6	38.6	115.7

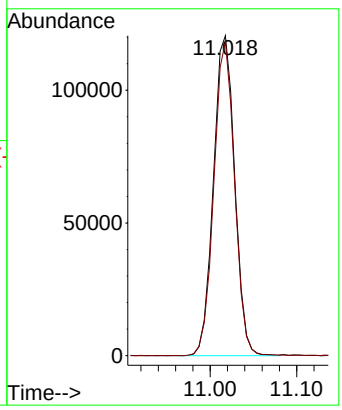




#61
1,2-Dibromoethane
Concen: 55.233 ug/l
RT: 11.018 min Scan# 1
Delta R.T. 0.006 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion:107 Resp: 20560

Ion	Ratio	Lower	Upper
107	100		
109	95.5	76.1	114.1



Instrument :
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ClientSampleId :
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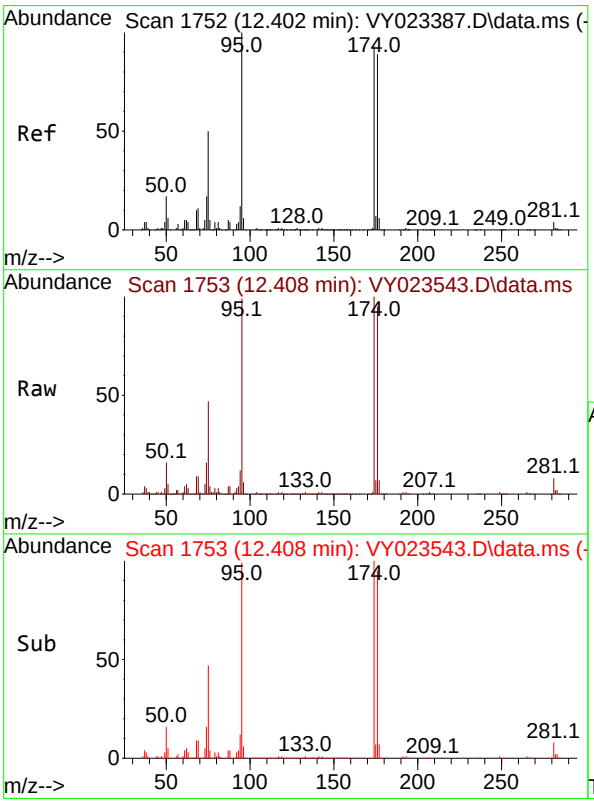
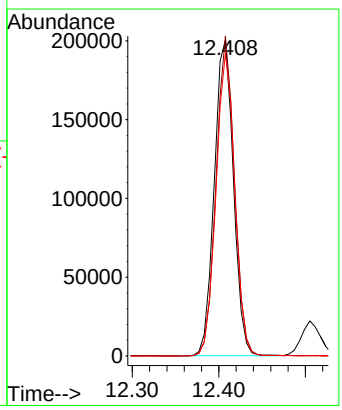
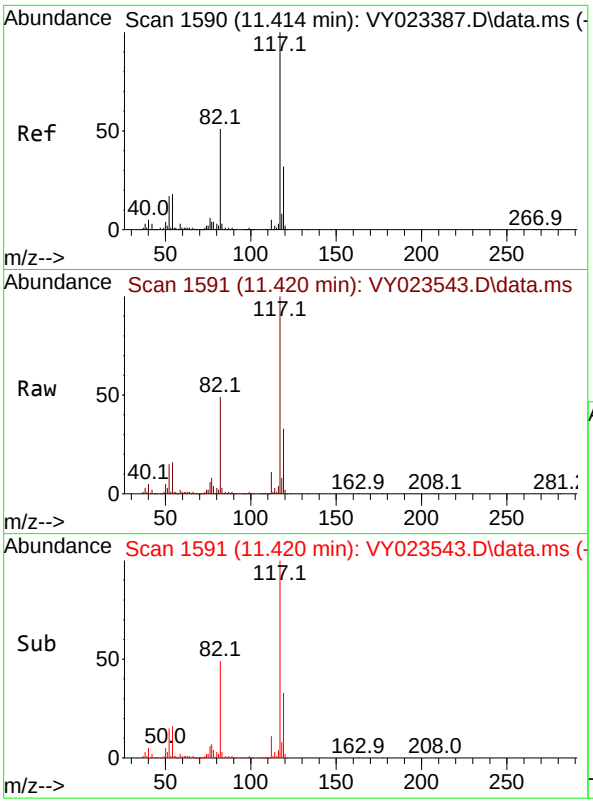


#62
4-Bromofluorobenzene
Concen: 50.517 ug/l
RT: 12.408 min Scan# 1753
Delta R.T. 0.006 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion: 95 Resp: 307868

Ion	Ratio	Lower	Upper
95	100		
174	97.4	0.0	192.8
176	93.9	0.0	187.6

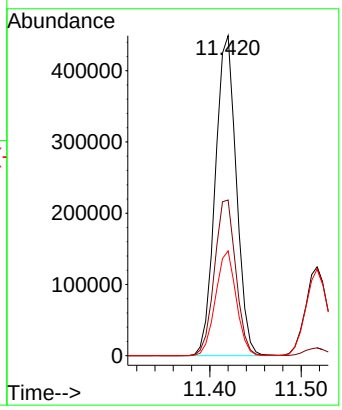




#63
Chlorobenzene-d5
Concen: 50.000 ug/l
RT: 11.420 min Scan# 1
Delta R.T. 0.006 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion:117 Resp: 72000

Ion	Ratio	Lower	Upper
117	100		
82	48.7	41.0	61.4
119	32.8	25.6	38.4



Instrument :
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ClientSampleId :
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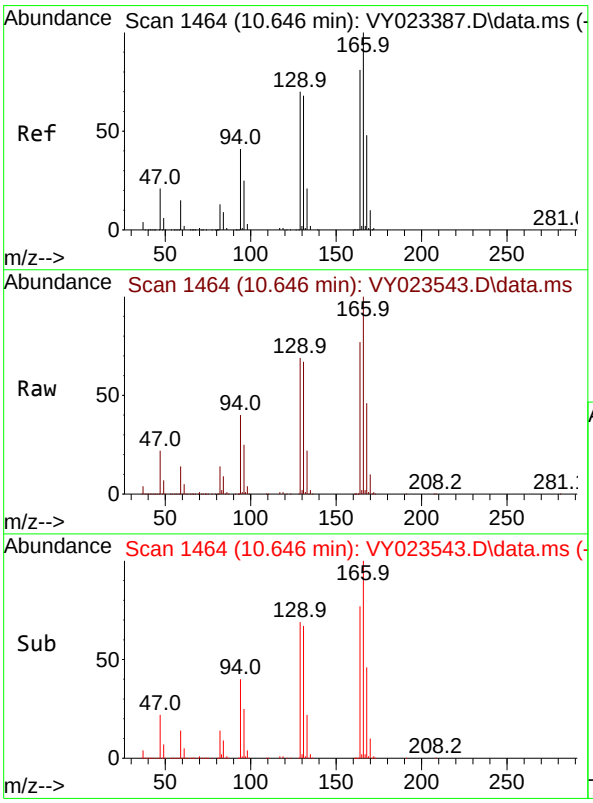
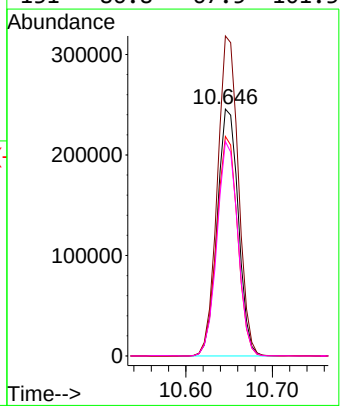
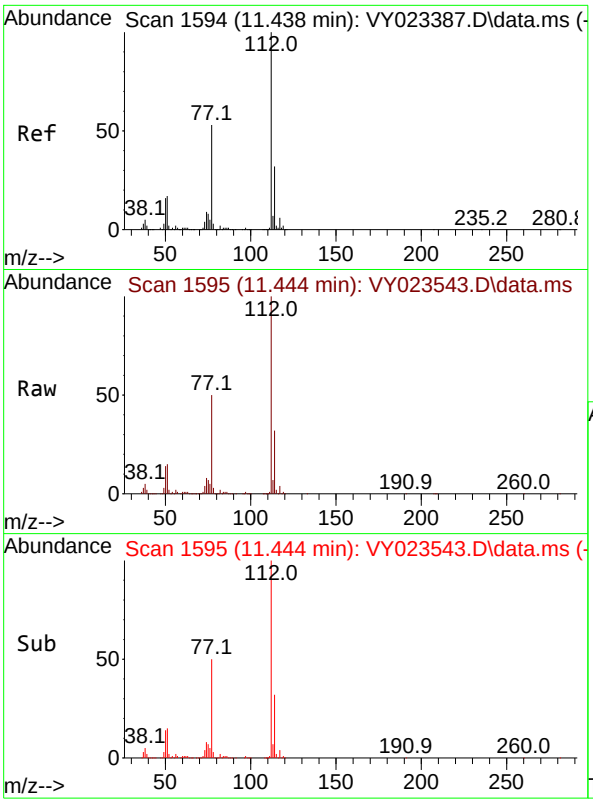


#64
Tetrachloroethene
Concen: 56.127 ug/l
RT: 10.646 min Scan# 1464
Delta R.T. -0.000 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion:164 Resp: 417270

Ion	Ratio	Lower	Upper
164	100		
166	129.6	99.4	149.0
129	89.0	69.4	104.2
131	86.8	67.5	101.3

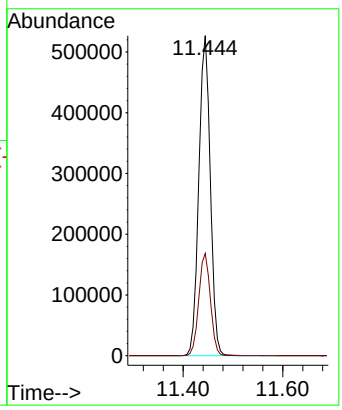




#65
Chlorobenzene
Concen: 53.721 ug/l
RT: 11.444 min Scan# 1
Delta R.T. 0.006 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion:112 Resp: 84125

Ion	Ratio	Lower	Upper
112	100		
114	32.0	25.6	38.4



Instrument :
MSVOA_Y
ClientSampleId :
VSTDCCC050

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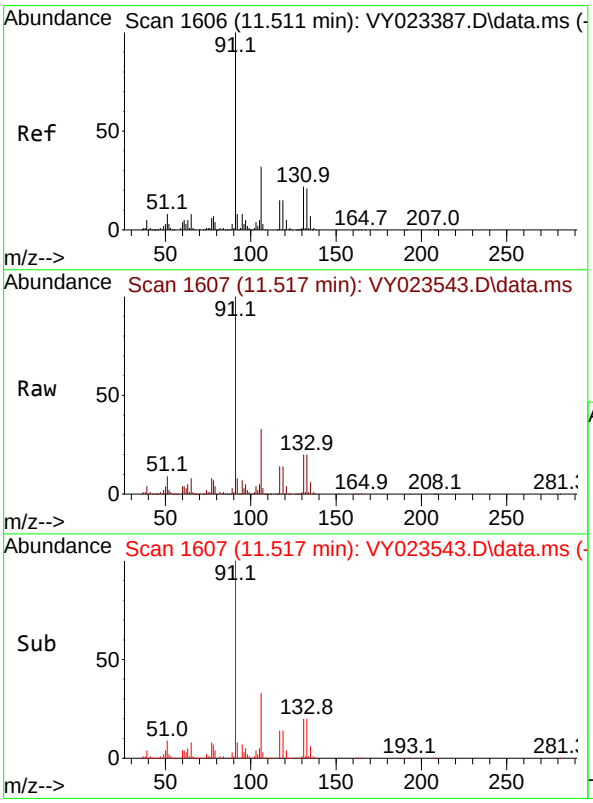
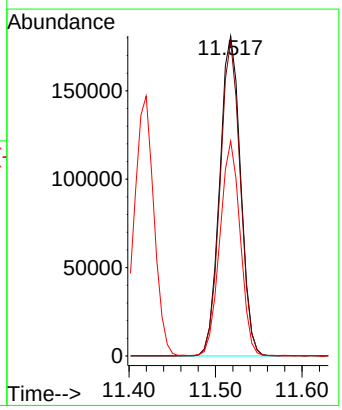
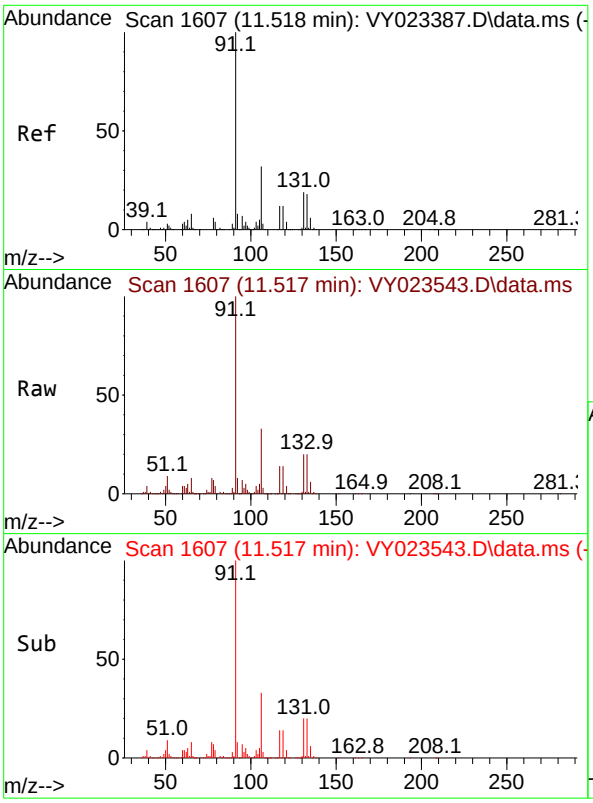


#66
1,1,1,2-Tetrachloroethane
Concen: 54.255 ug/l
RT: 11.517 min Scan# 1607
Delta R.T. 0.006 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion:131 Resp: 302769

Ion	Ratio	Lower	Upper
131	100		
133	95.7	48.4	145.2
119	65.3	32.4	97.2

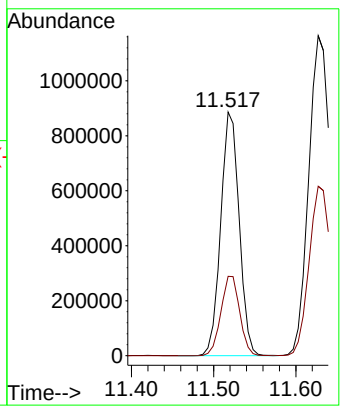




#67
Ethyl Benzene
Concen: 54.584 ug/l
RT: 11.517 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion: 91 Resp: 138361

Ion	Ratio	Lower	Upper
91	100		
106	32.6	25.8	38.8



Instrument :
MSVOA_Y
ClientSampleId :
VSTDCCC050

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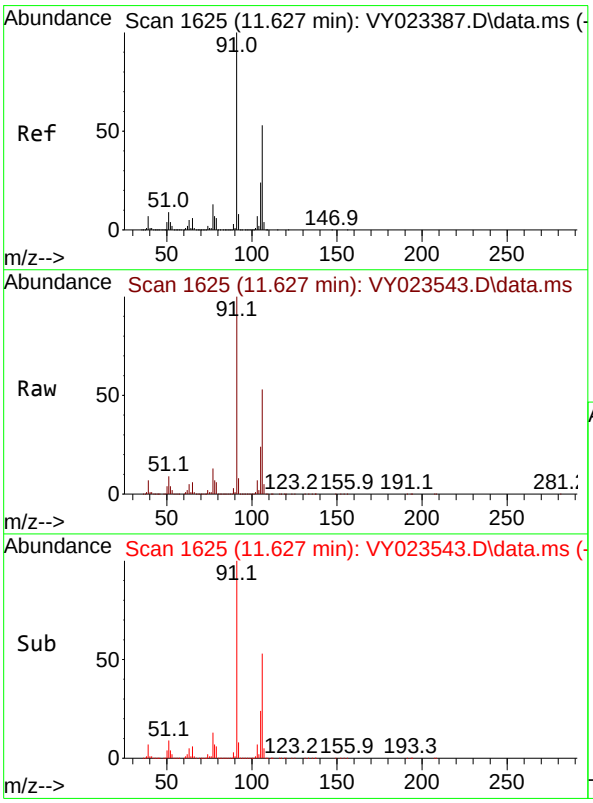
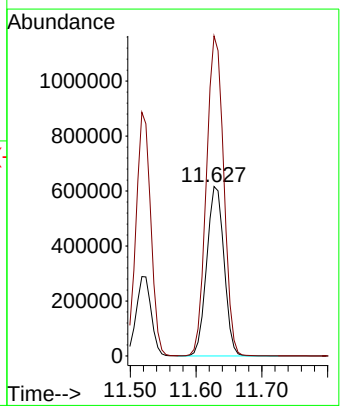
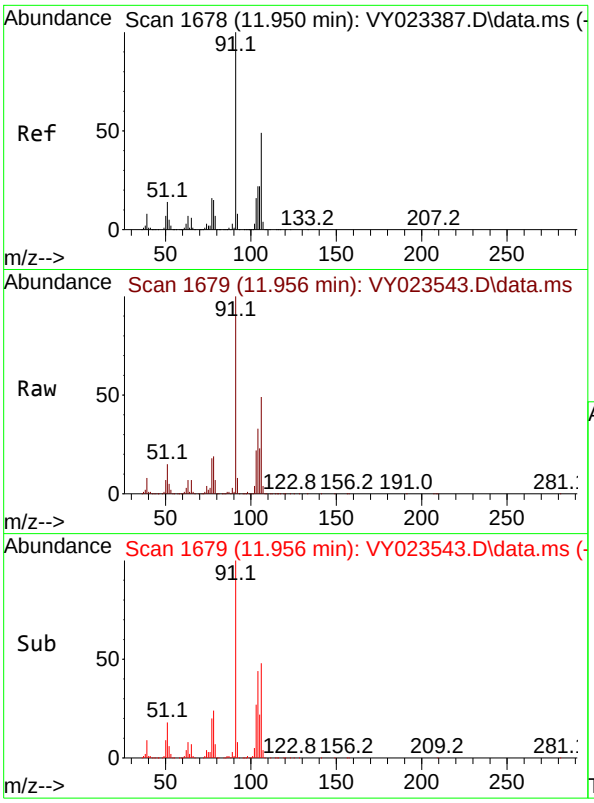


#68
m/p-Xylenes
Concen: 110.980 ug/l
RT: 11.627 min Scan# 1625
Delta R.T. -0.000 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion:106 Resp: 1128353

Ion	Ratio	Lower	Upper
106	100		
91	189.3	152.6	229.0





#69
o-Xylene
Concen: 55.814 ug/l
RT: 11.956 min Scan# 1
Delta R.T. 0.006 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion:106 Resp: 53226

Ion	Ratio	Lower	Upper
106	100		
91	201.1	101.4	304.1

Instrument :
MSVOA_Y
ClientSampleId :
VSTDCCC050

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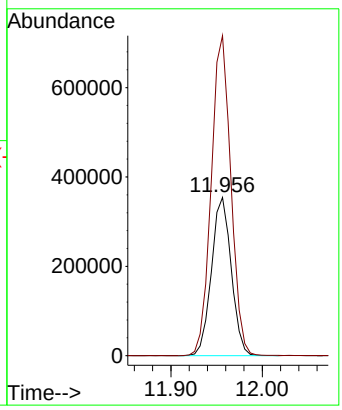
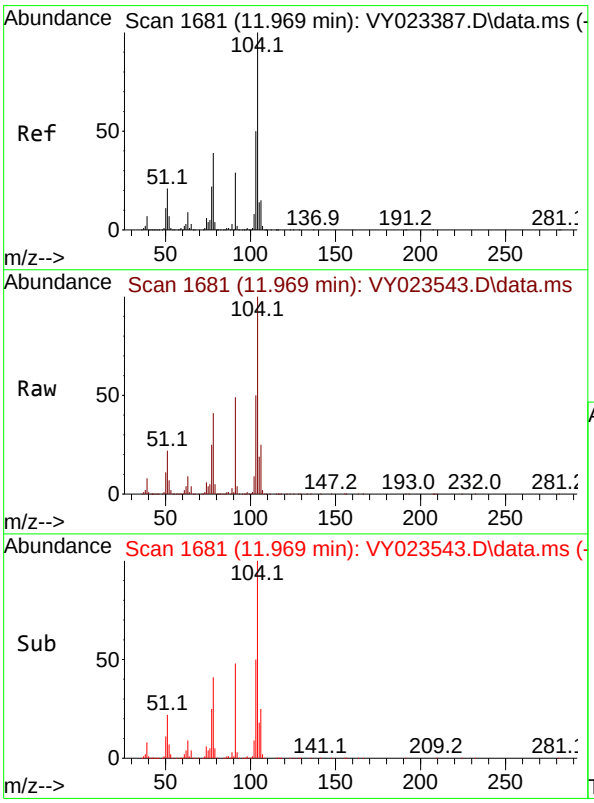
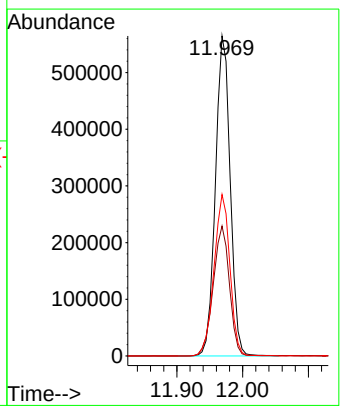


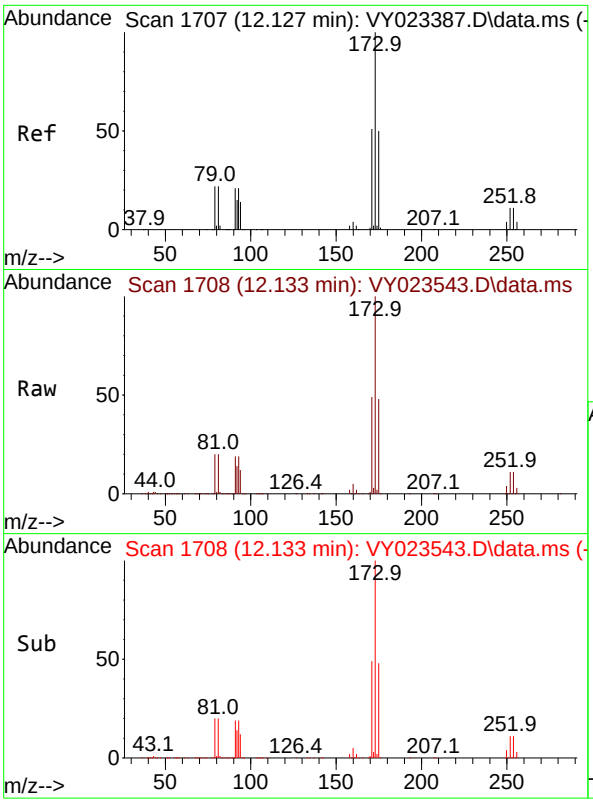


#70
Styrene
Concen: 56.380 ug/l
RT: 11.969 min Scan# 1681
Delta R.T. -0.000 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion:104 Resp: 884177

Ion	Ratio	Lower	Upper
104	100		
78	44.6	36.1	54.1
103	54.2	43.2	64.8

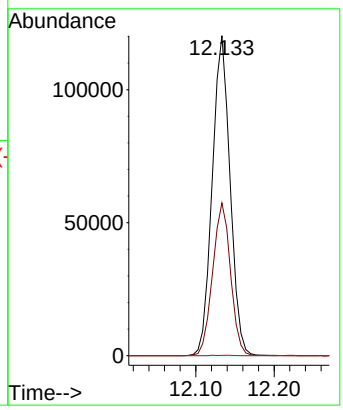




#71
Bromoform
Concen: 54.947 ug/l
RT: 12.133 min Scan# 1
Delta R.T. 0.006 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion:173 Resp: 19020

Ion	Ratio	Lower	Upper
173	100		
175	47.9	24.8	74.3
254	0.1	0.1	0.1#



Instrument :
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ClientSampleId :
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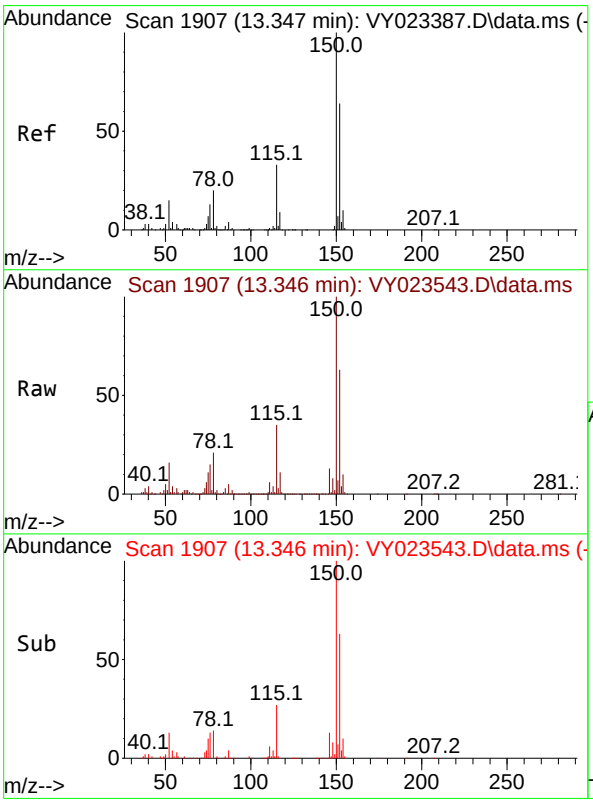
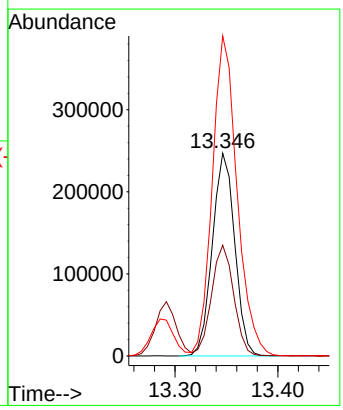
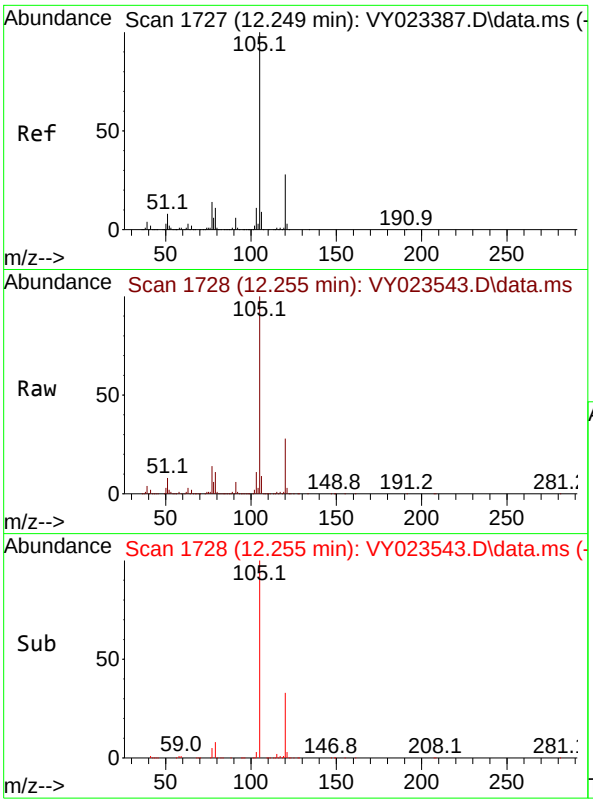


#72
1,4-Dichlorobenzene-d4
Concen: 50.000 ug/l
RT: 13.346 min Scan# 1907
Delta R.T. -0.000 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion:152 Resp: 373234

Ion	Ratio	Lower	Upper
152	100		
115	54.1	27.1	81.2
150	174.4	0.0	347.4

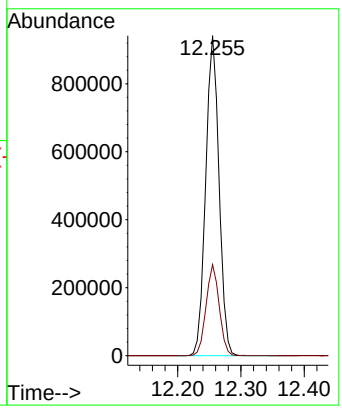




#73
Isopropylbenzene
Concen: 56.129 ug/l
RT: 12.255 min Scan# 1
Delta R.T. 0.006 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion:105 Resp: 138058

Ion	Ratio	Lower	Upper
105	100		
120	28.0	13.9	41.7



Instrument :
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ClientSampleId :
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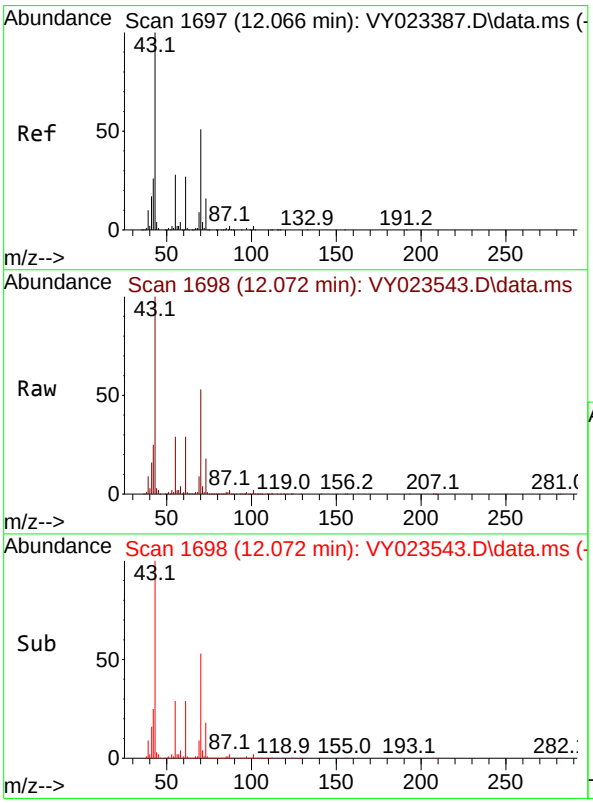
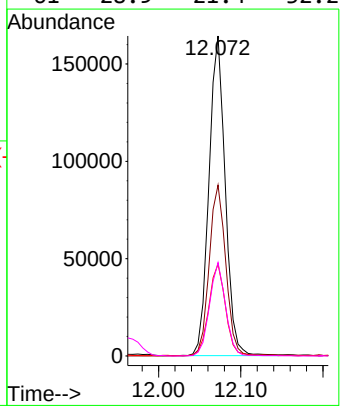
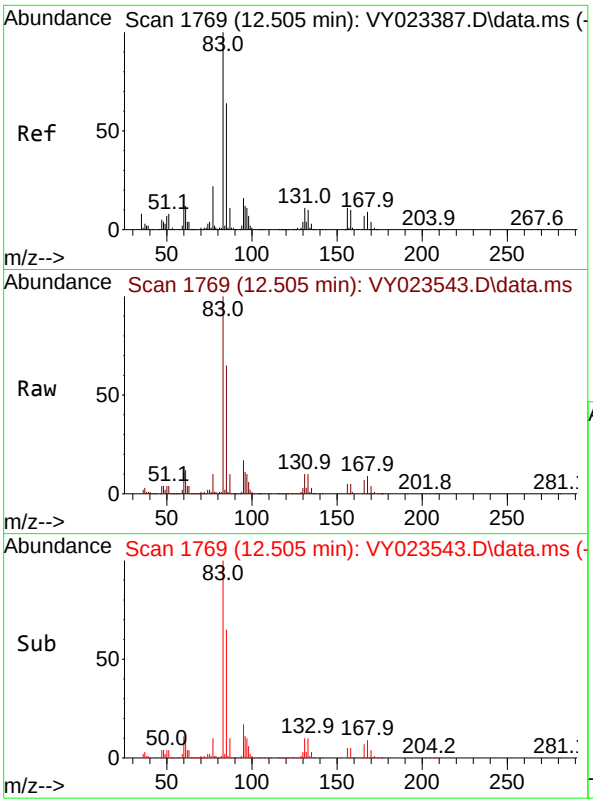


#74
N-amyl acetate
Concen: 51.252 ug/l
RT: 12.072 min Scan# 1698
Delta R.T. 0.006 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion: 43 Resp: 226427

Ion	Ratio	Lower	Upper
43	100		
70	54.6	41.1	61.7
55	29.0	23.0	34.6
61	28.9	21.4	32.2

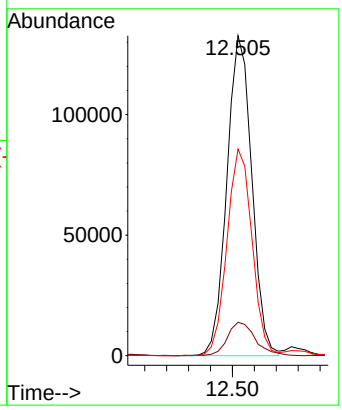




#75
1,1,2,2-Tetrachloroethane
Concen: 52.112 ug/l
RT: 12.505 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion: 83 Resp: 20964

Ion	Ratio	Lower	Upper
83	100		
131	11.7	5.9	17.6
85	64.8	31.8	95.3



Instrument :
MSVOA_Y
ClientSampleId :
VSTDCCC050

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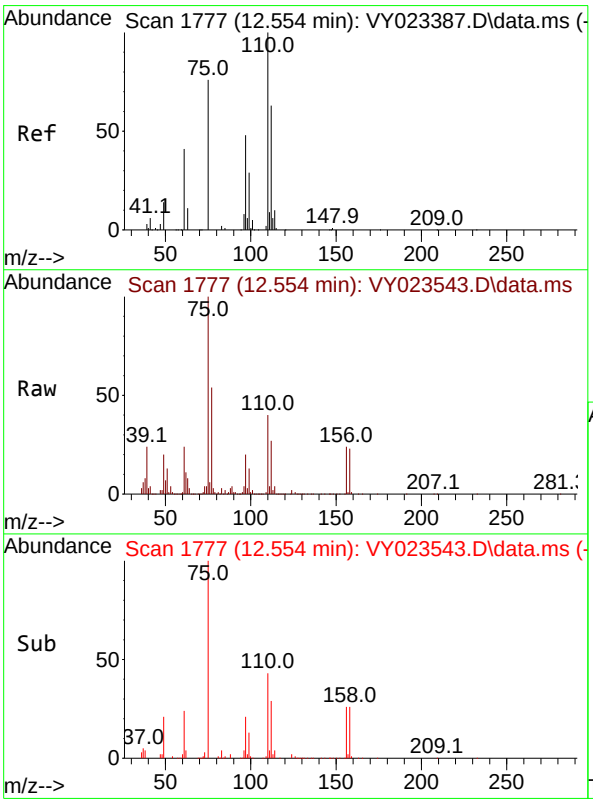
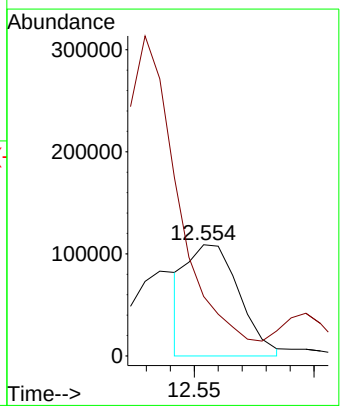
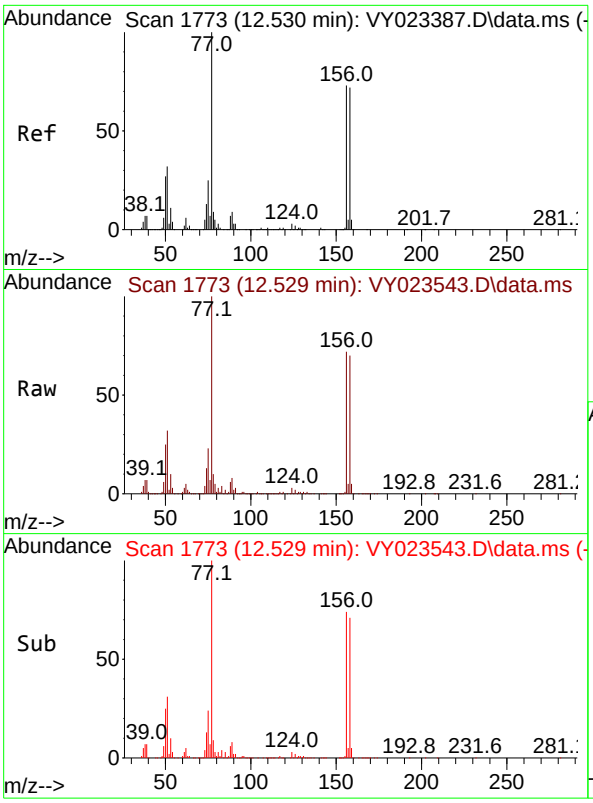


#76
1,2,3-Trichloropropane
Concen: 50.178 ug/l m
RT: 12.554 min Scan# 1777
Delta R.T. -0.000 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion: 75 Resp: 165233

Ion	Ratio	Lower	Upper
75	100		
77	0.0	0.0	0.0

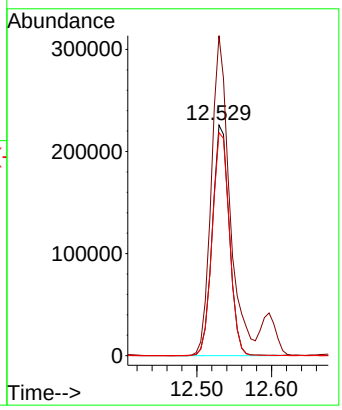




#77
Bromobenzene
Concen: 54.338 ug/l
RT: 12.529 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion:156 Resp: 35532

Ion	Ratio	Lower	Upper
156	100		
77	150.7	76.8	230.5
158	98.3	49.0	147.2



Instrument :
MSVOA_Y
ClientSampleId :
VSTDCCC050

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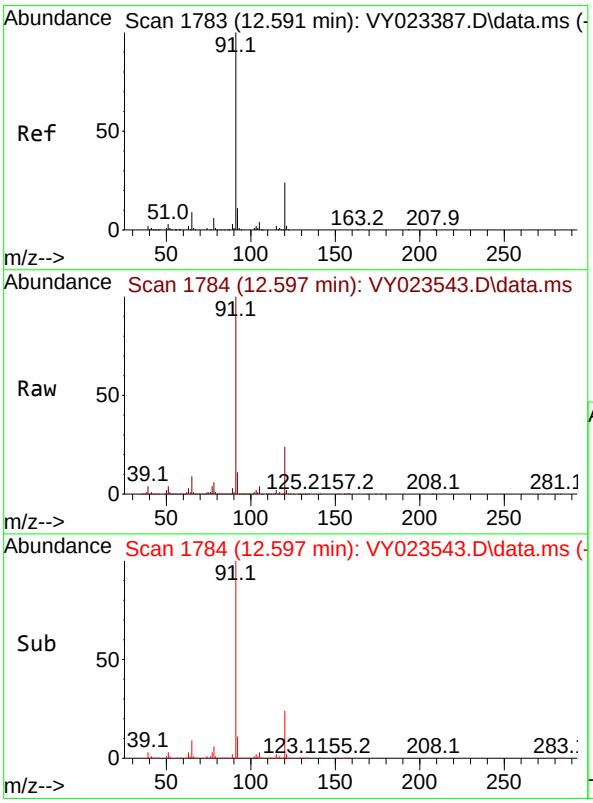
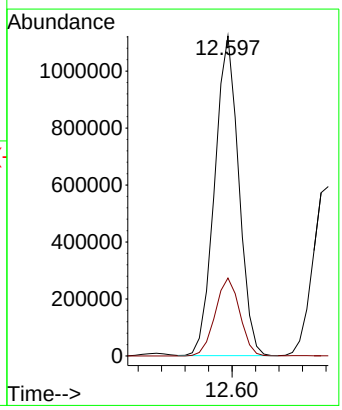
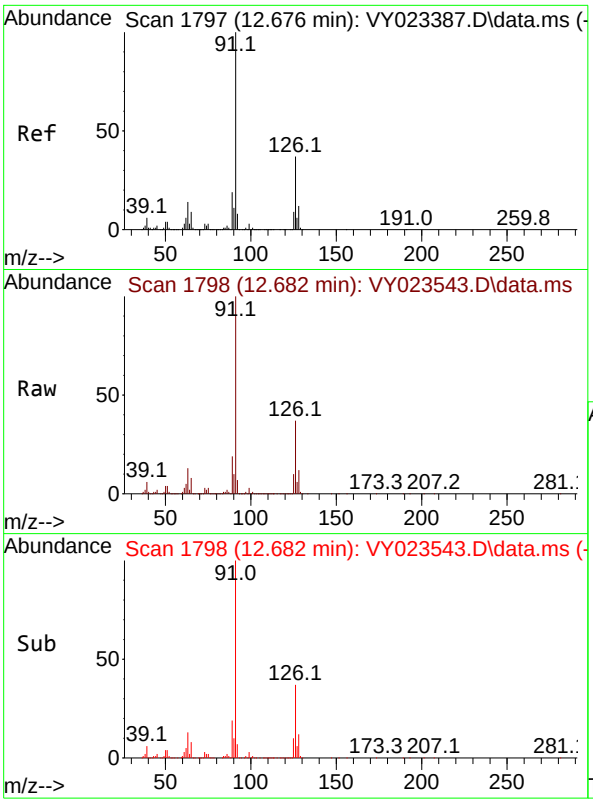


#78
n-propylbenzene
Concen: 56.123 ug/l
RT: 12.597 min Scan# 1784
Delta R.T. 0.006 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion: 91 Resp: 1597439

Ion	Ratio	Lower	Upper
91	100		
120	24.8	12.3	36.8

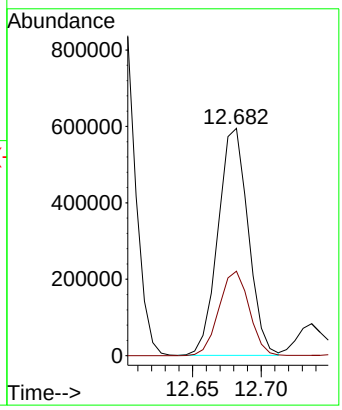




#79
2-Chlorotoluene
Concen: 54.637 ug/l
RT: 12.682 min Scan# 1
Delta R.T. 0.006 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion: 91 Resp: 91069

Ion	Ratio	Lower	Upper
91	100		
126	37.3	18.5	55.5



Instrument :
MSVOA_Y
ClientSampleId :
VSTDCCC050

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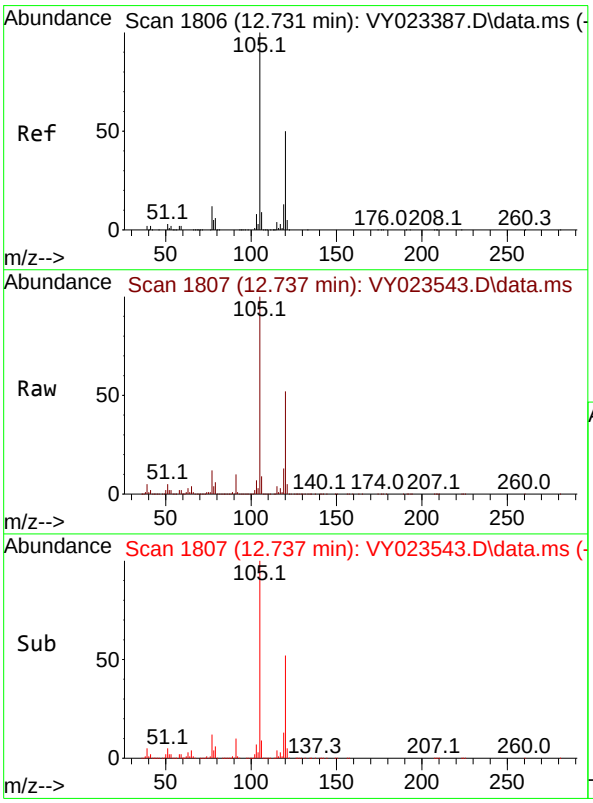
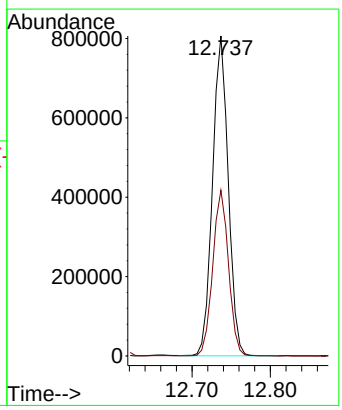
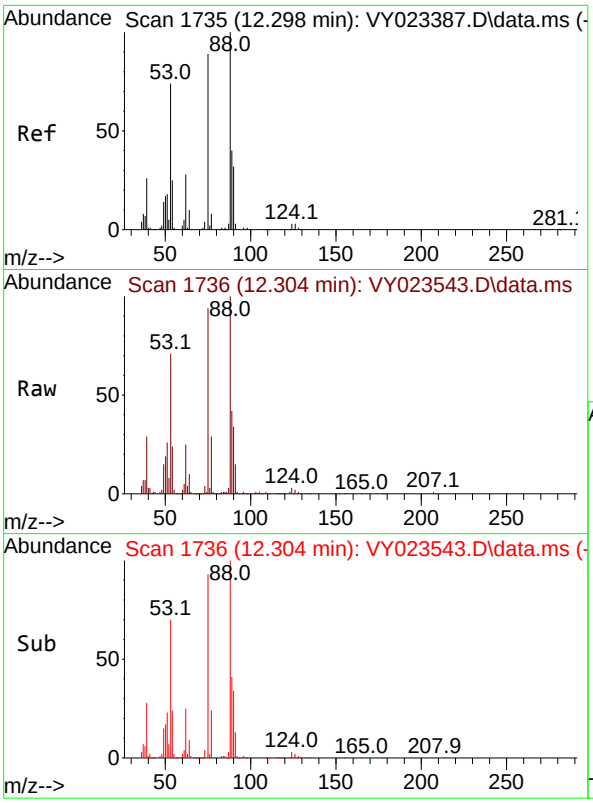


#80
1,3,5-Trimethylbenzene
Concen: 56.518 ug/l
RT: 12.737 min Scan# 1807
Delta R.T. 0.006 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion:105 Resp: 1123341

Ion	Ratio	Lower	Upper
105	100		
120	52.0	25.4	76.4





#81
trans-1,4-Dichloro-2-butene
Concen: 55.547 ug/l
RT: 12.304 min Scan# 1
Delta R.T. 0.006 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion: 75 Resp: 7459

Ion	Ratio	Lower	Upper
75	100		
53	80.3	68.6	102.8
89	47.0	39.0	58.4

Instrument :
MSVOA_Y
ClientSampleId :
VSTDCCC050

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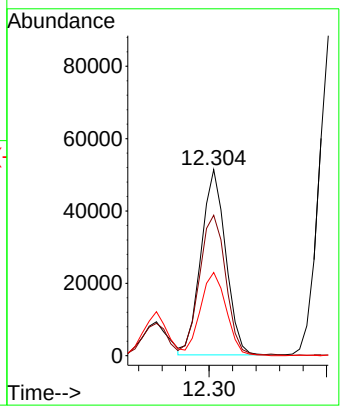
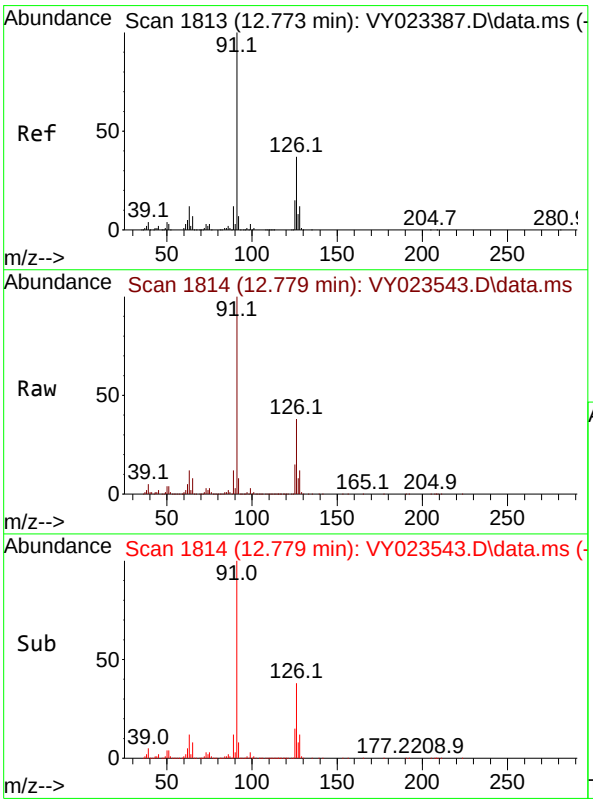
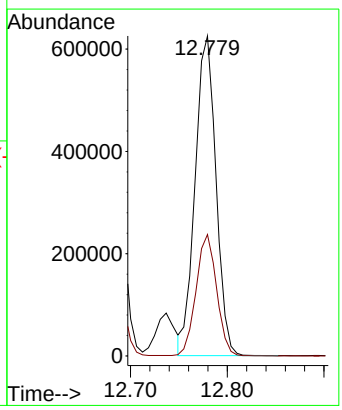


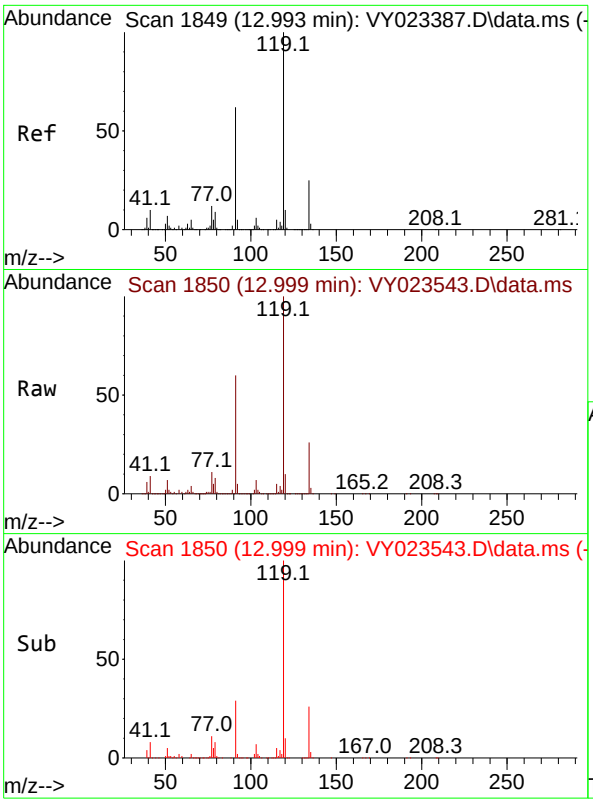


#82
4-Chlorotoluene
Concen: 54.609 ug/l
RT: 12.779 min Scan# 1814
Delta R.T. 0.006 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion: 91 Resp: 937415

Ion	Ratio	Lower	Upper
91	100		
126	37.7	18.4	55.4





#83
tert-Butylbenzene
Concen: 56.518 ug/l
RT: 12.999 min Scan# 1
Delta R.T. 0.006 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion:119 Resp: 103718

Ion	Ratio	Lower	Upper
119	100		
91	59.6	29.9	89.8
134	26.5	12.9	38.7

Instrument :
MSVOA_Y
ClientSampleId :
VSTDCCC050

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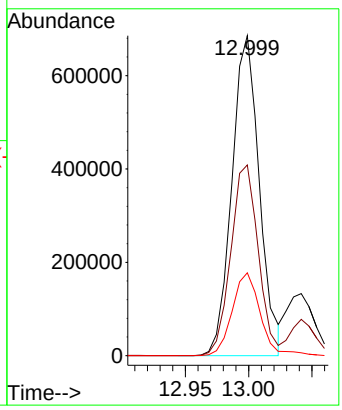
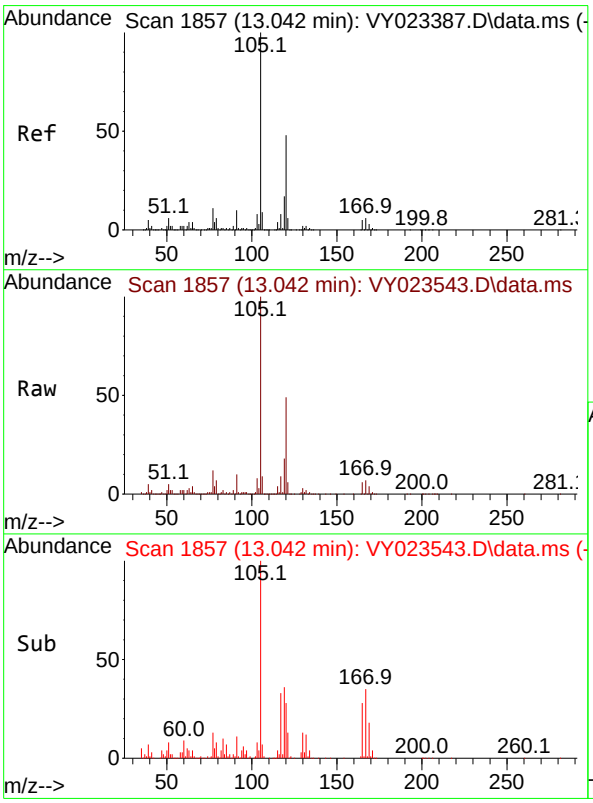
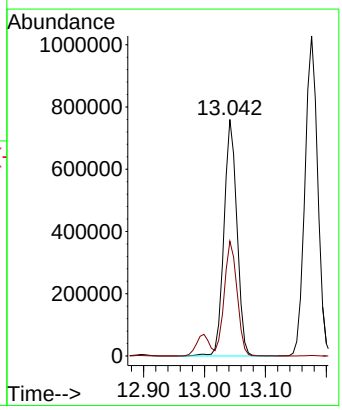


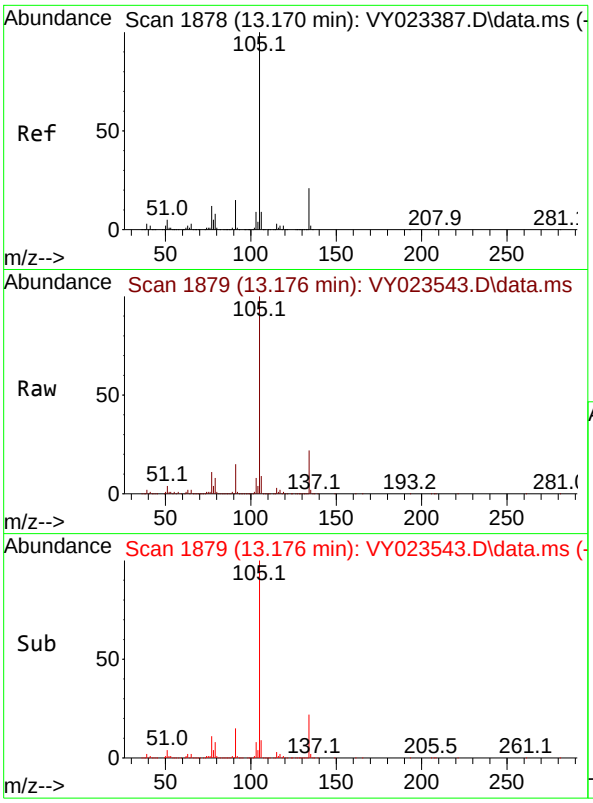


#84
1,2,4-Trimethylbenzene
Concen: 56.397 ug/l
RT: 13.042 min Scan# 1857
Delta R.T. -0.000 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion:105 Resp: 1118689

Ion	Ratio	Lower	Upper
105	100		
120	47.9	23.8	71.2

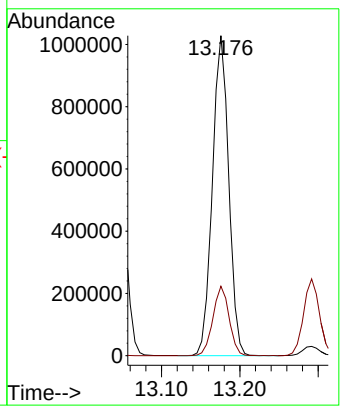




#85
sec-Butylbenzene
Concen: 56.506 ug/l
RT: 13.176 min Scan# 1
Delta R.T. 0.006 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion:105 Resp: 148751

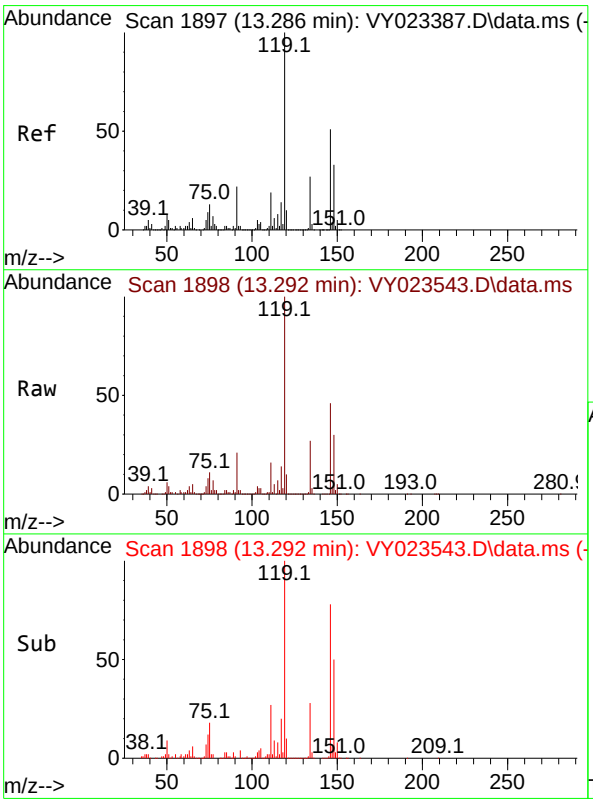
Ion	Ratio	Lower	Upper
105	100		
134	21.6	10.7	32.1



Instrument :
MSVOA_Y
ClientSampleId :
VSTDCCC050

Manual Integrations
APPROVED

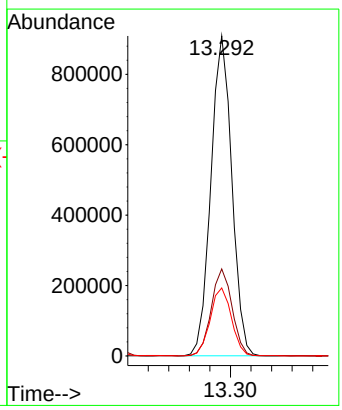
Reviewed By :Amit Patel 10/24/2025
Supervised By :Mahesh Dadoda 10/24/2025

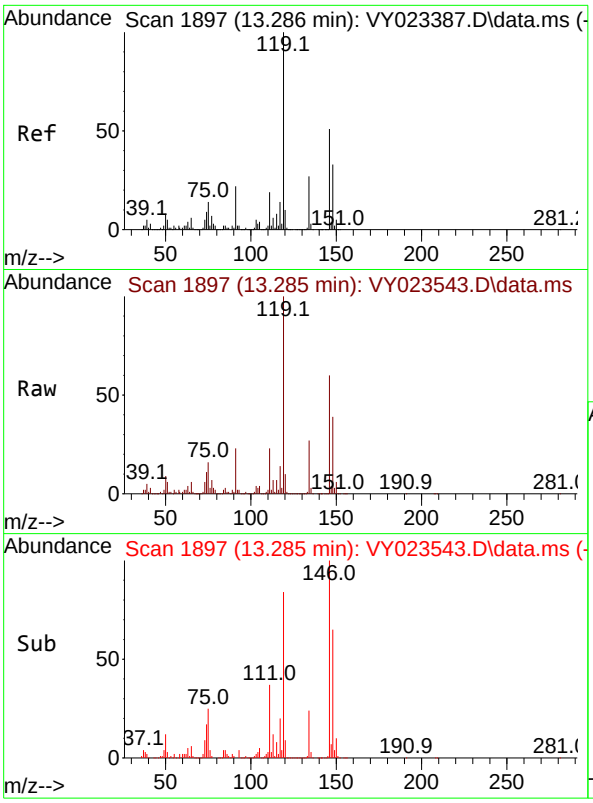


#86
p-Isopropyltoluene
Concen: 57.215 ug/l
RT: 13.292 min Scan# 1898
Delta R.T. 0.006 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion:119 Resp: 1282400

Ion	Ratio	Lower	Upper
119	100		
134	27.1	13.6	40.7
91	21.6	10.9	32.9

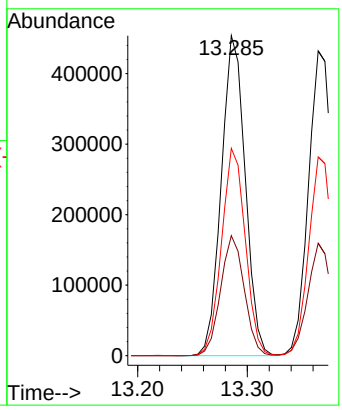




#87
1,3-Dichlorobenzene
Concen: 54.089 ug/l
RT: 13.285 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion:146 Resp: 68874

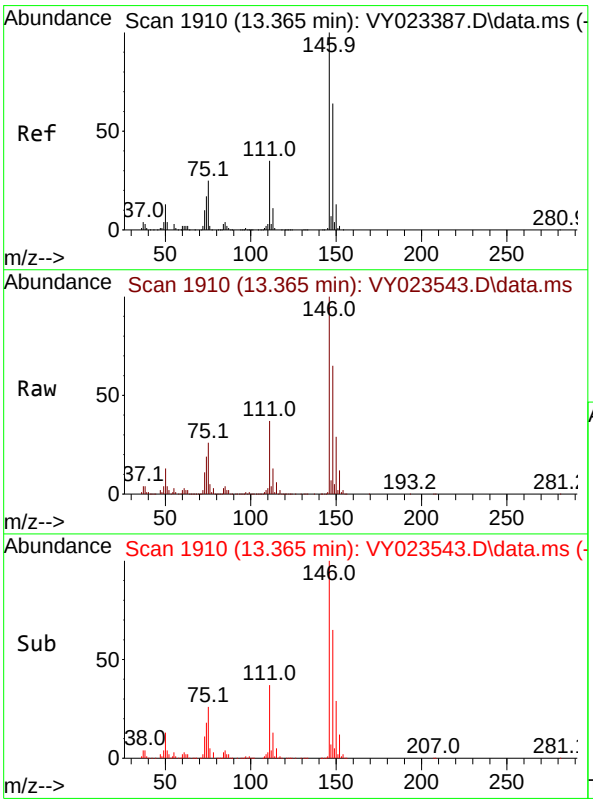
Ion	Ratio	Lower	Upper
146	100		
111	37.0	18.7	56.1
148	64.4	31.9	95.9



Instrument :
MSVOA_Y
ClientSampleId :
VSTDCCC050

Manual Integrations
APPROVED

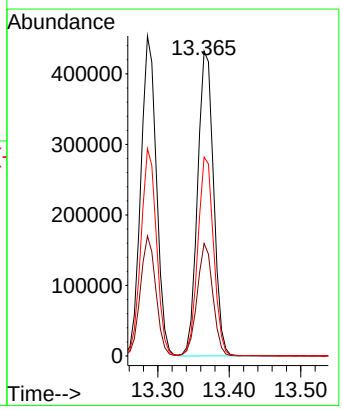
Reviewed By :Amit Patel 10/24/2025
Supervised By :Mahesh Dadoda 10/24/2025

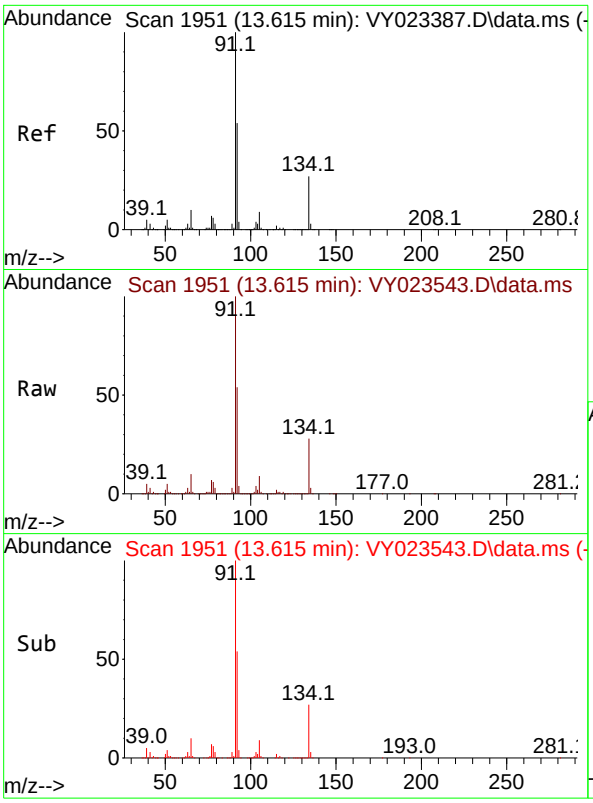


#88
1,4-Dichlorobenzene
Concen: 53.362 ug/l
RT: 13.365 min Scan# 1910
Delta R.T. -0.000 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion:146 Resp: 671095

Ion	Ratio	Lower	Upper
146	100		
111	36.1	18.0	54.0
148	64.6	31.9	95.7

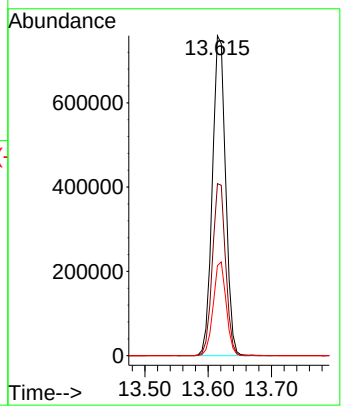




#89
n-Butylbenzene
Concen: 56.385 ug/l
RT: 13.615 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion: 91 Resp: 110118

Ion	Ratio	Lower	Upper
91	100		
92	53.7	27.0	80.8
134	28.7	14.1	42.2



Instrument :
MSVOA_Y
ClientSampleId :
VSTDCCC050

Manual Integrations
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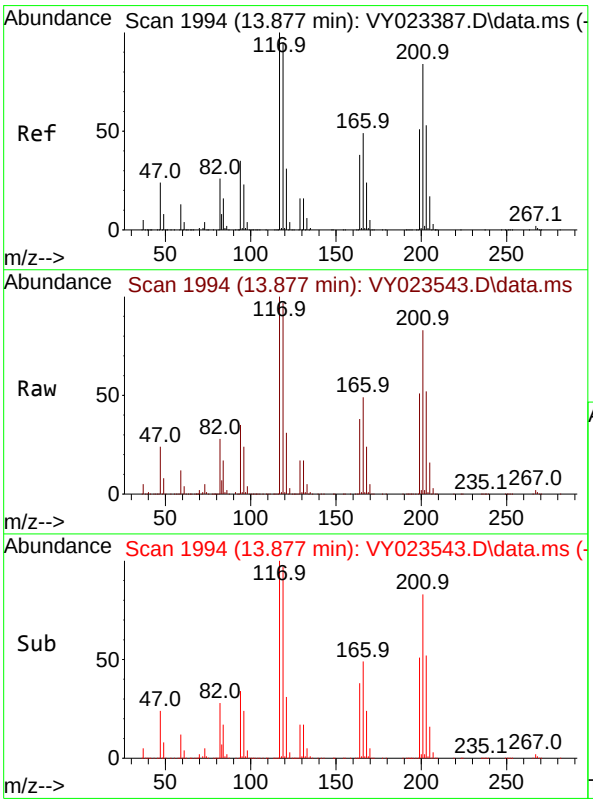
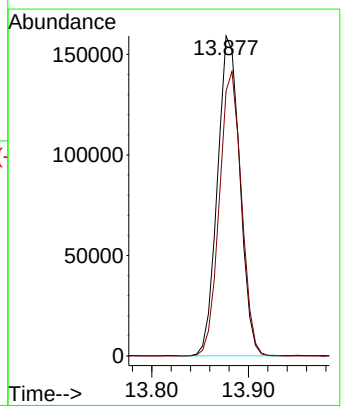
Reviewed By :Amit Patel 10/24/2025
Supervised By :Mahesh Dadoda 10/24/2025

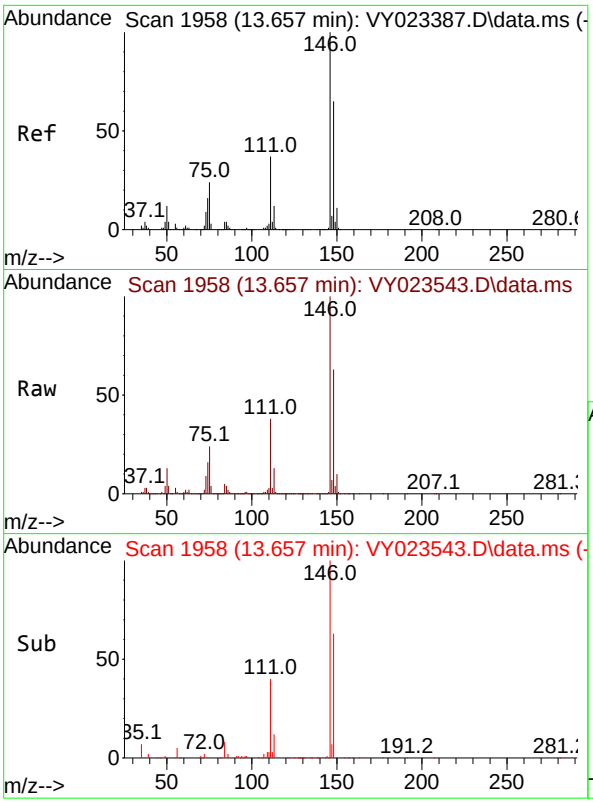


#90
Hexachloroethane
Concen: 52.984 ug/l
RT: 13.877 min Scan# 1994
Delta R.T. -0.000 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion:117 Resp: 255425

Ion	Ratio	Lower	Upper
117	100		
201	87.8	43.8	131.4

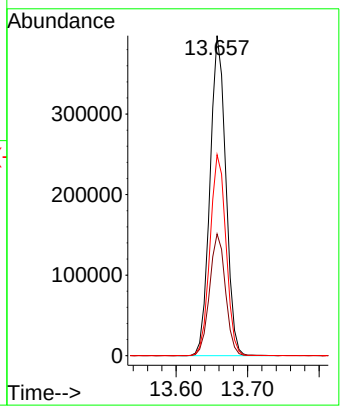




#91
1,2-Dichlorobenzene
Concen: 54.613 ug/l
RT: 13.657 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion:146 Resp: 60968

Ion	Ratio	Lower	Upper
146	100		
111	38.0	19.0	57.0
148	63.6	32.1	96.3



Instrument :
MSVOA_Y
ClientSampleId :
VSTDCCC050

Manual Integrations
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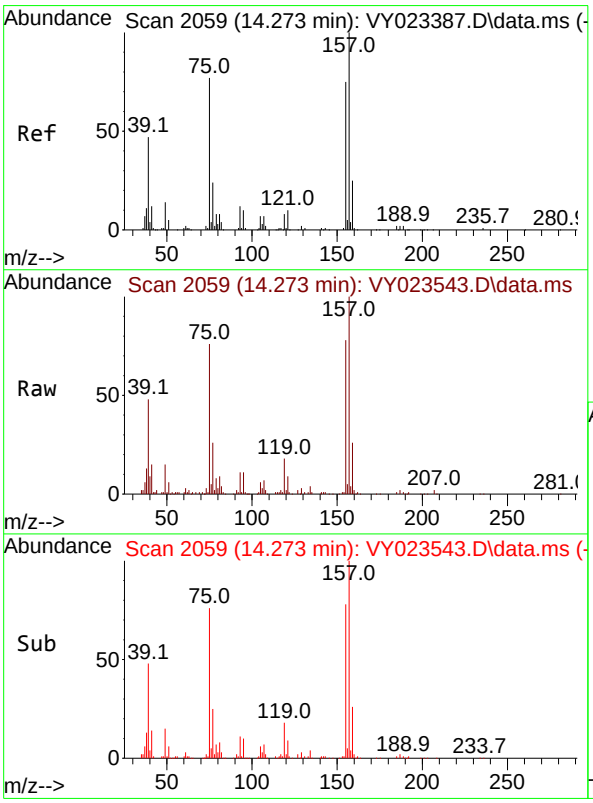
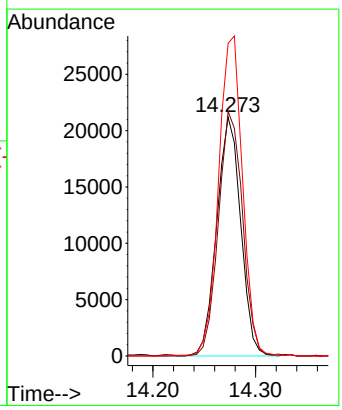
Reviewed By :Amit Patel 10/24/2025
Supervised By :Mahesh Dadoda 10/24/2025

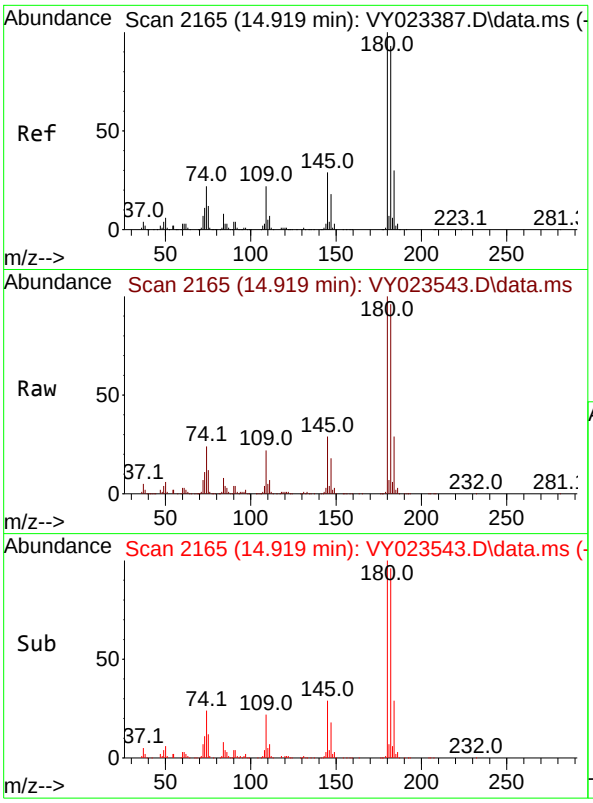


#92
1,2-Dibromo-3-Chloropropane
Concen: 51.910 ug/l
RT: 14.273 min Scan# 2059
Delta R.T. -0.000 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion: 75 Resp: 34265

Ion	Ratio	Lower	Upper
75	100		
155	103.1	50.0	150.0
157	134.1	63.8	191.5

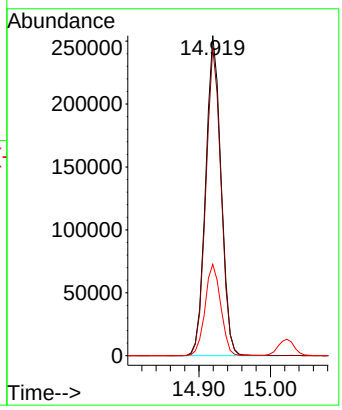




#93
1,2,4-Trichlorobenzene
Concen: 54.674 ug/l
RT: 14.919 min Scan# 2
Delta R.T. -0.000 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion:180 Resp: 38051

Ion	Ratio	Lower	Upper
180	100		
182	95.2	47.9	143.6
145	29.1	14.7	44.1



Instrument :
MSVOA_Y
ClientSampleId :
VSTDCCC050

Manual Integrations
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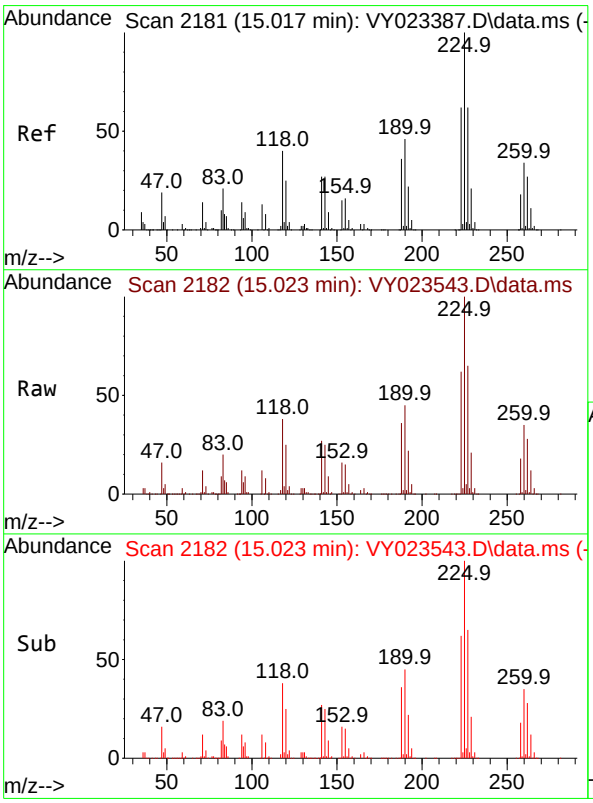
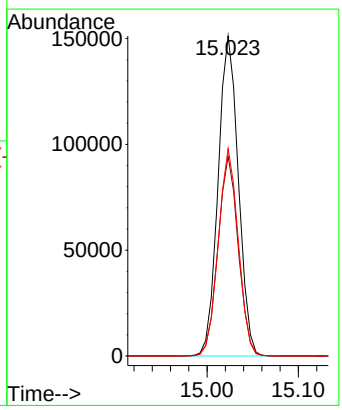
Reviewed By :Amit Patel 10/24/2025
Supervised By :Mahesh Dadoda 10/24/2025

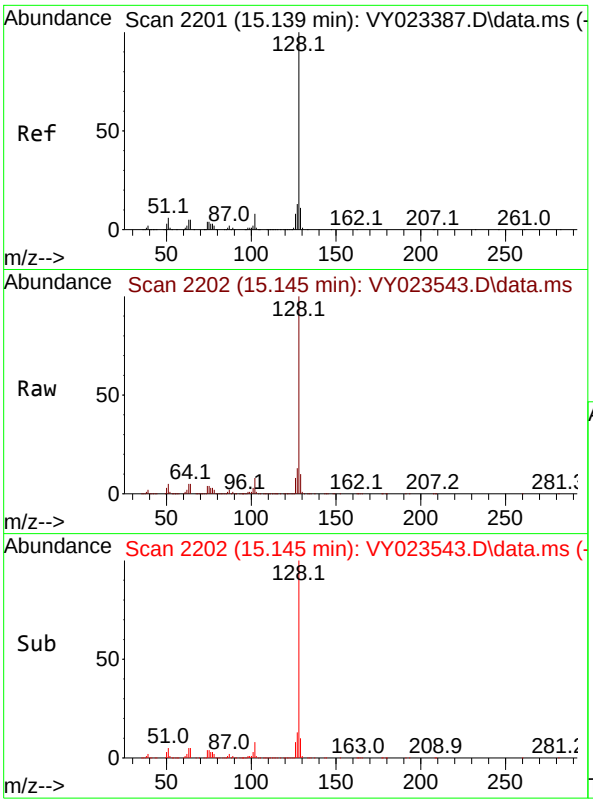


#94
Hexachlorobutadiene
Concen: 53.717 ug/l
RT: 15.023 min Scan# 2182
Delta R.T. 0.006 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion:225 Resp: 233049

Ion	Ratio	Lower	Upper
225	100		
223	62.2	30.8	92.3
227	63.9	31.9	95.7

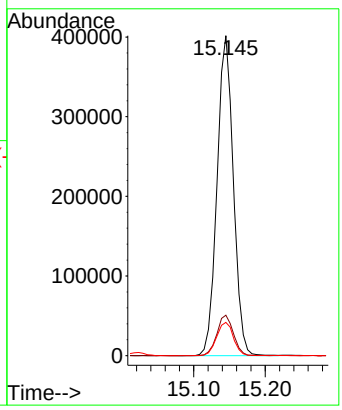




#95
Naphthalene
Concen: 57.452 ug/l
RT: 15.145 min Scan# 2
Delta R.T. 0.006 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

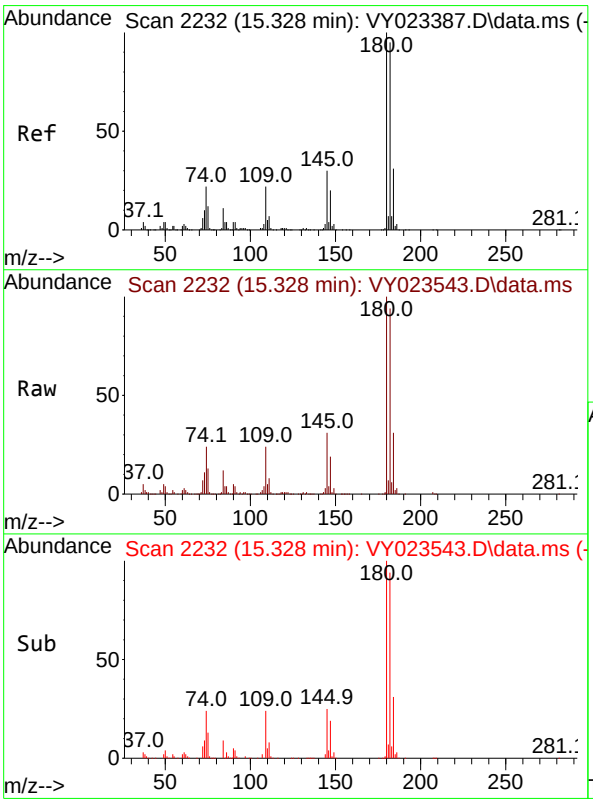
Tgt Ion:128 Resp: 63672

Ion	Ratio	Lower	Upper
128	100		
127	12.8	10.4	15.6
129	10.8	8.9	13.3



Instrument :
MSVOA_Y
ClientSampleId :
VSTDCCC050

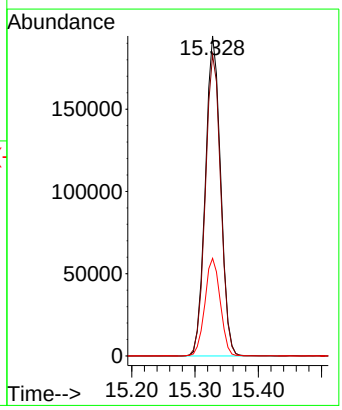
Manual Integrations APPROVED
Reviewed By :Amit Patel 10/24/2025
Supervised By :Mahesh Dadoda 10/24/2025



#96
1,2,3-Trichlorobenzene
Concen: 54.237 ug/l
RT: 15.328 min Scan# 2232
Delta R.T. -0.000 min
Lab File: VY023543.D
Acq: 22 Oct 2025 09:30

Tgt Ion:180 Resp: 326959

Ion	Ratio	Lower	Upper
180	100		
182	95.0	47.9	143.8
145	30.8	15.3	45.9



Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY102225\
Data File : VY023543.D
Acq On : 22 Oct 2025 09:30
Operator : SY/MD
Sample : VSTDCCC050
Misc : 5.00g/5.0mL/MSVOA_Y/SOIL
ALS Vial : 3 Sample Multiplier: 1

Instrument :
MSVOA_Y
LabSampleId :
VSTDCCC050

Quant Time: Oct 24 02:25:18 2025
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260
QLast Update : Wed Oct 08 05:12:50 2025
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
1	I	Pentafluorobenzene	1.000	1.000	0.0	95	0.00
2	T	Dichlorodifluoromethane	0.360	0.308	14.4	91	0.00
3	P	Chloromethane	0.490	0.409	16.5	86	0.00
4	C	Vinyl Chloride	0.639	0.552	13.6#	87	0.00
5	T	Bromomethane	0.536	0.456	14.9	92	0.00
6	T	Chloroethane	0.435	0.403	7.4	92	0.00
7	T	Trichlorofluoromethane	0.887	0.857	3.4	96	0.00
8	T	Diethyl Ether	0.232	0.233	-0.4	103	0.00
9	T	1,1,2-Trichlorotrifluoroeth	0.460	0.469	-2.0	101	0.00
10	T	Methyl Iodide	0.512	0.612	-19.5	108	0.00
11	T	Tert butyl alcohol	0.031	0.031	0.0	118	0.00
12	CM	1,1-Dichloroethene	0.446	0.456	-2.2#	101	0.00
13	T	Acrolein	0.044	0.014	68.2#	31#	0.00
14	T	Allyl chloride	0.544	0.522	4.0	94	0.00
15	T	Acrylonitrile	0.089	0.089	0.0	103	0.00
16	T	Acetone	0.100	0.096	4.0	108	0.00
17	T	Carbon Disulfide	1.277	1.206	5.6	93	0.00
18	T	Methyl Acetate	0.261	0.294	-12.6	113	0.00
19	T	Methyl tert-butyl Ether	1.072	1.142	-6.5	106	0.00
20	T	Methylene Chloride	0.538	0.496	7.8	102	0.00
21	T	trans-1,2-Dichloroethene	0.491	0.510	-3.9	103	0.00
22	T	Diisopropyl ether	1.202	1.215	-1.1	99	0.00
23	T	Vinyl Acetate	0.651	0.630	3.2	95	0.00
24	P	1,1-Dichloroethane	0.796	0.815	-2.4	101	0.00
25	T	2-Butanone	0.122	0.118	3.3	106	0.00
26	T	2,2-Dichloropropane	0.731	0.768	-5.1	103	0.00
27	T	cis-1,2-Dichloroethene	0.567	0.611	-7.8	106	0.00
28	T	Bromochloromethane	0.297	0.257	13.5	91	0.00
29	T	Tetrahydrofuran	0.069	0.066	4.3	99	0.00
30	C	Chloroform	0.875	0.928	-6.1#	105	0.00
31	T	Cyclohexane	0.696	0.650	6.6	96	0.00
32	T	1,1,1-Trichloroethane	0.795	0.839	-5.5	103	0.00
33	S	1,2-Dichloroethane-d4	0.418	0.381	8.9	92	0.00
34	I	1,4-Difluorobenzene	1.000	1.000	0.0	94	0.00
35	S	Dibromofluoromethane	0.307	0.307	0.0	97	0.00
36	T	1,1-Dichloropropene	0.407	0.427	-4.9	101	0.00
37	T	Ethyl Acetate	0.161	0.158	1.9	99	0.01
38	T	Carbon Tetrachloride	0.493	0.522	-5.9	102	0.00
39	T	Methylcyclohexane	0.530	0.561	-5.8	100	0.00
40	TM	Benzene	1.288	1.371	-6.4	102	0.00
41	T	Methacrylonitrile	0.087	0.084	3.4	99	0.00
42	TM	1,2-Dichloroethane	0.332	0.340	-2.4	102	0.00
43	T	Isopropyl Acetate	0.321	0.322	-0.3	100	0.00
44	TM	Trichloroethene	0.377	0.411	-9.0	105	0.00
45	C	1,2-Dichloropropane	0.285	0.303	-6.3#	104	0.00
46	T	Dibromomethane	0.180	0.196	-8.9	106	0.00
47	T	Bromodichloromethane	0.453	0.487	-7.5	104	0.00
48	T	Methyl methacrylate	0.151	0.156	-3.3	99	0.00

Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY102225\
Data File : VY023543.D
Acq On : 22 Oct 2025 09:30
Operator : SY/MD
Sample : VSTDCCC050
Misc : 5.00g/5.0mL/MSVOA_Y/SOIL
ALS Vial : 3 Sample Multiplier: 1

Instrument :
MSVOA_Y
LabSampleId :
VSTDCCC050

Quant Time: Oct 24 02:25:18 2025
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260
QLast Update : Wed Oct 08 05:12:50 2025
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
49	T	1,4-Dioxane	0.002	0.002	0.0	103	0.00
50	S	Toluene-d8	1.144	1.136	0.7	94	0.00
51	T	4-Methyl-2-Pentanone	0.166	0.175	-5.4	103	0.00
52	CM	Toluene	0.836	0.926	-10.8#	105	0.00
53	T	t-1,3-Dichloropropene	0.394	0.433	-9.9	106	0.00
54	T	cis-1,3-Dichloropropene	0.465	0.509	-9.5	105	0.00
55	T	1,1,2-Trichloroethane	0.242	0.264	-9.1	107	0.00
56	T	Ethyl methacrylate	0.279	0.324	-16.1	109	0.00
57	T	1,3-Dichloropropane	0.383	0.419	-9.4	105	0.00
58	T	2-Chloroethyl Vinyl ether	0.125	0.142	-13.6	104	0.00
59	T	2-Hexanone	0.119	0.129	-8.4	108	0.00
60	T	Dibromochloromethane	0.339	0.377	-11.2	108	0.00
61	T	1,2-Dibromoethane	0.231	0.255	-10.4	107	0.00
62	S	4-Bromofluorobenzene	0.378	0.382	-1.1	98	0.00
63	I	Chlorobenzene-d5	1.000	1.000	0.0	96	0.00
64	T	Tetrachloroethene	0.516	0.580	-12.4	106	0.00
65	PM	Chlorobenzene	1.087	1.168	-7.5	107	0.00
66	T	1,1,1,2-Tetrachloroethane	0.388	0.421	-8.5	108	0.00
67	C	Ethyl Benzene	1.760	1.922	-9.2#	104	0.00
68	T	m/p-Xylenes	0.706	0.784	-11.0	105	0.00
69	T	o-Xylene	0.662	0.739	-11.6	106	0.00
70	T	Styrene	1.089	1.228	-12.8	106	0.00
71	P	Bromoform	0.240	0.264	-10.0	110	0.00
72	I	1,4-Dichlorobenzene-d4	1.000	1.000	0.0	95	0.00
73	T	Isopropylbenzene	3.295	3.699	-12.3	106	0.00
74	T	N-amyl acetate	0.592	0.607	-2.5	99	0.00
75	P	1,1,2,2-Tetrachloroethane	0.539	0.562	-4.3	107	0.00
76	T	1,2,3-Trichloropropane	0.441	0.443	-0.5	97	0.00
77	T	Bromobenzene	0.876	0.952	-8.7	107	0.00
78	T	n-propylbenzene	3.813	4.280	-12.2	105	0.00
79	T	2-Chlorotoluene	2.233	2.440	-9.3	104	0.00
80	T	1,3,5-Trimethylbenzene	2.663	3.010	-13.0	106	0.00
81	T	trans-1,4-Dichloro-2-butene	0.180	0.200	-11.1	113	0.00
82	T	4-Chlorotoluene	2.300	2.512	-9.2	105	0.00
83	T	tert-Butylbenzene	2.458	2.779	-13.1	105	0.00
84	T	1,2,4-Trimethylbenzene	2.657	2.997	-12.8	105	0.00
85	T	sec-Butylbenzene	3.527	3.985	-13.0	106	0.00
86	T	p-Isopropyltoluene	3.003	3.436	-14.4	106	0.00
87	T	1,3-Dichlorobenzene	1.706	1.845	-8.1	106	0.00
88	T	1,4-Dichlorobenzene	1.685	1.798	-6.7	105	0.00
89	T	n-Butylbenzene	2.616	2.950	-12.8	105	0.00
90	T	Hexachloroethane	0.646	0.684	-5.9	104	0.00
91	T	1,2-Dichlorobenzene	1.496	1.634	-9.2	108	0.00
92	T	1,2-Dibromo-3-Chloropropane	0.088	0.092	-4.5	105	0.00
93	T	1,2,4-Trichlorobenzene	0.932	1.020	-9.4	106	0.00
94	T	Hexachlorobutadiene	0.581	0.624	-7.4	103	0.00
95	T	Naphthalene	1.485	1.706	-14.9	111	0.00

Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY102225\
Data File : VY023543.D
Acq On : 22 Oct 2025 09:30
Operator : SY/MD
Sample : VSTDCCC050
Misc : 5.00g/5.0mL/MSVOA_Y/SOIL
ALS Vial : 3 Sample Multiplier: 1

Instrument :
MSVOA_Y
LabSampleId :
VSTDCCC050

Quant Time: Oct 24 02:25:18 2025
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260
QLast Update : Wed Oct 08 05:12:50 2025
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

	Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
96 T	1,2,3-Trichlorobenzene	0.808	0.876	-8.4	105	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 6

Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY102225\
Data File : VY023543.D
Acq On : 22 Oct 2025 09:30
Operator : SY/MD
Sample : VSTDCCC050
Misc : 5.00g/5.0mL/MSVOA_Y/SOIL
ALS Vial : 3 Sample Multiplier: 1

Instrument :
MSVOA_Y
LabSampleId :
VSTDCCC050

Quant Time: Oct 24 02:25:18 2025
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260
QLast Update : Wed Oct 08 05:12:50 2025
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1	I	Pentafluorobenzene	50.000	50.000	0.0	95	0.00
2	T	Dichlorodifluoromethane	50.000	42.840	14.3	91	0.00
3	P	Chloromethane	50.000	41.760	16.5	86	0.00
4	C	Vinyl Chloride	50.000	43.199	13.6#	87	0.00
5	T	Bromomethane	50.000	42.551	14.9	92	0.00
6	T	Chloroethane	50.000	46.306	7.4	92	0.00
7	T	Trichlorofluoromethane	50.000	48.307	3.4	96	0.00
8	T	Diethyl Ether	50.000	50.281	-0.6	103	0.00
9	T	1,1,2-Trichlorotrifluoroeth	50.000	50.922	-1.8	101	0.00
10	T	Methyl Iodide	50.000	59.772	-19.5	108	0.00
11	T	Tert butyl alcohol	250.000	250.315	-0.1	118	0.00
12	CM	1,1-Dichloroethene	50.000	51.086	-2.2#	101	0.00
13	T	Acrolein	250.000	79.353	68.3#	31	0.00
14	T	Allyl chloride	50.000	48.025	4.0	94	0.00
15	T	Acrylonitrile	250.000	251.312	-0.5	103	0.00
16	T	Acetone	250.000	240.345	3.9	108	0.00
17	T	Carbon Disulfide	50.000	47.232	5.5	93	0.00
18	T	Methyl Acetate	50.000	56.225	-12.5	113	0.00
19	T	Methyl tert-butyl Ether	50.000	53.251	-6.5	106	0.00
20	T	Methylene Chloride	50.000	46.039	7.9	102	0.00
21	T	trans-1,2-Dichloroethene	50.000	51.921	-3.8	103	0.00
22	T	Diisopropyl ether	50.000	50.537	-1.1	99	0.00
23	T	Vinyl Acetate	250.000	242.046	3.2	95	0.00
24	P	1,1-Dichloroethane	50.000	51.156	-2.3	101	0.00
25	T	2-Butanone	250.000	242.629	2.9	106	0.00
26	T	2,2-Dichloropropane	50.000	52.555	-5.1	103	0.00
27	T	cis-1,2-Dichloroethene	50.000	53.843	-7.7	106	0.00
28	T	Bromochloromethane	50.000	43.243	13.5	91	0.00
29	T	Tetrahydrofuran	250.000	240.938	3.6	99	0.00
30	C	Chloroform	50.000	53.000	-6.0#	105	0.00
31	T	Cyclohexane	50.000	46.762	6.5	96	0.00
32	T	1,1,1-Trichloroethane	50.000	52.741	-5.5	103	0.00
33	S	1,2-Dichloroethane-d4	50.000	45.615	8.8	92	0.00
34	I	1,4-Difluorobenzene	50.000	50.000	0.0	94	0.00
35	S	Dibromofluoromethane	50.000	49.924	0.2	97	0.00
36	T	1,1-Dichloropropene	50.000	52.436	-4.9	101	0.00
37	T	Ethyl Acetate	50.000	48.956	2.1	99	0.01
38	T	Carbon Tetrachloride	50.000	52.970	-5.9	102	0.00
39	T	Methylcyclohexane	50.000	52.949	-5.9	100	0.00
40	TM	Benzene	50.000	53.219	-6.4	102	0.00
41	T	Methacrylonitrile	50.000	48.413	3.2	99	0.00
42	TM	1,2-Dichloroethane	50.000	51.247	-2.5	102	0.00
43	T	Isopropyl Acetate	50.000	50.092	-0.2	100	0.00
44	TM	Trichloroethene	50.000	54.528	-9.1	105	0.00
45	C	1,2-Dichloropropane	50.000	53.216	-6.4#	104	0.00
46	T	Dibromomethane	50.000	54.359	-8.7	106	0.00
47	T	Bromodichloromethane	50.000	53.731	-7.5	104	0.00
48	T	Methyl methacrylate	50.000	51.729	-3.5	99	0.00

Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY102225\
Data File : VY023543.D
Acq On : 22 Oct 2025 09:30
Operator : SY/MD
Sample : VSTDCCC050
Misc : 5.00g/5.0mL/MSVOA_Y/SOIL
ALS Vial : 3 Sample Multiplier: 1

Instrument :
MSVOA_Y
LabSampleId :
VSTDCCC050

Quant Time: Oct 24 02:25:18 2025
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260
QLast Update : Wed Oct 08 05:12:50 2025
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

		Compound	Amount	Calc.	%Dev	Area%	Dev(min)
49	T	1,4-Dioxane	1000.000	1042.410	-4.2	103	0.00
50	S	Toluene-d8	50.000	49.624	0.8	94	0.00
51	T	4-Methyl-2-Pentanone	250.000	263.542	-5.4	103	0.00
52	CM	Toluene	50.000	55.380	-10.8#	105	0.00
53	T	t-1,3-Dichloropropene	50.000	54.901	-9.8	106	0.00
54	T	cis-1,3-Dichloropropene	50.000	54.701	-9.4	105	0.00
55	T	1,1,2-Trichloroethane	50.000	54.478	-9.0	107	0.00
56	T	Ethyl methacrylate	50.000	57.967	-15.9	109	0.00
57	T	1,3-Dichloropropane	50.000	54.594	-9.2	105	0.00
58	T	2-Chloroethyl Vinyl ether	250.000	284.845	-13.9	104	0.00
59	T	2-Hexanone	250.000	271.019	-8.4	108	0.00
60	T	Dibromochloromethane	50.000	55.647	-11.3	108	0.00
61	T	1,2-Dibromoethane	50.000	55.233	-10.5	107	0.00
62	S	4-Bromofluorobenzene	50.000	50.517	-1.0	98	0.00
63	I	Chlorobenzene-d5	50.000	50.000	0.0	96	0.00
64	T	Tetrachloroethene	50.000	56.127	-12.3	106	0.00
65	PM	Chlorobenzene	50.000	53.721	-7.4	107	0.00
66	T	1,1,1,2-Tetrachloroethane	50.000	54.255	-8.5	108	0.00
67	C	Ethyl Benzene	50.000	54.584	-9.2#	104	0.00
68	T	m/p-Xylenes	100.000	110.980	-11.0	105	0.00
69	T	o-Xylene	50.000	55.814	-11.6	106	0.00
70	T	Styrene	50.000	56.380	-12.8	106	0.00
71	P	Bromoform	50.000	54.947	-9.9	110	0.00
72	I	1,4-Dichlorobenzene-d4	50.000	50.000	0.0	95	0.00
73	T	Isopropylbenzene	50.000	56.129	-12.3	106	0.00
74	T	N-amyl acetate	50.000	51.252	-2.5	99	0.00
75	P	1,1,2,2-Tetrachloroethane	50.000	52.112	-4.2	107	0.00
76	T	1,2,3-Trichloropropane	50.000	50.178	-0.4	97	0.00
77	T	Bromobenzene	50.000	54.338	-8.7	107	0.00
78	T	n-propylbenzene	50.000	56.123	-12.2	105	0.00
79	T	2-Chlorotoluene	50.000	54.637	-9.3	104	0.00
80	T	1,3,5-Trimethylbenzene	50.000	56.518	-13.0	106	0.00
81	T	trans-1,4-Dichloro-2-butene	50.000	55.547	-11.1	113	0.00
82	T	4-Chlorotoluene	50.000	54.609	-9.2	105	0.00
83	T	tert-Butylbenzene	50.000	56.518	-13.0	105	0.00
84	T	1,2,4-Trimethylbenzene	50.000	56.397	-12.8	105	0.00
85	T	sec-Butylbenzene	50.000	56.506	-13.0	106	0.00
86	T	p-Isopropyltoluene	50.000	57.215	-14.4	106	0.00
87	T	1,3-Dichlorobenzene	50.000	54.089	-8.2	106	0.00
88	T	1,4-Dichlorobenzene	50.000	53.362	-6.7	105	0.00
89	T	n-Butylbenzene	50.000	56.385	-12.8	105	0.00
90	T	Hexachloroethane	50.000	52.984	-6.0	104	0.00
91	T	1,2-Dichlorobenzene	50.000	54.613	-9.2	108	0.00
92	T	1,2-Dibromo-3-Chloropropane	50.000	51.910	-3.8	105	0.00
93	T	1,2,4-Trichlorobenzene	50.000	54.674	-9.3	106	0.00
94	T	Hexachlorobutadiene	50.000	53.717	-7.4	103	0.00
95	T	Naphthalene	50.000	57.452	-14.9	111	0.00

Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY102225\
Data File : VY023543.D
Acq On : 22 Oct 2025 09:30
Operator : SY/MD
Sample : VSTDCCC050
Misc : 5.00g/5.0mL/MSVOA_Y/SOIL
ALS Vial : 3 Sample Multiplier: 1

Instrument :
MSVOA_Y
LabSampleId :
VSTDCCC050

Quant Time: Oct 24 02:25:18 2025
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260
QLast Update : Wed Oct 08 05:12:50 2025
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 25% Max. Rel. Area : 150%

	Compound	Amount	Calc.	%Dev	Area%	Dev(min)
96 T	1,2,3-Trichlorobenzene	50.000	54.237	-8.5	105	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 6

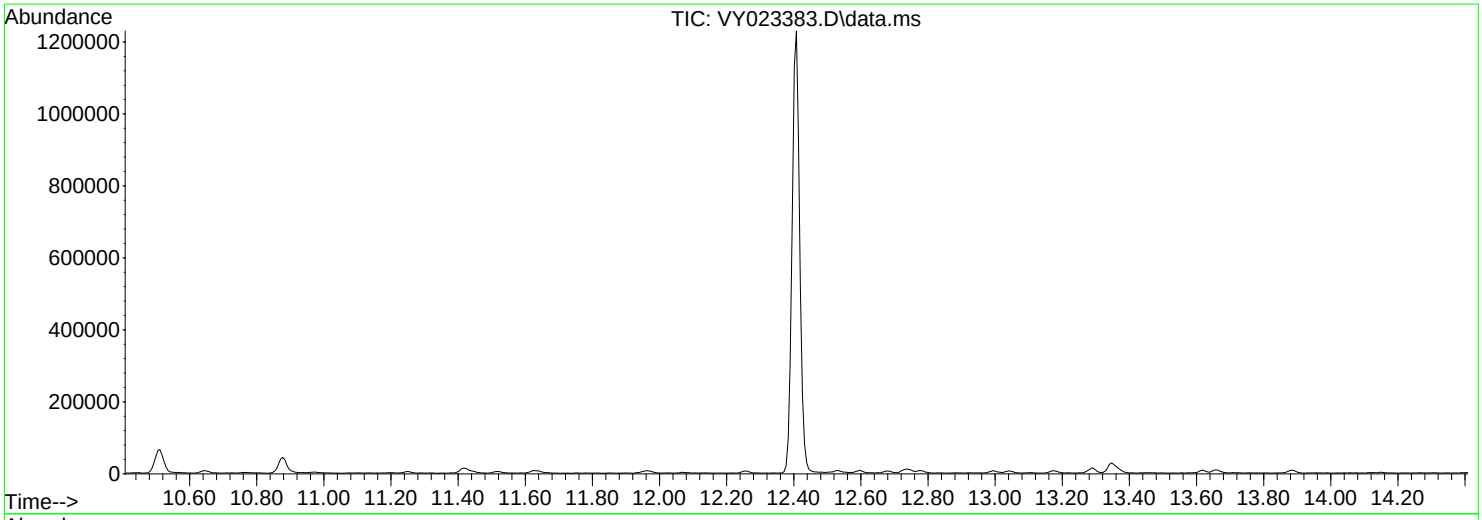
QC SAMPLE DATA

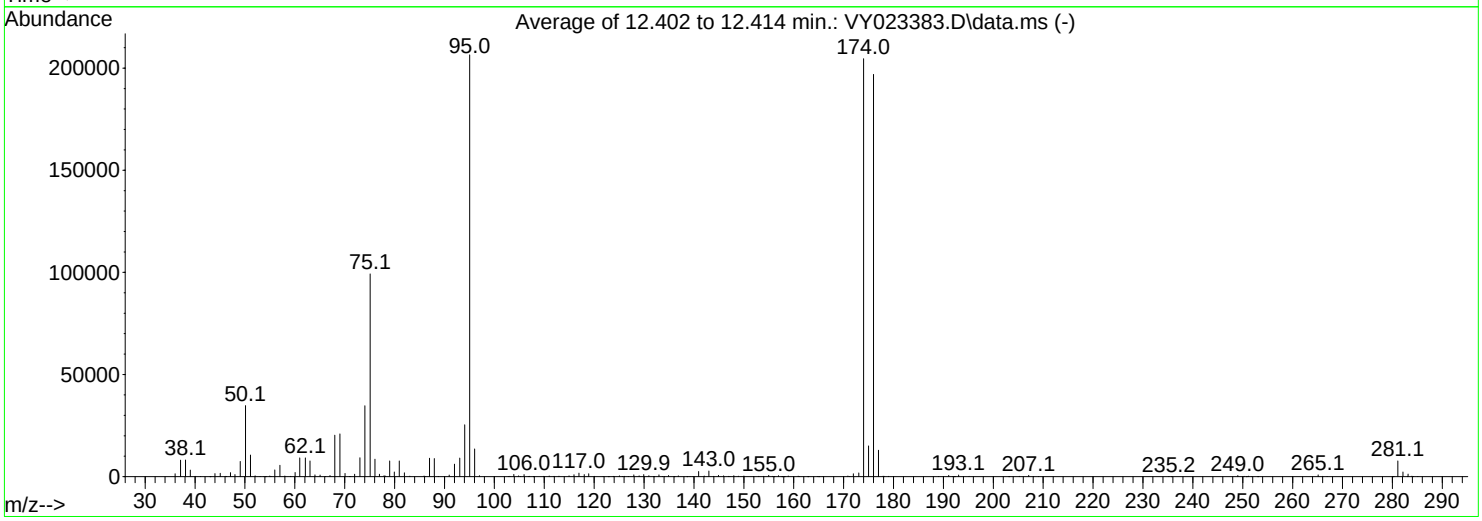
Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY100725\
Data File : VY023383.D
Acq On : 07 Oct 2025 08:43
Operator : SY/MD
Sample : BFB
Misc : 5.00g/5.0mL/MSVOA_Y/SOIL
ALS Vial : 1 Sample Multiplier: 1

Instrument :
MSVOA_Y
ClientSampleId :
BFB

Integration File: RTEINT.P

Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Title : SW846 8260
Last Update : Wed Oct 08 05:12:50 2025





AutoFind: Scans 1752, 1753, 1754; Background Corrected with Scan 1743

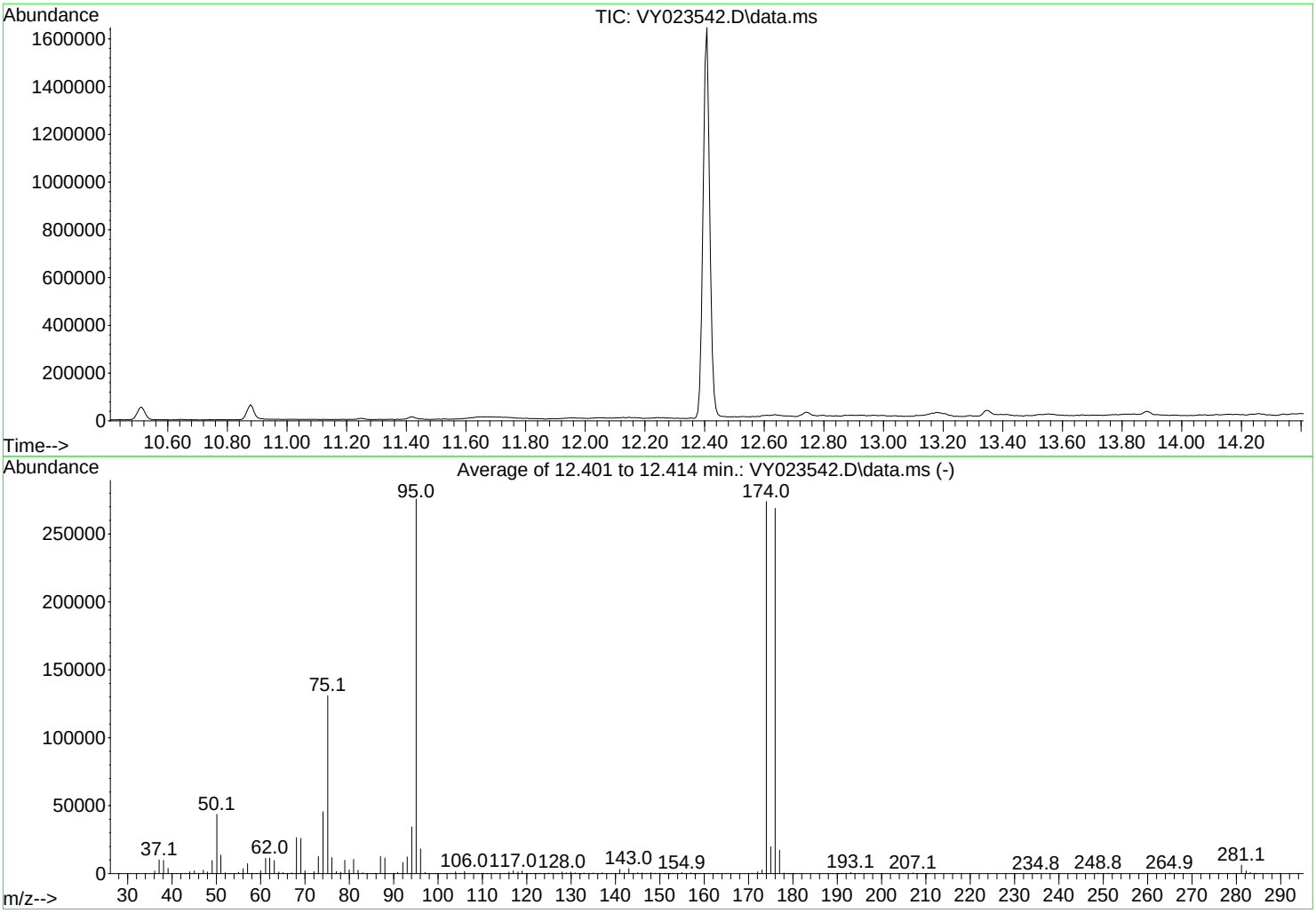
Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	15	40	16.9	34816	PASS
75	95	30	60	48.1	99264	PASS
95	95	100	100	100.0	206507	PASS
96	95	5	9	6.6	13540	PASS
173	174	0.00	2	0.9	1817	PASS
174	95	50	100	99.1	204629	PASS
175	174	5	9	7.4	15059	PASS
176	174	95	101	96.2	196949	PASS
177	176	5	9	6.6	12912	PASS

Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY102225\
Data File : VY023542.D
Acq On : 22 Oct 2025 09:00
Operator : SY/MD
Sample : BFB
Misc : 5.00g/5.0mL/MSVOA_Y/SOIL
ALS Vial : 2 Sample Multiplier: 1

Instrument :
MSVOA_Y
ClientSampleId :
BFB

Integration File: RTEINT.P

Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Title : SW846 8260
Last Update : Wed Oct 08 05:12:50 2025



AutoFind: Scans 1752, 1753, 1754; Background Corrected with Scan 1743

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	15	40	15.8	43632	PASS
75	95	30	60	47.5	130976	PASS
95	95	100	100	100.0	275756	PASS
96	95	5	9	6.6	18234	PASS
173	174	0.00	2	1.0	2756	PASS
174	95	50	100	99.3	273941	PASS
175	174	5	9	7.2	19793	PASS
176	174	95	101	98.2	268885	PASS
177	176	5	9	6.4	17309	PASS

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

Report of Analysis

Client:	AECOM	Date Collected:	
Project:	AE1-CTY 3.2.Z-PR-DOCK-Des-ODC - 60693795-1719206	Date Received:	
Client Sample ID:	VY1022SBL01	SDG No.:	Q3424
Lab Sample ID:	VY1022SBL01	Matrix:	SOIL
Analytical Method:	8260D	Level : LOW	% Solid: 100
Sample Wt/Vol:	5 g	Final Vol: 5000 uL	Test: VOC-TCLVOA-10

CAS Number	Parameter	Conc.	Qua.	DF	MDL	LOQ / CRQL	Units	Date Ana.	BatchID
TARGETS									
75-71-8	Dichlorodifluoromethane	5.00	U	1	1.10	5.00	ug/Kg	10/22/25 10:00	VY102225
74-87-3	Chloromethane	5.00	U	1	1.10	5.00	ug/Kg	10/22/25 10:00	VY102225
75-01-4	Vinyl Chloride	5.00	U	1	0.79	5.00	ug/Kg	10/22/25 10:00	VY102225
74-83-9	Bromomethane	5.00	U	1	1.10	5.00	ug/Kg	10/22/25 10:00	VY102225
75-00-3	Chloroethane	5.00	U	1	1.30	5.00	ug/Kg	10/22/25 10:00	VY102225
75-69-4	Trichlorofluoromethane	5.00	U	1	1.20	5.00	ug/Kg	10/22/25 10:00	VY102225
76-13-1	1,1,2-Trichlorotrifluoroethane	5.00	U	1	1.10	5.00	ug/Kg	10/22/25 10:00	VY102225
75-35-4	1,1-Dichloroethene	5.00	U	1	1.00	5.00	ug/Kg	10/22/25 10:00	VY102225
67-64-1	Acetone	25.0	U	1	4.70	25.0	ug/Kg	10/22/25 10:00	VY102225
75-15-0	Carbon Disulfide	5.00	U	1	1.10	5.00	ug/Kg	10/22/25 10:00	VY102225
1634-04-4	Methyl tert-butyl Ether	5.00	U	1	0.73	5.00	ug/Kg	10/22/25 10:00	VY102225
79-20-9	Methyl Acetate	5.00	U	1	1.50	5.00	ug/Kg	10/22/25 10:00	VY102225
75-09-2	Methylene Chloride	10.0	U	1	3.50	10.0	ug/Kg	10/22/25 10:00	VY102225
156-60-5	trans-1,2-Dichloroethene	5.00	U	1	0.86	5.00	ug/Kg	10/22/25 10:00	VY102225
75-34-3	1,1-Dichloroethane	5.00	U	1	0.80	5.00	ug/Kg	10/22/25 10:00	VY102225
110-82-7	Cyclohexane	5.00	U	1	0.79	5.00	ug/Kg	10/22/25 10:00	VY102225
78-93-3	2-Butanone	25.0	U	1	6.50	25.0	ug/Kg	10/22/25 10:00	VY102225
56-23-5	Carbon Tetrachloride	5.00	U	1	0.97	5.00	ug/Kg	10/22/25 10:00	VY102225
156-59-2	cis-1,2-Dichloroethene	5.00	U	1	0.75	5.00	ug/Kg	10/22/25 10:00	VY102225
74-97-5	Bromochloromethane	5.00	U	1	1.20	5.00	ug/Kg	10/22/25 10:00	VY102225
67-66-3	Chloroform	5.00	U	1	0.84	5.00	ug/Kg	10/22/25 10:00	VY102225
71-55-6	1,1,1-Trichloroethane	5.00	U	1	0.93	5.00	ug/Kg	10/22/25 10:00	VY102225
108-87-2	Methylcyclohexane	5.00	U	1	0.91	5.00	ug/Kg	10/22/25 10:00	VY102225
71-43-2	Benzene	5.00	U	1	0.79	5.00	ug/Kg	10/22/25 10:00	VY102225
107-06-2	1,2-Dichloroethane	5.00	U	1	0.79	5.00	ug/Kg	10/22/25 10:00	VY102225
79-01-6	Trichloroethene	5.00	U	1	0.81	5.00	ug/Kg	10/22/25 10:00	VY102225
78-87-5	1,2-Dichloropropane	5.00	U	1	0.91	5.00	ug/Kg	10/22/25 10:00	VY102225
75-27-4	Bromodichloromethane	5.00	U	1	0.78	5.00	ug/Kg	10/22/25 10:00	VY102225
108-10-1	4-Methyl-2-Pentanone	25.0	U	1	3.60	25.0	ug/Kg	10/22/25 10:00	VY102225
108-88-3	Toluene	5.00	U	1	0.78	5.00	ug/Kg	10/22/25 10:00	VY102225
10061-02-6	t-1,3-Dichloropropene	5.00	U	1	0.65	5.00	ug/Kg	10/22/25 10:00	VY102225
10061-01-5	cis-1,3-Dichloropropene	5.00	U	1	0.62	5.00	ug/Kg	10/22/25 10:00	VY102225
79-00-5	1,1,2-Trichloroethane	5.00	U	1	0.92	5.00	ug/Kg	10/22/25 10:00	VY102225
591-78-6	2-Hexanone	25.0	U	1	3.70	25.0	ug/Kg	10/22/25 10:00	VY102225
124-48-1	Dibromochloromethane	5.00	U	1	0.87	5.00	ug/Kg	10/22/25 10:00	VY102225
106-93-4	1,2-Dibromoethane	5.00	U	1	0.88	5.00	ug/Kg	10/22/25 10:00	VY102225
127-18-4	Tetrachloroethene	5.00	U	1	1.10	5.00	ug/Kg	10/22/25 10:00	VY102225
108-90-7	Chlorobenzene	5.00	U	1	0.91	5.00	ug/Kg	10/22/25 10:00	VY102225
100-41-4	Ethyl Benzene	5.00	U	1	0.67	5.00	ug/Kg	10/22/25 10:00	VY102225
179601-23-1	m/p-Xylenes	10.0	U	1	1.20	10.0	ug/Kg	10/22/25 10:00	VY102225
95-47-6	o-Xylene	5.00	U	1	0.82	5.00	ug/Kg	10/22/25 10:00	VY102225
100-42-5	Styrene	5.00	U	1	0.71	5.00	ug/Kg	10/22/25 10:00	VY102225
75-25-2	Bromoform	5.00	U	1	0.86	5.00	ug/Kg	10/22/25 10:00	VY102225

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

Report of Analysis

Client:	AECOM	Date Collected:	
Project:	AE1-CTY 3.2.Z-PR-DOCK-Des-ODC - 60693795-1719206	Date Received:	
Client Sample ID:	VY1022SBL01	SDG No.:	Q3424
Lab Sample ID:	VY1022SBL01	Matrix:	SOIL
Analytical Method:	8260D	Level : LOW	% Solid: 100
Sample Wt/Vol:	5 g	Final Vol: 5000 uL	Test: VOC-TCLVOA-10

CAS Number	Parameter	Conc.	Qua.	DF	MDL	LOQ / CRQL	Units	Date Ana.	BatchID
98-82-8	Isopropylbenzene	5.00	U	1	0.78	5.00	ug/Kg	10/22/25 10:00	VY102225
79-34-5	1,1,2,2-Tetrachloroethane	5.00	U	1	1.20	5.00	ug/Kg	10/22/25 10:00	VY102225
541-73-1	1,3-Dichlorobenzene	5.00	U	1	1.70	5.00	ug/Kg	10/22/25 10:00	VY102225
106-46-7	1,4-Dichlorobenzene	5.00	U	1	1.60	5.00	ug/Kg	10/22/25 10:00	VY102225
95-50-1	1,2-Dichlorobenzene	5.00	U	1	1.50	5.00	ug/Kg	10/22/25 10:00	VY102225
96-12-8	1,2-Dibromo-3-Chloropropane	5.00	U	1	1.80	5.00	ug/Kg	10/22/25 10:00	VY102225
120-82-1	1,2,4-Trichlorobenzene	5.00	U	1	3.00	5.00	ug/Kg	10/22/25 10:00	VY102225
87-61-6	1,2,3-Trichlorobenzene	5.00	U	1	3.20	5.00	ug/Kg	10/22/25 10:00	VY102225
SURROGATES									
17060-07-0	1,2-Dichloroethane-d4	48.3			63 - 155	97%	SPK: 50		
1868-53-7	Dibromofluoromethane	49.8			70 - 134	100%	SPK: 50		
2037-26-5	Toluene-d8	48.6			74 - 123	97%	SPK: 50		
460-00-4	4-Bromofluorobenzene	41.1			17 - 146	82%	SPK: 50		
INTERNAL STANDARDS		**Area Count**							
363-72-4	Pentafluorobenzene	890000							
540-36-3	1,4-Difluorobenzene	1430000							
3114-55-4	Chlorobenzene-d5	1180000							
3855-82-1	1,4-Dichlorobenzene-d4	485000							

U = Not Detected
LOQ = Limit of Quantitation
MDL = Method Detection Limit
LOD = Limit of Detection
E = Value Exceeds Calibration Range
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
() = Laboratory InHouse Limit
A = Aldol-Condensation Reaction Products

Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY102225\
Data File : VY023544.D
Acq On : 22 Oct 2025 10:00
Operator : SY/MD
Sample : VY1022SBL01
Misc : 5.00g/5.0mL/MSVOA_Y/SOIL
ALS Vial : 4 Sample Multiplier: 1

Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBL01

Quant Time: Oct 24 02:26:09 2025
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260
QLast Update : Wed Oct 08 05:12:50 2025
Response via : Initial Calibration

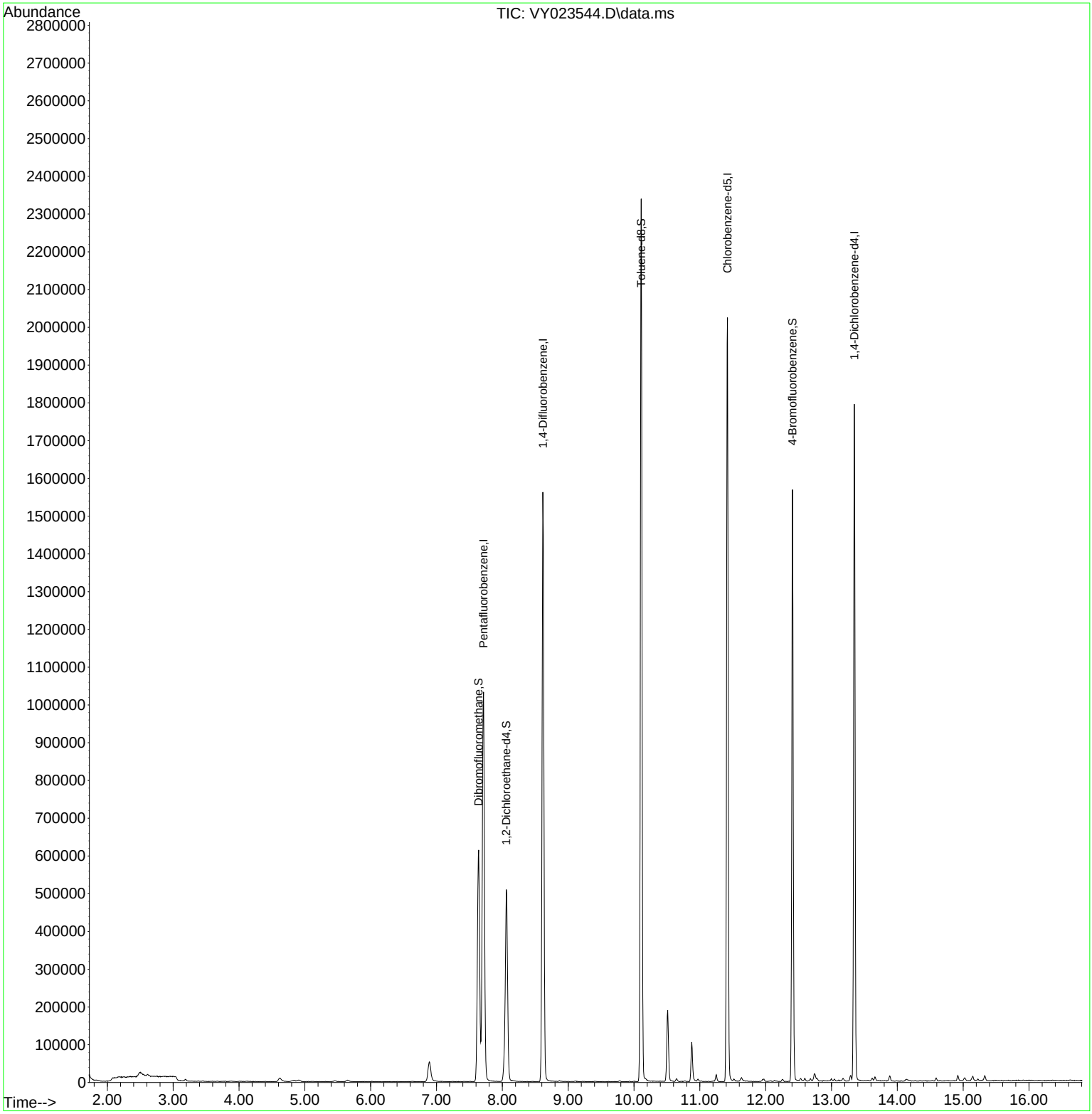
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Pentafluorobenzene	7.713	168	890059	50.000	ug/l	0.00
34) 1,4-Difluorobenzene	8.616	114	1434768	50.000	ug/l	0.00
63) Chlorobenzene-d5	11.420	117	1180185	50.000	ug/l	0.00
72) 1,4-Dichlorobenzene-d4	13.346	152	484557	50.000	ug/l	0.00
System Monitoring Compounds						
33) 1,2-Dichloroethane-d4	8.061	65	359226	48.265	ug/l	0.00
Spiked Amount 50.000	Range 50 - 163		Recovery = 96.520%			
35) Dibromofluoromethane	7.640	113	439107	49.808	ug/l	0.00
Spiked Amount 50.000	Range 54 - 147		Recovery = 99.620%			
50) Toluene-d8	10.109	98	1595601	48.600	ug/l	0.00
Spiked Amount 50.000	Range 58 - 134		Recovery = 97.200%			
62) 4-Bromofluorobenzene	12.408	95	445110	41.064	ug/l	0.00
Spiked Amount 50.000	Range 30 - 143		Recovery = 82.120%			
Target Compounds						Qvalue

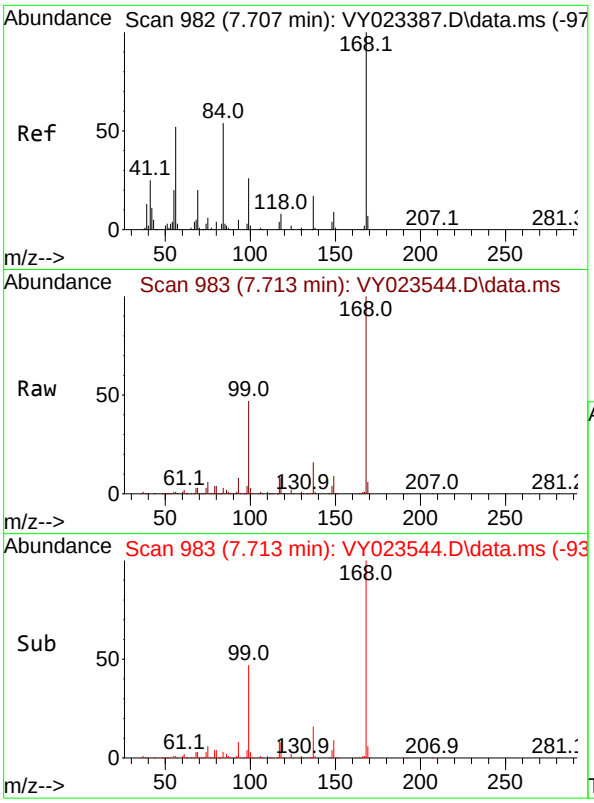
(#) = qualifier out of range (m) = manual integration (+) = signals summed

Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY102225\
Data File : VY023544.D
Acq On : 22 Oct 2025 10:00
Operator : SY/MD
Sample : VY1022SBL01
Misc : 5.00g/5.0mL/MSVOA_Y/SOIL
ALS Vial : 4 Sample Multiplier: 1

Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBL01

Quant Time: Oct 24 02:26:09 2025
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260
QLast Update : Wed Oct 08 05:12:50 2025
Response via : Initial Calibration



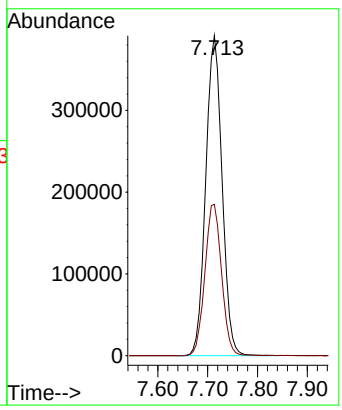


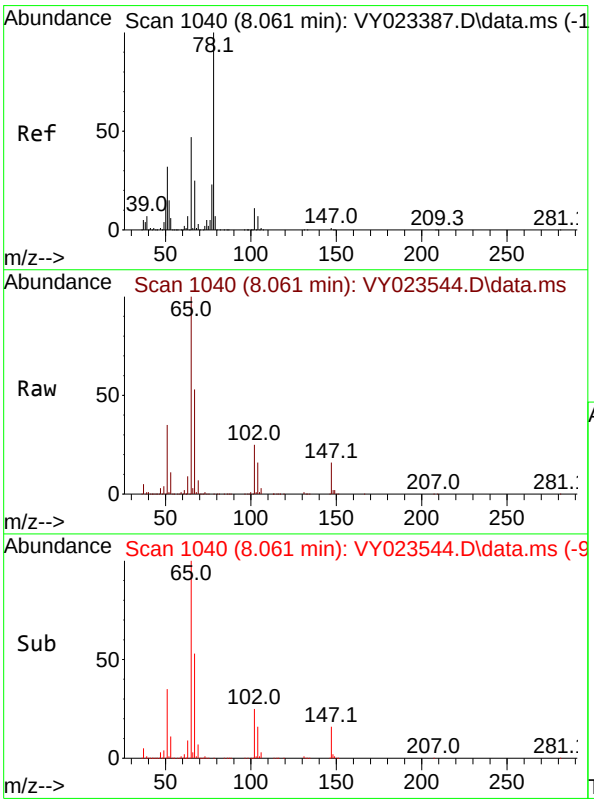
#1
Pentafluorobenzene
Concen: 50.000 ug/l
RT: 7.713 min Scan# 9
Delta R.T. 0.006 min
Lab File: VY023544.D
Acq: 22 Oct 2025 10:00

Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBL01

Tgt Ion:168 Resp: 890059

Ion	Ratio	Lower	Upper
168	100		
99	47.3	39.7	59.5

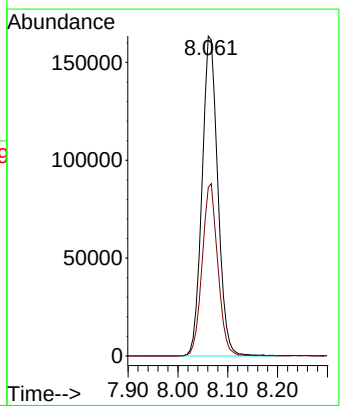


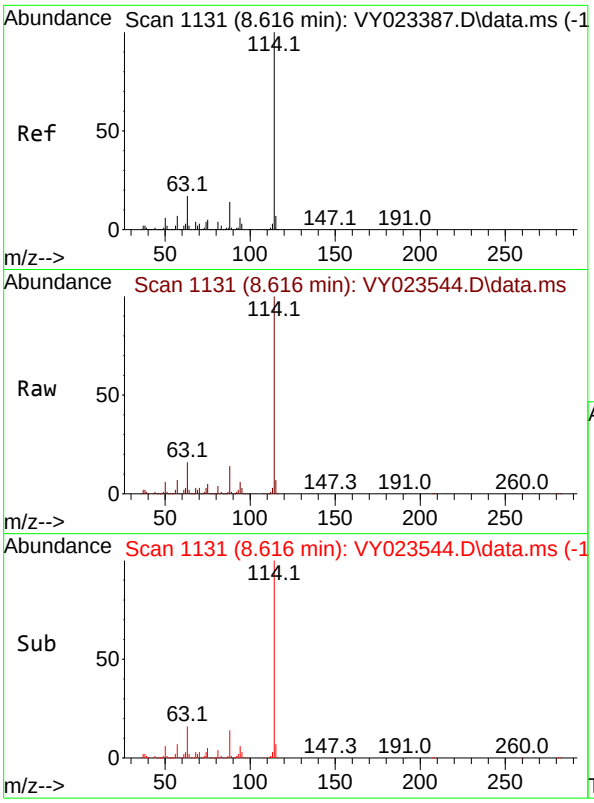


#33
1,2-Dichloroethane-d4
Concen: 48.265 ug/l
RT: 8.061 min Scan# 1040
Delta R.T. -0.000 min
Lab File: VY023544.D
Acq: 22 Oct 2025 10:00

Tgt Ion: 65 Resp: 359226

Ion	Ratio	Lower	Upper
65	100		
67	53.5	0.0	105.8



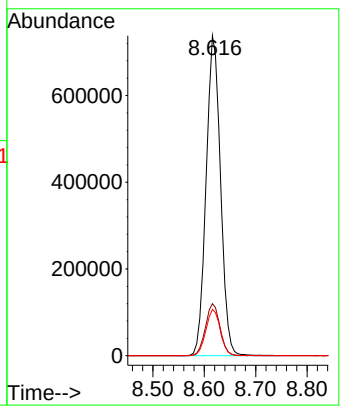


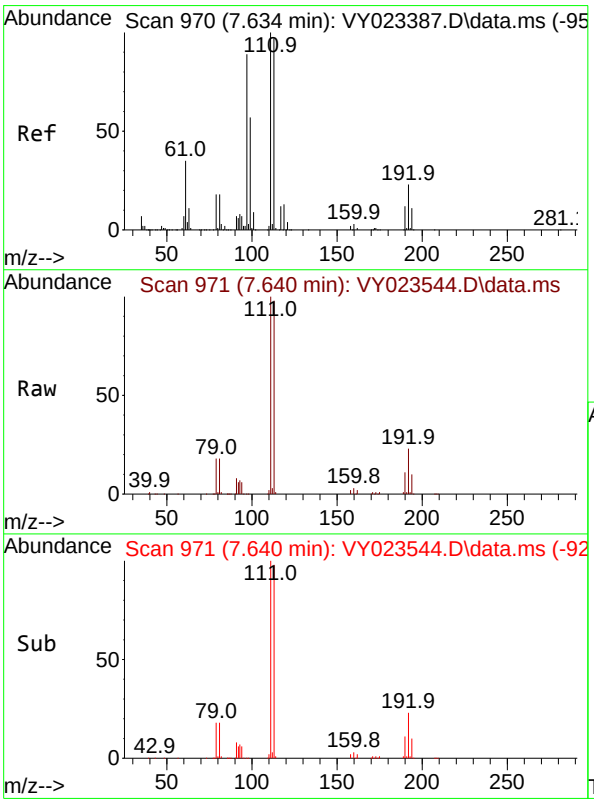
#34
1,4-Difluorobenzene
Concen: 50.000 ug/l
RT: 8.616 min Scan# 11
Delta R.T. 0.000 min
Lab File: VY023544.D
Acq: 22 Oct 2025 10:00

Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBL01

Tgt Ion:114 Resp: 1434768

Ion	Ratio	Lower	Upper
114	100		
63	16.2	0.0	34.2
88	14.5	0.0	28.4

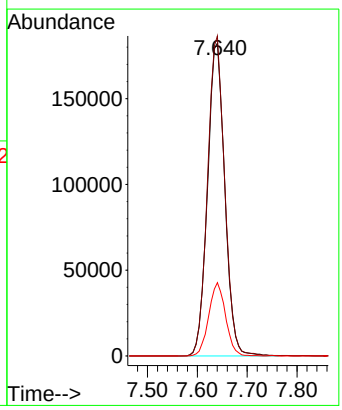


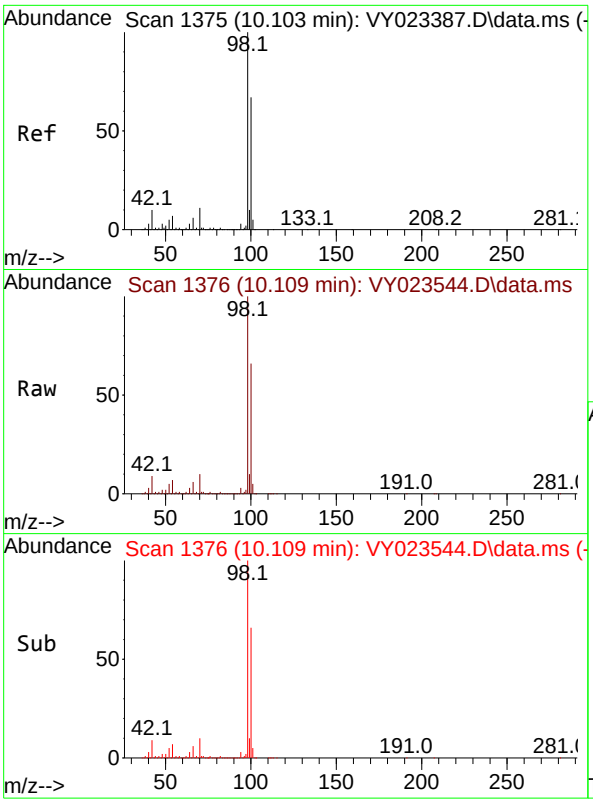


#35
Dibromofluoromethane
Concen: 49.808 ug/l
RT: 7.640 min Scan# 971
Delta R.T. 0.006 min
Lab File: VY023544.D
Acq: 22 Oct 2025 10:00

Tgt Ion:113 Resp: 439107

Ion	Ratio	Lower	Upper
113	100		
111	101.6	81.8	122.6
192	22.9	18.0	27.0



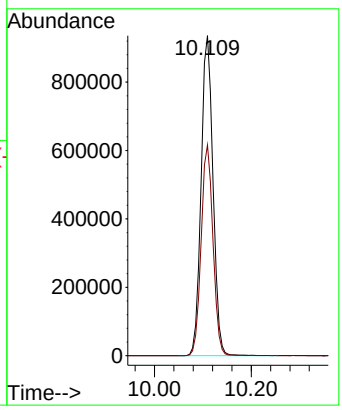


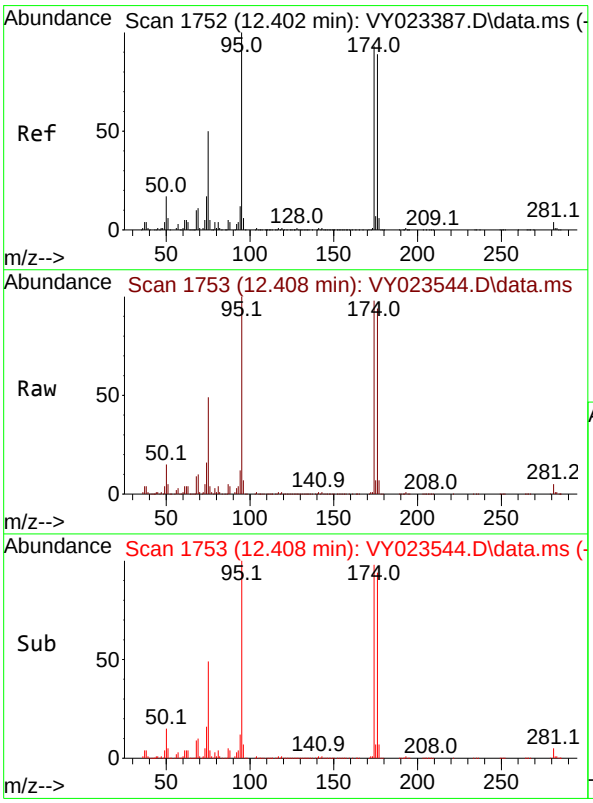
#50
Toluene-d8
Concen: 48.600 ug/l
RT: 10.109 min Scan# 1
Delta R.T. 0.006 min
Lab File: VY023544.D
Acq: 22 Oct 2025 10:00

Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBL01

Tgt Ion: 98 Resp: 1595601

Ion	Ratio	Lower	Upper
98	100		
100	65.5	53.0	79.4

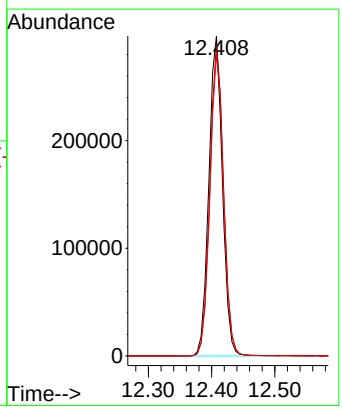


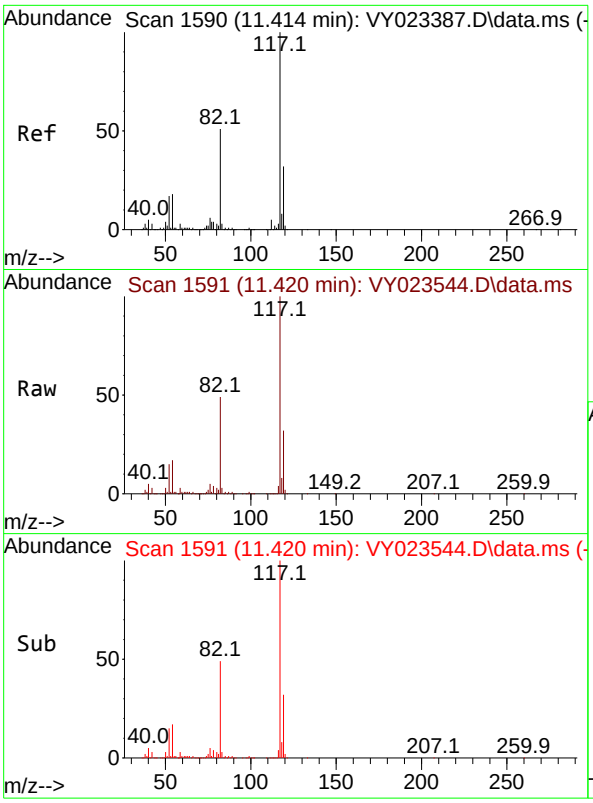


#62
4-Bromofluorobenzene
Concen: 41.064 ug/l
RT: 12.408 min Scan# 1753
Delta R.T. 0.006 min
Lab File: VY023544.D
Acq: 22 Oct 2025 10:00

Tgt Ion: 95 Resp: 445110

Ion	Ratio	Lower	Upper
95	100		
174	97.9	0.0	192.8
176	94.7	0.0	187.6



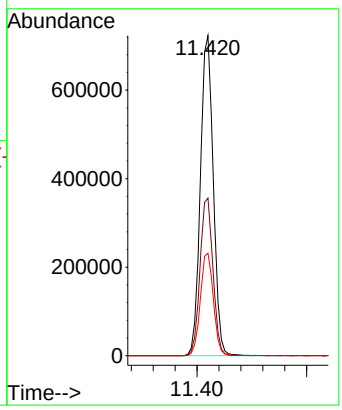


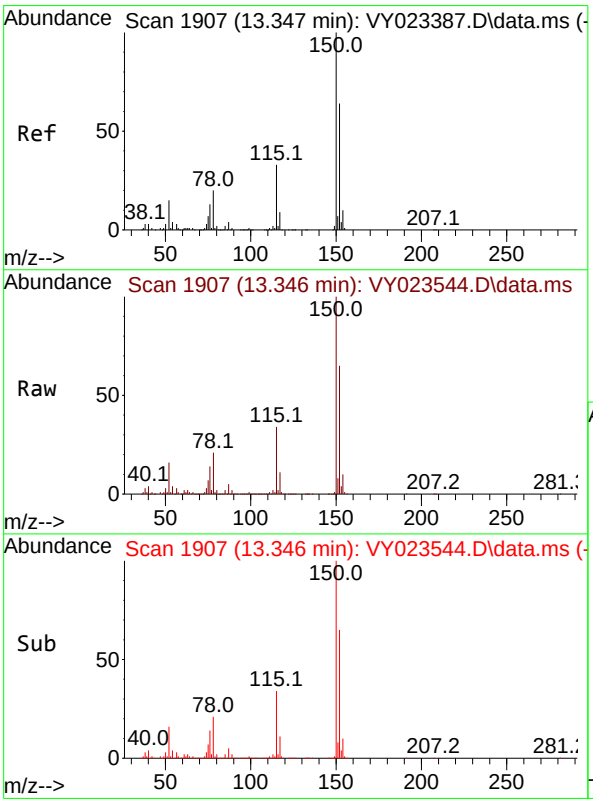
#63
Chlorobenzene-d5
Concen: 50.000 ug/l
RT: 11.420 min Scan# 1
Delta R.T. 0.006 min
Lab File: VY023544.D
Acq: 22 Oct 2025 10:00

Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBL01

Tgt Ion:117 Resp: 1180185

Ion	Ratio	Lower	Upper
117	100		
82	49.3	41.0	61.4
119	32.0	25.6	38.4

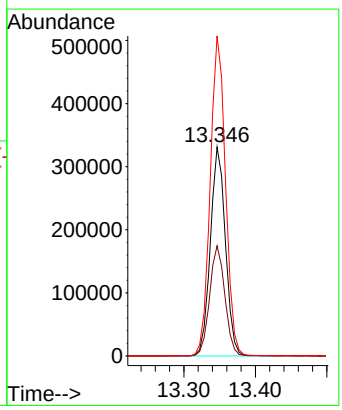




#72
1,4-Dichlorobenzene-d4
Concen: 50.000 ug/l
RT: 13.346 min Scan# 1907
Delta R.T. -0.000 min
Lab File: VY023544.D
Acq: 22 Oct 2025 10:00

Tgt Ion:152 Resp: 484557

Ion	Ratio	Lower	Upper
152	100		
115	53.2	27.1	81.2
150	154.9	0.0	347.4



Sample Results: **VY023544.D**

Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY102225\
Data File : VY023544.D
Acq On : 22 Oct 2025 10:00
Operator : SY/MD
Sample : VY1022SBL01
Misc : 5.00g/5.0mL/MSVOA_Y/SOIL
ALS Vial : 4 Sample Multiplier: 1

Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBL01

Integration Parameters: RTEINT.P
Integrator: RTE
Smoothing : ON Filtering: 5
Sampling : 1 Min Area: 3 % of largest Peak
Start Thrs: 0.2 Max Peaks: 100
Stop Thrs : 0 Peak Location: TOP

If leading or trailing edge < 100 prefer < Baseline drop else tangent >
Peak separation: 5

Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Title : SW846 8260

Signal : TIC: VY023544.D\data.ms

peak #	R.T. min	first scan	max scan	last scan	PK TY	peak height	corr. area	corr. % max.	% of total
1	6.890	836	848	860	rBV	52729	169844	4.22%	0.796%
2	7.640	958	971	976	rBV	613566	1444748	35.92%	6.772%
3	7.713	976	983	1000	rVB	1030611	2407906	59.87%	11.287%
4	8.061	1027	1040	1054	rBV2	508015	1257916	31.28%	5.897%
5	8.616	1122	1131	1151	rBV	1561233	3049586	75.83%	14.295%
6	10.109	1368	1376	1390	rBV	2337515	4021836	100.00%	18.853%
7	10.512	1434	1442	1459	rVB	188628	345760	8.60%	1.621%
8	10.877	1496	1502	1513	rBV	104551	178963	4.45%	0.839%
9	11.420	1582	1591	1603	rBV	2023505	3338390	83.01%	15.649%
10	12.408	1746	1753	1766	rBV	1567478	2435469	60.56%	11.416%
11	13.346	1901	1907	1921	rVB	1791615	2682609	66.70%	12.575%

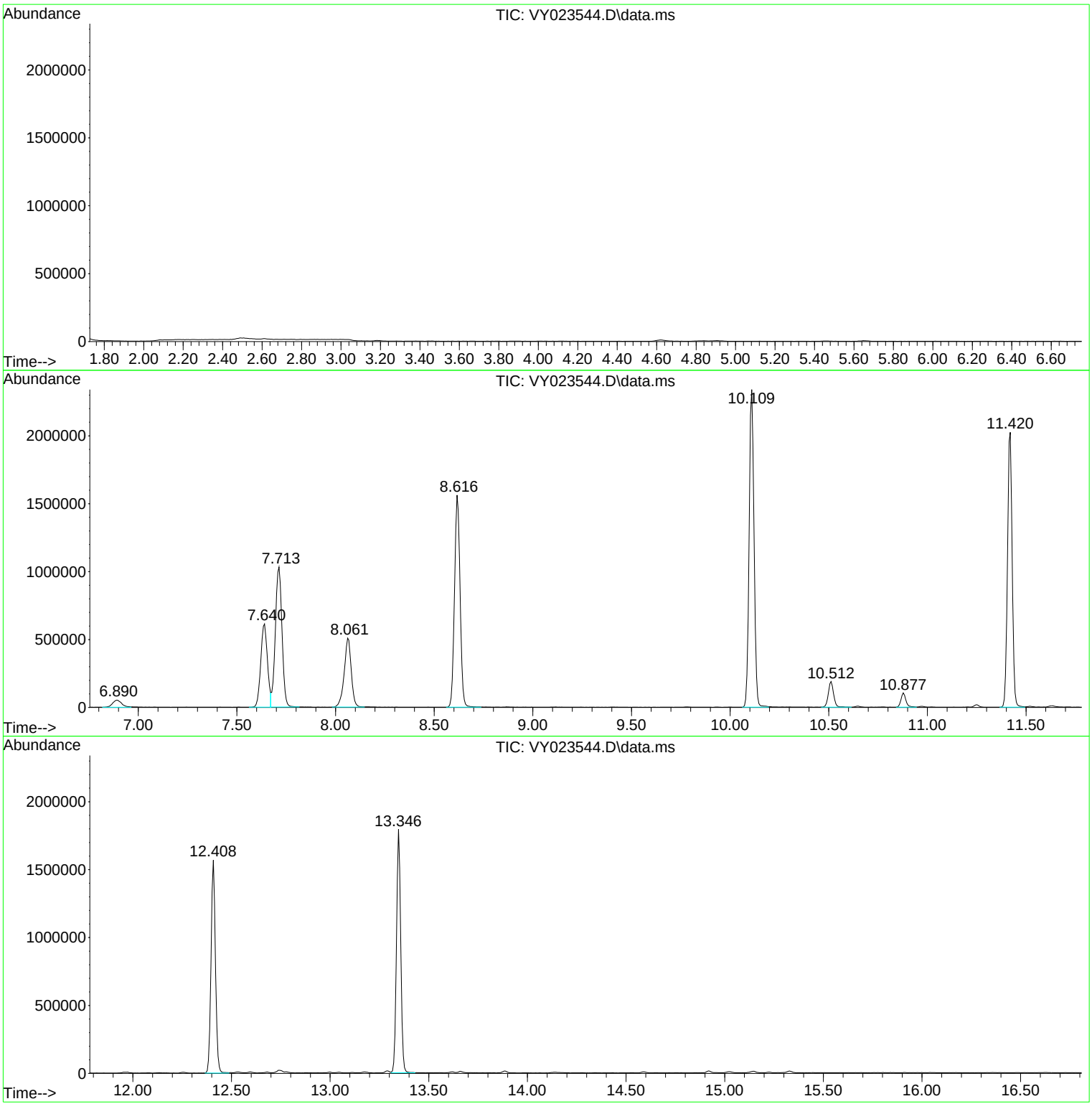
Sum of corrected areas: 21333027

Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY102225\
Data File : VY023544.D
Acq On : 22 Oct 2025 10:00
Operator : SY/MD
Sample : VY1022SBL01
Misc : 5.00g/5.0mL/MSVOA_Y/SOIL
ALS Vial : 4 Sample Multiplier: 1

Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBL01

Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260

TIC Library : C:\Database\NIST20.L
TIC Integration Parameters: LSCINT.P



Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY102225\
Data File : VY023544.D
Acq On : 22 Oct 2025 10:00
Operator : SY/MD
Sample : VY1022SBL01
Misc : 5.00g/5.0mL/MSVOA_Y/SOIL
ALS Vial : 4 Sample Multiplier: 1

Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBL01

Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260

TIC Library : C:\Database\NIST20.L
TIC Integration Parameters: LSCINT.P

No Library Search Compounds Detected
****

Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY102225\
Data File : VY023544.D
Acq On : 22 Oct 2025 10:00
Operator : SY/MD
Sample : VY1022SBL01
Misc : 5.00g/5.0mL/MSVOA_Y/SOIL
ALS Vial : 4 Sample Multiplier: 1

Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBL01

Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260

TIC Library : C:\Database\NIST20.L
TIC Integration Parameters: LSCINT.P

					--Internal Standard---			
TIC Top Hit name	RT	EstConc	Units	Response	#	RT	Resp	Conc

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

Report of Analysis

Client:	AECOM	Date Collected:	
Project:	AE1-CTY 3.2.Z-PR-DOCK-Des-ODC - 60693795-1719206	Date Received:	
Client Sample ID:	VY1022SBS01	SDG No.:	Q3424
Lab Sample ID:	VY1022SBS01	Matrix:	SOIL
Analytical Method:	8260D	Level : LOW	% Solid: 100
Sample Wt/Vol:	5 g	Final Vol: 5000 uL	Test: VOC-TCLVOA-10

CAS Number	Parameter	Conc.	Qua.	DF	MDL	LOQ / CRQL	Units	Date Ana.	BatchID
TARGETS									
75-71-8	Dichlorodifluoromethane	20.0		1	1.10	5.00	ug/Kg	10/22/25 10:28	VY102225
74-87-3	Chloromethane	18.0		1	1.10	5.00	ug/Kg	10/22/25 10:28	VY102225
75-01-4	Vinyl Chloride	18.7		1	0.79	5.00	ug/Kg	10/22/25 10:28	VY102225
74-83-9	Bromomethane	20.0		1	1.10	5.00	ug/Kg	10/22/25 10:28	VY102225
75-00-3	Chloroethane	19.8		1	1.30	5.00	ug/Kg	10/22/25 10:28	VY102225
75-69-4	Trichlorofluoromethane	20.2		1	1.20	5.00	ug/Kg	10/22/25 10:28	VY102225
76-13-1	1,1,2-Trichlorotrifluoroethane	21.3		1	1.10	5.00	ug/Kg	10/22/25 10:28	VY102225
75-35-4	1,1-Dichloroethene	20.7		1	1.00	5.00	ug/Kg	10/22/25 10:28	VY102225
67-64-1	Acetone	130		1	4.70	25.0	ug/Kg	10/22/25 10:28	VY102225
75-15-0	Carbon Disulfide	19.3		1	1.10	5.00	ug/Kg	10/22/25 10:28	VY102225
1634-04-4	Methyl tert-butyl Ether	19.8		1	0.73	5.00	ug/Kg	10/22/25 10:28	VY102225
79-20-9	Methyl Acetate	17.3		1	1.50	5.00	ug/Kg	10/22/25 10:28	VY102225
75-09-2	Methylene Chloride	18.4		1	3.50	10.0	ug/Kg	10/22/25 10:28	VY102225
156-60-5	trans-1,2-Dichloroethene	20.4		1	0.86	5.00	ug/Kg	10/22/25 10:28	VY102225
75-34-3	1,1-Dichloroethane	20.5		1	0.80	5.00	ug/Kg	10/22/25 10:28	VY102225
110-82-7	Cyclohexane	19.3		1	0.79	5.00	ug/Kg	10/22/25 10:28	VY102225
78-93-3	2-Butanone	110		1	6.50	25.0	ug/Kg	10/22/25 10:28	VY102225
56-23-5	Carbon Tetrachloride	21.4		1	0.97	5.00	ug/Kg	10/22/25 10:28	VY102225
156-59-2	cis-1,2-Dichloroethene	21.2		1	0.75	5.00	ug/Kg	10/22/25 10:28	VY102225
74-97-5	Bromochloromethane	19.3		1	1.20	5.00	ug/Kg	10/22/25 10:28	VY102225
67-66-3	Chloroform	21.2		1	0.84	5.00	ug/Kg	10/22/25 10:28	VY102225
71-55-6	1,1,1-Trichloroethane	21.3		1	0.93	5.00	ug/Kg	10/22/25 10:28	VY102225
108-87-2	Methylcyclohexane	20.7		1	0.91	5.00	ug/Kg	10/22/25 10:28	VY102225
71-43-2	Benzene	21.2		1	0.79	5.00	ug/Kg	10/22/25 10:28	VY102225
107-06-2	1,2-Dichloroethane	19.8		1	0.79	5.00	ug/Kg	10/22/25 10:28	VY102225
79-01-6	Trichloroethene	21.9		1	0.81	5.00	ug/Kg	10/22/25 10:28	VY102225
78-87-5	1,2-Dichloropropane	21.0		1	0.91	5.00	ug/Kg	10/22/25 10:28	VY102225
75-27-4	Bromodichloromethane	21.2		1	0.78	5.00	ug/Kg	10/22/25 10:28	VY102225
108-10-1	4-Methyl-2-Pentanone	96.0		1	3.60	25.0	ug/Kg	10/22/25 10:28	VY102225
108-88-3	Toluene	22.0		1	0.78	5.00	ug/Kg	10/22/25 10:28	VY102225
10061-02-6	t-1,3-Dichloropropene	21.0		1	0.65	5.00	ug/Kg	10/22/25 10:28	VY102225
10061-01-5	cis-1,3-Dichloropropene	20.9		1	0.62	5.00	ug/Kg	10/22/25 10:28	VY102225
79-00-5	1,1,2-Trichloroethane	21.6		1	0.92	5.00	ug/Kg	10/22/25 10:28	VY102225
591-78-6	2-Hexanone	110		1	3.70	25.0	ug/Kg	10/22/25 10:28	VY102225
124-48-1	Dibromochloromethane	21.4		1	0.87	5.00	ug/Kg	10/22/25 10:28	VY102225
106-93-4	1,2-Dibromoethane	21.2		1	0.88	5.00	ug/Kg	10/22/25 10:28	VY102225
127-18-4	Tetrachloroethene	22.9		1	1.10	5.00	ug/Kg	10/22/25 10:28	VY102225
108-90-7	Chlorobenzene	21.4		1	0.91	5.00	ug/Kg	10/22/25 10:28	VY102225
100-41-4	Ethyl Benzene	21.2		1	0.67	5.00	ug/Kg	10/22/25 10:28	VY102225
179601-23-1	m/p-Xylenes	43.3		1	1.20	10.0	ug/Kg	10/22/25 10:28	VY102225
95-47-6	o-Xylene	21.6		1	0.82	5.00	ug/Kg	10/22/25 10:28	VY102225
100-42-5	Styrene	21.3		1	0.71	5.00	ug/Kg	10/22/25 10:28	VY102225
75-25-2	Bromoform	20.5		1	0.86	5.00	ug/Kg	10/22/25 10:28	VY102225

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

Report of Analysis

Client:	AECOM	Date Collected:	
Project:	AE1-CTY 3.2.Z-PR-DOCK-Des-ODC - 60693795-1719206	Date Received:	
Client Sample ID:	VY1022SBS01	SDG No.:	Q3424
Lab Sample ID:	VY1022SBS01	Matrix:	SOIL
Analytical Method:	8260D	Level : LOW	% Solid: 100
Sample Wt/Vol:	5 g	Final Vol: 5000 uL	Test: VOC-TCLVOA-10

CAS Number	Parameter	Conc.	Qua.	DF	MDL	LOQ / CRQL	Units	Date Ana.	BatchID
98-82-8	Isopropylbenzene	21.7		1	0.78	5.00	ug/Kg	10/22/25 10:28	VY102225
79-34-5	1,1,2,2-Tetrachloroethane	19.2		1	1.20	5.00	ug/Kg	10/22/25 10:28	VY102225
541-73-1	1,3-Dichlorobenzene	21.3		1	1.70	5.00	ug/Kg	10/22/25 10:28	VY102225
106-46-7	1,4-Dichlorobenzene	21.1		1	1.60	5.00	ug/Kg	10/22/25 10:28	VY102225
95-50-1	1,2-Dichlorobenzene	21.3		1	1.50	5.00	ug/Kg	10/22/25 10:28	VY102225
96-12-8	1,2-Dibromo-3-Chloropropane	18.8		1	1.80	5.00	ug/Kg	10/22/25 10:28	VY102225
120-82-1	1,2,4-Trichlorobenzene	20.4		1	3.00	5.00	ug/Kg	10/22/25 10:28	VY102225
87-61-6	1,2,3-Trichlorobenzene	19.8		1	3.20	5.00	ug/Kg	10/22/25 10:28	VY102225
SURROGATES									
17060-07-0	1,2-Dichloroethane-d4	45.7			63 - 155	91%	SPK: 50		
1868-53-7	Dibromofluoromethane	49.3			70 - 134	99%	SPK: 50		
2037-26-5	Toluene-d8	49.8			74 - 123	100%	SPK: 50		
460-00-4	4-Bromofluorobenzene	49.3			17 - 146	99%	SPK: 50		
INTERNAL STANDARDS		**Area Count**							
363-72-4	Pentafluorobenzene	547000							
540-36-3	1,4-Difluorobenzene	794000							
3114-55-4	Chlorobenzene-d5	700000							
3855-82-1	1,4-Dichlorobenzene-d4	365000							

U = Not Detected
LOQ = Limit of Quantitation
MDL = Method Detection Limit
LOD = Limit of Detection
E = Value Exceeds Calibration Range
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
() = Laboratory InHouse Limit
A = Aldol-Condensation Reaction Products

Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY102225\
Data File : VY023545.D
Acq On : 22 Oct 2025 10:28
Operator : SY/MD
Sample : VY1022SBS01
Misc : 5.00g/5.0mL/MSVOA_Y/SOIL
ALS Vial : 5 Sample Multiplier: 1

Quant Time: Oct 24 02:26:30 2025
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260
QLast Update : Wed Oct 08 05:12:50 2025
Response via : Initial Calibration

Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBS01

Manual Integrations APPROVED
Reviewed By :Amit Patel 10/24/2025
Supervised By :Mahesh Dadoda 10/24/2025

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Pentafluorobenzene	7.713	168	546555	50.000	ug/l	0.00
34) 1,4-Difluorobenzene	8.616	114	794303	50.000	ug/l	0.00
63) Chlorobenzene-d5	11.414	117	700136	50.000	ug/l	0.00
72) 1,4-Dichlorobenzene-d4	13.346	152	365280	50.000	ug/l	0.00
System Monitoring Compounds						
33) 1,2-Dichloroethane-d4	8.061	65	208863	45.699	ug/l	0.00
Spiked Amount 50.000	Range 50 - 163		Recovery =	91.400%		
35) Dibromofluoromethane	7.634	113	240525	49.282	ug/l	0.00
Spiked Amount 50.000	Range 54 - 147		Recovery =	98.560%		
50) Toluene-d8	10.109	98	904633	49.771	ug/l	0.00
Spiked Amount 50.000	Range 58 - 134		Recovery =	99.540%		
62) 4-Bromofluorobenzene	12.408	95	295724	49.281	ug/l	0.00
Spiked Amount 50.000	Range 30 - 143		Recovery =	98.560%		
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.867	85	78862	20.046	ug/l	99
3) Chloromethane	2.074	50	96728	18.049	ug/l	97
4) Vinyl Chloride	2.208	62	130661	18.718	ug/l	99
5) Bromomethane	2.592	94	117294	20.024	ug/l	99
6) Chloroethane	2.739	64	94090	19.775	ug/l	99
7) Trichlorofluoromethane	3.056	101	195620	20.184	ug/l	99
8) Diethyl Ether	3.458	74	51088	20.172	ug/l	95
9) 1,1,2-Trichlorotrifluo...	3.824	101	107027	21.280	ug/l	98
10) Methyl Iodide	4.007	142	117165	20.926	ug/l	97
11) Tert butyl alcohol	4.860	59	28049	82.495	ug/l	98
12) 1,1-Dichloroethene	3.793	96	100716	20.658	ug/l	96
13) Acrolein	3.653	56	23166	48.218	ug/l	91
14) Allyl chloride	4.391	41	110064	18.524	ug/l	96
15) Acrylonitrile	5.061	53	90176	93.042	ug/l	99
16) Acetone	3.873	43	137184	126.081	ug/l	98
17) Carbon Disulfide	4.110	76	268938	19.273	ug/l	98
18) Methyl Acetate	4.391	43	49297	17.272	ug/l	98
19) Methyl tert-butyl Ether	5.122	73	231882	19.789	ug/l	97
20) Methylene Chloride	4.622	84	108140	18.380	ug/l	98
21) trans-1,2-Dichloroethene	5.116	96	109389	20.379	ug/l	97
22) Diisopropyl ether	6.019	45	262379	19.963	ug/l	96
23) Vinyl Acetate	5.964	43	681501	95.797	ug/l	96
24) 1,1-Dichloroethane	5.915	63	178683	20.524	ug/l	100
25) 2-Butanone	6.896	43	142981	107.638	ug/l	95
26) 2,2-Dichloropropane	6.884	77	167931	21.021	ug/l	99
27) cis-1,2-Dichloroethene	6.890	96	131514	21.211	ug/l	94
28) Bromochloromethane	7.250	49	62608	19.264	ug/l	94
29) Tetrahydrofuran	7.262	42	65038	86.341	ug/l	93
30) Chloroform	7.421	83	202767	21.198	ug/l	98
31) Cyclohexane	7.707	56	146973	19.331	ug/l	89
32) 1,1,1-Trichloroethane	7.622	97	185487	21.339	ug/l	98
36) 1,1-Dichloropropene	7.835	75	134867	20.873	ug/l	98
37) Ethyl Acetate	6.988	43	47665	18.620	ug/l #	96
38) Carbon Tetrachloride	7.823	117	167506	21.380	ug/l	99
39) Methylcyclohexane	9.109	83	174367	20.726	ug/l	98
40) Benzene	8.085	78	432933	21.157	ug/l	98

Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY102225\
Data File : VY023545.D
Acq On : 22 Oct 2025 10:28
Operator : SY/MD
Sample : VY1022SBS01
Misc : 5.00g/5.0mL/MSVOA_Y/SOIL
ALS Vial : 5 Sample Multiplier: 1

Quant Time: Oct 24 02:26:30 2025
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260
QLast Update : Wed Oct 08 05:12:50 2025
Response via : Initial Calibration

Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBS01

Manual Integrations APPROVED

Reviewed By :Amit Patel 10/24/2025
Supervised By :Mahesh Dadoda 10/24/2025

Compound	R.T.	QIon	Response	Conc	Units		Dev(Min)
41) Methacrylonitrile	7.226	41	23647	17.080	ug/l	#	67
42) 1,2-Dichloroethane	8.158	62	104422	19.787	ug/l		99
43) Isopropyl Acetate	8.201	43	93851	18.386	ug/l		96
44) Trichloroethene	8.866	130	131401	21.940	ug/l		99
45) 1,2-Dichloropropane	9.146	63	94941	21.006	ug/l		99
46) Dibromomethane	9.231	93	59570	20.843	ug/l		98
47) Bromodichloromethane	9.426	83	152859	21.237	ug/l		99
48) Methyl methacrylate	9.225	41	43753	18.246	ug/l		92
49) 1,4-Dioxane	9.225	88	12196	368.059	ug/l		96
51) 4-Methyl-2-Pentanone	9.999	43	253262	96.032	ug/l		99
52) Toluene	10.170	92	292104	21.986	ug/l		98
53) t-1,3-Dichloropropene	10.396	75	131626	21.031	ug/l		100
54) cis-1,3-Dichloropropene	9.859	75	154563	20.924	ug/l		97
55) 1,1,2-Trichloroethane	10.573	97	82907	21.572	ug/l		97
56) Ethyl methacrylate	10.438	69	87648	19.771	ug/l		93
57) 1,3-Dichloropropane	10.719	76	126727	20.809	ug/l		99
58) 2-Chloroethyl Vinyl ether	9.713	63	191490	96.421	ug/l		98
59) 2-Hexanone	10.762	43	201768	107.056	ug/l		97
60) Dibromochloromethane	10.908	129	115294	21.397	ug/l		99
61) 1,2-Dibromoethane	11.018	107	77772	21.218	ug/l		99
64) Tetrachloroethene	10.646	164	165184	22.850	ug/l		99
65) Chlorobenzene	11.444	112	325435	21.371	ug/l		100
66) 1,1,1,2-Tetrachloroethane	11.518	131	116407	21.452	ug/l		100
67) Ethyl Benzene	11.518	91	522038	21.179	ug/l		99
68) m/p-Xylenes	11.627	106	428308	43.322	ug/l		99
69) o-Xylene	11.956	106	200731	21.646	ug/l		97
70) Styrene	11.969	104	325186	21.324	ug/l		100
71) Bromoform	12.133	173	69048	20.514	ug/l	#	99
73) Isopropylbenzene	12.255	105	521665	21.671	ug/l		100
74) N-amyl acetate	12.072	43	76665	17.731	ug/l		95
75) 1,1,2,2-Tetrachloroethane	12.505	83	75537	19.185	ug/l		97
76) 1,2,3-Trichloropropane	12.554	75	60391m	18.739	ug/l		
77) Bromobenzene	12.530	156	136360	21.307	ug/l		97
78) n-propylbenzene	12.597	91	603121	21.651	ug/l		99
79) 2-Chlorotoluene	12.676	91	348031	21.335	ug/l		99
80) 1,3,5-Trimethylbenzene	12.737	105	426677	21.935	ug/l		99
81) trans-1,4-Dichloro-2-b...	12.304	75	26519	20.178	ug/l		97
82) 4-Chlorotoluene	12.773	91	358213	21.322	ug/l		100
83) tert-Butylbenzene	12.999	119	393129	21.889	ug/l		99
84) 1,2,4-Trimethylbenzene	13.042	105	420267	21.648	ug/l		99
85) sec-Butylbenzene	13.176	105	561763	21.804	ug/l		99
86) p-Isopropyltoluene	13.292	119	485141	22.116	ug/l		100
87) 1,3-Dichlorobenzene	13.285	146	265067	21.270	ug/l		99
88) 1,4-Dichlorobenzene	13.365	146	260280	21.147	ug/l		99
89) n-Butylbenzene	13.615	91	407439	21.317	ug/l		99
90) Hexachloroethane	13.877	117	100017	21.199	ug/l		99
91) 1,2-Dichlorobenzene	13.657	146	232327	21.264	ug/l		100
92) 1,2-Dibromo-3-Chloropr...	14.273	75	12117	18.756	ug/l		97
93) 1,2,4-Trichlorobenzene	14.919	180	138915	20.394	ug/l		100
94) Hexachlorobutadiene	15.023	225	88730	20.897	ug/l		97
95) Naphthalene	15.145	128	204152	18.822	ug/l		99
96) 1,2,3-Trichlorobenzene	15.328	180	116532	19.751	ug/l		100

Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY102225\
Data File : VY023545.D
Acq On : 22 Oct 2025 10:28
Operator : SY/MD
Sample : VY1022SBS01
Misc : 5.00g/5.0mL/MSVOA_Y/SOIL
ALS Vial : 5 Sample Multiplier: 1

Quant Time: Oct 24 02:26:30 2025
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260
QLast Update : Wed Oct 08 05:12:50 2025
Response via : Initial Calibration

Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBS01

Manual Integrations APPROVED

Reviewed By :Amit Patel 10/24/2025
Supervised By :Mahesh Dadoda 10/24/2025

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)

(#) = qualifier out of range (m) = manual integration (+) = signals summed

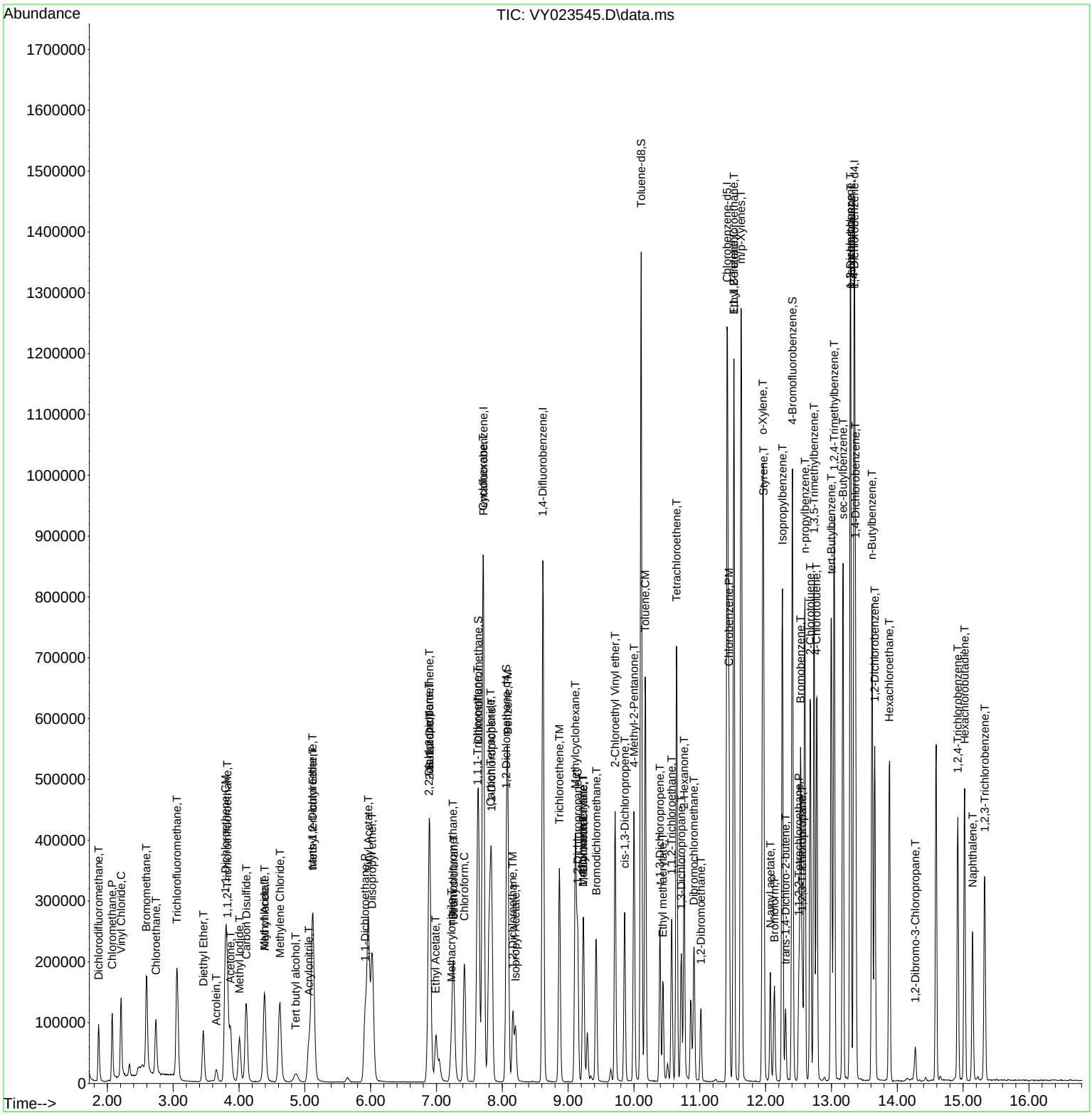
Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY102225\
Data File : VY023545.D
Acq On : 22 Oct 2025 10:28
Operator : SY/MD
Sample : VY1022SBS01
Misc : 5.00g/5.0mL/MSVOA_Y/SOIL
ALS Vial : 5 Sample Multiplier: 1

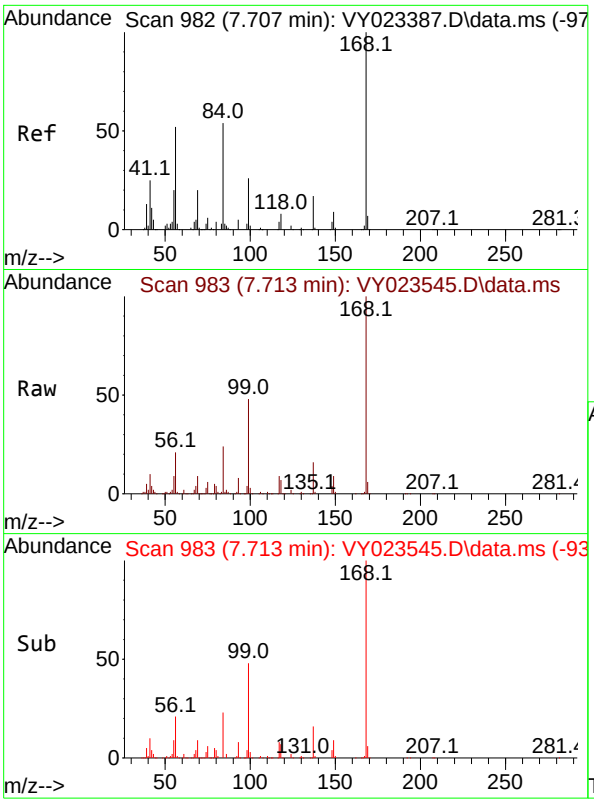
Quant Time: Oct 24 02:26:30 2025
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260
QLast Update : Wed Oct 08 05:12:50 2025
Response via : Initial Calibration

Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBS01

Manual Integrations APPROVED

Reviewed By :Amit Patel 10/24/2025
Supervised By :Mahesh Dadoda 10/24/2025

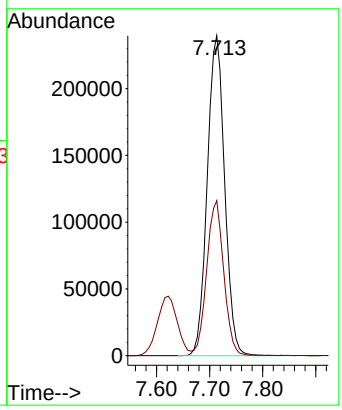




#1
Pentafluorobenzene
Concen: 50.000 ug/l
RT: 7.713 min Scan# 9
Delta R.T. 0.006 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion:168 Resp: 54655

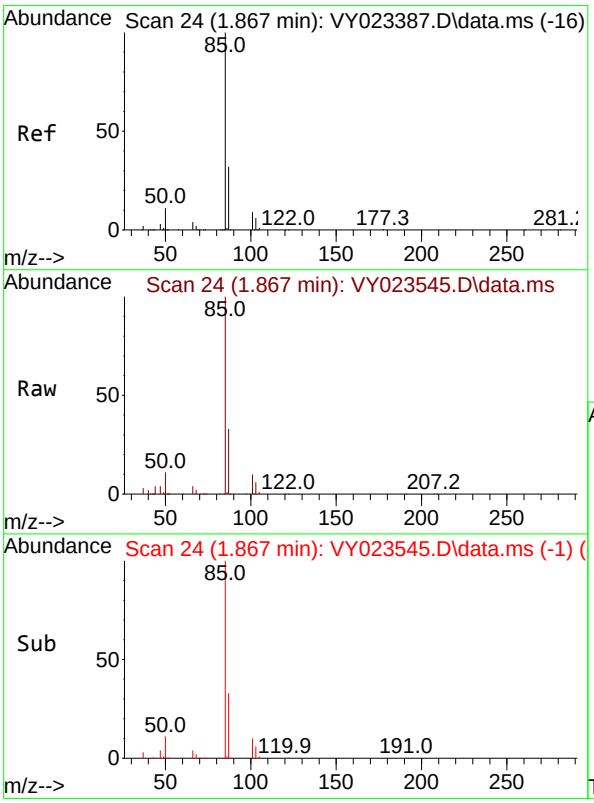
Ion	Ratio	Lower	Upper
168	100		
99	48.4	39.7	59.5



Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBS01

Manual Integrations
APPROVED

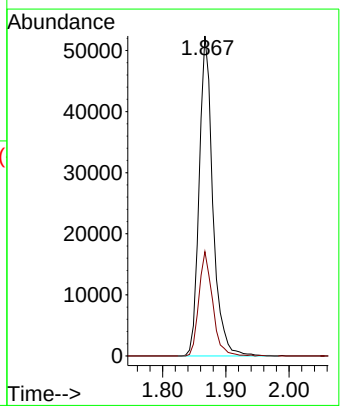
Reviewed By :Amit Patel 10/24/2025
Supervised By :Mahesh Dadoda 10/24/2025

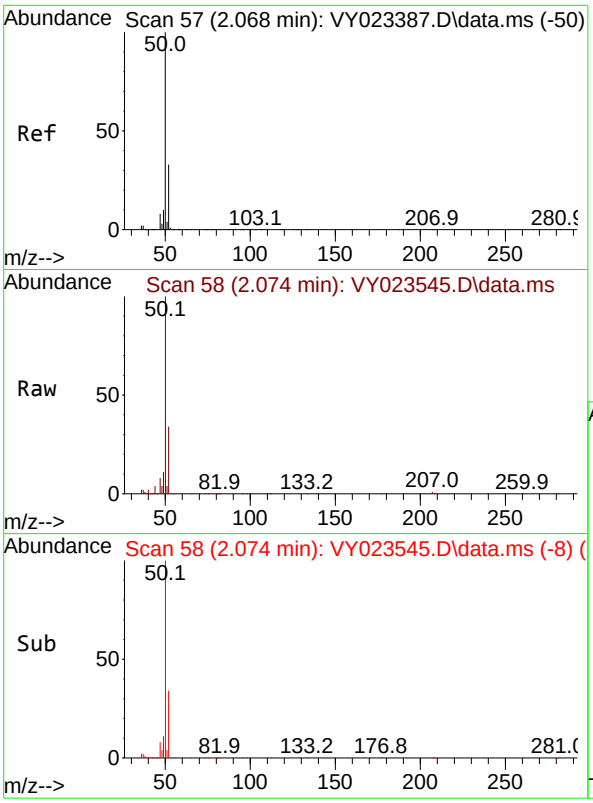


#2
Dichlorodifluoromethane
Concen: 20.046 ug/l
RT: 1.867 min Scan# 24
Delta R.T. -0.000 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion: 85 Resp: 78862

Ion	Ratio	Lower	Upper
85	100		
87	32.6	16.0	47.9

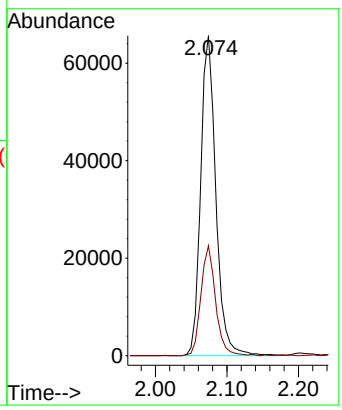




#3
Chloromethane
Concen: 18.049 ug/l
RT: 2.074 min Scan# 5
Delta R.T. 0.006 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion: 50 Resp: 9672

Ion	Ratio	Lower	Upper
50	100		
52	34.4	26.2	39.2



Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBS01

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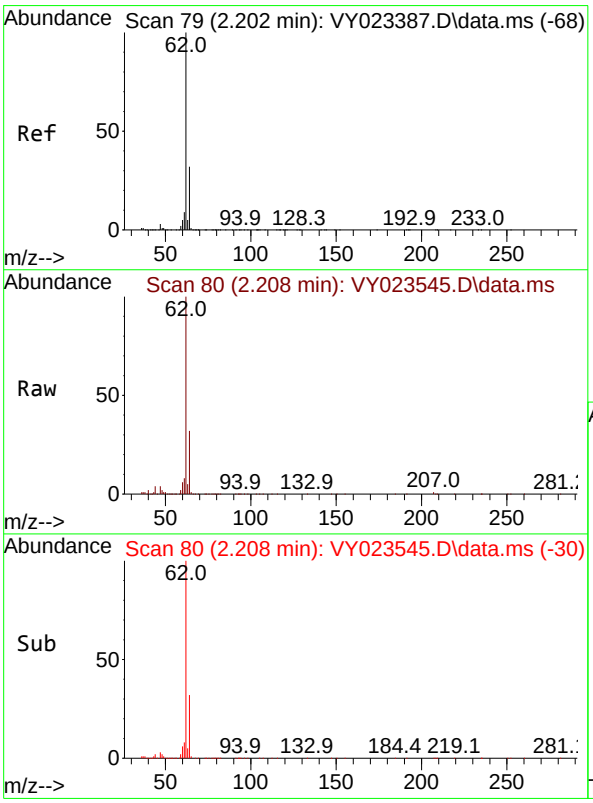
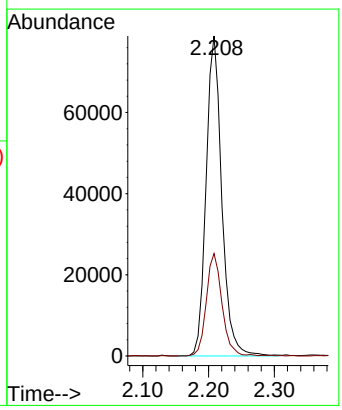
Reviewed By :Amit Patel 10/24/2025
Supervised By :Mahesh Dadoda 10/24/2025

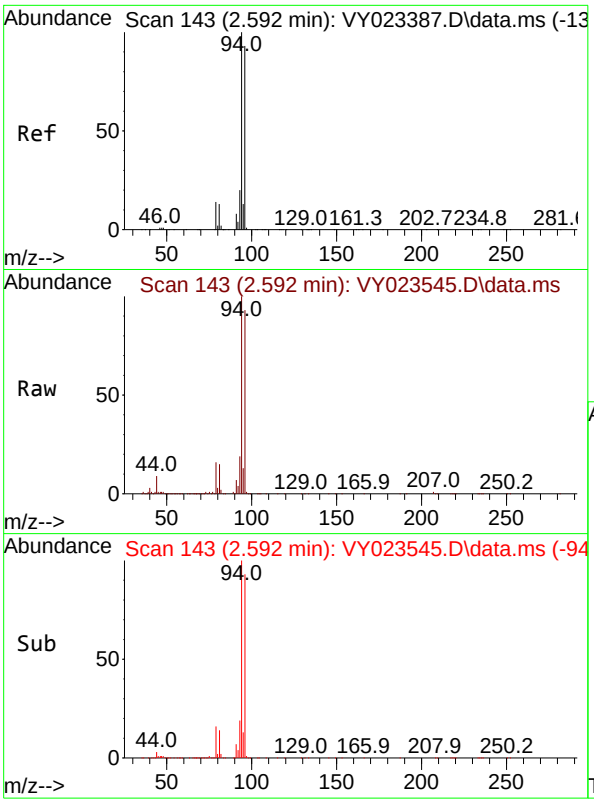


#4
Vinyl Chloride
Concen: 18.718 ug/l
RT: 2.208 min Scan# 80
Delta R.T. 0.006 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion: 62 Resp: 130661

Ion	Ratio	Lower	Upper
62	100		
64	32.0	25.8	38.8

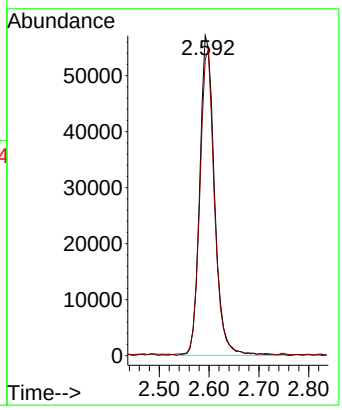




#5
Bromomethane
Concen: 20.024 ug/l
RT: 2.592 min Scan# 14
Delta R.T. -0.000 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion: 94 Resp: 11729

Ion	Ratio	Lower	Upper
94	100		
96	92.4	74.5	111.7



Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBS01

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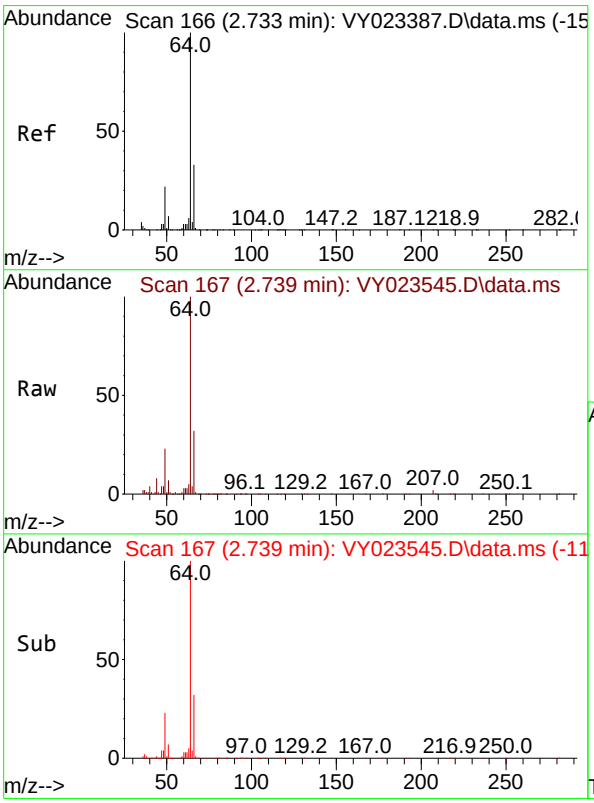
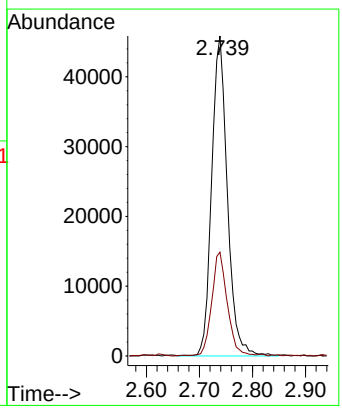
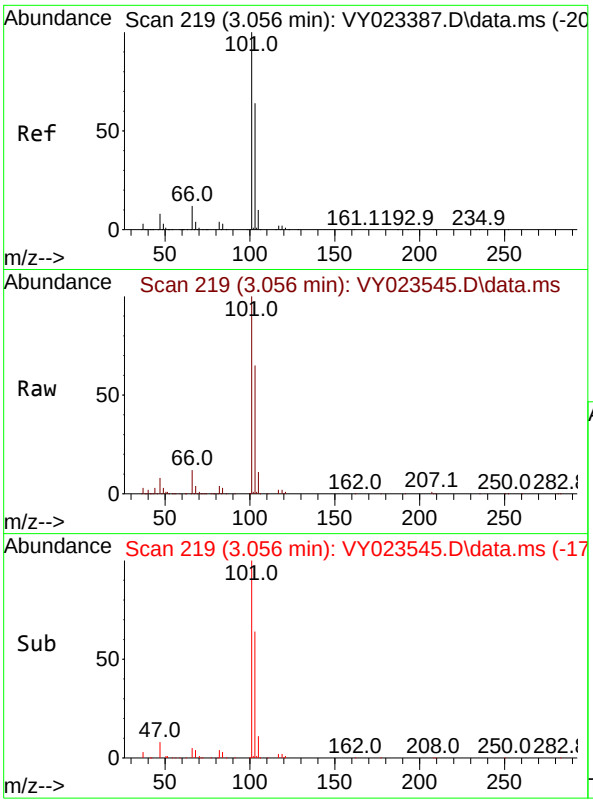


#6
Chloroethane
Concen: 19.775 ug/l
RT: 2.739 min Scan# 167
Delta R.T. 0.006 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion: 64 Resp: 94090

Ion	Ratio	Lower	Upper
64	100		
66	32.3	26.2	39.4





#7
Trichlorofluoromethane
Concen: 20.184 ug/l
RT: 3.056 min Scan# 21
Delta R.T. -0.000 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion:101 Resp: 19562

Ion	Ratio	Lower	Upper
101	100		
103	64.5	51.3	76.9

Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBS01

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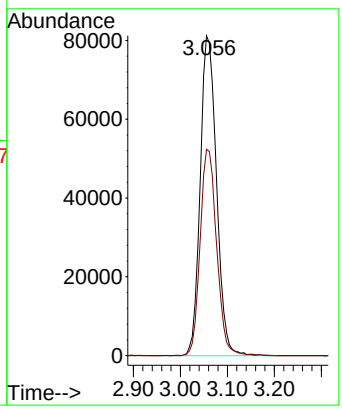
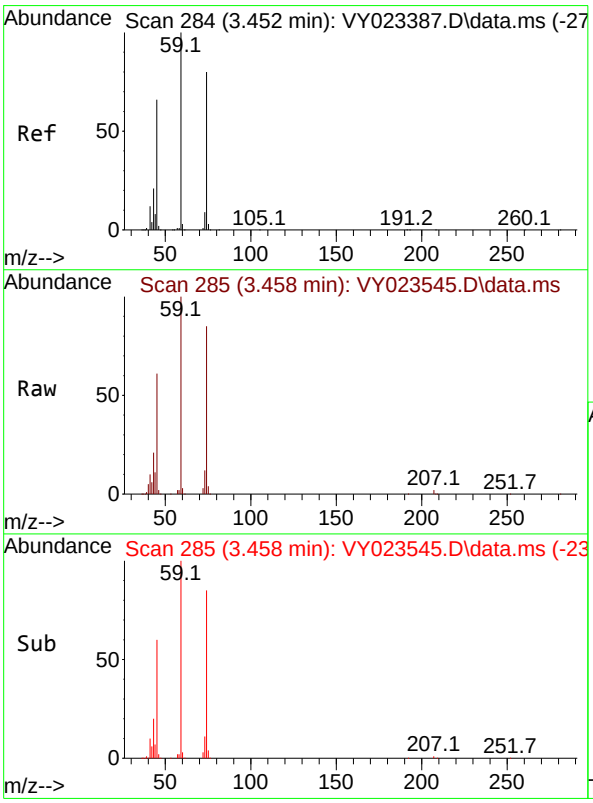
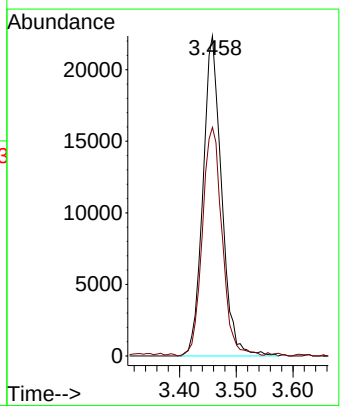


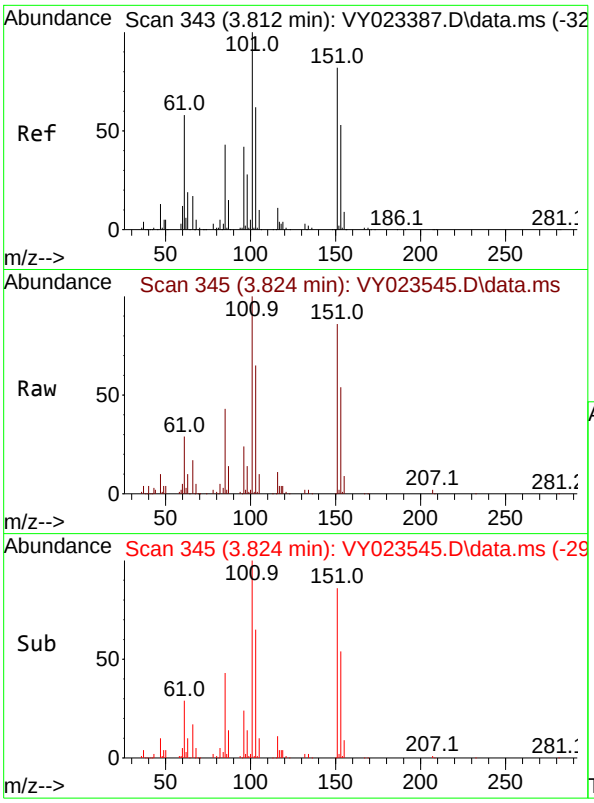


#8
Diethyl Ether
Concen: 20.172 ug/l
RT: 3.458 min Scan# 285
Delta R.T. 0.006 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion: 74 Resp: 51088

Ion	Ratio	Lower	Upper
74	100		
45	75.5	39.9	119.7





#9
1,1,2-Trichlorotrifluoroethane
Concen: 21.280 ug/l
RT: 3.824 min Scan# 34
Delta R.T. 0.012 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion:101 Resp: 10702

Ion	Ratio	Lower	Upper
101	100		
85	42.9	34.6	51.8
151	85.6	67.0	100.6

Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBS01

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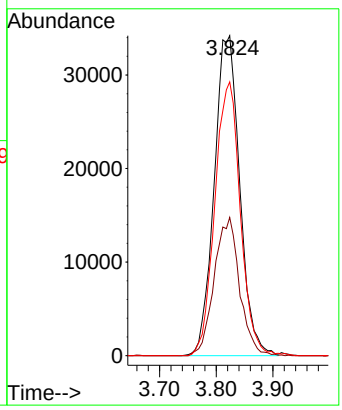
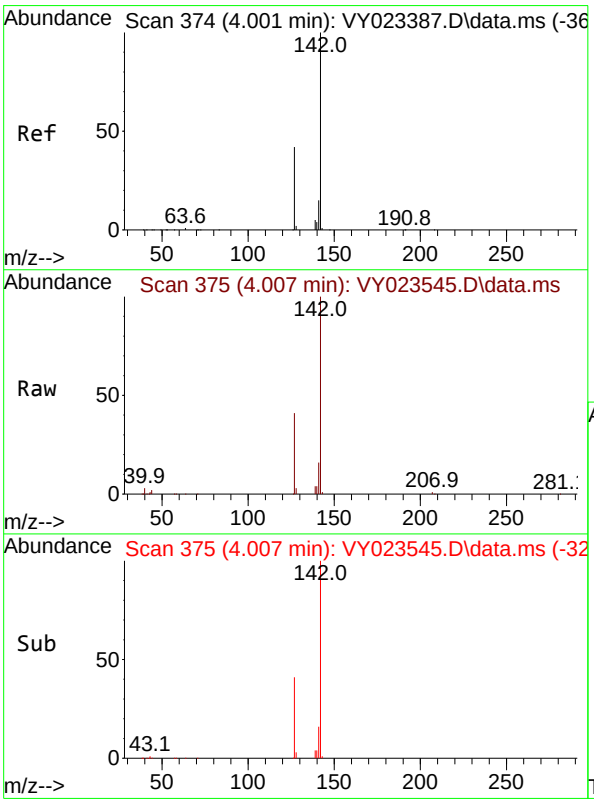
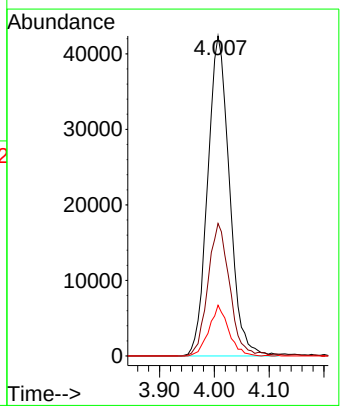


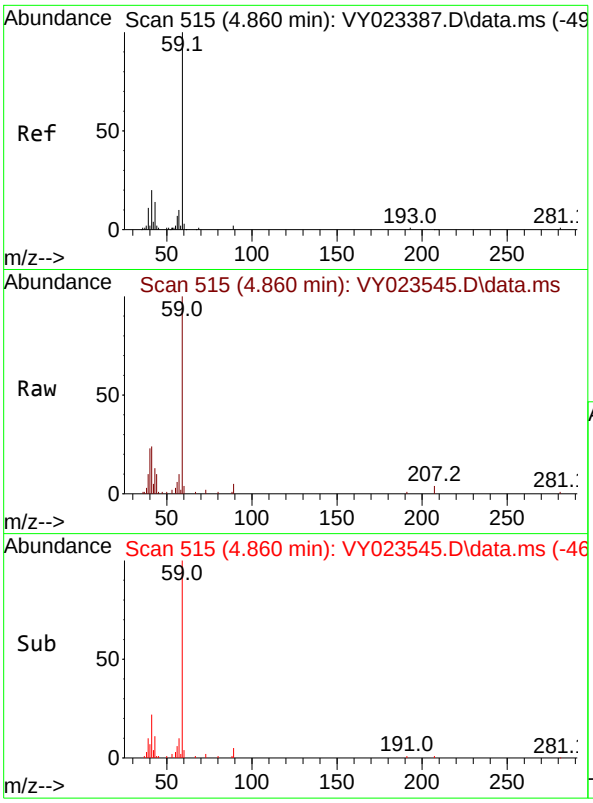


#10
Methyl Iodide
Concen: 20.926 ug/l
RT: 4.007 min Scan# 375
Delta R.T. 0.006 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion:142 Resp: 117165

Ion	Ratio	Lower	Upper
142	100		
127	41.3	34.8	52.2
141	14.2	11.6	17.4

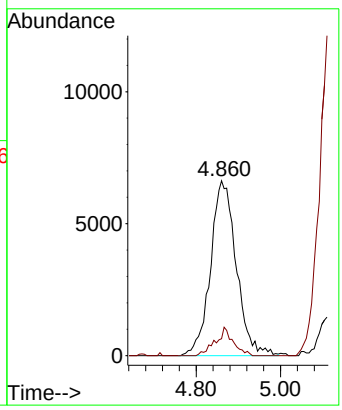




#11
Tert butyl alcohol
Concen: 82.495 ug/l
RT: 4.860 min Scan# 5
Delta R.T. -0.000 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion: 59 Resp: 2804

Ion	Ratio	Lower	Upper
59	100		
57	11.0	8.3	12.5



Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBS01

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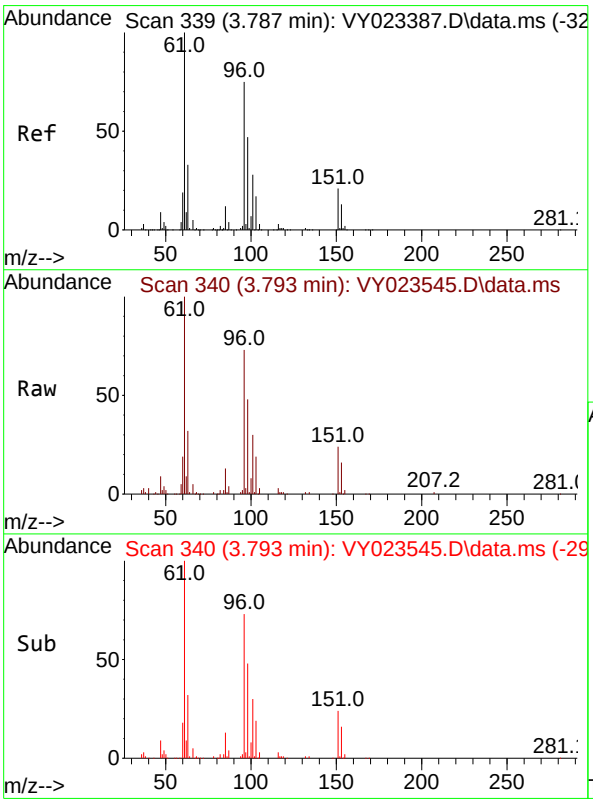
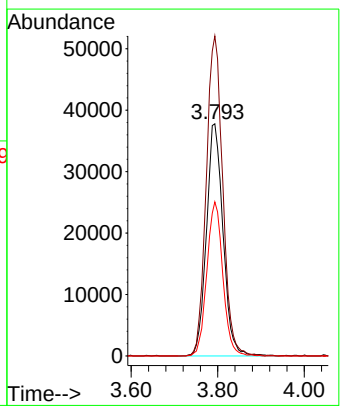
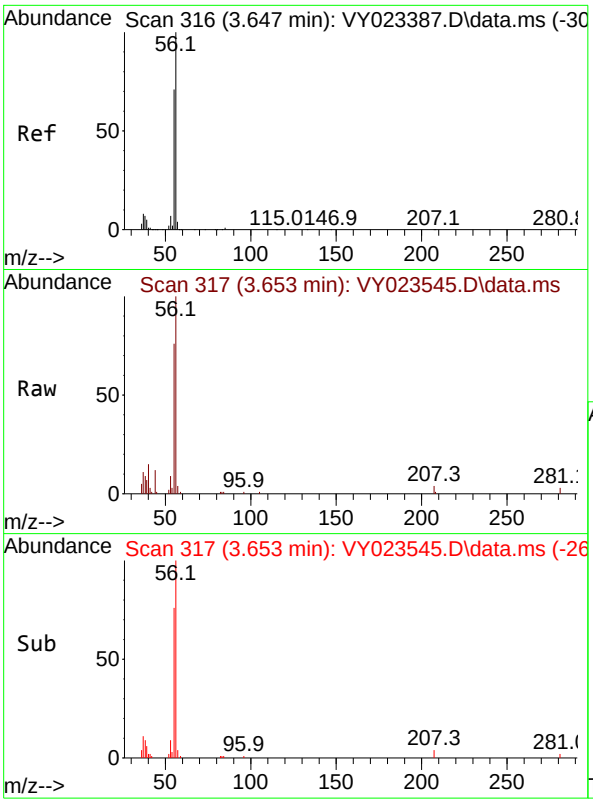


#12
1,1-Dichloroethene
Concen: 20.658 ug/l
RT: 3.793 min Scan# 340
Delta R.T. 0.006 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion: 96 Resp: 100716

Ion	Ratio	Lower	Upper
96	100		
61	137.8	106.7	160.1
98	66.4	50.2	75.4

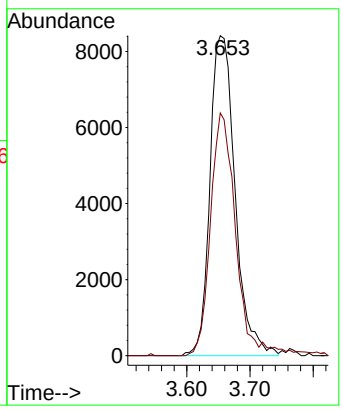




#13
Acrolein
Concen: 48.218 ug/l
RT: 3.653 min Scan# 3
Delta R.T. 0.006 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion: 56 Resp: 2316

Ion	Ratio	Lower	Upper
56	100		
55	77.1	56.1	84.1



Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBS01

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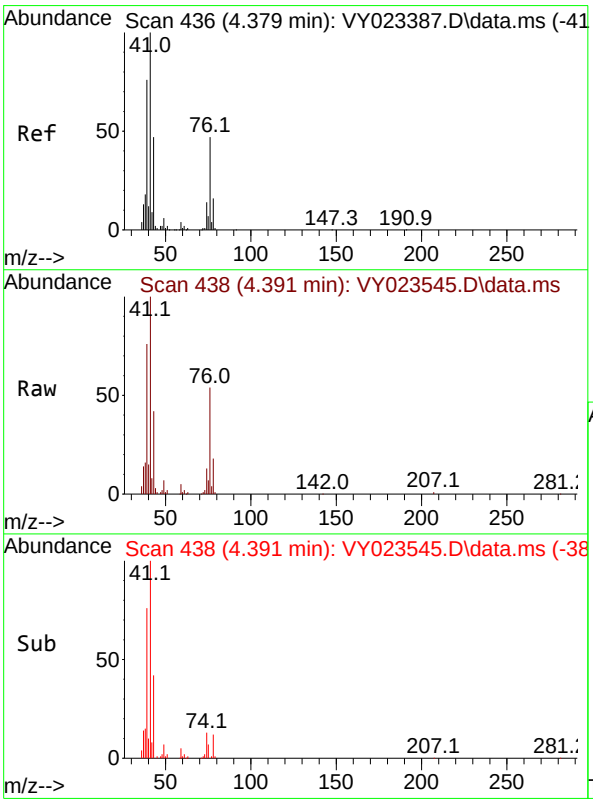
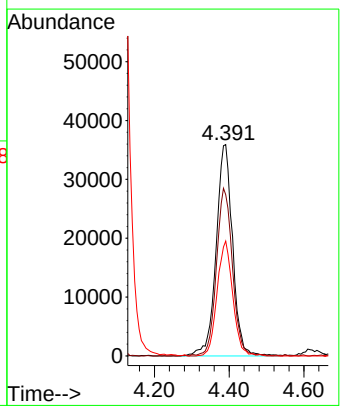
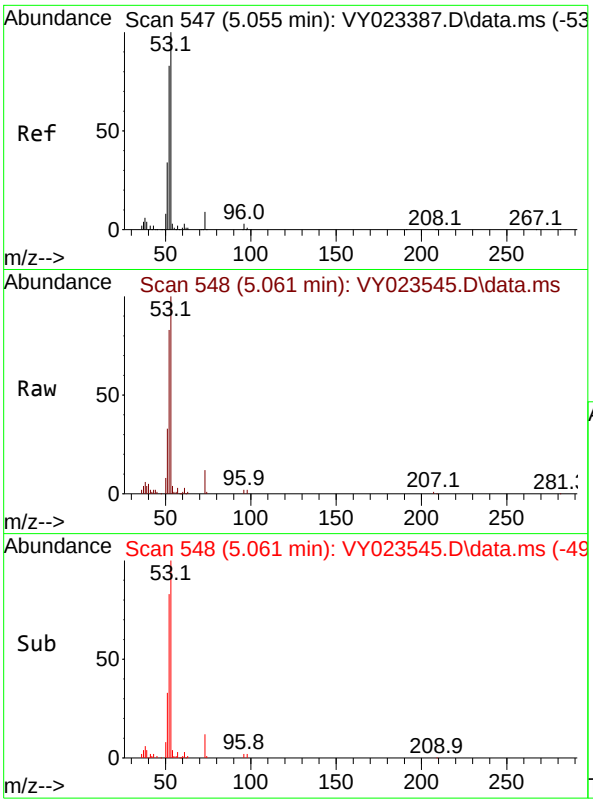


#14
Allyl chloride
Concen: 18.524 ug/l
RT: 4.391 min Scan# 438
Delta R.T. 0.012 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion: 41 Resp: 110064

Ion	Ratio	Lower	Upper
41	100		
39	77.2	59.9	89.9
76	51.6	38.0	57.0

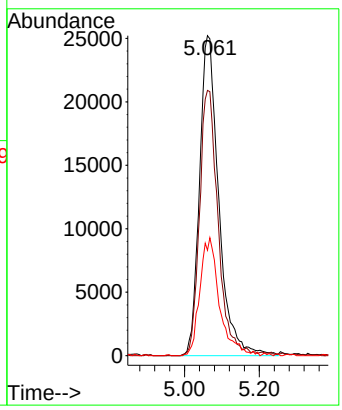




#15
Acrylonitrile
Concen: 93.042 ug/l
RT: 5.061 min Scan# 54
Delta R.T. 0.006 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion: 53 Resp: 9017

Ion	Ratio	Lower	Upper
53	100		
52	79.9	64.6	97.0
51	37.2	29.5	44.3



Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBS01

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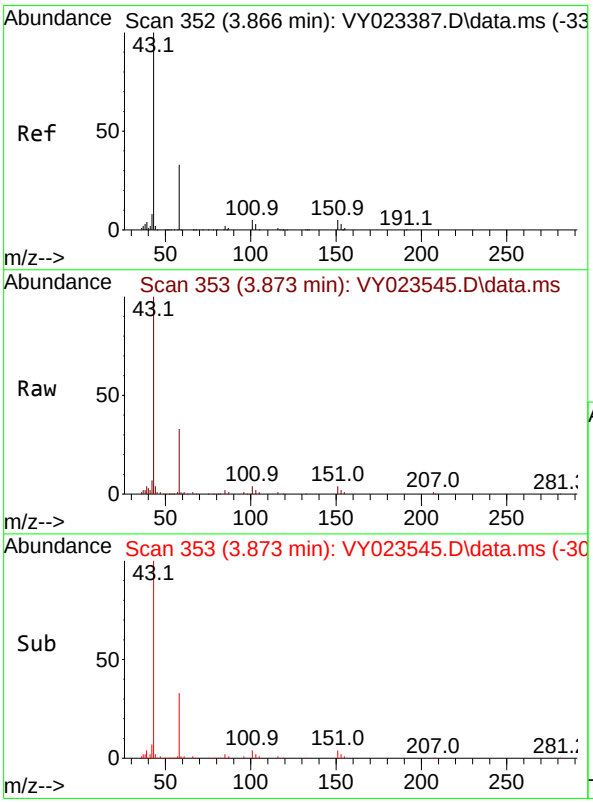
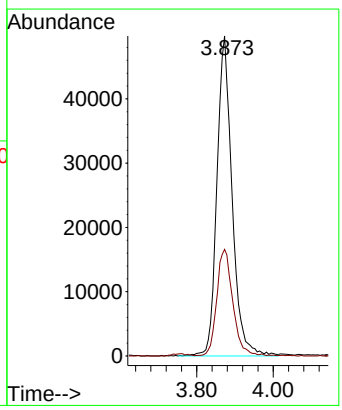
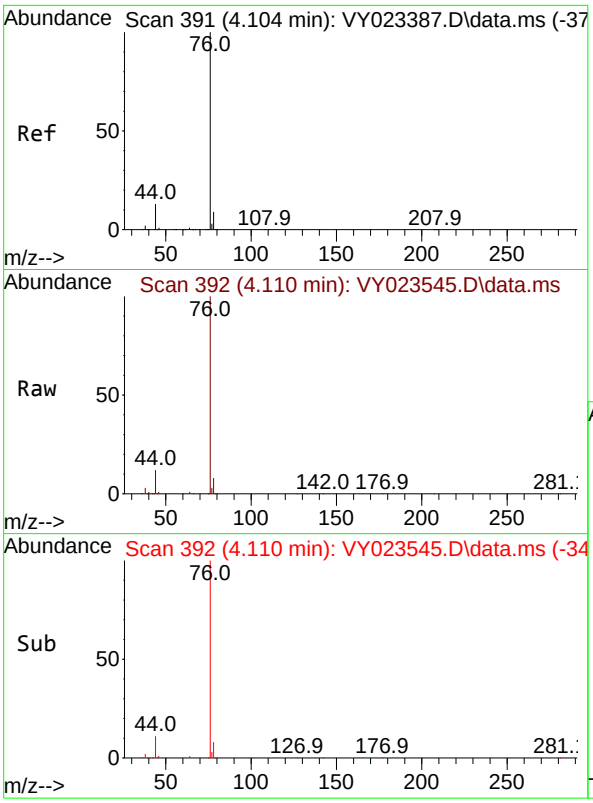


#16
Acetone
Concen: 126.081 ug/l
RT: 3.873 min Scan# 353
Delta R.T. 0.006 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion: 43 Resp: 137184

Ion	Ratio	Lower	Upper
43	100		
58	33.2	27.7	41.5

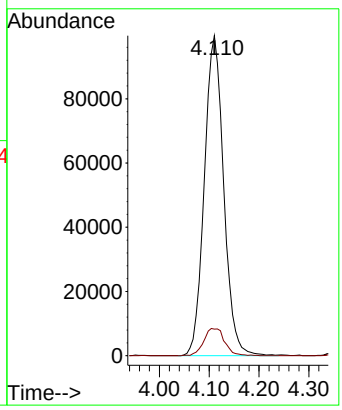




#17
Carbon Disulfide
Concen: 19.273 ug/l
RT: 4.110 min Scan# 3
Delta R.T. 0.006 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion: 76 Resp: 26893

Ion	Ratio	Lower	Upper
76	100		
78	8.3	7.3	10.9



Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBS01

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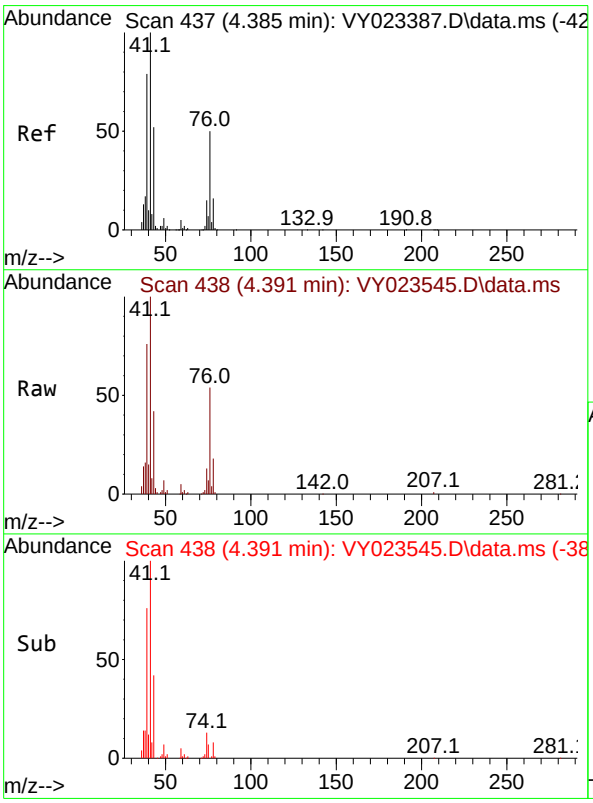
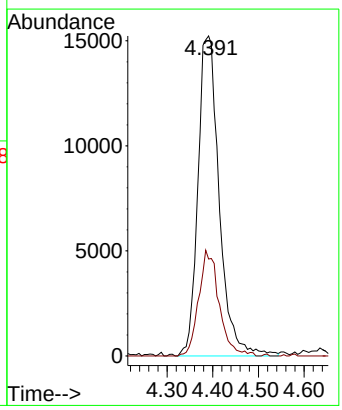
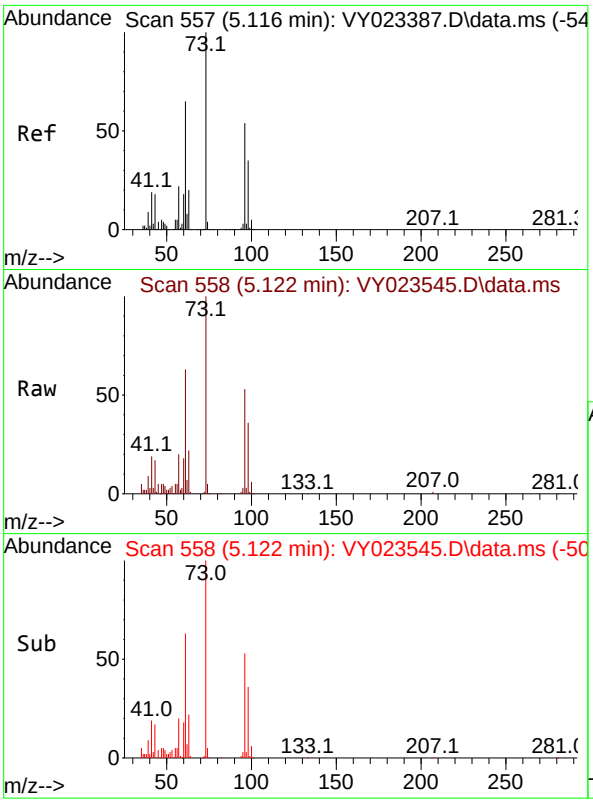


#18
Methyl Acetate
Concen: 17.272 ug/l
RT: 4.391 min Scan# 438
Delta R.T. 0.006 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion: 43 Resp: 49297

Ion	Ratio	Lower	Upper
43	100		
74	31.6	24.2	36.4

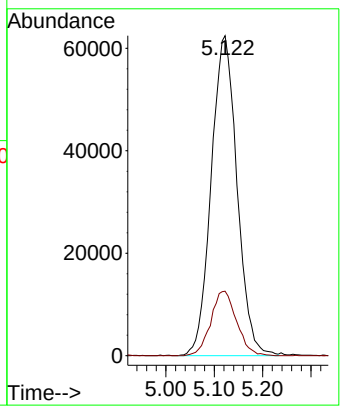




#19
Methyl tert-butyl Ether
Concen: 19.789 ug/l
RT: 5.122 min Scan# 5
Delta R.T. 0.006 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion: 73 Resp: 23188

Ion	Ratio	Lower	Upper
73	100		
57	20.2	17.4	26.0



Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBS01

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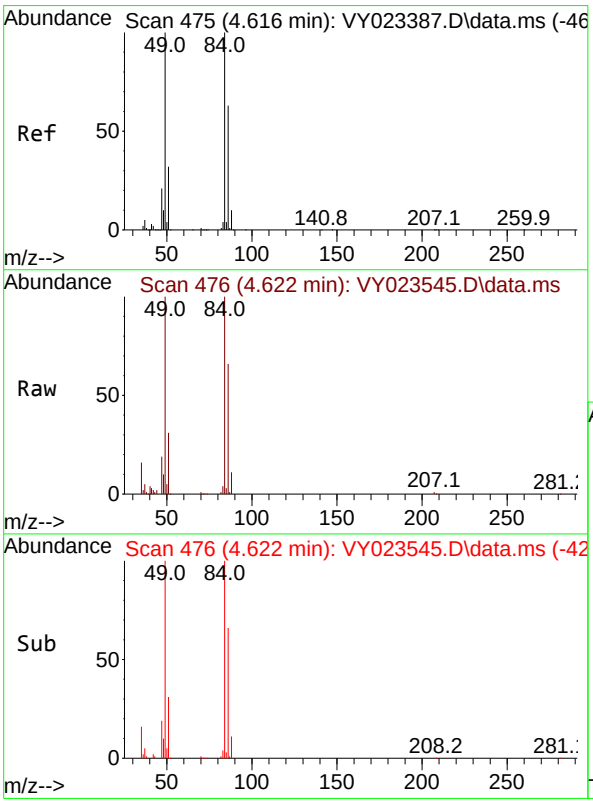
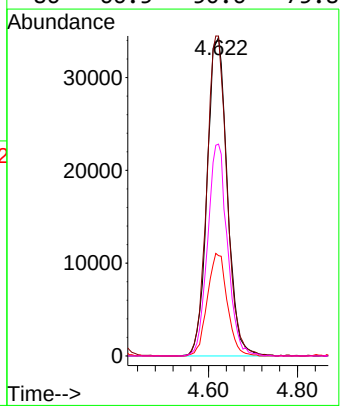
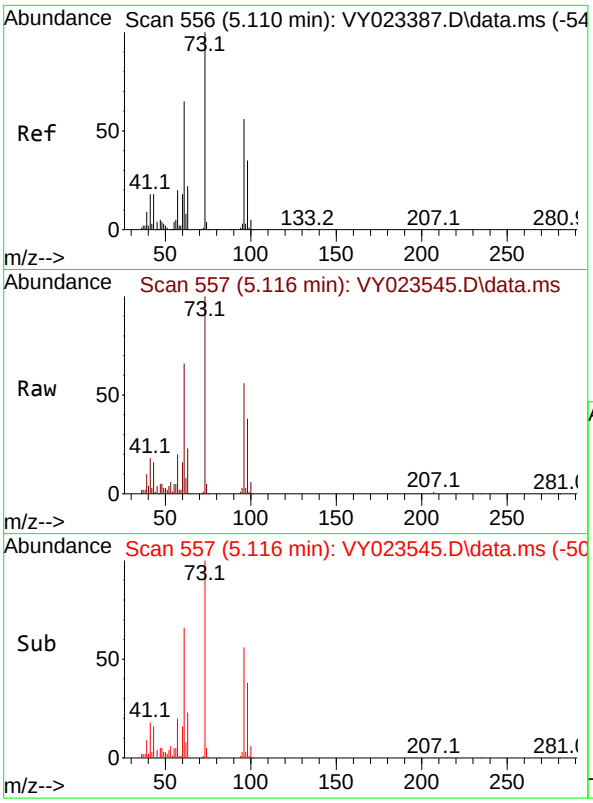


#20
Methylene Chloride
Concen: 18.380 ug/l
RT: 4.622 min Scan# 476
Delta R.T. 0.006 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion: 84 Resp: 108140

Ion	Ratio	Lower	Upper
84	100		
49	100.4	80.2	120.4
51	31.5	25.9	38.9
86	66.5	50.6	75.8

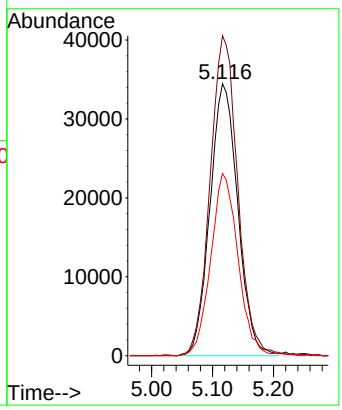




#21
trans-1,2-Dichloroethene
Concen: 20.379 ug/l
RT: 5.116 min Scan# 5
Delta R.T. 0.006 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion: 96 Resp: 10938

Ion	Ratio	Lower	Upper
96	100		
61	117.6	92.7	139.1
98	66.9	49.7	74.5



Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBS01

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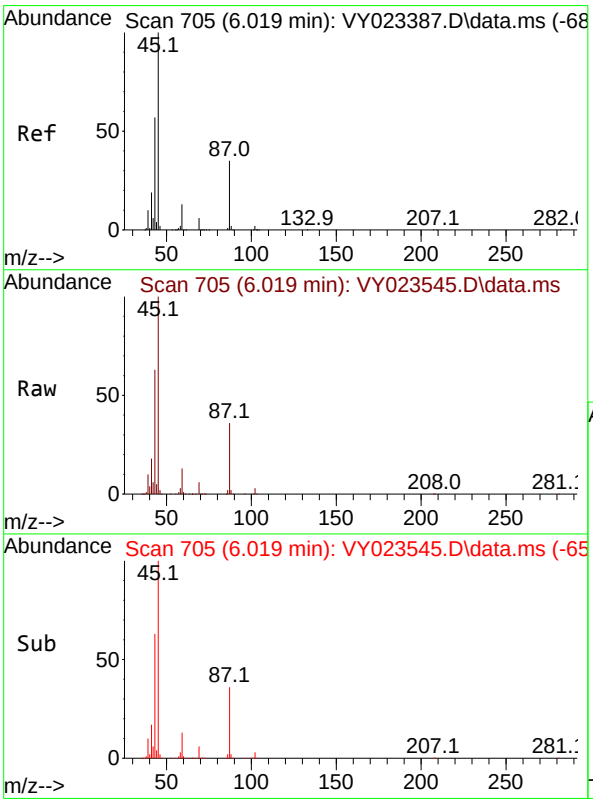
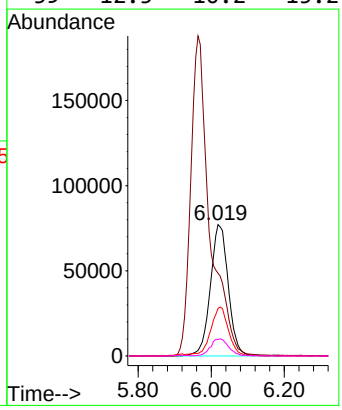
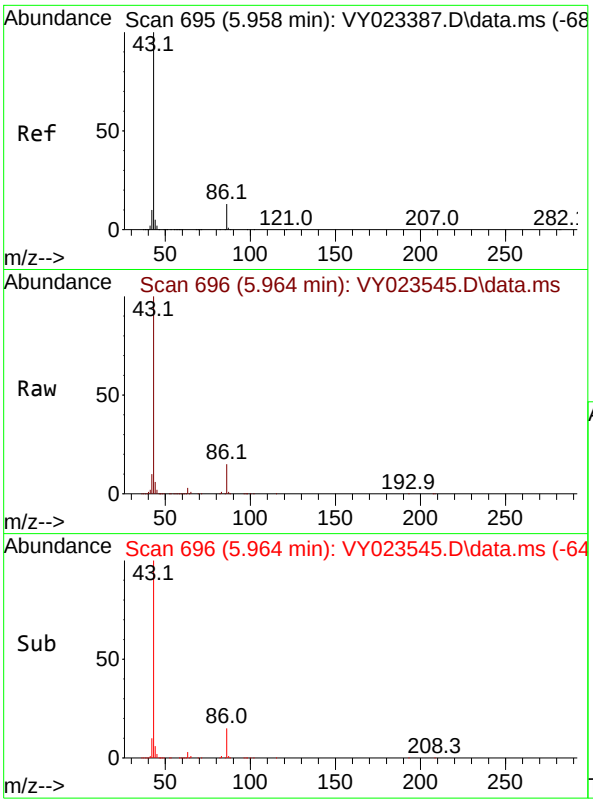


#22
Diisopropyl ether
Concen: 19.963 ug/l
RT: 6.019 min Scan# 705
Delta R.T. -0.000 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion: 45 Resp: 262379

Ion	Ratio	Lower	Upper
45	100		
43	62.2	45.6	68.4
87	36.1	28.1	42.1
59	12.5	10.2	15.2





#23
Vinyl Acetate
Concen: 95.797 ug/l
RT: 5.964 min Scan# 6
Delta R.T. 0.006 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion: 43 Resp: 68150

Ion	Ratio	Lower	Upper
43	100		
86	14.9	10.6	15.8

Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBS01

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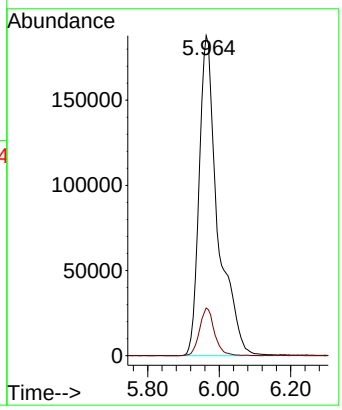
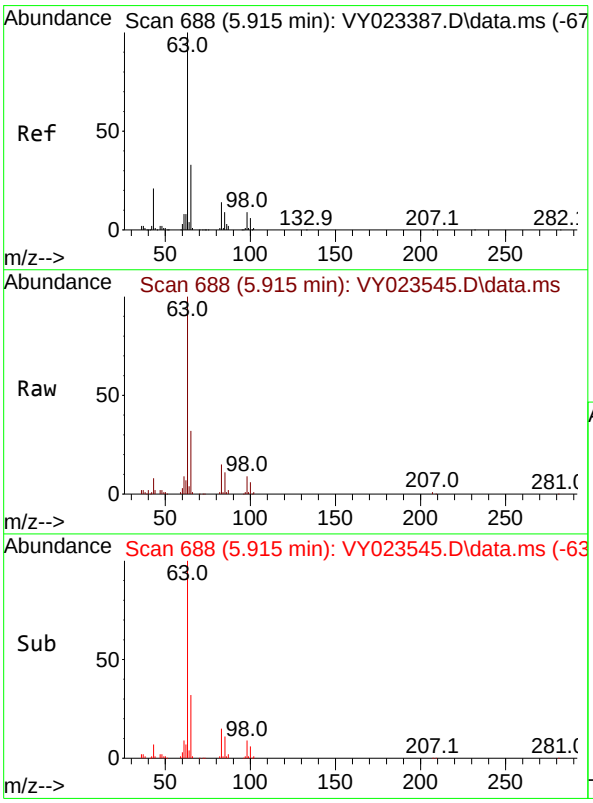
Reviewed By :Amit Patel 10/24/2025
Supervised By :Mahesh Dadoda 10/24/2025

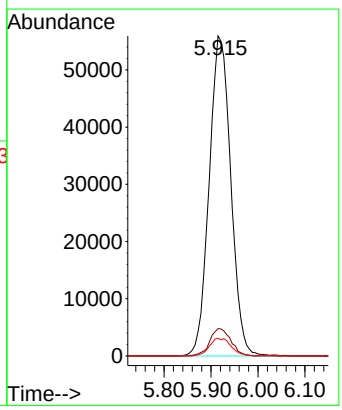


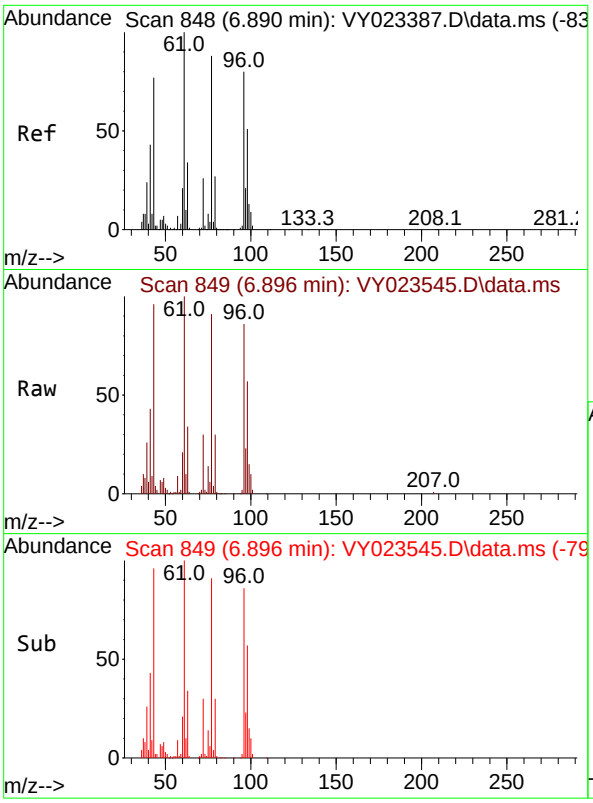


#24
1,1-Dichloroethane
Concen: 20.524 ug/l
RT: 5.915 min Scan# 688
Delta R.T. -0.000 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion: 63 Resp: 178683

Ion	Ratio	Lower	Upper
63	100		
98	8.6	4.3	13.1
100	5.5	2.8	8.4





#25
2-Butanone
Concen: 107.638 ug/l
RT: 6.896 min Scan# 84
Delta R.T. 0.006 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion: 43 Resp: 14298

Ion	Ratio	Lower	Upper
43	100		
72	31.3	27.4	41.2

Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBS01

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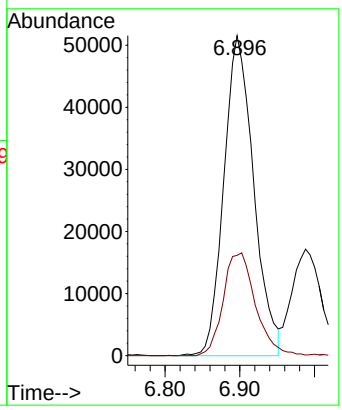
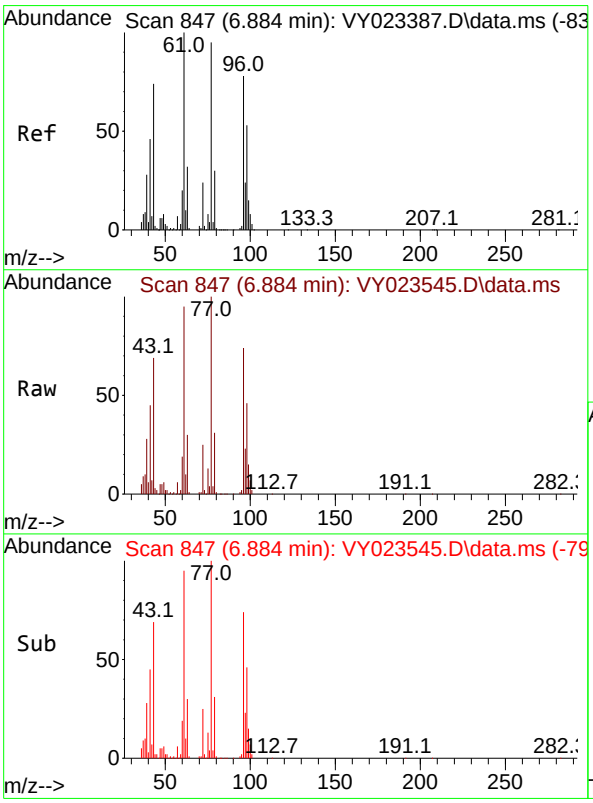
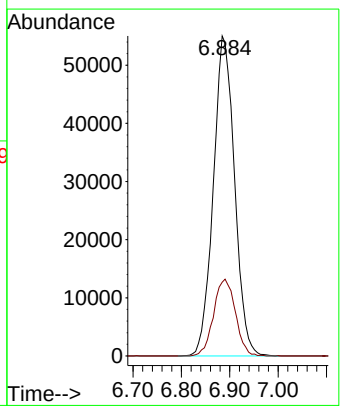


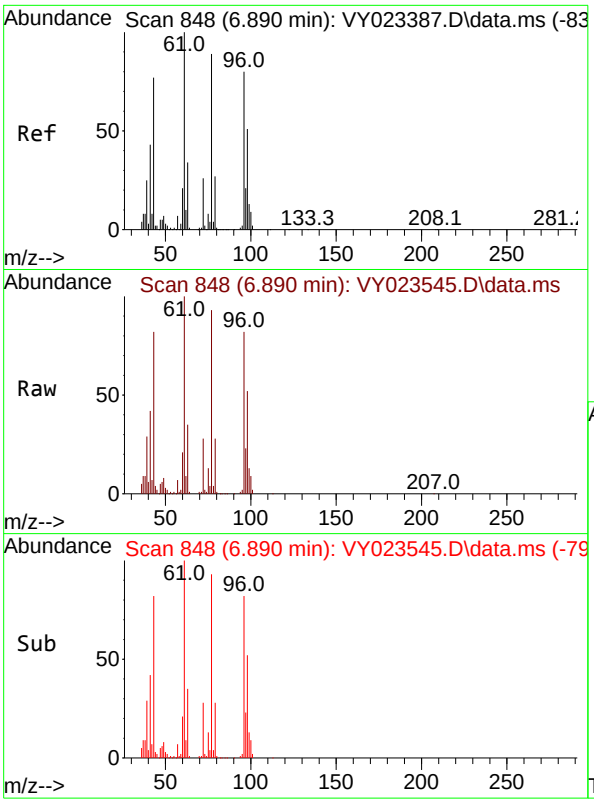


#26
2,2-Dichloropropane
Concen: 21.021 ug/l
RT: 6.884 min Scan# 847
Delta R.T. -0.000 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion: 77 Resp: 167931

Ion	Ratio	Lower	Upper
77	100		
97	24.6	12.1	36.3





#27
cis-1,2-Dichloroethene
Concen: 21.211 ug/l
RT: 6.890 min Scan# 84
Delta R.T. -0.000 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion: 96 Resp: 13151

Ion	Ratio	Lower	Upper
96	100		
61	120.8	0.0	258.2
98	63.9	0.0	132.0

Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBS01

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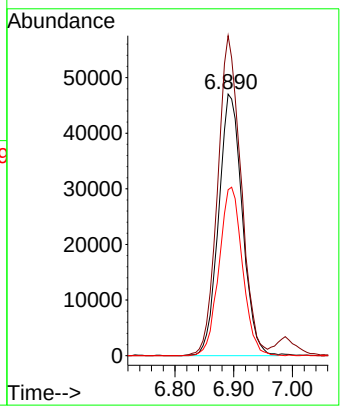
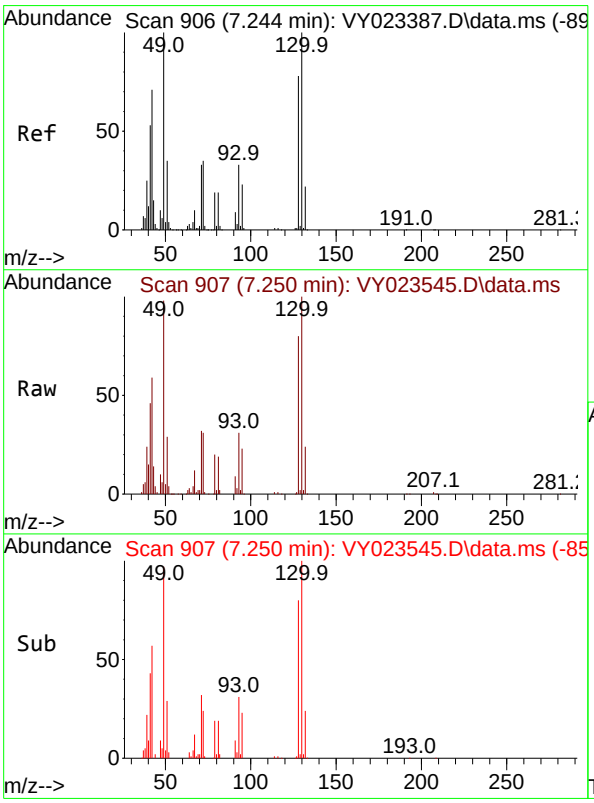
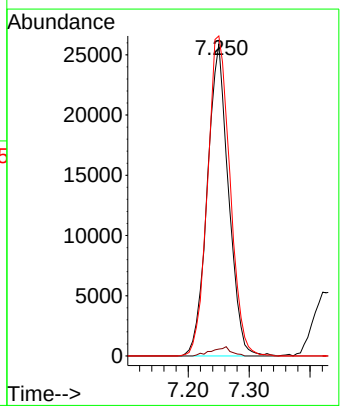


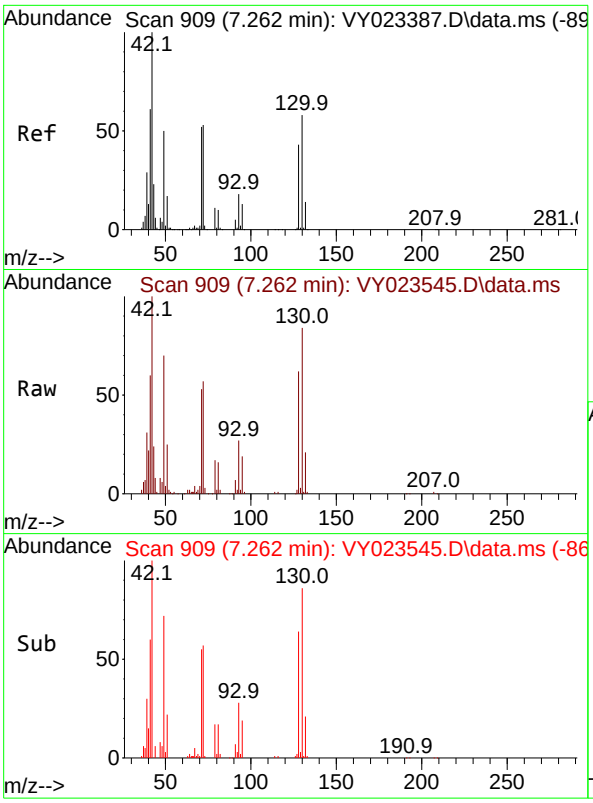


#28
Bromochloromethane
Concen: 19.264 ug/l
RT: 7.250 min Scan# 907
Delta R.T. 0.006 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion: 49 Resp: 62608

Ion	Ratio	Lower	Upper
49	100		
129	2.7	0.0	5.6
130	108.9	81.9	122.9

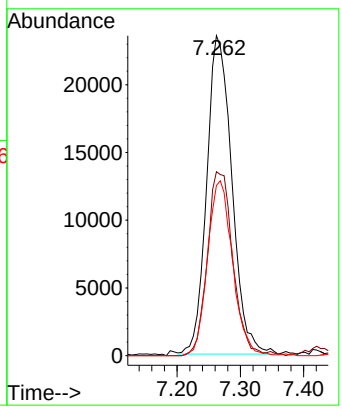




#29
Tetrahydrofuran
Concen: 86.341 ug/l
RT: 7.262 min Scan# 9(
Delta R.T. -0.000 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion: 42 Resp: 6503

Ion	Ratio	Lower	Upper
42	100		
72	58.5	43.0	64.6
71	54.7	40.1	60.1



Instrument :
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ClientSampleId :
VY1022SBS01

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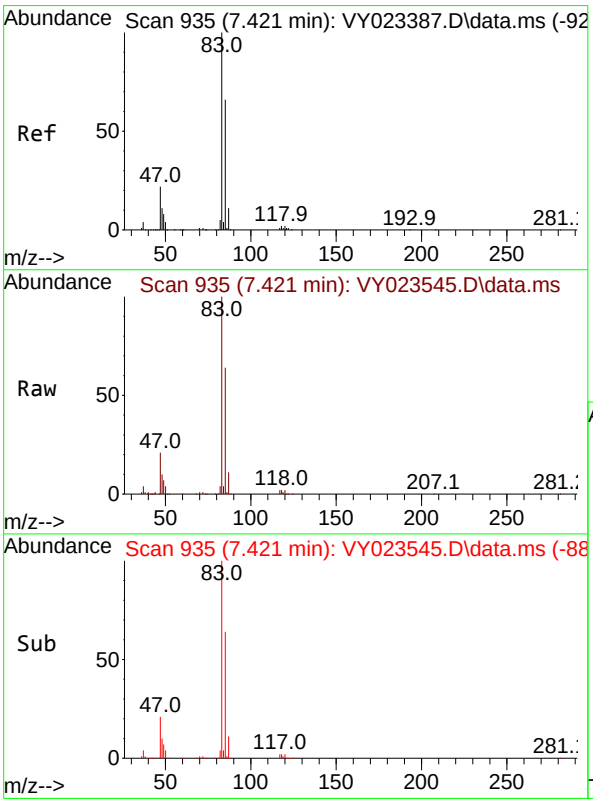
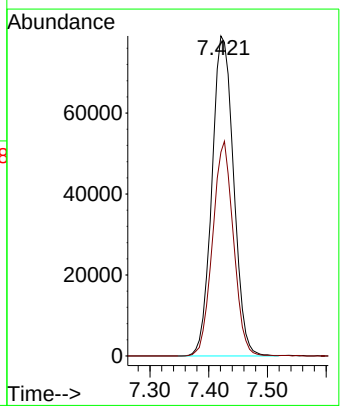
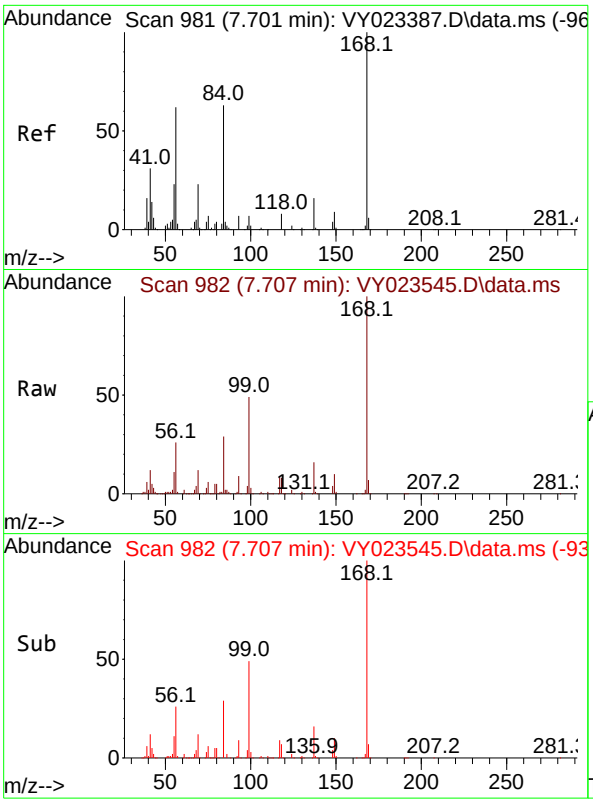


#30
Chloroform
Concen: 21.198 ug/l
RT: 7.421 min Scan# 935
Delta R.T. -0.000 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion: 83 Resp: 202767

Ion	Ratio	Lower	Upper
83	100		
85	63.7	52.5	78.7

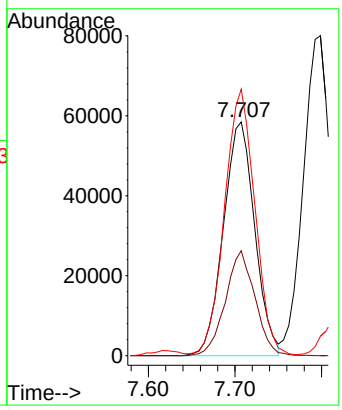




#31
Cyclohexane
Concen: 19.331 ug/l
RT: 7.707 min Scan# 9
Delta R.T. 0.006 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion: 56 Resp: 14697

Ion	Ratio	Lower	Upper
56	100		
69	44.9	30.0	45.0
84	112.5	81.2	121.8



Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBS01

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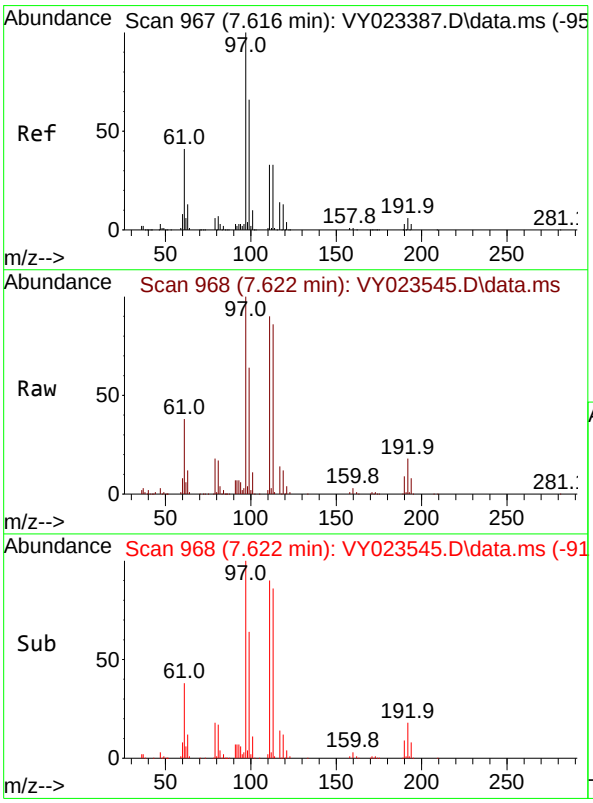
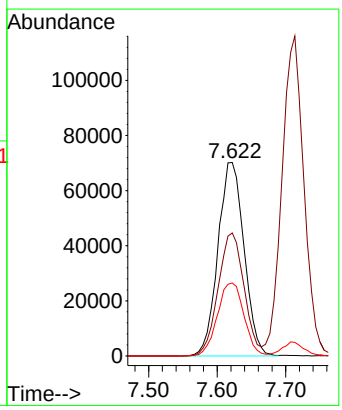
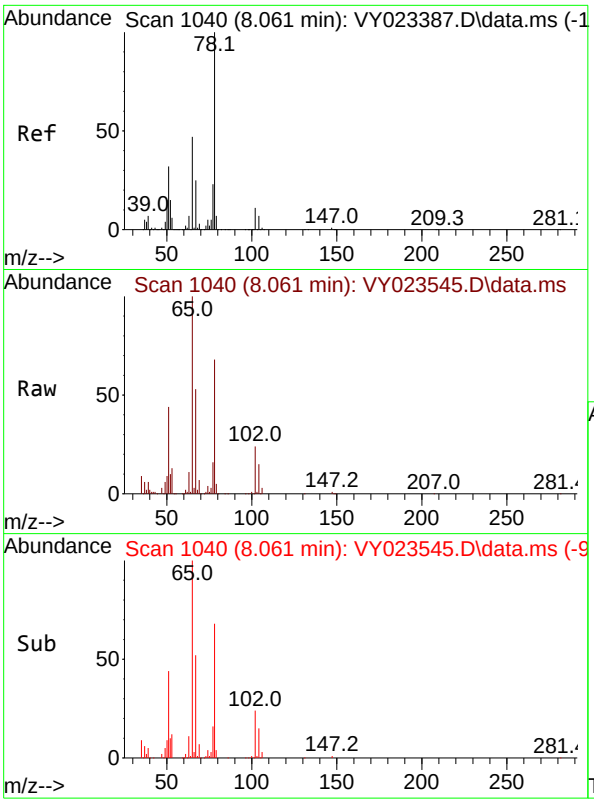


#32
1,1,1-Trichloroethane
Concen: 21.339 ug/l
RT: 7.622 min Scan# 968
Delta R.T. 0.006 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion: 97 Resp: 185487

Ion	Ratio	Lower	Upper
97	100		
99	63.2	51.4	77.2
61	38.4	31.9	47.9

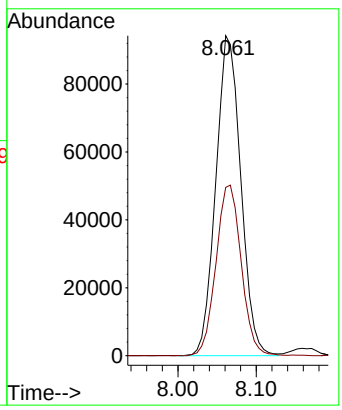




#33
1,2-Dichloroethane-d4
Concen: 45.699 ug/l
RT: 8.061 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion: 65 Resp: 20886

Ion	Ratio	Lower	Upper
65	100		
67	53.8	0.0	105.8



Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBS01

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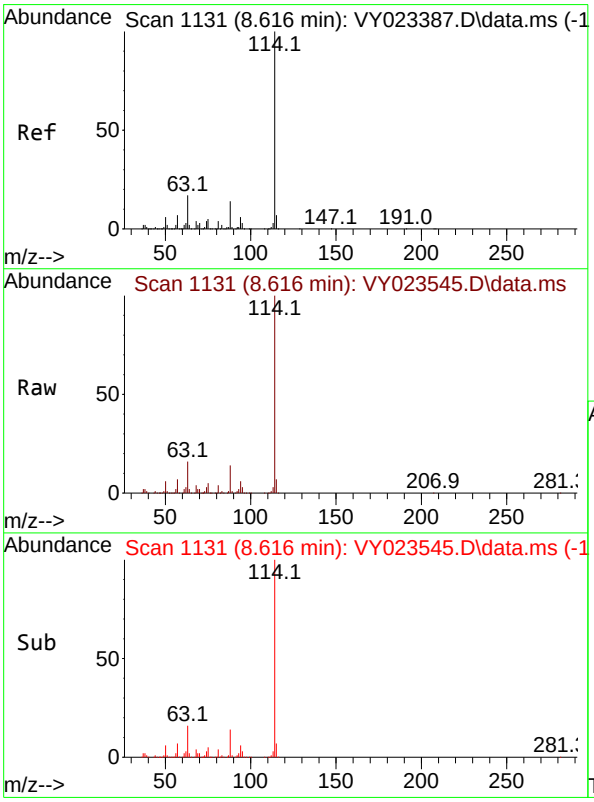
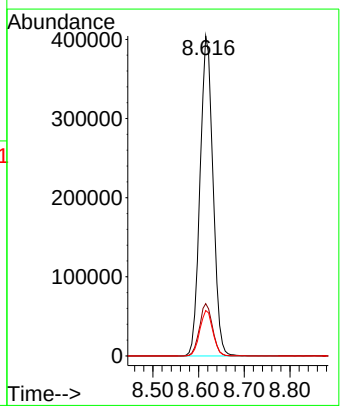
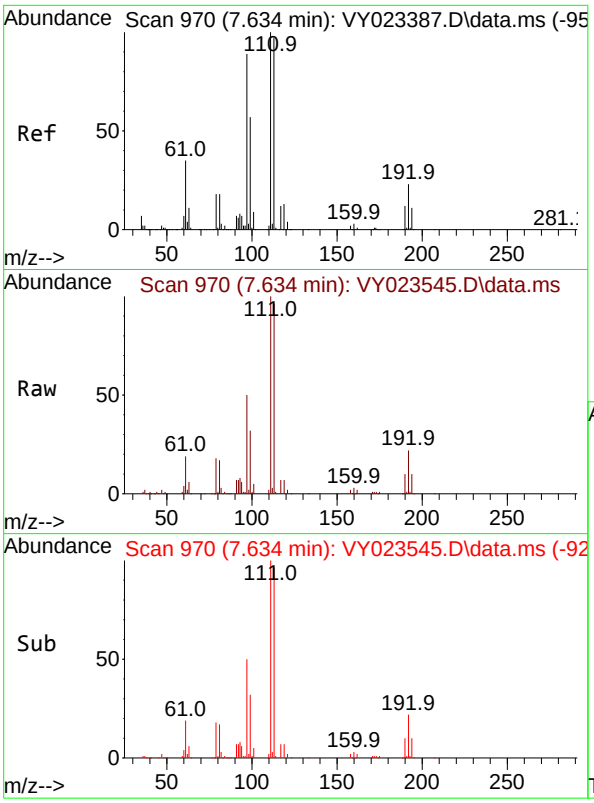


#34
1,4-Difluorobenzene
Concen: 50.000 ug/l
RT: 8.616 min Scan# 1131
Delta R.T. -0.000 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion:114 Resp: 794303

Ion	Ratio	Lower	Upper
114	100		
63	16.3	0.0	34.2
88	14.2	0.0	28.4

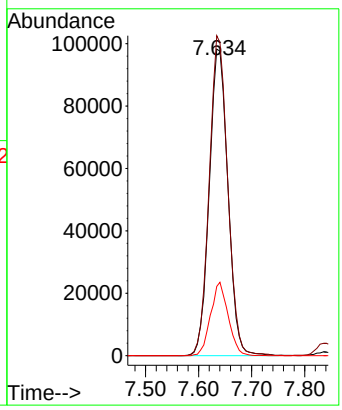




#35
Dibromofluoromethane
Concen: 49.282 ug/l
RT: 7.634 min Scan# 9
Delta R.T. -0.000 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion:113 Resp: 24052

Ion	Ratio	Lower	Upper
113	100		
111	103.3	81.8	122.6
192	22.6	18.0	27.0



Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBS01

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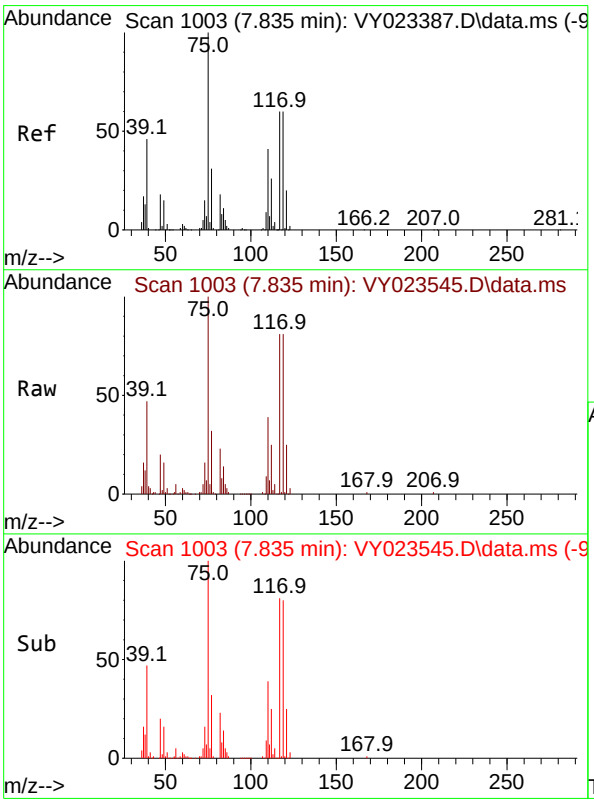
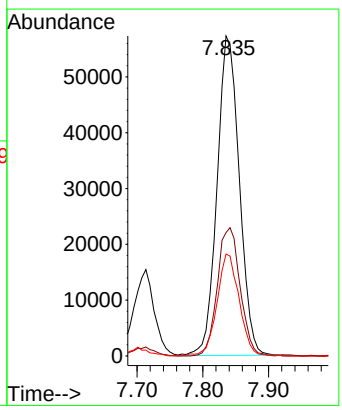
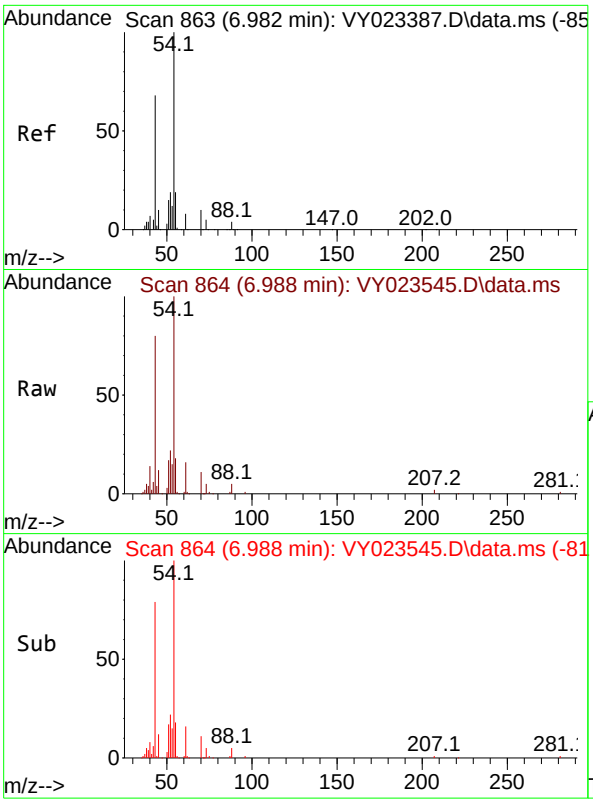


#36
1,1-Dichloropropene
Concen: 20.873 ug/l
RT: 7.835 min Scan# 1003
Delta R.T. -0.000 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion: 75 Resp: 134867

Ion	Ratio	Lower	Upper
75	100		
110	41.2	19.9	59.7
77	31.7	25.0	37.6





#37
Ethyl Acetate
Concen: 18.620 ug/l
RT: 6.988 min Scan# 8
Delta R.T. 0.006 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion: 43 Resp: 4766

Ion	Ratio	Lower	Upper
43	100		
61	17.8	11.8	17.8
70	13.5	10.5	15.7

Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBS01

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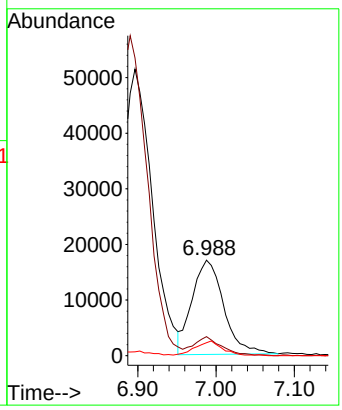
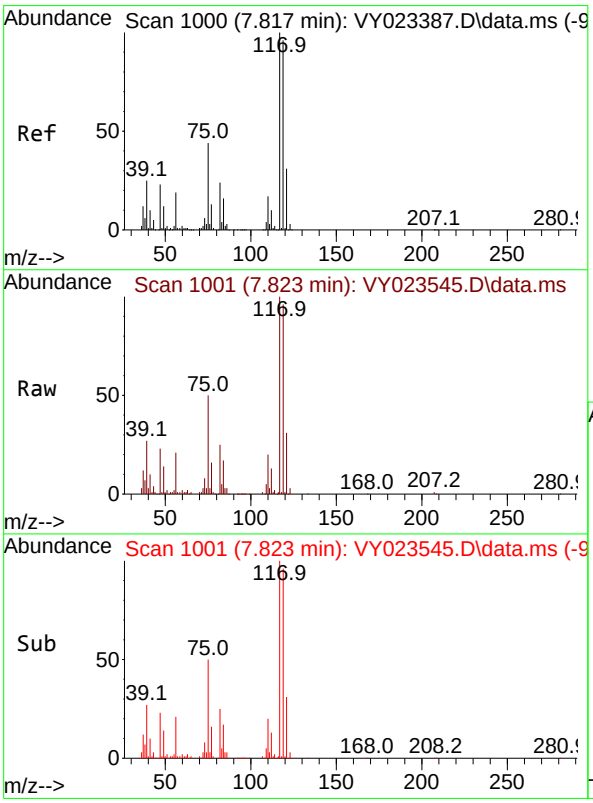
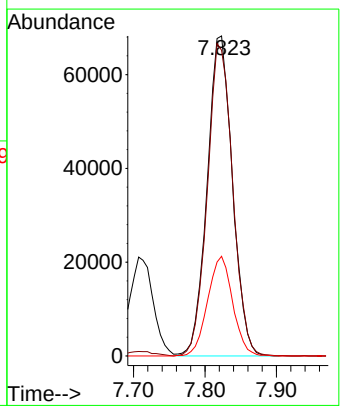


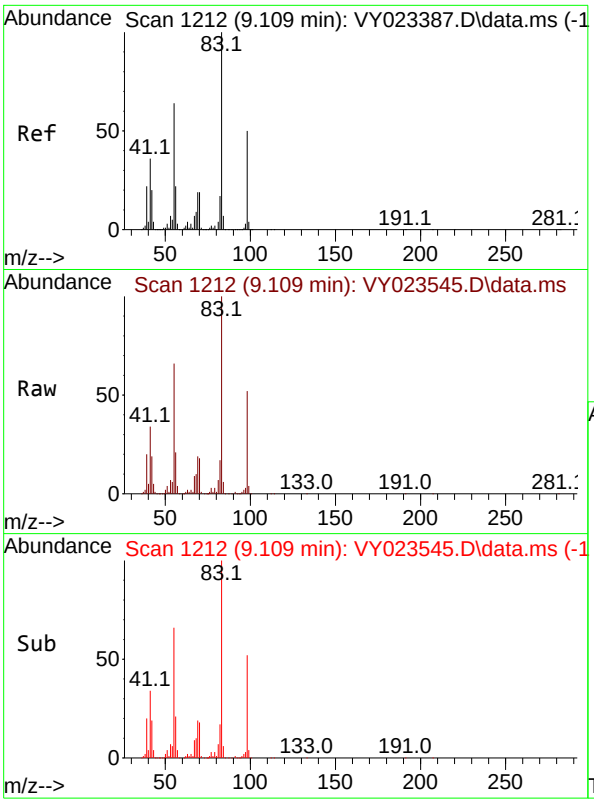


#38
Carbon Tetrachloride
Concen: 21.380 ug/l
RT: 7.823 min Scan# 1001
Delta R.T. 0.006 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion:117 Resp: 167506

Ion	Ratio	Lower	Upper
117	100		
119	95.5	76.8	115.2
121	31.2	24.5	36.7

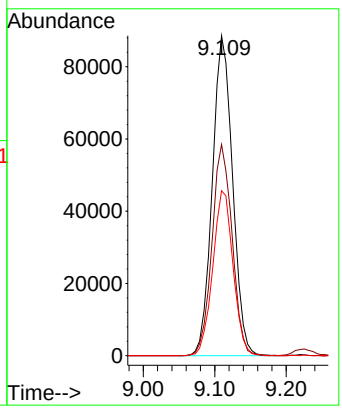




#39
Methylcyclohexane
Concen: 20.726 ug/l
RT: 9.109 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion: 83 Resp: 17436

Ion	Ratio	Lower	Upper
83	100		
55	66.0	51.4	77.2
98	51.6	40.4	60.6



Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBS01

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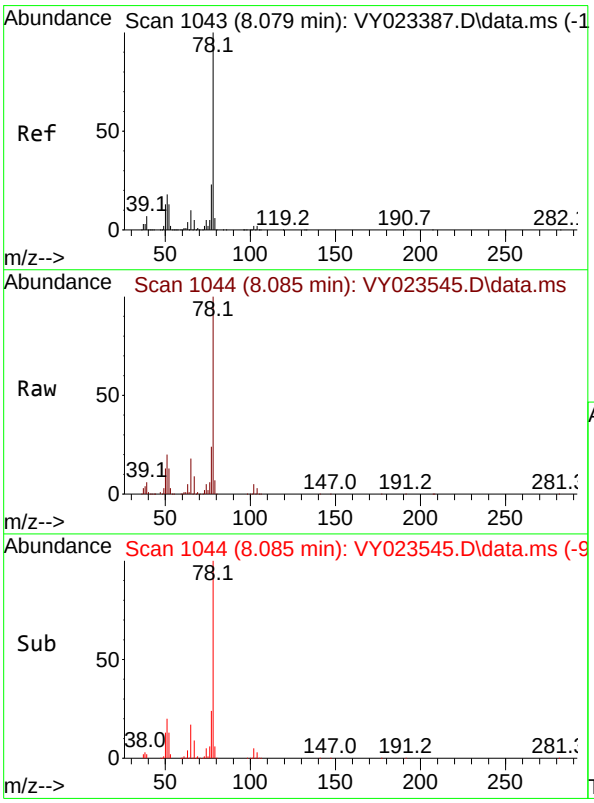
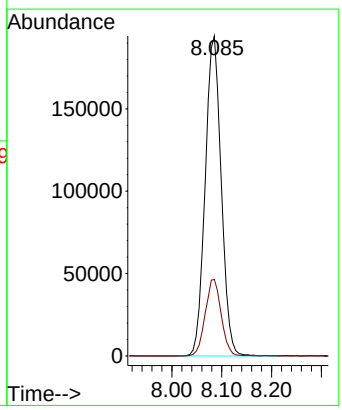
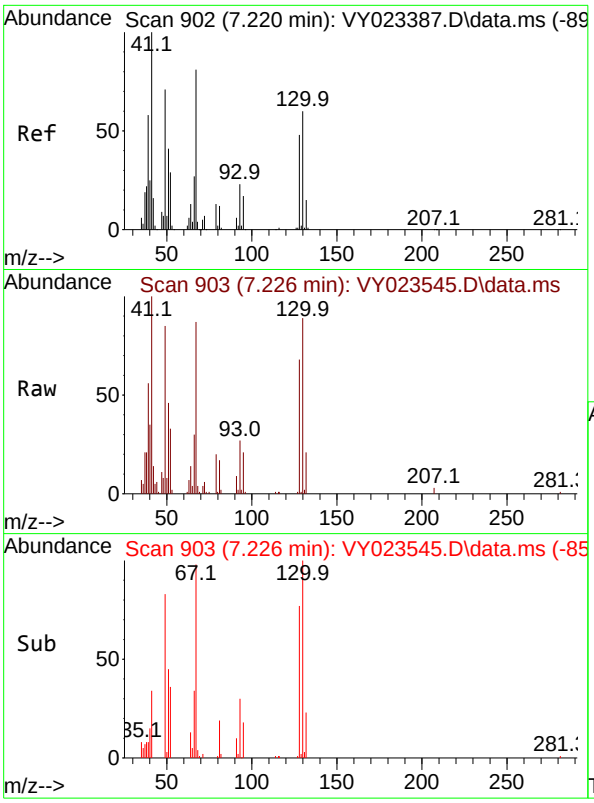


#40
Benzene
Concen: 21.157 ug/l
RT: 8.085 min Scan# 1044
Delta R.T. 0.006 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion: 78 Resp: 432933

Ion	Ratio	Lower	Upper
78	100		
77	23.9	18.3	27.5

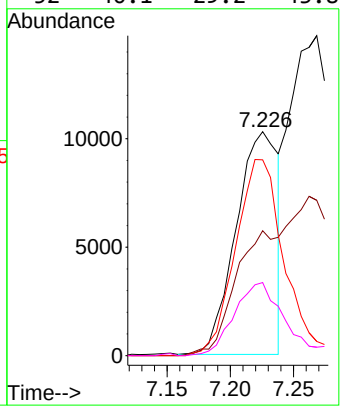




#41
Methacrylonitrile
Concen: 17.080 ug/l
RT: 7.226 min Scan# 9
Delta R.T. 0.006 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion: 41 Resp: 2364

Ion	Ratio	Lower	Upper
41	100		
39	0.0	52.2	78.4
67	102.5	74.9	112.3
52	40.1	29.2	43.8



Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBS01

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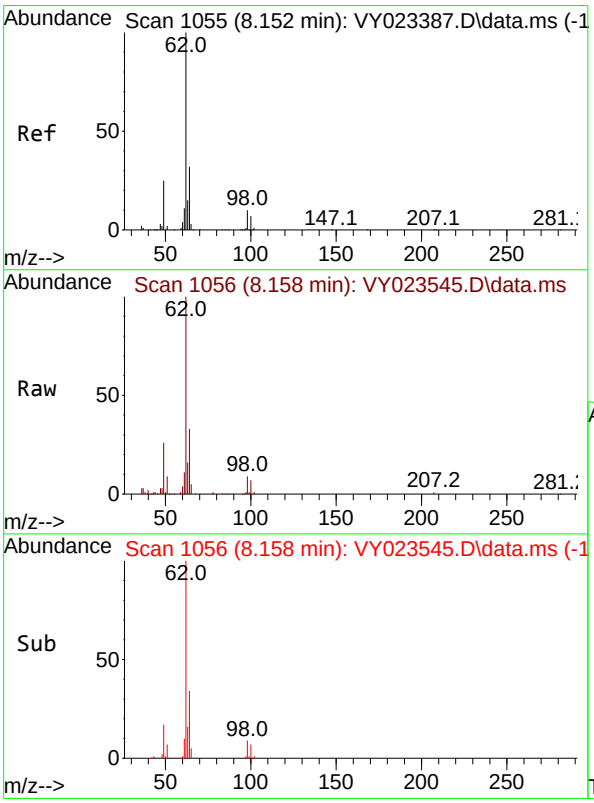
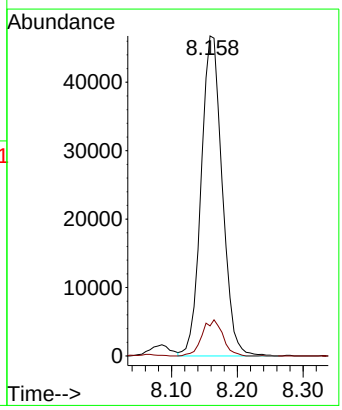
Supervised By :Mahesh Dadoda 10/24/2025

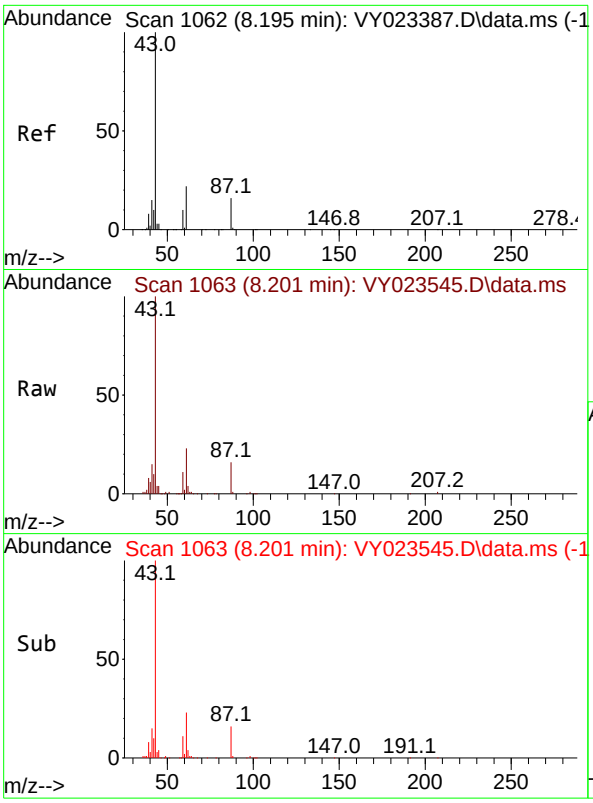


#42
1,2-Dichloroethane
Concen: 19.787 ug/l
RT: 8.158 min Scan# 1056
Delta R.T. 0.006 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion: 62 Resp: 104422

Ion	Ratio	Lower	Upper
62	100		
98	11.2	0.0	21.6

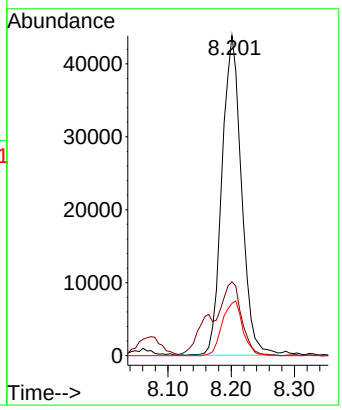




#43
Isopropyl Acetate
Concen: 18.386 ug/l
RT: 8.201 min Scan# 1
Delta R.T. 0.006 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion: 43 Resp: 9385

Ion	Ratio	Lower	Upper
43	100		
61	25.1	18.1	27.1
87	17.9	13.5	20.3



Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBS01

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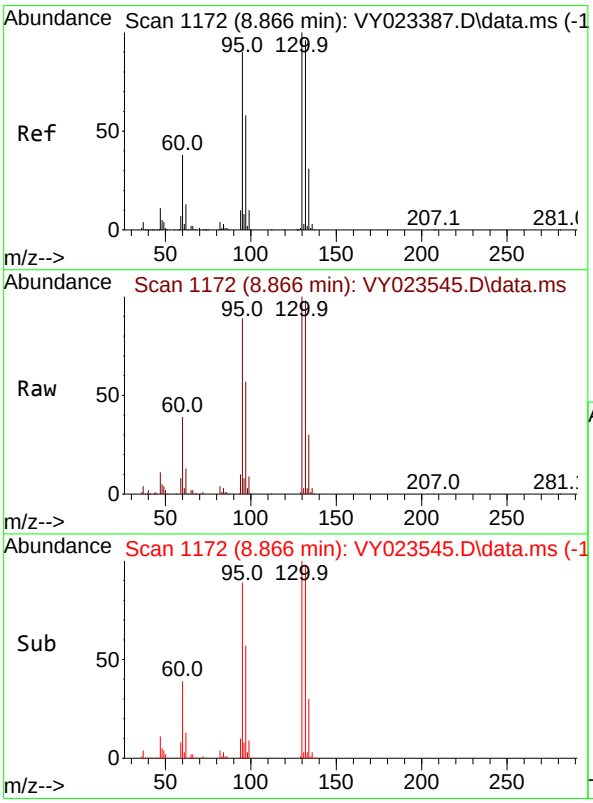
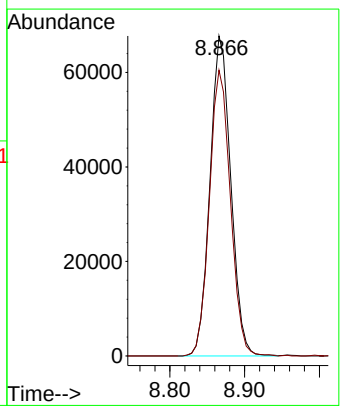
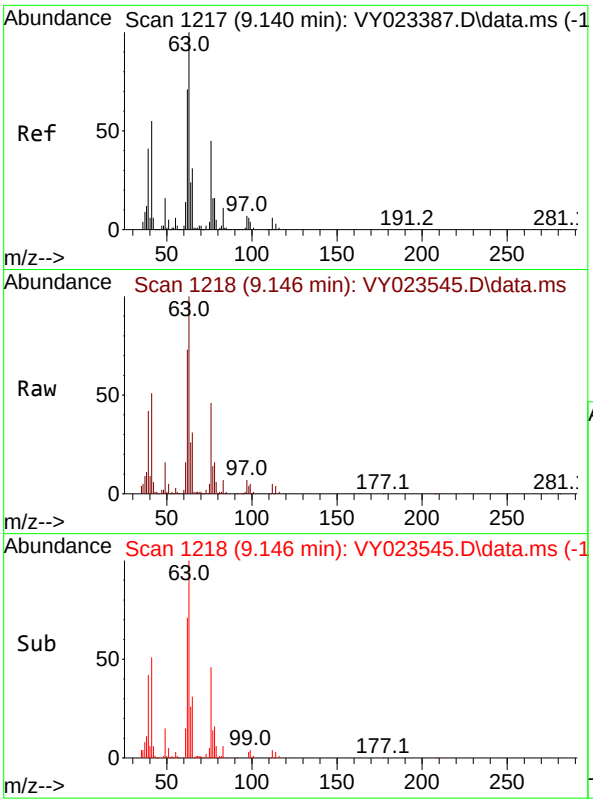


#44
Trichloroethene
Concen: 21.940 ug/l
RT: 8.866 min Scan# 1172
Delta R.T. -0.000 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion:130 Resp: 131401

Ion	Ratio	Lower	Upper
130	100		
95	89.3	0.0	180.6

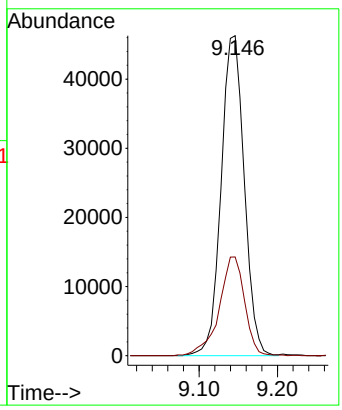




#45
1,2-Dichloropropane
Concen: 21.006 ug/l
RT: 9.146 min Scan# 1
Delta R.T. 0.006 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion: 63 Resp: 9494

Ion	Ratio	Lower	Upper
63	100		
65	30.7	24.9	37.3



Instrument :
MSVOA_Y
ClientSampleId :
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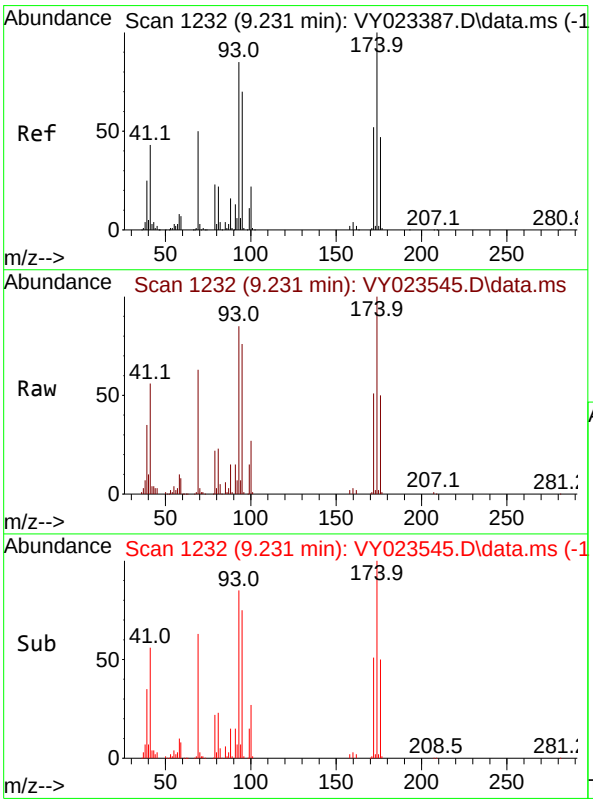
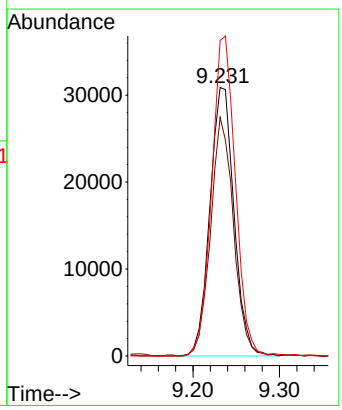
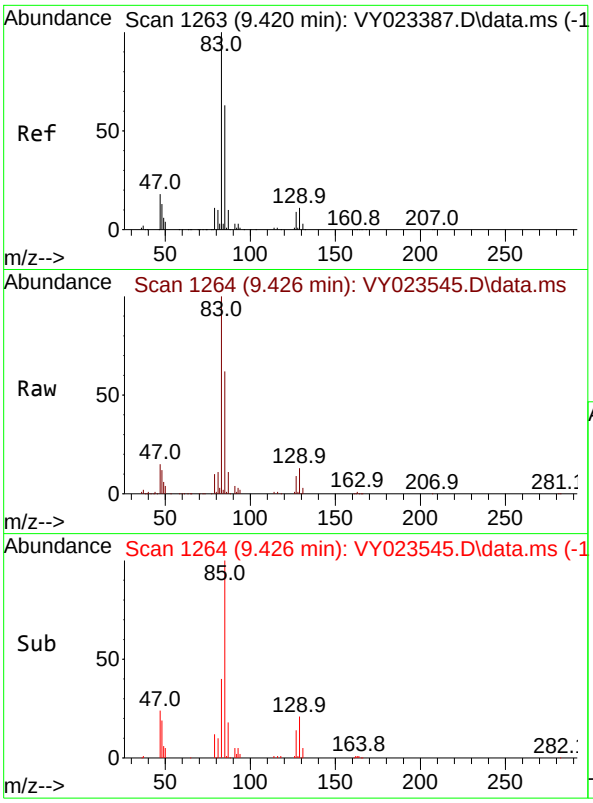


#46
Dibromomethane
Concen: 20.843 ug/l
RT: 9.231 min Scan# 1232
Delta R.T. -0.000 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion: 93 Resp: 59570

Ion	Ratio	Lower	Upper
93	100		
95	85.1	65.4	98.0
174	117.7	92.9	139.3

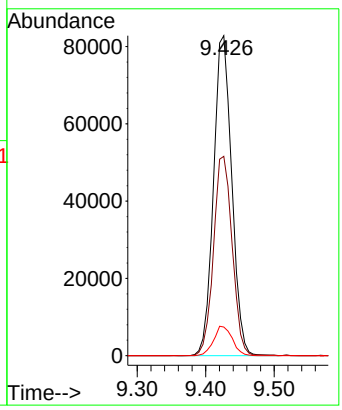




#47
Bromodichloromethane
Concen: 21.237 ug/l
RT: 9.426 min Scan# 1
Delta R.T. 0.006 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion: 83 Resp: 15285

Ion	Ratio	Lower	Upper
83	100		
85	62.3	50.8	76.2
127	8.9	7.4	11.2



Instrument :
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ClientSampleId :
VY1022SBS01

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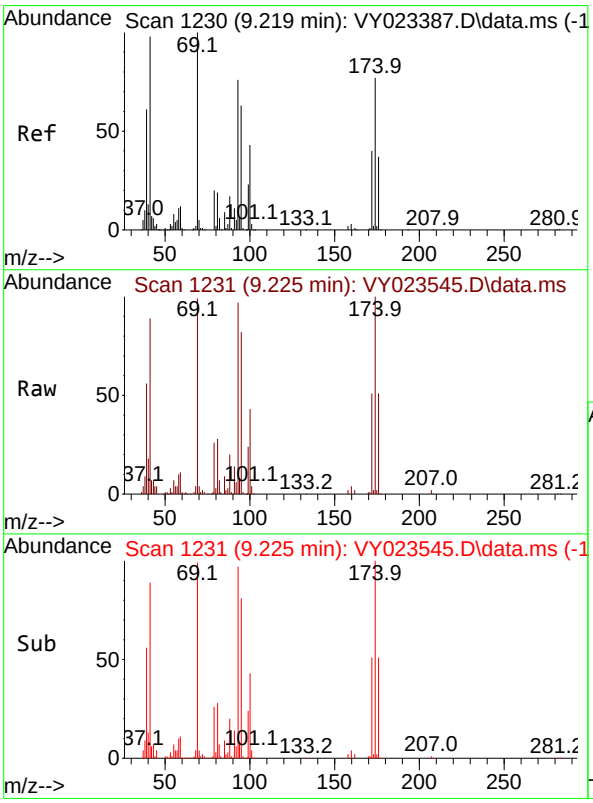
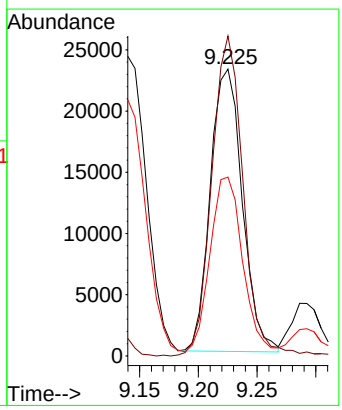
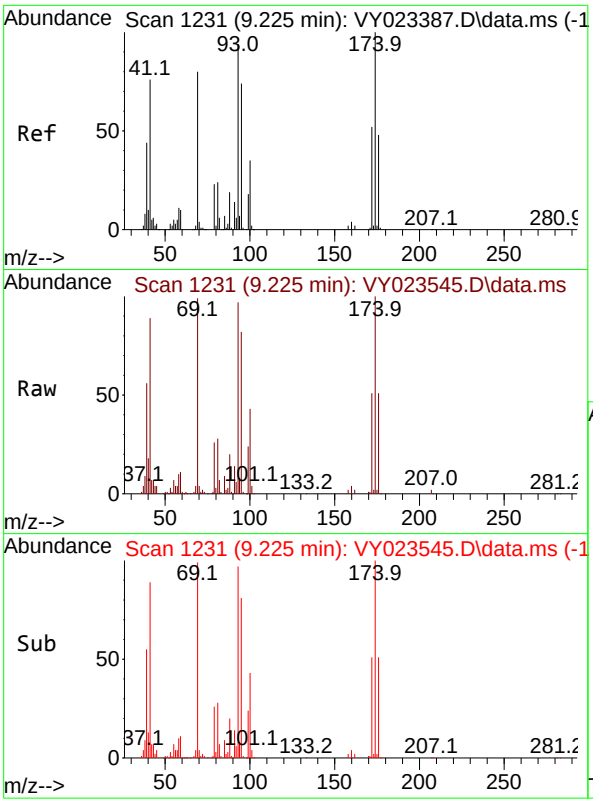


#48
Methyl methacrylate
Concen: 18.246 ug/l
RT: 9.225 min Scan# 1231
Delta R.T. 0.006 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion: 41 Resp: 43753

Ion	Ratio	Lower	Upper
41	100		
69	111.4	81.0	121.4
39	62.9	48.2	72.4





#49
1,4-Dioxane
Concen: 368.059 ug/l
RT: 9.225 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion: 88 Resp: 1219

Ion	Ratio	Lower	Upper
88	100		
43	30.0	21.8	32.8
58	60.8	46.8	70.2

Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBS01

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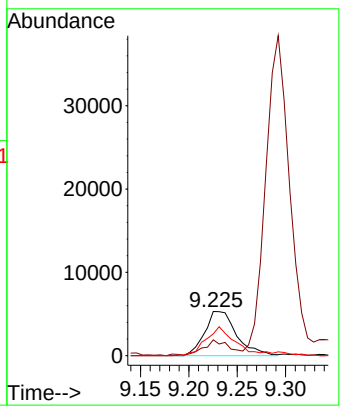
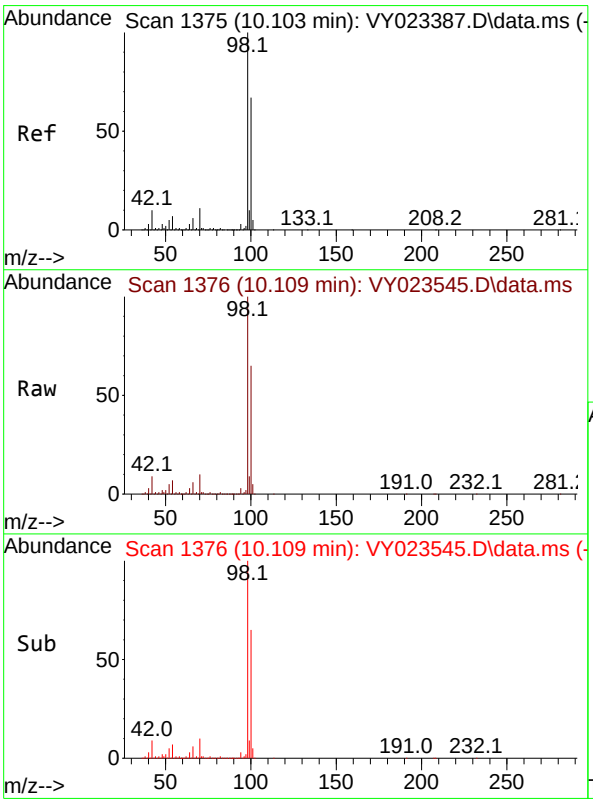
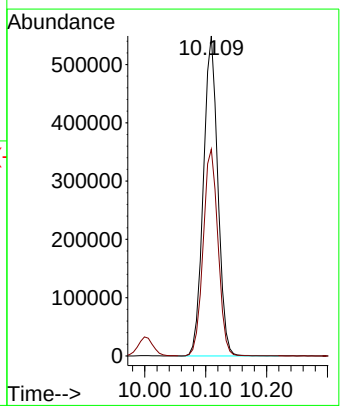


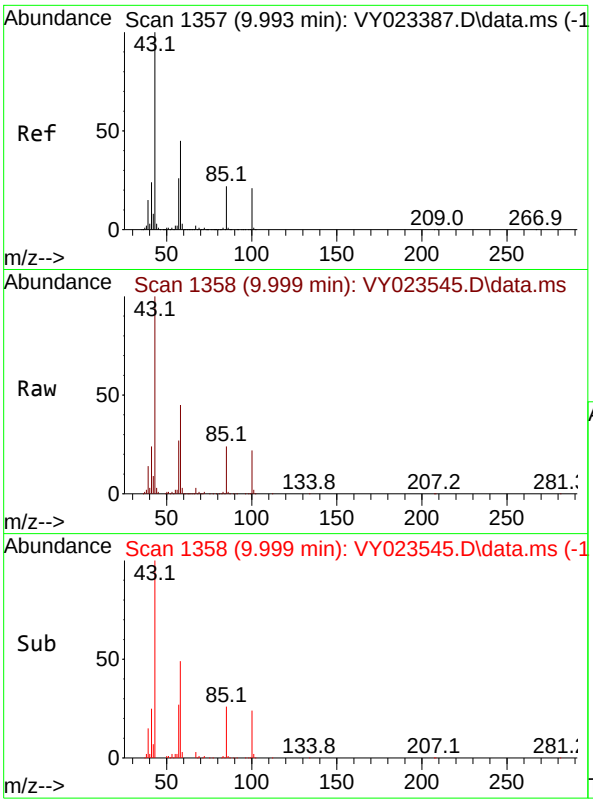


#50
Toluene-d8
Concen: 49.771 ug/l
RT: 10.109 min Scan# 1376
Delta R.T. 0.006 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion: 98 Resp: 904633

Ion	Ratio	Lower	Upper
98	100		
100	66.0	53.0	79.4

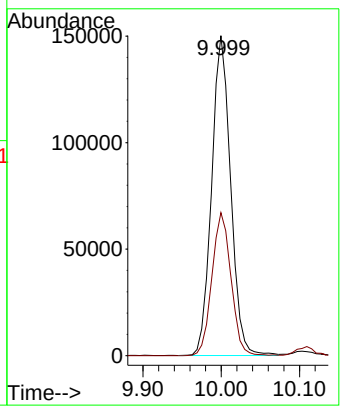




#51
4-Methyl-2-Pentanone
Concen: 96.032 ug/l
RT: 9.999 min Scan# 1
Delta R.T. 0.006 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion: 43 Resp: 25326

Ion	Ratio	Lower	Upper
43	100		
58	45.0	35.3	52.9



Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBS01

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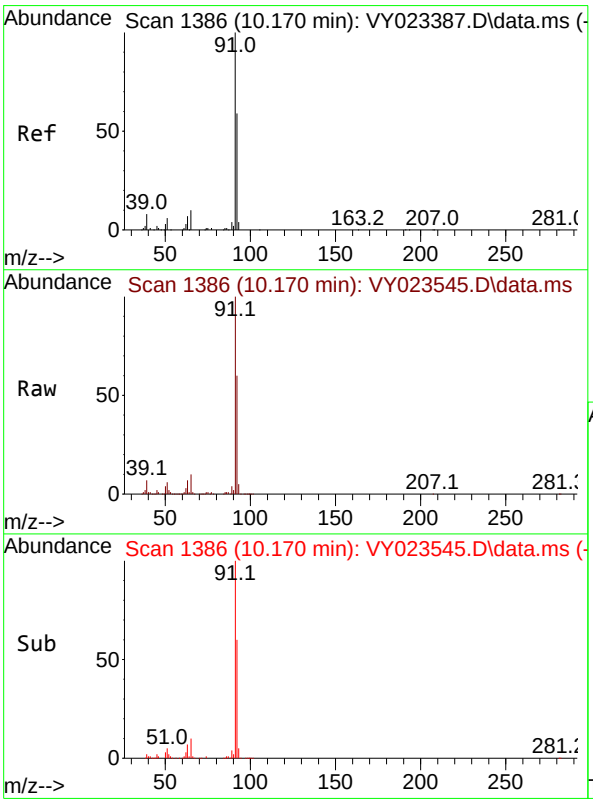
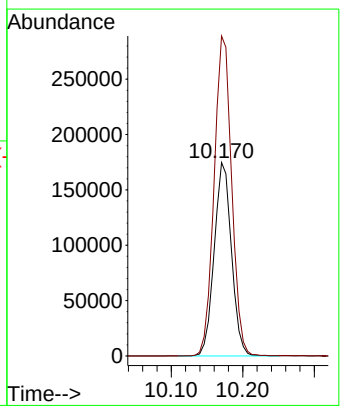
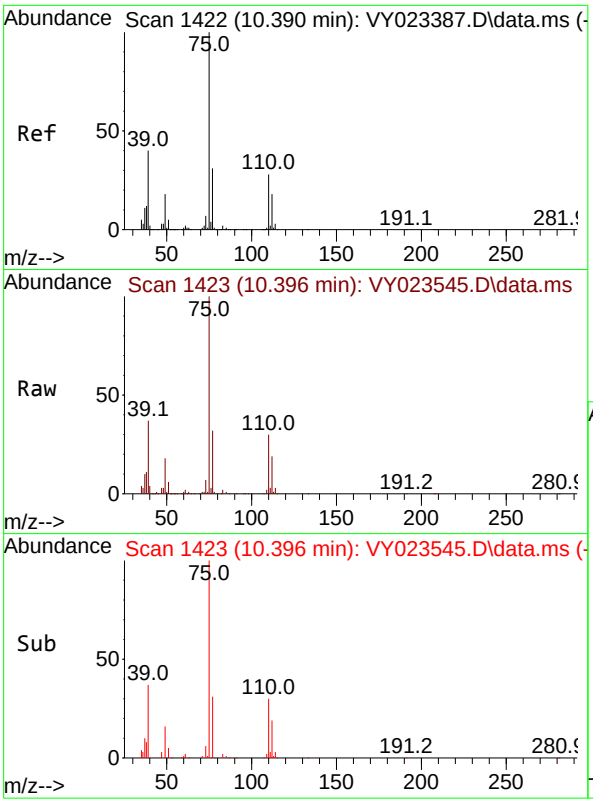


#52
Toluene
Concen: 21.986 ug/l
RT: 10.170 min Scan# 1386
Delta R.T. -0.000 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion: 92 Resp: 292104

Ion	Ratio	Lower	Upper
92	100		
91	168.4	136.4	204.6

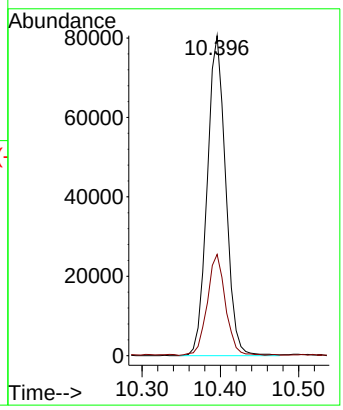




#53
t-1,3-Dichloropropene
Concen: 21.031 ug/l
RT: 10.396 min Scan# 14
Delta R.T. 0.006 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion: 75 Resp: 13162

Ion	Ratio	Lower	Upper
75	100		
77	31.5	25.1	37.7



Instrument :
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ClientSampleId :
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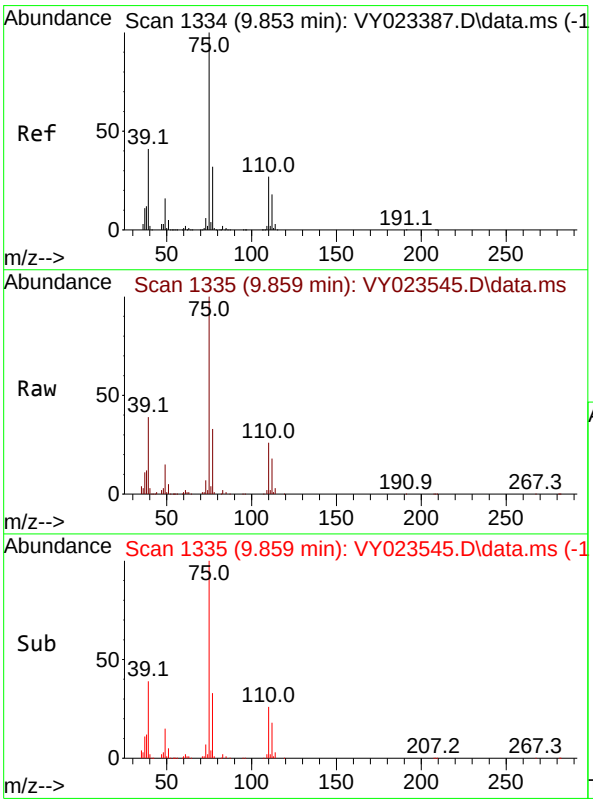
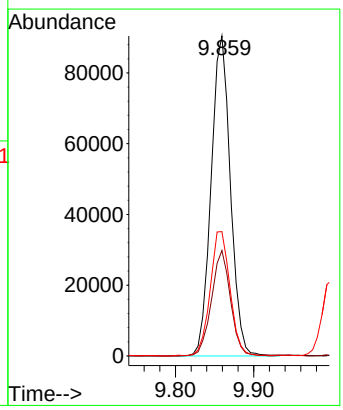
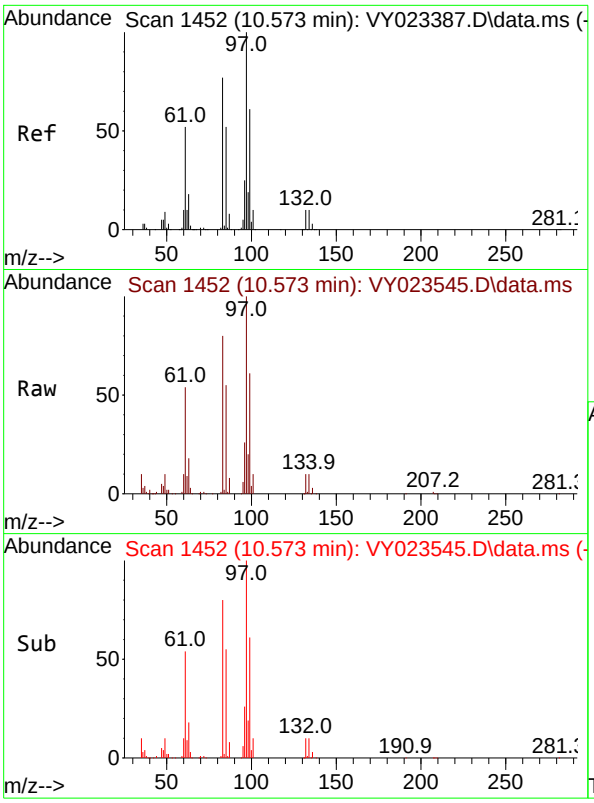


#54
cis-1,3-Dichloropropene
Concen: 20.924 ug/l
RT: 9.859 min Scan# 1335
Delta R.T. 0.006 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion: 75 Resp: 154563

Ion	Ratio	Lower	Upper
75	100		
77	33.0	25.4	38.0
39	38.6	32.8	49.2

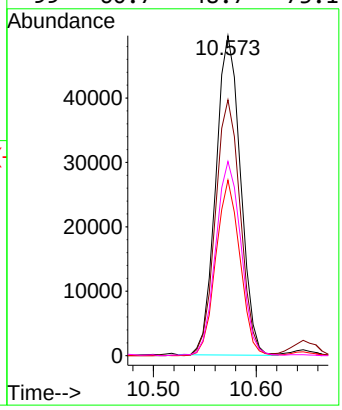




#55
1,1,2-Trichloroethane
Concen: 21.572 ug/l
RT: 10.573 min Scan# 14
Delta R.T. -0.000 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion: 97 Resp: 8290

Ion	Ratio	Lower	Upper
97	100		
83	80.1	61.8	92.6
85	55.0	41.3	61.9
99	60.7	48.7	73.1



Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBS01

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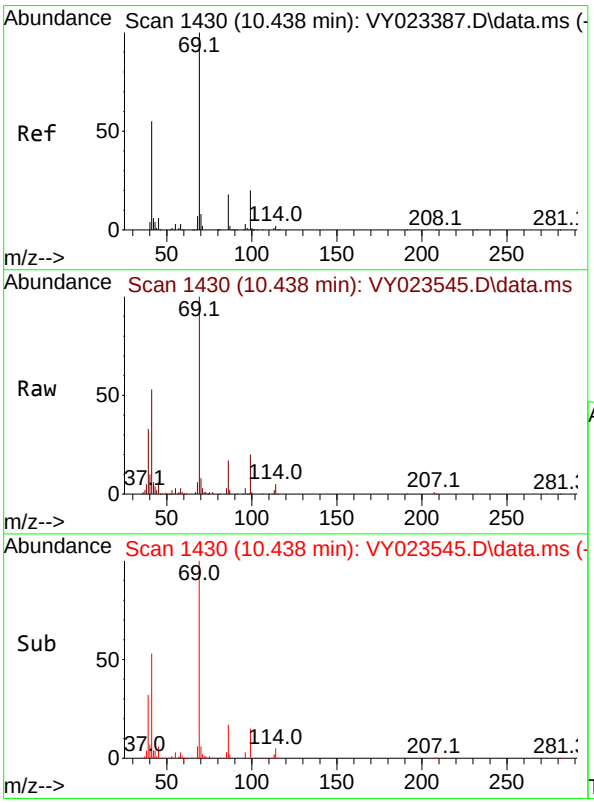
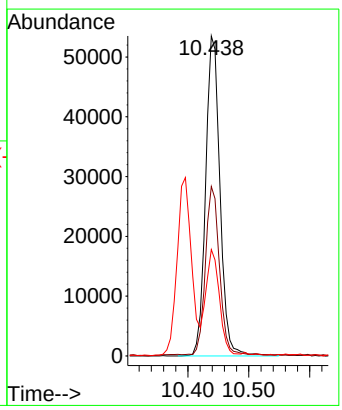
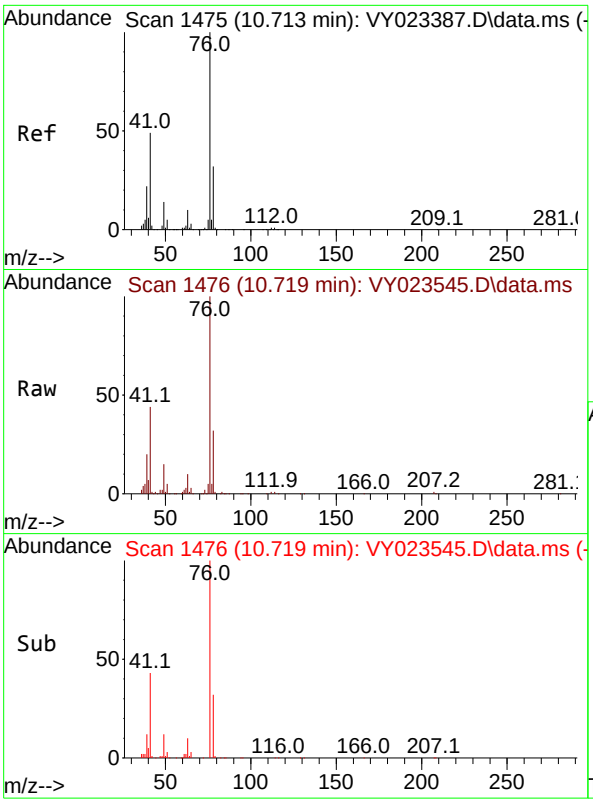


#56
Ethyl methacrylate
Concen: 19.771 ug/l
RT: 10.438 min Scan# 1430
Delta R.T. -0.000 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion: 69 Resp: 87648

Ion	Ratio	Lower	Upper
69	100		
41	50.7	44.6	67.0
39	30.3	27.0	40.4

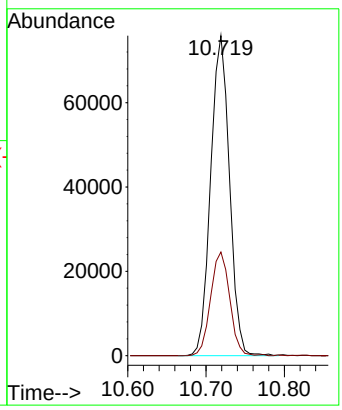




#57
1,3-Dichloropropane
Concen: 20.809 ug/l
RT: 10.719 min Scan# 14
Delta R.T. 0.006 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion: 76 Resp: 12672

Ion	Ratio	Lower	Upper
76	100		
78	32.8	25.9	38.9



Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBS01

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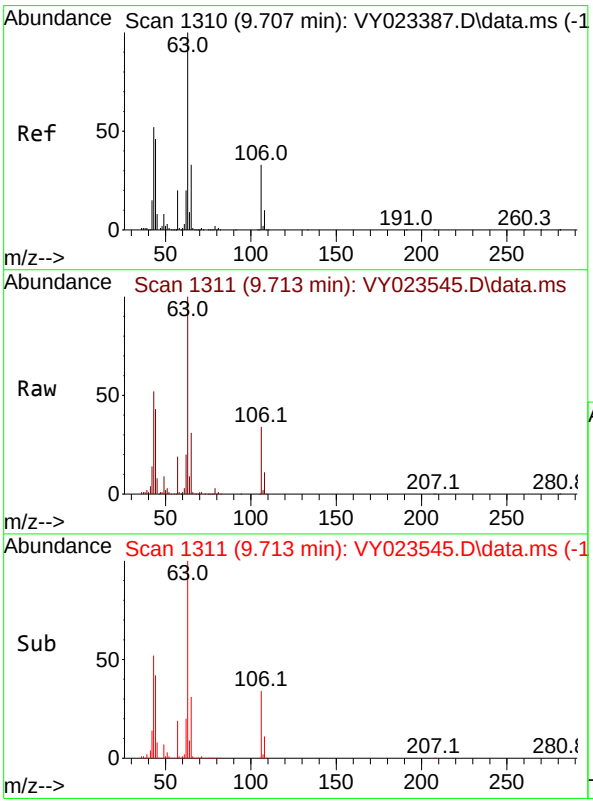
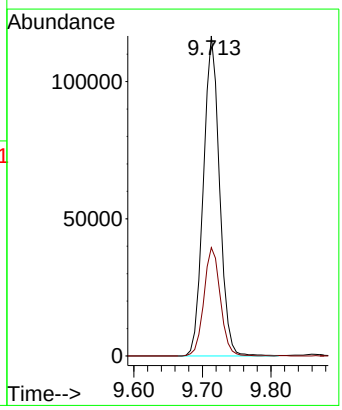
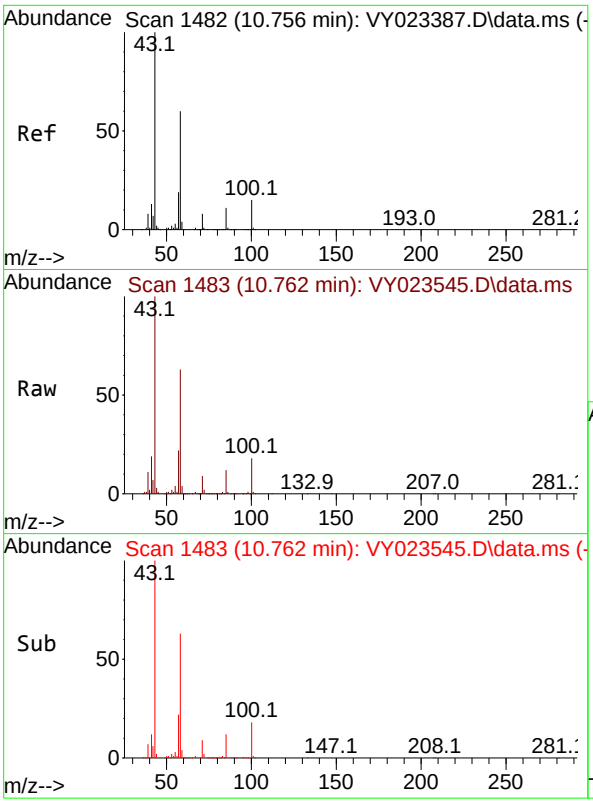


#58
2-Chloroethyl Vinyl ether
Concen: 96.421 ug/l
RT: 9.713 min Scan# 1311
Delta R.T. 0.006 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion: 63 Resp: 191490

Ion	Ratio	Lower	Upper
63	100		
106	34.4	26.6	39.8





#59
2-Hexanone
Concen: 107.056 ug/l
RT: 10.762 min Scan# 14
Delta R.T. 0.006 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion: 43 Resp: 20176

Ion	Ratio	Lower	Upper
43	100		
58	63.4	30.5	91.5

Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBS01

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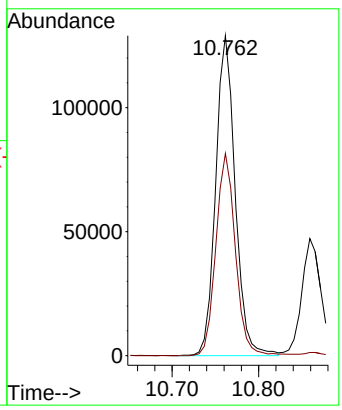
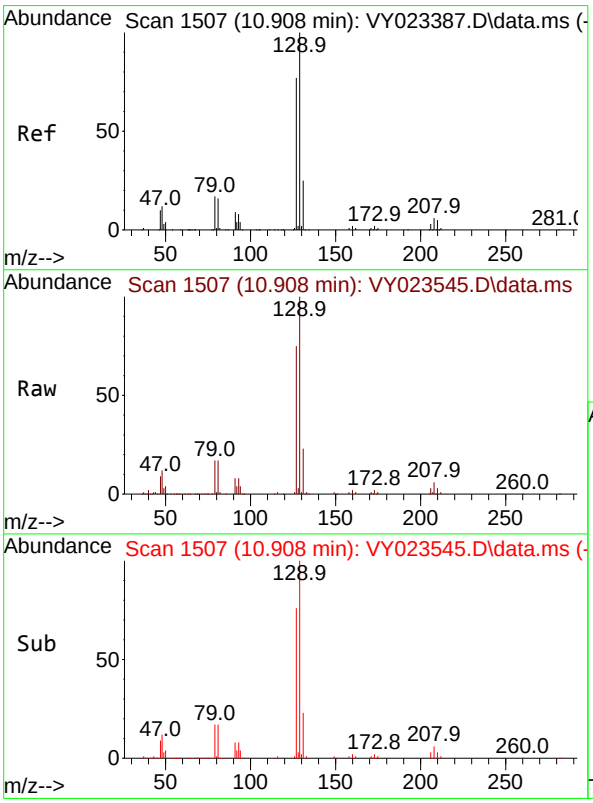
Supervised By :Mahesh Dadoda 10/24/2025

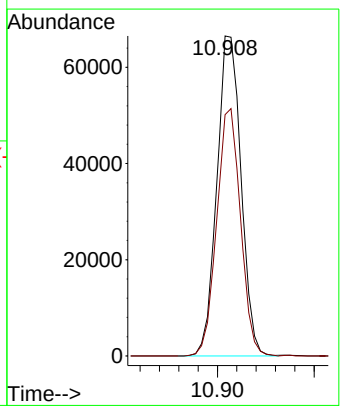


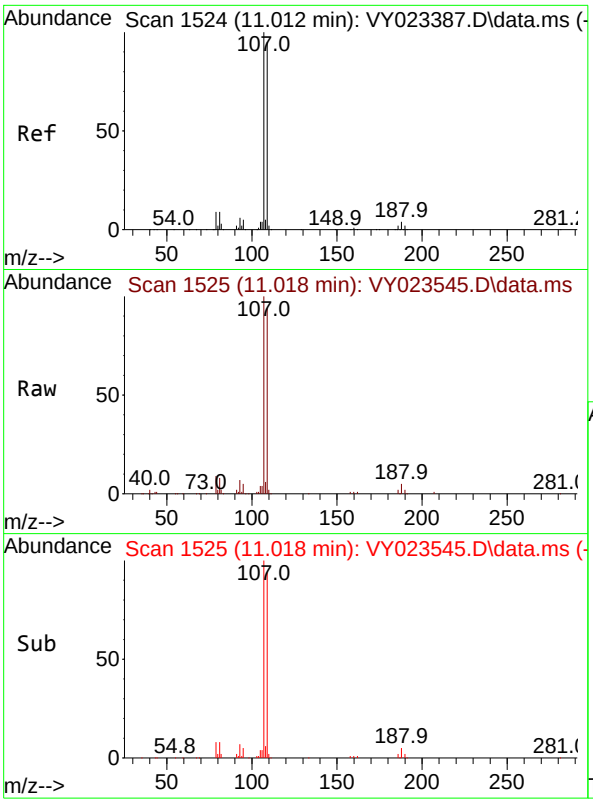


#60
Dibromochloromethane
Concen: 21.397 ug/l
RT: 10.908 min Scan# 1507
Delta R.T. -0.000 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion:129 Resp: 115294

Ion	Ratio	Lower	Upper
129	100		
127	76.1	38.6	115.7

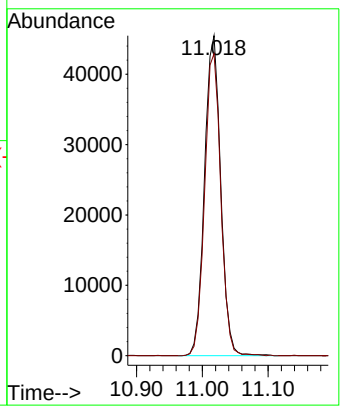




#61
1,2-Dibromoethane
Concen: 21.218 ug/l
RT: 11.018 min Scan# 1
Delta R.T. 0.006 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion:107 Resp: 7777

Ion	Ratio	Lower	Upper
107	100		
109	94.1	76.1	114.1



Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBS01

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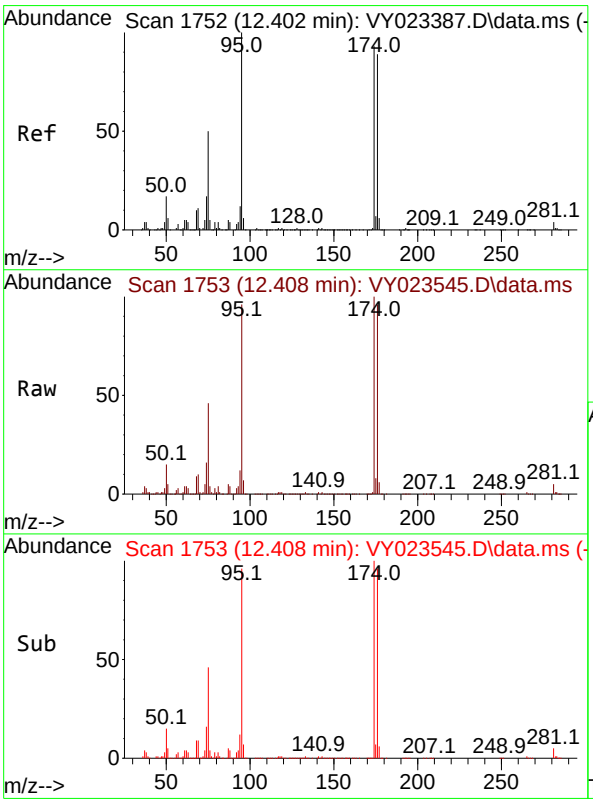
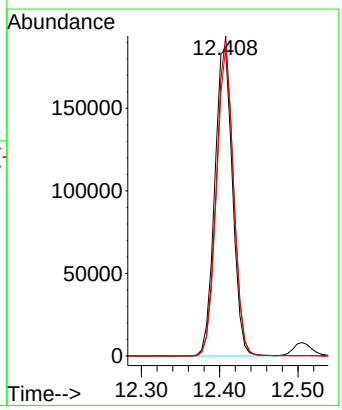
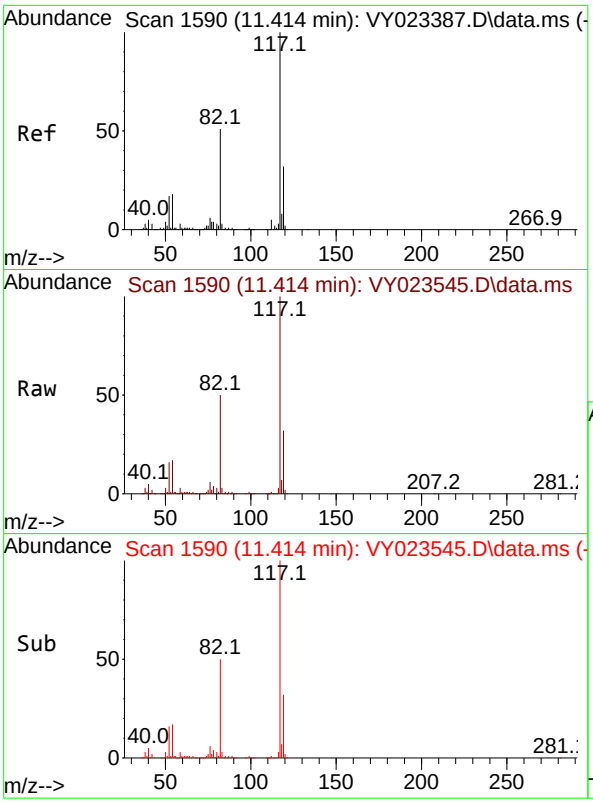


#62
4-Bromofluorobenzene
Concen: 49.281 ug/l
RT: 12.408 min Scan# 1753
Delta R.T. 0.006 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion: 95 Resp: 295724

Ion	Ratio	Lower	Upper
95	100		
174	98.8	0.0	192.8
176	95.7	0.0	187.6

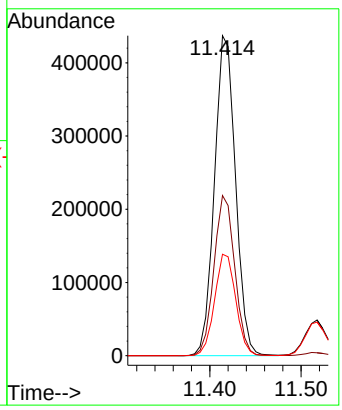




#63
Chlorobenzene-d5
Concen: 50.000 ug/l
RT: 11.414 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion:117 Resp: 70013

Ion	Ratio	Lower	Upper
117	100		
82	50.1	41.0	61.4
119	31.7	25.6	38.4



Instrument :
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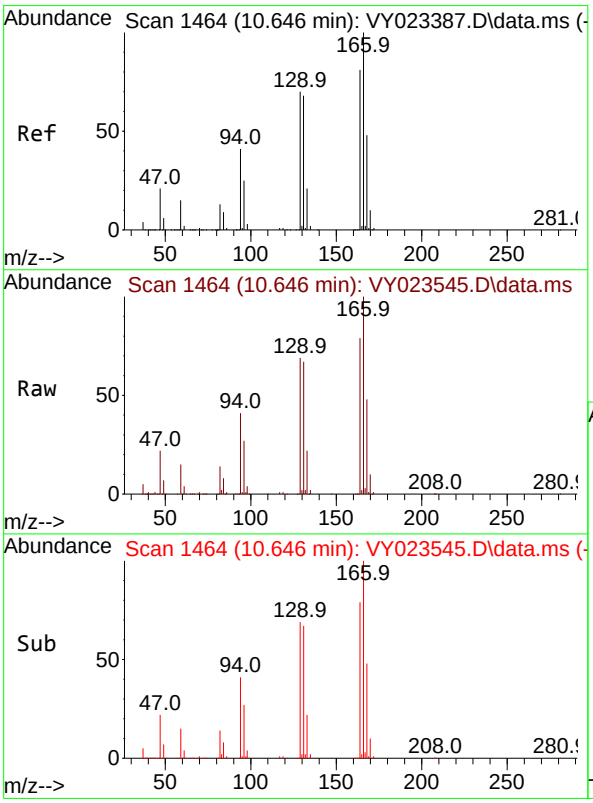
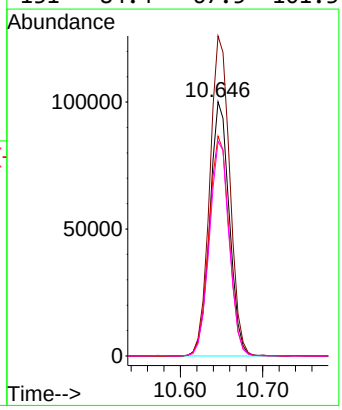
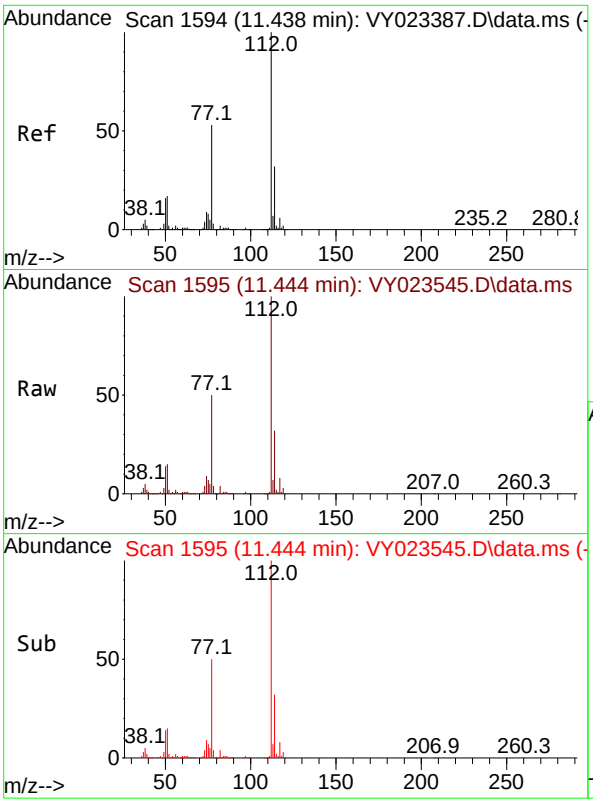


#64
Tetrachloroethene
Concen: 22.850 ug/l
RT: 10.646 min Scan# 1464
Delta R.T. -0.000 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion:164 Resp: 165184

Ion	Ratio	Lower	Upper
164	100		
166	125.9	99.4	149.0
129	86.5	69.4	104.2
131	84.4	67.5	101.3

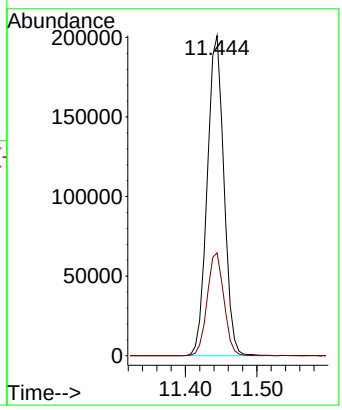




#65
Chlorobenzene
Concen: 21.371 ug/l
RT: 11.444 min Scan# 1
Delta R.T. 0.006 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion:112 Resp: 32543

Ion	Ratio	Lower	Upper
112	100		
114	32.1	25.6	38.4



Instrument :
MSVOA_Y
ClientSampleId :
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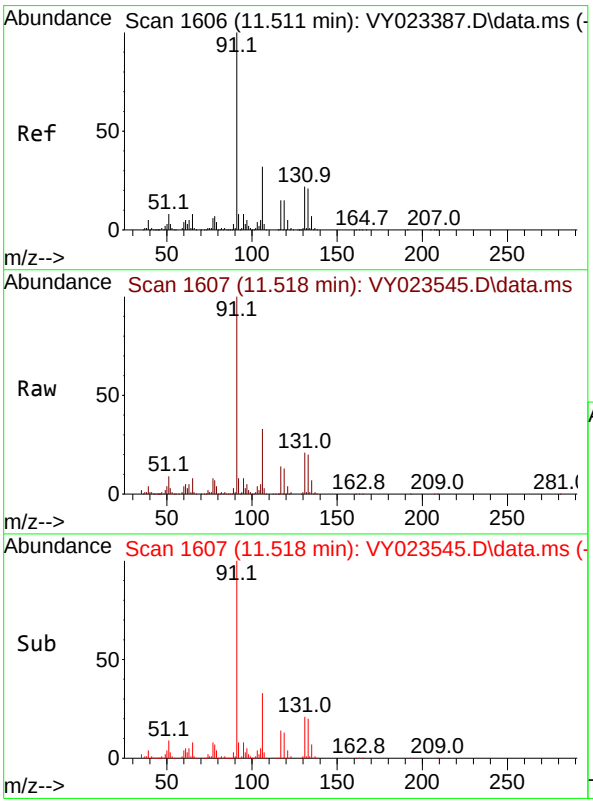
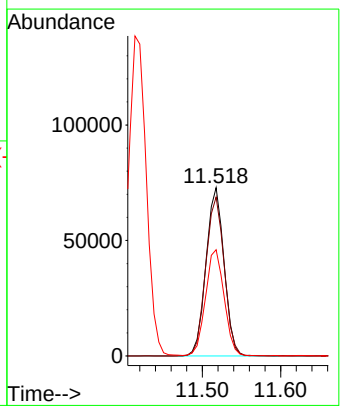
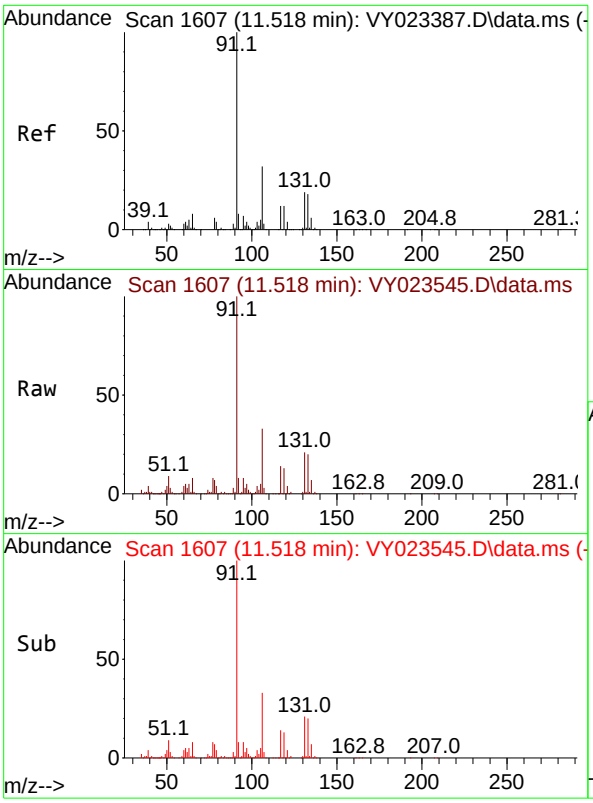


#66
1,1,1,2-Tetrachloroethane
Concen: 21.452 ug/l
RT: 11.518 min Scan# 1607
Delta R.T. 0.006 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion:131 Resp: 116407

Ion	Ratio	Lower	Upper
131	100		
133	96.9	48.4	145.2
119	65.4	32.4	97.2

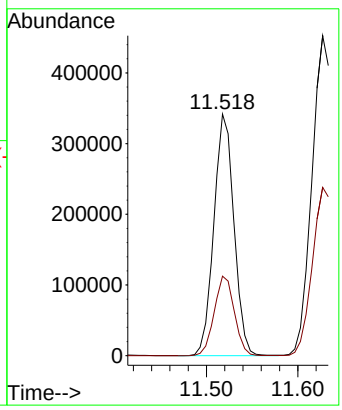




#67
Ethyl Benzene
Concen: 21.179 ug/l
RT: 11.518 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion: 91 Resp: 52203

Ion	Ratio	Lower	Upper
91	100		
106	32.9	25.8	38.8



Instrument :
MSVOA_Y
ClientSampleId :
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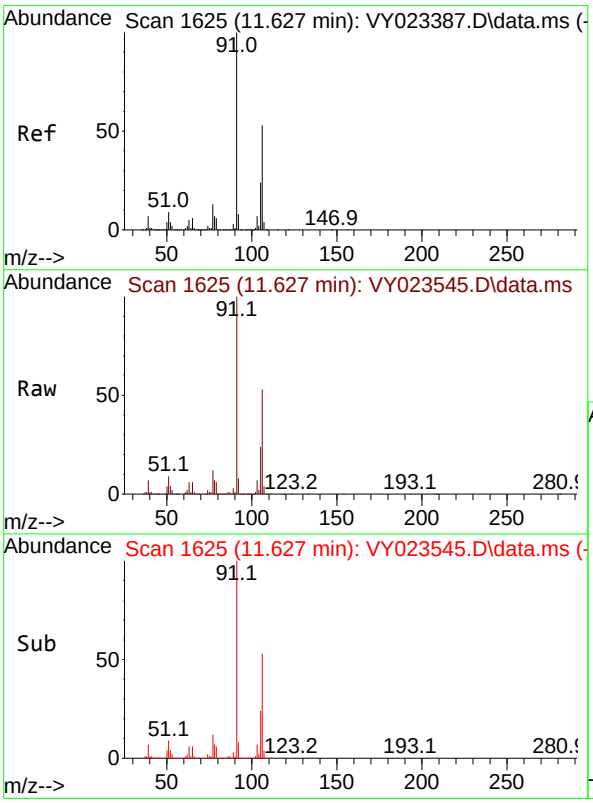
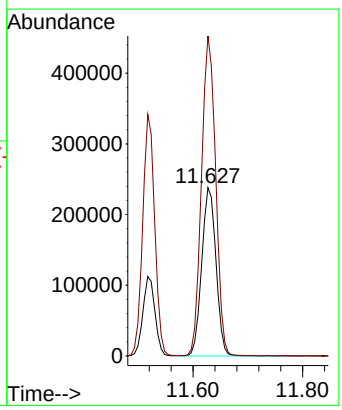
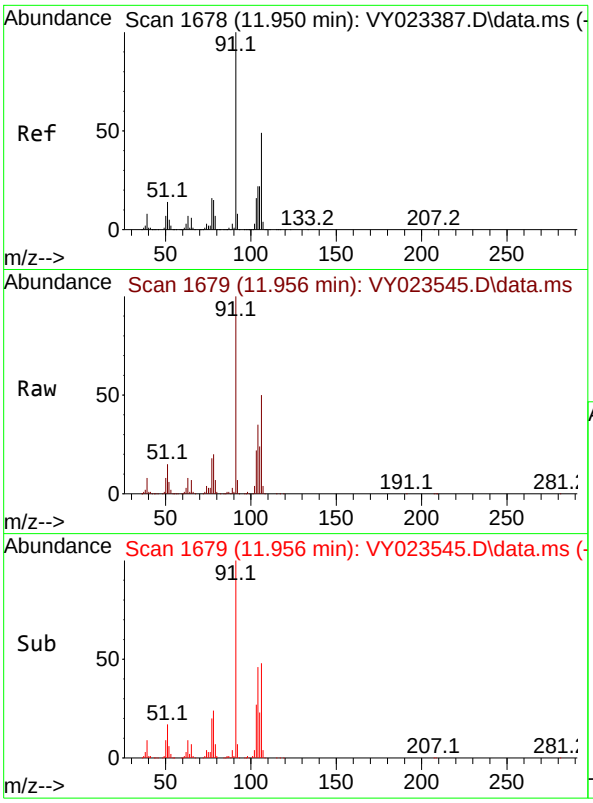


#68
m/p-Xylenes
Concen: 43.322 ug/l
RT: 11.627 min Scan# 1625
Delta R.T. -0.000 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion:106 Resp: 428308

Ion	Ratio	Lower	Upper
106	100		
91	189.4	152.6	229.0

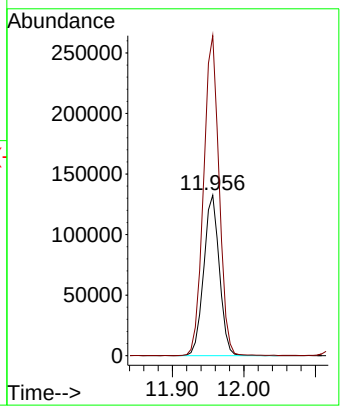




#69
o-Xylene
Concen: 21.646 ug/l
RT: 11.956 min Scan# 1
Delta R.T. 0.006 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion:106 Resp: 20073

Ion	Ratio	Lower	Upper
106	100		
91	198.5	101.4	304.1



Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBS01

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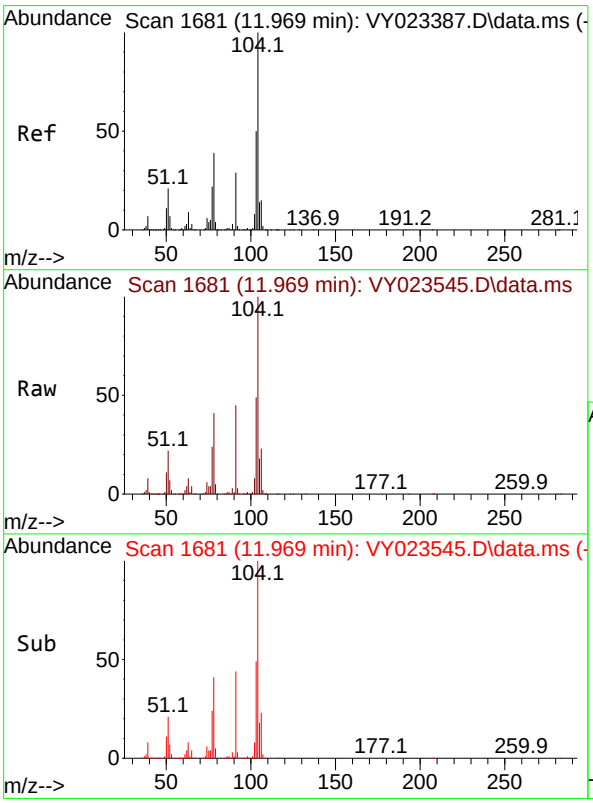
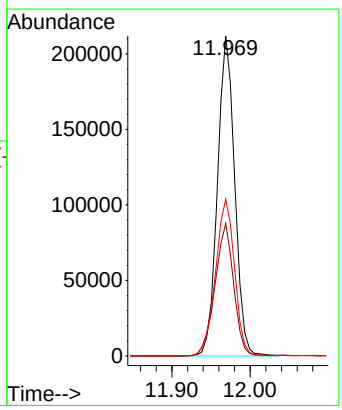
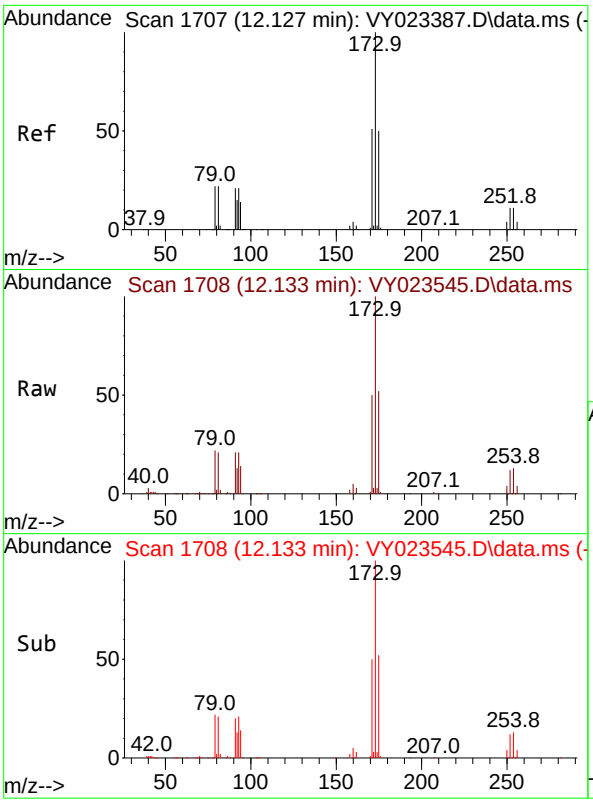


#70
Styrene
Concen: 21.324 ug/l
RT: 11.969 min Scan# 1681
Delta R.T. -0.000 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion:104 Resp: 325186

Ion	Ratio	Lower	Upper
104	100		
78	44.8	36.1	54.1
103	54.1	43.2	64.8

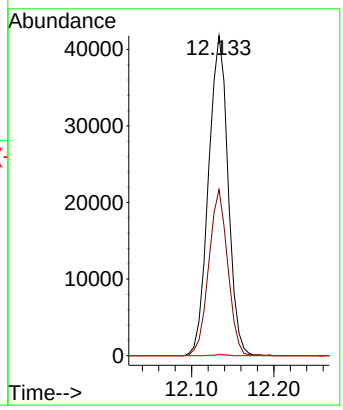




#71
Bromoform
Concen: 20.514 ug/l
RT: 12.133 min Scan# 1
Delta R.T. 0.006 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion:173 Resp: 6904

Ion	Ratio	Lower	Upper
173	100		
175	50.4	24.8	74.3
254	0.3	0.1	0.1



Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBS01

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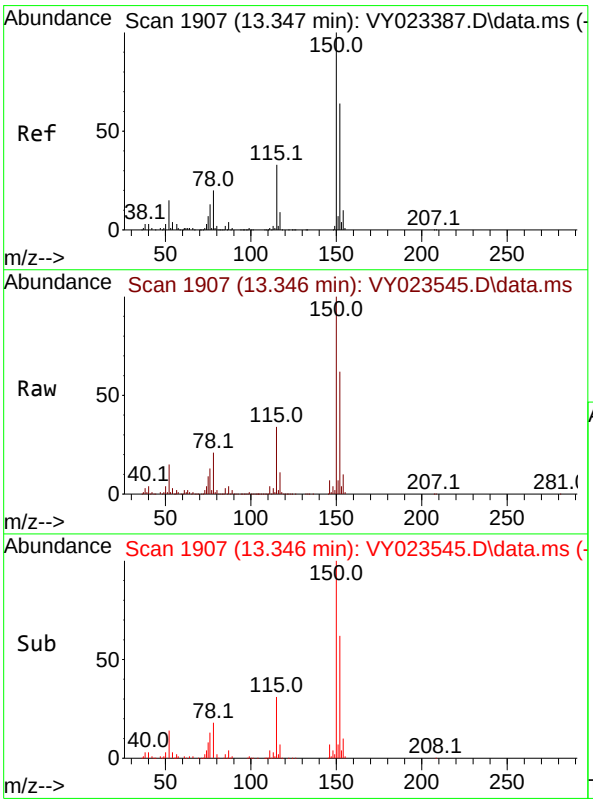
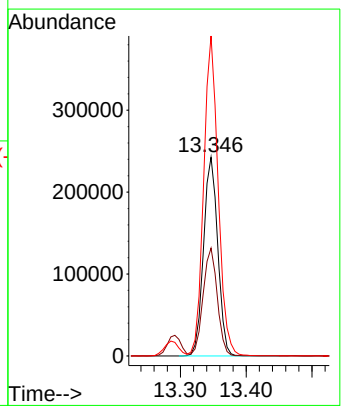
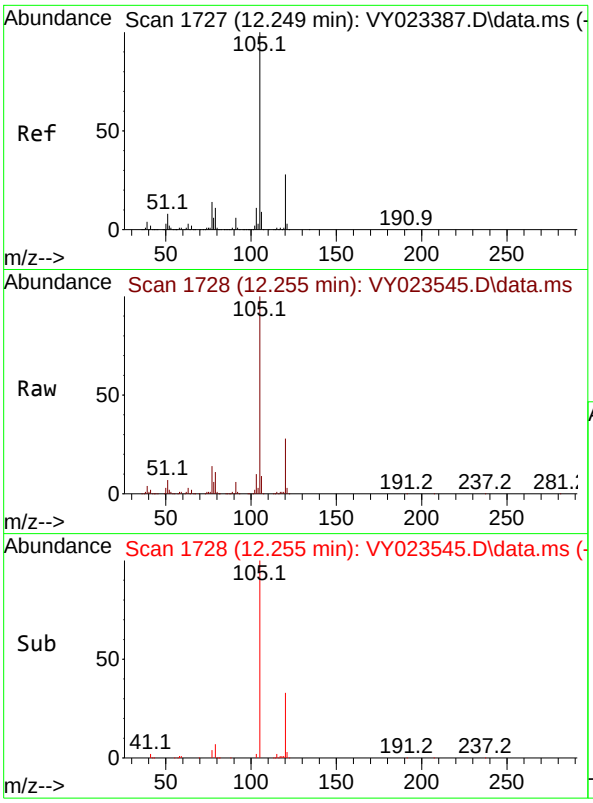


#72
1,4-Dichlorobenzene-d4
Concen: 50.000 ug/l
RT: 13.346 min Scan# 1907
Delta R.T. -0.000 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion:152 Resp: 365280

Ion	Ratio	Lower	Upper
152	100		
115	53.8	27.1	81.2
150	163.7	0.0	347.4

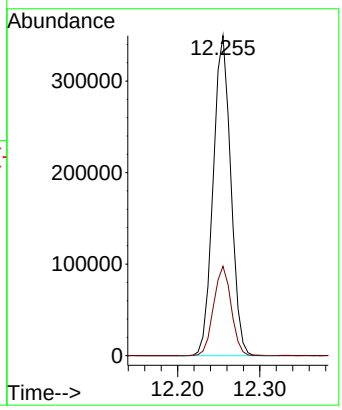




#73
Isopropylbenzene
Concen: 21.671 ug/l
RT: 12.255 min Scan# 1
Delta R.T. 0.006 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion:105 Resp: 52166

Ion	Ratio	Lower	Upper
105	100		
120	27.8	13.9	41.7



Instrument :
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ClientSampleId :
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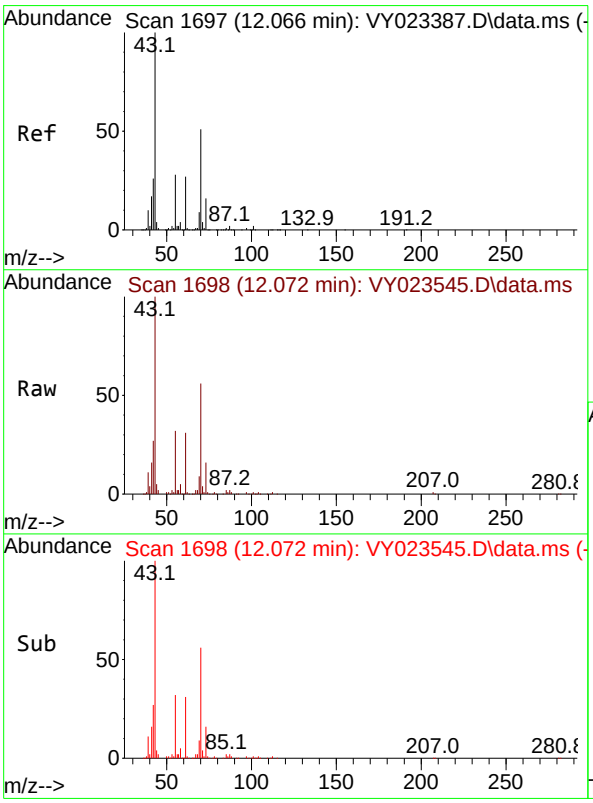
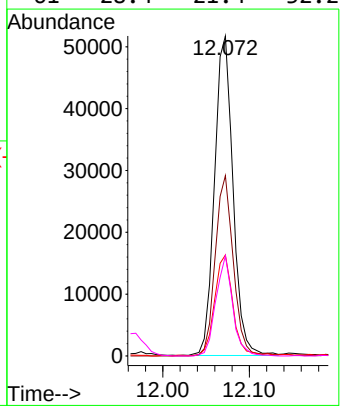
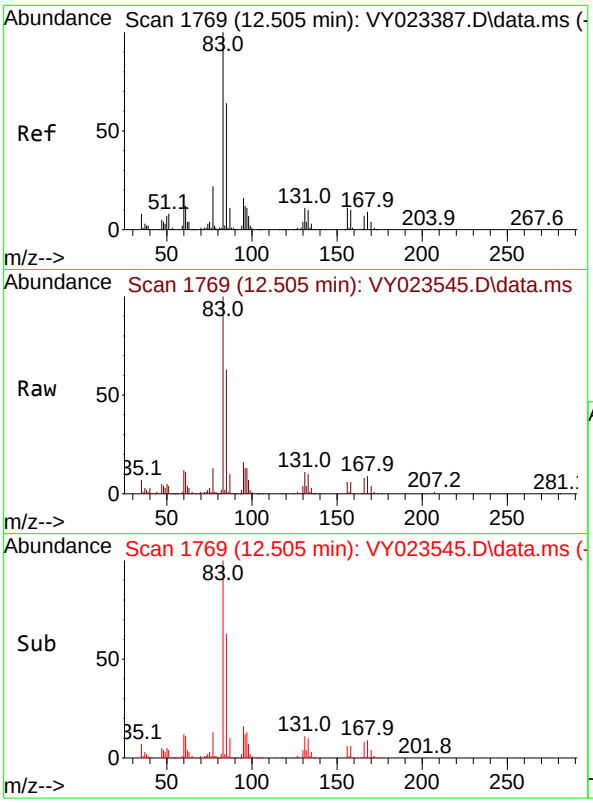


#74
N-amyl acetate
Concen: 17.731 ug/l
RT: 12.072 min Scan# 1698
Delta R.T. 0.006 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion: 43 Resp: 76665

Ion	Ratio	Lower	Upper
43	100		
70	55.8	41.1	61.7
55	30.9	23.0	34.6
61	28.4	21.4	32.2

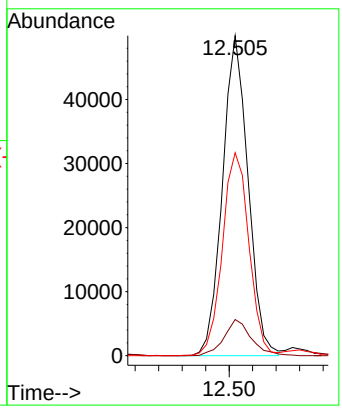




#75
1,1,2,2-Tetrachloroethane
Concen: 19.185 ug/l
RT: 12.505 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion: 83 Resp: 7553

Ion	Ratio	Lower	Upper
83	100		
131	12.0	5.9	17.6
85	65.8	31.8	95.3



Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBS01

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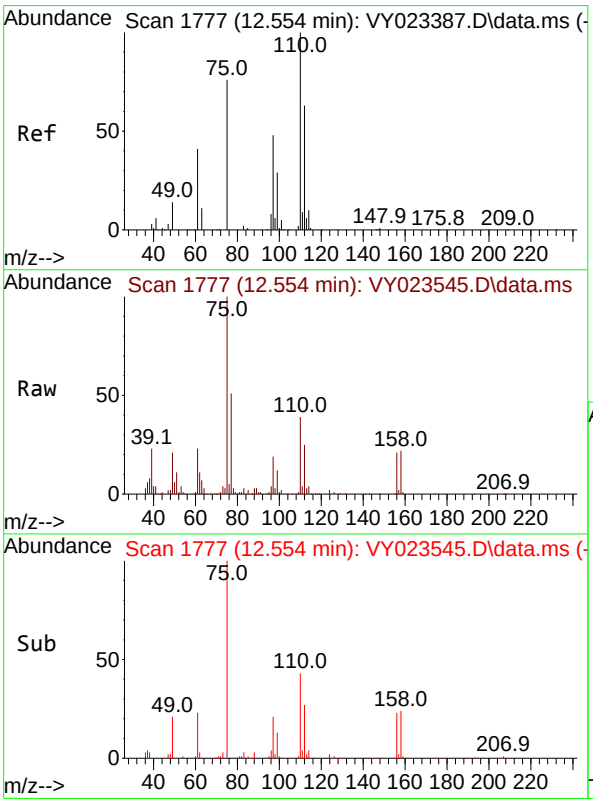
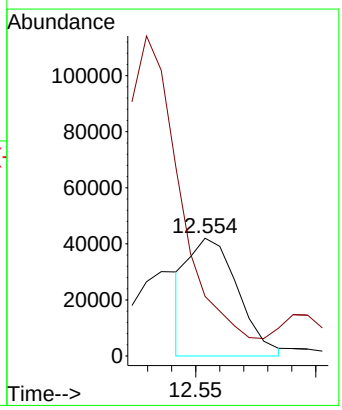
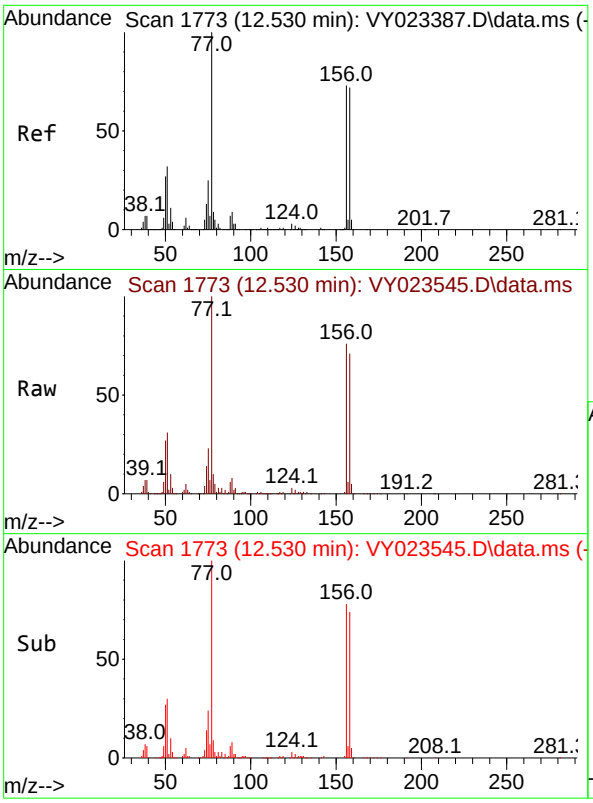


#76
1,2,3-Trichloropropane
Concen: 18.739 ug/l m
RT: 12.554 min Scan# 1777
Delta R.T. -0.000 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion: 75 Resp: 60391

Ion	Ratio	Lower	Upper
75	100		
77	0.0	0.0	0.0

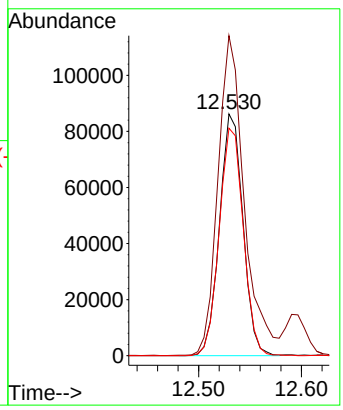




#77
Bromobenzene
Concen: 21.307 ug/l
RT: 12.530 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion:156 Resp: 13636

Ion	Ratio	Lower	Upper
156	100		
77	149.0	76.8	230.5
158	96.9	49.0	147.2



Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBS01

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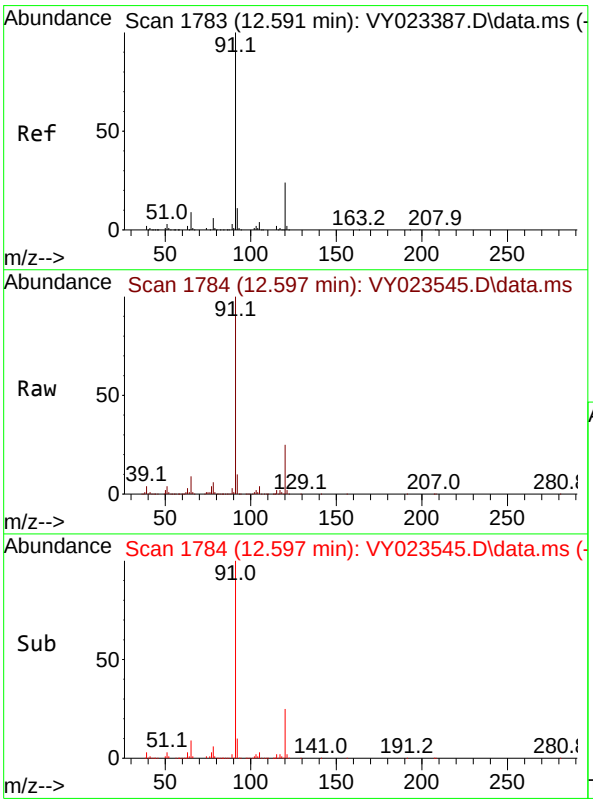
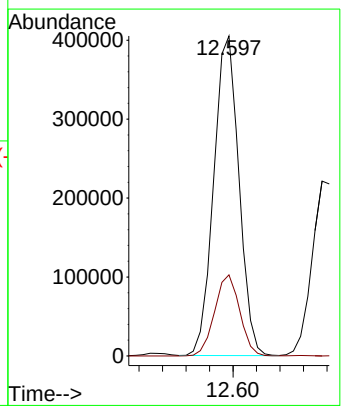
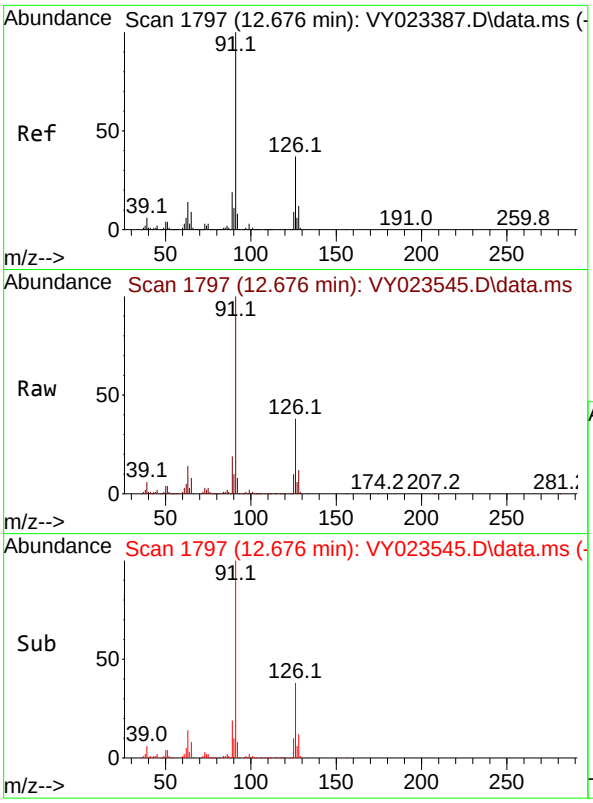


#78
n-propylbenzene
Concen: 21.651 ug/l
RT: 12.597 min Scan# 1784
Delta R.T. 0.006 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion: 91 Resp: 603121

Ion	Ratio	Lower	Upper
91	100		
120	25.2	12.3	36.8





#79
2-Chlorotoluene
Concen: 21.335 ug/l
RT: 12.676 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion: 91 Resp: 34803

Ion	Ratio	Lower	Upper
91	100		
126	37.8	18.5	55.5

Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBS01

Manual Integrations
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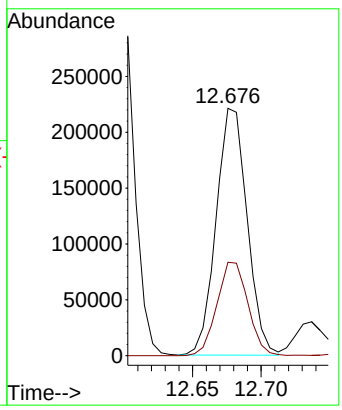
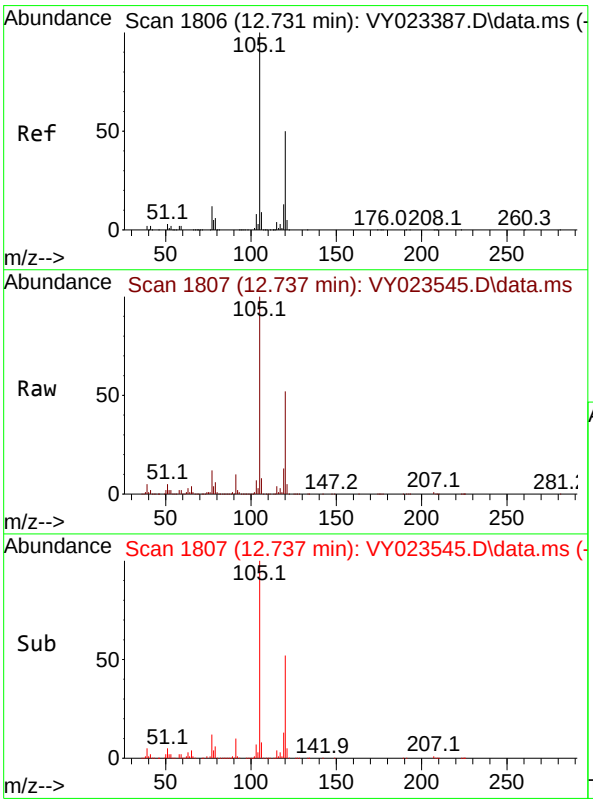
Reviewed By :Amit Patel 10/24/2025
Supervised By :Mahesh Dadoda 10/24/2025

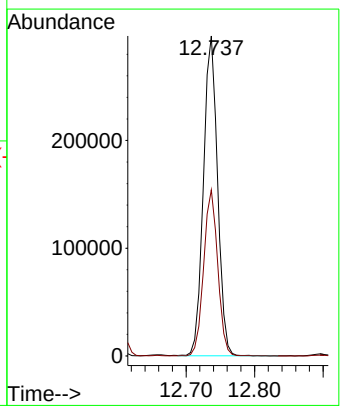


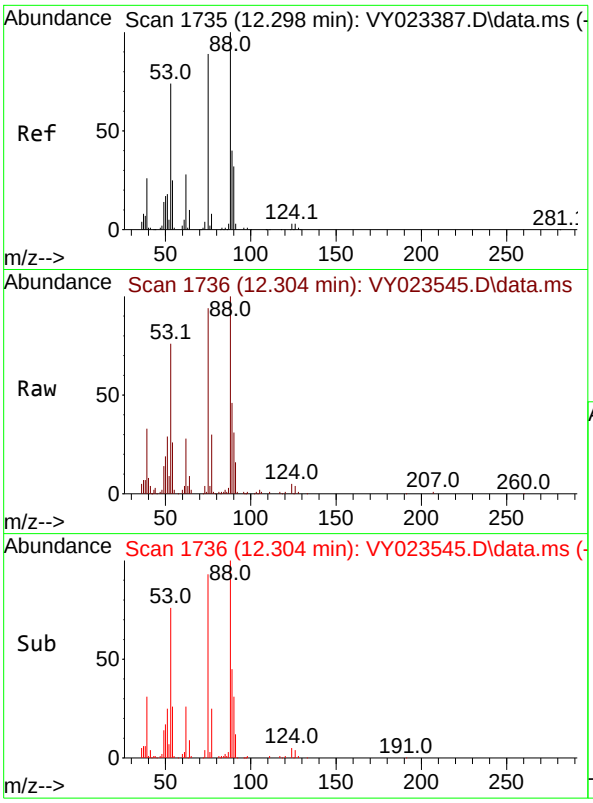


#80
1,3,5-Trimethylbenzene
Concen: 21.935 ug/l
RT: 12.737 min Scan# 1807
Delta R.T. 0.006 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion:105 Resp: 426677

Ion	Ratio	Lower	Upper
105	100		
120	51.8	25.4	76.4

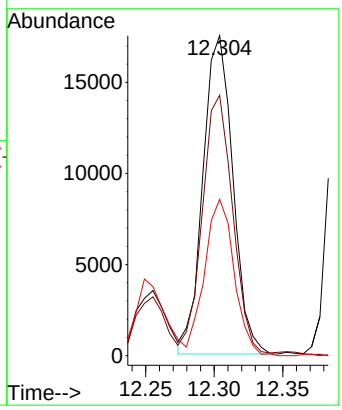




#81
trans-1,4-Dichloro-2-butene
Concen: 20.178 ug/l
RT: 12.304 min Scan# 1
Delta R.T. 0.006 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion: 75 Resp: 2651

Ion	Ratio	Lower	Upper
75	100		
53	81.9	68.6	102.8
89	48.4	39.0	58.4



Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBS01

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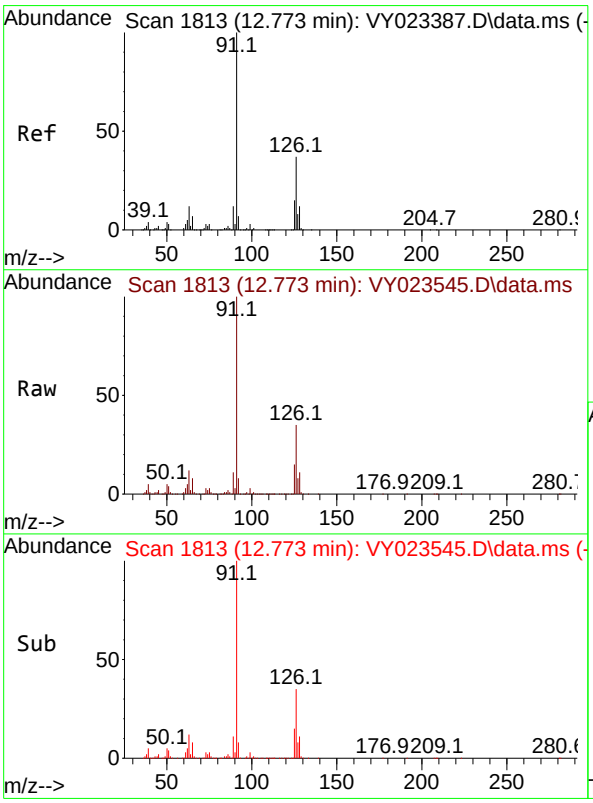
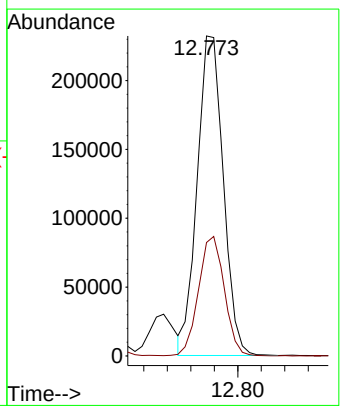
Supervised By :Mahesh Dadoda 10/24/2025

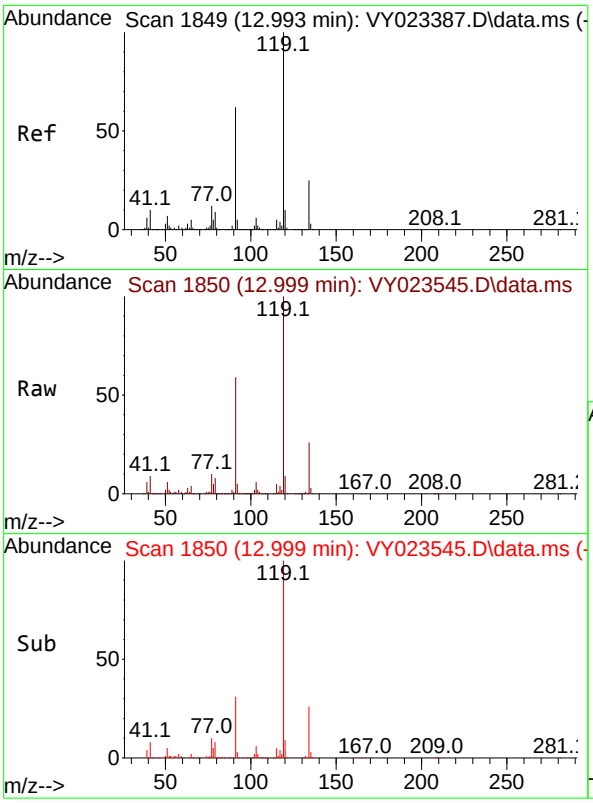


#82
4-Chlorotoluene
Concen: 21.322 ug/l
RT: 12.773 min Scan# 1813
Delta R.T. -0.000 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion: 91 Resp: 358213

Ion	Ratio	Lower	Upper
91	100		
126	37.0	18.4	55.4

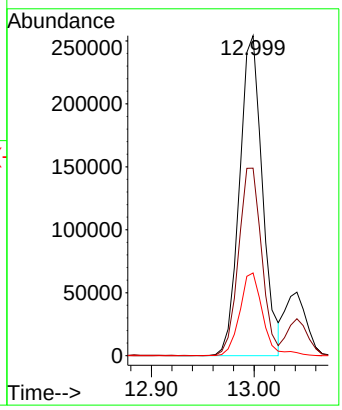




#83
tert-Butylbenzene
Concen: 21.889 ug/l
RT: 12.999 min Scan# 1
Delta R.T. 0.006 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion:119 Resp: 39312

Ion	Ratio	Lower	Upper
119	100		
91	59.2	29.9	89.8
134	26.1	12.9	38.7



Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBS01

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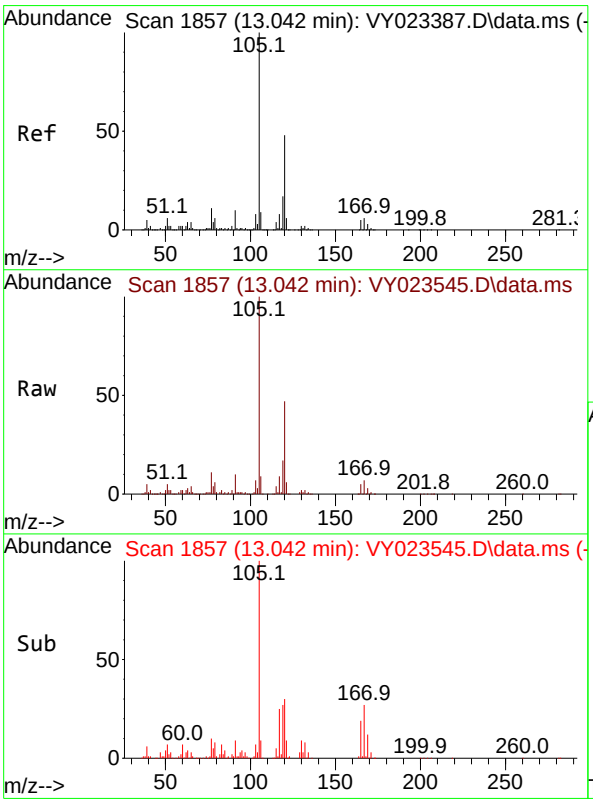
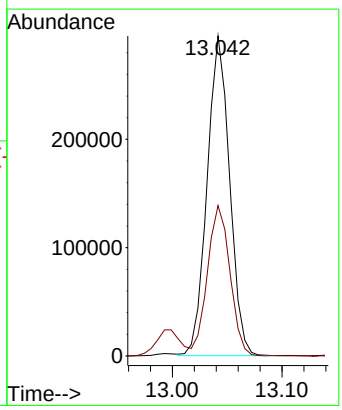
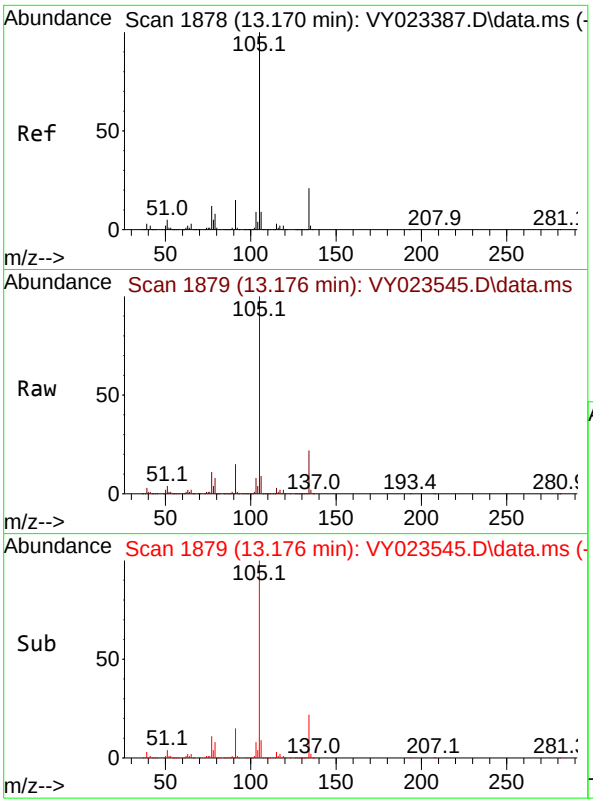


#84
1,2,4-Trimethylbenzene
Concen: 21.648 ug/l
RT: 13.042 min Scan# 1857
Delta R.T. -0.000 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion:105 Resp: 420267

Ion	Ratio	Lower	Upper
105	100		
120	47.1	23.8	71.2





#85
sec-Butylbenzene
Concen: 21.804 ug/l
RT: 13.176 min Scan# 1
Delta R.T. 0.006 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion:105 Resp: 56176

Ion	Ratio	Lower	Upper
105	100		
134	21.7	10.7	32.1

Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBS01

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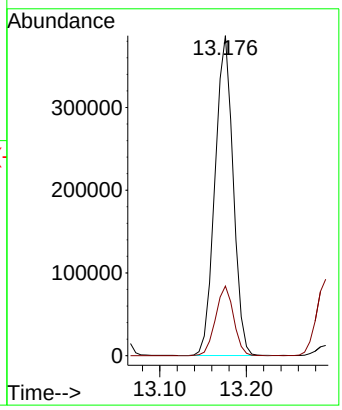
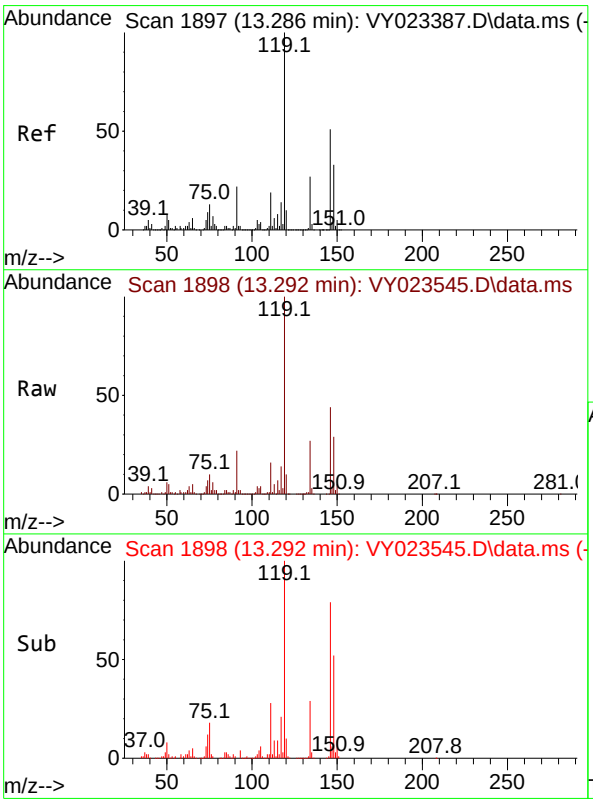
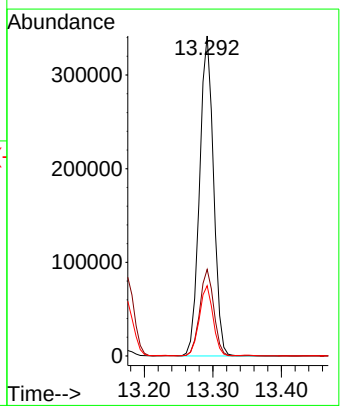


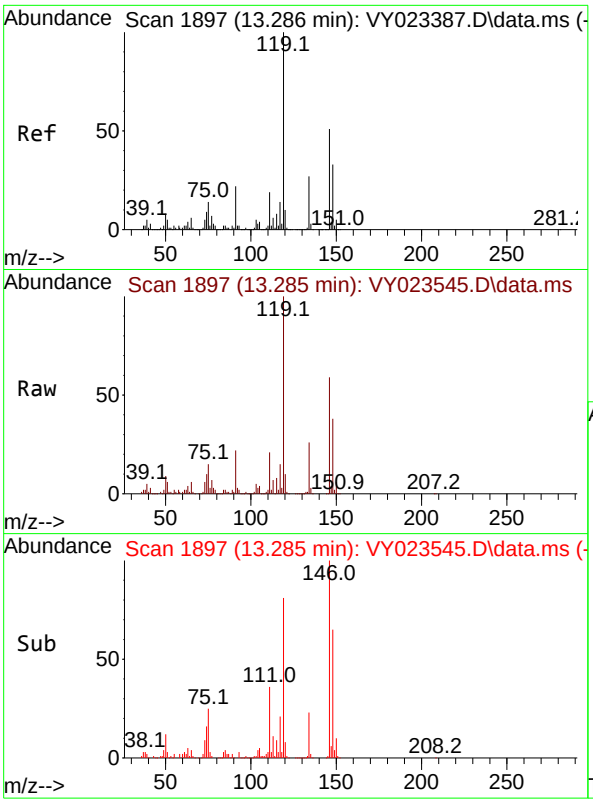


#86
p-Isopropyltoluene
Concen: 22.116 ug/l
RT: 13.292 min Scan# 1898
Delta R.T. 0.006 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion:119 Resp: 485141

Ion	Ratio	Lower	Upper
119	100		
134	27.1	13.6	40.7
91	21.5	10.9	32.9

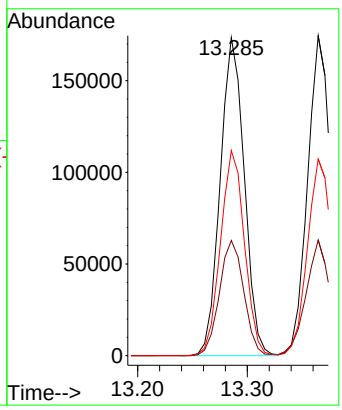




#87
1,3-Dichlorobenzene
Concen: 21.270 ug/l
RT: 13.285 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion:146 Resp: 26506

Ion	Ratio	Lower	Upper
146	100		
111	36.7	18.7	56.1
148	64.2	31.9	95.9



Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBS01

Manual Integrations
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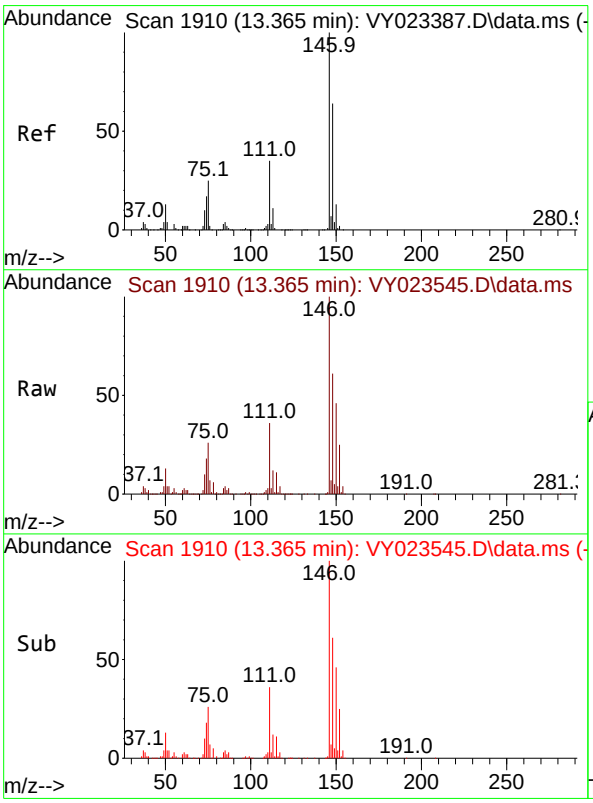
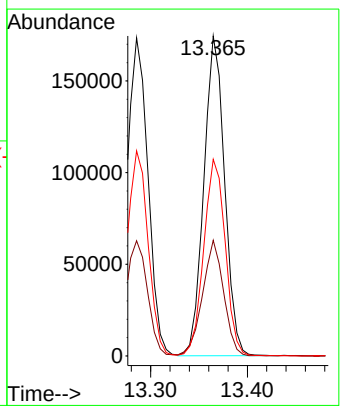
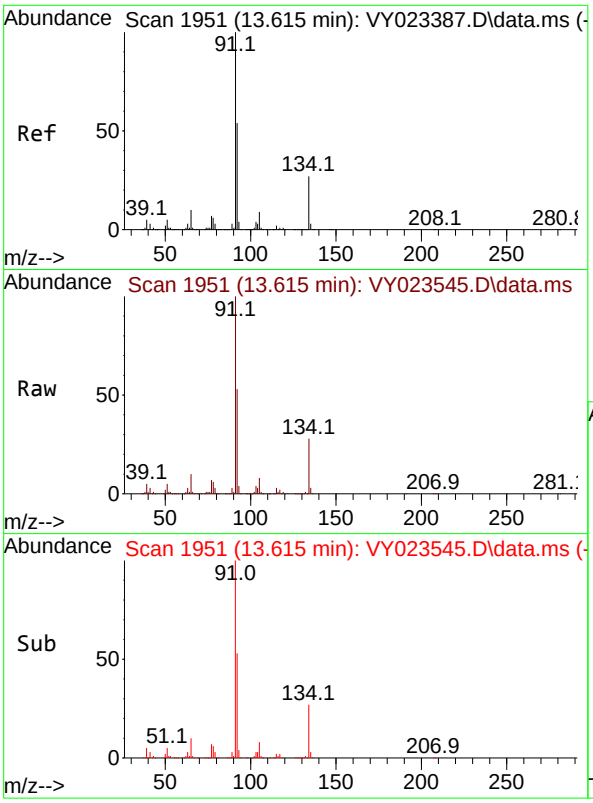


#88
1,4-Dichlorobenzene
Concen: 21.147 ug/l
RT: 13.365 min Scan# 1910
Delta R.T. -0.000 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion:146 Resp: 260280

Ion	Ratio	Lower	Upper
146	100		
111	36.9	18.0	54.0
148	63.7	31.9	95.7

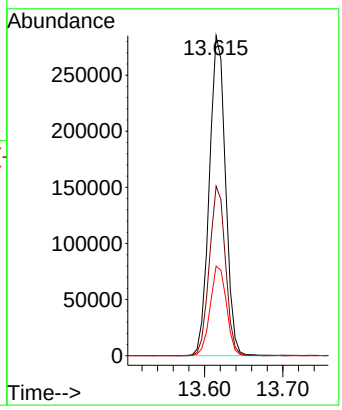




#89
n-Butylbenzene
Concen: 21.317 ug/l
RT: 13.615 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion: 91 Resp: 40743

Ion	Ratio	Lower	Upper
91	100		
92	52.8	27.0	80.8
134	28.3	14.1	42.2



Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBS01

Manual Integrations
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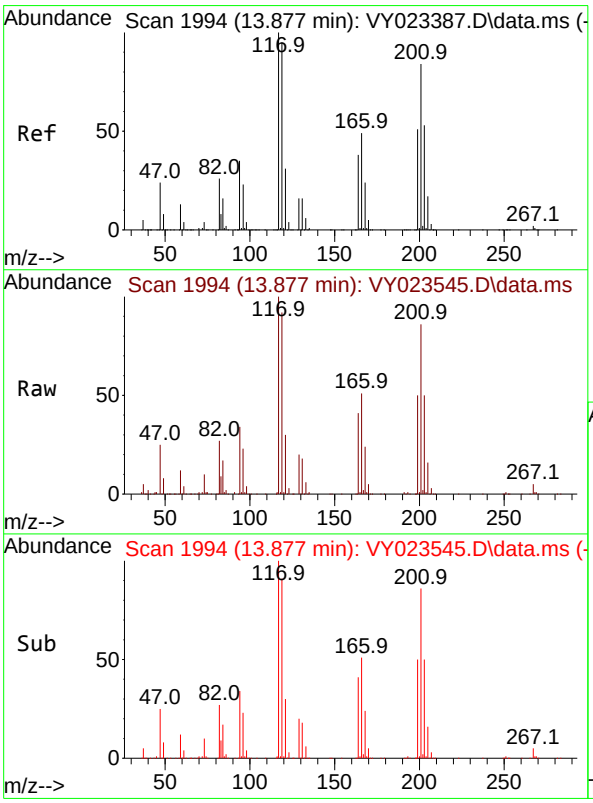
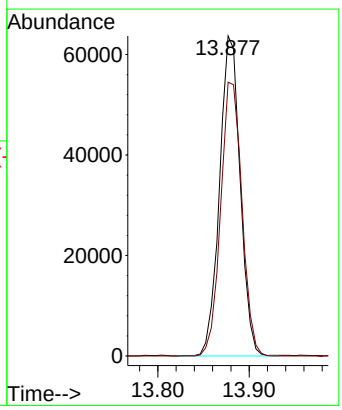
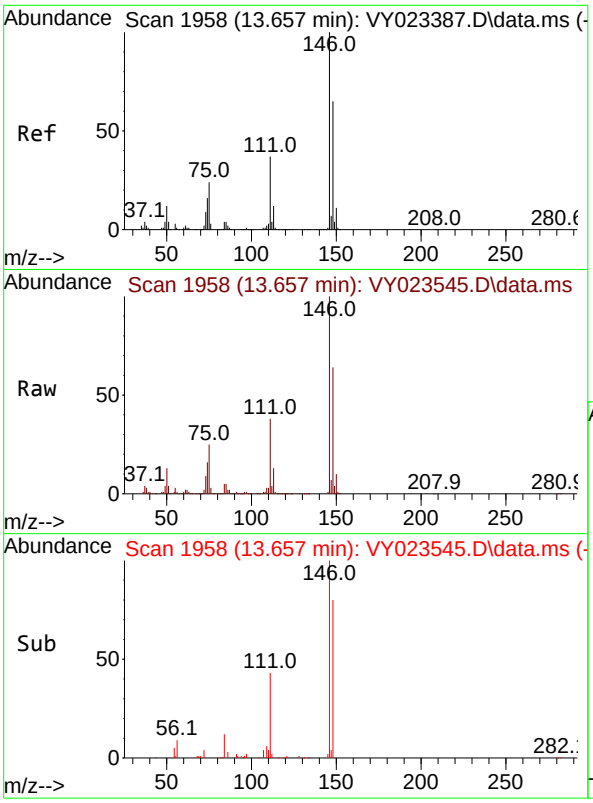


#90
Hexachloroethane
Concen: 21.199 ug/l
RT: 13.877 min Scan# 1994
Delta R.T. -0.000 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion:117 Resp: 100017

Ion	Ratio	Lower	Upper
117	100		
201	88.2	43.8	131.4

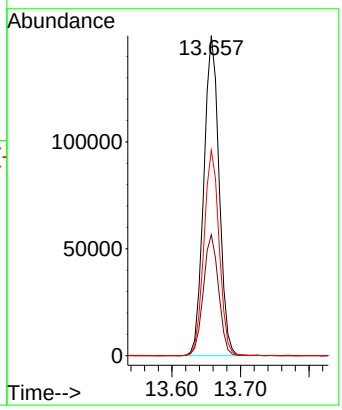




#91
1,2-Dichlorobenzene
Concen: 21.264 ug/l
RT: 13.657 min Scan# 1
Delta R.T. -0.000 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion:146 Resp: 23232

Ion	Ratio	Lower	Upper
146	100		
111	37.7	19.0	57.0
148	64.1	32.1	96.3



Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBS01

Manual Integrations
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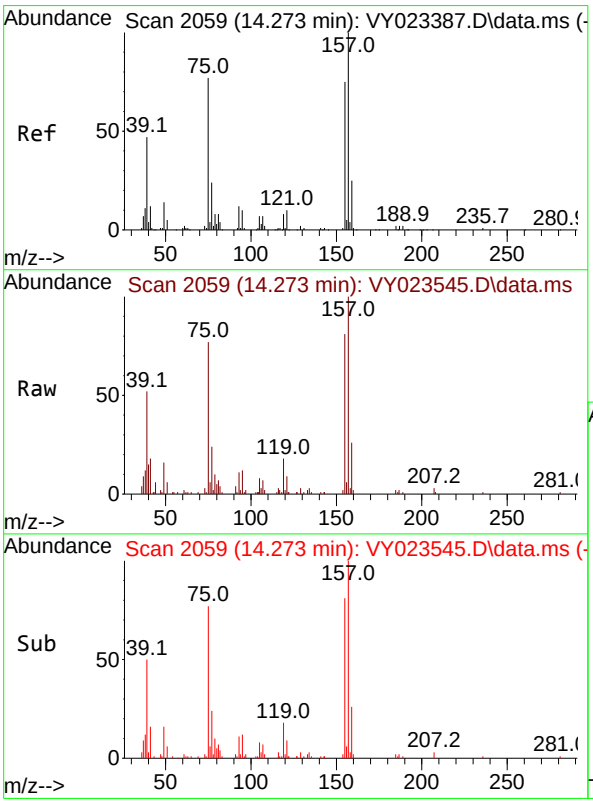
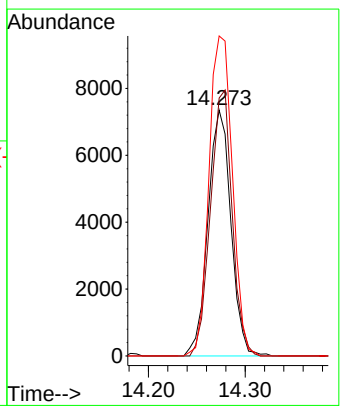
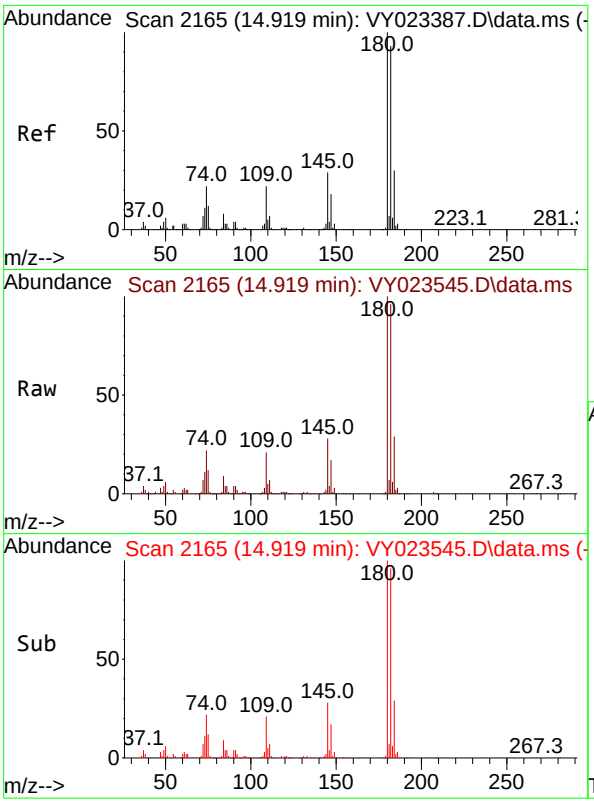


#92
1,2-Dibromo-3-Chloropropane
Concen: 18.756 ug/l
RT: 14.273 min Scan# 2059
Delta R.T. -0.000 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion: 75 Resp: 12117

Ion	Ratio	Lower	Upper
75	100		
155	102.3	50.0	150.0
157	132.5	63.8	191.5

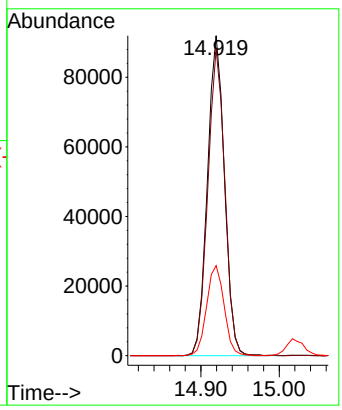




#93
1,2,4-Trichlorobenzene
Concen: 20.394 ug/l
RT: 14.919 min Scan# 2
Delta R.T. -0.000 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion:180 Resp: 13891

Ion	Ratio	Lower	Upper
180	100		
182	95.6	47.9	143.6
145	28.9	14.7	44.1



Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBS01

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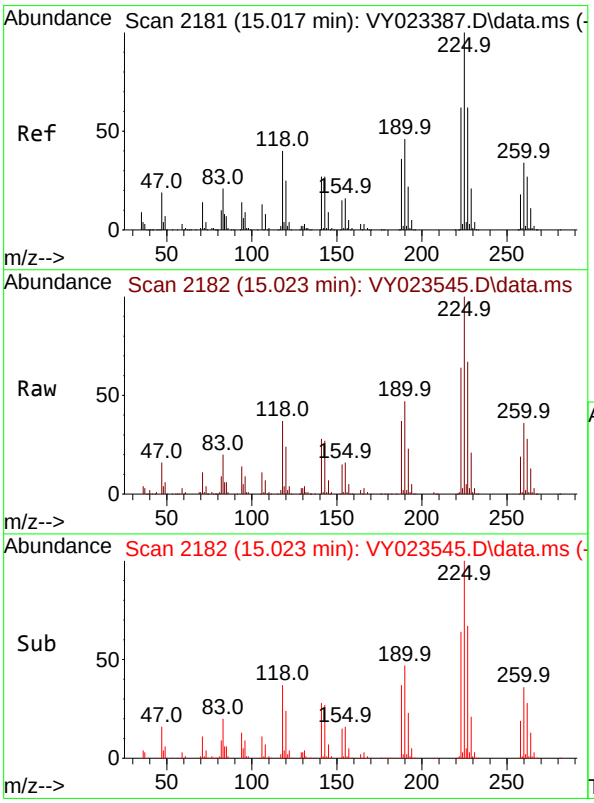
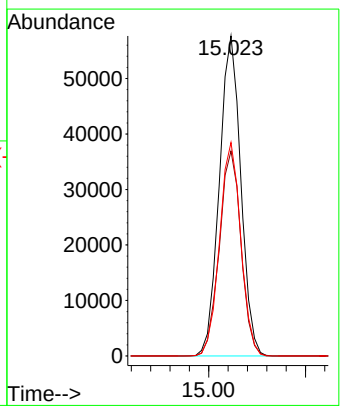
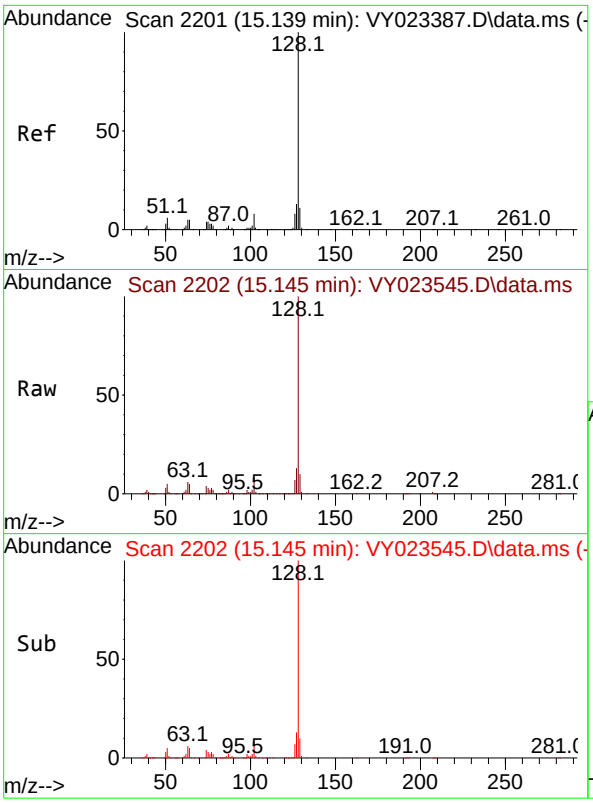


#94
Hexachlorobutadiene
Concen: 20.897 ug/l
RT: 15.023 min Scan# 2182
Delta R.T. 0.006 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion:225 Resp: 88730

Ion	Ratio	Lower	Upper
225	100		
223	64.5	30.8	92.3
227	66.0	31.9	95.7

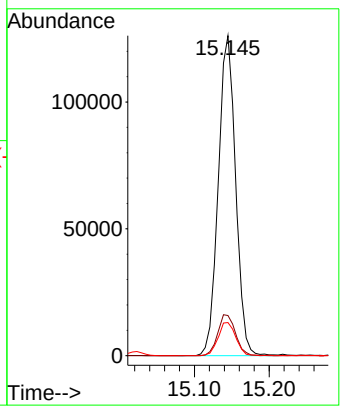




#95
Naphthalene
Concen: 18.822 ug/l
RT: 15.145 min Scan# 2
Delta R.T. 0.006 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion:128 Resp: 20415

Ion	Ratio	Lower	Upper
128	100		
127	13.1	10.4	15.6
129	10.6	8.9	13.3



Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBS01

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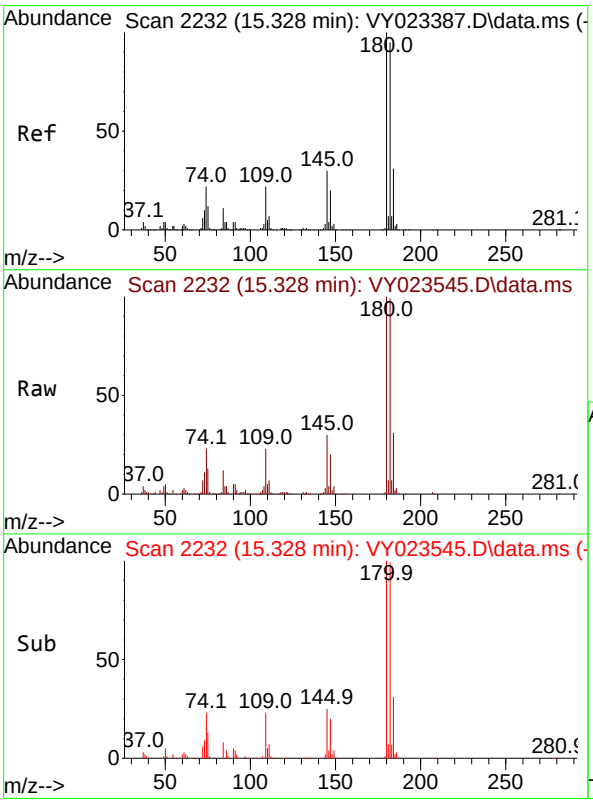
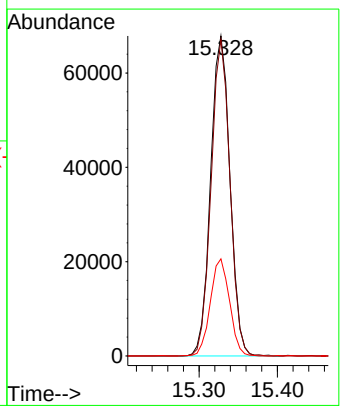


#96
1,2,3-Trichlorobenzene
Concen: 19.751 ug/l
RT: 15.328 min Scan# 2232
Delta R.T. -0.000 min
Lab File: VY023545.D
Acq: 22 Oct 2025 10:28

Tgt Ion:180 Resp: 116532

Ion	Ratio	Lower	Upper
180	100		
182	96.2	47.9	143.8
145	30.1	15.3	45.9



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

Report of Analysis

Client:	AECOM	Date Collected:	
Project:	AE1-CTY 3.2.Z-PR-DOCK-Des-ODC - 60693795-1719206	Date Received:	
Client Sample ID:	VY1022SBSD01	SDG No.:	Q3424
Lab Sample ID:	VY1022SBSD01	Matrix:	SOIL
Analytical Method:	8260D	Level : LOW	% Solid: 100
Sample Wt/Vol:	5 g	Final Vol: 5000 uL	Test: VOC-TCLVOA-10

CAS Number	Parameter	Conc.	Qua.	DF	MDL	LOQ / CRQL	Units	Date Ana.	BatchID
TARGETS									
75-71-8	Dichlorodifluoromethane	19.5		1	1.10	5.00	ug/Kg	10/22/25 10:51	VY102225
74-87-3	Chloromethane	17.5		1	1.10	5.00	ug/Kg	10/22/25 10:51	VY102225
75-01-4	Vinyl Chloride	18.3		1	0.79	5.00	ug/Kg	10/22/25 10:51	VY102225
74-83-9	Bromomethane	19.0		1	1.10	5.00	ug/Kg	10/22/25 10:51	VY102225
75-00-3	Chloroethane	18.9		1	1.30	5.00	ug/Kg	10/22/25 10:51	VY102225
75-69-4	Trichlorofluoromethane	19.5		1	1.20	5.00	ug/Kg	10/22/25 10:51	VY102225
76-13-1	1,1,2-Trichlorotrifluoroethane	20.4		1	1.10	5.00	ug/Kg	10/22/25 10:51	VY102225
75-35-4	1,1-Dichloroethene	19.9		1	1.00	5.00	ug/Kg	10/22/25 10:51	VY102225
67-64-1	Acetone	120		1	4.70	25.0	ug/Kg	10/22/25 10:51	VY102225
75-15-0	Carbon Disulfide	18.8		1	1.10	5.00	ug/Kg	10/22/25 10:51	VY102225
1634-04-4	Methyl tert-butyl Ether	19.3		1	0.73	5.00	ug/Kg	10/22/25 10:51	VY102225
79-20-9	Methyl Acetate	16.0		1	1.50	5.00	ug/Kg	10/22/25 10:51	VY102225
75-09-2	Methylene Chloride	18.0		1	3.50	10.0	ug/Kg	10/22/25 10:51	VY102225
156-60-5	trans-1,2-Dichloroethene	20.1		1	0.86	5.00	ug/Kg	10/22/25 10:51	VY102225
75-34-3	1,1-Dichloroethane	19.9		1	0.80	5.00	ug/Kg	10/22/25 10:51	VY102225
110-82-7	Cyclohexane	18.5		1	0.79	5.00	ug/Kg	10/22/25 10:51	VY102225
78-93-3	2-Butanone	110		1	6.50	25.0	ug/Kg	10/22/25 10:51	VY102225
56-23-5	Carbon Tetrachloride	20.5		1	0.97	5.00	ug/Kg	10/22/25 10:51	VY102225
156-59-2	cis-1,2-Dichloroethene	20.7		1	0.75	5.00	ug/Kg	10/22/25 10:51	VY102225
74-97-5	Bromochloromethane	19.3		1	1.20	5.00	ug/Kg	10/22/25 10:51	VY102225
67-66-3	Chloroform	20.6		1	0.84	5.00	ug/Kg	10/22/25 10:51	VY102225
71-55-6	1,1,1-Trichloroethane	20.7		1	0.93	5.00	ug/Kg	10/22/25 10:51	VY102225
108-87-2	Methylcyclohexane	20.0		1	0.91	5.00	ug/Kg	10/22/25 10:51	VY102225
71-43-2	Benzene	20.7		1	0.79	5.00	ug/Kg	10/22/25 10:51	VY102225
107-06-2	1,2-Dichloroethane	19.4		1	0.79	5.00	ug/Kg	10/22/25 10:51	VY102225
79-01-6	Trichloroethene	21.2		1	0.81	5.00	ug/Kg	10/22/25 10:51	VY102225
78-87-5	1,2-Dichloropropane	20.3		1	0.91	5.00	ug/Kg	10/22/25 10:51	VY102225
75-27-4	Bromodichloromethane	20.7		1	0.78	5.00	ug/Kg	10/22/25 10:51	VY102225
108-10-1	4-Methyl-2-Pentanone	91.4		1	3.60	25.0	ug/Kg	10/22/25 10:51	VY102225
108-88-3	Toluene	21.2		1	0.78	5.00	ug/Kg	10/22/25 10:51	VY102225
10061-02-6	t-1,3-Dichloropropene	20.1		1	0.65	5.00	ug/Kg	10/22/25 10:51	VY102225
10061-01-5	cis-1,3-Dichloropropene	20.4		1	0.62	5.00	ug/Kg	10/22/25 10:51	VY102225
79-00-5	1,1,2-Trichloroethane	21.2		1	0.92	5.00	ug/Kg	10/22/25 10:51	VY102225
591-78-6	2-Hexanone	100		1	3.70	25.0	ug/Kg	10/22/25 10:51	VY102225
124-48-1	Dibromochloromethane	20.7		1	0.87	5.00	ug/Kg	10/22/25 10:51	VY102225
106-93-4	1,2-Dibromoethane	20.5		1	0.88	5.00	ug/Kg	10/22/25 10:51	VY102225
127-18-4	Tetrachloroethene	22.3		1	1.10	5.00	ug/Kg	10/22/25 10:51	VY102225
108-90-7	Chlorobenzene	21.0		1	0.91	5.00	ug/Kg	10/22/25 10:51	VY102225
100-41-4	Ethyl Benzene	20.8		1	0.67	5.00	ug/Kg	10/22/25 10:51	VY102225
179601-23-1	m/p-Xylenes	42.2		1	1.20	10.0	ug/Kg	10/22/25 10:51	VY102225
95-47-6	o-Xylene	21.1		1	0.82	5.00	ug/Kg	10/22/25 10:51	VY102225
100-42-5	Styrene	21.2		1	0.71	5.00	ug/Kg	10/22/25 10:51	VY102225
75-25-2	Bromoform	20.3		1	0.86	5.00	ug/Kg	10/22/25 10:51	VY102225

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

Report of Analysis

Client:	AECOM	Date Collected:	
Project:	AE1-CTY 3.2.Z-PR-DOCK-Des-ODC - 60693795-1719206	Date Received:	
Client Sample ID:	VY1022SBSD01	SDG No.:	Q3424
Lab Sample ID:	VY1022SBSD01	Matrix:	SOIL
Analytical Method:	8260D	Level : LOW	% Solid: 100
Sample Wt/Vol:	5 g	Final Vol: 5000 uL	Test: VOC-TCLVOA-10

CAS Number	Parameter	Conc.	Qua.	DF	MDL	LOQ / CRQL	Units	Date Ana.	BatchID
98-82-8	Isopropylbenzene	20.8		1	0.78	5.00	ug/Kg	10/22/25 10:51	VY102225
79-34-5	1,1,2,2-Tetrachloroethane	19.2		1	1.20	5.00	ug/Kg	10/22/25 10:51	VY102225
541-73-1	1,3-Dichlorobenzene	20.8		1	1.70	5.00	ug/Kg	10/22/25 10:51	VY102225
106-46-7	1,4-Dichlorobenzene	20.7		1	1.60	5.00	ug/Kg	10/22/25 10:51	VY102225
95-50-1	1,2-Dichlorobenzene	20.9		1	1.50	5.00	ug/Kg	10/22/25 10:51	VY102225
96-12-8	1,2-Dibromo-3-Chloropropane	19.0		1	1.80	5.00	ug/Kg	10/22/25 10:51	VY102225
120-82-1	1,2,4-Trichlorobenzene	20.2		1	3.00	5.00	ug/Kg	10/22/25 10:51	VY102225
87-61-6	1,2,3-Trichlorobenzene	19.5		1	3.20	5.00	ug/Kg	10/22/25 10:51	VY102225
SURROGATES									
17060-07-0	1,2-Dichloroethane-d4	45.1			63 - 155	90%	SPK: 50		
1868-53-7	Dibromofluoromethane	49.3			70 - 134	99%	SPK: 50		
2037-26-5	Toluene-d8	48.6			74 - 123	97%	SPK: 50		
460-00-4	4-Bromofluorobenzene	48.7			17 - 146	97%	SPK: 50		
INTERNAL STANDARDS		**Area Count**							
363-72-4	Pentafluorobenzene	543000							
540-36-3	1,4-Difluorobenzene	794000							
3114-55-4	Chlorobenzene-d5	692000							
3855-82-1	1,4-Dichlorobenzene-d4	365000							

U = Not Detected
LOQ = Limit of Quantitation
MDL = Method Detection Limit
LOD = Limit of Detection
E = Value Exceeds Calibration Range
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
() = Laboratory InHouse Limit
A = Aldol-Condensation Reaction Products

Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY102225\
Data File : VY023546.D
Acq On : 22 Oct 2025 10:51
Operator : SY/MD
Sample : VY1022SBSD01
Misc : 5.00g/5.0mL/MSVOA_Y/SOIL
ALS Vial : 6 Sample Multiplier: 1

Quant Time: Oct 24 02:27:18 2025
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260
QLast Update : Wed Oct 08 05:12:50 2025
Response via : Initial Calibration

Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBSD01

Manual Integrations APPROVED
Reviewed By :Amit Patel 10/24/2025
Supervised By :Mahesh Dadoda 10/24/2025

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Pentafluorobenzene	7.713	168	542616	50.000	ug/l	0.00
34) 1,4-Difluorobenzene	8.616	114	794200	50.000	ug/l	0.00
63) Chlorobenzene-d5	11.414	117	691787	50.000	ug/l	0.00
72) 1,4-Dichlorobenzene-d4	13.346	152	364513	50.000	ug/l	0.00
System Monitoring Compounds						
33) 1,2-Dichloroethane-d4	8.067	65	204806	45.137	ug/l	0.00
Spiked Amount 50.000	Range 50 - 163		Recovery = 90.280%			
35) Dibromofluoromethane	7.634	113	240748	49.334	ug/l	0.00
Spiked Amount 50.000	Range 54 - 147		Recovery = 98.660%			
50) Toluene-d8	10.109	98	883426	48.611	ug/l	0.00
Spiked Amount 50.000	Range 58 - 134		Recovery = 97.220%			
62) 4-Bromofluorobenzene	12.402	95	292410	48.735	ug/l	0.00
Spiked Amount 50.000	Range 30 - 143		Recovery = 97.480%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	1.867	85	75983	19.455	ug/l	97
3) Chloromethane	2.074	50	92933	17.467	ug/l	99
4) Vinyl Chloride	2.208	62	126494	18.253	ug/l	98
5) Bromomethane	2.592	94	110374	18.979	ug/l	100
6) Chloroethane	2.739	64	89057	18.853	ug/l	97
7) Trichlorofluoromethane	3.056	101	187963	19.534	ug/l	100
8) Diethyl Ether	3.458	74	48922	19.457	ug/l	92
9) 1,1,2-Trichlorotrifluo...	3.818	101	101676	20.363	ug/l	99
10) Methyl Iodide	4.007	142	118807	21.373	ug/l	98
11) Tert butyl alcohol	4.860	59	31636	93.720	ug/l	94
12) 1,1-Dichloroethene	3.793	96	96256	19.887	ug/l	92
13) Acrolein	3.653	56	23721	49.732	ug/l	96
14) Allyl chloride	4.391	41	107766	18.269	ug/l	96
15) Acrylonitrile	5.067	53	88820	92.308	ug/l	99
16) Acetone	3.866	43	128229	118.706	ug/l	100
17) Carbon Disulfide	4.110	76	260315	18.791	ug/l	99
18) Methyl Acetate	4.385	43	45233	15.963	ug/l	99
19) Methyl tert-butyl Ether	5.122	73	224408	19.290	ug/l	95
20) Methylene Chloride	4.616	84	105150	18.001	ug/l	95
21) trans-1,2-Dichloroethene	5.116	96	106942	20.068	ug/l	98
22) Diisopropyl ether	6.019	45	250099	19.167	ug/l	93
23) Vinyl Acetate	5.964	43	664719	94.117	ug/l	98
24) 1,1-Dichloroethane	5.921	63	171993	19.899	ug/l	97
25) 2-Butanone	6.896	43	138738	105.202	ug/l	100
26) 2,2-Dichloropropane	6.884	77	161087	20.311	ug/l	99
27) cis-1,2-Dichloroethene	6.896	96	127379	20.693	ug/l	95
28) Bromochloromethane	7.250	49	62387	19.335	ug/l	93
29) Tetrahydrofuran	7.268	42	63173	84.474	ug/l	93
30) Chloroform	7.427	83	195371	20.573	ug/l	99
31) Cyclohexane	7.707	56	139704	18.508	ug/l	88
32) 1,1,1-Trichloroethane	7.622	97	178412	20.674	ug/l	98
36) 1,1-Dichloropropene	7.841	75	132638	20.530	ug/l	100
37) Ethyl Acetate	6.988	43	48392	18.907	ug/l	98
38) Carbon Tetrachloride	7.823	117	160505	20.489	ug/l	95
39) Methylcyclohexane	9.109	83	168002	19.972	ug/l	99
40) Benzene	8.085	78	423056	20.677	ug/l	100

Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY102225\
Data File : VY023546.D
Acq On : 22 Oct 2025 10:51
Operator : SY/MD
Sample : VY1022SBSD01
Misc : 5.00g/5.0mL/MSVOA_Y/SOIL
ALS Vial : 6 Sample Multiplier: 1

Quant Time: Oct 24 02:27:18 2025
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260
QLast Update : Wed Oct 08 05:12:50 2025
Response via : Initial Calibration

Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBSD01

Manual Integrations APPROVED

Reviewed By :Amit Patel 10/24/2025
Supervised By :Mahesh Dadoda 10/24/2025

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
41) Methacrylonitrile	7.220	41	23527	16.996	ug/l	88
42) 1,2-Dichloroethane	8.158	62	102298	19.387	ug/l	97
43) Isopropyl Acetate	8.201	43	92102	18.046	ug/l	98
44) Trichloroethene	8.866	130	126688	21.155	ug/l	98
45) 1,2-Dichloropropane	9.140	63	91803	20.314	ug/l	100
46) Dibromomethane	9.231	93	56943	19.927	ug/l	97
47) Bromodichloromethane	9.426	83	149048	20.710	ug/l	98
48) Methyl methacrylate	9.225	41	41870	17.463	ug/l	93
49) 1,4-Dioxane	9.231	88	12343	372.543	ug/l	98
51) 4-Methyl-2-Pentanone	10.000	43	240905	91.359	ug/l	98
52) Toluene	10.170	92	281449	21.186	ug/l	98
53) t-1,3-Dichloropropene	10.396	75	125699	20.087	ug/l	100
54) cis-1,3-Dichloropropene	9.859	75	150591	20.389	ug/l	96
55) 1,1,2-Trichloroethane	10.573	97	81403	21.184	ug/l	97
56) Ethyl methacrylate	10.438	69	84192	18.994	ug/l	95
57) 1,3-Dichloropropane	10.719	76	123408	20.266	ug/l	99
58) 2-Chloroethyl Vinyl ether	9.713	63	194748	98.074	ug/l	99
59) 2-Hexanone	10.762	43	193121	102.481	ug/l	97
60) Dibromochloromethane	10.908	129	111638	20.721	ug/l	100
61) 1,2-Dibromoethane	11.018	107	75216	20.524	ug/l	99
64) Tetrachloroethene	10.646	164	159402	22.316	ug/l	99
65) Chlorobenzene	11.444	112	315885	20.995	ug/l	100
66) 1,1,1,2-Tetrachloroethane	11.518	131	113849	21.234	ug/l	99
67) Ethyl Benzene	11.518	91	506760	20.807	ug/l	99
68) m/p-Xylenes	11.627	106	412583	42.235	ug/l	100
69) o-Xylene	11.957	106	193428	21.110	ug/l	98
70) Styrene	11.969	104	319023	21.173	ug/l	99
71) Bromoform	12.133	173	67370	20.257	ug/l	100
73) Isopropylbenzene	12.255	105	500033	20.816	ug/l	99
74) N-amyl acetate	12.072	43	76114	17.641	ug/l	97
75) 1,1,2,2-Tetrachloroethane	12.505	83	75476	19.210	ug/l	99
76) 1,2,3-Trichloropropane	12.554	75	68415m	21.273	ug/l	
77) Bromobenzene	12.530	156	135048	21.147	ug/l	95
78) n-propylbenzene	12.597	91	582648	20.960	ug/l	99
79) 2-Chlorotoluene	12.676	91	337780	20.750	ug/l	99
80) 1,3,5-Trimethylbenzene	12.737	105	412957	21.274	ug/l	100
81) trans-1,4-Dichloro-2-b...	12.304	75	25722	19.613	ug/l	97
82) 4-Chlorotoluene	12.773	91	343300	20.477	ug/l	98
83) tert-Butylbenzene	12.999	119	374031	20.869	ug/l	99
84) 1,2,4-Trimethylbenzene	13.042	105	406596	20.988	ug/l	99
85) sec-Butylbenzene	13.176	105	550279	21.403	ug/l	100
86) p-Isopropyltoluene	13.292	119	467814	21.371	ug/l	99
87) 1,3-Dichlorobenzene	13.286	146	258722	20.804	ug/l	99
88) 1,4-Dichlorobenzene	13.365	146	254047	20.684	ug/l	99
89) n-Butylbenzene	13.615	91	392922	20.600	ug/l	99
90) Hexachloroethane	13.877	117	95771	20.342	ug/l	99
91) 1,2-Dichlorobenzene	13.657	146	227404	20.857	ug/l	99
92) 1,2-Dibromo-3-Chloropr...	14.273	75	12234	18.977	ug/l	96
93) 1,2,4-Trichlorobenzene	14.919	180	137068	20.166	ug/l	98
94) Hexachlorobutadiene	15.023	225	86848	20.497	ug/l	97
95) Naphthalene	15.145	128	204628	18.906	ug/l	99
96) 1,2,3-Trichlorobenzene	15.328	180	114859	19.509	ug/l	99

Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY102225\
Data File : VY023546.D
Acq On : 22 Oct 2025 10:51
Operator : SY/MD
Sample : VY1022SBSD01
Misc : 5.00g/5.0mL/MSVOA_Y/SOIL
ALS Vial : 6 Sample Multiplier: 1

Quant Time: Oct 24 02:27:18 2025
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260
QLast Update : Wed Oct 08 05:12:50 2025
Response via : Initial Calibration

Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBSD01

Manual Integrations APPROVED

Reviewed By :Amit Patel 10/24/2025
Supervised By :Mahesh Dadoda 10/24/2025

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)

(#) = qualifier out of range (m) = manual integration (+) = signals summed

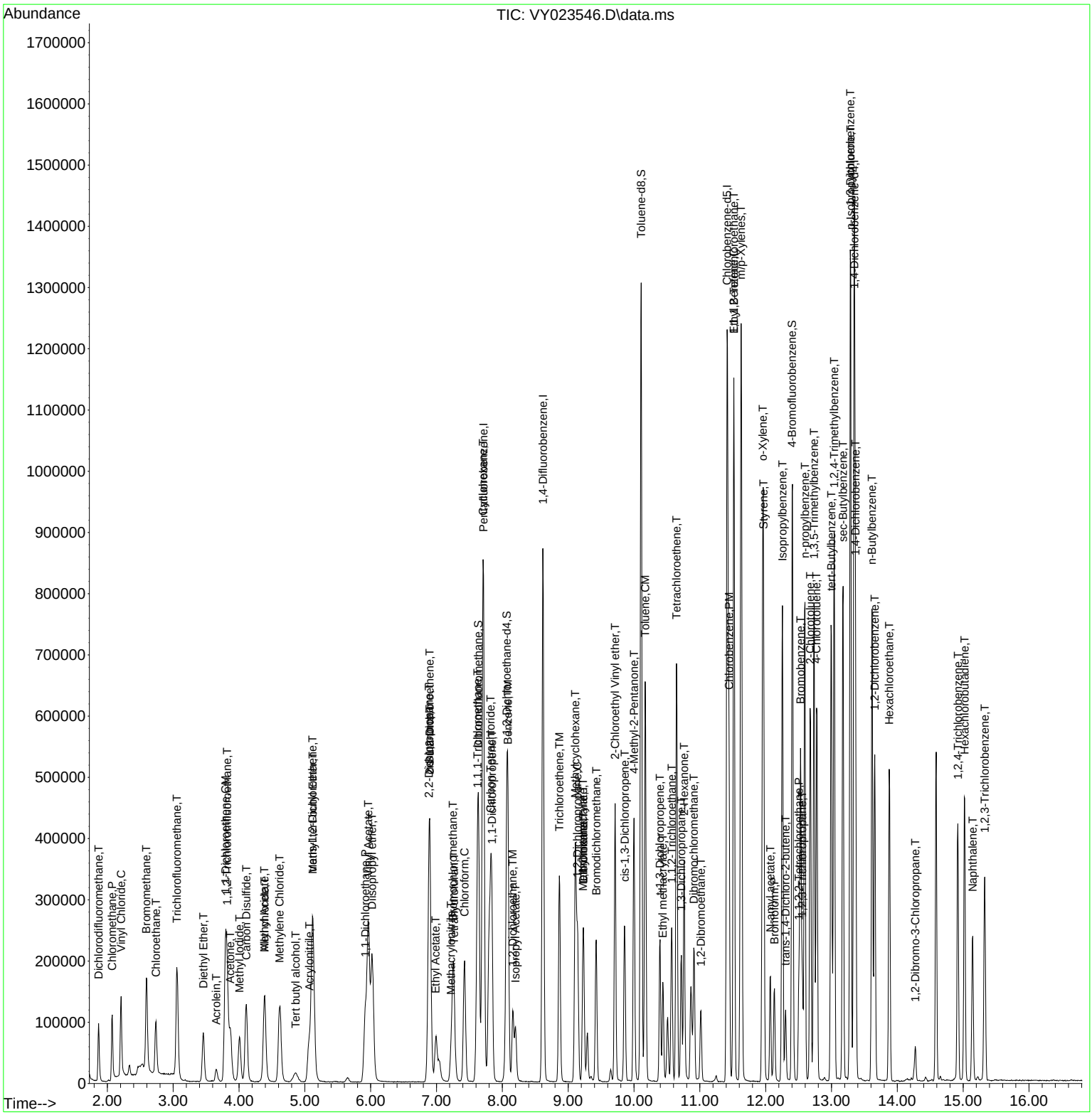
Data Path : Z:\voasrv\HPCHEM1\MSVOA_Y\Data\VY102225\
Data File : VY023546.D
Acq On : 22 Oct 2025 10:51
Operator : SY/MD
Sample : VY1022SBSD01
Misc : 5.00g/5.0mL/MSVOA_Y/SOIL
ALS Vial : 6 Sample Multiplier: 1

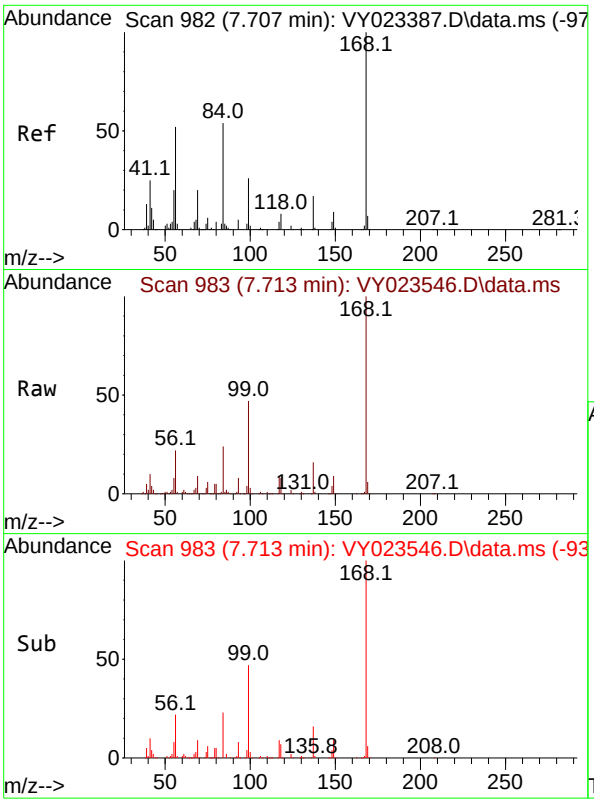
Quant Time: Oct 24 02:27:18 2025
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_Y\methods\82Y100725S.M
Quant Title : SW846 8260
QLast Update : Wed Oct 08 05:12:50 2025
Response via : Initial Calibration

Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBSD01

Manual Integrations APPROVED

Reviewed By :Amit Patel 10/24/2025
Supervised By :Mahesh Dadoda 10/24/2025

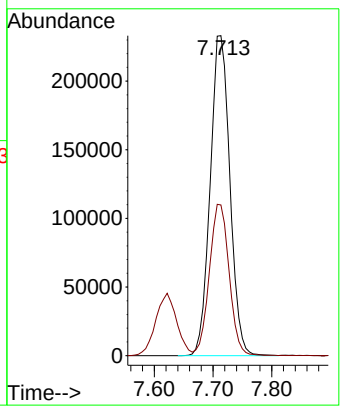




#1
Pentafluorobenzene
Concen: 50.000 ug/l
RT: 7.713 min Scan# 9
Delta R.T. 0.006 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion:168 Resp: 54261

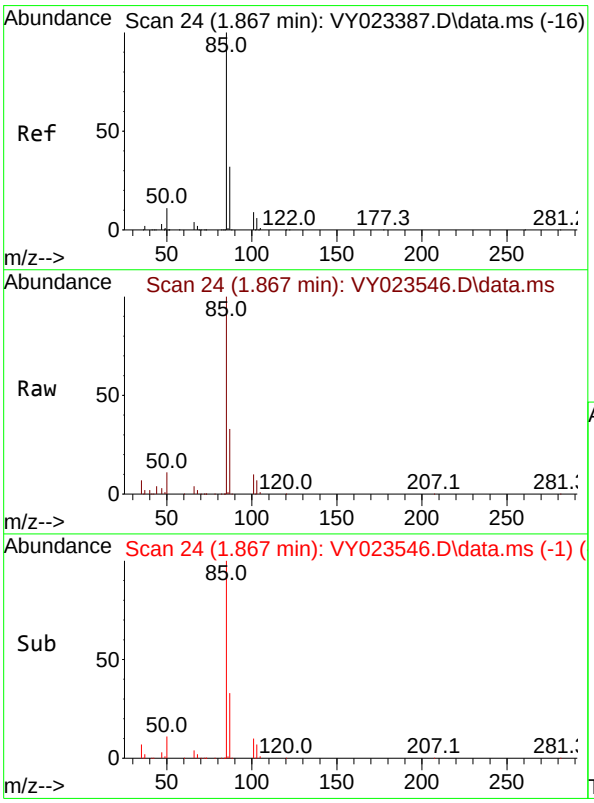
Ion	Ratio	Lower	Upper
168	100		
99	47.0	39.7	59.5



Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBSD01

Manual Integrations APPROVED

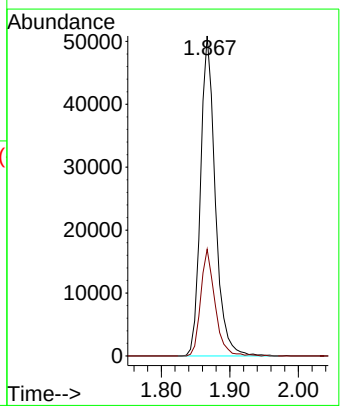
Reviewed By :Amit Patel 10/24/2025
Supervised By :Mahesh Dadoda 10/24/2025

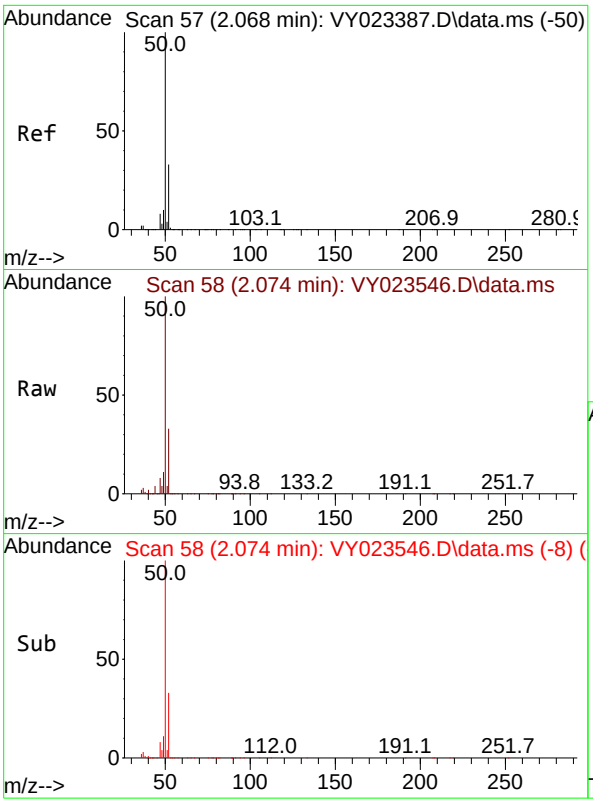


#2
Dichlorodifluoromethane
Concen: 19.455 ug/l
RT: 1.867 min Scan# 24
Delta R.T. 0.000 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion: 85 Resp: 75983

Ion	Ratio	Lower	Upper
85	100		
87	33.4	16.0	47.9

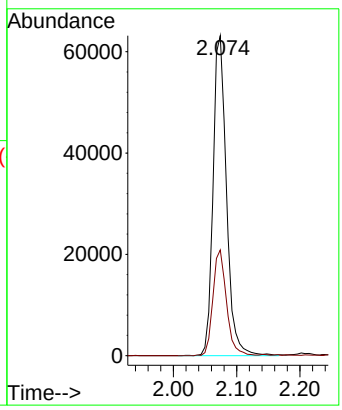




#3
Chloromethane
Concen: 17.467 ug/l
RT: 2.074 min Scan# 5
Delta R.T. 0.006 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion: 50 Resp: 9293

Ion	Ratio	Lower	Upper
50	100		
52	33.1	26.2	39.2



Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBSD01

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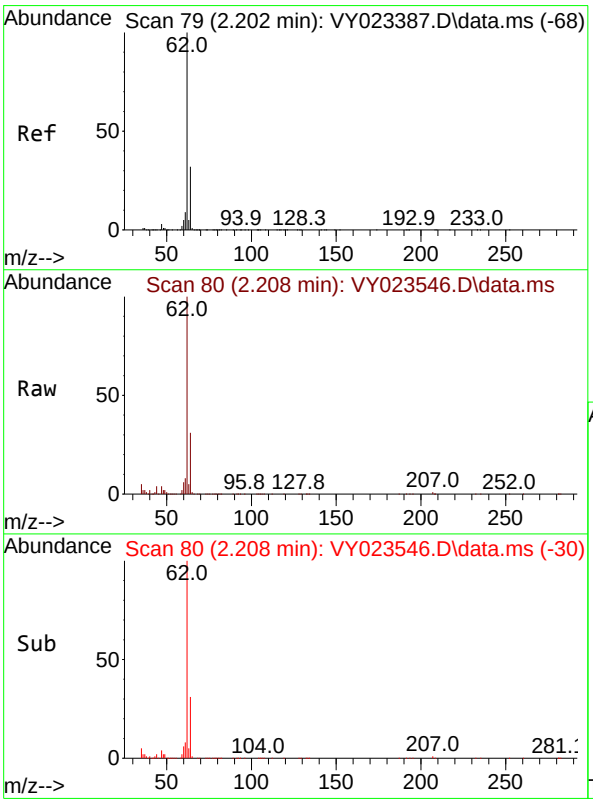
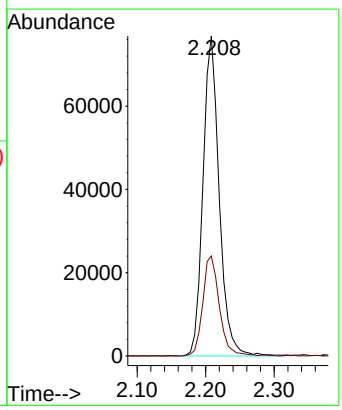
Supervised By :Mahesh Dadoda 10/24/2025

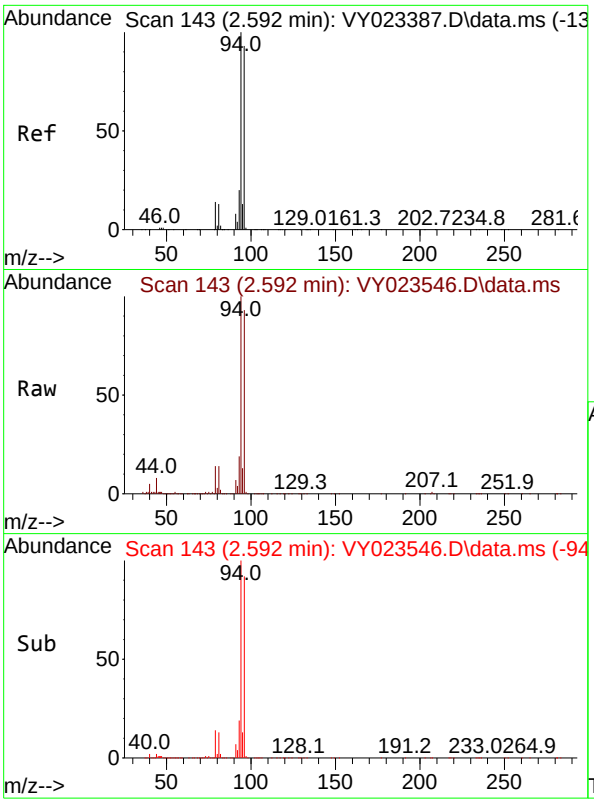


#4
Vinyl Chloride
Concen: 18.253 ug/l
RT: 2.208 min Scan# 80
Delta R.T. 0.006 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion: 62 Resp: 126494

Ion	Ratio	Lower	Upper
62	100		
64	31.2	25.8	38.8

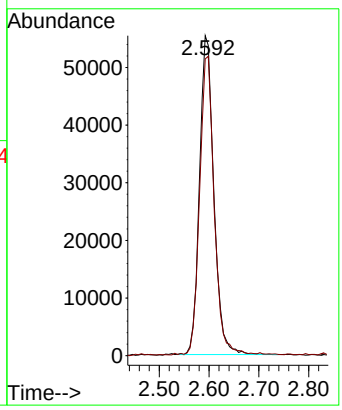




#5
Bromomethane
Concen: 18.979 ug/l
RT: 2.592 min Scan# 14
Delta R.T. -0.000 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion: 94 Resp: 11037

Ion	Ratio	Lower	Upper
94	100		
96	92.7	74.5	111.7



Instrument :
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ClientSampleId :
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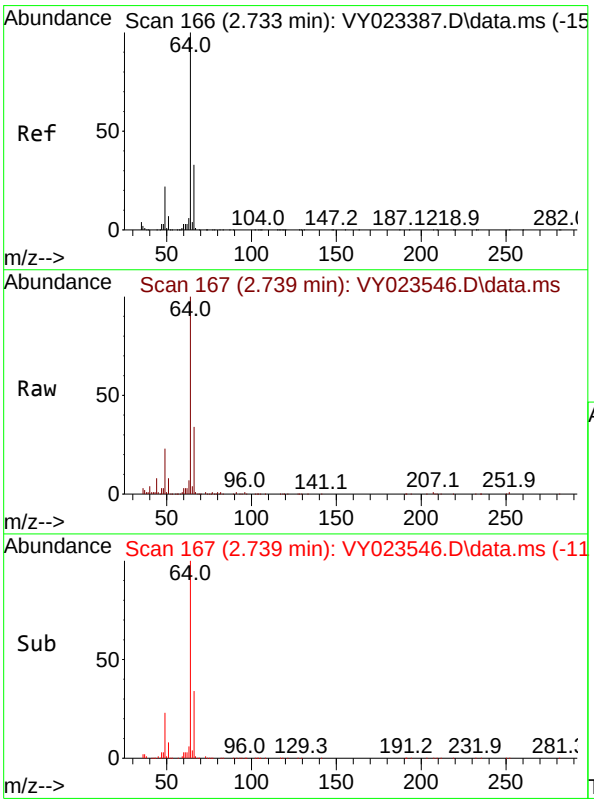
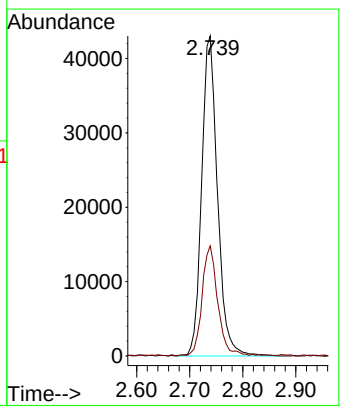
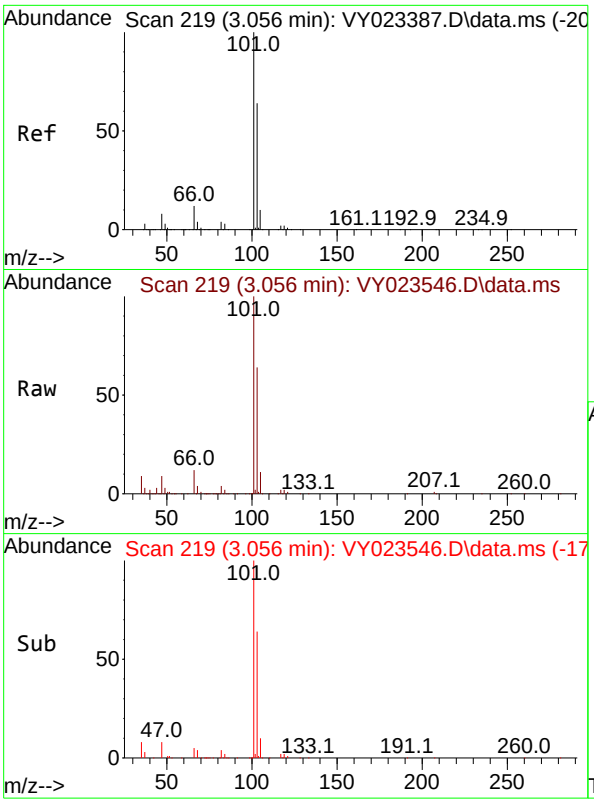


#6
Chloroethane
Concen: 18.853 ug/l
RT: 2.739 min Scan# 167
Delta R.T. 0.006 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion: 64 Resp: 89057

Ion	Ratio	Lower	Upper
64	100		
66	34.3	26.2	39.4





#7
Trichlorofluoromethane
Concen: 19.534 ug/l
RT: 3.056 min Scan# 21
Delta R.T. -0.000 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion:101 Resp: 18796

Ion	Ratio	Lower	Upper
101	100		
103	63.8	51.3	76.9

Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBSD01

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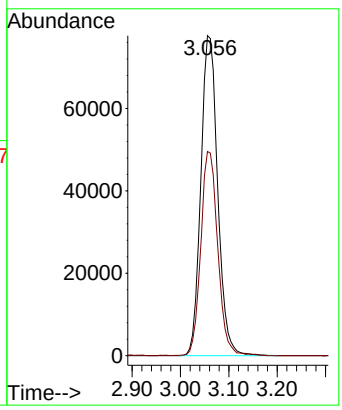
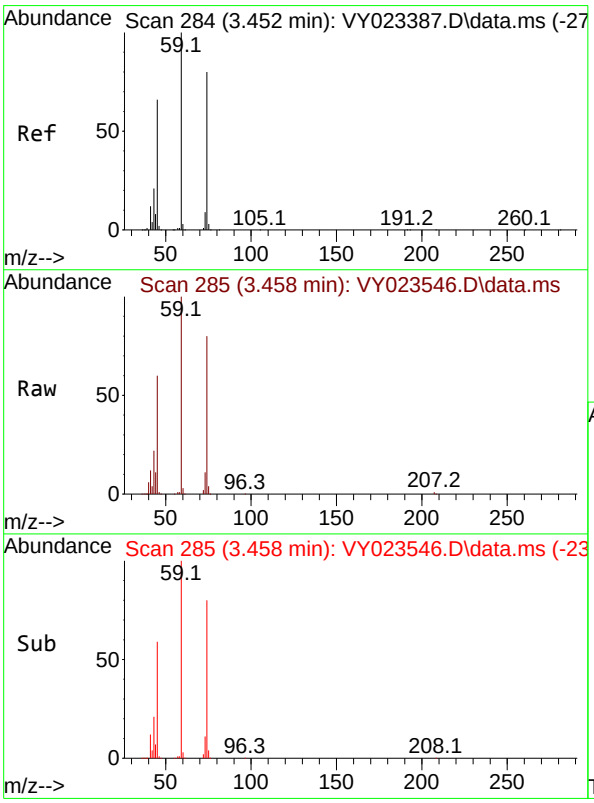
Supervised By :Mahesh Dadoda 10/24/2025

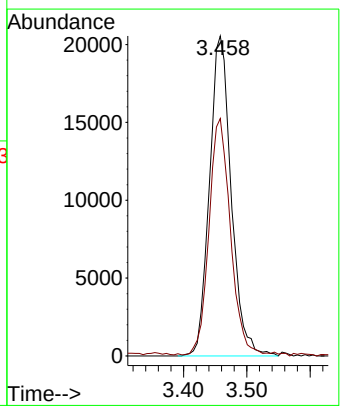


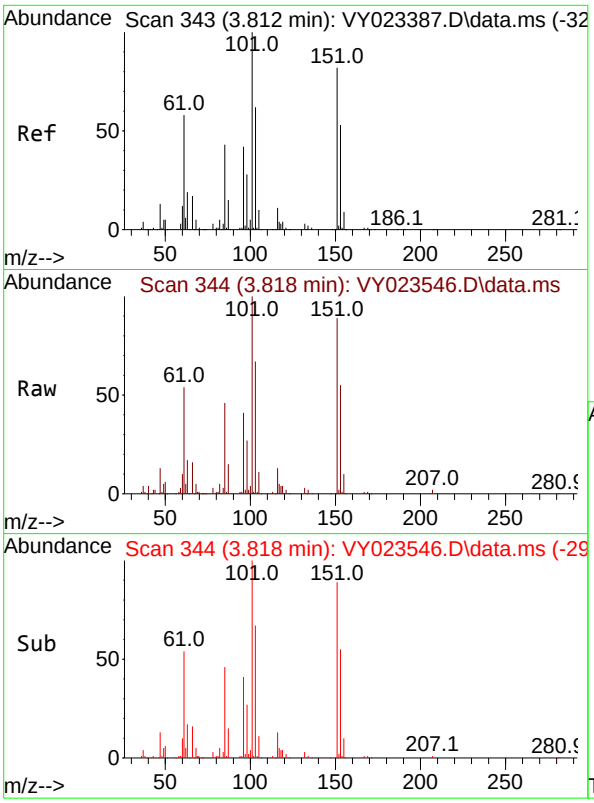


#8
Diethyl Ether
Concen: 19.457 ug/l
RT: 3.458 min Scan# 285
Delta R.T. 0.006 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion: 74 Resp: 48922

Ion	Ratio	Lower	Upper
74	100		
45	72.8	39.9	119.7





#9
1,1,2-Trichlorotrifluoroethane
Concen: 20.363 ug/l
RT: 3.818 min Scan# 34
Delta R.T. 0.006 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion:101 Resp: 10167

Ion	Ratio	Lower	Upper
101	100		
85	43.0	34.6	51.8
151	84.8	67.0	100.6

Instrument :
MSVOA_Y
ClientSampleId :
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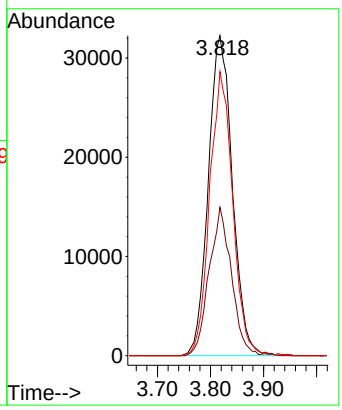
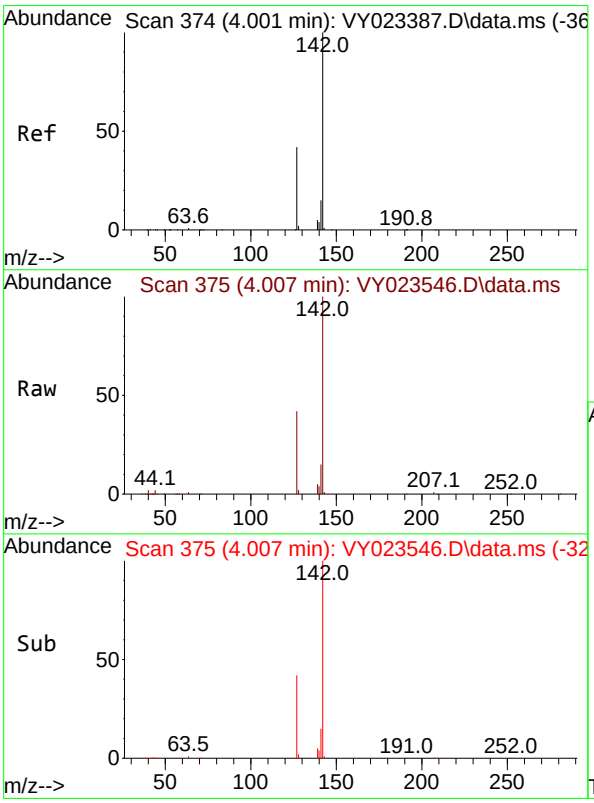
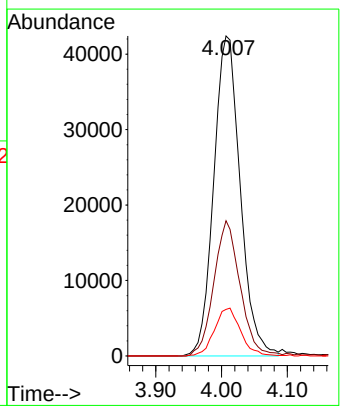


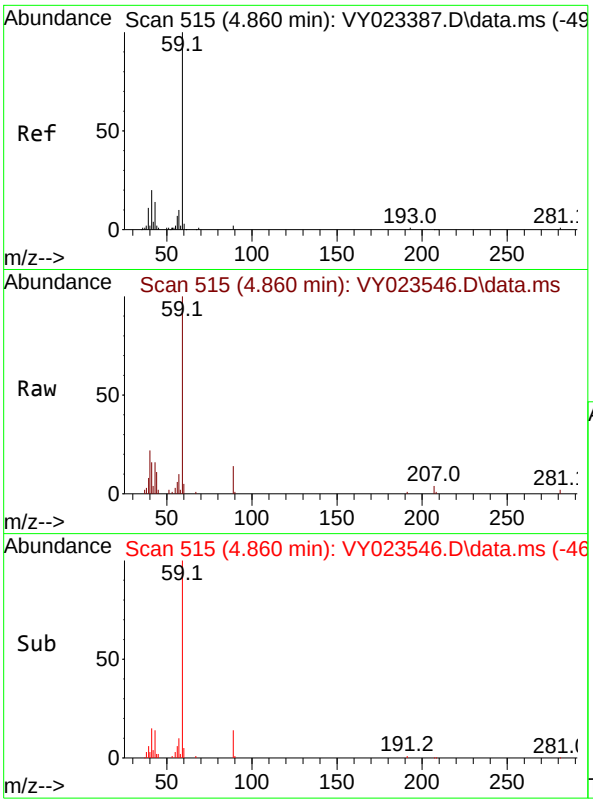


#10
Methyl Iodide
Concen: 21.373 ug/l
RT: 4.007 min Scan# 375
Delta R.T. 0.006 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion:142 Resp: 118807

Ion	Ratio	Lower	Upper
142	100		
127	41.8	34.8	52.2
141	14.8	11.6	17.4

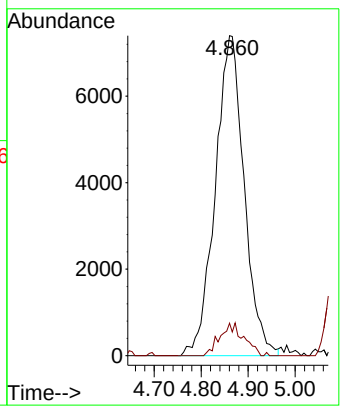




#11
Tert butyl alcohol
Concen: 93.720 ug/l
RT: 4.860 min Scan# 5
Delta R.T. 0.000 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion: 59 Resp: 3163

Ion	Ratio	Lower	Upper
59	100		
57	8.3	8.3	12.5



Instrument :
MSVOA_Y
ClientSampleId :
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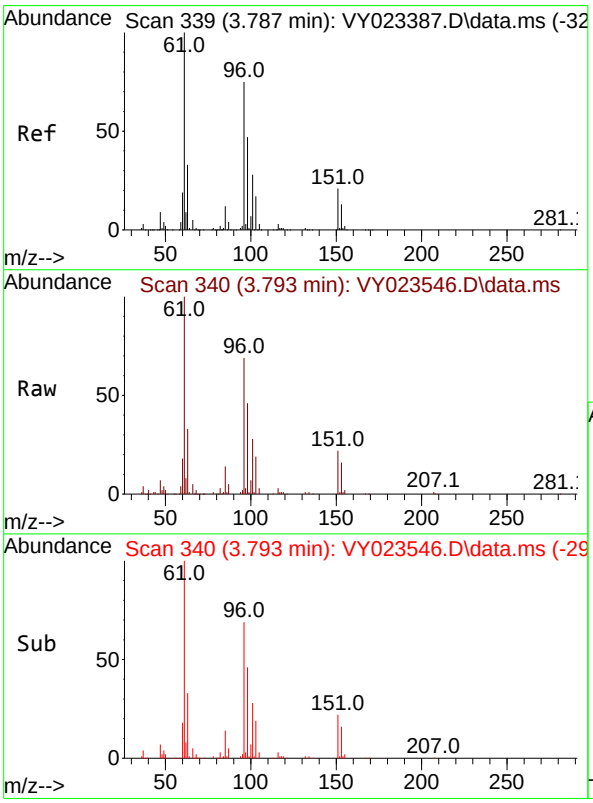
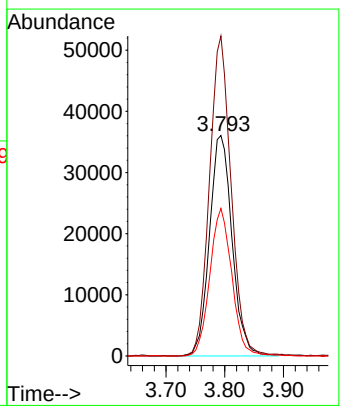
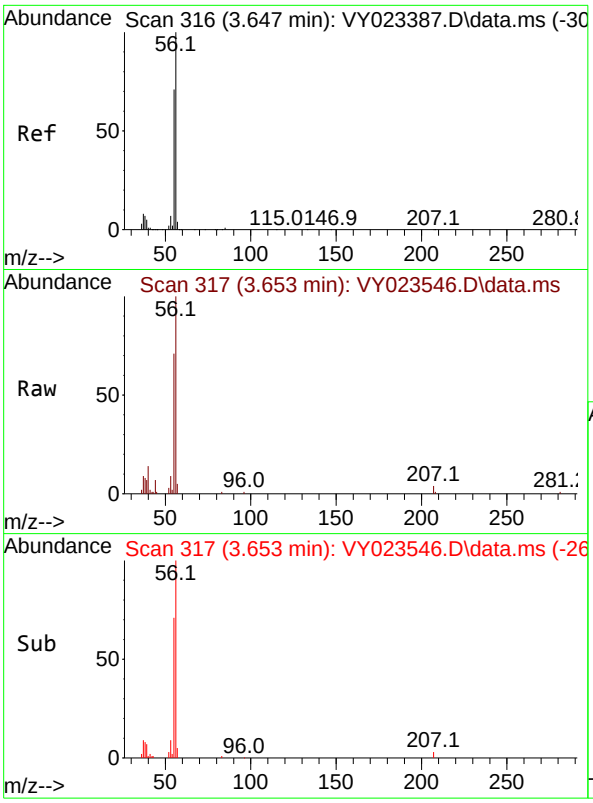


#12
1,1-Dichloroethene
Concen: 19.887 ug/l
RT: 3.793 min Scan# 340
Delta R.T. 0.006 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion: 96 Resp: 96256

Ion	Ratio	Lower	Upper
96	100		
61	145.1	106.7	160.1
98	66.9	50.2	75.4

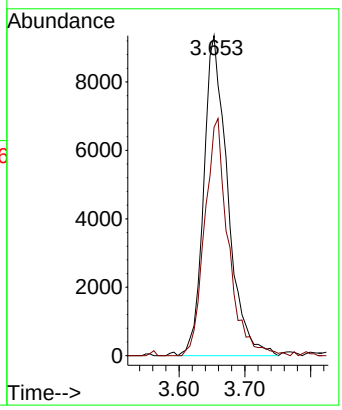




#13
Acrolein
Concen: 49.732 ug/l
RT: 3.653 min Scan# 3
Delta R.T. 0.006 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion: 56 Resp: 2372

Ion	Ratio	Lower	Upper
56	100		
55	73.2	56.1	84.1



Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBSD01

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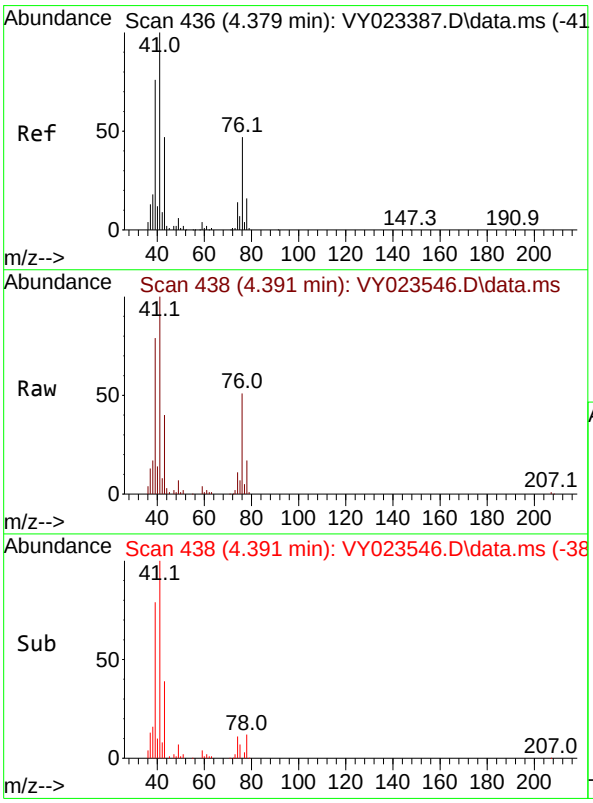
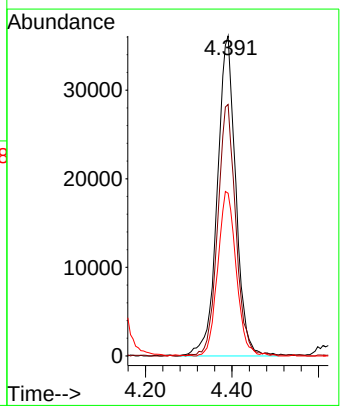
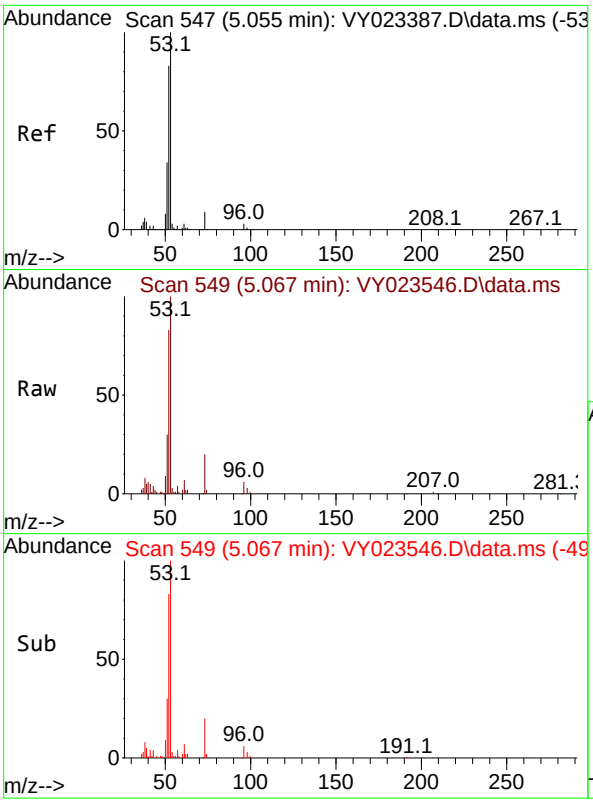


#14
Allyl chloride
Concen: 18.269 ug/l
RT: 4.391 min Scan# 438
Delta R.T. 0.012 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion: 41 Resp: 107766

Ion	Ratio	Lower	Upper
41	100		
39	77.1	59.9	89.9
76	51.0	38.0	57.0

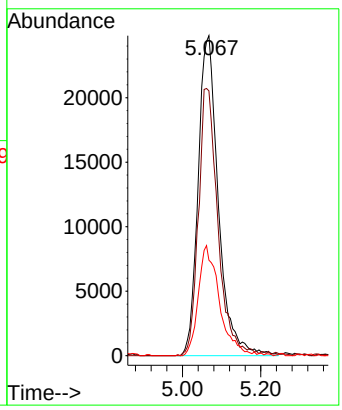




#15
Acrylonitrile
Concen: 92.308 ug/l
RT: 5.067 min Scan# 54
Delta R.T. 0.012 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion: 53 Resp: 8882

Ion	Ratio	Lower	Upper
53	100		
52	80.6	64.6	97.0
51	36.1	29.5	44.3



Instrument :
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ClientSampleId :
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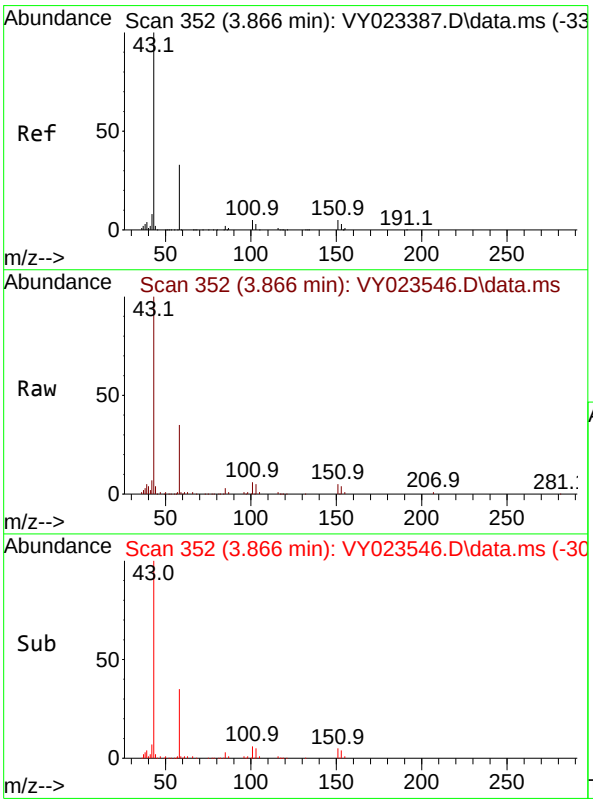
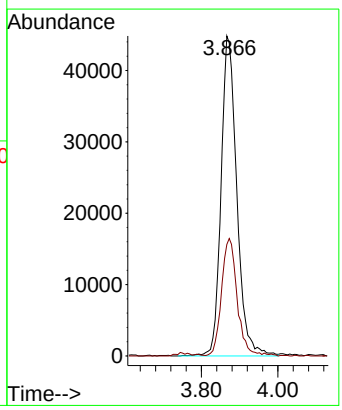
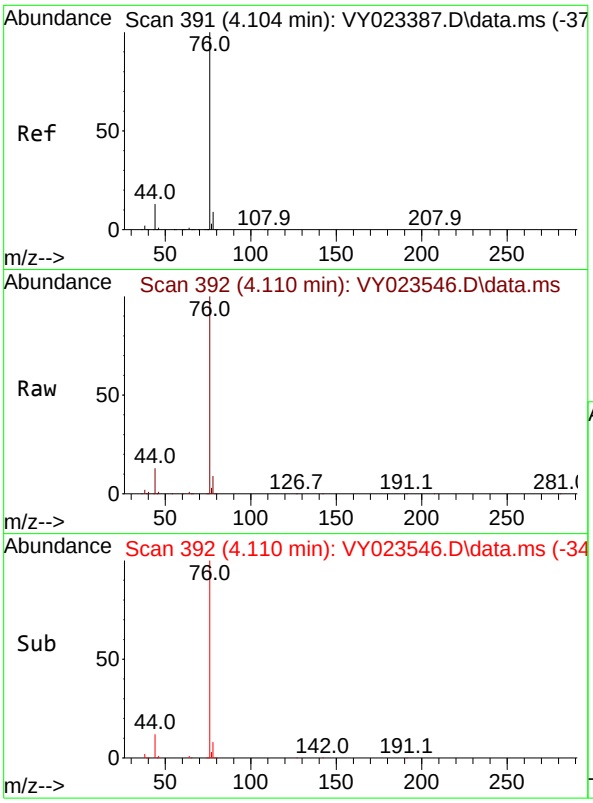


#16
Acetone
Concen: 118.706 ug/l
RT: 3.866 min Scan# 352
Delta R.T. -0.000 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion: 43 Resp: 128229

Ion	Ratio	Lower	Upper
43	100		
58	34.9	27.7	41.5

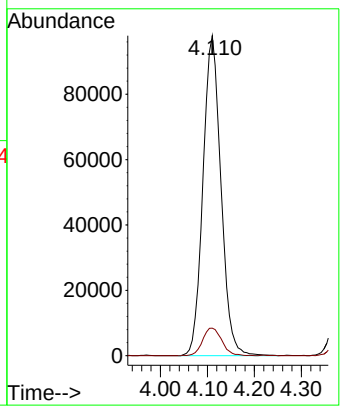




#17
Carbon Disulfide
Concen: 18.791 ug/l
RT: 4.110 min Scan# 3
Delta R.T. 0.006 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion: 76 Resp: 26031

Ion	Ratio	Lower	Upper
76	100		
78	8.6	7.3	10.9



Instrument :
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ClientSampleId :
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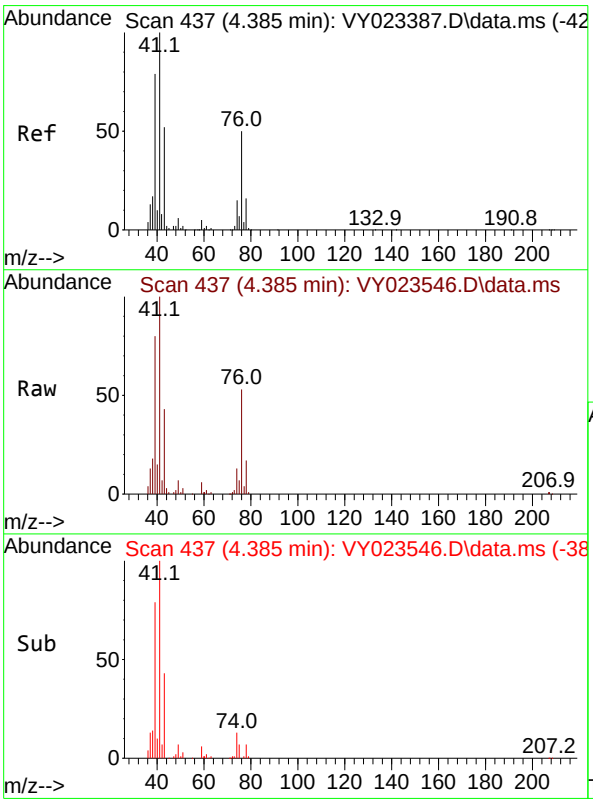
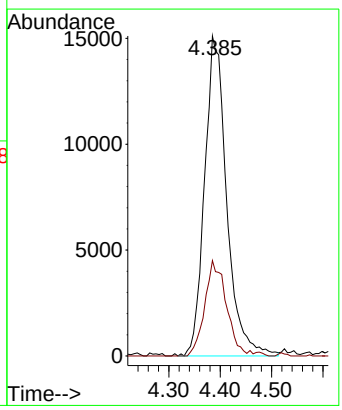
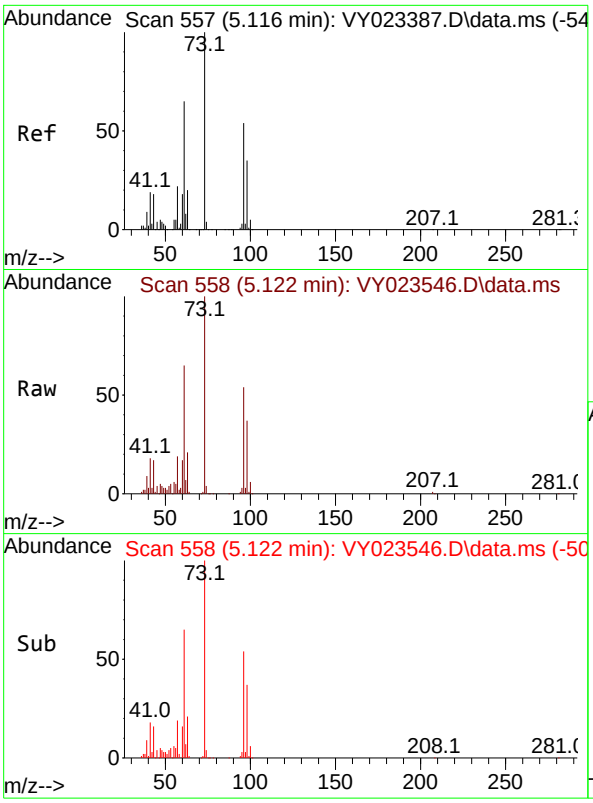


#18
Methyl Acetate
Concen: 15.963 ug/l
RT: 4.385 min Scan# 437
Delta R.T. -0.000 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion: 43 Resp: 45233

Ion	Ratio	Lower	Upper
43	100		
74	29.6	24.2	36.4

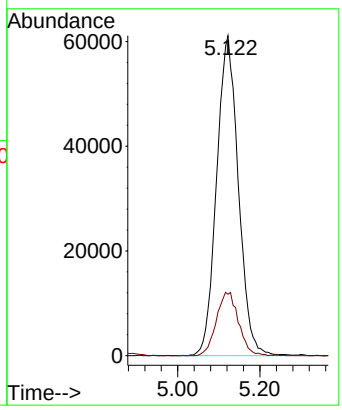




#19
Methyl tert-butyl Ether
Concen: 19.290 ug/l
RT: 5.122 min Scan# 5
Delta R.T. 0.006 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion: 73 Resp: 22440

Ion	Ratio	Lower	Upper
73	100		
57	19.2	17.4	26.0



Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBSD01

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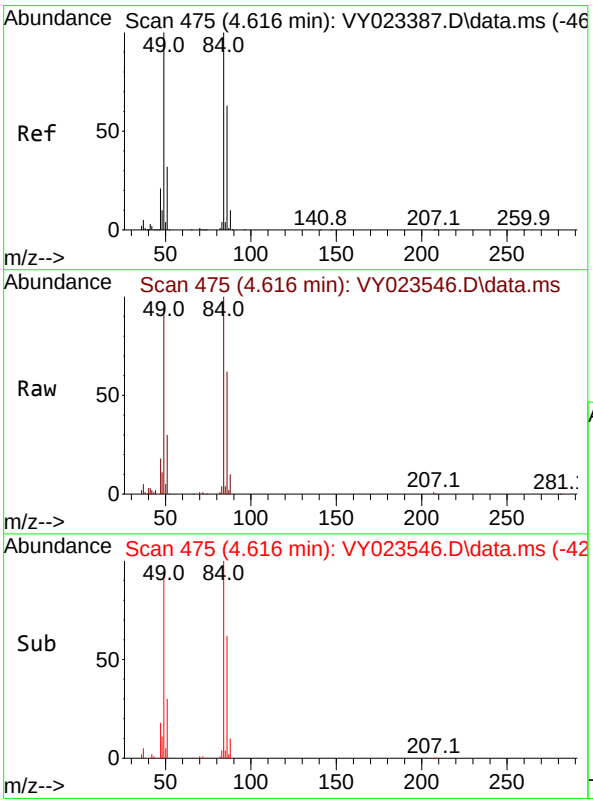
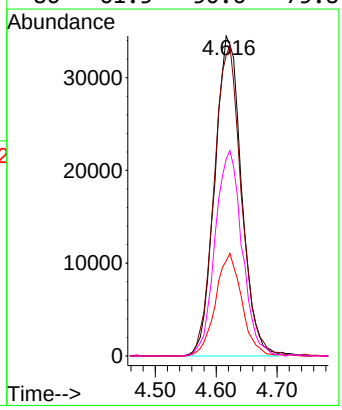
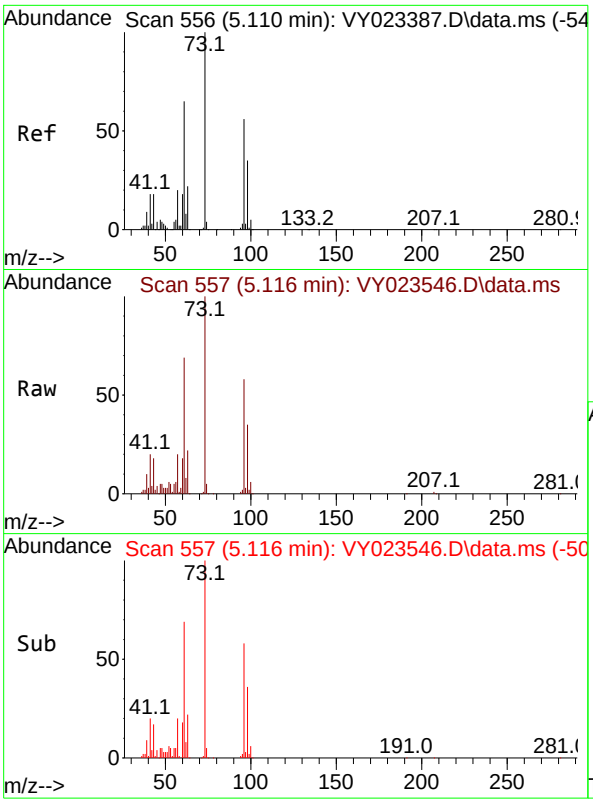


#20
Methylene Chloride
Concen: 18.001 ug/l
RT: 4.616 min Scan# 475
Delta R.T. 0.000 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion: 84 Resp: 105150

Ion	Ratio	Lower	Upper
84	100		
49	93.9	80.2	120.4
51	29.7	25.9	38.9
86	61.5	50.6	75.8

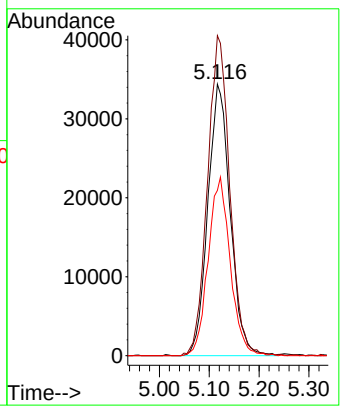




#21
trans-1,2-Dichloroethene
Concen: 20.068 ug/l
RT: 5.116 min Scan# 5
Delta R.T. 0.006 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion: 96 Resp: 10694

Ion	Ratio	Lower	Upper
96	100		
61	117.8	92.7	139.1
98	60.8	49.7	74.5



Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBSD01

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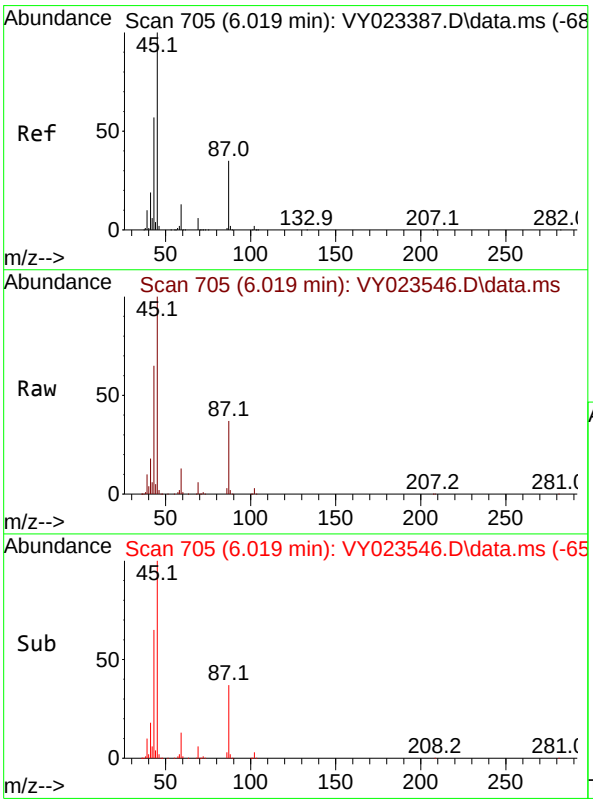
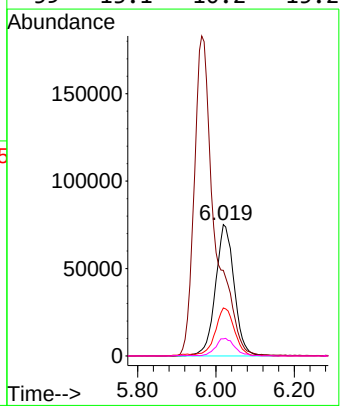
Supervised By :Mahesh Dadoda 10/24/2025

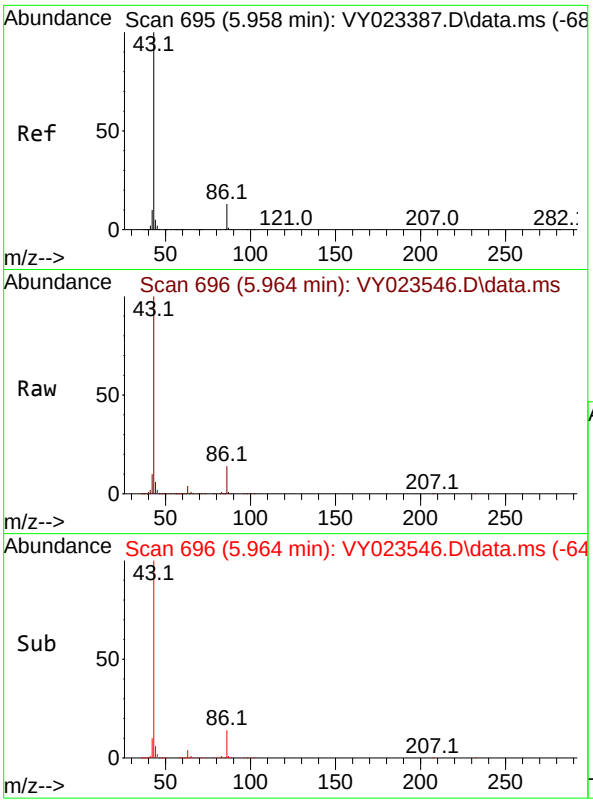


#22
Diisopropyl ether
Concen: 19.167 ug/l
RT: 6.019 min Scan# 705
Delta R.T. -0.000 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion: 45 Resp: 250099

Ion	Ratio	Lower	Upper
45	100		
43	64.7	45.6	68.4
87	36.5	28.1	42.1
59	13.1	10.2	15.2

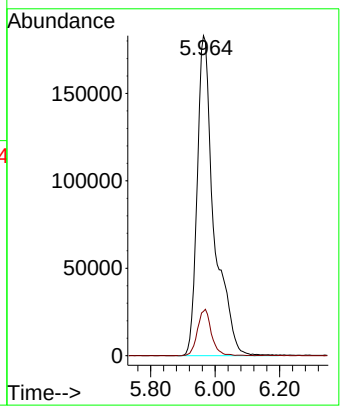




#23
Vinyl Acetate
Concen: 94.117 ug/l
RT: 5.964 min Scan# 6
Delta R.T. 0.006 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion: 43 Resp: 66471

Ion	Ratio	Lower	Upper
43	100		
86	13.9	10.6	15.8



Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBSD01

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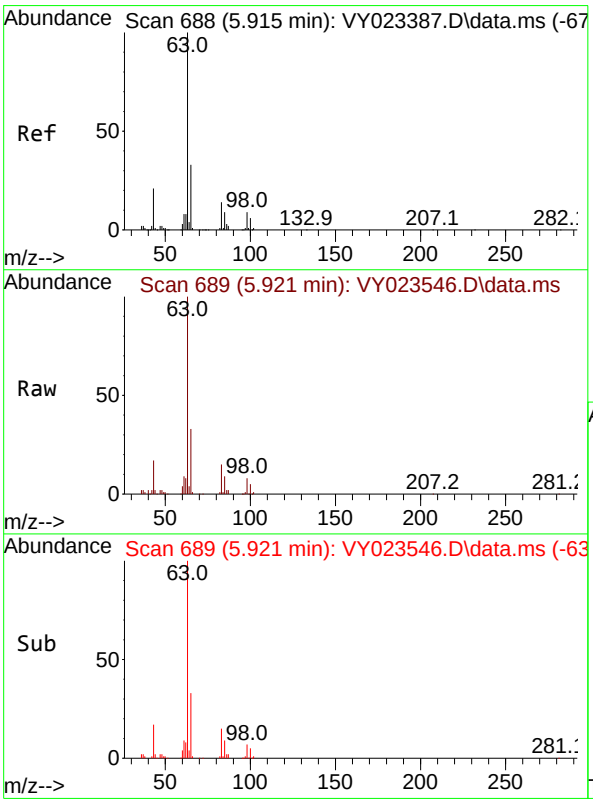
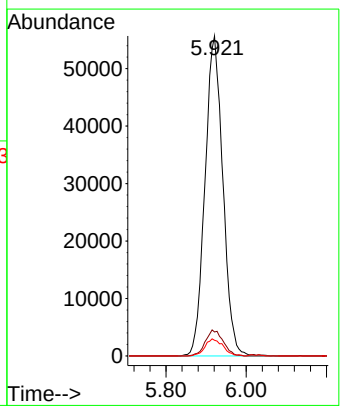
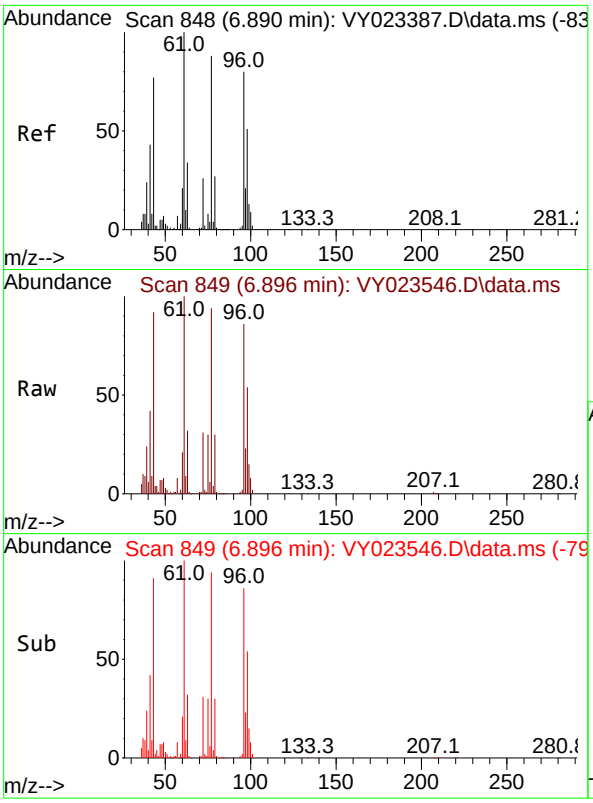


#24
1,1-Dichloroethane
Concen: 19.899 ug/l
RT: 5.921 min Scan# 689
Delta R.T. 0.006 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion: 63 Resp: 171993

Ion	Ratio	Lower	Upper
63	100		
98	7.5	4.3	13.1
100	4.9	2.8	8.4





#25
2-Butanone
Concen: 105.202 ug/l
RT: 6.896 min Scan# 84
Delta R.T. 0.006 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion: 43 Resp: 13873

Ion	Ratio	Lower	Upper
43	100		
72	34.1	27.4	41.2

Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBSD01

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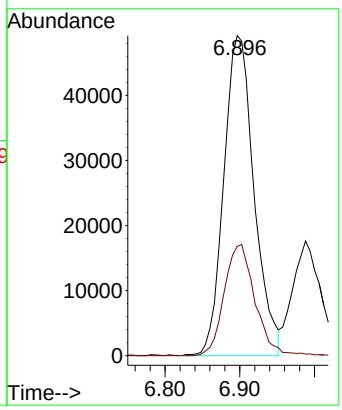
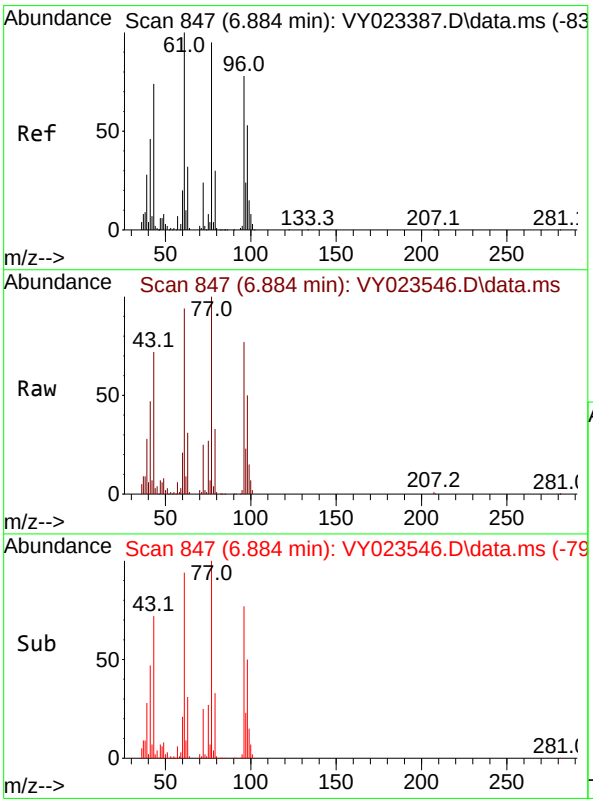
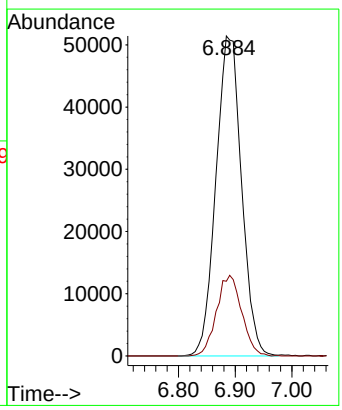


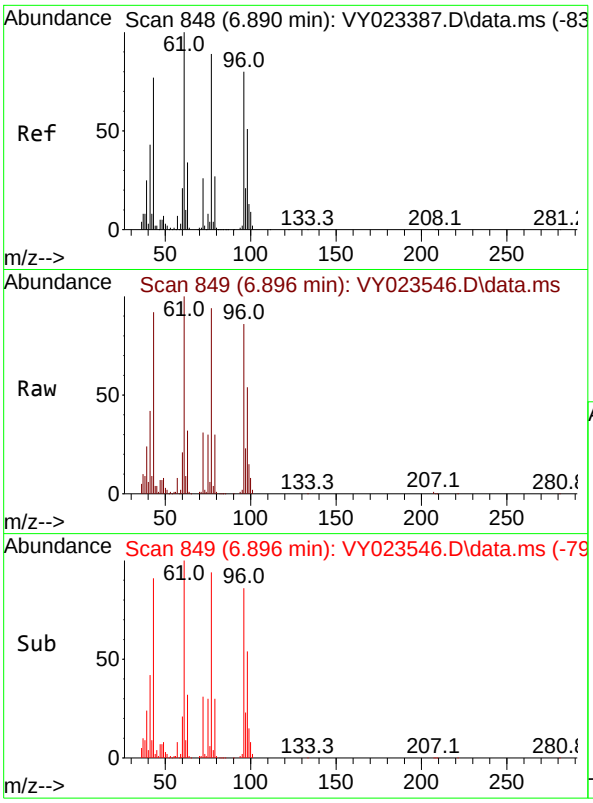


#26
2,2-Dichloropropane
Concen: 20.311 ug/l
RT: 6.884 min Scan# 847
Delta R.T. -0.000 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion: 77 Resp: 161087

Ion	Ratio	Lower	Upper
77	100		
97	24.8	12.1	36.3





#27
cis-1,2-Dichloroethene
Concen: 20.693 ug/l
RT: 6.896 min Scan# 84
Delta R.T. 0.006 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion: 96 Resp: 12737

Ion	Ratio	Lower	Upper
96	100		
61	120.7	0.0	258.2
98	64.8	0.0	132.0

Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBSD01

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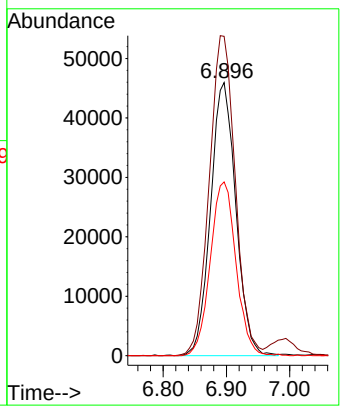
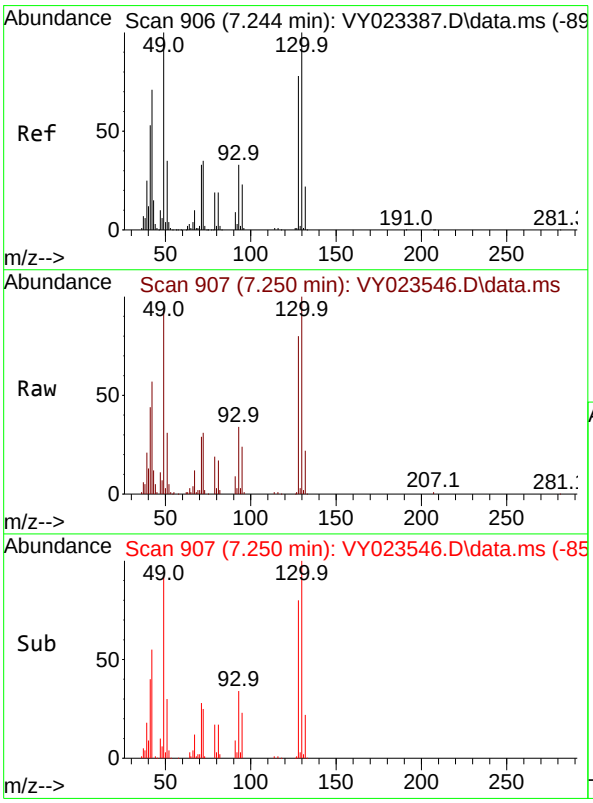
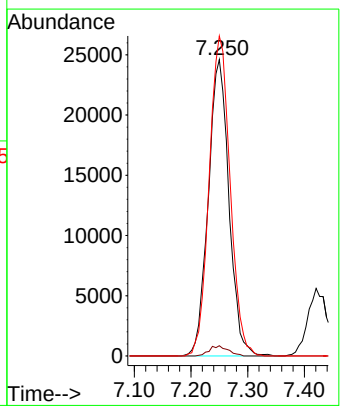


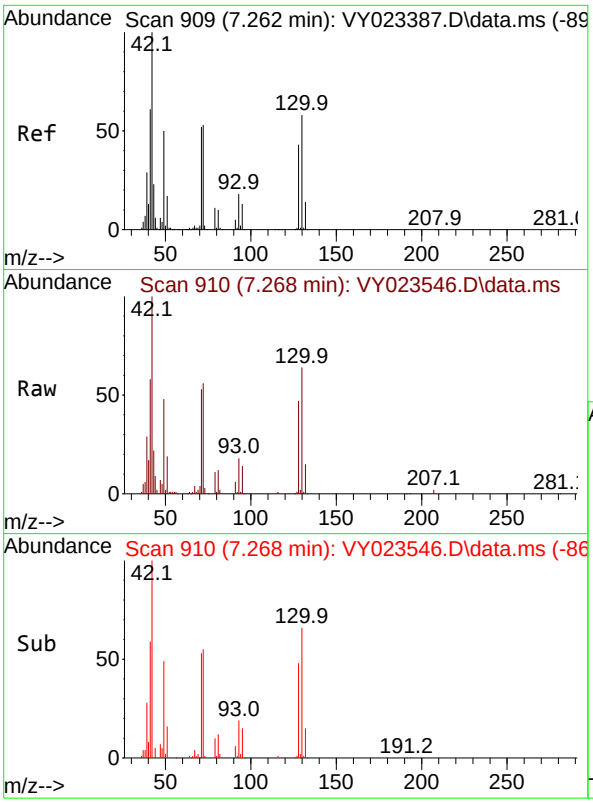


#28
Bromochloromethane
Concen: 19.335 ug/l
RT: 7.250 min Scan# 907
Delta R.T. 0.006 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion: 49 Resp: 62387

Ion	Ratio	Lower	Upper
49	100		
129	3.1	0.0	5.6
130	109.4	81.9	122.9

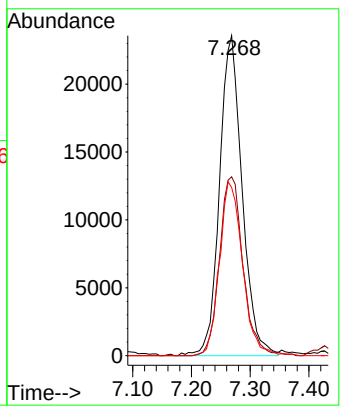




#29
Tetrahydrofuran
Concen: 84.474 ug/l
RT: 7.268 min Scan# 91
Delta R.T. 0.006 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion: 42 Resp: 6317

Ion	Ratio	Lower	Upper
42	100		
72	58.1	43.0	64.6
71	55.5	40.1	60.1



Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBSD01

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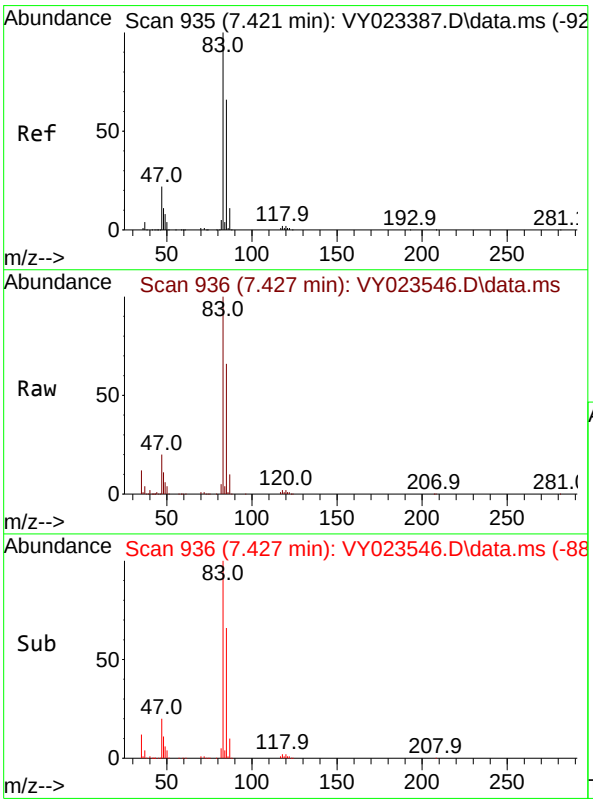
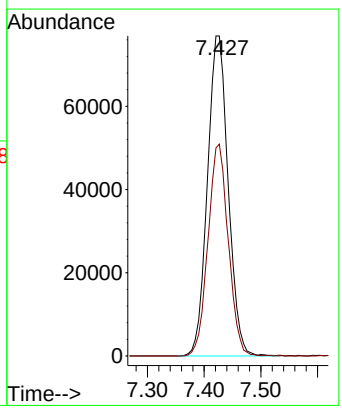
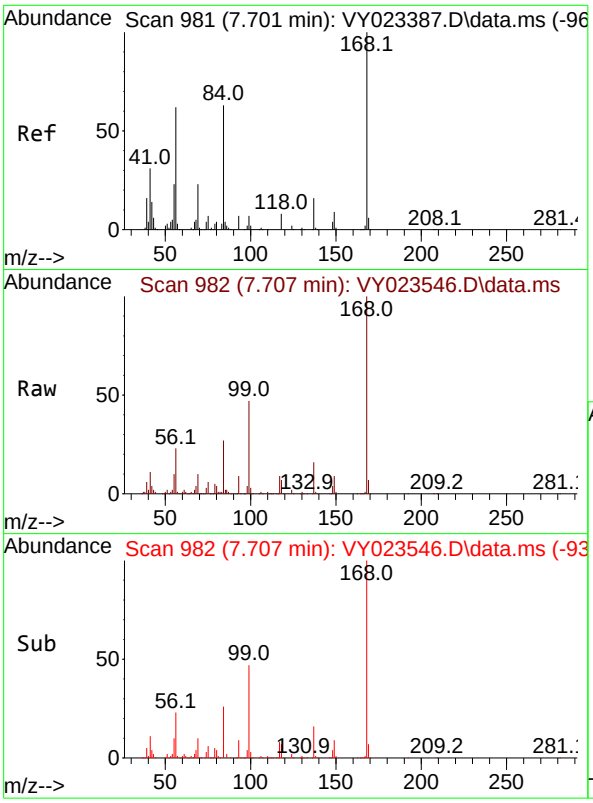


#30
Chloroform
Concen: 20.573 ug/l
RT: 7.427 min Scan# 936
Delta R.T. 0.006 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion: 83 Resp: 195371

Ion	Ratio	Lower	Upper
83	100		
85	66.2	52.5	78.7

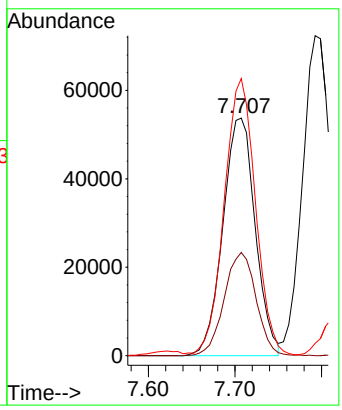




#31
Cyclohexane
Concen: 18.508 ug/l
RT: 7.707 min Scan# 9
Delta R.T. 0.006 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion: 56 Resp: 13970

Ion	Ratio	Lower	Upper
56	100		
69	43.4	30.0	45.0
84	114.9	81.2	121.8



Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBSD01

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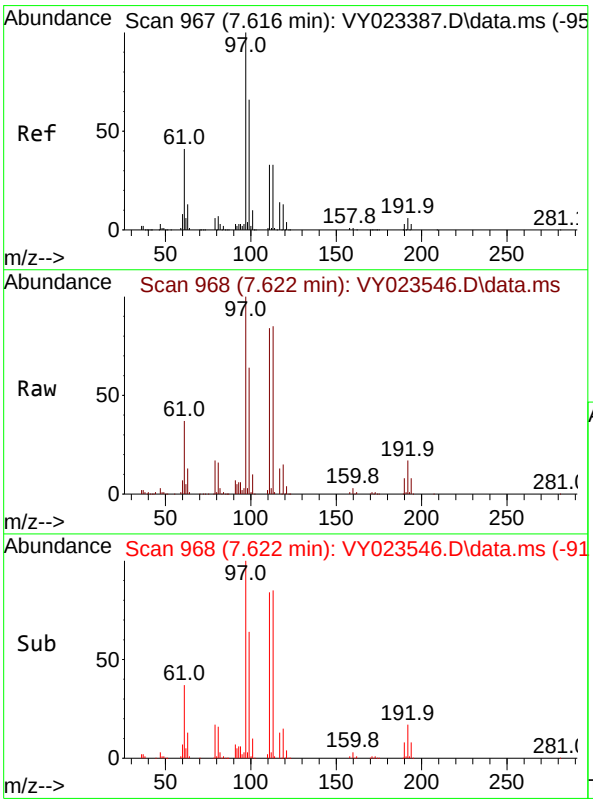
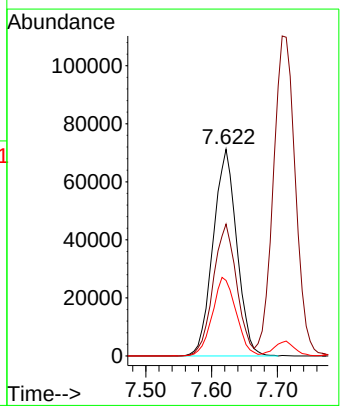
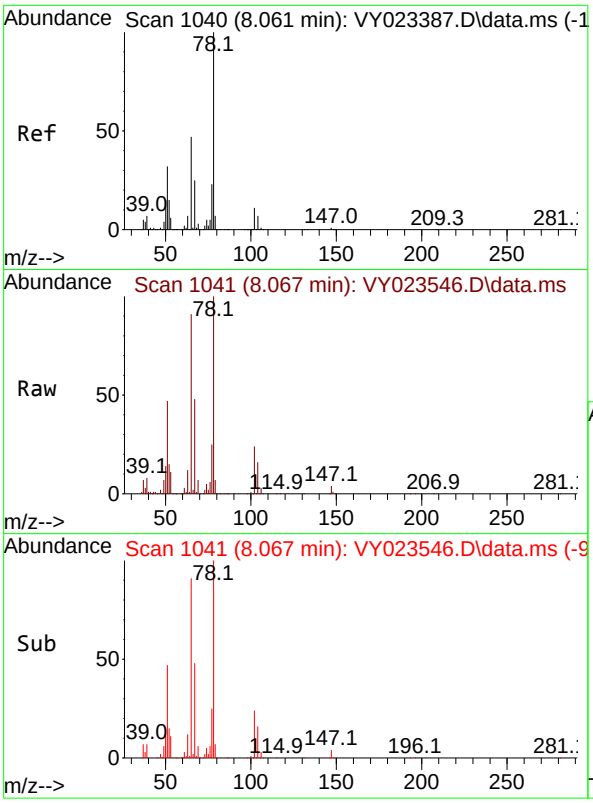


#32
1,1,1-Trichloroethane
Concen: 20.674 ug/l
RT: 7.622 min Scan# 968
Delta R.T. 0.006 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion: 97 Resp: 178412

Ion	Ratio	Lower	Upper
97	100		
99	63.6	51.4	77.2
61	38.2	31.9	47.9

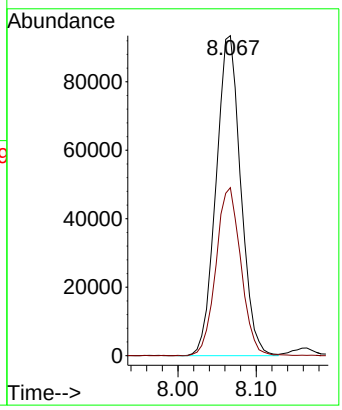




#33
1,2-Dichloroethane-d4
Concen: 45.137 ug/l
RT: 8.067 min Scan# 1
Delta R.T. 0.006 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion: 65 Resp: 20480

Ion	Ratio	Lower	Upper
65	100		
67	53.1	0.0	105.8



Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBSD01

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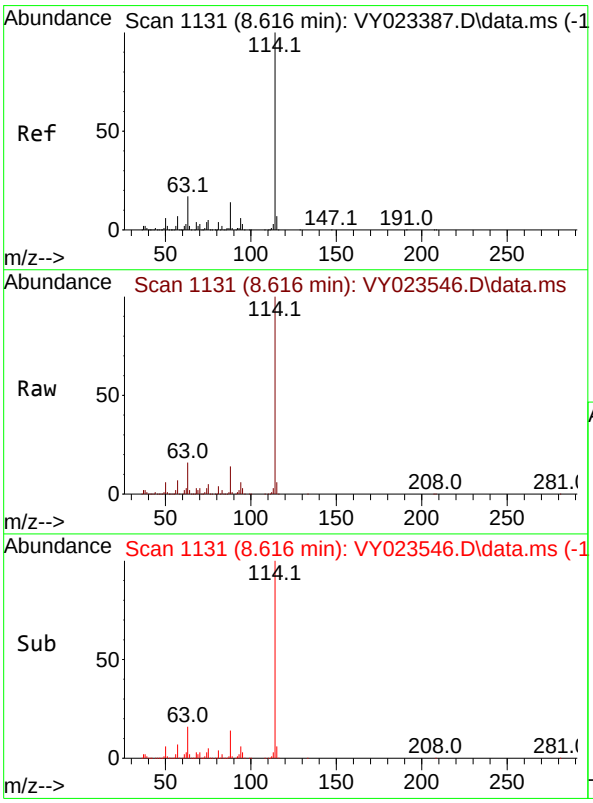
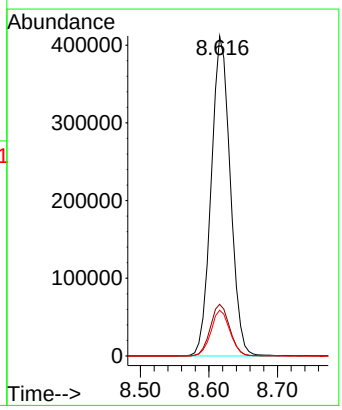
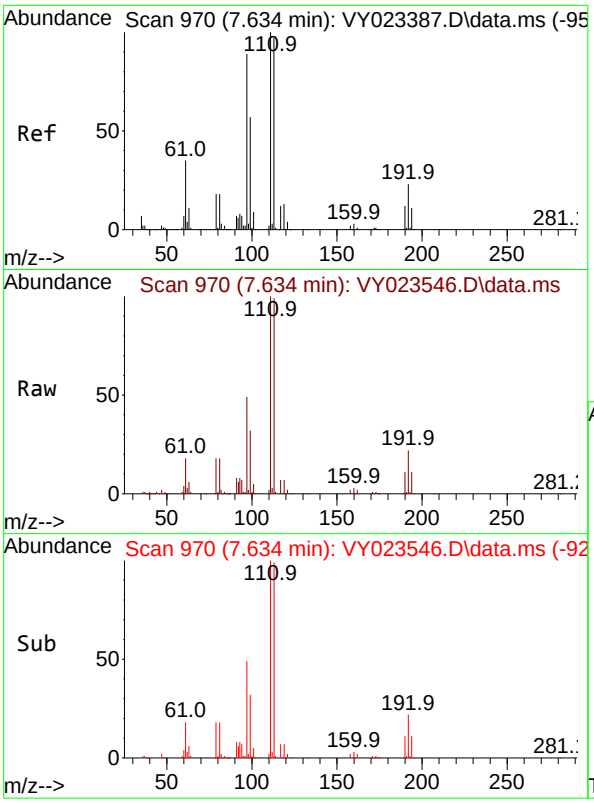


#34
1,4-Difluorobenzene
Concen: 50.000 ug/l
RT: 8.616 min Scan# 1131
Delta R.T. 0.000 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion:114 Resp: 794200

Ion	Ratio	Lower	Upper
114	100		
63	16.2	0.0	34.2
88	14.3	0.0	28.4

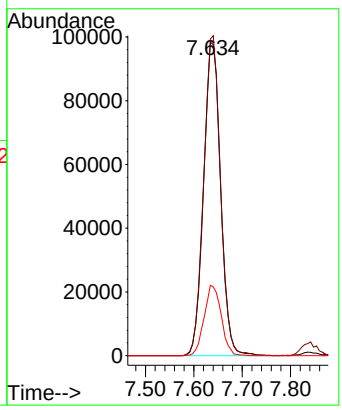




#35
Dibromofluoromethane
Concen: 49.334 ug/l
RT: 7.634 min Scan# 9
Delta R.T. 0.000 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion:113 Resp: 24074

Ion	Ratio	Lower	Upper
113	100		
111	101.1	81.8	122.6
192	22.5	18.0	27.0



Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBSD01

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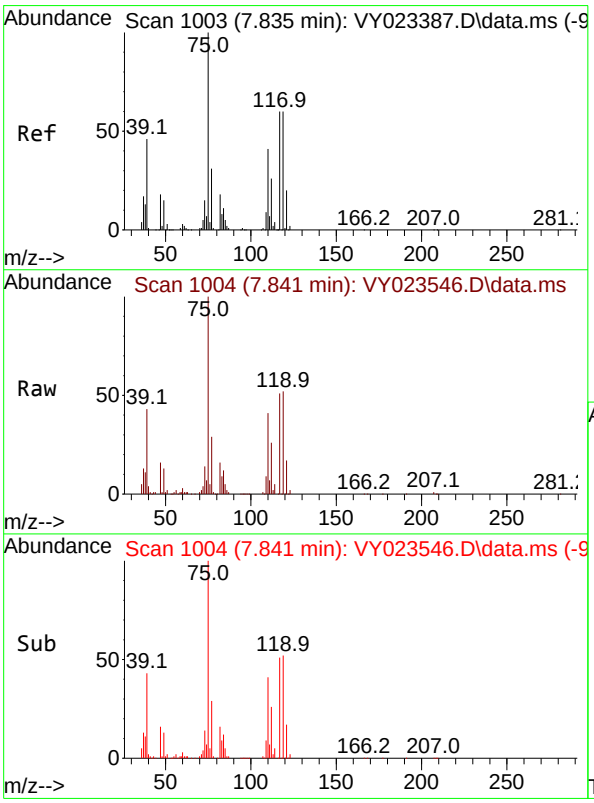
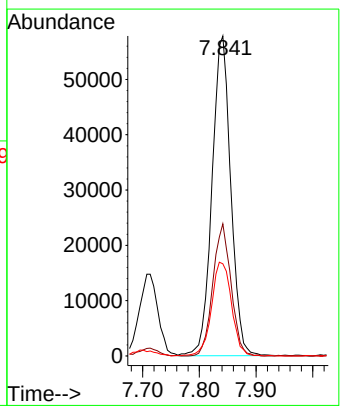
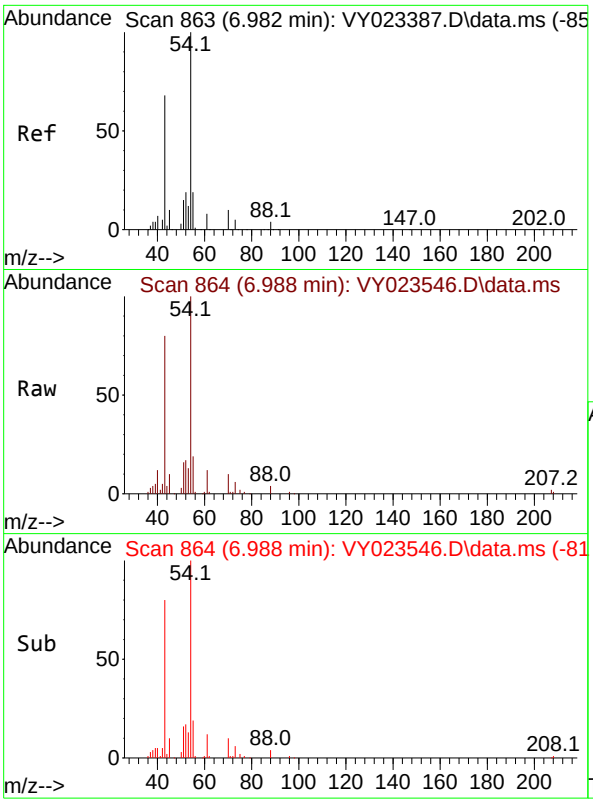


#36
1,1-Dichloropropene
Concen: 20.530 ug/l
RT: 7.841 min Scan# 1004
Delta R.T. 0.006 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion: 75 Resp: 132638

Ion	Ratio	Lower	Upper
75	100		
110	39.9	19.9	59.7
77	31.4	25.0	37.6





#37
Ethyl Acetate
Concen: 18.907 ug/l
RT: 6.988 min Scan# 8
Delta R.T. 0.006 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion: 43 Resp: 4839

Ion	Ratio	Lower	Upper
43	100		
61	16.0	11.8	17.8
70	13.0	10.5	15.7

Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBSD01

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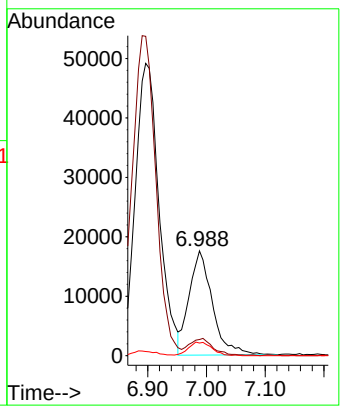
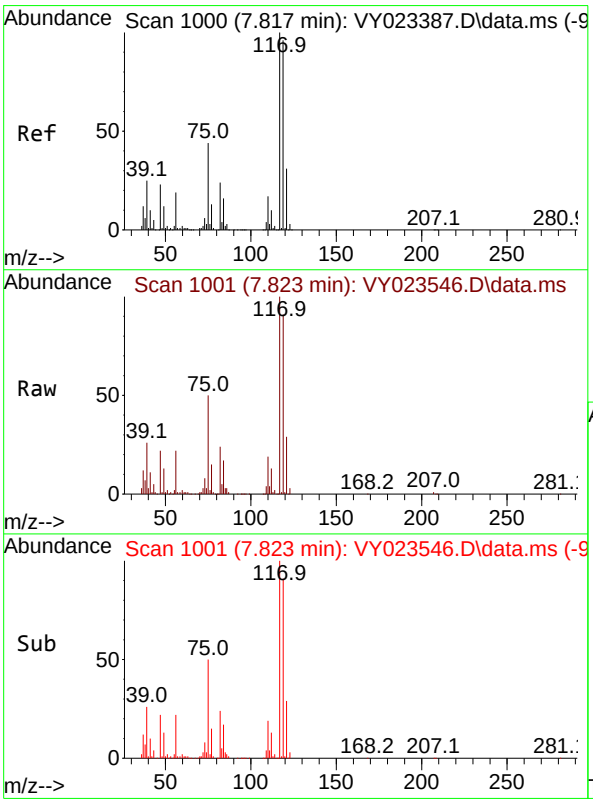
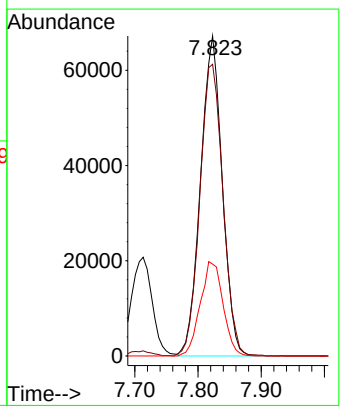


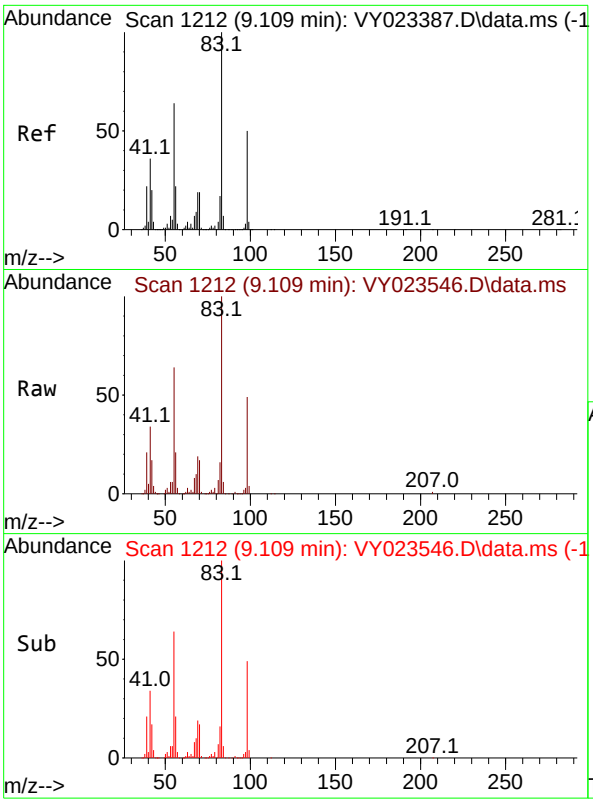


#38
Carbon Tetrachloride
Concen: 20.489 ug/l
RT: 7.823 min Scan# 1001
Delta R.T. 0.006 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion:117 Resp: 160505

Ion	Ratio	Lower	Upper
117	100		
119	91.1	76.8	115.2
121	28.7	24.5	36.7





#39
Methylcyclohexane
Concen: 19.972 ug/l
RT: 9.109 min Scan# 1
Delta R.T. 0.000 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion: 83 Resp: 16800

Ion	Ratio	Lower	Upper
83	100		
55	64.0	51.4	77.2
98	49.2	40.4	60.6

Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBSD01

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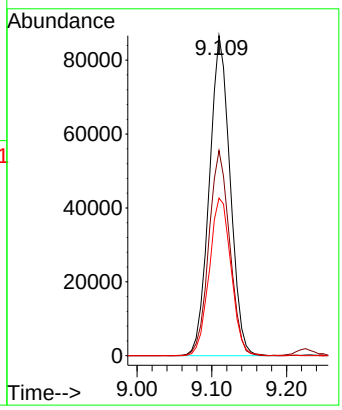
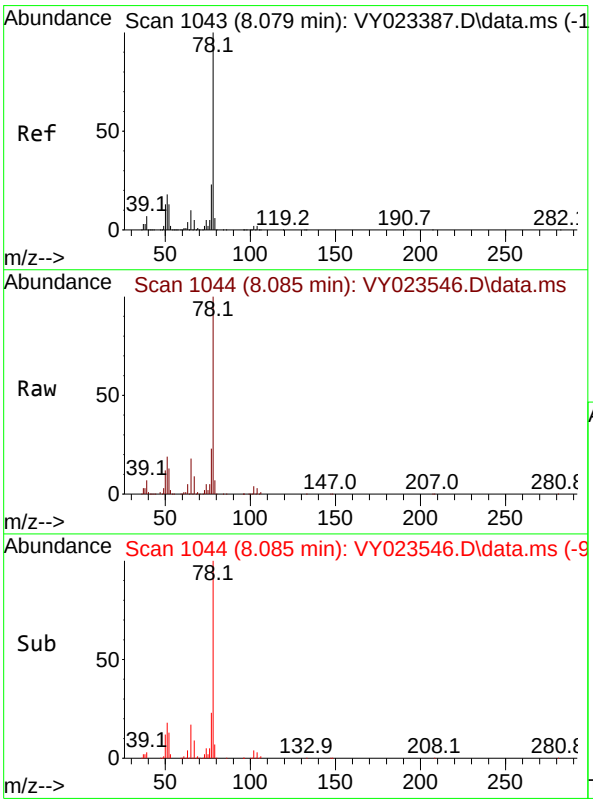
Reviewed By :Amit Patel 10/24/2025
Supervised By :Mahesh Dadoda 10/24/2025

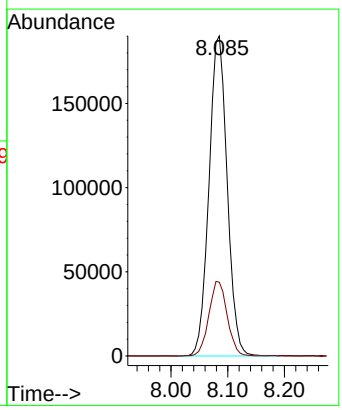


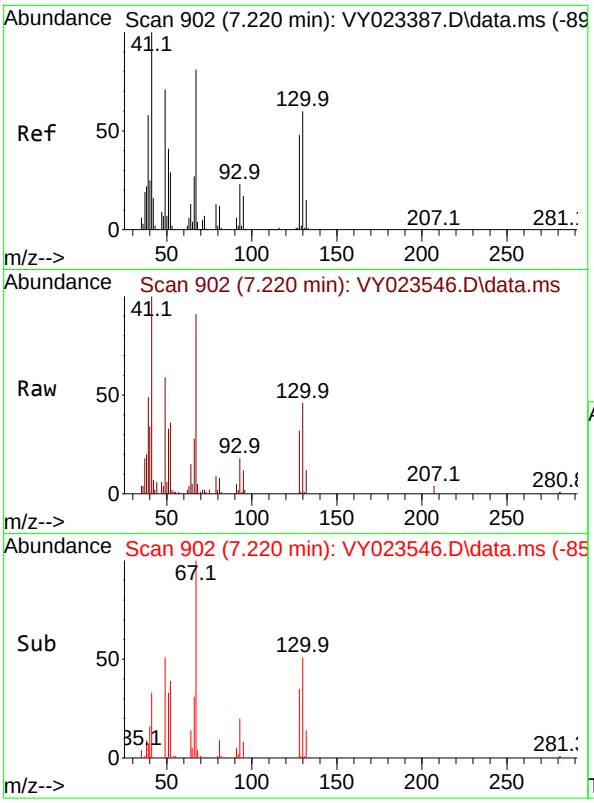


#40
Benzene
Concen: 20.677 ug/l
RT: 8.085 min Scan# 1044
Delta R.T. 0.006 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion: 78 Resp: 423056

Ion	Ratio	Lower	Upper
78	100		
77	23.0	18.3	27.5

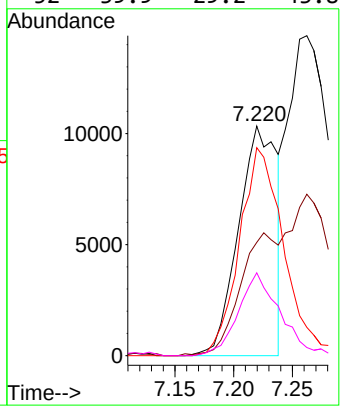




#41
Methacrylonitrile
Concen: 16.996 ug/l
RT: 7.220 min Scan# 9
Delta R.T. 0.000 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion: 41 Resp: 2352

Ion	Ratio	Lower	Upper
41	100		
39	52.8	52.2	78.4
67	105.4	74.9	112.3
52	39.9	29.2	43.8



Instrument :
MSVOA_Y
ClientSampleId :
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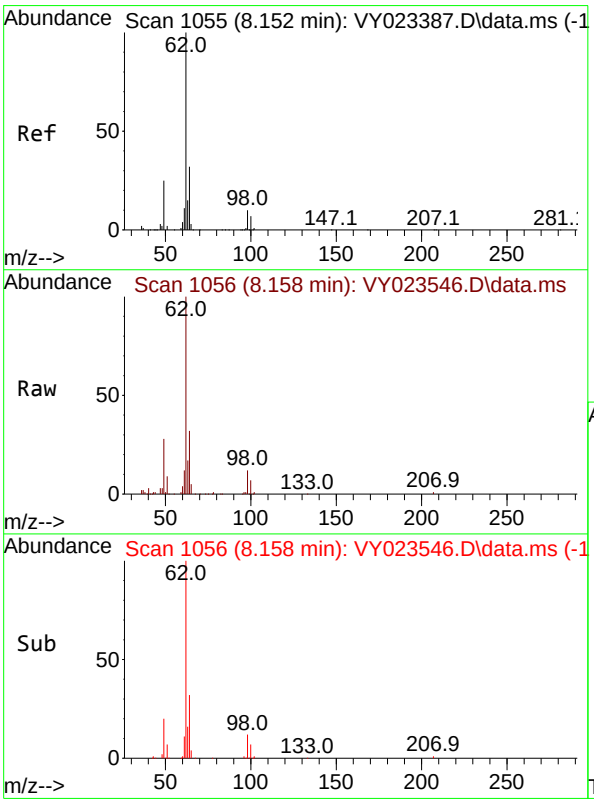
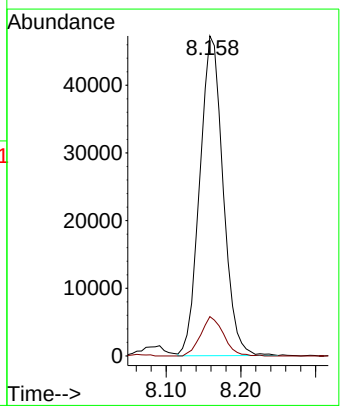
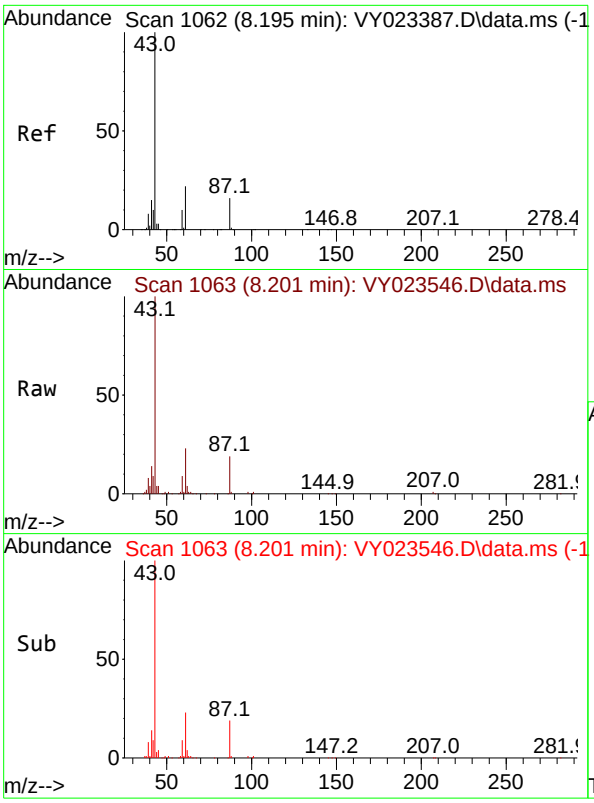


#42
1,2-Dichloroethane
Concen: 19.387 ug/l
RT: 8.158 min Scan# 1056
Delta R.T. 0.006 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion: 62 Resp: 102298

Ion	Ratio	Lower	Upper
62	100		
98	12.1	0.0	21.6





#43
Isopropyl Acetate
Concen: 18.046 ug/l
RT: 8.201 min Scan# 1
Delta R.T. 0.006 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion: 43 Resp: 9210

Ion	Ratio	Lower	Upper
43	100		
61	23.3	18.1	27.1
87	18.2	13.5	20.3

Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBSD01

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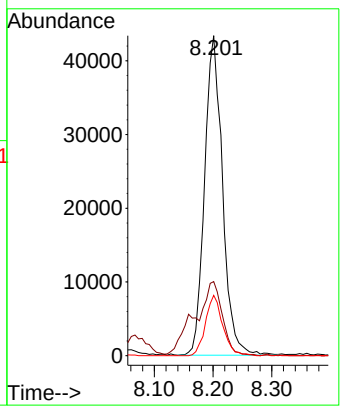
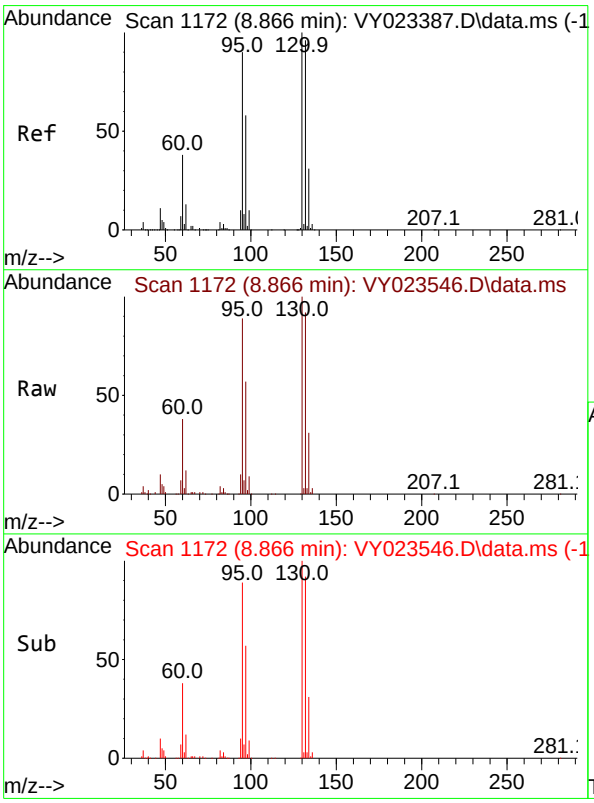
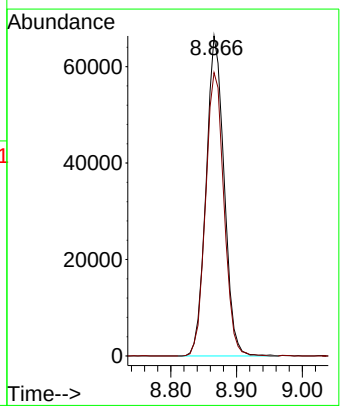


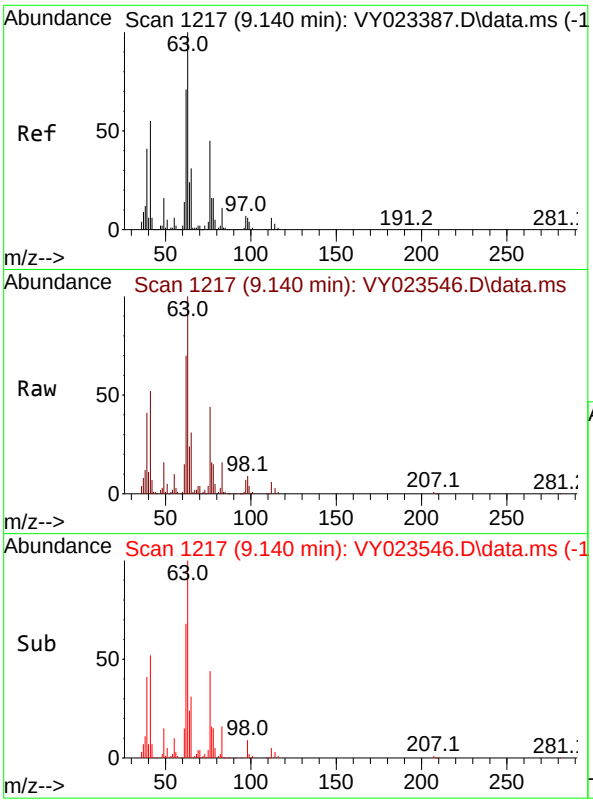


#44
Trichloroethene
Concen: 21.155 ug/l
RT: 8.866 min Scan# 1172
Delta R.T. -0.000 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion:130 Resp: 126688

Ion	Ratio	Lower	Upper
130	100		
95	88.6	0.0	180.6

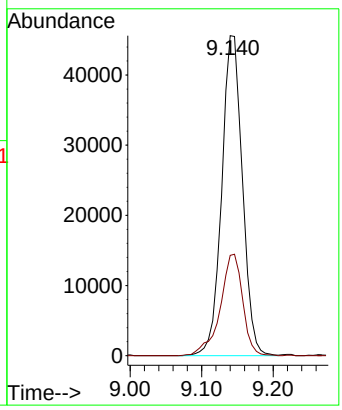




#45
1,2-Dichloropropane
Concen: 20.314 ug/l
RT: 9.140 min Scan# 1
Delta R.T. 0.000 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion: 63 Resp: 9180

Ion	Ratio	Lower	Upper
63	100		
65	31.3	24.9	37.3



Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBSD01

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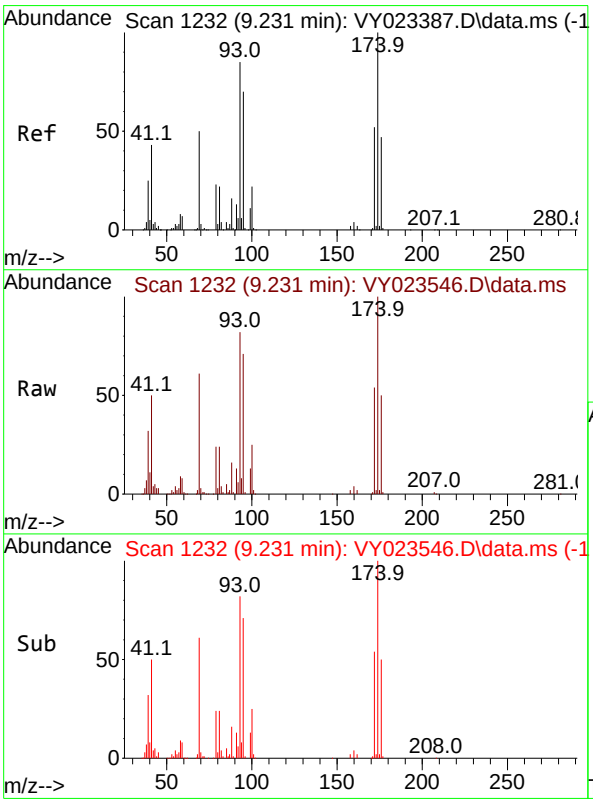
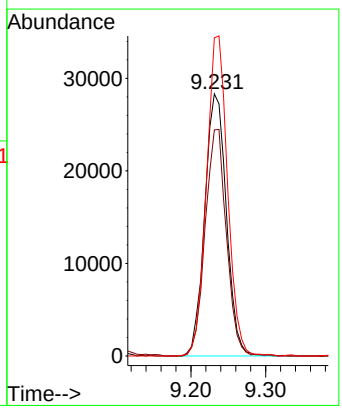
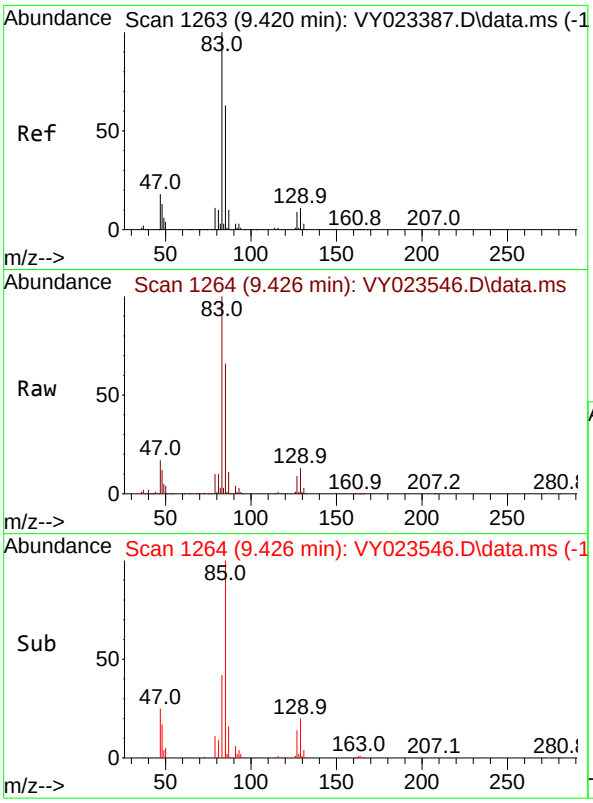


#46
Dibromomethane
Concen: 19.927 ug/l
RT: 9.231 min Scan# 1232
Delta R.T. 0.000 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion: 93 Resp: 56943

Ion	Ratio	Lower	Upper
93	100		
95	84.9	65.4	98.0
174	119.2	92.9	139.3

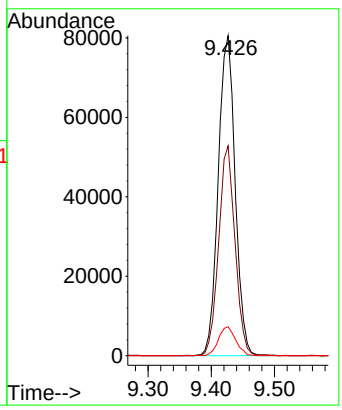




#47
Bromodichloromethane
Concen: 20.710 ug/l
RT: 9.426 min Scan# 1
Delta R.T. 0.006 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion: 83 Resp: 14904

Ion	Ratio	Lower	Upper
83	100		
85	65.6	50.8	76.2
127	9.1	7.4	11.2



Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBSD01

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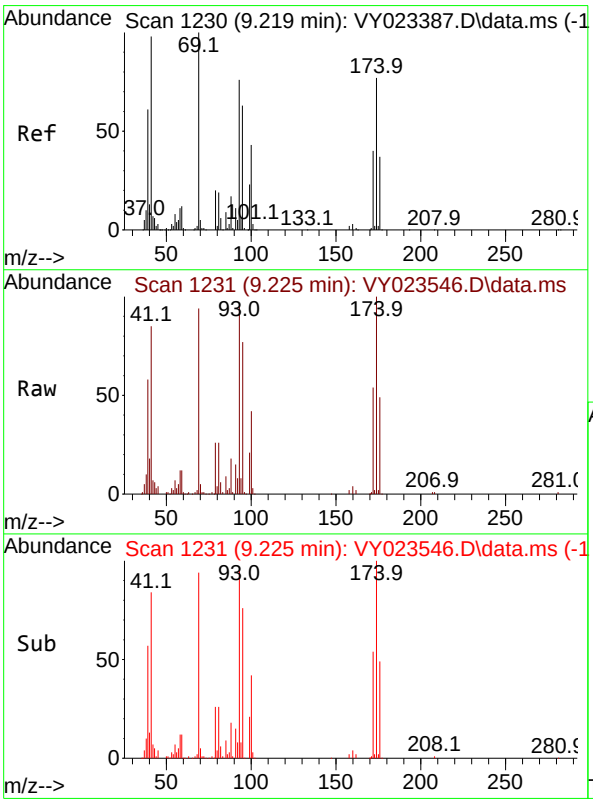
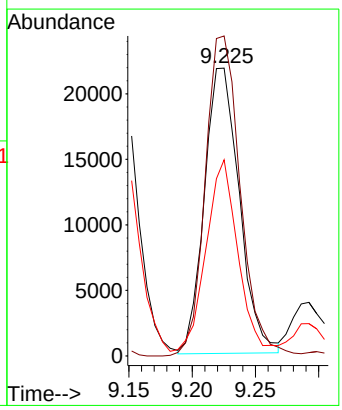
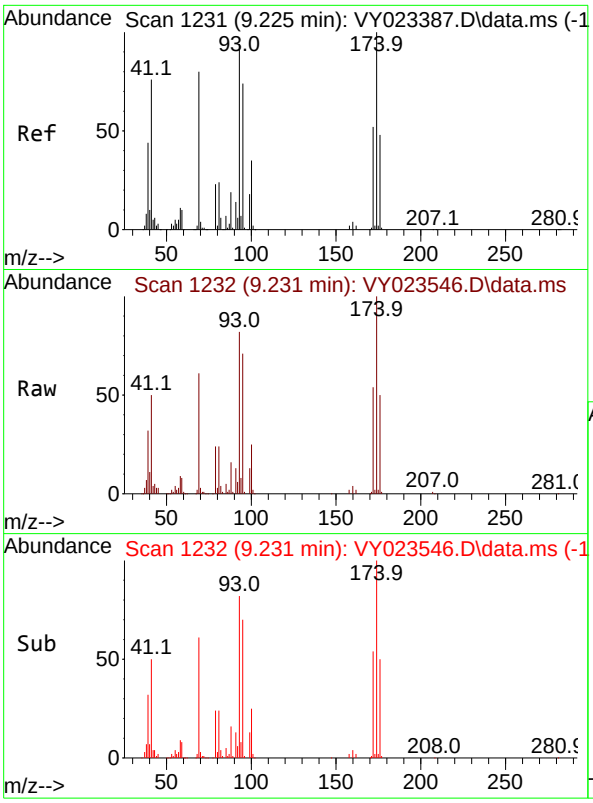


#48
Methyl methacrylate
Concen: 17.463 ug/l
RT: 9.225 min Scan# 1231
Delta R.T. 0.006 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion: 41 Resp: 41870

Ion	Ratio	Lower	Upper
41	100		
69	112.3	81.0	121.4
39	60.8	48.2	72.4

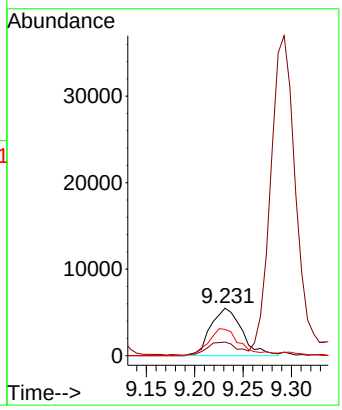




#49
1,4-Dioxane
Concen: 372.543 ug/l
RT: 9.231 min Scan# 1
Delta R.T. 0.006 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion: 88 Resp: 1234

Ion	Ratio	Lower	Upper
88	100		
43	26.7	21.8	32.8
58	56.9	46.8	70.2



Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBSD01

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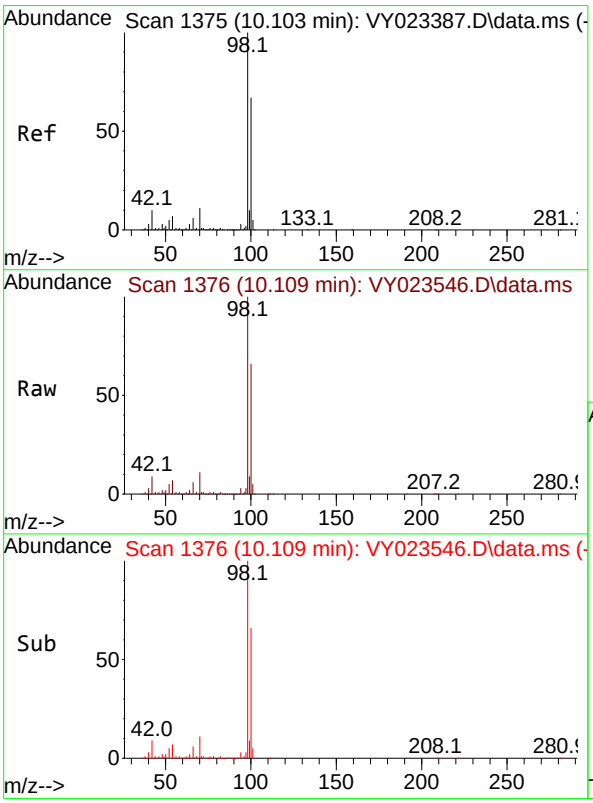
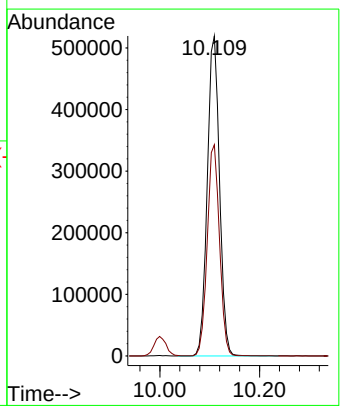
Supervised By :Mahesh Dadoda 10/24/2025

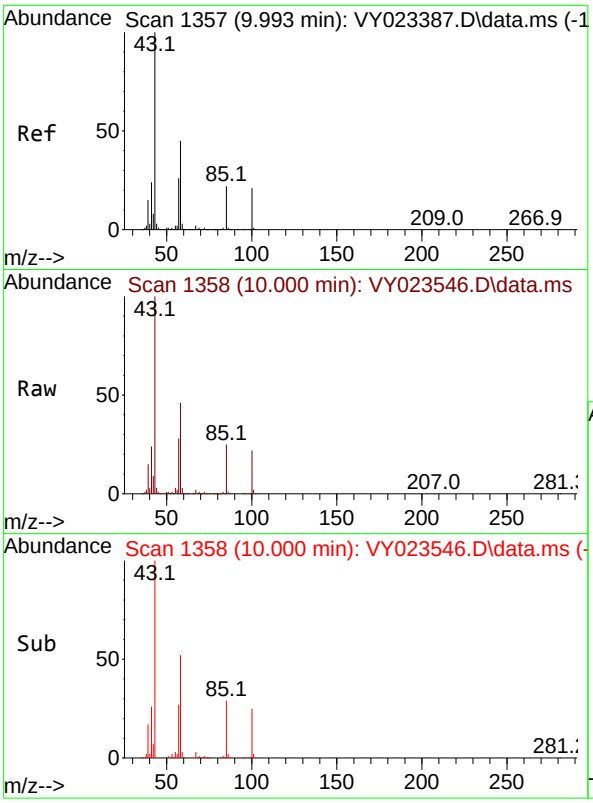


#50
Toluene-d8
Concen: 48.611 ug/l
RT: 10.109 min Scan# 1376
Delta R.T. 0.006 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion: 98 Resp: 883426

Ion	Ratio	Lower	Upper
98	100		
100	66.1	53.0	79.4

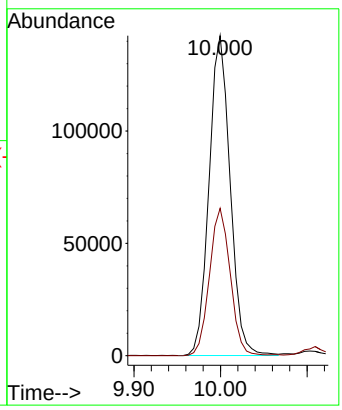




#51
4-Methyl-2-Pentanone
Concen: 91.359 ug/l
RT: 10.000 min Scan# 1
Delta R.T. 0.006 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion: 43 Resp: 24090

Ion	Ratio	Lower	Upper
43	100		
58	45.5	35.3	52.9



Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBSD01

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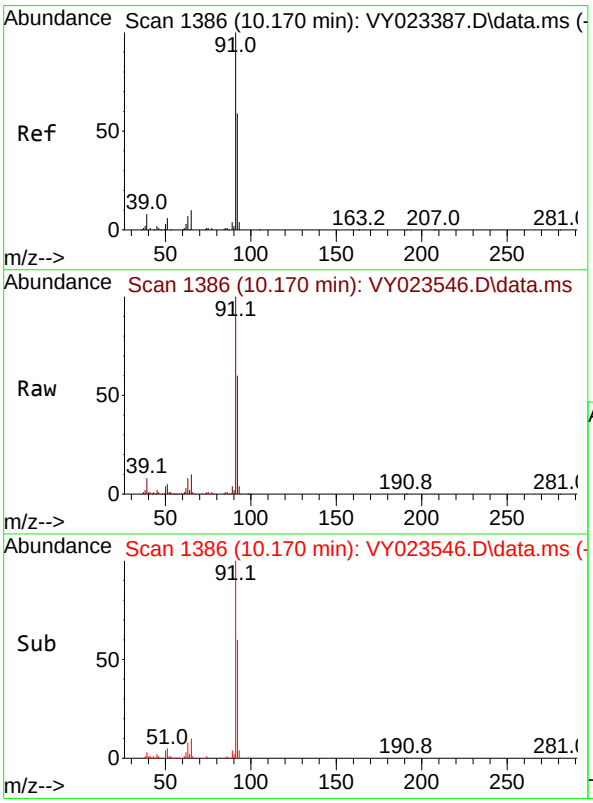
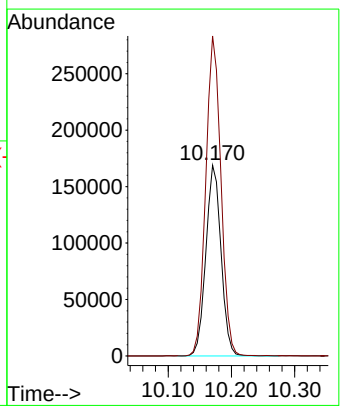
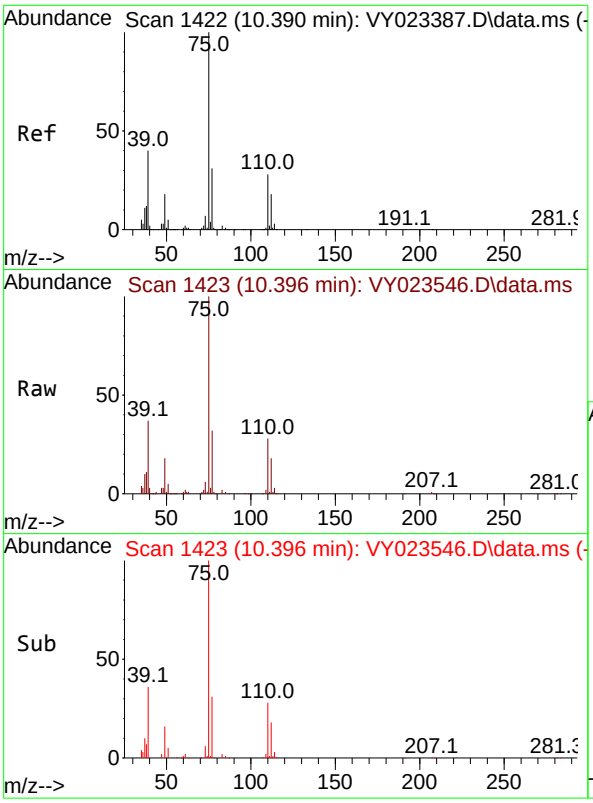


#52
Toluene
Concen: 21.186 ug/l
RT: 10.170 min Scan# 1386
Delta R.T. 0.000 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion: 92 Resp: 281449

Ion	Ratio	Lower	Upper
92	100		
91	168.1	136.4	204.6

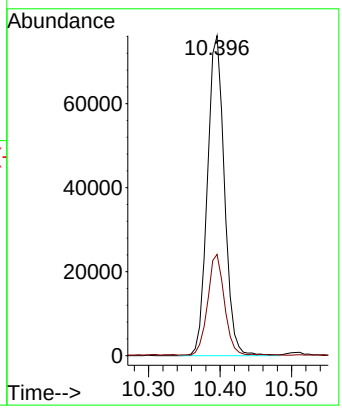




#53
t-1,3-Dichloropropene
Concen: 20.087 ug/l
RT: 10.396 min Scan# 14
Delta R.T. 0.006 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion: 75 Resp: 12569

Ion	Ratio	Lower	Upper
75	100		
77	31.4	25.1	37.7



Instrument :
MSVOA_Y
ClientSampleId :
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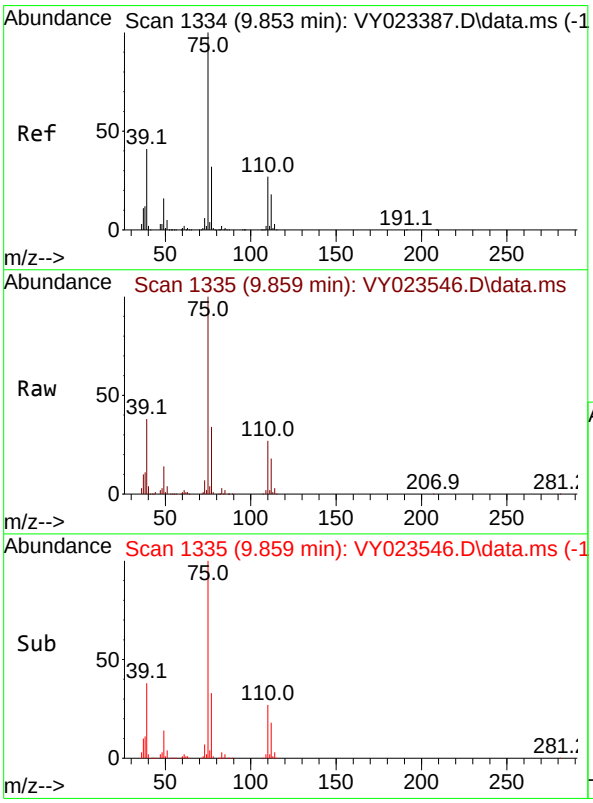
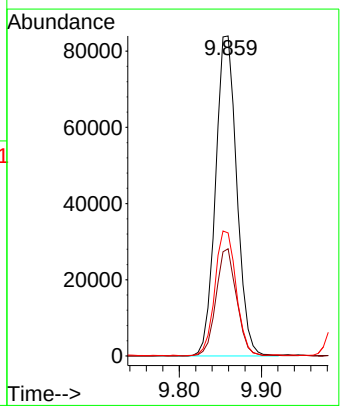
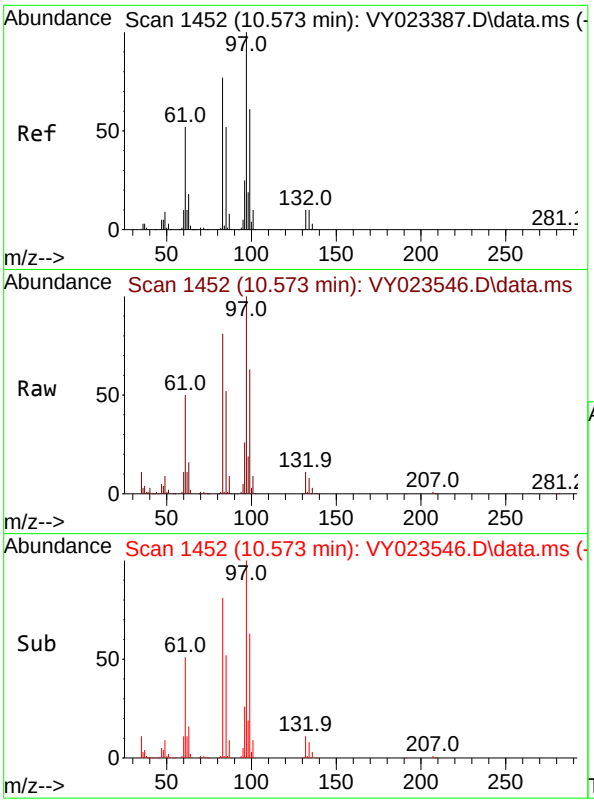


#54
cis-1,3-Dichloropropene
Concen: 20.389 ug/l
RT: 9.859 min Scan# 1335
Delta R.T. 0.006 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion: 75 Resp: 150591

Ion	Ratio	Lower	Upper
75	100		
77	33.4	25.4	38.0
39	38.3	32.8	49.2

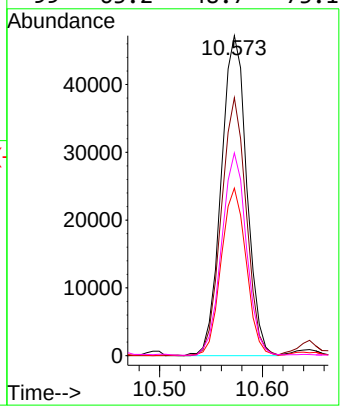




#55
1,1,2-Trichloroethane
Concen: 21.184 ug/l
RT: 10.573 min Scan# 14
Delta R.T. 0.000 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion: 97 Resp: 8140

Ion	Ratio	Lower	Upper
97	100		
83	80.4	61.8	92.6
85	52.4	41.3	61.9
99	63.2	48.7	73.1



Instrument :
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ClientSampleId :
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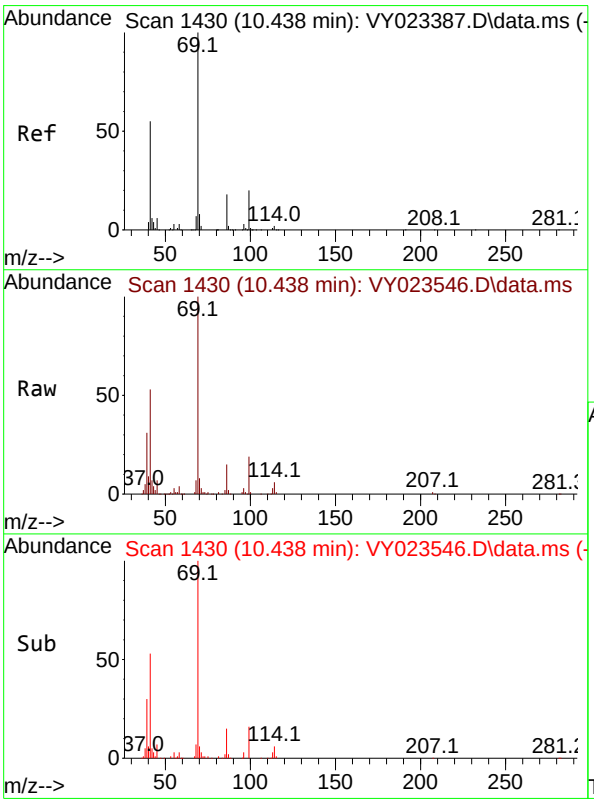
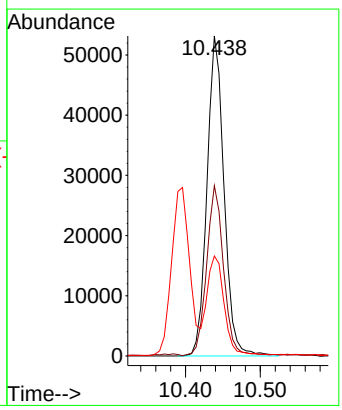
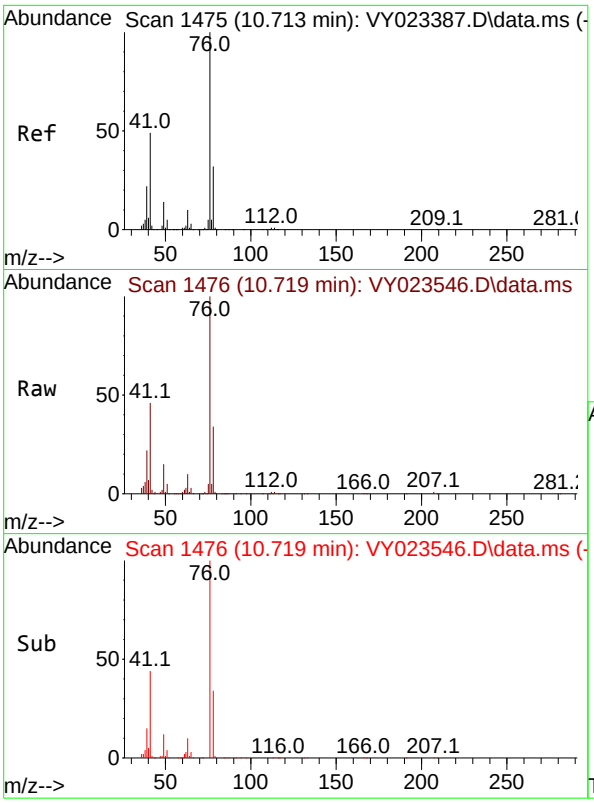


#56
Ethyl methacrylate
Concen: 18.994 ug/l
RT: 10.438 min Scan# 1430
Delta R.T. 0.000 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion: 69 Resp: 84192

Ion	Ratio	Lower	Upper
69	100		
41	52.9	44.6	67.0
39	30.6	27.0	40.4

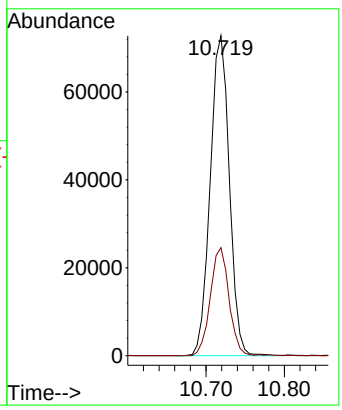




#57
1,3-Dichloropropane
Concen: 20.266 ug/l
RT: 10.719 min Scan# 14
Delta R.T. 0.006 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion: 76 Resp: 12340

Ion	Ratio	Lower	Upper
76	100		
78	32.9	25.9	38.9



Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBSD01

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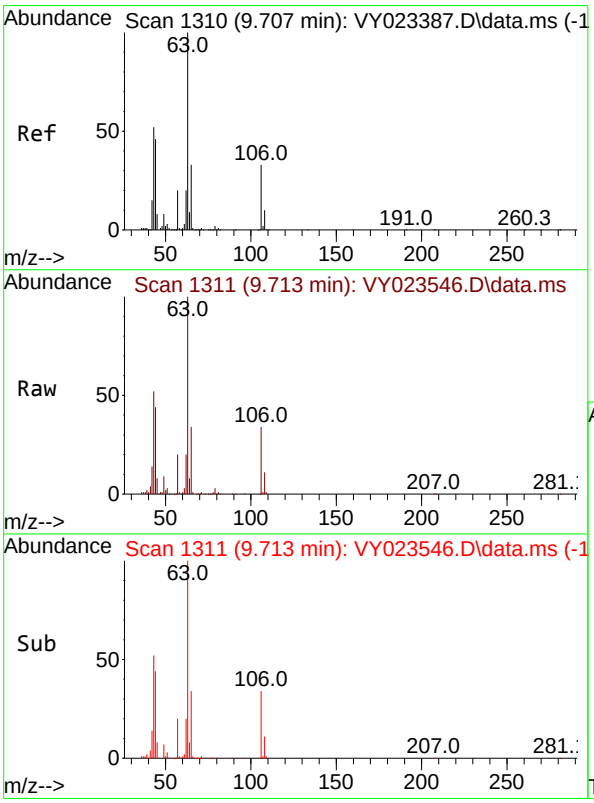
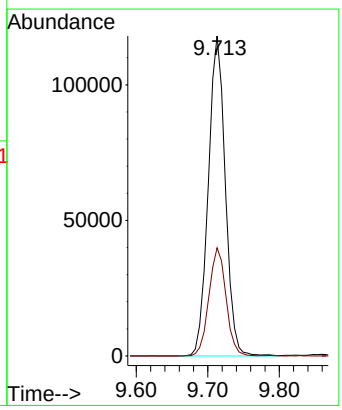
Supervised By :Mahesh Dadoda 10/24/2025

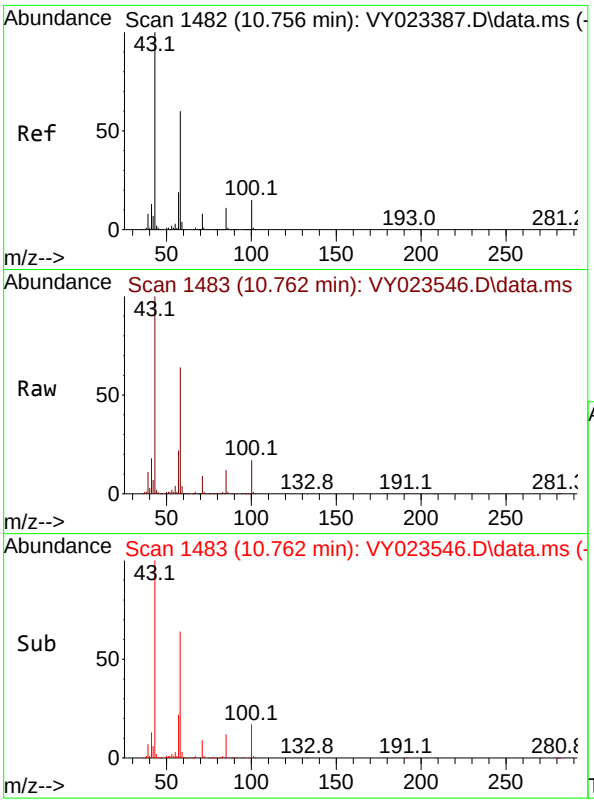


#58
2-Chloroethyl Vinyl ether
Concen: 98.074 ug/l
RT: 9.713 min Scan# 1311
Delta R.T. 0.006 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion: 63 Resp: 194748

Ion	Ratio	Lower	Upper
63	100		
106	34.0	26.6	39.8





#59
2-Hexanone
Concen: 102.481 ug/l
RT: 10.762 min Scan# 14
Delta R.T. 0.006 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion: 43 Resp: 19312

Ion	Ratio	Lower	Upper
43	100		
58	63.4	30.5	91.5

Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBSD01

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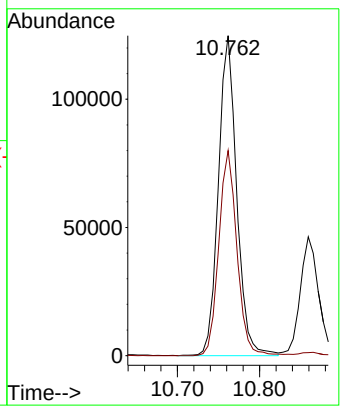
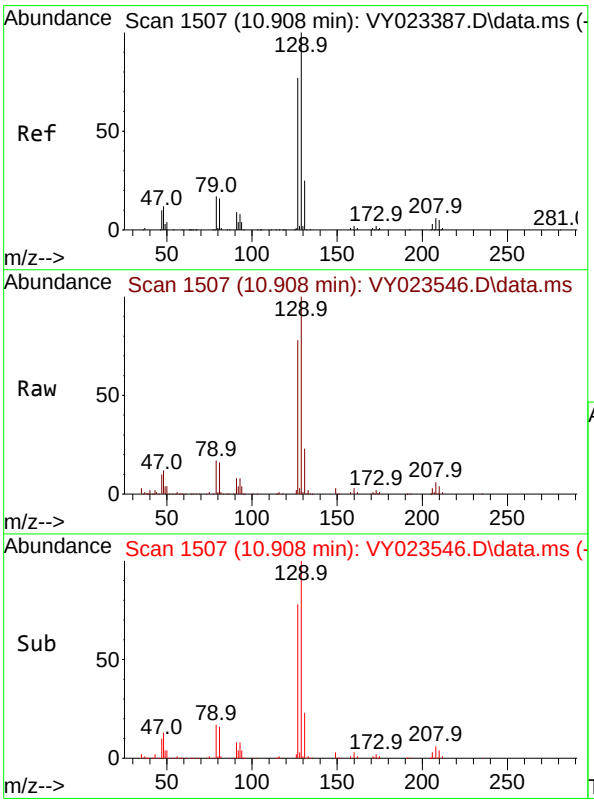
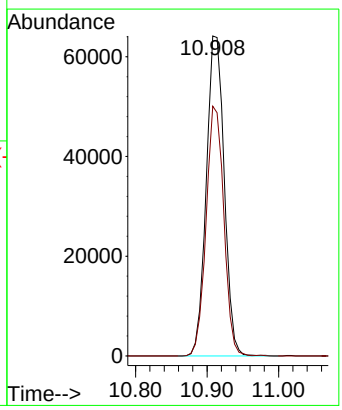


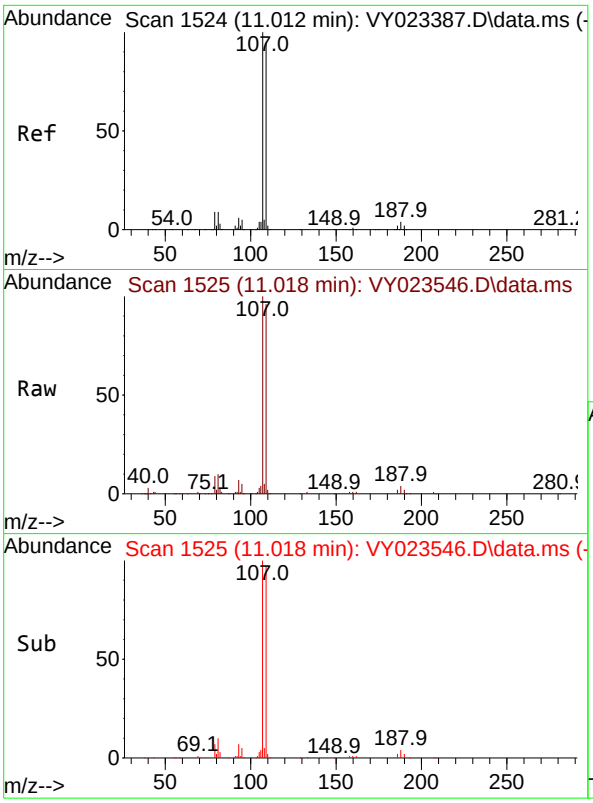


#60
Dibromochloromethane
Concen: 20.721 ug/l
RT: 10.908 min Scan# 1507
Delta R.T. -0.000 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion:129 Resp: 111638

Ion	Ratio	Lower	Upper
129	100		
127	77.0	38.6	115.7

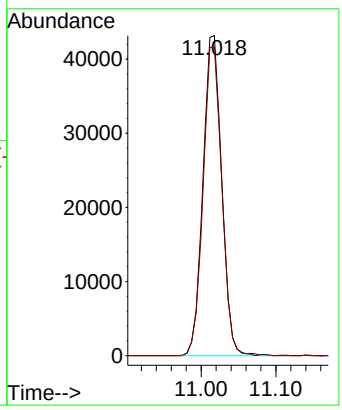




#61
1,2-Dibromoethane
Concen: 20.524 ug/l
RT: 11.018 min Scan# 1
Delta R.T. 0.006 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion:107 Resp: 7521

Ion	Ratio	Lower	Upper
107	100		
109	95.8	76.1	114.1



Instrument :
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ClientSampleId :
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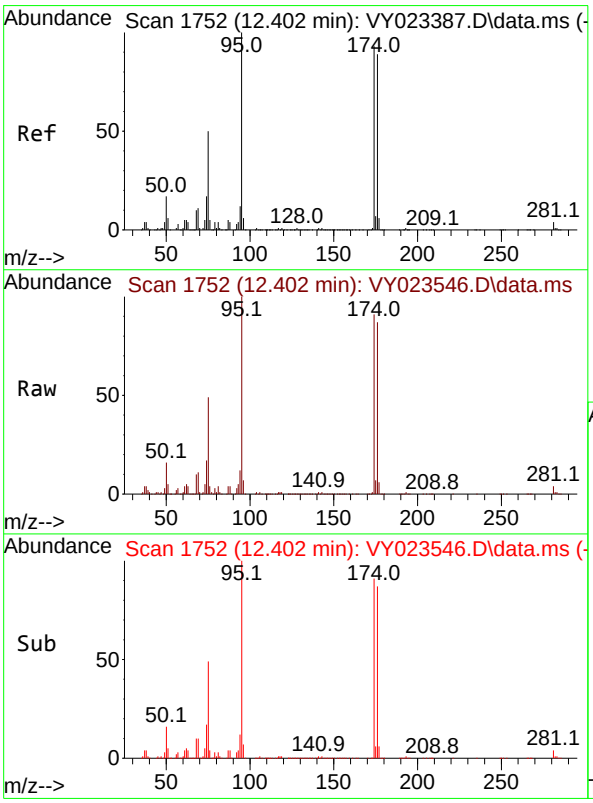
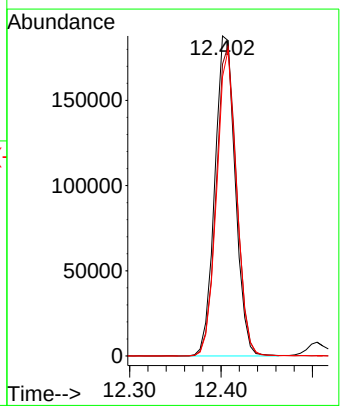
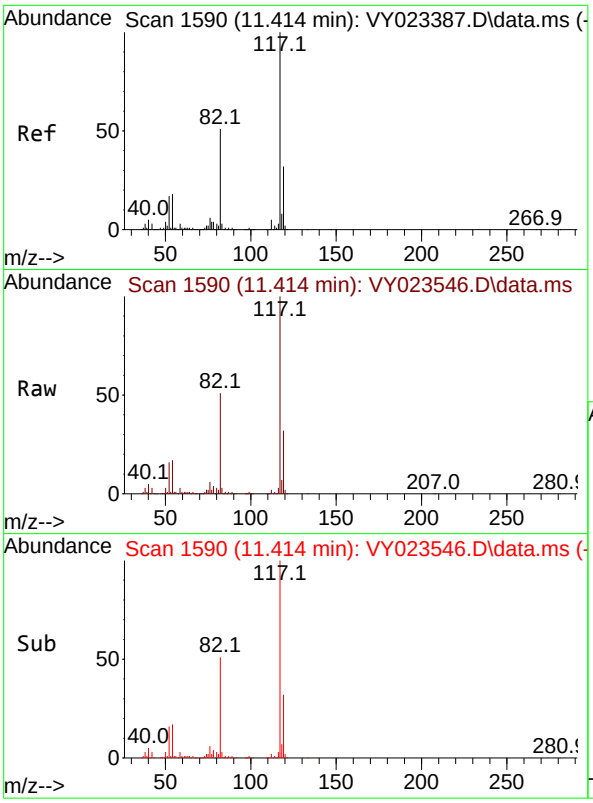


#62
4-Bromofluorobenzene
Concen: 48.735 ug/l
RT: 12.402 min Scan# 1752
Delta R.T. -0.000 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion: 95 Resp: 292410

Ion	Ratio	Lower	Upper
95	100		
174	96.3	0.0	192.8
176	93.1	0.0	187.6

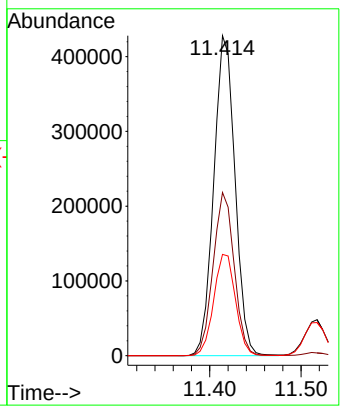




#63
Chlorobenzene-d5
Concen: 50.000 ug/l
RT: 11.414 min Scan# 1
Delta R.T. 0.000 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion:117 Resp: 69178

Ion	Ratio	Lower	Upper
117	100		
82	51.0	41.0	61.4
119	31.6	25.6	38.4



Instrument :
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ClientSampleId :
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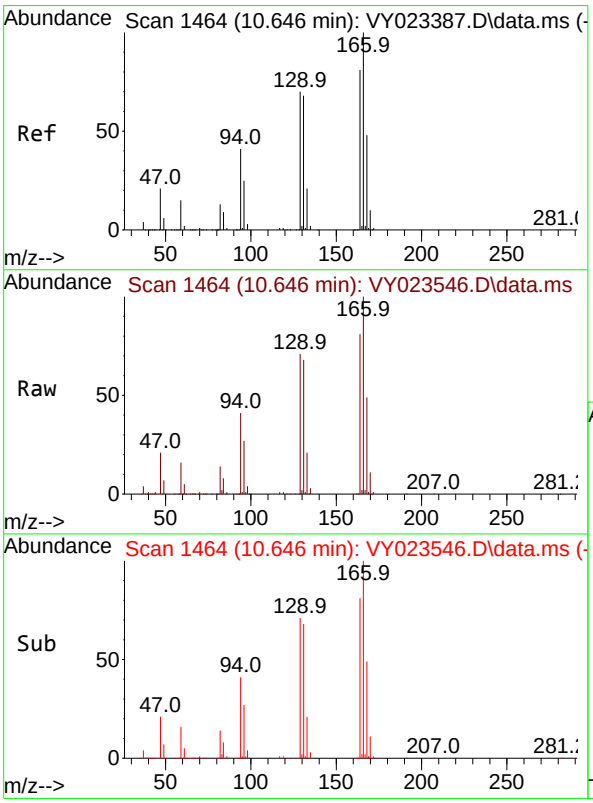
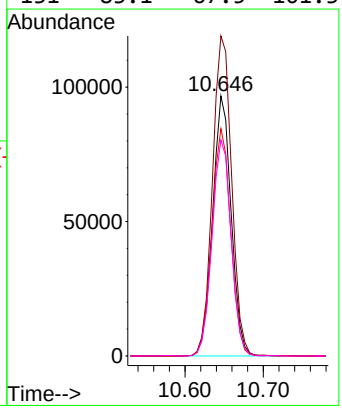
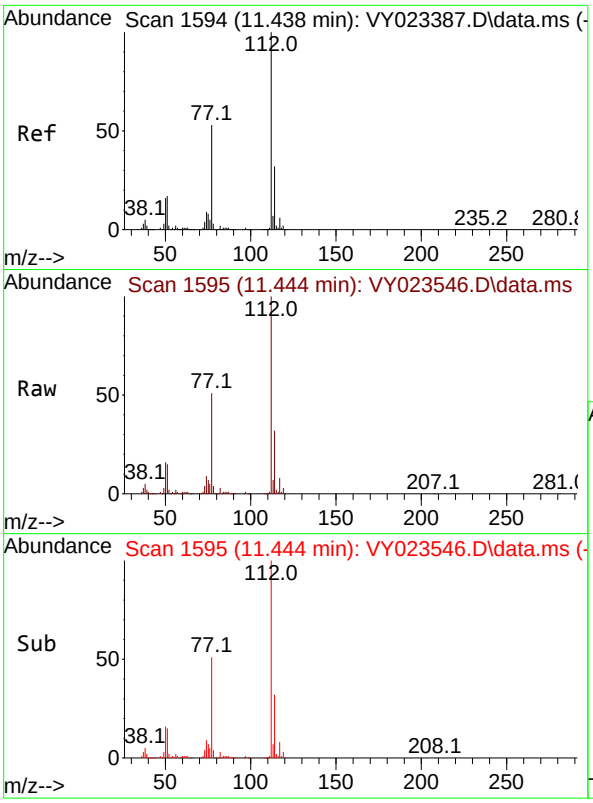


#64
Tetrachloroethene
Concen: 22.316 ug/l
RT: 10.646 min Scan# 1464
Delta R.T. -0.000 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion:164 Resp: 159402

Ion	Ratio	Lower	Upper
164	100		
166	123.0	99.4	149.0
129	87.4	69.4	104.2
131	83.1	67.5	101.3

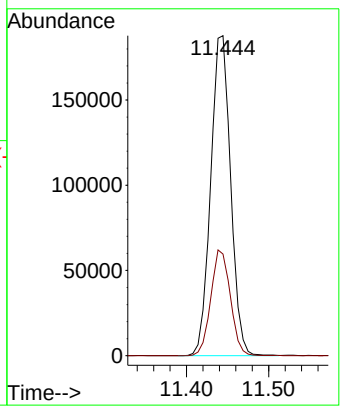




#65
Chlorobenzene
Concen: 20.995 ug/l
RT: 11.444 min Scan# 1
Delta R.T. 0.006 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion:112 Resp: 31588

Ion	Ratio	Lower	Upper
112	100		
114	31.7	25.6	38.4



Instrument :
MSVOA_Y
ClientSampleId :
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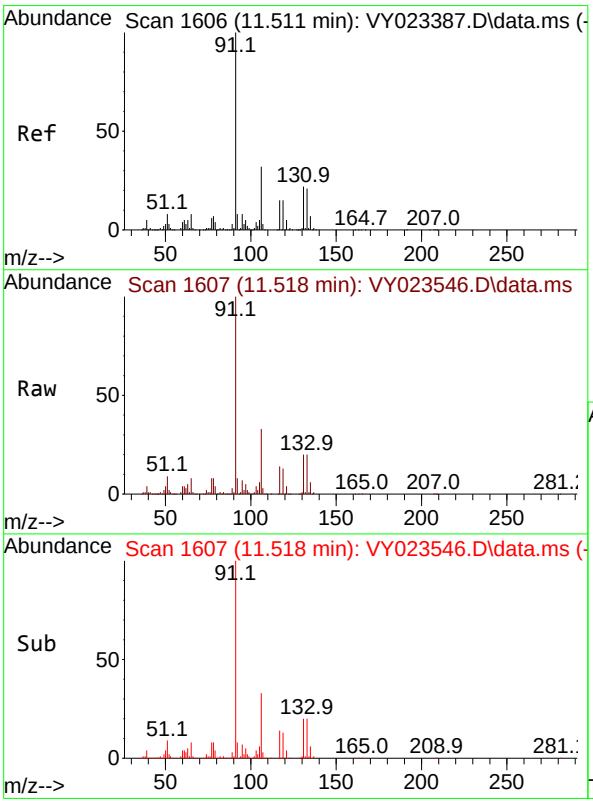
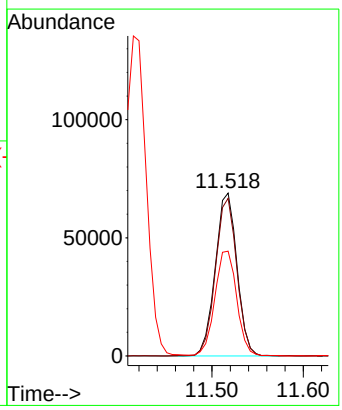
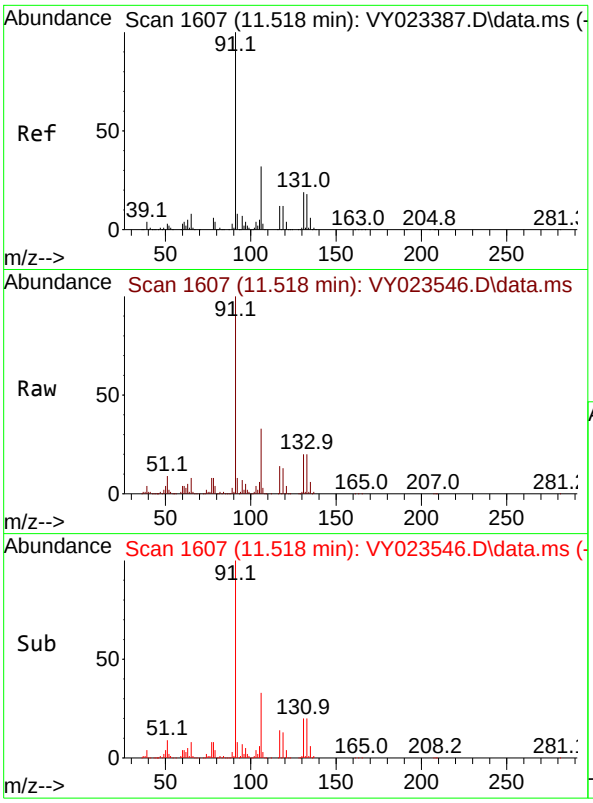


#66
1,1,1,2-Tetrachloroethane
Concen: 21.234 ug/l
RT: 11.518 min Scan# 1607
Delta R.T. 0.006 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion:131 Resp: 113849

Ion	Ratio	Lower	Upper
131	100		
133	95.7	48.4	145.2
119	65.3	32.4	97.2

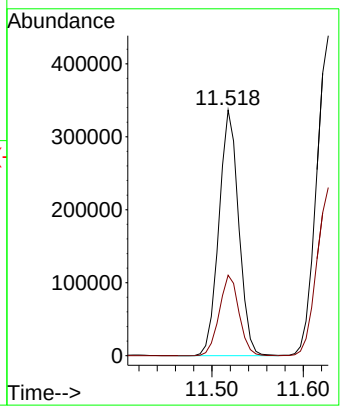




#67
Ethyl Benzene
Concen: 20.807 ug/l
RT: 11.518 min Scan# 1
Delta R.T. 0.000 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion: 91 Resp: 50676

Ion	Ratio	Lower	Upper
91	100		
106	32.8	25.8	38.8



Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBSD01

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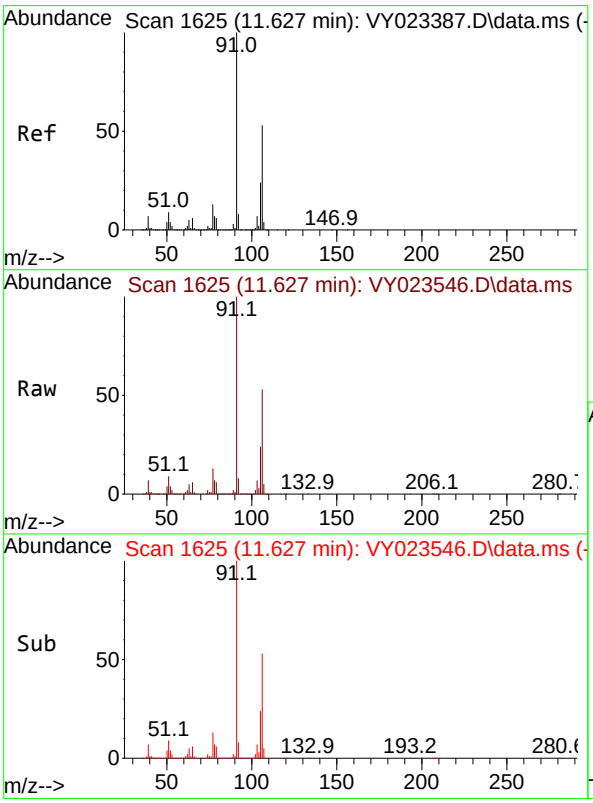
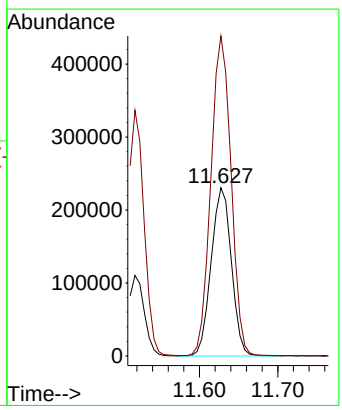
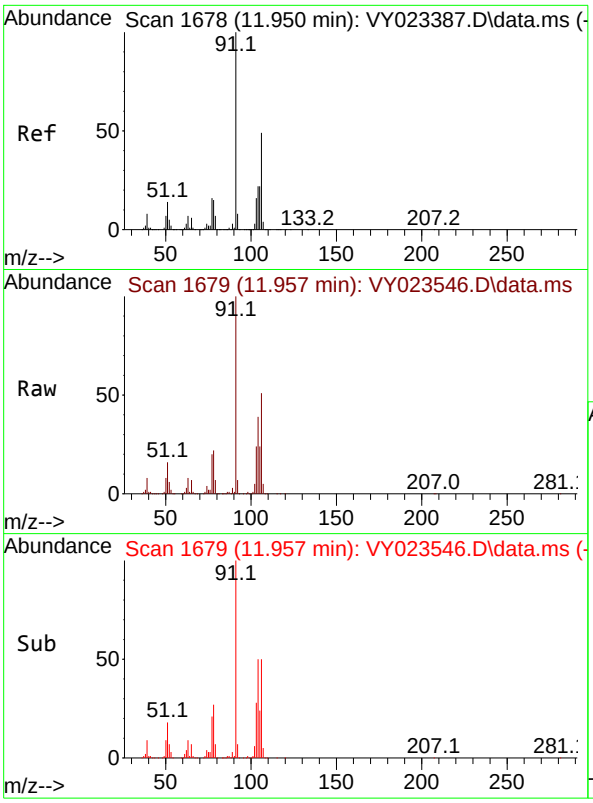


#68
m/p-Xylenes
Concen: 42.235 ug/l
RT: 11.627 min Scan# 1625
Delta R.T. -0.000 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion:106 Resp: 412583

Ion	Ratio	Lower	Upper
106	100		
91	190.4	152.6	229.0

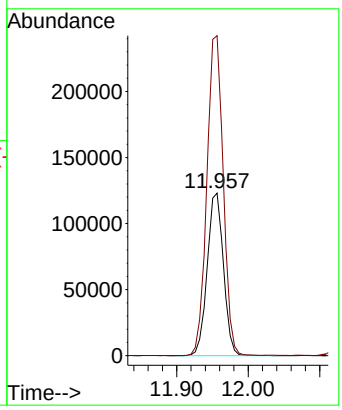




#69
o-Xylene
Concen: 21.110 ug/l
RT: 11.957 min Scan# 1
Delta R.T. 0.006 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion:106 Resp: 19342

Ion	Ratio	Lower	Upper
106	100		
91	199.0	101.4	304.1



Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBSD01

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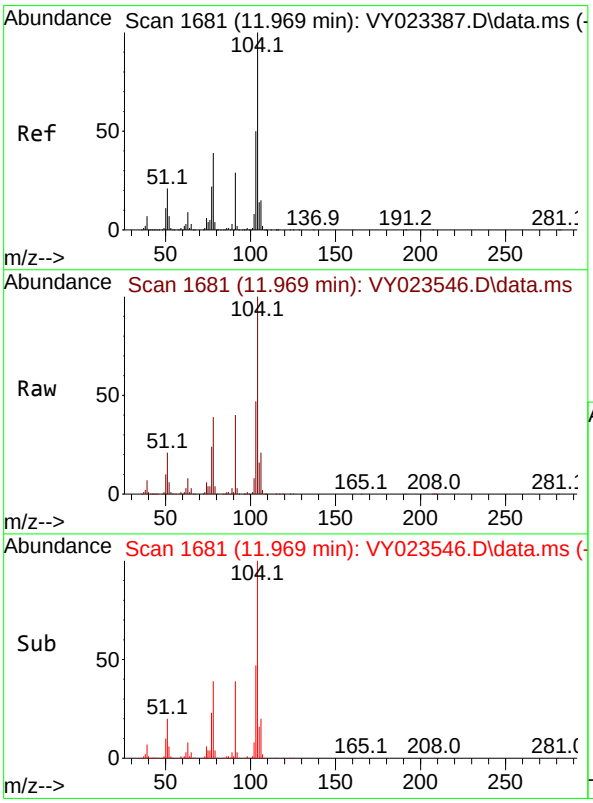
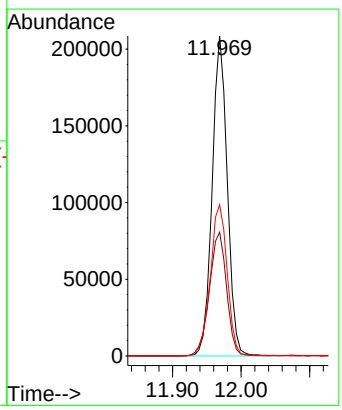
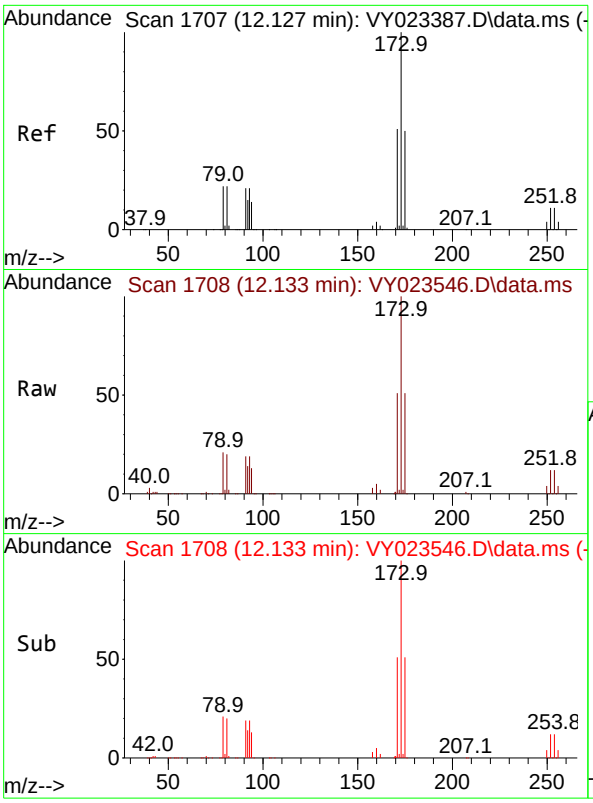


#70
Styrene
Concen: 21.173 ug/l
RT: 11.969 min Scan# 1681
Delta R.T. -0.000 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion:104 Resp: 319023

Ion	Ratio	Lower	Upper
104	100		
78	44.1	36.1	54.1
103	53.1	43.2	64.8

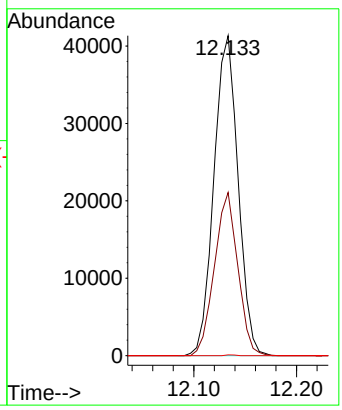




#71
Bromoform
Concen: 20.257 ug/l
RT: 12.133 min Scan# 1
Delta R.T. 0.006 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion:173 Resp: 6737

Ion	Ratio	Lower	Upper
173	100		
175	49.3	24.8	74.3
254	0.1	0.1	0.1



Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBSD01

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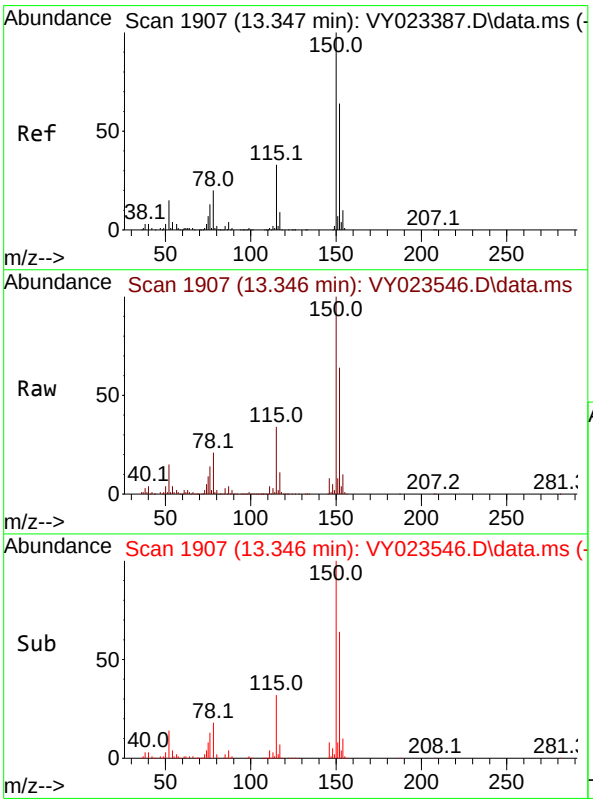
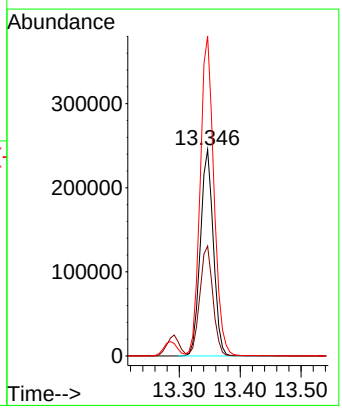
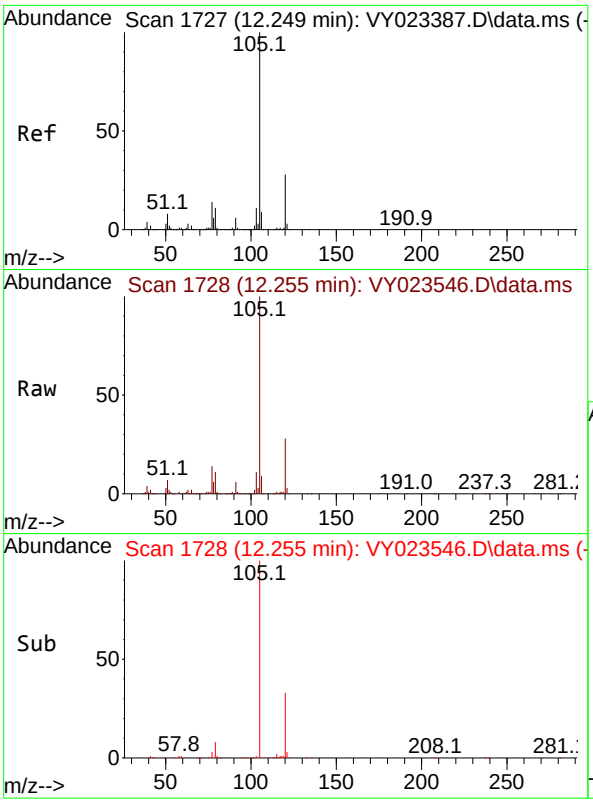


#72
1,4-Dichlorobenzene-d4
Concen: 50.000 ug/l
RT: 13.346 min Scan# 1907
Delta R.T. -0.000 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion:152 Resp: 364513

Ion	Ratio	Lower	Upper
152	100		
115	53.3	27.1	81.2
150	164.2	0.0	347.4

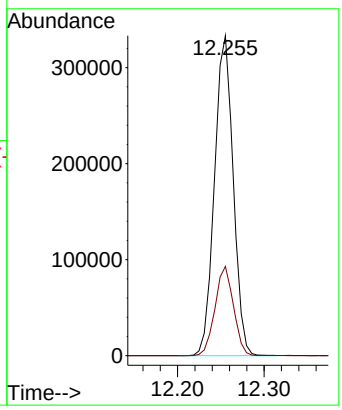




#73
Isopropylbenzene
Concen: 20.816 ug/l
RT: 12.255 min Scan# 1
Delta R.T. 0.006 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion:105 Resp: 50003

Ion	Ratio	Lower	Upper
105	100		
120	27.5	13.9	41.7



Instrument :
MSVOA_Y
ClientSampleId :
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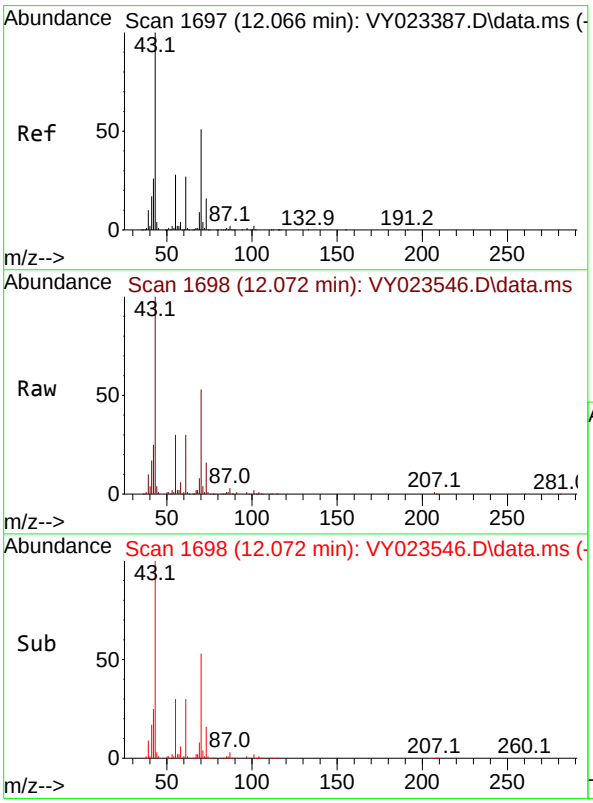
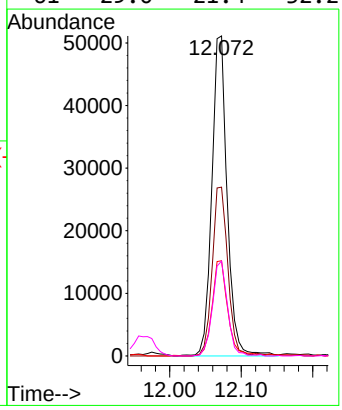
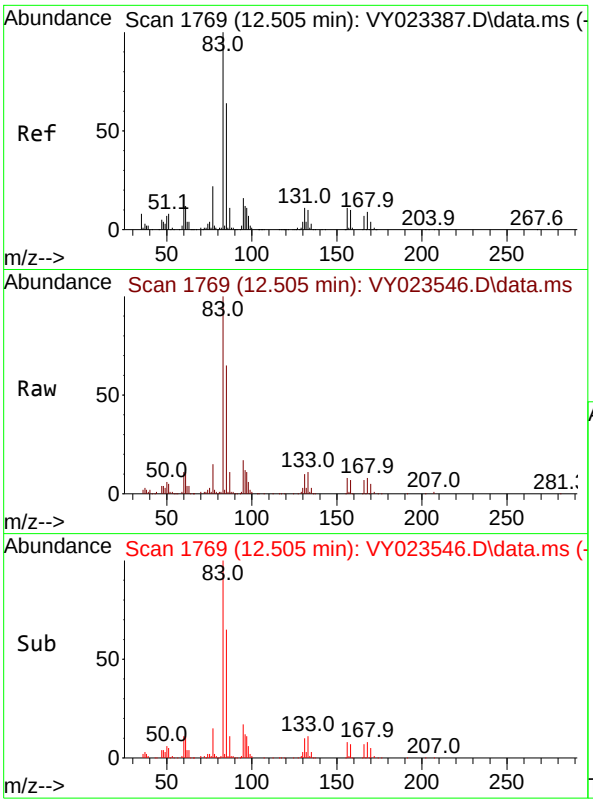


#74
N-amyl acetate
Concen: 17.641 ug/l
RT: 12.072 min Scan# 1698
Delta R.T. 0.006 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion: 43 Resp: 76114

Ion	Ratio	Lower	Upper
43	100		
70	53.4	41.1	61.7
55	30.3	23.0	34.6
61	29.0	21.4	32.2

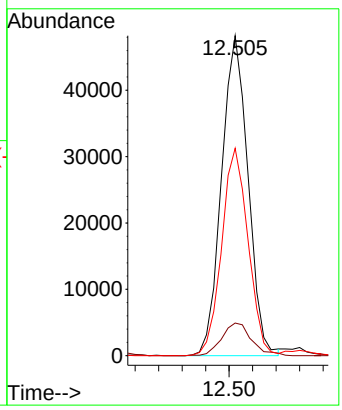




#75
1,1,2,2-Tetrachloroethane
Concen: 19.210 ug/l
RT: 12.505 min Scan# 1
Delta R.T. 0.000 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion: 83 Resp: 7547

Ion	Ratio	Lower	Upper
83	100		
131	11.5	5.9	17.6
85	64.7	31.8	95.3



Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBSD01

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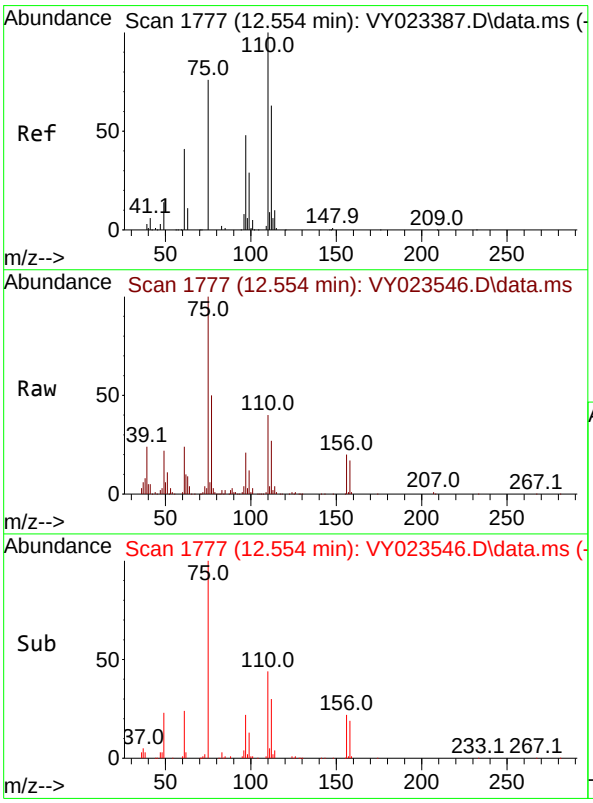
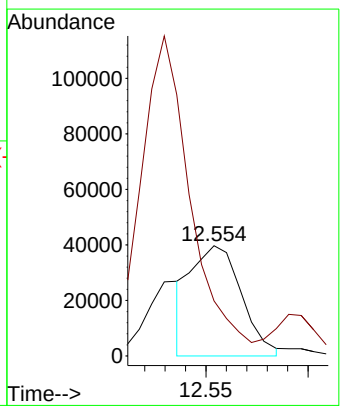
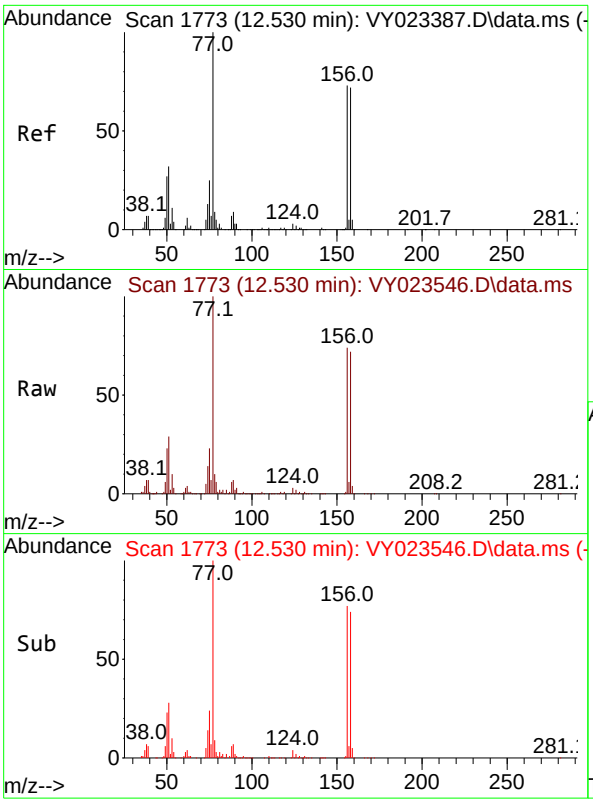


#76
1,2,3-Trichloropropane
Concen: 21.273 ug/l m
RT: 12.554 min Scan# 1777
Delta R.T. 0.000 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion: 75 Resp: 68415

Ion	Ratio	Lower	Upper
75	100		
77	0.0	0.0	0.0

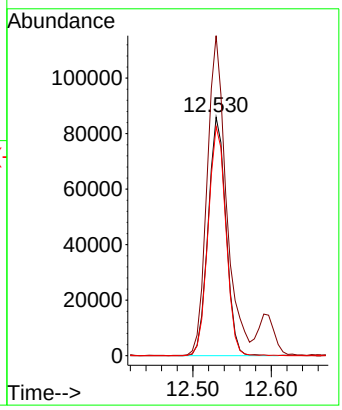




#77
Bromobenzene
Concen: 21.147 ug/l
RT: 12.530 min Scan# 1
Delta R.T. 0.000 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion:156 Resp: 13504

Ion	Ratio	Lower	Upper
156	100		
77	145.5	76.8	230.5
158	96.2	49.0	147.2



Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBSD01

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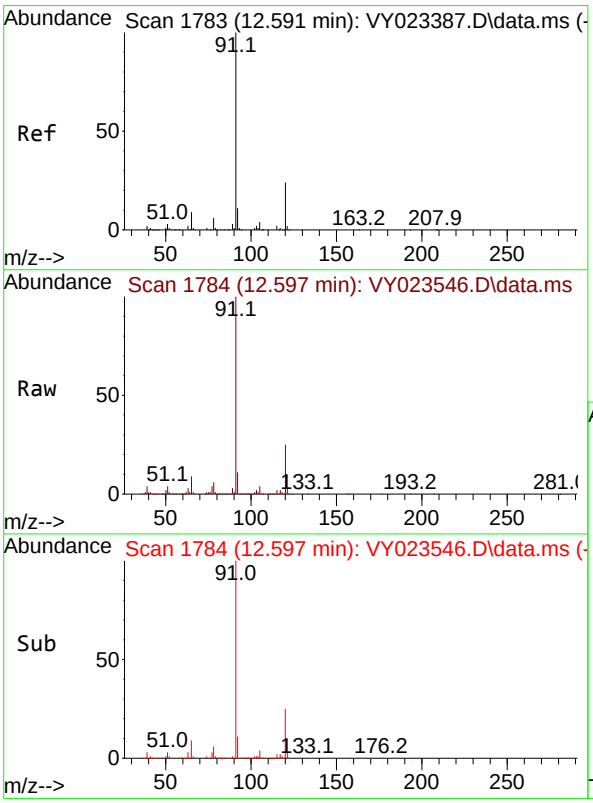
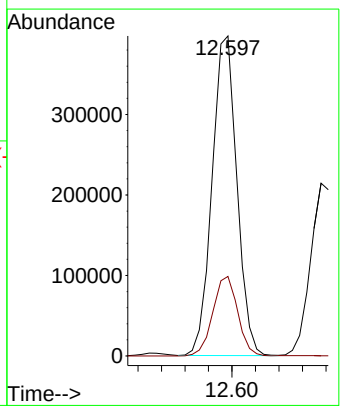
Supervised By :Mahesh Dadoda 10/24/2025

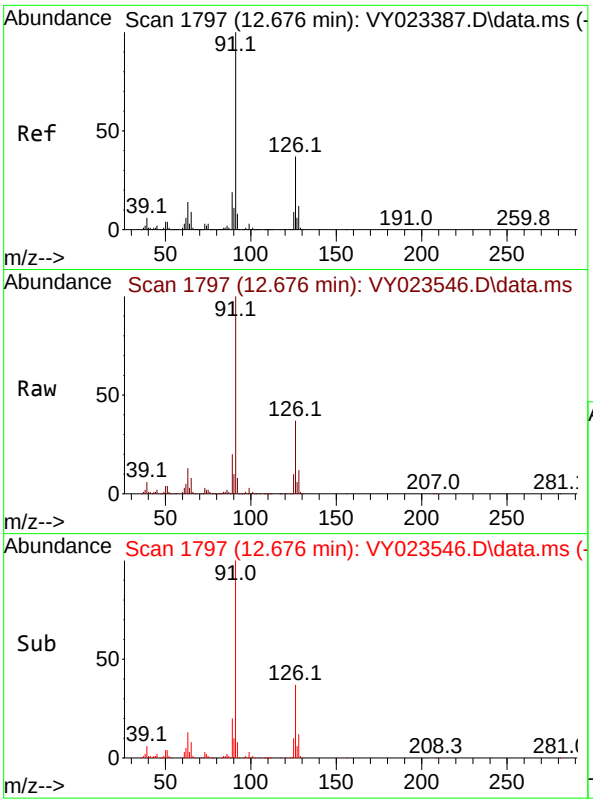


#78
n-propylbenzene
Concen: 20.960 ug/l
RT: 12.597 min Scan# 1784
Delta R.T. 0.006 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion: 91 Resp: 582648

Ion	Ratio	Lower	Upper
91	100		
120	24.9	12.3	36.8

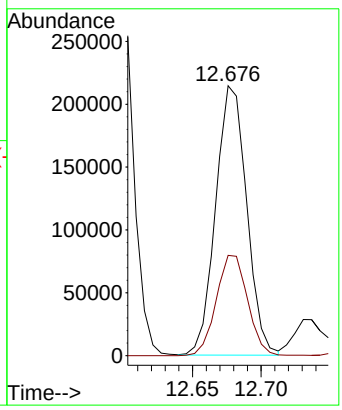




#79
2-Chlorotoluene
Concen: 20.750 ug/l
RT: 12.676 min Scan# 1
Delta R.T. 0.000 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion: 91 Resp: 33778

Ion	Ratio	Lower	Upper
91	100		
126	37.7	18.5	55.5



Instrument :
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ClientSampleId :
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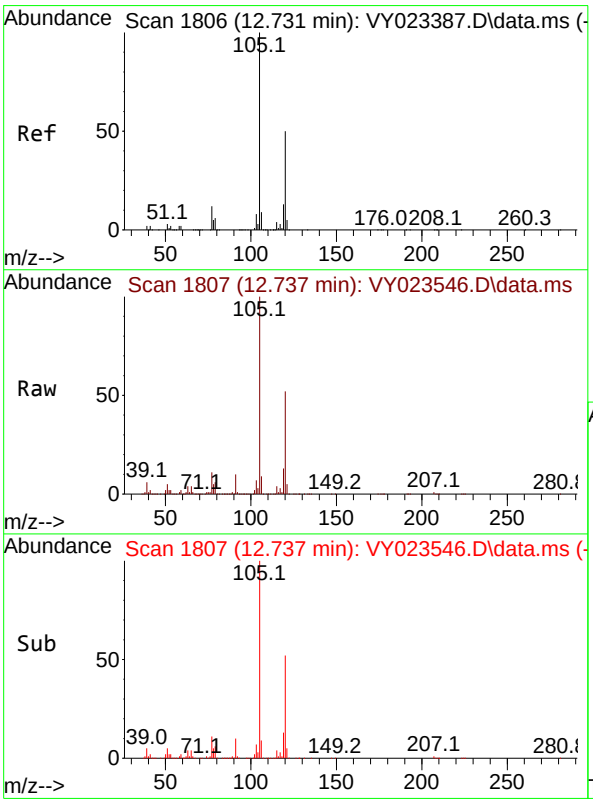
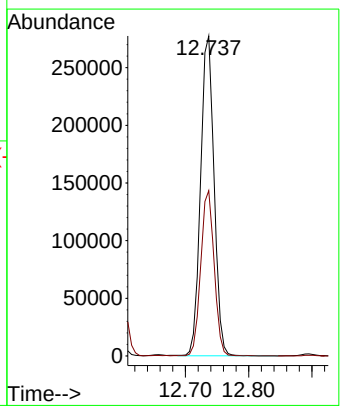
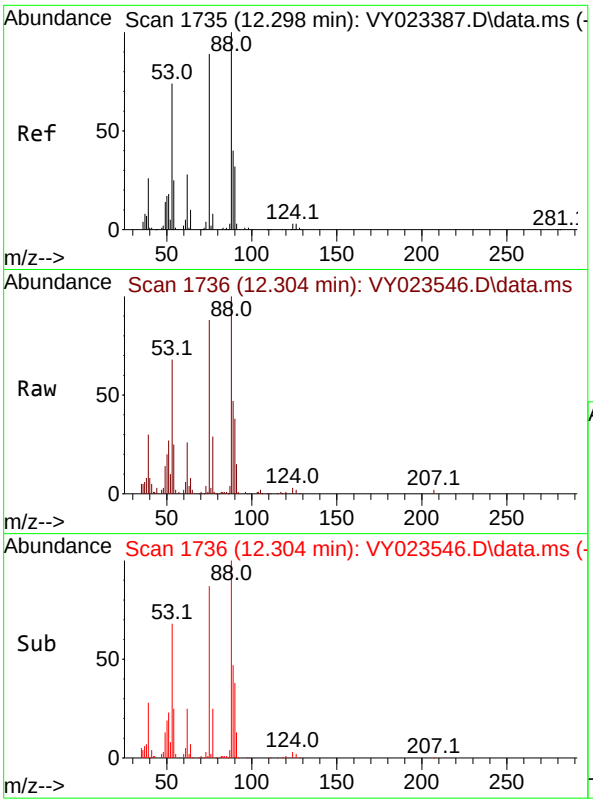


#80
1,3,5-Trimethylbenzene
Concen: 21.274 ug/l
RT: 12.737 min Scan# 1807
Delta R.T. 0.006 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion:105 Resp: 412957

Ion	Ratio	Lower	Upper
105	100		
120	51.1	25.4	76.4





#81
trans-1,4-Dichloro-2-butene
Concen: 19.613 ug/l
RT: 12.304 min Scan# 1
Delta R.T. 0.006 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion: 75 Resp: 2572

Ion	Ratio	Lower	Upper
75	100		
53	82.2	68.6	102.8
89	49.9	39.0	58.4

Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBSD01

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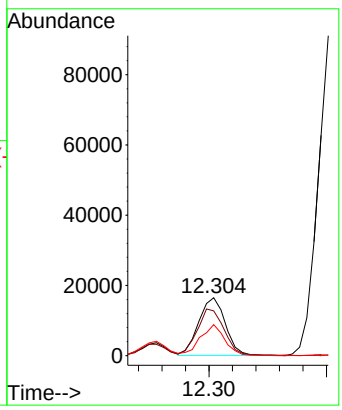
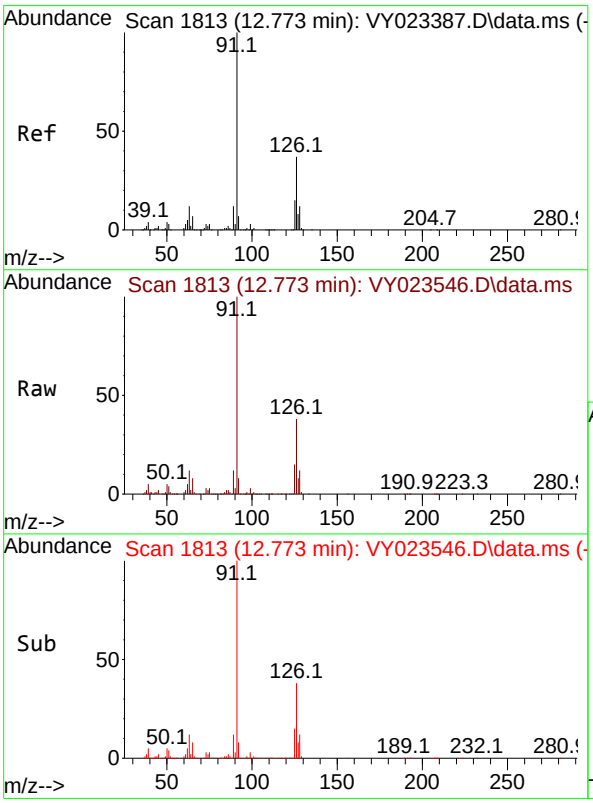
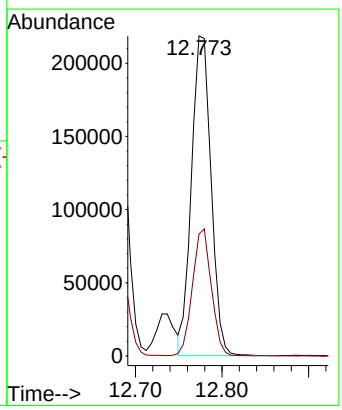


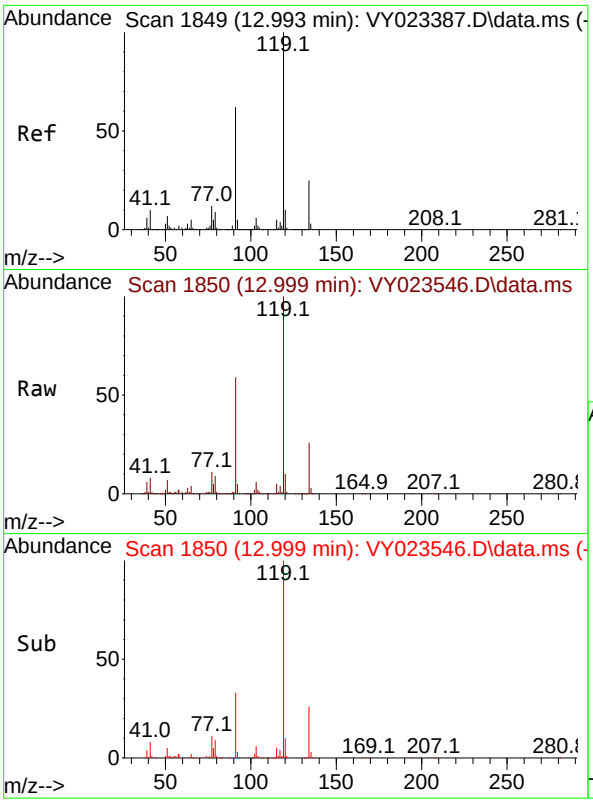


#82
4-Chlorotoluene
Concen: 20.477 ug/l
RT: 12.773 min Scan# 1813
Delta R.T. -0.000 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion: 91 Resp: 343300

Ion	Ratio	Lower	Upper
91	100		
126	38.3	18.4	55.4

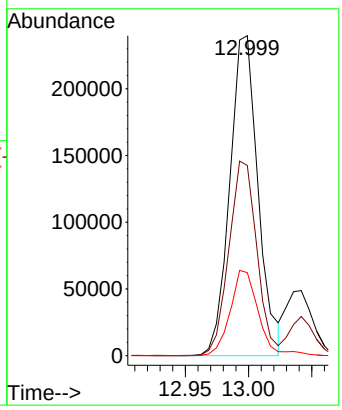




#83
tert-Butylbenzene
Concen: 20.869 ug/l
RT: 12.999 min Scan# 1
Delta R.T. 0.006 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion:119 Resp: 37403

Ion	Ratio	Lower	Upper
119	100		
91	60.0	29.9	89.8
134	26.6	12.9	38.7



Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBSD01

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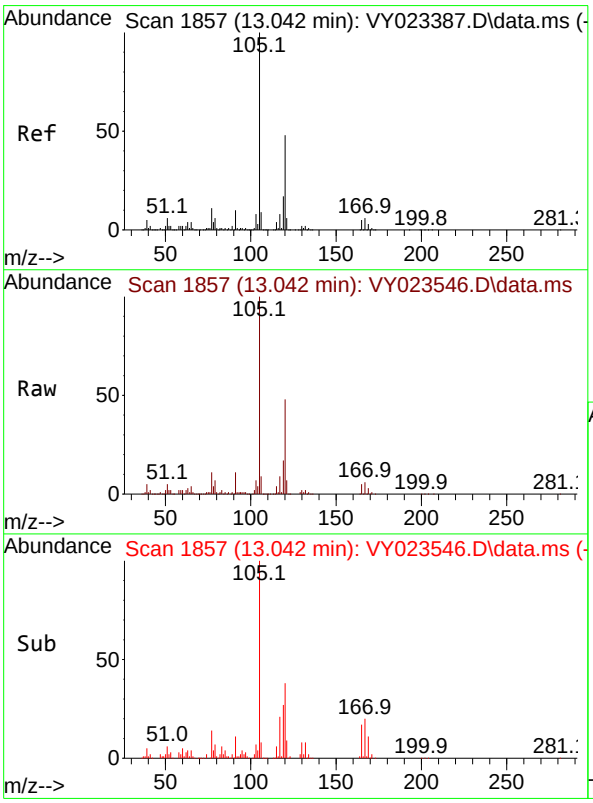
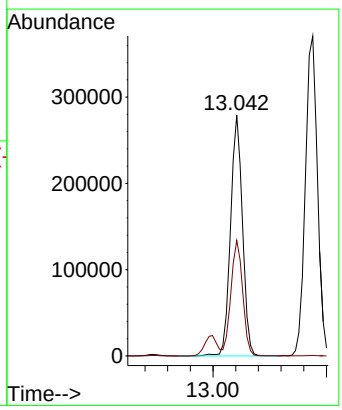
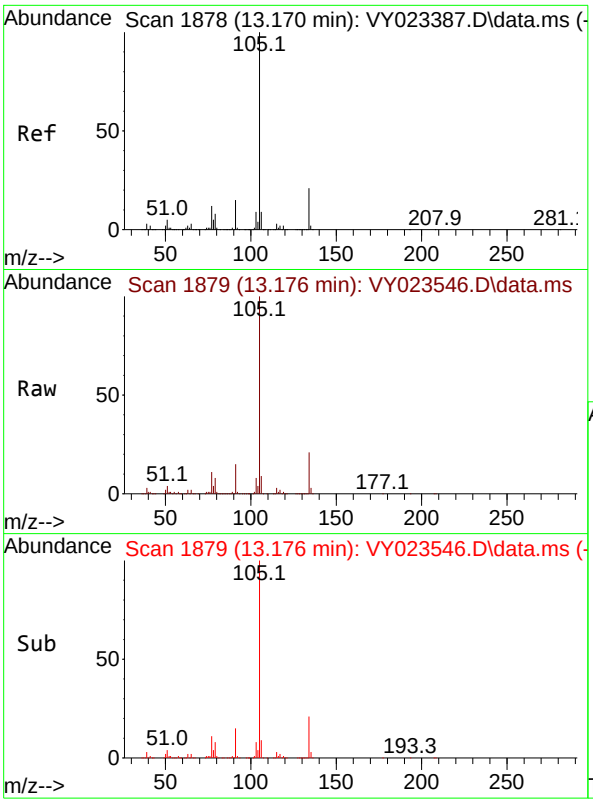


#84
1,2,4-Trimethylbenzene
Concen: 20.988 ug/l
RT: 13.042 min Scan# 1857
Delta R.T. 0.000 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion:105 Resp: 406596

Ion	Ratio	Lower	Upper
105	100		
120	47.0	23.8	71.2

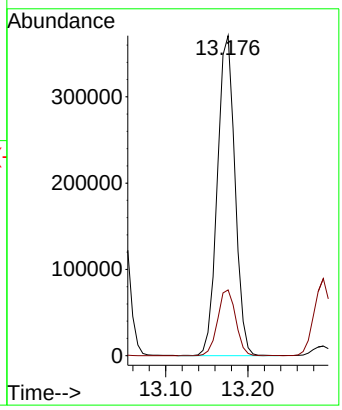




#85
sec-Butylbenzene
Concen: 21.403 ug/l
RT: 13.176 min Scan# 1
Delta R.T. 0.006 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion:105 Resp: 55027

Ion	Ratio	Lower	Upper
105	100		
134	21.2	10.7	32.1



Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBSD01

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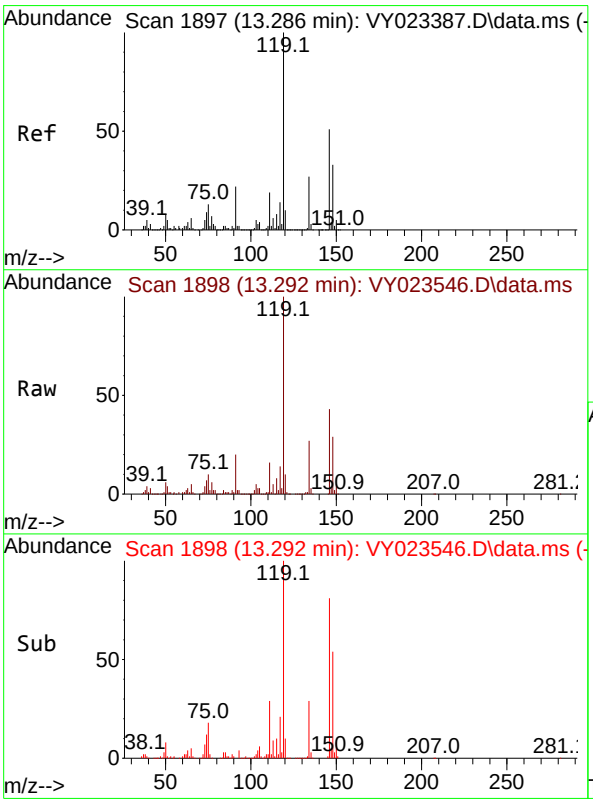
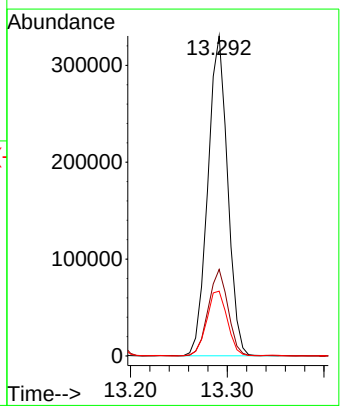
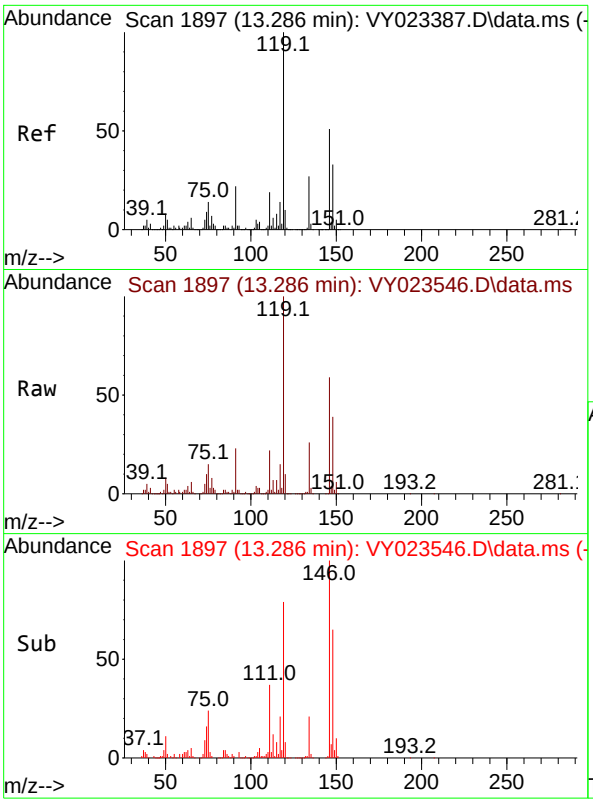


#86
p-Isopropyltoluene
Concen: 21.371 ug/l
RT: 13.292 min Scan# 1898
Delta R.T. 0.006 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion:119 Resp: 467814

Ion	Ratio	Lower	Upper
119	100		
134	27.0	13.6	40.7
91	21.2	10.9	32.9

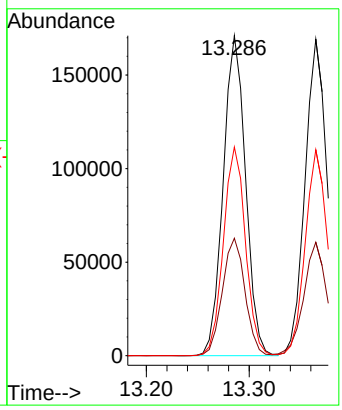




#87
1,3-Dichlorobenzene
Concen: 20.804 ug/l
RT: 13.286 min Scan# 1
Delta R.T. 0.000 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion:146 Resp: 25872

Ion	Ratio	Lower	Upper
146	100		
111	37.2	18.7	56.1
148	64.4	31.9	95.9



Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBSD01

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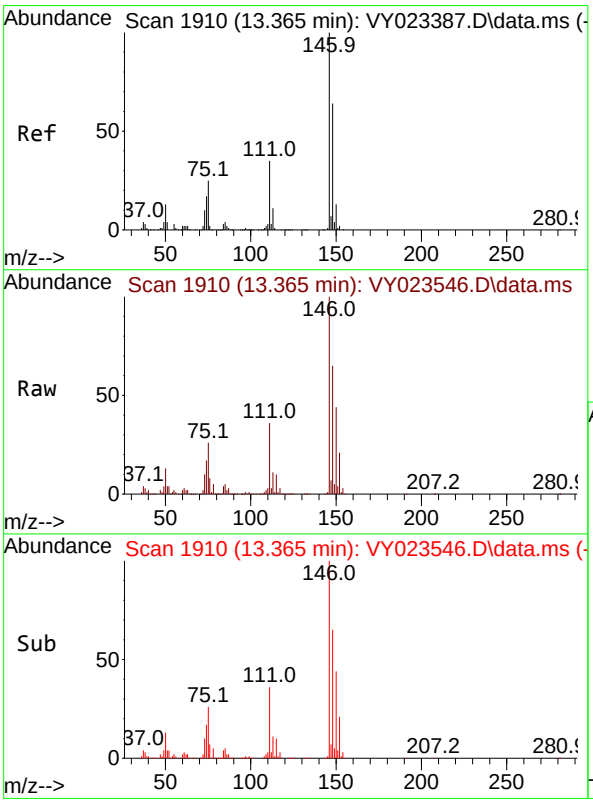
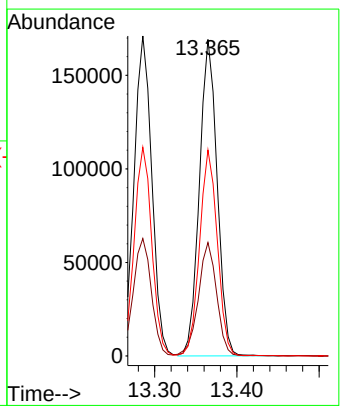
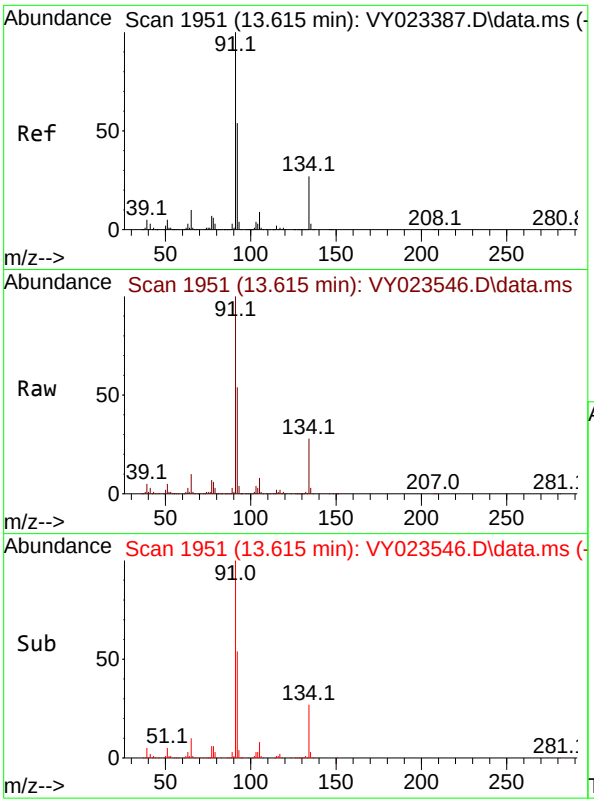


#88
1,4-Dichlorobenzene
Concen: 20.684 ug/l
RT: 13.365 min Scan# 1910
Delta R.T. 0.000 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion:146 Resp: 254047

Ion	Ratio	Lower	Upper
146	100		
111	36.6	18.0	54.0
148	64.9	31.9	95.7

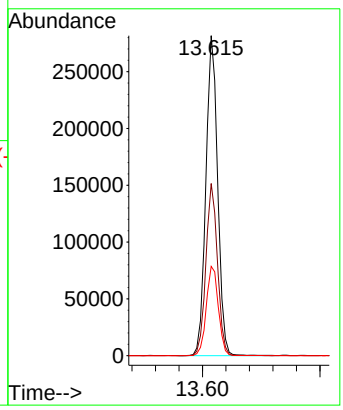




#89
n-Butylbenzene
Concen: 20.600 ug/l
RT: 13.615 min Scan# 1
Delta R.T. 0.000 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion: 91 Resp: 39292

Ion	Ratio	Lower	Upper
91	100		
92	52.9	27.0	80.8
134	28.5	14.1	42.2



Instrument :
MSVOA_Y
ClientSampleId :
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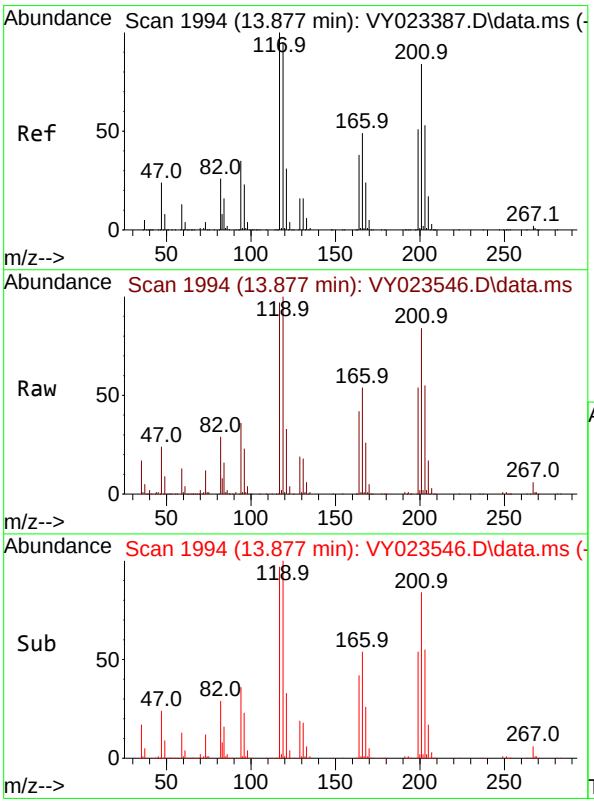
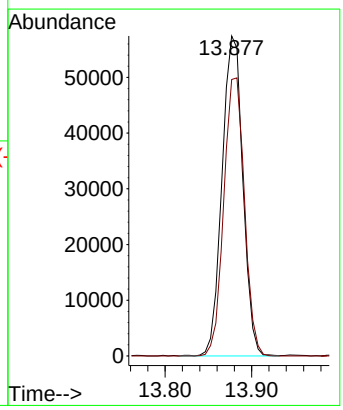
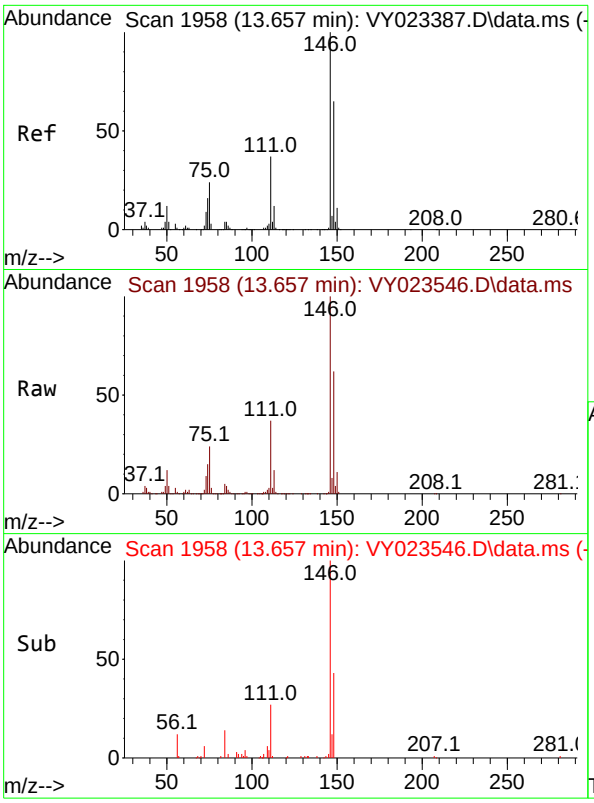


#90
Hexachloroethane
Concen: 20.342 ug/l
RT: 13.877 min Scan# 1994
Delta R.T. 0.000 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion:117 Resp: 95771

Ion	Ratio	Lower	Upper
117	100		
201	86.3	43.8	131.4

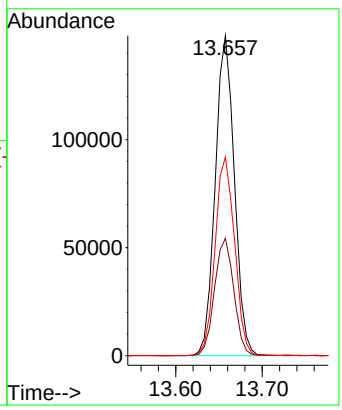




#91
1,2-Dichlorobenzene
Concen: 20.857 ug/l
RT: 13.657 min Scan# 1
Delta R.T. 0.000 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion:146 Resp: 22740

Ion	Ratio	Lower	Upper
146	100		
111	37.1	19.0	57.0
148	63.5	32.1	96.3



Instrument :
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ClientSampleId :
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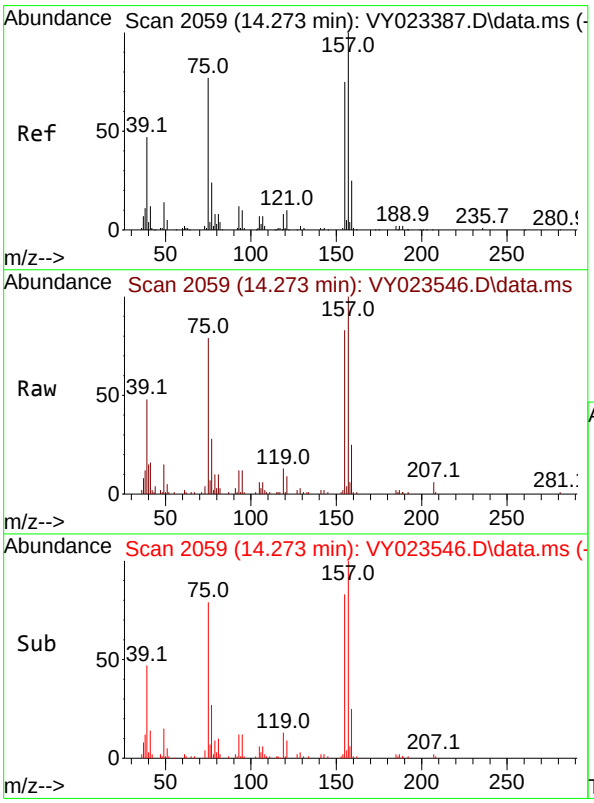
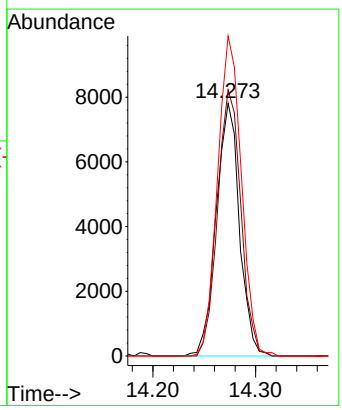
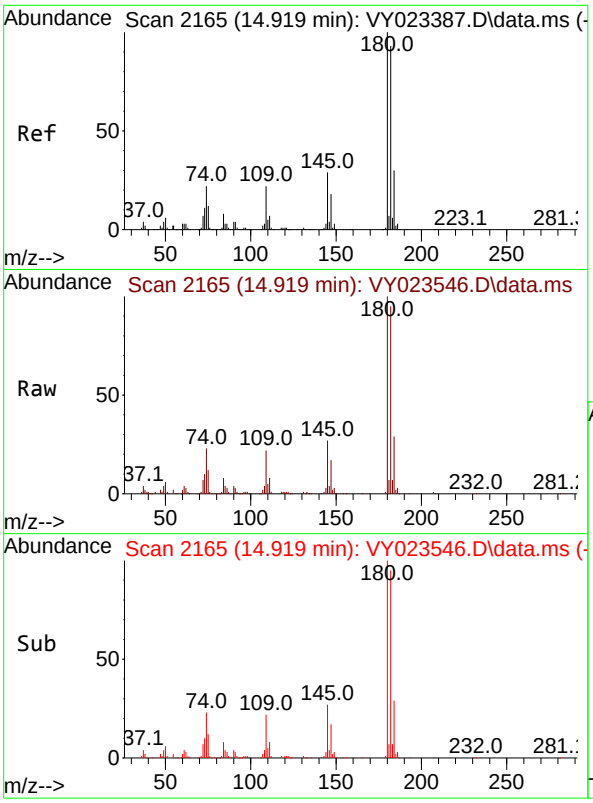


#92
1,2-Dibromo-3-Chloropropane
Concen: 18.977 ug/l
RT: 14.273 min Scan# 2059
Delta R.T. -0.000 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion: 75 Resp: 12234

Ion	Ratio	Lower	Upper
75	100		
155	105.6	50.0	150.0
157	130.3	63.8	191.5

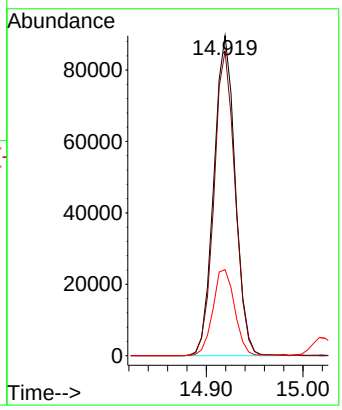




#93
1,2,4-Trichlorobenzene
Concen: 20.166 ug/l
RT: 14.919 min Scan# 2
Delta R.T. 0.000 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion:180 Resp: 13706

Ion	Ratio	Lower	Upper
180	100		
182	94.1	47.9	143.6
145	27.7	14.7	44.1



Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBSD01

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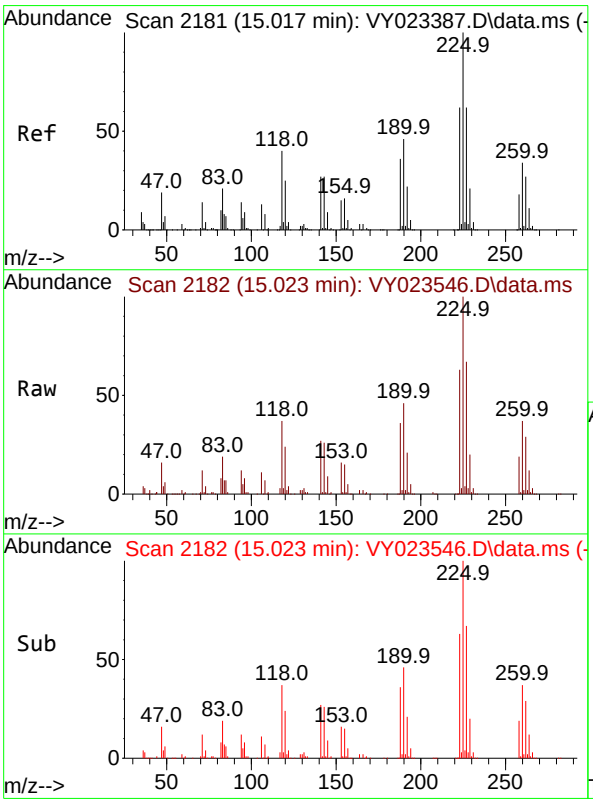
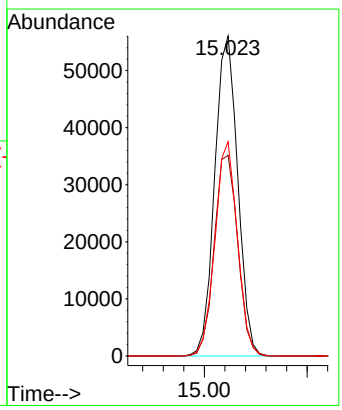
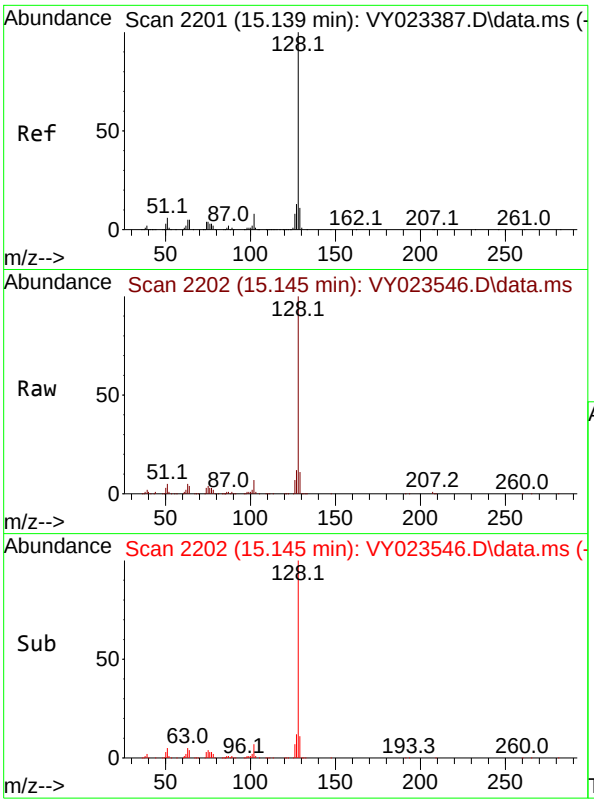


#94
Hexachlorobutadiene
Concen: 20.497 ug/l
RT: 15.023 min Scan# 2182
Delta R.T. 0.006 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion:225 Resp: 86848

Ion	Ratio	Lower	Upper
225	100		
223	64.0	30.8	92.3
227	65.4	31.9	95.7

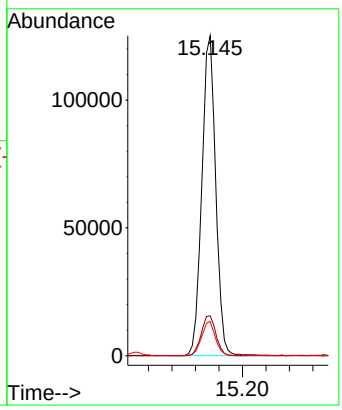




#95
Naphthalene
Concen: 18.906 ug/l
RT: 15.145 min Scan# 2
Delta R.T. 0.006 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion:128 Resp: 20462

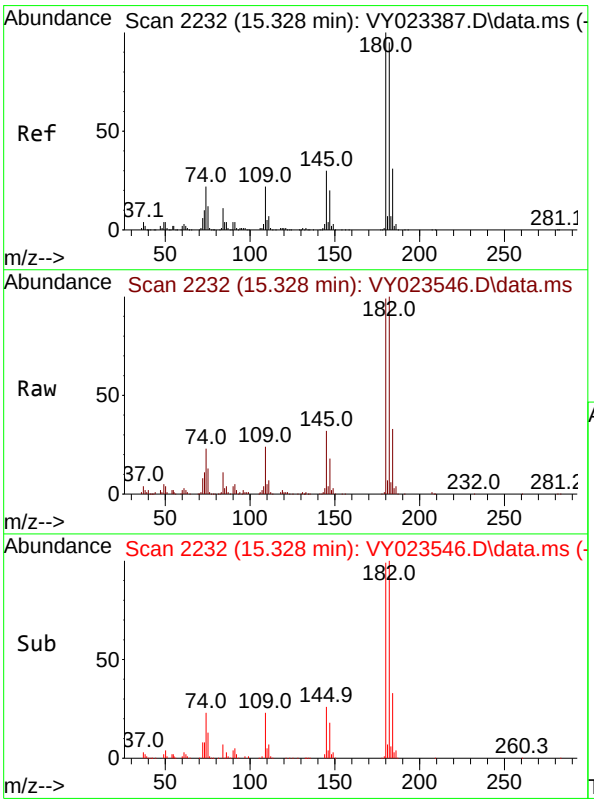
Ion	Ratio	Lower	Upper
128	100		
127	13.1	10.4	15.6
129	10.7	8.9	13.3



Instrument :
MSVOA_Y
ClientSampleId :
VY1022SBSD01

Manual Integrations
APPROVED

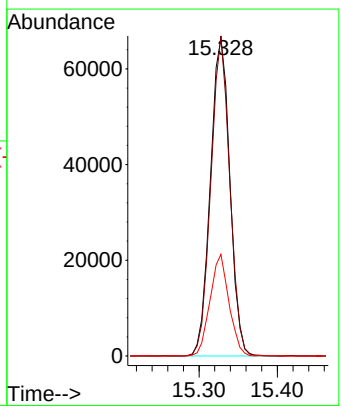
Reviewed By :Amit Patel 10/24/2025
Supervised By :Mahesh Dadoda 10/24/2025



#96
1,2,3-Trichlorobenzene
Concen: 19.509 ug/l
RT: 15.328 min Scan# 2232
Delta R.T. -0.000 min
Lab File: VY023546.D
Acq: 22 Oct 2025 10:51

Tgt Ion:180 Resp: 114859

Ion	Ratio	Lower	Upper
180	100		
182	97.1	47.9	143.8
145	31.0	15.3	45.9



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

Manual Integration Report

Sequence:	VY100725	Instrument	MSVOA_y

Sample ID	File ID	Parameter	Review By	Review On	Supervised By	Supervised On	Reason
VSTDICC005	VY023384.D	1,2,3-Trichloropropane	sam	10/10/2025 2:59:48 AM	MMdadoda	10/10/2025 4:37:28 AM	Peak Integrated by Software
VSTDICC005	VY023384.D	2-Chloroethyl Vinyl ether	sam	10/10/2025 2:59:48 AM	MMdadoda	10/10/2025 4:37:28 AM	Peak Integrated by Software
VSTDICC005	VY023384.D	Methacrylonitrile	sam	10/10/2025 2:59:48 AM	MMdadoda	10/10/2025 4:37:28 AM	Peak Integrated by Software
VSTDICC010	VY023385.D	1,2,3-Trichloropropane	sam	10/10/2025 2:59:52 AM	MMdadoda	10/10/2025 4:37:33 AM	Peak Integrated by Software
VSTDICC010	VY023385.D	2-Chloroethyl Vinyl ether	sam	10/10/2025 2:59:52 AM	MMdadoda	10/10/2025 4:37:33 AM	Peak Integrated by Software
VSTDICC020	VY023386.D	1,2,3-Trichloropropane	sam	10/10/2025 2:59:56 AM	MMdadoda	10/10/2025 4:37:37 AM	Peak Integrated by Software
VSTDICC020	VY023386.D	2-Chloroethyl Vinyl ether	sam	10/10/2025 2:59:56 AM	MMdadoda	10/10/2025 4:37:37 AM	Peak Integrated by Software
VSTDICC020	VY023386.D	Methacrylonitrile	sam	10/10/2025 2:59:56 AM	MMdadoda	10/10/2025 4:37:37 AM	Peak Integrated by Software
VSTDICCC050	VY023387.D	1,2,3-Trichloropropane	sam	10/10/2025 3:00:01 AM	MMdadoda	10/10/2025 4:37:41 AM	Peak Integrated by Software
VSTDICC100	VY023388.D	1,2,3-Trichloropropane	sam	10/10/2025 3:00:05 AM	MMdadoda	10/10/2025 4:37:46 AM	Peak Integrated by Software
VSTDICC150	VY023389.D	1,2,3-Trichloropropane	sam	10/10/2025 3:00:09 AM	MMdadoda	10/10/2025 4:37:51 AM	Peak Integrated by Software
VSTDICV050	VY023391.D	1,2,3-Trichloropropane	sam	10/10/2025 3:00:14 AM	MMdadoda	10/10/2025 4:37:55 AM	Peak Integrated by Software

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Manual Integration Report

Sequence:	VY100725	Instrument	MSVOA_y

Sample ID	File ID	Parameter	Review By	Review On	Supervised By	Supervised On	Reason

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Manual Integration Report

Sequence:	VY102225	Instrument	MSVOA_y

Sample ID	File ID	Parameter	Review By	Review On	Supervised By	Supervised On	Reason
VSTDCCC050	VY023543.D	1,2,3-Trichloropropane	Amit	10/24/2025 11:56:25 AM	MMDadoda	10/24/2025 2:54:05 PM	Peak Integrated by Software
VSTDCCC050	VY023543.D	Methacrylonitrile	Amit	10/24/2025 11:56:25 AM	MMDadoda	10/24/2025 2:54:05 PM	Peak Integrated by Software
VY1022SBS01	VY023545.D	1,2,3-Trichloropropane	Amit	10/24/2025 11:56:29 AM	MMDadoda	10/24/2025 2:54:10 PM	Peak Integrated by Software
VY1022SBSD01	VY023546.D	1,2,3-Trichloropropane	Amit	10/24/2025 11:56:34 AM	MMDadoda	10/24/2025 2:54:13 PM	Peak Integrated by Software

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Fax : 908 789 8922

Instrument ID: MSVOA_Y

Daily Analysis Runlog For Sequence/QCBatch ID # VY100725

Review By	Semsettin Yesilyurt	Review On	10/10/2025 3:00:22 AM				
Supervise By	Mahesh Dadoda	Supervise On	10/10/2025 4:38:02 AM				
SubDirectory	VY100725	HP Acquire Method	MSVOA_Y	HP Processing Method	82y100725s.m		

STD. NAME	STD REF.#
Tune/Reschk	VP135766
Initial Calibration Stds	VP135767,VP135768,VP135769,VP135770,VP135771,VP135772
CCC	
Internal Standard/PEM	VP133934
ICV/I.BLK	VP135773
Surrogate Standard	
MS/MSD Standard	
LCS Standard	

Sr#	SampleId	Data File Name	Date-Time	Operator	Status
1	BFB	VY023383.D	07 Oct 2025 08:43	SY/MD	Ok
2	VSTDICC005	VY023384.D	07 Oct 2025 09:17	SY/MD	Ok,M
3	VSTDICC010	VY023385.D	07 Oct 2025 10:02	SY/MD	Ok,M
4	VSTDICC020	VY023386.D	07 Oct 2025 11:24	SY/MD	Ok,M
5	VSTDICCC050	VY023387.D	07 Oct 2025 11:47	SY/MD	Ok,M
6	VSTDICC100	VY023388.D	07 Oct 2025 12:09	SY/MD	Ok,M
7	VSTDICC150	VY023389.D	07 Oct 2025 12:32	SY/MD	Ok,M
8	VIBLK	VY023390.D	07 Oct 2025 13:02	SY/MD	Ok
9	VSTDICV050	VY023391.D	07 Oct 2025 14:12	SY/MD	Ok,M

M : Manual Integration

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Fax : 908 789 8922

Instrument ID: MSVOA_Y

Daily Analysis Runlog For Sequence/QCBatch ID # VY102225

Review By	John Carlone	Review On	10/24/2025 2:07:41 PM				
Supervise By	Mahesh Dadoda	Supervise On	10/24/2025 2:54:27 PM				
SubDirectory	VY102225	HP Acquire Method	MSVOA_Y	HP Processing Method	82y100725s.m		

STD. NAME	STD REF.#
Tune/Reschk	VP135879
Initial Calibration Stds	
CCC	VP135880,VP135881
Internal Standard/PEM	VP133934
ICV/I.BLK	
Surrogate Standard	
MS/MSD Standard	
LCS Standard	

Sr#	SampleId	Data File Name	Date-Time	Operator	Status
1	BFB	VY023542.D	22 Oct 2025 09:00	SY/MD	Ok
2	VSTDCCC050	VY023543.D	22 Oct 2025 09:30	SY/MD	Ok,M
3	VY1022SBL01	VY023544.D	22 Oct 2025 10:00	SY/MD	Ok
4	VY1022SBS01	VY023545.D	22 Oct 2025 10:28	SY/MD	Ok,M
5	VY1022SBSD01	VY023546.D	22 Oct 2025 10:51	SY/MD	Ok,M
6	Q3395-04MSD	VY023547.D	22 Oct 2025 11:28	SY/MD	Not Ok
7	Q3416-01	VY023548.D	22 Oct 2025 12:03	SY/MD	Ok
8	Q3404-01RE	VY023549.D	22 Oct 2025 12:52	SY/MD	Confirms
9	Q3427-03	VY023550.D	22 Oct 2025 13:43	SY/MD	Ok
10	Q3419-01	VY023551.D	22 Oct 2025 14:07	SY/MD	Ok
11	Q3419-04	VY023552.D	22 Oct 2025 15:34	SY/MD	Ok
12	Q3419-05	VY023553.D	22 Oct 2025 15:58	SY/MD	Ok
13	Q3422-01	VY023554.D	22 Oct 2025 16:22	SY/MD	Ok
14	Q3424-01	VY023555.D	22 Oct 2025 16:46	SY/MD	Ok
15	Q3424-02	VY023556.D	22 Oct 2025 17:10	SY/MD	Ok
16	Q3424-03	VY023557.D	22 Oct 2025 17:35	SY/MD	Ok

M : Manual Integration

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Fax : 908 789 8922

Instrument ID: MSVOA_Y

Daily Analysis Runlog For Sequence/QCBatch ID # VY100725

Review By	Semsettin Yesilyurt	Review On	10/10/2025 3:00:22 AM		
Supervise By	Mahesh Dadoda	Supervise On	10/10/2025 4:38:02 AM		
SubDirectory	VY100725	HP Acquire Method	MSVOA_Y	HP Processing Method	82y100725s.m

STD. NAME	STD REF.#
Tune/Reschk	VP135766
Initial Calibration Stds	VP135767,VP135768,VP135769,VP135770,VP135771,VP135772
CCC	
Internal Standard/PEM	VP133934
ICV/I.BLK	VP135773
Surrogate Standard	
MS/MSD Standard	
LCS Standard	

Sr#	SampleId	ClientID	Data File Name	Date-Time	Comment	Operator	Status
1	BFB	BFB	VY023383.D	07 Oct 2025 08:43		SY/MD	Ok
2	VSTDICC005	VSTDICC005	VY023384.D	07 Oct 2025 09:17		SY/MD	Ok,M
3	VSTDICC010	VSTDICC010	VY023385.D	07 Oct 2025 10:02		SY/MD	Ok,M
4	VSTDICC020	VSTDICC020	VY023386.D	07 Oct 2025 11:24		SY/MD	Ok,M
5	VSTDICCC050	VSTDICCC050	VY023387.D	07 Oct 2025 11:47		SY/MD	Ok,M
6	VSTDICC100	VSTDICC100	VY023388.D	07 Oct 2025 12:09		SY/MD	Ok,M
7	VSTDICC150	VSTDICC150	VY023389.D	07 Oct 2025 12:32		SY/MD	Ok,M
8	VIBLK	VIBLK	VY023390.D	07 Oct 2025 13:02		SY/MD	Ok
9	VSTDICV050	ICVVY100725	VY023391.D	07 Oct 2025 14:12		SY/MD	Ok,M

M : Manual Integration

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Instrument ID: MSVOA_Y

Daily Analysis Runlog For Sequence/QCBatch ID # VY102225

Review By	John Carlone	Review On	10/24/2025 2:07:41 PM		
Supervise By	Mahesh Dadoda	Supervise On	10/24/2025 2:54:27 PM		
SubDirectory	VY102225	HP Acquire Method	MSVOA_Y	HP Processing Method	82y100725s.m

STD. NAME	STD REF.#
Tune/Reschk	VP135879
Initial Calibration Stds	
CCC	VP135880,VP135881
Internal Standard/PEM	VP133934
ICV/I.BLK	
Surrogate Standard	
MS/MSD Standard	
LCS Standard	

Sr#	SampleId	ClientID	Data File Name	Date-Time	Comment	Operator	Status
1	BFB	BFB	VY023542.D	22 Oct 2025 09:00		SY/MD	Ok
2	VSTDCCC050	VSTDCCC050	VY023543.D	22 Oct 2025 09:30		SY/MD	Ok,M
3	VY1022SBL01	VY1022SBL01	VY023544.D	22 Oct 2025 10:00		SY/MD	Ok
4	VY1022SBS01	VY1022SBS01	VY023545.D	22 Oct 2025 10:28		SY/MD	Ok,M
5	VY1022SBSD01	VY1022SBSD01	VY023546.D	22 Oct 2025 10:51		SY/MD	Ok,M
6	Q3395-04MSD	PR132-S07-000102-20	VY023547.D	22 Oct 2025 11:28	vial-B Internal Standard Fail	SY/MD	Not Ok
7	Q3416-01	NB-08-10212025	VY023548.D	22 Oct 2025 12:03	vial-A	SY/MD	Ok
8	Q3404-01RE	MOO-25-0285-0288RE	VY023549.D	22 Oct 2025 12:52	vial-B Internal standard fail	SY/MD	Confirms
9	Q3427-03	TP-8-VOC	VY023550.D	22 Oct 2025 13:43	vial-A	SY/MD	Ok
10	Q3419-01	PR-132-S16-015094-20	VY023551.D	22 Oct 2025 14:07	vial-A	SY/MD	Ok
11	Q3419-04	PR132-S16-119133-20	VY023552.D	22 Oct 2025 15:34	vial-A	SY/MD	Ok
12	Q3419-05	PR132-S16-094119-20	VY023553.D	22 Oct 2025 15:58	vial-A	SY/MD	Ok
13	Q3422-01	PR132-S15-000008-20	VY023554.D	22 Oct 2025 16:22	vial-A	SY/MD	Ok
14	Q3424-01	PR132-DP3-20251021	VY023555.D	22 Oct 2025 16:46	vial-A	SY/MD	Ok
15	Q3424-02	PR132-S11-010080-20	VY023556.D	22 Oct 2025 17:10	vial-A	SY/MD	Ok
16	Q3424-03	PR132-S14-000094-20	VY023557.D	22 Oct 2025 17:35	vial-A	SY/MD	Ok

M : Manual Integration

PERCENT SOLID

Supervisor: Iwona
Analyst: jignesh
Date: 10/23/2025

OVENTEMP IN Celsius(°C): 107
Time IN: 17:15
In Date: 10/22/2025
Weight Check 1.0g: 1.00
Weight Check 10g: 10.00
OvenID: M OVEN#1

OVENTEMP OUT Celsius(°C): 104
Time OUT: 08:15
Out Date: 10/23/2025
Weight Check 1.0g: 1.00
Weight Check 10g: 10.00
BalanceID: M SC-4
Thermometer ID: % SOLID-OVEN

QC: LB137614

Lab ID	Client SampleID	Dish #	Dish Wt(g) (A)	Sample Wt(g)	Dish + Sample Wt(g) (B)	Dish+Dry Sample Wt(g) (C)	% Solid	Comments
Q3419-01	PR-132-S16-015094-20251021	1	1.15	11.01	12.16	7.14	54.4	
Q3419-02	Q3419-01MS	2	1.15	11.01	12.16	7.14	54.4	
Q3419-03	Q3419-01MSD	3	1.15	11.01	12.16	7.14	54.4	
Q3419-04	PR-132-S16-119133-20251021	4	1.16	10.07	11.23	6.37	51.7	
Q3419-05	PR-132-S16-094119-20251021	5	1.19	11.07	12.26	6.38	46.9	
Q3422-01	PR132-S15-000008-20251017	6	1.18	11.02	12.2	7.58	58.1	
Q3424-01	PR132-DP3-20251021	7	1.15	10.36	11.51	5.91	45.9	
Q3424-02	PR132-S11-010080-20251021	8	1.12	10.72	11.84	6.49	50.1	
Q3424-03	PR132-S14-000094-20251021	9	1.14	11.34	12.48	6.82	50.1	
Q3427-01	TP-8	10	1.11	10.77	11.88	10.84	90.3	
Q3427-02	TP-8-EPH	11	1.18	10.97	12.15	10.98	89.3	
Q3427-03	TP-8-VOC	12	1.19	10.26	11.45	10.52	90.9	
Q3429-01	40309	13	1.00	1.00	2.00	2.00	100.0	WIPE SAMPLE
Q3429-02	40310	14	1.00	1.00	2.00	2.00	100.0	WIPE SAMPLE
Q3430-01	BUR-25-0095	15	1.00	1.00	2.00	2.00	100.0	WIPE SAMPLE
Q3431-01	EO-02-10222025	16	1.11	10.55	11.66	10.64	90.3	
Q3431-02	EO-02-10222025-E2	17	1.17	10.59	11.76	10.59	89.0	
Q3434-01	PR132-WC1-20251022	18	1.13	10.43	11.56	7.17	57.9	

$$\% \text{ Solid} = \frac{(C-A) * 100}{(B-A)}$$

WORKLIST(Hardcopy Internal Chain)

VB 137614

WorkList Name : %1-102225 **WorkList ID :** 192597 **Department :** Wet-Chemistry **Date :** 10-22-2025 09:03:13

Sample	Customer Sample	Matrix	Test	Preservative	Customer	Raw Sample Storage Location	Collect Date	Method
Q3419-01	PR-132-S16-015094-20251021	Solid	Percent Solids	Cool 4 deg C	AECO02	D41	10/21/2025	Chemtech -SO
Q3419-02	Q3419-01MS	Solid	Percent Solids	Cool 4 deg C	AECO02	D41	10/21/2025	Chemtech -SO
Q3419-03	Q3419-01MSD	Solid	Percent Solids	Cool 4 deg C	AECO02	D41	10/21/2025	Chemtech -SO
Q3419-04	PR-132-S16-119133-20251021	Solid	Percent Solids	Cool 4 deg C	AECO02	D41	10/21/2025	Chemtech -SO
Q3419-05	PR-132-S16-094119-20251021	Solid	Percent Solids	Cool 4 deg C	AECO02	D41	10/21/2025	Chemtech -SO
Q3422-01	PR132-S15-000008-20251017	Solid	Percent Solids	Cool 4 deg C	AECO02	D41	10/21/2025	Chemtech -SO
Q3424-01	PR132-DP3-20251021	Solid	Percent Solids	Cool 4 deg C	AECO02	D31	10/21/2025	Chemtech -SO
Q3424-02	PR132-S11-010080-20251021	Solid	Percent Solids	Cool 4 deg C	AECO02	D31	10/21/2025	Chemtech -SO
Q3424-03	PR132-S14-00094-20251021	Solid	Percent Solids	Cool 4 deg C	AECO02	D31	10/21/2025	Chemtech -SO
Q3427-01	TP-8	Solid	Percent Solids	Cool 4 deg C	PSEG03	D41	10/21/2025	Chemtech -SO
Q3427-02	TP-8-EPH	Solid	Percent Solids	Cool 4 deg C	PSEG03	D41	10/21/2025	Chemtech -SO
Q3427-03	TP-8-VOC	Solid	Percent Solids	Cool 4 deg C	PSEG03	D41	10/21/2025	Chemtech -SO
Q3429-01	40309	Solid	Percent Solids	Cool 4 deg C	PSEG03	D51	10/22/2025	Chemtech -SO
Q3429-02	40310	Solid	Percent Solids	Cool 4 deg C	PSEG03	D51	10/22/2025	Chemtech -SO
Q3430-01	BUR-25-0095	Solid	Percent Solids	Cool 4 deg C	PSEG03	D51	10/22/2025	Chemtech -SO
Q3431-01	EO-02-10222025	Solid	Percent Solids	Cool 4 deg C	PSEG05	D41	10/22/2025	Chemtech -SO
Q3431-02	EO-02-10222025-E2	Solid	Percent Solids	Cool 4 deg C	PSEG05	D41	10/22/2025	Chemtech -SO
Q3434-01	PR132-WC1-20251022	Solid	Percent Solids	Cool 4 deg C	AECO02	D41	10/22/2025	Chemtech -SO

Date/Time 10/22/25 15:00
Raw Sample Received by: JB WC
Raw Sample Relinquished by:

Date/Time 10/22/25 17:25
Raw Sample Received by:
Raw Sample Relinquished by: JB WC

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Prep Standard - Chemical Standard Summary

Order ID : Q3424

Test : VOC-TCLVOA-10

Prepbatch ID :

Sequence ID/Qc Batch ID: VY102225,

Standard ID :
VP133934,VP134147,VP134149,VP134150,VP134934,VP134957,VP135552,VP135553,VP135834,VP135835,VP135879,VP135880,VP135881,

Chemical ID :
V13391,V14200,V14204,V14205,V14290,V14509,V14510,V14531,V14532,V14625,V14636,V14637,V14638,V14639,V14673,V14727,V14728,V14803,V14815,V14844,V14906,V14921,V14928,V14929,V14951,V14952,V15073,V15074,V15075,W3112,

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VOC STANDARD PREPARATION LOG

Recipe ID	NAME	NO.	Prep Date	Expiration Date	Prepared By	ScaleID	PipetteID	Supervised By
1917	8260 Internal standard 50 ppm	VP133934	05/16/2025	11/12/2025	Semsettin Yesilyurt	None	None	Mahesh Dadoda 05/21/2025

FROM 0.10000ml of V14290 + 49.90000ml of V14921 = Final Quantity: 50.000 ml

Recipe ID	NAME	NO.	Prep Date	Expiration Date	Prepared By	ScaleID	PipetteID	Supervised By
252	8260 Working STD (BCM)-First source, 100PPM	VP134147	06/06/2025	12/06/2025	Semsettin Yesilyurt	None	None	Mahesh Dadoda 06/10/2025

FROM 1.00000ml of V14673 + 19.00000ml of V14929 = Final Quantity: 20.000 ml

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Fax : 908 789 8922

VOC STANDARD PREPARATION LOG

Recipe ID	NAME	NO.	Prep Date	Expiration Date	Prepared By	ScaleID	PipetteID	Supervised By
1810	8260 Working Std(2-CVE)-800ppm	VP134149	06/06/2025	12/06/2025	Semsettin Yesilyurt	None	None	Mahesh Dadoda 06/10/2025

FROM 1.00000ml of V14636 + 1.00000ml of V14637 + 1.00000ml of V14638 + 1.00000ml of V14639 + 46.00000ml of V14929 = Final Quantity: 50.000 ml

Recipe ID	NAME	NO.	Prep Date	Expiration Date	Prepared By	ScaleID	PipetteID	Supervised By
1811	8260 Working Std(2-CVE)-500ppm	VP134150	06/06/2025	12/06/2025	Semsettin Yesilyurt	None	None	Mahesh Dadoda 06/10/2025

FROM 7.50000ml of V14929 + 12.50000ml of VP134149 = Final Quantity: 20.000 ml

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

VOC STANDARD PREPARATION LOG

Recipe ID	NAME	NO.	Prep Date	Expiration Date	Prepared By	ScaleID	PipetteID	Supervised By
249	8260 Surrogate, 100PPM	VP134934	07/29/2025	01/29/2026	Semsettin Yesilyurt	None	None	Mahesh Dadoda 08/06/2025

FROM 0.10000ml of V14906 + 24.90000ml of V14625 = Final Quantity: 25.000 ml

Recipe ID	NAME	NO.	Prep Date	Expiration Date	Prepared By	ScaleID	PipetteID	Supervised By
218	BFB, 25PPM	VP134957	08/01/2025	11/22/2025	Semsettin Yesilyurt	None	None	Mahesh Dadoda 08/06/2025

FROM 0.50000ml of V13391 + 49.50000ml of V14625 = Final Quantity: 50.000 ml

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

VOC STANDARD PREPARATION LOG

Recipe ID	NAME	NO.	Prep Date	Expiration Date	Prepared By	ScaleID	PipetteID	Supervised By
257	8260 Calibration Working STD Mix-First source, 160PPM	VP135552	09/22/2025	11/03/2025	Semsettin Yesilyurt	None	None	Mahesh Dadoda 09/26/2025

FROM 0.40000ml of V14844 + 1.00000ml of V14200 + 1.00000ml of V14509 + 1.00000ml of V14510 + 1.00000ml of V14531 + 1.00000ml of V14532 + 1.00000ml of V14727 + 1.00000ml of V14728 + 1.00000ml of V14803 + 1.00000ml of V14815 + 1.00000ml of V14951 + 1.00000ml of V14952 + 1.50000ml of V14204 + 1.50000ml of V14205 + 10.60000ml of V14928 = Final Quantity: 25.000 ml

Recipe ID	NAME	NO.	Prep Date	Expiration Date	Prepared By	ScaleID	PipetteID	Supervised By
244	8260 Calibration Working STD Mix-First source, 100PPM	VP135553	09/22/2025	11/03/2025	Semsettin Yesilyurt	None	None	Mahesh Dadoda 09/26/2025

FROM 5.62500ml of V14928 + 9.37500ml of VP135552 = Final Quantity: 15.000 ml

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VOC STANDARD PREPARATION LOG

Recipe ID	NAME	NO.	Prep Date	Expiration Date	Prepared By	ScaleID	PipetteID	Supervised By
51	8260 Working STD (Acrolein) -first source, 800PPM	VP135834	10/17/2025	11/16/2025	Semsettin Yesilyurt	None	None	Mahesh Dadoda 10/17/2025

FROM 1.00000ml of V15073 + 1.50000ml of V15074 + 1.50000ml of V15075 + 21.00000ml of V14928 = Final Quantity: 25.000 ml

Recipe ID	NAME	NO.	Prep Date	Expiration Date	Prepared By	ScaleID	PipetteID	Supervised By
56	8260 Working STD (Acrolein) -first source, 500PPM	VP135835	10/17/2025	11/16/2025	Semsettin Yesilyurt	None	None	Mahesh Dadoda 10/17/2025

FROM 7.50000ml of V14928 + 12.50000ml of VP135834 = Final Quantity: 20.000 ml

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VOC STANDARD PREPARATION LOG

Recipe ID	NAME	NO.	Prep Date	Expiration Date	Prepared By	ScaleID	PipetteID	Supervised By
732	BFB TUNE CHECK - SOIL	VP135879	10/22/2025	10/23/2025	Amit Patel	None	None	Mahesh Dadoda 10/23/2025

FROM 4.99800ml of W3112 + 0.00200ml of VP134957 = Final Quantity: 5.000 ml

Recipe ID	NAME	NO.	Prep Date	Expiration Date	Prepared By	ScaleID	PipetteID	Supervised By
773	50 PPB CCC, 8260-SOIL	VP135880	10/22/2025	10/23/2025	Amit Patel	None	None	Mahesh Dadoda 10/23/2025

FROM 4.98000ml of W3112 + 0.00250ml of VP134147 + 0.00250ml of VP134150 + 0.00250ml of VP134934 + 0.00250ml of VP135553 + 0.00250ml of VP135835 + 0.00500ml of VP133934 = Final Quantity: 5.000 ml

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VOC STANDARD PREPARATION LOG

Recipe ID	NAME	NO.	Prep Date	Expiration Date	Prepared By	ScaleID	PipetteID	Supervised By
773	50 PPB CCC, 8260-SOIL	VP135881	10/22/2025	10/23/2025	Amit Patel	None	None	Mahesh Dadoda 10/23/2025

FROM 4.98000ml of W3112 + 0.00250ml of VP134147 + 0.00250ml of VP134150 + 0.00250ml of VP134934 + 0.00250ml of VP135553 + 0.00250ml of VP135835 + 0.00500ml of VP133934 = Final Quantity: 5.000 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 #
Restek	30067 / BFB tuneing solution	A0191805	11/22/2025	11/22/2024 / SAM	01/13/2023 / SAM	V13391

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Restek	30006 / VOA Mix, CLP method Calibration Std #1 ketones 5000uq/ml, PTM, 1ml	A0200785	03/22/2026	09/22/2025 / sam	02/28/2024 / SAM	V14200

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Restek	30006 / VOA Mix, CLP method Calibration Std #1 ketones 5000uq/ml, PTM, 1ml	A0200785	03/22/2026	09/22/2025 / sam	02/28/2024 / SAM	V14204

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Restek	30006 / VOA Mix, CLP method Calibration Std #1 ketones 5000uq/ml, PTM, 1ml	A0200785	03/22/2026	09/22/2025 / sam	02/28/2024 / SAM	V14205

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Restek	555581 / Custom Standard, 8260 Internal Std [CS 5179-1]	A0210184	12/12/2025	12/12/2024 / SAM	04/15/2024 / SAM	V14290

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Absolute Standards, Inc.	95317 / Universal VOA Mega Mix (Min order = 5)	021624	03/22/2026	09/22/2025 / sam	09/17/2024 / SAM	V14509

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CHEMICAL RECEIPT LOG BOOK

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Absolute Standards, Inc.	95317 / Universal VOA Mega Mix (Min order = 5)	021624	03/22/2026	09/22/2025 / sam	09/17/2024 / SAM	V14510

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Absolute Standards, Inc.	95319 / Revised Additions Mix (Min = 5)	091724	03/22/2026	09/22/2025 / sam	09/18/2024 / SAM	V14531

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Absolute Standards, Inc.	95319 / Revised Additions Mix (Min = 5)	091724	03/22/2026	09/22/2025 / sam	09/18/2024 / SAM	V14532

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Seidler Chemical	BA9077-02 / Methanol, Purge/Trap (cs=6x1L)	23I0762004	01/29/2026	07/29/2025 / SAM	11/26/2024 / SAM	V14625

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Absolute Standards, Inc.	/ 2-Chloroethyl vinyl ether	120524	12/06/2025	06/06/2025 / SAM	12/06/2024 / SAM	V14636

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Absolute Standards, Inc.	/ 2-Chloroethyl vinyl ether	120524	12/06/2025	06/06/2025 / SAM	12/06/2024 / SAM	V14637

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CHEMICAL RECEIPT LOG BOOK

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Absolute Standards, Inc.	/ 2-Chloroethyl vinyl ether	120524	12/06/2025	06/06/2025 / SAM	12/06/2024 / SAM	V14638

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Absolute Standards, Inc.	/ 2-Chloroethyl vinyl ether	120524	12/06/2025	06/06/2025 / SAM	12/06/2024 / SAM	V14639

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Restek	30225 / VOA Mix, bromochloromethane, 2000ug/mL, P&TM, 1mL/ampul	A0214960	12/06/2025	06/06/2025 / SAM	12/09/2024 / SAM	V14673

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Restek	30042 / VOA Mix,500 series method 502.2 Calibration Std #1 gases, 2000uq/ml, PTM, 1ml	A0216826	03/22/2026	09/22/2025 / sam	12/17/2024 / SAM	V14727

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Restek	30042 / VOA Mix,500 series method 502.2 Calibration Std #1 gases, 2000uq/ml, PTM, 1ml	A0216826	03/22/2026	09/22/2025 / sam	12/17/2024 / SAM	V14728

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Restek	555408 / Custom Standard, Vinyl Acetate Standard w/ Grav [CS 5066-6] TWO SEPARATE LOTS	A0220471	03/22/2026	09/22/2025 / sam	01/08/2025 / SAM	V14803

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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	555408 / Custom Standard, Vinyl Acetate Standard w/ Grav [CS 5066-6] TWO SEPARATE LOTS	A0220471	03/22/2026	09/22/2025 / sam	01/08/2025 / SAM	V14815

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Restek	30470 / VOA Stock Solution, tert-butanol std, 1mL, P&TM	A0217535	03/22/2026	09/22/2025 / sam	01/21/2025 / SAM	V14844

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Restek	555582 / Custom Mixture, 8260 A/B Surrogate Mix [CS 5179-2]	A0223904	07/29/2026	07/29/2025 / SAM	03/24/2025 / SAM	V14906

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Seidler Chemical	BA9077-02 / Methanol, Purge/Trap (cs=6x1L)	24G0262002	11/12/2025	05/12/2025 / SAM	05/09/2025 / SAM	V14921

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Seidler Chemical	BA9077-02 / Methanol, Purge/Trap (cs=6x1L)	24G0262002	03/22/2026	09/22/2025 / sam	05/09/2025 / SAM	V14928

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Seidler Chemical	BA9077-02 / Methanol, Purge/Trap (cs=6x1L)	24G0262002	12/06/2025	06/06/2025 / SAM	05/09/2025 / SAM	V14929

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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	30489 / VOA Mix, 8260B Acetates Mix, P&TM, 1mL	A0222076	03/22/2026	09/22/2025 / sam	05/19/2025 / SAM	V14951

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Restek	30489 / VOA Mix, 8260B Acetates Mix, P&TM, 1mL	A0222076	03/22/2026	09/22/2025 / sam	05/19/2025 / SAM	V14952

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Absolute Standards, Inc.	91980 / Acrolin Std (Min = 5)	101625	11/16/2025	10/17/2025 / sam	10/17/2025 / sam	V15073

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Absolute Standards, Inc.	91980 / Acrolin Std (Min = 5)	101625	11/16/2025	10/17/2025 / sam	10/17/2025 / sam	V15074

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Absolute Standards, Inc.	91980 / Acrolin Std (Min = 5)	101625	11/16/2025	10/17/2025 / sam	10/17/2025 / sam	V15075

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

Methanol
ULTRA RESI-ANALYZED
For Purge and Trap Analysis

avantor™ | J.T.Baker®

Material No.: 9077-02
Batch No.: 2310762004
Manufactured Date: 2023-08-11
Expiration Date: 2026-08-10
Revision No.: 0

Certificate of Analysis

Test	Specification	Result
Assay (CH_3OH) (by GC, corrected for water)	≥ 99.9 %	100.0 %
Residue after Evaporation	≤ 1.0 ppm	0.5 ppm
Titrable Acid (µeq/g)	≤ 0.3	0.2
Titrable Base (µeq/g)	≤ 0.10	0.01
Water (by KF, coulometric)	≤ 0.08 %	< 0.01 %
Volatile Organic Trace Analysis – Below EPA 8260B CRQL	Conforms	Conforms

For Laboratory,Research,or Manufacturing Use
Performance Tested for Use in EPA Methods
500 Series for Drinking Water
600 Series for Wastewater
846 for Solid Waste

Country of Origin: USA
Packaging Site: Phillipsburg Mfg Ctr & DC

Ken Koehnlein
Sr. Manager, Quality Assurance

Absolute Standards, Inc.
800-368-1131
www.absolutestandards.com

Certified Reference Material CRM

Rec 09/17/24

ANAB ISO 17034 Accredited
AR-1539 Certificate Number
https://Absolutestandards.com

CERTIFIED WEIGHT REPORT

Part Number: 95317
Lot Number: 021624
Description: Universal VOA Megamix
69 components
Expiration Date: 021627
Recommended Storage: Freezer (0 °C)
Nominal Concentration (µg/mL): 2000
NIST Test ID#: 6UTB

Solvent(s): Lot#
Methanol EG359-USQ12

5E-05 Balance Uncertainty
Weight(s) shown below were combined and diluted to (mL): 100.0 0.021 Flask Uncertainty

Formulated By: Prashant Chauhan 021624 DATE

Reviewed By: Pedro L. Rentas 021624 DATE

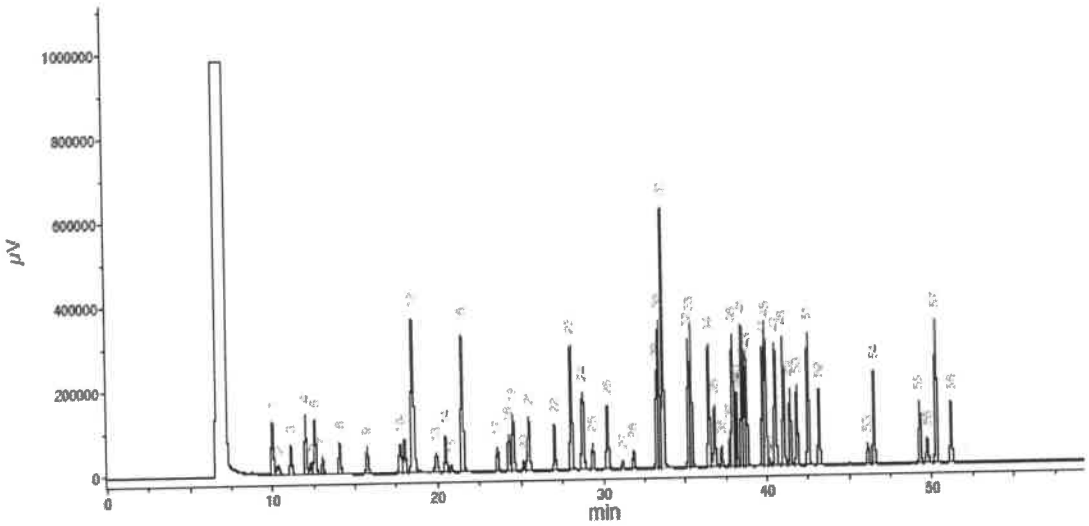
	Compound	(RM#) Part Number	Lot Number	Dil. Factor	Initial Vol. (mL)	Initial Conc.(ug/mL)	Nominal Conc (µg/mL)	Purity (%)	Purity Uncertainty	Uncertainty Pipette (mL)	Target Weight(g)	Actual Weight(g)	Actual Conc (µg/mL)	Expanded Uncertainty (+/-) (µg/mL)	SDS Information (Solvent Safety Info. On Attached pg.) CAS#	OSHA PEL (TWA)	LD50
1.	Acetonitrile	(0324)	021644	NA	NA	NA	2000	99.99	0.2	NA	0.20007	0.20020	2001.3	8.1	75-05-8	40 ppm (70mg/m3/8H)	orl-rat 2460mg/kg
2.	Allyl chloride (3-Chloropropene)	(0325)	102396	NA	NA	NA	2000	99	0.2	NA	0.20207	0.20221	2001.4	8.2	107-05-1	1 ppm (3mg/m3/8H)	orl-rat 700mg/kg
3.	Carbon disulphide	(0060)	MKCR8561	NA	NA	NA	2000	99.99	0.2	NA	0.20007	0.20023	2001.6	8.1	75-15-0	4 ppm (12mg/m3) (skin)	orl-rat 1200mg/kg
4.	cis-1,4-Dichloro-2-butene	(1196)	14718EF	NA	NA	NA	2000	95	0.2	NA	0.21058	0.21069	2001.1	8.5	1476-11-5	N/A	N/A
5.	trans-1,4-Dichloro-2-butene	(0466)	MKBP6041V	NA	NA	NA	2000	96.5	0.2	NA	0.20731	0.20748	2001.7	8.4	110-57-6	N/A	N/A
6.	Diethyl ether	(0153)	IK18CAS0000	NA	NA	NA	2000	99.9	0.2	NA	0.20025	0.20040	2001.5	8.1	60-29-7	N/A	N/A
7.	Ethyl methacrylate	(0381)	06128PX	NA	NA	NA	2000	99	0.2	NA	0.20207	0.20230	2002.3	8.2	97-63-2	N/A	orl-rat 14800mg/kg
8.	Iodomethane	(0489)	SHBF8718V	NA	NA	NA	2000	99.5	0.2	NA	0.20106	0.20121	2001.5	8.2	74-88-4	5 ppm(28mg/m3/8H)(skin)	orl-rat 76mg/kg
9.	2-Methyl-1-propanol	(0445)	15241EB	NA	NA	NA	2000	99.5	0.2	NA	0.20106	0.20120	2001.4	8.1	78-83-1	50 ppm (150mg/m3/8H)	orl-rat 2460mg/kg
10.	Methacrylonitrile	(0442)	00427ET	NA	NA	NA	2000	99	0.2	NA	0.20207	0.20221	2001.4	8.2	126-98-7	1 ppm (3mg/m3/8H)(skin)	orl-rat 120mg/kg
11.	Methyl acrylate	(1075)	SHBK0679	NA	NA	NA	2000	99.9	0.2	NA	0.20025	0.20040	2001.5	8.1	96-33-3	10 ppm(35mg/m3/8H)(skin)	orl-rat 277mg/kg
12.	Methyl methacrylate	(0404)	MKBW5137V	NA	NA	NA	2000	99.9	0.2	NA	0.20025	0.20041	2001.6	8.1	80-62-6	100 ppm (410mg/m3/8H)	orl-rat 7872mg/kg
13.	Nitrobenzene	(0228)	01213TV	NA	NA	NA	2000	99	0.2	NA	0.20207	0.20220	2001.3	8.2	98-95-3	1 ppm (5mg/m3/8H)(skin)	orl-rat 780mg/kg
14.	2-Nitropropane	(0461)	14002JX	NA	NA	NA	2000	97.3	0.2	NA	0.20560	0.20577	2001.6	8.3	79-46-9	10 ppm (35mg/m3/8H)	orl-rat 720mg/kg
15.	Pentachloroethane	(0450)	HGA01	NA	NA	NA	2000	98	0.2	NA	0.20413	0.20430	2001.6	8.3	76-01-7	N/A	N/A
16.	1,1,2-Trichlorotrifluoroethane	(0474)	18930	NA	NA	NA	2000	99	0.2	NA	0.20207	0.20225	2001.8	8.2	76-13-1	1000 ppm (7600mg/m3/8H)	orl-rat 43g/kg
17.	Bromodichloromethane	35171	101623	0.05	5.00	40001.7	2000	NA	NA	0.017	NA	NA	1999.6	22.9	75-27-4	N/A	orl-rat 916mg/kg
18.	Dibromochloromethane	35171	101623	0.05	5.00	40002.1	2000	NA	NA	0.017	NA	NA	1999.6	23.0	124-48-1	N/A	orl-rat 848mg/kg
19.	cis-1,2-Dichloroethene	35171	101623	0.05	5.00	40003.1	2000	NA	NA	0.017	NA	NA	1999.7	22.9	156-59-2	N/A	N/A
20.	trans-1,2-Dichloroethene	35171	101623	0.05	5.00	40002.4	2000	NA	NA	0.017	NA	NA	1999.6	23.0	156-60-5	N/A	orl-rat 1235mg/kg
21.	Methylene chloride	35171	101623	0.05	5.00	40002.8	2000	NA	NA	0.017	NA	NA	1999.6	22.9	75-09-2	500 ppm	orl-rat 820mg/kg
22.	1,1-Dichloroethene	32251	102023	0.10	10.00	20001.6	2000	NA	NA	0.042	NA	NA	1999.7	20.4	75-35-4	1 ppm (4mg/m3/8H)	orl-rat 200mg/kg
23.	Bromoform	95321	020724	0.10	10.00	20003.2	2000	NA	NA	0.042	NA	NA	1999.8	20.5	75-25-2	0.5 ppm (5mg/m3) (skin)	orl-rat 933mg/kg
24.	Carbon tetrachloride	95321	020724	0.10	10.00	20003.4	2000	NA	NA	0.042	NA	NA	1999.8	20.4	56-23-5	2 ppm (12.6mg/m3/8H)	orl-rat 2350mg/kg
25.	Chloroform	95321	020724	0.10	10.00	20024.0	2000	NA	NA	0.042	NA	NA	2001.9	20.5	67-66-3	50 ppm (240mg/m3) (CL)	orl-rat 908mg/kg
26.	Dibromomethane	95321	020724	0.10	10.00	20002.9	2000	NA	NA	0.042	NA	NA	1999.8	20.5	74-95-3	N/A	orl-rat 108mg/kg
27.	1,1-Dichloroethane	95321	020724	0.10	10.00	20003.4	2000	NA	NA	0.042	NA	NA	1999.8	20.5	75-34-3	100 ppm	orl-rat 725mg/kg
28.	2,2-Dichloropropane	95321	020724	0.10	10.00	20003.4	2000	NA	NA	0.042	NA	NA	1999.8	20.4	594-20-7	N/A	N/A
29.	Tetrachloroethene	95321	020724	0.10	10.00	20201.1	2000	NA	NA	0.042	NA	NA	2019.6	20.8	127-18-4	25 ppm (170mg/m3/8H)(final)	orl-rat 2629mg/kg
30.	1,1,1-Trichloroethane	95321	020724	0.10	10.00	20003.0	2000	NA	NA	0.042	NA	NA	1999.8	20.5	71-55-6	350 ppm (1900mg/m3/8H)	orl-rat 10300mg/kg
31.	1,2-Dibromo-3-chloropropane	35161	112322	0.05	5.00	40016.5	2000	NA	NA	0.017	NA	NA	2000.3	22.9	96-12-8	0.001 ppm	orl-rat 170mg/kg
32.	1,2-Dibromoethane	35161	112322	0.05	5.00	40024.8	2000	NA	NA	0.017	NA	NA	2000.7	22.9	106-93-4	20 ppm (8H)	orl-rat 108mg/kg
33.	1,2-Dichloroethane	35161	112322	0.05	5.00	40018.0	2000	NA	NA	0.017	NA	NA	2000.4	22.9	107-06-2	50 ppm (8H)	orl-rat 670mg/kg
34.	1,2-Dichloropropane	35161	112322	0.05	5.00	40051.0	2000	NA	NA	0.017	NA	NA	2002.0	22.9	78-87-5	75 ppm (350mg/m3/8H)	orl-rat 1947mg/kg
35.	1,3-Dichloropropane	35161	112322	0.05	5.00	40005.9	2000	NA	NA	0.017	NA	NA	1999.8	22.9	142-28-9	N/A	unr-mus 3600mg/kg
36.	1,1-Dichloropropene	35161	112322	0.05	5.00	40012.1	2000	NA	NA	0.017	NA	NA	2000.1	29.7	563-58-6	N/A	N/A
37.	cis-1,3-Dichloropropene	35161	112322	0.05	5.00	40010.0	2000	NA	NA	0.017	NA	NA	2000.0	23.0	10061-01-5	N/A	N/A
38.	trans-1,3-Dichloropropene	35161	112322	0.05	5.00	40017.6	2000	NA	NA	0.017	NA	NA	2000.4	23.0	10061-02-6	N/A	N/A
39.	Hexachloro-1,3-butadiene	35161	112322	0.05	5.00	40021.9	2000	NA	NA	0.017	NA	NA	2000.6	29.7	87-68-3	0.02 ppm (0.24mg/m3/8H)	orl-rat 82mg/kg
40.	1,1,1,2-Tetrachloroethane	35161	112322	0.05	5.00	40011.9	2000	NA	NA	0.017	NA	NA	2000.1	22.9	630-20-6	N/A	orl-rat 670mg/kg
41.	1,1,2,2-Tetrachloroethane	35161	112322	0.05	5.00	40007.5	2000	NA	NA	0.017	NA	NA	1999.9	22.9	79-34-5	5 ppm (35mg/m3/8H)(skin)	orl-rat 800mg/kg
42.	1,1,2-Trichloroethane	35161	112322	0.05	5.00	40006.6	2000	NA	NA	0.017	NA	NA	1999.8	23.0	79-00-5	10 ppm (45mg/m3/8H)(skin)	orl-rat 836mg/kg
43.	Trichloroethene	35161	112322	0.05	5.00	40029.0	2000	NA	NA	0.017	NA	NA	2000.9	22.9	79-01-6	50 ppm (270mg/m3/8H)	orl-mus 2402mg/kg
44.	1,2,3-Trichloropropane	35161	112322	0.05	5.00	40007.5	2000	NA	NA	0.017	NA	NA	1999.9	22.9	96-18-4	10 ppm (60mg/m3/8H)	orl-rat 149.6mg/kg
45.	Benzene	35162	050823	0.05	5.00	40005.0	2000	NA	NA	0.017	NA	NA	1999.7	22.9	71-43-2	1 ppm	orl-rat 4894mg/kg
46.	Bromobenzene	35162	050823	0.05	5.00	40006.9	2000	NA	NA	0.017	NA	NA	1999.8	22.9	108-86-1	N/A	orl-rat 2699mg/kg
47.	n-Butyl benzene	35162	050823	0.05	5.00	40003.8	2000	NA	NA	0.017	NA	NA	1999.7	22.9	104-51-8	N/A	N/A
48.	Ethyl benzene	35162	050823	0.05	5.00	40004.8	2000	NA	NA	0.017	NA	NA	1999.7	22.9	100-41-4	100 ppm (435mg/m3/8H)	orl-rat >2000mg/kg
49.	p-Isopropyl toluene	35162	050823	0.05	5.00	40005.8	2000	NA	NA	0.017	NA	NA	1999.8	22.9	99-87-6	N/A	orl-rat 4750mg/kg
50.	Naphthalene	35162	050823	0.05	5.00	40006.2	2000	NA	NA	0.017	NA	NA	1999.8	22.9	91-20-3	10 ppm (50mg/m3/8H)	orl-rat 490mg/kg
51.	Styrene	35162	050823	0.05	5.00	40004.8	2000	NA	NA	0.017	NA	NA	1999.7	22.9	100-42-5	100 ppm	orl-rat 5000mg/kg
52.	Toluene	35162	050823	0.05	5.00	40006.2	2000	NA	NA	0.017	NA	NA	1999.8	22.9	108-88-3	200 ppm	orl-rat 5000mg/kg
53.	1,2,3-Trichlorobenzene	35162	050823	0.05	5.00	40003.1	2000	NA	NA	0.017	NA	NA	1999.7	22.9	87-61-6	N/A	ipr-mus 1390mg/kg
54.	1,2,4-Trichlorobenzene	35162	050823	0.05	5.00	40006.8	2000	NA	NA	0.017	NA	NA	1999.8	22.9	120-82-1	5 ppm (CL) (40mg/m3)	orl-rat 756mg/kg
55.	1,2,4-Trimethylbenzene	35162	050823	0.05	5.00	40001.6	2000	NA	NA	0.017	NA	NA	1999.6	23.0	95-63-6	N/A	orl-rat 5g/kg
56.	1,3,5-Trimethylbenzene	35162	050823	0.05	5.00	40006.7	2000	NA	NA	0.017	NA	NA	1999.8	22.9	108-67-8	N/A	orl-rat 5000mg/kg
57.	m-Xylene	35162	050823	0.05	5.00	40005.8	2000	NA	NA	0.017	NA	NA	1999.8	22.9	108-38-3	100 ppm (435mg/m3/8H)	orl-rat 5g/kg
58.	tert-Butyl benzene	35163	101923	0.05	5.00	40001.2	2000	NA	NA	0.017	NA	NA	1999.8	22.9	98-06-6	N/A	N/A
59.	sec-Butyl benzene	35163	101923	0.05	5.00	40002.4	2000	NA	NA	0.017	NA	NA	1999.8	22.9	135-98-8	N/A	orl-rat 2240mg/kg
60.	Chlorobenzene	35163	101923	0.05	5.00	40003.8	2000	NA	NA	0.017	NA	NA	1999.7	22.9	108-90-7	75 ppm (350mg/m3/8H)	orl-rat 2290mg/kg
61.	2-Chlorotoluene	35163	101923	0.05	5.00	40000.3	2000	NA	NA	0.017	NA	NA	1999.5	22.9	95-49-8	50 ppm (250mg/m3/8H)	orl-rat 3900mg/kg
62.	4-Chlorotoluene	35163	101923	0.05	5.00	40003.3	2000	NA	NA	0.017	NA	NA	1999.7	22.9	106-43-4	N/A	orl-rat 2100mg/kg
63.	1,2-Dichlorobenzene	35163	101923	0.05	5.00	40003.8	2000	NA	NA	0.017	NA	NA	1999.7	22.9	95-50-1	50 ppm (300mg/m3) (CL)	orl-rat 500mg/kg
64.	1,3-Dichlorobenzene	35163	101923	0.05	5.00	40001.7	2000	NA	NA	0.017	NA	NA	1999.6	23.0	541-73-1	N/A	ipr-mus 1062mg/kg
65.	1,4-Dichlorobenzene	35163	101923	0.05	5.00	40001.8	2000	NA	NA	0.017	NA	NA	1999.6	22.9	106-46-7	75 ppm (450mg/m3/8H)	orl-rat 500mg/kg
66.	Isopropylbenzene	35163	101923	0.05	5.00	40000.8	2000	NA	NA	0.017	NA	NA	1999.5	22.9	98-82-8	50 ppm (245mg/m3/8H)	orl-rat 1400mg/kg
67.	n-Propylbenzene	35163	101923	0.05	5.00	40003.4	2000	NA	NA	0.017	NA	NA	1999.7	23.0	103-65-1	N/A	orl-rat 8040mg/kg
68.	o-Xylene	35163	101923	0.05	5.00	40040.8	2000	NA	NA	0.017	NA	NA	2001.5	23.0	95-47-6	100 ppm (435mg/m3/8H)	ipr-mus 1364mg/kg
69.	p-Xylene	35163	101923	0.05	5.00	40000.8	2000	NA	NA	0.017	NA	NA	1999.5	22.9	106-42-3	100 ppm (435mg/m3/8H)	orl-rat 5g/kg

- The certified value is the concentration calculated from gravimetric and volumetric measurements unless otherwise stated.
- Standards are prepared gravimetrically using balances that are calibrated with weights traceable to NIST (see above).
- Standards are certified (+/-) 0.5% of the stated value, unless otherwise stated.
- All Standards, after opening ampule, should be stored with caps tight and under appropriate laboratory conditions.
- Uncertainty Reference: Taylor, B.N. and Kuyat, C.E., "Guidelines for Evaluating and Expressing the Uncertainty of NIST Measurement Result," NIST Technical Note 1297, U.S. Government Printing Office, Washington, DC, (1994).

Run 16, "P95317 L021624 (2000µg/mL in MeOH)"

Run Length: 60.00 min, 35998 points at 10 points/second.
Created: Sat, Feb 17, 2024 at 8:56:46 AM.
Sampled: Sequence "021624-GC5M1", Method "GC5-M1".
Analyzed using Method "GC5-M1".

Comments
GC5-M1 Analysis by Candice Warren
Column ID SPB-Vocol 105 meter X 0.53mm X 3.0µm film thickness
Flow rates: Total flow=290mL/min., Helium (carrier)=10mL/min.,
Helium(make-up)=10mL/min., Hydogen(make-up)=40mL/min., Air(make-up)=230mL/min.
Oven Profile: Temp. 1=35°C (Time 1=10 min.), Temp 2=200°C (Time 2=8.75 min.),
Rate = 4°C/min., Total run time=60 min. Injector temp.=200°C, FID Temp.=200°C.
FID Signal = Edaq Channel 1
Standard injection = 0.5µL, Range=3



Peak #	Name	FID RT (min.)
1	Ether	9.97
2	1,1,2-Trichloro-1,2,3-trifluoroethane	10.33
3	1,1-Dichloroethene	11.10
4	Acetonitrile	12.00
5	Iodomethane	12.31
6	Allyl chloride	12.56
7	Carbon disulfide/Methylene chloride	13.04
8	trans-1,2-Dichloroethene	14.07
9	1,1-Dichloroethane	15.74
10	2,2-Dichloropropane	17.74
11	cis-1,2-Dichloroethene	18.00
12	Methacrylonitrile/Methyl acrylate/Chloroform	18.49
13	Isobutanol/1,1,1-Trichloroethane	18.91
14	1,1-Dichloropropene	19.46
15	Carbon tetrachloride	20.79
16	Benzene/1,2-Dichloroethane	21.48
17	Trichloroethene	23.86
18	1,2-Dichloropropane	24.26
19	Methyl methacrylate	24.62
20	Bromodichloromethane	25.13
21	Dibromomethane/2-Nitropropane	25.46
22	cis-1,3-Dichloropropene	27.02
23	Toluene	28.09
24	Ethyl methacrylate/trans-1,3-Dichloropropene	28.73
25	1,1,2-Trichloroethane	29.34
26	Tetrachloroethene/1,3-Dichloropropane	30.34
27	Dibromochloromethane	31.16
28	1,2-Dibromoethane	31.84
29	Chlorobenzene	33.26
30	Ethylbenzene/1,1,1,2-Tetrachloroethane	33.40
31	m-Xylene/p-Xylene	33.85
32	o-Xylene	35.33
33	Styrene	35.50
34	Isopropylbenzene/Bromoform	35.48
35	cis-1,4-Dichloro-2-butene	36.80
36	1,1,2,2-Tetrachloroethane	37.23
37	1,2,3-Trichloropropane	37.77
38	n-Propylbenzene	37.92
39	trans-1,4-Dichloro-2-butene	38.05
40	Bromobenzene	38.14
41	1,3,5-Trimethylbenzene	38.50
42	2-Chlorotoluene	38.62
43	4-Chlorotoluene	38.77
44	tert-Butylbenzene	39.76
45	1,2,4-Trimethylbenzene	39.91
46	Pentachloroethane	40.17
47	sec-Butylbenzene	40.52
48	p-Isopropyltoluene	41.02
49	1,3-Dichlorobenzene	41.42
50	1,4-Dichlorobenzene	41.63
51	n-Butylbenzene	42.82
52	1,2-Dichlorobenzene	43.18
53	1,2-Dibromo-3-chloropropane	46.12
54	Nitrobenzene	46.58
55	1,2,4-Trichlorobenzene	49.26
56	Hexachlorobutadiene	49.72
57	Naphthalene	50.46
58	1,2,3-Trichlorobenzene	51.16

Absolute Standards Inc.

PO Box 5585
Hamden, CT 06518-0585

Phone: 203-281-2917
FAX: 203-281-2922

Safety Data Sheet (SDS) GHS/OSHA Compliant

Section I Product and Company Identification

IDENTITY **ANALYTICAL STANDARD DISSOLVED IN METHANOL**

Manufacturer's Name	ABSOLUTE STANDARDS INC	Emergency Telephone USA & CANADA	**1-800-535-5053**
Address	44 Rossotto Dr.	Emergency Telephone International	**1-352-323-3500**
	Hamden CT, 06514	Date Prepared/Revised	January 1, 2024

Section II - Hazards Identification

GHS Classification in accordance with 29 CFR 1910 (OSHA HCS)

H225	**Highly Flammable Liquid and Vapor**	**H301, 311, 331**	**Toxic if swallowed, skin contact, inhaled**
H370	**Cause damage to organs**	**H351**	**Suspected of causing cancer**
P271	**Use in ventilated area**	**P280**	**Use gloves, eye protection/face sheild**
P302,332	**If on skin, wash with soap and water**	**P305,351,338**	**If in eyes, remove contacts, rinse with water**

Signal Word: DANGER

Section III - Composition

Components (Specific Chemical Identity; Common Name(s))			
Methanol	METHYL ALCOHOL	CAS#: 67-56-1	% (optional) > 97

See Certified Weight Report For Other Analytes Present At Trace Quantities.

INTENDED USE: REFERENCE MATERIAL

Section IV. FIRST AID MEASURES

General advice	Consult a physician. Show this safety data sheet to the doctor in attendance.Move to safe area.
If inhaled	If inhaled, move person into fresh air. If not breathing, give artificial respiration. Consult a physician.
In case of skin contact	Wash with soap and water. Consult a physician.
In case of eye contact	Rinse thoroughly with plenty of water for at least 15 minutes and consult a physician.
If swallowed	Do NOT induce vomiting. Rinse mouth with water. Consult a physician.

Section V. FIREFIGHTING MEASURES

Flammability	Flammable in the presence of a source of ignition when the temperature is above the flash point. Keep away from heat/sparks/open flame/hot surface. No smoking.
Suitable extinguishing media	Use water spray, alcohol-resistant foam, dry chemical or carbon dioxide.
Protective equipment for fire	Wear self contained breathing apparatus for fire fighting if necessary.

Section VI. ACCIDENTAL RELEASE MEASURES

Personal precautions	Wear respiratory protection. Avoid breathing vapors, mist or gas. Ensure adequate ventilation. Remove all sources of ignition. Vapours accumulate to form explosive concentrations.
Environmental precautions	Prevent further leakage or spillage if safe to do so. Do not let product enter drains.
Clean up	Contain spillage, and then collect and place in container for disposal according to local regulations (see section 13).

Section VII. HANDLING AND STORAGE

Precautions for safe handling	Avoid contact with skin and eyes. Avoid inhalation of vapour or mist.
Storage Conditions	Use ventilation Keep away from sources of ignition. No smoking. Prevent the build up of electrostatic charge. Keep container tightly closed in a dry and well-ventilated place. Containers which are opened must be carefully resealed and kept upright to prevent leakage.

Section VIII. EXPOSURE CONTROLS/PERSONAL PROTECTION

Methanol 67-56-1 TWA 200 ppm
Skin notation TWA 200 ppm
Potential for skin absorption , ingestion and inhalation.
Personal protective equipment Respiratory protection Handle with gloves. Gloves must be inspected prior to use. Eye protection.
Avoid contact with skin, eyes and clothing. Wash hands thoroughly after handling the product.

Section IX - Physical/Chemical Characteristics

Boiling Point	65°C	Specific Gravity (H2O = 1)	0.79
Vapor Pressure (mm Hg)	96	Melting Point	-98°C
Vapor Density (AIR = 1)	1.11	Evaporation rate (Butyl Acetate = 1)	4.6

Solubility in Water COMPLETE

Appearance and Odor CLEAR, COLORLESS LIQUID WITH CHARACTERISTIC PUNGENT ODOR.

Section X. STABILITY AND REACTIVITY

Chemical stability Stable under recommended storage conditions.
Possibility of hazardous reactions Vapours may form explosive mixture with air.
Conditions to avoid Heat, flames, sparks, extreme temperature and sunlight.
Materials to avoid Acid chlorides, Acid anhydrides, Oxidizing agents, Alkali metals, Reducing agents, Acids
Hazardous decomposition products formed under fire conditions. - Carbon oxides

Section XI. TOXICOLOGICAL INFORMATION

LD50 Oral - rat - 5,628 mg/kg
LC50 Inhalation - rat - 4 h - 64000 ppm
LD50 Dermal - rabbit - 15,800 mg/kg
Toxic if absorbed through skin. Causes skin irritation.
Eye damage/eye irritation
Toxic if inhaled. Causes respiratory tract irritation.
Toxic if swallowed.

Section XII. ECOLOGICAL INFORMATION FOR REPORTABLE QUANTITY OF 5000 lbs.

LC50	15,400 mg/l - 96 h
EC50	24,500.00 mg/l - 48 h
EC100	10,000.00 mg/l - 24 h

Section XIII. DISPOSAL CONSIDERATIONS

Dispose with normal Laboratory Solvent Waste.

Section XIV. TRANSPORT INFORMATION

DOT (US)
UN number: 1230 Class: 3 Packing group: II
Proper shipping name: Methanol

IATA
UN number: 1230 Class: 3 Packing group: II
Proper shipping name: Methanol

Section XV. REGULATORY INFORMATION

OSHA Hazards Flammable liquid, Target Organ Effect, Toxic by inhalation., Toxic by ingestion, Toxic by skin absorption, Irritant
SARA 302: No chemicals in this material are subject to the reporting requirements of SARA Title III, Section 302.

Section XVI. Misc. INFORMATION

The information in this Material Safety Data Sheet meets the requirements of the United States Occupational Safety and Health Act and regulations promulgated thereunder (29 CFR 1910.1200 et. seq.) and Global Harmonized System (GHS). This document is intended only as a guide to the appropriate precautionary handling of the material by trained personnel, or supervised by a person trained in chemical handling. The user is responsible for determining the precautions and dangers of this chemical for his or her particular application. Depending on usage, protective clothing including eye and face guards and respirators must be used to avoid contact with material or breathing chemical vapors/fumes. Exposure to this product may have serious adverse health effects. This chemical may interact with other substances. Since the potential uses are so varied, ABSOLUTE STANDARDS INC. cannot warn of all the potential dangers of use or interaction with other chemicals or substances. ABSOLUTE STANDARDS INC. warrants that the chemical meets the specifications set forth on the label. ABSOLUTE STANDARDS INC DISCLAIMS ANY OTHER WARRANTIES, EXPRESSED OR IMPLIED WITH REGARD TO THE PRODUCT SUPPLIED HEREUNDER, ITS MERCHANTABILITY OR ITS FITNESS FOR A PARTICULAR APPLICATION. The user should recognize that this product can cause severe injury or death, especially if improperly handled or the known dangers of use are not heeded. READ ALL PRECAUTIONARY INFORMATION. As new documented general safety information becomes available, Absolute Standards Inc. will periodically revise this Safety Data Sheet. If you have any questions, please call Technical Service at 1-203-281-2917 for assistance.

Absolute Standards, Inc.
800-368-1131
www.absolutestandards.com

Certified Reference Material CRM

Rec 09/17/24

ANAB ISO 17034 Accredited
AR-1539 Certificate Number
https://Absolutestandards.com

CERTIFIED WEIGHT REPORT

Part Number: 95317
Lot Number: 021624
Description: Universal VOA Megamix
69 components
Expiration Date: 021627
Recommended Storage: Freezer (0 °C)
Nominal Concentration (µg/mL): 2000
NIST Test ID#: 6UTB

Solvent(s): Lot#
Methanol EG359-USQ12

5E-05 Balance Uncertainty
Weight(s) shown below were combined and diluted to (mL): 100.0 0.021 Flask Uncertainty

Formulated By: Prashant Chauhan 021624 DATE

Reviewed By: Pedro L. Rentas 021624 DATE

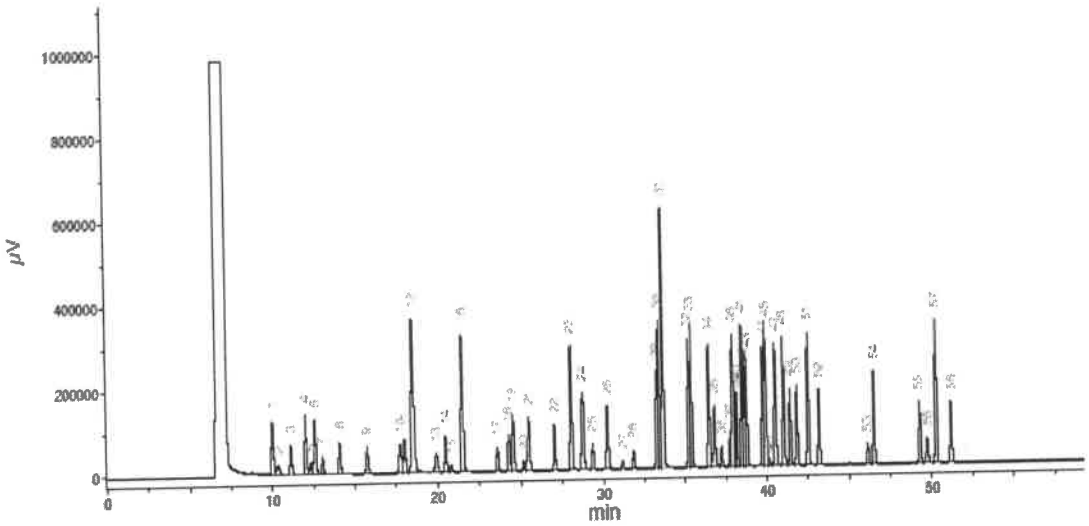
Compound	(RM#) Part Number	Lot Number	Dil. Factor	Initial Vol. (mL)	Initial Conc.(ug/mL)	Nominal Conc (µg/mL)	Purity (%)	Purity Uncertainty	Uncertainty Pipette (mL)	Target Weight(g)	Actual Weight(g)	Actual Conc (µg/mL)	Expanded Uncertainty (+/-) (µg/mL)	SDS Information (Solvent Safety Info. On Attached pg.) CAS#	OSHA PEL (TWA)	LD50
1. Acetonitrile	(0324)	021644	NA	NA	NA	2000	99.99	0.2	NA	0.20007	0.20020	2001.3	8.1	75-05-8	40 ppm (70mg/m3/8H)	orl-rat 2460mg/kg
2. Allyl chloride (3-Chloropropene)	(0325)	102396	NA	NA	NA	2000	99	0.2	NA	0.20207	0.20221	2001.4	8.2	107-05-1	1 ppm (3mg/m3/8H)	orl-rat 700mg/kg
3. Carbon disulphide	(0060)	MKCR8561	NA	NA	NA	2000	99.99	0.2	NA	0.20007	0.20023	2001.6	8.1	75-15-0	4 ppm (12mg/m3) (skin)	orl-rat 1200mg/kg
4. cis-1,4-Dichloro-2-butene	(1196)	14718EF	NA	NA	NA	2000	95	0.2	NA	0.21058	0.21069	2001.1	8.5	1476-11-5	N/A	N/A
5. trans-1,4-Dichloro-2-butene	(0466)	MKBP6041V	NA	NA	NA	2000	96.5	0.2	NA	0.20731	0.20748	2001.7	8.4	110-57-6	N/A	N/A
6. Diethyl ether	(0153)	IK18CAS0000	NA	NA	NA	2000	99.9	0.2	NA	0.20025	0.20040	2001.5	8.1	60-29-7	N/A	N/A
7. Ethyl methacrylate	(0381)	06128PX	NA	NA	NA	2000	99	0.2	NA	0.20207	0.20230	2002.3	8.2	97-63-2	N/A	orl-rat 14800mg/kg
8. Iodomethane	(0489)	SHBF8718V	NA	NA	NA	2000	99.5	0.2	NA	0.20106	0.20121	2001.5	8.2	74-88-4	5 ppm(28mg/m3/8H)(skin)	orl-rat 76mg/kg
9. 2-Methyl-1-propanol	(0445)	15241EB	NA	NA	NA	2000	99.5	0.2	NA	0.20106	0.20120	2001.4	8.1	78-83-1	50 ppm (150mg/m3/8H)	orl-rat 2460mg/kg
10. Methacrylonitrile	(0442)	00427ET	NA	NA	NA	2000	99	0.2	NA	0.20207	0.20221	2001.4	8.2	126-98-7	1 ppm (3mg/m3/8H)(skin)	orl-rat 120mg/kg
11. Methyl acrylate	(1075)	SHBK0679	NA	NA	NA	2000	99.9	0.2	NA	0.20025	0.20040	2001.5	8.1	96-33-3	10 ppm(35mg/m3/8H)(skin)	orl-rat 277mg/kg
12. Methyl methacrylate	(0404)	MKBW5137V	NA	NA	NA	2000	99.9	0.2	NA	0.20025	0.20041	2001.6	8.1	80-62-6	100 ppm (410mg/m3/8H)	orl-rat 7872mg/kg
13. Nitrobenzene	(0228)	01213TV	NA	NA	NA	2000	99	0.2	NA	0.20207	0.20220	2001.3	8.2	98-95-3	1 ppm (5mg/m3/8H)(skin)	orl-rat 780mg/kg
14. 2-Nitropropane	(0461)	14002JX	NA	NA	NA	2000	97.3	0.2	NA	0.20560	0.20577	2001.6	8.3	79-46-9	10 ppm (35mg/m3/8H)	orl-rat 720mg/kg
15. Pentachloroethane	(0450)	HGA01	NA	NA	NA	2000	98	0.2	NA	0.20413	0.20430	2001.6	8.3	76-01-7	N/A	N/A
16. 1,1,2-Trichlorotrifluoroethane	(0474)	18930	NA	NA	NA	2000	99	0.2	NA	0.20207	0.20225	2001.8	8.2	76-13-1	1000 ppm (7600mg/m3/8H)	orl-rat 43g/kg
17. Bromodichloromethane	35171	101623	0.05	5.00	40001.7	2000	NA	NA	0.017	NA	NA	1999.6	22.9	75-27-4	N/A	orl-rat 916mg/kg
18. Dibromochloromethane	35171	101623	0.05	5.00	40002.1	2000	NA	NA	0.017	NA	NA	1999.6	23.0	124-48-1	N/A	orl-rat 846mg/kg
19. cis-1,2-Dichloroethene	35171	101623	0.05	5.00	40003.1	2000	NA	NA	0.017	NA	NA	1999.7	22.9	156-59-2	N/A	N/A
20. trans-1,2-Dichloroethene	35171	101623	0.05	5.00	40002.4	2000	NA	NA	0.017	NA	NA	1999.6	23.0	156-60-5	N/A	orl-rat 1235mg/kg
21. Methylene chloride	35171	101623	0.05	5.00	40002.8	2000	NA	NA	0.017	NA	NA	1999.6	22.9	75-09-2	500 ppm	orl-rat 820mg/kg
22. 1,1-Dichloroethene	32251	102023	0.10	10.00	20001.6	2000	NA	NA	0.042	NA	NA	1999.7	20.4	75-35-4	1 ppm (4mg/m3/8H)	orl-rat 200mg/kg
23. Bromoform	95321	020724	0.10	10.00	20003.2	2000	NA	NA	0.042	NA	NA	1999.8	20.5	75-25-2	0.5 ppm (5mg/m3) (skin)	orl-rat 933mg/kg
24. Carbon tetrachloride	95321	020724	0.10	10.00	20003.4	2000	NA	NA	0.042	NA	NA	1999.8	20.4	56-23-5	2 ppm (12.6mg/m3/8H)	orl-rat 2350mg/kg
25. Chloroform	95321	020724	0.10	10.00	20024.0	2000	NA	NA	0.042	NA	NA	2001.9	20.5	67-66-3	50 ppm (240mg/m3) (CL)	orl-rat 908mg/kg
26. Dibromomethane	95321	020724	0.10	10.00	20002.9	2000	NA	NA	0.042	NA	NA	1999.8	20.5	74-95-3	N/A	orl-rat 108mg/kg
27. 1,1-Dichloroethane	95321	020724	0.10	10.00	20003.4	2000	NA	NA	0.042	NA	NA	1999.8	20.5	75-34-3	100 ppm	orl-rat 725mg/kg
28. 2,2-Dichloropropane	95321	020724	0.10	10.00	20003.4	2000	NA	NA	0.042	NA	NA	1999.8	20.4	594-20-7	N/A	N/A
29. Tetrachloroethene	95321	020724	0.10	10.00	20201.1	2000	NA	NA	0.042	NA	NA	2019.6	20.8	127-18-4	25 ppm (170mg/m3/8H)(final)	orl-rat 2629mg/kg
30. 1,1,1-Trichloroethane	95321	020724	0.10	10.00	20003.0	2000	NA	NA	0.042	NA	NA	1999.8	20.5	71-55-6	350 ppm (1900mg/m3/8H)	orl-rat 10300mg/kg
31. 1,2-Dibromo-3-chloropropane	35161	112322	0.05	5.00	40016.5	2000	NA	NA	0.017	NA	NA	2000.3	22.9	96-12-8	0.001 ppm	orl-rat 170mg/kg
32. 1,2-Dibromoethane	35161	112322	0.05	5.00	40024.8	2000	NA	NA	0.017	NA	NA	2000.7	22.9	106-93-4	20 ppm (8H)	orl-rat 108mg/kg
33. 1,2-Dichloroethane	35161	112322	0.05	5.00	40018.0	2000	NA	NA	0.017	NA	NA	2000.4	22.9	107-06-2	50 ppm (8H)	orl-rat 670mg/kg
34. 1,2-Dichloropropane	35161	112322	0.05	5.00	40051.0	2000	NA	NA	0.017	NA	NA	2002.0	22.9	78-87-5	75 ppm (350mg/m3/8H)	orl-rat 1947mg/kg
35. 1,3-Dichloropropane	35161	112322	0.05	5.00	40005.9	2000	NA	NA	0.017	NA	NA	1999.8	22.9	142-28-9	N/A	unr-mus 3600mg/kg
36. 1,1-Dichloropropene	35161	112322	0.05	5.00	40012.1	2000	NA	NA	0.017	NA	NA	2000.1	29.7	563-58-6	N/A	N/A
37. cis-1,3-Dichloropropene	35161	112322	0.05	5.00	40010.0	2000	NA	NA	0.017	NA	NA	2000.0	23.0	10061-01-5	N/A	N/A
38. trans-1,3-Dichloropropene	35161	112322	0.05	5.00	40017.6	2000	NA	NA	0.017	NA	NA	2000.4	23.0	10061-02-6	N/A	N/A
39. Hexachloro-1,3-butadiene	35161	112322	0.05	5.00	40021.9	2000	NA	NA	0.017	NA	NA	2000.6	29.7	87-68-3	0.02 ppm (0.24mg/m3/8H)	orl-rat 82mg/kg
40. 1,1,1,2-Tetrachloroethane	35161	112322	0.05	5.00	40011.9	2000	NA	NA	0.017	NA	NA	2000.1	22.9	630-20-6	N/A	orl-rat 670mg/kg
41. 1,1,2,2-Tetrachloroethane	35161	112322	0.05	5.00	40007.5	2000	NA	NA	0.017	NA	NA	1999.9	22.9	79-34-5	5 ppm (35mg/m3/8H)(skin)	orl-rat 800mg/kg
42. 1,1,2-Trichloroethane	35161	112322	0.05	5.00	40006.6	2000	NA	NA	0.017	NA	NA	1999.8	23.0	79-00-5	10 ppm (45mg/m3/8H)(skin)	orl-rat 836mg/kg
43. Trichloroethene	35161	112322	0.05	5.00	40029.0	2000	NA	NA	0.017	NA	NA	2000.9	22.9	79-01-6	50 ppm (270mg/m3/8H)	orl-mus 2402mg/kg
44. 1,2,3-Trichloropropane	35161	112322	0.05	5.00	40007.5	2000	NA	NA	0.017	NA	NA	1999.9	22.9	96-18-4	10 ppm (60mg/m3/8H)	orl-rat 149.6mg/kg
45. Benzene	35162	050823	0.05	5.00	40005.0	2000	NA	NA	0.017	NA	NA	1999.7	22.9	71-43-2	1 ppm	orl-rat 4894mg/kg
46. Bromobenzene	35162	050823	0.05	5.00	40006.9	2000	NA	NA	0.017	NA	NA	1999.8	22.9	108-86-1	N/A	orl-rat 2699mg/kg
47. n-Butyl benzene	35162	050823	0.05	5.00	40003.8	2000	NA	NA	0.017	NA	NA	1999.7	22.9	104-51-8	N/A	N/A
48. Ethyl benzene	35162	050823	0.05	5.00	40004.8	2000	NA	NA	0.017	NA	NA	1999.7	22.9	100-41-4	100 ppm (435mg/m3/8H)	orl-rat >2000mg/kg
49. p-Isopropyl toluene	35162	050823	0.05	5.00	40005.8	2000	NA	NA	0.017	NA	NA	1999.8	22.9	99-87-6	N/A	orl-rat 4750mg/kg
50. Naphthalene	35162	050823	0.05	5.00	40006.2	2000	NA	NA	0.017	NA	NA	1999.8	22.9	91-20-3	10 ppm (50mg/m3/8H)	orl-rat 490mg/kg
51. Styrene	35162	050823	0.05	5.00	40004.8	2000	NA	NA	0.017	NA	NA	1999.7	22.9	100-42-5	100 ppm	orl-rat 5000mg/kg
52. Toluene	35162	050823	0.05	5.00	40006.2	2000	NA	NA	0.017	NA	NA	1999.8	22.9	108-88-3	200 ppm	orl-rat 5000mg/kg
53. 1,2,3-Trichlorobenzene	35162	050823	0.05	5.00	40003.1	2000	NA	NA	0.017	NA	NA	1999.7	22.9	87-61-6	N/A	ipr-mus 1390mg/kg
54. 1,2,4-Trichlorobenzene	35162	050823	0.05	5.00	40006.8	2000	NA	NA	0.017	NA	NA	1999.8	22.9	120-82-1	5 ppm (CL) (40mg/m3)	orl-rat 756mg/kg
55. 1,2,4-Trimethylbenzene	35162	050823	0.05	5.00	40001.6	2000	NA	NA	0.017	NA	NA	1999.6	23.0	95-63-6	N/A	orl-rat 5g/kg
56. 1,3,5-Trimethylbenzene	35162	050823	0.05	5.00	40006.7	2000	NA	NA	0.017	NA	NA	1999.8	22.9	108-67-8	N/A	orl-rat 5000mg/kg
57. m-Xylene	35162	050823	0.05	5.00	40005.8	2000	NA	NA	0.017	NA	NA	1999.8	22.9	108-38-3	100 ppm (435mg/m3/8H)	orl-rat 5g/kg
58. tert-Butyl benzene	35163	101923	0.05	5.00	40001.2	2000	NA	NA	0.017	NA	NA	1999.8	22.9	98-06-6	N/A	N/A
59. sec-Butyl benzene	35163	101923	0.05	5.00	40002.4	2000	NA	NA	0.017	NA	NA	1999.8	22.9	135-98-8	N/A	orl-rat 2240mg/kg
60. Chlorobenzene	35163	101923	0.05	5.00	40003.8	2000	NA	NA	0.017	NA	NA	1999.7	22.9	108-90-7	75 ppm (350mg/m3/8H)	orl-rat 2290mg/kg
61. 2-Chlorotoluene	35163	101923	0.05	5.00	40000.3	2000	NA	NA	0.017	NA	NA	1999.5	22.9	95-49-8	50 ppm (250mg/m3/8H)	orl-rat 3900mg/kg
62. 4-Chlorotoluene	35163	101923	0.05	5.00	40003.3	2000	NA	NA	0.017	NA	NA	1999.7	22.9	106-43-4	N/A	orl-rat 2100mg/kg
63. 1,2-Dichlorobenzene	35163	101923	0.05	5.00	40003.8	2000	NA	NA	0.017	NA	NA	1999.7	22.9	95-50-1	50 ppm (300mg/m3) (CL)	orl-rat 500mg/kg
64. 1,3-Dichlorobenzene	35163	101923	0.05	5.00	40001.7	2000	NA	NA	0.017	NA	NA	1999.6	23.0	541-73-1	N/A	ipr-mus 1062mg/kg
65. 1,4-Dichlorobenzene	35163	101923	0.05	5.00	40001.8	2000	NA	NA	0.017	NA	NA	1999.6	22.9	106-46-7	75 ppm (450mg/m3/8H)	orl-rat 500mg/kg
66. Isopropylbenzene	35163	101923	0.05	5.00	40000.8	2000	NA	NA	0.017	NA	NA	1999.5	22.9	98-82-8	50 ppm (245mg/m3/8H)	orl-rat 1400mg/kg
67. n-Propylbenzene	35163	101923	0.05	5.00	40003.4	2000	NA	NA	0.017	NA	NA	1999.7	23.0	103-65-1	N/A	orl-rat 8040mg/kg
68. o-Xylene	35163	101923	0.05	5.00	40040.8	2000	NA	NA	0.017	NA	NA	2001.5	23.0	95-47-6	100 ppm (435mg/m3/8H)	ipr-mus 1364mg/kg
69. p-Xylene	35163	101923	0.05	5.00	40000.8	2000	NA	NA	0.017	NA	NA	1999.5	22.9	106-42-3	100 ppm (435mg/m3/8H)	orl-rat 5g/kg

- The certified value is the concentration calculated from gravimetric and volumetric measurements unless otherwise stated.
- Standards are prepared gravimetrically using balances that are calibrated with weights traceable to NIST (see above).
- Standards are certified (+/-) 0.5% of the stated value, unless otherwise stated.
- All Standards, after opening ampule, should be stored with caps tight and under appropriate laboratory conditions.
- Uncertainty Reference: Taylor, B.N. and Kuyat, C.E., "Guidelines for Evaluating and Expressing the Uncertainty of NIST Measurement Result," NIST Technical Note 1297, U.S. Government Printing Office, Washington, DC, (1994).

Run 16, "P95317 L021624 (2000µg/mL in MeOH)"

Run Length: 60.00 min, 35998 points at 10 points/second.
Created: Sat, Feb 17, 2024 at 8:56:46 AM.
Sampled: Sequence "021624-GC5M1", Method "GC5-M1".
Analyzed using Method "GC5-M1".

Comments
GC5-M1 Analysis by Candice Warren
Column ID SPB-Vocol 105 meter X 0.53mm X 3.0µm film thickness
Flow rates: Total flow=290mL/min., Helium (carrier)=10mL/min.,
Helium(make-up)=10mL/min., Hydogen(make-up)=40mL/min., Air(make-up)=230mL/min.
Oven Profile: Temp. 1=35°C (Time 1=10 min.), Temp 2=200°C (Time 2=8.75 min.),
Rate = 4°C/min., Total run time=60 min. Injector temp.=200°C, FID Temp.=200°C.
FID Signal = Edaq Channel 1
Standard injection = 0.5µL, Range=3



Peak #	Name	FID RT (min.)
1	Ether	9.97
2	1,1,2-Trichloro-1,2,3-trifluoroethane	10.33
3	1,1-Dichloroethene	11.10
4	Acetonitrile	12.00
5	Iodomethane	12.31
6	Allyl chloride	12.56
7	Carbon disulfide/Methylene chloride	13.04
8	trans-1,2-Dichloroethene	14.07
9	1,1-Dichloroethane	15.74
10	2,2-Dichloropropane	17.74
11	cis-1,2-Dichloroethene	18.00
12	Methacrylonitrile/Methyl acrylate/Chloroform	18.49
13	Isobutanol/1,1,1-Trichloroethane	18.91
14	1,1-Dichloropropene	19.46
15	Carbon tetrachloride	20.79
16	Benzene/1,2-Dichloroethane	21.48
17	Trichloroethene	23.86
18	1,2-Dichloropropane	24.26
19	Methyl methacrylate	24.62
20	Bromodichloromethane	25.13
21	Dibromomethane/2-Nitropropane	25.46
22	cis-1,3-Dichloropropene	27.07
23	Toluene	28.09
24	Ethyl methacrylate/trans-1,3-Dichloropropene	28.73
25	1,1,2-Trichloroethane	29.34
26	Tetrachloroethene/1,3-Dichloropropane	30.34
27	Dibromochloromethane	31.16
28	1,2-Dibromoethane	31.84
29	Chlorobenzene	33.26
30	Ethylbenzene/1,1,1,2-Tetrachloroethane	33.40
31	m-Xylene/p-Xylene	33.85
32	o-Xylene	35.33
33	Styrene	35.50
34	Isopropylbenzene/Bromoform	35.48
35	cis-1,4-Dichloro-2-butene	36.80
36	1,1,2,2-Tetrachloroethane	37.23
37	1,2,3-Trichloropropane	37.77
38	n-Propylbenzene	37.92
39	trans-1,4-Dichloro-2-butene	38.05
40	Bromobenzene	38.14
41	1,3,5-Trimethylbenzene	38.50
42	2-Chlorotoluene	38.62
43	4-Chlorotoluene	38.77
44	tert-Butylbenzene	39.76
45	1,2,4-Trimethylbenzene	39.91
46	Pentachloroethane	40.17
47	sec-Butylbenzene	40.52
48	p-Isopropyltoluene	41.02
49	1,3-Dichlorobenzene	41.42
50	1,4-Dichlorobenzene	41.63
51	n-Butylbenzene	42.82
52	1,2-Dichlorobenzene	43.18
53	1,2-Dibromo-3-chloropropane	46.12
54	Nitrobenzene	46.58
55	1,2,4-Trichlorobenzene	49.26
56	Hexachlorobutadiene	49.72
57	Naphthalene	50.26
58	1,2,3-Trichlorobenzene	51.16

Absolute Standards Inc.

PO Box 5585
Hamden, CT 06518-0585

Phone: 203-281-2917
FAX: 203-281-2922

Safety Data Sheet (SDS) GHS/OSHA Compliant

Section I Product and Company Identification

IDENTITY **ANALYTICAL STANDARD DISSOLVED IN METHANOL**

Manufacturer's Name	ABSOLUTE STANDARDS INC	Emergency Telephone USA & CANADA	**1-800-535-5053**
Address	44 Rossotto Dr.	Emergency Telephone International	**1-352-323-3500**
	Hamden CT, 06514	Date Prepared/Revised	January 1, 2024

Section II - Hazards Identification

GHS Classification in accordance with 29 CFR 1910 (OSHA HCS)

H225	**Highly Flammable Liquid and Vapor**	**H301, 311, 331**	**Toxic if swallowed, skin contact, inhaled**
H370	**Cause damage to organs**	**H351**	**Suspected of causing cancer**
P271	**Use in ventilated area**	**P280**	**Use gloves, eye protection/face sheild**
P302,332	**If on skin, wash with soap and water**	**P305,351,338**	**If in eyes, remove contacts, rinse with water**

Signal Word: DANGER

Section III - Composition

Components (Specific Chemical Identity; Common Name(s))			
Methanol	METHYL ALCOHOL	CAS#: 67-56-1	% (optional) > 97

See Certified Weight Report For Other Analytes Present At Trace Quantities.

INTENDED USE: REFERENCE MATERIAL

Section IV. FIRST AID MEASURES

General advice	Consult a physician. Show this safety data sheet to the doctor in attendance.Move to safe area.
If inhaled	If inhaled, move person into fresh air. If not breathing, give artificial respiration. Consult a physician.
In case of skin contact	Wash with soap and water. Consult a physician.
In case of eye contact	Rinse thoroughly with plenty of water for at least 15 minutes and consult a physician.
If swallowed	Do NOT induce vomiting. Rinse mouth with water. Consult a physician.

Section V. FIREFIGHTING MEASURES

Flammability	Flammable in the presence of a source of ignition when the temperature is above the flash point. Keep away from heat/sparks/open flame/hot surface. No smoking.
Suitable extinguishing media	Use water spray, alcohol-resistant foam, dry chemical or carbon dioxide.
Protective equipment for fire	Wear self contained breathing apparatus for fire fighting if necessary.

Section VI. ACCIDENTAL RELEASE MEASURES

Personal precautions	Wear respiratory protection. Avoid breathing vapors, mist or gas. Ensure adequate ventilation. Remove all sources of ignition. Vapours accumulate to form explosive concentrations.
Environmental precautions	Prevent further leakage or spillage if safe to do so. Do not let product enter drains.
Clean up	Contain spillage, and then collect and place in container for disposal according to local regulations (see section 13).

Section VII. HANDLING AND STORAGE

Precautions for safe handling	Avoid contact with skin and eyes. Avoid inhalation of vapour or mist.
Storage Conditions	Use ventilation Keep away from sources of ignition. No smoking. Prevent the build up of electrostatic charge. Keep container tightly closed in a dry and well-ventilated place. Containers which are opened must be carefully resealed and kept upright to prevent leakage.

Section VIII. EXPOSURE CONTROLS/PERSONAL PROTECTION

Methanol 67-56-1 TWA 200 ppm
Skin notation TWA 200 ppm
Potential for skin absorption , ingestion and inhalation.
Personal protective equipment Respiratory protection Handle with gloves. Gloves must be inspected prior to use. Eye protection.
Avoid contact with skin, eyes and clothing. Wash hands thoroughly after handling the product.

Section IX - Physical/Chemical Characteristics

Boiling Point	65°C	Specific Gravity (H2O = 1)	0.79
Vapor Pressure (mm Hg)	96	Melting Point	-98°C
Vapor Density (AIR = 1)	1.11	Evaporation rate (Butyl Acetate = 1)	4.6

Solubility in Water COMPLETE

Appearance and Odor CLEAR, COLORLESS LIQUID WITH CHARACTERISTIC PUNGENT ODOR.

Section X. STABILITY AND REACTIVITY

Chemical stability Stable under recommended storage conditions.
Possibility of hazardous reactions Vapours may form explosive mixture with air.
Conditions to avoid Heat, flames, sparks, extreme temperature and sunlight.
Materials to avoid Acid chlorides, Acid anhydrides, Oxidizing agents, Alkali metals, Reducing agents, Acids
Hazardous decomposition products formed under fire conditions. - Carbon oxides

Section XI. TOXICOLOGICAL INFORMATION

LD50 Oral - rat - 5,628 mg/kg
LC50 Inhalation - rat - 4 h - 64000 ppm
LD50 Dermal - rabbit - 15,800 mg/kg
Toxic if absorbed through skin. Causes skin irritation.
Eye damage/eye irritation
Toxic if inhaled. Causes respiratory tract irritation.
Toxic if swallowed.

Section XII. ECOLOGICAL INFORMATION FOR REPORTABLE QUANTITY OF 5000 lbs.

LC50	15,400 mg/l - 96 h
EC50	24,500.00 mg/l - 48 h
EC100	10,000.00 mg/l - 24 h

Section XIII. DISPOSAL CONSIDERATIONS

Dispose with normal Laboratory Solvent Waste.

Section XIV. TRANSPORT INFORMATION

DOT (US)
UN number: 1230 Class: 3 Packing group: II
Proper shipping name: Methanol

IATA
UN number: 1230 Class: 3 Packing group: II
Proper shipping name: Methanol

Section XV. REGULATORY INFORMATION

OSHA Hazards Flammable liquid, Target Organ Effect, Toxic by inhalation., Toxic by ingestion, Toxic by skin absorption, Irritant
SARA 302: No chemicals in this material are subject to the reporting requirements of SARA Title III, Section 302.

Section XVI. Misc. INFORMATION

The information in this Material Safety Data Sheet meets the requirements of the United States Occupational Safety and Health Act and regulations promulgated thereunder (29 CFR 1910.1200 et. seq.) and Global Harmonized System (GHS). This document is intended only as a guide to the appropriate precautionary handling of the material by trained personnel, or supervised by a person trained in chemical handling. The user is responsible for determining the precautions and dangers of this chemical for his or her particular application. Depending on usage, protective clothing including eye and face guards and respirators must be used to avoid contact with material or breathing chemical vapors/fumes. Exposure to this product may have serious adverse health effects. This chemical may interact with other substances. Since the potential uses are so varied, ABSOLUTE STANDARDS INC. cannot warn of all the potential dangers of use or interaction with other chemicals or substances. ABSOLUTE STANDARDS INC. warrants that the chemical meets the specifications set forth on the label. ABSOLUTE STANDARDS INC DISCLAIMS ANY OTHER WARRANTIES, EXPRESSED OR IMPLIED WITH REGARD TO THE PRODUCT SUPPLIED HEREUNDER, ITS MERCHANTABILITY OR ITS FITNESS FOR A PARTICULAR APPLICATION. The user should recognize that this product can cause severe injury or death, especially if improperly handled or the known dangers of use are not heeded. READ ALL PRECAUTIONARY INFORMATION. As new documented general safety information becomes available, Absolute Standards Inc. will periodically revise this Safety Data Sheet. If you have any questions, please call Technical Service at 1-203-281-2917 for assistance.

Absolute Standards, Inc.
800-368-1131
www.absolutestandards.com

Certified Reference Material CRM

Rec 09/16/24 2 Vials

ANAB ISO 17034 Accredited
AR-1539 Certificate Numb
https://Absolutestandards.co...

CERTIFIED WEIGHT REPORT

Part Number:	91980
Lot Number:	091424
Description:	Acrolein
Expiration Date:	101424
Recommended Storage:	Refrigerate (4 °C)
Nominal Concentration (µg/mL):	5000
NIST Test ID#:	6UTB

Weight(s) shown below were combined and diluted to (mL): 10.0

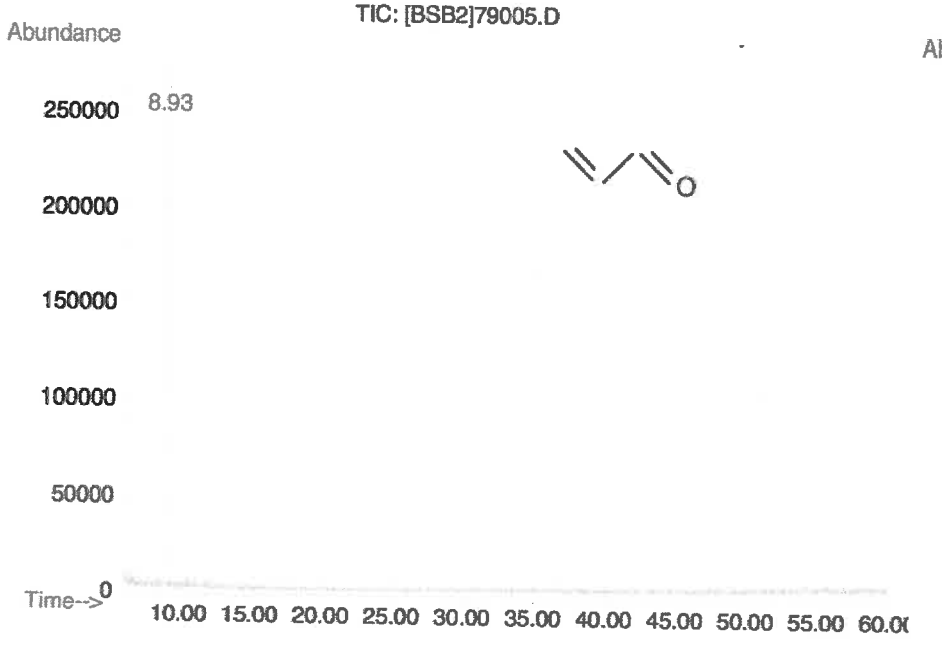
Solvent(s):	Lot#
Water	072324Q

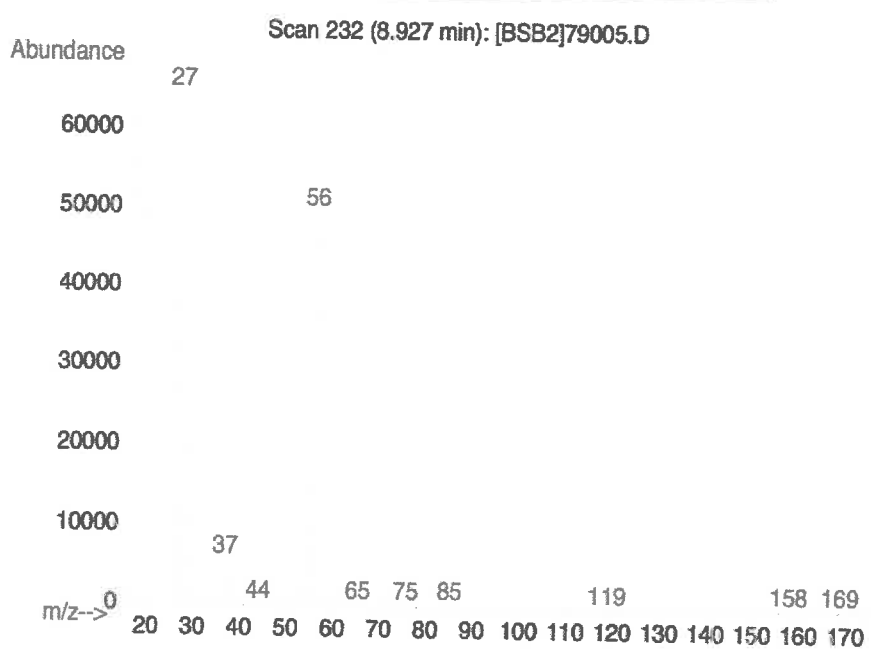
5E-05 Balance Uncertainty
0.001 Flask Uncertainty

Formulated By:	Justin Dippold	091424 DATE
Reviewed By:	Pedro L. Rentas	091424 DATE

Compound	RM#	Lot Number	Nominal Conc (µg/mL)	Purity (%)	Uncertainty Purity	Target Weight(g)	Actual Weight(g)	Actual Conc (µg/mL)	Expanded Uncertainty (+/-) (µg/mL)	SDS Information (Solvent Safety Info. On Attached pg.) CAS#	OSHA PEL (TWA)	LD50
1. Acrolein	5	103755V10F	5000	97	0.5	0.05166	0.05175	5008.9	52.5	107-02-8	0.1 ppm	orl-rat 46mg/kg

Method: GC6MSD-1. **Detector:** Mass Selective Detector (Scan mode). **Column:** Vocol (60m X 0.25mm ID X 1.5µm film thickness). **Oven Profile:** Temp. 1 = 35°C (Time 1 = 10min.), Temp. 2=200°C (Time 2 = 8.75 min.), Rate = 4°C/min., Injector Temp. = 200°C, Detector Temp. = 220°C. **Analyst:** Pedro Rentas. **NOTE:** Due to the instability of acrolein in solution, all solutions of acrolein, and any dilutions thereof, should be used immediately Long term storage is not recommended. Please contact our technical department if further information is required.





- The certified value is the concentration calculated from gravimetric and volumetric measurements unless otherwise stated.
- Standards are prepared gravimetrically using balances that are calibrated with weights traceable to NIST (see above).
- Standards are certified (+/-) 0.5% of the stated value, unless otherwise stated.
- All Standards, after opening ampule, should be stored with caps tight and under appropriate laboratory conditions.
- Uncertainty Reference: Taylor, B.N. and Kuyat, C.E., "Guidelines for Evaluating and Expressing the Uncertainty of NIST Measurement Result," NIST Technical Note 1297, U.S. Government Printing Office, Washington, DC, (1994).

Absolute Standards, Inc.
800-368-1131
www.absolutestandards.com

Certified Reference Material CRM

Rec 09/16/24 2 Vials

ANAB ISO 17034 Accredited
AR-1539 Certificate Numb
https://Absolutestandards.co...

CERTIFIED WEIGHT REPORT

Part Number: 91980
Lot Number: 091424
Description: Acrolein

Solvent(s): Water **Lot#** 072324Q

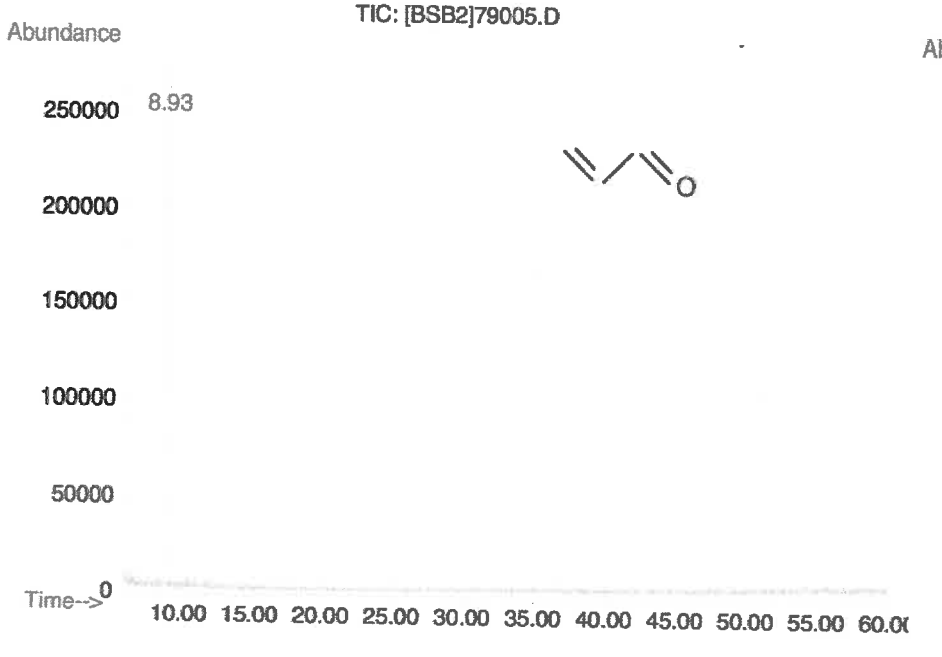
Expiration Date: 101424
Recommended Storage: Refrigerate (4 °C)
Nominal Concentration (µg/mL): 5000
NIST Test ID#: 6UTB

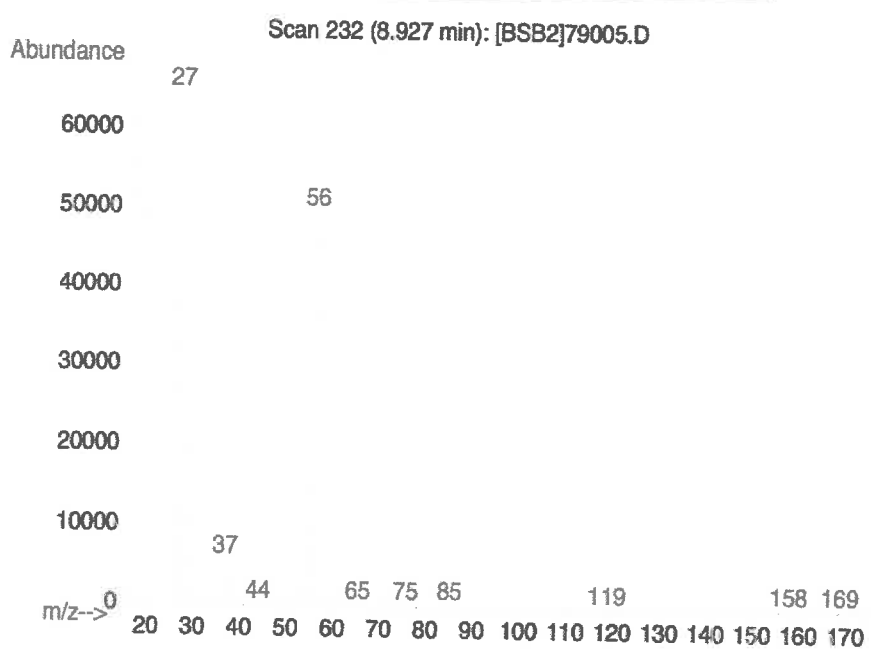
Weight(s) shown below were combined and diluted to (mL): 10.0 | 5E-05 Balance Uncertainty | 0.001 Flask Uncertainty

Justin Dippold	091424
Formulated By: Justin Dippold	DATE
Pedro Rentas	091424
Reviewed By: Pedro L. Rentas	DATE

Compound	RM#	Lot Number	Nominal Conc (µg/mL)	Purity (%)	Uncertainty Purity	Target Weight(g)	Actual Weight(g)	Actual Conc (µg/mL)	Expanded Uncertainty (+/-) (µg/mL)	SDS Information (Solvent Safety Info. On Attached pg.) CAS#	OSHA PEL (TWA)	LD50
1. Acrolein	5	103755V10F	5000	97	0.5	0.05166	0.05175	5008.9	52.5	107-02-8	0.1 ppm	orl-rat 46mg/kg

Method: GC6MSD-1. **Detector:** Mass Selective Detector (Scan mode). **Column:** Vocol (60m X 0.25mm ID X 1.5µm film thickness). **Oven Profile:** Temp. 1 = 35°C (Time 1 = 10min.), Temp. 2=200°C (Time 2 = 8.75 min.), Rate = 4°C/min., Injector Temp. = 200°C, Detector Temp. = 220°C. **Analyst:** Pedro Rentas. **NOTE:** Due to the instability of acrolein in solution, all solutions of acrolein, and any dilutions thereof, should be used immediately Long term storage is not recommended. Please contact our technical department if further information is required.





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- Standards are prepared gravimetrically using balances that are calibrated with weights traceable to NIST (see above).
- Standards are certified (+/-) 0.5% of the stated value, unless otherwise stated.
- All Standards, after opening ampule, should be stored with caps tight and under appropriate laboratory conditions.
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AR-1539 Certificate Number
https://Absolutestandards.com

CERTIFIED WEIGHT REPORT

Part Number: 95318
Lot Number: 120524
Description: 2-Chloroethyl vinyl ether

Expiration Date: 120527
Recommended Storage: Refrigerate (4 °C)
Nominal Concentration (µg/mL): 10000
NIST Test ID#: 6UTB

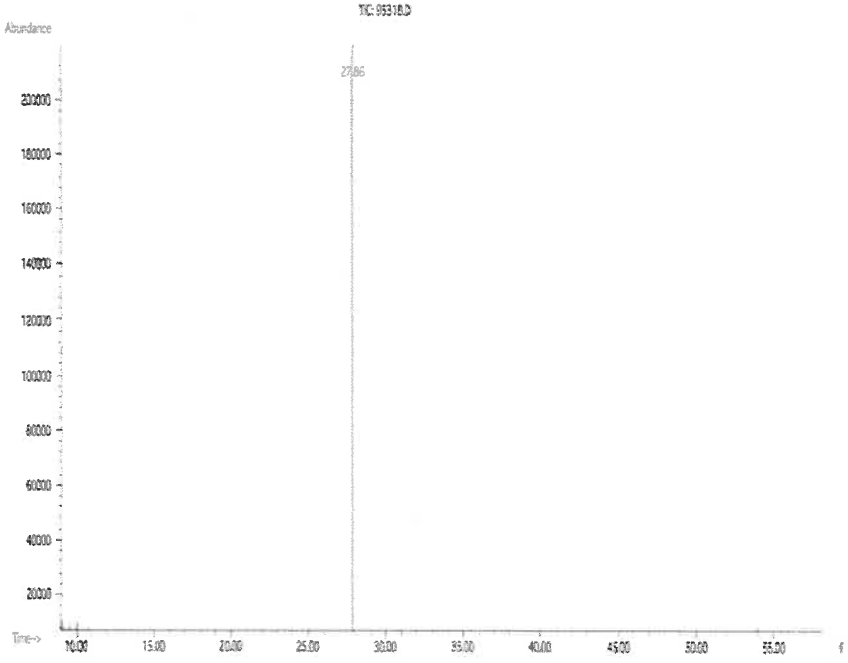
Solvent(s): Methanol **Lot#** EJ143-US

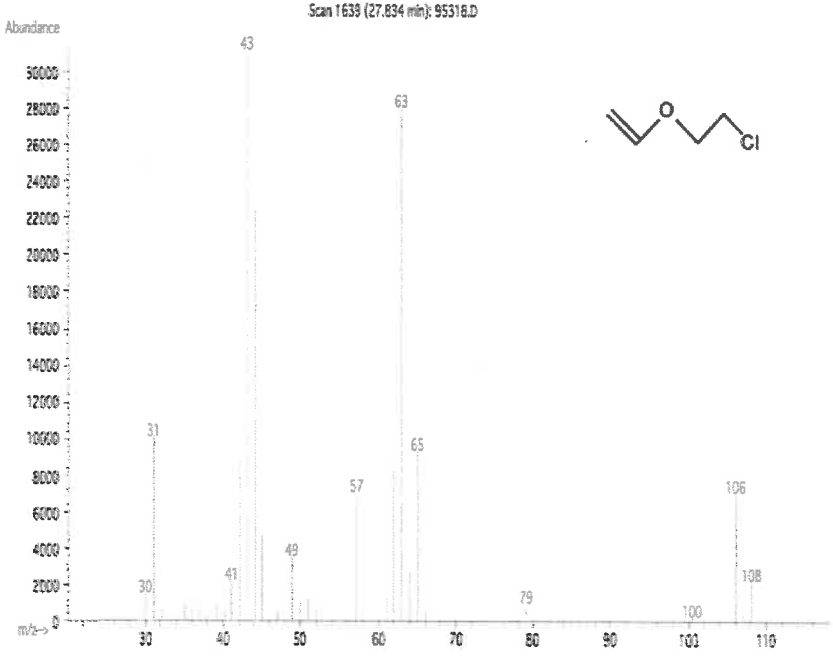
5E-05 Balance Uncertainty
Weight(s) shown below were combined and diluted to (mL): 50.0 0.001 Flask Uncertainty

Prashant Chauhan		120524
Formulated By:	Prashant Chauhan	DATE
Pedro Rentas		120524
Reviewed By:	Pedro L. Rentas	DATE

Compound	RM#	Lot Number	Nominal Conc (µg/mL)	Purity (%)	Uncertainty Purity	Target Weight (g)	Actual Weight (g)	Actual Conc(µg/mL)	Expanded Uncertainty (+/-) (µg/mL)	SDS Information (Solvent Safety Info. On Attached pg.) CAS#	OSHA PEL (TWA)	LD50
1. 2-Chloroethyl vinyl ether	74	MKCD0033	10000	99	0.2	0.50536	0.50550	10002.9	40.5	110-75-8	N/A	ori-rat 250mg/kg

Method: GC6MSD-1.M. **Detector:** MSD. **Column:** (60m X 0.25mm X 1.5 µm). **Oven Profile:** Temp 1 = 35°C (Time 1=10min.), Temp 2 = 200°C (Time 2=8.75 min.), Rate = 4°C/min., Injector B Temp.= 200°C, Detector B Temp. = 220°C. **Analyst:** Candice Warren.





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Absolute Standards Inc.
PO Box 5585
Hamden, CT 06518-0585
Phone: 203-281-2917
FAX: 203-281-2922

Safety Data Sheet (SDS) GHS/OSHA Compliant

Section I Product and Company Identification

IDENTITY **ANALYTICAL STANDARD DISSOLVED IN METHANOL**

Manufacturer's Name	ABSOLUTE STANDARDS INC	Emergency Telephone USA & CANADA	**1-800-535-5053**
Address	44 Rossotto Dr. Hamden CT, 06514	Emergency Telephone International Date Prepared/Revised	**1-352-323-3500** January 1, 2024

Section II - Hazards Identification

GHS Classification in accordance with 29 CFR 1910 (OSHA HCS)

H225	**Highly Flammable Liquid and Vapor**	**H301, 311, 331**	**Toxic if swallowed, skin contact, inhaled**
H370	**Cause damage to organs**	**H351**	**Suspected of causing cancer**
P271	**Use in ventilated area**	**P280**	**Use gloves, eye protection/face sheild**
P302,332	**If on skin, wash with soap and water**	**P305,351,338**	**If in eyes, remove contacts, rinse with water**

Signal Word: DANGER

Section III - Composition

Components (Specific Chemical Identity; Common Name(s))			% (optional)
Methanol	METHYL ALCOHOL	CAS#: 67-56-1	> 97

See Certified Weight Report For Other Analytes Present At Trace Quantities.

INTENDED USE: REFERENCE MATERIAL

Section IV. FIRST AID MEASURES

General advice	Consult a physician. Show this safety data sheet to the doctor in attendance.Move to safe area.
If inhaled	If inhaled, move person into fresh air. If not breathing, give artificial respiration. Consult a physician.
In case of skin contact	Wash with soap and water. Consult a physician.
In case of eye contact	Rinse thoroughly with plenty of water for at least 15 minutes and consult a physician.
If swallowed	Do NOT induce vomiting. Rinse mouth with water. Consult a physician.

Section V. FIREFIGHTING MEASURES

Flammability	Flammable in the presence of a source of ignition when the temperature is above the flash point. Keep away from heat/sparks/open flame/hot surface. No smoking.
Suitable extinguishing media	Use water spray, alcohol-resistant foam, dry chemical or carbon dioxide.
Protective equipment for fire	Wear self contained breathing apparatus for fire fighting if necessary.

Section VI. ACCIDENTAL RELEASE MEASURES

Personal precautions	Wear respiratory protection. Avoid breathing vapors, mist or gas. Ensure adequate ventilation. Remove all sources of ignition. Vapours accumulate to form explosive concentrations.
Environmental precautions	Prevent further leakage or spillage if safe to do so. Do not let product enter drains.
Clean up	Contain spillage, and then collect and place in container for disposal according to local regulations (see section 13).

Section VII. HANDLING AND STORAGE

Precautions for safe handling	Avoid contact with skin and eyes. Avoid inhalation of vapour or mist. Use ventilation Keep away from sources of ignition. No smoking. Prevent the build up of electrostatic charge.
Storage Conditions	Keep container tightly closed in a dry and well-ventilated place. Containers which are opened must be carefully resealed and kept upright to prevent leakage.

Section VIII. EXPOSURE CONTROLS/PERSONAL PROTECTION

Methanol 67-56-1 TWA 200 ppm
Skin notation TWA 200 ppm
Potential for skin absorption , ingestion and inhalation.
Personal protective equipment Respiratory protection Handle with gloves. Gloves must be inspected prior to use. Eye protection.
Avoid contact with skin, eyes and clothing. Wash hands thoroughly after handling the product.

Section IX - Physical/Chemical Characteristics

Boiling Point	65°C	Specific Gravity (H2O = 1)	0.79
Vapor Pressure (mm Hg)	96	Melting Point	-98°C
Vapor Density (AIR = 1)	1.11	Evaporation rate (Butyl Acetate = 1)	4.6

Solubility in Water COMPLETE

Appearance and Odor CLEAR, COLORLESS LIQUID WITH CHARACTERISTIC PUNGENT ODOR.

Section X. STABILITY AND REACTIVITY

Chemical stability — Stable under recommended storage conditions.
Possibility of hazardous reactions — Vapours may form explosive mixture with air.
Conditions to avoid — Heat, flames, sparks, extreme temperature and sunlight.
Materials to avoid — Acid chlorides, Acid anhydrides, Oxidizing agents, Alkali metals, Reducing agents, Acids
Hazardous decomposition products formed under fire conditions. - Carbon oxides

Section XI. TOXICOLOGICAL INFORMATION

LD50 Oral - rat - 5,628 mg/kg
LC50 Inhalation - rat - 4 h - 64000 ppm
LD50 Dermal - rabbit - 15,800 mg/kg
Toxic if absorbed through skin. Causes skin irritation.
Eye damage/eye irritation
Toxic if inhaled. Causes respiratory tract irritation.
Toxic if swallowed.

Section XII. ECOLOGICAL INFORMATION FOR REPORTABLE QUANTITY OF 5000 lbs.

LC50	15,400 mg/l - 96 h
EC50	24,500.00 mg/l - 48 h
EC100	10,000.00 mg/l - 24 h

Section XIII. DISPOSAL CONSIDERATIONS

Dispose with normal Laboratory Solvent Waste.

Section XIV. TRANSPORT INFORMATION

DOT (US)
UN number: 1230 Class: 3 Packing group: II
Proper shipping name: Methanol

IATA
UN number: 1230 Class: 3 Packing group: II
Proper shipping name: Methanol

Section XV. REGULATORY INFORMATION

OSHA Hazards Flammable liquid, Target Organ Effect, Toxic by inhalation., Toxic by ingestion, Toxic by skin absorption, Irritant
SARA 302: No chemicals in this material are subject to the reporting requirements of SARA Title III, Section 302.

Section XVI. Misc. INFORMATION

The information in this Material Safety Data Sheet meets the requirements of the United States Occupational Safety and Health Act and regulations promulgated thereunder (29 CFR 1910.1200 et. seq.) and Global Harmonized System (GHS). This document is intended only as a guide to the appropriate precautionary handling of the material by trained personnel, or supervised by a person trained in chemical handling. The user is responsible for determining the precautions and dangers of this chemical for his or her particular application. Depending on usage, protective clothing including eye and face guards and respirators must be used to avoid contact with material or breathing chemical vapors/fumes. Exposure to this product may have serious adverse health effects. This chemical may interact with other substances. Since the potential uses are so varied, ABSOLUTE STANDARDS INC. cannot warn of all the potential dangers of use or interaction with other chemicals or substances. ABSOLUTE STANDARDS INC. warrants that the chemical meets the specifications set forth on the label. ABSOLUTE STANDARDS INC DISCLAIMS ANY OTHER WARRANTIES, EXPRESSED OR IMPLIED WITH REGARD TO THE PRODUCT SUPPLIED HEREUNDER, ITS MERCHANTABILITY OR ITS FITNESS FOR A PARTICULAR APPLICATION. The user should recognize that this product can cause severe injury or death, especially if improperly handled or the known dangers of use are not heeded. READ ALL PRECAUTIONARY INFORMATION. As new documented general safety information becomes available, Absolute Standards Inc. will periodically revise this Safety Data Sheet. If you have any questions, please call Technical Service at 1-203-281-2917 for assistance.

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CERTIFIED WEIGHT REPORT

Part Number: 95318
Lot Number: 120524
Description: 2-Chloroethyl vinyl ether

Expiration Date: 120527
Recommended Storage: Refrigerate (4 °C)
Nominal Concentration (µg/mL): 10000
NIST Test ID#: 6UTB

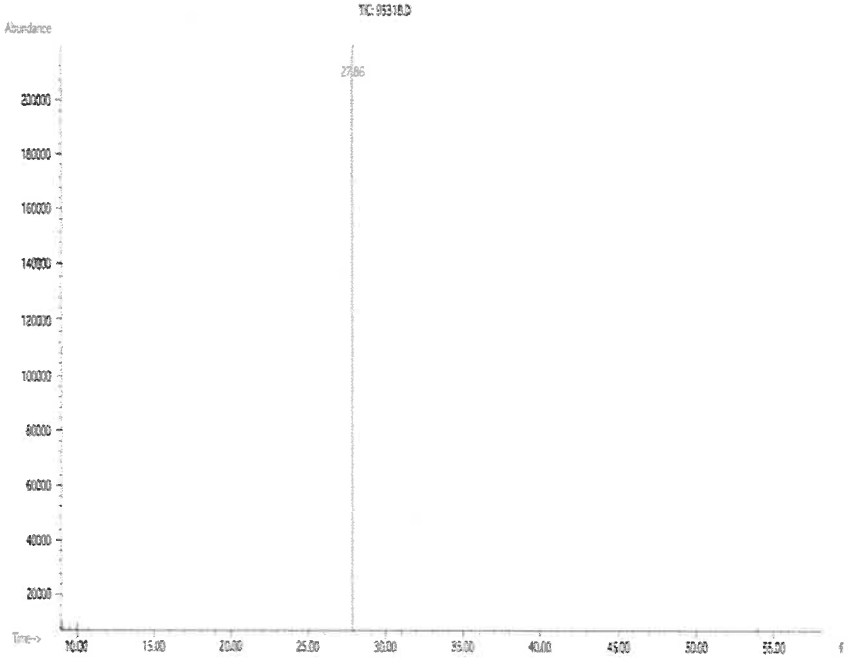
Solvent(s): Methanol **Lot#** EJ143-US

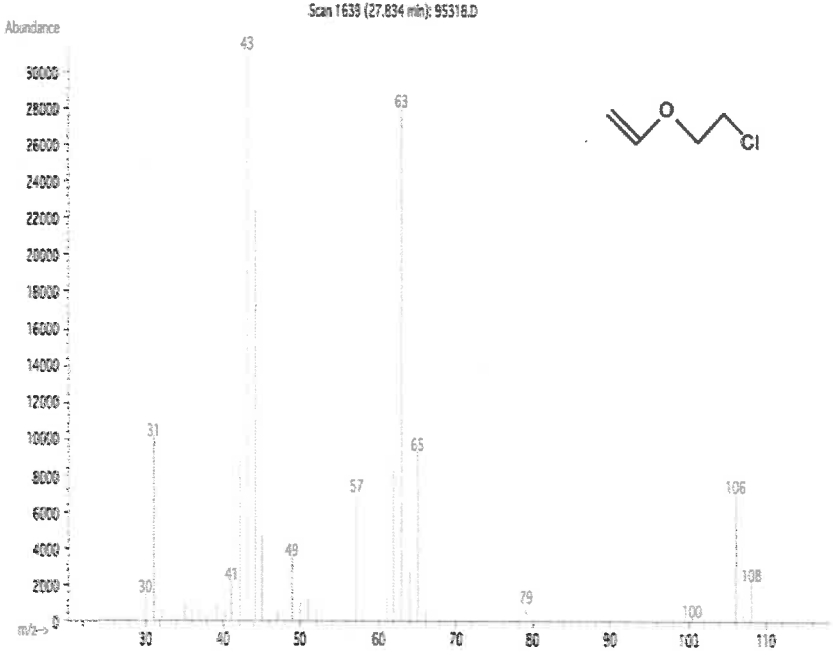
5E-05 Balance Uncertainty
Weight(s) shown below were combined and diluted to (mL): 50.0 0.001 Flask Uncertainty

Formulated By:	Prashant Chauhan	120524 DATE
Reviewed By:	Pedro L. Rentas	120524 DATE

Compound	RM#	Lot Number	Nominal Conc (µg/mL)	Purity (%)	Uncertainty Purity	Target Weight (g)	Actual Weight (g)	Actual Conc(µg/mL)	Expanded Uncertainty (+/-) (µg/mL)	SDS Information (Solvent Safety Info. On Attached pg.) CAS#	OSHA PEL (TWA)	LD50
1. 2-Chloroethyl vinyl ether	74	MKCD0033	10000	99	0.2	0.50536	0.50550	10002.9	40.5	110-75-8	N/A	ori-rat 250mg/kg

Method: GC6MSD-1.M. **Detector:** MSD. **Column:** (60m X 0.25mm X 1.5 µm). **Oven Profile:** Temp 1 = 35°C (Time 1=10min.), Temp 2 = 200°C (Time 2=8.75 min.), Rate = 4°C/min., Injector B Temp.= 200°C, Detector B Temp. = 220°C. **Analyst:** Candice Warren.





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Safety Data Sheet (SDS) GHS/OSHA Compliant

Section I Product and Company Identification

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Address	44 Rossotto Dr. Hamden CT, 06514	Emergency Telephone International Date Prepared/Revised	**1-352-323-3500** January 1, 2024

Section II - Hazards Identification

GHS Classification in accordance with 29 CFR 1910 (OSHA HCS)

H225	**Highly Flammable Liquid and Vapor**	**H301, 311, 331**	**Toxic if swallowed, skin contact, inhaled**
H370	**Cause damage to organs**	**H351**	**Suspected of causing cancer**
P271	**Use in ventilated area**	**P280**	**Use gloves, eye protection/face sheild**
P302,332	**If on skin, wash with soap and water**	**P305,351,338**	**If in eyes, remove contacts, rinse with water**

Signal Word: DANGER

Section III - Composition

Components (Specific Chemical Identity; Common Name(s))			% (optional)
Methanol	METHYL ALCOHOL	CAS#: 67-56-1	> 97

See Certified Weight Report For Other Analytes Present At Trace Quantities.

INTENDED USE: REFERENCE MATERIAL

Section IV. FIRST AID MEASURES

General advice	Consult a physician. Show this safety data sheet to the doctor in attendance.Move to safe area.
If inhaled	If inhaled, move person into fresh air. If not breathing, give artificial respiration. Consult a physician.
In case of skin contact	Wash with soap and water. Consult a physician.
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If swallowed	Do NOT induce vomiting. Rinse mouth with water. Consult a physician.

Section V. FIREFIGHTING MEASURES

Flammability	Flammable in the presence of a source of ignition when the temperature is above the flash point. Keep away from heat/sparks/open flame/hot surface. No smoking.
Suitable extinguishing media	Use water spray, alcohol-resistant foam, dry chemical or carbon dioxide.
Protective equipment for fire	Wear self contained breathing apparatus for fire fighting if necessary.

Section VI. ACCIDENTAL RELEASE MEASURES

Personal precautions	Wear respiratory protection. Avoid breathing vapors, mist or gas. Ensure adequate ventilation. Remove all sources of ignition. Vapours accumulate to form explosive concentrations.
Environmental precautions	Prevent further leakage or spillage if safe to do so. Do not let product enter drains.
Clean up	Contain spillage, and then collect and place in container for disposal according to local regulations (see section 13).

Section VII. HANDLING AND STORAGE

Precautions for safe handling	Avoid contact with skin and eyes. Avoid inhalation of vapour or mist. Use ventilation Keep away from sources of ignition. No smoking. Prevent the build up of electrostatic charge.
Storage Conditions	Keep container tightly closed in a dry and well-ventilated place. Containers which are opened must be carefully resealed and kept upright to prevent leakage.

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Methanol 67-56-1 TWA 200 ppm
Skin notation TWA 200 ppm
Potential for skin absorption , ingestion and inhalation.
Personal protective equipment Respiratory protection Handle with gloves. Gloves must be inspected prior to use. Eye protection.
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Section IX - Physical/Chemical Characteristics

Boiling Point	65°C	Specific Gravity (H2O = 1)	0.79
Vapor Pressure (mm Hg)	96	Melting Point	-98°C
Vapor Density (AIR = 1)	1.11	Evaporation rate (Butyl Acetate = 1)	4.6

Solubility in Water COMPLETE

Appearance and Odor CLEAR, COLORLESS LIQUID WITH CHARACTERISTIC PUNGENT ODOR.

Section X. STABILITY AND REACTIVITY

Chemical stability Stable under recommended storage conditions.
Possibility of hazardous reactions Vapours may form explosive mixture with air.
Conditions to avoid Heat, flames, sparks, extreme temperature and sunlight.
Materials to avoid Acid chlorides, Acid anhydrides, Oxidizing agents, Alkali metals, Reducing agents, Acids
Hazardous decomposition products formed under fire conditions. - Carbon oxides

Section XI. TOXICOLOGICAL INFORMATION

LD50 Oral - rat - 5,628 mg/kg
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Section XIII. DISPOSAL CONSIDERATIONS

Dispose with normal Laboratory Solvent Waste.

Section XIV. TRANSPORT INFORMATION

DOT (US)
UN number: 1230 Class: 3 Packing group: II
Proper shipping name: Methanol

IATA
UN number: 1230 Class: 3 Packing group: II
Proper shipping name: Methanol

Section XV. REGULATORY INFORMATION

OSHA Hazards Flammable liquid, Target Organ Effect, Toxic by inhalation., Toxic by ingestion, Toxic by skin absorption, Irritant
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CERTIFIED WEIGHT REPORT

Part Number: 95318
Lot Number: 120524
Description: 2-Chloroethyl vinyl ether

Expiration Date: 120527
Recommended Storage: Refrigerate (4 °C)
Nominal Concentration (µg/mL): 10000
NIST Test ID#: 6UTB

Solvent(s): Methanol **Lot#** EJ143-US

5E-05 Balance Uncertainty
Weight(s) shown below were combined and diluted to (mL): 50.0 0.001 Flask Uncertainty

Prashant Chauhan	120524
Formulated By: Prashant Chauhan	DATE
Pedro Rentas	120524
Reviewed By: Pedro L. Rentas	DATE

Compound	RM#	Lot Number	Nominal Conc (µg/mL)	Purity (%)	Uncertainty Purity	Target Weight (g)	Actual Weight (g)	Actual Conc(µg/mL)	Expanded Uncertainty (+/-) (µg/mL)	SDS Information (Solvent Safety Info. On Attached pg.) CAS#	OSHA PEL (TWA)	LD50
1. 2-Chloroethyl vinyl ether	74	MKCD0033	10000	99	0.2	0.50536	0.50550	10002.9	40.5	110-75-8	N/A	ori-rat 250mg/kg

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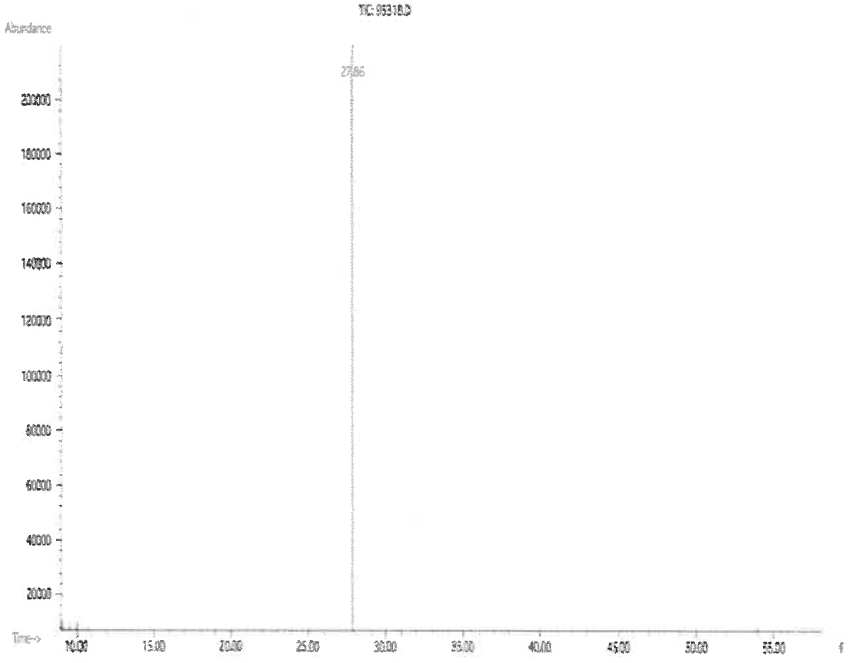

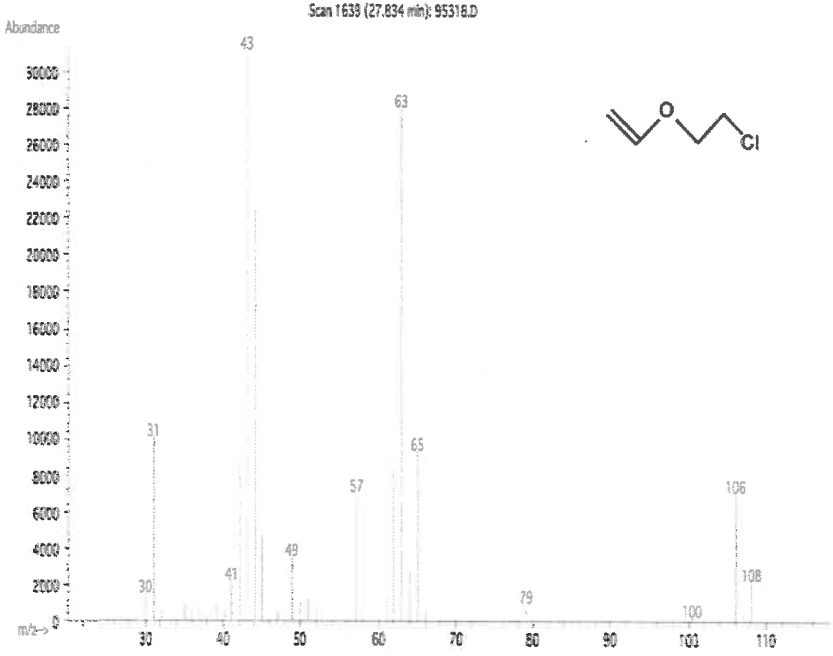

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Address	44 Rossotto Dr. Hamden CT, 06514	Emergency Telephone International Date Prepared/Revised	**1-352-323-3500** January 1, 2024

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GHS Classification in accordance with 29 CFR 1910 (OSHA HCS)

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Signal Word: DANGER

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Components (Specific Chemical Identity; Common Name(s))			% (optional)
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Personal precautions	Wear respiratory protection. Avoid breathing vapors, mist or gas. Ensure adequate ventilation. Remove all sources of ignition. Vapours accumulate to form explosive concentrations.
Environmental precautions	Prevent further leakage or spillage if safe to do so. Do not let product enter drains.
Clean up	Contain spillage, and then collect and place in container for disposal according to local regulations (see section 13).

Section VII. HANDLING AND STORAGE

Precautions for safe handling	Avoid contact with skin and eyes. Avoid inhalation of vapour or mist. Use ventilation Keep away from sources of ignition. No smoking. Prevent the build up of electrostatic charge.
Storage Conditions	Keep container tightly closed in a dry and well-ventilated place. Containers which are opened must be carefully resealed and kept upright to prevent leakage.

Section VIII. EXPOSURE CONTROLS/PERSONAL PROTECTION

Methanol 67-56-1 TWA 200 ppm
Skin notation TWA 200 ppm
Potential for skin absorption , ingestion and inhalation.
Personal protective equipment Respiratory protection Handle with gloves. Gloves must be inspected prior to use. Eye protection.
Avoid contact with skin, eyes and clothing. Wash hands thoroughly after handling the product.

Section IX - Physical/Chemical Characteristics

Boiling Point	65°C	Specific Gravity (H2O = 1)	0.79
Vapor Pressure (mm Hg)	96	Melting Point	-98°C
Vapor Density (AIR = 1)	1.11	Evaporation rate (Butyl Acetate = 1)	4.6

Solubility in Water COMPLETE

Appearance and Odor CLEAR, COLORLESS LIQUID WITH CHARACTERISTIC PUNGENT ODOR.

Section X. STABILITY AND REACTIVITY

Chemical stability — Stable under recommended storage conditions.
Possibility of hazardous reactions — Vapours may form explosive mixture with air.
Conditions to avoid — Heat, flames, sparks, extreme temperature and sunlight.
Materials to avoid — Acid chlorides, Acid anhydrides, Oxidizing agents, Alkali metals, Reducing agents, Acids
Hazardous decomposition products formed under fire conditions. - Carbon oxides

Section XI. TOXICOLOGICAL INFORMATION

LD50 Oral - rat - 5,628 mg/kg
LC50 Inhalation - rat - 4 h - 64000 ppm
LD50 Dermal - rabbit - 15,800 mg/kg
Toxic if absorbed through skin. Causes skin irritation.
Eye damage/eye irritation
Toxic if inhaled. Causes respiratory tract irritation.
Toxic if swallowed.

Section XII. ECOLOGICAL INFORMATION FOR REPORTABLE QUANTITY OF 5000 lbs.

LC50	15,400 mg/l - 96 h
EC50	24,500.00 mg/l - 48 h
EC100	10,000.00 mg/l - 24 h

Section XIII. DISPOSAL CONSIDERATIONS

Dispose with normal Laboratory Solvent Waste.

Section XIV. TRANSPORT INFORMATION

DOT (US)
UN number: 1230 Class: 3 Packing group: II
Proper shipping name: Methanol

IATA
UN number: 1230 Class: 3 Packing group: II
Proper shipping name: Methanol

Section XV. REGULATORY INFORMATION

OSHA Hazards Flammable liquid, Target Organ Effect, Toxic by inhalation., Toxic by ingestion, Toxic by skin absorption, Irritant
SARA 302: No chemicals in this material are subject to the reporting requirements of SARA Title III, Section 302.

Section XVI. Misc. INFORMATION

The information in this Material Safety Data Sheet meets the requirements of the United States Occupational Safety and Health Act and regulations promulgated thereunder (29 CFR 1910.1200 et. seq.) and Global Harmonized System (GHS). This document is intended only as a guide to the appropriate precautionary handling of the material by trained personnel, or supervised by a person trained in chemical handling. The user is responsible for determining the precautions and dangers of this chemical for his or her particular application. Depending on usage, protective clothing including eye and face guards and respirators must be used to avoid contact with material or breathing chemical vapors/fumes. Exposure to this product may have serious adverse health effects. This chemical may interact with other substances. Since the potential uses are so varied, ABSOLUTE STANDARDS INC. cannot warn of all the potential dangers of use or interaction with other chemicals or substances. ABSOLUTE STANDARDS INC. warrants that the chemical meets the specifications set forth on the label. ABSOLUTE STANDARDS INC DISCLAIMS ANY OTHER WARRANTIES, EXPRESSED OR IMPLIED WITH REGARD TO THE PRODUCT SUPPLIED HEREUNDER, ITS MERCHANTABILITY OR ITS FITNESS FOR A PARTICULAR APPLICATION. The user should recognize that this product can cause severe injury or death, especially if improperly handled or the known dangers of use are not heeded. READ ALL PRECAUTIONARY INFORMATION. As new documented general safety information becomes available, Absolute Standards Inc. will periodically revise this Safety Data Sheet. If you have any questions, please call Technical Service at 1-203-281-2917 for assistance.

Absolute Standards, Inc.
800-368-1131
www.absolutestandards.com

Certified Reference Material CRM

Rec 12/6/24
20 vial
V14630 to
V14649

ANAB ISO 17034 Accredited
AR-1539 Certificate Number
https://Absolutestandards.com

CERTIFIED WEIGHT REPORT

Part Number: 95318
Lot Number: 120524
Description: 2-Chloroethyl vinyl ether

Expiration Date: 120527
Recommended Storage: Refrigerate (4 °C)
Nominal Concentration (µg/mL): 10000
NIST Test ID#: 6UTB

Solvent(s): Methanol **Lot#** EJ143-US

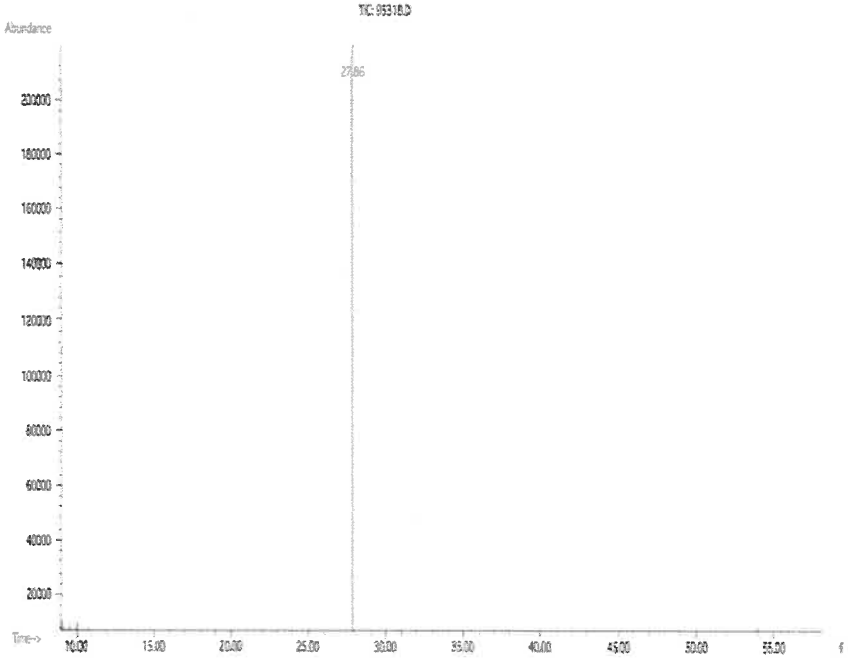
5E-05 Balance Uncertainty
Weight(s) shown below were combined and diluted to (mL): 50.0 0.001 Flask Uncertainty

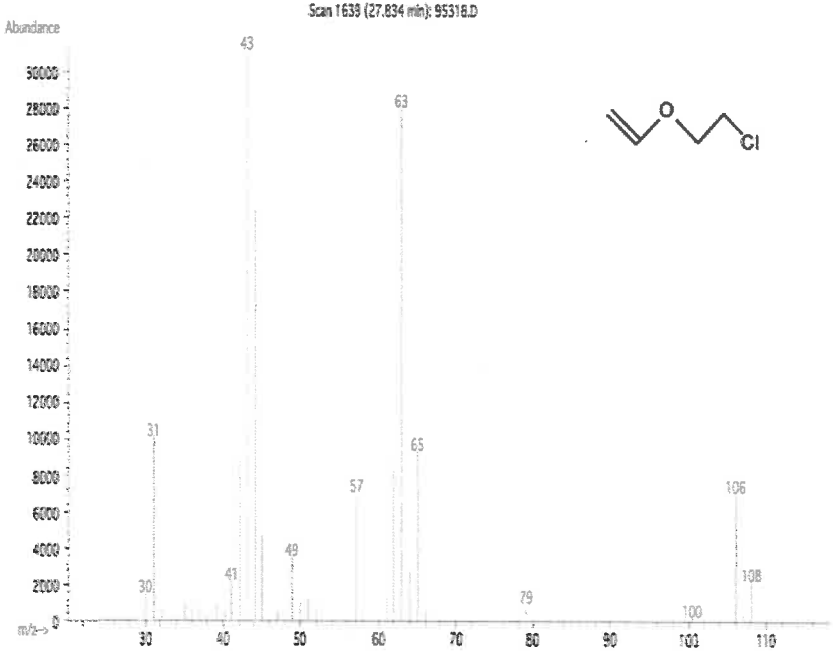
Prashant Chauhan 120524
Formulated By: Prashant Chauhan DATE

Pedro Rentas 120524
Reviewed By: Pedro L. Rentas DATE

Compound	RM#	Lot Number	Nominal Conc (µg/mL)	Purity (%)	Uncertainty Purity	Target Weight (g)	Actual Weight (g)	Actual Conc(µg/mL)	Expanded Uncertainty (+/-) (µg/mL)	SDS Information (Solvent Safety Info. On Attached pg.) CAS#	OSHA PEL (TWA)	LD50
1. 2-Chloroethyl vinyl ether	74	MKCD0033	10000	99	0.2	0.50536	0.50550	10002.9	40.5	110-75-8	N/A	ori-rat 250mg/kg

Method: GC6MSD-1.M. **Detector:** MSD. **Column:** (60m X 0.25mm X 1.5 µm). **Oven Profile:** Temp 1 = 35°C (Time 1=10min.), Temp 2 = 200°C (Time 2=8.75 min.), Rate = 4°C/min., Injector B Temp.= 200°C, Detector B Temp. = 220°C. **Analyst:** Candice Warren.





- The certified value is the concentration calculated from gravimetric and volumetric measurements unless otherwise stated.
- Standards are prepared gravimetrically using balances that are calibrated with weights traceable to NIST (see above).
- Standards are certifed (+/-) 0.5% of the stated value, unless otherwise stated.
- All Standards, after opening ampule, should be stored with caps tight and under appropriate laboratory conditions.
- Uncertainty Reference: Taylor, B.N. and Kuyat, C.E., "Guidelines for Evaluating and Expressing the Uncertainty of NIST Measurement Result," NIST Technical Note 1297, U.S. Government Printing Office, Washington, DC, (1994).

Absolute Standards Inc.
PO Box 5585
Hamden, CT 06518-0585
Phone: 203-281-2917
FAX: 203-281-2922

Safety Data Sheet (SDS) GHS/OSHA Compliant

Section I Product and Company Identification

IDENTITY **ANALYTICAL STANDARD DISSOLVED IN METHANOL**

Manufacturer's Name	ABSOLUTE STANDARDS INC	Emergency Telephone USA & CANADA	**1-800-535-5053**
Address	44 Rossotto Dr. Hamden CT, 06514	Emergency Telephone International Date Prepared/Revised	**1-352-323-3500** January 1, 2024

Section II - Hazards Identification

GHS Classification in accordance with 29 CFR 1910 (OSHA HCS)

H225	**Highly Flammable Liquid and Vapor**	**H301, 311, 331**	**Toxic if swallowed, skin contact, inhaled**
H370	**Cause damage to organs**	**H351**	**Suspected of causing cancer**
P271	**Use in ventilated area**	**P280**	**Use gloves, eye protection/face sheild**
P302,332	**If on skin, wash with soap and water**	**P305,351,338**	**If in eyes, remove contacts, rinse with water**

Signal Word: DANGER

Section III - Composition

Components (Specific Chemical Identity; Common Name(s))			% (optional)
Methanol	METHYL ALCOHOL	CAS#: 67-56-1	> 97

See Certified Weight Report For Other Analytes Present At Trace Quantities.

INTENDED USE: REFERENCE MATERIAL

Section IV. FIRST AID MEASURES

General advice	Consult a physician. Show this safety data sheet to the doctor in attendance.Move to safe area.
If inhaled	If inhaled, move person into fresh air. If not breathing, give artificial respiration. Consult a physician.
In case of skin contact	Wash with soap and water. Consult a physician.
In case of eye contact	Rinse thoroughly with plenty of water for at least 15 minutes and consult a physician.
If swallowed	Do NOT induce vomiting. Rinse mouth with water. Consult a physician.

Section V. FIREFIGHTING MEASURES

Flammability	Flammable in the presence of a source of ignition when the temperature is above the flash point. Keep away from heat/sparks/open flame/hot surface. No smoking.
Suitable extinguishing media	Use water spray, alcohol-resistant foam, dry chemical or carbon dioxide.
Protective equipment for fire	Wear self contained breathing apparatus for fire fighting if necessary.

Section VI. ACCIDENTAL RELEASE MEASURES

Personal precautions	Wear respiratory protection. Avoid breathing vapors, mist or gas. Ensure adequate ventilation. Remove all sources of ignition. Vapours accumulate to form explosive concentrations.
Environmental precautions	Prevent further leakage or spillage if safe to do so. Do not let product enter drains.
Clean up	Contain spillage, and then collect and place in container for disposal according to local regulations (see section 13).

Section VII. HANDLING AND STORAGE

Precautions for safe handling	Avoid contact with skin and eyes. Avoid inhalation of vapour or mist. Use ventilation Keep away from sources of ignition. No smoking. Prevent the build up of electrostatic charge.
Storage Conditions	Keep container tightly closed in a dry and well-ventilated place. Containers which are opened must be carefully resealed and kept upright to prevent leakage.

Section VIII. EXPOSURE CONTROLS/PERSONAL PROTECTION

Methanol 67-56-1 TWA 200 ppm
Skin notation TWA 200 ppm
Potential for skin absorption , ingestion and inhalation.
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Boiling Point	65°C	Specific Gravity (H2O = 1)	0.79
Vapor Pressure (mm Hg)	96	Melting Point	-98°C
Vapor Density (AIR = 1)	1.11	Evaporation rate (Butyl Acetate = 1)	4.6

Solubility in Water COMPLETE

Appearance and Odor CLEAR, COLORLESS LIQUID WITH CHARACTERISTIC PUNGENT ODOR.

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UN number: 1230 Class: 3 Packing group: II
Proper shipping name: Methanol

IATA
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Proper shipping name: Methanol

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RESTEK
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

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. : 30067 **Lot No.:** A0191805

Description : 4-Bromofluorobenzene Standard

4-Bromofluorobenzene Standard 2,500µg/mL, P&T Methanol, 1mL/ampul

Container Size : 2 mL **Pkg Amt:** > 1 mL

Expiration Date : November 30, 2027 **Storage:** 0°C or colder

Ship: Ambient

CERTIFIED VALUES

Elution Order	Compound	CAS #	Lot #	Purity	Grav. Conc. (weight/volume)	Expanded Uncertainty * (95% C.L.; K=2)
1	1-Bromo-4-fluorobenzene (BFB)	460-00-4	184975	99%	2,483.9 µg/mL	+/- 139.5488

* Expanded Uncertainty displayed in same units as Grav. Conc.

Solvent: P&T Methanol
CAS # 67-56-1
Purity 99%

Quality Confirmation Test

Column:
105m x 0.53mm x 3.0µm
Rtx-502.2 (cat.#10910)

Carrier Gas:
hydrogen-constant pressure 11.0 psi.

Temp. Program:
40°C (hold 2 min.) to 240°C
@ 8°C/min. (hold 5 min.)

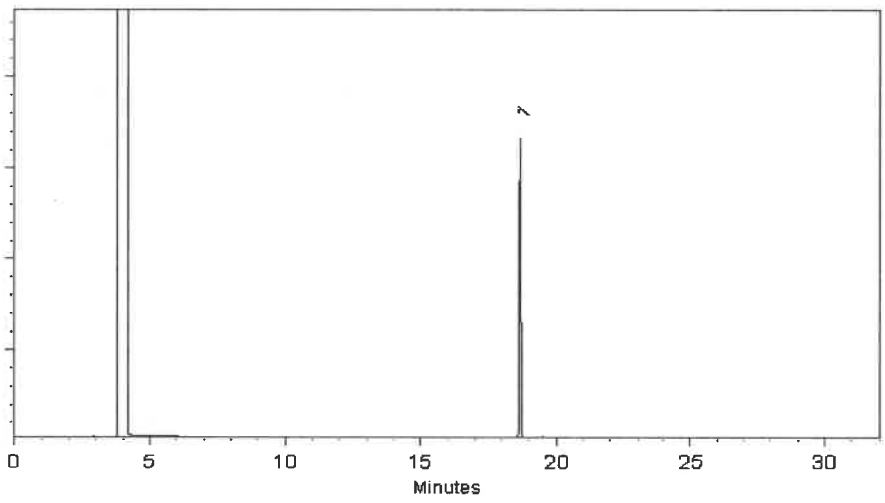
Inj. Temp:
200°C

Det. Temp:
250°C

Det. Type:
FID

Split Vent:
40 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.

Alicia Leathers - Operation Technician I

Date Mixed: 17-Nov-2022 **Balance Serial #** B251644995

Jennifer Pollino - Operations Tech III - ARM QC

Date Passed: 21-Nov-2022

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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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. : 30006 **Lot No.:** A0200785

Description : VOA Calibration Mix #1

VOA Calibration Mix #1 5,000µg/mL, P&T Methanol/Water(90:10), 1mL/ampul

Container Size : 2 mL **Pkg Amt:** > 1 mL

Expiration Date : November 30, 2026 **Storage:** 0°C or colder

Ship: Ambient

CERTIFIED VALUES

Elution Order	Compound	CAS #	Lot #	Purity	Grav. Conc. (weight/volume)	Expanded Uncertainty * (95% C.L.; K=2)
1	Acetone	67-64-1	SHBP8774	99%	5,018.5 µg/mL	+/- 173.4162
2	2-Butanone (MEK)	78-93-3	SHBL5543	99%	5,016.0 µg/mL	+/- 173.3298
3	4-Methyl-2-pentanone (MIBK)	108-10-1	SHBP4724	99%	5,010.7 µg/mL	+/- 173.1455
4	2-Hexanone	591-78-6	MKCQ6663	99%	5,015.0 µg/mL	+/- 173.2952

* Expanded Uncertainty displayed in same units as Grav. Conc.

Solvent: P&T Methanol/Water (90:10)
CAS # 67-56-1/7732-18-5
Purity 99%

Quality Confirmation Test

Column:
105m x 0.53mm x 3.0µm
Rtx-502.2 (cat.#10910)

Carrier Gas:
hydrogen-constant pressure 11.0 psi.

Temp. Program:
40°C (hold 2 min.) to 240°C
@ 8°C/min. (hold 5 min.)

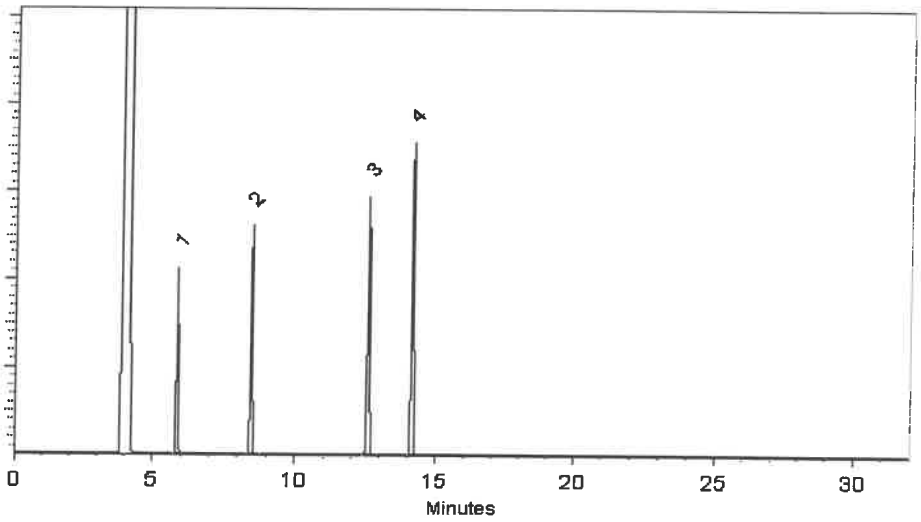
Inj. Temp:
200°C

Det. Temp:
250°C

Det. Type:
FID

Split Vent:
40 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.

Laith Clemente - Operations Technician I **Date Mixed:** 09-Aug-2023 **Balance Serial #** B707717271

Marlina Cowan – Operations Tech II ARM QC **Date Passed:** 16-Aug-2023

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

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ISO 17034 Accredited
Reference Material Producer
Certificate #3222.01

ACCREDITED
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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.

Catalog No. : 30006 **Lot No.:** A0200785

Description : VOA Calibration Mix #1

VOA Calibration Mix #1 5,000µg/mL, P&T Methanol/Water(90:10), 1mL/ampul

Container Size : 2 mL **Pkg Amt:** > 1 mL

Expiration Date : November 30, 2026 **Storage:** 0°C or colder

Ship: Ambient

CERTIFIED VALUES

Elution Order	Compound	CAS #	Lot #	Purity	Grav. Conc. (weight/volume)	Expanded Uncertainty * (95% C.L.; K=2)
1	Acetone	67-64-1	SHBP8774	99%	5,018.5 µg/mL	+/- 173.4162
2	2-Butanone (MEK)	78-93-3	SHBL5543	99%	5,016.0 µg/mL	+/- 173.3298
3	4-Methyl-2-pentanone (MIBK)	108-10-1	SHBP4724	99%	5,010.7 µg/mL	+/- 173.1455
4	2-Hexanone	591-78-6	MKCQ6663	99%	5,015.0 µg/mL	+/- 173.2952

* Expanded Uncertainty displayed in same units as Grav. Conc.

Solvent: P&T Methanol/Water (90:10)
CAS # 67-56-1/7732-18-5
Purity 99%

Quality Confirmation Test

Column:
105m x 0.53mm x 3.0µm
Rtx-502.2 (cat.#10910)

Carrier Gas:
hydrogen-constant pressure 11.0 psi.

Temp. Program:
40°C (hold 2 min.) to 240°C
@ 8°C/min. (hold 5 min.)

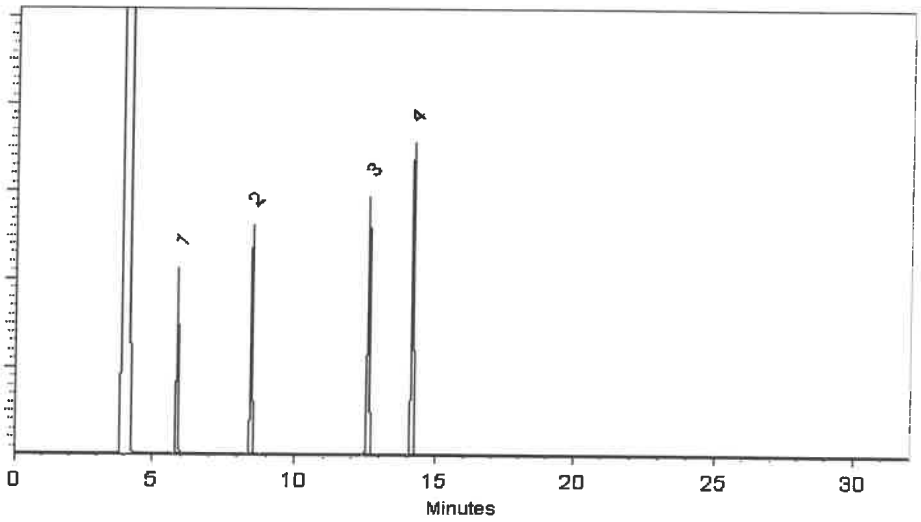
Inj. Temp:
200°C

Det. Temp:
250°C

Det. Type:
FID

Split Vent:
40 ml/min

Inj. Vol
1µl



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Laith Clemente - Operations Technician I

Date Mixed: 09-Aug-2023 **Balance Serial #** B707717271

Marlina Cowan – Operations Tech II ARM QC

Date Passed: 16-Aug-2023

Manufactured under Restek's ISO 9001:2015 Registered Quality System Certificate #FM 80397

General Certified Reference Material Notes

Expiration Notes:

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- 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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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. : 30006 **Lot No.:** A0200785

Description : VOA Calibration Mix #1

VOA Calibration Mix #1 5,000µg/mL, P&T Methanol/Water(90:10), 1mL/ampul

Container Size : 2 mL **Pkg Amt:** > 1 mL

Expiration Date : November 30, 2026 **Storage:** 0°C or colder

Ship: Ambient

CERTIFIED VALUES

Elution Order	Compound	CAS #	Lot #	Purity	Grav. Conc. (weight/volume)	Expanded Uncertainty * (95% C.L.; K=2)
1	Acetone	67-64-1	SHBP8774	99%	5,018.5 µg/mL	+/- 173.4162
2	2-Butanone (MEK)	78-93-3	SHBL5543	99%	5,016.0 µg/mL	+/- 173.3298
3	4-Methyl-2-pentanone (MIBK)	108-10-1	SHBP4724	99%	5,010.7 µg/mL	+/- 173.1455
4	2-Hexanone	591-78-6	MKCQ6663	99%	5,015.0 µg/mL	+/- 173.2952

* Expanded Uncertainty displayed in same units as Grav. Conc.

Solvent: P&T Methanol/Water (90:10)
CAS # 67-56-1/7732-18-5
Purity 99%

Quality Confirmation Test

Column:
105m x 0.53mm x 3.0µm
Rtx-502.2 (cat.#10910)

Carrier Gas:
hydrogen-constant pressure 11.0 psi.

Temp. Program:
40°C (hold 2 min.) to 240°C
@ 8°C/min. (hold 5 min.)

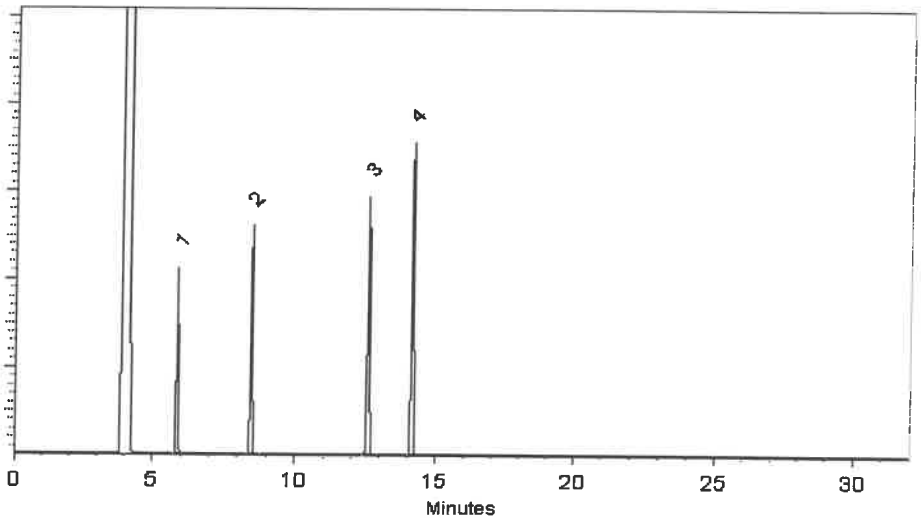
Inj. Temp:
200°C

Det. Temp:
250°C

Det. Type:
FID

Split Vent:
40 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.

Laith Clemente - Operations Technician I **Date Mixed:** 09-Aug-2023 **Balance Serial #** B707717271

Marlina Cowan – Operations Tech II ARM QC **Date Passed:** 16-Aug-2023

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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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. : 555581 **Lot No.:** A0210184

Description : Custom 8260 Internal Standard Mix

Custom 8260 Internal Standard Mix 25,000µg/mL, P&T Methanol, 1mL/ampul

Container Size : 2 mL **Pkg Amt:** > 1 mL

Expiration Date : April 30, 2027 **Storage:** 10°C or colder

Ship: Ambient

CERTIFIED VALUES

Component #	Compound	CAS #	Lot #	Purity	Grav. Conc. (weight/volume)	Expanded Uncertainty * (95% C.L.; K=2)
1	1,4-Dichlorobenzene-d4	3855-82-1	PR-30447	99%	25,212.0 µg/mL	+/- 1,427.8857
2	1,4-Difluorobenzene	540-36-3	MKCS8657	99%	25,220.0 µg/mL	+/- 1,428.3388
3	Chlorobenzene-d5	3114-55-4	PR-31132	99%	25,116.0 µg/mL	+/- 1,422.4487
4	Pentafluorobenzene	363-72-4	MKCR9383	99%	25,180.0 µg/mL	+/- 1,426.0734

Solvent: P&T Methanol
CAS # 67-56-1
Purity 99%

John Friedline - Operations Technician I

Date Mixed: 11-Apr-2024 **Balance:** 1127510105

REVIEWED

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:

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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:

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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.

Catalog No. : 30225 **Lot No.:** A0214960

Description : Bromochloromethane Standard

Bromochloromethane 2000µg/mL, P&T Methanol, 1mL/ampul

Container Size : 2 mL **Pkg Amt:** > 1 mL

Expiration Date : August 31, 2029 **Storage:** 0°C or colder

Ship: Ambient

CERTIFIED VALUES

Elution Order	Compound	CAS #	Lot #	Purity	Grav. Conc. (weight/volume)	Expanded Uncertainty * (95% C.L.; K=2)
1	Bromochloromethane	74-97-5	SYN240416CTH	99%	2,012.0 µg/mL	+/- 113.0519

* Expanded Uncertainty displayed in same units as Grav. Conc.

Solvent: P&T Methanol
CAS # 67-56-1
Purity 99%

Quality Confirmation Test

Column:
105m x 0.53mm x 3.0µm
Rtx-502.2 (cat.#10910)

Carrier Gas:
hydrogen-constant pressure 11.0 psi.

Temp. Program:
40°C (hold 2 min.) to 240°C
@ 8°C/min. (hold 5 min.)

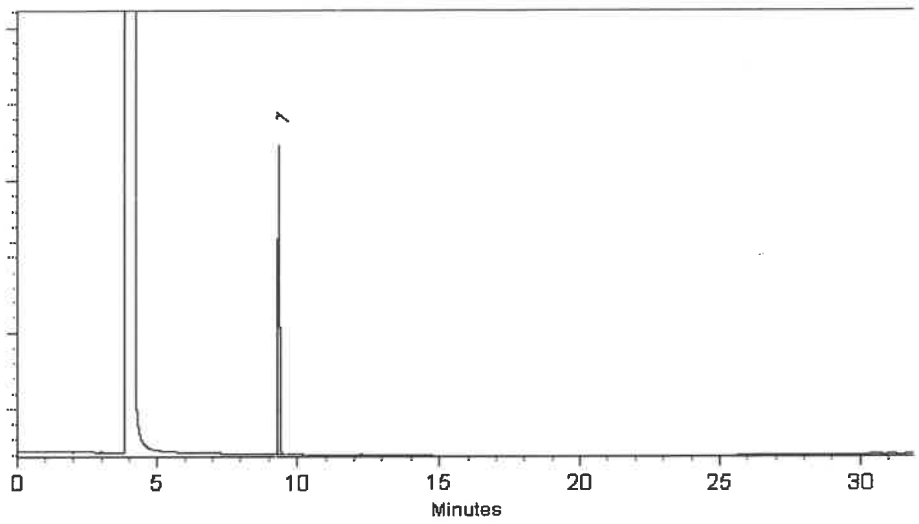
Inj. Temp:
200°C

Det. Temp:
250°C

Det. Type:
FID

Split Vent:
40 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.

Stacey Wanner - Operations Technician I

Date Mixed: 08-Aug-2024 **Balance Serial #** 1127510105

Jennifer Pollino - Operations Tech III - ARM QC

Date Passed: 14-Aug-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:

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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. : 30042 **Lot No.:** A0216826

Description : 502.2 Calibration Mix #1

502.2 Calibration Mix #1 2,000µg/mL, P&T Methanol, 1mL/ampul

Container Size : 2 mL **Pkg Amt:** > 1 mL

Expiration Date : May 31, 2031 **Storage:** 0°C or colder

Ship: Ambient

CERTIFIED VALUES

Elution Order	Compound	CAS #	Lot #	Purity	Grav. Conc. (weight/volume)	Expanded Uncertainty * (95% C.L.; K=2)
1	Dichlorodifluoromethane (CFC-12)	75-71-8	00022922	99%	2,000.9 µg/mL	+/- 112.4144
2	Chloromethane (methyl chloride)	74-87-3	00022694	99%	2,000.7 µg/mL	+/- 112.3998
3	Vinyl chloride	75-01-4	00015559	99%	2,000.3 µg/mL	+/- 112.3779
4	Bromomethane (methyl bromide)	74-83-9	00017022	99%	2,001.8 µg/mL	+/- 112.4650
5	Chloroethane (ethyl chloride)	75-00-3	107-401039114-1	99%	2,000.1 µg/mL	+/- 112.3700
6	Trichlorofluoromethane (CFC-11)	75-69-4	MKCJ8658	99%	2,000.7 µg/mL	+/- 112.3992

* Expanded Uncertainty displayed in same units as Grav. Conc.

Solvent: P&T Methanol
CAS # 67-56-1
Purity 99%

Quality Confirmation Test

Column:
60m x 0.25mm x 1.4µm
Rtx-502.2 (cat.#10916)

Carrier Gas:
helium-constant flow 2.0 mL/min.

Temp. Program:
40°C (hold 6 min.) to 100°C
@ 6°C/min.

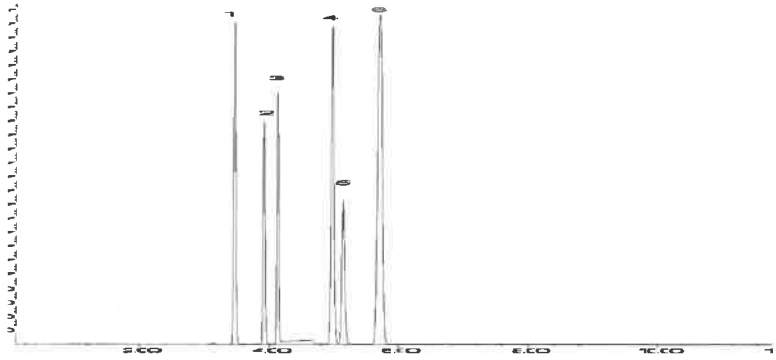
Inj. Temp:
200°C

Det. Temp:
250°C

Det. Type:
MSD

Split Vent:
Split ratio 10:1

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.

Tom Suckar - Mix Technician

Date Mixed: 23-Sep-2024 **Balance Serial #** B707717271

Jennifer Pollino - Operations Tech III - ARM QC

Date Passed: 04-Oct-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.
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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:

- 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:

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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:

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Handling Notes:

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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.

Catalog No. : 30042 **Lot No.:** A0216826

Description : 502.2 Calibration Mix #1

502.2 Calibration Mix #1 2,000µg/mL, P&T Methanol, 1mL/ampul

Container Size : 2 mL **Pkg Amt:** > 1 mL

Expiration Date : May 31, 2031 **Storage:** 0°C or colder

Ship: Ambient

CERTIFIED VALUES

Elution Order	Compound	CAS #	Lot #	Purity	Grav. Conc. (weight/volume)	Expanded Uncertainty * (95% C.L.; K=2)
1	Dichlorodifluoromethane (CFC-12)	75-71-8	00022922	99%	2,000.9 µg/mL	+/- 112.4144
2	Chloromethane (methyl chloride)	74-87-3	00022694	99%	2,000.7 µg/mL	+/- 112.3998
3	Vinyl chloride	75-01-4	00015559	99%	2,000.3 µg/mL	+/- 112.3779
4	Bromomethane (methyl bromide)	74-83-9	00017022	99%	2,001.8 µg/mL	+/- 112.4650
5	Chloroethane (ethyl chloride)	75-00-3	107-401039114-1	99%	2,000.1 µg/mL	+/- 112.3700
6	Trichlorofluoromethane (CFC-11)	75-69-4	MKCJ8658	99%	2,000.7 µg/mL	+/- 112.3992

* Expanded Uncertainty displayed in same units as Grav. Conc.

Solvent: P&T Methanol
CAS # 67-56-1
Purity 99%

Quality Confirmation Test

Column:
60m x 0.25mm x 1.4µm
Rtx-502.2 (cat.#10916)

Carrier Gas:
helium-constant flow 2.0 mL/min.

Temp. Program:
40°C (hold 6 min.) to 100°C
@ 6°C/min.

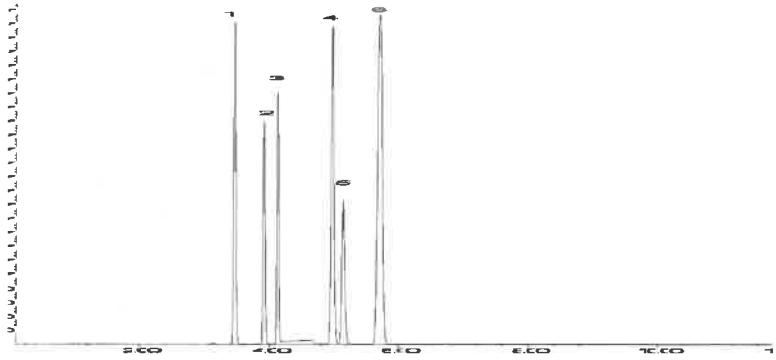
Inj. Temp:
200°C

Det. Temp:
250°C

Det. Type:
MSD

Split Vent:
Split ratio 10:1

Inj. Vol
1µl



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Tom Suckar - Mix Technician

Date Mixed: 23-Sep-2024 **Balance Serial #** B707717271

Jennifer Pollino - Operations Tech III - ARM QC

Date Passed: 04-Oct-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.
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- Purity values are rounded to the nearest whole number.

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- 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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Certificate of Analysis

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J14842 to 14846

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. : 30470 **Lot No.:** A0217535

Description : tert-Butanol Standard

tert-Butanol Std 50,000µg/mL, P&T Methanol, 1mL/ampul

Container Size : 2 mL **Pkg Amt:** > 1 mL

Expiration Date : October 31, 2027 **Storage:** 0°C or colder

Ship: Ambient

CERTIFIED VALUES

Elution Order	Compound	CAS #	Lot #	Purity	Grav. Conc. (weight/volume)	Expanded Uncertainty * (95% C.L.; K=2)
1	tert-Butanol (TBA)	75-65-0	SHBQ8002-1	99%	50,007.5 µg/mL	+/- 717.6137

* Expanded Uncertainty displayed in same units as Grav. Conc.

Solvent: P&T Methanol
CAS # 67-56-1
Purity 99%

Quality Confirmation Test

Column:
105m x 0.53mm x 3.0µm
Rtx-502.2 (cat.#10910)

Carrier Gas:
hydrogen-constant pressure 11.0 psi.

Temp. Program:
40°C (hold 2 min.) to 240°C
@ 8°C/min. (hold 5 min.)

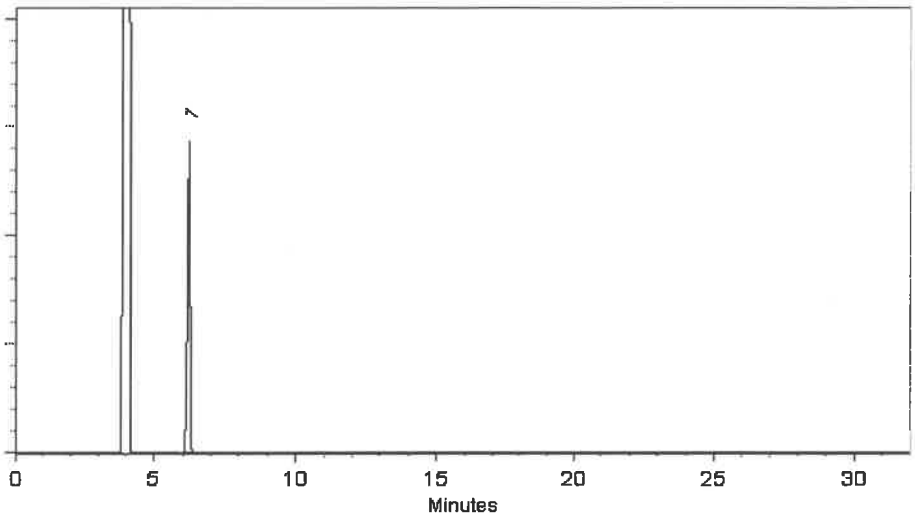
Inj. Temp:
200°C

Det. Temp:
250°C

Det. Type:
FID

Split Vent:
40 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.

Aaron Enyart - Operations Tech I

Date Mixed: 07-Oct-2024 **Balance Serial #** B251644995

Brittany Federinko - Operations Tech I

Date Passed: 09-Oct-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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Zoviy Rec 01/08/21

CERTIFIED REFERENCE MATERIAL

ACCREDITED
ISO 17034 Accredited
Reference Material Producer
Certificate #3222.01

ACCREDITED
ISO/IEC 17025 Accredited
Testing Laboratory
Certificate #3222.02

Certificate of Analysis

chromatographic

VI4803 - VI4822

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. : 555408-SL **Lot No.:** A0220471

Description : Custom Vinyl Acetate Standard

Custom Vinyl Acetate Standard 8,000µg/mL, P&T Methanol, 1mL/ampul

Container Size : 2 mL **Pkg Amt:** > 1 mL

Expiration Date : June 30, 2026 **Storage:** -20°C or colder

Handling: This product is photosensitive. **Ship:** On Ice

CERTIFIED VALUES

Elution Order	Compound	CAS #	Lot #	Purity	Grav. Conc. (weight/volume)	Expanded Uncertainty * (95% C.L.; K=2)
1	Vinyl acetate	108-05-4	RD240423RSR	99%	8,066.0 µg/mL	+/- 278.7979

* Expanded Uncertainty displayed in same units as Grav. Conc.

Solvent: P&T Methanol
CAS # 67-56-1
Purity 99%

Tech Tips:

Vinyl acetate is a volatile organic ester included in the target lists of several US EPA and other methods . Under acidic conditions, esters react with alcohols to form new esters (transesterification). Methanol-based mixes containing halogenated compounds are slightly acidic, so it is important to minimize exposure of vinyl acetate to mixes of halogenated compounds in methanol. For this reason, we offer vinyl acetate in individual solution, and suggest that it be introduced into the working level calibration solution immediately before use. This will minimize problems and ensure more consistent results.

Quality Confirmation Test

Column:
105m x 0.53mm x 3.0µm
Rtx-502.2 (cat.#10910)

Carrier Gas:
hydrogen-constant pressure 11.0 psi.

Temp. Program:
40°C (hold 2 min.) to 240°C
@ 8°C/min. (hold 5 min.)

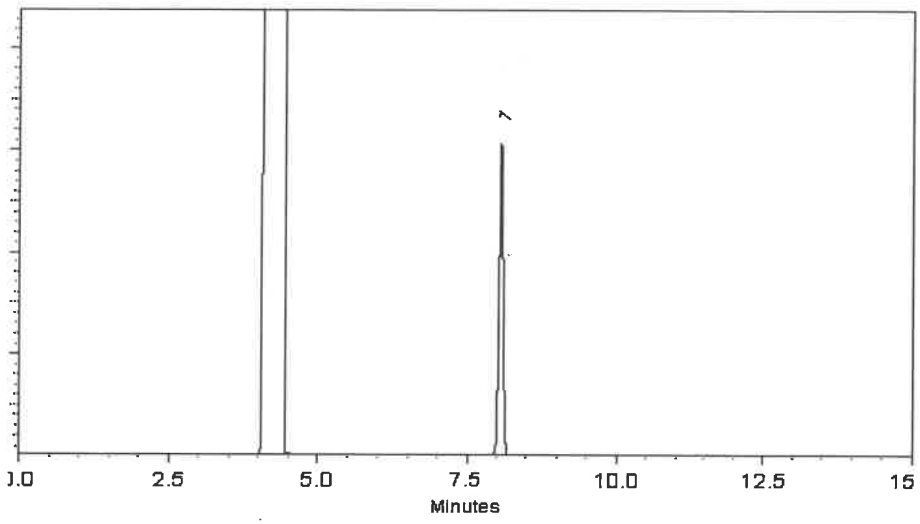
Inj. Temp:
200°C

Det. Temp:
250°C

Det. Type:
FID

Split Vent:
40 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.

Ethan Winiarski - Operations Tech I

Date Mixed: 24-Dec-2024 **Balance Serial #** 1127510105

Dillan Murphy - Operations Technician I

Date Passed: 02-Jan-2025

REVIEWED

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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Verify Rec 01/08/21

CERTIFIED REFERENCE MATERIAL

Certificate of Analysis

chromatographic

V14803 - V14822

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. : 555408-SL **Lot No.:** A0220471

Description : Custom Vinyl Acetate Standard

Custom Vinyl Acetate Standard 8,000µg/mL, P&T Methanol, 1mL/ampul

Container Size : 2 mL **Pkg Amt:** > 1 mL

Expiration Date : June 30, 2026 **Storage:** -20°C or colder

Handling: This product is photosensitive. **Ship:** On Ice

CERTIFIED VALUES

Elution Order	Compound	CAS #	Lot #	Purity	Grav. Conc. (weight/volume)	Expanded Uncertainty * (95% C.L.; K=2)
1	Vinyl acetate	108-05-4	RD240423RSR	99%	8,066.0 µg/mL	+/- 278.7979

* Expanded Uncertainty displayed in same units as Grav. Conc.

Solvent: P&T Methanol
CAS # 67-56-1
Purity 99%

Tech Tips:

Vinyl acetate is a volatile organic ester included in the target lists of several US EPA and other methods . Under acidic conditions, esters react with alcohols to form new esters (transesterification). Methanol-based mixes containing halogenated compounds are slightly acidic, so it is important to minimize exposure of vinyl acetate to mixes of halogenated compounds in methanol. For this reason, we offer vinyl acetate in individual solution, and suggest that it be introduced into the working level calibration solution immediately before use. This will minimize problems and ensure more consistent results.

Quality Confirmation Test

Column:
105m x 0.53mm x 3.0µm
Rtx-502.2 (cat.#10910)

Carrier Gas:
hydrogen-constant pressure 11.0 psi.

Temp. Program:
40°C (hold 2 min.) to 240°C
@ 8°C/min. (hold 5 min.)

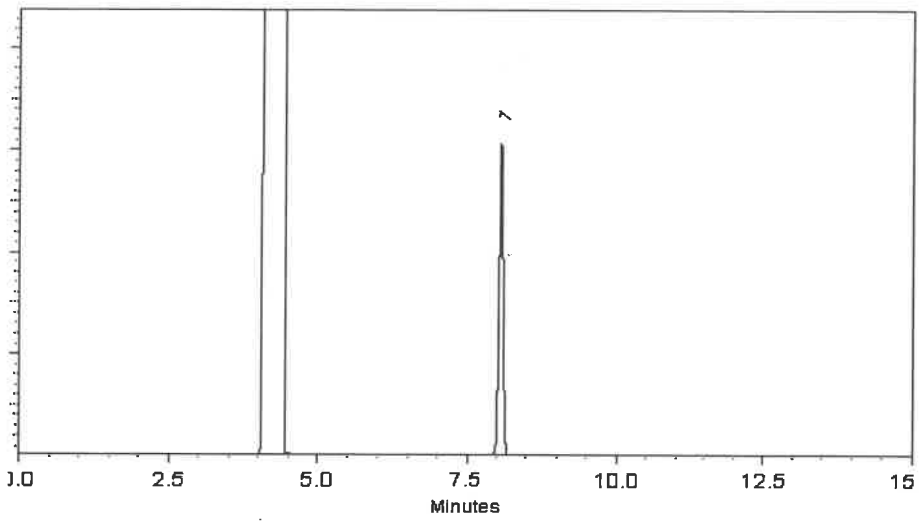
Inj. Temp:
200°C

Det. Temp:
250°C

Det. Type:
FID

Split Vent:
40 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.

Ethan Winiarski - Operations Tech I

Date Mixed: 24-Dec-2024 **Balance Serial #** 1127510105

Dillan Murphy - Operations Technician I

Date Passed: 02-Jan-2025

REVIEWED

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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10 vial

CERTIFIED REFERENCE MATERIAL

Rec 03/31/25

Certificate of Analysis

gravimetric

V14904 to V14913

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. : 555582 **Lot No.:** A0223904

Description : Custom 8260A/B Surrogate Mix

Custom 8260A/B Surrogate Mix 25,000µg/mL, P&T Methanol, 1mL/ampul

Container Size : 2 mL **Pkg Amt:** > 1 mL

Expiration Date : March 31, 2028 **Storage:** 10°C or colder

Ship: Ambient

CERTIFIED VALUES

Component #	Compound	CAS #	Lot #	Purity	Grav. Conc. (weight/volume)	Expanded Uncertainty * (95% C.L.; K=2)
1	1,2-Dichloroethane-d4	17060-07-0	PR-33313	99%	25,108.0 µg/mL	+/- 1,421.9957
2	1-Bromo-4-fluorobenzene (BFB)	460-00-4	0000268853	99%	25,108.0 µg/mL	+/- 1,421.9957
3	Dibromofluoromethane	1868-53-7	VENKAT02	99%	25,232.0 µg/mL	+/- 1,429.0184
4	Toluene-d8	2037-26-5	PR-34141	99%	25,156.0 µg/mL	+/- 1,424.7141

Solvent: P&T Methanol
CAS # 67-56-1
Purity 99%

Brittany Federinko - Operations Tech I

Date Mixed: 27-Mar-2025 **Balance:** B251644995

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.

Methanol
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For Purge and Trap Analysis

Rec 05/09/25

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V14921 to
V14938

Material No.: 9077-02
Batch No.: 24G0262002
Manufactured Date: 2024-05-14
Expiration Date: 2027-05-14
Revision No.: 0

Certificate of Analysis

Test	Specification	Result
Assay (CH_3OH) (by GC, corrected for water)	≥ 99.9 %	100.0 %
Residue after Evaporation	≤ 1.0 ppm	0.3 ppm
Titrable Acid (µeq/g)	≤ 0.3	0.3
Titrable Base (µeq/g)	≤ 0.10	0.03
Water (by KF, coulometric)	≤ 0.08 %	< 0.01 %
Volatile Organic Trace Analysis – Below EPA 8260B CRQL	Conforms	Conforms

For Laboratory,Research,or Manufacturing Use
Performance Tested for Use in EPA Methods
500 Series for Drinking Water
600 Series for Wastewater
846 for Solid Waste

Country of Origin: USA
Packaging Site: Phillipsburg Mfg Ctr & DC

JCroak

Jamie Croak
Director Quality Operations, Bioscience Production

Methanol
ULTRA RESI-ANALYZED
For Purge and Trap Analysis

Rec 05/09/25

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V14921 to
V14938

Material No.: 9077-02
Batch No.: 24G0262002
Manufactured Date: 2024-05-14
Expiration Date: 2027-05-14
Revision No.: 0

Certificate of Analysis

Test	Specification	Result
Assay (CH_3OH) (by GC, corrected for water)	≥ 99.9 %	100.0 %
Residue after Evaporation	≤ 1.0 ppm	0.3 ppm
Titrable Acid (µeq/g)	≤ 0.3	0.3
Titrable Base (µeq/g)	≤ 0.10	0.03
Water (by KF, coulometric)	≤ 0.08 %	< 0.01 %
Volatile Organic Trace Analysis – Below EPA 8260B CRQL	Conforms	Conforms

For Laboratory,Research,or Manufacturing Use
Performance Tested for Use in EPA Methods
500 Series for Drinking Water
600 Series for Wastewater
846 for Solid Waste

Country of Origin: USA
Packaging Site: Phillipsburg Mfg Ctr & DC

JCroak

Jamie Croak
Director Quality Operations, Bioscience Production

Methanol
ULTRA RESI-ANALYZED
For Purge and Trap Analysis

Rec 05/09/25

avantor™ | J.T.Baker®

V14921 to
V14938

Material No.: 9077-02
Batch No.: 24G0262002
Manufactured Date: 2024-05-14
Expiration Date: 2027-05-14
Revision No.: 0

Certificate of Analysis

Test	Specification	Result
Assay (CH_3OH) (by GC, corrected for water)	≥ 99.9 %	100.0 %
Residue after Evaporation	≤ 1.0 ppm	0.3 ppm
Titrable Acid (µeq/g)	≤ 0.3	0.3
Titrable Base (µeq/g)	≤ 0.10	0.03
Water (by KF, coulometric)	≤ 0.08 %	< 0.01 %
Volatile Organic Trace Analysis - Below EPA 8260B CRQL	Conforms	Conforms

For Laboratory,Research,or Manufacturing Use
Performance Tested for Use in EPA Methods
500 Series for Drinking Water
600 Series for Wastewater
846 for Solid Waste

Country of Origin: USA
Packaging Site: Phillipsburg Mfg Ctr & DC

JCroak

Jamie Croak
Director Quality Operations, Bioscience Production

Lee 05/19/25

RESTEK

110 Benner Circle
Bellefonte, PA 16823-8812
Tel: 1-814-353-1300
Fax: 1-814-353-1309

www.restek.com

CERTIFIED REFERENCE MATERIAL
2 x Vial

Certificate of Analysis

chromatographic plus

VJ14951 to VJ14970

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. : 30489 **Lot No.:** A0222076

Description : 8260B Acetates Mix

8260B Acetates Mix 2,000 µg/mL, P&T Methanol, 1mL/ampul

Container Size : 2 mL **Pkg Amt:** > 1 mL

Expiration Date : August 31, 2026 **Storage:** -20°C or colder

Handling: This product is photosensitive. **Ship:** On Ice

CERTIFIED VALUES

Elution Order	Compound	CAS #	Lot #	Purity	Grav. Conc. (weight/volume)	Expanded Uncertainty * (95% C.L.; K=2)
1	Methyl acetate	79-20-9	SHBR1889	99%	2,004.0 µg/mL	+/- 69.2674
2	Vinyl acetate	108-05-4	RD240423RSR	99%	2,010.0 µg/mL	+/- 69.4748
3	Ethyl acetate	141-78-6	SHBS3323	99%	2,019.3 µg/mL	+/- 69.7974
4	Isopropyl acetate	108-21-4	BCCG7069	99%	2,008.0 µg/mL	+/- 69.4057
5	Propyl acetate	109-60-4	P8XLN	99%	2,008.0 µg/mL	+/- 69.4057
6	Butyl acetate	123-86-4	SHBR2024	99%	2,008.0 µg/mL	+/- 69.4057
7	Amyl acetate	628-63-7	BCBT7442	99%	2,006.7 µg/mL	+/- 69.3596

* Expanded Uncertainty displayed in same units as Grav. Conc.

Solvent: P&T Methanol
CAS # 67-56-1
Purity 99%

Tech Tips:

Vinyl acetate is a volatile organic ester included in the target lists of several US EPA and other methods . Under acidic conditions, esters react with alcohols to form new esters (transesterification). Methanol-based mixes containing halogenated compounds are slightly acidic, so it is important to minimize exposure of vinyl acetate to mixes of halogenated compounds in methanol. For this

Rec 05/19/25

RESTEK
110 Benner Circle
Bellefonte, PA 16823-8812
Tel: 1-814-353-1300
Fax: 1-814-353-1309

www.restek.com

CERTIFIED REFERENCE MATERIAL

2 x Vial

Certificate of Analysis

chromatographic plus

VJ14951 to VJ14970

ilac-MRA 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.

Catalog No. : 30489 **Lot No.:** A0222076

Description : 8260B Acetates Mix

8260B Acetates Mix 2,000 µg/mL, P&T Methanol, 1mL/ampul

Container Size : 2 mL **Pkg Amt:** > 1 mL

Expiration Date : August 31, 2026 **Storage:** -20°C or colder

Handling: This product is photosensitive. **Ship:** On Ice

CERTIFIED VALUES

Elution Order	Compound	CAS #	Lot #	Purity	Grav. Conc. (weight/volume)	Expanded Uncertainty * (95% C.L.; K=2)
1	Methyl acetate	79-20-9	SHBR1889	99%	2,004.0 µg/mL	+/- 69.2674
2	Vinyl acetate	108-05-4	RD240423RSR	99%	2,010.0 µg/mL	+/- 69.4748
3	Ethyl acetate	141-78-6	SHBS3323	99%	2,019.3 µg/mL	+/- 69.7974
4	Isopropyl acetate	108-21-4	BCCG7069	99%	2,008.0 µg/mL	+/- 69.4057
5	Propyl acetate	109-60-4	P8XLN	99%	2,008.0 µg/mL	+/- 69.4057
6	Butyl acetate	123-86-4	SHBR2024	99%	2,008.0 µg/mL	+/- 69.4057
7	Amyl acetate	628-63-7	BCBT7442	99%	2,006.7 µg/mL	+/- 69.3596

* Expanded Uncertainty displayed in same units as Grav. Conc.

Solvent: P&T Methanol
CAS # 67-56-1
Purity 99%

Tech Tips:

Vinyl acetate is a volatile organic ester included in the target lists of several US EPA and other methods . Under acidic conditions, esters react with alcohols to form new esters (transesterification). Methanol-based mixes containing halogenated compounds are slightly acidic, so it is important to minimize exposure of vinyl acetate to mixes of halogenated compounds in methanol. For this

Absolute Standards, Inc.
800-368-1131
www.absolutestandards.com

Certified Reference Material CRM

Rec 10/16/25 5 vials

ANAB ISO 17034 Accredited
AR-1539 Certificate Number
https://Absolutestandards.com

CERTIFIED WEIGHT REPORT

Part Number: 91980
Lot Number: 101625
Description: Acrolein

Solvent(s): Water **Lot#** 041725Q

Expiration Date: 111625
Recommended Storage: Refrigerate (2°C to 8°C)
Nominal Concentration (µg/mL): 5000
NIST Test ID#: 6UTB

V15071 – V15075

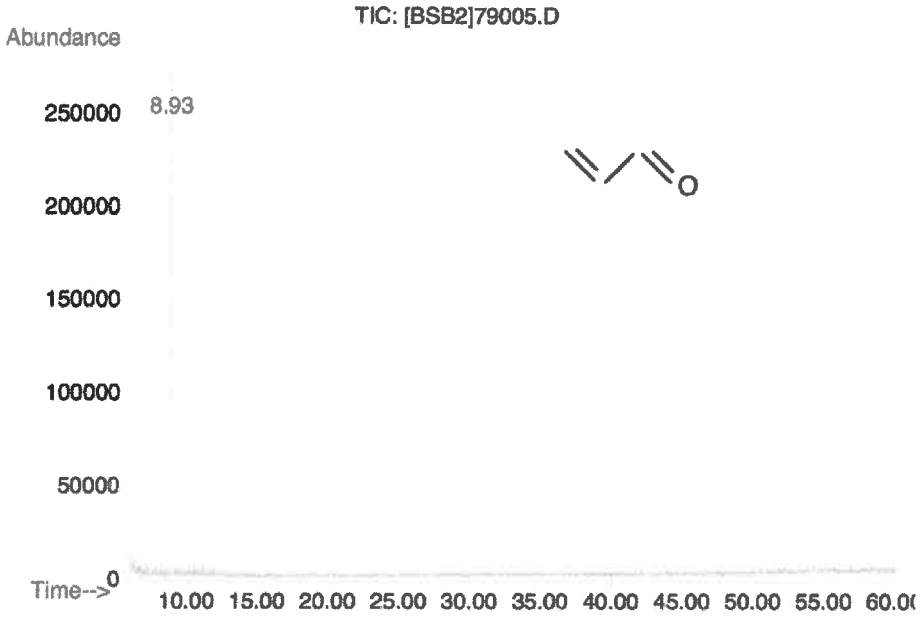
5E-05 Balance Uncertainty
0.001 Flask Uncertainty

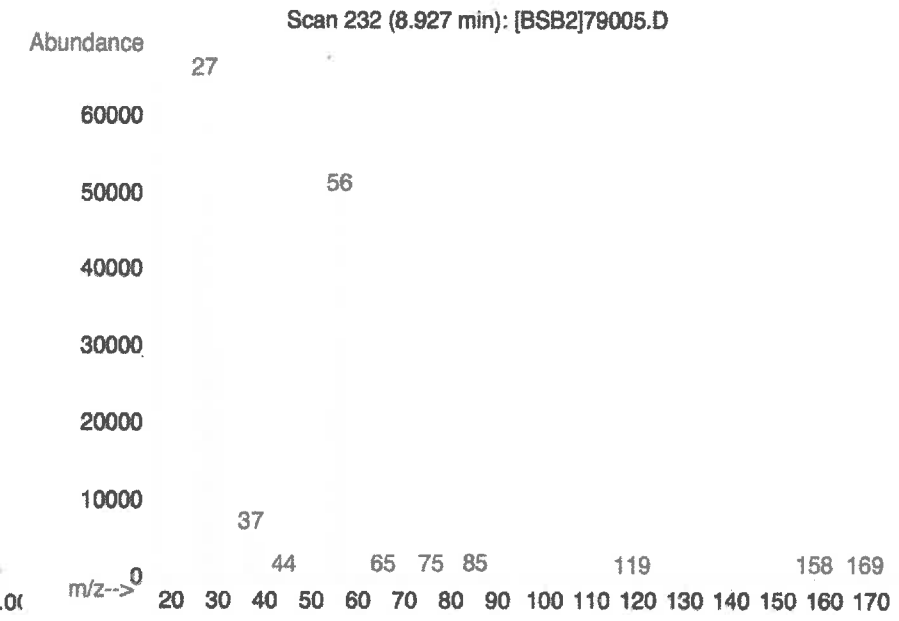
Weight(s) shown below were combined and diluted to (mL): 10.0

Prashant Chauhan	101625
Formulated By: Prashant Chauhan	DATE
Pedro L. Rentas	101625
Reviewed By: Pedro L. Rentas	DATE

Compound	RM#	Lot Number	Nominal Conc (µg/mL)	Purity (%)	Uncertainty Purity	Target Weight(g)	Actual Weight(g)	Actual Conc (µg/mL)	Expanded Uncertainty (+/-) (µg/mL)	SDS Information (Solvent Safety Info. On Attached pg.) CAS#	OSHA PEL (TWA)	LD50
1. Acrolein	5	103755V10F	5000	97	0.5	0.05166	0.05180	5013.7	52.6	107-02-8	0.1 ppm	orl-rat 46mg/kg

Method: GC6MSD-1. **Detector:** Mass Selective Detector (Scan mode). **Column:** Vocol (60m X 0.25mm ID X 1.5µm film thickness). **Oven Profile:** Temp. 1 = 35°C (Time 1 = 10min.), Temp. 2=200°C (Time 2 = 8.75 min.) Rate = 4°C/min., Injector Temp. = 200°C, Detector Temp. = 220°C. **Analyst:** Pedro Rentas. **NOTE:** Due to the instability of acrolein in solution, all solutions of acrolein, and any dilutions thereof, should be used immediately Long term storage is not recommended. Please contact our technical department if further information is required.





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- Standards are prepared gravimetrically using balances that are calibrated by an ISO 17025 certified organization with weights traceable through NIST to the SI kilogram (see above).
- Standards are certified (+/-) 0.5% of the stated value, unless otherwise stated.
- All Standards, after opening ampule, should be stored with caps tight and under appropriate laboratory conditions.
- Uncertainty Reference: Taylor, B.N. and Kuyat, C.E., "Guidelines for Evaluating and Expressing the Uncertainty of NIST Measurement Result," NIST Technical Note 1297, U.S. Goverament Printing Office, Washington, DC, (1994).
  Rev 1.0, 2/25/2025

Absolute Standards, Inc.
800-368-1131
www.absolutestandards.com

Certified Reference Material CRM

Rec 10/16/25 5 vials

ANAB ISO 17034 Accredited
AR-1539 Certificate Number
https://Absolutestandards.com

CERTIFIED WEIGHT REPORT

Part Number: 91980
Lot Number: 101625
Description: Acrolein

Solvent(s): Water **Lot#** 041725Q

Expiration Date: 111625
Recommended Storage: Refrigerate (2°C to 8°C)
Nominal Concentration (µg/mL): 5000
NIST Test ID#: 6UTB

V15071 – V15075

5E-05 Balance Uncertainty
0.001 Flask Uncertainty

Weight(s) shown below were combined and diluted to (mL): 10.0

Prashant Chauhan	101625
Formulated By: Prashant Chauhan	DATE
Pedro Rentas	101625
Reviewed By: Pedro L. Rentas	DATE

Compound	RM#	Lot Number	Nominal Conc (µg/mL)	Purity (%)	Uncertainty Purity	Target Weight(g)	Actual Weight(g)	Actual Conc (µg/mL)	Expanded Uncertainty (+/-) (µg/mL)	SDS Information (Solvent Safety Info. On Attached pg.) CAS#	OSHA PEL (TWA)	LD50
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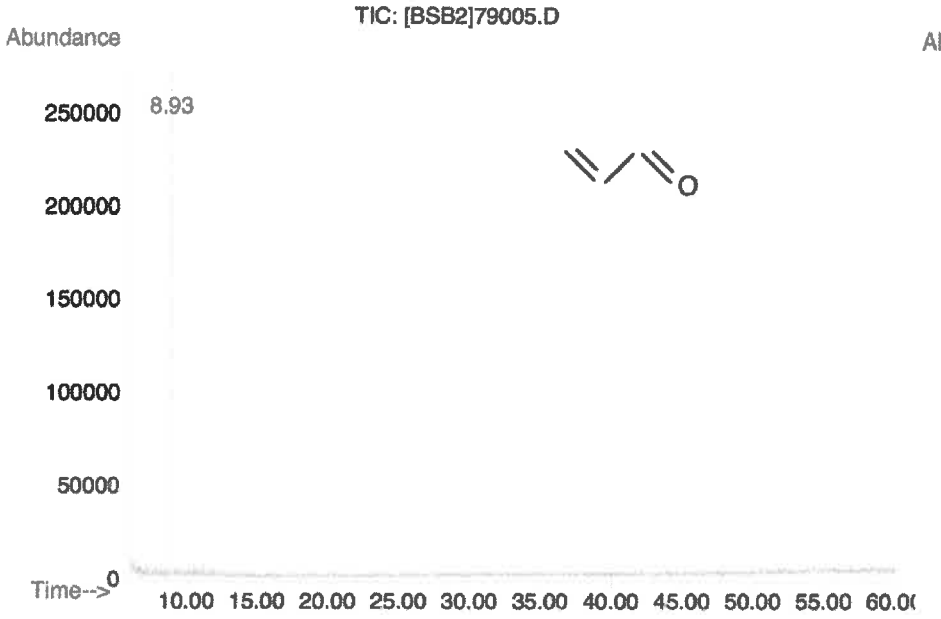
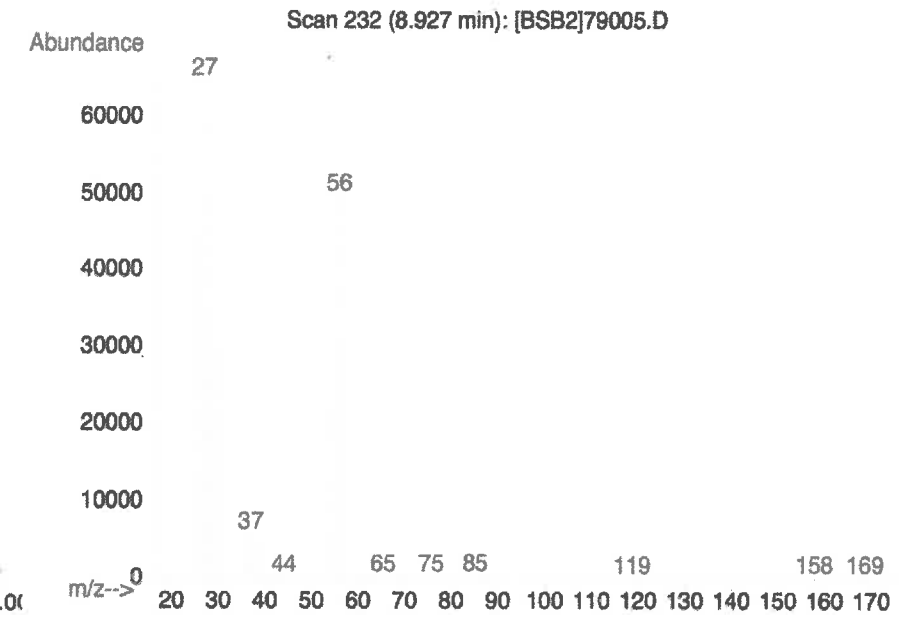
Method: GC6MSD-1. **Detector:** Mass Selective Detector (Scan mode). **Column:** Vocol (60m X 0.25mm ID X 1.5µm film thickness). **Oven Profile:** Temp. 1 = 35°C (Time 1 = 10min.), Temp. 2=200°C (Time 2 = 8.75 min.) Rate = 4°C/min., Injector Temp. = 200°C, Detector Temp. = 220°C. **Analyst:** Pedro Rentas. **NOTE:** Due to the instability of acrolein in solution, all solutions of acrolein, and any dilutions thereof, should be used immediately Long term storage is not recommended. Please contact our technical department if further information is required.





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Rev 1.0, 2/25/2025

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Certified Reference Material CRM

Rec 10/16/25 5 vials

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AR-1539 Certificate Number
https://Absolutestandards.com

CERTIFIED WEIGHT REPORT

Part Number: 91980
Lot Number: 101625
Description: Acrolein

Solvent(s): Water **Lot#** 041725Q

Expiration Date: 111625
Recommended Storage: Refrigerate (2°C to 8°C)
Nominal Concentration (µg/mL): 5000
NIST Test ID#: 6UTB

V15071 – V15075

5E-05 Balance Uncertainty
0.001 Flask Uncertainty

Weight(s) shown below were combined and diluted to (mL): 10.0

Prashant Chauhan	101625
Formulated By: Prashant Chauhan	DATE
Pedro Rentas	101625
Reviewed By: Pedro L. Rentas	DATE

Compound	RM#	Lot Number	Nominal Conc (µg/mL)	Purity (%)	Uncertainty Purity	Target Weight(g)	Actual Weight(g)	Actual Conc (µg/mL)	Expanded Uncertainty (+/-) (µg/mL)	SDS Information (Solvent Safety Info. On Attached pg.) CAS#	OSHA PEL (TWA)	LD50
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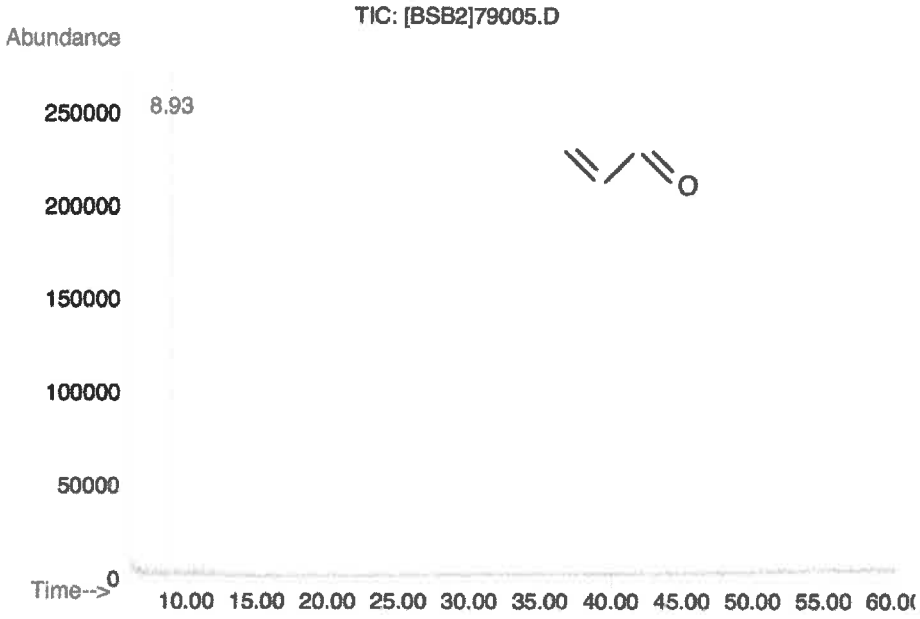

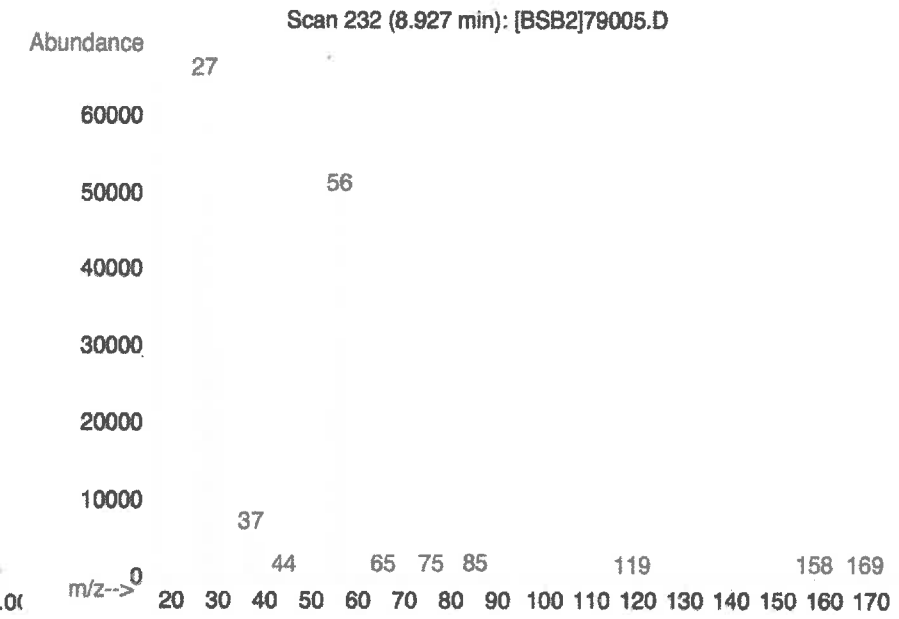

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  Rev 1.0, 2/25/2025

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

Preservation Log

BalanceID: VOA-SC-2

Review By: Amit

Supervise By: MMDadoda

Seq	LabID	Vial A Weight(g)= Total Wt-Tare Wt	Vial A Time	Vial B Weight(g)= Total Wt-Tare Wt	Vial B Time	Vial C Weight(g) Preserve with MeOH	Vial C Time	Methanol ID	Preservation Date	Comments
1	Q3424-01	37.24-33.03=4.21	14:01	36.61-32.87=3.74	14:02	33.18-27.96=5.22	14:03	V14921	10/22/2025	TERRACORE SAMPLE 8260
2	Q3424-02	38.63-32.85=5.78	14:03	37.08-32.64=4.44	14:04	32.37-28.41=3.96	14:05	V14921	10/22/2025	
3	Q3424-03	37.37-32.79=4.58	14:06	37.24-33.04=4.2	14:07	32.85-28.00=4.85	14:08	V14921	10/22/2025	

Instructions : For medium Level analysis, 5ml MeOH added for CLP(SOM/SFAM) method and 10ml for regular 8260.

If the samples are not to be analyzed within 48hrs of sampling, preserve samples immediately, Vials A and B are stored in the VOA-FRZ-2.

Vial C - MeOH preserved vials are kept in VOA-REF #6.

QA Contorl # A3041177

SHIPPING DOCUMENTS

Alliance TECHNICAL GROUP

284 Sheffield Street, Mountainside, NJ 07092
(908) 789-8900 • Fax (908) 789-8922
www.chemtech.net

ALLIANCE PROJECT NO. Q3424
QUOTE NO. Q3425
COC Number 2045126

CLIENT INFORMATION (REPORT TO BE SENT TO:)

COMPANY: AECOM
ADDRESS: 605 3rd Ave
CITY New York STATE: NY ZIP: 10158
ATTENTION: Rob Forstner
PHONE: 212-377-8721 FAX:

CLIENT PROJECT INFORMATION

PROJECT NAME: Port Richmond
PROJECT NO.: 60693795 LOCATION: Staten Isl
PROJECT MANAGER: Rob Forstner
e-mail: Robert.Forstner@aecom.com
PHONE: 212-377-8721 FAX:

CLIENT BILLING INFORMATION

BILL TO: AECOM PO#:
ADDRESS:
CITY STATE: ZIP:
ATTENTION: Rob Forstner PHONE:

DATA TURNAROUND INFORMATION

FAX (RUSH) _____ DAYS*
HARDCOPY (DATA PACKAGE): _____ DAYS*
EDD: _____ DAYS*
*TO BE APPROVED BY CHEMTECH
STANDARD HARDCOPY TURNAROUND TIME IS 10 BUSINESS

DATA DELIVERABLE INFORMATION

☐ Level 1 (Results Only) ☐ Level 4 (QC + Full Raw Data)
☐ Level 2 (Results + QC) ☐ NJ Reduced ☐ US EPA CLP
☐ Level 3 (Results + QC + Raw Data) ☐ NYS ASP A ☑ NYS ASP B
☐ Other _____
☐ EDD FORMAT _____

ANALYSIS

1 SVOCs, 2 Pesticides TCL, 3 Mercury Metals, 4 PCBs Hexchrome, 5 Dioxin, 6 Grain Size, 7 TOCs, 8 VOCs, 9

ALLIANCE SAMPLE ID	PROJECT SAMPLE IDENTIFICATION	SAMPLE MATRIX	SAMPLE TYPE COMP	SAMPLE TYPE GRAB	SAMPLE COLLECTION DATE	SAMPLE COLLECTION TIME	# OF BOTTLES	PRESERVATIVES 1	2	3	4	5	6	7	8	9	COMMENTS
1.	~~DUPE~~ PR132-DP3-20251021	S		X	10/21	9:20	11	X	X	X	X	X	X	X	X		
2.	PR132-S11-010080-20251021	S		X	10/21	9:15	11	X	X	X	X	X	X	X	X		
3.	PR132-S14-000094-20251021	S		X	10/21	9:25	11	X	X	X	X	X	X	X	X		
4.	Temp Blank	A			10/21		1	X	X	X	X	X	/		X		
5.																	
6.																	
7.																	
8.																	
9.																	
10.																	

← Specify Preservatives
A-HCl D-NaOH
B-HN03 E-ICE
C-H2SO4 F-OTHER

SAMPLE CUSTODY MUST BE DOCUMENTED BELOW EACH TIME SAMPLES CHANGE POSSESSION INCLUDING COURIER DELIVERY

RELINQUISHED BY SAMPLER:	DATE/TIME:	RECEIVED BY:
1. Jim Alderson	10/21/25 4:30	1. 1635 10-21-25
2.		2.
3.	10-21-25 1740	3.

Conditions of bottles or coolers at receipt: ☐ COMPLIANT ☐ NON COMPLIANT ☐ COOLER TEMP 2.0 °C
Comments:

Page ____ of

CLIENT: ☐ Hand Delivered ☐ Other

Shipment Complete ☐ YES ☐ NO

WHITE - ALLIANCE COPY FOR RETURN TO CLIENT YELLOW - ALLIANCE COPY PINK - SAMPLER COPY

Alliance TECHNICAL GROUP 284 Sheffield Street, Mountainside NJ 07092 (908)-789-8900 Fax : 908 789 8922

Laboratory Certification

Certified By	License No.
Connecticut	PH-0830
DOD ELAP (ANAB)	L2219
Maine	2024021
Maryland	296
New Hampshire	255425
New Jersey	20012
New York	11376
Pennsylvania	68-00548
Soil Permit	525-24-234-08441
Texas	TX-C25-00189
Virginia	460312

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

LOGIN REPORT/SAMPLE TRANSFER

Order ID : Q3424 AECO02
Client Name : AECOM
Client Contact : Rob Forstner
Invoice Name : AECOM
Invoice Contact : Rob Forstner

Order Date : 10/22/2025 11:34:00 AM
Project Name : AE1-CTY 3.2.Z-PR-DOCK
Receive DateTime : 10/21/2025 5:40:00 PM
Purchase Order :

Project Mgr :
Report Type : NYS ASP B
EDD Type : EQUIS
Hard Copy Date :
Date Signoff :

LAB ID	CLIENT ID	MATRIX	SAMPLE DATE	SAMPLE TIME	TEST	TEST GROUP	METHOD	FAX DATE	DUE DATES
Q3424-01	PR132-DP3-20251021	Solid	10/21/2025	09:20					
					VOC-TCLVOA-10		8260D		10 Bus. Days
Q3424-02	PR132-S11-010080-20251021	Solid	10/21/2025	09:15					
					VOC-TCLVOA-10		8260D		10 Bus. Days
Q3424-03	PR132-S14-~~00094~~ 000094 -20251021	Solid	10/21/2025	09:25					
					VOC-TCLVOA-10		8260D		10 Bus. Days

Relinguished By :
Date / Time : 10/22/25 1245

Received By :
Date / Time : 10/22/25 1245

Storage Area : VOA Refridgerator Room