

**DATA PACKAGE
VOLATILE ORGANICS**

PROJECT NAME : NJ DRINKING WATER PT

CHEMTECH CONSULTING GROUP

284 Sheffield St,

Mountainside, NJ - 07092

Phone No: 908-789-8900

ORDER ID : Q1172

ATTENTION : QA Officer



Laboratory Certification ID # 20012



1) VOLATILES DATA	2
2) Signature Page	3
3) Case Narrative	4
4) Qualifier Page	6
5) Conformance/Non Conformance	7
6) QA Checklist	9
7) Chronicle	10
8) Hit Summary	11
9) QC Data Summary For VOCMS Group4	12
9.1) Deuterated Monitoring Compound Summary	13
9.2) LCS/LCSD Summary	14
9.3) Method Blank Summary	16
9.4) GS/MS Tune Summary	17
9.5) Internal Standard Area and RT Summary	19
10) Sample Data	20
10.1) PT-THM-WS	21
10.2) PT-THM-WSDL	28
11) Calibration Data Summary	35
11.1) Initial Calibration Data	36
11.1.1) VU021025	36
11.2) Continued Calibration Data	377
11.2.1) VU063228.D	377
12) QC Sample Data	430
12.1) Tune Raw Data	431
12.2) Method Blank Data	433
12.3) LCS Data	438
12.4) LCSD Data	487
13) Manual Integration	536
14) Analytical Runlogs	541
15) Standard Prep Logs	547
16) Shipping Document	622
16.1) Chain Of Custody	623
16.2) Lab Certificate	624

Cover Page

Order ID : Q1172

Project ID : NJ Drinking Water PT

Client : Chemtech Consulting Group

Lab Sample Number

Q1172-01
Q1172-02
Q1172-03
Q1172-04
Q1172-05
Q1172-06
Q1172-07
Q1172-08
Q1172-09
Q1172-10
Q1172-11

Client Sample Number

PT-TURB-WS
PT-TURB-WS
PT-MIN-WS
PT-TM-WS
PT-HG-WS
PT-SIO2-WS
PT-RVOA-WS
PT-UNRVOA-WS
PT-THM-WS
PT-ADD-WS
PT-EDBCP-WS

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: 2/24/2025

NYDOH CERTIFICATION NO - 11376

NJDEP CERTIFICATION NO - 20012

CASE NARRATIVE

Chemtech Consulting Group

Project Name: NJ Drinking Water PT

Project # N/A

Chemtech Project # Q1172

Test Name: VOCMS Group4

A. Number of Samples and Date of Receipt:

11 Water samples were received on 01/15/2025.

B. Parameters

According to the Chain of Custody document, the following analyses were requested: Hardness, Calcium, Hardness, Total, Mercury, Metals Group3, Metals Group6, Metals Group7, Silica, Turbidity, VOCGC Group 1, VOCMS Group1, VOCMS Group2, VOCMS Group3, VOCMS Group4 and VOCMS Group5. This data package contains results for VOCMS Group4.

C. Analytical Techniques:

The analysis performed on instrument MSVOA_U were done using GC column DB-624UI 20m 0.18mm 1.0 um. Cat#121-1324UI The analysis of VOCMS Group4 was based on method 524.2.

D. QA/ QC Samples:

The Holding Times were met for all analysis.

The Surrogate recoveries met the acceptable criteria.

The Internal Standards Areas met the acceptable requirements.

The Retention Times were acceptable for all samples.

The RPD met criteria .

The Blank Spike met requirements for all samples .

The Blank Spike Duplicate met requirements for all samples .

The Blank analysis did not indicate the presence of lab contamination.

The Initial Calibration met the requirements .

The Continuous Calibration met the requirements .

The Tuning criteria met requirements.

Sample PT-THM-WS was diluted due to high concentration.

E. Additional Comments:

Please use %D calculated based on Avg RF and CCRF for all compounds using Average Response Factor when the %RSD value for a compound is <20% for the Initial Calibration curve and use %D calculated based on Amount added and Calculated amount for all compounds using Linear Regression when the %RSD value for a compound is > 20% for the Initial Calibration curve for SW-846 analysis.



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

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_____

1
2
3
4
5
6
7
8
9
10
11
12
13
14
15
16

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 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

CHEMTECH PROJECT NUMBER: Q1172

MATRIX: Water

METHOD: 524.2

		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. The Blank Spike met requirements for all samples . The Blank Spike Duplicate met requirements for all samples .			✓
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:			✓

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

NA NO YES

ADDITIONAL COMMENTS:

Sample PT-THM-WS was diluted due to high concentration.

Please use %D calculated based on Avg RF and CCRF for all compounds using Average Response Factor when the %RSD value for a compound is <20% for the Initial Calibration curve and use %D calculated based on Amount added and Calculated amount for all compounds using Linear Regression when the %RSD value for a compound is > 20% for the Initial Calibration curve for SW-846 analysis.

QA REVIEW

Date

APPENDIX A

QA REVIEW GENERAL DOCUMENTATION

Project #: Q1172

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: 02/24/2025

LAB CHRONICLE

OrderID:	Q1172	OrderDate:	1/23/2025 2:53:00 PM
Client:	Chemtech Consulting Group	Project:	NJ Drinking Water PT
Contact:	QA Officer	Location:	QA Office,VOA Lab

LabID	ClientID	Matrix	Test	Method	Sample Date	Prep Date	Anal Date	Received
Q1172-07	PT-RVOA-WS	Water	VOCMS Group1	524.2	01/13/25		02/11/25	01/15/25
Q1172-07DL	PT-RVOA-WSDL	Water	VOCMS Group1	524.2	01/13/25		02/11/25	01/15/25
Q1172-08	PT-UNRVOA-WS	Water	VOCMS Group2	524.2	01/13/25		02/11/25	01/15/25
Q1172-08DL	PT-UNRVOA-WSDL	Water	VOCMS Group2	524.2	01/13/25		02/13/25	01/15/25
Q1172-09	PT-THM-WS	Water	VOCMS Group4	524.2	01/13/25		02/11/25	01/15/25
Q1172-09DL	PT-THM-WSDL	Water	VOCMS Group4	524.2	01/13/25		02/11/25	01/15/25
Q1172-10	PT-ADD-WS	Water	VOCMS Group3	524.2	01/13/25		02/12/25	01/15/25
Q1172-10DL	PT-ADD-WSDL	Water	VOCMS Group3	524.2	01/13/25		02/12/25	01/15/25
Q1172-11	PT-EDBCP-WS	Water	VOCMS Group5	524.2	01/13/25		02/11/25	01/15/25

Hit Summary Sheet
SW-846

SDG No.: Q1172

Client: Chemtech Consulting Group

Sample ID	Client ID	Matrix	Parameter	Concentration	C	MDL	RDL	Units
Client ID:	PT-THM-WS							
Q1172-09	PT-THM-WS	Water	Chloroform	45.8	E	0.13	0.50	ug/L
Q1172-09	PT-THM-WS	Water	Bromodichloromethane	37.4	E	0.12	0.50	ug/L
Q1172-09	PT-THM-WS	Water	Dibromochloromethane	35.0	E	0.13	0.50	ug/L
Q1172-09	PT-THM-WS	Water	Bromoform	33.8	E	0.14	0.50	ug/L
			Total Voc :	152				
			Total Concentration:	152				
Client ID:	PT-THM-WSDL							
Q1172-09DL	PT-THM-WSDL	Water	Chloroform	42.6	D	0.65	2.50	ug/L
Q1172-09DL	PT-THM-WSDL	Water	Bromodichloromethane	34.1	D	0.60	2.50	ug/L
Q1172-09DL	PT-THM-WSDL	Water	Dibromochloromethane	31.9	D	0.65	2.50	ug/L
Q1172-09DL	PT-THM-WSDL	Water	Bromoform	30.5	D	0.70	2.50	ug/L
			Total Voc :	139				
			Total Concentration:	139				



QC SUMMARY

- 1
- 2
- 3
- 4
- 5
- 6
- 7
- 8
- 9
- 10
- 11
- 12
- 13
- 14
- 15
- 16

Surrogate Summary

SDG No.: Q1172

Client: Chemtech Consulting Group

Analytical Method: SW524.2

Lab Sample ID	Client ID	Parameter	Spike	Result	RecoveryQual	Limits	
						Low	High
Q1172-09	PT-THM-WS	1,2-Dichlorobenzene-d4	1	0.84	84	70	130
		4-Bromofluorobenzene	1	0.86	86	70	130
Q1172-09DL	PT-THM-WSDL	1,2-Dichlorobenzene-d4	1	0.84	84	70	130
		4-Bromofluorobenzene	1	0.89	89	70	130
VU0211WBL01	VU0211WBL01	1,2-Dichlorobenzene-d4	1	0.82	82	70	130
		4-Bromofluorobenzene	1	0.81	81	70	130
VU0211WBS01	VU0211WBS01	1,2-Dichlorobenzene-d4	1	0.94	94	70	130
		4-Bromofluorobenzene	1	0.98	98	70	130
VU0211WBSD0	VU0211WBSD01	1,2-Dichlorobenzene-d4	1	0.96	96	70	130
		4-Bromofluorobenzene	1	1.03	103	70	130

Laboratory Control Sample/Laboratory Control Sample Duplicate Summary

SW-846

SDG No.: Q1172

Client: Chemtech Consulting Group

Analytical Method: SW524.2

Datafile : VU063230.D

Lab Sample ID	Parameter	Spike	Result	Unit	Rec	RPD	Qual	Low	Limits High	RPD
VU0211WBS01	Chloroform	2	2.00	ug/L	100			70	130	
	Bromodichloromethane	2	2.00	ug/L	100			70	130	
	Dibromochloromethane	2	2.00	ug/L	100			70	130	
	Bromoform	2	1.90	ug/L	95			70	130	

Laboratory Control Sample/Laboratory Control Sample Duplicate Summary

SW-846

SDG No.: Q1172

Client: Chemtech Consulting Group

Analytical Method: SW524.2

Datafile : VU063231.D

Lab Sample ID	Parameter	Spike	Result	Unit	Rec	RPD	Qual	Low	Limits	RPD
									High	
VU0211WBSD01	Chloroform	2	1.90	ug/L	95	5		70	130	20
	Bromodichloromethane	2	2.00	ug/L	100	0		70	130	20
	Dibromochloromethane	2	1.90	ug/L	95	5		70	130	20
	Bromoform	2	1.80	ug/L	90	5		70	130	20

VOLATILE METHOD BLANK SUMMARY

EPA SAMPLE NO.

VU0211WBL01

Lab Name: CHEMTECH

Contract: CHEM02

Lab Code: CHEM Case No.: Q1172

SAS No.: Q1172 SDG NO.: Q1172

Lab File ID: VU063229.D

Lab Sample ID: VU0211WBL01

Date Analyzed: 02/11/2025

Time Analyzed: 11:14

GC Column: DB-624UI ID: 0.18 (mm)

Heated Purge: (Y/N) N

Instrument ID: MSVOA_U

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

EPA SAMPLE NO.	LAB SAMPLE ID	LAB FILE ID	DATE ANALYZED
VU0211WBS01	VU0211WBS01	VU063230.D	02/11/2025
VU0211WBSD01	VU0211WBSD01	VU063231.D	02/11/2025
PT-THM-WS	Q1172-09	VU063233.D	02/11/2025
PT-THM-WSDL	Q1172-09DL	VU063234.D	02/11/2025

COMMENTS: _____



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

VOLATILE ORGANIC INSTRUMENT PERFORMANCE CHECK
BROMOFLUOROBENZENE (BFB)

Lab Name: CHEMTECH Contract: CHEM02
Lab Code: CHEM Case No.: Q1172 SAS No.: Q1172 SDG NO.: Q1172
Lab File ID: VU063218.D BFB Injection Date: 02/10/2025
Instrument ID: MSVOA_U BFB Injection Time: 09:06
GC Column: DB-624UI ID: 0.18 (mm) Heated Purge: Y/N N

m/e	ION ABUNDANCE CRITERIA	% RELATIVE ABUNDANCE
50	15.0 - 40.0% of mass 95	19.5
75	30.0 - 60.0% of mass 95	52.7
95	Base Peak, 100% relative abundance	100
96	5.0 - 9.0% of mass 95	6.5
173	Less than 2.0% of mass 174	0.4 (0.5) 1
174	50.0 - 100.0% of mass 95	79.1
175	5.0 - 9.0% of mass 174	5.8 (7.3) 1
176	95.0 - 101.0% of mass 174	77.5 (98.1) 1
177	5.0 - 9.0% of mass 176	4.8 (6.2) 2

1-Value is % mass 174

2-Value is % mass 176

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

EPA SAMPLE NO.	LAB SAMPLE ID	LAB FILE ID	DATE ANALYZED	TIME ANALYZED
VSTDICC0.5	VSTDICC0.5	VU063219.D	02/10/2025	12:59
VSTDICC001	VSTDICC001	VU063220.D	02/10/2025	13:23
VSTDICC002	VSTDICC002	VU063221.D	02/10/2025	13:58
VSTDICC005	VSTDICC005	VU063222.D	02/10/2025	14:23
VSTDICCC010	VSTDICCC010	VU063223.D	02/10/2025	15:06
VSTDICC015	VSTDICC015	VU063224.D	02/10/2025	15:33

VOLATILE ORGANIC INSTRUMENT PERFORMANCE CHECK
 BROMOFLUOROBENZENE (BFB)

Lab Name: CHEMTECH Contract: CHEM02
 Lab Code: CHEM Case No.: Q1172 SAS No.: Q1172 SDG NO.: Q1172
 Lab File ID: VU063226.D BFB Injection Date: 02/11/2025
 Instrument ID: MSVOA_U BFB Injection Time: 08:11
 GC Column: DB-624UI ID: 0.18 (mm) Heated Purge: Y/N N

m/e	ION ABUNDANCE CRITERIA	% RELATIVE ABUNDANCE
50	15.0 - 40.0% of mass 95	18.9
75	30.0 - 60.0% of mass 95	52
95	Base Peak, 100% relative abundance	100
96	5.0 - 9.0% of mass 95	6.3
173	Less than 2.0% of mass 174	0.6 (0.8) 1
174	50.0 - 100.0% of mass 95	77.3
175	5.0 - 9.0% of mass 174	5.7 (7.4) 1
176	95.0 - 101.0% of mass 174	74.3 (96.2) 1
177	5.0 - 9.0% of mass 176	4.9 (6.5) 2

1-Value is % mass 174

2-Value is % mass 176

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

EPA SAMPLE NO.	LAB SAMPLE ID	LAB FILE ID	DATE ANALYZED	TIME ANALYZED
VSTDCCC010	VSTDCCC010	VU063228.D	02/11/2025	10:01
VU0211WBL01	VU0211WBL01	VU063229.D	02/11/2025	11:14
VU0211WBS01	VU0211WBS01	VU063230.D	02/11/2025	12:07
VU0211WBSD01	VU0211WBSD01	VU063231.D	02/11/2025	12:31
PT-THM-WS	Q1172-09	VU063233.D	02/11/2025	13:28
PT-THM-WSDL	Q1172-09DL	VU063234.D	02/11/2025	13:55

VOLATILE INTERNAL STANDARD AREA AND RT SUMMARY

Lab Name: CHEMTECH Contract: CHEM02
Lab Code: CHEM Case No.: Q1172 SAS No.: Q1172 SDG NO.: Q1172
Lab File ID: VU063228.D Date Analyzed: 02/11/2025
Instrument ID: MSVOA_U Time Analyzed: 10:01
GC Column: DB-624UI ID: 0.18 (mm) Heated Purge: (Y/N) N

	IS1 AREA #	RT #	IS2 AREA #	RT #	IS3 AREA #	RT #
12 HOUR STD	58984	6.11	0	0.00	0	0.00
UPPER LIMIT	76679.2	6.607	0		0	
LOWER LIMIT	41288.8	5.607	0		0	
EPA SAMPLE NO.						
PT-THM-WS	50312	6.11	0	0.00	0	0.00
PT-THM-WSDL	47942	6.10	0	0.00	0	0.00
VU0211WBL01	52216	6.11	0	0.00	0	0.00
VU0211WBS01	55425	6.11	0	0.00	0	0.00
VU0211WBSD01	54780	6.10	0	0.00	0	0.00

IS1 = Fluorobenzene

IS2 =

IS3 =

AREA UPPER LIMIT = +30% of internal standard area

AREA LOWER LIMIT = -30% 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

1
2
3
4
5
6
7
8
9
10
11
12
13
14
15
16

Report of Analysis

Client:	Chemtech Consulting Group	Date Collected:	01/13/25
Project:	NJ Drinking Water PT	Date Received:	01/15/25
Client Sample ID:	PT-THM-WS	SDG No.:	Q1172
Lab Sample ID:	Q1172-09	Matrix:	Water
Analytical Method:	E524.2	% Solid:	0
Sample Wt/Vol:	25 Units: mL	Final Vol:	25000 uL
Soil Aliquot Vol:	uL	Test:	VOCMS Group4
GC Column:	DB-624UI ID : 0.18	Level :	LOW
Prep Method :			

File ID/Qc Batch:	Dilution:	Prep Date	Date Analyzed	Prep Batch ID
VU063233.D	1		02/11/25 13:28	VU021125

CAS Number	Parameter	Conc.	Qualifier	MDL	LOQ / CRQL	Units
TARGETS						
67-66-3	Chloroform	45.8	E	0.13	0.50	ug/L
75-27-4	Bromodichloromethane	37.4	E	0.12	0.50	ug/L
124-48-1	Dibromochloromethane	35.0	E	0.13	0.50	ug/L
75-25-2	Bromoform	33.8	E	0.14	0.50	ug/L
SURROGATES						
2199-69-1	1,2-Dichlorobenzene-d4	0.84		70 - 130	84%	SPK: 1
460-00-4	4-Bromofluorobenzene	0.86		70 - 130	86%	SPK: 1
INTERNAL STANDARDS						
462-06-6	Fluorobenzene	50300	6.106			

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_U\Data\VU021125\
Data File : VU063233.D
Acq On : 11 Feb 2025 13:28
Operator : MD/SY
Sample : Q1172-09
Misc : 25.0mL/MSVOA_U/WATER
ALS Vial : 10 Sample Multiplier: 1

Instrument :
MSVOA_U
ClientSampleId :
PT-THM-WS

Quant Time: Feb 12 03:18:37 2025
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_U\Method\524U021025DW.M
Quant Title : METHOD 524.2 VOLATILES DRINKING WATER
QLast Update : Tue Feb 11 08:42:19 2025
Response via : Initial Calibration

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

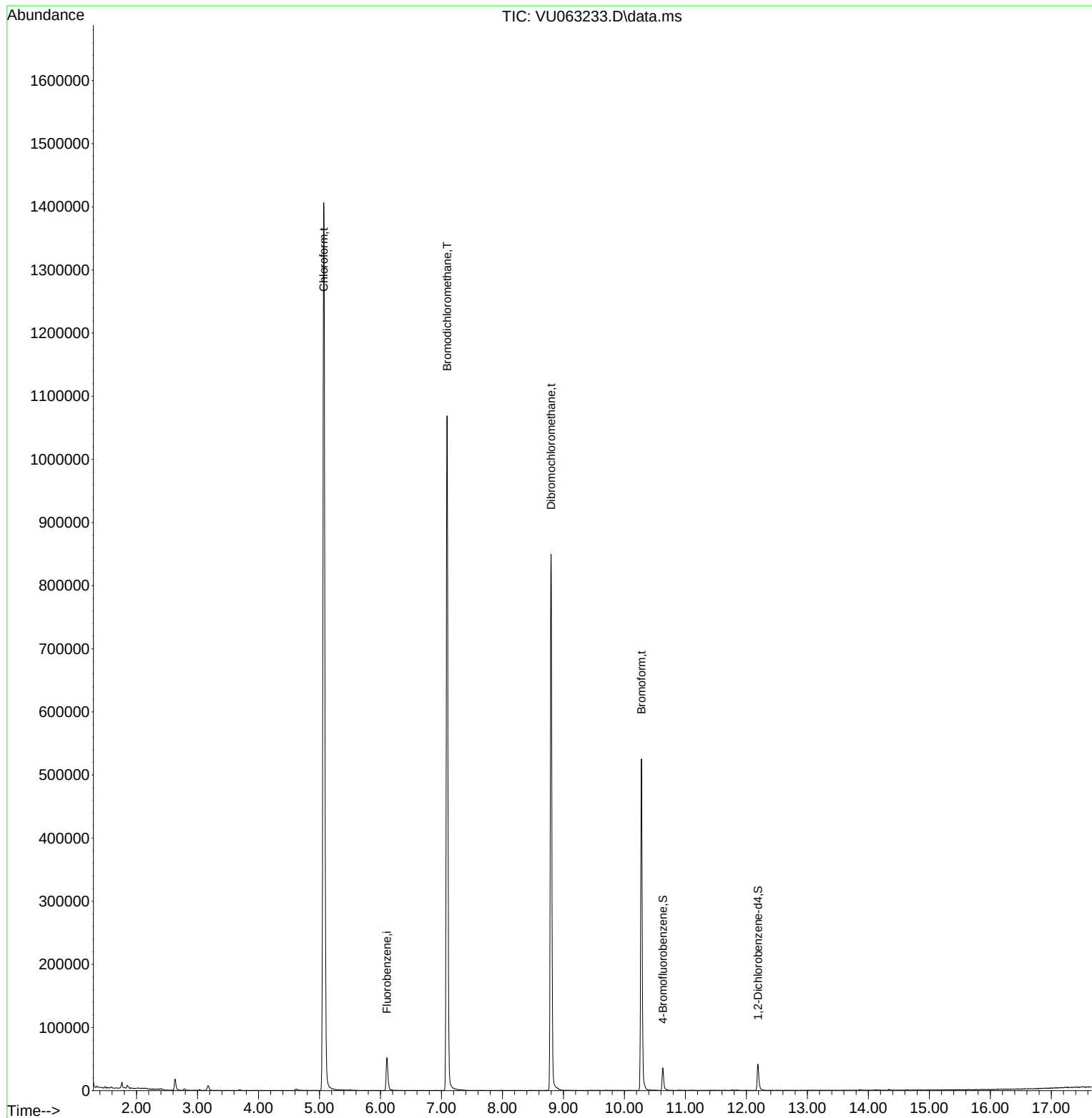
Internal Standards						
1) Fluorobenzene	6.106	96	50312	1.000	ug/l	# 0.00
System Monitoring Compounds						
57) 4-Bromofluorobenzene	10.630	95	14327	0.863	ug/l	0.00
Spiked Amount 1.000			Recovery	=	86.000%	
68) 1,2-Dichlorobenzene-d4	12.190	152	14413	0.835	ug/l	0.00
Spiked Amount 1.000			Recovery	=	84.000%	
Target Compounds						
						Qvalue
27) Chloroform	5.071	83	1268617	45.780	ug/l	98
44) Bromodichloromethane	7.094	83	713400	37.410	ug/l	100
55) Dibromochloromethane	8.798	129	444481	34.974	ug/l	98
67) Bromoform	10.280	173	243455	33.752	ug/l	100

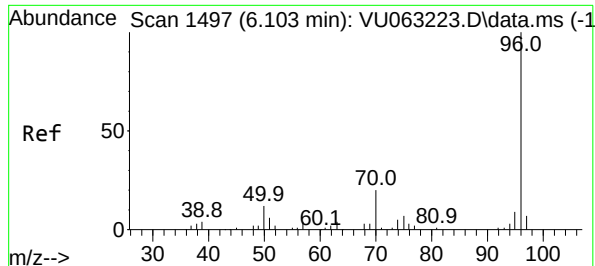
(#) = qualifier out of range (m) = manual integration (+) = signals summed

Data Path : Z:\voasrv\HPCHEM1\MSVOA_U\Data\VU021125\
Data File : VU063233.D
Acq On : 11 Feb 2025 13:28
Operator : MD/SY
Sample : Q1172-09
Misc : 25.0mL/MSVOA_U/WATER
ALS Vial : 10 Sample Multiplier: 1

Instrument :
MSVOA_U
ClientSampleId :
PT-THM-WS

Quant Time: Feb 12 03:18:37 2025
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_U\Method\524U021025DW.M
Quant Title : METHOD 524.2 VOLATILES DRINKING WATER
QLast Update : Tue Feb 11 08:42:19 2025
Response via : Initial Calibration

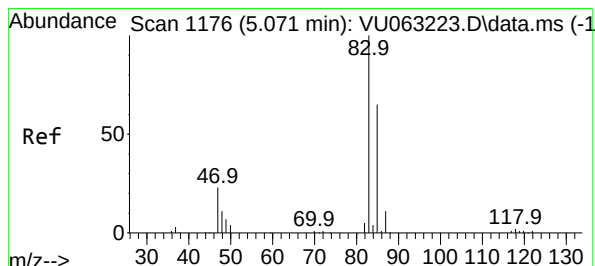
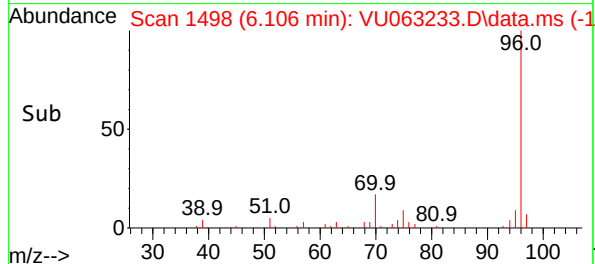
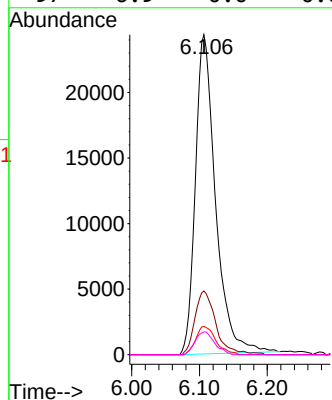
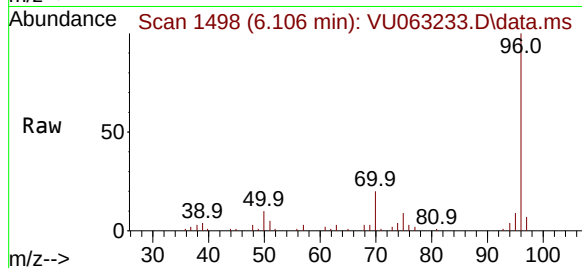




#1
Fluorobenzene
Concen: 1.000 ug/l
RT: 6.106 min Scan# 1498
Delta R.T. 0.003 min
Lab File: VU063233.D
Acq: 11 Feb 2025 13:28

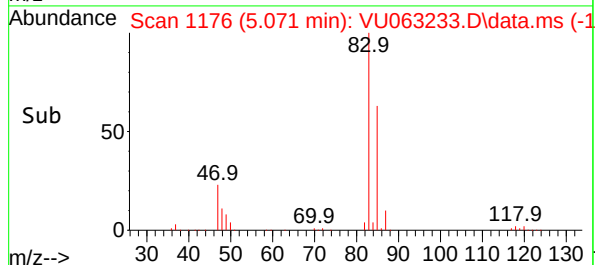
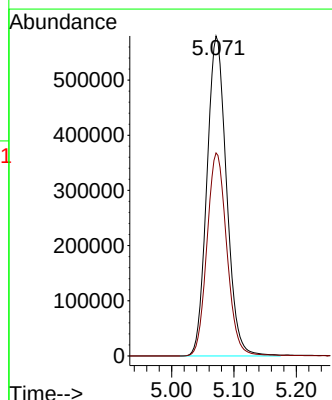
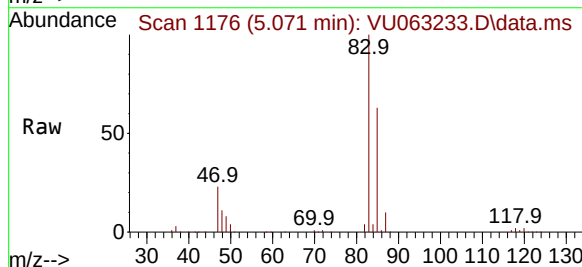
Instrument :
MSVOA_U
ClientSampleId :
PT-THM-WS

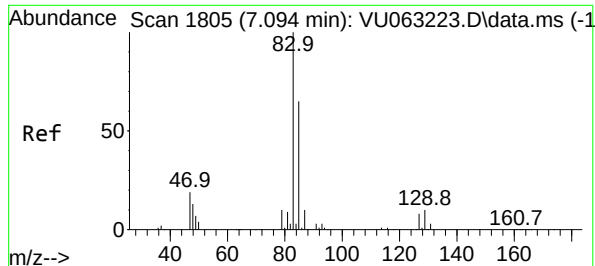
Tgt Ion: 96 Resp: 50312
Ion Ratio Lower Upper
96 100
70 19.7 15.6 23.4
95 8.8 7.3 10.9
97 6.9 0.0 0.0#



#27
Chloroform
Concen: 45.780 ug/l
RT: 5.071 min Scan# 1176
Delta R.T. -0.000 min
Lab File: VU063233.D
Acq: 11 Feb 2025 13:28

Tgt Ion: 83 Resp: 1268617
Ion Ratio Lower Upper
83 100
85 63.5 0.0 129.8





#44

Bromodichloromethane

Concen: 37.410 ug/l

RT: 7.094 min Scan# 1805

Delta R.T. -0.000 min

Lab File: VU063233.D

Acq: 11 Feb 2025 13:28

Instrument :

MSVOA_U

ClientSampleId :

PT-THM-WS

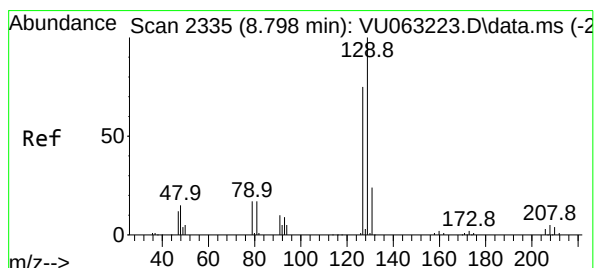
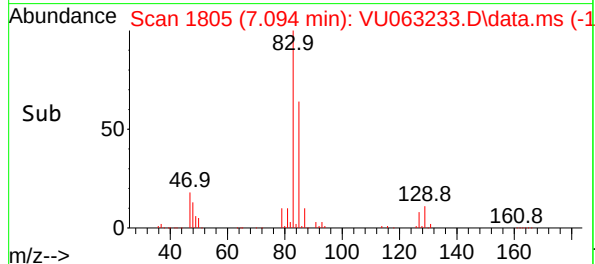
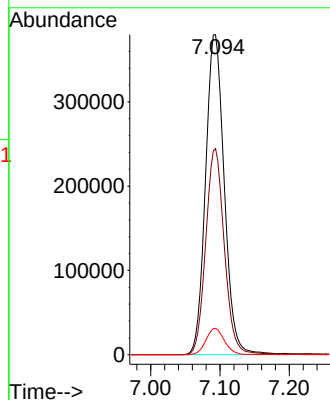
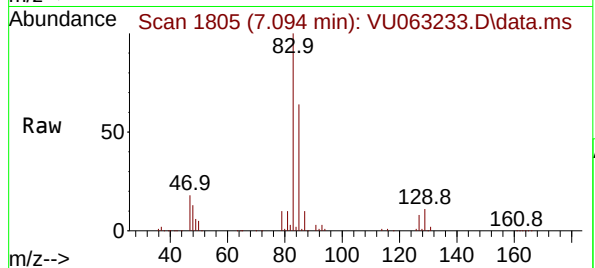
Tgt Ion: 83 Resp: 713400

Ion Ratio Lower Upper

83 100

85 64.4 51.7 77.5

127 8.2 6.7 10.1



#55

Dibromochloromethane

Concen: 34.974 ug/l

RT: 8.798 min Scan# 2335

Delta R.T. -0.000 min

Lab File: VU063233.D

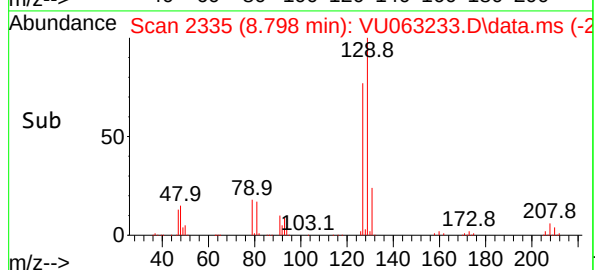
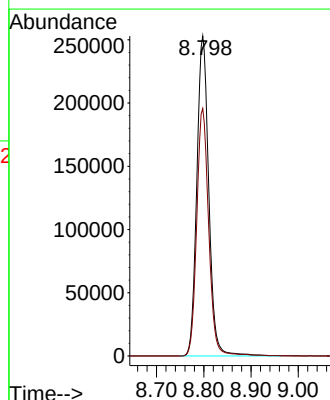
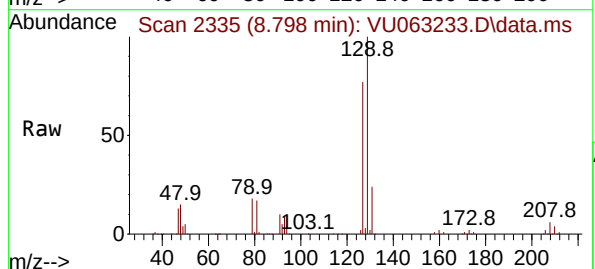
Acq: 11 Feb 2025 13:28

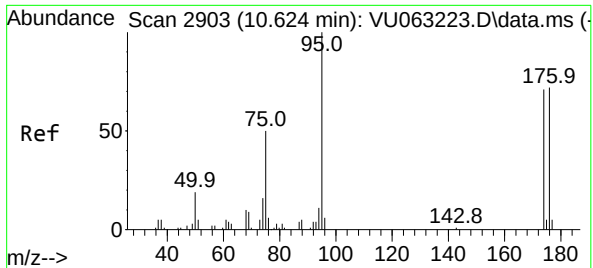
Tgt Ion: 129 Resp: 444481

Ion Ratio Lower Upper

129 100

127 76.9 60.4 90.6

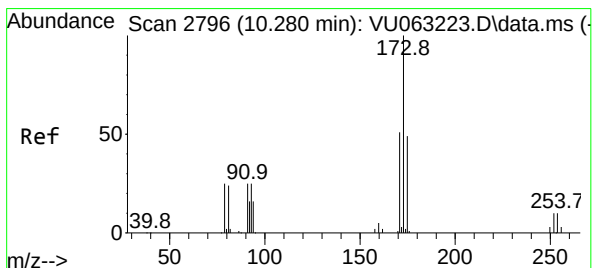
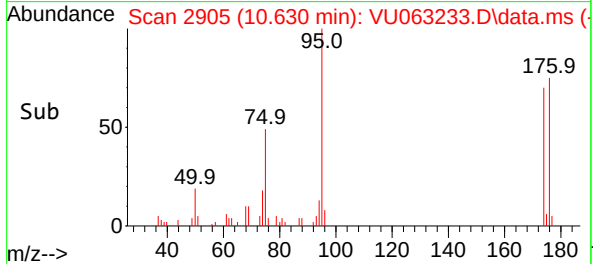
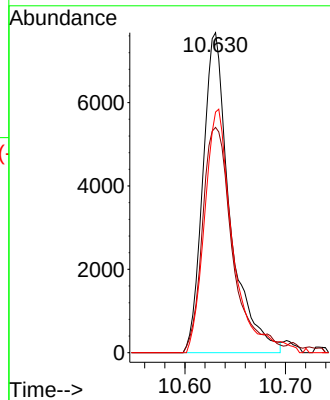
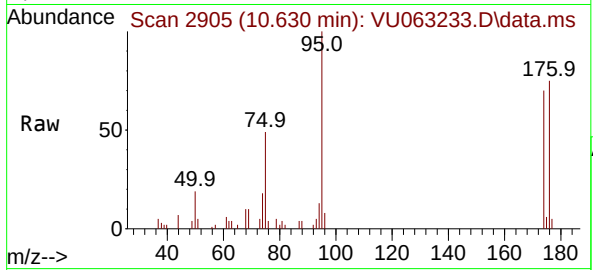




#57
4-Bromofluorobenzene
Concen: 0.863 ug/l
RT: 10.630 min Scan# 2905
Delta R.T. 0.006 min
Lab File: VU063233.D
Acq: 11 Feb 2025 13:28

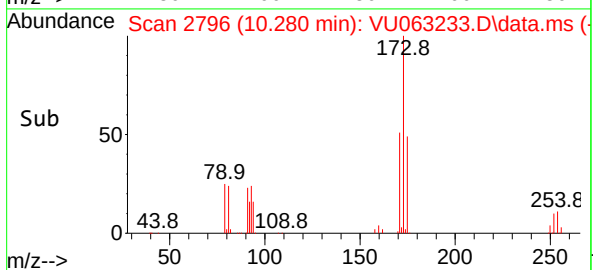
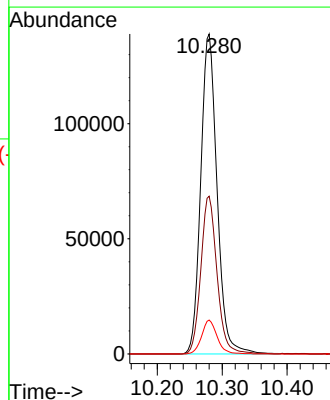
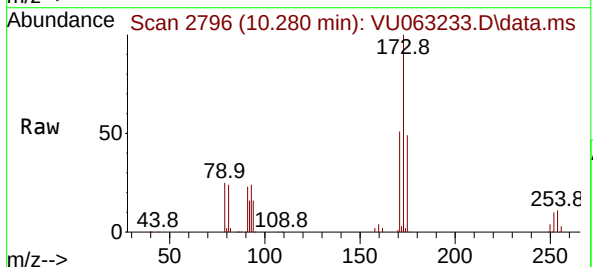
Instrument :
MSVOA_U
ClientSampleId :
PT-THM-WS

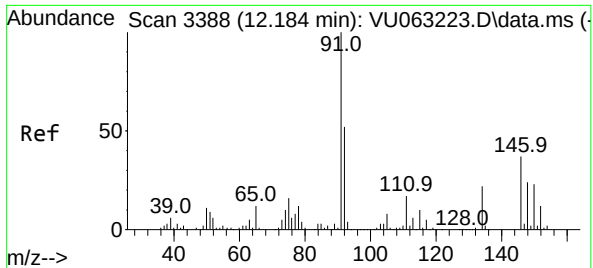
Tgt Ion: 95 Resp: 14327
Ion Ratio Lower Upper
95 100
174 78.8 58.6 88.0
176 79.8 58.2 87.4



#67
Bromoform
Concen: 33.752 ug/l
RT: 10.280 min Scan# 2796
Delta R.T. -0.000 min
Lab File: VU063233.D
Acq: 11 Feb 2025 13:28

Tgt Ion: 173 Resp: 243455
Ion Ratio Lower Upper
173 100
175 48.7 39.0 58.4
254 10.1 7.7 11.5





#68

1,2-Dichlorobenzene-d4

Concen: 0.835 ug/l

RT: 12.190 min Scan# 31

Delta R.T. 0.006 min

Lab File: VU063233.D

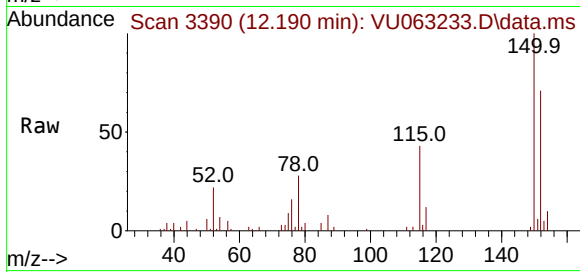
Acq: 11 Feb 2025 13:28

Instrument :

MSVOA_U

ClientSampleId :

PT-THM-WS



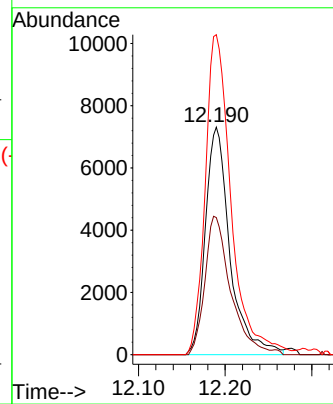
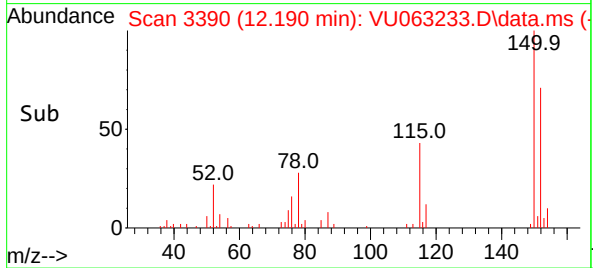
Tgt Ion:152 Resp: 14413

Ion Ratio Lower Upper

152 100

115 64.0 0.0 275.2

150 148.0 0.0 658.4



Report of Analysis

Client:	Chemtech Consulting Group	Date Collected:	01/13/25
Project:	NJ Drinking Water PT	Date Received:	01/15/25
Client Sample ID:	PT-THM-WSDL	SDG No.:	Q1172
Lab Sample ID:	Q1172-09DL	Matrix:	Water
Analytical Method:	E524.2	% Solid:	0
Sample Wt/Vol:	25 Units: mL	Final Vol:	25000 uL
Soil Aliquot Vol:	uL	Test:	VOCMS Group4
GC Column:	DB-624UI ID : 0.18	Level :	LOW
Prep Method :			

File ID/Qc Batch:	Dilution:	Prep Date	Date Analyzed	Prep Batch ID
VU063234.D	5		02/11/25 13:55	VU021125

CAS Number	Parameter	Conc.	Qualifier	MDL	LOQ / CRQL	Units
TARGETS						
67-66-3	Chloroform	42.6	D	0.65	2.50	ug/L
75-27-4	Bromodichloromethane	34.1	D	0.60	2.50	ug/L
124-48-1	Dibromochloromethane	31.9	D	0.65	2.50	ug/L
75-25-2	Bromoform	30.5	D	0.70	2.50	ug/L
SURROGATES						
2199-69-1	1,2-Dichlorobenzene-d4	0.84		70 - 130	84%	SPK: 1
460-00-4	4-Bromofluorobenzene	0.89		70 - 130	89%	SPK: 1
INTERNAL STANDARDS						
462-06-6	Fluorobenzene	47900	6.103			

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_U\Data\VU021125\
Data File : VU063234.D
Acq On : 11 Feb 2025 13:55
Operator : MD/SY
Sample : Q1172-09DL 5X
Misc : 25.0mL/MSVOA_U/WATER
ALS Vial : 11 Sample Multiplier: 1

Instrument :
MSVOA_U
ClientSampleId :
PT-THM-WSDL

Quant Time: Feb 12 03:18:55 2025
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_U\Method\524U021025DW.M
Quant Title : METHOD 524.2 VOLATILES DRINKING WATER
QLast Update : Tue Feb 11 08:42:19 2025
Response via : Initial Calibration

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

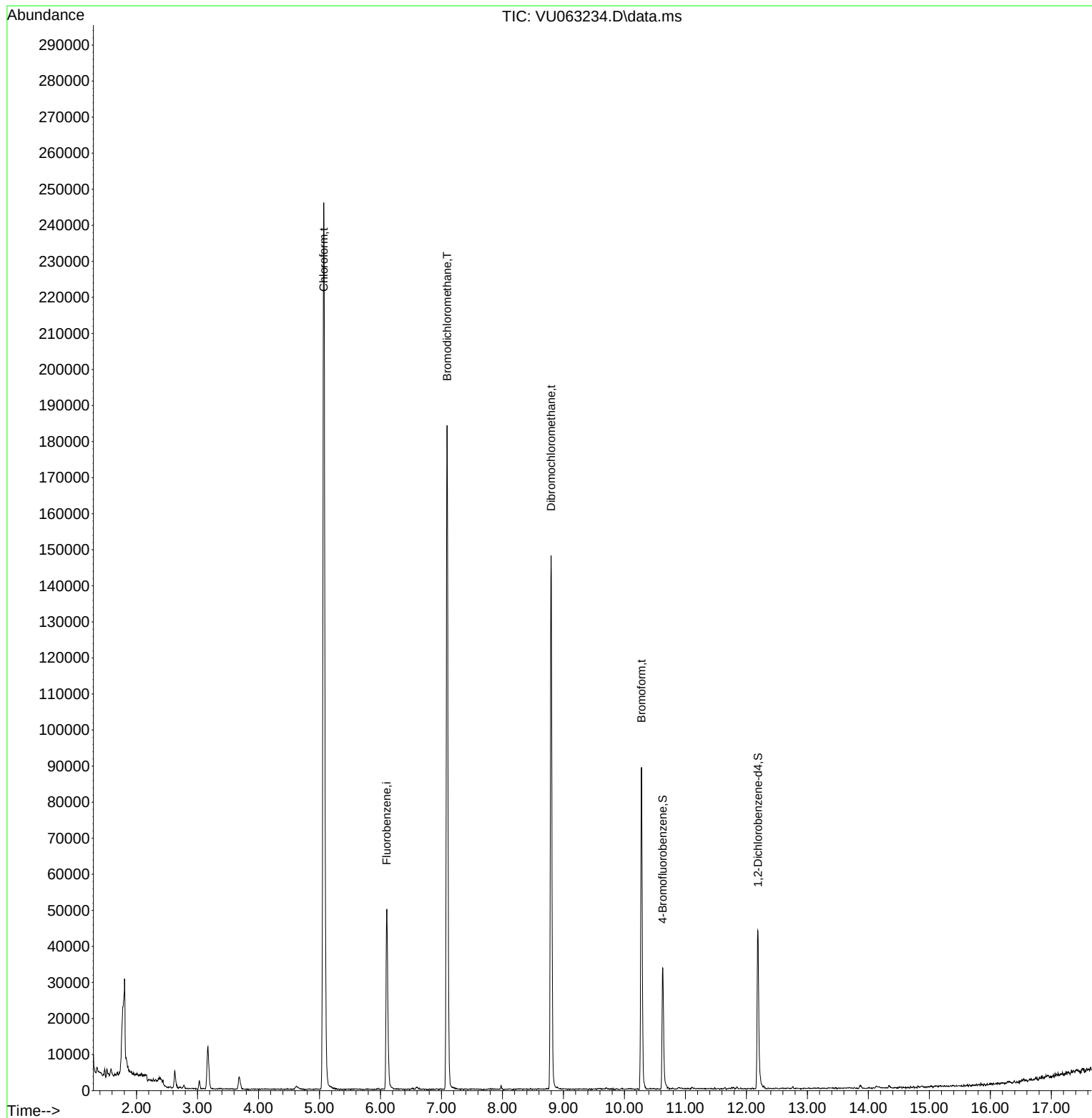
Internal Standards						
1) Fluorobenzene	6.103	96	47942	1.000	ug/l	# 0.00
System Monitoring Compounds						
57) 4-Bromofluorobenzene	10.627	95	14090	0.891	ug/l	0.00
Spiked Amount 1.000			Recovery	=	89.000%	
68) 1,2-Dichlorobenzene-d4	12.190	152	13870	0.843	ug/l	0.00
Spiked Amount 1.000			Recovery	=	84.000%	
Target Compounds						
					Qvalue	
27) Chloroform	5.071	83	224830	8.514	ug/l	100
44) Bromodichloromethane	7.094	83	124082	6.828	ug/l	99
55) Dibromochloromethane	8.798	129	77163	6.372	ug/l	96
67) Bromoform	10.280	173	41888	6.094	ug/l	99

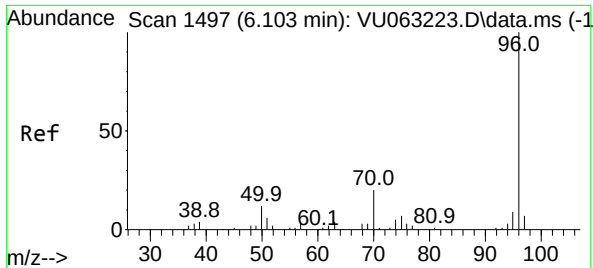
(#) = qualifier out of range (m) = manual integration (+) = signals summed

Data Path : Z:\voasrv\HPCHEM1\MSVOA_U\Data\VU021125\
Data File : VU063234.D
Acq On : 11 Feb 2025 13:55
Operator : MD/SY
Sample : Q1172-09DL 5X
Misc : 25.0mL/MSVOA_U/WATER
ALS Vial : 11 Sample Multiplier: 1

Instrument :
MSVOA_U
ClientSampleId :
PT-THM-WSDL

Quant Time: Feb 12 03:18:55 2025
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_U\Method\524U021025DW.M
Quant Title : METHOD 524.2 VOLATILES DRINKING WATER
QLast Update : Tue Feb 11 08:42:19 2025
Response via : Initial Calibration

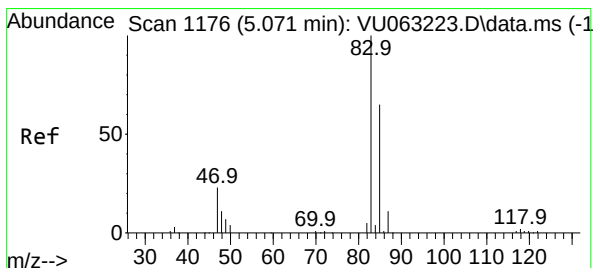
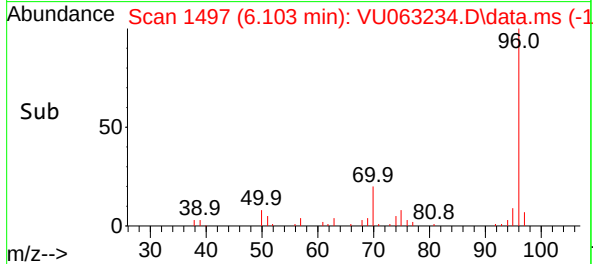
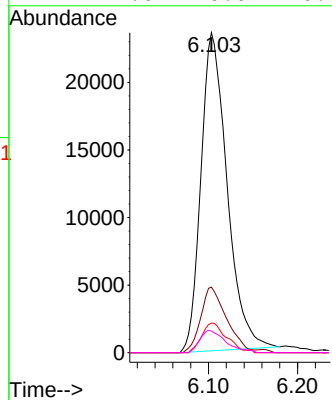
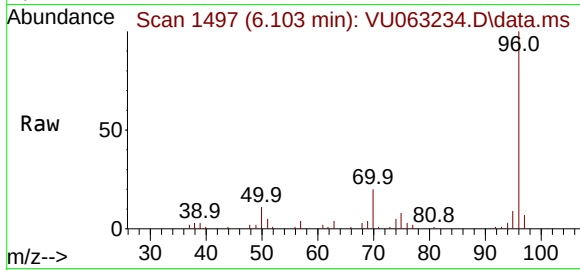




#1
Fluorobenzene
Concen: 1.000 ug/l
RT: 6.103 min Scan# 1497
Delta R.T. 0.000 min
Lab File: VU063234.D
Acq: 11 Feb 2025 13:55

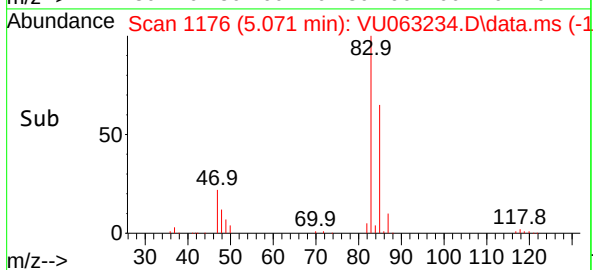
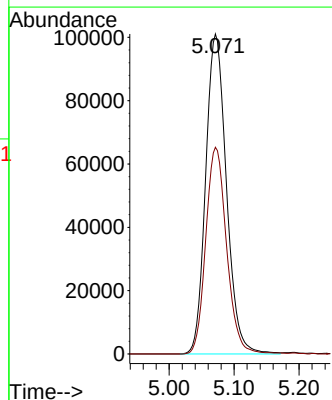
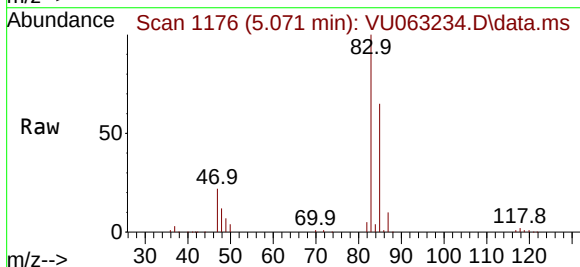
Instrument :
MSVOA_U
ClientSampleId :
PT-THM-WSDL

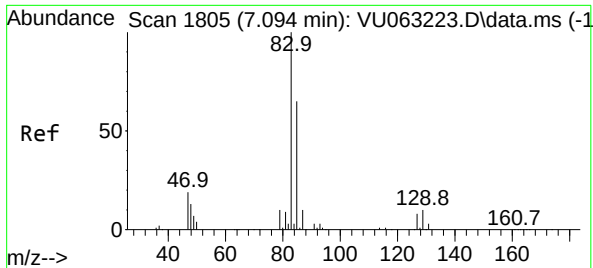
Tgt Ion:	96	Resp:	47942
Ion	Ratio	Lower	Upper
96	100		
70	19.4	15.6	23.4
95	8.9	7.3	10.9
97	7.0	0.0	0.0



#27
Chloroform
Concen: 8.514 ug/l
RT: 5.071 min Scan# 1176
Delta R.T. -0.000 min
Lab File: VU063234.D
Acq: 11 Feb 2025 13:55

Tgt Ion:	83	Resp:	224830
Ion	Ratio	Lower	Upper
83	100		
85	64.6	0.0	129.8

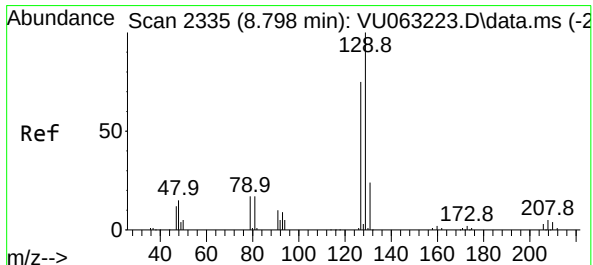
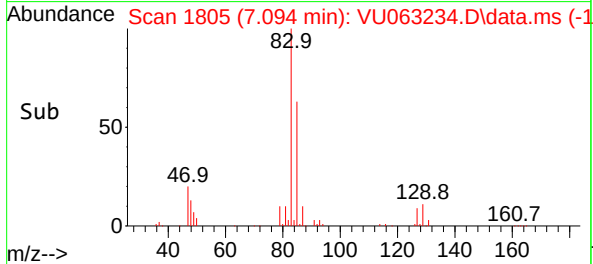
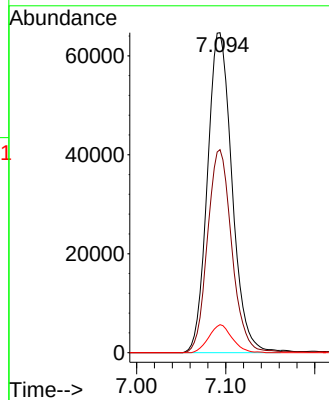
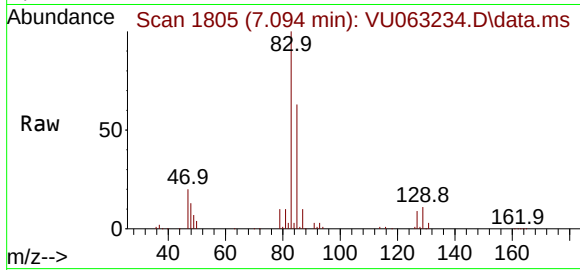




#44
Bromodichloromethane
Concen: 6.828 ug/l
RT: 7.094 min Scan# 1805
Delta R.T. -0.000 min
Lab File: VU063234.D
Acq: 11 Feb 2025 13:55

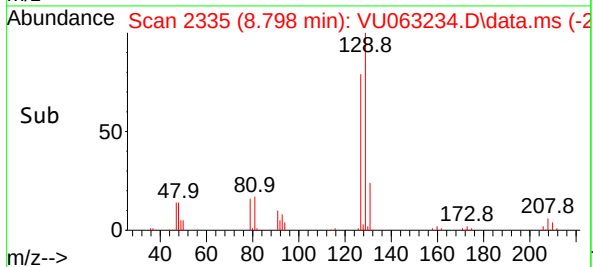
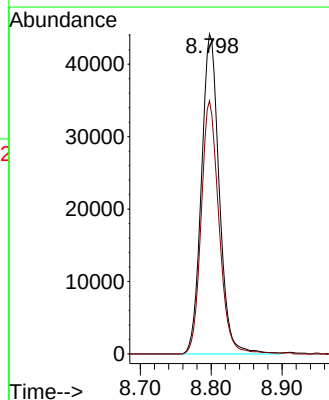
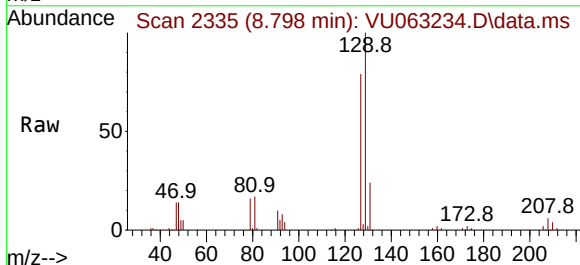
Instrument :
MSVOA_U
ClientSampleId :
PT-THM-WSDL

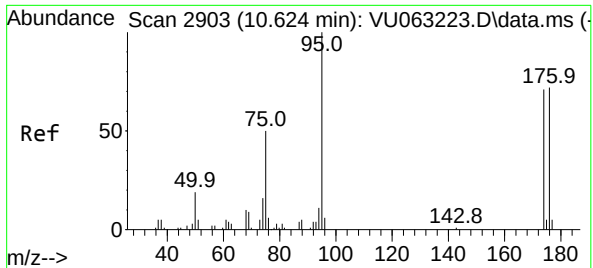
Tgt Ion: 83 Resp: 124082
Ion Ratio Lower Upper
83 100
85 63.4 51.7 77.5
127 8.7 6.7 10.1



#55
Dibromochloromethane
Concen: 6.372 ug/l
RT: 8.798 min Scan# 2335
Delta R.T. -0.000 min
Lab File: VU063234.D
Acq: 11 Feb 2025 13:55

Tgt Ion: 129 Resp: 77163
Ion Ratio Lower Upper
129 100
127 78.9 60.4 90.6

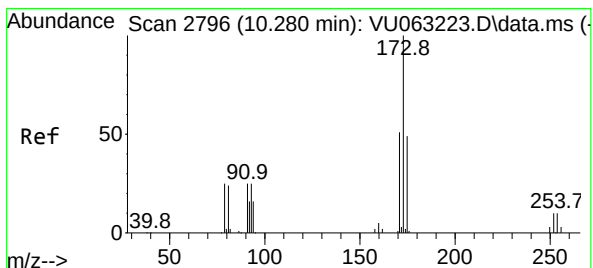
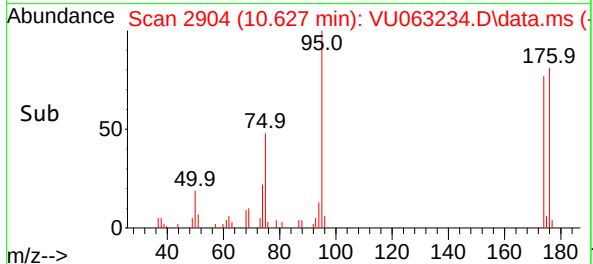
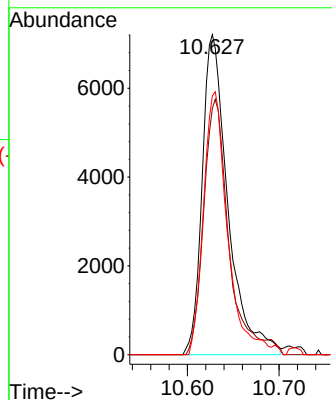
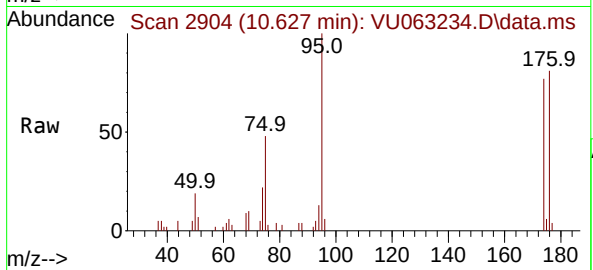




#57
4-Bromofluorobenzene
Concen: 0.891 ug/l
RT: 10.627 min Scan# 2904
Delta R.T. 0.003 min
Lab File: VU063234.D
Acq: 11 Feb 2025 13:55

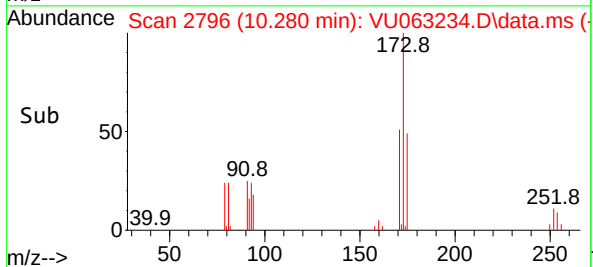
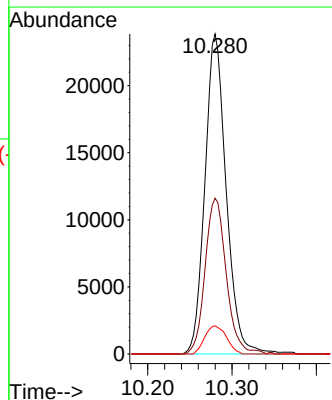
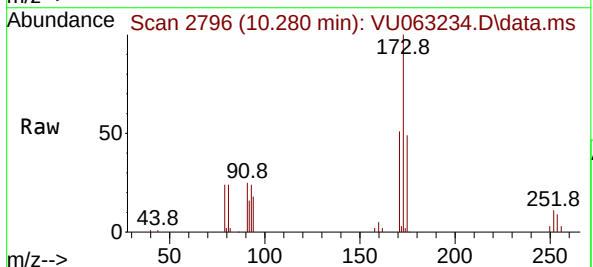
Instrument :
MSVOA_U
ClientSampleId :
PT-THM-WSDL

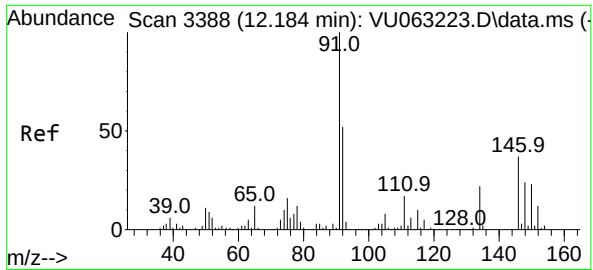
Tgt Ion: 95 Resp: 14090
Ion Ratio Lower Upper
95 100
174 78.1 58.6 88.0
176 76.5 58.2 87.4



#67
Bromoform
Concen: 6.094 ug/l
RT: 10.280 min Scan# 2796
Delta R.T. -0.000 min
Lab File: VU063234.D
Acq: 11 Feb 2025 13:55

Tgt Ion: 173 Resp: 41888
Ion Ratio Lower Upper
173 100
175 48.4 39.0 58.4
254 8.9 7.7 11.5





#68

1,2-Dichlorobenzene-d4

Concen: 0.843 ug/l

RT: 12.190 min Scan# 31

Delta R.T. 0.006 min

Lab File: VU063234.D

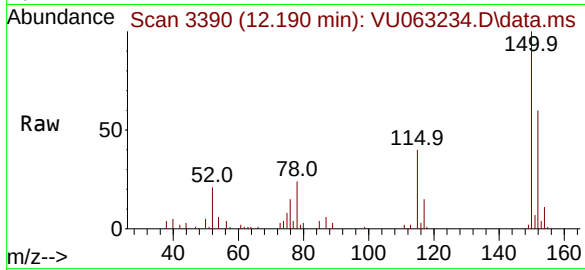
Acq: 11 Feb 2025 13:55

Instrument :

MSVOA_U

ClientSampleId :

PT-THM-WSDL



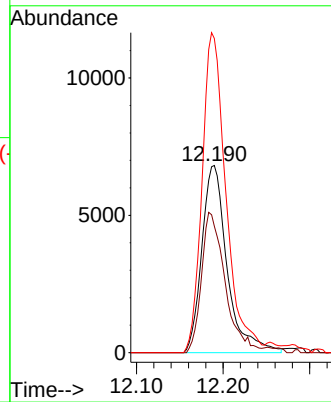
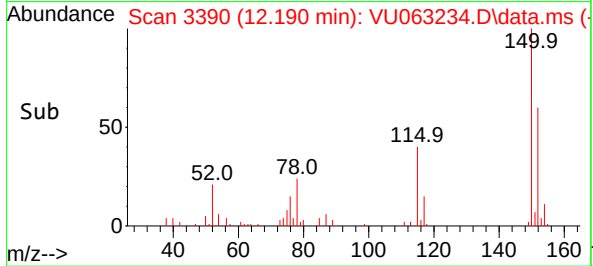
Tgt Ion:152 Resp: 13870

Ion Ratio Lower Upper

152 100

115 69.7 0.0 275.2

150 160.7 0.0 658.4





CALIBRATION SUMMARY

1
2
3
4
5
6
7
8
9
10
11
12
13
14
15
16



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

VOLATILE ORGANICS INITIAL CALIBRATION DATA

Lab Name: CHEMTECH Contract: CHEM02
 Lab Code: CHEM Case No.: Q1172 SAS No.: Q1172 SDG No.: Q1172
 Instrument ID: MSVOA_U Calibration Date(s): 02/10/2025 02/10/2025
 Heated Purge: (Y/N) N Calibration Time(s): 12:59 15:33
 GC Column: DB-624UI ID: 0.18 (mm)

LAB FILE ID:		RRF0.5 = VU063219.D		RRF001 = VU063220.D		RRF002 = VU063221.D			
		RRF005 = VU063222.D		RRF010 = VU063223.D		RRF015 = VU063224.D			
COMPOUND	RRF0.5	RRF001	RRF002	RRF005	RRF010	RRF015	RRF	% RSD	
Chloroform	0.546	0.588	0.543	0.556	0.546	0.526	0.551	3.7	
Bromodichloromethane	0.332	0.402	0.386	0.393	0.391	0.371	0.379	6.7	
Dibromochloromethane	0.238	0.257	0.246	0.256	0.267	0.252	0.253	4	
Bromoform	0.127	0.139	0.142	0.145	0.156	0.151	0.143	7.1	
1,2-Dichlorobenzene-d4	0.314	0.328	0.350	0.336	0.344	0.388	0.343	7.4	
4-Bromofluorobenzene	0.302	0.311	0.330	0.321	0.358	0.356	0.330	7	

* 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.

Method Path : Z:\voasrv\HPCHEM1\MSVOA_U\Method\
 Method File : 524U021025DW.M
 Title : METHOD 524.2 VOLATILES DRINKING WATER
 Last Update : Tue Feb 11 08:42:19 2025
 Response Via : Initial Calibration

Calibration Files

0.5 =VU063219.D 1 =VU063220.D 2 =VU063221.D 5 =VU063222.D 10 =VU063223.D 15 =VU063224.D

Compound		0.5	1	2	5	10	15	Avg	%RSD

1) i	Fluorobenzene	-----ISTD-----							
2) T	Dichlorodifluo...	0.326	0.362	0.329	0.325	0.305	0.302	0.325	6.65
3) t	Chloromethane	0.390	0.400	0.389	0.368	0.352	0.344	0.374	6.06
4) Rt	Vinyl Chloride	0.364	0.390	0.367	0.376	0.366	0.357	0.370	3.13
5) T	Bromomethane	0.198	0.201	0.125	0.189	0.191		0.181	17.62
6) T	Chloroethane	0.245	0.259	0.233	0.223	0.222	0.216	0.233	7.09
7) T	Trichlorofluor...	0.426	0.473	0.452	0.443	0.423	0.416	0.439	4.85
8)	1,1,2-Trichlor...	0.259	0.272	0.253	0.250	0.231	0.230	0.249	6.54
9) Rt	1,1-Dichloroet...	0.256	0.274	0.253	0.250	0.248	0.241	0.254	4.34
10) t	Iodomethane		0.411	0.389	0.411	0.405	0.378	0.399	3.63
11) t	Allyl Chloride	0.340	0.390	0.369	0.364	0.365	0.357	0.364	4.45
12) t	Acrylonitrile	0.051	0.056	0.059	0.060	0.065	0.059	0.059	7.58
13) T	Acetone	0.050	0.047	0.044	0.042	0.047	0.040	0.045	8.41
14) T	Carbon Disulfide	0.944	0.945	0.880	0.869	0.861	0.822	0.887	5.49
15) RT	Methylene Chlo...	0.332	0.333	0.313	0.309	0.304	0.289	0.313	5.41
16) RT	trans-1,2-Dich...	0.292	0.305	0.287	0.288	0.287	0.279	0.290	3.01
17) t	1,1-Dichloroet...	0.523	0.592	0.552	0.549	0.538	0.520	0.546	4.80
18) T	2-Butanone	0.071	0.072	0.067	0.071	0.079	0.070	0.072	5.29
19)	Cyclohexane	0.415	0.423	0.423	0.457	0.453	0.460	0.439	4.65
20)	Methylcyclohexane	0.377	0.448	0.418	0.461	0.448	0.458	0.435	7.44
21) T	2,2-Dichloropr...	0.434	0.463	0.413	0.421	0.418	0.407	0.426	4.71
22) RT	cis-1,2-Dichlo...	0.297	0.332	0.306	0.316	0.316	0.310	0.313	3.74
23) t	Diethyl Ether	0.223	0.231	0.215	0.218	0.216	0.203	0.218	4.22
24) t	tert-Butyl Alc...		0.039	0.027	0.022	0.024	0.021	0.026	27.01
25) t	Methyl tert-Bu...	0.582	0.652	0.618	0.642	0.673	0.635	0.634	4.89
26) t	Bromochloromet...	0.133	0.150	0.132	0.139	0.137	0.130	0.137	5.31
27) t	Chloroform	0.546	0.588	0.543	0.556	0.546	0.526	0.551	3.74
28) RT	1,1,1-Trichlor...	0.433	0.466	0.448	0.459	0.442	0.429	0.446	3.26
29) T	1,1-Dichloropr...	0.368	0.416	0.404	0.404	0.408	0.399	0.400	4.14
30) RT	Carbon Tetrach...	0.371	0.417	0.379	0.383	0.378	0.369	0.383	4.62
31) t	Isopropyl Ether	0.718	0.786	0.766	0.785	0.814	0.808	0.779	4.45
32)	Ethyl-t-butyl ...	0.648	0.686	0.691	0.726	0.755	0.746	0.709	5.72
33)	Tert-Amyl meth...	0.540	0.604	0.585	0.637	0.688	0.661	0.619	8.69
34) t	Propionitrile	0.016	0.020	0.023	0.022	0.025	0.024	0.022	14.47
35) RT	Benzene	1.163	1.280	1.242	1.256	1.232	1.199	1.229	3.40
36) RT	1,2-Dichloroet...	0.351	0.371	0.358	0.357	0.355	0.335	0.355	3.35
37) RT	Trichloroethene	0.287	0.311	0.294	0.290	0.291	0.281	0.292	3.43
38) Rt	1,2-Dichloropr...	0.314	0.333	0.319	0.323	0.326	0.314	0.322	2.27
39) t	Methacrylonitrile	0.062	0.067	0.079	0.087	0.098	0.091	0.080	17.33
40) t	Methyl acrylate	0.118	0.146	0.150	0.157	0.165	0.153	0.148	10.87
41) t	Tetrahydrofuran	0.046	0.046	0.049	0.044	0.051	0.046	0.047	5.91
42) t	1-Chlorobutane	0.484	0.555	0.547	0.578	0.565	0.552	0.547	5.95
43) T	Dibromomethane	0.161	0.173	0.163	0.164	0.163	0.153	0.163	3.96
44) T	Bromodichlorom...	0.332	0.402	0.386	0.393	0.391	0.371	0.379	6.67
45) T	4-Methyl-2-Pen...	0.147	0.155	0.166	0.176	0.197	0.182	0.171	10.64
46) t	t-1,4-Dichloro...	0.071	0.084	0.088	0.072	0.084	0.082	0.080	8.79
47) t	Methyl methacr...	0.112	0.126	0.128	0.148	0.161	0.147	0.137	13.27
48) t	Ethyl methacry...	0.194	0.227	0.244	0.270	0.314	0.296	0.258	17.35
49) Rt	Toluene	0.607	0.705	0.706	0.745	0.744	0.732	0.707	7.37
50) T	t-1,3-Dichloro...	0.284	0.343	0.343	0.362	0.383	0.368	0.347	9.93
51) T	cis-1,3-Dichlo...	0.378	0.427	0.430	0.435	0.459	0.444	0.429	6.40
52) RT	1,1,2-Trichlor...	0.211	0.225	0.219	0.221	0.228	0.214	0.220	2.98
53) t	1,3-Dichloropr...	0.354	0.408	0.393	0.400	0.405	0.379	0.390	5.20
54) t	2-Hexanone	0.094	0.109	0.115	0.118	0.136	0.128	0.117	12.64
55) t	Dibromochlorom...	0.238	0.257	0.246	0.256	0.267	0.252	0.253	3.96
56) T	1,2-Dibromoethane	0.194	0.206	0.202	0.209	0.219	0.205	0.206	4.03
57) S	4-Bromofluorob...	0.302	0.311	0.330	0.321	0.358	0.356	0.330	7.00

Method Path : Z:\voasrv\HPCHEM1\MSVOA_U\Method\										
Method File : 524U021025DW.M										
58)	RT	Tetrachloroethene	0.242	0.258	0.236	0.250	0.234	0.225	0.241	4.94
59)	Rt	Chlorobenzene	0.676	0.752	0.745	0.775	0.768	0.758	0.746	4.79
60)	T	1,1,1,2-Tetrac...	0.254	0.279	0.264	0.269	0.274	0.268	0.268	3.18
61)	t	Pentachloroethane	0.209	0.246	0.251	0.240	0.241	0.250	0.239	6.51
62)	t	Hexachloroethane	0.179	0.215	0.214	0.210	0.222	0.232	0.212	8.47
63)	Rt	Ethyl Benzene	1.075	1.229	1.246	1.363	1.403	1.399	1.286	9.96
64)	RT	m/p-Xylenes	0.374	0.444	0.475	0.526	0.536	0.528	0.480	13.21
65)	RT	o-Xylene	0.374	0.449	0.469	0.502	0.514	0.513	0.470	11.48
66)	RT	Styrene	0.562	0.675	0.721	0.815	0.856	0.862	0.748	15.82
67)	t	Bromoform	0.127	0.139	0.142	0.145	0.156	0.151	0.143	7.11
68)	S	1,2-Dichlorobe...	0.314	0.328	0.350	0.336	0.344	0.388	0.343	7.36
69)	T	Isopropylbenzene	0.889	1.035	1.086	1.184	1.212	1.226	1.106	11.74
70)	T	1,1,2,2-Tetrac...	0.260	0.304	0.306	0.292	0.310	0.303	0.296	6.25
71)	T	1,2,3-Trichlor...	0.220	0.222	0.246	0.213	0.204	0.230	0.222	6.49
72)	t	Bromobenzene	0.253	0.303	0.295	0.308	0.314	0.314	0.298	7.83
73)	t	n-propylbenzene	0.242	0.286	0.314	0.344	0.354	0.359	0.317	14.49
74)	t	2-Chlorotoluene	0.228	0.278	0.292	0.315	0.316	0.321	0.292	12.05
75)	t	1,3,5-Trimethy...	0.741	0.939	1.024	1.125	1.148	1.169	1.024	15.99
76)	t	4-Chlorotoluene	0.237	0.292	0.297	0.320	0.321	0.327	0.299	11.24
77)	t	tert-Butylbenzene	0.854	0.987	1.030	1.074	1.118	1.153	1.036	10.34
78)	t	1,2,4-Trimethy...	0.709	0.905	1.009	1.126	1.157	1.192	1.016	18.12
79)	t	sec-Butylbenzene	1.016	1.226	1.318	1.415	1.442	1.498	1.319	13.42
80)		Nitrobenzene	0.004	0.006	0.007	0.009	0.009	0.009	0.007	30.30
81)	t	p-Isopropyltol...	0.745	0.942	1.033	1.137	1.168	1.222	1.041	16.95
82)	t	1,3-Dichlorobe...	0.531	0.551	0.589	0.589	0.596	0.611	0.578	5.23
83)	Rt	1,4-Dichlorobe...	0.485	0.514	0.581	0.593	0.601	0.617	0.565	9.37
84)	t	n-Butylbenzene	0.693	0.822	0.907	0.992	1.044	1.142	0.933	17.26
85)	Rt	1,2-Dichlorobe...	0.481	0.538	0.571	0.563	0.574	0.604	0.555	7.60
86)	t	1,2-Dibromo-3-...	0.031	0.041	0.039	0.043	0.049	0.046	0.042	14.63
87)	Rt	1,2,4-Trichlor...	0.206	0.246	0.253	0.282	0.308	0.331	0.271	16.72
88)	t	Hexachlorobuta...	0.186	0.197	0.203	0.191	0.182	0.202	0.194	4.41
89)	t	Naphthalene	0.315	0.335	0.379	0.441	0.556	0.592	0.436	26.52
90)	t	1,2,3-Trichlor...	0.219	0.237	0.239	0.275	0.303	0.318	0.265	15.07

(#) = Out of Range

Data Path : Z:\voasrv\HPCHEM1\MSVOA_U\Data\VU021025\
 Data File : VU063219.D
 Acq On : 10 Feb 2025 12:59
 Operator : MD/SY
 Sample : VSTDICC0.5
 Misc : 25.0mL/MSVOA_U/WATER
 ALS Vial : 3 Sample Multiplier: 1

Instrument :
 MSVOA_U
 ClientSampleId :
 VSTDICC0.5

Quant Time: Feb 11 03:57:11 2025
 Quant Method : Z:\voasrv\HPCHEM1\MSVOA_U\Method\524U021025DW.M
 Quant Title : METHOD 524.2 VOLATILES DRINKING WATER
 QLast Update : Tue Feb 11 03:56:39 2025
 Response via : Initial Calibration

Manual Integrations APPROVED

Reviewed By :Amit Patel 02/12/2025
 Supervised By :Mahesh Dadoda 02/12/2025

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	6.107	96	49900	1.000	ug/l	# 0.00
System Monitoring Compounds						
57) 4-Bromofluorobenzene	10.627	95	15091	0.917	ug/l	0.00
Spiked Amount 1.000			Recovery	=	92.000%	
68) 1,2-Dichlorobenzene-d4	12.187	152	15652	0.914	ug/l	0.00
Spiked Amount 1.000			Recovery	=	91.000%	
Target Compounds						
					Qvalue	
2) Dichlorodifluoromethane	1.380	85	8130	0.501	ug/l	99
3) Chloromethane	1.518	50	9740	0.522	ug/l	100
4) Vinyl Chloride	1.599	62	9090	0.492	ug/l	98
5) Bromomethane	1.849	94	4941	0.578	ug/l	82
6) Chloroethane	1.927	64	6121	0.526	ug/l	90
7) Trichlorofluoromethane	2.129	101	10617	0.485	ug/l	92
8) 1,1,2-Trichloro-1,2,2-...	2.570	101	6464	0.520	ug/l	95
9) 1,1-Dichloroethene	2.573	96	6378	0.504	ug/l	95
11) Allyl Chloride	2.917	41	8493	0.467	ug/l	91
12) Acrylonitrile	3.332	53	2569m	0.893	ug/l	
13) Acetone	2.618	43	6197	2.760	ug/l	90
14) Carbon Disulfide	2.782	76	23559	0.532	ug/l	100
15) Methylene Chloride	3.033	84	8284	0.530	ug/l	96
16) trans-1,2-Dichloroethene	3.348	96	7275	0.504	ug/l	99
17) 1,1-Dichloroethane	3.856	63	13044	0.479	ug/l	96
18) 2-Butanone	4.730	43	8910m	2.456	ug/l	
19) Cyclohexane	5.377	56	10342m	0.473	ug/l	
20) Methylcyclohexane	6.753	83	9399	0.433	ug/l	96
21) 2,2-Dichloropropane	4.653	77	10817	0.509	ug/l	95
22) cis-1,2-Dichloroethene	4.663	96	7417	0.475	ug/l	91
23) Diethyl Ether	2.367	59	5553	0.511	ug/l	95
25) Methyl tert-Butyl Ether	3.354	73	14531	0.460	ug/l	98
26) Bromochloromethane	4.968	128	3323	0.487	ug/l	95
27) Chloroform	5.081	83	13627	0.496	ug/l	93
28) 1,1,1-Trichloroethane	5.306	97	10801	0.485	ug/l	98
29) 1,1-Dichloropropene	5.518	75	9175	0.460	ug/l	99
30) Carbon Tetrachloride	5.515	117	9251	0.485	ug/l	93
31) Isopropyl Ether	3.978	45	17908	0.461	ug/l	98
32) Ethyl-t-butyl ether	4.492	59	16177	0.458	ug/l	99
33) Tert-Amyl methyl ether	5.930	73	13471	0.436	ug/l	99
34) Propionitrile	4.801	54	2034m	1.809	ug/l	
35) Benzene	5.769	78	29011	0.473	ug/l	98
36) 1,2-Dichloroethane	5.791	62	8750	0.494	ug/l	# 95
37) Trichloroethene	6.537	130	7149	0.490	ug/l	94
38) 1,2-Dichloropropane	6.782	63	7842	0.489	ug/l	98
39) Methacrylonitrile	5.017	41	1535m	0.382	ug/l	
40) Methyl acrylate	4.920	55	2955m	0.403	ug/l	
41) Tetrahydrofuran	5.065	42	2289	0.970	ug/l	# 58
42) 1-Chlorobutane	5.451	56	12081	0.443	ug/l	92
43) Dibromomethane	6.910	93	4024	0.495	ug/l	94
44) Bromodichloromethane	7.100	83	8280	0.438	ug/l	# 99
45) 4-Methyl-2-Pentanone	7.785	43	18398	2.160	ug/l	# 91
46) t-1,4-Dichloro-2-butene	10.823	75	3537m	0.839	ug/l	

Data Path : Z:\voasrv\HPCHEM1\MSVOA_U\Data\VU021025\
 Data File : VU063219.D
 Acq On : 10 Feb 2025 12:59
 Operator : MD/SY
 Sample : VSTDIC0.5
 Misc : 25.0mL/MSVOA_U/WATER
 ALS Vial : 3 Sample Multiplier: 1

Instrument :
 MSVOA_U
 ClientSampleId :
 VSTDIC0.5

Manual Integrations
 APPROVED

Reviewed By :Amit Patel 02/12/2025
 Supervised By :Mahesh Dadoda 02/12/2025

Quant Time: Feb 11 03:57:11 2025
 Quant Method : Z:\voasrv\HPCHEM1\MSVOA_U\Method\524U021025DW.M
 Quant Title : METHOD 524.2 VOLATILES DRINKING WATER
 QLast Update : Tue Feb 11 03:56:39 2025
 Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
47) Methyl methacrylate	6.965	69	5580m	0.815	ug/l	
48) Ethyl methacrylate	8.332	69	4839	0.377	ug/l	91
49) Toluene	7.962	92	15136	0.429	ug/l	97
50) t-1,3-Dichloropropene	8.209	75	7086	0.409	ug/l	99
51) cis-1,3-Dichloropropene	7.605	75	9424	0.441	ug/l	91
52) 1,1,2-Trichloroethane	8.393	97	5257	0.480	ug/l	94
53) 1,3-Dichloropropane	8.566	76	8834	0.454	ug/l	96
54) 2-Hexanone	8.685	43	11692m	2.011	ug/l	
55) Dibromochloromethane	8.801	129	5934	0.471	ug/l	97
56) 1,2-Dibromoethane	8.917	107	4834	0.470	ug/l	90
58) Tetrachloroethene	8.544	164	6044	0.503	ug/l	88
59) Chlorobenzene	9.441	112	16870	0.453	ug/l	96
60) 1,1,1,2-Tetrachloroethane	9.524	131	6349	0.475	ug/l	97
61) Pentachloroethane	11.418	117	5212	0.436	ug/l	98
62) Hexachloroethane	12.466	117	4467	0.423	ug/l	97
63) Ethyl Benzene	9.563	91	26810	0.418	ug/l	98
64) m/p-Xylenes	9.685	106	18658	0.778	ug/l	96
65) o-Xylene	10.094	106	9329	0.398	ug/l	99
66) Styrene	10.113	104	14012	0.375	ug/l	98
67) Bromoform	10.283	173	3160	0.442	ug/l	95
69) Isopropylbenzene	10.476	105	22191	0.402	ug/l	99
70) 1,1,2,2-Tetrachloroethane	10.772	83	6493	0.440	ug/l	97
71) 1,2,3-Trichloropropane	10.817	75	5487m	0.490	ug/l	
72) Bromobenzene	10.778	156	6302	0.424	ug/l	92
73) n-propylbenzene	10.901	120	6029	0.382	ug/l	97
74) 2-Chlorotoluene	10.981	126	5699	0.392	ug/l	97
75) 1,3,5-Trimethylbenzene	11.081	105	18487	0.362	ug/l	98
76) 4-Chlorotoluene	11.093	126	5912	0.396	ug/l	88
77) tert-Butylbenzene	11.412	119	21304	0.412	ug/l	95
78) 1,2,4-Trimethylbenzene	11.460	105	17694	0.349	ug/l	95
79) sec-Butylbenzene	11.637	105	25352	0.385	ug/l	100
81) p-Isopropyltoluene	11.785	119	18576	0.358	ug/l	98
82) 1,3-Dichlorobenzene	11.740	146	13255	0.460	ug/l	97
83) 1,4-Dichlorobenzene	11.833	146	12096	0.429	ug/l	99
84) n-Butylbenzene	12.206	91	17297	0.369	ug/l	95
85) 1,2-Dichlorobenzene	12.209	146	11996	0.433	ug/l	98
86) 1,2-Dibromo-3-Chloropr...	12.997	75	779	0.376	ug/l	90
87) 1,2,4-Trichlorobenzene	13.839	180	5130	0.380	ug/l	94
88) Hexachlorobutadiene	14.013	225	4651	0.482	ug/l	96
89) Naphthalene	14.097	128	7859	0.899	ug/l #	93
90) 1,2,3-Trichlorobenzene	14.328	180	5453	0.412	ug/l	98

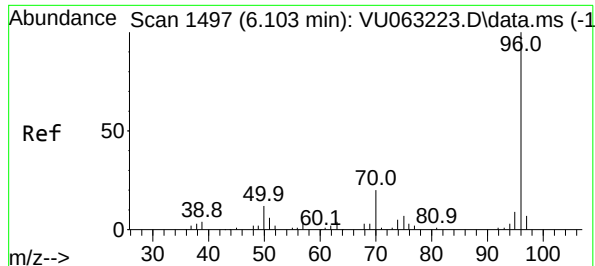
(#) = qualifier out of range (m) = manual integration (+) = signals summed

Instrument :
MSVOA_U
ClientSampleId :
VSTDICCO.5

Manual Integrations APPROVED

Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025





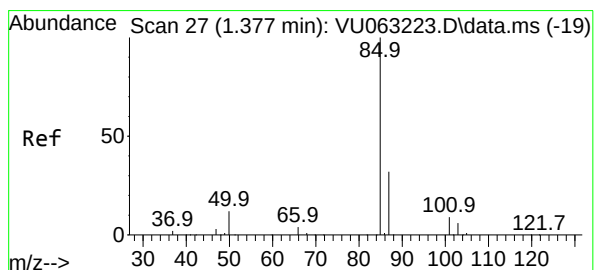
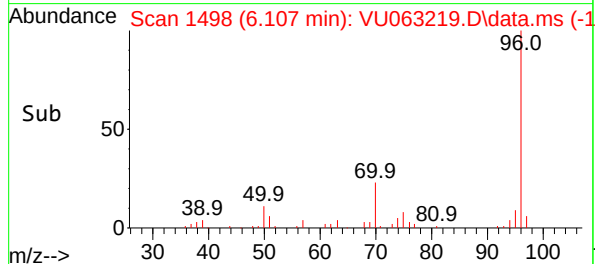
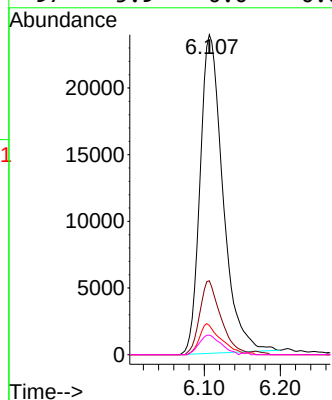
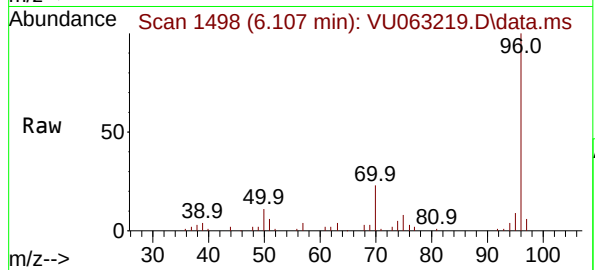
#1
Fluorobenzene
Concen: 1.000 ug/l
RT: 6.107 min Scan# 1497
Delta R.T. 0.004 min
Lab File: VU063219.D
Acq: 10 Feb 2025 12:59

Instrument :
MSVOA_U
ClientSampleId :
VSTDIC0.5

Tgt Ion: 96 Resp: 49900
Ion Ratio Lower Upper
96 100
70 20.5 15.6 23.4
95 8.6 7.3 10.9
97 5.9 0.0 0.0#

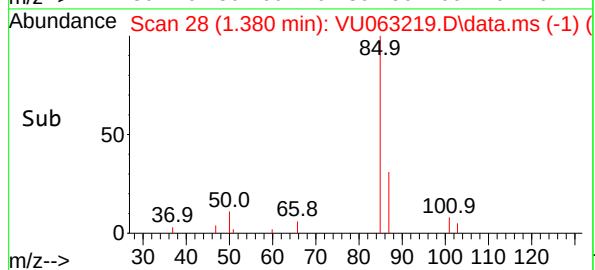
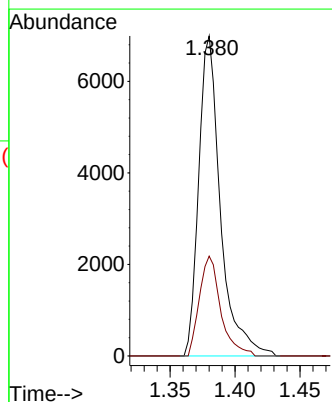
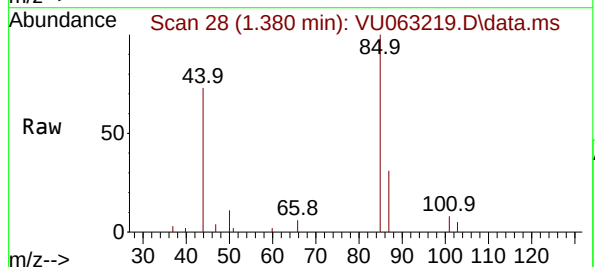
Manual Integrations
APPROVED

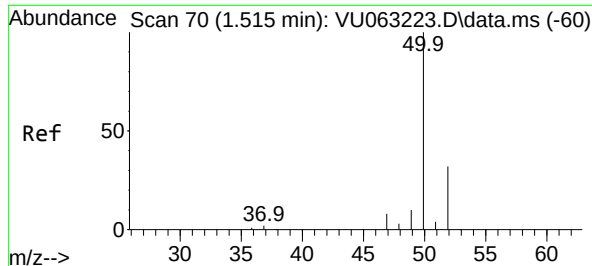
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#2
Dichlorodifluoromethane
Concen: 0.501 ug/l
RT: 1.380 min Scan# 28
Delta R.T. 0.003 min
Lab File: VU063219.D
Acq: 10 Feb 2025 12:59

Tgt Ion: 85 Resp: 8130
Ion Ratio Lower Upper
85 100
87 31.2 16.0 48.0





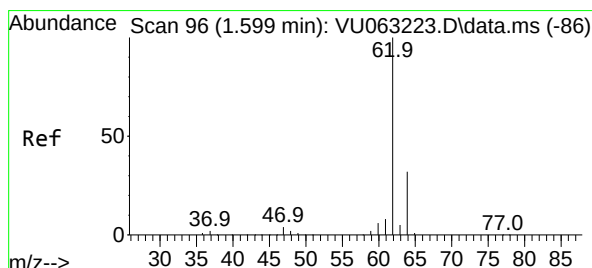
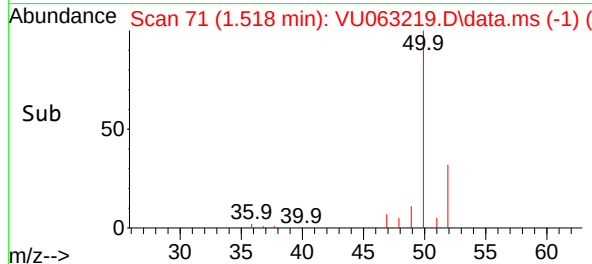
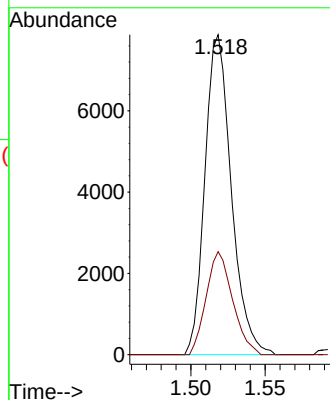
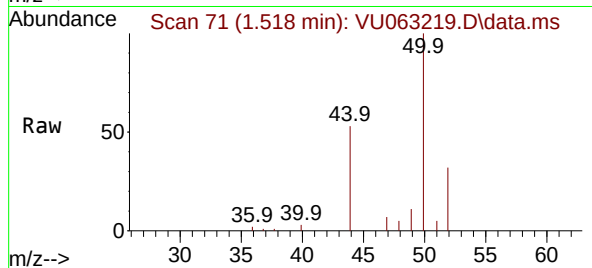
#3
Chloromethane
Concen: 0.522 ug/l
RT: 1.518 min Scan# 70
Delta R.T. 0.003 min
Lab File: VU063219.D
Acq: 10 Feb 2025 12:59

Instrument :
MSVOA_U
ClientSampleId :
VSTDICC0.5

Tgt Ion: 50 Resp: 9740
Ion Ratio Lower Upper
50 100
52 32.2 25.8 38.8

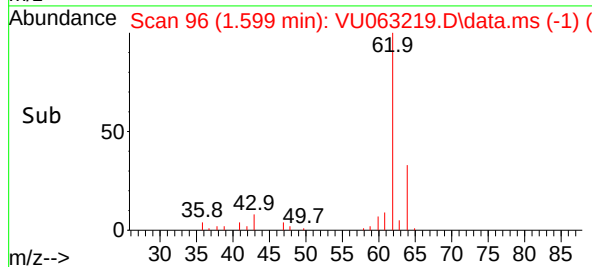
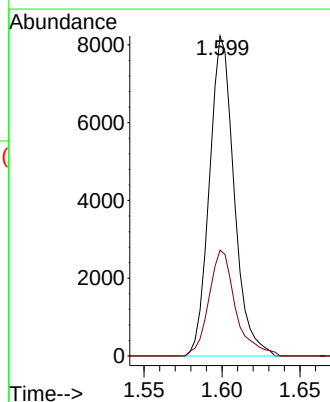
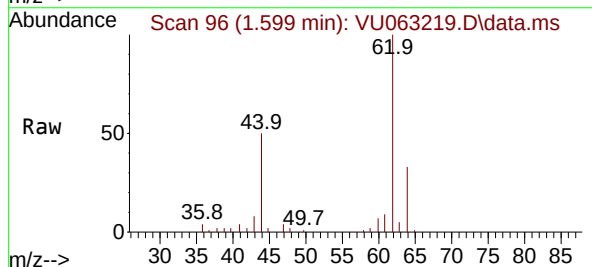
Manual Integrations
APPROVED

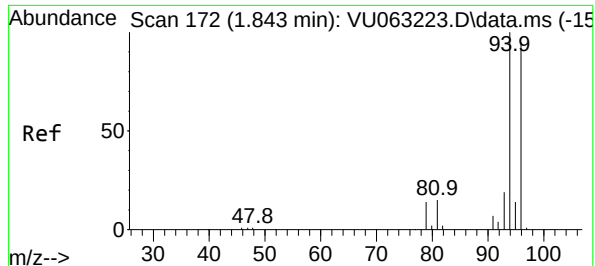
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#4
Vinyl Chloride
Concen: 0.492 ug/l
RT: 1.599 min Scan# 96
Delta R.T. -0.000 min
Lab File: VU063219.D
Acq: 10 Feb 2025 12:59

Tgt Ion: 62 Resp: 9090
Ion Ratio Lower Upper
62 100
64 33.0 25.4 38.0





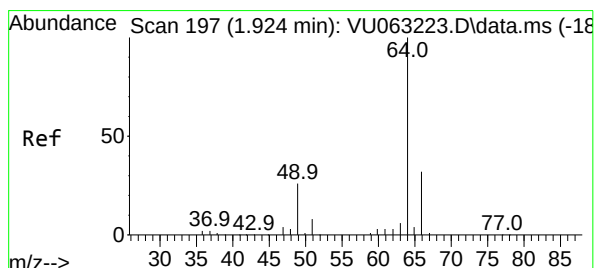
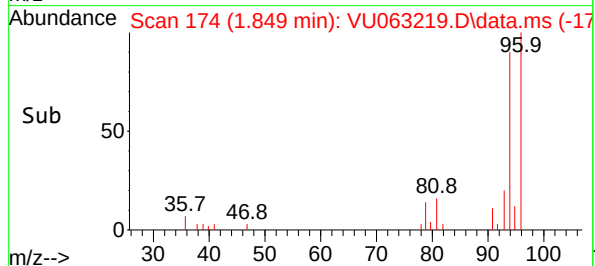
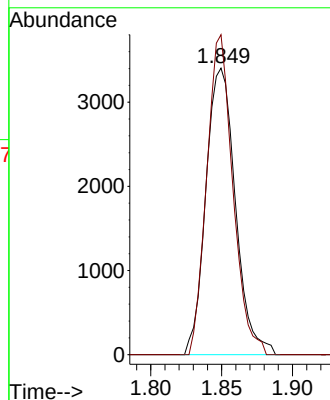
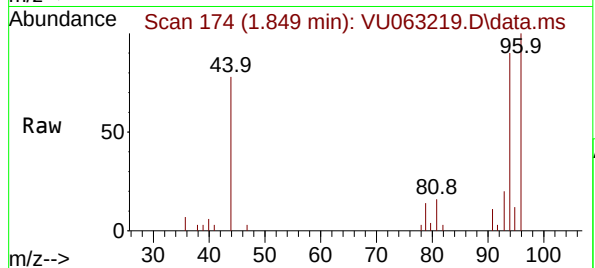
#5
Bromomethane
Concen: 0.578 ug/l
RT: 1.849 min Scan# 11
Delta R.T. 0.006 min
Lab File: VU063219.D
Acq: 10 Feb 2025 12:59

Instrument :
MSVOA_U
ClientSampleId :
VSTDICC0.5

Tgt Ion: 94 Resp: 494
Ion Ratio Lower Upper
94 100
96 111.7 75.7 113.5

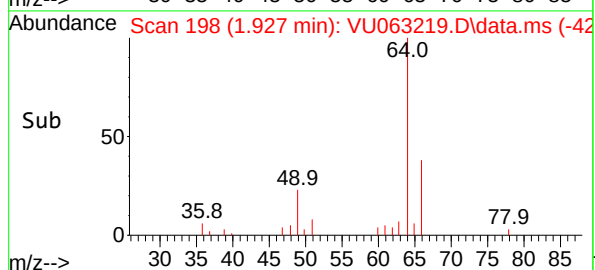
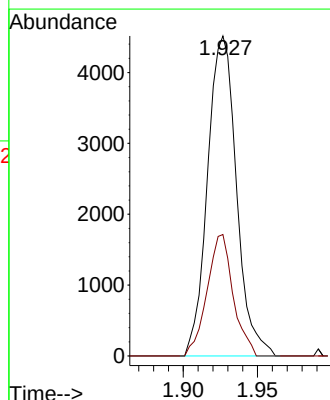
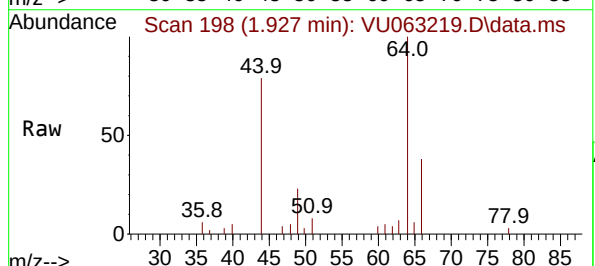
Manual Integrations
APPROVED

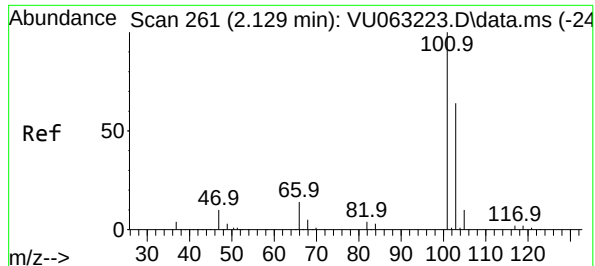
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#6
Chloroethane
Concen: 0.526 ug/l
RT: 1.927 min Scan# 198
Delta R.T. 0.003 min
Lab File: VU063219.D
Acq: 10 Feb 2025 12:59

Tgt Ion: 64 Resp: 6121
Ion Ratio Lower Upper
64 100
66 38.0 25.8 38.8





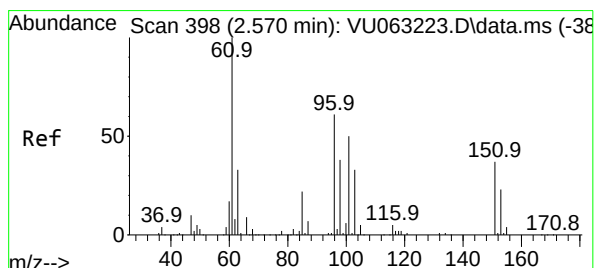
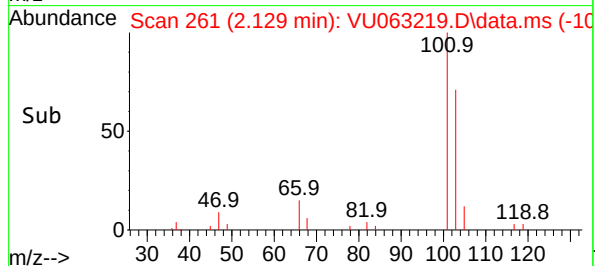
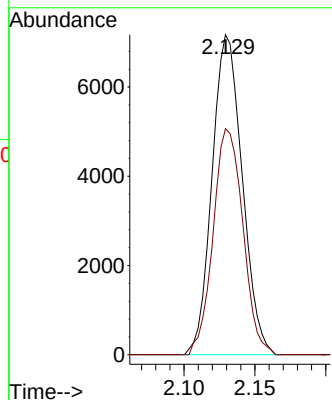
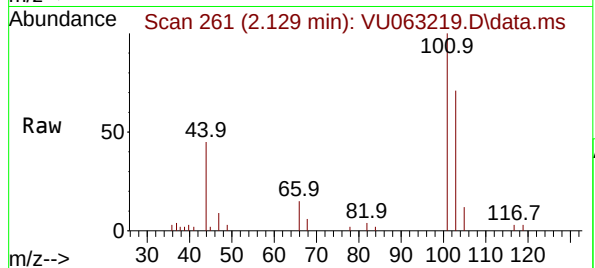
#7
Trichlorofluoromethane
Concen: 0.485 ug/l
RT: 2.129 min Scan# 206
Delta R.T. -0.000 min
Lab File: VU063219.D
Acq: 10 Feb 2025 12:59

Instrument :
MSVOA_U
ClientSampleId :
VSTDICC0.5

Tgt Ion:101 Resp: 1061
Ion Ratio Lower Upper
101 100
103 70.6 51.4 77.2

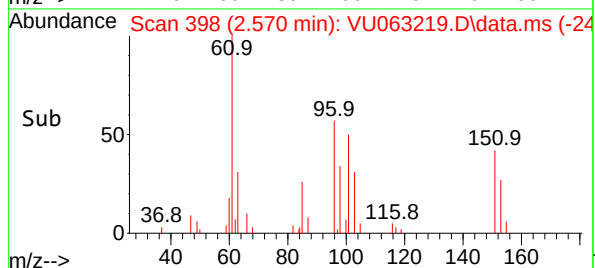
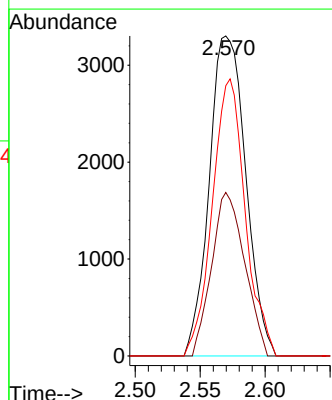
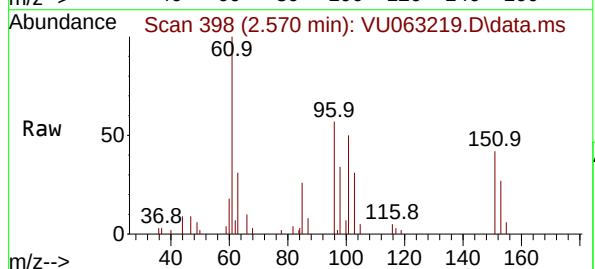
Manual Integrations
APPROVED

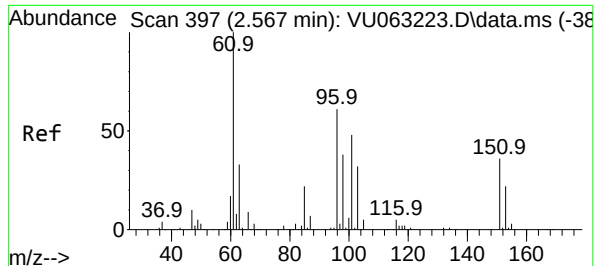
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#8
1,1,2-Trichloro-1,2,2-trifluoroethane
Concen: 0.520 ug/l
RT: 2.570 min Scan# 398
Delta R.T. -0.000 min
Lab File: VU063219.D
Acq: 10 Feb 2025 12:59

Tgt Ion:101 Resp: 6464
Ion Ratio Lower Upper
101 100
85 46.2 35.4 53.0
151 77.9 58.5 87.7





#9

1,1-Dichloroethene

Concen: 0.504 ug/l

RT: 2.573 min Scan# 397

Delta R.T. 0.006 min

Lab File: VU063219.D

Acq: 10 Feb 2025 12:59

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC0.5

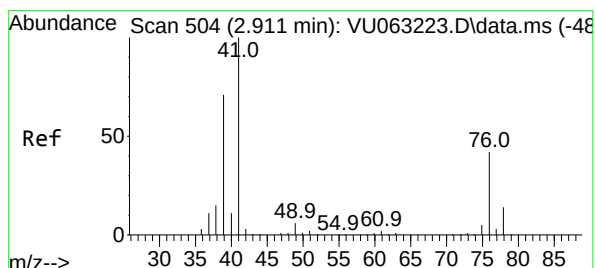
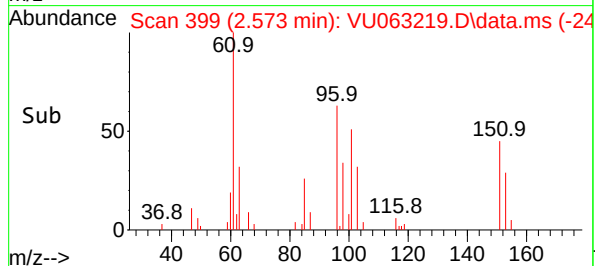
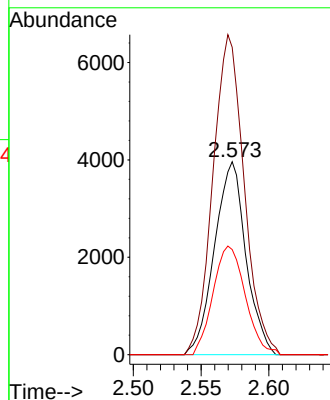
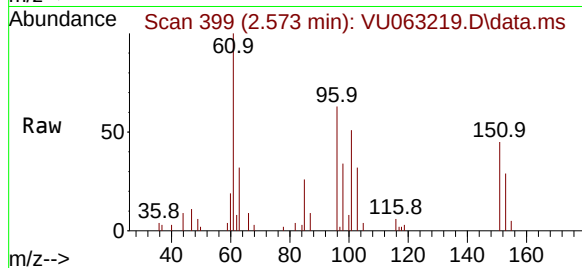
Tgt Ion:	96	Resp:	6378
Ion	Ratio	Lower	Upper
96	100		
61	159.4	0.0	492.9
98	54.5	0.0	124.0

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#11

Allyl Chloride

Concen: 0.467 ug/l

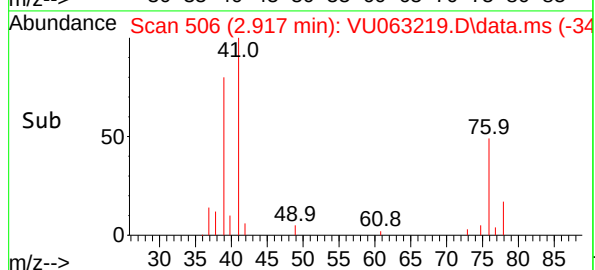
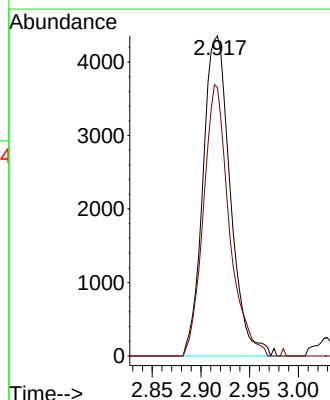
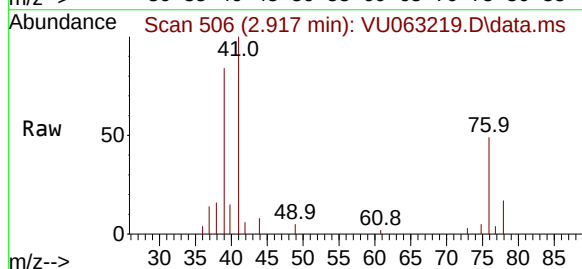
RT: 2.917 min Scan# 506

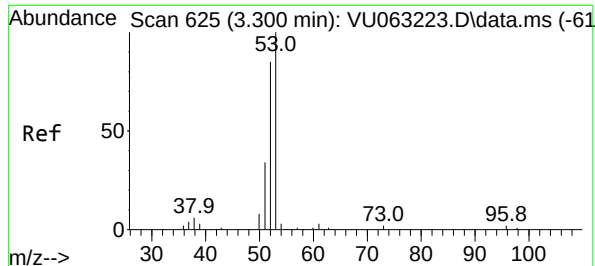
Delta R.T. 0.006 min

Lab File: VU063219.D

Acq: 10 Feb 2025 12:59

Tgt Ion:	41	Resp:	8493
Ion	Ratio	Lower	Upper
41	100		
39	80.2	57.9	86.9





#12

Acrylonitrile

Concen: 0.893 ug/l m

RT: 3.332 min Scan# 61

Delta R.T. 0.032 min

Lab File: VU063219.D

Acq: 10 Feb 2025 12:59

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC0.5

Tgt Ion: 53 Resp: 2569

Ion Ratio Lower Upper

53 100

52 57.8 64.2 96.2

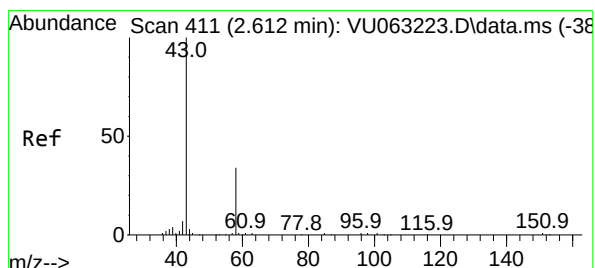
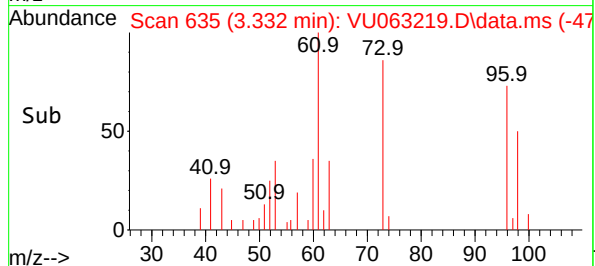
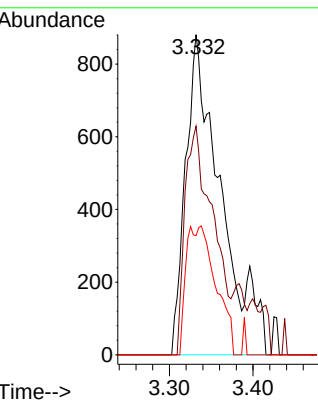
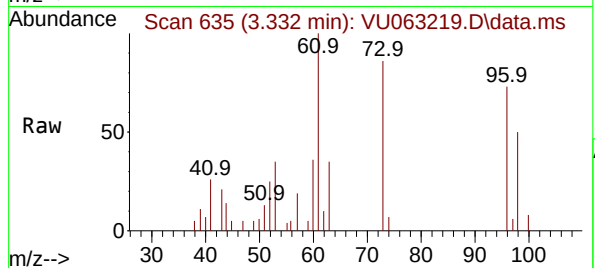
51 12.6 30.8 46.2

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#13

Acetone

Concen: 2.760 ug/l

RT: 2.618 min Scan# 413

Delta R.T. 0.006 min

Lab File: VU063219.D

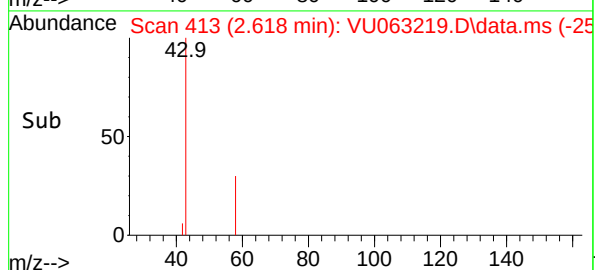
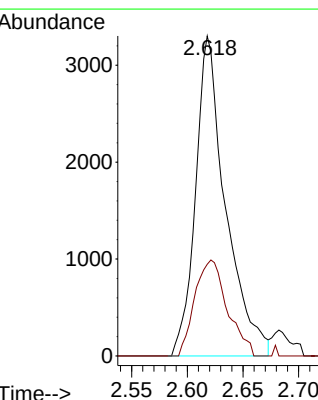
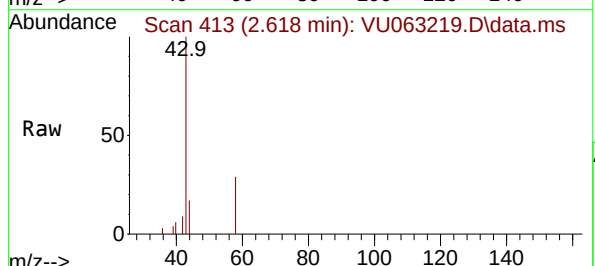
Acq: 10 Feb 2025 12:59

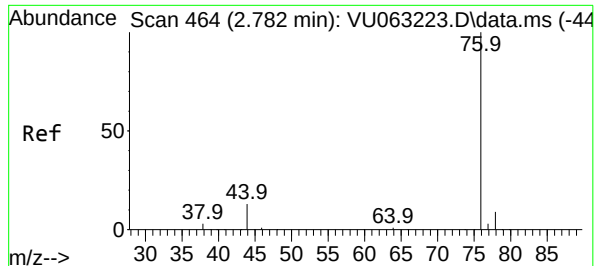
Tgt Ion: 43 Resp: 6197

Ion Ratio Lower Upper

43 100

58 28.6 27.4 41.0





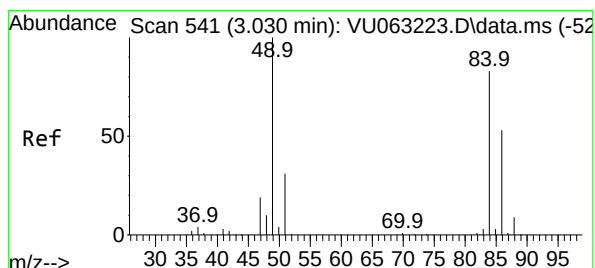
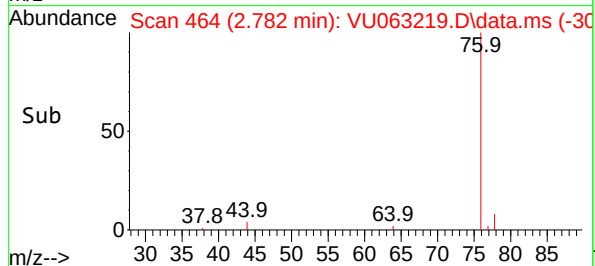
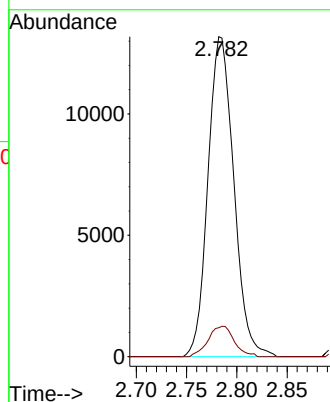
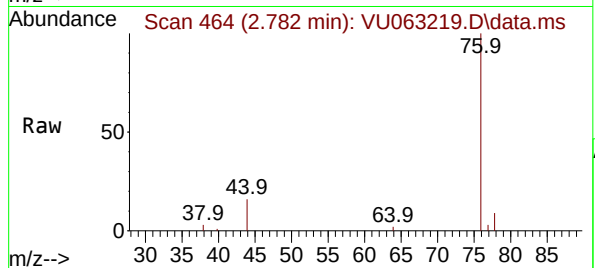
#14
Carbon Disulfide
Concen: 0.532 ug/l
RT: 2.782 min Scan# 464
Delta R.T. -0.000 min
Lab File: VU063219.D
Acq: 10 Feb 2025 12:59

Instrument :
MSVOA_U
ClientSampleId :
VSTDIC0.5

Tgt Ion: 76 Resp: 2355
Ion Ratio Lower Upper
76 100
78 9.1 7.2 10.8

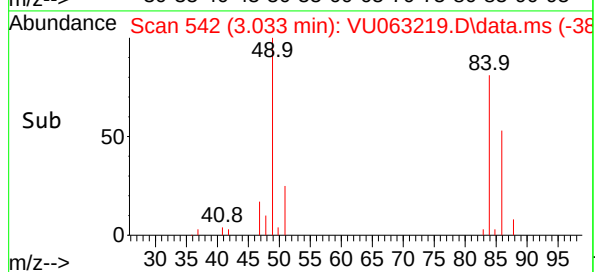
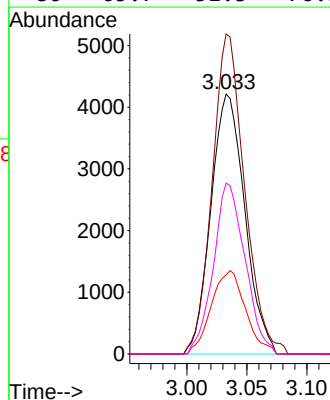
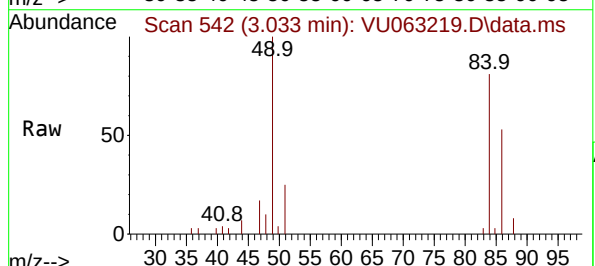
Manual Integrations
APPROVED

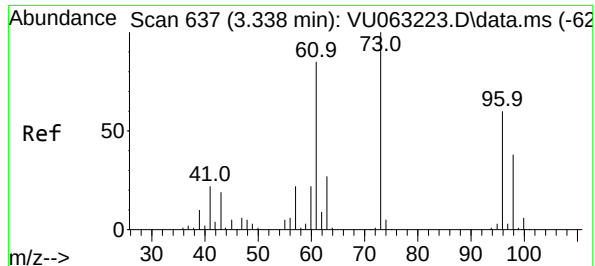
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#15
Methylene Chloride
Concen: 0.530 ug/l
RT: 3.033 min Scan# 542
Delta R.T. 0.003 min
Lab File: VU063219.D
Acq: 10 Feb 2025 12:59

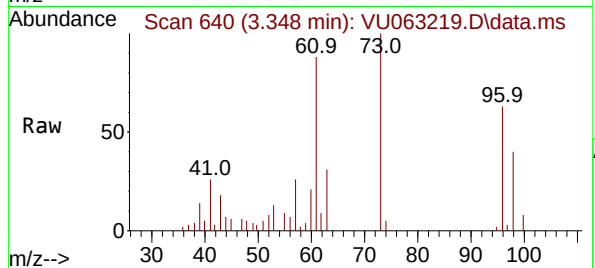
Tgt Ion: 84 Resp: 8284
Ion Ratio Lower Upper
84 100
49 123.1 96.4 144.6
51 30.5 0.0 74.8
86 65.7 51.3 76.9





#16
trans-1,2-Dichloroethene
Concen: 0.504 ug/l
RT: 3.348 min Scan# 640
Delta R.T. 0.010 min
Lab File: VU063219.D
Acq: 10 Feb 2025 12:59

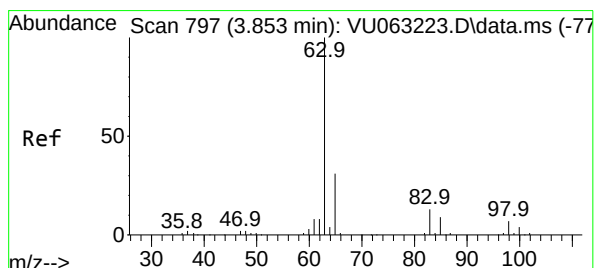
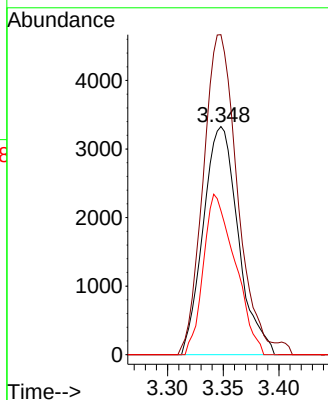
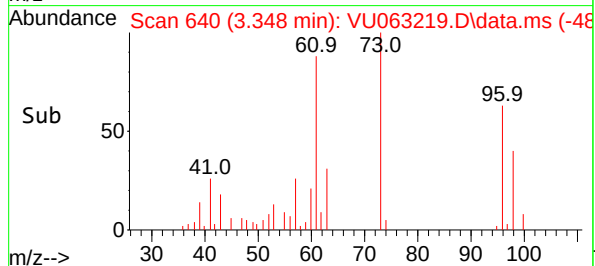
Instrument :
MSVOA_U
ClientSampleId :
VSTDIC0.5



Tgt Ion: 96 Resp: 727
Ion Ratio Lower Upper
96 100
61 140.2 113.4 170.2
98 63.1 51.2 76.8

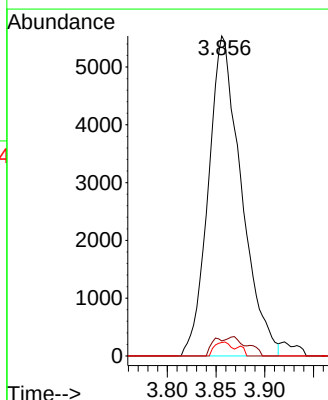
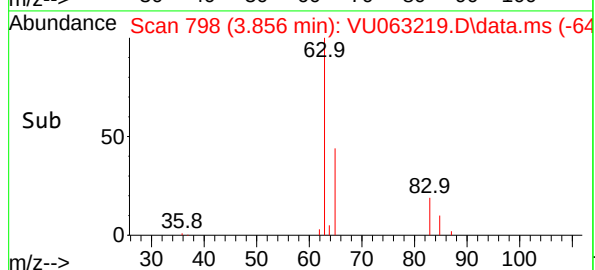
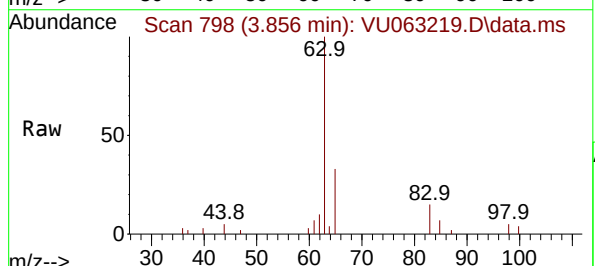
Manual Integrations
APPROVED

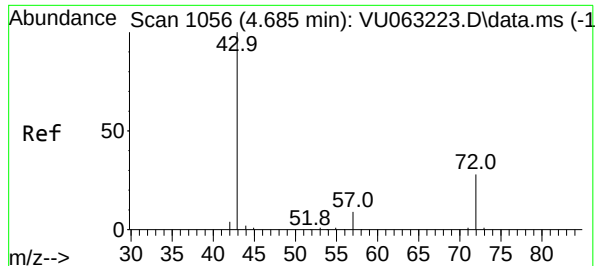
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#17
1,1-Dichloroethane
Concen: 0.479 ug/l
RT: 3.856 min Scan# 798
Delta R.T. 0.003 min
Lab File: VU063219.D
Acq: 10 Feb 2025 12:59

Tgt Ion: 63 Resp: 13044
Ion Ratio Lower Upper
63 100
98 4.7 3.3 9.9
100 4.2 2.1 6.2





#18

2-Butanone

Concen: 2.456 ug/l m

RT: 4.730 min Scan# 1070

Delta R.T. 0.045 min

Lab File: VU063219.D

Acq: 10 Feb 2025 12:59

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC0.5

Tgt Ion: 43 Resp: 8910

Ion Ratio Lower Upper

43 100

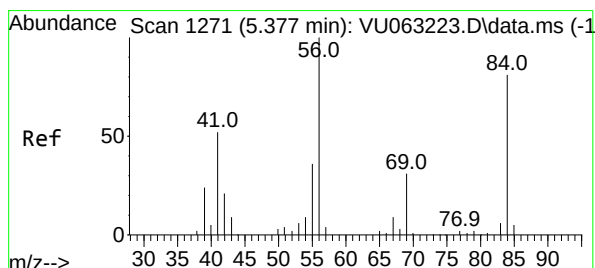
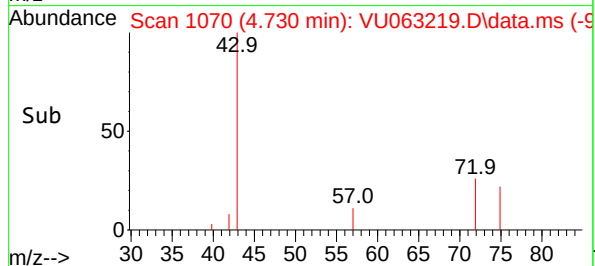
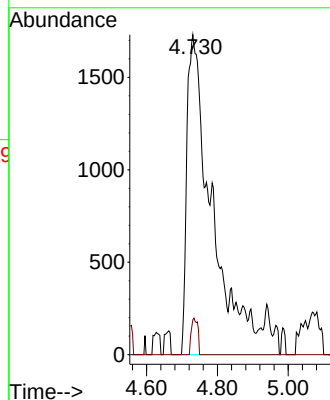
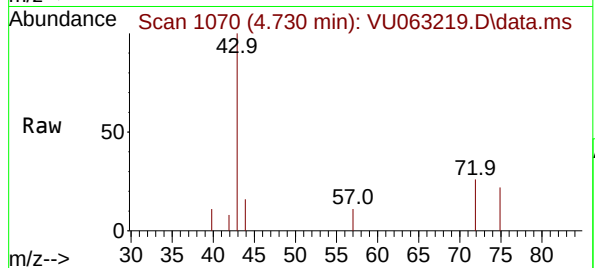
57 10.9 0.0 17.0

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#19

Cyclohexane

Concen: 0.473 ug/l m

RT: 5.377 min Scan# 1271

Delta R.T. -0.000 min

Lab File: VU063219.D

Acq: 10 Feb 2025 12:59

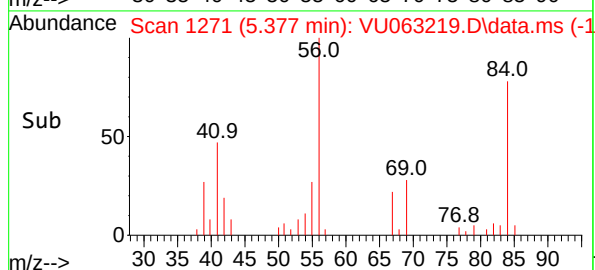
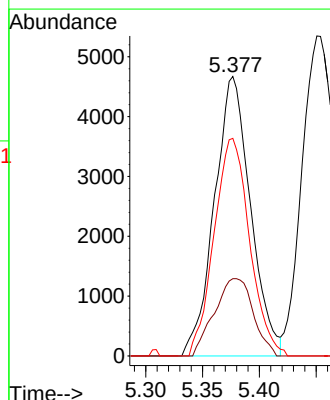
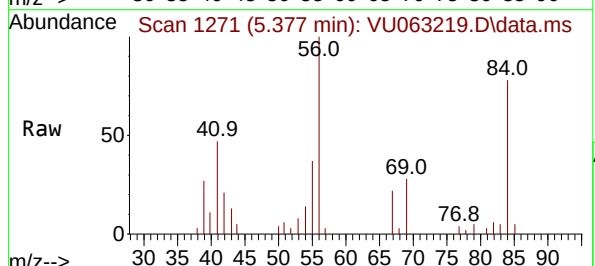
Tgt Ion: 56 Resp: 10342

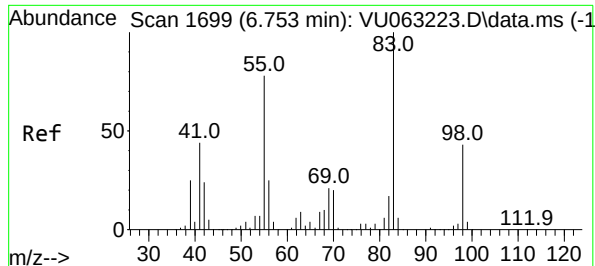
Ion Ratio Lower Upper

56 100

69 29.7 24.5 36.7

84 76.6 65.2 97.8





#20

Methylcyclohexane

Concen: 0.433 ug/l

RT: 6.753 min Scan# 1

Delta R.T. -0.000 min

Lab File: VU063219.D

Acq: 10 Feb 2025 12:59

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC0.5

Tgt Ion: 83 Resp: 939

Ion Ratio Lower Upper

83 100

55 84.6 63.1 94.7

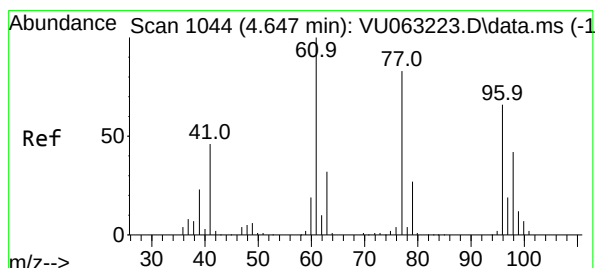
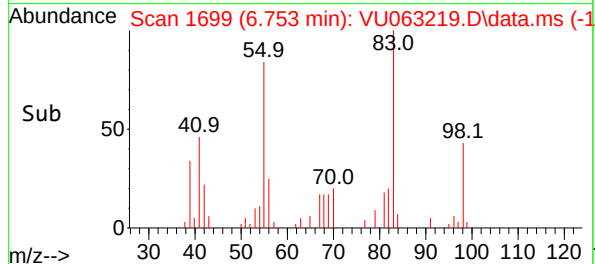
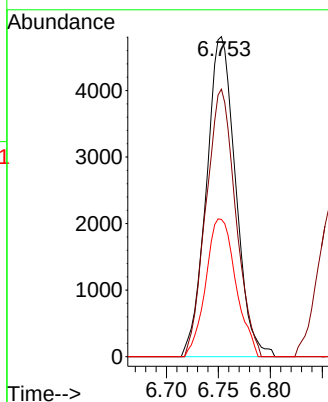
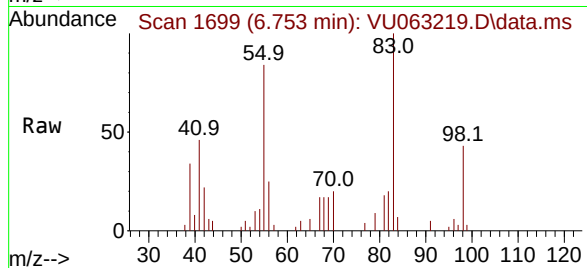
98 44.2 35.2 52.8

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#21

2,2-Dichloropropane

Concen: 0.509 ug/l

RT: 4.653 min Scan# 1046

Delta R.T. 0.006 min

Lab File: VU063219.D

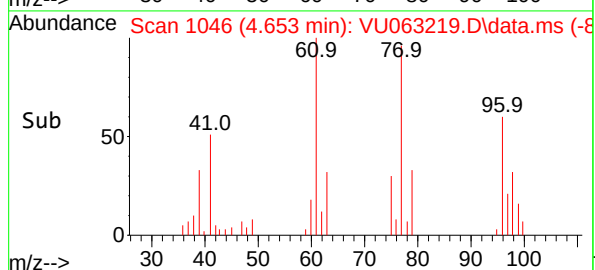
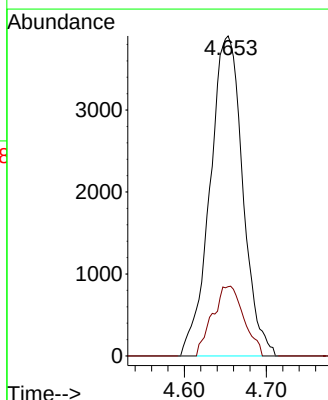
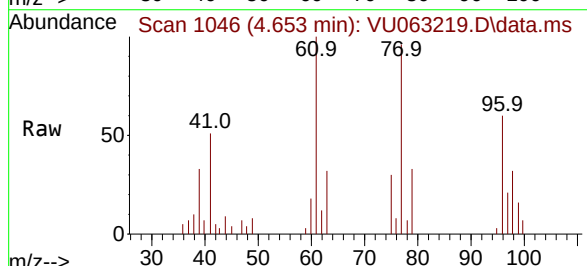
Acq: 10 Feb 2025 12:59

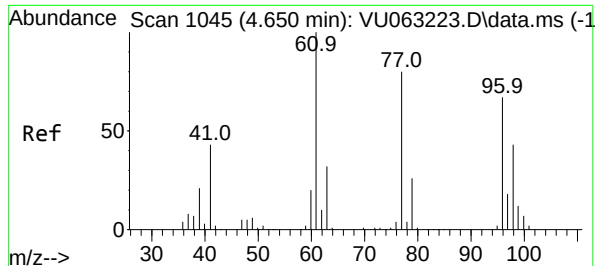
Tgt Ion: 77 Resp: 10817

Ion Ratio Lower Upper

77 100

97 20.9 18.5 27.7





#22

cis-1,2-Dichloroethene

Concen: 0.475 ug/l

RT: 4.663 min Scan# 1049

Delta R.T. 0.013 min

Lab File: VU063219.D

Acq: 10 Feb 2025 12:59

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC0.5

Tgt Ion: 96 Resp: 741

Ion Ratio Lower Upper

96 100

61 163.8 0.0 373.3

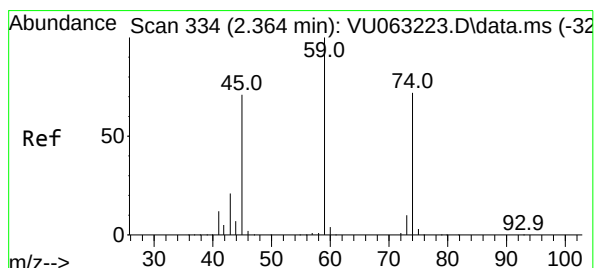
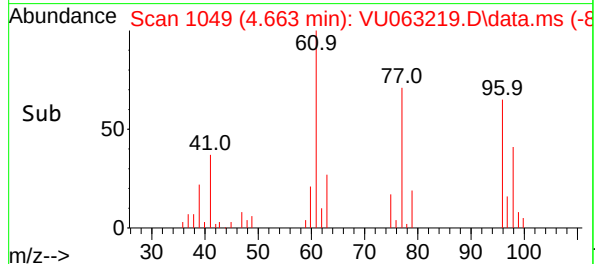
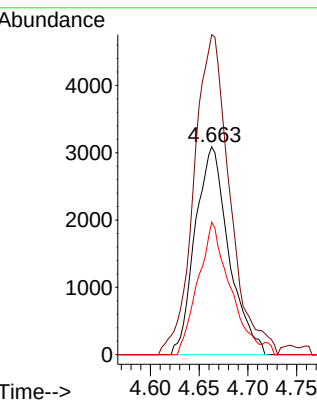
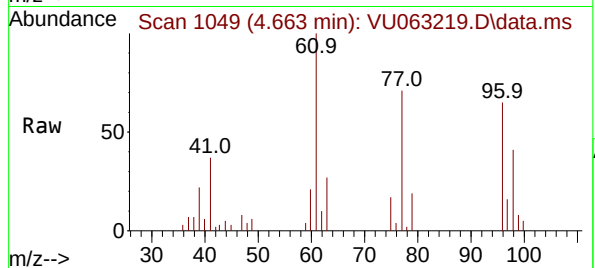
98 60.6 31.9 95.9

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#23

Diethyl Ether

Concen: 0.511 ug/l

RT: 2.367 min Scan# 335

Delta R.T. 0.003 min

Lab File: VU063219.D

Acq: 10 Feb 2025 12:59

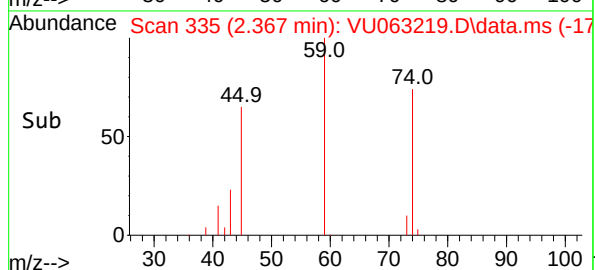
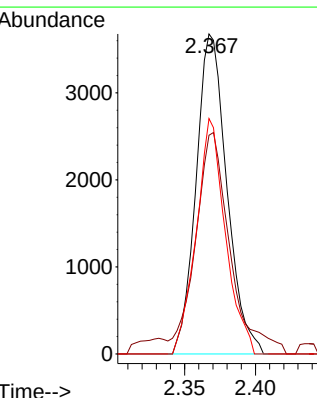
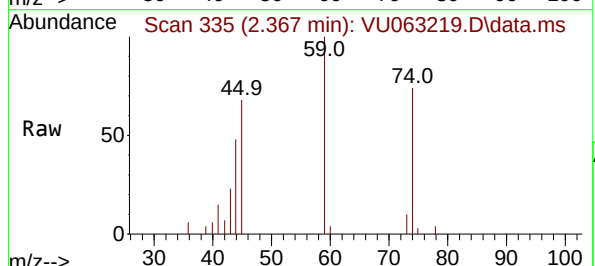
Tgt Ion: 59 Resp: 5553

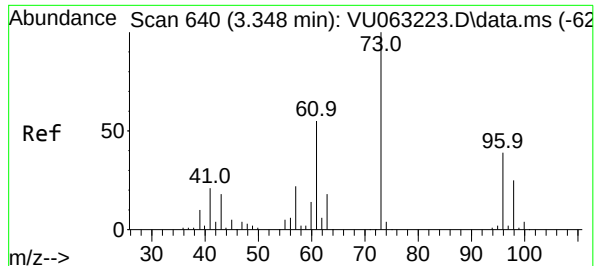
Ion Ratio Lower Upper

59 100

45 77.3 57.8 86.6

74 69.4 57.7 86.5





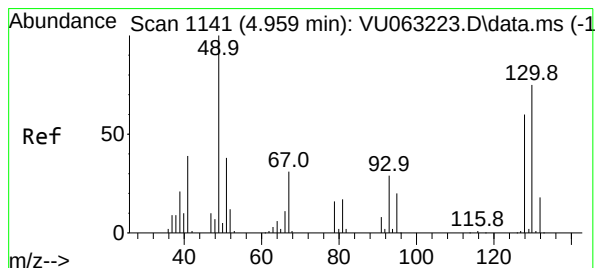
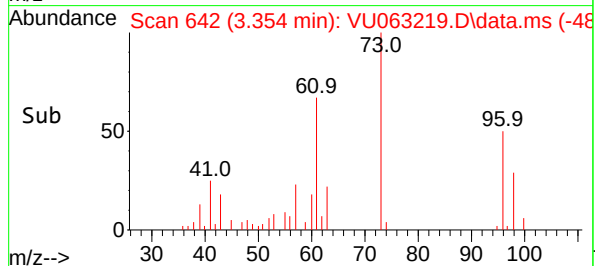
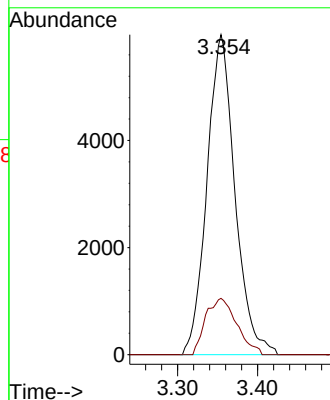
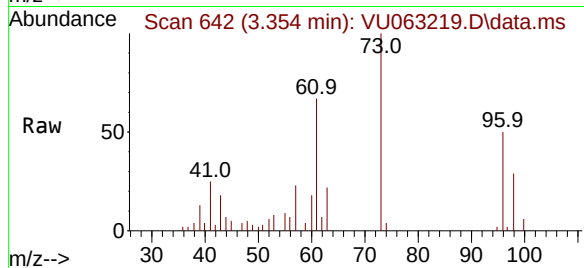
#25
Methyl tert-Butyl Ether
Concen: 0.460 ug/l
RT: 3.354 min Scan# 640
Delta R.T. 0.006 min
Lab File: VU063219.D
Acq: 10 Feb 2025 12:59

Instrument :
MSVOA_U
ClientSampleId :
VSTDIC0.5

Tgt Ion: 73 Resp: 1453
Ion Ratio Lower Upper
73 100
43 19.6 14.9 22.3

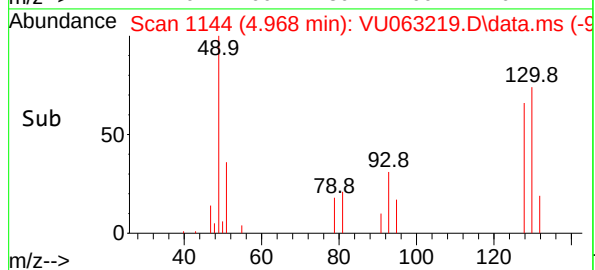
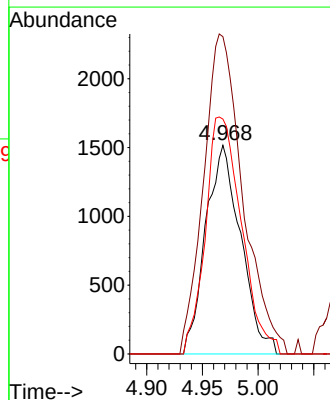
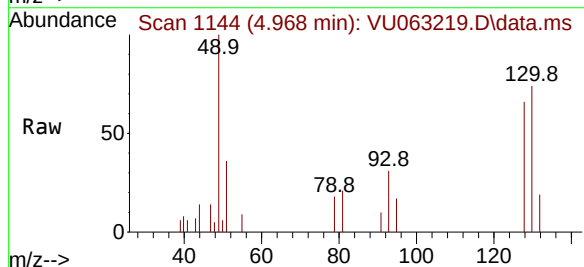
Manual Integrations
APPROVED

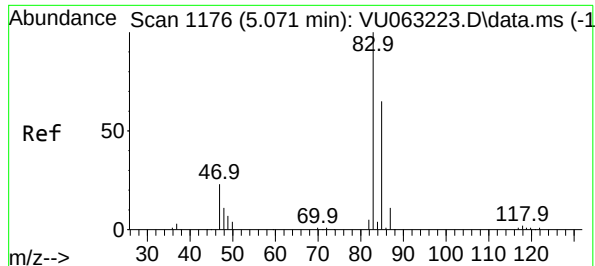
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#26
Bromochloromethane
Concen: 0.487 ug/l
RT: 4.968 min Scan# 1144
Delta R.T. 0.010 min
Lab File: VU063219.D
Acq: 10 Feb 2025 12:59

Tgt Ion:128 Resp: 3323
Ion Ratio Lower Upper
128 100
49 171.5 0.0 343.4
130 116.6 102.9 154.3





#27

Chloroform

Concen: 0.496 ug/l

RT: 5.081 min Scan# 1176

Delta R.T. 0.010 min

Lab File: VU063219.D

Acq: 10 Feb 2025 12:59

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC0.5

Tgt Ion: 83 Resp: 1362

Ion Ratio Lower Upper

83 100

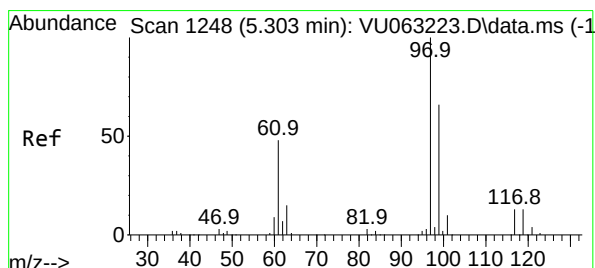
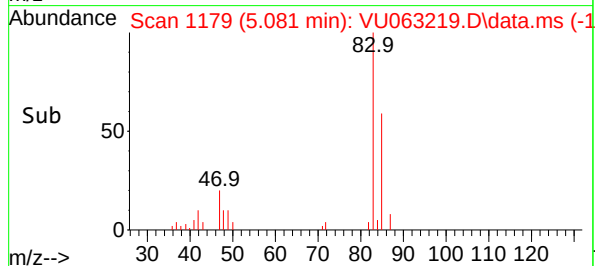
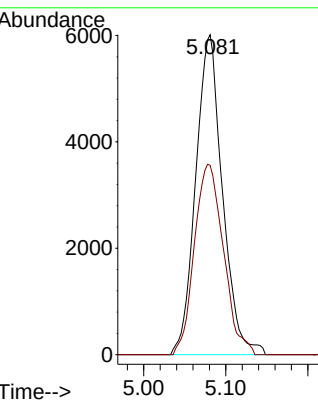
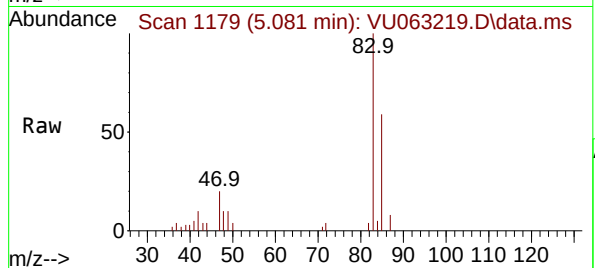
85 59.2 0.0 129.8

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#28

1,1,1-Trichloroethane

Concen: 0.485 ug/l

RT: 5.306 min Scan# 1249

Delta R.T. 0.003 min

Lab File: VU063219.D

Acq: 10 Feb 2025 12:59

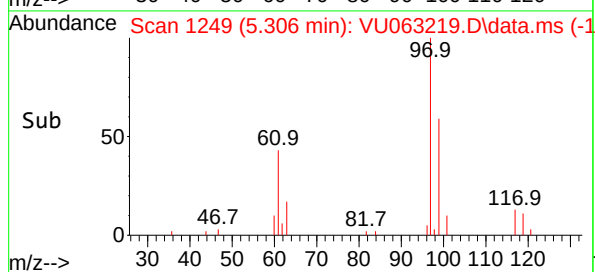
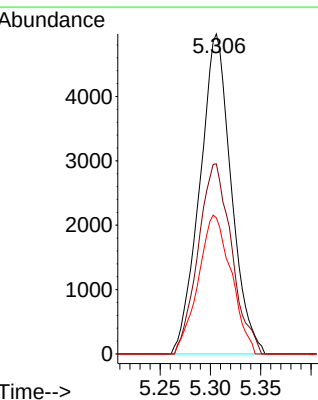
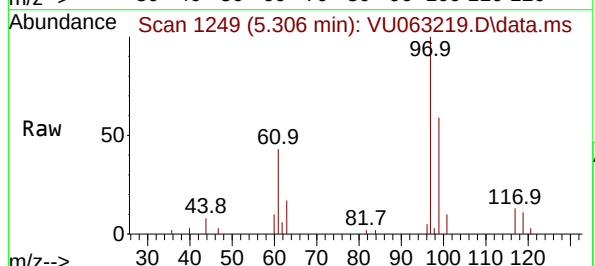
Tgt Ion: 97 Resp: 10801

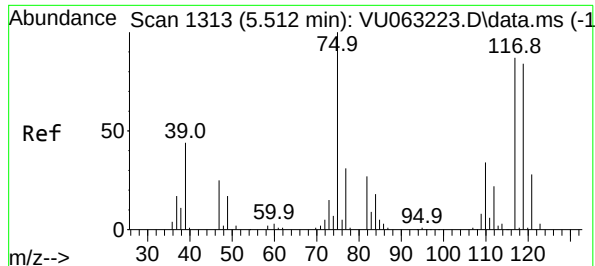
Ion Ratio Lower Upper

97 100

99 63.2 32.4 97.0

61 45.5 23.8 71.2





#29

1,1-Dichloropropene

Concen: 0.460 ug/l

RT: 5.518 min Scan# 117

Delta R.T. 0.006 min

Lab File: VU063219.D

Acq: 10 Feb 2025 12:59

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC0.5

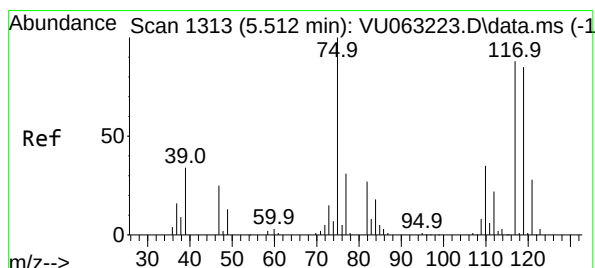
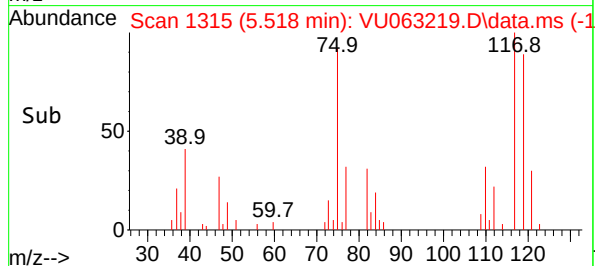
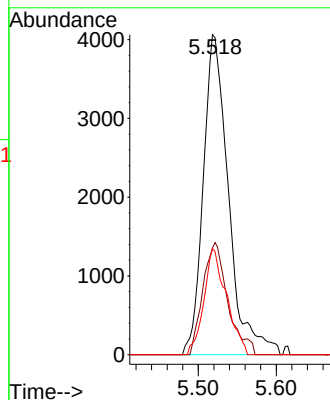
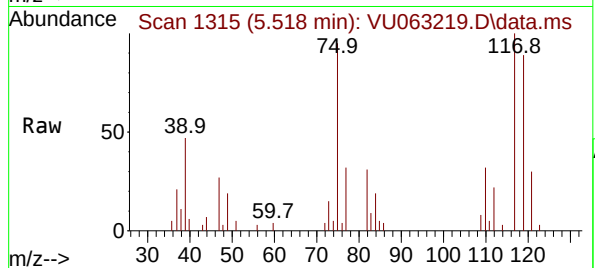
Tgt Ion:	75	Resp:	917
Ion	Ratio	Lower	Upper
75	100		
110	34.4	17.2	51.5
77	29.6	24.6	37.0

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#30

Carbon Tetrachloride

Concen: 0.485 ug/l

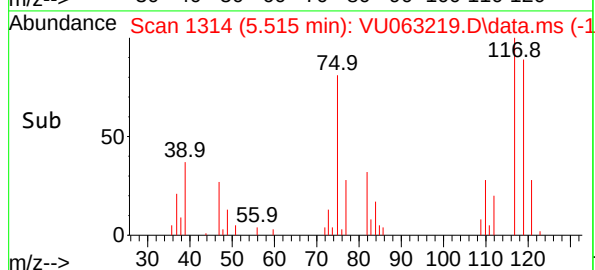
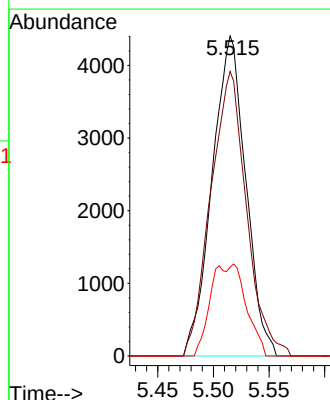
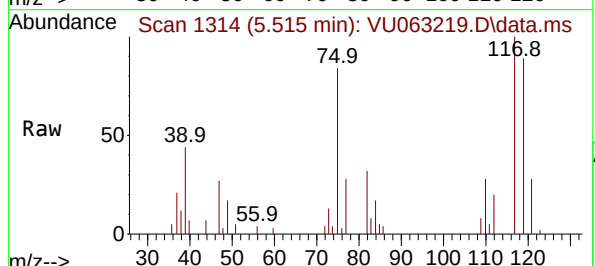
RT: 5.515 min Scan# 1314

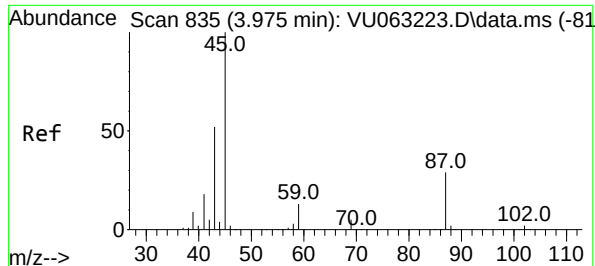
Delta R.T. 0.003 min

Lab File: VU063219.D

Acq: 10 Feb 2025 12:59

Tgt Ion:	117	Resp:	9251
Ion	Ratio	Lower	Upper
117	100		
119	88.9	76.7	115.1
121	27.7	25.5	38.3





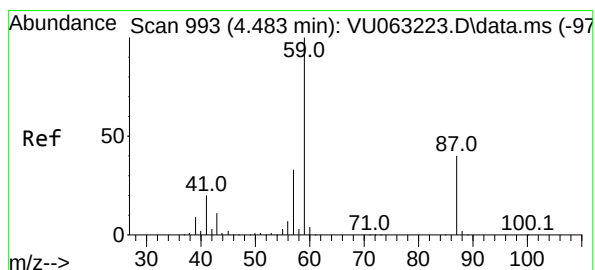
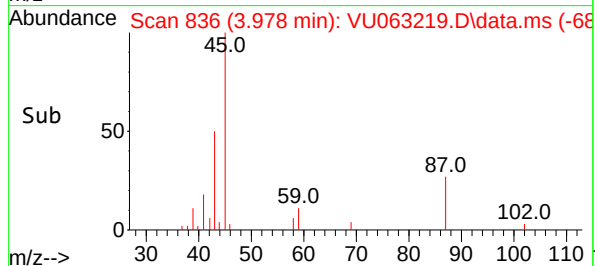
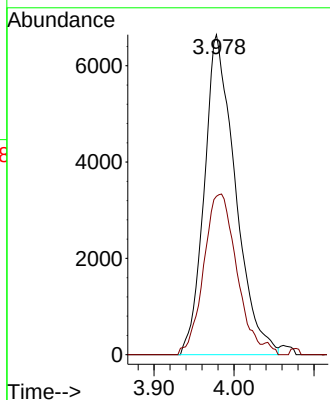
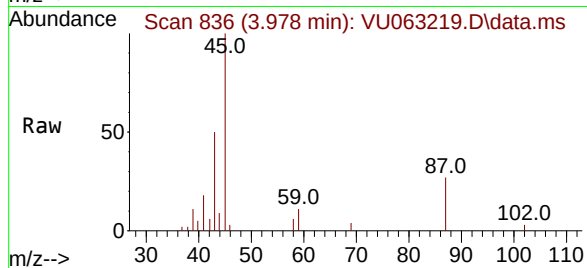
#31
Isopropyl Ether
Concen: 0.461 ug/l
RT: 3.978 min Scan# 836
Delta R.T. 0.003 min
Lab File: VU063219.D
Acq: 10 Feb 2025 12:59

Instrument :
MSVOA_U
ClientSampleId :
VSTDIC0.5

Tgt Ion: 45 Resp: 17908
Ion Ratio Lower Upper
45 100
43 53.0 25.7 77.1

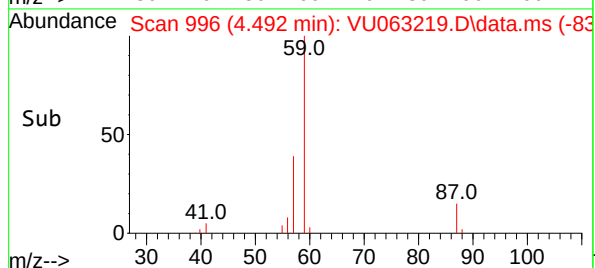
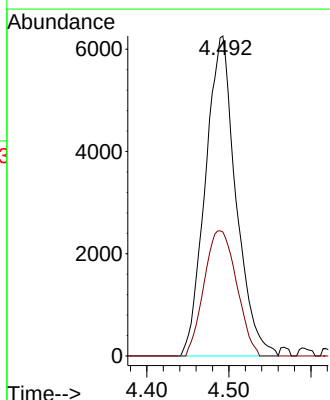
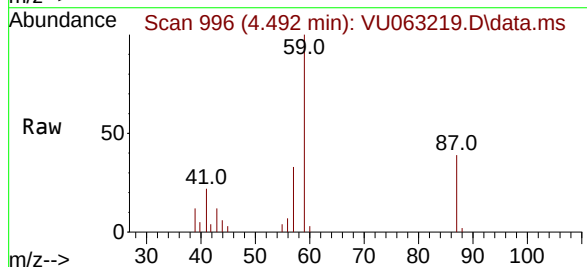
Manual Integrations
APPROVED

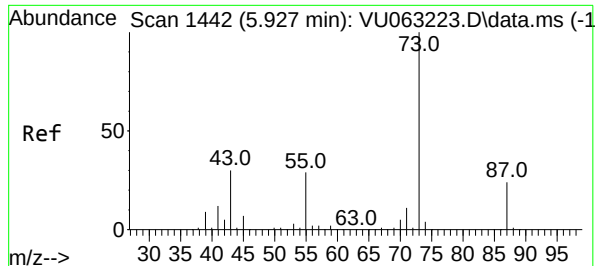
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#32
Ethyl-t-butyl ether
Concen: 0.458 ug/l
RT: 4.492 min Scan# 996
Delta R.T. 0.010 min
Lab File: VU063219.D
Acq: 10 Feb 2025 12:59

Tgt Ion: 59 Resp: 16177
Ion Ratio Lower Upper
59 100
87 41.6 32.6 49.0





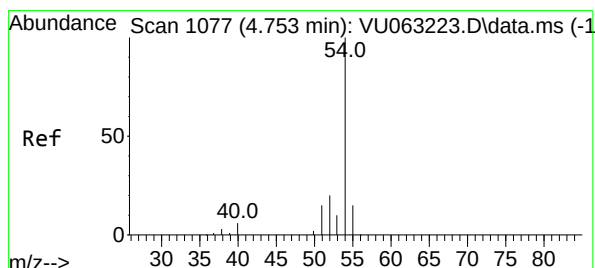
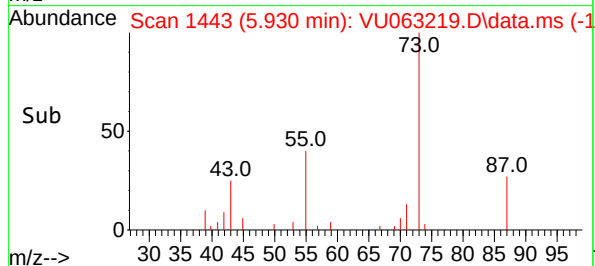
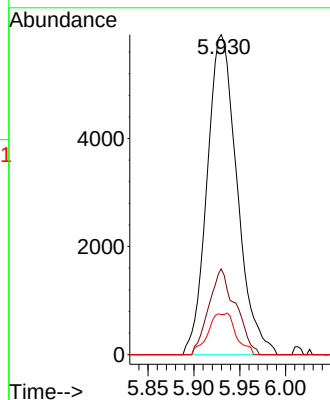
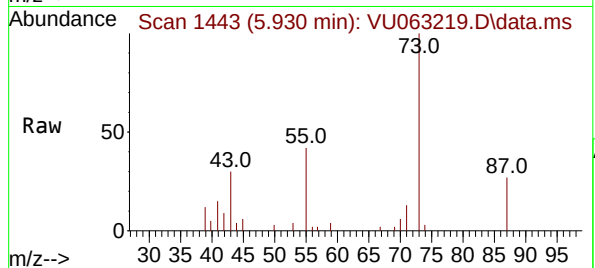
#33
Tert-Amyl methyl ether
Concen: 0.436 ug/l
RT: 5.930 min Scan# 1442
Delta R.T. 0.003 min
Lab File: VU063219.D
Acq: 10 Feb 2025 12:59

Instrument :
MSVOA_U
ClientSampleId :
VSTDICC0.5

Tgt Ion: 73 Resp: 1347
Ion Ratio Lower Upper
73 100
87 24.1 18.9 28.3
71 12.0 9.0 13.4

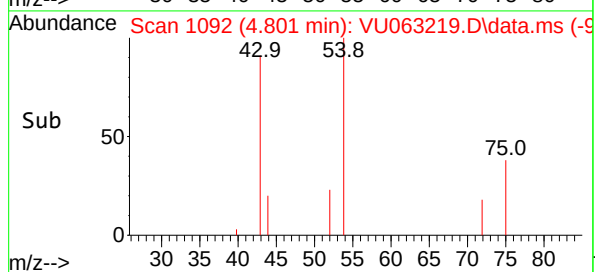
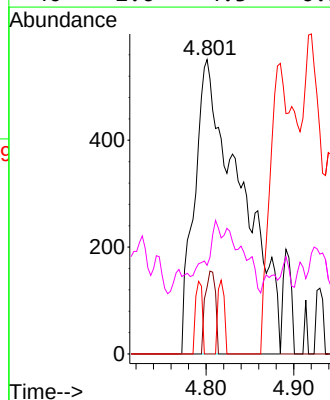
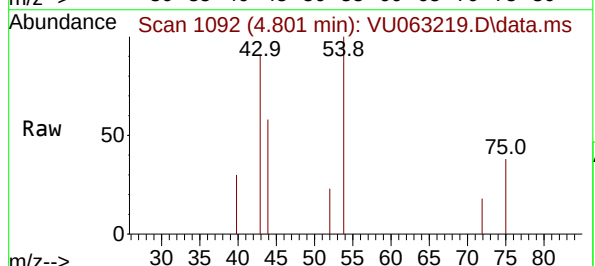
Manual Integrations
APPROVED

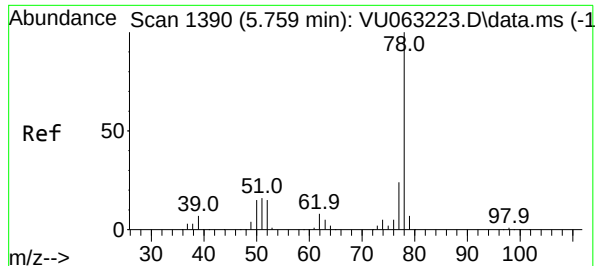
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#34
Propionitrile
Concen: 1.809 ug/l m
RT: 4.801 min Scan# 1092
Delta R.T. 0.048 min
Lab File: VU063219.D
Acq: 10 Feb 2025 12:59

Tgt Ion: 54 Resp: 2034
Ion Ratio Lower Upper
54 100
52 6.2 16.3 24.5#
55 3.5 11.8 17.6#
40 2.6 4.3 6.5#





#35

Benzene

Concen: 0.473 ug/l

RT: 5.769 min Scan# 11

Delta R.T. 0.010 min

Lab File: VU063219.D

Acq: 10 Feb 2025 12:59

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC0.5

Tgt Ion: 78 Resp: 2901

Ion Ratio Lower Upper

78 100

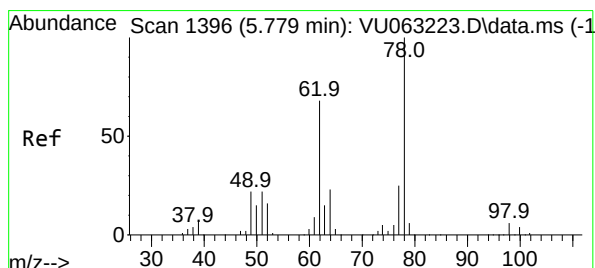
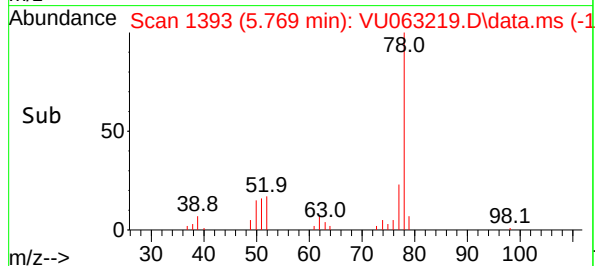
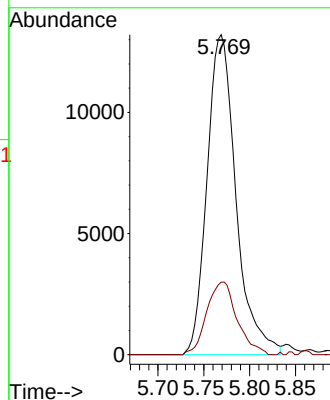
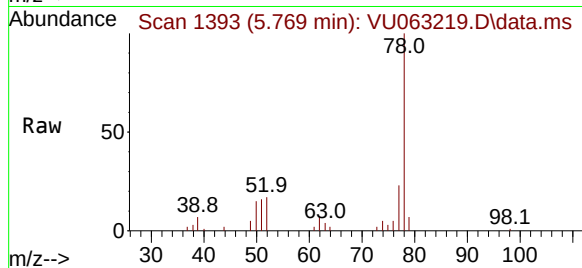
77 22.6 19.0 28.4

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#36

1,2-Dichloroethane

Concen: 0.494 ug/l

RT: 5.791 min Scan# 1400

Delta R.T. 0.013 min

Lab File: VU063219.D

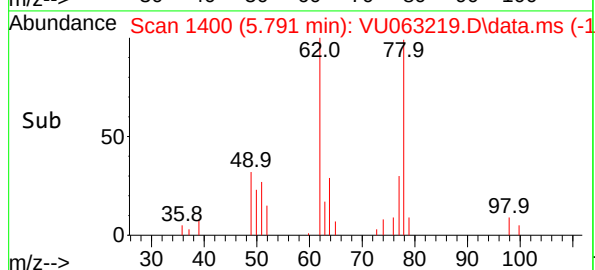
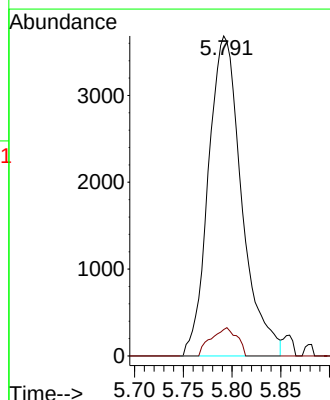
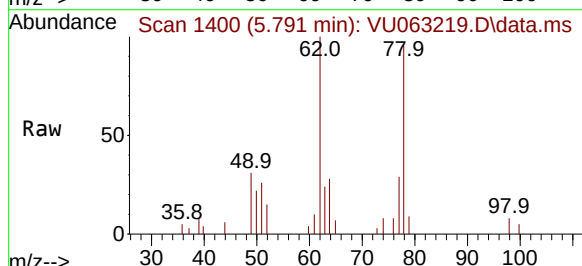
Acq: 10 Feb 2025 12:59

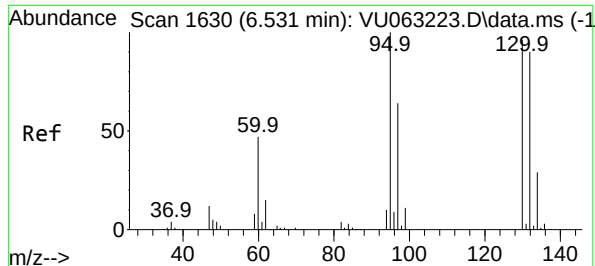
Tgt Ion: 62 Resp: 8750

Ion Ratio Lower Upper

62 100

98 6.9 6.9 10.3#





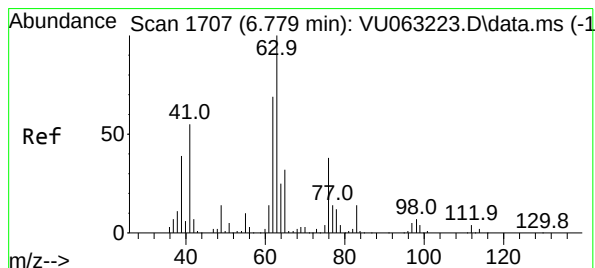
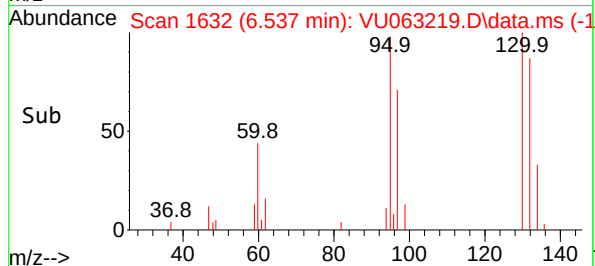
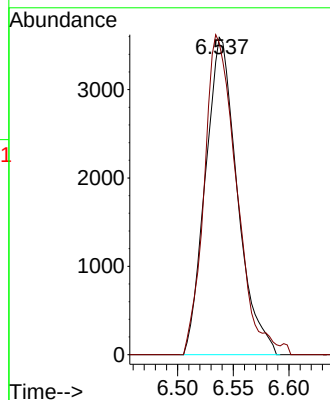
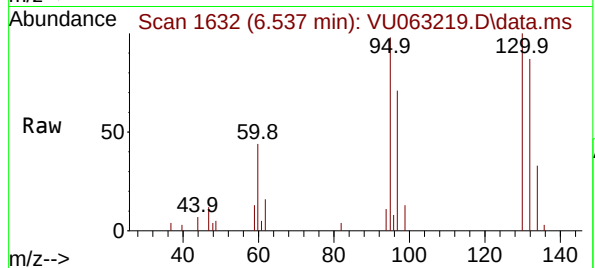
#37
Trichloroethene
Concen: 0.490 ug/l
RT: 6.537 min Scan# 1630
Delta R.T. 0.006 min
Lab File: VU063219.D
Acq: 10 Feb 2025 12:59

Instrument :
MSVOA_U
ClientSampleId :
VSTDIC0.5

Tgt Ion:130 Resp: 7149
Ion Ratio Lower Upper
130 100
95 98.3 83.2 124.8

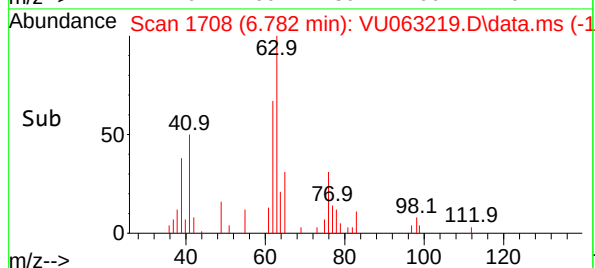
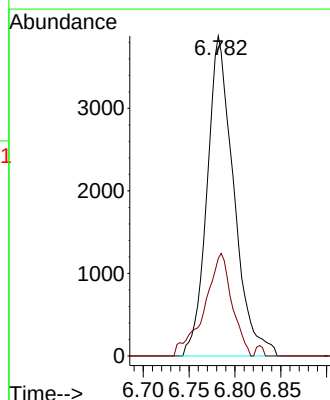
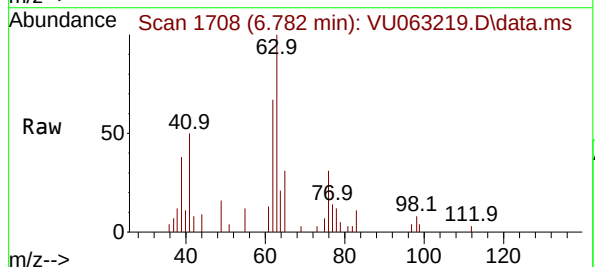
Manual Integrations
APPROVED

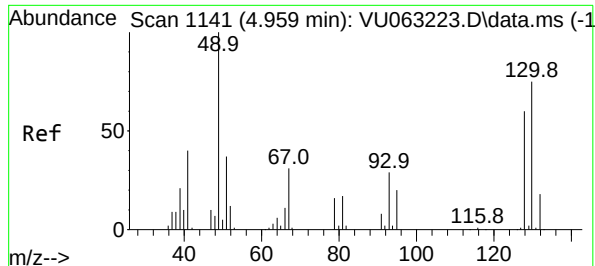
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#38
1,2-Dichloropropane
Concen: 0.489 ug/l
RT: 6.782 min Scan# 1708
Delta R.T. 0.003 min
Lab File: VU063219.D
Acq: 10 Feb 2025 12:59

Tgt Ion: 63 Resp: 7842
Ion Ratio Lower Upper
63 100
65 30.5 25.3 37.9





#39

Methacrylonitrile

Concen: 0.382 ug/l m

RT: 5.017 min Scan# 1159

Delta R.T. 0.058 min

Lab File: VU063219.D

Acq: 10 Feb 2025 12:59

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC0.5

Tgt Ion: 41 Resp: 153

Ion Ratio Lower Upper

41 100

67 14.5 64.5 96.7

39 0.0 43.0 64.6

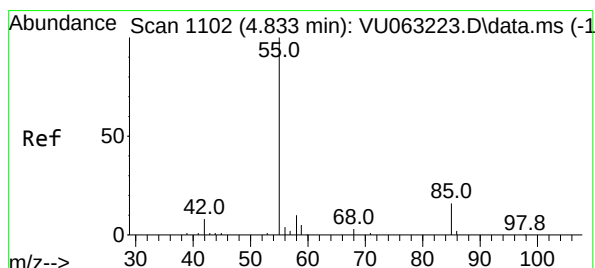
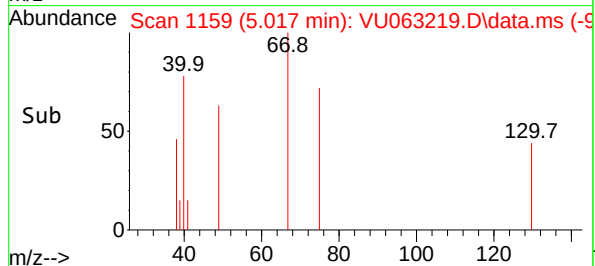
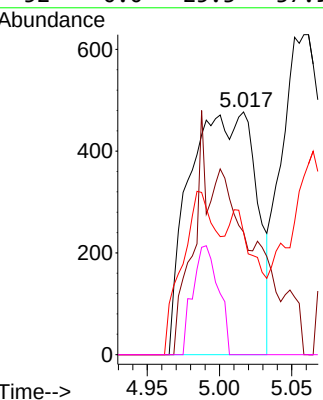
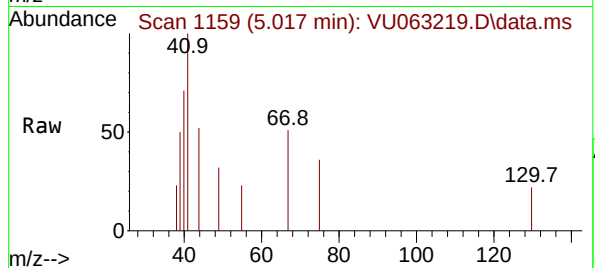
52 0.0 25.3 37.9

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#40

Methyl acrylate

Concen: 0.403 ug/l m

RT: 4.920 min Scan# 1129

Delta R.T. 0.087 min

Lab File: VU063219.D

Acq: 10 Feb 2025 12:59

Tgt Ion: 55 Resp: 2955

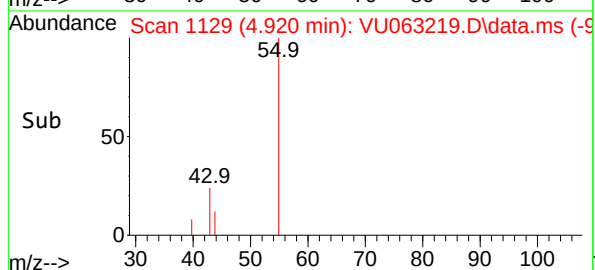
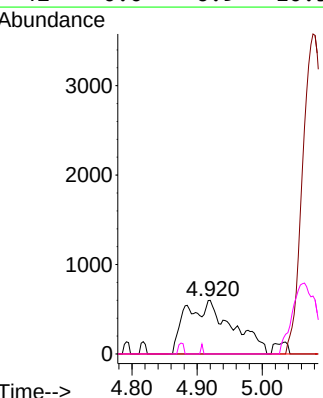
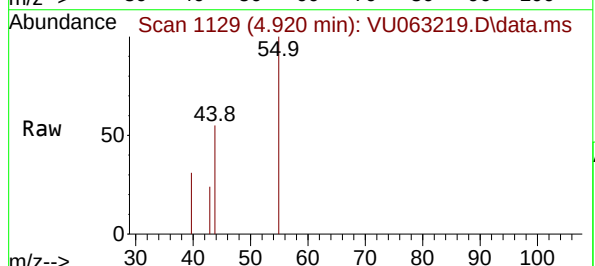
Ion Ratio Lower Upper

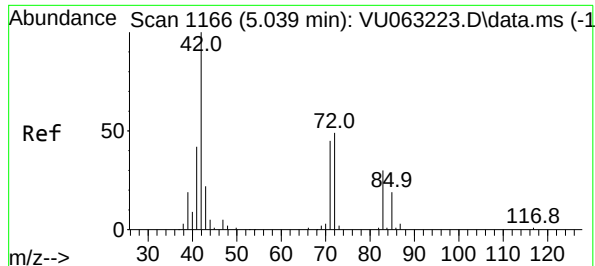
55 100

85 0.0 13.3 19.9

58 0.0 7.3 10.9

42 0.0 6.9 10.3





#41

Tetrahydrofuran

Concen: 0.970 ug/l

RT: 5.065 min Scan# 1174

Delta R.T. 0.026 min

Lab File: VU063219.D

Acq: 10 Feb 2025 12:59

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC0.5

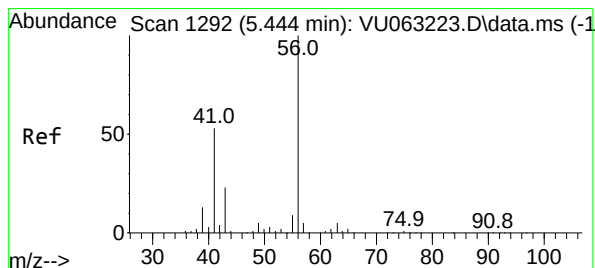
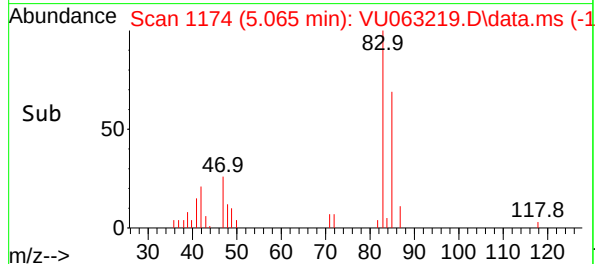
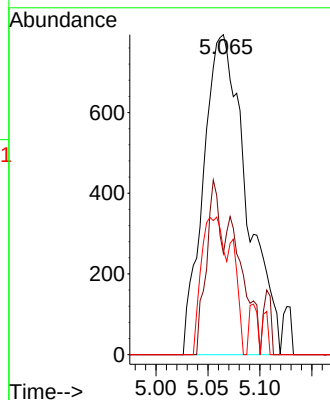
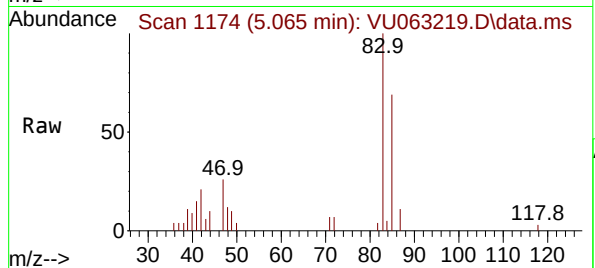
Tgt Ion:	42	Resp:	2289
Ion Ratio	Lower	Upper	
42	100		
72	18.8	41.5	62.3
71	23.0	37.2	55.8

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#42

1-Chlorobutane

Concen: 0.443 ug/l

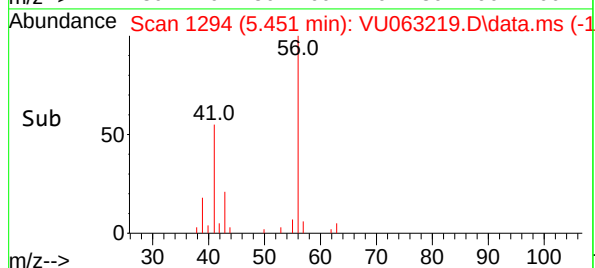
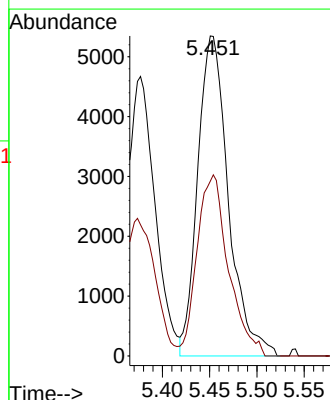
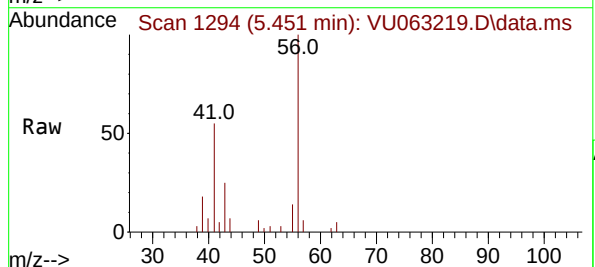
RT: 5.451 min Scan# 1294

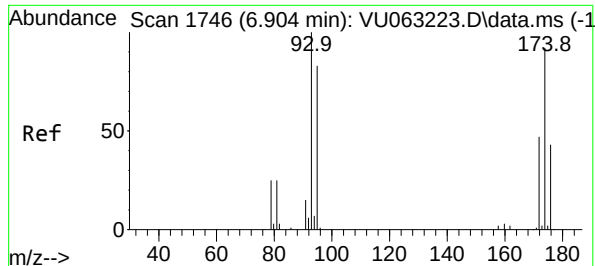
Delta R.T. 0.006 min

Lab File: VU063219.D

Acq: 10 Feb 2025 12:59

Tgt Ion:	56	Resp:	12081
Ion Ratio	Lower	Upper	
56	100		
41	58.0	26.3	78.8





#43

Dibromomethane

Concen: 0.495 ug/l

RT: 6.910 min Scan# 11

Delta R.T. 0.006 min

Lab File: VU063219.D

Acq: 10 Feb 2025 12:59

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC0.5

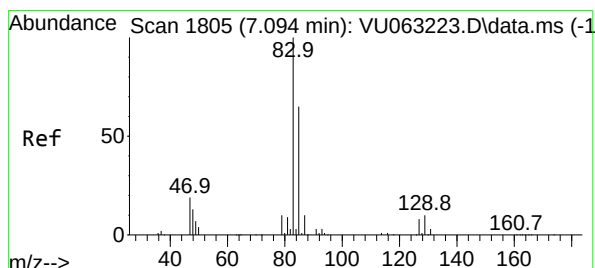
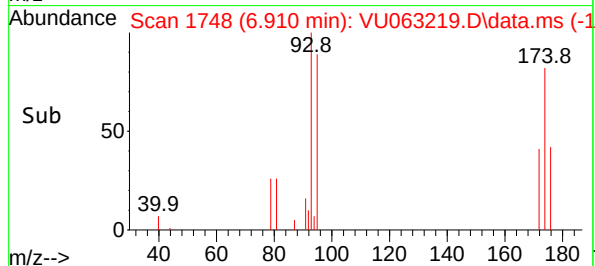
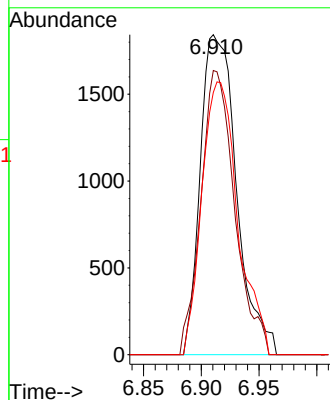
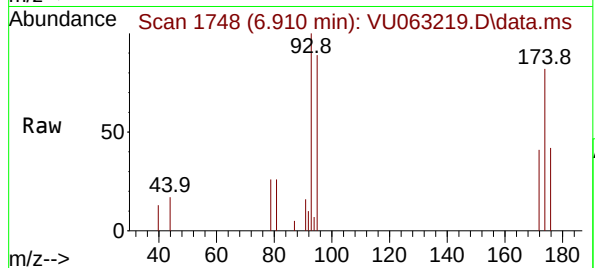
Tgt Ion:	93	Resp:	4024
Ion	Ratio	Lower	Upper
93	100		
95	82.9	67.2	100.8
174	84.6	75.7	113.5

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#44

Bromodichloromethane

Concen: 0.438 ug/l

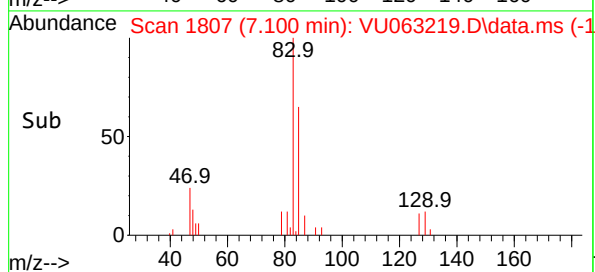
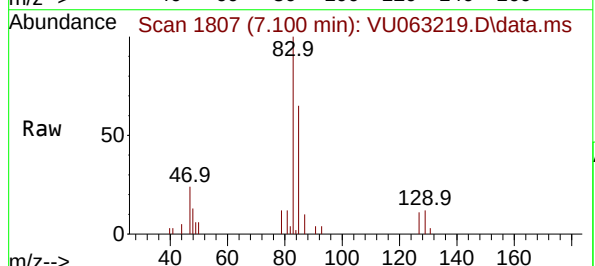
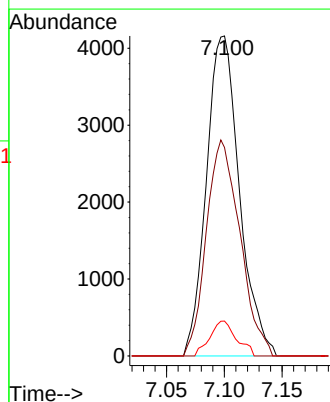
RT: 7.100 min Scan# 1807

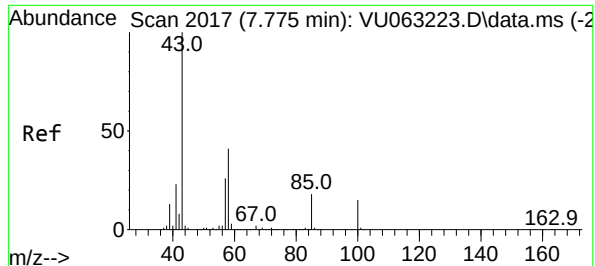
Delta R.T. 0.006 min

Lab File: VU063219.D

Acq: 10 Feb 2025 12:59

Tgt Ion:	83	Resp:	8280
Ion	Ratio	Lower	Upper
83	100		
85	65.2	51.7	77.5
127	10.9	6.7	10.1





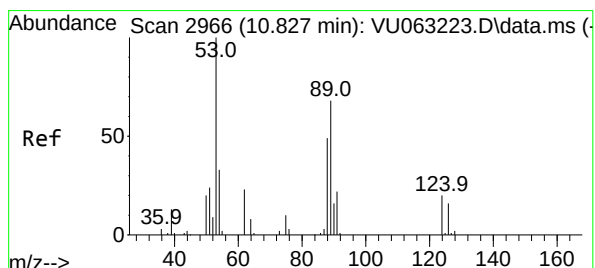
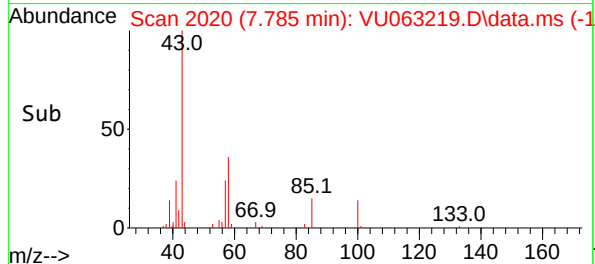
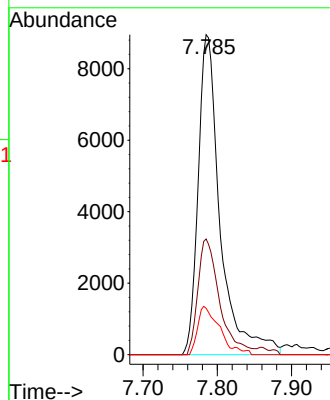
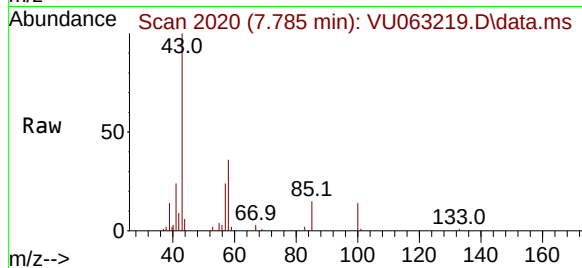
#45
4-Methyl-2-Pentanone
Concen: 2.160 ug/l
RT: 7.785 min Scan# 2017
Delta R.T. 0.010 min
Lab File: VU063219.D
Acq: 10 Feb 2025 12:59

Instrument :
MSVOA_U
ClientSampleId :
VSTDIC0.5

Tgt Ion: 43 Resp: 18398
Ion Ratio Lower Upper
43 100
58 36.0 20.8 62.5
85 14.1 14.8 22.2

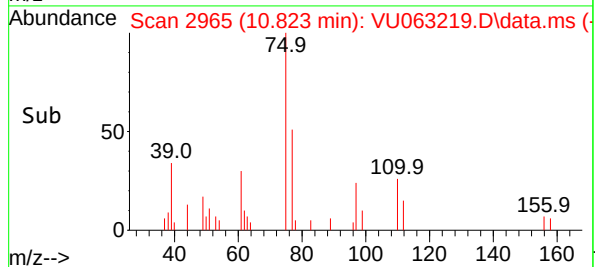
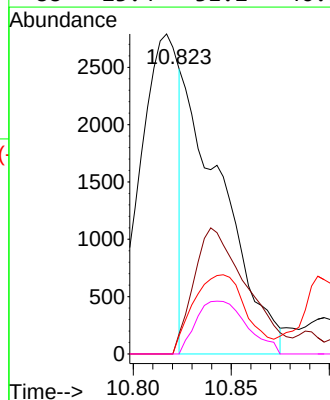
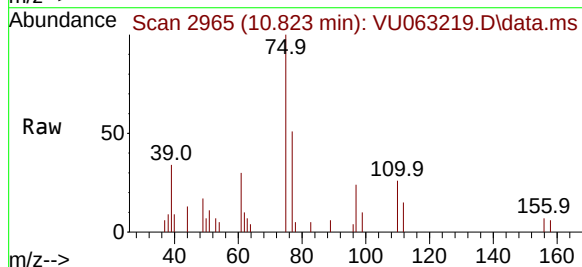
Manual Integrations
APPROVED

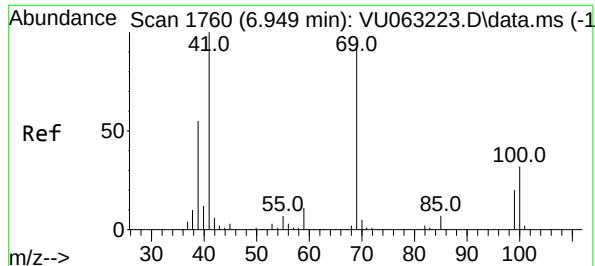
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#46
t-1,4-Dichloro-2-butene
Concen: 0.839 ug/l m
RT: 10.823 min Scan# 2965
Delta R.T. -0.003 min
Lab File: VU063219.D
Acq: 10 Feb 2025 12:59

Tgt Ion: 75 Resp: 3537
Ion Ratio Lower Upper
75 100
53 59.0 64.5 96.7#
89 37.1 43.4 65.2#
88 23.4 31.2 46.8#





#47

Methyl methacrylate

Concen: 0.815 ug/l m

RT: 6.965 min Scan# 1765

Delta R.T. 0.016 min

Lab File: VU063219.D

Acq: 10 Feb 2025 12:59

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC0.5

Tgt Ion: 69 Resp: 5580

Ion Ratio Lower Upper

69 100

41 97.2 0.0 217.0

39 25.7 47.7 71.5

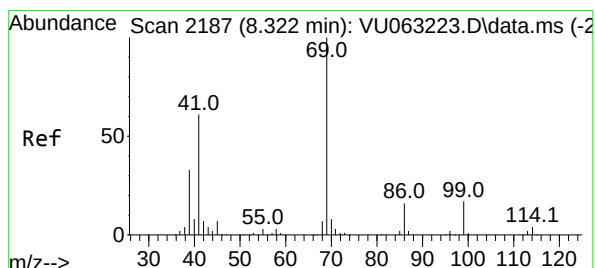
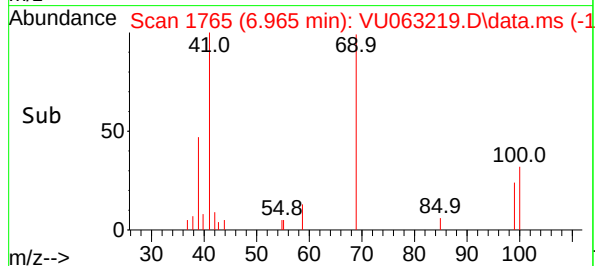
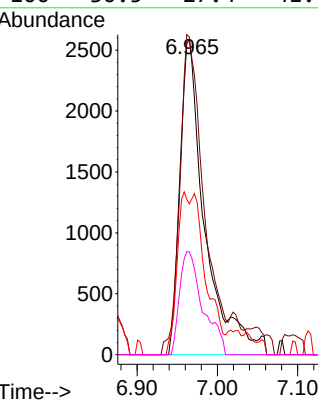
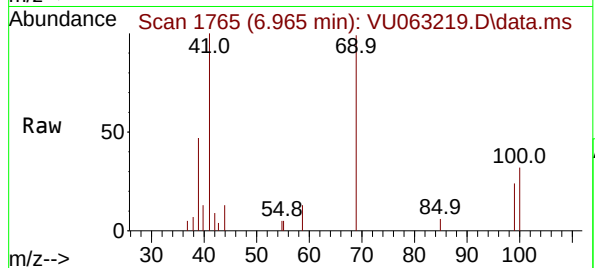
100 30.5 27.4 41.0

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#48

Ethyl methacrylate

Concen: 0.377 ug/l

RT: 8.332 min Scan# 2190

Delta R.T. 0.010 min

Lab File: VU063219.D

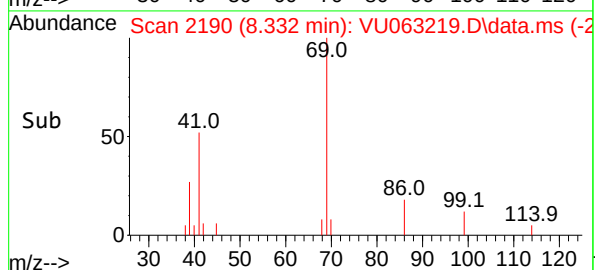
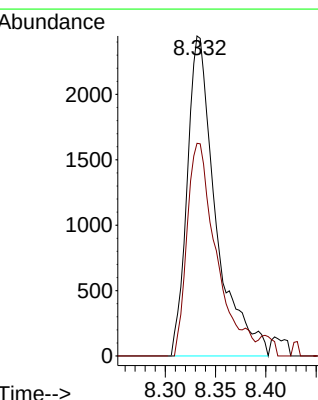
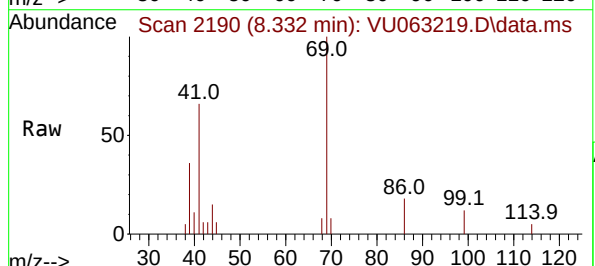
Acq: 10 Feb 2025 12:59

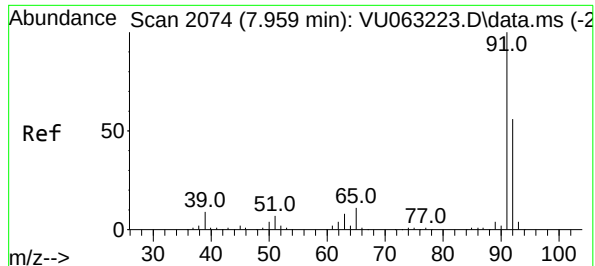
Tgt Ion: 69 Resp: 4839

Ion Ratio Lower Upper

69 100

41 68.2 30.6 92.0





#49

Toluene

Concen: 0.429 ug/l

RT: 7.962 min Scan# 2074

Delta R.T. 0.003 min

Lab File: VU063219.D

Acq: 10 Feb 2025 12:59

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC0.5

Tgt Ion: 92 Resp: 1513

Ion Ratio Lower Upper

92 100

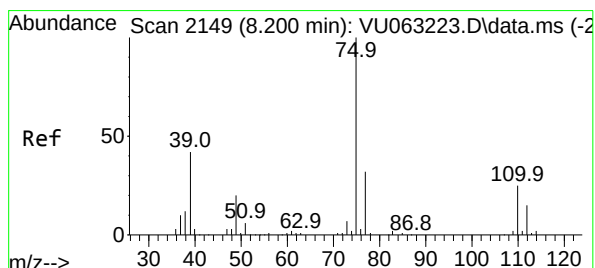
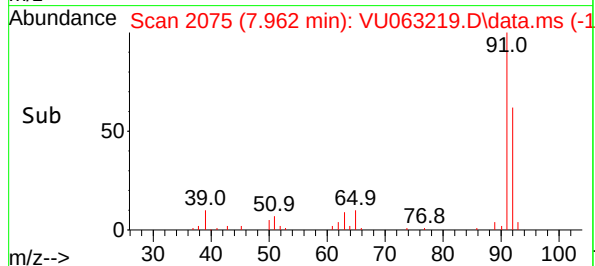
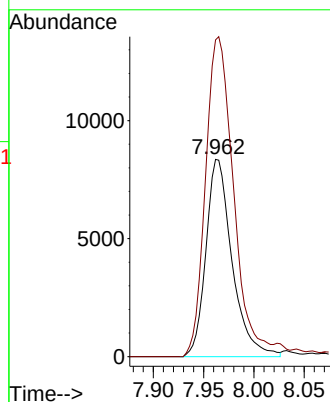
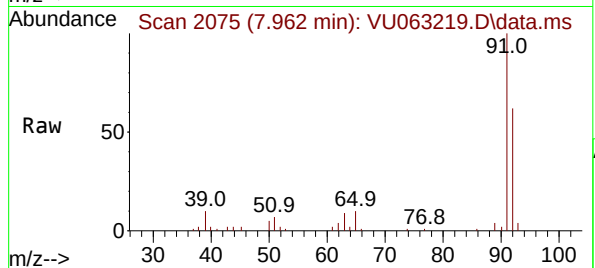
91 173.4 141.8 212.6

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#50

t-1,3-Dichloropropene

Concen: 0.409 ug/l

RT: 8.209 min Scan# 2152

Delta R.T. 0.010 min

Lab File: VU063219.D

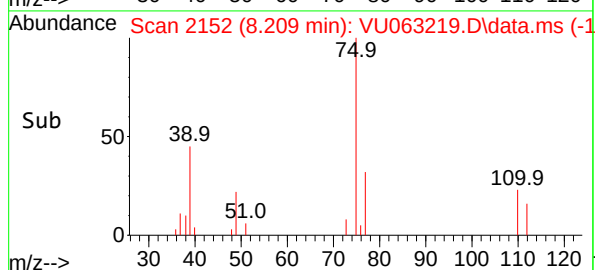
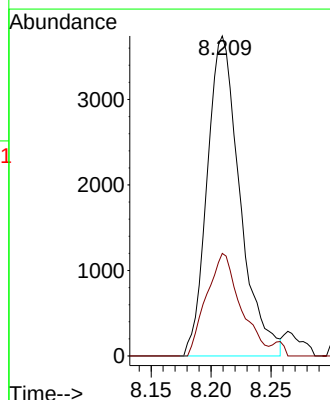
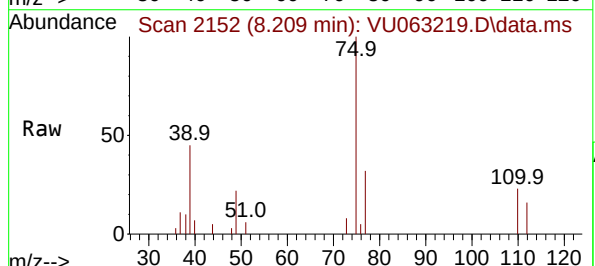
Acq: 10 Feb 2025 12:59

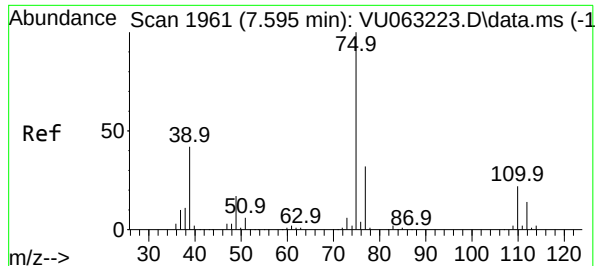
Tgt Ion: 75 Resp: 7086

Ion Ratio Lower Upper

75 100

77 32.1 25.9 38.9





#51

cis-1,3-Dichloropropene

Concen: 0.441 ug/l

RT: 7.605 min Scan# 1964

Delta R.T. 0.010 min

Lab File: VU063219.D

Acq: 10 Feb 2025 12:59

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC0.5

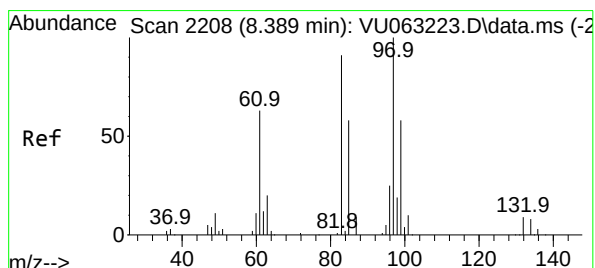
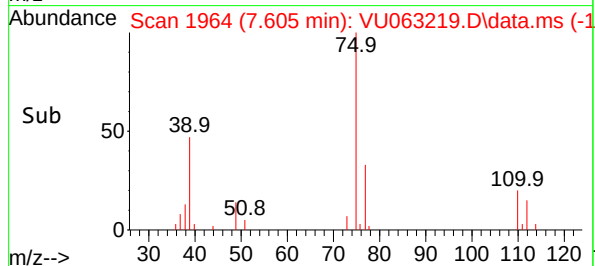
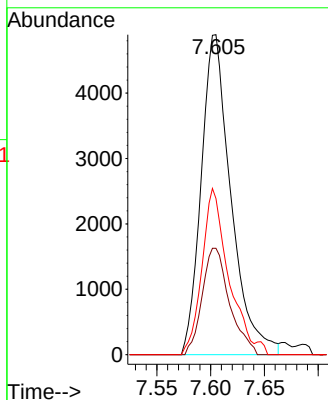
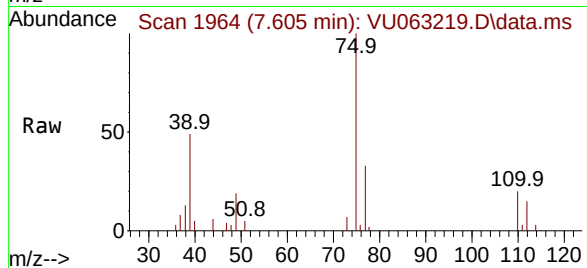
Tgt Ion:	75	Resp:	9424
Ion	Ratio	Lower	Upper
75	100		
77	35.5	25.3	37.9
39	48.8	33.5	50.3

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#52

1,1,2-Trichloroethane

Concen: 0.480 ug/l

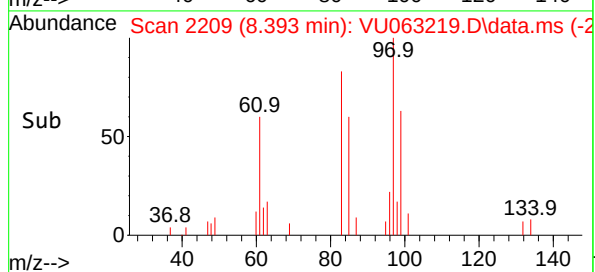
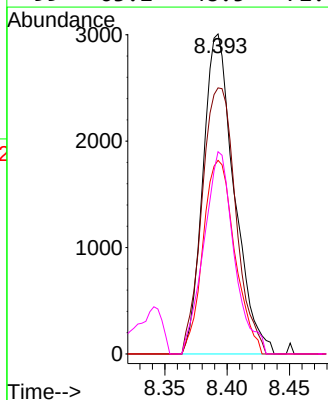
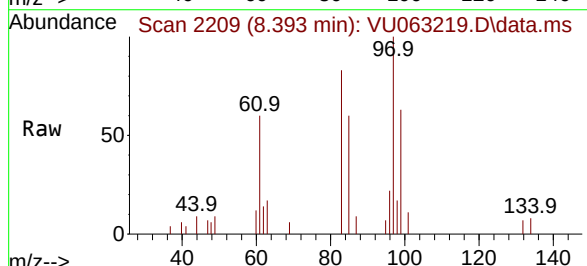
RT: 8.393 min Scan# 2209

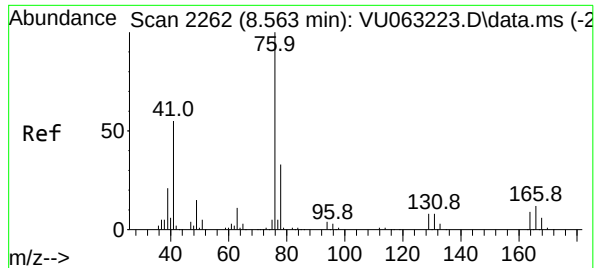
Delta R.T. 0.003 min

Lab File: VU063219.D

Acq: 10 Feb 2025 12:59

Tgt Ion:	97	Resp:	5257
Ion	Ratio	Lower	Upper
97	100		
83	83.1	73.0	109.4
85	60.5	46.3	69.5
99	63.2	48.5	72.7





#53

1,3-Dichloropropane

Concen: 0.454 ug/l

RT: 8.566 min Scan# 21

Delta R.T. 0.003 min

Lab File: VU063219.D

Acq: 10 Feb 2025 12:59

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC0.5

Tgt Ion: 76 Resp: 8834

Ion Ratio Lower Upper

76 100

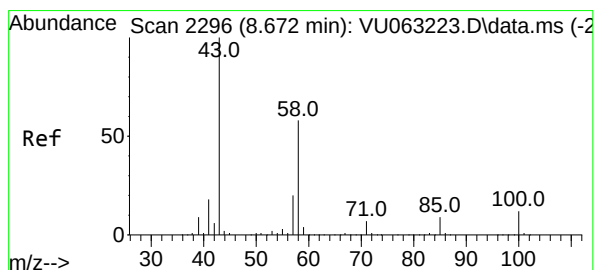
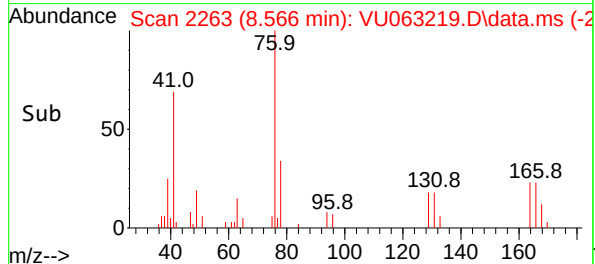
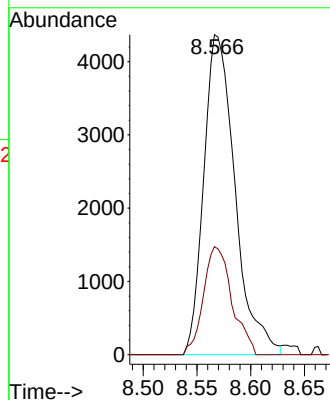
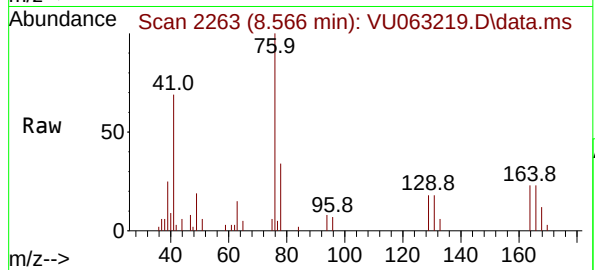
78 30.9 26.3 39.5

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#54

2-Hexanone

Concen: 2.011 ug/l m

RT: 8.685 min Scan# 2300

Delta R.T. 0.013 min

Lab File: VU063219.D

Acq: 10 Feb 2025 12:59

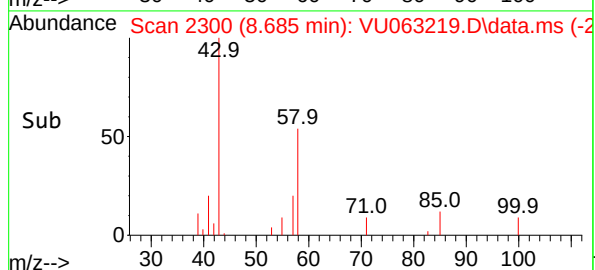
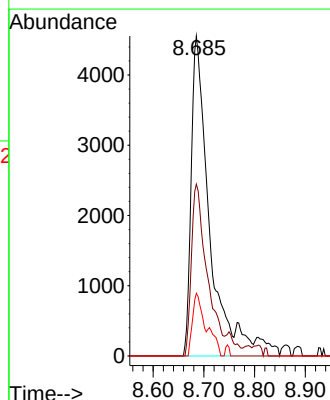
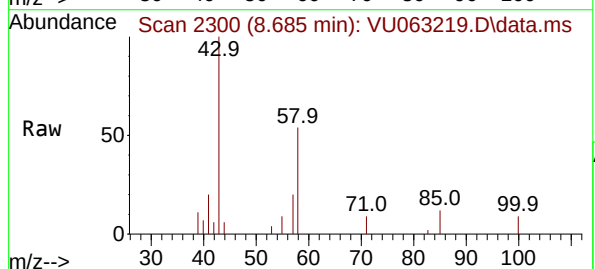
Tgt Ion: 43 Resp: 11692

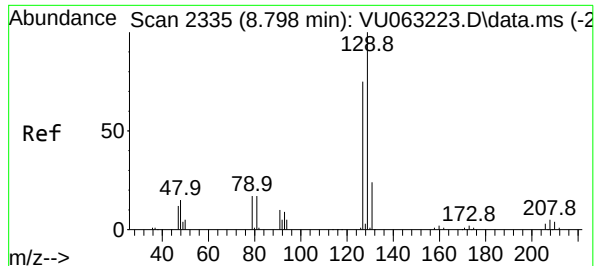
Ion Ratio Lower Upper

43 100

58 44.7 38.0 78.0

57 10.5 0.0 39.1





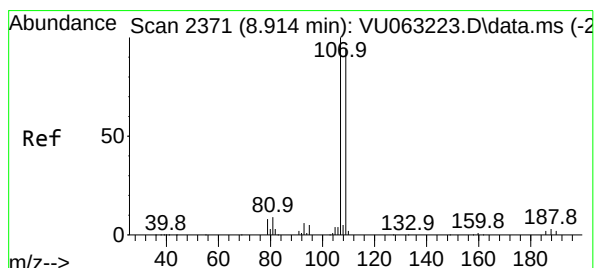
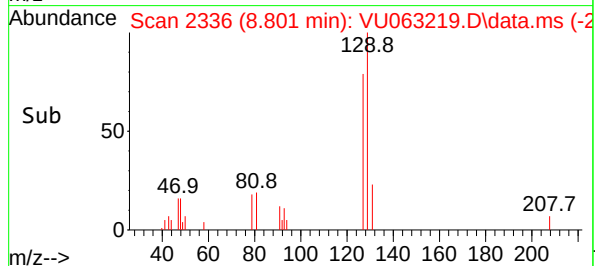
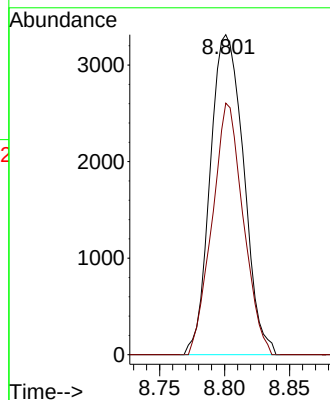
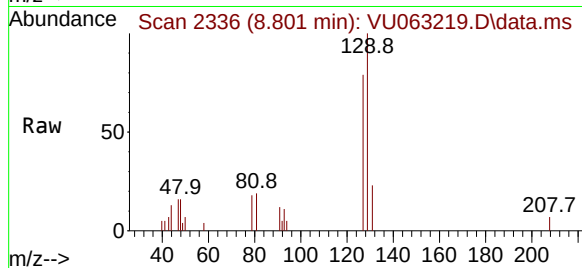
#55
Dibromochloromethane
Concen: 0.471 ug/l
RT: 8.801 min Scan# 2121
Delta R.T. 0.003 min
Lab File: VU063219.D
Acq: 10 Feb 2025 12:59

Instrument :
MSVOA_U
ClientSampleId :
VSTDIC0.5

Tgt Ion:129 Resp: 5934
Ion Ratio Lower Upper
129 100
127 73.0 60.4 90.6

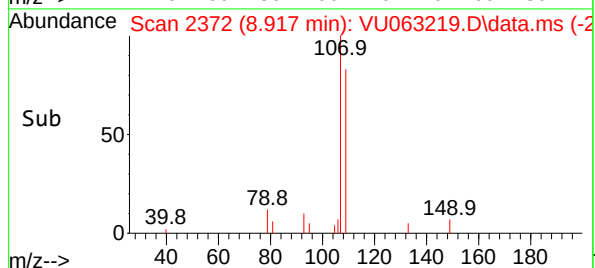
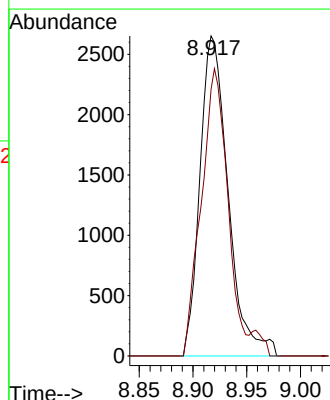
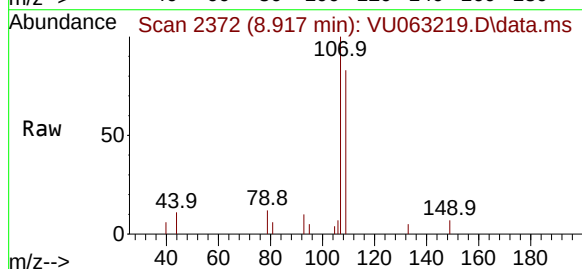
Manual Integrations
APPROVED

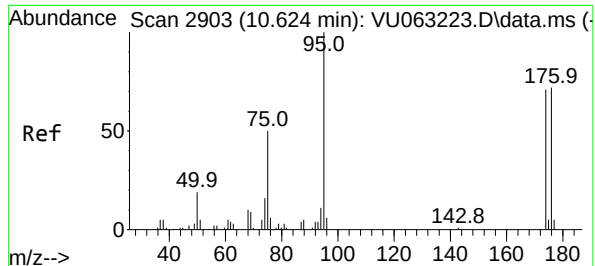
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#56
1,2-Dibromoethane
Concen: 0.470 ug/l
RT: 8.917 min Scan# 2372
Delta R.T. 0.003 min
Lab File: VU063219.D
Acq: 10 Feb 2025 12:59

Tgt Ion:107 Resp: 4834
Ion Ratio Lower Upper
107 100
109 84.1 0.0 187.8





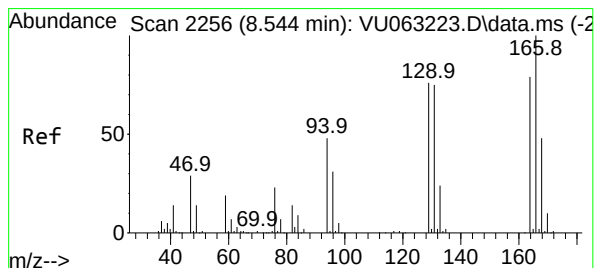
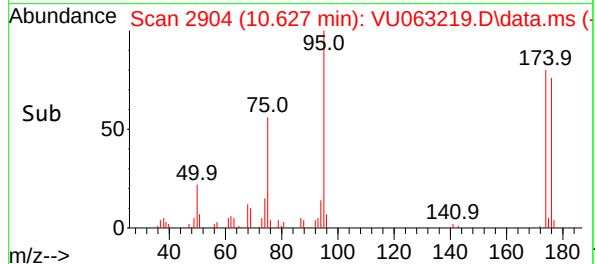
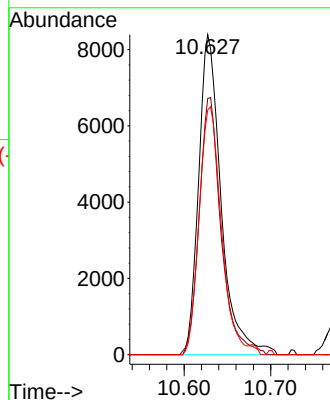
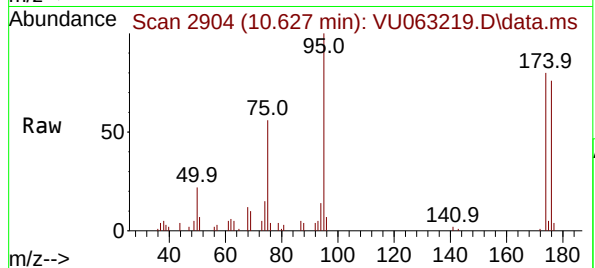
#57
4-Bromofluorobenzene
Concen: 0.917 ug/l
RT: 10.627 min Scan# 2904
Delta R.T. 0.003 min
Lab File: VU063219.D
Acq: 10 Feb 2025 12:59

Instrument :
MSVOA_U
ClientSampleId :
VSTDIC0.5

Tgt Ion: 95 Resp: 1509
Ion Ratio Lower Upper
95 100
174 78.4 58.6 88.0
176 77.1 58.2 87.4

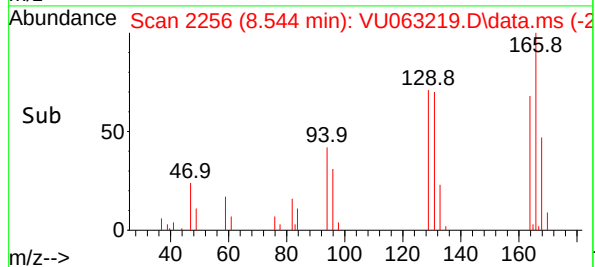
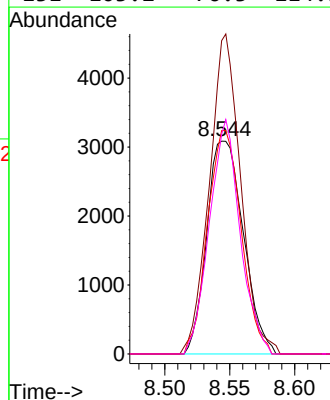
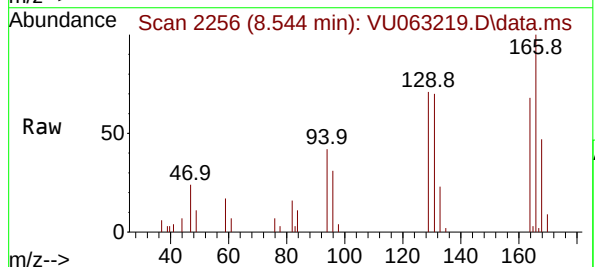
Manual Integrations
APPROVED

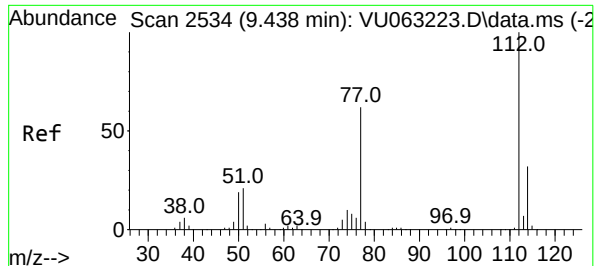
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#58
Tetrachloroethene
Concen: 0.503 ug/l
RT: 8.544 min Scan# 2256
Delta R.T. -0.000 min
Lab File: VU063219.D
Acq: 10 Feb 2025 12:59

Tgt Ion:164 Resp: 6044
Ion Ratio Lower Upper
164 100
166 147.2 101.4 152.0
129 105.0 77.0 115.4
131 103.2 76.3 114.5





#59

Chlorobenzene

Concen: 0.453 ug/l

RT: 9.441 min Scan# 2535

Delta R.T. 0.003 min

Lab File: VU063219.D

Acq: 10 Feb 2025 12:59

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC0.5

Tgt Ion:112 Resp: 16870

Ion Ratio Lower Upper

112 100

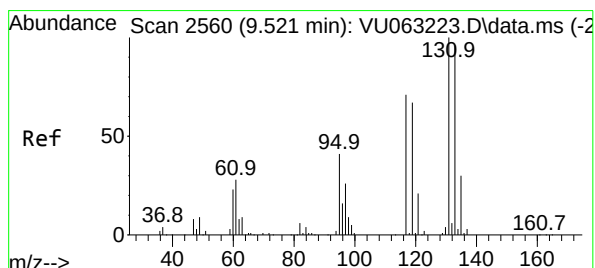
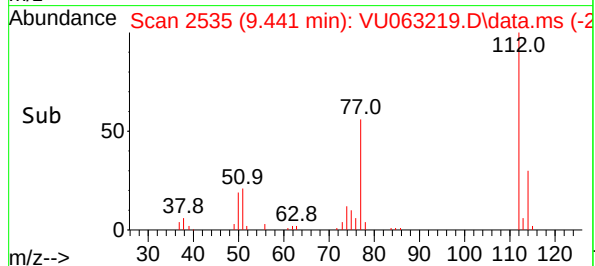
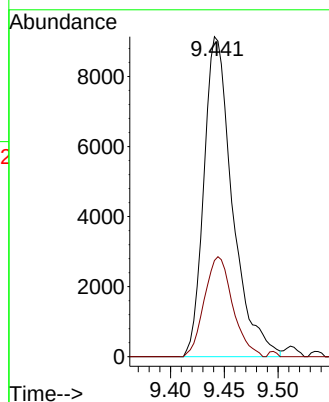
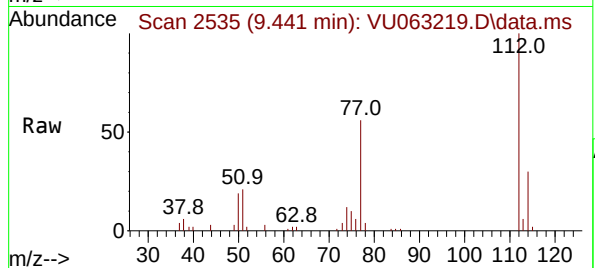
114 30.0 25.7 38.5

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#60

1,1,1,2-Tetrachloroethane

Concen: 0.475 ug/l

RT: 9.524 min Scan# 2561

Delta R.T. 0.003 min

Lab File: VU063219.D

Acq: 10 Feb 2025 12:59

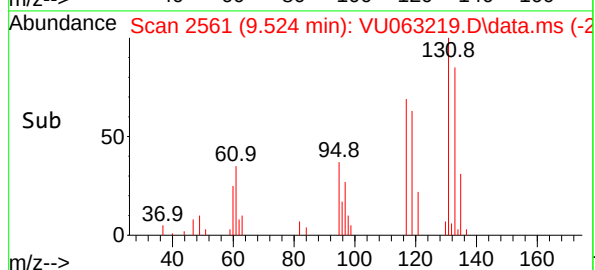
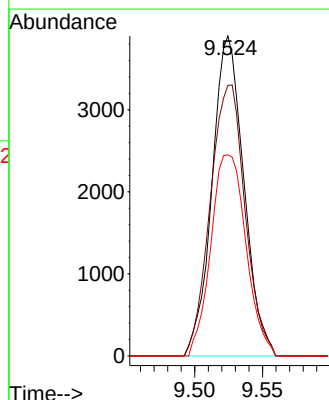
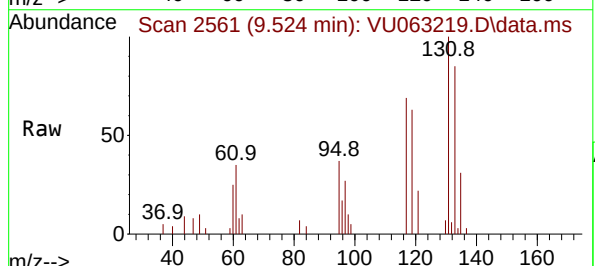
Tgt Ion:131 Resp: 6349

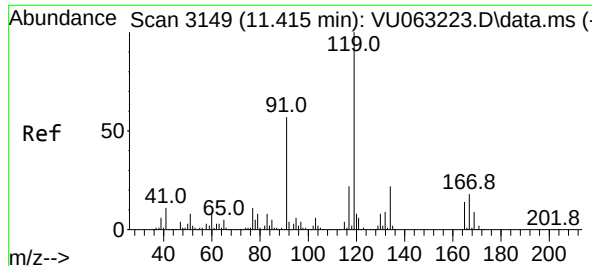
Ion Ratio Lower Upper

131 100

133 92.8 76.7 115.1

119 69.5 54.4 81.6





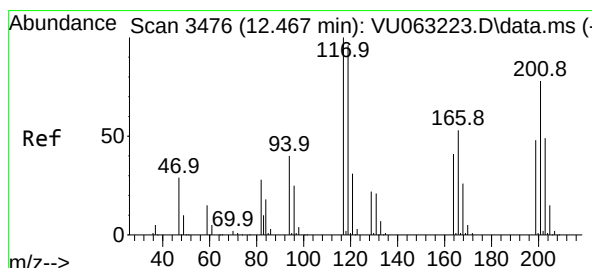
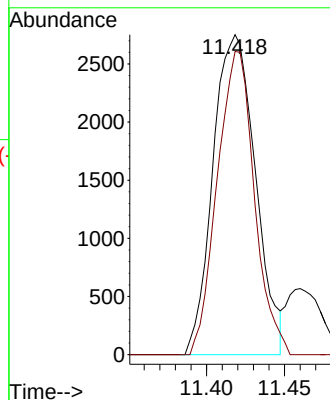
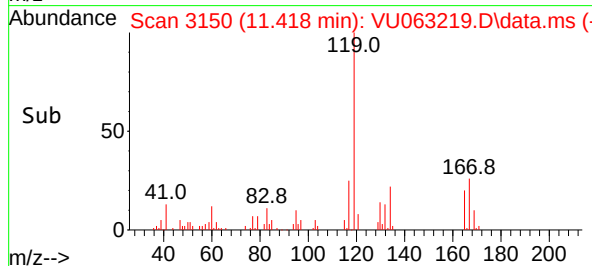
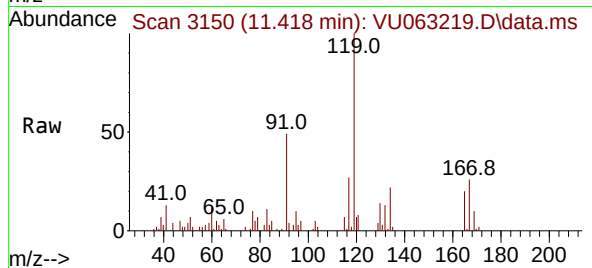
#61
Pentachloroethane
Concen: 0.436 ug/l
RT: 11.418 min Scan# 3149
Delta R.T. 0.003 min
Lab File: VU063219.D
Acq: 10 Feb 2025 12:59

Instrument :
MSVOA_U
ClientSampleId :
VSTDICC0.5

Tgt Ion:117 Resp: 521
Ion Ratio Lower Upper
117 100
167 82.8 65.0 97.6

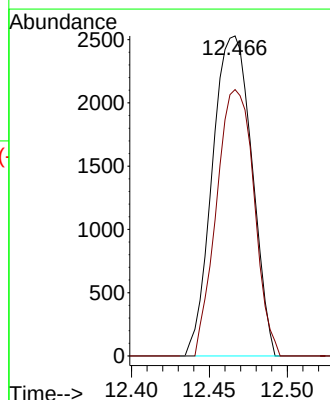
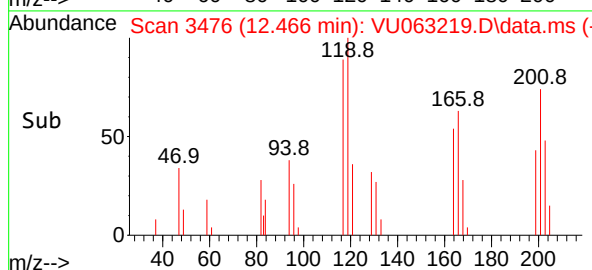
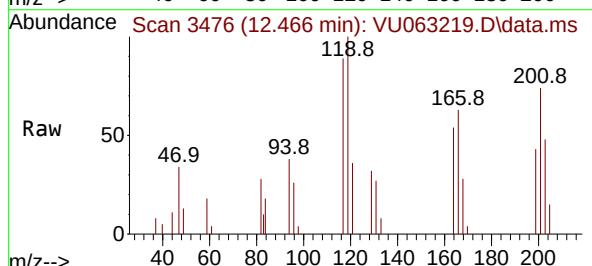
Manual Integrations
APPROVED

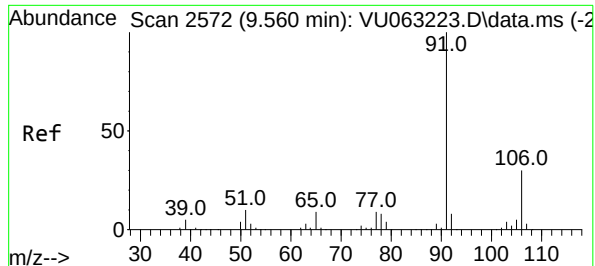
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#62
Hexachloroethane
Concen: 0.423 ug/l
RT: 12.466 min Scan# 3476
Delta R.T. -0.000 min
Lab File: VU063219.D
Acq: 10 Feb 2025 12:59

Tgt Ion:117 Resp: 4467
Ion Ratio Lower Upper
117 100
201 79.0 61.3 91.9





#63

Ethyl Benzene

Concen: 0.418 ug/l

RT: 9.563 min Scan# 2573

Delta R.T. 0.003 min

Lab File: VU063219.D

Acq: 10 Feb 2025 12:59

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC0.5

Tgt Ion: 91 Resp: 26810

Ion Ratio Lower Upper

91 100

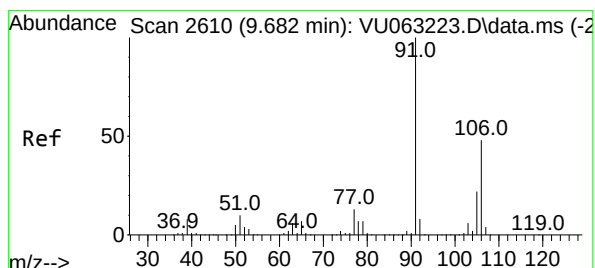
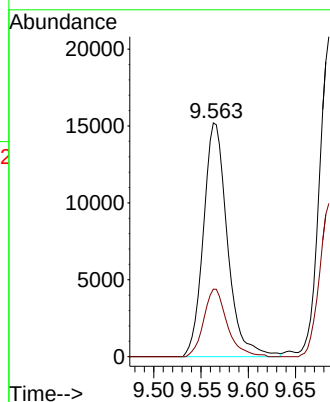
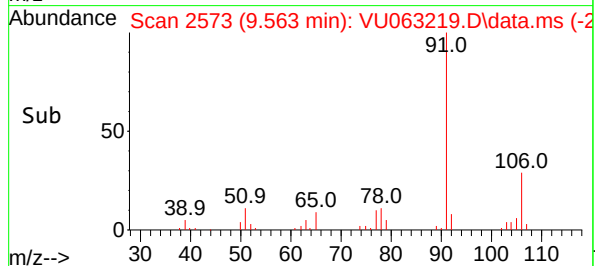
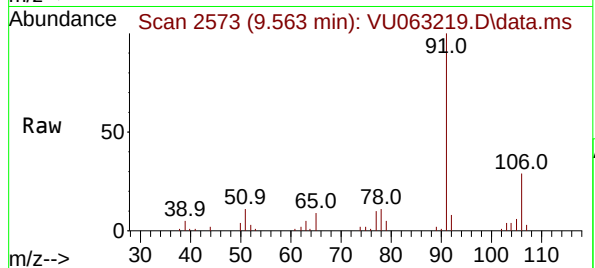
106 28.8 24.2 36.2

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#64

m/p-Xylenes

Concen: 0.778 ug/l

RT: 9.685 min Scan# 2611

Delta R.T. 0.003 min

Lab File: VU063219.D

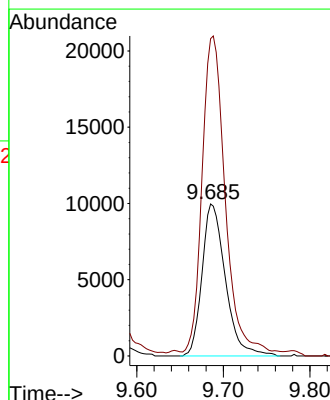
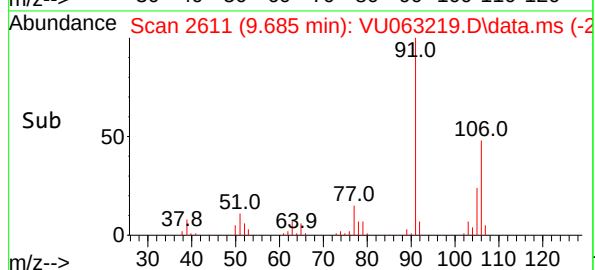
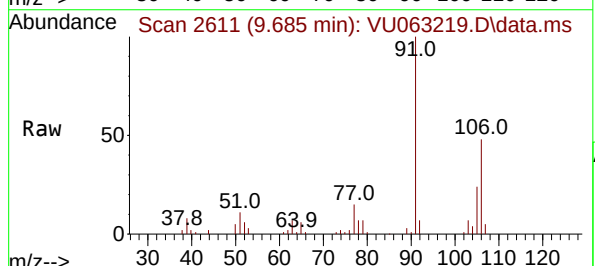
Acq: 10 Feb 2025 12:59

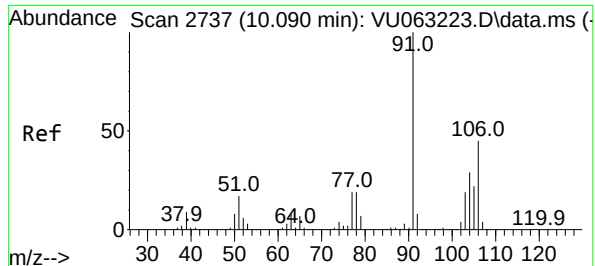
Tgt Ion:106 Resp: 18658

Ion Ratio Lower Upper

106 100

91 201.9 166.9 250.3





#65

o-Xylene

Concen: 0.398 ug/l

RT: 10.094 min Scan# 2737

Delta R.T. 0.003 min

Lab File: VU063219.D

Acq: 10 Feb 2025 12:59

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC0.5

Tgt Ion:106 Resp: 9329

Ion Ratio Lower Upper

106 100

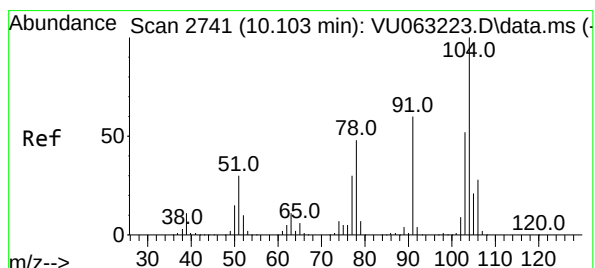
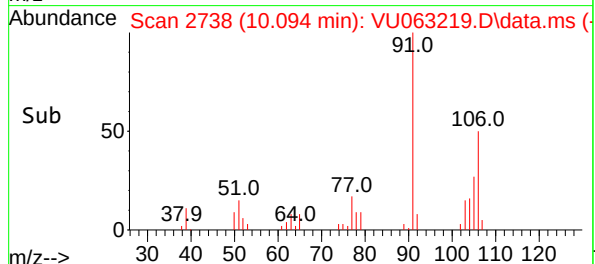
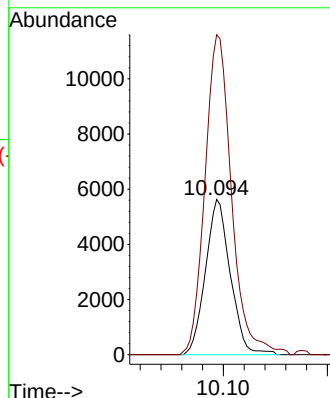
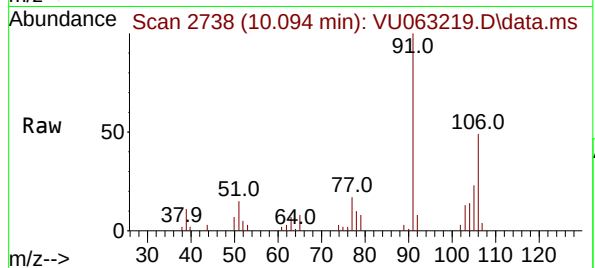
91 220.7 110.9 332.9

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#66

Styrene

Concen: 0.375 ug/l

RT: 10.113 min Scan# 2744

Delta R.T. 0.010 min

Lab File: VU063219.D

Acq: 10 Feb 2025 12:59

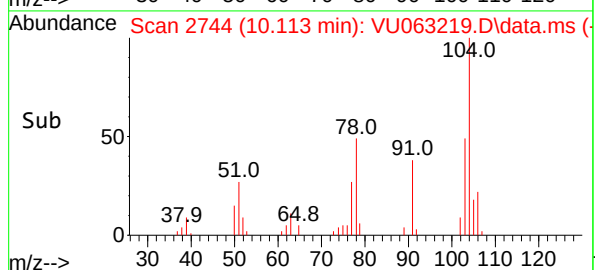
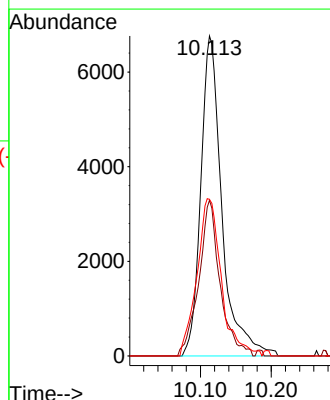
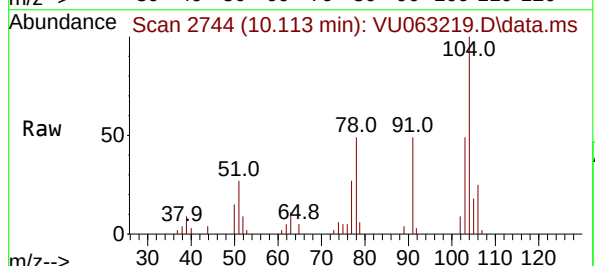
Tgt Ion:104 Resp: 14012

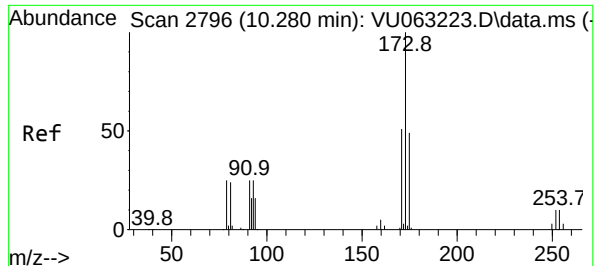
Ion Ratio Lower Upper

104 100

78 48.9 41.2 61.8

103 56.6 44.8 67.2





#67

Bromoform

Concen: 0.442 ug/l

RT: 10.283 min Scan# 21

Delta R.T. 0.003 min

Lab File: VU063219.D

Acq: 10 Feb 2025 12:59

Instrument :

MSVOA_U

ClientSampleId :

VSTDICC0.5

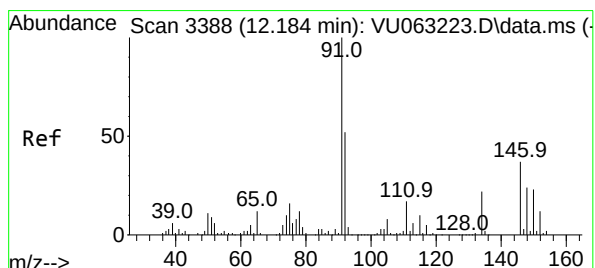
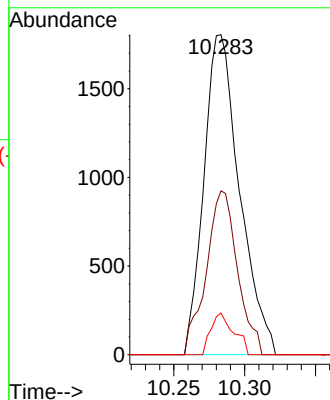
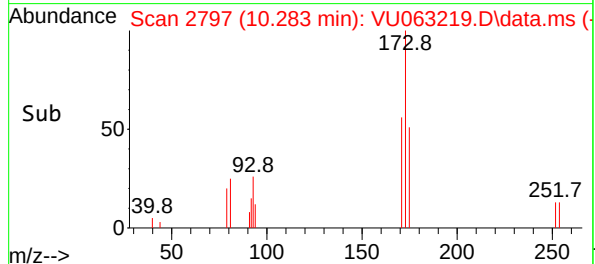
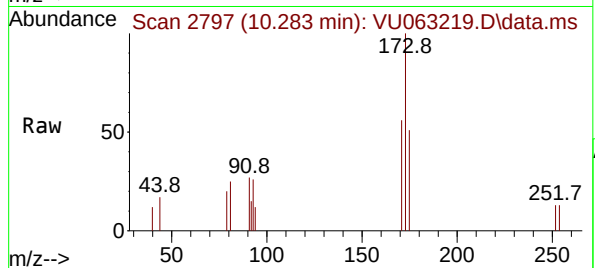
Tgt Ion:	173	Resp:	3160
Ion	Ratio	Lower	Upper
173	100		
175	44.9	39.0	58.4
254	8.4	7.7	11.5

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#68

1,2-Dichlorobenzene-d4

Concen: 0.914 ug/l

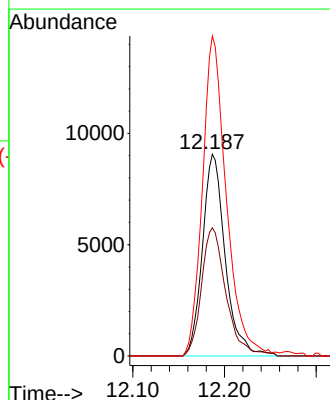
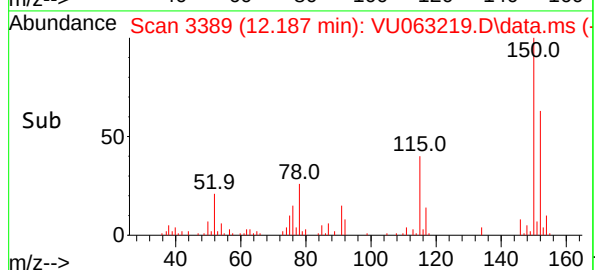
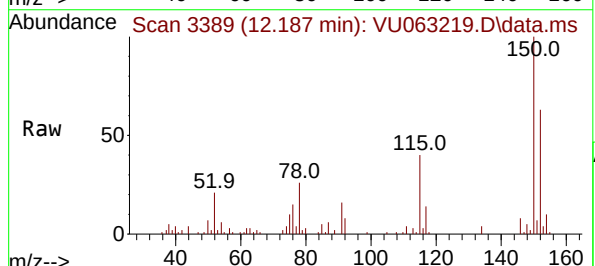
RT: 12.187 min Scan# 3389

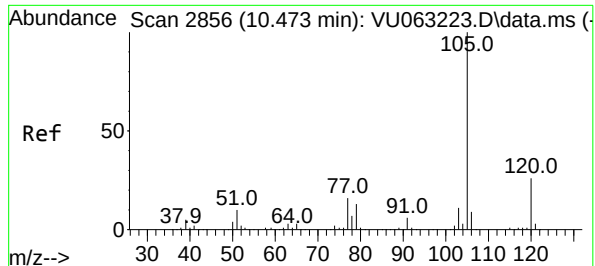
Delta R.T. 0.003 min

Lab File: VU063219.D

Acq: 10 Feb 2025 12:59

Tgt Ion:	152	Resp:	15652
Ion	Ratio	Lower	Upper
152	100		
115	68.2	0.0	275.2
150	166.4	0.0	658.4





#69

Isopropylbenzene

Concen: 0.402 ug/l

RT: 10.476 min Scan# 2856

Delta R.T. 0.003 min

Lab File: VU063219.D

Acq: 10 Feb 2025 12:59

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC0.5

Tgt Ion:105 Resp: 2219

Ion Ratio Lower Upper

105 100

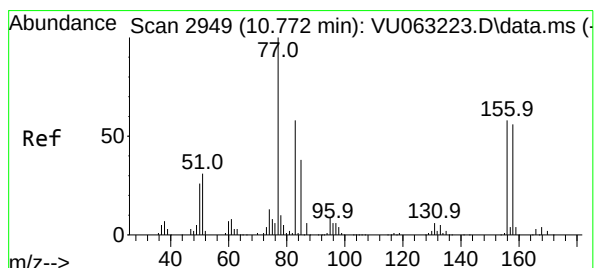
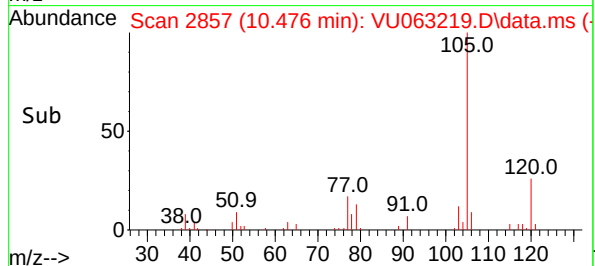
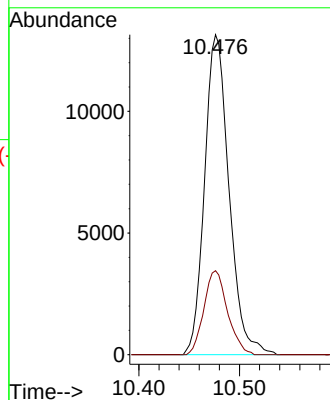
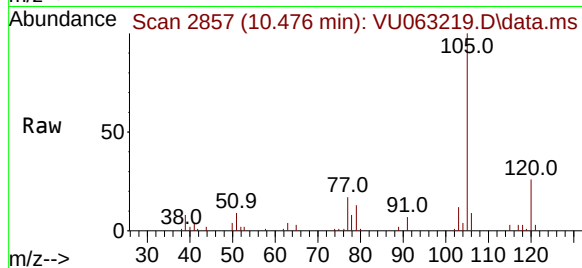
120 25.3 12.8 38.4

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#70

1,1,2,2-Tetrachloroethane

Concen: 0.440 ug/l

RT: 10.772 min Scan# 2949

Delta R.T. -0.000 min

Lab File: VU063219.D

Acq: 10 Feb 2025 12:59

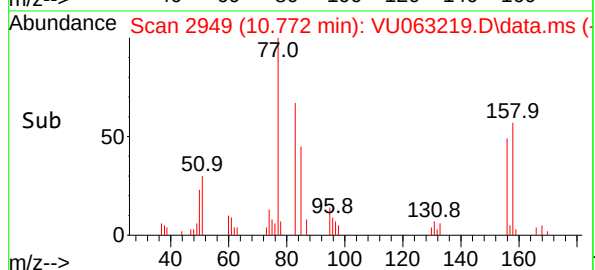
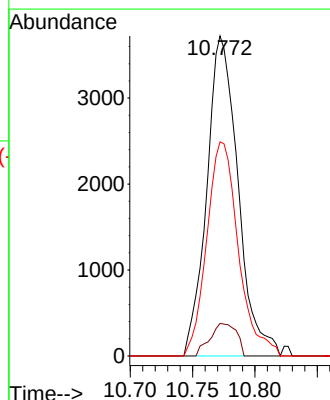
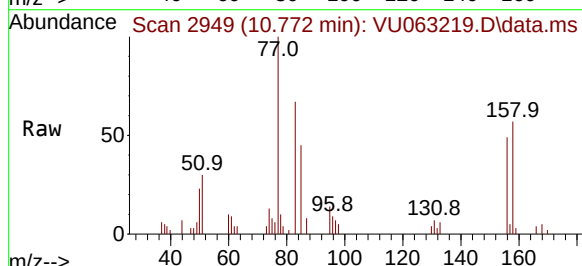
Tgt Ion: 83 Resp: 6493

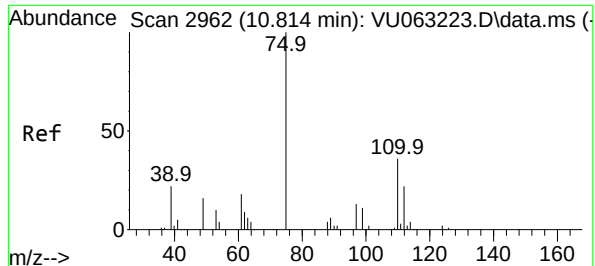
Ion Ratio Lower Upper

83 100

131 8.6 7.4 11.0

85 67.6 51.8 77.8





#71

1,2,3-Trichloropropane

Concen: 0.490 ug/l m

RT: 10.817 min Scan# 2963

Delta R.T. 0.003 min

Lab File: VU063219.D

Acq: 10 Feb 2025 12:59

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC0.5

Tgt Ion: 75 Resp: 548

Ion Ratio Lower Upper

75 100

77 0.0 0.0 0.0

110 27.4 0.0 77.0

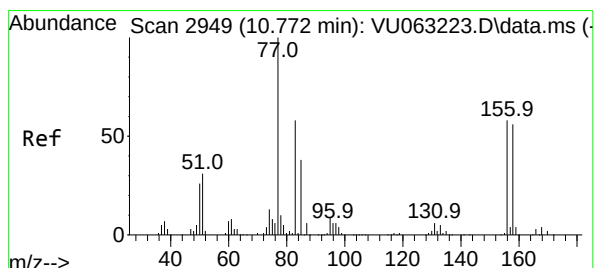
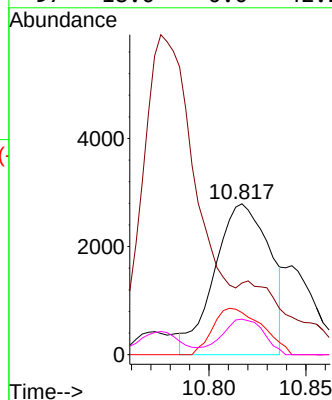
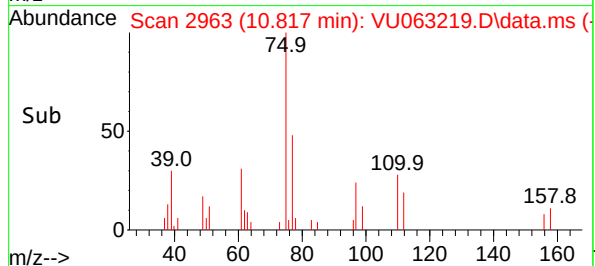
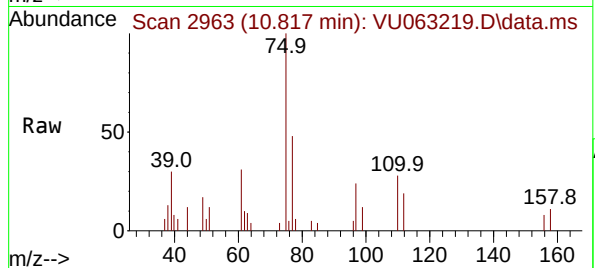
97 18.0 0.0 42.2

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#72

Bromobenzene

Concen: 0.424 ug/l

RT: 10.778 min Scan# 2951

Delta R.T. 0.006 min

Lab File: VU063219.D

Acq: 10 Feb 2025 12:59

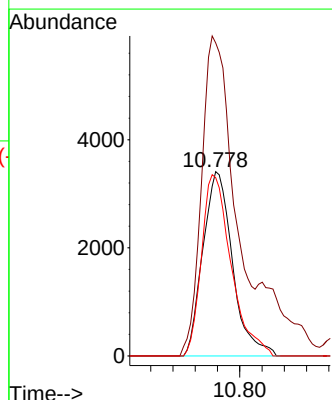
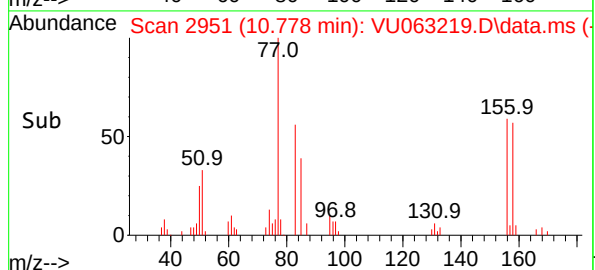
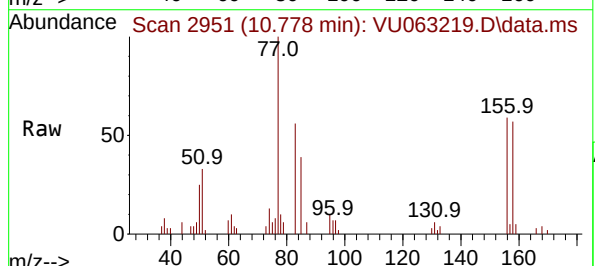
Tgt Ion:156 Resp: 6302

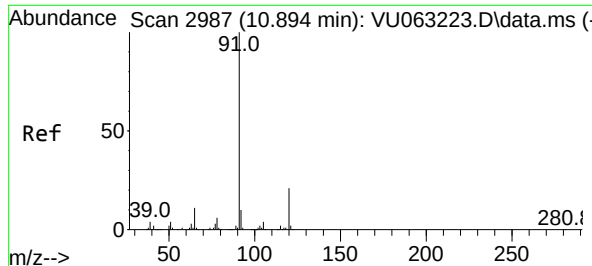
Ion Ratio Lower Upper

156 100

77 186.6 0.0 343.6

158 98.3 0.0 193.0





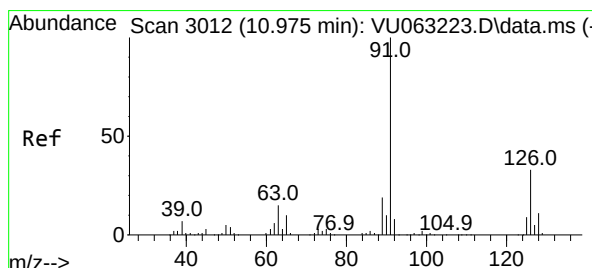
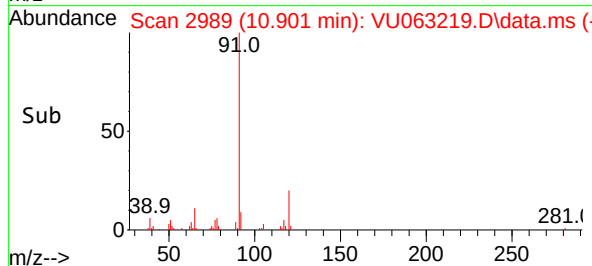
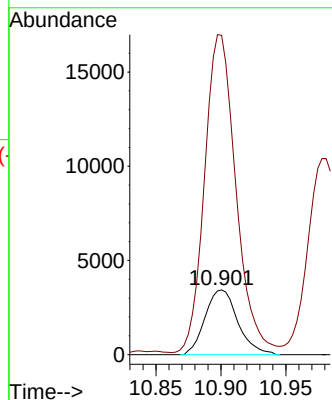
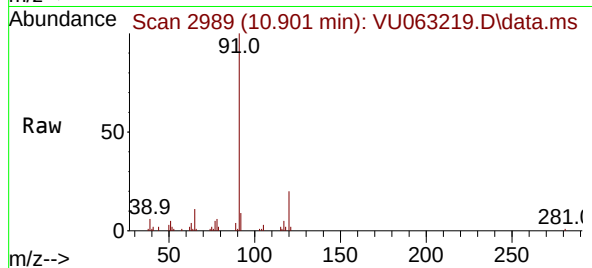
#73
n-propylbenzene
Concen: 0.382 ug/l
RT: 10.901 min Scan# 2989
Delta R.T. 0.006 min
Lab File: VU063219.D
Acq: 10 Feb 2025 12:59

Instrument :
MSVOA_U
ClientSampleId :
VSTDIC0.5

Tgt Ion:120 Resp: 6029
Ion Ratio Lower Upper
120 100
91 469.0 369.8 554.6

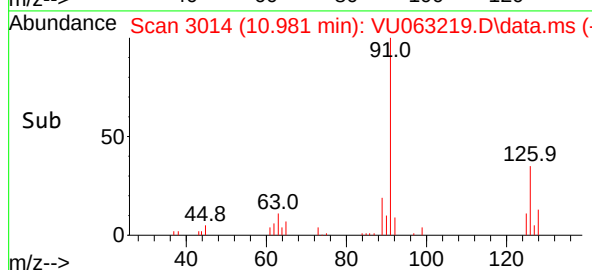
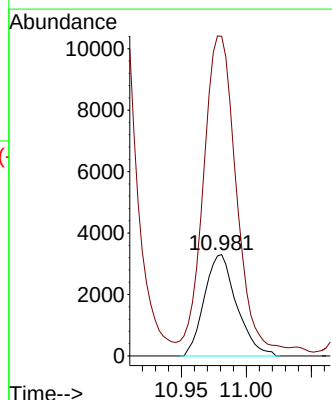
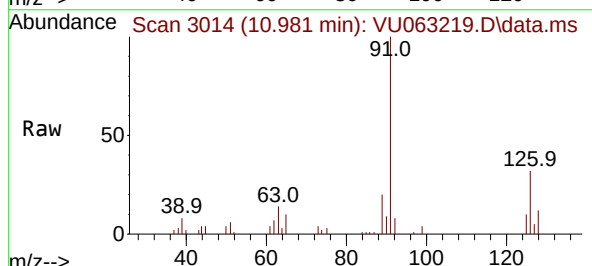
Manual Integrations
APPROVED

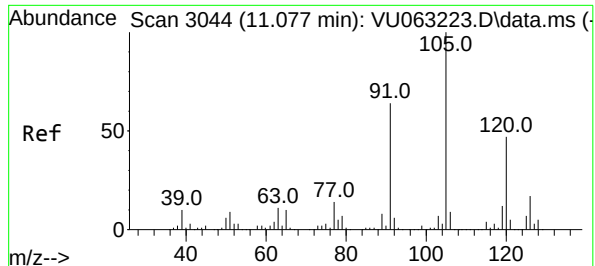
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#74
2-Chlorotoluene
Concen: 0.392 ug/l
RT: 10.981 min Scan# 3014
Delta R.T. 0.006 min
Lab File: VU063219.D
Acq: 10 Feb 2025 12:59

Tgt Ion:126 Resp: 5699
Ion Ratio Lower Upper
126 100
91 306.6 0.0 623.8





#75

1,3,5-Trimethylbenzene

Concen: 0.362 ug/l

RT: 11.081 min Scan# 3045

Delta R.T. 0.003 min

Lab File: VU063219.D

Acq: 10 Feb 2025 12:59

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC0.5

Tgt Ion:105 Resp: 1848

Ion Ratio Lower Upper

105 100

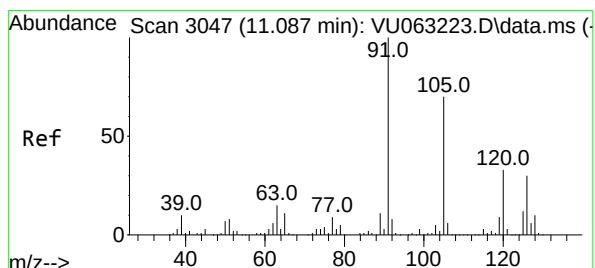
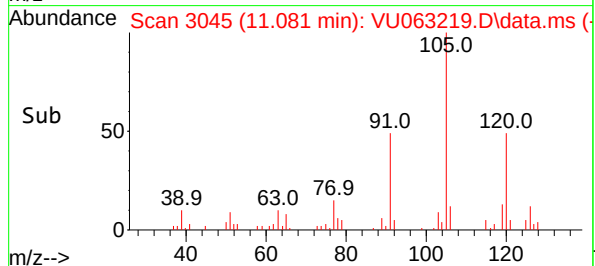
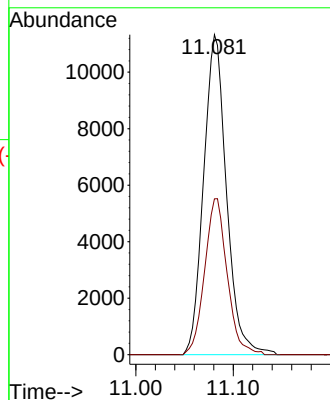
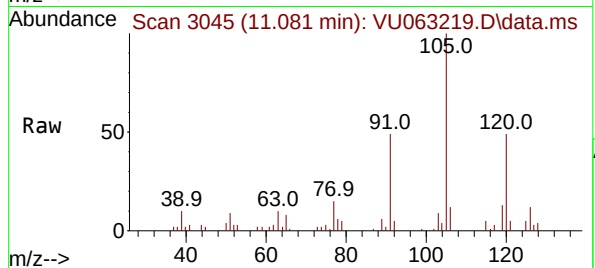
120 48.0 37.3 55.9

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#76

4-Chlorotoluene

Concen: 0.396 ug/l

RT: 11.093 min Scan# 3049

Delta R.T. 0.006 min

Lab File: VU063219.D

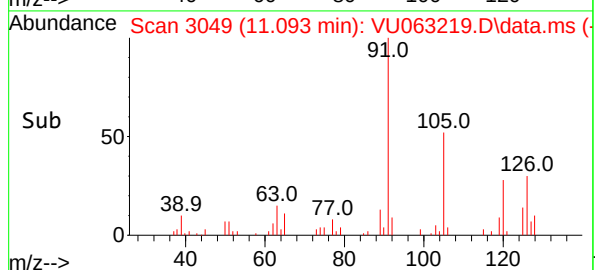
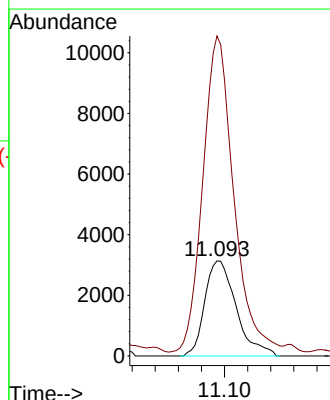
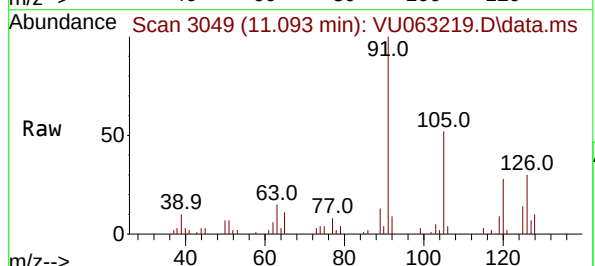
Acq: 10 Feb 2025 12:59

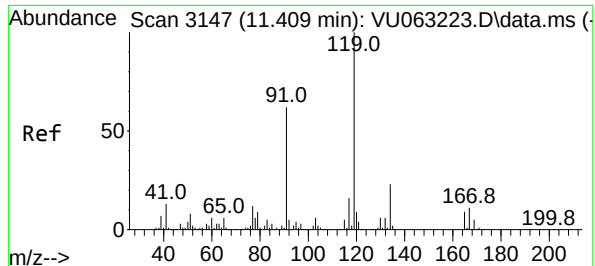
Tgt Ion:126 Resp: 5912

Ion Ratio Lower Upper

126 100

91 326.4 0.0 703.6



#77
tert-Butylbenzene

Concen: 0.412 ug/l

RT: 11.412 min Scan# 3148

Delta R.T. 0.003 min

Lab File: VU063219.D

Acq: 10 Feb 2025 12:59

Instrument :

MSVOA_U

ClientSampleId :

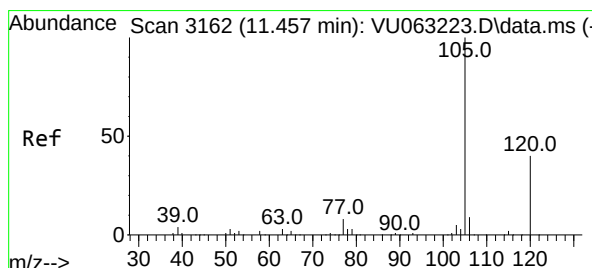
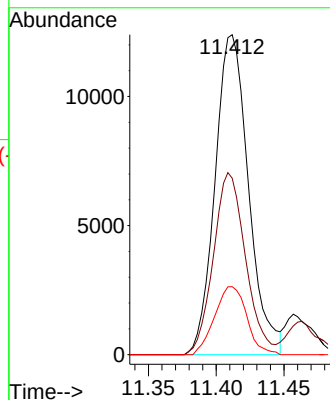
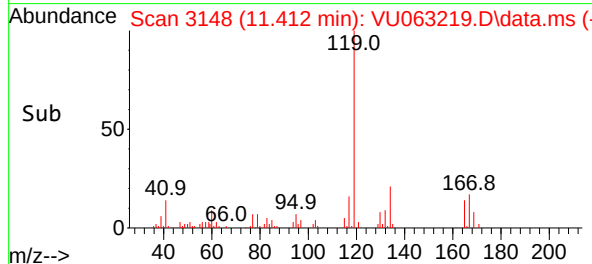
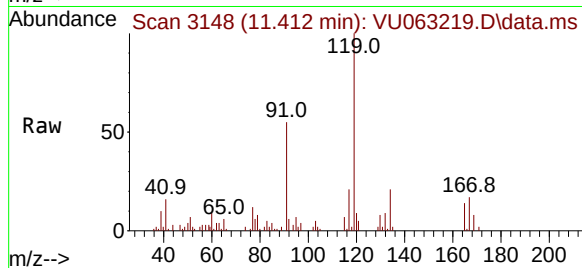
VSTDIC0.5

Tgt Ion:	119	Resp:	21304
Ion	Ratio	Lower	Upper
119	100		
91	54.7	29.4	88.3
134	20.4	17.6	26.4

Manual Integrations
APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#78

1,2,4-Trimethylbenzene

Concen: 0.349 ug/l

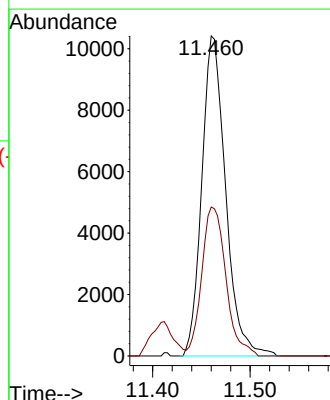
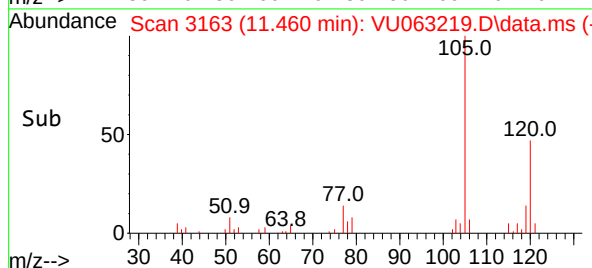
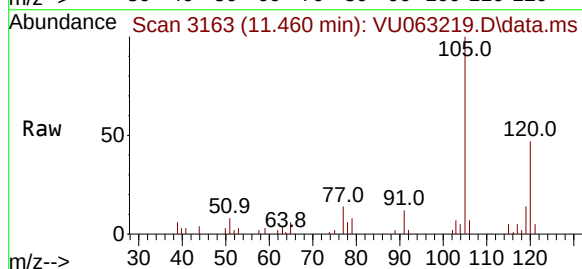
RT: 11.460 min Scan# 3163

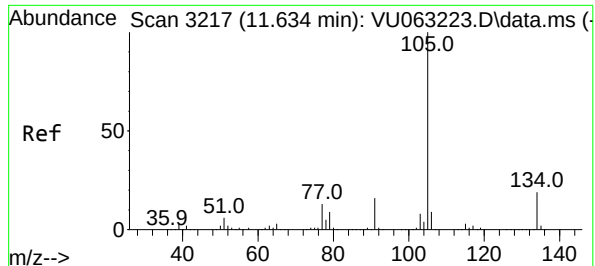
Delta R.T. 0.003 min

Lab File: VU063219.D

Acq: 10 Feb 2025 12:59

Tgt Ion:	105	Resp:	17694
Ion	Ratio	Lower	Upper
105	100		
120	47.2	21.9	65.7





#79

sec-Butylbenzene

Concen: 0.385 ug/l

RT: 11.637 min Scan# 3217

Delta R.T. 0.003 min

Lab File: VU063219.D

Acq: 10 Feb 2025 12:59

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC0.5

Tgt Ion:105 Resp: 2535

Ion Ratio Lower Upper

105 100

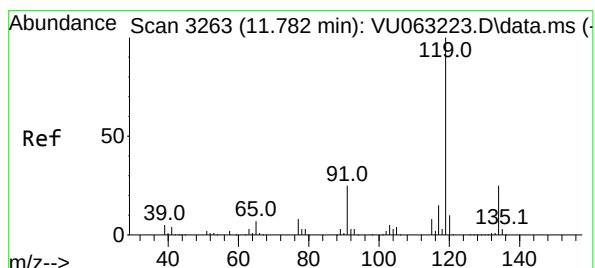
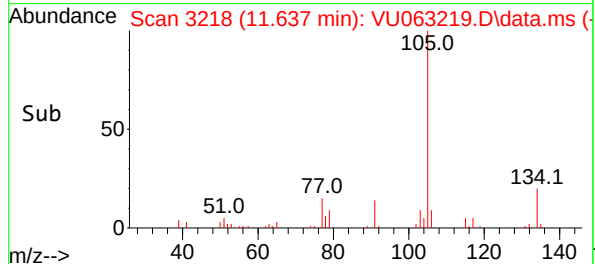
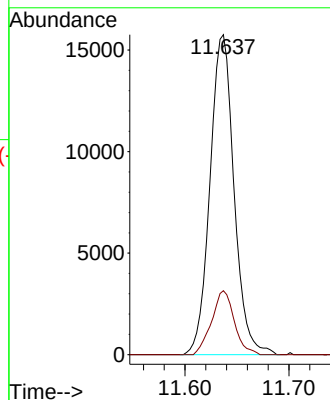
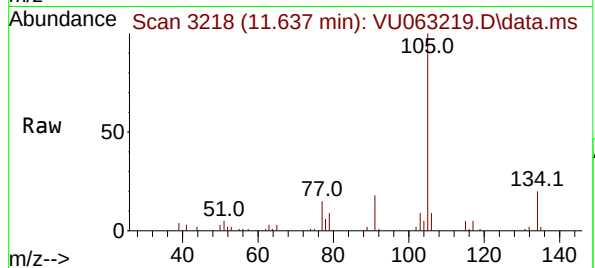
134 18.9 15.1 22.7

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#81

p-Isopropyltoluene

Concen: 0.358 ug/l

RT: 11.785 min Scan# 3264

Delta R.T. 0.003 min

Lab File: VU063219.D

Acq: 10 Feb 2025 12:59

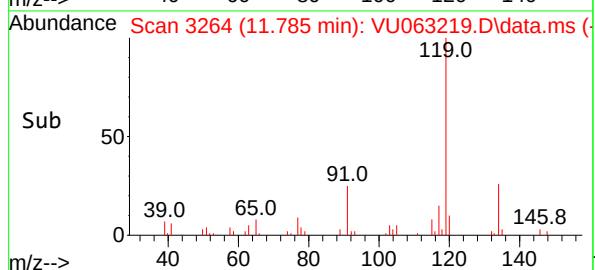
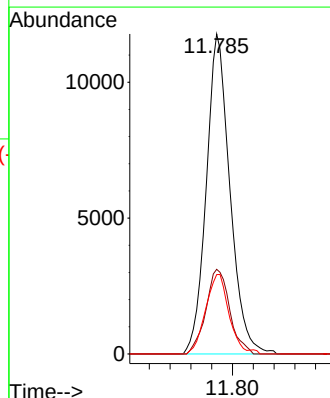
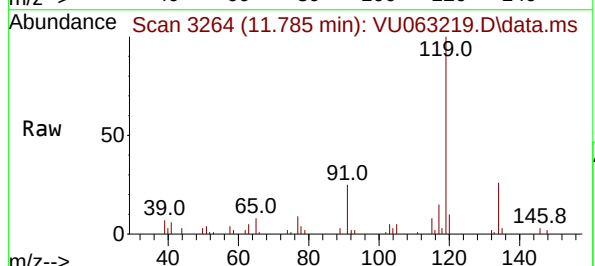
Tgt Ion:119 Resp: 18576

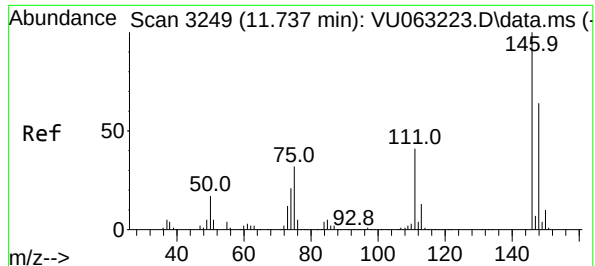
Ion Ratio Lower Upper

119 100

134 26.6 20.3 30.5

91 24.7 19.4 29.2





#82

1,3-Dichlorobenzene

Concen: 0.460 ug/l

RT: 11.740 min Scan# 31

Delta R.T. 0.003 min

Lab File: VU063219.D

Acq: 10 Feb 2025 12:59

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC0.5

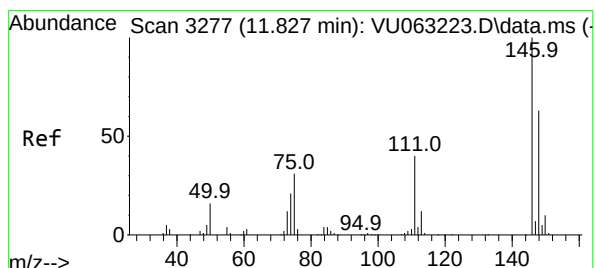
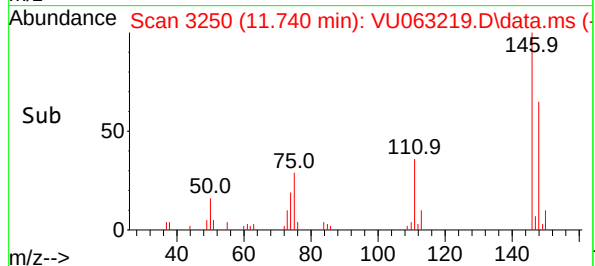
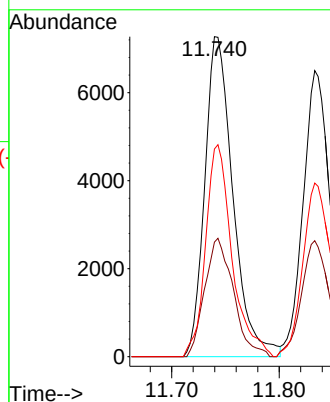
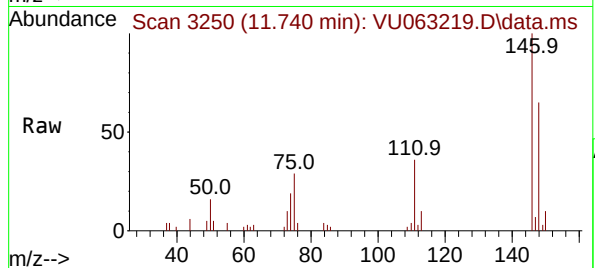
Tgt Ion:146	Resp:	1325
Ion Ratio	Lower	Upper
146	100	
111	37.7	32.8 49.2
148	62.2	51.1 76.7

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#83

1,4-Dichlorobenzene

Concen: 0.429 ug/l

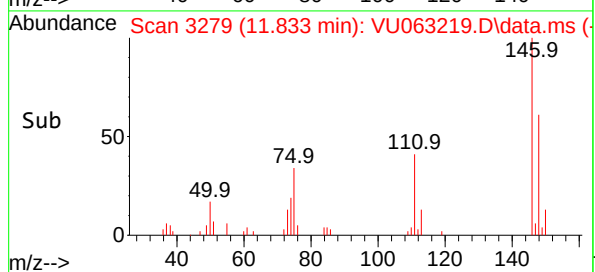
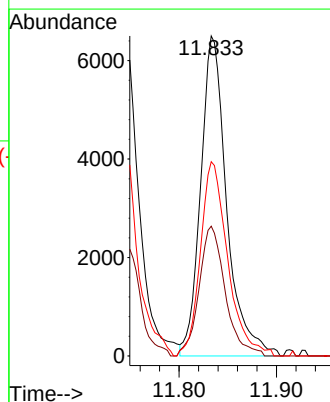
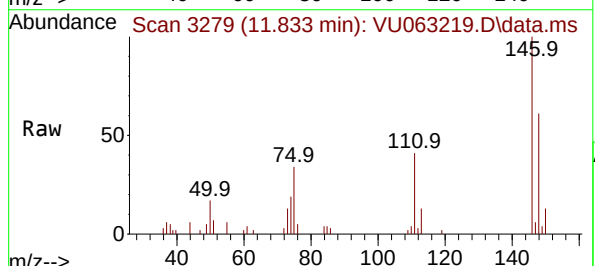
RT: 11.833 min Scan# 3279

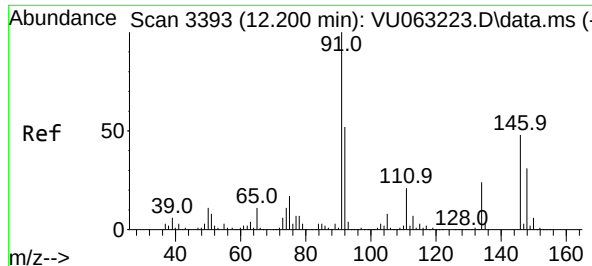
Delta R.T. 0.006 min

Lab File: VU063219.D

Acq: 10 Feb 2025 12:59

Tgt Ion:146	Resp:	12096
Ion Ratio	Lower	Upper
146	100	
111	40.6	32.1 48.1
148	63.6	50.2 75.4





#84

n-Butylbenzene

Concen: 0.369 ug/l

RT: 12.206 min Scan# 3395

Delta R.T. 0.006 min

Lab File: VU063219.D

Acq: 10 Feb 2025 12:59

Instrument :

MSVOA_U

ClientSampleId :

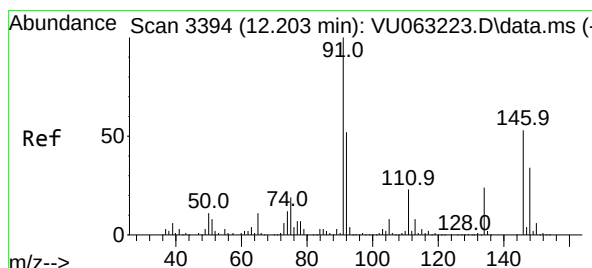
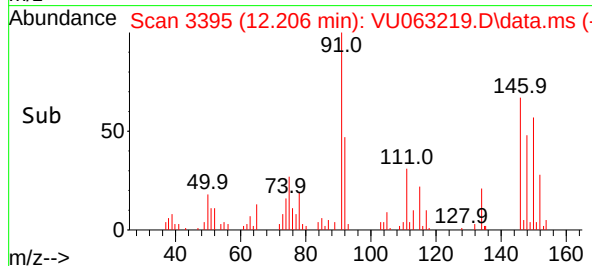
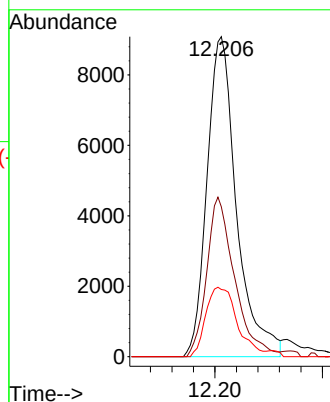
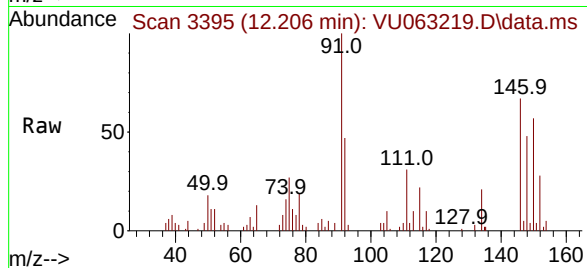
VSTDIC0.5

Tgt Ion: 91	Resp: 1729
Ion Ratio	Lower Upper
91	100
92	47.1 41.8 62.8
134	23.1 18.6 28.0

Manual Integrations
APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#85

1,2-Dichlorobenzene

Concen: 0.433 ug/l

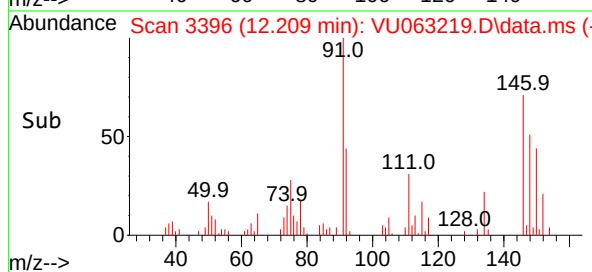
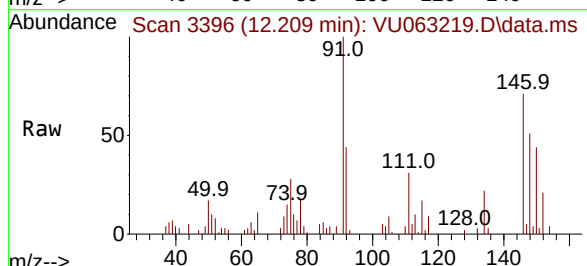
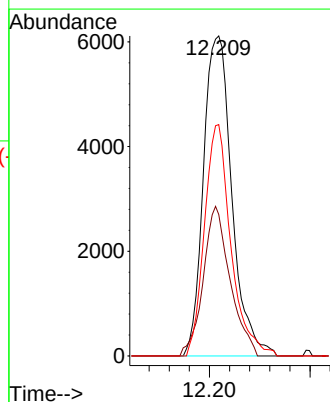
RT: 12.209 min Scan# 3396

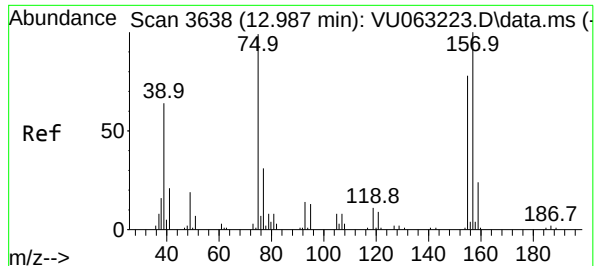
Delta R.T. 0.006 min

Lab File: VU063219.D

Acq: 10 Feb 2025 12:59

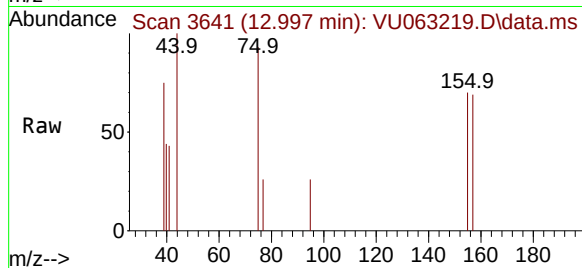
Tgt Ion:146	Resp: 11996
Ion Ratio	Lower Upper
146	100
111	44.2 21.9 65.7
148	67.4 32.3 96.9





#86
1,2-Dibromo-3-Chloropropane
Concen: 0.376 ug/l
RT: 12.997 min Scan# 3641
Delta R.T. 0.010 min
Lab File: VU063219.D
Acq: 10 Feb 2025 12:59

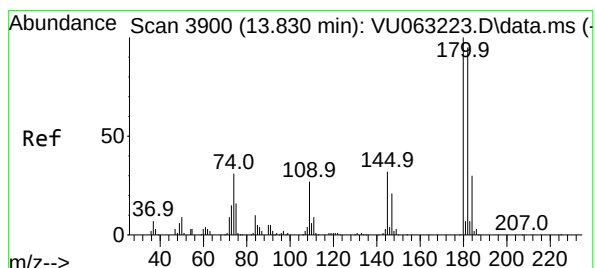
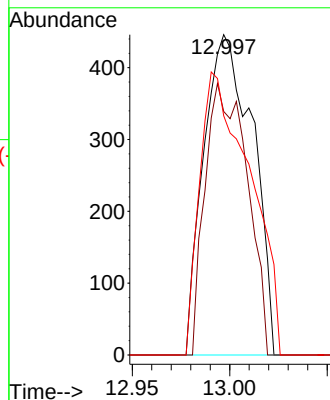
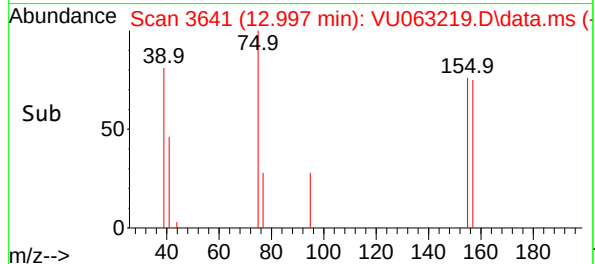
Instrument :
MSVOA_U
ClientSampleId :
VSTDIC0.5



Tgt Ion: 75 Resp: 779
Ion Ratio Lower Upper
75 100
155 72.8 63.5 95.3
157 91.0 81.8 122.6

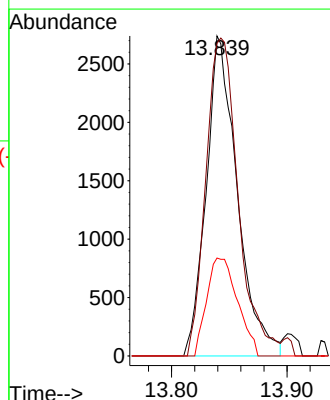
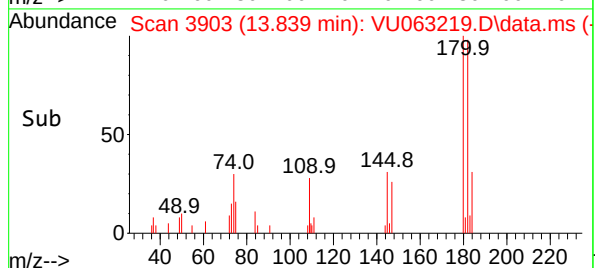
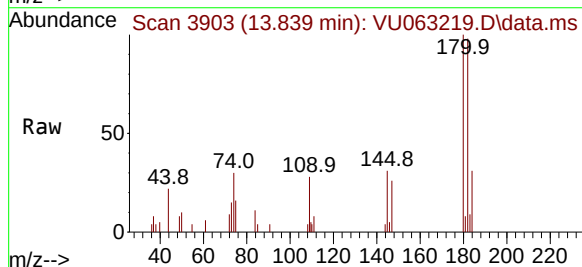
Manual Integrations
APPROVED

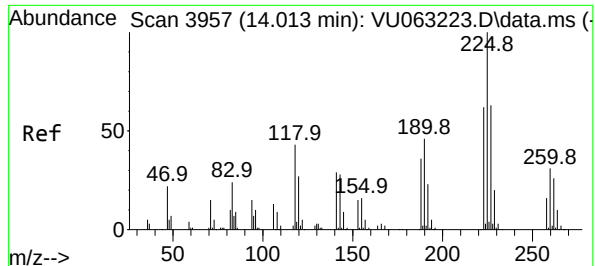
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#87
1,2,4-Trichlorobenzene
Concen: 0.380 ug/l
RT: 13.839 min Scan# 3903
Delta R.T. 0.010 min
Lab File: VU063219.D
Acq: 10 Feb 2025 12:59

Tgt Ion:180 Resp: 5130
Ion Ratio Lower Upper
180 100
182 103.3 76.6 115.0
145 30.3 25.4 38.2





#88

Hexachlorobutadiene

Concen: 0.482 ug/l

RT: 14.013 min Scan# 3957

Delta R.T. -0.000 min

Lab File: VU063219.D

Acq: 10 Feb 2025 12:59

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC0.5

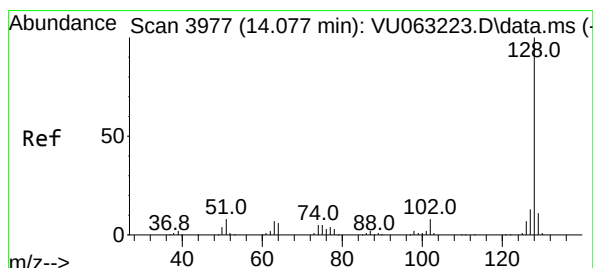
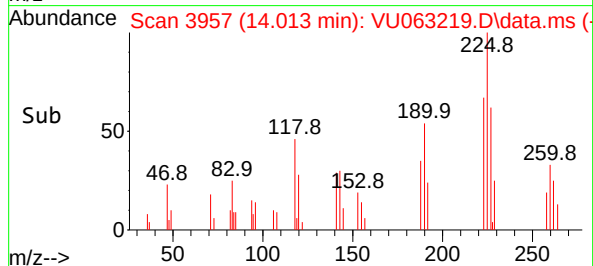
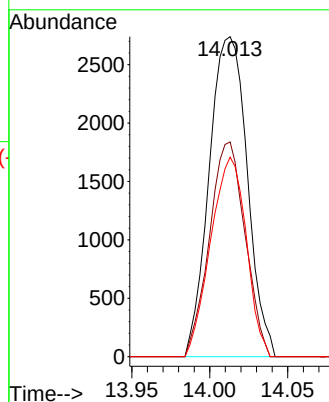
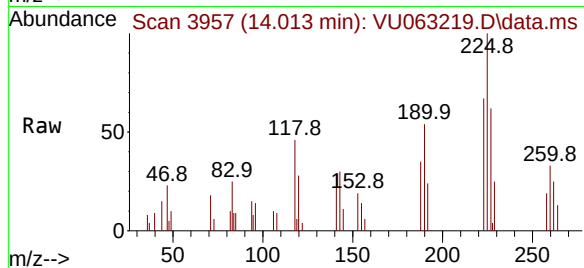
Tgt Ion:	225	Resp:	465
Ion Ratio	Lower	Upper	
225	100		
223	62.8	49.5	74.3
227	58.2	51.0	76.4

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#89

Naphthalene

Concen: 0.899 ug/l

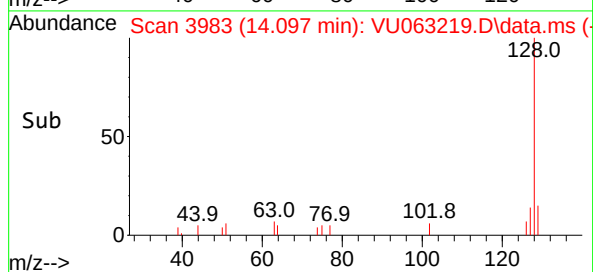
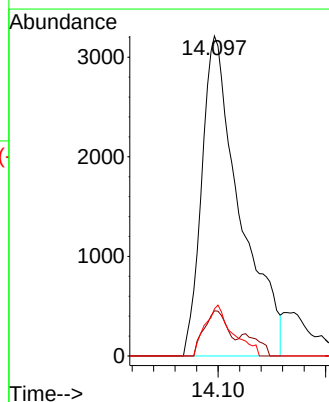
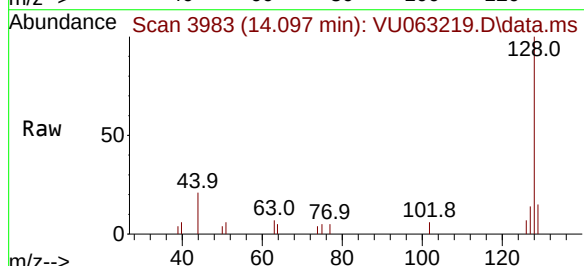
RT: 14.097 min Scan# 3983

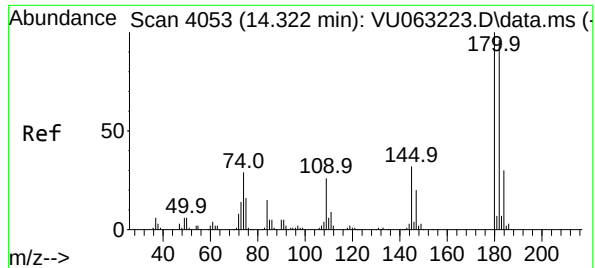
Delta R.T. 0.019 min

Lab File: VU063219.D

Acq: 10 Feb 2025 12:59

Tgt Ion:	128	Resp:	7859
Ion Ratio	Lower	Upper	
128	100		
127	8.9	10.6	16.0#
129	11.5	8.6	13.0





#90

1,2,3-Trichlorobenzene

Concen: 0.412 ug/l

RT: 14.328 min Scan# 4053

Delta R.T. 0.006 min

Lab File: VU063219.D

Acq: 10 Feb 2025 12:59

Instrument :

MSVOA_U

ClientSampleId :

VSTDICC0.5

Tgt Ion:180 Resp: 545

Ion Ratio Lower Upper

180 100

182 96.5 78.2 117.2

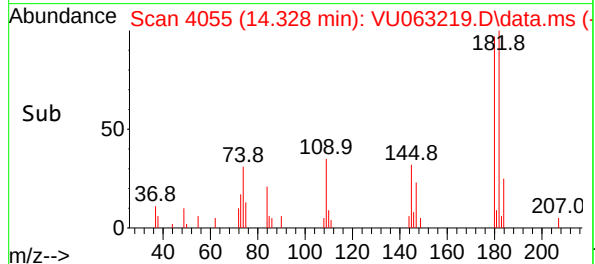
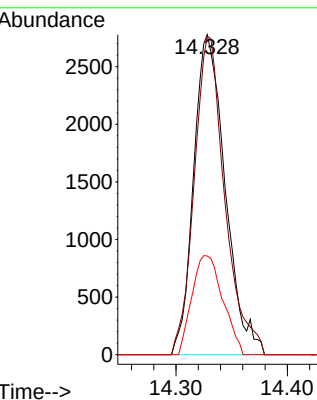
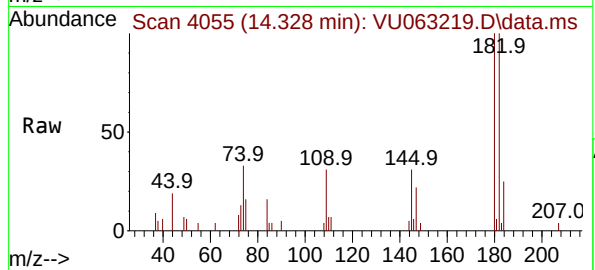
145 30.3 26.1 39.1

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



Data Path : Z:\voasrv\HPCHEM1\MSVOA_U\Data\VU021025\
 Data File : VU063220.D
 Acq On : 10 Feb 2025 13:23
 Operator : MD/SY
 Sample : VSTDICC001
 Misc : 25.0mL/MSVOA_U/WATER
 ALS Vial : 4 Sample Multiplier: 1

Instrument :
 MSVOA_U
 ClientSampleId :
 VSTDICC001

Manual Integrations APPROVED

Reviewed By :Amit Patel 02/12/2025
 Supervised By :Mahesh Dadoda 02/12/2025

Quant Time: Feb 11 03:57:58 2025
 Quant Method : Z:\voasrv\HPCHEM1\MSVOA_U\Method\524U021025DW.M
 Quant Title : METHOD 524.2 VOLATILES DRINKING WATER
 QLast Update : Tue Feb 11 03:56:39 2025
 Response via : Initial Calibration

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

Internal Standards						
1) Fluorobenzene	6.107	96	51567	1.000	ug/l	# 0.00
System Monitoring Compounds						
57) 4-Bromofluorobenzene	10.627	95	16040	0.943	ug/l	0.00
Spiked Amount 1.000			Recovery	=	94.000%	
68) 1,2-Dichlorobenzene-d4	12.187	152	16904	0.956	ug/l	0.00
Spiked Amount 1.000			Recovery	=	96.000%	
Target Compounds						
					Qvalue	
2) Dichlorodifluoromethane	1.380	85	18689	1.115	ug/l	97
3) Chloromethane	1.518	50	20645	1.070	ug/l	98
4) Vinyl Chloride	1.599	62	20135	1.055	ug/l	99
5) Bromomethane	1.846	94	10384	1.176	ug/l	96
6) Chloroethane	1.924	64	13381	1.113	ug/l	95
7) Trichlorofluoromethane	2.129	101	24378	1.078	ug/l	98
8) 1,1,2-Trichloro-1,2,2-...	2.567	101	14009	1.091	ug/l	98
9) 1,1-Dichloroethene	2.570	96	14118	1.079	ug/l	97
10) Iodomethane	2.711	142	21185	1.030	ug/l	98
11) Allyl Chloride	2.914	41	20123	1.071	ug/l	97
12) Acrylonitrile	3.322	53	5799	1.950	ug/l	99
13) Acetone	2.618	43	12193	5.255	ug/l	98
14) Carbon Disulfide	2.782	76	48738	1.065	ug/l	99
15) Methylene Chloride	3.033	84	17173	1.063	ug/l	95
16) trans-1,2-Dichloroethene	3.345	96	15731	1.054	ug/l	98
17) 1,1-Dichloroethane	3.856	63	30538	1.085	ug/l	98
18) 2-Butanone	4.711	43	18530m	4.944	ug/l	
19) Cyclohexane	5.374	56	21832m	0.965	ug/l	
20) Methylcyclohexane	6.753	83	23086	1.029	ug/l	99
21) 2,2-Dichloropropane	4.650	77	23852	1.086	ug/l	98
22) cis-1,2-Dichloroethene	4.657	96	17134	1.062	ug/l	98
23) Diethyl Ether	2.367	59	11921	1.062	ug/l	95
24) tert-Butyl Alcohol	3.165	59	19963	11.656	ug/l #	89
25) Methyl tert-Butyl Ether	3.351	73	33609	1.029	ug/l	98
26) Bromochloromethane	4.962	128	7742	1.098	ug/l	96
27) Chloroform	5.075	83	30302	1.067	ug/l	94
28) 1,1,1-Trichloroethane	5.300	97	24038	1.045	ug/l	96
29) 1,1-Dichloropropene	5.518	75	21427	1.040	ug/l	99
30) Carbon Tetrachloride	5.512	117	21505	1.090	ug/l	90
31) Isopropyl Ether	3.978	45	40509	1.008	ug/l	96
32) Ethyl-t-butyl ether	4.486	59	35372	0.968	ug/l	98
33) Tert-Amyl methyl ether	5.927	73	31129	0.975	ug/l	99
34) Propionitrile	4.782	54	5038m	4.335	ug/l	
35) Benzene	5.766	78	65980	1.041	ug/l	99
36) 1,2-Dichloroethane	5.788	62	19157	1.048	ug/l	97
37) Trichloroethene	6.534	130	16013	1.063	ug/l	97
38) 1,2-Dichloropropane	6.782	63	17158	1.035	ug/l	93
39) Methacrylonitrile	4.978	41	3478	0.838	ug/l #	84
40) Methyl acrylate	4.866	55	7528m	0.993	ug/l	
41) Tetrahydrofuran	5.049	42	4693	1.924	ug/l	91
42) 1-Chlorobutane	5.448	56	28598	1.014	ug/l	99
43) Dibromomethane	6.907	93	8944	1.065	ug/l	93
44) Bromodichloromethane	7.094	83	20720	1.060	ug/l	98

Data Path : Z:\voasrv\HPCHEM1\MSVOA_U\Data\VU021025\
 Data File : VU063220.D
 Acq On : 10 Feb 2025 13:23
 Operator : MD/SY
 Sample : VSTDICC001
 Misc : 25.0mL/MSVOA_U/WATER
 ALS Vial : 4 Sample Multiplier: 1

Instrument :
 MSVOA_U
 ClientSampleId :
 VSTDICC001

Manual Integrations
 APPROVED

Reviewed By :Amit Patel 02/12/2025
 Supervised By :Mahesh Dadoda 02/12/2025

Quant Time: Feb 11 03:57:58 2025
 Quant Method : Z:\voasrv\HPCHEM1\MSVOA_U\Method\524U021025DW.M
 Quant Title : METHOD 524.2 VOLATILES DRINKING WATER
 QLast Update : Tue Feb 11 03:56:39 2025
 Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
45) 4-Methyl-2-Pentanone	7.782	43	39981	4.541	ug/l	96
46) t-1,4-Dichloro-2-butene	10.820	75	8630m	1.981	ug/l	
47) Methyl methacrylate	6.956	69	12987	1.836	ug/l	98
48) Ethyl methacrylate	8.328	69	11711	0.882	ug/l	100
49) Toluene	7.962	92	36357	0.998	ug/l	100
50) t-1,3-Dichloropropene	8.206	75	17681	0.988	ug/l	98
51) cis-1,3-Dichloropropene	7.599	75	22033	0.997	ug/l	99
52) 1,1,2-Trichloroethane	8.393	97	11610	1.025	ug/l	97
53) 1,3-Dichloropropane	8.566	76	21023	1.046	ug/l	99
54) 2-Hexanone	8.679	43	28078m	4.673	ug/l	
55) Dibromochloromethane	8.801	129	13259	1.018	ug/l	98
56) 1,2-Dibromoethane	8.917	107	10628	1.001	ug/l	94
58) Tetrachloroethene	8.544	164	13296	1.071	ug/l	95
59) Chlorobenzene	9.441	112	38774	1.008	ug/l	99
60) 1,1,1,2-Tetrachloroethane	9.525	131	14393	1.041	ug/l	99
61) Pentachloroethane	11.418	117	12686	1.027	ug/l	94
62) Hexachloroethane	12.463	117	11074	1.014	ug/l	93
63) Ethyl Benzene	9.560	91	63398	0.956	ug/l	99
64) m/p-Xylenes	9.685	106	45748	1.847	ug/l	99
65) o-Xylene	10.090	106	23138	0.954	ug/l	100
66) Styrene	10.110	104	34785	0.901	ug/l	99
67) Bromoform	10.280	173	7192	0.973	ug/l #	97
69) Isopropylbenzene	10.473	105	53372	0.936	ug/l	98
70) 1,1,2,2-Tetrachloroethane	10.772	83	15680	1.027	ug/l	97
71) 1,2,3-Trichloropropane	10.814	75	11462m	0.991	ug/l	
72) Bromobenzene	10.775	156	15611	1.016	ug/l	95
73) n-propylbenzene	10.898	120	14761	0.904	ug/l	95
74) 2-Chlorotoluene	10.975	126	14317	0.952	ug/l	95
75) 1,3,5-Trimethylbenzene	11.078	105	48403	0.916	ug/l	99
76) 4-Chlorotoluene	11.090	126	15039	0.975	ug/l	89
77) tert-Butylbenzene	11.409	119	50914	0.953	ug/l	98
78) 1,2,4-Trimethylbenzene	11.460	105	46689	0.891	ug/l	100
79) sec-Butylbenzene	11.634	105	63226	0.930	ug/l	99
80) Nitrobenzene	13.232	77	1014	5.911	ug/l #	57
81) p-Isopropyltoluene	11.785	119	48578	0.905	ug/l	99
82) 1,3-Dichlorobenzene	11.737	146	28406	0.953	ug/l	98
83) 1,4-Dichlorobenzene	11.830	146	26529	0.910	ug/l	94
84) n-Butylbenzene	12.200	91	42404	0.876	ug/l	97
85) 1,2-Dichlorobenzene	12.203	146	27742	0.969	ug/l	99
86) 1,2-Dibromo-3-Chloropr...	12.997	75	2103	0.982	ug/l	89
87) 1,2,4-Trichlorobenzene	13.836	180	12695	0.909	ug/l	99
88) Hexachlorobutadiene	14.010	225	10179	1.020	ug/l	97
89) Naphthalene	14.090	128	17271	1.192	ug/l	97
90) 1,2,3-Trichlorobenzene	14.325	180	12218	0.894	ug/l	96

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

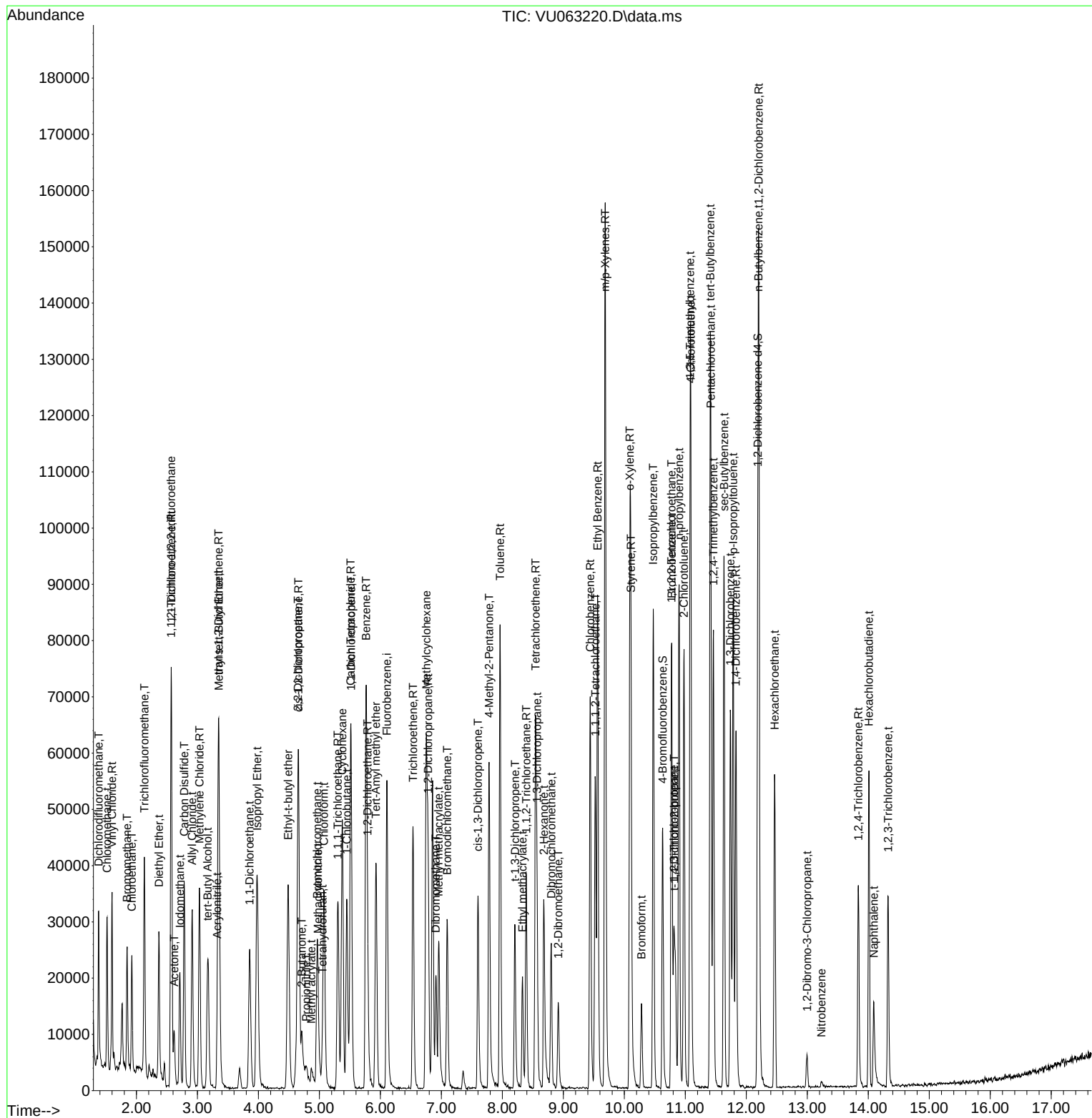
Data Path : Z:\voasrv\HPCHEM1\MSVOA_U\Data\VU021025\
 Data File : VU063220.D
 Acq On : 10 Feb 2025 13:23
 Operator : MD/SY
 Sample : VSTDIC001
 Misc : 25.0mL/MSVOA_U/WATER
 ALS Vial : 4 Sample Multiplier: 1

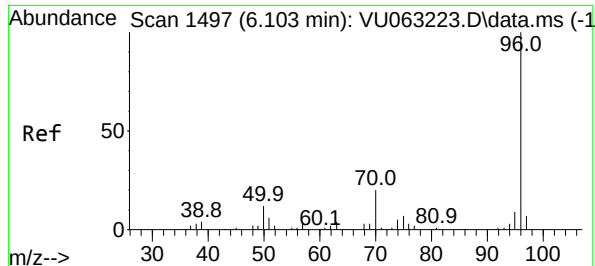
Instrument :
 MSVOA_U
 ClientSampleId :
 VSTDIC001

Manual Integrations APPROVED

Reviewed By :Amit Patel 02/12/2025
 Supervised By :Mahesh Dadoda 02/12/2025

Quant Time: Feb 11 03:57:58 2025
 Quant Method : Z:\voasrv\HPCHEM1\MSVOA_U\Method\524U021025DW.M
 Quant Title : METHOD 524.2 VOLATILES DRINKING WATER
 QLast Update : Tue Feb 11 03:56:39 2025
 Response via : Initial Calibration





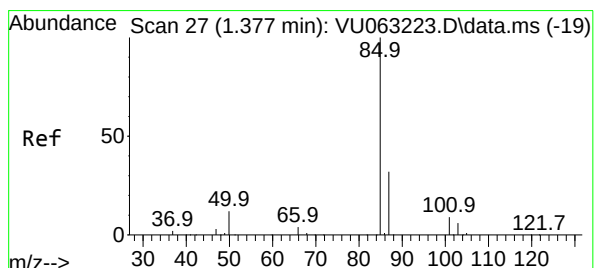
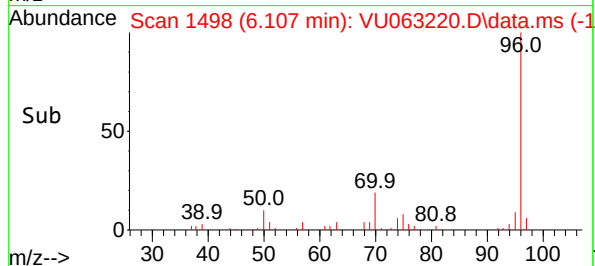
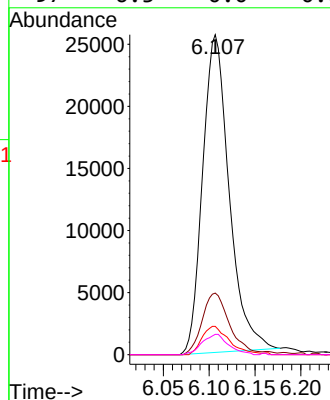
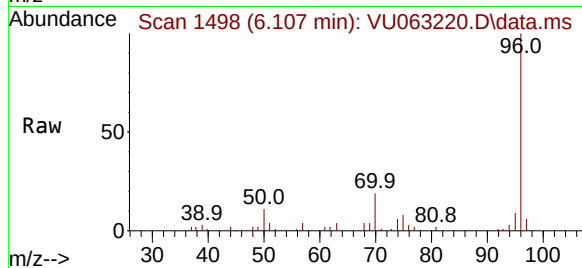
#1
Fluorobenzene
Concen: 1.000 ug/l
RT: 6.107 min Scan# 1497
Delta R.T. 0.004 min
Lab File: VU063220.D
Acq: 10 Feb 2025 13:23

Instrument :
MSVOA_U
ClientSampleId :
VSTDICC001

Tgt Ion: 96 Resp: 5156
Ion Ratio Lower Upper
96 100
70 18.8 15.6 23.4
95 9.2 7.3 10.9
97 6.3 0.0 0.0#

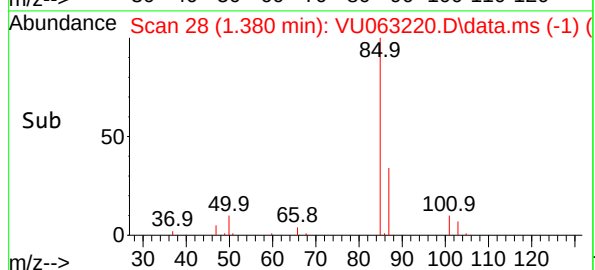
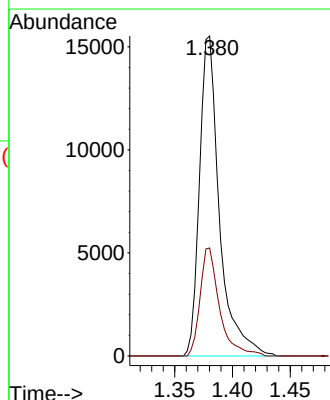
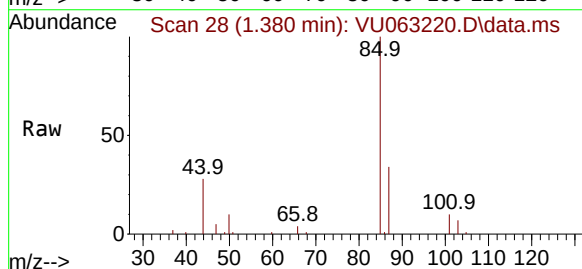
Manual Integrations
APPROVED

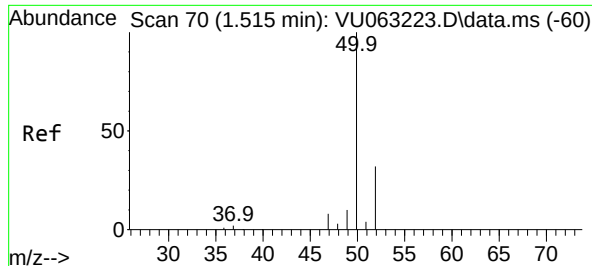
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#2
Dichlorodifluoromethane
Concen: 1.115 ug/l
RT: 1.380 min Scan# 28
Delta R.T. 0.003 min
Lab File: VU063220.D
Acq: 10 Feb 2025 13:23

Tgt Ion: 85 Resp: 18689
Ion Ratio Lower Upper
85 100
87 33.8 16.0 48.0





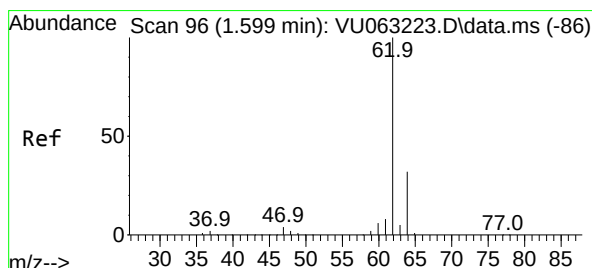
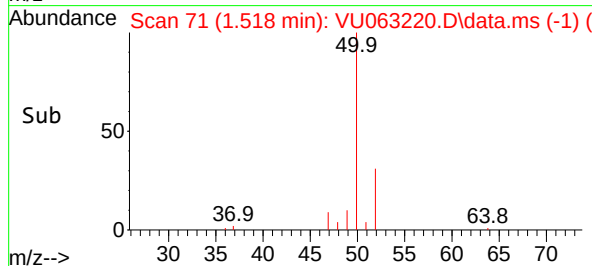
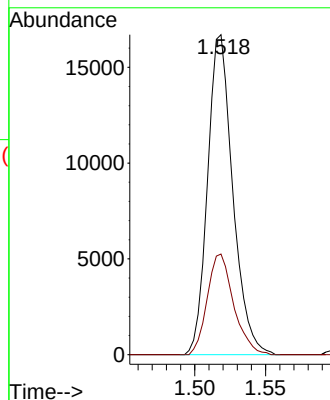
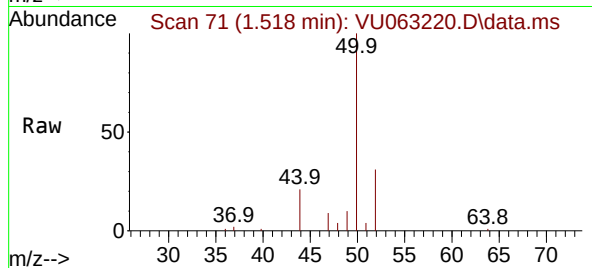
#3
Chloromethane
Concen: 1.070 ug/l
RT: 1.518 min Scan# 70
Delta R.T. 0.003 min
Lab File: VU063220.D
Acq: 10 Feb 2025 13:23

Instrument :
MSVOA_U
ClientSampleId :
VSTDICC001

Tgt Ion: 50 Resp: 2064
Ion Ratio Lower Upper
50 100
52 31.5 25.8 38.8

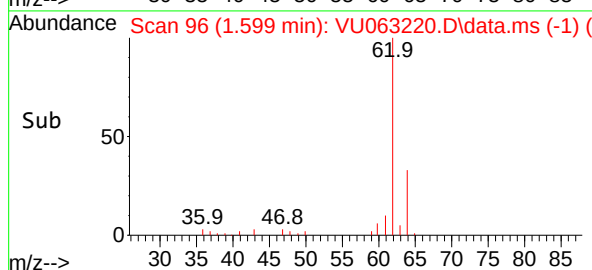
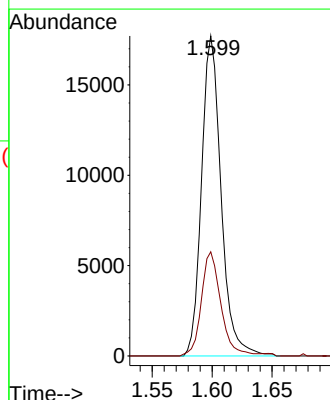
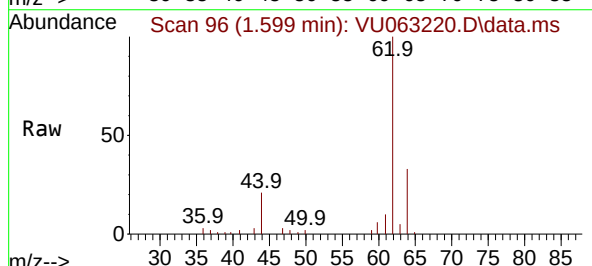
Manual Integrations
APPROVED

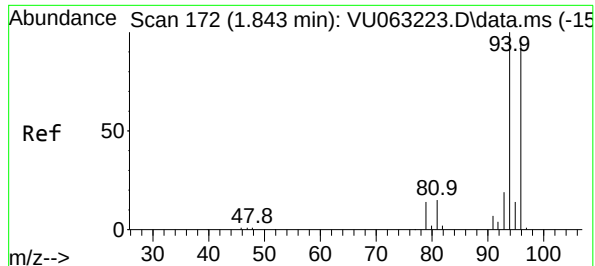
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#4
Vinyl Chloride
Concen: 1.055 ug/l
RT: 1.599 min Scan# 96
Delta R.T. 0.000 min
Lab File: VU063220.D
Acq: 10 Feb 2025 13:23

Tgt Ion: 62 Resp: 20135
Ion Ratio Lower Upper
62 100
64 32.5 25.4 38.0





#5

Bromomethane

Concen: 1.176 ug/l

RT: 1.846 min Scan# 1

Delta R.T. 0.003 min

Lab File: VU063220.D

Acq: 10 Feb 2025 13:23

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC001

Tgt Ion: 94 Resp: 10384

Ion Ratio Lower Upper

94 100

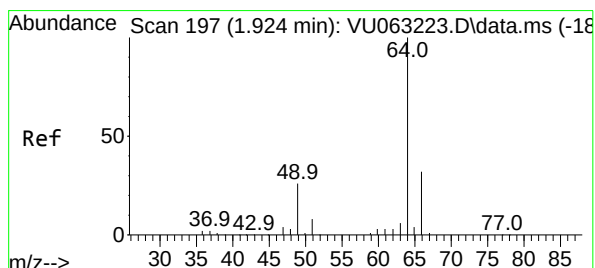
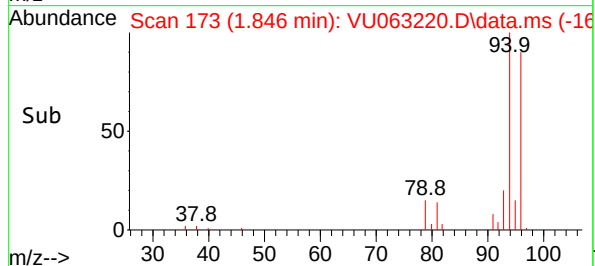
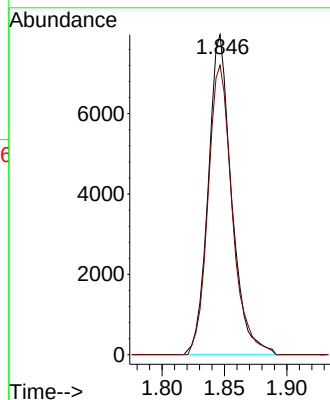
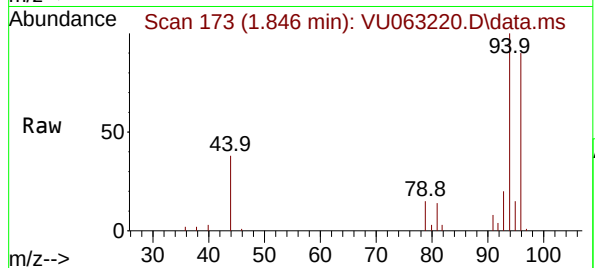
96 90.4 75.7 113.5

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#6

Chloroethane

Concen: 1.113 ug/l

RT: 1.924 min Scan# 197

Delta R.T. 0.000 min

Lab File: VU063220.D

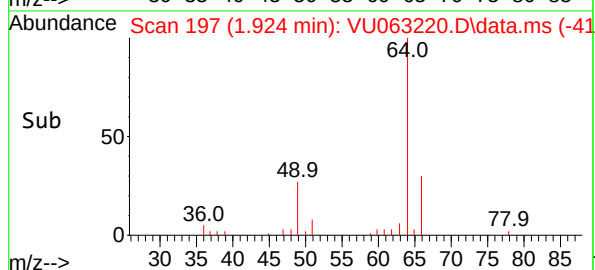
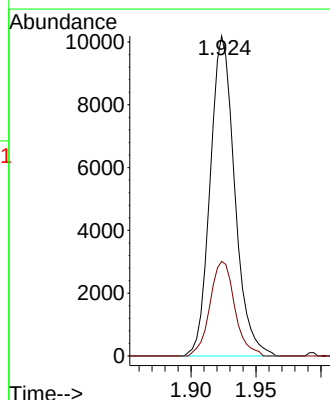
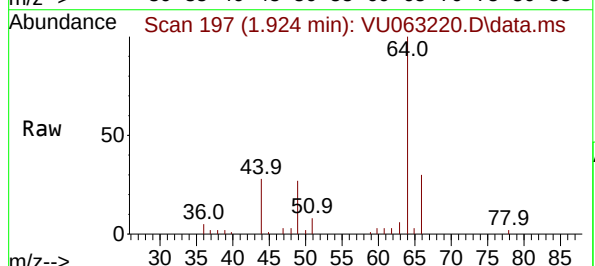
Acq: 10 Feb 2025 13:23

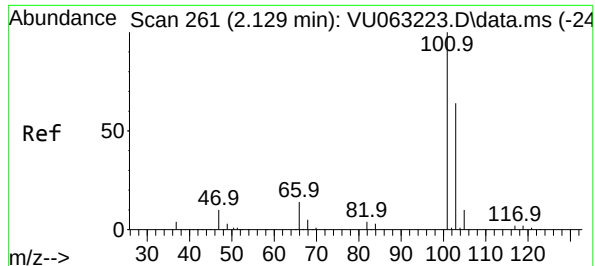
Tgt Ion: 64 Resp: 13381

Ion Ratio Lower Upper

64 100

66 29.6 25.8 38.8





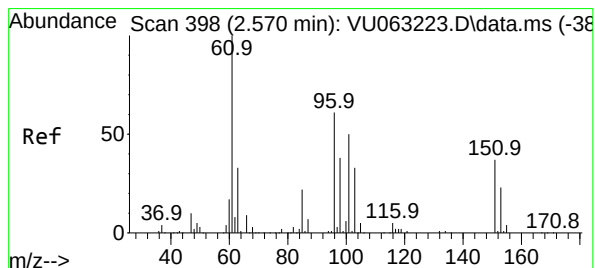
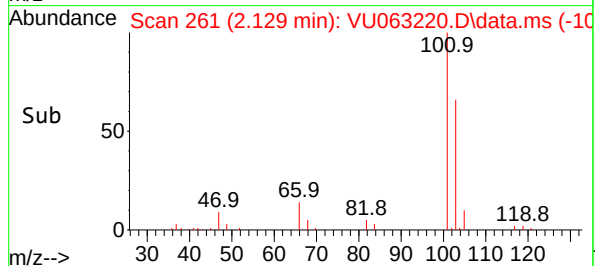
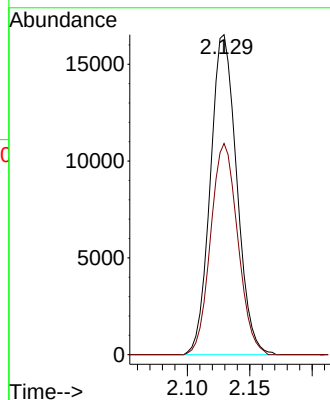
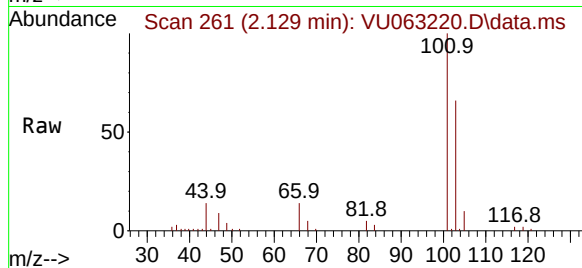
#7
Trichlorofluoromethane
Concen: 1.078 ug/l
RT: 2.129 min Scan# 20
Delta R.T. 0.000 min
Lab File: VU063220.D
Acq: 10 Feb 2025 13:23

Instrument :
MSVOA_U
ClientSampleId :
VSTDICC001

Tgt Ion:101 Resp: 24378
Ion Ratio Lower Upper
101 100
103 66.0 51.4 77.2

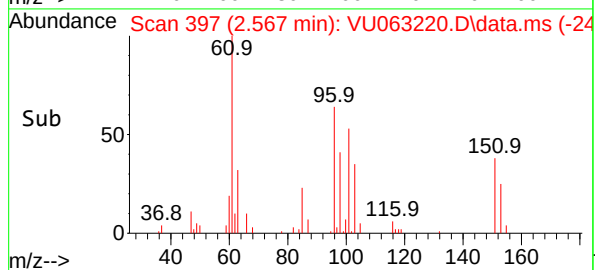
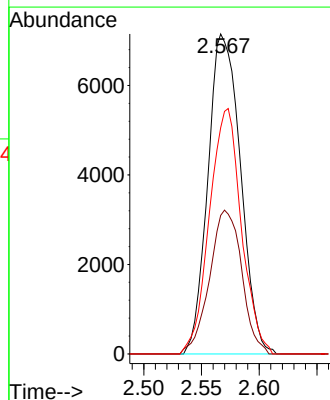
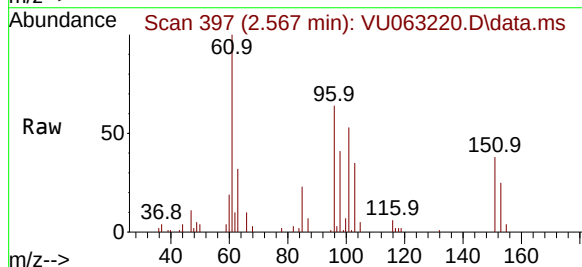
Manual Integrations
APPROVED

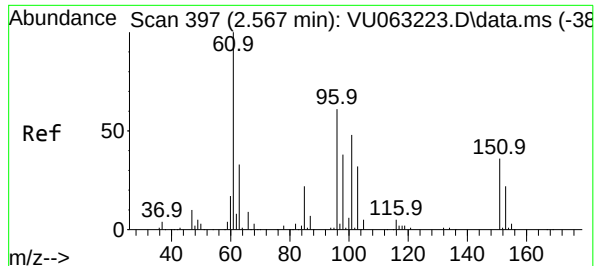
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#8
1,1,2-Trichloro-1,2,2-trifluoroethane
Concen: 1.091 ug/l
RT: 2.567 min Scan# 397
Delta R.T. -0.003 min
Lab File: VU063220.D
Acq: 10 Feb 2025 13:23

Tgt Ion:101 Resp: 14009
Ion Ratio Lower Upper
101 100
85 44.4 35.4 53.0
151 75.2 58.5 87.7





#9

1,1-Dichloroethene

Concen: 1.079 ug/l

RT: 2.570 min Scan# 397

Delta R.T. 0.003 min

Lab File: VU063220.D

Acq: 10 Feb 2025 13:23

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC001

Tgt Ion: 96 Resp: 14118

Ion Ratio Lower Upper

96 100

61 160.1 0.0 492.9

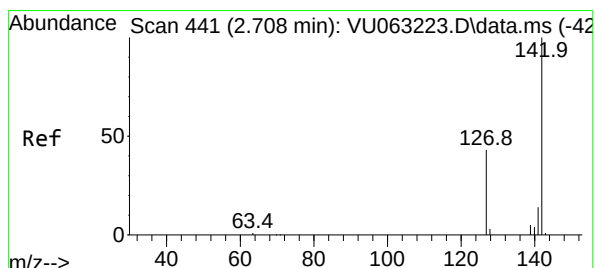
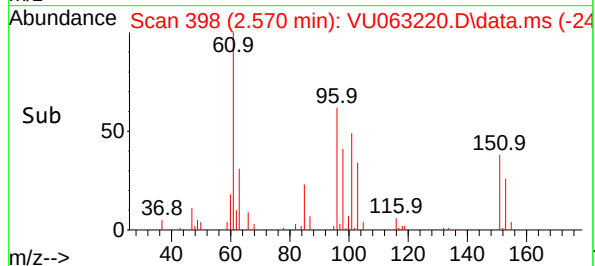
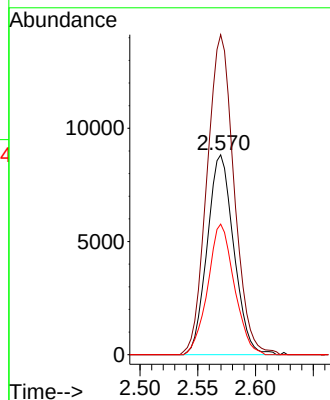
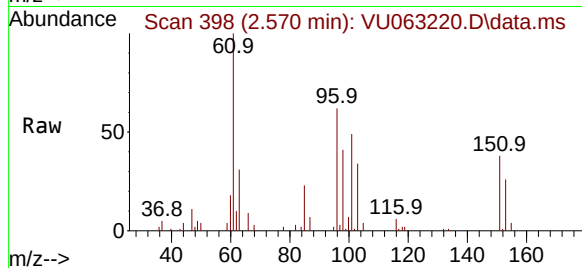
98 65.4 0.0 124.0

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#10

Iodomethane

Concen: 1.030 ug/l

RT: 2.711 min Scan# 442

Delta R.T. 0.003 min

Lab File: VU063220.D

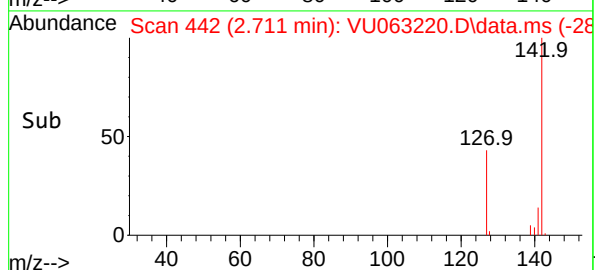
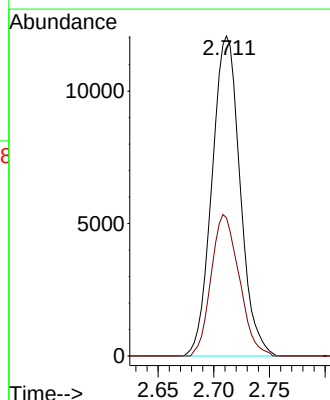
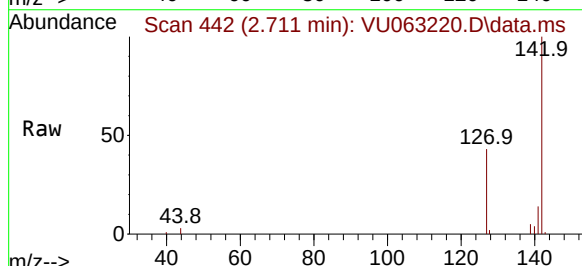
Acq: 10 Feb 2025 13:23

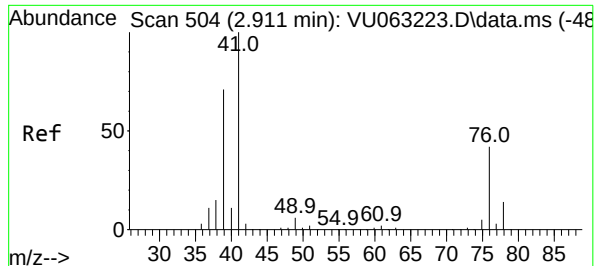
Tgt Ion:142 Resp: 21185

Ion Ratio Lower Upper

142 100

127 44.1 34.5 51.7





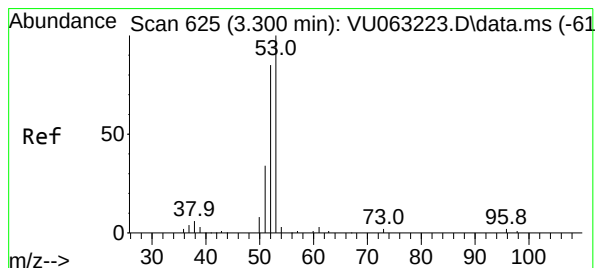
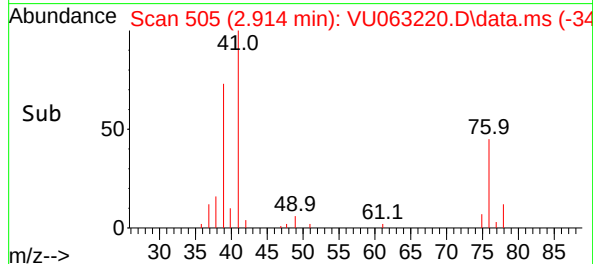
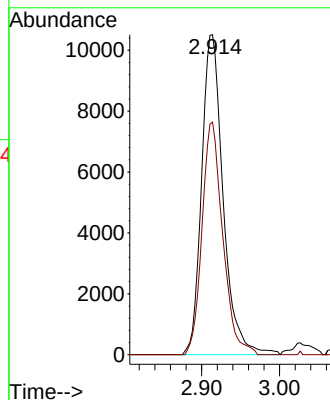
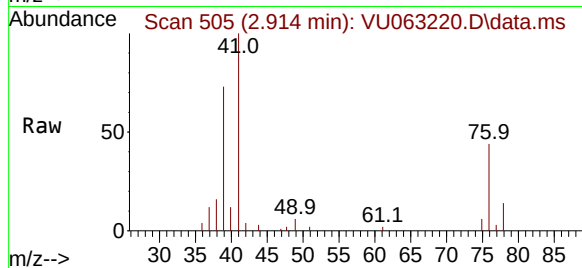
#11
Allyl Chloride
Concen: 1.071 ug/l
RT: 2.914 min Scan# 504
Delta R.T. 0.003 min
Lab File: VU063220.D
Acq: 10 Feb 2025 13:23

Instrument :
MSVOA_U
Client Sample Id :
VSTDIC001

Tgt Ion: 41 Resp: 2012
Ion Ratio Lower Upper
41 100
39 70.1 57.9 86.9

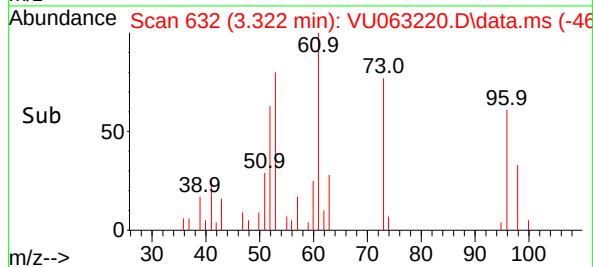
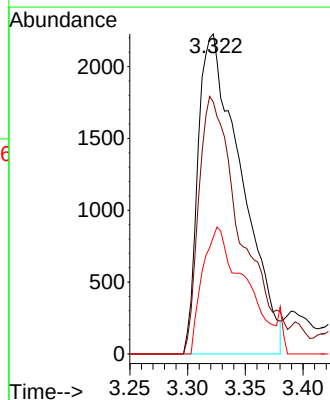
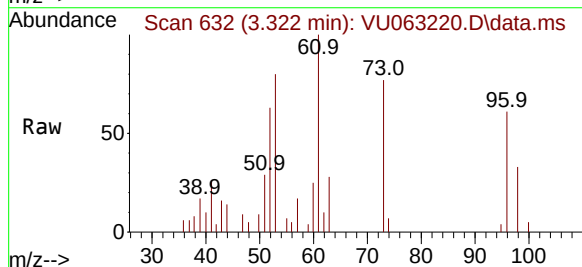
Manual Integrations
APPROVED

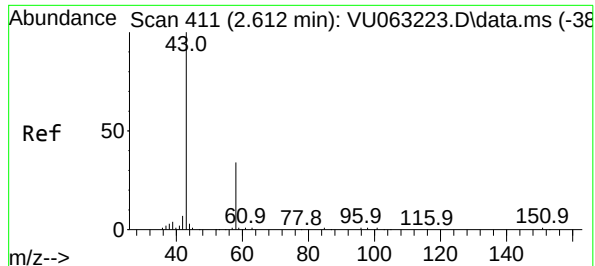
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#12
Acrylonitrile
Concen: 1.950 ug/l
RT: 3.322 min Scan# 632
Delta R.T. 0.023 min
Lab File: VU063220.D
Acq: 10 Feb 2025 13:23

Tgt Ion: 53 Resp: 5799
Ion Ratio Lower Upper
53 100
52 79.0 64.2 96.2
51 38.4 30.8 46.2





#13

Acetone

Concen: 5.255 ug/l

RT: 2.618 min Scan# 411

Delta R.T. 0.006 min

Lab File: VU063220.D

Acq: 10 Feb 2025 13:23

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC001

Tgt Ion: 43 Resp: 1219

Ion Ratio Lower Upper

43 100

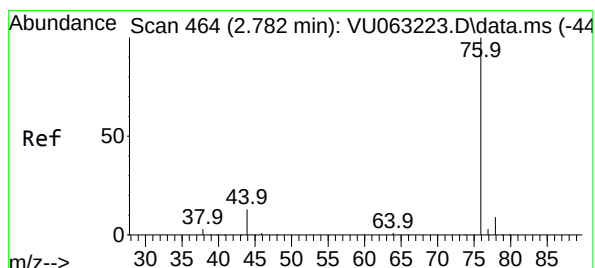
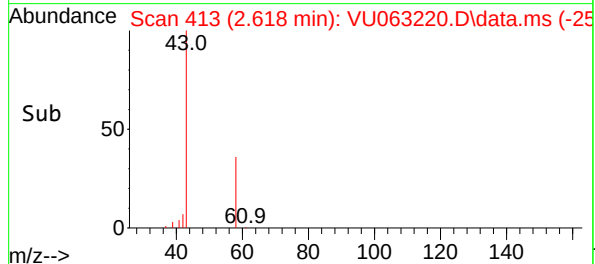
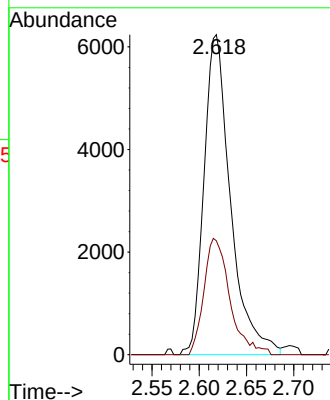
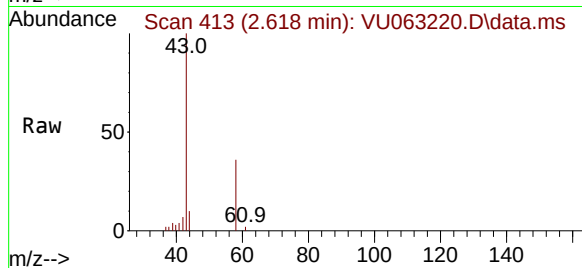
58 35.6 27.4 41.0

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#14

Carbon Disulfide

Concen: 1.065 ug/l

RT: 2.782 min Scan# 464

Delta R.T. 0.000 min

Lab File: VU063220.D

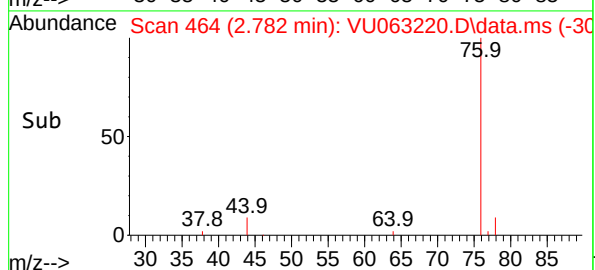
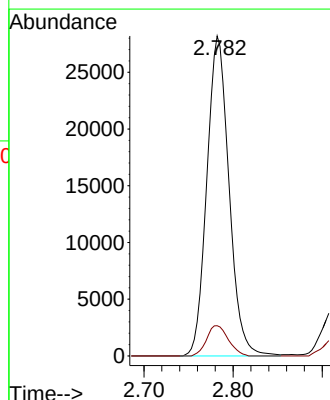
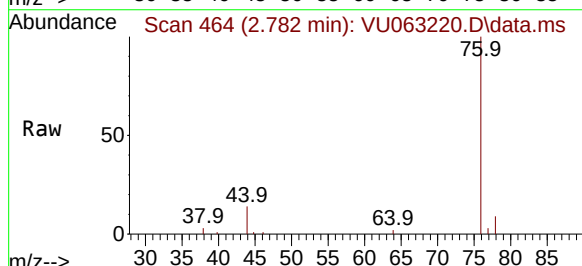
Acq: 10 Feb 2025 13:23

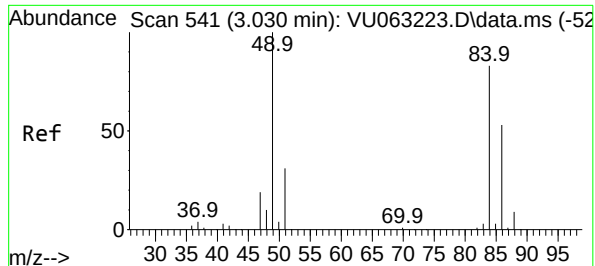
Tgt Ion: 76 Resp: 48738

Ion Ratio Lower Upper

76 100

78 9.4 7.2 10.8





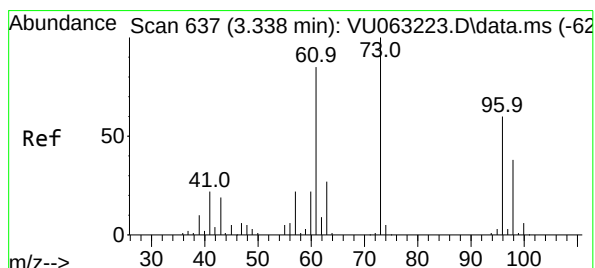
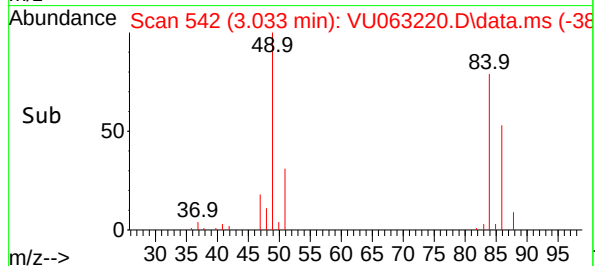
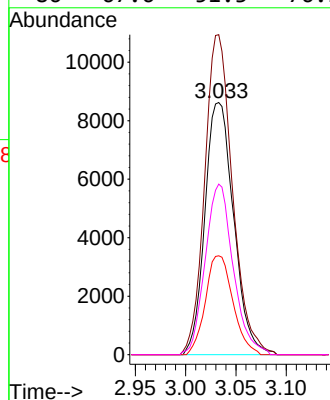
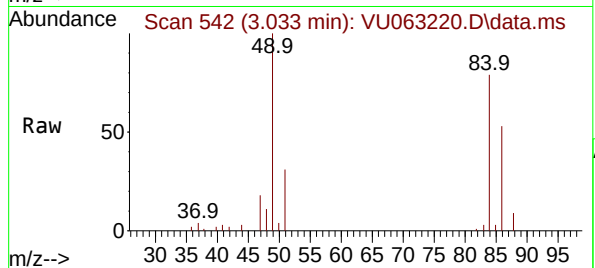
#15
Methylene Chloride
Concen: 1.063 ug/l
RT: 3.033 min Scan# 541
Delta R.T. 0.003 min
Lab File: VU063220.D
Acq: 10 Feb 2025 13:23

Instrument :
MSVOA_U
ClientSampleId :
VSTDIC001

Tgt Ion: 84 Resp: 1717
Ion Ratio Lower Upper
84 100
49 126.9 96.4 144.6
51 39.2 0.0 74.8
86 67.6 51.3 76.9

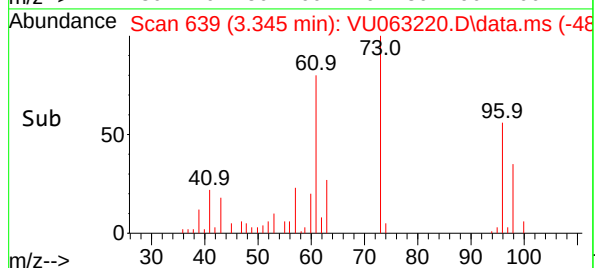
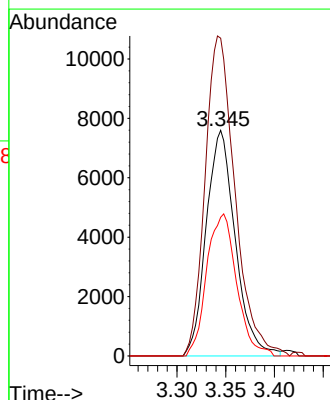
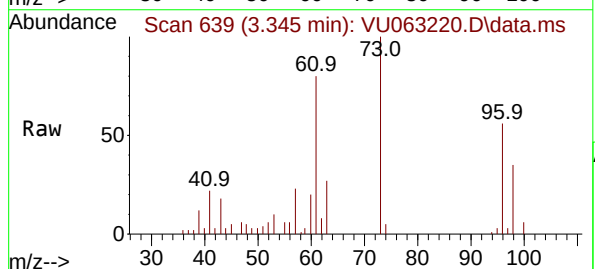
Manual Integrations
APPROVED

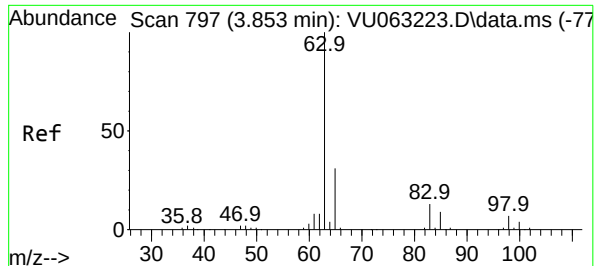
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#16
trans-1,2-Dichloroethene
Concen: 1.054 ug/l
RT: 3.345 min Scan# 639
Delta R.T. 0.006 min
Lab File: VU063220.D
Acq: 10 Feb 2025 13:23

Tgt Ion: 96 Resp: 15731
Ion Ratio Lower Upper
96 100
61 140.9 113.4 170.2
98 61.5 51.2 76.8





#17

1,1-Dichloroethane

Concen: 1.085 ug/l

RT: 3.856 min Scan# 79

Delta R.T. 0.003 min

Lab File: VU063220.D

Acq: 10 Feb 2025 13:23

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC001

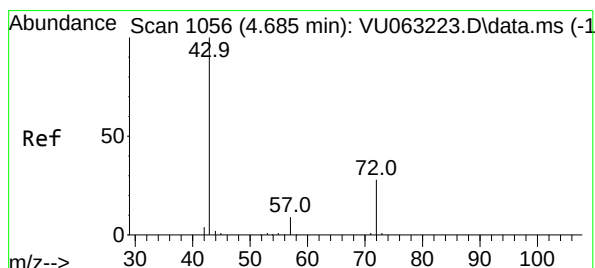
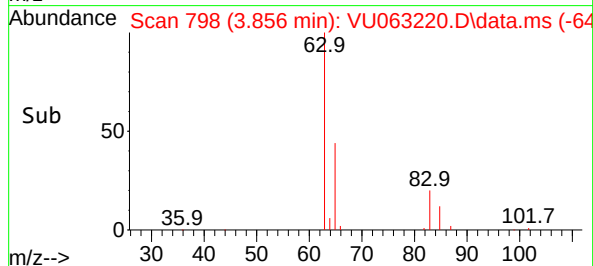
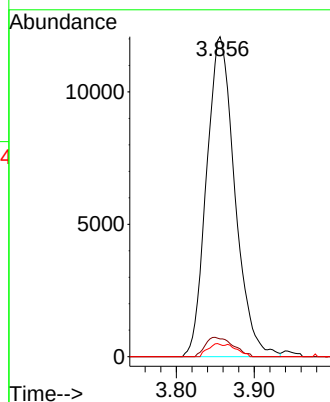
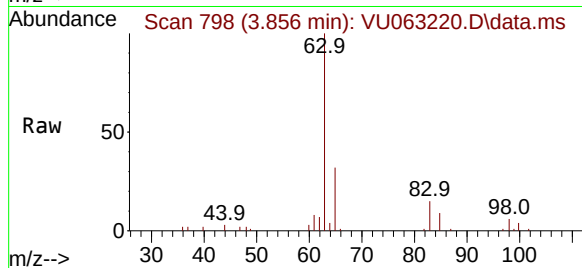
Tgt Ion:	63	Resp:	3053
Ion Ratio	Lower	Upper	
63	100		
98	5.6	3.3	9.9
100	3.8	2.1	6.2

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#18

2-Butanone

Concen: 4.944 ug/l m

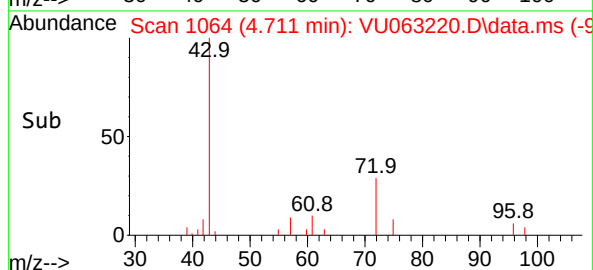
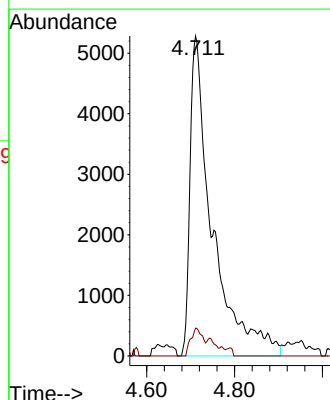
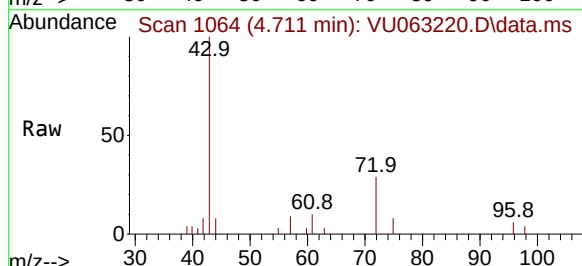
RT: 4.711 min Scan# 1064

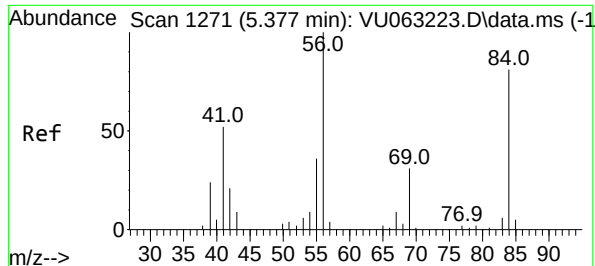
Delta R.T. 0.026 min

Lab File: VU063220.D

Acq: 10 Feb 2025 13:23

Tgt Ion:	43	Resp:	18530
Ion Ratio	Lower	Upper	
43	100		
57	8.7	0.0	17.0





#19

Cyclohexane

Concen: 0.965 ug/l m

RT: 5.374 min Scan# 1271

Delta R.T. -0.003 min

Lab File: VU063220.D

Acq: 10 Feb 2025 13:23

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC001

Tgt Ion: 56 Resp: 2183

Ion Ratio Lower Upper

56 100

69 33.0 24.5 36.7

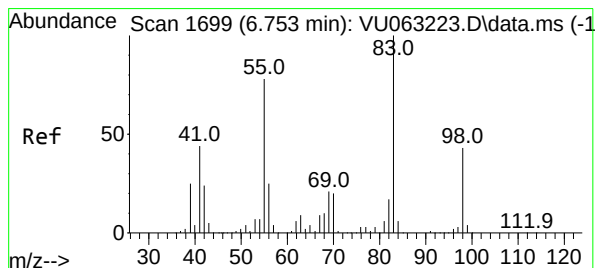
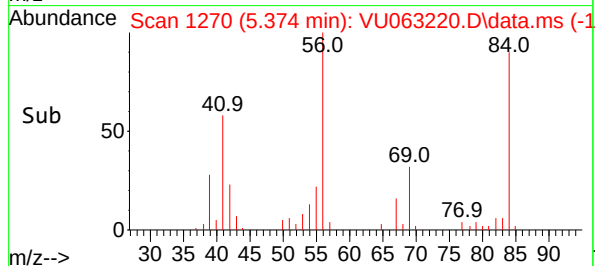
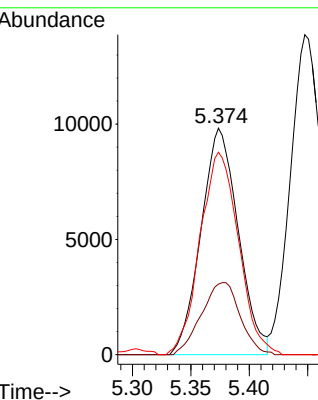
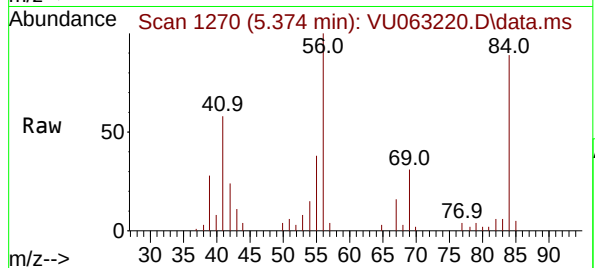
84 92.3 65.2 97.8

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#20

Methylcyclohexane

Concen: 1.029 ug/l

RT: 6.753 min Scan# 1699

Delta R.T. 0.000 min

Lab File: VU063220.D

Acq: 10 Feb 2025 13:23

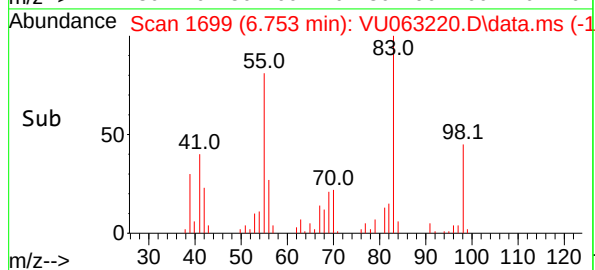
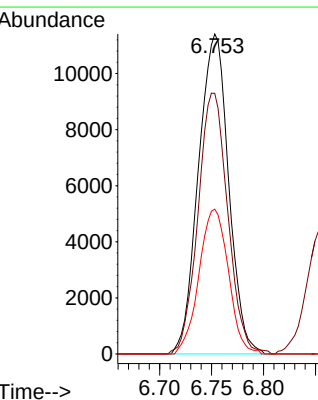
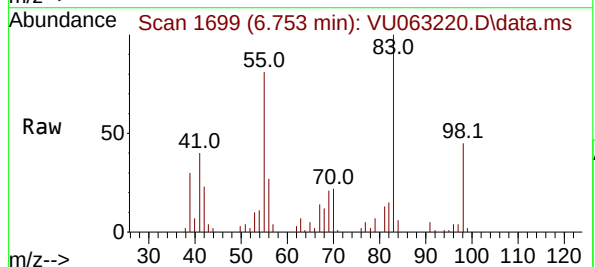
Tgt Ion: 83 Resp: 23086

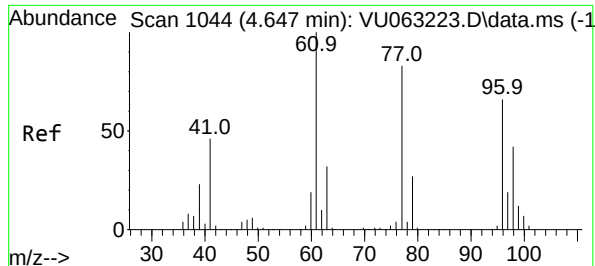
Ion Ratio Lower Upper

83 100

55 80.3 63.1 94.7

98 44.1 35.2 52.8





#21

2,2-Dichloropropane

Concen: 1.086 ug/l

RT: 4.650 min Scan# 1045

Delta R.T. 0.003 min

Lab File: VU063220.D

Acq: 10 Feb 2025 13:23

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC001

Tgt Ion: 77 Resp: 2385

Ion Ratio Lower Upper

77 100

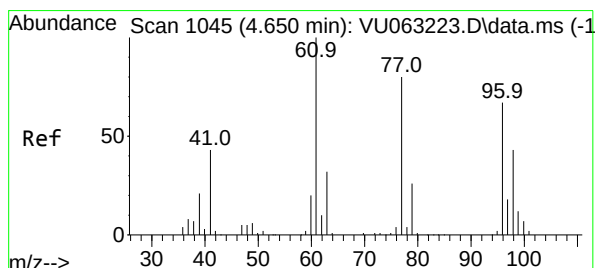
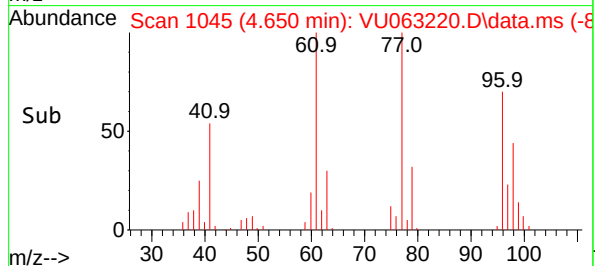
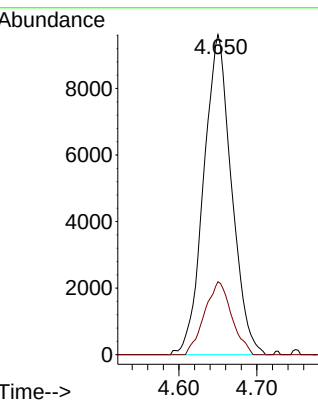
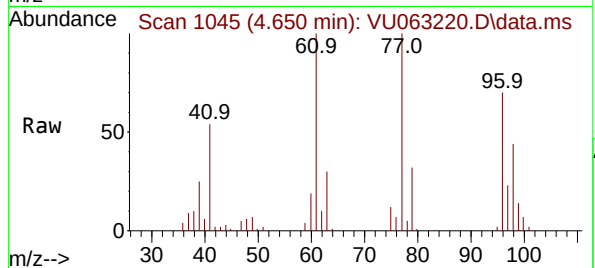
97 22.2 18.5 27.7

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#22

cis-1,2-Dichloroethene

Concen: 1.062 ug/l

RT: 4.657 min Scan# 1047

Delta R.T. 0.007 min

Lab File: VU063220.D

Acq: 10 Feb 2025 13:23

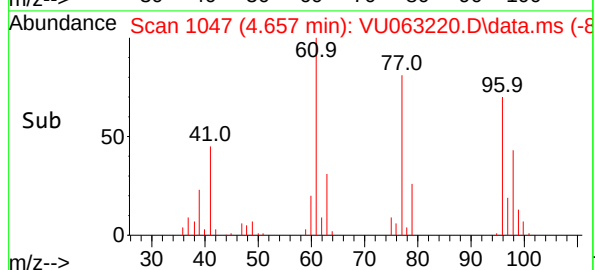
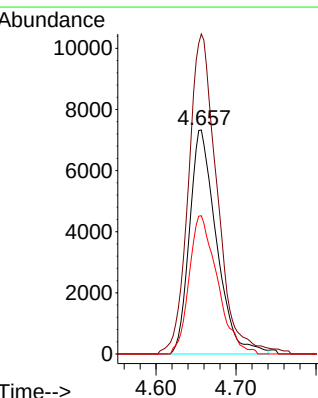
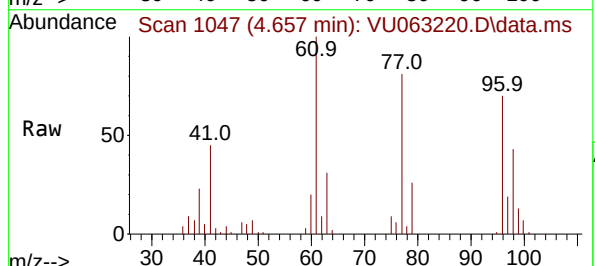
Tgt Ion: 96 Resp: 17134

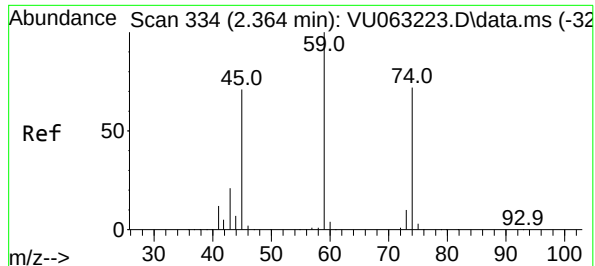
Ion Ratio Lower Upper

96 100

61 152.5 0.0 373.3

98 64.7 31.9 95.9





#23

Diethyl Ether

Concen: 1.062 ug/l

RT: 2.367 min Scan# 31

Delta R.T. 0.003 min

Lab File: VU063220.D

Acq: 10 Feb 2025 13:23

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC001

Tgt Ion: 59 Resp: 1192

Ion Ratio Lower Upper

59 100

45 79.7 57.8 86.6

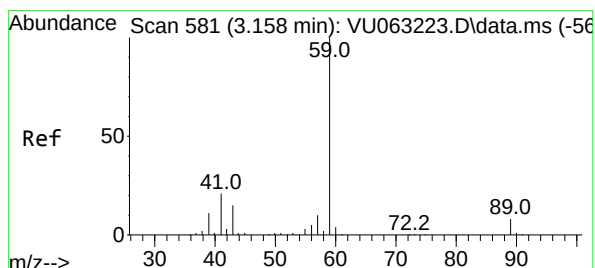
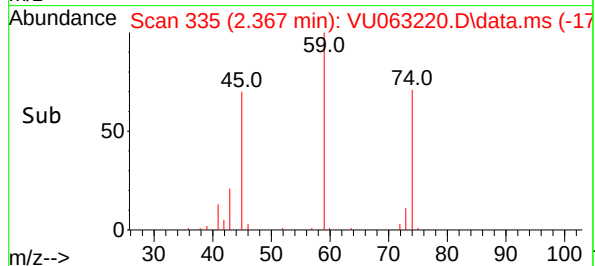
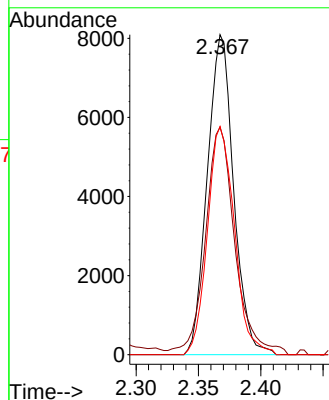
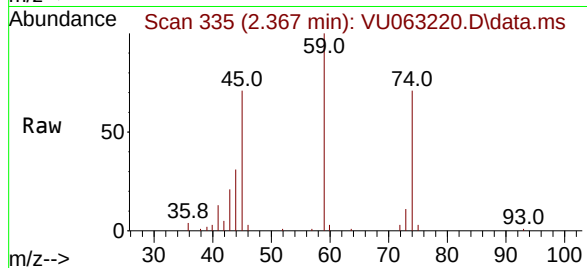
74 73.1 57.7 86.5

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#24

tert-Butyl Alcohol

Concen: 11.656 ug/l

RT: 3.165 min Scan# 583

Delta R.T. 0.007 min

Lab File: VU063220.D

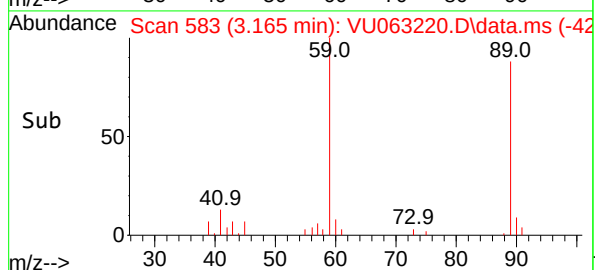
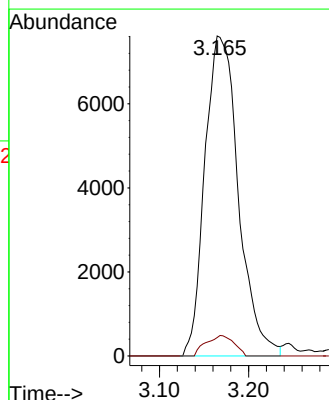
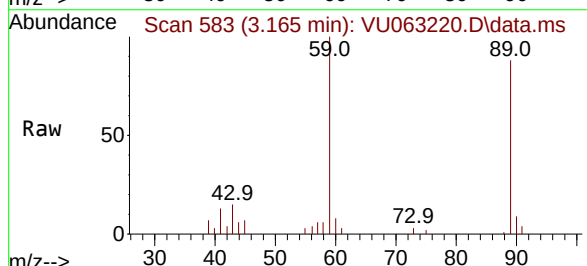
Acq: 10 Feb 2025 13:23

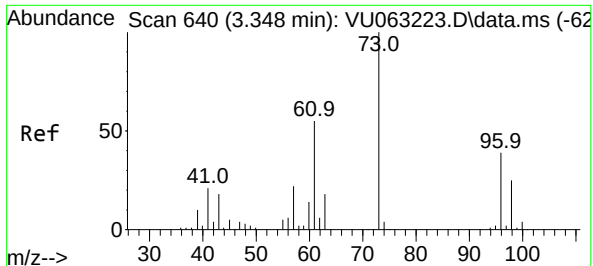
Tgt Ion: 59 Resp: 19963

Ion Ratio Lower Upper

59 100

57 5.3 7.5 11.3#





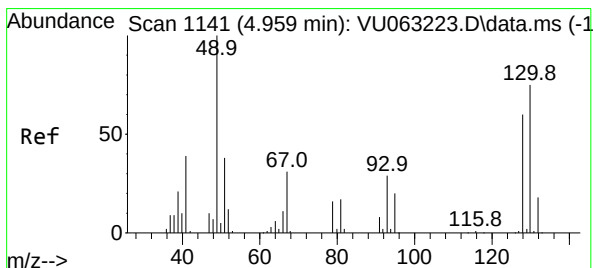
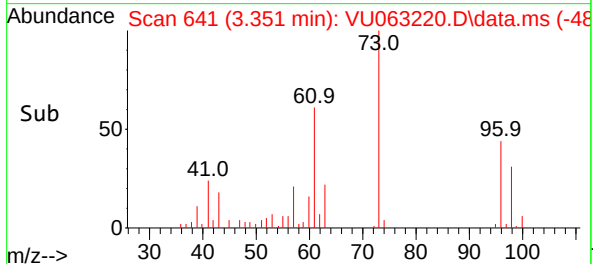
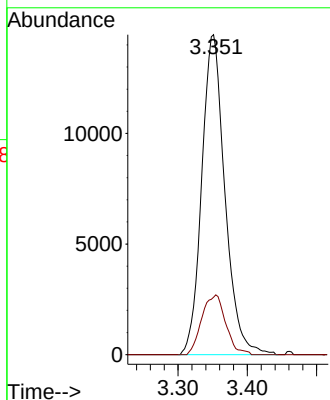
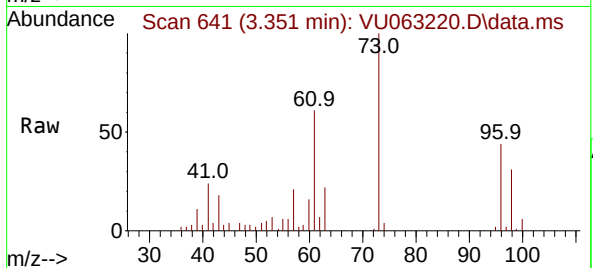
#25
Methyl tert-Butyl Ether
Concen: 1.029 ug/l
RT: 3.351 min Scan# 641
Delta R.T. 0.003 min
Lab File: VU063220.D
Acq: 10 Feb 2025 13:23

Instrument :
MSVOA_U
ClientSampleId :
VSTDIC001

Tgt Ion: 73 Resp: 33609
Ion Ratio Lower Upper
73 100
43 19.3 14.9 22.3

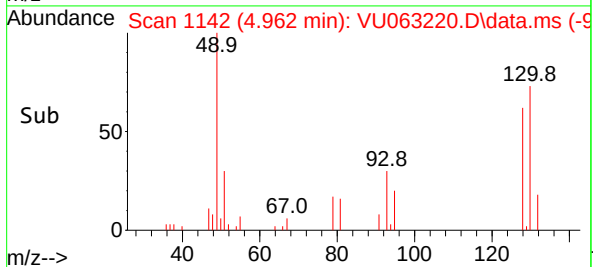
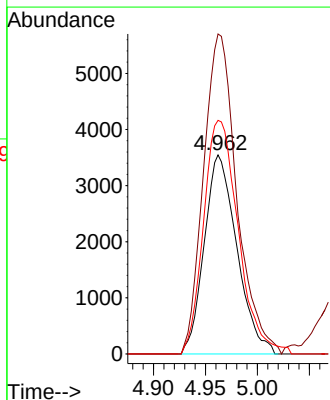
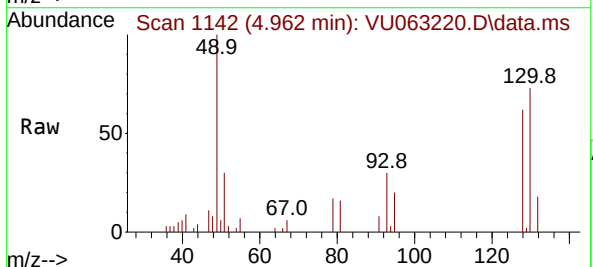
Manual Integrations
APPROVED

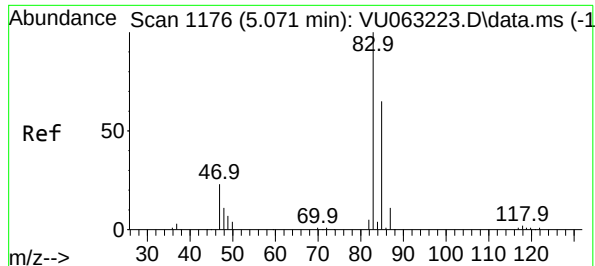
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#26
Bromochloromethane
Concen: 1.098 ug/l
RT: 4.962 min Scan# 1142
Delta R.T. 0.003 min
Lab File: VU063220.D
Acq: 10 Feb 2025 13:23

Tgt Ion:128 Resp: 7742
Ion Ratio Lower Upper
128 100
49 164.2 0.0 343.4
130 125.4 102.9 154.3





#27

Chloroform

Concen: 1.067 ug/l

RT: 5.075 min Scan# 1176

Delta R.T. 0.003 min

Lab File: VU063220.D

Acq: 10 Feb 2025 13:23

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC001

Tgt Ion: 83 Resp: 3030

Ion Ratio Lower Upper

83 100

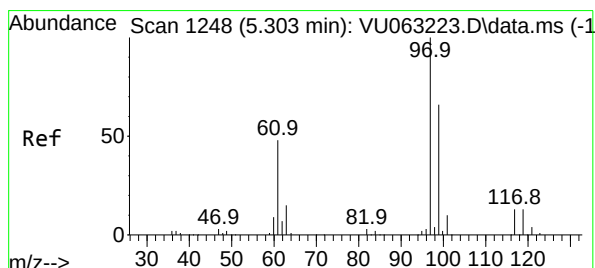
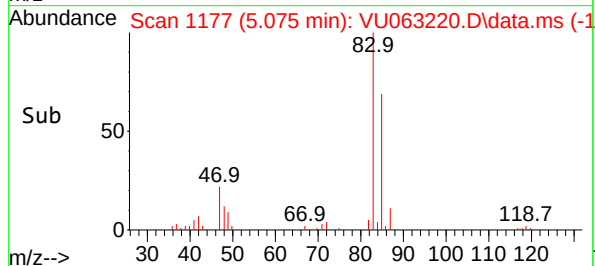
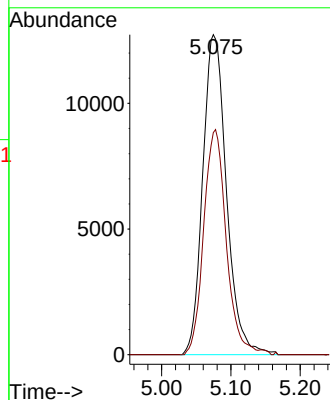
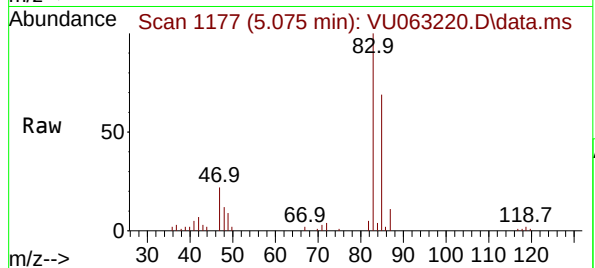
85 69.4 0.0 129.8

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#28

1,1,1-Trichloroethane

Concen: 1.045 ug/l

RT: 5.300 min Scan# 1247

Delta R.T. -0.003 min

Lab File: VU063220.D

Acq: 10 Feb 2025 13:23

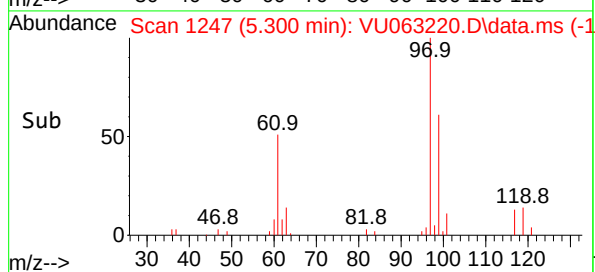
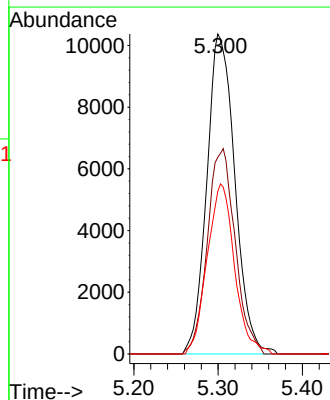
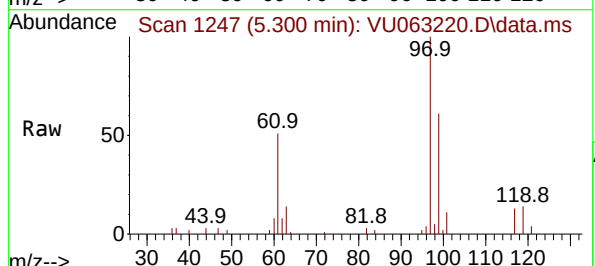
Tgt Ion: 97 Resp: 24038

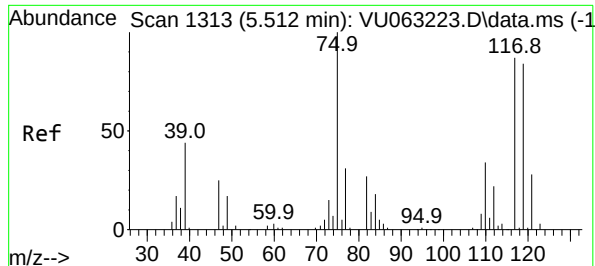
Ion Ratio Lower Upper

97 100

99 63.6 32.4 97.0

61 51.8 23.8 71.2





#29

1,1-Dichloropropene

Concen: 1.040 ug/l

RT: 5.518 min Scan# 11

Delta R.T. 0.006 min

Lab File: VU063220.D

Acq: 10 Feb 2025 13:23

Instrument :

MSVOA_U

ClientSampleId :

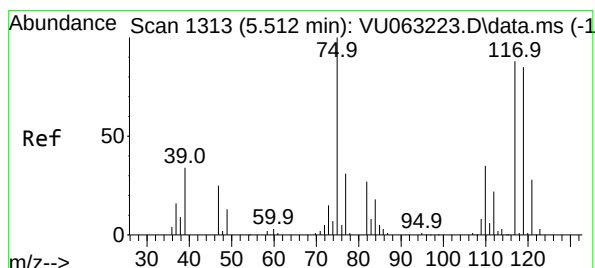
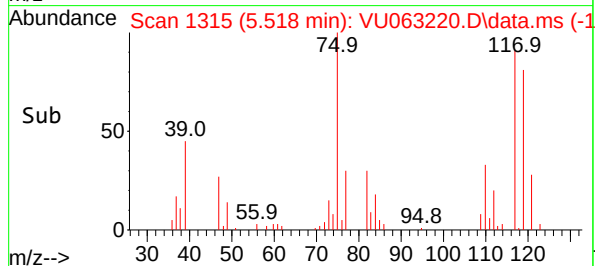
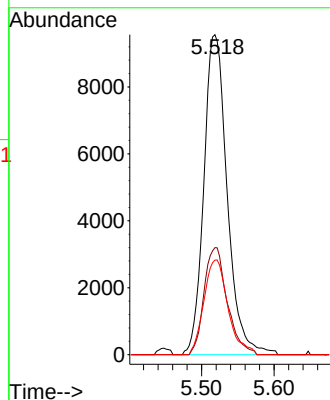
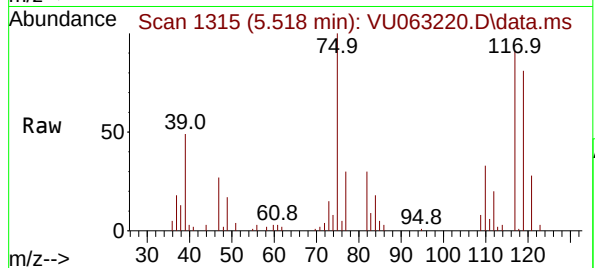
VSTDICC001

Tgt Ion: 75	Resp: 2142
Ion Ratio	Lower Upper
75 100	
110 33.1	17.2 51.5
77 30.5	24.6 37.0

Manual Integrations
APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#30

Carbon Tetrachloride

Concen: 1.090 ug/l

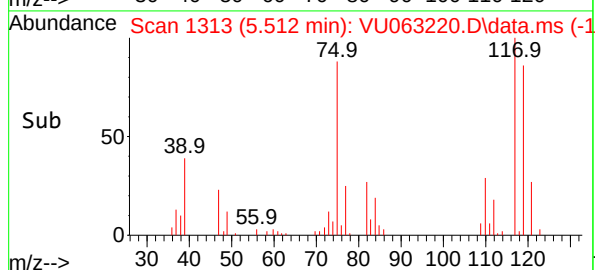
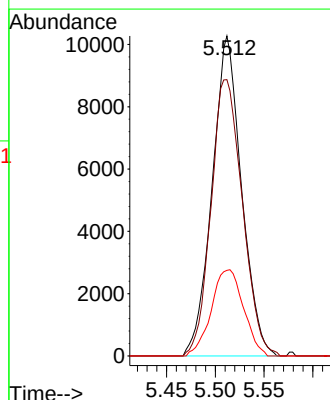
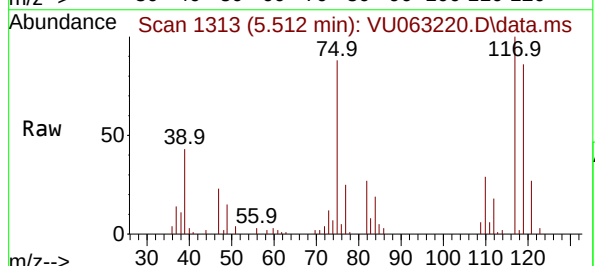
RT: 5.512 min Scan# 1313

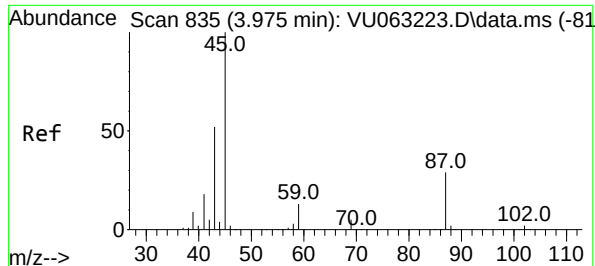
Delta R.T. 0.000 min

Lab File: VU063220.D

Acq: 10 Feb 2025 13:23

Tgt Ion: 117	Resp: 21505
Ion Ratio	Lower Upper
117 100	
119 86.4	76.7 115.1
121 26.7	25.5 38.3





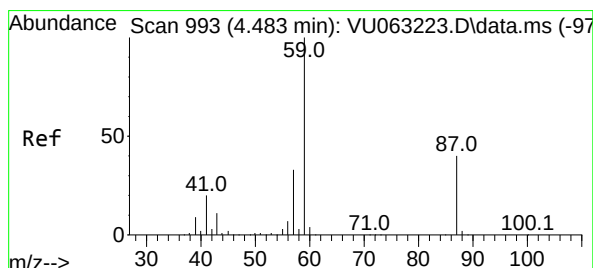
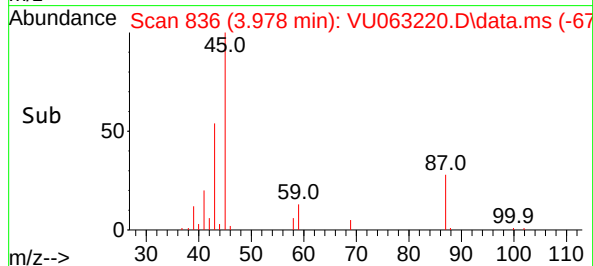
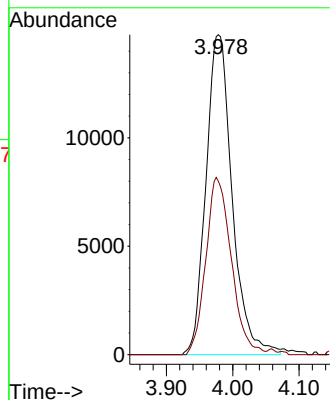
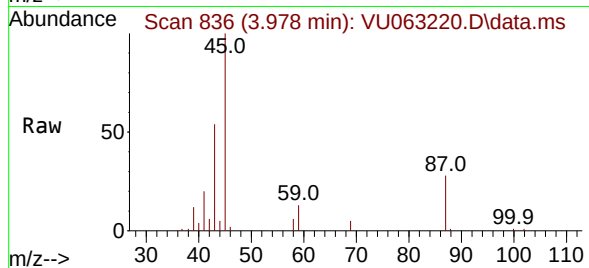
#31
Isopropyl Ether
Concen: 1.008 ug/l
RT: 3.978 min Scan# 836
Delta R.T. 0.003 min
Lab File: VU063220.D
Acq: 10 Feb 2025 13:23

Instrument :
MSVOA_U
ClientSampleId :
VSTDIC001

Tgt Ion: 45 Resp: 40509
Ion Ratio Lower Upper
45 100
43 54.0 25.7 77.1

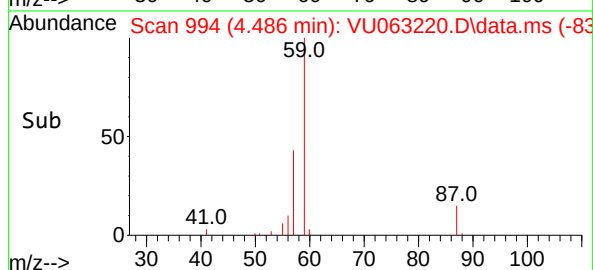
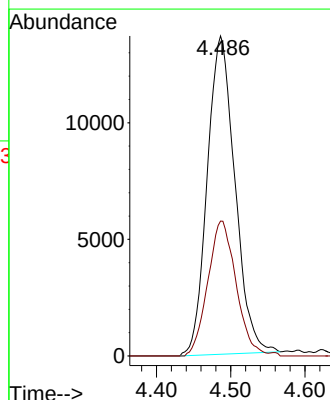
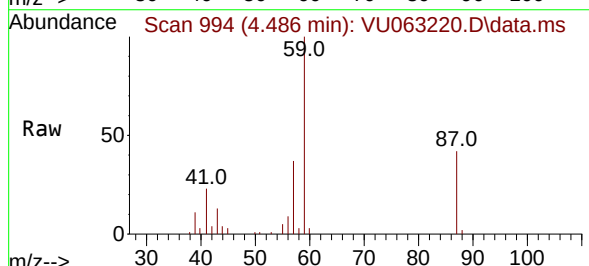
Manual Integrations
APPROVED

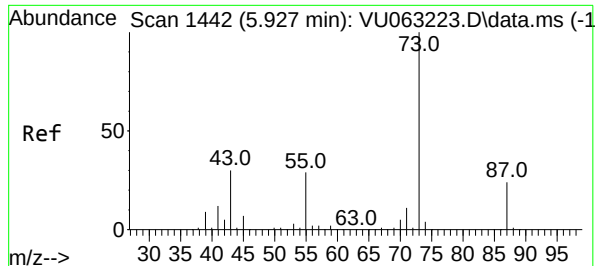
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#32
Ethyl-t-butyl ether
Concen: 0.968 ug/l
RT: 4.486 min Scan# 994
Delta R.T. 0.003 min
Lab File: VU063220.D
Acq: 10 Feb 2025 13:23

Tgt Ion: 59 Resp: 35372
Ion Ratio Lower Upper
59 100
87 42.1 32.6 49.0





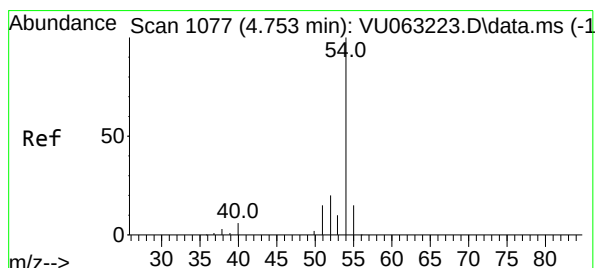
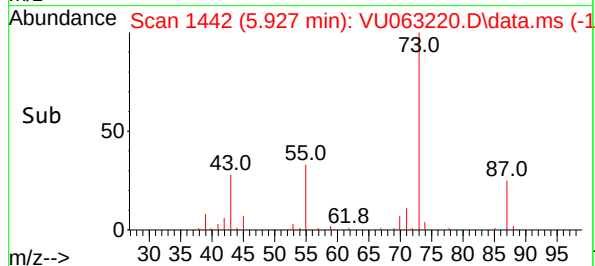
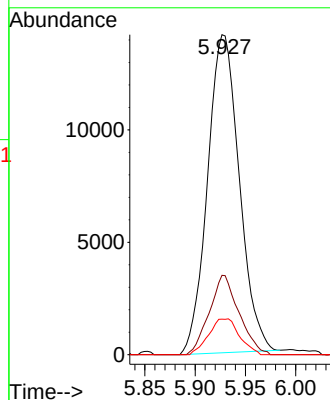
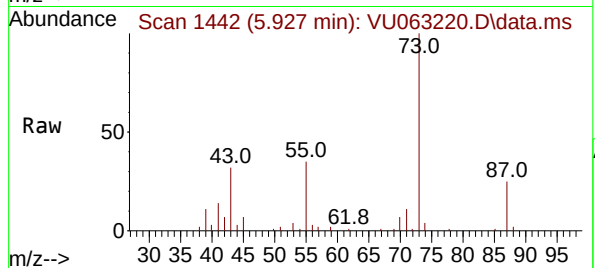
#33
Tert-Amyl methyl ether
Concen: 0.975 ug/l
RT: 5.927 min Scan# 1442
Delta R.T. 0.000 min
Lab File: VU063220.D
Acq: 10 Feb 2025 13:23

Instrument :
MSVOA_U
ClientSampleId :
VSTDIC001

Tgt Ion: 73 Resp: 31129
Ion Ratio Lower Upper
73 100
87 23.3 18.9 28.3
71 10.9 9.0 13.4

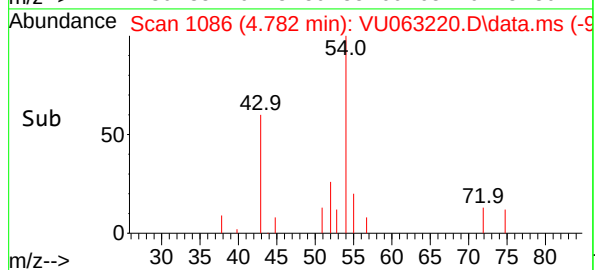
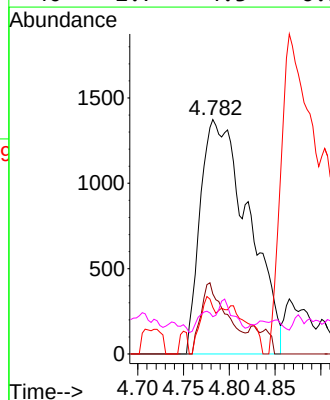
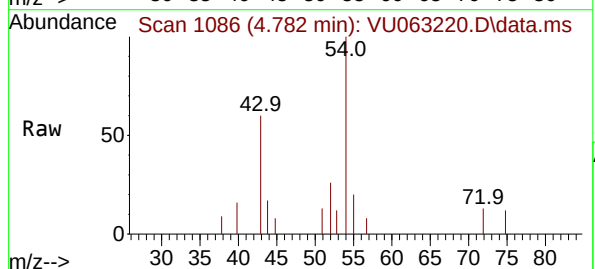
Manual Integrations
APPROVED

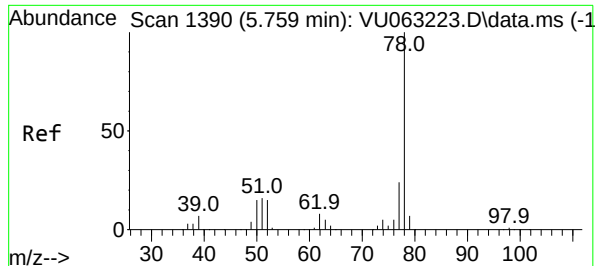
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#34
Propionitrile
Concen: 4.335 ug/l m
RT: 4.782 min Scan# 1086
Delta R.T. 0.029 min
Lab File: VU063220.D
Acq: 10 Feb 2025 13:23

Tgt Ion: 54 Resp: 5038
Ion Ratio Lower Upper
54 100
52 16.5 16.3 24.5
55 7.3 11.8 17.6#
40 2.7 4.3 6.5#





#35

Benzene

Concen: 1.041 ug/l

RT: 5.766 min Scan# 1392

Delta R.T. 0.006 min

Lab File: VU063220.D

Acq: 10 Feb 2025 13:23

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC001

Tgt Ion: 78 Resp: 6598

Ion Ratio Lower Upper

78 100

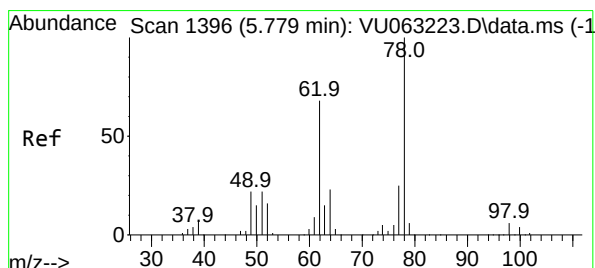
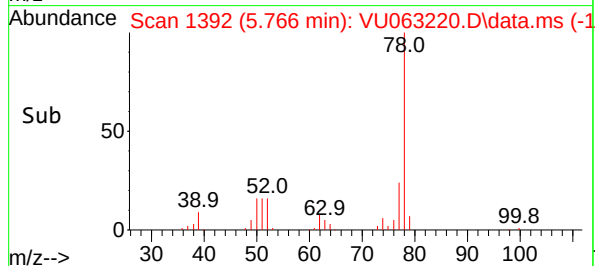
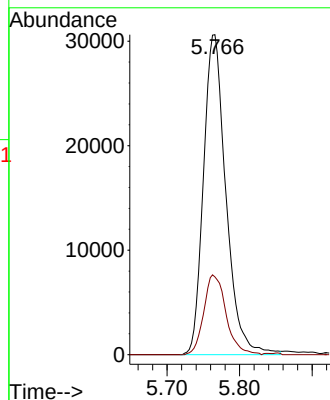
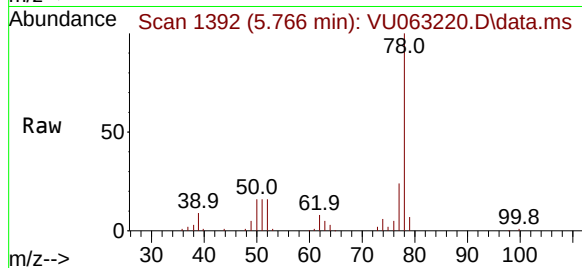
77 24.3 19.0 28.4

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#36

1,2-Dichloroethane

Concen: 1.048 ug/l

RT: 5.788 min Scan# 1399

Delta R.T. 0.010 min

Lab File: VU063220.D

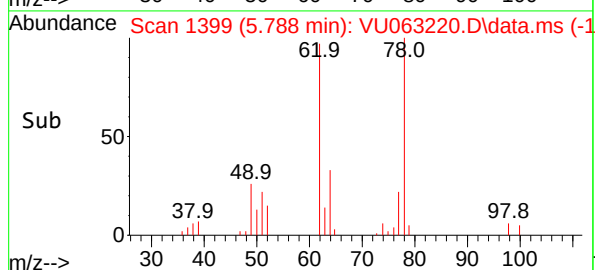
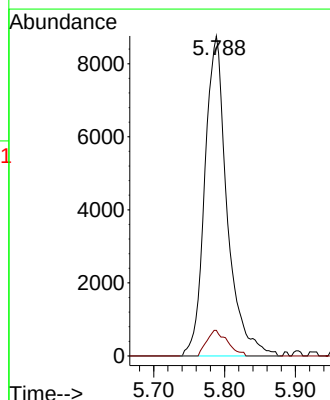
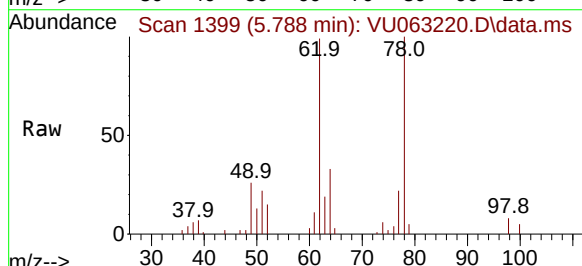
Acq: 10 Feb 2025 13:23

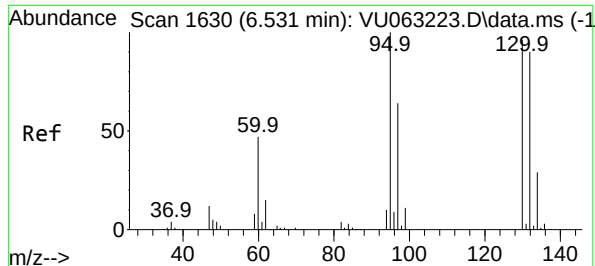
Tgt Ion: 62 Resp: 19157

Ion Ratio Lower Upper

62 100

98 7.4 6.9 10.3





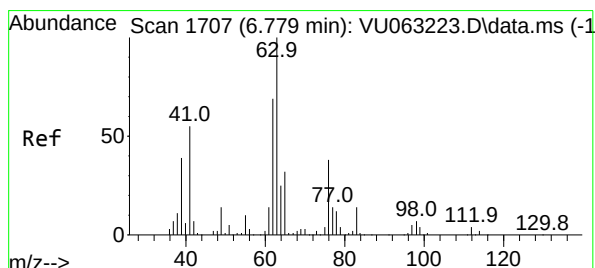
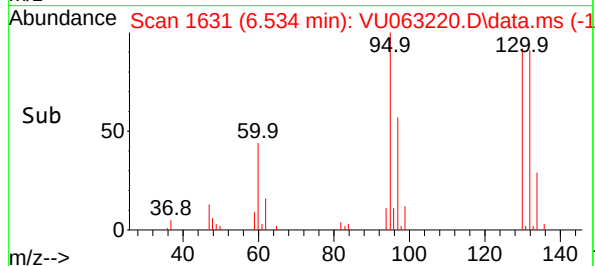
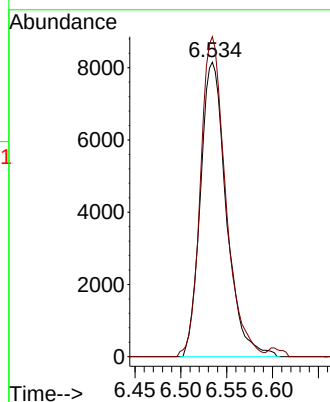
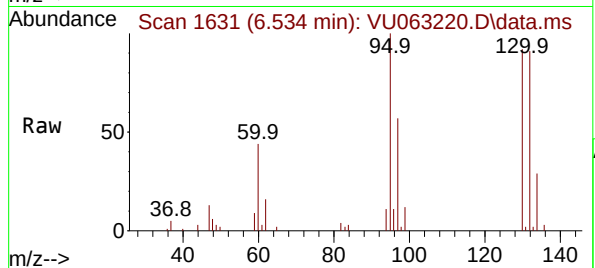
#37
Trichloroethene
Concen: 1.063 ug/l
RT: 6.534 min Scan# 1630
Delta R.T. 0.003 min
Lab File: VU063220.D
Acq: 10 Feb 2025 13:23

Instrument :
MSVOA_U
ClientSampleId :
VSTDICC001

Tgt Ion: 130 Resp: 1601
Ion Ratio Lower Upper
130 100
95 106.9 83.2 124.8

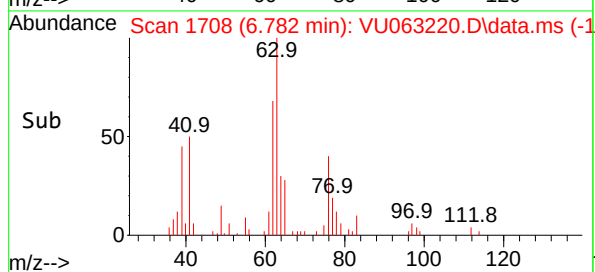
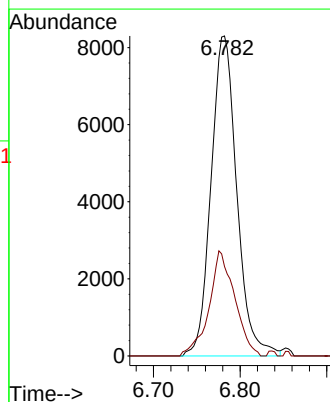
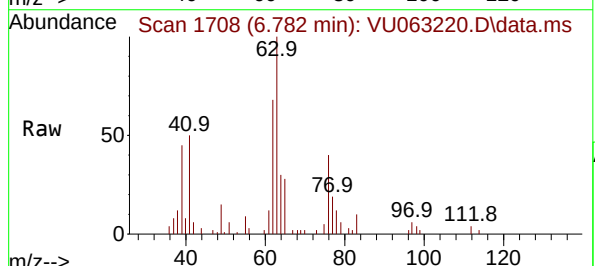
Manual Integrations
APPROVED

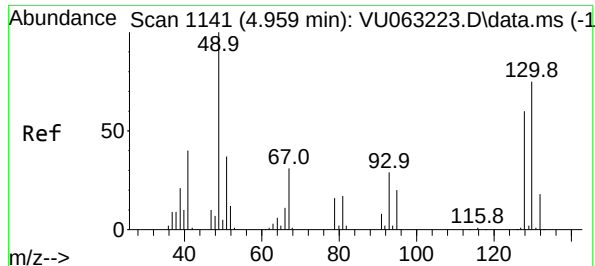
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#38
1,2-Dichloropropane
Concen: 1.035 ug/l
RT: 6.782 min Scan# 1708
Delta R.T. 0.003 min
Lab File: VU063220.D
Acq: 10 Feb 2025 13:23

Tgt Ion: 63 Resp: 17158
Ion Ratio Lower Upper
63 100
65 28.0 25.3 37.9





#39

Methacrylonitrile

Concen: 0.838 ug/l

RT: 4.978 min Scan# 1141

Delta R.T. 0.019 min

Lab File: VU063220.D

Acq: 10 Feb 2025 13:23

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC001

Tgt Ion: 41 Resp: 3478

Ion Ratio Lower Upper

41 100

67 101.4 64.5 96.7

39 61.6 43.0 64.6

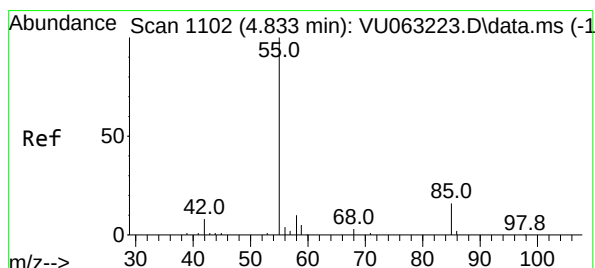
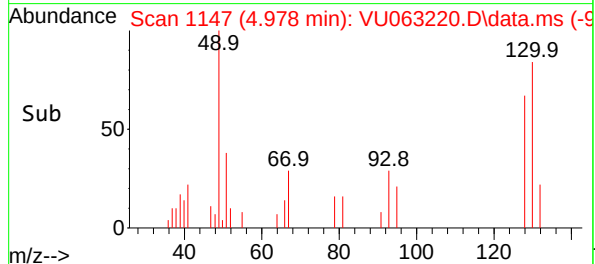
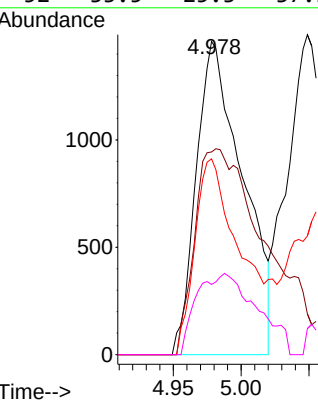
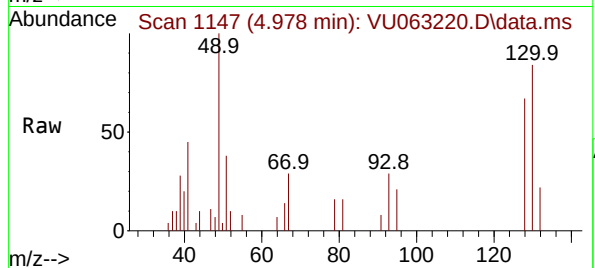
52 33.5 25.3 37.9

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#40

Methyl acrylate

Concen: 0.993 ug/l m

RT: 4.866 min Scan# 1112

Delta R.T. 0.032 min

Lab File: VU063220.D

Acq: 10 Feb 2025 13:23

Tgt Ion: 55 Resp: 7528

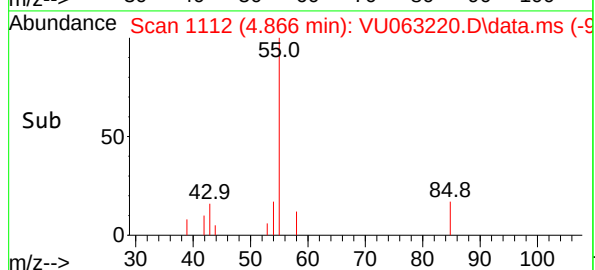
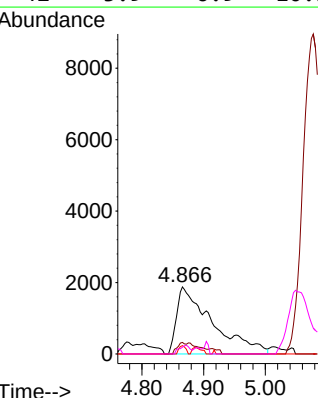
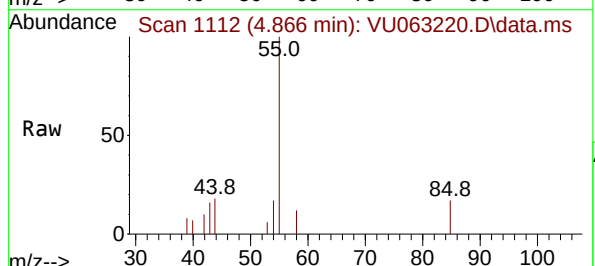
Ion Ratio Lower Upper

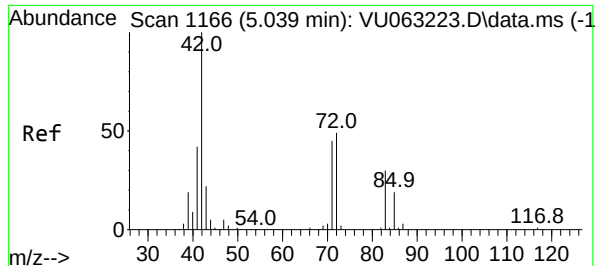
55 100

85 0.0 13.3 19.9#

58 2.3 7.3 10.9#

42 3.9 6.9 10.3#





#41

Tetrahydrofuran

Concen: 1.924 ug/l

RT: 5.049 min Scan# 1166

Delta R.T. 0.010 min

Lab File: VU063220.D

Acq: 10 Feb 2025 13:23

Instrument :

MSVOA_U

ClientSampleId :

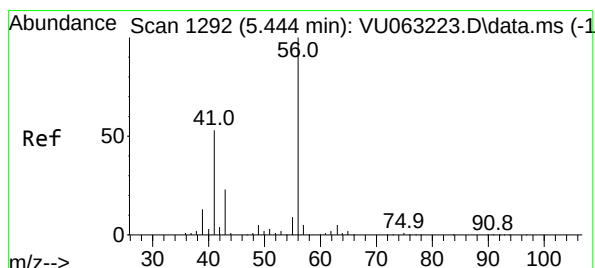
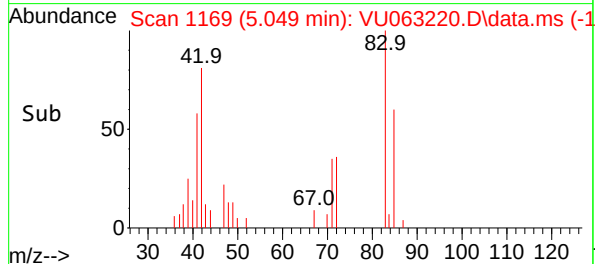
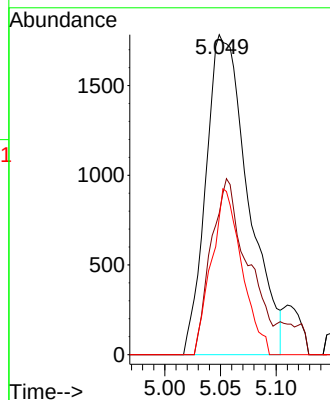
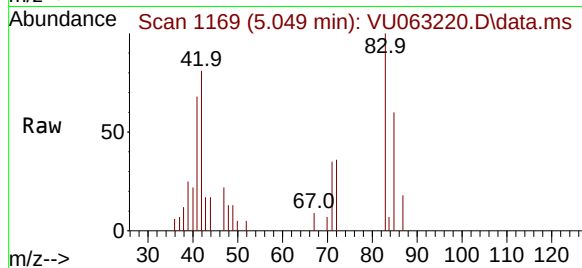
VSTDIC001

Tgt Ion:	42	Resp:	469
Ion	Ratio	Lower	Upper
42	100		
72	47.9	41.5	62.3
71	37.6	37.2	55.8

Manual Integrations
APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#42

1-Chlorobutane

Concen: 1.014 ug/l

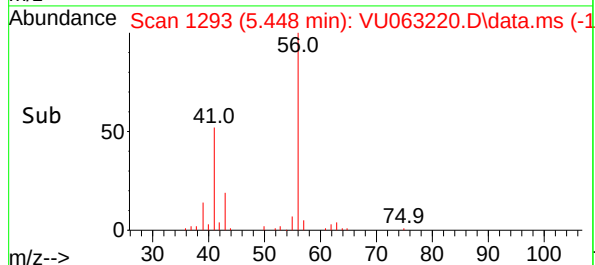
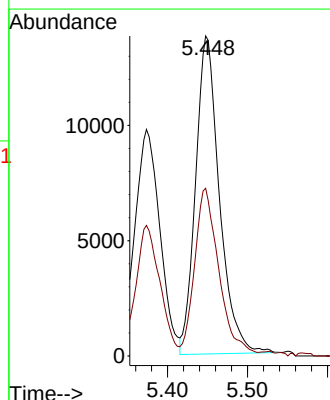
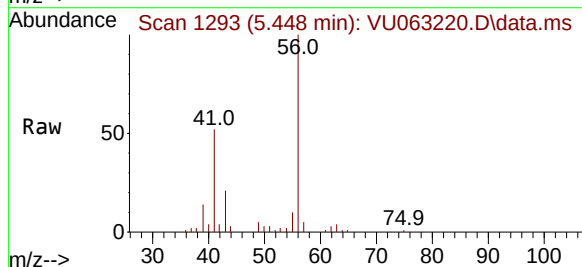
RT: 5.448 min Scan# 1293

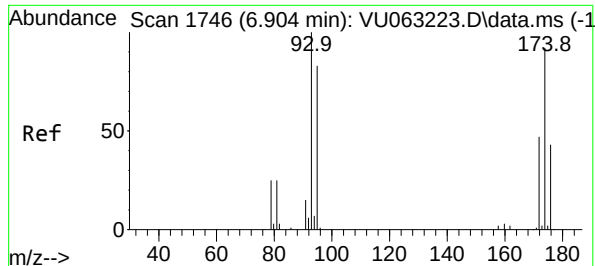
Delta R.T. 0.003 min

Lab File: VU063220.D

Acq: 10 Feb 2025 13:23

Tgt Ion:	56	Resp:	28598
Ion	Ratio	Lower	Upper
56	100		
41	51.7	26.3	78.8





#43

Dibromomethane

Concen: 1.065 ug/l

RT: 6.907 min Scan# 11

Delta R.T. 0.003 min

Lab File: VU063220.D

Acq: 10 Feb 2025 13:23

Instrument :

MSVOA_U

ClientSampleId :

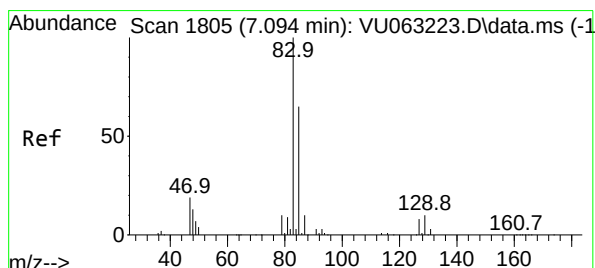
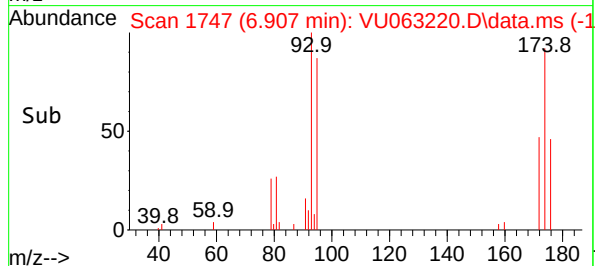
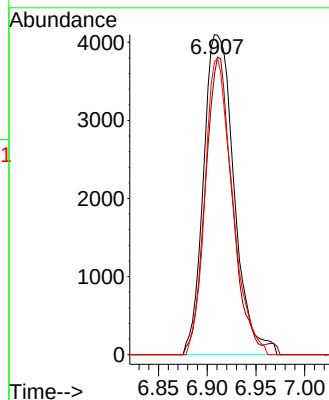
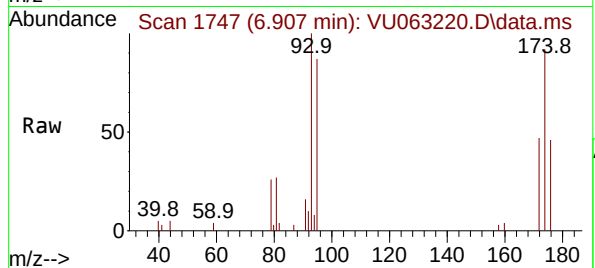
VSTDIC001

Tgt Ion:	93	Resp:	894
Ion	Ratio	Lower	Upper
93	100		
95	81.7	67.2	100.8
174	83.3	75.7	113.5

Manual Integrations
APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#44

Bromodichloromethane

Concen: 1.060 ug/l

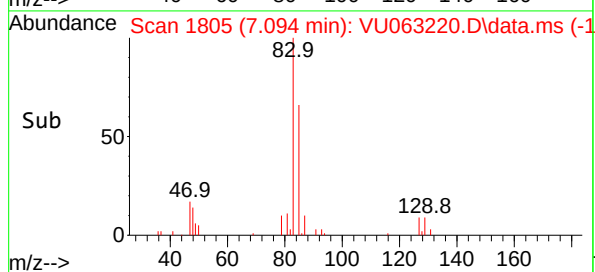
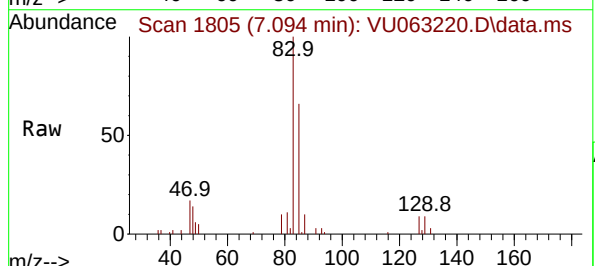
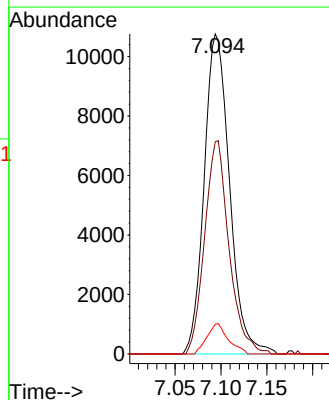
RT: 7.094 min Scan# 1805

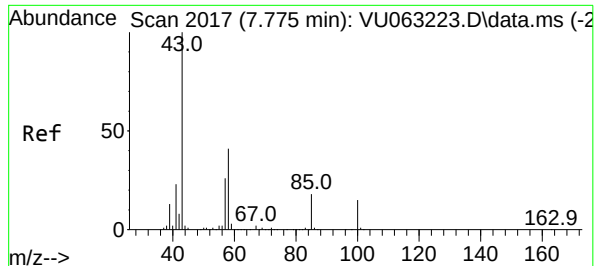
Delta R.T. 0.000 min

Lab File: VU063220.D

Acq: 10 Feb 2025 13:23

Tgt Ion:	83	Resp:	20720
Ion	Ratio	Lower	Upper
83	100		
85	66.3	51.7	77.5
127	9.2	6.7	10.1





#45

4-Methyl-2-Pentanone

Concen: 4.541 ug/l

RT: 7.782 min Scan# 2017

Delta R.T. 0.006 min

Lab File: VU063220.D

Acq: 10 Feb 2025 13:23

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC001

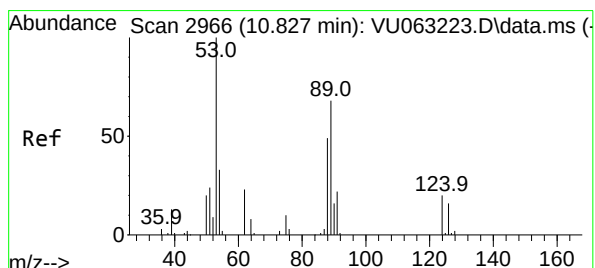
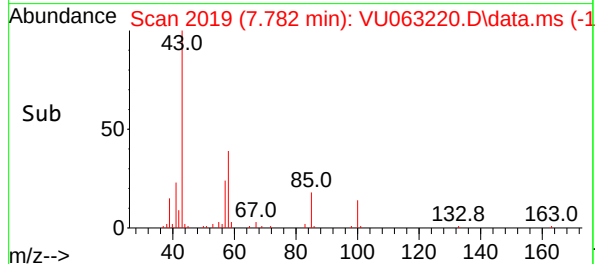
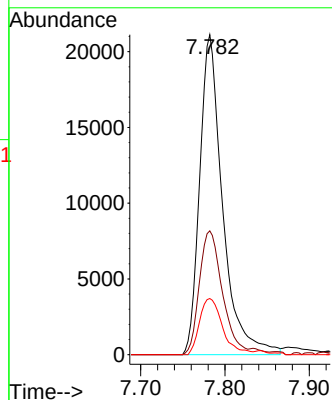
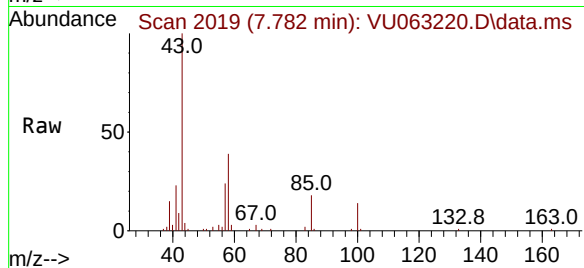
Tgt Ion:	43	Resp:	3998
Ion	Ratio	Lower	Upper
43	100		
58	38.7	20.8	62.5
85	17.7	14.8	22.2

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#46

t-1,4-Dichloro-2-butene

Concen: 1.981 ug/l m

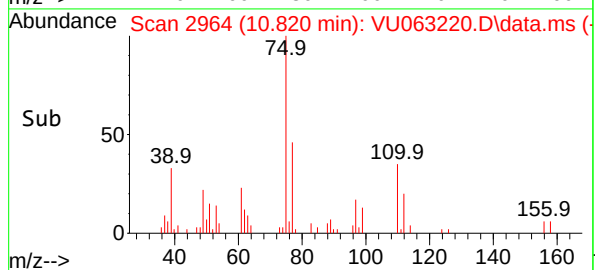
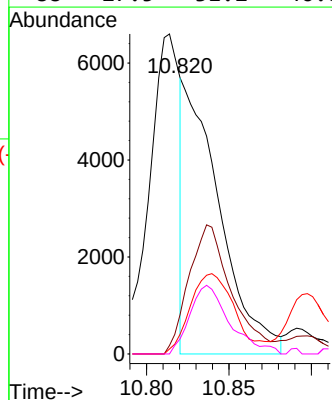
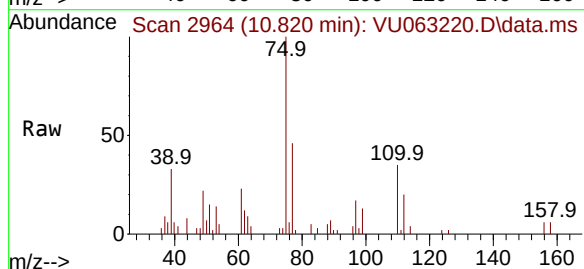
RT: 10.820 min Scan# 2964

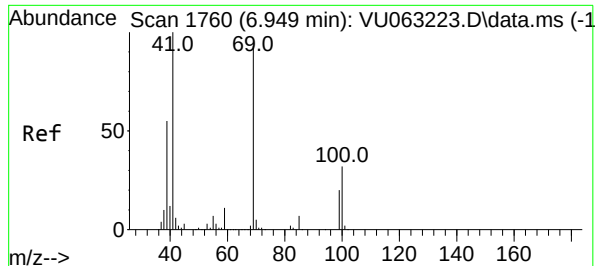
Delta R.T. -0.006 min

Lab File: VU063220.D

Acq: 10 Feb 2025 13:23

Tgt Ion:	75	Resp:	8630
Ion	Ratio	Lower	Upper
75	100		
53	55.7	64.5	96.7#
89	36.6	43.4	65.2#
88	27.5	31.2	46.8#





#47

Methyl methacrylate

Concen: 1.836 ug/l

RT: 6.956 min Scan# 11

Delta R.T. 0.006 min

Lab File: VU063220.D

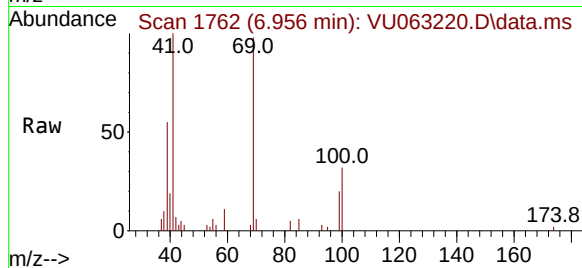
Acq: 10 Feb 2025 13:23

Instrument :

MSVOA_U

ClientSampleId :

VSTDICC001



Tgt Ion: 69 Resp: 1298

Ion Ratio Lower Upper

69 100

41 109.0 0.0 217.0

39 62.7 47.7 71.5

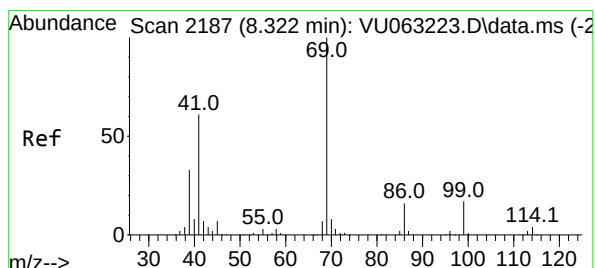
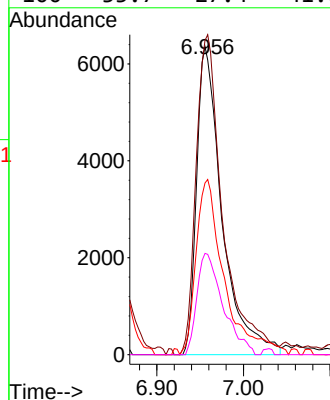
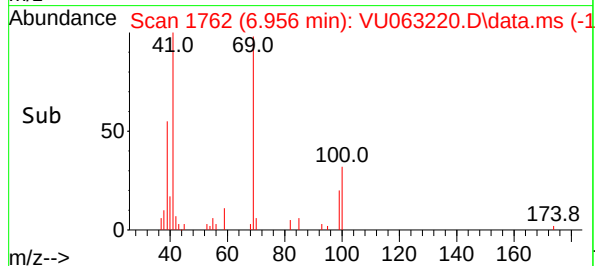
100 33.7 27.4 41.0

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#48

Ethyl methacrylate

Concen: 0.882 ug/l

RT: 8.328 min Scan# 2189

Delta R.T. 0.007 min

Lab File: VU063220.D

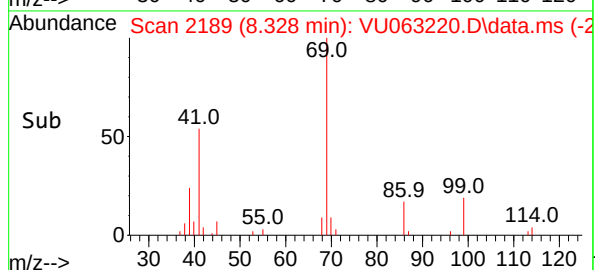
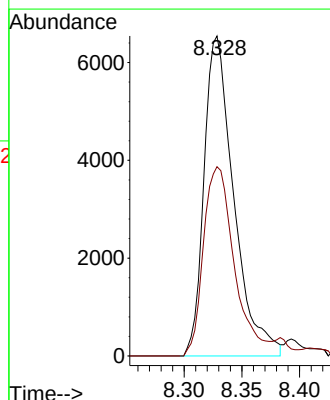
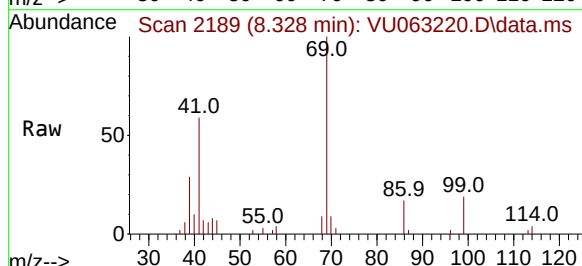
Acq: 10 Feb 2025 13:23

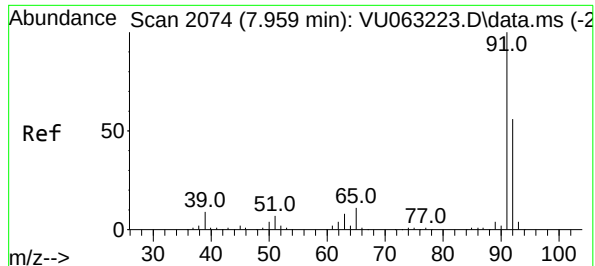
Tgt Ion: 69 Resp: 11711

Ion Ratio Lower Upper

69 100

41 61.3 30.6 92.0





#49

Toluene

Concen: 0.998 ug/l

RT: 7.962 min Scan# 2074

Delta R.T. 0.003 min

Lab File: VU063220.D

Acq: 10 Feb 2025 13:23

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC001

Tgt Ion: 92 Resp: 3635

Ion Ratio Lower Upper

92 100

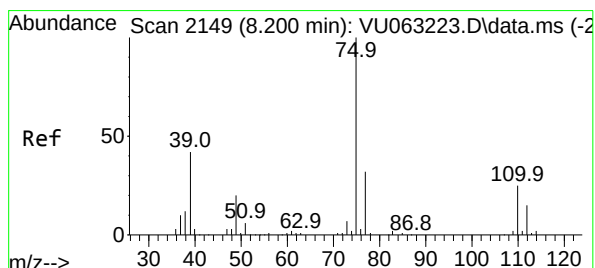
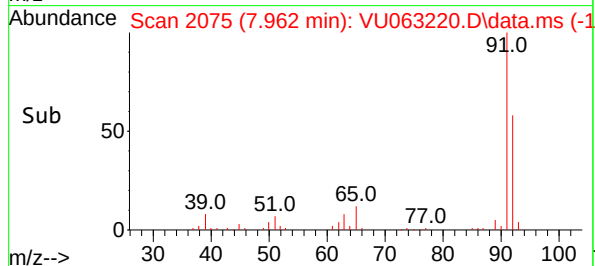
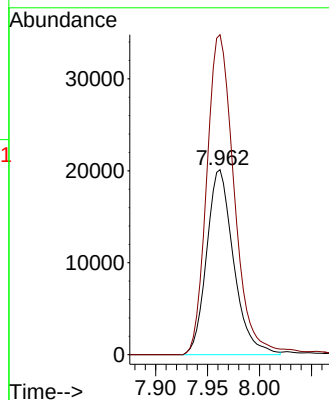
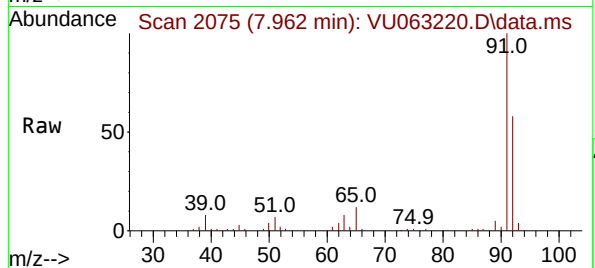
91 176.9 141.8 212.6

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#50

t-1,3-Dichloropropene

Concen: 0.988 ug/l

RT: 8.206 min Scan# 2151

Delta R.T. 0.007 min

Lab File: VU063220.D

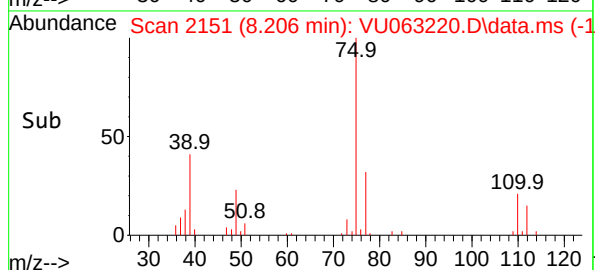
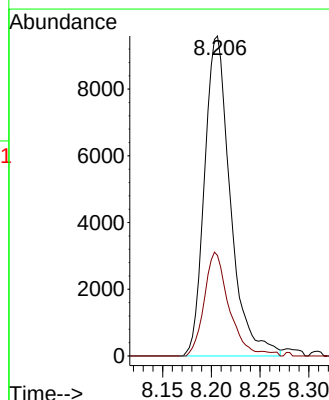
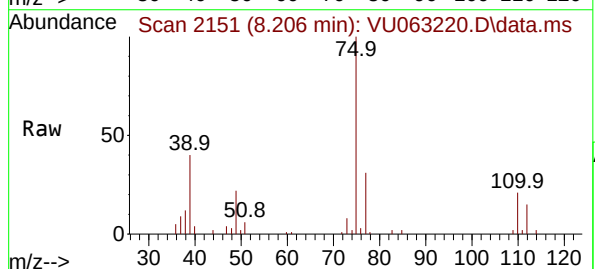
Acq: 10 Feb 2025 13:23

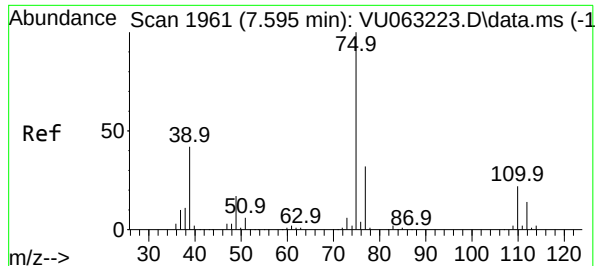
Tgt Ion: 75 Resp: 17681

Ion Ratio Lower Upper

75 100

77 31.4 25.9 38.9





#51

cis-1,3-Dichloropropene

Concen: 0.997 ug/l

RT: 7.599 min Scan# 1961

Delta R.T. 0.003 min

Lab File: VU063220.D

Acq: 10 Feb 2025 13:23

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC001

Tgt Ion: 75 Resp: 2203

Ion Ratio Lower Upper

75 100

77 32.0 25.3 37.9

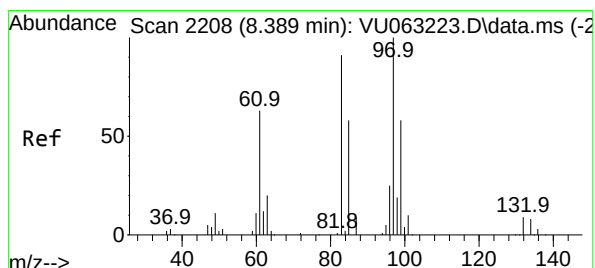
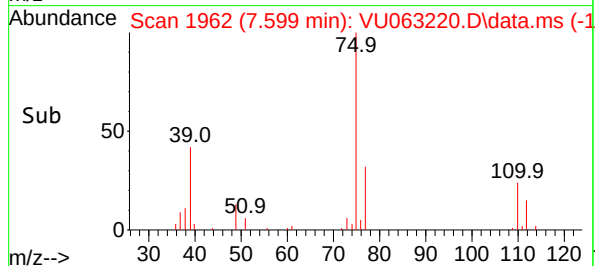
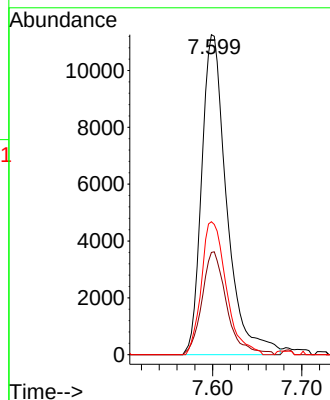
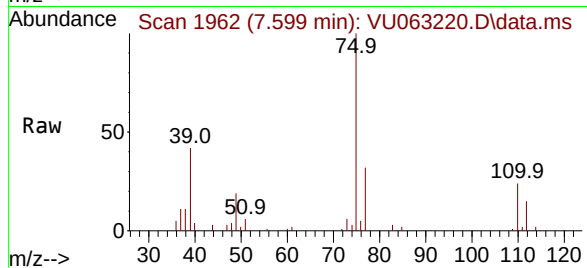
39 41.5 33.5 50.3

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#52

1,1,2-Trichloroethane

Concen: 1.025 ug/l

RT: 8.393 min Scan# 2209

Delta R.T. 0.003 min

Lab File: VU063220.D

Acq: 10 Feb 2025 13:23

Tgt Ion: 97 Resp: 11610

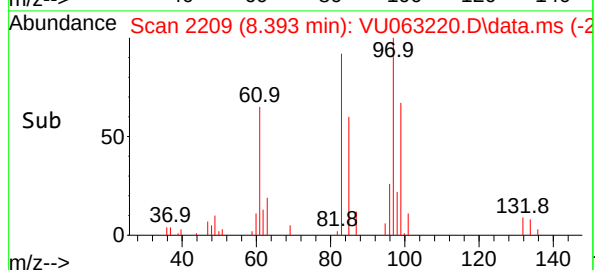
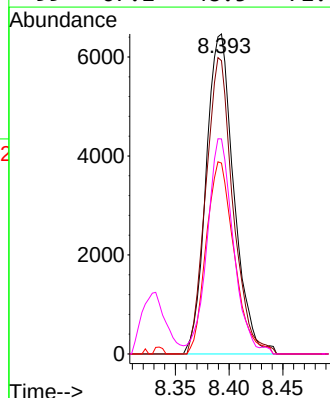
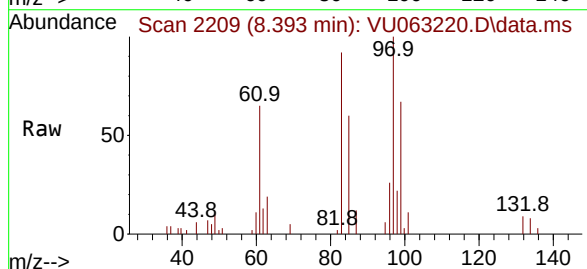
Ion Ratio Lower Upper

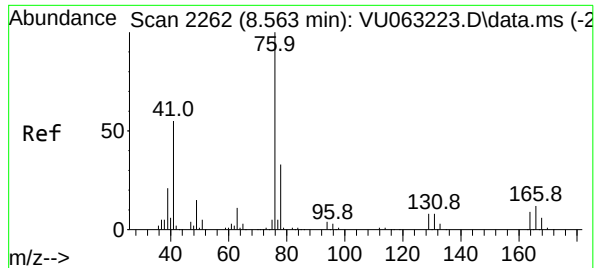
97 100

83 91.6 73.0 109.4

85 59.6 46.3 69.5

99 67.2 48.5 72.7





#53

1,3-Dichloropropane

Concen: 1.046 ug/l

RT: 8.566 min Scan# 2102

Delta R.T. 0.003 min

Lab File: VU063220.D

Acq: 10 Feb 2025 13:23

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC001

Tgt Ion: 76 Resp: 2102

Ion Ratio Lower Upper

76 100

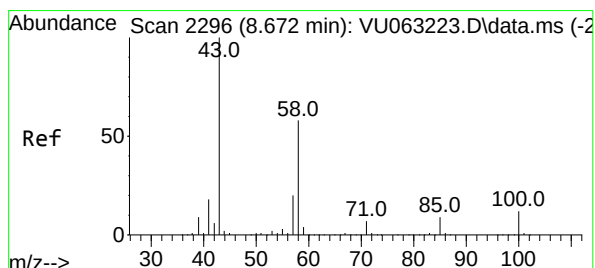
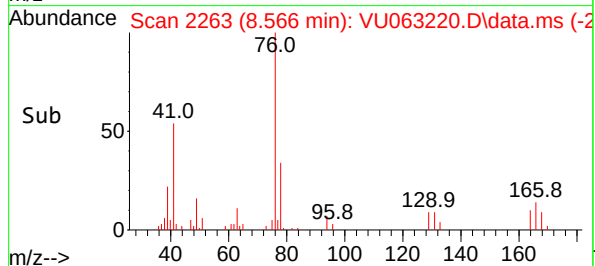
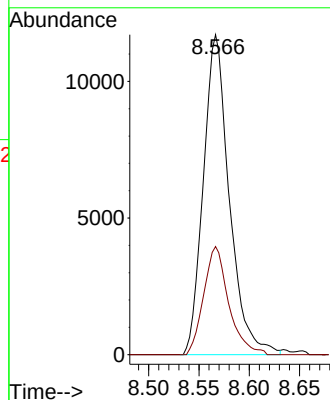
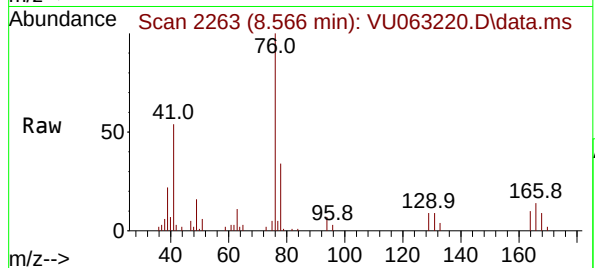
78 32.5 26.3 39.5

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#54

2-Hexanone

Concen: 4.673 ug/l m

RT: 8.679 min Scan# 2298

Delta R.T. 0.006 min

Lab File: VU063220.D

Acq: 10 Feb 2025 13:23

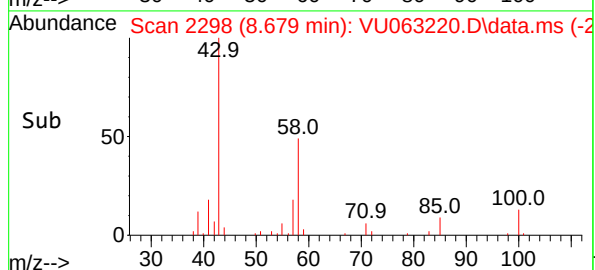
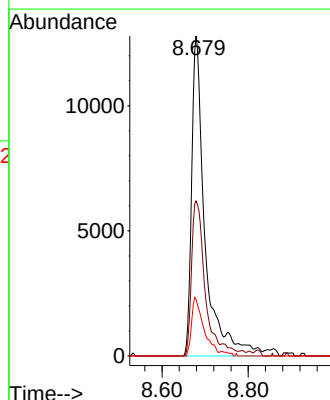
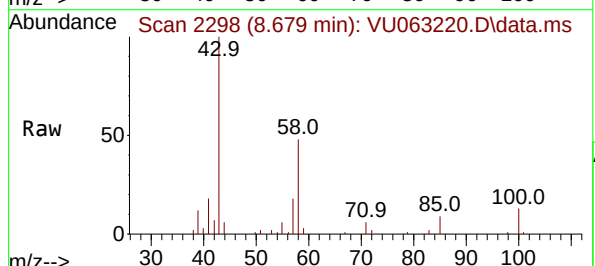
Tgt Ion: 43 Resp: 28078

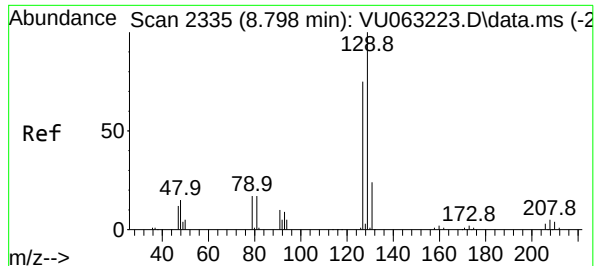
Ion Ratio Lower Upper

43 100

58 46.0 38.0 78.0

57 16.4 0.0 39.1





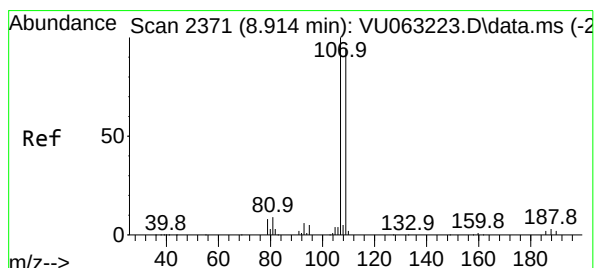
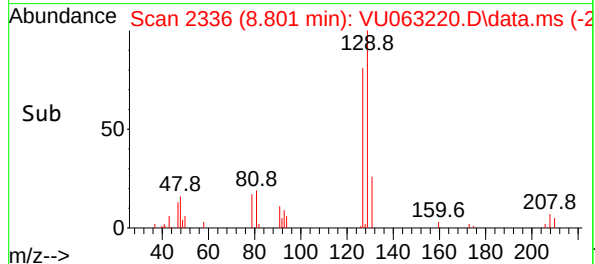
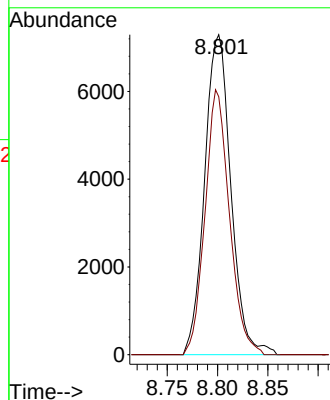
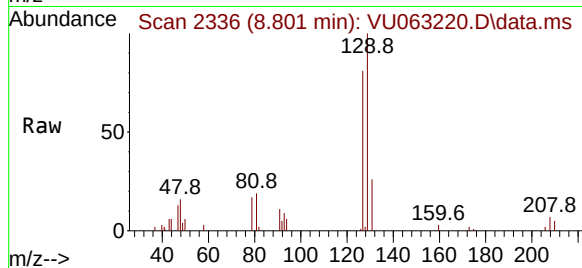
#55
Dibromochloromethane
Concen: 1.018 ug/l
RT: 8.801 min Scan# 2336
Delta R.T. 0.003 min
Lab File: VU063220.D
Acq: 10 Feb 2025 13:23

Instrument :
MSVOA_U
ClientSampleId :
VSTDIC001

Tgt Ion:129 Resp: 1325
Ion Ratio Lower Upper
129 100
127 77.0 60.4 90.6

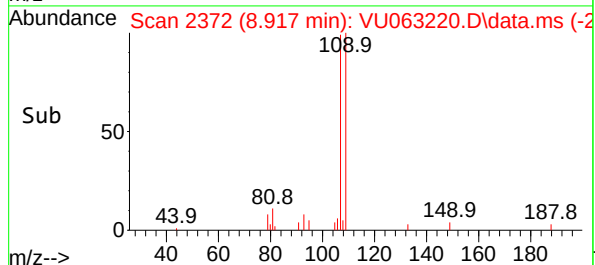
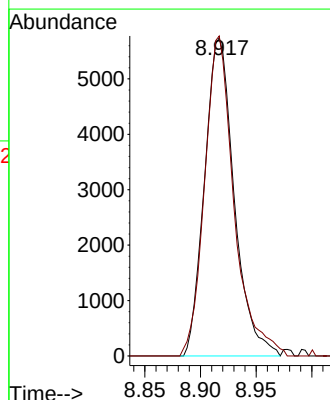
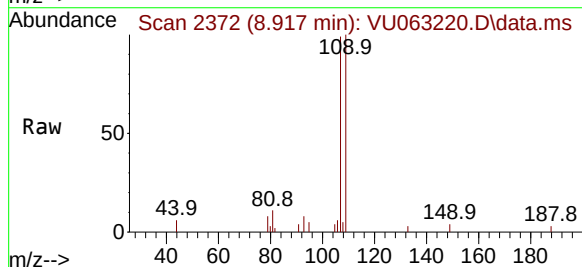
Manual Integrations
APPROVED

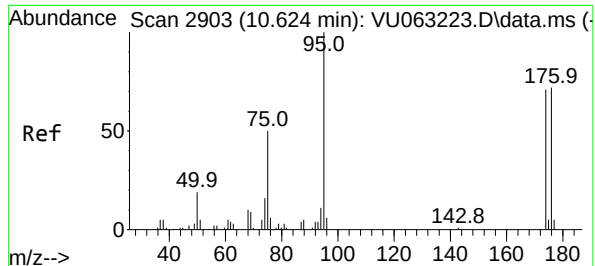
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#56
1,2-Dibromoethane
Concen: 1.001 ug/l
RT: 8.917 min Scan# 2372
Delta R.T. 0.003 min
Lab File: VU063220.D
Acq: 10 Feb 2025 13:23

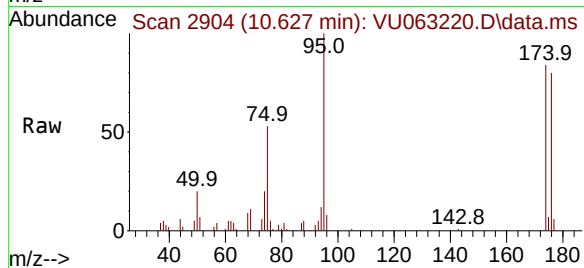
Tgt Ion:107 Resp: 10628
Ion Ratio Lower Upper
107 100
109 99.6 0.0 187.8





#57
4-Bromofluorobenzene
Concen: 0.943 ug/l
RT: 10.627 min Scan# 2904
Delta R.T. 0.003 min
Lab File: VU063220.D
Acq: 10 Feb 2025 13:23

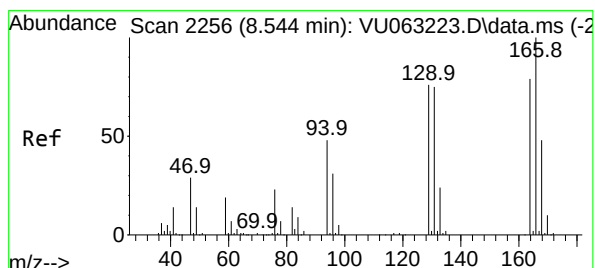
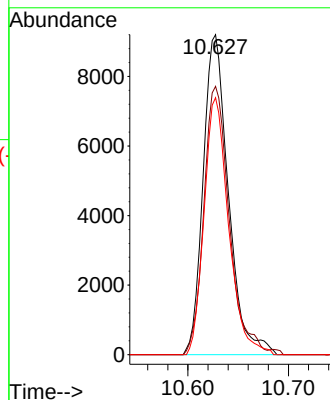
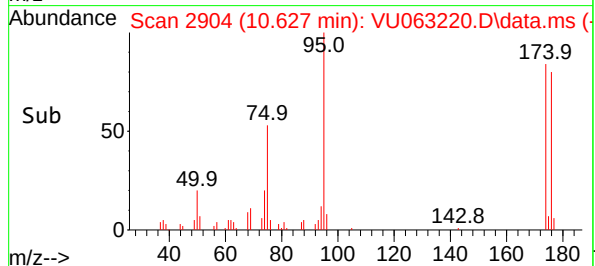
Instrument :
MSVOA_U
ClientSampleId :
VSTDICC001



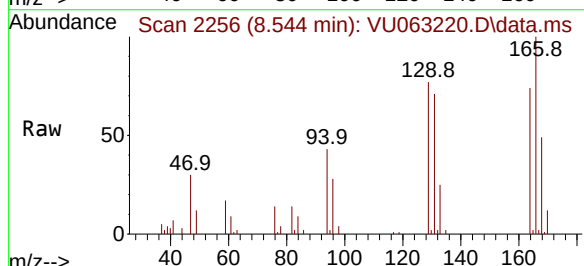
Tgt Ion: 95 Resp: 16040
Ion Ratio Lower Upper
95 100
174 84.4 58.6 88.0
176 78.3 58.2 87.4

Manual Integrations
APPROVED

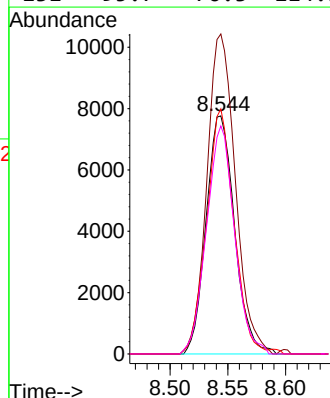
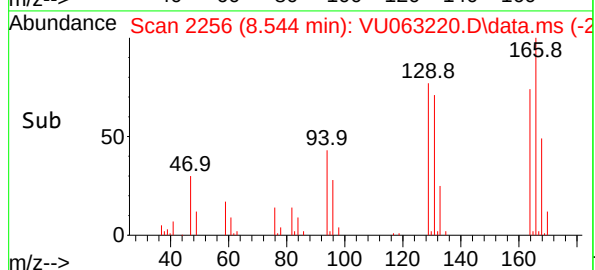
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025

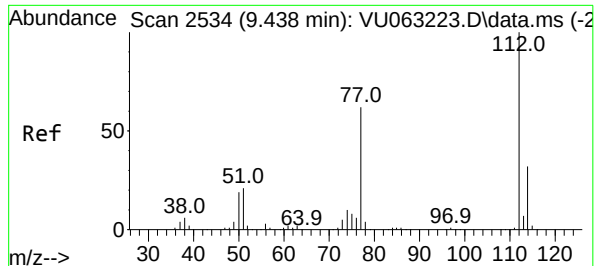


#58
Tetrachloroethene
Concen: 1.071 ug/l
RT: 8.544 min Scan# 2256
Delta R.T. 0.000 min
Lab File: VU063220.D
Acq: 10 Feb 2025 13:23



Tgt Ion:164 Resp: 13296
Ion Ratio Lower Upper
164 100
166 134.4 101.4 152.0
129 102.9 77.0 115.4
131 95.7 76.3 114.5





#59

Chlorobenzene

Concen: 1.008 ug/l

RT: 9.441 min Scan# 2534

Delta R.T. 0.003 min

Lab File: VU063220.D

Acq: 10 Feb 2025 13:23

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC001

Tgt Ion:112 Resp: 38774

Ion Ratio Lower Upper

112 100

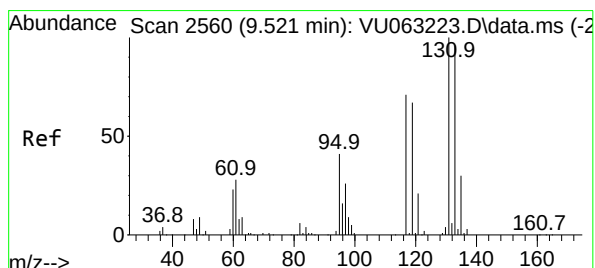
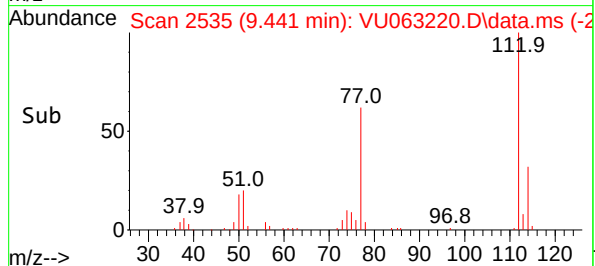
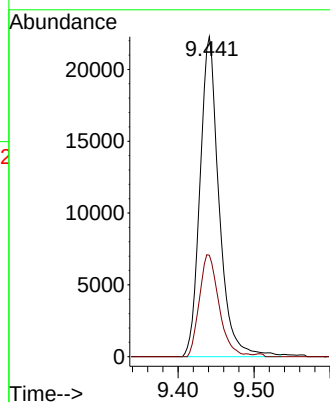
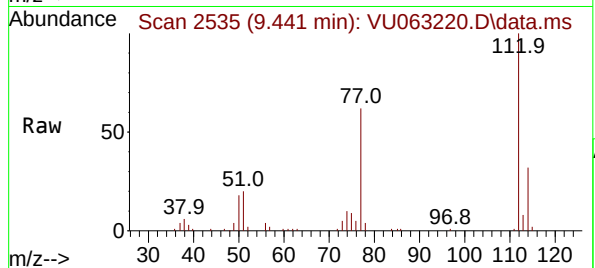
114 31.7 25.7 38.5

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#60

1,1,1,2-Tetrachloroethane

Concen: 1.041 ug/l

RT: 9.525 min Scan# 2561

Delta R.T. 0.003 min

Lab File: VU063220.D

Acq: 10 Feb 2025 13:23

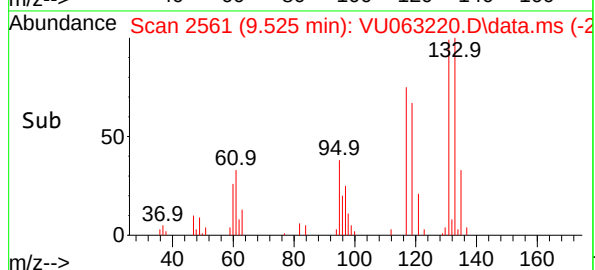
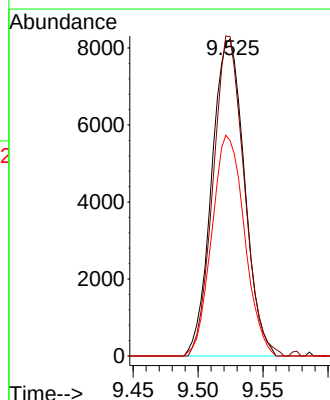
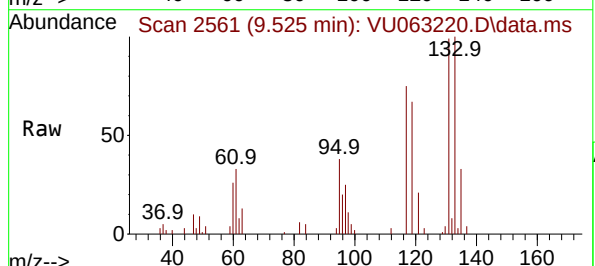
Tgt Ion:131 Resp: 14393

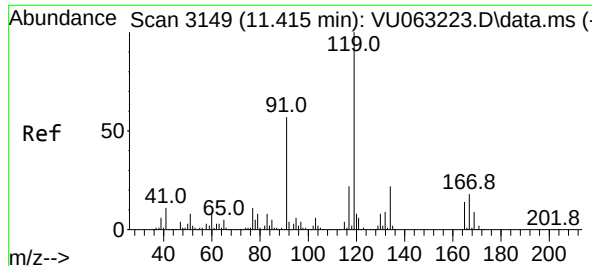
Ion Ratio Lower Upper

131 100

133 95.6 76.7 115.1

119 69.6 54.4 81.6





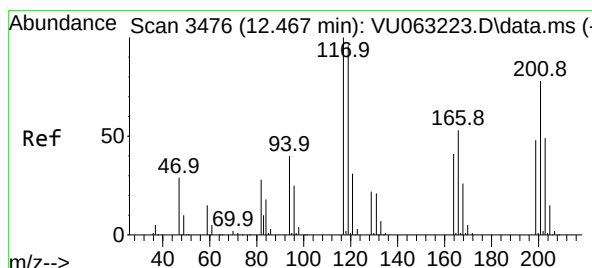
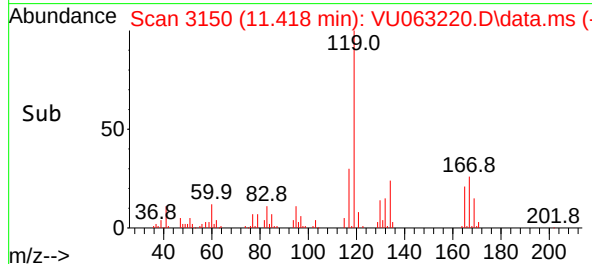
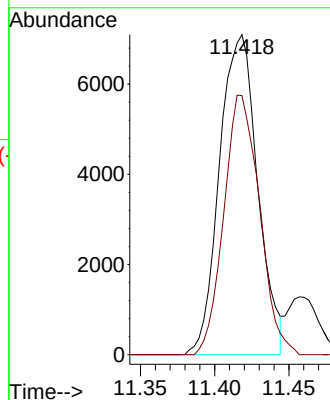
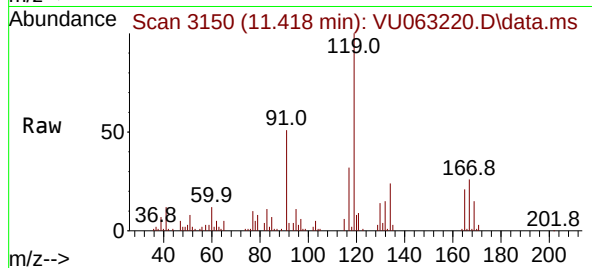
#61
Pentachloroethane
Concen: 1.027 ug/l
RT: 11.418 min Scan# 3149
Delta R.T. 0.003 min
Lab File: VU063220.D
Acq: 10 Feb 2025 13:23

Instrument :
MSVOA_U
ClientSampleId :
VSTDICC001

Tgt Ion:117 Resp: 12680
Ion Ratio Lower Upper
117 100
167 76.1 65.0 97.6

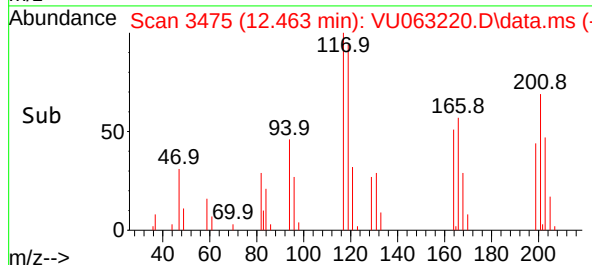
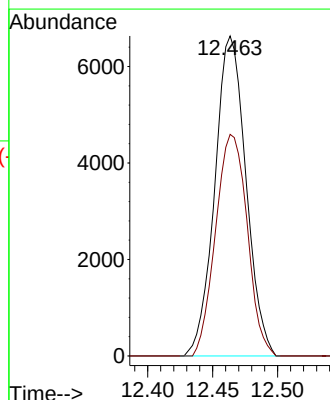
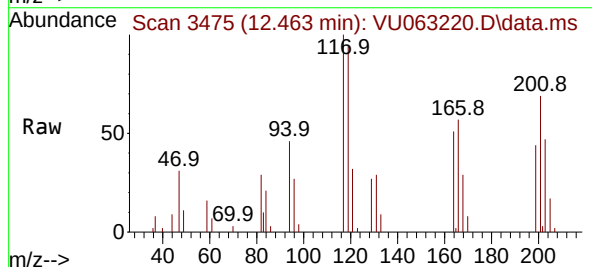
Manual Integrations
APPROVED

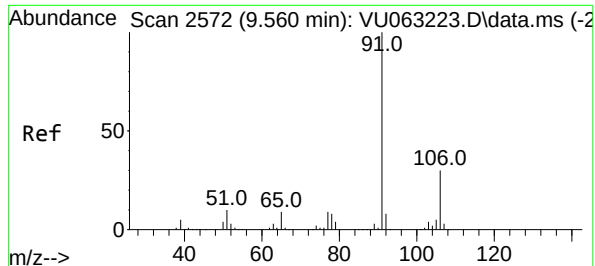
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#62
Hexachloroethane
Concen: 1.014 ug/l
RT: 12.463 min Scan# 3475
Delta R.T. -0.003 min
Lab File: VU063220.D
Acq: 10 Feb 2025 13:23

Tgt Ion:117 Resp: 11074
Ion Ratio Lower Upper
117 100
201 70.2 61.3 91.9





#63

Ethyl Benzene

Concen: 0.956 ug/l

RT: 9.560 min Scan# 2572

Delta R.T. 0.000 min

Lab File: VU063220.D

Acq: 10 Feb 2025 13:23

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC001

Tgt Ion: 91 Resp: 63398

Ion Ratio Lower Upper

91 100

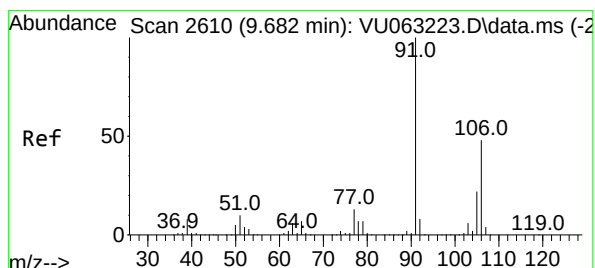
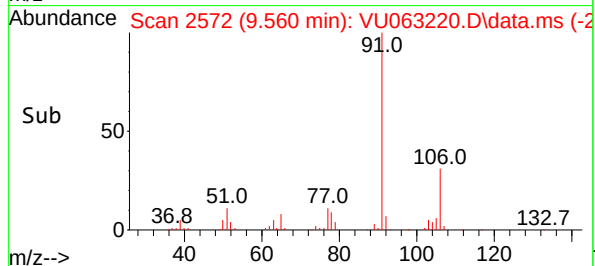
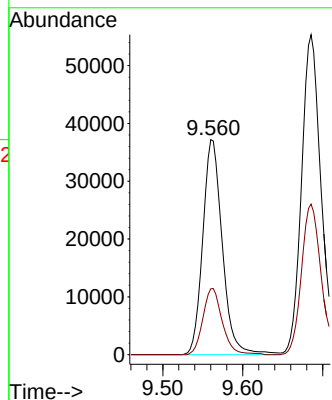
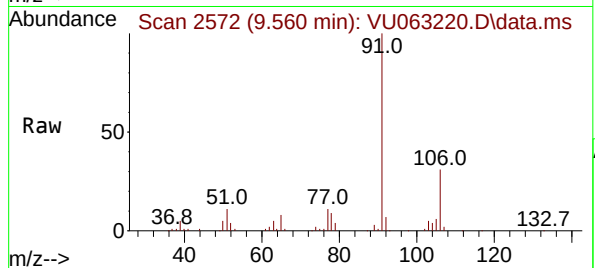
106 30.7 24.2 36.2

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#64

m/p-Xylenes

Concen: 1.847 ug/l

RT: 9.685 min Scan# 2611

Delta R.T. 0.003 min

Lab File: VU063220.D

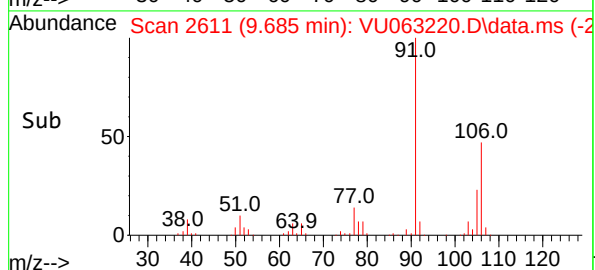
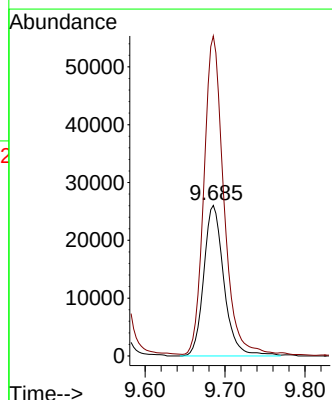
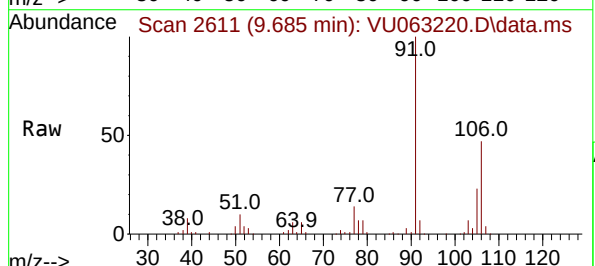
Acq: 10 Feb 2025 13:23

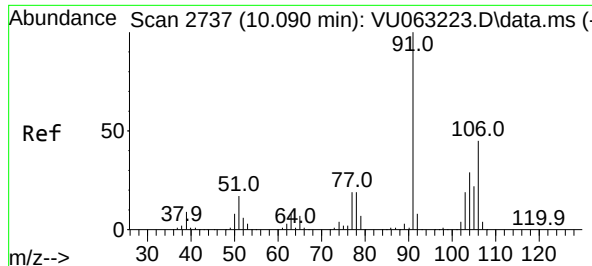
Tgt Ion:106 Resp: 45748

Ion Ratio Lower Upper

106 100

91 207.1 166.9 250.3





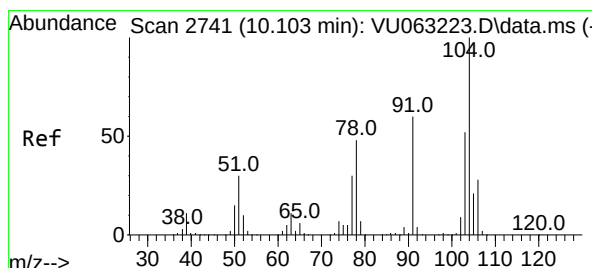
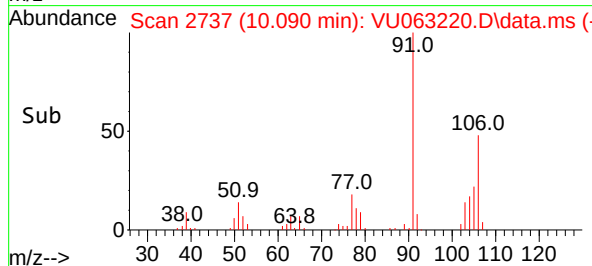
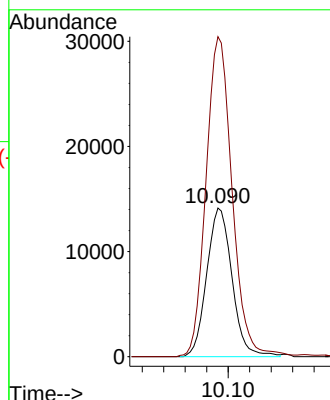
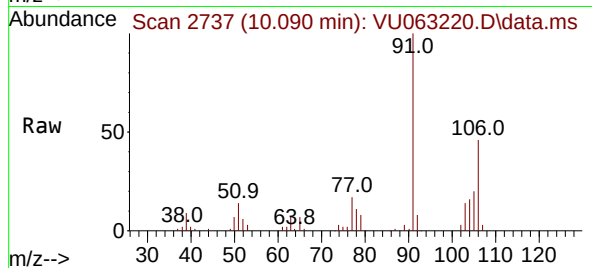
#65
o-Xylene
Concen: 0.954 ug/l
RT: 10.090 min Scan# 2737
Delta R.T. 0.000 min
Lab File: VU063220.D
Acq: 10 Feb 2025 13:23

Instrument :
MSVOA_U
ClientSampleId :
VSTDICC001

Tgt Ion:106 Resp: 23138
Ion Ratio Lower Upper
106 100
91 221.5 110.9 332.9

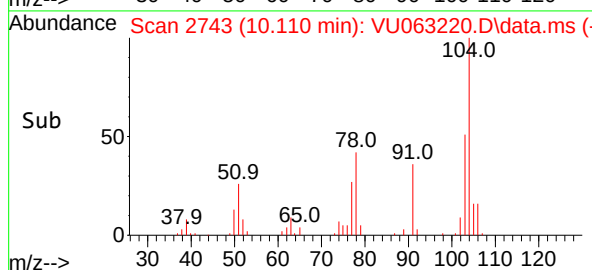
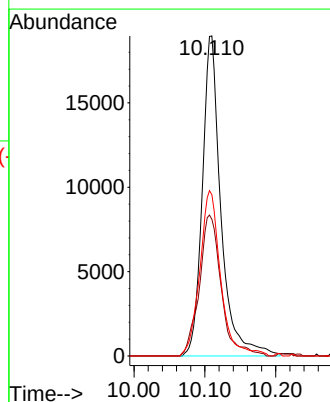
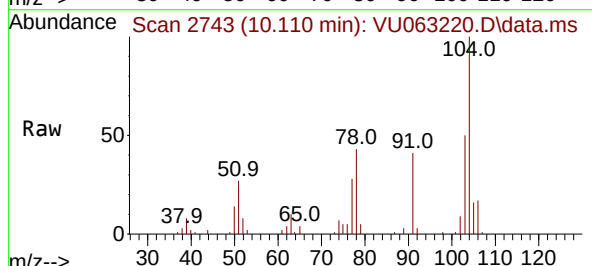
Manual Integrations
APPROVED

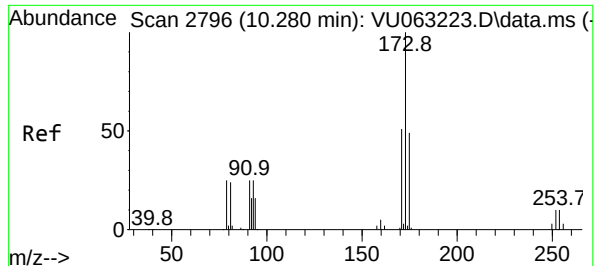
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#66
Styrene
Concen: 0.901 ug/l
RT: 10.110 min Scan# 2743
Delta R.T. 0.007 min
Lab File: VU063220.D
Acq: 10 Feb 2025 13:23

Tgt Ion:104 Resp: 34785
Ion Ratio Lower Upper
104 100
78 51.5 41.2 61.8
103 57.5 44.8 67.2





#67

Bromoform

Concen: 0.973 ug/l

RT: 10.280 min Scan# 21

Delta R.T. 0.000 min

Lab File: VU063220.D

Acq: 10 Feb 2025 13:23

Instrument :

MSVOA_U

ClientSampleId :

VSTDICC001

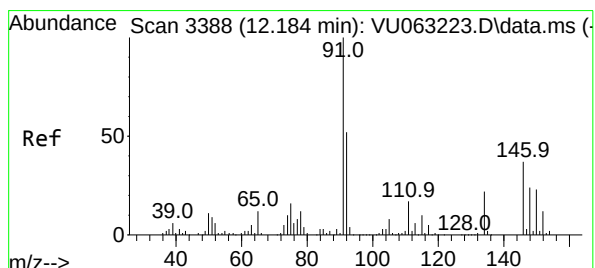
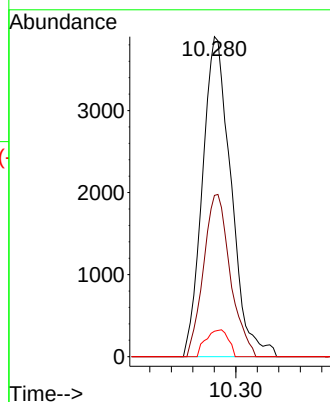
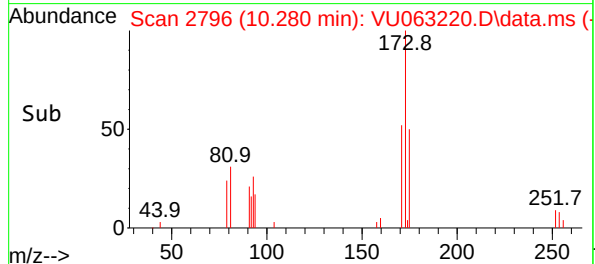
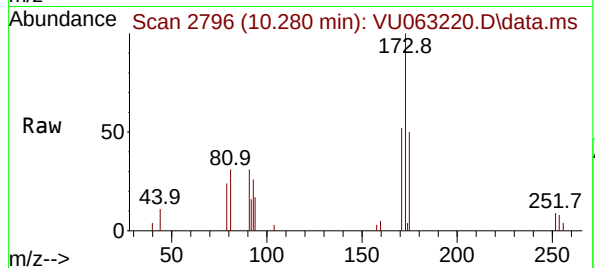
Tgt Ion:	173	Resp:	719
Ion	Ratio	Lower	Upper
173	100		
175	47.4	39.0	58.4
254	6.6	7.7	11.5

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#68

1,2-Dichlorobenzene-d4

Concen: 0.956 ug/l

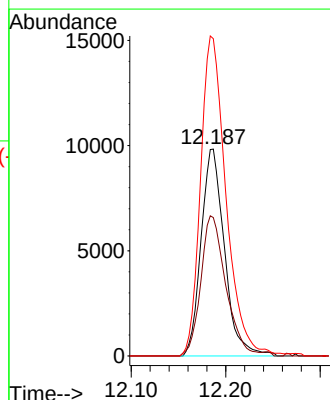
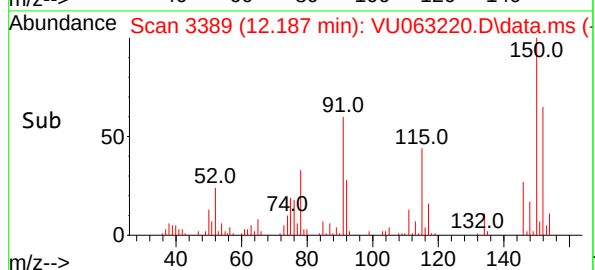
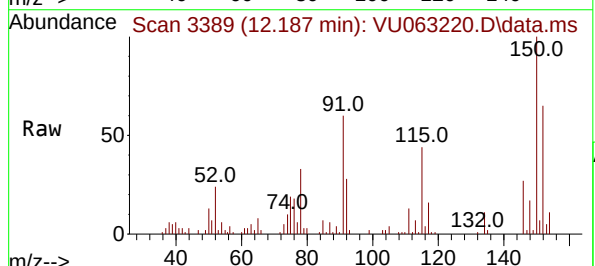
RT: 12.187 min Scan# 3389

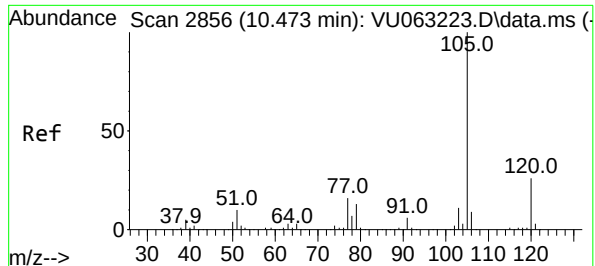
Delta R.T. 0.003 min

Lab File: VU063220.D

Acq: 10 Feb 2025 13:23

Tgt Ion:	152	Resp:	16904
Ion	Ratio	Lower	Upper
152	100		
115	72.2	0.0	275.2
150	168.3	0.0	658.4





#69

Isopropylbenzene

Concen: 0.936 ug/l

RT: 10.473 min Scan# 2856

Delta R.T. 0.000 min

Lab File: VU063220.D

Acq: 10 Feb 2025 13:23

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC001

Tgt Ion:105 Resp: 5337

Ion Ratio Lower Upper

105 100

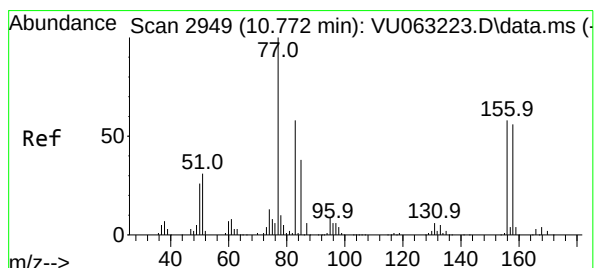
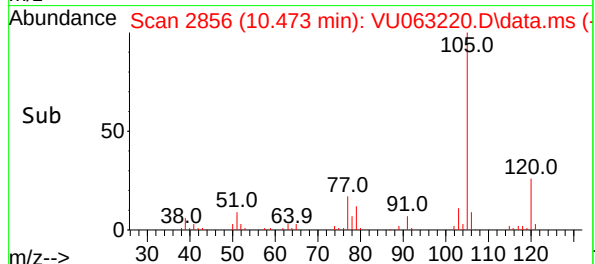
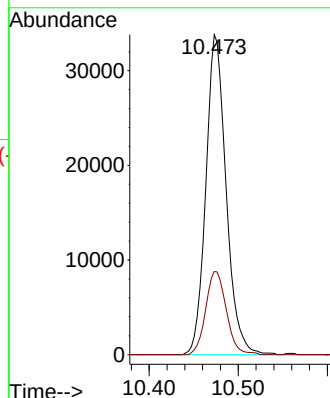
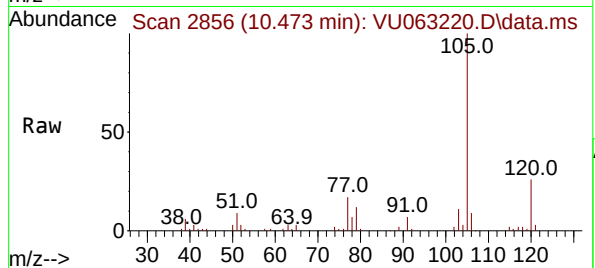
120 26.5 12.8 38.4

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#70

1,1,2,2-Tetrachloroethane

Concen: 1.027 ug/l

RT: 10.772 min Scan# 2949

Delta R.T. 0.000 min

Lab File: VU063220.D

Acq: 10 Feb 2025 13:23

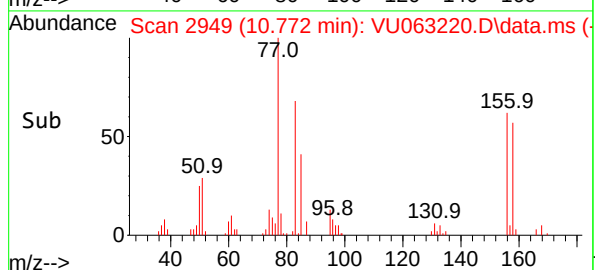
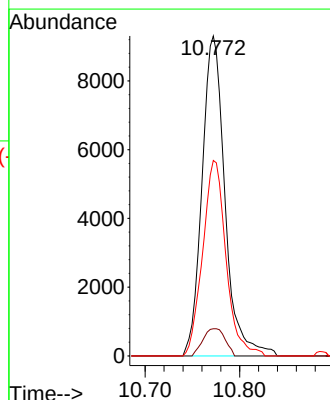
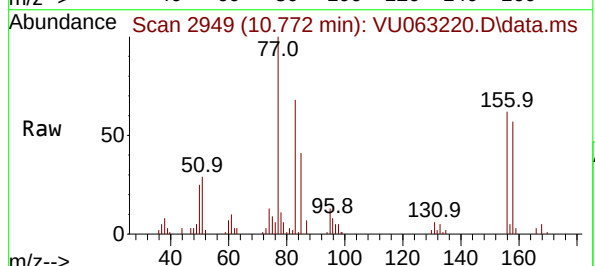
Tgt Ion: 83 Resp: 15680

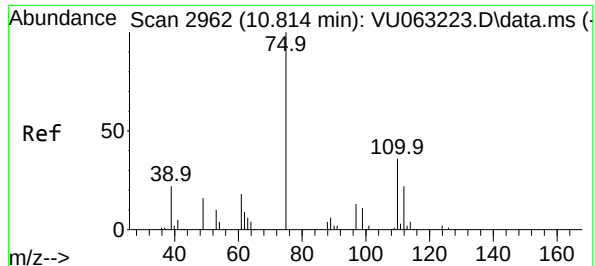
Ion Ratio Lower Upper

83 100

131 8.2 7.4 11.0

85 62.2 51.8 77.8





#71

1,2,3-Trichloropropane

Concen: 0.991 ug/l m

RT: 10.814 min Scan# 2962

Delta R.T. 0.000 min

Lab File: VU063220.D

Acq: 10 Feb 2025 13:23

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC001

Tgt Ion: 75 Resp: 11462

Ion Ratio Lower Upper

75 100

77 0.0 0.0 0.0

110 32.3 0.0 77.0

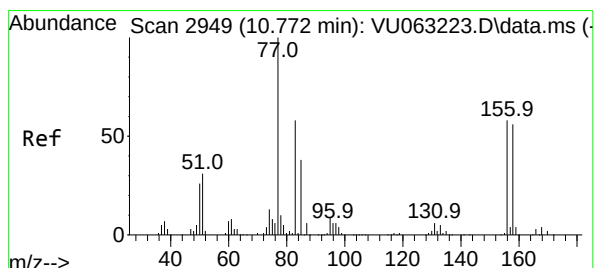
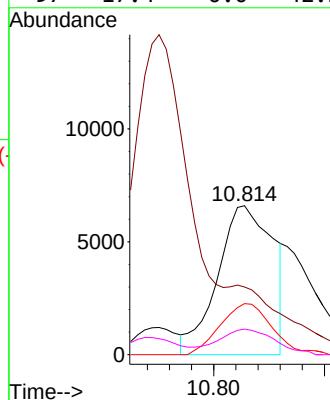
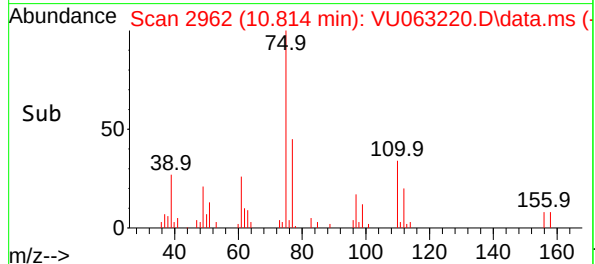
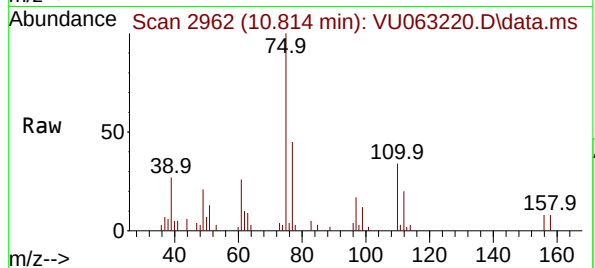
97 17.4 0.0 42.2

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#72

Bromobenzene

Concen: 1.016 ug/l

RT: 10.775 min Scan# 2950

Delta R.T. 0.003 min

Lab File: VU063220.D

Acq: 10 Feb 2025 13:23

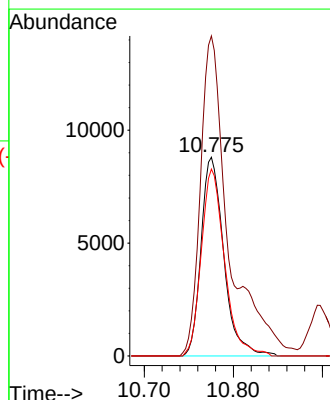
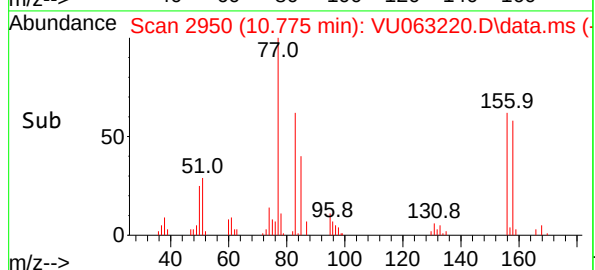
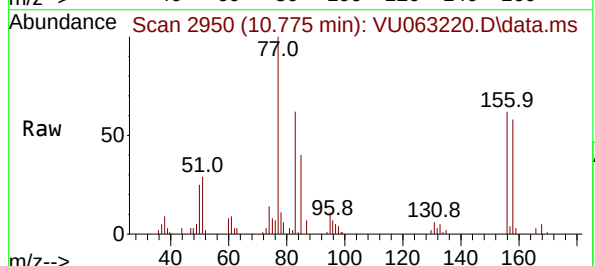
Tgt Ion:156 Resp: 15611

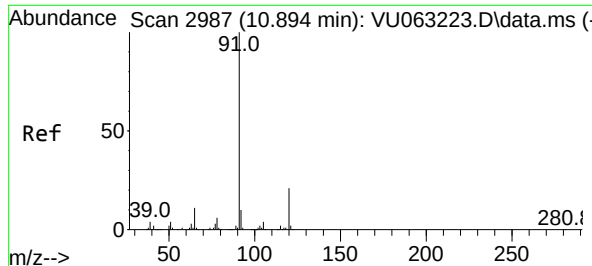
Ion Ratio Lower Upper

156 100

77 161.9 0.0 343.6

158 96.3 0.0 193.0





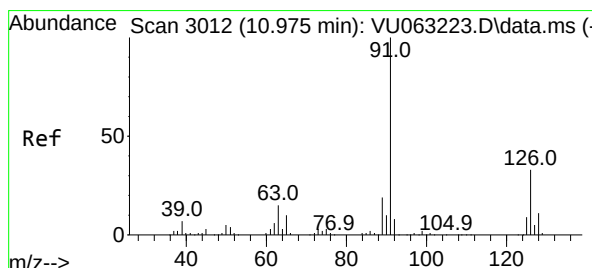
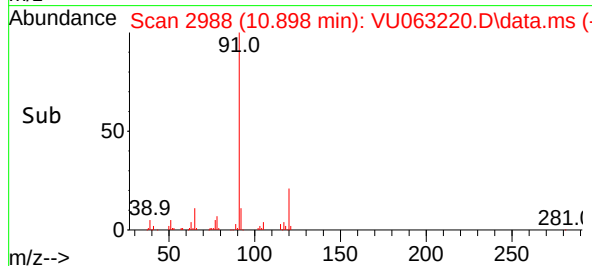
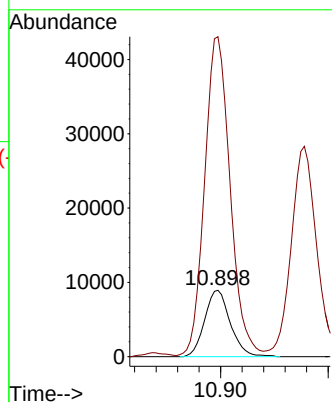
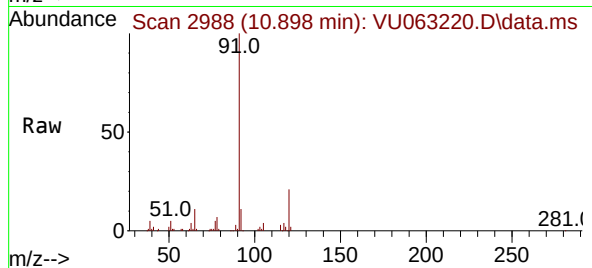
#73
n-propylbenzene
Concen: 0.904 ug/l
RT: 10.898 min Scan# 2987
Delta R.T. 0.003 min
Lab File: VU063220.D
Acq: 10 Feb 2025 13:23

Instrument :
MSVOA_U
ClientSampleId :
VSTDICC001

Tgt Ion:120 Resp: 1476
Ion Ratio Lower Upper
120 100
91 476.2 369.8 554.6

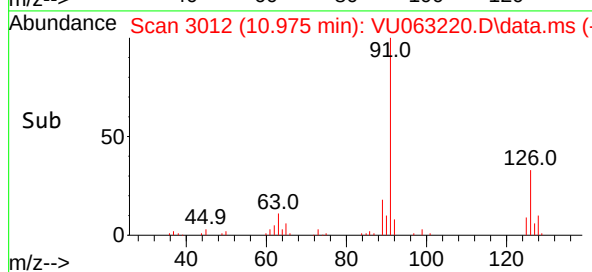
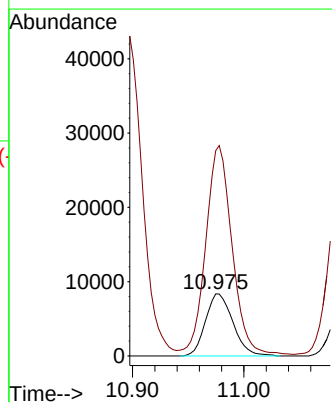
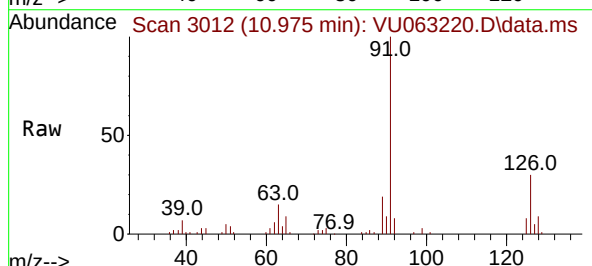
Manual Integrations
APPROVED

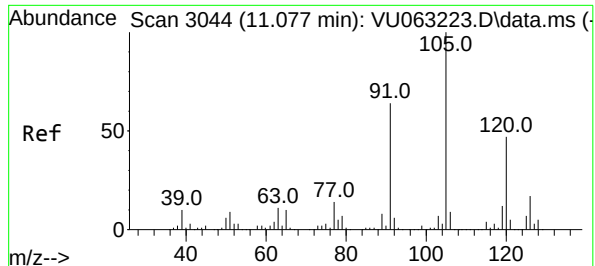
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#74
2-Chlorotoluene
Concen: 0.952 ug/l
RT: 10.975 min Scan# 3012
Delta R.T. 0.000 min
Lab File: VU063220.D
Acq: 10 Feb 2025 13:23

Tgt Ion:126 Resp: 14317
Ion Ratio Lower Upper
126 100
91 322.6 0.0 623.8





#75

1,3,5-Trimethylbenzene

Concen: 0.916 ug/l

RT: 11.078 min Scan# 3044

Delta R.T. 0.000 min

Lab File: VU063220.D

Acq: 10 Feb 2025 13:23

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC001

Tgt Ion:105 Resp: 4840

Ion Ratio Lower Upper

105 100

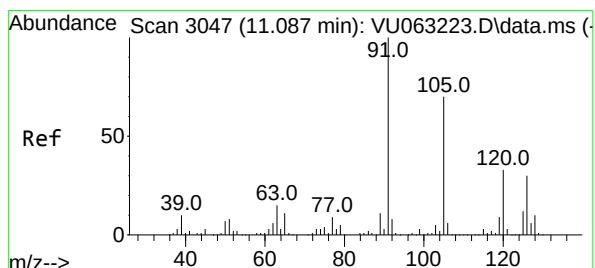
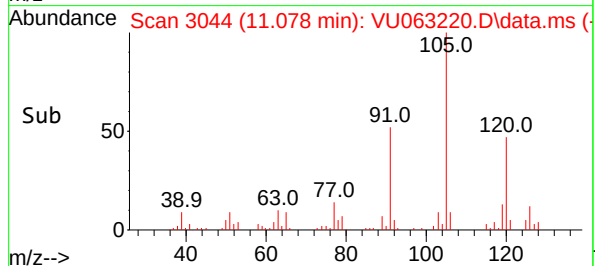
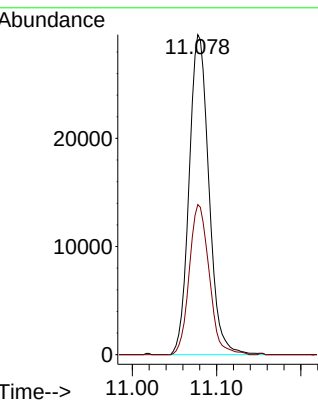
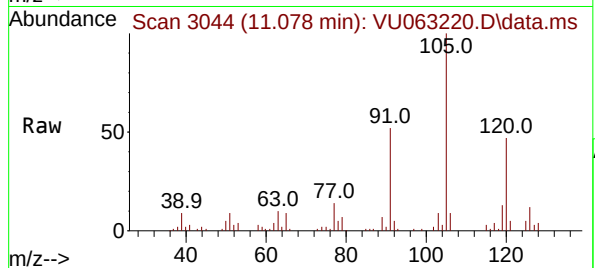
120 47.2 37.3 55.9

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#76

4-Chlorotoluene

Concen: 0.975 ug/l

RT: 11.090 min Scan# 3048

Delta R.T. 0.003 min

Lab File: VU063220.D

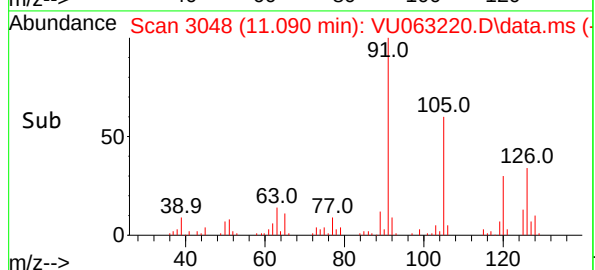
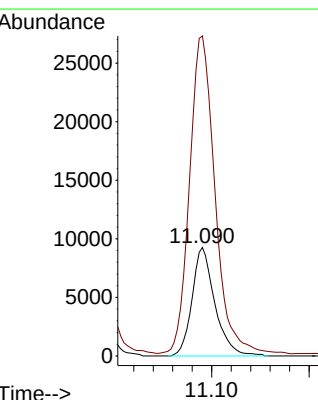
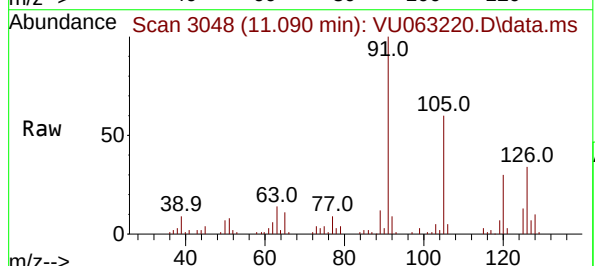
Acq: 10 Feb 2025 13:23

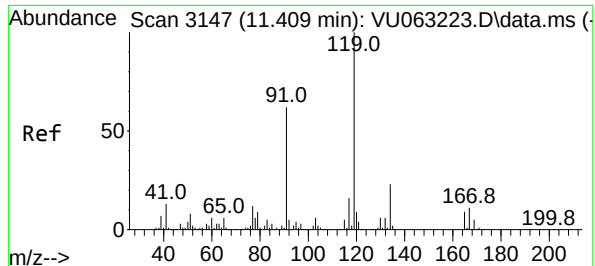
Tgt Ion:126 Resp: 15039

Ion Ratio Lower Upper

126 100

91 327.4 0.0 703.6





#77

tert-Butylbenzene

Concen: 0.953 ug/l

RT: 11.409 min Scan# 3147

Delta R.T. 0.000 min

Lab File: VU063220.D

Acq: 10 Feb 2025 13:23

Instrument :

MSVOA_U

ClientSampleId :

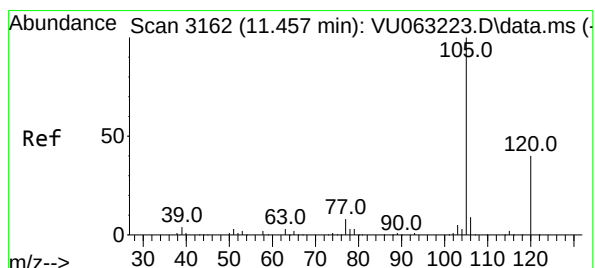
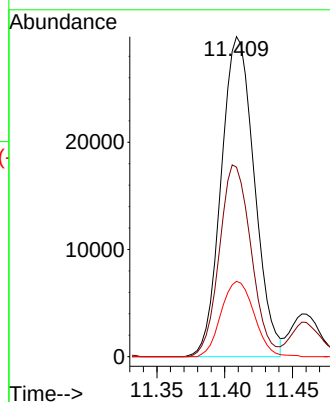
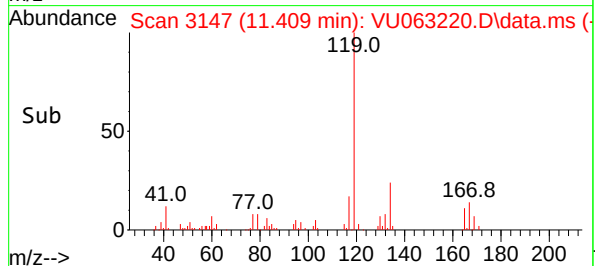
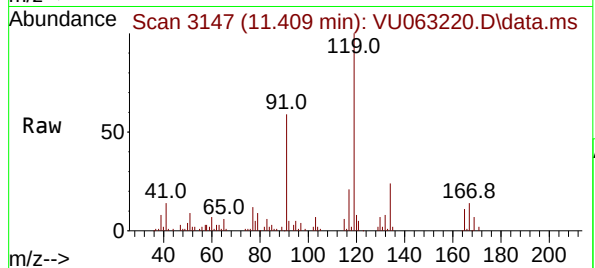
VSTDIC001

Tgt Ion:	119	Resp:	50914
Ion	Ratio	Lower	Upper
119	100		
91	57.4	29.4	88.3
134	23.4	17.6	26.4

Manual Integrations
APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#78

1,2,4-Trimethylbenzene

Concen: 0.891 ug/l

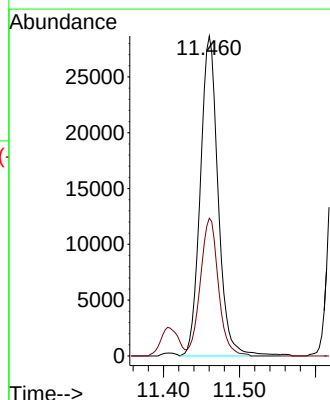
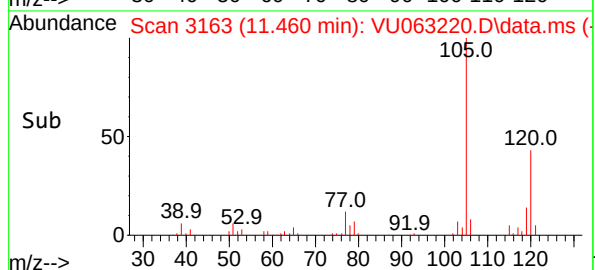
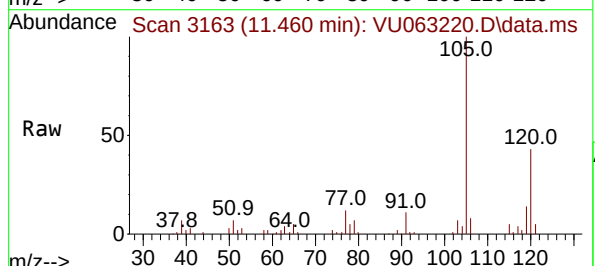
RT: 11.460 min Scan# 3163

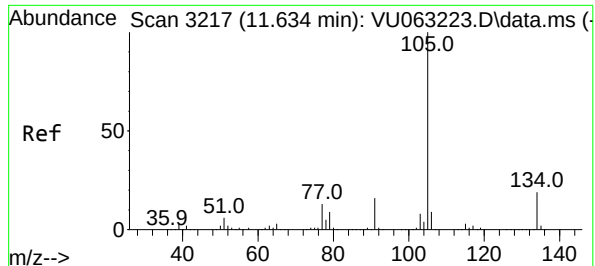
Delta R.T. 0.003 min

Lab File: VU063220.D

Acq: 10 Feb 2025 13:23

Tgt Ion:	105	Resp:	46689
Ion	Ratio	Lower	Upper
105	100		
120	43.8	21.9	65.7





#79

sec-Butylbenzene

Concen: 0.930 ug/l

RT: 11.634 min Scan# 31

Delta R.T. 0.000 min

Lab File: VU063220.D

Acq: 10 Feb 2025 13:23

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC001

Tgt Ion:105 Resp: 63220

Ion Ratio Lower Upper

105 100

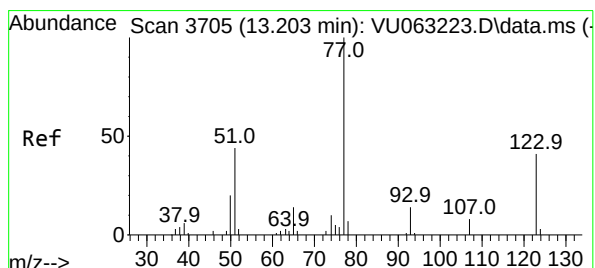
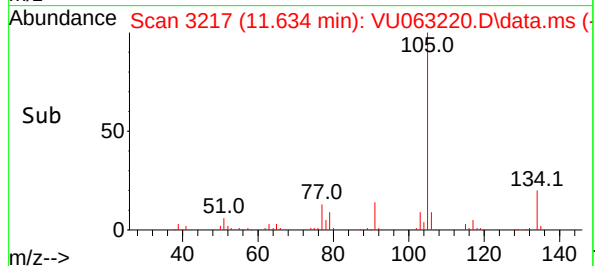
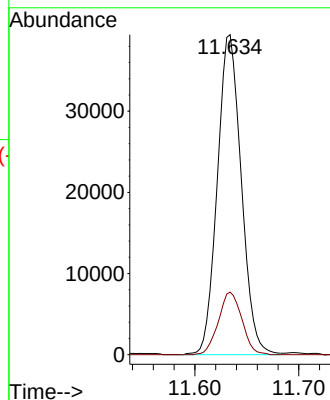
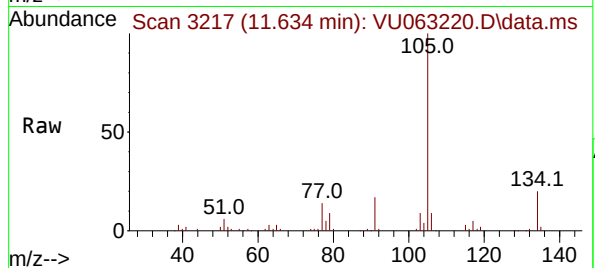
134 19.1 15.1 22.7

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#80

Nitrobenzene

Concen: 5.911 ug/l

RT: 13.232 min Scan# 3714

Delta R.T. 0.029 min

Lab File: VU063220.D

Acq: 10 Feb 2025 13:23

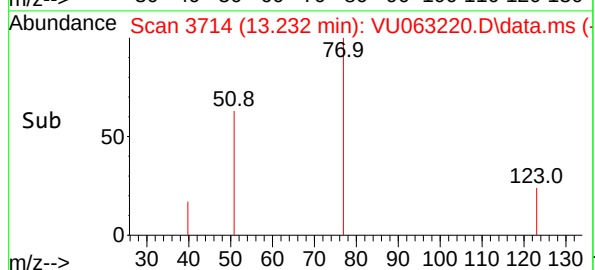
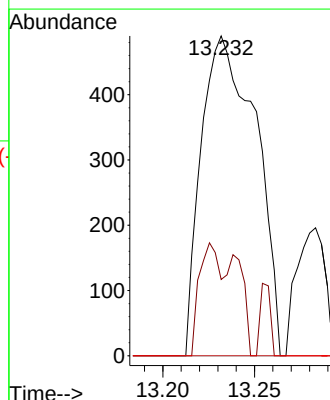
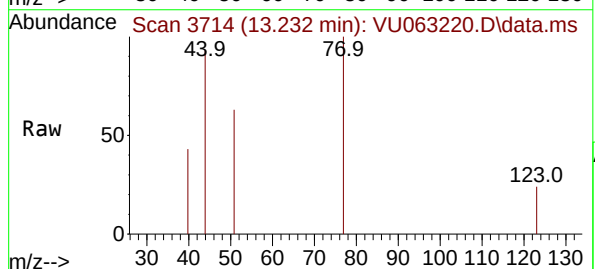
Tgt Ion: 77 Resp: 1014

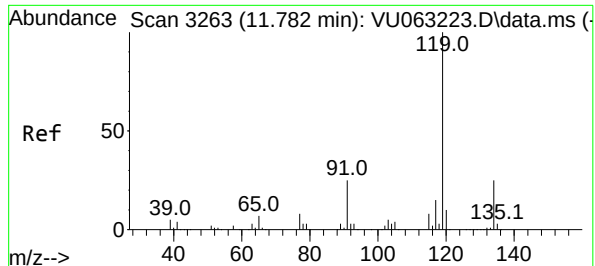
Ion Ratio Lower Upper

77 100

123 13.5 18.9 67.1#

65 0.0 11.9 15.1#





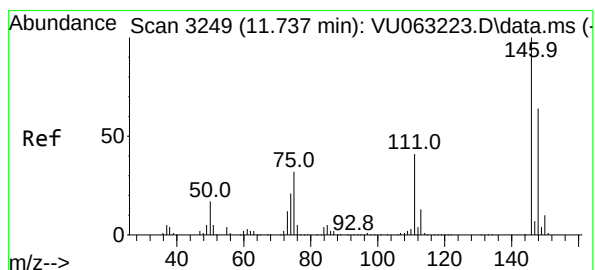
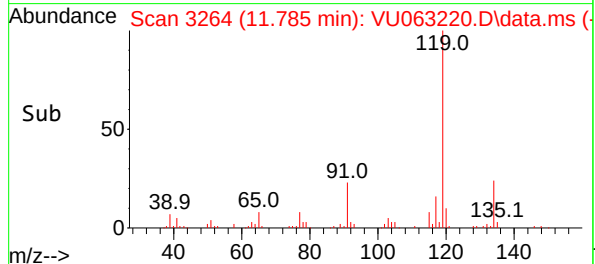
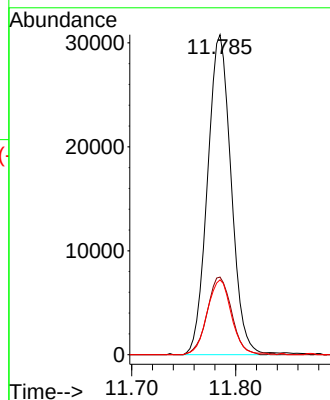
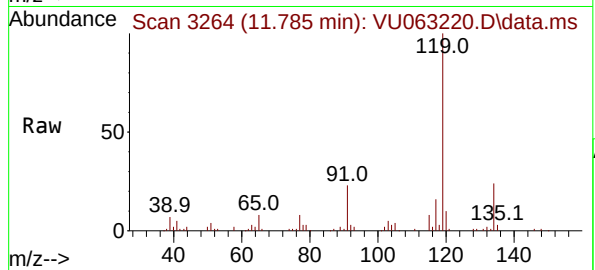
#81
p-Isopropyltoluene
Concen: 0.905 ug/l
RT: 11.785 min Scan# 3264
Delta R.T. 0.003 min
Lab File: VU063220.D
Acq: 10 Feb 2025 13:23

Instrument :
MSVOA_U
ClientSampleId :
VSTDIC001

Tgt Ion:119 Resp: 48578
Ion Ratio Lower Upper
119 100
134 25.0 20.3 30.5
91 24.1 19.4 29.2

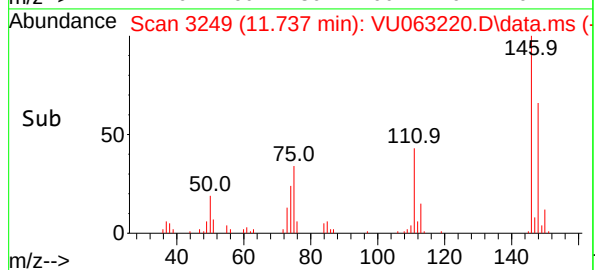
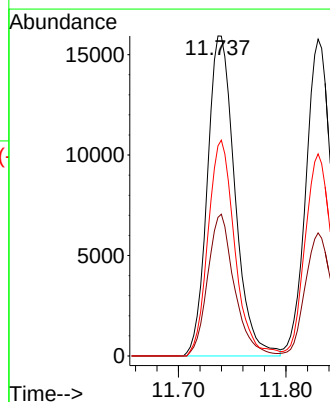
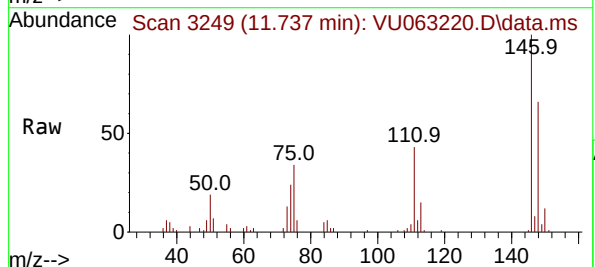
Manual Integrations
APPROVED

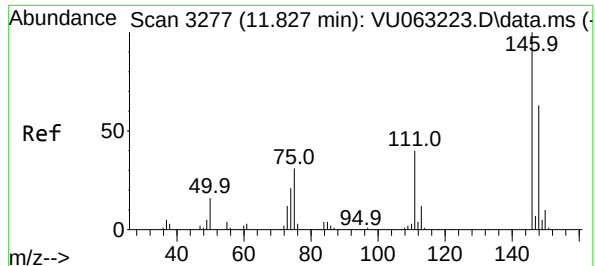
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#82
1,3-Dichlorobenzene
Concen: 0.953 ug/l
RT: 11.737 min Scan# 3249
Delta R.T. 0.000 min
Lab File: VU063220.D
Acq: 10 Feb 2025 13:23

Tgt Ion:146 Resp: 28406
Ion Ratio Lower Upper
146 100
111 42.9 32.8 49.2
148 65.4 51.1 76.7





#83

1,4-Dichlorobenzene

Concen: 0.910 ug/l

RT: 11.830 min Scan# 3277

Delta R.T. 0.003 min

Lab File: VU063220.D

Acq: 10 Feb 2025 13:23

Instrument :

MSVOA_U

ClientSampleId :

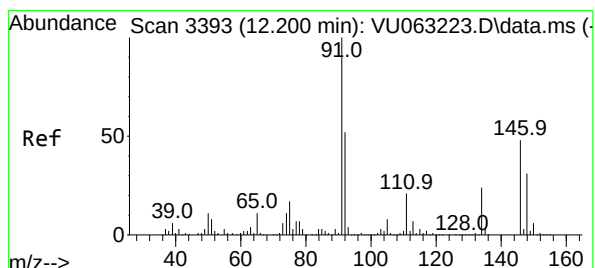
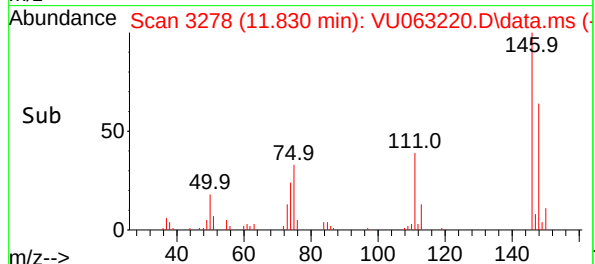
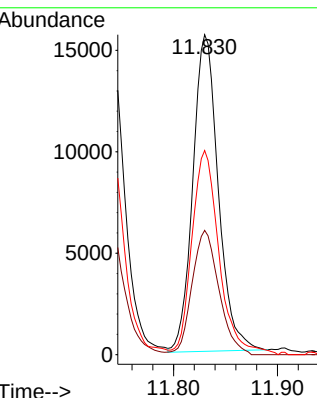
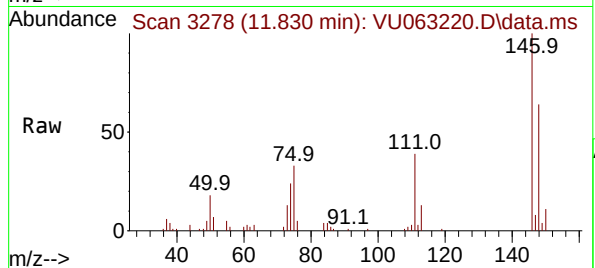
VSTDIC001

Tgt Ion:	146	Resp:	26529
Ion Ratio	Lower	Upper	
146	100		
111	41.5	32.1	48.1
148	69.0	50.2	75.4

Manual Integrations
APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#84

n-Butylbenzene

Concen: 0.876 ug/l

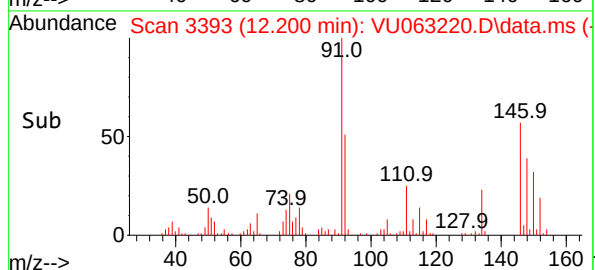
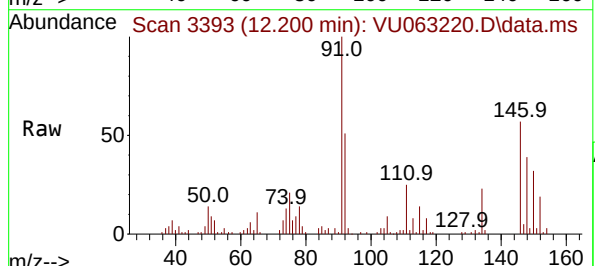
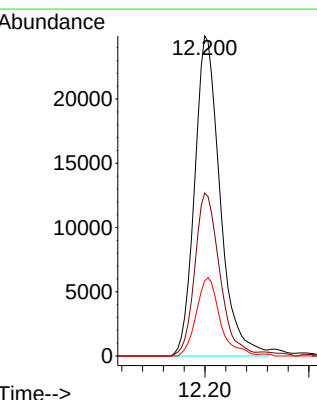
RT: 12.200 min Scan# 3393

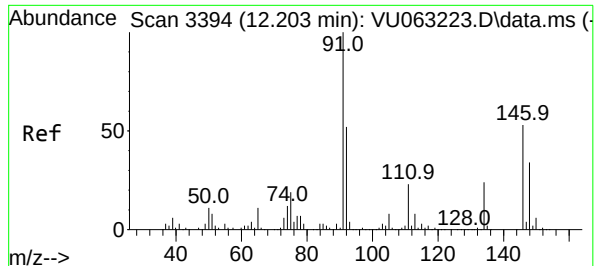
Delta R.T. 0.000 min

Lab File: VU063220.D

Acq: 10 Feb 2025 13:23

Tgt Ion:	91	Resp:	42404
Ion Ratio	Lower	Upper	
91	100		
92	49.9	41.8	62.8
134	22.8	18.6	28.0





#85

1,2-Dichlorobenzene

Concen: 0.969 ug/l

RT: 12.203 min Scan# 31

Delta R.T. 0.000 min

Lab File: VU063220.D

Acq: 10 Feb 2025 13:23

Instrument :

MSVOA_U

ClientSampleId :

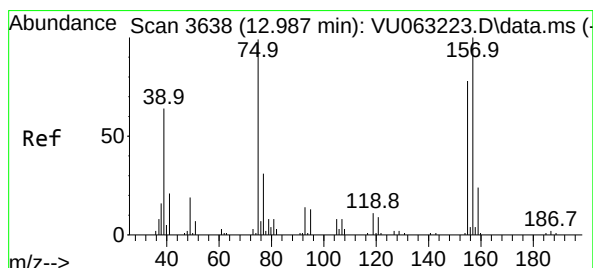
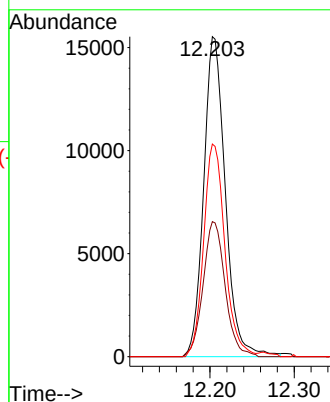
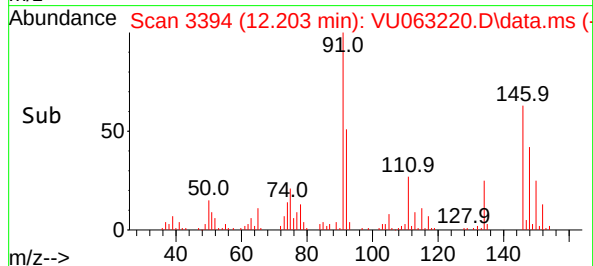
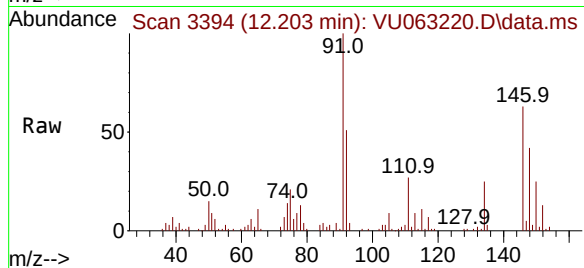
VSTDICC001

Tgt Ion:	146	Resp:	2774
Ion	Ratio	Lower	Upper
146	100		
111	43.0	21.9	65.7
148	65.4	32.3	96.9

Manual Integrations
APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#86

1,2-Dibromo-3-Chloropropane

Concen: 0.982 ug/l

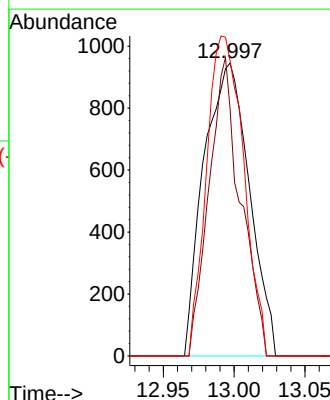
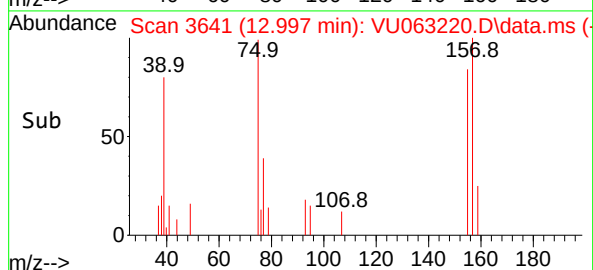
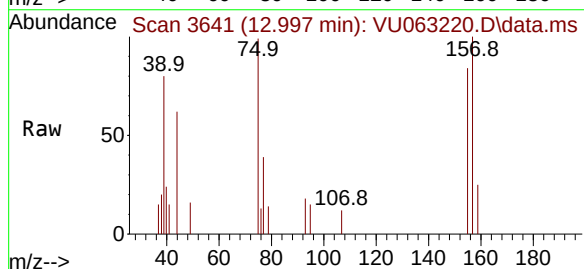
RT: 12.997 min Scan# 3641

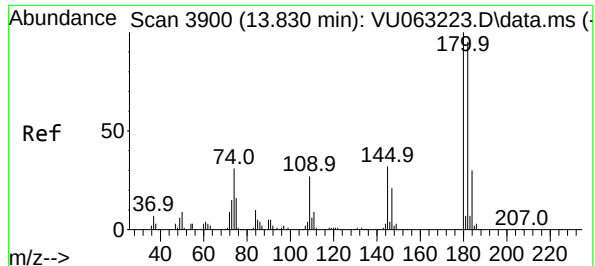
Delta R.T. 0.010 min

Lab File: VU063220.D

Acq: 10 Feb 2025 13:23

Tgt Ion:	75	Resp:	2103
Ion	Ratio	Lower	Upper
75	100		
155	71.2	63.5	95.3
157	89.2	81.8	122.6





#87

1,2,4-Trichlorobenzene

Concen: 0.909 ug/l

RT: 13.836 min Scan# 3900

Delta R.T. 0.007 min

Lab File: VU063220.D

Acq: 10 Feb 2025 13:23

Instrument :

MSVOA_U

ClientSampleId :

VSTDICC001

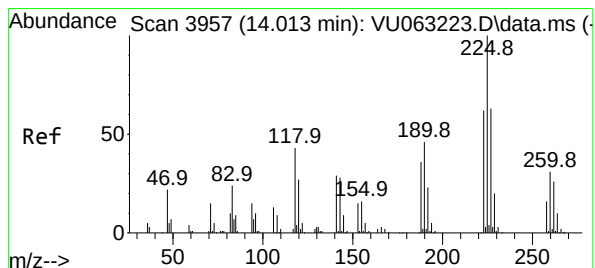
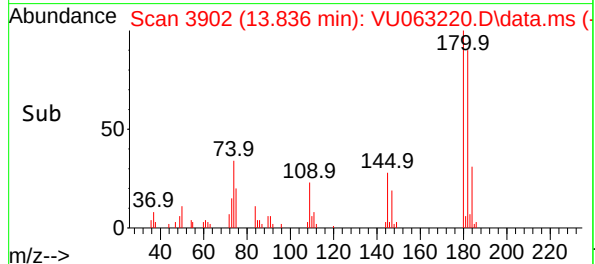
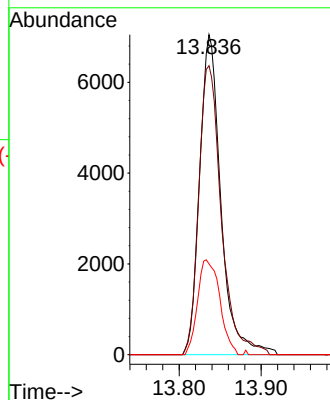
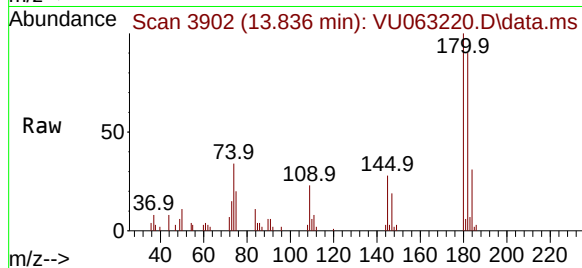
Tgt Ion:180	Resp:	1269
Ion Ratio	Lower	Upper
180	100	
182	95.4	76.6 115.0
145	30.9	25.4 38.2

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#88

Hexachlorobutadiene

Concen: 1.020 ug/l

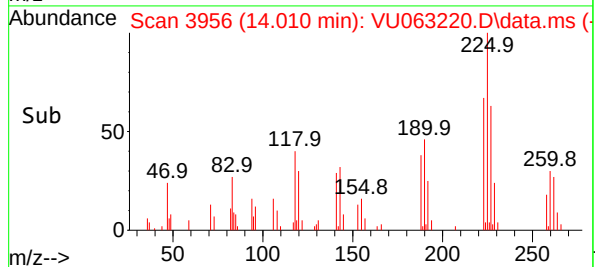
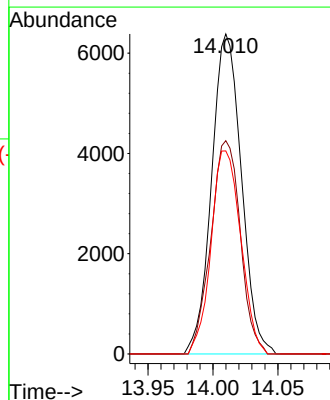
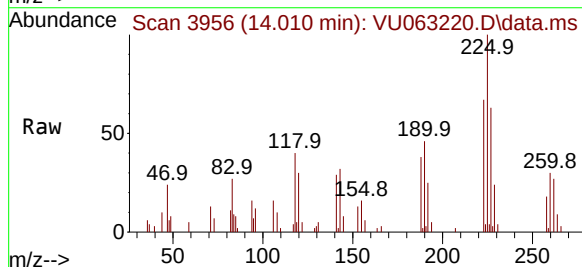
RT: 14.010 min Scan# 3956

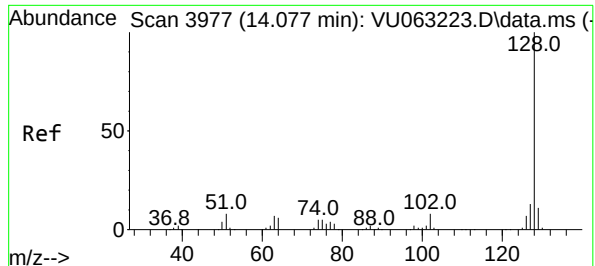
Delta R.T. -0.003 min

Lab File: VU063220.D

Acq: 10 Feb 2025 13:23

Tgt Ion:225	Resp:	10179
Ion Ratio	Lower	Upper
225	100	
223	65.9	49.5 74.3
227	63.2	51.0 76.4





#89

Naphthalene

Concen: 1.192 ug/l

RT: 14.090 min Scan# 3981

Delta R.T. 0.013 min

Lab File: VU063220.D

Acq: 10 Feb 2025 13:23

Instrument :

MSVOA_U

ClientSampleId :

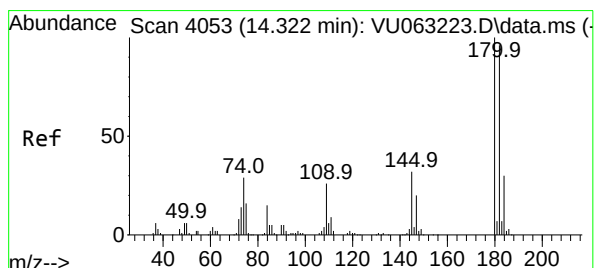
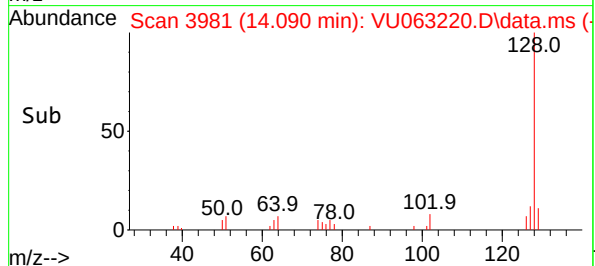
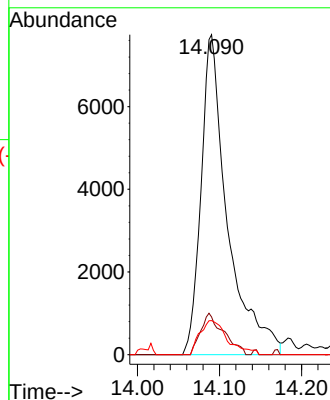
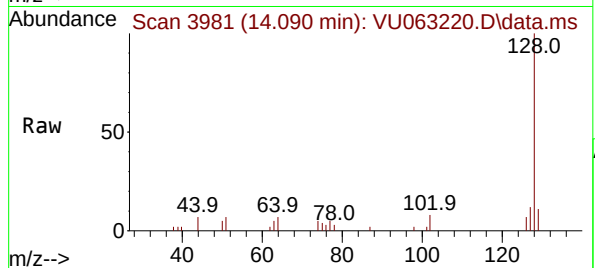
VSTDICC001

Tgt Ion:	128	Resp:	1727
Ion Ratio	Lower	Upper	
128	100		
127	11.3	10.6	16.0
129	11.3	8.6	13.0

Manual Integrations
APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#90

1,2,3-Trichlorobenzene

Concen: 0.894 ug/l

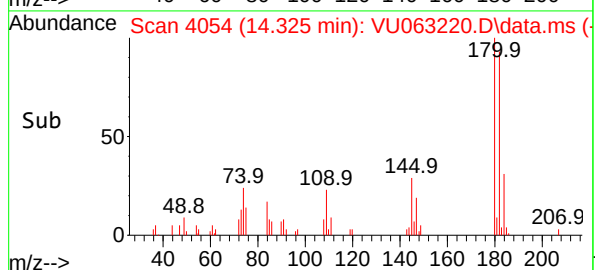
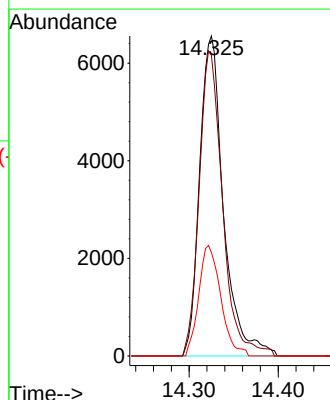
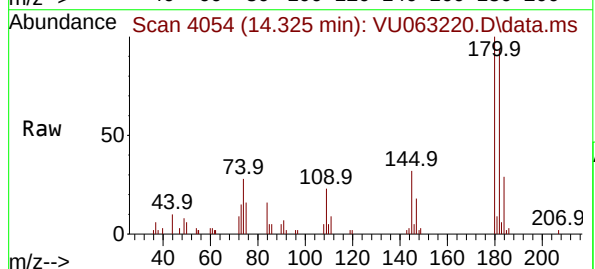
RT: 14.325 min Scan# 4054

Delta R.T. 0.003 min

Lab File: VU063220.D

Acq: 10 Feb 2025 13:23

Tgt Ion:	180	Resp:	12218
Ion Ratio	Lower	Upper	
180	100		
182	93.2	78.2	117.2
145	31.9	26.1	39.1



Data Path : Z:\voasrv\HPCHEM1\MSVOA_U\Data\VU021025\
 Data File : VU063221.D
 Acq On : 10 Feb 2025 13:58
 Operator : MD/SY
 Sample : VSTDICC002
 Misc : 25.0mL/MSVOA_U/WATER
 ALS Vial : 5 Sample Multiplier: 1

Instrument :
 MSVOA_U
 ClientSampleId :
 VSTDICC002

Manual Integrations
 APPROVED

Reviewed By :Amit Patel 02/12/2025
 Supervised By :Mahesh Dadoda 02/12/2025

Quant Time: Feb 11 03:58:44 2025
 Quant Method : Z:\voasrv\HPCHEM1\MSVOA_U\Method\524U021025DW.M
 Quant Title : METHOD 524.2 VOLATILES DRINKING WATER
 QLast Update : Tue Feb 11 03:56:39 2025
 Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	6.103	96	53430	1.000	ug/l	# 0.00
System Monitoring Compounds						
57) 4-Bromofluorobenzene	10.624	95	17627	1.000	ug/l	0.00
Spiked Amount 1.000			Recovery	=	100.000%	
68) 1,2-Dichlorobenzene-d4	12.184	152	18679	1.019	ug/l	0.00
Spiked Amount 1.000			Recovery	=	102.000%	
Target Compounds						
					Qvalue	
2) Dichlorodifluoromethane	1.377	85	35165	2.026	ug/l	97
3) Chloromethane	1.515	50	41607	2.081	ug/l	97
4) Vinyl Chloride	1.596	62	39263	1.985	ug/l	100
5) Bromomethane	1.821	94	13311	1.455	ug/l	99
6) Chloroethane	1.904	64	24932	2.001	ug/l	97
7) Trichlorofluoromethane	2.116	101	48274	2.060	ug/l	99
8) 1,1,2-Trichloro-1,2,2-...	2.563	101	27021	2.031	ug/l	98
9) 1,1-Dichloroethene	2.563	96	27058	1.996	ug/l	97
10) Iodomethane	2.705	142	41566	1.951	ug/l	100
11) Allyl Chloride	2.907	41	39456	2.026	ug/l	99
12) Acrylonitrile	3.316	53	12654	4.107	ug/l #	86
13) Acetone	2.618	43	23537	9.790	ug/l	93
14) Carbon Disulfide	2.776	76	94065	1.985	ug/l	98
15) Methylene Chloride	3.026	84	33474	1.999	ug/l	97
16) trans-1,2-Dichloroethene	3.338	96	30710	1.985	ug/l	99
17) 1,1-Dichloroethane	3.849	63	59018	2.024	ug/l	98
18) 2-Butanone	4.702	43	35904	9.245	ug/l	100
19) Cyclohexane	5.374	56	45197m	1.929	ug/l	
20) Methylcyclohexane	6.750	83	44636	1.921	ug/l	96
21) 2,2-Dichloropropane	4.647	77	44095	1.938	ug/l	99
22) cis-1,2-Dichloroethene	4.653	96	32738	1.958	ug/l	98
23) Diethyl Ether	2.364	59	22999	1.977	ug/l	98
24) tert-Butyl Alcohol	3.178	59	28594	18.780	ug/l #	86
25) Methyl tert-Butyl Ether	3.348	73	66015	1.950	ug/l	98
26) Bromochloromethane	4.959	128	14111	1.931	ug/l	96
27) Chloroform	5.075	83	58030	1.972	ug/l	97
28) 1,1,1-Trichloroethane	5.300	97	47900	2.009	ug/l	99
29) 1,1-Dichloropropene	5.512	75	43166	2.022	ug/l	99
30) Carbon Tetrachloride	5.509	117	40459	1.979	ug/l	99
31) Isopropyl Ether	3.975	45	81829	1.966	ug/l	97
32) Ethyl-t-butyl ether	4.483	59	73881	1.951	ug/l	97
33) Tert-Amyl methyl ether	5.927	73	62542	1.891	ug/l	97
34) Propionitrile	4.776	54	12222	10.151	ug/l #	92
35) Benzene	5.763	78	132758	2.022	ug/l	98
36) 1,2-Dichloroethane	5.782	62	38273	2.020	ug/l	100
37) Trichloroethene	6.531	130	31430	2.013	ug/l	98
38) 1,2-Dichloropropane	6.779	63	34066	1.983	ug/l	99
39) Methacrylonitrile	4.968	41	8407	1.955	ug/l	97
40) Methyl acrylate	4.856	55	16003m	2.038	ug/l	
41) Tetrahydrofuran	5.049	42	10378	4.106	ug/l #	88
42) 1-Chlorobutane	5.444	56	58462	2.001	ug/l	98
43) Dibromomethane	6.910	93	17367	1.996	ug/l	95
44) Bromodichloromethane	7.094	83	41213	2.035	ug/l	99

Data Path : Z:\voasrv\HPCHEM1\MSVOA_U\Data\VU021025\
 Data File : VU063221.D
 Acq On : 10 Feb 2025 13:58
 Operator : MD/SY
 Sample : VSTDICC002
 Misc : 25.0mL/MSVOA_U/WATER
 ALS Vial : 5 Sample Multiplier: 1

Instrument :
 MSVOA_U
 ClientSampleId :
 VSTDICC002

Manual Integrations
 APPROVED

Reviewed By :Amit Patel 02/12/2025
 Supervised By :Mahesh Dadoda 02/12/2025

Quant Time: Feb 11 03:58:44 2025
 Quant Method : Z:\voasrv\HPCHEM1\MSVOA_U\Method\524U021025DW.M
 Quant Title : METHOD 524.2 VOLATILES DRINKING WATER
 QLast Update : Tue Feb 11 03:56:39 2025
 Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
45) 4-Methyl-2-Pentanone	7.782	43	88945	9.751	ug/l	98
46) t-1,4-Dichloro-2-butene	10.820	75	18852m	4.176	ug/l	
47) Methyl methacrylate	6.955	69	27411	3.740	ug/l	95
48) Ethyl methacrylate	8.325	69	26103	1.897	ug/l	96
49) Toluene	7.959	92	75472	1.999	ug/l	100
50) t-1,3-Dichloropropene	8.203	75	36608	1.974	ug/l	98
51) cis-1,3-Dichloropropene	7.599	75	45949	2.006	ug/l	97
52) 1,1,2-Trichloroethane	8.390	97	23377	1.993	ug/l	98
53) 1,3-Dichloropropane	8.566	76	41970	2.015	ug/l	100
54) 2-Hexanone	8.679	43	61467	9.874	ug/l	97
55) Dibromochloromethane	8.798	129	26319	1.950	ug/l	98
56) 1,2-Dibromoethane	8.914	107	21639	1.967	ug/l	100
58) Tetrachloroethene	8.544	164	25204	1.959	ug/l	98
59) Chlorobenzene	9.438	112	79653	1.999	ug/l	99
60) 1,1,1,2-Tetrachloroethane	9.525	131	28159	1.966	ug/l	98
61) Pentachloroethane	11.415	117	26815	2.096	ug/l	95
62) Hexachloroethane	12.463	117	22824	2.017	ug/l	99
63) Ethyl Benzene	9.560	91	133142	1.938	ug/l	99
64) m/p-Xylenes	9.685	106	101491	3.954	ug/l	98
65) o-Xylene	10.090	106	50127	1.995	ug/l	97
66) Styrene	10.106	104	77021	1.926	ug/l	100
67) Bromoform	10.283	173	15177	1.981	ug/l	97
69) Isopropylbenzene	10.476	105	116075	1.965	ug/l	100
70) 1,1,2,2-Tetrachloroethane	10.772	83	32740	2.071	ug/l	99
71) 1,2,3-Trichloropropane	10.814	75	26243m	2.189	ug/l	
72) Bromobenzene	10.775	156	31558	1.983	ug/l	95
73) n-propylbenzene	10.897	120	33538	1.983	ug/l	96
74) 2-Chlorotoluene	10.978	126	31255	2.005	ug/l	97
75) 1,3,5-Trimethylbenzene	11.078	105	109465	2.000	ug/l	99
76) 4-Chlorotoluene	11.090	126	31781	1.988	ug/l	98
77) tert-Butylbenzene	11.409	119	110066	1.988	ug/l	100
78) 1,2,4-Trimethylbenzene	11.460	105	107777	1.985	ug/l	99
79) sec-Butylbenzene	11.634	105	140803	1.998	ug/l	100
80) Nitrobenzene	13.219	77	3216m	10.179	ug/l	
81) p-Isopropyltoluene	11.785	119	110370	1.984	ug/l	100
82) 1,3-Dichlorobenzene	11.737	146	62914	2.038	ug/l	99
83) 1,4-Dichlorobenzene	11.827	146	62036	2.055	ug/l	99
84) n-Butylbenzene	12.200	91	96950	1.933	ug/l	99
85) 1,2-Dichlorobenzene	12.203	146	61011	2.057	ug/l	98
86) 1,2-Dibromo-3-Chloropr...	12.994	75	4203	1.894	ug/l	98
87) 1,2,4-Trichlorobenzene	13.836	180	27020	1.867	ug/l	97
88) Hexachlorobutadiene	14.010	225	21652	2.094	ug/l	99
89) Naphthalene	14.084	128	40458	1.891	ug/l	98
90) 1,2,3-Trichlorobenzene	14.322	180	25501	1.801	ug/l	99

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

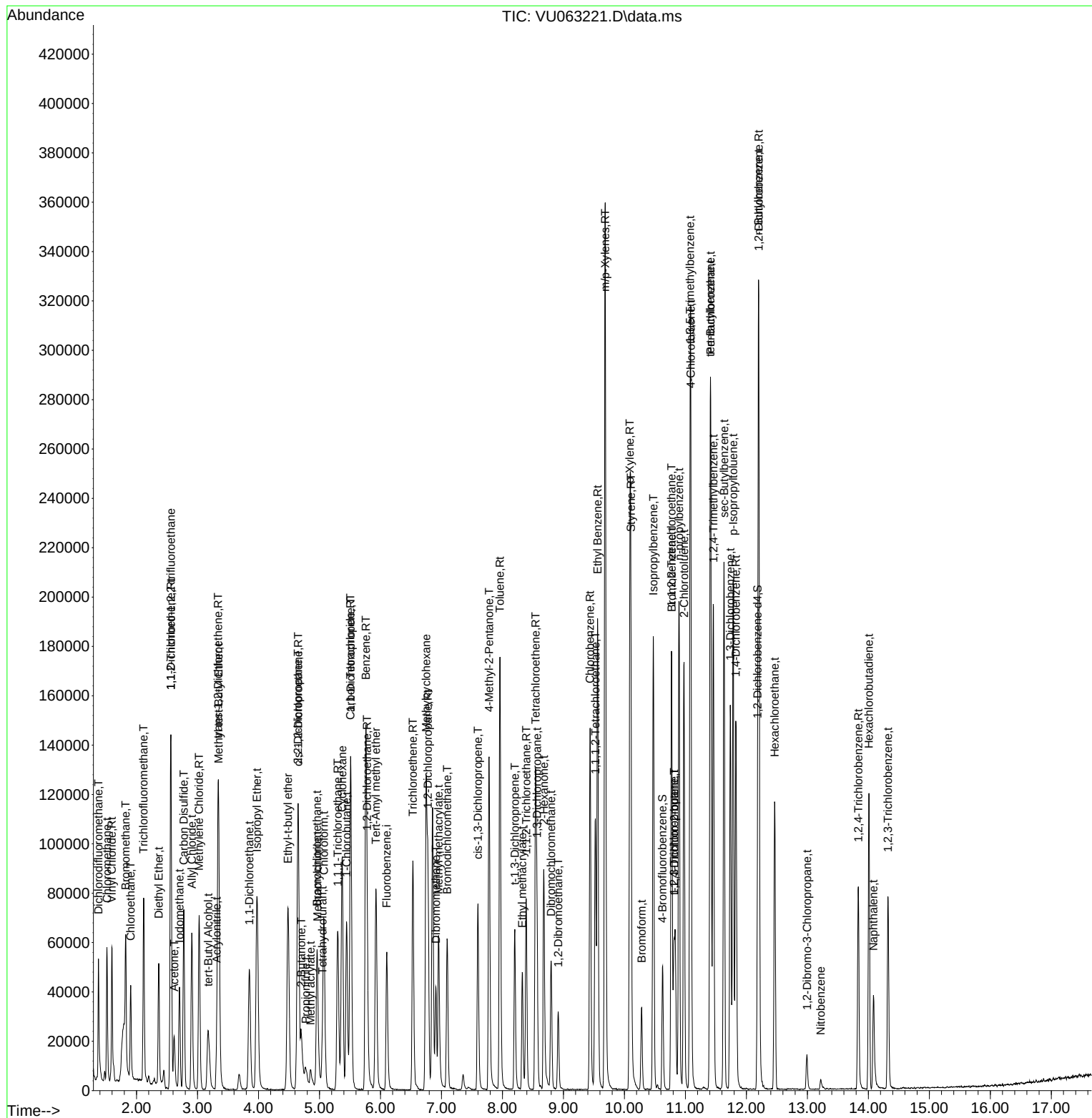
Data Path : Z:\voasrv\HPCHEM1\MSVOA_U\Data\VU021025\
Data File : VU063221.D
Acq On : 10 Feb 2025 13:58
Operator : MD/SY
Sample : VSTDIC002
Misc : 25.0mL/MSVOA_U/WATER
ALS Vial : 5 Sample Multiplier: 1

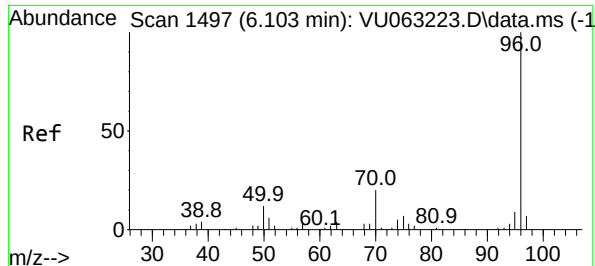
Instrument :
MSVOA_U
ClientSampleId :
VSTDICC002

Manual Integrations APPROVED

Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025

Quant Time: Feb 11 03:58:44 2025
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_U\Method\524U021025DW.M
Quant Title : METHOD 524.2 VOLATILES DRINKING WATER
QLast Update : Tue Feb 11 03:56:39 2025
Response via : Initial Calibration





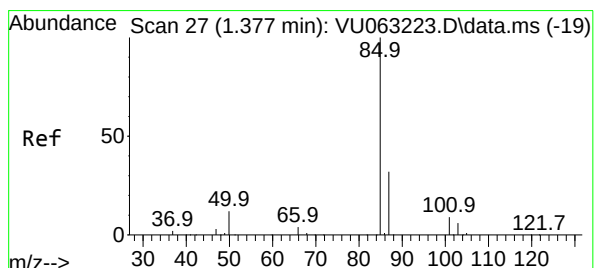
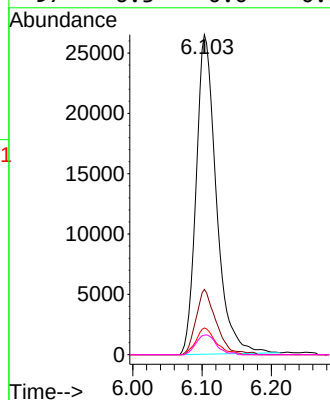
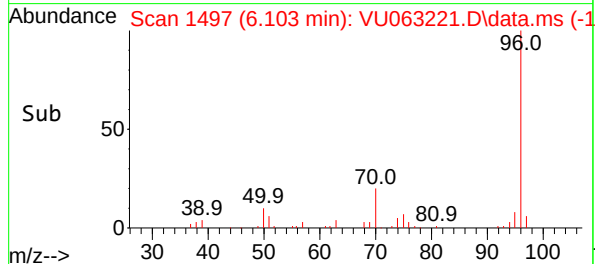
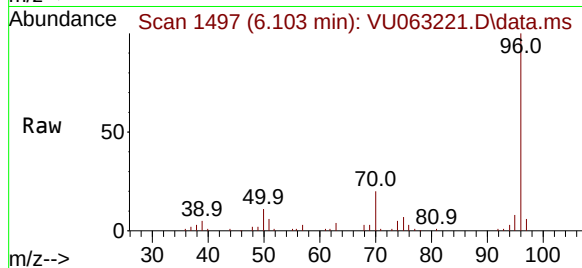
#1
Fluorobenzene
Concen: 1.000 ug/l
RT: 6.103 min Scan# 1497
Delta R.T. 0.000 min
Lab File: VU063221.D
Acq: 10 Feb 2025 13:58

Instrument :
MSVOA_U
ClientSampleId :
VSTDICC002

Tgt Ion: 96 Resp: 53430
Ion Ratio Lower Upper
96 100
70 19.4 15.6 23.4
95 8.3 7.3 10.9
97 6.3 0.0 0.0#

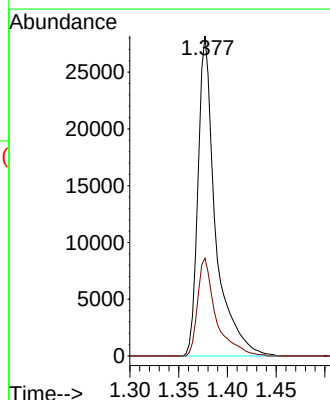
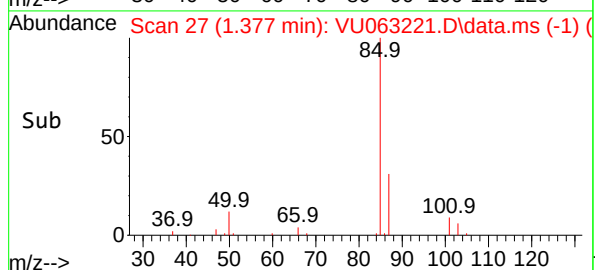
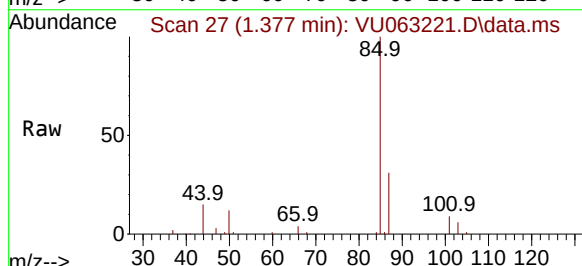
Manual Integrations
APPROVED

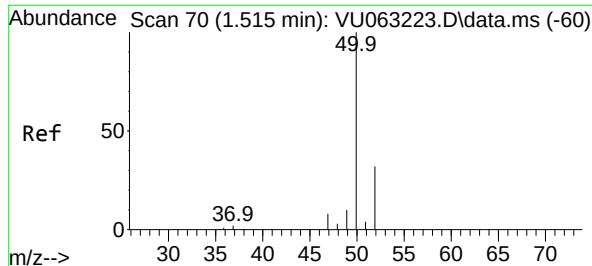
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#2
Dichlorodifluoromethane
Concen: 2.026 ug/l
RT: 1.377 min Scan# 27
Delta R.T. 0.000 min
Lab File: VU063221.D
Acq: 10 Feb 2025 13:58

Tgt Ion: 85 Resp: 35165
Ion Ratio Lower Upper
85 100
87 30.5 16.0 48.0





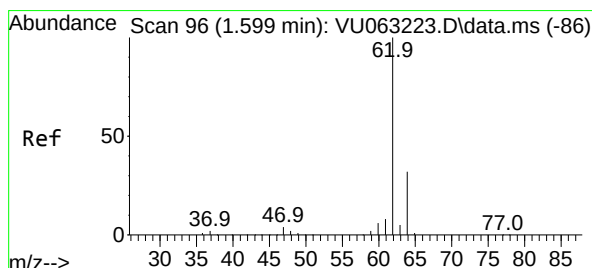
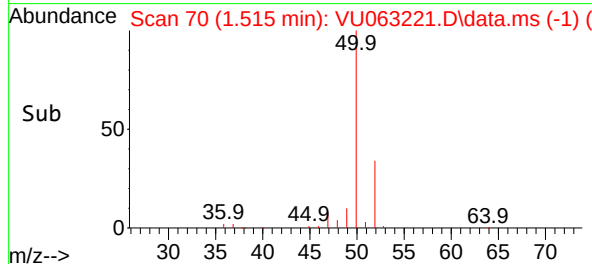
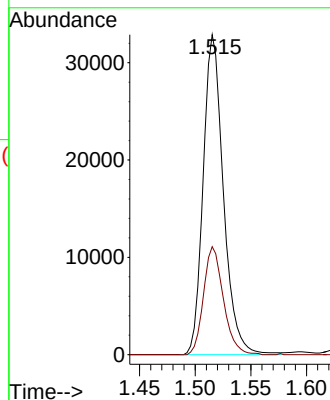
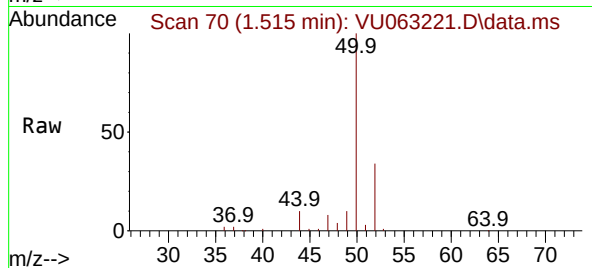
#3
Chloromethane
Concen: 2.081 ug/l
RT: 1.515 min Scan# 70
Delta R.T. 0.000 min
Lab File: VU063221.D
Acq: 10 Feb 2025 13:58

Instrument :
MSVOA_U
ClientSampleId :
VSTDICC002

Tgt Ion: 50 Resp: 4160
Ion Ratio Lower Upper
50 100
52 33.8 25.8 38.8

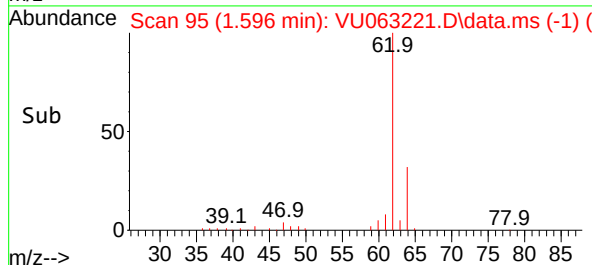
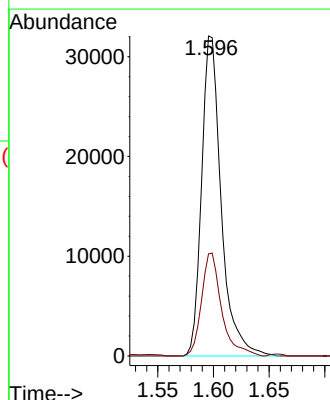
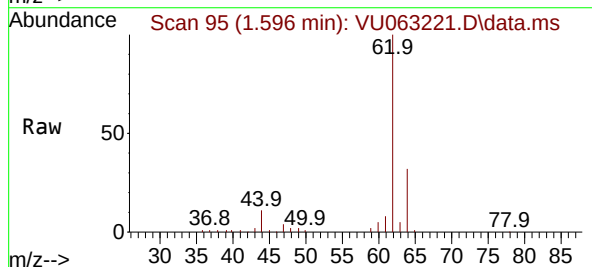
Manual Integrations
APPROVED

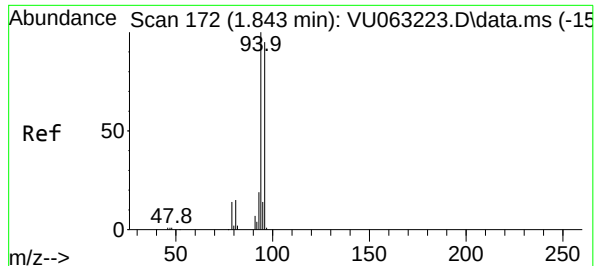
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#4
Vinyl Chloride
Concen: 1.985 ug/l
RT: 1.596 min Scan# 95
Delta R.T. -0.003 min
Lab File: VU063221.D
Acq: 10 Feb 2025 13:58

Tgt Ion: 62 Resp: 39263
Ion Ratio Lower Upper
62 100
64 31.9 25.4 38.0





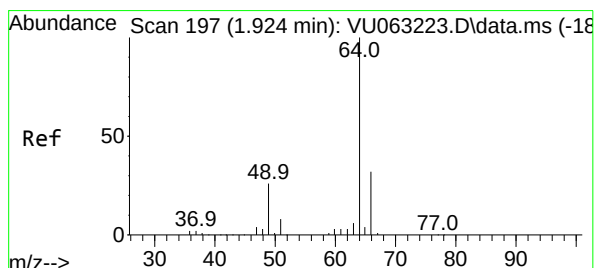
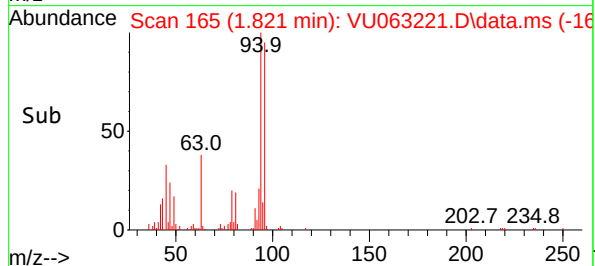
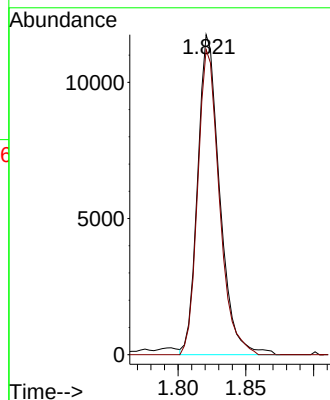
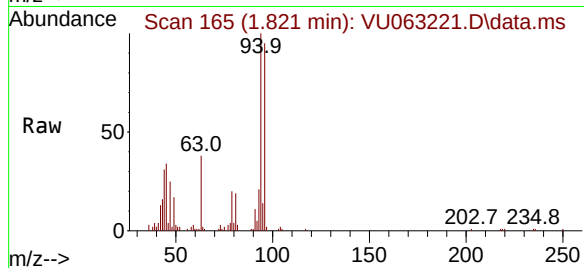
#5
Bromomethane
Concen: 1.455 ug/l
RT: 1.821 min Scan# 10
Delta R.T. -0.022 min
Lab File: VU063221.D
Acq: 10 Feb 2025 13:58

Instrument :
MSVOA_U
ClientSampleId :
VSTDICC002

Tgt Ion: 94 Resp: 1331
Ion Ratio Lower Upper
94 100
96 95.3 75.7 113.5

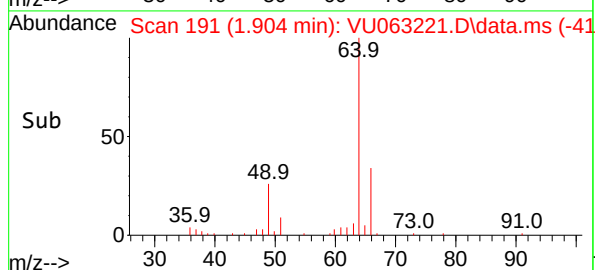
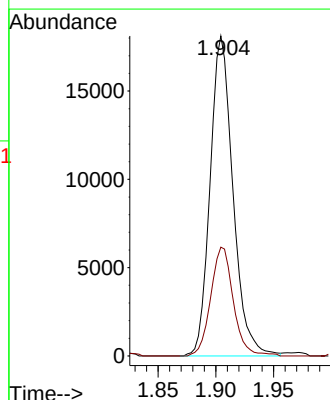
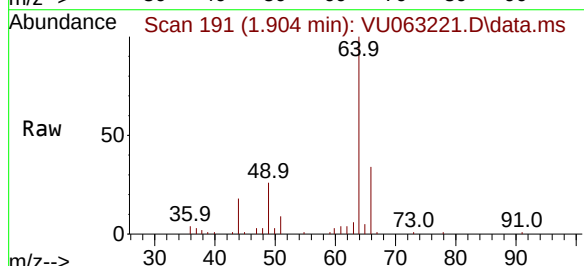
Manual Integrations
APPROVED

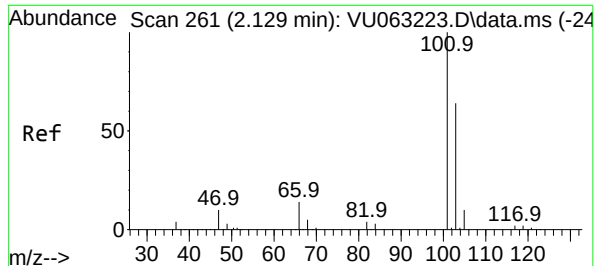
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#6
Chloroethane
Concen: 2.001 ug/l
RT: 1.904 min Scan# 191
Delta R.T. -0.019 min
Lab File: VU063221.D
Acq: 10 Feb 2025 13:58

Tgt Ion: 64 Resp: 24932
Ion Ratio Lower Upper
64 100
66 34.0 25.8 38.8





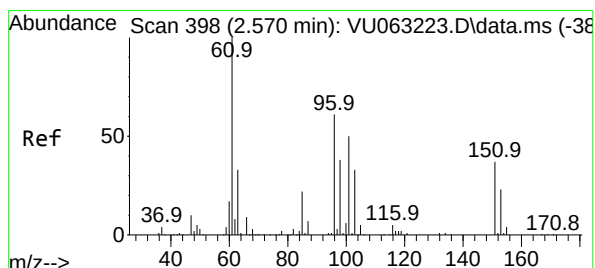
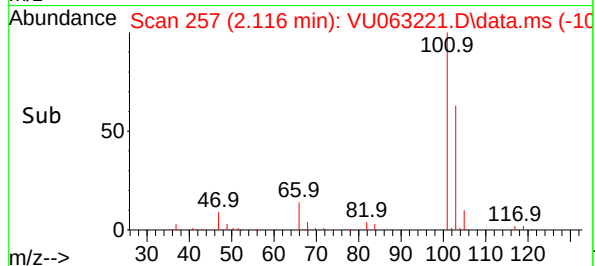
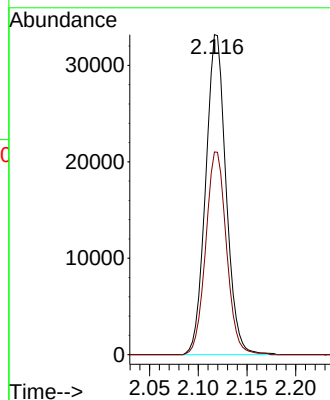
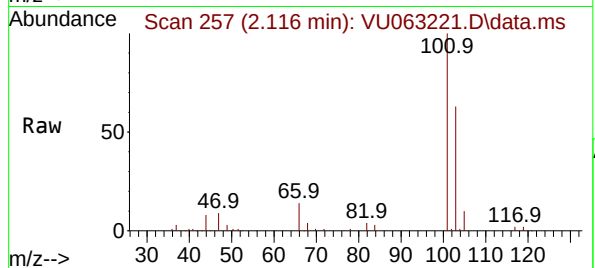
#7
Trichlorofluoromethane
Concen: 2.060 ug/l
RT: 2.116 min Scan# 21
Delta R.T. -0.013 min
Lab File: VU063221.D
Acq: 10 Feb 2025 13:58

Instrument :
MSVOA_U
ClientSampleId :
VSTDICC002

Tgt Ion:101 Resp: 48274
Ion Ratio Lower Upper
101 100
103 63.3 51.4 77.2

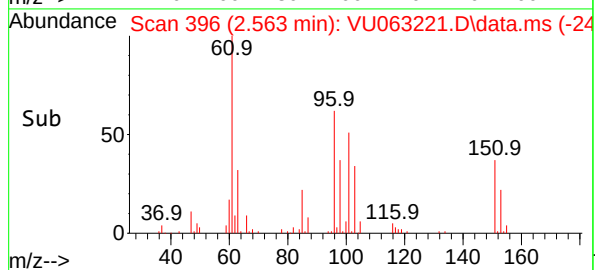
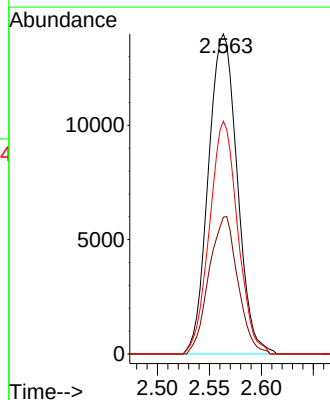
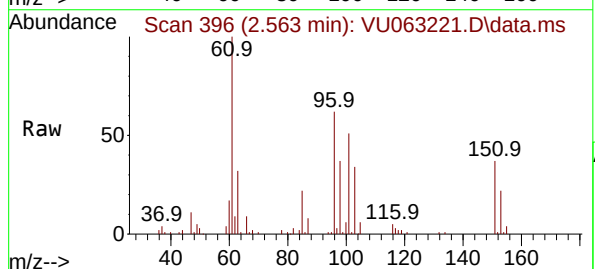
Manual Integrations
APPROVED

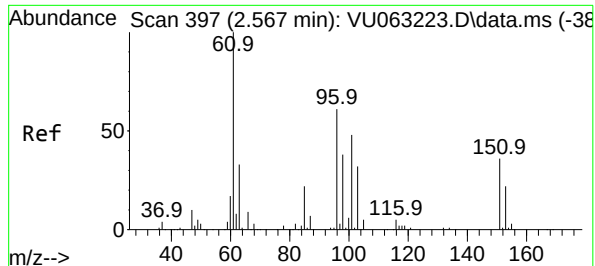
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#8
1,1,2-Trichloro-1,2,2-trifluoroethane
Concen: 2.031 ug/l
RT: 2.563 min Scan# 396
Delta R.T. -0.006 min
Lab File: VU063221.D
Acq: 10 Feb 2025 13:58

Tgt Ion:101 Resp: 27021
Ion Ratio Lower Upper
101 100
85 42.9 35.4 53.0
151 71.2 58.5 87.7





#9

1,1-Dichloroethene

Concen: 1.996 ug/l

RT: 2.563 min Scan# 396

Delta R.T. -0.003 min

Lab File: VU063221.D

Acq: 10 Feb 2025 13:58

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC002

Tgt Ion: 96 Resp: 2705

Ion Ratio Lower Upper

96 100

61 160.9 0.0 492.9

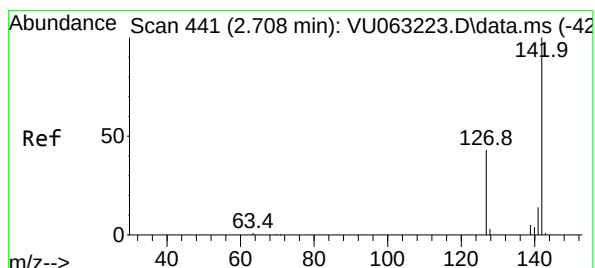
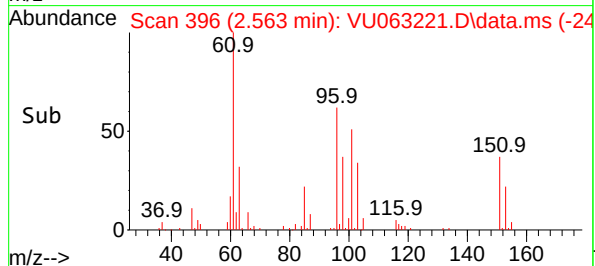
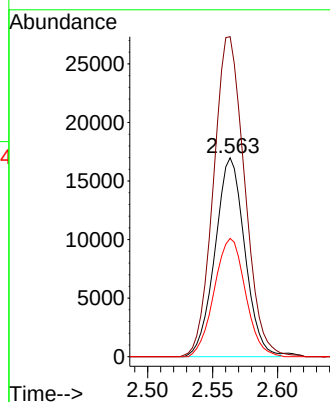
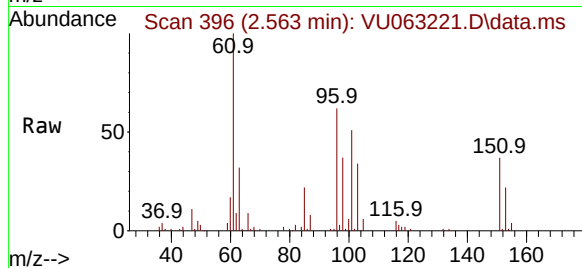
98 59.4 0.0 124.0

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#10

Iodomethane

Concen: 1.951 ug/l

RT: 2.705 min Scan# 440

Delta R.T. -0.003 min

Lab File: VU063221.D

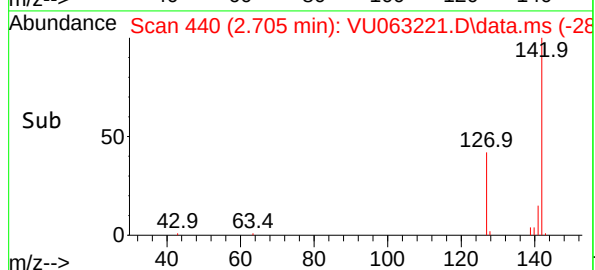
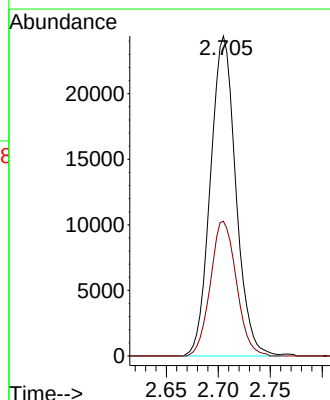
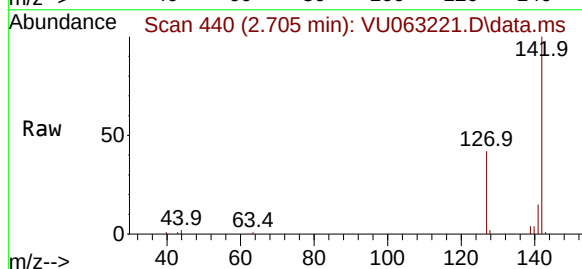
Acq: 10 Feb 2025 13:58

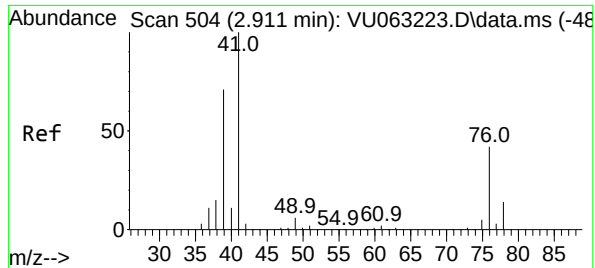
Tgt Ion:142 Resp: 41566

Ion Ratio Lower Upper

142 100

127 43.1 34.5 51.7





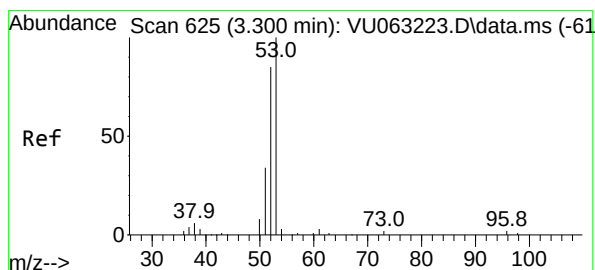
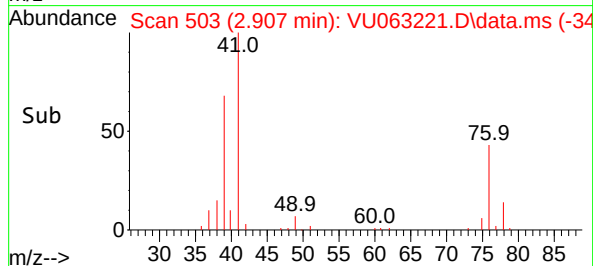
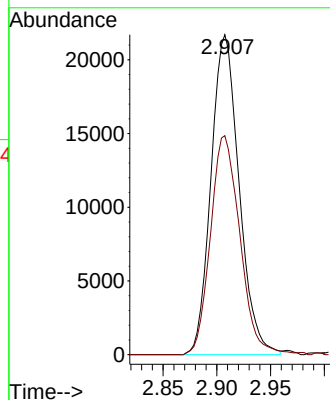
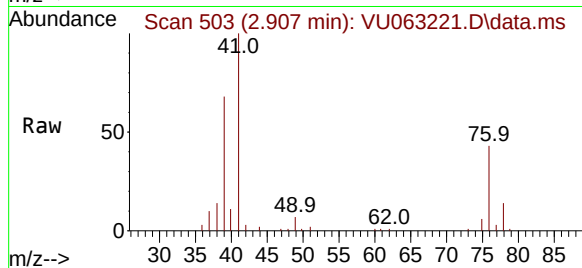
#11
Allyl Chloride
Concen: 2.026 ug/l
RT: 2.907 min Scan# 504
Delta R.T. -0.003 min
Lab File: VU063221.D
Acq: 10 Feb 2025 13:58

Instrument :
MSVOA_U
ClientSampleId :
VSTDICC002

Tgt Ion: 41 Resp: 39450
Ion Ratio Lower Upper
41 100
39 71.6 57.9 86.9

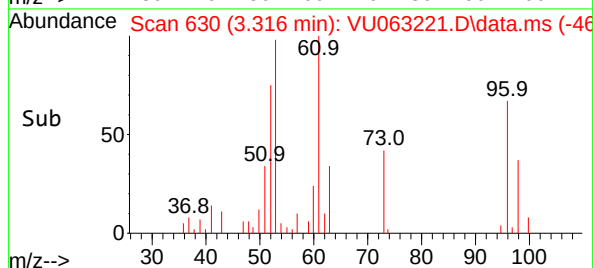
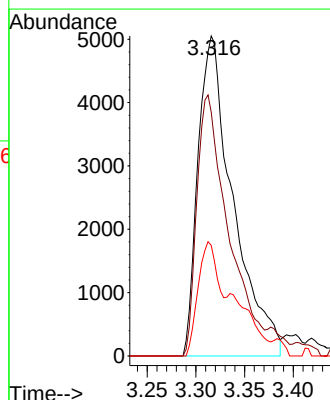
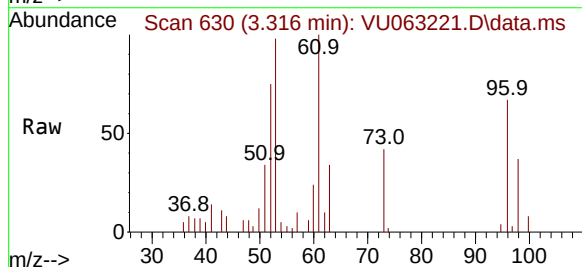
Manual Integrations
APPROVED

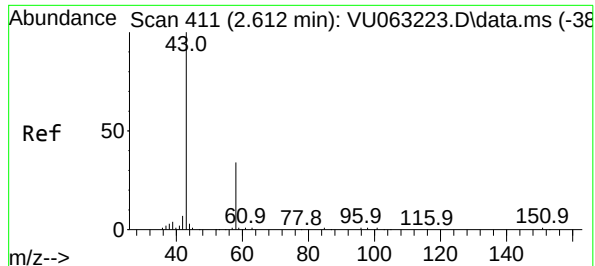
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#12
Acrylonitrile
Concen: 4.107 ug/l
RT: 3.316 min Scan# 630
Delta R.T. 0.016 min
Lab File: VU063221.D
Acq: 10 Feb 2025 13:58

Tgt Ion: 53 Resp: 12654
Ion Ratio Lower Upper
53 100
52 73.3 64.2 96.2
51 22.6 30.8 46.2#





#13

Acetone

Concen: 9.790 ug/l

RT: 2.618 min Scan# 411

Delta R.T. 0.006 min

Lab File: VU063221.D

Acq: 10 Feb 2025 13:58

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC002

Tgt Ion: 43 Resp: 2353

Ion Ratio Lower Upper

43 100

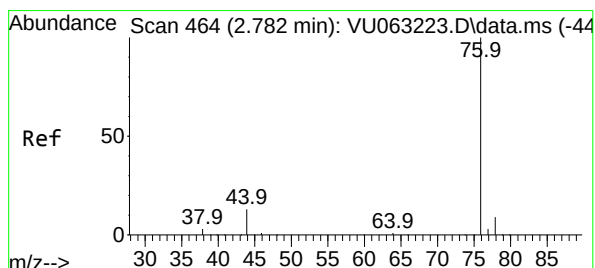
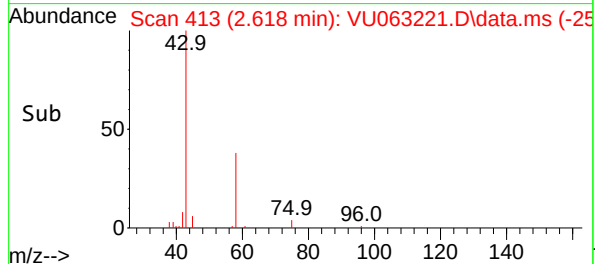
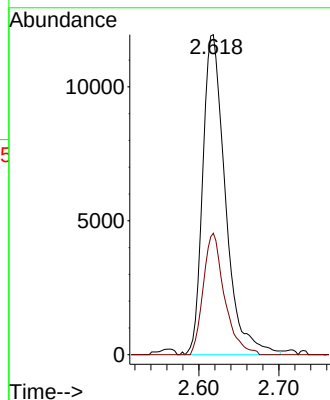
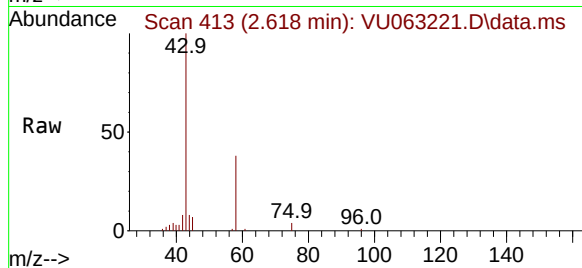
58 38.0 27.4 41.0

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#14

Carbon Disulfide

Concen: 1.985 ug/l

RT: 2.776 min Scan# 462

Delta R.T. -0.006 min

Lab File: VU063221.D

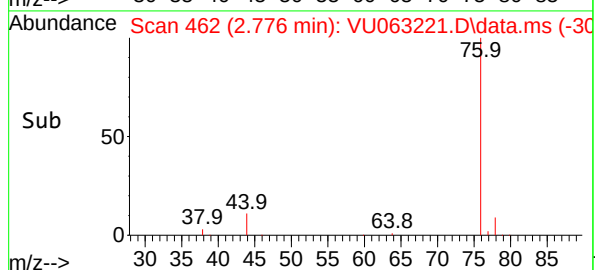
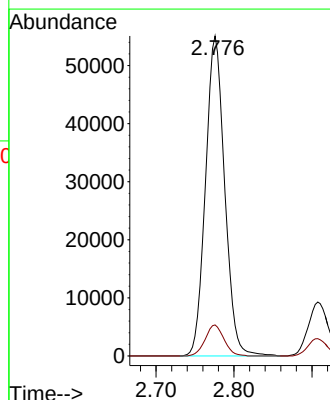
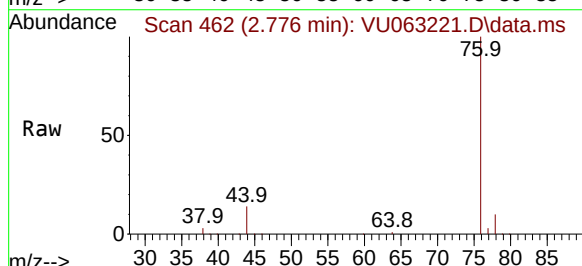
Acq: 10 Feb 2025 13:58

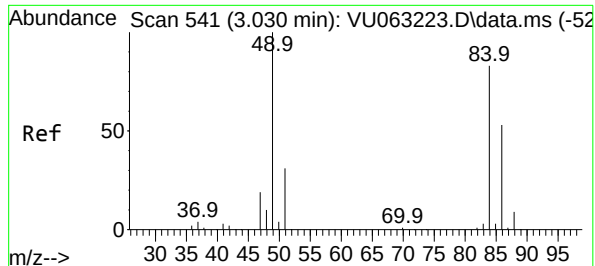
Tgt Ion: 76 Resp: 94065

Ion Ratio Lower Upper

76 100

78 9.7 7.2 10.8





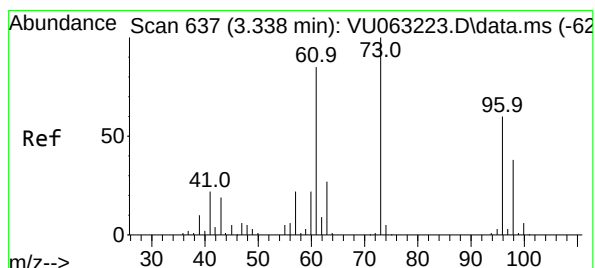
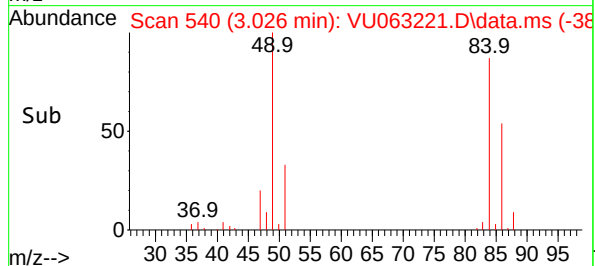
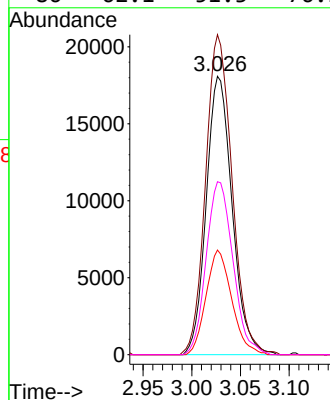
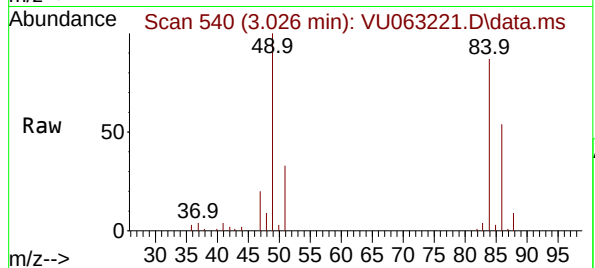
#15
Methylene Chloride
Concen: 1.999 ug/l
RT: 3.026 min Scan# 541
Delta R.T. -0.003 min
Lab File: VU063221.D
Acq: 10 Feb 2025 13:58

Instrument :
MSVOA_U
ClientSampleId :
VSTDICC002

Tgt Ion: 84 Resp: 33474
Ion Ratio Lower Upper
84 100
49 114.9 96.4 144.6
51 37.6 0.0 74.8
86 62.1 51.3 76.9

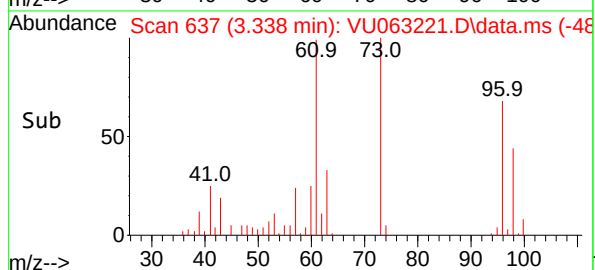
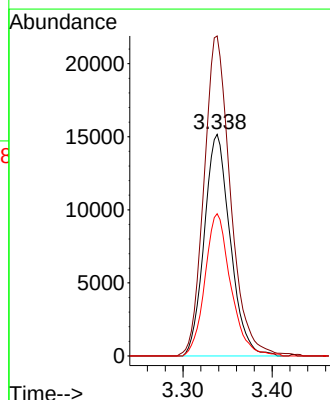
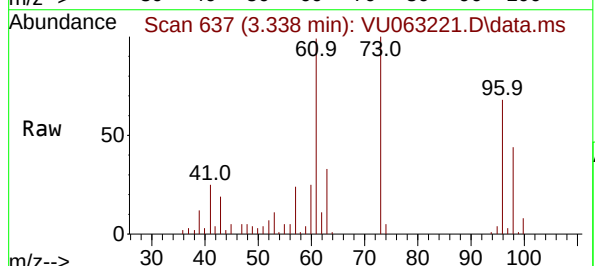
Manual Integrations
APPROVED

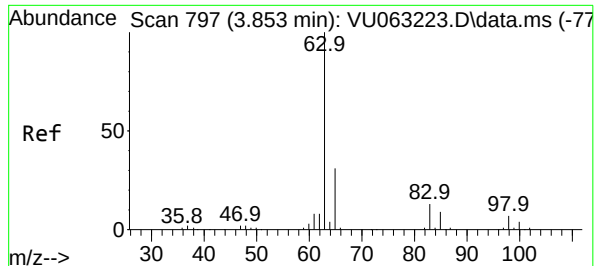
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#16
trans-1,2-Dichloroethene
Concen: 1.985 ug/l
RT: 3.338 min Scan# 637
Delta R.T. 0.000 min
Lab File: VU063221.D
Acq: 10 Feb 2025 13:58

Tgt Ion: 96 Resp: 30710
Ion Ratio Lower Upper
96 100
61 143.5 113.4 170.2
98 64.2 51.2 76.8





#17

1,1-Dichloroethane

Concen: 2.024 ug/l

RT: 3.849 min Scan# 797

Delta R.T. -0.003 min

Lab File: VU063221.D

Acq: 10 Feb 2025 13:58

Instrument :

MSVOA_U

ClientSampleId :

VSTDICC002

Tgt Ion: 63 Resp: 59018

Ion Ratio Lower Upper

63 100

98 5.8 3.3 9.9

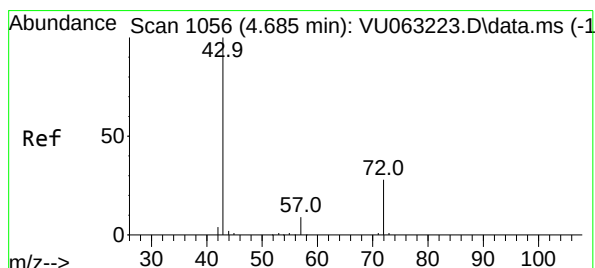
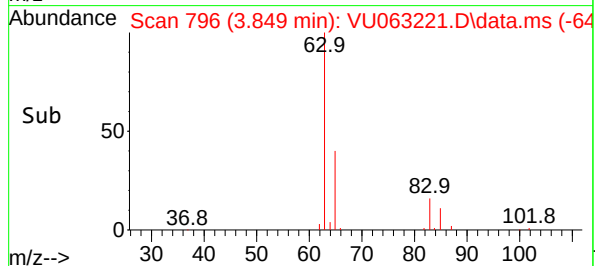
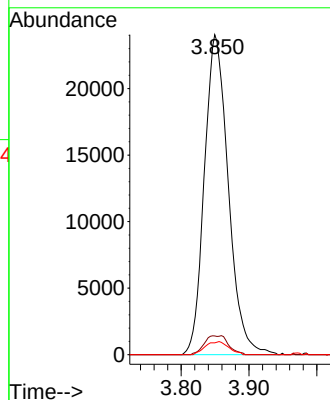
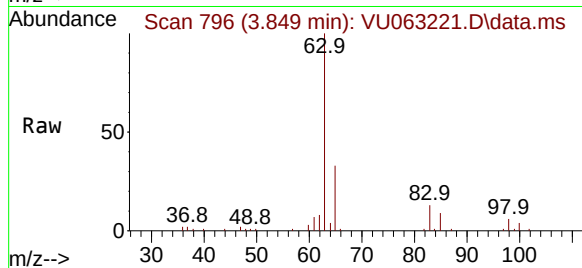
100 3.7 2.1 6.2

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#18

2-Butanone

Concen: 9.245 ug/l

RT: 4.702 min Scan# 1061

Delta R.T. 0.016 min

Lab File: VU063221.D

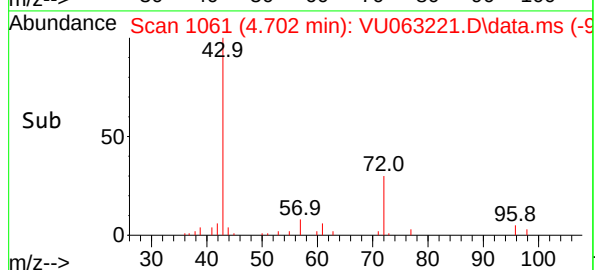
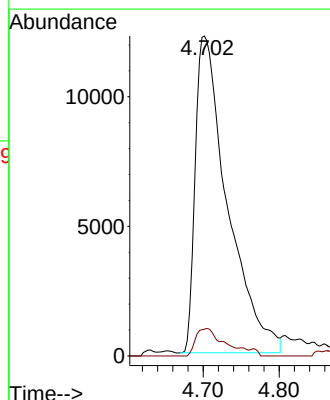
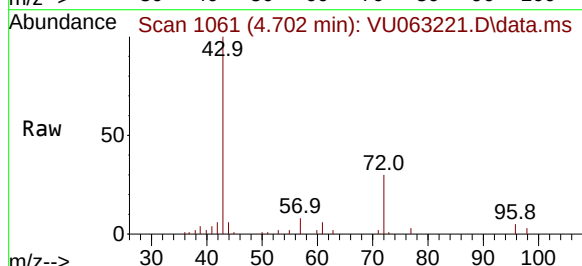
Acq: 10 Feb 2025 13:58

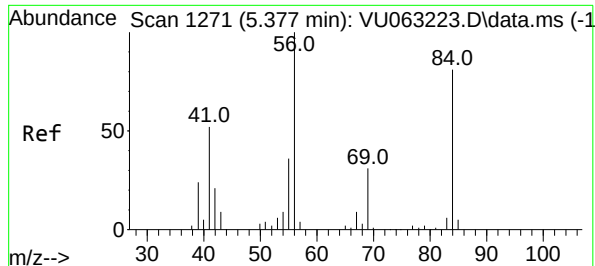
Tgt Ion: 43 Resp: 35904

Ion Ratio Lower Upper

43 100

57 8.5 0.0 17.0





#19

Cyclohexane

Concen: 1.929 ug/l m

RT: 5.374 min Scan# 1

Delta R.T. -0.003 min

Lab File: VU063221.D

Acq: 10 Feb 2025 13:58

Instrument :

MSVOA_U

ClientSampleId :

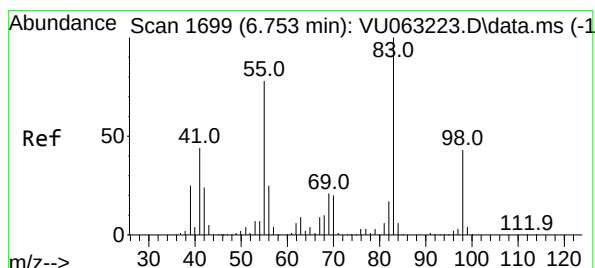
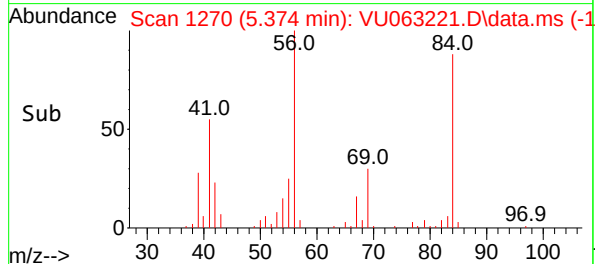
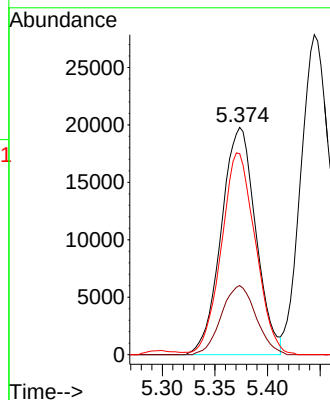
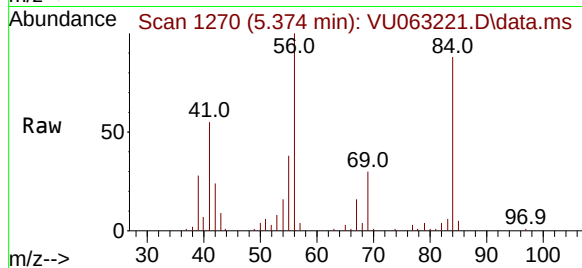
VSTDICC002

Tgt Ion:	56	Resp:	4519
Ion	Ratio	Lower	Upper
56	100		
69	30.4	24.5	36.7
84	86.2	65.2	97.8

Manual Integrations
APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#20

Methylcyclohexane

Concen: 1.921 ug/l

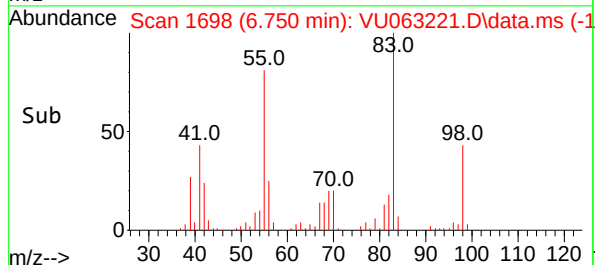
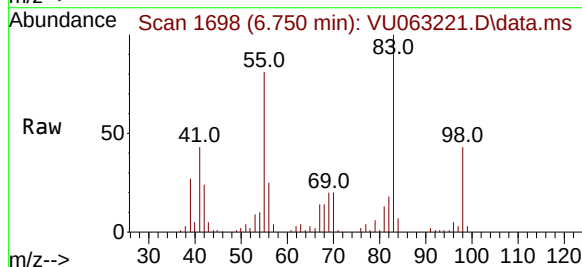
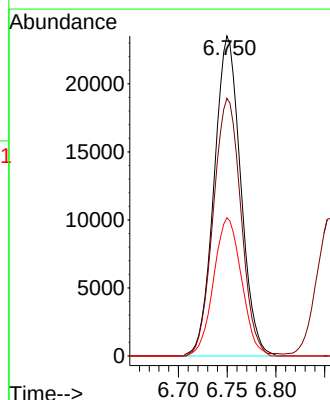
RT: 6.750 min Scan# 1698

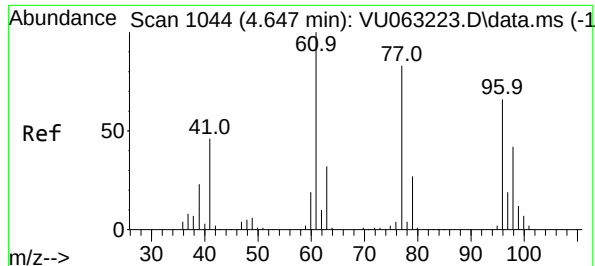
Delta R.T. -0.003 min

Lab File: VU063221.D

Acq: 10 Feb 2025 13:58

Tgt Ion:	83	Resp:	44636
Ion	Ratio	Lower	Upper
83	100		
55	82.9	63.1	94.7
98	45.2	35.2	52.8





#21

2,2-Dichloropropane

Concen: 1.938 ug/l

RT: 4.647 min Scan# 1044

Delta R.T. 0.000 min

Lab File: VU063221.D

Acq: 10 Feb 2025 13:58

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC002

Tgt Ion: 77 Resp: 4409

Ion Ratio Lower Upper

77 100

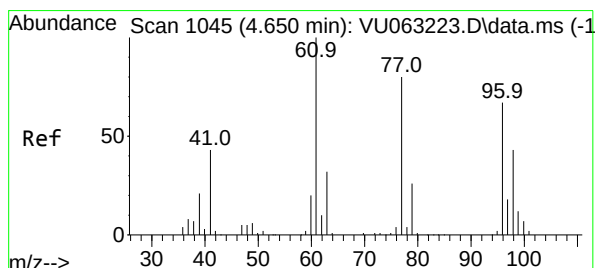
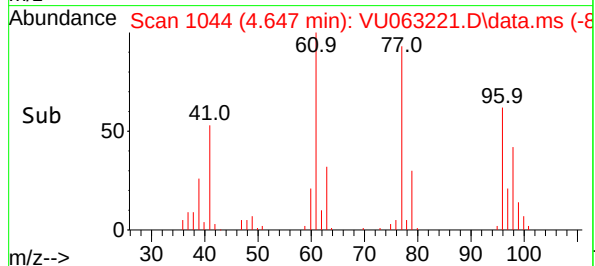
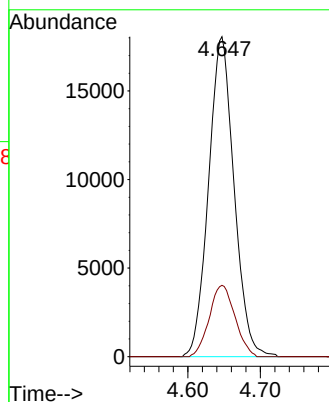
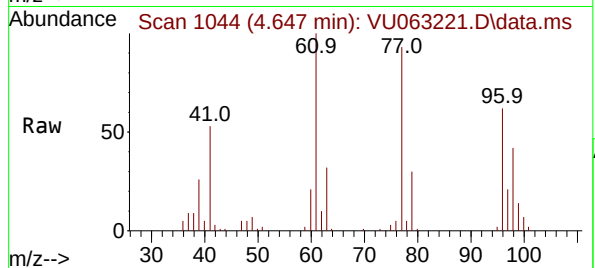
97 22.5 18.5 27.7

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#22

cis-1,2-Dichloroethene

Concen: 1.958 ug/l

RT: 4.653 min Scan# 1046

Delta R.T. 0.003 min

Lab File: VU063221.D

Acq: 10 Feb 2025 13:58

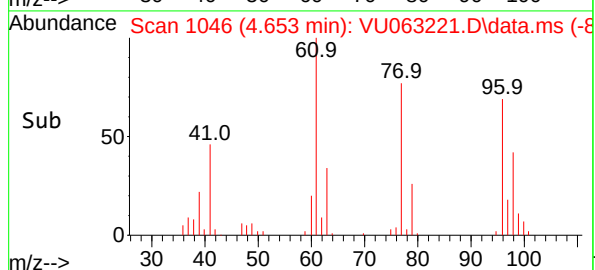
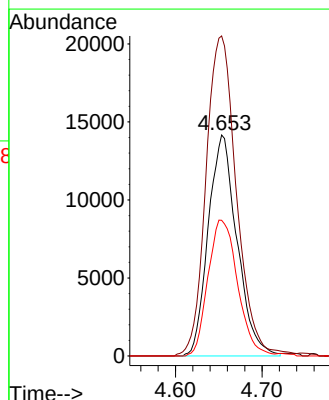
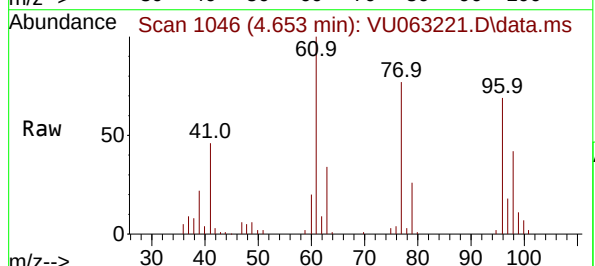
Tgt Ion: 96 Resp: 32738

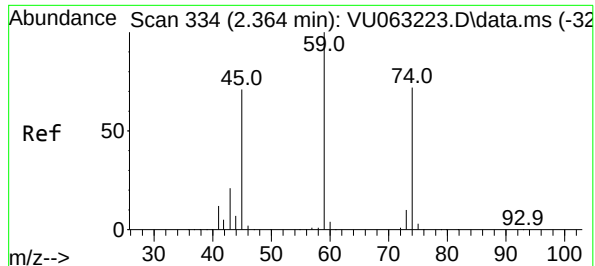
Ion Ratio Lower Upper

96 100

61 153.1 0.0 373.3

98 63.1 31.9 95.9





#23

Diethyl Ether

Concen: 1.977 ug/l

RT: 2.364 min Scan# 31

Delta R.T. 0.000 min

Lab File: VU063221.D

Acq: 10 Feb 2025 13:58

Instrument :

MSVOA_U

ClientSampleId :

VSTDICC002

Tgt Ion: 59 Resp: 2299

Ion Ratio Lower Upper

59 100

45 69.8 57.8 86.6

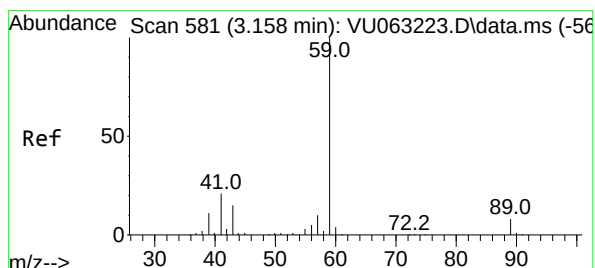
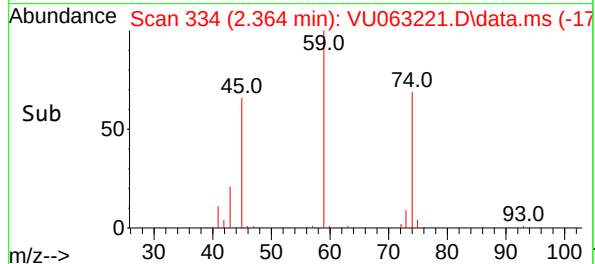
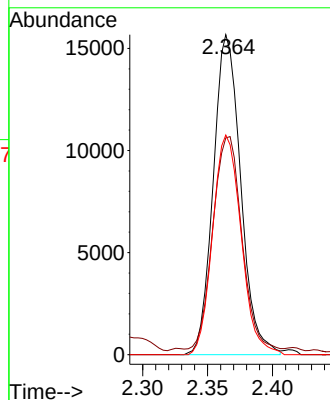
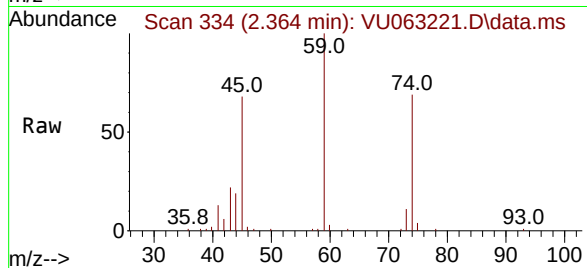
74 71.4 57.7 86.5

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#24

tert-Butyl Alcohol

Concen: 18.780 ug/l

RT: 3.178 min Scan# 587

Delta R.T. 0.019 min

Lab File: VU063221.D

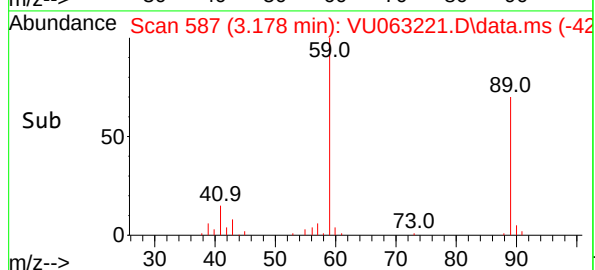
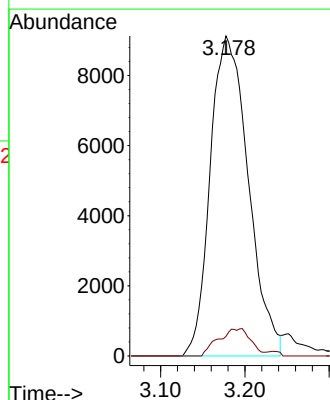
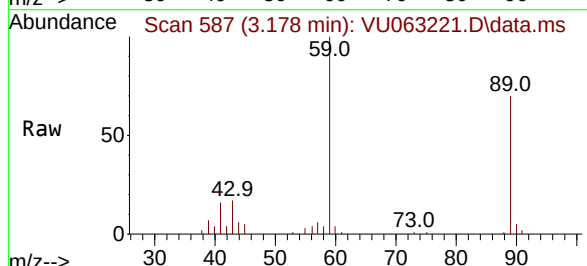
Acq: 10 Feb 2025 13:58

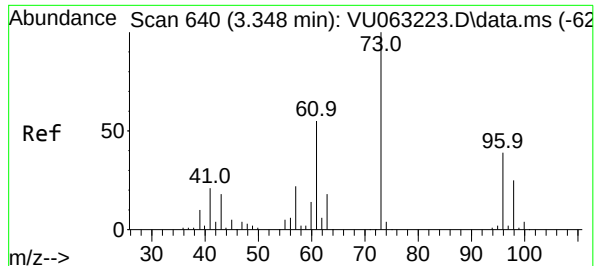
Tgt Ion: 59 Resp: 28594

Ion Ratio Lower Upper

59 100

57 4.4 7.5 11.3#





#25

Methyl tert-Butyl Ether

Concen: 1.950 ug/l

RT: 3.348 min Scan# 640

Delta R.T. 0.000 min

Lab File: VU063221.D

Acq: 10 Feb 2025 13:58

Instrument :

MSVOA_U

Client Sample Id :

VSTDIC002

Tgt Ion: 73 Resp: 6601

Ion Ratio Lower Upper

73 100

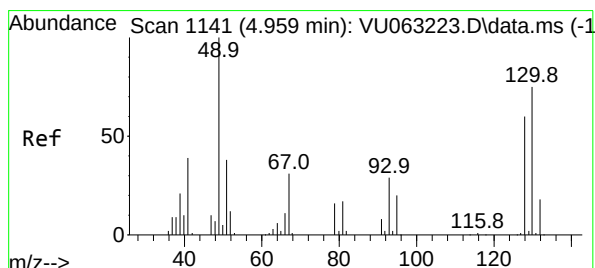
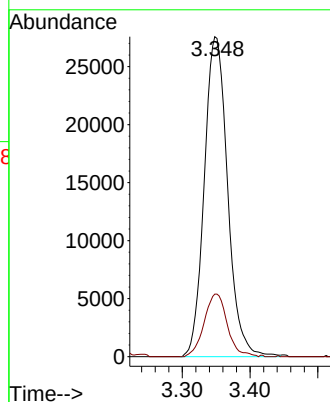
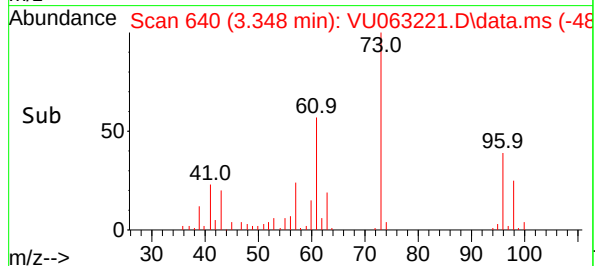
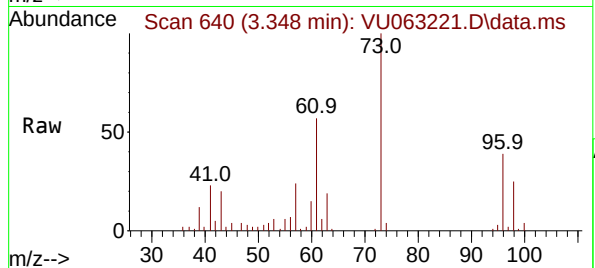
43 19.4 14.9 22.3

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#26

Bromochloromethane

Concen: 1.931 ug/l

RT: 4.959 min Scan# 1141

Delta R.T. 0.000 min

Lab File: VU063221.D

Acq: 10 Feb 2025 13:58

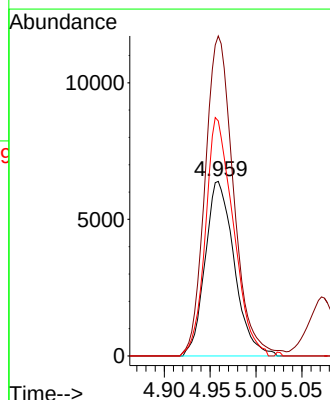
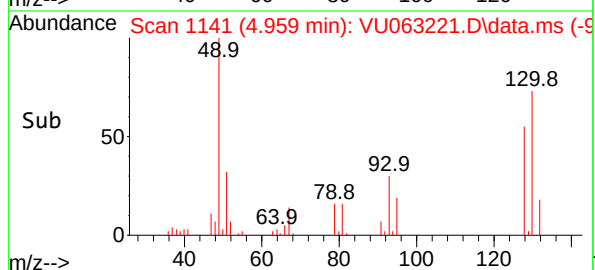
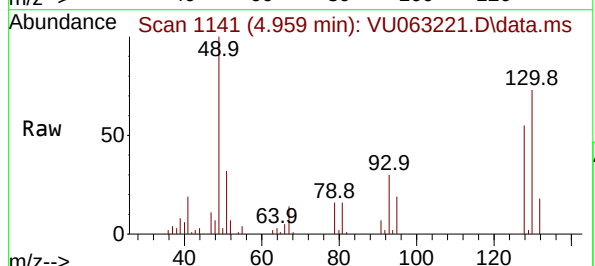
Tgt Ion:128 Resp: 14111

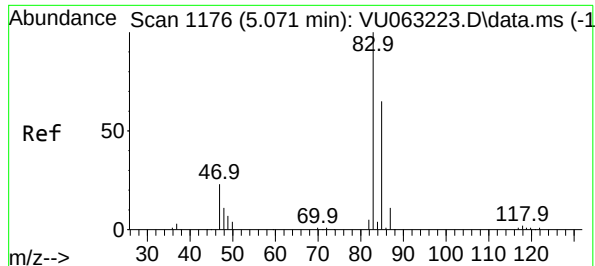
Ion Ratio Lower Upper

128 100

49 179.3 0.0 343.4

130 130.6 102.9 154.3





#27

Chloroform

Concen: 1.972 ug/l

RT: 5.075 min Scan# 1176

Delta R.T. 0.003 min

Lab File: VU063221.D

Acq: 10 Feb 2025 13:58

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC002

Tgt Ion: 83 Resp: 5803

Ion Ratio Lower Upper

83 100

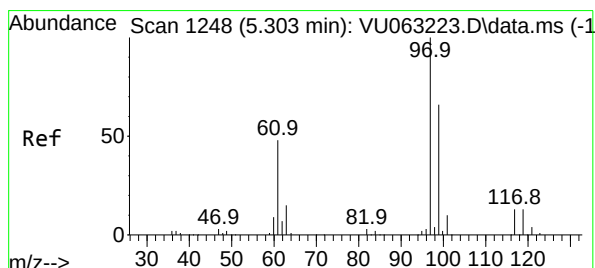
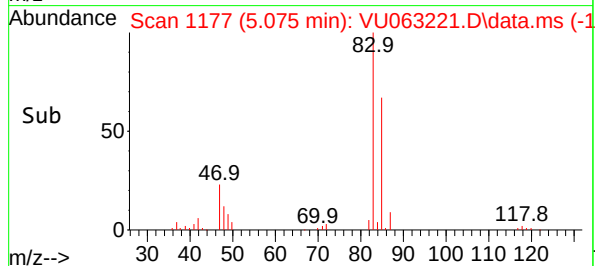
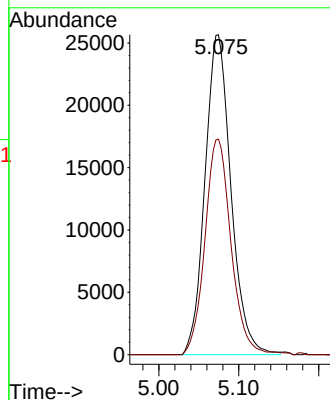
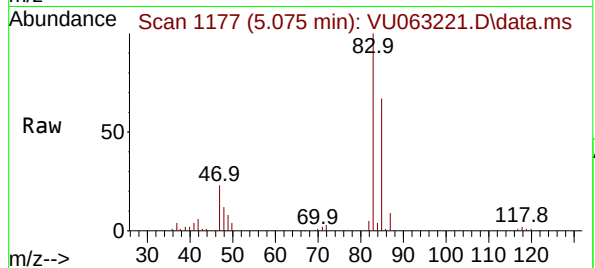
85 67.3 0.0 129.8

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#28

1,1,1-Trichloroethane

Concen: 2.009 ug/l

RT: 5.300 min Scan# 1247

Delta R.T. -0.003 min

Lab File: VU063221.D

Acq: 10 Feb 2025 13:58

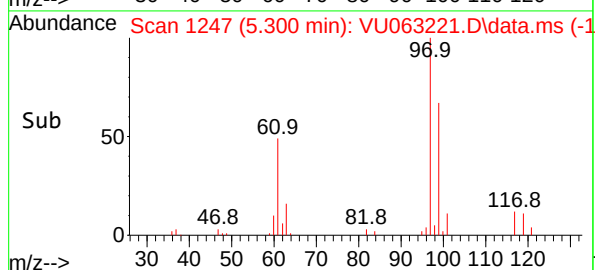
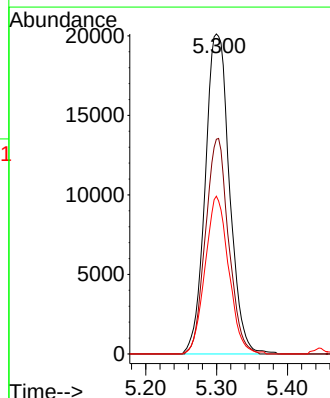
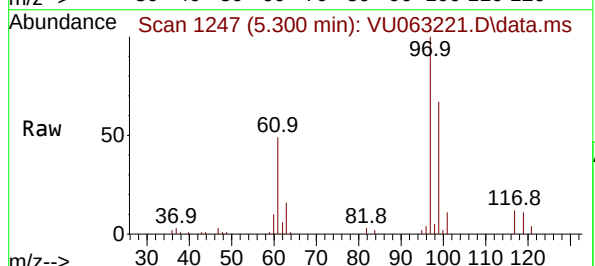
Tgt Ion: 97 Resp: 47900

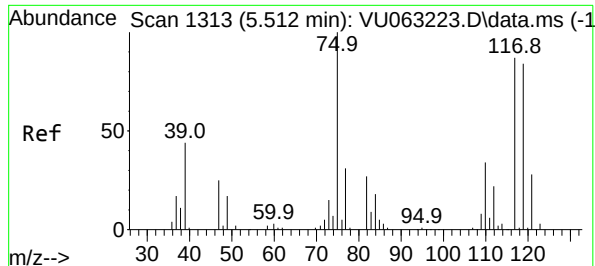
Ion Ratio Lower Upper

97 100

99 64.2 32.4 97.0

61 47.9 23.8 71.2





#29

1,1-Dichloropropene

Concen: 2.022 ug/l

RT: 5.512 min Scan# 1313

Delta R.T. 0.000 min

Lab File: VU063221.D

Acq: 10 Feb 2025 13:58

Instrument :

MSVOA_U

ClientSampleId :

VSTDICC002

Tgt Ion: 75 Resp: 4316

Ion Ratio Lower Upper

75 100

110 32.7 17.2 51.5

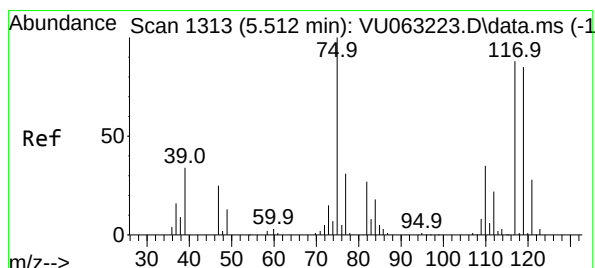
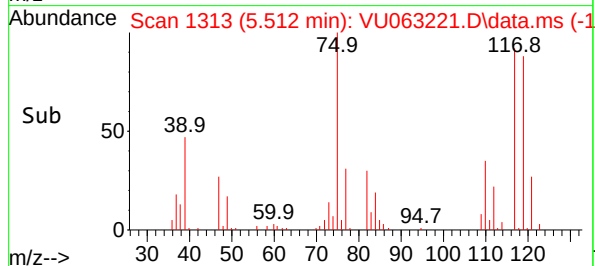
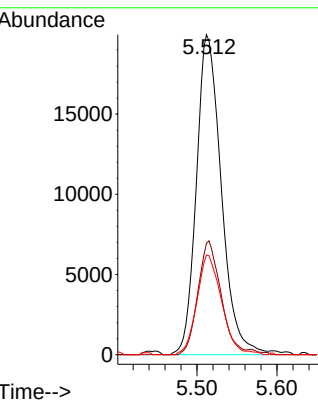
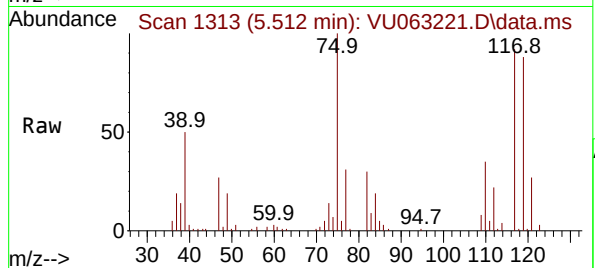
77 30.8 24.6 37.0

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#30

Carbon Tetrachloride

Concen: 1.979 ug/l

RT: 5.509 min Scan# 1312

Delta R.T. -0.003 min

Lab File: VU063221.D

Acq: 10 Feb 2025 13:58

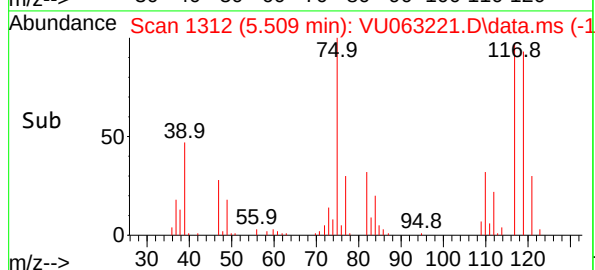
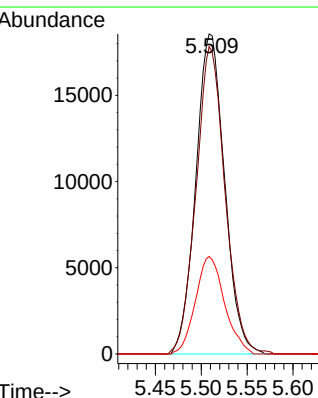
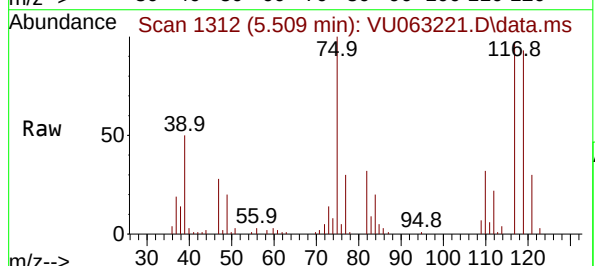
Tgt Ion:117 Resp: 40459

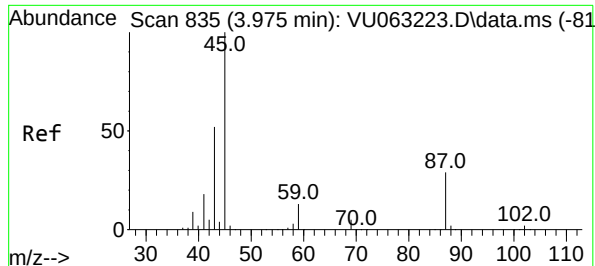
Ion Ratio Lower Upper

117 100

119 96.0 76.7 115.1

121 30.5 25.5 38.3





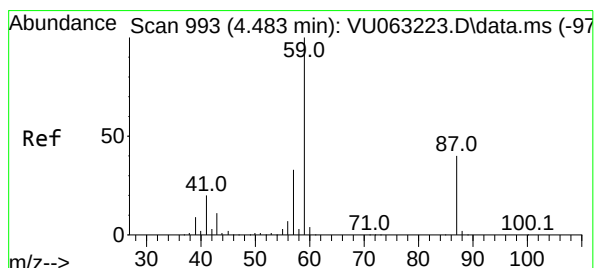
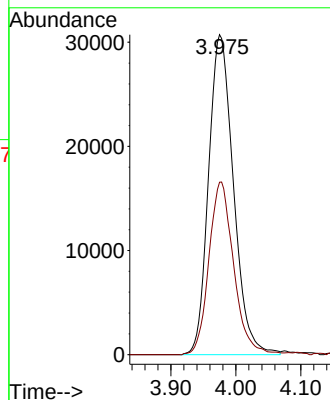
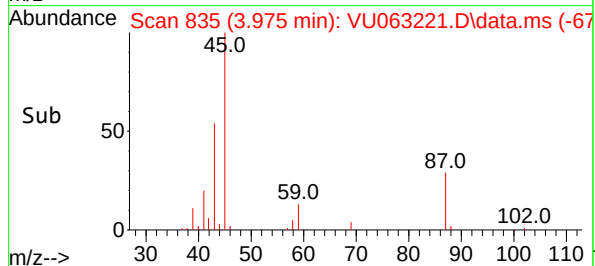
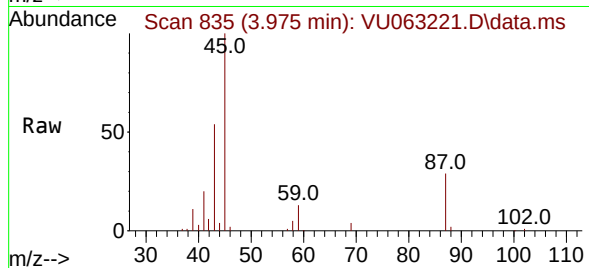
#31
Isopropyl Ether
Concen: 1.966 ug/l
RT: 3.975 min Scan# 835
Delta R.T. 0.000 min
Lab File: VU063221.D
Acq: 10 Feb 2025 13:58

Instrument :
MSVOA_U
ClientSampleId :
VSTDICC002

Tgt Ion: 45 Resp: 81829
Ion Ratio Lower Upper
45 100
43 53.7 25.7 77.1

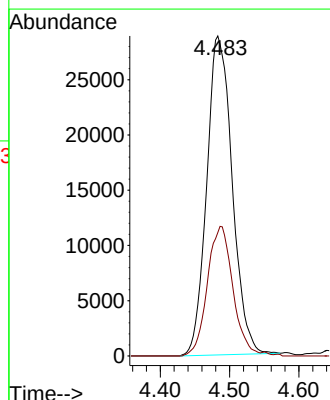
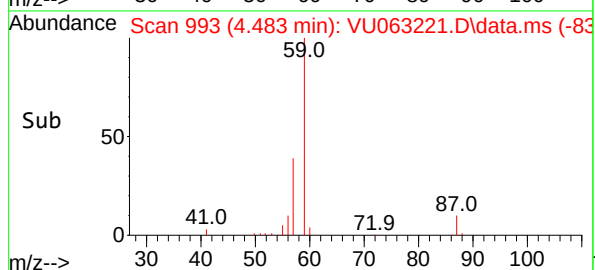
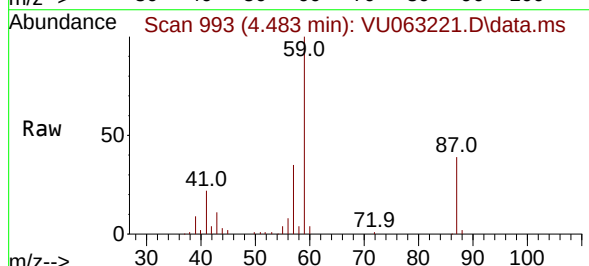
Manual Integrations
APPROVED

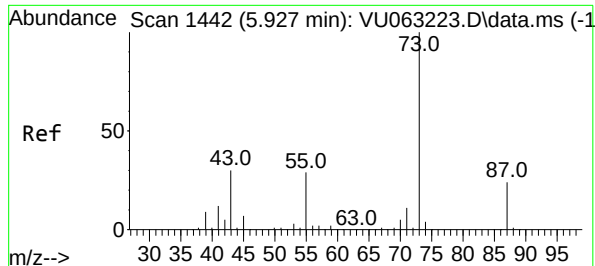
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#32
Ethyl-t-butyl ether
Concen: 1.951 ug/l
RT: 4.483 min Scan# 993
Delta R.T. 0.000 min
Lab File: VU063221.D
Acq: 10 Feb 2025 13:58

Tgt Ion: 59 Resp: 73881
Ion Ratio Lower Upper
59 100
87 39.2 32.6 49.0





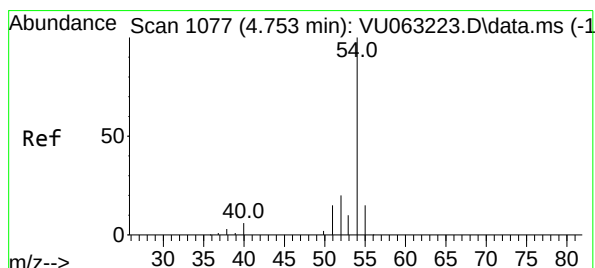
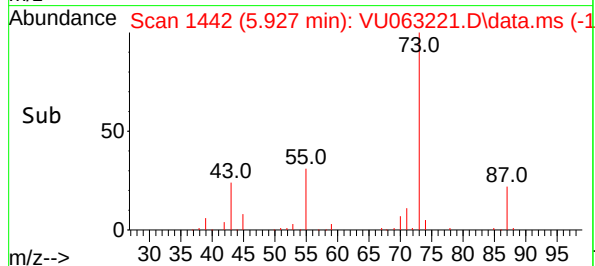
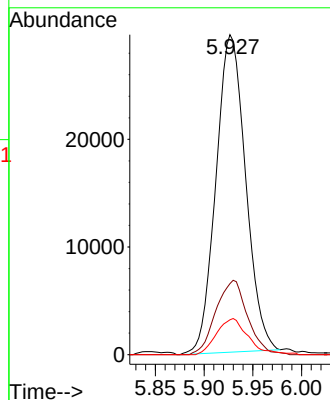
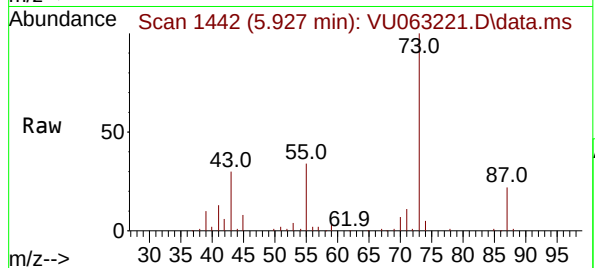
#33
Tert-Amyl methyl ether
Concen: 1.891 ug/l
RT: 5.927 min Scan# 1442
Delta R.T. 0.000 min
Lab File: VU063221.D
Acq: 10 Feb 2025 13:58

Instrument :
MSVOA_U
ClientSampleId :
VSTDICC002

Tgt Ion: 73 Resp: 6254
Ion Ratio Lower Upper
73 100
87 24.9 18.9 28.3
71 12.2 9.0 13.4

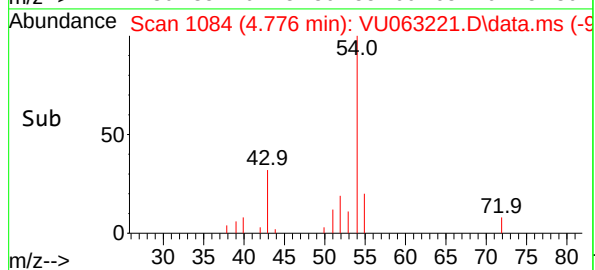
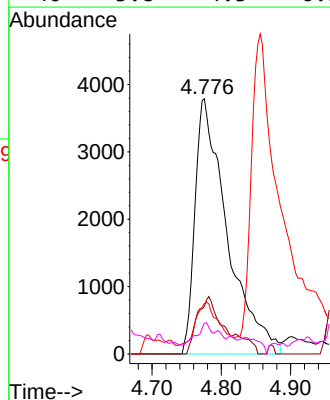
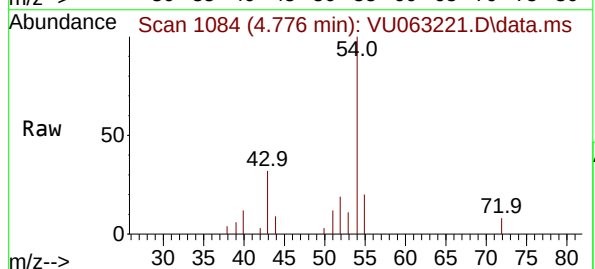
Manual Integrations
APPROVED

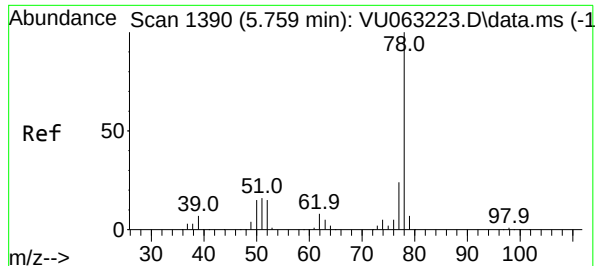
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#34
Propionitrile
Concen: 10.151 ug/l
RT: 4.776 min Scan# 1084
Delta R.T. 0.023 min
Lab File: VU063221.D
Acq: 10 Feb 2025 13:58

Tgt Ion: 54 Resp: 12222
Ion Ratio Lower Upper
54 100
52 16.1 16.3 24.5#
55 11.4 11.8 17.6#
40 3.8 4.3 6.5#





#35

Benzene

Concen: 2.022 ug/l

RT: 5.763 min Scan# 1390

Delta R.T. 0.003 min

Lab File: VU063221.D

Acq: 10 Feb 2025 13:58

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC002

Tgt Ion: 78 Resp: 132758

Ion Ratio Lower Upper

78 100

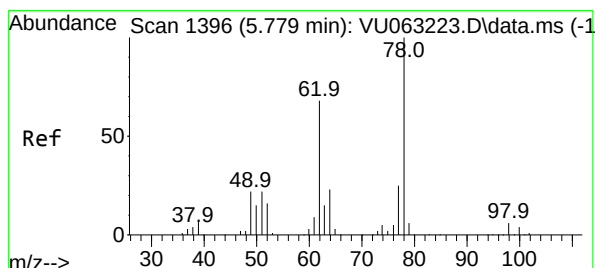
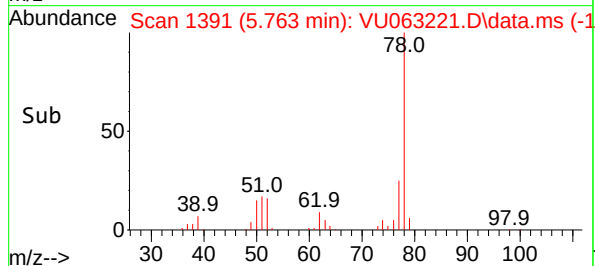
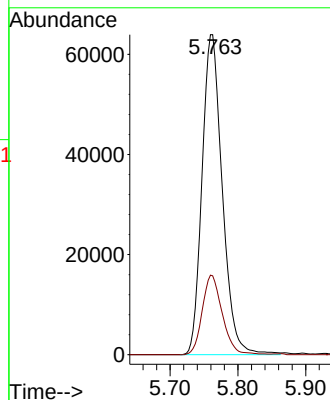
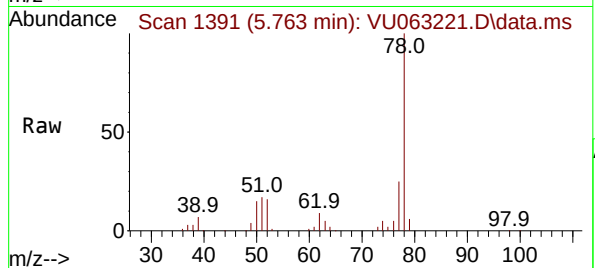
77 24.6 19.0 28.4

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#36

1,2-Dichloroethane

Concen: 2.020 ug/l

RT: 5.782 min Scan# 1397

Delta R.T. 0.003 min

Lab File: VU063221.D

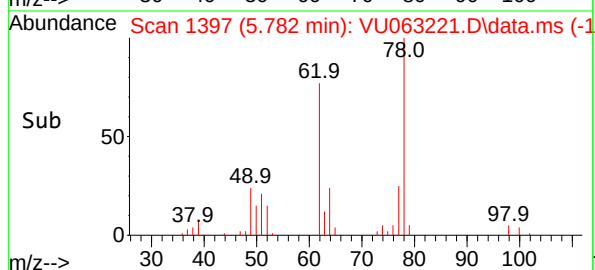
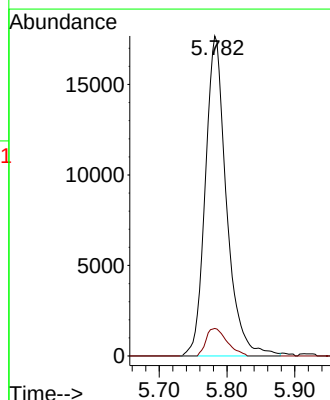
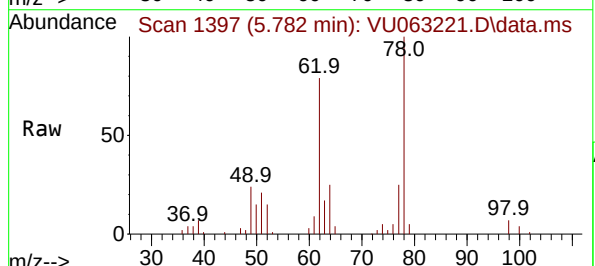
Acq: 10 Feb 2025 13:58

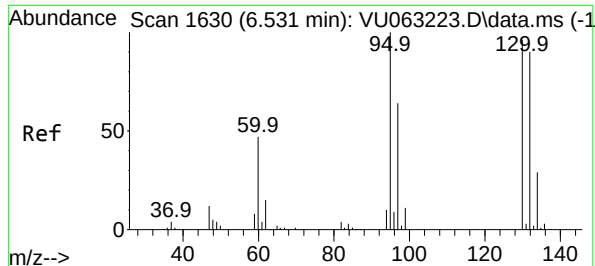
Tgt Ion: 62 Resp: 38273

Ion Ratio Lower Upper

62 100

98 8.5 6.9 10.3





#37

Trichloroethene

Concen: 2.013 ug/l

RT: 6.531 min Scan# 1630

Delta R.T. 0.000 min

Lab File: VU063221.D

Acq: 10 Feb 2025 13:58

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC002

Tgt Ion:130 Resp: 31430

Ion Ratio Lower Upper

130 100

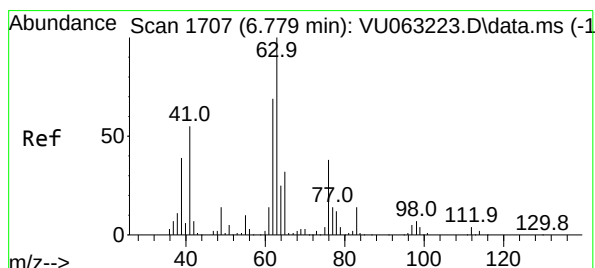
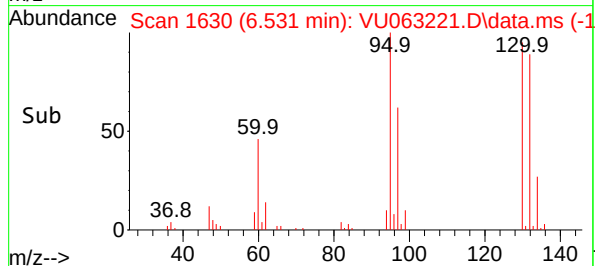
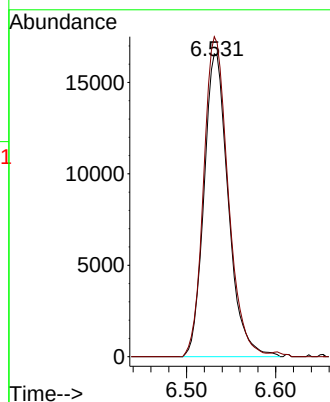
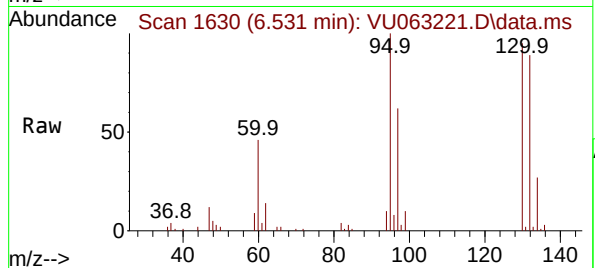
95 105.6 83.2 124.8

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#38

1,2-Dichloropropane

Concen: 1.983 ug/l

RT: 6.779 min Scan# 1707

Delta R.T. 0.000 min

Lab File: VU063221.D

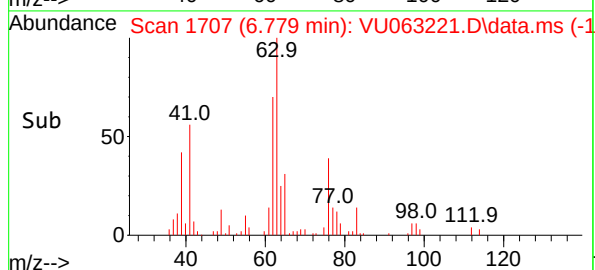
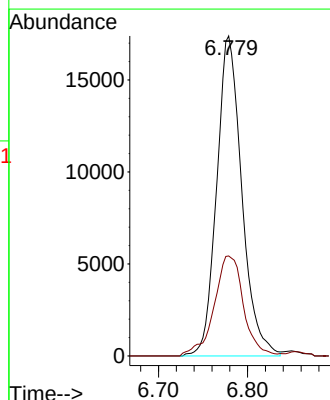
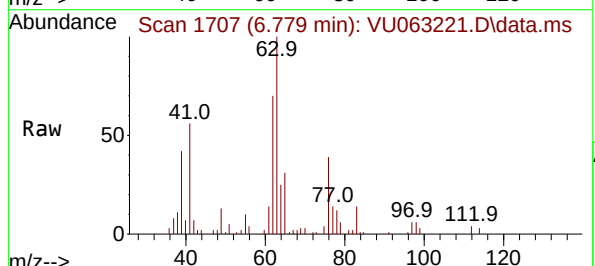
Acq: 10 Feb 2025 13:58

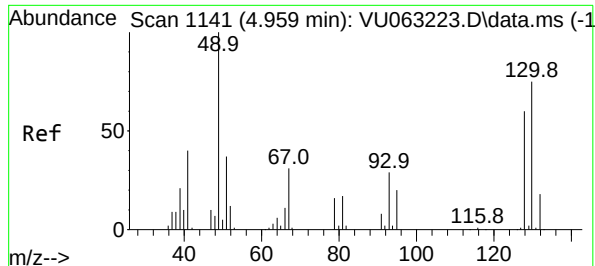
Tgt Ion: 63 Resp: 34066

Ion Ratio Lower Upper

63 100

65 31.3 25.3 37.9





#39

Methacrylonitrile

Concen: 1.955 ug/l

RT: 4.968 min Scan# 1141

Delta R.T. 0.010 min

Lab File: VU063221.D

Acq: 10 Feb 2025 13:58

Instrument :

MSVOA_U

ClientSampleId :

VSTDICC002

Tgt Ion: 41 Resp: 840

Ion Ratio Lower Upper

41 100

67 78.1 64.5 96.7

39 51.0 43.0 64.6

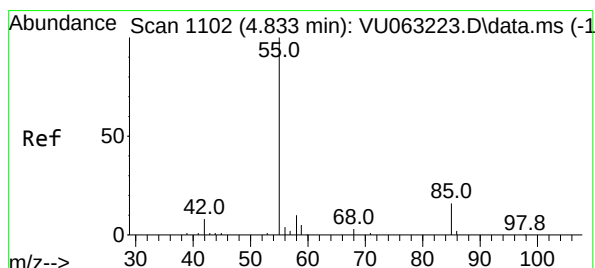
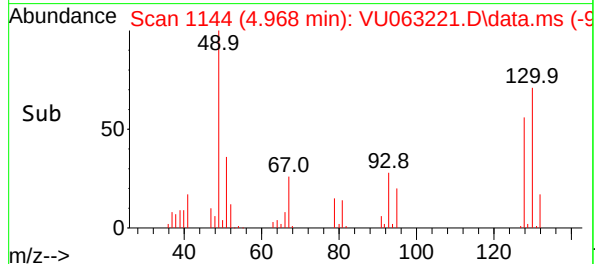
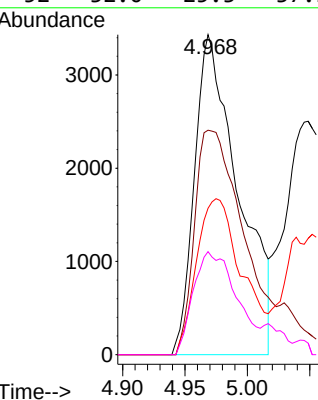
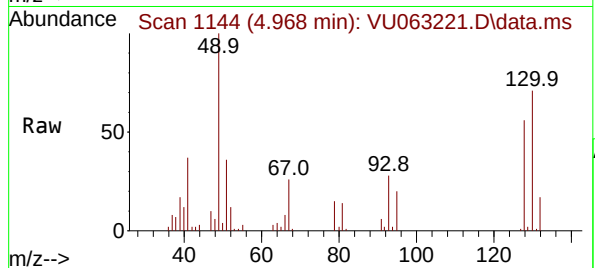
52 32.0 25.3 37.9

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#40

Methyl acrylate

Concen: 2.038 ug/l m

RT: 4.856 min Scan# 1109

Delta R.T. 0.023 min

Lab File: VU063221.D

Acq: 10 Feb 2025 13:58

Tgt Ion: 55 Resp: 16003

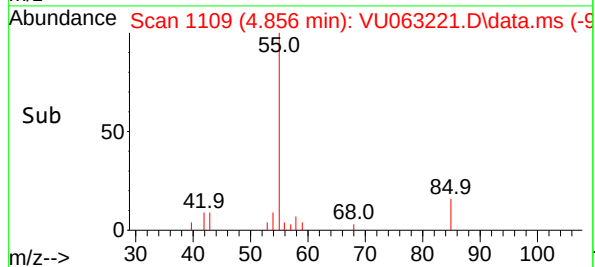
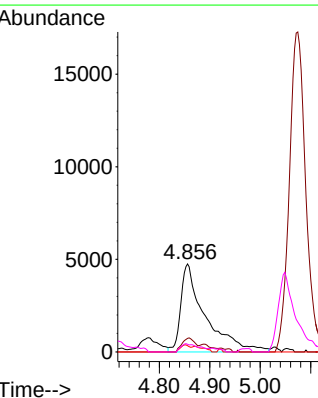
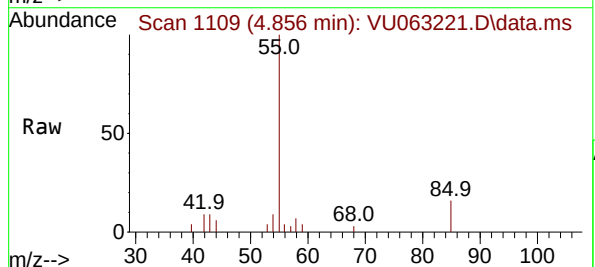
Ion Ratio Lower Upper

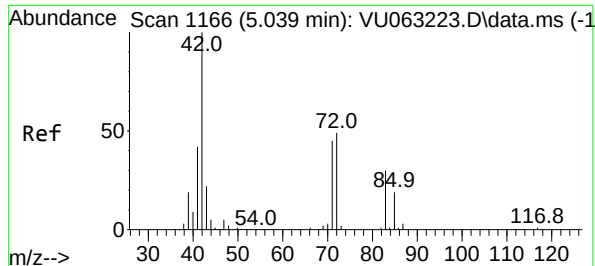
55 100

85 8.6 13.3 19.9#

58 3.0 7.3 10.9#

42 5.5 6.9 10.3#





#41

Tetrahydrofuran

Concen: 4.106 ug/l

RT: 5.049 min Scan# 1166

Delta R.T. 0.010 min

Lab File: VU063221.D

Acq: 10 Feb 2025 13:58

Instrument :

MSVOA_U

ClientSampleId :

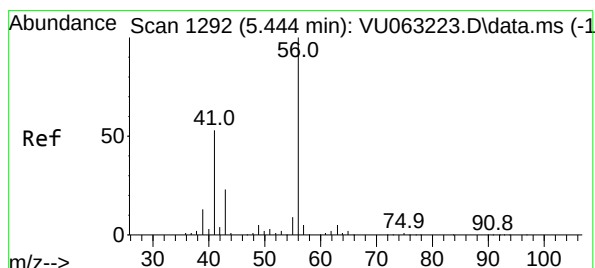
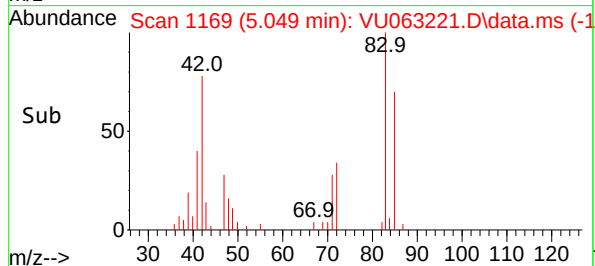
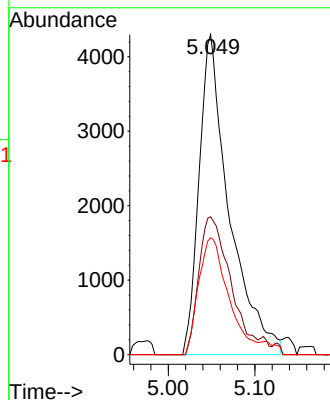
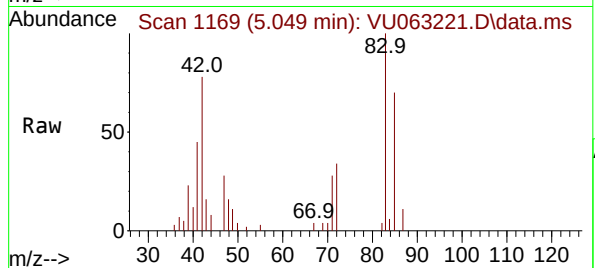
VSTDICC002

Tgt Ion: 42 Resp: 10378
Ion Ratio Lower Upper
42 100
72 45.1 41.5 62.3
71 36.2 37.2 55.8

Manual Integrations
APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#42

1-Chlorobutane

Concen: 2.001 ug/l

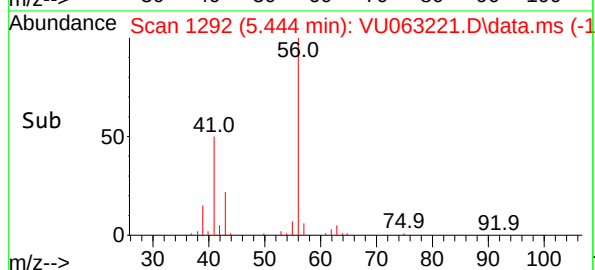
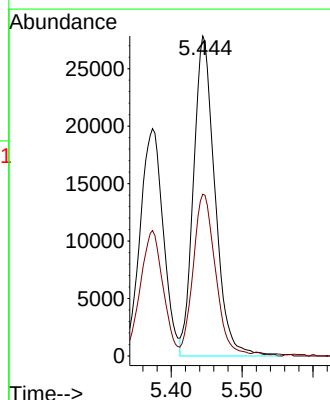
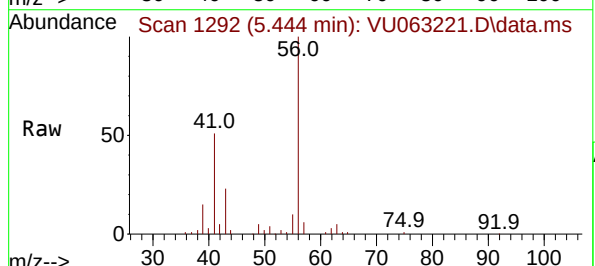
RT: 5.444 min Scan# 1292

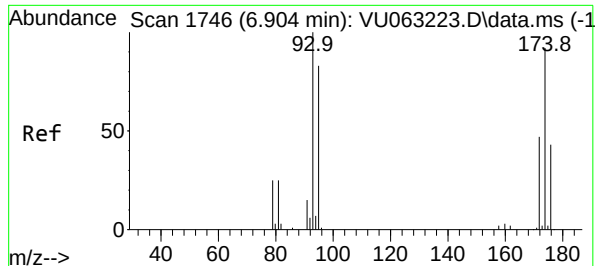
Delta R.T. 0.000 min

Lab File: VU063221.D

Acq: 10 Feb 2025 13:58

Tgt Ion: 56 Resp: 58462
Ion Ratio Lower Upper
56 100
41 51.0 26.3 78.8





#43

Dibromomethane

Concen: 1.996 ug/l

RT: 6.910 min Scan# 1746

Delta R.T. 0.006 min

Lab File: VU063221.D

Acq: 10 Feb 2025 13:58

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC002

Tgt Ion: 93 Resp: 1736

Ion Ratio Lower Upper

93 100

95 80.0 67.2 100.8

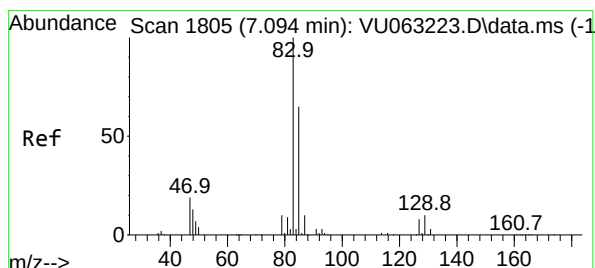
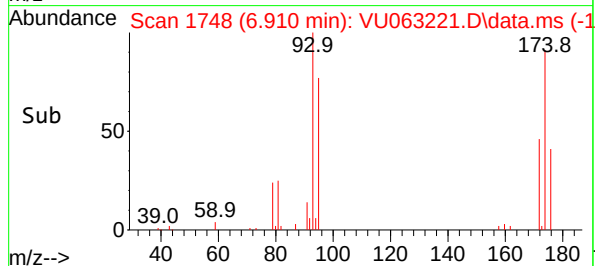
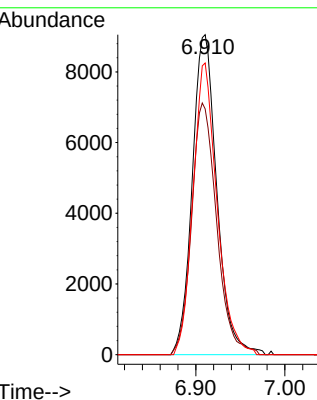
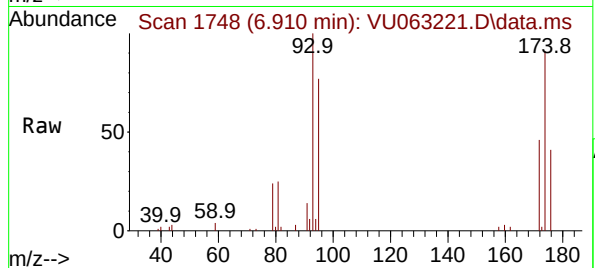
174 89.2 75.7 113.5

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#44

Bromodichloromethane

Concen: 2.035 ug/l

RT: 7.094 min Scan# 1805

Delta R.T. 0.000 min

Lab File: VU063221.D

Acq: 10 Feb 2025 13:58

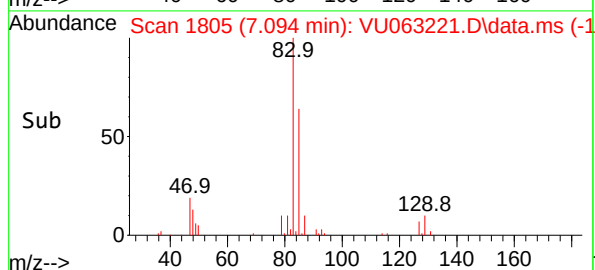
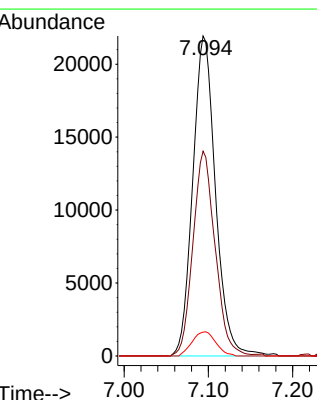
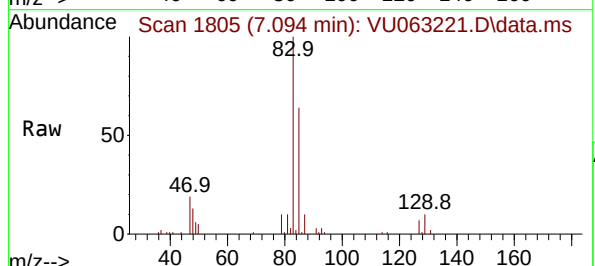
Tgt Ion: 83 Resp: 41213

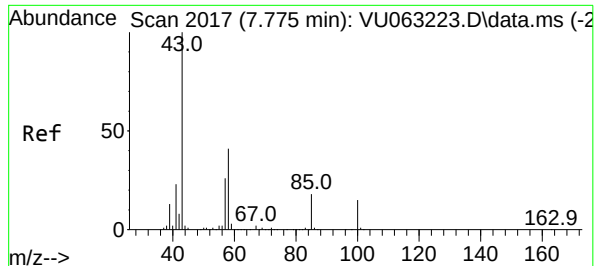
Ion Ratio Lower Upper

83 100

85 64.0 51.7 77.5

127 7.4 6.7 10.1





#45

4-Methyl-2-Pentanone

Concen: 9.751 ug/l

RT: 7.782 min Scan# 2017

Delta R.T. 0.006 min

Lab File: VU063221.D

Acq: 10 Feb 2025 13:58

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC002

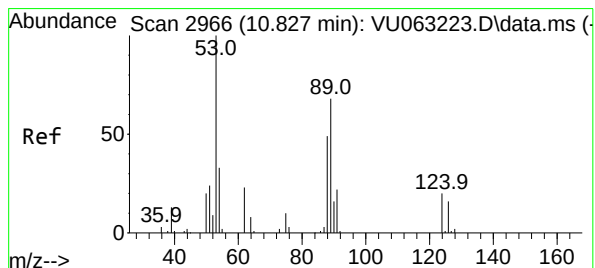
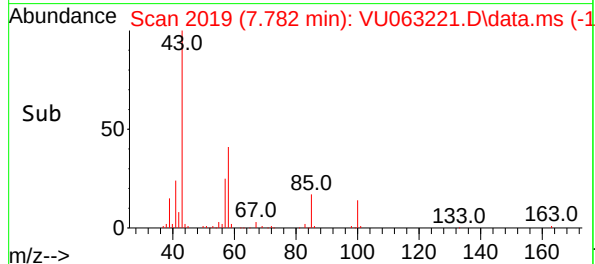
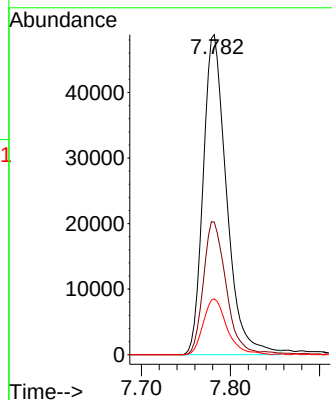
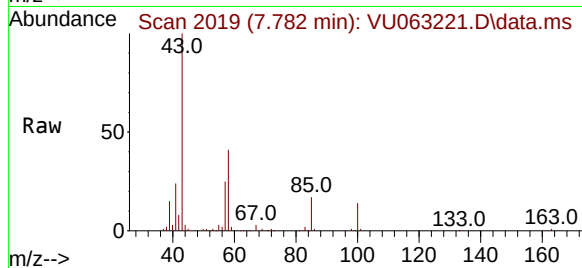
Tgt Ion:	43	Resp:	8894
Ion	Ratio	Lower	Upper
43	100		
58	40.2	20.8	62.5
85	17.7	14.8	22.2

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#46

t-1,4-Dichloro-2-butene

Concen: 4.176 ug/l m

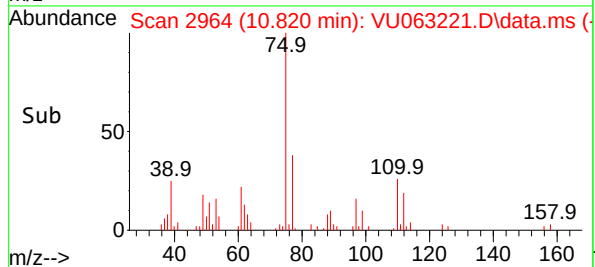
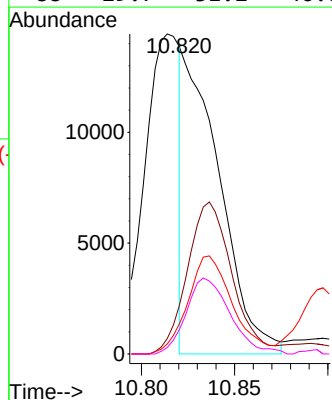
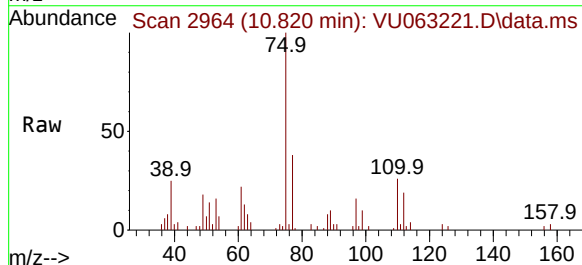
RT: 10.820 min Scan# 2964

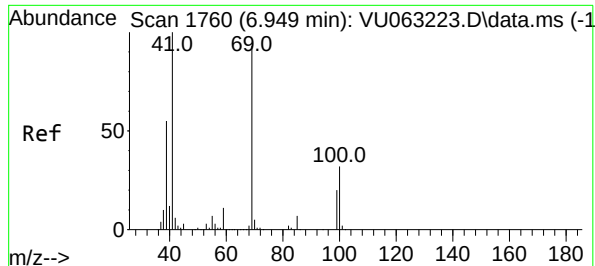
Delta R.T. -0.006 min

Lab File: VU063221.D

Acq: 10 Feb 2025 13:58

Tgt Ion:	75	Resp:	18852
Ion	Ratio	Lower	Upper
75	100		
53	60.4	64.5	96.7#
89	39.0	43.4	65.2#
88	29.7	31.2	46.8#





#47

Methyl methacrylate

Concen: 3.740 ug/l

RT: 6.955 min Scan# 1760

Delta R.T. 0.006 min

Lab File: VU063221.D

Acq: 10 Feb 2025 13:58

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC002

Tgt Ion: 69 Resp: 2741

Ion Ratio Lower Upper

69 100

41 113.8 0.0 217.0

39 64.1 47.7 71.5

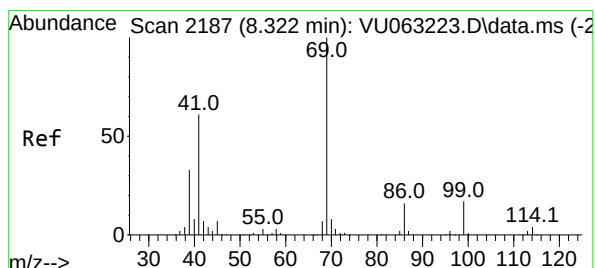
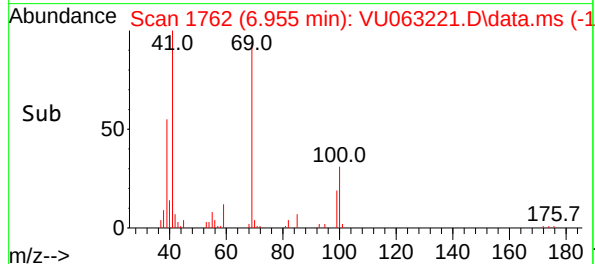
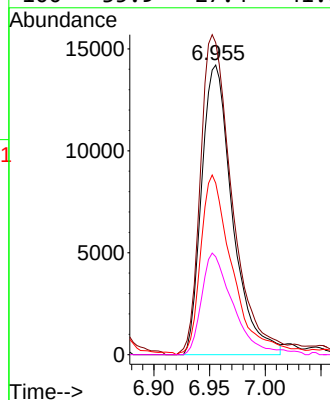
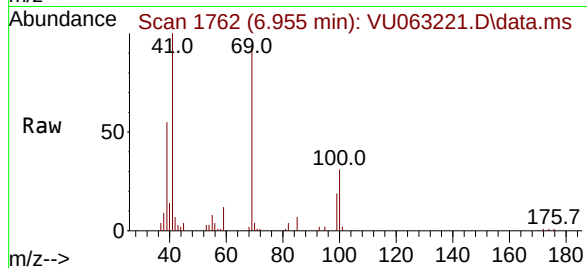
100 35.9 27.4 41.0

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#48

Ethyl methacrylate

Concen: 1.897 ug/l

RT: 8.325 min Scan# 2188

Delta R.T. 0.003 min

Lab File: VU063221.D

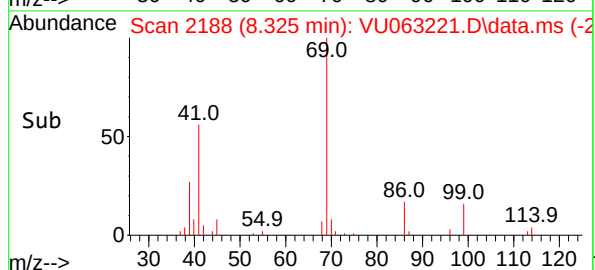
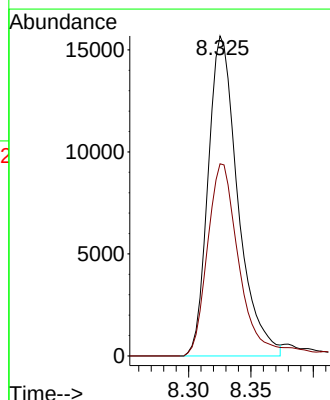
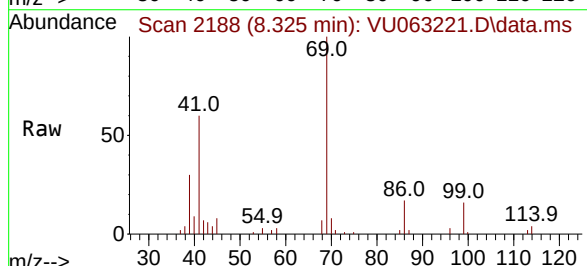
Acq: 10 Feb 2025 13:58

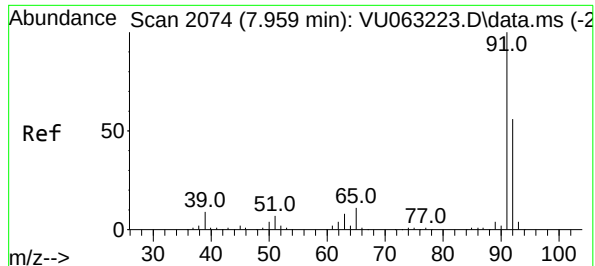
Tgt Ion: 69 Resp: 26103

Ion Ratio Lower Upper

69 100

41 64.5 30.6 92.0





#49

Toluene

Concen: 1.999 ug/l

RT: 7.959 min Scan# 2074

Delta R.T. 0.000 min

Lab File: VU063221.D

Acq: 10 Feb 2025 13:58

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC002

Tgt Ion: 92 Resp: 75472

Ion Ratio Lower Upper

92 100

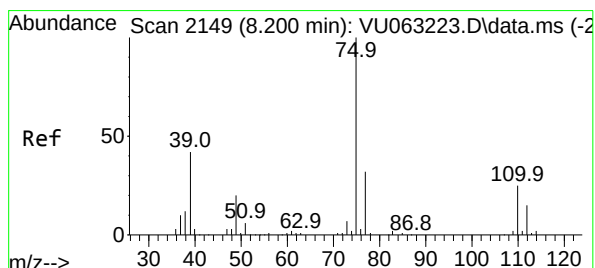
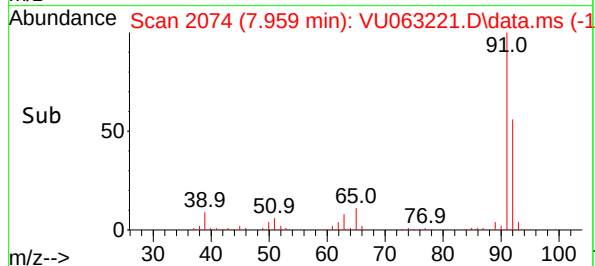
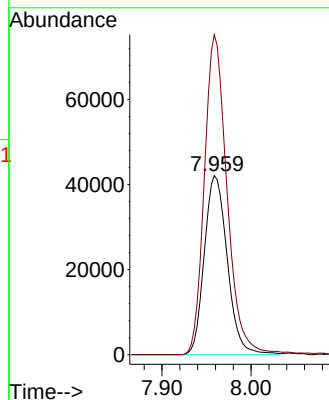
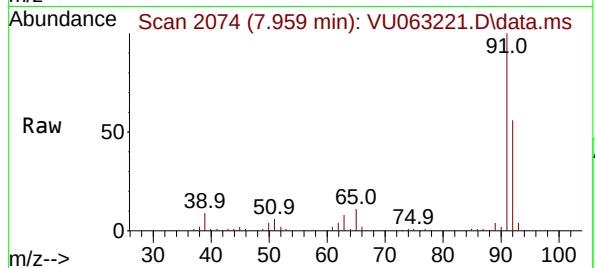
91 176.6 141.8 212.6

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#50

t-1,3-Dichloropropene

Concen: 1.974 ug/l

RT: 8.203 min Scan# 2150

Delta R.T. 0.003 min

Lab File: VU063221.D

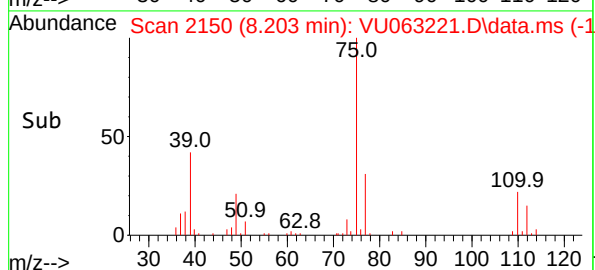
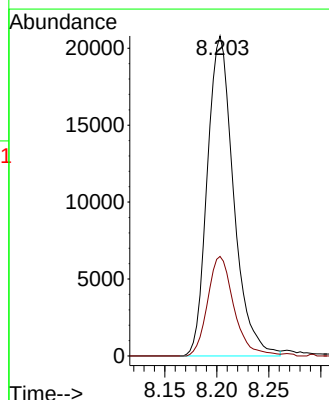
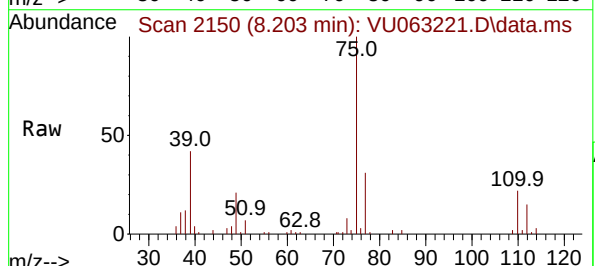
Acq: 10 Feb 2025 13:58

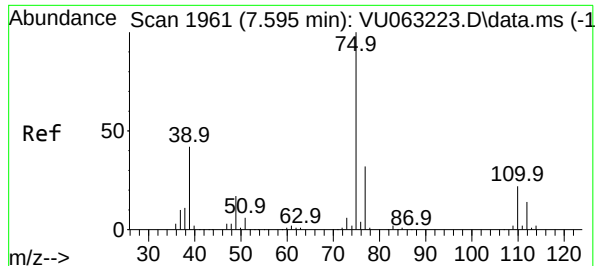
Tgt Ion: 75 Resp: 36608

Ion Ratio Lower Upper

75 100

77 31.1 25.9 38.9





#51

cis-1,3-Dichloropropene

Concen: 2.006 ug/l

RT: 7.599 min Scan# 1961

Delta R.T. 0.003 min

Lab File: VU063221.D

Acq: 10 Feb 2025 13:58

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC002

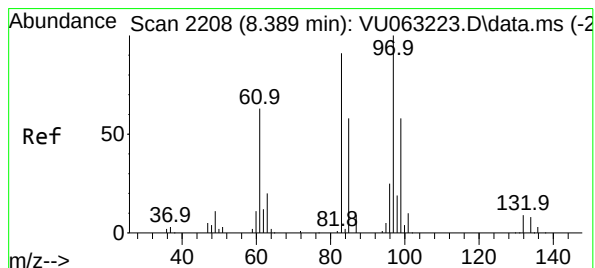
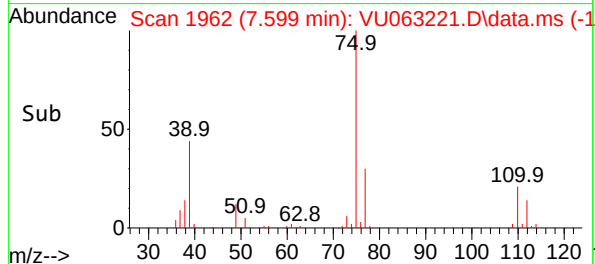
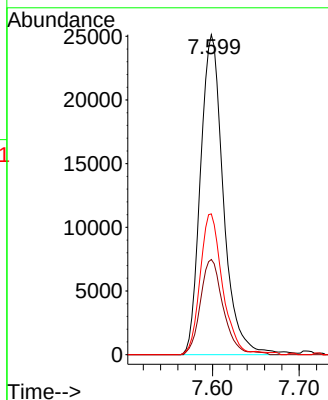
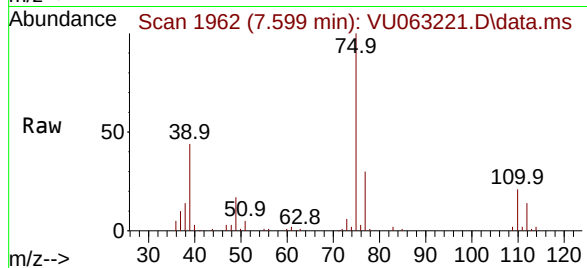
Tgt Ion:	75	Resp:	45949
Ion	Ratio	Lower	Upper
75	100		
77	29.7	25.3	37.9
39	44.0	33.5	50.3

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#52

1,1,2-Trichloroethane

Concen: 1.993 ug/l

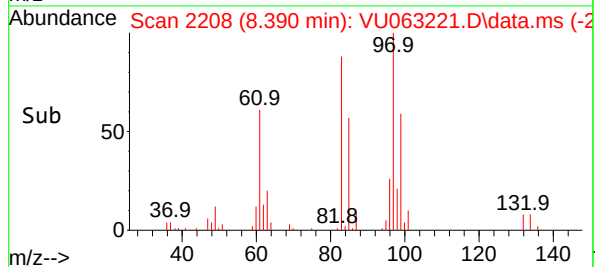
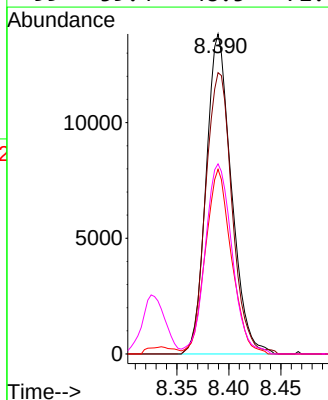
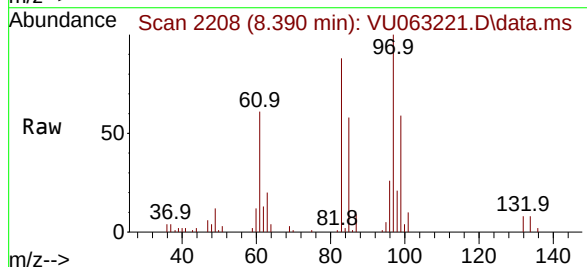
RT: 8.390 min Scan# 2208

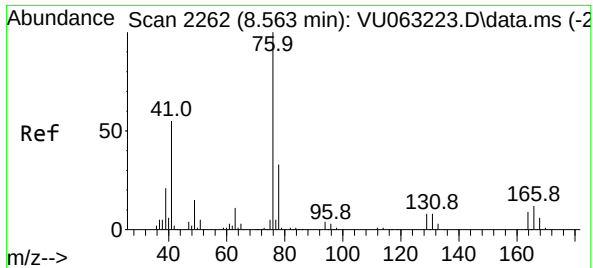
Delta R.T. 0.000 min

Lab File: VU063221.D

Acq: 10 Feb 2025 13:58

Tgt Ion:	97	Resp:	23377
Ion	Ratio	Lower	Upper
97	100		
83	87.9	73.0	109.4
85	57.7	46.3	69.5
99	59.4	48.5	72.7





#53

1,3-Dichloropropane

Concen: 2.015 ug/l

RT: 8.566 min Scan# 2262

Delta R.T. 0.003 min

Lab File: VU063221.D

Acq: 10 Feb 2025 13:58

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC002

Tgt Ion: 76 Resp: 41970

Ion Ratio Lower Upper

76 100

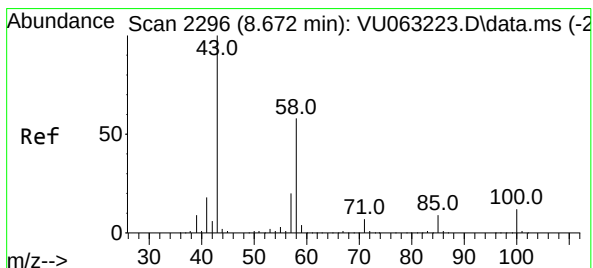
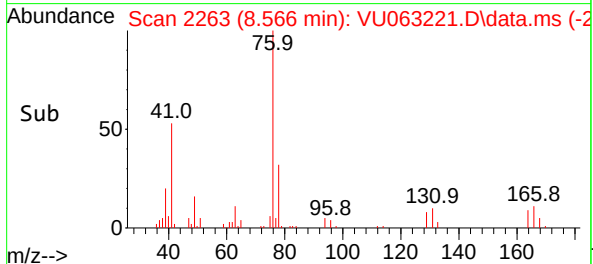
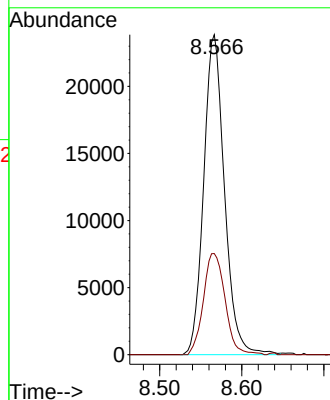
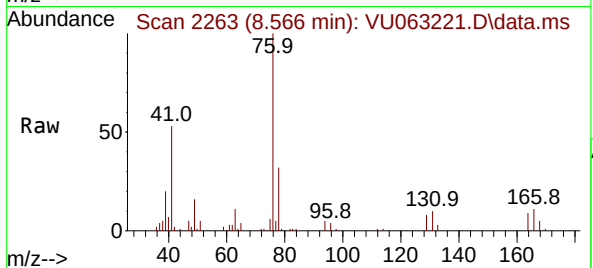
78 33.0 26.3 39.5

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#54

2-Hexanone

Concen: 9.874 ug/l

RT: 8.679 min Scan# 2298

Delta R.T. 0.006 min

Lab File: VU063221.D

Acq: 10 Feb 2025 13:58

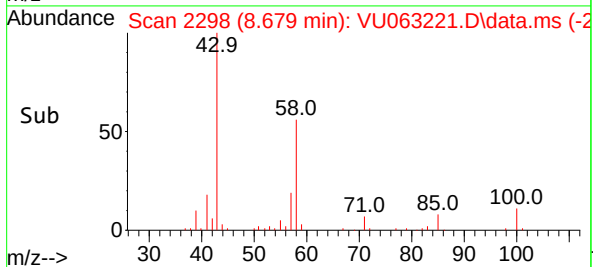
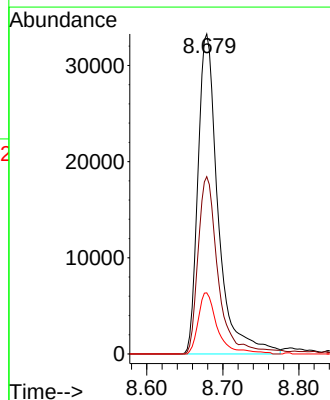
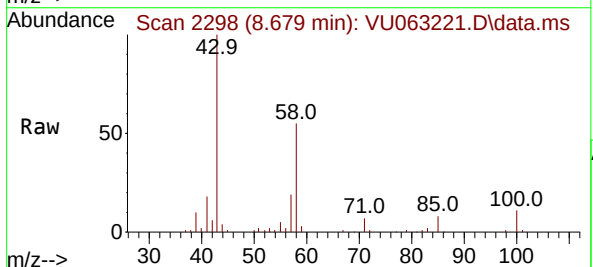
Tgt Ion: 43 Resp: 61467

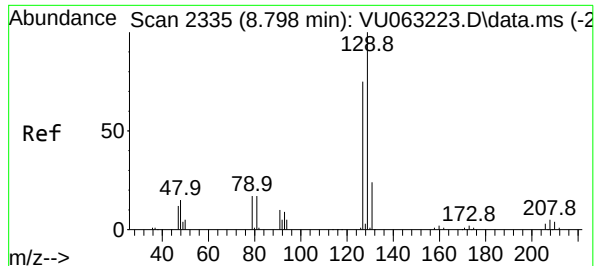
Ion Ratio Lower Upper

43 100

58 55.4 38.0 78.0

57 18.3 0.0 39.1





#55

Dibromochloromethane

Concen: 1.950 ug/l

RT: 8.798 min Scan# 2335

Delta R.T. 0.000 min

Lab File: VU063221.D

Acq: 10 Feb 2025 13:58

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC002

Tgt Ion:129 Resp: 26319

Ion Ratio Lower Upper

129 100

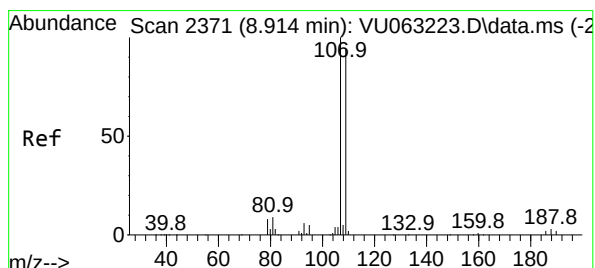
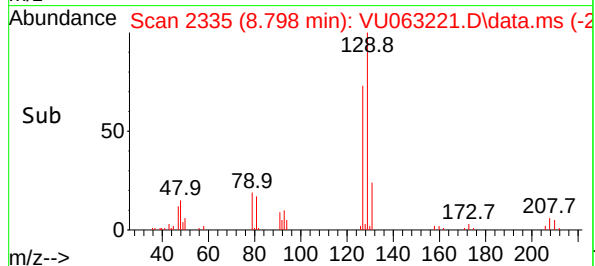
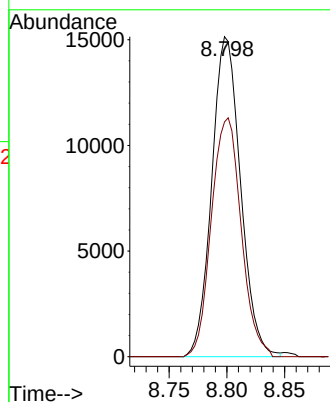
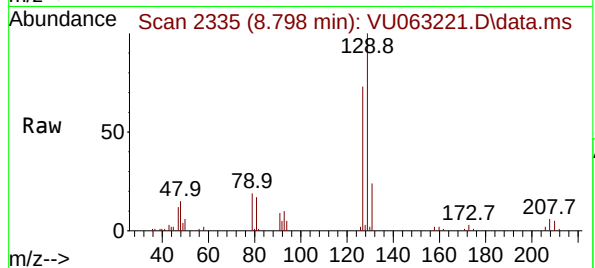
127 77.0 60.4 90.6

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#56

1,2-Dibromoethane

Concen: 1.967 ug/l

RT: 8.914 min Scan# 2371

Delta R.T. 0.000 min

Lab File: VU063221.D

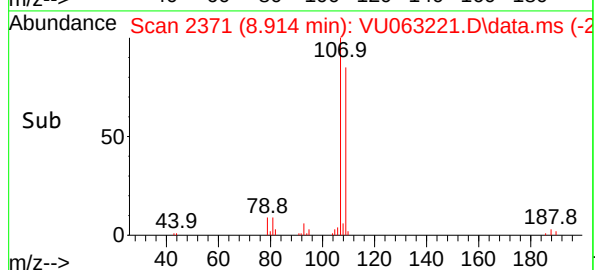
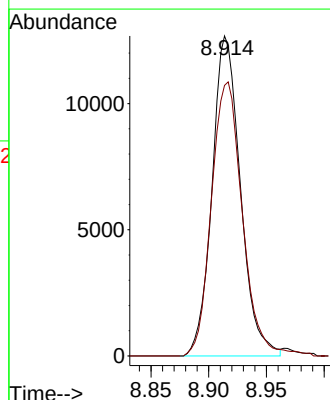
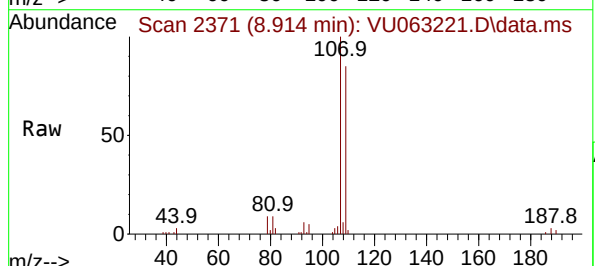
Acq: 10 Feb 2025 13:58

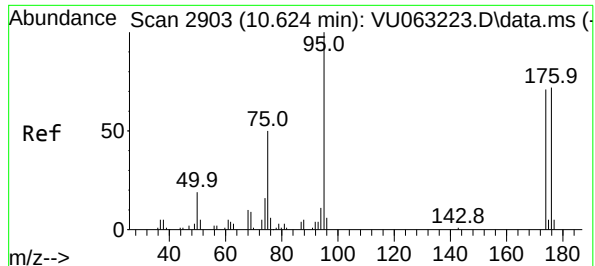
Tgt Ion:107 Resp: 21639

Ion Ratio Lower Upper

107 100

109 93.6 0.0 187.8





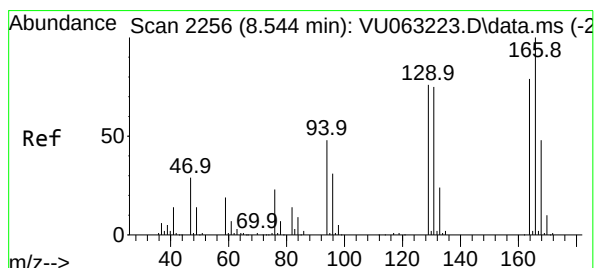
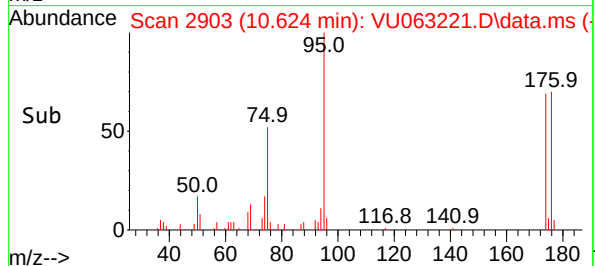
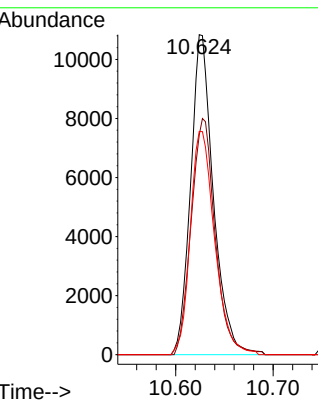
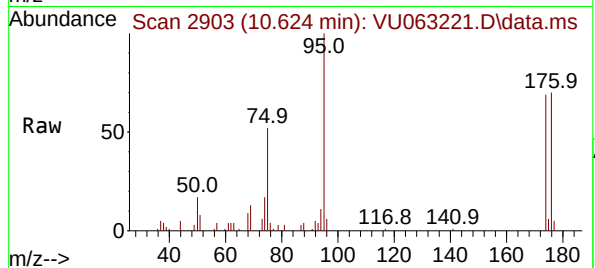
#57
4-Bromofluorobenzene
Concen: 1.000 ug/l
RT: 10.624 min Scan# 2903
Delta R.T. 0.000 min
Lab File: VU063221.D
Acq: 10 Feb 2025 13:58

Instrument :
MSVOA_U
ClientSampleId :
VSTDICC002

Tgt Ion: 95 Resp: 1762
Ion Ratio Lower Upper
95 100
174 77.7 58.6 88.0
176 74.7 58.2 87.4

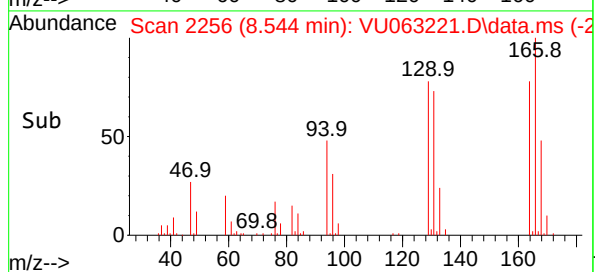
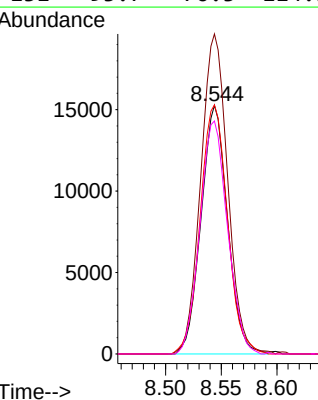
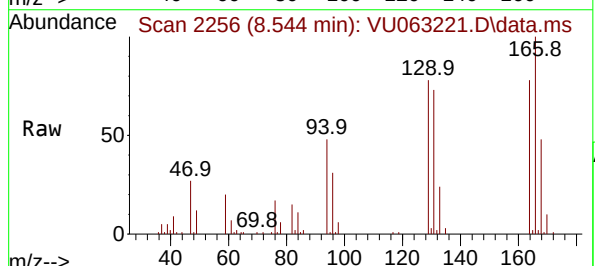
Manual Integrations
APPROVED

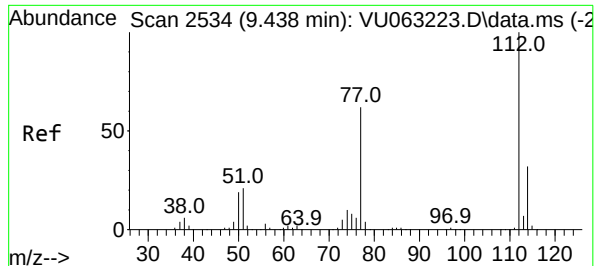
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#58
Tetrachloroethene
Concen: 1.959 ug/l
RT: 8.544 min Scan# 2256
Delta R.T. 0.000 min
Lab File: VU063221.D
Acq: 10 Feb 2025 13:58

Tgt Ion:164 Resp: 25204
Ion Ratio Lower Upper
164 100
166 128.7 101.4 152.0
129 100.2 77.0 115.4
131 93.7 76.3 114.5





#59

Chlorobenzene

Concen: 1.999 ug/l

RT: 9.438 min Scan# 2534

Delta R.T. 0.000 min

Lab File: VU063221.D

Acq: 10 Feb 2025 13:58

Instrument :

MSVOA_U

ClientSampleId :

VSTDICC002

Tgt Ion:112 Resp: 7965

Ion Ratio Lower Upper

112 100

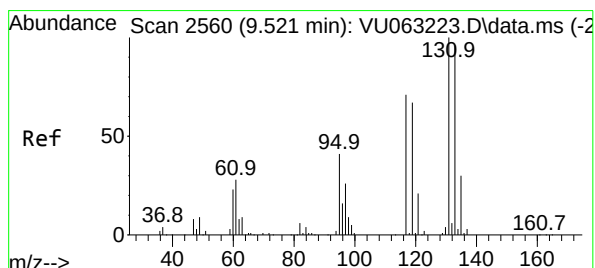
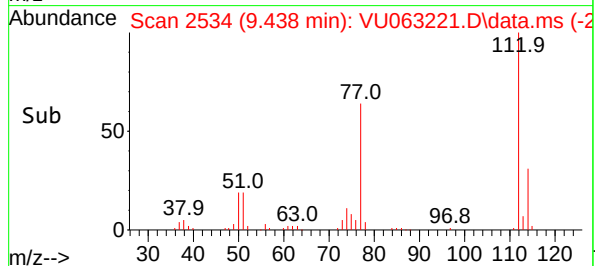
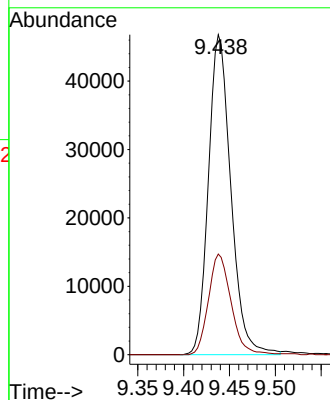
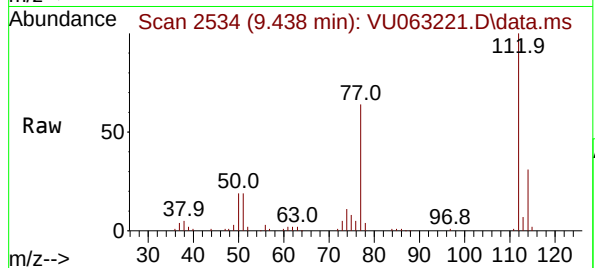
114 31.4 25.7 38.5

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#60

1,1,1,2-Tetrachloroethane

Concen: 1.966 ug/l

RT: 9.525 min Scan# 2561

Delta R.T. 0.003 min

Lab File: VU063221.D

Acq: 10 Feb 2025 13:58

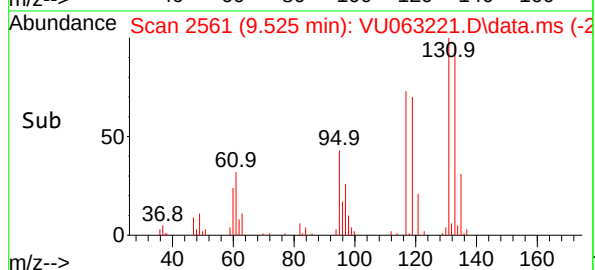
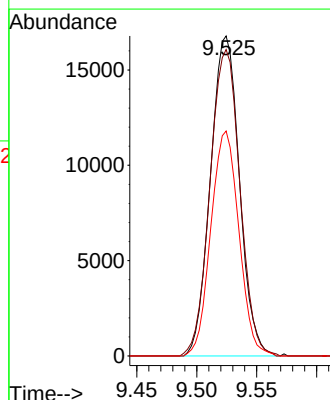
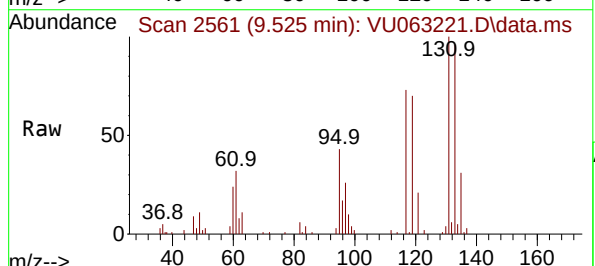
Tgt Ion:131 Resp: 28159

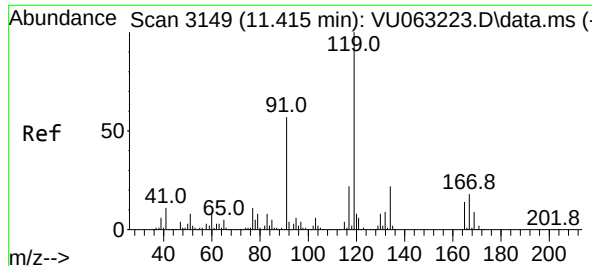
Ion Ratio Lower Upper

131 100

133 98.9 76.7 115.1

119 68.1 54.4 81.6





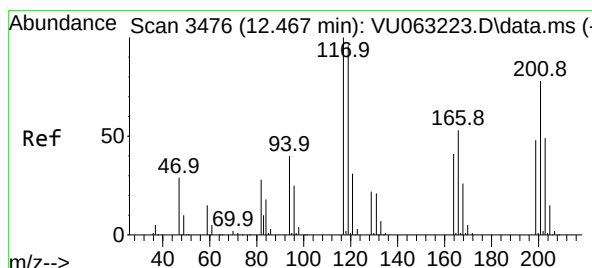
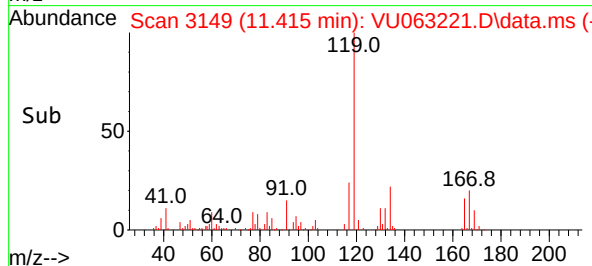
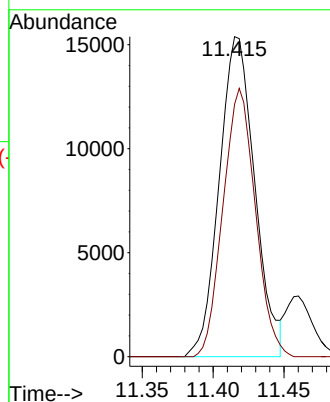
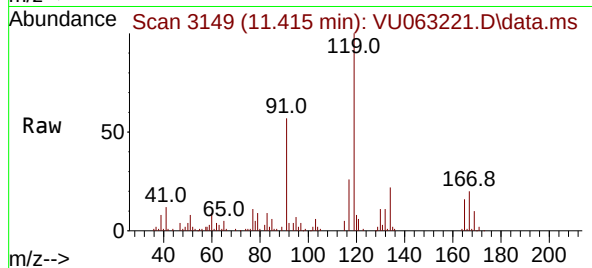
#61
Pentachloroethane
Concen: 2.096 ug/l
RT: 11.415 min Scan# 3149
Delta R.T. 0.000 min
Lab File: VU063221.D
Acq: 10 Feb 2025 13:58

Instrument :
MSVOA_U
ClientSampleId :
VSTDICC002

Tgt Ion:117 Resp: 2681
Ion Ratio Lower Upper
117 100
167 76.4 65.0 97.6

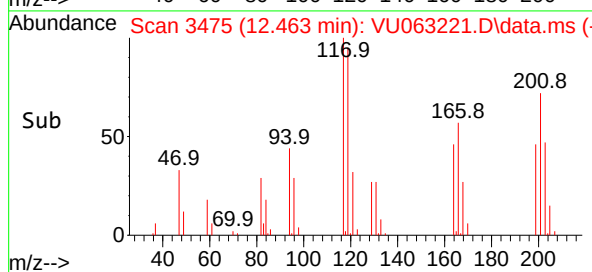
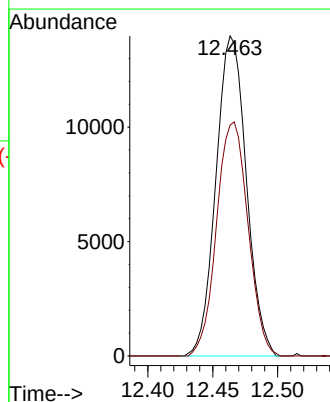
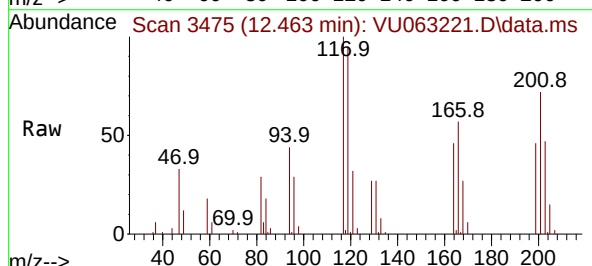
Manual Integrations
APPROVED

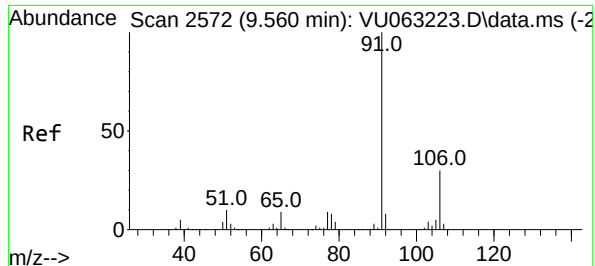
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#62
Hexachloroethane
Concen: 2.017 ug/l
RT: 12.463 min Scan# 3475
Delta R.T. -0.003 min
Lab File: VU063221.D
Acq: 10 Feb 2025 13:58

Tgt Ion:117 Resp: 22824
Ion Ratio Lower Upper
117 100
201 75.4 61.3 91.9





#63

Ethyl Benzene

Concen: 1.938 ug/l

RT: 9.560 min Scan# 2572

Delta R.T. 0.000 min

Lab File: VU063221.D

Acq: 10 Feb 2025 13:58

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC002

Tgt Ion: 91 Resp: 13314

Ion Ratio Lower Upper

91 100

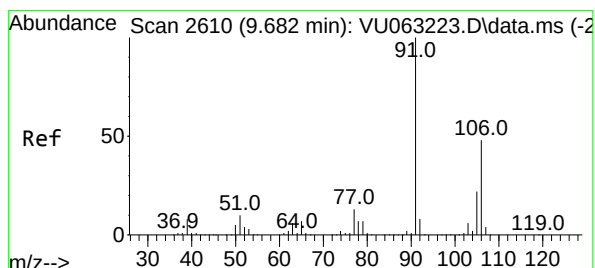
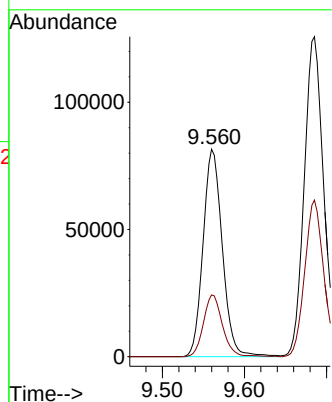
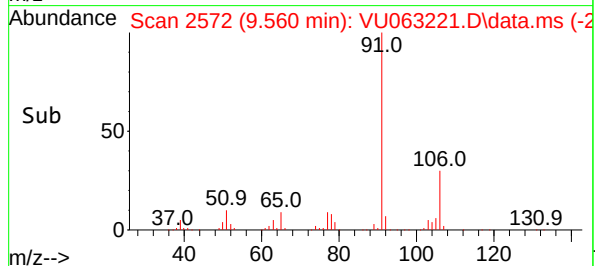
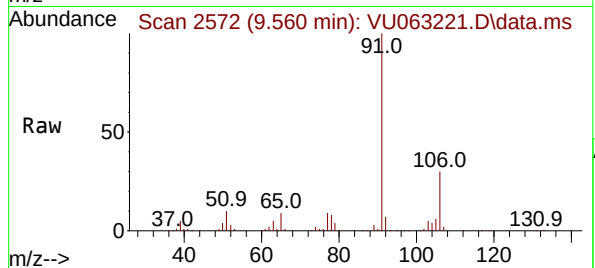
106 29.8 24.2 36.2

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#64

m/p-Xylenes

Concen: 3.954 ug/l

RT: 9.685 min Scan# 2611

Delta R.T. 0.003 min

Lab File: VU063221.D

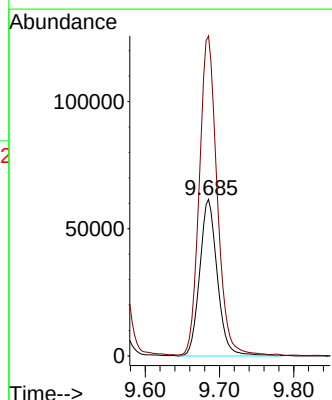
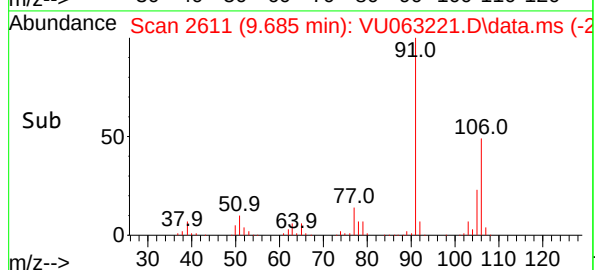
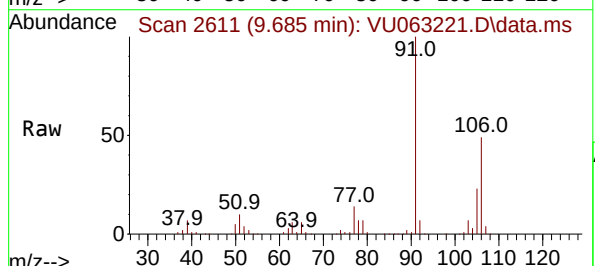
Acq: 10 Feb 2025 13:58

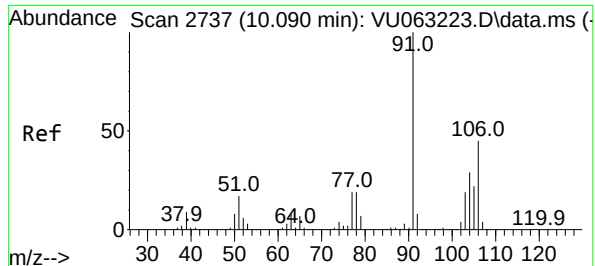
Tgt Ion:106 Resp: 101491

Ion Ratio Lower Upper

106 100

91 205.7 166.9 250.3





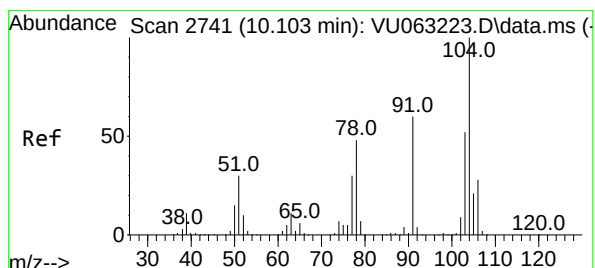
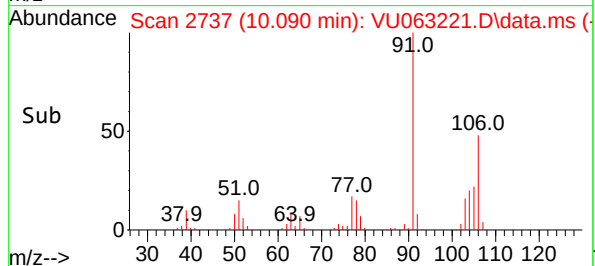
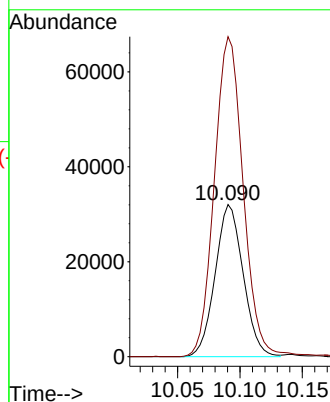
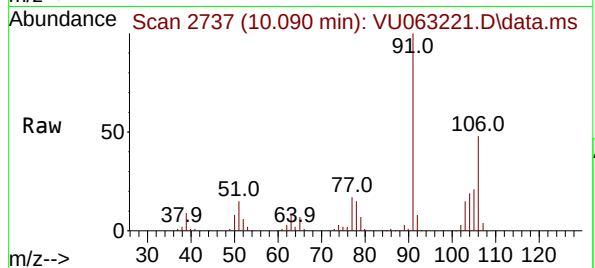
#65
o-Xylene
Concen: 1.995 ug/l
RT: 10.090 min Scan# 2737
Delta R.T. 0.000 min
Lab File: VU063221.D
Acq: 10 Feb 2025 13:58

Instrument :
MSVOA_U
ClientSampleId :
VSTDIC002

Tgt Ion:106 Resp: 5012
Ion Ratio Lower Upper
106 100
91 217.6 110.9 332.9

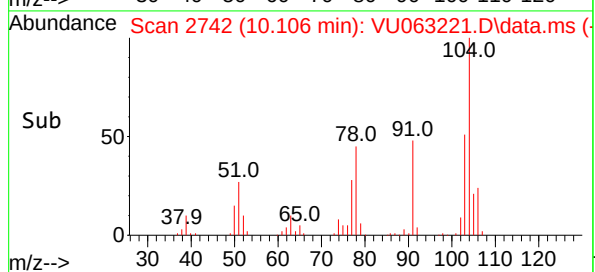
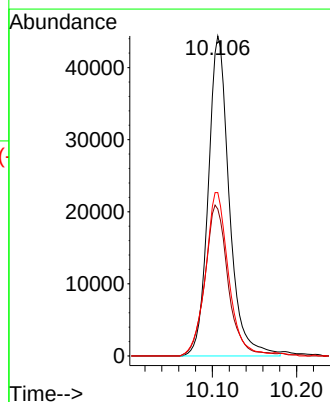
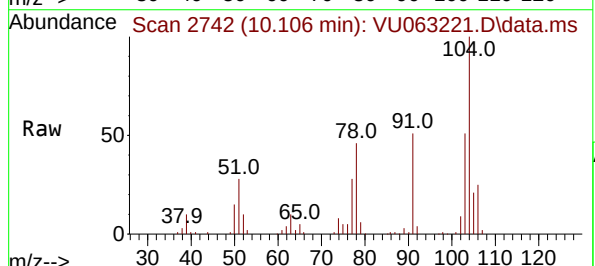
Manual Integrations
APPROVED

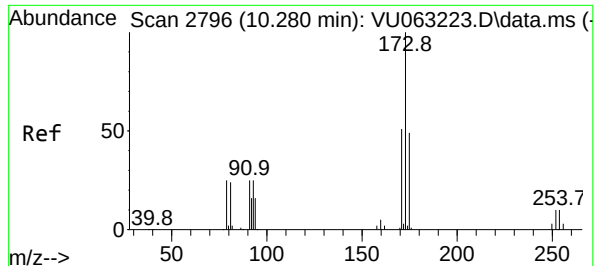
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#66
Styrene
Concen: 1.926 ug/l
RT: 10.106 min Scan# 2742
Delta R.T. 0.003 min
Lab File: VU063221.D
Acq: 10 Feb 2025 13:58

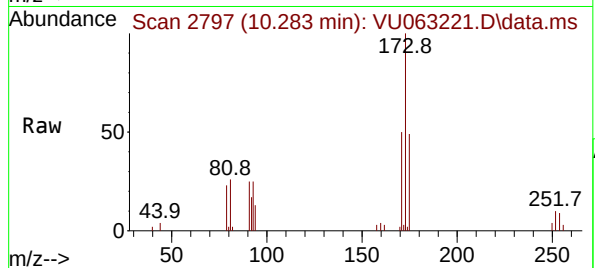
Tgt Ion:104 Resp: 77021
Ion Ratio Lower Upper
104 100
78 52.1 41.2 61.8
103 56.0 44.8 67.2





#67
Bromoform
Concen: 1.981 ug/l
RT: 10.283 min Scan# 21
Delta R.T. 0.003 min
Lab File: VU063221.D
Acq: 10 Feb 2025 13:58

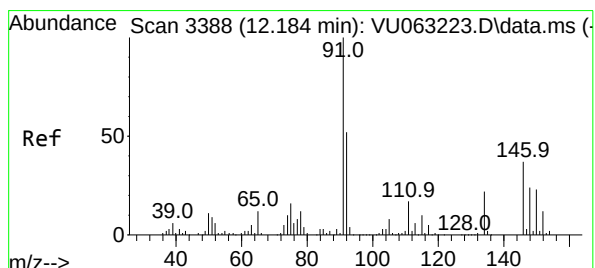
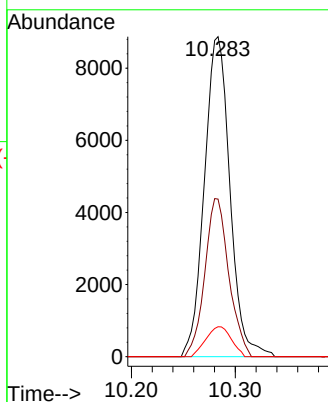
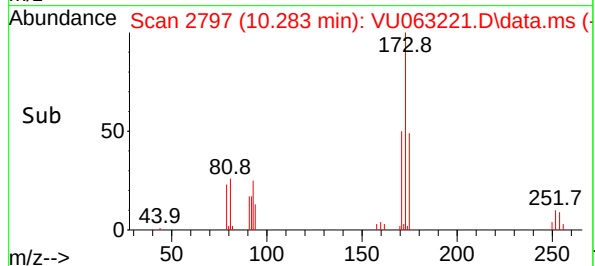
Instrument :
MSVOA_U
ClientSampleId :
VSTDICC002



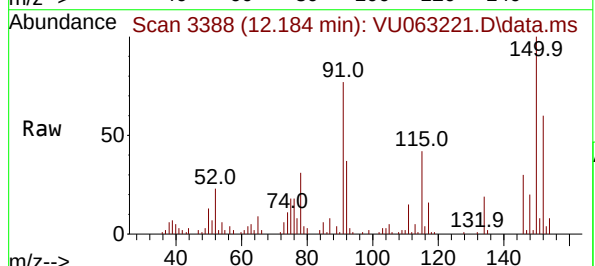
Tgt Ion:173 Resp: 1517
Ion Ratio Lower Upper
173 100
175 46.3 39.0 58.4
254 9.3 7.7 11.5

Manual Integrations
APPROVED

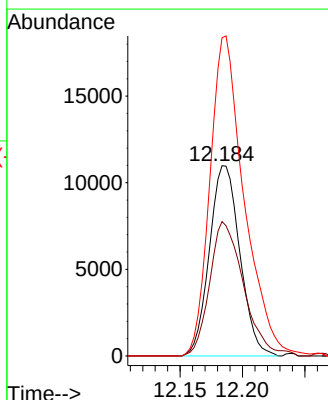
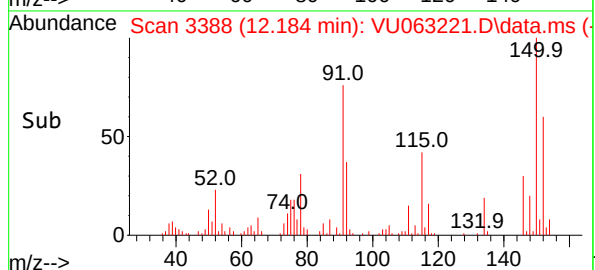
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025

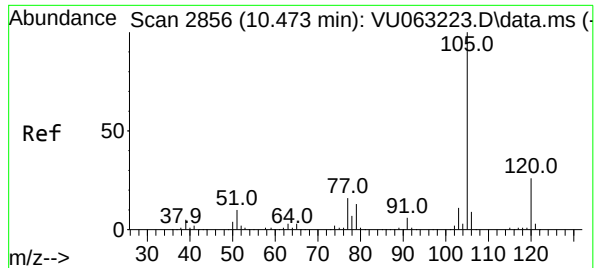


#68
1,2-Dichlorobenzene-d4
Concen: 1.019 ug/l
RT: 12.184 min Scan# 3388
Delta R.T. 0.000 min
Lab File: VU063221.D
Acq: 10 Feb 2025 13:58



Tgt Ion:152 Resp: 18679
Ion Ratio Lower Upper
152 100
115 78.6 0.0 275.2
150 189.0 0.0 658.4





#69

Isopropylbenzene

Concen: 1.965 ug/l

RT: 10.476 min Scan# 2856

Delta R.T. 0.003 min

Lab File: VU063221.D

Acq: 10 Feb 2025 13:58

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC002

Tgt Ion:105 Resp: 11607

Ion Ratio Lower Upper

105 100

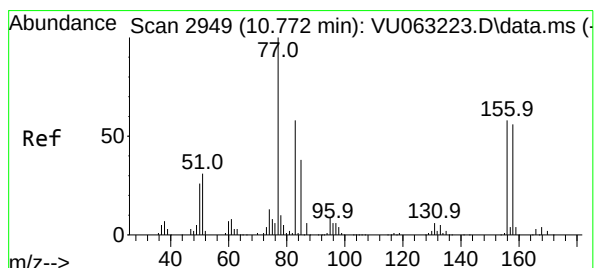
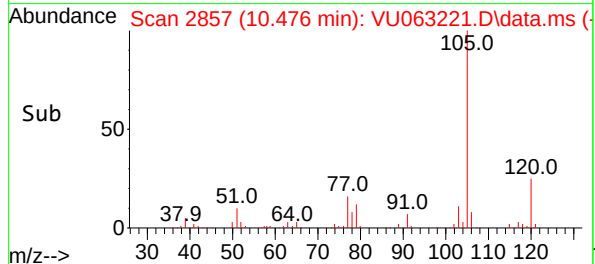
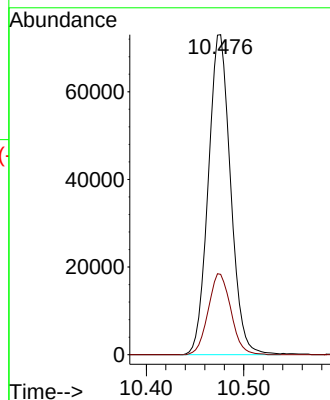
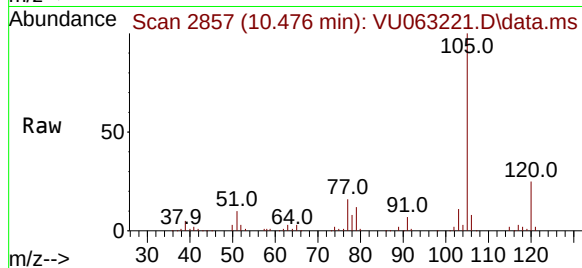
120 25.7 12.8 38.4

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#70

1,1,2,2-Tetrachloroethane

Concen: 2.071 ug/l

RT: 10.772 min Scan# 2949

Delta R.T. 0.000 min

Lab File: VU063221.D

Acq: 10 Feb 2025 13:58

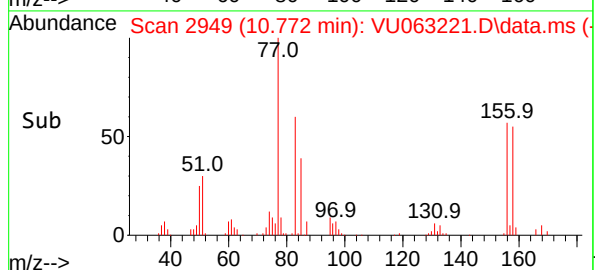
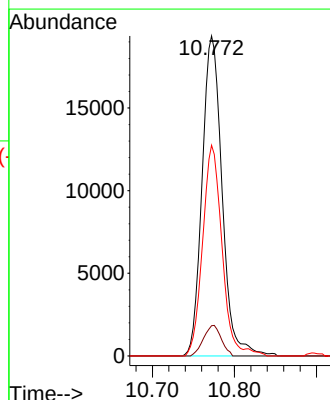
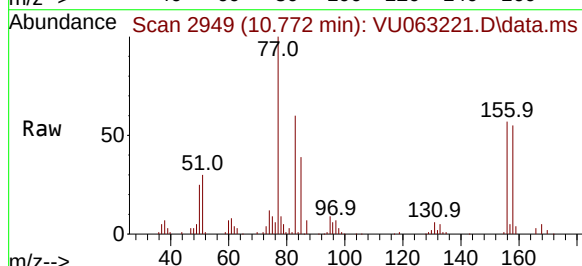
Tgt Ion: 83 Resp: 32740

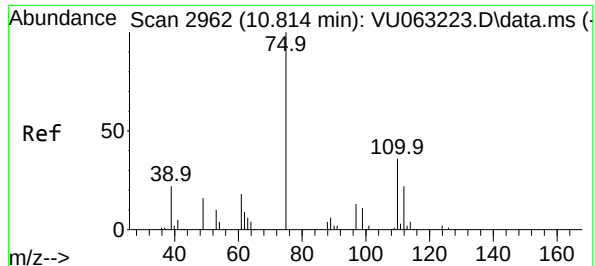
Ion Ratio Lower Upper

83 100

131 8.5 7.4 11.0

85 64.1 51.8 77.8





#71

1,2,3-Trichloropropane

Concen: 2.189 ug/l m

RT: 10.814 min Scan# 2962

Delta R.T. 0.000 min

Lab File: VU063221.D

Acq: 10 Feb 2025 13:58

Instrument :

MSVOA_U

ClientSampleId :

VSTDICC002

Tgt Ion: 75 Resp: 2624

Ion Ratio Lower Upper

75 100

77 0.0 0.0 0.0

110 29.6 0.0 77.0

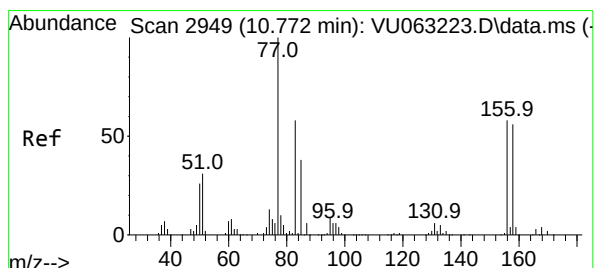
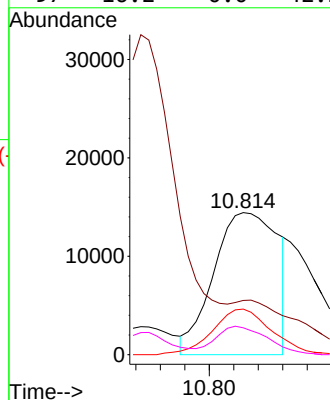
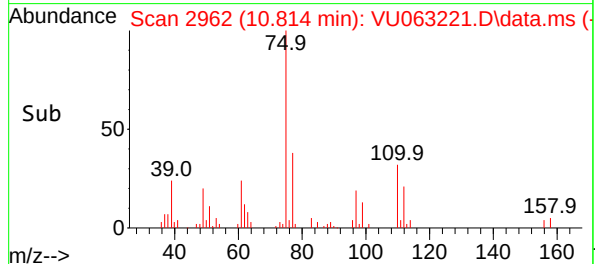
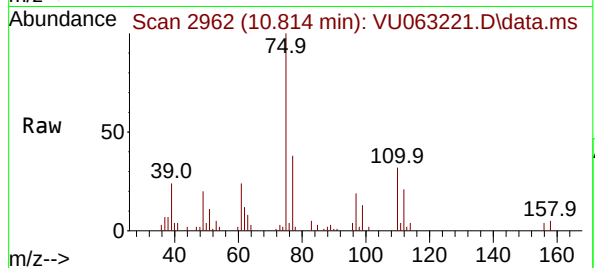
97 16.2 0.0 42.2

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#72

Bromobenzene

Concen: 1.983 ug/l

RT: 10.775 min Scan# 2950

Delta R.T. 0.003 min

Lab File: VU063221.D

Acq: 10 Feb 2025 13:58

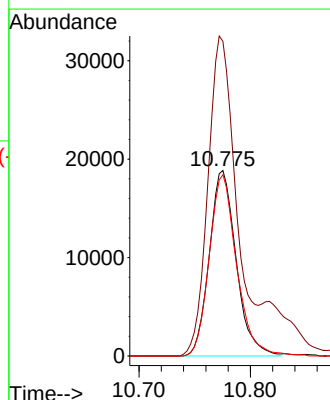
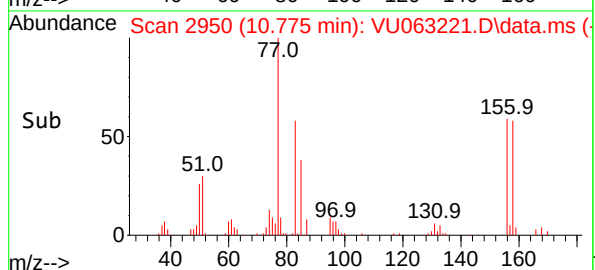
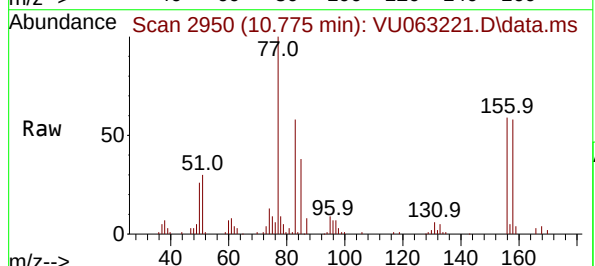
Tgt Ion:156 Resp: 31558

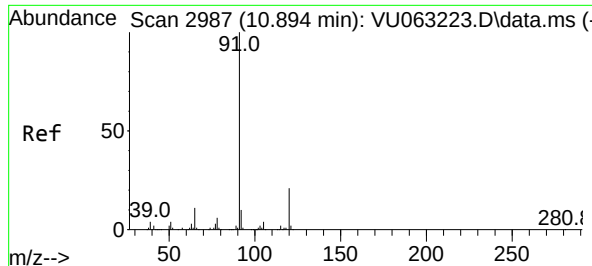
Ion Ratio Lower Upper

156 100

77 179.9 0.0 343.6

158 99.7 0.0 193.0





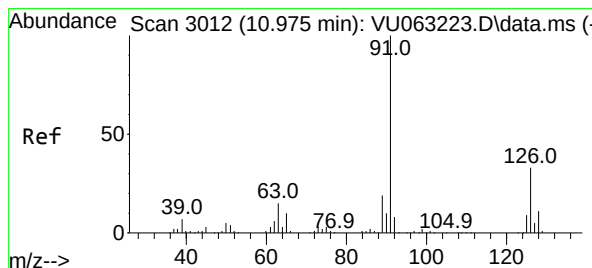
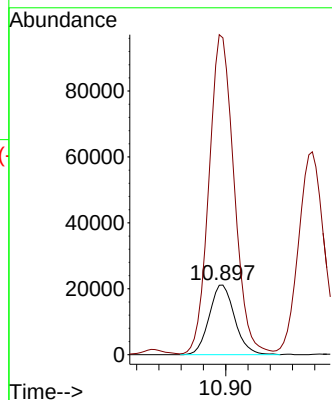
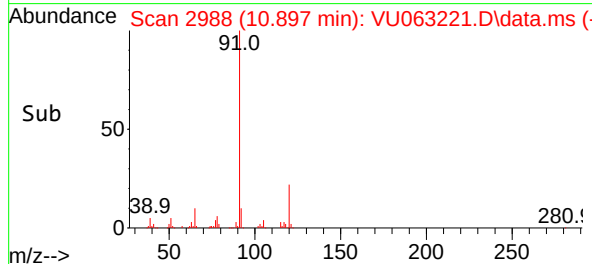
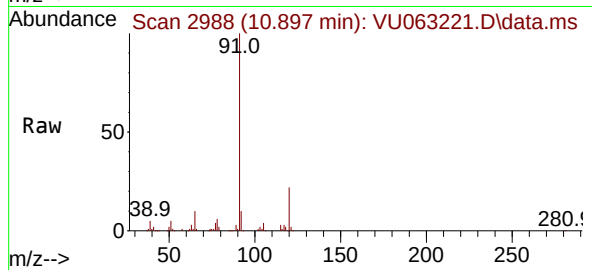
#73
n-propylbenzene
Concen: 1.983 ug/l
RT: 10.897 min Scan# 2987
Delta R.T. 0.003 min
Lab File: VU063221.D
Acq: 10 Feb 2025 13:58

Instrument :
MSVOA_U
ClientSampleId :
VSTDICC002

Tgt Ion:120 Resp: 33538
Ion Ratio Lower Upper
120 100
91 452.1 369.8 554.6

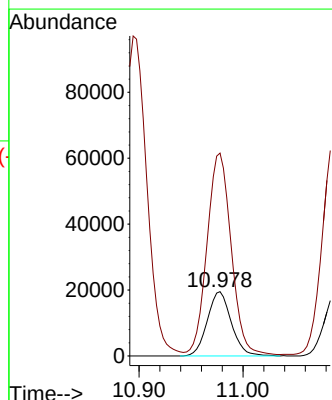
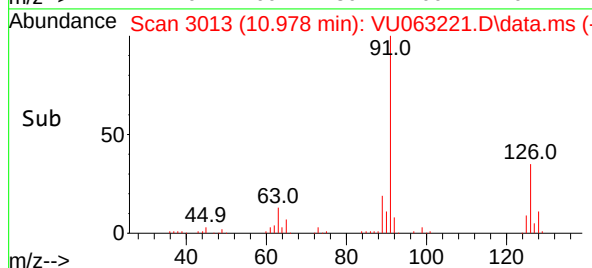
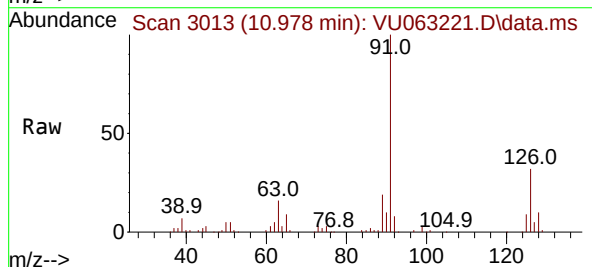
Manual Integrations
APPROVED

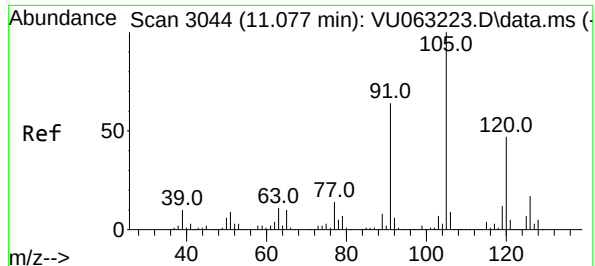
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#74
2-Chlorotoluene
Concen: 2.005 ug/l
RT: 10.978 min Scan# 3013
Delta R.T. 0.003 min
Lab File: VU063221.D
Acq: 10 Feb 2025 13:58

Tgt Ion:126 Resp: 31255
Ion Ratio Lower Upper
126 100
91 317.2 0.0 623.8





#75

1,3,5-Trimethylbenzene

Concen: 2.000 ug/l

RT: 11.078 min Scan# 3044

Delta R.T. 0.000 min

Lab File: VU063221.D

Acq: 10 Feb 2025 13:58

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC002

Tgt Ion:105 Resp: 10946

Ion Ratio Lower Upper

105 100

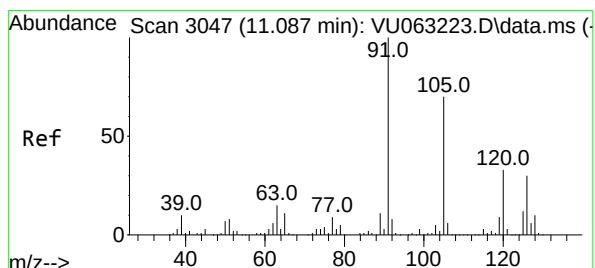
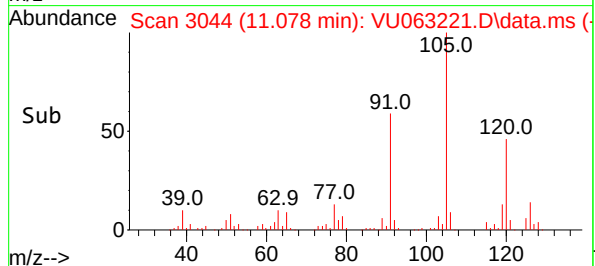
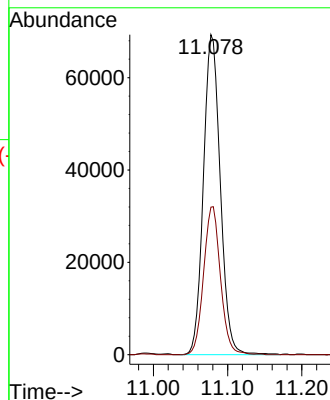
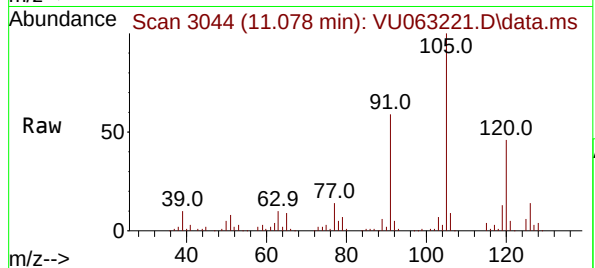
120 46.1 37.3 55.9

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#76

4-Chlorotoluene

Concen: 1.988 ug/l

RT: 11.090 min Scan# 3048

Delta R.T. 0.003 min

Lab File: VU063221.D

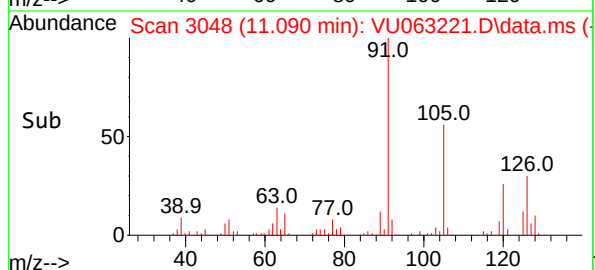
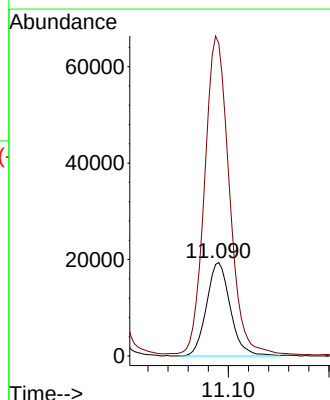
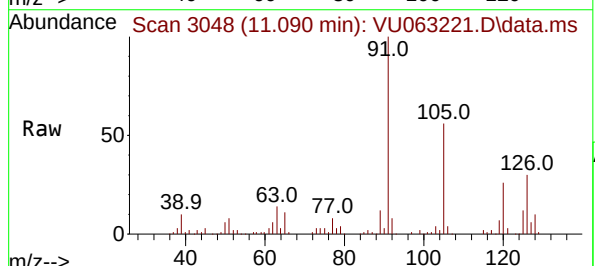
Acq: 10 Feb 2025 13:58

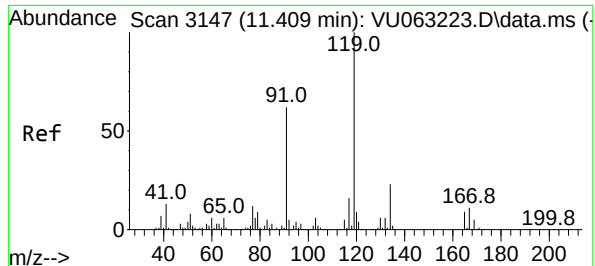
Tgt Ion:126 Resp: 31781

Ion Ratio Lower Upper

126 100

91 355.9 0.0 703.6





#77
tert-Butylbenzene

Concen: 1.988 ug/l

RT: 11.409 min Scan# 3147

Delta R.T. 0.000 min

Lab File: VU063221.D

Acq: 10 Feb 2025 13:58

Instrument :

MSVOA_U

ClientSampleId :

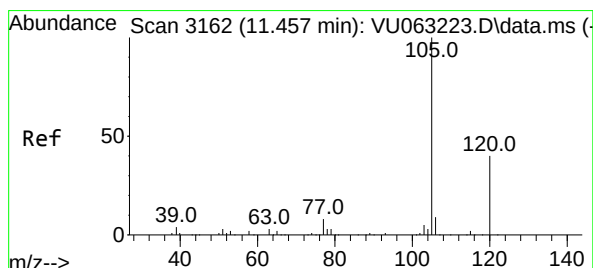
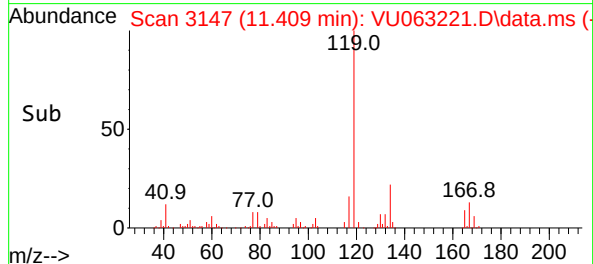
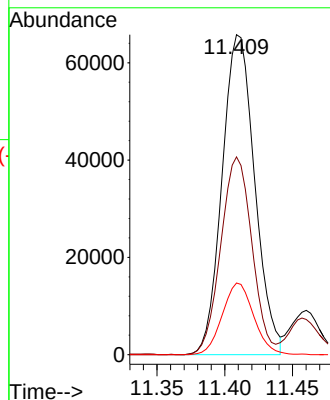
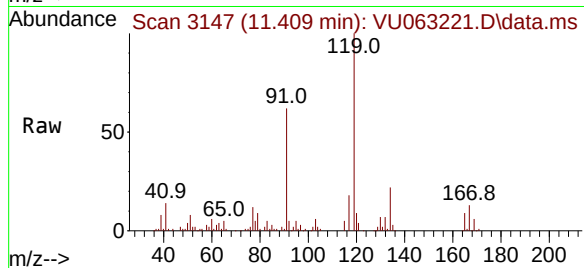
VSTDICC002

Tgt Ion:119 Resp: 110060
Ion Ratio Lower Upper
119 100
91 59.1 29.4 88.3
134 21.7 17.6 26.4

Manual Integrations
APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#78

1,2,4-Trimethylbenzene

Concen: 1.985 ug/l

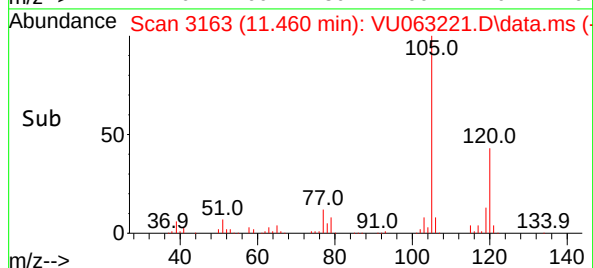
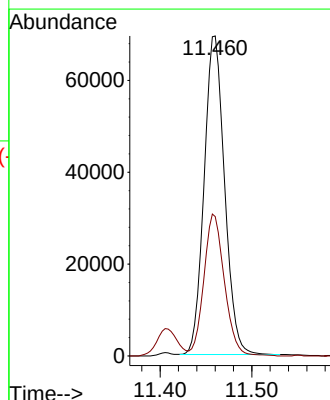
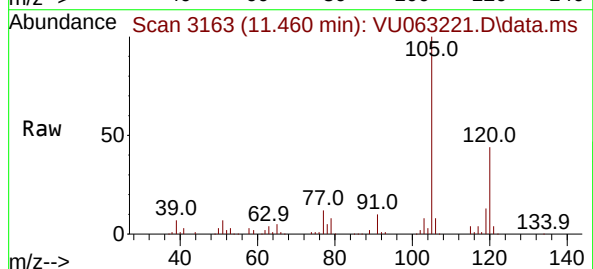
RT: 11.460 min Scan# 3163

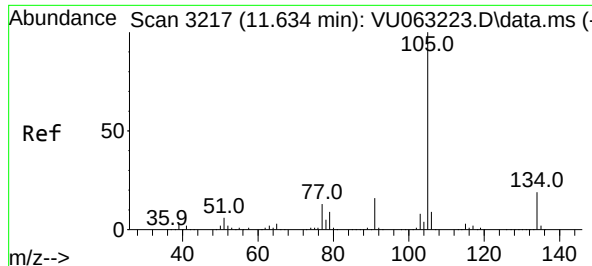
Delta R.T. 0.003 min

Lab File: VU063221.D

Acq: 10 Feb 2025 13:58

Tgt Ion:105 Resp: 107777
Ion Ratio Lower Upper
105 100
120 44.7 21.9 65.7





#79

sec-Butylbenzene

Concen: 1.998 ug/l

RT: 11.634 min Scan# 3217

Delta R.T. 0.000 min

Lab File: VU063221.D

Acq: 10 Feb 2025 13:58

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC002

Tgt Ion:105 Resp: 14080

Ion Ratio Lower Upper

105 100

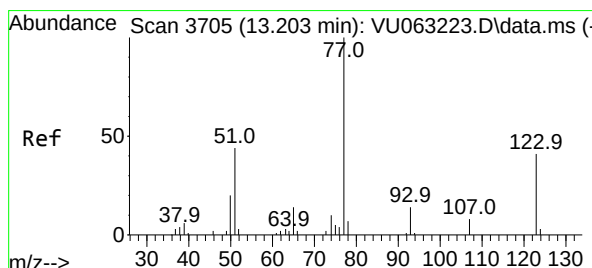
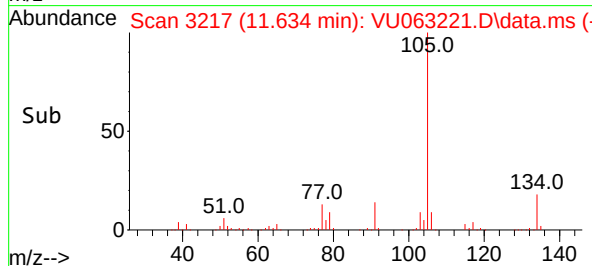
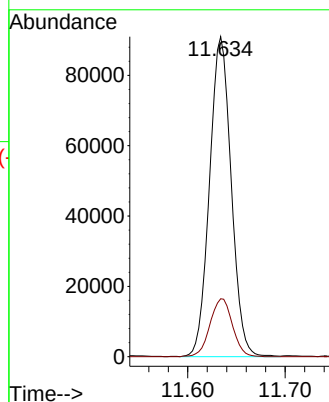
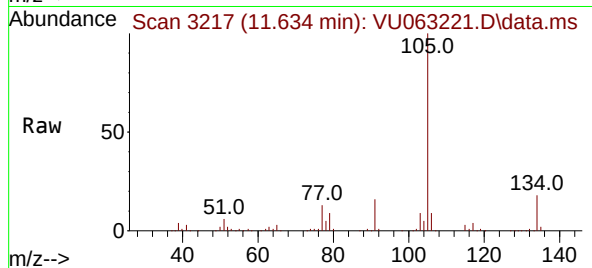
134 18.7 15.1 22.7

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#80

Nitrobenzene

Concen: 10.179 ug/l m

RT: 13.219 min Scan# 3710

Delta R.T. 0.016 min

Lab File: VU063221.D

Acq: 10 Feb 2025 13:58

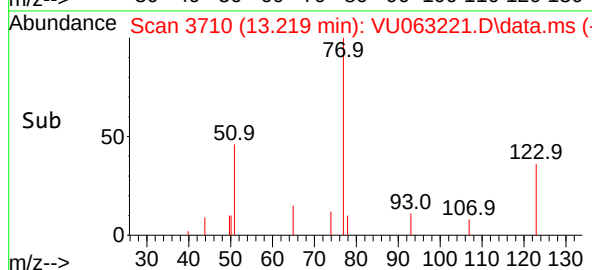
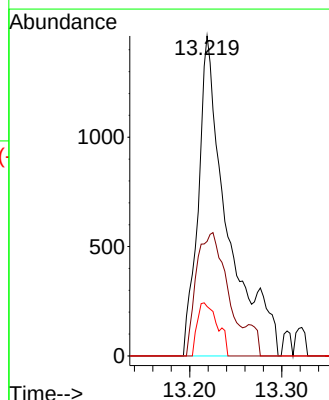
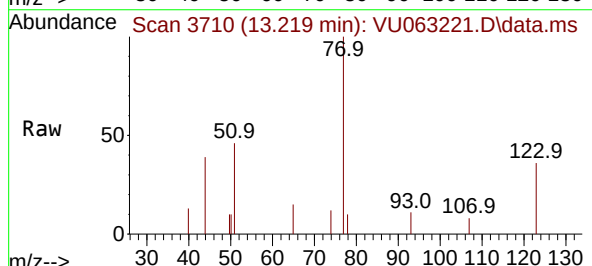
Tgt Ion: 77 Resp: 3216

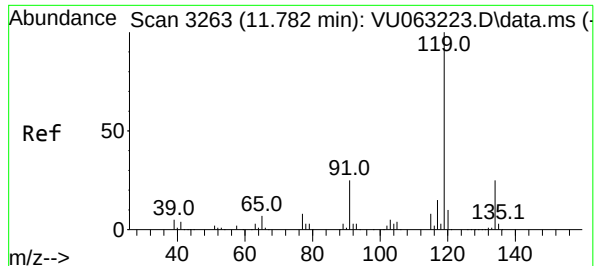
Ion Ratio Lower Upper

77 100

123 32.9 18.9 67.1

65 11.5 11.9 15.1#





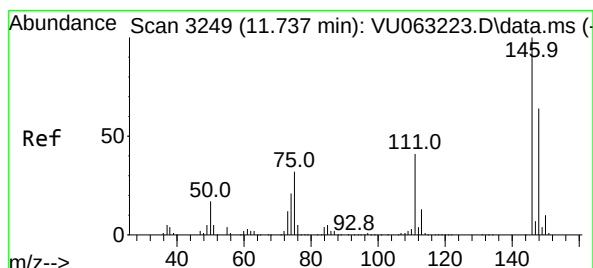
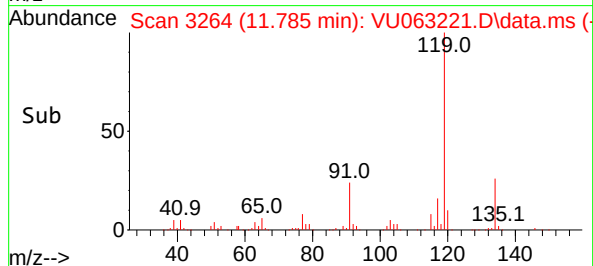
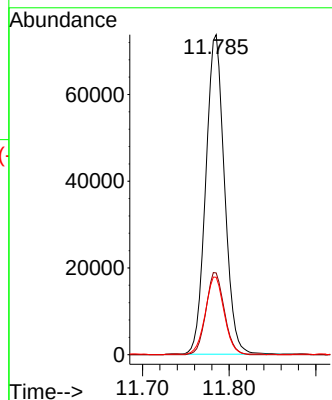
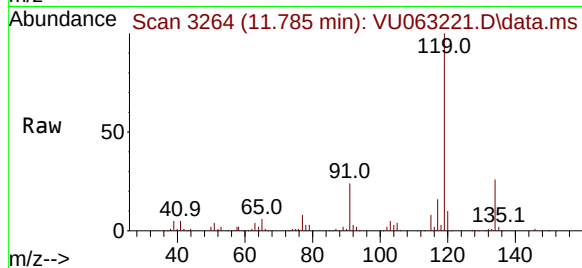
#81
p-Isopropyltoluene
Concen: 1.984 ug/l
RT: 11.785 min Scan# 31
Delta R.T. 0.003 min
Lab File: VU063221.D
Acq: 10 Feb 2025 13:58

Instrument :
MSVOA_U
ClientSampleId :
VSTDICC002

Tgt Ion:119 Resp: 110370
Ion Ratio Lower Upper
119 100
134 25.2 20.3 30.5
91 24.2 19.4 29.2

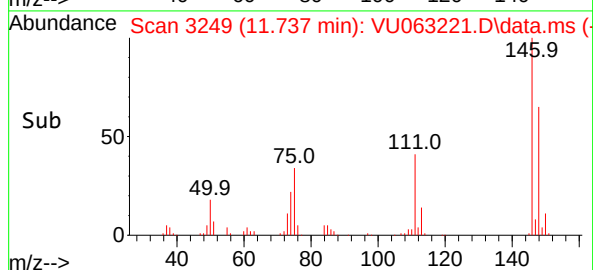
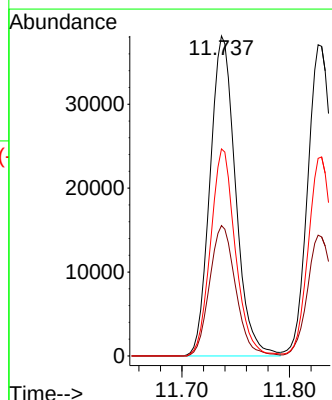
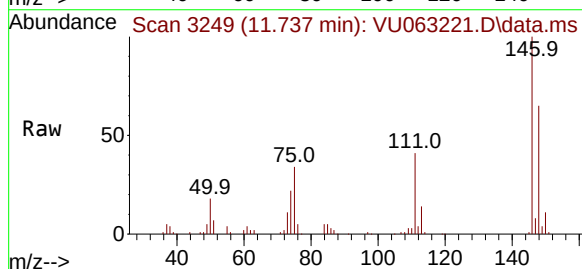
Manual Integrations
APPROVED

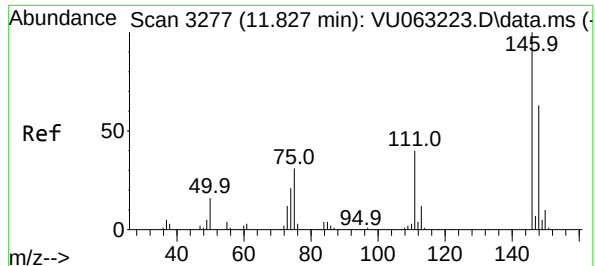
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#82
1,3-Dichlorobenzene
Concen: 2.038 ug/l
RT: 11.737 min Scan# 3249
Delta R.T. 0.000 min
Lab File: VU063221.D
Acq: 10 Feb 2025 13:58

Tgt Ion:146 Resp: 62914
Ion Ratio Lower Upper
146 100
111 41.4 32.8 49.2
148 63.0 51.1 76.7





#83

1,4-Dichlorobenzene

Concen: 2.055 ug/l

RT: 11.827 min Scan# 3277

Delta R.T. 0.000 min

Lab File: VU063221.D

Acq: 10 Feb 2025 13:58

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC002

Tgt Ion:146 Resp: 62030

Ion Ratio Lower Upper

146 100

111 39.9 32.1 48.1

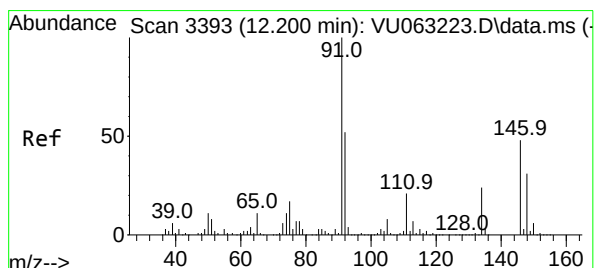
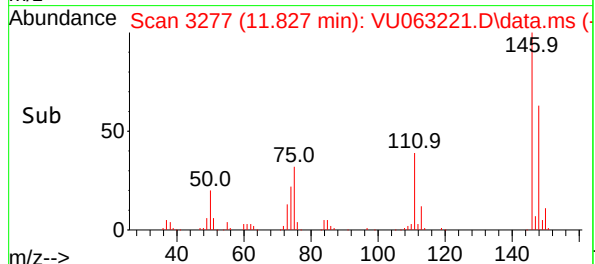
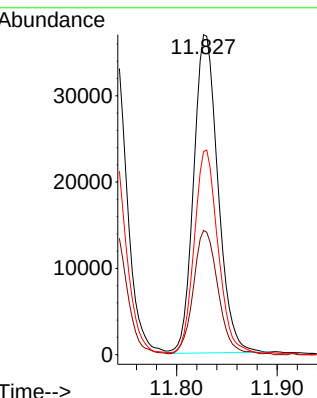
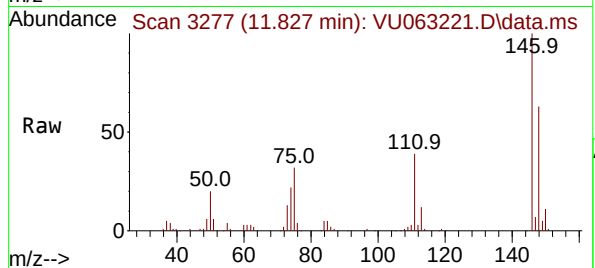
148 62.2 50.2 75.4

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#84

n-Butylbenzene

Concen: 1.933 ug/l

RT: 12.200 min Scan# 3393

Delta R.T. 0.000 min

Lab File: VU063221.D

Acq: 10 Feb 2025 13:58

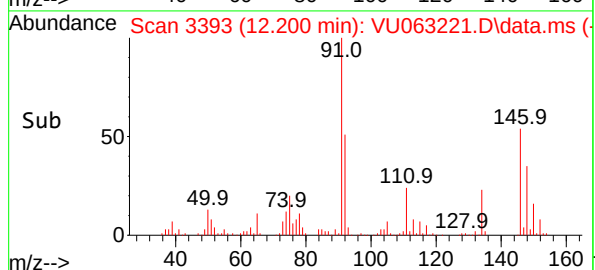
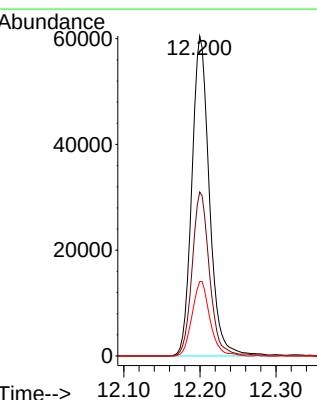
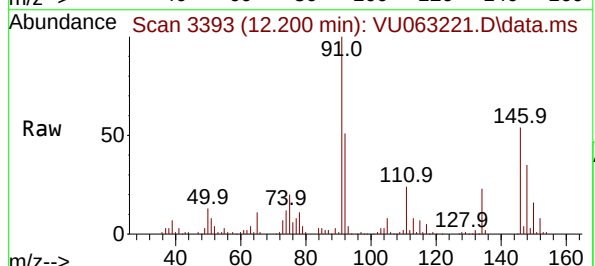
Tgt Ion: 91 Resp: 96950

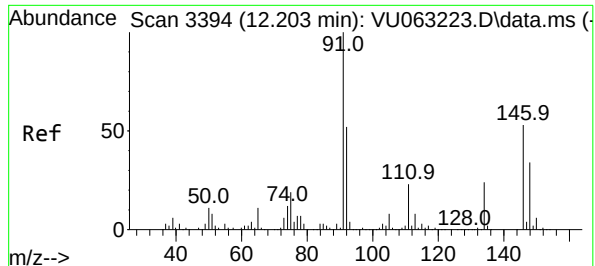
Ion Ratio Lower Upper

91 100

92 51.1 41.8 62.8

134 23.6 18.6 28.0





#85

1,2-Dichlorobenzene

Concen: 2.057 ug/l

RT: 12.203 min Scan# 3394

Delta R.T. 0.000 min

Lab File: VU063221.D

Acq: 10 Feb 2025 13:58

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC002

Tgt Ion:146 Resp: 6101

Ion Ratio Lower Upper

146 100

111 42.9 21.9 65.7

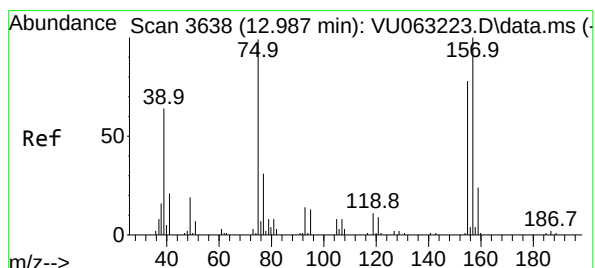
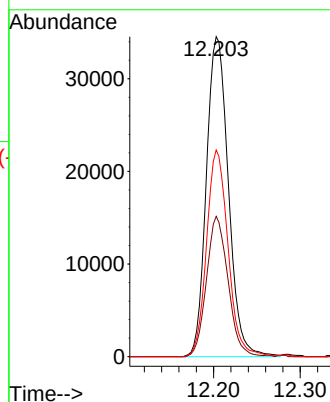
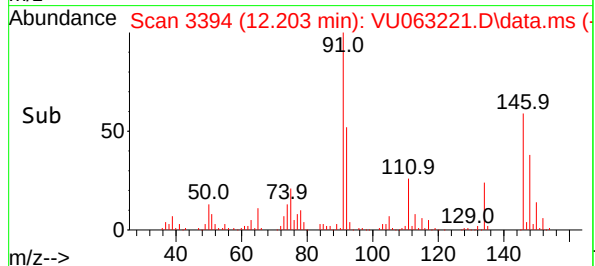
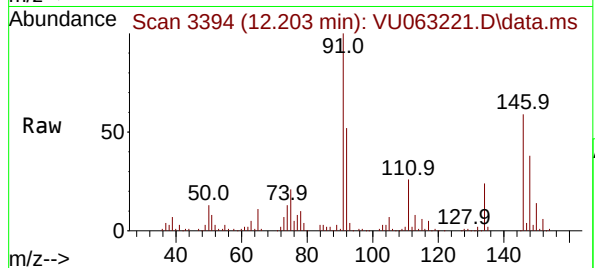
148 62.9 32.3 96.9

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#86

1,2-Dibromo-3-Chloropropane

Concen: 1.894 ug/l

RT: 12.994 min Scan# 3640

Delta R.T. 0.006 min

Lab File: VU063221.D

Acq: 10 Feb 2025 13:58

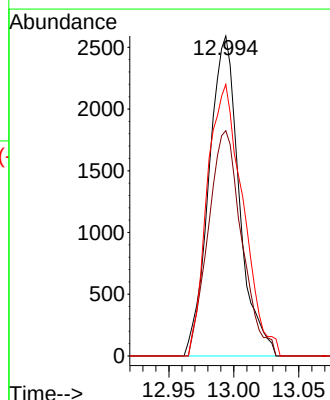
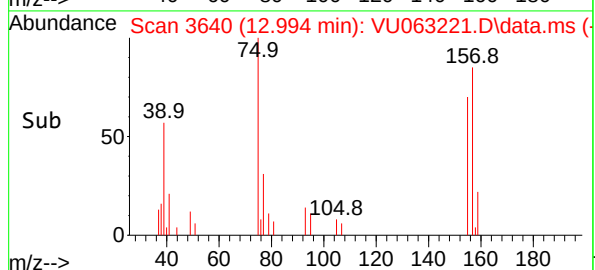
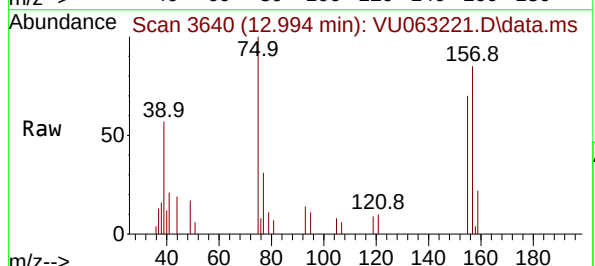
Tgt Ion: 75 Resp: 4203

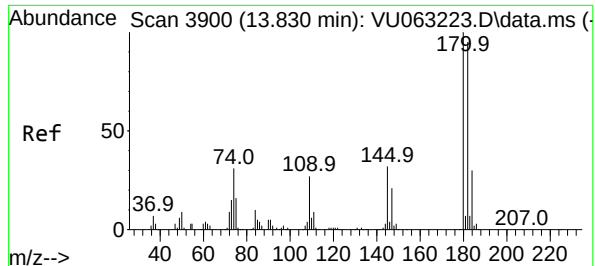
Ion Ratio Lower Upper

75 100

155 77.8 63.5 95.3

157 99.9 81.8 122.6





#87

1,2,4-Trichlorobenzene

Concen: 1.867 ug/l

RT: 13.836 min Scan# 3900

Delta R.T. 0.006 min

Lab File: VU063221.D

Acq: 10 Feb 2025 13:58

Instrument :

MSVOA_U

ClientSampleId :

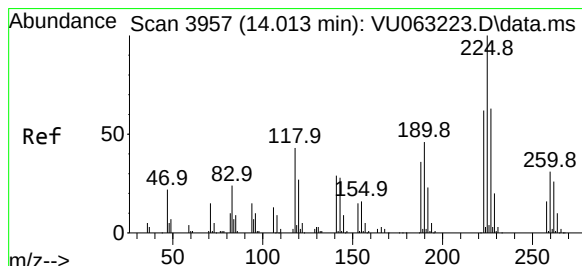
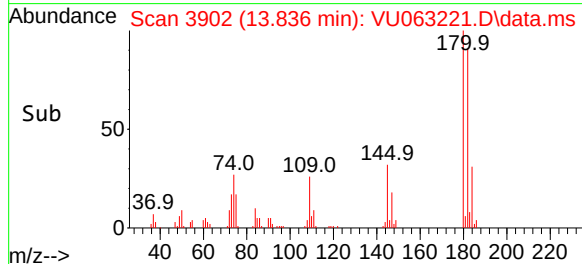
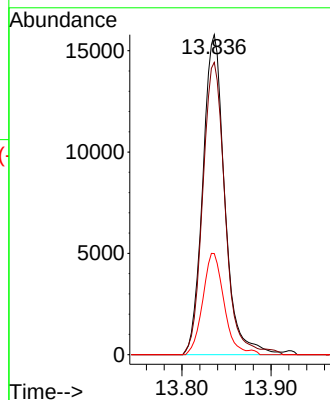
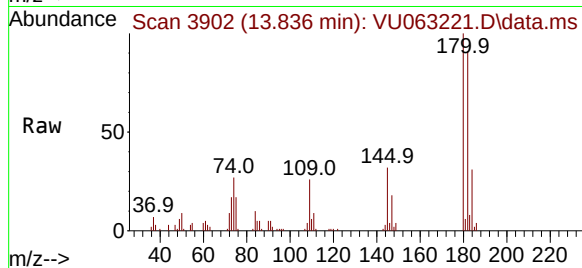
VSTDICC002

Tgt Ion:180	Resp:	27020
Ion Ratio	Lower	Upper
180	100	
182	93.1	76.6 115.0
145	30.9	25.4 38.2

Manual Integrations
APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#88

Hexachlorobutadiene

Concen: 2.094 ug/l

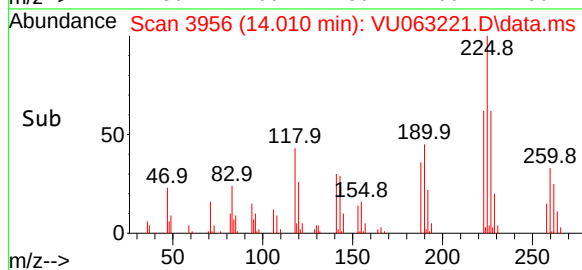
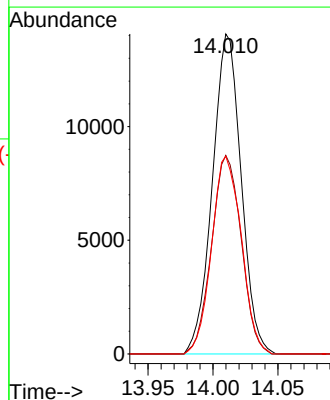
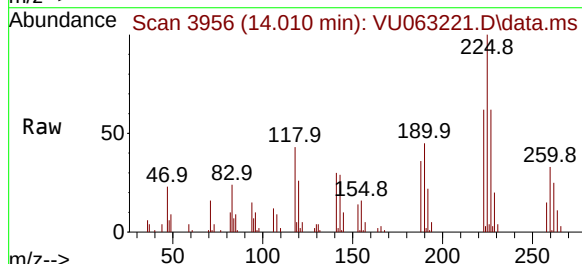
RT: 14.010 min Scan# 3956

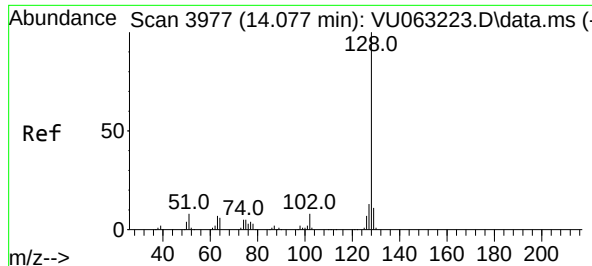
Delta R.T. -0.003 min

Lab File: VU063221.D

Acq: 10 Feb 2025 13:58

Tgt Ion:225	Resp:	21652
Ion Ratio	Lower	Upper
225	100	
223	64.0	49.5 74.3
227	63.7	51.0 76.4





#89
Naphthalene

Concen: 1.891 ug/l

RT: 14.084 min Scan# 3977

Delta R.T. 0.006 min

Lab File: VU063221.D

Acq: 10 Feb 2025 13:58

Instrument :

MSVOA_U

ClientSampleId :

VSTDICC002

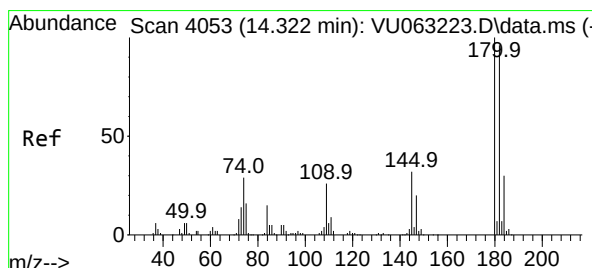
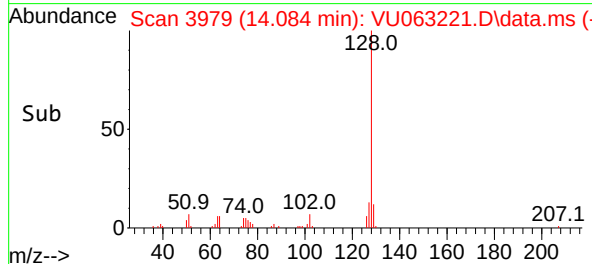
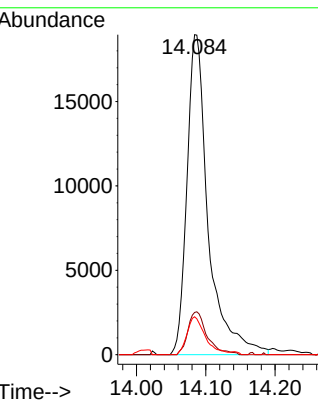
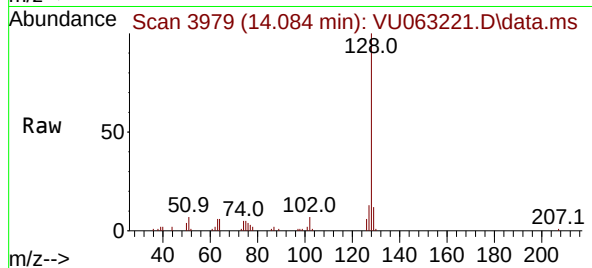
Tgt Ion:	128	Resp:	4045
Ion Ratio	Lower	Upper	
128	100		
127	12.1	10.6	16.0
129	10.2	8.6	13.0

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#90

1,2,3-Trichlorobenzene

Concen: 1.801 ug/l

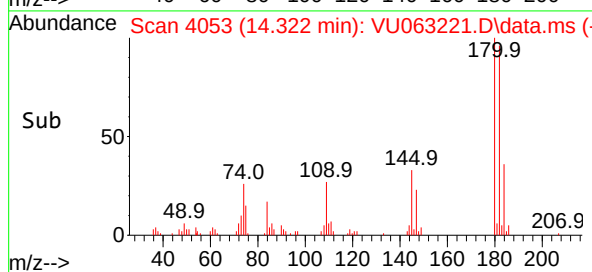
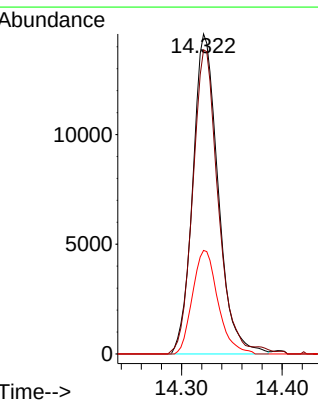
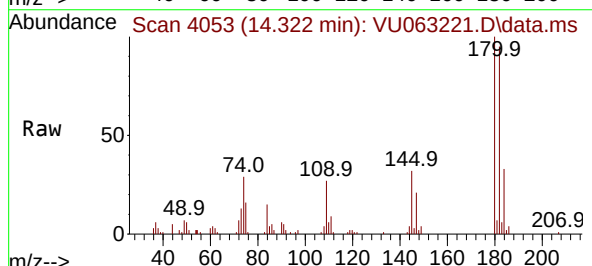
RT: 14.322 min Scan# 4053

Delta R.T. 0.000 min

Lab File: VU063221.D

Acq: 10 Feb 2025 13:58

Tgt Ion:	180	Resp:	25501
Ion Ratio	Lower	Upper	
180	100		
182	96.0	78.2	117.2
145	32.5	26.1	39.1



Data Path : Z:\voasrv\HPCHEM1\MSVOA_U\Data\VU021025\
 Data File : VU063222.D
 Acq On : 10 Feb 2025 14:23
 Operator : MD/SY
 Sample : VSTDICC005
 Misc : 25.0mL/MSVOA_U/WATER
 ALS Vial : 6 Sample Multiplier: 1

Instrument :

MSVOA_U

ClientSampleId :

VSTDICC005

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025

Quant Time: Feb 11 03:59:30 2025

Quant Method : Z:\voasrv\HPCHEM1\MSVOA_U\Method\524U021025DW.M

Quant Title : METHOD 524.2 VOLATILES DRINKING WATER

QLast Update : Tue Feb 11 03:56:39 2025

Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	6.103	96	55729	1.000	ug/l	# 0.00
System Monitoring Compounds						
57) 4-Bromofluorobenzene	10.624	95	17913	0.974	ug/l	0.00
Spiked Amount 1.000			Recovery	=	97.000%	
68) 1,2-Dichlorobenzene-d4	12.184	152	18704	0.978	ug/l	0.00
Spiked Amount 1.000			Recovery	=	98.000%	
Target Compounds						
					Qvalue	
2) Dichlorodifluoromethane	1.380	85	90512	4.999	ug/l	99
3) Chloromethane	1.518	50	102545	4.918	ug/l	99
4) Vinyl Chloride	1.599	62	104693	5.075	ug/l	99
5) Bromomethane	1.843	94	52801	5.534	ug/l	99
6) Chloroethane	1.924	64	62097	4.779	ug/l	98
7) Trichlorofluoromethane	2.129	101	123320	5.044	ug/l	100
8) 1,1,2-Trichloro-1,2,2-...	2.570	101	69588	5.015	ug/l	99
9) 1,1-Dichloroethene	2.567	96	69679	4.928	ug/l	96
10) Iodomethane	2.708	142	114428	5.148	ug/l	100
11) Allyl Chloride	2.911	41	101481	4.996	ug/l	100
12) Acrylonitrile	3.306	53	33591	10.453	ug/l	99
13) Acetone	2.612	43	58550	23.349	ug/l	96
14) Carbon Disulfide	2.782	76	242244	4.900	ug/l	100
15) Methylene Chloride	3.033	84	86216	4.936	ug/l	99
16) trans-1,2-Dichloroethene	3.338	96	80123	4.965	ug/l	98
17) 1,1-Dichloroethane	3.853	63	152899	5.027	ug/l	100
18) 2-Butanone	4.689	43	98391	24.289	ug/l	97
19) Cyclohexane	5.374	56	127410m	5.213	ug/l	
20) Methylcyclohexane	6.750	83	128499	5.302	ug/l	100
21) 2,2-Dichloropropane	4.647	77	117171	4.938	ug/l	98
22) cis-1,2-Dichloroethene	4.653	96	87987	5.046	ug/l	98
23) Diethyl Ether	2.364	59	60657	5.000	ug/l	97
24) tert-Butyl Alcohol	3.161	59	61281	45.943	ug/l	98
25) Methyl tert-Butyl Ether	3.348	73	178876	5.066	ug/l	99
26) Bromochloromethane	4.959	128	38617	5.067	ug/l	99
27) Chloroform	5.071	83	155011	5.050	ug/l	99
28) 1,1,1-Trichloroethane	5.300	97	127899	5.144	ug/l	99
29) 1,1-Dichloropropene	5.512	75	112514	5.052	ug/l	99
30) Carbon Tetrachloride	5.509	117	106762	5.007	ug/l	97
31) Isopropyl Ether	3.975	45	218715	5.037	ug/l	97
32) Ethyl-t-butyl ether	4.486	59	202182	5.120	ug/l	100
33) Tert-Amyl methyl ether	5.927	73	177493	5.144	ug/l	98
34) Propionitrile	4.759	54	31294	24.919	ug/l	96
35) Benzene	5.759	78	349985	5.111	ug/l	100
36) 1,2-Dichloroethane	5.779	62	99553	5.037	ug/l	99
37) Trichloroethene	6.531	130	80810	4.962	ug/l	93
38) 1,2-Dichloropropane	6.779	63	90072	5.026	ug/l	98
39) Methacrylonitrile	4.962	41	24242	5.404	ug/l	97
40) Methyl acrylate	4.840	55	43877m	5.358	ug/l	
41) Tetrahydrofuran	5.042	42	24329	9.229	ug/l	97
42) 1-Chlorobutane	5.444	56	160975	5.283	ug/l	98
43) Dibromomethane	6.907	93	45659	5.031	ug/l	97
44) Bromodichloromethane	7.094	83	109612	5.189	ug/l	99

Data Path : Z:\voasrv\HPCHEM1\MSVOA_U\Data\VU021025\
 Data File : VU063222.D
 Acq On : 10 Feb 2025 14:23
 Operator : MD/SY
 Sample : VSTDICC005
 Misc : 25.0mL/MSVOA_U/WATER
 ALS Vial : 6 Sample Multiplier: 1

Instrument :
 MSVOA_U
 ClientSampleId :
 VSTDICC005

Manual Integrations
 APPROVED

Reviewed By :Amit Patel 02/12/2025
 Supervised By :Mahesh Dadoda 02/12/2025

Quant Time: Feb 11 03:59:30 2025
 Quant Method : Z:\voasrv\HPCHEM1\MSVOA_U\Method\524U021025DW.M
 Quant Title : METHOD 524.2 VOLATILES DRINKING WATER
 QLast Update : Tue Feb 11 03:56:39 2025
 Response via : Initial Calibration

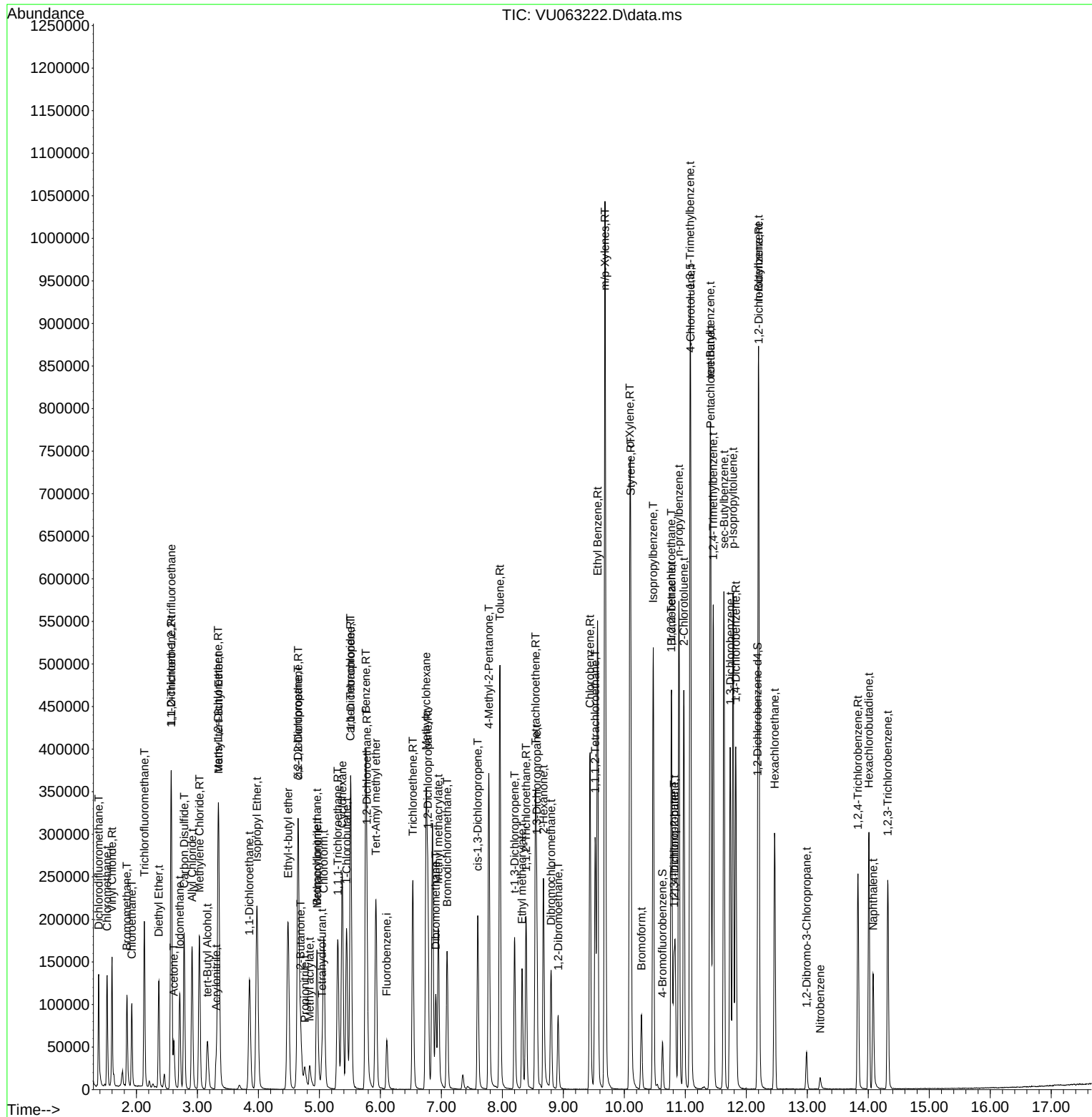
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
45) 4-Methyl-2-Pentanone	7.779	43	245466	25.799	ug/l	99
46) t-1,4-Dichloro-2-butene	10.824	75	40225m	8.544	ug/l	
47) Methyl methacrylate	6.949	69	82725	10.822	ug/l	97
48) Ethyl methacrylate	8.322	69	75186	5.238	ug/l	99
49) Toluene	7.959	92	207542	5.270	ug/l	100
50) t-1,3-Dichloropropene	8.200	75	100975	5.221	ug/l	99
51) cis-1,3-Dichloropropene	7.595	75	121107	5.070	ug/l	96
52) 1,1,2-Trichloroethane	8.386	97	61701	5.042	ug/l	98
53) 1,3-Dichloropropane	8.563	76	111566	5.136	ug/l	99
54) 2-Hexanone	8.672	43	163849	25.235	ug/l	98
55) Dibromochloromethane	8.798	129	71240	5.061	ug/l	98
56) 1,2-Dibromoethane	8.914	107	58284	5.079	ug/l	99
58) Tetrachloroethene	8.544	164	69703	5.194	ug/l	97
59) Chlorobenzene	9.438	112	215989	5.198	ug/l	99
60) 1,1,1,2-Tetrachloroethane	9.521	131	74952	5.018	ug/l	98
61) Pentachloroethane	11.415	117	66930	5.016	ug/l	96
62) Hexachloroethane	12.463	117	58399	4.947	ug/l	99
63) Ethyl Benzene	9.560	91	379921	5.301	ug/l	99
64) m/p-Xylenes	9.682	106	293404	10.960	ug/l	99
65) o-Xylene	10.090	106	139940	5.340	ug/l	98
66) Styrene	10.103	104	227199	5.448	ug/l	99
67) Bromoform	10.280	173	40369	5.053	ug/l	99
69) Isopropylbenzene	10.473	105	329990	5.356	ug/l	99
70) 1,1,2,2-Tetrachloroethane	10.769	83	81338	4.932	ug/l	99
71) 1,2,3-Trichloropropane	10.814	75	59228m	4.736	ug/l	
72) Bromobenzene	10.772	156	85960	5.178	ug/l	98
73) n-propylbenzene	10.894	120	95937	5.439	ug/l	99
74) 2-Chlorotoluene	10.975	126	87769	5.399	ug/l	98
75) 1,3,5-Trimethylbenzene	11.078	105	313345	5.489	ug/l	100
76) 4-Chlorotoluene	11.087	126	89247	5.353	ug/l	99
77) tert-Butylbenzene	11.409	119	299259	5.183	ug/l	99
78) 1,2,4-Trimethylbenzene	11.457	105	313777	5.539	ug/l	99
79) sec-Butylbenzene	11.634	105	394157	5.362	ug/l	99
80) Nitrobenzene	13.209	77	10183m	23.083	ug/l	
81) p-Isopropyltoluene	11.782	119	316807	5.461	ug/l	100
82) 1,3-Dichlorobenzene	11.737	146	164073	5.096	ug/l	99
83) 1,4-Dichlorobenzene	11.827	146	165157	5.244	ug/l	99
84) n-Butylbenzene	12.200	91	276461	5.285	ug/l	98
85) 1,2-Dichlorobenzene	12.203	146	156956	5.072	ug/l	100
86) 1,2-Dibromo-3-Chloropr...	12.987	75	12084	5.220	ug/l	96
87) 1,2,4-Trichlorobenzene	13.830	180	78516	5.203	ug/l	98
88) Hexachlorobutadiene	14.010	225	53269	4.939	ug/l	99
89) Naphthalene	14.081	128	122840	4.286	ug/l	99
90) 1,2,3-Trichlorobenzene	14.319	180	76620	5.189	ug/l	98

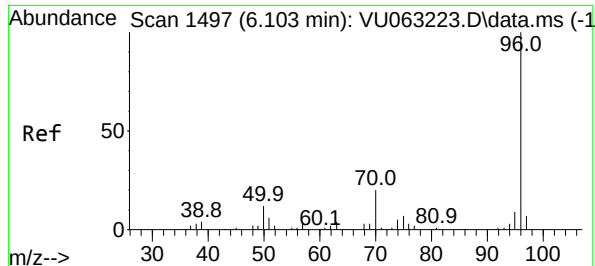
(#) = qualifier out of range (m) = manual integration (+) = signals summed

Instrument :
MSVOA_U
ClientSampleId :
VSTDICC005

Manual Integrations

Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025





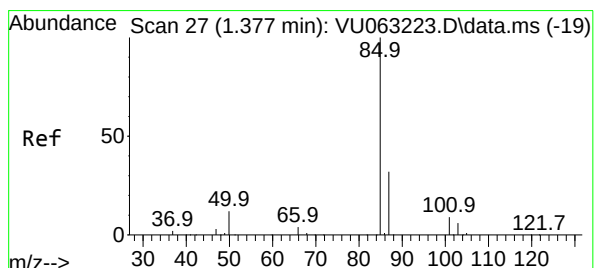
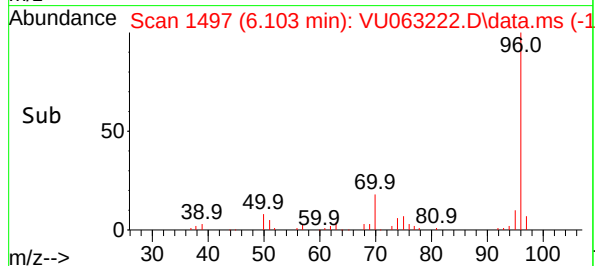
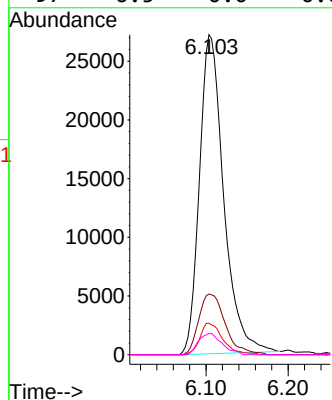
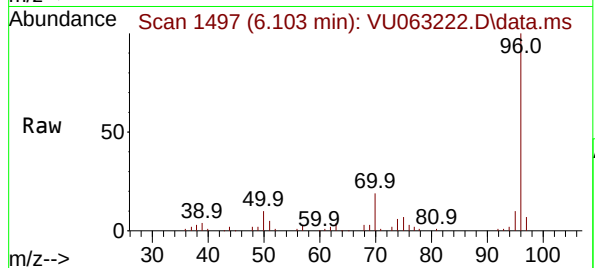
#1
Fluorobenzene
Concen: 1.000 ug/l
RT: 6.103 min Scan# 1497
Delta R.T. 0.000 min
Lab File: VU063222.D
Acq: 10 Feb 2025 14:23

Instrument :
MSVOA_U
ClientSampleId :
VSTDIC005

Tgt Ion: 96 Resp: 55729
Ion Ratio Lower Upper
96 100
70 20.8 15.6 23.4
95 9.3 7.3 10.9
97 6.5 0.0 0.0#

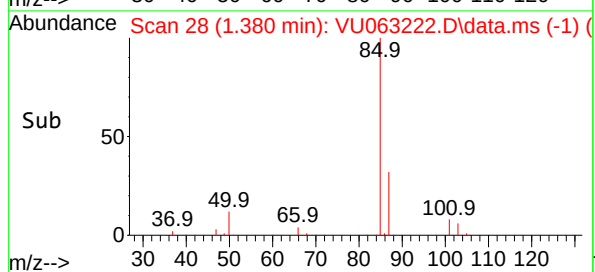
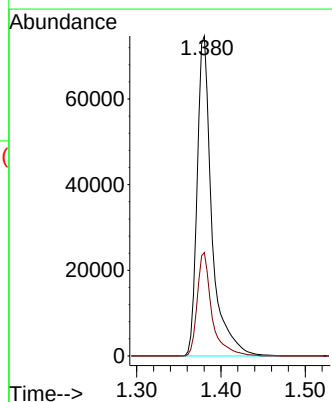
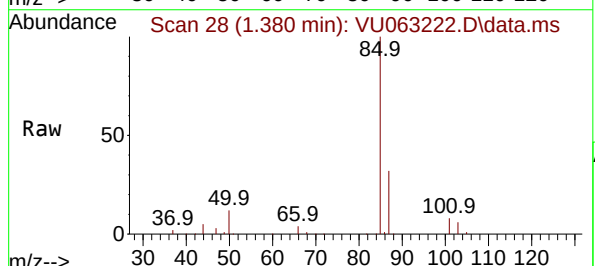
Manual Integrations
APPROVED

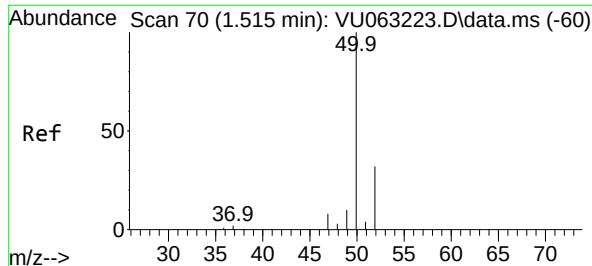
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#2
Dichlorodifluoromethane
Concen: 4.999 ug/l
RT: 1.380 min Scan# 28
Delta R.T. 0.003 min
Lab File: VU063222.D
Acq: 10 Feb 2025 14:23

Tgt Ion: 85 Resp: 90512
Ion Ratio Lower Upper
85 100
87 32.3 16.0 48.0





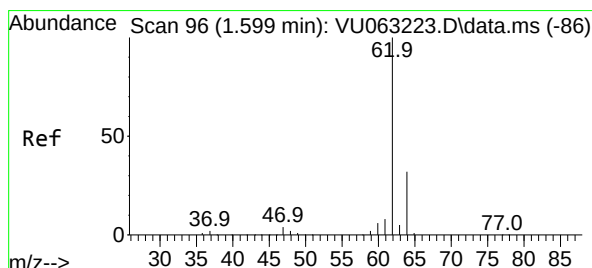
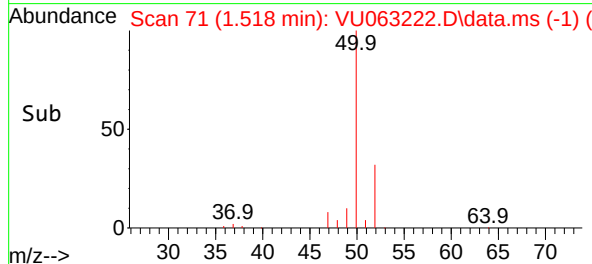
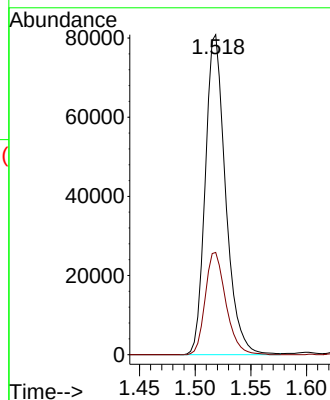
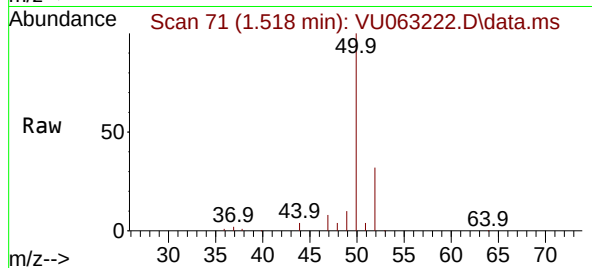
#3
Chloromethane
Concen: 4.918 ug/l
RT: 1.518 min Scan# 70
Delta R.T. 0.003 min
Lab File: VU063222.D
Acq: 10 Feb 2025 14:23

Instrument :
MSVOA_U
ClientSampleId :
VSTDICC005

Tgt Ion: 50 Resp: 10254
Ion Ratio Lower Upper
50 100
52 31.9 25.8 38.8

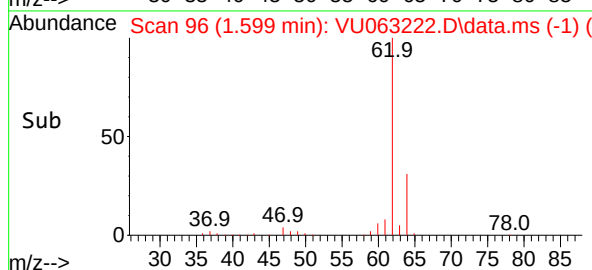
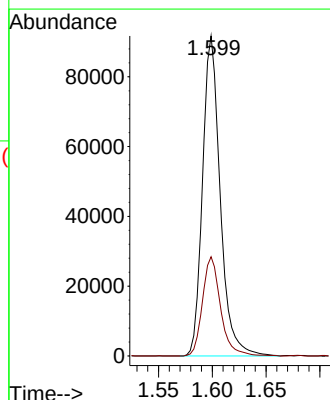
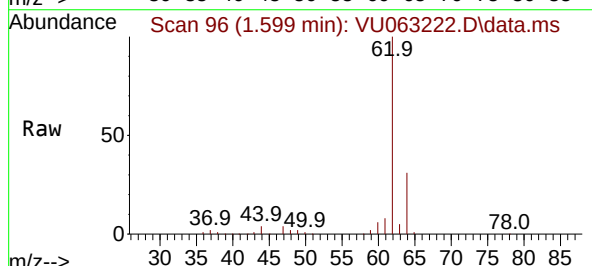
Manual Integrations
APPROVED

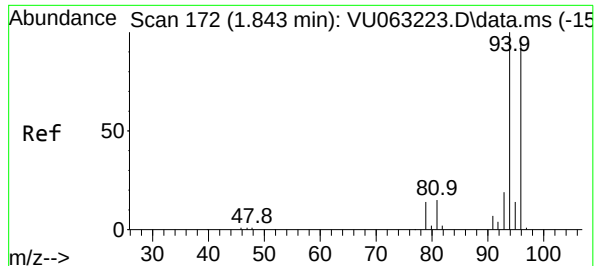
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#4
Vinyl Chloride
Concen: 5.075 ug/l
RT: 1.599 min Scan# 96
Delta R.T. 0.000 min
Lab File: VU063222.D
Acq: 10 Feb 2025 14:23

Tgt Ion: 62 Resp: 104693
Ion Ratio Lower Upper
62 100
64 31.0 25.4 38.0





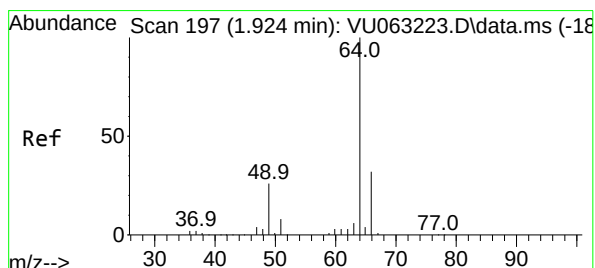
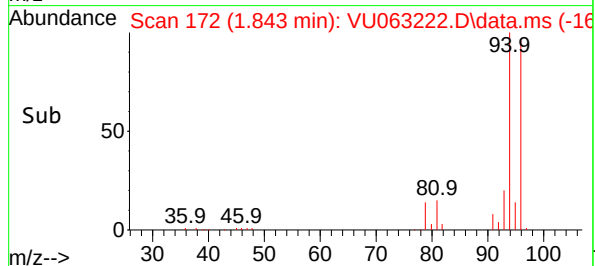
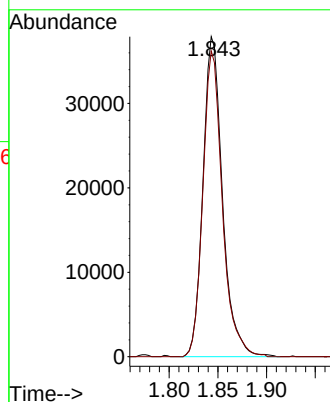
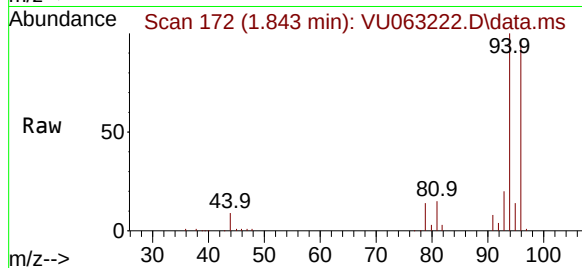
#5
Bromomethane
Concen: 5.534 ug/l
RT: 1.843 min Scan# 172
Delta R.T. 0.000 min
Lab File: VU063222.D
Acq: 10 Feb 2025 14:23

Instrument :
MSVOA_U
ClientSampleId :
VSTDIC005

Tgt Ion: 94 Resp: 5280
Ion Ratio Lower Upper
94 100
96 95.6 75.7 113.5

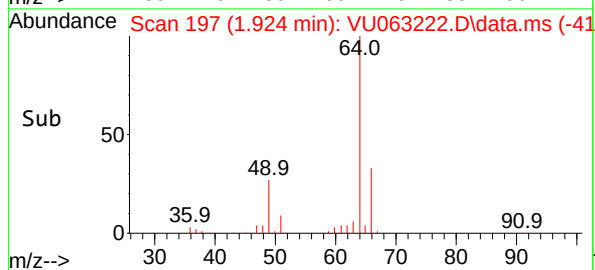
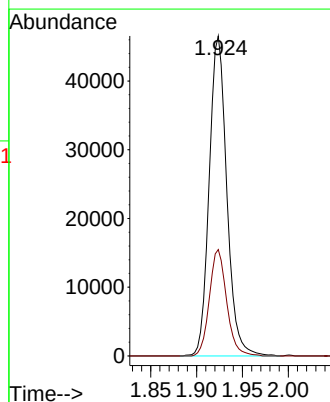
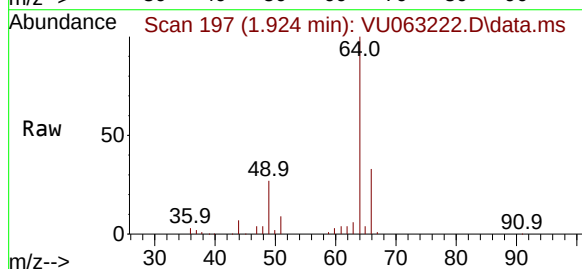
Manual Integrations
APPROVED

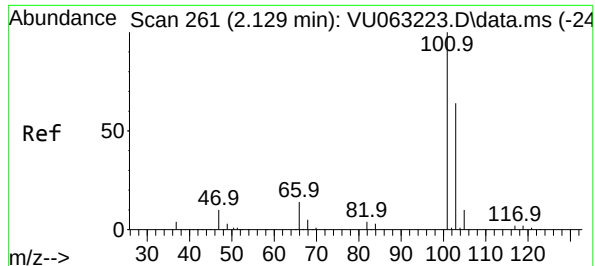
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#6
Chloroethane
Concen: 4.779 ug/l
RT: 1.924 min Scan# 197
Delta R.T. 0.000 min
Lab File: VU063222.D
Acq: 10 Feb 2025 14:23

Tgt Ion: 64 Resp: 62097
Ion Ratio Lower Upper
64 100
66 33.3 25.8 38.8





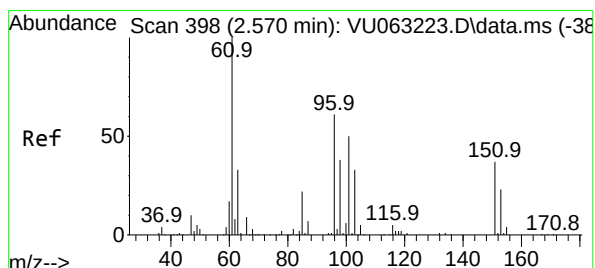
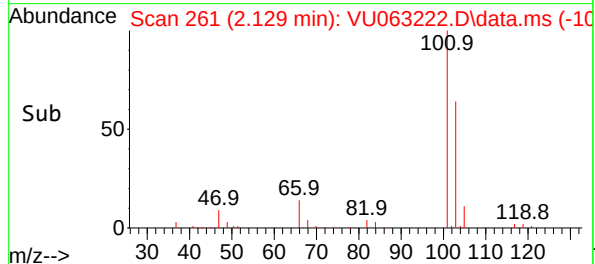
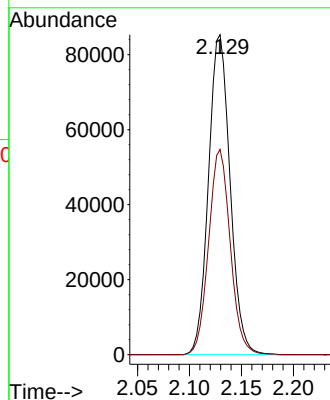
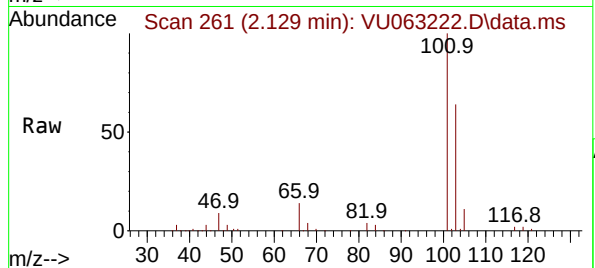
#7
Trichlorofluoromethane
Concen: 5.044 ug/l
RT: 2.129 min Scan# 20
Delta R.T. 0.000 min
Lab File: VU063222.D
Acq: 10 Feb 2025 14:23

Instrument :
MSVOA_U
ClientSampleId :
VSTDICC005

Tgt Ion:101 Resp: 123320
Ion Ratio Lower Upper
101 100
103 64.1 51.4 77.2

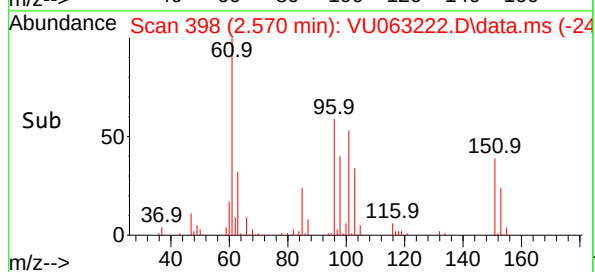
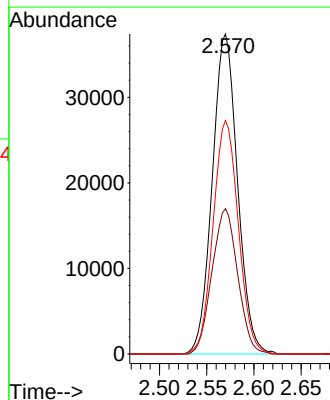
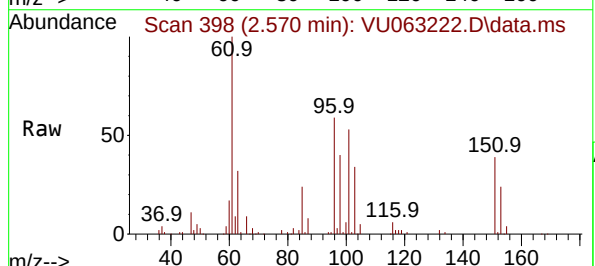
Manual Integrations
APPROVED

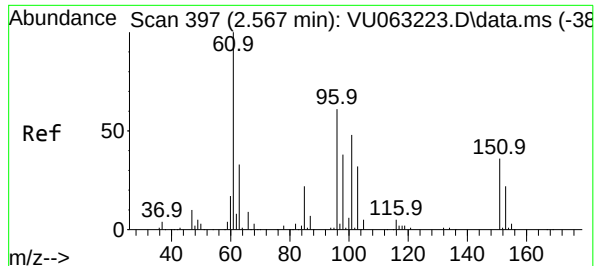
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#8
1,1,2-Trichloro-1,2,2-trifluoroethane
Concen: 5.015 ug/l
RT: 2.570 min Scan# 398
Delta R.T. 0.000 min
Lab File: VU063222.D
Acq: 10 Feb 2025 14:23

Tgt Ion:101 Resp: 69588
Ion Ratio Lower Upper
101 100
85 46.1 35.4 53.0
151 72.8 58.5 87.7





#9

1,1-Dichloroethene

Concen: 4.928 ug/l

RT: 2.567 min Scan# 397

Delta R.T. 0.000 min

Lab File: VU063222.D

Acq: 10 Feb 2025 14:23

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC005

Tgt Ion: 96 Resp: 69679

Ion Ratio Lower Upper

96 100

61 170.1 0.0 492.9

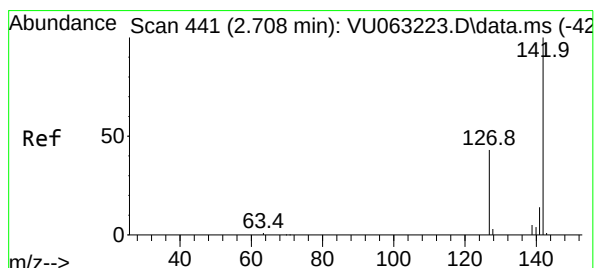
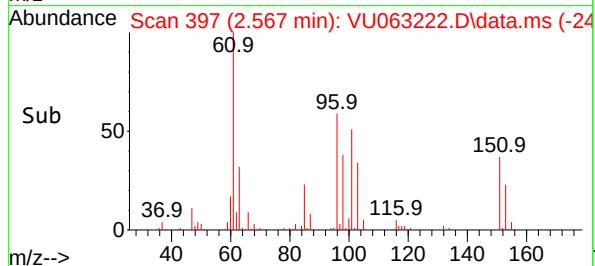
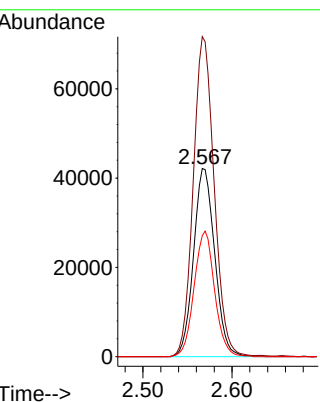
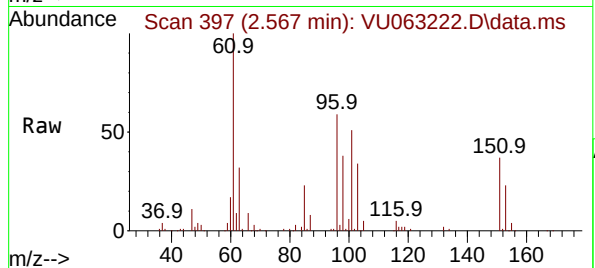
98 64.3 0.0 124.0

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#10

Iodomethane

Concen: 5.148 ug/l

RT: 2.708 min Scan# 441

Delta R.T. 0.000 min

Lab File: VU063222.D

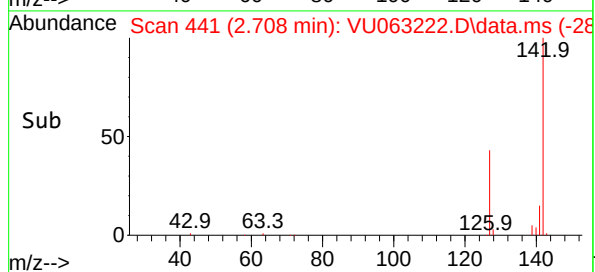
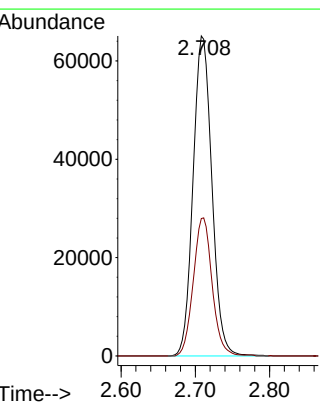
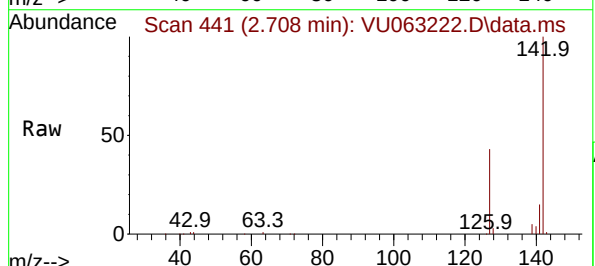
Acq: 10 Feb 2025 14:23

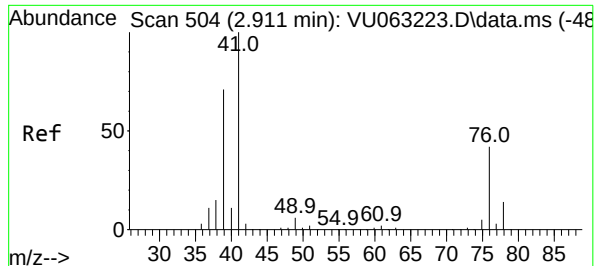
Tgt Ion:142 Resp: 114428

Ion Ratio Lower Upper

142 100

127 43.1 34.5 51.7





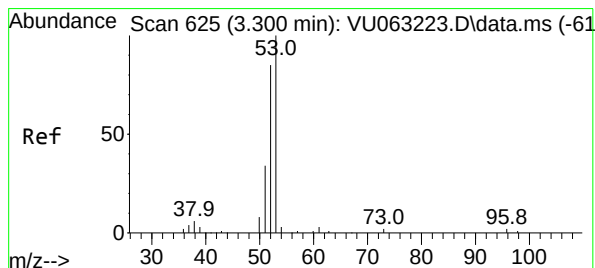
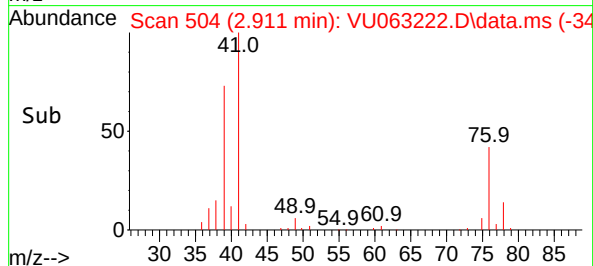
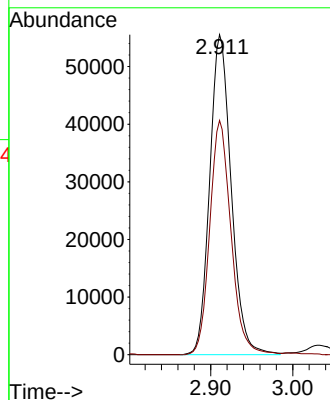
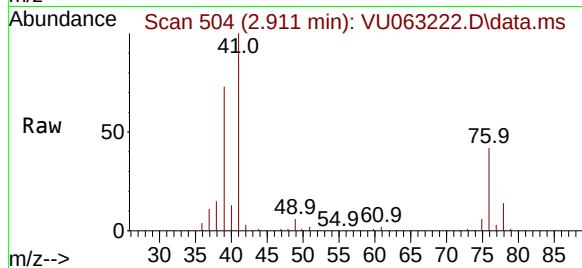
#11
Allyl Chloride
Concen: 4.996 ug/l
RT: 2.911 min Scan# 504
Delta R.T. 0.000 min
Lab File: VU063222.D
Acq: 10 Feb 2025 14:23

Instrument :
MSVOA_U
Client Sample Id :
VSTDIC005

Tgt Ion: 41 Resp: 10148
Ion Ratio Lower Upper
41 100
39 72.1 57.9 86.9

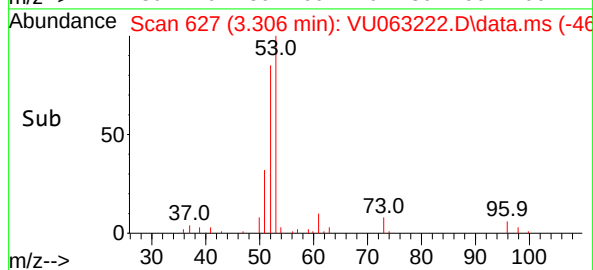
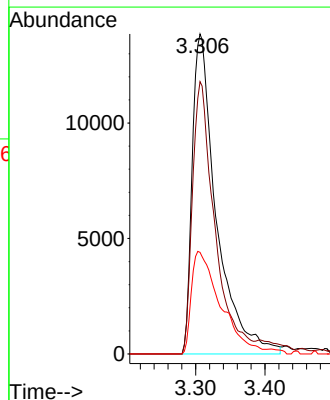
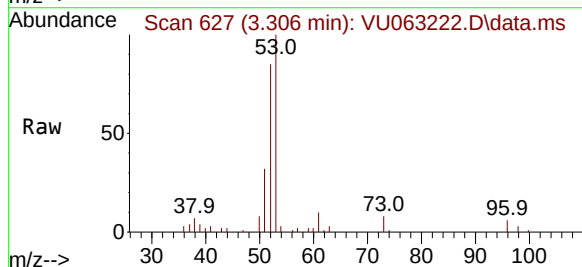
Manual Integrations
APPROVED

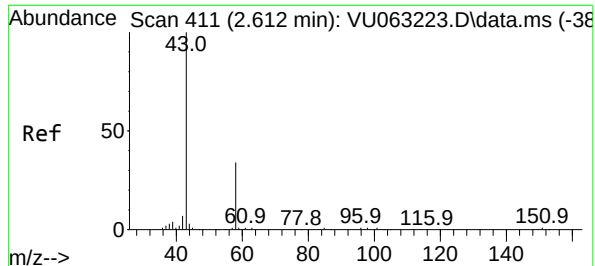
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#12
Acrylonitrile
Concen: 10.453 ug/l
RT: 3.306 min Scan# 627
Delta R.T. 0.006 min
Lab File: VU063222.D
Acq: 10 Feb 2025 14:23

Tgt Ion: 53 Resp: 33591
Ion Ratio Lower Upper
53 100
52 78.3 64.2 96.2
51 38.5 30.8 46.2





#13

Acetone

Concen: 23.349 ug/l

RT: 2.612 min Scan# 411

Delta R.T. 0.000 min

Lab File: VU063222.D

Acq: 10 Feb 2025 14:23

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC005

Tgt Ion: 43 Resp: 58550

Ion Ratio Lower Upper

43 100

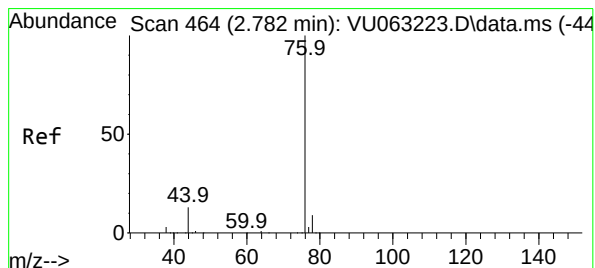
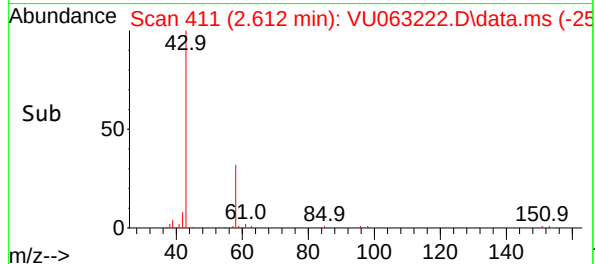
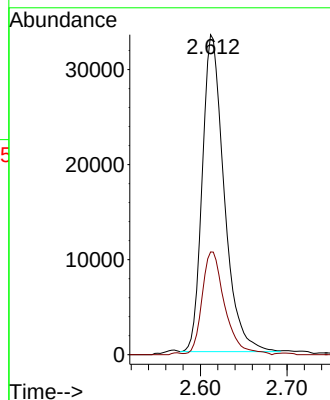
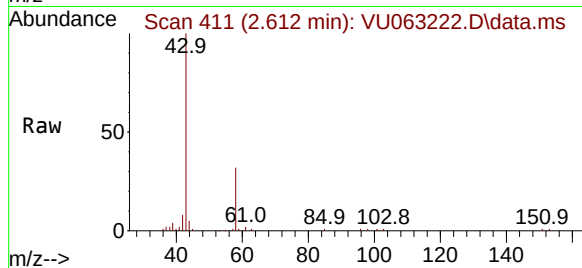
58 32.0 27.4 41.0

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#14

Carbon Disulfide

Concen: 4.900 ug/l

RT: 2.782 min Scan# 464

Delta R.T. 0.000 min

Lab File: VU063222.D

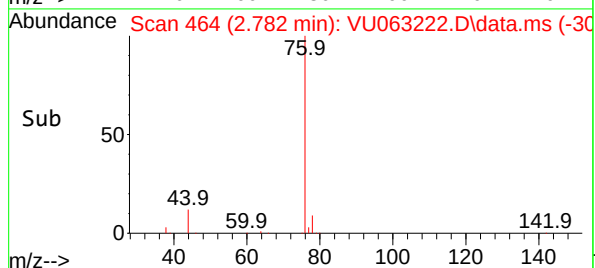
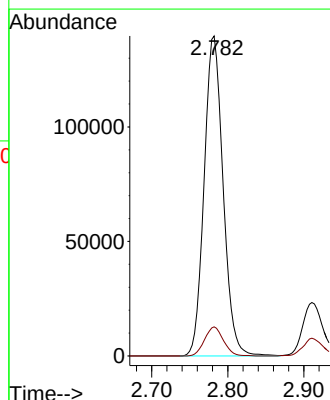
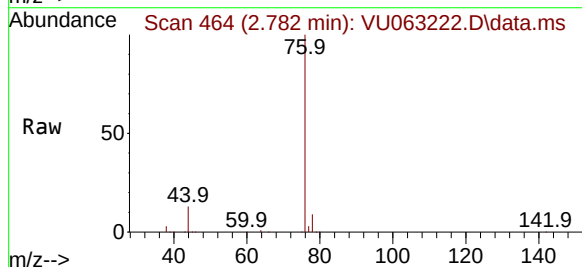
Acq: 10 Feb 2025 14:23

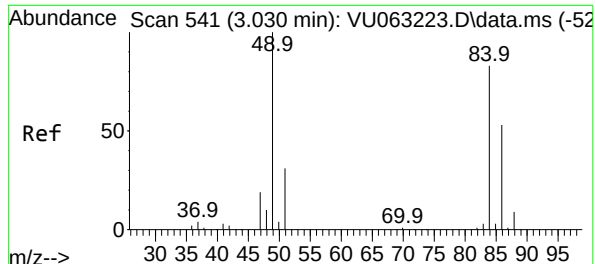
Tgt Ion: 76 Resp: 242244

Ion Ratio Lower Upper

76 100

78 9.1 7.2 10.8





#15

Methylene Chloride

Concen: 4.936 ug/l

RT: 3.033 min Scan# 541

Delta R.T. 0.003 min

Lab File: VU063222.D

Acq: 10 Feb 2025 14:23

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC005

Tgt Ion: 84 Resp: 86210

Ion Ratio Lower Upper

84 100

49 118.4 96.4 144.6

51 37.9 0.0 74.8

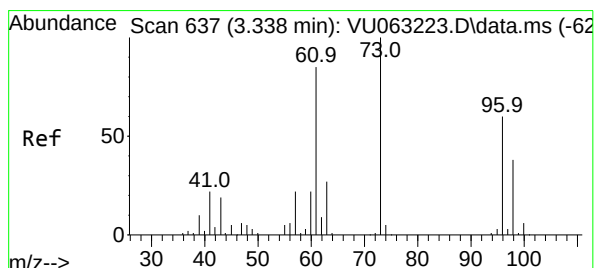
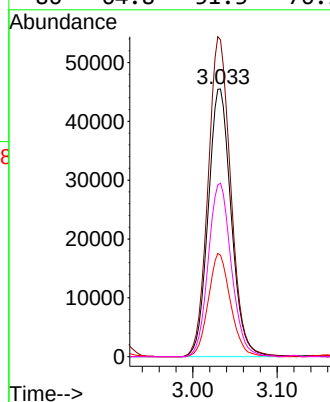
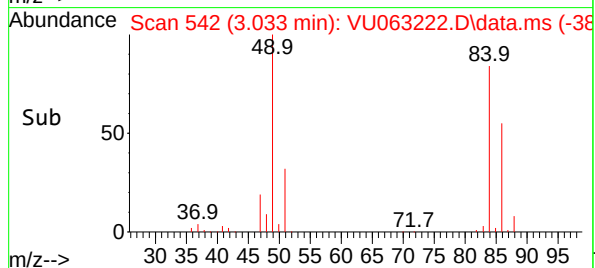
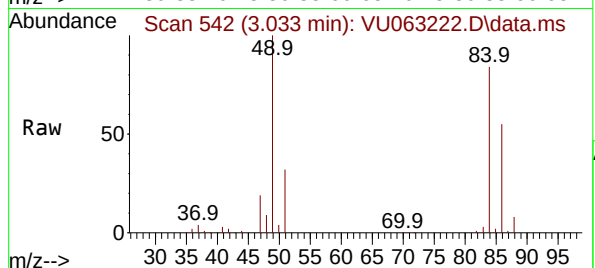
86 64.8 51.3 76.9

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#16

trans-1,2-Dichloroethene

Concen: 4.965 ug/l

RT: 3.338 min Scan# 637

Delta R.T. 0.000 min

Lab File: VU063222.D

Acq: 10 Feb 2025 14:23

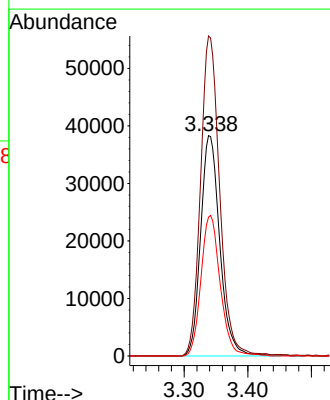
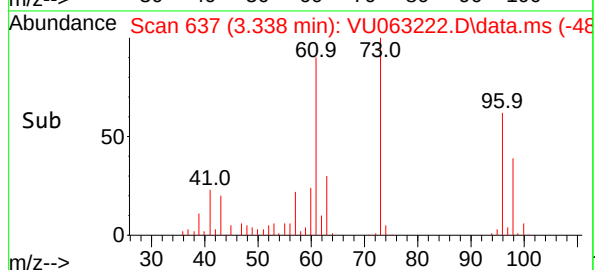
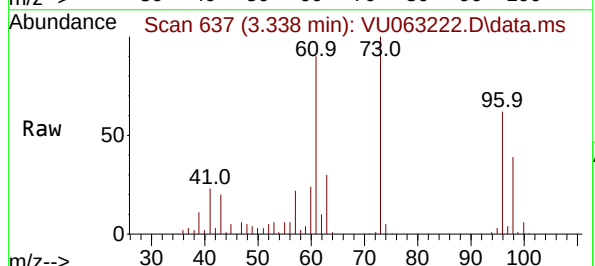
Tgt Ion: 96 Resp: 80123

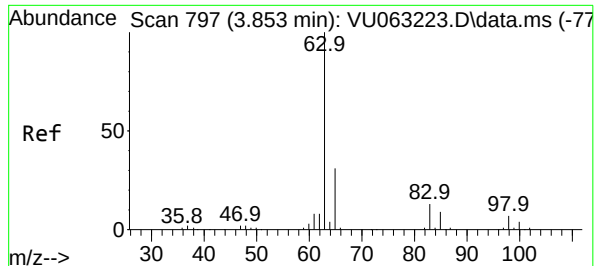
Ion Ratio Lower Upper

96 100

61 145.3 113.4 170.2

98 63.0 51.2 76.8





#17

1,1-Dichloroethane

Concen: 5.027 ug/l

RT: 3.853 min Scan# 79

Delta R.T. 0.000 min

Lab File: VU063222.D

Acq: 10 Feb 2025 14:23

Instrument :

MSVOA_U

ClientSampleId :

VSTDICC005

Tgt Ion: 63 Resp: 15289

Ion Ratio Lower Upper

63 100

98 6.6 3.3 9.9

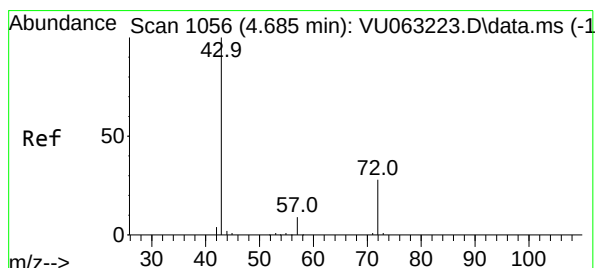
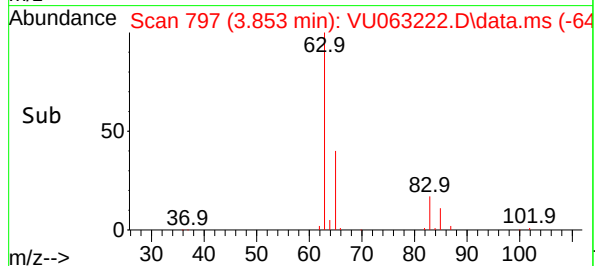
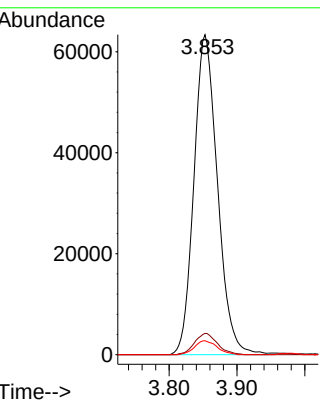
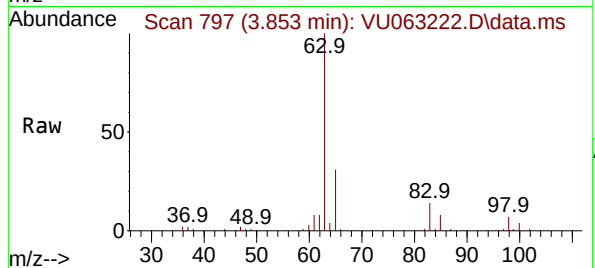
100 4.3 2.1 6.2

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#18

2-Butanone

Concen: 24.289 ug/l

RT: 4.689 min Scan# 1057

Delta R.T. 0.003 min

Lab File: VU063222.D

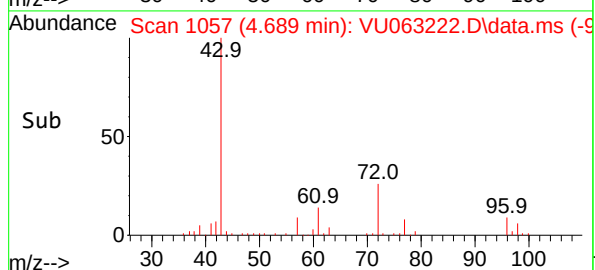
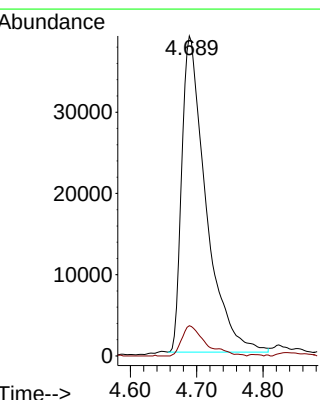
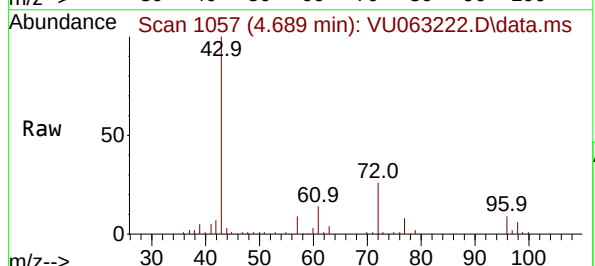
Acq: 10 Feb 2025 14:23

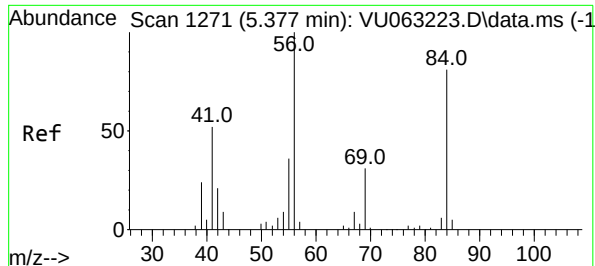
Tgt Ion: 43 Resp: 98391

Ion Ratio Lower Upper

43 100

57 9.5 0.0 17.0





#19

Cyclohexane

Concen: 5.213 ug/l m

RT: 5.374 min Scan# 1271

Delta R.T. -0.003 min

Lab File: VU063222.D

Acq: 10 Feb 2025 14:23

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC005

Tgt Ion: 56 Resp: 127410

Ion Ratio Lower Upper

56 100

69 30.9 24.5 36.7

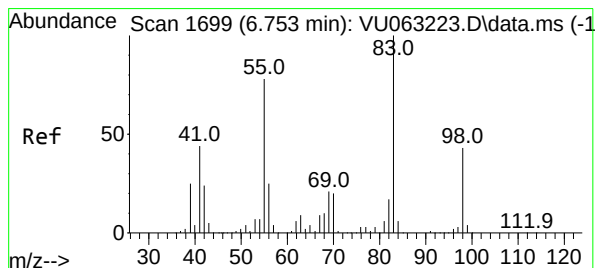
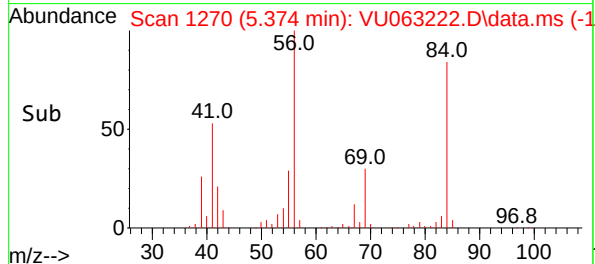
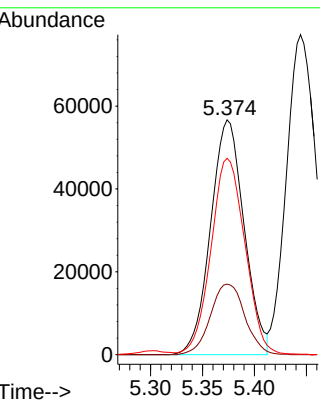
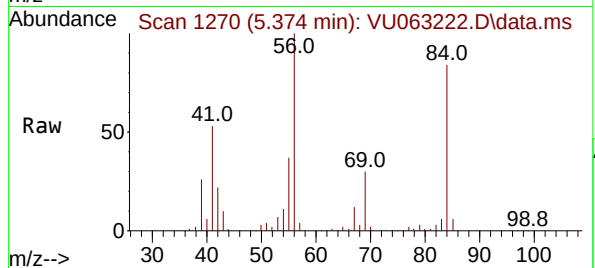
84 83.4 65.2 97.8

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#20

Methylcyclohexane

Concen: 5.302 ug/l

RT: 6.750 min Scan# 1698

Delta R.T. -0.003 min

Lab File: VU063222.D

Acq: 10 Feb 2025 14:23

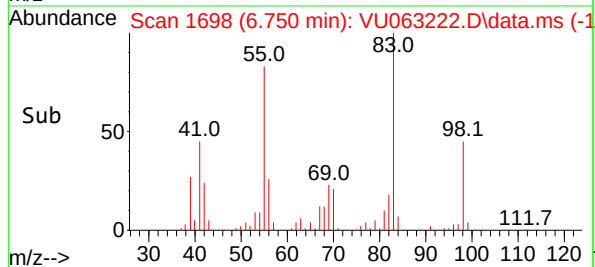
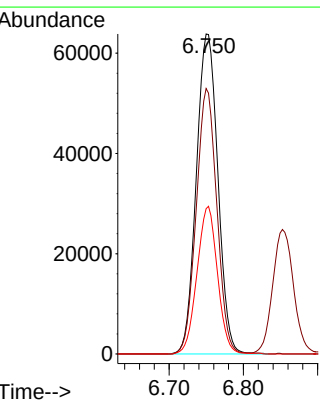
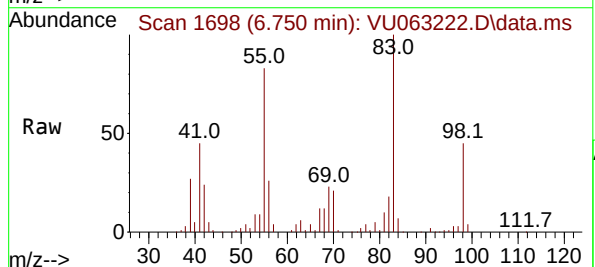
Tgt Ion: 83 Resp: 128499

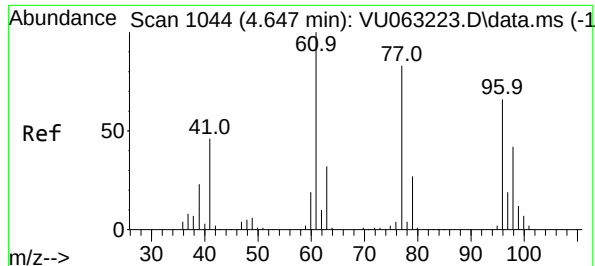
Ion Ratio Lower Upper

83 100

55 78.9 63.1 94.7

98 43.6 35.2 52.8





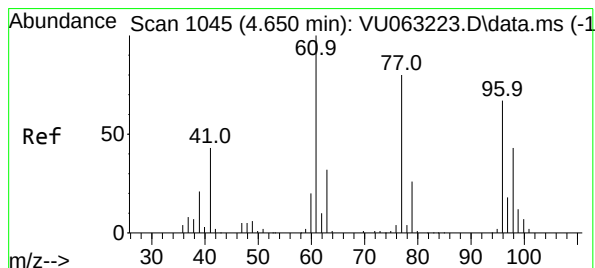
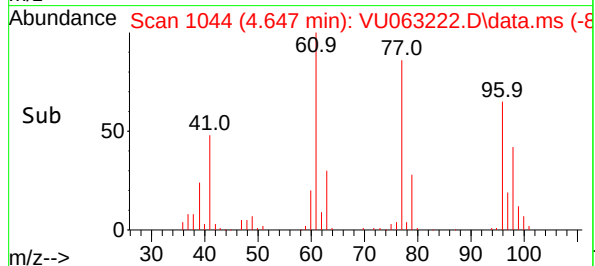
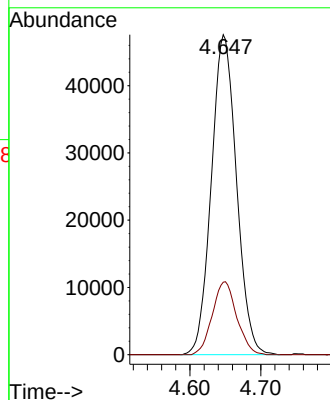
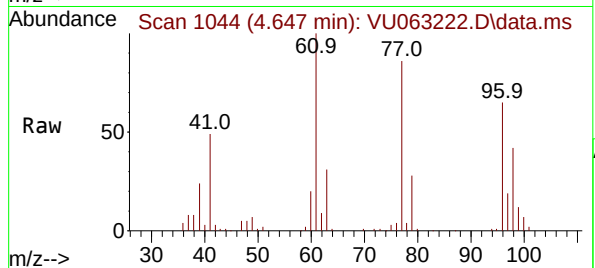
#21
2,2-Dichloropropane
Concen: 4.938 ug/l
RT: 4.647 min Scan# 1044
Delta R.T. 0.000 min
Lab File: VU063222.D
Acq: 10 Feb 2025 14:23

Instrument :
MSVOA_U
ClientSampleId :
VSTDIC005

Tgt Ion: 77 Resp: 11717
Ion Ratio Lower Upper
77 100
97 22.1 18.5 27.7

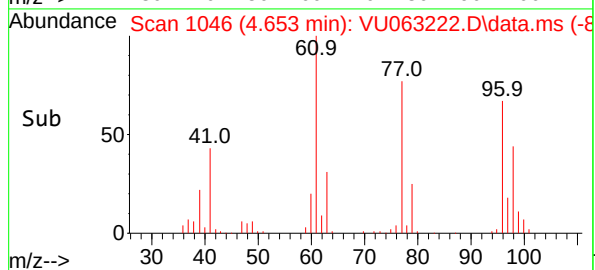
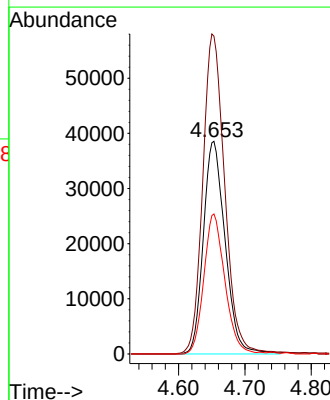
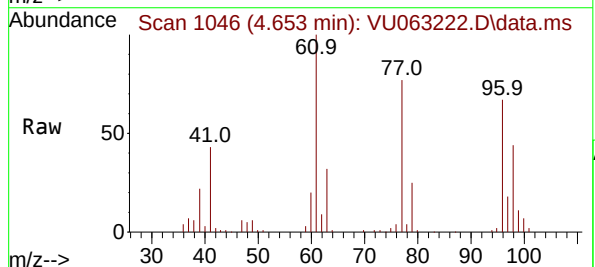
Manual Integrations
APPROVED

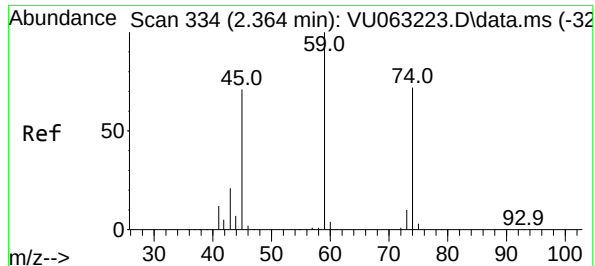
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#22
cis-1,2-Dichloroethene
Concen: 5.046 ug/l
RT: 4.653 min Scan# 1046
Delta R.T. 0.003 min
Lab File: VU063222.D
Acq: 10 Feb 2025 14:23

Tgt Ion: 96 Resp: 87987
Ion Ratio Lower Upper
96 100
61 152.1 0.0 373.3
98 63.4 31.9 95.9





#23

Diethyl Ether

Concen: 5.000 ug/l

RT: 2.364 min Scan# 31

Delta R.T. 0.000 min

Lab File: VU063222.D

Acq: 10 Feb 2025 14:23

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC005

Tgt Ion: 59 Resp: 6065

Ion Ratio Lower Upper

59 100

45 69.8 57.8 86.6

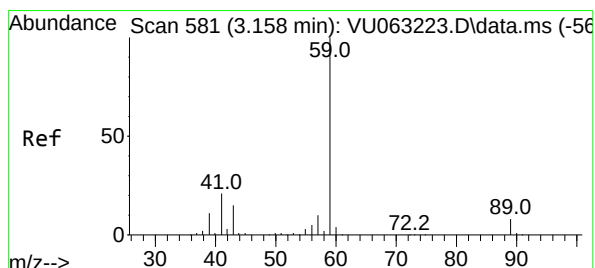
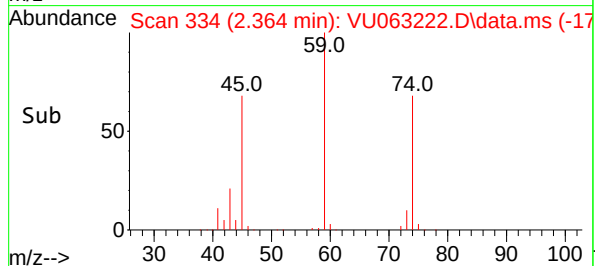
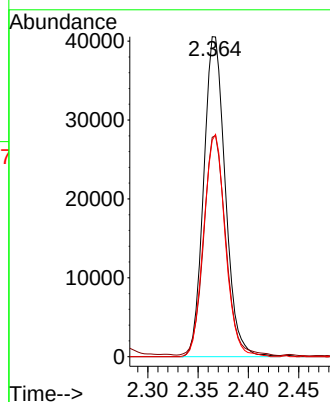
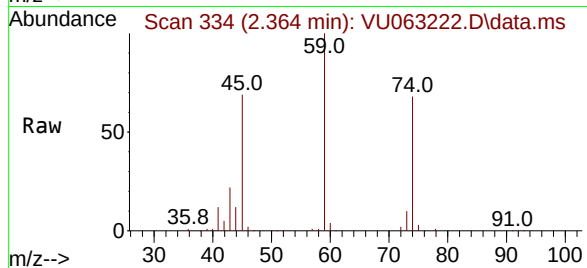
74 69.7 57.7 86.5

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#24

tert-Butyl Alcohol

Concen: 45.943 ug/l

RT: 3.161 min Scan# 582

Delta R.T. 0.003 min

Lab File: VU063222.D

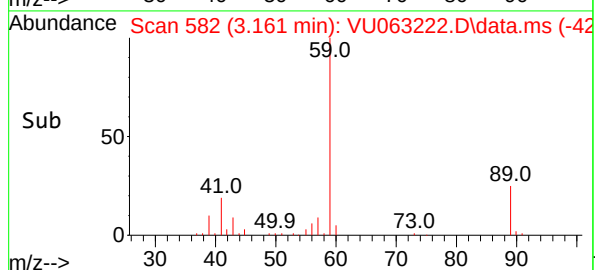
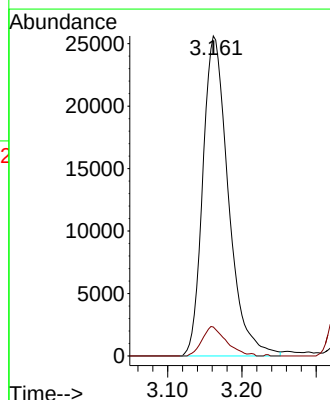
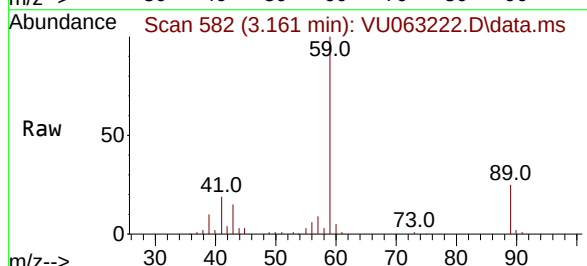
Acq: 10 Feb 2025 14:23

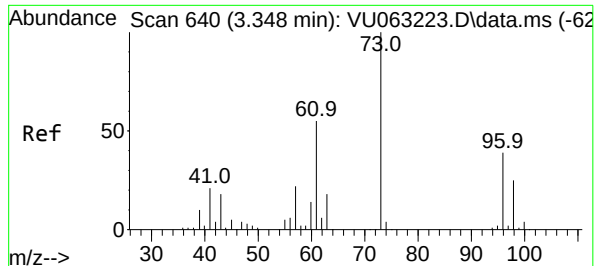
Tgt Ion: 59 Resp: 61281

Ion Ratio Lower Upper

59 100

57 8.6 7.5 11.3





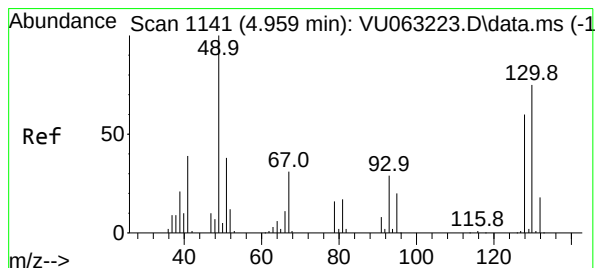
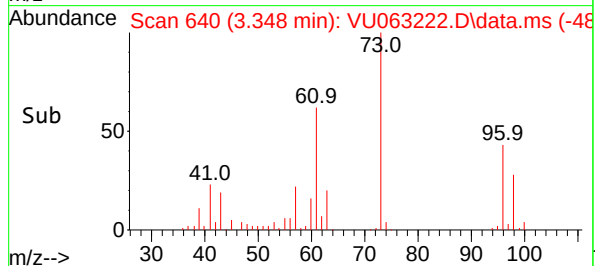
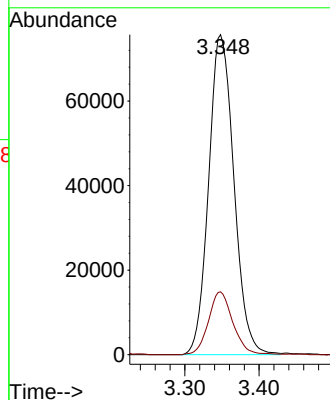
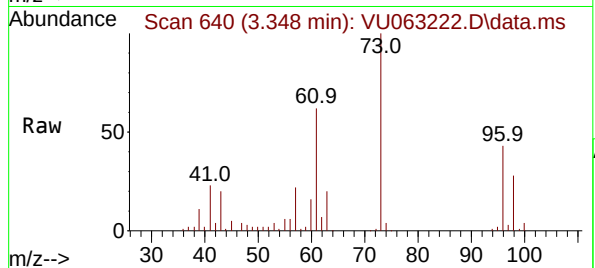
#25
Methyl tert-Butyl Ether
Concen: 5.066 ug/l
RT: 3.348 min Scan# 640
Delta R.T. 0.000 min
Lab File: VU063222.D
Acq: 10 Feb 2025 14:23

Instrument :
MSVOA_U
ClientSampleId :
VSTDIC005

Tgt Ion: 73 Resp: 178870
Ion Ratio Lower Upper
73 100
43 19.0 14.9 22.3

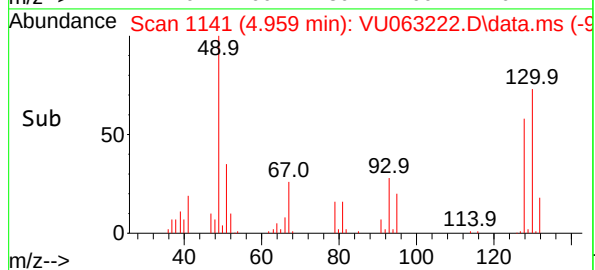
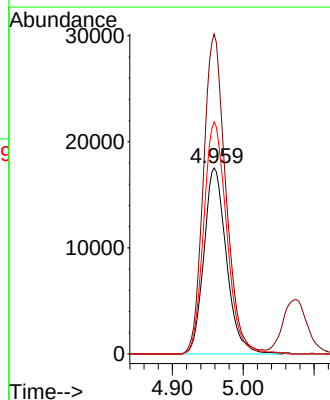
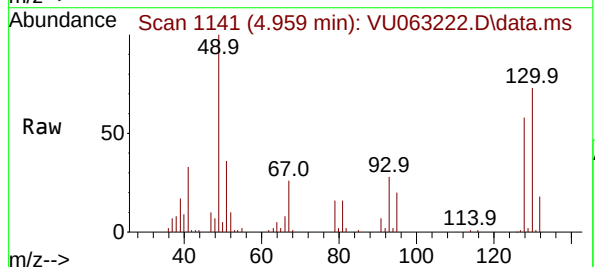
Manual Integrations
APPROVED

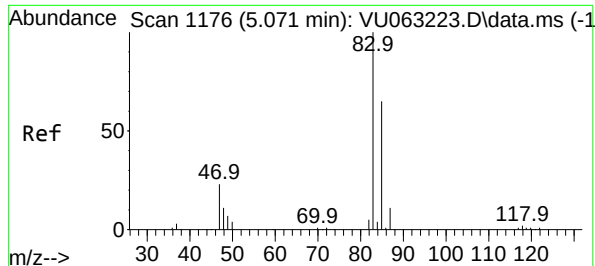
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#26
Bromochloromethane
Concen: 5.067 ug/l
RT: 4.959 min Scan# 1141
Delta R.T. 0.000 min
Lab File: VU063222.D
Acq: 10 Feb 2025 14:23

Tgt Ion:128 Resp: 38617
Ion Ratio Lower Upper
128 100
49 171.4 0.0 343.4
130 127.4 102.9 154.3





#27

Chloroform

Concen: 5.050 ug/l

RT: 5.071 min Scan# 1176

Delta R.T. 0.000 min

Lab File: VU063222.D

Acq: 10 Feb 2025 14:23

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC005

Tgt Ion: 83 Resp: 15501

Ion Ratio Lower Upper

83 100

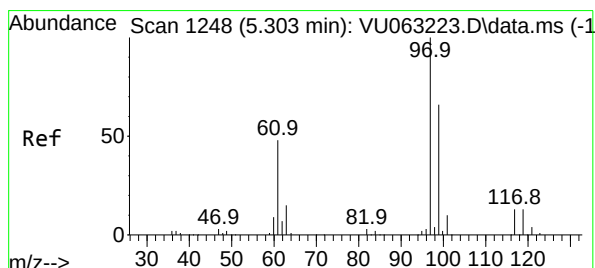
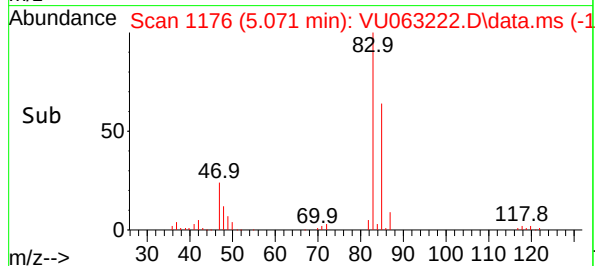
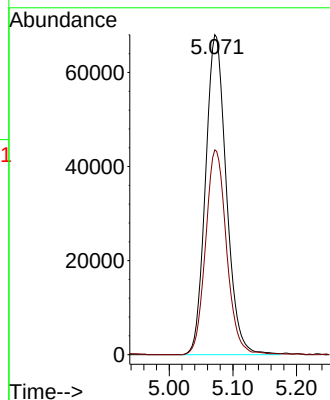
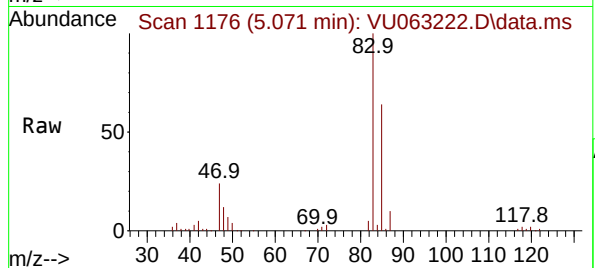
85 64.0 0.0 129.8

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#28

1,1,1-Trichloroethane

Concen: 5.144 ug/l

RT: 5.300 min Scan# 1247

Delta R.T. -0.003 min

Lab File: VU063222.D

Acq: 10 Feb 2025 14:23

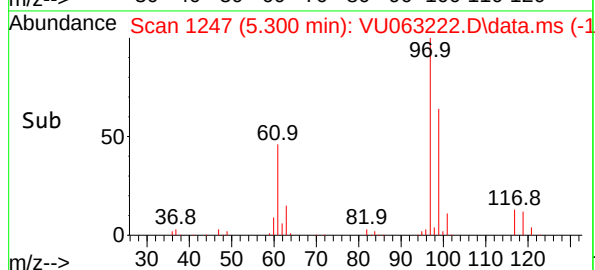
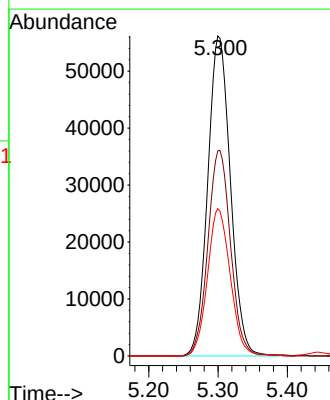
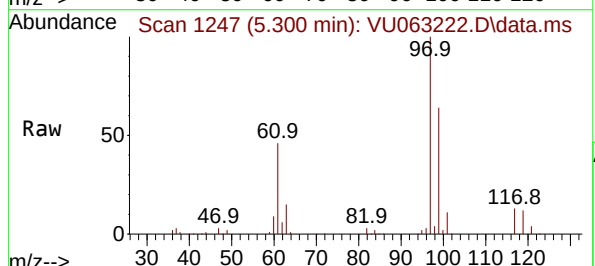
Tgt Ion: 97 Resp: 127899

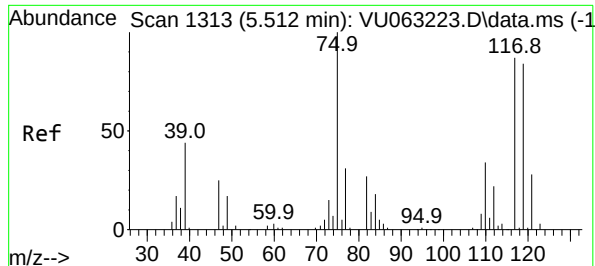
Ion Ratio Lower Upper

97 100

99 64.1 32.4 97.0

61 46.2 23.8 71.2





#29

1,1-Dichloropropene

Concen: 5.052 ug/l

RT: 5.512 min Scan# 11

Delta R.T. 0.000 min

Lab File: VU063222.D

Acq: 10 Feb 2025 14:23

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC005

Tgt Ion: 75 Resp: 112514

Ion Ratio Lower Upper

75 100

110 35.5 17.2 51.5

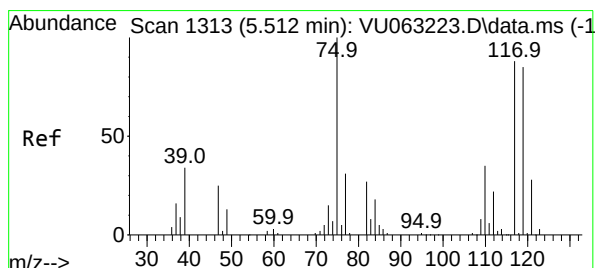
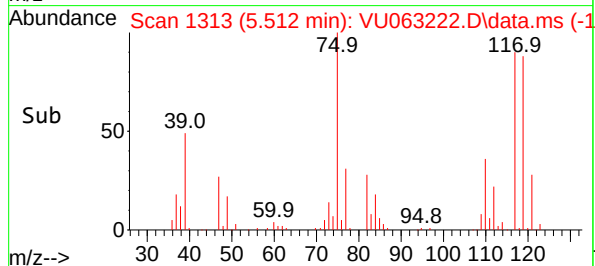
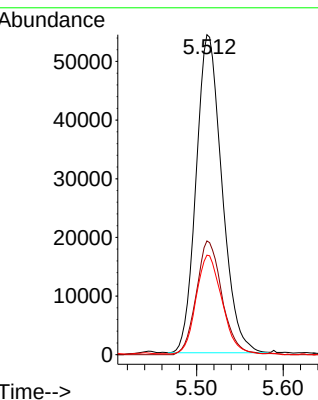
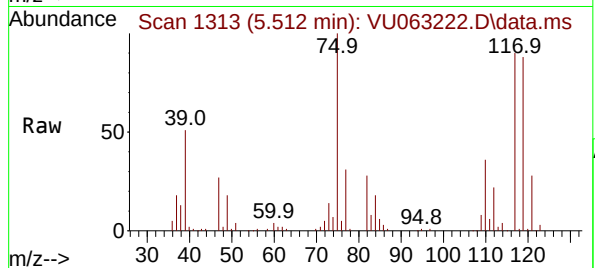
77 30.9 24.6 37.0

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#30

Carbon Tetrachloride

Concen: 5.007 ug/l

RT: 5.509 min Scan# 1312

Delta R.T. -0.003 min

Lab File: VU063222.D

Acq: 10 Feb 2025 14:23

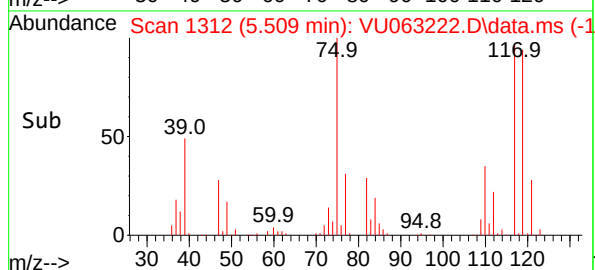
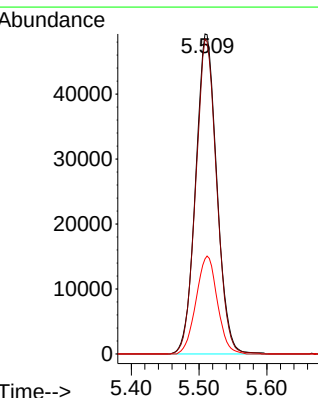
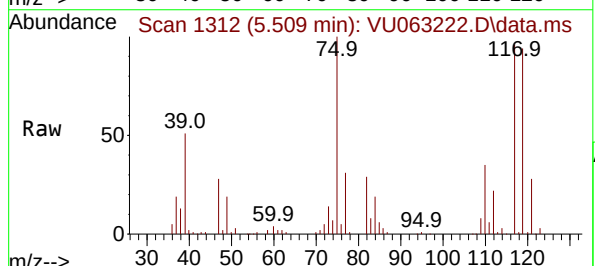
Tgt Ion:117 Resp: 106762

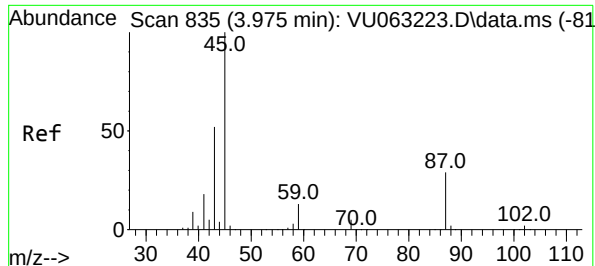
Ion Ratio Lower Upper

117 100

119 98.3 76.7 115.1

121 29.7 25.5 38.3





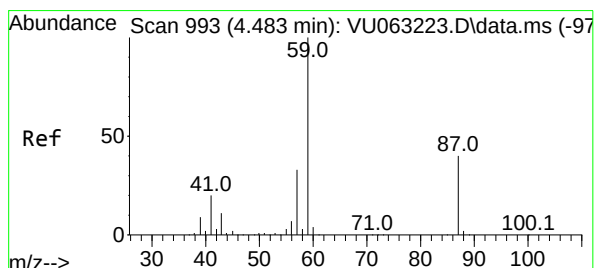
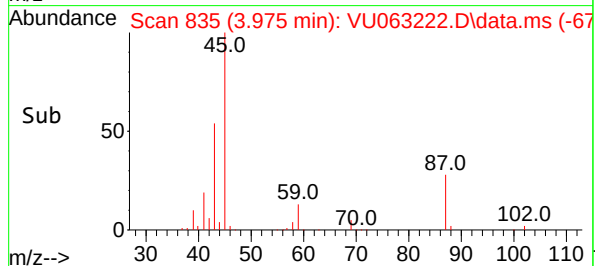
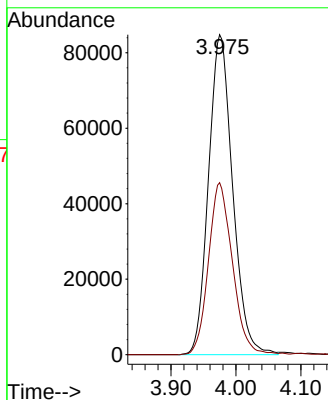
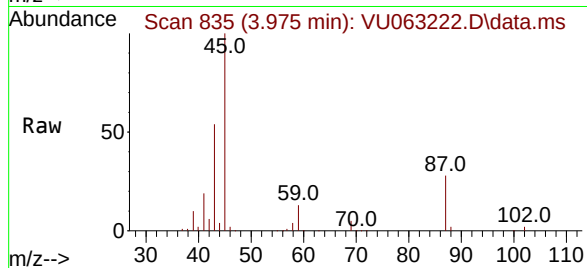
#31
Isopropyl Ether
Concen: 5.037 ug/l
RT: 3.975 min Scan# 835
Delta R.T. 0.000 min
Lab File: VU063222.D
Acq: 10 Feb 2025 14:23

Instrument :
MSVOA_U
ClientSampleId :
VSTDICC005

Tgt Ion: 45 Resp: 218715
Ion Ratio Lower Upper
45 100
43 53.4 25.7 77.1

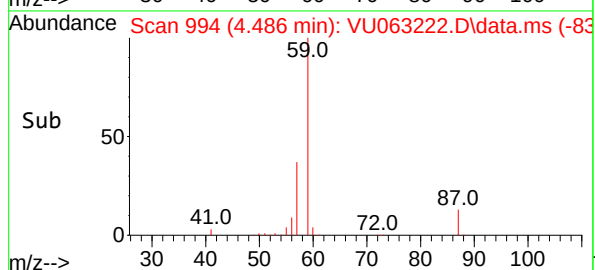
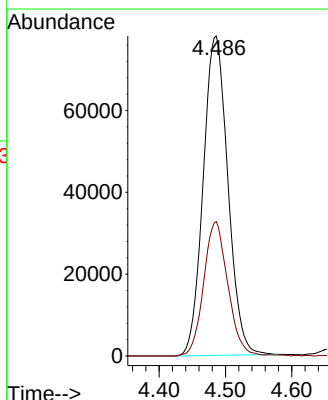
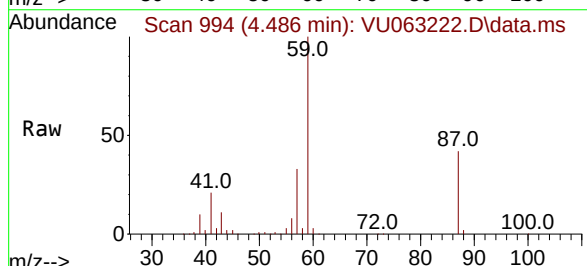
Manual Integrations
APPROVED

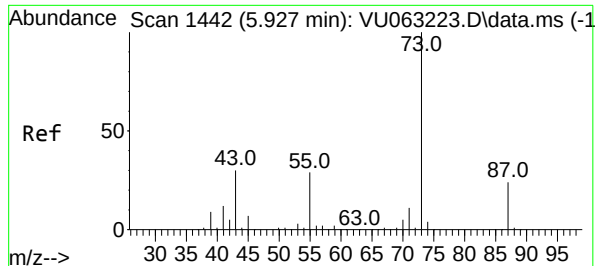
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#32
Ethyl-t-butyl ether
Concen: 5.120 ug/l
RT: 4.486 min Scan# 994
Delta R.T. 0.003 min
Lab File: VU063222.D
Acq: 10 Feb 2025 14:23

Tgt Ion: 59 Resp: 202182
Ion Ratio Lower Upper
59 100
87 40.5 32.6 49.0





#33

Tert-Amyl methyl ether

Concen: 5.144 ug/l

RT: 5.927 min Scan# 1442

Delta R.T. 0.000 min

Lab File: VU063222.D

Acq: 10 Feb 2025 14:23

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC005

Tgt Ion: 73 Resp: 17749

Ion Ratio Lower Upper

73 100

87 24.4 18.9 28.3

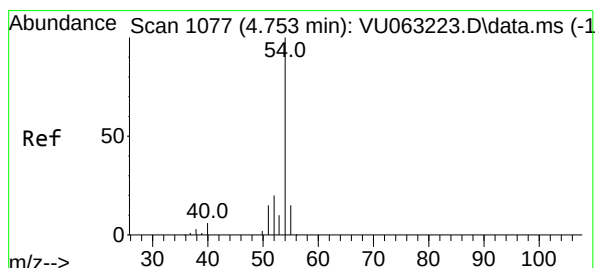
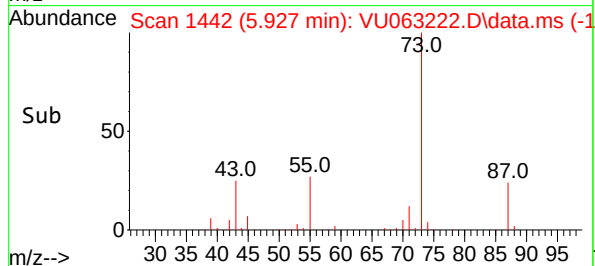
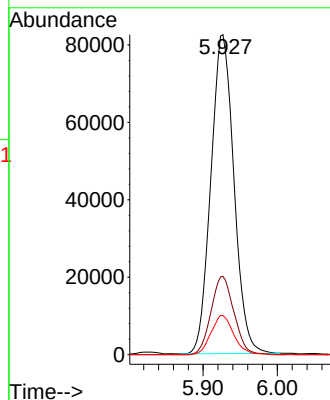
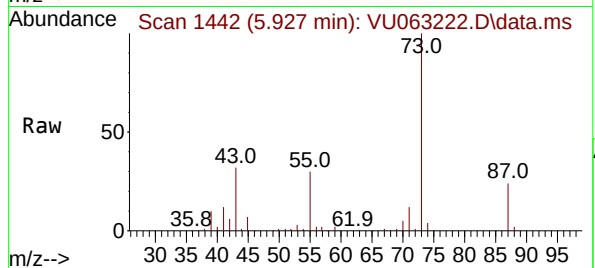
71 12.2 9.0 13.4

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#34

Propionitrile

Concen: 24.919 ug/l

RT: 4.759 min Scan# 1079

Delta R.T. 0.006 min

Lab File: VU063222.D

Acq: 10 Feb 2025 14:23

Tgt Ion: 54 Resp: 31294

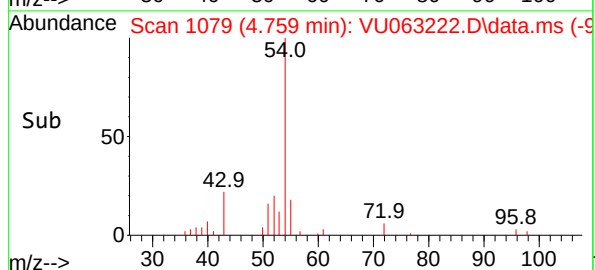
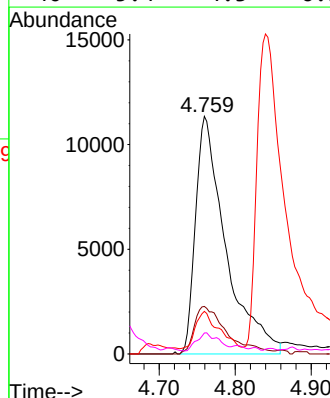
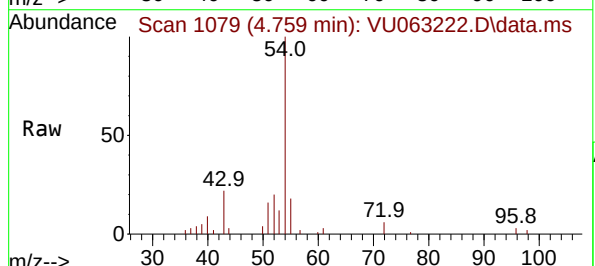
Ion Ratio Lower Upper

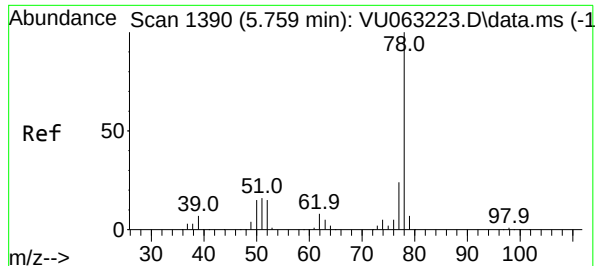
54 100

52 21.5 16.3 24.5

55 11.9 11.8 17.6

40 5.4 4.3 6.5





#35

Benzene

Concen: 5.111 ug/l

RT: 5.759 min Scan# 1390

Delta R.T. 0.000 min

Lab File: VU063222.D

Acq: 10 Feb 2025 14:23

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC005

Tgt Ion: 78 Resp: 34998

Ion Ratio Lower Upper

78 100

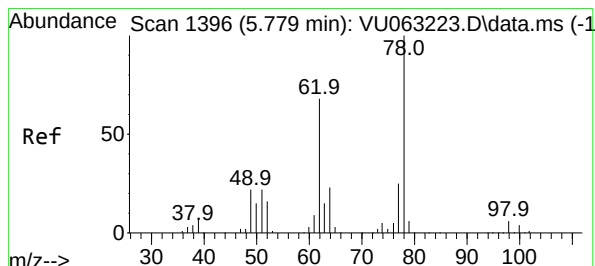
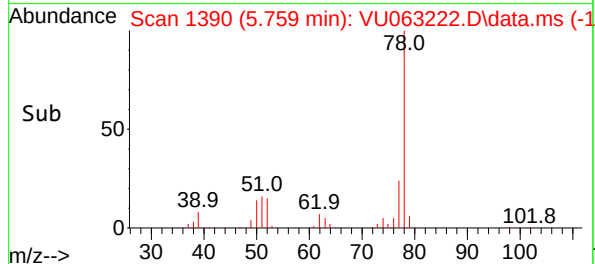
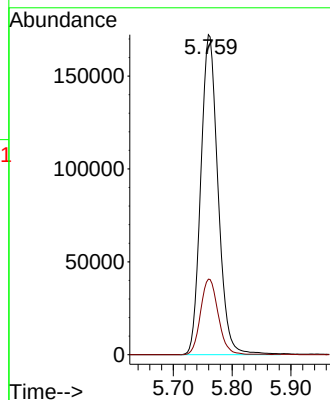
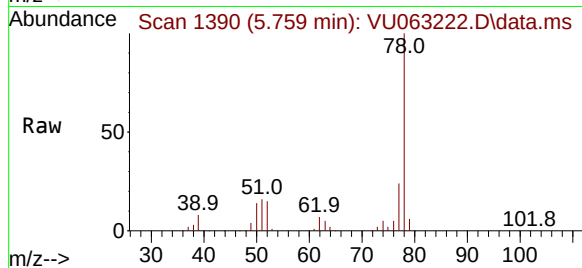
77 23.6 19.0 28.4

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#36

1,2-Dichloroethane

Concen: 5.037 ug/l

RT: 5.779 min Scan# 1396

Delta R.T. 0.000 min

Lab File: VU063222.D

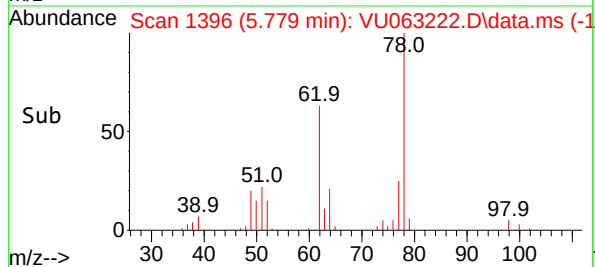
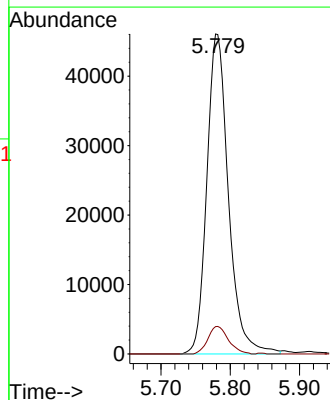
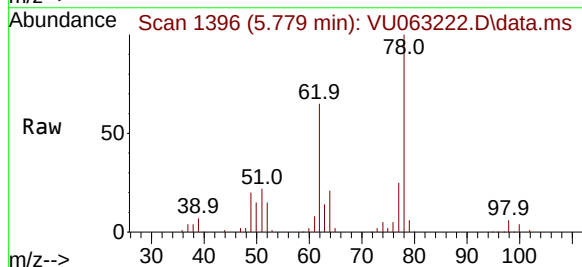
Acq: 10 Feb 2025 14:23

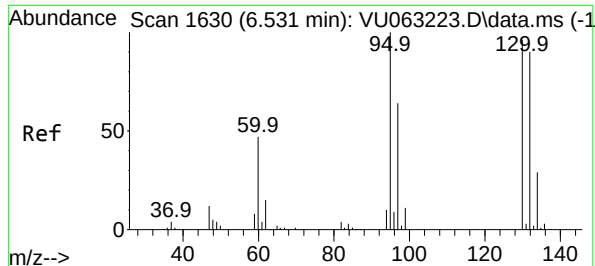
Tgt Ion: 62 Resp: 99553

Ion Ratio Lower Upper

62 100

98 8.2 6.9 10.3





#37

Trichloroethene

Concen: 4.962 ug/l

RT: 6.531 min Scan# 1630

Delta R.T. 0.000 min

Lab File: VU063222.D

Acq: 10 Feb 2025 14:23

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC005

Tgt Ion:130 Resp: 80810

Ion Ratio Lower Upper

130 100

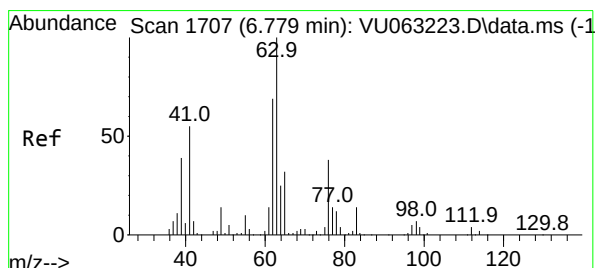
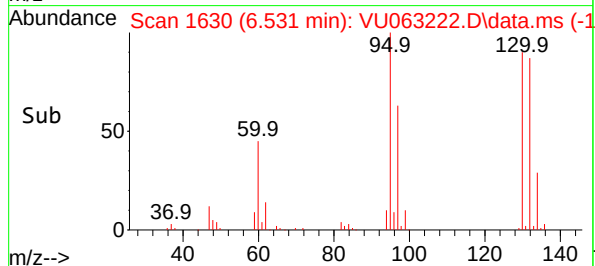
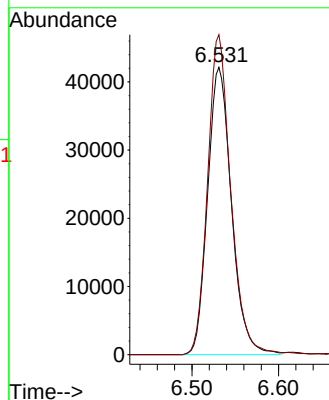
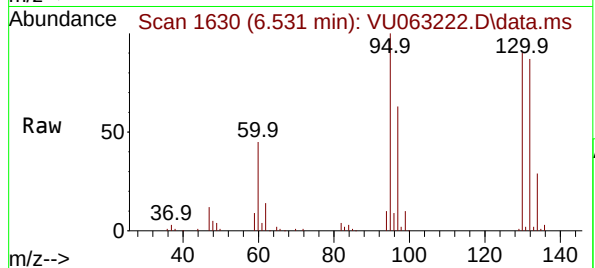
95 111.3 83.2 124.8

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#38

1,2-Dichloropropane

Concen: 5.026 ug/l

RT: 6.779 min Scan# 1707

Delta R.T. 0.000 min

Lab File: VU063222.D

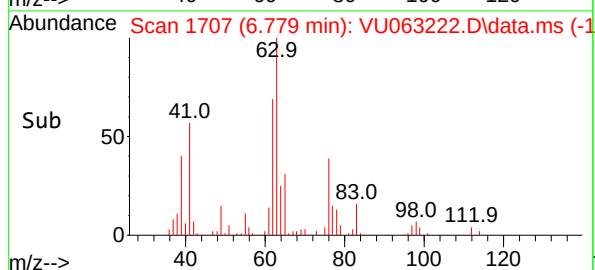
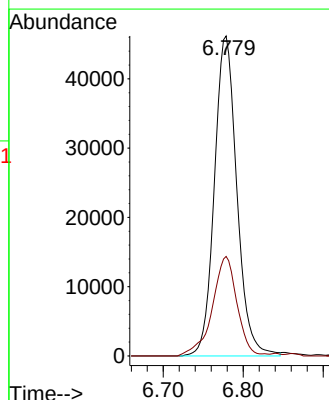
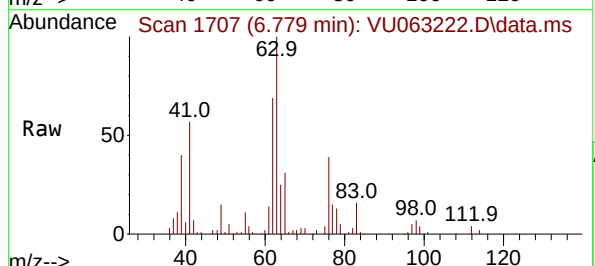
Acq: 10 Feb 2025 14:23

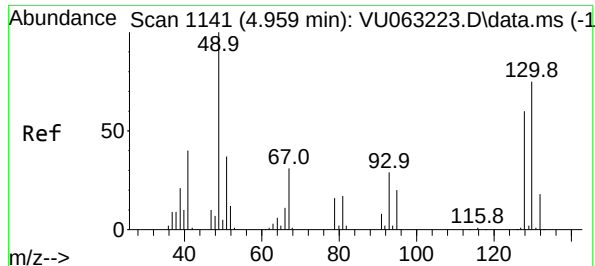
Tgt Ion: 63 Resp: 90072

Ion Ratio Lower Upper

63 100

65 30.7 25.3 37.9





#39

Methacrylonitrile

Concen: 5.404 ug/l

RT: 4.962 min Scan# 1141

Delta R.T. 0.003 min

Lab File: VU063222.D

Acq: 10 Feb 2025 14:23

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC005

Tgt Ion: 41 Resp: 2424

Ion Ratio Lower Upper

41 100

67 84.7 64.5 96.7

39 53.0 43.0 64.6

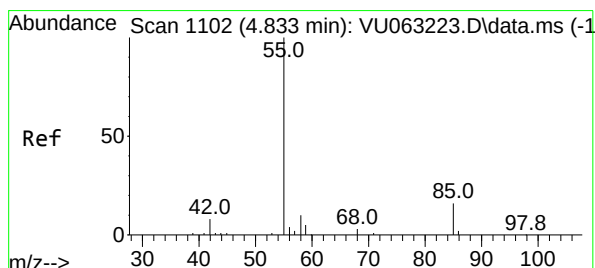
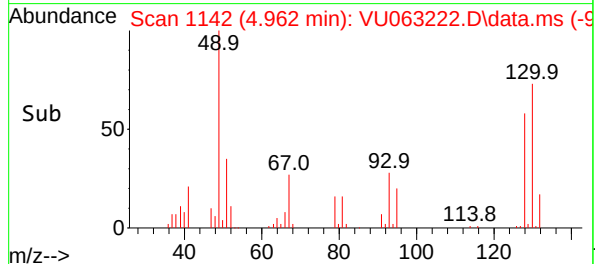
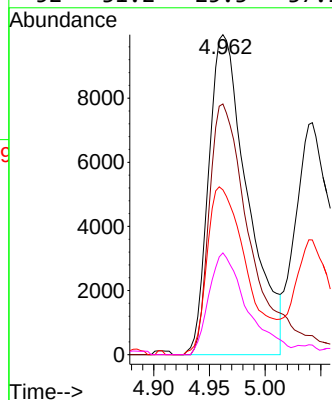
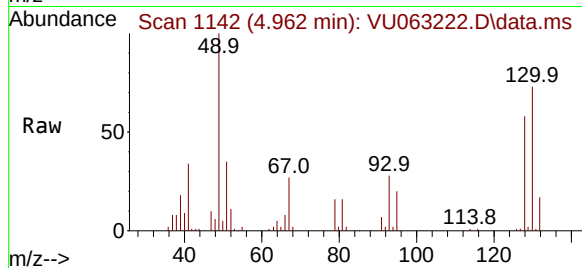
52 31.2 25.3 37.9

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#40

Methyl acrylate

Concen: 5.358 ug/l m

RT: 4.840 min Scan# 1104

Delta R.T. 0.006 min

Lab File: VU063222.D

Acq: 10 Feb 2025 14:23

Tgt Ion: 55 Resp: 43877

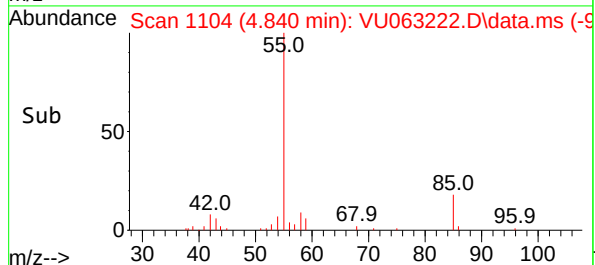
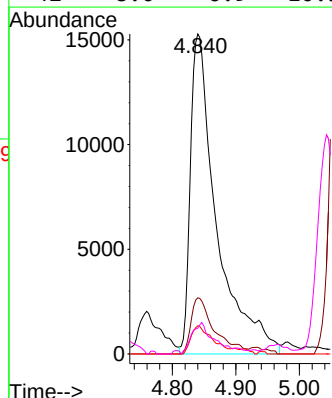
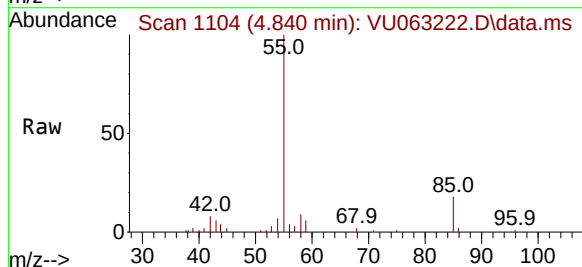
Ion Ratio Lower Upper

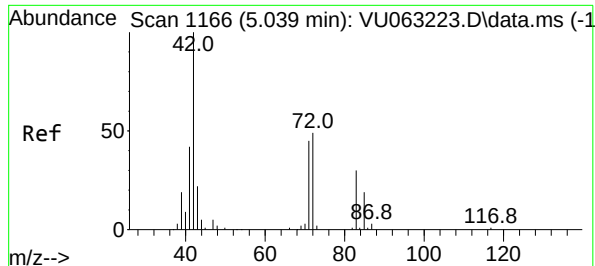
55 100

85 15.7 13.3 19.9

58 7.2 7.3 10.9#

42 8.0 6.9 10.3





#41

Tetrahydrofuran

Concen: 9.229 ug/l

RT: 5.042 min Scan# 1166

Delta R.T. 0.003 min

Lab File: VU063222.D

Acq: 10 Feb 2025 14:23

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC005

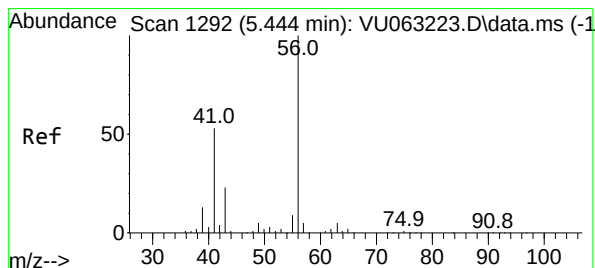
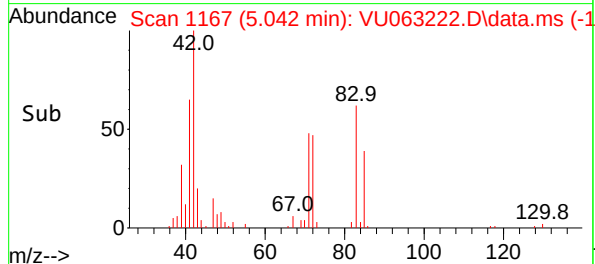
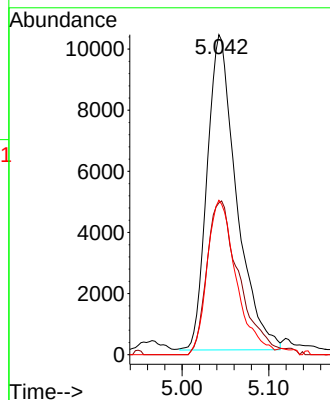
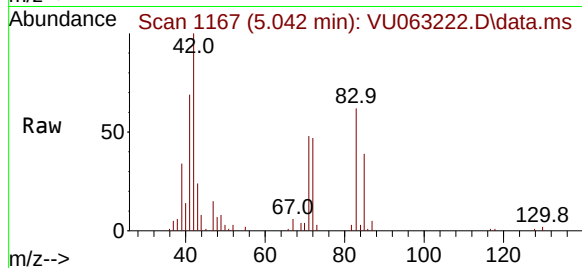
Tgt Ion:	42	Resp:	24329
Ion Ratio	Lower	Upper	
42	100		
72	53.6	41.5	62.3
71	48.7	37.2	55.8

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#42

1-Chlorobutane

Concen: 5.283 ug/l

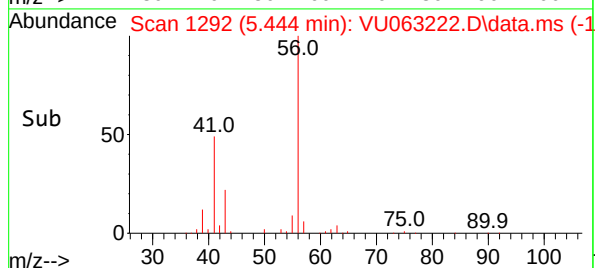
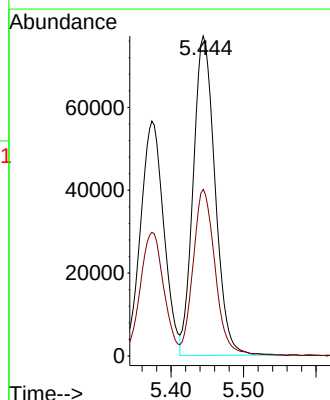
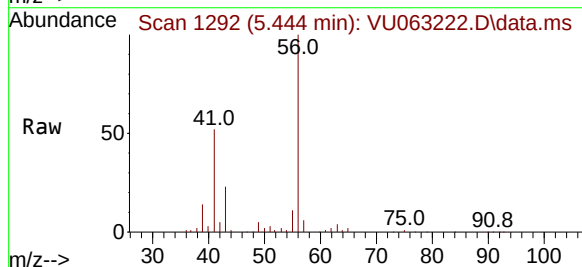
RT: 5.444 min Scan# 1292

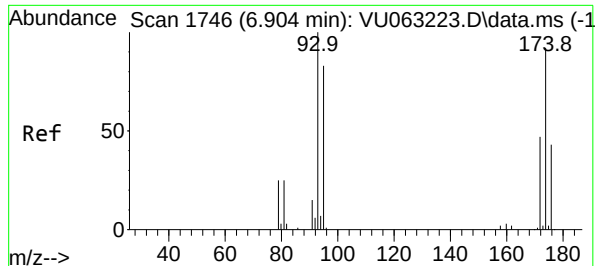
Delta R.T. 0.000 min

Lab File: VU063222.D

Acq: 10 Feb 2025 14:23

Tgt Ion:	56	Resp:	160975
Ion Ratio	Lower	Upper	
56	100		
41	51.3	26.3	78.8





#43

Dibromomethane

Concen: 5.031 ug/l

RT: 6.907 min Scan# 1746

Delta R.T. 0.003 min

Lab File: VU063222.D

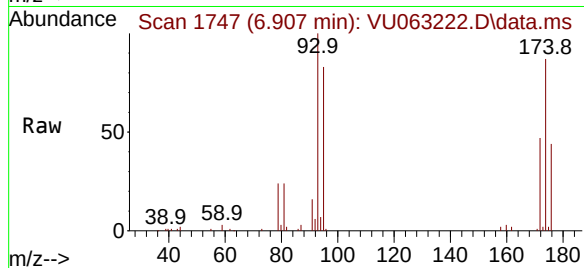
Acq: 10 Feb 2025 14:23

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC005



Tgt Ion: 93 Resp: 4565

Ion Ratio Lower Upper

93 100

95 81.3 67.2 100.8

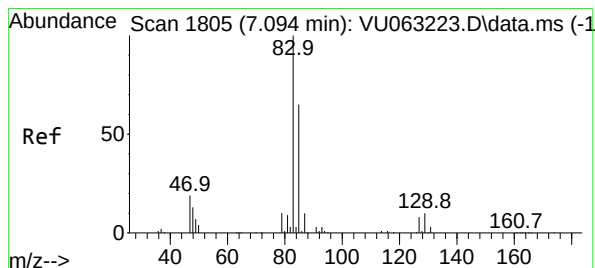
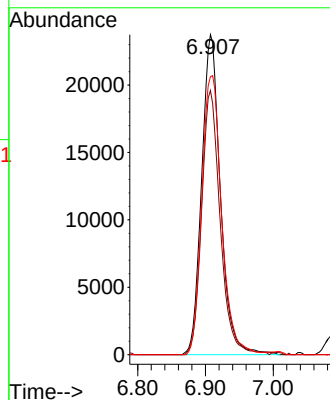
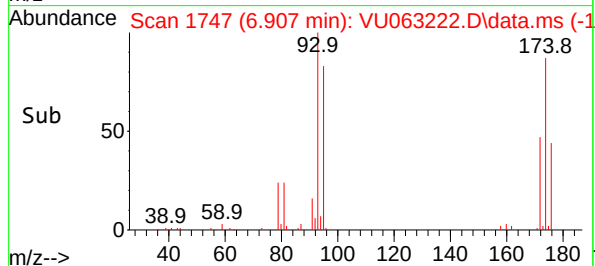
174 92.0 75.7 113.5

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#44

Bromodichloromethane

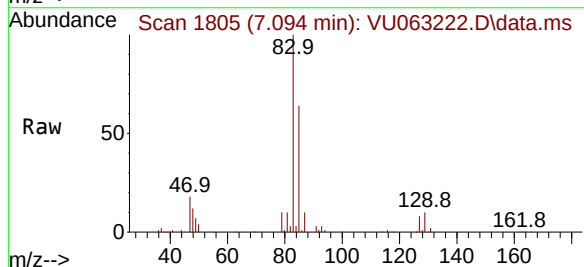
Concen: 5.189 ug/l

RT: 7.094 min Scan# 1805

Delta R.T. 0.000 min

Lab File: VU063222.D

Acq: 10 Feb 2025 14:23



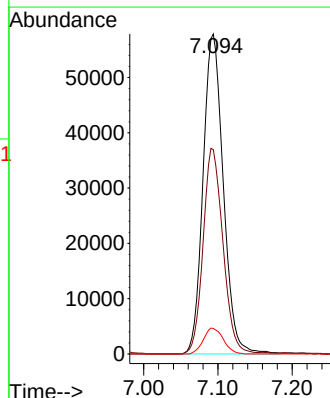
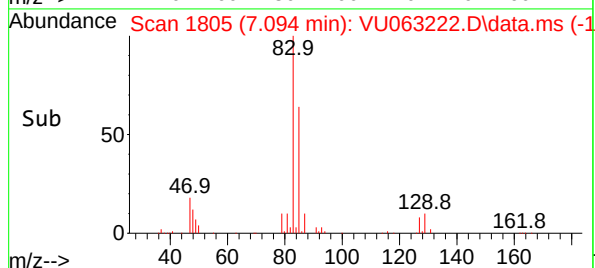
Tgt Ion: 83 Resp: 109612

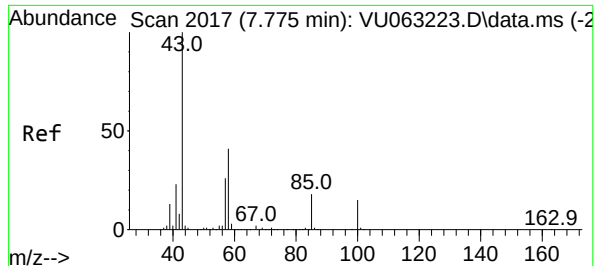
Ion Ratio Lower Upper

83 100

85 63.9 51.7 77.5

127 8.0 6.7 10.1





#45

4-Methyl-2-Pentanone

Concen: 25.799 ug/l

RT: 7.779 min Scan# 2017

Delta R.T. 0.003 min

Lab File: VU063222.D

Acq: 10 Feb 2025 14:23

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC005

Tgt Ion: 43 Resp: 24546

Ion Ratio Lower Upper

43 100

58 40.8 20.8 62.5

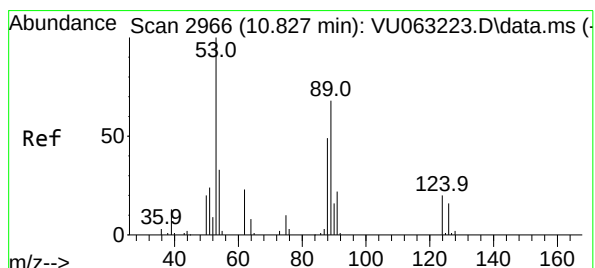
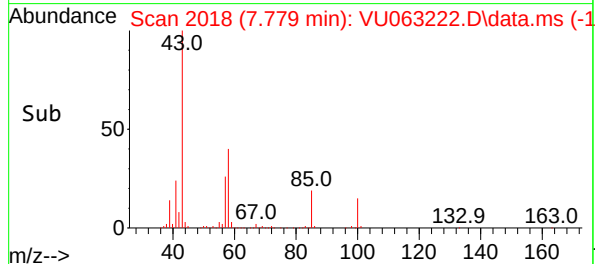
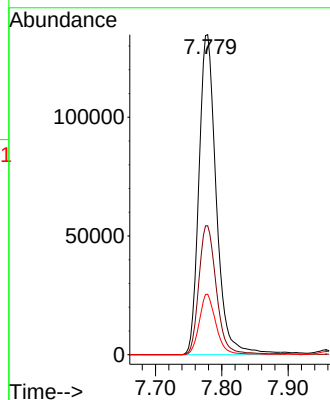
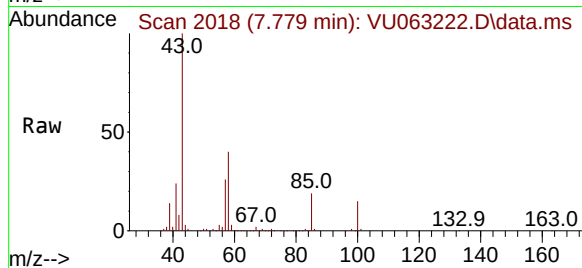
85 18.0 14.8 22.2

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#46

t-1,4-Dichloro-2-butene

Concen: 8.544 ug/l m

RT: 10.824 min Scan# 2965

Delta R.T. -0.003 min

Lab File: VU063222.D

Acq: 10 Feb 2025 14:23

Tgt Ion: 75 Resp: 40225

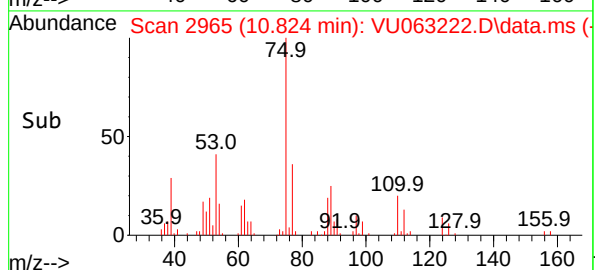
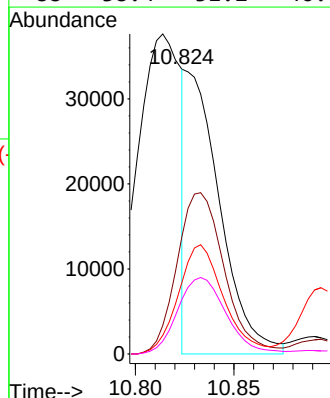
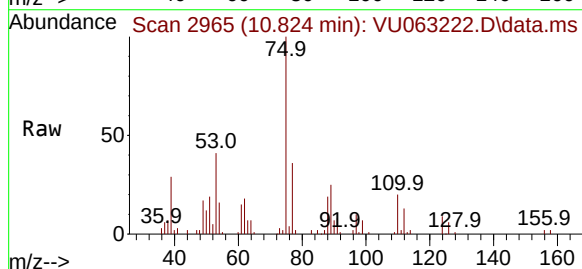
Ion Ratio Lower Upper

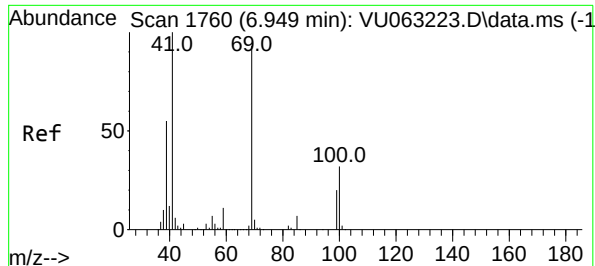
75 100

53 79.1 64.5 96.7

89 51.4 43.4 65.2

88 38.4 31.2 46.8





#47

Methyl methacrylate

Concen: 10.822 ug/l

RT: 6.949 min Scan# 1760

Delta R.T. 0.000 min

Lab File: VU063222.D

Acq: 10 Feb 2025 14:23

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC005

Tgt Ion: 69 Resp: 82725

Ion Ratio Lower Upper

69 100

41 103.9 0.0 217.0

39 58.1 47.7 71.5

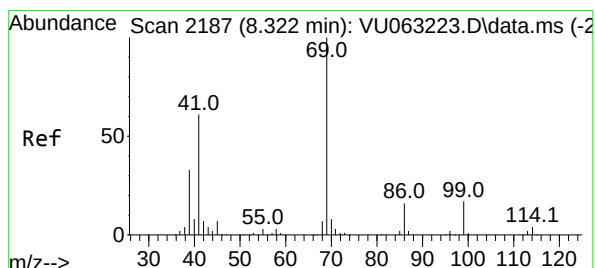
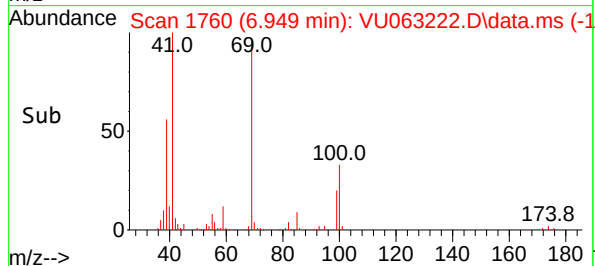
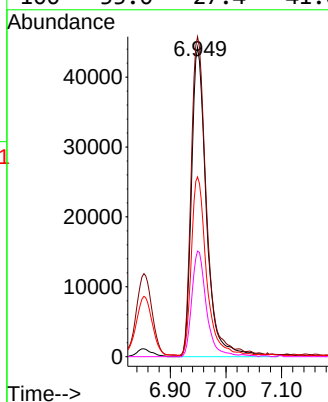
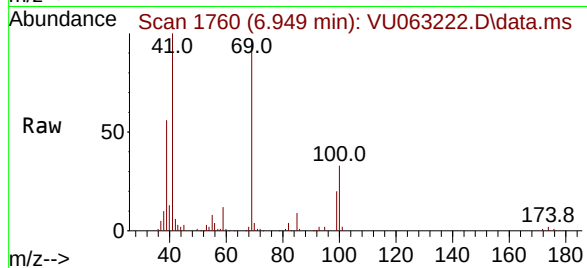
100 33.0 27.4 41.0

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#48

Ethyl methacrylate

Concen: 5.238 ug/l

RT: 8.322 min Scan# 2187

Delta R.T. 0.000 min

Lab File: VU063222.D

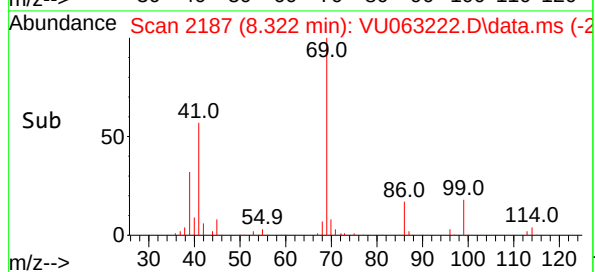
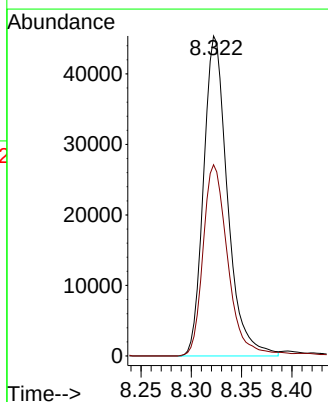
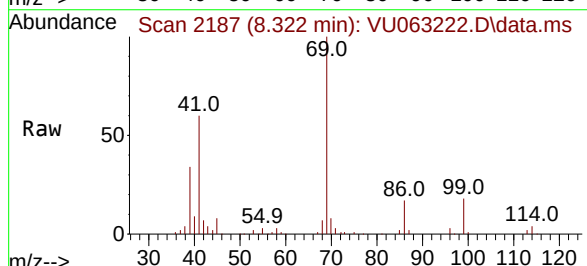
Acq: 10 Feb 2025 14:23

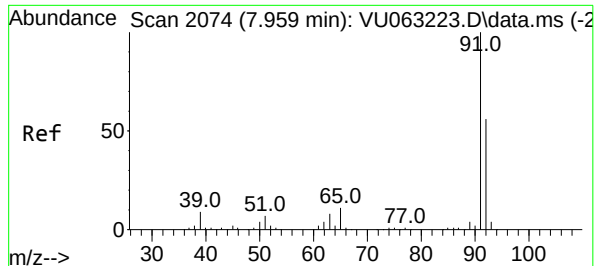
Tgt Ion: 69 Resp: 75186

Ion Ratio Lower Upper

69 100

41 62.0 30.6 92.0





#49

Toluene

Concen: 5.270 ug/l

RT: 7.959 min Scan# 20754

Delta R.T. 0.000 min

Lab File: VU063222.D

Acq: 10 Feb 2025 14:23

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC005

Tgt Ion: 92 Resp: 20754

Ion Ratio Lower Upper

92 100

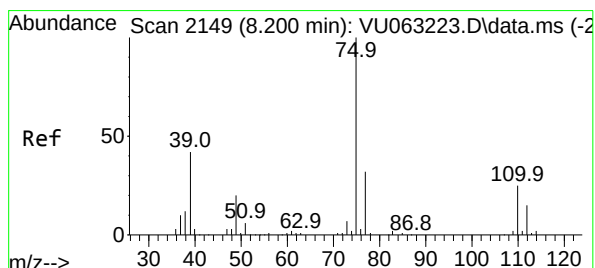
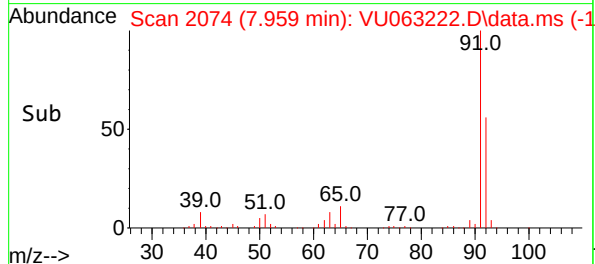
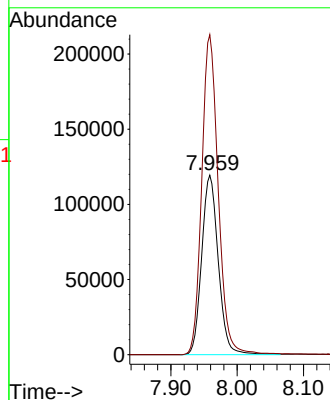
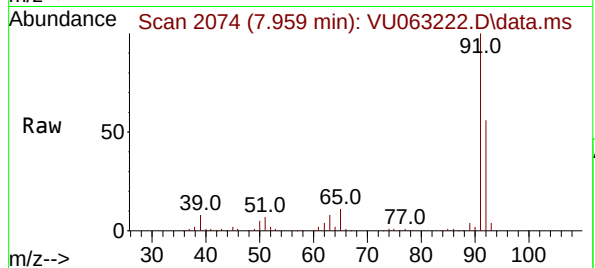
91 177.1 141.8 212.6

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#50

t-1,3-Dichloropropene

Concen: 5.221 ug/l

RT: 8.200 min Scan# 2149

Delta R.T. 0.000 min

Lab File: VU063222.D

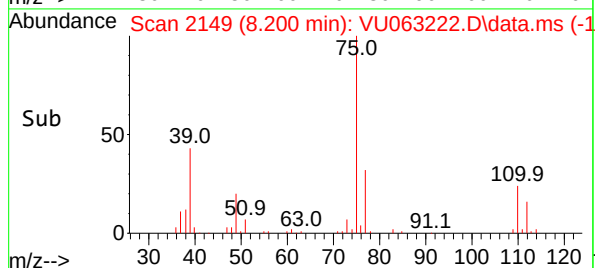
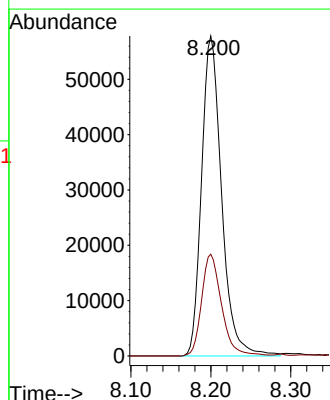
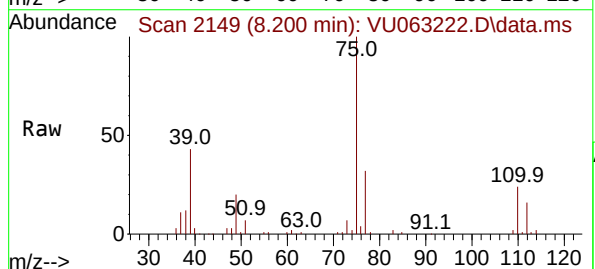
Acq: 10 Feb 2025 14:23

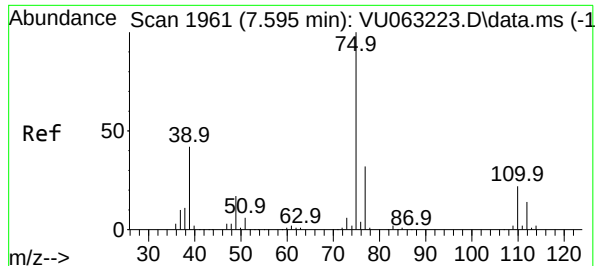
Tgt Ion: 75 Resp: 100975

Ion Ratio Lower Upper

75 100

77 31.8 25.9 38.9





#51

cis-1,3-Dichloropropene

Concen: 5.070 ug/l

RT: 7.595 min Scan# 1961

Delta R.T. 0.000 min

Lab File: VU063222.D

Acq: 10 Feb 2025 14:23

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC005

Tgt Ion: 75 Resp: 12110

Ion Ratio Lower Upper

75 100

77 32.6 25.3 37.9

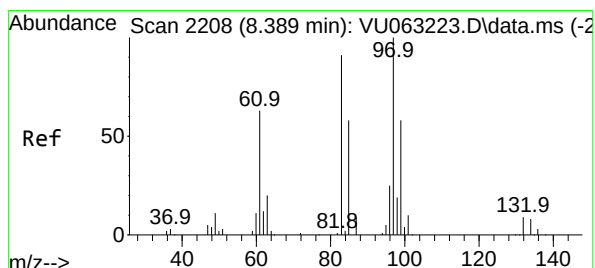
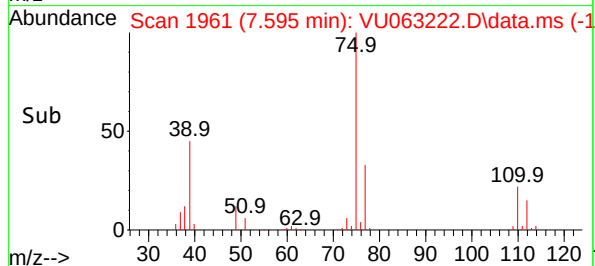
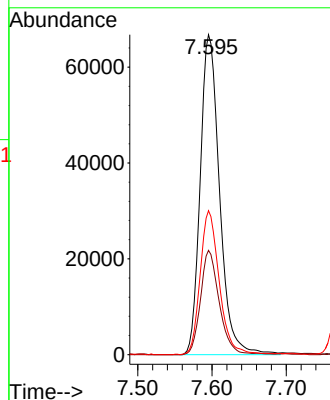
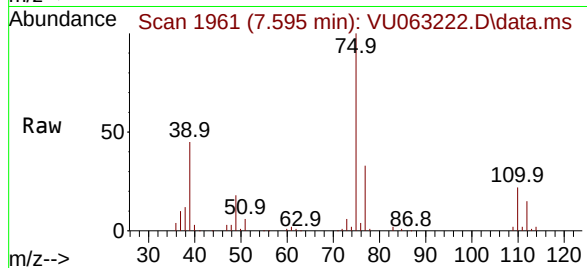
39 45.0 33.5 50.3

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#52

1,1,2-Trichloroethane

Concen: 5.042 ug/l

RT: 8.386 min Scan# 2207

Delta R.T. -0.003 min

Lab File: VU063222.D

Acq: 10 Feb 2025 14:23

Tgt Ion: 97 Resp: 61701

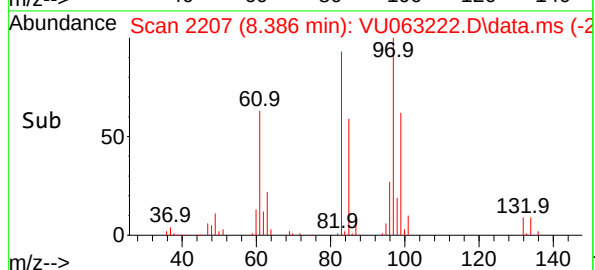
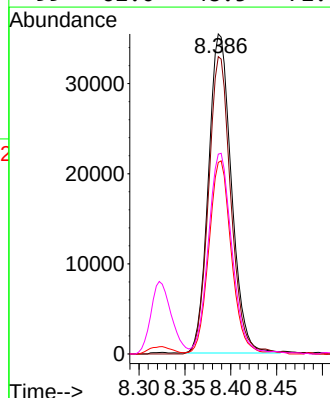
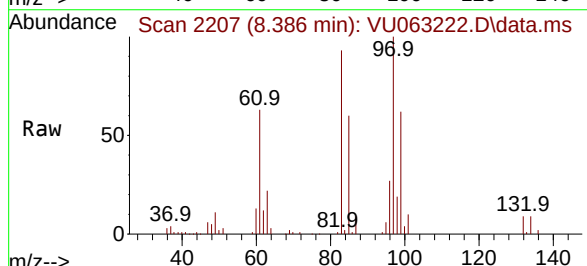
Ion Ratio Lower Upper

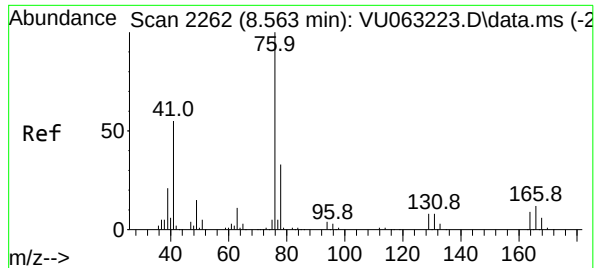
97 100

83 93.2 73.0 109.4

85 59.6 46.3 69.5

99 62.0 48.5 72.7





#53

1,3-Dichloropropane

Concen: 5.136 ug/l

RT: 8.563 min Scan# 21156

Delta R.T. 0.000 min

Lab File: VU063222.D

Acq: 10 Feb 2025 14:23

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC005

Tgt Ion: 76 Resp: 11156

Ion Ratio Lower Upper

76 100

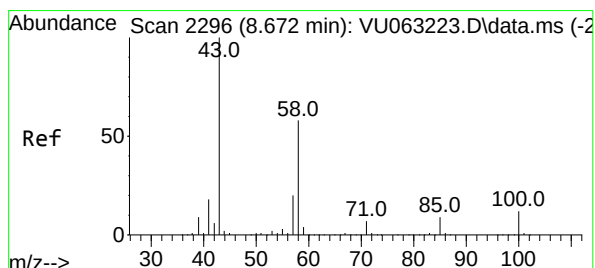
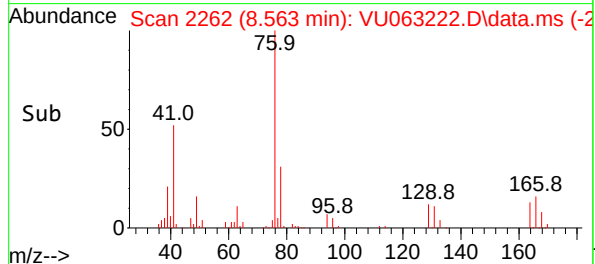
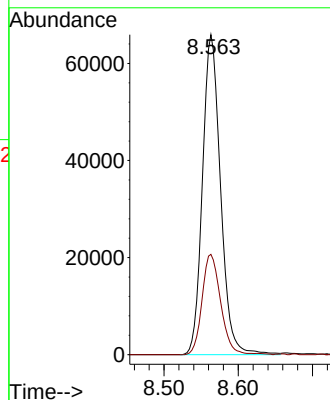
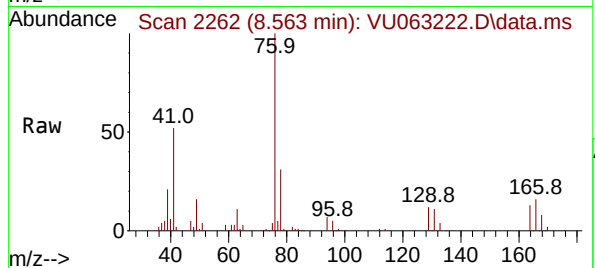
78 32.3 26.3 39.5

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#54

2-Hexanone

Concen: 25.235 ug/l

RT: 8.672 min Scan# 2296

Delta R.T. 0.000 min

Lab File: VU063222.D

Acq: 10 Feb 2025 14:23

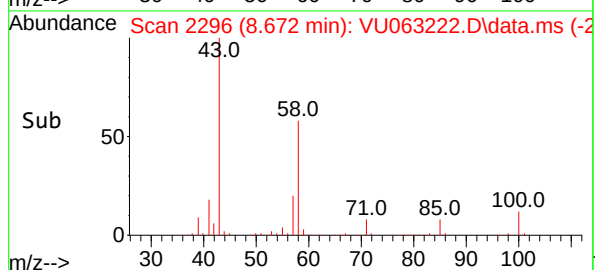
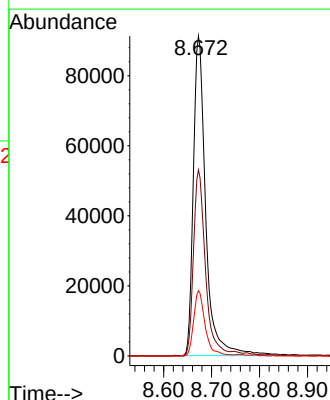
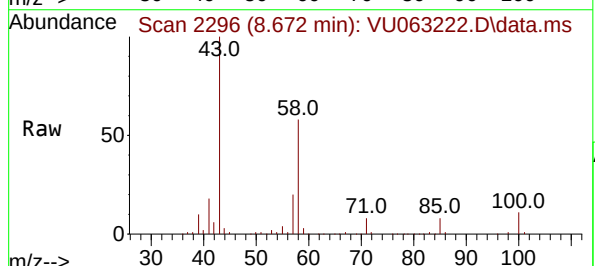
Tgt Ion: 43 Resp: 163849

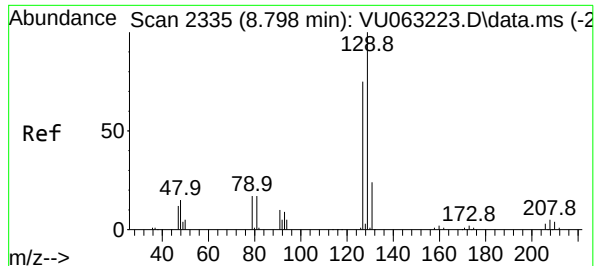
Ion Ratio Lower Upper

43 100

58 55.7 38.0 78.0

57 18.9 0.0 39.1





#55

Dibromochloromethane

Concen: 5.061 ug/l

RT: 8.798 min Scan# 2335

Delta R.T. 0.000 min

Lab File: VU063222.D

Acq: 10 Feb 2025 14:23

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC005

Tgt Ion:129 Resp: 71240

Ion Ratio Lower Upper

129 100

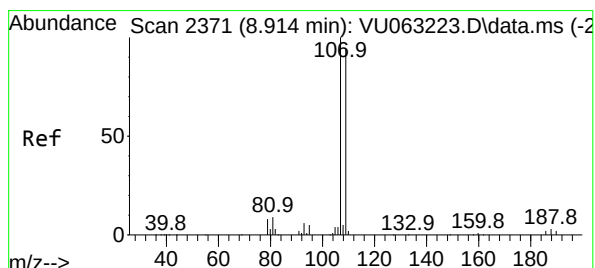
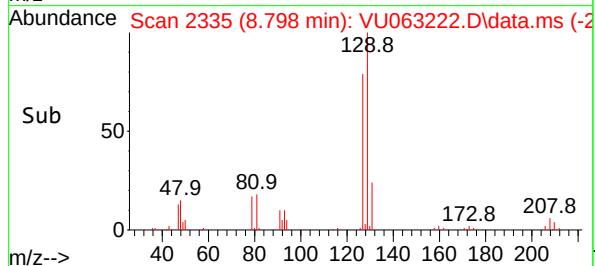
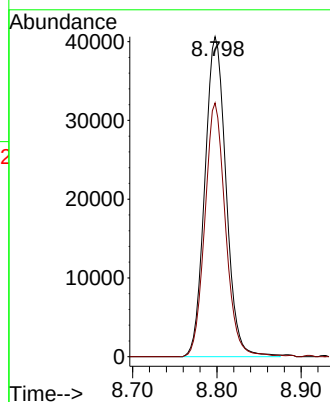
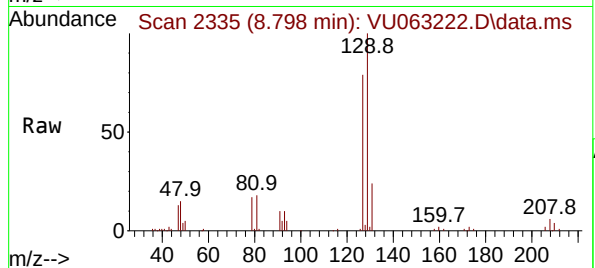
127 77.1 60.4 90.6

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#56

1,2-Dibromoethane

Concen: 5.079 ug/l

RT: 8.914 min Scan# 2371

Delta R.T. 0.000 min

Lab File: VU063222.D

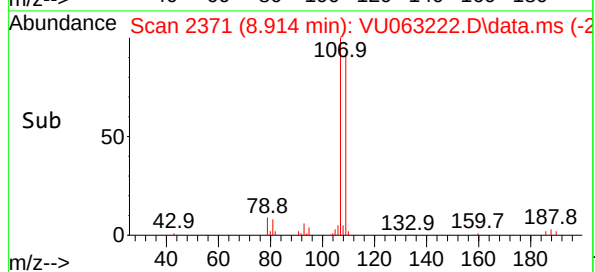
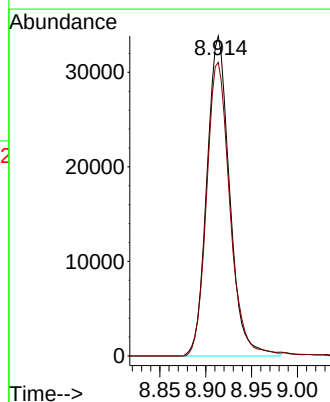
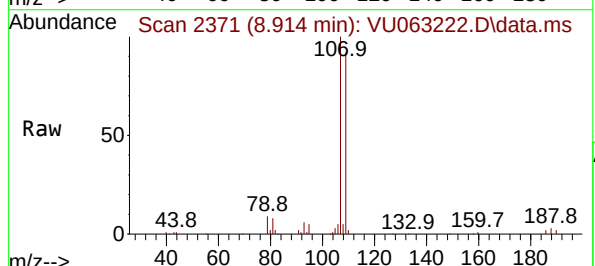
Acq: 10 Feb 2025 14:23

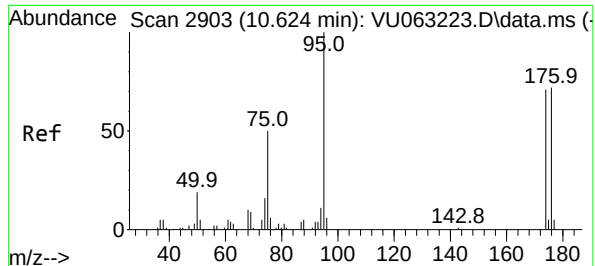
Tgt Ion:107 Resp: 58284

Ion Ratio Lower Upper

107 100

109 94.6 0.0 187.8





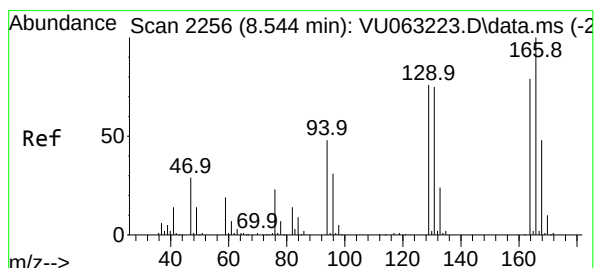
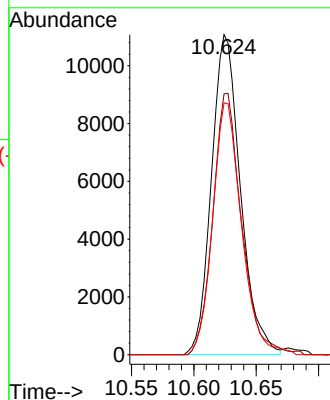
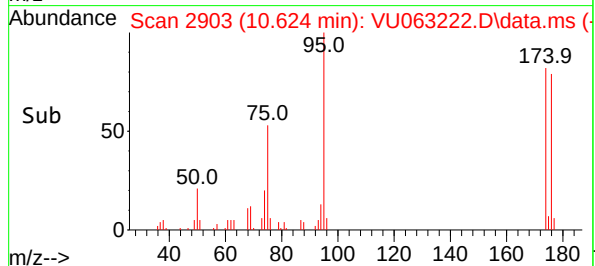
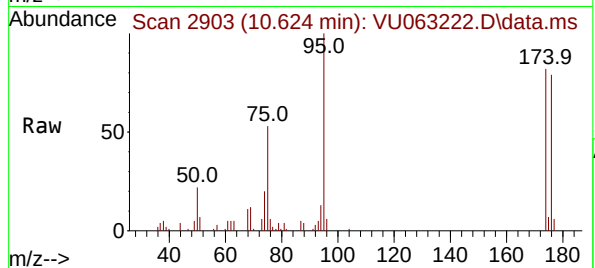
#57
4-Bromofluorobenzene
Concen: 0.974 ug/l
RT: 10.624 min Scan# 2903
Delta R.T. 0.000 min
Lab File: VU063222.D
Acq: 10 Feb 2025 14:23

Instrument :
MSVOA_U
ClientSampleId :
VSTDIC005

Tgt Ion: 95 Resp: 1791
Ion Ratio Lower Upper
95 100
174 81.3 58.6 88.0
176 78.3 58.2 87.4

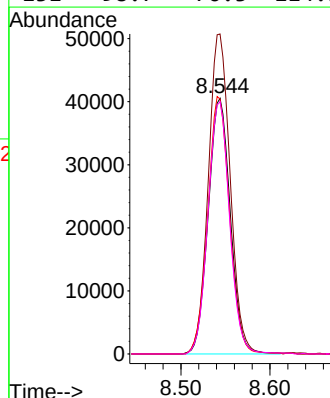
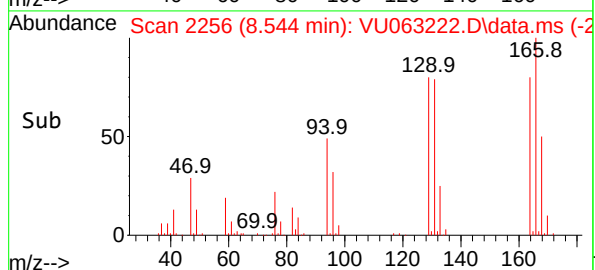
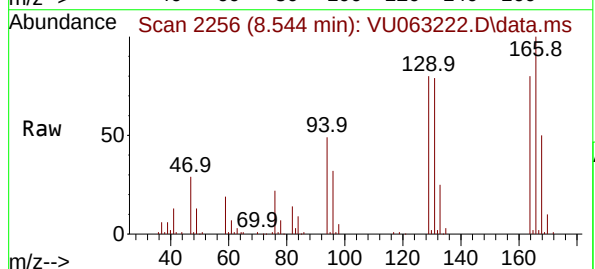
Manual Integrations
APPROVED

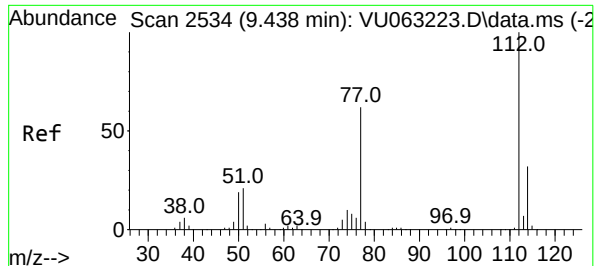
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#58
Tetrachloroethene
Concen: 5.194 ug/l
RT: 8.544 min Scan# 2256
Delta R.T. 0.000 min
Lab File: VU063222.D
Acq: 10 Feb 2025 14:23

Tgt Ion:164 Resp: 69703
Ion Ratio Lower Upper
164 100
166 125.2 101.4 152.0
129 99.7 77.0 115.4
131 98.7 76.3 114.5





#59

Chlorobenzene

Concen: 5.198 ug/l

RT: 9.438 min Scan# 21598

Delta R.T. 0.000 min

Lab File: VU063222.D

Acq: 10 Feb 2025 14:23

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC005

Tgt Ion:112 Resp: 21598

Ion Ratio Lower Upper

112 100

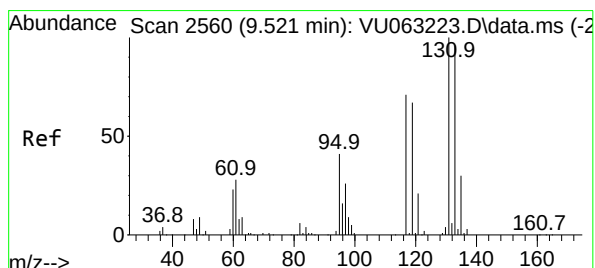
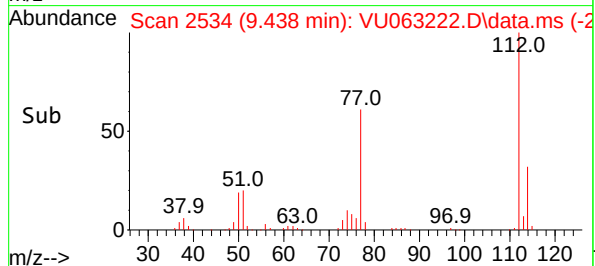
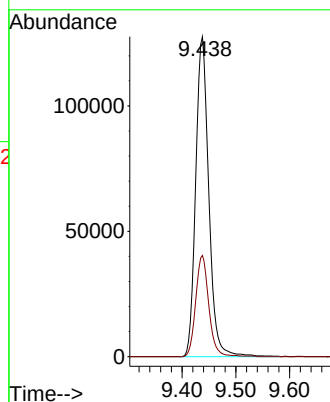
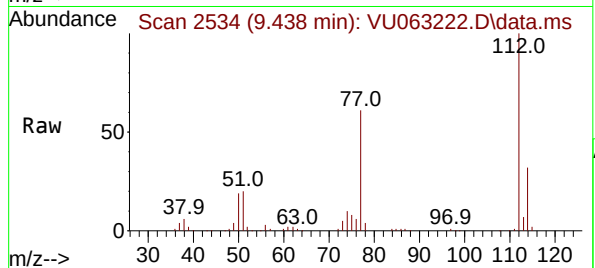
114 31.7 25.7 38.5

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#60

1,1,1,2-Tetrachloroethane

Concen: 5.018 ug/l

RT: 9.521 min Scan# 2560

Delta R.T. 0.000 min

Lab File: VU063222.D

Acq: 10 Feb 2025 14:23

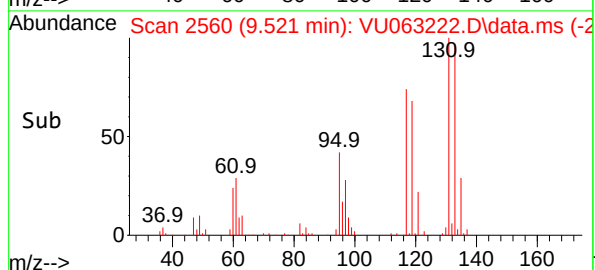
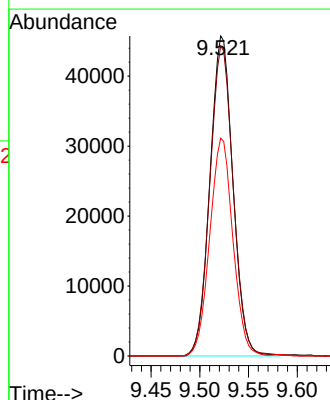
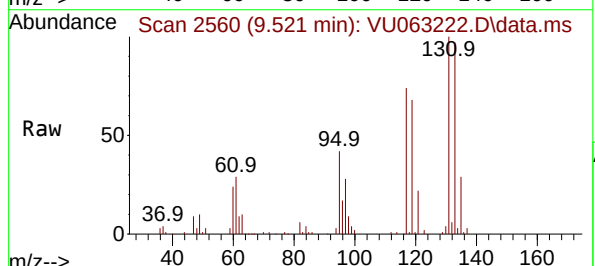
Tgt Ion:131 Resp: 74952

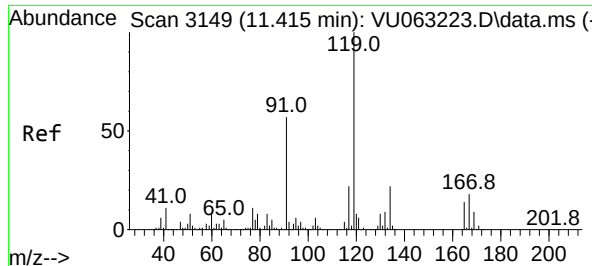
Ion Ratio Lower Upper

131 100

133 98.9 76.7 115.1

119 68.6 54.4 81.6





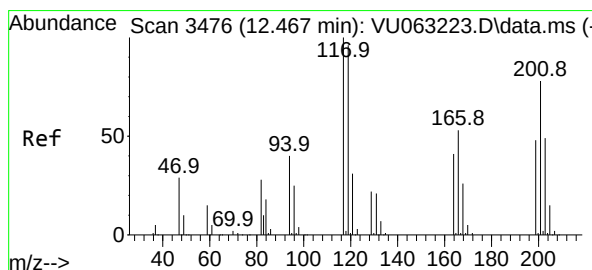
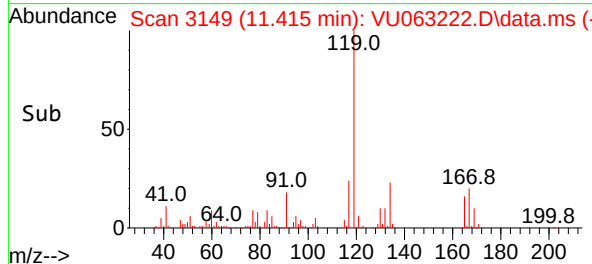
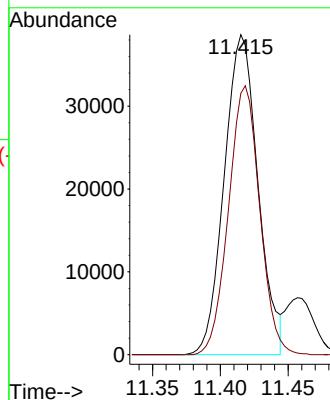
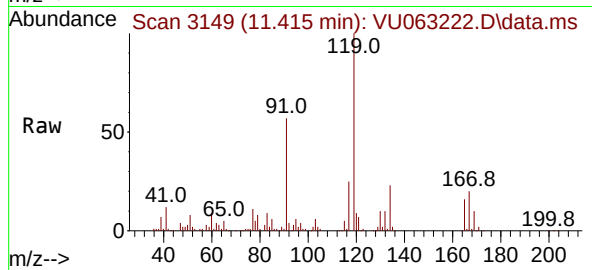
#61
Pentachloroethane
Concen: 5.016 ug/l
RT: 11.415 min Scan# 3149
Delta R.T. 0.000 min
Lab File: VU063222.D
Acq: 10 Feb 2025 14:23

Instrument :
MSVOA_U
ClientSampleId :
VSTDICC005

Tgt Ion:117 Resp: 66930
Ion Ratio Lower Upper
117 100
167 77.9 65.0 97.6

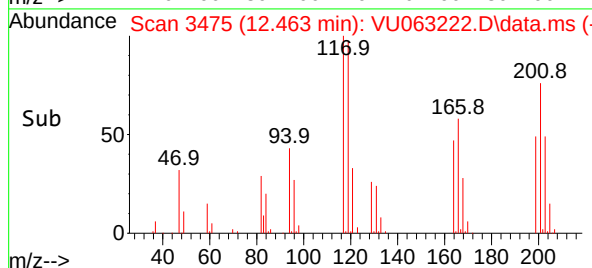
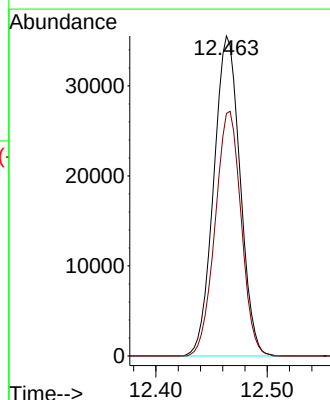
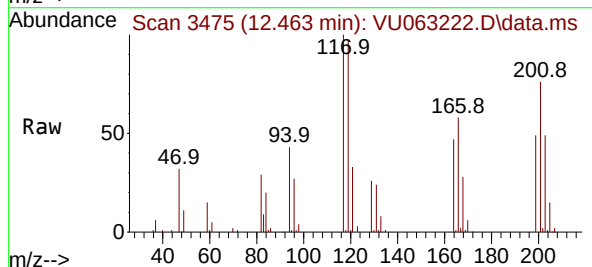
Manual Integrations
APPROVED

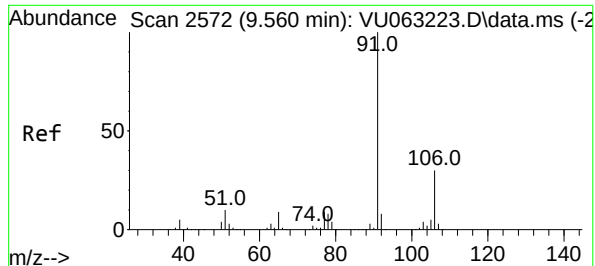
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#62
Hexachloroethane
Concen: 4.947 ug/l
RT: 12.463 min Scan# 3475
Delta R.T. -0.003 min
Lab File: VU063222.D
Acq: 10 Feb 2025 14:23

Tgt Ion:117 Resp: 58399
Ion Ratio Lower Upper
117 100
201 75.3 61.3 91.9





#63

Ethyl Benzene

Concen: 5.301 ug/l

RT: 9.560 min Scan# 2572

Delta R.T. 0.000 min

Lab File: VU063222.D

Acq: 10 Feb 2025 14:23

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC005

Tgt Ion: 91 Resp: 37992

Ion Ratio Lower Upper

91 100

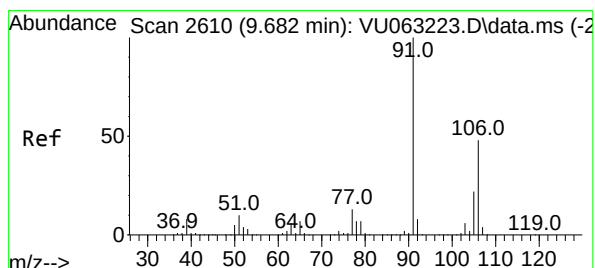
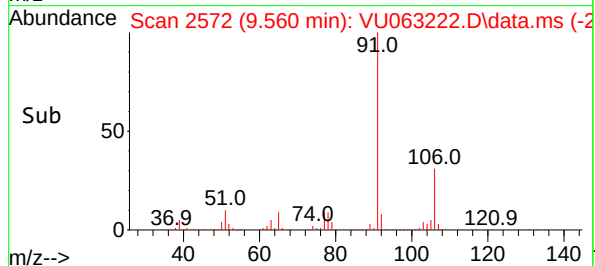
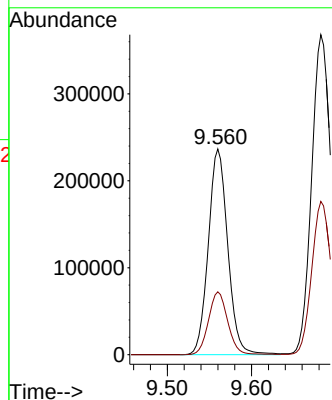
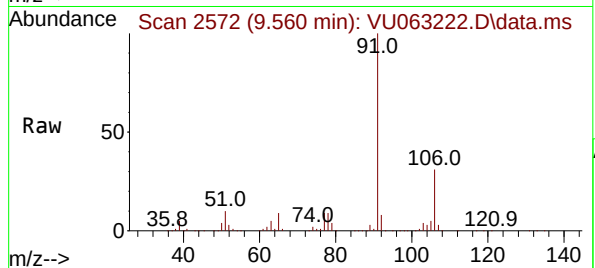
106 30.6 24.2 36.2

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#64

m/p-Xylenes

Concen: 10.960 ug/l

RT: 9.682 min Scan# 2610

Delta R.T. 0.000 min

Lab File: VU063222.D

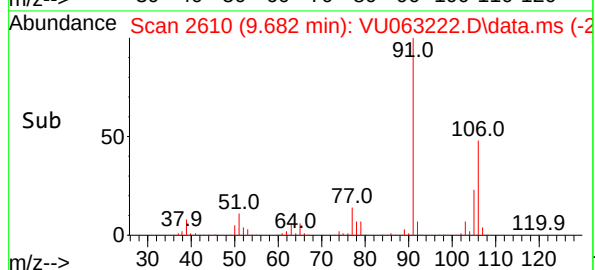
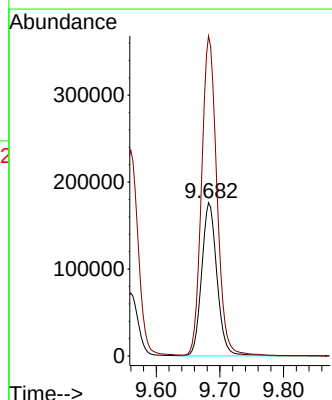
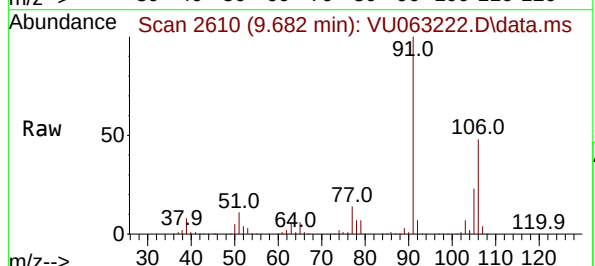
Acq: 10 Feb 2025 14:23

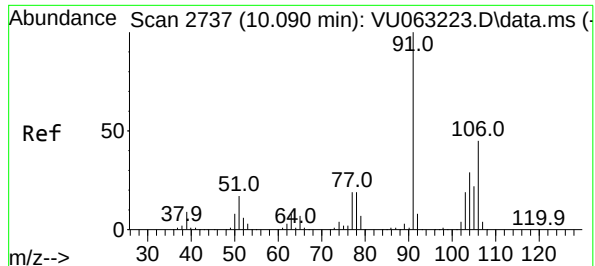
Tgt Ion:106 Resp: 293404

Ion Ratio Lower Upper

106 100

91 209.6 166.9 250.3





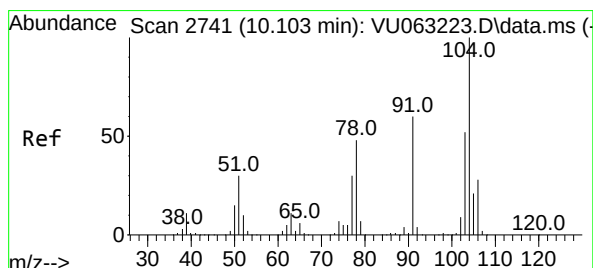
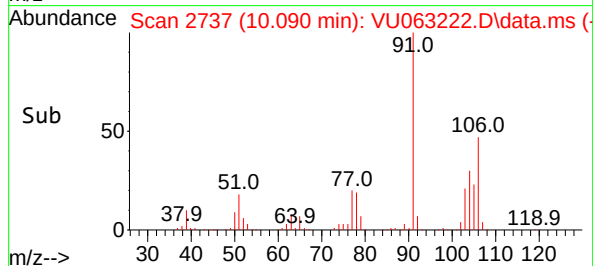
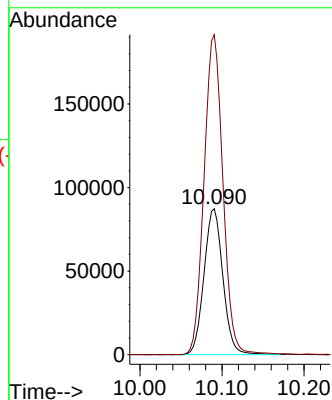
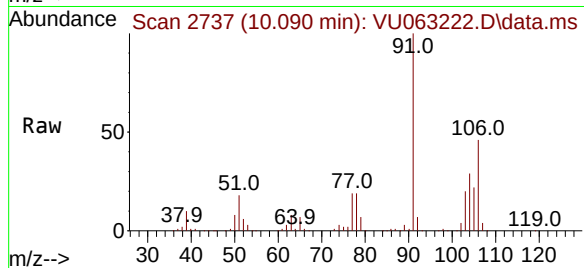
#65
o-Xylene
Concen: 5.340 ug/l
RT: 10.090 min Scan# 2737
Delta R.T. 0.000 min
Lab File: VU063222.D
Acq: 10 Feb 2025 14:23

Instrument :
MSVOA_U
ClientSampleId :
VSTDIC005

Tgt Ion:106 Resp: 139940
Ion Ratio Lower Upper
106 100
91 219.4 110.9 332.9

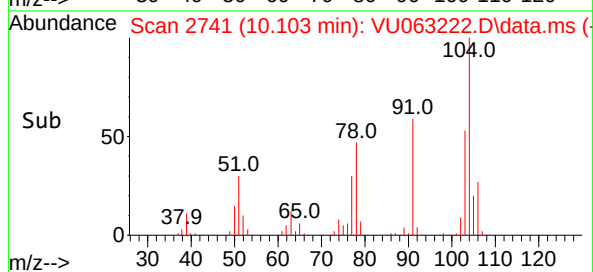
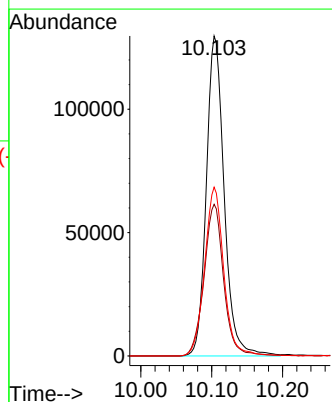
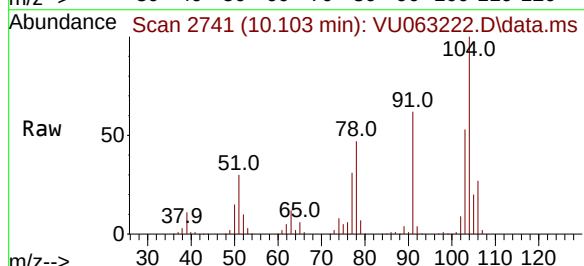
Manual Integrations
APPROVED

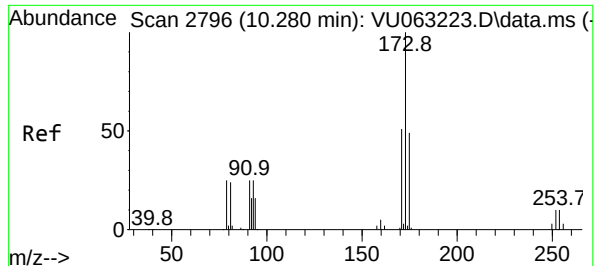
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#66
Styrene
Concen: 5.448 ug/l
RT: 10.103 min Scan# 2741
Delta R.T. 0.000 min
Lab File: VU063222.D
Acq: 10 Feb 2025 14:23

Tgt Ion:104 Resp: 227199
Ion Ratio Lower Upper
104 100
78 52.1 41.2 61.8
103 56.8 44.8 67.2





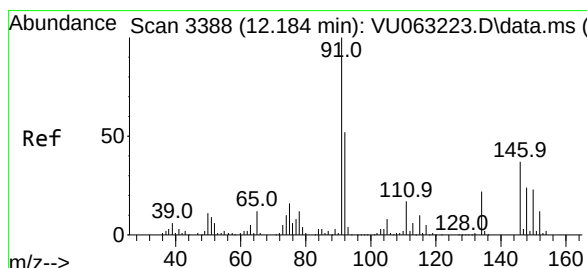
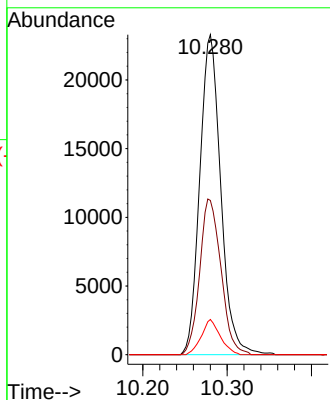
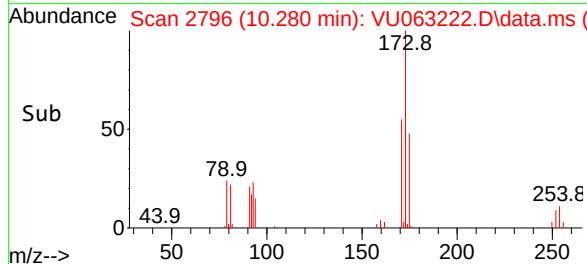
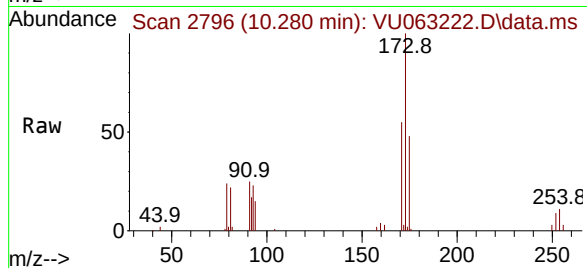
#67
Bromoform
Concen: 5.053 ug/l
RT: 10.280 min Scan# 2796
Delta R.T. 0.000 min
Lab File: VU063222.D
Acq: 10 Feb 2025 14:23

Instrument :
MSVOA_U
ClientSampleId :
VSTDICC005

Tgt Ion:173 Resp: 40369
Ion Ratio Lower Upper
173 100
175 49.3 39.0 58.4
254 9.9 7.7 11.5

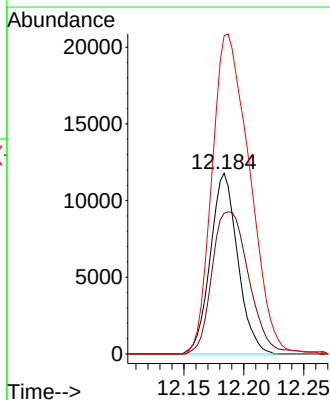
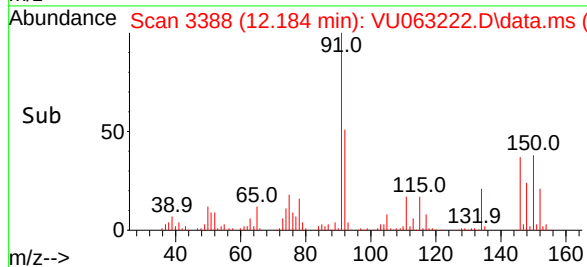
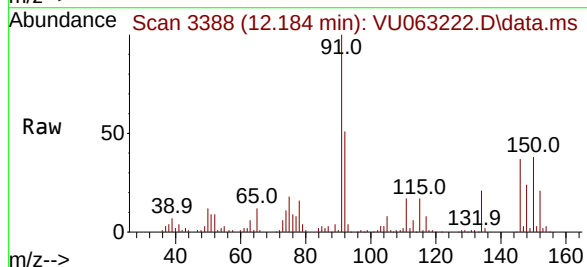
Manual Integrations
APPROVED

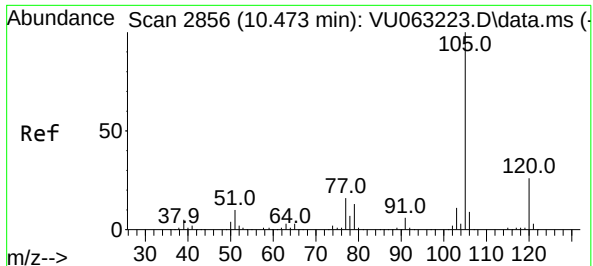
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#68
1,2-Dichlorobenzene-d4
Concen: 0.978 ug/l
RT: 12.184 min Scan# 3388
Delta R.T. 0.000 min
Lab File: VU063222.D
Acq: 10 Feb 2025 14:23

Tgt Ion:152 Resp: 18704
Ion Ratio Lower Upper
152 100
115 105.9 0.0 275.2
150 243.0 0.0 658.4





#69

Isopropylbenzene

Concen: 5.356 ug/l

RT: 10.473 min Scan# 2856

Delta R.T. 0.000 min

Lab File: VU063222.D

Acq: 10 Feb 2025 14:23

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC005

Tgt Ion:105 Resp: 329990

Ion Ratio Lower Upper

105 100

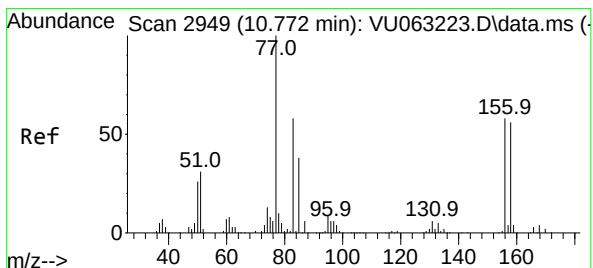
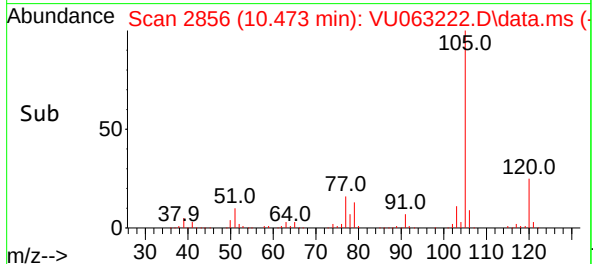
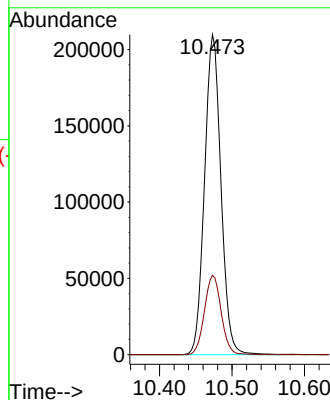
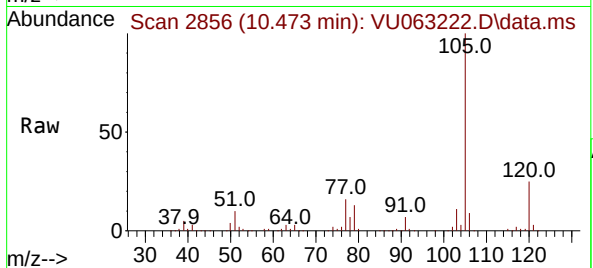
120 25.3 12.8 38.4

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#70

1,1,2,2-Tetrachloroethane

Concen: 4.932 ug/l

RT: 10.769 min Scan# 2948

Delta R.T. -0.003 min

Lab File: VU063222.D

Acq: 10 Feb 2025 14:23

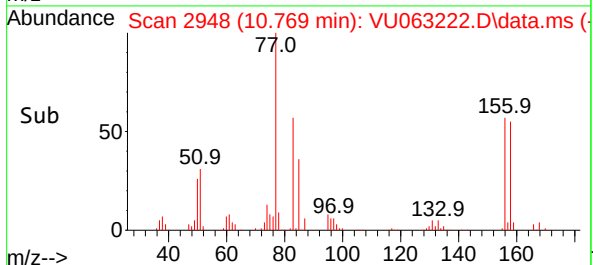
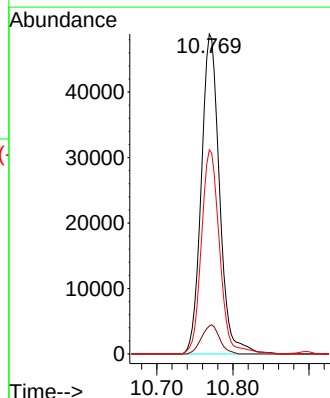
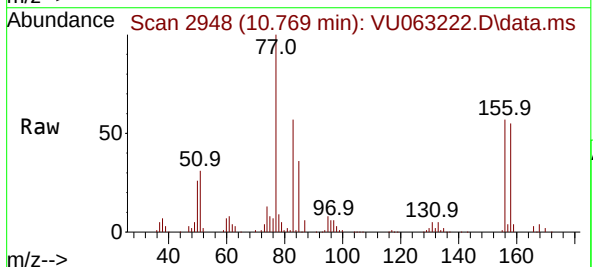
Tgt Ion: 83 Resp: 81338

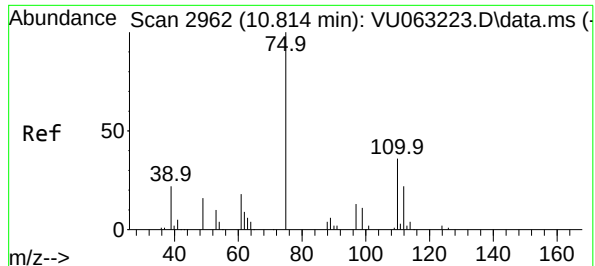
Ion Ratio Lower Upper

83 100

131 9.0 7.4 11.0

85 63.7 51.8 77.8





#71

1,2,3-Trichloropropane

Concen: 4.736 ug/l m

RT: 10.814 min Scan# 2962

Delta R.T. 0.000 min

Lab File: VU063222.D

Acq: 10 Feb 2025 14:23

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC005

Tgt Ion: 75 Resp: 59228

Ion Ratio Lower Upper

75 100

77 0.0 0.0 0.0

110 35.6 0.0 77.0

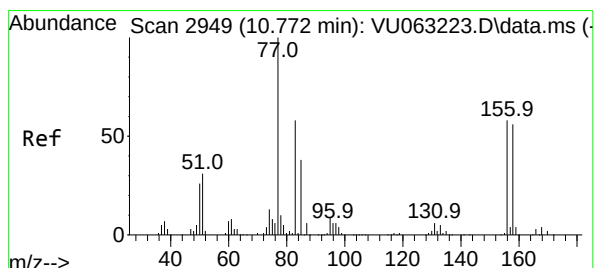
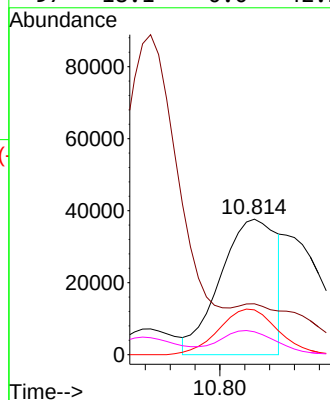
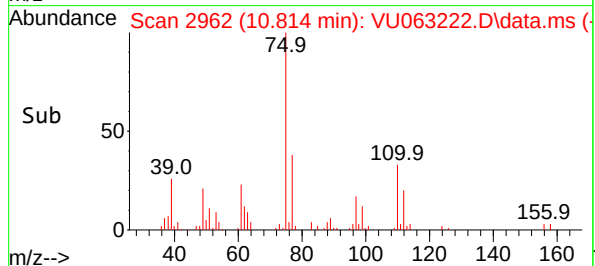
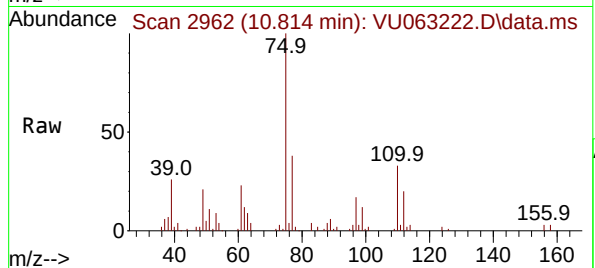
97 18.1 0.0 42.2

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#72

Bromobenzene

Concen: 5.178 ug/l

RT: 10.772 min Scan# 2949

Delta R.T. 0.000 min

Lab File: VU063222.D

Acq: 10 Feb 2025 14:23

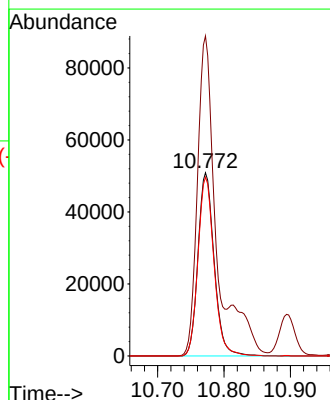
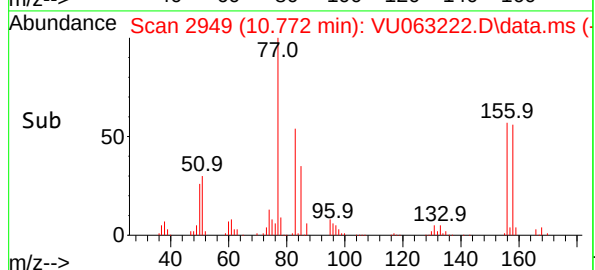
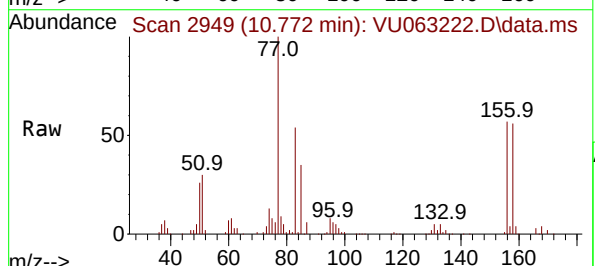
Tgt Ion:156 Resp: 85960

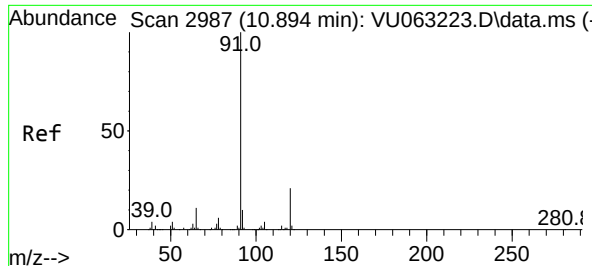
Ion Ratio Lower Upper

156 100

77 175.5 0.0 343.6

158 97.1 0.0 193.0





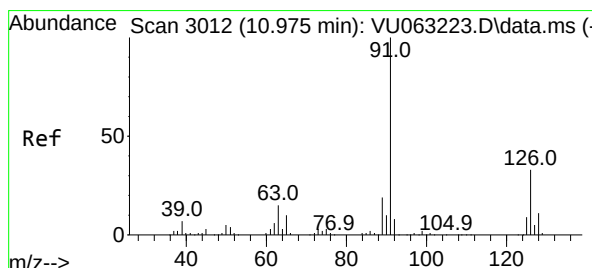
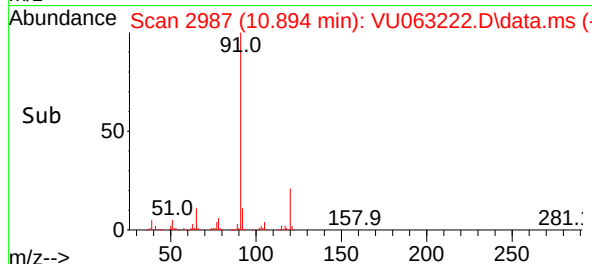
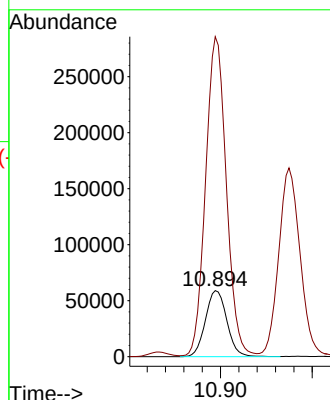
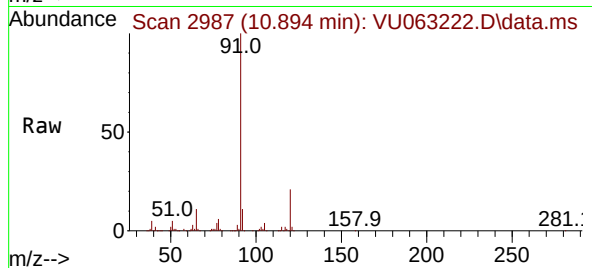
#73
n-propylbenzene
Concen: 5.439 ug/l
RT: 10.894 min Scan# 2987
Delta R.T. 0.000 min
Lab File: VU063222.D
Acq: 10 Feb 2025 14:23

Instrument :
MSVOA_U
ClientSampleId :
VSTDICC005

Tgt Ion:120 Resp: 9593
Ion Ratio Lower Upper
120 100
91 464.6 369.8 554.6

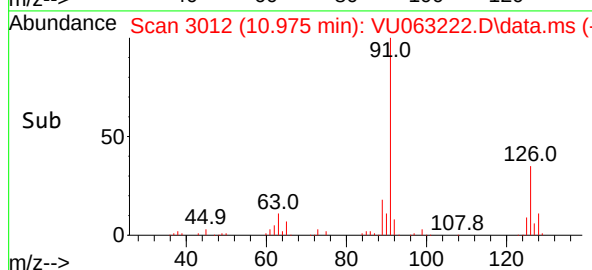
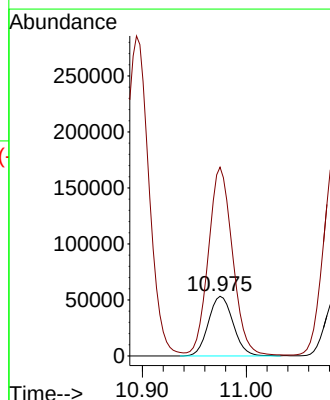
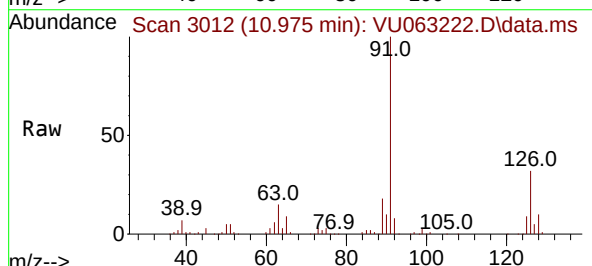
Manual Integrations
APPROVED

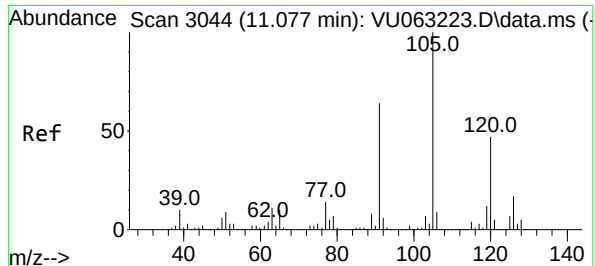
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#74
2-Chlorotoluene
Concen: 5.399 ug/l
RT: 10.975 min Scan# 3012
Delta R.T. 0.000 min
Lab File: VU063222.D
Acq: 10 Feb 2025 14:23

Tgt Ion:126 Resp: 87769
Ion Ratio Lower Upper
126 100
91 307.9 0.0 623.8





#75

1,3,5-Trimethylbenzene

Concen: 5.489 ug/l

RT: 11.078 min Scan# 3044

Delta R.T. 0.000 min

Lab File: VU063222.D

Acq: 10 Feb 2025 14:23

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC005

Tgt Ion:105 Resp: 31334

Ion Ratio Lower Upper

105 100

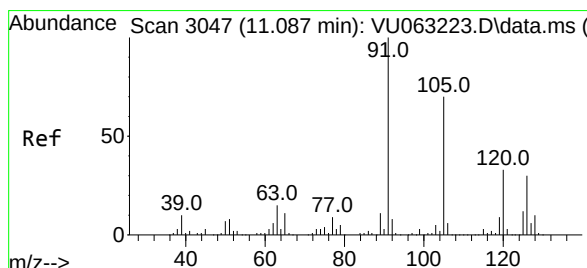
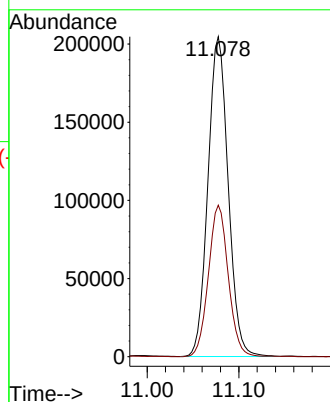
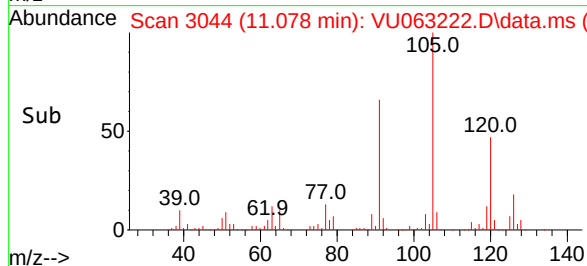
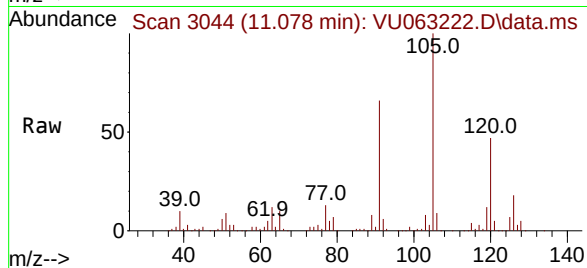
120 46.6 37.3 55.9

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#76

4-Chlorotoluene

Concen: 5.353 ug/l

RT: 11.087 min Scan# 3047

Delta R.T. 0.000 min

Lab File: VU063222.D

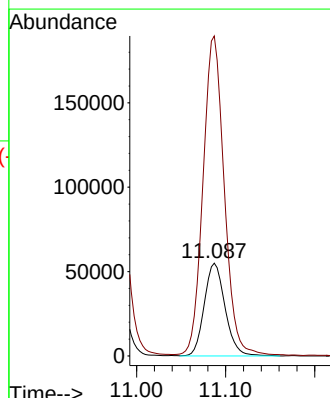
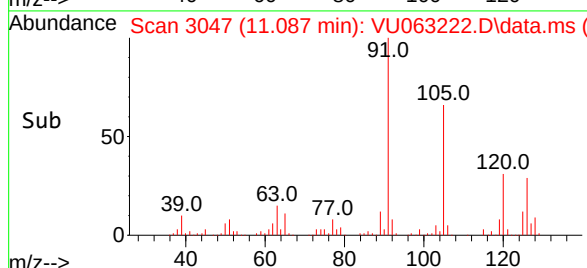
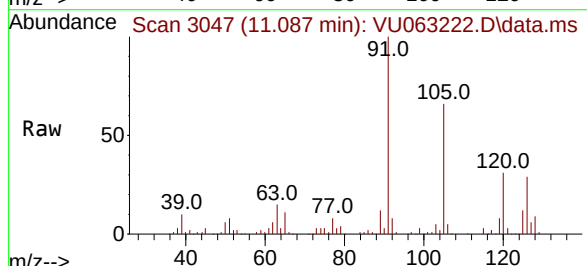
Acq: 10 Feb 2025 14:23

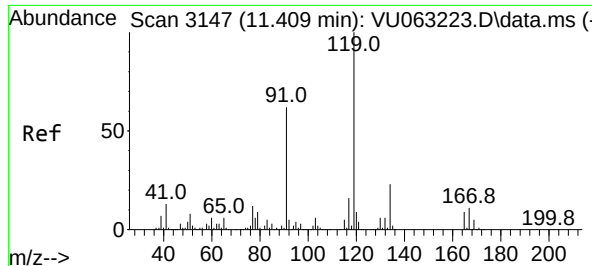
Tgt Ion:126 Resp: 89247

Ion Ratio Lower Upper

126 100

91 349.6 0.0 703.6





#77

tert-Butylbenzene

Concen: 5.183 ug/l

RT: 11.409 min Scan# 3147

Delta R.T. 0.000 min

Lab File: VU063222.D

Acq: 10 Feb 2025 14:23

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC005

Tgt Ion:119 Resp: 299259

Ion Ratio Lower Upper

119 100

91 59.8 29.4 88.3

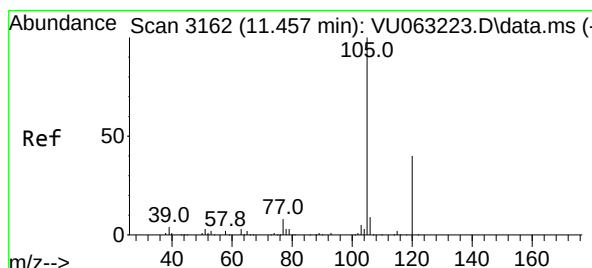
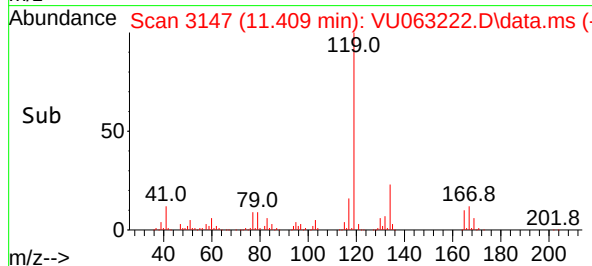
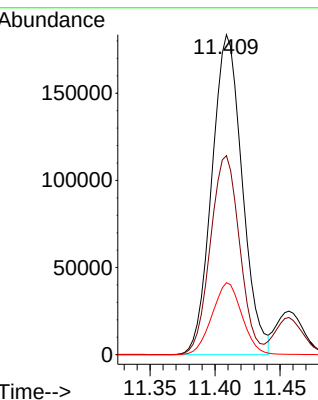
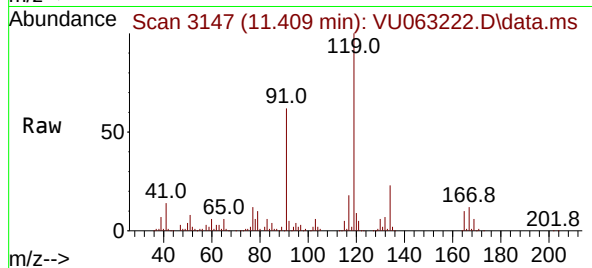
134 22.2 17.6 26.4

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#78

1,2,4-Trimethylbenzene

Concen: 5.539 ug/l

RT: 11.457 min Scan# 3162

Delta R.T. 0.000 min

Lab File: VU063222.D

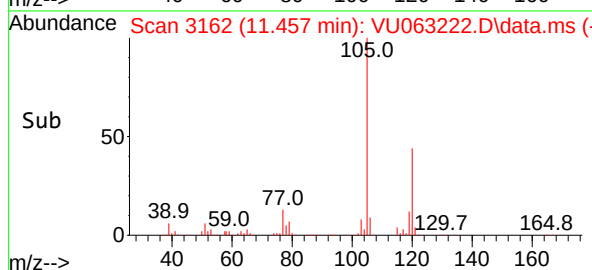
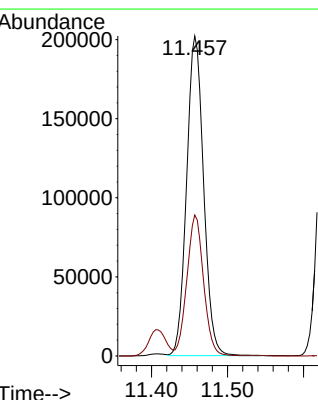
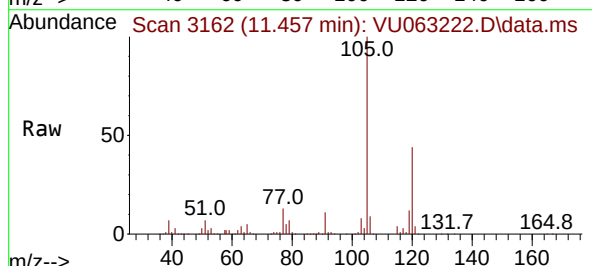
Acq: 10 Feb 2025 14:23

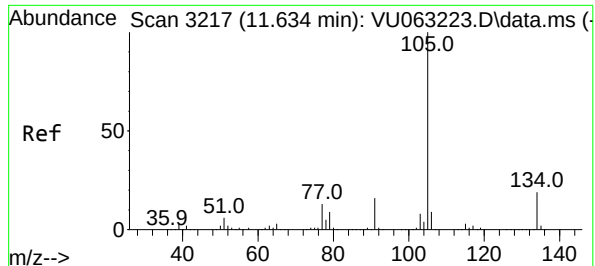
Tgt Ion:105 Resp: 313777

Ion Ratio Lower Upper

105 100

120 43.3 21.9 65.7





#79

sec-Butylbenzene

Concen: 5.362 ug/l

RT: 11.634 min Scan# 3217

Delta R.T. 0.000 min

Lab File: VU063222.D

Acq: 10 Feb 2025 14:23

Instrument :

MSVOA_U

ClientSampleId :

VSTDICC005

Tgt Ion:105 Resp: 39415

Ion Ratio Lower Upper

105 100

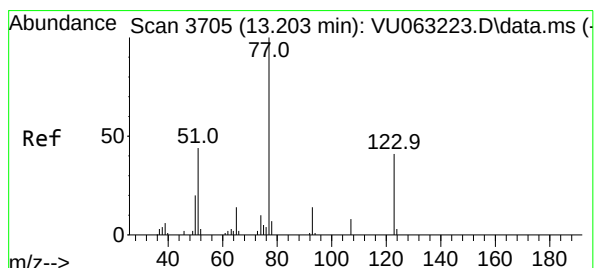
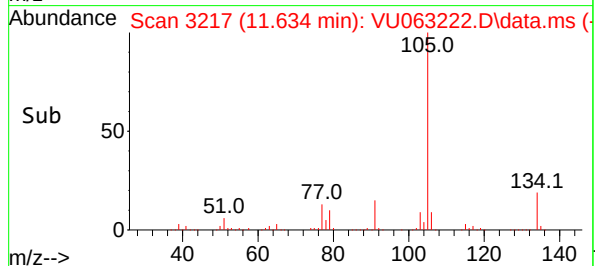
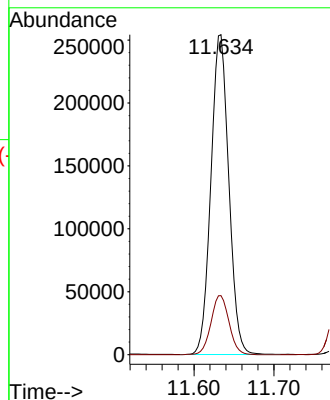
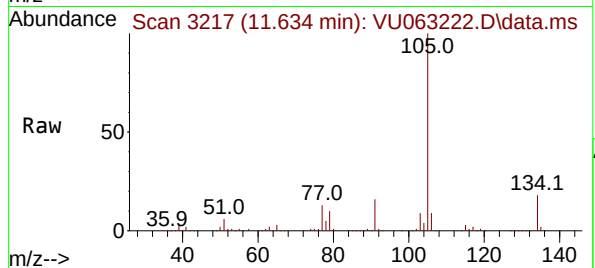
134 18.7 15.1 22.7

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#80

Nitrobenzene

Concen: 23.083 ug/l m

RT: 13.209 min Scan# 3707

Delta R.T. 0.006 min

Lab File: VU063222.D

Acq: 10 Feb 2025 14:23

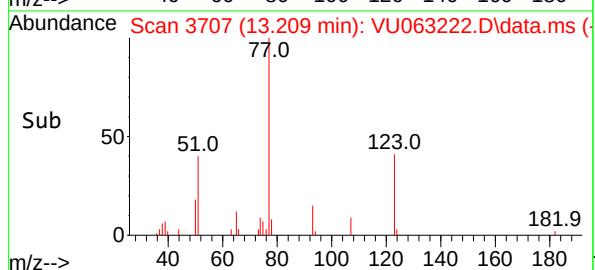
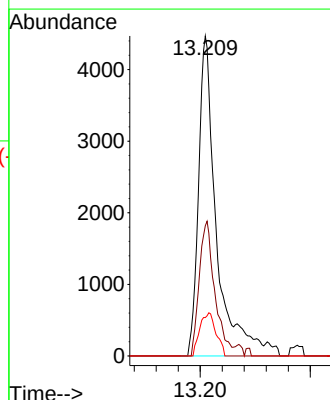
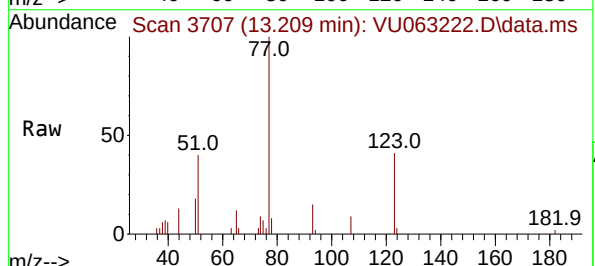
Tgt Ion: 77 Resp: 10183

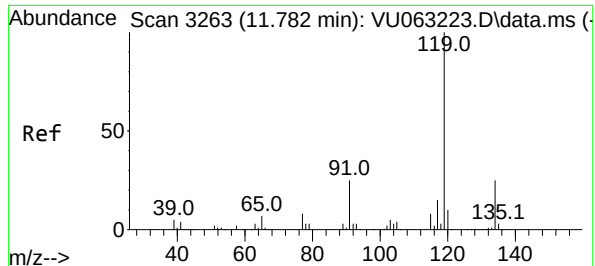
Ion Ratio Lower Upper

77 100

123 33.5 18.9 67.1

65 12.1 11.9 15.1





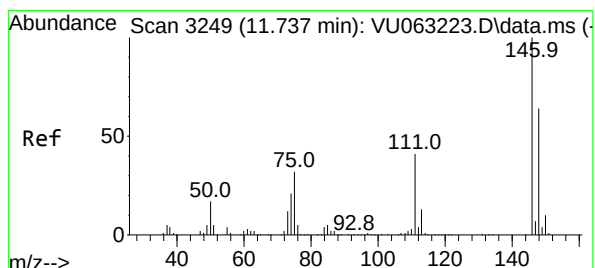
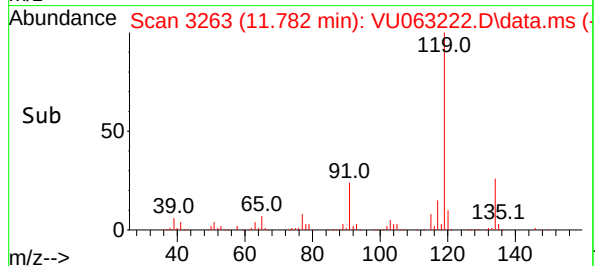
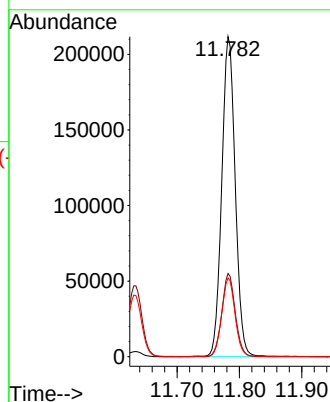
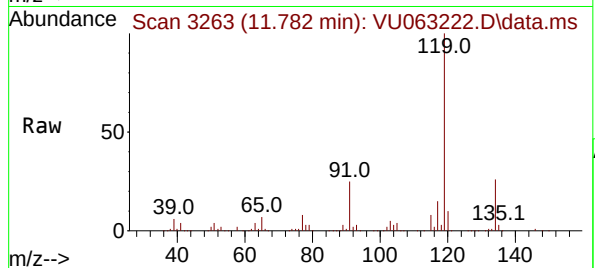
#81
p-Isopropyltoluene
Concen: 5.461 ug/l
RT: 11.782 min Scan# 31
Delta R.T. 0.000 min
Lab File: VU063222.D
Acq: 10 Feb 2025 14:23

Instrument :
MSVOA_U
ClientSampleId :
VSTDIC005

Tgt Ion:119 Resp: 31680
Ion Ratio Lower Upper
119 100
134 25.7 20.3 30.5
91 24.2 19.4 29.2

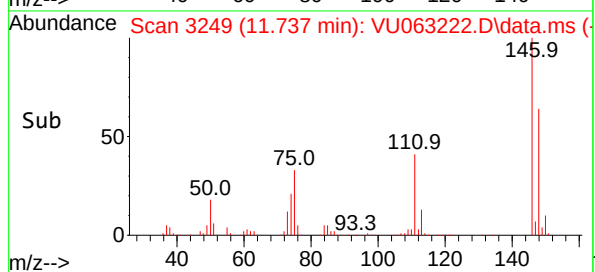
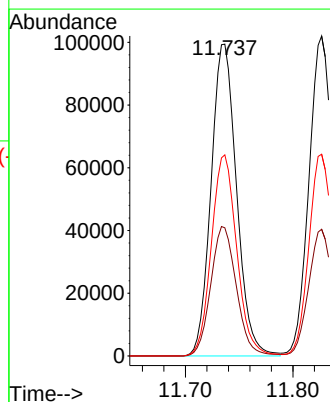
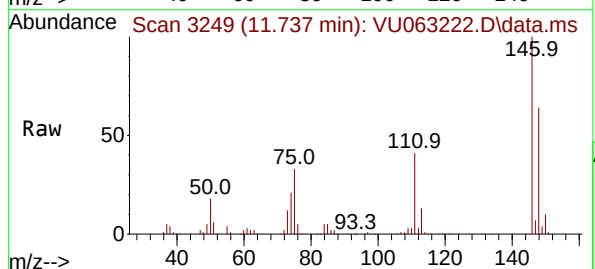
Manual Integrations
APPROVED

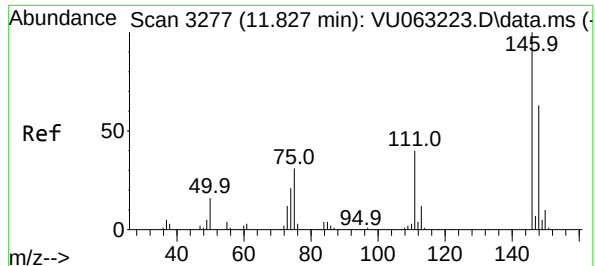
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#82
1,3-Dichlorobenzene
Concen: 5.096 ug/l
RT: 11.737 min Scan# 3249
Delta R.T. 0.000 min
Lab File: VU063222.D
Acq: 10 Feb 2025 14:23

Tgt Ion:146 Resp: 164073
Ion Ratio Lower Upper
146 100
111 41.7 32.8 49.2
148 64.2 51.1 76.7





#83

1,4-Dichlorobenzene

Concen: 5.244 ug/l

RT: 11.827 min Scan# 3277

Delta R.T. 0.000 min

Lab File: VU063222.D

Acq: 10 Feb 2025 14:23

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC005

Tgt Ion:146 Resp: 16515

Ion Ratio Lower Upper

146 100

111 39.8 32.1 48.1

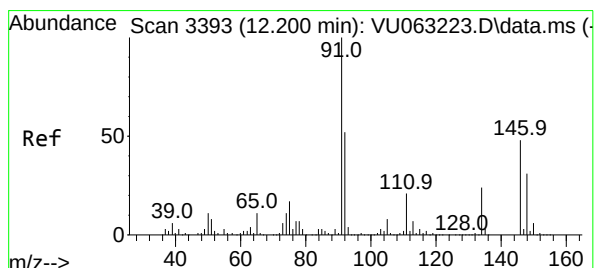
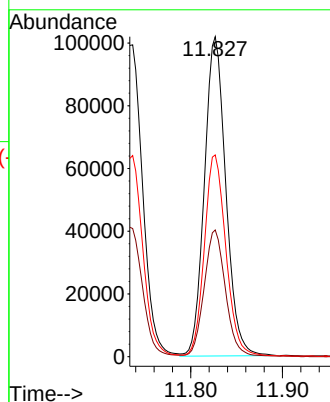
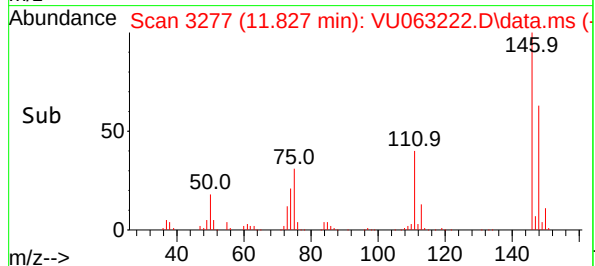
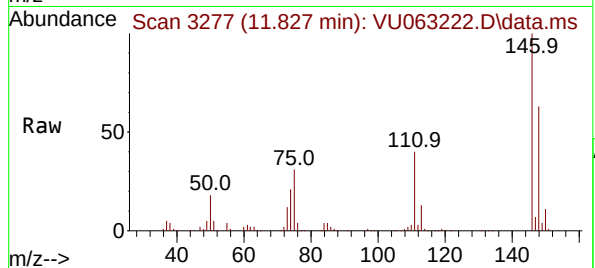
148 63.3 50.2 75.4

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#84

n-Butylbenzene

Concen: 5.285 ug/l

RT: 12.200 min Scan# 3393

Delta R.T. 0.000 min

Lab File: VU063222.D

Acq: 10 Feb 2025 14:23

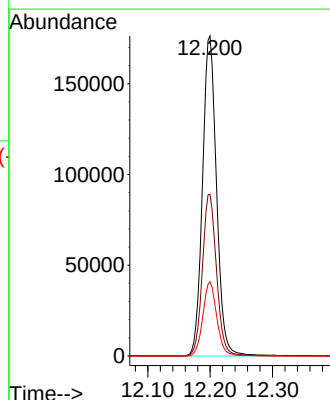
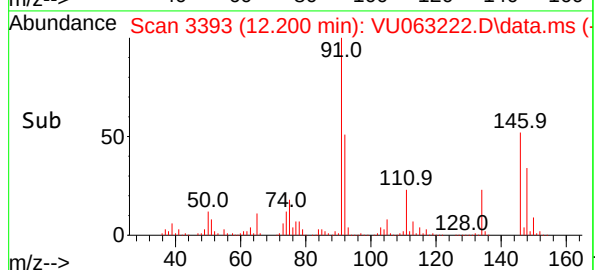
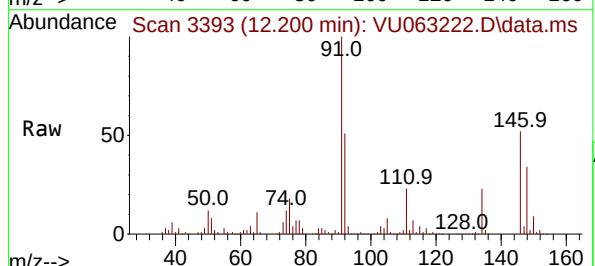
Tgt Ion: 91 Resp: 276461

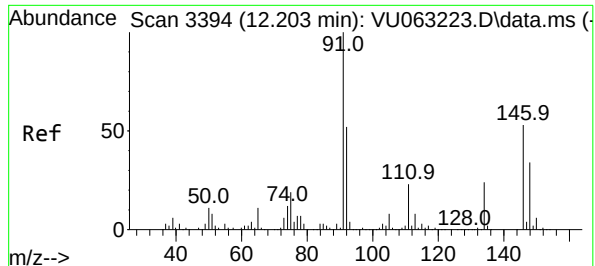
Ion Ratio Lower Upper

91 100

92 50.7 41.8 62.8

134 23.0 18.6 28.0





#85

1,2-Dichlorobenzene

Concen: 5.072 ug/l

RT: 12.203 min Scan# 3394

Delta R.T. 0.000 min

Lab File: VU063222.D

Acq: 10 Feb 2025 14:23

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC005

Tgt Ion:146 Resp: 156950

Ion Ratio Lower Upper

146 100

111 43.1 21.9 65.7

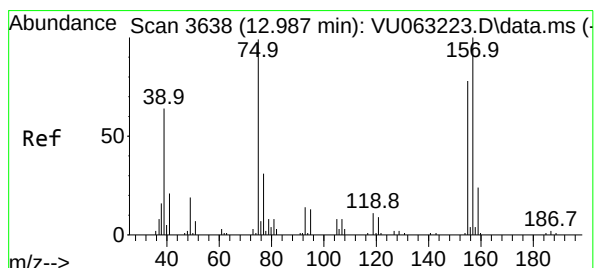
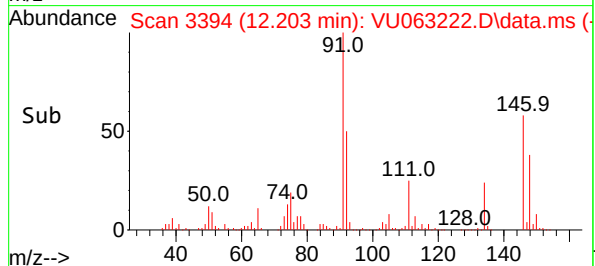
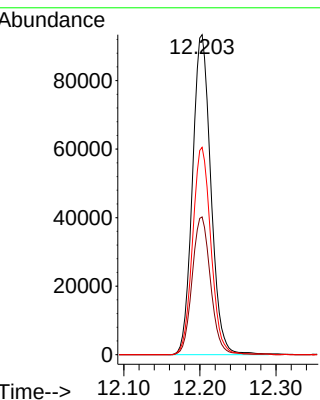
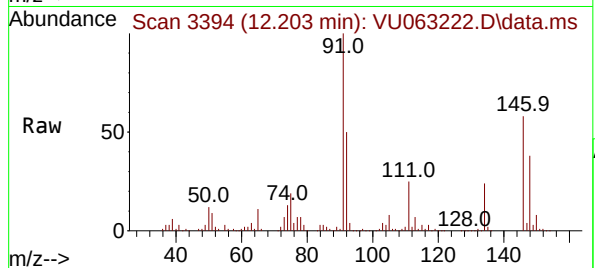
148 64.6 32.3 96.9

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#86

1,2-Dibromo-3-Chloropropane

Concen: 5.220 ug/l

RT: 12.987 min Scan# 3638

Delta R.T. 0.000 min

Lab File: VU063222.D

Acq: 10 Feb 2025 14:23

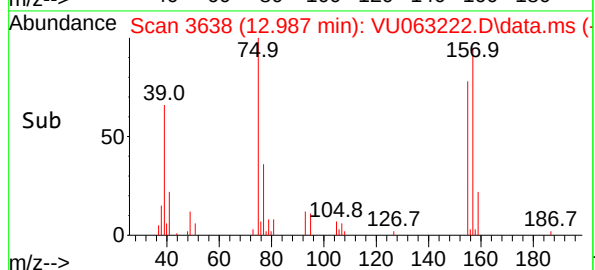
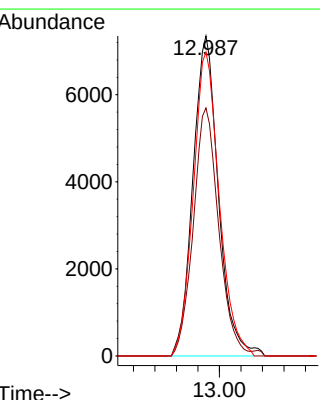
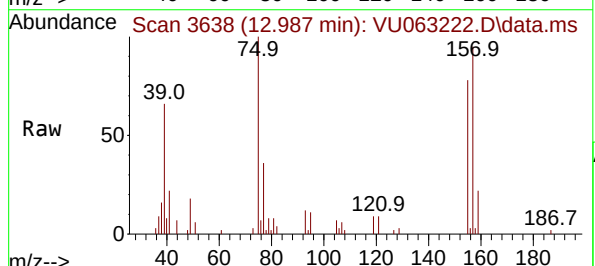
Tgt Ion: 75 Resp: 12084

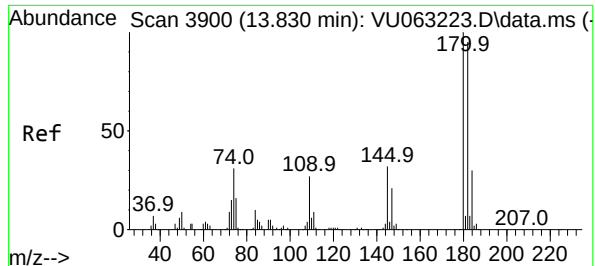
Ion Ratio Lower Upper

75 100

155 77.3 63.5 95.3

157 96.9 81.8 122.6





#87

1,2,4-Trichlorobenzene

Concen: 5.203 ug/l

RT: 13.830 min Scan# 3900

Delta R.T. 0.000 min

Lab File: VU063222.D

Acq: 10 Feb 2025 14:23

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC005

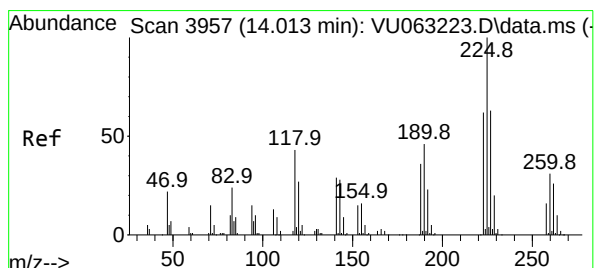
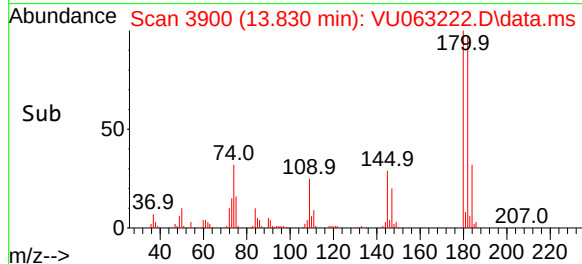
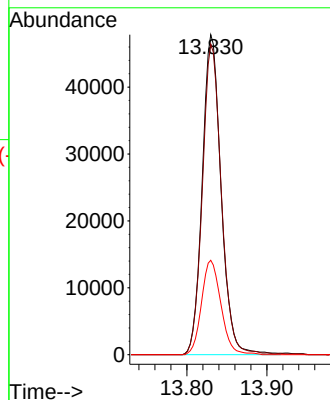
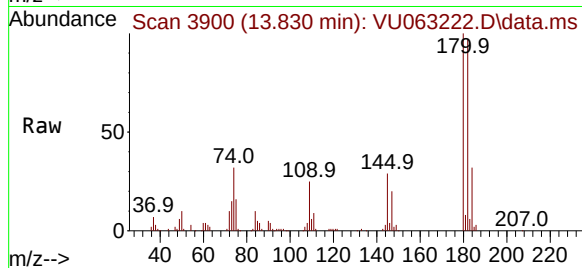
Tgt Ion:180	Resp:	78510
Ion Ratio	Lower	Upper
180	100	
182	97.4	76.6 115.0
145	30.4	25.4 38.2

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#88

Hexachlorobutadiene

Concen: 4.939 ug/l

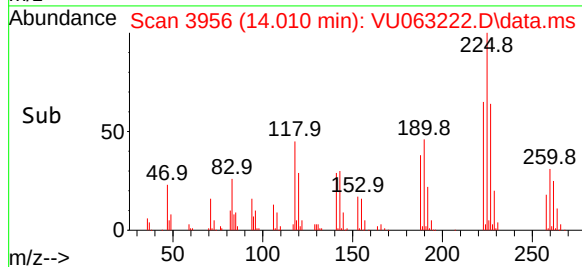
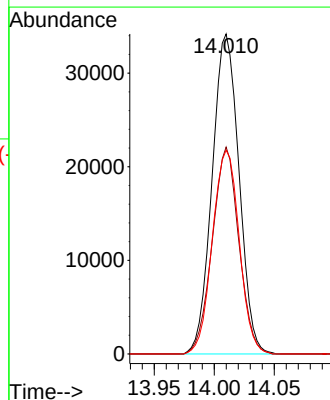
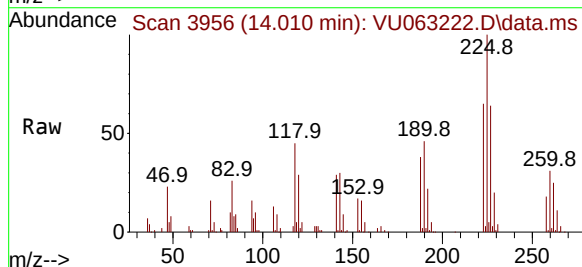
RT: 14.010 min Scan# 3956

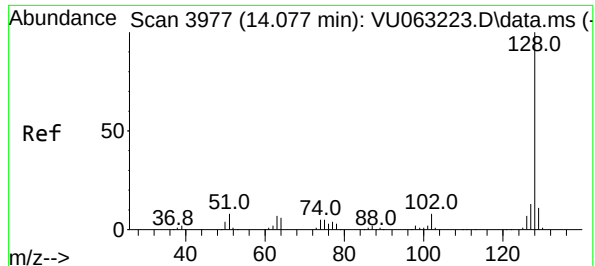
Delta R.T. -0.003 min

Lab File: VU063222.D

Acq: 10 Feb 2025 14:23

Tgt Ion:225	Resp:	53269
Ion Ratio	Lower	Upper
225	100	
223	63.8	49.5 74.3
227	63.6	51.0 76.4





#89

Naphthalene

Concen: 4.286 ug/l

RT: 14.081 min Scan# 3977

Delta R.T. 0.003 min

Lab File: VU063222.D

Acq: 10 Feb 2025 14:23

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC005

Tgt Ion:128 Resp: 122840

Ion Ratio Lower Upper

128 100

127 13.3 10.6 16.0

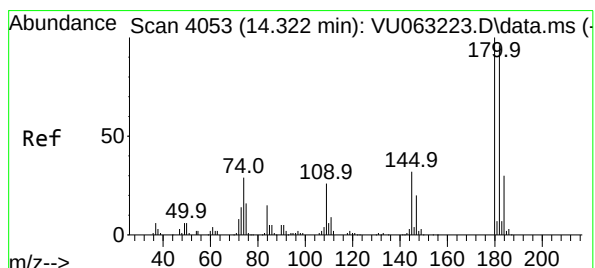
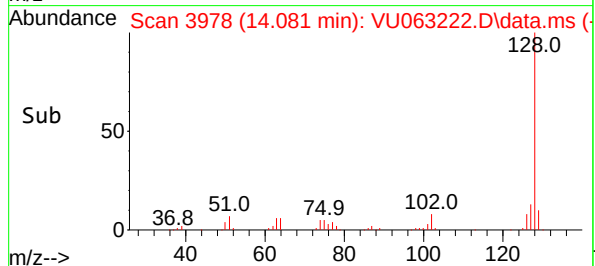
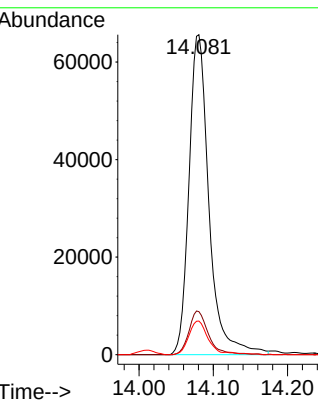
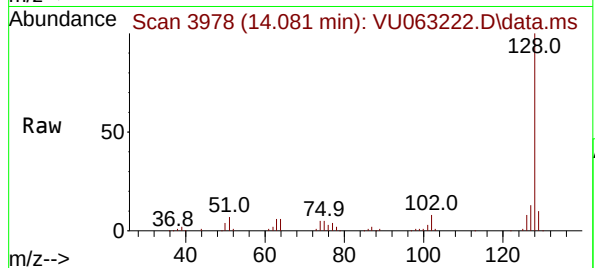
129 9.8 8.6 13.0

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#90

1,2,3-Trichlorobenzene

Concen: 5.189 ug/l

RT: 14.319 min Scan# 4052

Delta R.T. -0.003 min

Lab File: VU063222.D

Acq: 10 Feb 2025 14:23

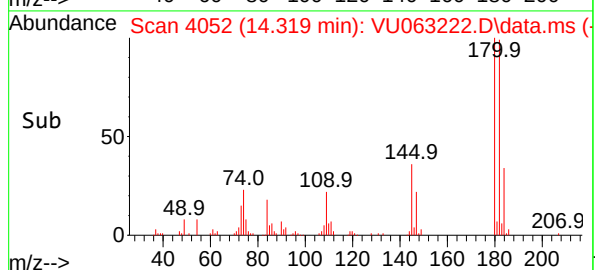
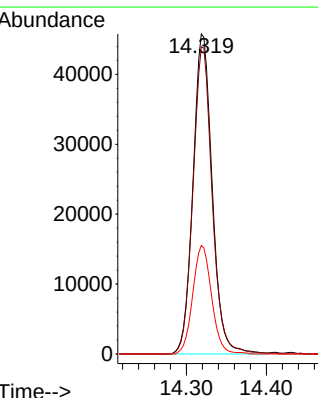
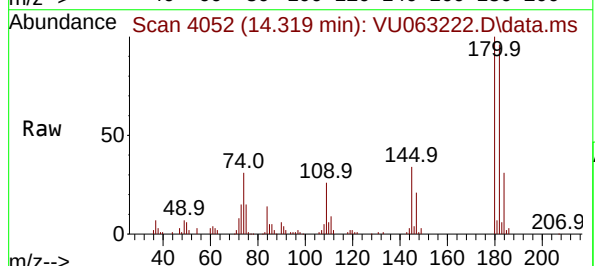
Tgt Ion:180 Resp: 76620

Ion Ratio Lower Upper

180 100

182 95.8 78.2 117.2

145 33.2 26.1 39.1



Data Path : Z:\voasrv\HPCHEM1\MSVOA_U\Data\VU021025\
 Data File : VU063223.D
 Acq On : 10 Feb 2025 15:06
 Operator : MD/SY
 Sample : VSTDICCC010
 Misc : 25.0mL/MSVOA_U/WATER
 ALS Vial : 7 Sample Multiplier: 1

Instrument :
 MSVOA_U
 ClientSampleId :
 VSTDICCC010

Manual Integrations
 APPROVED

Reviewed By :Amit Patel 02/12/2025
 Supervised By :Mahesh Dadoda 02/12/2025

Quant Time: Feb 11 04:00:16 2025
 Quant Method : Z:\voasrv\HPCHEM1\MSVOA_U\Method\524U021025DW.M
 Quant Title : METHOD 524.2 VOLATILES DRINKING WATER
 QLast Update : Tue Feb 11 03:56:39 2025
 Response via : Initial Calibration

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

Internal Standards						
1) Fluorobenzene	6.103	96	57821	1.000	ug/l	# 0.00
System Monitoring Compounds						
57) 4-Bromofluorobenzene	10.624	95	20703	1.085	ug/l	0.00
Spiked Amount 1.000			Recovery	=	109.000%	
68) 1,2-Dichlorobenzene-d4	12.184	152	19878	1.002	ug/l	0.00
Spiked Amount 1.000			Recovery	=	100.000%	
Target Compounds						
					Qvalue	
2) Dichlorodifluoromethane	1.377	85	176288	9.384	ug/l	100
3) Chloromethane	1.515	50	203794	9.420	ug/l	100
4) Vinyl Chloride	1.599	62	211768	9.893	ug/l	100
5) Bromomethane	1.843	94	110441	11.156	ug/l	100
6) Chloroethane	1.924	64	128364	9.521	ug/l	100
7) Trichlorofluoromethane	2.129	101	244670	9.646	ug/l	100
8) 1,1,2-Trichloro-1,2,2-...	2.570	101	133515	9.273	ug/l	100
9) 1,1-Dichloroethene	2.567	96	143583	9.788	ug/l	100
10) Iodomethane	2.708	142	234351	10.162	ug/l	100
11) Allyl Chloride	2.911	41	211288	10.026	ug/l	100
12) Acrylonitrile	3.300	53	74970	22.485	ug/l	100
13) Acetone	2.612	43	136864	52.606	ug/l	100
14) Carbon Disulfide	2.782	76	497871	9.707	ug/l	100
15) Methylene Chloride	3.030	84	175770	9.699	ug/l	100
16) trans-1,2-Dichloroethene	3.338	96	166021	9.916	ug/l	100
17) 1,1-Dichloroethane	3.853	63	311213	9.862	ug/l	100
18) 2-Butanone	4.685	43	227157	54.048	ug/l	100
19) Cyclohexane	5.377	56	262184m	10.340	ug/l	
20) Methylcyclohexane	6.753	83	259112	10.304	ug/l	100
21) 2,2-Dichloropropane	4.647	77	241757	9.820	ug/l	100
22) cis-1,2-Dichloroethene	4.650	96	182447	10.086	ug/l	100
23) Diethyl Ether	2.364	59	125036	9.933	ug/l	100
24) tert-Butyl Alcohol	3.158	59	136525	106.650	ug/l	100
25) Methyl tert-Butyl Ether	3.348	73	388982	10.617	ug/l	100
26) Bromochloromethane	4.959	128	78959	9.986	ug/l	100
27) Chloroform	5.071	83	315662	9.912	ug/l	100
28) 1,1,1-Trichloroethane	5.303	97	255321	9.897	ug/l	100
29) 1,1-Dichloropropene	5.512	75	235647	10.198	ug/l	100
30) Carbon Tetrachloride	5.512	117	218368	9.870	ug/l	100
31) Isopropyl Ether	3.975	45	470393	10.441	ug/l	100
32) Ethyl-t-butyl ether	4.483	59	436320	10.649	ug/l	100
33) Tert-Amyl methyl ether	5.927	73	397764	11.111	ug/l	100
34) Propionitrile	4.753	54	71557	54.918	ug/l	100
35) Benzene	5.759	78	712587	10.030	ug/l	100
36) 1,2-Dichloroethane	5.779	62	205344	10.014	ug/l	100
37) Trichloroethene	6.531	130	168312	9.962	ug/l	100
38) 1,2-Dichloropropane	6.779	63	188716	10.148	ug/l	100
39) Methacrylonitrile	4.959	41	56424	12.123	ug/l	100
40) Methyl acrylate	4.833	55	95663	11.258	ug/l	100
41) Tetrahydrofuran	5.039	42	59516	21.760	ug/l	100
42) 1-Chlorobutane	5.444	56	326490	10.327	ug/l	100
43) Dibromomethane	6.904	93	94106	9.994	ug/l	100
44) Bromodichloromethane	7.094	83	225813	10.303	ug/l	100

Data Path : Z:\voasrv\HPCHEM1\MSVOA_U\Data\VU021025\
 Data File : VU063223.D
 Acq On : 10 Feb 2025 15:06
 Operator : MD/SY
 Sample : VSTDICCC010
 Misc : 25.0mL/MSVOA_U/WATER
 ALS Vial : 7 Sample Multiplier: 1

Instrument :
 MSVOA_U
 ClientSampleId :
 VSTDICCC010

Manual Integrations
 APPROVED

Reviewed By :Amit Patel 02/12/2025
 Supervised By :Mahesh Dadoda 02/12/2025

Quant Time: Feb 11 04:00:16 2025
 Quant Method : Z:\voasrv\HPCHEM1\MSVOA_U\Method\524U021025DW.M
 Quant Title : METHOD 524.2 VOLATILES DRINKING WATER
 QLast Update : Tue Feb 11 03:56:39 2025
 Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
45) 4-Methyl-2-Pentanone	7.775	43	568881	57.627	ug/l	100
46) t-1,4-Dichloro-2-butene	10.827	75	97536m	19.967	ug/l	
47) Methyl methacrylate	6.949	69	186394	23.502	ug/l	100
48) Ethyl methacrylate	8.322	69	181630	12.196	ug/l	100
49) Toluene	7.959	92	430442	10.535	ug/l	100
50) t-1,3-Dichloropropene	8.200	75	221262	11.027	ug/l	100
51) cis-1,3-Dichloropropene	7.595	75	265202	10.700	ug/l	100
52) 1,1,2-Trichloroethane	8.389	97	131655	10.370	ug/l	100
53) 1,3-Dichloropropane	8.563	76	234008	10.382	ug/l	100
54) 2-Hexanone	8.672	43	392522	58.266	ug/l	100
55) Dibromochloromethane	8.798	129	154464	10.575	ug/l	100
56) 1,2-Dibromoethane	8.914	107	126673	10.638	ug/l	100
58) Tetrachloroethene	8.544	164	135324	9.719	ug/l	100
59) Chlorobenzene	9.438	112	443950	10.297	ug/l	100
60) 1,1,1,2-Tetrachloroethane	9.521	131	158424	10.222	ug/l	100
61) Pentachloroethane	11.415	117	139274	10.060	ug/l	100
62) Hexachloroethane	12.467	117	128179	10.465	ug/l	100
63) Ethyl Benzene	9.560	91	811424	10.912	ug/l	100
64) m/p-Xylenes	9.682	106	619391	22.300	ug/l	100
65) o-Xylene	10.090	106	297309	10.934	ug/l	100
66) Styrene	10.103	104	495181	11.443	ug/l	100
67) Bromoform	10.280	173	90220	10.883	ug/l	100
69) Isopropylbenzene	10.473	105	700805	10.963	ug/l	100
70) 1,1,2,2-Tetrachloroethane	10.772	83	179045	10.464	ug/l	100
71) 1,2,3-Trichloropropane	10.814	75	117848m	9.083	ug/l	
72) Bromobenzene	10.772	156	181776	10.554	ug/l	100
73) n-propylbenzene	10.894	120	204779	11.189	ug/l	100
74) 2-Chlorotoluene	10.975	126	182649	10.829	ug/l	100
75) 1,3,5-Trimethylbenzene	11.077	105	664048	11.211	ug/l	100
76) 4-Chlorotoluene	11.087	126	185864	10.745	ug/l	100
77) tert-Butylbenzene	11.409	119	646436	10.791	ug/l	100
78) 1,2,4-Trimethylbenzene	11.457	105	668930	11.382	ug/l	100
79) sec-Butylbenzene	11.634	105	833792	10.932	ug/l	100
80) Nitrobenzene	13.203	77	25795	50.821	ug/l	100
81) p-Isopropyltoluene	11.782	119	675304	11.219	ug/l	100
82) 1,3-Dichlorobenzene	11.737	146	344574	10.314	ug/l	100
83) 1,4-Dichlorobenzene	11.827	146	347616	10.638	ug/l	100
84) n-Butylbenzene	12.200	91	603657	11.122	ug/l	100
85) 1,2-Dichlorobenzene	12.203	146	332012	10.342	ug/l	100
86) 1,2-Dibromo-3-Chloropr...	12.987	75	28133	11.713	ug/l	100
87) 1,2,4-Trichlorobenzene	13.830	180	177895	11.361	ug/l	100
88) Hexachlorobutadiene	14.013	225	105064	9.389	ug/l	100
89) Naphthalene	14.077	128	321601	9.843	ug/l	100
90) 1,2,3-Trichlorobenzene	14.322	180	174986	11.421	ug/l	100

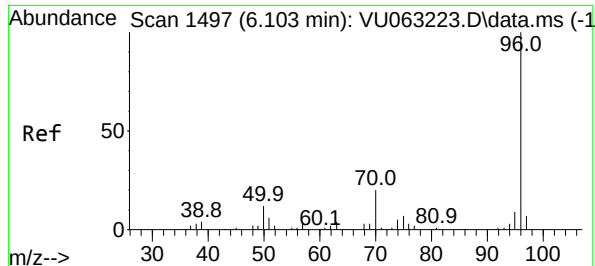
(#) = qualifier out of range (m) = manual integration (+) = signals summed

Instrument :
MSVOA_U
ClientSampleId :
VSTDICCC010

Manual Integrations APPROVED

Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025





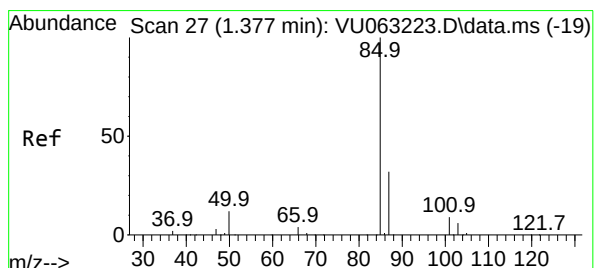
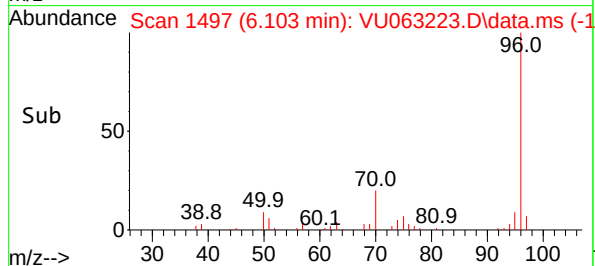
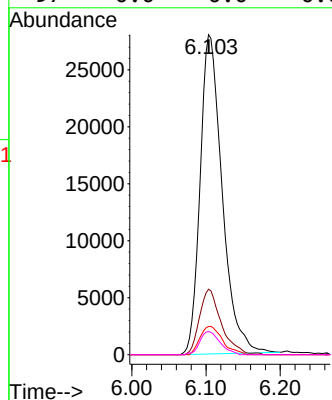
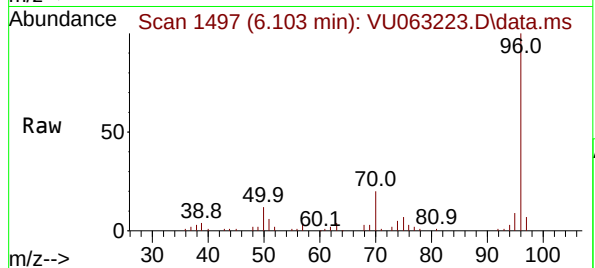
#1
Fluorobenzene
Concen: 1.000 ug/l
RT: 6.103 min Scan# 1497
Delta R.T. 0.000 min
Lab File: VU063223.D
Acq: 10 Feb 2025 15:06

Instrument :
MSVOA_U
ClientSampleId :
VSTDICCC010

Tgt Ion: 96 Resp: 5782
Ion Ratio Lower Upper
96 100
70 19.5 15.6 23.4
95 9.1 7.3 10.9
97 0.0 0.0 0.0

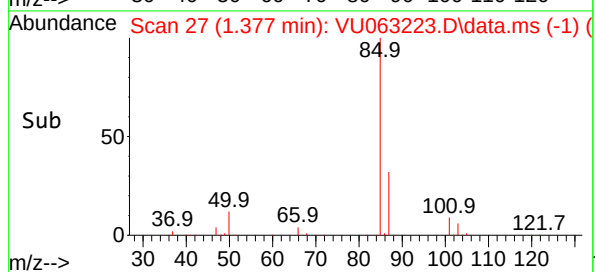
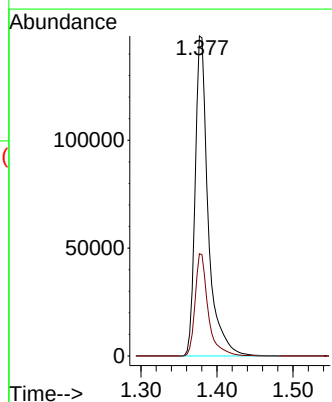
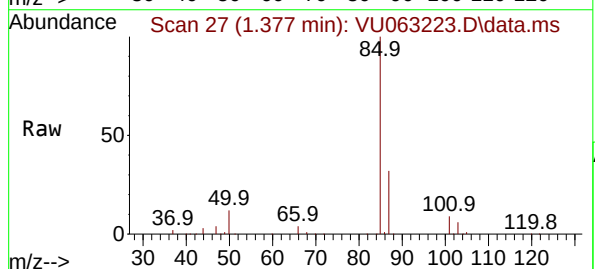
Manual Integrations
APPROVED

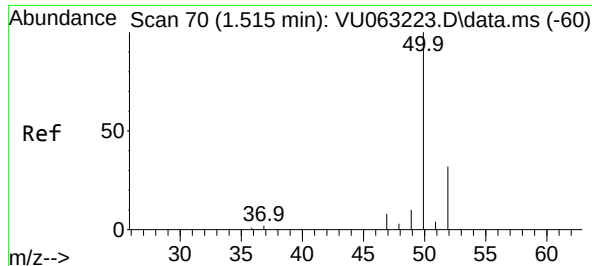
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#2
Dichlorodifluoromethane
Concen: 9.384 ug/l
RT: 1.377 min Scan# 27
Delta R.T. 0.000 min
Lab File: VU063223.D
Acq: 10 Feb 2025 15:06

Tgt Ion: 85 Resp: 176288
Ion Ratio Lower Upper
85 100
87 32.0 16.0 48.0





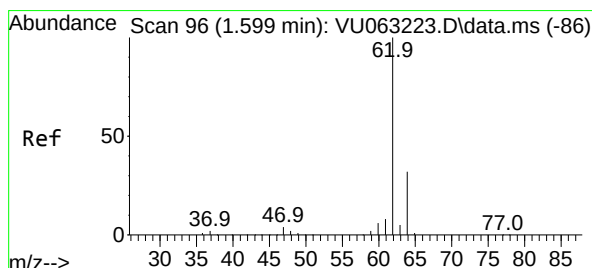
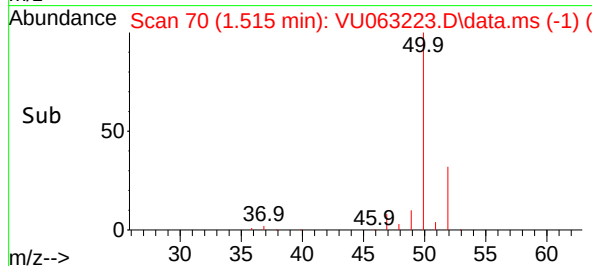
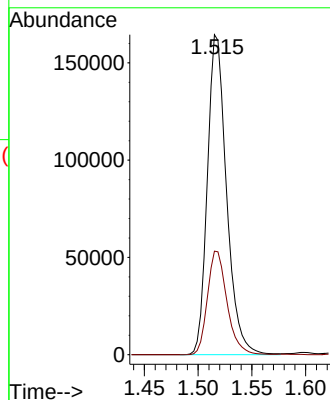
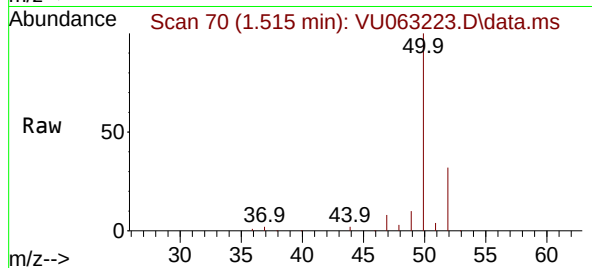
#3
Chloromethane
Concen: 9.420 ug/l
RT: 1.515 min Scan# 70
Delta R.T. 0.000 min
Lab File: VU063223.D
Acq: 10 Feb 2025 15:06

Instrument :
MSVOA_U
ClientSampleId :
VSTDICCC010

Tgt Ion: 50 Resp: 203794
Ion Ratio Lower Upper
50 100
52 32.3 25.8 38.8

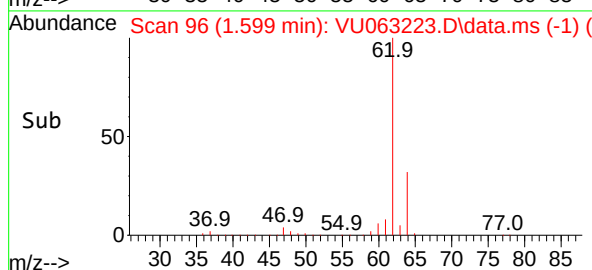
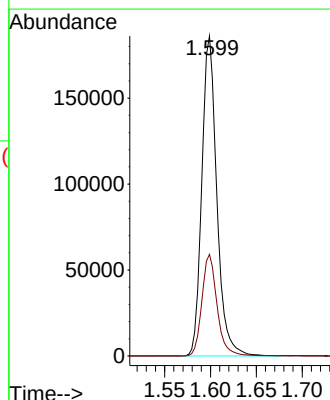
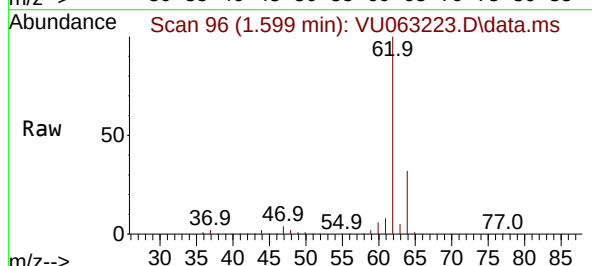
Manual Integrations
APPROVED

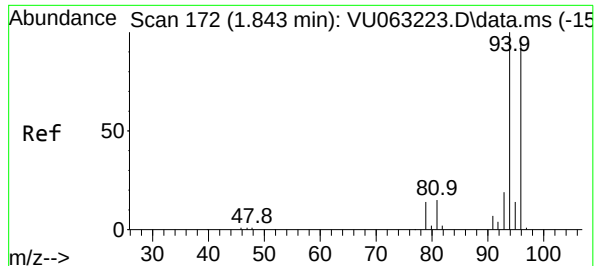
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#4
Vinyl Chloride
Concen: 9.893 ug/l
RT: 1.599 min Scan# 96
Delta R.T. 0.000 min
Lab File: VU063223.D
Acq: 10 Feb 2025 15:06

Tgt Ion: 62 Resp: 211768
Ion Ratio Lower Upper
62 100
64 31.7 25.4 38.0





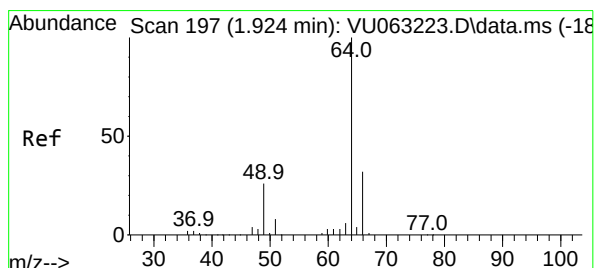
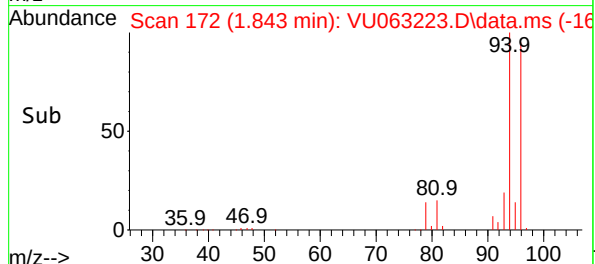
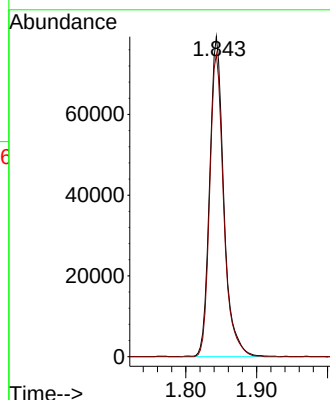
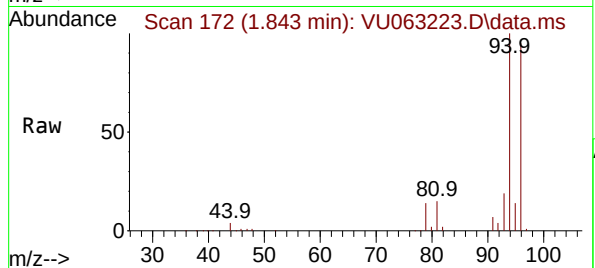
#5
Bromomethane
Concen: 11.156 ug/l
RT: 1.843 min Scan# 11
Delta R.T. 0.000 min
Lab File: VU063223.D
Acq: 10 Feb 2025 15:06

Instrument :
MSVOA_U
ClientSampleId :
VSTDICCC010

Tgt Ion: 94 Resp: 11044
Ion Ratio Lower Upper
94 100
96 94.6 75.7 113.5

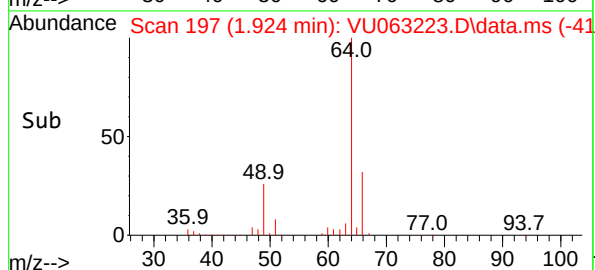
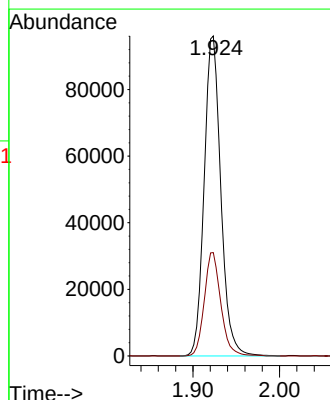
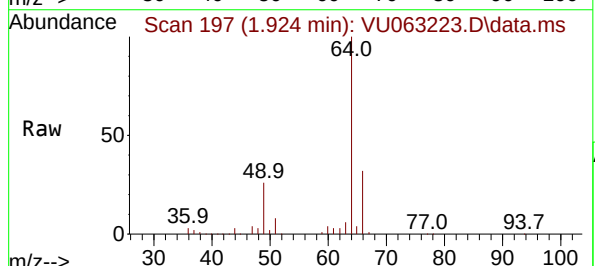
Manual Integrations
APPROVED

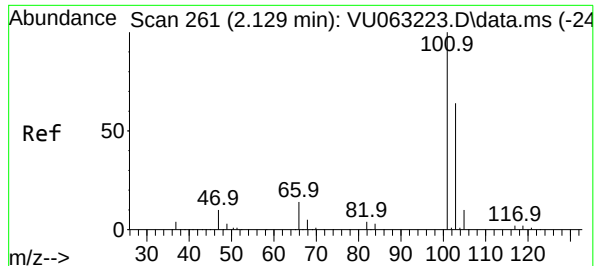
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#6
Chloroethane
Concen: 9.521 ug/l
RT: 1.924 min Scan# 197
Delta R.T. 0.000 min
Lab File: VU063223.D
Acq: 10 Feb 2025 15:06

Tgt Ion: 64 Resp: 128364
Ion Ratio Lower Upper
64 100
66 32.3 25.8 38.8





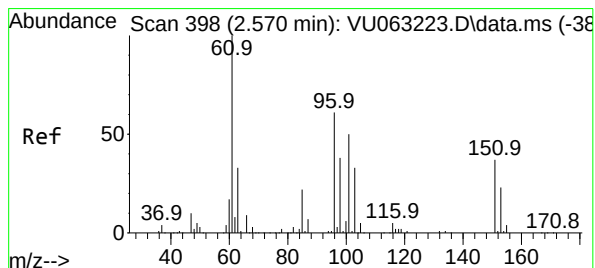
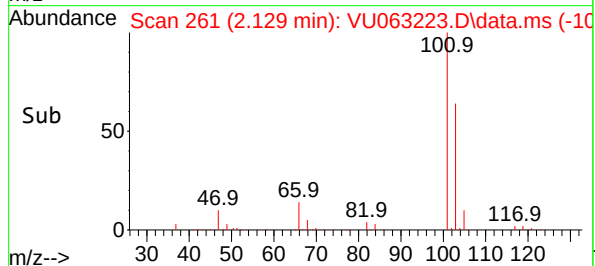
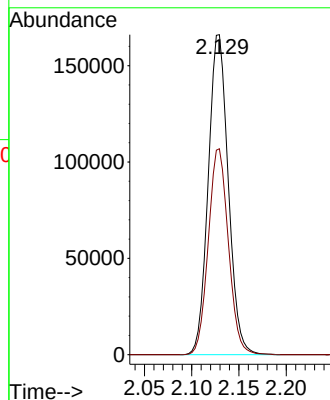
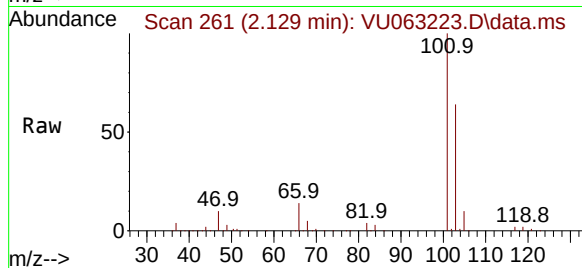
#7
Trichlorofluoromethane
Concen: 9.646 ug/l
RT: 2.129 min Scan# 20
Delta R.T. 0.000 min
Lab File: VU063223.D
Acq: 10 Feb 2025 15:06

Instrument :
MSVOA_U
ClientSampleId :
VSTDICCC010

Tgt Ion:101 Resp: 244670
Ion Ratio Lower Upper
101 100
103 64.3 51.4 77.2

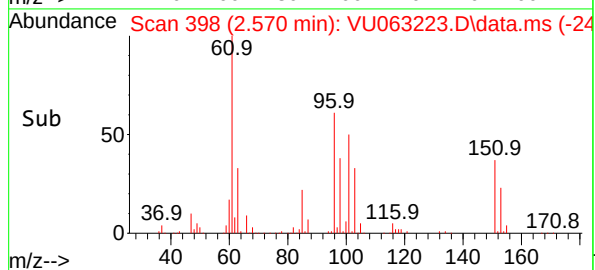
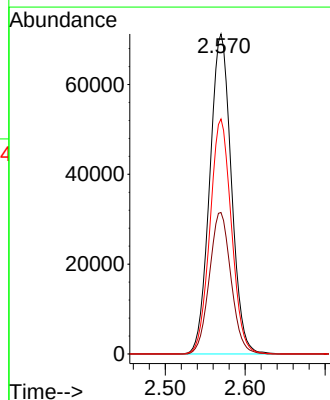
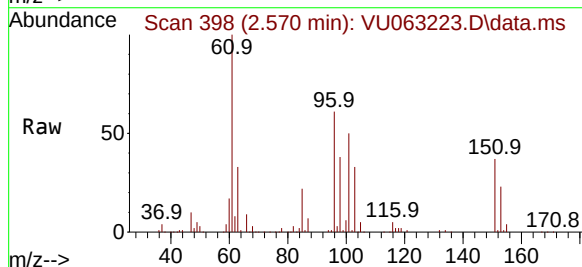
Manual Integrations
APPROVED

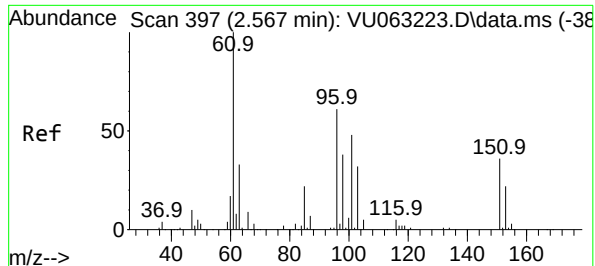
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#8
1,1,2-Trichloro-1,2,2-trifluoroethane
Concen: 9.273 ug/l
RT: 2.570 min Scan# 398
Delta R.T. 0.000 min
Lab File: VU063223.D
Acq: 10 Feb 2025 15:06

Tgt Ion:101 Resp: 133515
Ion Ratio Lower Upper
101 100
85 44.2 35.4 53.0
151 73.1 58.5 87.7





#9

1,1-Dichloroethene

Concen: 9.788 ug/l

RT: 2.567 min Scan# 397

Delta R.T. 0.000 min

Lab File: VU063223.D

Acq: 10 Feb 2025 15:06

Instrument :

MSVOA_U

ClientSampleId :

VSTDICCC010

Tgt Ion: 96 Resp: 14358

Ion Ratio Lower Upper

96 100

61 164.3 0.0 492.9

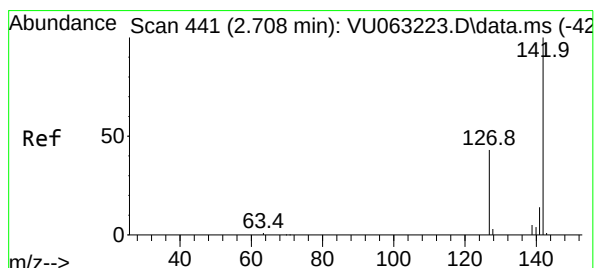
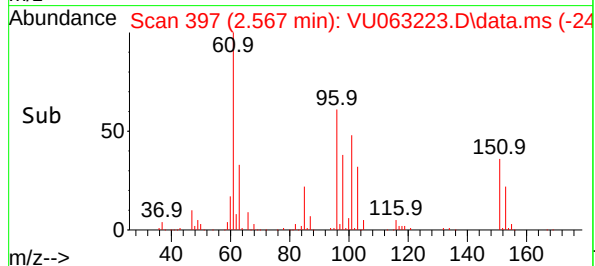
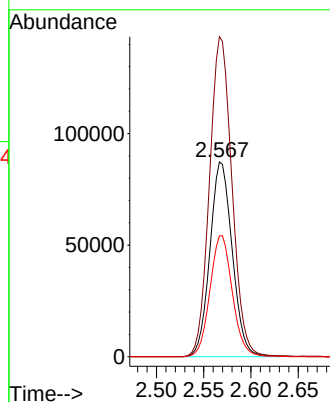
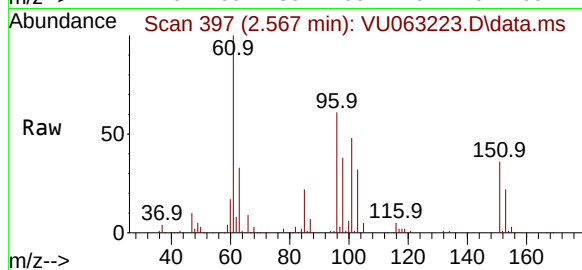
98 62.0 0.0 124.0

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#10

Iodomethane

Concen: 10.162 ug/l

RT: 2.708 min Scan# 441

Delta R.T. 0.000 min

Lab File: VU063223.D

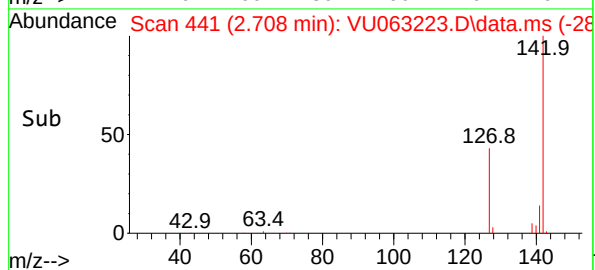
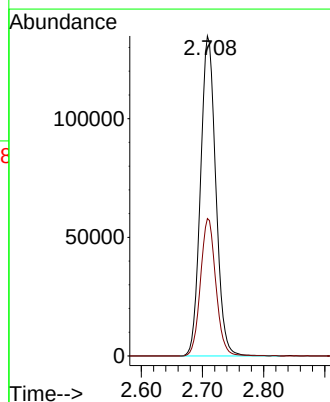
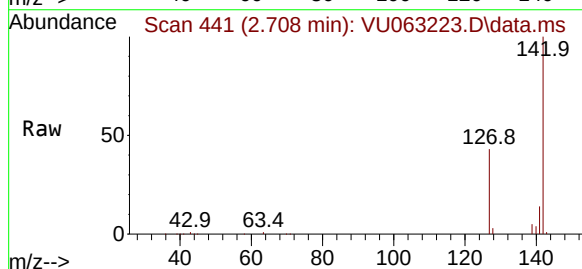
Acq: 10 Feb 2025 15:06

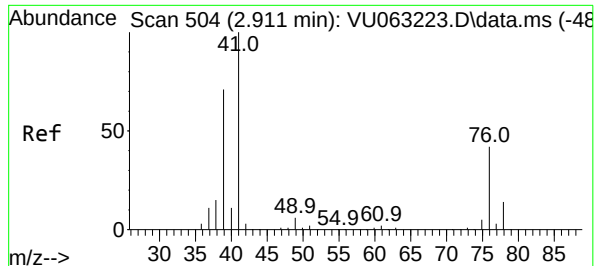
Tgt Ion:142 Resp: 234351

Ion Ratio Lower Upper

142 100

127 43.1 34.5 51.7





#11

Allyl Chloride

Concen: 10.026 ug/l

RT: 2.911 min Scan# 504

Delta R.T. 0.000 min

Lab File: VU063223.D

Acq: 10 Feb 2025 15:06

Instrument :

MSVOA_U

ClientSampleId :

VSTDICCC010

Tgt Ion: 41 Resp: 21128

Ion Ratio Lower Upper

41 100

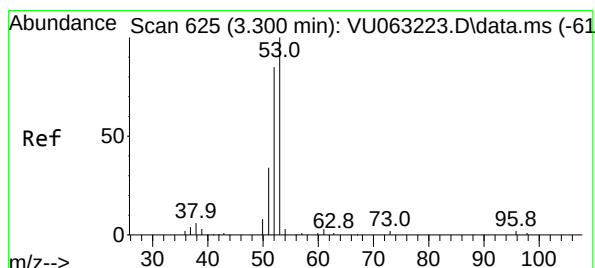
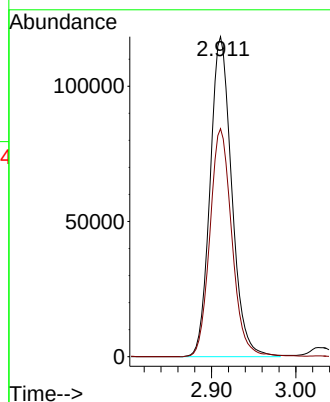
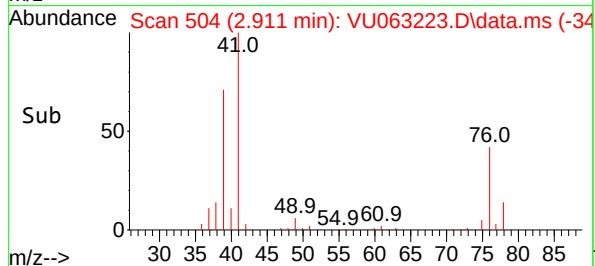
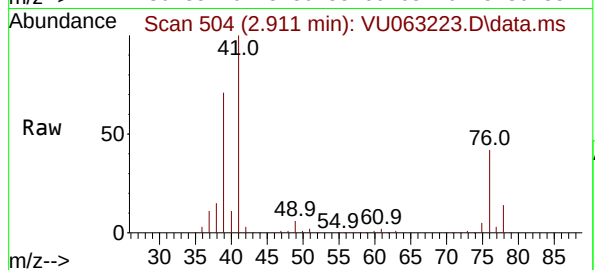
39 72.4 57.9 86.9

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#12

Acrylonitrile

Concen: 22.485 ug/l

RT: 3.300 min Scan# 625

Delta R.T. 0.000 min

Lab File: VU063223.D

Acq: 10 Feb 2025 15:06

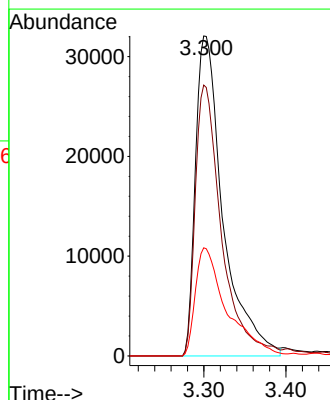
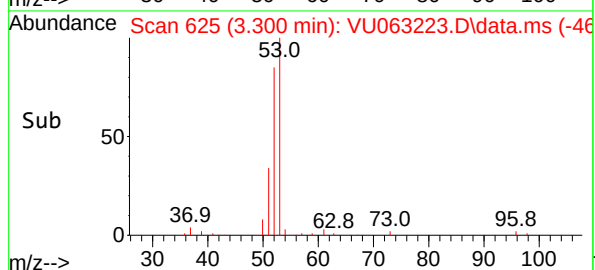
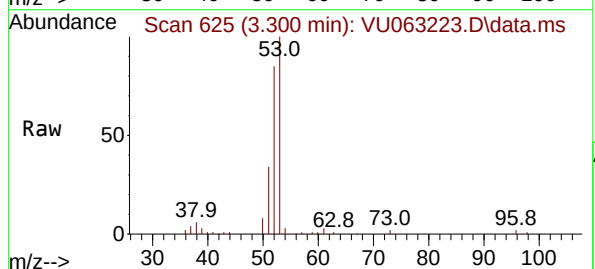
Tgt Ion: 53 Resp: 74970

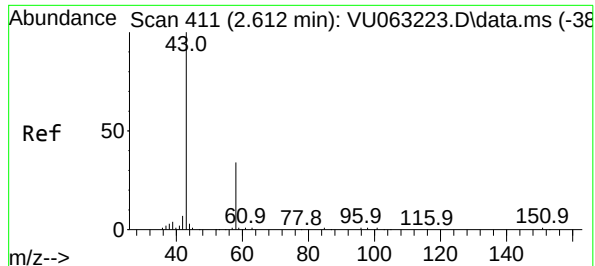
Ion Ratio Lower Upper

53 100

52 80.2 64.2 96.2

51 38.5 30.8 46.2





#13

Acetone

Concen: 52.606 ug/l

RT: 2.612 min Scan# 411

Delta R.T. 0.000 min

Lab File: VU063223.D

Acq: 10 Feb 2025 15:06

Instrument :

MSVOA_U

ClientSampleId :

VSTDICCC010

Tgt Ion: 43 Resp: 136864

Ion Ratio Lower Upper

43 100

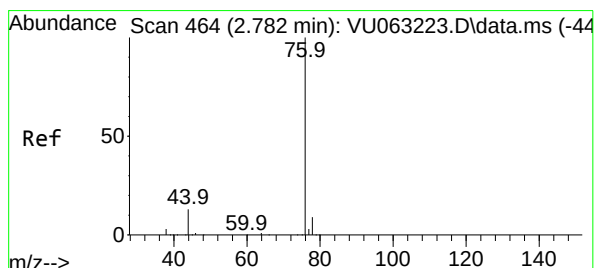
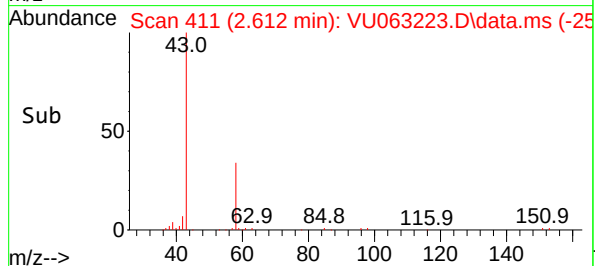
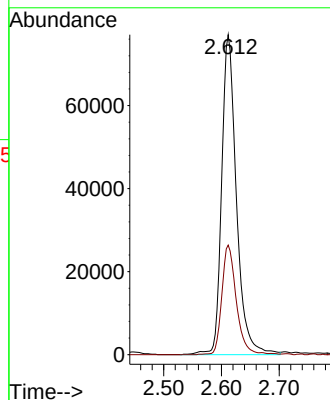
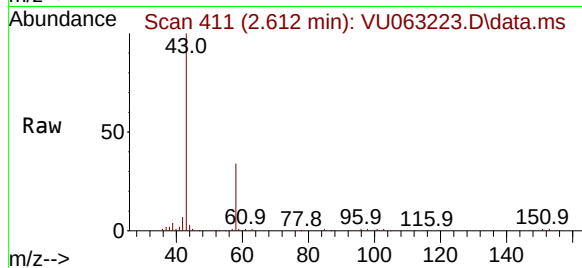
58 34.2 27.4 41.0

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#14

Carbon Disulfide

Concen: 9.707 ug/l

RT: 2.782 min Scan# 464

Delta R.T. 0.000 min

Lab File: VU063223.D

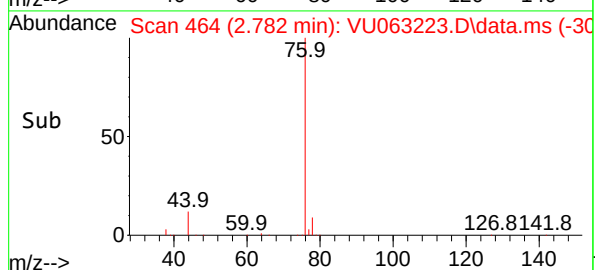
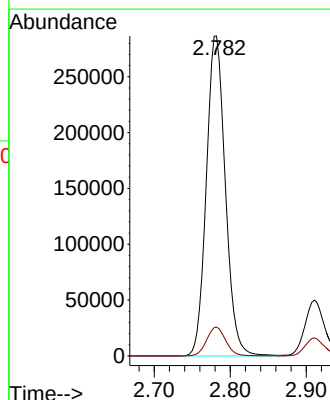
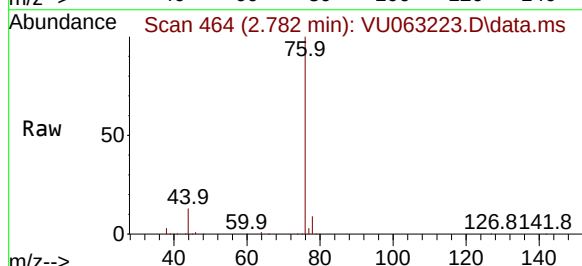
Acq: 10 Feb 2025 15:06

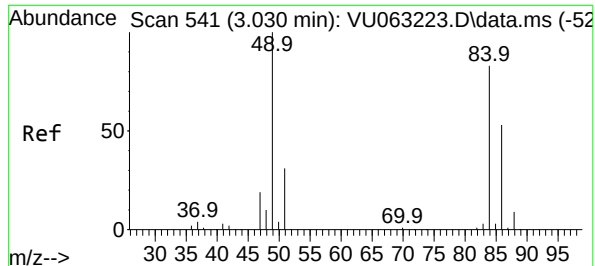
Tgt Ion: 76 Resp: 497871

Ion Ratio Lower Upper

76 100

78 9.0 7.2 10.8





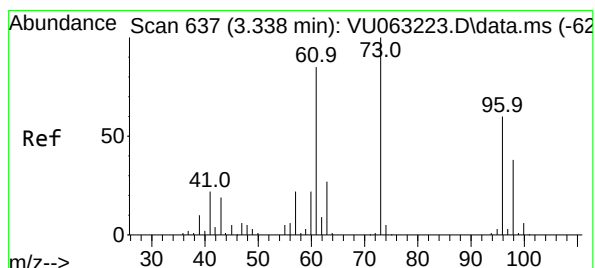
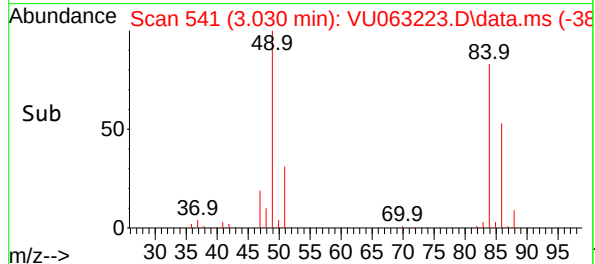
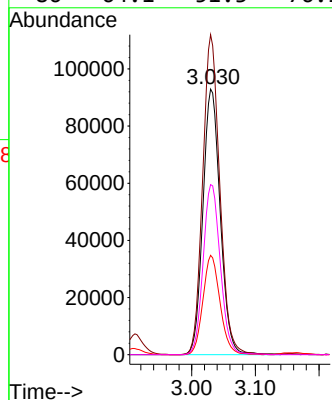
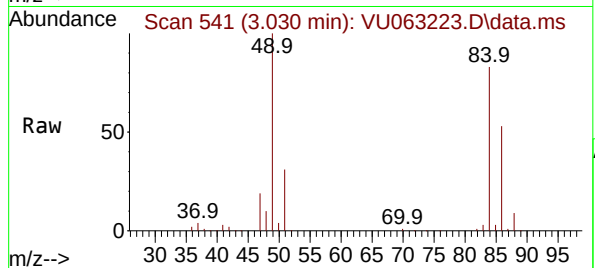
#15
Methylene Chloride
Concen: 9.699 ug/l
RT: 3.030 min Scan# 541
Delta R.T. 0.000 min
Lab File: VU063223.D
Acq: 10 Feb 2025 15:06

Instrument :
MSVOA_U
ClientSampleId :
VSTDICCC010

Tgt Ion: 84 Resp: 175770
Ion Ratio Lower Upper
84 100
49 120.5 96.4 144.6
51 37.4 0.0 74.8
86 64.1 51.3 76.9

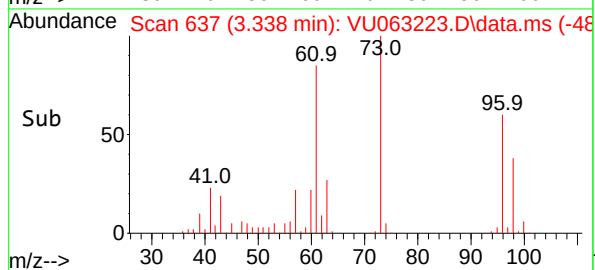
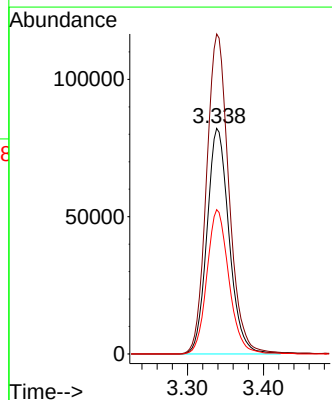
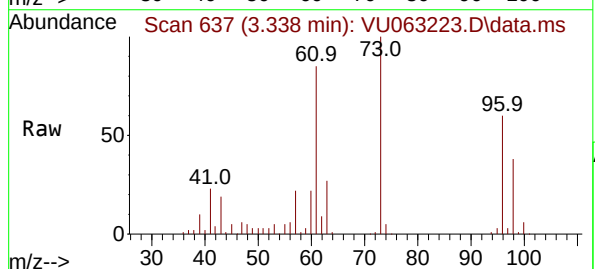
Manual Integrations
APPROVED

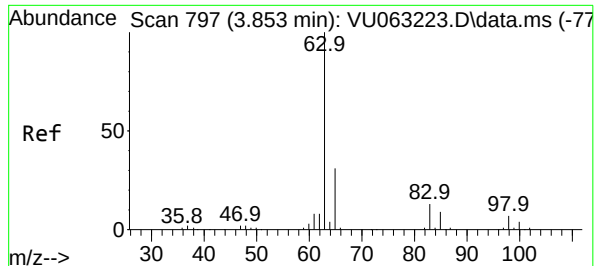
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#16
trans-1,2-Dichloroethene
Concen: 9.916 ug/l
RT: 3.338 min Scan# 637
Delta R.T. 0.000 min
Lab File: VU063223.D
Acq: 10 Feb 2025 15:06

Tgt Ion: 96 Resp: 166021
Ion Ratio Lower Upper
96 100
61 141.8 113.4 170.2
98 64.0 51.2 76.8





#17

1,1-Dichloroethane

Concen: 9.862 ug/l

RT: 3.853 min Scan# 797

Delta R.T. 0.000 min

Lab File: VU063223.D

Acq: 10 Feb 2025 15:06

Instrument :

MSVOA_U

ClientSampleId :

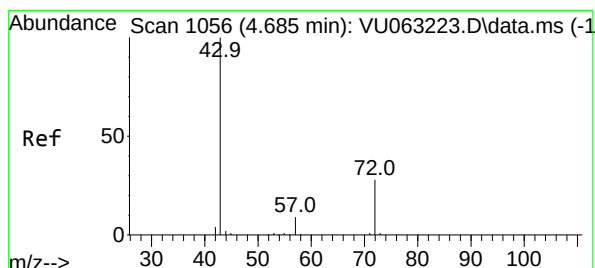
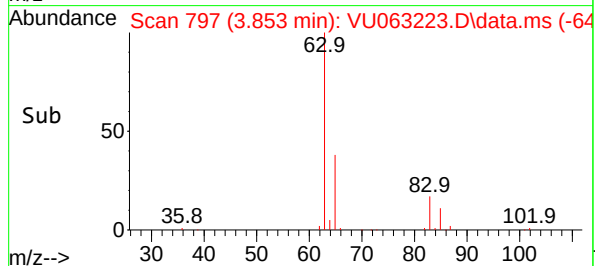
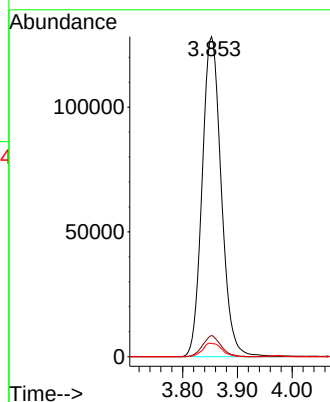
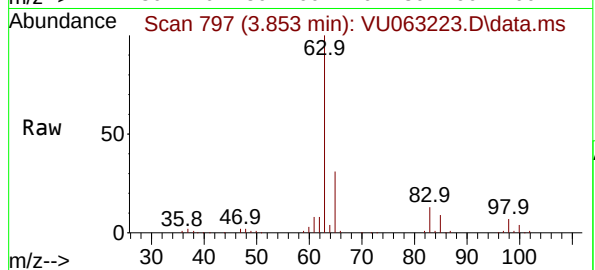
VSTDICCC010

Tgt Ion:	63	Resp:	31121
Ion Ratio	Lower	Upper	
63	100		
98	6.6	3.3	9.9
100	4.1	2.1	6.2

Manual Integrations
APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#18

2-Butanone

Concen: 54.048 ug/l

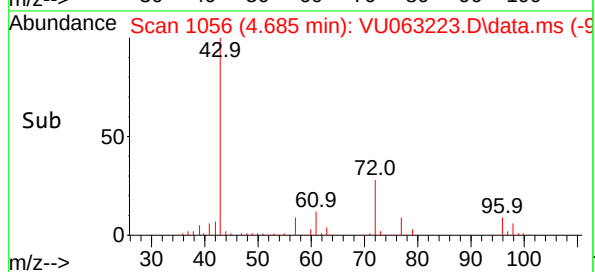
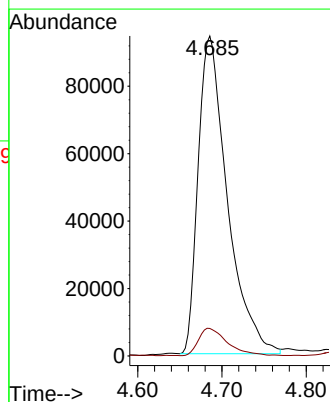
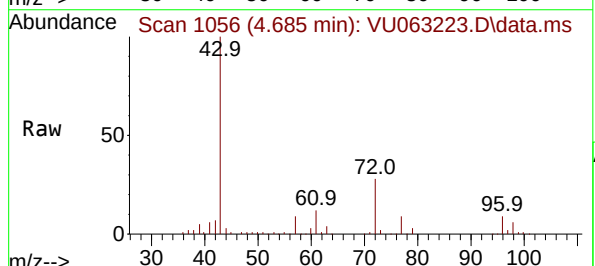
RT: 4.685 min Scan# 1056

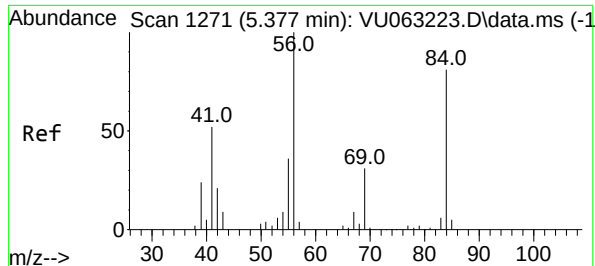
Delta R.T. 0.000 min

Lab File: VU063223.D

Acq: 10 Feb 2025 15:06

Tgt Ion:	43	Resp:	227157
Ion Ratio	Lower	Upper	
43	100		
57	8.5	0.0	17.0





#19

Cyclohexane

Concen: 10.340 ug/l m

RT: 5.377 min Scan# 1

Delta R.T. 0.000 min

Lab File: VU063223.D

Acq: 10 Feb 2025 15:06

Instrument :

MSVOA_U

ClientSampleId :

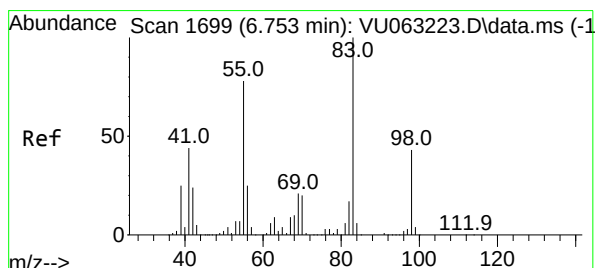
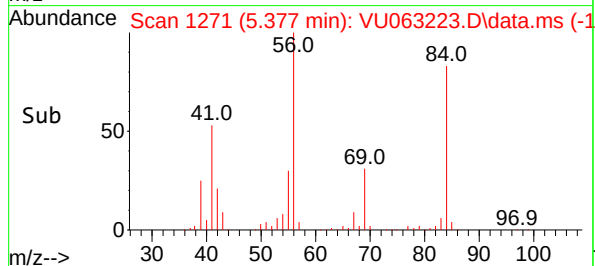
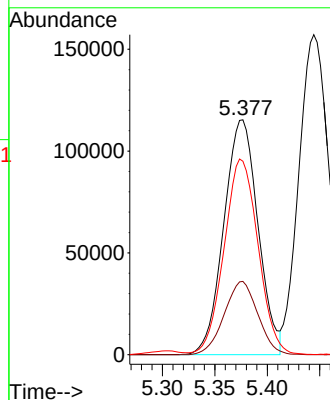
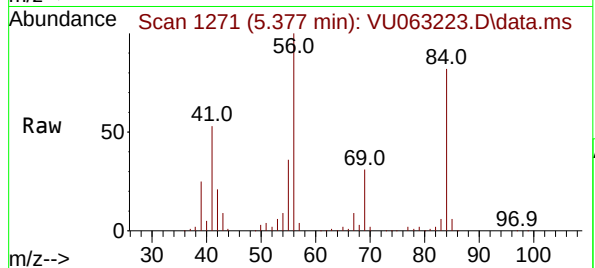
VSTDICCC010

Tgt Ion:	56	Resp:	262184
Ion	Ratio	Lower	Upper
56	100		
69	30.6	24.5	36.7
84	81.5	65.2	97.8

Manual Integrations
APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#20

Methylcyclohexane

Concen: 10.304 ug/l

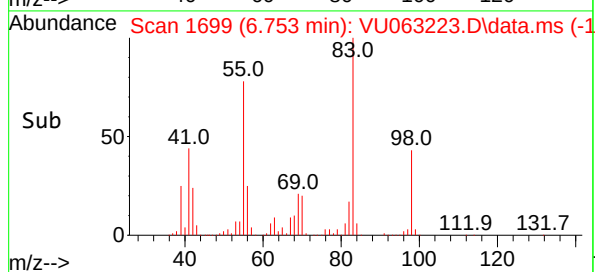
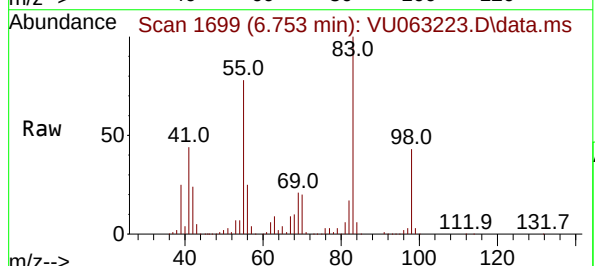
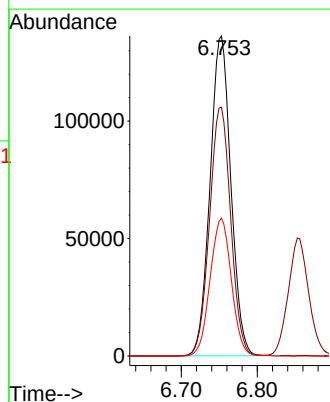
RT: 6.753 min Scan# 1699

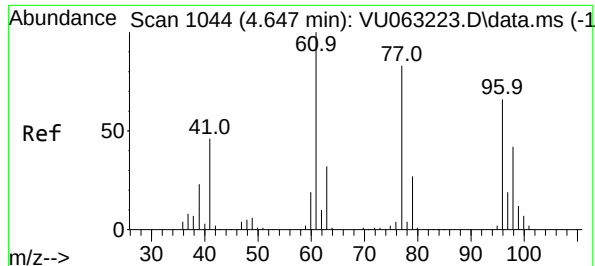
Delta R.T. 0.000 min

Lab File: VU063223.D

Acq: 10 Feb 2025 15:06

Tgt Ion:	83	Resp:	259112
Ion	Ratio	Lower	Upper
83	100		
55	78.9	63.1	94.7
98	44.0	35.2	52.8





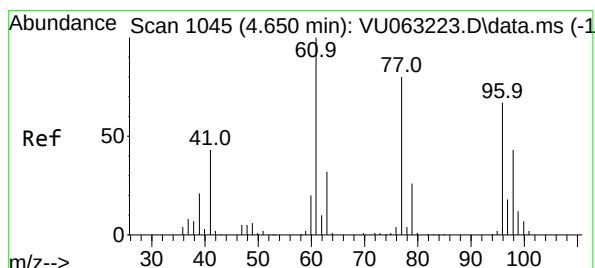
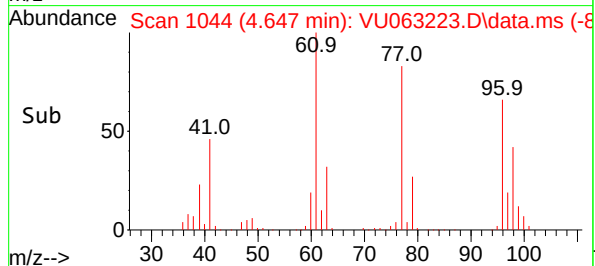
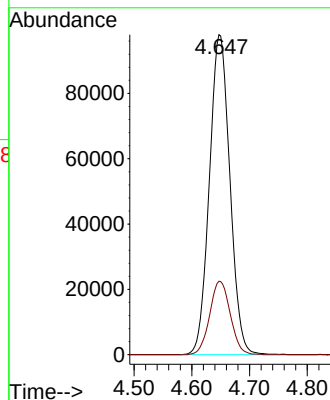
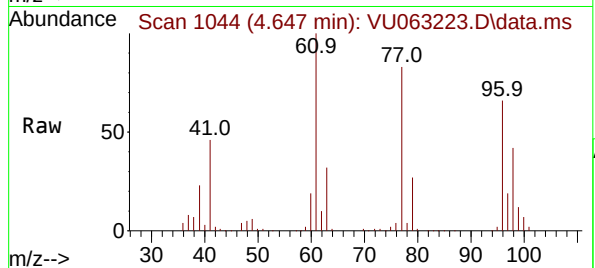
#21
2,2-Dichloropropane
Concen: 9.820 ug/l
RT: 4.647 min Scan# 1044
Delta R.T. 0.000 min
Lab File: VU063223.D
Acq: 10 Feb 2025 15:06

Instrument :
MSVOA_U
ClientSampleId :
VSTDICCC010

Tgt Ion: 77 Resp: 24175
Ion Ratio Lower Upper
77 100
97 23.1 18.5 27.7

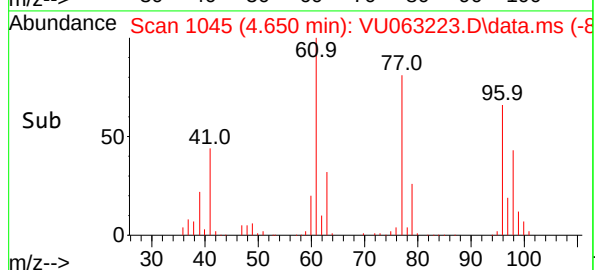
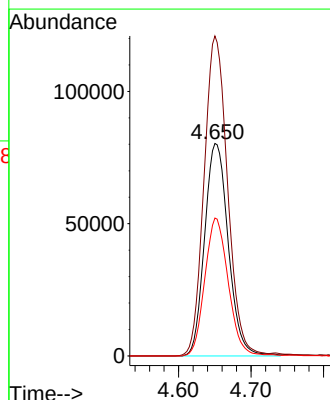
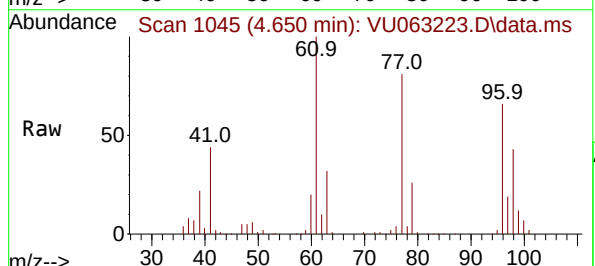
Manual Integrations
APPROVED

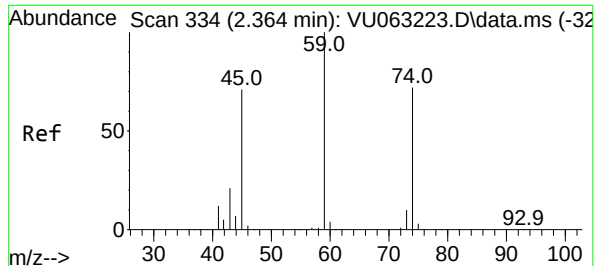
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#22
cis-1,2-Dichloroethene
Concen: 10.086 ug/l
RT: 4.650 min Scan# 1045
Delta R.T. 0.000 min
Lab File: VU063223.D
Acq: 10 Feb 2025 15:06

Tgt Ion: 96 Resp: 182447
Ion Ratio Lower Upper
96 100
61 149.3 0.0 373.3
98 63.9 31.9 95.9





#23

Diethyl Ether

Concen: 9.933 ug/l

RT: 2.364 min Scan# 311

Delta R.T. 0.000 min

Lab File: VU063223.D

Acq: 10 Feb 2025 15:06

Instrument :

MSVOA_U

ClientSampleId :

VSTDICCC010

Tgt Ion: 59 Resp: 125036

Ion Ratio Lower Upper

59 100

45 72.2 57.8 86.6

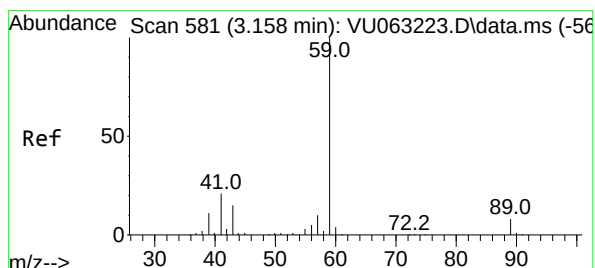
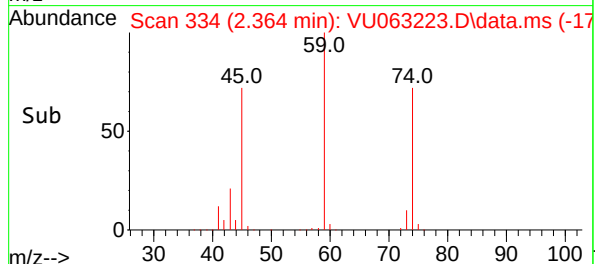
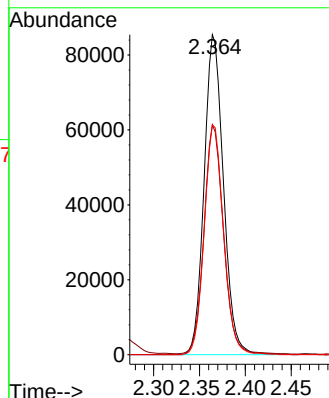
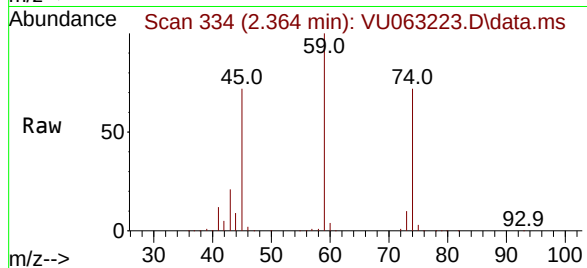
74 72.1 57.7 86.5

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#24

tert-Butyl Alcohol

Concen: 106.650 ug/l

RT: 3.158 min Scan# 581

Delta R.T. 0.000 min

Lab File: VU063223.D

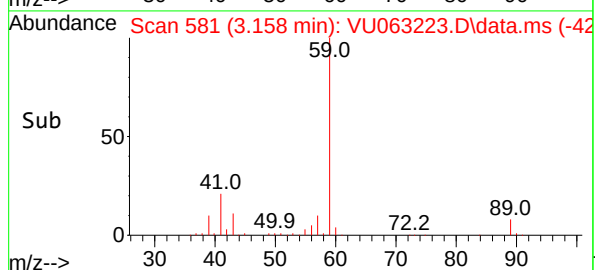
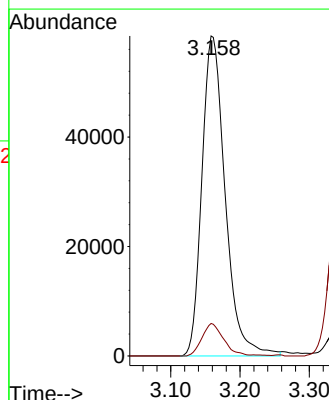
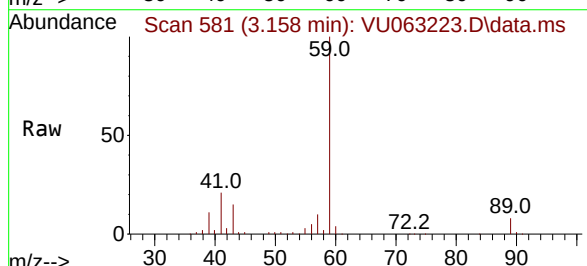
Acq: 10 Feb 2025 15:06

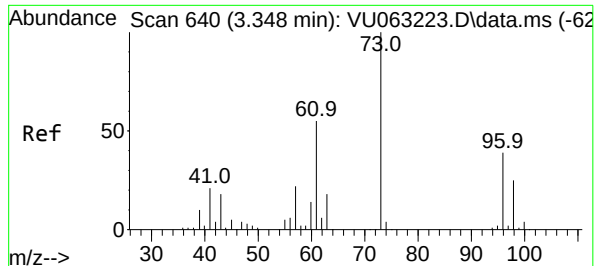
Tgt Ion: 59 Resp: 136525

Ion Ratio Lower Upper

59 100

57 9.4 7.5 11.3





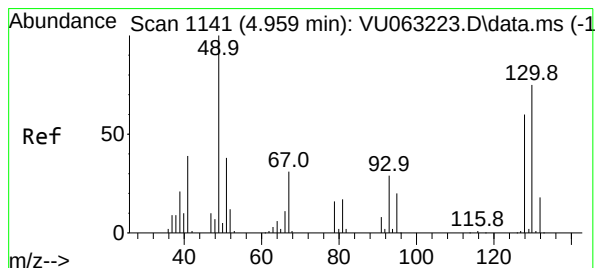
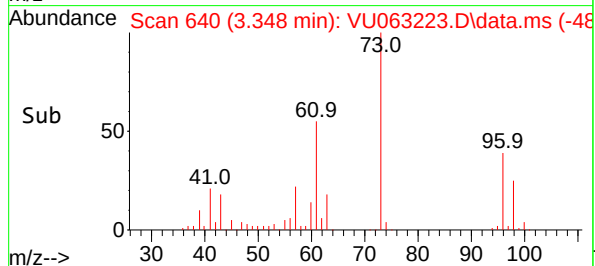
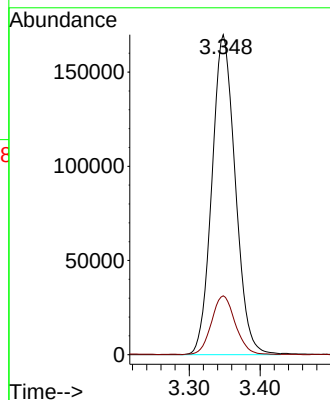
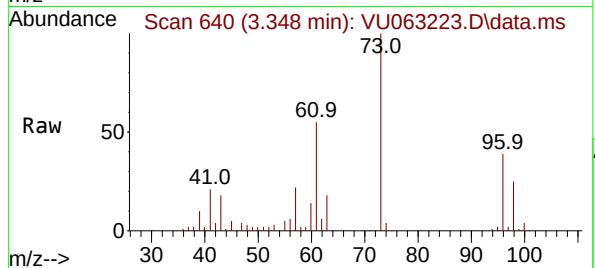
#25
Methyl tert-Butyl Ether
Concen: 10.617 ug/l
RT: 3.348 min Scan# 640
Delta R.T. 0.000 min
Lab File: VU063223.D
Acq: 10 Feb 2025 15:06

Instrument :
MSVOA_U
Client Sample Id :
VSTDICCC010

Tgt Ion: 73 Resp: 38898
Ion Ratio Lower Upper
73 100
43 18.6 14.9 22.3

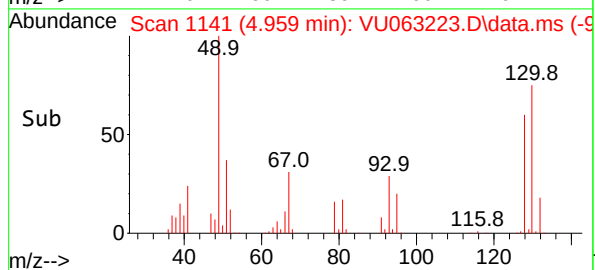
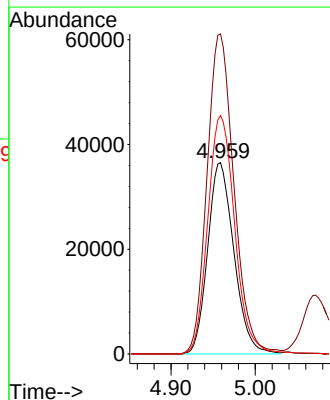
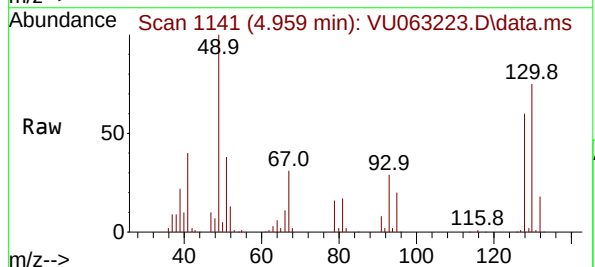
Manual Integrations
APPROVED

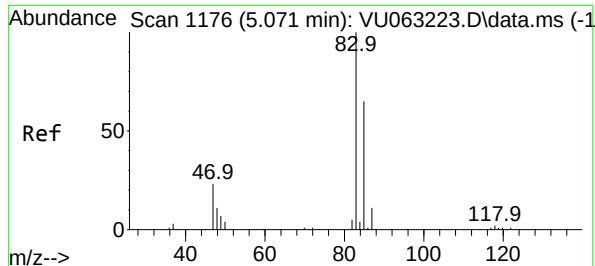
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#26
Bromochloromethane
Concen: 9.986 ug/l
RT: 4.959 min Scan# 1141
Delta R.T. 0.000 min
Lab File: VU063223.D
Acq: 10 Feb 2025 15:06

Tgt Ion:128 Resp: 78959
Ion Ratio Lower Upper
128 100
49 171.7 0.0 343.4
130 128.6 102.9 154.3





#27

Chloroform

Concen: 9.912 ug/l

RT: 5.071 min Scan# 1176

Delta R.T. 0.000 min

Lab File: VU063223.D

Acq: 10 Feb 2025 15:06

Instrument :

MSVOA_U

ClientSampleId :

VSTDICCC010

Tgt Ion: 83 Resp: 31566

Ion Ratio Lower Upper

83 100

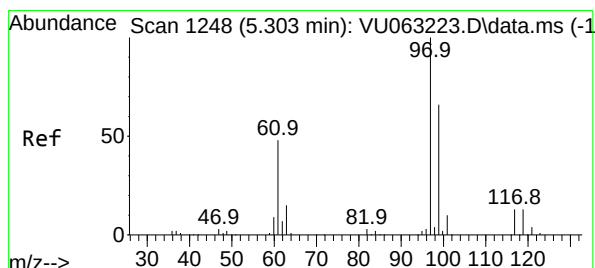
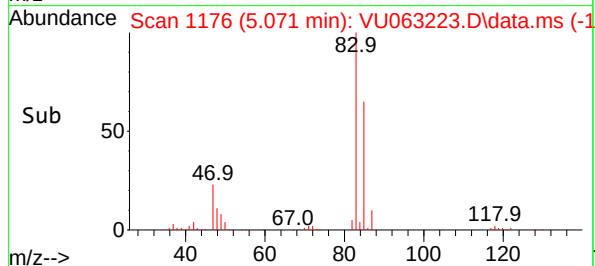
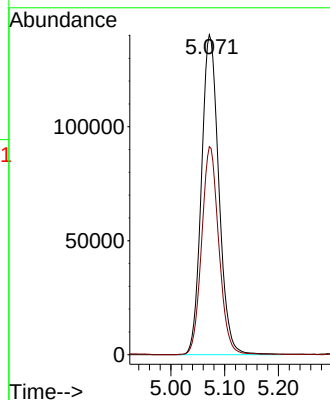
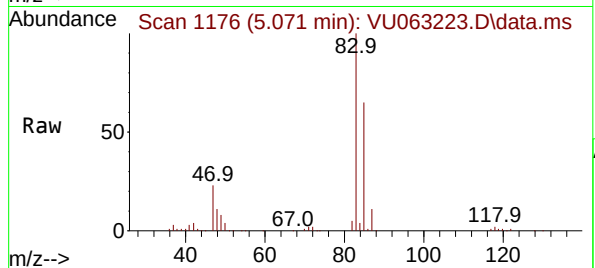
85 64.9 0.0 129.8

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#28

1,1,1-Trichloroethane

Concen: 9.897 ug/l

RT: 5.303 min Scan# 1248

Delta R.T. 0.000 min

Lab File: VU063223.D

Acq: 10 Feb 2025 15:06

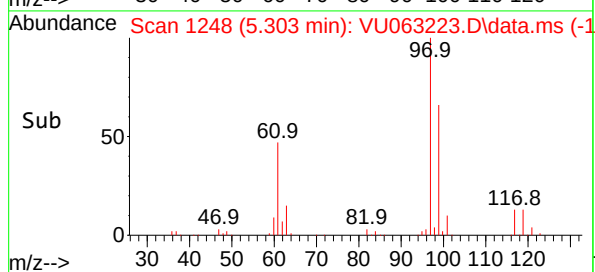
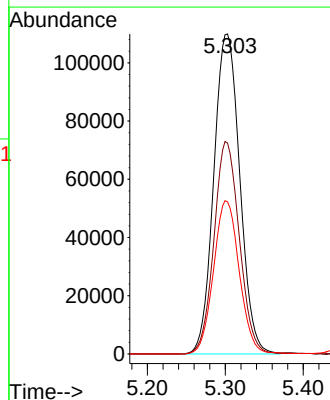
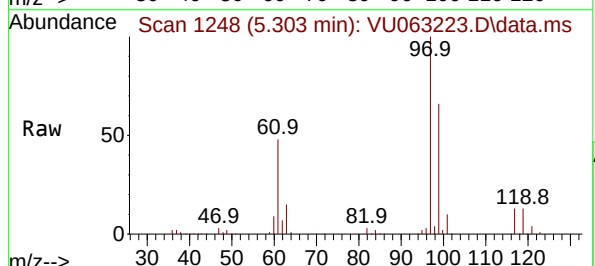
Tgt Ion: 97 Resp: 255321

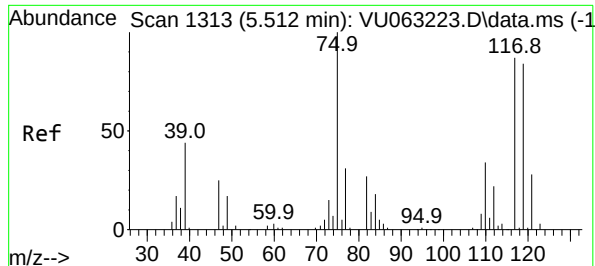
Ion Ratio Lower Upper

97 100

99 64.7 32.4 97.0

61 47.5 23.8 71.2





#29

1,1-Dichloropropene

Concen: 10.198 ug/l

RT: 5.512 min Scan# 1313

Delta R.T. 0.000 min

Lab File: VU063223.D

Acq: 10 Feb 2025 15:06

Instrument :

MSVOA_U

ClientSampleId :

VSTDICCC010

Tgt Ion: 75 Resp: 23564

Ion Ratio Lower Upper

75 100

110 34.3 17.2 51.5

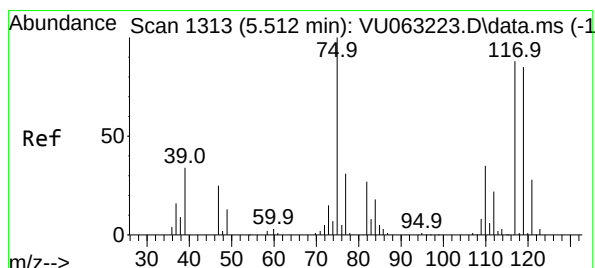
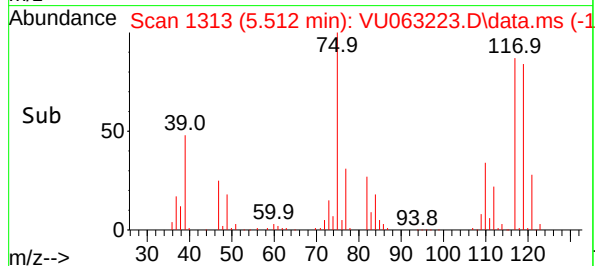
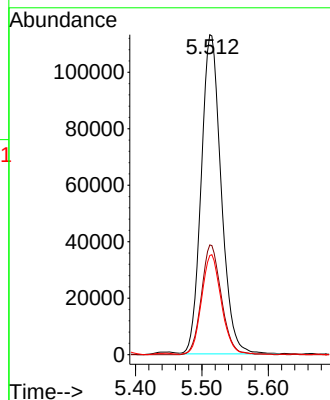
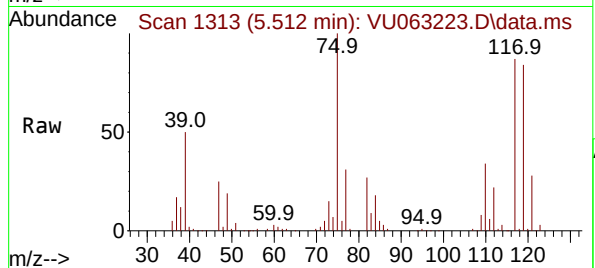
77 30.8 24.6 37.0

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#30

Carbon Tetrachloride

Concen: 9.870 ug/l

RT: 5.512 min Scan# 1313

Delta R.T. 0.000 min

Lab File: VU063223.D

Acq: 10 Feb 2025 15:06

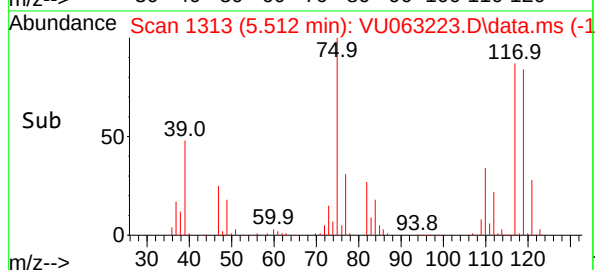
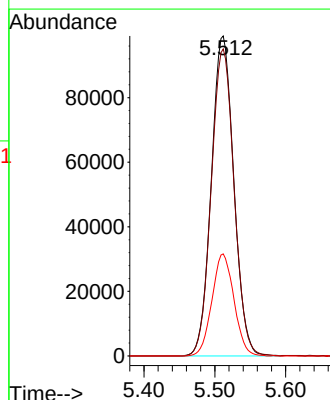
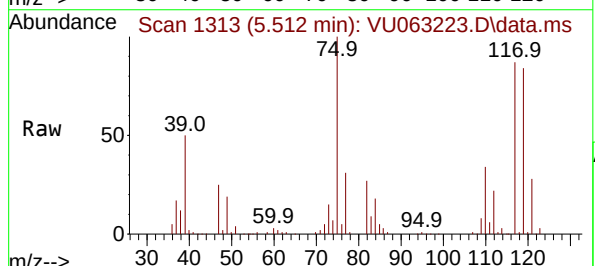
Tgt Ion:117 Resp: 218368

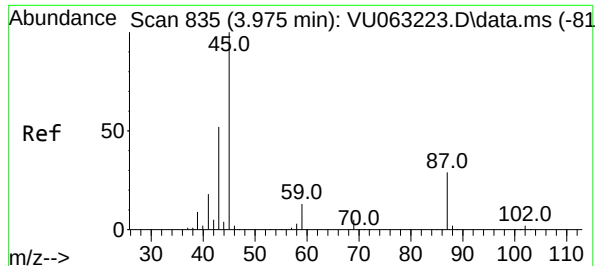
Ion Ratio Lower Upper

117 100

119 95.9 76.7 115.1

121 31.9 25.5 38.3





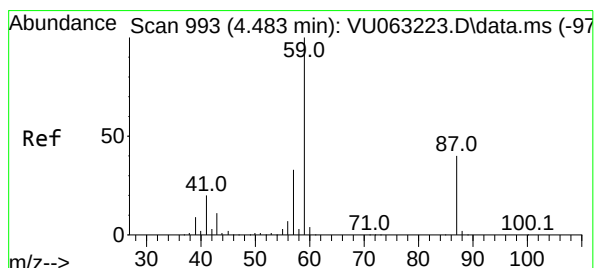
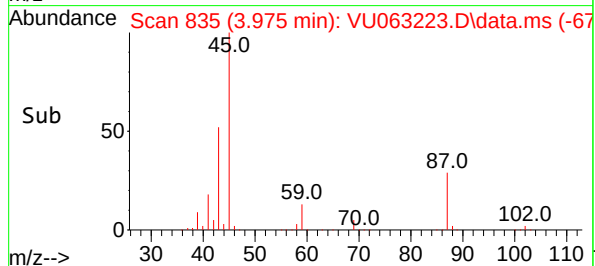
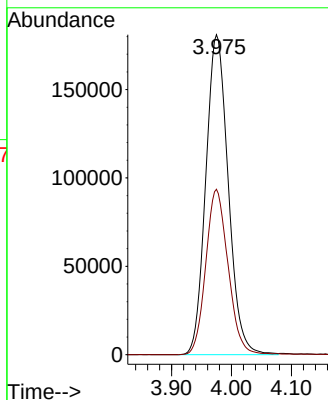
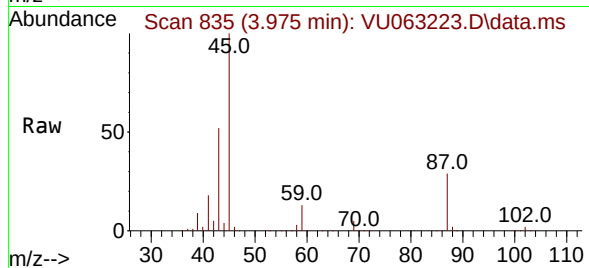
#31
Isopropyl Ether
Concen: 10.441 ug/l
RT: 3.975 min Scan# 835
Delta R.T. 0.000 min
Lab File: VU063223.D
Acq: 10 Feb 2025 15:06

Instrument :
MSVOA_U
ClientSampleId :
VSTDICCC010

Tgt Ion: 45 Resp: 47039
Ion Ratio Lower Upper
45 100
43 51.4 25.7 77.1

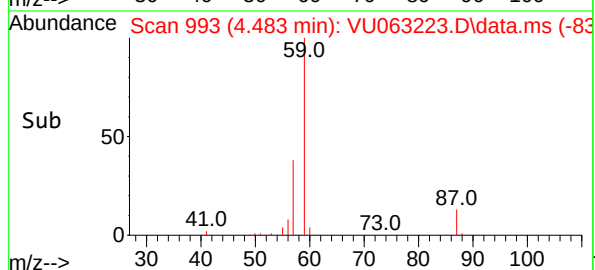
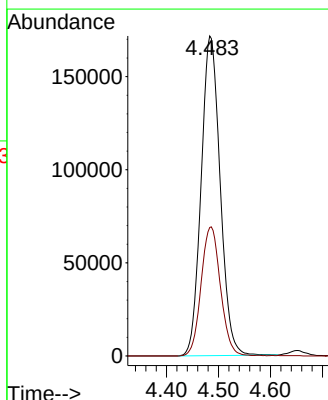
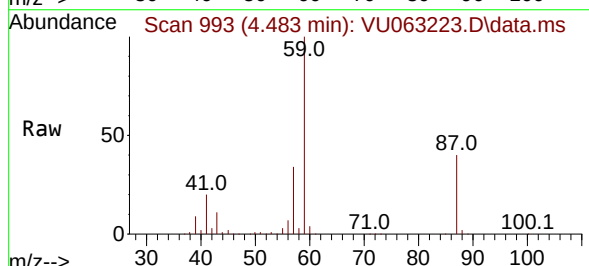
Manual Integrations
APPROVED

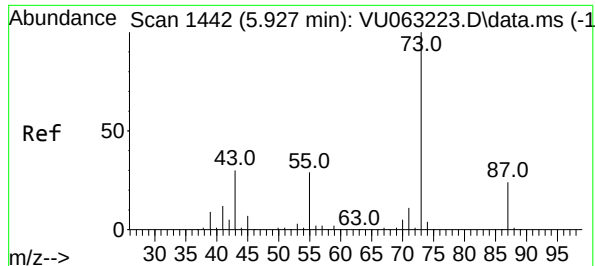
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#32
Ethyl-t-butyl ether
Concen: 10.649 ug/l
RT: 4.483 min Scan# 993
Delta R.T. 0.000 min
Lab File: VU063223.D
Acq: 10 Feb 2025 15:06

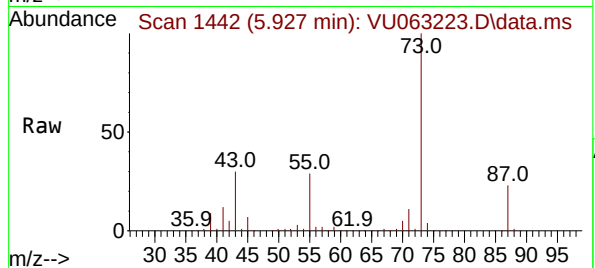
Tgt Ion: 59 Resp: 436320
Ion Ratio Lower Upper
59 100
87 40.8 32.6 49.0





#33
Tert-Amyl methyl ether
Concen: 11.111 ug/l
RT: 5.927 min Scan# 1442
Delta R.T. 0.000 min
Lab File: VU063223.D
Acq: 10 Feb 2025 15:06

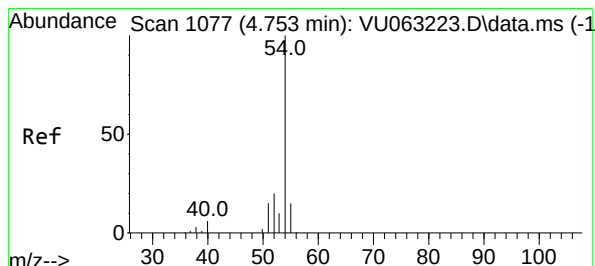
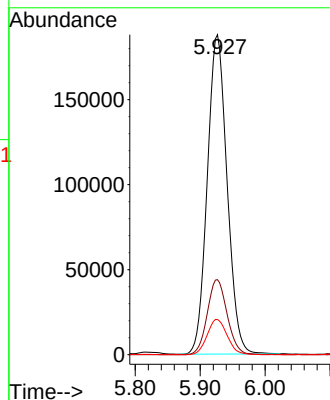
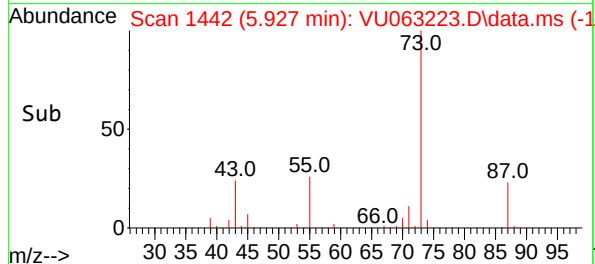
Instrument :
MSVOA_U
ClientSampleId :
VSTDICCC010



Tgt Ion: 73 Resp: 397764
Ion Ratio Lower Upper
73 100
87 23.6 18.9 28.3
71 11.2 9.0 13.4

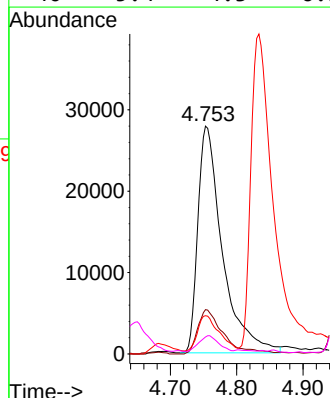
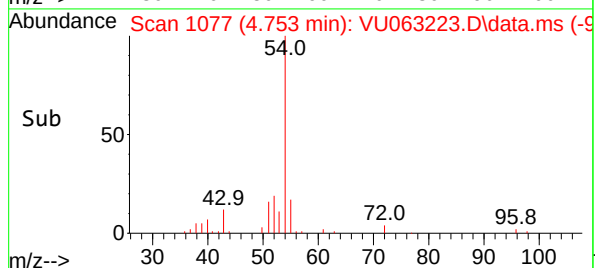
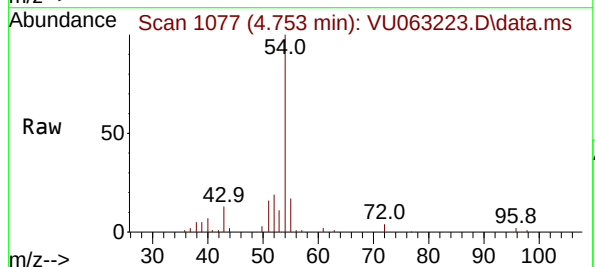
Manual Integrations
APPROVED

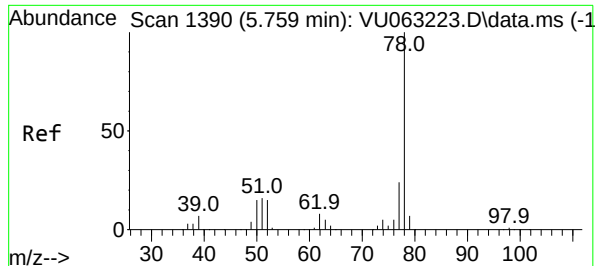
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#34
Propionitrile
Concen: 54.918 ug/l
RT: 4.753 min Scan# 1077
Delta R.T. 0.000 min
Lab File: VU063223.D
Acq: 10 Feb 2025 15:06

Tgt Ion: 54 Resp: 71557
Ion Ratio Lower Upper
54 100
52 20.4 16.3 24.5
55 14.7 11.8 17.6
40 5.4 4.3 6.5





#35

Benzene

Concen: 10.030 ug/l

RT: 5.759 min Scan# 1390

Delta R.T. 0.000 min

Lab File: VU063223.D

Acq: 10 Feb 2025 15:06

Instrument :

MSVOA_U

ClientSampleId :

VSTDICCC010

Tgt Ion: 78 Resp: 71258

Ion Ratio Lower Upper

78 100

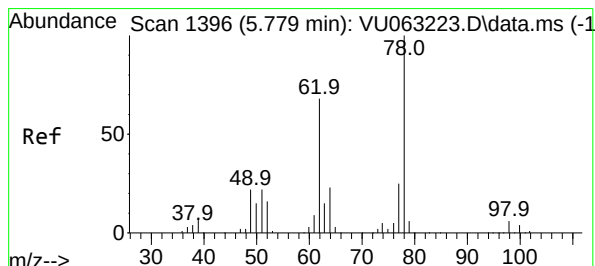
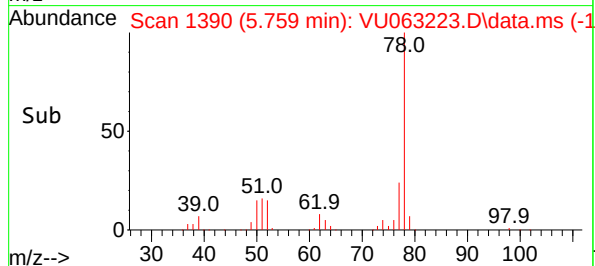
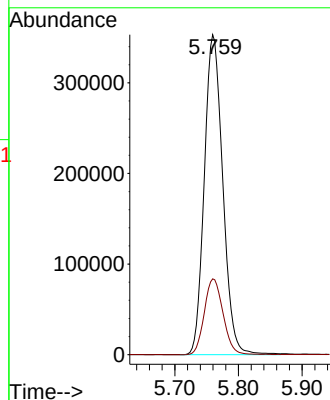
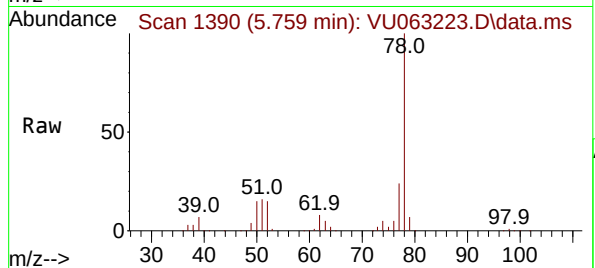
77 23.7 19.0 28.4

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#36

1,2-Dichloroethane

Concen: 10.014 ug/l

RT: 5.779 min Scan# 1396

Delta R.T. 0.000 min

Lab File: VU063223.D

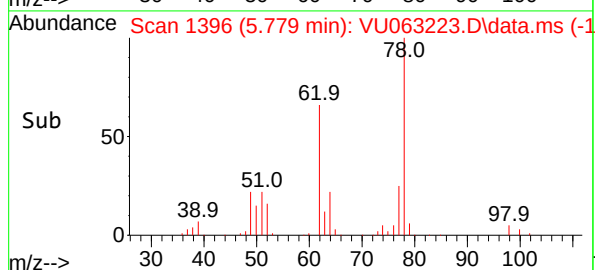
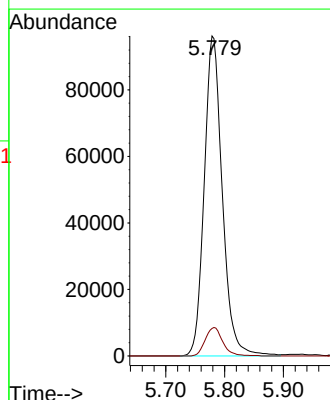
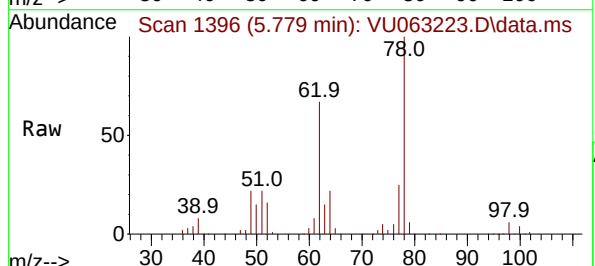
Acq: 10 Feb 2025 15:06

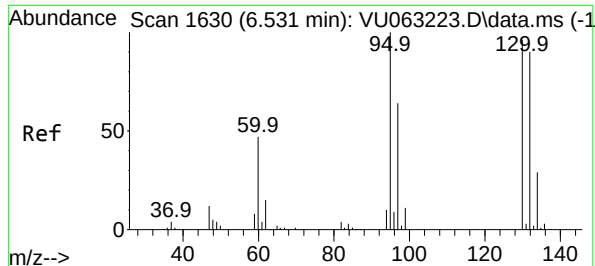
Tgt Ion: 62 Resp: 205344

Ion Ratio Lower Upper

62 100

98 8.6 6.9 10.3





#37

Trichloroethene

Concen: 9.962 ug/l

RT: 6.531 min Scan# 1

Delta R.T. 0.000 min

Lab File: VU063223.D

Acq: 10 Feb 2025 15:06

Instrument :

MSVOA_U

ClientSampleId :

VSTDICCC010

Tgt Ion:130 Resp: 16831

Ion Ratio Lower Upper

130 100

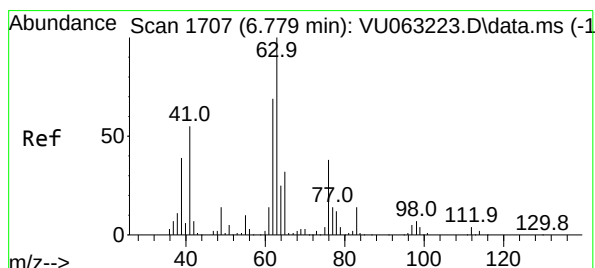
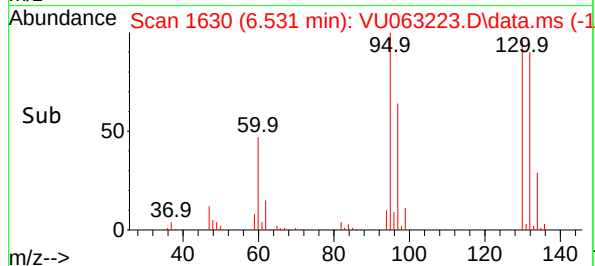
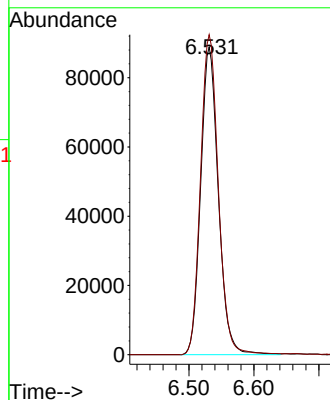
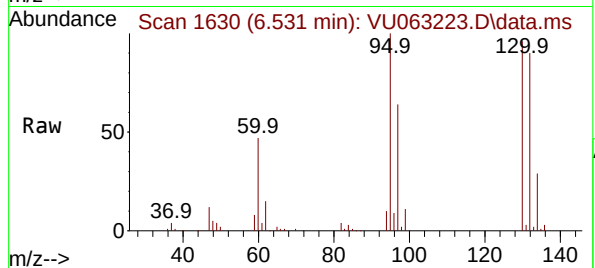
95 104.0 83.2 124.8

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#38

1,2-Dichloropropane

Concen: 10.148 ug/l

RT: 6.779 min Scan# 1707

Delta R.T. 0.000 min

Lab File: VU063223.D

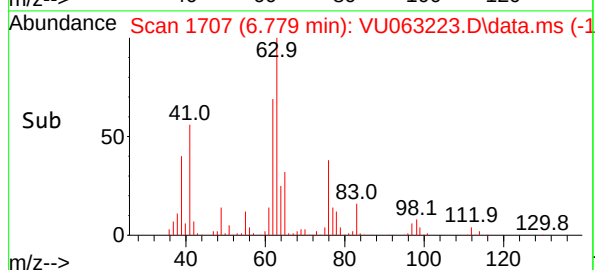
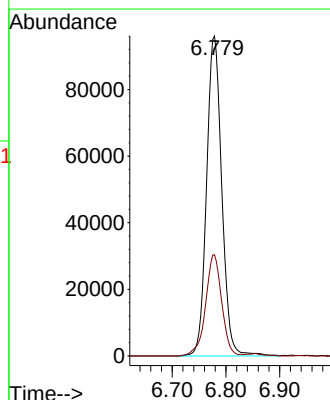
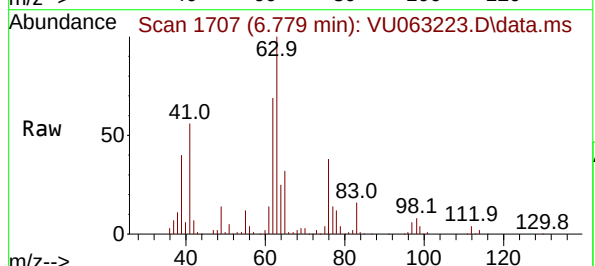
Acq: 10 Feb 2025 15:06

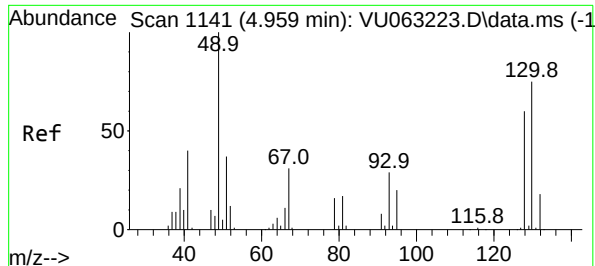
Tgt Ion: 63 Resp: 188716

Ion Ratio Lower Upper

63 100

65 31.6 25.3 37.9





#39

Methacrylonitrile

Concen: 12.123 ug/l

RT: 4.959 min Scan# 1141

Delta R.T. 0.000 min

Lab File: VU063223.D

Acq: 10 Feb 2025 15:06

Instrument :

MSVOA_U

ClientSampleId :

VSTDICCC010

Tgt Ion: 41 Resp: 56424

Ion Ratio Lower Upper

41 100

67 80.6 64.5 96.7

39 53.8 43.0 64.6

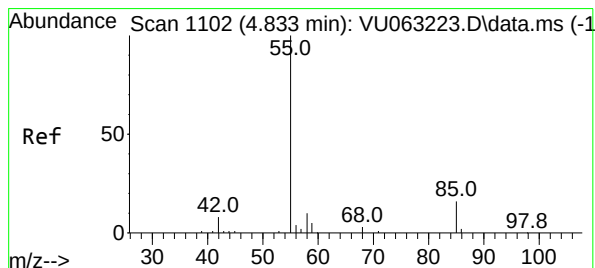
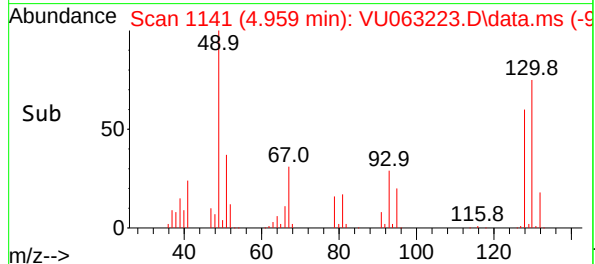
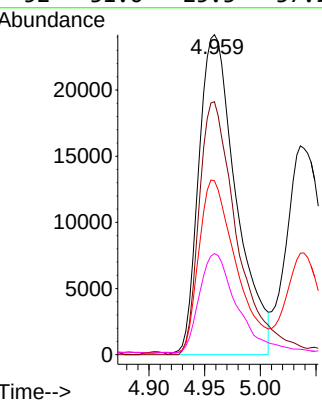
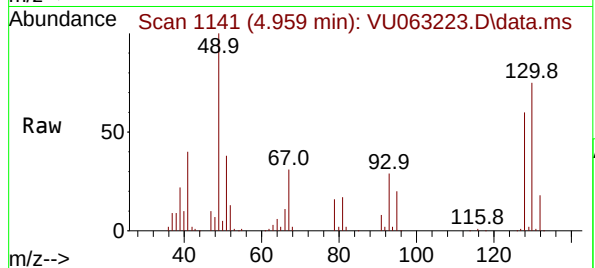
52 31.6 25.3 37.9

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#40

Methyl acrylate

Concen: 11.258 ug/l

RT: 4.833 min Scan# 1102

Delta R.T. 0.000 min

Lab File: VU063223.D

Acq: 10 Feb 2025 15:06

Tgt Ion: 55 Resp: 95663

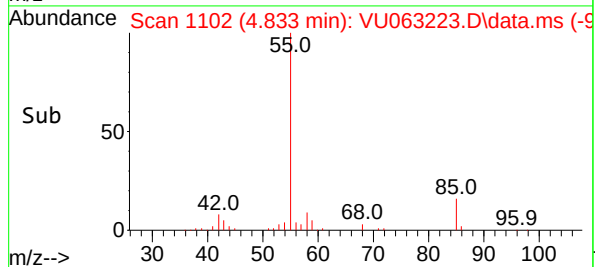
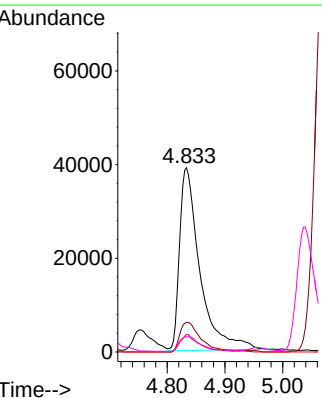
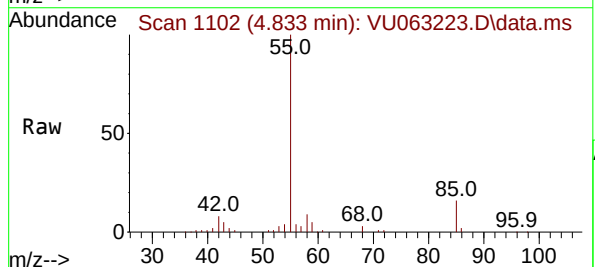
Ion Ratio Lower Upper

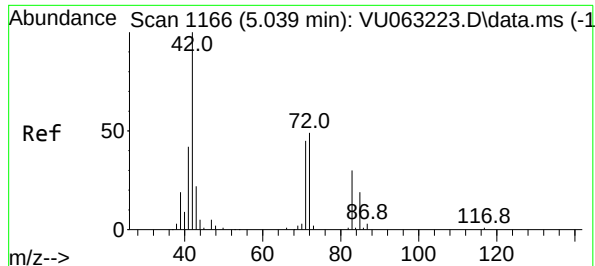
55 100

85 16.6 13.3 19.9

58 9.1 7.3 10.9

42 8.6 6.9 10.3





#41

Tetrahydrofuran

Concen: 21.760 ug/l

RT: 5.039 min Scan# 1166

Delta R.T. 0.000 min

Lab File: VU063223.D

Acq: 10 Feb 2025 15:06

Instrument :

MSVOA_U

ClientSampleId :

VSTDICCC010

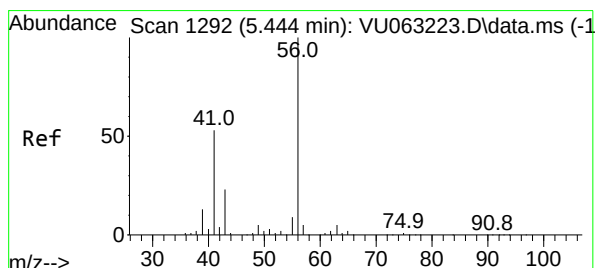
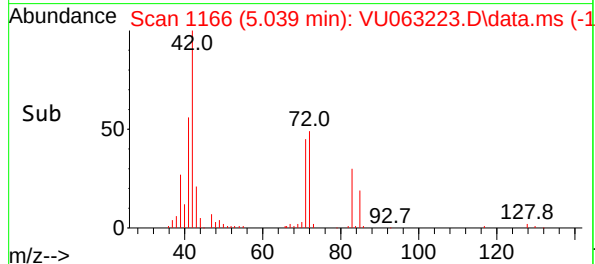
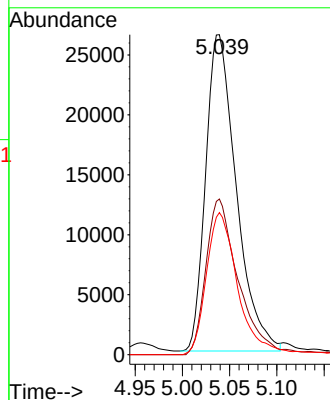
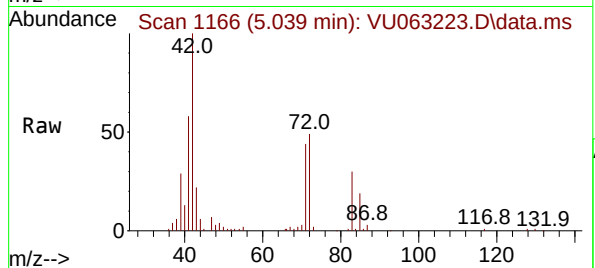
Tgt Ion:	42	Resp:	59510
Ion Ratio	Lower	Upper	
42	100		
72	51.9	41.5	62.3
71	46.5	37.2	55.8

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#42

1-Chlorobutane

Concen: 10.327 ug/l

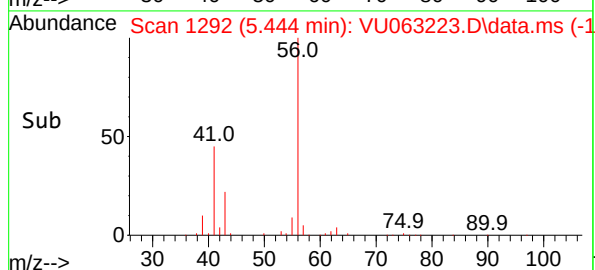
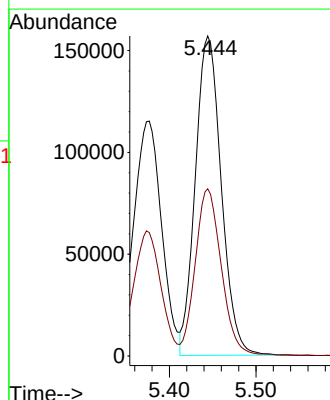
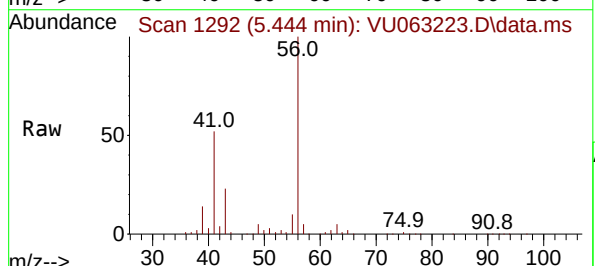
RT: 5.444 min Scan# 1292

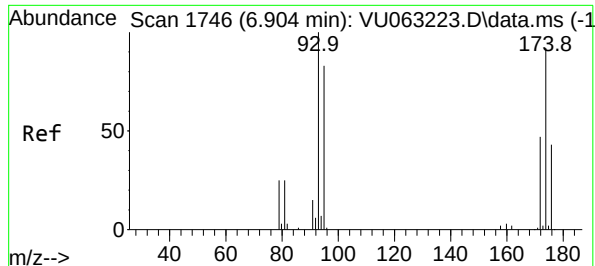
Delta R.T. 0.000 min

Lab File: VU063223.D

Acq: 10 Feb 2025 15:06

Tgt Ion:	56	Resp:	326490
Ion Ratio	Lower	Upper	
56	100		
41	52.5	26.3	78.8





#43

Dibromomethane

Concen: 9.994 ug/l

RT: 6.904 min Scan# 1746

Delta R.T. 0.000 min

Lab File: VU063223.D

Acq: 10 Feb 2025 15:06

Instrument :

MSVOA_U

ClientSampleId :

VSTDICCC010

Tgt Ion: 93 Resp: 94100

Ion Ratio Lower Upper

93 100

95 84.0 67.2 100.8

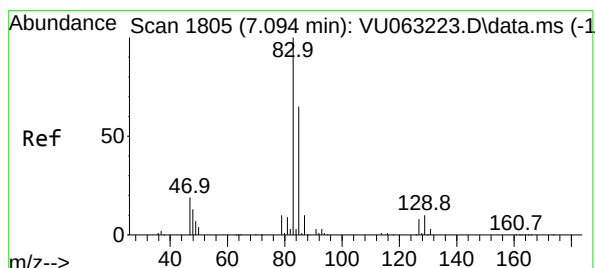
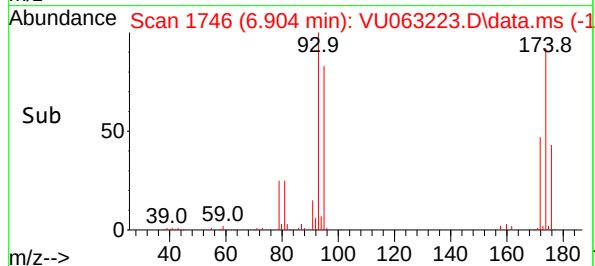
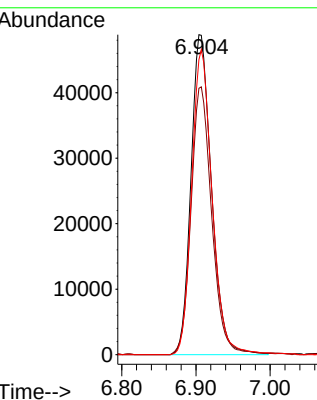
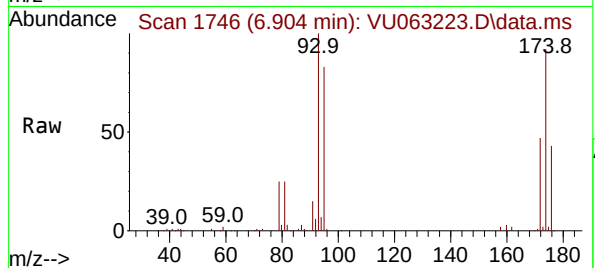
174 94.6 75.7 113.5

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#44

Bromodichloromethane

Concen: 10.303 ug/l

RT: 7.094 min Scan# 1805

Delta R.T. 0.000 min

Lab File: VU063223.D

Acq: 10 Feb 2025 15:06

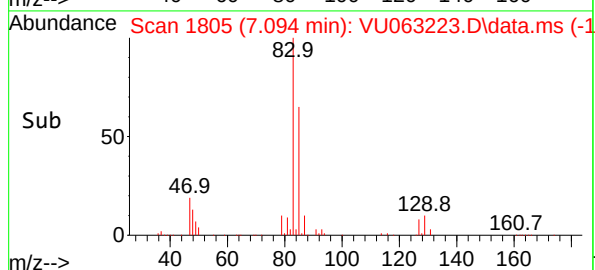
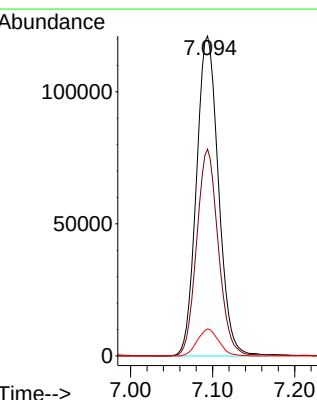
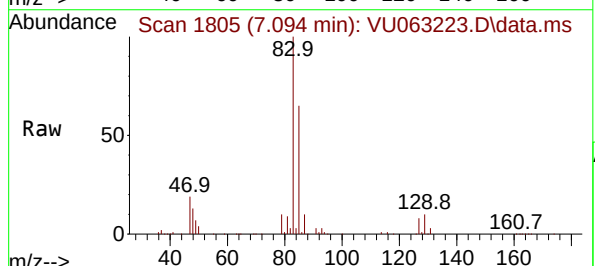
Tgt Ion: 83 Resp: 225813

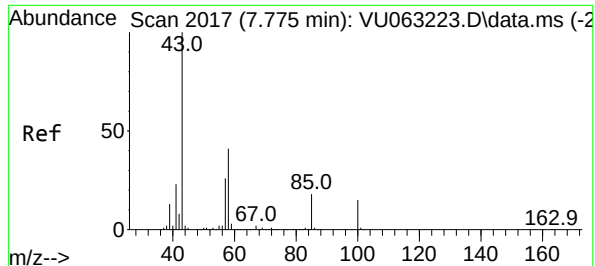
Ion Ratio Lower Upper

83 100

85 64.6 51.7 77.5

127 8.4 6.7 10.1





#45

4-Methyl-2-Pentanone

Concen: 57.627 ug/l

RT: 7.775 min Scan# 2017

Delta R.T. 0.000 min

Lab File: VU063223.D

Acq: 10 Feb 2025 15:06

Instrument :

MSVOA_U

ClientSampleId :

VSTDICCC010

Tgt Ion: 43 Resp: 56888

Ion Ratio Lower Upper

43 100

58 41.7 20.8 62.5

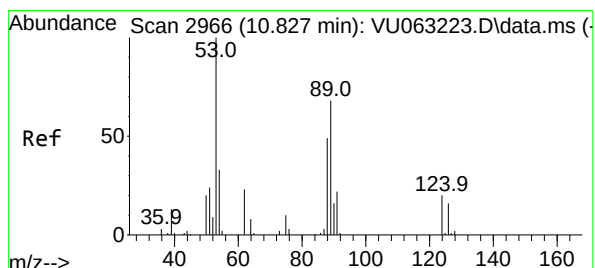
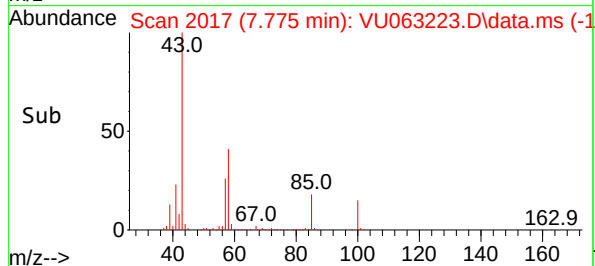
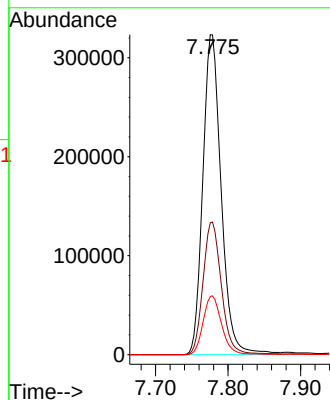
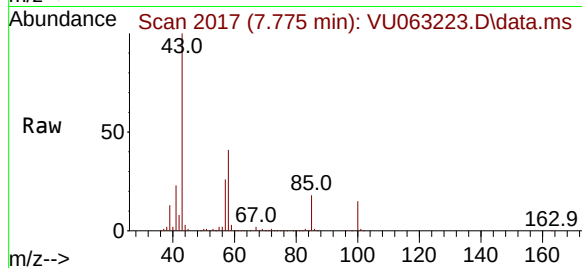
85 18.5 14.8 22.2

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#46

t-1,4-Dichloro-2-butene

Concen: 19.967 ug/l m

RT: 10.827 min Scan# 2966

Delta R.T. 0.000 min

Lab File: VU063223.D

Acq: 10 Feb 2025 15:06

Tgt Ion: 75 Resp: 97536

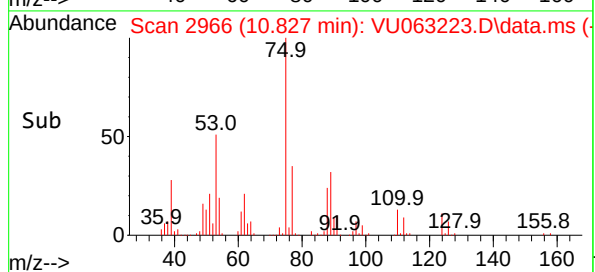
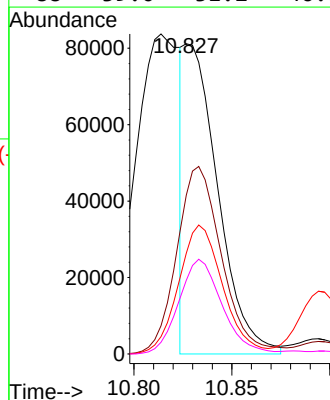
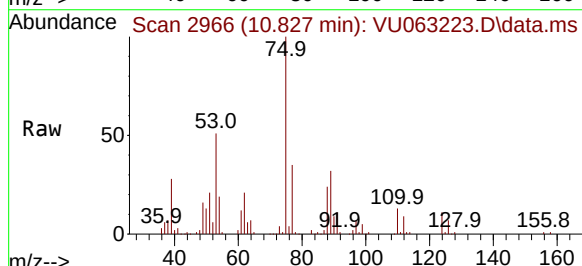
Ion Ratio Lower Upper

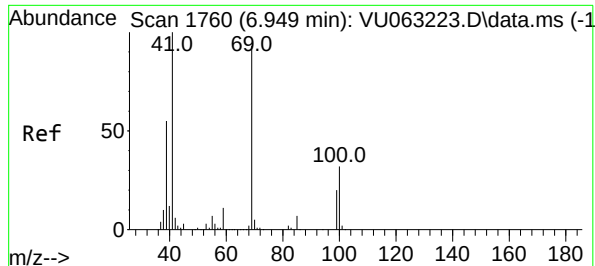
75 100

53 80.6 64.5 96.7

89 54.3 43.4 65.2

88 39.0 31.2 46.8





#47

Methyl methacrylate

Concen: 23.502 ug/l

RT: 6.949 min Scan# 1760

Delta R.T. 0.000 min

Lab File: VU063223.D

Acq: 10 Feb 2025 15:06

Instrument :

MSVOA_U

ClientSampleId :

VSTDICCC010

Tgt Ion: 69 Resp: 186394

Ion Ratio Lower Upper

69 100

41 108.5 0.0 217.0

39 59.6 47.7 71.5

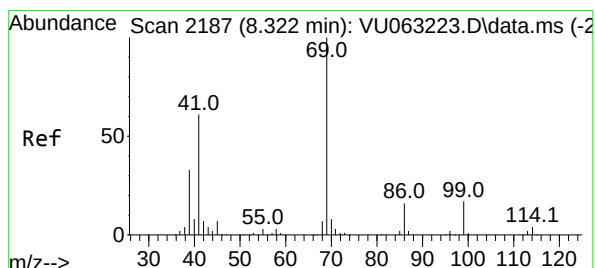
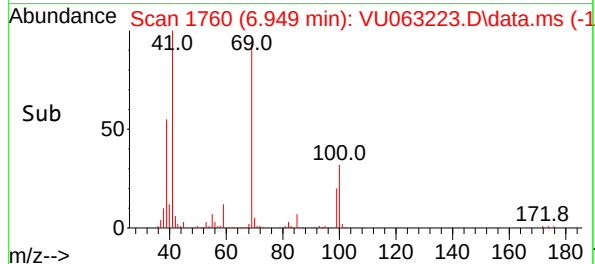
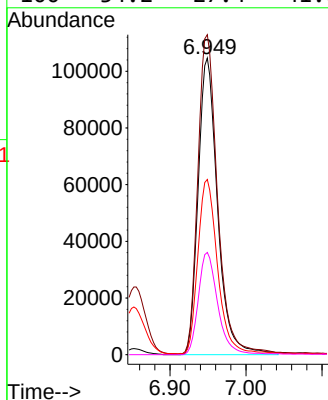
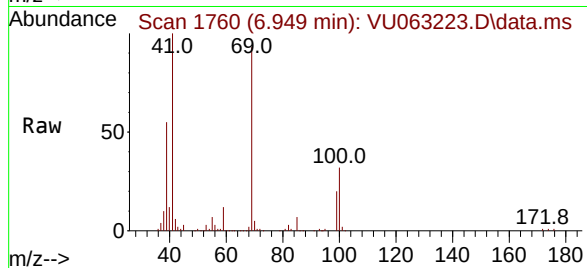
100 34.2 27.4 41.0

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#48

Ethyl methacrylate

Concen: 12.196 ug/l

RT: 8.322 min Scan# 2187

Delta R.T. 0.000 min

Lab File: VU063223.D

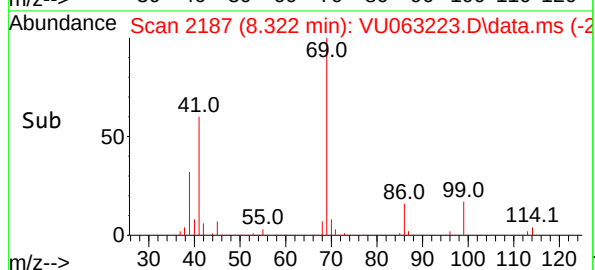
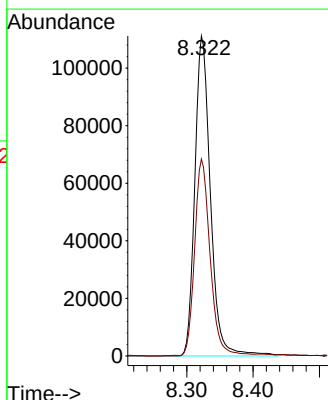
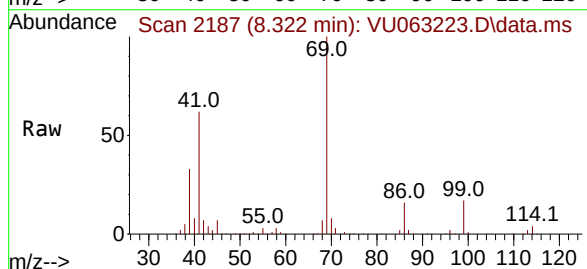
Acq: 10 Feb 2025 15:06

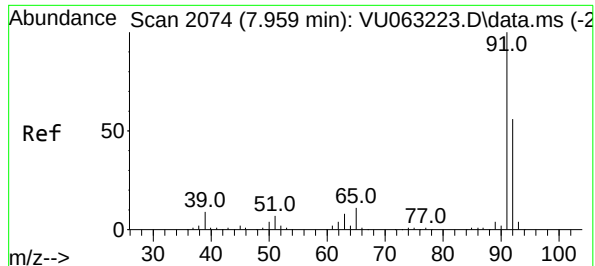
Tgt Ion: 69 Resp: 181630

Ion Ratio Lower Upper

69 100

41 61.3 30.6 92.0





#49

Toluene

Concen: 10.535 ug/l

RT: 7.959 min Scan# 2074

Delta R.T. 0.000 min

Lab File: VU063223.D

Acq: 10 Feb 2025 15:06

Instrument :

MSVOA_U

ClientSampleId :

VSTDICCC010

Tgt Ion: 92 Resp: 43044

Ion Ratio Lower Upper

92 100

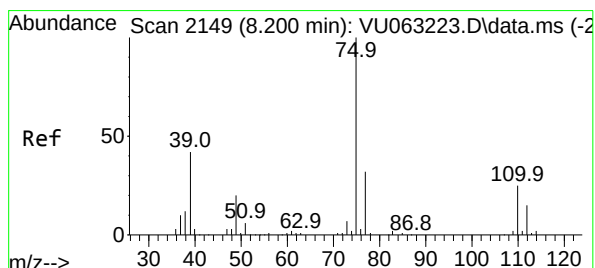
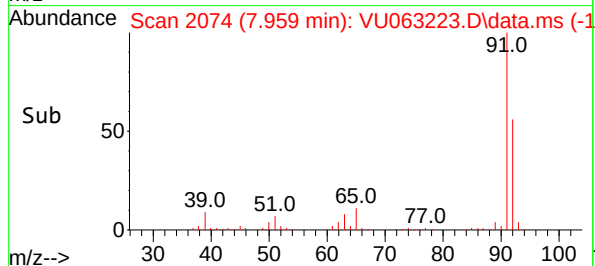
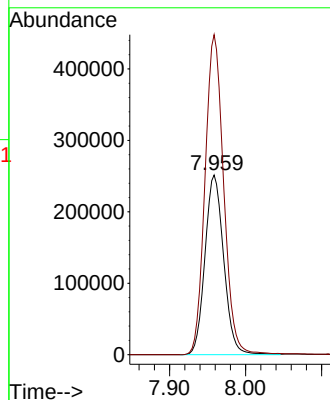
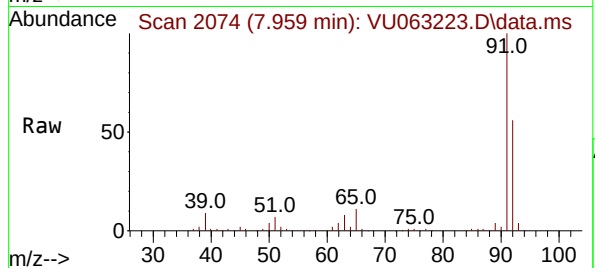
91 177.2 141.8 212.6

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#50

t-1,3-Dichloropropene

Concen: 11.027 ug/l

RT: 8.200 min Scan# 2149

Delta R.T. 0.000 min

Lab File: VU063223.D

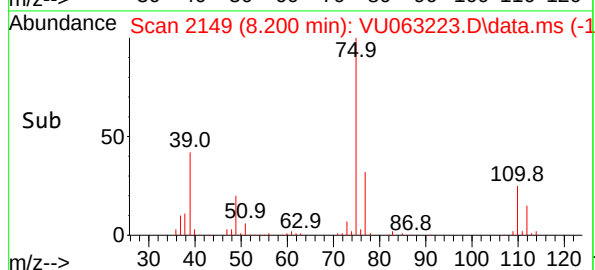
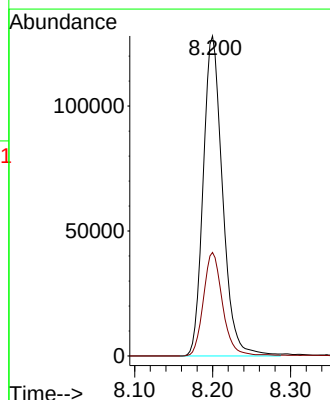
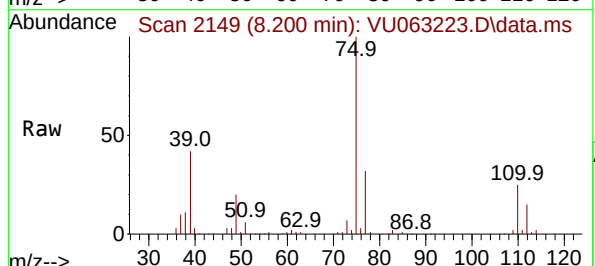
Acq: 10 Feb 2025 15:06

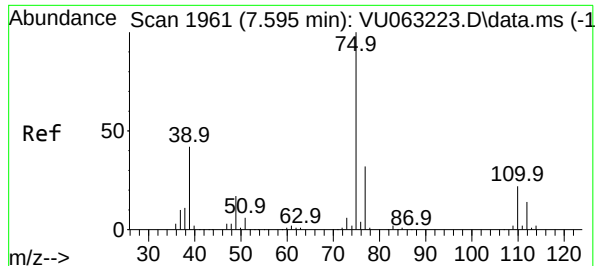
Tgt Ion: 75 Resp: 221262

Ion Ratio Lower Upper

75 100

77 32.4 25.9 38.9





#51

cis-1,3-Dichloropropene

Concen: 10.700 ug/l

RT: 7.595 min Scan# 1961

Delta R.T. 0.000 min

Lab File: VU063223.D

Acq: 10 Feb 2025 15:06

Instrument :

MSVOA_U

ClientSampleId :

VSTDICCC010

Tgt Ion: 75 Resp: 26520

Ion Ratio Lower Upper

75 100

77 31.6 25.3 37.9

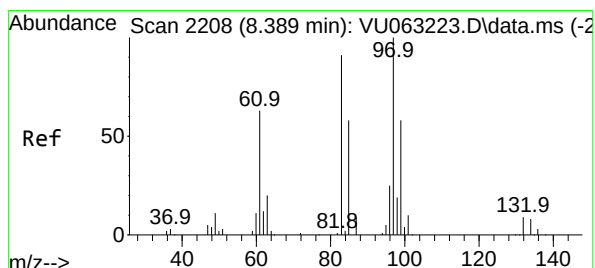
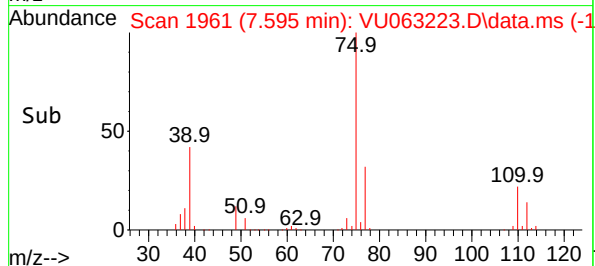
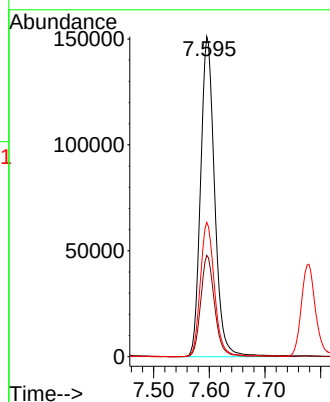
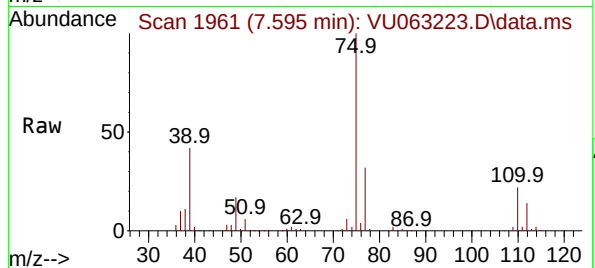
39 41.9 33.5 50.3

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#52

1,1,2-Trichloroethane

Concen: 10.370 ug/l

RT: 8.389 min Scan# 2208

Delta R.T. 0.000 min

Lab File: VU063223.D

Acq: 10 Feb 2025 15:06

Tgt Ion: 97 Resp: 131655

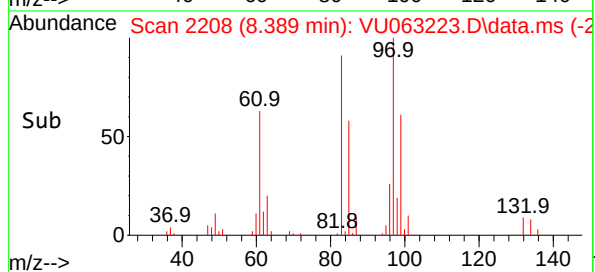
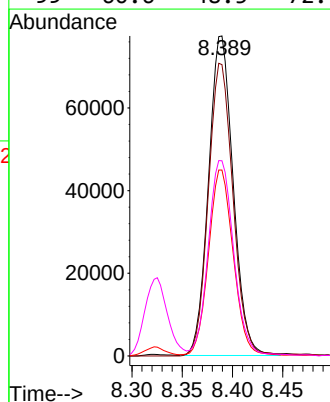
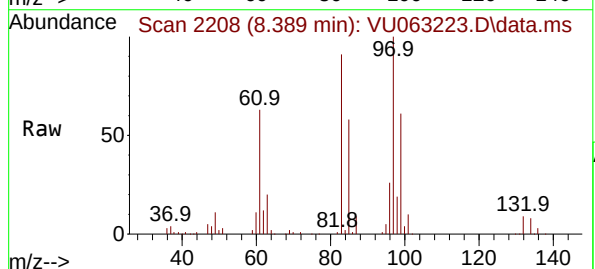
Ion Ratio Lower Upper

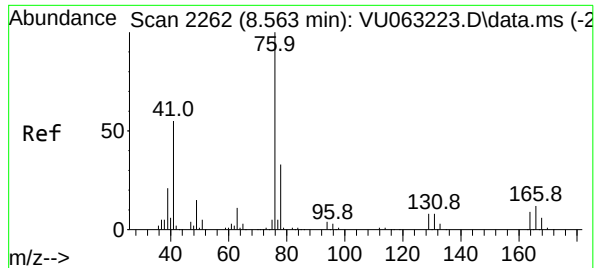
97 100

83 91.2 73.0 109.4

85 57.9 46.3 69.5

99 60.6 48.5 72.7





#53

1,3-Dichloropropane

Concen: 10.382 ug/l

RT: 8.563 min Scan# 2262

Delta R.T. 0.000 min

Lab File: VU063223.D

Acq: 10 Feb 2025 15:06

Instrument :

MSVOA_U

ClientSampleId :

VSTDICCC010

Tgt Ion: 76 Resp: 234000

Ion Ratio Lower Upper

76 100

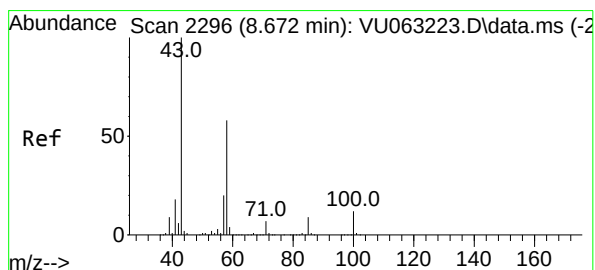
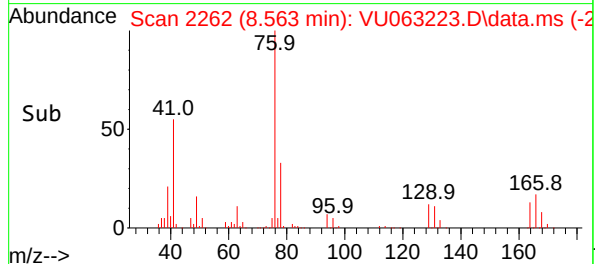
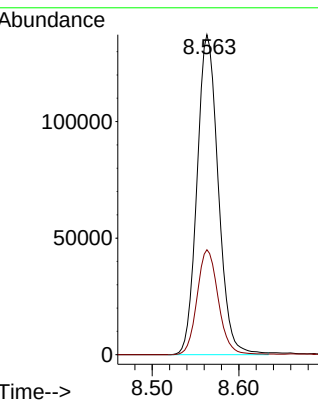
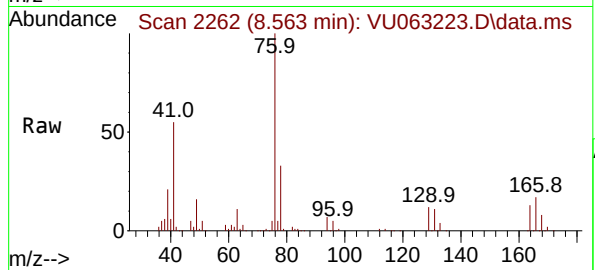
78 32.9 26.3 39.5

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#54

2-Hexanone

Concen: 58.266 ug/l

RT: 8.672 min Scan# 2296

Delta R.T. 0.000 min

Lab File: VU063223.D

Acq: 10 Feb 2025 15:06

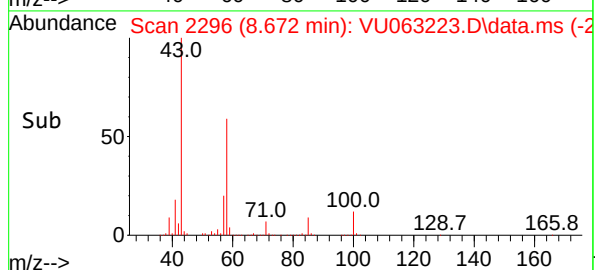
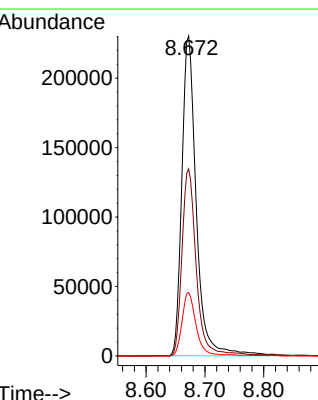
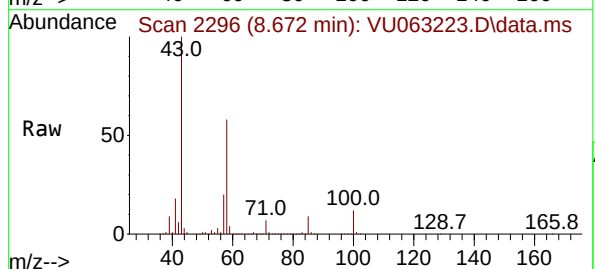
Tgt Ion: 43 Resp: 392522

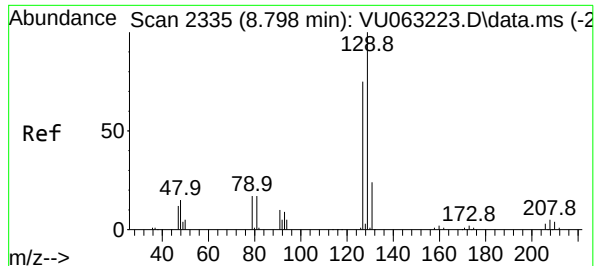
Ion Ratio Lower Upper

43 100

58 58.0 38.0 78.0

57 19.1 0.0 39.1





#55

Dibromochloromethane

Concen: 10.575 ug/l

RT: 8.798 min Scan# 2335

Delta R.T. 0.000 min

Lab File: VU063223.D

Acq: 10 Feb 2025 15:06

Instrument :

MSVOA_U

ClientSampleId :

VSTDICCC010

Tgt Ion:129 Resp: 154464

Ion Ratio Lower Upper

129 100

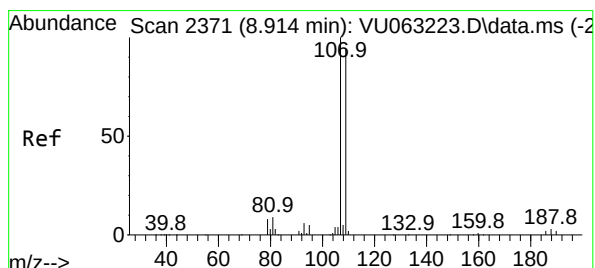
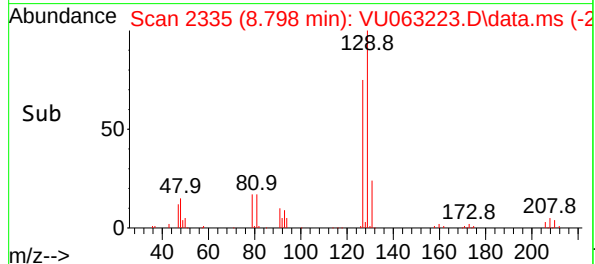
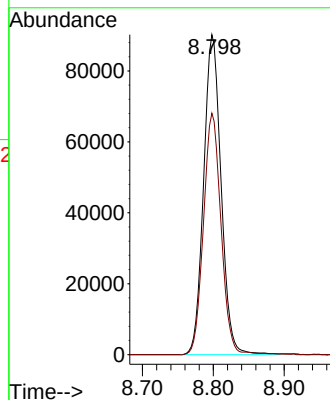
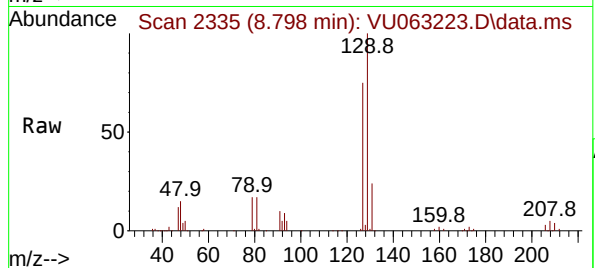
127 75.5 60.4 90.6

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#56

1,2-Dibromoethane

Concen: 10.638 ug/l

RT: 8.914 min Scan# 2371

Delta R.T. 0.000 min

Lab File: VU063223.D

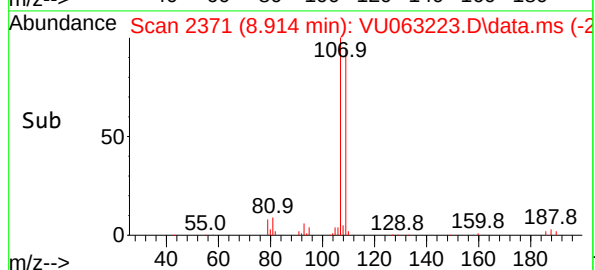
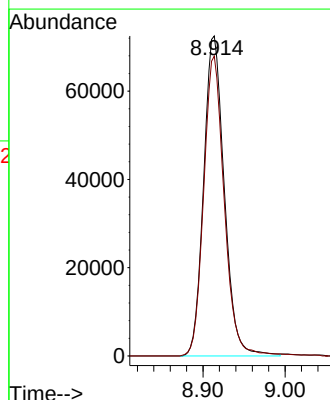
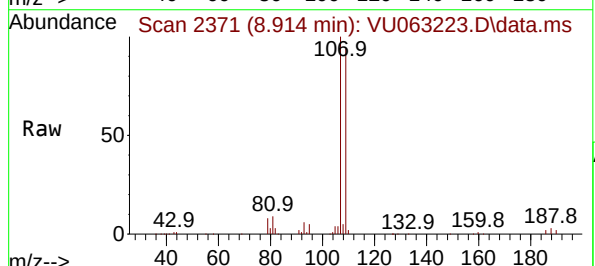
Acq: 10 Feb 2025 15:06

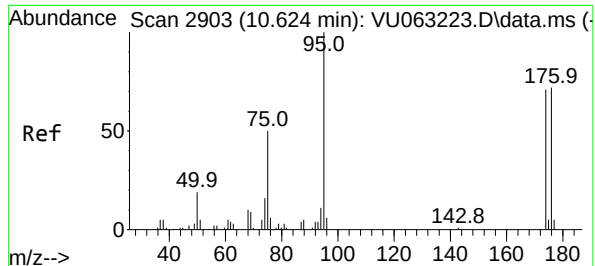
Tgt Ion:107 Resp: 126673

Ion Ratio Lower Upper

107 100

109 93.9 0.0 187.8





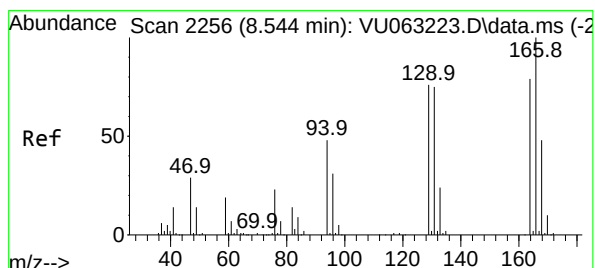
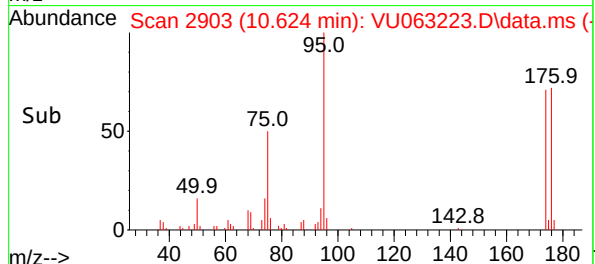
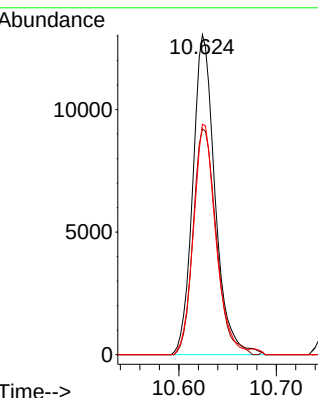
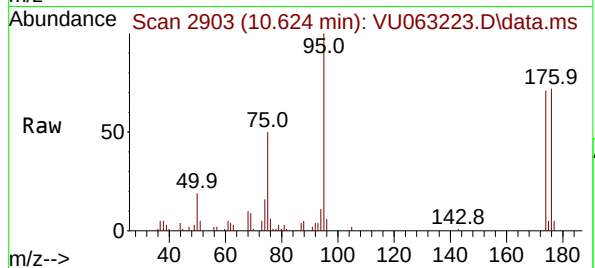
#57
4-Bromofluorobenzene
Concen: 1.085 ug/l
RT: 10.624 min Scan# 2903
Delta R.T. 0.000 min
Lab File: VU063223.D
Acq: 10 Feb 2025 15:06

Instrument :
MSVOA_U
ClientSampleId :
VSTDICCC010

Tgt Ion: 95 Resp: 2070
Ion Ratio Lower Upper
95 100
174 73.3 58.6 88.0
176 72.8 58.2 87.4

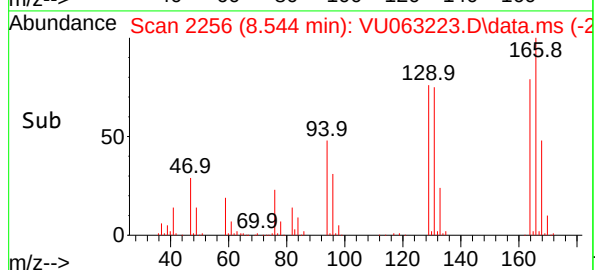
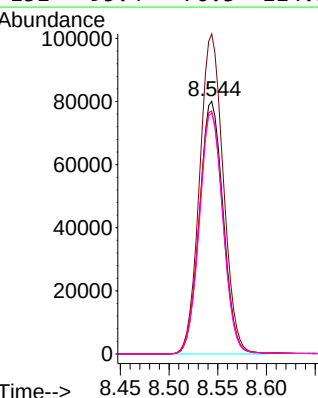
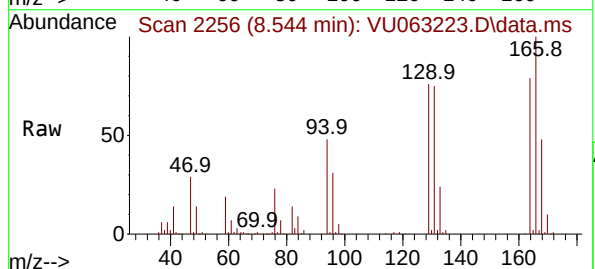
Manual Integrations
APPROVED

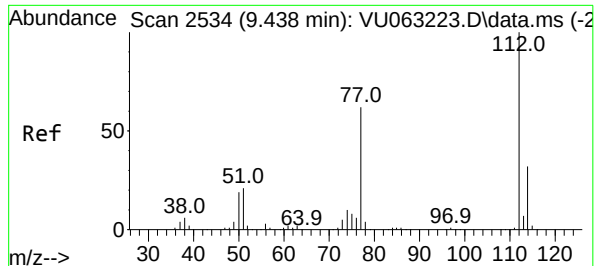
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#58
Tetrachloroethene
Concen: 9.719 ug/l
RT: 8.544 min Scan# 2256
Delta R.T. 0.000 min
Lab File: VU063223.D
Acq: 10 Feb 2025 15:06

Tgt Ion:164 Resp: 135324
Ion Ratio Lower Upper
164 100
166 126.7 101.4 152.0
129 96.2 77.0 115.4
131 95.4 76.3 114.5





#59

Chlorobenzene

Concen: 10.297 ug/l

RT: 9.438 min Scan# 2534

Delta R.T. 0.000 min

Lab File: VU063223.D

Acq: 10 Feb 2025 15:06

Instrument :

MSVOA_U

ClientSampleId :

VSTDICCC010

Tgt Ion:112 Resp: 443950

Ion Ratio Lower Upper

112 100

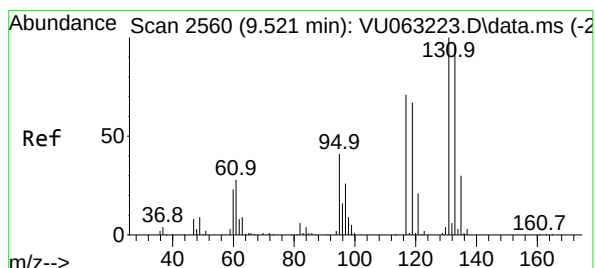
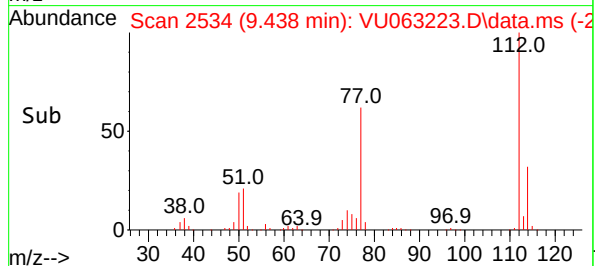
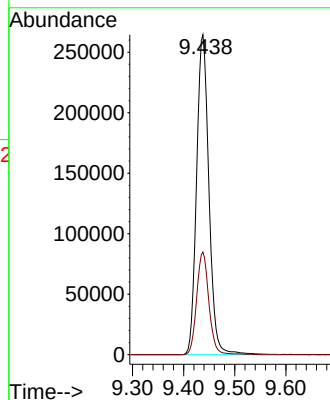
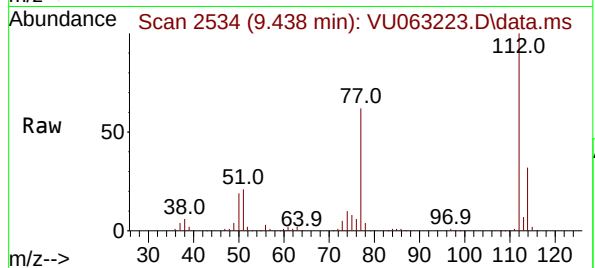
114 32.1 25.7 38.5

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#60

1,1,1,2-Tetrachloroethane

Concen: 10.222 ug/l

RT: 9.521 min Scan# 2560

Delta R.T. 0.000 min

Lab File: VU063223.D

Acq: 10 Feb 2025 15:06

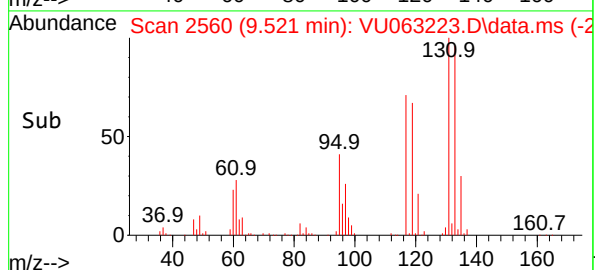
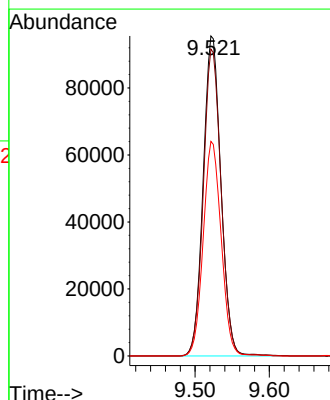
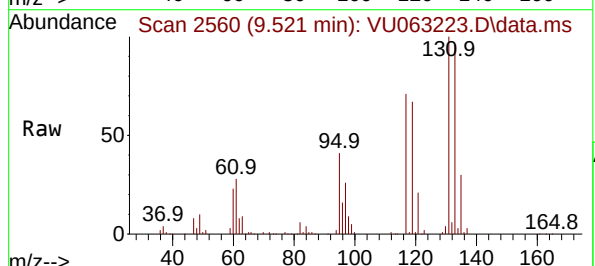
Tgt Ion:131 Resp: 158424

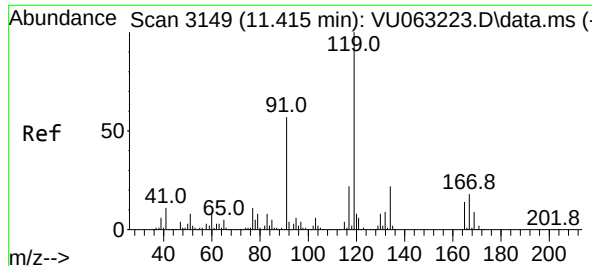
Ion Ratio Lower Upper

131 100

133 95.9 76.7 115.1

119 68.0 54.4 81.6





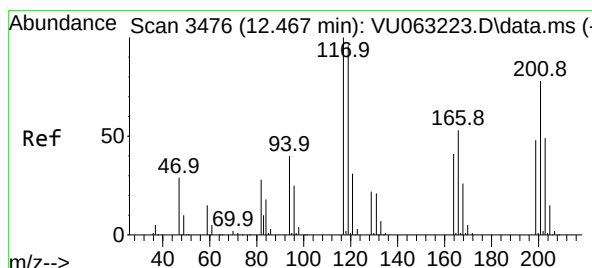
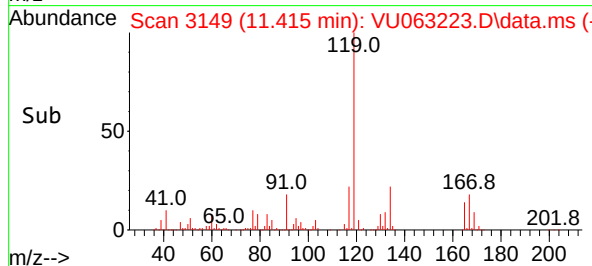
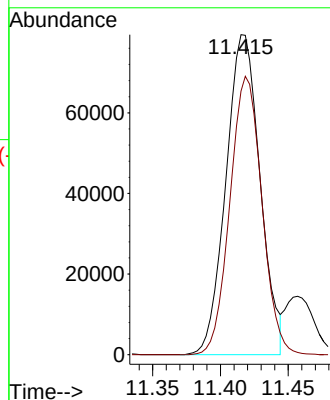
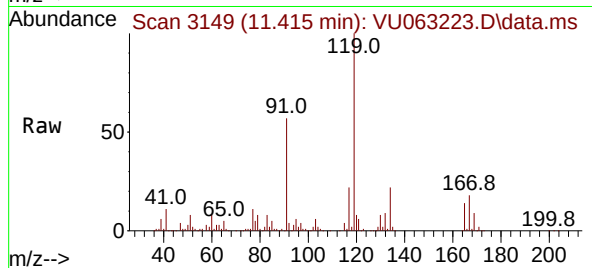
#61
Pentachloroethane
Concen: 10.060 ug/l
RT: 11.415 min Scan# 3149
Delta R.T. 0.000 min
Lab File: VU063223.D
Acq: 10 Feb 2025 15:06

Instrument :
MSVOA_U
ClientSampleId :
VSTDICCC010

Tgt Ion:117 Resp: 139274
Ion Ratio Lower Upper
117 100
167 81.3 65.0 97.6

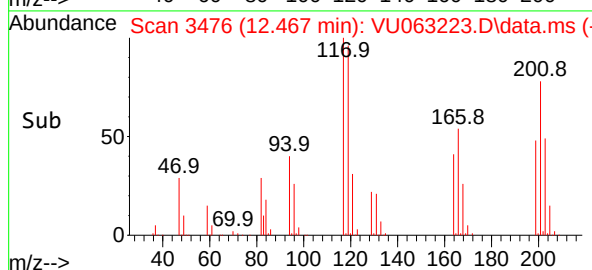
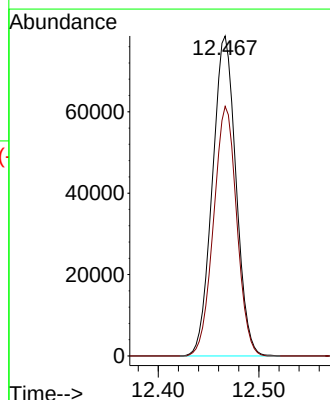
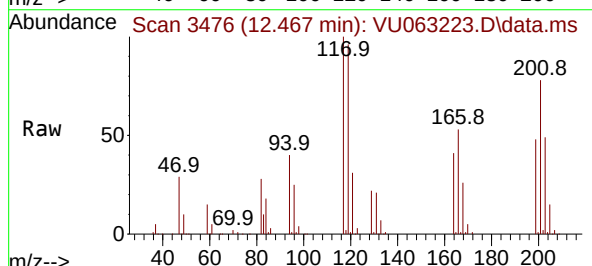
Manual Integrations
APPROVED

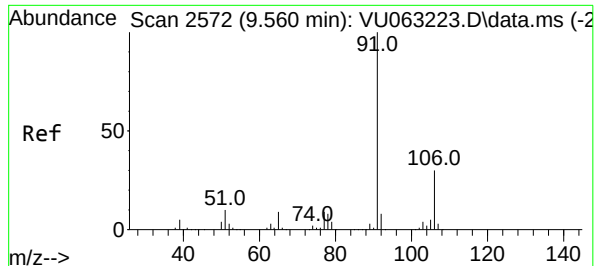
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#62
Hexachloroethane
Concen: 10.465 ug/l
RT: 12.467 min Scan# 3476
Delta R.T. 0.000 min
Lab File: VU063223.D
Acq: 10 Feb 2025 15:06

Tgt Ion:117 Resp: 128179
Ion Ratio Lower Upper
117 100
201 76.6 61.3 91.9





#63

Ethyl Benzene

Concen: 10.912 ug/l

RT: 9.560 min Scan# 2572

Delta R.T. 0.000 min

Lab File: VU063223.D

Acq: 10 Feb 2025 15:06

Instrument :

MSVOA_U

ClientSampleId :

VSTDICCC010

Tgt Ion: 91 Resp: 811424

Ion Ratio Lower Upper

91 100

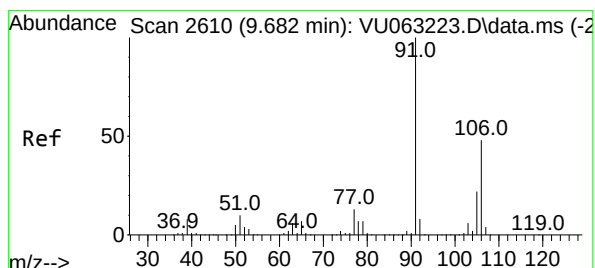
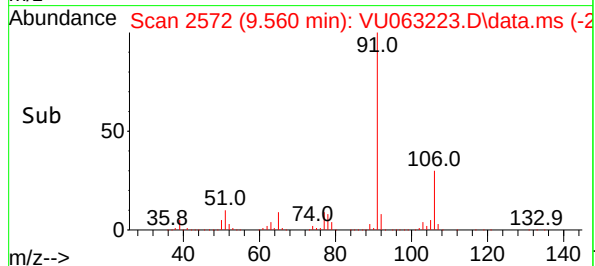
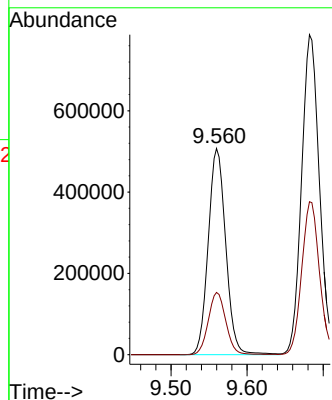
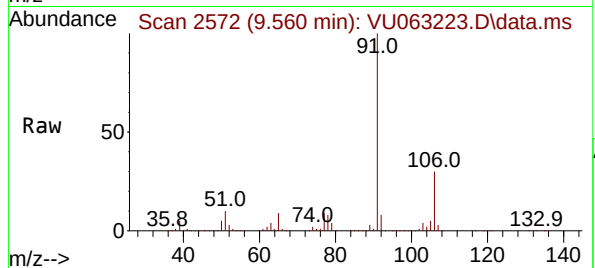
106 30.2 24.2 36.2

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#64

m/p-Xylenes

Concen: 22.300 ug/l

RT: 9.682 min Scan# 2610

Delta R.T. 0.000 min

Lab File: VU063223.D

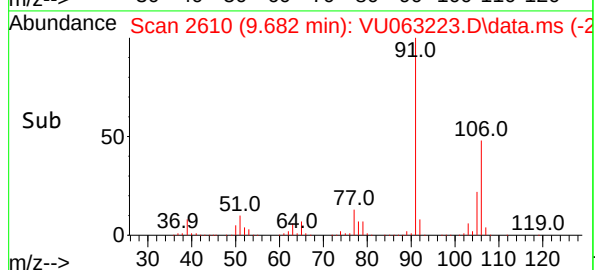
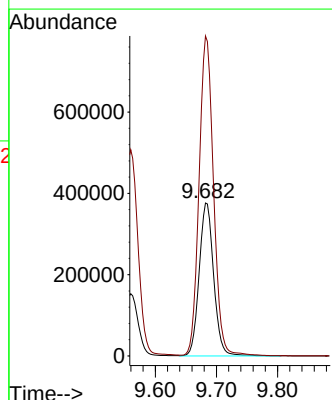
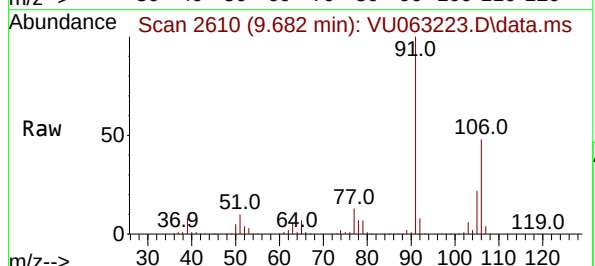
Acq: 10 Feb 2025 15:06

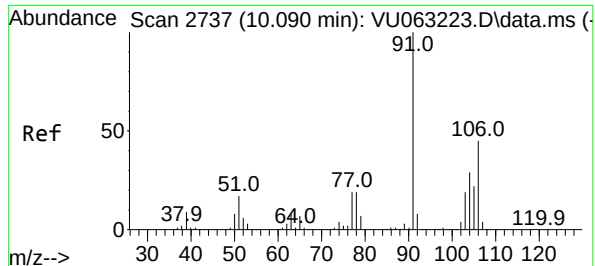
Tgt Ion:106 Resp: 619391

Ion Ratio Lower Upper

106 100

91 208.6 166.9 250.3





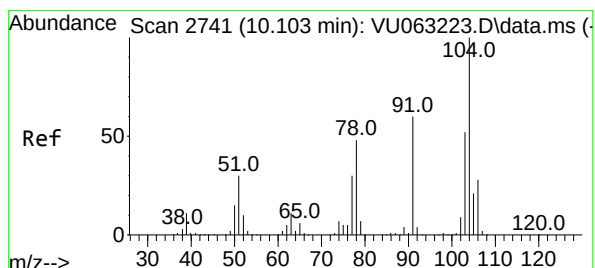
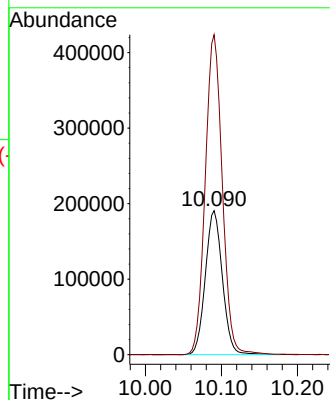
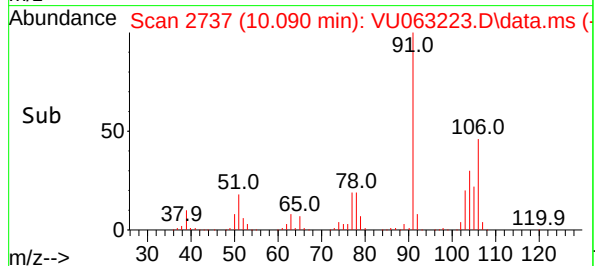
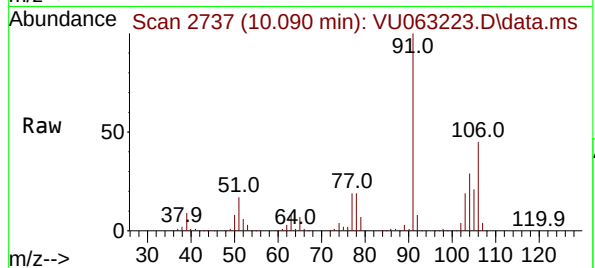
#65
o-Xylene
Concen: 10.934 ug/l
RT: 10.090 min Scan# 2737
Delta R.T. 0.000 min
Lab File: VU063223.D
Acq: 10 Feb 2025 15:06

Instrument :
MSVOA_U
ClientSampleId :
VSTDICCC010

Tgt Ion:106 Resp: 297309
Ion Ratio Lower Upper
106 100
91 221.9 110.9 332.9

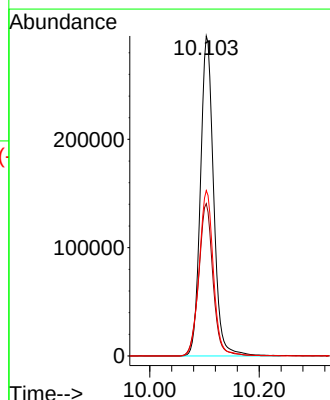
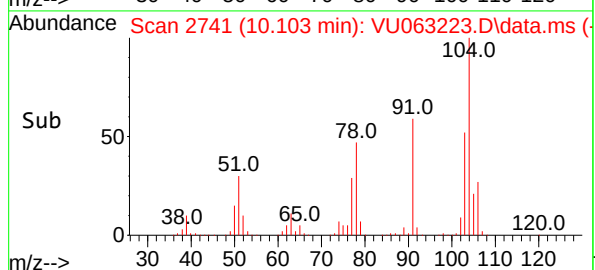
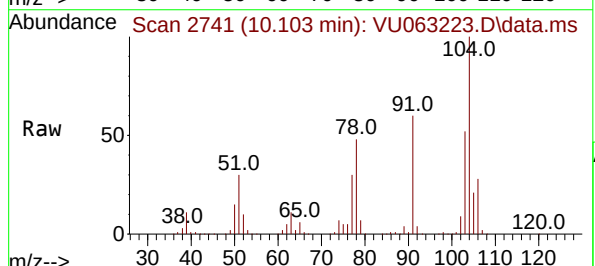
Manual Integrations
APPROVED

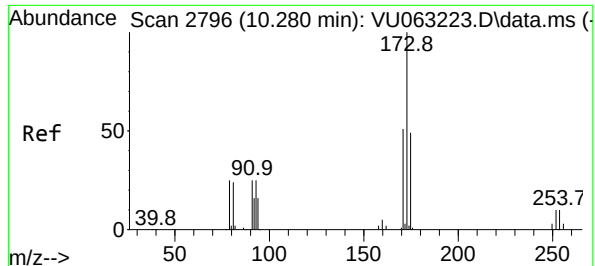
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#66
Styrene
Concen: 11.443 ug/l
RT: 10.103 min Scan# 2741
Delta R.T. 0.000 min
Lab File: VU063223.D
Acq: 10 Feb 2025 15:06

Tgt Ion:104 Resp: 495181
Ion Ratio Lower Upper
104 100
78 51.5 41.2 61.8
103 56.0 44.8 67.2





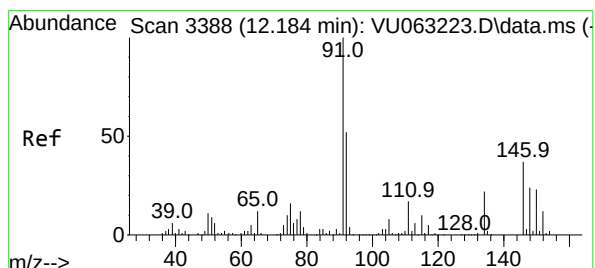
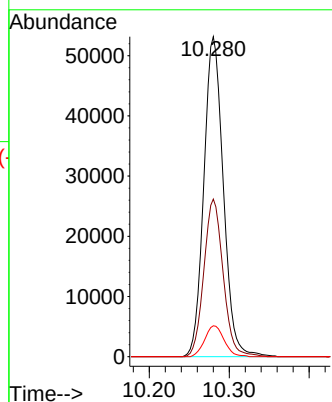
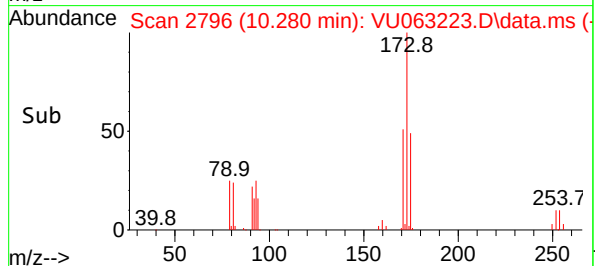
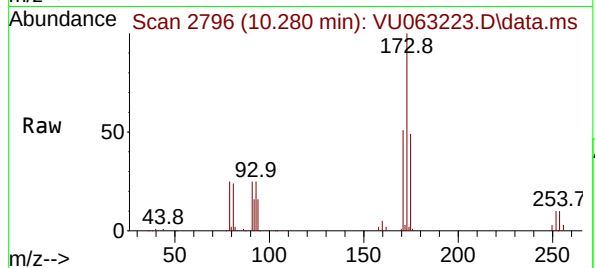
#67
Bromoform
Concen: 10.883 ug/l
RT: 10.280 min Scan# 2796
Delta R.T. 0.000 min
Lab File: VU063223.D
Acq: 10 Feb 2025 15:06

Instrument :
MSVOA_U
ClientSampleId :
VSTDICCC010

Tgt Ion:173 Resp: 90220
Ion Ratio Lower Upper
173 100
175 48.7 39.0 58.4
254 9.6 7.7 11.5

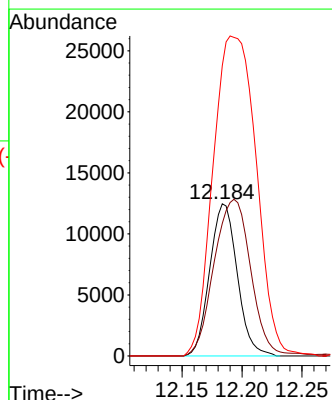
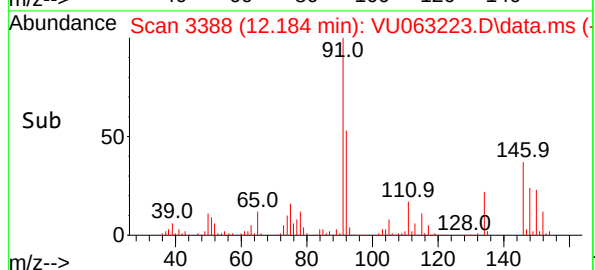
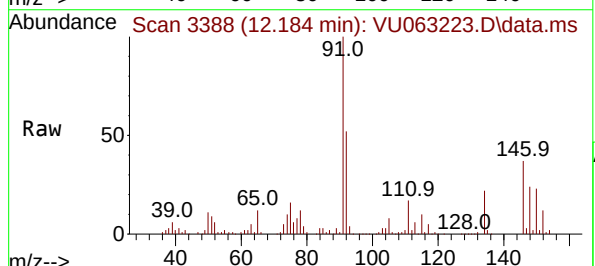
Manual Integrations
APPROVED

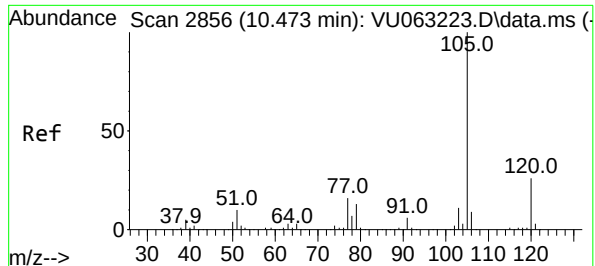
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#68
1,2-Dichlorobenzene-d4
Concen: 1.002 ug/l
RT: 12.184 min Scan# 3388
Delta R.T. 0.000 min
Lab File: VU063223.D
Acq: 10 Feb 2025 15:06

Tgt Ion:152 Resp: 19878
Ion Ratio Lower Upper
152 100
115 137.6 0.0 275.2
150 329.2 0.0 658.4





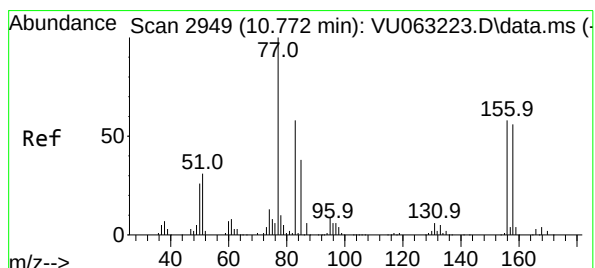
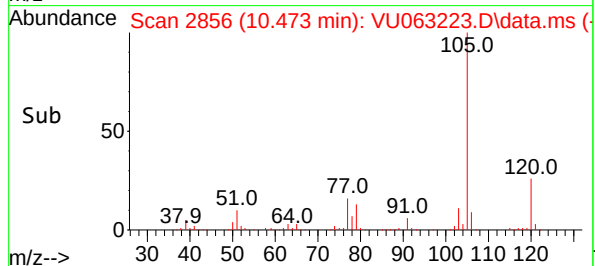
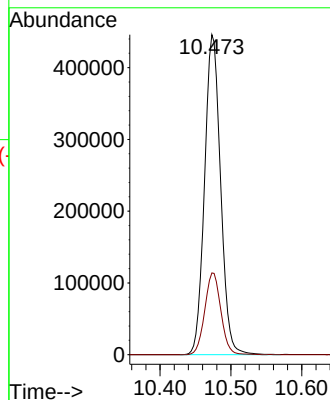
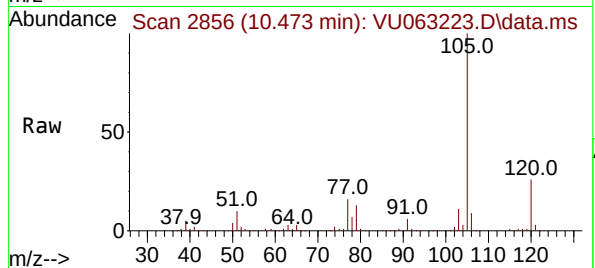
#69
Isopropylbenzene
Concen: 10.963 ug/l
RT: 10.473 min Scan# 2856
Delta R.T. 0.000 min
Lab File: VU063223.D
Acq: 10 Feb 2025 15:06

Instrument :
MSVOA_U
ClientSampleId :
VSTDICCC010

Tgt Ion:105 Resp: 70080
Ion Ratio Lower Upper
105 100
120 25.6 12.8 38.4

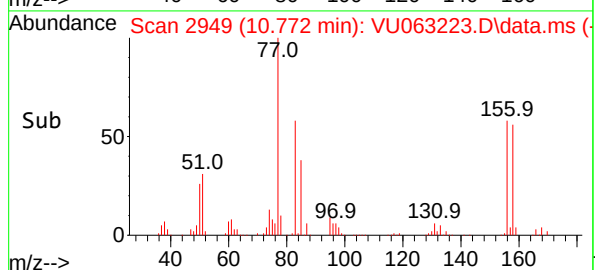
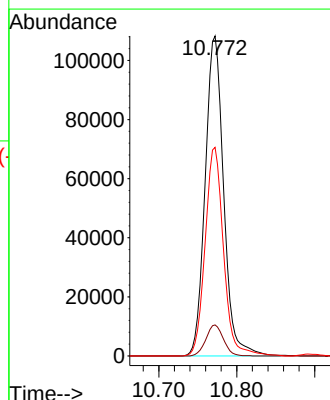
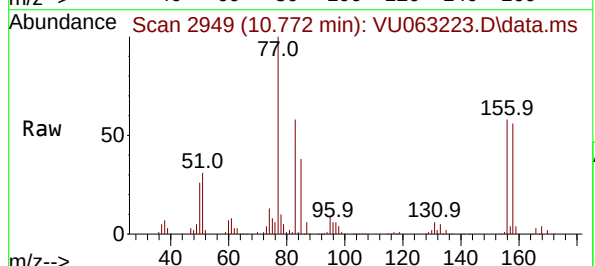
Manual Integrations
APPROVED

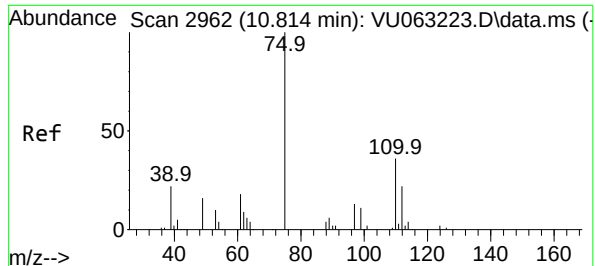
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#70
1,1,2,2-Tetrachloroethane
Concen: 10.464 ug/l
RT: 10.772 min Scan# 2949
Delta R.T. 0.000 min
Lab File: VU063223.D
Acq: 10 Feb 2025 15:06

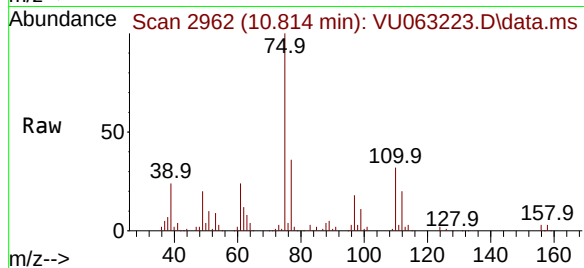
Tgt Ion: 83 Resp: 179045
Ion Ratio Lower Upper
83 100
131 9.2 7.4 11.0
85 64.8 51.8 77.8





#71
1,2,3-Trichloropropane
Concen: 9.083 ug/l m
RT: 10.814 min Scan# 2962
Delta R.T. 0.000 min
Lab File: VU063223.D
Acq: 10 Feb 2025 15:06

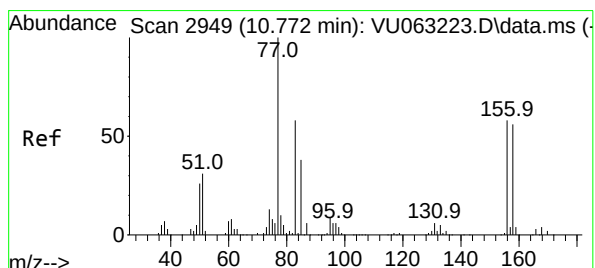
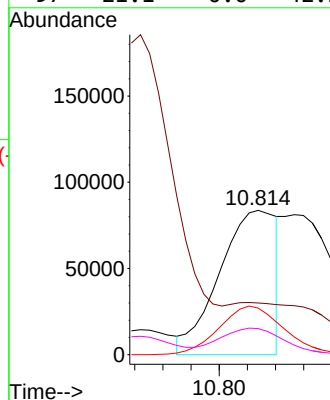
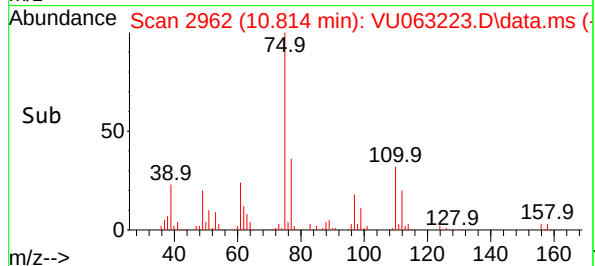
Instrument :
MSVOA_U
ClientSampleId :
VSTDICCC010



Tgt Ion: 75 Resp: 117848
Ion Ratio Lower Upper
75 100
77 0.0 0.0 0.0
110 38.5 0.0 77.0
97 21.1 0.0 42.2

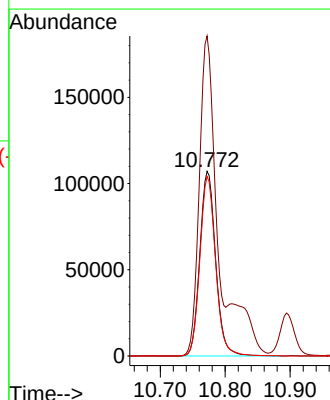
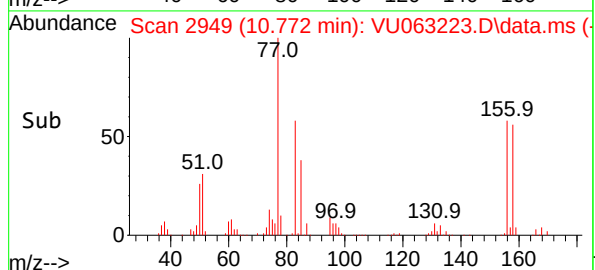
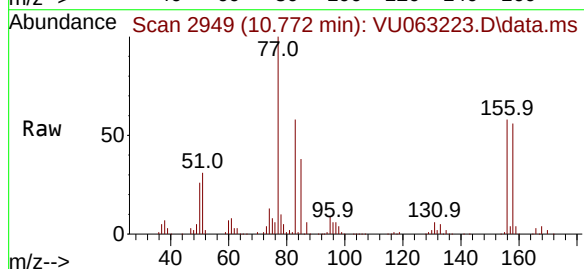
Manual Integrations
APPROVED

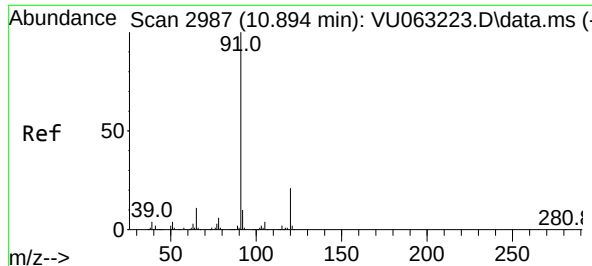
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#72
Bromobenzene
Concen: 10.554 ug/l
RT: 10.772 min Scan# 2949
Delta R.T. 0.000 min
Lab File: VU063223.D
Acq: 10 Feb 2025 15:06

Tgt Ion:156 Resp: 181776
Ion Ratio Lower Upper
156 100
77 171.8 0.0 343.6
158 96.5 0.0 193.0





#73

n-propylbenzene

Concen: 11.189 ug/l

RT: 10.894 min Scan# 2987

Delta R.T. 0.000 min

Lab File: VU063223.D

Acq: 10 Feb 2025 15:06

Instrument :

MSVOA_U

ClientSampleId :

VSTDICCC010

Tgt Ion:120 Resp: 204779

Ion Ratio Lower Upper

120 100

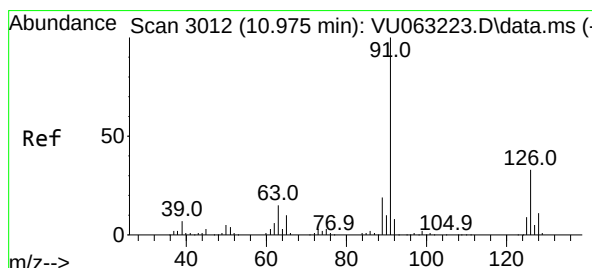
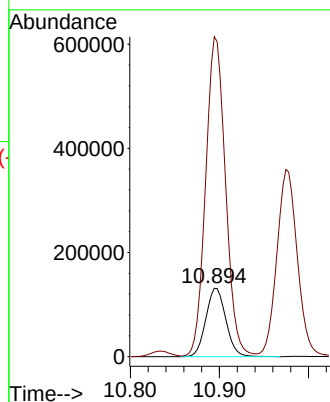
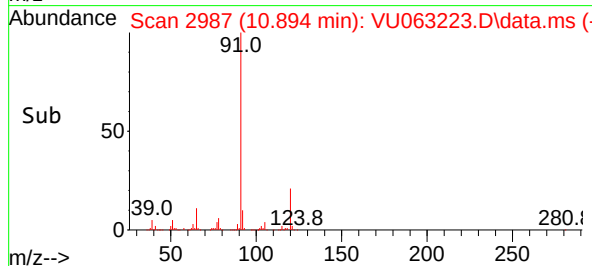
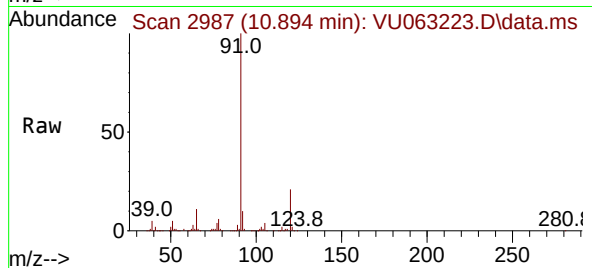
91 462.2 369.8 554.6

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#74

2-Chlorotoluene

Concen: 10.829 ug/l

RT: 10.975 min Scan# 3012

Delta R.T. 0.000 min

Lab File: VU063223.D

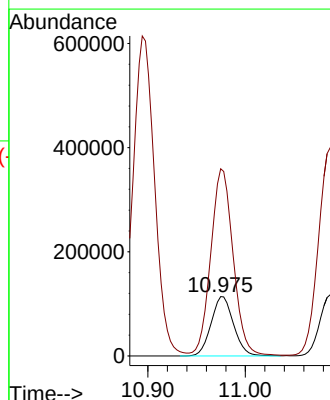
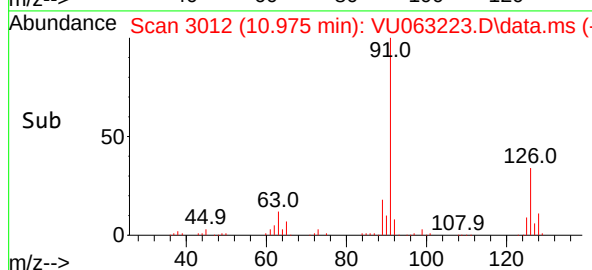
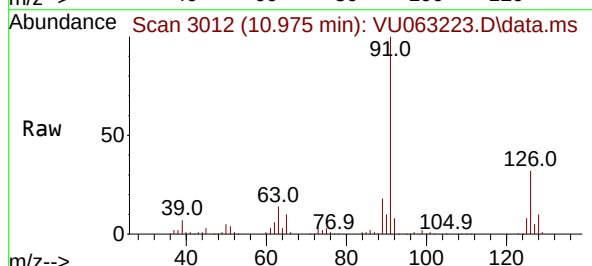
Acq: 10 Feb 2025 15:06

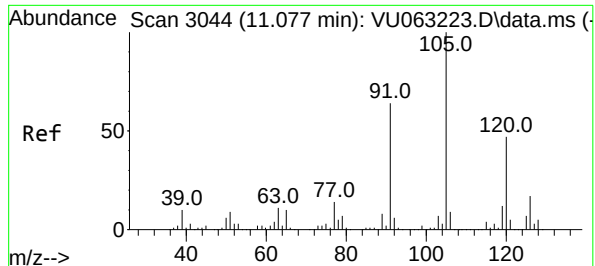
Tgt Ion:126 Resp: 182649

Ion Ratio Lower Upper

126 100

91 311.9 0.0 623.8





#75

1,3,5-Trimethylbenzene

Concen: 11.211 ug/l

RT: 11.077 min Scan# 3044

Delta R.T. 0.000 min

Lab File: VU063223.D

Acq: 10 Feb 2025 15:06

Instrument :

MSVOA_U

ClientSampleId :

VSTDICCC010

Tgt Ion:105 Resp: 664048

Ion Ratio Lower Upper

105 100

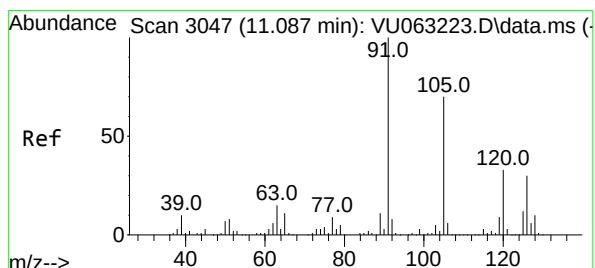
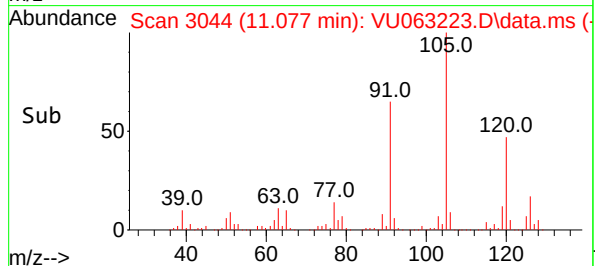
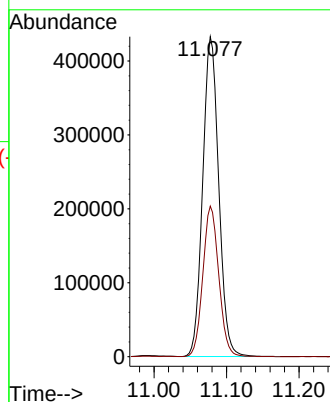
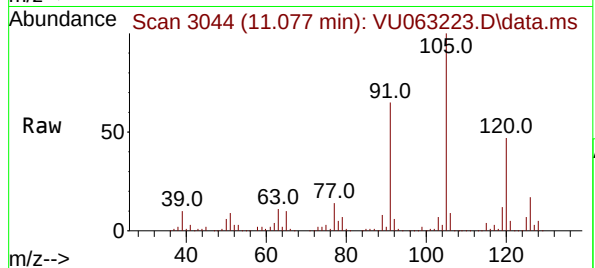
120 46.6 37.3 55.9

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#76

4-Chlorotoluene

Concen: 10.745 ug/l

RT: 11.087 min Scan# 3047

Delta R.T. 0.000 min

Lab File: VU063223.D

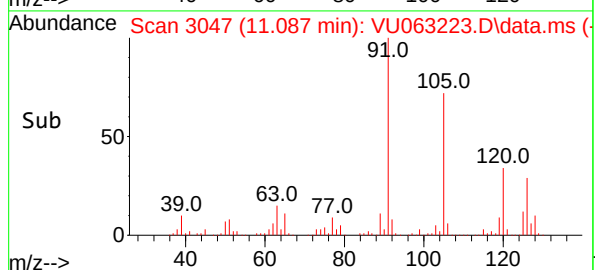
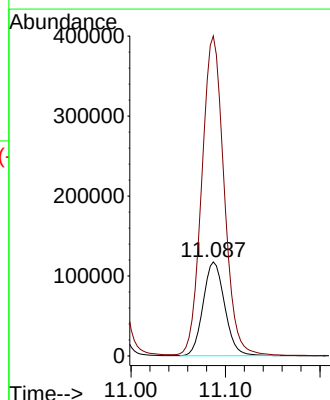
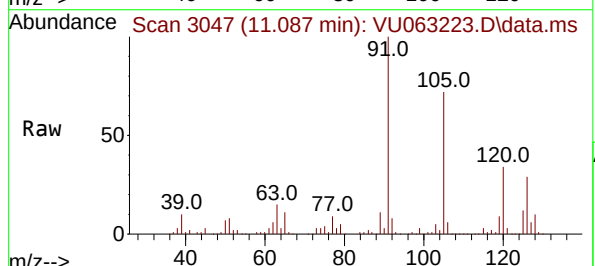
Acq: 10 Feb 2025 15:06

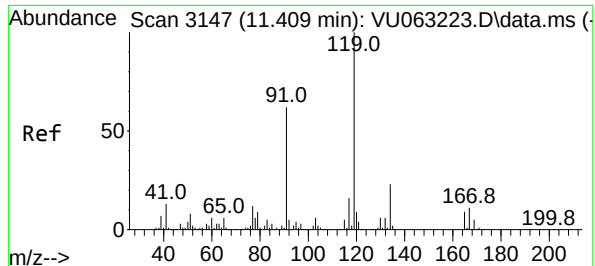
Tgt Ion:126 Resp: 185864

Ion Ratio Lower Upper

126 100

91 351.8 0.0 703.6





#77

tert-Butylbenzene

Concen: 10.791 ug/l

RT: 11.409 min Scan# 3147

Delta R.T. 0.000 min

Lab File: VU063223.D

Acq: 10 Feb 2025 15:06

Instrument :

MSVOA_U

ClientSampleId :

VSTDICCC010

Tgt Ion:119 Resp: 646430

Ion Ratio Lower Upper

119 100

91 58.9 29.4 88.3

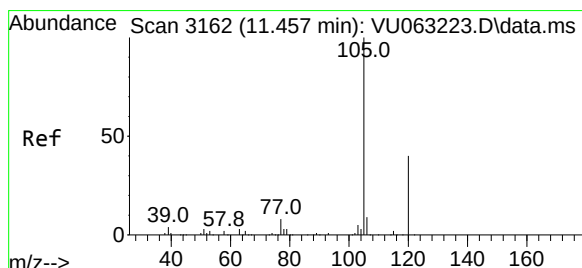
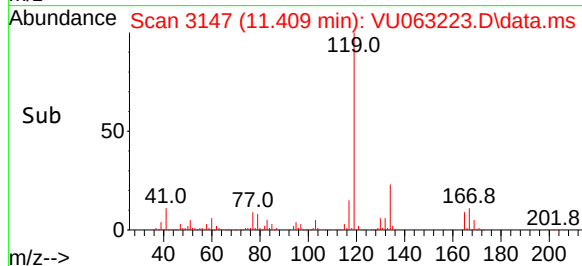
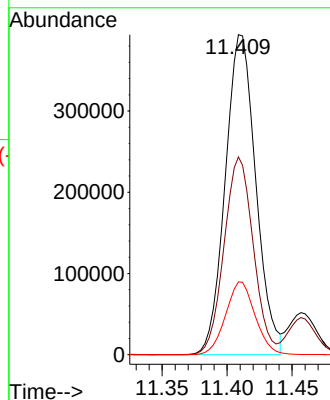
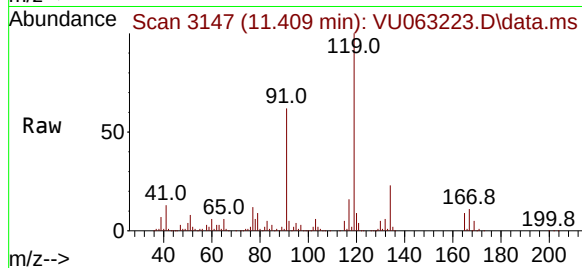
134 22.0 17.6 26.4

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#78

1,2,4-Trimethylbenzene

Concen: 11.382 ug/l

RT: 11.457 min Scan# 3162

Delta R.T. 0.000 min

Lab File: VU063223.D

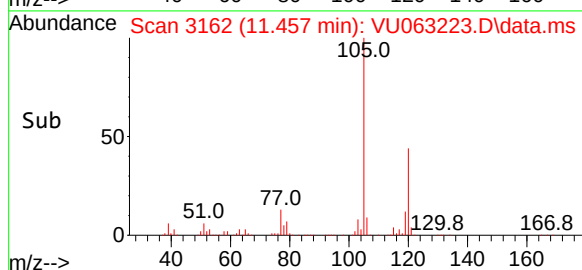
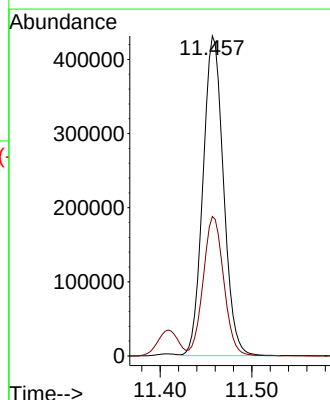
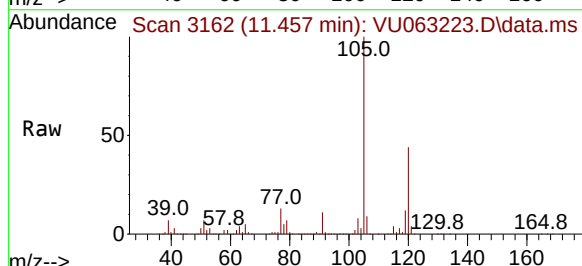
Acq: 10 Feb 2025 15:06

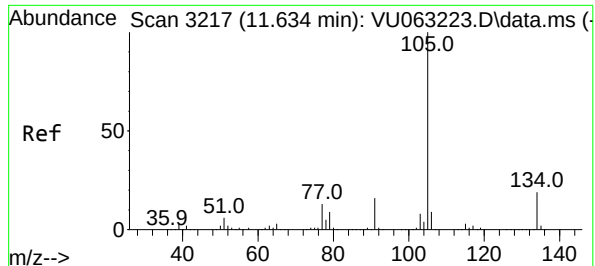
Tgt Ion:105 Resp: 668930

Ion Ratio Lower Upper

105 100

120 43.8 21.9 65.7





#79

sec-Butylbenzene

Concen: 10.932 ug/l

RT: 11.634 min Scan# 3217

Delta R.T. 0.000 min

Lab File: VU063223.D

Acq: 10 Feb 2025 15:06

Instrument :

MSVOA_U

ClientSampleId :

VSTDICCC010

Tgt Ion:105 Resp: 833792

Ion Ratio Lower Upper

105 100

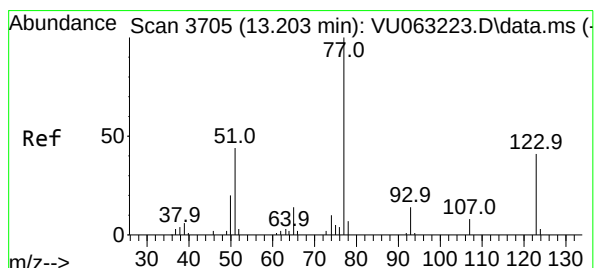
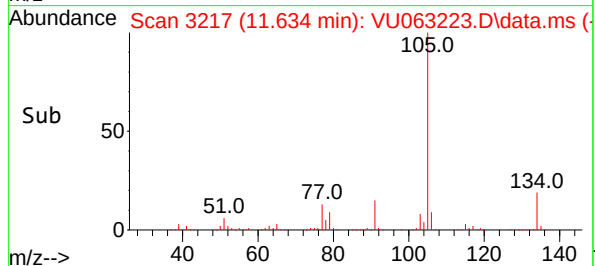
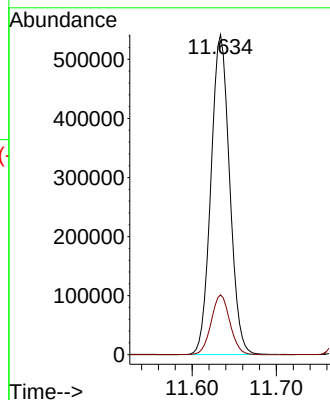
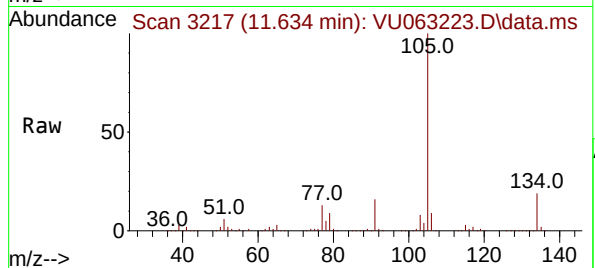
134 18.9 15.1 22.7

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#80

Nitrobenzene

Concen: 50.821 ug/l

RT: 13.203 min Scan# 3705

Delta R.T. 0.000 min

Lab File: VU063223.D

Acq: 10 Feb 2025 15:06

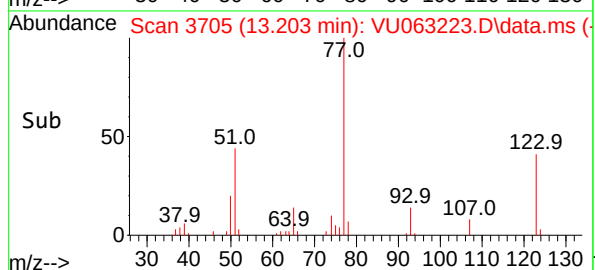
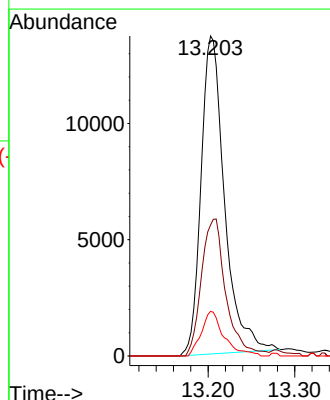
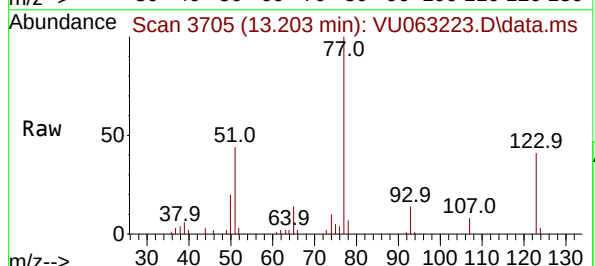
Tgt Ion: 77 Resp: 25795

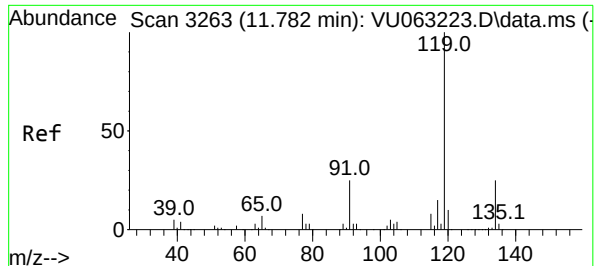
Ion Ratio Lower Upper

77 100

123 43.0 18.9 67.1

65 13.5 11.9 15.1





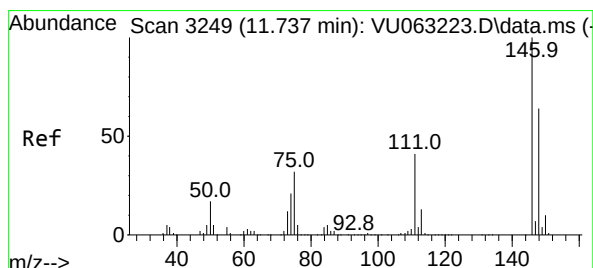
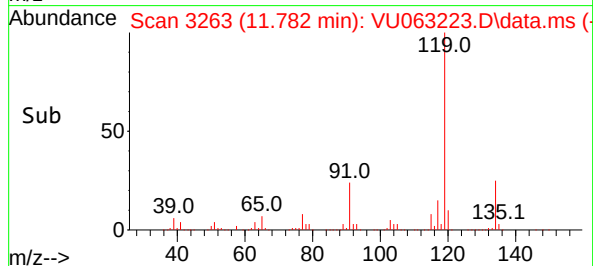
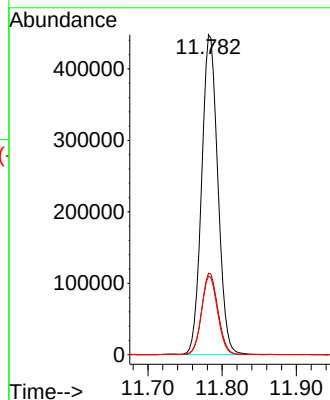
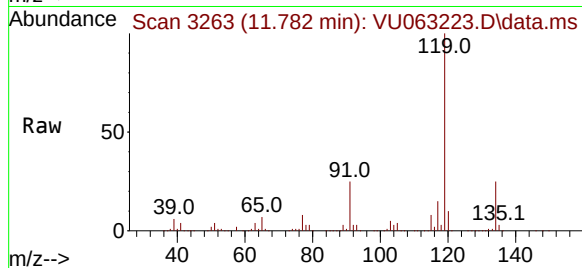
#81
p-Isopropyltoluene
Concen: 11.219 ug/l
RT: 11.782 min Scan# 3263
Delta R.T. 0.000 min
Lab File: VU063223.D
Acq: 10 Feb 2025 15:06

Instrument :
MSVOA_U
ClientSampleId :
VSTDICCC010

Tgt Ion:119 Resp: 675304
Ion Ratio Lower Upper
119 100
134 25.4 20.3 30.5
91 24.3 19.4 29.2

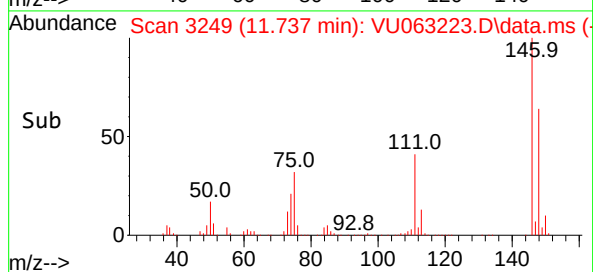
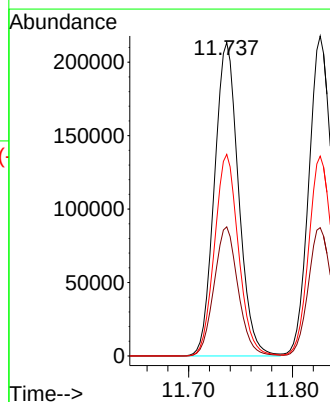
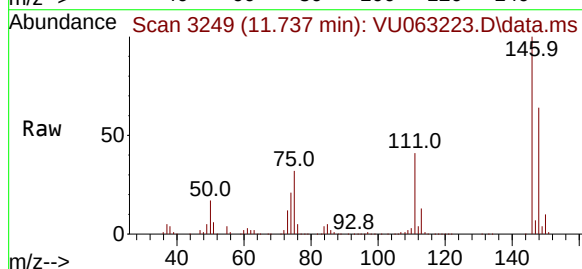
Manual Integrations
APPROVED

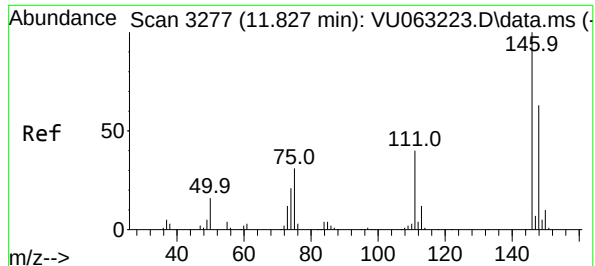
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#82
1,3-Dichlorobenzene
Concen: 10.314 ug/l
RT: 11.737 min Scan# 3249
Delta R.T. 0.000 min
Lab File: VU063223.D
Acq: 10 Feb 2025 15:06

Tgt Ion:146 Resp: 344574
Ion Ratio Lower Upper
146 100
111 41.0 32.8 49.2
148 63.9 51.1 76.7





#83

1,4-Dichlorobenzene

Concen: 10.638 ug/l

RT: 11.827 min Scan# 3277

Delta R.T. 0.000 min

Lab File: VU063223.D

Acq: 10 Feb 2025 15:06

Instrument :

MSVOA_U

ClientSampleId :

VSTDICCC010

Tgt Ion:146 Resp: 347610

Ion Ratio Lower Upper

146 100

111 40.1 32.1 48.1

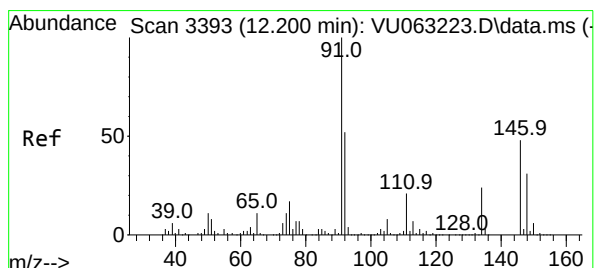
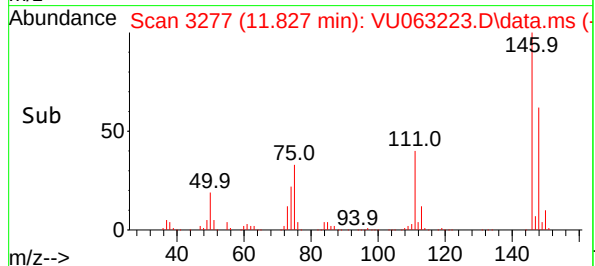
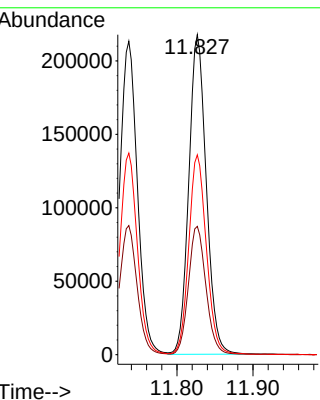
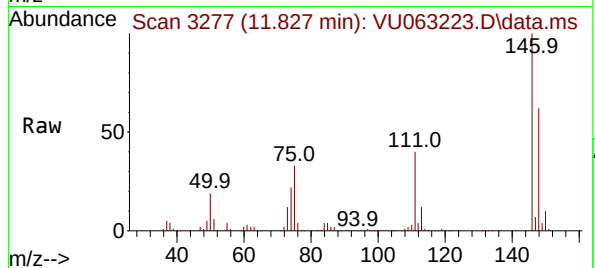
148 62.8 50.2 75.4

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#84

n-Butylbenzene

Concen: 11.122 ug/l

RT: 12.200 min Scan# 3393

Delta R.T. 0.000 min

Lab File: VU063223.D

Acq: 10 Feb 2025 15:06

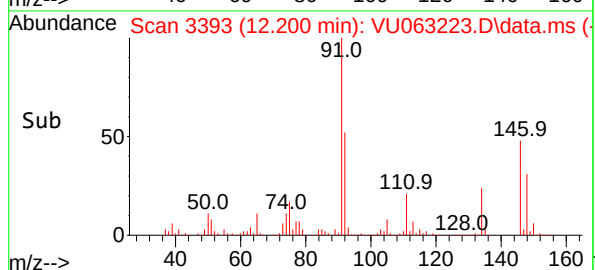
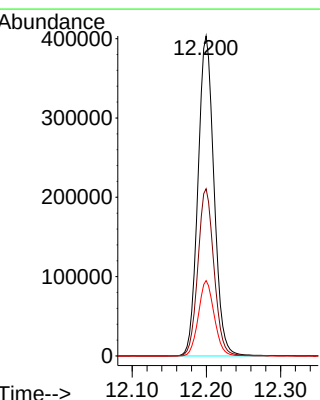
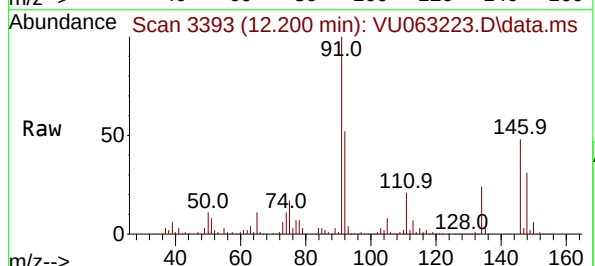
Tgt Ion: 91 Resp: 603657

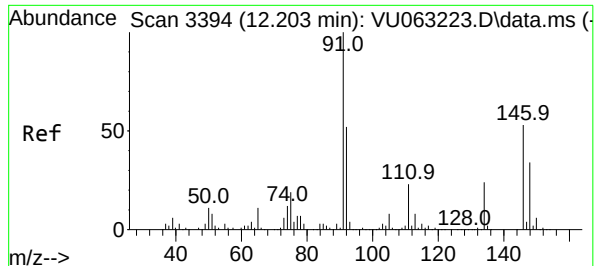
Ion Ratio Lower Upper

91 100

92 52.3 41.8 62.8

134 23.3 18.6 28.0





#85

1,2-Dichlorobenzene

Concen: 10.342 ug/l

RT: 12.203 min Scan# 3394

Delta R.T. 0.000 min

Lab File: VU063223.D

Acq: 10 Feb 2025 15:06

Instrument :

MSVOA_U

ClientSampleId :

VSTDICCC010

Tgt Ion:146 Resp: 33201

Ion Ratio Lower Upper

146 100

111 43.8 21.9 65.7

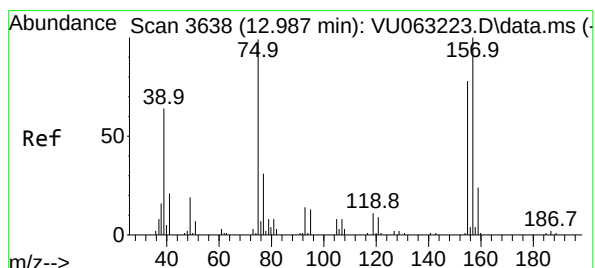
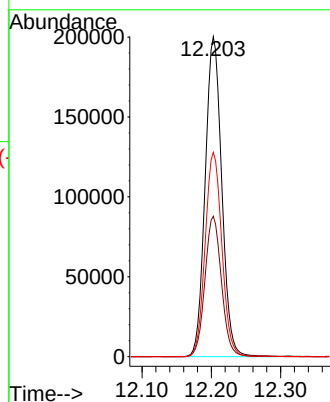
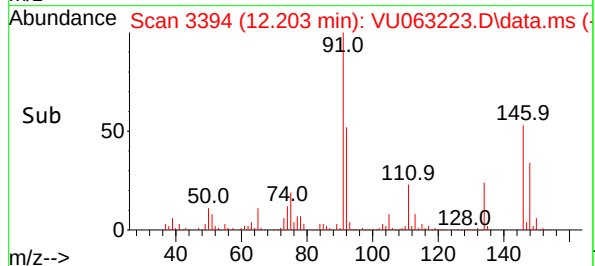
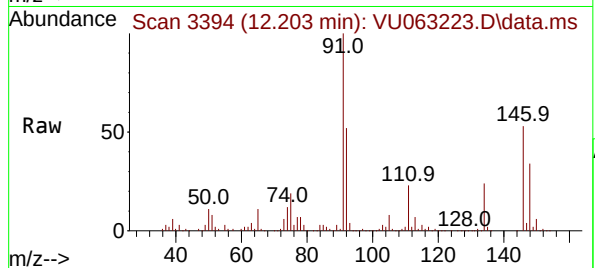
148 64.6 32.3 96.9

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#86

1,2-Dibromo-3-Chloropropane

Concen: 11.713 ug/l

RT: 12.987 min Scan# 3638

Delta R.T. 0.000 min

Lab File: VU063223.D

Acq: 10 Feb 2025 15:06

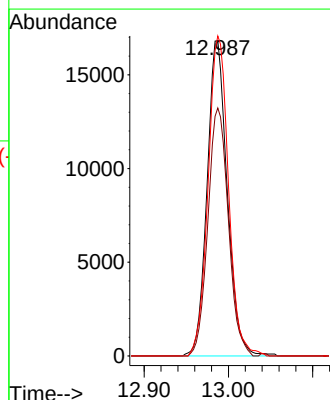
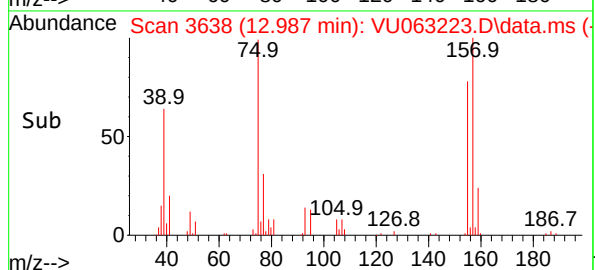
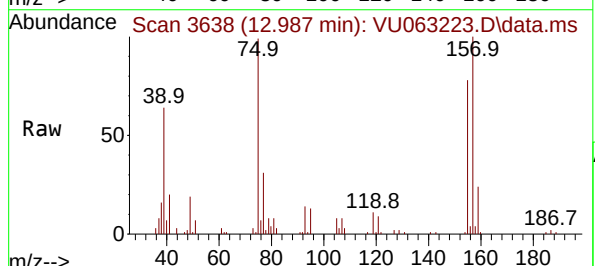
Tgt Ion: 75 Resp: 28133

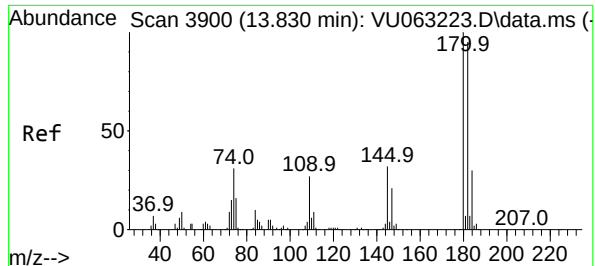
Ion Ratio Lower Upper

75 100

155 79.4 63.5 95.3

157 102.2 81.8 122.6





#87

1,2,4-Trichlorobenzene

Concen: 11.361 ug/l

RT: 13.830 min Scan# 3900

Delta R.T. 0.000 min

Lab File: VU063223.D

Acq: 10 Feb 2025 15:06

Instrument :

MSVOA_U

ClientSampleId :

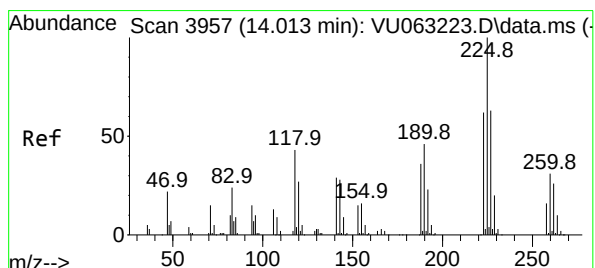
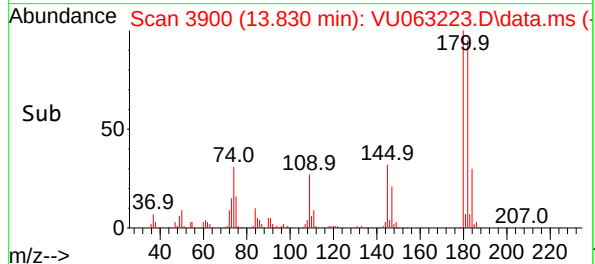
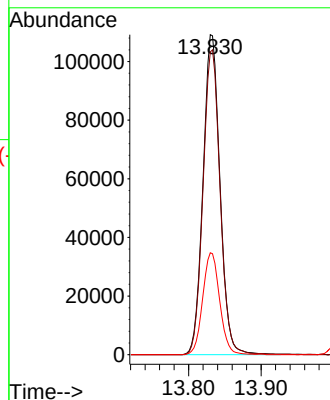
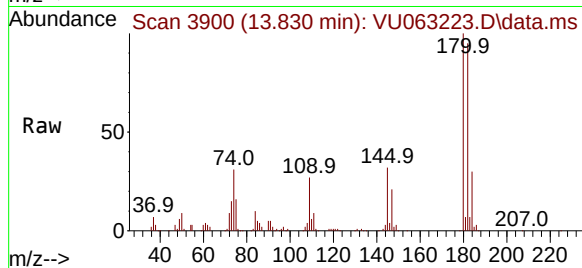
VSTDICCC010

Tgt Ion:	180	Resp:	17789
Ion Ratio	Lower	Upper	
180	100		
182	95.8	76.6	115.0
145	31.8	25.4	38.2

Manual Integrations
APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#88

Hexachlorobutadiene

Concen: 9.389 ug/l

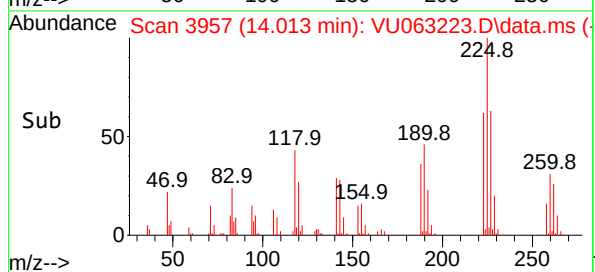
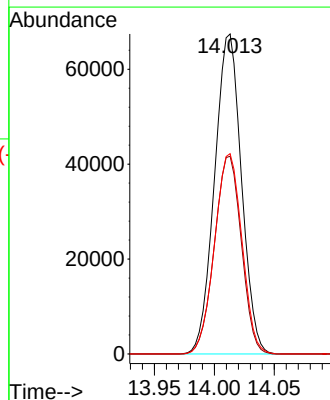
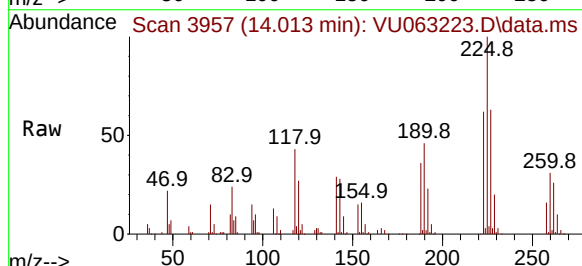
RT: 14.013 min Scan# 3957

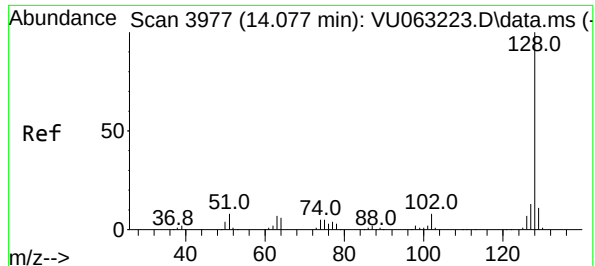
Delta R.T. 0.000 min

Lab File: VU063223.D

Acq: 10 Feb 2025 15:06

Tgt Ion:	225	Resp:	105064
Ion Ratio	Lower	Upper	
225	100		
223	61.9	49.5	74.3
227	63.7	51.0	76.4





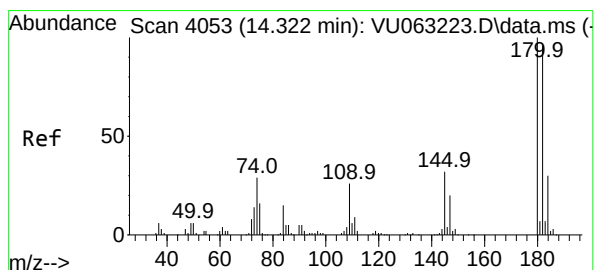
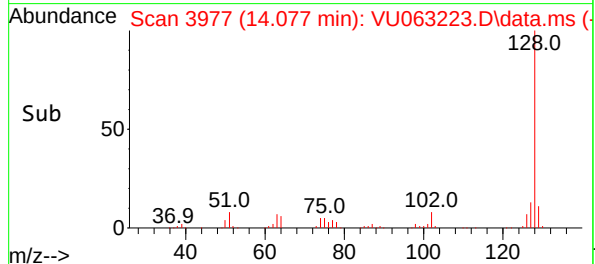
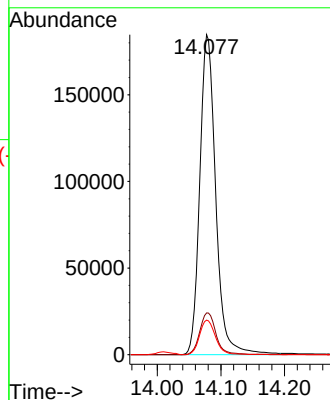
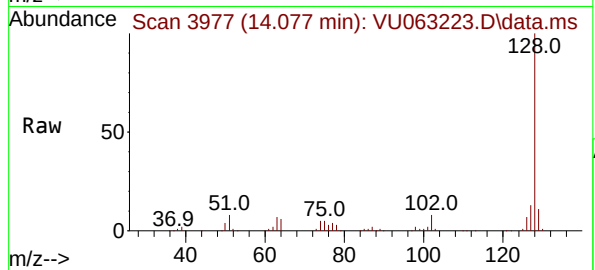
#89
Naphthalene
Concen: 9.843 ug/l
RT: 14.077 min Scan# 3977
Delta R.T. 0.000 min
Lab File: VU063223.D
Acq: 10 Feb 2025 15:06

Instrument :
MSVOA_U
ClientSampleId :
VSTDICCC010

Tgt Ion:128 Resp: 32160
Ion Ratio Lower Upper
128 100
127 13.3 10.6 16.0
129 10.8 8.6 13.0

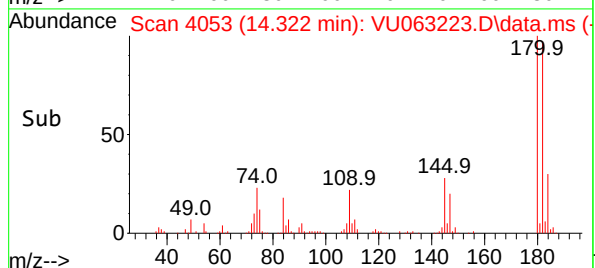
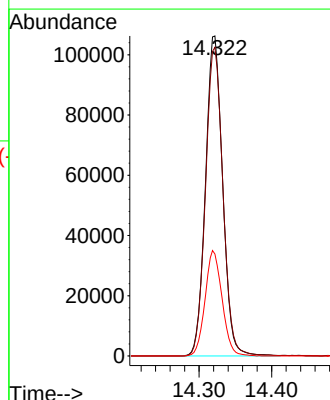
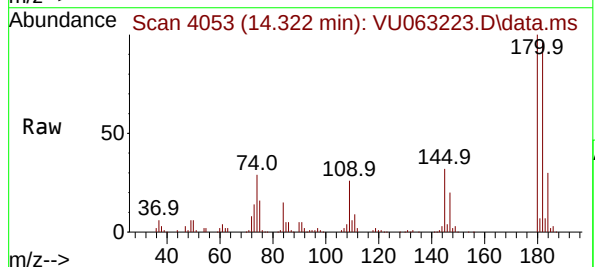
Manual Integrations
APPROVED

Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#90
1,2,3-Trichlorobenzene
Concen: 11.421 ug/l
RT: 14.322 min Scan# 4053
Delta R.T. 0.000 min
Lab File: VU063223.D
Acq: 10 Feb 2025 15:06

Tgt Ion:180 Resp: 174986
Ion Ratio Lower Upper
180 100
182 97.7 78.2 117.2
145 32.6 26.1 39.1



Data Path : Z:\voasrv\HPCHEM1\MSVOA_U\Data\VU021025\
 Data File : VU063224.D
 Acq On : 10 Feb 2025 15:33
 Operator : MD/SY
 Sample : VSTDICC015
 Misc : 25.0mL/MSVOA_U/WATER
 ALS Vial : 8 Sample Multiplier: 1

Instrument :
 MSVOA_U
 ClientSampleId :
 VSTDICC015

Manual Integrations APPROVED

Reviewed By :Amit Patel 02/12/2025
 Supervised By :Mahesh Dadoda 02/12/2025

Quant Time: Feb 11 04:01:03 2025
 Quant Method : Z:\voasrv\HPCHEM1\MSVOA_U\Method\524U021025DW.M
 Quant Title : METHOD 524.2 VOLATILES DRINKING WATER
 QLast Update : Tue Feb 11 03:56:39 2025
 Response via : Initial Calibration

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

Internal Standards						
1) Fluorobenzene	6.103	96	58075	1.000	ug/l	# 0.00
System Monitoring Compounds						
57) 4-Bromofluorobenzene	10.624	95	20689	1.080	ug/l	0.00
Spiked Amount	1.000		Recovery	=	108.000%	
68) 1,2-Dichlorobenzene-d4	12.184	152	22516	1.130	ug/l	0.00
Spiked Amount	1.000		Recovery	=	113.000%	
Target Compounds						
					Qvalue	
2) Dichlorodifluoromethane	1.377	85	263402	13.960	ug/l	100
3) Chloromethane	1.515	50	300062	13.809	ug/l	97
4) Vinyl Chloride	1.596	62	311009	14.466	ug/l	100
6) Chloroethane	1.904	64	188210	13.899	ug/l	99
7) Trichlorofluoromethane	2.116	101	362692	14.236	ug/l	100
8) 1,1,2-Trichloro-1,2,2-...	2.563	101	200170	13.842	ug/l	99
9) 1,1-Dichloroethene	2.560	96	210091	14.259	ug/l	98
10) Iodomethane	2.705	142	329697	14.234	ug/l	99
11) Allyl Chloride	2.904	41	311245	14.705	ug/l	100
12) Acrylonitrile	3.300	53	102914	30.731	ug/l	99
13) Acetone	2.612	43	172446	65.992	ug/l	100
14) Carbon Disulfide	2.776	76	716395	13.906	ug/l	100
15) Methylene Chloride	3.026	84	251659	13.825	ug/l	99
16) trans-1,2-Dichloroethene	3.335	96	242715	14.434	ug/l	98
17) 1,1-Dichloroethane	3.846	63	453378	14.304	ug/l	100
18) 2-Butanone	4.685	43	304814	72.208	ug/l	99
19) Cyclohexane	5.370	56	400586m	15.729	ug/l	
20) Methylcyclohexane	6.750	83	398925	15.795	ug/l	99
21) 2,2-Dichloropropane	4.644	77	354900	14.352	ug/l	100
22) cis-1,2-Dichloroethene	4.647	96	270006	14.861	ug/l	100
23) Diethyl Ether	2.364	59	177089	14.007	ug/l	100
24) tert-Butyl Alcohol	3.177	59	185785	146.971	ug/l	100
25) Methyl tert-Butyl Ether	3.348	73	553339	15.037	ug/l	99
26) Bromochloromethane	4.952	128	113229	14.257	ug/l	98
27) Chloroform	5.071	83	457911	14.316	ug/l	100
28) 1,1,1-Trichloroethane	5.300	97	373842	14.428	ug/l	99
29) 1,1-Dichloropropene	5.509	75	347711	14.983	ug/l	99
30) Carbon Tetrachloride	5.509	117	321059	14.448	ug/l	99
31) Isopropyl Ether	3.975	45	703540	15.547	ug/l	98
32) Ethyl-t-butyl ether	4.483	59	649553	15.784	ug/l	99
33) Tert-Amyl methyl ether	5.923	73	575729	16.013	ug/l	100
34) Propionitrile	4.753	54	103055	78.746	ug/l	99
35) Benzene	5.756	78	1044796	14.641	ug/l	99
36) 1,2-Dichloroethane	5.775	62	291840	14.170	ug/l	100
37) Trichloroethene	6.528	130	244774	14.424	ug/l	100
38) 1,2-Dichloropropane	6.775	63	273676	14.653	ug/l	99
39) Methacrylonitrile	4.956	41	79040	16.908	ug/l	99
40) Methyl acrylate	4.830	55	133276	15.616	ug/l	99
41) Tetrahydrofuran	5.036	42	79845	29.065	ug/l	99
42) 1-Chlorobutane	5.441	56	481169	15.153	ug/l	99
43) Dibromomethane	6.904	93	133485	14.114	ug/l	98
44) Bromodichloromethane	7.090	83	323143	14.680	ug/l	99
45) 4-Methyl-2-Pentanone	7.779	43	794494	80.129	ug/l	99

Data Path : Z:\voasrv\HPCHEM1\MSVOA_U\Data\VU021025\
 Data File : VU063224.D
 Acq On : 10 Feb 2025 15:33
 Operator : MD/SY
 Sample : VSTDICC015
 Misc : 25.0mL/MSVOA_U/WATER
 ALS Vial : 8 Sample Multiplier: 1

Instrument :
 MSVOA_U
 ClientSampleId :
 VSTDICC015

Manual Integrations
 APPROVED

Reviewed By :Amit Patel 02/12/2025
 Supervised By :Mahesh Dadoda 02/12/2025

Quant Time: Feb 11 04:01:03 2025
 Quant Method : Z:\voasrv\HPCHEM1\MSVOA_U\Method\524U021025DW.M
 Quant Title : METHOD 524.2 VOLATILES DRINKING WATER
 QLast Update : Tue Feb 11 03:56:39 2025
 Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
46) t-1,4-Dichloro-2-butene	10.827	75	143327m	29.213	ug/l	
47) Methyl methacrylate	6.946	69	256757	32.232	ug/l	100
48) Ethyl methacrylate	8.322	69	257931	17.244	ug/l	100
49) Toluene	7.955	92	638079	15.549	ug/l	100
50) t-1,3-Dichloropropene	8.197	75	320246	15.891	ug/l	98
51) cis-1,3-Dichloropropene	7.595	75	386542	15.527	ug/l	99
52) 1,1,2-Trichloroethane	8.386	97	186154	14.598	ug/l	98
53) 1,3-Dichloropropane	8.563	76	330381	14.594	ug/l	99
54) 2-Hexanone	8.672	43	557608	82.409	ug/l	99
55) Dibromochloromethane	8.798	129	219151	14.939	ug/l	97
56) 1,2-Dibromoethane	8.910	107	178579	14.932	ug/l	99
58) Tetrachloroethene	8.541	164	195759	13.998	ug/l	99
59) Chlorobenzene	9.434	112	659996	15.241	ug/l	100
60) 1,1,1,2-Tetrachloroethane	9.521	131	233573	15.005	ug/l	99
61) Pentachloroethane	11.415	117	217502	15.642	ug/l	100
62) Hexachloroethane	12.463	117	202372	16.451	ug/l	100
63) Ethyl Benzene	9.560	91	1218926	16.321	ug/l	99
64) m/p-Xylenes	9.682	106	919492	32.960	ug/l	99
65) o-Xylene	10.090	106	447318	16.379	ug/l	100
66) Styrene	10.103	104	750530	17.269	ug/l	100
67) Bromoform	10.280	173	131670	15.814	ug/l	99
69) Isopropylbenzene	10.473	105	1068251	16.638	ug/l	100
70) 1,1,2,2-Tetrachloroethane	10.769	83	264258	15.376	ug/l	100
71) 1,2,3-Trichloropropane	10.814	75	200210m	15.363	ug/l	
72) Bromobenzene	10.772	156	273315	15.799	ug/l	99
73) n-propylbenzene	10.894	120	312734	17.012	ug/l	100
74) 2-Chlorotoluene	10.975	126	279514	16.499	ug/l	98
75) 1,3,5-Trimethylbenzene	11.077	105	1018594	17.122	ug/l	100
76) 4-Chlorotoluene	11.087	126	284996	16.404	ug/l	100
77) tert-Butylbenzene	11.409	119	1004388	16.693	ug/l	100
78) 1,2,4-Trimethylbenzene	11.457	105	1038794	17.598	ug/l	99
79) sec-Butylbenzene	11.630	105	1305019	17.036	ug/l	100
80) Nitrobenzene	13.200	77	39246	75.007	ug/l	99
81) p-Isopropyltoluene	11.782	119	1064335	17.605	ug/l	100
82) 1,3-Dichlorobenzene	11.733	146	532282	15.863	ug/l	99
83) 1,4-Dichlorobenzene	11.827	146	537516	16.378	ug/l	99
84) n-Butylbenzene	12.196	91	994690	18.246	ug/l	100
85) 1,2-Dichlorobenzene	12.200	146	526346	16.323	ug/l	99
86) 1,2-Dibromo-3-Chloropr...	12.987	75	39960	16.565	ug/l	98
87) 1,2,4-Trichlorobenzene	13.830	180	288112	18.320	ug/l	99
88) Hexachlorobutadiene	14.010	225	175875	15.648	ug/l	99
89) Naphthalene	14.077	128	515515	15.328	ug/l	100
90) 1,2,3-Trichlorobenzene	14.318	180	277101	18.007	ug/l	98

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

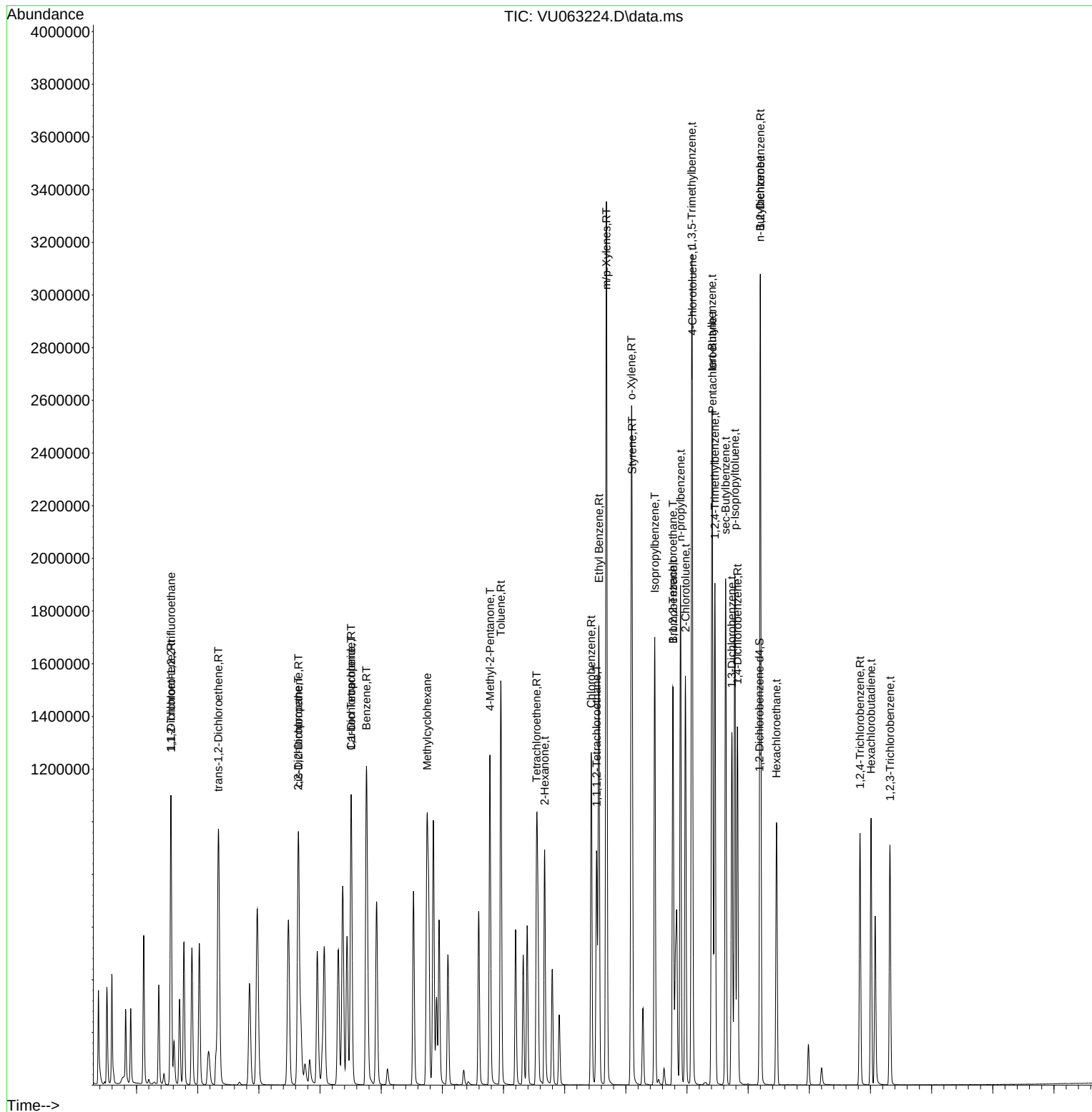
Data Path : Z:\voasrv\HPCHEM1\MSVOA_U\Data\VU021025\
Data File : VU063224.D
Acq On : 10 Feb 2025 15:33
Operator : MD/SY
Sample : VSTDIC015
Misc : 25.0mL/MSVOA_U/WATER
ALS Vial : 8 Sample Multiplier: 1

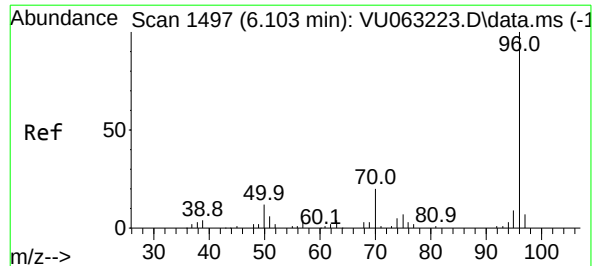
Instrument :
MSVOA_U
ClientSampleId :
VSTDIC015

Manual Integrations
APPROVED

Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025

Quant Time: Feb 11 04:01:03 2025
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_U\Method\524U021025DW.M
Quant Title : METHOD 524.2 VOLATILES DRINKING WATER
QLast Update : Tue Feb 11 03:56:39 2025
Response via : Initial Calibration





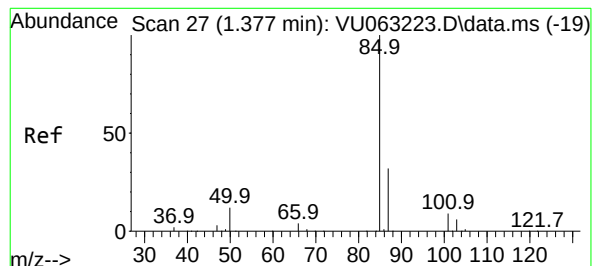
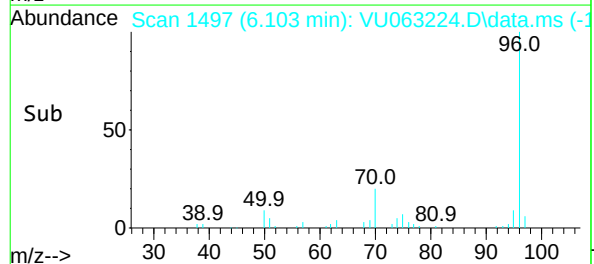
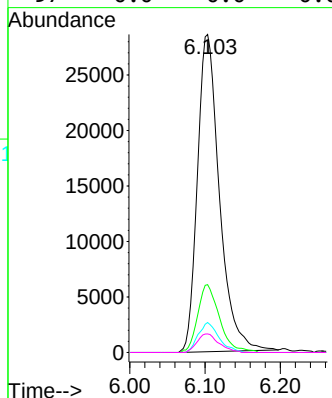
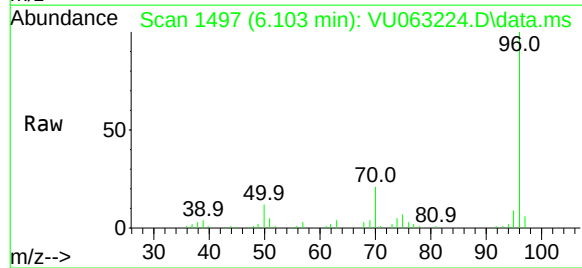
#1
Fluorobenzene
Concen: 1.000 ug/l
RT: 6.103 min Scan# 14
Delta R.T. 0.000 min
Lab File: VU063224.D
Acq: 10 Feb 2025 15:33

Instrument :
MSVOA_U
ClientSampleId :
VSTDICC015

Tgt Ion	Ratio	Lower	Upper
96	100		
70	21.2	15.6	23.4
95	8.9	7.3	10.9
97	0.0	0.0	0.0

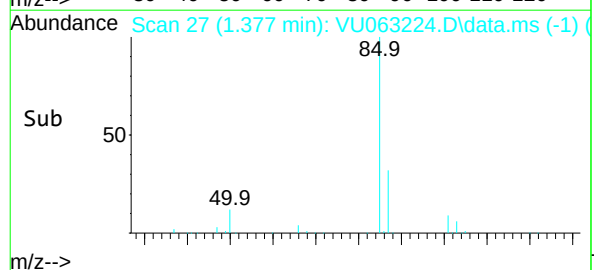
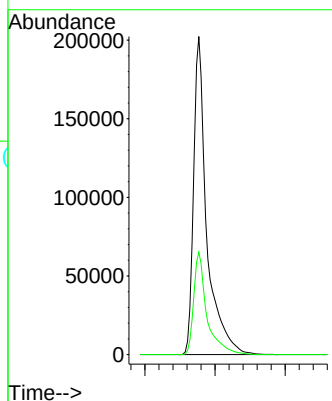
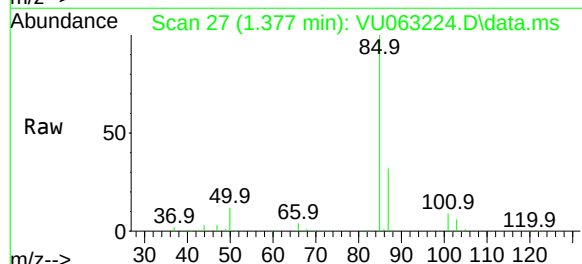
Manual Integrations
APPROVED

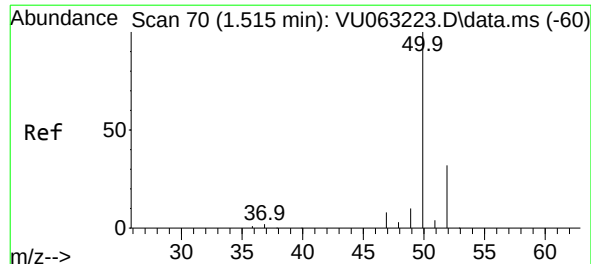
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#2
Dichlorodifluoromethane
Concen: 13.960 ug/l
RT: 1.377 min Scan# 27
Delta R.T. -0.000 min
Lab File: VU063224.D
Acq: 10 Feb 2025 15:33

Tgt Ion	Ratio	Lower	Upper
85	100		
87	32.2	16.0	48.0





#3

Chloromethane

Concen: 13.809 ug/l

RT: 1.515 min Scan# 70

Delta R.T. -0.000 min

Lab File: VU063224.D

Acq: 10 Feb 2025 15:33

Instrument :

MSVOA_U

ClientSampleId :

VSTDICC015

Tgt Ion: 50 Resp: 300062

Ion Ratio Lower Upper

50 100

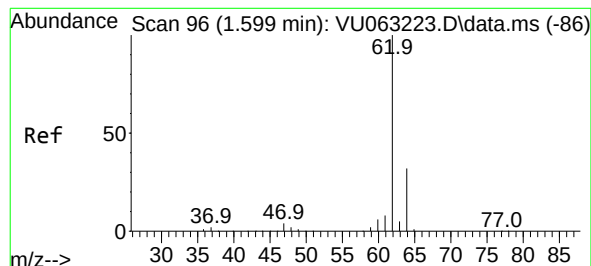
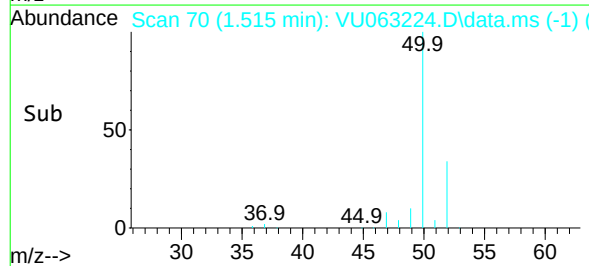
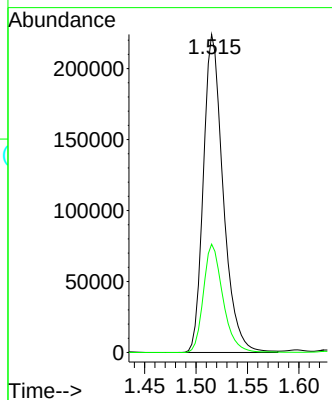
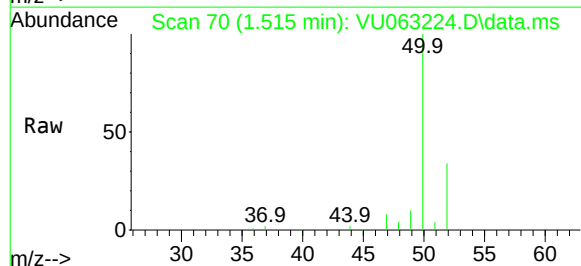
52 34.1 25.8 38.8

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#4

Vinyl Chloride

Concen: 14.466 ug/l

RT: 1.596 min Scan# 95

Delta R.T. -0.003 min

Lab File: VU063224.D

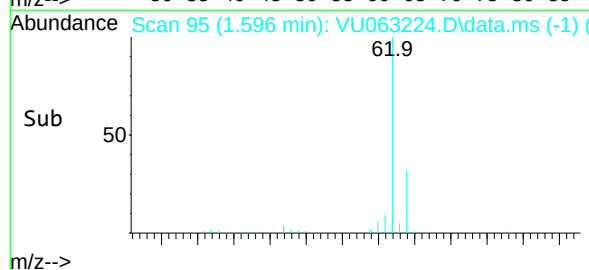
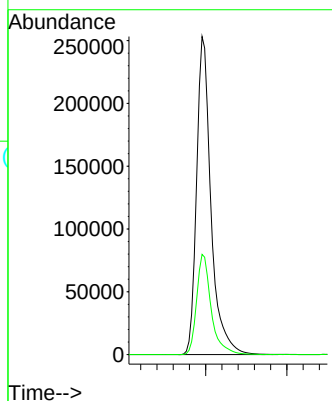
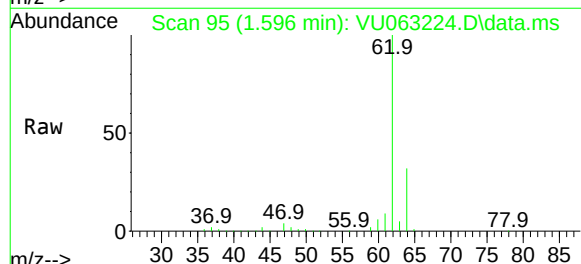
Acq: 10 Feb 2025 15:33

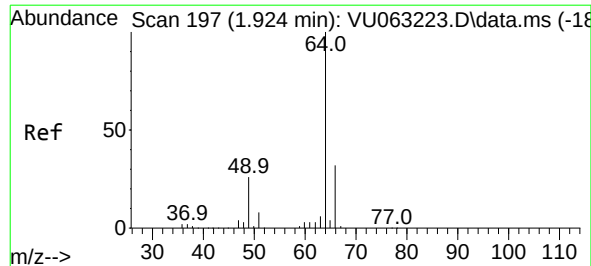
Tgt Ion: 62 Resp: 311009

Ion Ratio Lower Upper

62 100

64 31.5 25.4 38.0





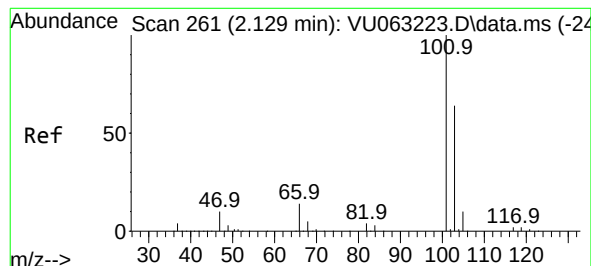
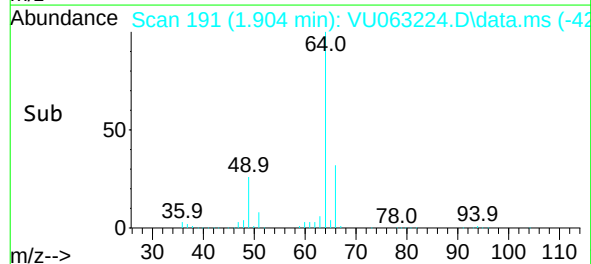
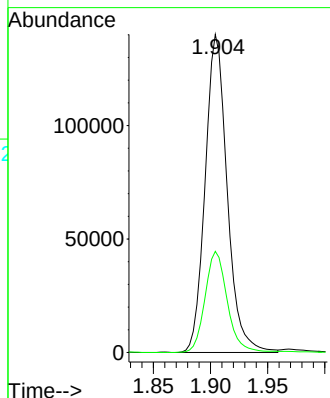
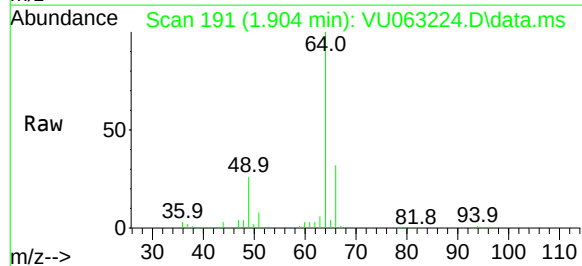
#6
Chloroethane
Concen: 13.899 ug/l
RT: 1.904 min Scan# 19
Delta R.T. -0.019 min
Lab File: VU063224.D
Acq: 10 Feb 2025 15:33

Instrument :
MSVOA_U
ClientSampleId :
VSTDIC015

Tgt Ion: 64 Resp: 188210
Ion Ratio Lower Upper
64 100
66 31.7 25.8 38.8

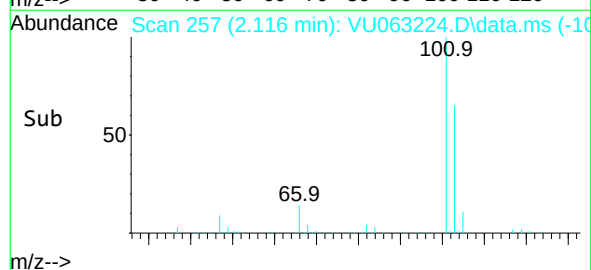
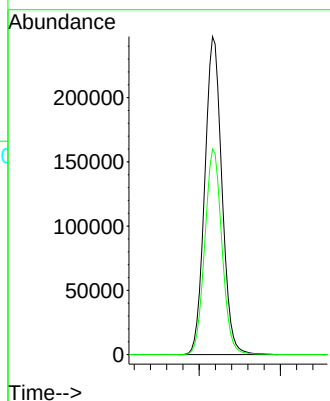
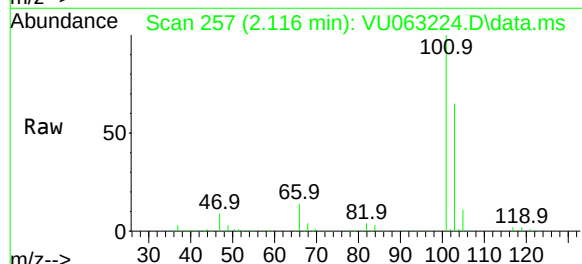
Manual Integrations
APPROVED

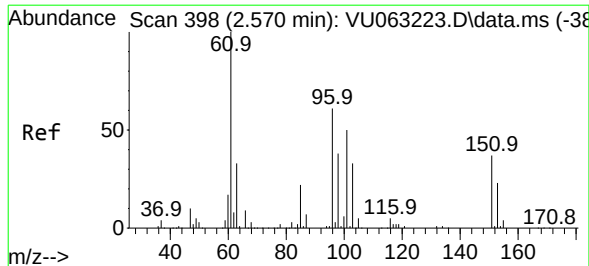
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#7
Trichlorofluoromethane
Concen: 14.236 ug/l
RT: 2.116 min Scan# 257
Delta R.T. -0.013 min
Lab File: VU063224.D
Acq: 10 Feb 2025 15:33

Tgt Ion:101 Resp: 362692
Ion Ratio Lower Upper
101 100
103 64.6 51.4 77.2





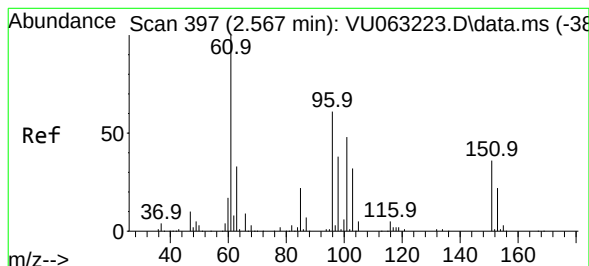
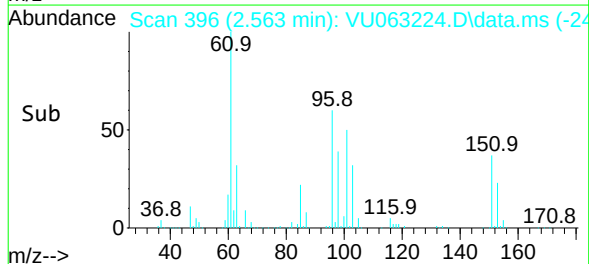
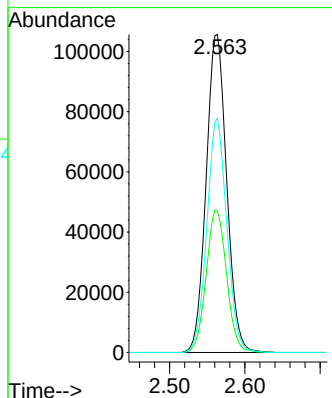
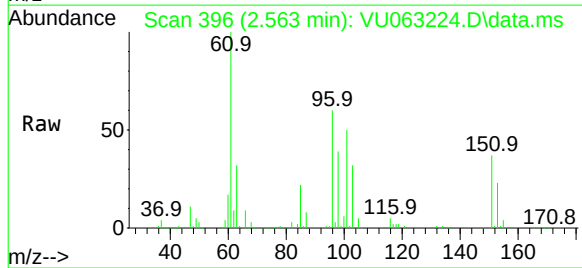
#8
1,1,2-Trichloro-1,2,2-trifluoroethane
Concen: 13.842 ug/l
RT: 2.563 min Scan# 395
Delta R.T. -0.006 min
Lab File: VU063224.D
Acq: 10 Feb 2025 15:33

Instrument :
MSVOA_U
ClientSampleId :
VSTDICC015

Tgt Ion: 101 Resp: 200170
Ion Ratio Lower Upper
101 100
85 44.3 35.4 53.0
151 72.0 58.5 87.7

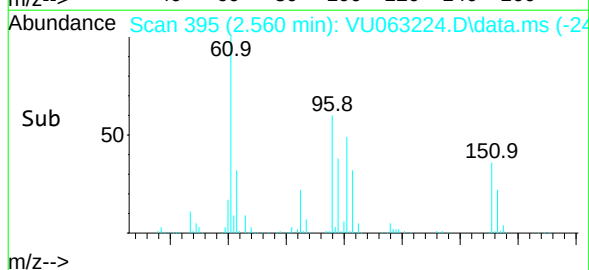
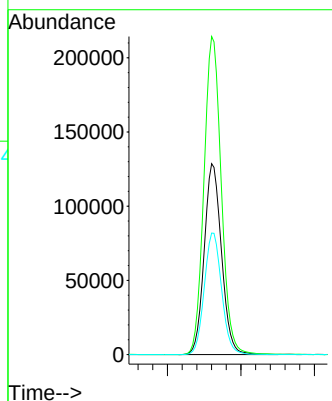
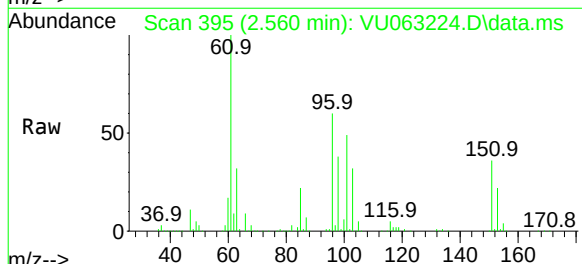
Manual Integrations
APPROVED

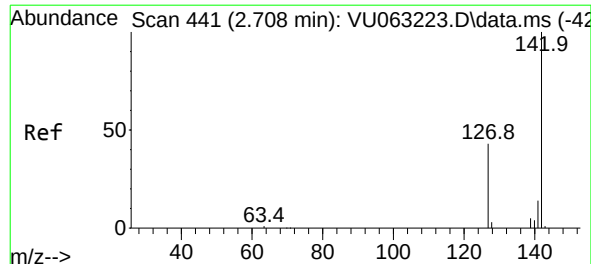
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#9
1,1-Dichloroethene
Concen: 14.259 ug/l
RT: 2.560 min Scan# 395
Delta R.T. -0.006 min
Lab File: VU063224.D
Acq: 10 Feb 2025 15:33

Tgt Ion: 96 Resp: 210091
Ion Ratio Lower Upper
96 100
61 166.6 0.0 492.9
98 63.7 0.0 124.0





#10

Iodomethane

Concen: 14.234 ug/l

RT: 2.705 min Scan# 441

Delta R.T. -0.003 min

Lab File: VU063224.D

Acq: 10 Feb 2025 15:33

Instrument :

MSVOA_U

ClientSampleId :

VSTDICC015

Tgt Ion: 142 Resp: 329697

Ion Ratio Lower Upper

142 100

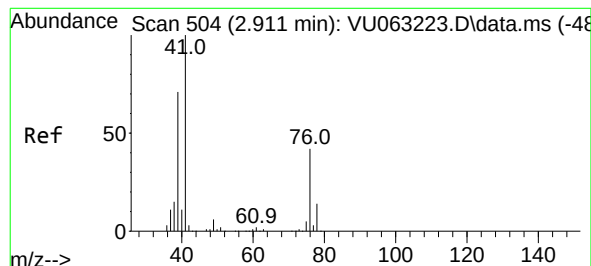
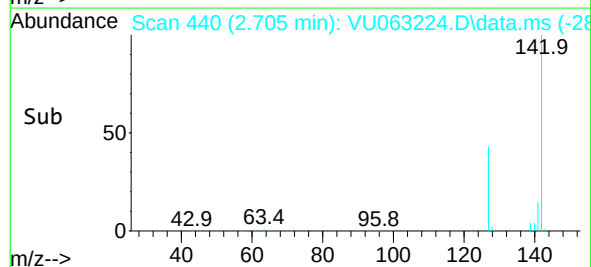
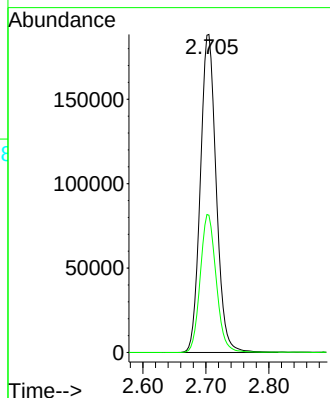
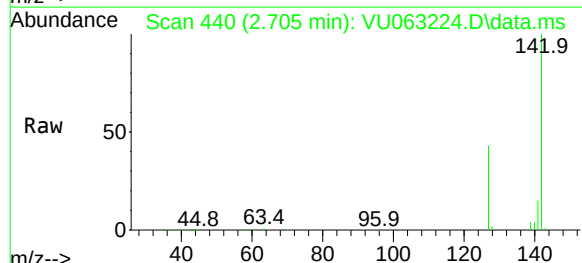
127 43.7 34.5 51.7

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#11

Allyl Chloride

Concen: 14.705 ug/l

RT: 2.904 min Scan# 502

Delta R.T. -0.006 min

Lab File: VU063224.D

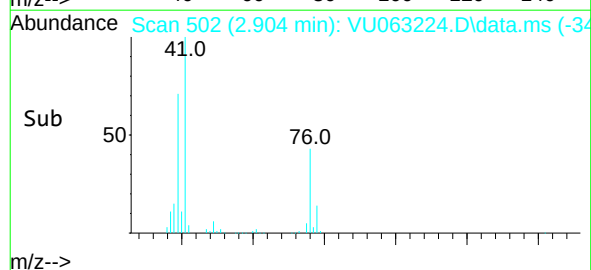
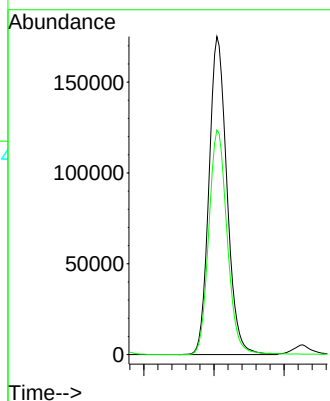
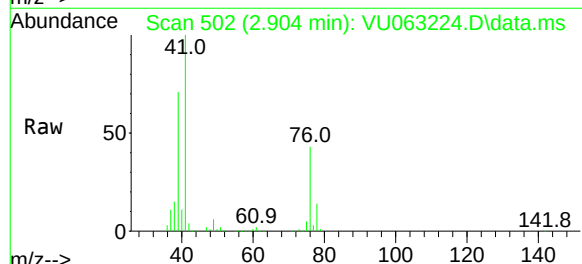
Acq: 10 Feb 2025 15:33

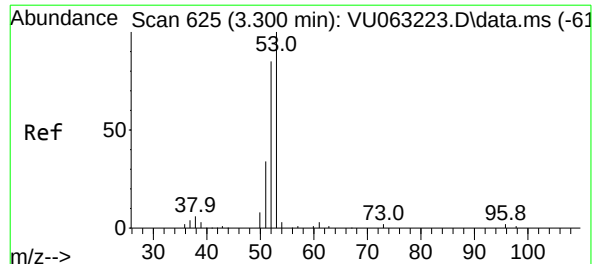
Tgt Ion: 41 Resp: 311245

Ion Ratio Lower Upper

41 100

39 72.4 57.9 86.9





#12

Acrylonitrile

Concen: 30.731 ug/l

RT: 3.300 min Scan# 62

Delta R.T. -0.000 min

Lab File: VU063224.D

Acq: 10 Feb 2025 15:33

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC015

Tgt Ion: 53 Resp: 102914

Ion Ratio Lower Upper

53 100

52 80.8 64.2 96.2

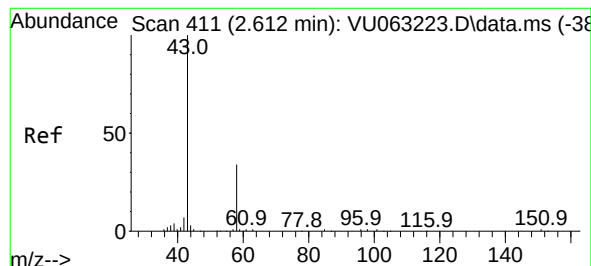
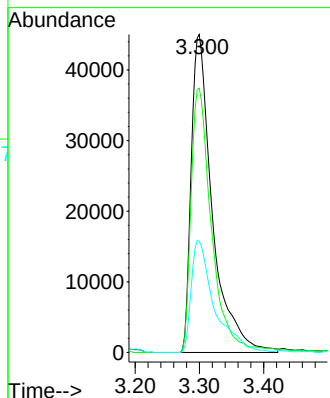
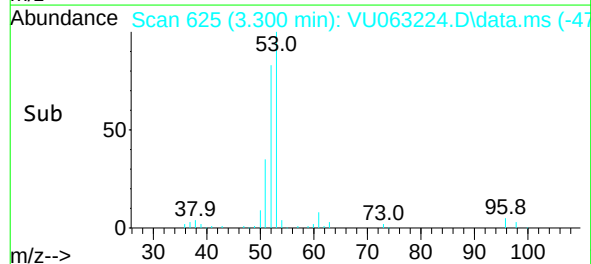
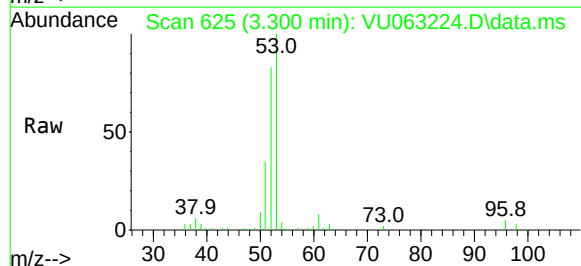
51 38.3 30.8 46.2

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#13

Acetone

Concen: 65.992 ug/l

RT: 2.612 min Scan# 411

Delta R.T. -0.000 min

Lab File: VU063224.D

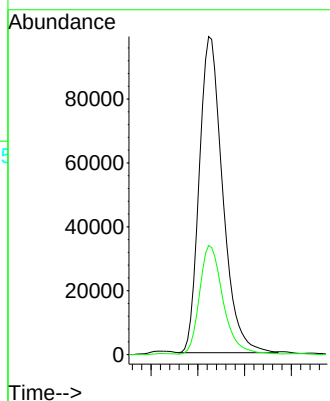
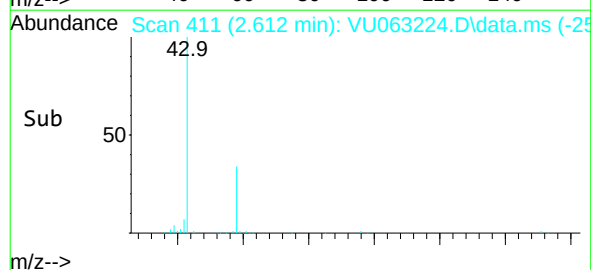
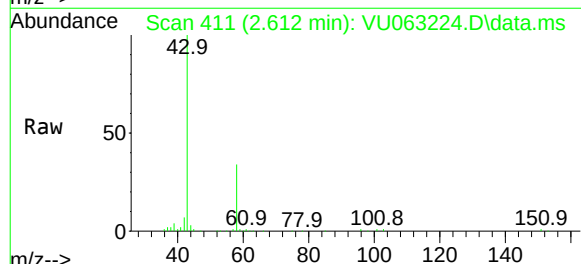
Acq: 10 Feb 2025 15:33

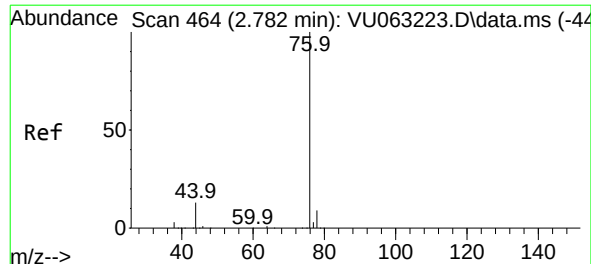
Tgt Ion: 43 Resp: 172446

Ion Ratio Lower Upper

43 100

58 34.3 27.4 41.0





#14

Carbon Disulfide

Concen: 13.906 ug/l

RT: 2.776 min Scan# 46

Delta R.T. -0.006 min

Lab File: VU063224.D

Acq: 10 Feb 2025 15:33

Instrument :

MSVOA_U

ClientSampleId :

VSTDICC015

Tgt Ion: 76 Resp: 716395

Ion Ratio Lower Upper

76 100

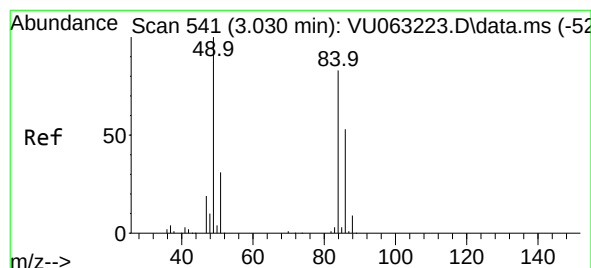
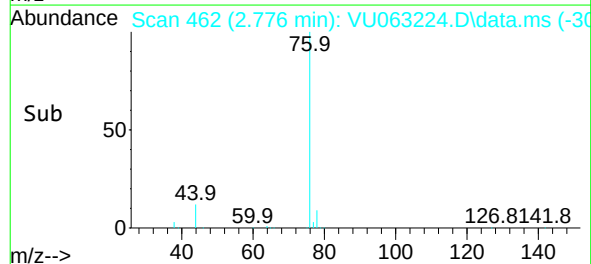
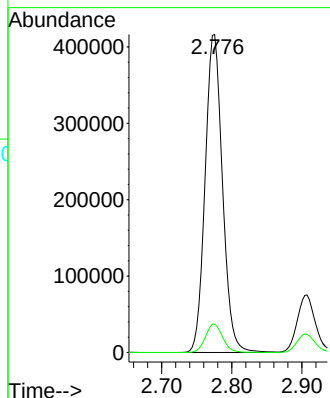
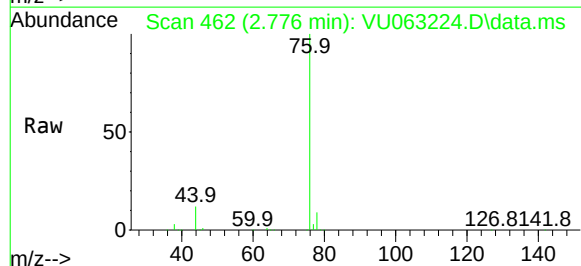
78 8.9 7.2 10.8

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#15

Methylene Chloride

Concen: 13.825 ug/l

RT: 3.026 min Scan# 540

Delta R.T. -0.003 min

Lab File: VU063224.D

Acq: 10 Feb 2025 15:33

Tgt Ion: 84 Resp: 251659

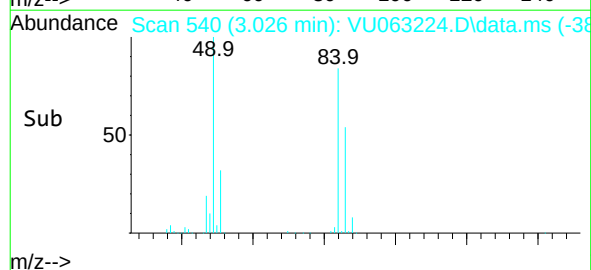
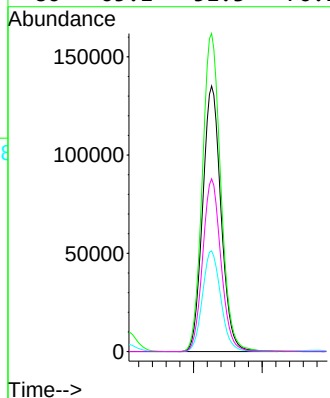
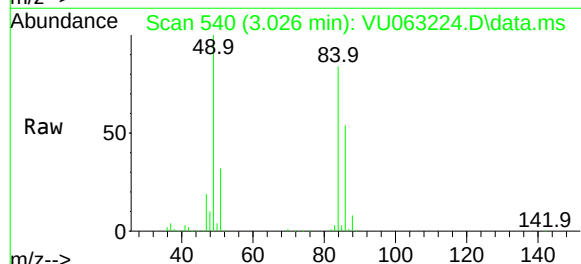
Ion Ratio Lower Upper

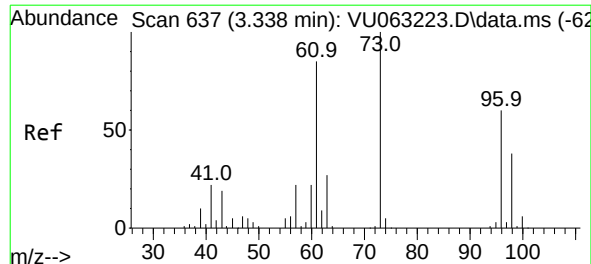
84 100

49 119.7 96.4 144.6

51 37.9 0.0 74.8

86 65.1 51.3 76.9





#16

trans-1,2-Dichloroethene

Concen: 14.434 ug/l

RT: 3.335 min Scan# 63

Delta R.T. -0.003 min

Lab File: VU063224.D

Acq: 10 Feb 2025 15:33

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC015

Tgt Ion: 96 Resp: 242715

Ion Ratio Lower Upper

96 100

61 143.8 113.4 170.2

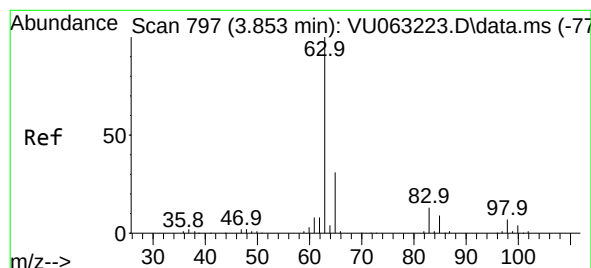
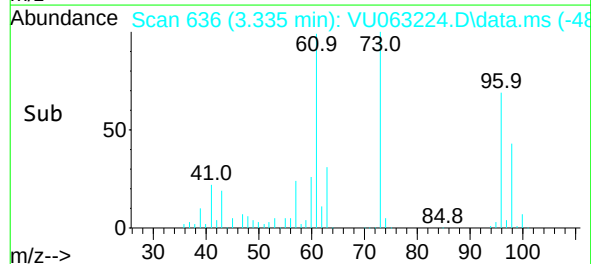
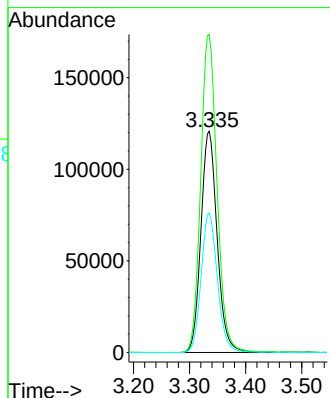
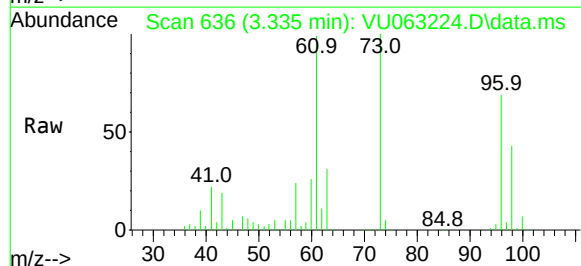
98 62.9 51.2 76.8

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#17

1,1-Dichloroethane

Concen: 14.304 ug/l

RT: 3.846 min Scan# 795

Delta R.T. -0.006 min

Lab File: VU063224.D

Acq: 10 Feb 2025 15:33

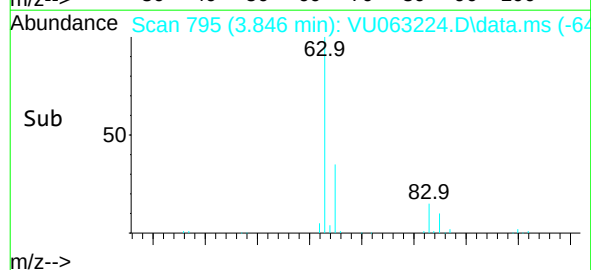
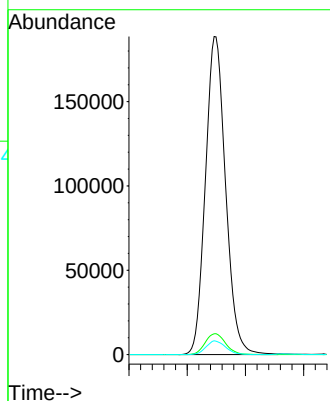
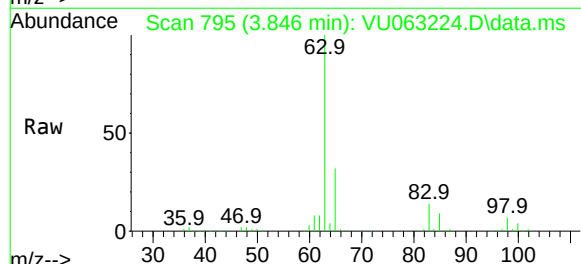
Tgt Ion: 63 Resp: 453378

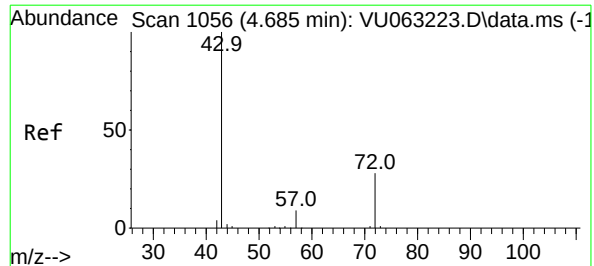
Ion Ratio Lower Upper

63 100

98 6.5 3.3 9.9

100 4.3 2.1 6.2





#18

2-Butanone

Concen: 72.208 ug/l

RT: 4.685 min Scan# 10

Delta R.T. -0.000 min

Lab File: VU063224.D

Acq: 10 Feb 2025 15:33

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC015

Tgt Ion: 43 Resp: 304814

Ion Ratio Lower Upper

43 100

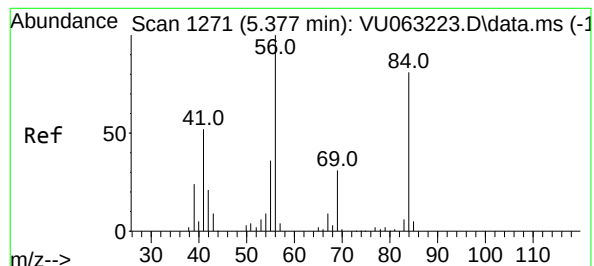
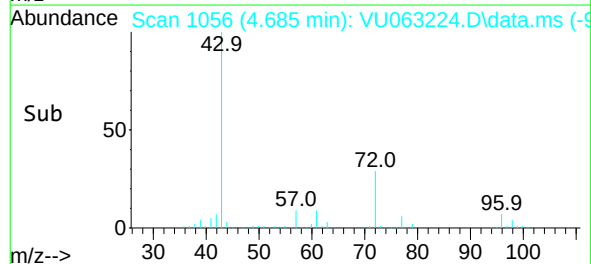
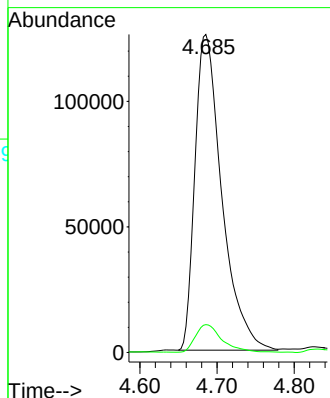
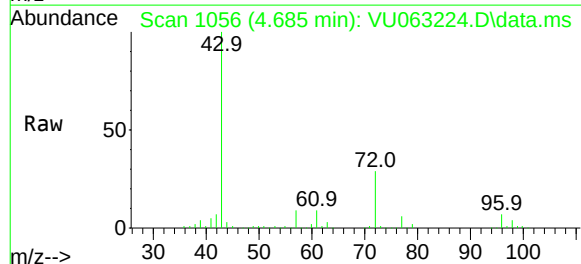
57 8.7 0.0 17.0

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#19

Cyclohexane

Concen: 15.729 ug/l m

RT: 5.370 min Scan# 1269

Delta R.T. -0.006 min

Lab File: VU063224.D

Acq: 10 Feb 2025 15:33

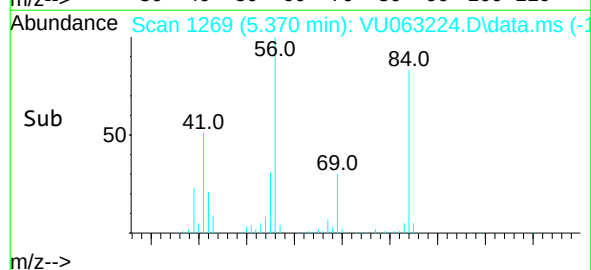
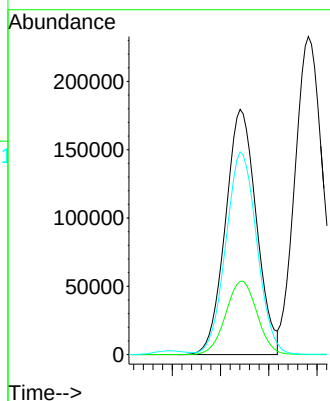
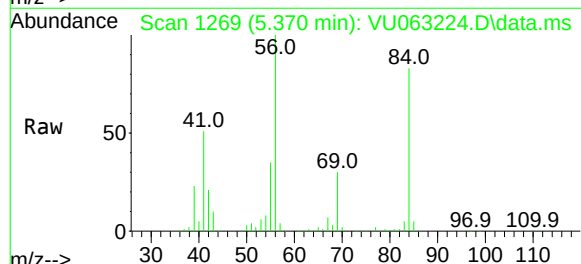
Tgt Ion: 56 Resp: 400586

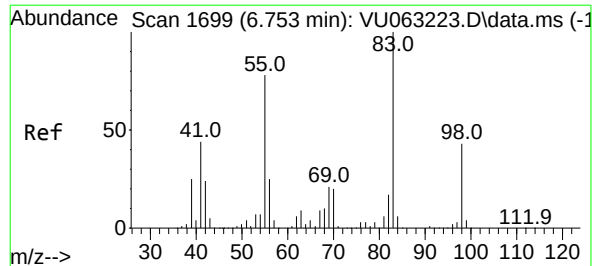
Ion Ratio Lower Upper

56 100

69 30.3 24.5 36.7

84 81.7 65.2 97.8





#20

Methylcyclohexane

Concen: 15.795 ug/l

RT: 6.750 min Scan# 1699

Delta R.T. -0.003 min

Lab File: VU063224.D

Acq: 10 Feb 2025 15:33

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC015

Tgt Ion: 83 Resp: 398925

Ion Ratio Lower Upper

83 100

55 77.0 63.1 94.7

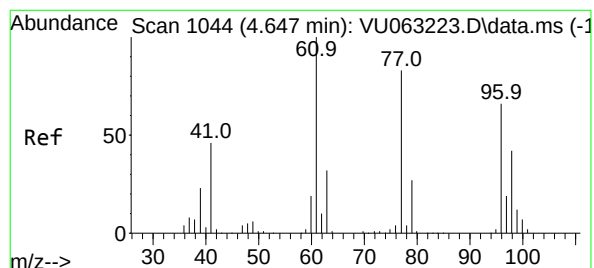
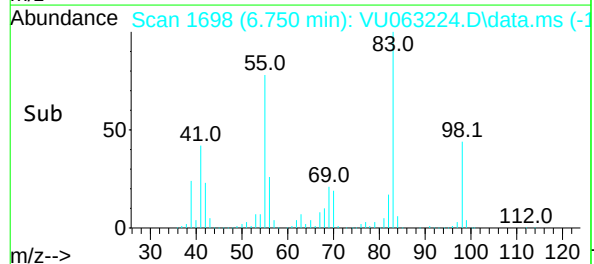
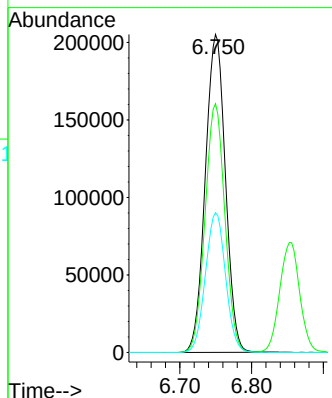
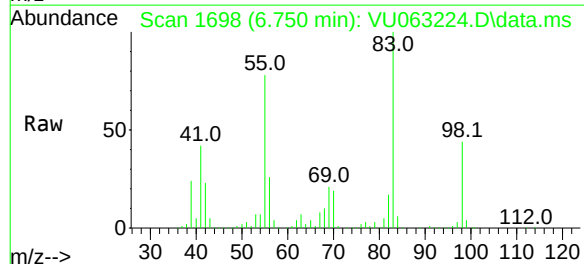
98 44.1 35.2 52.8

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#21

2,2-Dichloropropane

Concen: 14.352 ug/l

RT: 4.644 min Scan# 1043

Delta R.T. -0.003 min

Lab File: VU063224.D

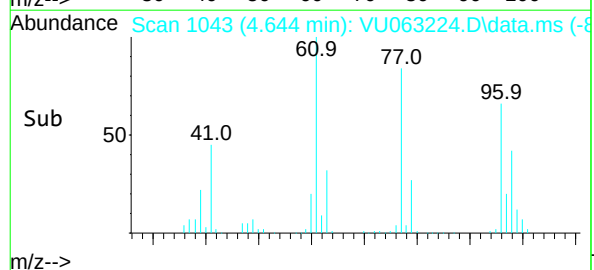
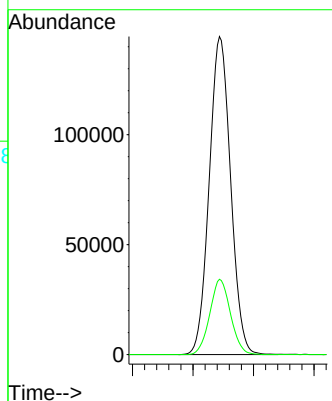
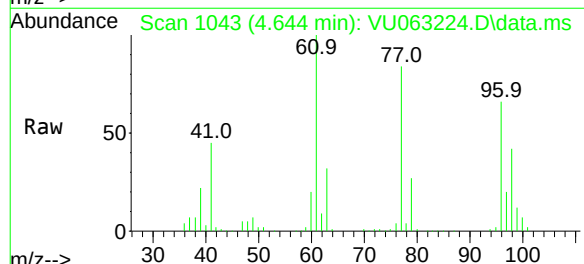
Acq: 10 Feb 2025 15:33

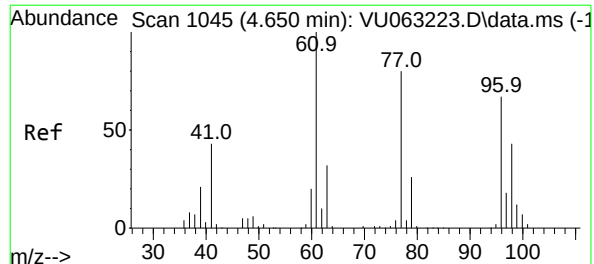
Tgt Ion: 77 Resp: 354900

Ion Ratio Lower Upper

77 100

97 22.9 18.5 27.7





#22
cis-1,2-Dichloroethene
Concen: 14.861 ug/l
RT: 4.647 min Scan# 1045
Delta R.T. -0.003 min
Lab File: VU063224.D
Acq: 10 Feb 2025 15:33

Instrument :

MSVOA_U

ClientSampleId :

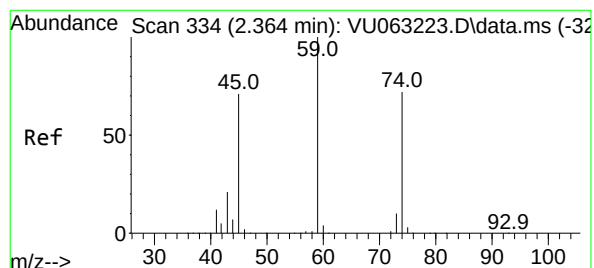
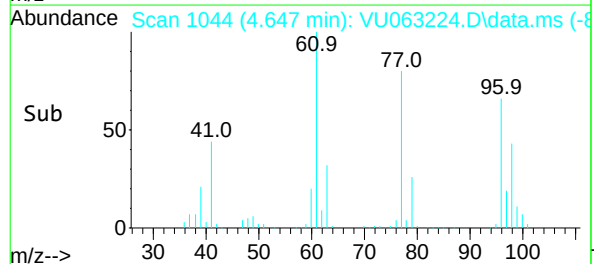
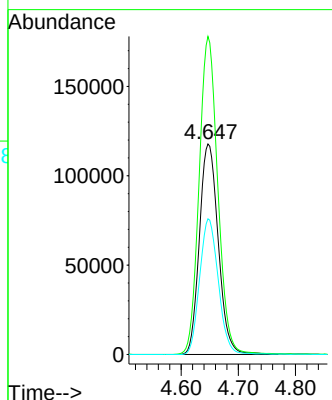
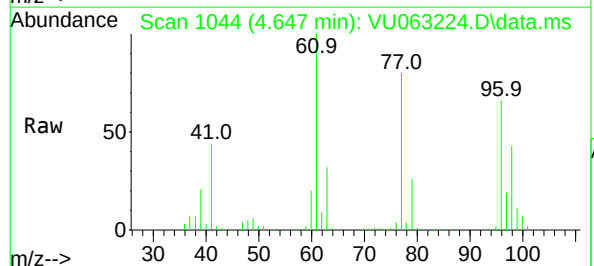
VSTDIC015

Tgt Ion: 96 Resp: 270006
Ion Ratio Lower Upper
96 100
61 149.6 0.0 373.3
98 63.7 31.9 95.9

Manual Integrations
APPROVED

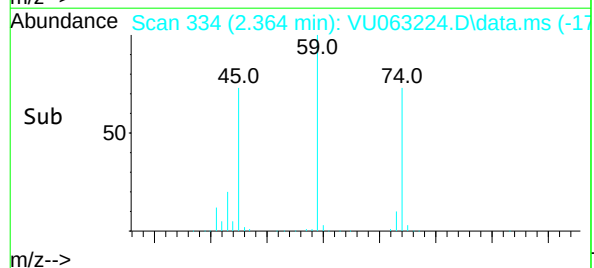
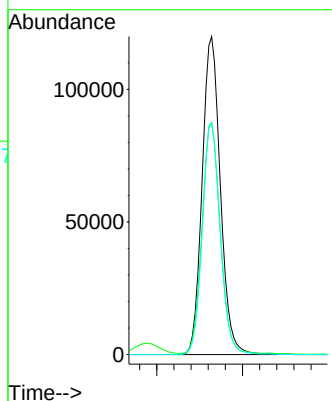
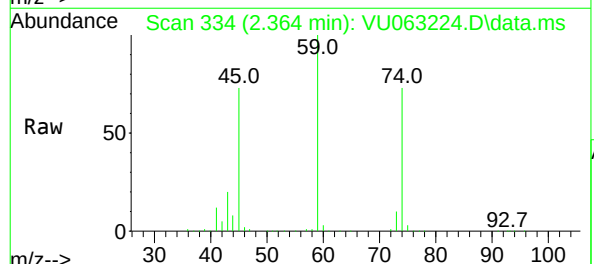
Reviewed By :Amit Patel 02/12/2025

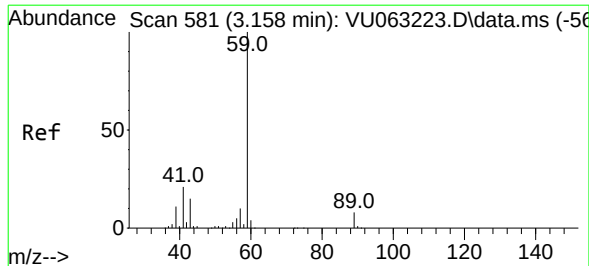
Supervised By :Mahesh Dadoda 02/12/2025



#23
Diethyl Ether
Concen: 14.007 ug/l
RT: 2.364 min Scan# 334
Delta R.T. -0.000 min
Lab File: VU063224.D
Acq: 10 Feb 2025 15:33

Tgt Ion: 59 Resp: 177089
Ion Ratio Lower Upper
59 100
45 71.8 57.8 86.6
74 71.8 57.7 86.5





#24

tert-Butyl Alcohol

Concen: 146.971 ug/l

RT: 3.177 min Scan# 58

Delta R.T. 0.019 min

Lab File: VU063224.D

Acq: 10 Feb 2025 15:33

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC015

Tgt Ion: 59 Resp: 185785

Ion Ratio Lower Upper

59 100

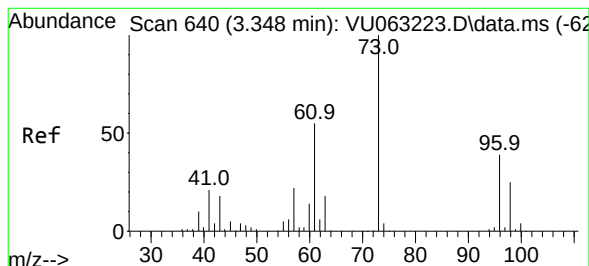
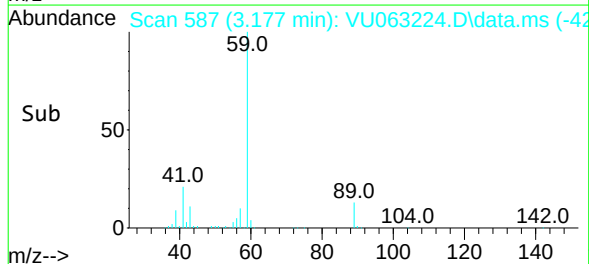
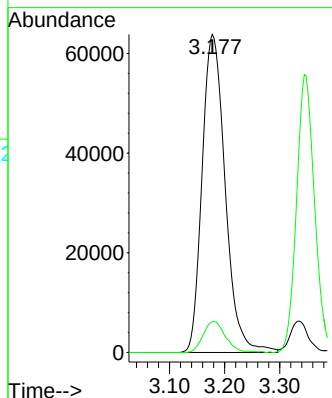
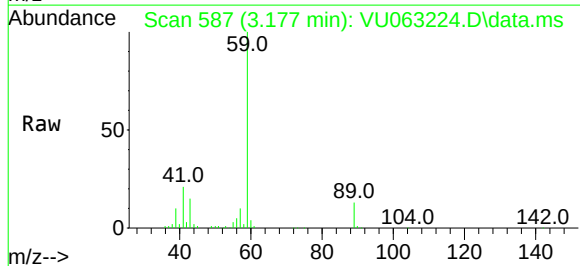
57 9.5 7.5 11.3

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#25

Methyl tert-Butyl Ether

Concen: 15.037 ug/l

RT: 3.348 min Scan# 640

Delta R.T. -0.000 min

Lab File: VU063224.D

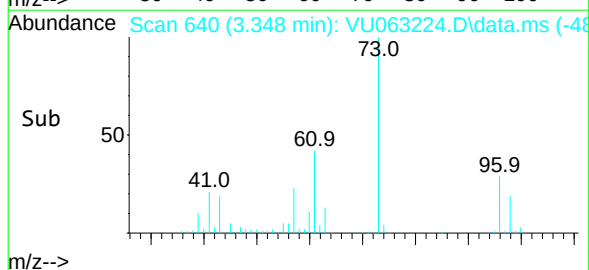
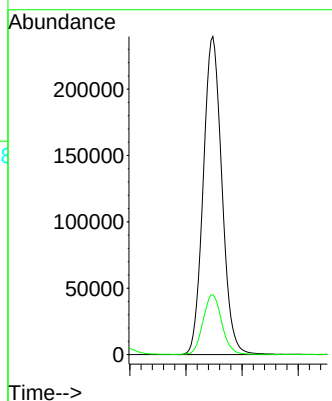
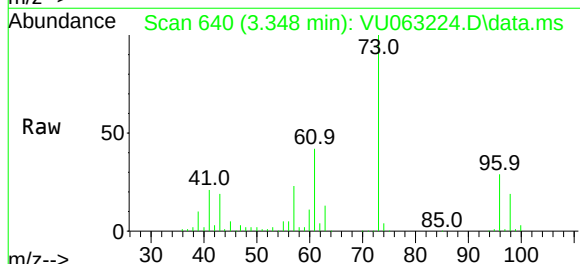
Acq: 10 Feb 2025 15:33

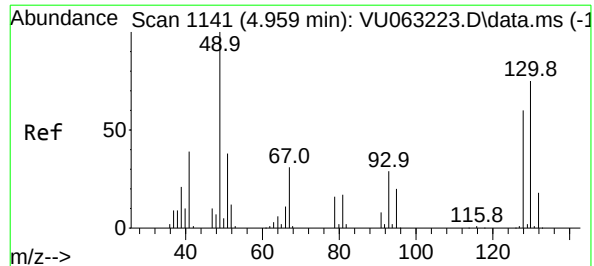
Tgt Ion: 73 Resp: 553339

Ion Ratio Lower Upper

73 100

43 18.9 14.9 22.3





#26

Bromochloromethane

Concen: 14.257 ug/l

RT: 4.952 min Scan# 11

Delta R.T. -0.006 min

Lab File: VU063224.D

Acq: 10 Feb 2025 15:33

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC015

Tgt Ion: 128 Resp: 113229

Ion Ratio Lower Upper

128 100

49 170.1 0.0 343.4

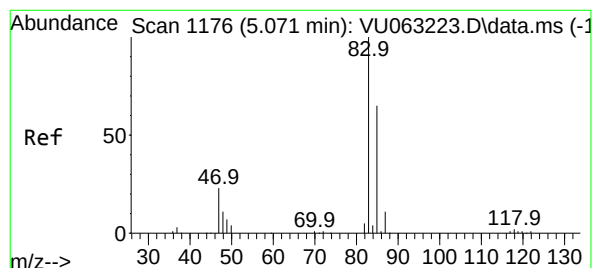
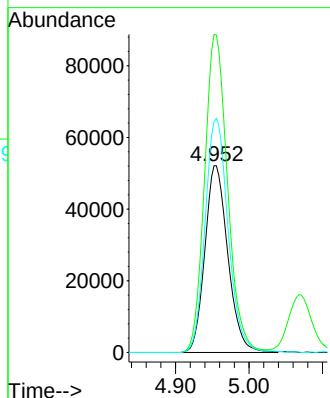
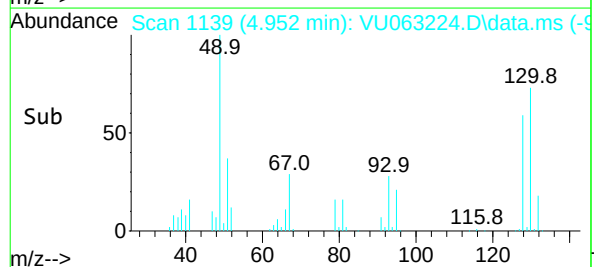
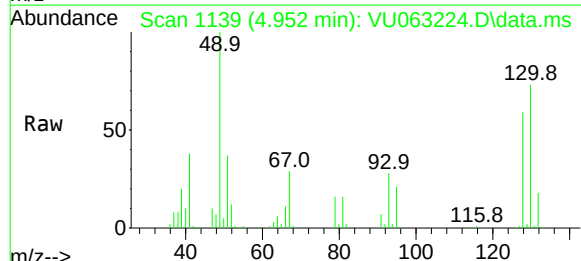
130 126.0 102.9 154.3

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#27

Chloroform

Concen: 14.316 ug/l

RT: 5.071 min Scan# 1176

Delta R.T. -0.000 min

Lab File: VU063224.D

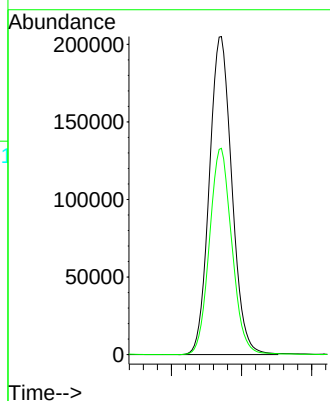
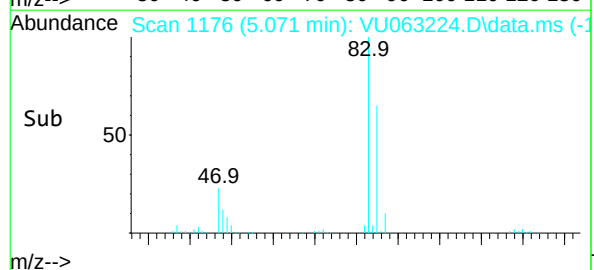
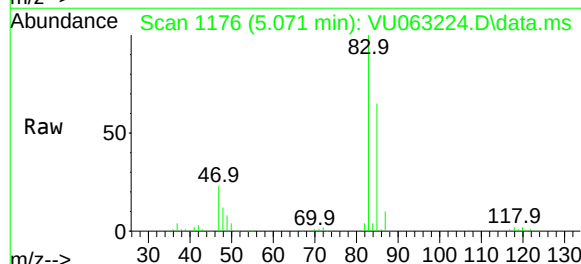
Acq: 10 Feb 2025 15:33

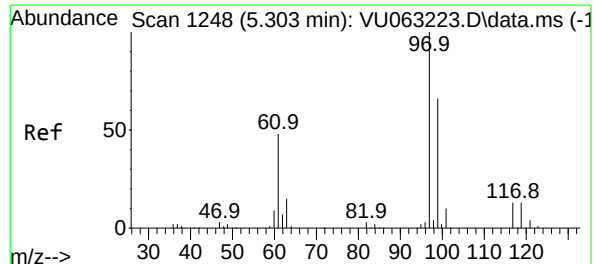
Tgt Ion: 83 Resp: 457911

Ion Ratio Lower Upper

83 100

85 64.9 0.0 129.8





#28

1,1,1-Trichloroethane

Concen: 14.428 ug/l

RT: 5.300 min Scan# 12

Delta R.T. -0.003 min

Lab File: VU063224.D

Acq: 10 Feb 2025 15:33

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC015

Tgt Ion: 97 Resp: 373842

Ion Ratio Lower Upper

97 100

99 64.4 32.4 97.0

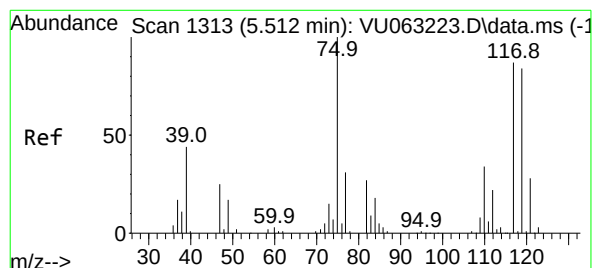
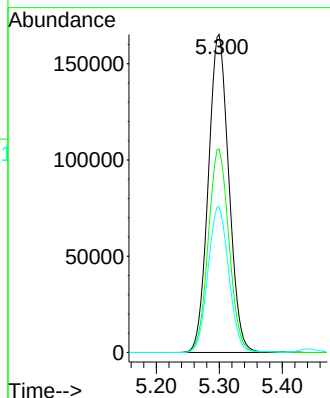
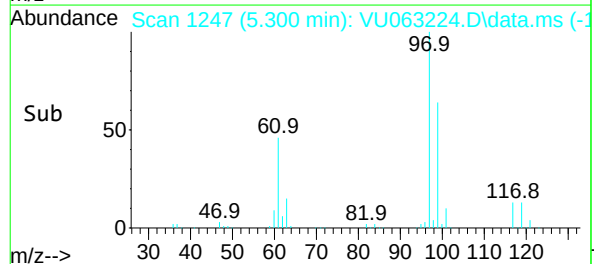
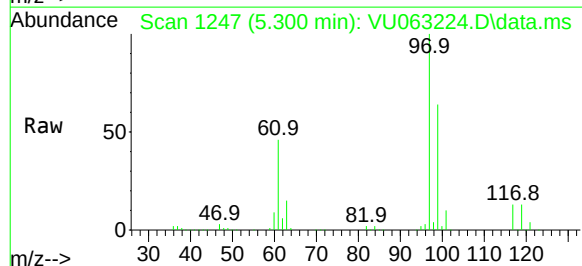
61 46.5 23.8 71.2

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#29

1,1-Dichloropropene

Concen: 14.983 ug/l

RT: 5.509 min Scan# 1312

Delta R.T. -0.003 min

Lab File: VU063224.D

Acq: 10 Feb 2025 15:33

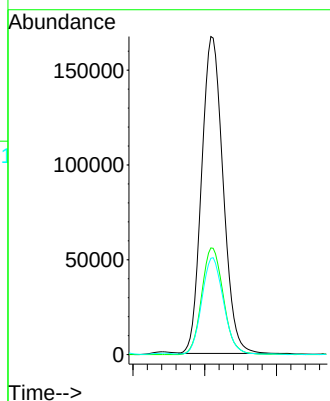
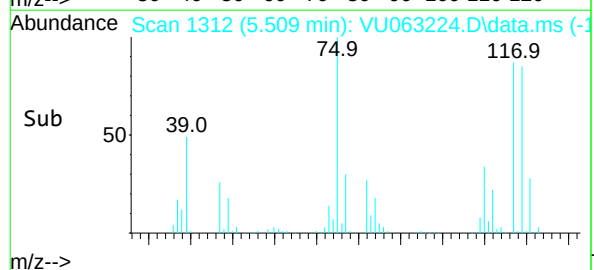
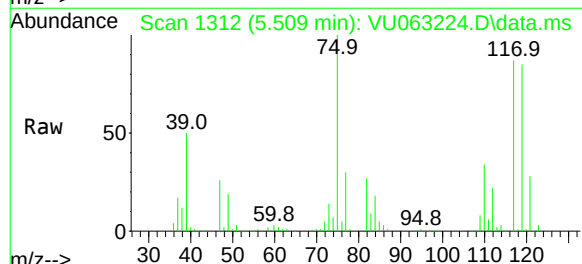
Tgt Ion: 75 Resp: 347711

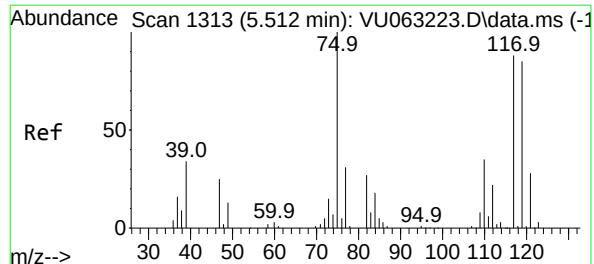
Ion Ratio Lower Upper

75 100

110 34.1 17.2 51.5

77 30.5 24.6 37.0





#30

Carbon Tetrachloride

Concen: 14.448 ug/l

RT: 5.509 min Scan# 1313

Delta R.T. -0.003 min

Lab File: VU063224.D

Acq: 10 Feb 2025 15:33

Instrument :

MSVOA_U

ClientSampleId :

VSTDICC015

Tgt Ion:117 Resp: 321059

Ion Ratio Lower Upper

117 100

119 97.2 76.7 115.1

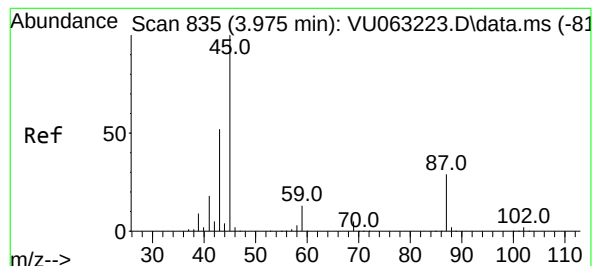
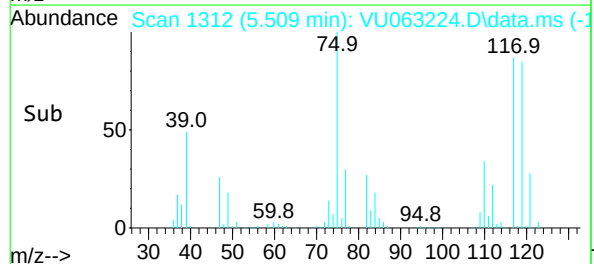
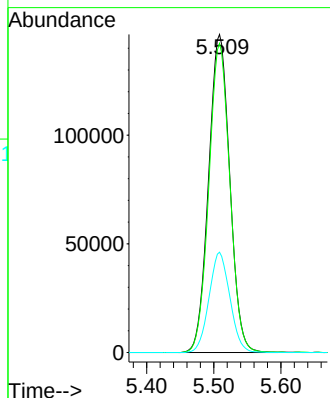
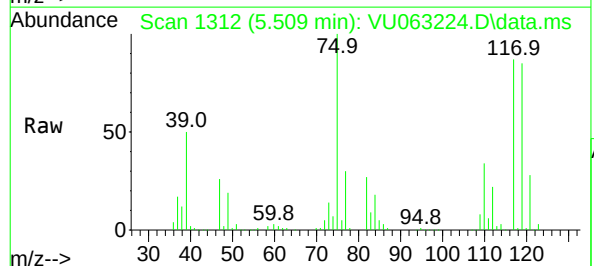
121 31.5 25.5 38.3

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#31

Isopropyl Ether

Concen: 15.547 ug/l

RT: 3.975 min Scan# 835

Delta R.T. -0.000 min

Lab File: VU063224.D

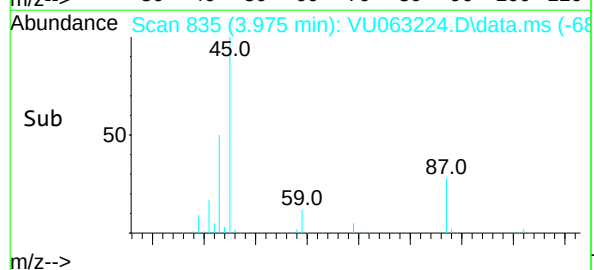
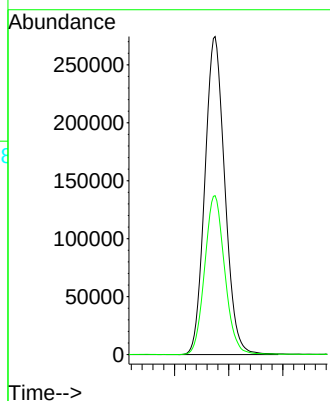
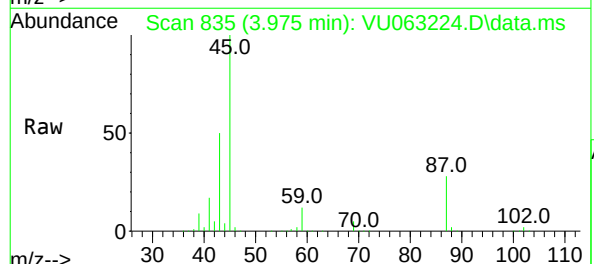
Acq: 10 Feb 2025 15:33

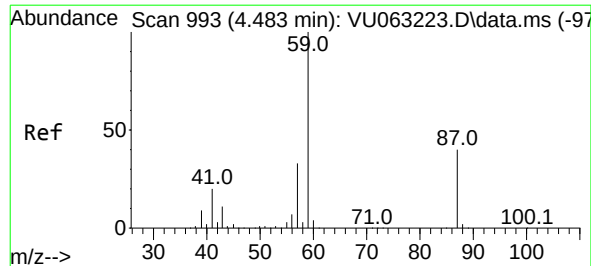
Tgt Ion: 45 Resp: 703540

Ion Ratio Lower Upper

45 100

43 50.1 25.7 77.1





#32

Ethyl-t-butyl ether

Concen: 15.784 ug/l

RT: 4.483 min Scan# 99

Delta R.T. -0.000 min

Lab File: VU063224.D

Acq: 10 Feb 2025 15:33

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC015

Tgt Ion: 59 Resp: 649553

Ion Ratio Lower Upper

59 100

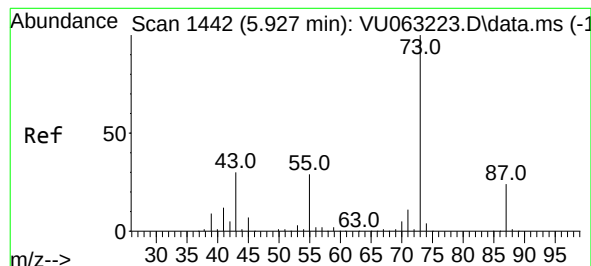
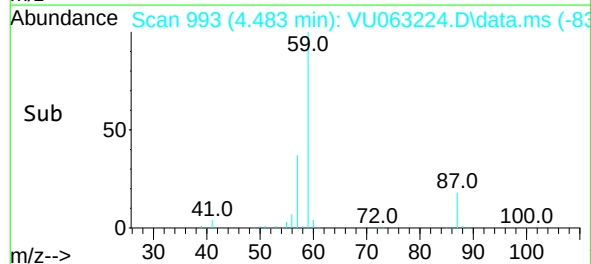
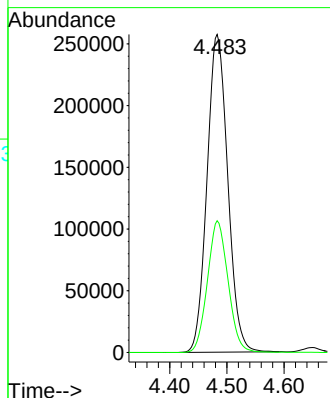
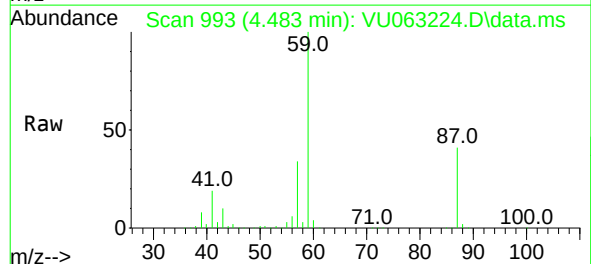
87 41.1 32.6 49.0

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#33

Tert-Amyl methyl ether

Concen: 16.013 ug/l

RT: 5.923 min Scan# 1441

Delta R.T. -0.003 min

Lab File: VU063224.D

Acq: 10 Feb 2025 15:33

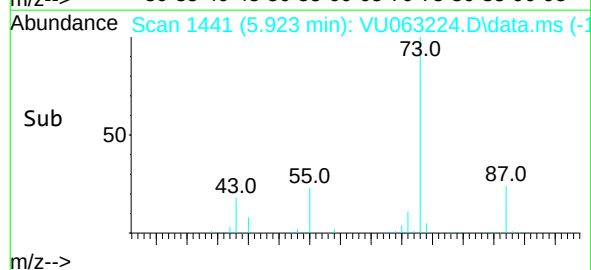
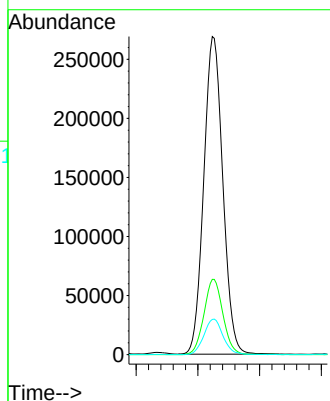
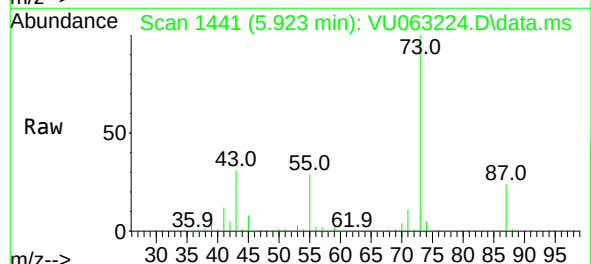
Tgt Ion: 73 Resp: 575729

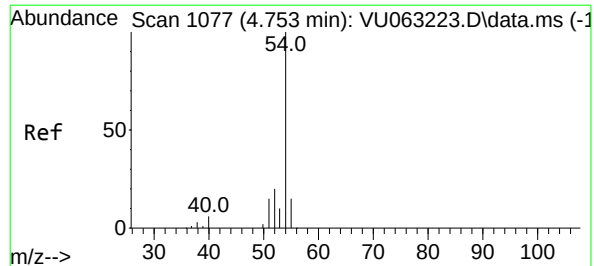
Ion Ratio Lower Upper

73 100

87 23.5 18.9 28.3

71 11.3 9.0 13.4





#34

Propionitrile

Concen: 78.746 ug/l

RT: 4.753 min Scan# 1077

Delta R.T. -0.000 min

Lab File: VU063224.D

Acq: 10 Feb 2025 15:33

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC015

Tgt Ion: 54 Resp: 103055

Ion Ratio Lower Upper

54 100

52 19.3 16.3 24.5

55 14.7 11.8 17.6

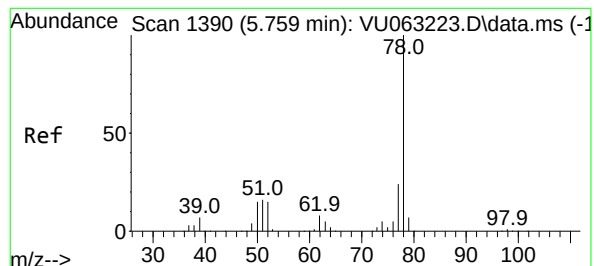
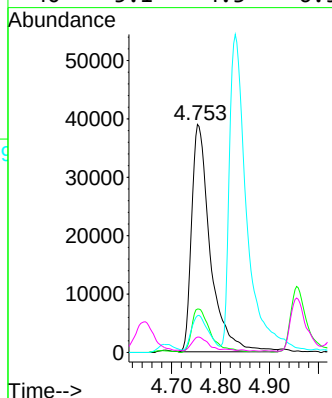
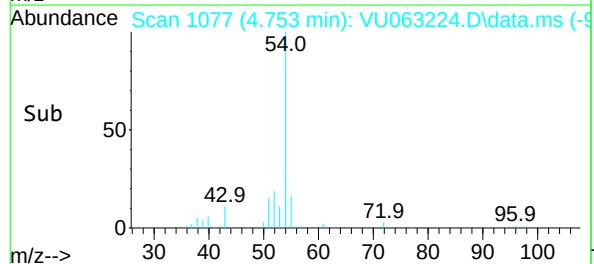
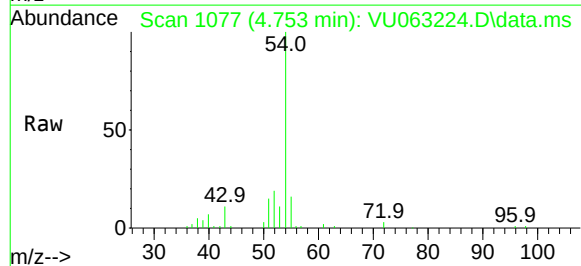
40 5.1 4.3 6.5

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#35

Benzene

Concen: 14.641 ug/l

RT: 5.756 min Scan# 1389

Delta R.T. -0.003 min

Lab File: VU063224.D

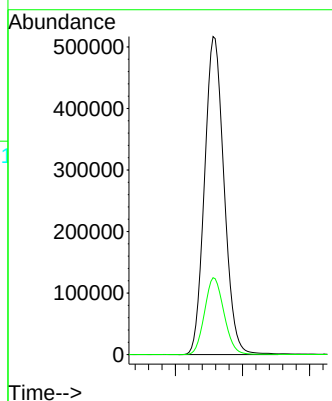
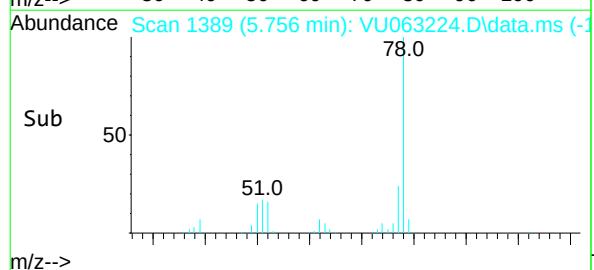
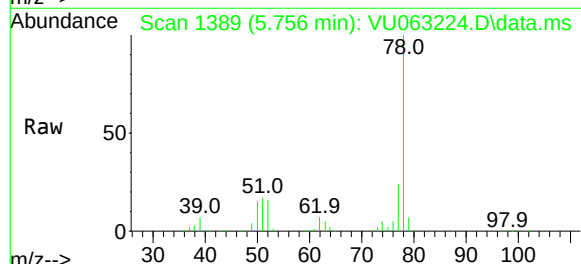
Acq: 10 Feb 2025 15:33

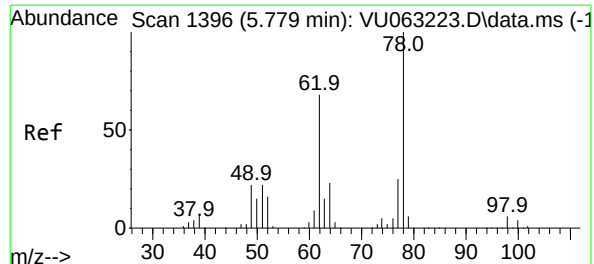
Tgt Ion: 78 Resp: 1044796

Ion Ratio Lower Upper

78 100

77 24.2 19.0 28.4





#36

1,2-Dichloroethane

Concen: 14.170 ug/l

RT: 5.775 min Scan# 13

Delta R.T. -0.003 min

Lab File: VU063224.D

Acq: 10 Feb 2025 15:33

Instrument :

MSVOA_U

ClientSampleId :

VSTDICC015

Tgt Ion: 62 Resp: 291840

Ion Ratio Lower Upper

62 100

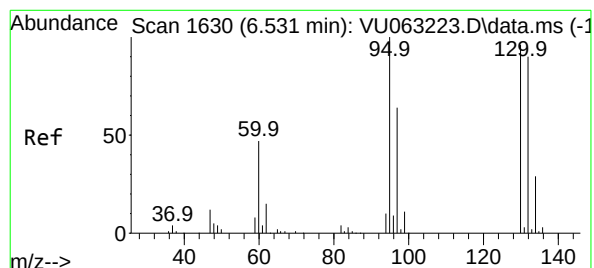
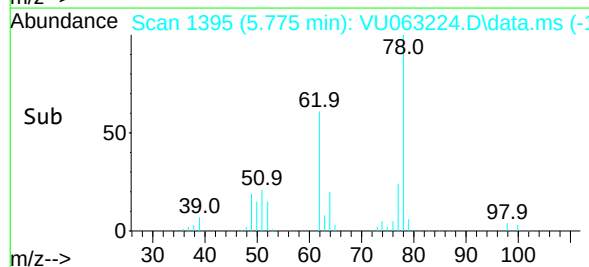
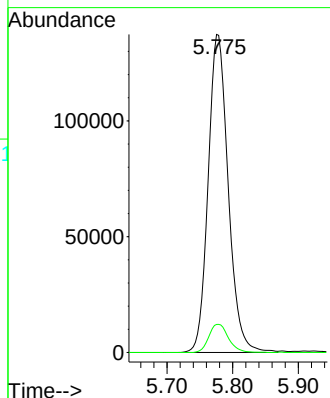
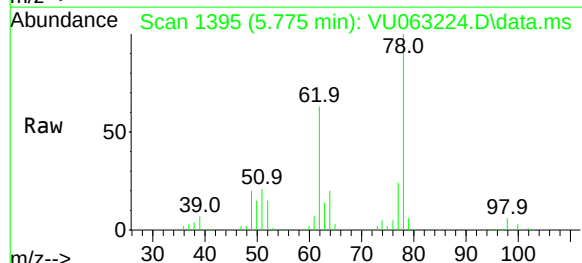
98 8.7 6.9 10.3

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#37

Trichloroethene

Concen: 14.424 ug/l

RT: 6.528 min Scan# 1629

Delta R.T. -0.003 min

Lab File: VU063224.D

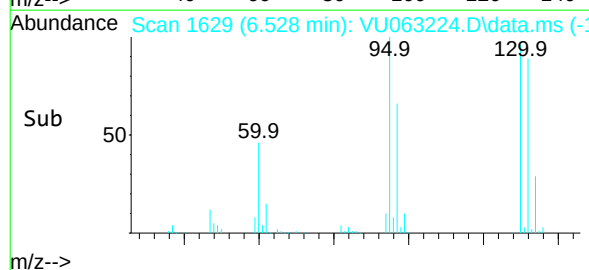
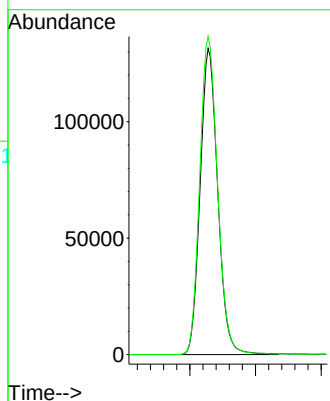
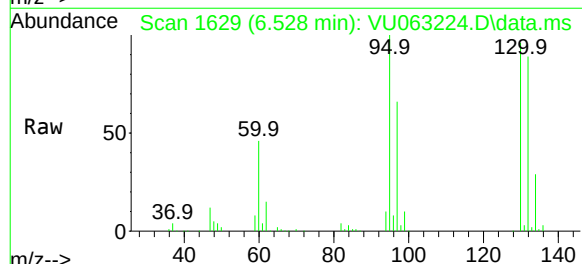
Acq: 10 Feb 2025 15:33

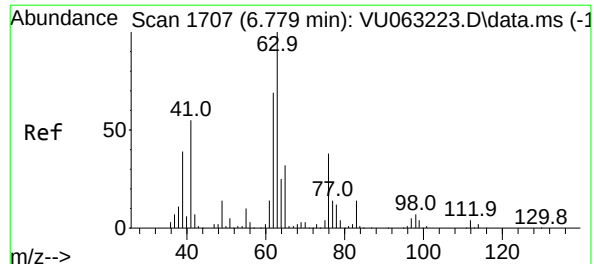
Tgt Ion:130 Resp: 244774

Ion Ratio Lower Upper

130 100

95 103.9 83.2 124.8





#38

1,2-Dichloropropane

Concen: 14.653 ug/l

RT: 6.775 min Scan# 1707

Delta R.T. -0.003 min

Lab File: VU063224.D

Acq: 10 Feb 2025 15:33

Instrument :

MSVOA_U

ClientSampleId :

VSTDICC015

Tgt Ion: 63 Resp: 273676

Ion Ratio Lower Upper

63 100

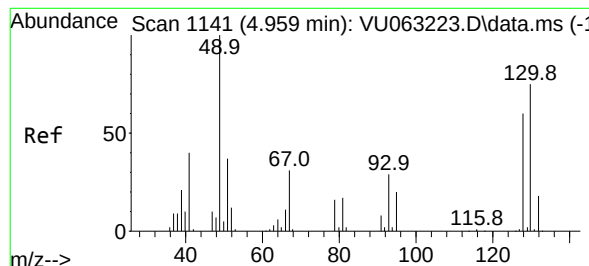
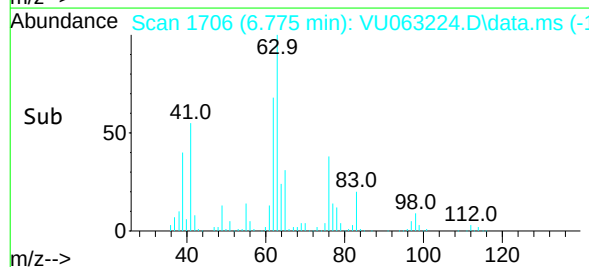
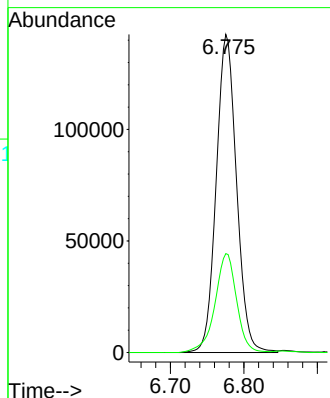
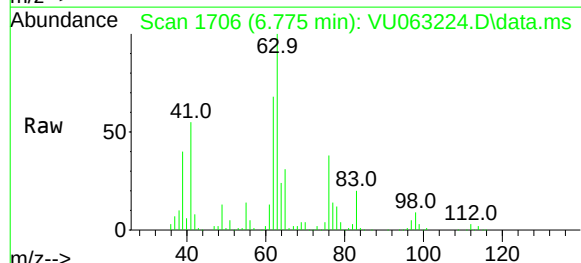
65 31.1 25.3 37.9

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#39

Methacrylonitrile

Concen: 16.908 ug/l

RT: 4.956 min Scan# 1140

Delta R.T. -0.003 min

Lab File: VU063224.D

Acq: 10 Feb 2025 15:33

Tgt Ion: 41 Resp: 79040

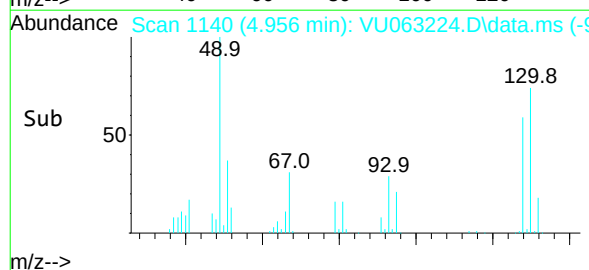
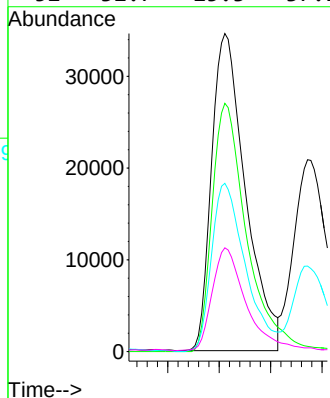
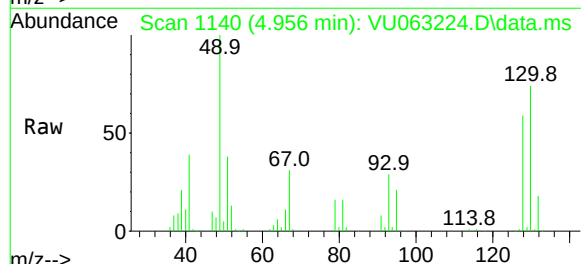
Ion Ratio Lower Upper

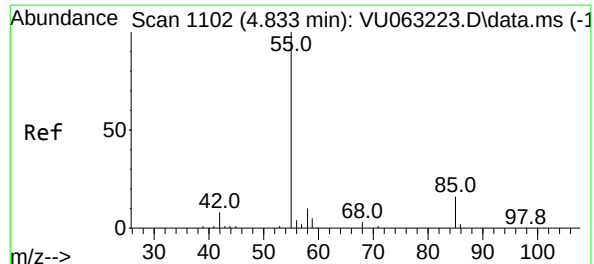
41 100

67 80.5 64.5 96.7

39 53.2 43.0 64.6

52 32.7 25.3 37.9





#40

Methyl acrylate

Concen: 15.616 ug/l

RT: 4.830 min Scan# 11

Delta R.T. -0.003 min

Lab File: VU063224.D

Acq: 10 Feb 2025 15:33

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC015

Tgt Ion: 55 Resp: 133276

Ion Ratio Lower Upper

55 100

85 17.1 13.3 19.9

58 8.6 7.3 10.9

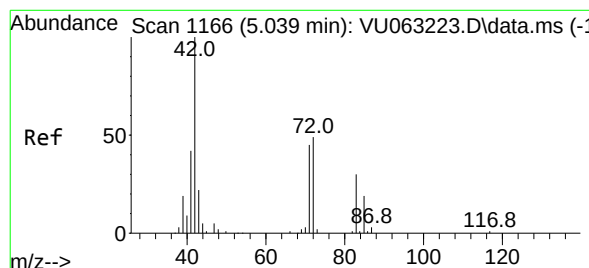
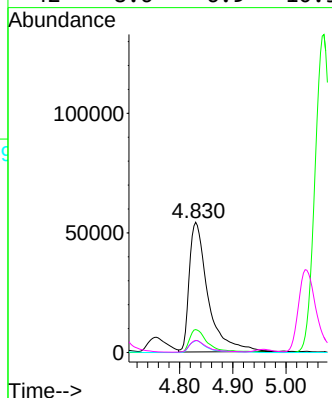
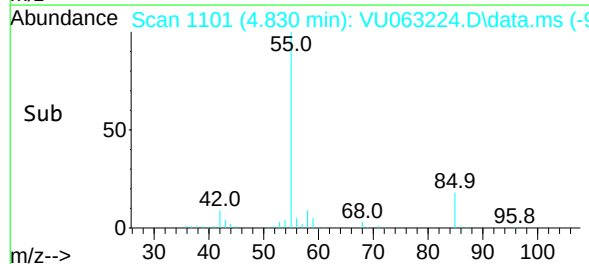
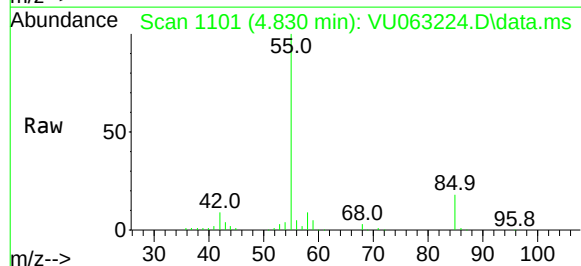
42 8.6 6.9 10.3

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#41

Tetrahydrofuran

Concen: 29.065 ug/l

RT: 5.036 min Scan# 1165

Delta R.T. -0.003 min

Lab File: VU063224.D

Acq: 10 Feb 2025 15:33

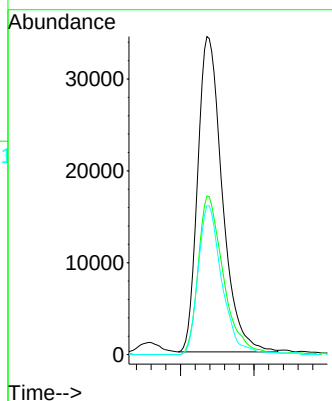
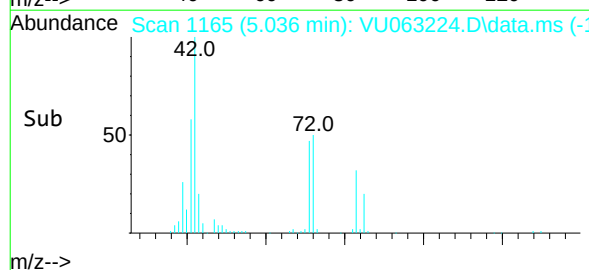
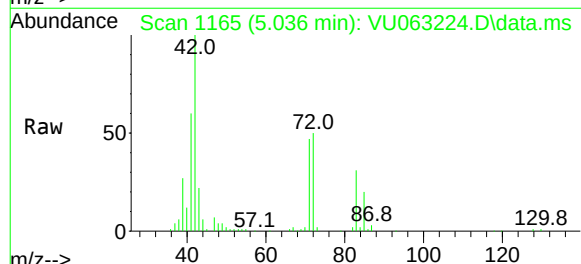
Tgt Ion: 42 Resp: 79845

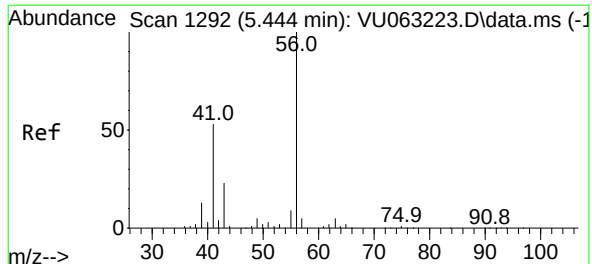
Ion Ratio Lower Upper

42 100

72 51.6 41.5 62.3

71 45.6 37.2 55.8





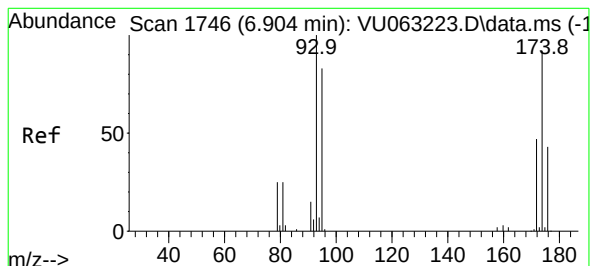
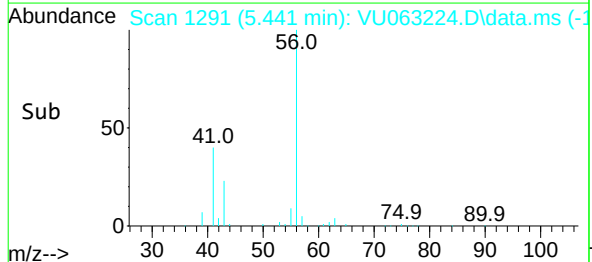
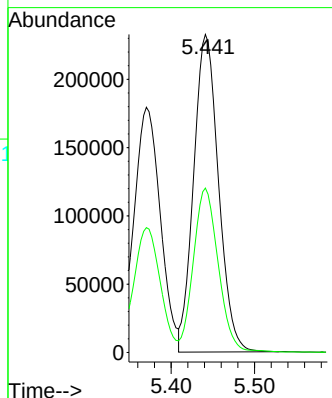
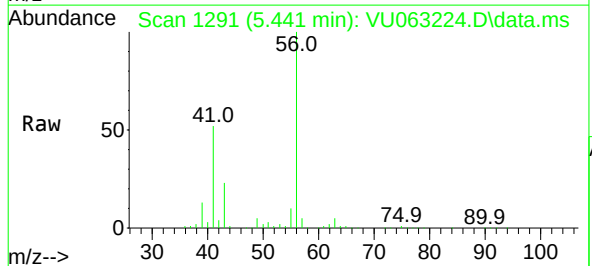
#42
1-Chlorobutane
Concen: 15.153 ug/l
RT: 5.441 min Scan# 1292
Delta R.T. -0.003 min
Lab File: VU063224.D
Acq: 10 Feb 2025 15:33

Instrument :
MSVOA_U
ClientSampleId :
VSTDICC015

Tgt Ion: 56 Resp: 481169
Ion Ratio Lower Upper
56 100
41 51.7 26.3 78.8

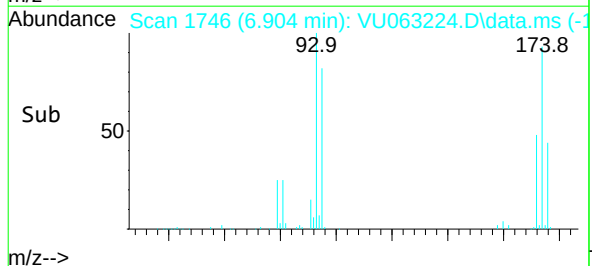
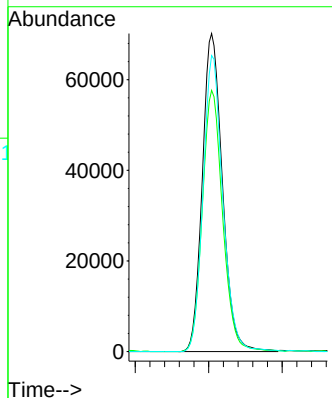
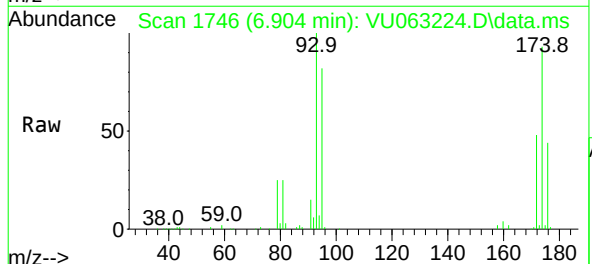
Manual Integrations
APPROVED

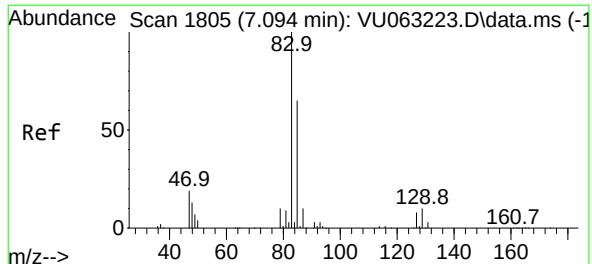
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#43
Dibromomethane
Concen: 14.114 ug/l
RT: 6.904 min Scan# 1746
Delta R.T. -0.000 min
Lab File: VU063224.D
Acq: 10 Feb 2025 15:33

Tgt Ion: 93 Resp: 133485
Ion Ratio Lower Upper
93 100
95 82.7 67.2 100.8
174 91.6 75.7 113.5





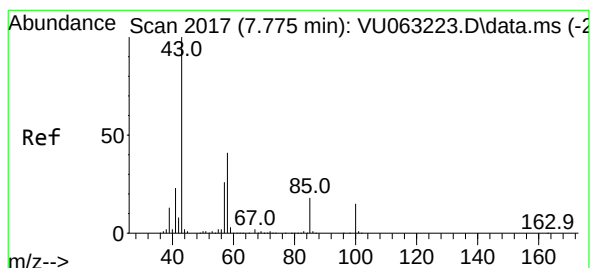
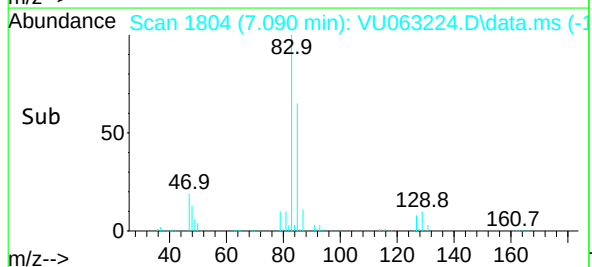
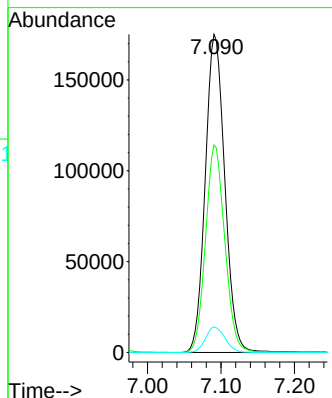
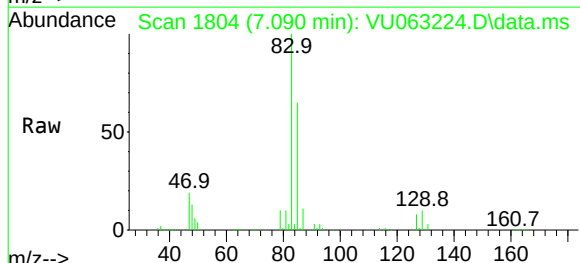
#44
Bromodichloromethane
Concen: 14.680 ug/l
RT: 7.090 min Scan# 1805
Delta R.T. -0.003 min
Lab File: VU063224.D
Acq: 10 Feb 2025 15:33

Instrument :
MSVOA_U
ClientSampleId :
VSTDICC015

Tgt Ion	83	Resp	323143
Ion	Ratio	Lower	Upper
83	100		
85	65.3	51.7	77.5
127	8.1	6.7	10.1

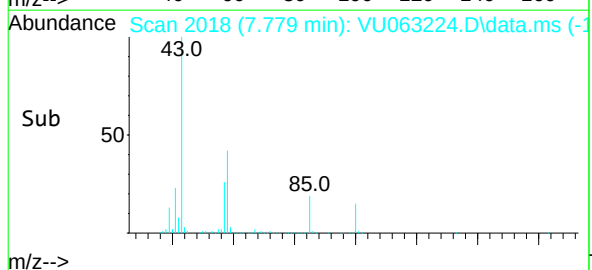
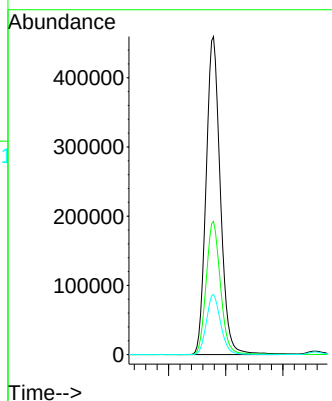
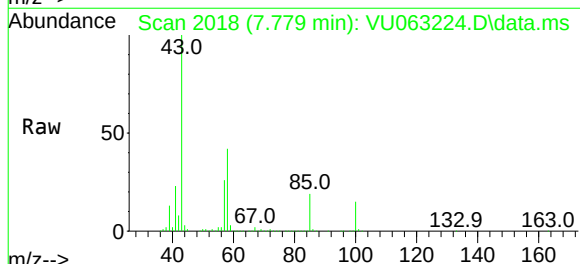
Manual Integrations
APPROVED

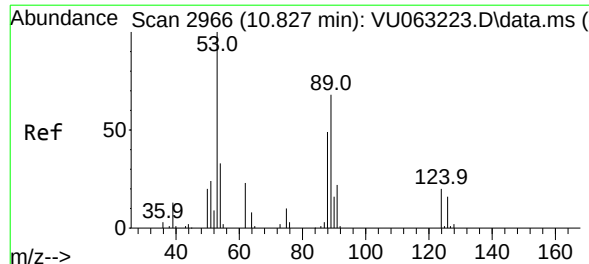
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#45
4-Methyl-2-Pentanone
Concen: 80.129 ug/l
RT: 7.779 min Scan# 2018
Delta R.T. 0.003 min
Lab File: VU063224.D
Acq: 10 Feb 2025 15:33

Tgt Ion	43	Resp	794494
Ion	Ratio	Lower	Upper
43	100		
58	42.1	20.8	62.5
85	19.0	14.8	22.2





#46

t-1,4-Dichloro-2-butene

Concen: 29.213 ug/l m

RT: 10.827 min Scan# 29

Delta R.T. -0.000 min

Lab File: VU063224.D

Acq: 10 Feb 2025 15:33

Instrument :

MSVOA_U

ClientSampleId :

VSTDICC015

Tgt Ion: 75 Resp: 143327

Ion Ratio Lower Upper

75 100

53 82.4 64.5 96.7

89 56.3 43.4 65.2

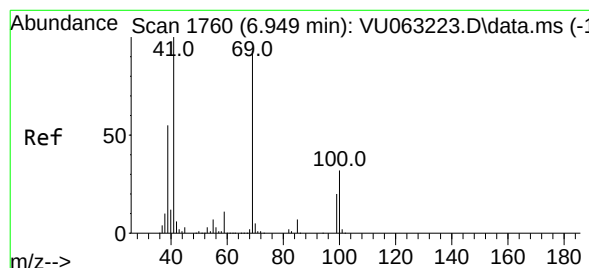
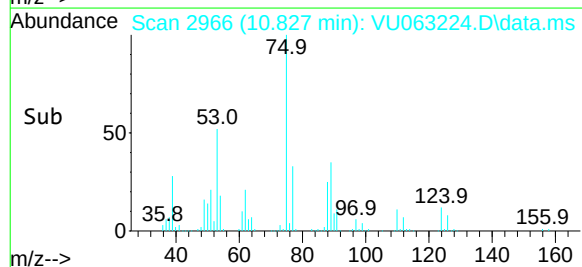
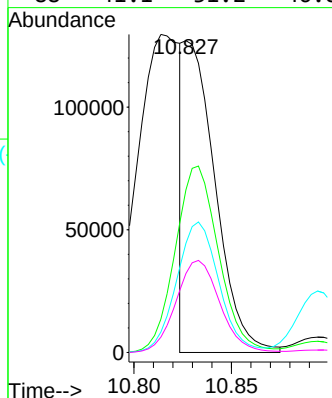
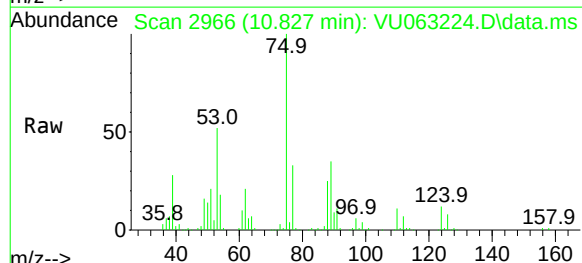
88 41.1 31.2 46.8

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#47

Methyl methacrylate

Concen: 32.232 ug/l

RT: 6.946 min Scan# 1759

Delta R.T. -0.003 min

Lab File: VU063224.D

Acq: 10 Feb 2025 15:33

Tgt Ion: 69 Resp: 256757

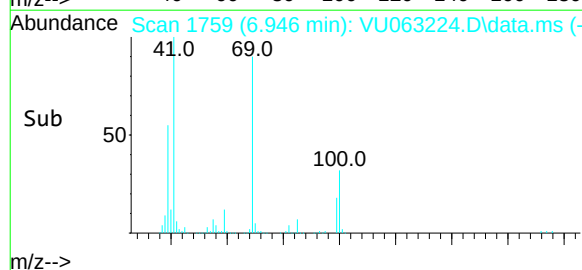
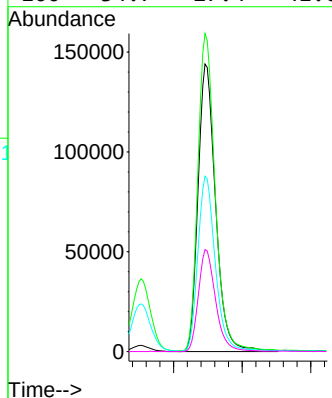
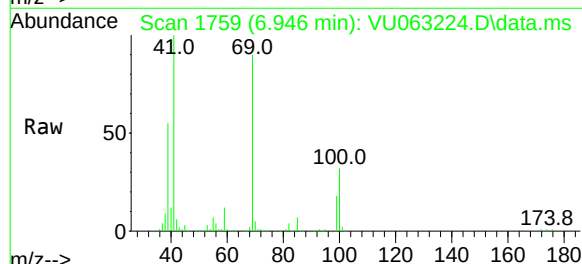
Ion Ratio Lower Upper

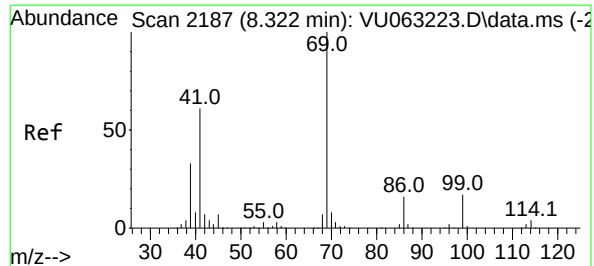
69 100

41 108.6 0.0 217.0

39 59.9 47.7 71.5

100 34.7 27.4 41.0





#48

Ethyl methacrylate

Concen: 17.244 ug/l

RT: 8.322 min Scan# 21

Delta R.T. -0.000 min

Lab File: VU063224.D

Acq: 10 Feb 2025 15:33

Instrument :

MSVOA_U

ClientSampleId :

VSTDICC015

Tgt Ion: 69 Resp: 257931

Ion Ratio Lower Upper

69 100

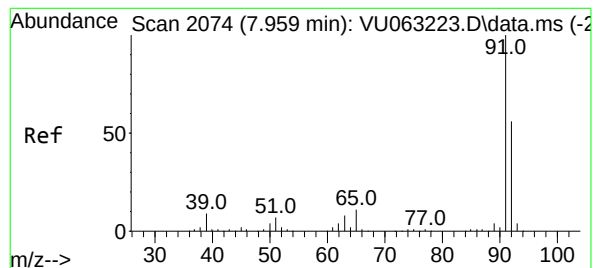
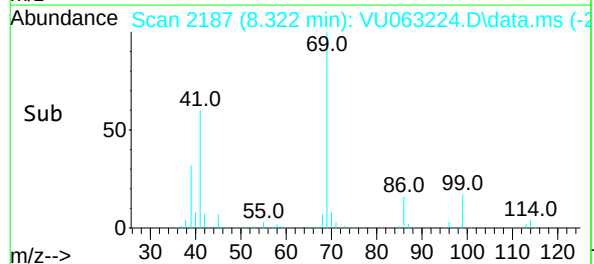
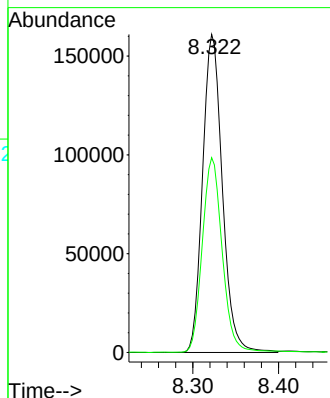
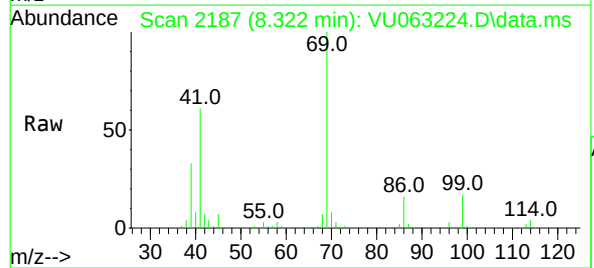
41 61.3 30.6 92.0

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#49

Toluene

Concen: 15.549 ug/l

RT: 7.955 min Scan# 2073

Delta R.T. -0.003 min

Lab File: VU063224.D

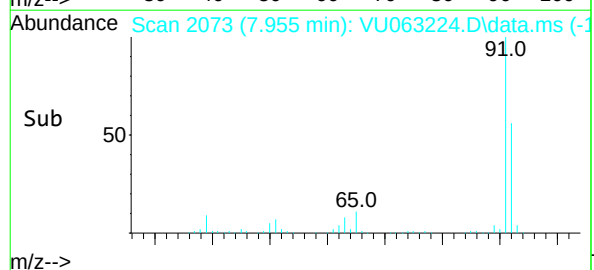
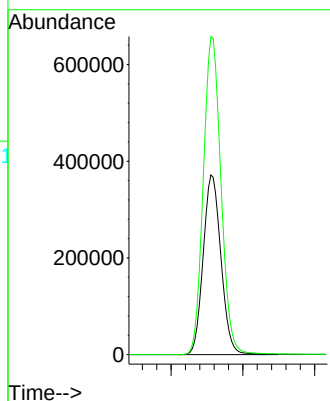
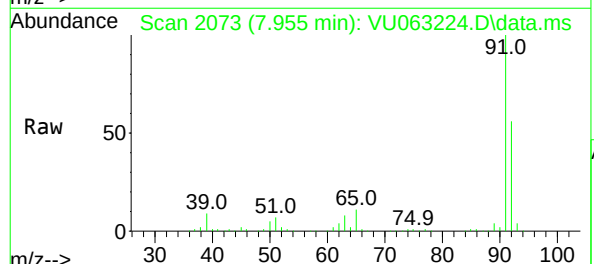
Acq: 10 Feb 2025 15:33

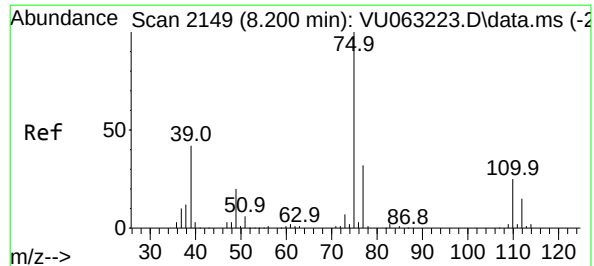
Tgt Ion: 92 Resp: 638079

Ion Ratio Lower Upper

92 100

91 177.1 141.8 212.6





#50

t-1,3-Dichloropropene

Concen: 15.891 ug/l

RT: 8.197 min Scan# 2149

Delta R.T. -0.003 min

Lab File: VU063224.D

Acq: 10 Feb 2025 15:33

Instrument :

MSVOA_U

ClientSampleId :

VSTDICC015

Tgt Ion: 75 Resp: 320246

Ion Ratio Lower Upper

75 100

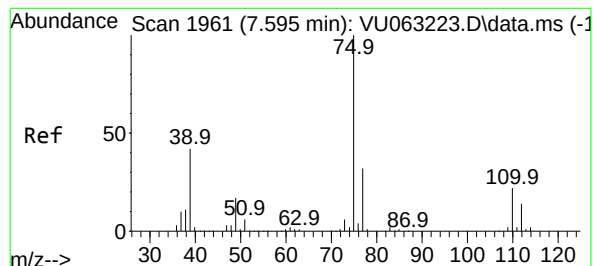
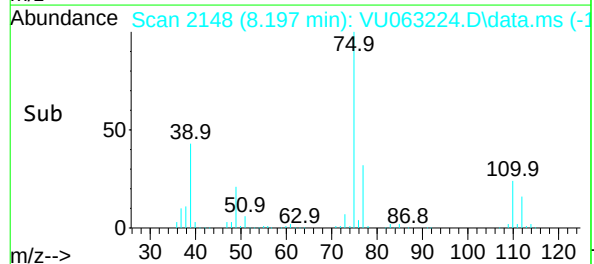
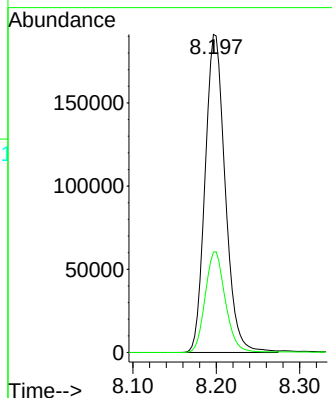
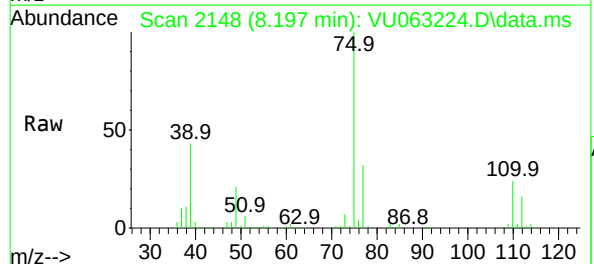
77 31.6 25.9 38.9

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#51

cis-1,3-Dichloropropene

Concen: 15.527 ug/l

RT: 7.595 min Scan# 1961

Delta R.T. -0.000 min

Lab File: VU063224.D

Acq: 10 Feb 2025 15:33

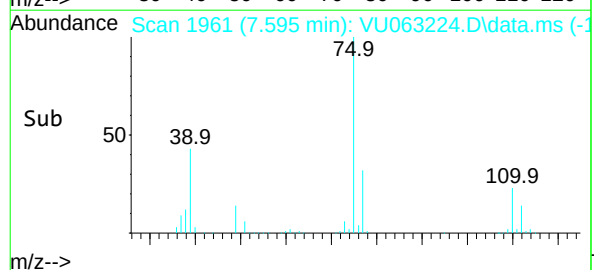
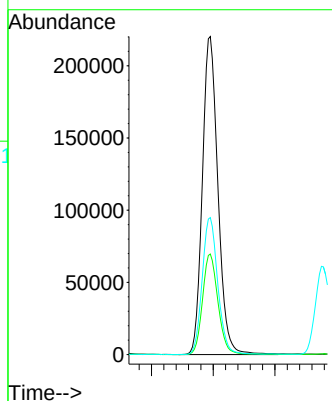
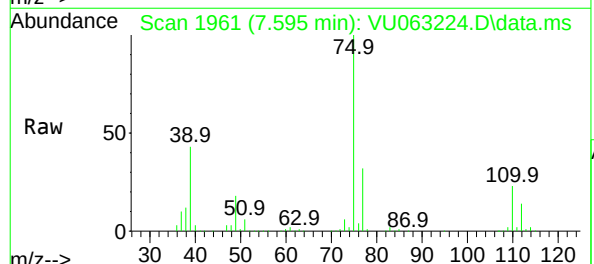
Tgt Ion: 75 Resp: 386542

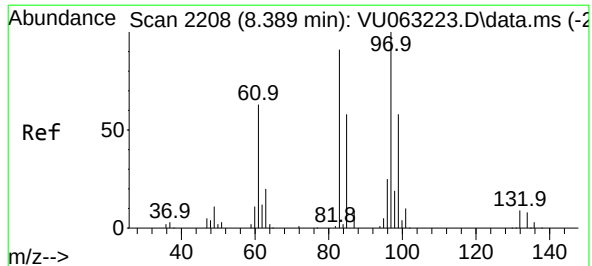
Ion Ratio Lower Upper

75 100

77 31.6 25.3 37.9

39 43.0 33.5 50.3





#52

1,1,2-Trichloroethane

Concen: 14.598 ug/l

RT: 8.386 min Scan# 2208

Delta R.T. -0.003 min

Lab File: VU063224.D

Acq: 10 Feb 2025 15:33

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC015

Tgt Ion: 97 Resp: 186154

Ion Ratio Lower Upper

97 100

83 89.6 73.0 109.4

85 57.5 46.3 69.5

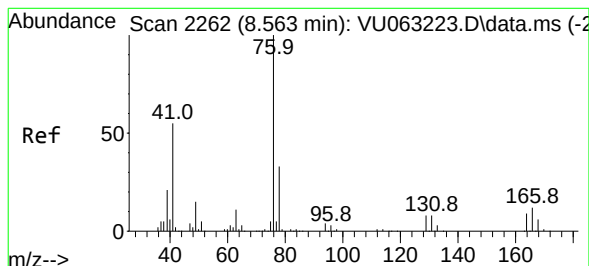
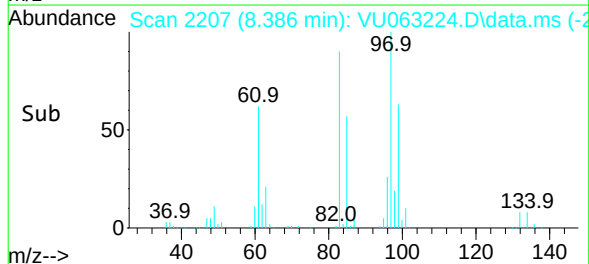
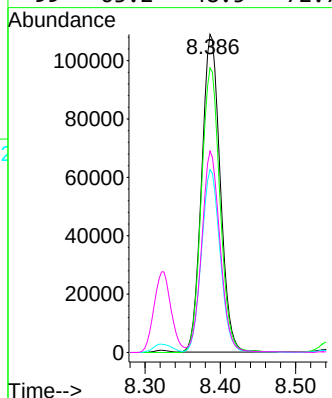
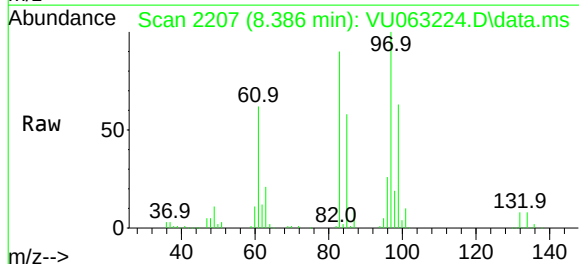
99 63.2 48.5 72.7

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#53

1,3-Dichloropropane

Concen: 14.594 ug/l

RT: 8.563 min Scan# 2262

Delta R.T. -0.000 min

Lab File: VU063224.D

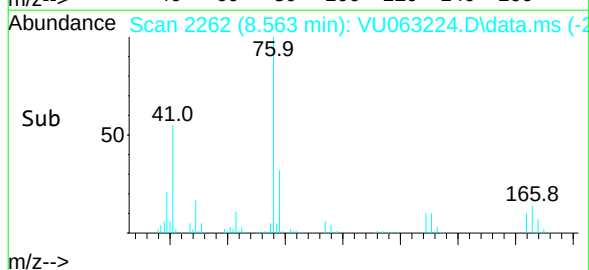
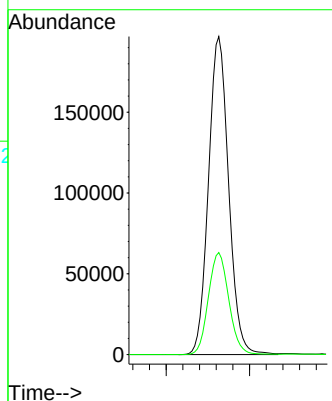
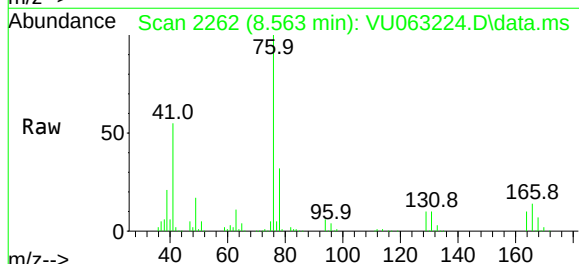
Acq: 10 Feb 2025 15:33

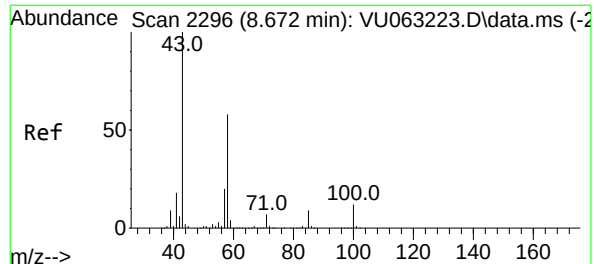
Tgt Ion: 76 Resp: 330381

Ion Ratio Lower Upper

76 100

78 32.6 26.3 39.5





#54

2-Hexanone

Concen: 82.409 ug/l

RT: 8.672 min Scan# 2296

Delta R.T. -0.000 min

Lab File: VU063224.D

Acq: 10 Feb 2025 15:33

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC015

Tgt Ion: 43 Resp: 557608

Ion Ratio Lower Upper

43 100

58 58.4 38.0 78.0

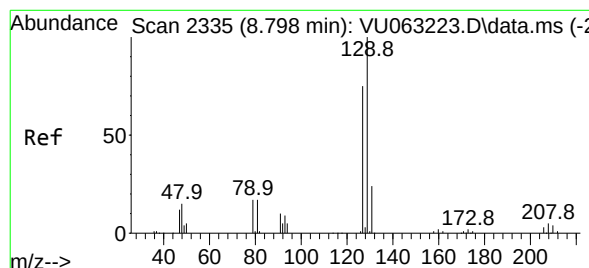
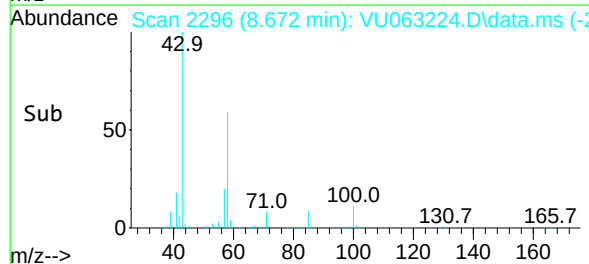
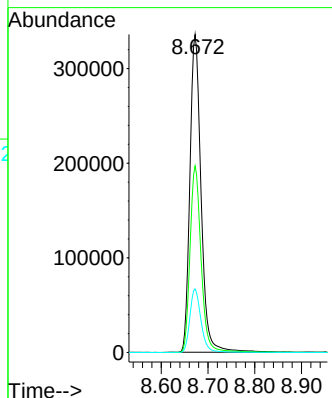
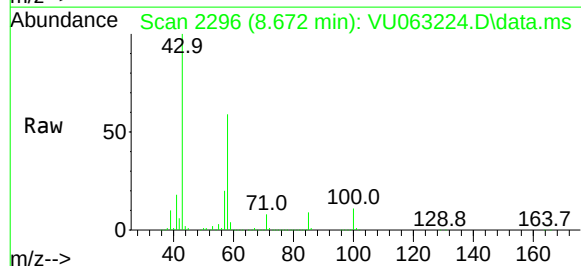
57 19.8 0.0 39.1

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#55

Dibromochloromethane

Concen: 14.939 ug/l

RT: 8.798 min Scan# 2335

Delta R.T. -0.000 min

Lab File: VU063224.D

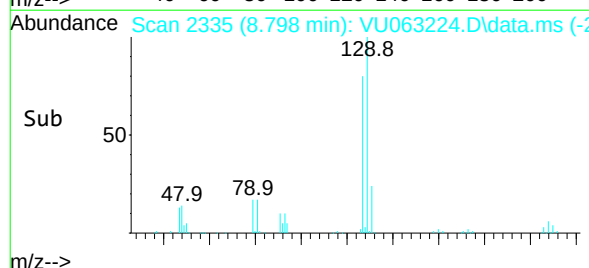
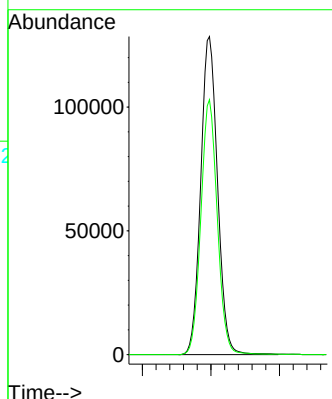
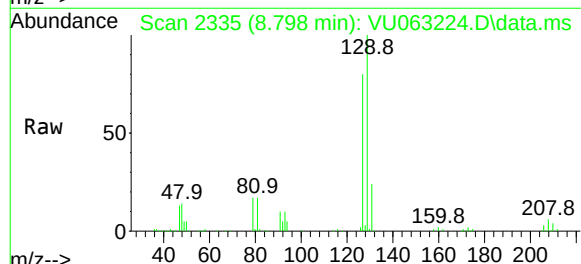
Acq: 10 Feb 2025 15:33

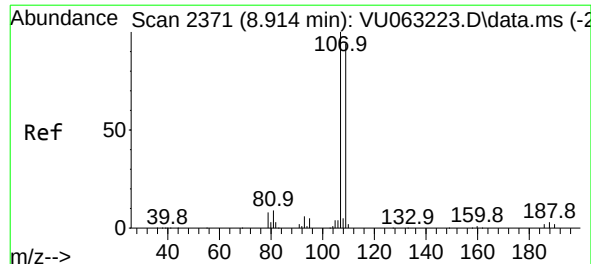
Tgt Ion:129 Resp: 219151

Ion Ratio Lower Upper

129 100

127 78.2 60.4 90.6





#56

1,2-Dibromoethane

Concen: 14.932 ug/l

RT: 8.910 min Scan# 2371

Delta R.T. -0.003 min

Lab File: VU063224.D

Acq: 10 Feb 2025 15:33

Instrument :

MSVOA_U

ClientSampleId :

VSTDICC015

Tgt Ion: 107 Resp: 178579

Ion Ratio Lower Upper

107 100

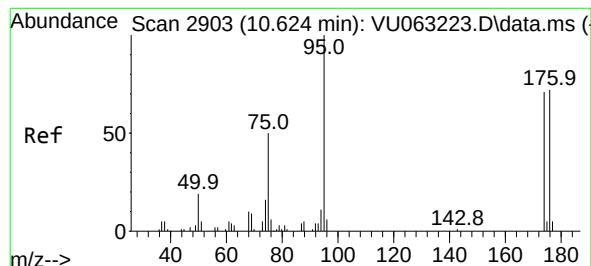
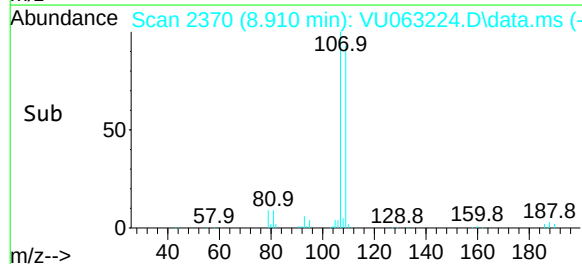
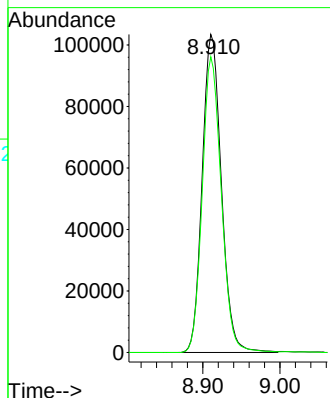
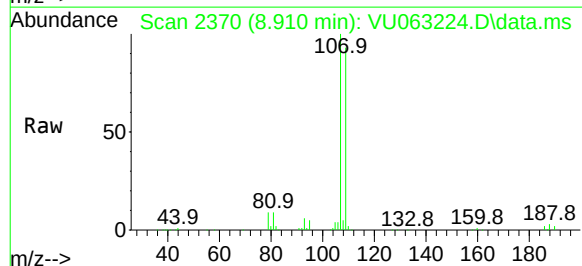
109 92.5 0.0 187.8

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#57

4-Bromofluorobenzene

Concen: 1.080 ug/l

RT: 10.624 min Scan# 2903

Delta R.T. -0.000 min

Lab File: VU063224.D

Acq: 10 Feb 2025 15:33

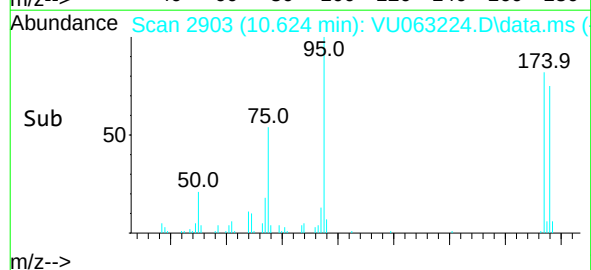
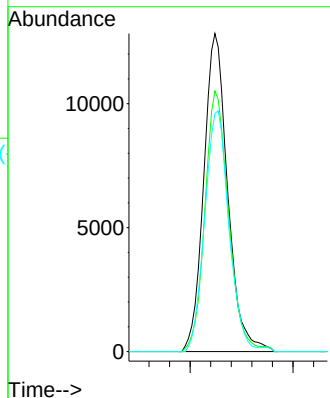
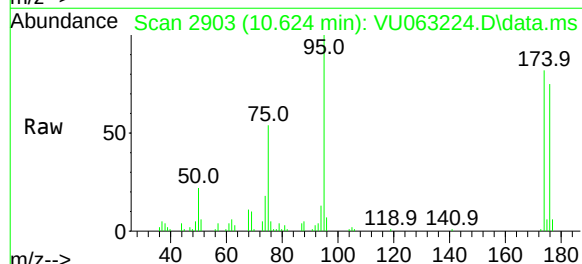
Tgt Ion: 95 Resp: 20689

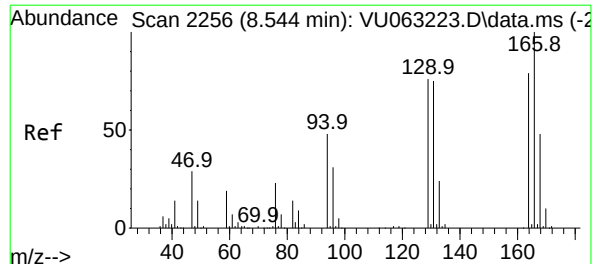
Ion Ratio Lower Upper

95 100

174 81.3 58.6 88.0

176 77.0 58.2 87.4





#58

Tetrachloroethene

Concen: 13.998 ug/l

RT: 8.541 min Scan# 2256

Delta R.T. -0.003 min

Lab File: VU063224.D

Acq: 10 Feb 2025 15:33

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC015

Tgt Ion:164 Resp: 195759

Ion Ratio Lower Upper

164 100

166 128.0 101.4 152.0

129 97.4 77.0 115.4

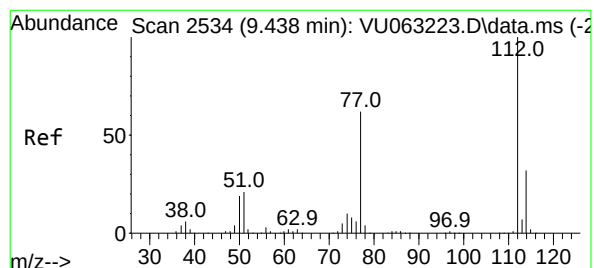
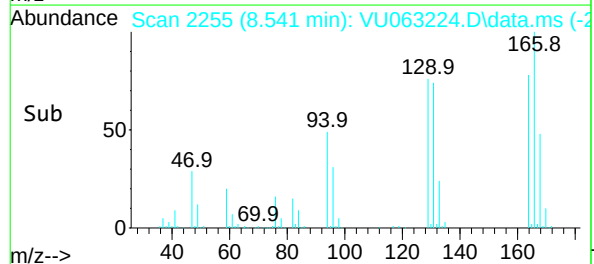
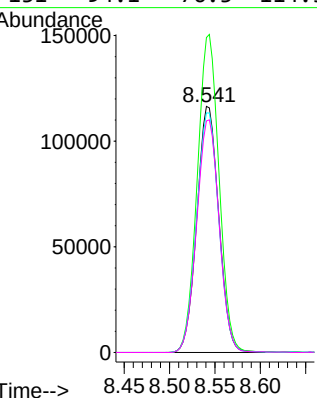
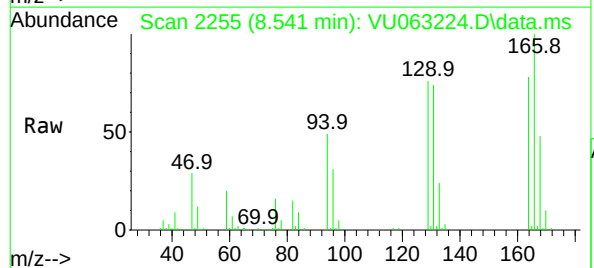
131 94.1 76.3 114.5

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#59

Chlorobenzene

Concen: 15.241 ug/l

RT: 9.434 min Scan# 2533

Delta R.T. -0.003 min

Lab File: VU063224.D

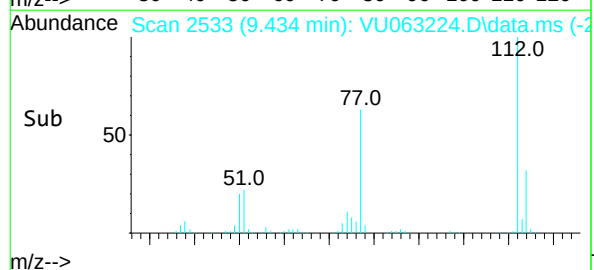
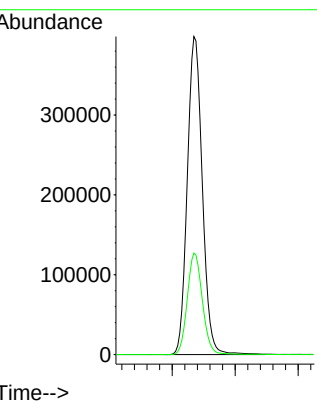
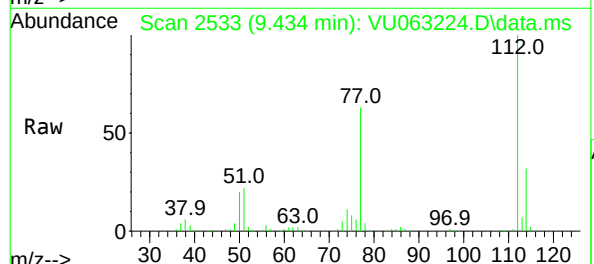
Acq: 10 Feb 2025 15:33

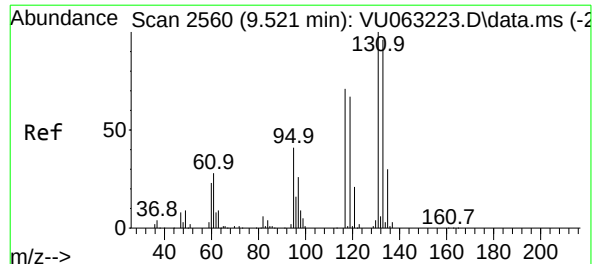
Tgt Ion:112 Resp: 659996

Ion Ratio Lower Upper

112 100

114 31.9 25.7 38.5





#60

1,1,1,2-Tetrachloroethane

Concen: 15.005 ug/l

RT: 9.521 min Scan# 2560

Delta R.T. -0.000 min

Lab File: VU063224.D

Acq: 10 Feb 2025 15:33

Instrument :

MSVOA_U

ClientSampleId :

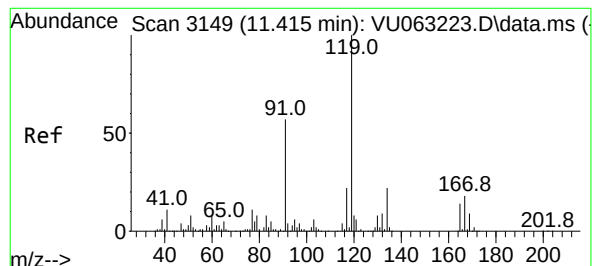
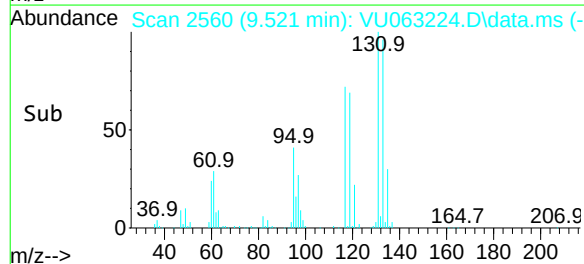
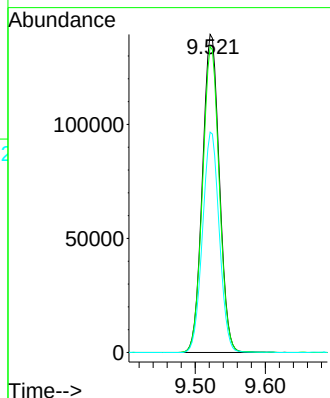
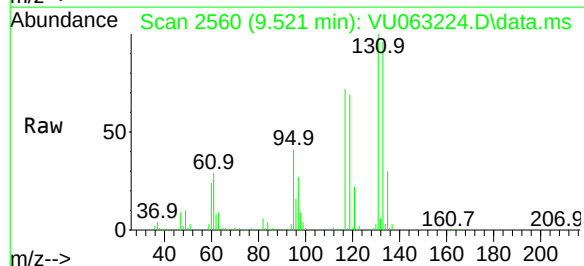
VSTDIC015

Tgt Ion:	131	Resp:	233573
Ion Ratio	Lower	Upper	
131	100		
133	95.3	76.7	115.1
119	68.6	54.4	81.6

Manual Integrations
APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#61

Pentachloroethane

Concen: 15.642 ug/l

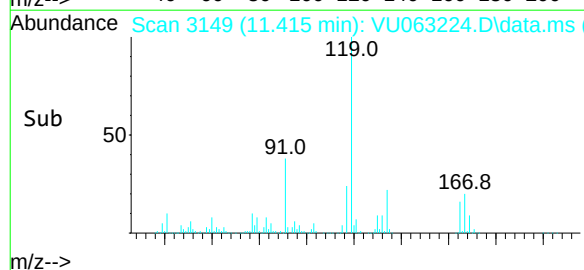
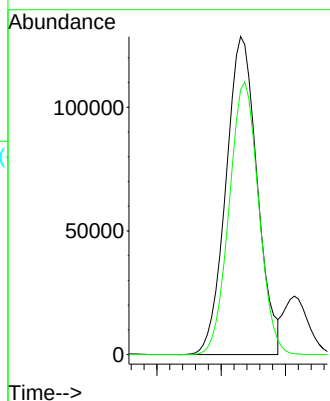
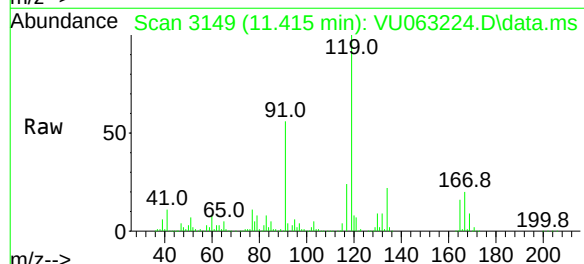
RT: 11.415 min Scan# 3149

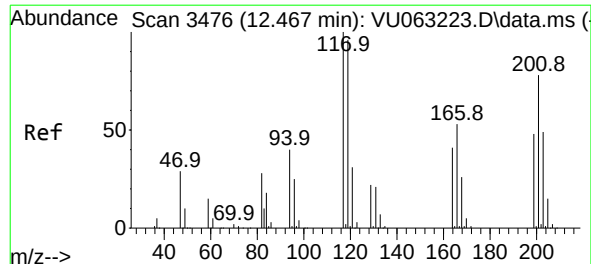
Delta R.T. -0.000 min

Lab File: VU063224.D

Acq: 10 Feb 2025 15:33

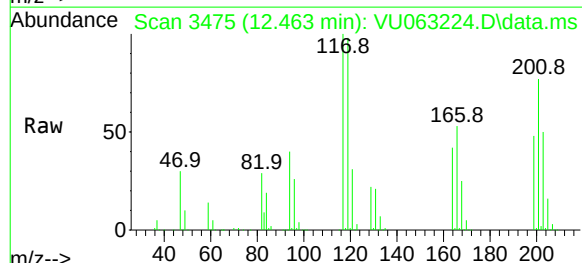
Tgt Ion:	117	Resp:	217502
Ion Ratio	Lower	Upper	
117	100		
167	80.9	65.0	97.6





#62
Hexachloroethane
Concen: 16.451 ug/l
RT: 12.463 min Scan# 3476
Delta R.T. -0.003 min
Lab File: VU063224.D
Acq: 10 Feb 2025 15:33

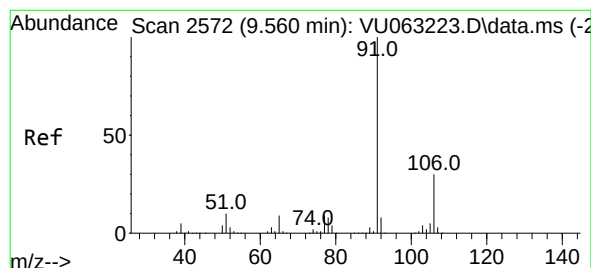
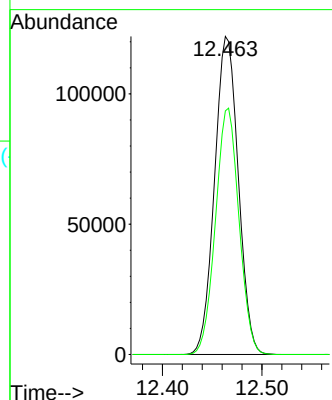
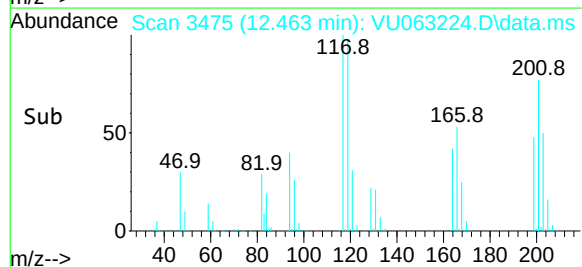
Instrument :
MSVOA_U
ClientSampleId :
VSTDICC015



Tgt Ion: 117 Resp: 202372
Ion Ratio Lower Upper
117 100
201 76.5 61.3 91.9

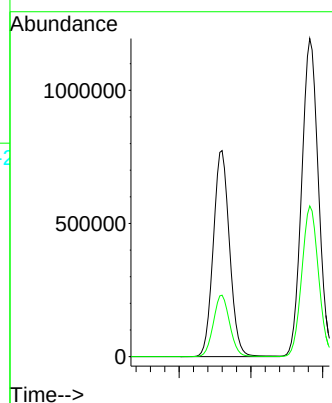
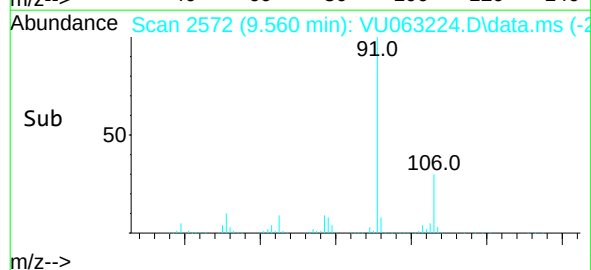
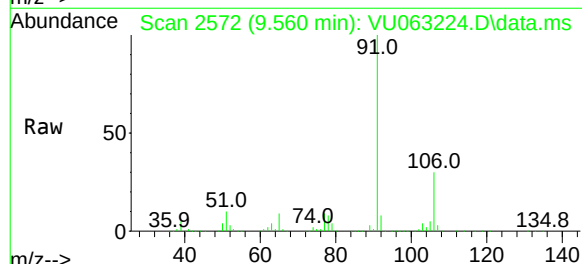
Manual Integrations
APPROVED

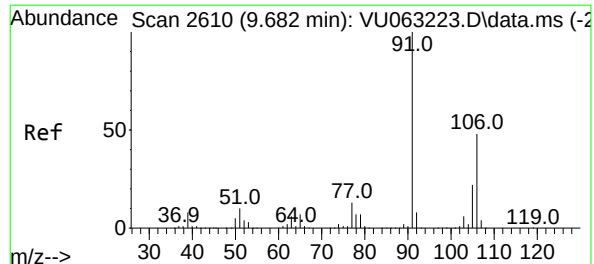
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#63
Ethyl Benzene
Concen: 16.321 ug/l
RT: 9.560 min Scan# 2572
Delta R.T. -0.000 min
Lab File: VU063224.D
Acq: 10 Feb 2025 15:33

Tgt Ion: 91 Resp: 1218926
Ion Ratio Lower Upper
91 100
106 29.8 24.2 36.2





#64

m/p-Xylenes

Concen: 32.960 ug/l

RT: 9.682 min Scan# 2610

Delta R.T. -0.000 min

Lab File: VU063224.D

Acq: 10 Feb 2025 15:33

Instrument :

MSVOA_U

ClientSampleId :

VSTDICC015

Tgt Ion:106 Resp: 919492

Ion Ratio Lower Upper

106 100

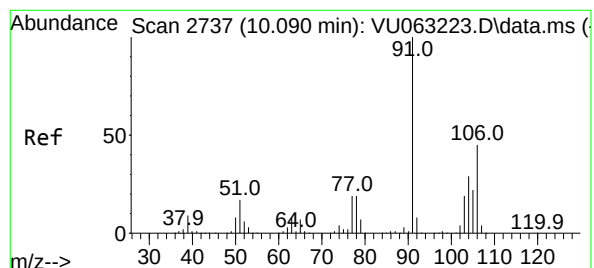
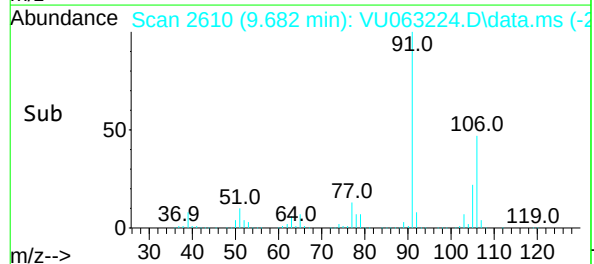
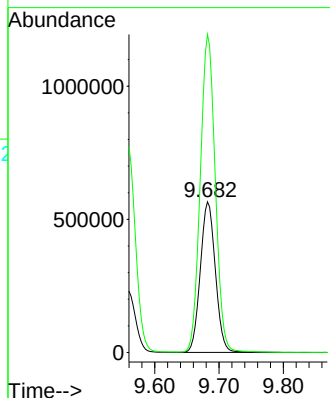
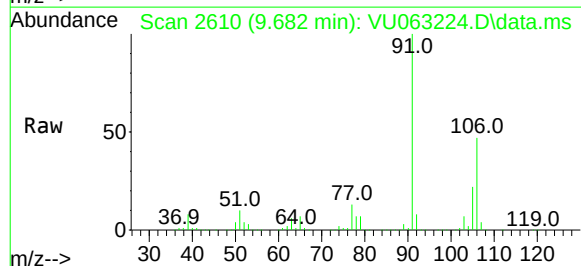
91 210.6 166.9 250.3

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#65

o-Xylene

Concen: 16.379 ug/l

RT: 10.090 min Scan# 2737

Delta R.T. -0.000 min

Lab File: VU063224.D

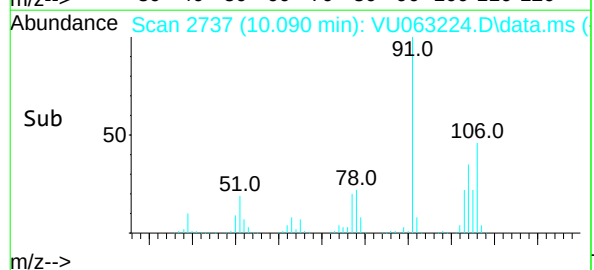
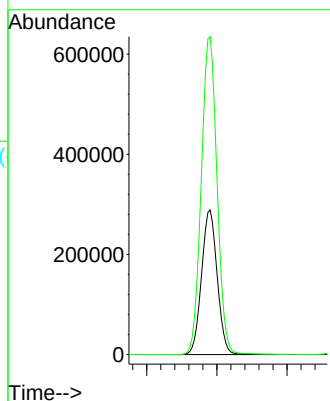
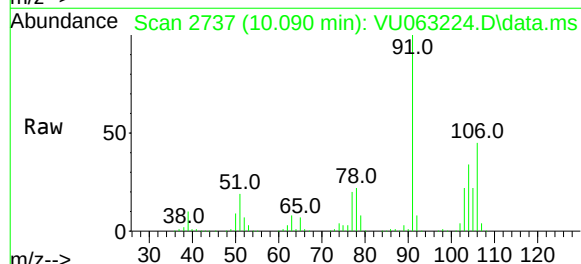
Acq: 10 Feb 2025 15:33

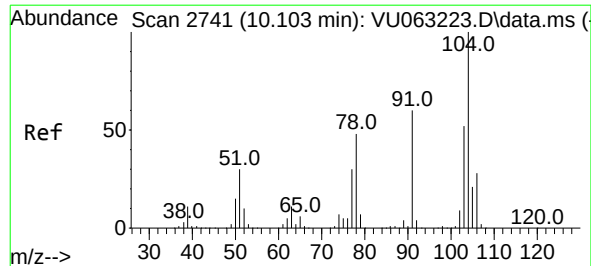
Tgt Ion:106 Resp: 447318

Ion Ratio Lower Upper

106 100

91 221.7 110.9 332.9





#66

Styrene

Concen: 17.269 ug/l

RT: 10.103 min Scan# 2741

Delta R.T. -0.000 min

Lab File: VU063224.D

Acq: 10 Feb 2025 15:33

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC015

Tgt Ion:104 Resp: 750530

Ion Ratio Lower Upper

104 100

78 51.7 41.2 61.8

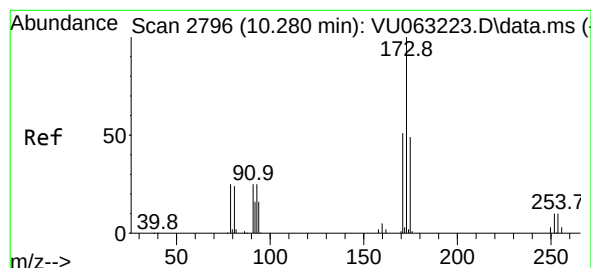
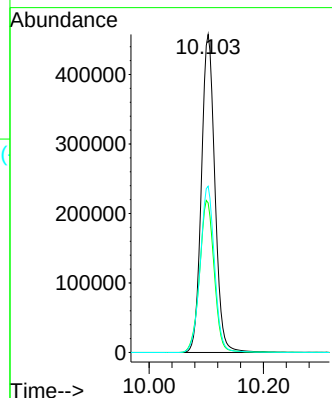
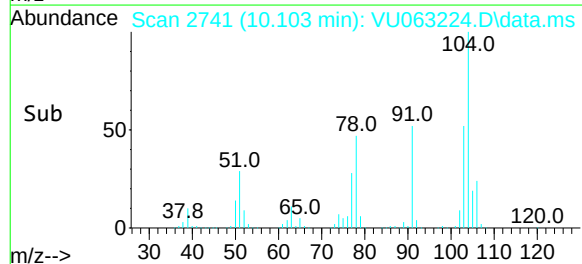
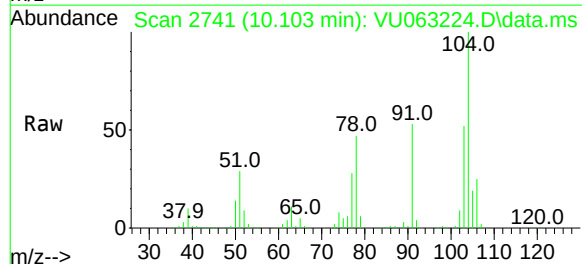
103 55.7 44.8 67.2

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#67

Bromoform

Concen: 15.814 ug/l

RT: 10.280 min Scan# 2796

Delta R.T. -0.000 min

Lab File: VU063224.D

Acq: 10 Feb 2025 15:33

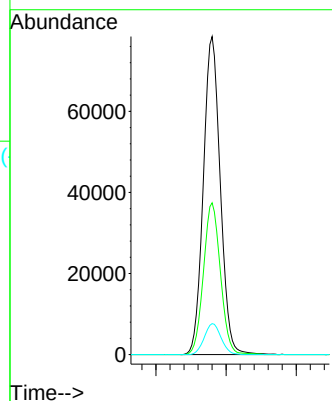
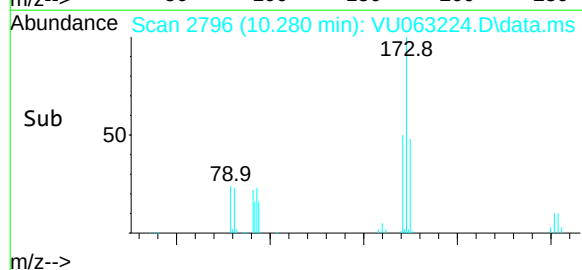
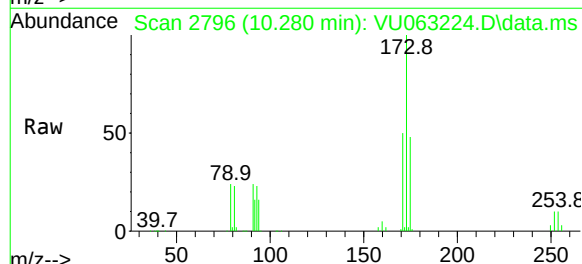
Tgt Ion:173 Resp: 131670

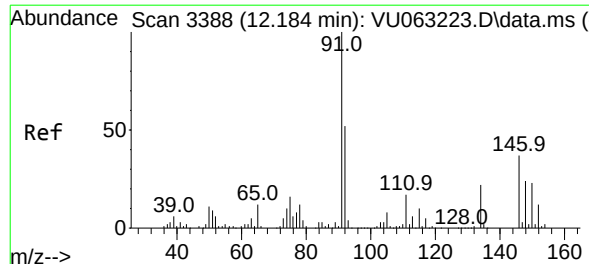
Ion Ratio Lower Upper

173 100

175 47.8 39.0 58.4

254 9.7 7.7 11.5





#68

1,2-Dichlorobenzene-d4

Concen: 1.130 ug/l

RT: 12.184 min Scan# 3388

Delta R.T. -0.000 min

Lab File: VU063224.D

Acq: 10 Feb 2025 15:33

Tgt Ion:152 Resp: 22516

Ion Ratio Lower Upper

152 100

115 152.9 0.0 275.2

150 390.7 0.0 658.4

Instrument :

MSVOA_U

ClientSampleId :

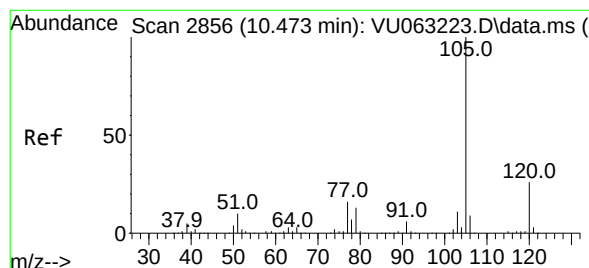
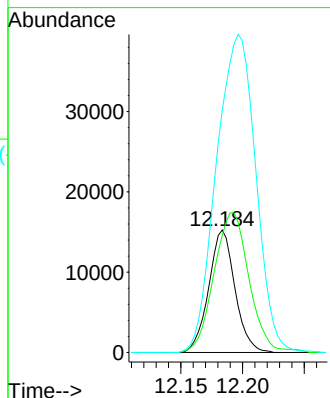
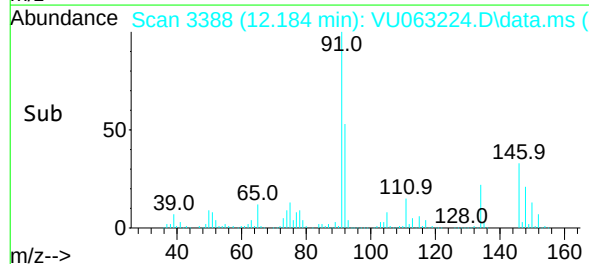
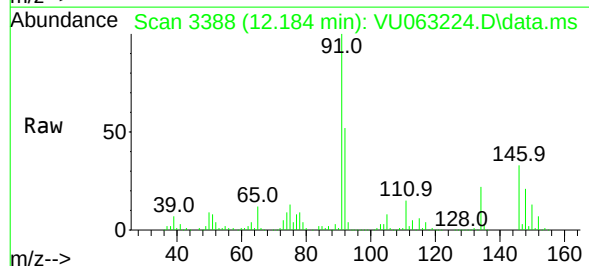
VSTDIC015

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#69

Isopropylbenzene

Concen: 16.638 ug/l

RT: 10.473 min Scan# 2856

Delta R.T. -0.000 min

Lab File: VU063224.D

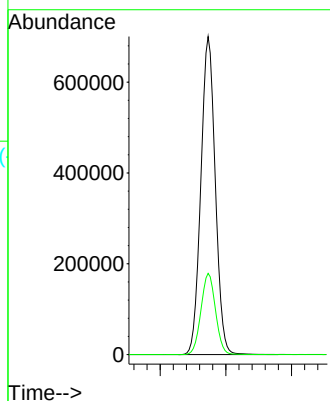
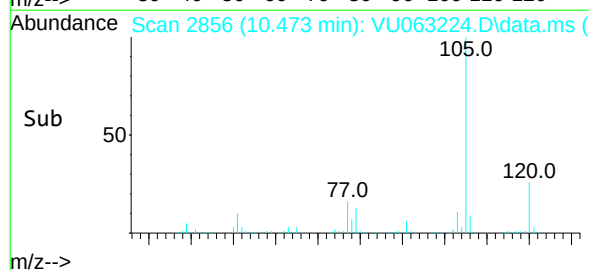
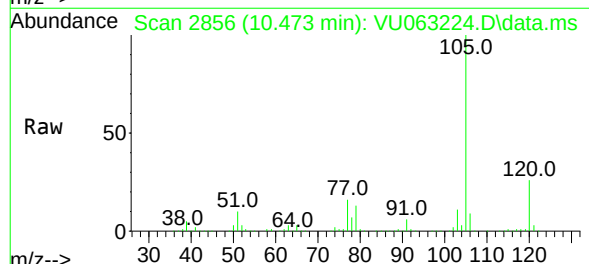
Acq: 10 Feb 2025 15:33

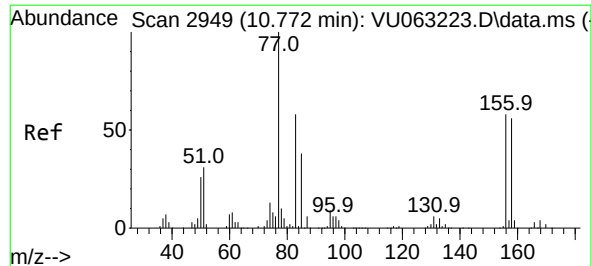
Tgt Ion:105 Resp: 1068251

Ion Ratio Lower Upper

105 100

120 25.7 12.8 38.4





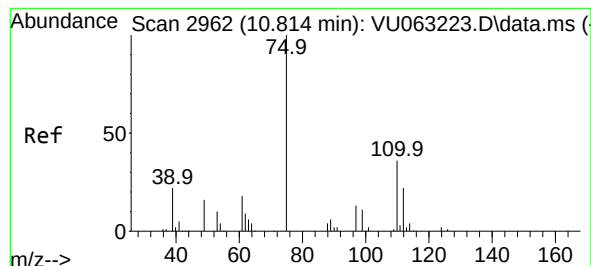
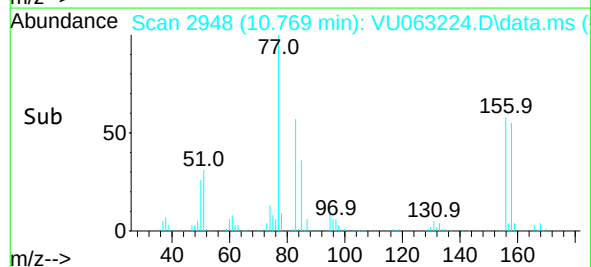
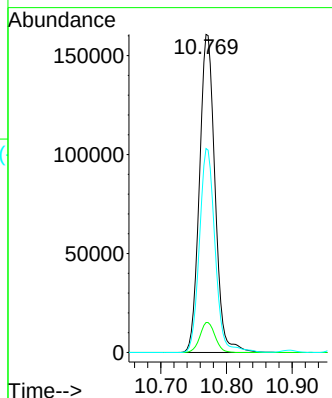
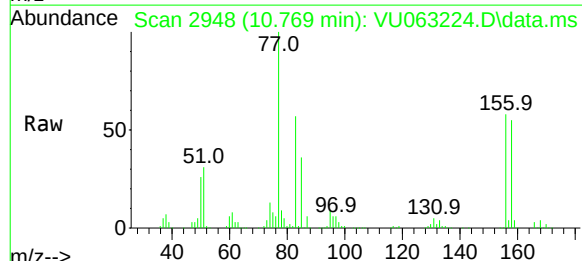
1,1,2,2-Tetrachloroethane
Concen: 15.376 ug/l
RT: 10.769 min Scan# 2949
Delta R.T. -0.003 min
Lab File: VU063224.D
Acq: 10 Feb 2025 15:33

Instrument :
MSVOA_U
ClientSampleId :
VSTDICC015

Tgt Ion	83	Resp	264258
Ion	Ratio	Lower	Upper
83	100		
131	9.2	7.4	11.0
85	64.5	51.8	77.8

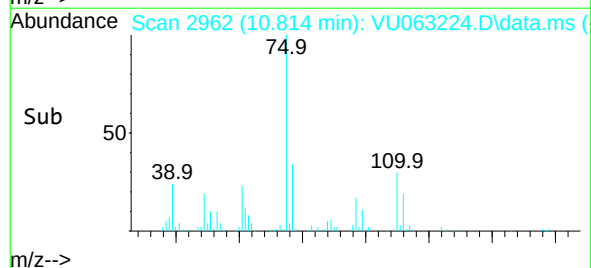
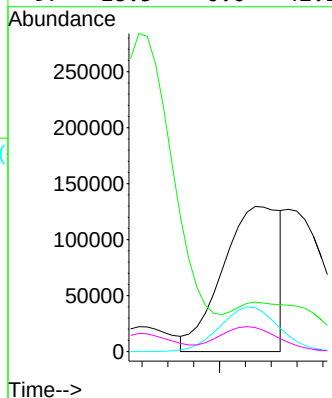
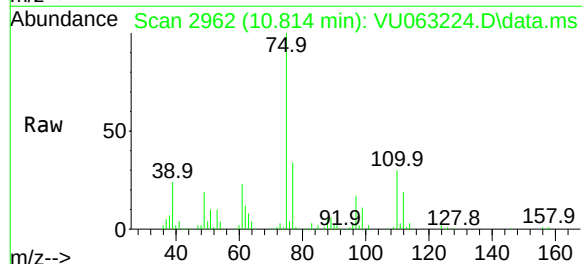
Manual Integrations
APPROVED

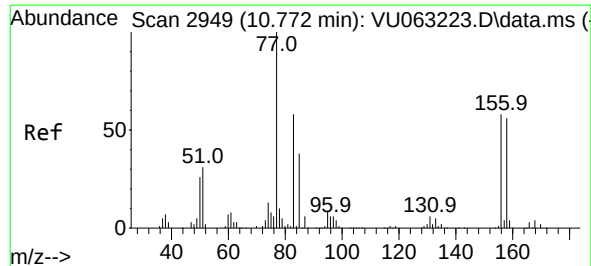
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



1,2,3-Trichloropropane
Concen: 15.363 ug/l m
RT: 10.814 min Scan# 2962
Delta R.T. -0.000 min
Lab File: VU063224.D
Acq: 10 Feb 2025 15:33

Tgt Ion	75	Resp	200210
Ion	Ratio	Lower	Upper
75	100		
77	47.8	0.0	0.0#
110	31.9	0.0	77.0
97	18.5	0.0	42.2





#72

Bromobenzene

Concen: 15.799 ug/l

RT: 10.772 min Scan# 2949

Delta R.T. -0.000 min

Lab File: VU063224.D

Acq: 10 Feb 2025 15:33

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC015

Tgt Ion:156 Resp: 273315

Ion Ratio Lower Upper

156 100

77 174.0 0.0 343.6

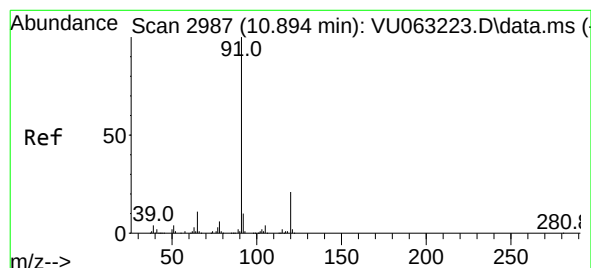
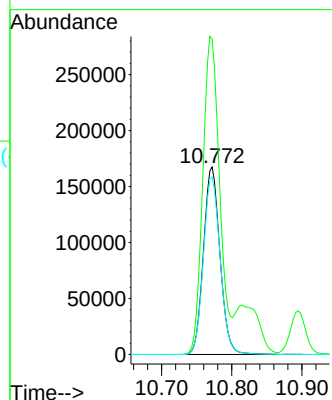
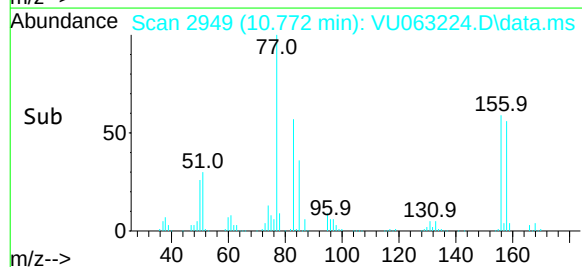
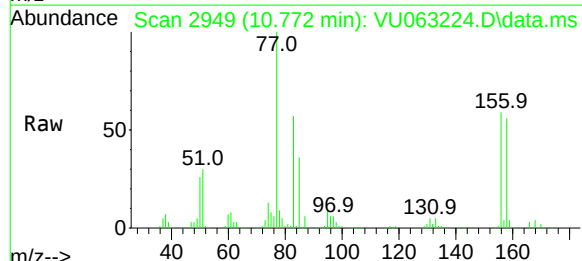
158 96.2 0.0 193.0

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#73

n-propylbenzene

Concen: 17.012 ug/l

RT: 10.894 min Scan# 2987

Delta R.T. -0.000 min

Lab File: VU063224.D

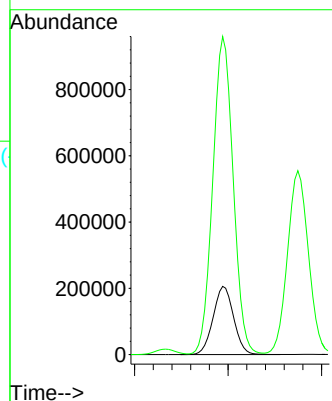
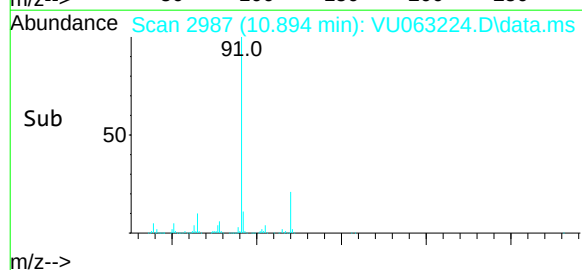
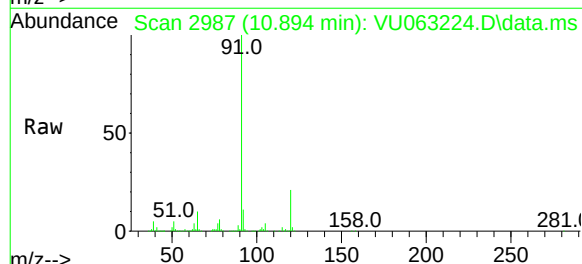
Acq: 10 Feb 2025 15:33

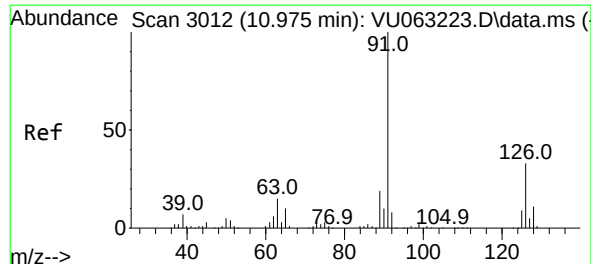
Tgt Ion:120 Resp: 312734

Ion Ratio Lower Upper

120 100

91 462.7 369.8 554.6





#74

2-Chlorotoluene

Concen: 16.499 ug/l

RT: 10.975 min Scan# 3012

Delta R.T. -0.000 min

Lab File: VU063224.D

Acq: 10 Feb 2025 15:33

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC015

Tgt Ion:126 Resp: 279514

Ion Ratio Lower Upper

126 100

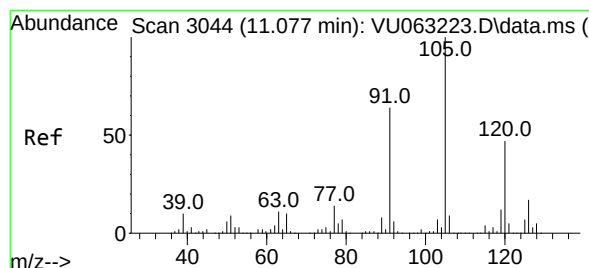
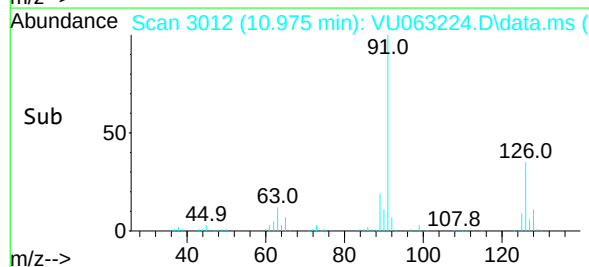
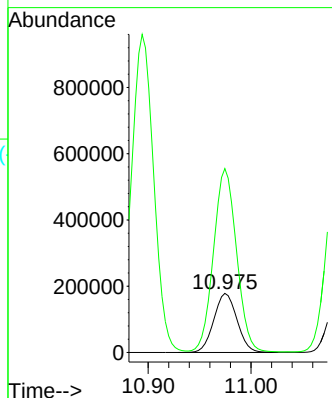
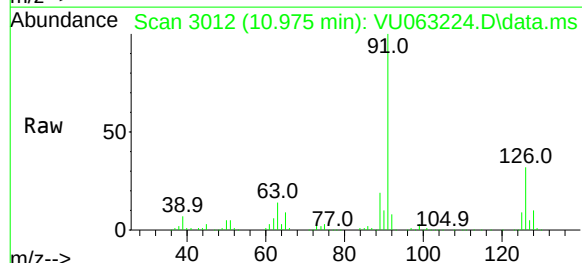
91 307.9 0.0 623.8

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#75

1,3,5-Trimethylbenzene

Concen: 17.122 ug/l

RT: 11.077 min Scan# 3044

Delta R.T. -0.000 min

Lab File: VU063224.D

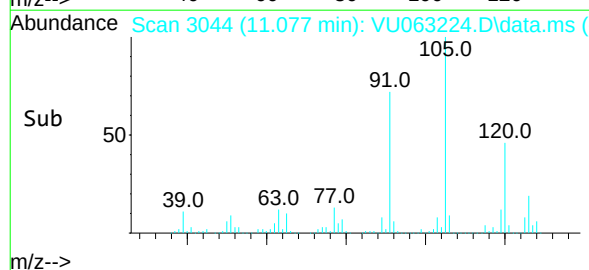
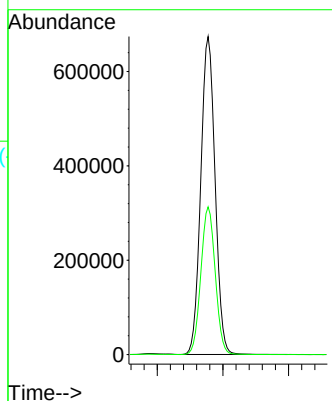
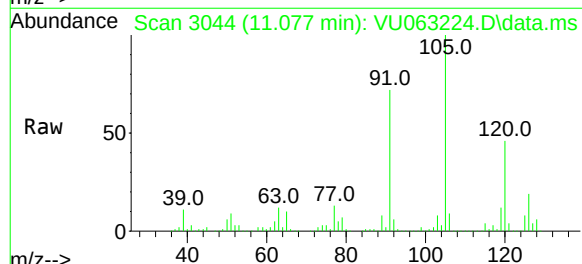
Acq: 10 Feb 2025 15:33

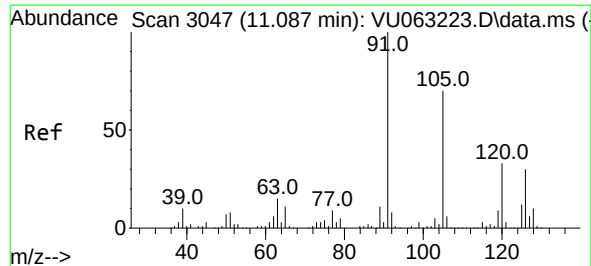
Tgt Ion:105 Resp: 1018594

Ion Ratio Lower Upper

105 100

120 46.7 37.3 55.9





#76

4-Chlorotoluene

Concen: 16.404 ug/l

RT: 11.087 min Scan# 3047

Delta R.T. -0.000 min

Lab File: VU063224.D

Acq: 10 Feb 2025 15:33

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC015

Tgt Ion:126 Resp: 284996

Ion Ratio Lower Upper

126 100

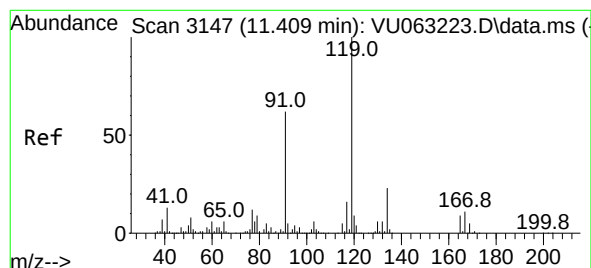
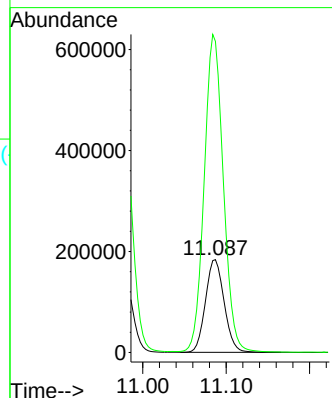
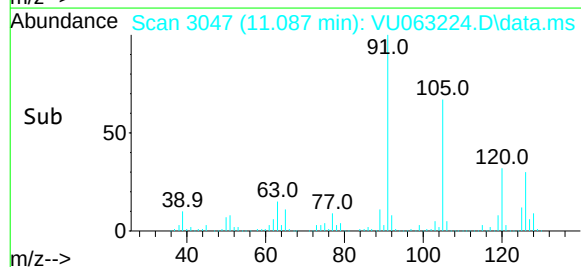
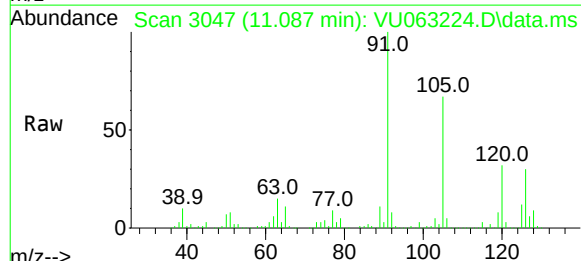
91 351.8 0.0 703.6

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#77

tert-Butylbenzene

Concen: 16.693 ug/l

RT: 11.409 min Scan# 3147

Delta R.T. -0.000 min

Lab File: VU063224.D

Acq: 10 Feb 2025 15:33

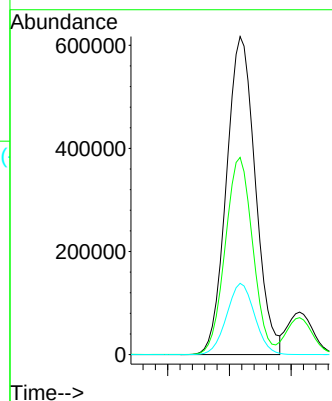
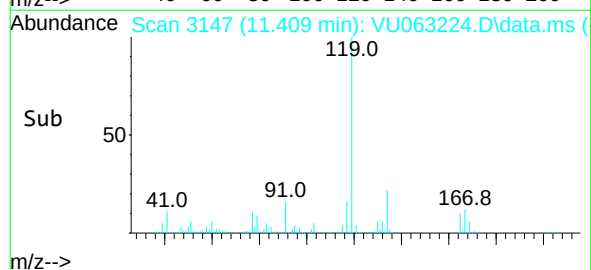
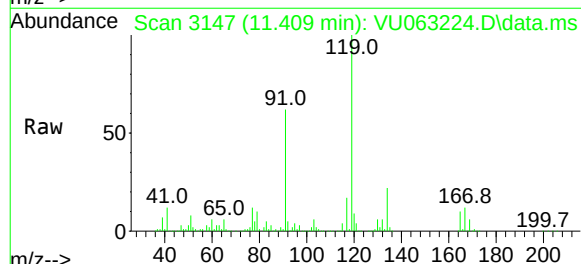
Tgt Ion:119 Resp: 1004388

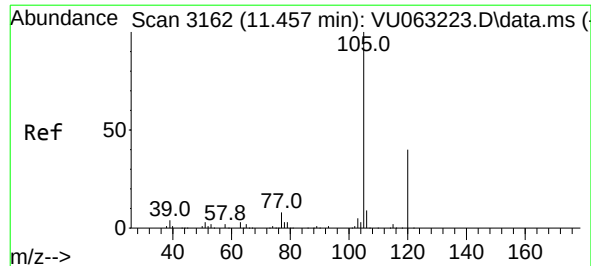
Ion Ratio Lower Upper

119 100

91 59.1 29.4 88.3

134 21.7 17.6 26.4





#78

1,2,4-Trimethylbenzene

Concen: 17.598 ug/l

RT: 11.457 min Scan# 31

Delta R.T. -0.000 min

Lab File: VU063224.D

Acq: 10 Feb 2025 15:33

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC015

Tgt Ion:105 Resp: 1038794

Ion Ratio Lower Upper

105 100

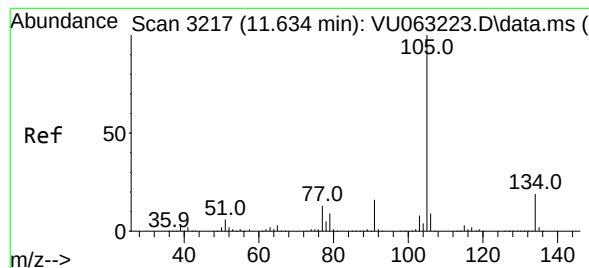
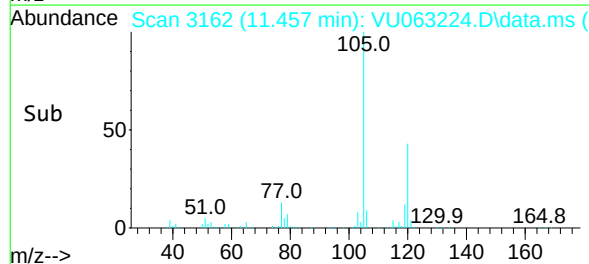
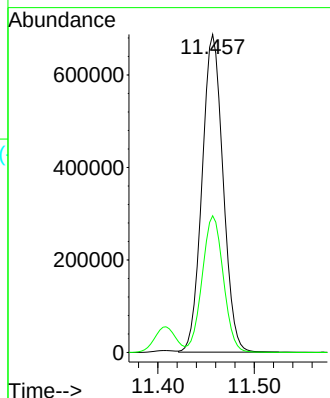
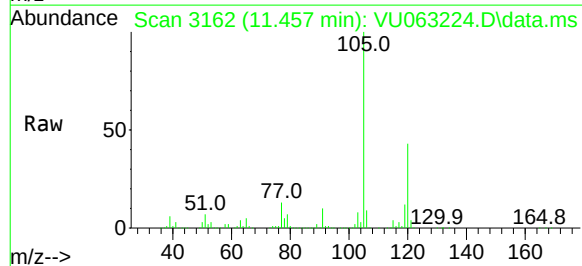
120 43.4 21.9 65.7

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#79

sec-Butylbenzene

Concen: 17.036 ug/l

RT: 11.630 min Scan# 3216

Delta R.T. -0.003 min

Lab File: VU063224.D

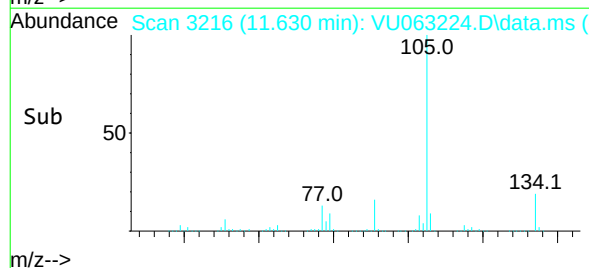
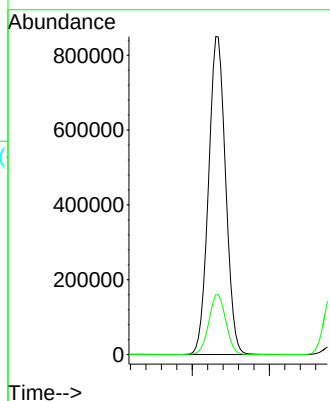
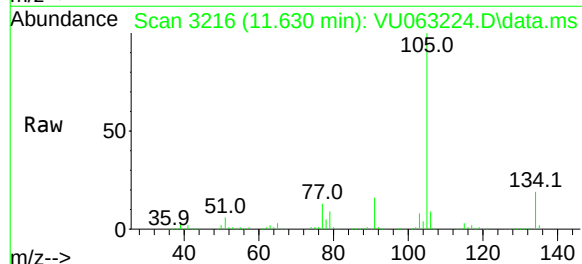
Acq: 10 Feb 2025 15:33

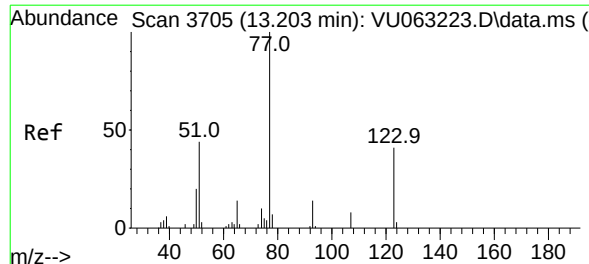
Tgt Ion:105 Resp: 1305019

Ion Ratio Lower Upper

105 100

134 18.9 15.1 22.7





#80

Nitrobenzene

Concen: 75.007 ug/l

RT: 13.200 min Scan# 3705

Delta R.T. -0.003 min

Lab File: VU063224.D

Acq: 10 Feb 2025 15:33

Instrument :

MSVOA_U

ClientSampleId :

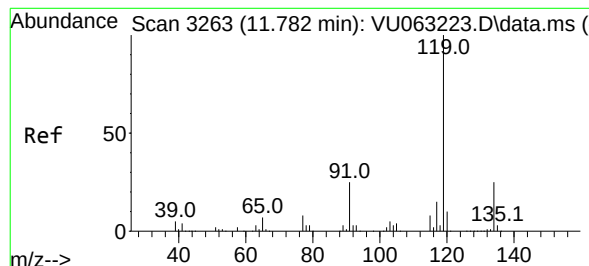
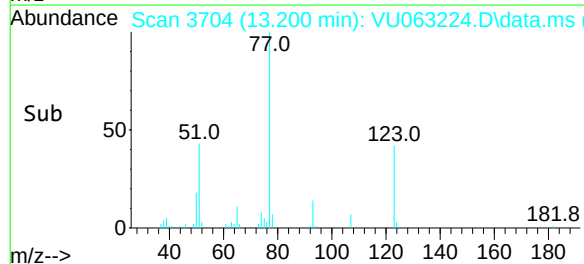
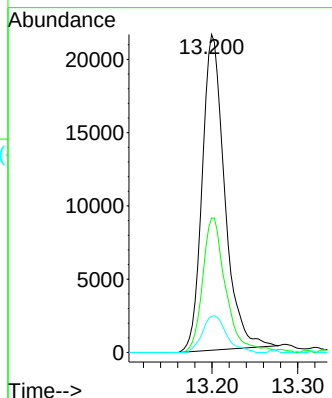
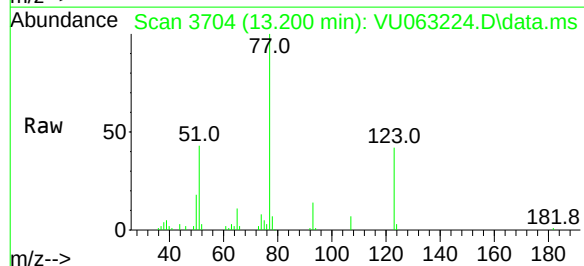
VSTDIC015

Tgt Ion:	77	Resp:	39246
Ion	Ratio	Lower	Upper
77	100		
123	42.5	18.9	67.1
65	12.5	11.9	15.1

Manual Integrations
APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#81

p-Isopropyltoluene

Concen: 17.605 ug/l

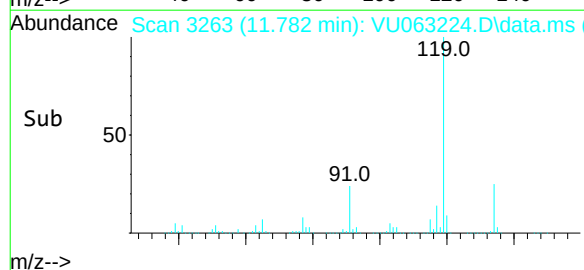
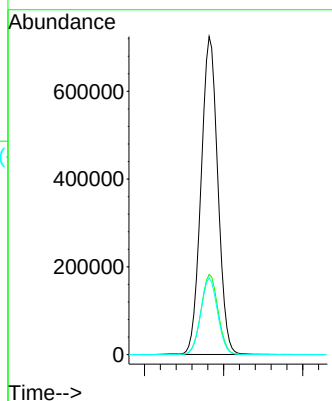
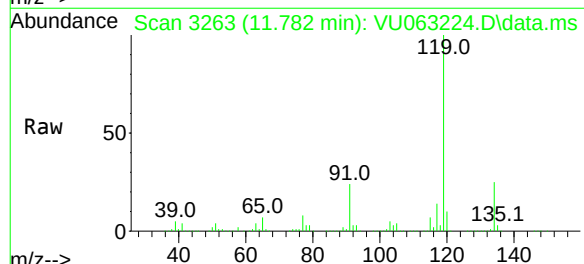
RT: 11.782 min Scan# 3263

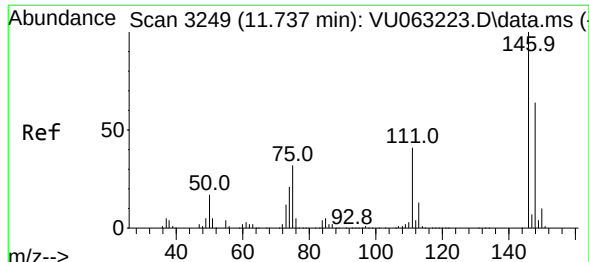
Delta R.T. -0.000 min

Lab File: VU063224.D

Acq: 10 Feb 2025 15:33

Tgt Ion:	119	Resp:	1064335
Ion	Ratio	Lower	Upper
119	100		
134	25.7	20.3	30.5
91	24.1	19.4	29.2





#82

1,3-Dichlorobenzene

Concen: 15.863 ug/l

RT: 11.733 min Scan# 3249

Delta R.T. -0.003 min

Lab File: VU063224.D

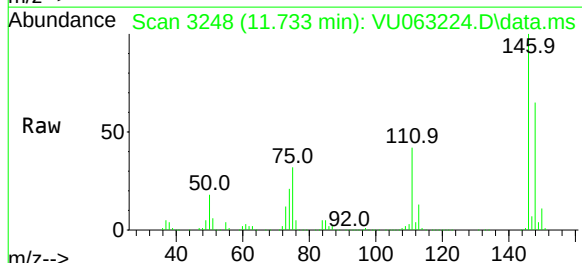
Acq: 10 Feb 2025 15:33

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC015

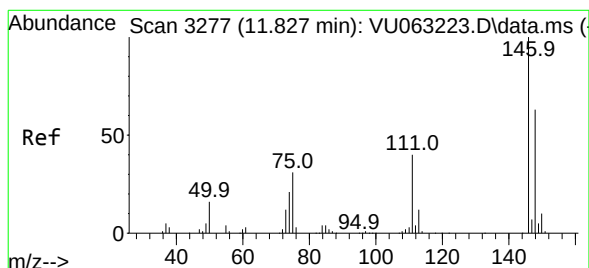
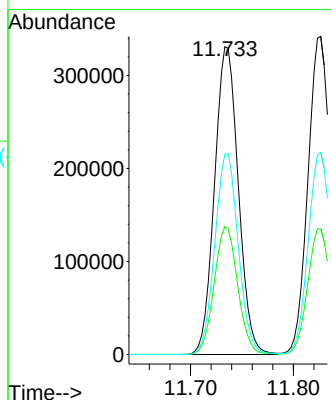
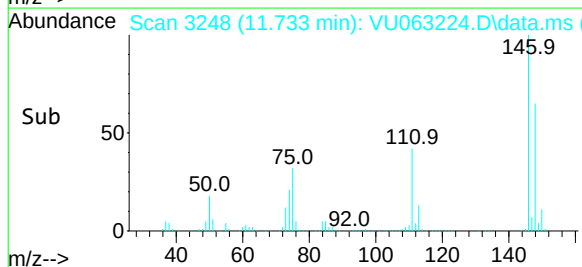


Tgt Ion:	146	Resp:	532282
Ion	Ratio	Lower	Upper
146	100		
111	41.1	32.8	49.2
148	64.5	51.1	76.7

Manual Integrations
APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#83

1,4-Dichlorobenzene

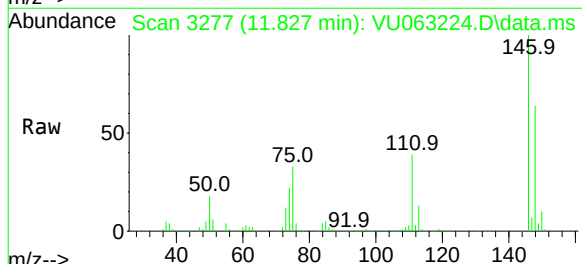
Concen: 16.378 ug/l

RT: 11.827 min Scan# 3277

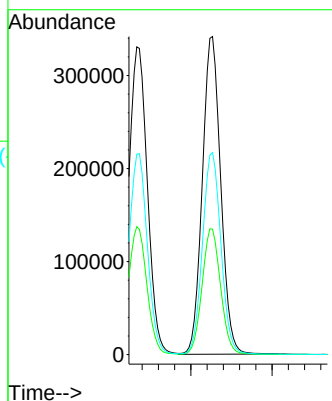
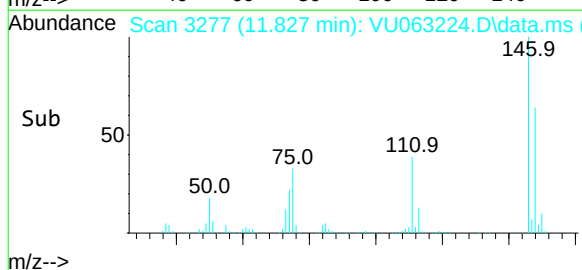
Delta R.T. -0.000 min

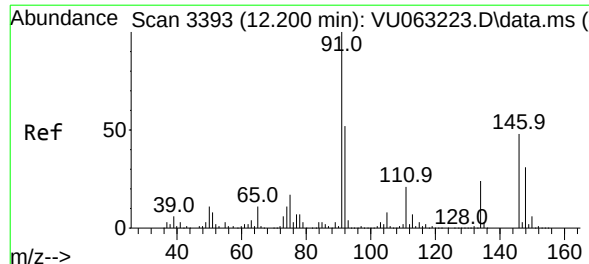
Lab File: VU063224.D

Acq: 10 Feb 2025 15:33



Tgt Ion:	146	Resp:	537516
Ion	Ratio	Lower	Upper
146	100		
111	39.8	32.1	48.1
148	63.5	50.2	75.4





#84

n-Butylbenzene

Concen: 18.246 ug/l

RT: 12.196 min Scan# 3392

Delta R.T. -0.003 min

Lab File: VU063224.D

Acq: 10 Feb 2025 15:33

Instrument :

MSVOA_U

ClientSampleId :

VSTDICC015

Tgt Ion: 91 Resp: 994696

Ion Ratio Lower Upper

91 100

92 52.1 41.8 62.8

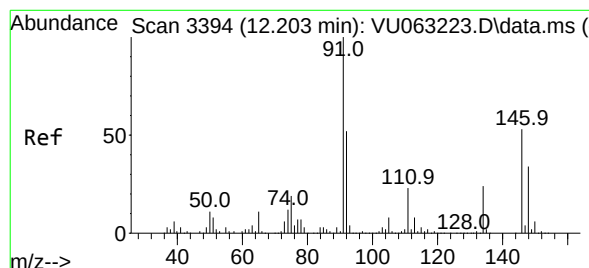
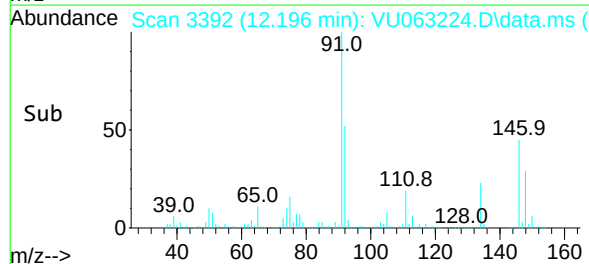
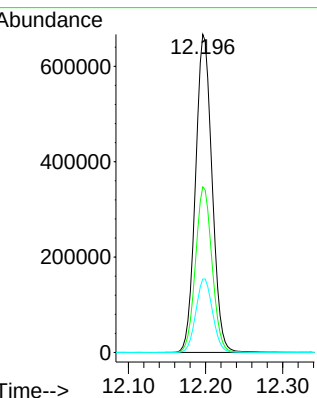
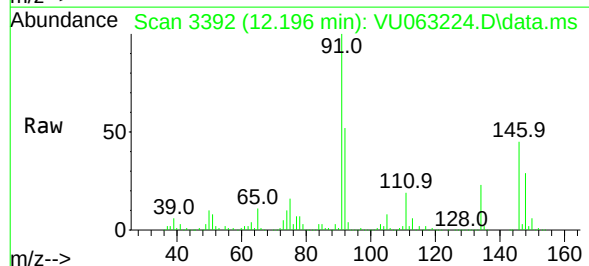
134 23.4 18.6 28.0

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#85

1,2-Dichlorobenzene

Concen: 16.323 ug/l

RT: 12.200 min Scan# 3393

Delta R.T. -0.003 min

Lab File: VU063224.D

Acq: 10 Feb 2025 15:33

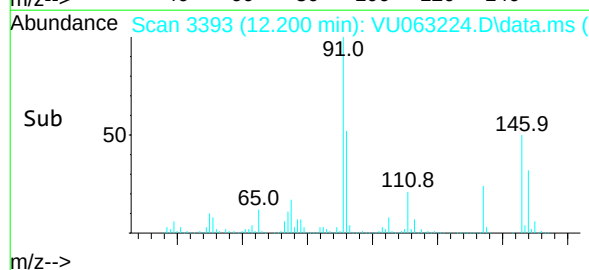
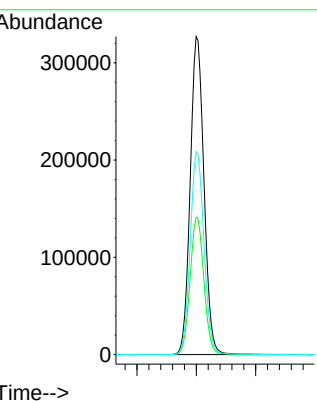
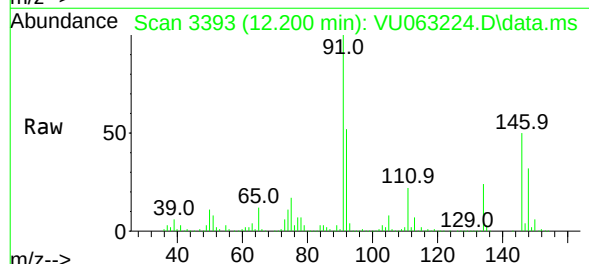
Tgt Ion:146 Resp: 526346

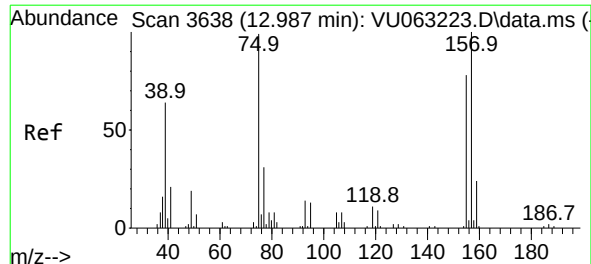
Ion Ratio Lower Upper

146 100

111 43.4 21.9 65.7

148 64.1 32.3 96.9





#86

1,2-Dibromo-3-Chloropropane

Concen: 16.565 ug/l

RT: 12.987 min Scan# 3638

Delta R.T. -0.000 min

Lab File: VU063224.D

Acq: 10 Feb 2025 15:33

Instrument :

MSVOA_U

ClientSampleId :

VSTDIC015

Tgt Ion: 75 Resp: 39960

Ion Ratio Lower Upper

75 100

155 81.3 63.5 95.3

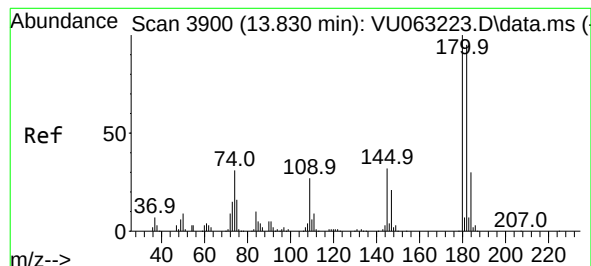
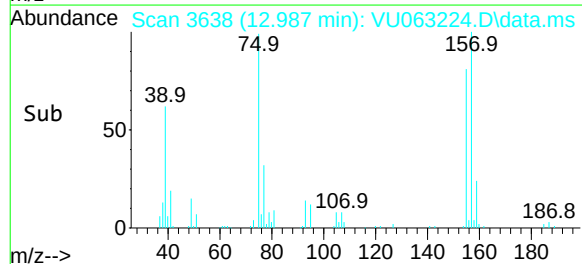
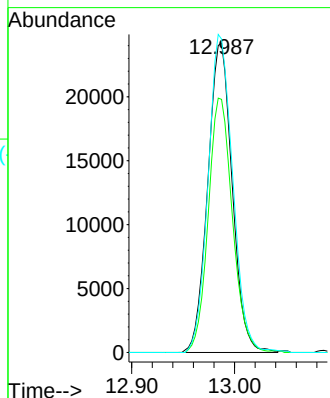
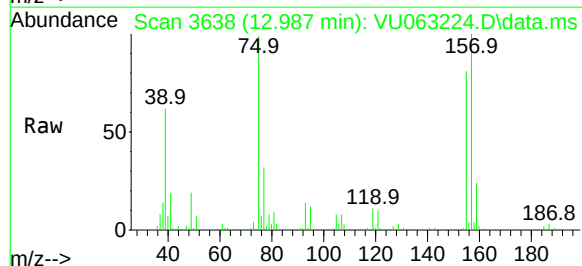
157 103.4 81.8 122.6

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#87

1,2,4-Trichlorobenzene

Concen: 18.320 ug/l

RT: 13.830 min Scan# 3900

Delta R.T. -0.000 min

Lab File: VU063224.D

Acq: 10 Feb 2025 15:33

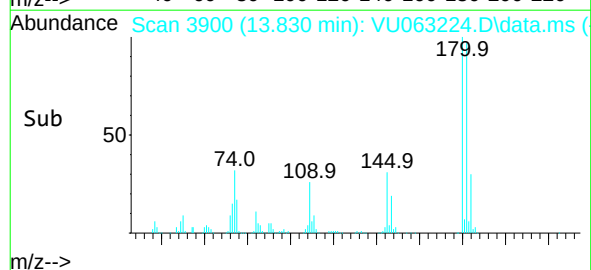
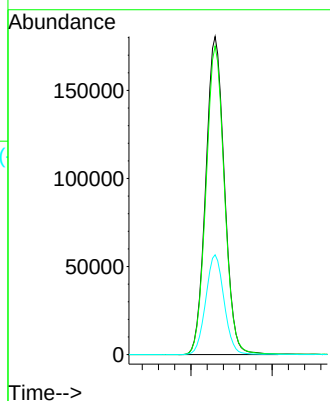
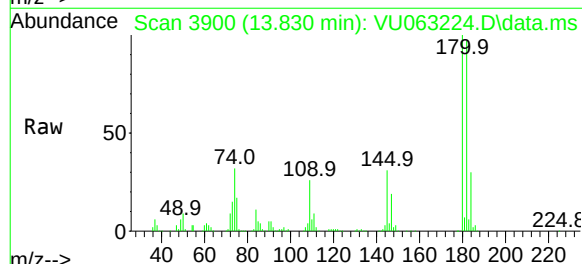
Tgt Ion:180 Resp: 288112

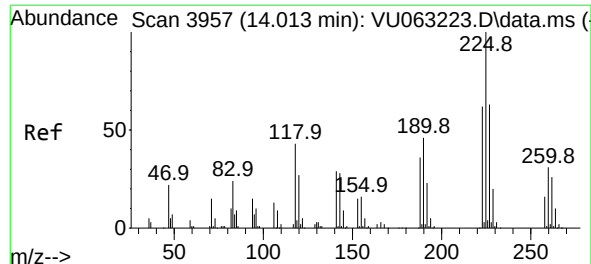
Ion Ratio Lower Upper

180 100

182 96.1 76.6 115.0

145 30.9 25.4 38.2





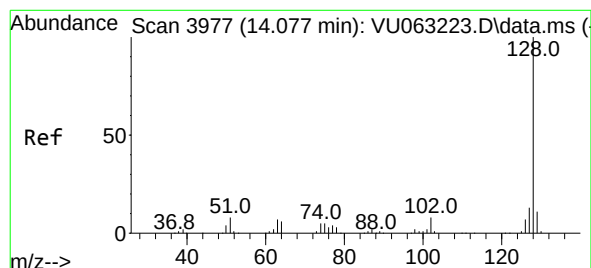
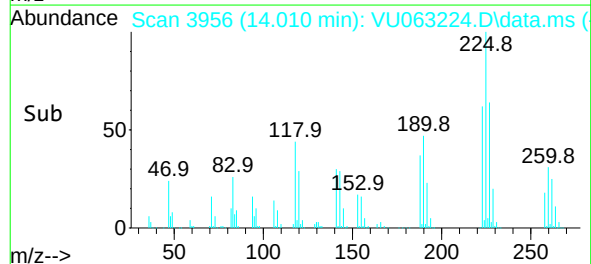
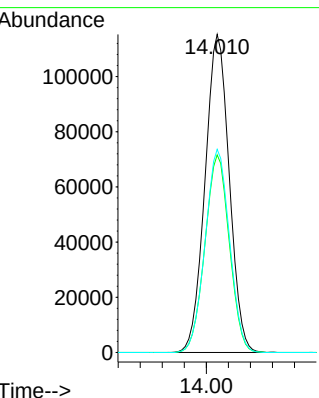
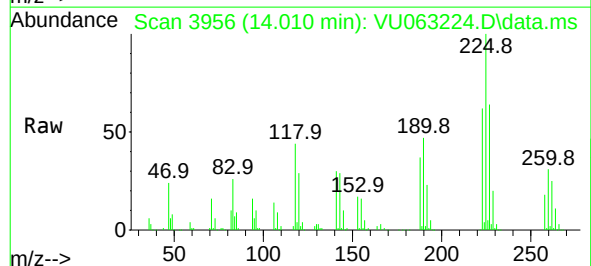
#88
Hexachlorobutadiene
Concen: 15.648 ug/l
RT: 14.010 min Scan# 3957
Delta R.T. -0.003 min
Lab File: VU063224.D
Acq: 10 Feb 2025 15:33

Instrument :
MSVOA_U
ClientSampleId :
VSTDICC015

Tgt Ion: 225 Resp: 175875
Ion Ratio Lower Upper
225 100
223 62.6 49.5 74.3
227 64.4 51.0 76.4

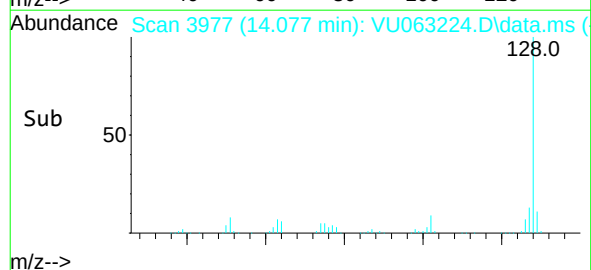
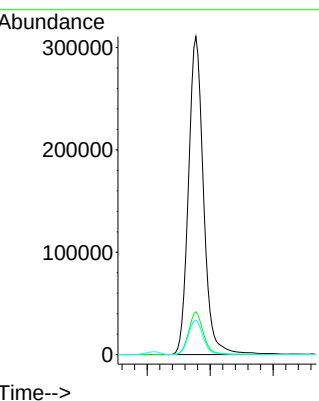
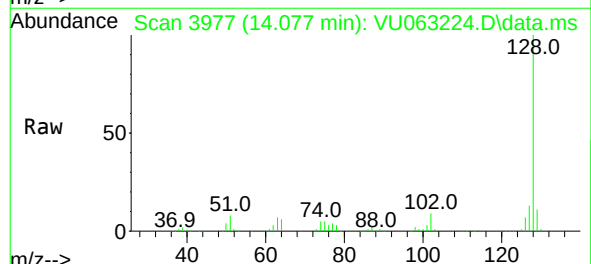
Manual Integrations
APPROVED

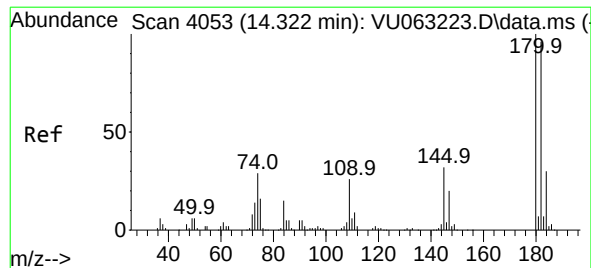
Reviewed By : Amit Patel 02/12/2025
Supervised By : Mahesh Dadoda 02/12/2025



#89
Naphthalene
Concen: 15.328 ug/l
RT: 14.077 min Scan# 3977
Delta R.T. -0.000 min
Lab File: VU063224.D
Acq: 10 Feb 2025 15:33

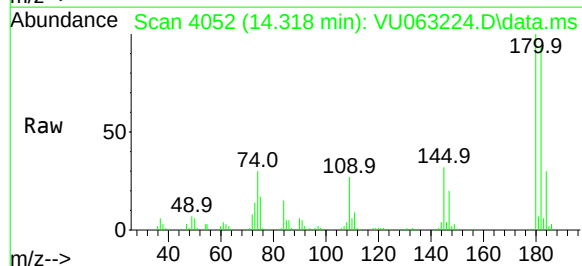
Tgt Ion: 128 Resp: 515515
Ion Ratio Lower Upper
128 100
127 13.2 10.6 16.0
129 10.5 8.6 13.0





#90
1,2,3-Trichlorobenzene
Concen: 18.007 ug/l
RT: 14.318 min Scan# 40
Delta R.T. -0.003 min
Lab File: VU063224.D
Acq: 10 Feb 2025 15:33

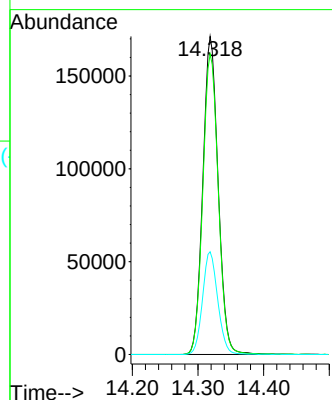
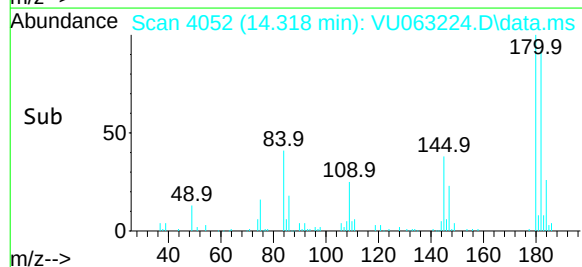
Instrument :
MSVOA_U
ClientSampleId :
VSTDICC015



Tgt Ion:180 Resp: 277101
Ion Ratio Lower Upper
180 100
182 95.6 78.2 117.2
145 32.0 26.1 39.1

Manual Integrations
APPROVED

Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



Data Path : Z:\voasrv\HPCHEM1\MSVOA_U\Data\VU021125\
 Data File : VU063227.D
 Acq On : 11 Feb 2025 08:50
 Operator : MD/SY
 Sample : VSTDICV010
 Misc : 25.0mL/MSVOA_U/WATER
 ALS Vial : 2 Sample Multiplier: 1

Instrument :
 MSVOA_U
 ClientSampleId :
 ICVVU021025

Quant Time: Feb 12 03:08:06 2025
 Quant Method : Z:\voasrv\HPCHEM1\MSVOA_U\Method\524U021025DW.M
 Quant Title : METHOD 524.2 VOLATILES DRINKING WATER
 QLast Update : Tue Feb 11 08:42:19 2025
 Response via : Initial Calibration

Manual Integrations APPROVED

Reviewed By :Amit Patel 02/12/2025
 Supervised By :Mahesh Dadoda 02/12/2025

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

Internal Standards						
1) Fluorobenzene	6.106	96	56495	1.000	ug/l	# 0.00
System Monitoring Compounds						
57) 4-Bromofluorobenzene	10.624	95	25232	1.354	ug/l	0.00
Spiked Amount 1.000			Recovery	=	135.000%	
68) 1,2-Dichlorobenzene-d4	12.183	152	18463	0.953	ug/l	0.00
Spiked Amount 1.000			Recovery	=	95.000%	
Target Compounds						
						Qvalue
2) Dichlorodifluoromethane	1.380	85	113504	6.184	ug/l	99
3) Chloromethane	1.515	50	146642	6.937	ug/l	98
4) Vinyl Chloride	1.599	62	161150	7.705	ug/l	99
5) Bromomethane	1.849	94	95220	9.317	ug/l	95
6) Chloroethane	1.923	64	105662	8.021	ug/l	99
7) Trichlorofluoromethane	2.129	101	209914	8.470	ug/l	100
8) 1,1,2-Trichloro-1,2,2-...	2.570	101	136239	9.685	ug/l	99
9) 1,1-Dichloroethene	2.570	96	135994	9.488	ug/l	99
10) Iodomethane	2.711	142	206755	9.176	ug/l	99
11) Allyl Chloride	2.914	41	206293	10.019	ug/l	98
12) Acrylonitrile	3.303	53	159992	48.397	ug/l	98
13) Acetone	2.621	43	117956	46.402	ug/l	100
14) Carbon Disulfide	2.785	76	402996	8.041	ug/l	100
15) Methylene Chloride	3.033	84	156673	8.848	ug/l	99
16) trans-1,2-Dichloroethene	3.341	96	144812	8.852	ug/l	99
17) 1,1-Dichloroethane	3.853	63	282308	9.156	ug/l	99
18) 2-Butanone	4.692	43	186600	46.124	ug/l	99
19) Cyclohexane	5.377	56	233963m	9.443	ug/l	
20) Methylcyclohexane	6.753	83	249729	10.164	ug/l	99
21) 2,2-Dichloropropane	4.650	77	229157	9.526	ug/l	99
22) cis-1,2-Dichloroethene	4.650	96	176178	9.968	ug/l	100
23) Diethyl Ether	2.367	59	102821	8.360	ug/l	99
24) tert-Butyl Alcohol	3.193	59	45647	31.908	ug/l	# 88
25) Methyl tert-Butyl Ether	3.348	73	345681	9.657	ug/l	100
26) Bromochloromethane	4.959	128	73733	9.544	ug/l	99
27) Chloroform	5.074	83	289263	9.296	ug/l	99
28) 1,1,1-Trichloroethane	5.303	97	239040	9.483	ug/l	98
29) 1,1-Dichloropropene	5.515	75	196807	8.717	ug/l	99
30) Carbon Tetrachloride	5.512	117	201284	9.311	ug/l	98
31) Isopropyl Ether	3.975	45	463697	10.534	ug/l	# 1
34) Propionitrile	4.762	54	122058	100.030	ug/l	98
35) Benzene	5.759	78	645948	9.305	ug/l	99
36) 1,2-Dichloroethane	5.782	62	170414	8.506	ug/l	99
37) Trichloroethene	6.531	130	146452	8.871	ug/l	98
38) 1,2-Dichloropropane	6.778	63	159772	8.794	ug/l	97
39) Methacrylonitrile	4.962	41	46732	10.277	ug/l	96
40) Methyl acrylate	4.836	55	82118	9.798	ug/l	# 93
41) Tetrahydrofuran	5.039	42	123058	46.529	ug/l	98
42) 1-Chlorobutane	5.444	56	300232	9.720	ug/l	99
43) Dibromomethane	6.907	93	83308	9.055	ug/l	97
44) Bromodichloromethane	7.094	83	215139	10.047	ug/l	99
45) 4-Methyl-2-Pentanone	7.778	43	470573	48.787	ug/l	100
46) t-1,4-Dichloro-2-butene	10.820	75	49406m	10.896	ug/l	

Data Path : Z:\voasrv\HPCHEM1\MSVOA_U\Data\VU021125\
 Data File : VU063227.D
 Acq On : 11 Feb 2025 08:50
 Operator : MD/SY
 Sample : VSTDICV010
 Misc : 25.0mL/MSVOA_U/WATER
 ALS Vial : 2 Sample Multiplier: 1

Instrument :
 MSVOA_U
 ClientSampleId :
 ICSVU021025

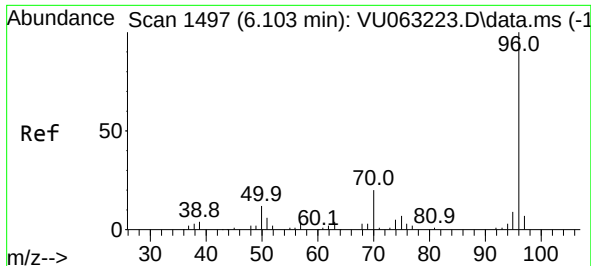
Manual Integrations
 APPROVED

Reviewed By :Amit Patel 02/12/2025
 Supervised By :Mahesh Dadoda 02/12/2025

Quant Time: Feb 12 03:08:06 2025
 Quant Method : Z:\voasrv\HPCHEM1\MSVOA_U\Method\524U021025DW.M
 Quant Title : METHOD 524.2 VOLATILES DRINKING WATER
 QLast Update : Tue Feb 11 08:42:19 2025
 Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
47) Methyl methacrylate	6.949	69	75036	9.683	ug/l	97
48) Ethyl methacrylate	8.322	69	150671	10.355	ug/l	99
49) Toluene	7.958	92	394103	9.872	ug/l	100
50) t-1,3-Dichloropropene	8.200	75	190233	9.703	ug/l	99
51) cis-1,3-Dichloropropene	7.595	75	225683	9.319	ug/l	99
52) 1,1,2-Trichloroethane	8.386	97	112663	9.082	ug/l	97
53) 1,3-Dichloropropane	8.563	76	196173	8.908	ug/l	99
54) 2-Hexanone	8.675	43	318084	48.325	ug/l	99
55) Dibromochloromethane	8.798	129	136481	9.564	ug/l	98
56) 1,2-Dibromoethane	8.913	107	104935	9.020	ug/l	99
58) Tetrachloroethene	8.544	164	131195	9.644	ug/l	98
59) Chlorobenzene	9.438	112	411460	9.767	ug/l	100
60) 1,1,1,2-Tetrachloroethane	9.521	131	138560	9.150	ug/l	98
61) Pentachloroethane	11.415	117	127090	9.395	ug/l	98
62) Hexachloroethane	12.463	117	117375	9.808	ug/l	99
63) Ethyl Benzene	9.560	91	753103	10.366	ug/l	99
64) m/p-Xylenes	9.682	106	574738	21.178	ug/l	98
65) o-Xylene	10.090	106	275873	10.384	ug/l	99
66) Styrene	10.103	104	457882	10.830	ug/l	100
67) Bromoform	10.280	173	77802	9.606	ug/l	99
69) Isopropylbenzene	10.473	105	734939	11.767	ug/l	100
70) 1,1,2,2-Tetrachloroethane	10.769	83	142854	8.545	ug/l	99
71) 1,2,3-Trichloropropane	10.814	75	106046m	8.443	ug/l	
72) Bromobenzene	10.772	156	167353	9.945	ug/l	99
73) n-propylbenzene	10.894	120	192125	10.744	ug/l	97
74) 2-Chlorotoluene	10.974	126	172282	10.454	ug/l	99
75) 1,3,5-Trimethylbenzene	11.077	105	628091	10.853	ug/l	100
76) 4-Chlorotoluene	11.087	126	175303	10.373	ug/l	99
77) tert-Butylbenzene	11.409	119	606100	10.355	ug/l	99
78) 1,2,4-Trimethylbenzene	11.457	105	617064	10.746	ug/l	100
79) sec-Butylbenzene	11.634	105	809829	10.867	ug/l	100
80) Nitrobenzene	13.212	77	3697m	10.731	ug/l	
81) p-Isopropyltoluene	11.781	119	651414	11.076	ug/l	100
82) 1,3-Dichlorobenzene	11.736	146	326539	10.004	ug/l	99
83) 1,4-Dichlorobenzene	11.826	146	323813	10.142	ug/l	99
84) n-Butylbenzene	12.199	91	606308	11.497	ug/l	99
85) 1,2-Dichlorobenzene	12.203	146	304825	9.718	ug/l	99
86) 1,2-Dibromo-3-Chloropr...	12.984	75	20970	8.936	ug/l	97
87) 1,2,4-Trichlorobenzene	13.830	180	184275	12.045	ug/l	99
88) Hexachlorobutadiene	14.010	225	107826	9.862	ug/l	100
89) Naphthalene	14.077	128	270551	8.568	ug/l	99
90) 1,2,3-Trichlorobenzene	14.318	180	156676	10.466	ug/l	97

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



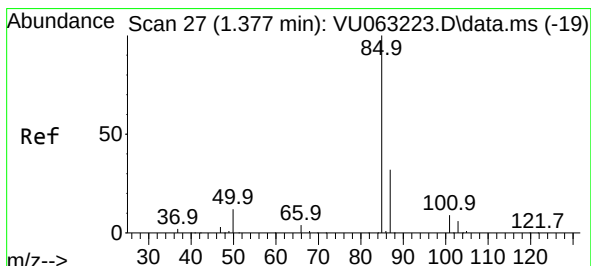
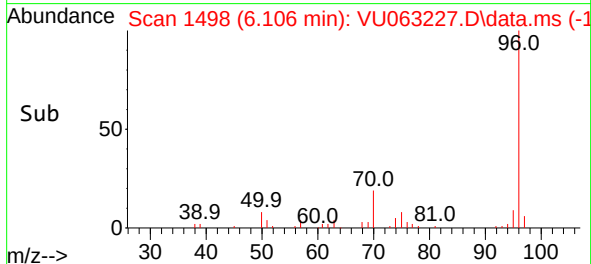
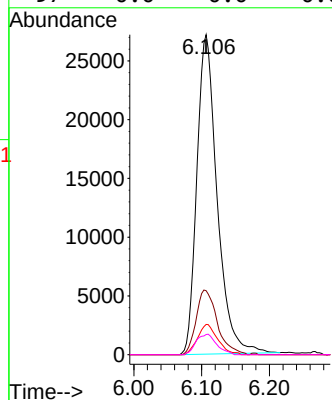
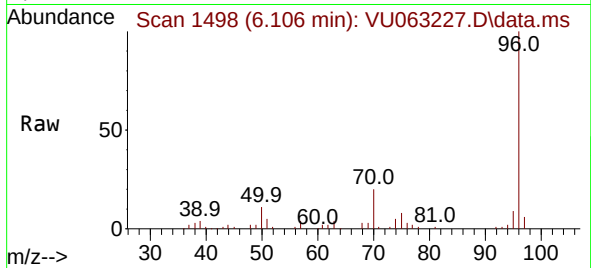
#1
Fluorobenzene
Concen: 1.000 ug/l
RT: 6.106 min Scan# 1497
Delta R.T. 0.003 min
Lab File: VU063227.D
Acq: 11 Feb 2025 08:50

Instrument :
MSVOA_U
ClientSampleId :
ICVVU021025

Tgt Ion: 96	Resp: 5649
Ion Ratio	Lower Upper
96 100	
70 21.0	15.6 23.4
95 9.4	7.3 10.9
97 0.0	0.0 0.0

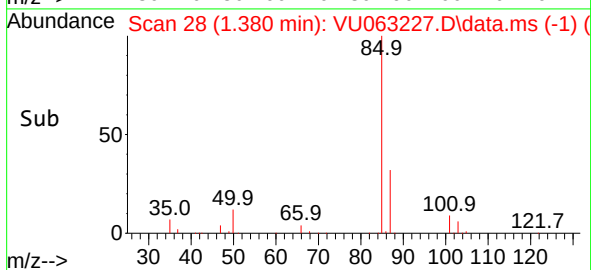
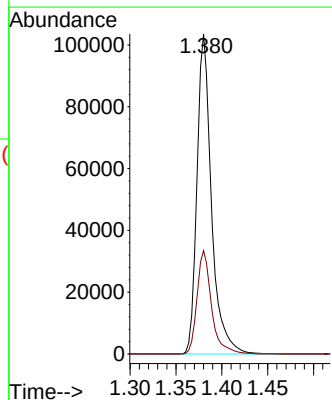
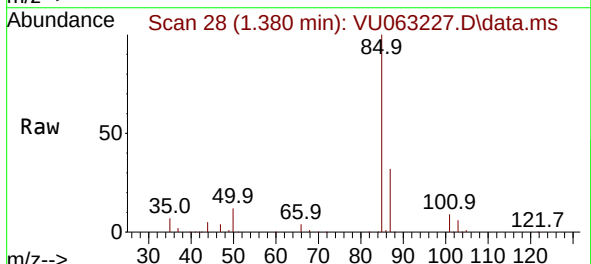
Manual Integrations
APPROVED

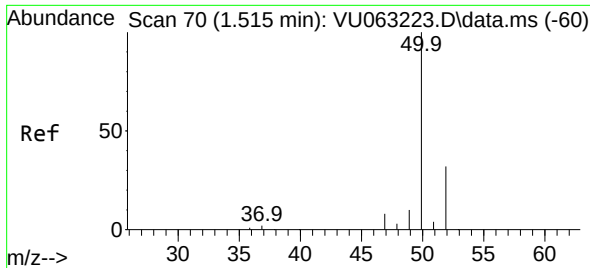
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#2
Dichlorodifluoromethane
Concen: 6.184 ug/l
RT: 1.380 min Scan# 28
Delta R.T. 0.003 min
Lab File: VU063227.D
Acq: 11 Feb 2025 08:50

Tgt Ion: 85	Resp: 113504
Ion Ratio	Lower Upper
85 100	
87 32.3	16.0 48.0





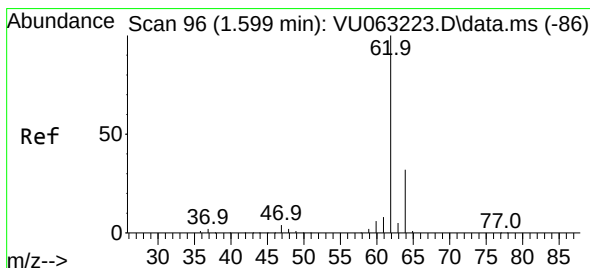
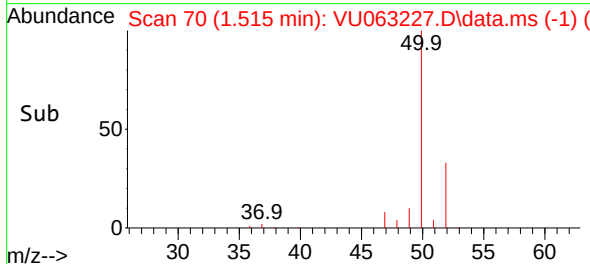
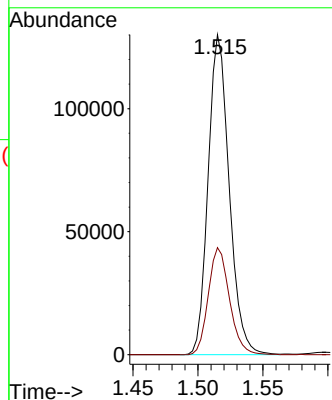
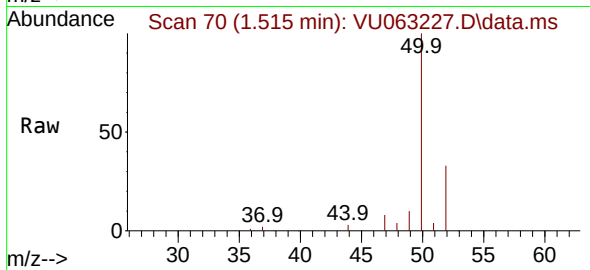
#3
Chloromethane
Concen: 6.937 ug/l
RT: 1.515 min Scan# 70
Delta R.T. -0.000 min
Lab File: VU063227.D
Acq: 11 Feb 2025 08:50

Instrument :
MSVOA_U
ClientSampleId :
ICVVU021025

Tgt Ion: 50 Resp: 14664
Ion Ratio Lower Upper
50 100
52 33.5 25.8 38.8

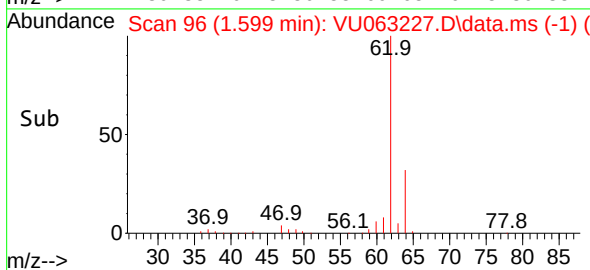
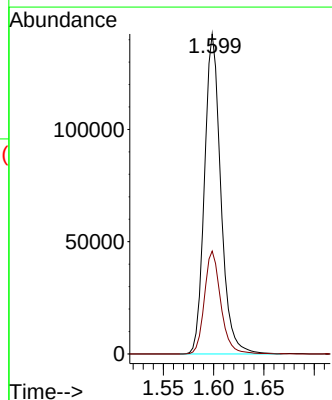
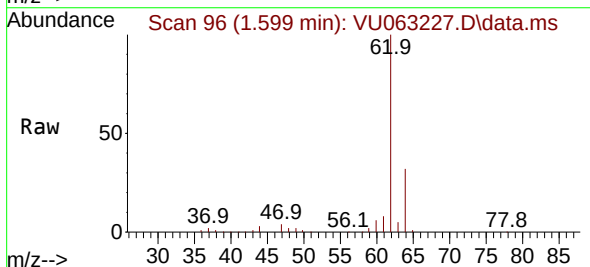
Manual Integrations
APPROVED

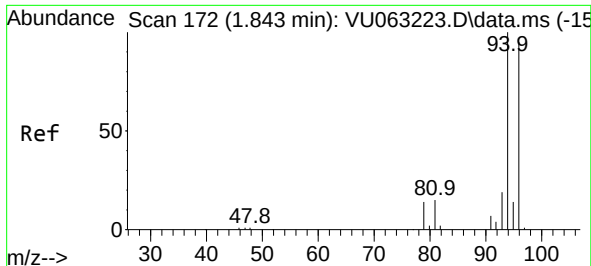
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#4
Vinyl Chloride
Concen: 7.705 ug/l
RT: 1.599 min Scan# 96
Delta R.T. -0.000 min
Lab File: VU063227.D
Acq: 11 Feb 2025 08:50

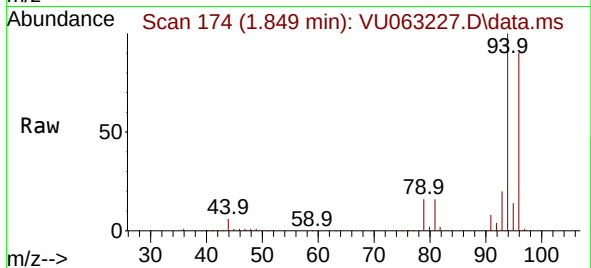
Tgt Ion: 62 Resp: 161150
Ion Ratio Lower Upper
62 100
64 32.2 25.4 38.0





#5
Bromomethane
Concen: 9.317 ug/l
RT: 1.849 min Scan# 172
Delta R.T. 0.006 min
Lab File: VU063227.D
Acq: 11 Feb 2025 08:50

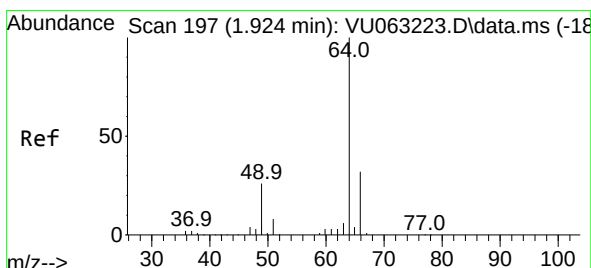
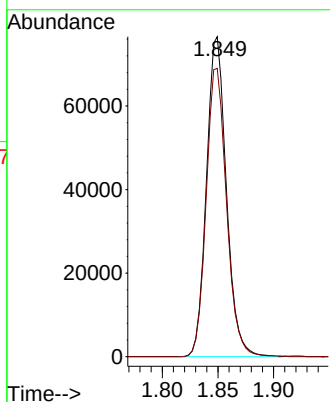
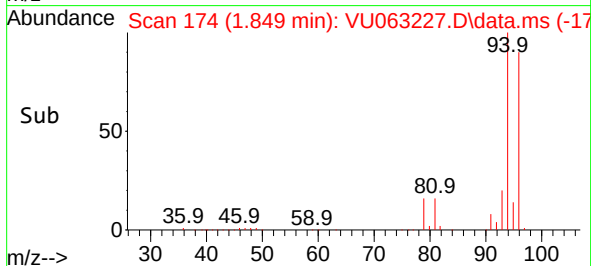
Instrument :
MSVOA_U
ClientSampleId :
ICVVU021025



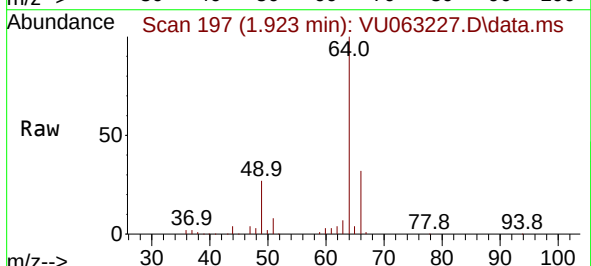
Tgt Ion: 94 Resp: 95220
Ion Ratio Lower Upper
94 100
96 90.1 75.7 113.5

Manual Integrations
APPROVED

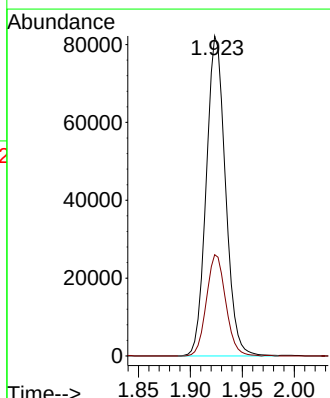
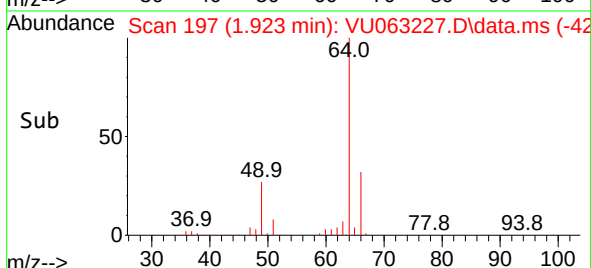
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025

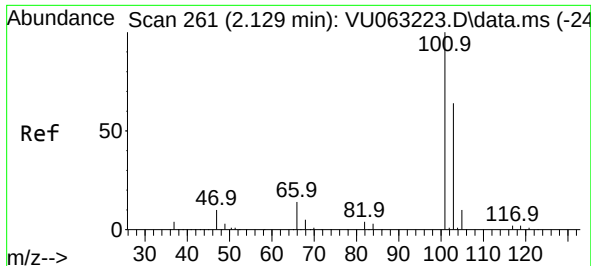


#6
Chloroethane
Concen: 8.021 ug/l
RT: 1.923 min Scan# 197
Delta R.T. -0.000 min
Lab File: VU063227.D
Acq: 11 Feb 2025 08:50



Tgt Ion: 64 Resp: 105662
Ion Ratio Lower Upper
64 100
66 31.7 25.8 38.8





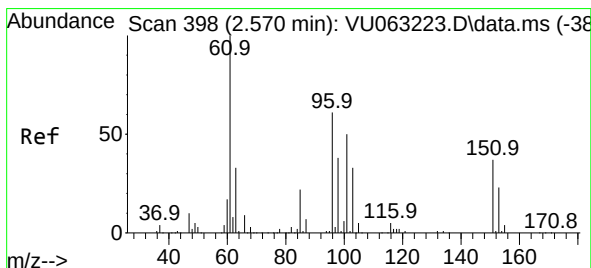
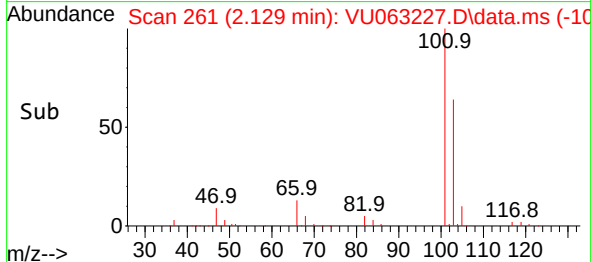
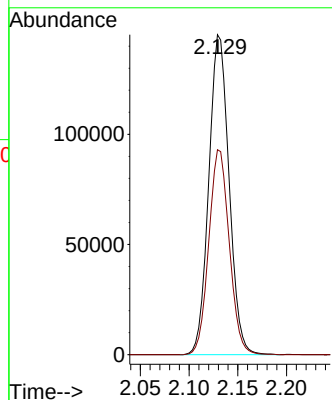
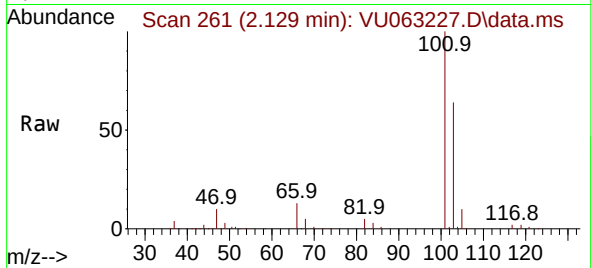
#7
Trichlorofluoromethane
Concen: 8.470 ug/l
RT: 2.129 min Scan# 209914
Delta R.T. -0.000 min
Lab File: VU063227.D
Acq: 11 Feb 2025 08:50

Instrument : MSVOA_U
ClientSampleId : ICVVU021025

Tgt Ion:101 Resp: 209914
Ion Ratio Lower Upper
101 100
103 64.0 51.4 77.2

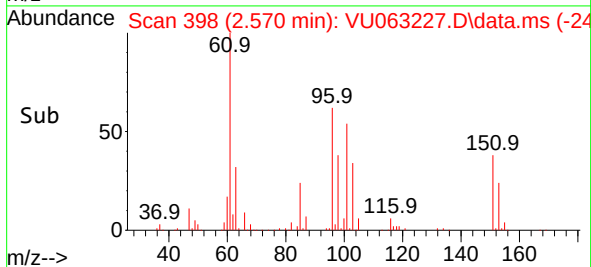
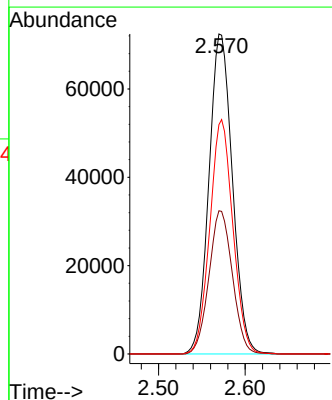
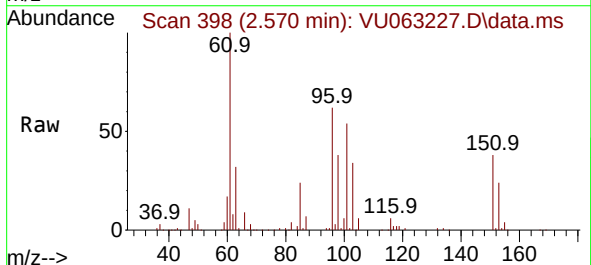
Manual Integrations
APPROVED

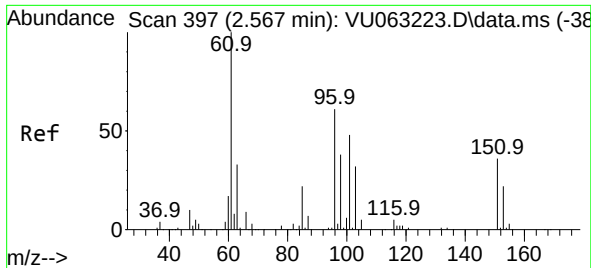
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#8
1,1,2-Trichloro-1,2,2-trifluoroethane
Concen: 9.685 ug/l
RT: 2.570 min Scan# 398
Delta R.T. -0.000 min
Lab File: VU063227.D
Acq: 11 Feb 2025 08:50

Tgt Ion:101 Resp: 136239
Ion Ratio Lower Upper
101 100
85 44.7 35.4 53.0
151 72.2 58.5 87.7





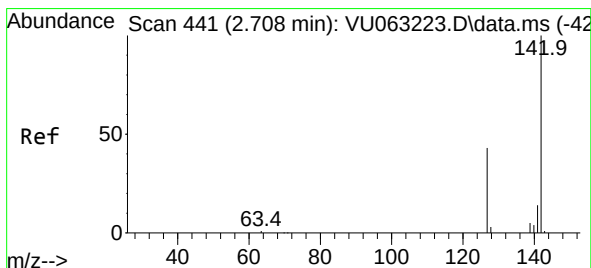
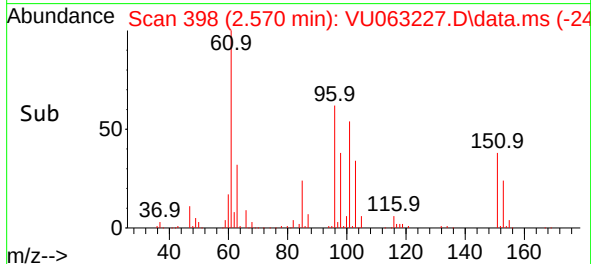
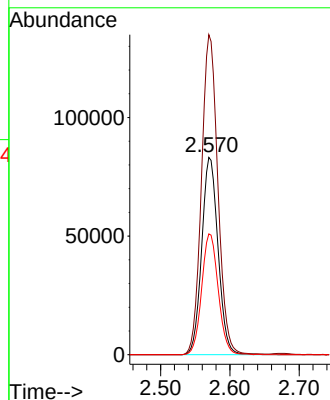
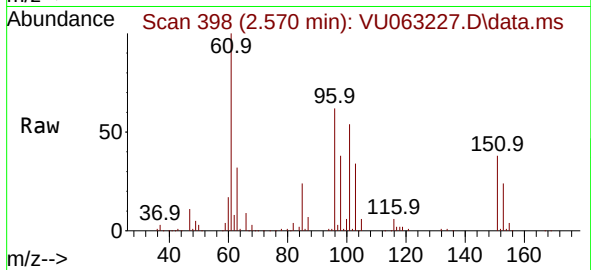
#9
1,1-Dichloroethene
Concen: 9.488 ug/l
RT: 2.570 min Scan# 397
Delta R.T. 0.003 min
Lab File: VU063227.D
Acq: 11 Feb 2025 08:50

Instrument :
MSVOA_U
ClientSampleId :
ICVVU021025

Tgt Ion: 96 Resp: 135994
Ion Ratio Lower Upper
96 100
61 162.2 0.0 492.9
98 61.2 0.0 124.0

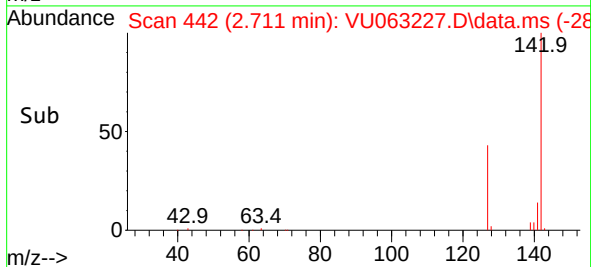
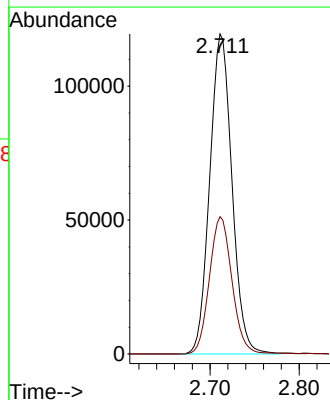
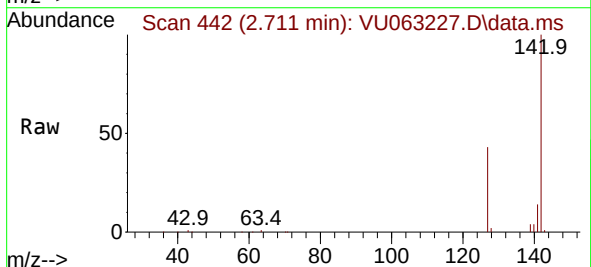
Manual Integrations
APPROVED

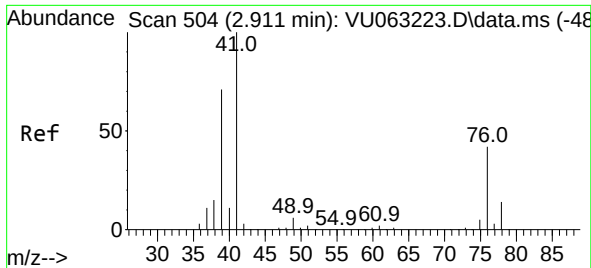
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#10
Iodomethane
Concen: 9.176 ug/l
RT: 2.711 min Scan# 442
Delta R.T. 0.003 min
Lab File: VU063227.D
Acq: 11 Feb 2025 08:50

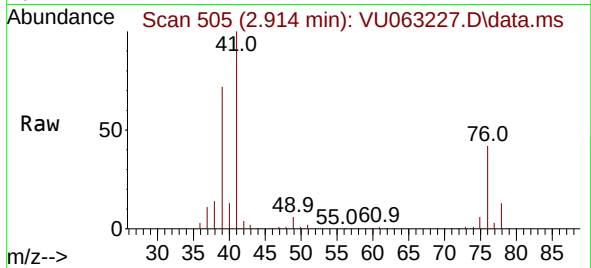
Tgt Ion:142 Resp: 206755
Ion Ratio Lower Upper
142 100
127 43.7 34.5 51.7





#11
 Allyl Chloride
 Concen: 10.019 ug/l
 RT: 2.914 min Scan# 504
 Delta R.T. 0.003 min
 Lab File: VU063227.D
 Acq: 11 Feb 2025 08:50

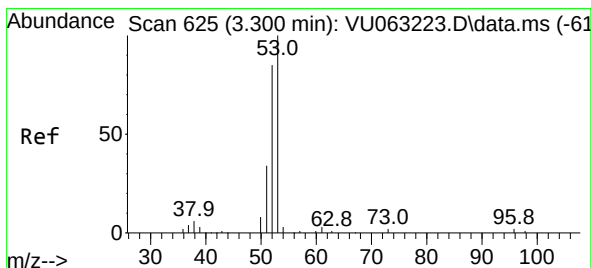
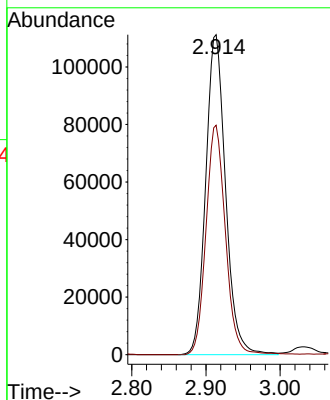
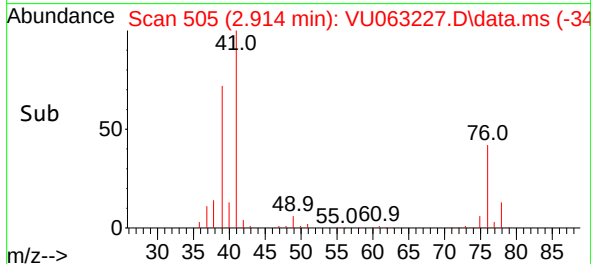
Instrument :
 MSVOA_U
 ClientSampleId :
 ICVVU021025



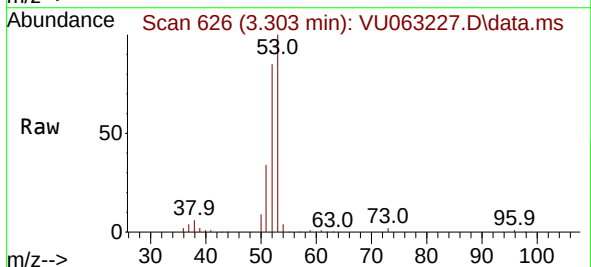
Tgt Ion: 41 Resp: 20629
 Ion Ratio Lower Upper
 41 100
 39 70.4 57.9 86.9

Manual Integrations
 APPROVED

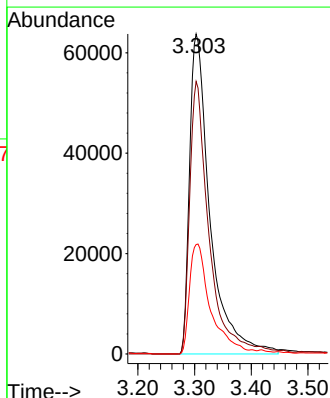
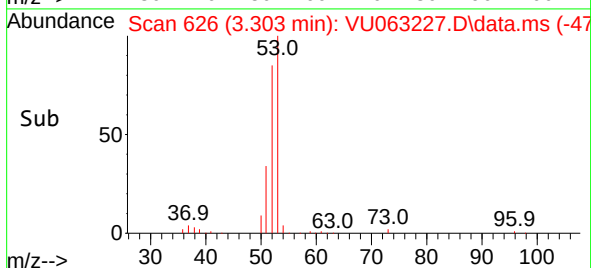
Reviewed By :Amit Patel 02/12/2025
 Supervised By :Mahesh Dadoda 02/12/2025

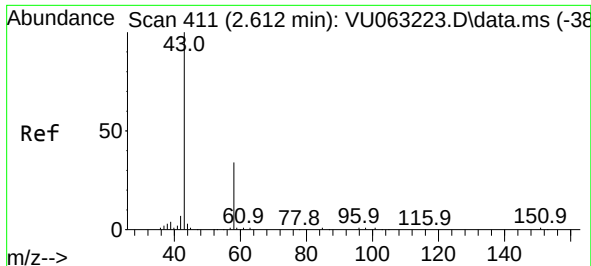


#12
 Acrylonitrile
 Concen: 48.397 ug/l
 RT: 3.303 min Scan# 626
 Delta R.T. 0.003 min
 Lab File: VU063227.D
 Acq: 11 Feb 2025 08:50



Tgt Ion: 53 Resp: 159992
 Ion Ratio Lower Upper
 53 100
 52 80.5 64.2 96.2
 51 35.2 30.8 46.2





#13

Acetone

Concen: 46.402 ug/l

RT: 2.621 min Scan# 411

Delta R.T. 0.009 min

Lab File: VU063227.D

Acq: 11 Feb 2025 08:50

Instrument :

MSVOA_U

ClientSampleId :

ICVVU021025

Tgt Ion: 43 Resp: 117950

Ion Ratio Lower Upper

43 100

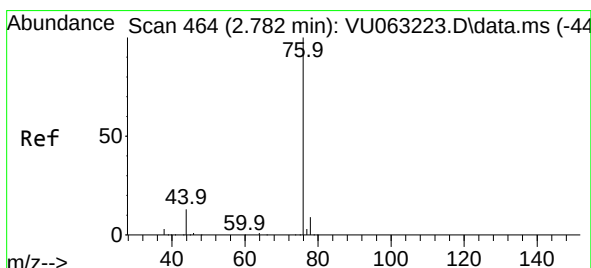
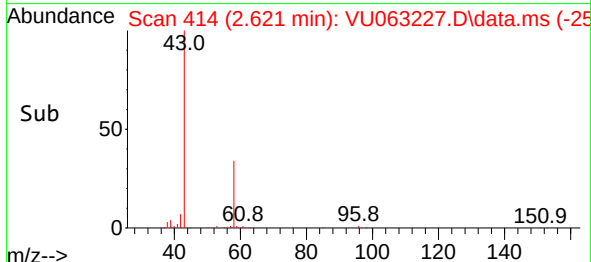
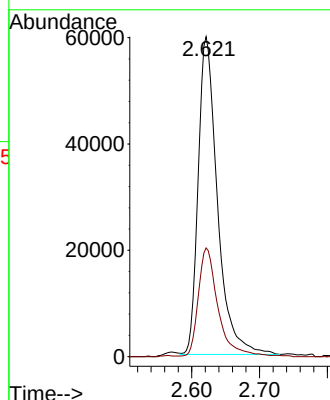
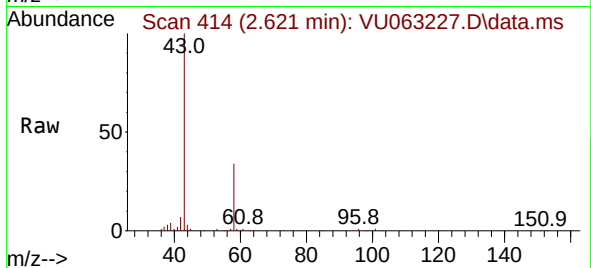
58 34.1 27.4 41.0

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#14

Carbon Disulfide

Concen: 8.041 ug/l

RT: 2.785 min Scan# 465

Delta R.T. 0.003 min

Lab File: VU063227.D

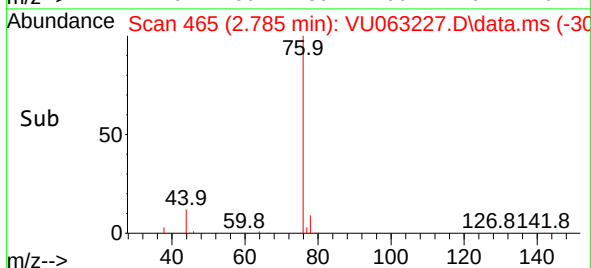
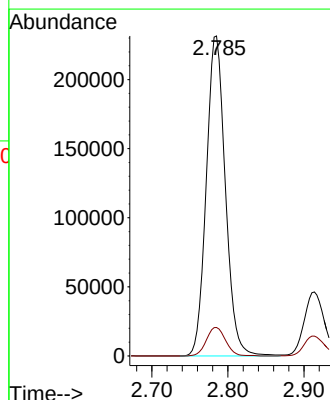
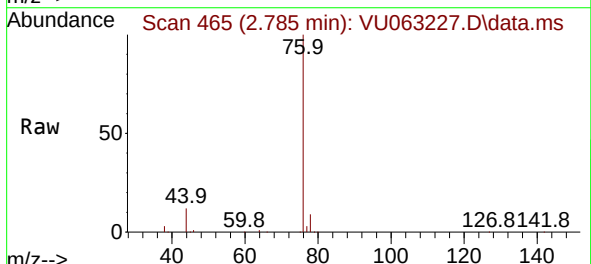
Acq: 11 Feb 2025 08:50

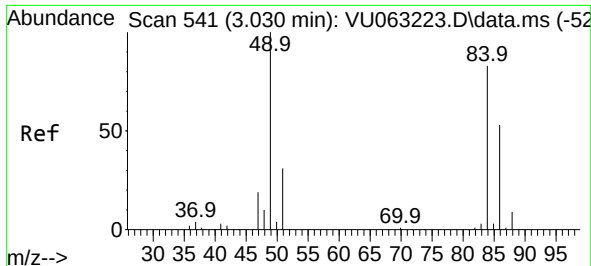
Tgt Ion: 76 Resp: 402996

Ion Ratio Lower Upper

76 100

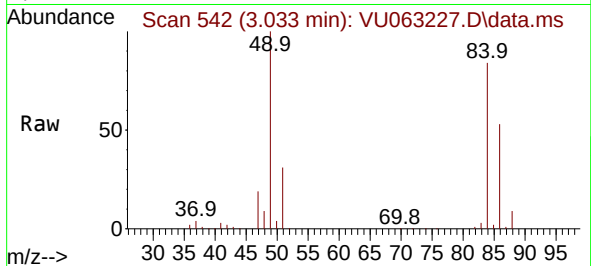
78 8.9 7.2 10.8





#15
Methylene Chloride
Concen: 8.848 ug/l
RT: 3.033 min Scan# 541
Delta R.T. 0.003 min
Lab File: VU063227.D
Acq: 11 Feb 2025 08:50

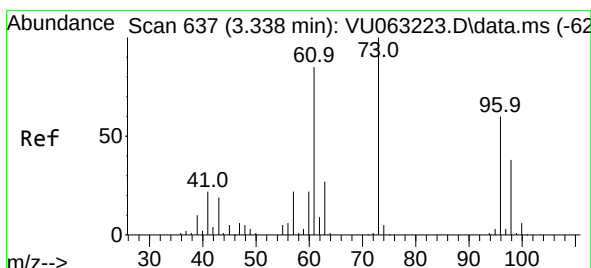
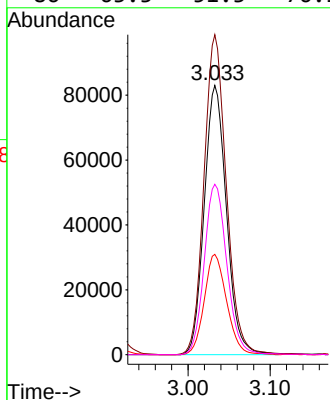
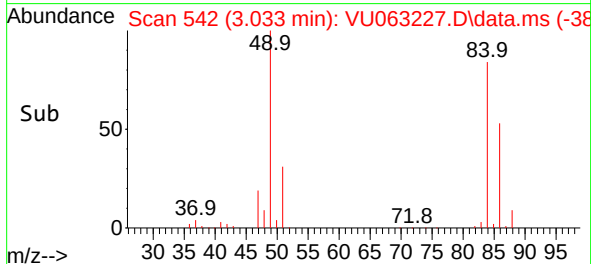
Instrument :
MSVOA_U
ClientSampleId :
ICVVU021025



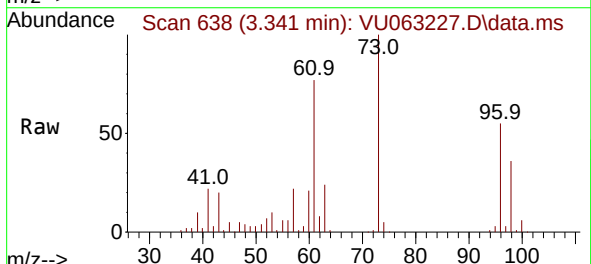
Tgt Ion: 84 Resp: 15667
Ion Ratio Lower Upper
84 100
49 118.7 96.4 144.6
51 37.3 0.0 74.8
86 63.3 51.3 76.9

Manual Integrations
APPROVED

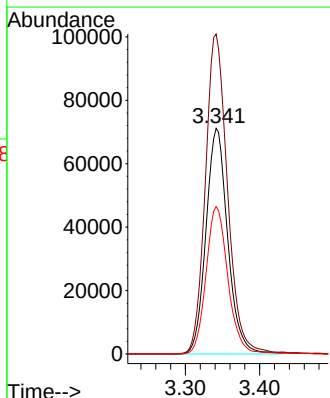
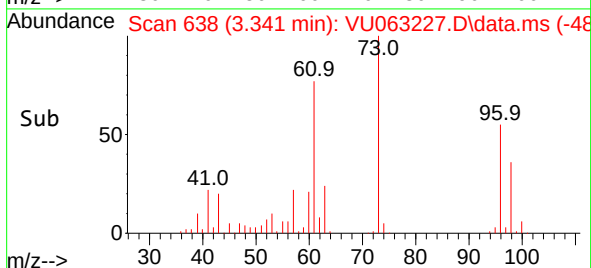
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025

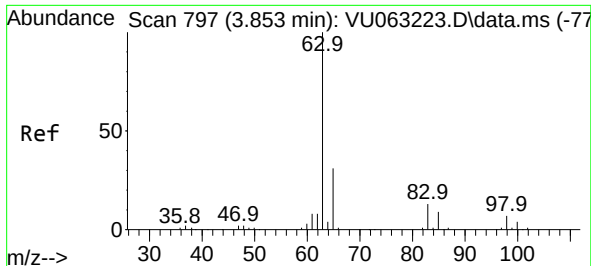


#16
trans-1,2-Dichloroethene
Concen: 8.852 ug/l
RT: 3.341 min Scan# 638
Delta R.T. 0.003 min
Lab File: VU063227.D
Acq: 11 Feb 2025 08:50



Tgt Ion: 96 Resp: 144812
Ion Ratio Lower Upper
96 100
61 141.8 113.4 170.2
98 65.3 51.2 76.8





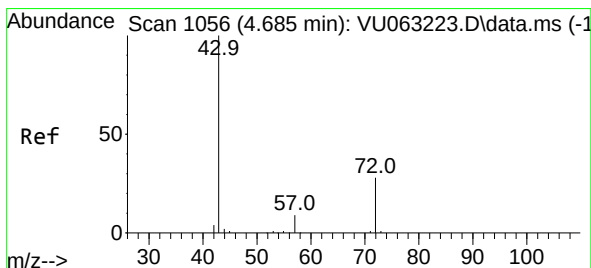
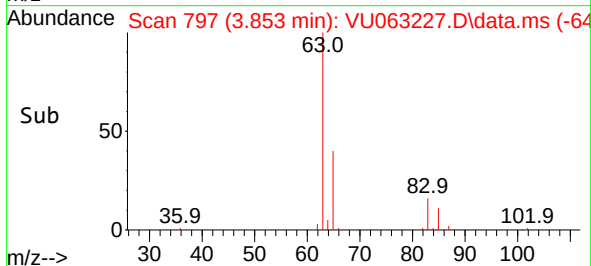
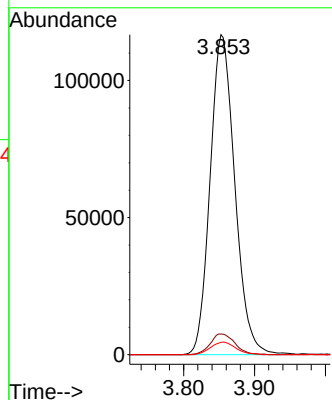
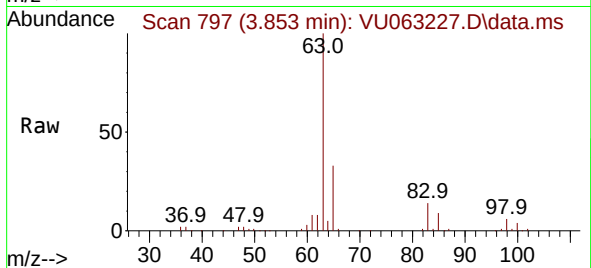
#17
1,1-Dichloroethane
Concen: 9.156 ug/l
RT: 3.853 min Scan# 797
Delta R.T. -0.000 min
Lab File: VU063227.D
Acq: 11 Feb 2025 08:50

Instrument : MSVOA_U
ClientSampleId : ICVVU021025

Tgt Ion: 63 Resp: 282308
Ion Ratio Lower Upper
63 100
98 6.5 3.3 9.9
100 3.8 2.1 6.2

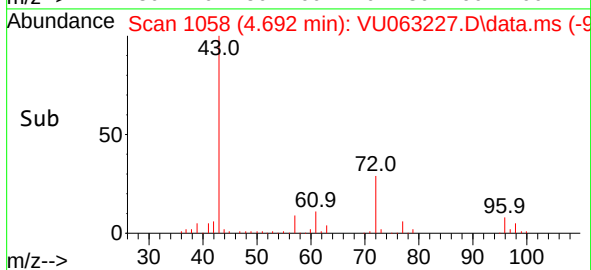
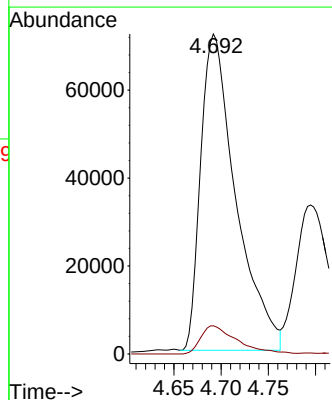
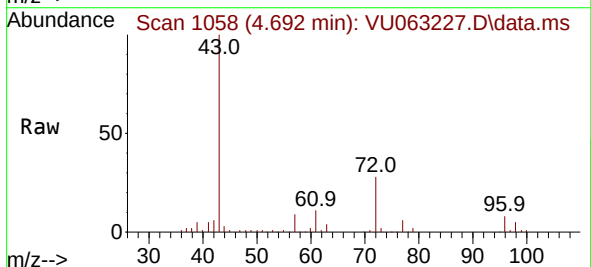
Manual Integrations
APPROVED

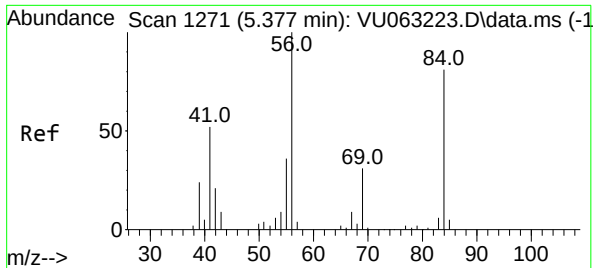
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#18
2-Butanone
Concen: 46.124 ug/l
RT: 4.692 min Scan# 1058
Delta R.T. 0.006 min
Lab File: VU063227.D
Acq: 11 Feb 2025 08:50

Tgt Ion: 43 Resp: 186600
Ion Ratio Lower Upper
43 100
57 8.9 0.0 17.0





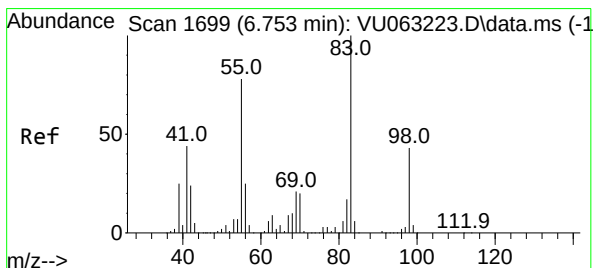
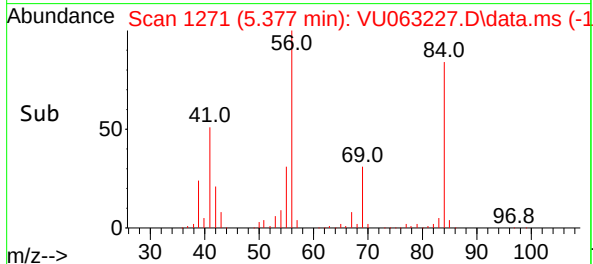
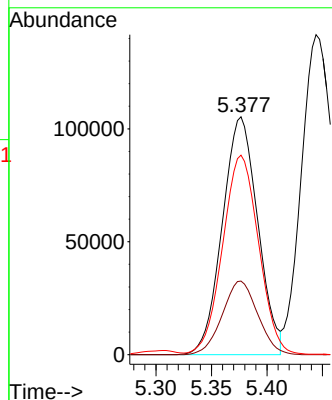
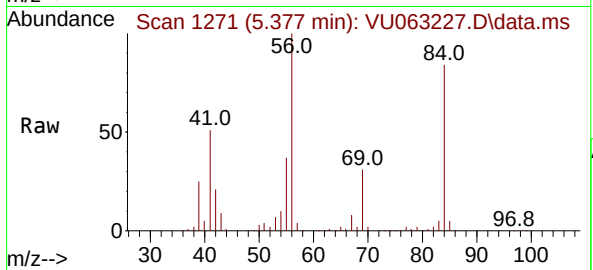
#19
Cyclohexane
Concen: 9.443 ug/l m
RT: 5.377 min Scan# 1271
Delta R.T. -0.000 min
Lab File: VU063227.D
Acq: 11 Feb 2025 08:50

Instrument : MSVOA_U
ClientSampleId : ICVVU021025

Tgt Ion: 56 Resp: 23396
Ion Ratio Lower Upper
56 100
69 30.9 24.5 36.7
84 84.2 65.2 97.8

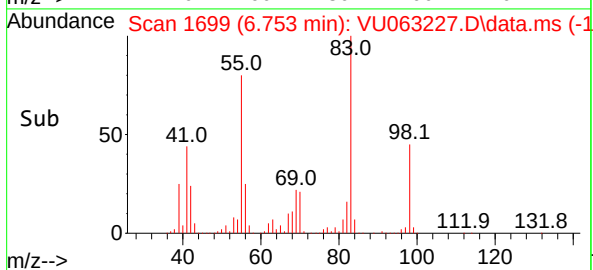
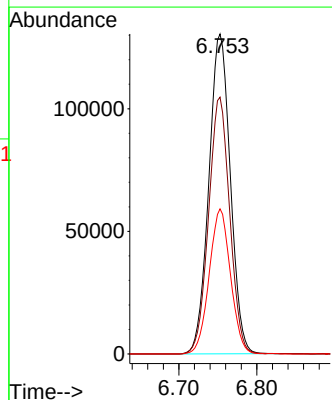
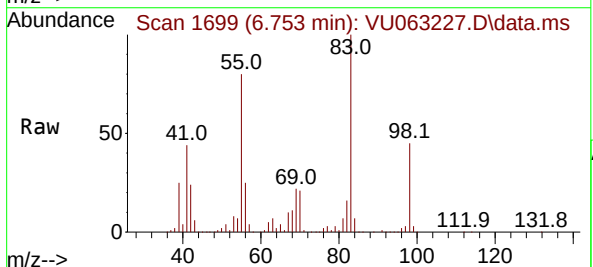
Manual Integrations
APPROVED

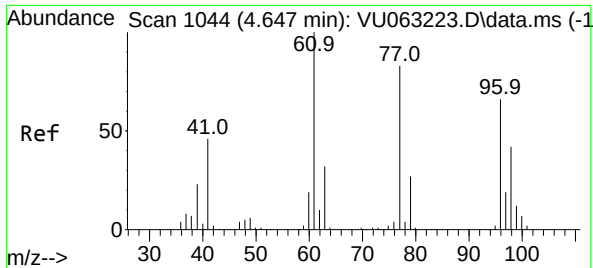
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#20
Methylcyclohexane
Concen: 10.164 ug/l
RT: 6.753 min Scan# 1699
Delta R.T. -0.000 min
Lab File: VU063227.D
Acq: 11 Feb 2025 08:50

Tgt Ion: 83 Resp: 249729
Ion Ratio Lower Upper
83 100
55 79.2 63.1 94.7
98 45.0 35.2 52.8





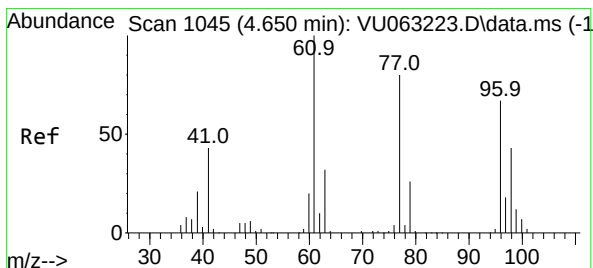
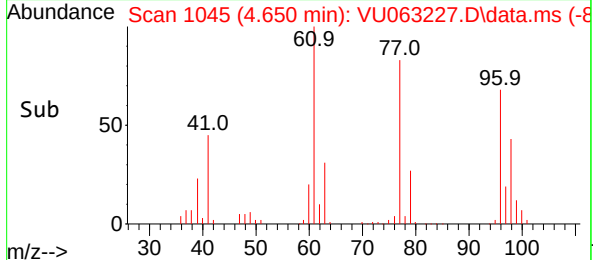
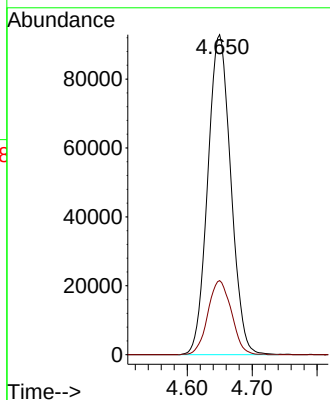
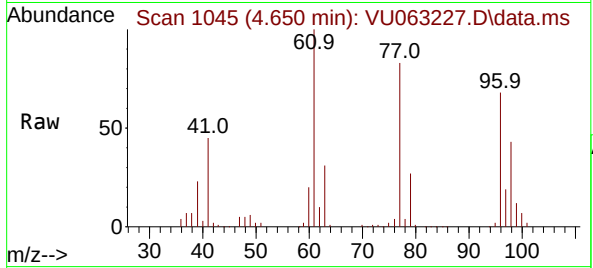
#21
2,2-Dichloropropane
Concen: 9.526 ug/l
RT: 4.650 min Scan# 1045
Delta R.T. 0.003 min
Lab File: VU063227.D
Acq: 11 Feb 2025 08:50

Instrument : MSVOA_U
ClientSampleId : ICVVU021025

Tgt Ion: 77 Resp: 22915
Ion Ratio Lower Upper
77 100
97 23.6 18.5 27.7

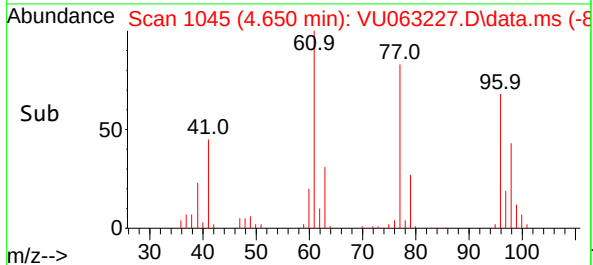
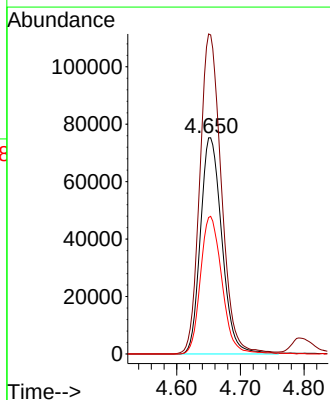
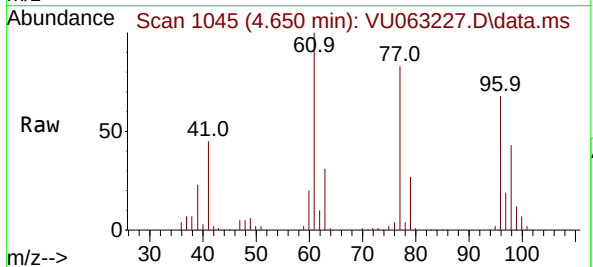
Manual Integrations
APPROVED

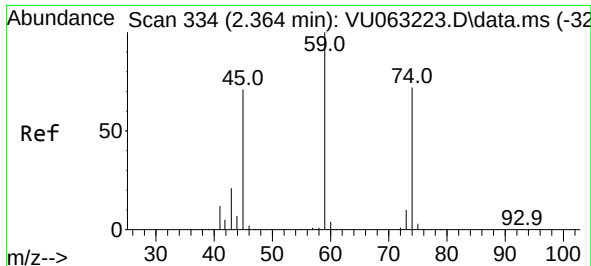
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#22
cis-1,2-Dichloroethene
Concen: 9.968 ug/l
RT: 4.650 min Scan# 1045
Delta R.T. -0.000 min
Lab File: VU063227.D
Acq: 11 Feb 2025 08:50

Tgt Ion: 96 Resp: 176178
Ion Ratio Lower Upper
96 100
61 148.9 0.0 373.3
98 63.6 31.9 95.9





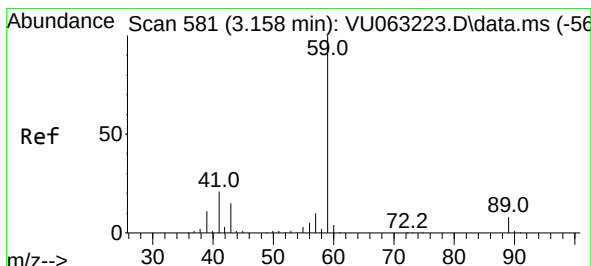
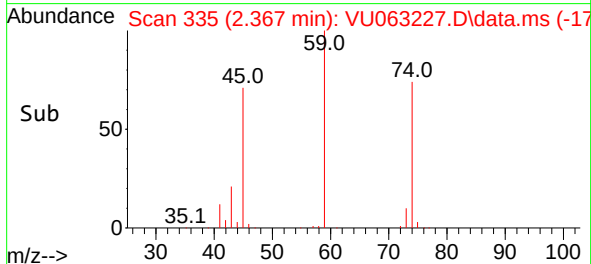
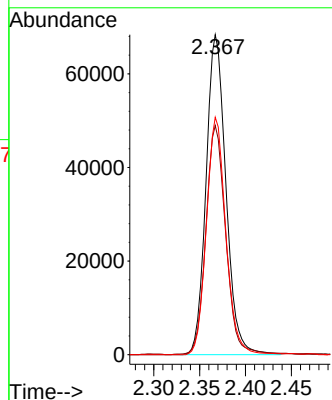
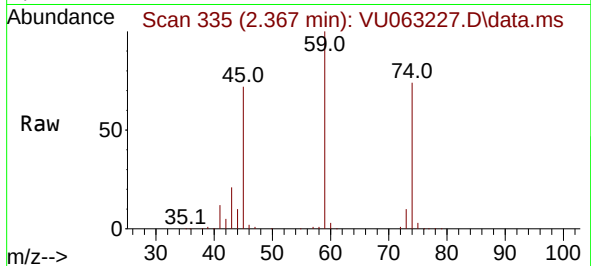
#23
Diethyl Ether
Concen: 8.360 ug/l
RT: 2.367 min Scan# 31
Delta R.T. 0.003 min
Lab File: VU063227.D
Acq: 11 Feb 2025 08:50

Instrument :
MSVOA_U
ClientSampleId :
ICVVU021025

Tgt Ion: 59 Resp: 10282
Ion Ratio Lower Upper
59 100
45 71.8 57.8 86.6
74 72.6 57.7 86.5

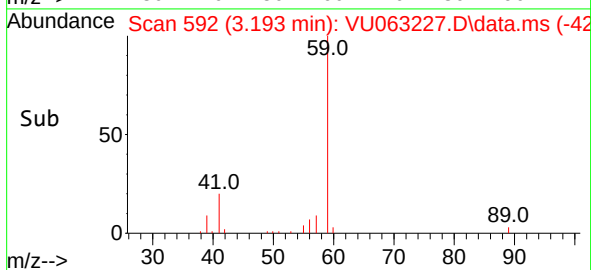
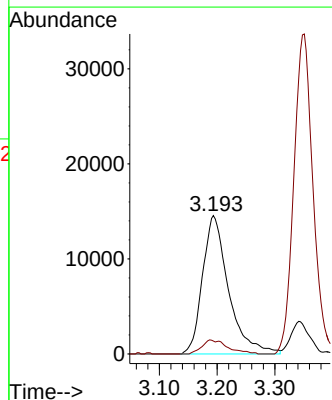
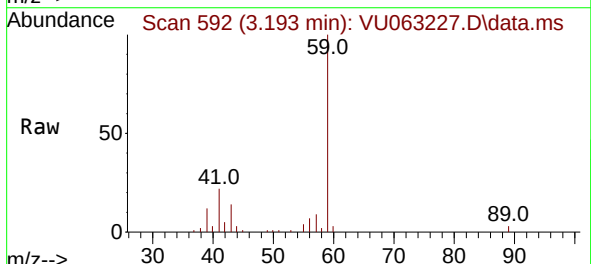
Manual Integrations
APPROVED

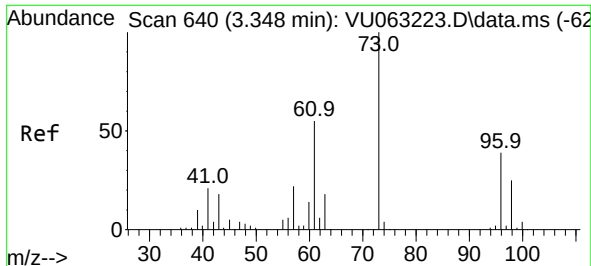
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#24
tert-Butyl Alcohol
Concen: 31.908 ug/l
RT: 3.193 min Scan# 592
Delta R.T. 0.035 min
Lab File: VU063227.D
Acq: 11 Feb 2025 08:50

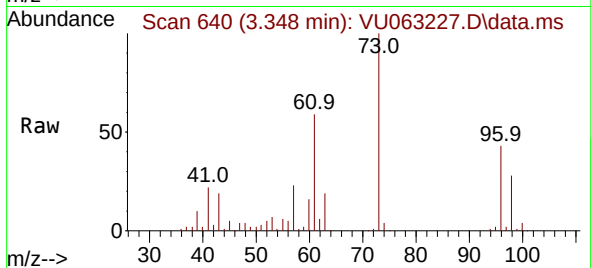
Tgt Ion: 59 Resp: 45647
Ion Ratio Lower Upper
59 100
57 5.1 7.5 11.3#





#25
Methyl tert-Butyl Ether
Concen: 9.657 ug/l
RT: 3.348 min Scan# 640
Delta R.T. -0.000 min
Lab File: VU063227.D
Acq: 11 Feb 2025 08:50

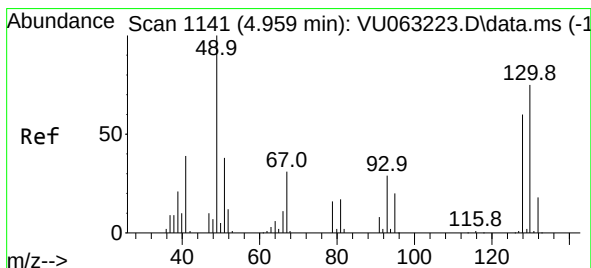
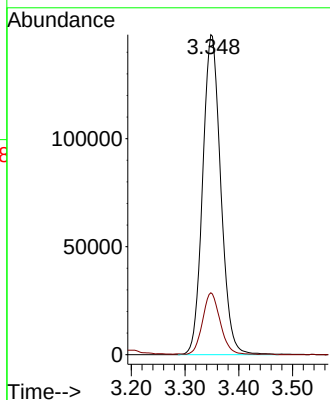
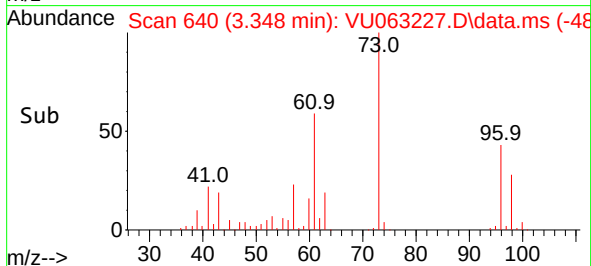
Instrument :
MSVOA_U
ClientSampleId :
ICVVU021025



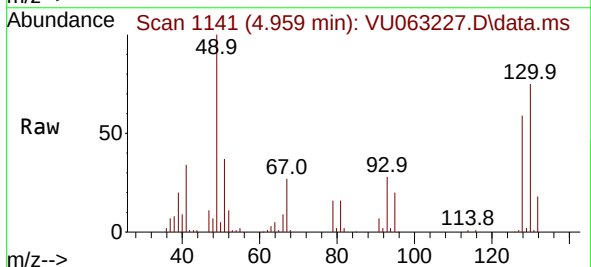
Tgt Ion: 73 Resp: 34568
Ion Ratio Lower Upper
73 100
43 18.7 14.9 22.3

Manual Integrations
APPROVED

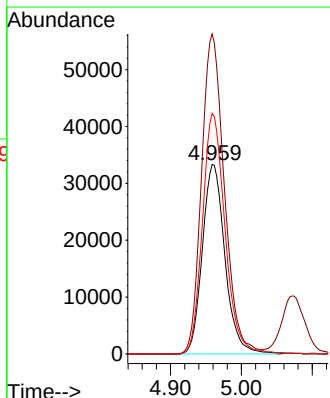
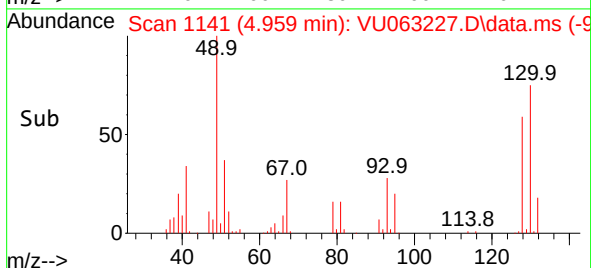
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025

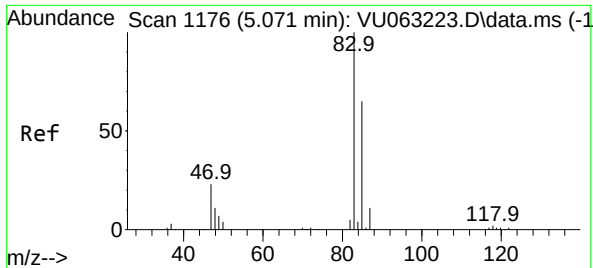


#26
Bromochloromethane
Concen: 9.544 ug/l
RT: 4.959 min Scan# 1141
Delta R.T. -0.000 min
Lab File: VU063227.D
Acq: 11 Feb 2025 08:50



Tgt Ion:128 Resp: 73733
Ion Ratio Lower Upper
128 100
49 170.0 0.0 343.4
130 127.6 102.9 154.3





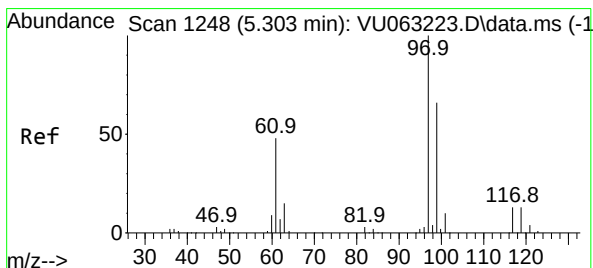
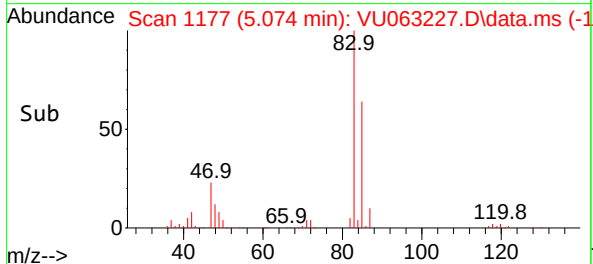
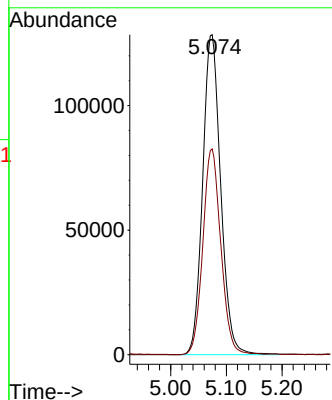
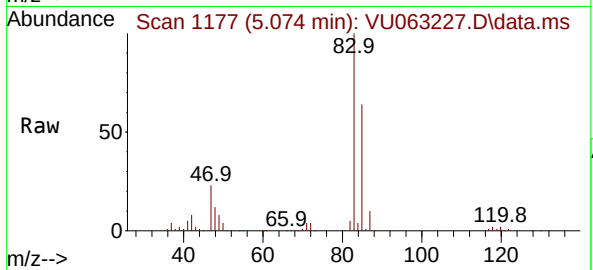
#27
Chloroform
Concen: 9.296 ug/l
RT: 5.074 min Scan# 1176
Delta R.T. 0.003 min
Lab File: VU063227.D
Acq: 11 Feb 2025 08:50

Instrument :
MSVOA_U
ClientSampleId :
ICVVU021025

Tgt Ion: 83 Resp: 28926
Ion Ratio Lower Upper
83 100
85 64.3 0.0 129.8

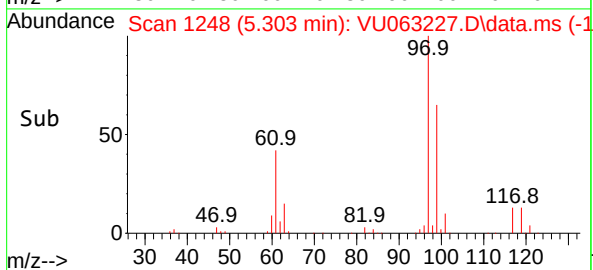
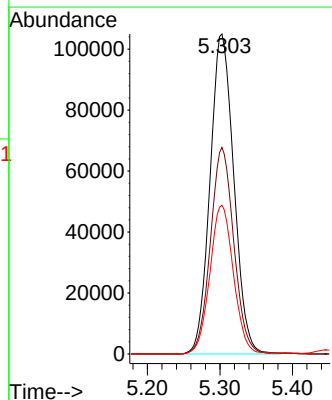
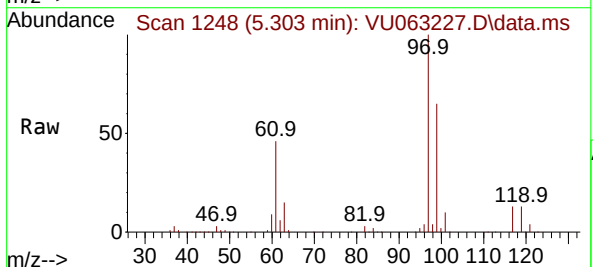
Manual Integrations
APPROVED

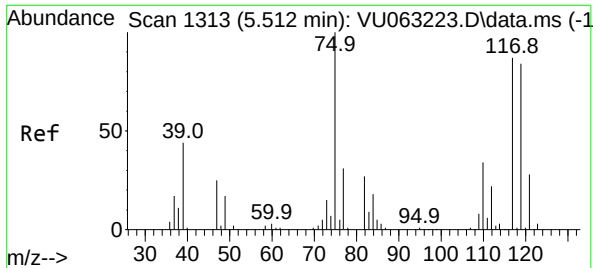
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#28
1,1,1-Trichloroethane
Concen: 9.483 ug/l
RT: 5.303 min Scan# 1248
Delta R.T. -0.000 min
Lab File: VU063227.D
Acq: 11 Feb 2025 08:50

Tgt Ion: 97 Resp: 239040
Ion Ratio Lower Upper
97 100
99 63.5 32.4 97.0
61 46.1 23.8 71.2





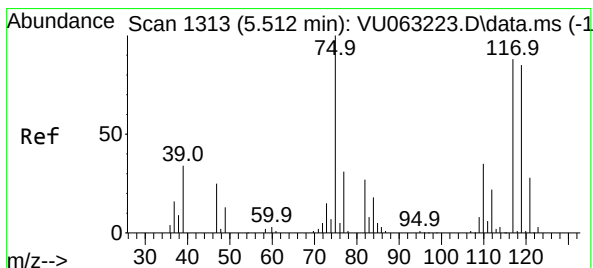
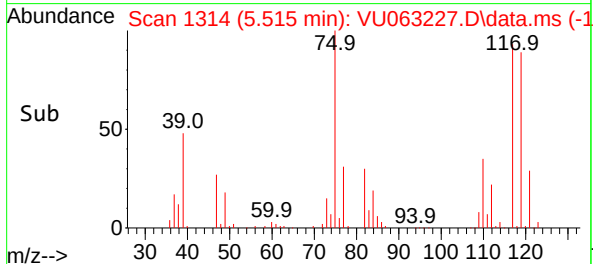
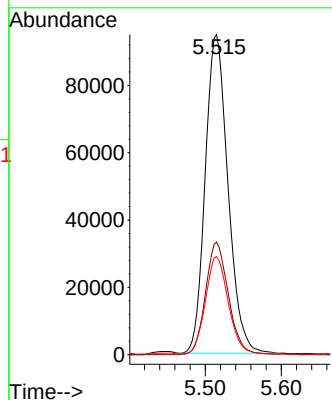
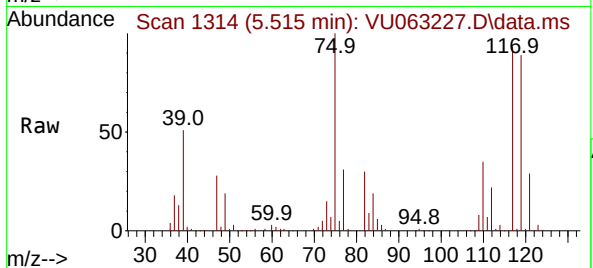
#29
1,1-Dichloropropene
Concen: 8.717 ug/l
RT: 5.515 min Scan# 11
Delta R.T. 0.003 min
Lab File: VU063227.D
Acq: 11 Feb 2025 08:50

Instrument :
MSVOA_U
ClientSampleId :
ICVVU021025

Tgt Ion: 75 Resp: 19680
Ion Ratio Lower Upper
75 100
110 35.5 17.2 51.5
77 30.9 24.6 37.0

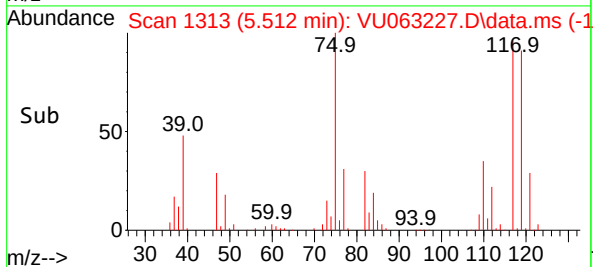
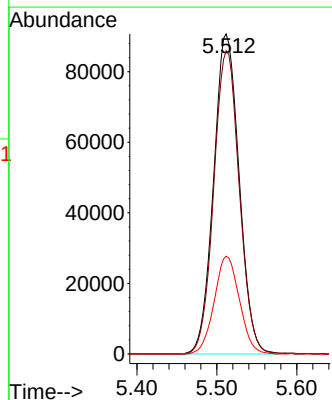
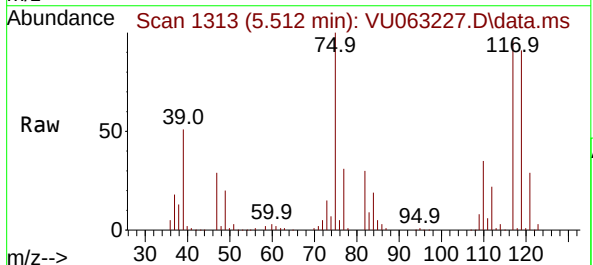
Manual Integrations
APPROVED

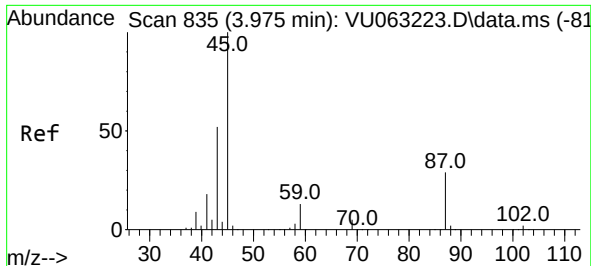
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#30
Carbon Tetrachloride
Concen: 9.311 ug/l
RT: 5.512 min Scan# 1313
Delta R.T. -0.000 min
Lab File: VU063227.D
Acq: 11 Feb 2025 08:50

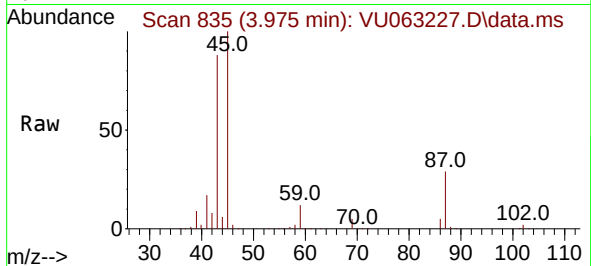
Tgt Ion:117 Resp: 201284
Ion Ratio Lower Upper
117 100
119 94.7 76.7 115.1
121 30.5 25.5 38.3





#31
Isopropyl Ether
Concen: 10.534 ug/l
RT: 3.975 min Scan# 81
Delta R.T. -0.000 min
Lab File: VU063227.D
Acq: 11 Feb 2025 08:50

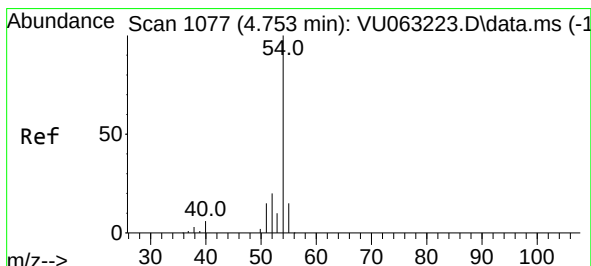
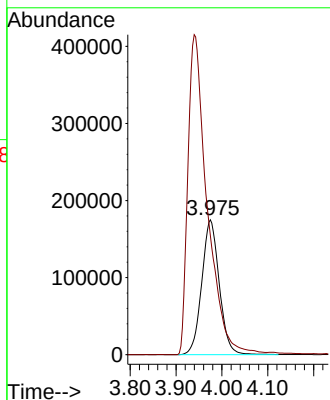
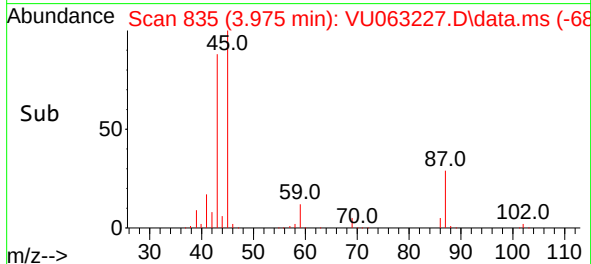
Instrument :
MSVOA_U
ClientSampleId :
ICVVU021025



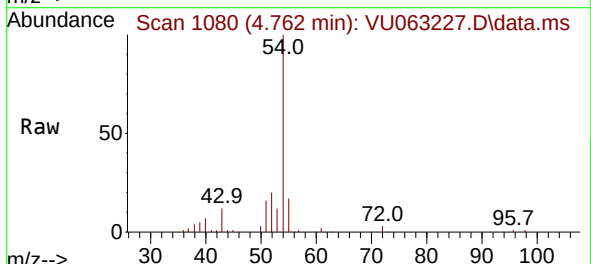
Tgt Ion: 45 Resp: 46369
Ion Ratio Lower Upper
45 100
43 262.2 25.7 77.1

Manual Integrations
APPROVED

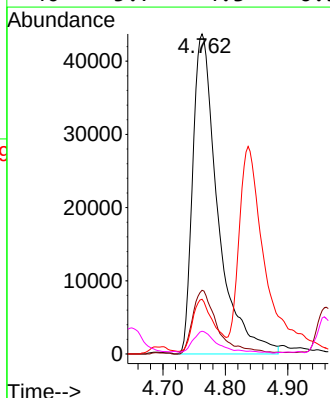
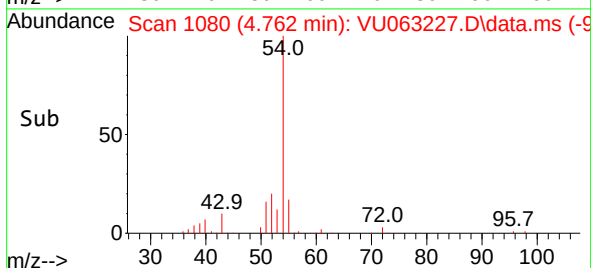
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025

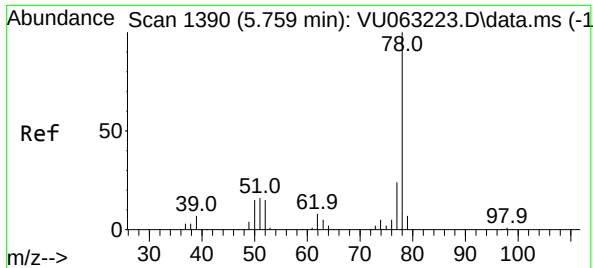


#34
Propionitrile
Concen: 100.030 ug/l
RT: 4.762 min Scan# 1080
Delta R.T. 0.009 min
Lab File: VU063227.D
Acq: 11 Feb 2025 08:50



Tgt Ion: 54 Resp: 122058
Ion Ratio Lower Upper
54 100
52 19.8 16.3 24.5
55 13.7 11.8 17.6
40 5.7 4.3 6.5





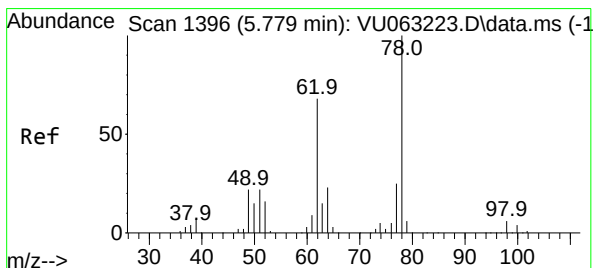
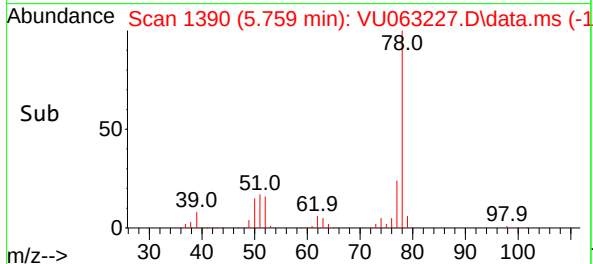
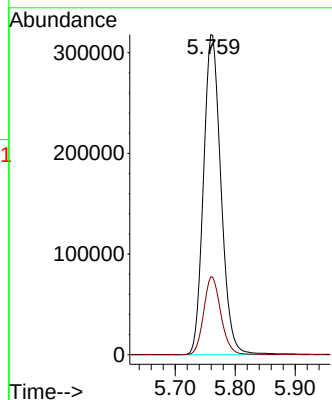
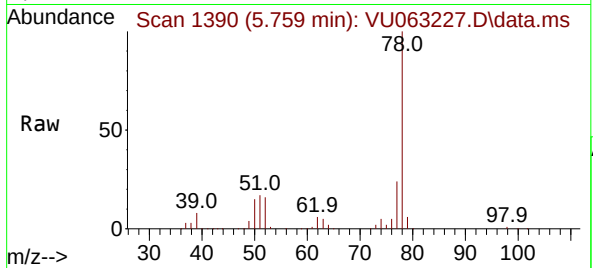
#35
Benzene
Concen: 9.305 ug/l
RT: 5.759 min Scan# 1390
Delta R.T. -0.000 min
Lab File: VU063227.D
Acq: 11 Feb 2025 08:50

Instrument : MSVOA_U
ClientSampleId : ICVVU021025

Tgt Ion: 78 Resp: 645948
Ion Ratio Lower Upper
78 100
77 24.3 19.0 28.4

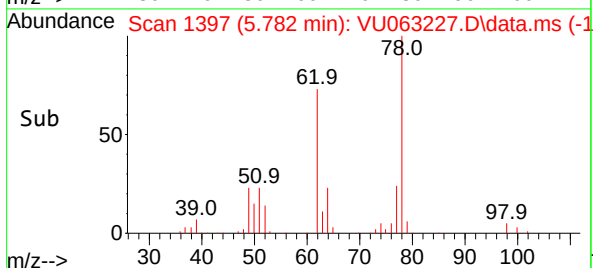
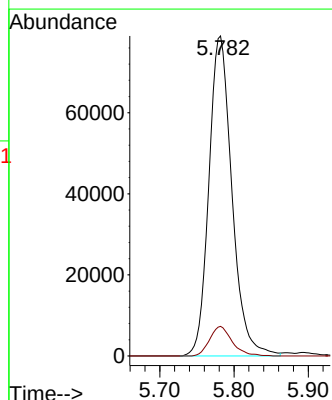
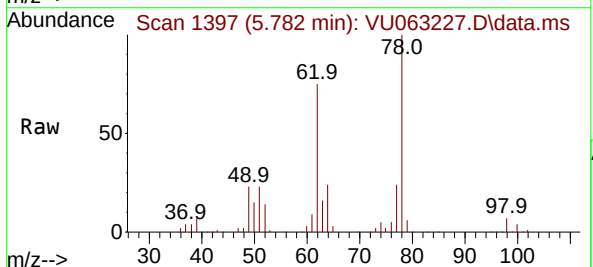
Manual Integrations
APPROVED

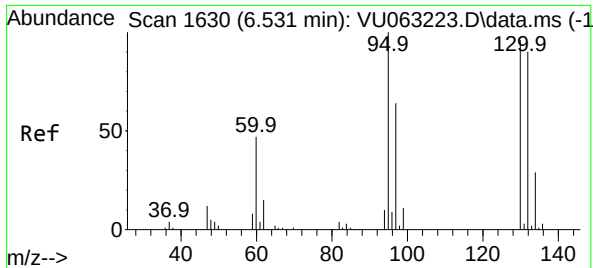
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#36
1,2-Dichloroethane
Concen: 8.506 ug/l
RT: 5.782 min Scan# 1397
Delta R.T. 0.003 min
Lab File: VU063227.D
Acq: 11 Feb 2025 08:50

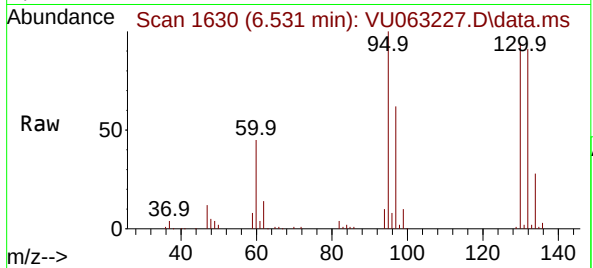
Tgt Ion: 62 Resp: 170414
Ion Ratio Lower Upper
62 100
98 9.0 6.9 10.3





#37
Trichloroethene
Concen: 8.871 ug/l
RT: 6.531 min Scan# 1630
Delta R.T. -0.000 min
Lab File: VU063227.D
Acq: 11 Feb 2025 08:50

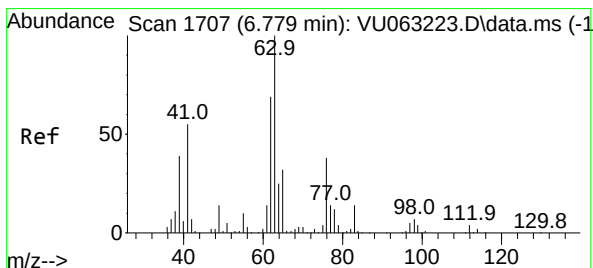
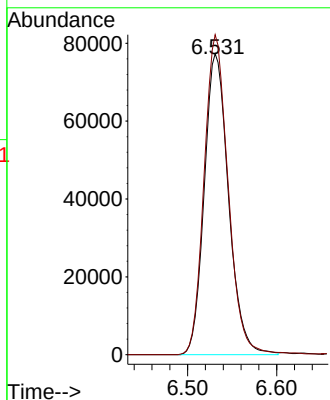
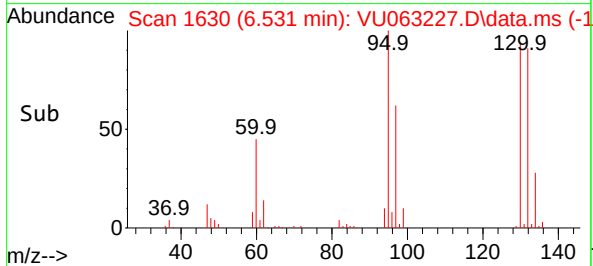
Instrument :
MSVOA_U
ClientSampleId :
ICVVU021025



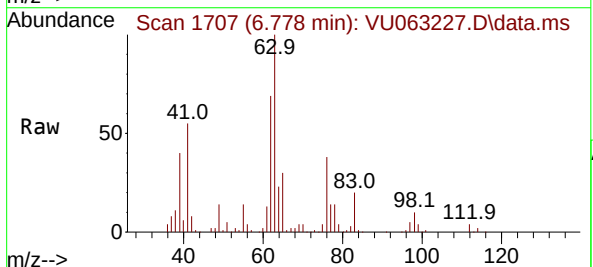
Tgt Ion:130 Resp: 146452
Ion Ratio Lower Upper
130 100
95 106.3 83.2 124.8

Manual Integrations
APPROVED

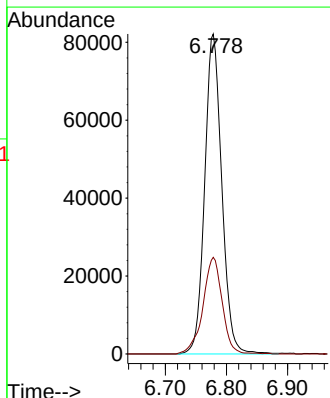
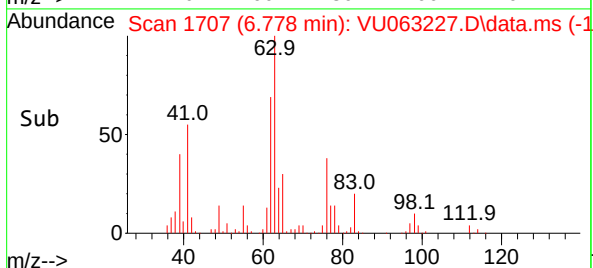
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025

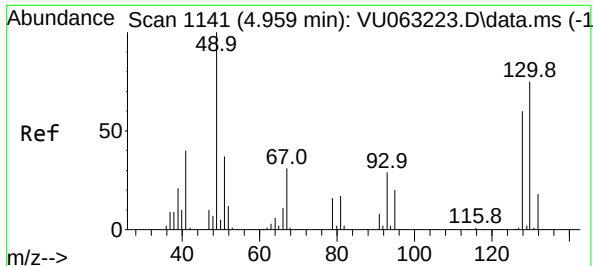


#38
1,2-Dichloropropane
Concen: 8.794 ug/l
RT: 6.778 min Scan# 1707
Delta R.T. -0.000 min
Lab File: VU063227.D
Acq: 11 Feb 2025 08:50



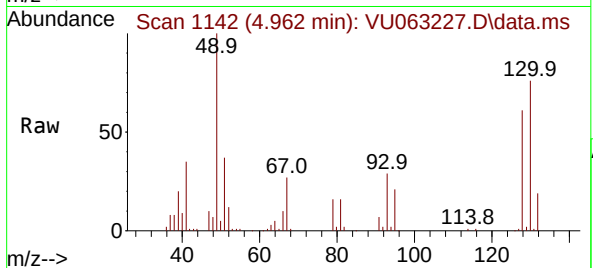
Tgt Ion: 63 Resp: 159772
Ion Ratio Lower Upper
63 100
65 30.2 25.3 37.9





#39
Methacrylonitrile
Concen: 10.277 ug/l
RT: 4.962 min Scan# 1141
Delta R.T. 0.003 min
Lab File: VU063227.D
Acq: 11 Feb 2025 08:50

Instrument :
MSVOA_U
ClientSampleId :
ICVVU021025

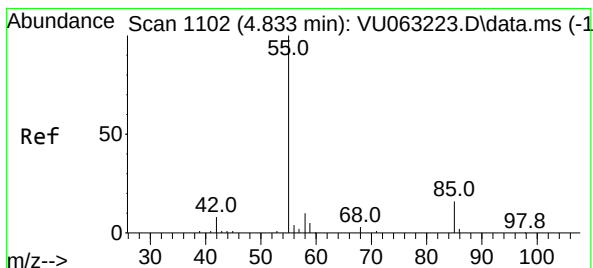
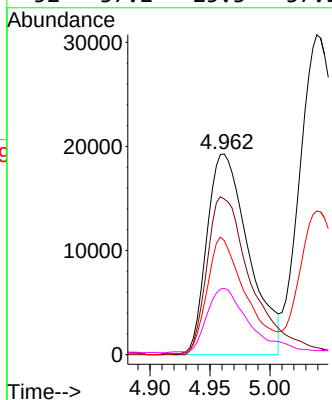
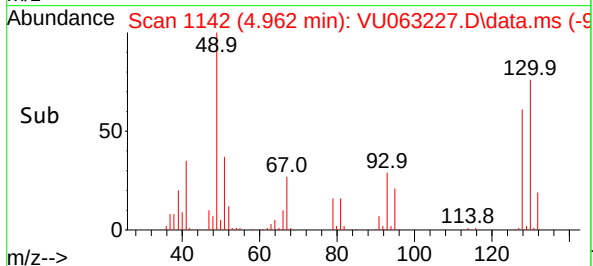


Tgt Ion: 41 Resp: 4673

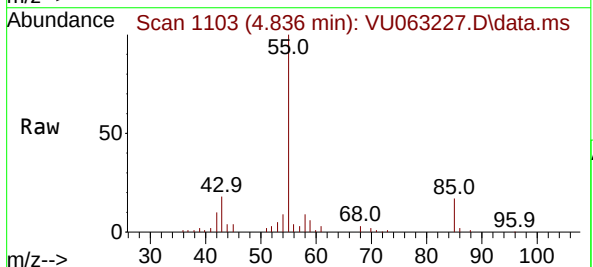
Ion	Ratio	Lower	Upper
41	100		
67	84.8	64.5	96.7
39	53.8	43.0	64.6
52	37.2	25.3	37.9

Manual Integrations
APPROVED

Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025

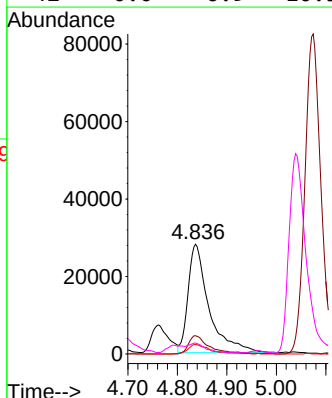
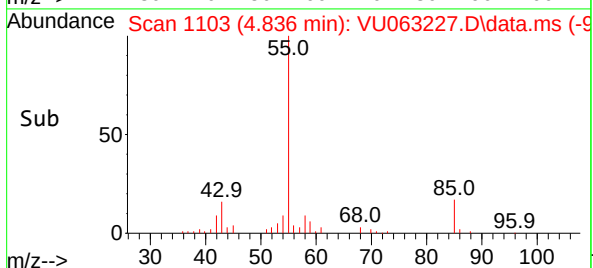


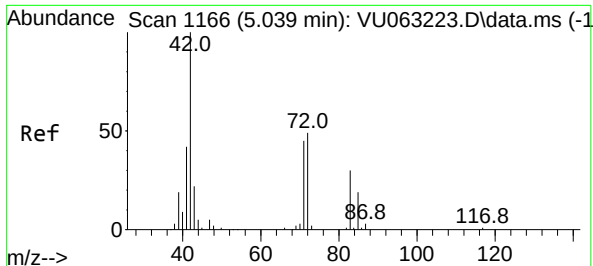
#40
Methyl acrylate
Concen: 9.798 ug/l
RT: 4.836 min Scan# 1103
Delta R.T. 0.003 min
Lab File: VU063227.D
Acq: 11 Feb 2025 08:50



Tgt Ion: 55 Resp: 82118

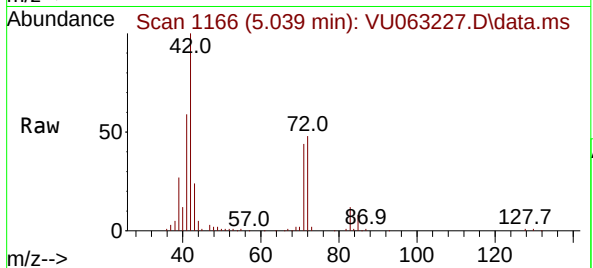
Ion	Ratio	Lower	Upper
55	100		
85	16.6	13.3	19.9
58	8.2	7.3	10.9
42	0.0	6.9	10.3





#41
Tetrahydrofuran
Concen: 46.529 ug/l
RT: 5.039 min Scan# 1166
Delta R.T. -0.000 min
Lab File: VU063227.D
Acq: 11 Feb 2025 08:50

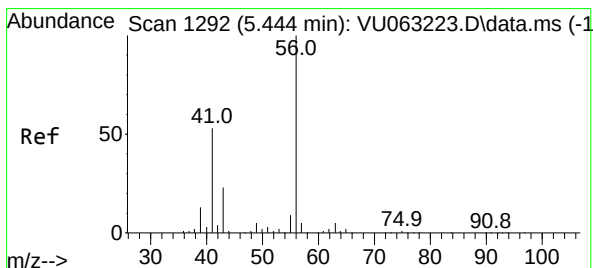
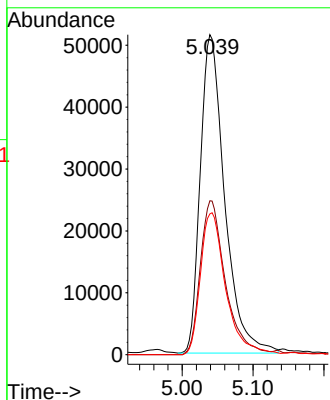
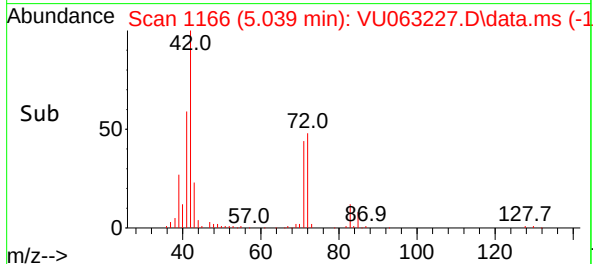
Instrument : MSVOA_U
ClientSampleId : ICVVU021025



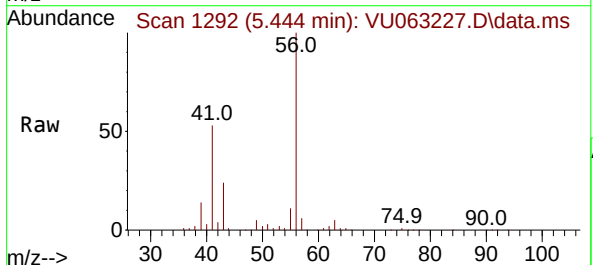
Tgt Ion: 42 Resp: 123058
Ion Ratio Lower Upper
42 100
72 49.7 41.5 62.3
71 46.2 37.2 55.8

Manual Integrations
APPROVED

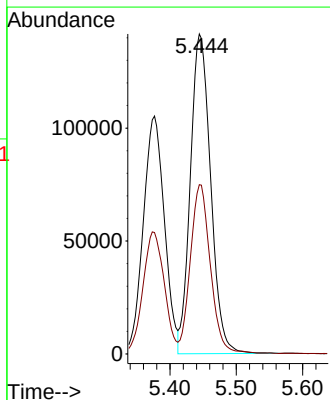
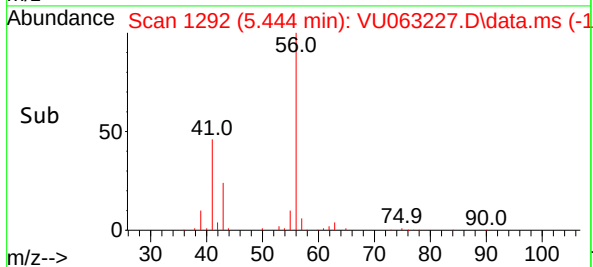
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025

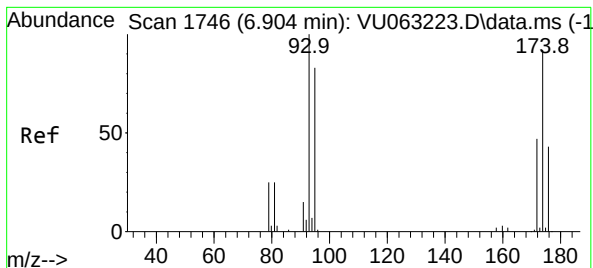


#42
1-Chlorobutane
Concen: 9.720 ug/l
RT: 5.444 min Scan# 1292
Delta R.T. -0.000 min
Lab File: VU063227.D
Acq: 11 Feb 2025 08:50



Tgt Ion: 56 Resp: 300232
Ion Ratio Lower Upper
56 100
41 51.9 26.3 78.8





#43

Dibromomethane

Concen: 9.055 ug/l

RT: 6.907 min Scan# 1747

Delta R.T. 0.003 min

Lab File: VU063227.D

Acq: 11 Feb 2025 08:50

Instrument :

MSVOA_U

ClientSampleId :

ICVVU021025

Tgt Ion: 93 Resp: 83308

Ion Ratio Lower Upper

93 100

95 82.4 67.2 100.8

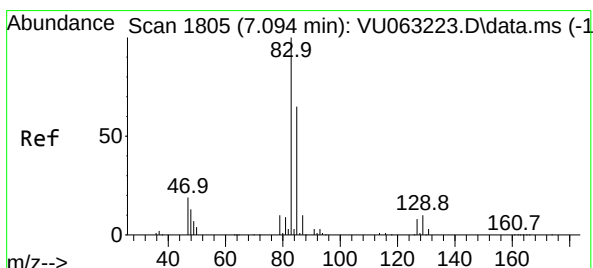
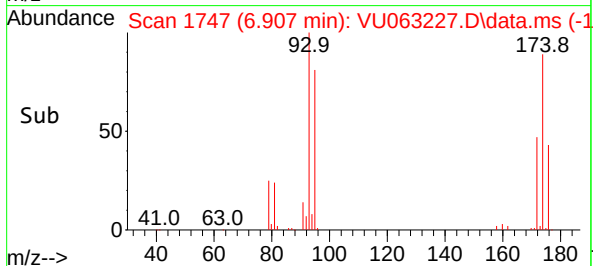
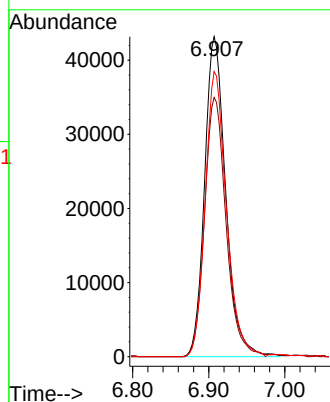
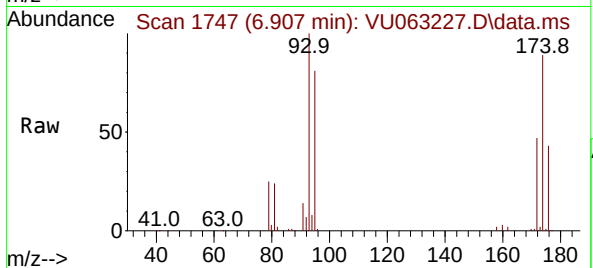
174 89.9 75.7 113.5

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#44

Bromodichloromethane

Concen: 10.047 ug/l

RT: 7.094 min Scan# 1805

Delta R.T. -0.000 min

Lab File: VU063227.D

Acq: 11 Feb 2025 08:50

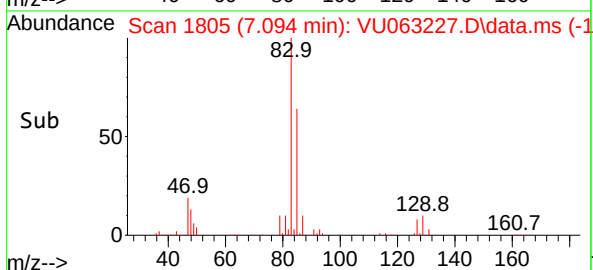
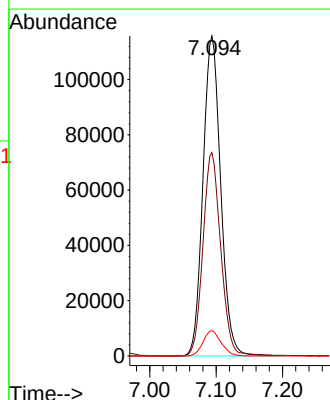
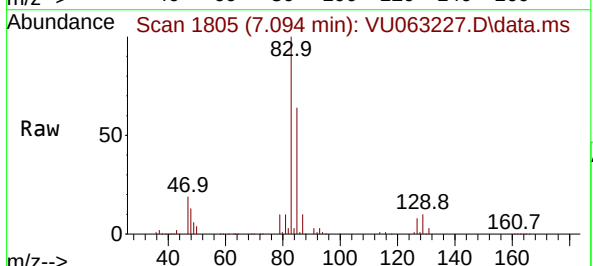
Tgt Ion: 83 Resp: 215139

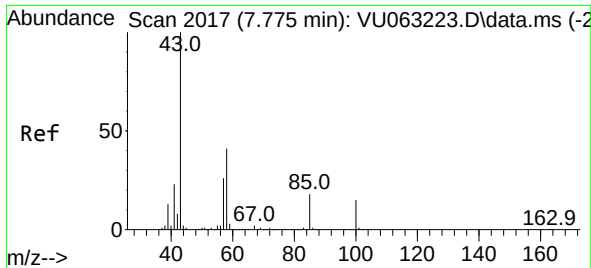
Ion Ratio Lower Upper

83 100

85 63.6 51.7 77.5

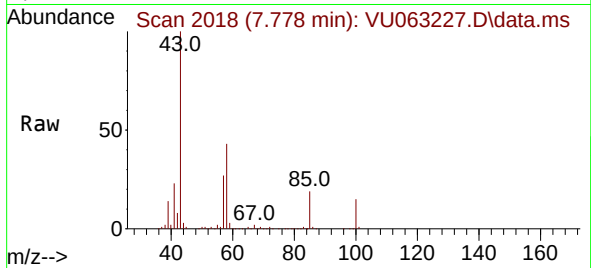
127 7.9 6.7 10.1





#45
4-Methyl-2-Pentanone
Concen: 48.787 ug/l
RT: 7.778 min Scan# 2017
Delta R.T. 0.003 min
Lab File: VU063227.D
Acq: 11 Feb 2025 08:50

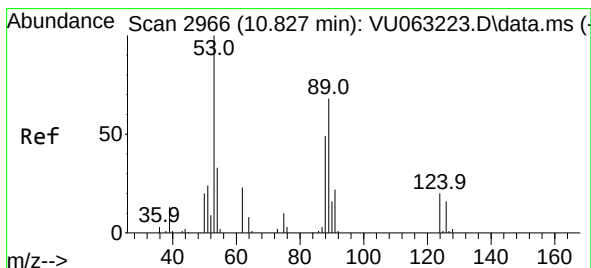
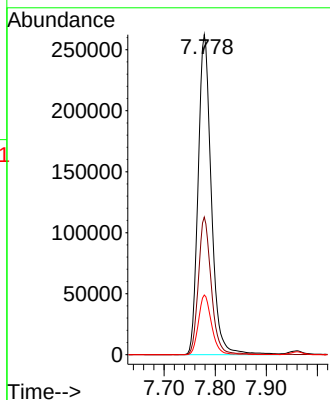
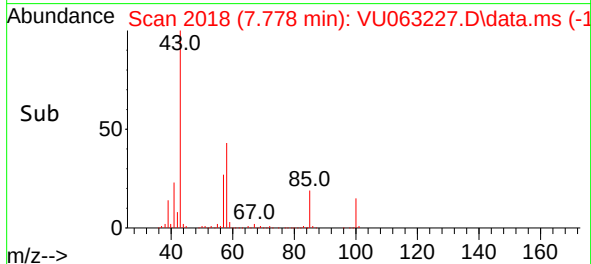
Instrument :
MSVOA_U
ClientSampleId :
ICVVU021025



Tgt Ion: 43 Resp: 47057
Ion Ratio Lower Upper
43 100
58 42.1 20.8 62.5
85 18.5 14.8 22.2

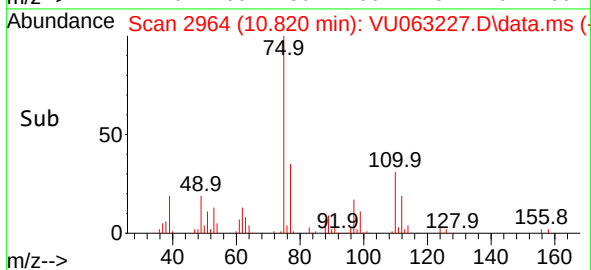
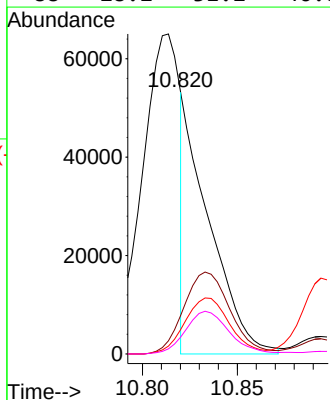
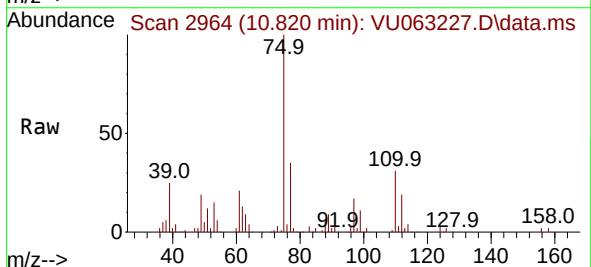
Manual Integrations
APPROVED

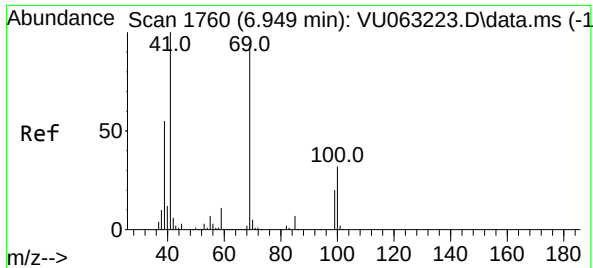
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#46
t-1,4-Dichloro-2-butene
Concen: 10.896 ug/l m
RT: 10.820 min Scan# 2964
Delta R.T. -0.007 min
Lab File: VU063227.D
Acq: 11 Feb 2025 08:50

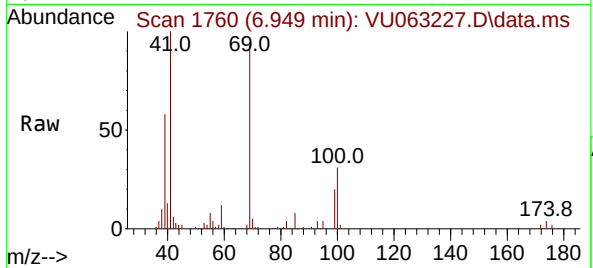
Tgt Ion: 75 Resp: 49406
Ion Ratio Lower Upper
75 100
53 57.3 64.5 96.7#
89 37.9 43.4 65.2#
88 28.2 31.2 46.8#





#47
Methyl methacrylate
Concen: 9.683 ug/l
RT: 6.949 min Scan# 1760
Delta R.T. -0.000 min
Lab File: VU063227.D
Acq: 11 Feb 2025 08:50

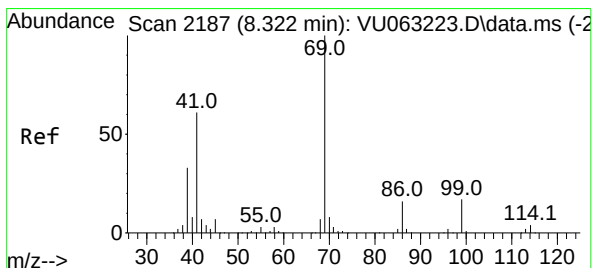
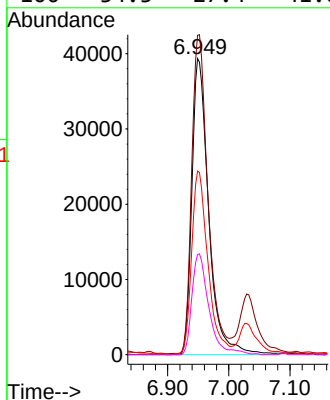
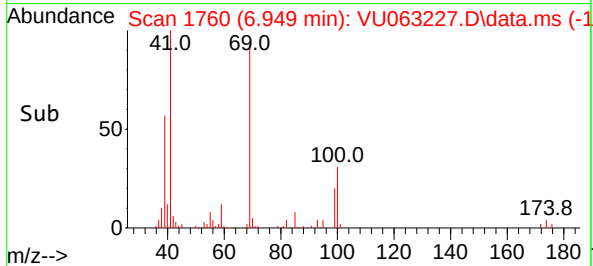
Instrument :
MSVOA_U
ClientSampleId :
ICVVU021025



Tgt Ion: 69 Resp: 75036
Ion Ratio Lower Upper
69 100
41 103.9 0.0 217.0
39 60.4 47.7 71.5
100 34.3 27.4 41.0

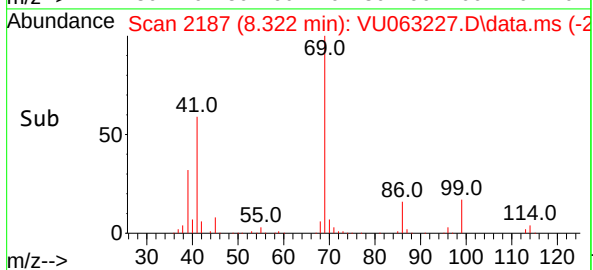
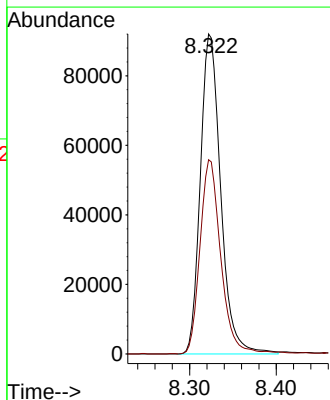
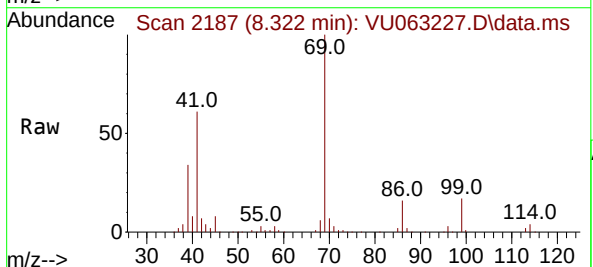
Manual Integrations
APPROVED

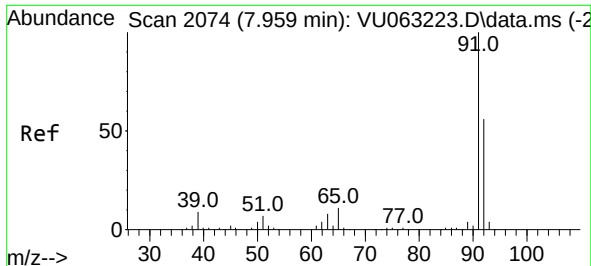
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#48
Ethyl methacrylate
Concen: 10.355 ug/l
RT: 8.322 min Scan# 2187
Delta R.T. -0.000 min
Lab File: VU063227.D
Acq: 11 Feb 2025 08:50

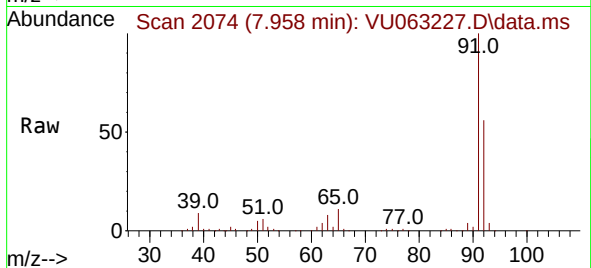
Tgt Ion: 69 Resp: 150671
Ion Ratio Lower Upper
69 100
41 62.1 30.6 92.0





#49
Toluene
Concen: 9.872 ug/l
RT: 7.958 min Scan# 2074
Delta R.T. -0.000 min
Lab File: VU063227.D
Acq: 11 Feb 2025 08:50

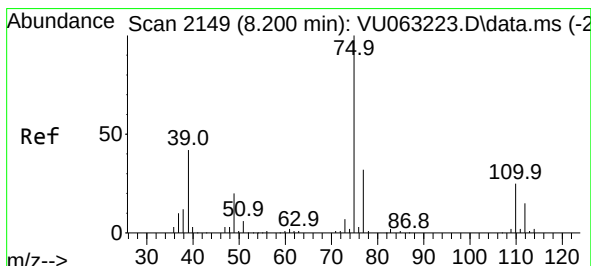
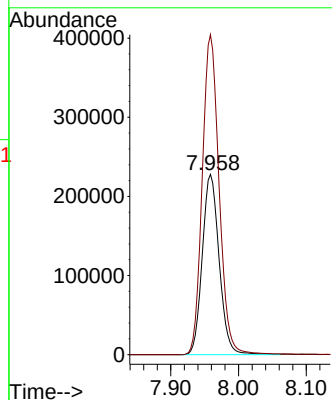
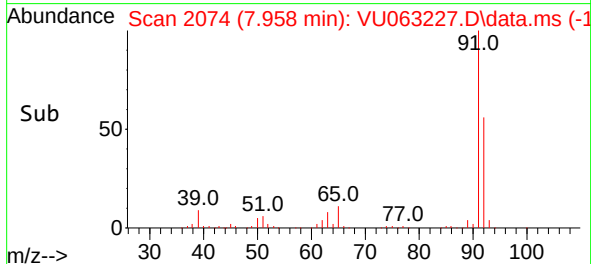
Instrument : MSVOA_U
ClientSampleId : ICVVU021025



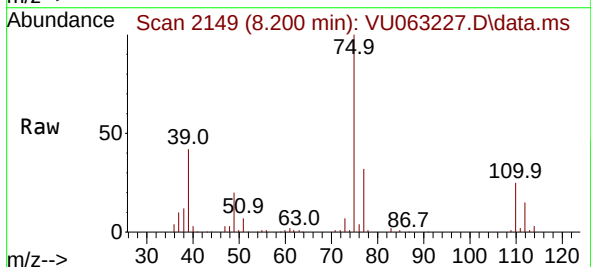
Tgt Ion: 92 Resp: 39410
Ion Ratio Lower Upper
92 100
91 177.5 141.8 212.6

Manual Integrations
APPROVED

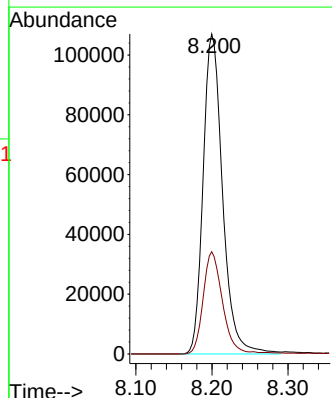
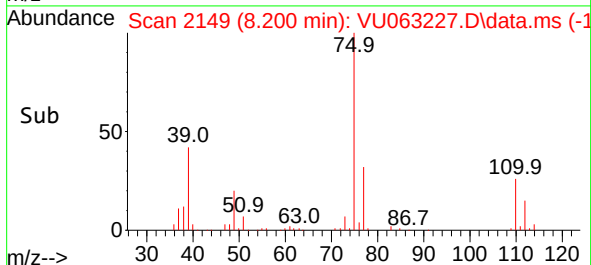
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025

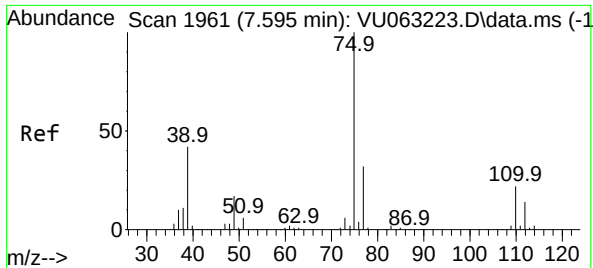


#50
t-1,3-Dichloropropene
Concen: 9.703 ug/l
RT: 8.200 min Scan# 2149
Delta R.T. -0.000 min
Lab File: VU063227.D
Acq: 11 Feb 2025 08:50



Tgt Ion: 75 Resp: 190233
Ion Ratio Lower Upper
75 100
77 32.0 25.9 38.9





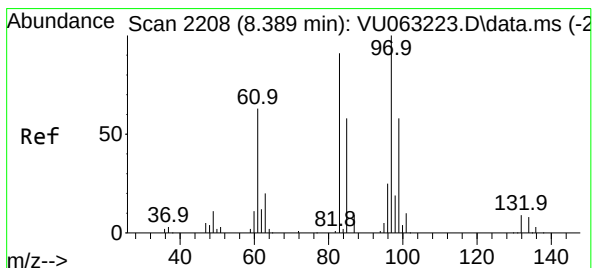
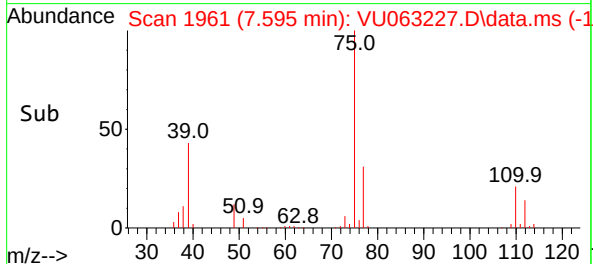
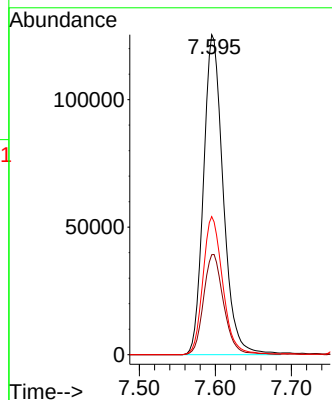
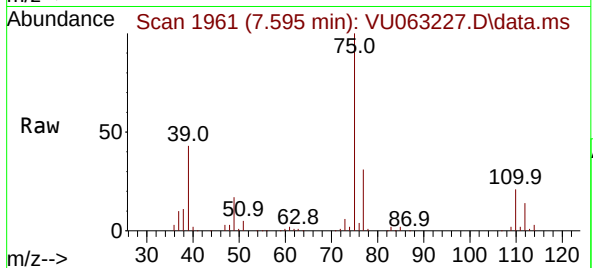
#51
 cis-1,3-Dichloropropene
 Concen: 9.319 ug/l
 RT: 7.595 min Scan# 1961
 Delta R.T. -0.000 min
 Lab File: VU063227.D
 Acq: 11 Feb 2025 08:50

Instrument : MSVOA_U
 ClientSampleId : ICVVU021025

Tgt Ion: 75 Resp: 22568
 Ion Ratio Lower Upper
 75 100
 77 31.2 25.3 37.9
 39 43.1 33.5 50.3

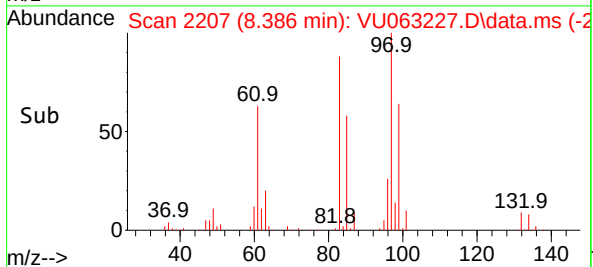
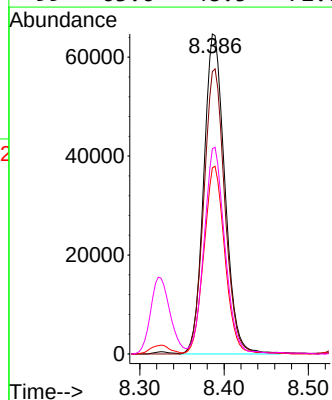
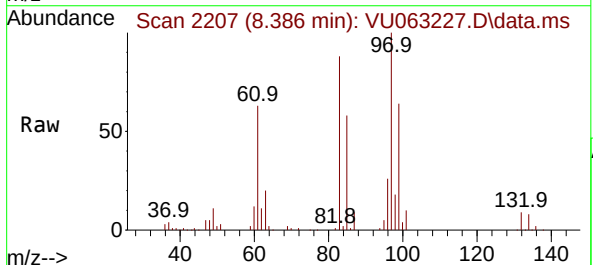
Manual Integrations
 APPROVED

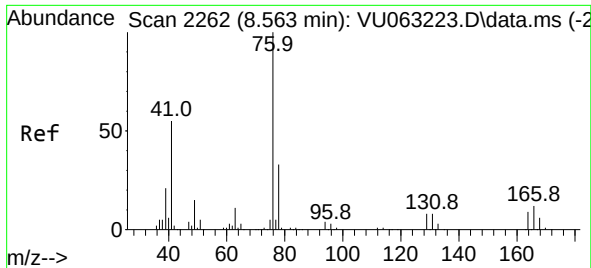
Reviewed By :Amit Patel 02/12/2025
 Supervised By :Mahesh Dadoda 02/12/2025



#52
 1,1,2-Trichloroethane
 Concen: 9.082 ug/l
 RT: 8.386 min Scan# 2207
 Delta R.T. -0.003 min
 Lab File: VU063227.D
 Acq: 11 Feb 2025 08:50

Tgt Ion: 97 Resp: 112663
 Ion Ratio Lower Upper
 97 100
 83 88.2 73.0 109.4
 85 57.9 46.3 69.5
 99 63.6 48.5 72.7





#53

1,3-Dichloropropane

Concen: 8.908 ug/l

RT: 8.563 min Scan# 21

Delta R.T. -0.000 min

Lab File: VU063227.D

Acq: 11 Feb 2025 08:50

Instrument :

MSVOA_U

ClientSampleId :

ICVVU021025

Tgt Ion: 76 Resp: 19617

Ion Ratio Lower Upper

76 100

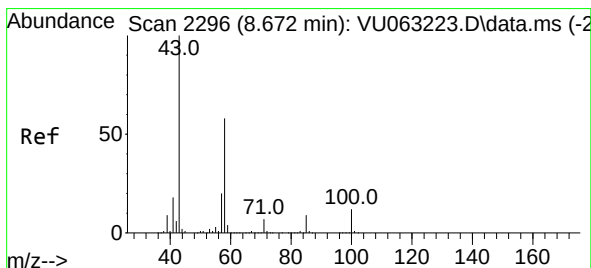
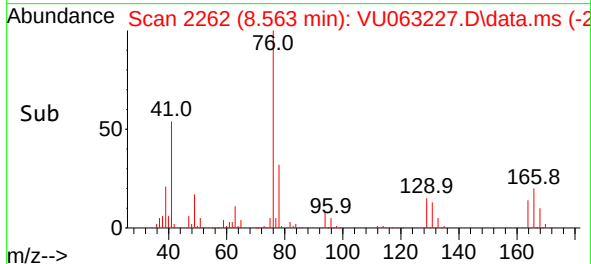
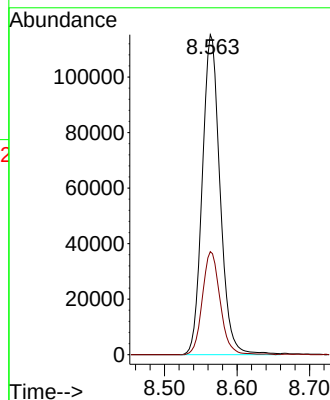
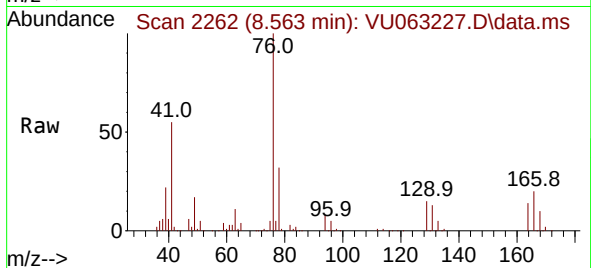
78 32.1 26.3 39.5

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#54

2-Hexanone

Concen: 48.325 ug/l

RT: 8.675 min Scan# 2297

Delta R.T. 0.003 min

Lab File: VU063227.D

Acq: 11 Feb 2025 08:50

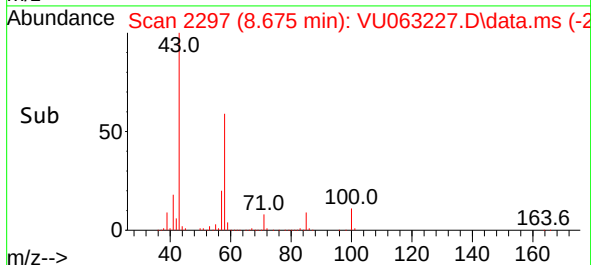
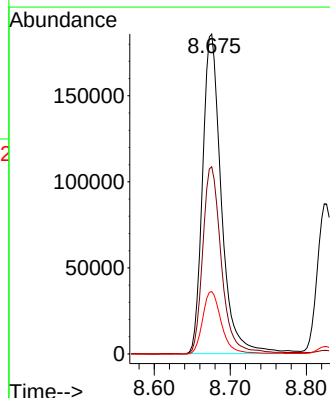
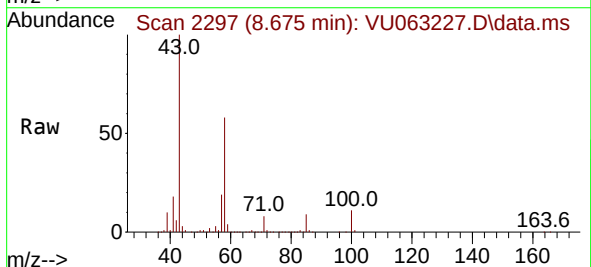
Tgt Ion: 43 Resp: 318084

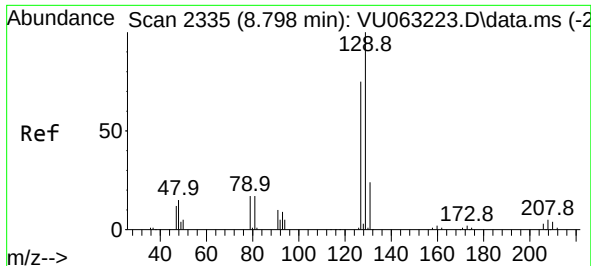
Ion Ratio Lower Upper

43 100

58 58.5 38.0 78.0

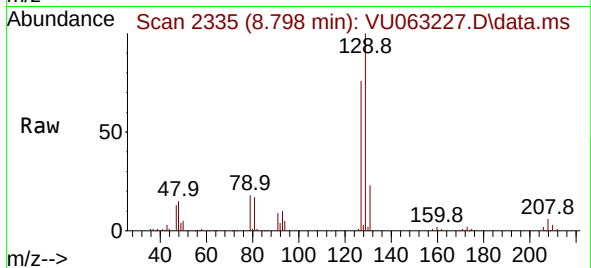
57 19.6 0.0 39.1





#55
Dibromochloromethane
Concen: 9.564 ug/l
RT: 8.798 min Scan# 2335
Delta R.T. -0.000 min
Lab File: VU063227.D
Acq: 11 Feb 2025 08:50

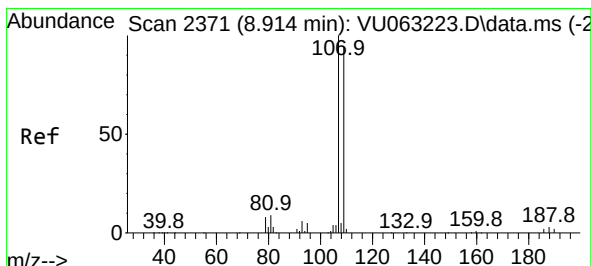
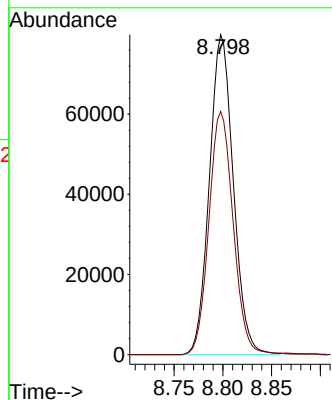
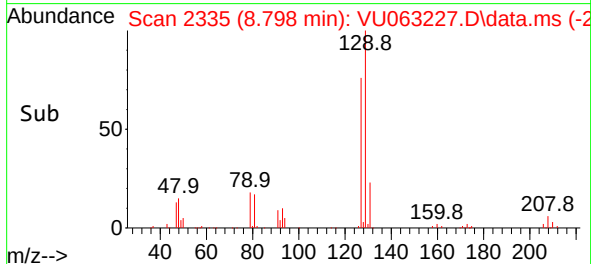
Instrument : MSVOA_U
ClientSampleId : ICVVU021025



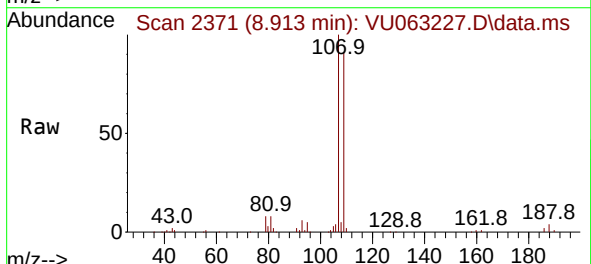
Tgt Ion:129 Resp: 13648
Ion Ratio Lower Upper
129 100
127 77.0 60.4 90.6

Manual Integrations
APPROVED

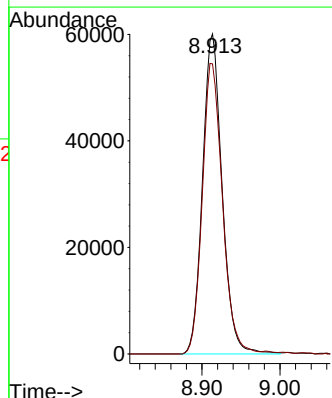
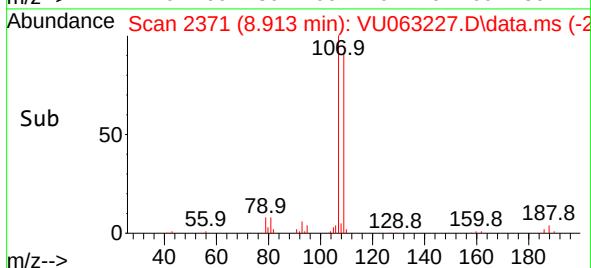
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025

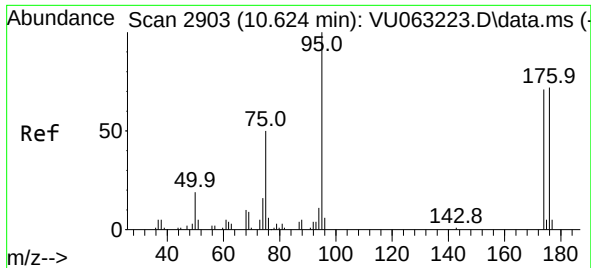


#56
1,2-Dibromoethane
Concen: 9.020 ug/l
RT: 8.913 min Scan# 2371
Delta R.T. -0.000 min
Lab File: VU063227.D
Acq: 11 Feb 2025 08:50



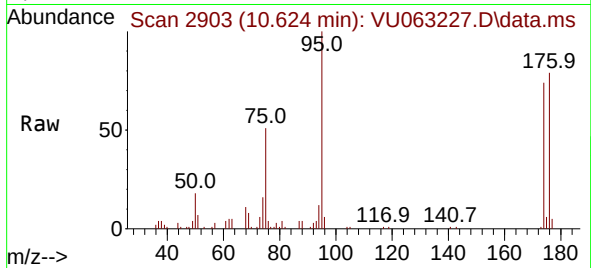
Tgt Ion:107 Resp: 104935
Ion Ratio Lower Upper
107 100
109 93.4 0.0 187.8





#57
4-Bromofluorobenzene
Concen: 1.354 ug/l
RT: 10.624 min Scan# 2903
Delta R.T. -0.000 min
Lab File: VU063227.D
Acq: 11 Feb 2025 08:50

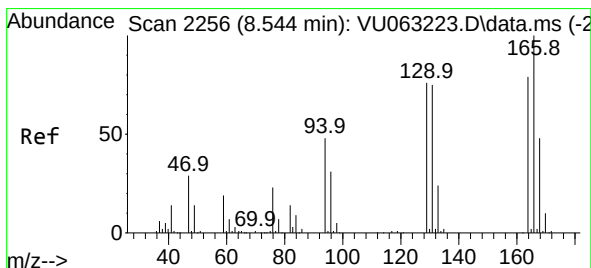
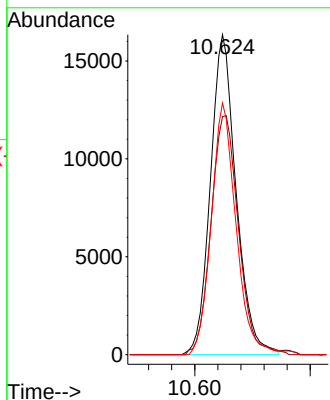
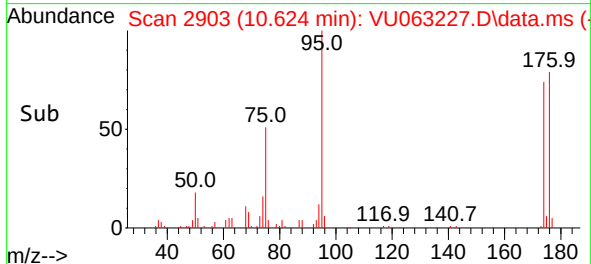
Instrument : MSVOA_U
ClientSampleId : ICVVU021025



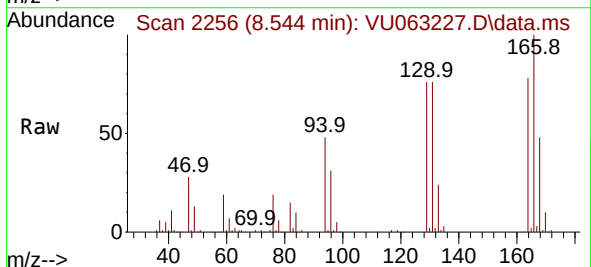
Tgt Ion: 95 Resp: 2523
Ion Ratio Lower Upper
95 100
174 80.2 58.6 88.0
176 76.2 58.2 87.4

Manual Integrations
APPROVED

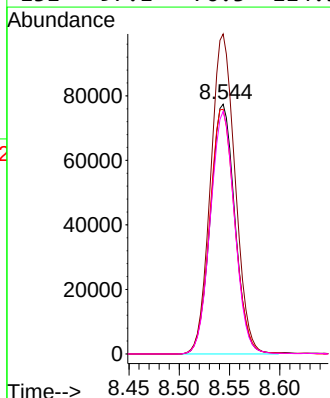
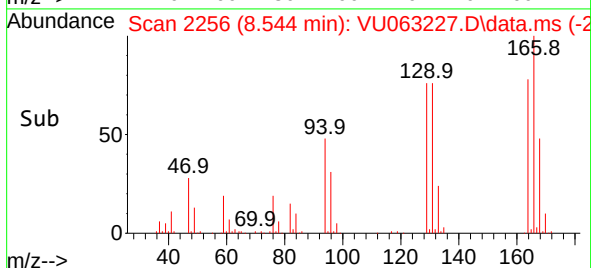
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025

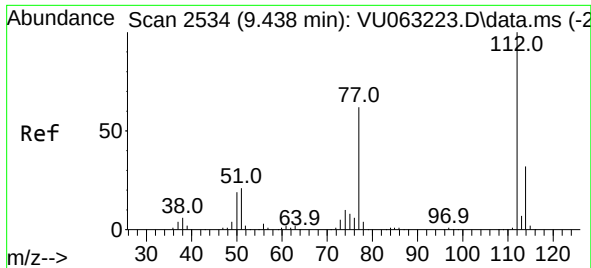


#58
Tetrachloroethene
Concen: 9.644 ug/l
RT: 8.544 min Scan# 2256
Delta R.T. -0.000 min
Lab File: VU063227.D
Acq: 11 Feb 2025 08:50



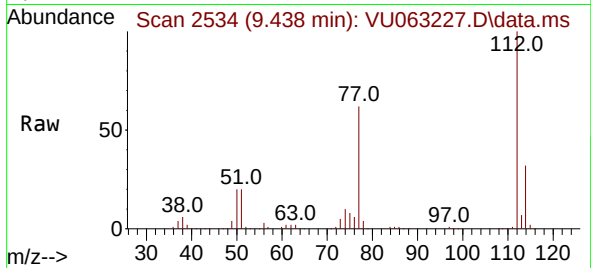
Tgt Ion:164 Resp: 131195
Ion Ratio Lower Upper
164 100
166 128.1 101.4 152.0
129 97.9 77.0 115.4
131 97.1 76.3 114.5





#59
Chlorobenzene
Concen: 9.767 ug/l
RT: 9.438 min Scan# 2534
Delta R.T. -0.000 min
Lab File: VU063227.D
Acq: 11 Feb 2025 08:50

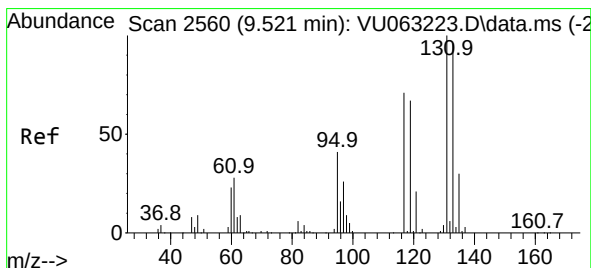
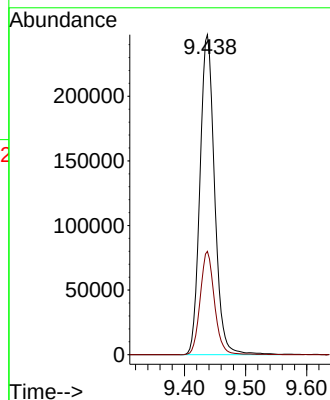
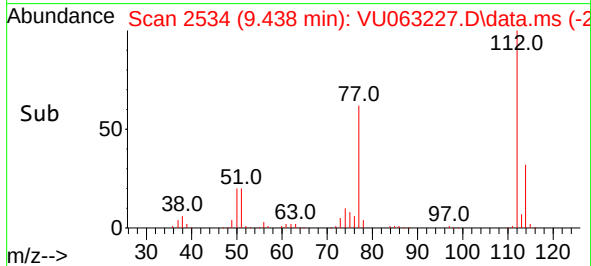
Instrument : MSVOA_U
ClientSampleId : ICVVU021025



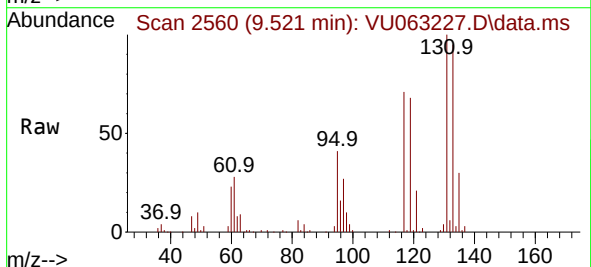
Tgt Ion:112 Resp: 411460
Ion Ratio Lower Upper
112 100
114 32.3 25.7 38.5

Manual Integrations
APPROVED

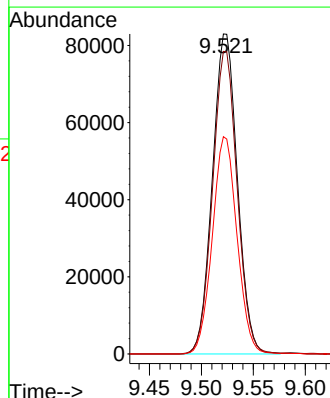
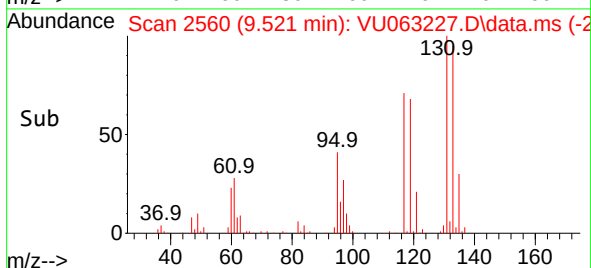
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025

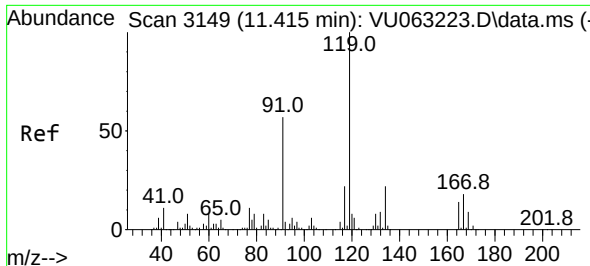


#60
1,1,1,2-Tetrachloroethane
Concen: 9.150 ug/l
RT: 9.521 min Scan# 2560
Delta R.T. -0.000 min
Lab File: VU063227.D
Acq: 11 Feb 2025 08:50



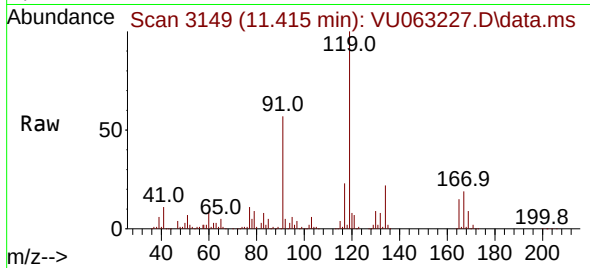
Tgt Ion:131 Resp: 138560
Ion Ratio Lower Upper
131 100
133 93.7 76.7 115.1
119 67.2 54.4 81.6





#61
Pentachloroethane
Concen: 9.395 ug/l
RT: 11.415 min Scan# 3149
Delta R.T. -0.000 min
Lab File: VU063227.D
Acq: 11 Feb 2025 08:50

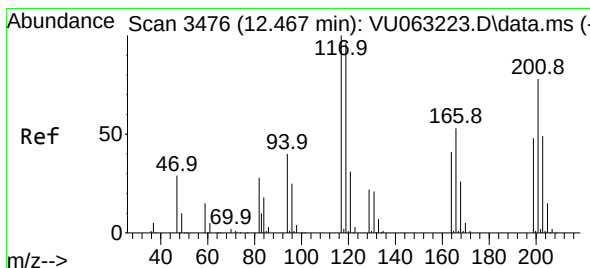
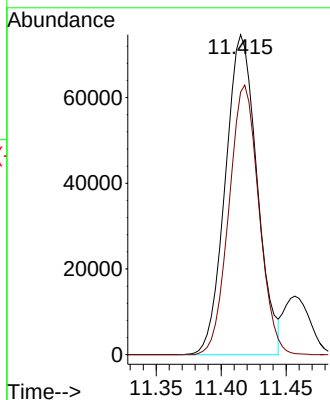
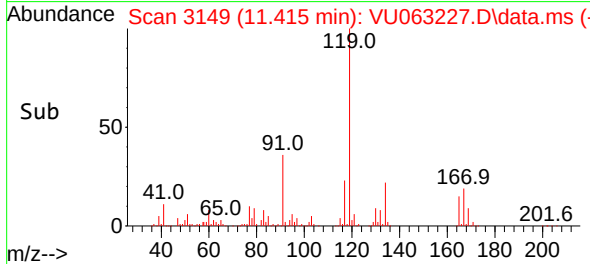
Instrument :
MSVOA_U
ClientSampleId :
ICVVU021025



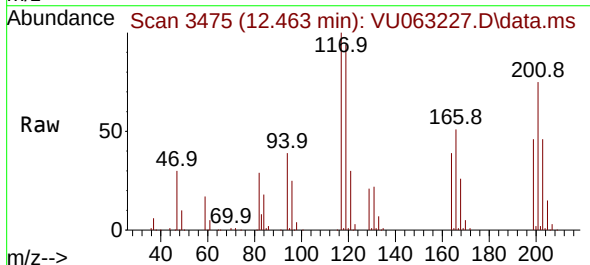
Tgt Ion:117 Resp: 127090
Ion Ratio Lower Upper
117 100
167 79.6 65.0 97.6

Manual Integrations
APPROVED

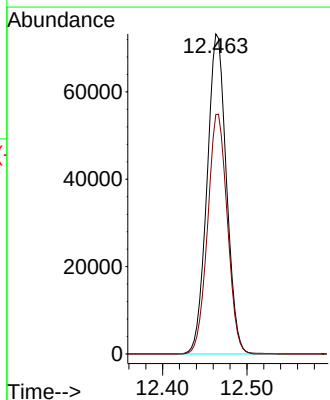
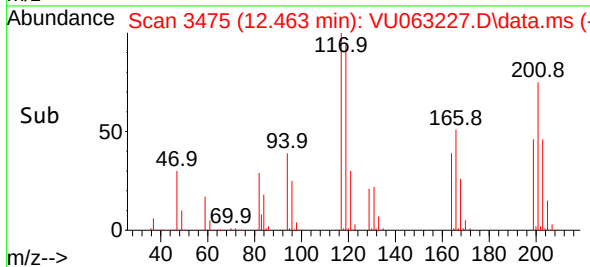
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025

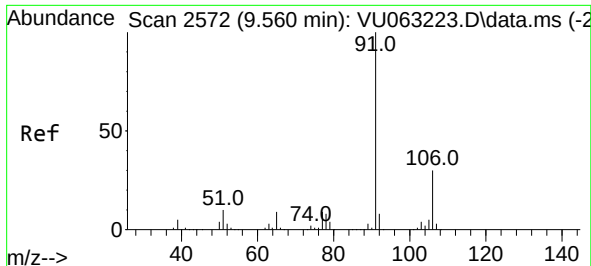


#62
Hexachloroethane
Concen: 9.808 ug/l
RT: 12.463 min Scan# 3475
Delta R.T. -0.003 min
Lab File: VU063227.D
Acq: 11 Feb 2025 08:50



Tgt Ion:117 Resp: 117375
Ion Ratio Lower Upper
117 100
201 75.9 61.3 91.9





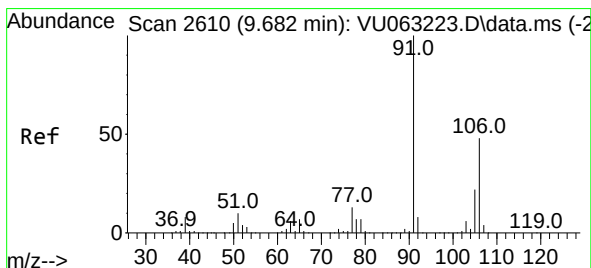
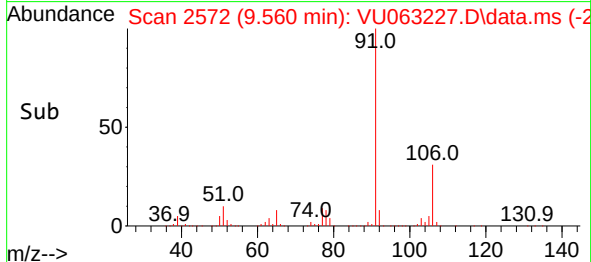
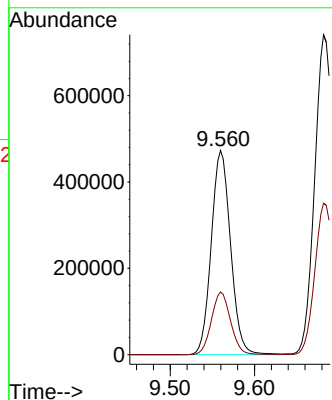
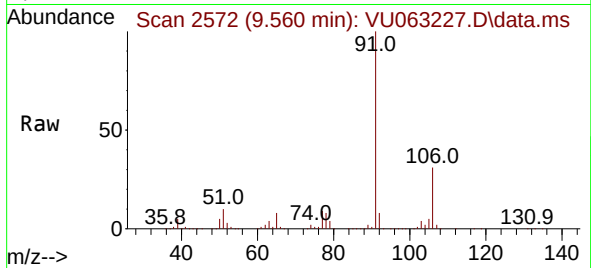
#63
Ethyl Benzene
Concen: 10.366 ug/l
RT: 9.560 min Scan# 2572
Delta R.T. -0.000 min
Lab File: VU063227.D
Acq: 11 Feb 2025 08:50

Instrument :
MSVOA_U
ClientSampleId :
ICVVU021025

Tgt Ion: 91 Resp: 75310
Ion Ratio Lower Upper
91 100
106 30.7 24.2 36.2

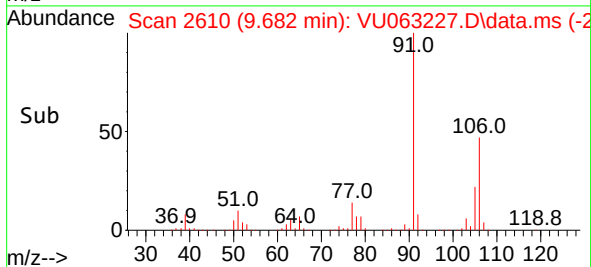
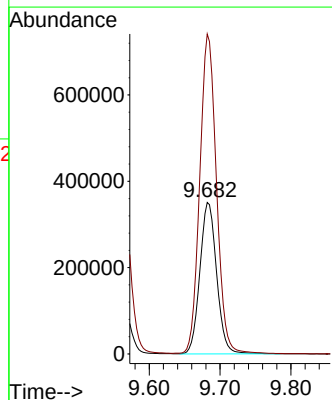
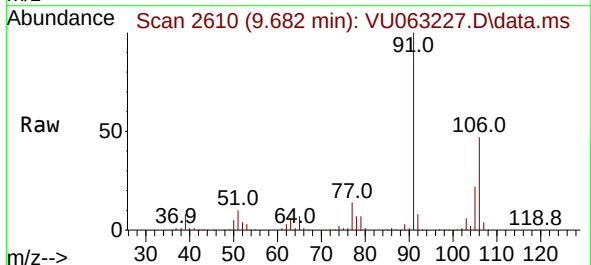
Manual Integrations
APPROVED

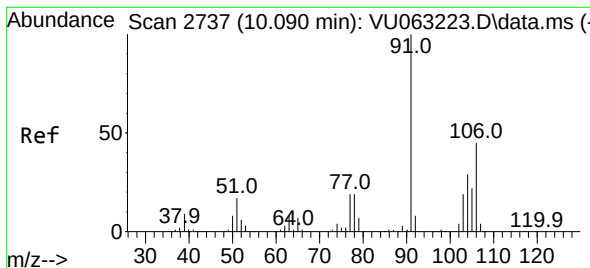
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#64
m/p-Xylenes
Concen: 21.178 ug/l
RT: 9.682 min Scan# 2610
Delta R.T. -0.000 min
Lab File: VU063227.D
Acq: 11 Feb 2025 08:50

Tgt Ion:106 Resp: 574738
Ion Ratio Lower Upper
106 100
91 211.3 166.9 250.3





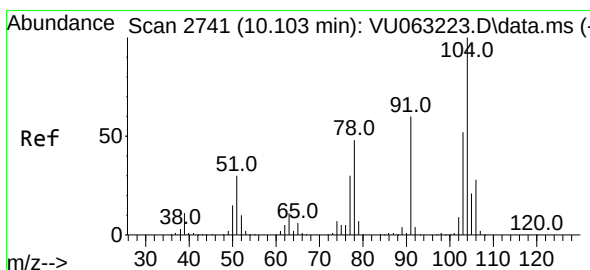
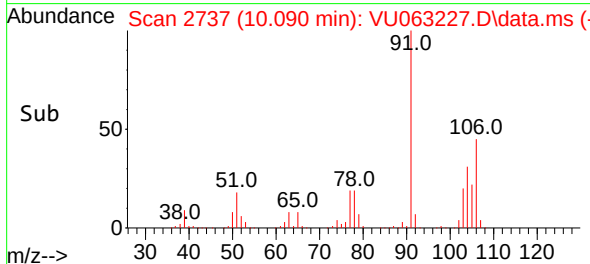
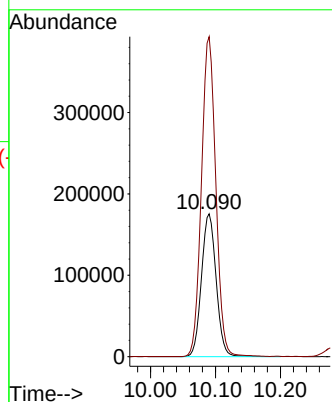
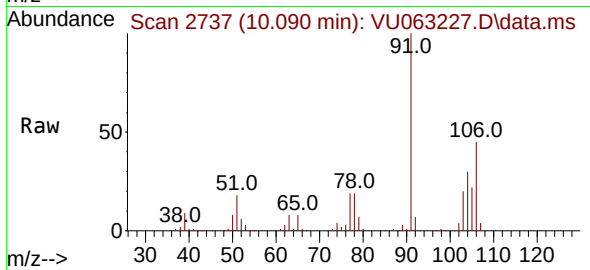
#65
o-Xylene
Concen: 10.384 ug/l
RT: 10.090 min Scan# 2737
Delta R.T. -0.000 min
Lab File: VU063227.D
Acq: 11 Feb 2025 08:50

Instrument :
MSVOA_U
ClientSampleId :
ICVVU021025

Tgt Ion:106 Resp: 27587
Ion Ratio Lower Upper
106 100
91 219.6 110.9 332.9

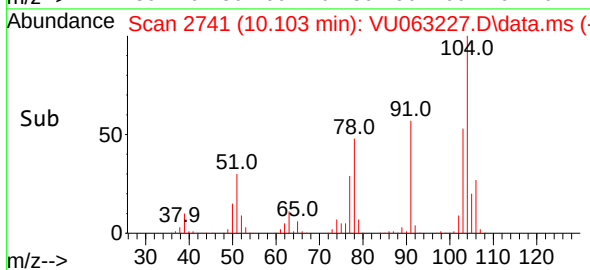
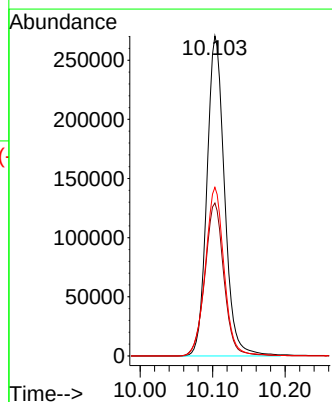
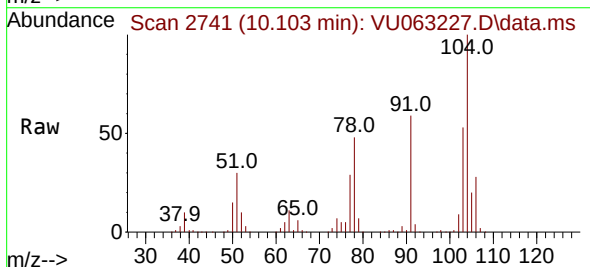
Manual Integrations
APPROVED

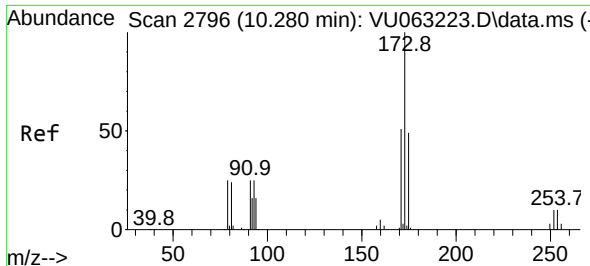
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#66
Styrene
Concen: 10.830 ug/l
RT: 10.103 min Scan# 2741
Delta R.T. -0.000 min
Lab File: VU063227.D
Acq: 11 Feb 2025 08:50

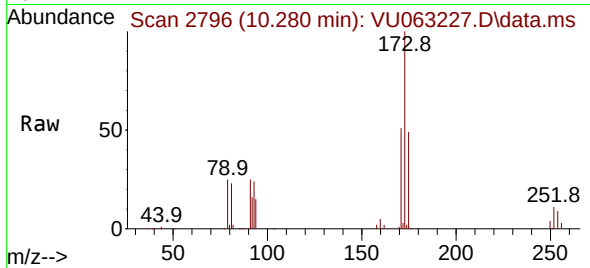
Tgt Ion:104 Resp: 457882
Ion Ratio Lower Upper
104 100
78 51.8 41.2 61.8
103 56.3 44.8 67.2





#67
Bromoform
Concen: 9.606 ug/l
RT: 10.280 min Scan# 2796
Delta R.T. -0.000 min
Lab File: VU063227.D
Acq: 11 Feb 2025 08:50

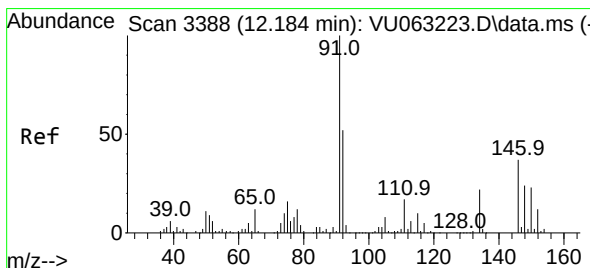
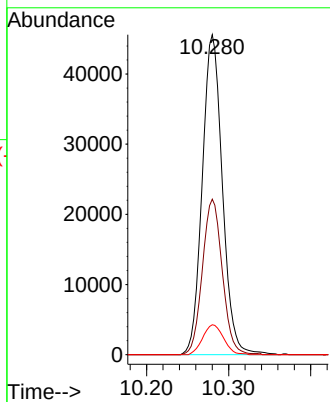
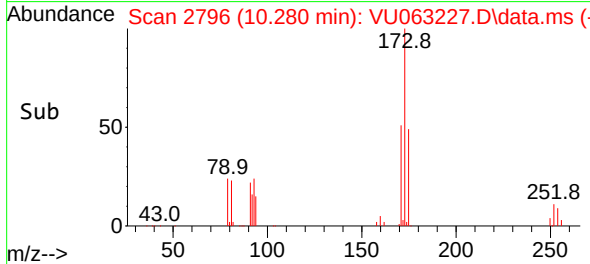
Instrument :
MSVOA_U
ClientSampleId :
ICVVU021025



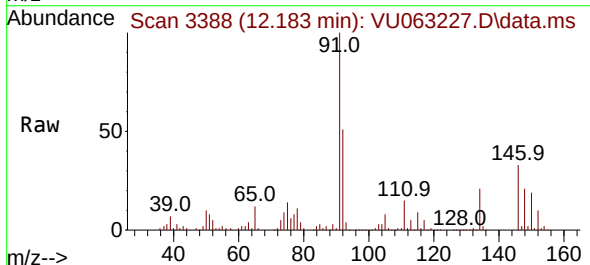
Tgt Ion:173 Resp: 7780
Ion Ratio Lower Upper
173 100
175 48.0 39.0 58.4
254 9.7 7.7 11.5

Manual Integrations
APPROVED

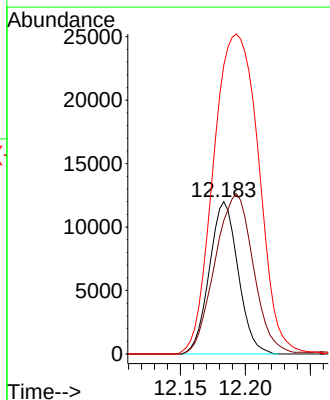
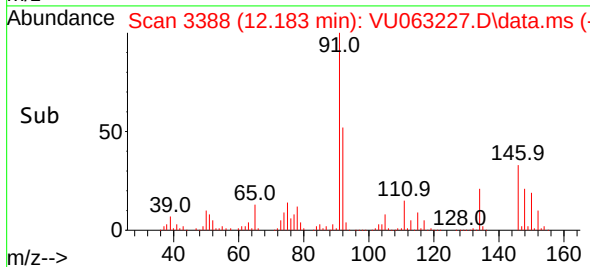
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025

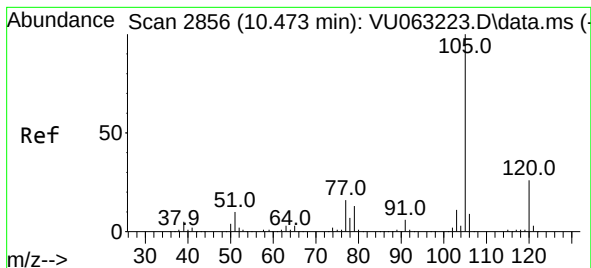


#68
1,2-Dichlorobenzene-d4
Concen: 0.953 ug/l
RT: 12.183 min Scan# 3388
Delta R.T. -0.000 min
Lab File: VU063227.D
Acq: 11 Feb 2025 08:50



Tgt Ion:152 Resp: 18463
Ion Ratio Lower Upper
152 100
115 140.1 0.0 275.2
150 330.7 0.0 658.4





#69

Isopropylbenzene

Concen: 11.767 ug/l

RT: 10.473 min Scan# 2856

Delta R.T. -0.000 min

Lab File: VU063227.D

Acq: 11 Feb 2025 08:50

Instrument :

MSVOA_U

ClientSampleId :

ICVVU021025

Tgt Ion:105 Resp: 734939

Ion Ratio Lower Upper

105 100

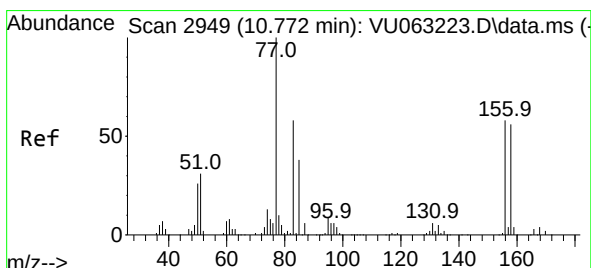
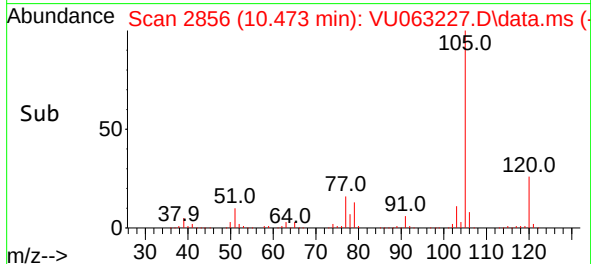
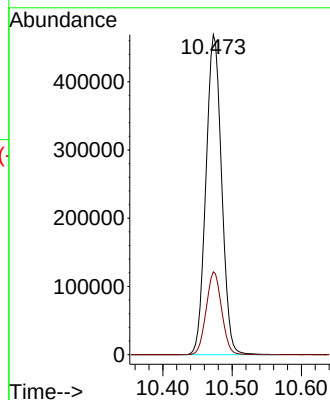
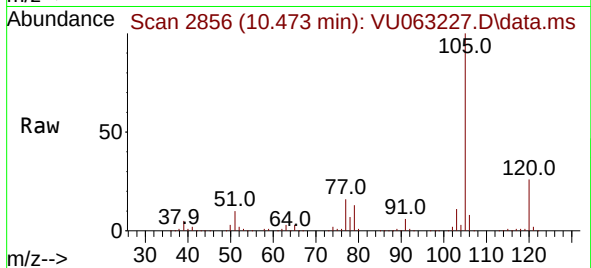
120 25.5 12.8 38.4

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#70

1,1,2,2-Tetrachloroethane

Concen: 8.545 ug/l

RT: 10.769 min Scan# 2948

Delta R.T. -0.003 min

Lab File: VU063227.D

Acq: 11 Feb 2025 08:50

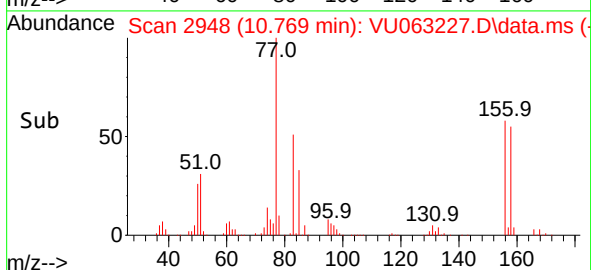
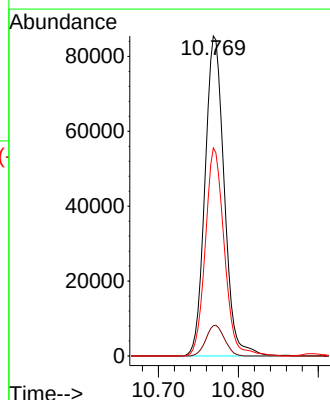
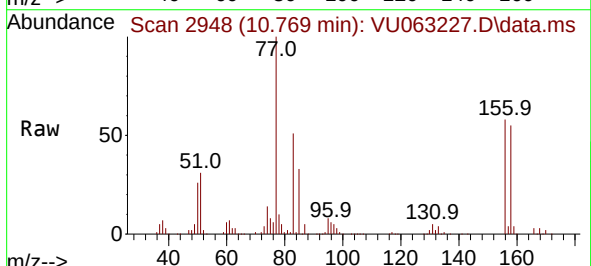
Tgt Ion: 83 Resp: 142854

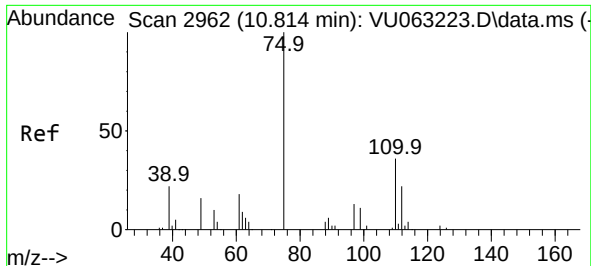
Ion Ratio Lower Upper

83 100

131 9.2 7.4 11.0

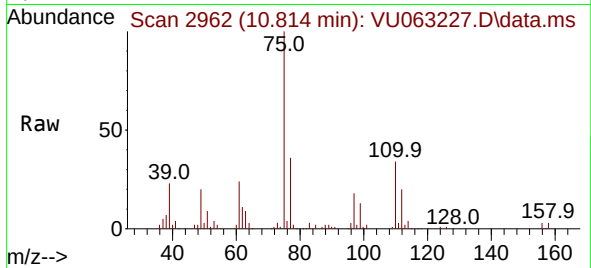
85 64.1 51.8 77.8





#71
1,2,3-Trichloropropane
Concen: 8.443 ug/l m
RT: 10.814 min Scan# 2962
Delta R.T. -0.000 min
Lab File: VU063227.D
Acq: 11 Feb 2025 08:50

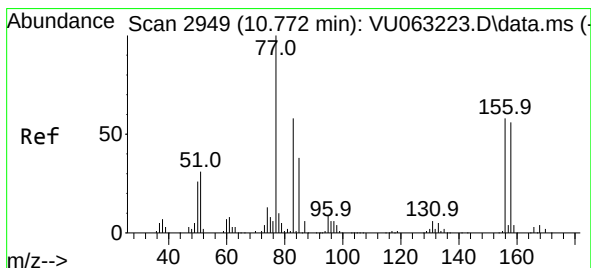
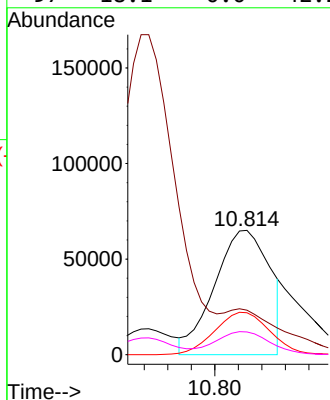
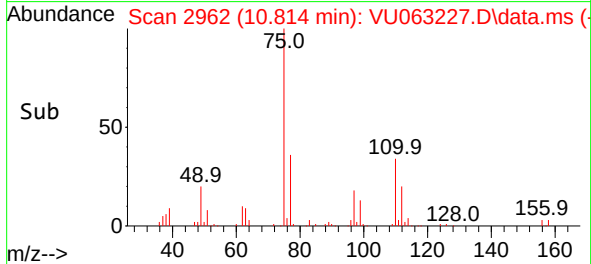
Instrument : MSVOA_U
ClientSampleId : ICVVU021025



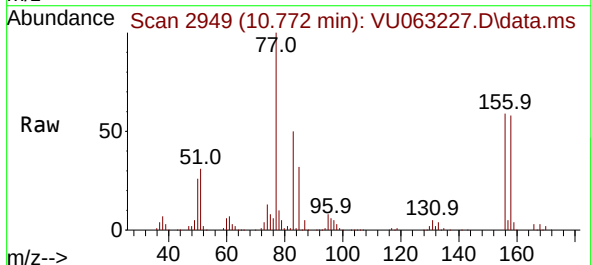
Tgt Ion: 75 Resp: 106040
Ion Ratio Lower Upper
75 100
77 0.0 0.0 0.0
110 34.3 0.0 77.0
97 18.1 0.0 42.2

Manual Integrations
APPROVED

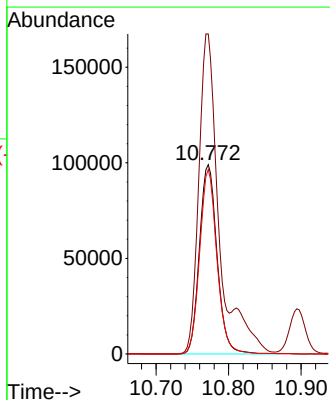
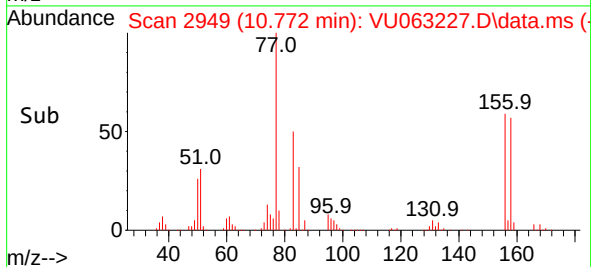
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025

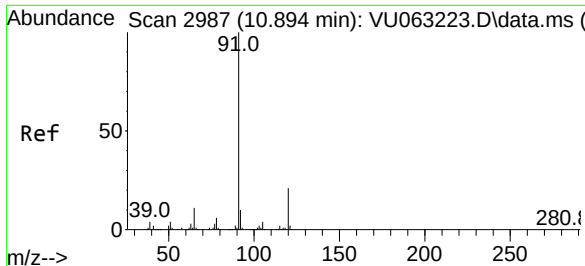


#72
Bromobenzene
Concen: 9.945 ug/l
RT: 10.772 min Scan# 2949
Delta R.T. -0.000 min
Lab File: VU063227.D
Acq: 11 Feb 2025 08:50



Tgt Ion:156 Resp: 167353
Ion Ratio Lower Upper
156 100
77 169.8 0.0 343.6
158 95.6 0.0 193.0





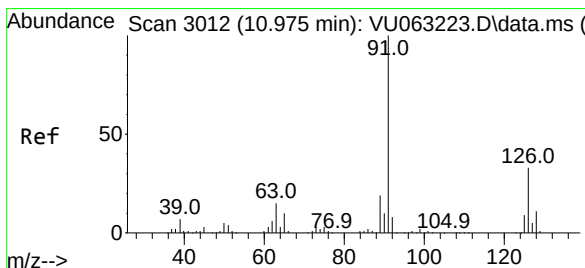
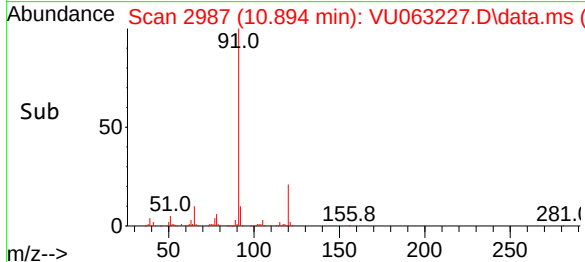
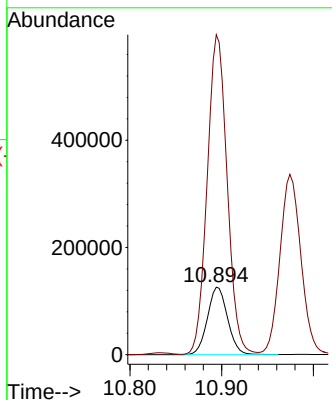
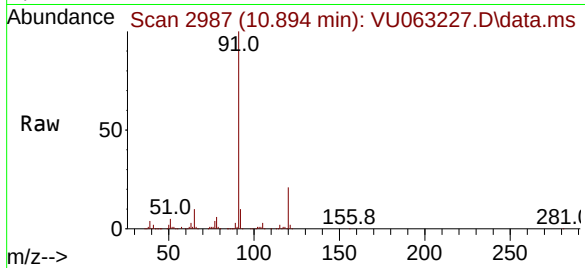
#73
n-propylbenzene
Concen: 10.744 ug/l
RT: 10.894 min Scan# 2987
Delta R.T. -0.000 min
Lab File: VU063227.D
Acq: 11 Feb 2025 08:50

Instrument : MSVOA_U
ClientSampleId : ICVVU021025

Tgt Ion:120 Resp: 192125
Ion Ratio Lower Upper
120 100
91 469.3 369.8 554.6

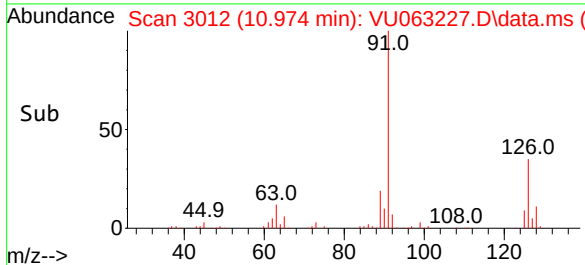
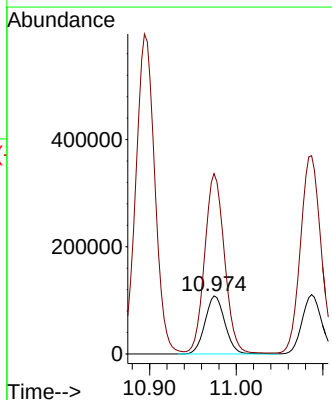
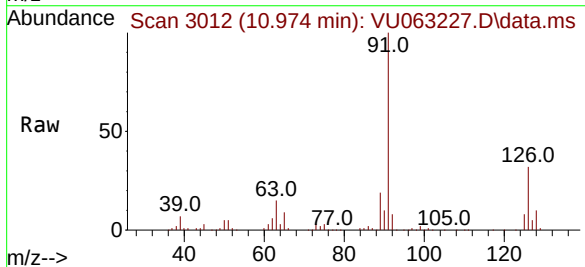
Manual Integrations APPROVED

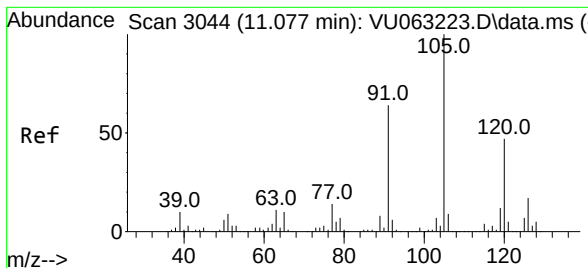
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#74
2-Chlorotoluene
Concen: 10.454 ug/l
RT: 10.974 min Scan# 3012
Delta R.T. -0.000 min
Lab File: VU063227.D
Acq: 11 Feb 2025 08:50

Tgt Ion:126 Resp: 172282
Ion Ratio Lower Upper
126 100
91 310.4 0.0 623.8





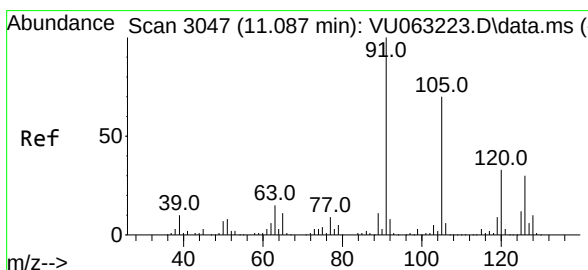
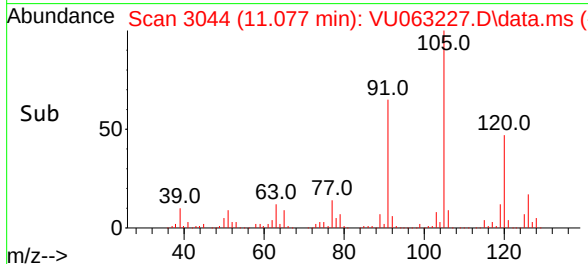
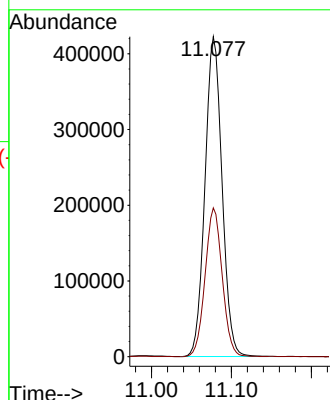
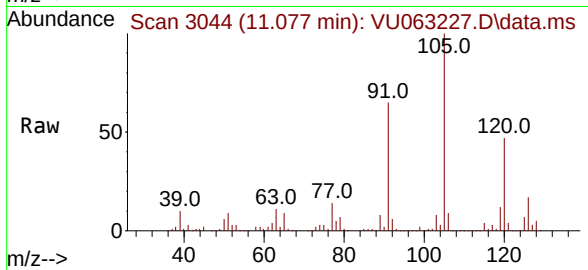
#75
1,3,5-Trimethylbenzene
Concen: 10.853 ug/l
RT: 11.077 min Scan# 3044
Delta R.T. -0.000 min
Lab File: VU063227.D
Acq: 11 Feb 2025 08:50

Instrument :
MSVOA_U
ClientSampleId :
ICVVU021025

Tgt Ion:105 Resp: 62809
Ion Ratio Lower Upper
105 100
120 46.7 37.3 55.9

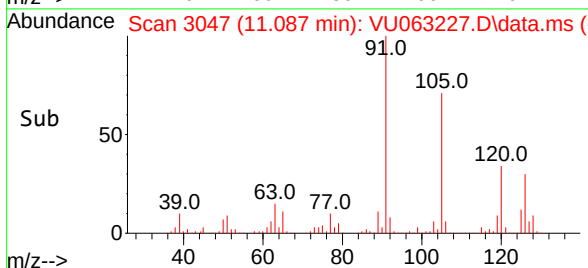
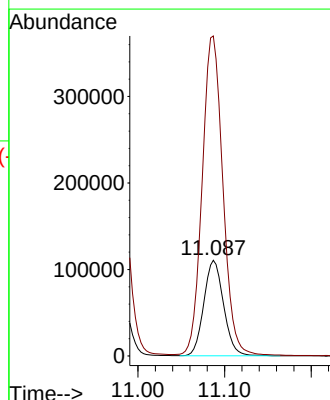
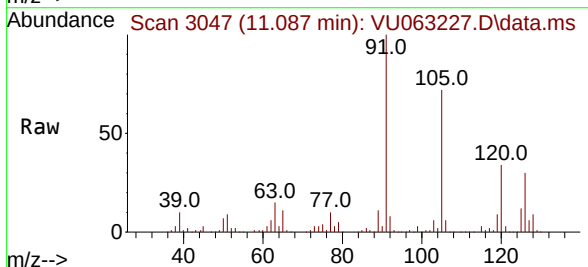
Manual Integrations
APPROVED

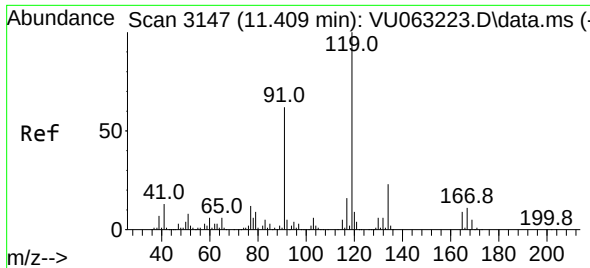
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#76
4-Chlorotoluene
Concen: 10.373 ug/l
RT: 11.087 min Scan# 3047
Delta R.T. -0.000 min
Lab File: VU063227.D
Acq: 11 Feb 2025 08:50

Tgt Ion:126 Resp: 175303
Ion Ratio Lower Upper
126 100
91 350.0 0.0 703.6





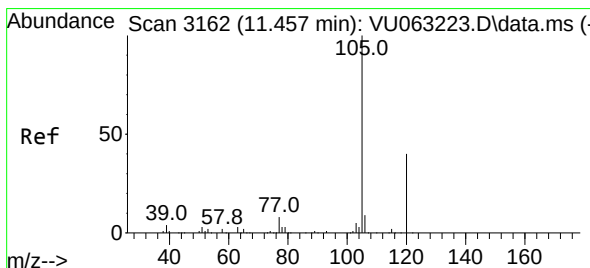
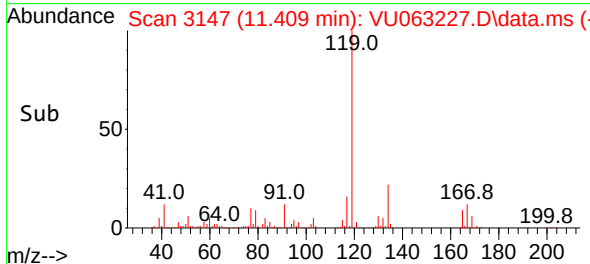
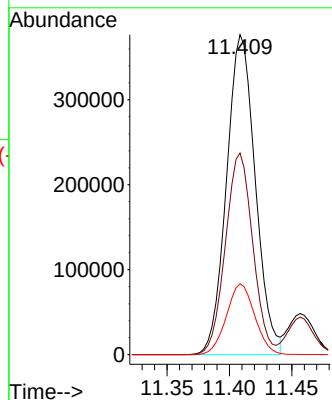
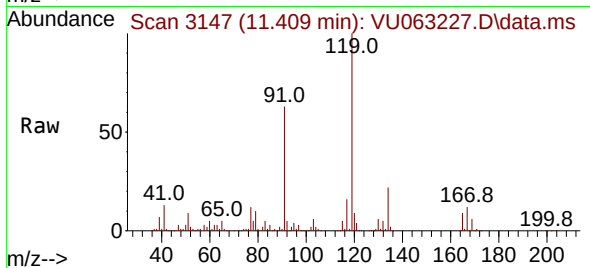
#77
tert-Butylbenzene
Concen: 10.355 ug/l
RT: 11.409 min Scan# 3147
Delta R.T. -0.000 min
Lab File: VU063227.D
Acq: 11 Feb 2025 08:50

Instrument : MSVOA_U
ClientSampleId : ICVVU021025

Tgt Ion:119 Resp: 606100
Ion Ratio Lower Upper
119 100
91 59.9 29.4 88.3
134 21.8 17.6 26.4

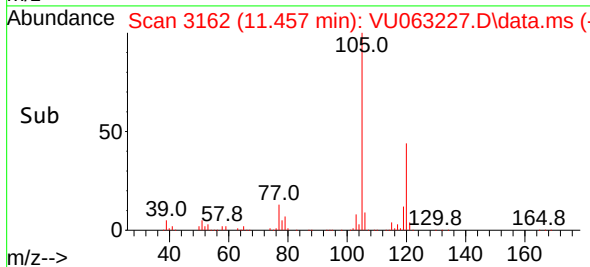
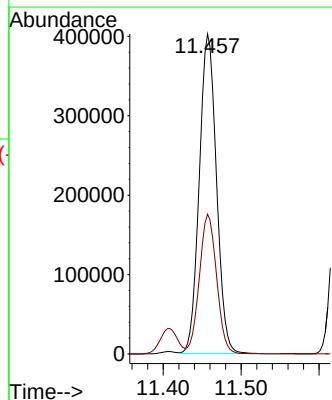
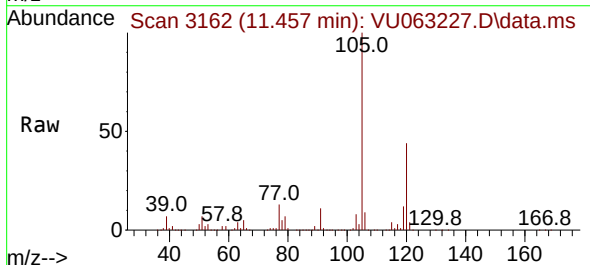
Manual Integrations
APPROVED

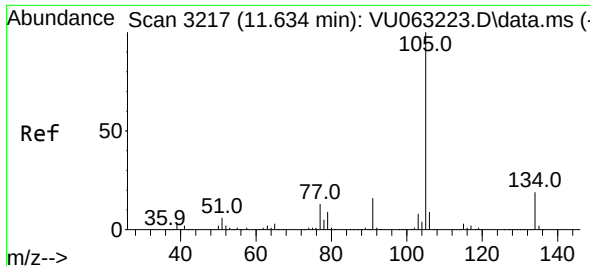
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#78
1,2,4-Trimethylbenzene
Concen: 10.746 ug/l
RT: 11.457 min Scan# 3162
Delta R.T. -0.000 min
Lab File: VU063227.D
Acq: 11 Feb 2025 08:50

Tgt Ion:105 Resp: 617064
Ion Ratio Lower Upper
105 100
120 43.9 21.9 65.7





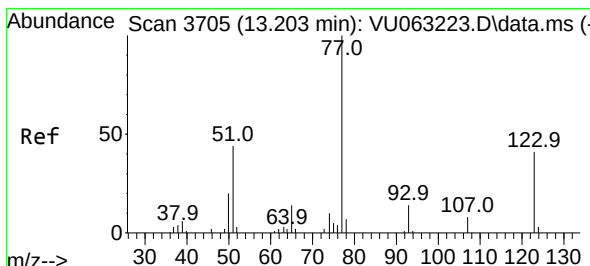
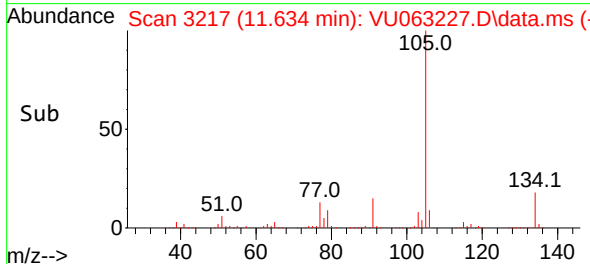
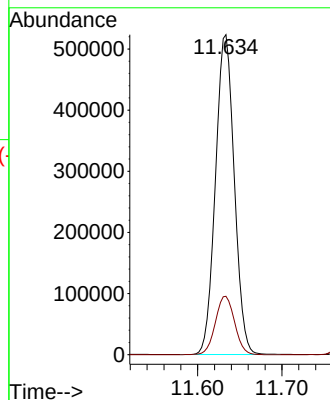
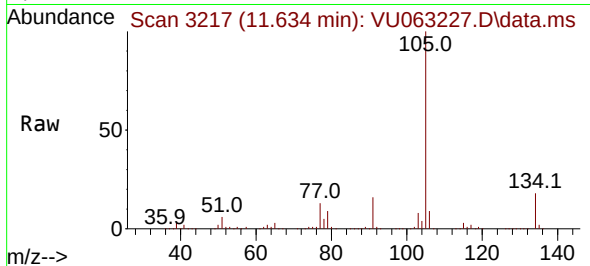
#79
 sec-Butylbenzene
 Concen: 10.867 ug/l
 RT: 11.634 min Scan# 3217
 Delta R.T. -0.000 min
 Lab File: VU063227.D
 Acq: 11 Feb 2025 08:50

Instrument :
 MSVOA_U
 ClientSampleId :
 ICVVU021025

Tgt Ion:105 Resp: 809829
 Ion Ratio Lower Upper
 105 100
 134 18.7 15.1 22.7

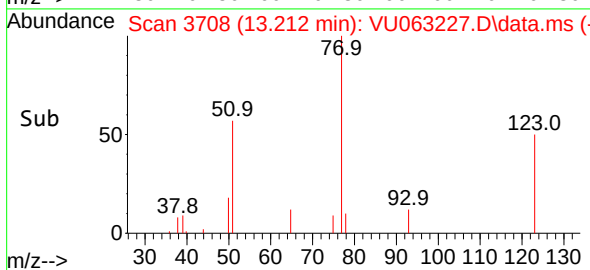
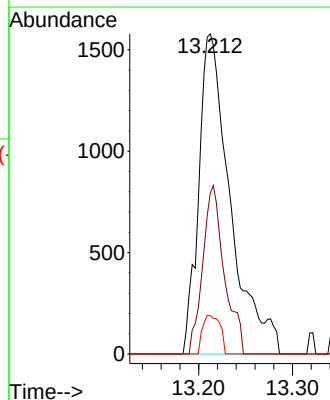
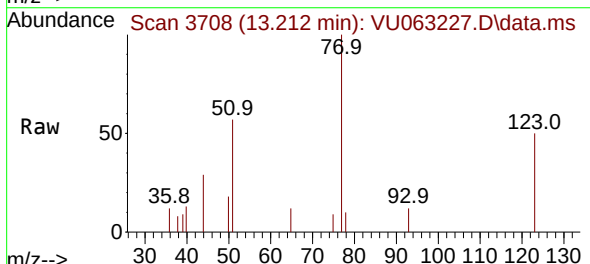
Manual Integrations
 APPROVED

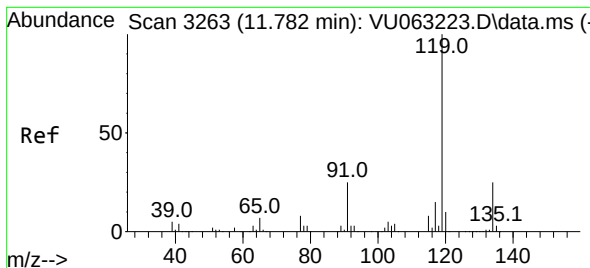
Reviewed By :Amit Patel 02/12/2025
 Supervised By :Mahesh Dadoda 02/12/2025



#80
 Nitrobenzene
 Concen: 10.731 ug/l m
 RT: 13.212 min Scan# 3708
 Delta R.T. 0.009 min
 Lab File: VU063227.D
 Acq: 11 Feb 2025 08:50

Tgt Ion: 77 Resp: 3697
 Ion Ratio Lower Upper
 77 100
 123 35.8 18.9 67.1
 65 0.0 11.9 15.1#





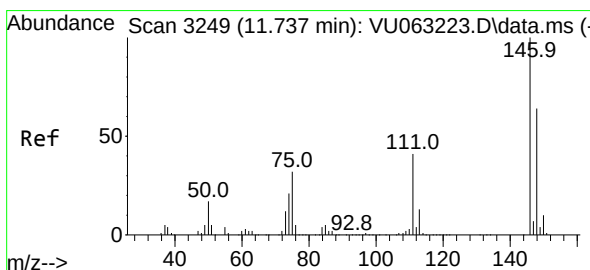
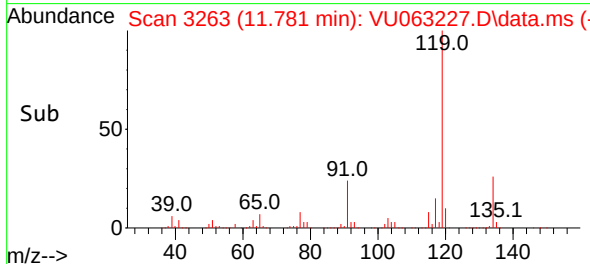
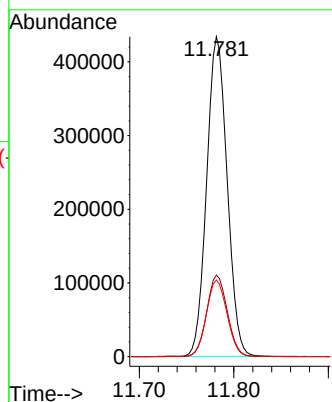
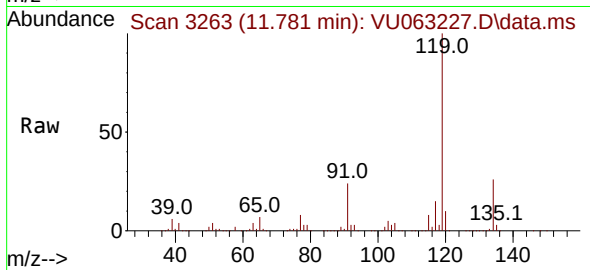
#81
p-Isopropyltoluene
Concen: 11.076 ug/l
RT: 11.781 min Scan# 3263
Delta R.T. -0.000 min
Lab File: VU063227.D
Acq: 11 Feb 2025 08:50

Instrument :
MSVOA_U
ClientSampleId :
ICVVU021025

Tgt Ion:119 Resp: 651414
Ion Ratio Lower Upper
119 100
134 25.7 20.3 30.5
91 24.2 19.4 29.2

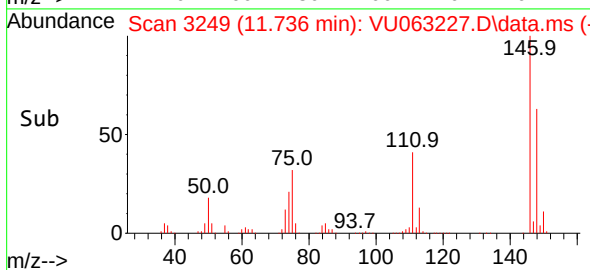
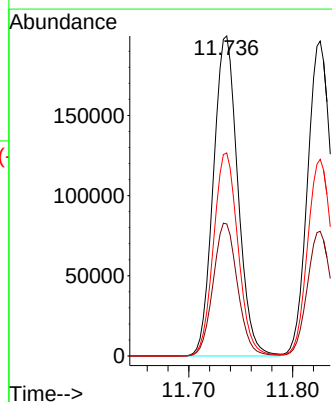
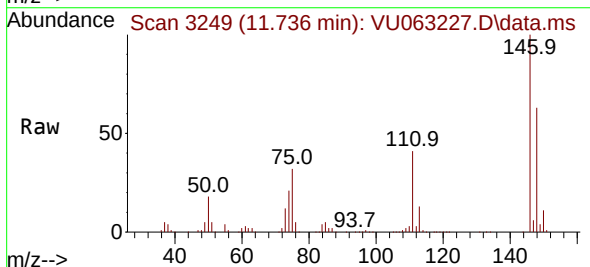
Manual Integrations
APPROVED

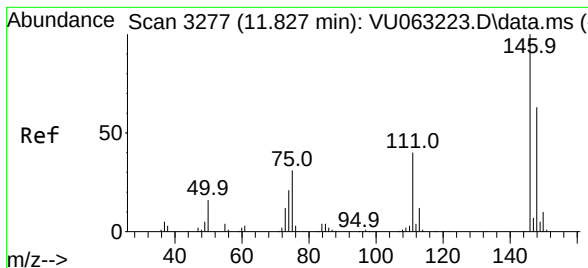
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#82
1,3-Dichlorobenzene
Concen: 10.004 ug/l
RT: 11.736 min Scan# 3249
Delta R.T. -0.000 min
Lab File: VU063227.D
Acq: 11 Feb 2025 08:50

Tgt Ion:146 Resp: 326539
Ion Ratio Lower Upper
146 100
111 41.4 32.8 49.2
148 63.5 51.1 76.7





#83

1,4-Dichlorobenzene

Concen: 10.142 ug/l

RT: 11.826 min Scan# 3277

Delta R.T. -0.000 min

Lab File: VU063227.D

Acq: 11 Feb 2025 08:50

Instrument :

MSVOA_U

ClientSampleId :

ICVVU021025

Tgt Ion:146 Resp: 32381

Ion Ratio Lower Upper

146 100

111 39.4 32.1 48.1

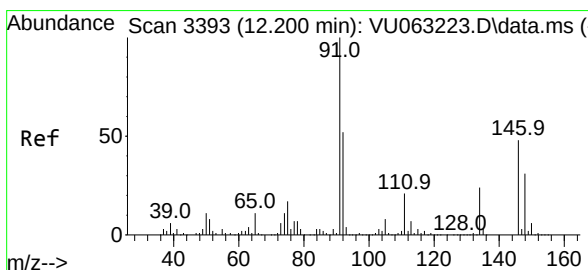
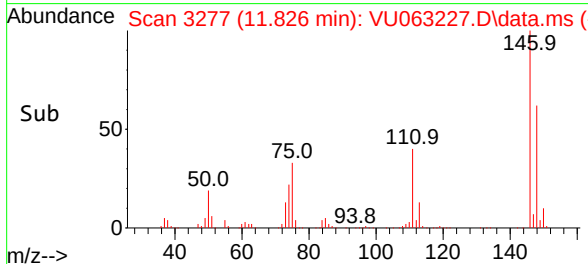
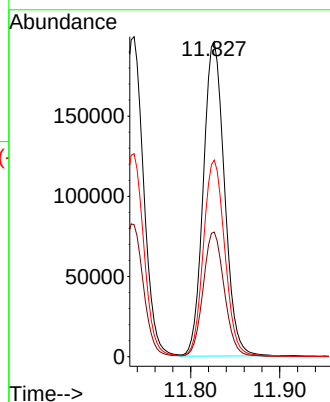
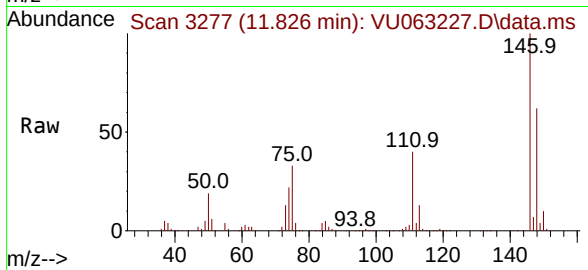
148 63.3 50.2 75.4

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#84

n-Butylbenzene

Concen: 11.497 ug/l

RT: 12.199 min Scan# 3393

Delta R.T. -0.000 min

Lab File: VU063227.D

Acq: 11 Feb 2025 08:50

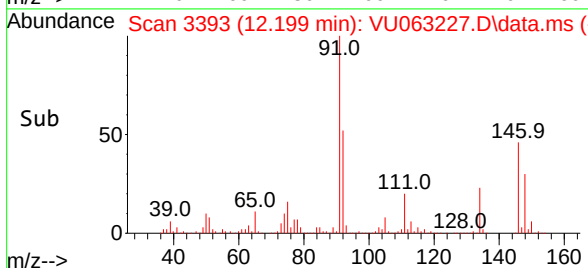
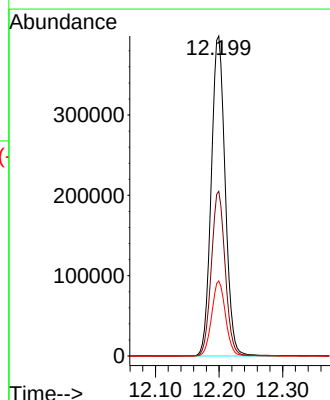
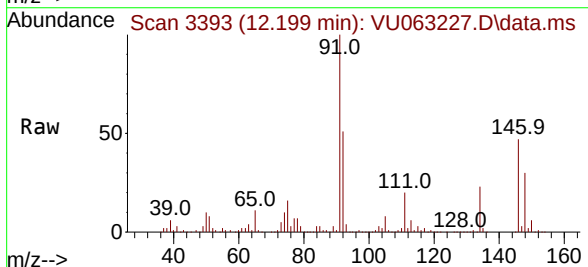
Tgt Ion: 91 Resp: 606308

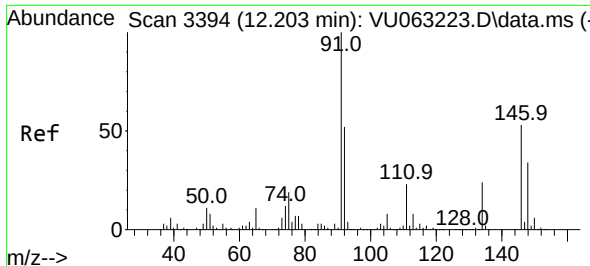
Ion Ratio Lower Upper

91 100

92 51.2 41.8 62.8

134 23.2 18.6 28.0





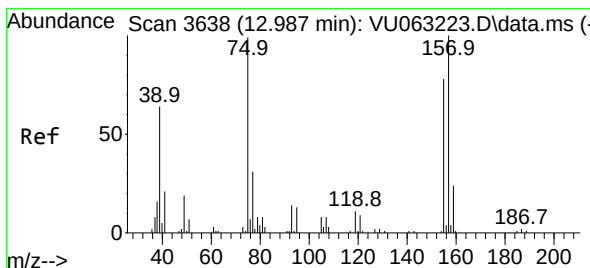
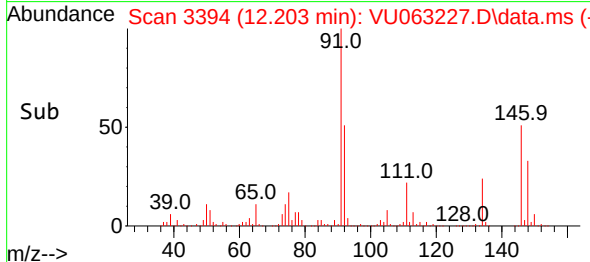
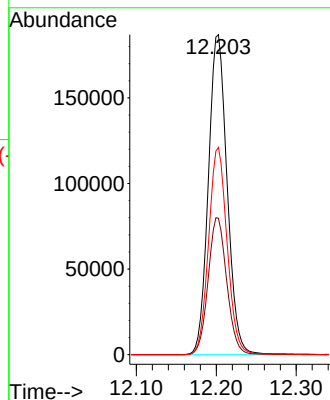
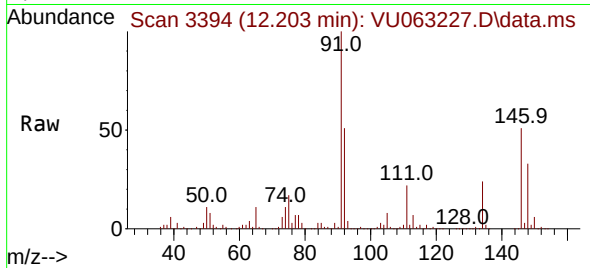
#85
1,2-Dichlorobenzene
Concen: 9.718 ug/l
RT: 12.203 min Scan# 311
Delta R.T. -0.000 min
Lab File: VU063227.D
Acq: 11 Feb 2025 08:50

Instrument :
MSVOA_U
ClientSampleId :
ICVVU021025

Tgt Ion:146 Resp: 304829
Ion Ratio Lower Upper
146 100
111 42.7 21.9 65.7
148 63.9 32.3 96.9

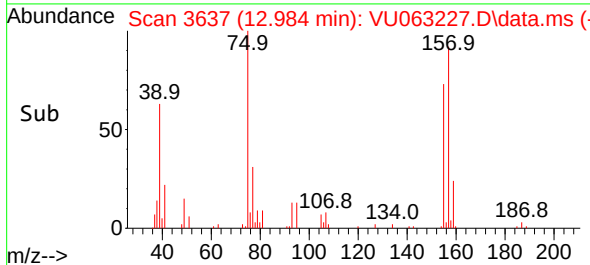
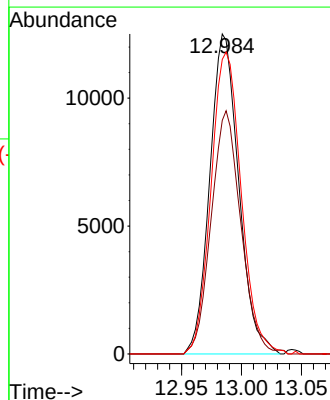
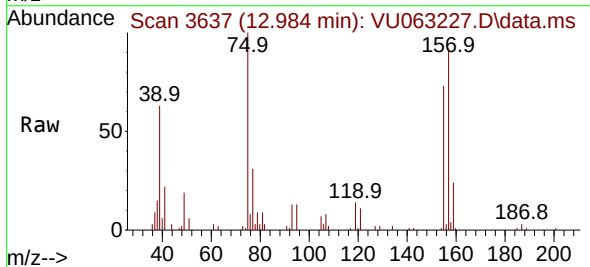
Manual Integrations
APPROVED

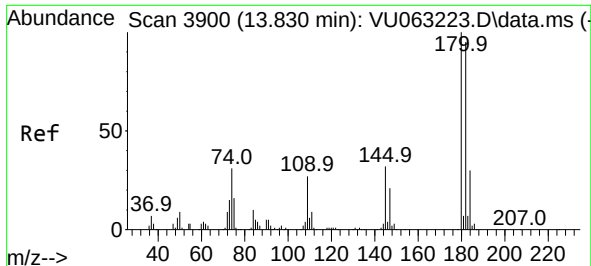
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#86
1,2-Dibromo-3-Chloropropane
Concen: 8.936 ug/l
RT: 12.984 min Scan# 3637
Delta R.T. -0.003 min
Lab File: VU063227.D
Acq: 11 Feb 2025 08:50

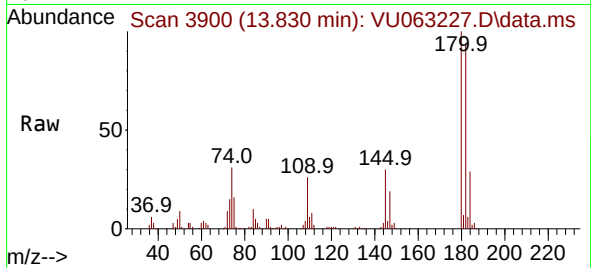
Tgt Ion: 75 Resp: 20970
Ion Ratio Lower Upper
75 100
155 77.9 63.5 95.3
157 98.4 81.8 122.6





#87
1,2,4-Trichlorobenzene
Concen: 12.045 ug/l
RT: 13.830 min Scan# 3900
Delta R.T. -0.000 min
Lab File: VU063227.D
Acq: 11 Feb 2025 08:50

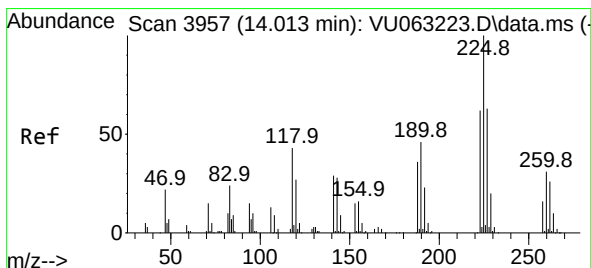
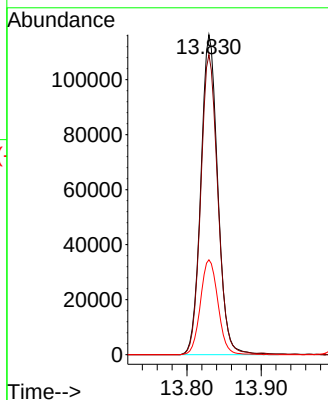
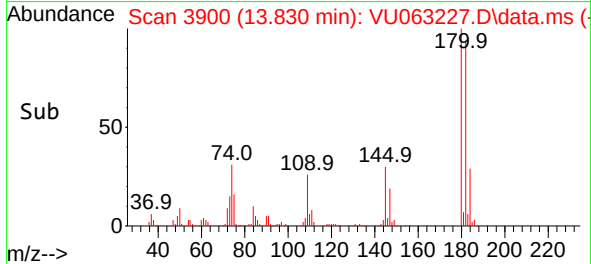
Instrument :
MSVOA_U
ClientSampleId :
ICVVU021025



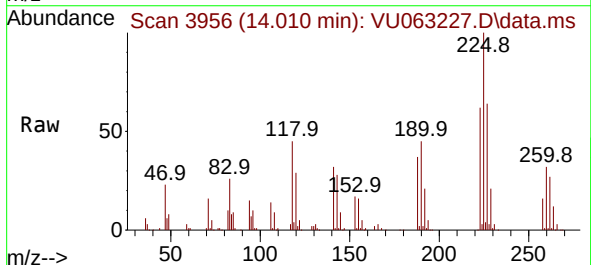
Tgt Ion:180 Resp: 18427
Ion Ratio Lower Upper
180 100
182 94.5 76.6 115.0
145 30.7 25.4 38.2

Manual Integrations
APPROVED

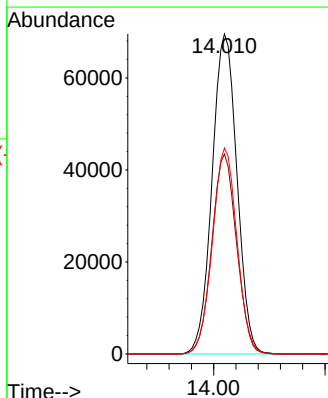
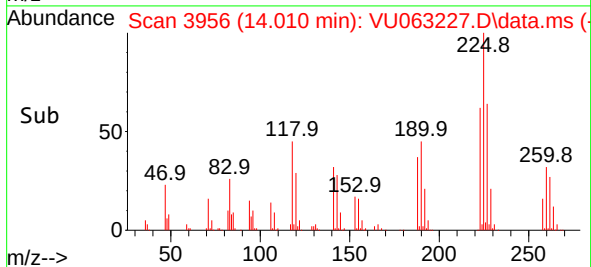
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025

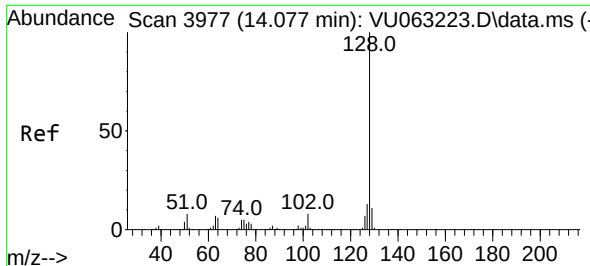


#88
Hexachlorobutadiene
Concen: 9.862 ug/l
RT: 14.010 min Scan# 3956
Delta R.T. -0.003 min
Lab File: VU063227.D
Acq: 11 Feb 2025 08:50



Tgt Ion:225 Resp: 107826
Ion Ratio Lower Upper
225 100
223 62.2 49.5 74.3
227 63.7 51.0 76.4





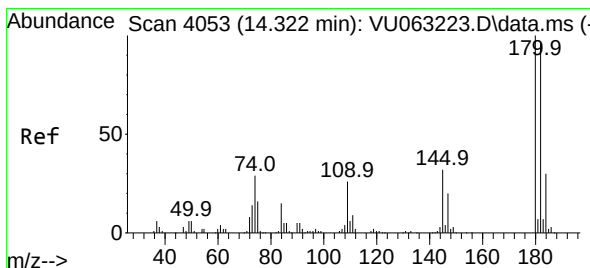
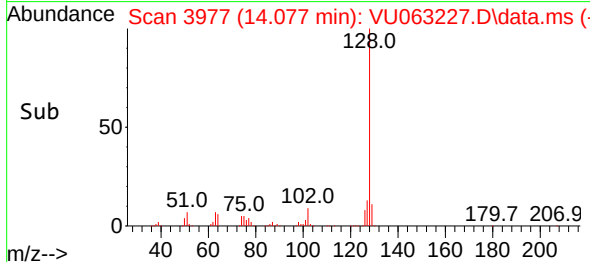
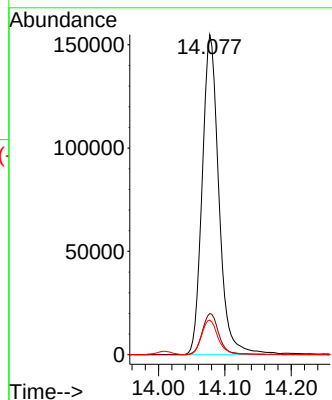
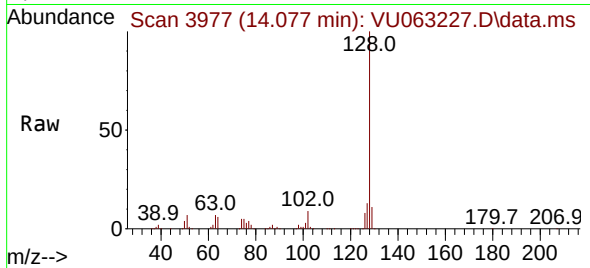
#89
Naphthalene
Concen: 8.568 ug/l
RT: 14.077 min Scan# 3977
Delta R.T. -0.000 min
Lab File: VU063227.D
Acq: 11 Feb 2025 08:50

Instrument :
MSVOA_U
ClientSampleId :
ICVVU021025

Tgt Ion:128 Resp: 27055
Ion Ratio Lower Upper
128 100
127 12.8 10.6 16.0
129 10.8 8.6 13.0

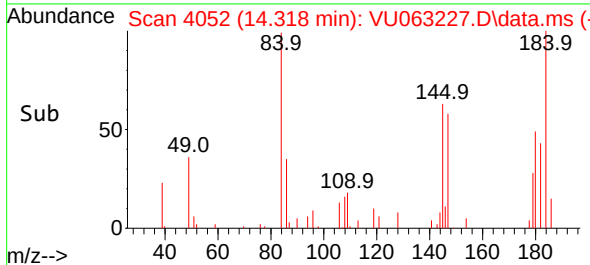
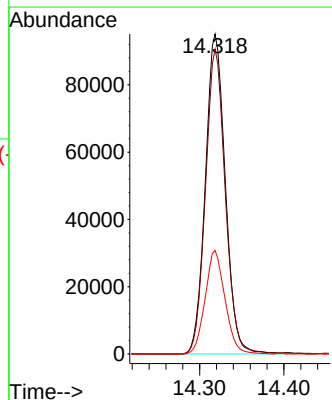
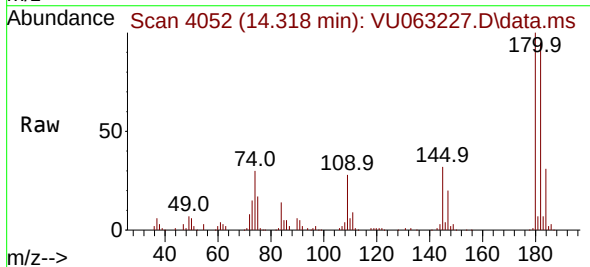
Manual Integrations
APPROVED

Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#90
1,2,3-Trichlorobenzene
Concen: 10.466 ug/l
RT: 14.318 min Scan# 4052
Delta R.T. -0.003 min
Lab File: VU063227.D
Acq: 11 Feb 2025 08:50

Tgt Ion:180 Resp: 156676
Ion Ratio Lower Upper
180 100
182 94.5 78.2 117.2
145 32.2 26.1 39.1



Data Path : Z:\voasrv\HPCHEM1\MSVOA_U\Data\VU021125\
 Data File : VU063227.D
 Acq On : 11 Feb 2025 08:50
 Operator : MD/SY
 Sample : VSTDICV010
 Misc : 25.0mL/MSVOA_U/WATER
 ALS Vial : 2 Sample Multiplier: 1

Instrument :
 MSVOA_U
 ClientSampleId :
 ICSVU021025

Quant Time: Feb 12 03:08:06 2025
 Quant Method : Z:\voasrv\HPCHEM1\MSVOA_U\Method\524U021025DW.M
 Quant Title : METHOD 524.2 VOLATILES DRINKING WATER
 QLast Update : Tue Feb 11 08:42:19 2025
 Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 20% Max. R.T. Dev 0.50min
 Max. RRF Dev : 30% Max. Rel. Area : 200%

	Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
1 i	Fluorobenzene	1.000	1.000	0.0	98	0.00
2 T	Dichlorodifluoromethane	0.325	0.201	38.2#	64	0.00
3 t	Chloromethane	0.374	0.260	30.5#	72	0.00
4 Rt	Vinyl Chloride	0.370	0.285	23.0	76	0.00
5 T	Bromomethane	0.181	0.169	6.6	86	0.00
6 T	Chloroethane	0.233	0.187	19.7	82	0.00
7 T	Trichlorofluoromethane	0.439	0.372	15.3	86	0.00
8	1,1,2-Trichloro-1,2,2-trifl	0.249	0.241	3.2	102	0.00
9 Rt	1,1-Dichloroethene	0.254	0.241	5.1	95	0.00
10 t	Iodomethane	0.399	0.366	8.3	88	0.00
11 t	Allyl Chloride	0.364	0.365	-0.3	98	0.00
12 t	Acrylonitrile	0.059	0.142	-140.7#	213#	0.00
13 T	Acetone	0.045	0.042	6.7	86	0.00
14 T	Carbon Disulfide	0.887	0.713	19.6	81	0.00
15 RT	Methylene Chloride	0.313	0.277	11.5	89	0.00
16 RT	trans-1,2-Dichloroethene	0.290	0.256	11.7	87	0.00
17 t	1,1-Dichloroethane	0.546	0.500	8.4	91	0.00
18 T	2-Butanone	0.072	0.066	8.3	82	0.00
19	Cyclohexane	0.439	0.414	5.7	89	0.00
20	Methylcyclohexane	0.435	0.442	-1.6	96	0.00
21 T	2,2-Dichloropropane	0.426	0.406	4.7	95	0.00
22 RT	cis-1,2-Dichloroethene	0.313	0.312	0.3	97	0.00
23 t	Diethyl Ether	0.218	0.182	16.5	82	0.00
24 t	tert-Butyl Alcohol	0.026	0.008	69.2#	33	0.04
25 t	Methyl tert-Butyl Ether	0.634	0.612	3.5	89	0.00
26 t	Bromochloromethane	0.137	0.131	4.4	93	0.00
27 t	Chloroform	0.551	0.512	7.1	92	0.00
28 RT	1,1,1-Trichloroethane	0.446	0.423	5.2	94	0.00
29 T	1,1-Dichloropropene	0.400	0.348	13.0	84	0.00
30 RT	Carbon Tetrachloride	0.383	0.356	7.0	92	0.00
31 t	Isopropyl Ether	0.779	0.821	-5.4	99	0.00
32	Ethyl-t-butyl ether	0.709	0.000	100.0#	0#	-4.48#
33	Tert-Amyl methyl ether	0.619	0.000	100.0#	0#	-5.93#
34 t	Propionitrile	0.022	0.043	-95.5#	171	0.00
35 RT	Benzene	1.229	1.143	7.0	91	0.00
36 RT	1,2-Dichloroethane	0.355	0.302	14.9	83	0.00
37 RT	Trichloroethene	0.292	0.259	11.3	87	0.00
38 Rt	1,2-Dichloropropane	0.322	0.283	12.1	85	0.00
39 t	Methacrylonitrile	0.080	0.083	-3.8	83	0.00
40 t	Methyl acrylate	0.148	0.145	2.0	86	0.00
41 t	Tetrahydrofuran	0.047	0.109	-131.9#	207#	0.00
42 t	1-Chlorobutane	0.547	0.531	2.9	92	0.00
43 T	Dibromomethane	0.163	0.147	9.8	89	0.00
44 T	Bromodichloromethane	0.379	0.381	-0.5	95	0.00
45 T	4-Methyl-2-Pentanone	0.171	0.167	2.3	83	0.00
46 t	t-1,4-Dichloro-2-butene	0.080	0.044	45.0#	51	0.00
47 t	Methyl methacrylate	0.137	0.066	51.8#	40	0.00
48 t	Ethyl methacrylate	0.258	0.267	-3.5	83	0.00
49 Rt	Toluene	0.707	0.698	1.3	92	0.00

Data Path : Z:\voasrv\HPCHEM1\MSVOA_U\Data\U021125\
 Data File : U063227.D
 Acq On : 11 Feb 2025 08:50
 Operator : MD/SY
 Sample : VSTDICV010
 Misc : 25.0mL/MSVOA_U/WATER
 ALS Vial : 2 Sample Multiplier: 1

Instrument :
 MSVOA_U
 ClientSampleId :
 ICVVU021025

Quant Time: Feb 12 03:08:06 2025
 Quant Method : Z:\voasrv\HPCHEM1\MSVOA_U\Method\524U021025DW.M
 Quant Title : METHOD 524.2 VOLATILES DRINKING WATER
 QLast Update : Tue Feb 11 08:42:19 2025
 Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 20% Max. R.T. Dev 0.50min
 Max. RRF Dev : 30% Max. Rel. Area : 200%

	Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
50 T	t-1,3-Dichloropropene	0.347	0.337	2.9	86	0.00
51 T	cis-1,3-Dichloropropene	0.429	0.399	7.0	85	0.00
52 RT	1,1,2-Trichloroethane	0.220	0.199	9.5	86	0.00
53 t	1,3-Dichloropropane	0.390	0.347	11.0	84	0.00
54 t	2-Hexanone	0.117	0.113	3.4	81	0.00
55 t	Dibromochloromethane	0.253	0.242	4.3	88	0.00
56 T	1,2-Dibromoethane	0.206	0.186	9.7	83	0.00
57 S	4-Bromofluorobenzene	0.330	0.447	-35.5#	122	0.00
58 RT	Tetrachloroethene	0.241	0.232	3.7	97	0.00
59 Rt	Chlorobenzene	0.746	0.728	2.4	93	0.00
60 T	1,1,1,2-Tetrachloroethane	0.268	0.245	8.6	87	0.00
61 t	Pentachloroethane	0.239	0.225	5.9	91	0.00
62 t	Hexachloroethane	0.212	0.208	1.9	92	0.00
63 Rt	Ethyl Benzene	1.286	1.333	-3.7	93	0.00
64 RT	m/p-Xylenes	0.480	0.509	-6.0	93	0.00
65 RT	o-Xylene	0.470	0.488	-3.8	93	0.00
66 RT	Styrene	0.748	0.810	-8.3	92	0.00
67 t	Bromoform	0.143	0.138	3.5	86	0.00
68 S	1,2-Dichlorobenzene-d4	0.343	0.327	4.7	93	0.00
69 T	Isopropylbenzene	1.106	1.301	-17.6	105	0.00
70 T	1,1,2,2-Tetrachloroethane	0.296	0.253	14.5	80	0.00
71 T	1,2,3-Trichloropropane	0.222	0.188	15.3	90	0.00
72 t	Bromobenzene	0.298	0.296	0.7	92	0.00
73 t	n-propylbenzene	0.317	0.340	-7.3	94	0.00
74 t	2-Chlorotoluene	0.292	0.305	-4.5	94	0.00
75 t	1,3,5-Trimethylbenzene	1.024	1.112	-8.6	95	0.00
76 t	4-Chlorotoluene	0.299	0.310	-3.7	94	0.00
77 t	tert-Butylbenzene	1.036	1.073	-3.6	94	0.00
78 t	1,2,4-Trimethylbenzene	1.016	1.092	-7.5	92	0.00
79 t	sec-Butylbenzene	1.319	1.433	-8.6	97	0.00
80	Nitrobenzene	0.007	0.001	85.7#	14#	0.00
81 t	p-Isopropyltoluene	1.041	1.153	-10.8	96	0.00
82 t	1,3-Dichlorobenzene	0.578	0.578	0.0	95	0.00
83 Rt	1,4-Dichlorobenzene	0.565	0.573	-1.4	93	0.00
84 t	n-Butylbenzene	0.933	1.073	-15.0	100	0.00
85 Rt	1,2-Dichlorobenzene	0.555	0.540	2.7	92	0.00
86 t	1,2-Dibromo-3-Chloropropane	0.042	0.037	11.9	75	0.00
87 Rt	1,2,4-Trichlorobenzene	0.271	0.326	-20.3	104	0.00
88 t	Hexachlorobutadiene	0.194	0.191	1.5	103	0.00
89 t	Naphthalene	0.436	0.479	-9.9	84	0.00
90 t	1,2,3-Trichlorobenzene	0.265	0.277	-4.5	90	0.00

(#) = Out of Range

SPCC's out = 0 CCC's out = 0

Data Path : Z:\voasrv\HPCHEM1\MSVOA_U\Data\VU021125\
 Data File : VU063227.D
 Acq On : 11 Feb 2025 08:50
 Operator : MD/SY
 Sample : VSTDICV010
 Misc : 25.0mL/MSVOA_U/WATER
 ALS Vial : 2 Sample Multiplier: 1

Instrument :
 MSVOA_U
 ClientSampleId :
 ICVVU021025

Quant Time: Feb 12 03:08:06 2025
 Quant Method : Z:\voasrv\HPCHEM1\MSVOA_U\Method\524U021025DW.M
 Quant Title : METHOD 524.2 VOLATILES DRINKING WATER
 QLast Update : Tue Feb 11 08:42:19 2025
 Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 20% Max. R.T. Dev 0.50min
 Max. RRF Dev : 30% Max. Rel. Area : 200%

	Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1 i	Fluorobenzene	1.000	1.000	0.0	98	0.00
2 T	Dichlorodifluoromethane	10.000	6.184	38.2#	64	0.00
3 t	Chloromethane	10.000	6.937	30.6#	72	0.00
4 Rt	Vinyl Chloride	10.000	7.705	22.9	76	0.00
5 T	Bromomethane	10.000	9.317	6.8	86	0.00
6 T	Chloroethane	10.000	8.021	19.8	82	0.00
7 T	Trichlorofluoromethane	10.000	8.470	15.3	86	0.00
8	1,1,2-Trichloro-1,2,2-trifl	10.000	9.685	3.1	102	0.00
9 Rt	1,1-Dichloroethene	10.000	9.488	5.1	95	0.00
10 t	Iodomethane	10.000	9.176	8.2	88	0.00
11 t	Allyl Chloride	10.000	10.019	-0.2	98	0.00
12 t	Acrylonitrile	20.000	48.397	-142.0#	213	0.00
13 T	Acetone	50.000	46.402	7.2	86	0.00
14 T	Carbon Disulfide	10.000	8.041	19.6	81	0.00
15 RT	Methylene Chloride	10.000	8.848	11.5	89	0.00
16 RT	trans-1,2-Dichloroethene	10.000	8.852	11.5	87	0.00
17 t	1,1-Dichloroethane	10.000	9.156	8.4	91	0.00
18 T	2-Butanone	50.000	46.124	7.8	82	0.00
19	Cyclohexane	10.000	9.443	5.6	89	0.00
20	Methylcyclohexane	10.000	10.164	-1.6	96	0.00
21 T	2,2-Dichloropropane	10.000	9.526	4.7	95	0.00
22 RT	cis-1,2-Dichloroethene	10.000	9.968	0.3	97	0.00
23 t	Diethyl Ether	10.000	8.360	16.4	82	0.00
24 t	tert-Butyl Alcohol	100.000	31.908	68.1#	33	0.04
25 t	Methyl tert-Butyl Ether	10.000	9.657	3.4	89	0.00
26 t	Bromochloromethane	10.000	9.544	4.6	93	0.00
27 t	Chloroform	10.000	9.296	7.0	92	0.00
28 RT	1,1,1-Trichloroethane	10.000	9.483	5.2	94	0.00
29 T	1,1-Dichloropropene	10.000	8.717	12.8	84	0.00
30 RT	Carbon Tetrachloride	10.000	9.311	6.9	92	0.00
31 t	Isopropyl Ether	10.000	10.534	-5.3	99	0.00
32	Ethyl-t-butyl ether	10.000	0.000	100.0#	0	-4.48#
33	Tert-Amyl methyl ether	10.000	0.000	100.0#	0	-5.93#
34 t	Propionitrile	50.000	100.030	-100.1#	171	0.00
35 RT	Benzene	10.000	9.305	7.0	91	0.00
36 RT	1,2-Dichloroethane	10.000	8.506	14.9	83	0.00
37 RT	Trichloroethene	10.000	8.871	11.3	87	0.00
38 Rt	1,2-Dichloropropane	10.000	8.794	12.1	85	0.00
39 t	Methacrylonitrile	10.000	10.277	-2.8	83	0.00
40 t	Methyl acrylate	10.000	9.798	2.0	86	0.00
41 t	Tetrahydrofuran	20.000	46.529	-132.6#	207	0.00
42 t	1-Chlorobutane	10.000	9.720	2.8	92	0.00
43 T	Dibromomethane	10.000	9.055	9.5	89	0.00
44 T	Bromodichloromethane	10.000	10.047	-0.5	95	0.00
45 T	4-Methyl-2-Pentanone	50.000	48.787	2.4	83	0.00
46 t	t-1,4-Dichloro-2-butene	20.000	10.896	45.5#	51	0.00
47 t	Methyl methacrylate	20.000	9.683	51.6#	40	0.00
48 t	Ethyl methacrylate	10.000	10.355	-3.6	83	0.00
49 Rt	Toluene	10.000	9.872	1.3	92	0.00

Data Path : Z:\voasrv\HPCHEM1\MSVOA_U\Data\VU021125\
 Data File : VU063227.D
 Acq On : 11 Feb 2025 08:50
 Operator : MD/SY
 Sample : VSTDICV010
 Misc : 25.0mL/MSVOA_U/WATER
 ALS Vial : 2 Sample Multiplier: 1

Instrument :
 MSVOA_U
 ClientSampleId :
 ICVVU021025

Quant Time: Feb 12 03:08:06 2025
 Quant Method : Z:\voasrv\HPCHEM1\MSVOA_U\Method\524U021025DW.M
 Quant Title : METHOD 524.2 VOLATILES DRINKING WATER
 QLast Update : Tue Feb 11 08:42:19 2025
 Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 20% Max. R.T. Dev 0.50min
 Max. RRF Dev : 30% Max. Rel. Area : 200%

	Compound	Amount	Calc.	%Dev	Area%	Dev(min)
50 T	t-1,3-Dichloropropene	10.000	9.703	3.0	86	0.00
51 T	cis-1,3-Dichloropropene	10.000	9.319	6.8	85	0.00
52 RT	1,1,2-Trichloroethane	10.000	9.082	9.2	86	0.00
53 t	1,3-Dichloropropane	10.000	8.908	10.9	84	0.00
54 t	2-Hexanone	50.000	48.325	3.3	81	0.00
55 t	Dibromochloromethane	10.000	9.564	4.4	88	0.00
56 T	1,2-Dibromoethane	10.000	9.020	9.8	83	0.00
57 S	4-Bromofluorobenzene	1.000	1.354	-35.4#	122	0.00
58 RT	Tetrachloroethene	10.000	9.644	3.6	97	0.00
59 Rt	Chlorobenzene	10.000	9.767	2.3	93	0.00
60 T	1,1,1,2-Tetrachloroethane	10.000	9.150	8.5	87	0.00
61 t	Pentachloroethane	10.000	9.395	6.1	91	0.00
62 t	Hexachloroethane	10.000	9.808	1.9	92	0.00
63 Rt	Ethyl Benzene	10.000	10.366	-3.7	93	0.00
64 RT	m/p-Xylenes	20.000	21.178	-5.9	93	0.00
65 RT	o-Xylene	10.000	10.384	-3.8	93	0.00
66 RT	Styrene	10.000	10.830	-8.3	92	0.00
67 t	Bromoform	10.000	9.606	3.9	86	0.00
68 S	1,2-Dichlorobenzene-d4	1.000	0.953	4.7	93	0.00
69 T	Isopropylbenzene	10.000	11.767	-17.7	105	0.00
70 T	1,1,2,2-Tetrachloroethane	10.000	8.545	14.6	80	0.00
71 T	1,2,3-Trichloropropane	10.000	8.443	15.6	90	0.00
72 t	Bromobenzene	10.000	9.945	0.5	92	0.00
73 t	n-propylbenzene	10.000	10.744	-7.4	94	0.00
74 t	2-Chlorotoluene	10.000	10.454	-4.5	94	0.00
75 t	1,3,5-Trimethylbenzene	10.000	10.853	-8.5	95	0.00
76 t	4-Chlorotoluene	10.000	10.373	-3.7	94	0.00
77 t	tert-Butylbenzene	10.000	10.355	-3.6	94	0.00
78 t	1,2,4-Trimethylbenzene	10.000	10.746	-7.5	92	0.00
79 t	sec-Butylbenzene	10.000	10.867	-8.7	97	0.00
80	Nitrobenzene	50.000	10.731	78.5#	14	0.00
81 t	p-Isopropyltoluene	10.000	11.076	-10.8	96	0.00
82 t	1,3-Dichlorobenzene	10.000	10.004	-0.0	95	0.00
83 Rt	1,4-Dichlorobenzene	10.000	10.142	-1.4	93	0.00
84 t	n-Butylbenzene	10.000	11.497	-15.0	100	0.00
85 Rt	1,2-Dichlorobenzene	10.000	9.718	2.8	92	0.00
86 t	1,2-Dibromo-3-Chloropropane	10.000	8.936	10.6	75	0.00
87 Rt	1,2,4-Trichlorobenzene	10.000	12.045	-20.4	104	0.00
88 t	Hexachlorobutadiene	10.000	9.862	1.4	103	0.00
89 t	Naphthalene	10.000	8.568	14.3	84	0.00
90 t	1,2,3-Trichlorobenzene	10.000	10.466	-4.7	90	0.00

(#) = Out of Range

SPCC's out = 0 CCC's out = 0



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

VOLATILE CONTINUING CALIBRATION CHECK

Lab Name: CHEMTECH Contract: CHEM02
 Lab Code: CHEM Case No.: Q1172 SAS No.: Q1172 SDG No.: Q1172
 Instrument ID: MSVOA_U Calibration Date/Time: 02/11/2025 10:01
 Lab File ID: VU063228.D Init. Calib. Date(s): 02/10/2025 02/10/2025
 Heated Purge: (Y/N) N Init. Calib. Time(s): 12:59 15:33
 GC Column: DB-624UI ID: 0.18 (mm)

COMPOUND	RRF	RRF010	MIN RRF	%D	MAX%D
Chloroform	0.551	0.488		-11.43	30
Bromodichloromethane	0.379	0.346		-8.71	30
Dibromochloromethane	0.253	0.232		-8.3	30
Bromoform	0.143	0.130		-9.09	30
1,2-Dichlorobenzene-d4	0.343	0.340		-0.88	30
4-Bromofluorobenzene	0.330	0.353		6.97	30

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_U\Data\VU021125\
 Data File : VU063228.D
 Acq On : 11 Feb 2025 10:01
 Operator : MD/SY
 Sample : VSTDCCC010
 Misc : 25.0mL/MSVOA_U/WATER
 ALS Vial : 3 Sample Multiplier: 1

Instrument :
 MSVOA_U
 ClientSampleId :
 VSTDCCC010

Manual Integrations
 APPROVED

Reviewed By :Amit Patel 02/12/2025
 Supervised By :Mahesh Dadoda 02/12/2025

Quant Time: Feb 12 03:08:58 2025
 Quant Method : Z:\voasrv\HPCHEM1\MSVOA_U\Method\524U021025DW.M
 Quant Title : METHOD 524.2 VOLATILES DRINKING WATER
 QLast Update : Tue Feb 11 08:42:19 2025
 Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	6.107	96	58984	1.000	ug/l	# 0.00
System Monitoring Compounds						
57) 4-Bromofluorobenzene	10.624	95	20817	1.070	ug/l	0.00
Spiked Amount 1.000			Recovery	=	107.000%	
68) 1,2-Dichlorobenzene-d4	12.183	152	20041	0.990	ug/l	0.00
Spiked Amount 1.000			Recovery	=	99.000%	
Target Compounds						
						Qvalue
2) Dichlorodifluoromethane	1.377	85	168588	8.797	ug/l	99
3) Chloromethane	1.512	50	183150	8.299	ug/l	99
4) Vinyl Chloride	1.595	62	191877	8.787	ug/l	99
5) Bromomethane	1.846	94	108143	10.135	ug/l	100
6) Chloroethane	1.923	64	118959	8.649	ug/l	99
7) Trichlorofluoromethane	2.129	101	232107	8.970	ug/l	100
8) 1,1,2-Trichloro-1,2,2-...	2.570	101	134615	9.165	ug/l	100
9) 1,1-Dichloroethene	2.570	96	133273	8.906	ug/l	99
10) Iodomethane	2.708	142	220323	9.365	ug/l	100
11) Allyl Chloride	2.911	41	197158	9.171	ug/l	99
12) Acrylonitrile	3.306	53	63729	18.464	ug/l	97
13) Acetone	2.621	43	108004	40.694	ug/l	98
14) Carbon Disulfide	2.782	76	457748	8.748	ug/l	100
15) Methylene Chloride	3.030	84	159891	8.649	ug/l	99
16) trans-1,2-Dichloroethene	3.338	96	154228	9.030	ug/l	97
17) 1,1-Dichloroethane	3.853	63	285900	8.881	ug/l	100
18) 2-Butanone	4.692	43	189230	44.800	ug/l	99
19) Cyclohexane	5.373	56	251683m	9.729	ug/l	
20) Methylcyclohexane	6.753	83	264092	10.295	ug/l	99
21) 2,2-Dichloropropane	4.647	77	232569	9.260	ug/l	100
22) cis-1,2-Dichloroethene	4.650	96	167648	9.085	ug/l	98
23) Diethyl Ether	2.364	59	107509	8.373	ug/l	94
24) tert-Butyl Alcohol	3.190	59	97948	72.937	ug/l	99
25) Methyl tert-Butyl Ether	3.348	73	345688	9.249	ug/l	100
26) Bromochloromethane	4.959	128	71801	8.902	ug/l	99
27) Chloroform	5.071	83	287897	8.862	ug/l	100
28) 1,1,1-Trichloroethane	5.303	97	240282	9.130	ug/l	99
29) 1,1-Dichloropropene	5.512	75	221821	9.411	ug/l	99
30) Carbon Tetrachloride	5.512	117	205723	9.115	ug/l	97
31) Isopropyl Ether	3.975	45	438504	9.541	ug/l	98
32) Ethyl-t-butyl ether	4.483	59	404506	9.678	ug/l	100
33) Tert-Amyl methyl ether	5.926	73	355235	9.728	ug/l	100
34) Propionitrile	4.769	54	62417	48.994	ug/l	97
35) Benzene	5.759	78	659362	9.098	ug/l	99
36) 1,2-Dichloroethane	5.779	62	181267	8.666	ug/l	99
37) Trichloroethene	6.531	130	157032	9.111	ug/l	99
38) 1,2-Dichloropropane	6.779	63	172356	9.086	ug/l	99
39) Methacrylonitrile	4.959	41	46751	9.847	ug/l	96
40) Methyl acrylate	4.837	55	73871	8.442	ug/l	96
41) Tetrahydrofuran	5.046	42	49020	17.753	ug/l	99
42) 1-Chlorobutane	5.444	56	309030	9.582	ug/l	99
43) Dibromomethane	6.907	93	85171	8.867	ug/l	97
44) Bromodichloromethane	7.094	83	204300	9.138	ug/l	99

Data Path : Z:\voasrv\HPCHEM1\MSVOA_U\Data\VU021125\
 Data File : VU063228.D
 Acq On : 11 Feb 2025 10:01
 Operator : MD/SY
 Sample : VSTDCCC010
 Misc : 25.0mL/MSVOA_U/WATER
 ALS Vial : 3 Sample Multiplier: 1

Instrument :
 MSVOA_U
 ClientSampleId :
 VSTDCCC010

Manual Integrations
 APPROVED

Reviewed By :Amit Patel 02/12/2025
 Supervised By :Mahesh Dadoda 02/12/2025

Quant Time: Feb 12 03:08:58 2025
 Quant Method : Z:\voasrv\HPCHEM1\MSVOA_U\Method\524U021025DW.M
 Quant Title : METHOD 524.2 VOLATILES DRINKING WATER
 QLast Update : Tue Feb 11 08:42:19 2025
 Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
45) 4-Methyl-2-Pentanone	7.779	43	477721	47.438	ug/l	99
46) t-1,4-Dichloro-2-butene	10.817	75	104119m	21.994	ug/l	
47) Methyl methacrylate	6.949	69	158763	19.623	ug/l	99
48) Ethyl methacrylate	8.322	69	156800	10.321	ug/l	99
49) Toluene	7.959	92	403234	9.675	ug/l	100
50) t-1,3-Dichloropropene	8.200	75	200824	9.811	ug/l	99
51) cis-1,3-Dichloropropene	7.595	75	236098	9.338	ug/l	98
52) 1,1,2-Trichloroethane	8.389	97	118560	9.154	ug/l	99
53) 1,3-Dichloropropane	8.563	76	209175	9.097	ug/l	99
54) 2-Hexanone	8.676	43	327783	47.697	ug/l	99
55) Dibromochloromethane	8.798	129	136618	9.169	ug/l	98
56) 1,2-Dibromoethane	8.914	107	112027	9.223	ug/l	99
58) Tetrachloroethene	8.544	164	132957	9.361	ug/l	99
59) Chlorobenzene	9.438	112	418432	9.514	ug/l	100
60) 1,1,1,2-Tetrachloroethane	9.521	131	145537	9.206	ug/l	100
61) Pentachloroethane	11.415	117	125203	8.865	ug/l	99
62) Hexachloroethane	12.463	117	116848	9.352	ug/l	99
63) Ethyl Benzene	9.560	91	759839	10.017	ug/l	100
64) m/p-Xylenes	9.682	106	579956	20.468	ug/l	99
65) o-Xylene	10.090	106	277570	10.007	ug/l	99
66) Styrene	10.103	104	451617	10.231	ug/l	100
67) Bromoform	10.280	173	76919	9.096	ug/l	99
69) Isopropylbenzene	10.473	105	663578	10.176	ug/l	100
70) 1,1,2,2-Tetrachloroethane	10.772	83	153961	8.820	ug/l	99
71) 1,2,3-Trichloropropane	10.814	75	124385m	9.485	ug/l	
72) Bromobenzene	10.772	156	166186	9.459	ug/l	100
73) n-propylbenzene	10.894	120	194100	10.396	ug/l	98
74) 2-Chlorotoluene	10.975	126	170502	9.909	ug/l	99
75) 1,3,5-Trimethylbenzene	11.077	105	619325	10.250	ug/l	100
76) 4-Chlorotoluene	11.087	126	177057	10.034	ug/l	97
77) tert-Butylbenzene	11.409	119	604402	9.891	ug/l	99
78) 1,2,4-Trimethylbenzene	11.457	105	624278	10.413	ug/l	99
79) sec-Butylbenzene	11.634	105	798973	10.269	ug/l	99
80) Nitrobenzene	13.203	77	19933m	39.429	ug/l	
81) p-Isopropyltoluene	11.782	119	648966	10.569	ug/l	100
82) 1,3-Dichlorobenzene	11.733	146	320582	9.407	ug/l	100
83) 1,4-Dichlorobenzene	11.827	146	320867	9.626	ug/l	99
84) n-Butylbenzene	12.196	91	608967	11.060	ug/l	99
85) 1,2-Dichlorobenzene	12.203	146	304747	9.305	ug/l	99
86) 1,2-Dibromo-3-Chloropr...	12.987	75	22925	9.357	ug/l	96
87) 1,2,4-Trichlorobenzene	13.830	180	175153	10.965	ug/l	99
88) Hexachlorobutadiene	14.010	225	110172	9.651	ug/l	98
89) Naphthalene	14.077	128	294274	8.899	ug/l	99
90) 1,2,3-Trichlorobenzene	14.318	180	165126	10.565	ug/l	99

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

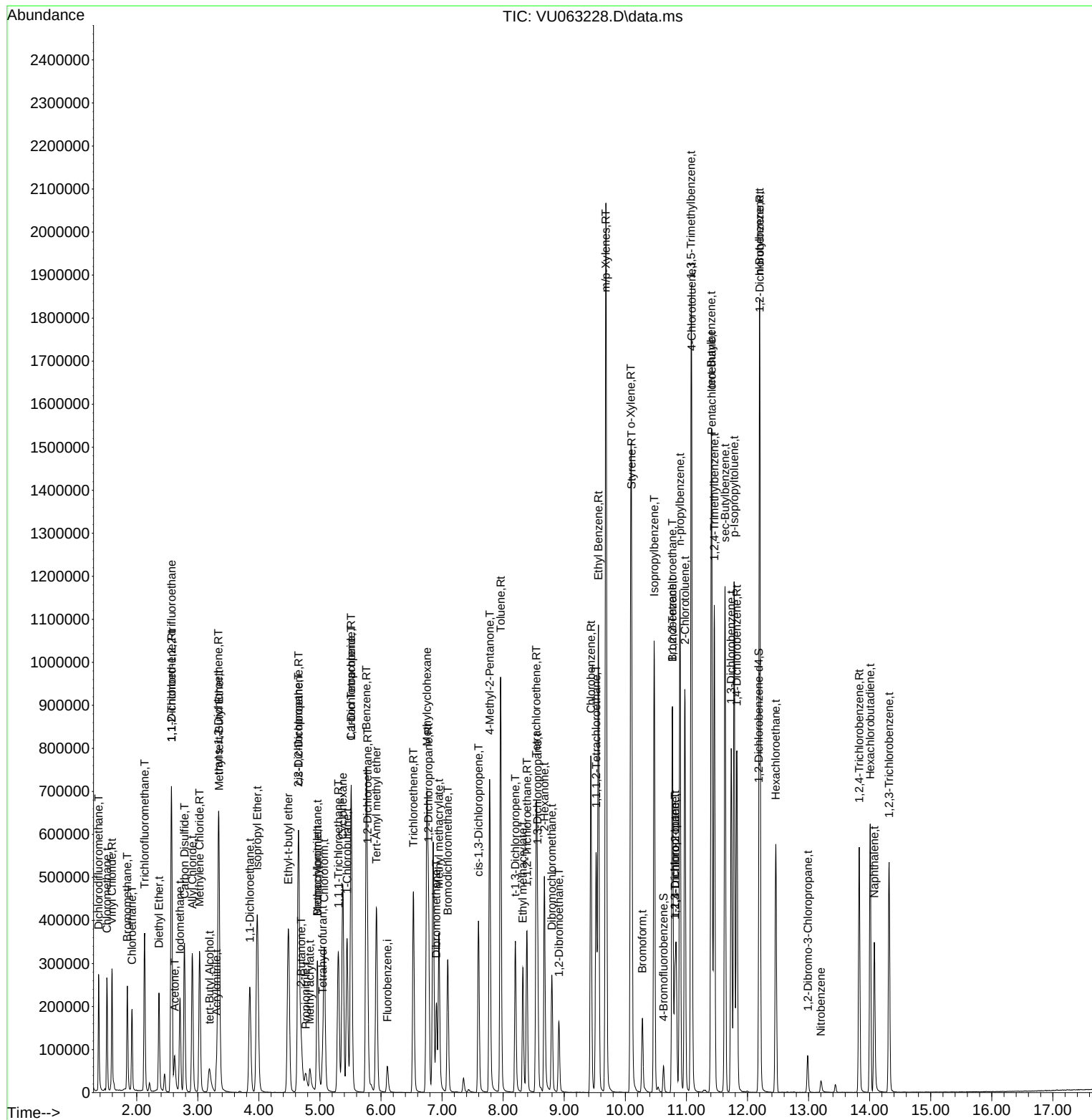
Data Path : Z:\voasrv\HPCHEM1\MSVOA_U\Data\VU021125\
 Data File : VU063228.D
 Acq On : 11 Feb 2025 10:01
 Operator : MD/SY
 Sample : VSTDCCC010
 Misc : 25.0mL/MSVOA_U/WATER
 ALS Vial : 3 Sample Multiplier: 1

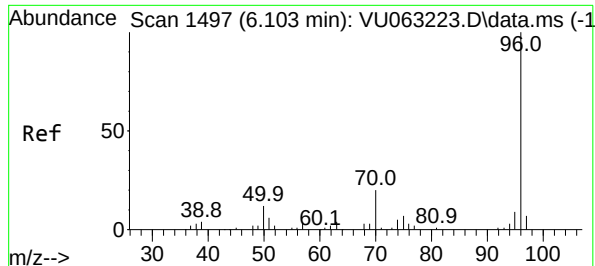
Instrument :
 MSVOA_U
 ClientSampleId :
 VSTDCCC010

Manual Integrations
 APPROVED

Reviewed By :Amit Patel 02/12/2025
 Supervised By :Mahesh Dadoda 02/12/2025

Quant Time: Feb 12 03:08:58 2025
 Quant Method : Z:\voasrv\HPCHEM1\MSVOA_U\Method\524U021025DW.M
 Quant Title : METHOD 524.2 VOLATILES DRINKING WATER
 QLast Update : Tue Feb 11 08:42:19 2025
 Response via : Initial Calibration





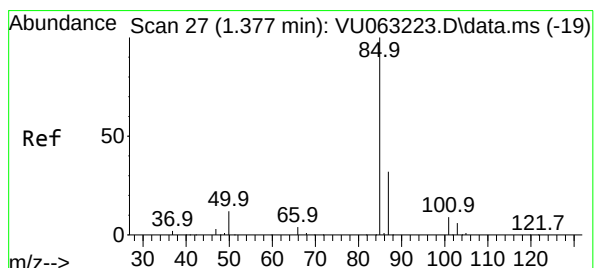
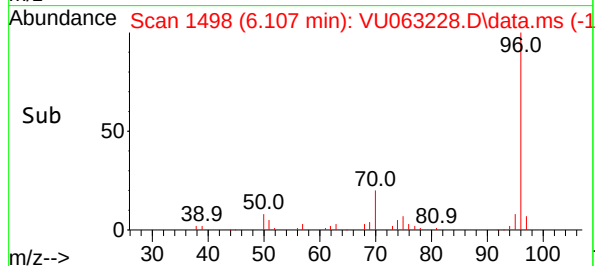
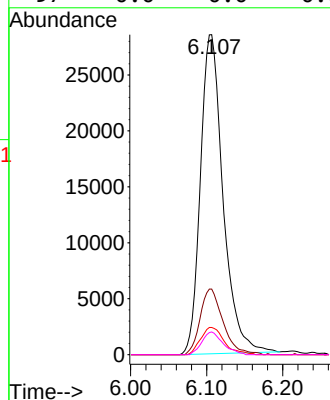
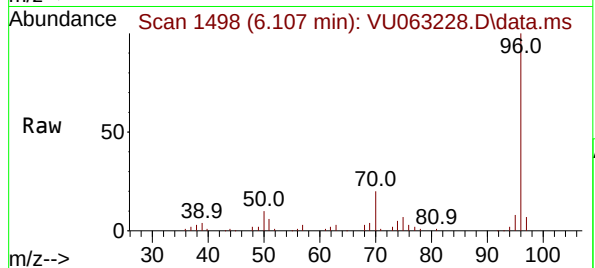
#1
Fluorobenzene
Concen: 1.000 ug/l
RT: 6.107 min Scan# 1498
Delta R.T. 0.004 min
Lab File: VU063228.D
Acq: 11 Feb 2025 10:01

Instrument :
MSVOA_U
ClientSampleId :
VSTDCCC010

Tgt Ion: 96 Resp: 58984
Ion Ratio Lower Upper
96 100
70 20.8 15.6 23.4
95 8.9 7.3 10.9
97 0.0 0.0 0.0

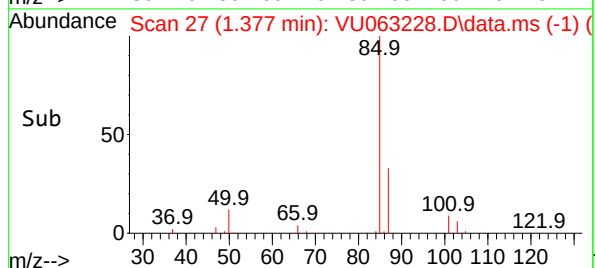
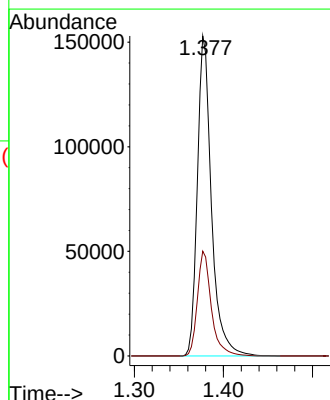
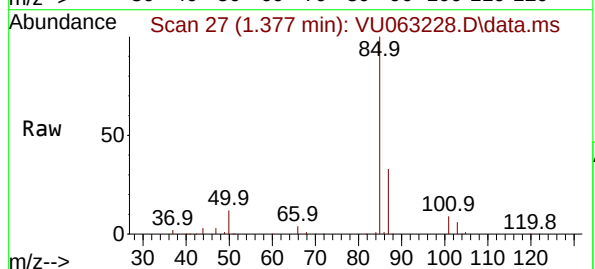
Manual Integrations
APPROVED

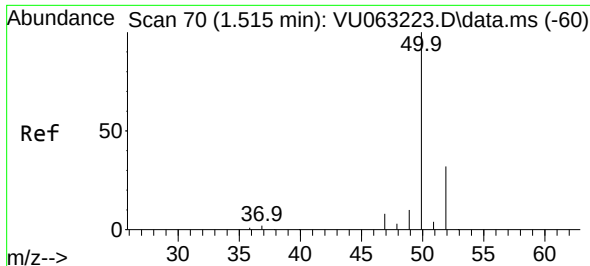
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#2
Dichlorodifluoromethane
Concen: 8.797 ug/l
RT: 1.377 min Scan# 27
Delta R.T. -0.000 min
Lab File: VU063228.D
Acq: 11 Feb 2025 10:01

Tgt Ion: 85 Resp: 168588
Ion Ratio Lower Upper
85 100
87 32.8 16.0 48.0





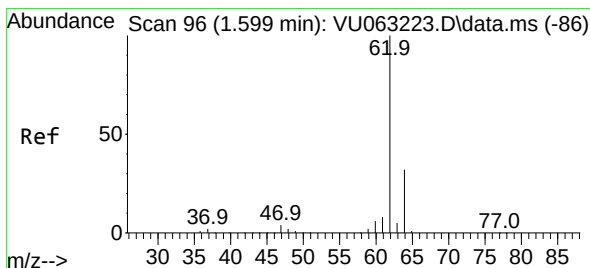
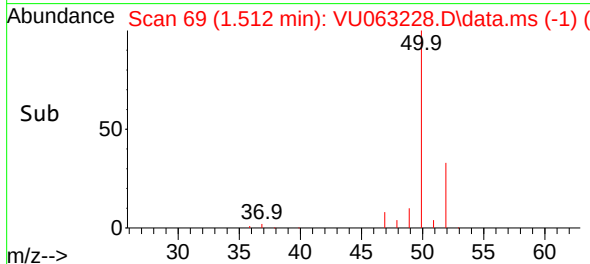
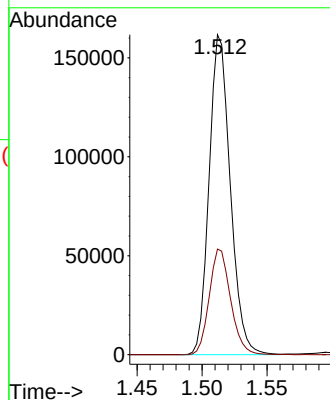
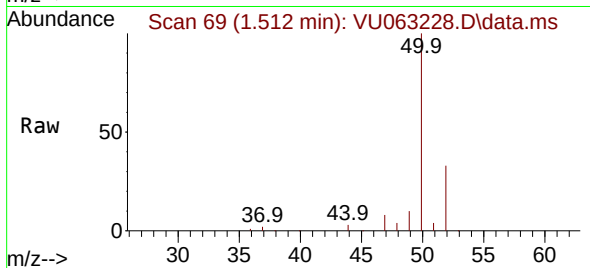
#3
Chloromethane
Concen: 8.299 ug/l
RT: 1.512 min Scan# 69
Delta R.T. -0.003 min
Lab File: VU063228.D
Acq: 11 Feb 2025 10:01

Instrument :
MSVOA_U
ClientSampleId :
VSTDCCC010

Tgt Ion: 50 Resp: 183150
Ion Ratio Lower Upper
50 100
52 33.0 25.8 38.8

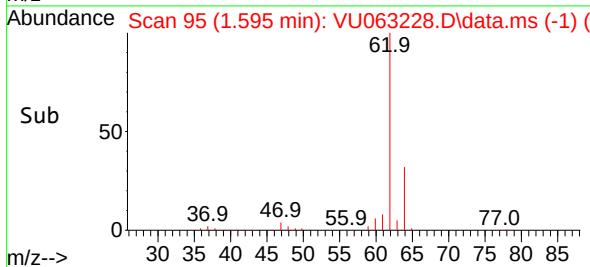
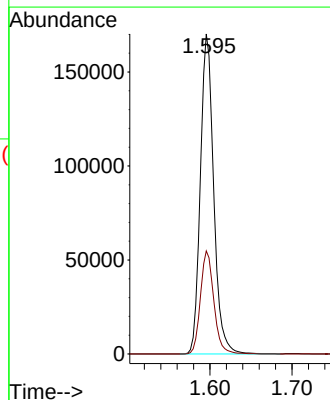
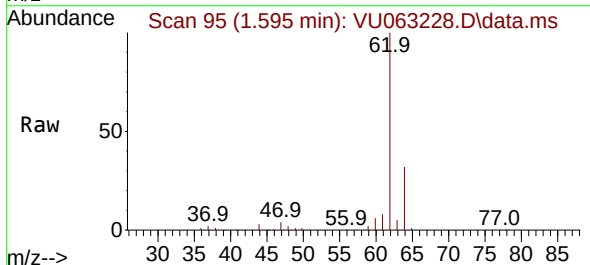
Manual Integrations
APPROVED

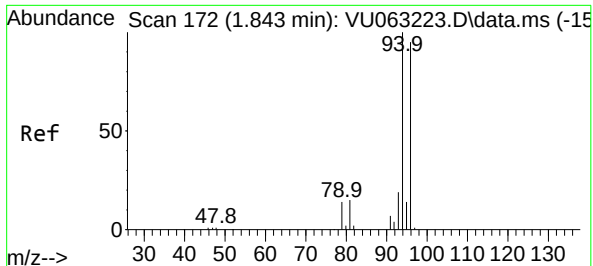
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#4
Vinyl Chloride
Concen: 8.787 ug/l
RT: 1.595 min Scan# 95
Delta R.T. -0.003 min
Lab File: VU063228.D
Acq: 11 Feb 2025 10:01

Tgt Ion: 62 Resp: 191877
Ion Ratio Lower Upper
62 100
64 32.2 25.4 38.0





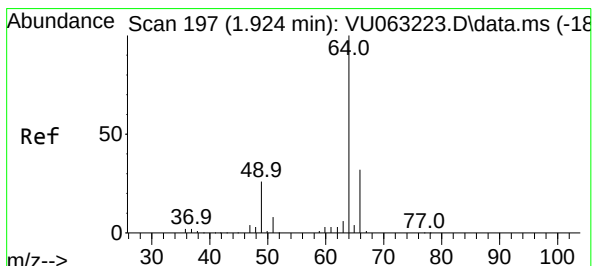
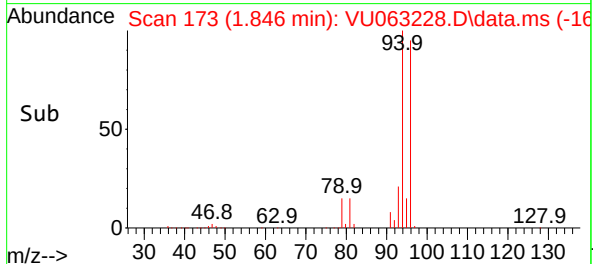
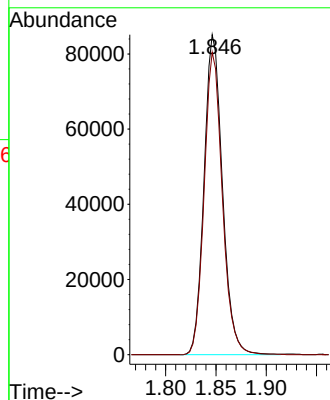
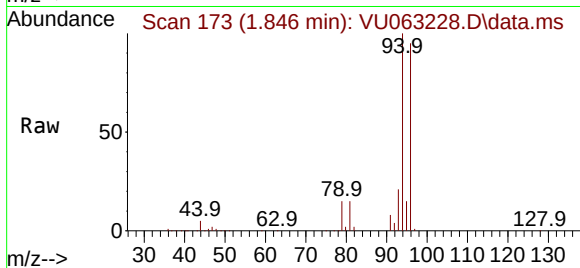
#5
Bromomethane
Concen: 10.135 ug/l
RT: 1.846 min Scan# 11
Delta R.T. 0.003 min
Lab File: VU063228.D
Acq: 11 Feb 2025 10:01

Instrument :
MSVOA_U
ClientSampleId :
VSTDCCC010

Tgt Ion: 94 Resp: 10814
Ion Ratio Lower Upper
94 100
96 94.5 75.7 113.5

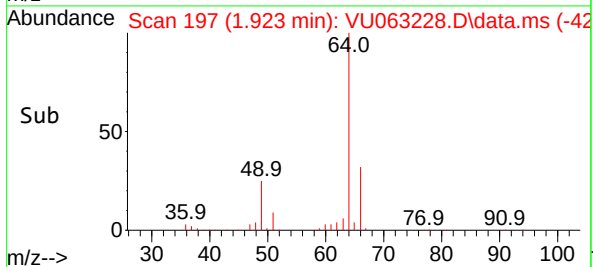
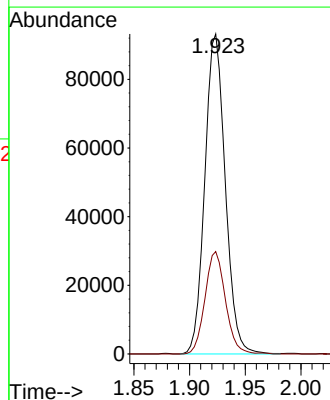
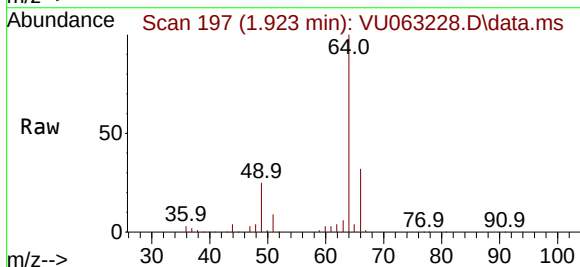
Manual Integrations
APPROVED

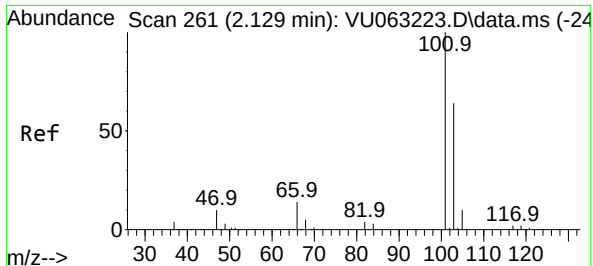
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#6
Chloroethane
Concen: 8.649 ug/l
RT: 1.923 min Scan# 197
Delta R.T. -0.000 min
Lab File: VU063228.D
Acq: 11 Feb 2025 10:01

Tgt Ion: 64 Resp: 118959
Ion Ratio Lower Upper
64 100
66 32.0 25.8 38.8





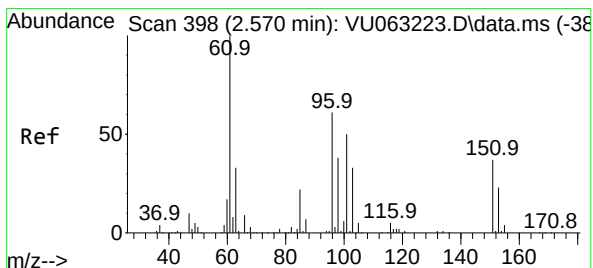
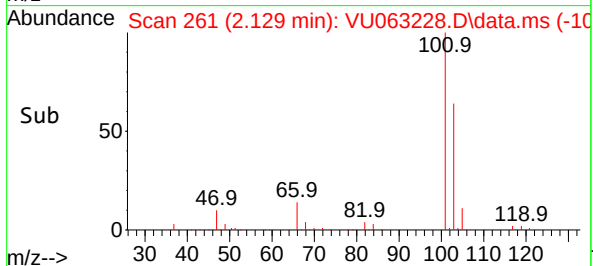
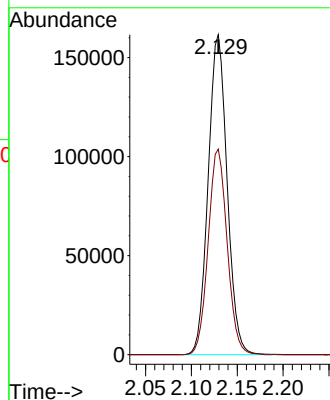
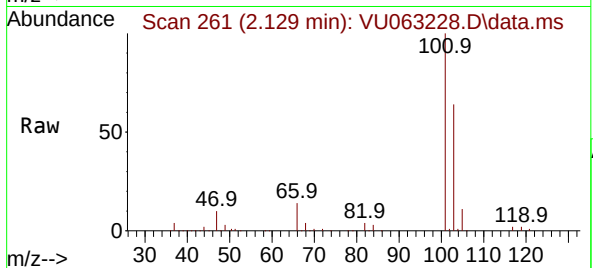
#7
Trichlorofluoromethane
Concen: 8.970 ug/l
RT: 2.129 min Scan# 20
Delta R.T. -0.000 min
Lab File: VU063228.D
Acq: 11 Feb 2025 10:01

Instrument :
MSVOA_U
ClientSampleId :
VSTDCCC010

Tgt Ion:101 Resp: 23210
Ion Ratio Lower Upper
101 100
103 64.2 51.4 77.2

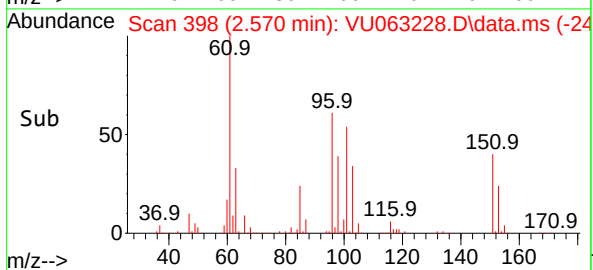
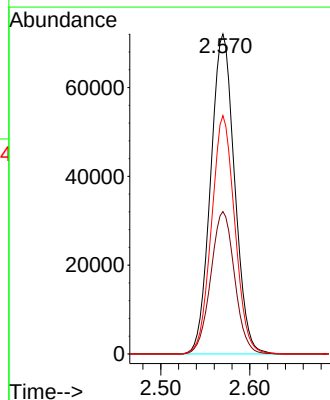
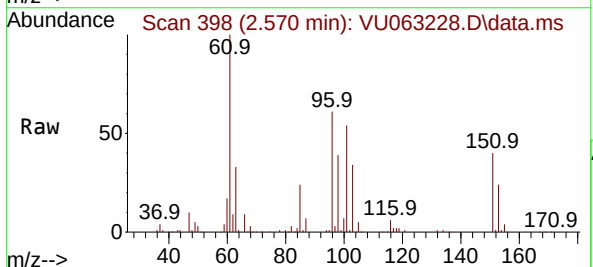
Manual Integrations
APPROVED

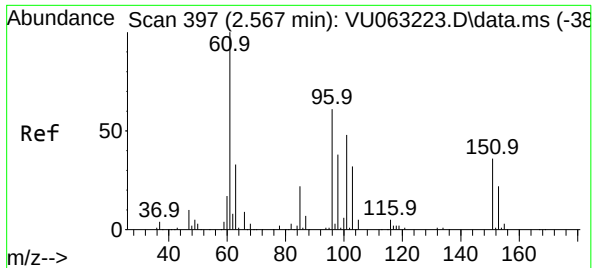
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#8
1,1,2-Trichloro-1,2,2-trifluoroethane
Concen: 9.165 ug/l
RT: 2.570 min Scan# 398
Delta R.T. -0.000 min
Lab File: VU063228.D
Acq: 11 Feb 2025 10:01

Tgt Ion:101 Resp: 134615
Ion Ratio Lower Upper
101 100
85 44.3 35.4 53.0
151 72.6 58.5 87.7





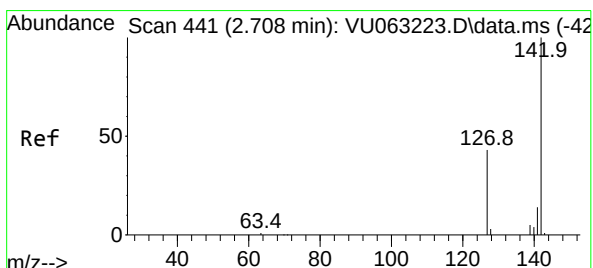
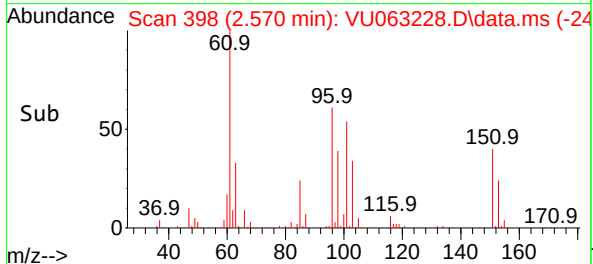
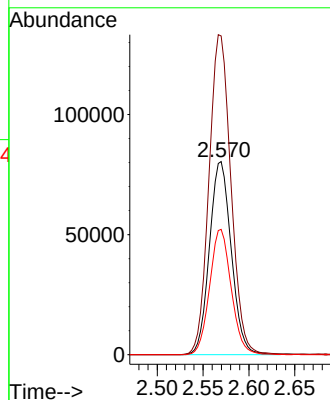
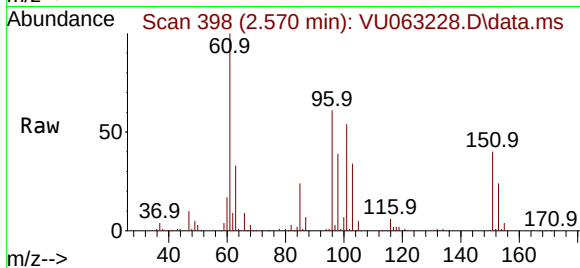
#9
1,1-Dichloroethene
Concen: 8.906 ug/l
RT: 2.570 min Scan# 397
Delta R.T. 0.003 min
Lab File: VU063228.D
Acq: 11 Feb 2025 10:01

Instrument :
MSVOA_U
ClientSampleId :
VSTDCCC010

Tgt Ion: 96 Resp: 13327
Ion Ratio Lower Upper
96 100
61 165.1 0.0 492.9
98 64.9 0.0 124.0

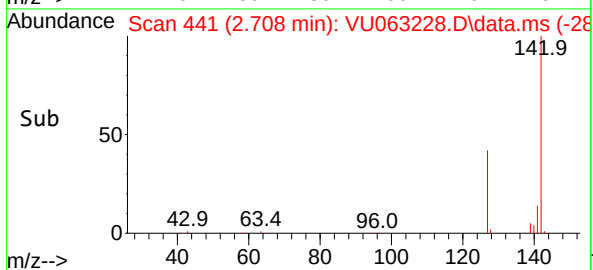
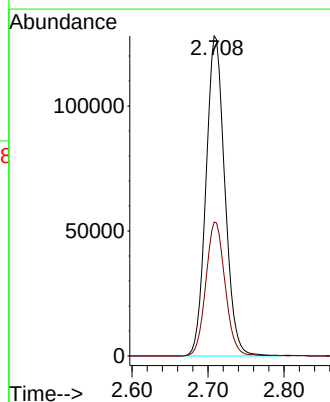
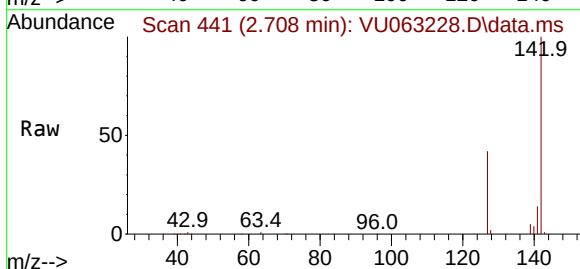
Manual Integrations
APPROVED

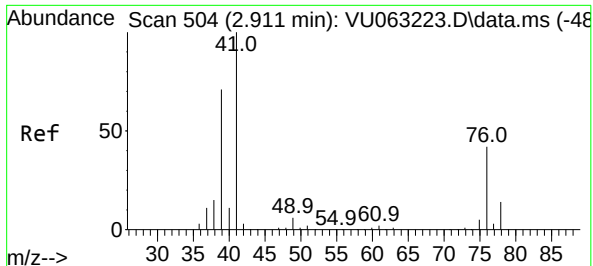
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#10
Iodomethane
Concen: 9.365 ug/l
RT: 2.708 min Scan# 441
Delta R.T. -0.000 min
Lab File: VU063228.D
Acq: 11 Feb 2025 10:01

Tgt Ion:142 Resp: 220323
Ion Ratio Lower Upper
142 100
127 42.8 34.5 51.7





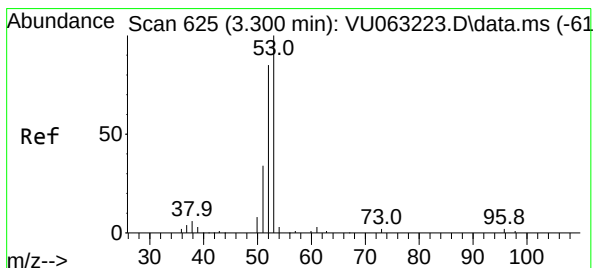
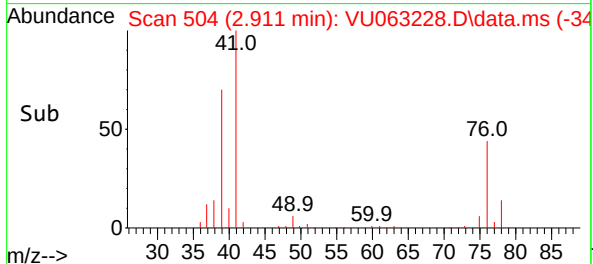
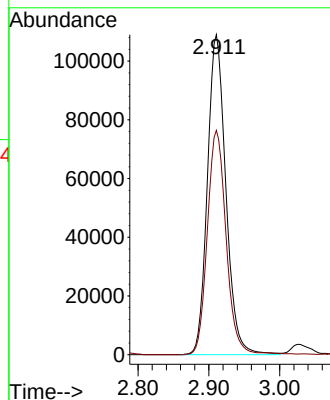
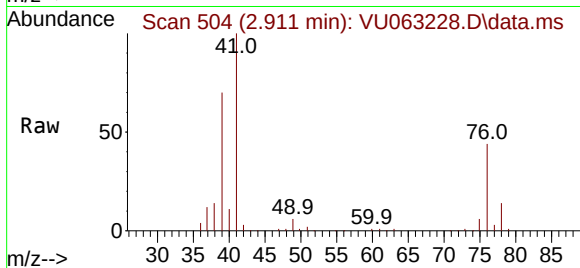
#11
 Allyl Chloride
 Concen: 9.171 ug/l
 RT: 2.911 min Scan# 504
 Delta R.T. -0.000 min
 Lab File: VU063228.D
 Acq: 11 Feb 2025 10:01

Instrument :
 MSVOA_U
 ClientSampleId :
 VSTDCCC010

Tgt Ion: 41 Resp: 197158
 Ion Ratio Lower Upper
 41 100
 39 71.6 57.9 86.9

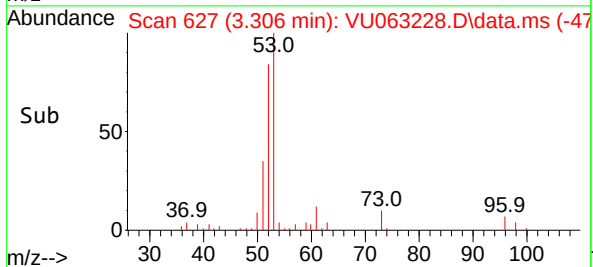
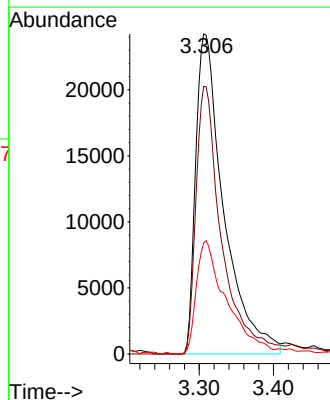
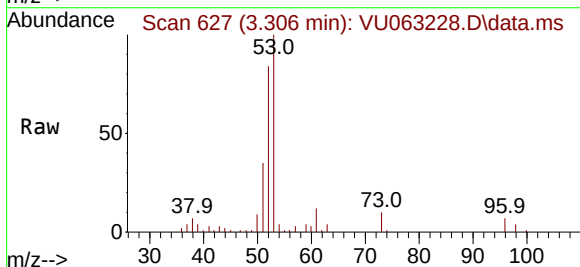
Manual Integrations
 APPROVED

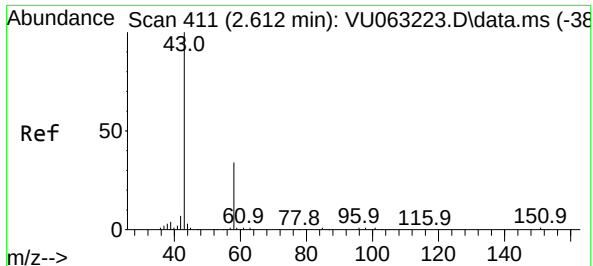
Reviewed By :Amit Patel 02/12/2025
 Supervised By :Mahesh Dadoda 02/12/2025



#12
 Acrylonitrile
 Concen: 18.464 ug/l
 RT: 3.306 min Scan# 627
 Delta R.T. 0.006 min
 Lab File: VU063228.D
 Acq: 11 Feb 2025 10:01

Tgt Ion: 53 Resp: 63729
 Ion Ratio Lower Upper
 53 100
 52 76.3 64.2 96.2
 51 37.9 30.8 46.2





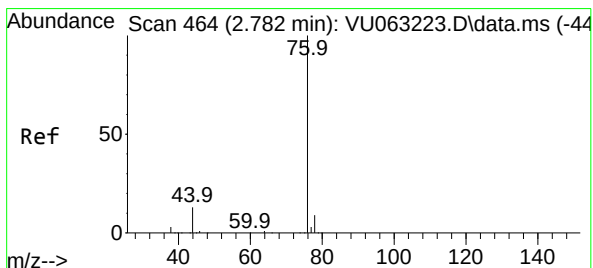
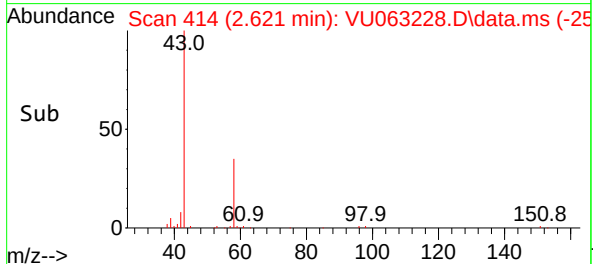
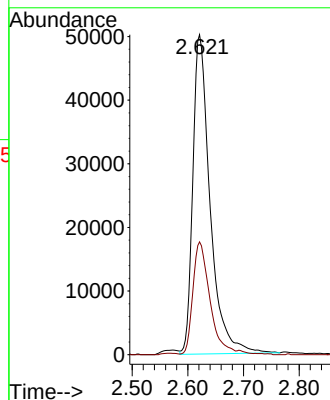
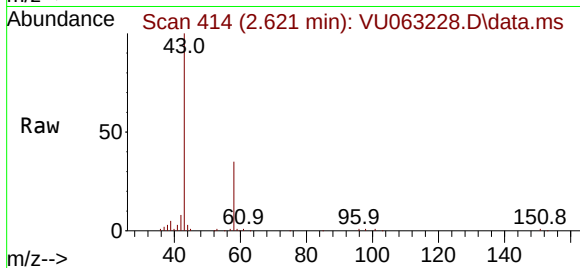
#13
Acetone
Concen: 40.694 ug/l
RT: 2.621 min Scan# 411
Delta R.T. 0.010 min
Lab File: VU063228.D
Acq: 11 Feb 2025 10:01

Instrument :
MSVOA_U
ClientSampleId :
VSTDCCC010

Tgt Ion: 43 Resp: 108004
Ion Ratio Lower Upper
43 100
58 35.5 27.4 41.0

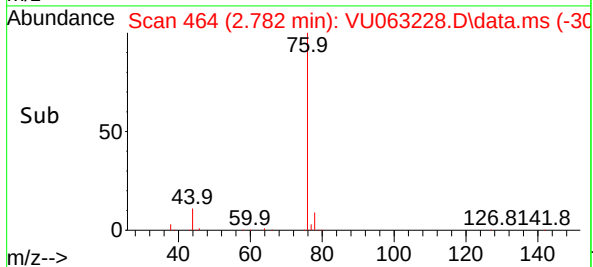
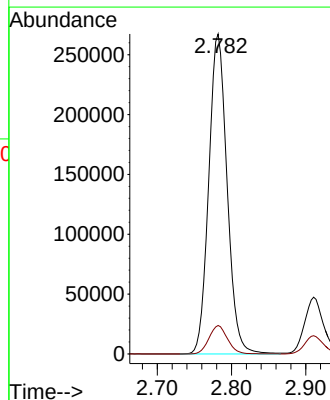
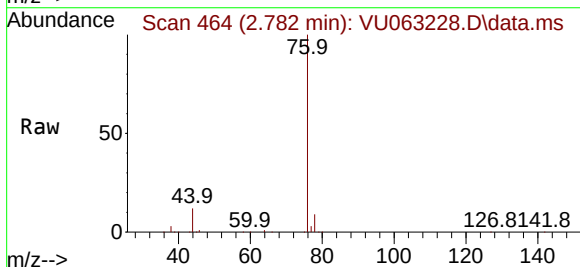
Manual Integrations
APPROVED

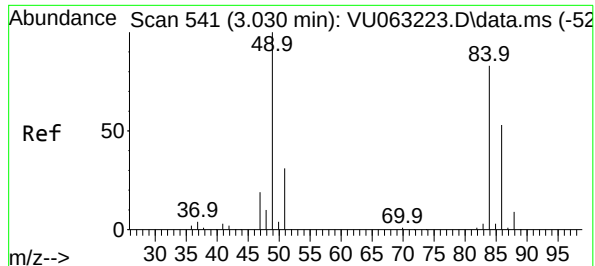
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#14
Carbon Disulfide
Concen: 8.748 ug/l
RT: 2.782 min Scan# 464
Delta R.T. -0.000 min
Lab File: VU063228.D
Acq: 11 Feb 2025 10:01

Tgt Ion: 76 Resp: 457748
Ion Ratio Lower Upper
76 100
78 8.9 7.2 10.8





#15

Methylene Chloride

Concen: 8.649 ug/l

RT: 3.030 min Scan# 541

Delta R.T. -0.000 min

Lab File: VU063228.D

Acq: 11 Feb 2025 10:01

Instrument :

MSVOA_U

ClientSampleId :

VSTDCCC010

Tgt Ion: 84 Resp: 15989

Ion Ratio Lower Upper

84 100

49 120.8 96.4 144.6

51 35.7 0.0 74.8

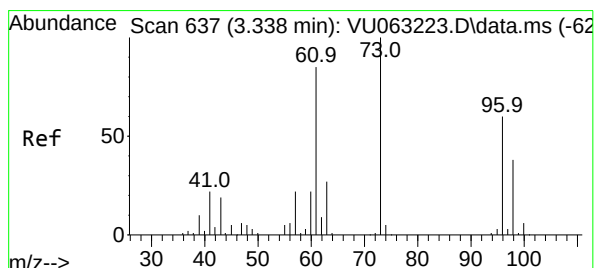
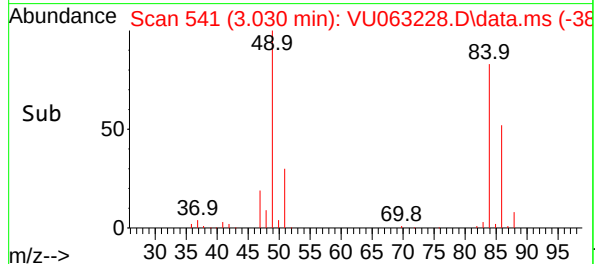
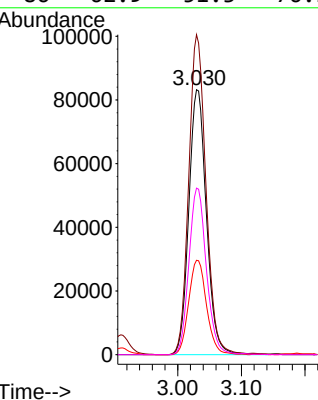
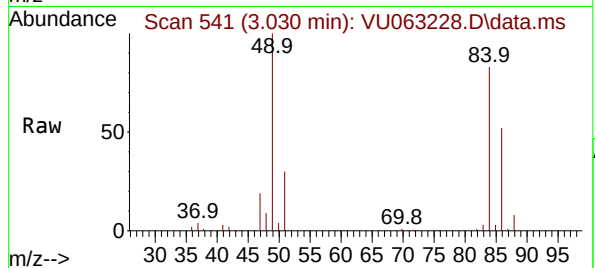
86 62.9 51.3 76.9

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#16

trans-1,2-Dichloroethene

Concen: 9.030 ug/l

RT: 3.338 min Scan# 637

Delta R.T. -0.000 min

Lab File: VU063228.D

Acq: 11 Feb 2025 10:01

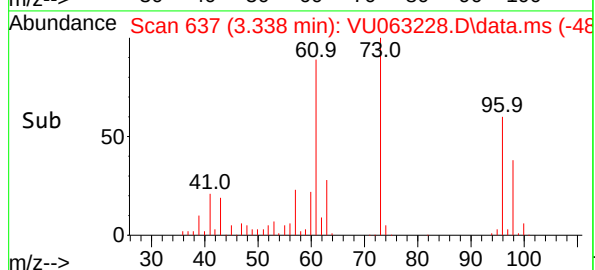
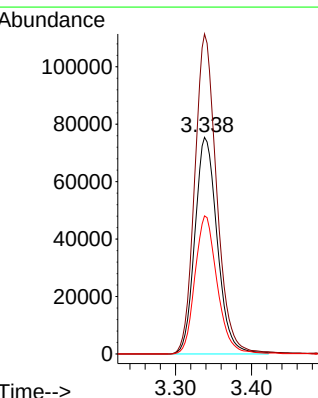
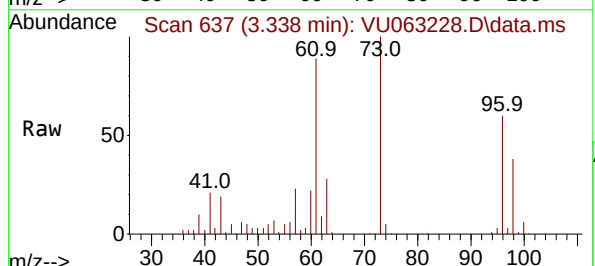
Tgt Ion: 96 Resp: 154228

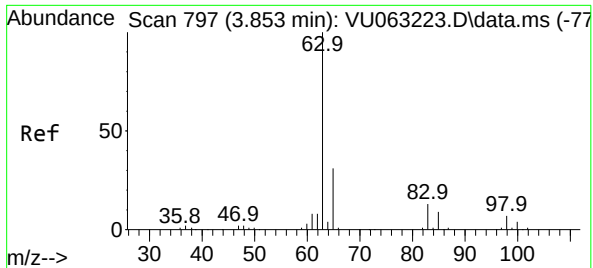
Ion Ratio Lower Upper

96 100

61 147.7 113.4 170.2

98 63.7 51.2 76.8





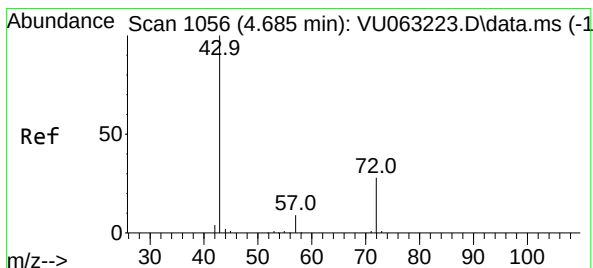
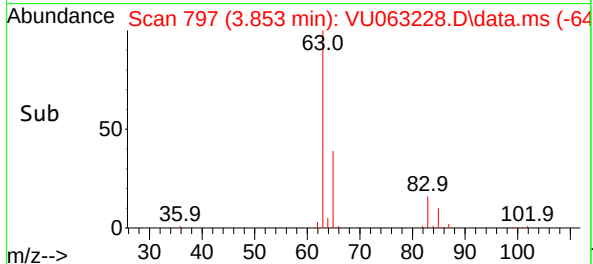
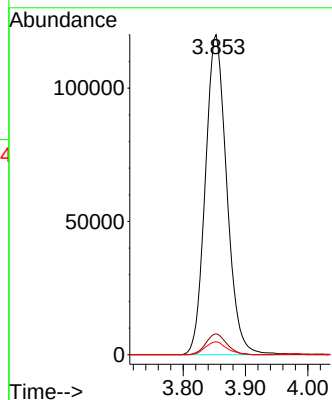
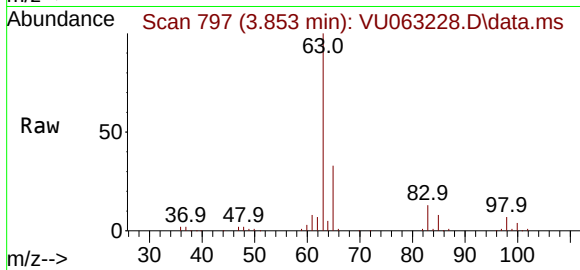
#17
1,1-Dichloroethane
Concen: 8.881 ug/l
RT: 3.853 min Scan# 797
Delta R.T. -0.000 min
Lab File: VU063228.D
Acq: 11 Feb 2025 10:01

Instrument :
MSVOA_U
ClientSampleId :
VSTDCCC010

Tgt Ion: 63 Resp: 285900
Ion Ratio Lower Upper
63 100
98 6.5 3.3 9.9
100 4.0 2.1 6.2

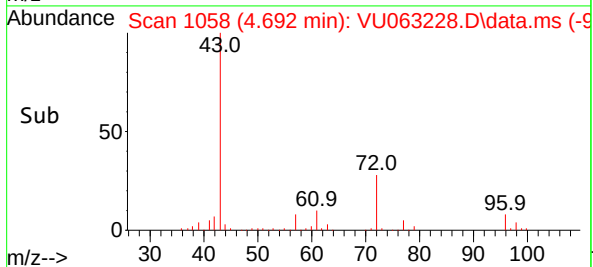
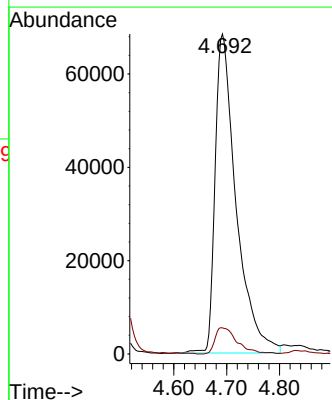
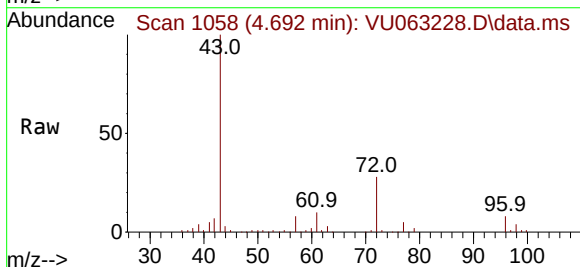
Manual Integrations
APPROVED

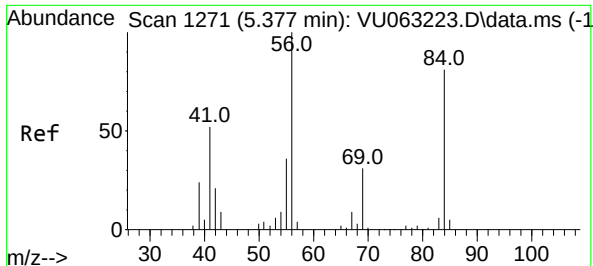
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#18
2-Butanone
Concen: 44.800 ug/l
RT: 4.692 min Scan# 1058
Delta R.T. 0.006 min
Lab File: VU063228.D
Acq: 11 Feb 2025 10:01

Tgt Ion: 43 Resp: 189230
Ion Ratio Lower Upper
43 100
57 8.0 0.0 17.0





#19

Cyclohexane

Concen: 9.729 ug/l m

RT: 5.373 min Scan# 1271

Delta R.T. -0.003 min

Lab File: VU063228.D

Acq: 11 Feb 2025 10:01

Instrument :

MSVOA_U

ClientSampleId :

VSTDCCC010

Tgt Ion: 56 Resp: 25168

Ion Ratio Lower Upper

56 100

69 31.4 24.5 36.7

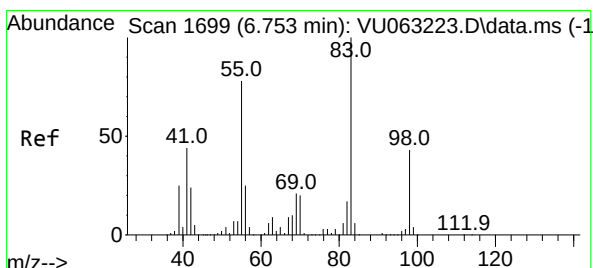
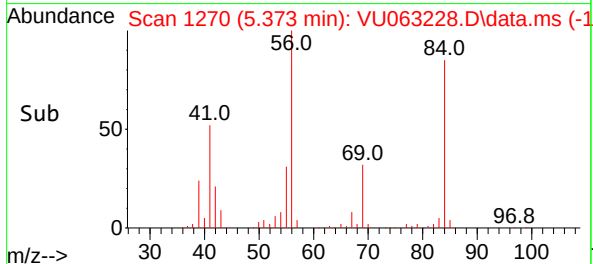
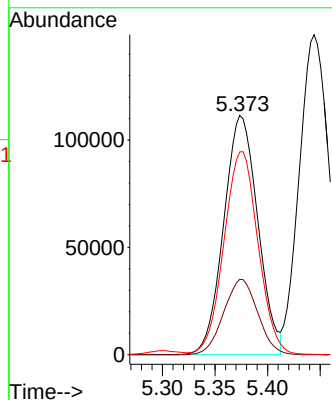
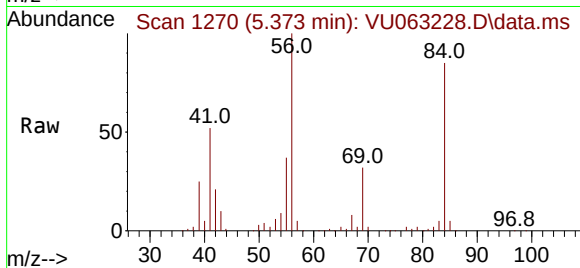
84 83.6 65.2 97.8

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#20

Methylcyclohexane

Concen: 10.295 ug/l

RT: 6.753 min Scan# 1699

Delta R.T. -0.000 min

Lab File: VU063228.D

Acq: 11 Feb 2025 10:01

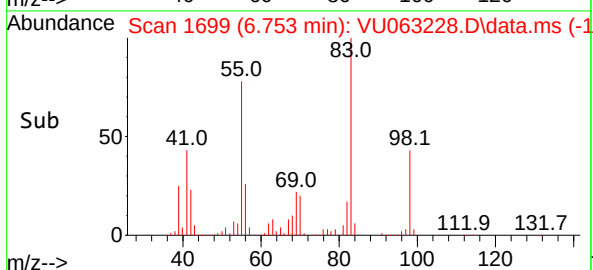
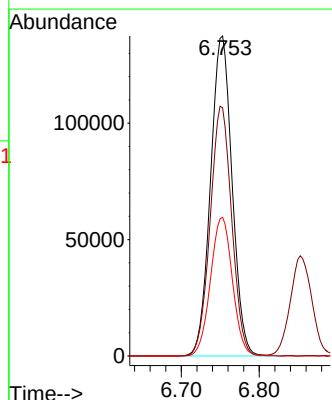
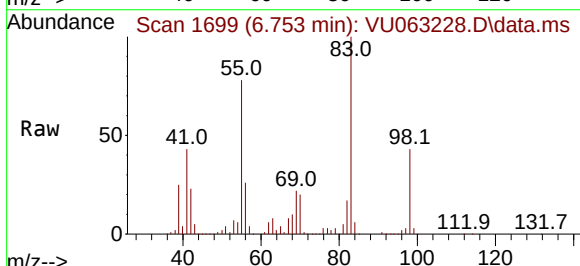
Tgt Ion: 83 Resp: 264092

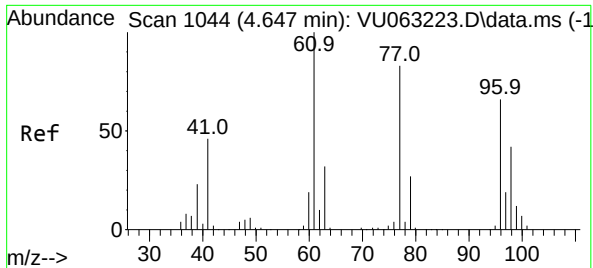
Ion Ratio Lower Upper

83 100

55 77.6 63.1 94.7

98 44.1 35.2 52.8





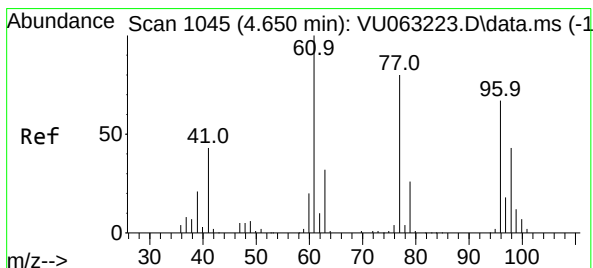
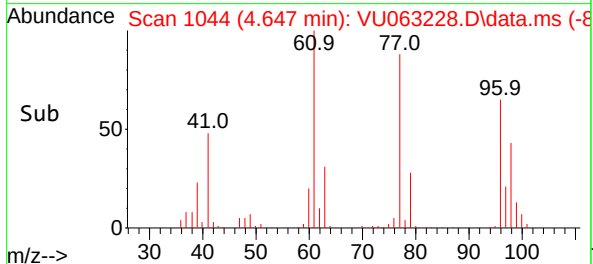
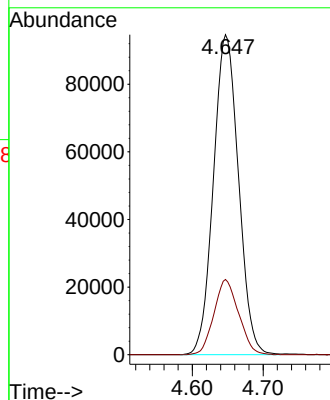
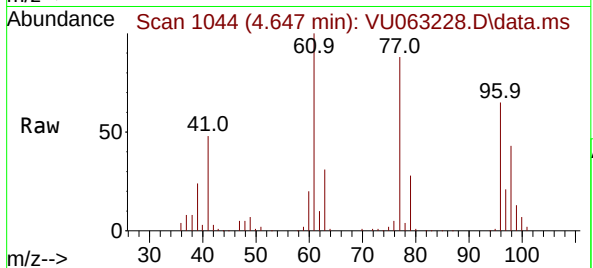
#21
2,2-Dichloropropane
Concen: 9.260 ug/l
RT: 4.647 min Scan# 1044
Delta R.T. -0.000 min
Lab File: VU063228.D
Acq: 11 Feb 2025 10:01

Instrument :
MSVOA_U
ClientSampleId :
VSTDCCC010

Tgt Ion: 77 Resp: 232569
Ion Ratio Lower Upper
77 100
97 23.1 18.5 27.7

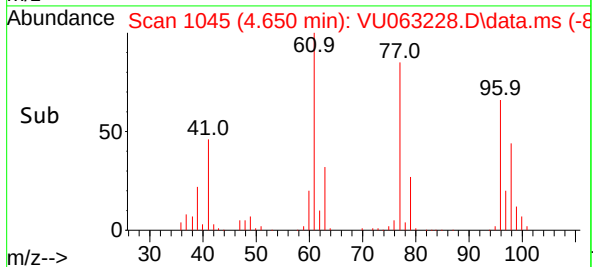
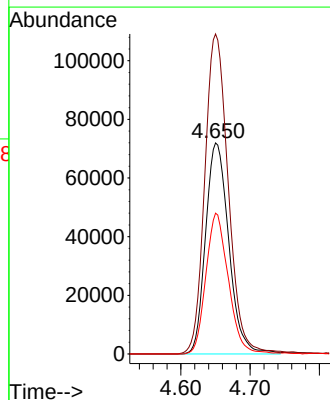
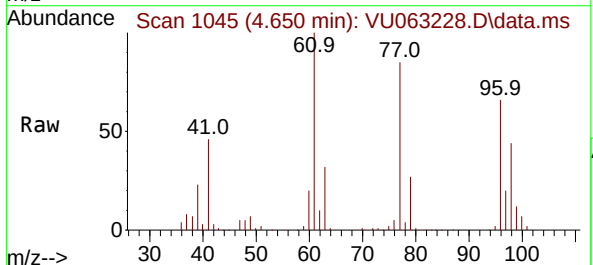
Manual Integrations
APPROVED

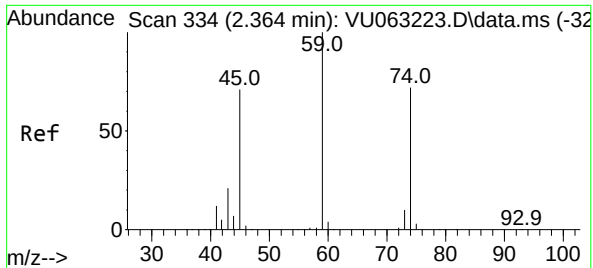
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#22
cis-1,2-Dichloroethene
Concen: 9.085 ug/l
RT: 4.650 min Scan# 1045
Delta R.T. -0.000 min
Lab File: VU063228.D
Acq: 11 Feb 2025 10:01

Tgt Ion: 96 Resp: 167648
Ion Ratio Lower Upper
96 100
61 153.2 0.0 373.3
98 64.5 31.9 95.9





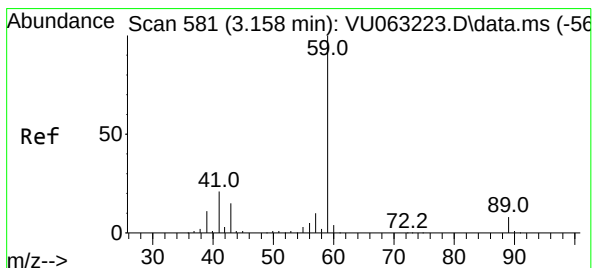
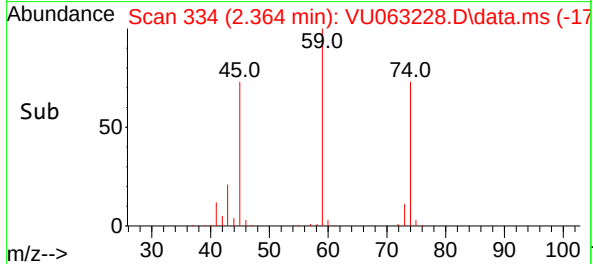
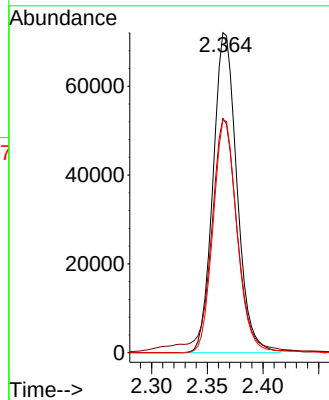
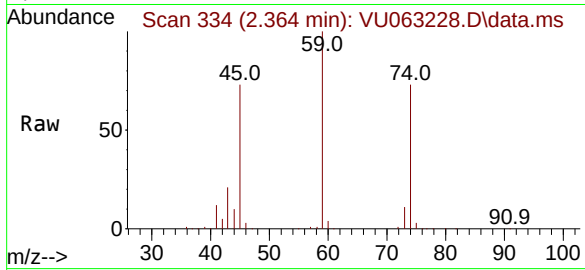
#23
Diethyl Ether
Concen: 8.373 ug/l
RT: 2.364 min Scan# 311
Delta R.T. -0.000 min
Lab File: VU063228.D
Acq: 11 Feb 2025 10:01

Instrument :
MSVOA_U
ClientSampleId :
VSTDCCC010

Tgt Ion: 59 Resp: 107509
Ion Ratio Lower Upper
59 100
45 80.4 57.8 86.6
74 73.5 57.7 86.5

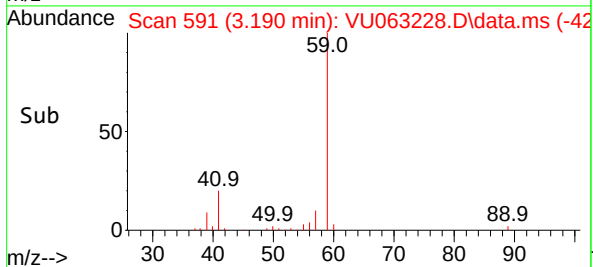
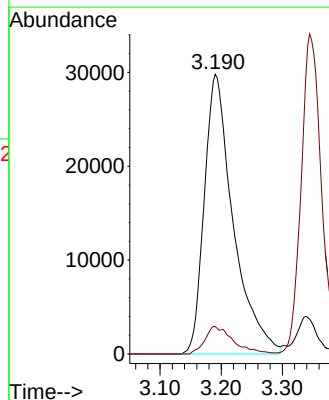
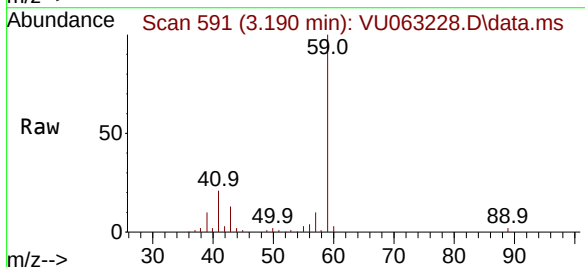
Manual Integrations
APPROVED

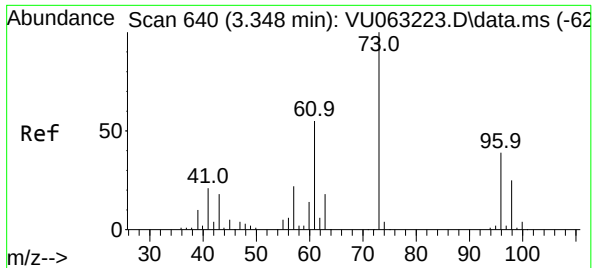
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#24
tert-Butyl Alcohol
Concen: 72.937 ug/l
RT: 3.190 min Scan# 591
Delta R.T. 0.032 min
Lab File: VU063228.D
Acq: 11 Feb 2025 10:01

Tgt Ion: 59 Resp: 97948
Ion Ratio Lower Upper
59 100
57 9.7 7.5 11.3





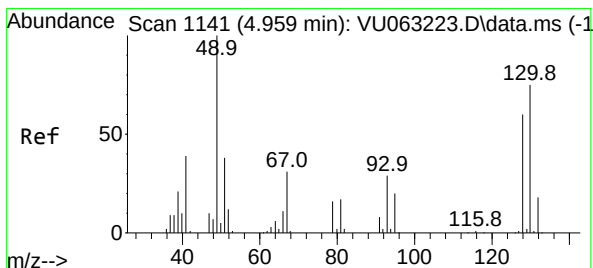
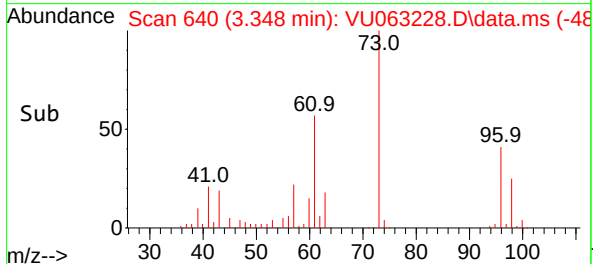
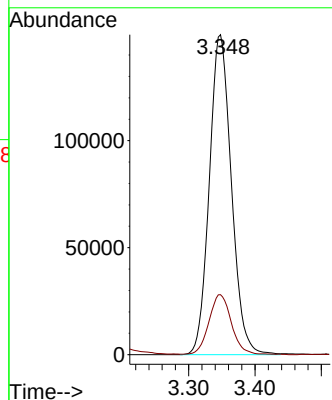
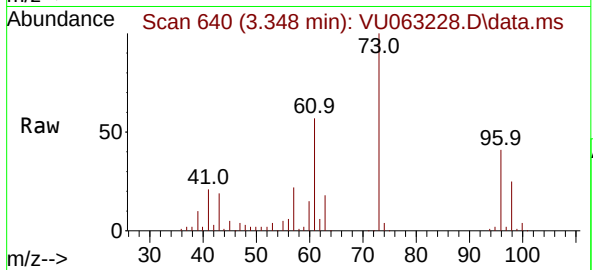
#25
Methyl tert-Butyl Ether
Concen: 9.249 ug/l
RT: 3.348 min Scan# 640
Delta R.T. -0.000 min
Lab File: VU063228.D
Acq: 11 Feb 2025 10:01

Instrument :
MSVOA_U
ClientSampleId :
VSTDCCC010

Tgt Ion: 73 Resp: 34568
Ion Ratio Lower Upper
73 100
43 18.8 14.9 22.3

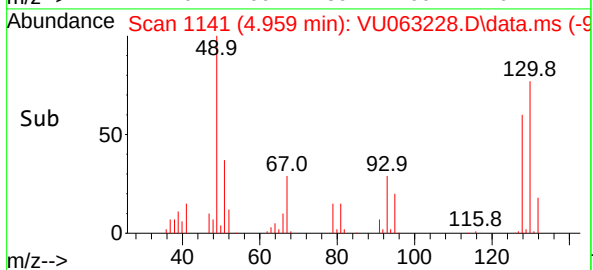
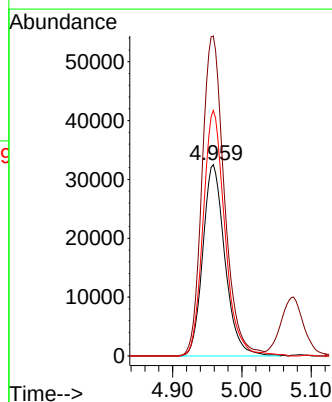
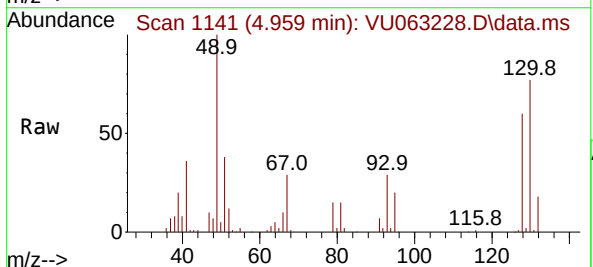
Manual Integrations
APPROVED

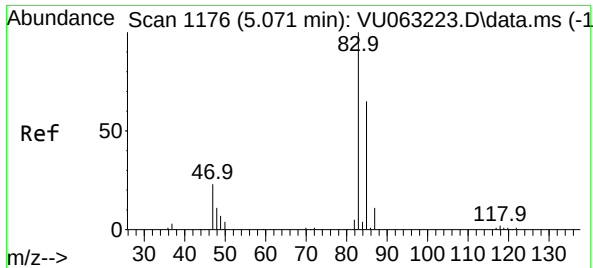
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#26
Bromochloromethane
Concen: 8.902 ug/l
RT: 4.959 min Scan# 1141
Delta R.T. -0.000 min
Lab File: VU063228.D
Acq: 11 Feb 2025 10:01

Tgt Ion:128 Resp: 71801
Ion Ratio Lower Upper
128 100
49 169.6 0.0 343.4
130 127.3 102.9 154.3





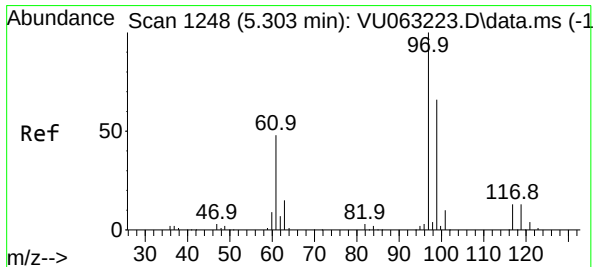
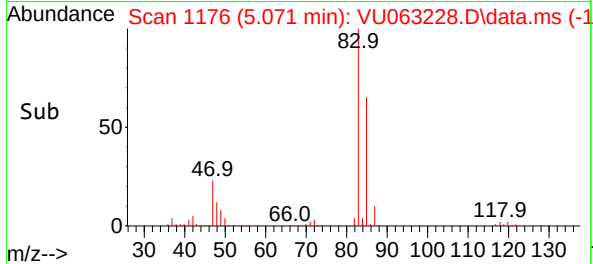
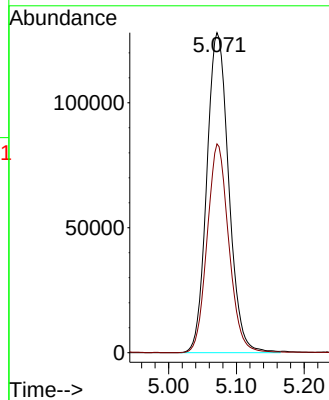
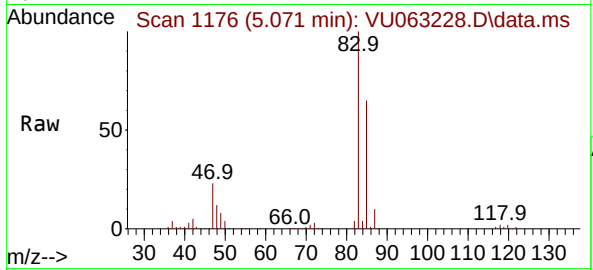
#27
Chloroform
Concen: 8.862 ug/l
RT: 5.071 min Scan# 1176
Delta R.T. -0.000 min
Lab File: VU063228.D
Acq: 11 Feb 2025 10:01

Instrument :
MSVOA_U
ClientSampleId :
VSTDCCC010

Tgt Ion: 83 Resp: 28789
Ion Ratio Lower Upper
83 100
85 65.2 0.0 129.8

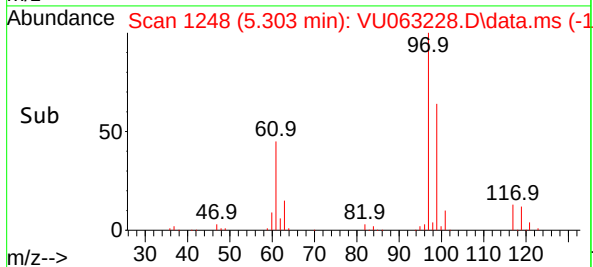
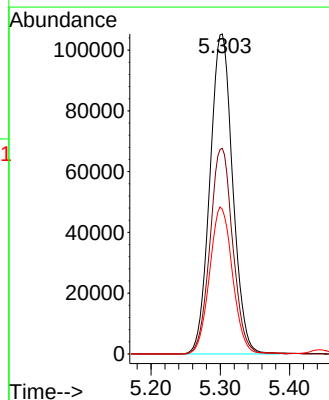
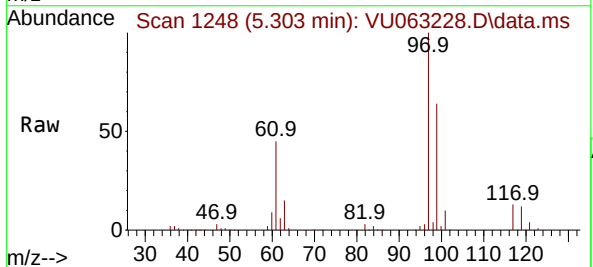
Manual Integrations
APPROVED

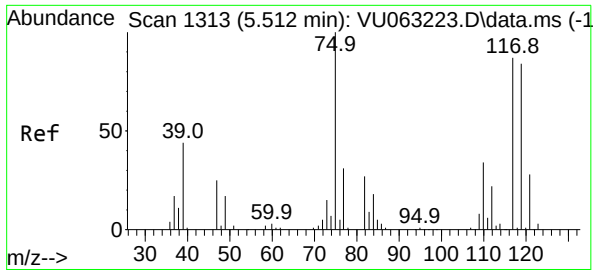
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#28
1,1,1-Trichloroethane
Concen: 9.130 ug/l
RT: 5.303 min Scan# 1248
Delta R.T. -0.000 min
Lab File: VU063228.D
Acq: 11 Feb 2025 10:01

Tgt Ion: 97 Resp: 240282
Ion Ratio Lower Upper
97 100
99 64.3 32.4 97.0
61 46.4 23.8 71.2





#29

1,1-Dichloropropene

Concen: 9.411 ug/l

RT: 5.512 min Scan# 1313

Delta R.T. -0.000 min

Lab File: VU063228.D

Acq: 11 Feb 2025 10:01

Instrument :

MSVOA_U

ClientSampleId :

VSTDCCC010

Tgt Ion: 75 Resp: 22182

Ion Ratio Lower Upper

75 100

110 35.0 17.2 51.5

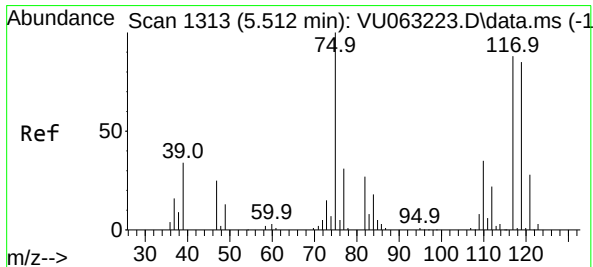
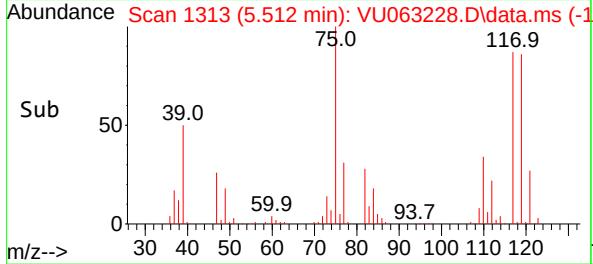
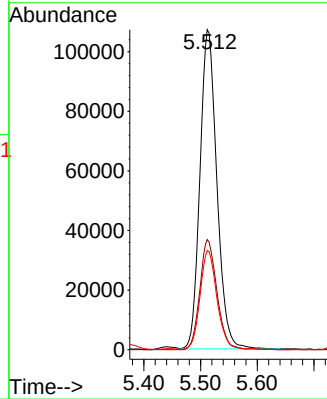
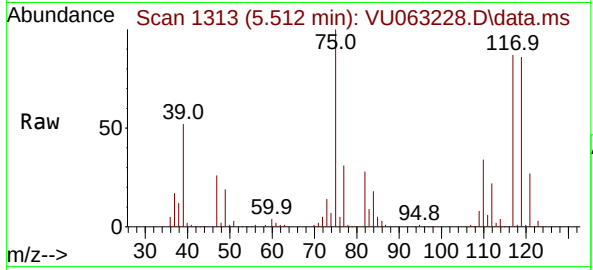
77 30.5 24.6 37.0

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#30

Carbon Tetrachloride

Concen: 9.115 ug/l

RT: 5.512 min Scan# 1313

Delta R.T. -0.000 min

Lab File: VU063228.D

Acq: 11 Feb 2025 10:01

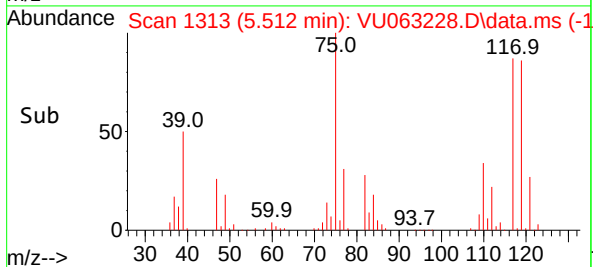
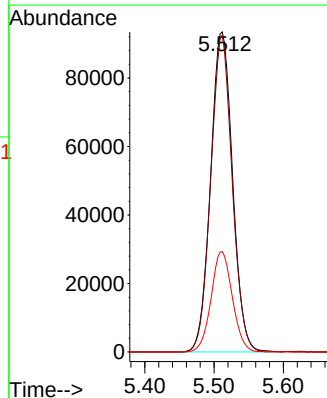
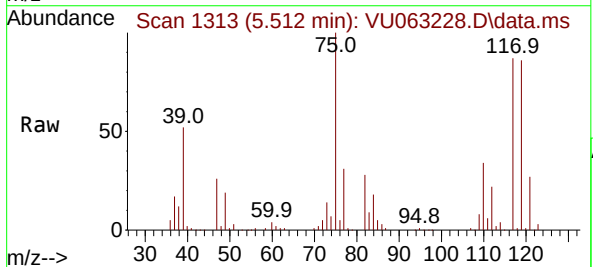
Tgt Ion:117 Resp: 205723

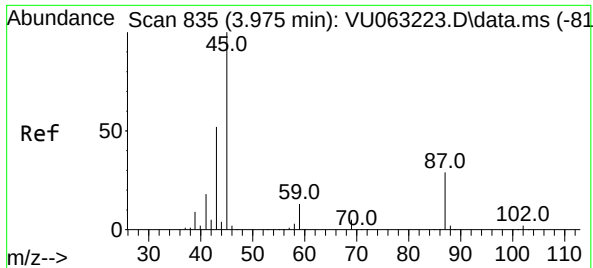
Ion Ratio Lower Upper

117 100

119 99.0 76.7 115.1

121 31.4 25.5 38.3





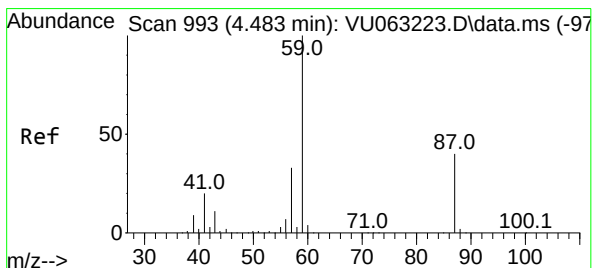
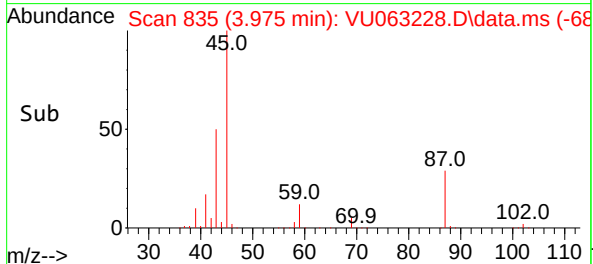
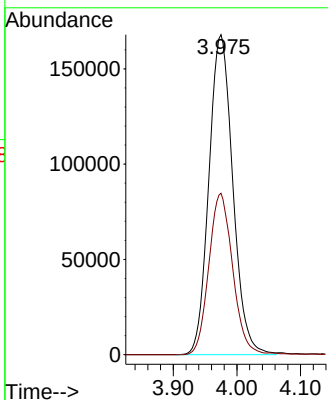
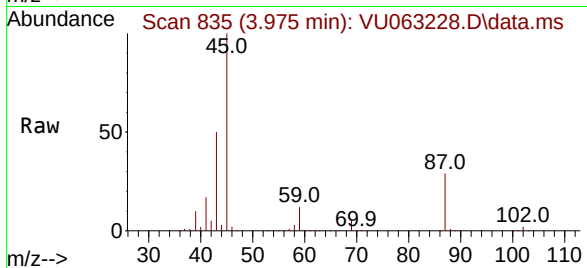
#31
Isopropyl Ether
Concen: 9.541 ug/l
RT: 3.975 min Scan# 835
Delta R.T. -0.000 min
Lab File: VU063228.D
Acq: 11 Feb 2025 10:01

Instrument :
MSVOA_U
ClientSampleId :
VSTDCCC010

Tgt Ion: 45 Resp: 438504
Ion Ratio Lower Upper
45 100
43 50.1 25.7 77.1

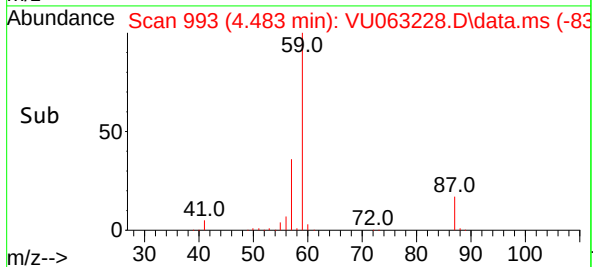
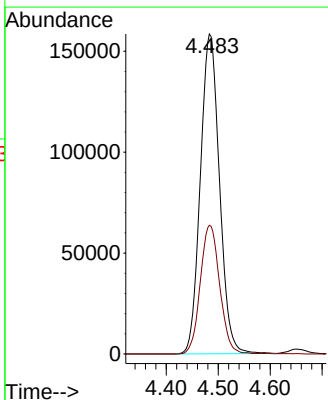
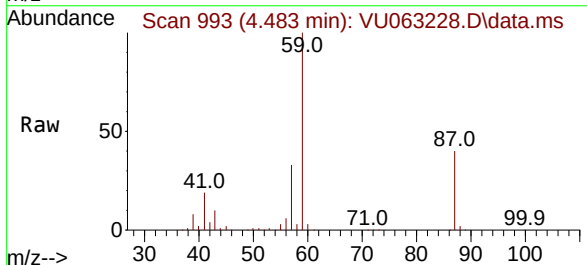
Manual Integrations
APPROVED

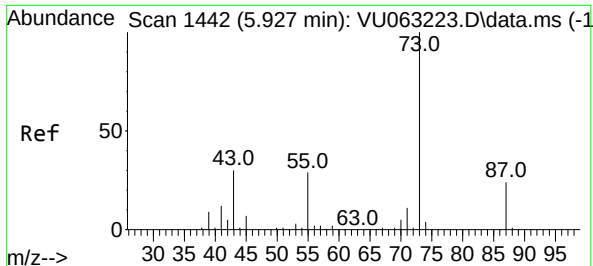
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#32
Ethyl-t-butyl ether
Concen: 9.678 ug/l
RT: 4.483 min Scan# 993
Delta R.T. -0.000 min
Lab File: VU063228.D
Acq: 11 Feb 2025 10:01

Tgt Ion: 59 Resp: 404506
Ion Ratio Lower Upper
59 100
87 40.6 32.6 49.0





#33

Tert-Amyl methyl ether

Concen: 9.728 ug/l

RT: 5.926 min Scan# 1442

Delta R.T. -0.000 min

Lab File: VU063228.D

Acq: 11 Feb 2025 10:01

Instrument :

MSVOA_U

ClientSampleId :

VSTDCCC010

Tgt Ion: 73 Resp: 35523

Ion Ratio Lower Upper

73 100

87 23.5 18.9 28.3

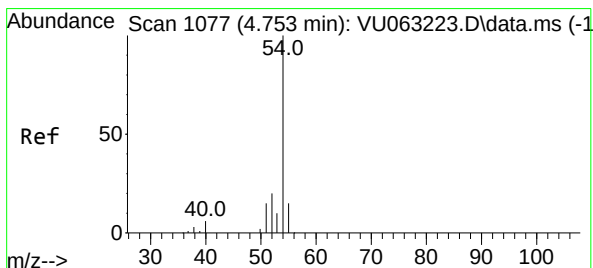
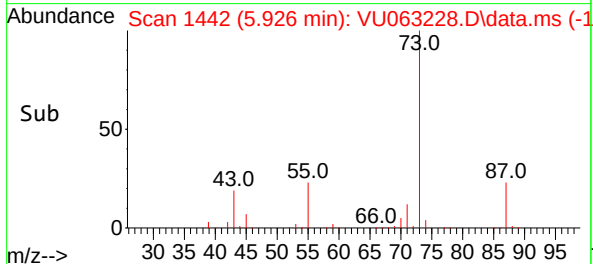
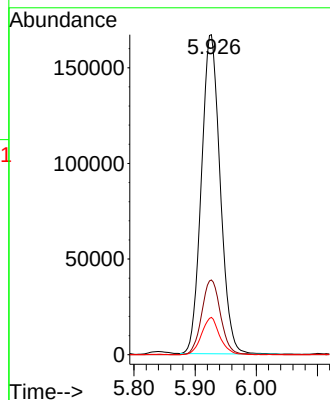
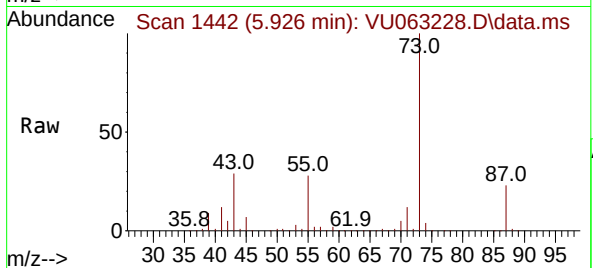
71 11.4 9.0 13.4

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#34

Propionitrile

Concen: 48.994 ug/l

RT: 4.769 min Scan# 1082

Delta R.T. 0.016 min

Lab File: VU063228.D

Acq: 11 Feb 2025 10:01

Tgt Ion: 54 Resp: 62417

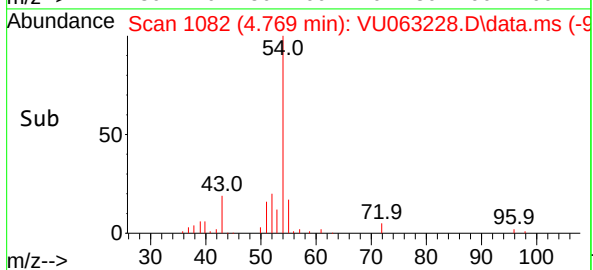
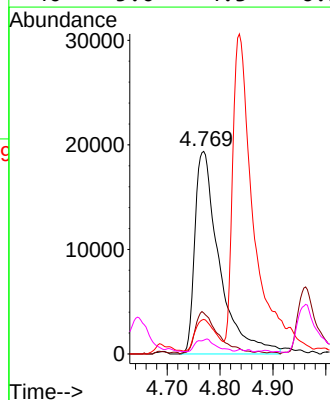
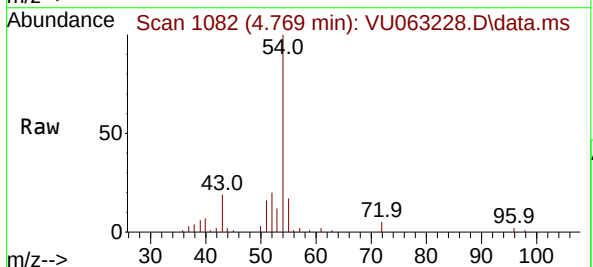
Ion Ratio Lower Upper

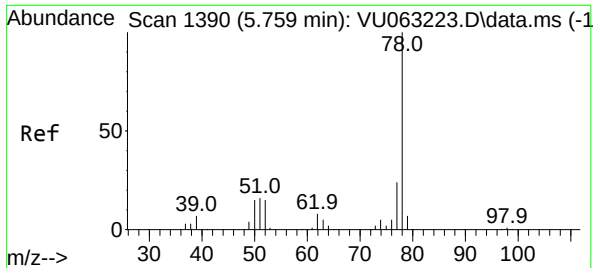
54 100

52 19.6 16.3 24.5

55 12.7 11.8 17.6

40 5.0 4.3 6.5





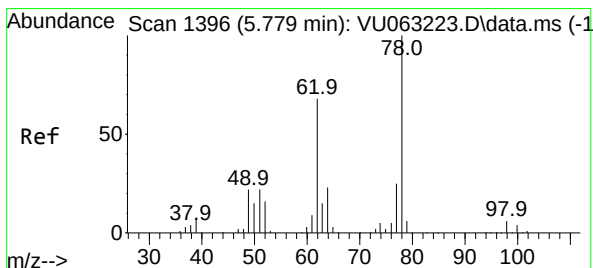
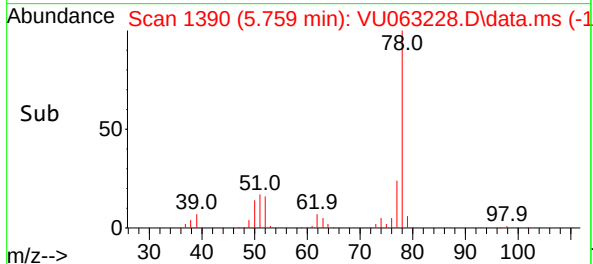
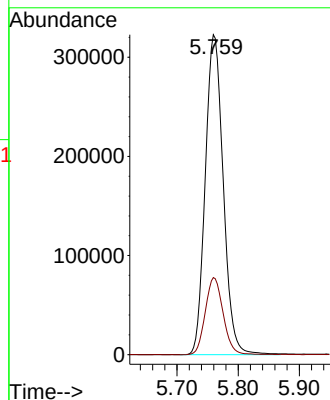
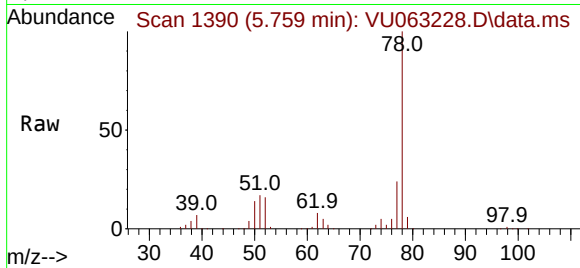
#35
Benzene
Concen: 9.098 ug/l
RT: 5.759 min Scan# 1390
Delta R.T. -0.000 min
Lab File: VU063228.D
Acq: 11 Feb 2025 10:01

Instrument :
MSVOA_U
ClientSampleId :
VSTDCCC010

Tgt Ion: 78 Resp: 659362
Ion Ratio Lower Upper
78 100
77 24.1 19.0 28.4

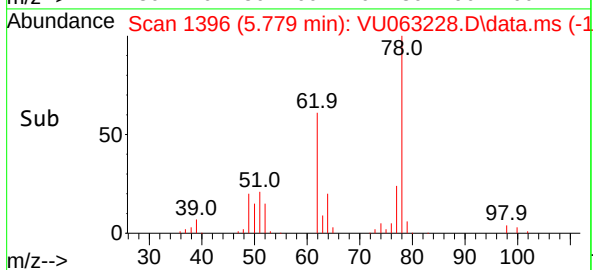
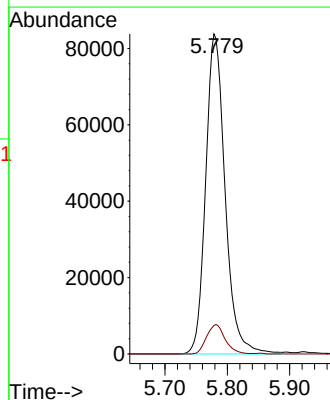
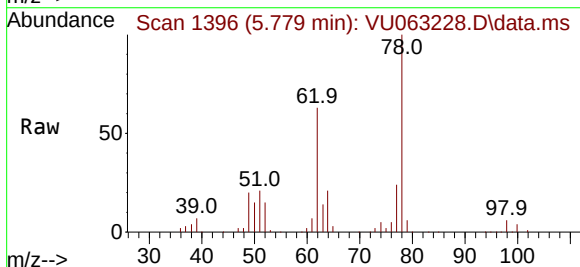
Manual Integrations
APPROVED

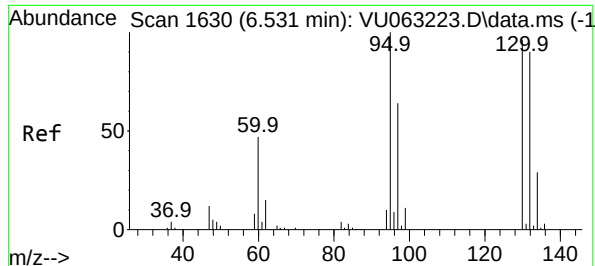
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#36
1,2-Dichloroethane
Concen: 8.666 ug/l
RT: 5.779 min Scan# 1396
Delta R.T. -0.000 min
Lab File: VU063228.D
Acq: 11 Feb 2025 10:01

Tgt Ion: 62 Resp: 181267
Ion Ratio Lower Upper
62 100
98 8.8 6.9 10.3





#37

Trichloroethene

Concen: 9.111 ug/l

RT: 6.531 min Scan# 1

Delta R.T. -0.000 min

Lab File: VU063228.D

Acq: 11 Feb 2025 10:01

Instrument :

MSVOA_U

ClientSampleId :

VSTDCCC010

Tgt Ion:130 Resp: 15703

Ion Ratio Lower Upper

130 100

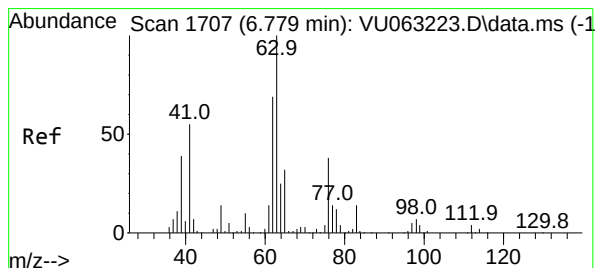
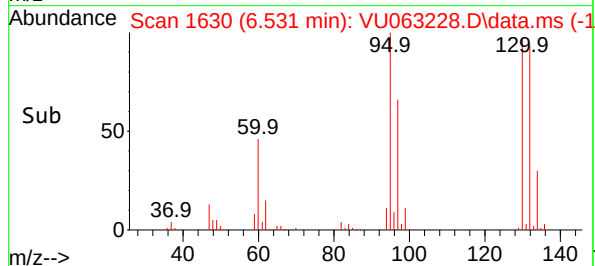
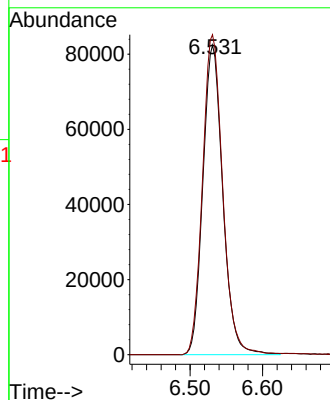
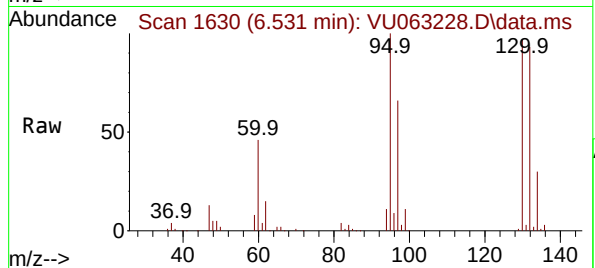
95 103.4 83.2 124.8

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#38

1,2-Dichloropropane

Concen: 9.086 ug/l

RT: 6.779 min Scan# 1707

Delta R.T. -0.000 min

Lab File: VU063228.D

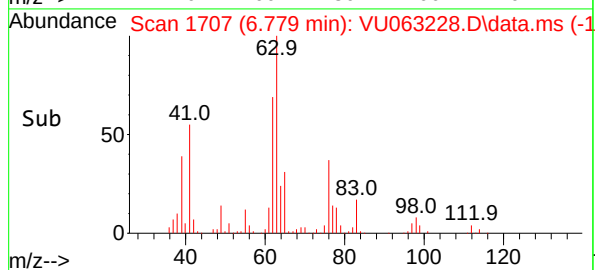
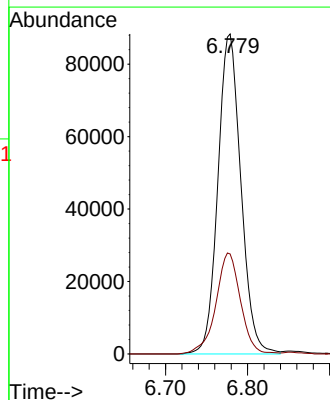
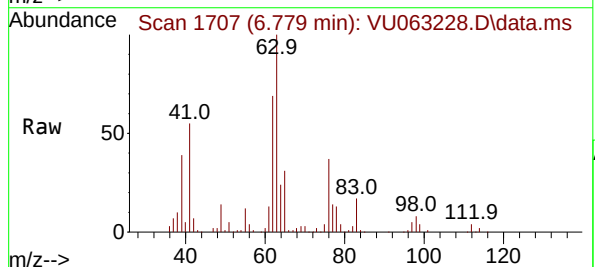
Acq: 11 Feb 2025 10:01

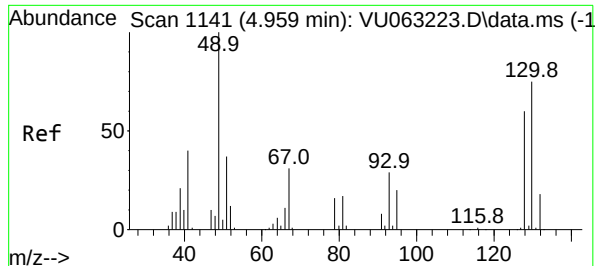
Tgt Ion: 63 Resp: 172356

Ion Ratio Lower Upper

63 100

65 31.1 25.3 37.9





#39

Methacrylonitrile

Concen: 9.847 ug/l

RT: 4.959 min Scan# 1141

Delta R.T. -0.000 min

Lab File: VU063228.D

Acq: 11 Feb 2025 10:01

Instrument :

MSVOA_U

ClientSampleId :

VSTDCCC010

Tgt Ion: 41 Resp: 4675

Ion Ratio Lower Upper

41 100

67 85.0 64.5 96.7

39 54.0 43.0 64.6

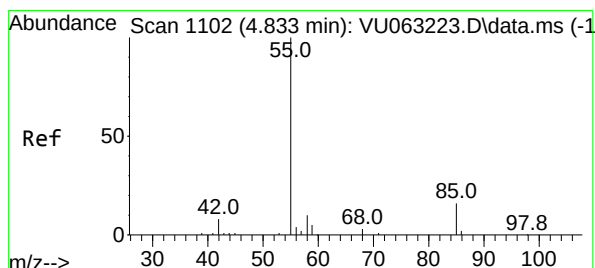
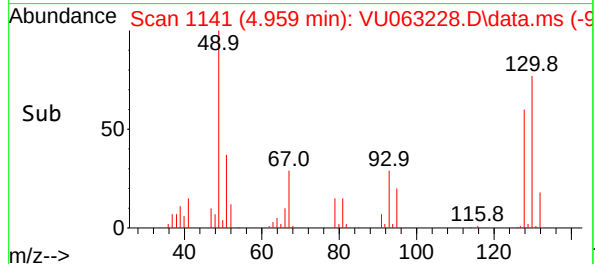
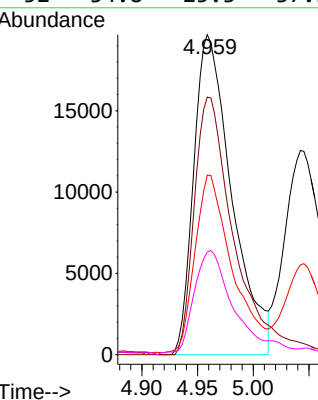
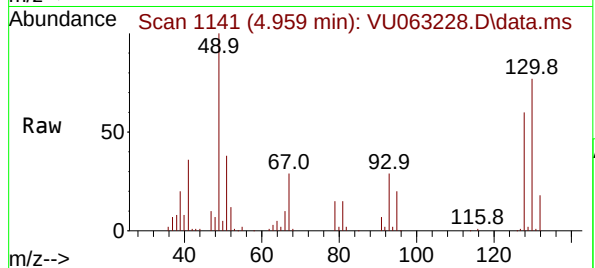
52 34.8 25.3 37.9

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#40

Methyl acrylate

Concen: 8.442 ug/l

RT: 4.837 min Scan# 1103

Delta R.T. 0.003 min

Lab File: VU063228.D

Acq: 11 Feb 2025 10:01

Tgt Ion: 55 Resp: 73871

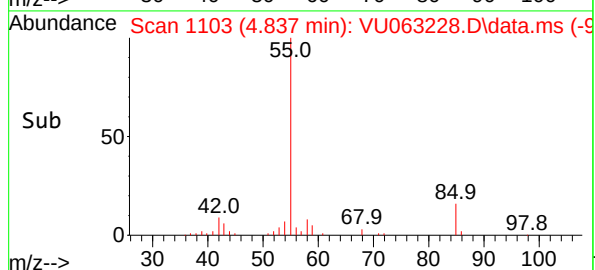
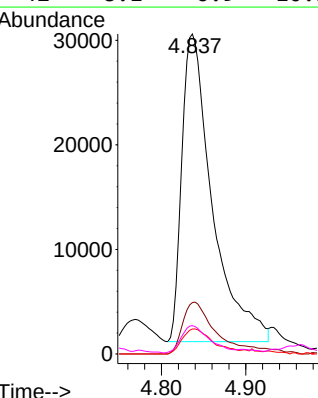
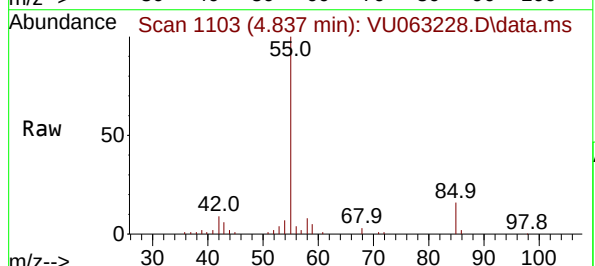
Ion Ratio Lower Upper

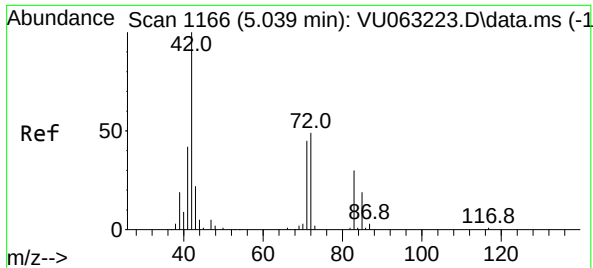
55 100

85 19.4 13.3 19.9

58 8.3 7.3 10.9

42 8.1 6.9 10.3





#41

Tetrahydrofuran

Concen: 17.753 ug/l

RT: 5.046 min Scan# 1166

Delta R.T. 0.006 min

Lab File: VU063228.D

Acq: 11 Feb 2025 10:01

Instrument :

MSVOA_U

ClientSampleId :

VSTDCCC010

Tgt Ion: 42 Resp: 49020

Ion Ratio Lower Upper

42 100

72 51.3 41.5 62.3

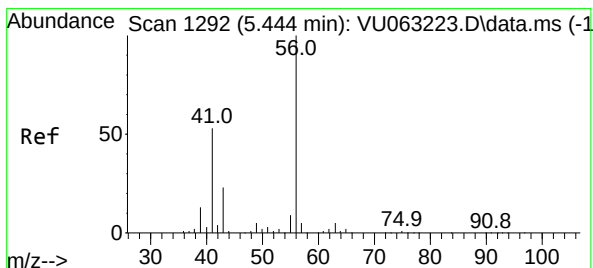
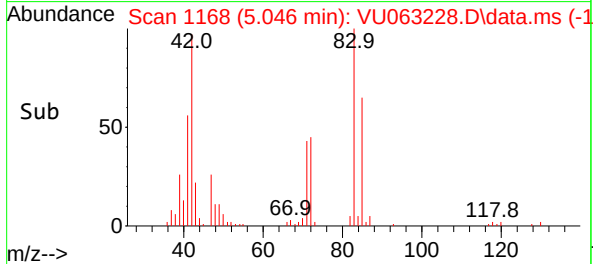
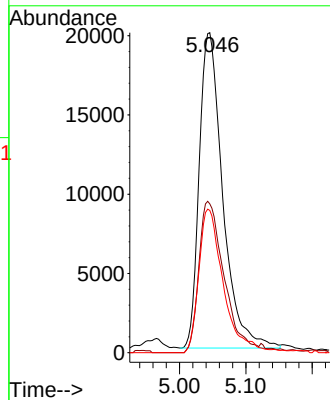
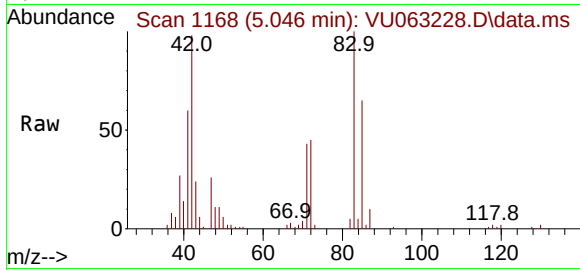
71 47.8 37.2 55.8

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#42

1-Chlorobutane

Concen: 9.582 ug/l

RT: 5.444 min Scan# 1292

Delta R.T. -0.000 min

Lab File: VU063228.D

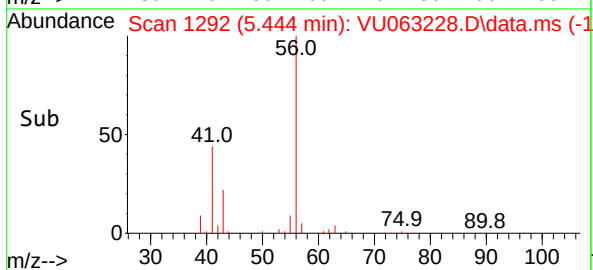
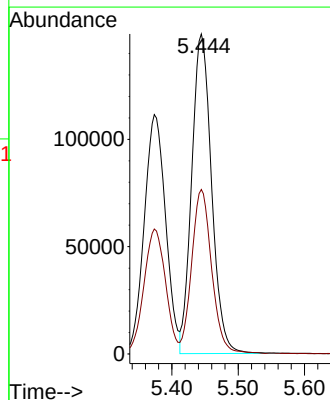
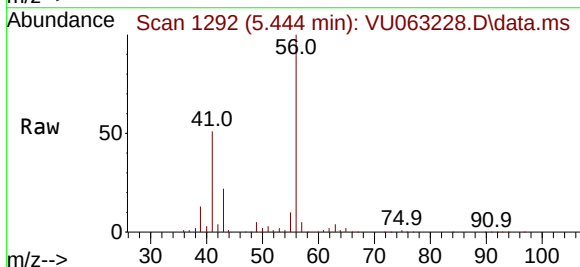
Acq: 11 Feb 2025 10:01

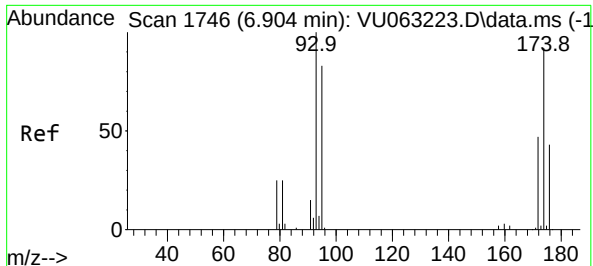
Tgt Ion: 56 Resp: 309030

Ion Ratio Lower Upper

56 100

41 51.6 26.3 78.8





#43

Dibromomethane

Concen: 8.867 ug/l

RT: 6.907 min Scan# 1746

Delta R.T. 0.003 min

Lab File: VU063228.D

Acq: 11 Feb 2025 10:01

Instrument :

MSVOA_U

ClientSampleId :

VSTDCCC010

Tgt Ion: 93 Resp: 8517

Ion Ratio Lower Upper

93 100

95 82.6 67.2 100.8

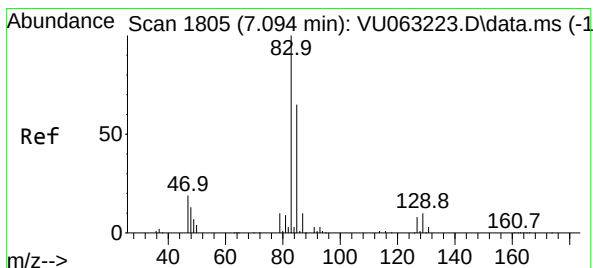
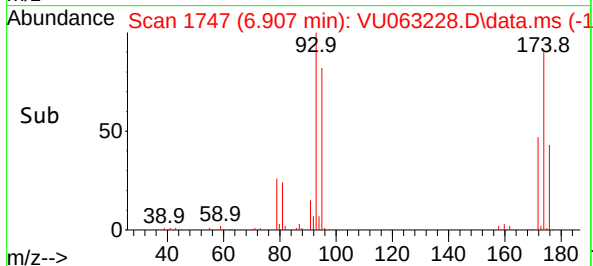
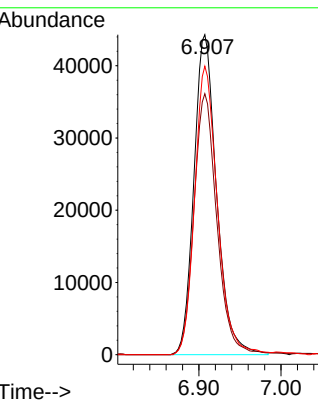
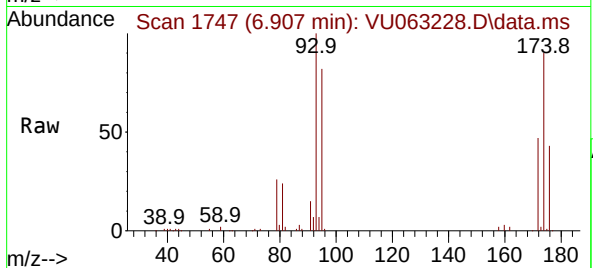
174 90.4 75.7 113.5

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#44

Bromodichloromethane

Concen: 9.138 ug/l

RT: 7.094 min Scan# 1805

Delta R.T. -0.000 min

Lab File: VU063228.D

Acq: 11 Feb 2025 10:01

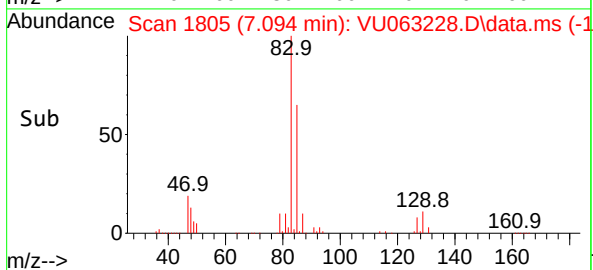
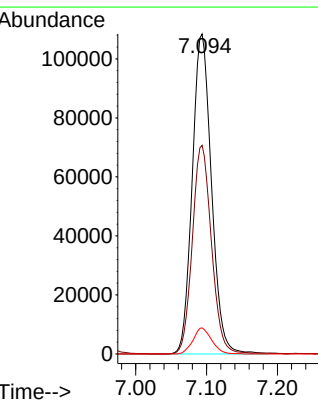
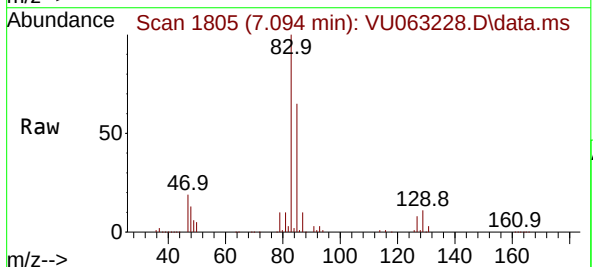
Tgt Ion: 83 Resp: 204300

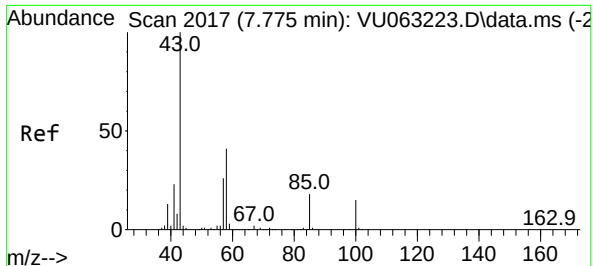
Ion Ratio Lower Upper

83 100

85 65.2 51.7 77.5

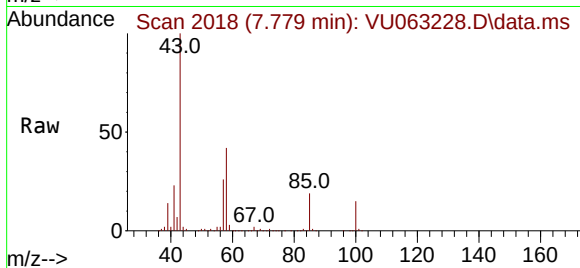
127 8.1 6.7 10.1





#45
4-Methyl-2-Pentanone
Concen: 47.438 ug/l
RT: 7.779 min Scan# 2017
Delta R.T. 0.003 min
Lab File: VU063228.D
Acq: 11 Feb 2025 10:01

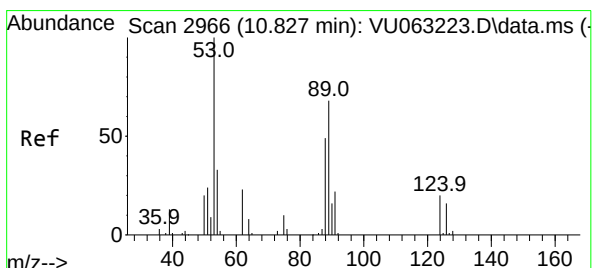
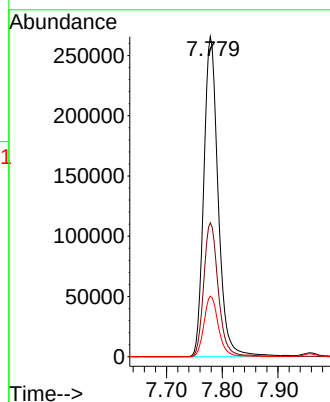
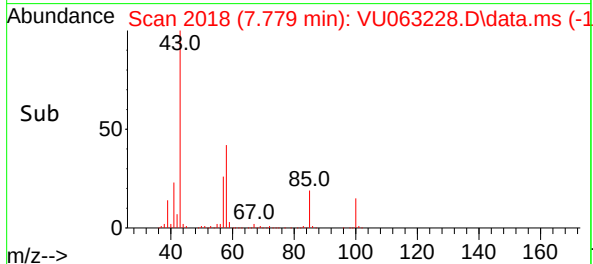
Instrument :
MSVOA_U
ClientSampleId :
VSTDCCC010



Tgt Ion: 43 Resp: 47772
Ion Ratio Lower Upper
43 100
58 41.9 20.8 62.5
85 19.0 14.8 22.2

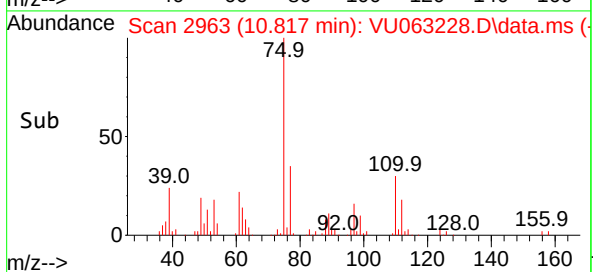
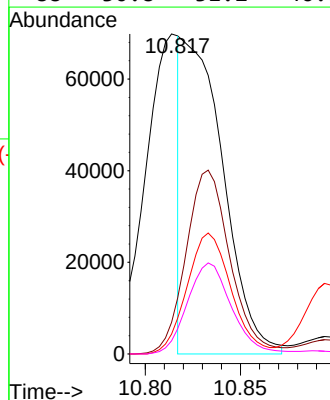
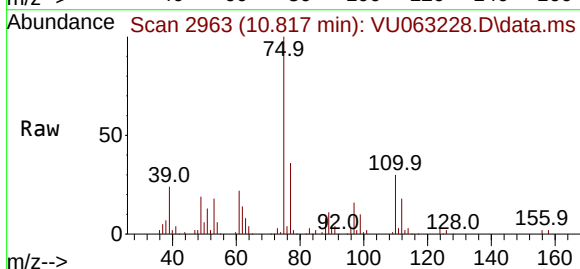
Manual Integrations
APPROVED

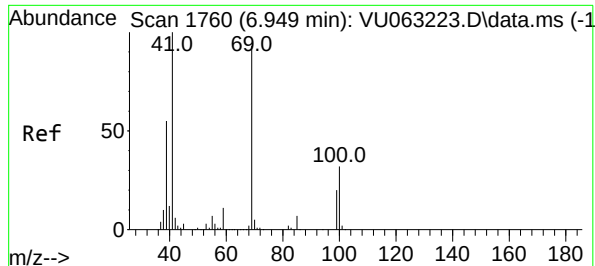
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#46
t-1,4-Dichloro-2-butene
Concen: 21.994 ug/l m
RT: 10.817 min Scan# 2963
Delta R.T. -0.010 min
Lab File: VU063228.D
Acq: 11 Feb 2025 10:01

Tgt Ion: 75 Resp: 104119
Ion Ratio Lower Upper
75 100
53 62.2 64.5 96.7#
89 40.8 43.4 65.2#
88 30.8 31.2 46.8#





#47

Methyl methacrylate

Concen: 19.623 ug/l

RT: 6.949 min Scan# 1760

Delta R.T. -0.000 min

Lab File: VU063228.D

Acq: 11 Feb 2025 10:01

Instrument :

MSVOA_U

ClientSampleId :

VSTDCCC010

Tgt Ion: 69 Resp: 15876

Ion Ratio Lower Upper

69 100

41 107.9 0.0 217.0

39 59.9 47.7 71.5

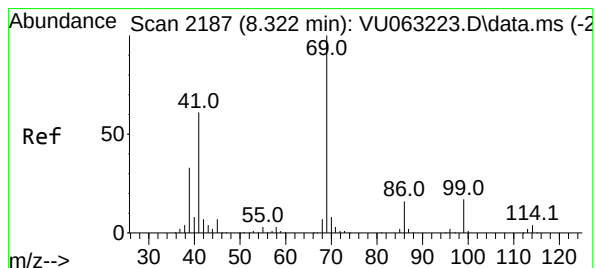
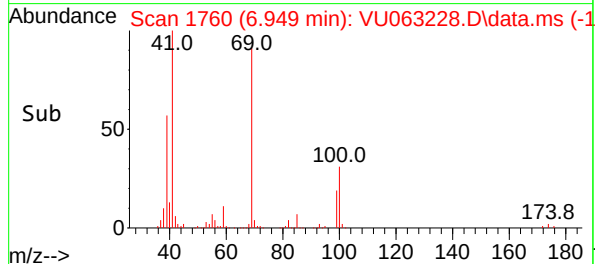
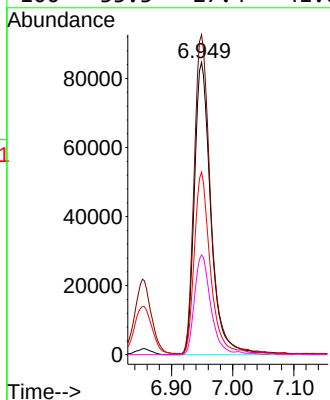
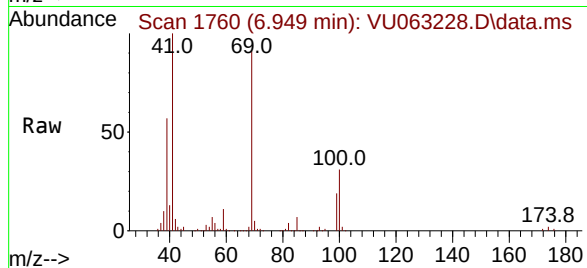
100 33.3 27.4 41.0

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#48

Ethyl methacrylate

Concen: 10.321 ug/l

RT: 8.322 min Scan# 2187

Delta R.T. -0.000 min

Lab File: VU063228.D

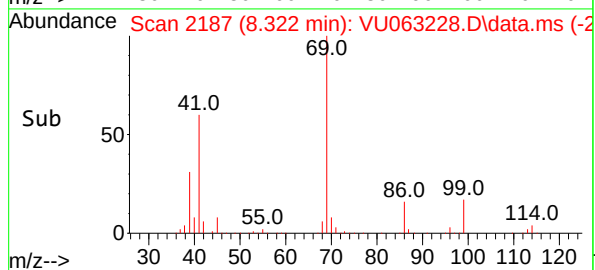
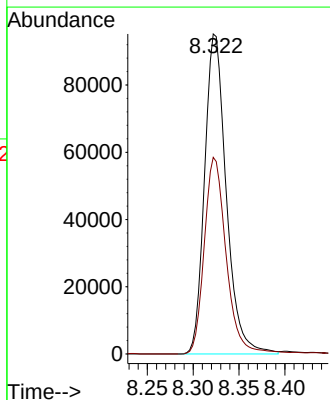
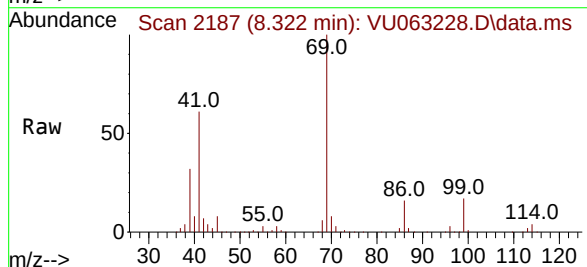
Acq: 11 Feb 2025 10:01

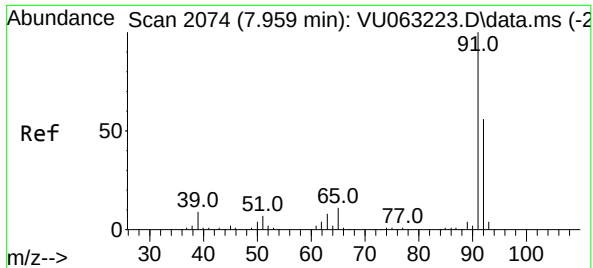
Tgt Ion: 69 Resp: 156800

Ion Ratio Lower Upper

69 100

41 62.0 30.6 92.0





#49

Toluene

Concen: 9.675 ug/l

RT: 7.959 min Scan# 2074

Delta R.T. -0.000 min

Lab File: VU063228.D

Acq: 11 Feb 2025 10:01

Instrument :

MSVOA_U

ClientSampleId :

VSTDCCC010

Tgt Ion: 92 Resp: 403234

Ion Ratio Lower Upper

92 100

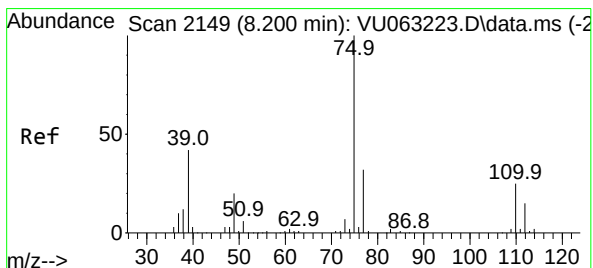
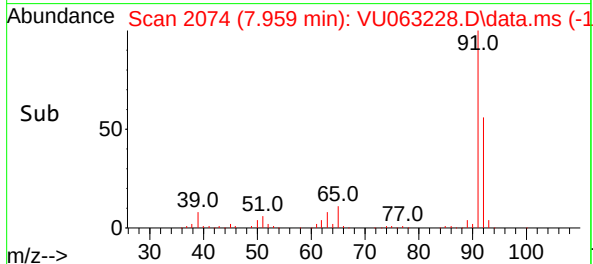
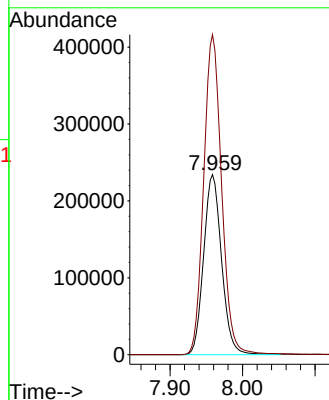
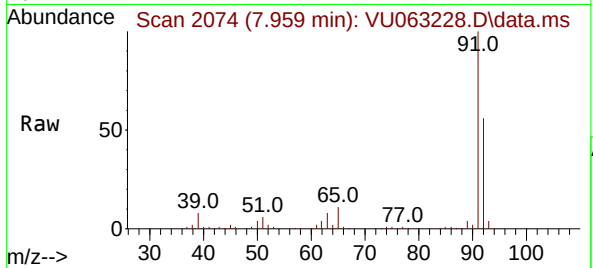
91 177.8 141.8 212.6

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#50

t-1,3-Dichloropropene

Concen: 9.811 ug/l

RT: 8.200 min Scan# 2149

Delta R.T. -0.000 min

Lab File: VU063228.D

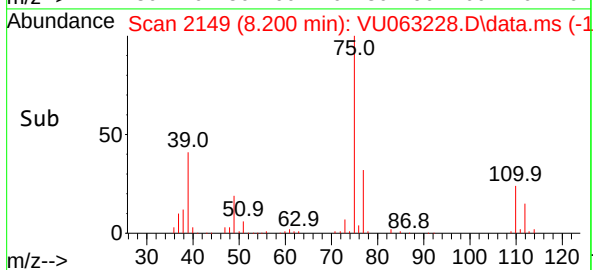
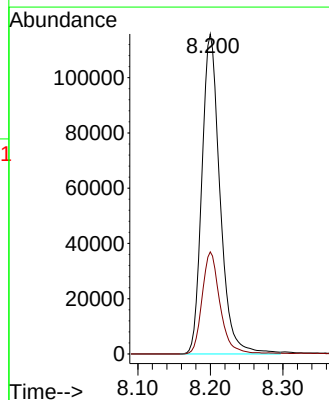
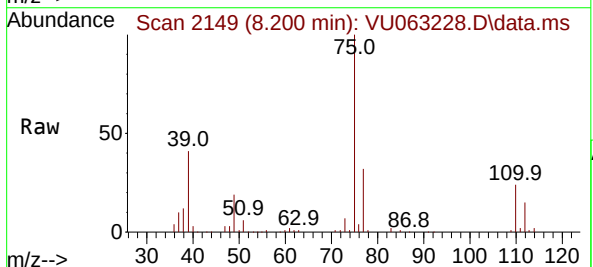
Acq: 11 Feb 2025 10:01

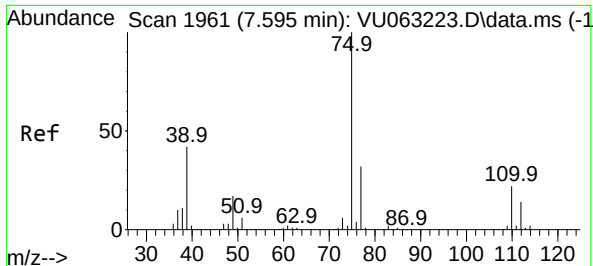
Tgt Ion: 75 Resp: 200824

Ion Ratio Lower Upper

75 100

77 31.9 25.9 38.9





#51

cis-1,3-Dichloropropene

Concen: 9.338 ug/l

RT: 7.595 min Scan# 1961

Delta R.T. -0.000 min

Lab File: VU063228.D

Acq: 11 Feb 2025 10:01

Instrument :

MSVOA_U

ClientSampleId :

VSTDCCC010

Tgt Ion: 75 Resp: 236098

Ion Ratio Lower Upper

75 100

77 32.1 25.3 37.9

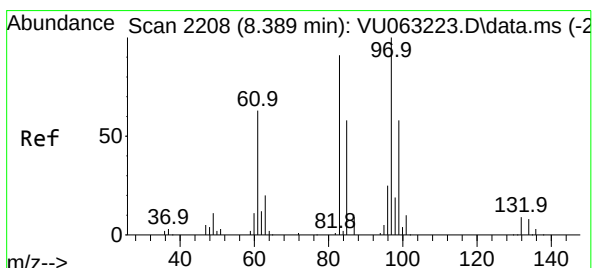
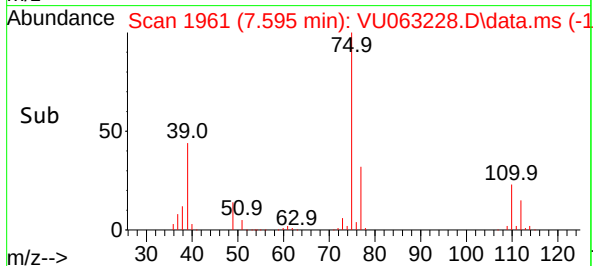
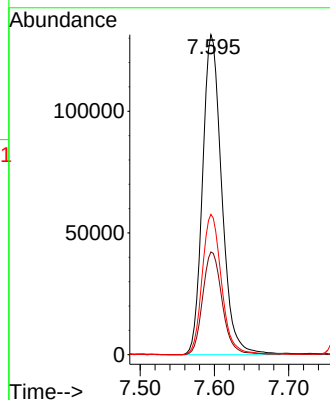
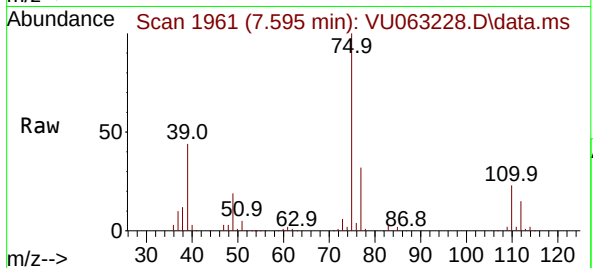
39 43.8 33.5 50.3

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#52

1,1,2-Trichloroethane

Concen: 9.154 ug/l

RT: 8.389 min Scan# 2208

Delta R.T. -0.000 min

Lab File: VU063228.D

Acq: 11 Feb 2025 10:01

Tgt Ion: 97 Resp: 118560

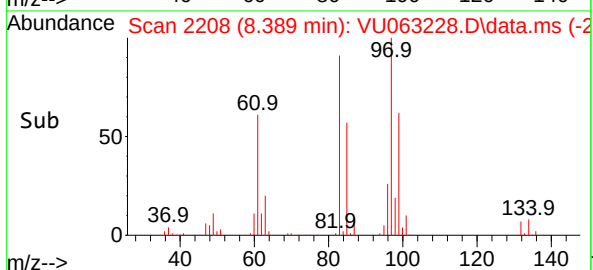
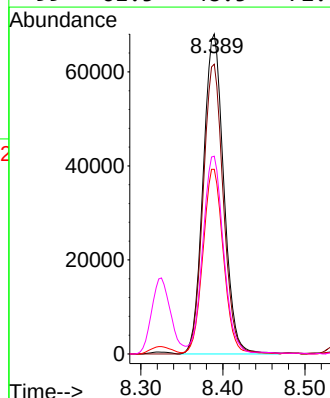
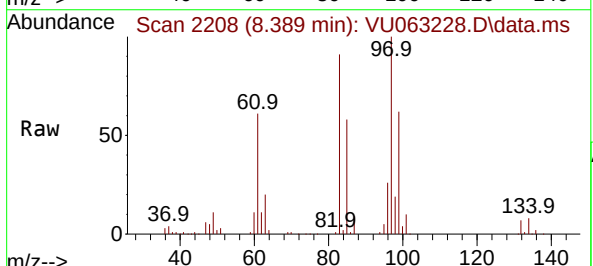
Ion Ratio Lower Upper

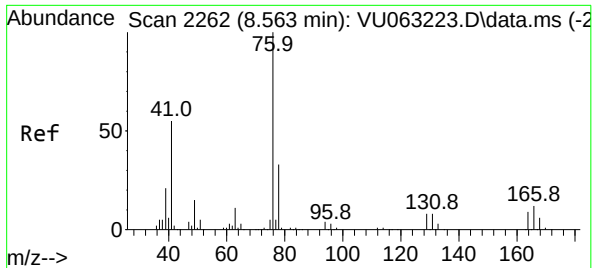
97 100

83 90.5 73.0 109.4

85 57.7 46.3 69.5

99 61.5 48.5 72.7





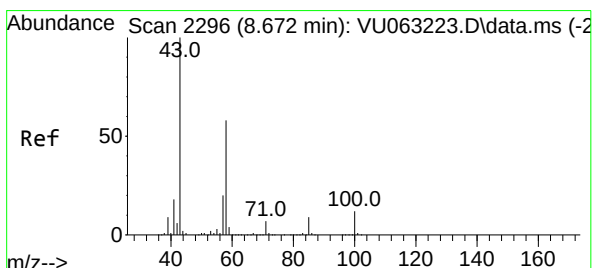
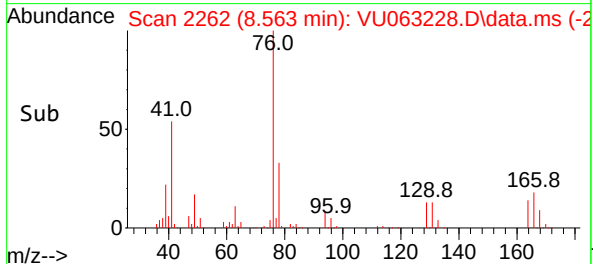
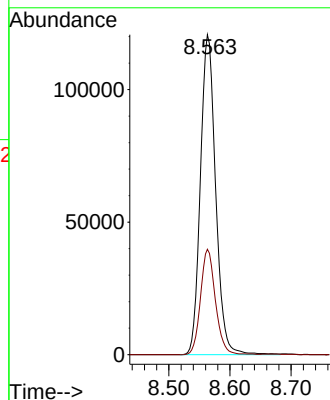
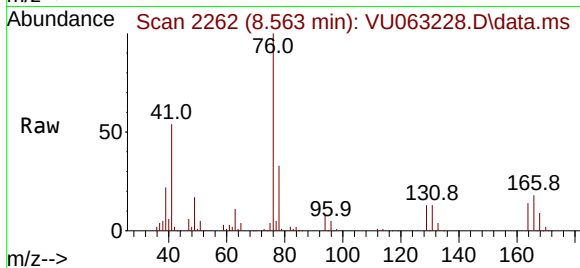
#53
1,3-Dichloropropane
Concen: 9.097 ug/l
RT: 8.563 min Scan# 2262
Delta R.T. -0.000 min
Lab File: VU063228.D
Acq: 11 Feb 2025 10:01

Instrument :
MSVOA_U
ClientSampleId :
VSTDCCC010

Tgt Ion: 76 Resp: 20917
Ion Ratio Lower Upper
76 100
78 32.3 26.3 39.5

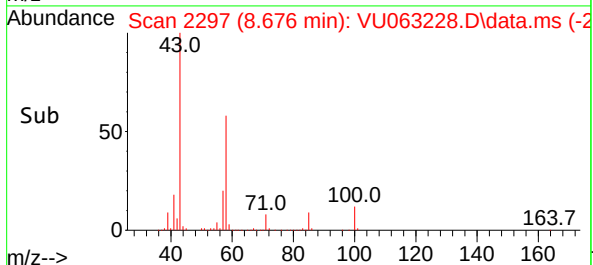
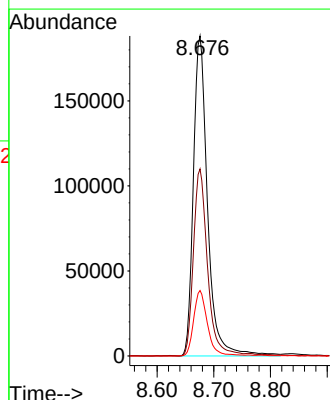
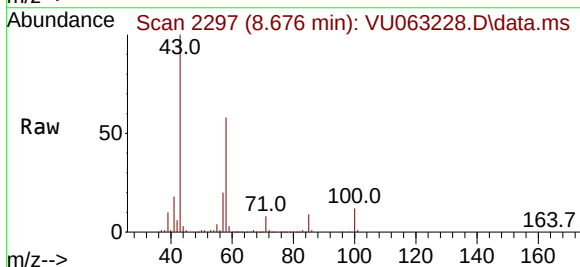
Manual Integrations
APPROVED

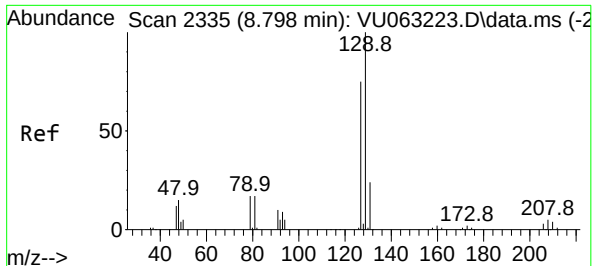
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#54
2-Hexanone
Concen: 47.697 ug/l
RT: 8.676 min Scan# 2297
Delta R.T. 0.003 min
Lab File: VU063228.D
Acq: 11 Feb 2025 10:01

Tgt Ion: 43 Resp: 327783
Ion Ratio Lower Upper
43 100
58 57.7 38.0 78.0
57 19.8 0.0 39.1





#55

Dibromochloromethane

Concen: 9.169 ug/l

RT: 8.798 min Scan# 2335

Delta R.T. -0.000 min

Lab File: VU063228.D

Acq: 11 Feb 2025 10:01

Instrument :

MSVOA_U

ClientSampleId :

VSTDCCC010

Tgt Ion:129 Resp: 136618

Ion Ratio Lower Upper

129 100

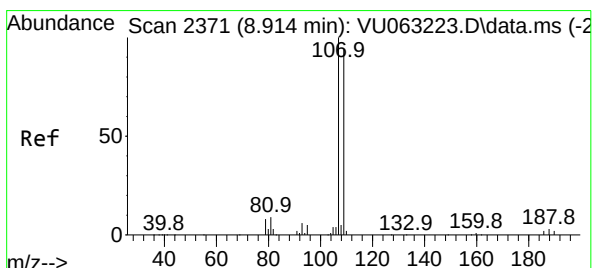
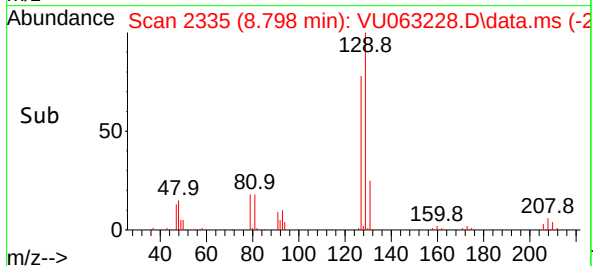
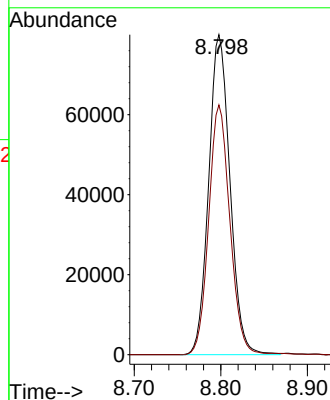
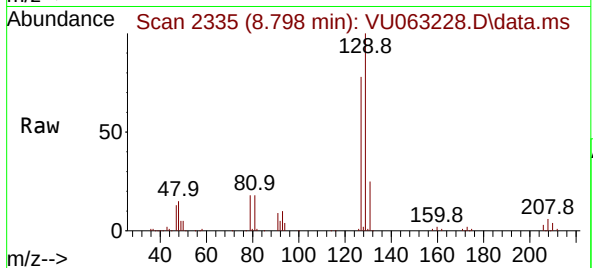
127 77.3 60.4 90.6

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#56

1,2-Dibromoethane

Concen: 9.223 ug/l

RT: 8.914 min Scan# 2371

Delta R.T. -0.000 min

Lab File: VU063228.D

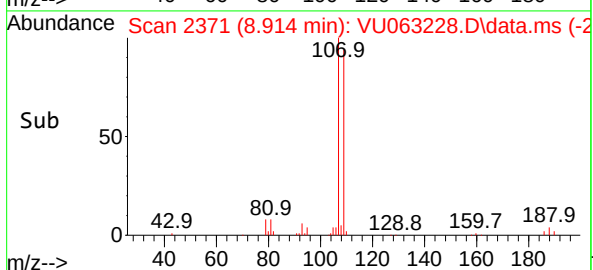
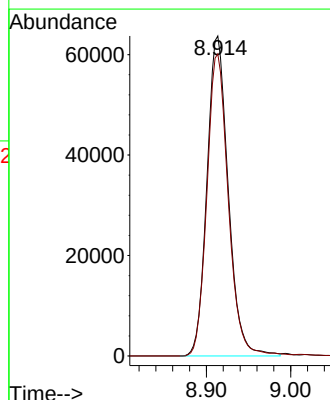
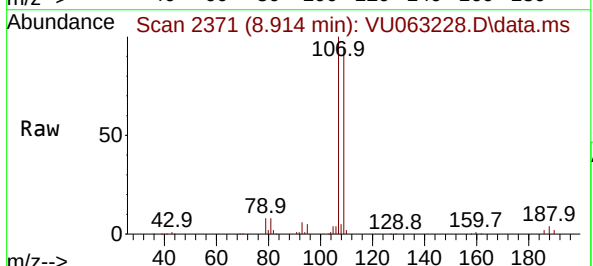
Acq: 11 Feb 2025 10:01

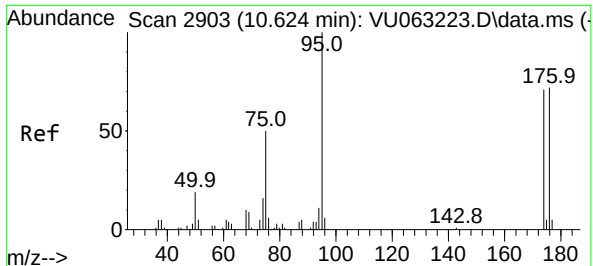
Tgt Ion:107 Resp: 112027

Ion Ratio Lower Upper

107 100

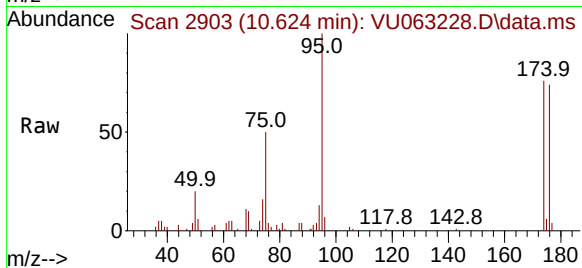
109 94.8 0.0 187.8





#57
4-Bromofluorobenzene
Concen: 1.070 ug/l
RT: 10.624 min Scan# 2903
Delta R.T. -0.000 min
Lab File: VU063228.D
Acq: 11 Feb 2025 10:01

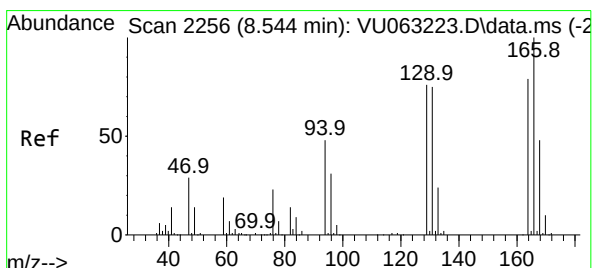
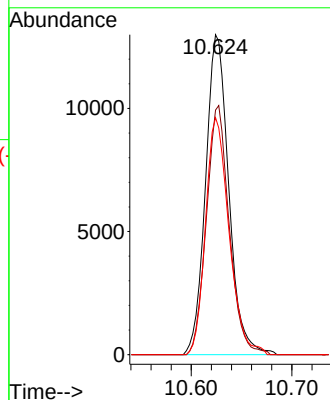
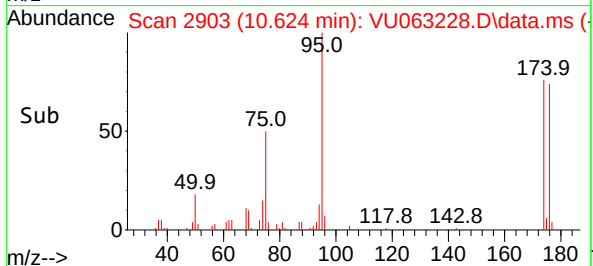
Instrument :
MSVOA_U
ClientSampleId :
VSTDCCC010



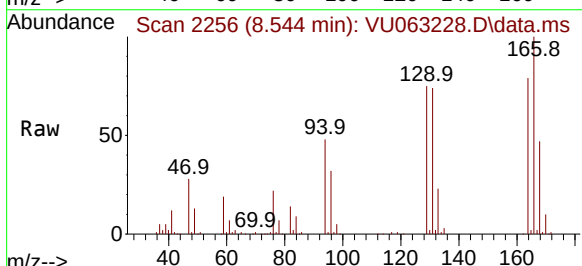
Tgt Ion: 95 Resp: 2081
Ion Ratio Lower Upper
95 100
174 76.7 58.6 88.0
176 75.1 58.2 87.4

Manual Integrations
APPROVED

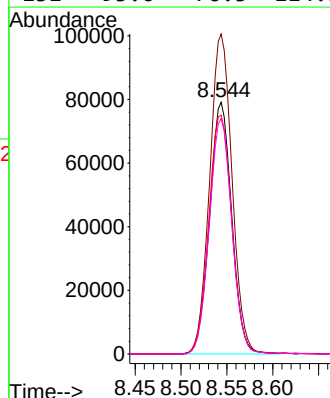
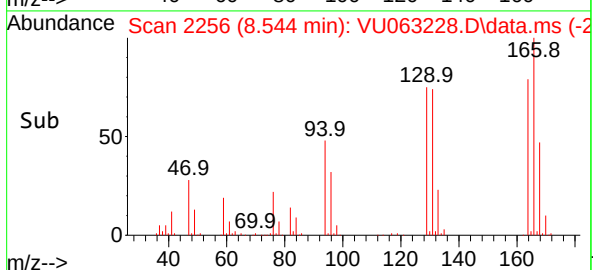
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025

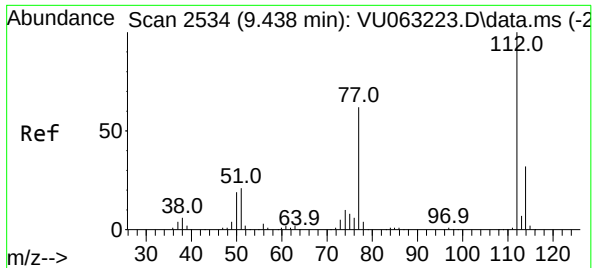


#58
Tetrachloroethene
Concen: 9.361 ug/l
RT: 8.544 min Scan# 2256
Delta R.T. -0.000 min
Lab File: VU063228.D
Acq: 11 Feb 2025 10:01



Tgt Ion:164 Resp: 132957
Ion Ratio Lower Upper
164 100
166 127.2 101.4 152.0
129 94.9 77.0 115.4
131 93.6 76.3 114.5





#59

Chlorobenzene

Concen: 9.514 ug/l

RT: 9.438 min Scan# 2534

Delta R.T. -0.000 min

Lab File: VU063228.D

Acq: 11 Feb 2025 10:01

Instrument :

MSVOA_U

ClientSampleId :

VSTDCCC010

Tgt Ion:112 Resp: 41843

Ion Ratio Lower Upper

112 100

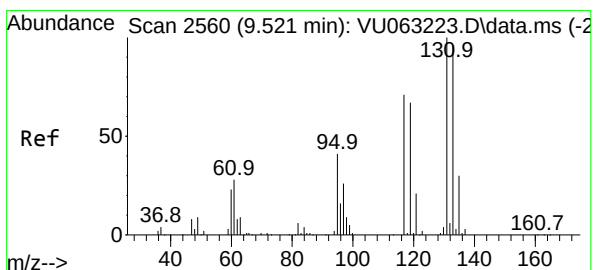
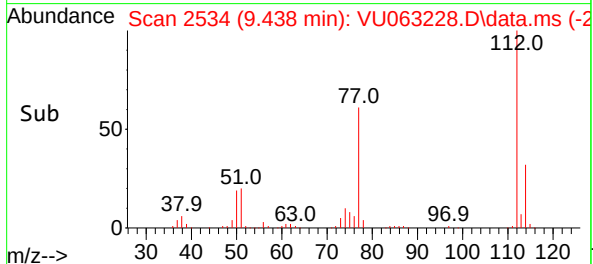
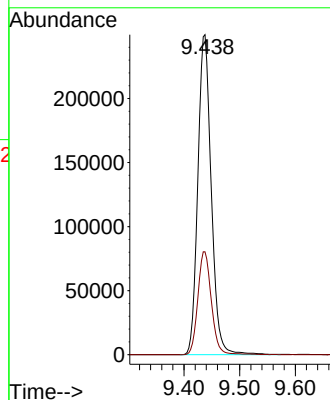
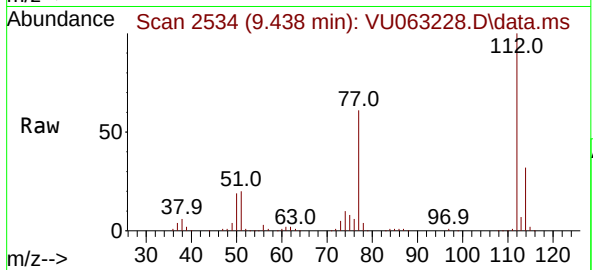
114 32.2 25.7 38.5

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#60

1,1,1,2-Tetrachloroethane

Concen: 9.206 ug/l

RT: 9.521 min Scan# 2560

Delta R.T. -0.000 min

Lab File: VU063228.D

Acq: 11 Feb 2025 10:01

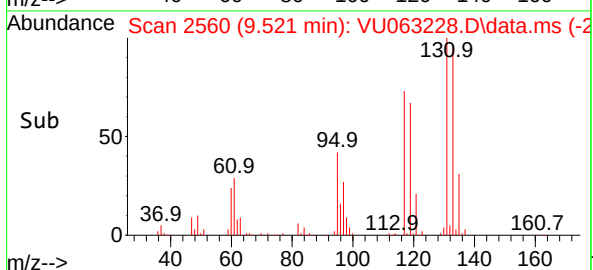
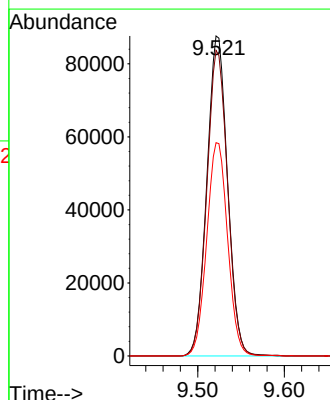
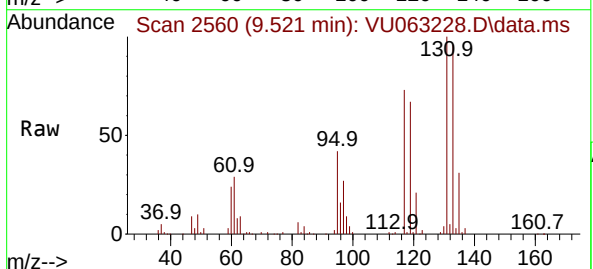
Tgt Ion:131 Resp: 145537

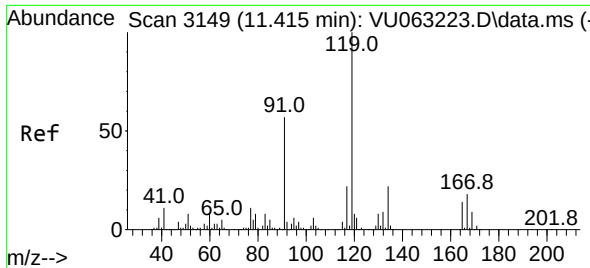
Ion Ratio Lower Upper

131 100

133 95.9 76.7 115.1

119 67.2 54.4 81.6





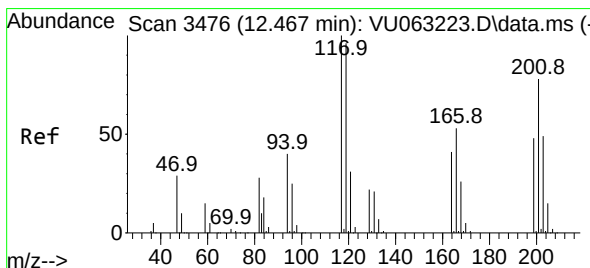
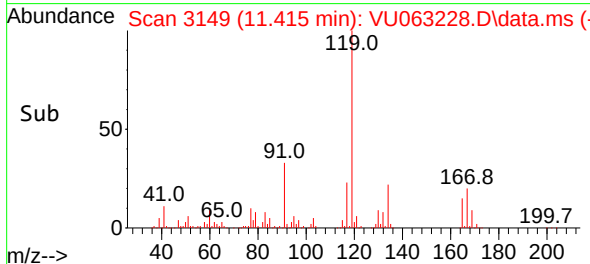
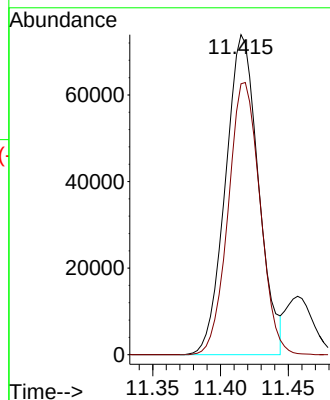
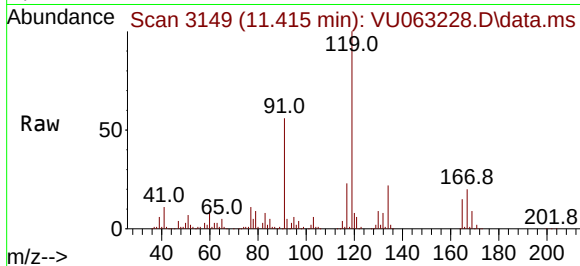
#61
Pentachloroethane
Concen: 8.865 ug/l
RT: 11.415 min Scan# 3149
Delta R.T. -0.000 min
Lab File: VU063228.D
Acq: 11 Feb 2025 10:01

Instrument :
MSVOA_U
ClientSampleId :
VSTDCCC010

Tgt Ion:117 Resp: 12520
Ion Ratio Lower Upper
117 100
167 82.0 65.0 97.6

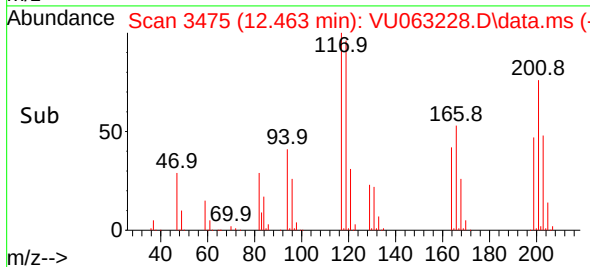
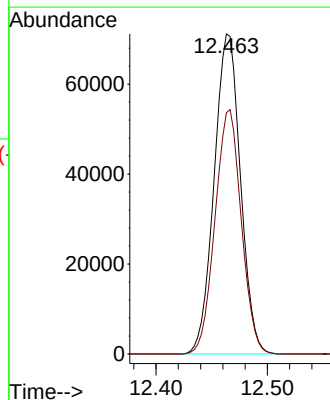
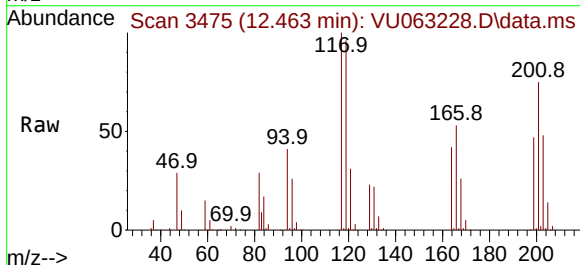
Manual Integrations
APPROVED

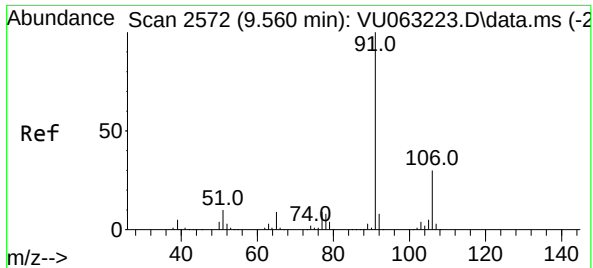
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#62
Hexachloroethane
Concen: 9.352 ug/l
RT: 12.463 min Scan# 3475
Delta R.T. -0.003 min
Lab File: VU063228.D
Acq: 11 Feb 2025 10:01

Tgt Ion:117 Resp: 116848
Ion Ratio Lower Upper
117 100
201 76.1 61.3 91.9





#63

Ethyl Benzene

Concen: 10.017 ug/l

RT: 9.560 min Scan# 2572

Delta R.T. -0.000 min

Lab File: VU063228.D

Acq: 11 Feb 2025 10:01

Instrument :

MSVOA_U

ClientSampleId :

VSTDCCC010

Tgt Ion: 91 Resp: 759839

Ion Ratio Lower Upper

91 100

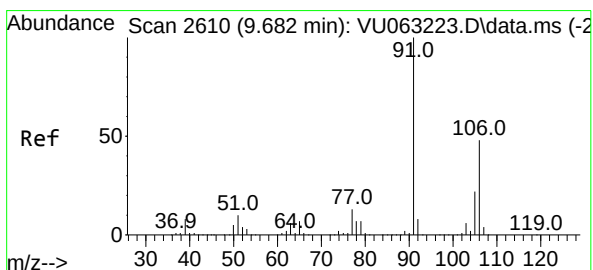
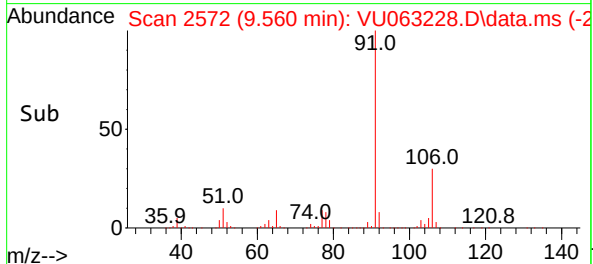
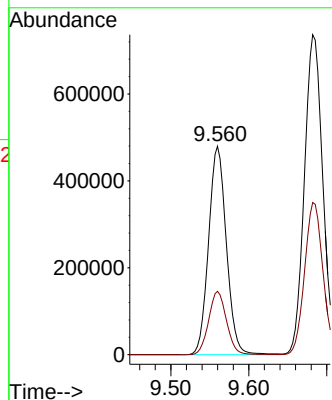
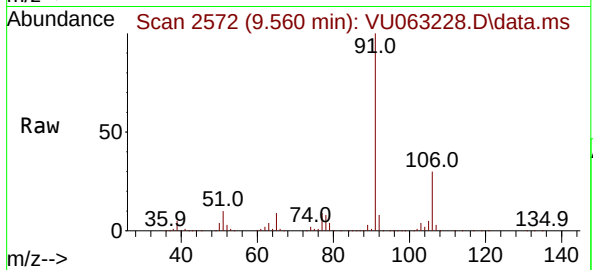
106 30.4 24.2 36.2

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#64

m/p-Xylenes

Concen: 20.468 ug/l

RT: 9.682 min Scan# 2610

Delta R.T. -0.000 min

Lab File: VU063228.D

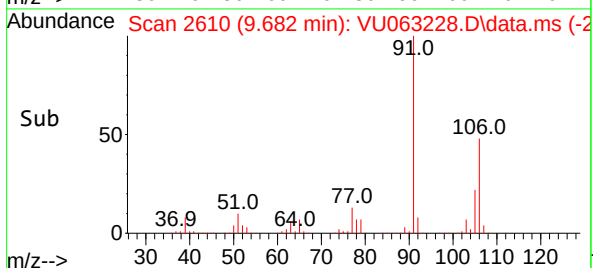
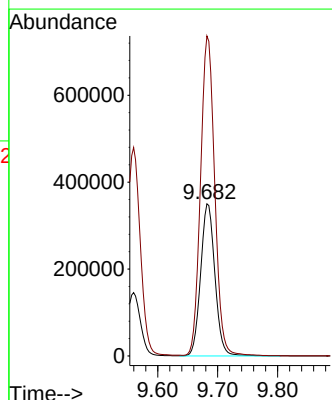
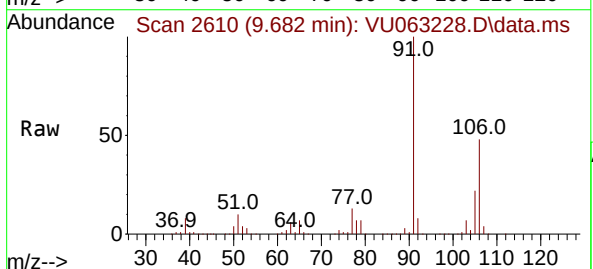
Acq: 11 Feb 2025 10:01

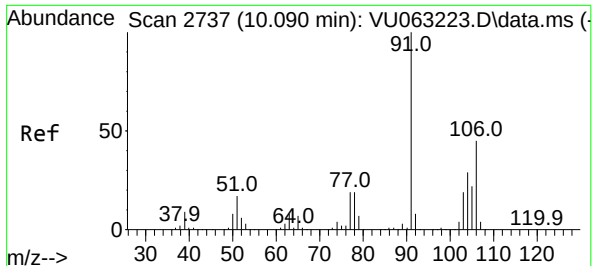
Tgt Ion:106 Resp: 579956

Ion Ratio Lower Upper

106 100

91 210.0 166.9 250.3





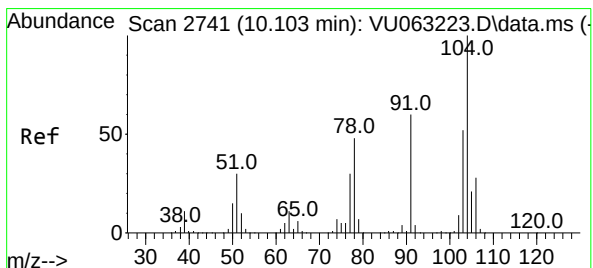
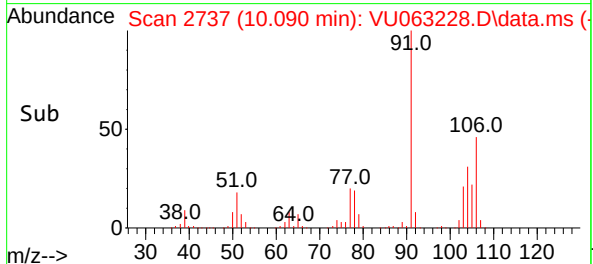
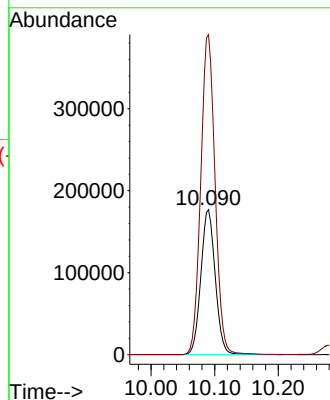
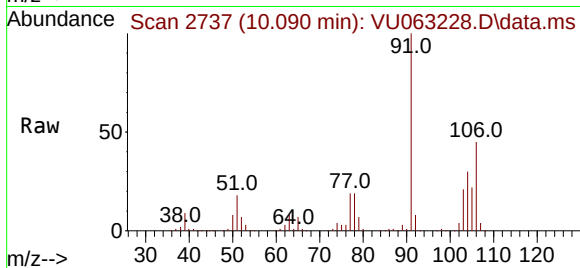
#65
o-Xylene
Concen: 10.007 ug/l
RT: 10.090 min Scan# 2737
Delta R.T. -0.000 min
Lab File: VU063228.D
Acq: 11 Feb 2025 10:01

Instrument :
MSVOA_U
ClientSampleId :
VSTDCCC010

Tgt Ion:106 Resp: 277570
Ion Ratio Lower Upper
106 100
91 220.3 110.9 332.9

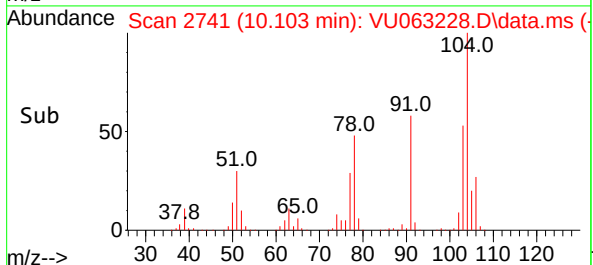
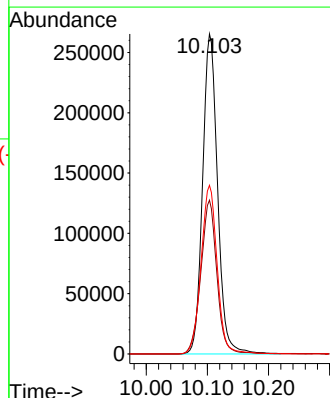
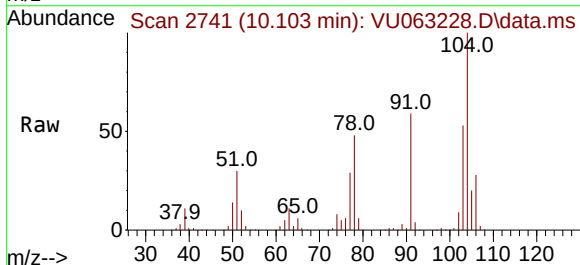
Manual Integrations
APPROVED

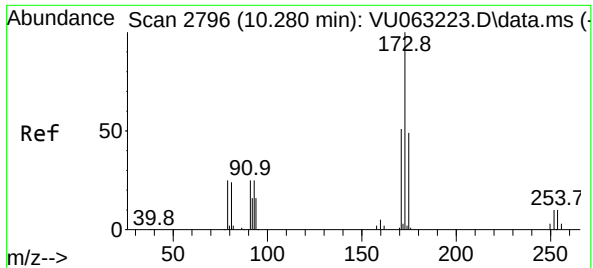
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#66
Styrene
Concen: 10.231 ug/l
RT: 10.103 min Scan# 2741
Delta R.T. -0.000 min
Lab File: VU063228.D
Acq: 11 Feb 2025 10:01

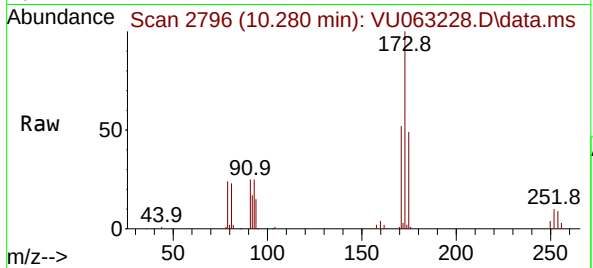
Tgt Ion:104 Resp: 451617
Ion Ratio Lower Upper
104 100
78 51.5 41.2 61.8
103 56.7 44.8 67.2





#67
Bromoform
Concen: 9.096 ug/l
RT: 10.280 min Scan# 2796
Delta R.T. -0.000 min
Lab File: VU063228.D
Acq: 11 Feb 2025 10:01

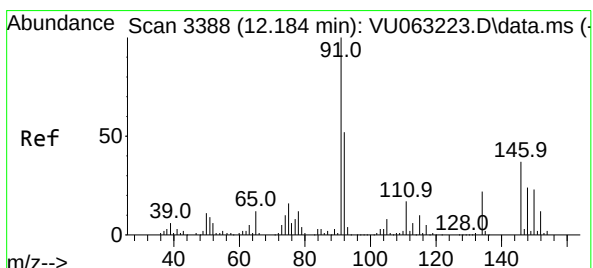
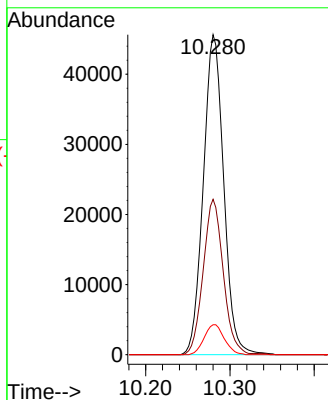
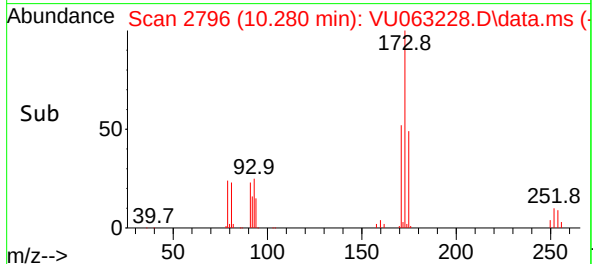
Instrument :
MSVOA_U
ClientSampleId :
VSTDCCC010



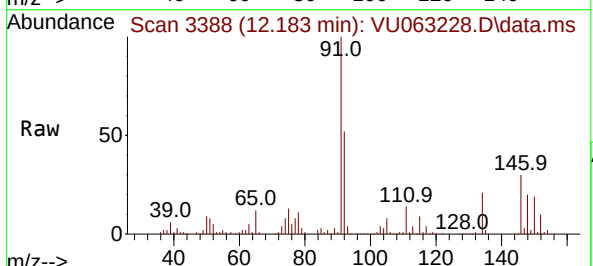
Tgt Ion:173 Resp: 76919
Ion Ratio Lower Upper
173 100
175 47.8 39.0 58.4
254 9.3 7.7 11.5

Manual Integrations
APPROVED

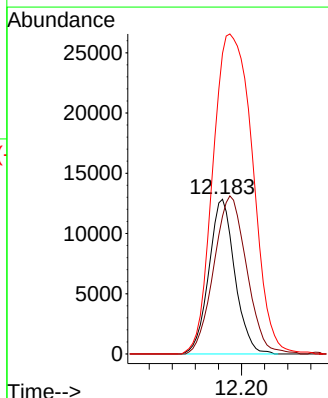
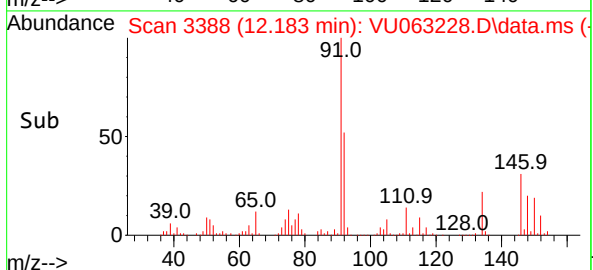
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025

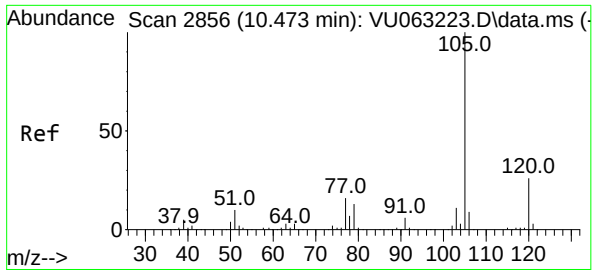


#68
1,2-Dichlorobenzene-d4
Concen: 0.990 ug/l
RT: 12.183 min Scan# 3388
Delta R.T. -0.000 min
Lab File: VU063228.D
Acq: 11 Feb 2025 10:01



Tgt Ion:152 Resp: 20041
Ion Ratio Lower Upper
152 100
115 129.1 0.0 275.2
150 316.0 0.0 658.4





#69

Isopropylbenzene

Concen: 10.176 ug/l

RT: 10.473 min Scan# 2856

Delta R.T. -0.000 min

Lab File: VU063228.D

Acq: 11 Feb 2025 10:01

Instrument :

MSVOA_U

ClientSampleId :

VSTDCCC010

Tgt Ion:105 Resp: 663578

Ion Ratio Lower Upper

105 100

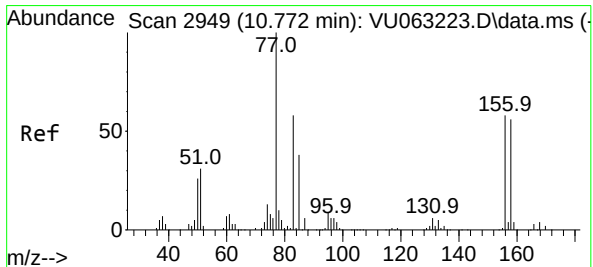
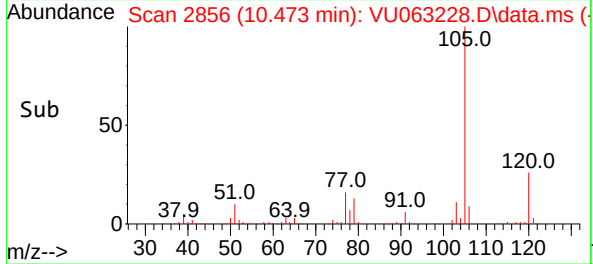
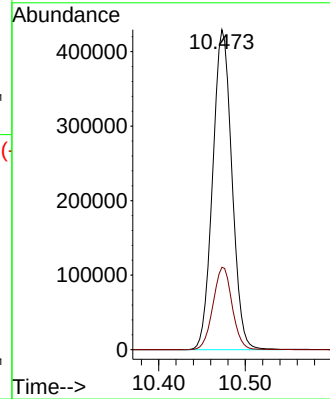
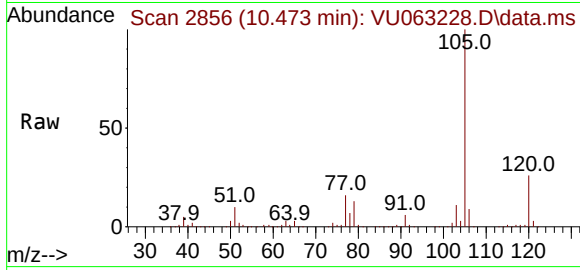
120 25.6 12.8 38.4

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#70

1,1,2,2-Tetrachloroethane

Concen: 8.820 ug/l

RT: 10.772 min Scan# 2949

Delta R.T. -0.000 min

Lab File: VU063228.D

Acq: 11 Feb 2025 10:01

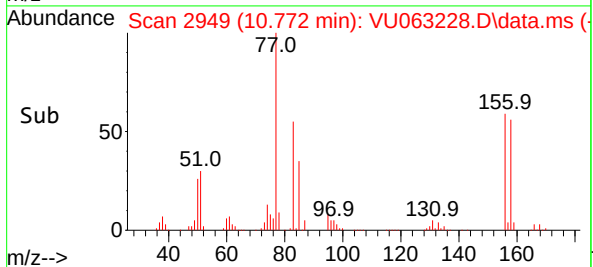
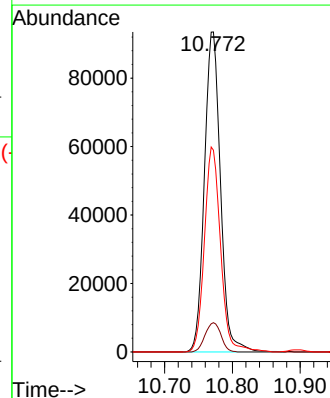
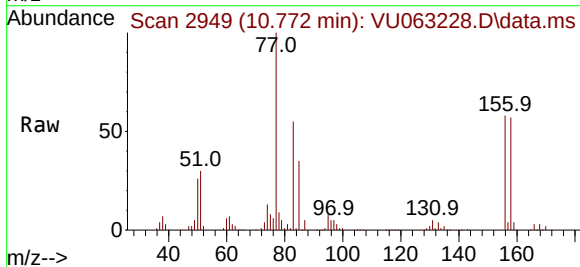
Tgt Ion: 83 Resp: 153961

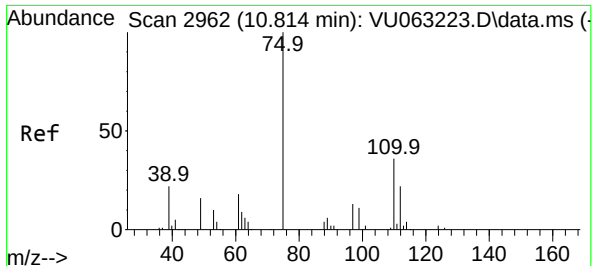
Ion Ratio Lower Upper

83 100

131 9.0 7.4 11.0

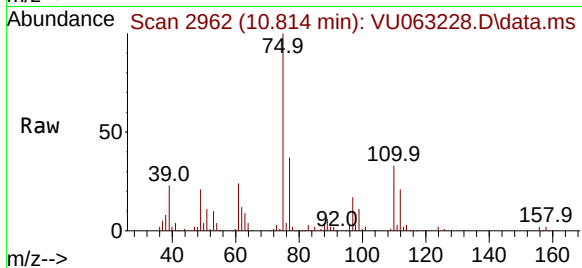
85 64.3 51.8 77.8





#71
1,2,3-Trichloropropane
Concen: 9.485 ug/l m
RT: 10.814 min Scan# 2962
Delta R.T. -0.000 min
Lab File: VU063228.D
Acq: 11 Feb 2025 10:01

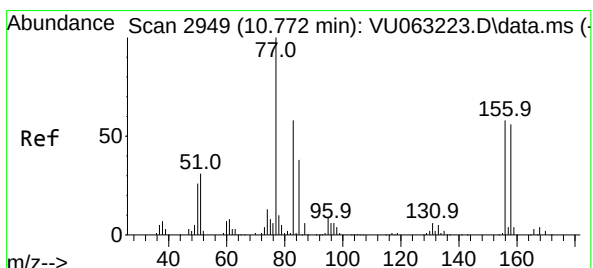
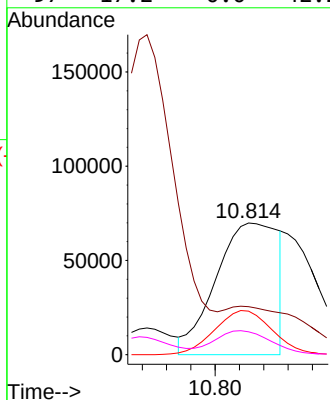
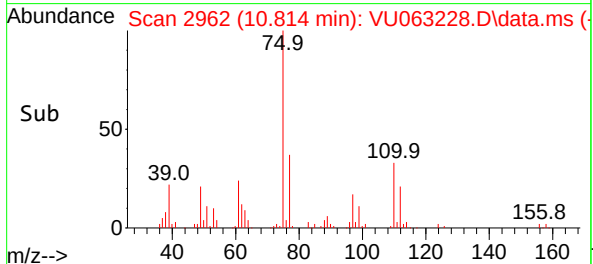
Instrument :
MSVOA_U
ClientSampleId :
VSTDCCC010



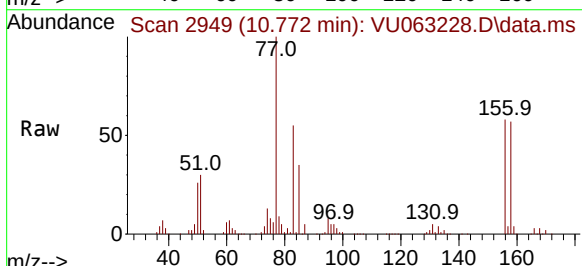
Tgt Ion: 75 Resp: 124385
Ion Ratio Lower Upper
75 100
77 0.0 0.0 0.0
110 31.2 0.0 77.0
97 17.2 0.0 42.2

Manual Integrations
APPROVED

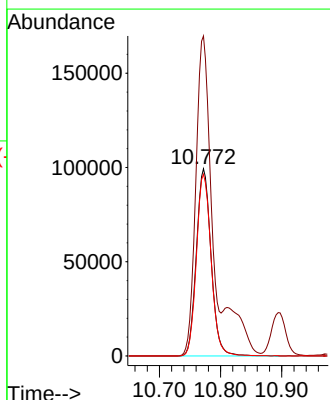
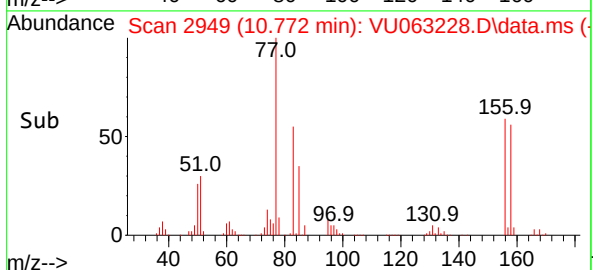
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025

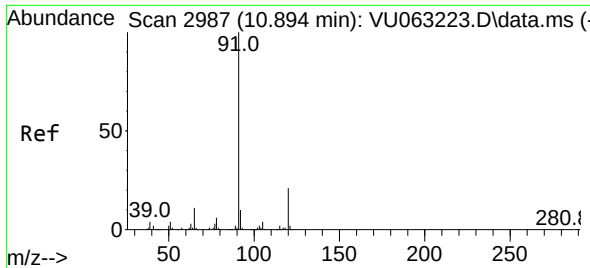


#72
Bromobenzene
Concen: 9.459 ug/l
RT: 10.772 min Scan# 2949
Delta R.T. -0.000 min
Lab File: VU063228.D
Acq: 11 Feb 2025 10:01



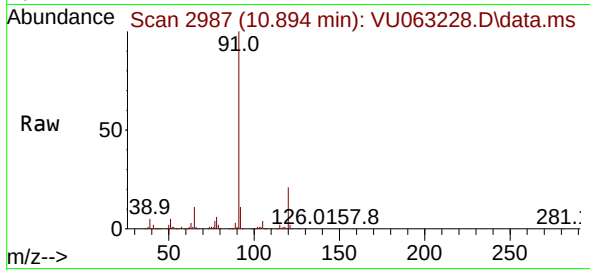
Tgt Ion:156 Resp: 166186
Ion Ratio Lower Upper
156 100
77 171.7 0.0 343.6
158 97.1 0.0 193.0





#73
n-propylbenzene
Concen: 10.396 ug/l
RT: 10.894 min Scan# 2987
Delta R.T. -0.000 min
Lab File: VU063228.D
Acq: 11 Feb 2025 10:01

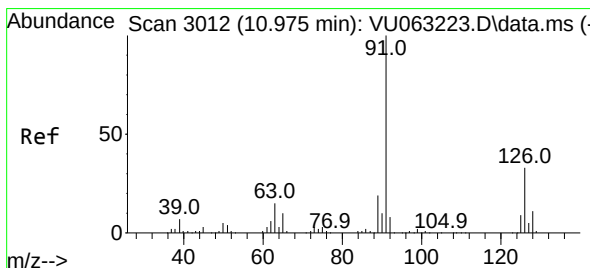
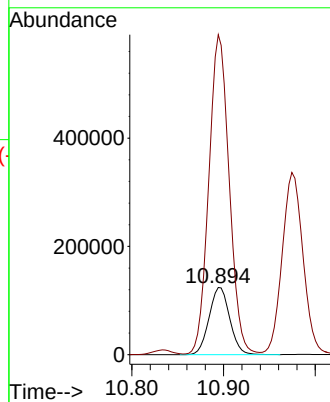
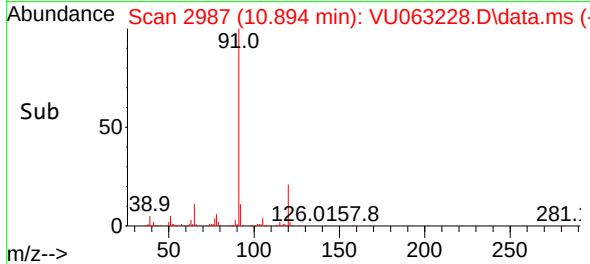
Instrument :
MSVOA_U
ClientSampleId :
VSTDCCC010



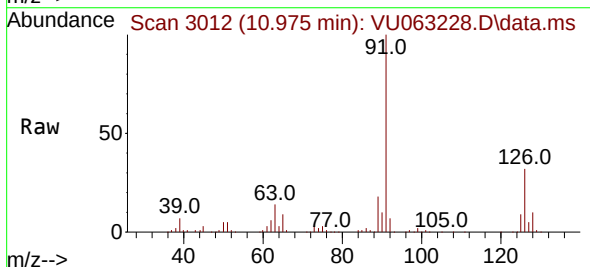
Tgt Ion:120 Resp: 194100
Ion Ratio Lower Upper
120 100
91 467.7 369.8 554.6

Manual Integrations
APPROVED

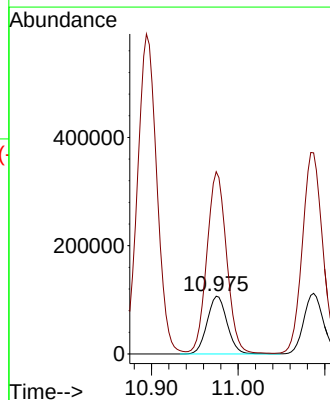
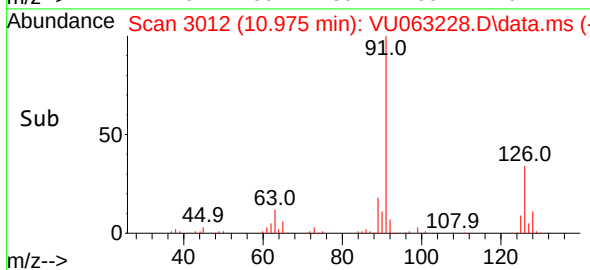
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025

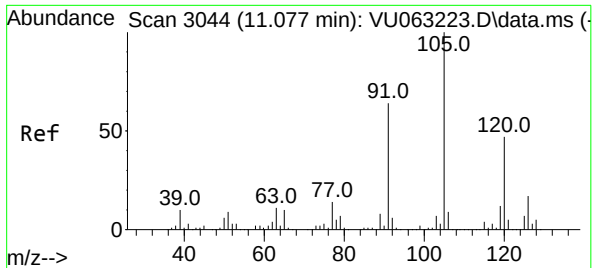


#74
2-Chlorotoluene
Concen: 9.909 ug/l
RT: 10.975 min Scan# 3012
Delta R.T. -0.000 min
Lab File: VU063228.D
Acq: 11 Feb 2025 10:01



Tgt Ion:126 Resp: 170502
Ion Ratio Lower Upper
126 100
91 310.3 0.0 623.8





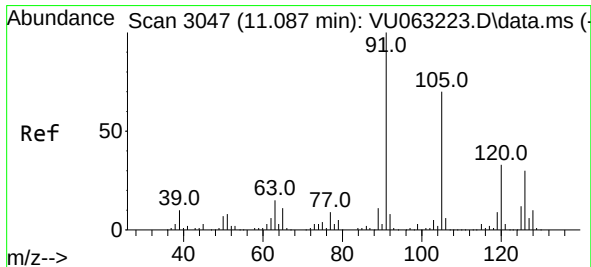
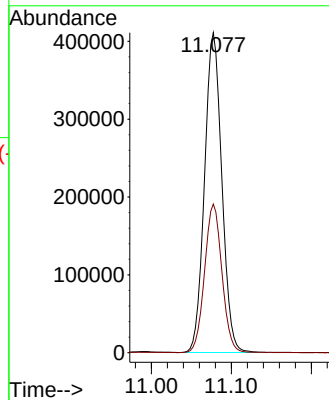
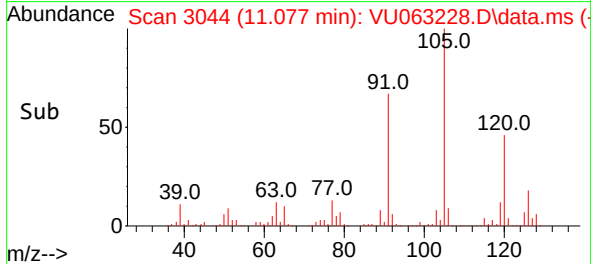
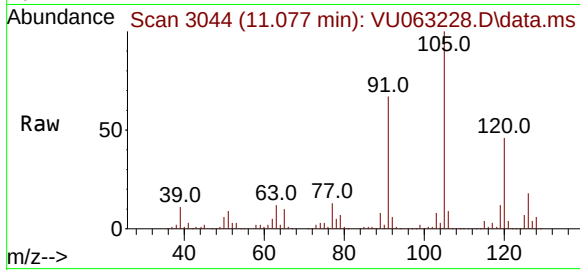
#75
1,3,5-Trimethylbenzene
Concen: 10.250 ug/l
RT: 11.077 min Scan# 3044
Delta R.T. -0.000 min
Lab File: VU063228.D
Acq: 11 Feb 2025 10:01

Instrument :
MSVOA_U
ClientSampleId :
VSTDCCC010

Tgt Ion:105 Resp: 61932
Ion Ratio Lower Upper
105 100
120 46.6 37.3 55.9

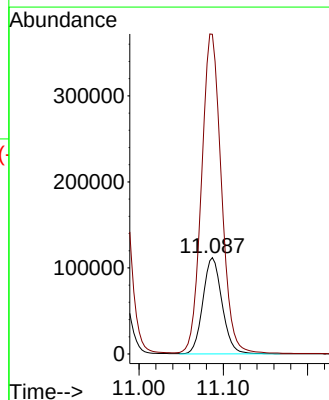
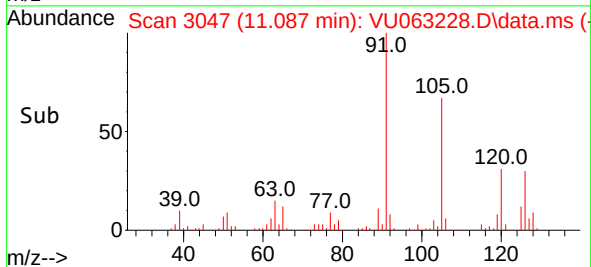
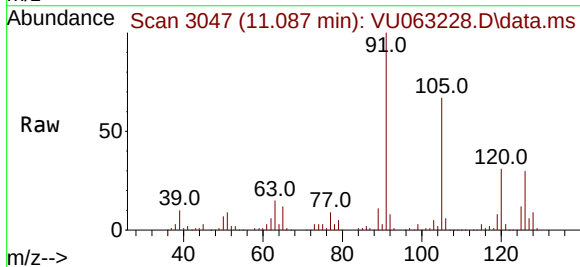
Manual Integrations
APPROVED

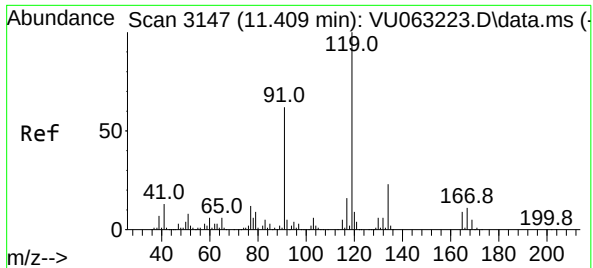
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#76
4-Chlorotoluene
Concen: 10.034 ug/l
RT: 11.087 min Scan# 3047
Delta R.T. -0.000 min
Lab File: VU063228.D
Acq: 11 Feb 2025 10:01

Tgt Ion:126 Resp: 177057
Ion Ratio Lower Upper
126 100
91 345.0 0.0 703.6





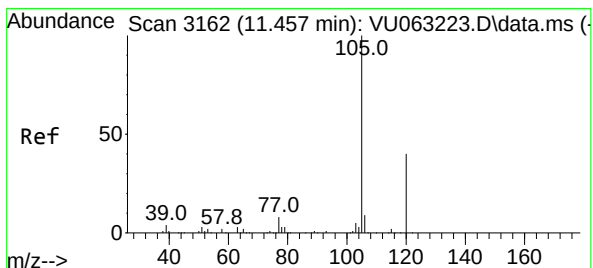
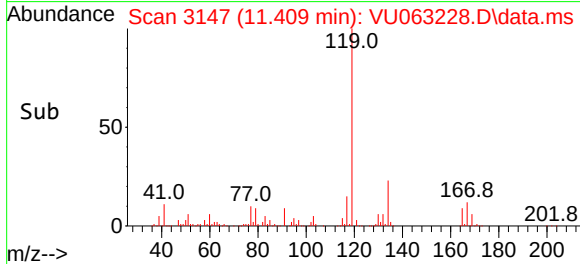
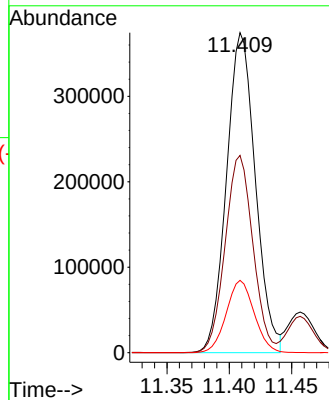
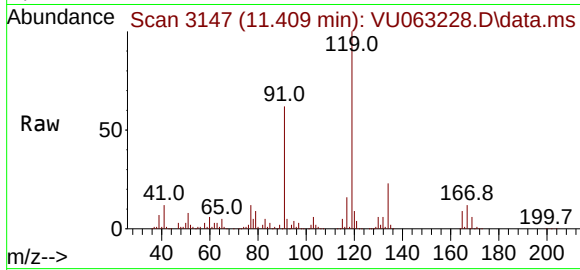
#77
tert-Butylbenzene
Concen: 9.891 ug/l
RT: 11.409 min Scan# 3147
Delta R.T. -0.000 min
Lab File: VU063228.D
Acq: 11 Feb 2025 10:01

Instrument :
MSVOA_U
ClientSampleId :
VSTDCCC010

Tgt Ion:119 Resp: 604402
Ion Ratio Lower Upper
119 100
91 59.4 29.4 88.3
134 21.9 17.6 26.4

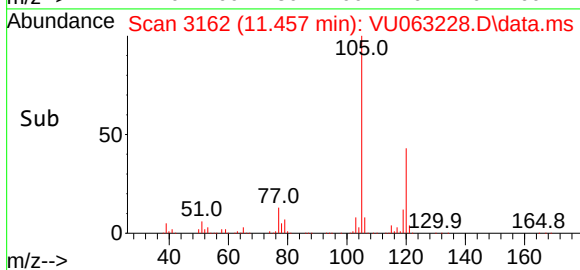
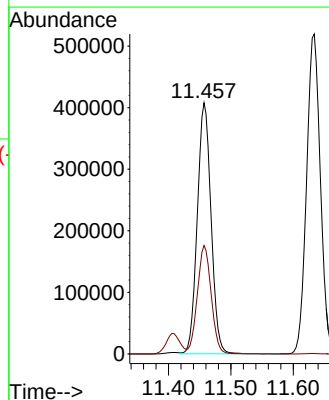
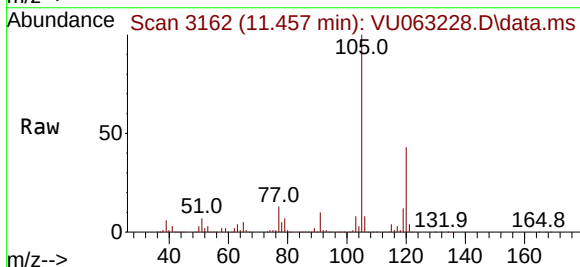
Manual Integrations
APPROVED

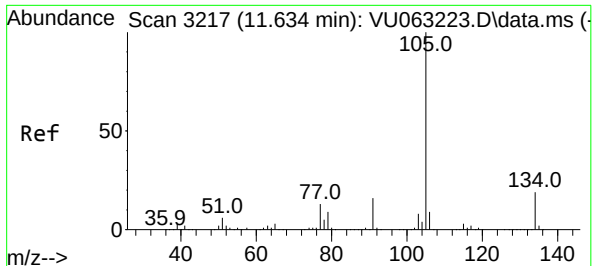
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#78
1,2,4-Trimethylbenzene
Concen: 10.413 ug/l
RT: 11.457 min Scan# 3162
Delta R.T. -0.000 min
Lab File: VU063228.D
Acq: 11 Feb 2025 10:01

Tgt Ion:105 Resp: 624278
Ion Ratio Lower Upper
105 100
120 43.4 21.9 65.7





#79

sec-Butylbenzene

Concen: 10.269 ug/l

RT: 11.634 min Scan# 3217

Delta R.T. -0.000 min

Lab File: VU063228.D

Acq: 11 Feb 2025 10:01

Instrument :

MSVOA_U

ClientSampleId :

VSTDCCC010

Tgt Ion:105 Resp: 79897

Ion Ratio Lower Upper

105 100

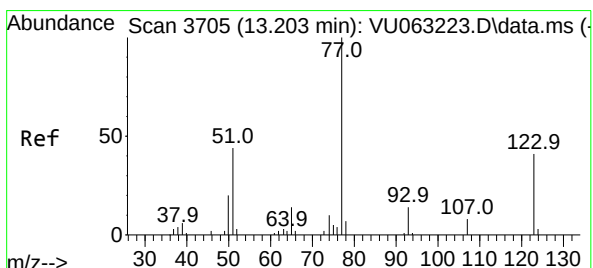
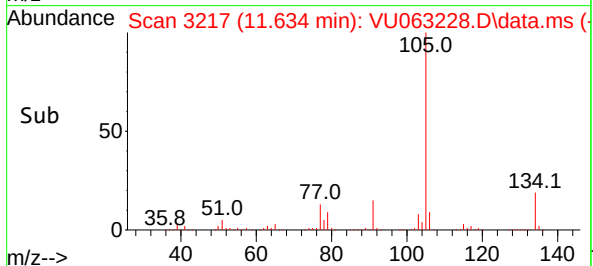
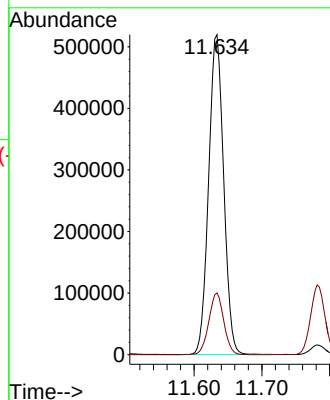
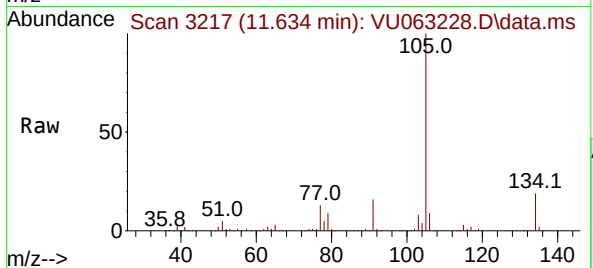
134 19.2 15.1 22.7

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#80

Nitrobenzene

Concen: 39.429 ug/l m

RT: 13.203 min Scan# 3705

Delta R.T. -0.000 min

Lab File: VU063228.D

Acq: 11 Feb 2025 10:01

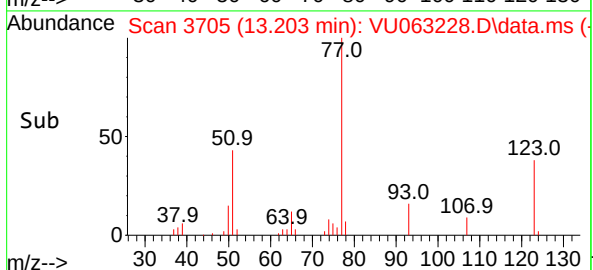
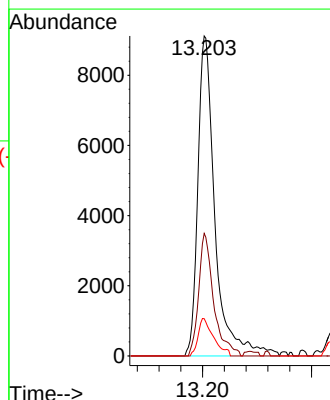
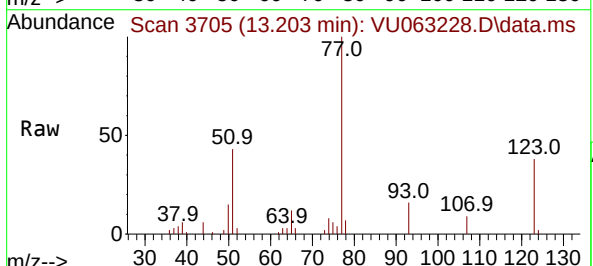
Tgt Ion: 77 Resp: 19933

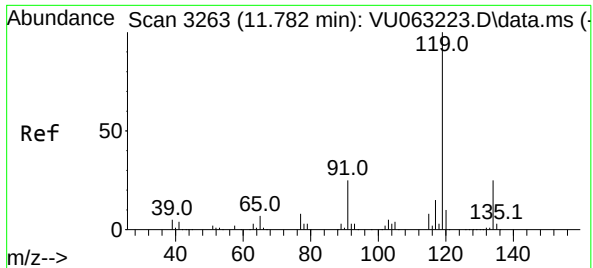
Ion Ratio Lower Upper

77 100

123 33.5 18.9 67.1

65 10.5 11.9 15.1#





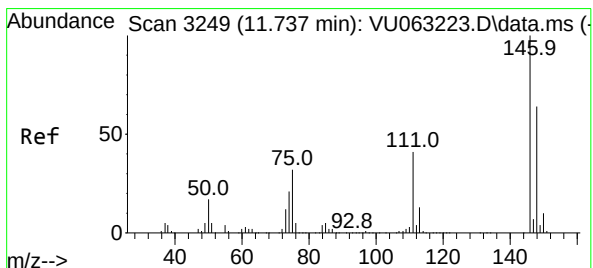
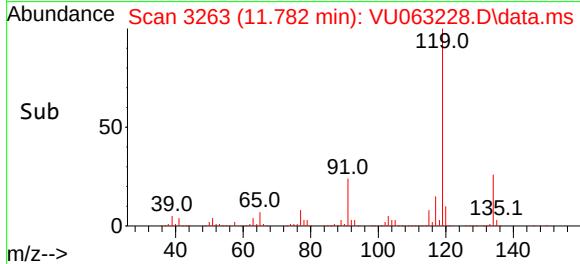
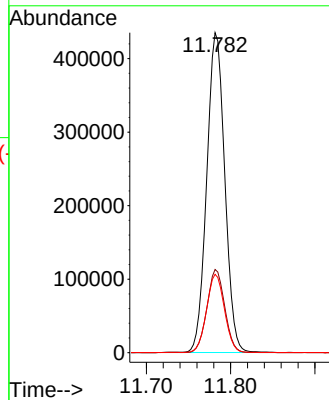
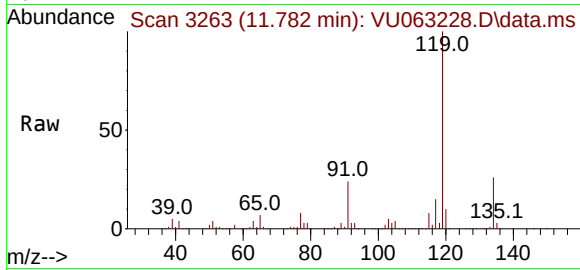
#81
p-Isopropyltoluene
Concen: 10.569 ug/l
RT: 11.782 min Scan# 31
Delta R.T. -0.000 min
Lab File: VU063228.D
Acq: 11 Feb 2025 10:01

Instrument :
MSVOA_U
ClientSampleId :
VSTDCCC010

Tgt Ion:119 Resp: 648960
Ion Ratio Lower Upper
119 100
134 25.7 20.3 30.5
91 24.2 19.4 29.2

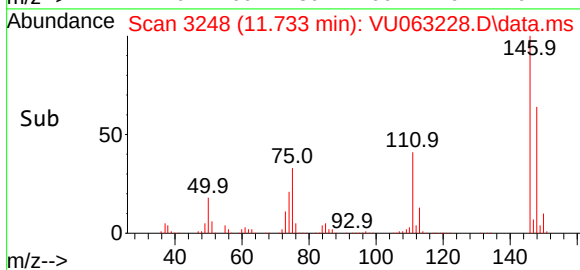
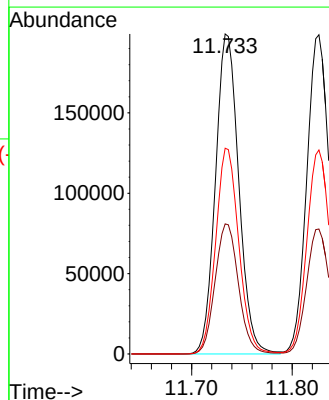
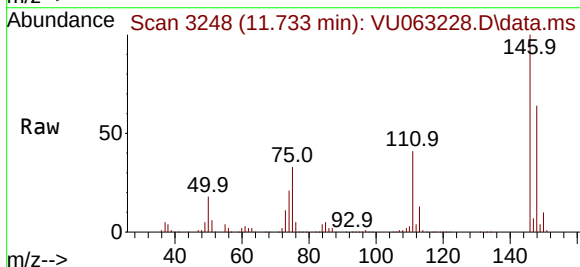
Manual Integrations
APPROVED

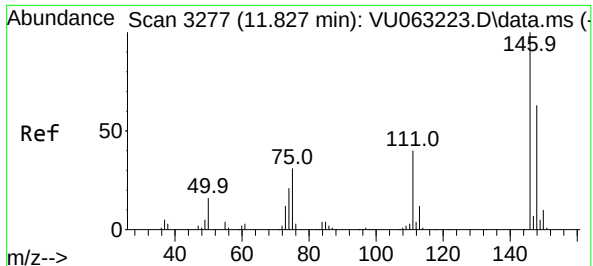
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#82
1,3-Dichlorobenzene
Concen: 9.407 ug/l
RT: 11.733 min Scan# 3248
Delta R.T. -0.003 min
Lab File: VU063228.D
Acq: 11 Feb 2025 10:01

Tgt Ion:146 Resp: 320582
Ion Ratio Lower Upper
146 100
111 40.8 32.8 49.2
148 63.8 51.1 76.7





#83

1,4-Dichlorobenzene

Concen: 9.626 ug/l

RT: 11.827 min Scan# 31

Delta R.T. -0.000 min

Lab File: VU063228.D

Acq: 11 Feb 2025 10:01

Instrument :

MSVOA_U

ClientSampleId :

VSTDCCC010

Tgt Ion:146 Resp: 32086

Ion Ratio Lower Upper

146 100

111 39.4 32.1 48.1

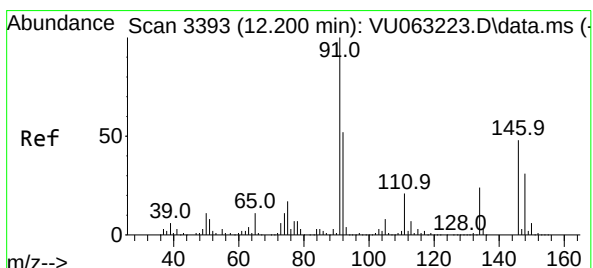
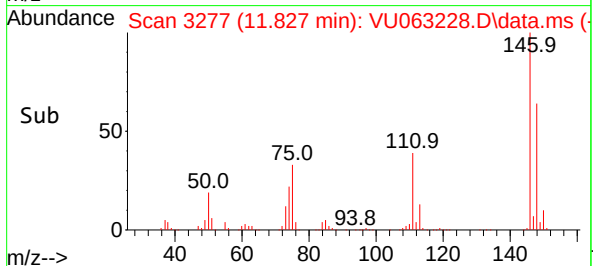
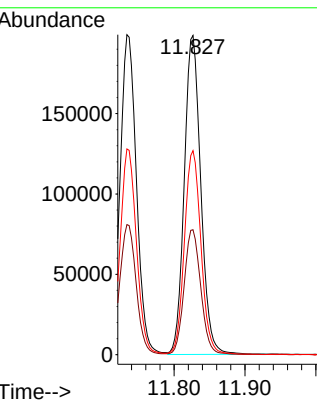
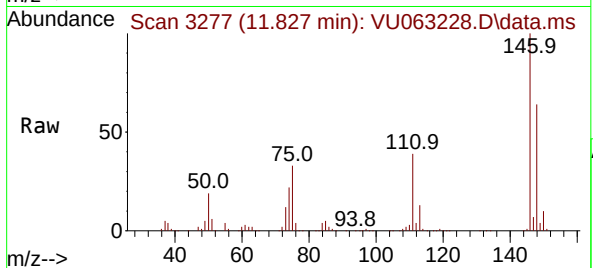
148 63.8 50.2 75.4

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#84

n-Butylbenzene

Concen: 11.060 ug/l

RT: 12.196 min Scan# 3392

Delta R.T. -0.003 min

Lab File: VU063228.D

Acq: 11 Feb 2025 10:01

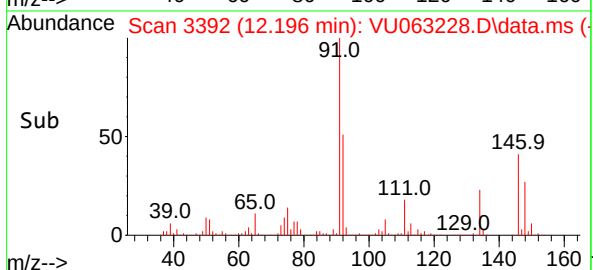
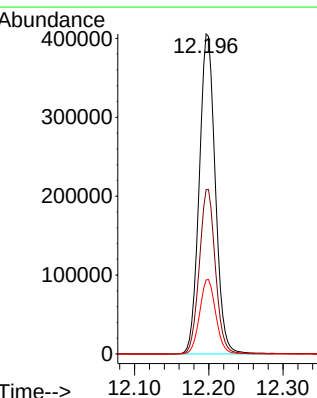
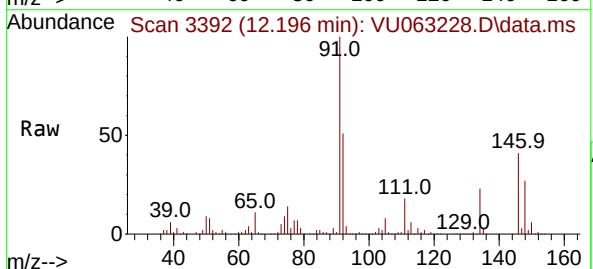
Tgt Ion: 91 Resp: 608967

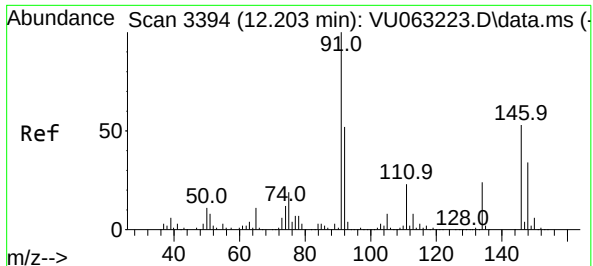
Ion Ratio Lower Upper

91 100

92 51.4 41.8 62.8

134 23.4 18.6 28.0





#85

1,2-Dichlorobenzene

Concen: 9.305 ug/l

RT: 12.203 min Scan# 31

Delta R.T. -0.000 min

Lab File: VU063228.D

Acq: 11 Feb 2025 10:01

Instrument :

MSVOA_U

ClientSampleId :

VSTDCCC010

Tgt Ion:146 Resp: 30474

Ion Ratio Lower Upper

146 100

111 42.3 21.9 65.7

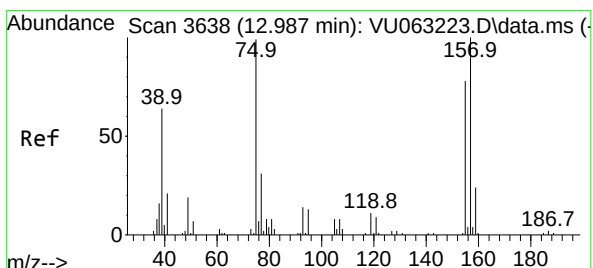
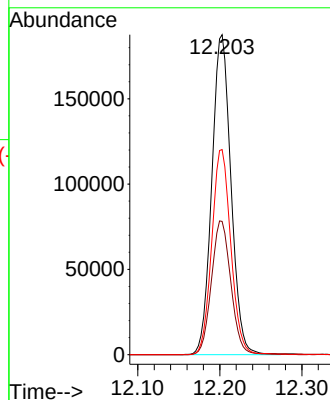
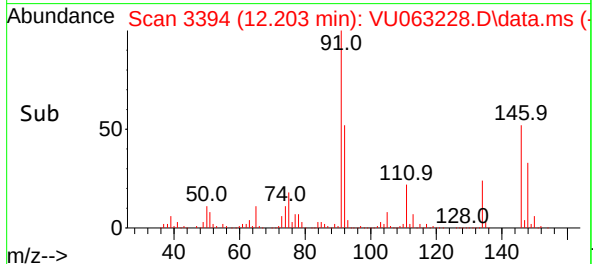
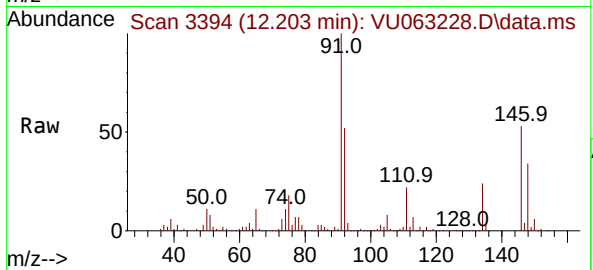
148 63.9 32.3 96.9

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#86

1,2-Dibromo-3-Chloropropane

Concen: 9.357 ug/l

RT: 12.987 min Scan# 3638

Delta R.T. -0.000 min

Lab File: VU063228.D

Acq: 11 Feb 2025 10:01

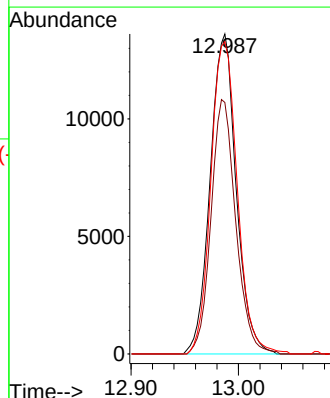
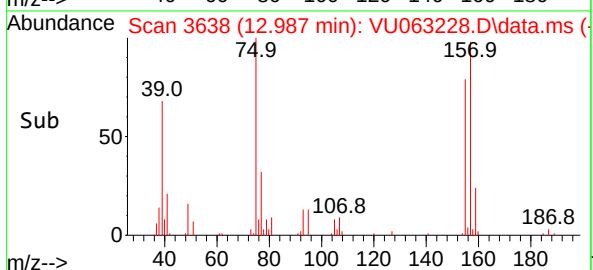
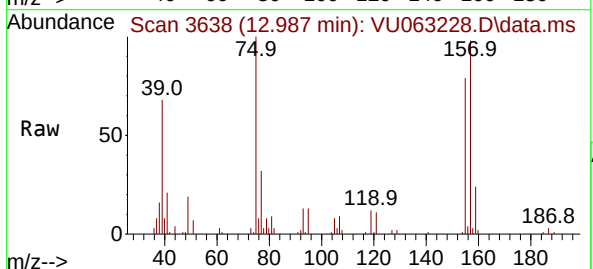
Tgt Ion: 75 Resp: 22925

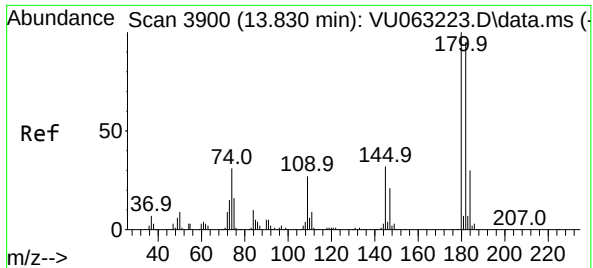
Ion Ratio Lower Upper

75 100

155 75.6 63.5 95.3

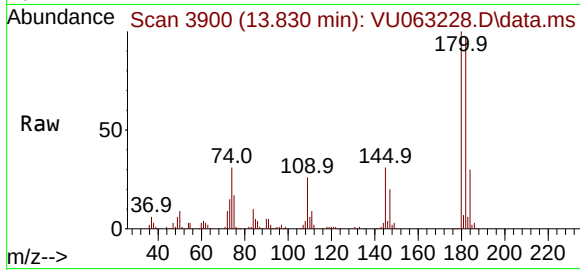
157 99.0 81.8 122.6





#87
1,2,4-Trichlorobenzene
Concen: 10.965 ug/l
RT: 13.830 min Scan# 3900
Delta R.T. -0.000 min
Lab File: VU063228.D
Acq: 11 Feb 2025 10:01

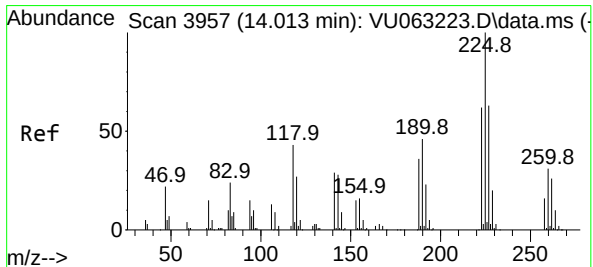
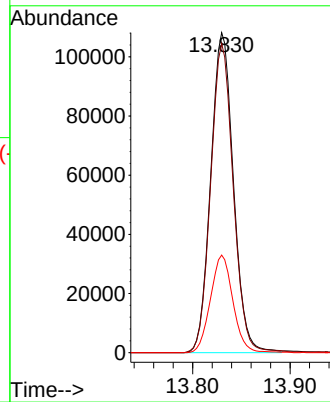
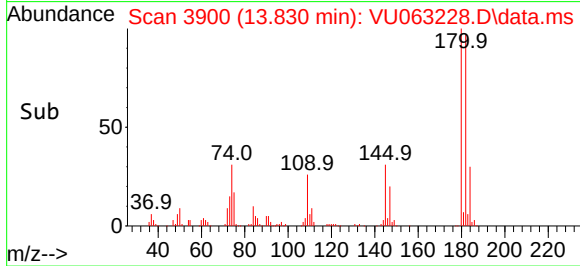
Instrument :
MSVOA_U
ClientSampleId :
VSTDCCC010



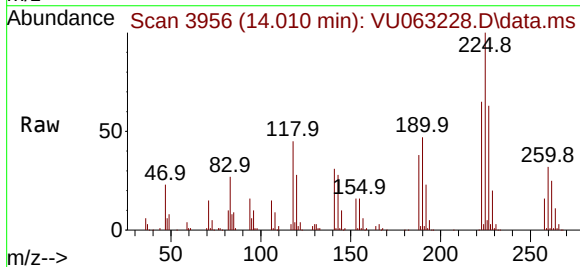
Tgt Ion:180 Resp: 17515
Ion Ratio Lower Upper
180 100
182 96.1 76.6 115.0
145 30.2 25.4 38.2

Manual Integrations
APPROVED

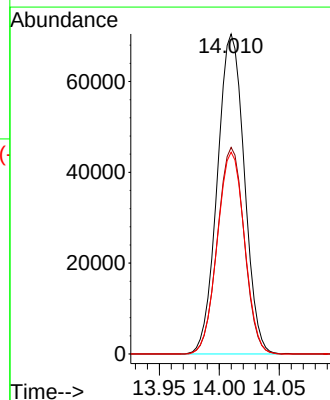
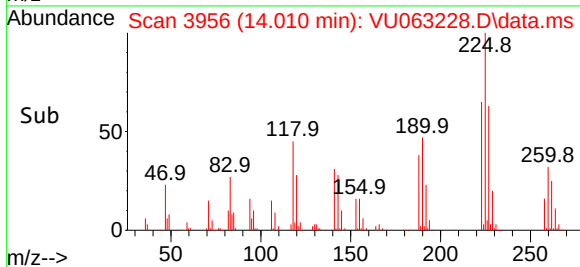
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025

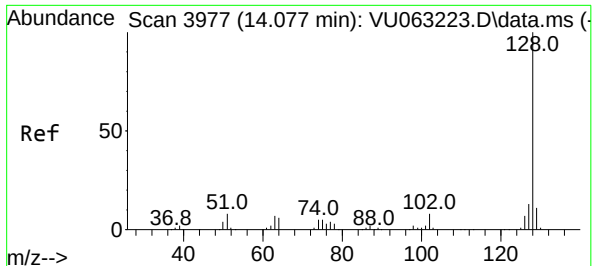


#88
Hexachlorobutadiene
Concen: 9.651 ug/l
RT: 14.010 min Scan# 3956
Delta R.T. -0.003 min
Lab File: VU063228.D
Acq: 11 Feb 2025 10:01



Tgt Ion:225 Resp: 110172
Ion Ratio Lower Upper
225 100
223 64.1 49.5 74.3
227 63.5 51.0 76.4





#89

Naphthalene

Concen: 8.899 ug/l

RT: 14.077 min Scan# 3977

Delta R.T. -0.000 min

Lab File: VU063228.D

Acq: 11 Feb 2025 10:01

Instrument :

MSVOA_U

ClientSampleId :

VSTDCCC010

Tgt Ion:128 Resp: 294274

Ion Ratio Lower Upper

128 100

127 13.0 10.6 16.0

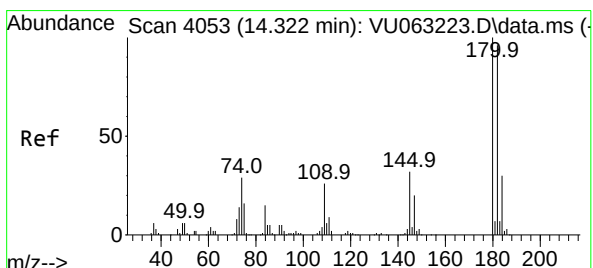
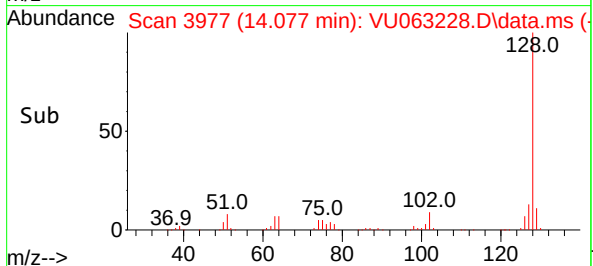
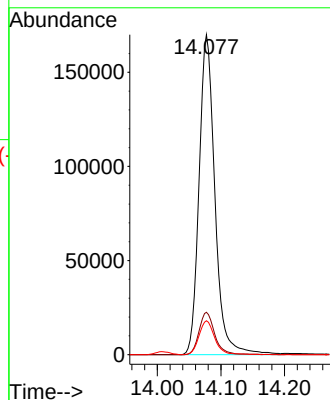
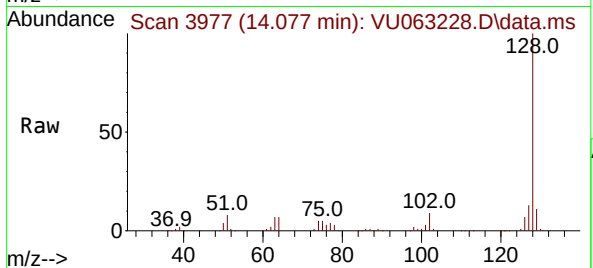
129 10.6 8.6 13.0

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#90

1,2,3-Trichlorobenzene

Concen: 10.565 ug/l

RT: 14.318 min Scan# 4052

Delta R.T. -0.003 min

Lab File: VU063228.D

Acq: 11 Feb 2025 10:01

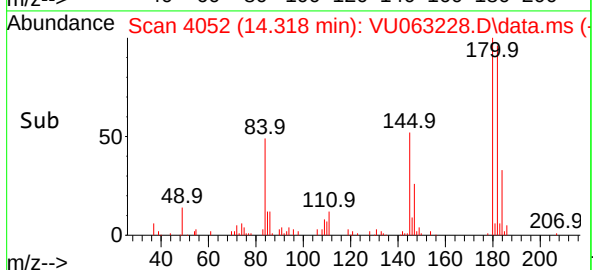
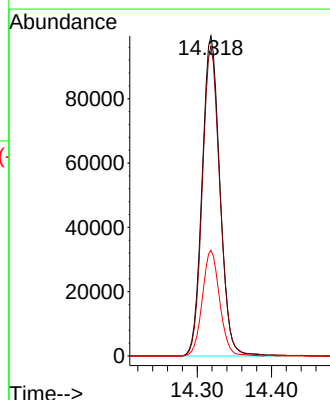
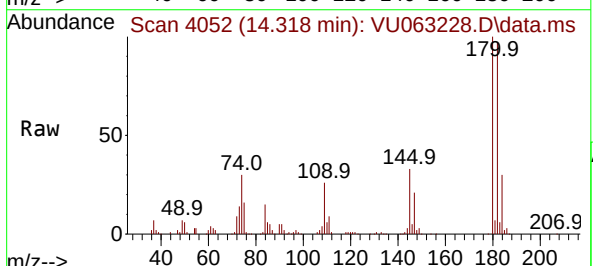
Tgt Ion:180 Resp: 165126

Ion Ratio Lower Upper

180 100

182 96.0 78.2 117.2

145 32.2 26.1 39.1



Data Path : Z:\voasrv\HPCHEM1\MSVOA_U\Data\VU021125\
 Data File : VU063228.D
 Acq On : 11 Feb 2025 10:01
 Operator : MD/SY
 Sample : VSTDCCC010
 Misc : 25.0mL/MSVOA_U/WATER
 ALS Vial : 3 Sample Multiplier: 1

Instrument :
 MSVOA_U
 LabSampleId :
 VSTDCCC010

Quant Time: Feb 12 03:08:58 2025
 Quant Method : Z:\voasrv\HPCHEM1\MSVOA_U\Method\524U021025DW.M
 Quant Title : METHOD 524.2 VOLATILES DRINKING WATER
 QLast Update : Tue Feb 11 08:42:19 2025
 Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 20% Max. R.T. Dev 0.50min
 Max. RRF Dev : 30% Max. Rel. Area : 200%

	Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
1 i	Fluorobenzene	1.000	1.000	0.0	102	0.00
2 T	Dichlorodifluoromethane	0.325	0.286	12.0	96	0.00
3 t	Chloromethane	0.374	0.311	16.8	90	0.00
4 Rt	Vinyl Chloride	0.370	0.325	12.2	91	0.00
5 T	Bromomethane	0.181	0.183	-1.1	98	0.00
6 T	Chloroethane	0.233	0.202	13.3	93	0.00
7 T	Trichlorofluoromethane	0.439	0.394	10.3	95	0.00
8	1,1,2-Trichloro-1,2,2-trifl	0.249	0.228	8.4	101	0.00
9 Rt	1,1-Dichloroethene	0.254	0.226	11.0	93	0.00
10 t	Iodomethane	0.399	0.374	6.3	94	0.00
11 t	Allyl Chloride	0.364	0.334	8.2	93	0.00
12 t	Acrylonitrile	0.059	0.054	8.5	85	0.00
13 T	Acetone	0.045	0.037	17.8	79	0.00
14 T	Carbon Disulfide	0.887	0.776	12.5	92	0.00
15 RT	Methylene Chloride	0.313	0.271	13.4	91	0.00
16 RT	trans-1,2-Dichloroethene	0.290	0.261	10.0	93	0.00
17 t	1,1-Dichloroethane	0.546	0.485	11.2	92	0.00
18 T	2-Butanone	0.072	0.064	11.1	83	0.00
19	Cyclohexane	0.439	0.427	2.7	96	0.00
20	Methylcyclohexane	0.435	0.448	-3.0	102	0.00
21 T	2,2-Dichloropropane	0.426	0.394	7.5	96	0.00
22 RT	cis-1,2-Dichloroethene	0.313	0.284	9.3	92	0.00
23 t	Diethyl Ether	0.218	0.182	16.5	86	0.00
24 t	tert-Butyl Alcohol	0.026	0.017	34.6#	72	0.03
25 t	Methyl tert-Butyl Ether	0.634	0.586	7.6	89	0.00
26 t	Bromochloromethane	0.137	0.122	10.9	91	0.00
27 t	Chloroform	0.551	0.488	11.4	91	0.00
28 RT	1,1,1-Trichloroethane	0.446	0.407	8.7	94	0.00
29 T	1,1-Dichloropropene	0.400	0.376	6.0	94	0.00
30 RT	Carbon Tetrachloride	0.383	0.349	8.9	94	0.00
31 t	Isopropyl Ether	0.779	0.743	4.6	93	0.00
32	Ethyl-t-butyl ether	0.709	0.686	3.2	93	0.00
33	Tert-Amyl methyl ether	0.619	0.602	2.7	89	0.00
34 t	Propionitrile	0.022	0.021	4.5	87	0.02
35 RT	Benzene	1.229	1.118	9.0	93	0.00
36 RT	1,2-Dichloroethane	0.355	0.307	13.5	88	0.00
37 RT	Trichloroethene	0.292	0.266	8.9	93	0.00
38 Rt	1,2-Dichloropropane	0.322	0.292	9.3	91	0.00
39 t	Methacrylonitrile	0.080	0.079	1.3	83	0.00
40 t	Methyl acrylate	0.148	0.125	15.5	77	0.00
41 t	Tetrahydrofuran	0.047	0.042	10.6	82	0.00
42 t	1-Chlorobutane	0.547	0.524	4.2	95	0.00
43 T	Dibromomethane	0.163	0.144	11.7	91	0.00
44 T	Bromodichloromethane	0.379	0.346	8.7	90	0.00
45 T	4-Methyl-2-Pentanone	0.171	0.162	5.3	84	0.00
46 t	t-1,4-Dichloro-2-butene	0.080	0.088	-10.0	107	0.00
47 t	Methyl methacrylate	0.137	0.135	1.5	85	0.00
48 t	Ethyl methacrylate	0.258	0.266	-3.1	86	0.00
49 Rt	Toluene	0.707	0.684	3.3	94	0.00

Data Path : Z:\voasrv\HPCHEM1\MSVOA_U\Data\VU021125\
 Data File : VU063228.D
 Acq On : 11 Feb 2025 10:01
 Operator : MD/SY
 Sample : VSTDCCC010
 Misc : 25.0mL/MSVOA_U/WATER
 ALS Vial : 3 Sample Multiplier: 1

Instrument :
 MSVOA_U
 LabSampleId :
 VSTDCCC010

Quant Time: Feb 12 03:08:58 2025
 Quant Method : Z:\voasrv\HPCHEM1\MSVOA_U\Method\524U021025DW.M
 Quant Title : METHOD 524.2 VOLATILES DRINKING WATER
 QLast Update : Tue Feb 11 08:42:19 2025
 Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 20% Max. R.T. Dev 0.50min
 Max. RRF Dev : 30% Max. Rel. Area : 200%

	Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
50 T	t-1,3-Dichloropropene	0.347	0.340	2.0	91	0.00
51 T	cis-1,3-Dichloropropene	0.429	0.400	6.8	89	0.00
52 RT	1,1,2-Trichloroethane	0.220	0.201	8.6	90	0.00
53 t	1,3-Dichloropropane	0.390	0.355	9.0	89	0.00
54 t	2-Hexanone	0.117	0.111	5.1	84	0.00
55 t	Dibromochloromethane	0.253	0.232	8.3	88	0.00
56 T	1,2-Dibromoethane	0.206	0.190	7.8	88	0.00
57 S	4-Bromofluorobenzene	0.330	0.353	-7.0	101	0.00
58 RT	Tetrachloroethene	0.241	0.225	6.6	98	0.00
59 Rt	Chlorobenzene	0.746	0.709	5.0	94	0.00
60 T	1,1,1,2-Tetrachloroethane	0.268	0.247	7.8	92	0.00
61 t	Pentachloroethane	0.239	0.212	11.3	90	0.00
62 t	Hexachloroethane	0.212	0.198	6.6	91	0.00
63 Rt	Ethyl Benzene	1.286	1.288	-0.2	94	0.00
64 RT	m/p-Xylenes	0.480	0.492	-2.5	94	0.00
65 RT	o-Xylene	0.470	0.471	-0.2	93	0.00
66 RT	Styrene	0.748	0.766	-2.4	91	0.00
67 t	Bromoform	0.143	0.130	9.1	85	0.00
68 S	1,2-Dichlorobenzene-d4	0.343	0.340	0.9	101	0.00
69 T	Isopropylbenzene	1.106	1.125	-1.7	95	0.00
70 T	1,1,2,2-Tetrachloroethane	0.296	0.261	11.8	86	0.00
71 T	1,2,3-Trichloropropane	0.222	0.211	5.0	106	0.00
72 t	Bromobenzene	0.298	0.282	5.4	91	0.00
73 t	n-propylbenzene	0.317	0.329	-3.8	95	0.00
74 t	2-Chlorotoluene	0.292	0.289	1.0	93	0.00
75 t	1,3,5-Trimethylbenzene	1.024	1.050	-2.5	93	0.00
76 t	4-Chlorotoluene	0.299	0.300	-0.3	95	0.00
77 t	tert-Butylbenzene	1.036	1.025	1.1	93	0.00
78 t	1,2,4-Trimethylbenzene	1.016	1.058	-4.1	93	0.00
79 t	sec-Butylbenzene	1.319	1.355	-2.7	96	0.00
80	Nitrobenzene	0.007	0.007	0.0	77	0.00
81 t	p-Isopropyltoluene	1.041	1.100	-5.7	96	0.00
82 t	1,3-Dichlorobenzene	0.578	0.544	5.9	93	0.00
83 Rt	1,4-Dichlorobenzene	0.565	0.544	3.7	92	0.00
84 t	n-Butylbenzene	0.933	1.032	-10.6	101	0.00
85 Rt	1,2-Dichlorobenzene	0.555	0.517	6.8	92	0.00
86 t	1,2-Dibromo-3-Chloropropane	0.042	0.039	7.1	81	0.00
87 Rt	1,2,4-Trichlorobenzene	0.271	0.297	-9.6	98	0.00
88 t	Hexachlorobutadiene	0.194	0.187	3.6	105	0.00
89 t	Naphthalene	0.436	0.499	-14.4	92	0.00
90 t	1,2,3-Trichlorobenzene	0.265	0.280	-5.7	94	0.00

(#) = Out of Range

SPCC's out = 0 CCC's out = 0

Data Path : Z:\voasrv\HPCHEM1\MSVOA_U\Data\VU021125\
Data File : VU063228.D
Acq On : 11 Feb 2025 10:01
Operator : MD/SY
Sample : VSTDCCC010
Misc : 25.0mL/MSVOA_U/WATER
ALS Vial : 3 Sample Multiplier: 1

Instrument :
MSVOA_U
LabSampleId :
VSTDCCC010

Quant Time: Feb 12 03:08:58 2025
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_U\Method\524U021025DW.M
Quant Title : METHOD 524.2 VOLATILES DRINKING WATER
QLast Update : Tue Feb 11 08:42:19 2025
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 20% Max. R.T. Dev 0.50min
Max. RRF Dev : 30% Max. Rel. Area : 200%

	Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1 i	Fluorobenzene	1.000	1.000	0.0	102	0.00
2 T	Dichlorodifluoromethane	10.000	8.797	12.0	96	0.00
3 t	Chloromethane	10.000	8.299	17.0	90	0.00
4 Rt	Vinyl Chloride	10.000	8.787	12.1	91	0.00
5 T	Bromomethane	10.000	10.135	-1.3	98	0.00
6 T	Chloroethane	10.000	8.649	13.5	93	0.00
7 T	Trichlorofluoromethane	10.000	8.970	10.3	95	0.00
8	1,1,2-Trichloro-1,2,2-trifl	10.000	9.165	8.4	101	0.00
9 Rt	1,1-Dichloroethene	10.000	8.906	10.9	93	0.00
10 t	Iodomethane	10.000	9.365	6.3	94	0.00
11 t	Allyl Chloride	10.000	9.171	8.3	93	0.00
12 t	Acrylonitrile	20.000	18.464	7.7	85	0.00
13 T	Acetone	50.000	40.694	18.6	79	0.00
14 T	Carbon Disulfide	10.000	8.748	12.5	92	0.00
15 RT	Methylene Chloride	10.000	8.649	13.5	91	0.00
16 RT	trans-1,2-Dichloroethene	10.000	9.030	9.7	93	0.00
17 t	1,1-Dichloroethane	10.000	8.881	11.2	92	0.00
18 T	2-Butanone	50.000	44.800	10.4	83	0.00
19	Cyclohexane	10.000	9.729	2.7	96	0.00
20	Methylcyclohexane	10.000	10.295	-2.9	102	0.00
21 T	2,2-Dichloropropane	10.000	9.260	7.4	96	0.00
22 RT	cis-1,2-Dichloroethene	10.000	9.085	9.1	92	0.00
23 t	Diethyl Ether	10.000	8.373	16.3	86	0.00
24 t	tert-Butyl Alcohol	100.000	72.937	27.1	72	0.03
25 t	Methyl tert-Butyl Ether	10.000	9.249	7.5	89	0.00
26 t	Bromochloromethane	10.000	8.902	11.0	91	0.00
27 t	Chloroform	10.000	8.862	11.4	91	0.00
28 RT	1,1,1-Trichloroethane	10.000	9.130	8.7	94	0.00
29 T	1,1-Dichloropropene	10.000	9.411	5.9	94	0.00
30 RT	Carbon Tetrachloride	10.000	9.115	8.8	94	0.00
31 t	Isopropyl Ether	10.000	9.541	4.6	93	0.00
32	Ethyl-t-butyl ether	10.000	9.678	3.2	93	0.00
33	Tert-Amyl methyl ether	10.000	9.728	2.7	89	0.00
34 t	Propionitrile	50.000	48.994	2.0	87	0.02
35 RT	Benzene	10.000	9.098	9.0	93	0.00
36 RT	1,2-Dichloroethane	10.000	8.666	13.3	88	0.00
37 RT	Trichloroethene	10.000	9.111	8.9	93	0.00
38 Rt	1,2-Dichloropropane	10.000	9.086	9.1	91	0.00
39 t	Methacrylonitrile	10.000	9.847	1.5	83	0.00
40 t	Methyl acrylate	10.000	8.442	15.6	77	0.00
41 t	Tetrahydrofuran	20.000	17.753	11.2	82	0.00
42 t	1-Chlorobutane	10.000	9.582	4.2	95	0.00
43 T	Dibromomethane	10.000	8.867	11.3	91	0.00
44 T	Bromodichloromethane	10.000	9.138	8.6	90	0.00
45 T	4-Methyl-2-Pentanone	50.000	47.438	5.1	84	0.00
46 t	t-1,4-Dichloro-2-butene	20.000	21.994	-10.0	107	0.00
47 t	Methyl methacrylate	20.000	19.623	1.9	85	0.00
48 t	Ethyl methacrylate	10.000	10.321	-3.2	86	0.00
49 Rt	Toluene	10.000	9.675	3.2	94	0.00

Data Path : Z:\voasrv\HPCHEM1\MSVOA_U\Data\VU021125\
Data File : VU063228.D
Acq On : 11 Feb 2025 10:01
Operator : MD/SY
Sample : VSTDCCC010
Misc : 25.0mL/MSVOA_U/WATER
ALS Vial : 3 Sample Multiplier: 1

Instrument :
MSVOA_U
LabSampleId :
VSTDCCC010

Quant Time: Feb 12 03:08:58 2025
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_U\Method\524U021025DW.M
Quant Title : METHOD 524.2 VOLATILES DRINKING WATER
QLast Update : Tue Feb 11 08:42:19 2025
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 20% Max. R.T. Dev 0.50min
Max. RRF Dev : 30% Max. Rel. Area : 200%

	Compound	Amount	Calc.	%Dev	Area%	Dev(min)
50 T	t-1,3-Dichloropropene	10.000	9.811	1.9	91	0.00
51 T	cis-1,3-Dichloropropene	10.000	9.338	6.6	89	0.00
52 RT	1,1,2-Trichloroethane	10.000	9.154	8.5	90	0.00
53 t	1,3-Dichloropropane	10.000	9.097	9.0	89	0.00
54 t	2-Hexanone	50.000	47.697	4.6	84	0.00
55 t	Dibromochloromethane	10.000	9.169	8.3	88	0.00
56 T	1,2-Dibromoethane	10.000	9.223	7.8	88	0.00
57 S	4-Bromofluorobenzene	1.000	1.070	-7.0	101	0.00
58 RT	Tetrachloroethene	10.000	9.361	6.4	98	0.00
59 Rt	Chlorobenzene	10.000	9.514	4.9	94	0.00
60 T	1,1,1,2-Tetrachloroethane	10.000	9.206	7.9	92	0.00
61 t	Pentachloroethane	10.000	8.865	11.3	90	0.00
62 t	Hexachloroethane	10.000	9.352	6.5	91	0.00
63 Rt	Ethyl Benzene	10.000	10.017	-0.2	94	0.00
64 RT	m/p-Xylenes	20.000	20.468	-2.3	94	0.00
65 RT	o-Xylene	10.000	10.007	-0.1	93	0.00
66 RT	Styrene	10.000	10.231	-2.3	91	0.00
67 t	Bromoform	10.000	9.096	9.0	85	0.00
68 S	1,2-Dichlorobenzene-d4	1.000	0.990	1.0	101	0.00
69 T	Isopropylbenzene	10.000	10.176	-1.8	95	0.00
70 T	1,1,2,2-Tetrachloroethane	10.000	8.820	11.8	86	0.00
71 T	1,2,3-Trichloropropane	10.000	9.485	5.2	106	0.00
72 t	Bromobenzene	10.000	9.459	5.4	91	0.00
73 t	n-propylbenzene	10.000	10.396	-4.0	95	0.00
74 t	2-Chlorotoluene	10.000	9.909	0.9	93	0.00
75 t	1,3,5-Trimethylbenzene	10.000	10.250	-2.5	93	0.00
76 t	4-Chlorotoluene	10.000	10.034	-0.3	95	0.00
77 t	tert-Butylbenzene	10.000	9.891	1.1	93	0.00
78 t	1,2,4-Trimethylbenzene	10.000	10.413	-4.1	93	0.00
79 t	sec-Butylbenzene	10.000	10.269	-2.7	96	0.00
80	Nitrobenzene	50.000	39.429	21.1	77	0.00
81 t	p-Isopropyltoluene	10.000	10.569	-5.7	96	0.00
82 t	1,3-Dichlorobenzene	10.000	9.407	5.9	93	0.00
83 Rt	1,4-Dichlorobenzene	10.000	9.626	3.7	92	0.00
84 t	n-Butylbenzene	10.000	11.060	-10.6	101	0.00
85 Rt	1,2-Dichlorobenzene	10.000	9.305	7.0	92	0.00
86 t	1,2-Dibromo-3-Chloropropane	10.000	9.357	6.4	81	0.00
87 Rt	1,2,4-Trichlorobenzene	10.000	10.965	-9.6	98	0.00
88 t	Hexachlorobutadiene	10.000	9.651	3.5	105	0.00
89 t	Naphthalene	10.000	8.899	11.0	92	0.00
90 t	1,2,3-Trichlorobenzene	10.000	10.565	-5.6	94	0.00

(#) = Out of Range

SPCC's out = 0 CCC's out = 0



QC SAMPLE DATA

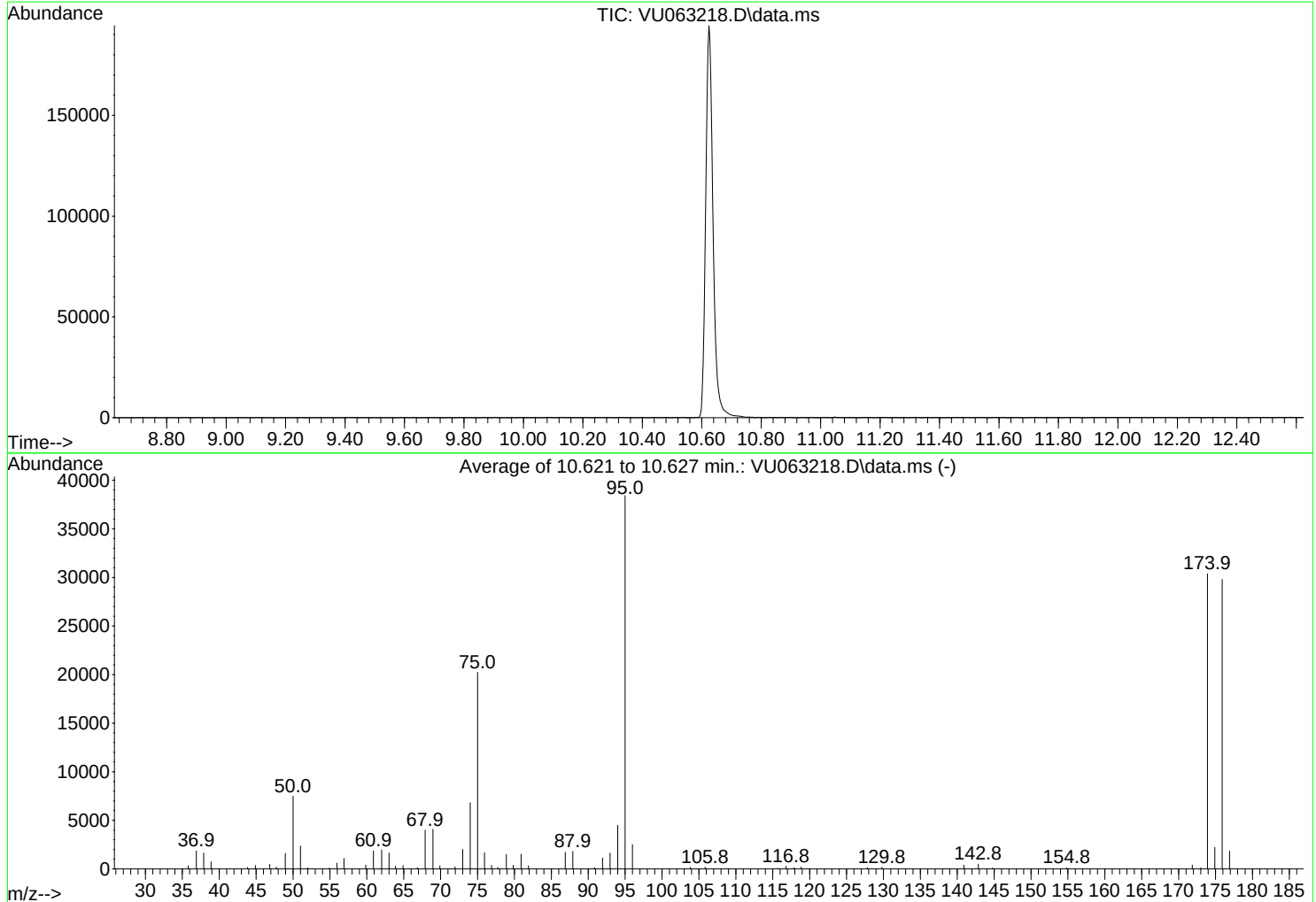
- 1
- 2
- 3
- 4
- 5
- 6
- 7
- 8
- 9
- 10
- 11
- 12
- 13
- 14
- 15
- 16

Data Path : Z:\voasrv\HPCHEM1\MSVOA_U\Data\VU021025\
Data File : VU063218.D
Acq On : 10 Feb 2025 09:06
Operator : MD/SY
Sample : BFB
Misc : 25.0mL/MSVOA_U/WATER
ALS Vial : 1 Sample Multiplier: 1

Instrument :
MSVOA_U
ClientSampleId :
BFB

Integration File: rteint.p

Method : Z:\voasrv\HPCHEM1\MSVOA_U\Method\524U021025DW.M
Title : METHOD 524.2 VOLATILES DRINKING WATER
Last Update : Tue Feb 11 08:42:19 2025



AutoFind: Scans 2902, 2903, 2904; Background Corrected with Scan 2890

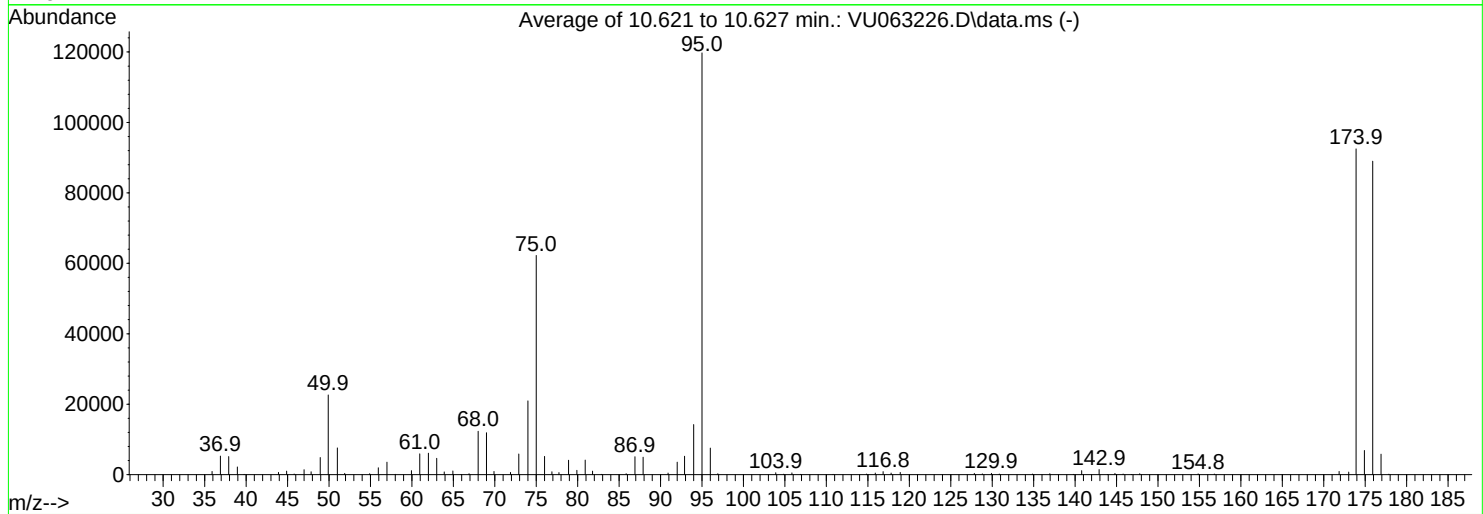
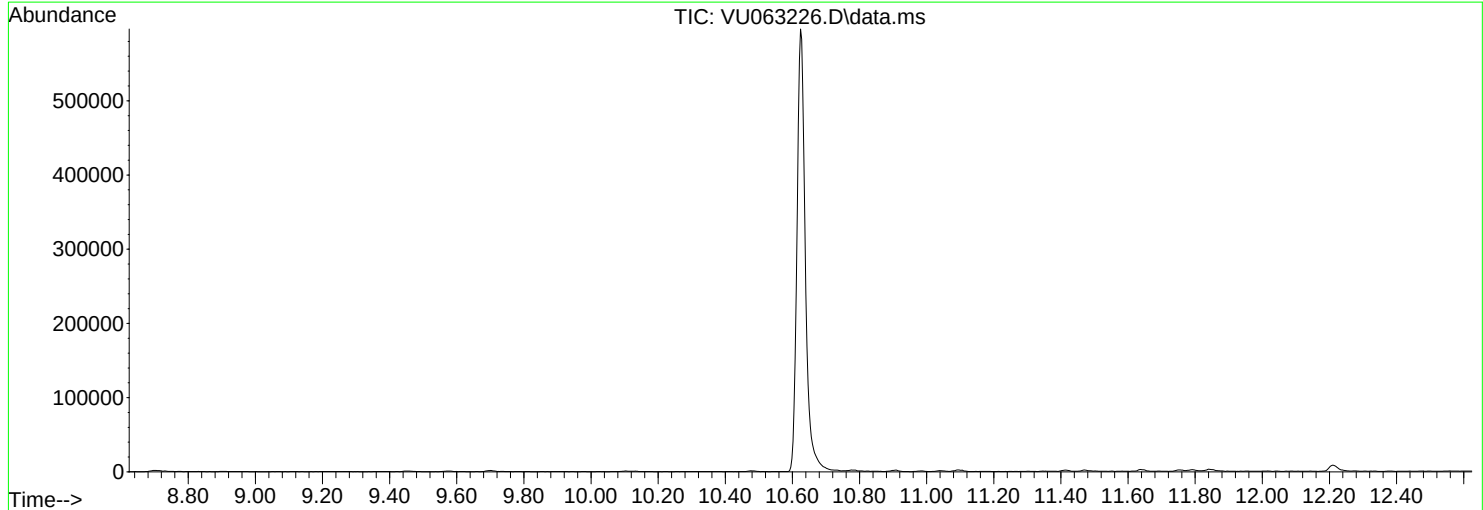
Target	Rel. to	Lower	Upper	Rel.	Raw	Result
Mass	Mass	Limit%	Limit%	Abn%	Abn	Pass/Fail
50	95	15	40	19.5	7489	PASS
75	95	30	60	52.7	20232	PASS
95	95	100	100	100.0	38421	PASS
96	95	5	9	6.5	2505	PASS
173	174	0.00	2	0.5	139	PASS
174	95	50	100	79.1	30381	PASS
175	174	5	9	7.3	2224	PASS
176	174	95	101	98.1	29792	PASS
177	176	5	9	6.2	1844	PASS

Data Path : Z:\voasrv\HPCHEM1\MSVOA_U\Data\VU021125\
Data File : VU063226.D
Acq On : 11 Feb 2025 08:11
Operator : MD/SY
Sample : BFB
Misc : 25.0mL/MSVOA_U/WATER
ALS Vial : 1 Sample Multiplier: 1

Instrument :
MSVOA_U
ClientSampleId :
BFB

Integration File: rteint.p

Method : Z:\voasrv\HPCHEM1\MSVOA_U\Method\524U021025DW.M
Title : METHOD 524.2 VOLATILES DRINKING WATER
Last Update : Tue Feb 11 08:42:19 2025



AutoFind: Scans 2902, 2903, 2904; Background Corrected with Scan 2889

Target	Rel. to	Lower	Upper	Rel.	Raw	Result
Mass	Mass	Limit%	Limit%	Abn%	Abn	Pass/Fail
50	95	15	40	18.9	22621	PASS
75	95	30	60	52.0	62235	PASS
95	95	100	100	100.0	119757	PASS
96	95	5	9	6.3	7557	PASS
173	174	0.00	2	0.8	738	PASS
174	95	50	100	77.3	92515	PASS
175	174	5	9	7.4	6861	PASS
176	174	95	101	96.2	88989	PASS
177	176	5	9	6.5	5816	PASS

Report of Analysis

Client:	Chemtech Consulting Group	Date Collected:	
Project:	NJ Drinking Water PT	Date Received:	
Client Sample ID:	VU0211WBL01	SDG No.:	Q1172
Lab Sample ID:	VU0211WBL01	Matrix:	Water
Analytical Method:	E524.2	% Solid:	0
Sample Wt/Vol:	25 Units: mL	Final Vol:	25000 uL
Soil Aliquot Vol:	uL	Test:	VOCMS Group4
GC Column:	DB-624UI ID : 0.18	Level :	LOW
Prep Method :			

File ID/Qc Batch:	Dilution:	Prep Date	Date Analyzed	Prep Batch ID
VU063229.D	1		02/11/25 11:14	VU021125

CAS Number	Parameter	Conc.	Qualifier	MDL	LOQ / CRQL	Units
TARGETS						
67-66-3	Chloroform	0.13	U	0.13	0.50	ug/L
75-27-4	Bromodichloromethane	0.12	U	0.12	0.50	ug/L
124-48-1	Dibromochloromethane	0.13	U	0.13	0.50	ug/L
75-25-2	Bromoform	0.14	U	0.14	0.50	ug/L
SURROGATES						
2199-69-1	1,2-Dichlorobenzene-d4	0.82		70 - 130	82%	SPK: 1
460-00-4	4-Bromofluorobenzene	0.81		70 - 130	81%	SPK: 1
INTERNAL STANDARDS						
462-06-6	Fluorobenzene	52200	6.107			

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_U\Data\VU021125\
Data File : VU063229.D
Acq On : 11 Feb 2025 11:14
Operator : MD/SY
Sample : VU0211WBL01
Misc : 25.0mL/MSVOA_U/WATER
ALS Vial : 6 Sample Multiplier: 1

Instrument :
MSVOA_U
ClientSampleId :
VU0211WBL01

Quant Time: Feb 12 03:16:36 2025
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_U\Method\524U021025DW.M
Quant Title : METHOD 524.2 VOLATILES DRINKING WATER
QLast Update : Tue Feb 11 08:42:19 2025
Response via : Initial Calibration

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

Internal Standards						
1) Fluorobenzene	6.107	96	52216	1.000	ug/l	# 0.00
System Monitoring Compounds						
57) 4-Bromofluorobenzene	10.627	95	13937	0.809	ug/l	0.00
Spiked Amount	1.000		Recovery	=	81.000%	
68) 1,2-Dichlorobenzene-d4	12.187	152	14680	0.820	ug/l	0.00
Spiked Amount	1.000		Recovery	=	82.000%	

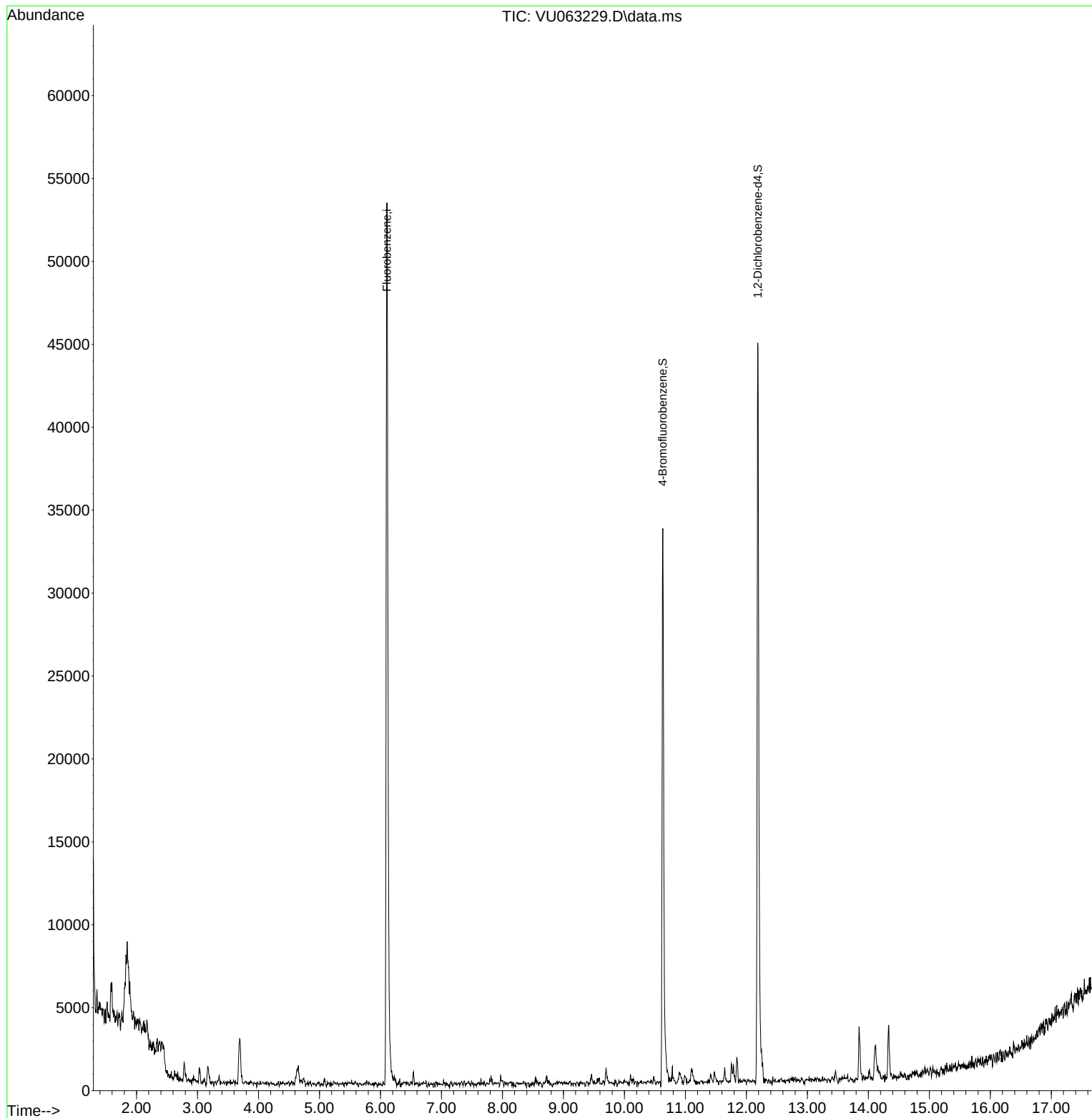
Target Compounds	Qvalue

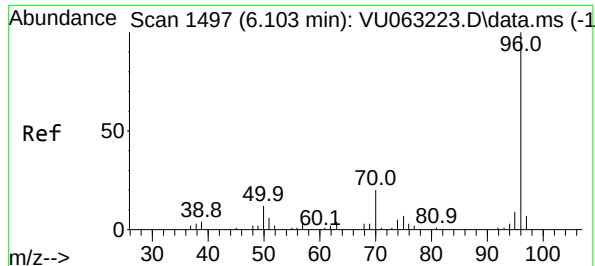
(#) = qualifier out of range (m) = manual integration (+) = signals summed

Data Path : Z:\voasrv\HPCHEM1\MSVOA_U\Data\VU021125\
Data File : VU063229.D
Acq On : 11 Feb 2025 11:14
Operator : MD/SY
Sample : VU0211WBL01
Misc : 25.0mL/MSVOA_U/WATER
ALS Vial : 6 Sample Multiplier: 1

Instrument :
MSVOA_U
ClientSampleId :
VU0211WBL01

Quant Time: Feb 12 03:16:36 2025
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_U\Method\524U021025DW.M
Quant Title : METHOD 524.2 VOLATILES DRINKING WATER
QLast Update : Tue Feb 11 08:42:19 2025
Response via : Initial Calibration

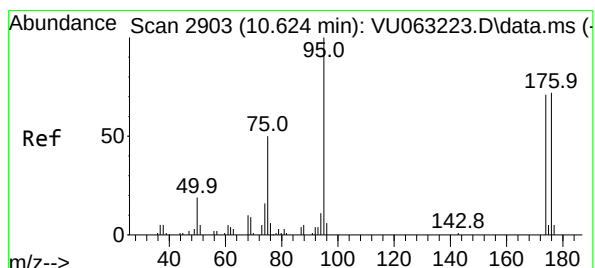
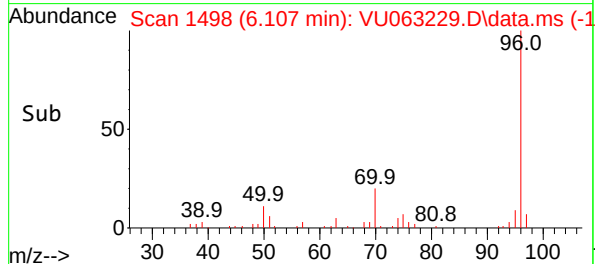
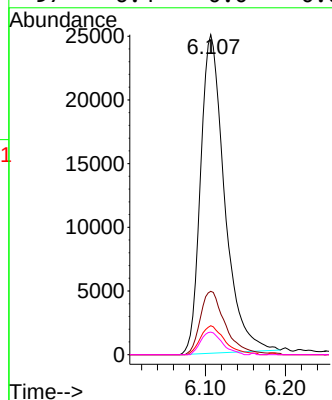
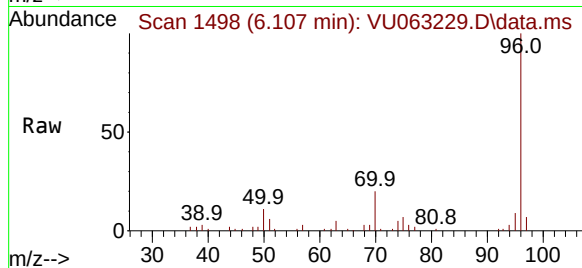




#1
Fluorobenzene
Concen: 1.000 ug/l
RT: 6.107 min Scan# 1497
Delta R.T. 0.004 min
Lab File: VU063229.D
Acq: 11 Feb 2025 11:14

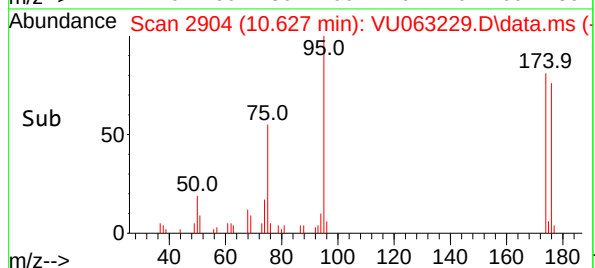
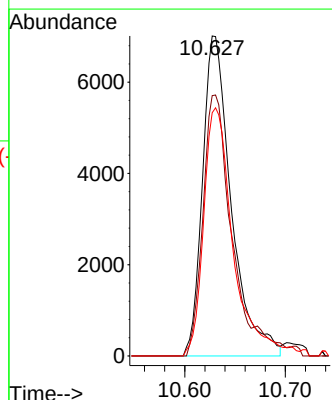
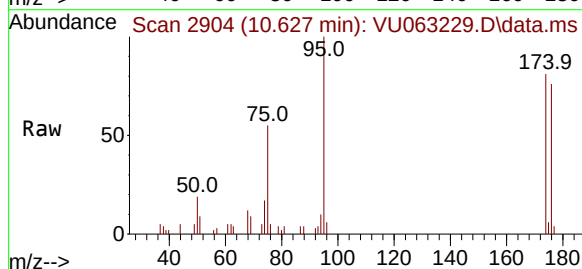
Instrument :
MSVOA_U
ClientSampleId :
VU0211WBL01

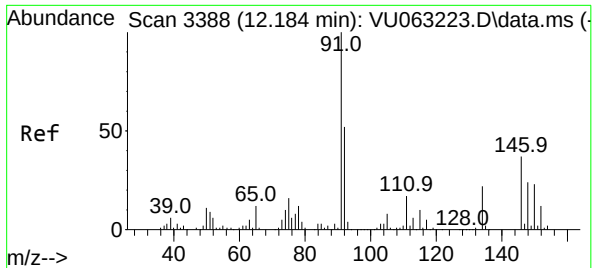
Tgt Ion: 96	Resp: 52216
Ion Ratio	Lower Upper
96 100	
70 20.0	15.6 23.4
95 9.2	7.3 10.9
97 6.4	0.0 0.0#



#57
4-Bromofluorobenzene
Concen: 0.809 ug/l
RT: 10.627 min Scan# 2904
Delta R.T. 0.003 min
Lab File: VU063229.D
Acq: 11 Feb 2025 11:14

Tgt Ion: 95	Resp: 13937
Ion Ratio	Lower Upper
95 100	
174 82.6	58.6 88.0
176 80.1	58.2 87.4





#68

1,2-Dichlorobenzene-d4

Concen: 0.820 ug/l

RT: 12.187 min Scan# 31

Delta R.T. 0.003 min

Lab File: VU063229.D

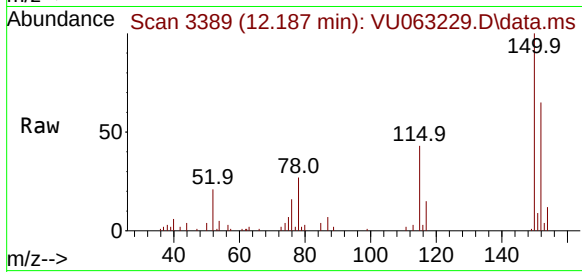
Acq: 11 Feb 2025 11:14

Instrument :

MSVOA_U

ClientSampleId :

VU0211WBL01



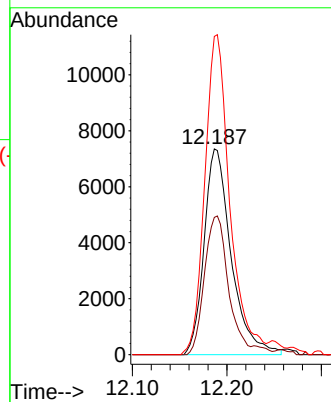
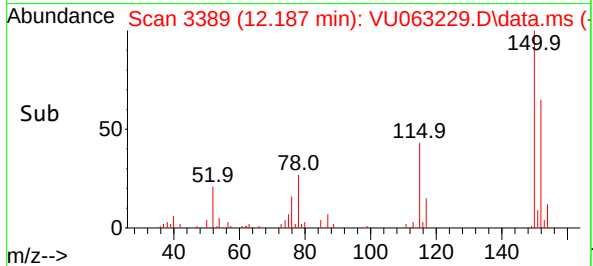
Tgt Ion:152 Resp: 14680

Ion Ratio Lower Upper

152 100

115 61.4 0.0 275.2

150 143.3 0.0 658.4



Report of Analysis

Client:	Chemtech Consulting Group	Date Collected:	
Project:	NJ Drinking Water PT	Date Received:	
Client Sample ID:	VU0211WBS01	SDG No.:	Q1172
Lab Sample ID:	VU0211WBS01	Matrix:	Water
Analytical Method:	E524.2	% Solid:	0
Sample Wt/Vol:	25 Units: mL	Final Vol:	25000 uL
Soil Aliquot Vol:	uL	Test:	VOCMS Group4
GC Column:	DB-624UI ID : 0.18	Level :	LOW
Prep Method :			

File ID/Qc Batch:	Dilution:	Prep Date	Date Analyzed	Prep Batch ID
VU063230.D	1		02/11/25 12:07	VU021125

CAS Number	Parameter	Conc.	Qualifier	MDL	LOQ / CRQL	Units
TARGETS						
67-66-3	Chloroform	2.00		0.13	0.50	ug/L
75-27-4	Bromodichloromethane	2.00		0.12	0.50	ug/L
124-48-1	Dibromochloromethane	2.00		0.13	0.50	ug/L
75-25-2	Bromoform	1.90		0.14	0.50	ug/L
SURROGATES						
2199-69-1	1,2-Dichlorobenzene-d4	0.94		70 - 130	94%	SPK: 1
460-00-4	4-Bromofluorobenzene	0.98		70 - 130	98%	SPK: 1
INTERNAL STANDARDS						
462-06-6	Fluorobenzene	55400	6.106			

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_U\Data\VU021125\
 Data File : VU063230.D
 Acq On : 11 Feb 2025 12:07
 Operator : MD/SY
 Sample : VU0211WBS01
 Misc : 25.0mL/MSVOA_U/WATER
 ALS Vial : 7 Sample Multiplier: 1

Instrument :
 MSVOA_U
 ClientSampleId :
 VU0211WBS01

Manual Integrations
 APPROVED

Reviewed By :Amit Patel 02/12/2025
 Supervised By :Mahesh Dadoda 02/12/2025

Quant Time: Feb 12 03:16:55 2025
 Quant Method : Z:\voasrv\HPCHEM1\MSVOA_U\Method\524U021025DW.M
 Quant Title : METHOD 524.2 VOLATILES DRINKING WATER
 QLast Update : Tue Feb 11 08:42:19 2025
 Response via : Initial Calibration

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

Internal Standards						
1) Fluorobenzene	6.106	96	55425	1.000	ug/l	# 0.00
System Monitoring Compounds						
57) 4-Bromofluorobenzene	10.627	95	17934	0.981	ug/l	0.00
Spiked Amount 1.000			Recovery	=	98.000%	
68) 1,2-Dichlorobenzene-d4	12.187	152	17795	0.936	ug/l	0.00
Spiked Amount 1.000			Recovery	=	94.000%	
Target Compounds						
					Qvalue	
2) Dichlorodifluoromethane	1.380	85	34881	1.937	ug/l	100
3) Chloromethane	1.515	50	39366	1.898	ug/l	98
4) Vinyl Chloride	1.599	62	40631	1.980	ug/l	100
5) Bromomethane	1.849	94	22200	2.214	ug/l	98
6) Chloroethane	1.923	64	25320	1.959	ug/l	98
7) Trichlorofluoromethane	2.129	101	50024	2.057	ug/l	97
8) 1,1,2-Trichloro-1,2,2-...	2.570	101	27957	2.026	ug/l	100
9) 1,1-Dichloroethene	2.570	96	28143	2.001	ug/l	98
10) Iodomethane	2.711	142	42948	1.943	ug/l	96
11) Allyl Chloride	2.914	41	38956	1.928	ug/l	99
12) Acrylonitrile	3.325	53	11706	3.609	ug/l	97
13) Acetone	2.631	43	22228	8.913	ug/l	95
14) Carbon Disulfide	2.782	76	97781	1.989	ug/l	99
15) Methylene Chloride	3.033	84	32623	1.878	ug/l	99
16) trans-1,2-Dichloroethene	3.345	96	31649	1.972	ug/l	95
17) 1,1-Dichloroethane	3.856	63	58713	1.941	ug/l	100
18) 2-Butanone	4.714	43	35261	8.884	ug/l	94
19) Cyclohexane	5.373	56	47343m	1.948	ug/l	
20) Methylcyclohexane	6.753	83	49192	2.041	ug/l	98
21) 2,2-Dichloropropane	4.650	77	46690	1.978	ug/l	99
22) cis-1,2-Dichloroethene	4.656	96	33572	1.936	ug/l	99
23) Diethyl Ether	2.367	59	22508	1.865	ug/l	92
24) tert-Butyl Alcohol	3.200	59	20238m	10.598	ug/l	
25) Methyl tert-Butyl Ether	3.351	73	66762	1.901	ug/l	97
26) Bromochloromethane	4.962	128	14812	1.954	ug/l	97
27) Chloroform	5.078	83	60066	1.968	ug/l	95
28) 1,1,1-Trichloroethane	5.306	97	48266	1.952	ug/l	99
29) 1,1-Dichloropropene	5.518	75	44151	1.993	ug/l	99
30) Carbon Tetrachloride	5.515	117	43154	2.035	ug/l	97
31) Isopropyl Ether	3.978	45	82853	1.918	ug/l	99
32) Ethyl-t-butyl ether	4.486	59	75741	1.929	ug/l	100
33) Tert-Amyl methyl ether	5.930	73	65301	1.903	ug/l	98
34) Propionitrile	4.785	54	10600	8.855	ug/l #	87
35) Benzene	5.762	78	132307	1.943	ug/l	96
36) 1,2-Dichloroethane	5.785	62	38000	1.933	ug/l	99
37) Trichloroethene	6.534	130	33039	2.040	ug/l	98
38) 1,2-Dichloropropane	6.782	63	34557	1.939	ug/l	97
39) Methacrylonitrile	4.975	41	8038	1.802	ug/l #	86
40) Methyl acrylate	4.865	55	15318m	1.863	ug/l	
41) Tetrahydrofuran	5.058	42	8769	3.380	ug/l	95
42) 1-Chlorobutane	5.447	56	58303	1.924	ug/l	95
43) Dibromomethane	6.914	93	17206	1.906	ug/l	99
44) Bromodichloromethane	7.097	83	41643	1.982	ug/l	98

Data Path : Z:\voasrv\HPCHEM1\MSVOA_U\Data\VU021125\
 Data File : VU063230.D
 Acq On : 11 Feb 2025 12:07
 Operator : MD/SY
 Sample : VU0211WBS01
 Misc : 25.0mL/MSVOA_U/WATER
 ALS Vial : 7 Sample Multiplier: 1

Instrument :
 MSVOA_U
 ClientSampleId :
 VU0211WBS01

Manual Integrations APPROVED

Reviewed By :Amit Patel 02/12/2025
 Supervised By :Mahesh Dadoda 02/12/2025

Quant Time: Feb 12 03:16:55 2025
 Quant Method : Z:\voasrv\HPCHEM1\MSVOA_U\Method\524U021025DW.M
 Quant Title : METHOD 524.2 VOLATILES DRINKING WATER
 QLast Update : Tue Feb 11 08:42:19 2025
 Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
45) 4-Methyl-2-Pentanone	7.785	43	89316	9.439	ug/l	99
46) t-1,4-Dichloro-2-butene	10.820	75	18247m	4.102	ug/l	
47) Methyl methacrylate	6.955	69	27667	3.639	ug/l	94
48) Ethyl methacrylate	8.328	69	26252	1.839	ug/l	99
49) Toluene	7.962	92	78140	1.995	ug/l	99
50) t-1,3-Dichloropropene	8.206	75	37997	1.976	ug/l	97
51) cis-1,3-Dichloropropene	7.598	75	46394	1.953	ug/l	98
52) 1,1,2-Trichloroethane	8.389	97	23627	1.941	ug/l	97
53) 1,3-Dichloropropane	8.566	76	41879	1.938	ug/l	99
54) 2-Hexanone	8.682	43	58847	9.113	ug/l	98
55) Dibromochloromethane	8.801	129	27354	1.954	ug/l	99
56) 1,2-Dibromoethane	8.917	107	22029	1.930	ug/l	99
58) Tetrachloroethene	8.544	164	27268	2.043	ug/l	97
59) Chlorobenzene	9.438	112	81191	1.965	ug/l	98
60) 1,1,1,2-Tetrachloroethane	9.524	131	28863	1.943	ug/l	99
61) Pentachloroethane	11.418	117	24877	1.875	ug/l	96
62) Hexachloroethane	12.466	117	21187	1.805	ug/l	99
63) Ethyl Benzene	9.563	91	137062	1.923	ug/l	100
64) m/p-Xylenes	9.685	106	104430	3.922	ug/l	97
65) o-Xylene	10.090	106	49629	1.904	ug/l	97
66) Styrene	10.110	104	77051	1.858	ug/l	98
67) Bromoform	10.283	173	14840	1.868	ug/l	99
69) Isopropylbenzene	10.476	105	119341	1.948	ug/l	99
70) 1,1,2,2-Tetrachloroethane	10.772	83	30580	1.864	ug/l	98
71) 1,2,3-Trichloropropane	10.814	75	24894m	2.020	ug/l	
72) Bromobenzene	10.775	156	32516	1.969	ug/l	98
73) n-propylbenzene	10.897	120	34231	1.951	ug/l	97
74) 2-Chlorotoluene	10.978	126	32733	2.025	ug/l	98
75) 1,3,5-Trimethylbenzene	11.081	105	111469	1.963	ug/l	100
76) 4-Chlorotoluene	11.090	126	32504	1.960	ug/l	99
77) tert-Butylbenzene	11.412	119	111932	1.949	ug/l	99
78) 1,2,4-Trimethylbenzene	11.460	105	105544	1.873	ug/l	100
79) sec-Butylbenzene	11.634	105	143488	1.963	ug/l	99
80) Nitrobenzene	13.225	77	2628m	8.833	ug/l	
81) p-Isopropyltoluene	11.785	119	110271	1.911	ug/l	99
82) 1,3-Dichlorobenzene	11.740	146	61914	1.933	ug/l	99
83) 1,4-Dichlorobenzene	11.830	146	61090	1.950	ug/l	99
84) n-Butylbenzene	12.199	91	95124	1.839	ug/l	99
85) 1,2-Dichlorobenzene	12.206	146	59757	1.942	ug/l	97
86) 1,2-Dibromo-3-Chloropr...	12.990	75	4088	1.776	ug/l	98
87) 1,2,4-Trichlorobenzene	13.836	180	28591	1.905	ug/l	99
88) Hexachlorobutadiene	14.010	225	21893	2.041	ug/l	97
89) Naphthalene	14.084	128	41131	1.883	ug/l	96
90) 1,2,3-Trichlorobenzene	14.322	180	26648	1.815	ug/l	98

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

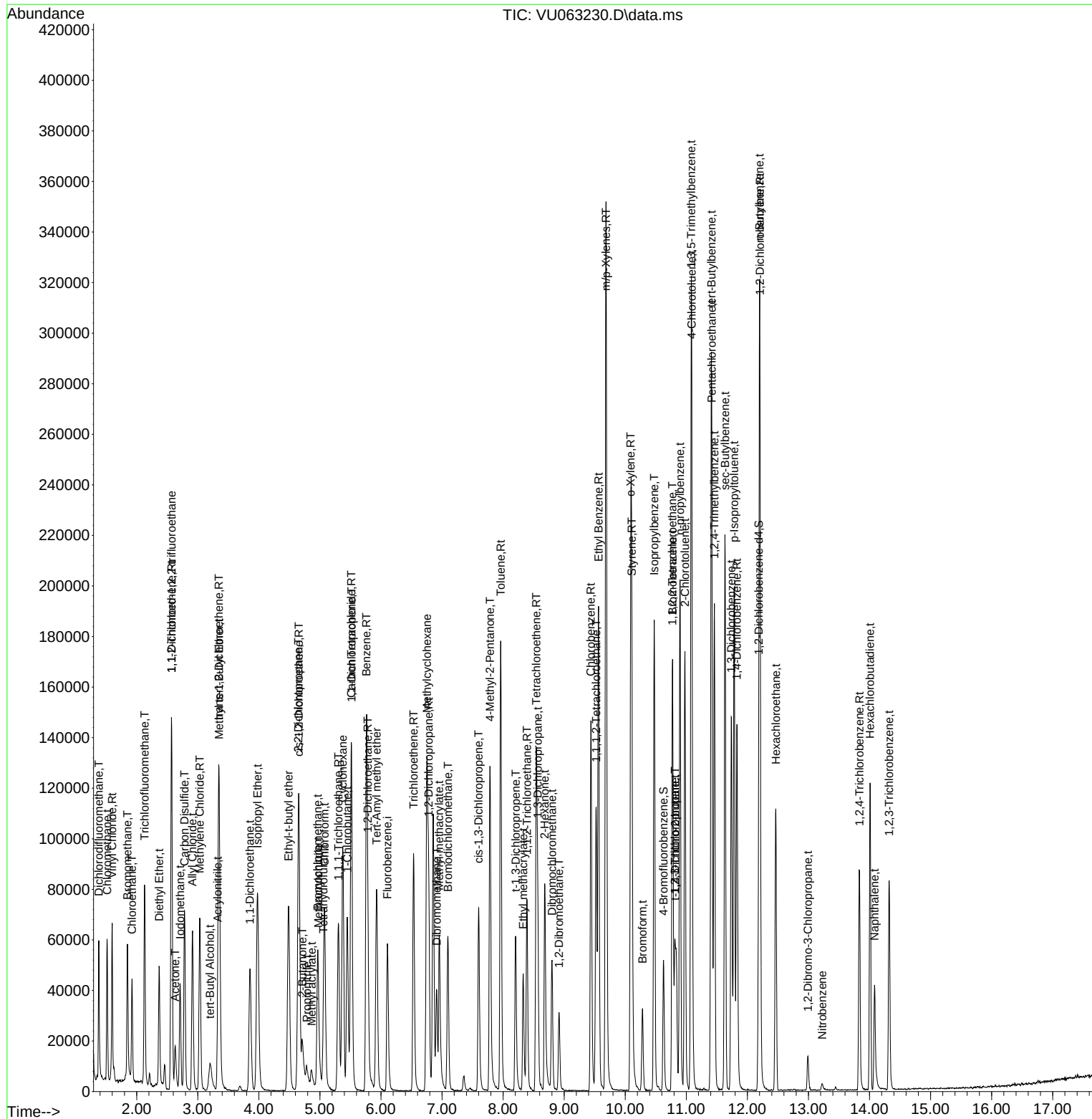
Data Path : Z:\voasrv\HPCHEM1\MSVOA_U\Data\VU021125\
 Data File : VU063230.D
 Acq On : 11 Feb 2025 12:07
 Operator : MD/SY
 Sample : VU0211WBS01
 Misc : 25.0mL/MSVOA_U/WATER
 ALS Vial : 7 Sample Multiplier: 1

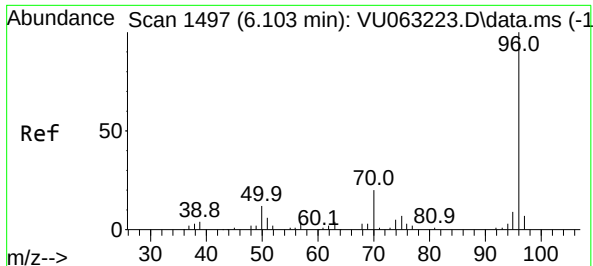
Instrument :
 MSVOA_U
 ClientSampleId :
 VU0211WBS01

Manual Integrations
 APPROVED

Reviewed By :Amit Patel 02/12/2025
 Supervised By :Mahesh Dadoda 02/12/2025

Quant Time: Feb 12 03:16:55 2025
 Quant Method : Z:\voasrv\HPCHEM1\MSVOA_U\Method\524U021025DW.M
 Quant Title : METHOD 524.2 VOLATILES DRINKING WATER
 QLast Update : Tue Feb 11 08:42:19 2025
 Response via : Initial Calibration





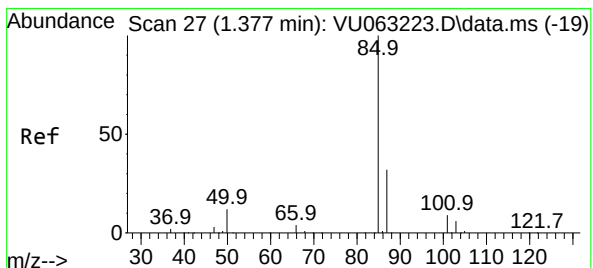
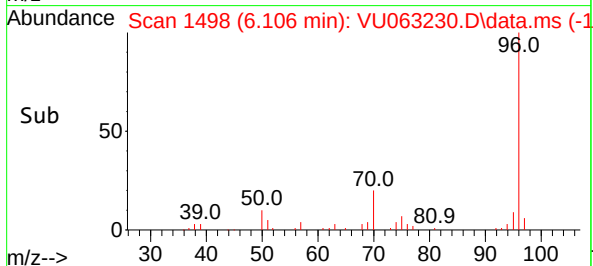
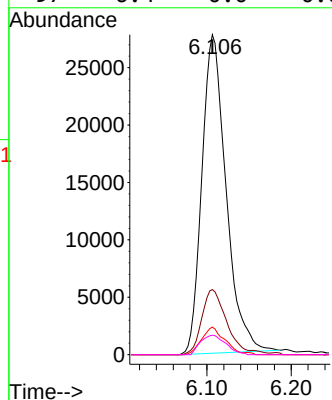
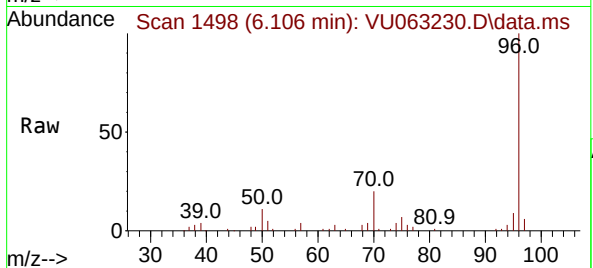
#1
Fluorobenzene
Concen: 1.000 ug/l
RT: 6.106 min Scan# 14
Delta R.T. 0.003 min
Lab File: VU063230.D
Acq: 11 Feb 2025 12:07

Instrument :
MSVOA_U
ClientSampleId :
VU0211WBS01

Tgt Ion:	96	Resp:	5542
Ion	Ratio	Lower	Upper
96	100		
70	20.4	15.6	23.4
95	8.4	7.3	10.9
97	6.4	0.0	0.0

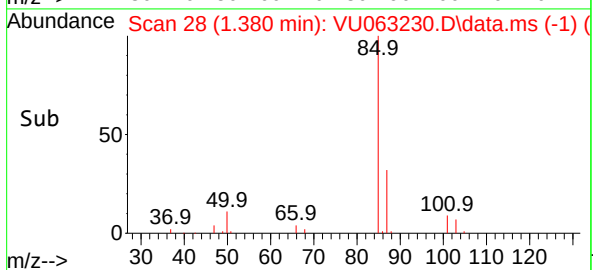
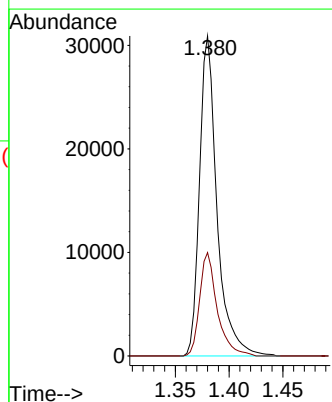
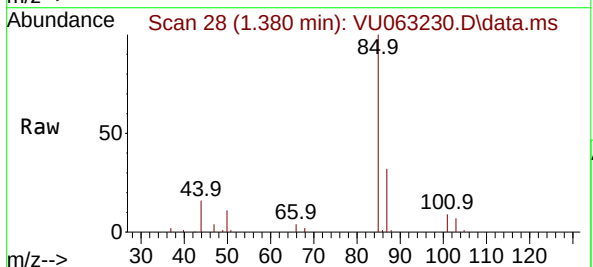
Manual Integrations
APPROVED

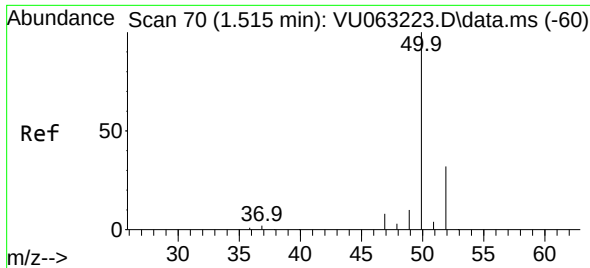
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#2
Dichlorodifluoromethane
Concen: 1.937 ug/l
RT: 1.380 min Scan# 28
Delta R.T. 0.003 min
Lab File: VU063230.D
Acq: 11 Feb 2025 12:07

Tgt Ion:	85	Resp:	34881
Ion	Ratio	Lower	Upper
85	100		
87	32.3	16.0	48.0





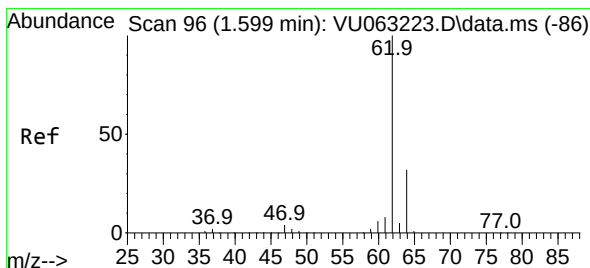
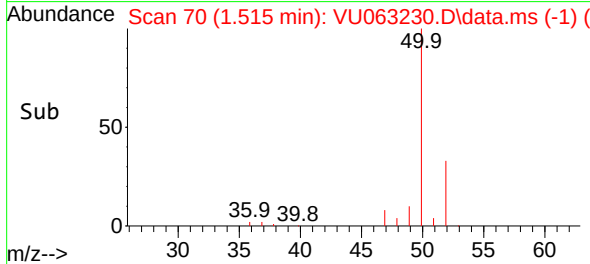
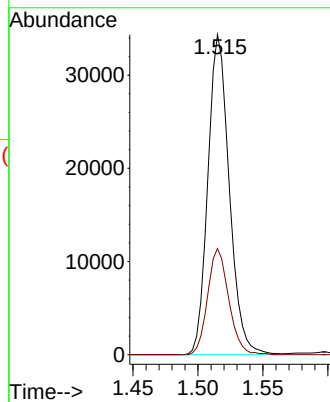
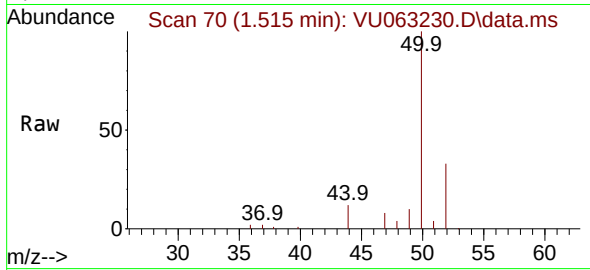
#3
Chloromethane
Concen: 1.898 ug/l
RT: 1.515 min Scan# 70
Delta R.T. -0.000 min
Lab File: VU063230.D
Acq: 11 Feb 2025 12:07

Instrument :
MSVOA_U
ClientSampleId :
VU0211WBS01

Tgt Ion: 50 Resp: 39360
Ion Ratio Lower Upper
50 100
52 33.2 25.8 38.8

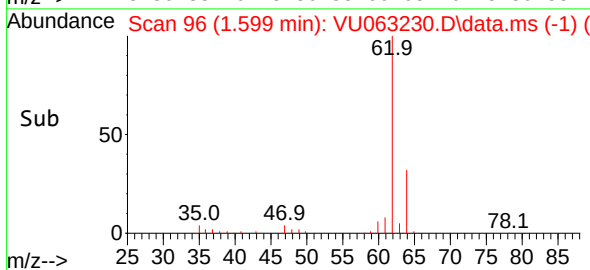
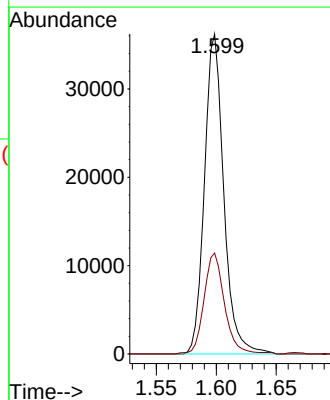
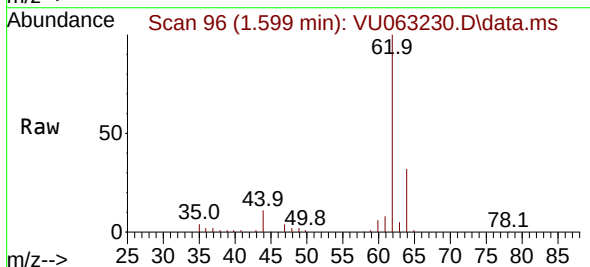
Manual Integrations
APPROVED

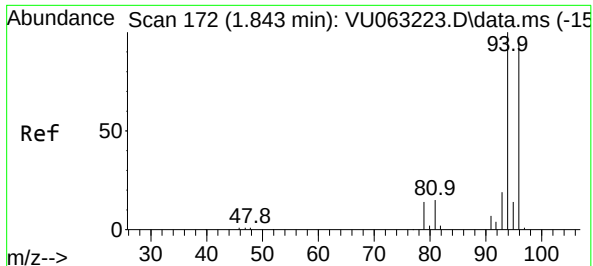
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#4
Vinyl Chloride
Concen: 1.980 ug/l
RT: 1.599 min Scan# 96
Delta R.T. -0.000 min
Lab File: VU063230.D
Acq: 11 Feb 2025 12:07

Tgt Ion: 62 Resp: 40631
Ion Ratio Lower Upper
62 100
64 31.6 25.4 38.0





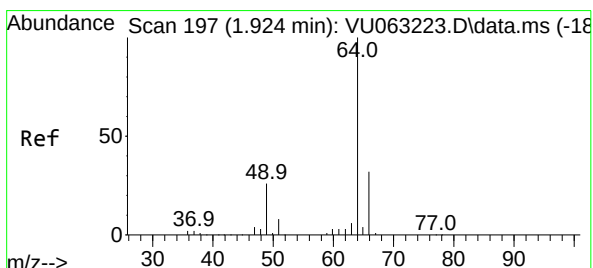
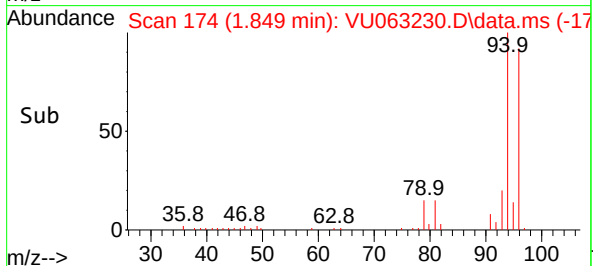
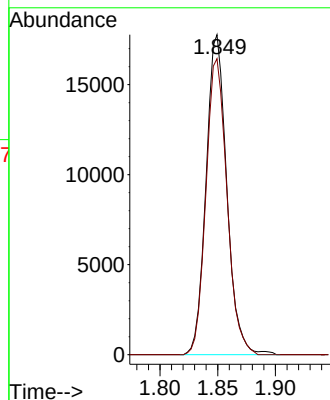
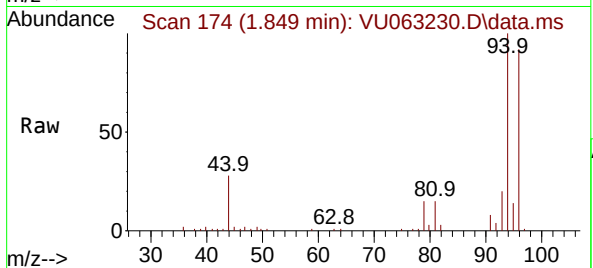
#5
Bromomethane
Concen: 2.214 ug/l
RT: 1.849 min Scan# 172
Delta R.T. 0.006 min
Lab File: VU063230.D
Acq: 11 Feb 2025 12:07

Instrument :
MSVOA_U
ClientSampleId :
VU0211WBS01

Tgt Ion: 94 Resp: 22200
Ion Ratio Lower Upper
94 100
96 92.5 75.7 113.5

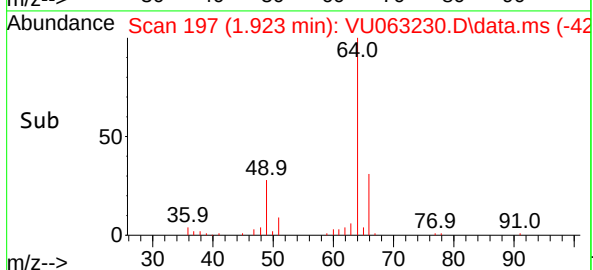
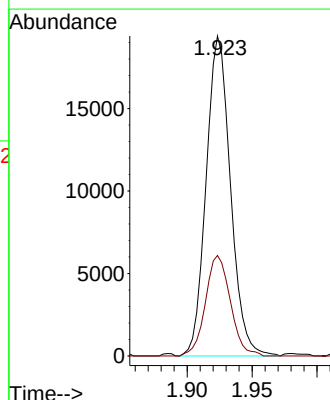
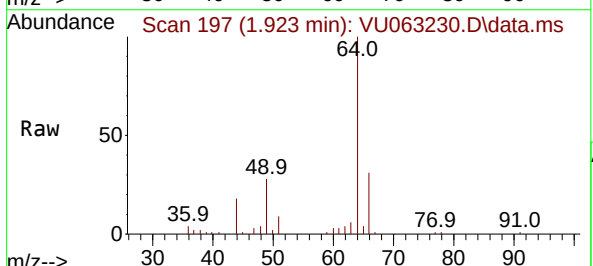
Manual Integrations
APPROVED

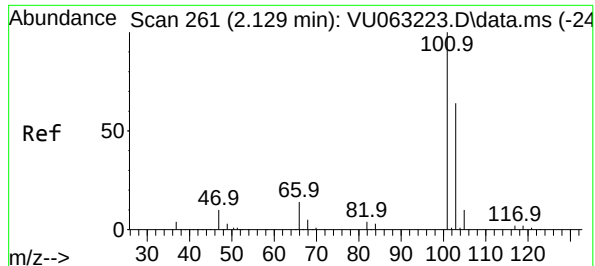
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#6
Chloroethane
Concen: 1.959 ug/l
RT: 1.923 min Scan# 197
Delta R.T. -0.000 min
Lab File: VU063230.D
Acq: 11 Feb 2025 12:07

Tgt Ion: 64 Resp: 25320
Ion Ratio Lower Upper
64 100
66 31.4 25.8 38.8





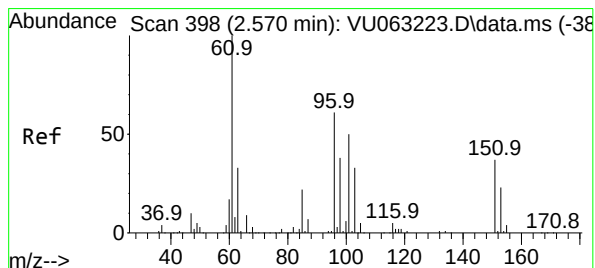
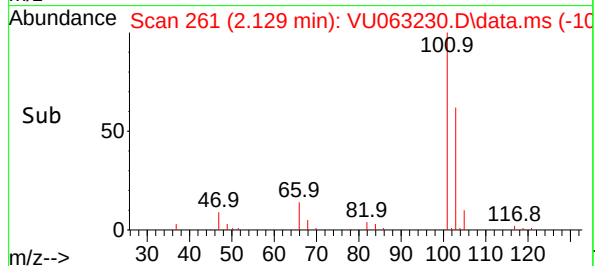
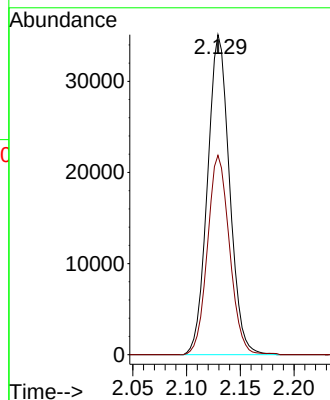
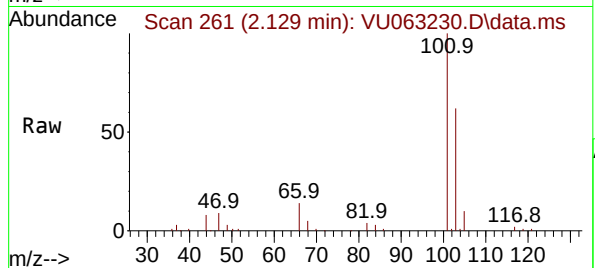
#7
Trichlorofluoromethane
Concen: 2.057 ug/l
RT: 2.129 min Scan# 20
Delta R.T. -0.000 min
Lab File: VU063230.D
Acq: 11 Feb 2025 12:07

Instrument :
MSVOA_U
ClientSampleId :
VU0211WBS01

Tgt Ion:101 Resp: 50024
Ion Ratio Lower Upper
101 100
103 62.3 51.4 77.2

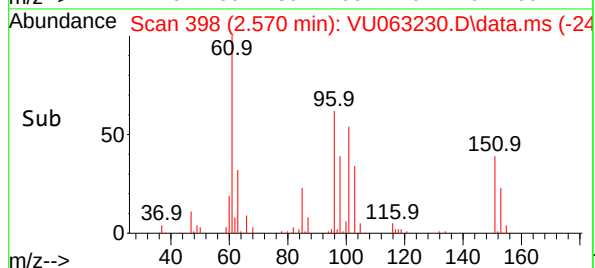
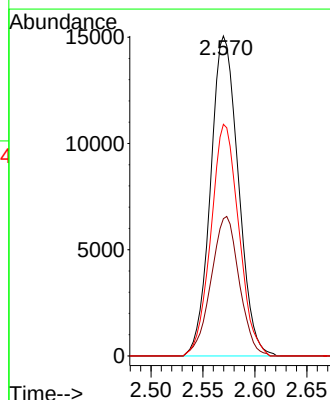
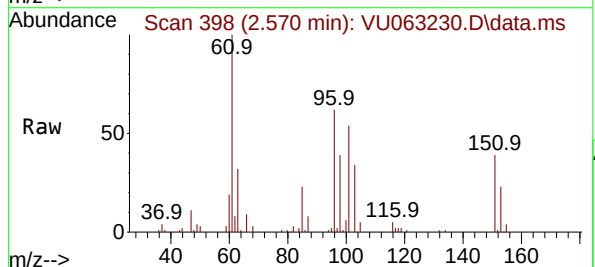
Manual Integrations
APPROVED

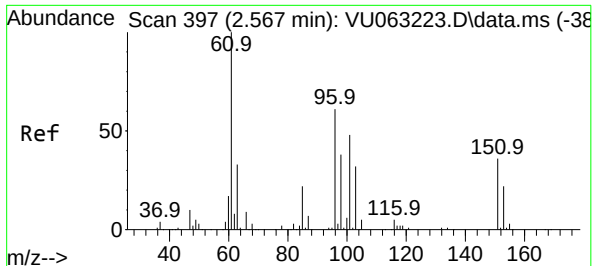
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#8
1,1,2-Trichloro-1,2,2-trifluoroethane
Concen: 2.026 ug/l
RT: 2.570 min Scan# 398
Delta R.T. -0.000 min
Lab File: VU063230.D
Acq: 11 Feb 2025 12:07

Tgt Ion:101 Resp: 27957
Ion Ratio Lower Upper
101 100
85 44.4 35.4 53.0
151 72.8 58.5 87.7





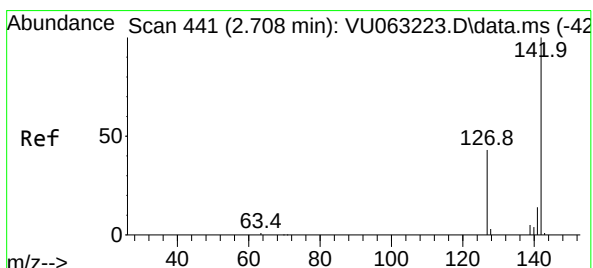
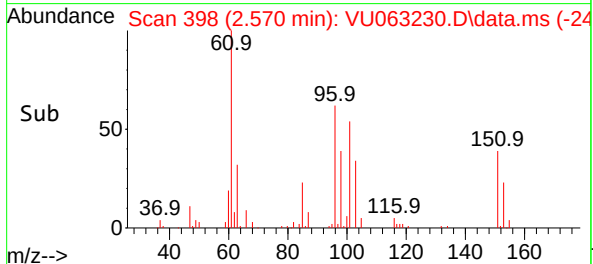
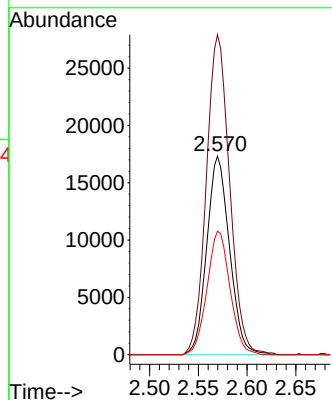
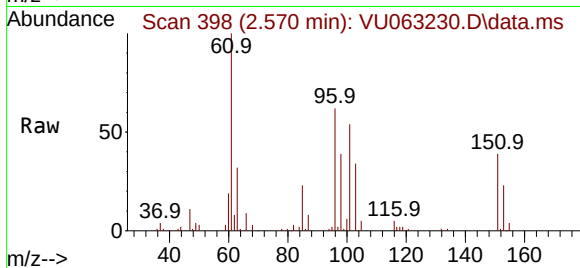
#9
1,1-Dichloroethene
Concen: 2.001 ug/l
RT: 2.570 min Scan# 397
Delta R.T. 0.003 min
Lab File: VU063230.D
Acq: 11 Feb 2025 12:07

Instrument :
MSVOA_U
ClientSampleId :
VU0211WBS01

Tgt Ion	Ratio	Lower	Upper
96	100		
61	161.2	0.0	492.9
98	62.2	0.0	124.0

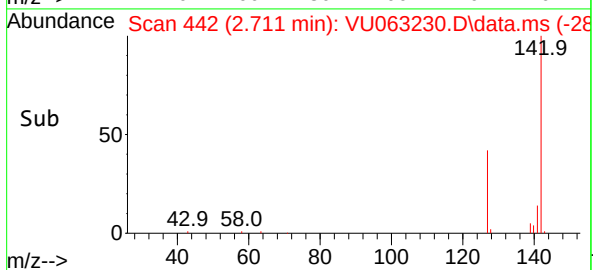
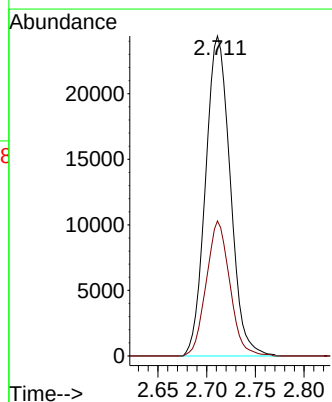
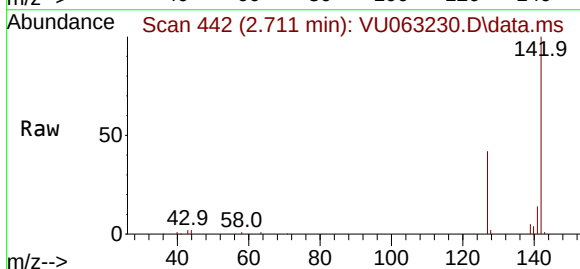
Manual Integrations
APPROVED

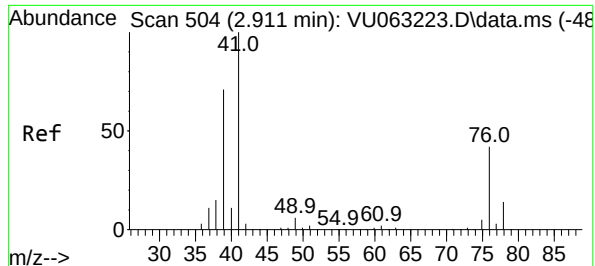
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#10
Iodomethane
Concen: 1.943 ug/l
RT: 2.711 min Scan# 442
Delta R.T. 0.003 min
Lab File: VU063230.D
Acq: 11 Feb 2025 12:07

Tgt Ion	Ratio	Lower	Upper
142	100		
127	40.3	34.5	51.7





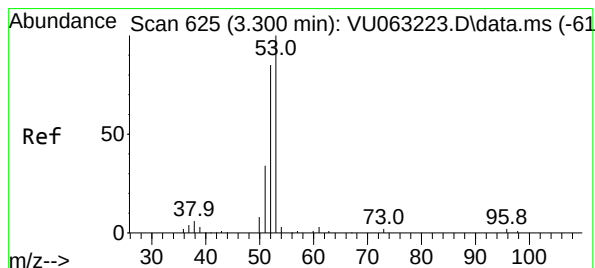
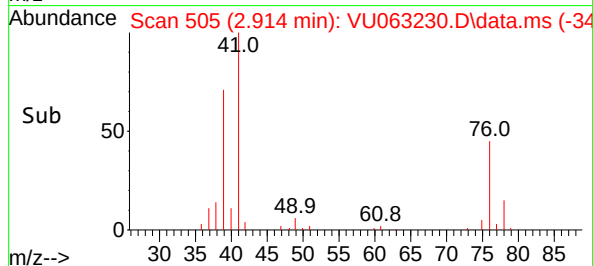
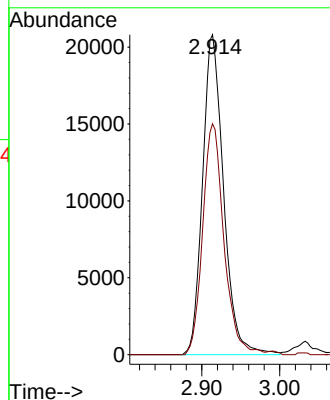
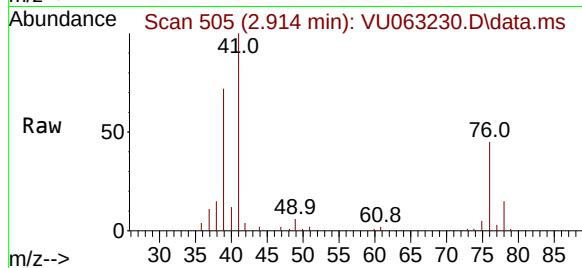
#11
Allyl Chloride
Concen: 1.928 ug/l
RT: 2.914 min Scan# 504
Delta R.T. 0.003 min
Lab File: VU063230.D
Acq: 11 Feb 2025 12:07

Instrument :
MSVOA_U
ClientSampleId :
VU0211WBS01

Tgt Ion: 41 Resp: 3895
Ion Ratio Lower Upper
41 100
39 72.8 57.9 86.9

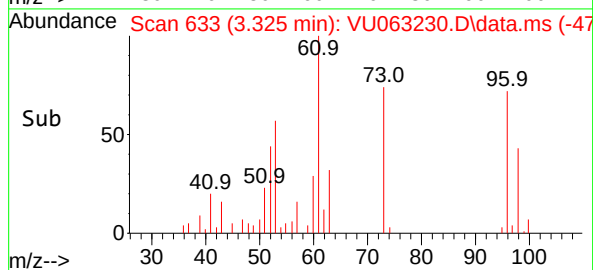
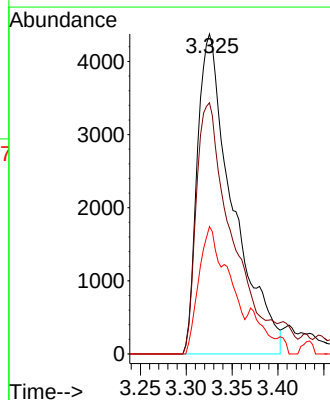
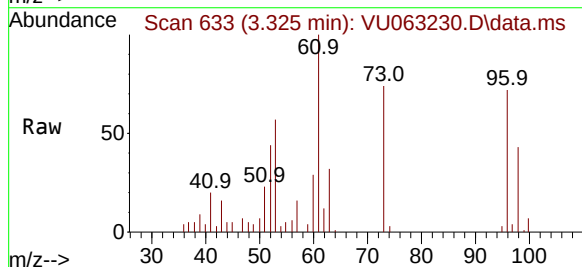
Manual Integrations
APPROVED

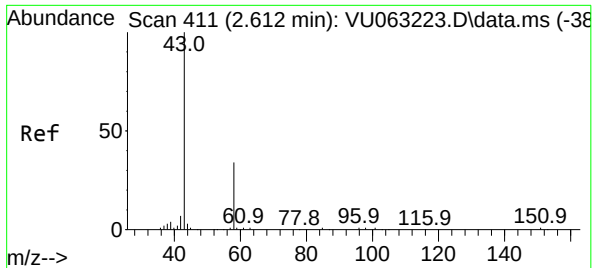
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#12
Acrylonitrile
Concen: 3.609 ug/l
RT: 3.325 min Scan# 633
Delta R.T. 0.026 min
Lab File: VU063230.D
Acq: 11 Feb 2025 12:07

Tgt Ion: 53 Resp: 11706
Ion Ratio Lower Upper
53 100
52 79.3 64.2 96.2
51 34.0 30.8 46.2





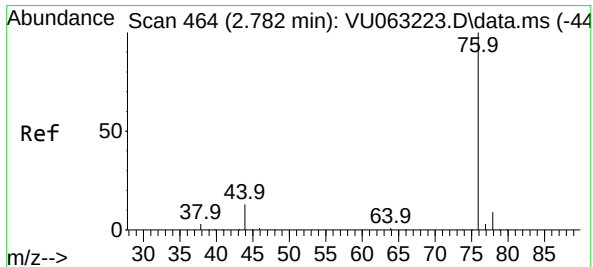
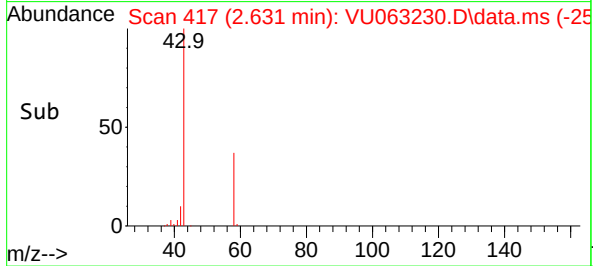
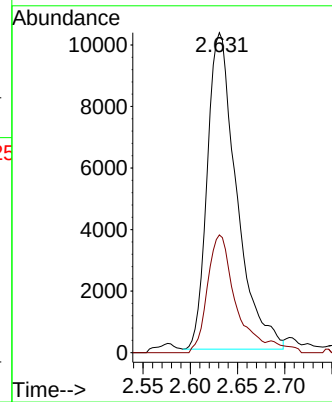
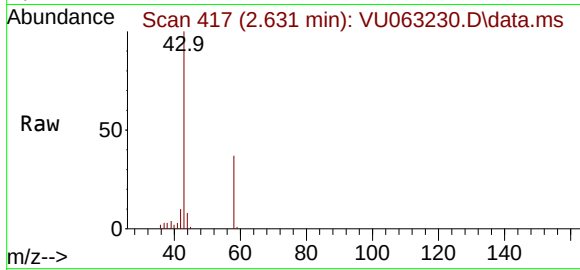
#13
Acetone
Concen: 8.913 ug/l
RT: 2.631 min Scan# 411
Delta R.T. 0.019 min
Lab File: VU063230.D
Acq: 11 Feb 2025 12:07

Instrument :
MSVOA_U
ClientSampleId :
VU0211WBS01

Tgt Ion: 43 Resp: 22228
Ion Ratio Lower Upper
43 100
58 37.2 27.4 41.0

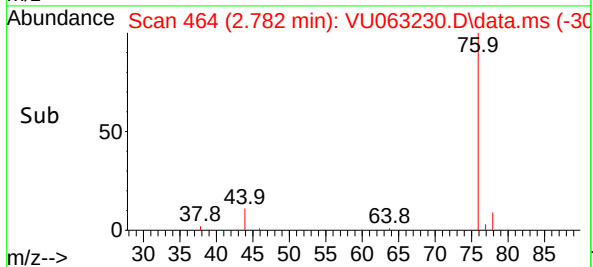
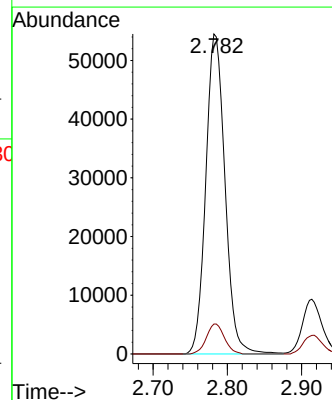
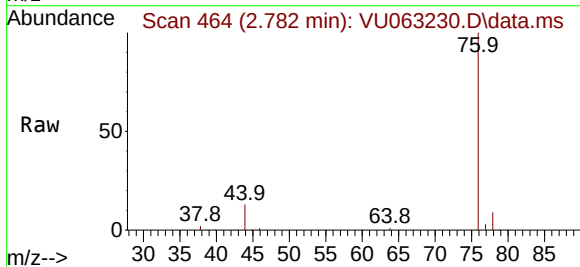
Manual Integrations
APPROVED

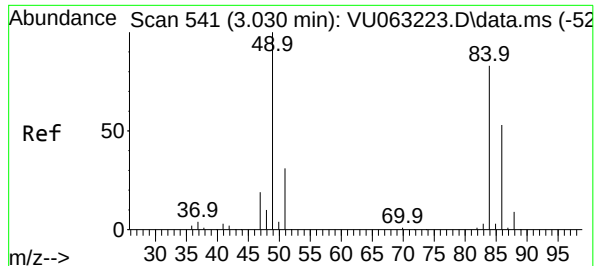
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#14
Carbon Disulfide
Concen: 1.989 ug/l
RT: 2.782 min Scan# 464
Delta R.T. -0.000 min
Lab File: VU063230.D
Acq: 11 Feb 2025 12:07

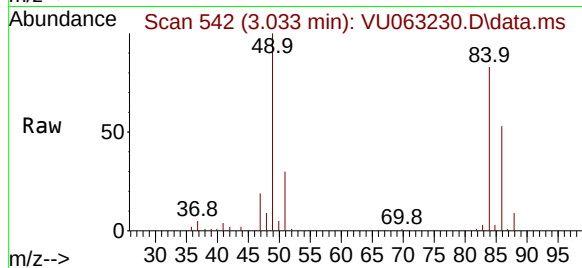
Tgt Ion: 76 Resp: 97781
Ion Ratio Lower Upper
76 100
78 9.3 7.2 10.8





#15
Methylene Chloride
Concen: 1.878 ug/l
RT: 3.033 min Scan# 541
Delta R.T. 0.003 min
Lab File: VU063230.D
Acq: 11 Feb 2025 12:07

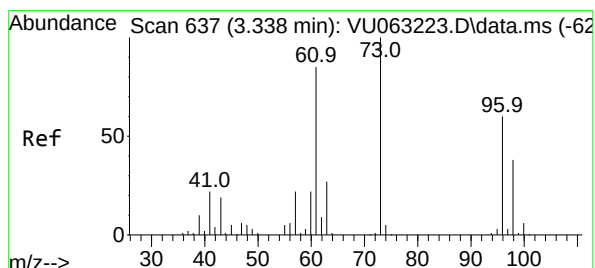
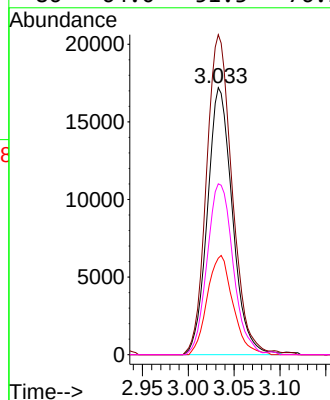
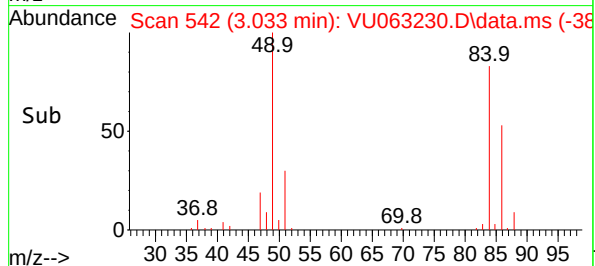
Instrument :
MSVOA_U
ClientSampleId :
VU0211WBS01



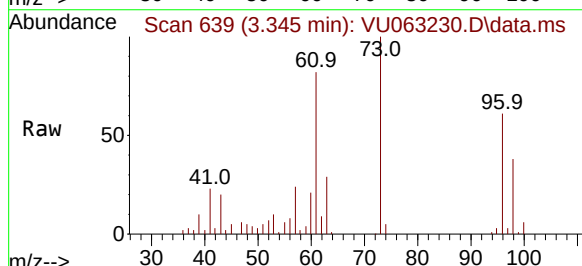
Tgt Ion: 84 Resp: 3262
Ion Ratio Lower Upper
84 100
49 119.9 96.4 144.6
51 36.1 0.0 74.8
86 64.0 51.3 76.9

Manual Integrations
APPROVED

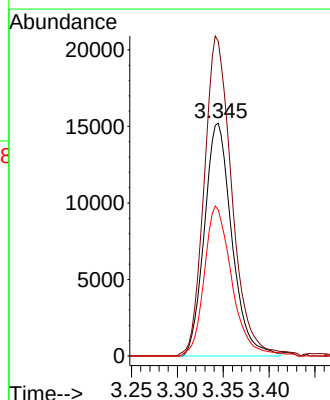
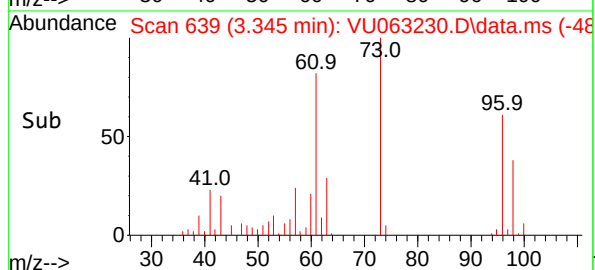
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025

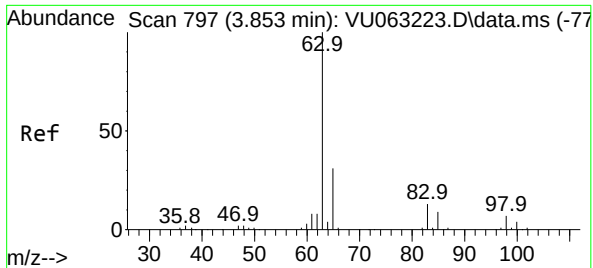


#16
trans-1,2-Dichloroethene
Concen: 1.972 ug/l
RT: 3.345 min Scan# 639
Delta R.T. 0.006 min
Lab File: VU063230.D
Acq: 11 Feb 2025 12:07



Tgt Ion: 96 Resp: 31649
Ion Ratio Lower Upper
96 100
61 134.1 113.4 170.2
98 62.7 51.2 76.8





#17

1,1-Dichloroethane

Concen: 1.941 ug/l

RT: 3.856 min Scan# 797

Delta R.T. 0.003 min

Lab File: VU063230.D

Acq: 11 Feb 2025 12:07

Instrument :

MSVOA_U

ClientSampleId :

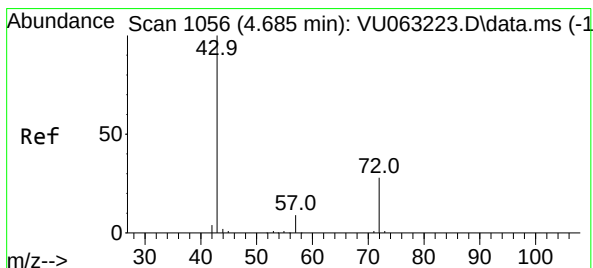
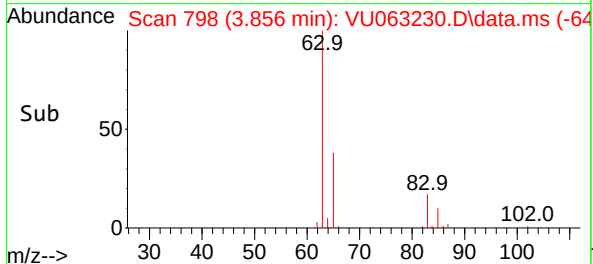
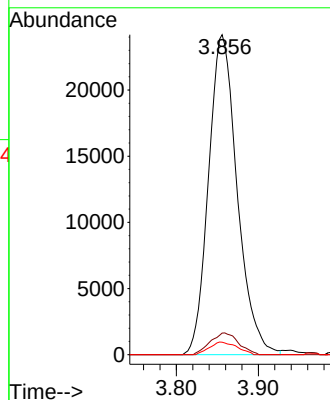
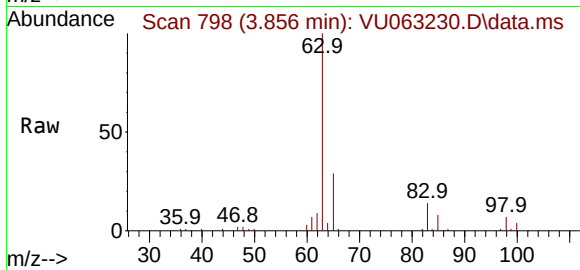
VU0211WBS01

Tgt Ion:	63	Resp:	5871
Ion Ratio	Lower	Upper	
63	100		
98	6.7	3.3	9.9
100	3.9	2.1	6.2

Manual Integrations
APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#18

2-Butanone

Concen: 8.884 ug/l

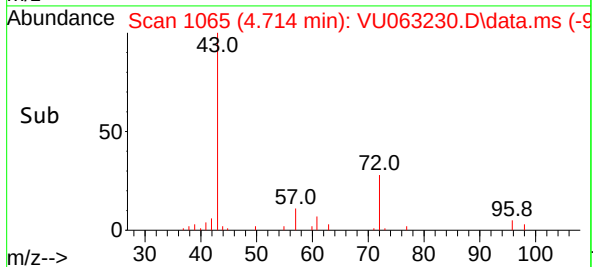
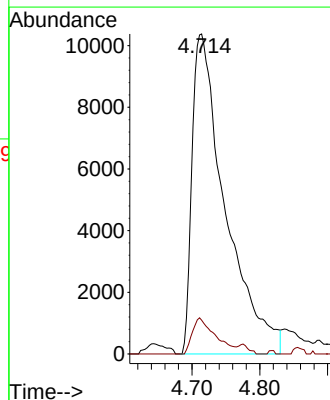
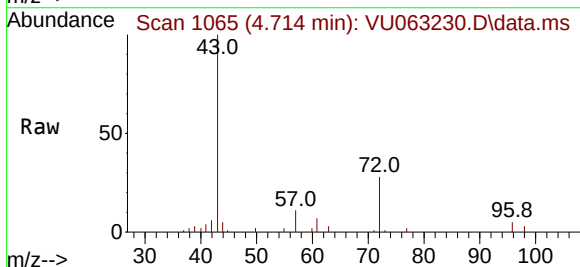
RT: 4.714 min Scan# 1065

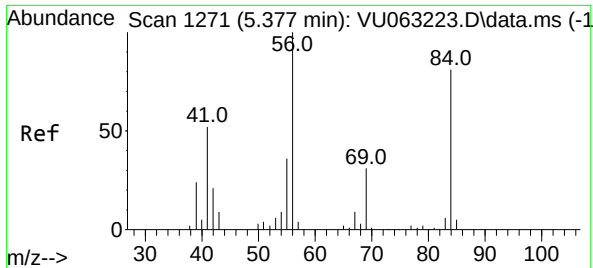
Delta R.T. 0.029 min

Lab File: VU063230.D

Acq: 11 Feb 2025 12:07

Tgt Ion:	43	Resp:	35261
Ion Ratio	Lower	Upper	
43	100		
57	10.6	0.0	17.0





#19

Cyclohexane

Concen: 1.948 ug/l m

RT: 5.373 min Scan# 1271

Delta R.T. -0.003 min

Lab File: VU063230.D

Acq: 11 Feb 2025 12:07

Instrument :

MSVOA_U

ClientSampleId :

VU0211WBS01

Tgt Ion: 56 Resp: 4734

Ion Ratio Lower Upper

56 100

69 31.1 24.5 36.7

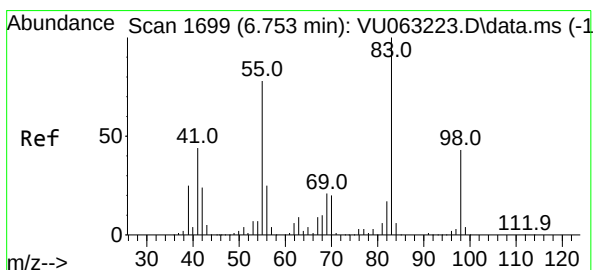
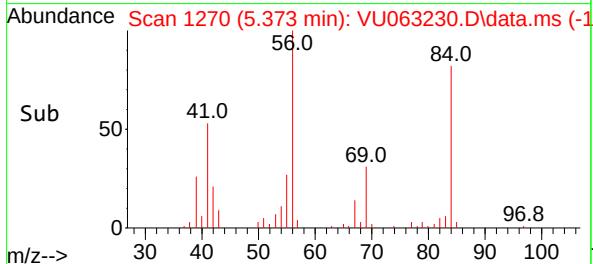
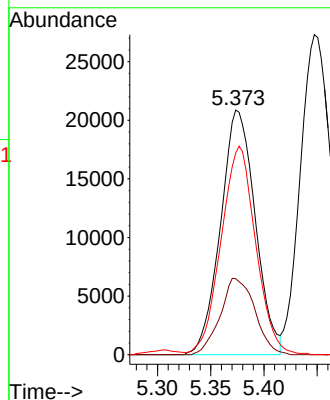
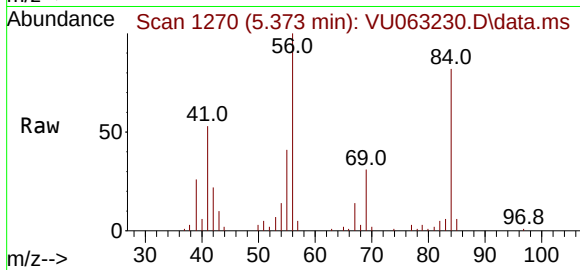
84 83.8 65.2 97.8

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#20

Methylcyclohexane

Concen: 2.041 ug/l

RT: 6.753 min Scan# 1699

Delta R.T. -0.000 min

Lab File: VU063230.D

Acq: 11 Feb 2025 12:07

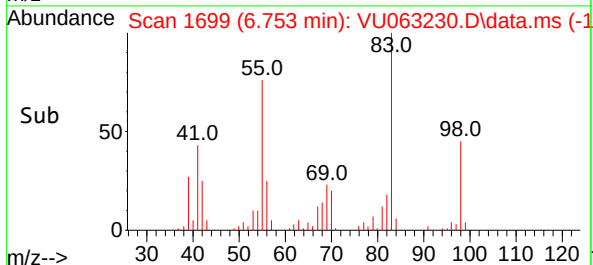
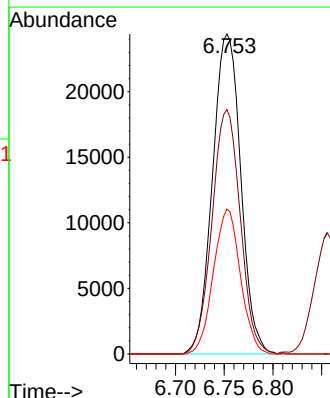
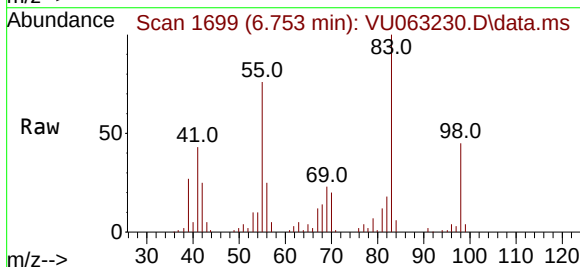
Tgt Ion: 83 Resp: 49192

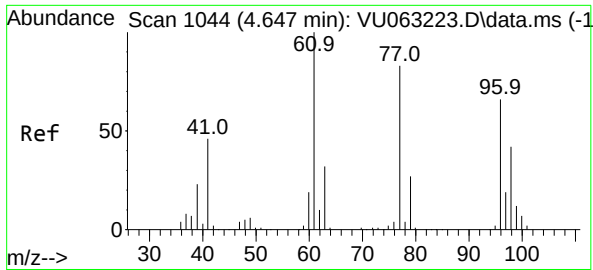
Ion Ratio Lower Upper

83 100

55 76.4 63.1 94.7

98 43.3 35.2 52.8





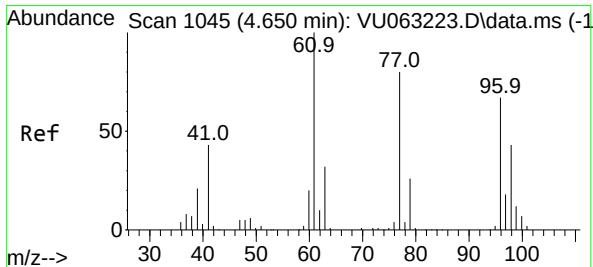
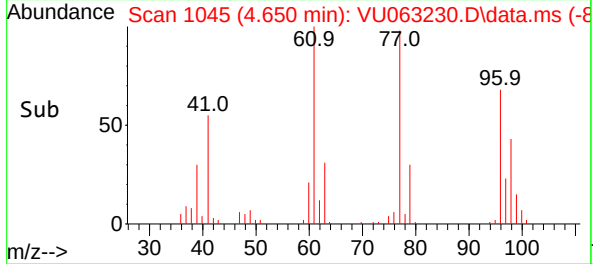
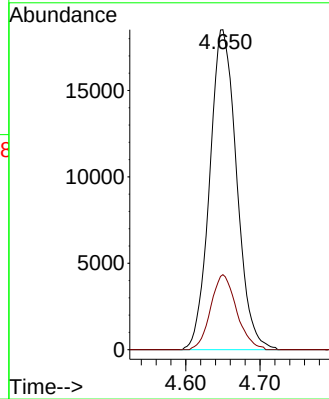
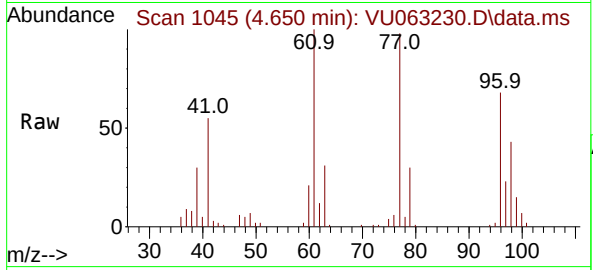
#21
2,2-Dichloropropane
Concen: 1.978 ug/l
RT: 4.650 min Scan# 1045
Delta R.T. 0.003 min
Lab File: VU063230.D
Acq: 11 Feb 2025 12:07

Instrument :
MSVOA_U
ClientSampleId :
VU0211WBS01

Tgt Ion: 77 Resp: 46690
Ion Ratio Lower Upper
77 100
97 22.5 18.5 27.7

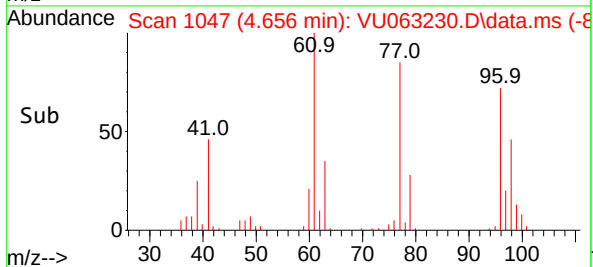
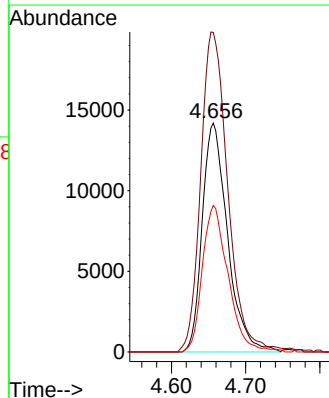
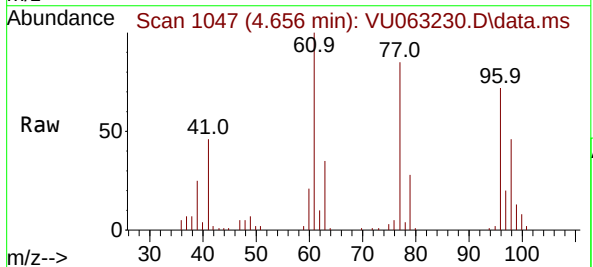
Manual Integrations
APPROVED

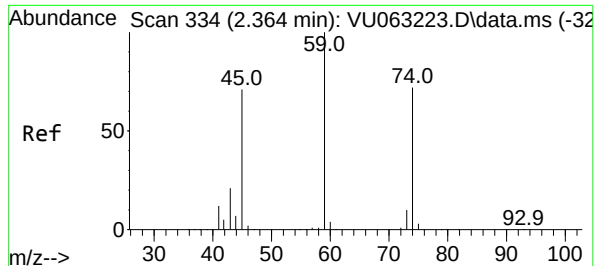
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#22
cis-1,2-Dichloroethene
Concen: 1.936 ug/l
RT: 4.656 min Scan# 1047
Delta R.T. 0.006 min
Lab File: VU063230.D
Acq: 11 Feb 2025 12:07

Tgt Ion: 96 Resp: 33572
Ion Ratio Lower Upper
96 100
61 149.7 0.0 373.3
98 65.2 31.9 95.9





#23

Diethyl Ether

Concen: 1.865 ug/l

RT: 2.367 min Scan# 31

Delta R.T. 0.003 min

Lab File: VU063230.D

Acq: 11 Feb 2025 12:07

Instrument :

MSVOA_U

ClientSampleId :

VU0211WBS01

Tgt Ion: 59 Resp: 22508

Ion Ratio Lower Upper

59 100

45 84.3 57.8 86.6

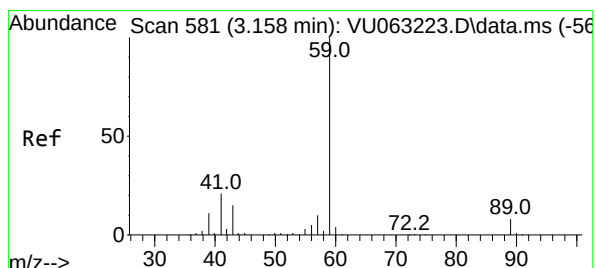
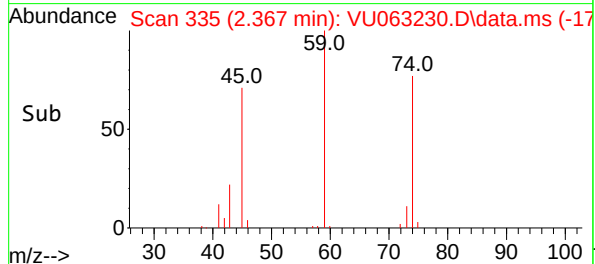
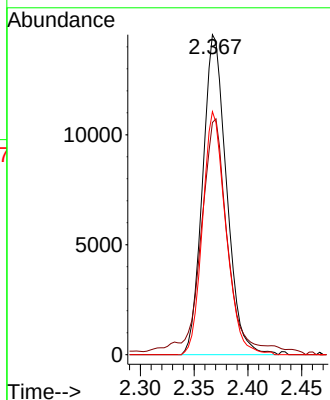
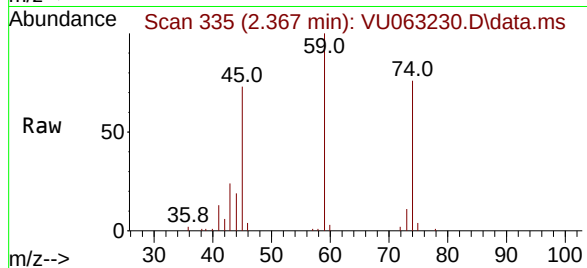
74 73.9 57.7 86.5

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#24

tert-Butyl Alcohol

Concen: 10.598 ug/l m

RT: 3.200 min Scan# 594

Delta R.T. 0.042 min

Lab File: VU063230.D

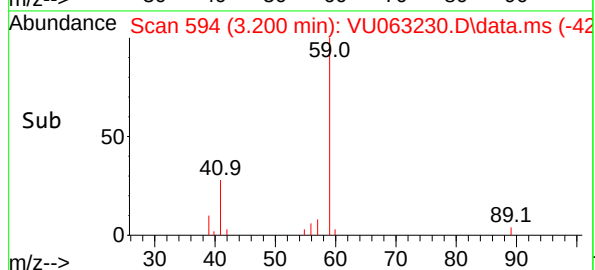
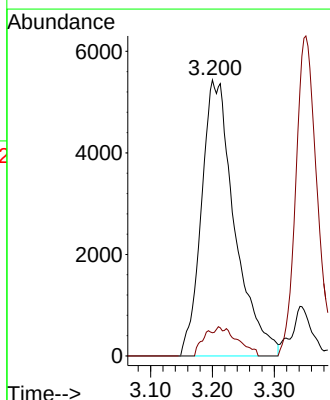
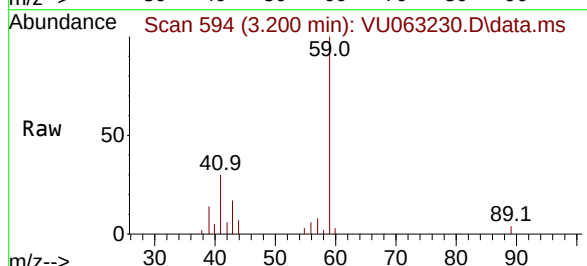
Acq: 11 Feb 2025 12:07

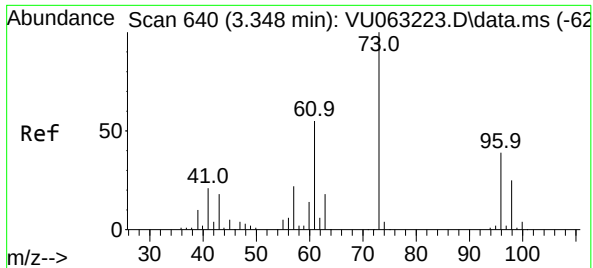
Tgt Ion: 59 Resp: 20238

Ion Ratio Lower Upper

59 100

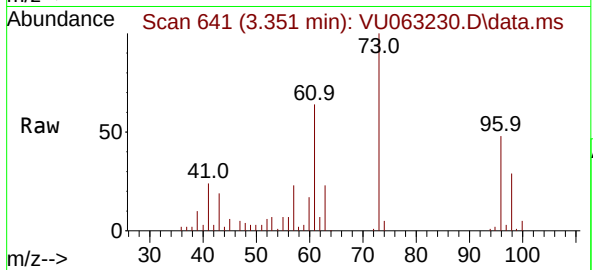
57 3.1 7.5 11.3#





#25
Methyl tert-Butyl Ether
Concen: 1.901 ug/l
RT: 3.351 min Scan# 641
Delta R.T. 0.003 min
Lab File: VU063230.D
Acq: 11 Feb 2025 12:07

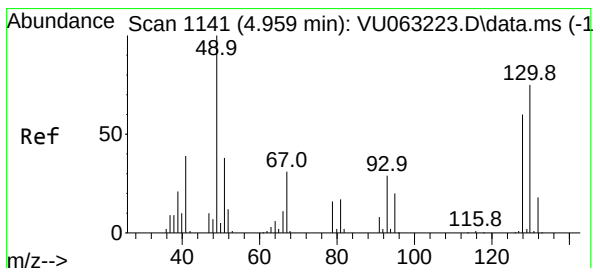
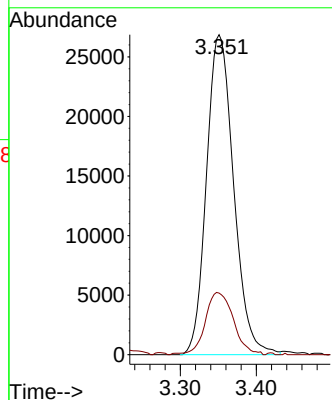
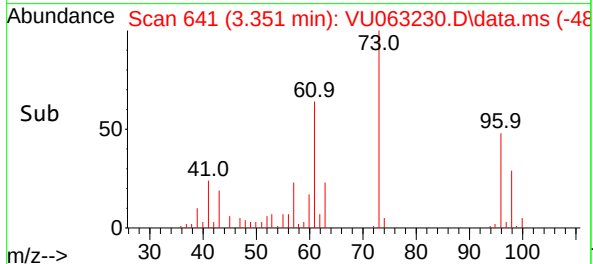
Instrument :
MSVOA_U
ClientSampleId :
VU0211WBS01



Tgt Ion: 73 Resp: 66762
Ion Ratio Lower Upper
73 100
43 20.1 14.9 22.3

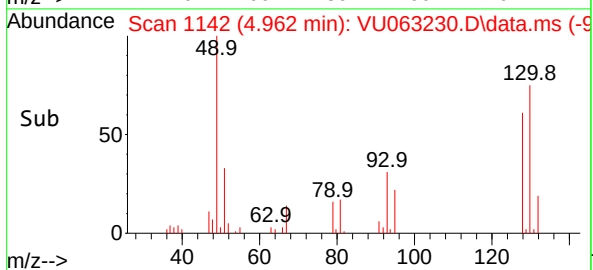
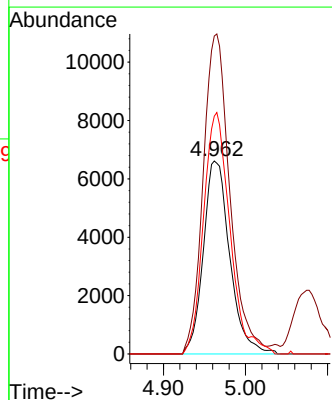
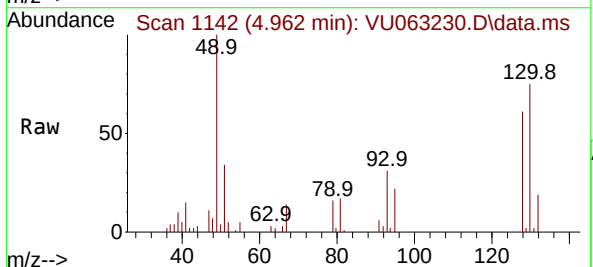
Manual Integrations
APPROVED

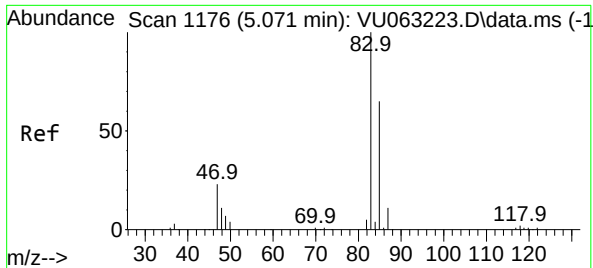
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#26
Bromochloromethane
Concen: 1.954 ug/l
RT: 4.962 min Scan# 1142
Delta R.T. 0.003 min
Lab File: VU063230.D
Acq: 11 Feb 2025 12:07

Tgt Ion:128 Resp: 14812
Ion Ratio Lower Upper
128 100
49 167.8 0.0 343.4
130 125.4 102.9 154.3





#27

Chloroform

Concen: 1.968 ug/l

RT: 5.078 min Scan# 1176

Delta R.T. 0.006 min

Lab File: VU063230.D

Acq: 11 Feb 2025 12:07

Instrument :

MSVOA_U

ClientSampleId :

VU0211WBS01

Tgt Ion: 83 Resp: 6006

Ion Ratio Lower Upper

83 100

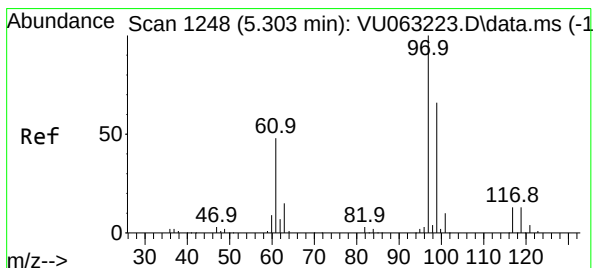
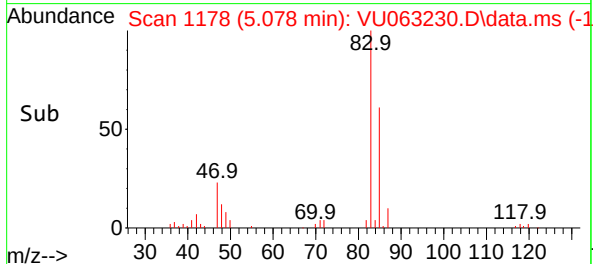
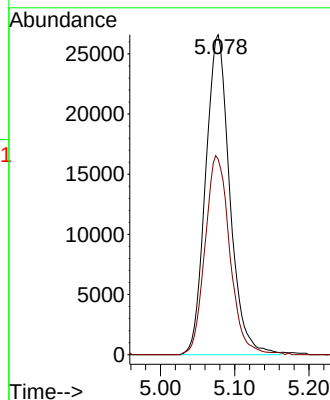
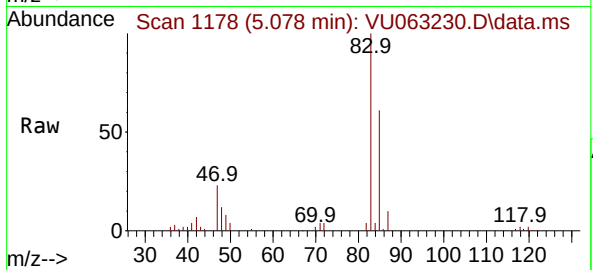
85 61.1 0.0 129.8

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#28

1,1,1-Trichloroethane

Concen: 1.952 ug/l

RT: 5.306 min Scan# 1249

Delta R.T. 0.003 min

Lab File: VU063230.D

Acq: 11 Feb 2025 12:07

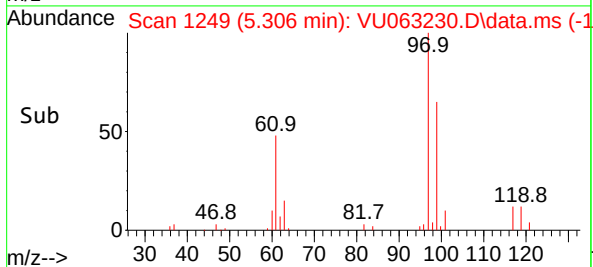
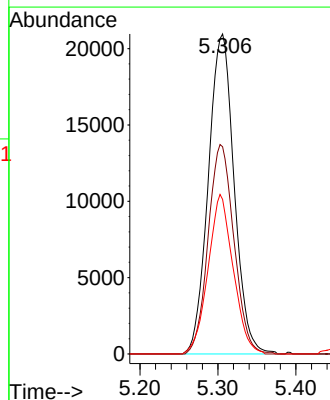
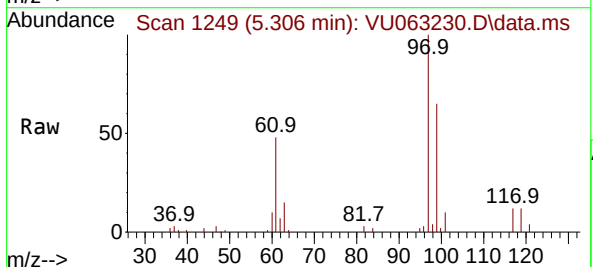
Tgt Ion: 97 Resp: 48266

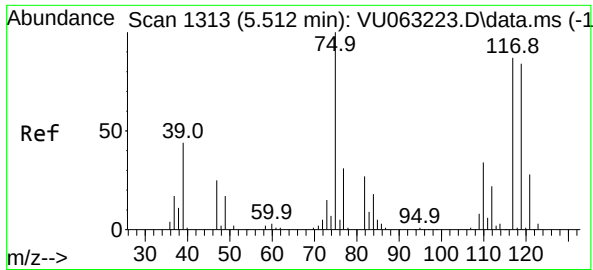
Ion Ratio Lower Upper

97 100

99 65.3 32.4 97.0

61 48.5 23.8 71.2





#29

1,1-Dichloropropene

Concen: 1.993 ug/l

RT: 5.518 min Scan# 1315

Delta R.T. 0.006 min

Lab File: VU063230.D

Acq: 11 Feb 2025 12:07

Instrument :

MSVOA_U

ClientSampleId :

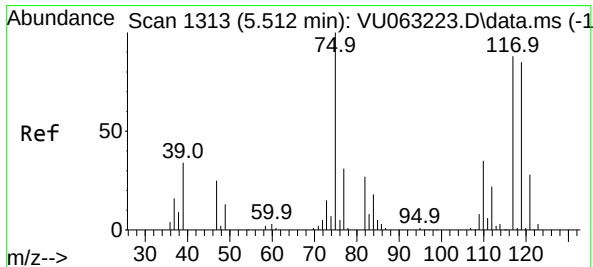
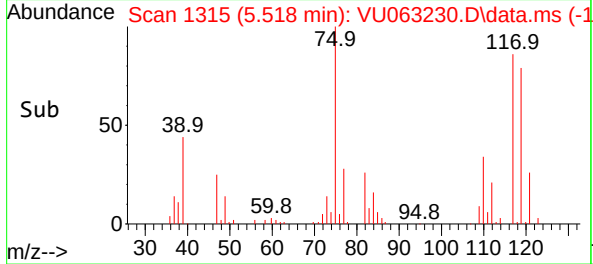
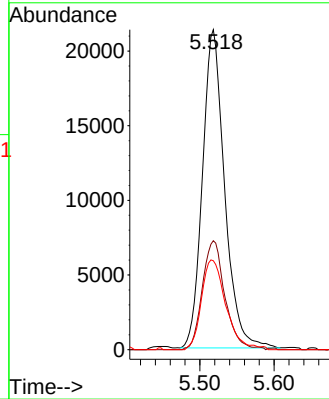
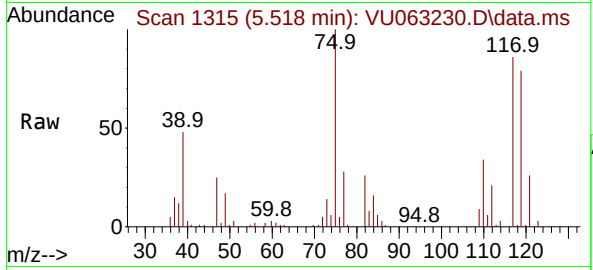
VU0211WBS01

Tgt Ion:	75	Resp:	4415
Ion	Ratio	Lower	Upper
75	100		
110	34.7	17.2	51.5
77	31.1	24.6	37.0

Manual Integrations
APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#30

Carbon Tetrachloride

Concen: 2.035 ug/l

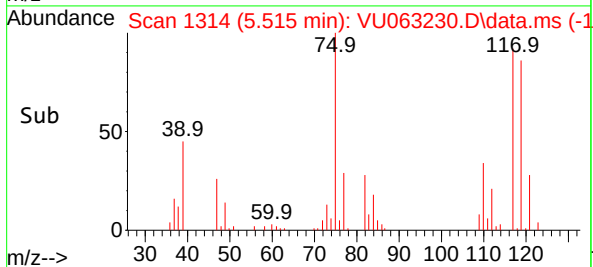
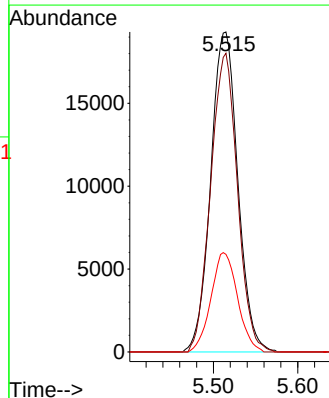
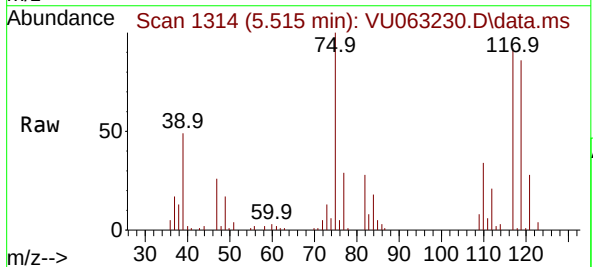
RT: 5.515 min Scan# 1314

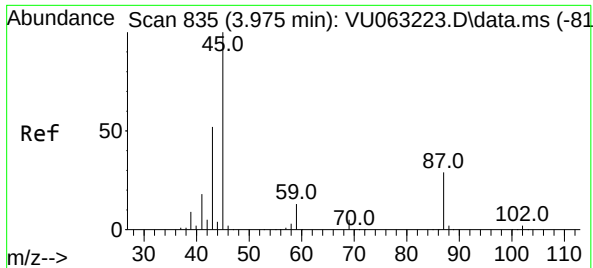
Delta R.T. 0.003 min

Lab File: VU063230.D

Acq: 11 Feb 2025 12:07

Tgt Ion:	117	Resp:	43154
Ion	Ratio	Lower	Upper
117	100		
119	93.3	76.7	115.1
121	30.5	25.5	38.3





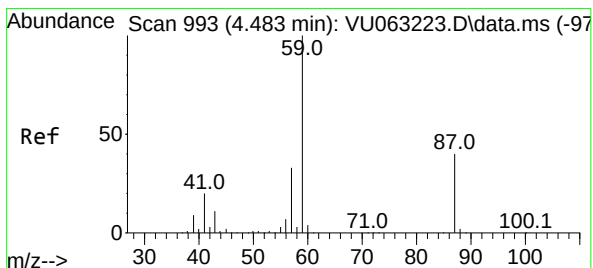
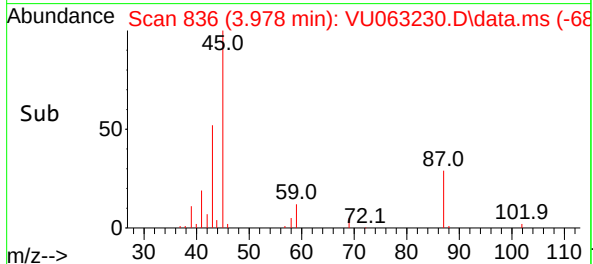
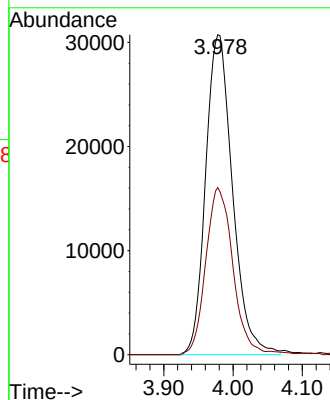
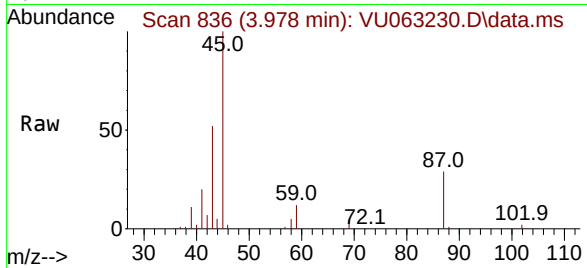
#31
Isopropyl Ether
Concen: 1.918 ug/l
RT: 3.978 min Scan# 835
Delta R.T. 0.003 min
Lab File: VU063230.D
Acq: 11 Feb 2025 12:07

Instrument :
MSVOA_U
ClientSampleId :
VU0211WBS01

Tgt Ion: 45 Resp: 8285
Ion Ratio Lower Upper
45 100
43 52.2 25.7 77.1

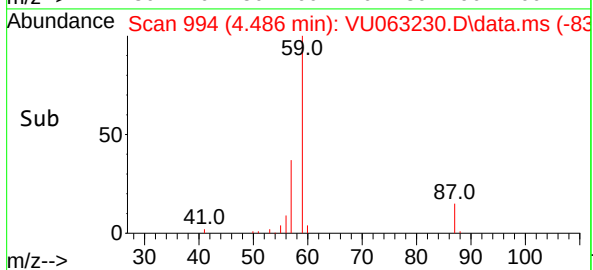
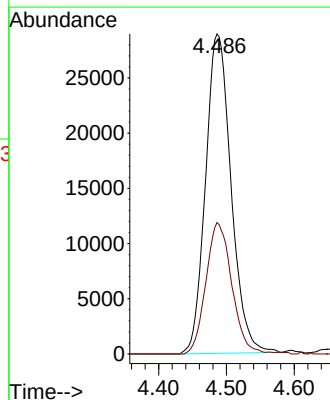
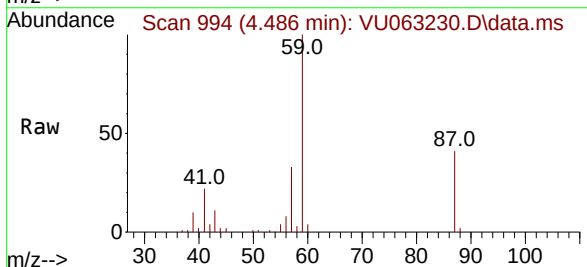
Manual Integrations
APPROVED

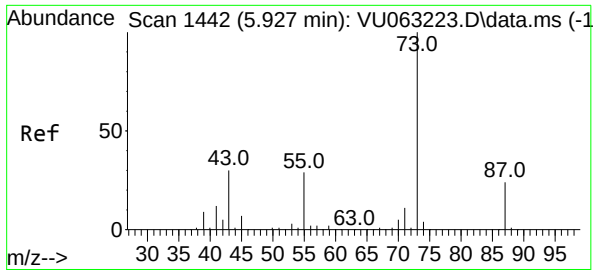
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#32
Ethyl-t-butyl ether
Concen: 1.929 ug/l
RT: 4.486 min Scan# 994
Delta R.T. 0.003 min
Lab File: VU063230.D
Acq: 11 Feb 2025 12:07

Tgt Ion: 59 Resp: 75741
Ion Ratio Lower Upper
59 100
87 40.9 32.6 49.0





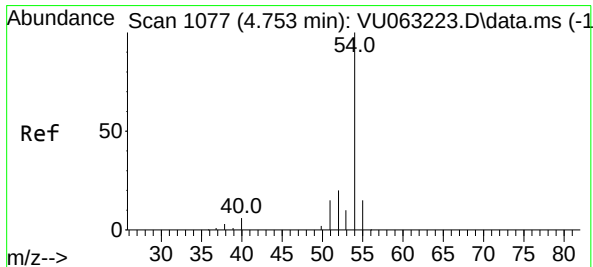
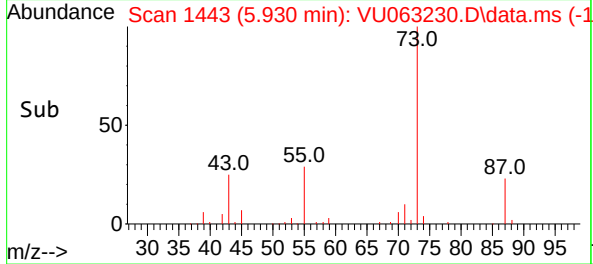
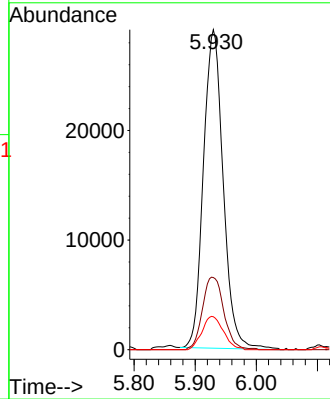
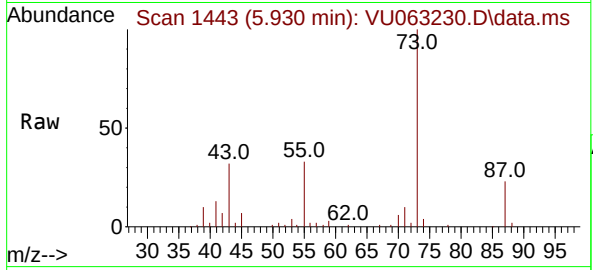
#33
Tert-Amyl methyl ether
Concen: 1.903 ug/l
RT: 5.930 min Scan# 1442
Delta R.T. 0.003 min
Lab File: VU063230.D
Acq: 11 Feb 2025 12:07

Instrument :
MSVOA_U
ClientSampleId :
VU0211WBS01

Tgt Ion: 73 Resp: 6530
Ion Ratio Lower Upper
73 100
87 24.6 18.9 28.3
71 11.3 9.0 13.4

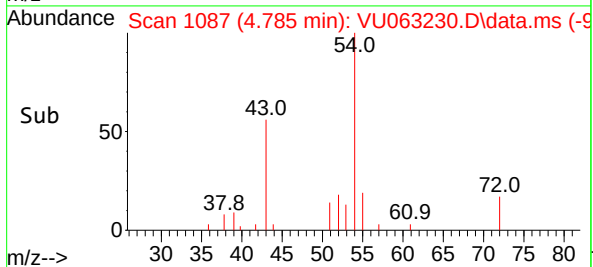
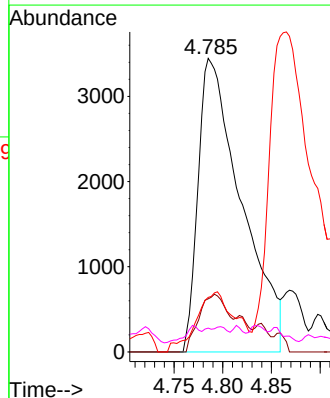
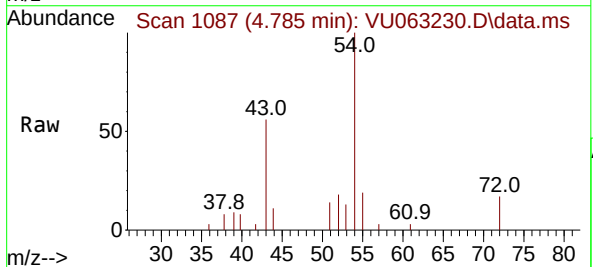
Manual Integrations
APPROVED

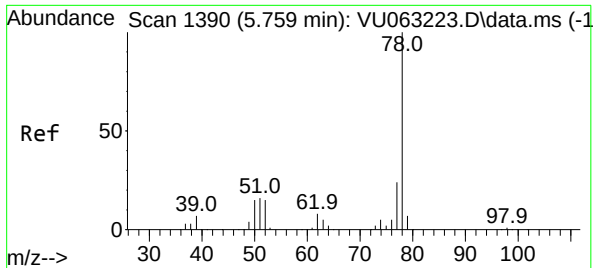
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#34
Propionitrile
Concen: 8.855 ug/l
RT: 4.785 min Scan# 1087
Delta R.T. 0.032 min
Lab File: VU063230.D
Acq: 11 Feb 2025 12:07

Tgt Ion: 54 Resp: 10600
Ion Ratio Lower Upper
54 100
52 13.1 16.3 24.5#
55 18.7 11.8 17.6#
40 1.9 4.3 6.5#





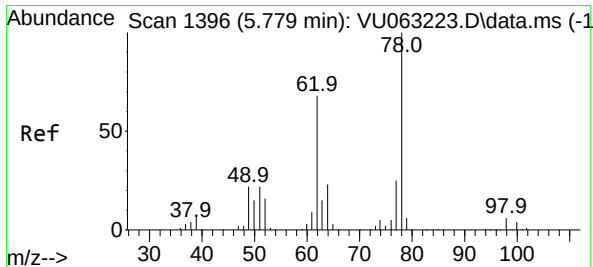
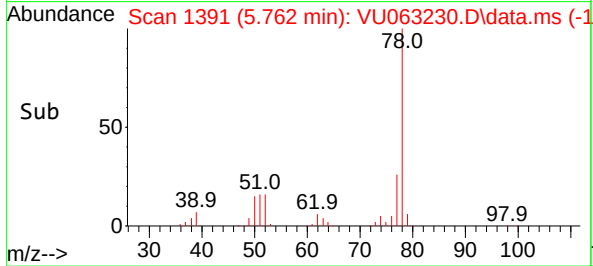
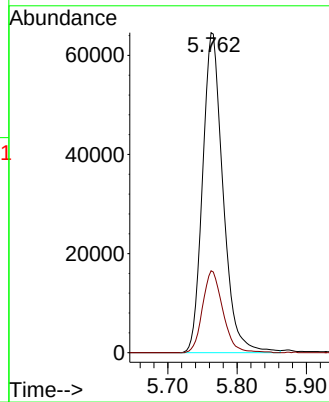
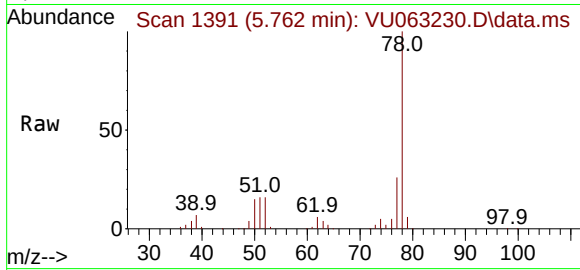
#35
Benzene
Concen: 1.943 ug/l
RT: 5.762 min Scan# 1391
Delta R.T. 0.003 min
Lab File: VU063230.D
Acq: 11 Feb 2025 12:07

Instrument :
MSVOA_U
ClientSampleId :
VU0211WBS01

Tgt Ion: 78 Resp: 13230
Ion Ratio Lower Upper
78 100
77 25.6 19.0 28.4

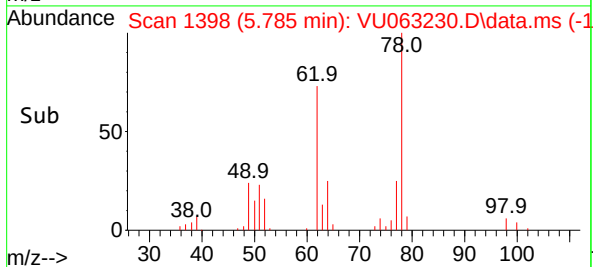
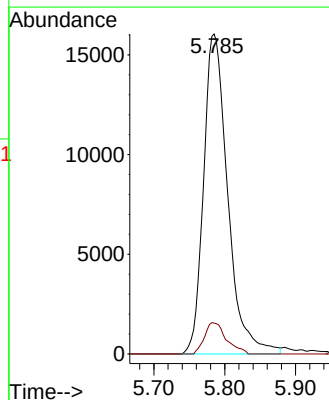
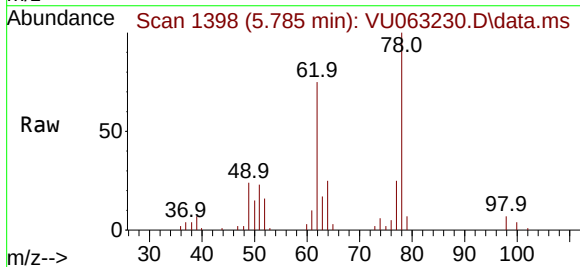
Manual Integrations
APPROVED

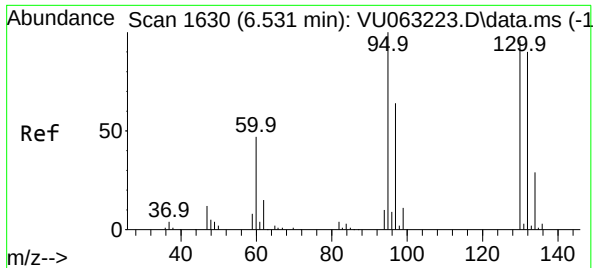
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#36
1,2-Dichloroethane
Concen: 1.933 ug/l
RT: 5.785 min Scan# 1398
Delta R.T. 0.006 min
Lab File: VU063230.D
Acq: 11 Feb 2025 12:07

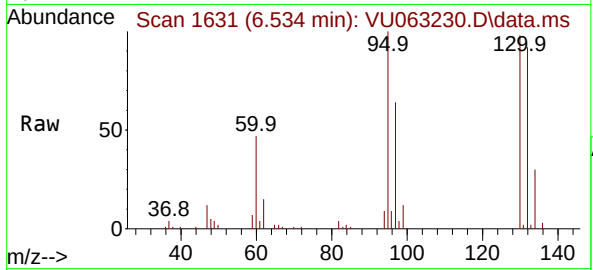
Tgt Ion: 62 Resp: 38000
Ion Ratio Lower Upper
62 100
98 8.9 6.9 10.3





#37
Trichloroethene
Concen: 2.040 ug/l
RT: 6.534 min Scan# 1630
Delta R.T. 0.003 min
Lab File: VU063230.D
Acq: 11 Feb 2025 12:07

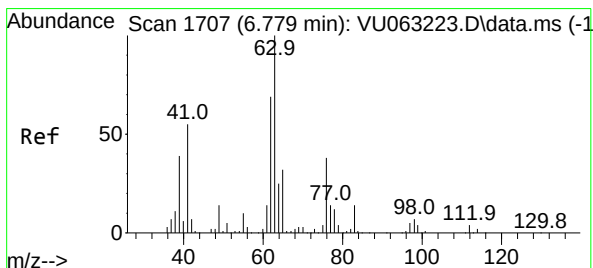
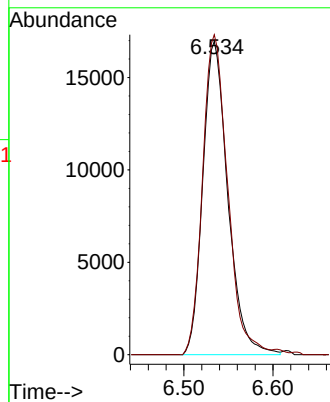
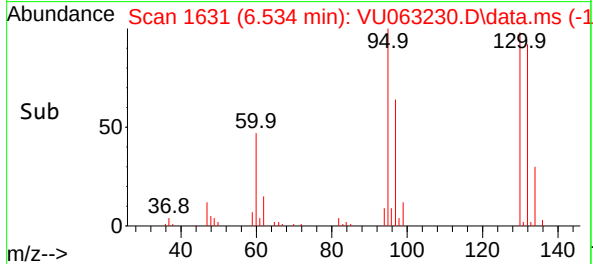
Instrument :
MSVOA_U
ClientSampleId :
VU0211WBS01



Tgt Ion:130 Resp: 33039
Ion Ratio Lower Upper
130 100
95 102.1 83.2 124.8

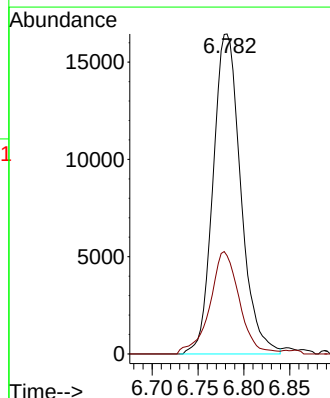
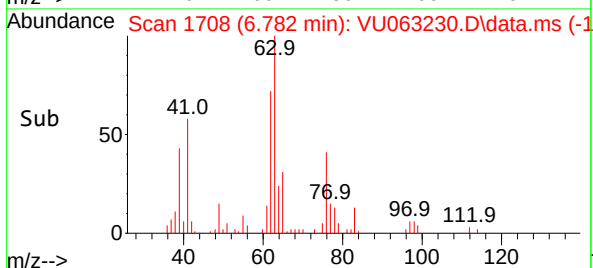
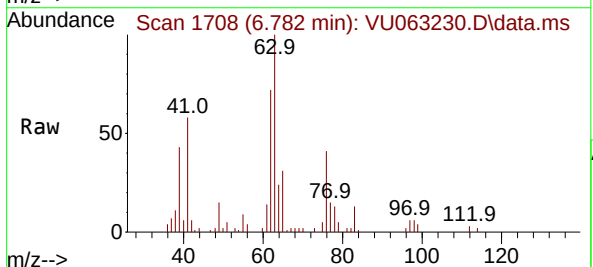
Manual Integrations
APPROVED

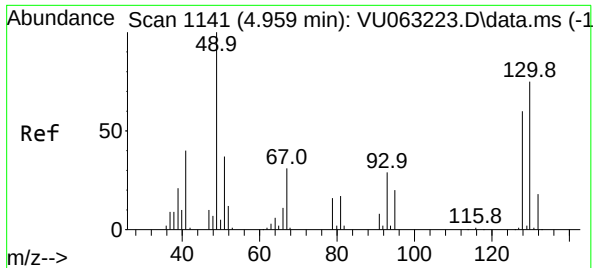
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#38
1,2-Dichloropropane
Concen: 1.939 ug/l
RT: 6.782 min Scan# 1708
Delta R.T. 0.003 min
Lab File: VU063230.D
Acq: 11 Feb 2025 12:07

Tgt Ion: 63 Resp: 34557
Ion Ratio Lower Upper
63 100
65 29.9 25.3 37.9





#39

Methacrylonitrile

Concen: 1.802 ug/l

RT: 4.975 min Scan# 1141

Delta R.T. 0.016 min

Lab File: VU063230.D

Acq: 11 Feb 2025 12:07

Instrument :

MSVOA_U

ClientSampleId :

VU0211WBS01

Tgt Ion: 41 Resp: 8038

Ion Ratio Lower Upper

41 100

67 97.5 64.5 96.7

39 61.8 43.0 64.6

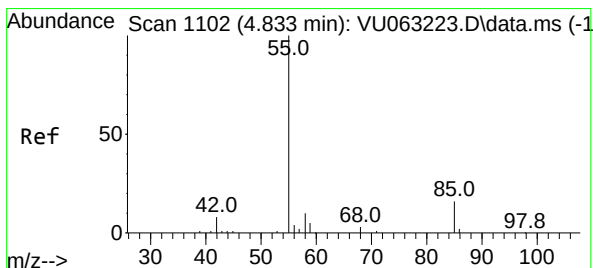
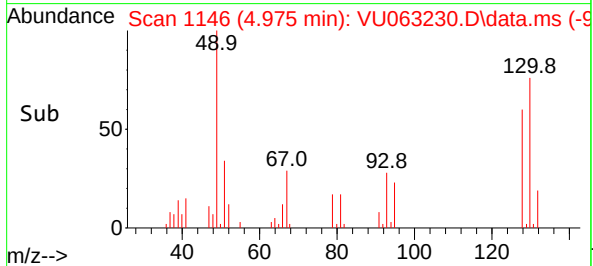
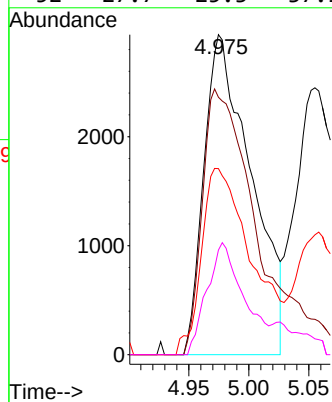
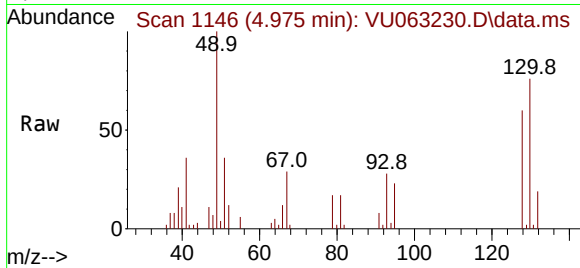
52 27.7 25.3 37.9

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#40

Methyl acrylate

Concen: 1.863 ug/l m

RT: 4.865 min Scan# 1112

Delta R.T. 0.032 min

Lab File: VU063230.D

Acq: 11 Feb 2025 12:07

Tgt Ion: 55 Resp: 15318

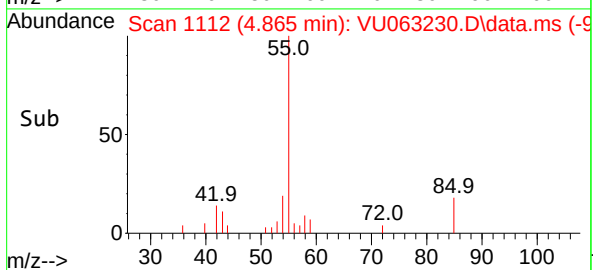
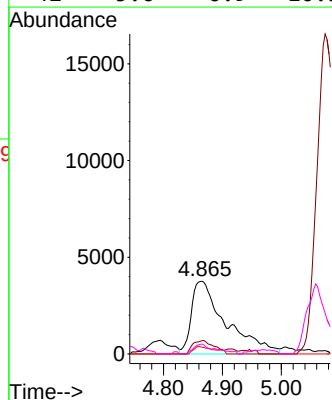
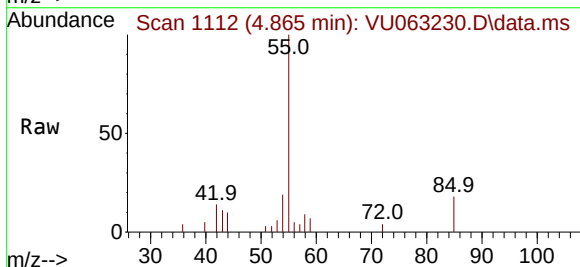
Ion Ratio Lower Upper

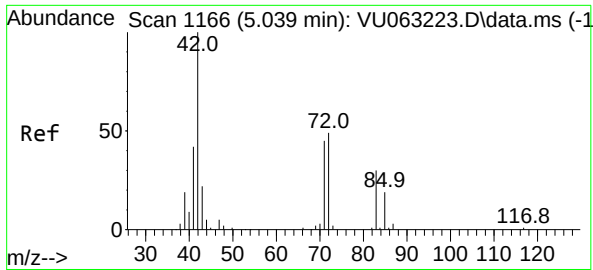
55 100

85 11.2 13.3 19.9#

58 5.2 7.3 10.9#

42 5.6 6.9 10.3#





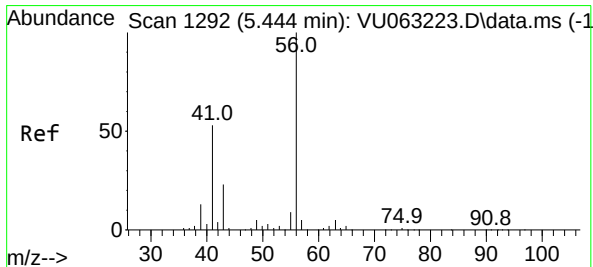
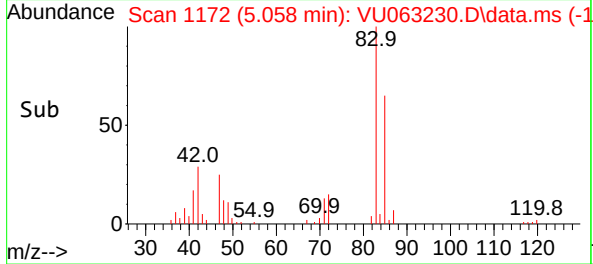
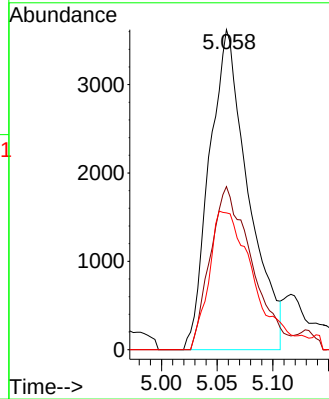
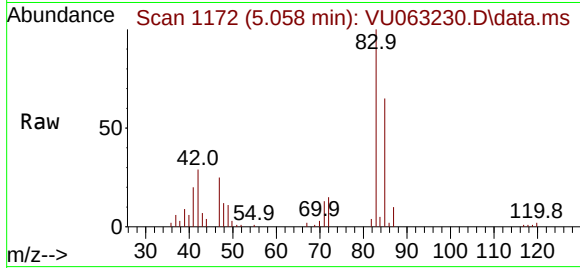
#41
Tetrahydrofuran
Concen: 3.380 ug/l
RT: 5.058 min Scan# 1166
Delta R.T. 0.019 min
Lab File: VU063230.D
Acq: 11 Feb 2025 12:07

Instrument :
MSVOA_U
ClientSampleId :
VU0211WBS01

Tgt Ion: 42 Resp: 8769
Ion Ratio Lower Upper
42 100
72 54.7 41.5 62.3
71 50.5 37.2 55.8

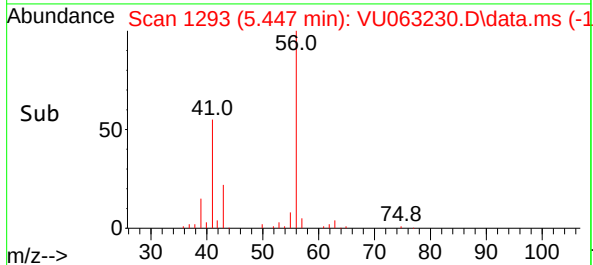
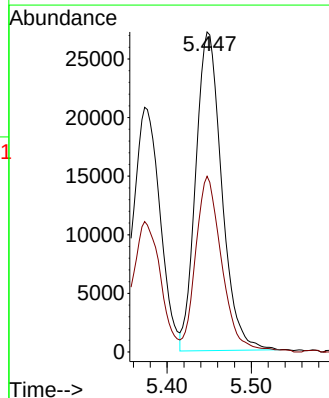
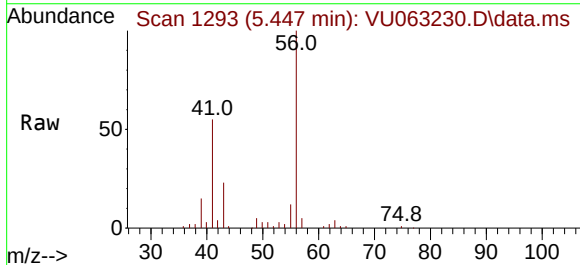
Manual Integrations
APPROVED

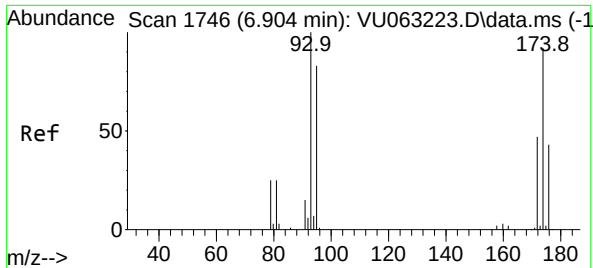
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#42
1-Chlorobutane
Concen: 1.924 ug/l
RT: 5.447 min Scan# 1293
Delta R.T. 0.003 min
Lab File: VU063230.D
Acq: 11 Feb 2025 12:07

Tgt Ion: 56 Resp: 58303
Ion Ratio Lower Upper
56 100
41 55.7 26.3 78.8





#43

Dibromomethane

Concen: 1.906 ug/l

RT: 6.914 min Scan# 1746

Delta R.T. 0.009 min

Lab File: VU063230.D

Acq: 11 Feb 2025 12:07

Instrument :

MSVOA_U

ClientSampleId :

VU0211WBS01

Tgt Ion: 93 Resp: 17200

Ion Ratio Lower Upper

93 100

95 85.5 67.2 100.8

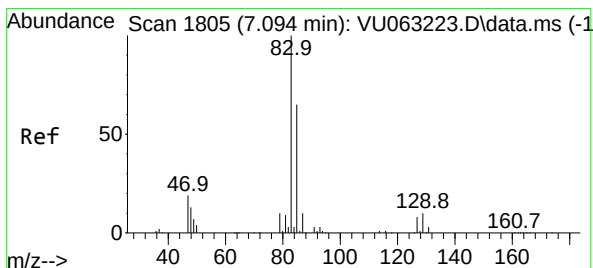
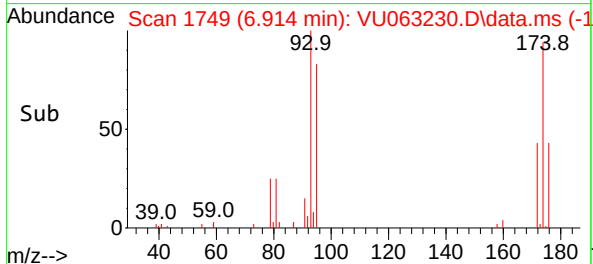
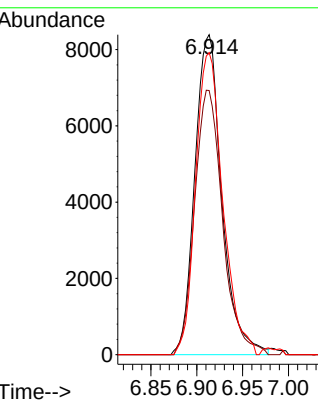
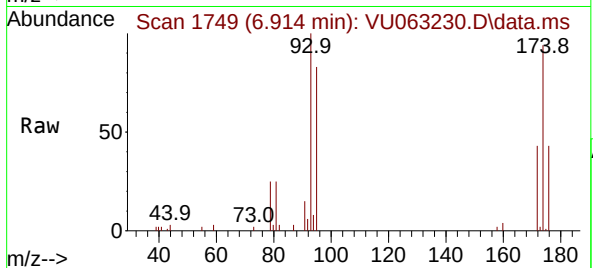
174 95.0 75.7 113.5

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#44

Bromodichloromethane

Concen: 1.982 ug/l

RT: 7.097 min Scan# 1806

Delta R.T. 0.003 min

Lab File: VU063230.D

Acq: 11 Feb 2025 12:07

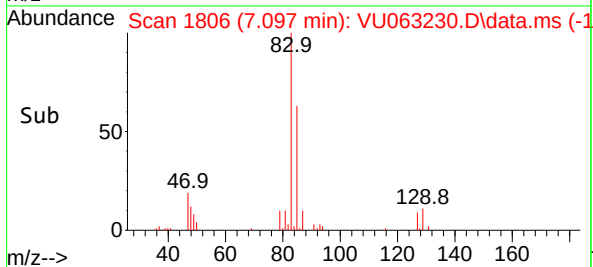
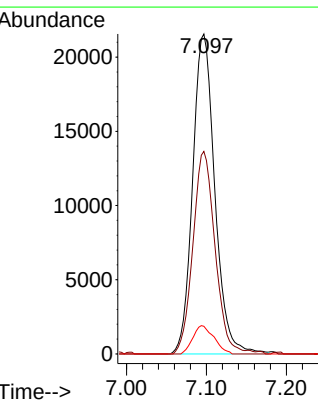
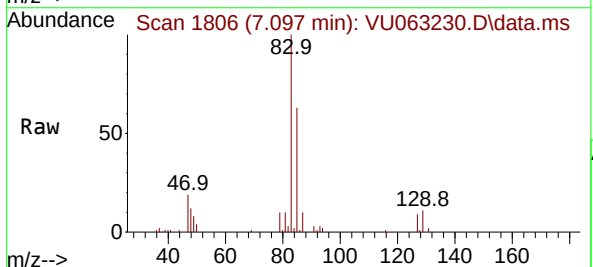
Tgt Ion: 83 Resp: 41643

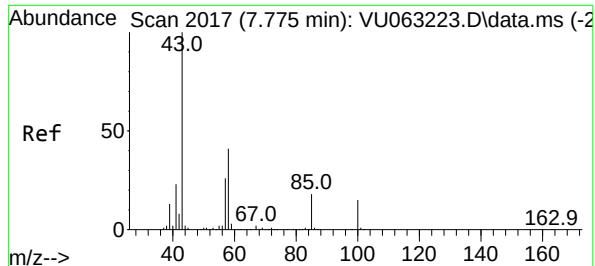
Ion Ratio Lower Upper

83 100

85 63.3 51.7 77.5

127 9.6 6.7 10.1





#45

4-Methyl-2-Pentanone

Concen: 9.439 ug/l

RT: 7.785 min Scan# 2017

Delta R.T. 0.009 min

Lab File: VU063230.D

Acq: 11 Feb 2025 12:07

Instrument :

MSVOA_U

ClientSampleId :

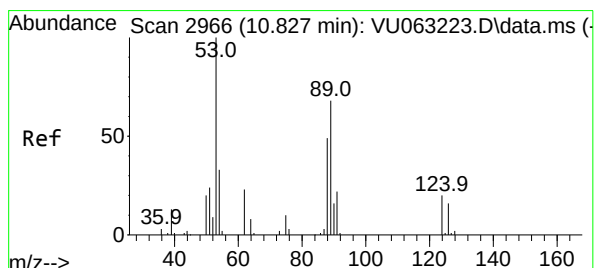
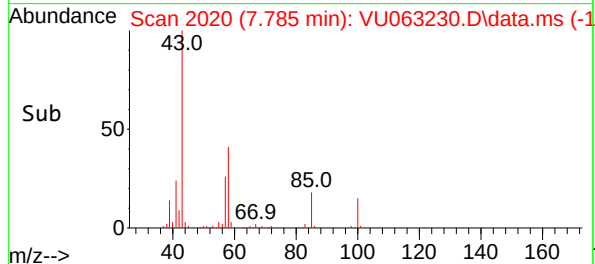
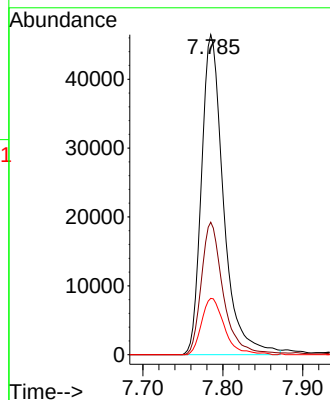
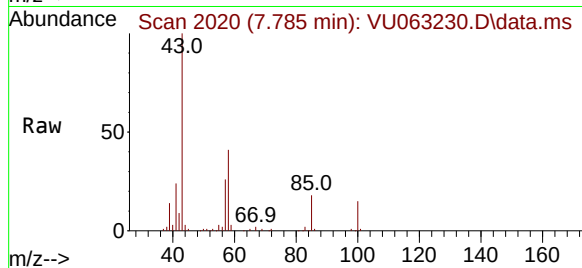
VU0211WBS01

Tgt Ion:	43	Resp:	89310
Ion Ratio	Lower	Upper	
43	100		
58	41.3	20.8	62.5
85	18.1	14.8	22.2

Manual Integrations
APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#46

t-1,4-Dichloro-2-butene

Concen: 4.102 ug/l m

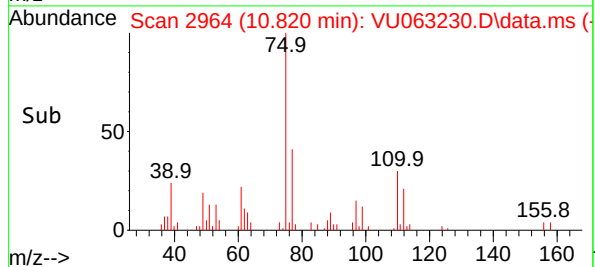
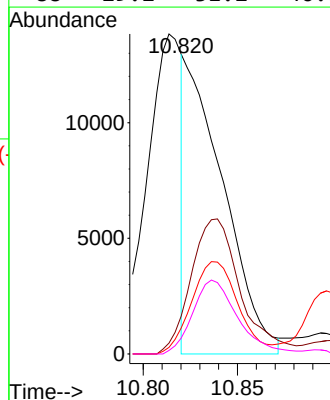
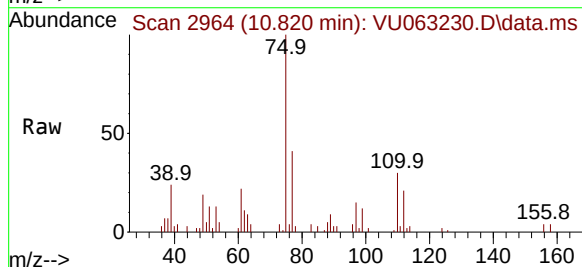
RT: 10.820 min Scan# 2964

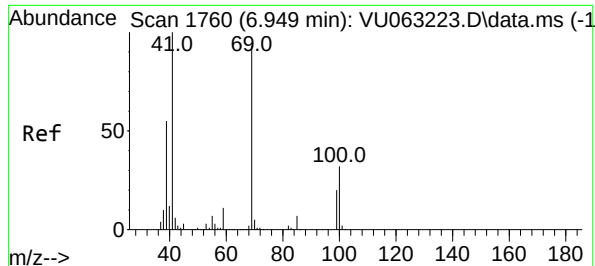
Delta R.T. -0.007 min

Lab File: VU063230.D

Acq: 11 Feb 2025 12:07

Tgt Ion:	75	Resp:	18247
Ion Ratio	Lower	Upper	
75	100		
53	58.3	64.5	96.7#
89	37.6	43.4	65.2#
88	29.2	31.2	46.8#





#47

Methyl methacrylate

Concen: 3.639 ug/l

RT: 6.955 min Scan# 1762

Delta R.T. 0.006 min

Lab File: VU063230.D

Acq: 11 Feb 2025 12:07

Tgt Ion: 69 Resp: 2766

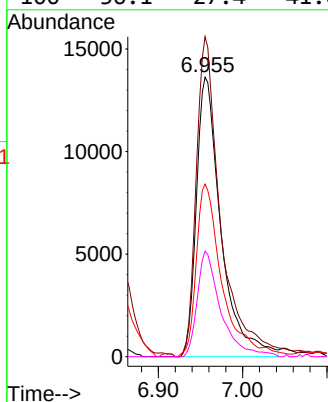
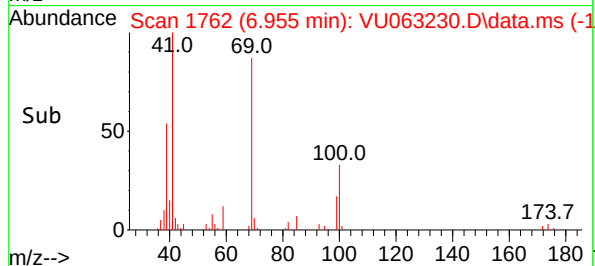
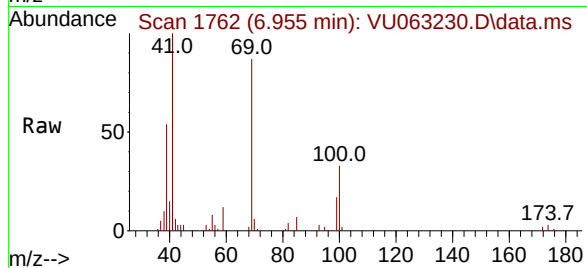
Ion Ratio Lower Upper

69 100

41 114.8 0.0 217.0

39 64.7 47.7 71.5

100 36.1 27.4 41.0

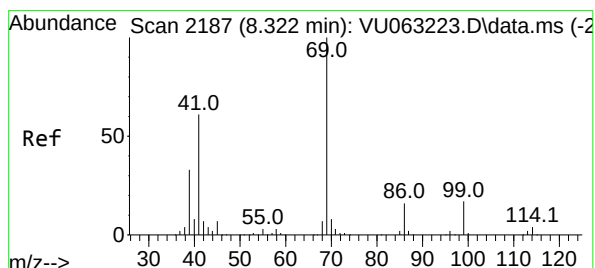


Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#48

Ethyl methacrylate

Concen: 1.839 ug/l

RT: 8.328 min Scan# 2189

Delta R.T. 0.006 min

Lab File: VU063230.D

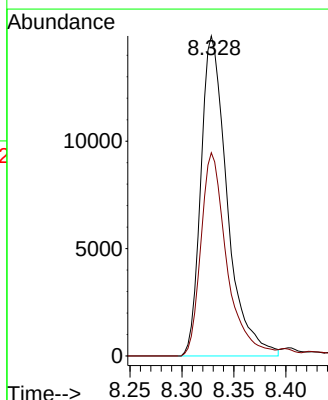
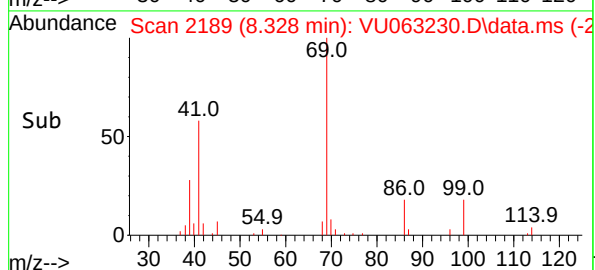
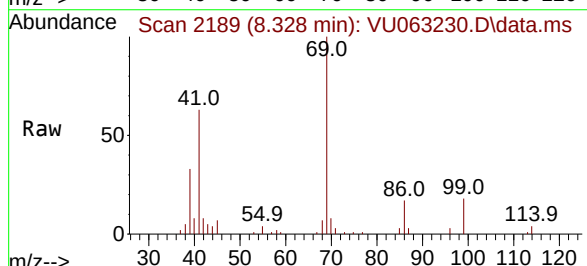
Acq: 11 Feb 2025 12:07

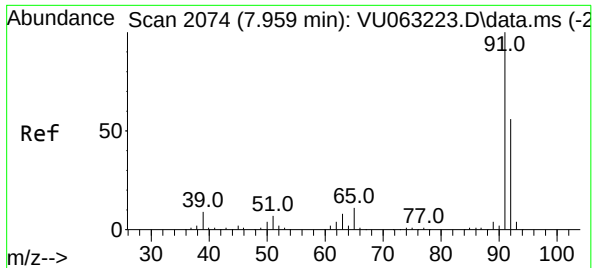
Tgt Ion: 69 Resp: 26252

Ion Ratio Lower Upper

69 100

41 62.4 30.6 92.0





#49

Toluene

Concen: 1.995 ug/l

RT: 7.962 min Scan# 2074

Delta R.T. 0.003 min

Lab File: VU063230.D

Acq: 11 Feb 2025 12:07

Instrument :

MSVOA_U

ClientSampleId :

VU0211WBS01

Tgt Ion: 92 Resp: 78140

Ion Ratio Lower Upper

92 100

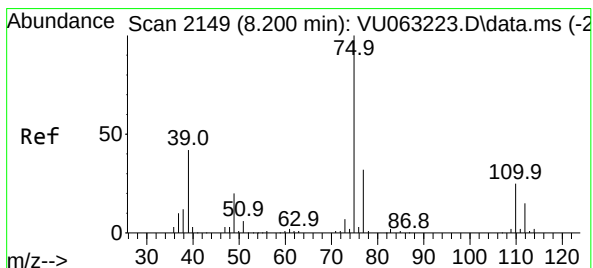
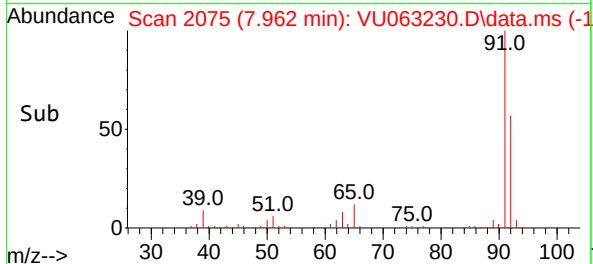
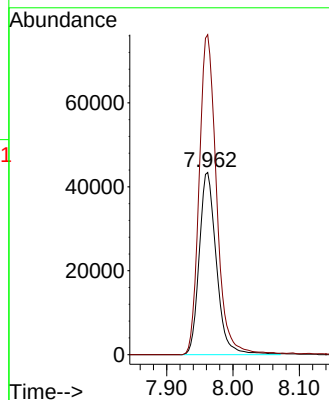
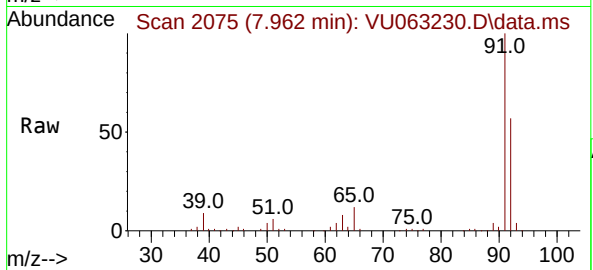
91 178.2 141.8 212.6

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#50

t-1,3-Dichloropropene

Concen: 1.976 ug/l

RT: 8.206 min Scan# 2151

Delta R.T. 0.006 min

Lab File: VU063230.D

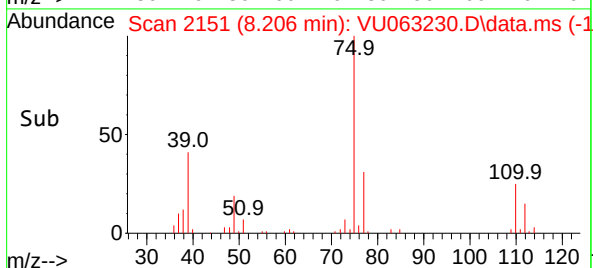
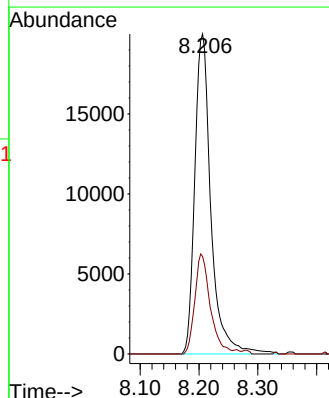
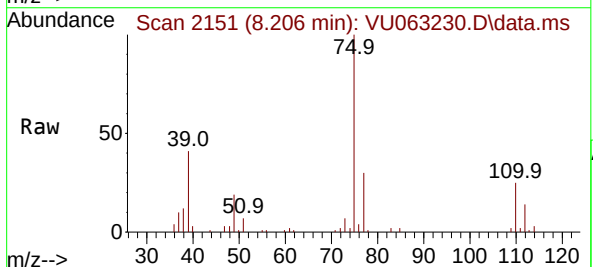
Acq: 11 Feb 2025 12:07

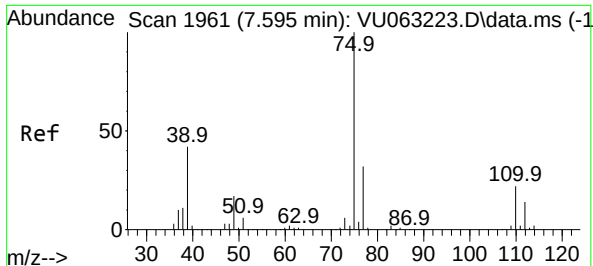
Tgt Ion: 75 Resp: 37997

Ion Ratio Lower Upper

75 100

77 30.4 25.9 38.9





#51

cis-1,3-Dichloropropene

Concen: 1.953 ug/l

RT: 7.598 min Scan# 1961

Delta R.T. 0.003 min

Lab File: VU063230.D

Acq: 11 Feb 2025 12:07

Instrument :

MSVOA_U

ClientSampleId :

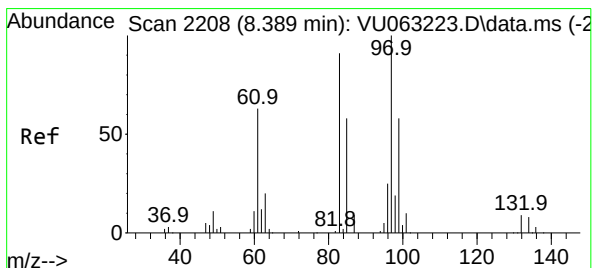
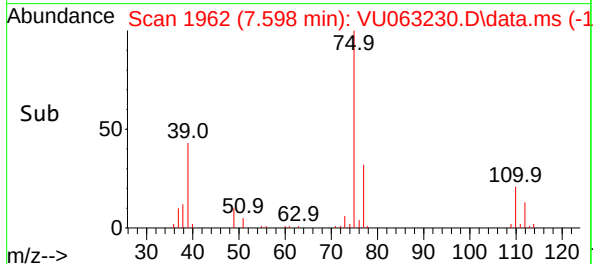
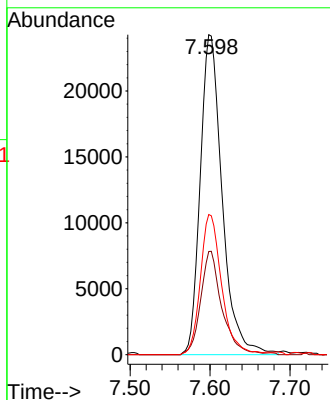
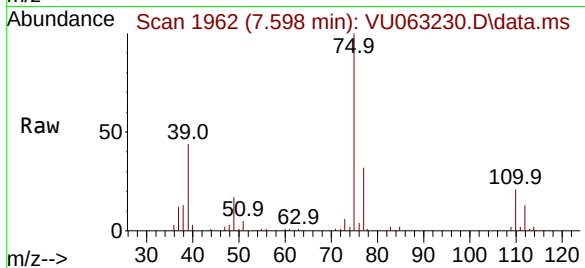
VU0211WBS01

Tgt Ion:	75	Resp:	46394
Ion	Ratio	Lower	Upper
75	100		
77	32.2	25.3	37.9
39	43.2	33.5	50.3

Manual Integrations
APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#52

1,1,2-Trichloroethane

Concen: 1.941 ug/l

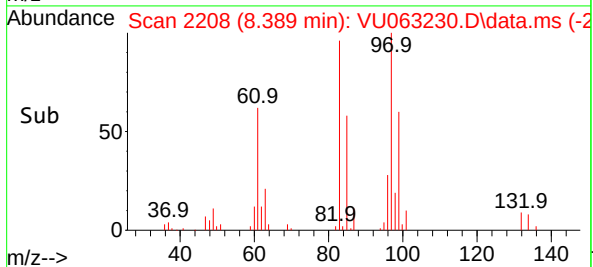
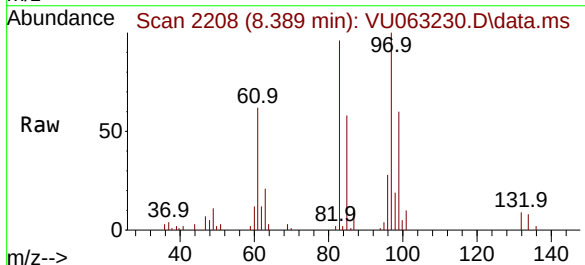
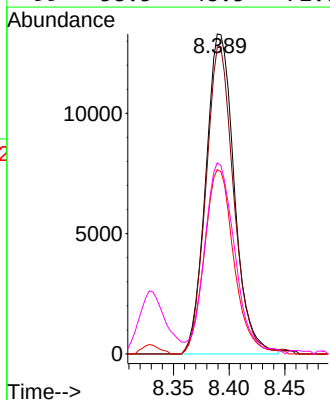
RT: 8.389 min Scan# 2208

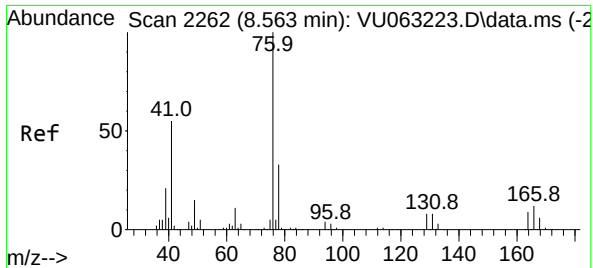
Delta R.T. -0.000 min

Lab File: VU063230.D

Acq: 11 Feb 2025 12:07

Tgt Ion:	97	Resp:	23627
Ion	Ratio	Lower	Upper
97	100		
83	95.7	73.0	109.4
85	57.6	46.3	69.5
99	58.5	48.5	72.7





#53

1,3-Dichloropropane

Concen: 1.938 ug/l

RT: 8.566 min Scan# 2262

Delta R.T. 0.003 min

Lab File: VU063230.D

Acq: 11 Feb 2025 12:07

Tgt Ion: 76 Resp: 41879

Ion Ratio Lower Upper

76 100

78 33.6 26.3 39.5

Instrument :

MSVOA_U

ClientSampleId :

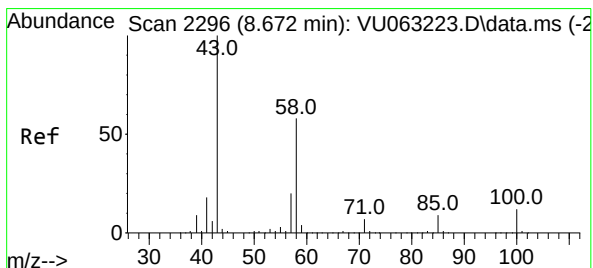
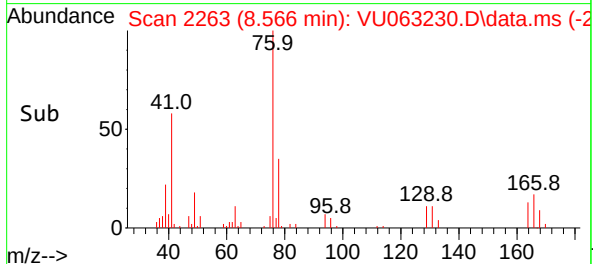
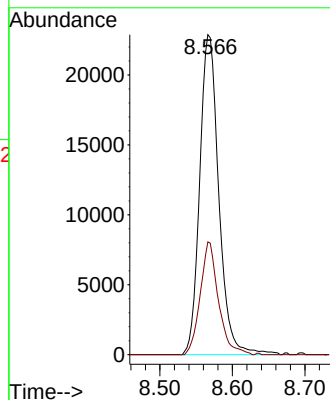
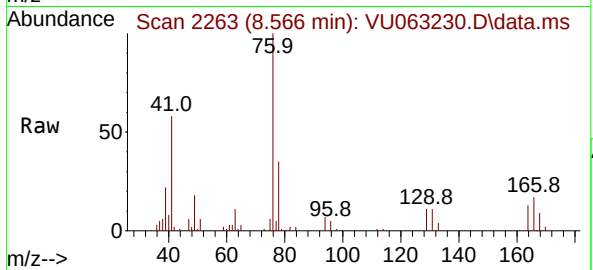
VU0211WBS01

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#54

2-Hexanone

Concen: 9.113 ug/l

RT: 8.682 min Scan# 2299

Delta R.T. 0.009 min

Lab File: VU063230.D

Acq: 11 Feb 2025 12:07

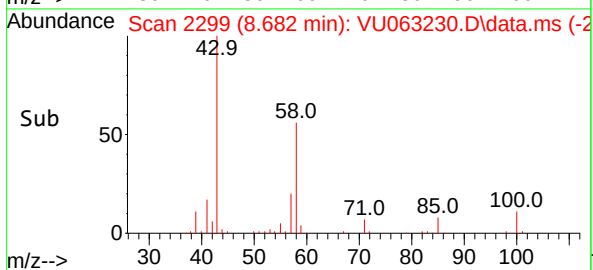
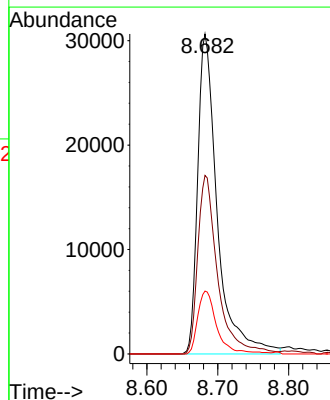
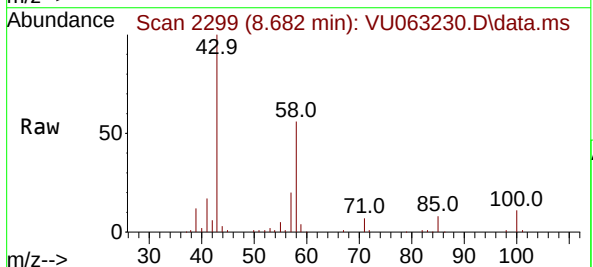
Tgt Ion: 43 Resp: 58847

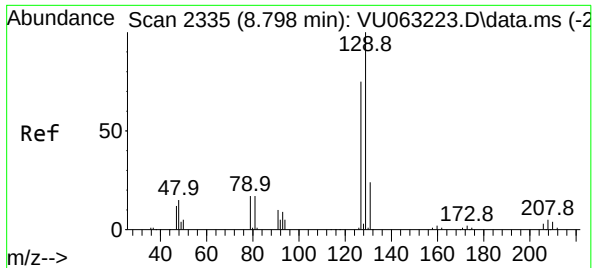
Ion Ratio Lower Upper

43 100

58 56.5 38.0 78.0

57 19.2 0.0 39.1





#55

Dibromochloromethane

Concen: 1.954 ug/l

RT: 8.801 min Scan# 21

Delta R.T. 0.003 min

Lab File: VU063230.D

Acq: 11 Feb 2025 12:07

Instrument :

MSVOA_U

ClientSampleId :

VU0211WBS01

Tgt Ion:129 Resp: 27354

Ion Ratio Lower Upper

129 100

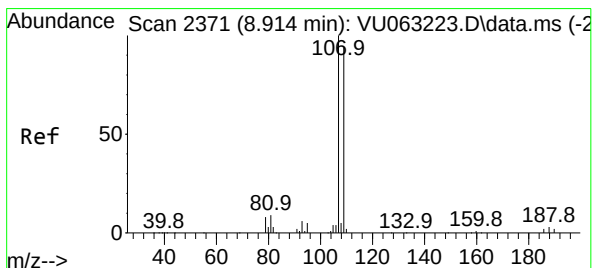
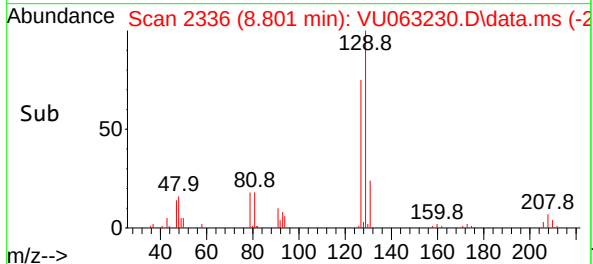
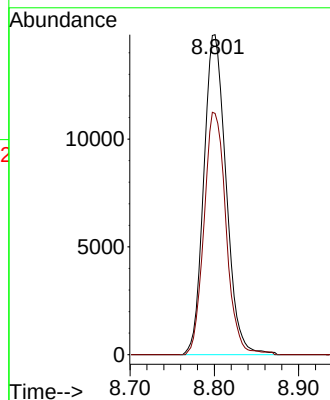
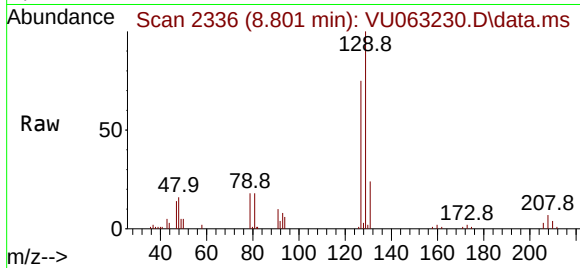
127 74.5 60.4 90.6

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#56

1,2-Dibromoethane

Concen: 1.930 ug/l

RT: 8.917 min Scan# 2372

Delta R.T. 0.003 min

Lab File: VU063230.D

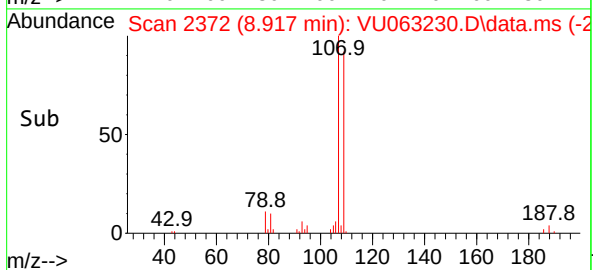
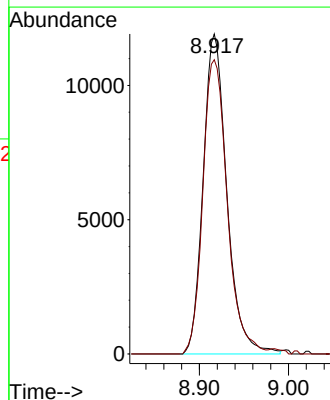
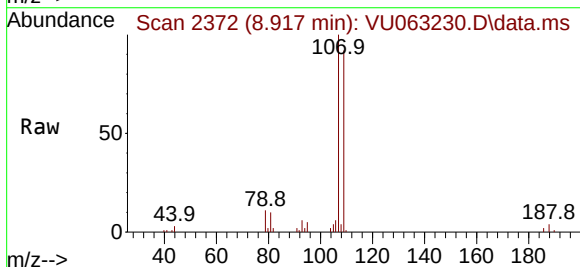
Acq: 11 Feb 2025 12:07

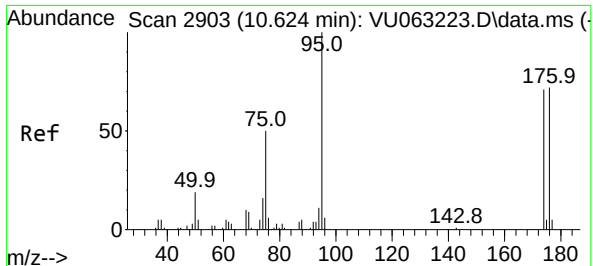
Tgt Ion:107 Resp: 22029

Ion Ratio Lower Upper

107 100

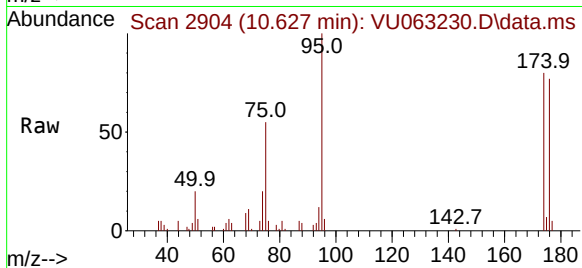
109 94.8 0.0 187.8





#57
4-Bromofluorobenzene
Concen: 0.981 ug/l
RT: 10.627 min Scan# 2904
Delta R.T. 0.003 min
Lab File: VU063230.D
Acq: 11 Feb 2025 12:07

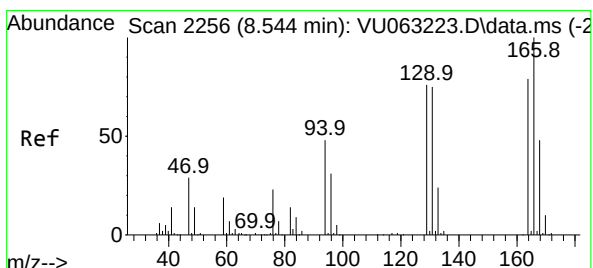
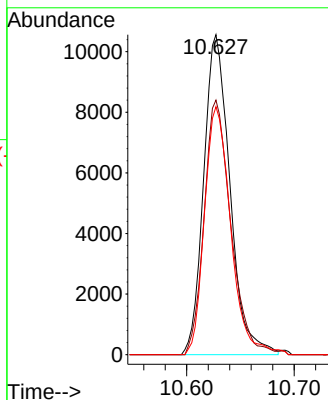
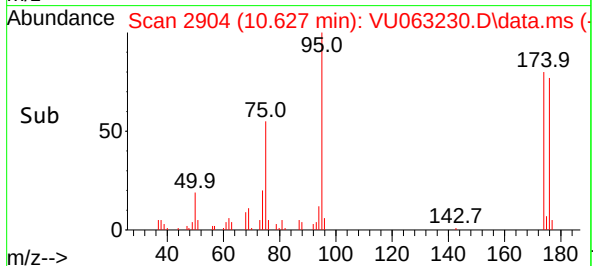
Instrument :
MSVOA_U
ClientSampleId :
VU0211WBS01



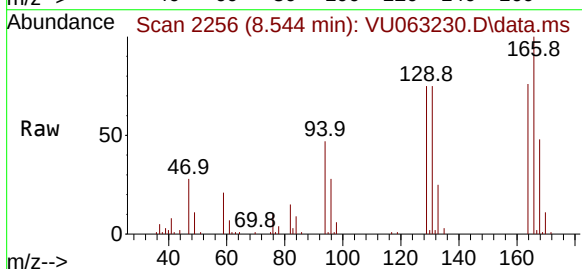
Tgt Ion: 95 Resp: 17934
Ion Ratio Lower Upper
95 100
174 80.9 58.6 88.0
176 77.4 58.2 87.4

Manual Integrations
APPROVED

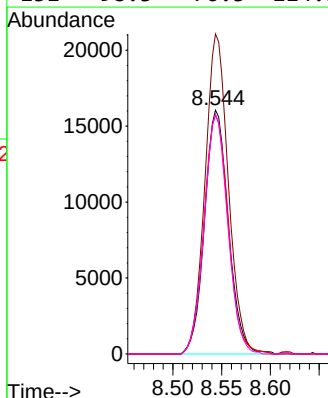
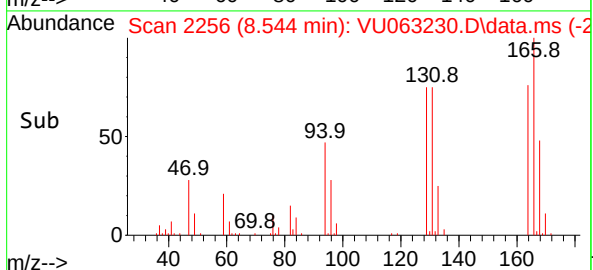
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025

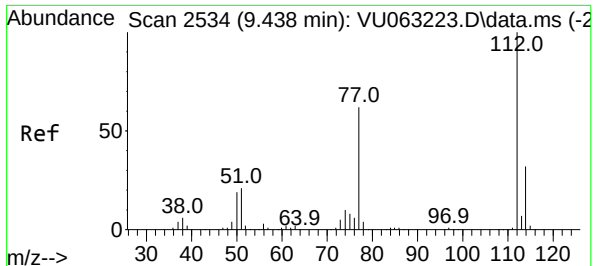


#58
Tetrachloroethene
Concen: 2.043 ug/l
RT: 8.544 min Scan# 2256
Delta R.T. -0.000 min
Lab File: VU063230.D
Acq: 11 Feb 2025 12:07



Tgt Ion:164 Resp: 27268
Ion Ratio Lower Upper
164 100
166 131.2 101.4 152.0
129 98.0 77.0 115.4
131 98.3 76.3 114.5





#59

Chlorobenzene

Concen: 1.965 ug/l

RT: 9.438 min Scan# 2534

Delta R.T. -0.000 min

Lab File: VU063230.D

Acq: 11 Feb 2025 12:07

Instrument :

MSVOA_U

ClientSampleId :

VU0211WBS01

Tgt Ion:112 Resp: 8119

Ion Ratio Lower Upper

112 100

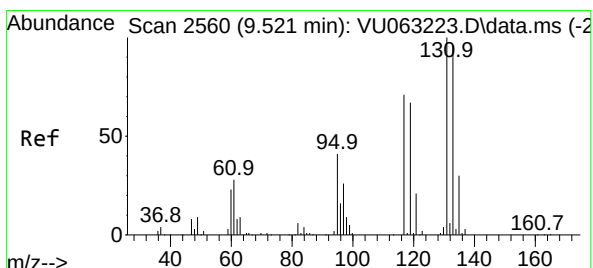
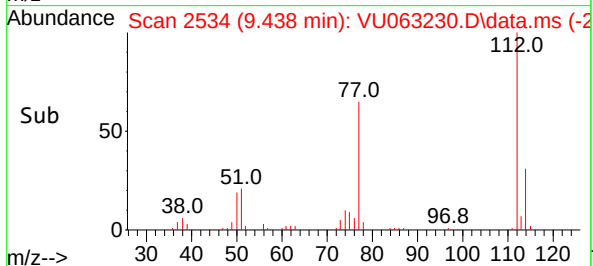
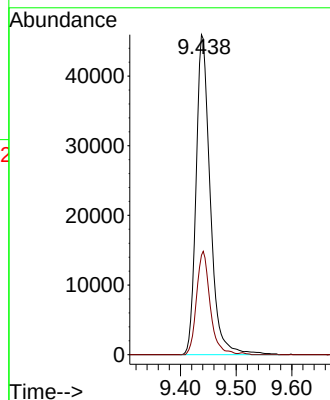
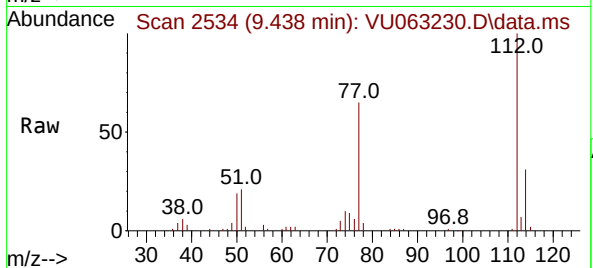
114 31.1 25.7 38.5

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#60

1,1,1,2-Tetrachloroethane

Concen: 1.943 ug/l

RT: 9.524 min Scan# 2561

Delta R.T. 0.003 min

Lab File: VU063230.D

Acq: 11 Feb 2025 12:07

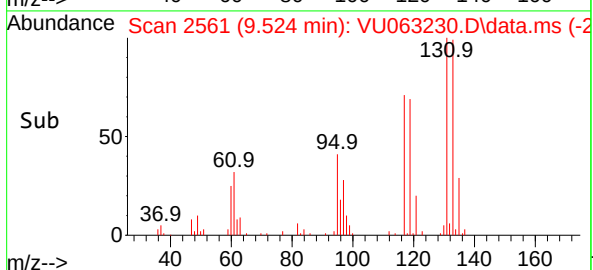
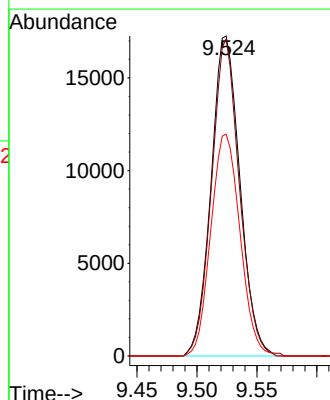
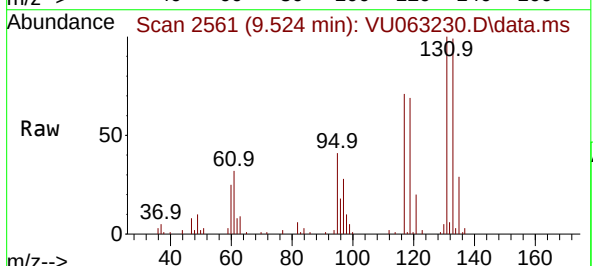
Tgt Ion:131 Resp: 28863

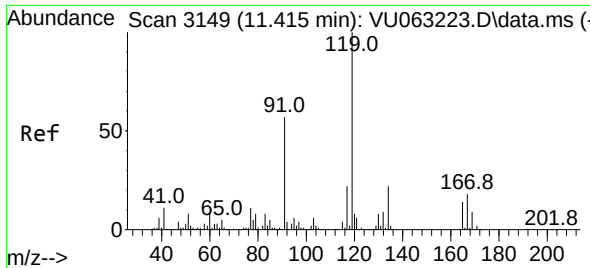
Ion Ratio Lower Upper

131 100

133 95.8 76.7 115.1

119 70.0 54.4 81.6





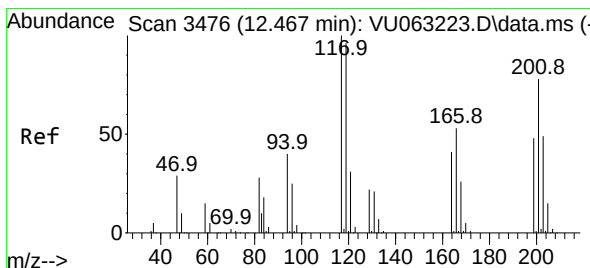
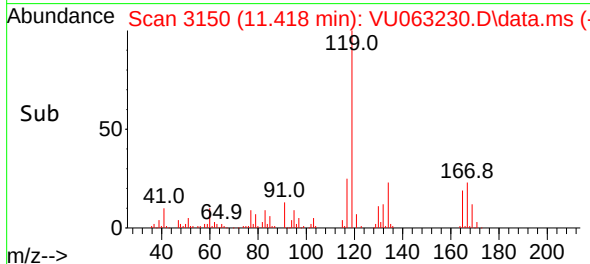
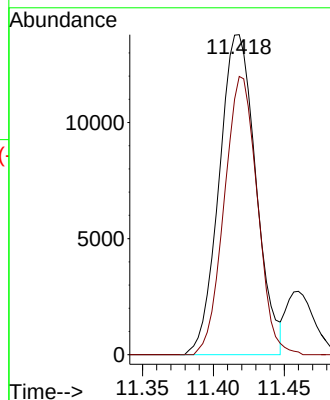
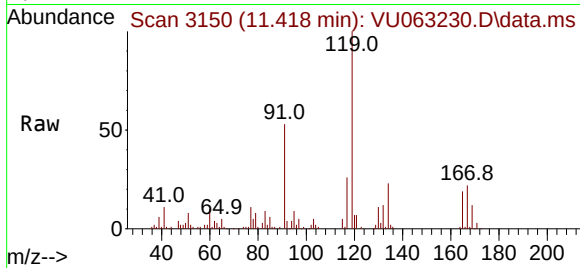
#61
 Pentachloroethane
 Concen: 1.875 ug/l
 RT: 11.418 min Scan# 3149
 Delta R.T. 0.003 min
 Lab File: VU063230.D
 Acq: 11 Feb 2025 12:07

Instrument :
 MSVOA_U
 ClientSampleId :
 VU0211WBS01

Tgt Ion:117 Resp: 2487
 Ion Ratio Lower Upper
 117 100
 167 78.1 65.0 97.6

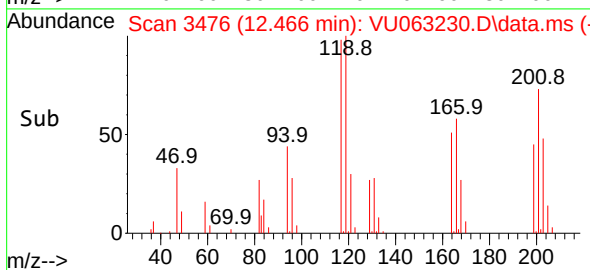
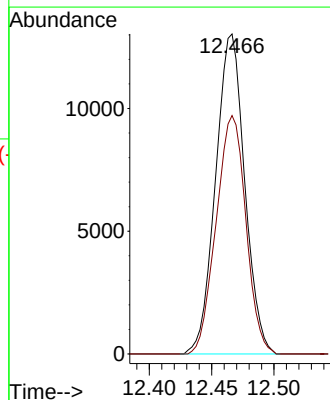
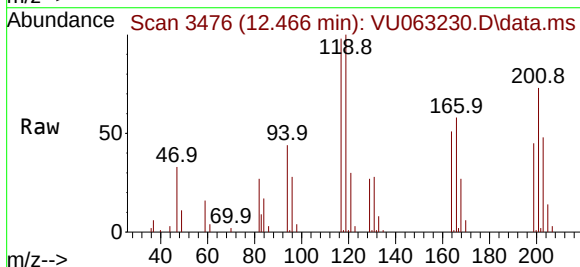
Manual Integrations
 APPROVED

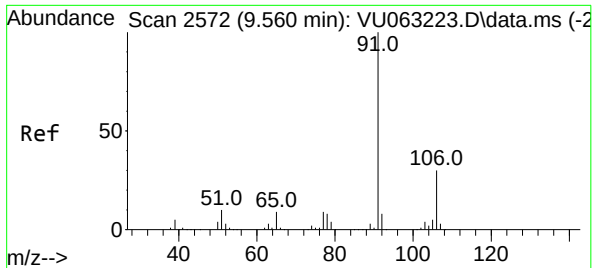
Reviewed By :Amit Patel 02/12/2025
 Supervised By :Mahesh Dadoda 02/12/2025



#62
 Hexachloroethane
 Concen: 1.805 ug/l
 RT: 12.466 min Scan# 3476
 Delta R.T. -0.000 min
 Lab File: VU063230.D
 Acq: 11 Feb 2025 12:07

Tgt Ion:117 Resp: 21187
 Ion Ratio Lower Upper
 117 100
 201 76.1 61.3 91.9





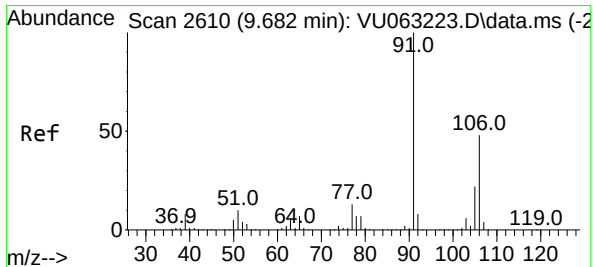
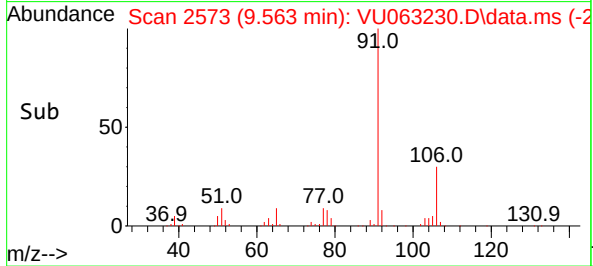
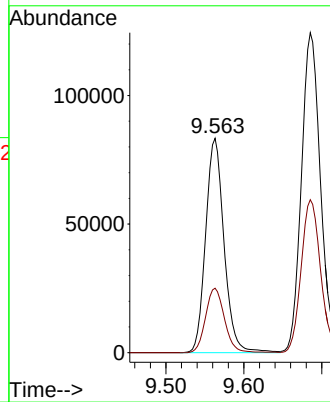
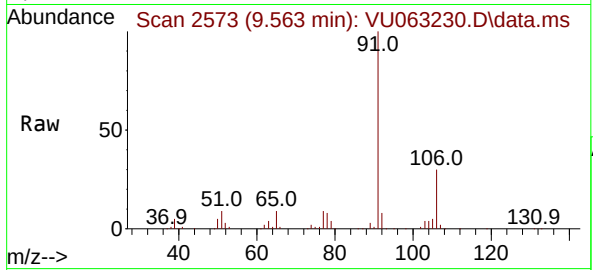
#63
Ethyl Benzene
Concen: 1.923 ug/l
RT: 9.563 min Scan# 2572
Delta R.T. 0.003 min
Lab File: VU063230.D
Acq: 11 Feb 2025 12:07

Instrument :
MSVOA_U
ClientSampleId :
VU0211WBS01

Tgt Ion: 91 Resp: 137062
Ion Ratio Lower Upper
91 100
106 30.1 24.2 36.2

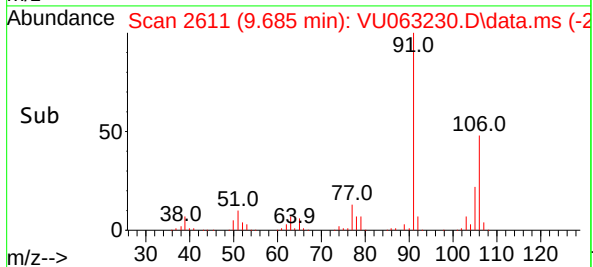
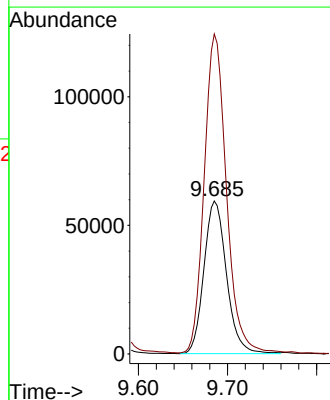
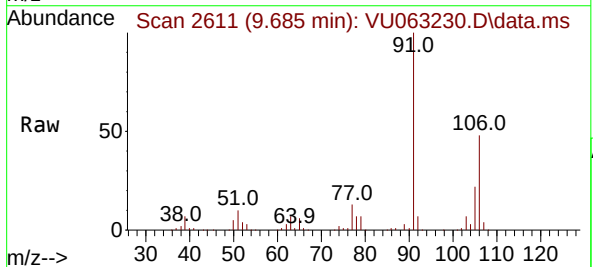
Manual Integrations
APPROVED

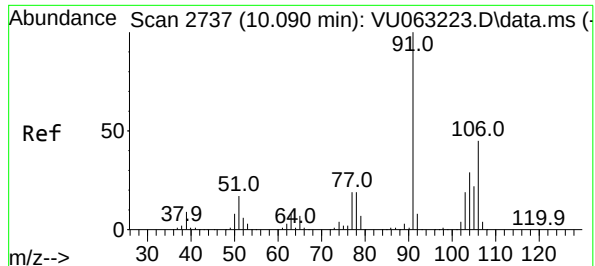
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#64
m/p-Xylenes
Concen: 3.922 ug/l
RT: 9.685 min Scan# 2611
Delta R.T. 0.003 min
Lab File: VU063230.D
Acq: 11 Feb 2025 12:07

Tgt Ion:106 Resp: 104430
Ion Ratio Lower Upper
106 100
91 204.7 166.9 250.3





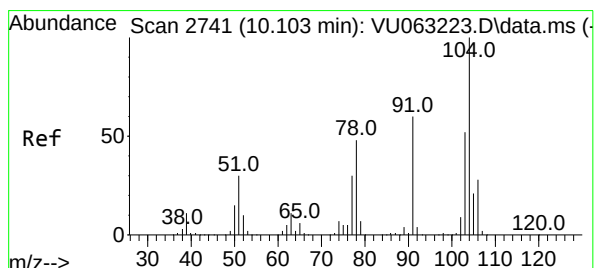
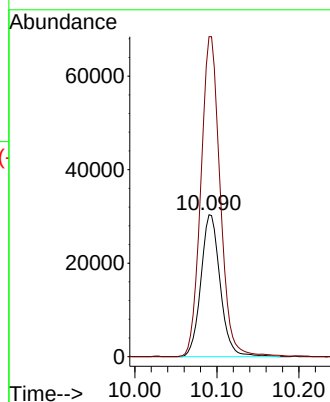
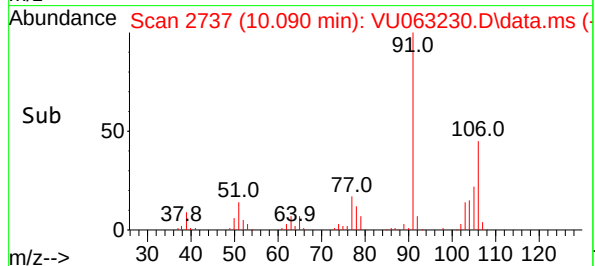
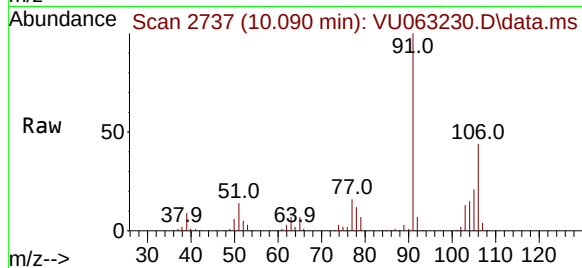
#65
o-Xylene
Concen: 1.904 ug/l
RT: 10.090 min Scan# 2737
Delta R.T. -0.000 min
Lab File: VU063230.D
Acq: 11 Feb 2025 12:07

Instrument :
MSVOA_U
ClientSampleId :
VU0211WBS01

Tgt Ion:106 Resp: 49629
Ion Ratio Lower Upper
106 100
91 226.3 110.9 332.9

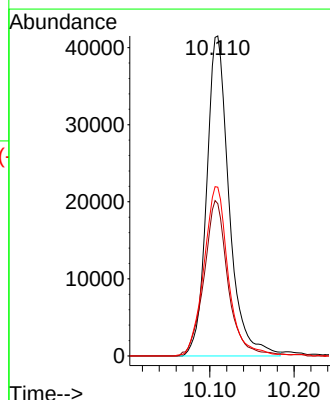
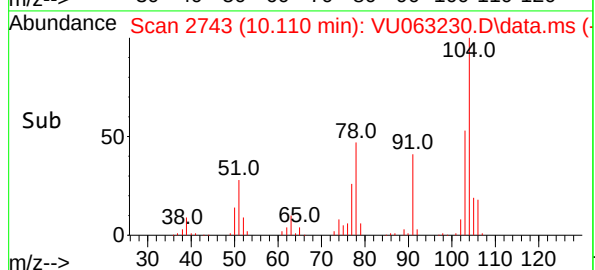
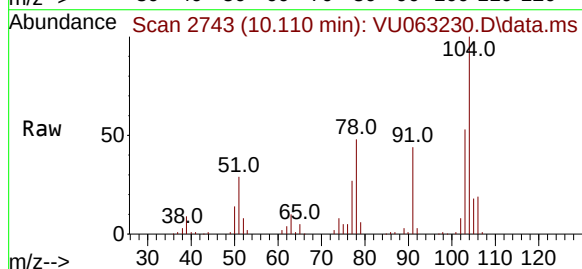
Manual Integrations
APPROVED

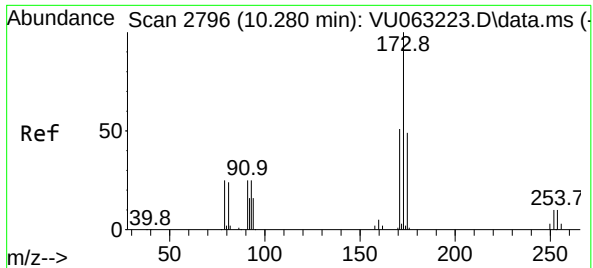
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#66
Styrene
Concen: 1.858 ug/l
RT: 10.110 min Scan# 2743
Delta R.T. 0.006 min
Lab File: VU063230.D
Acq: 11 Feb 2025 12:07

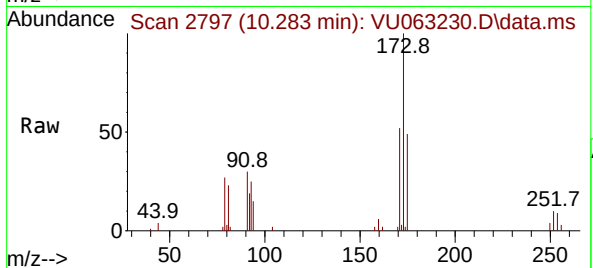
Tgt Ion:104 Resp: 77051
Ion Ratio Lower Upper
104 100
78 52.1 41.2 61.8
103 57.8 44.8 67.2





#67
Bromoform
Concen: 1.868 ug/l
RT: 10.283 min Scan# 2797
Delta R.T. 0.003 min
Lab File: VU063230.D
Acq: 11 Feb 2025 12:07

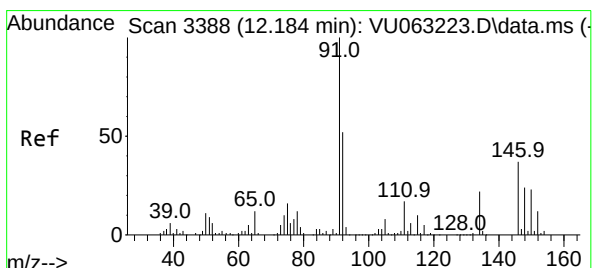
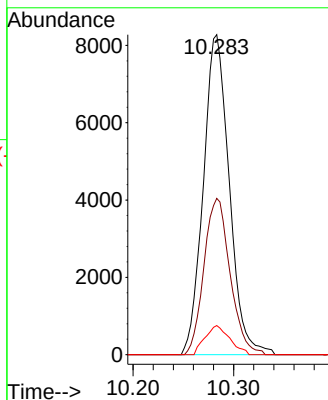
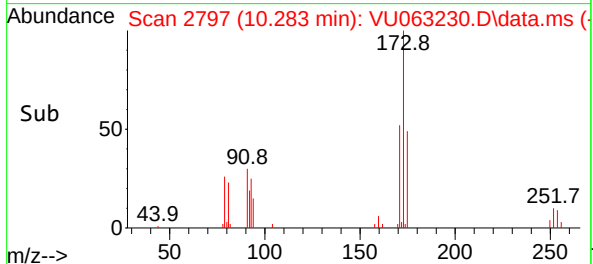
Instrument :
MSVOA_U
ClientSampleId :
VU0211WBS01



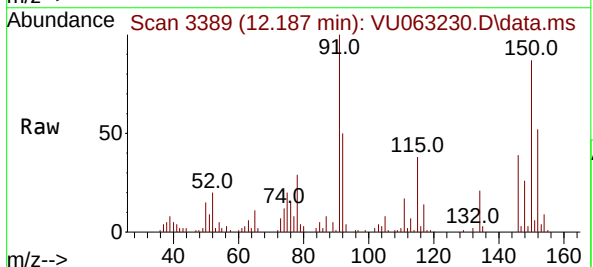
Tgt Ion:173 Resp: 14840
Ion Ratio Lower Upper
173 100
175 49.2 39.0 58.4
254 8.6 7.7 11.5

Manual Integrations
APPROVED

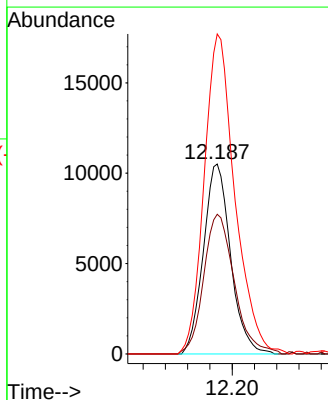
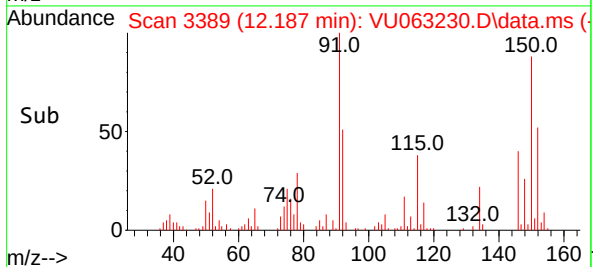
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025

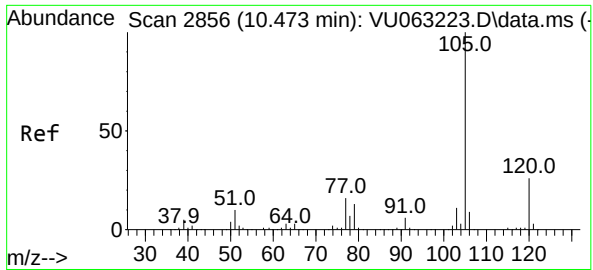


#68
1,2-Dichlorobenzene-d4
Concen: 0.936 ug/l
RT: 12.187 min Scan# 3389
Delta R.T. 0.003 min
Lab File: VU063230.D
Acq: 11 Feb 2025 12:07



Tgt Ion:152 Resp: 17795
Ion Ratio Lower Upper
152 100
115 82.7 0.0 275.2
150 190.1 0.0 658.4





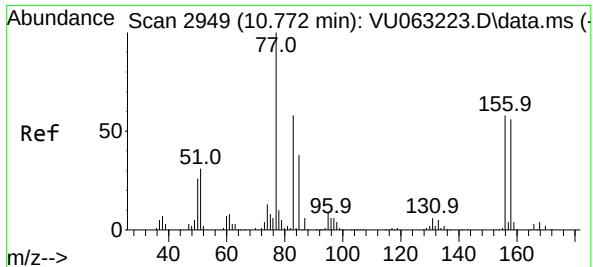
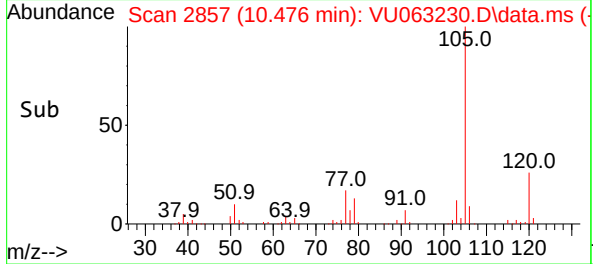
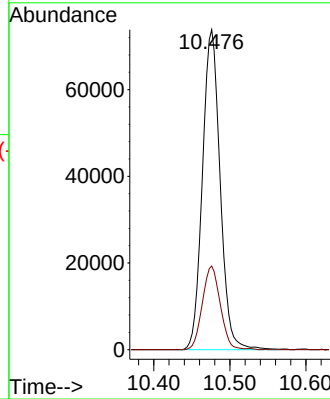
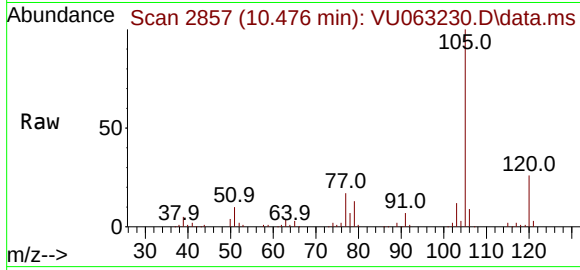
#69
Isopropylbenzene
Concen: 1.948 ug/l
RT: 10.476 min Scan# 2856
Delta R.T. 0.003 min
Lab File: VU063230.D
Acq: 11 Feb 2025 12:07

Instrument :
MSVOA_U
ClientSampleId :
VU0211WBS01

Tgt Ion:105 Resp: 11934
Ion Ratio Lower Upper
105 100
120 26.3 12.8 38.4

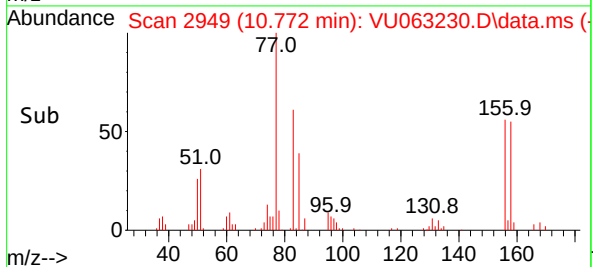
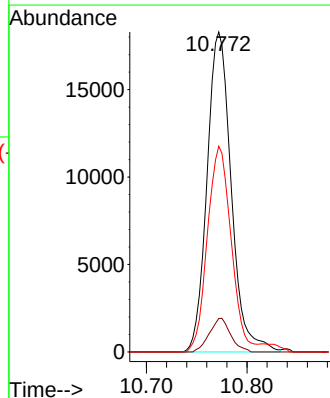
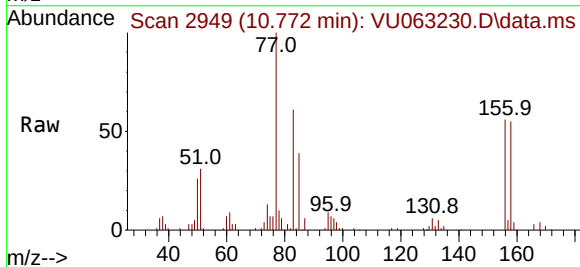
Manual Integrations
APPROVED

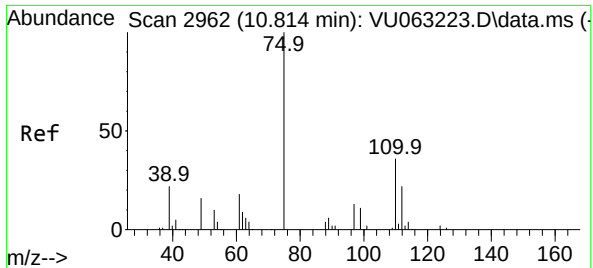
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#70
1,1,2,2-Tetrachloroethane
Concen: 1.864 ug/l
RT: 10.772 min Scan# 2949
Delta R.T. -0.000 min
Lab File: VU063230.D
Acq: 11 Feb 2025 12:07

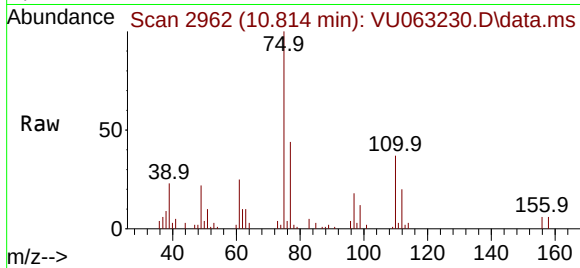
Tgt Ion: 83 Resp: 30580
Ion Ratio Lower Upper
83 100
131 9.2 7.4 11.0
85 63.1 51.8 77.8





#71
1,2,3-Trichloropropane
Concen: 2.020 ug/l m
RT: 10.814 min Scan# 2962
Delta R.T. -0.000 min
Lab File: VU063230.D
Acq: 11 Feb 2025 12:07

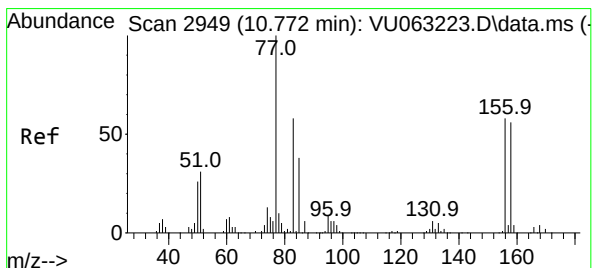
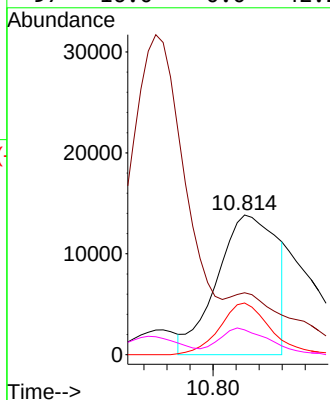
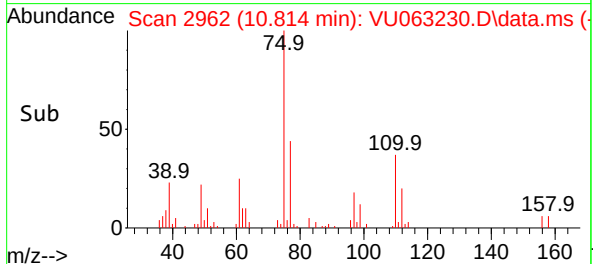
Instrument :
MSVOA_U
ClientSampleId :
VU0211WBS01



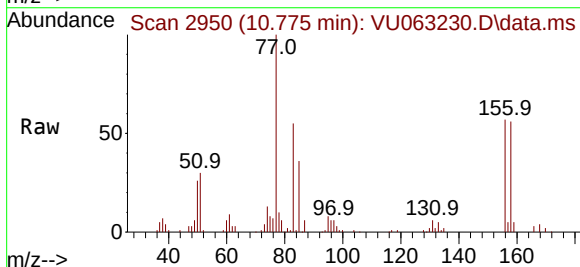
Tgt Ion: 75 Resp: 24894
Ion Ratio Lower Upper
75 100
77 0.0 0.0 0.0
110 31.6 0.0 77.0
97 16.0 0.0 42.2

Manual Integrations
APPROVED

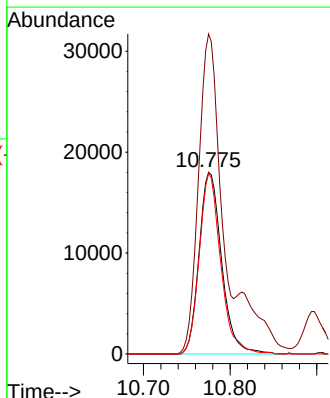
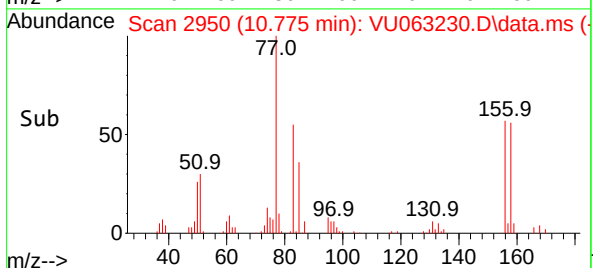
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025

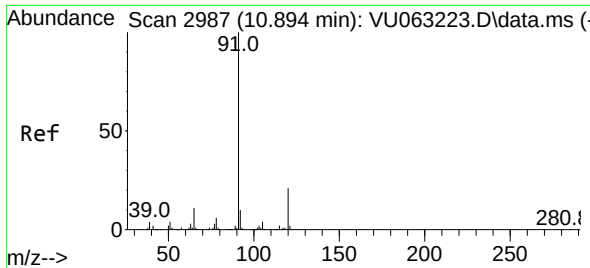


#72
Bromobenzene
Concen: 1.969 ug/l
RT: 10.775 min Scan# 2950
Delta R.T. 0.003 min
Lab File: VU063230.D
Acq: 11 Feb 2025 12:07



Tgt Ion:156 Resp: 32516
Ion Ratio Lower Upper
156 100
77 168.7 0.0 343.6
158 94.8 0.0 193.0





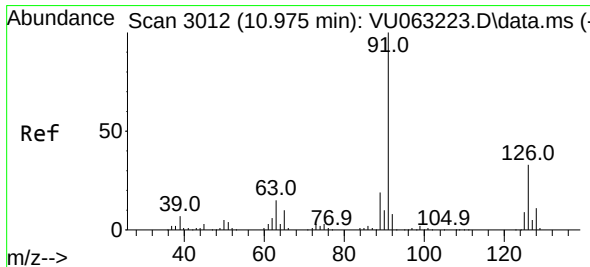
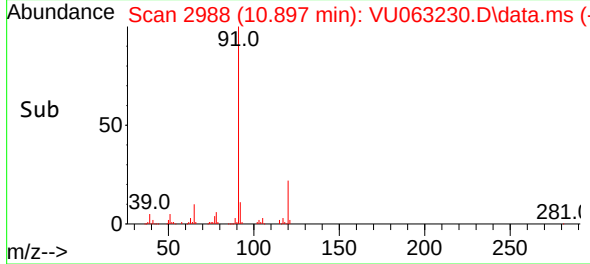
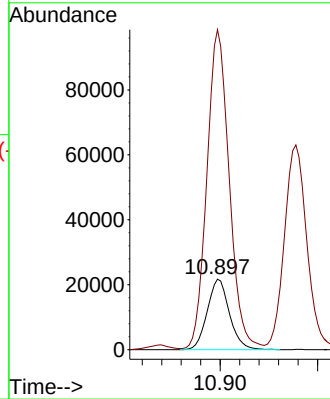
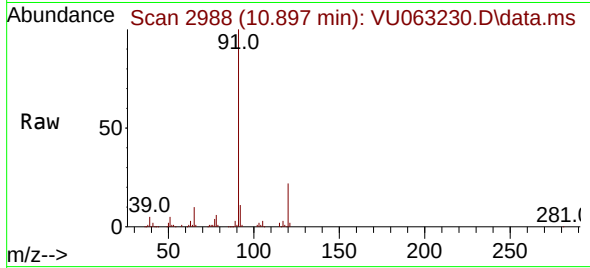
#73
n-propylbenzene
Concen: 1.951 ug/l
RT: 10.897 min Scan# 2987
Delta R.T. 0.003 min
Lab File: VU063230.D
Acq: 11 Feb 2025 12:07

Instrument :
MSVOA_U
ClientSampleId :
VU0211WBS01

Tgt Ion:120 Resp: 3423
Ion Ratio Lower Upper
120 100
91 454.5 369.8 554.6

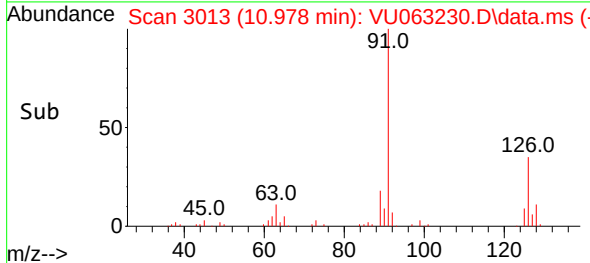
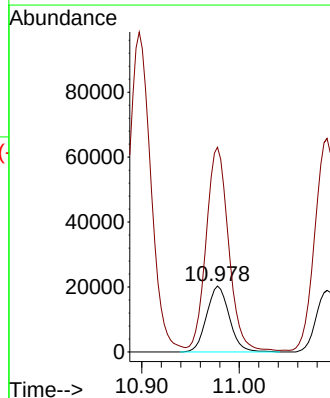
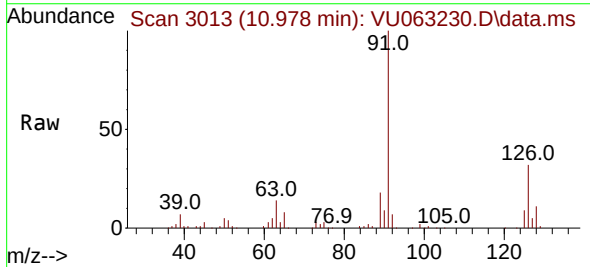
Manual Integrations
APPROVED

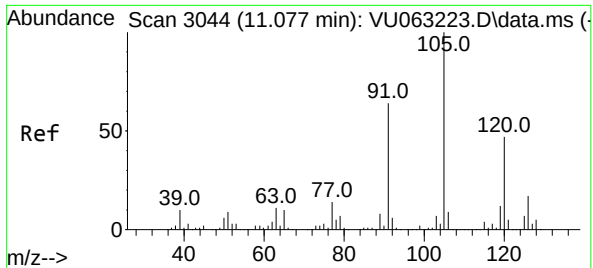
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#74
2-Chlorotoluene
Concen: 2.025 ug/l
RT: 10.978 min Scan# 3013
Delta R.T. 0.003 min
Lab File: VU063230.D
Acq: 11 Feb 2025 12:07

Tgt Ion:126 Resp: 32733
Ion Ratio Lower Upper
126 100
91 307.0 0.0 623.8





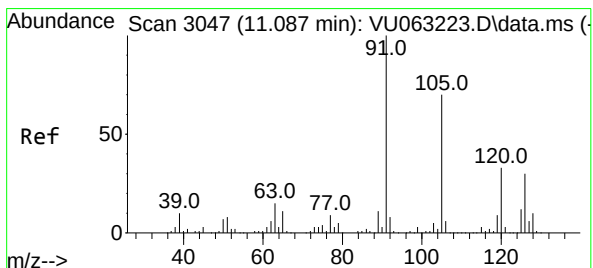
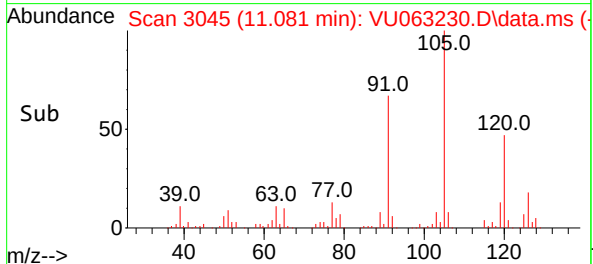
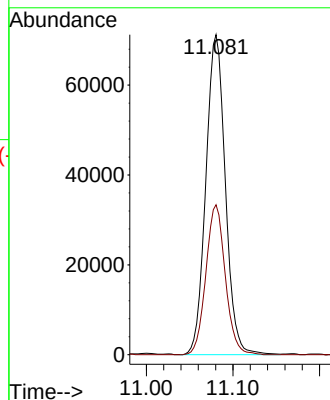
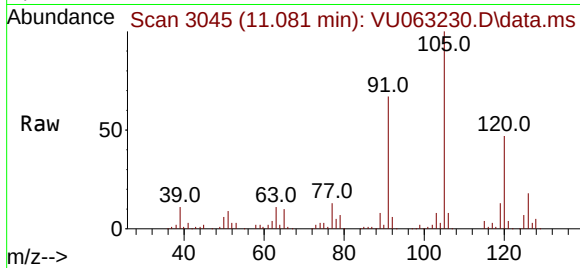
#75
1,3,5-Trimethylbenzene
Concen: 1.963 ug/l
RT: 11.081 min Scan# 3044
Delta R.T. 0.003 min
Lab File: VU063230.D
Acq: 11 Feb 2025 12:07

Instrument :
MSVOA_U
ClientSampleId :
VU0211WBS01

Tgt Ion:105 Resp: 111469
Ion Ratio Lower Upper
105 100
120 46.6 37.3 55.9

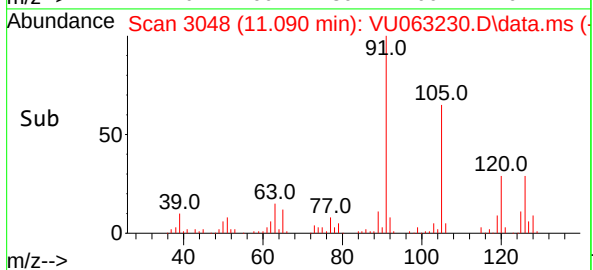
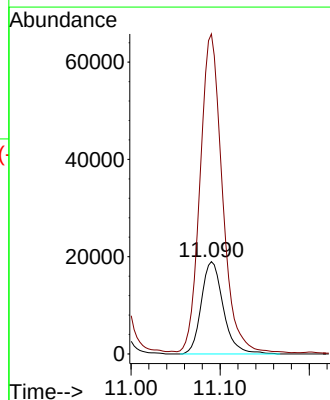
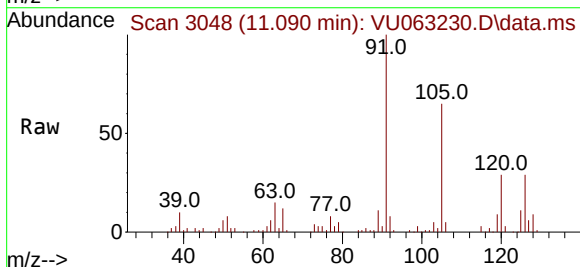
Manual Integrations
APPROVED

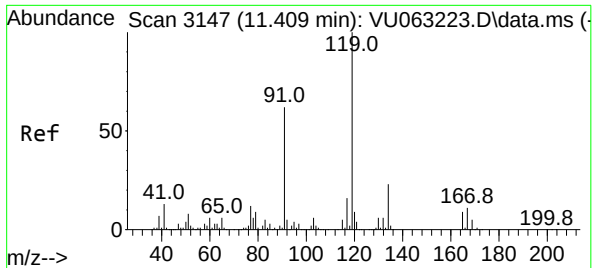
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#76
4-Chlorotoluene
Concen: 1.960 ug/l
RT: 11.090 min Scan# 3048
Delta R.T. 0.003 min
Lab File: VU063230.D
Acq: 11 Feb 2025 12:07

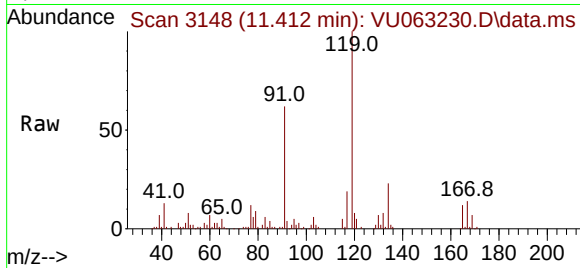
Tgt Ion:126 Resp: 32504
Ion Ratio Lower Upper
126 100
91 350.2 0.0 703.6





#77
tert-Butylbenzene
Concen: 1.949 ug/l
RT: 11.412 min Scan# 3148
Delta R.T. 0.003 min
Lab File: VU063230.D
Acq: 11 Feb 2025 12:07

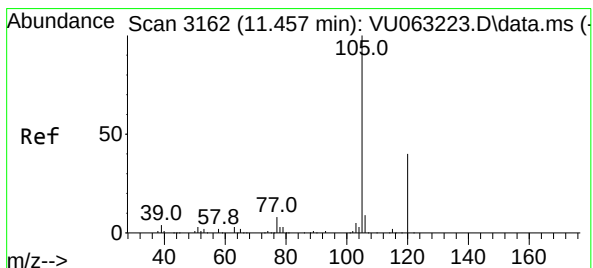
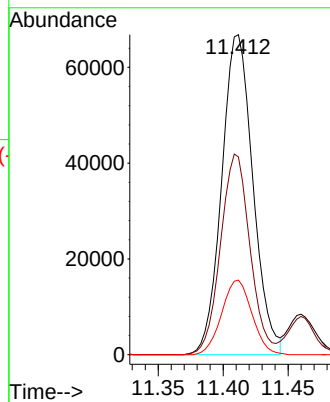
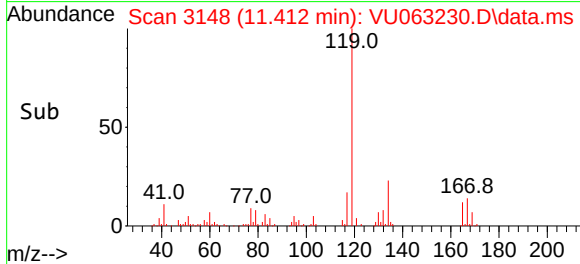
Instrument :
MSVOA_U
ClientSampleId :
VU0211WBS01



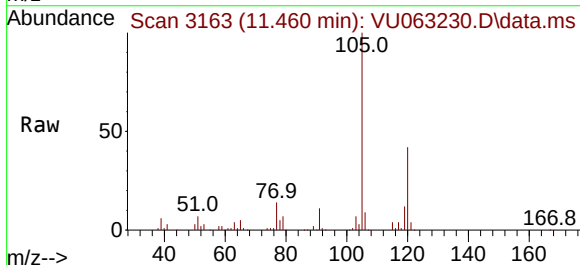
Tgt Ion:119 Resp: 11193
Ion Ratio Lower Upper
119 100
91 59.2 29.4 88.3
134 22.5 17.6 26.4

Manual Integrations
APPROVED

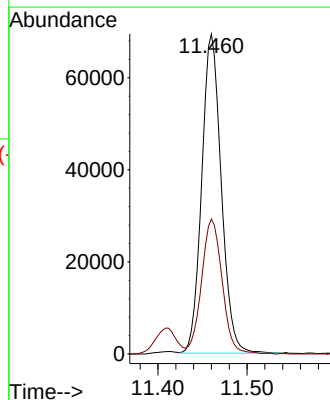
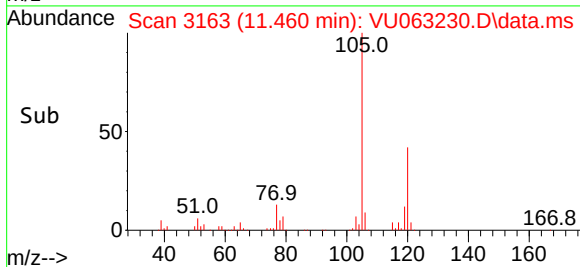
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025

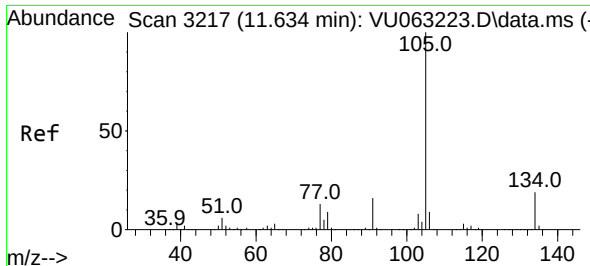


#78
1,2,4-Trimethylbenzene
Concen: 1.873 ug/l
RT: 11.460 min Scan# 3163
Delta R.T. 0.003 min
Lab File: VU063230.D
Acq: 11 Feb 2025 12:07



Tgt Ion:105 Resp: 105544
Ion Ratio Lower Upper
105 100
120 44.0 21.9 65.7





#79

sec-Butylbenzene

Concen: 1.963 ug/l

RT: 11.634 min Scan# 3217

Delta R.T. -0.000 min

Lab File: VU063230.D

Acq: 11 Feb 2025 12:07

Instrument :

MSVOA_U

ClientSampleId :

VU0211WBS01

Tgt Ion:105 Resp: 14348

Ion Ratio Lower Upper

105 100

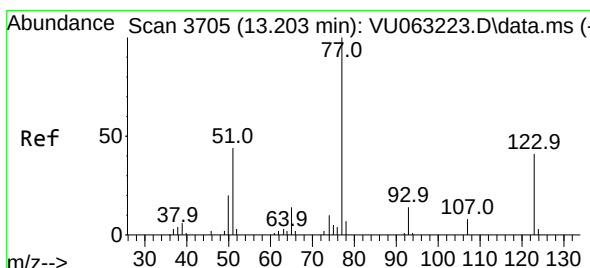
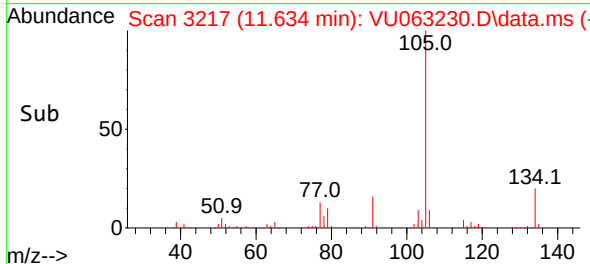
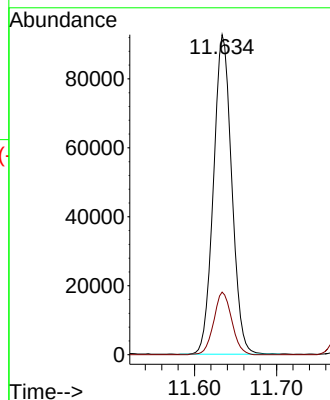
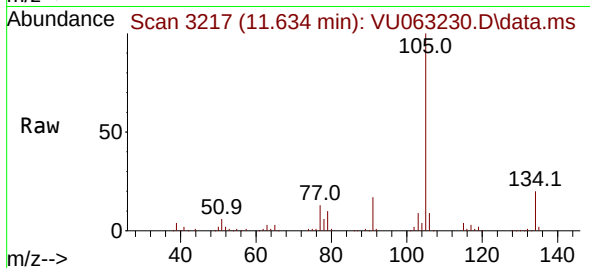
134 19.4 15.1 22.7

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#80

Nitrobenzene

Concen: 8.833 ug/l m

RT: 13.225 min Scan# 3712

Delta R.T. 0.022 min

Lab File: VU063230.D

Acq: 11 Feb 2025 12:07

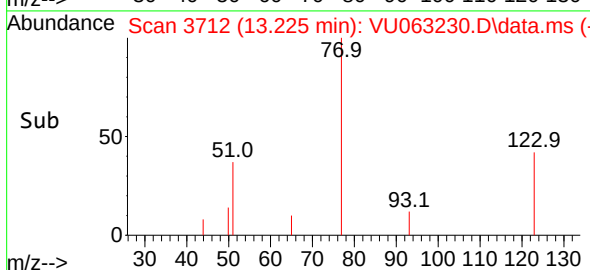
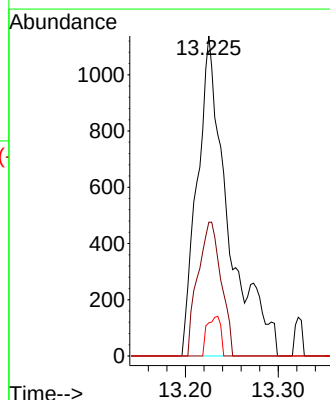
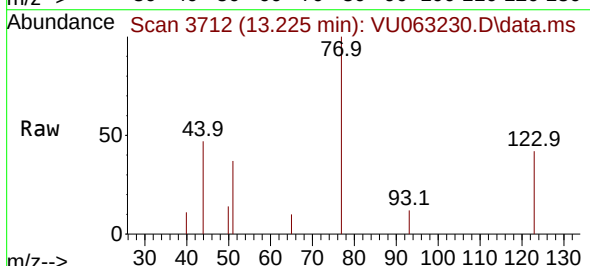
Tgt Ion: 77 Resp: 2628

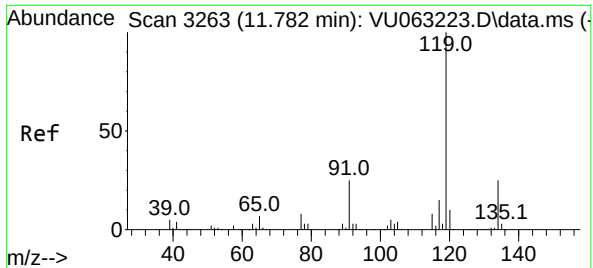
Ion Ratio Lower Upper

77 100

123 31.4 18.9 67.1

65 5.4 11.9 15.1#





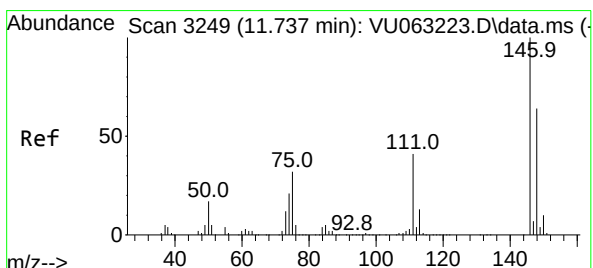
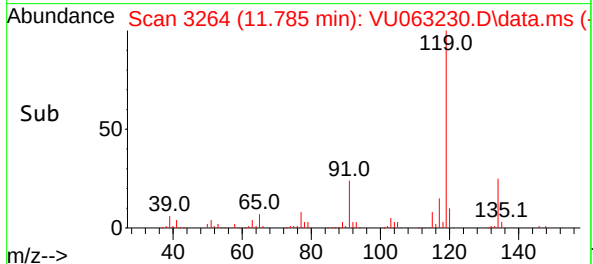
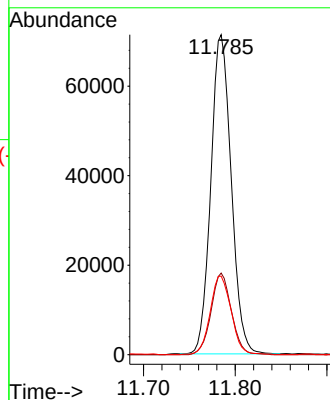
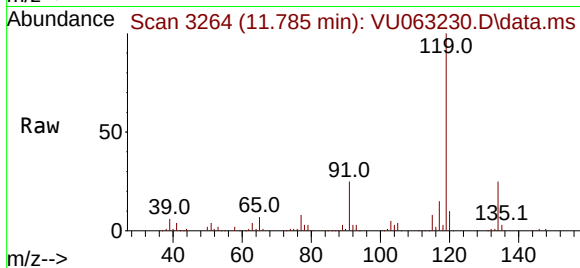
#81
p-Isopropyltoluene
Concen: 1.911 ug/l
RT: 11.785 min Scan# 31
Delta R.T. 0.003 min
Lab File: VU063230.D
Acq: 11 Feb 2025 12:07

Instrument :
MSVOA_U
ClientSampleId :
VU0211WBS01

Tgt Ion:119 Resp: 11027
Ion Ratio Lower Upper
119 100
134 25.5 20.3 30.5
91 25.4 19.4 29.2

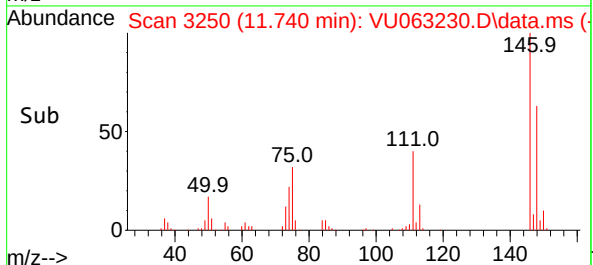
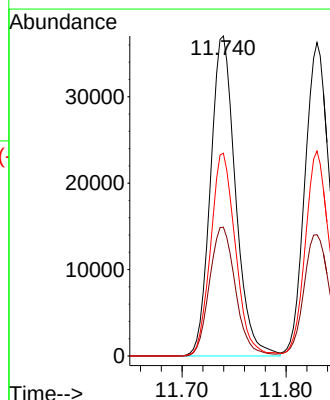
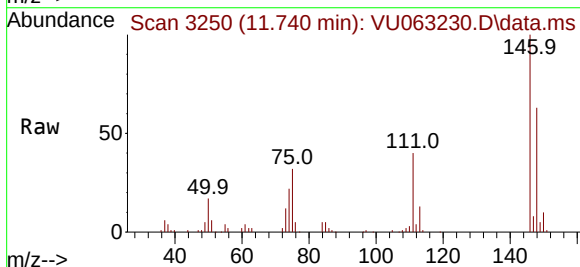
Manual Integrations
APPROVED

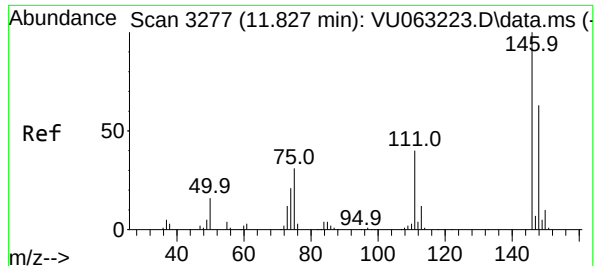
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#82
1,3-Dichlorobenzene
Concen: 1.933 ug/l
RT: 11.740 min Scan# 3250
Delta R.T. 0.003 min
Lab File: VU063230.D
Acq: 11 Feb 2025 12:07

Tgt Ion:146 Resp: 61914
Ion Ratio Lower Upper
146 100
111 41.9 32.8 49.2
148 63.2 51.1 76.7





#83

1,4-Dichlorobenzene

Concen: 1.950 ug/l

RT: 11.830 min Scan# 3277

Delta R.T. 0.003 min

Lab File: VU063230.D

Acq: 11 Feb 2025 12:07

Instrument :

MSVOA_U

ClientSampleId :

VU0211WBS01

Tgt Ion:146 Resp: 61090

Ion Ratio Lower Upper

146 100

111 41.0 32.1 48.1

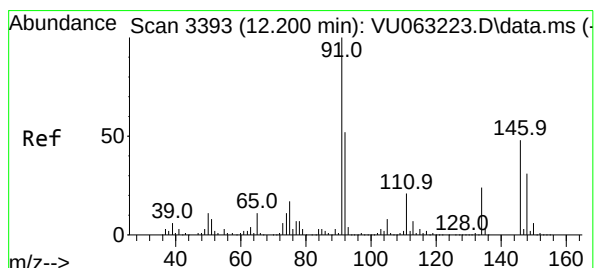
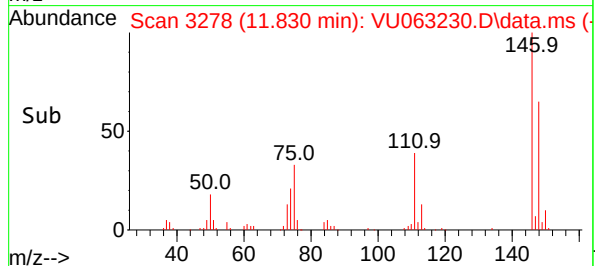
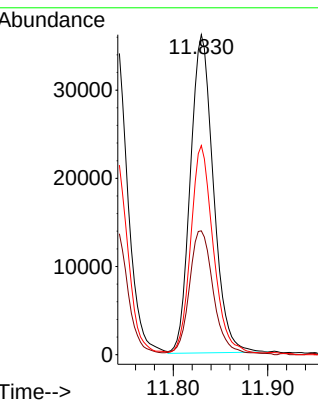
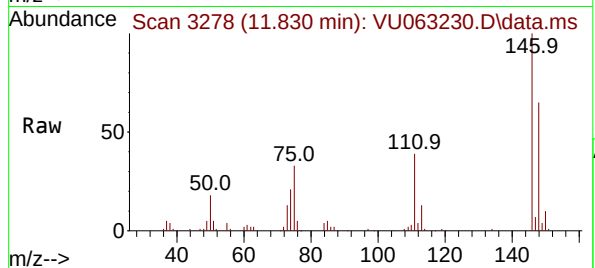
148 63.6 50.2 75.4

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#84

n-Butylbenzene

Concen: 1.839 ug/l

RT: 12.199 min Scan# 3393

Delta R.T. -0.000 min

Lab File: VU063230.D

Acq: 11 Feb 2025 12:07

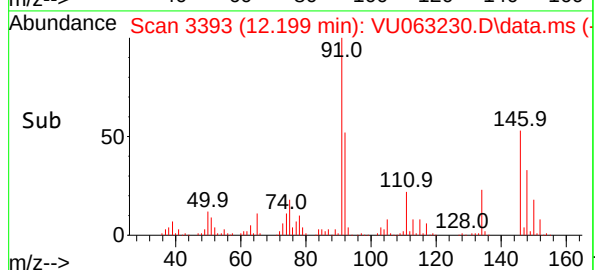
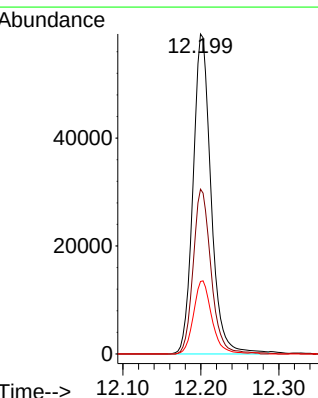
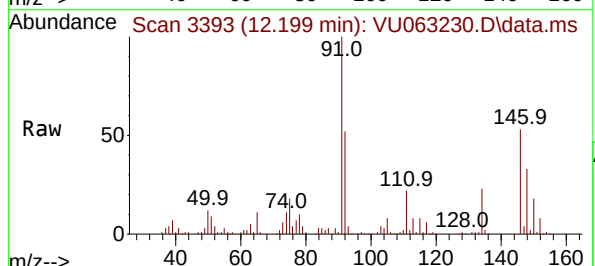
Tgt Ion: 91 Resp: 95124

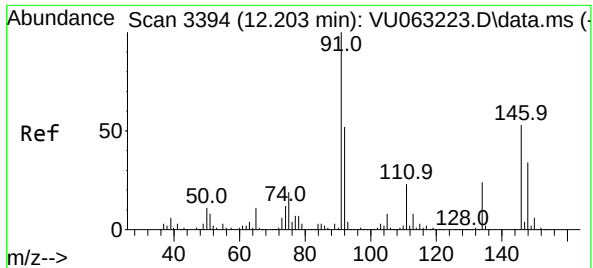
Ion Ratio Lower Upper

91 100

92 51.1 41.8 62.8

134 23.2 18.6 28.0





#85

1,2-Dichlorobenzene

Concen: 1.942 ug/l

RT: 12.206 min Scan# 31

Delta R.T. 0.003 min

Lab File: VU063230.D

Acq: 11 Feb 2025 12:07

Instrument :

MSVOA_U

ClientSampleId :

VU0211WBS01

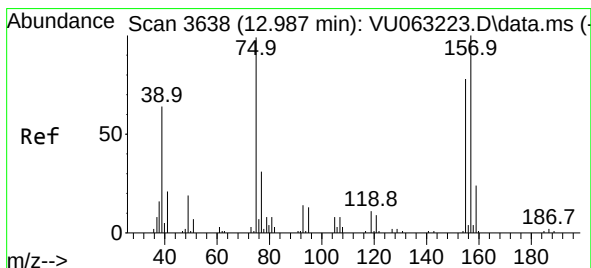
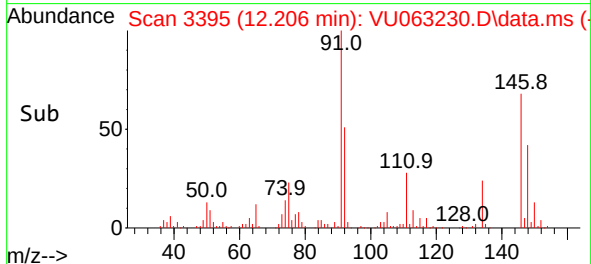
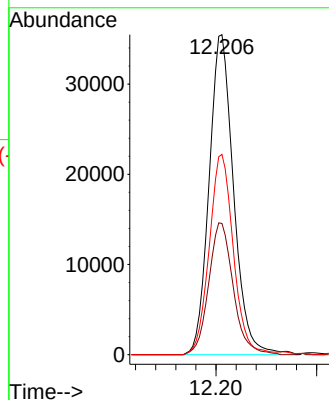
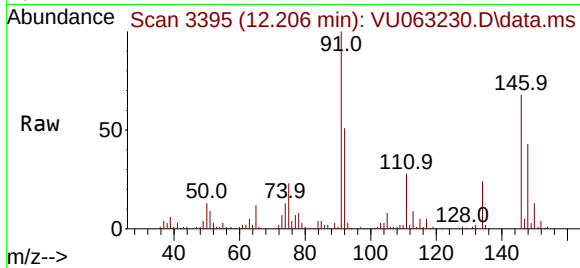
Tgt Ion:	146	Resp:	5975
Ion Ratio	Lower	Upper	
146	100		
111	41.4	21.9	65.7
148	62.1	32.3	96.9

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#86

1,2-Dibromo-3-Chloropropane

Concen: 1.776 ug/l

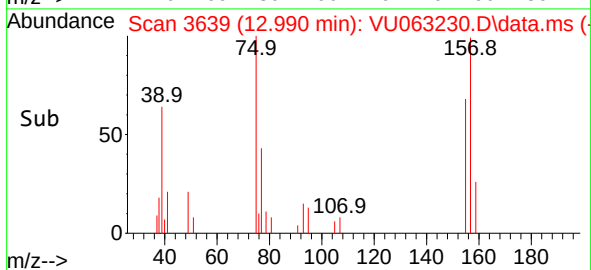
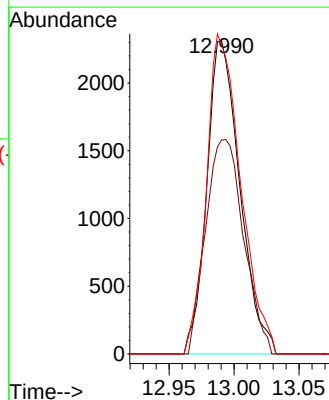
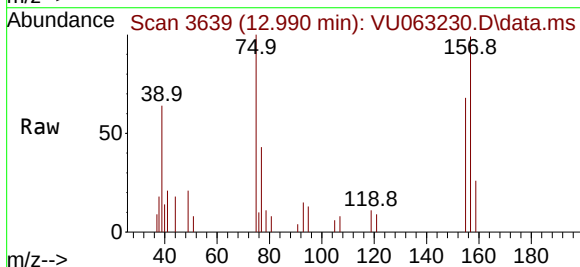
RT: 12.990 min Scan# 3639

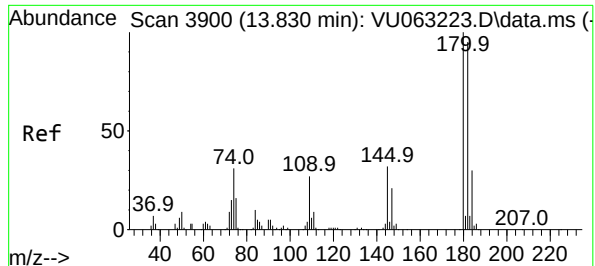
Delta R.T. 0.003 min

Lab File: VU063230.D

Acq: 11 Feb 2025 12:07

Tgt Ion:	75	Resp:	4088
Ion Ratio	Lower	Upper	
75	100		
155	78.8	63.5	95.3
157	105.6	81.8	122.6





#87

1,2,4-Trichlorobenzene

Concen: 1.905 ug/l

RT: 13.836 min Scan# 3900

Delta R.T. 0.006 min

Lab File: VU063230.D

Acq: 11 Feb 2025 12:07

Instrument :

MSVOA_U

ClientSampleId :

VU0211WBS01

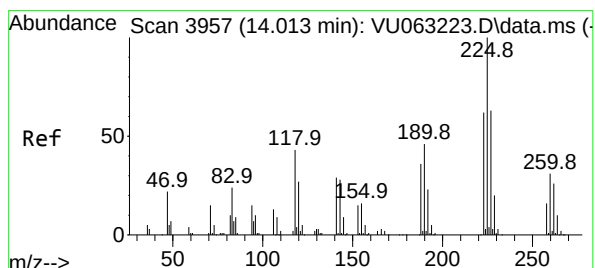
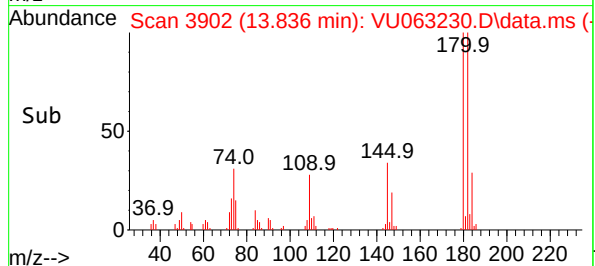
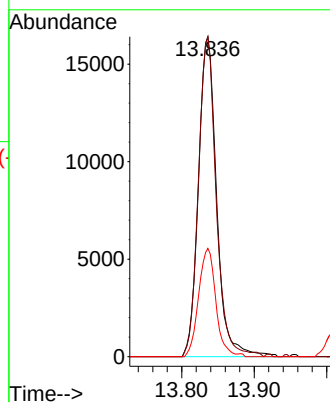
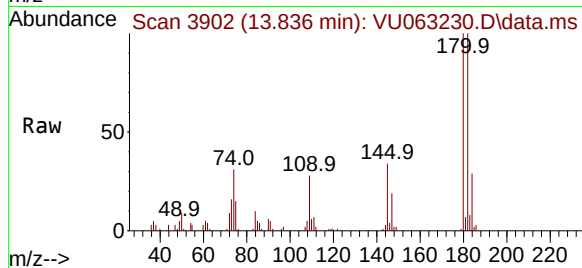
Tgt Ion:180	Resp:	2859
Ion Ratio	Lower	Upper
180	100	
182	97.3	76.6 115.0
145	31.9	25.4 38.2

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#88

Hexachlorobutadiene

Concen: 2.041 ug/l

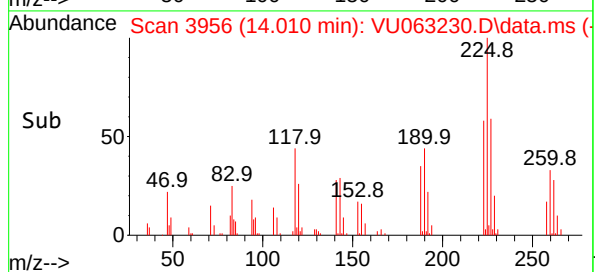
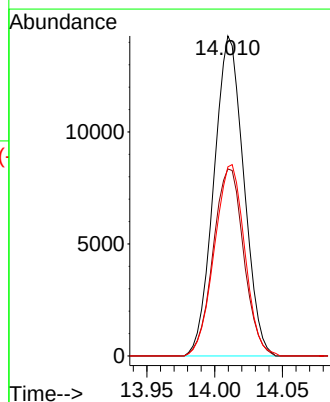
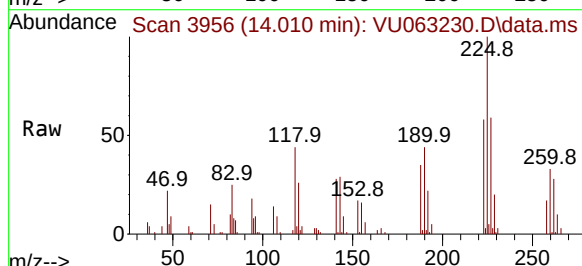
RT: 14.010 min Scan# 3956

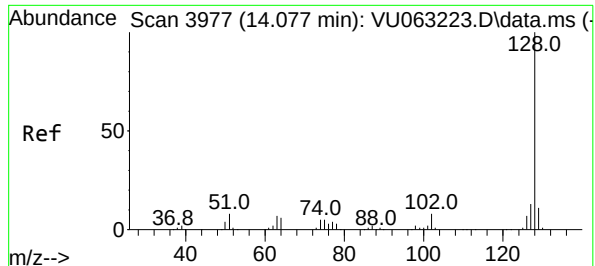
Delta R.T. -0.003 min

Lab File: VU063230.D

Acq: 11 Feb 2025 12:07

Tgt Ion:225	Resp:	21893
Ion Ratio	Lower	Upper
225	100	
223	59.9	49.5 74.3
227	60.9	51.0 76.4





#89

Naphthalene

Concen: 1.883 ug/l

RT: 14.084 min Scan# 3977

Delta R.T. 0.006 min

Lab File: VU063230.D

Acq: 11 Feb 2025 12:07

Instrument :

MSVOA_U

ClientSampleId :

VU0211WBS01

Tgt Ion:128 Resp: 4113

Ion Ratio Lower Upper

128 100

127 11.7 10.6 16.0

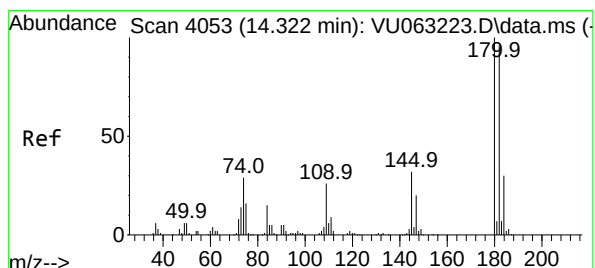
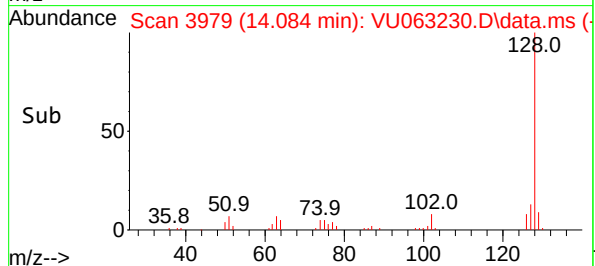
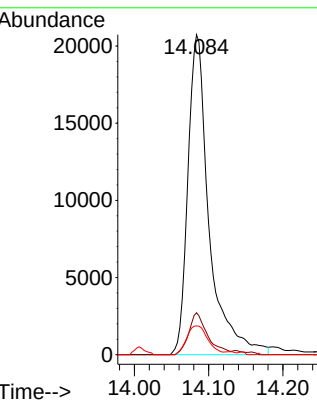
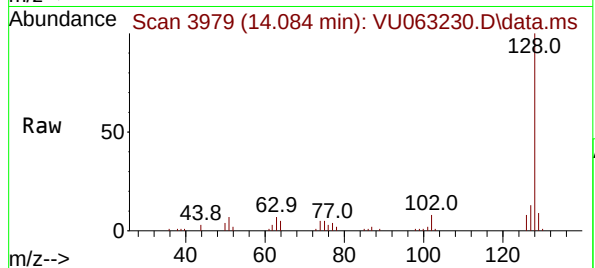
129 9.0 8.6 13.0

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#90

1,2,3-Trichlorobenzene

Concen: 1.815 ug/l

RT: 14.322 min Scan# 4053

Delta R.T. -0.000 min

Lab File: VU063230.D

Acq: 11 Feb 2025 12:07

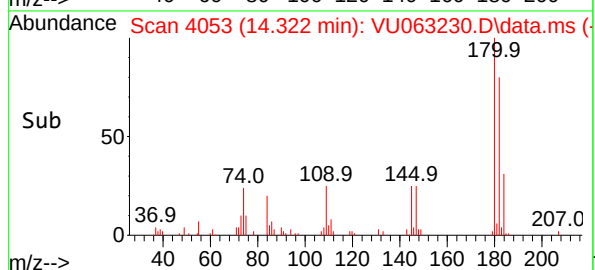
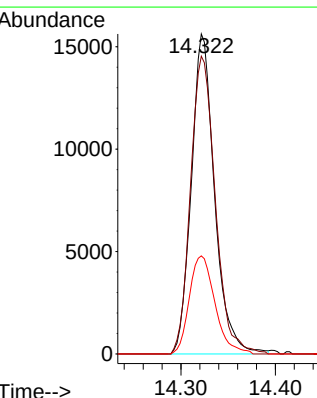
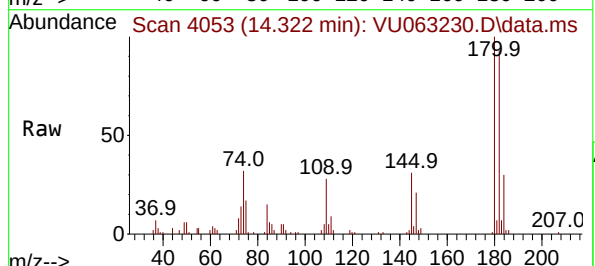
Tgt Ion:180 Resp: 26648

Ion Ratio Lower Upper

180 100

182 99.1 78.2 117.2

145 33.8 26.1 39.1



Report of Analysis

Client:	Chemtech Consulting Group	Date Collected:	
Project:	NJ Drinking Water PT	Date Received:	
Client Sample ID:	VU0211WBSD01	SDG No.:	Q1172
Lab Sample ID:	VU0211WBSD01	Matrix:	Water
Analytical Method:	E524.2	% Solid:	0
Sample Wt/Vol:	25 Units: mL	Final Vol:	25000 uL
Soil Aliquot Vol:	uL	Test:	VOCMS Group4
GC Column:	DB-624UI ID : 0.18	Level :	LOW
Prep Method :			

File ID/Qc Batch:	Dilution:	Prep Date	Date Analyzed	Prep Batch ID
VU063231.D	1		02/11/25 12:31	VU021125

CAS Number	Parameter	Conc.	Qualifier	MDL	LOQ / CRQL	Units
TARGETS						
67-66-3	Chloroform	1.90		0.13	0.50	ug/L
75-27-4	Bromodichloromethane	2.00		0.12	0.50	ug/L
124-48-1	Dibromochloromethane	1.90		0.13	0.50	ug/L
75-25-2	Bromoform	1.80		0.14	0.50	ug/L
SURROGATES						
2199-69-1	1,2-Dichlorobenzene-d4	0.96		70 - 130	96%	SPK: 1
460-00-4	4-Bromofluorobenzene	1.00		70 - 130	103%	SPK: 1
INTERNAL STANDARDS						
462-06-6	Fluorobenzene	54800	6.103			

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_U\Data\VU021125\
 Data File : VU063231.D
 Acq On : 11 Feb 2025 12:31
 Operator : MD/SY
 Sample : VU0211WBSD01
 Misc : 25.0mL/MSVOA_U/WATER
 ALS Vial : 8 Sample Multiplier: 1

Instrument :
 MSVOA_U
 ClientSampleId :
 VU0211WBSD01

Manual Integrations
 APPROVED

Reviewed By :Amit Patel 02/12/2025
 Supervised By :Mahesh Dadoda 02/12/2025

Quant Time: Feb 12 03:17:39 2025
 Quant Method : Z:\voasrv\HPCHEM1\MSVOA_U\Method\524U021025DW.M
 Quant Title : METHOD 524.2 VOLATILES DRINKING WATER
 QLast Update : Tue Feb 11 08:42:19 2025
 Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) Fluorobenzene	6.103	96	54780	1.000	ug/l	# 0.00
System Monitoring Compounds						
57) 4-Bromofluorobenzene	10.627	95	18663	1.033	ug/l	0.00
Spiked Amount 1.000			Recovery	=	103.000%	
68) 1,2-Dichlorobenzene-d4	12.183	152	18049	0.961	ug/l	0.00
Spiked Amount 1.000			Recovery	=	96.000%	
Target Compounds						
					Qvalue	
2) Dichlorodifluoromethane	1.380	85	33113	1.860	ug/l	98
3) Chloromethane	1.515	50	37175	1.814	ug/l	97
4) Vinyl Chloride	1.599	62	38868	1.917	ug/l	100
5) Bromomethane	1.846	94	21592	2.179	ug/l	93
6) Chloroethane	1.923	64	22977	1.799	ug/l	96
7) Trichlorofluoromethane	2.129	101	46922	1.953	ug/l	98
8) 1,1,2-Trichloro-1,2,2-...	2.570	101	26150	1.917	ug/l	99
9) 1,1-Dichloroethene	2.570	96	26901	1.936	ug/l	98
10) Iodomethane	2.711	142	40470	1.852	ug/l	100
11) Allyl Chloride	2.914	41	35836	1.795	ug/l	93
12) Acrylonitrile	3.322	53	11247	3.509	ug/l	97
13) Acetone	2.624	43	21459	8.706	ug/l	97
14) Carbon Disulfide	2.782	76	91922	1.892	ug/l	99
15) Methylene Chloride	3.033	84	32676	1.903	ug/l	95
16) trans-1,2-Dichloroethene	3.341	96	29942	1.888	ug/l	97
17) 1,1-Dichloroethane	3.856	63	56108	1.877	ug/l	99
18) 2-Butanone	4.711	43	34023	8.673	ug/l	97
19) Cyclohexane	5.377	56	44912m	1.869	ug/l	
20) Methylcyclohexane	6.750	83	44579	1.871	ug/l	98
21) 2,2-Dichloropropane	4.650	77	44541	1.910	ug/l	98
22) cis-1,2-Dichloroethene	4.656	96	32128	1.875	ug/l	97
23) Diethyl Ether	2.367	59	21752	1.824	ug/l	99
24) tert-Butyl Alcohol	3.184	59	20987	11.463	ug/l	# 87
25) Methyl tert-Butyl Ether	3.351	73	64764	1.866	ug/l	100
26) Bromochloromethane	4.962	128	14122	1.885	ug/l	98
27) Chloroform	5.074	83	57379	1.902	ug/l	100
28) 1,1,1-Trichloroethane	5.303	97	47038	1.925	ug/l	99
29) 1,1-Dichloropropene	5.515	75	41492	1.895	ug/l	99
30) Carbon Tetrachloride	5.512	117	39937	1.905	ug/l	93
31) Isopropyl Ether	3.978	45	78534	1.840	ug/l	98
32) Ethyl-t-butyl ether	4.489	59	71285	1.836	ug/l	99
33) Tert-Amyl methyl ether	5.926	73	64175	1.892	ug/l	99
34) Propionitrile	4.782	54	10345	8.743	ug/l	# 89
35) Benzene	5.762	78	127531	1.895	ug/l	99
36) 1,2-Dichloroethane	5.785	62	35880	1.847	ug/l	98
37) Trichloroethene	6.534	130	31454	1.965	ug/l	95
38) 1,2-Dichloropropane	6.778	63	33332	1.892	ug/l	98
39) Methacrylonitrile	4.975	41	7882	1.788	ug/l	93
40) Methyl acrylate	4.856	55	14998m	1.846	ug/l	
41) Tetrahydrofuran	5.052	42	9149	3.568	ug/l	94
42) 1-Chlorobutane	5.447	56	54703	1.826	ug/l	98
43) Dibromomethane	6.907	93	16512	1.851	ug/l	98
44) Bromodichloromethane	7.094	83	40544	1.953	ug/l	100

Data Path : Z:\voasrv\HPCHEM1\MSVOA_U\Data\VU021125\
 Data File : VU063231.D
 Acq On : 11 Feb 2025 12:31
 Operator : MD/SY
 Sample : VU0211WBSD01
 Misc : 25.0mL/MSVOA_U/WATER
 ALS Vial : 8 Sample Multiplier: 1

Instrument :
 MSVOA_U
 ClientSampleId :
 VU0211WBSD01

Manual Integrations
 APPROVED

Reviewed By :Amit Patel 02/12/2025
 Supervised By :Mahesh Dadoda 02/12/2025

Quant Time: Feb 12 03:17:39 2025
 Quant Method : Z:\voasrv\HPCHEM1\MSVOA_U\Method\524U021025DW.M
 Quant Title : METHOD 524.2 VOLATILES DRINKING WATER
 QLast Update : Tue Feb 11 08:42:19 2025
 Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
45) 4-Methyl-2-Pentanone	7.782	43	84721	9.059	ug/l	98
46) t-1,4-Dichloro-2-butene	10.823	75	15342m	3.490	ug/l	
47) Methyl methacrylate	6.955	69	27905	3.714	ug/l	99
48) Ethyl methacrylate	8.328	69	26666	1.890	ug/l	97
49) Toluene	7.958	92	73665	1.903	ug/l	98
50) t-1,3-Dichloropropene	8.203	75	35883	1.888	ug/l	98
51) cis-1,3-Dichloropropene	7.598	75	44229	1.884	ug/l	99
52) 1,1,2-Trichloroethane	8.389	97	22475	1.869	ug/l	95
53) 1,3-Dichloropropane	8.566	76	39762	1.862	ug/l	99
54) 2-Hexanone	8.679	43	55875	8.755	ug/l	96
55) Dibromochloromethane	8.798	129	25680	1.856	ug/l	96
56) 1,2-Dibromoethane	8.913	107	21428	1.899	ug/l	99
58) Tetrachloroethene	8.544	164	26480	2.007	ug/l	99
59) Chlorobenzene	9.438	112	78809	1.929	ug/l	98
60) 1,1,1,2-Tetrachloroethane	9.524	131	27412	1.867	ug/l	98
61) Pentachloroethane	11.415	117	23456	1.788	ug/l	98
62) Hexachloroethane	12.463	117	20644	1.779	ug/l	100
63) Ethyl Benzene	9.560	91	129864	1.843	ug/l	98
64) m/p-Xylenes	9.685	106	97083	3.689	ug/l	97
65) o-Xylene	10.090	106	47893	1.859	ug/l	99
66) Styrene	10.106	104	74164	1.809	ug/l	98
67) Bromoform	10.280	173	14362	1.829	ug/l	99
69) Isopropylbenzene	10.473	105	113031	1.866	ug/l	99
70) 1,1,2,2-Tetrachloroethane	10.772	83	30438	1.878	ug/l	98
71) 1,2,3-Trichloropropane	10.814	75	22418m	1.841	ug/l	
72) Bromobenzene	10.775	156	31774	1.947	ug/l	87
73) n-propylbenzene	10.894	120	32378	1.867	ug/l	97
74) 2-Chlorotoluene	10.978	126	30928	1.935	ug/l	97
75) 1,3,5-Trimethylbenzene	11.077	105	105240	1.875	ug/l	99
76) 4-Chlorotoluene	11.090	126	31460	1.920	ug/l	98
77) tert-Butylbenzene	11.408	119	105468	1.858	ug/l	99
78) 1,2,4-Trimethylbenzene	11.460	105	100273	1.801	ug/l	99
79) sec-Butylbenzene	11.634	105	137558	1.904	ug/l	99
80) Nitrobenzene	13.219	77	3153m	9.901	ug/l	
81) p-Isopropyltoluene	11.781	119	105707	1.854	ug/l	99
82) 1,3-Dichlorobenzene	11.736	146	59568	1.882	ug/l	100
83) 1,4-Dichlorobenzene	11.830	146	57308	1.851	ug/l	96
84) n-Butylbenzene	12.199	91	94788	1.854	ug/l	99
85) 1,2-Dichlorobenzene	12.203	146	57519	1.891	ug/l	97
86) 1,2-Dibromo-3-Chloropr...	12.987	75	4147	1.822	ug/l	97
87) 1,2,4-Trichlorobenzene	13.833	180	30065	2.027	ug/l	97
88) Hexachlorobutadiene	14.010	225	20647	1.948	ug/l	97
89) Naphthalene	14.084	128	46812	2.069	ug/l	97
90) 1,2,3-Trichlorobenzene	14.322	180	28334	1.952	ug/l	98

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

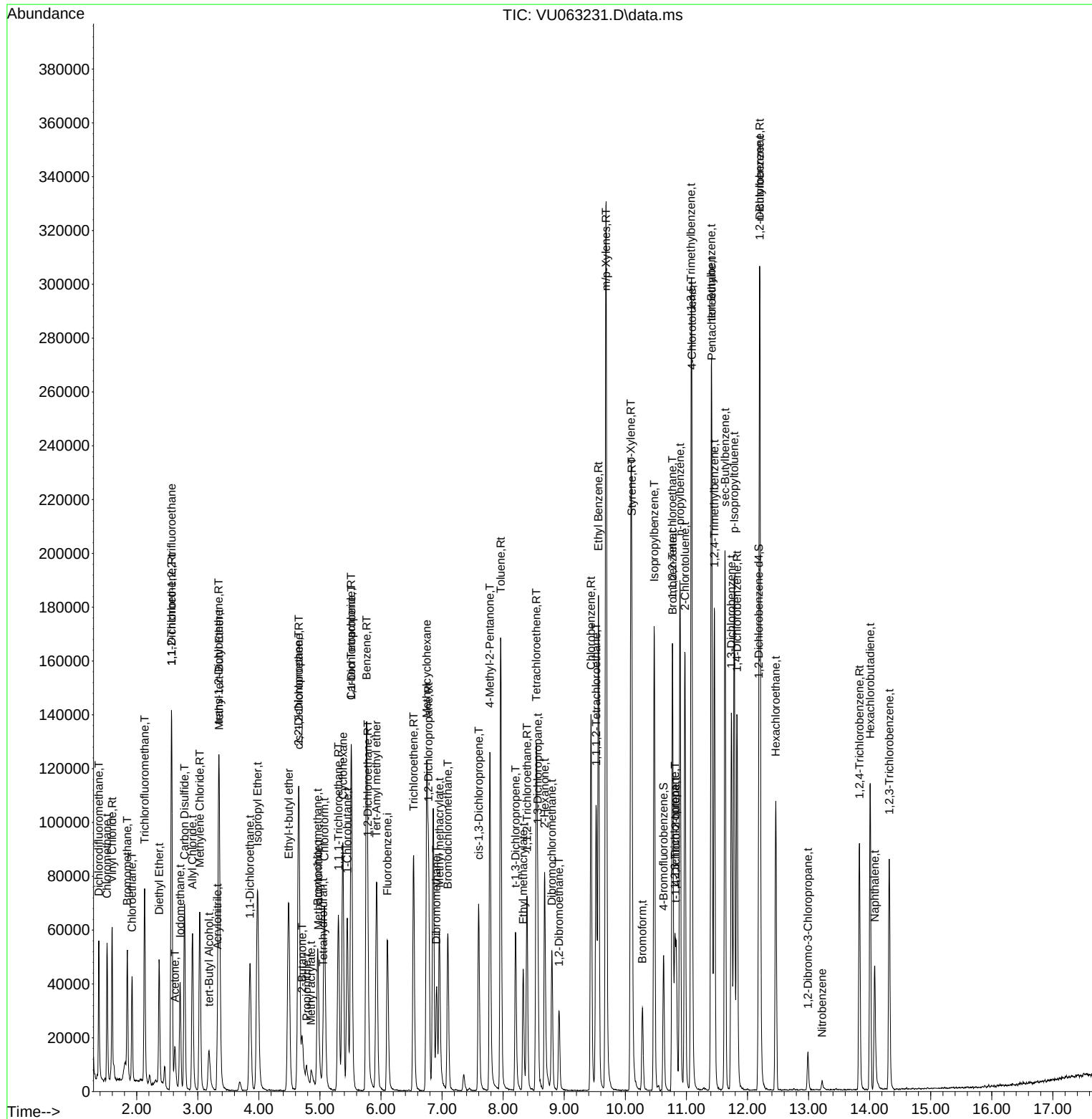
```
Data Path : Z:\voasrv\HPCHEM1\MSVOA_U\Data\VU021125\
Data File : VU063231.D
Acq On    : 11 Feb 2025  12:31
Operator  : MD/SY
Sample    : VU0211WBSD01
Misc      : 25.0mL/MSVOA_U/WATER
ALS Vial  : 8   Sample Multiplier: 1
```

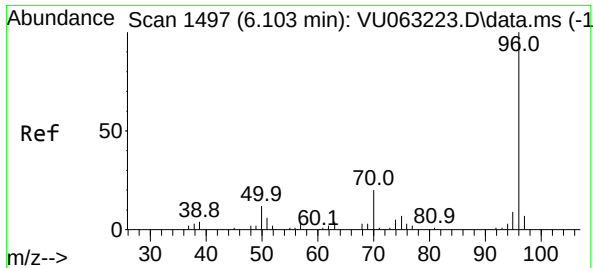
Instrument :
MSVOA_U
ClientSampleId :
VU0211WBSD01

Manual Integrations

Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025

Quant Time: Feb 12 03:17:39 2025
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_U\Method\524U021025DW.M
Quant Title : METHOD 524.2 VOLATILES DRINKING WATER
QLast Update : Tue Feb 11 08:42:19 2025
Response via : Initial Calibration





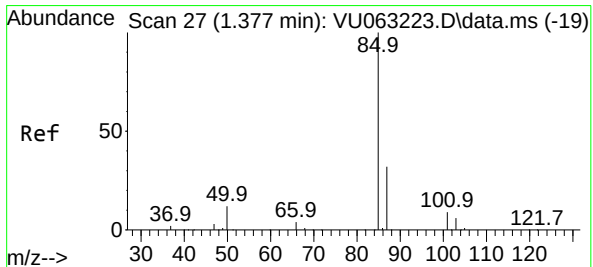
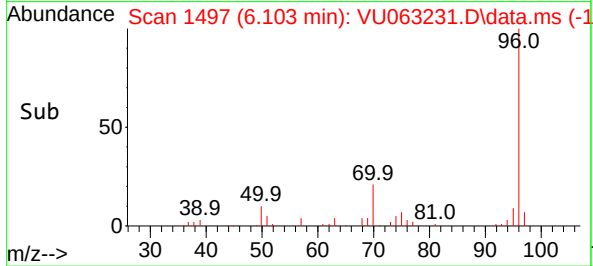
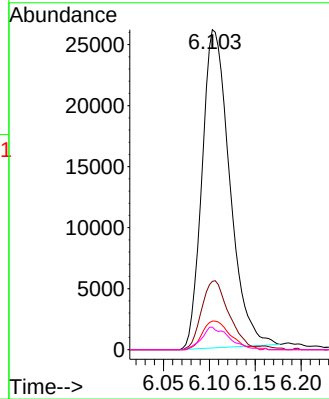
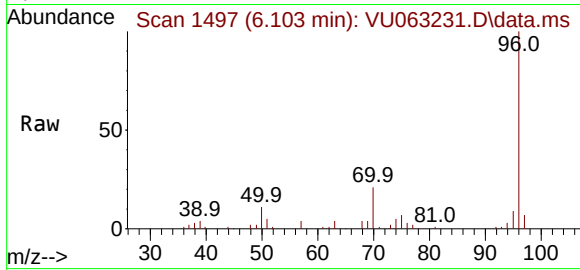
#1
Fluorobenzene
Concen: 1.000 ug/l
RT: 6.103 min Scan# 1497
Delta R.T. 0.000 min
Lab File: VU063231.D
Acq: 11 Feb 2025 12:31

Instrument :
MSVOA_U
ClientSampleId :
VU0211WBSD01

Tgt Ion: 96 Resp: 54780
Ion Ratio Lower Upper
96 100
70 20.2 15.6 23.4
95 9.1 7.3 10.9
97 7.1 0.0 0.0#

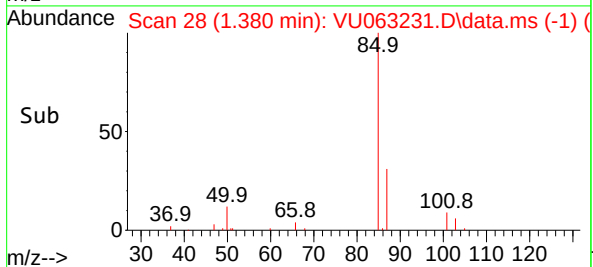
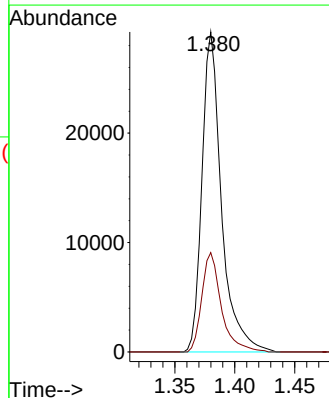
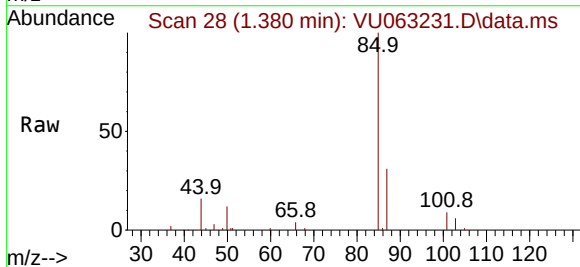
Manual Integrations
APPROVED

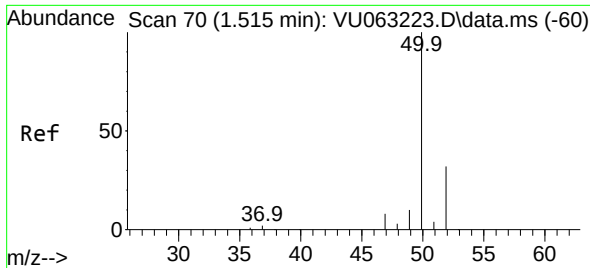
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#2
Dichlorodifluoromethane
Concen: 1.860 ug/l
RT: 1.380 min Scan# 28
Delta R.T. 0.003 min
Lab File: VU063231.D
Acq: 11 Feb 2025 12:31

Tgt Ion: 85 Resp: 33113
Ion Ratio Lower Upper
85 100
87 31.1 16.0 48.0





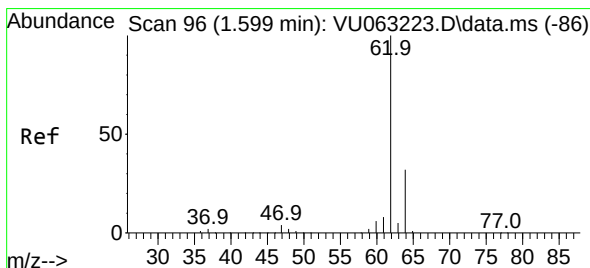
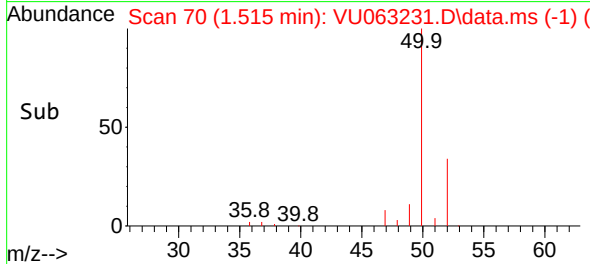
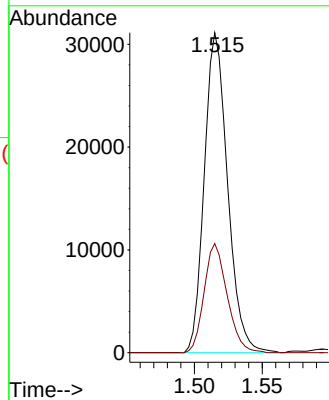
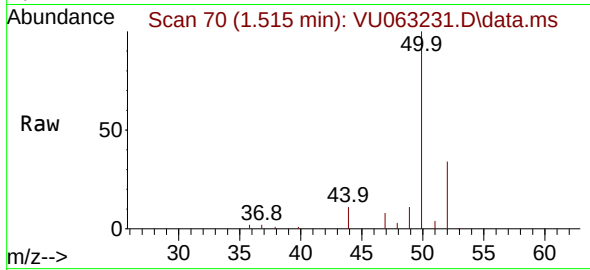
#3
Chloromethane
Concen: 1.814 ug/l
RT: 1.515 min Scan# 70
Delta R.T. -0.000 min
Lab File: VU063231.D
Acq: 11 Feb 2025 12:31

Instrument :
MSVOA_U
ClientSampleId :
VU0211WBSD01

Tgt Ion: 50 Resp: 3717
Ion Ratio Lower Upper
50 100
52 34.1 25.8 38.8

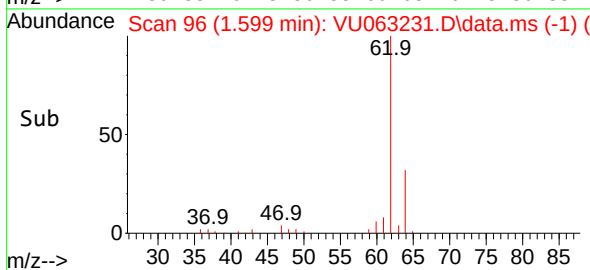
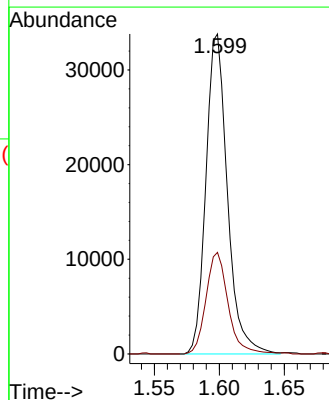
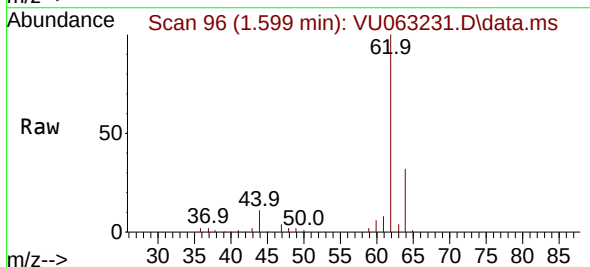
Manual Integrations
APPROVED

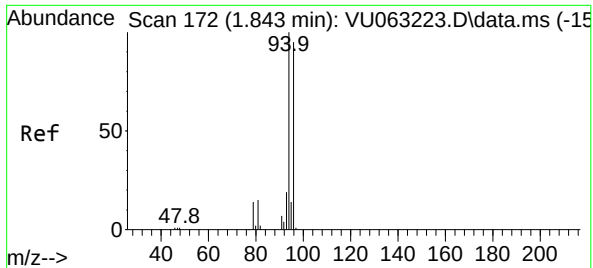
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#4
Vinyl Chloride
Concen: 1.917 ug/l
RT: 1.599 min Scan# 96
Delta R.T. -0.000 min
Lab File: VU063231.D
Acq: 11 Feb 2025 12:31

Tgt Ion: 62 Resp: 38868
Ion Ratio Lower Upper
62 100
64 31.8 25.4 38.0





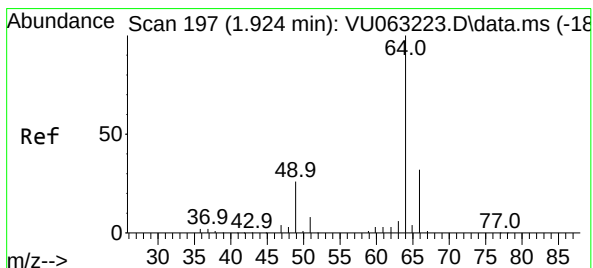
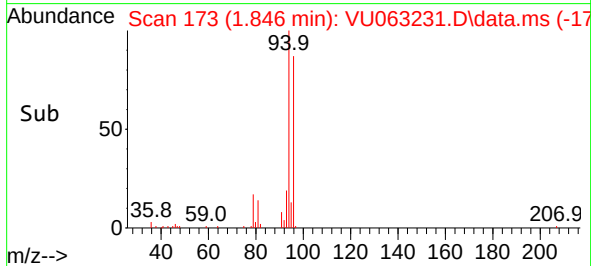
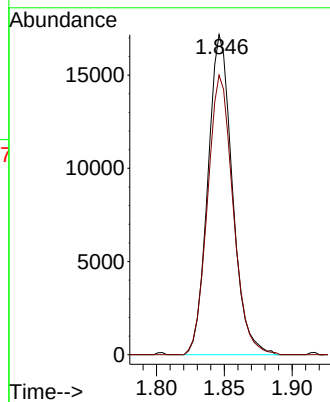
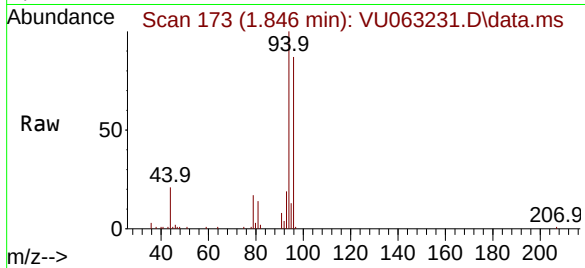
#5
Bromomethane
Concen: 2.179 ug/l
RT: 1.846 min Scan# 172
Delta R.T. 0.003 min
Lab File: VU063231.D
Acq: 11 Feb 2025 12:31

Instrument :
MSVOA_U
ClientSampleId :
VU0211WBSD01

Tgt Ion: 94 Resp: 21592
Ion Ratio Lower Upper
94 100
96 87.4 75.7 113.5

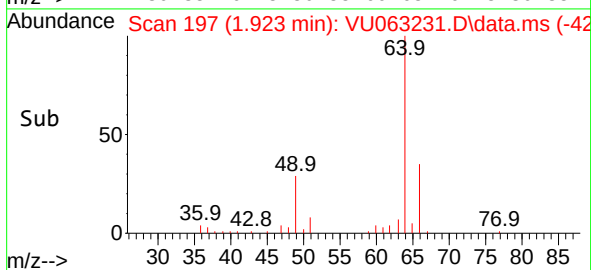
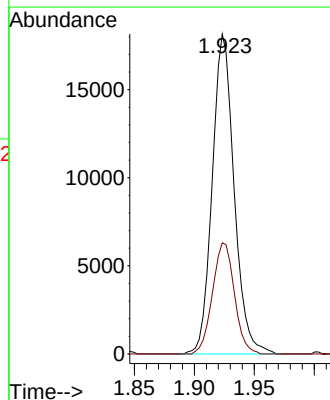
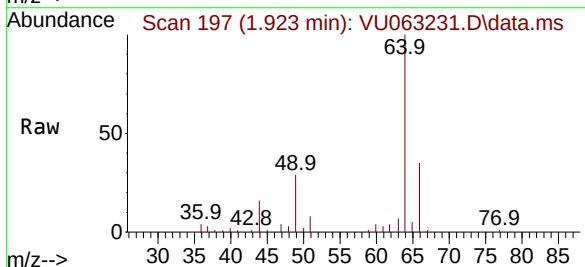
Manual Integrations
APPROVED

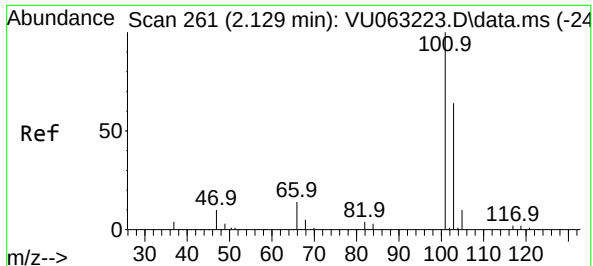
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#6
Chloroethane
Concen: 1.799 ug/l
RT: 1.923 min Scan# 197
Delta R.T. -0.000 min
Lab File: VU063231.D
Acq: 11 Feb 2025 12:31

Tgt Ion: 64 Resp: 22977
Ion Ratio Lower Upper
64 100
66 34.8 25.8 38.8





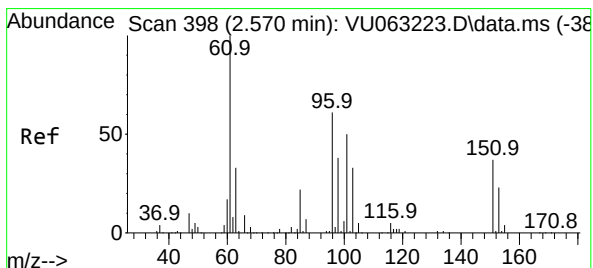
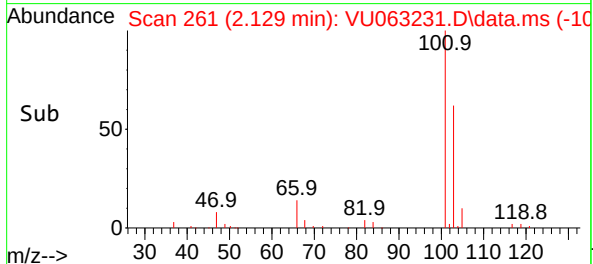
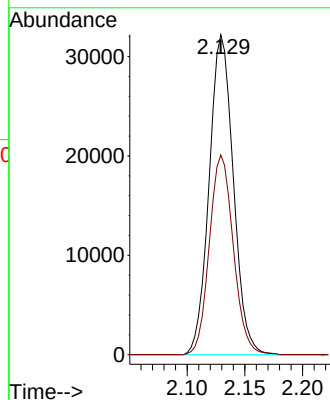
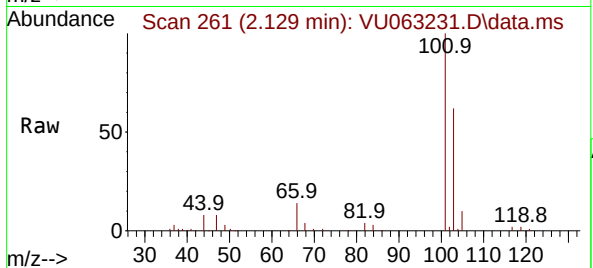
#7
Trichlorofluoromethane
Concen: 1.953 ug/l
RT: 2.129 min Scan# 20
Delta R.T. -0.000 min
Lab File: VU063231.D
Acq: 11 Feb 2025 12:31

Instrument :
MSVOA_U
ClientSampleId :
VU0211WBSD01

Tgt Ion:101 Resp: 4692
Ion Ratio Lower Upper
101 100
103 62.4 51.4 77.2

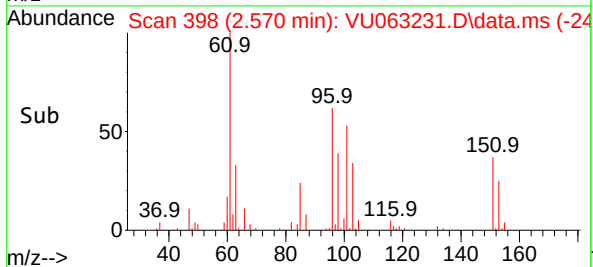
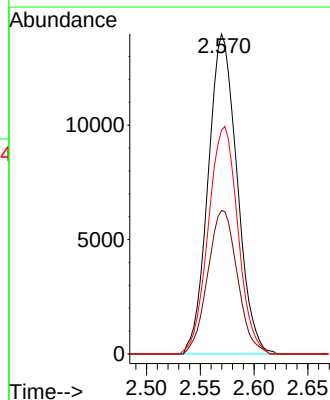
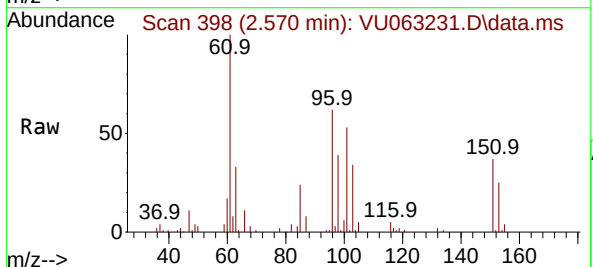
Manual Integrations
APPROVED

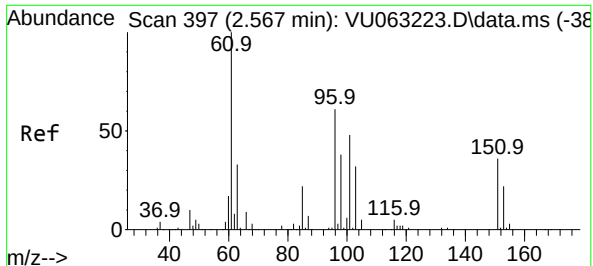
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#8
1,1,2-Trichloro-1,2,2-trifluoroethane
Concen: 1.917 ug/l
RT: 2.570 min Scan# 398
Delta R.T. -0.000 min
Lab File: VU063231.D
Acq: 11 Feb 2025 12:31

Tgt Ion:101 Resp: 26150
Ion Ratio Lower Upper
101 100
85 45.9 35.4 53.0
151 72.9 58.5 87.7





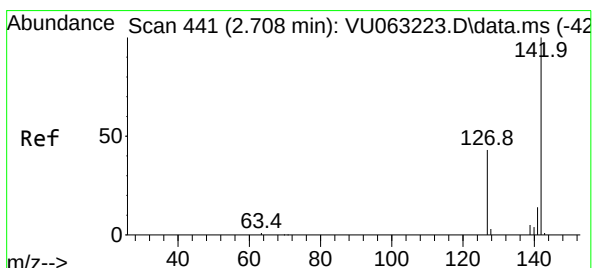
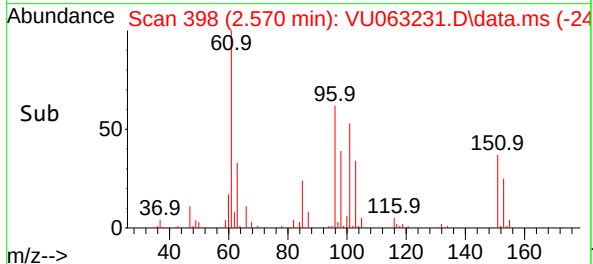
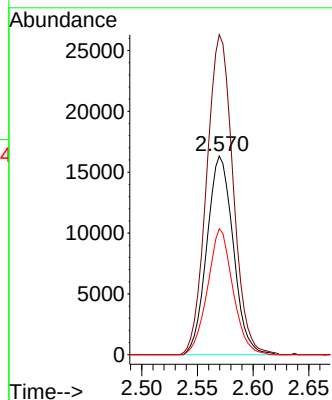
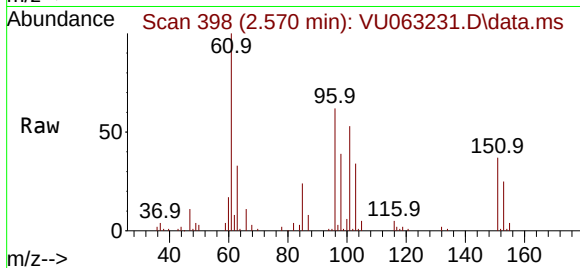
#9
1,1-Dichloroethene
Concen: 1.936 ug/l
RT: 2.570 min Scan# 397
Delta R.T. 0.003 min
Lab File: VU063231.D
Acq: 11 Feb 2025 12:31

Instrument :
MSVOA_U
ClientSampleId :
VU0211WBSD01

Tgt Ion: 96 Resp: 2690
Ion Ratio Lower Upper
96 100
61 161.0 0.0 492.9
98 63.3 0.0 124.0

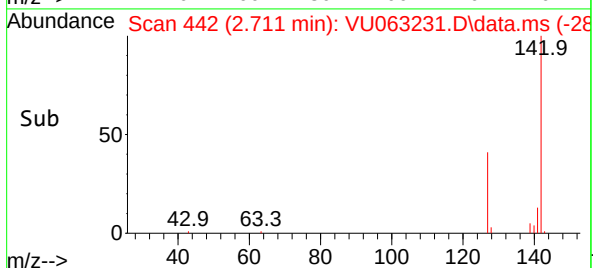
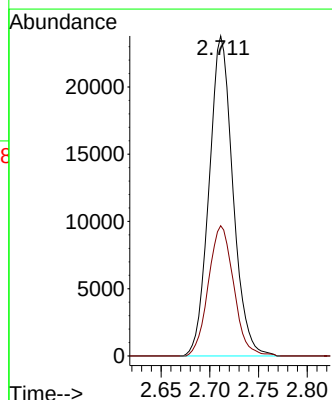
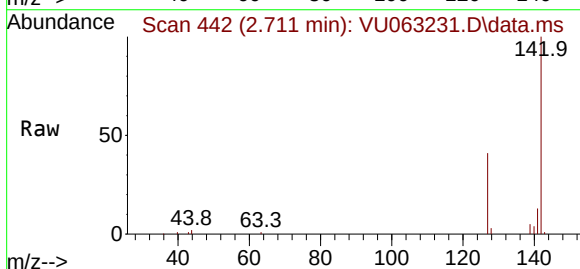
Manual Integrations
APPROVED

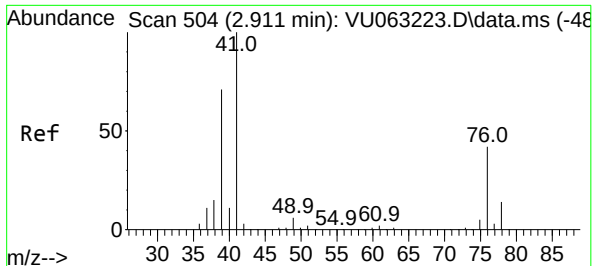
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#10
Iodomethane
Concen: 1.852 ug/l
RT: 2.711 min Scan# 442
Delta R.T. 0.003 min
Lab File: VU063231.D
Acq: 11 Feb 2025 12:31

Tgt Ion:142 Resp: 40470
Ion Ratio Lower Upper
142 100
127 43.2 34.5 51.7





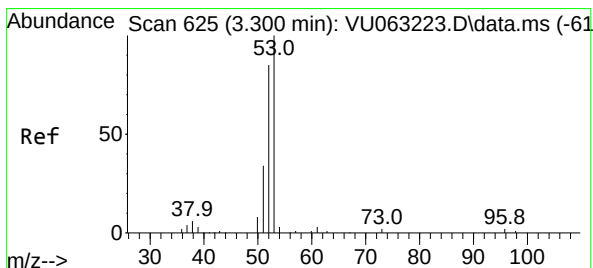
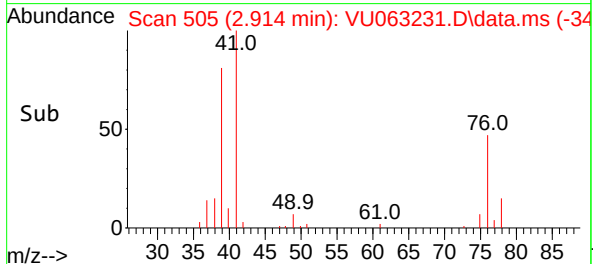
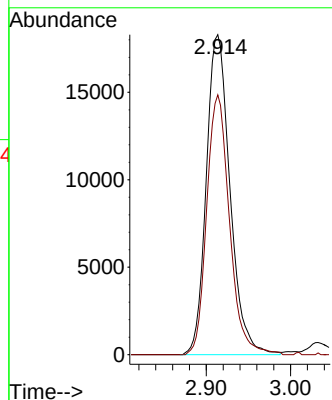
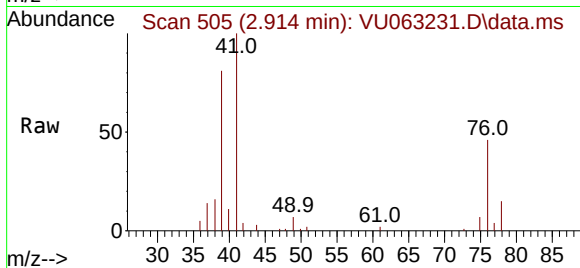
#11
Allyl Chloride
Concen: 1.795 ug/l
RT: 2.914 min Scan# 504
Delta R.T. 0.003 min
Lab File: VU063231.D
Acq: 11 Feb 2025 12:31

Instrument :
MSVOA_U
ClientSampleId :
VU0211WBSD01

Tgt Ion: 41 Resp: 3583
Ion Ratio Lower Upper
41 100
39 78.1 57.9 86.9

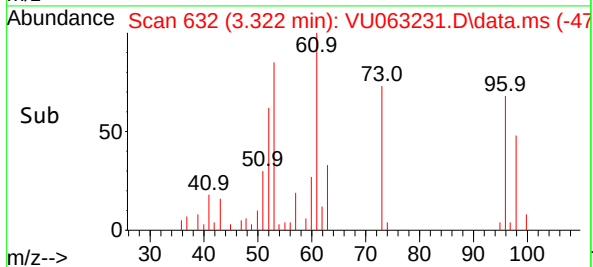
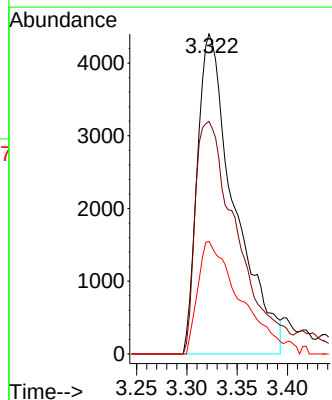
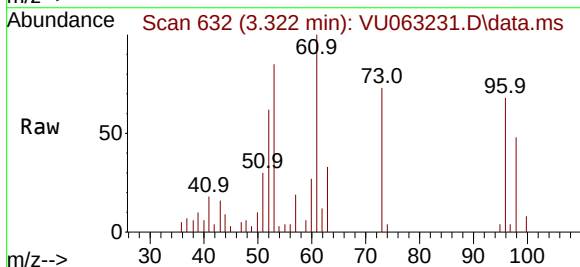
Manual Integrations
APPROVED

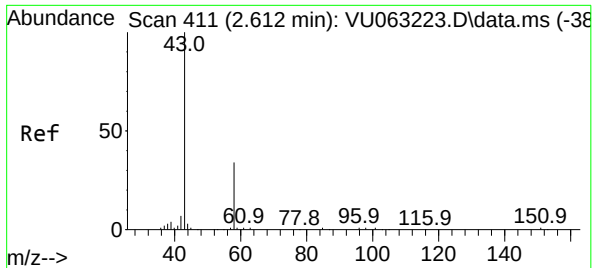
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#12
Acrylonitrile
Concen: 3.509 ug/l
RT: 3.322 min Scan# 632
Delta R.T. 0.022 min
Lab File: VU063231.D
Acq: 11 Feb 2025 12:31

Tgt Ion: 53 Resp: 11247
Ion Ratio Lower Upper
53 100
52 83.1 64.2 96.2
51 39.8 30.8 46.2





#13

Acetone

Concen: 8.706 ug/l

RT: 2.624 min Scan# 411

Delta R.T. 0.013 min

Lab File: VU063231.D

Acq: 11 Feb 2025 12:31

Instrument :

MSVOA_U

ClientSampleId :

VU0211WBSD01

Tgt Ion: 43 Resp: 2145

Ion Ratio Lower Upper

43 100

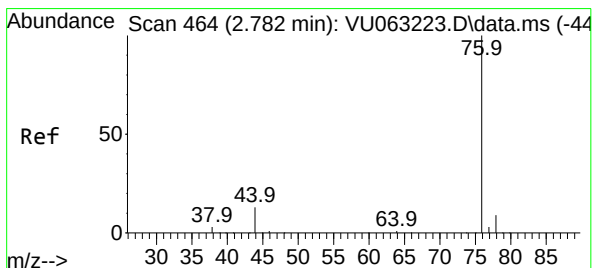
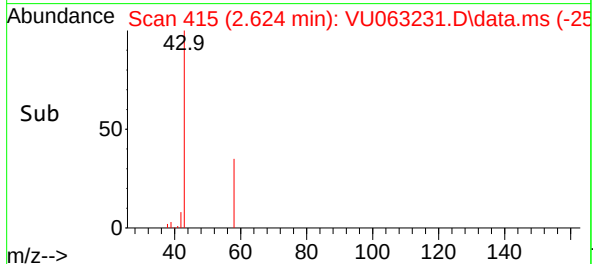
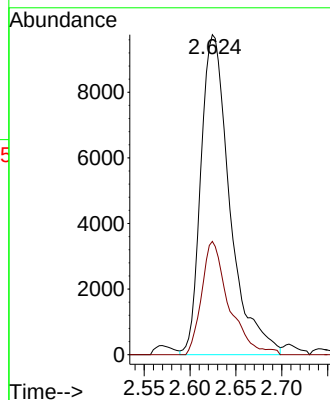
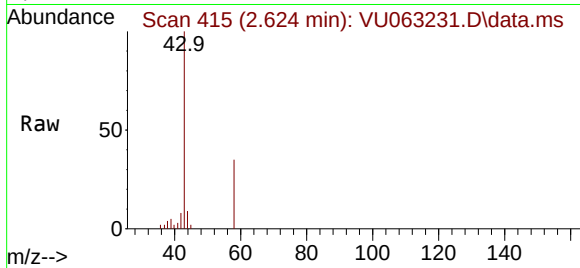
58 35.8 27.4 41.0

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#14

Carbon Disulfide

Concen: 1.892 ug/l

RT: 2.782 min Scan# 464

Delta R.T. -0.000 min

Lab File: VU063231.D

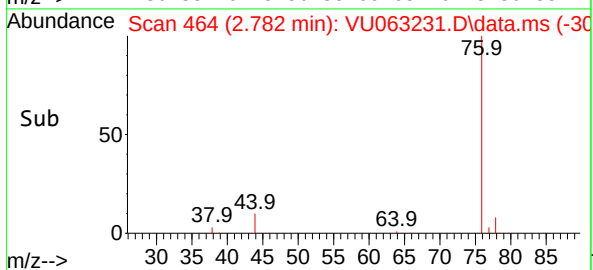
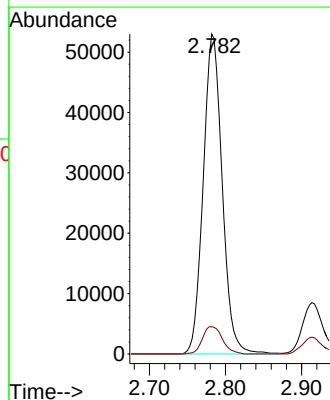
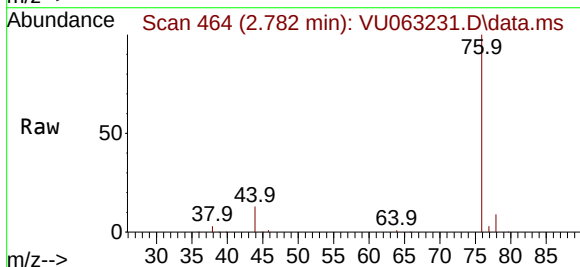
Acq: 11 Feb 2025 12:31

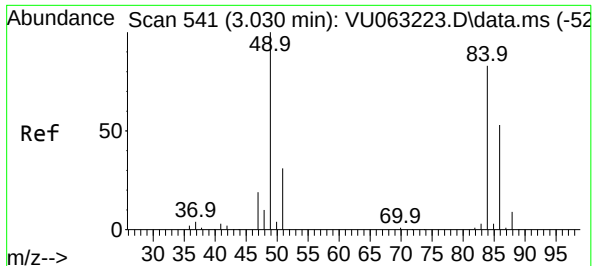
Tgt Ion: 76 Resp: 91922

Ion Ratio Lower Upper

76 100

78 8.5 7.2 10.8





#15

Methylene Chloride

Concen: 1.903 ug/l

RT: 3.033 min Scan# 541

Delta R.T. 0.003 min

Lab File: VU063231.D

Acq: 11 Feb 2025 12:31

Instrument :

MSVOA_U

ClientSampleId :

VU0211WBSD01

Tgt Ion: 84 Resp: 32670

Ion Ratio Lower Upper

84 100

49 113.0 96.4 144.6

51 36.9 0.0 74.8

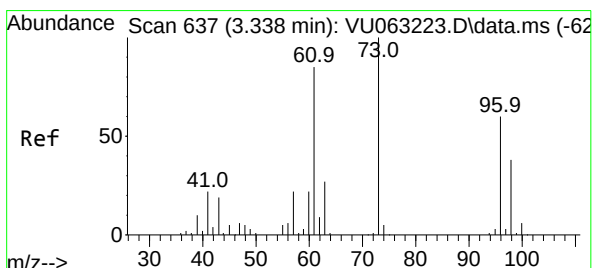
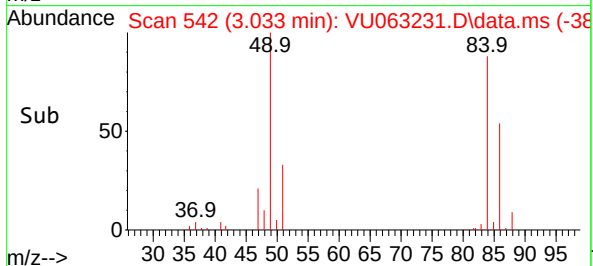
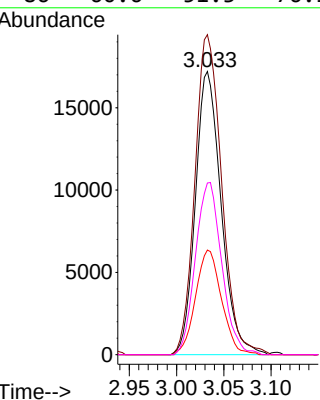
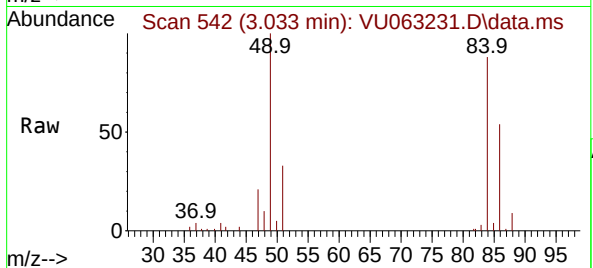
86 60.6 51.3 76.9

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#16

trans-1,2-Dichloroethene

Concen: 1.888 ug/l

RT: 3.341 min Scan# 638

Delta R.T. 0.003 min

Lab File: VU063231.D

Acq: 11 Feb 2025 12:31

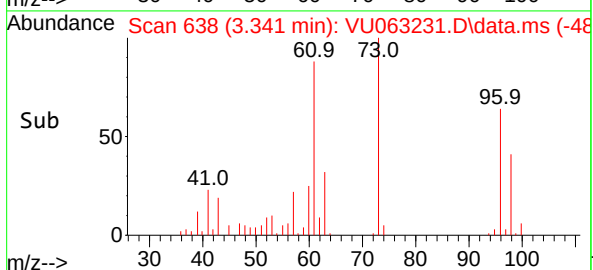
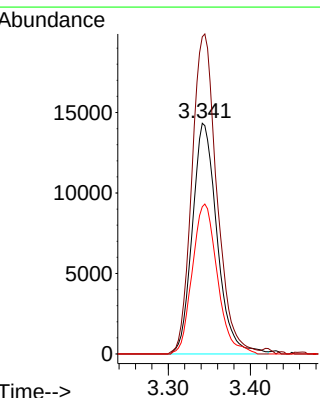
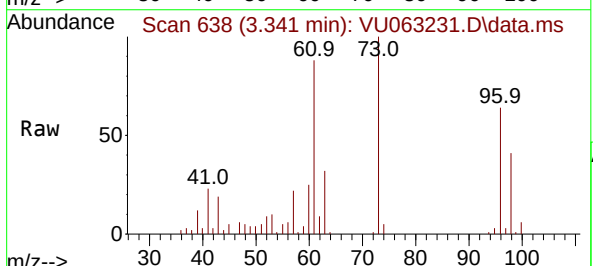
Tgt Ion: 96 Resp: 29942

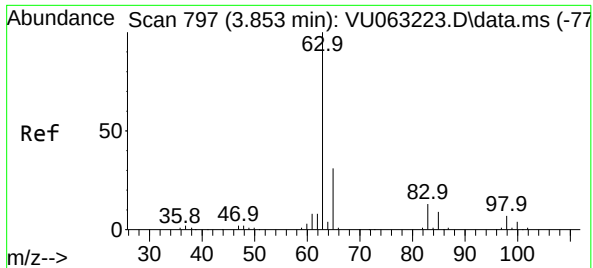
Ion Ratio Lower Upper

96 100

61 137.5 113.4 170.2

98 63.8 51.2 76.8





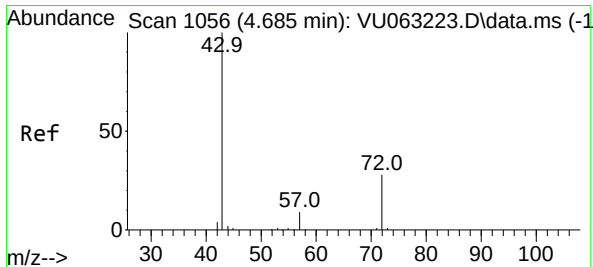
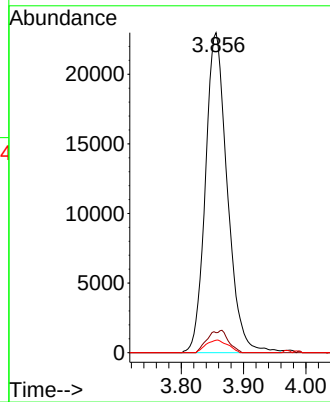
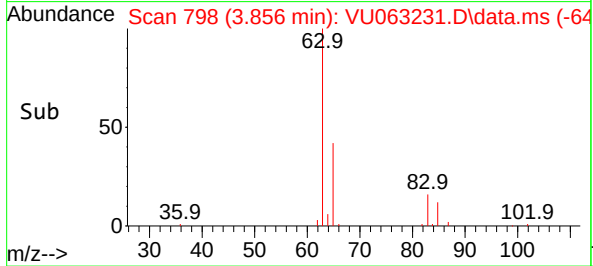
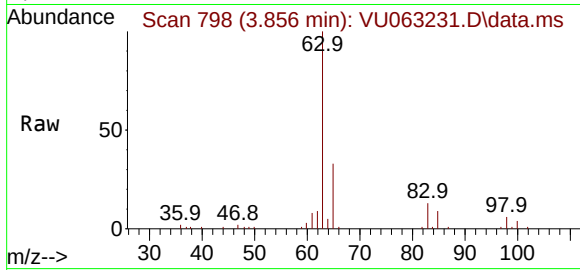
#17
1,1-Dichloroethane
Concen: 1.877 ug/l
RT: 3.856 min Scan# 797
Delta R.T. 0.003 min
Lab File: VU063231.D
Acq: 11 Feb 2025 12:31

Instrument :
MSVOA_U
Client SampleId :
VU0211WBSD01

Tgt Ion: 63 Resp: 5610
Ion Ratio Lower Upper
63 100
98 6.2 3.3 9.9
100 3.9 2.1 6.2

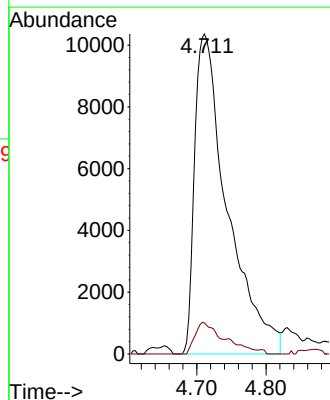
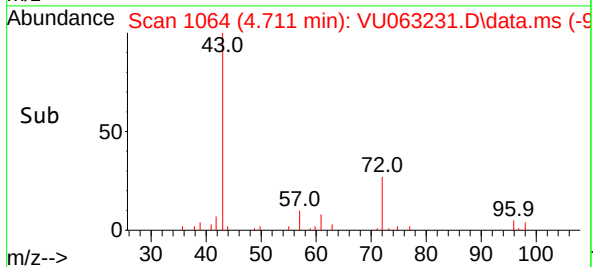
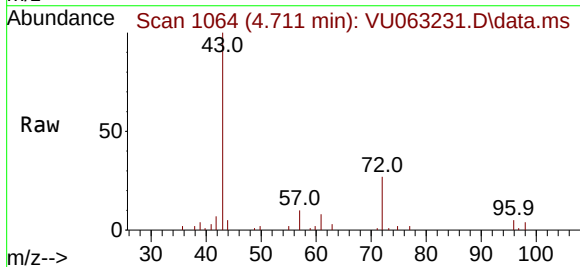
Manual Integrations
APPROVED

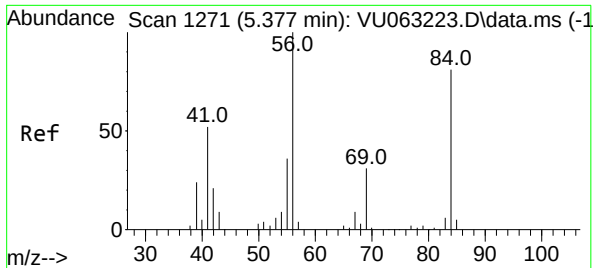
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#18
2-Butanone
Concen: 8.673 ug/l
RT: 4.711 min Scan# 1064
Delta R.T. 0.026 min
Lab File: VU063231.D
Acq: 11 Feb 2025 12:31

Tgt Ion: 43 Resp: 34023
Ion Ratio Lower Upper
43 100
57 9.7 0.0 17.0





#19

Cyclohexane

Concen: 1.869 ug/l m

RT: 5.377 min Scan# 1

Delta R.T. -0.000 min

Lab File: VU063231.D

Acq: 11 Feb 2025 12:31

Instrument :

MSVOA_U

ClientSampleId :

VU0211WBSD01

Tgt Ion: 56 Resp: 4491

Ion Ratio Lower Upper

56 100

69 30.9 24.5 36.7

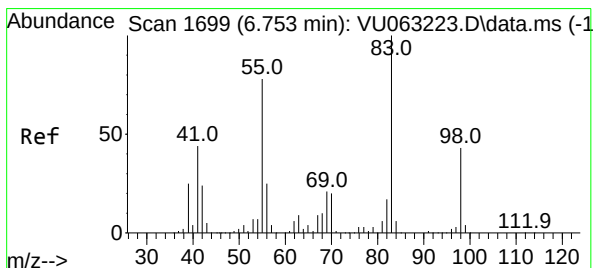
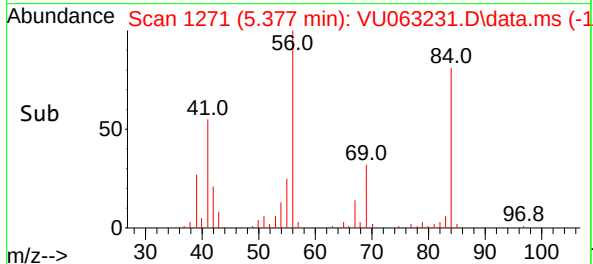
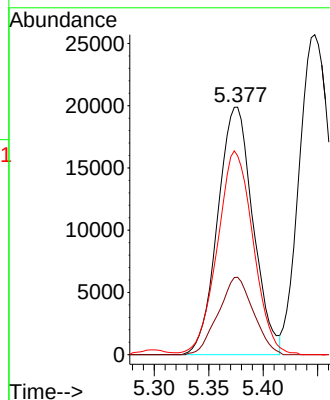
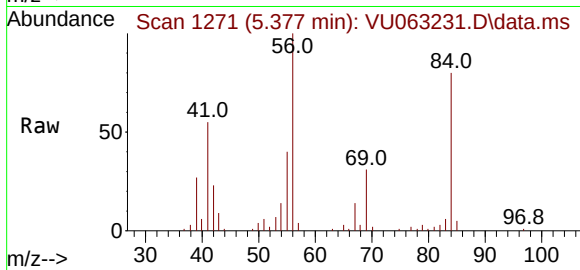
84 82.4 65.2 97.8

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#20

Methylcyclohexane

Concen: 1.871 ug/l

RT: 6.750 min Scan# 1698

Delta R.T. -0.003 min

Lab File: VU063231.D

Acq: 11 Feb 2025 12:31

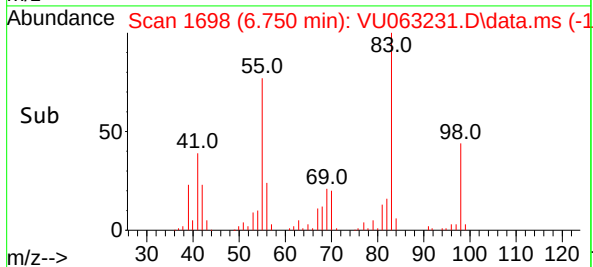
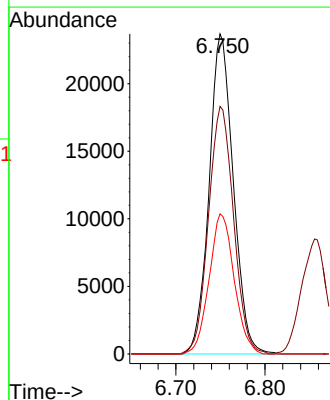
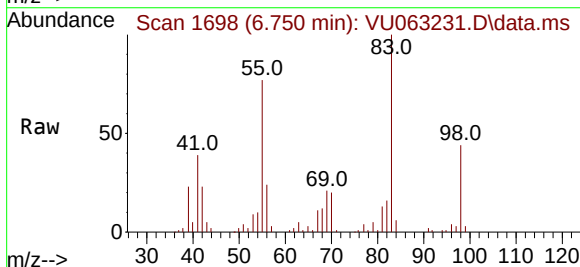
Tgt Ion: 83 Resp: 44579

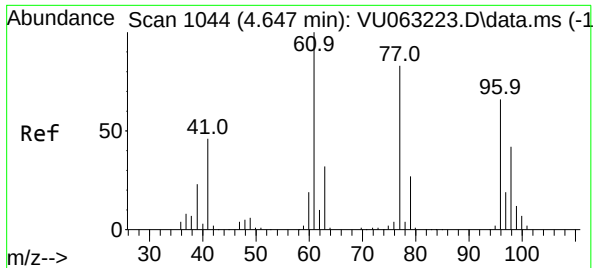
Ion Ratio Lower Upper

83 100

55 80.4 63.1 94.7

98 45.4 35.2 52.8





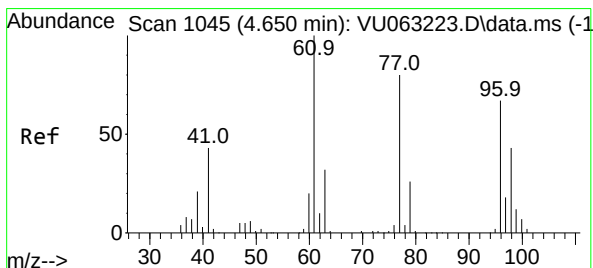
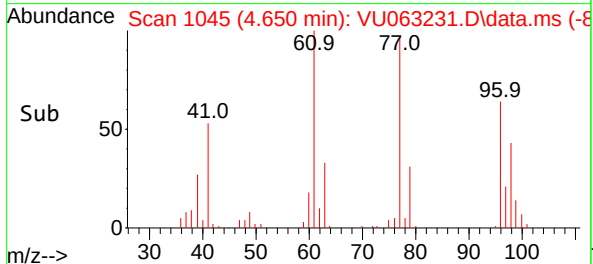
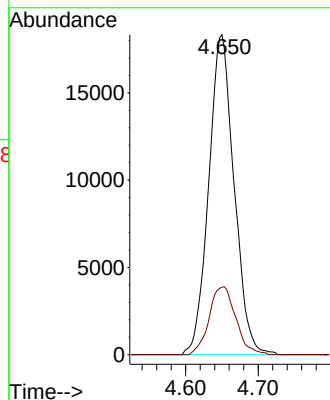
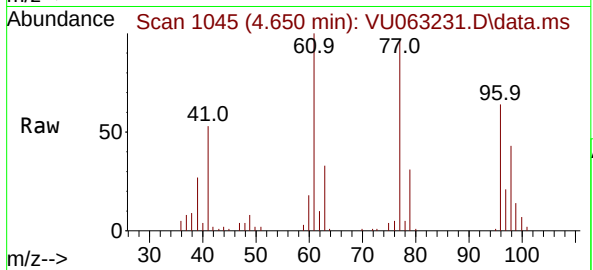
#21
2,2-Dichloropropane
Concen: 1.910 ug/l
RT: 4.650 min Scan# 1045
Delta R.T. 0.003 min
Lab File: VU063231.D
Acq: 11 Feb 2025 12:31

Instrument :
MSVOA_U
ClientSampleId :
VU0211WBSD01

Tgt Ion: 77 Resp: 4454
Ion Ratio Lower Upper
77 100
97 22.3 18.5 27.7

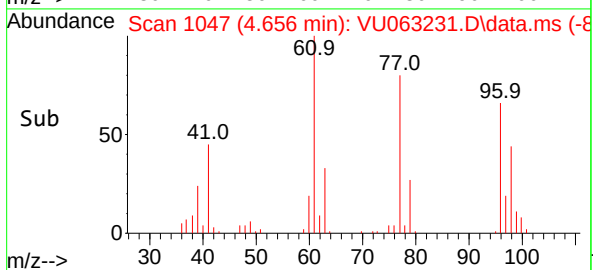
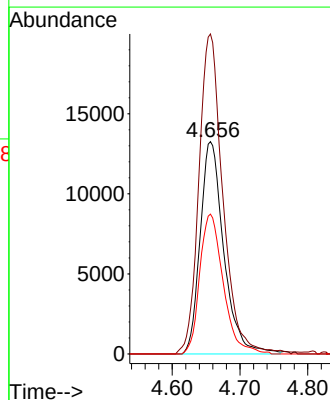
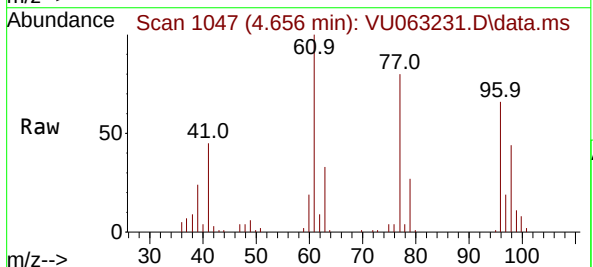
Manual Integrations
APPROVED

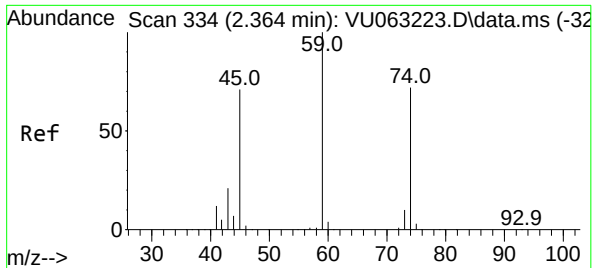
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#22
cis-1,2-Dichloroethene
Concen: 1.875 ug/l
RT: 4.656 min Scan# 1047
Delta R.T. 0.006 min
Lab File: VU063231.D
Acq: 11 Feb 2025 12:31

Tgt Ion: 96 Resp: 32128
Ion Ratio Lower Upper
96 100
61 153.4 0.0 373.3
98 65.5 31.9 95.9





#23

Diethyl Ether

Concen: 1.824 ug/l

RT: 2.367 min Scan# 31

Delta R.T. 0.003 min

Lab File: VU063231.D

Acq: 11 Feb 2025 12:31

Instrument :

MSVOA_U

ClientSampleId :

VU0211WBSD01

Tgt Ion: 59 Resp: 2175

Ion Ratio Lower Upper

59 100

45 73.4 57.8 86.6

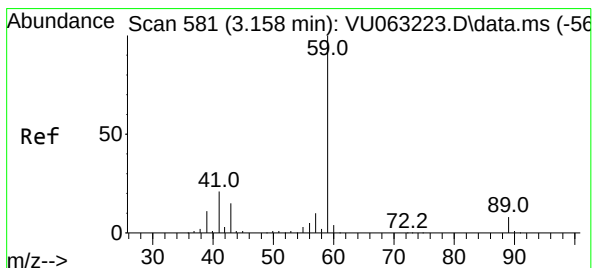
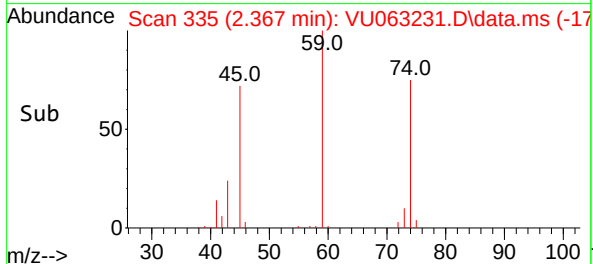
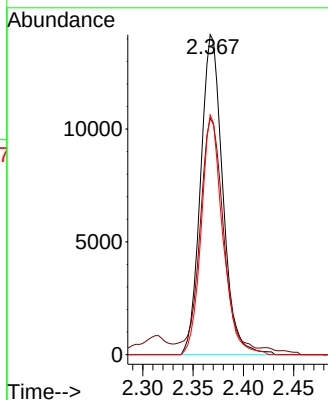
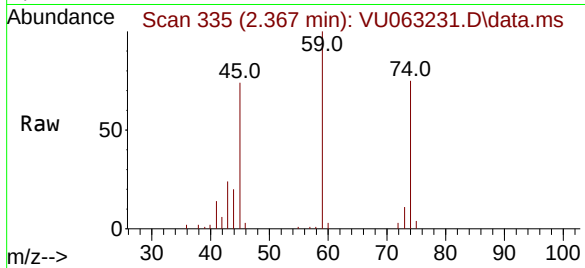
74 72.7 57.7 86.5

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#24

tert-Butyl Alcohol

Concen: 11.463 ug/l

RT: 3.184 min Scan# 589

Delta R.T. 0.026 min

Lab File: VU063231.D

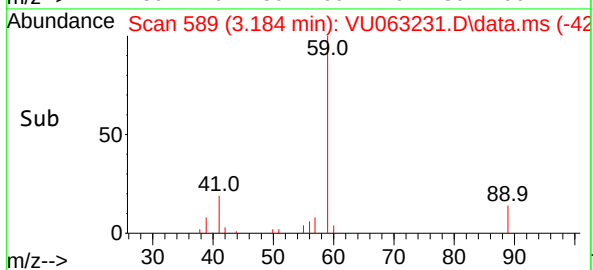
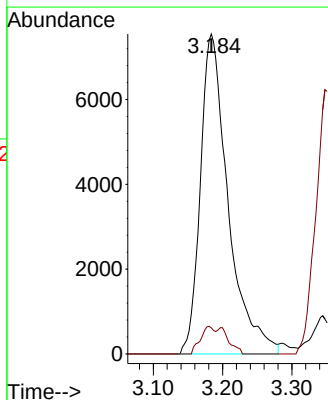
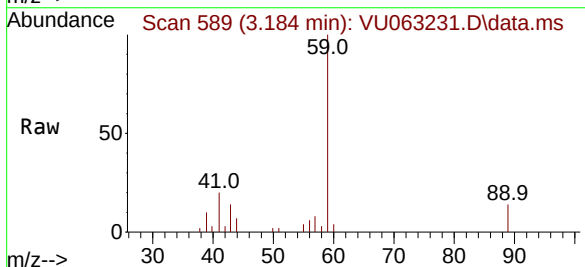
Acq: 11 Feb 2025 12:31

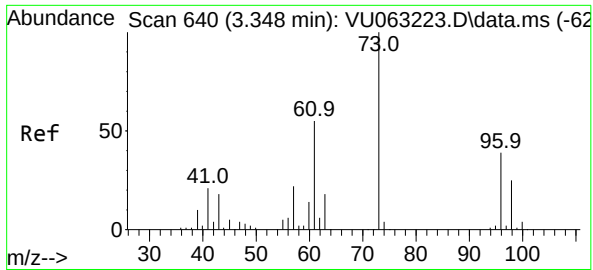
Tgt Ion: 59 Resp: 20987

Ion Ratio Lower Upper

59 100

57 4.5 7.5 11.3#





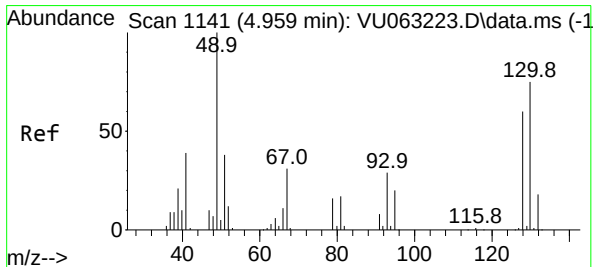
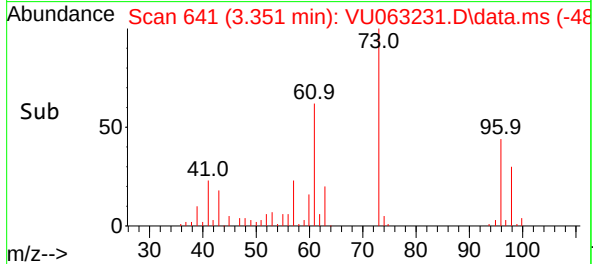
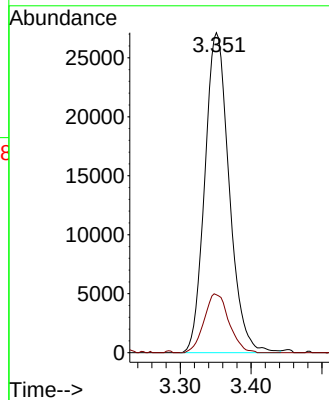
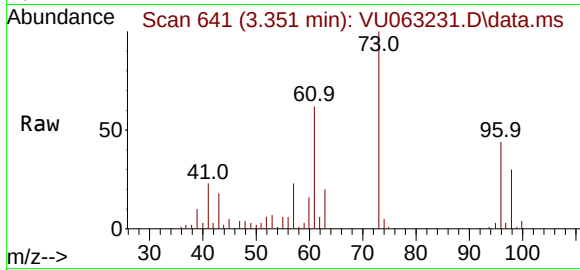
#25
Methyl tert-Butyl Ether
Concen: 1.866 ug/l
RT: 3.351 min Scan# 641
Delta R.T. 0.003 min
Lab File: VU063231.D
Acq: 11 Feb 2025 12:31

Instrument :
MSVOA_U
ClientSampleId :
VU0211WBSD01

Tgt Ion: 73 Resp: 64764
Ion Ratio Lower Upper
73 100
43 18.7 14.9 22.3

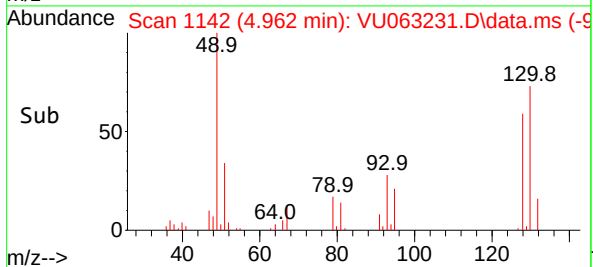
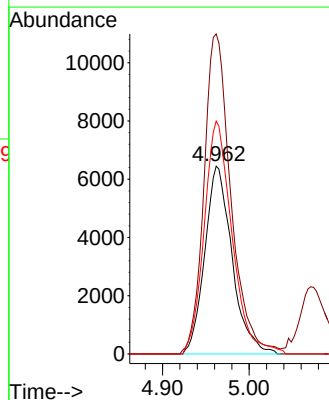
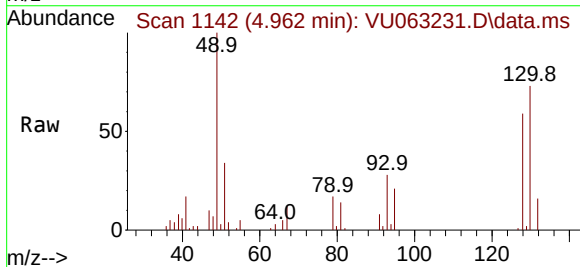
Manual Integrations
APPROVED

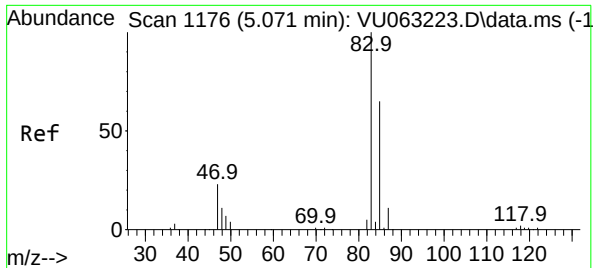
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#26
Bromochloromethane
Concen: 1.885 ug/l
RT: 4.962 min Scan# 1142
Delta R.T. 0.003 min
Lab File: VU063231.D
Acq: 11 Feb 2025 12:31

Tgt Ion:128 Resp: 14122
Ion Ratio Lower Upper
128 100
49 168.1 0.0 343.4
130 126.8 102.9 154.3





#27

Chloroform

Concen: 1.902 ug/l

RT: 5.074 min Scan# 1176

Delta R.T. 0.003 min

Lab File: VU063231.D

Acq: 11 Feb 2025 12:31

Instrument :

MSVOA_U

ClientSampleId :

VU0211WBSD01

Tgt Ion: 83 Resp: 57379

Ion Ratio Lower Upper

83 100

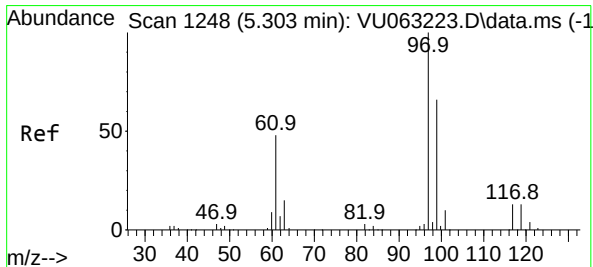
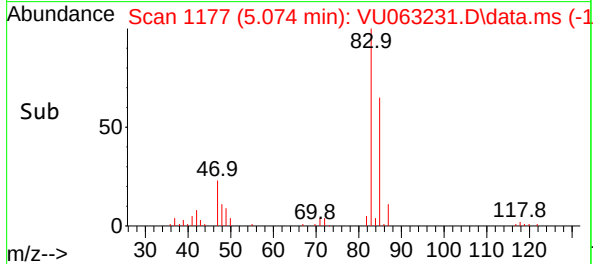
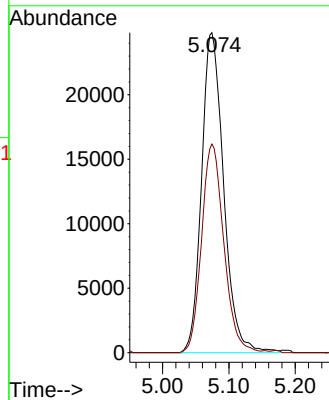
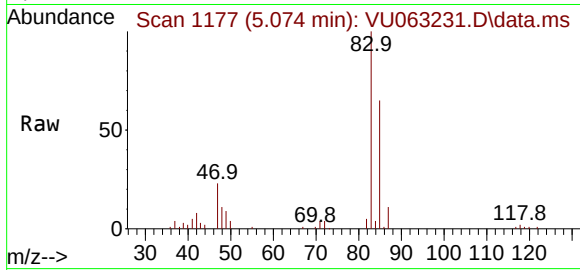
85 65.2 0.0 129.8

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#28

1,1,1-Trichloroethane

Concen: 1.925 ug/l

RT: 5.303 min Scan# 1248

Delta R.T. -0.000 min

Lab File: VU063231.D

Acq: 11 Feb 2025 12:31

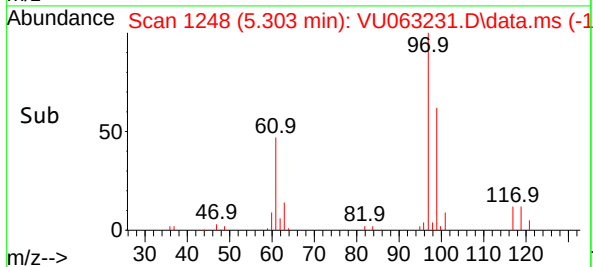
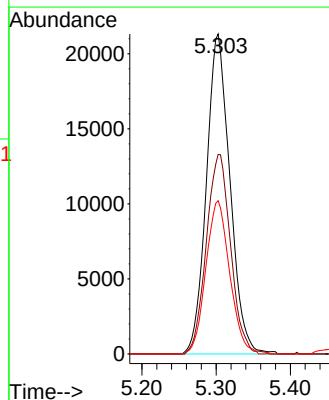
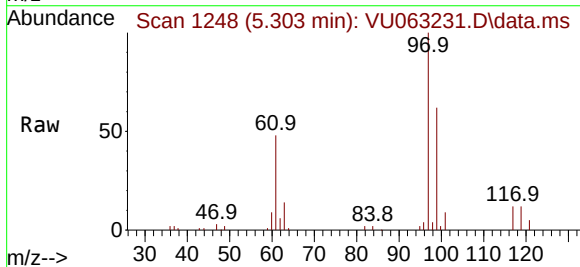
Tgt Ion: 97 Resp: 47038

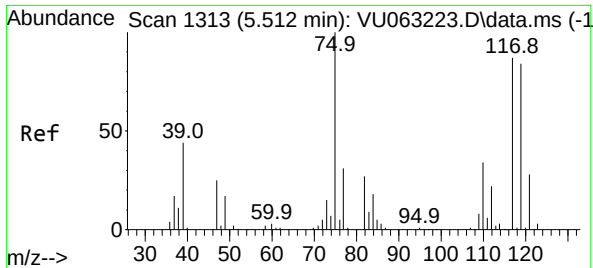
Ion Ratio Lower Upper

97 100

99 64.1 32.4 97.0

61 48.2 23.8 71.2





#29

1,1-Dichloropropene

Concen: 1.895 ug/l

RT: 5.515 min Scan# 11

Delta R.T. 0.003 min

Lab File: VU063231.D

Acq: 11 Feb 2025 12:31

Instrument :

MSVOA_U

ClientSampleId :

VU0211WBSD01

Tgt Ion: 75 Resp: 4149

Ion Ratio Lower Upper

75 100

110 34.4 17.2 51.5

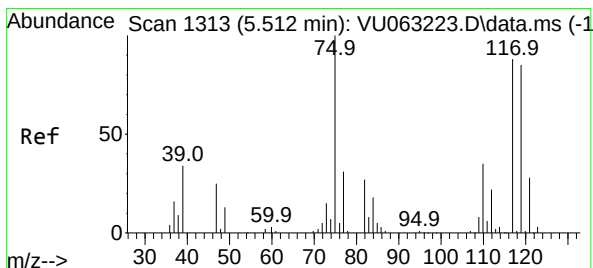
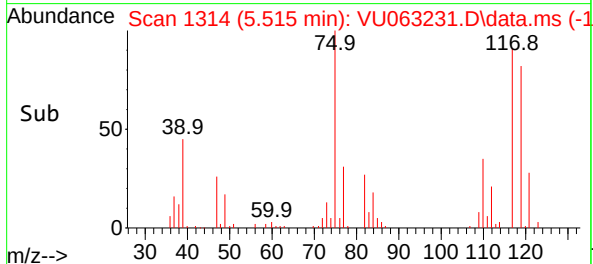
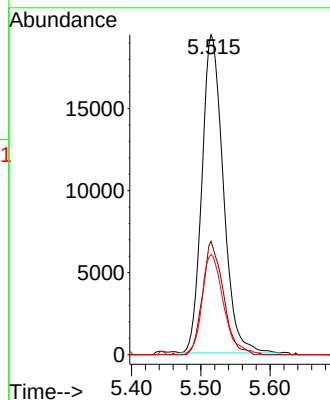
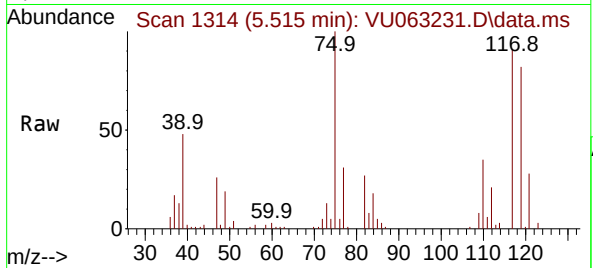
77 31.9 24.6 37.0

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#30

Carbon Tetrachloride

Concen: 1.905 ug/l

RT: 5.512 min Scan# 1313

Delta R.T. -0.000 min

Lab File: VU063231.D

Acq: 11 Feb 2025 12:31

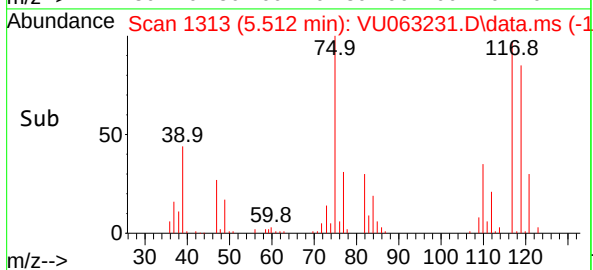
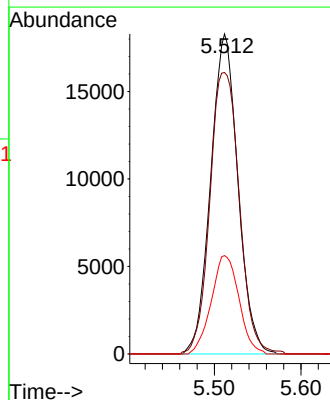
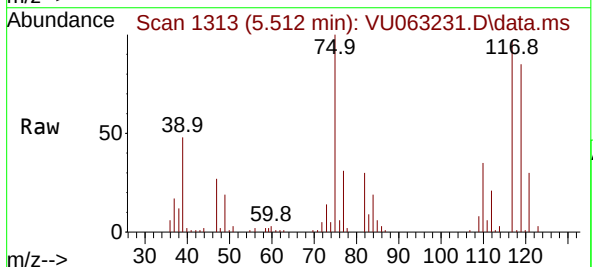
Tgt Ion:117 Resp: 39937

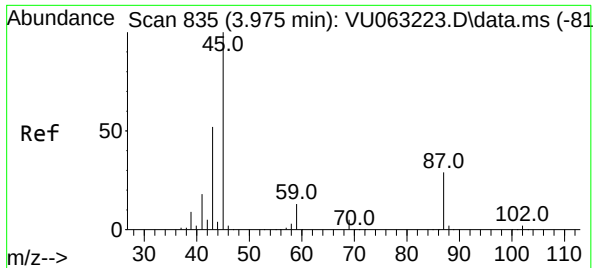
Ion Ratio Lower Upper

117 100

119 88.0 76.7 115.1

121 30.8 25.5 38.3





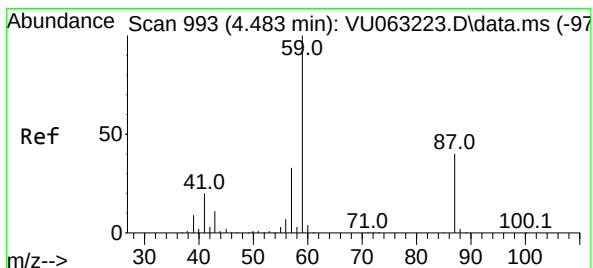
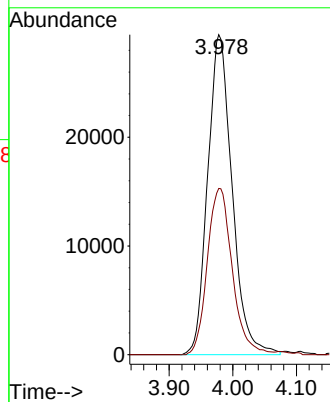
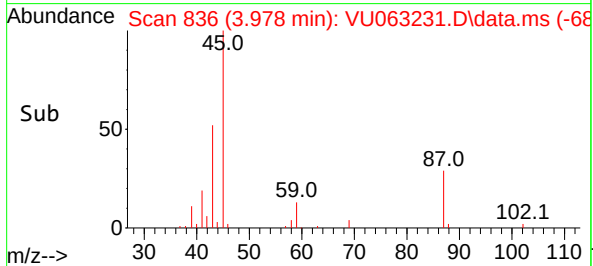
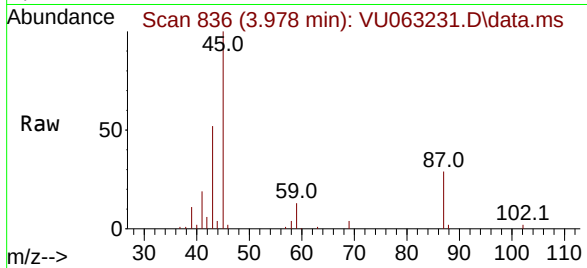
#31
Isopropyl Ether
Concen: 1.840 ug/l
RT: 3.978 min Scan# 836
Delta R.T. 0.003 min
Lab File: VU063231.D
Acq: 11 Feb 2025 12:31

Instrument :
MSVOA_U
ClientSampleId :
VU0211WBSD01

Tgt Ion: 45 Resp: 78534
Ion Ratio Lower Upper
45 100
43 53.1 25.7 77.1

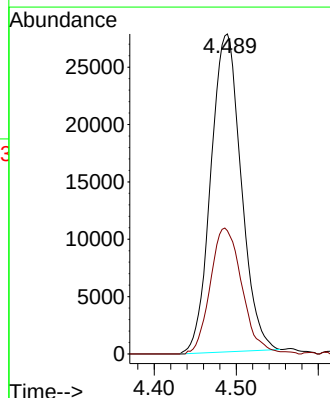
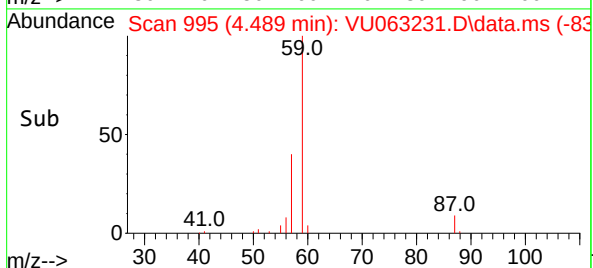
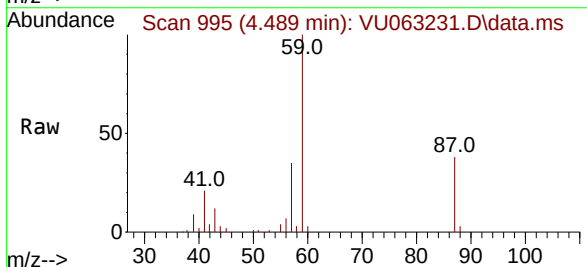
Manual Integrations
APPROVED

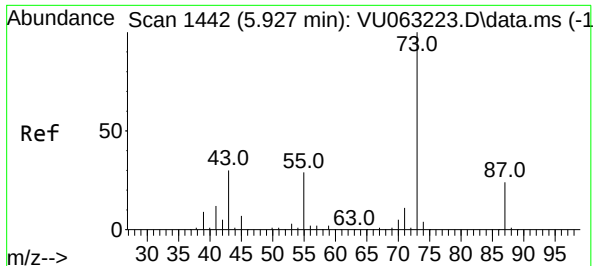
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#32
Ethyl-t-butyl ether
Concen: 1.836 ug/l
RT: 4.489 min Scan# 995
Delta R.T. 0.006 min
Lab File: VU063231.D
Acq: 11 Feb 2025 12:31

Tgt Ion: 59 Resp: 71285
Ion Ratio Lower Upper
59 100
87 41.5 32.6 49.0





#33

Tert-Amyl methyl ether

Concen: 1.892 ug/l

RT: 5.926 min Scan# 1442

Delta R.T. -0.000 min

Lab File: VU063231.D

Acq: 11 Feb 2025 12:31

Instrument :

MSVOA_U

ClientSampleId :

VU0211WBSD01

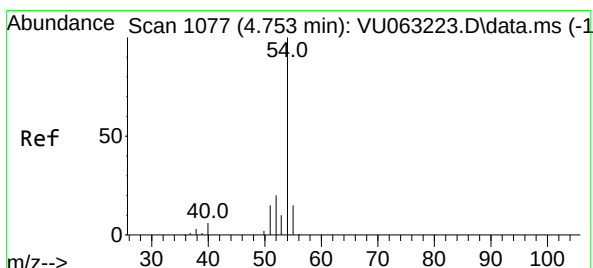
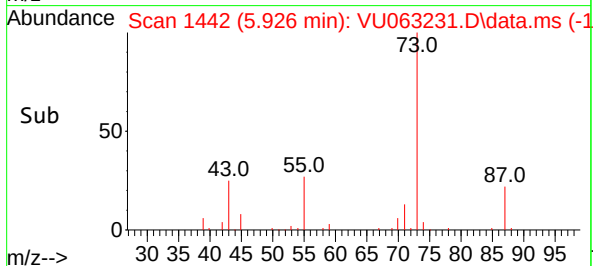
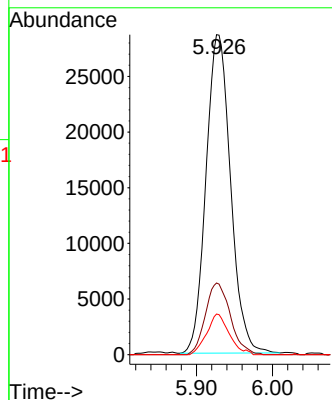
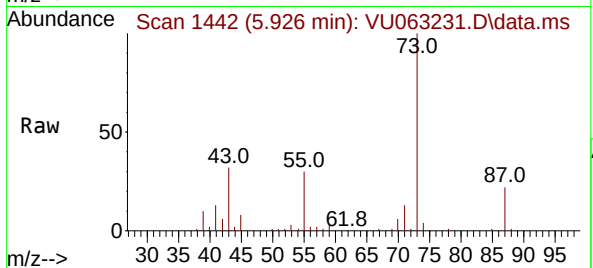
Tgt Ion: 73	Resp: 6417
Ion Ratio	Lower Upper
73	100
87	22.9 18.9 28.3
71	11.7 9.0 13.4

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#34

Propionitrile

Concen: 8.743 ug/l

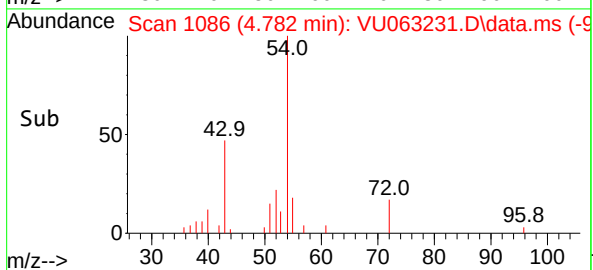
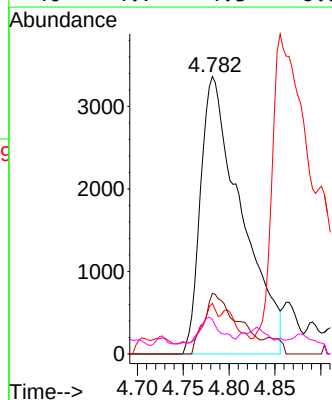
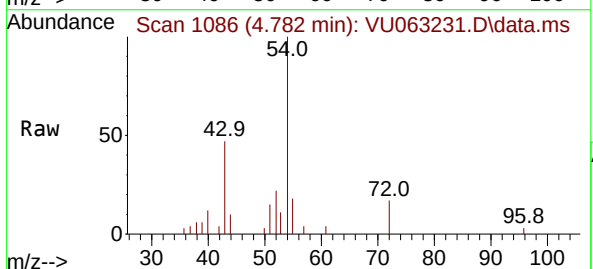
RT: 4.782 min Scan# 1086

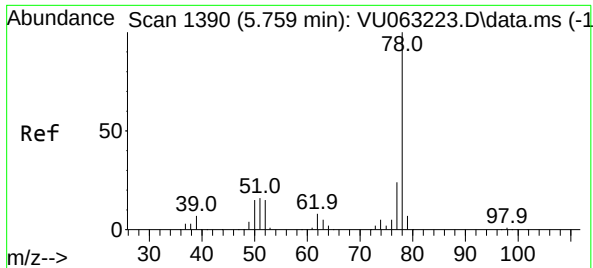
Delta R.T. 0.029 min

Lab File: VU063231.D

Acq: 11 Feb 2025 12:31

Tgt Ion: 54	Resp: 10345
Ion Ratio	Lower Upper
54	100
52	18.5 16.3 24.5
55	4.6 11.8 17.6#
40	4.7 4.3 6.5





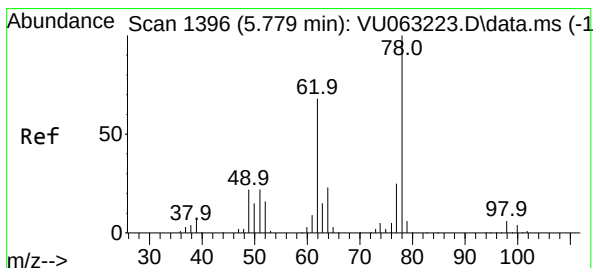
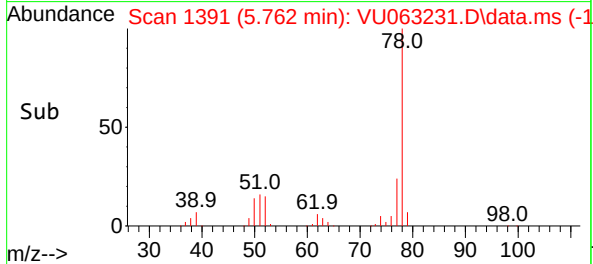
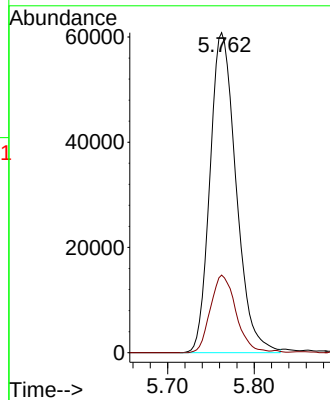
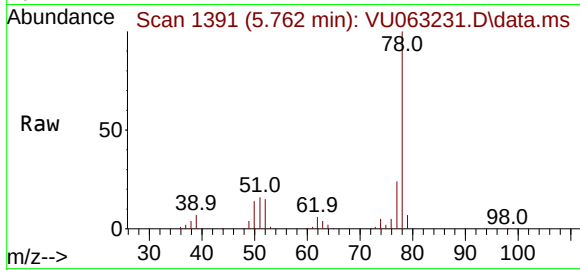
#35
Benzene
Concen: 1.895 ug/l
RT: 5.762 min Scan# 1391
Delta R.T. 0.003 min
Lab File: VU063231.D
Acq: 11 Feb 2025 12:31

Instrument :
MSVOA_U
ClientSampleId :
VU0211WBSD01

Tgt Ion: 78 Resp: 12753
Ion Ratio Lower Upper
78 100
77 24.3 19.0 28.4

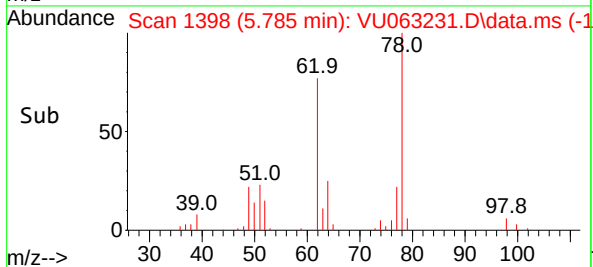
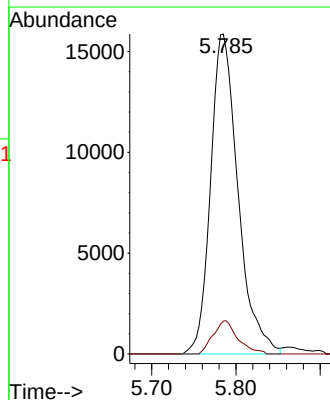
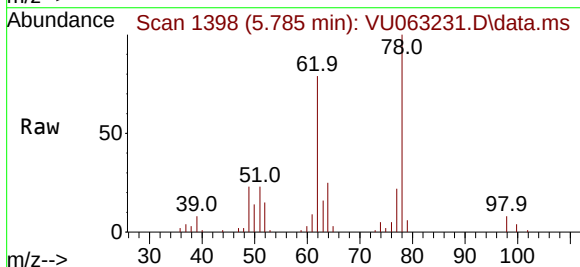
Manual Integrations
APPROVED

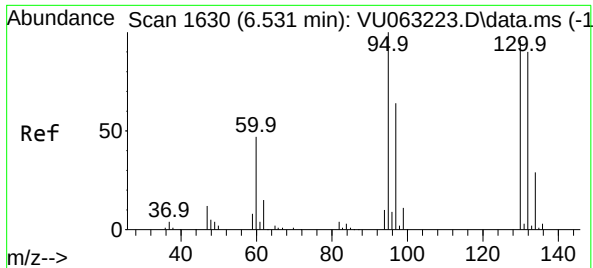
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#36
1,2-Dichloroethane
Concen: 1.847 ug/l
RT: 5.785 min Scan# 1398
Delta R.T. 0.006 min
Lab File: VU063231.D
Acq: 11 Feb 2025 12:31

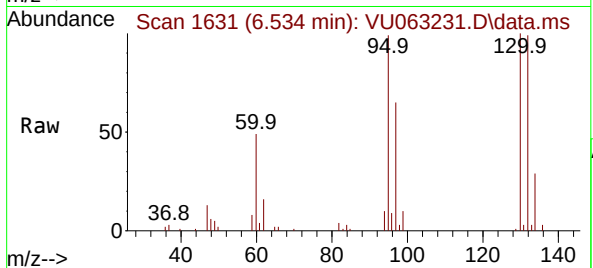
Tgt Ion: 62 Resp: 35880
Ion Ratio Lower Upper
62 100
98 9.3 6.9 10.3





#37
Trichloroethene
Concen: 1.965 ug/l
RT: 6.534 min Scan# 1630
Delta R.T. 0.003 min
Lab File: VU063231.D
Acq: 11 Feb 2025 12:31

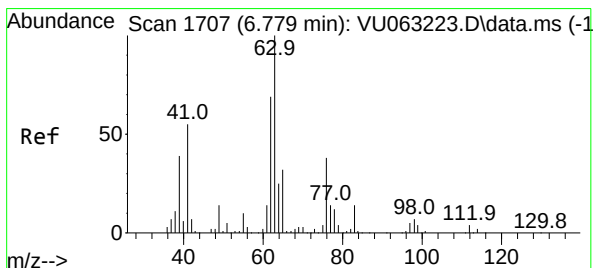
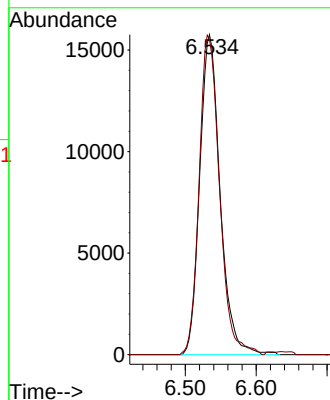
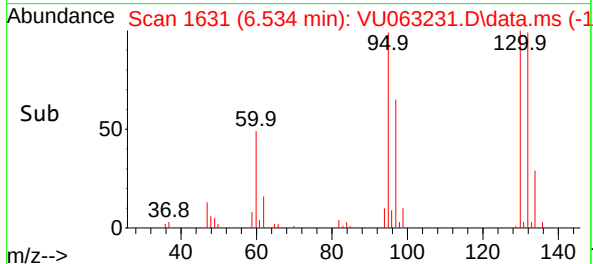
Instrument :
MSVOA_U
ClientSampleId :
VU0211WBSD01



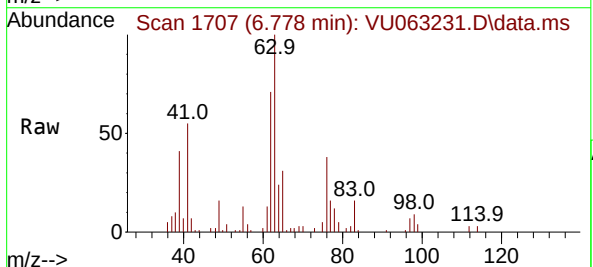
Tgt Ion:130 Resp: 31454
Ion Ratio Lower Upper
130 100
95 98.5 83.2 124.8

Manual Integrations
APPROVED

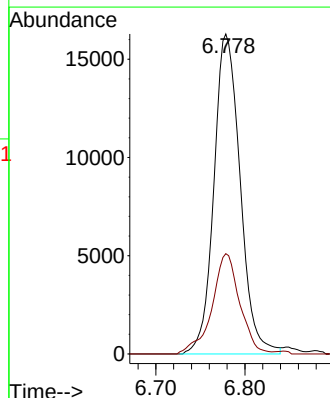
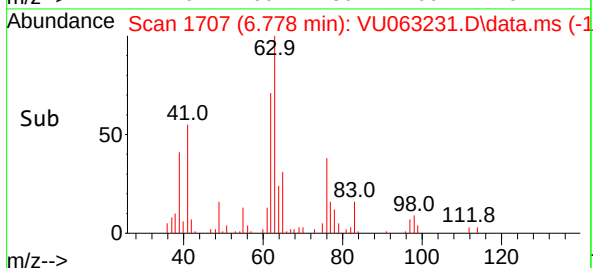
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025

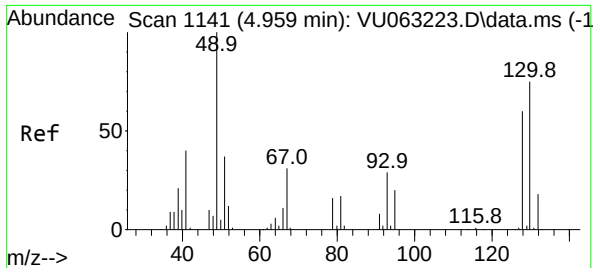


#38
1,2-Dichloropropane
Concen: 1.892 ug/l
RT: 6.778 min Scan# 1707
Delta R.T. -0.000 min
Lab File: VU063231.D
Acq: 11 Feb 2025 12:31



Tgt Ion: 63 Resp: 33332
Ion Ratio Lower Upper
63 100
65 30.7 25.3 37.9





#39

Methacrylonitrile

Concen: 1.788 ug/l

RT: 4.975 min Scan# 1146

Delta R.T. 0.016 min

Lab File: VU063231.D

Acq: 11 Feb 2025 12:31

Instrument :

MSVOA_U

ClientSampleId :

VU0211WBSD01

Tgt Ion: 41 Resp: 788

Ion Ratio Lower Upper

41 100

67 89.5 64.5 96.7

39 56.4 43.0 64.6

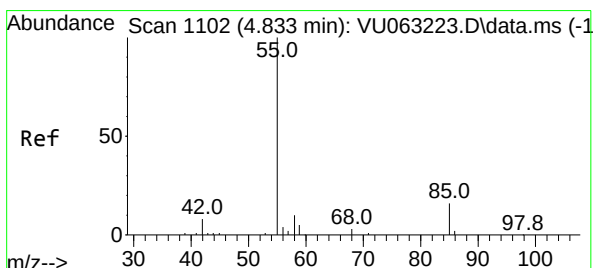
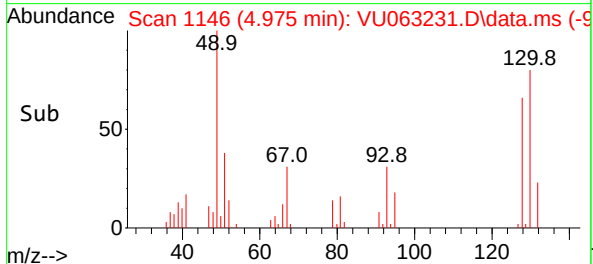
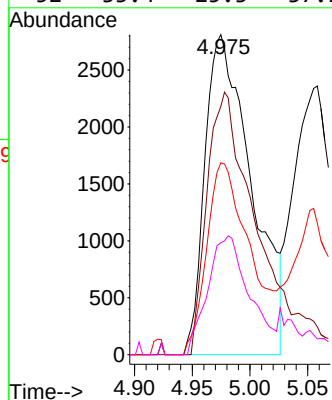
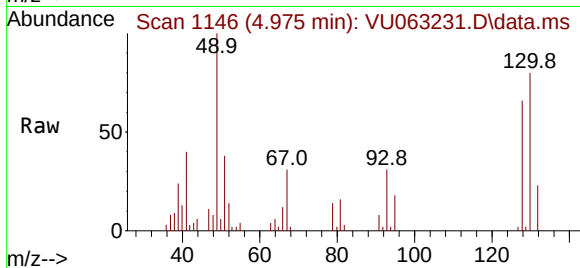
52 33.4 25.3 37.9

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#40

Methyl acrylate

Concen: 1.846 ug/l m

RT: 4.856 min Scan# 1109

Delta R.T. 0.022 min

Lab File: VU063231.D

Acq: 11 Feb 2025 12:31

Tgt Ion: 55 Resp: 14998

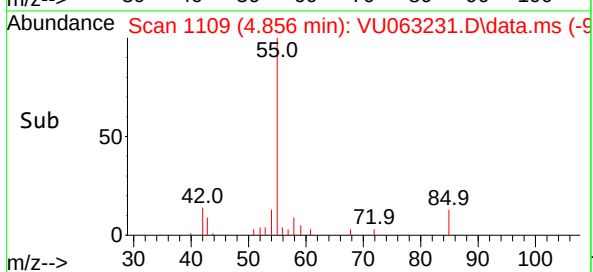
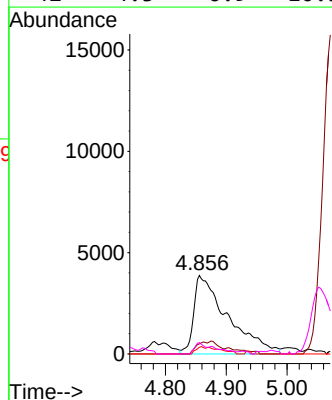
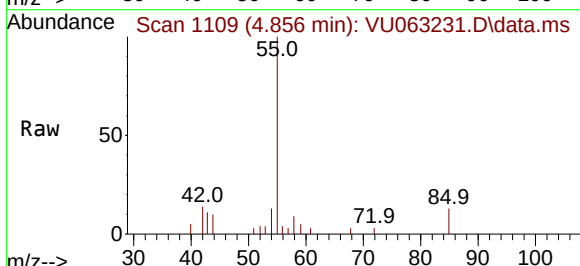
Ion Ratio Lower Upper

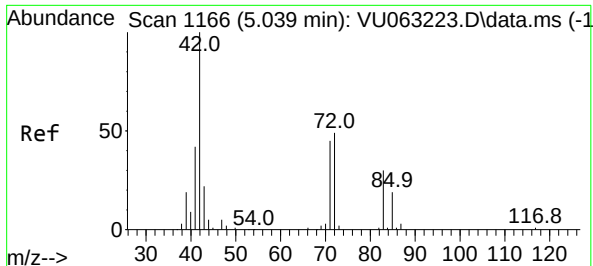
55 100

85 0.0 13.3 19.9#

58 2.4 7.3 10.9#

42 4.3 6.9 10.3#





#41

Tetrahydrofuran

Concen: 3.568 ug/l

RT: 5.052 min Scan# 1166

Delta R.T. 0.013 min

Lab File: VU063231.D

Acq: 11 Feb 2025 12:31

Instrument :

MSVOA_U

ClientSampleId :

VU0211WBSD01

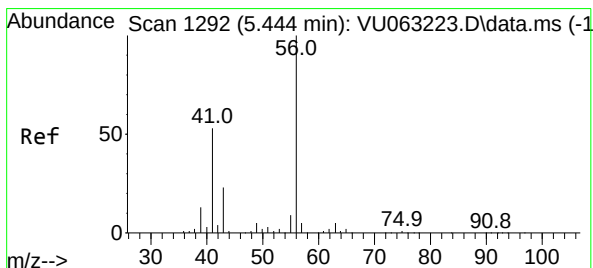
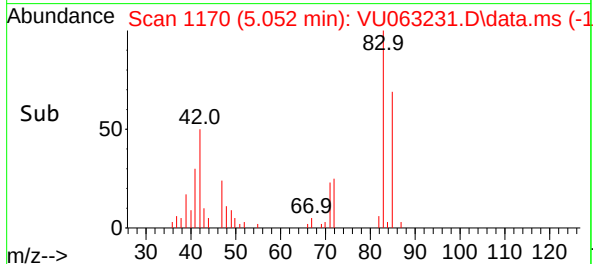
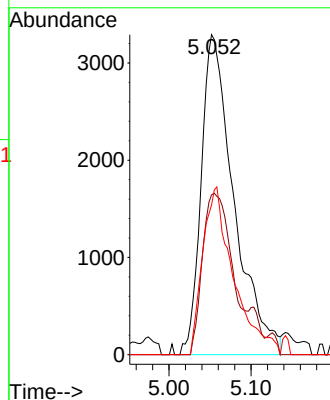
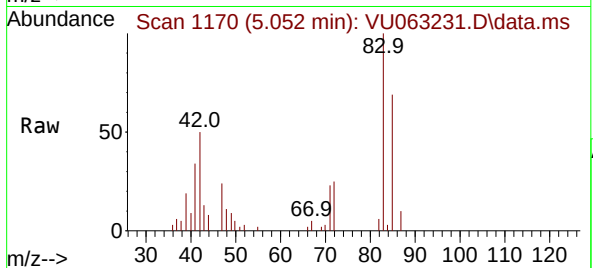
Tgt Ion:	42	Resp:	9149
Ion	Ratio	Lower	Upper
42	100		
72	45.9	41.5	62.3
71	49.2	37.2	55.8

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#42

1-Chlorobutane

Concen: 1.826 ug/l

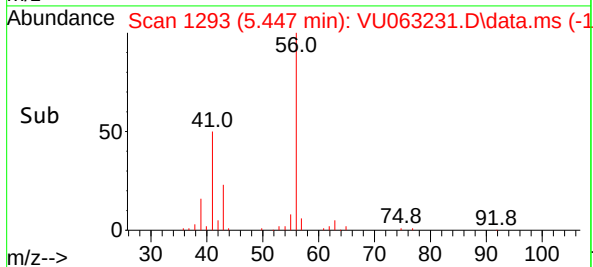
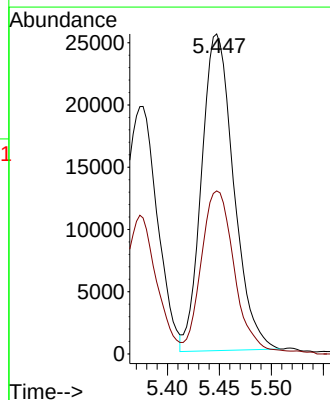
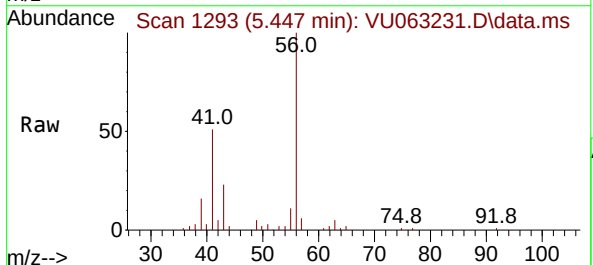
RT: 5.447 min Scan# 1293

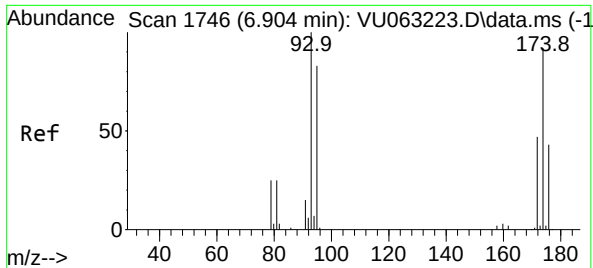
Delta R.T. 0.003 min

Lab File: VU063231.D

Acq: 11 Feb 2025 12:31

Tgt Ion:	56	Resp:	54703
Ion	Ratio	Lower	Upper
56	100		
41	53.7	26.3	78.8





#43

Dibromomethane

Concen: 1.851 ug/l

RT: 6.907 min Scan# 1746

Delta R.T. 0.003 min

Lab File: VU063231.D

Acq: 11 Feb 2025 12:31

Instrument :

MSVOA_U

ClientSampleId :

VU0211WBSD01

Tgt Ion: 93 Resp: 1651

Ion Ratio Lower Upper

93 100

95 83.8 67.2 100.8

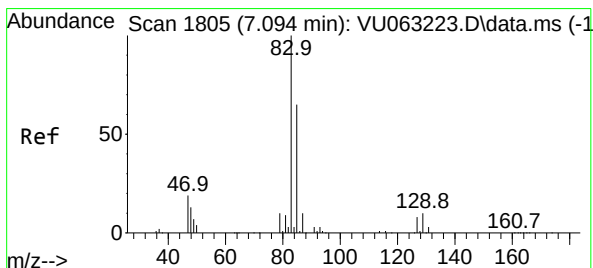
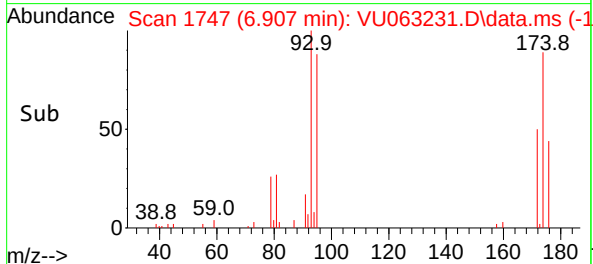
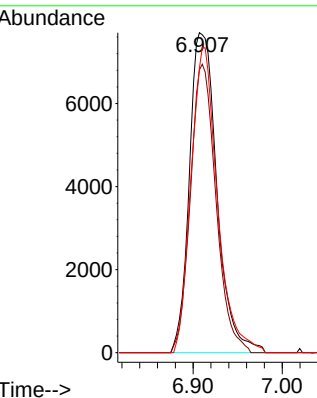
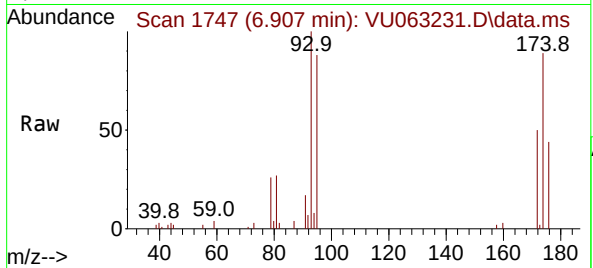
174 91.7 75.7 113.5

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#44

Bromodichloromethane

Concen: 1.953 ug/l

RT: 7.094 min Scan# 1805

Delta R.T. -0.000 min

Lab File: VU063231.D

Acq: 11 Feb 2025 12:31

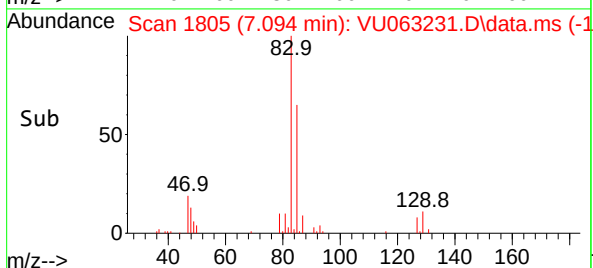
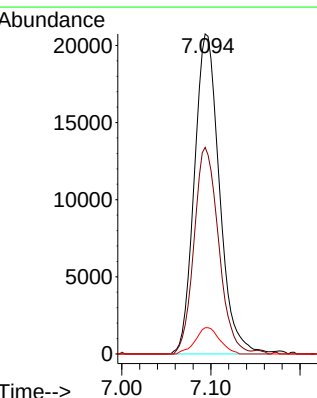
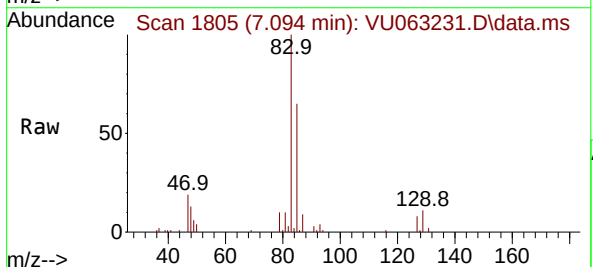
Tgt Ion: 83 Resp: 40544

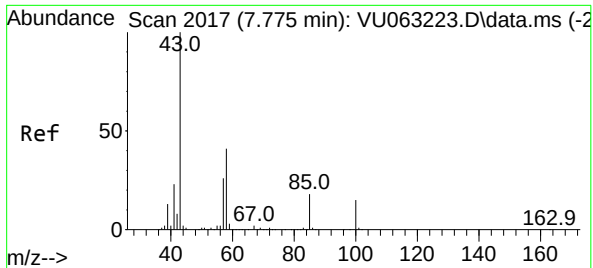
Ion Ratio Lower Upper

83 100

85 64.6 51.7 77.5

127 8.2 6.7 10.1





#45

4-Methyl-2-Pentanone

Concen: 9.059 ug/l

RT: 7.782 min Scan# 2017

Delta R.T. 0.006 min

Lab File: VU063231.D

Acq: 11 Feb 2025 12:31

Instrument :

MSVOA_U

ClientSampleId :

VU0211WBSD01

Tgt Ion: 43 Resp: 8472

Ion Ratio Lower Upper

43 100

58 40.4 20.8 62.5

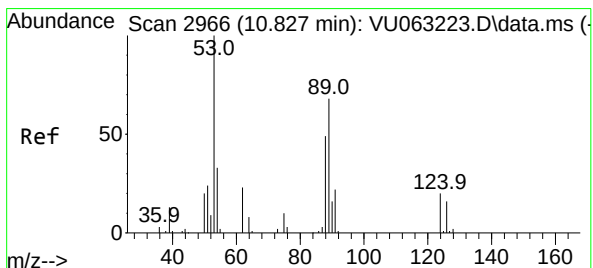
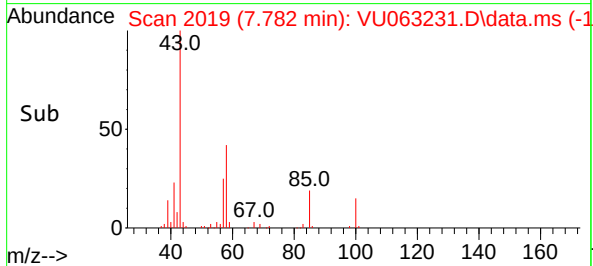
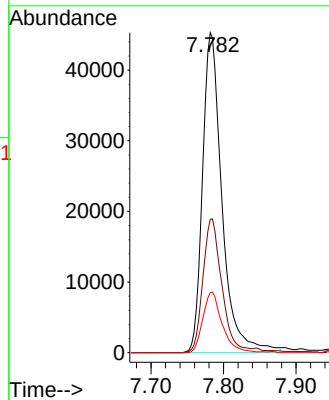
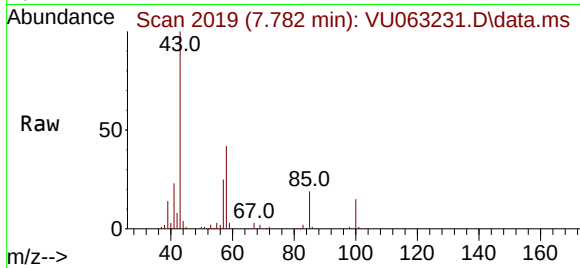
85 18.6 14.8 22.2

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#46

t-1,4-Dichloro-2-butene

Concen: 3.490 ug/l m

RT: 10.823 min Scan# 2965

Delta R.T. -0.003 min

Lab File: VU063231.D

Acq: 11 Feb 2025 12:31

Tgt Ion: 75 Resp: 15342

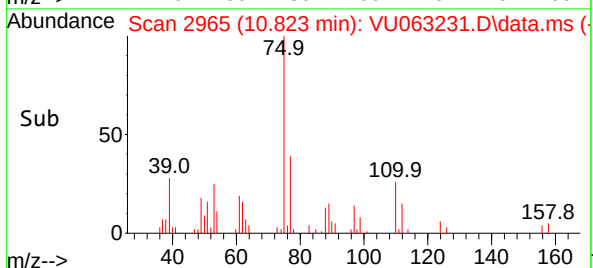
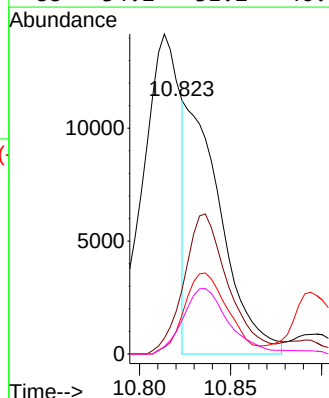
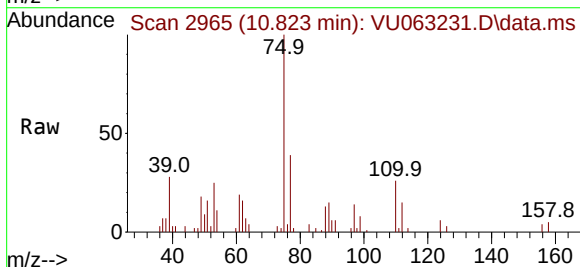
Ion Ratio Lower Upper

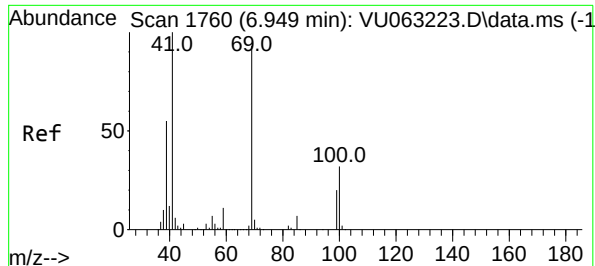
75 100

53 68.6 64.5 96.7

89 39.0 43.4 65.2#

88 34.2 31.2 46.8





#47

Methyl methacrylate

Concen: 3.714 ug/l

RT: 6.955 min Scan# 1762

Delta R.T. 0.006 min

Lab File: VU063231.D

Acq: 11 Feb 2025 12:31

Instrument :

MSVOA_U

ClientSampleId :

VU0211WBSD01

Tgt Ion: 69 Resp: 2790

Ion Ratio Lower Upper

69 100

41 108.3 0.0 217.0

39 61.9 47.7 71.5

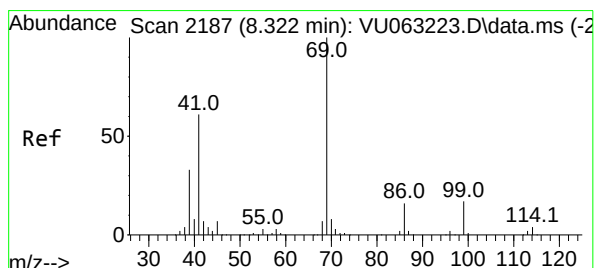
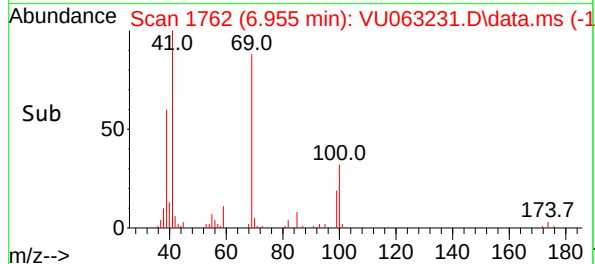
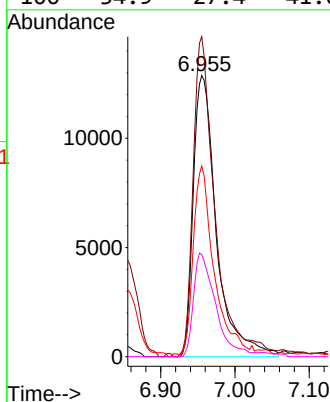
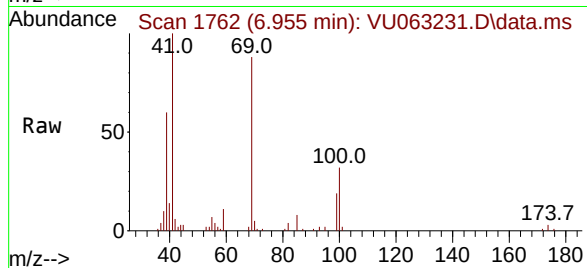
100 34.9 27.4 41.0

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#48

Ethyl methacrylate

Concen: 1.890 ug/l

RT: 8.328 min Scan# 2189

Delta R.T. 0.006 min

Lab File: VU063231.D

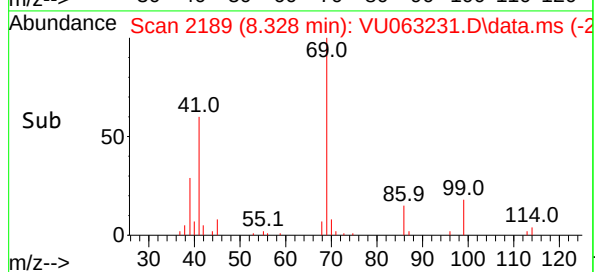
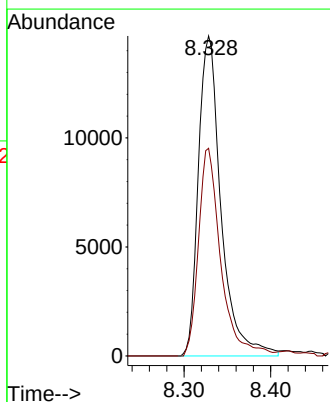
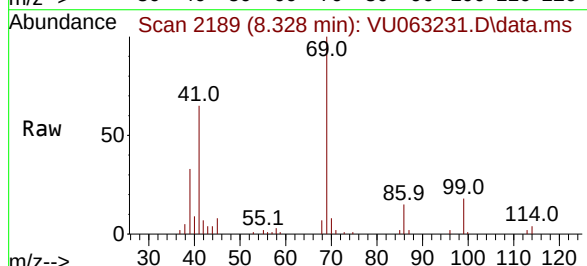
Acq: 11 Feb 2025 12:31

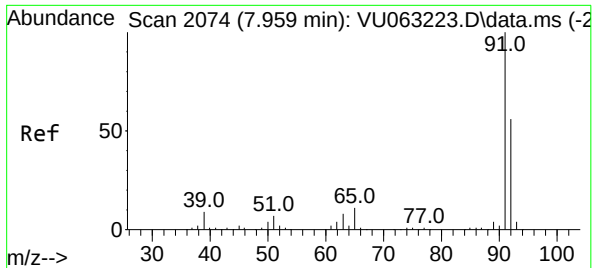
Tgt Ion: 69 Resp: 26666

Ion Ratio Lower Upper

69 100

41 63.7 30.6 92.0





#49

Toluene

Concen: 1.903 ug/l

RT: 7.958 min Scan# 2074

Delta R.T. -0.000 min

Lab File: VU063231.D

Acq: 11 Feb 2025 12:31

Instrument :

MSVOA_U

ClientSampleId :

VU0211WBSD01

Tgt Ion: 92 Resp: 7366

Ion Ratio Lower Upper

92 100

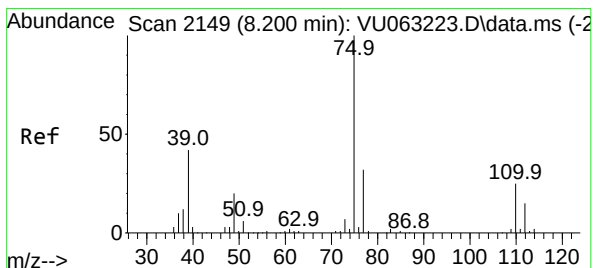
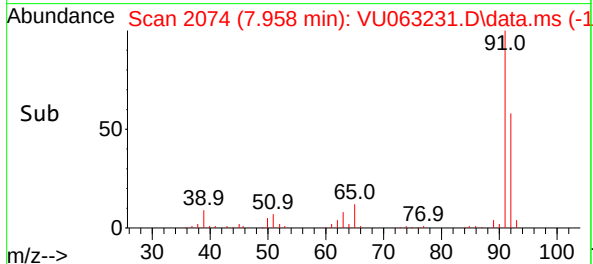
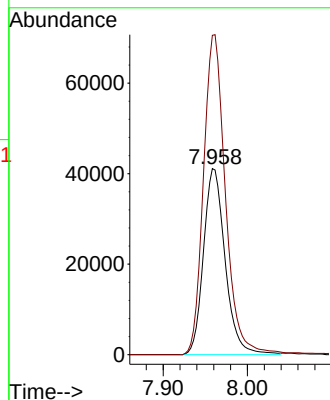
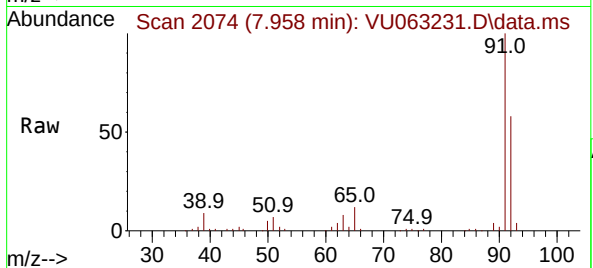
91 174.3 141.8 212.6

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#50

t-1,3-Dichloropropene

Concen: 1.888 ug/l

RT: 8.203 min Scan# 2150

Delta R.T. 0.003 min

Lab File: VU063231.D

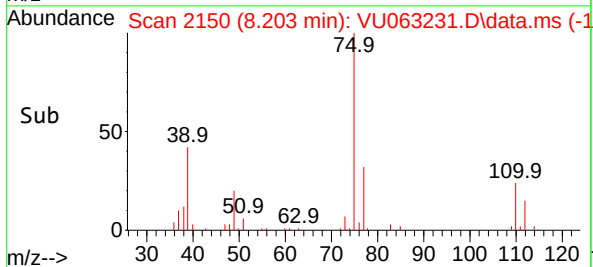
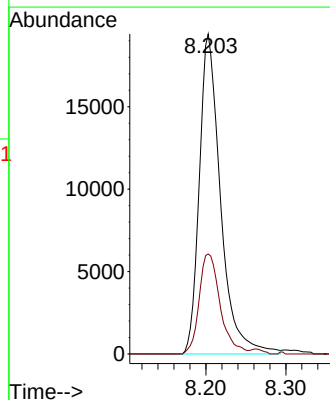
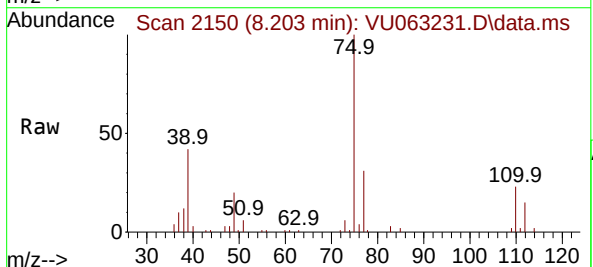
Acq: 11 Feb 2025 12:31

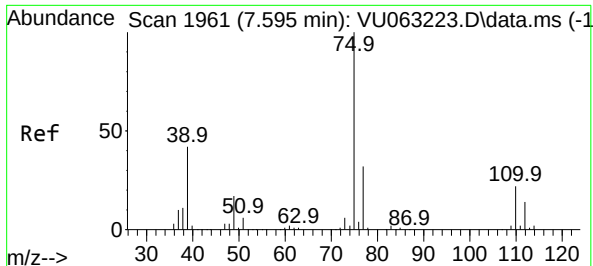
Tgt Ion: 75 Resp: 35883

Ion Ratio Lower Upper

75 100

77 31.2 25.9 38.9





#51

cis-1,3-Dichloropropene

Concen: 1.884 ug/l

RT: 7.598 min Scan# 1961

Delta R.T. 0.003 min

Lab File: VU063231.D

Acq: 11 Feb 2025 12:31

Instrument :

MSVOA_U

ClientSampleId :

VU0211WBSD01

Tgt Ion: 75 Resp: 44229

Ion Ratio Lower Upper

75 100

77 31.9 25.3 37.9

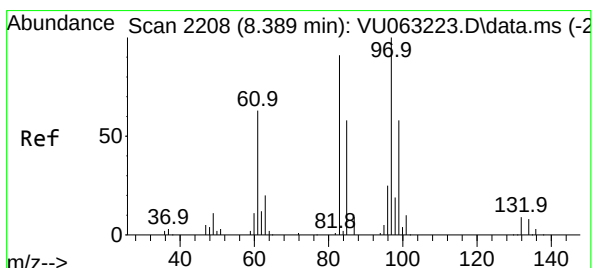
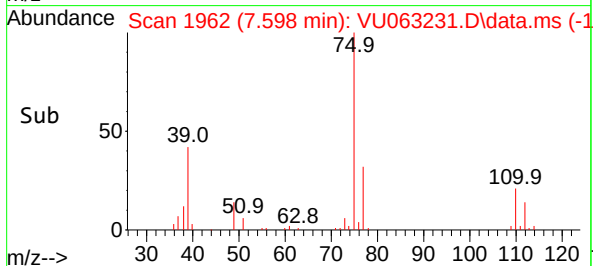
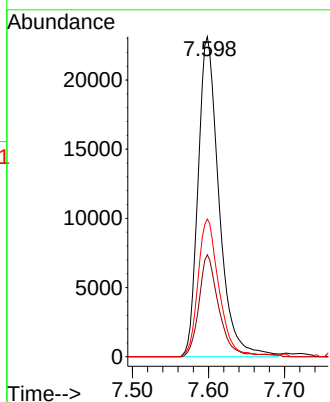
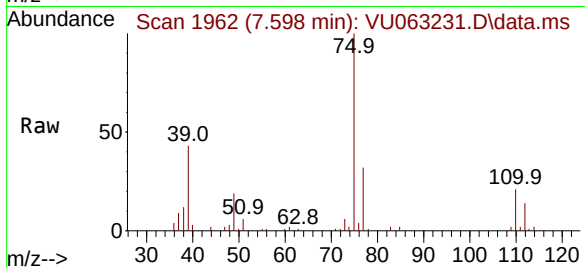
39 43.1 33.5 50.3

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#52

1,1,2-Trichloroethane

Concen: 1.869 ug/l

RT: 8.389 min Scan# 2208

Delta R.T. -0.000 min

Lab File: VU063231.D

Acq: 11 Feb 2025 12:31

Tgt Ion: 97 Resp: 22475

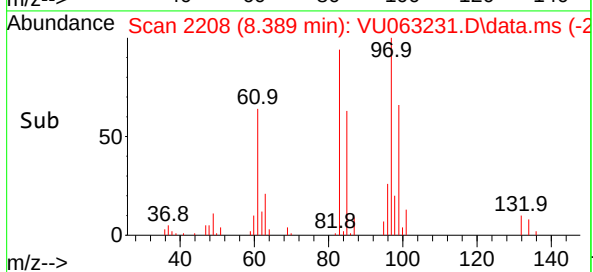
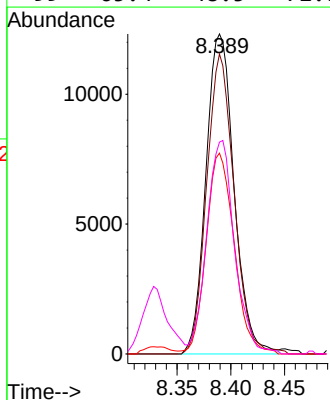
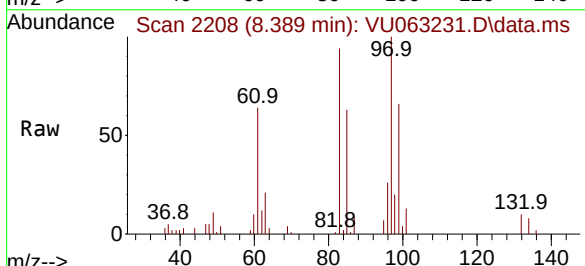
Ion Ratio Lower Upper

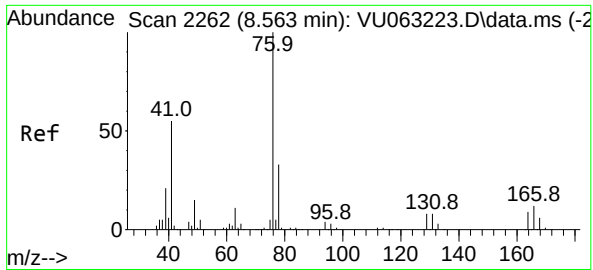
97 100

83 93.8 73.0 109.4

85 62.8 46.3 69.5

99 65.4 48.5 72.7





#53

1,3-Dichloropropane

Concen: 1.862 ug/l

RT: 8.566 min Scan# 2262

Delta R.T. 0.003 min

Lab File: VU063231.D

Acq: 11 Feb 2025 12:31

Tgt Ion: 76 Resp: 3976

Ion Ratio Lower Upper

76 100

78 32.1 26.3 39.5

Instrument :

MSVOA_U

ClientSampleId :

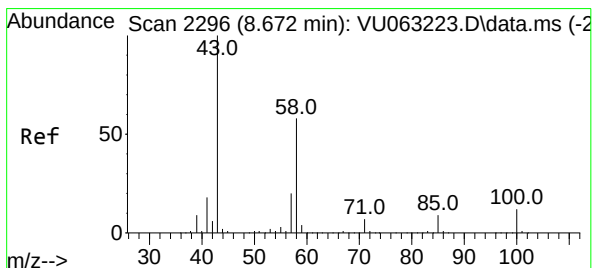
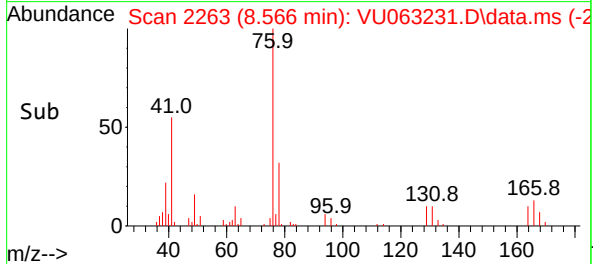
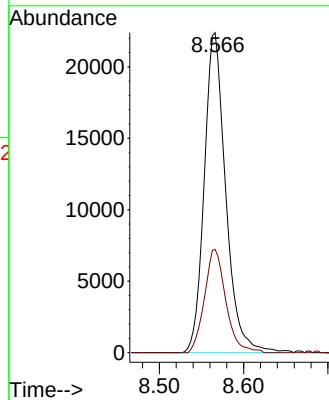
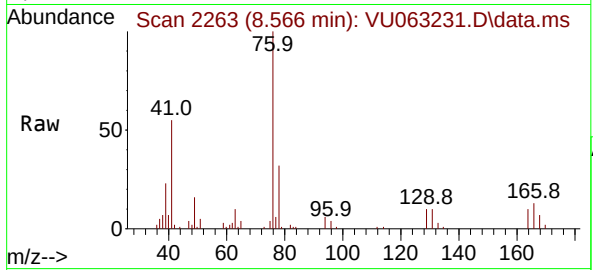
VU0211WBSD01

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#54

2-Hexanone

Concen: 8.755 ug/l

RT: 8.679 min Scan# 2298

Delta R.T. 0.006 min

Lab File: VU063231.D

Acq: 11 Feb 2025 12:31

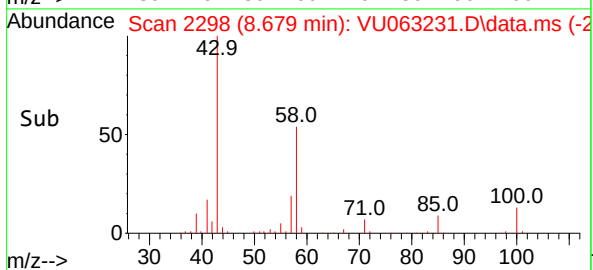
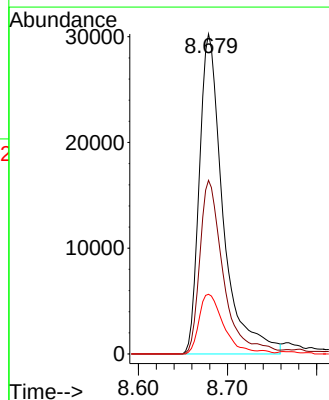
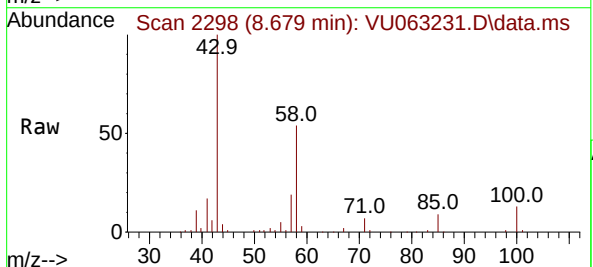
Tgt Ion: 43 Resp: 55875

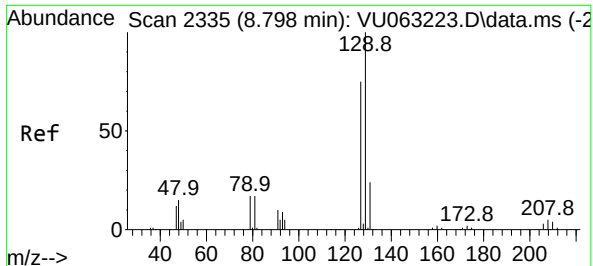
Ion Ratio Lower Upper

43 100

58 53.9 38.0 78.0

57 19.2 0.0 39.1





#55

Dibromochloromethane

Concen: 1.856 ug/l

RT: 8.798 min Scan# 2335

Delta R.T. -0.000 min

Lab File: VU063231.D

Acq: 11 Feb 2025 12:31

Instrument :

MSVOA_U

ClientSampleId :

VU0211WBSD01

Tgt Ion:129 Resp: 25680

Ion Ratio Lower Upper

129 100

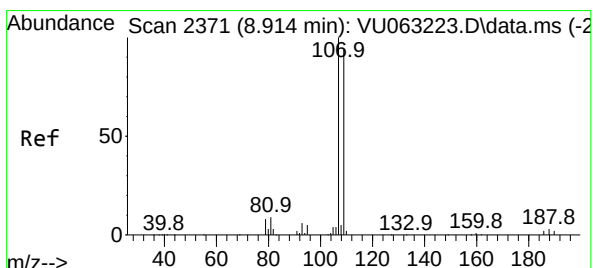
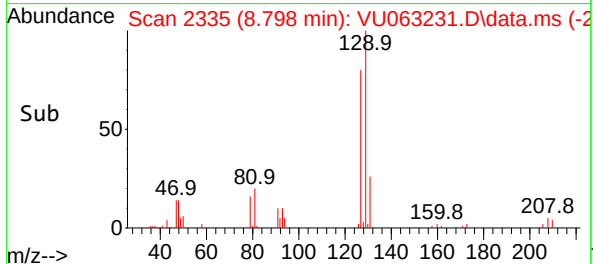
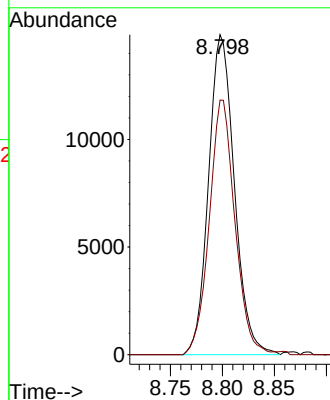
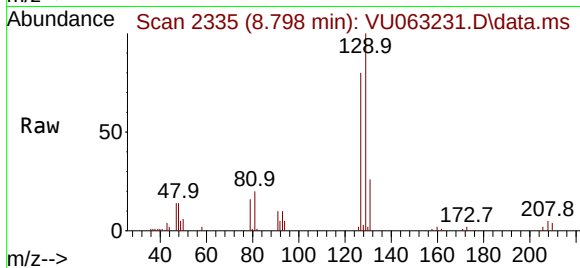
127 79.0 60.4 90.6

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#56

1,2-Dibromoethane

Concen: 1.899 ug/l

RT: 8.913 min Scan# 2371

Delta R.T. -0.000 min

Lab File: VU063231.D

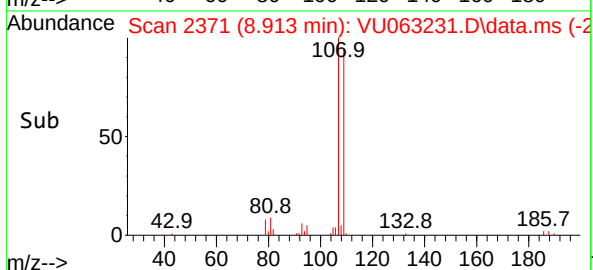
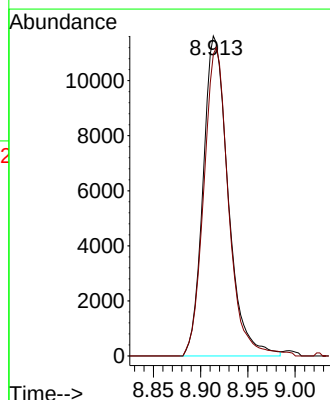
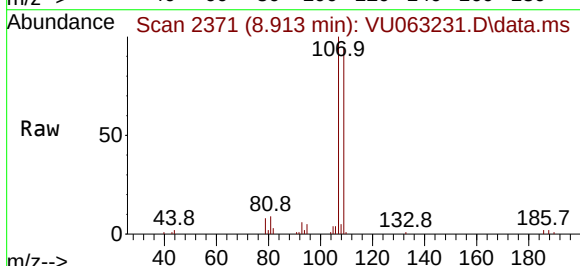
Acq: 11 Feb 2025 12:31

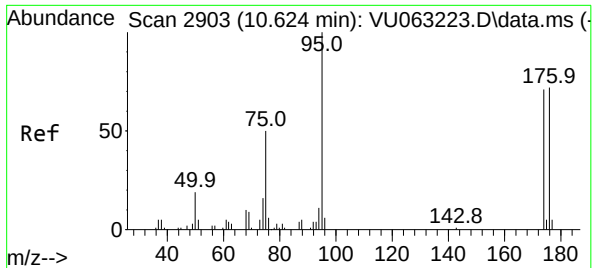
Tgt Ion:107 Resp: 21428

Ion Ratio Lower Upper

107 100

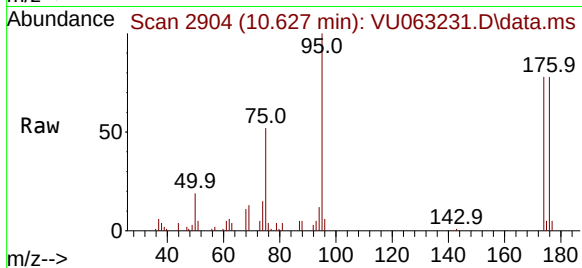
109 95.1 0.0 187.8





#57
4-Bromofluorobenzene
Concen: 1.033 ug/l
RT: 10.627 min Scan# 2904
Delta R.T. 0.003 min
Lab File: VU063231.D
Acq: 11 Feb 2025 12:31

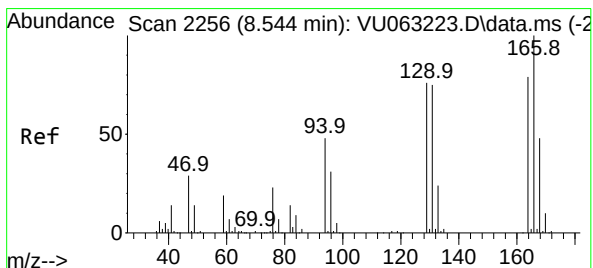
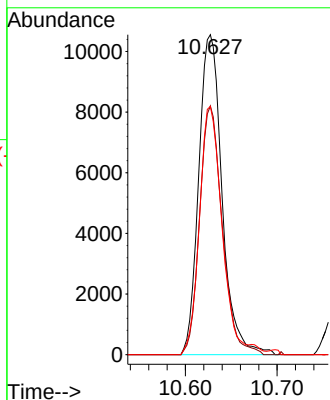
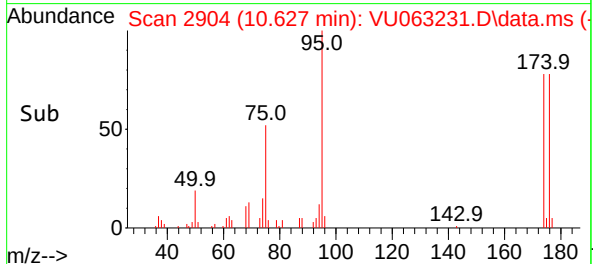
Instrument :
MSVOA_U
ClientSampleId :
VU0211WBSD01



Tgt Ion: 95 Resp: 1866
Ion Ratio Lower Upper
95 100
174 75.4 58.6 88.0
176 75.8 58.2 87.4

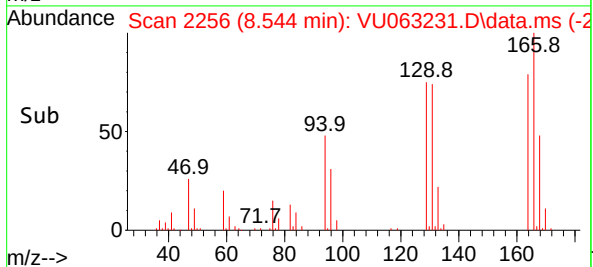
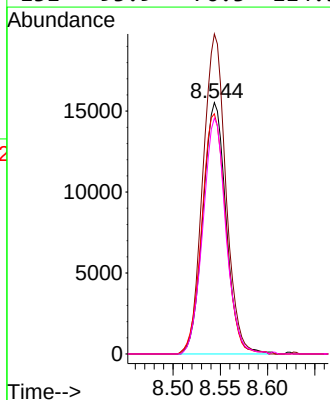
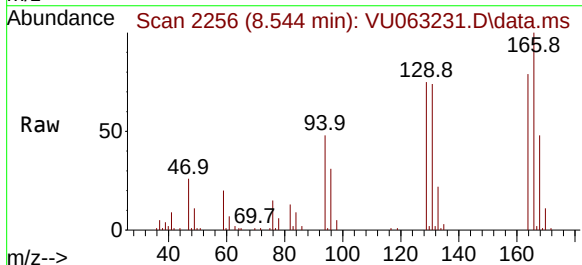
Manual Integrations
APPROVED

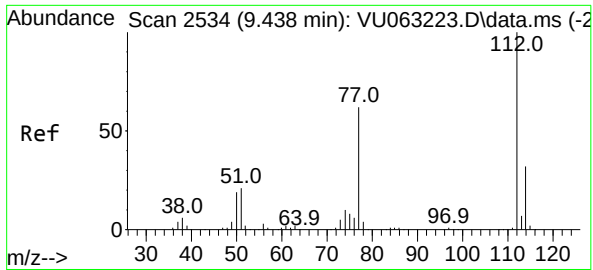
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#58
Tetrachloroethene
Concen: 2.007 ug/l
RT: 8.544 min Scan# 2256
Delta R.T. -0.000 min
Lab File: VU063231.D
Acq: 11 Feb 2025 12:31

Tgt Ion:164 Resp: 26480
Ion Ratio Lower Upper
164 100
166 127.3 101.4 152.0
129 95.6 77.0 115.4
131 93.9 76.3 114.5





#59

Chlorobenzene

Concen: 1.929 ug/l

RT: 9.438 min Scan# 2534

Delta R.T. -0.000 min

Lab File: VU063231.D

Acq: 11 Feb 2025 12:31

Instrument :

MSVOA_U

ClientSampleId :

VU0211WBSD01

Tgt Ion:112 Resp: 7880

Ion Ratio Lower Upper

112 100

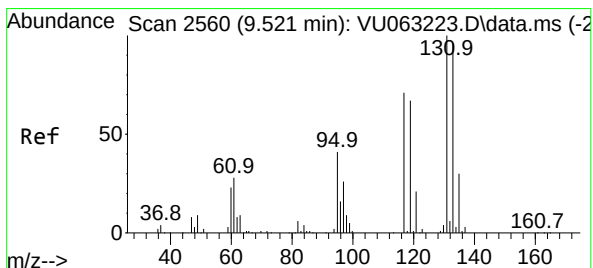
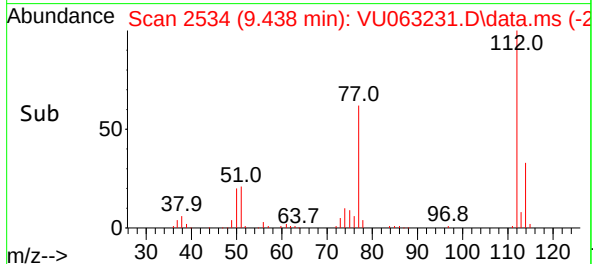
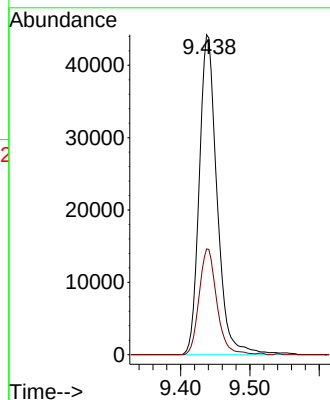
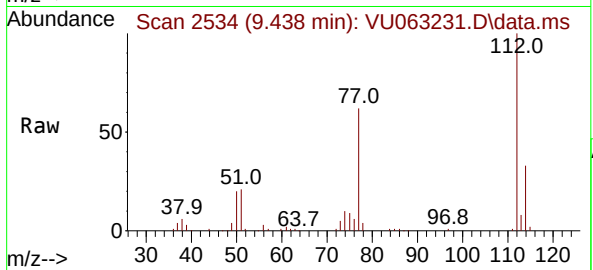
114 33.1 25.7 38.5

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#60

1,1,1,2-Tetrachloroethane

Concen: 1.867 ug/l

RT: 9.524 min Scan# 2561

Delta R.T. 0.003 min

Lab File: VU063231.D

Acq: 11 Feb 2025 12:31

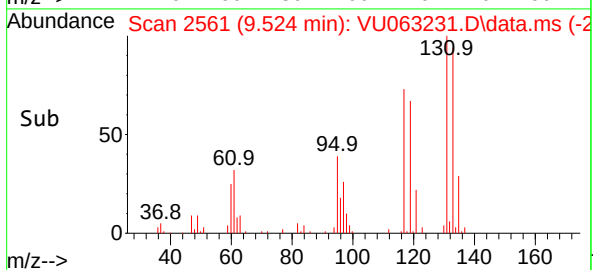
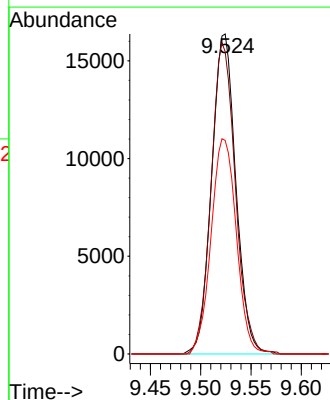
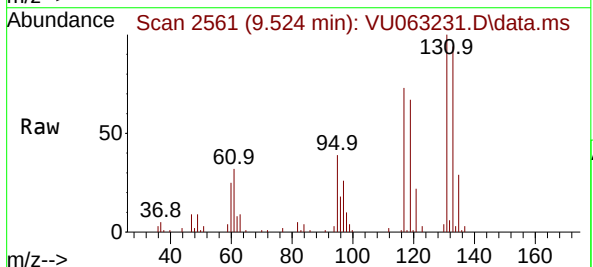
Tgt Ion:131 Resp: 27412

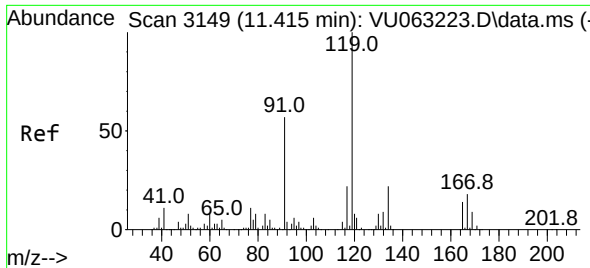
Ion Ratio Lower Upper

131 100

133 97.4 76.7 115.1

119 70.2 54.4 81.6





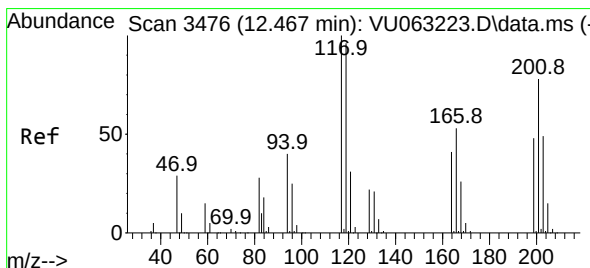
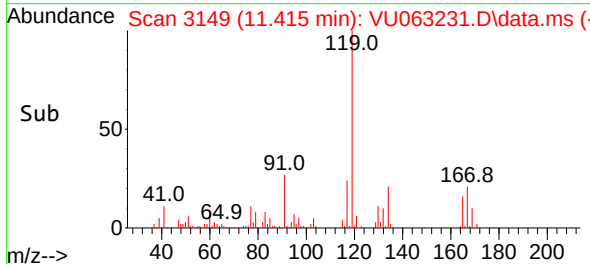
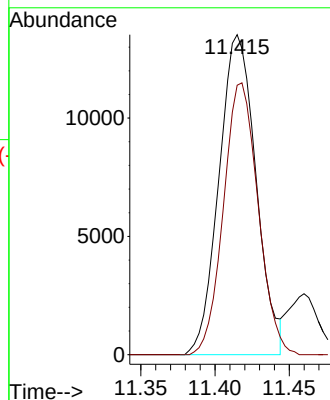
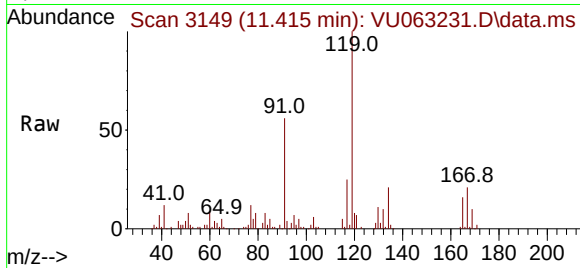
#61
Pentachloroethane
Concen: 1.788 ug/l
RT: 11.415 min Scan# 3149
Delta R.T. -0.000 min
Lab File: VU063231.D
Acq: 11 Feb 2025 12:31

Instrument :
MSVOA_U
ClientSampleId :
VU0211WBSD01

Tgt Ion:117 Resp: 23450
Ion Ratio Lower Upper
117 100
167 79.4 65.0 97.6

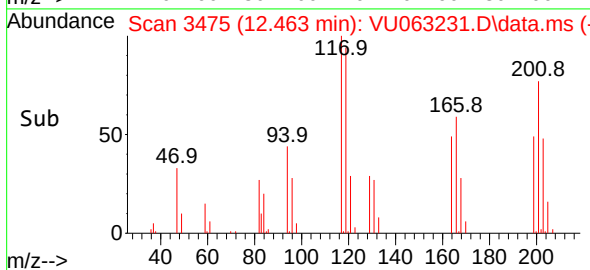
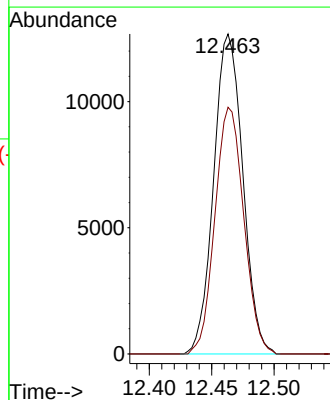
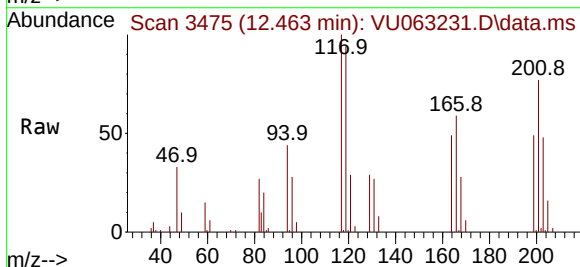
Manual Integrations
APPROVED

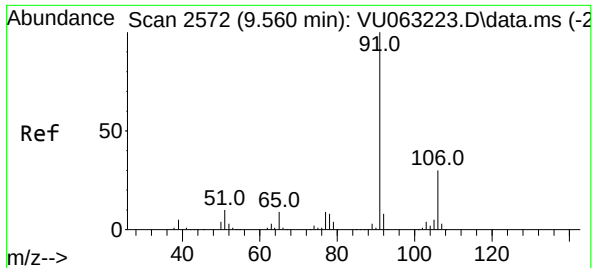
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#62
Hexachloroethane
Concen: 1.779 ug/l
RT: 12.463 min Scan# 3475
Delta R.T. -0.003 min
Lab File: VU063231.D
Acq: 11 Feb 2025 12:31

Tgt Ion:117 Resp: 20644
Ion Ratio Lower Upper
117 100
201 76.3 61.3 91.9





#63

Ethyl Benzene

Concen: 1.843 ug/l

RT: 9.560 min Scan# 21

Delta R.T. -0.000 min

Lab File: VU063231.D

Acq: 11 Feb 2025 12:31

Instrument :

MSVOA_U

ClientSampleId :

VU0211WBSD01

Tgt Ion: 91 Resp: 129864

Ion Ratio Lower Upper

91 100

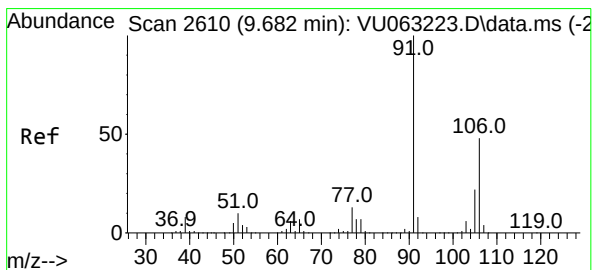
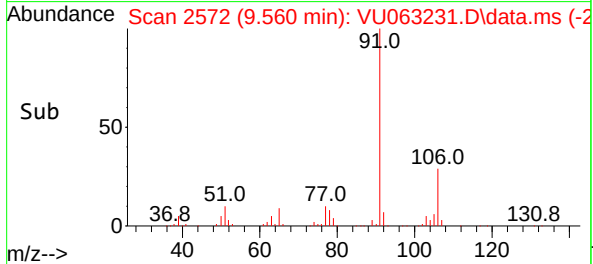
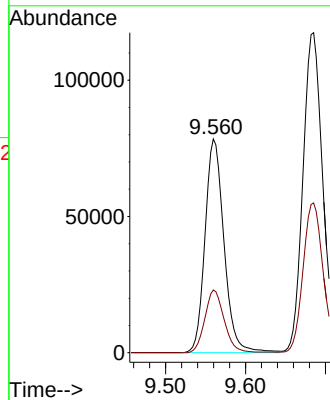
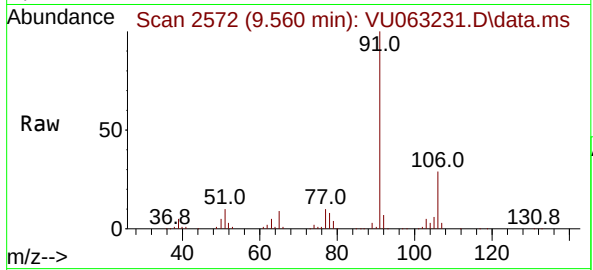
106 29.4 24.2 36.2

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#64

m/p-Xylenes

Concen: 3.689 ug/l

RT: 9.685 min Scan# 2611

Delta R.T. 0.003 min

Lab File: VU063231.D

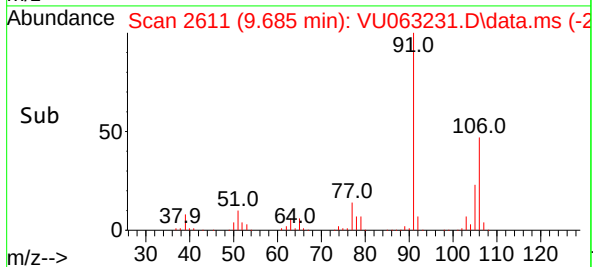
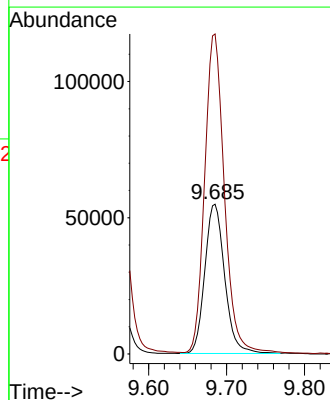
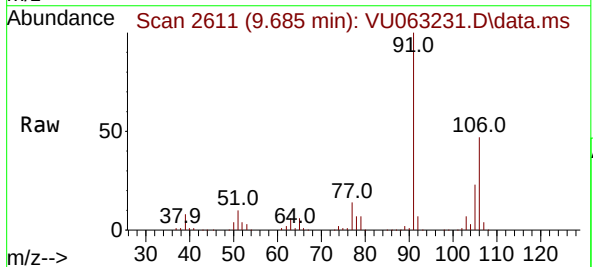
Acq: 11 Feb 2025 12:31

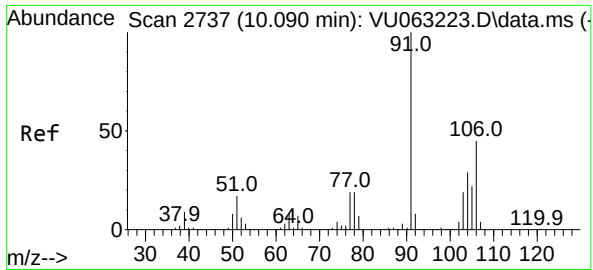
Tgt Ion:106 Resp: 97083

Ion Ratio Lower Upper

106 100

91 213.1 166.9 250.3





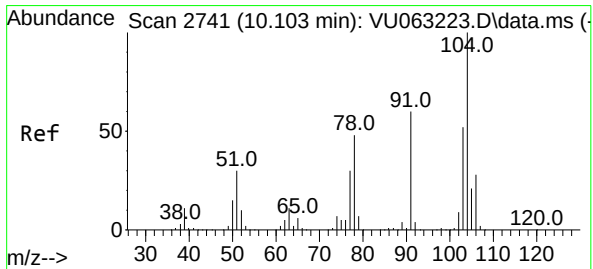
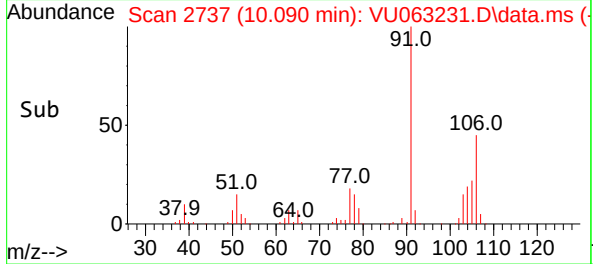
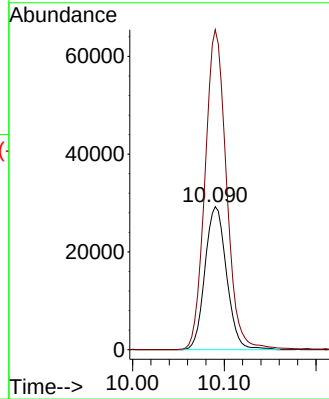
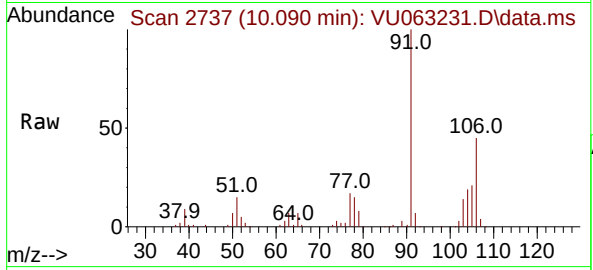
#65
o-Xylene
Concen: 1.859 ug/l
RT: 10.090 min Scan# 2737
Delta R.T. -0.000 min
Lab File: VU063231.D
Acq: 11 Feb 2025 12:31

Instrument :
MSVOA_U
ClientSampleId :
VU0211WBSD01

Tgt Ion:106 Resp: 4789
Ion Ratio Lower Upper
106 100
91 223.0 110.9 332.9

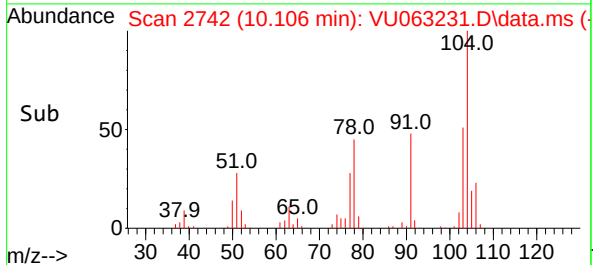
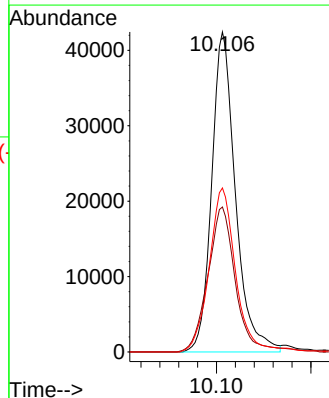
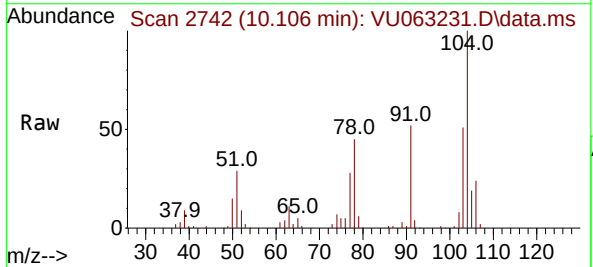
Manual Integrations
APPROVED

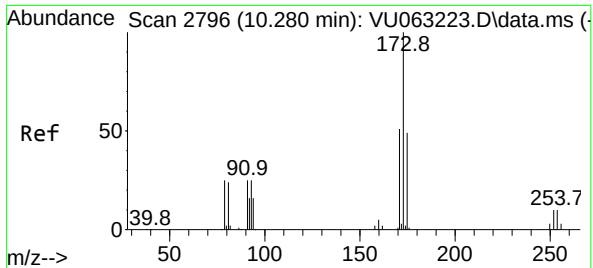
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#66
Styrene
Concen: 1.809 ug/l
RT: 10.106 min Scan# 2742
Delta R.T. 0.003 min
Lab File: VU063231.D
Acq: 11 Feb 2025 12:31

Tgt Ion:104 Resp: 74164
Ion Ratio Lower Upper
104 100
78 52.8 41.2 61.8
103 57.3 44.8 67.2





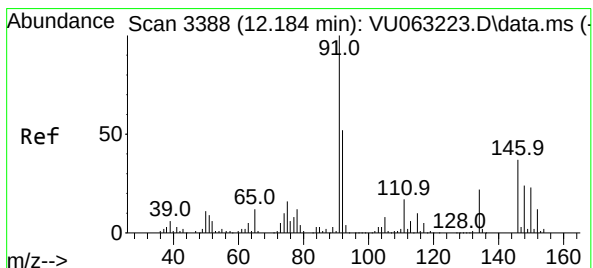
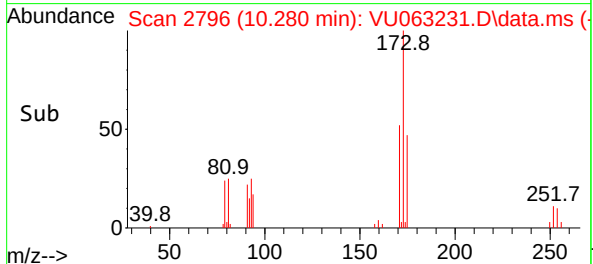
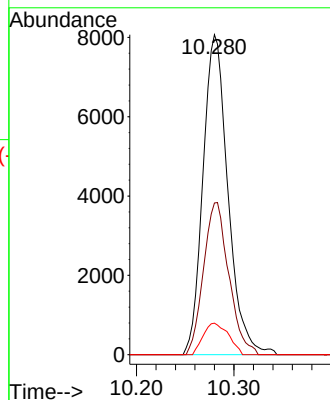
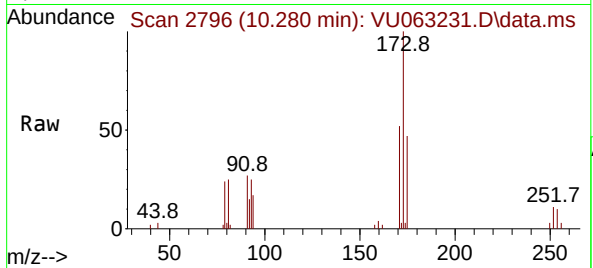
#67
Bromoform
Concen: 1.829 ug/l
RT: 10.280 min Scan# 2796
Delta R.T. -0.000 min
Lab File: VU063231.D
Acq: 11 Feb 2025 12:31

Instrument :
MSVOA_U
ClientSampleId :
VU0211WBSD01

Tgt Ion:173 Resp: 1436
Ion Ratio Lower Upper
173 100
175 48.1 39.0 58.4
254 9.9 7.7 11.5

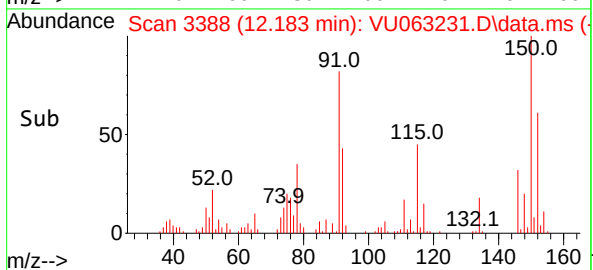
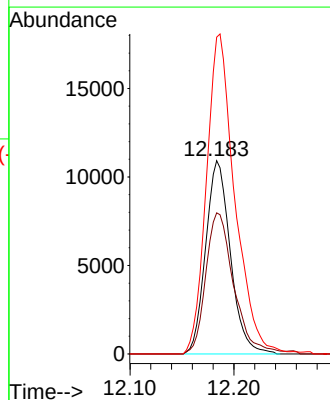
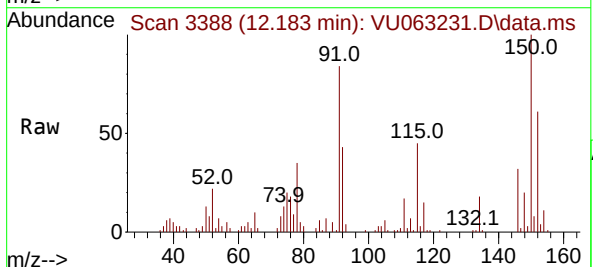
Manual Integrations
APPROVED

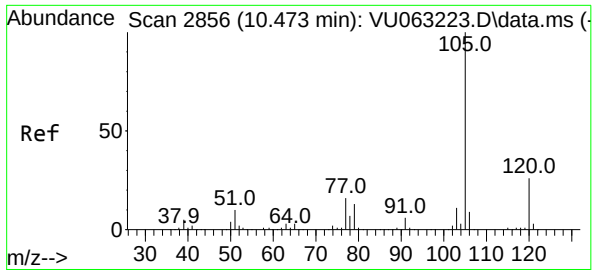
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#68
1,2-Dichlorobenzene-d4
Concen: 0.961 ug/l
RT: 12.183 min Scan# 3388
Delta R.T. -0.000 min
Lab File: VU063231.D
Acq: 11 Feb 2025 12:31

Tgt Ion:152 Resp: 18049
Ion Ratio Lower Upper
152 100
115 82.5 0.0 275.2
150 190.2 0.0 658.4





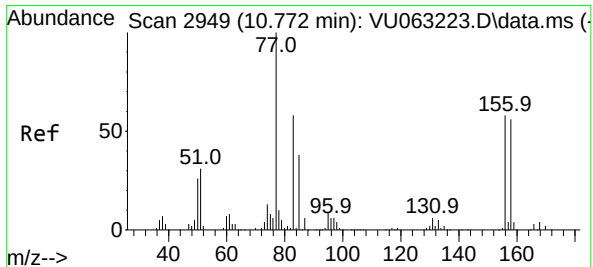
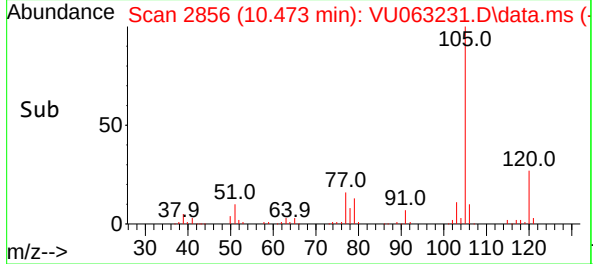
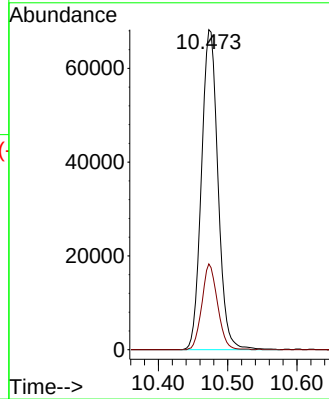
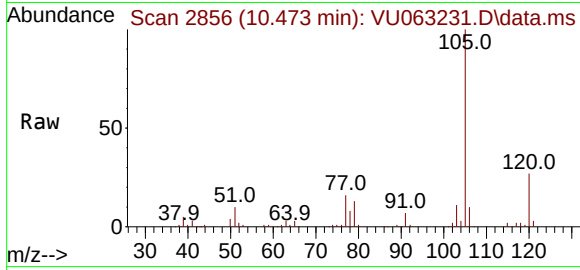
#69
Isopropylbenzene
Concen: 1.866 ug/l
RT: 10.473 min Scan# 2856
Delta R.T. -0.000 min
Lab File: VU063231.D
Acq: 11 Feb 2025 12:31

Instrument :
MSVOA_U
ClientSampleId :
VU0211WBSD01

Tgt Ion:105 Resp: 11303
Ion Ratio Lower Upper
105 100
120 25.3 12.8 38.4

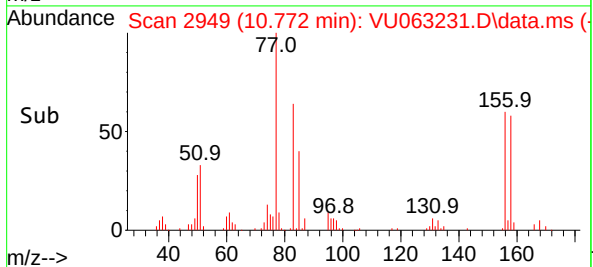
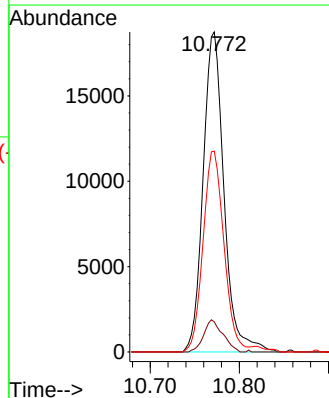
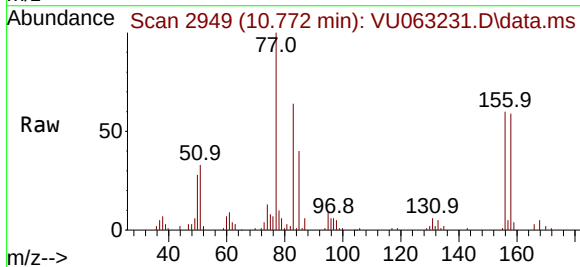
Manual Integrations
APPROVED

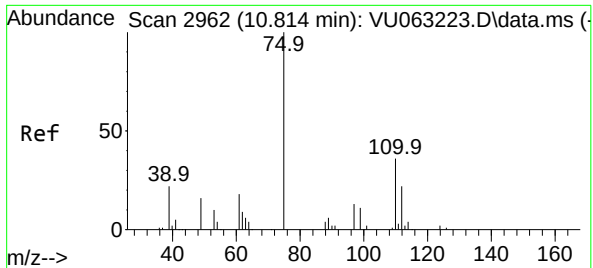
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#70
1,1,2,2-Tetrachloroethane
Concen: 1.878 ug/l
RT: 10.772 min Scan# 2949
Delta R.T. -0.000 min
Lab File: VU063231.D
Acq: 11 Feb 2025 12:31

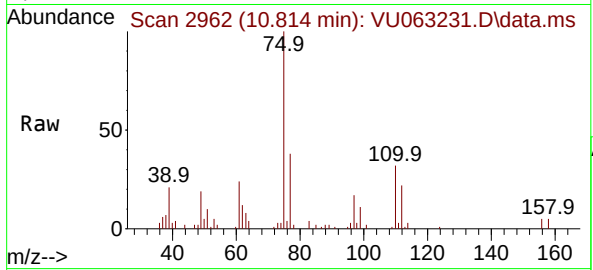
Tgt Ion: 83 Resp: 30438
Ion Ratio Lower Upper
83 100
131 9.2 7.4 11.0
85 62.8 51.8 77.8





#71
1,2,3-Trichloropropane
Concen: 1.841 ug/l m
RT: 10.814 min Scan# 2962
Delta R.T. -0.000 min
Lab File: VU063231.D
Acq: 11 Feb 2025 12:31

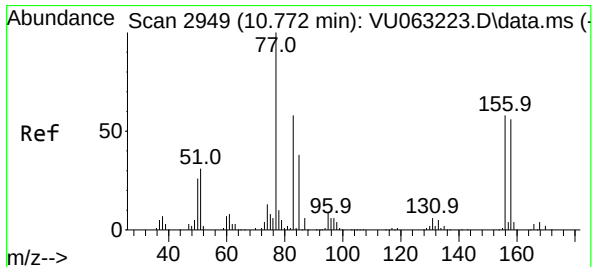
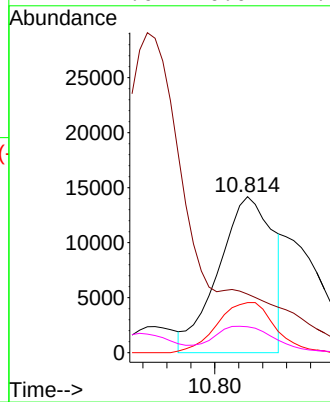
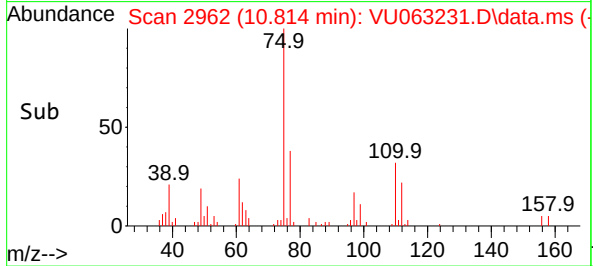
Instrument :
MSVOA_U
ClientSampleId :
VU0211WBSD01



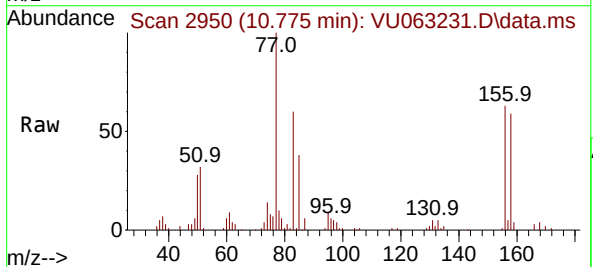
Tgt Ion: 75 Resp: 22418
Ion Ratio Lower Upper
75 100
77 0.0 0.0 0.0
110 34.0 0.0 77.0
97 19.0 0.0 42.2

Manual Integrations
APPROVED

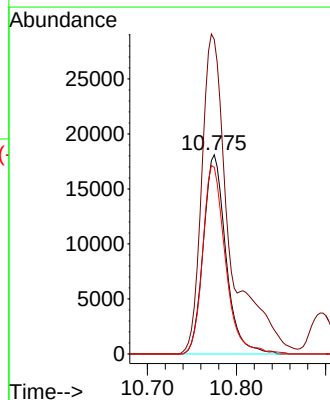
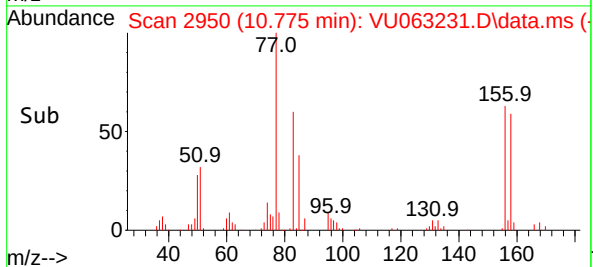
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025

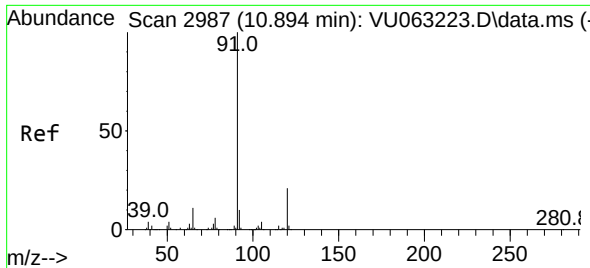


#72
Bromobenzene
Concen: 1.947 ug/l
RT: 10.775 min Scan# 2950
Delta R.T. 0.003 min
Lab File: VU063231.D
Acq: 11 Feb 2025 12:31



Tgt Ion:156 Resp: 31774
Ion Ratio Lower Upper
156 100
77 199.5 0.0 343.6
158 95.3 0.0 193.0





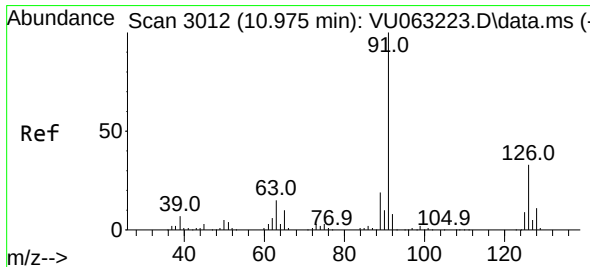
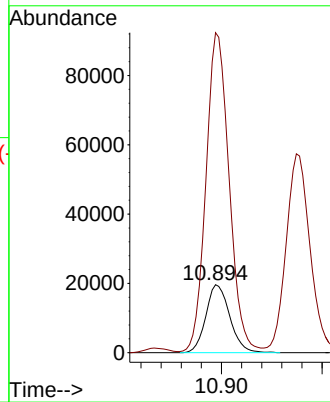
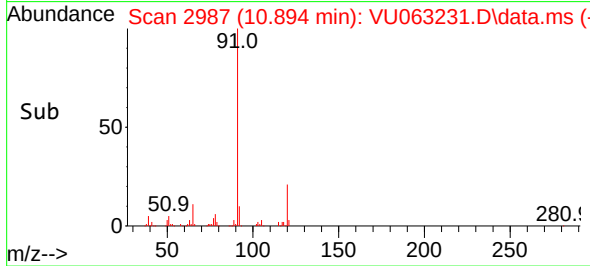
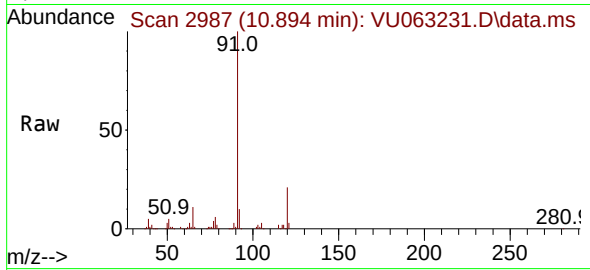
#73
n-propylbenzene
Concen: 1.867 ug/l
RT: 10.894 min Scan# 2987
Delta R.T. -0.000 min
Lab File: VU063231.D
Acq: 11 Feb 2025 12:31

Instrument :
MSVOA_U
ClientSampleId :
VU0211WBSD01

Tgt Ion:120 Resp: 32378
Ion Ratio Lower Upper
120 100
91 453.8 369.8 554.6

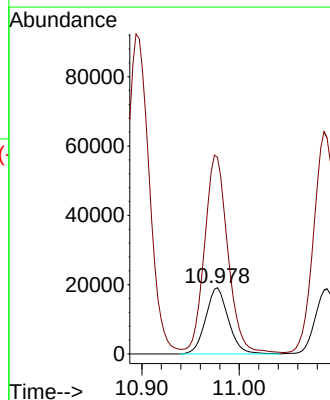
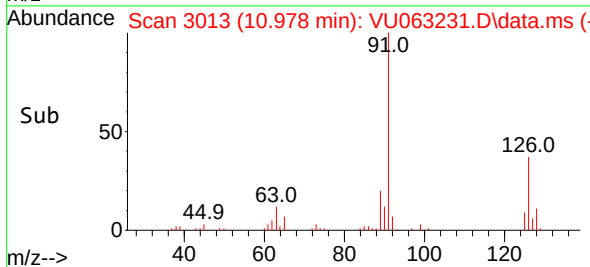
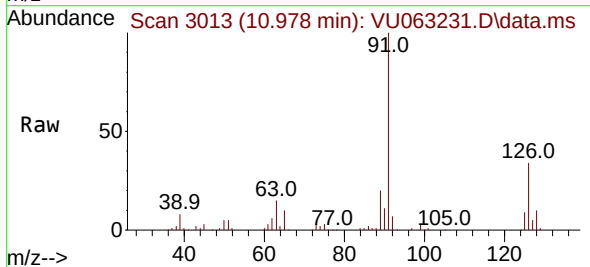
Manual Integrations
APPROVED

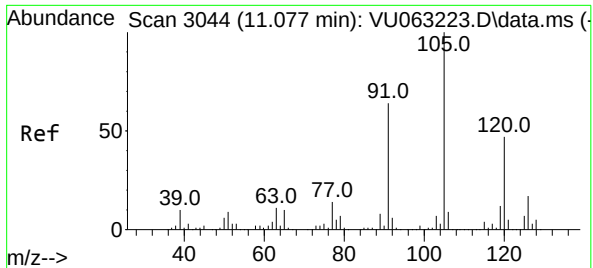
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#74
2-Chlorotoluene
Concen: 1.935 ug/l
RT: 10.978 min Scan# 3013
Delta R.T. 0.003 min
Lab File: VU063231.D
Acq: 11 Feb 2025 12:31

Tgt Ion:126 Resp: 30928
Ion Ratio Lower Upper
126 100
91 305.5 0.0 623.8





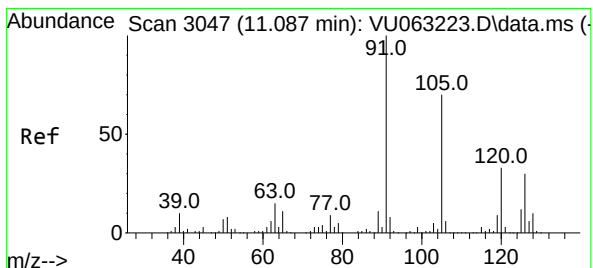
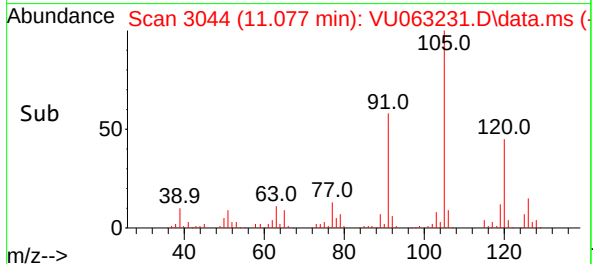
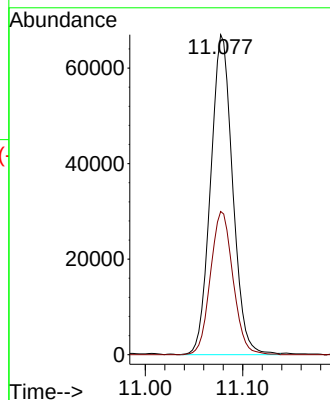
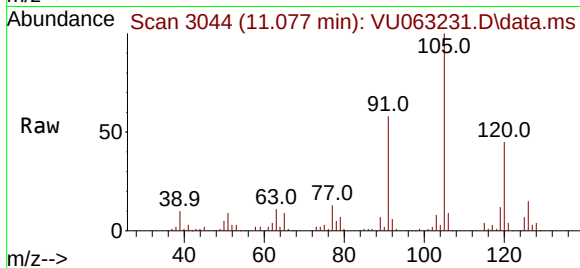
#75
1,3,5-Trimethylbenzene
Concen: 1.875 ug/l
RT: 11.077 min Scan# 3044
Delta R.T. -0.000 min
Lab File: VU063231.D
Acq: 11 Feb 2025 12:31

Instrument :
MSVOA_U
ClientSampleId :
VU0211WBSD01

Tgt Ion:105 Resp: 105240
Ion Ratio Lower Upper
105 100
120 45.8 37.3 55.9

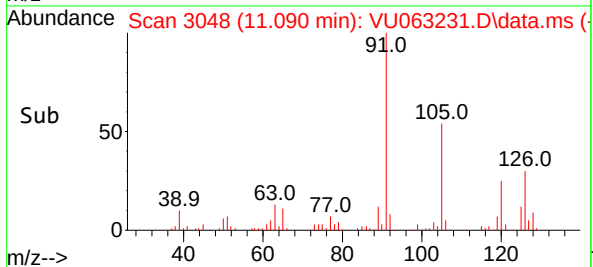
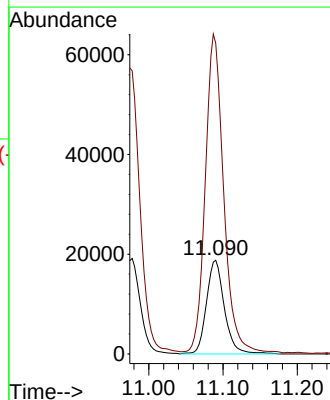
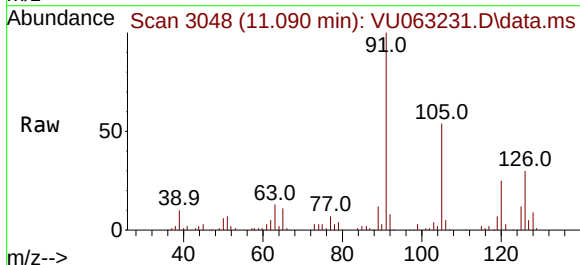
Manual Integrations
APPROVED

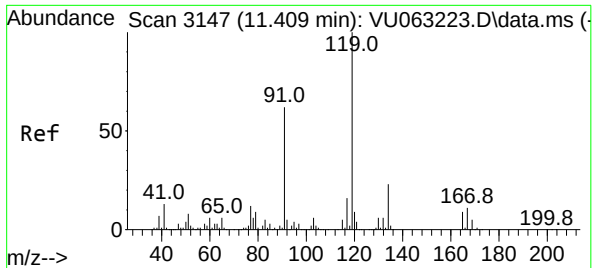
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#76
4-Chlorotoluene
Concen: 1.920 ug/l
RT: 11.090 min Scan# 3048
Delta R.T. 0.003 min
Lab File: VU063231.D
Acq: 11 Feb 2025 12:31

Tgt Ion:126 Resp: 31460
Ion Ratio Lower Upper
126 100
91 346.9 0.0 703.6





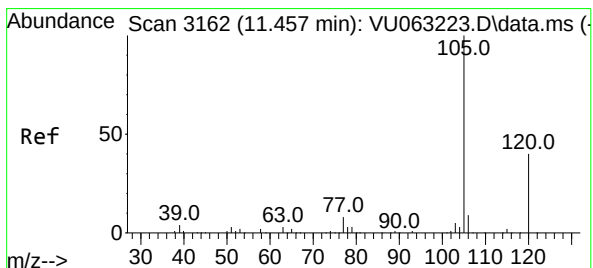
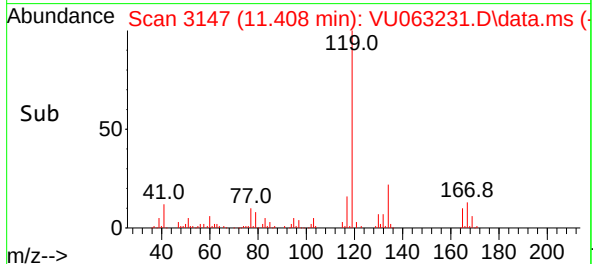
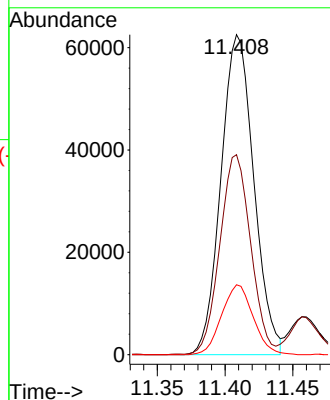
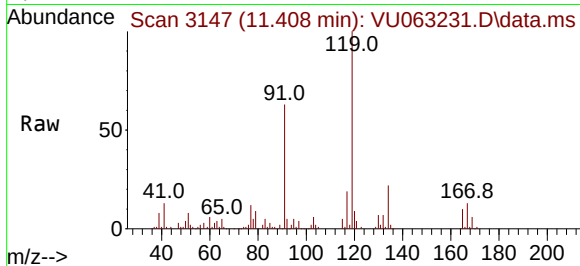
#77
tert-Butylbenzene
Concen: 1.858 ug/l
RT: 11.408 min Scan# 3147
Delta R.T. -0.000 min
Lab File: VU063231.D
Acq: 11 Feb 2025 12:31

Instrument :
MSVOA_U
ClientSampleId :
VU0211WBSD01

Tgt Ion:119 Resp: 105468
Ion Ratio Lower Upper
119 100
91 58.8 29.4 88.3
134 20.9 17.6 26.4

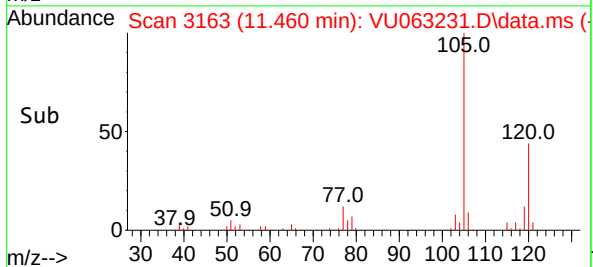
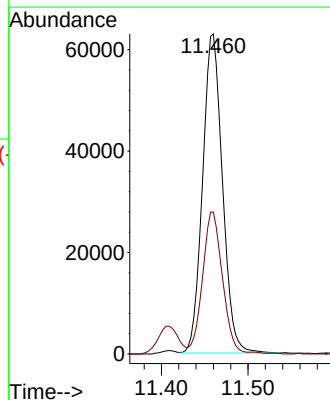
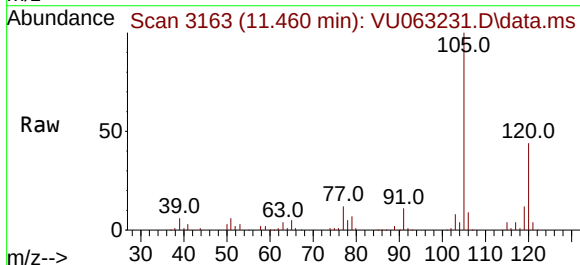
Manual Integrations
APPROVED

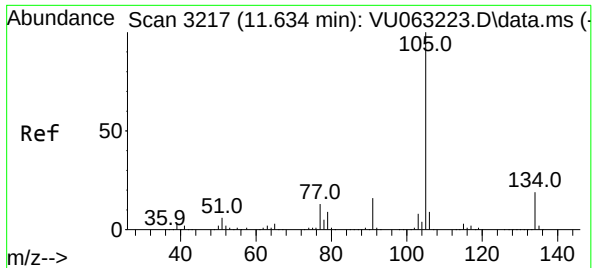
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#78
1,2,4-Trimethylbenzene
Concen: 1.801 ug/l
RT: 11.460 min Scan# 3163
Delta R.T. 0.003 min
Lab File: VU063231.D
Acq: 11 Feb 2025 12:31

Tgt Ion:105 Resp: 100273
Ion Ratio Lower Upper
105 100
120 44.2 21.9 65.7





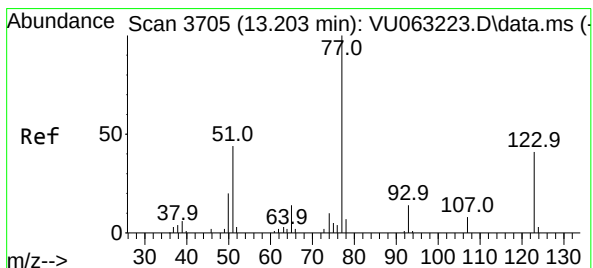
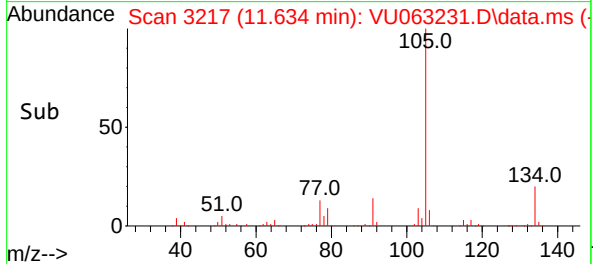
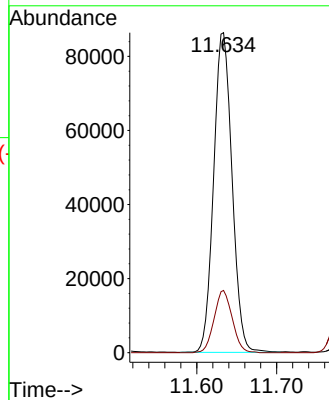
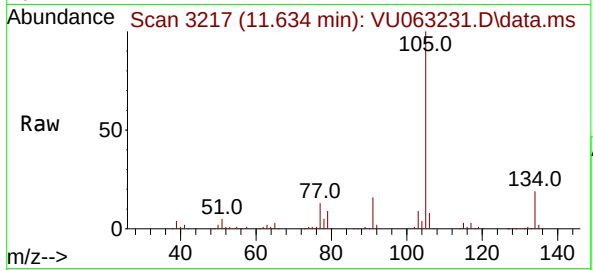
#79
sec-Butylbenzene
Concen: 1.904 ug/l
RT: 11.634 min Scan# 3170
Delta R.T. -0.000 min
Lab File: VU063231.D
Acq: 11 Feb 2025 12:31

Instrument :
MSVOA_U
ClientSampleId :
VU0211WBSD01

Tgt Ion:105 Resp: 137558
Ion Ratio Lower Upper
105 100
134 19.2 15.1 22.7

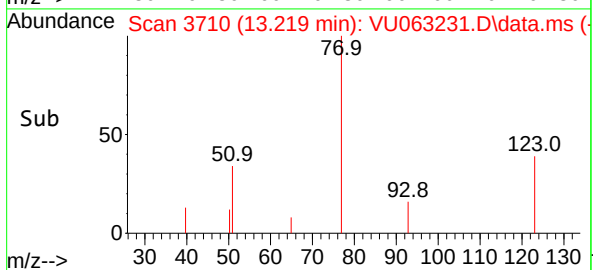
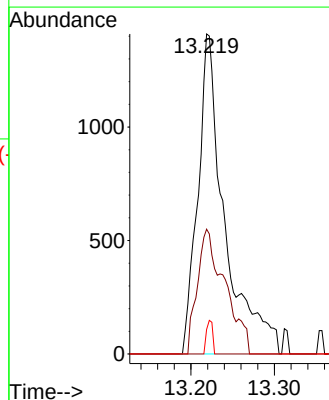
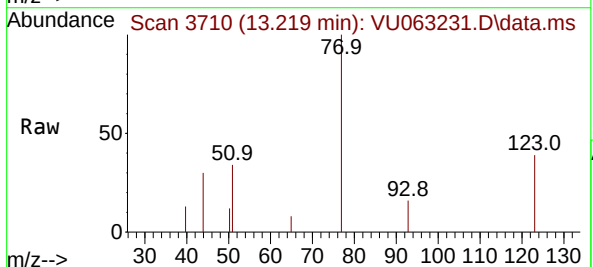
Manual Integrations
APPROVED

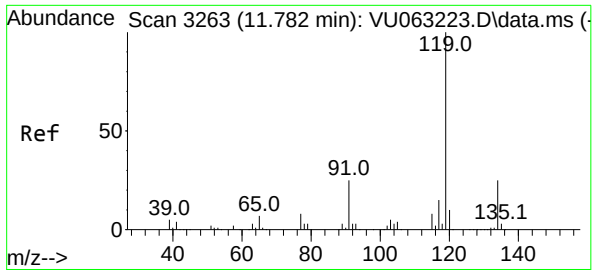
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#80
Nitrobenzene
Concen: 9.901 ug/l m
RT: 13.219 min Scan# 3710
Delta R.T. 0.016 min
Lab File: VU063231.D
Acq: 11 Feb 2025 12:31

Tgt Ion: 77 Resp: 3153
Ion Ratio Lower Upper
77 100
123 40.1 18.9 67.1
65 2.4 11.9 15.1#





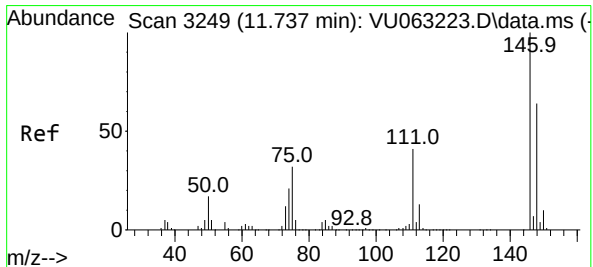
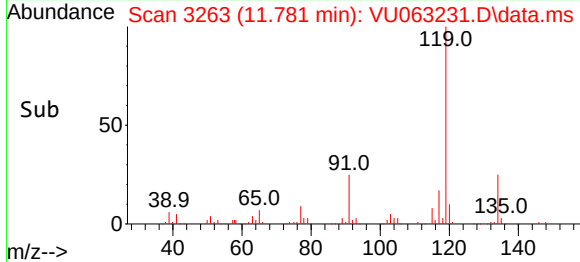
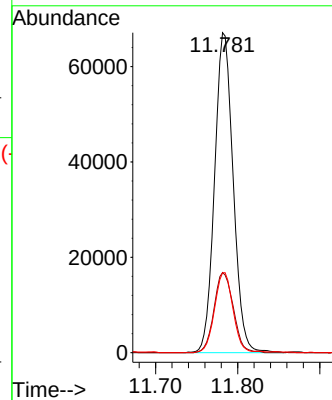
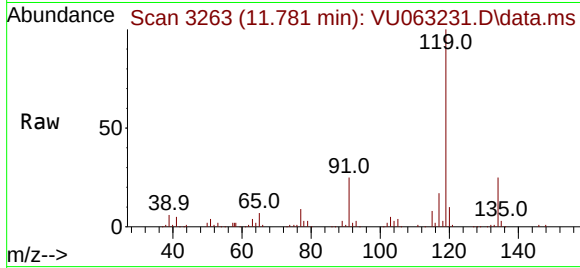
#81
p-Isopropyltoluene
Concen: 1.854 ug/l
RT: 11.781 min Scan# 3263
Delta R.T. -0.000 min
Lab File: VU063231.D
Acq: 11 Feb 2025 12:31

Instrument :
MSVOA_U
ClientSampleId :
VU0211WBSD01

Tgt Ion:119 Resp: 10570
Ion Ratio Lower Upper
119 100
134 26.0 20.3 30.5
91 24.7 19.4 29.2

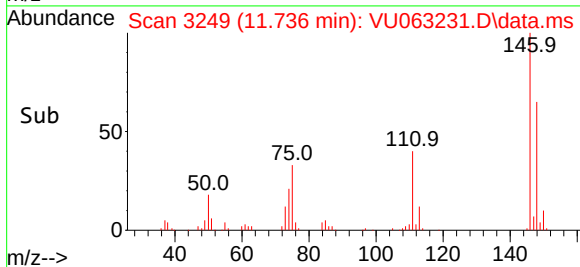
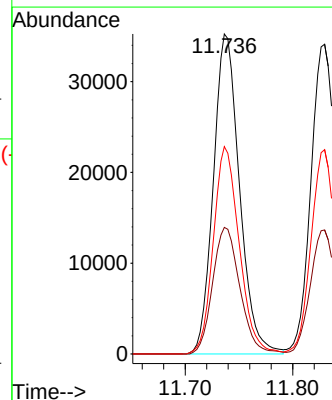
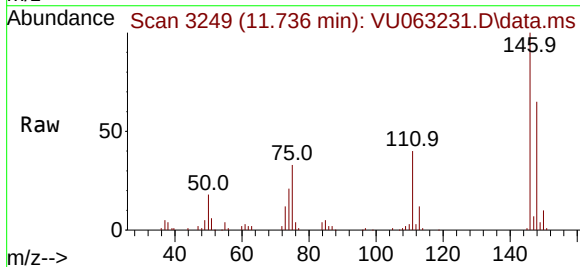
Manual Integrations
APPROVED

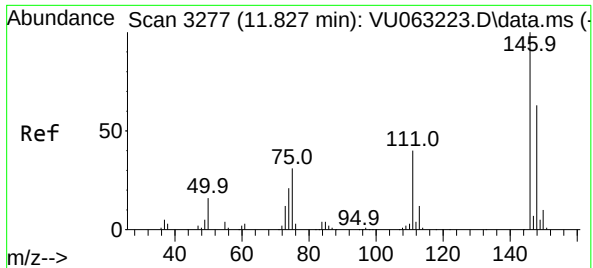
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025



#82
1,3-Dichlorobenzene
Concen: 1.882 ug/l
RT: 11.736 min Scan# 3249
Delta R.T. -0.000 min
Lab File: VU063231.D
Acq: 11 Feb 2025 12:31

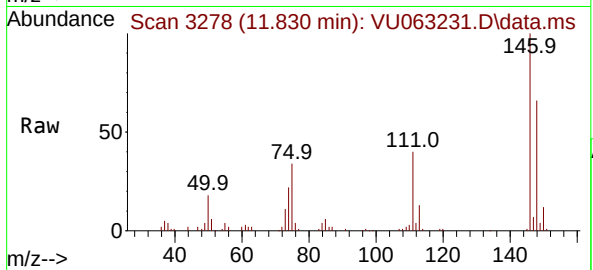
Tgt Ion:146 Resp: 59568
Ion Ratio Lower Upper
146 100
111 41.4 32.8 49.2
148 64.2 51.1 76.7





#83
1,4-Dichlorobenzene
Concen: 1.851 ug/l
RT: 11.830 min Scan# 3277
Delta R.T. 0.003 min
Lab File: VU063231.D
Acq: 11 Feb 2025 12:31

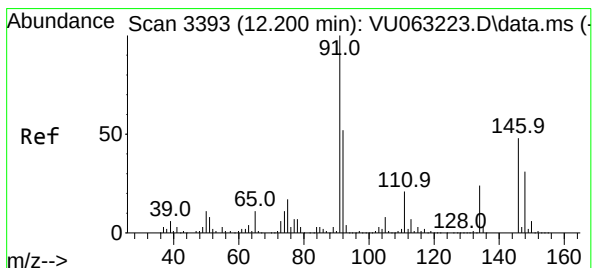
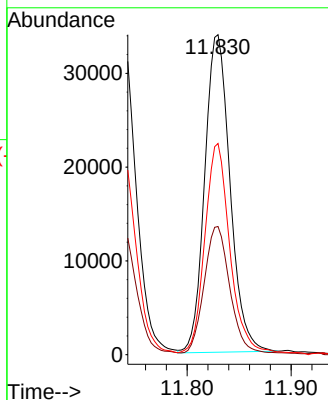
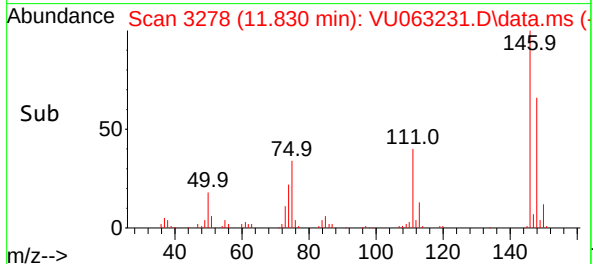
Instrument :
MSVOA_U
ClientSampleId :
VU0211WBSD01



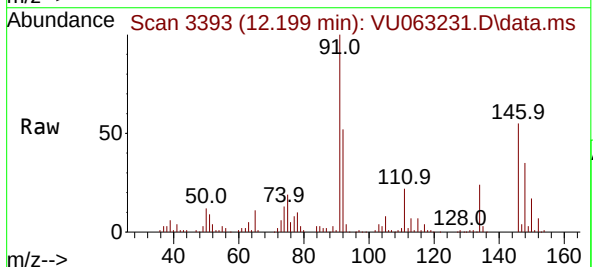
Tgt Ion:146 Resp: 57308
Ion Ratio Lower Upper
146 100
111 41.1 32.1 48.1
148 67.1 50.2 75.4

Manual Integrations
APPROVED

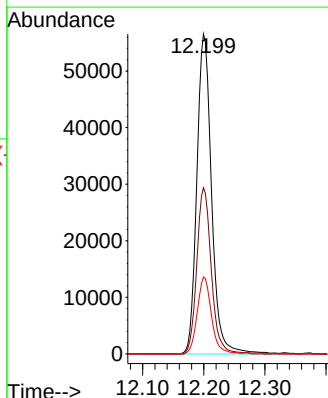
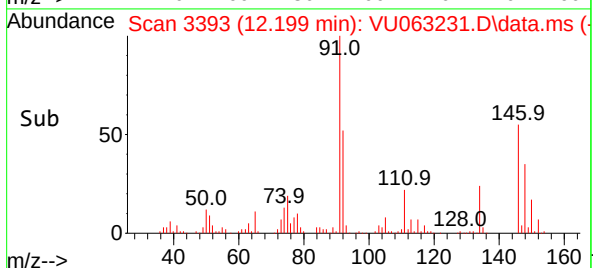
Reviewed By :Amit Patel 02/12/2025
Supervised By :Mahesh Dadoda 02/12/2025

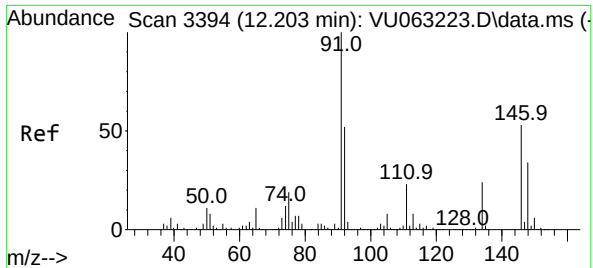


#84
n-Butylbenzene
Concen: 1.854 ug/l
RT: 12.199 min Scan# 3393
Delta R.T. -0.000 min
Lab File: VU063231.D
Acq: 11 Feb 2025 12:31



Tgt Ion: 91 Resp: 94788
Ion Ratio Lower Upper
91 100
92 51.0 41.8 62.8
134 23.1 18.6 28.0





#85

1,2-Dichlorobenzene

Concen: 1.891 ug/l

RT: 12.203 min Scan# 3394

Delta R.T. -0.000 min

Lab File: VU063231.D

Acq: 11 Feb 2025 12:31

Instrument :

MSVOA_U

ClientSampleId :

VU0211WBSD01

Tgt Ion:146 Resp: 57519

Ion Ratio Lower Upper

146 100

111 41.5 21.9 65.7

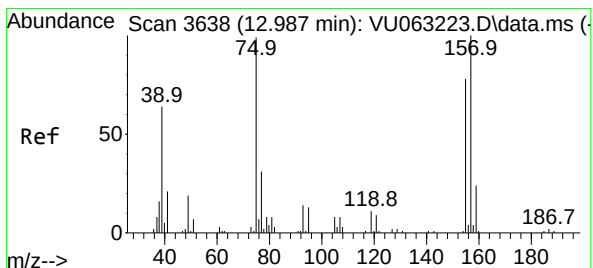
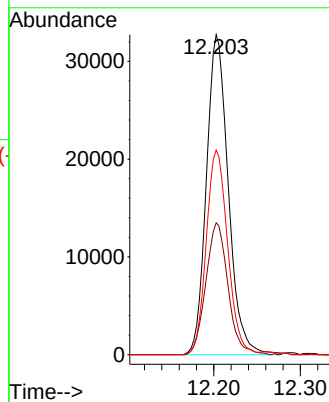
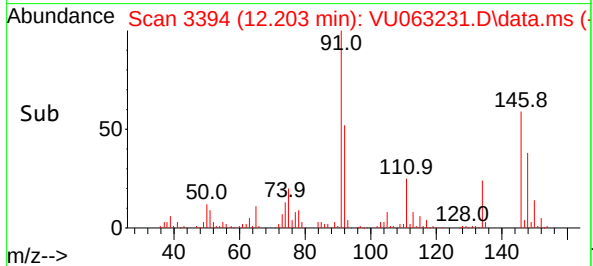
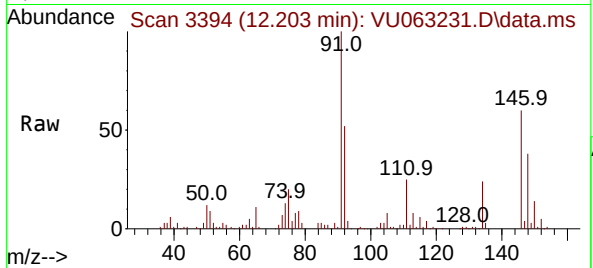
148 62.5 32.3 96.9

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#86

1,2-Dibromo-3-Chloropropane

Concen: 1.822 ug/l

RT: 12.987 min Scan# 3638

Delta R.T. -0.000 min

Lab File: VU063231.D

Acq: 11 Feb 2025 12:31

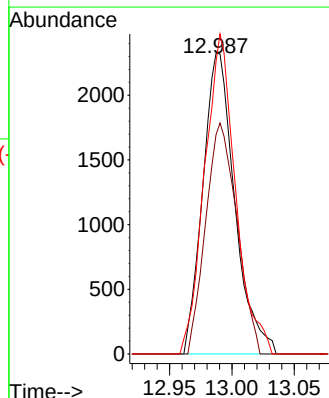
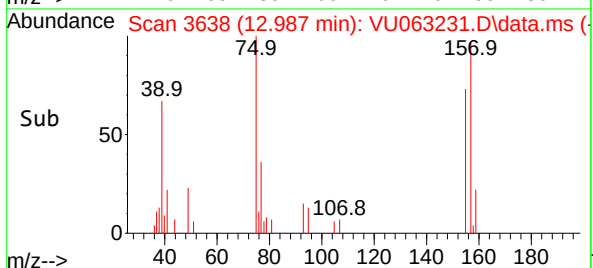
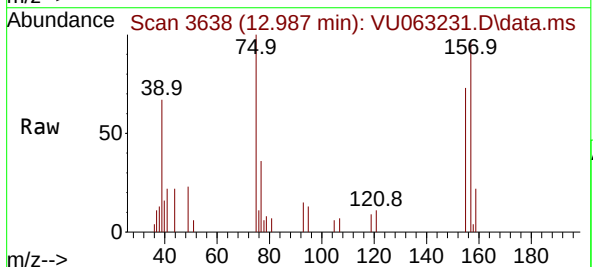
Tgt Ion: 75 Resp: 4147

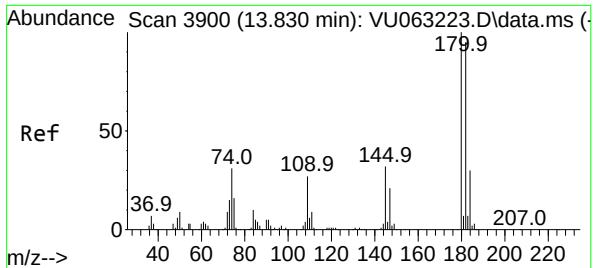
Ion Ratio Lower Upper

75 100

155 75.1 63.5 95.3

157 103.0 81.8 122.6





#87

1,2,4-Trichlorobenzene

Concen: 2.027 ug/l

RT: 13.833 min Scan# 3901

Delta R.T. 0.003 min

Lab File: VU063231.D

Acq: 11 Feb 2025 12:31

Instrument :

MSVOA_U

ClientSampleId :

VU0211WBSD01

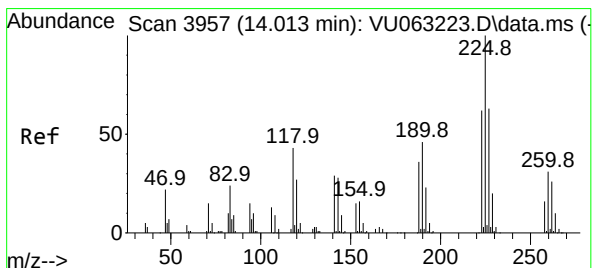
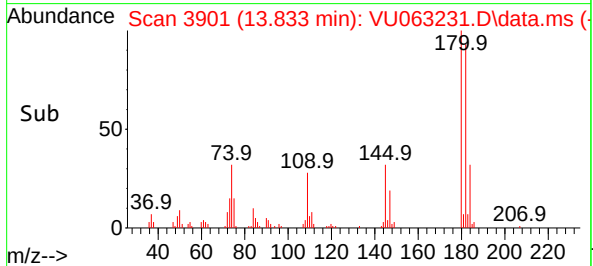
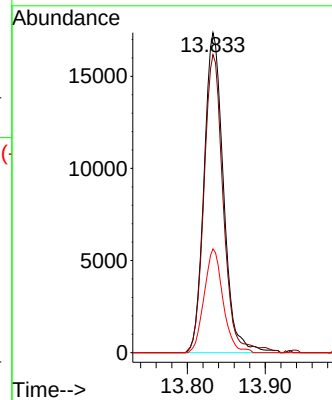
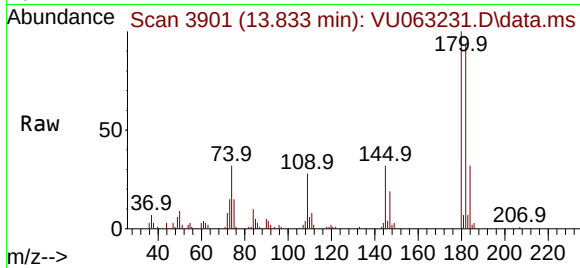
Tgt Ion:	180	Resp:	3006
Ion Ratio	Lower	Upper	
180	100		
182	91.7	76.6	115.0
145	31.5	25.4	38.2

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#88

Hexachlorobutadiene

Concen: 1.948 ug/l

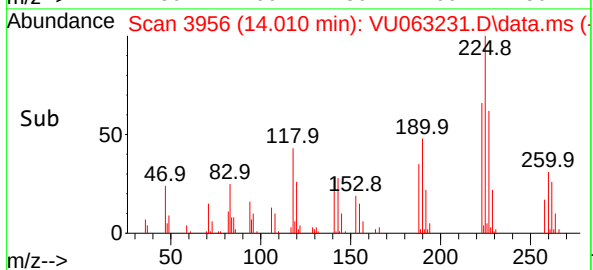
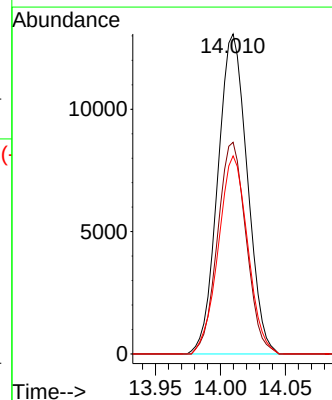
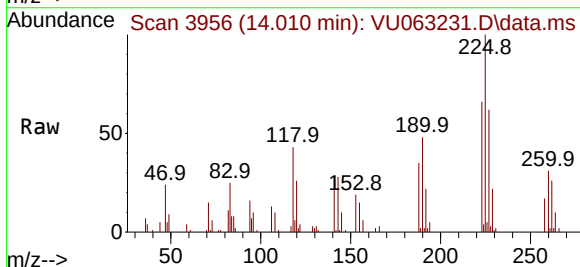
RT: 14.010 min Scan# 3956

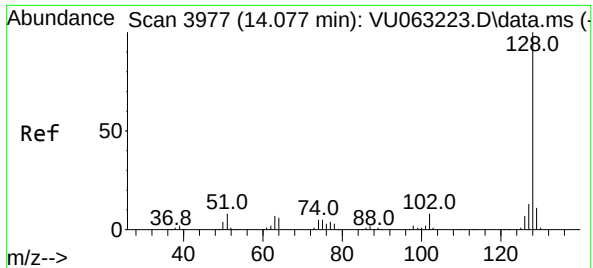
Delta R.T. -0.003 min

Lab File: VU063231.D

Acq: 11 Feb 2025 12:31

Tgt Ion:	225	Resp:	20647
Ion Ratio	Lower	Upper	
225	100		
223	64.0	49.5	74.3
227	61.5	51.0	76.4





#89

Naphthalene

Concen: 2.069 ug/l

RT: 14.084 min Scan# 3977

Delta R.T. 0.006 min

Lab File: VU063231.D

Acq: 11 Feb 2025 12:31

Instrument :

MSVOA_U

ClientSampleId :

VU0211WBSD01

Tgt Ion:128 Resp: 4681

Ion Ratio Lower Upper

128 100

127 11.7 10.6 16.0

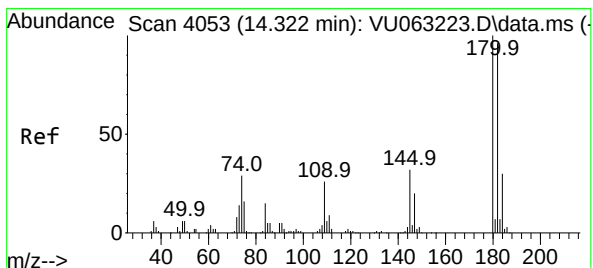
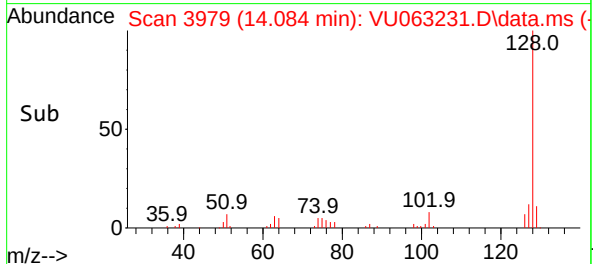
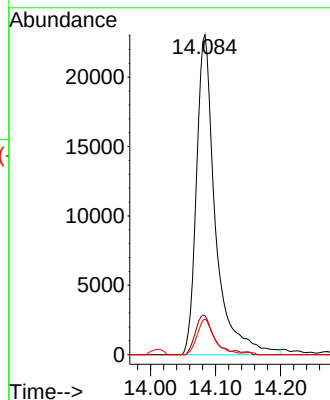
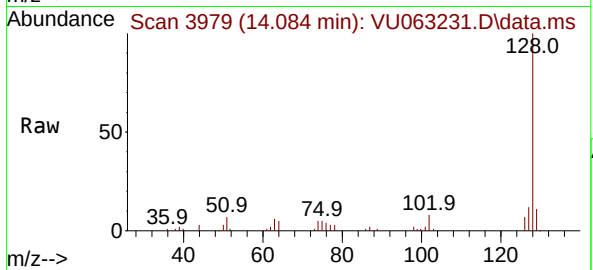
129 10.2 8.6 13.0

Manual Integrations

APPROVED

Reviewed By :Amit Patel 02/12/2025

Supervised By :Mahesh Dadoda 02/12/2025



#90

1,2,3-Trichlorobenzene

Concen: 1.952 ug/l

RT: 14.322 min Scan# 4053

Delta R.T. -0.000 min

Lab File: VU063231.D

Acq: 11 Feb 2025 12:31

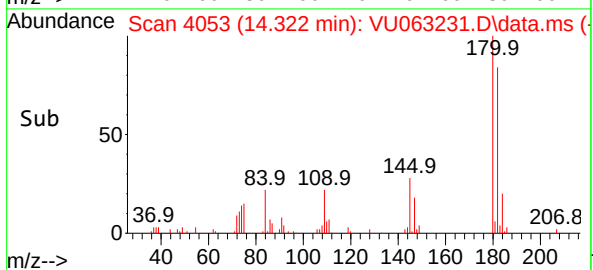
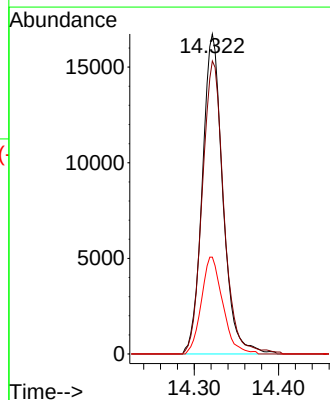
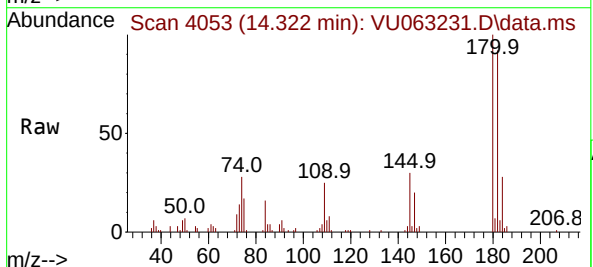
Tgt Ion:180 Resp: 28334

Ion Ratio Lower Upper

180 100

182 96.0 78.2 117.2

145 31.6 26.1 39.1



Manual Integration Report

Sequence:	VU021025	Instrument	MSVOA_u

Sample ID	File ID	Parameter	Review By	Review On	Supervised By	Supervised On	Reason
VSTDICC0.5	VU063219.D	1,2,3-Trichloropropane	Amit	2/12/2025 4:22:31 PM	MMDadoda	2/12/2025 4:22:33 PM	Peak Integrated by Software
VSTDICC0.5	VU063219.D	2-Butanone	Amit	2/12/2025 4:22:31 PM	MMDadoda	2/12/2025 4:22:33 PM	Peak Integrated by Software
VSTDICC0.5	VU063219.D	2-Hexanone	Amit	2/12/2025 4:22:31 PM	MMDadoda	2/12/2025 4:22:33 PM	Peak Integrated by Software
VSTDICC0.5	VU063219.D	Acrylonitrile	Amit	2/12/2025 4:22:31 PM	MMDadoda	2/12/2025 4:22:33 PM	Peak Integrated by Software
VSTDICC0.5	VU063219.D	Cyclohexane	Amit	2/12/2025 4:22:31 PM	MMDadoda	2/12/2025 4:22:33 PM	Peak Integrated by Software
VSTDICC0.5	VU063219.D	Methacrylonitrile	Amit	2/12/2025 4:22:31 PM	MMDadoda	2/12/2025 4:22:33 PM	Peak Integrated by Software
VSTDICC0.5	VU063219.D	Methyl acrylate	Amit	2/12/2025 4:22:31 PM	MMDadoda	2/12/2025 4:22:33 PM	Peak Integrated by Software
VSTDICC0.5	VU063219.D	Methyl methacrylate	Amit	2/12/2025 4:22:31 PM	MMDadoda	2/12/2025 4:22:33 PM	Peak Integrated by Software
VSTDICC0.5	VU063219.D	Propionitrile	Amit	2/12/2025 4:22:31 PM	MMDadoda	2/12/2025 4:22:33 PM	Peak Integrated by Software
VSTDICC0.5	VU063219.D	t-1,4-Dichloro-2-butene	Amit	2/12/2025 4:22:31 PM	MMDadoda	2/12/2025 4:22:33 PM	Peak Integrated by Software
VSTDICC001	VU063220.D	1,2,3-Trichloropropane	Amit	2/12/2025 4:22:52 PM	MMDadoda	2/12/2025 4:23:07 PM	Peak Integrated by Software
VSTDICC001	VU063220.D	2-Butanone	Amit	2/12/2025 4:22:52 PM	MMDadoda	2/12/2025 4:23:07 PM	Peak Integrated by Software
VSTDICC001	VU063220.D	2-Hexanone	Amit	2/12/2025 4:22:52 PM	MMDadoda	2/12/2025 4:23:07 PM	Peak Integrated by Software

Manual Integration Report

Sequence:	VU021025	Instrument	MSVOA_u

Sample ID	File ID	Parameter	Review By	Review On	Supervised By	Supervised On	Reason
VSTDICC001	VU063220.D	Cyclohexane	Amit	2/12/2025 4:22:52 PM	MMDadoda	2/12/2025 4:23:07 PM	Peak Integrated by Software
VSTDICC001	VU063220.D	Methyl acrylate	Amit	2/12/2025 4:22:52 PM	MMDadoda	2/12/2025 4:23:07 PM	Peak Integrated by Software
VSTDICC001	VU063220.D	Propionitrile	Amit	2/12/2025 4:22:52 PM	MMDadoda	2/12/2025 4:23:07 PM	Peak Integrated by Software
VSTDICC001	VU063220.D	t-1,4-Dichloro-2-butene	Amit	2/12/2025 4:22:52 PM	MMDadoda	2/12/2025 4:23:07 PM	Peak Integrated by Software
VSTDICC002	VU063221.D	1,2,3-Trichloropropane	Amit	2/12/2025 4:23:13 PM	MMDadoda	2/12/2025 4:23:18 PM	Peak Integrated by Software
VSTDICC002	VU063221.D	Cyclohexane	Amit	2/12/2025 4:23:13 PM	MMDadoda	2/12/2025 4:23:18 PM	Peak Integrated by Software
VSTDICC002	VU063221.D	Methyl acrylate	Amit	2/12/2025 4:23:13 PM	MMDadoda	2/12/2025 4:23:18 PM	Peak Integrated by Software
VSTDICC002	VU063221.D	Nitrobenzene	Amit	2/12/2025 4:23:13 PM	MMDadoda	2/12/2025 4:23:18 PM	Peak Integrated by Software
VSTDICC002	VU063221.D	t-1,4-Dichloro-2-butene	Amit	2/12/2025 4:23:13 PM	MMDadoda	2/12/2025 4:23:18 PM	Peak Integrated by Software
VSTDICC005	VU063222.D	1,2,3-Trichloropropane	Amit	2/12/2025 4:23:29 PM	MMDadoda	2/12/2025 4:23:42 PM	Peak Integrated by Software
VSTDICC005	VU063222.D	Cyclohexane	Amit	2/12/2025 4:23:29 PM	MMDadoda	2/12/2025 4:23:42 PM	Peak Integrated by Software
VSTDICC005	VU063222.D	Methyl acrylate	Amit	2/12/2025 4:23:29 PM	MMDadoda	2/12/2025 4:23:42 PM	Peak Integrated by Software
VSTDICC005	VU063222.D	Nitrobenzene	Amit	2/12/2025 4:23:29 PM	MMDadoda	2/12/2025 4:23:42 PM	Peak Integrated by Software

Manual Integration Report

Sequence:	VU021025	Instrument	MSVOA_u

Sample ID	File ID	Parameter	Review By	Review On	Supervised By	Supervised On	Reason
VSTDICC005	VU063222.D	t-1,4-Dichloro-2-butene	Amit	2/12/2025 4:23:29 PM	MMDadoda	2/12/2025 4:23:42 PM	Peak Integrated by Software
VSTDICCC010	VU063223.D	1,2,3-Trichloropropane	Amit	2/12/2025 4:23:38 PM	MMDadoda	2/12/2025 4:23:53 PM	Peak Integrated by Software
VSTDICCC010	VU063223.D	Cyclohexane	Amit	2/12/2025 4:23:38 PM	MMDadoda	2/12/2025 4:23:53 PM	Peak Integrated by Software
VSTDICCC010	VU063223.D	t-1,4-Dichloro-2-butene	Amit	2/12/2025 4:23:38 PM	MMDadoda	2/12/2025 4:23:53 PM	Peak Integrated by Software
VSTDICC015	VU063224.D	1,2,3-Trichloropropane	Amit	2/12/2025 4:23:42 PM	MMDadoda	2/12/2025 4:23:57 PM	Peak Integrated by Software
VSTDICC015	VU063224.D	Cyclohexane	Amit	2/12/2025 4:23:42 PM	MMDadoda	2/12/2025 4:23:57 PM	Peak Integrated by Software
VSTDICC015	VU063224.D	t-1,4-Dichloro-2-butene	Amit	2/12/2025 4:23:42 PM	MMDadoda	2/12/2025 4:23:57 PM	Peak Integrated by Software
VSTDICV010	VU063225.D	1,2,3-Trichloropropane	Amit	2/12/2025 4:23:46 PM	MMDadoda	2/12/2025 4:24:01 PM	Peak Integrated by Software
VSTDICV010	VU063225.D	Cyclohexane	Amit	2/12/2025 4:23:46 PM	MMDadoda	2/12/2025 4:24:01 PM	Peak Integrated by Software
VSTDICV010	VU063225.D	t-1,4-Dichloro-2-butene	Amit	2/12/2025 4:23:46 PM	MMDadoda	2/12/2025 4:24:01 PM	Peak Integrated by Software

Manual Integration Report

Sequence:	VU021125	Instrument	MSVOA_u

Sample ID	File ID	Parameter	Review By	Review On	Supervised By	Supervised On	Reason
VSTDICV010	VU063227.D	1,2,3-Trichloropropane	Amit	2/12/2025 4:25:04 PM	MMDadoda	2/12/2025 4:25:51 PM	Peak Integrated by Software
VSTDICV010	VU063227.D	Cyclohexane	Amit	2/12/2025 4:25:04 PM	MMDadoda	2/12/2025 4:25:51 PM	Peak Integrated by Software
VSTDICV010	VU063227.D	Nitrobenzene	Amit	2/12/2025 4:25:04 PM	MMDadoda	2/12/2025 4:25:51 PM	Peak Integrated by Software
VSTDICV010	VU063227.D	t-1,4-Dichloro-2-butene	Amit	2/12/2025 4:25:04 PM	MMDadoda	2/12/2025 4:25:51 PM	Peak Integrated by Software
VSTDCCC010	VU063228.D	1,2,3-Trichloropropane	Amit	2/12/2025 4:25:10 PM	MMDadoda	2/12/2025 4:25:54 PM	Peak Integrated by Software
VSTDCCC010	VU063228.D	Cyclohexane	Amit	2/12/2025 4:25:10 PM	MMDadoda	2/12/2025 4:25:54 PM	Peak Integrated by Software
VSTDCCC010	VU063228.D	Nitrobenzene	Amit	2/12/2025 4:25:10 PM	MMDadoda	2/12/2025 4:25:54 PM	Peak Integrated by Software
VSTDCCC010	VU063228.D	t-1,4-Dichloro-2-butene	Amit	2/12/2025 4:25:10 PM	MMDadoda	2/12/2025 4:25:54 PM	Peak Integrated by Software
VU0211WBS01	VU063230.D	1,2,3-Trichloropropane	Amit	2/12/2025 4:25:16 PM	MMDadoda	2/12/2025 4:25:57 PM	Peak Integrated by Software
VU0211WBS01	VU063230.D	Cyclohexane	Amit	2/12/2025 4:25:16 PM	MMDadoda	2/12/2025 4:25:57 PM	Peak Integrated by Software
VU0211WBS01	VU063230.D	Methyl acrylate	Amit	2/12/2025 4:25:16 PM	MMDadoda	2/12/2025 4:25:57 PM	Peak Integrated by Software
VU0211WBS01	VU063230.D	Nitrobenzene	Amit	2/12/2025 4:25:16 PM	MMDadoda	2/12/2025 4:25:57 PM	Peak Integrated by Software
VU0211WBS01	VU063230.D	t-1,4-Dichloro-2-butene	Amit	2/12/2025 4:25:16 PM	MMDadoda	2/12/2025 4:25:57 PM	Peak Integrated by Software

Manual Integration Report

Sequence:	VU021125	Instrument	MSVOA_u

Sample ID	File ID	Parameter	Review By	Review On	Supervised By	Supervised On	Reason
VU0211WBS01	VU063230.D	tert-Butyl Alcohol	Amit	2/12/2025 4:25:16 PM	MMDadoda	2/12/2025 4:25:57 PM	Peak Integrated by Software
VU0211WBSD01	VU063231.D	1,2,3-Trichloropropane	Amit	2/12/2025 4:25:22 PM	MMDadoda	2/12/2025 4:26:00 PM	Peak Integrated by Software
VU0211WBSD01	VU063231.D	Cyclohexane	Amit	2/12/2025 4:25:22 PM	MMDadoda	2/12/2025 4:26:00 PM	Peak Integrated by Software
VU0211WBSD01	VU063231.D	Methyl acrylate	Amit	2/12/2025 4:25:22 PM	MMDadoda	2/12/2025 4:26:00 PM	Peak Integrated by Software
VU0211WBSD01	VU063231.D	Nitrobenzene	Amit	2/12/2025 4:25:22 PM	MMDadoda	2/12/2025 4:26:00 PM	Peak Integrated by Software
VU0211WBSD01	VU063231.D	t-1,4-Dichloro-2-butene	Amit	2/12/2025 4:25:22 PM	MMDadoda	2/12/2025 4:26:00 PM	Peak Integrated by Software
VSTDCCC010	VU063247.D	1,2,3-Trichloropropane	Amit	2/12/2025 4:26:03 PM	MMDadoda	2/12/2025 4:26:35 PM	Peak Integrated by Software
VSTDCCC010	VU063247.D	Cyclohexane	Amit	2/12/2025 4:26:03 PM	MMDadoda	2/12/2025 4:26:35 PM	Peak Integrated by Software
VSTDCCC010	VU063247.D	t-1,4-Dichloro-2-butene	Amit	2/12/2025 4:26:03 PM	MMDadoda	2/12/2025 4:26:35 PM	Peak Integrated by Software

Instrument ID: **MSVOA_U**

Daily Analysis Runlog For Sequence/QC Batch ID # VU021025

Review By	Mahesh Dadoda	Review On	2/13/2025 12:08:39 PM		
Supervise By	Semsettin Yesilyurt	Supervise On	2/13/2025 12:10:26 PM		
SubDirectory	VU021025	HP Acquire Method	MSVOA_U	HP Processing Method	524u021025dw.m
STD. NAME		STD REF.#			
Tune/Reschk		VP132982			
Initial Calibration Stds		VP132975,VP132976,VP132977,VP132978,VP132979,VP132980			
CCC					
Internal Standard/PEM		VP132884			
ICV/I.BLK		VP132981			
Surrogate Standard					
MS/MSD Standard					
LCS Standard					

Sr#	SampleId	Data File Name	Date-Time	Operator	Status
1	BFB	VU063218.D	10 Feb 2025 09:06	MD/SY	Ok
2	VSTDICC0.5	VU063219.D	10 Feb 2025 12:59	MD/SY	Ok,M
3	VSTDICC001	VU063220.D	10 Feb 2025 13:23	MD/SY	Ok,M
4	VSTDICC002	VU063221.D	10 Feb 2025 13:58	MD/SY	Ok,M
5	VSTDICC005	VU063222.D	10 Feb 2025 14:23	MD/SY	Ok,M
6	VSTDICCC010	VU063223.D	10 Feb 2025 15:06	MD/SY	Ok,M
7	VSTDICC015	VU063224.D	10 Feb 2025 15:33	MD/SY	Ok,M
8	VSTDICV010	VU063225.D	10 Feb 2025 16:45	MD/SY	ReRun

M : Manual Integration

Instrument ID: MSVOA_U

Daily Analysis Runlog For Sequence/QC Batch ID # VU021125

Review By	Amit Patel	Review On	2/12/2025 4:24:48 PM		
Supervise By	Maresh Dadoda	Supervise On	2/12/2025 4:26:45 PM		
SubDirectory	VU021125	HP Acquire Method	MSVOA_U	HP Processing Method	524u021025dw.m
STD. NAME		STD REF.#			
Tune/Reschk Initial Calibration Stds		VP132989			
CCC		VP132991,VP132992,LOD VP132993,VP132994,VP132995,LOQ VP132996,VP132997			
Internal Standard/PEM		VP132884			
ICV/I.BLK		VP132990			
Surrogate Standard					
MS/MSD Standard					
LCS Standard					

Sr#	SampleId	Data File Name	Date-Time	Operator	Status
1	BFB	VU063226.D	11 Feb 2025 08:11	MD/SY	Ok
2	VSTDICV010	VU063227.D	11 Feb 2025 08:50	MD/SY	Ok,M
3	VSTDCCC010	VU063228.D	11 Feb 2025 10:01	MD/SY	Ok,M
4	VU0211WBL01	VU063229.D	11 Feb 2025 11:14	MD/SY	Ok
5	VU0211WBS01	VU063230.D	11 Feb 2025 12:07	MD/SY	Ok,M
6	VU0211WBSD01	VU063231.D	11 Feb 2025 12:31	MD/SY	Ok,M
7	Q1172-11	VU063232.D	11 Feb 2025 13:02	MD/SY	Ok
8	Q1172-09	VU063233.D	11 Feb 2025 13:28	MD/SY	Dilution
9	Q1172-09DL	VU063234.D	11 Feb 2025 13:55	MD/SY	Ok
10	Q1172-10	VU063235.D	11 Feb 2025 14:20	MD/SY	Not Ok
11	Q1172-10DL	VU063236.D	11 Feb 2025 15:21	MD/SY	Not Ok
12	Q1172-07	VU063237.D	11 Feb 2025 15:45	MD/SY	Dilution
13	Q1172-07DL	VU063238.D	11 Feb 2025 16:11	MD/SY	Ok
14	Q1172-08	VU063239.D	11 Feb 2025 16:36	MD/SY	Dilution
15	Q1172-08DL	VU063240.D	11 Feb 2025 17:01	MD/SY	Not Ok
16	VIBLK	VU063241.D	11 Feb 2025 17:26	MD/SY	Ok
17	Q1168-07	VU063242.D	11 Feb 2025 17:50	MD/SY	Ok,M
18	Q1168-07	VU063243.D	11 Feb 2025 18:15	MD/SY	Ok,M
19	Q1168-07	VU063244.D	11 Feb 2025 18:40	MD/SY	Ok,M
20	Q1168-08	VU063245.D	11 Feb 2025 19:04	MD/SY	Ok,M
21	Q1168-08	VU063246.D	11 Feb 2025 19:29	MD/SY	Ok,M

Instrument ID: MSVOA_U

Daily Analysis Runlog For Sequence/QC Batch ID # VU021125

Review By	Amit Patel	Review On	2/12/2025 4:24:48 PM		
Supervise By	Mahesh Dadoda	Supervise On	2/12/2025 4:26:45 PM		
SubDirectory	VU021125	HP Acquire Method	MSVOA_U	HP Processing Method	524u021025dw.m
STD. NAME	STD REF.#				
Tune/Reschk Initial Calibration Stds	VP132989				
CCC	VP132991,VP132992,LOD VP132993,VP132994,VP132995,LOQ VP132996,VP132997				
Internal Standard/PEM	VP132884				
ICV/I.BLK	VP132990				
Surrogate Standard					
MS/MSD Standard					
LCS Standard					

22	VSTDCCC010	VU063247.D	11 Feb 2025 19:54	MD/SY	Ok,M

M : Manual Integration

Instrument ID: MSVOA_U

Daily Analysis Runlog For Sequence/QC Batch ID # VU021025

Review By	Maresh Dadoda	Review On	2/13/2025 12:08:39 PM
Supervise By	Semsettin Yesilyurt	Supervise On	2/13/2025 12:10:26 PM
SubDirectory	VU021025	HP Acquire Method	MSVOA_U
		HP Processing Method	524u021025dw.m

STD. NAME	STD REF.#
Tune/Reschk	VP132982
Initial Calibration Stds	VP132975,VP132976,VP132977,VP132978,VP132979,VP132980
CCC	
Internal Standard/PEM	VP132884
ICV/I.BLK	VP132981
Surrogate Standard	
MS/MSD Standard	
LCS Standard	

Sr#	SampleID	ClientID	Data File Name	Date-Time	Comment	Operator	Status
1	BFB	BFB	VU063218.D	10 Feb 2025 09:06		MD/SY	Ok
2	VSTDICC0.5	VSTDICC0.5	VU063219.D	10 Feb 2025 12:59		MD/SY	Ok,M
3	VSTDICC001	VSTDICC001	VU063220.D	10 Feb 2025 13:23	524.2	MD/SY	Ok,M
4	VSTDICC002	VSTDICC002	VU063221.D	10 Feb 2025 13:58	Drinking water method	MD/SY	Ok,M
5	VSTDICC005	VSTDICC005	VU063222.D	10 Feb 2025 14:23		MD/SY	Ok,M
6	VSTDICCC010	VSTDICCC010	VU063223.D	10 Feb 2025 15:06		MD/SY	Ok,M
7	VSTDICC015	VSTDICC015	VU063224.D	10 Feb 2025 15:33		MD/SY	Ok,M
8	VSTDICV010	ICVVU021025	VU063225.D	10 Feb 2025 16:45	Fail ,rerun	MD/SY	ReRun

M : Manual Integration

Instrument ID: MSVOA_U

Daily Analysis Runlog For Sequence/QC Batch ID # VU021125

Review By	Amit Patel	Review On	2/12/2025 4:24:48 PM
Supervise By	Mahesh Dadoda	Supervise On	2/12/2025 4:26:45 PM
SubDirectory	VU021125	HP Acquire Method	MSVOA_U
		HP Processing Method	524u021025dw.m

STD. NAME	STD REF.#
Tune/Reschk Initial Calibration Stds	VP132989
CCC	VP132991,VP132992,LOD VP132993,VP132994,VP132995,LOQ VP132996,VP132997
Internal Standard/PEM	VP132884
ICV/I.BLK	VP132990
Surrogate Standard	
MS/MSD Standard	
LCS Standard	

Sr#	SampleID	ClientID	Data File Name	Date-Time	Comment	Operator	Status
1	BFB	BFB	VU063226.D	11 Feb 2025 08:11		MD/SY	Ok
2	VSTDICV010	ICVVU021025	VU063227.D	11 Feb 2025 08:50		MD/SY	Ok,M
3	VSTDCCC010	VSTDCCC010	VU063228.D	11 Feb 2025 10:01		MD/SY	Ok,M
4	VU0211WBL01	VU0211WBL01	VU063229.D	11 Feb 2025 11:14		MD/SY	Ok
5	VU0211WBS01	VU0211WBS01	VU063230.D	11 Feb 2025 12:07	TBA-low recovery	MD/SY	Ok,M
6	VU0211WBSD01	VU0211WBSD01	VU063231.D	11 Feb 2025 12:31	TBA-low recovery	MD/SY	Ok,M
7	Q1172-11	PT-EDBCP-WS	VU063232.D	11 Feb 2025 13:02	PT-EDBCP	MD/SY	Ok
8	Q1172-09	PT-THM-WS	VU063233.D	11 Feb 2025 13:28	PT-THM, Need 5X	MD/SY	Dilution
9	Q1172-09DL	PT-THM-WSDL	VU063234.D	11 Feb 2025 13:55		MD/SY	Ok
10	Q1172-10	PT-ADD-WS	VU063235.D	11 Feb 2025 14:20	rerun,TBA low	MD/SY	Not Ok
11	Q1172-10DL	PT-ADD-WSDL	VU063236.D	11 Feb 2025 15:21	rerun,TBA low	MD/SY	Not Ok
12	Q1172-07	PT-RVOA-WS	VU063237.D	11 Feb 2025 15:45	PT-RVOA ,Need 5X	MD/SY	Dilution
13	Q1172-07DL	PT-RVOA-WSDL	VU063238.D	11 Feb 2025 16:11		MD/SY	Ok
14	Q1172-08	PT-UNRVOA-WS	VU063239.D	11 Feb 2025 16:36	PT-URVOA,Need 5x	MD/SY	Dilution
15	Q1172-08DL	PT-UNRVOA-WSDL	VU063240.D	11 Feb 2025 17:01	prep error, rerun	MD/SY	Not Ok
16	VIBLK	VIBLK	VU063241.D	11 Feb 2025 17:26		MD/SY	Ok
17	Q1168-07	LOD-MDL-WATER-01-	VU063242.D	11 Feb 2025 17:50	lod-0.25 ppb	MD/SY	Ok,M
18	Q1168-07	LOD-MDL-WATER-01-	VU063243.D	11 Feb 2025 18:15	lod-0.4 ppb	MD/SY	Ok,M

Instrument ID: MSVOA_U

Daily Analysis Runlog For Sequence/QC Batch ID # VU021125

Review By	Amit Patel	Review On	2/12/2025 4:24:48 PM		
Supervise By	Mahesh Dadoda	Supervise On	2/12/2025 4:26:45 PM		
SubDirectory	VU021125	HP Acquire Method	MSVOA_U	HP Processing Method	524u021025dw.m
STD. NAME	STD REF.#				
Tune/Reschk Initial Calibration Stds	VP132989				
CCC	VP132991,VP132992,LOD VP132993,VP132994,VP132995,LOQ VP132996,VP132997				
Internal Standard/PEM	VP132884				
ICV/I.BLK	VP132990				
Surrogate Standard					
MS/MSD Standard					
LCS Standard					

19	Q1168-07	LOD-MDL-WATER-01-0	VU063244.D	11 Feb 2025 18:40	lod-0.8 ppb	MD/SY	Ok,M
20	Q1168-08	LOQ-WATER-02-QT1-2	VU063245.D	11 Feb 2025 19:04	RL-check-0.5ppb	MD/SY	Ok,M
21	Q1168-08	LOQ-WATER-02-QT1-2	VU063246.D	11 Feb 2025 19:29	RL-check-1.0ppb	MD/SY	Ok,M
22	VSTDCCC010	VSTDCCC010EC	VU063247.D	11 Feb 2025 19:54		MD/SY	Ok,M

M : Manual Integration

Prep Standard - Chemical Standard Summary

Order ID : Q1172

Test : VOCMS Group4

Prepbatch ID :

Sequence ID/Qc Batch ID: VU021125,

Standard ID :

VP131767,VP132098,VP132613,VP132614,VP132883,VP132884,VP132989,VP132990,VP132991,VP132992,VP132994,VP132995,VP132997,

Chemical ID :

LOD VP132993,LOQ

VP132996,V13391,V13446,V13466,V13879,V14134,V14154,V14175,V14176,V14419,V14433,V14439,V14521,V14522,V14614,V14624,V14722,V14723,V14724,V14754,V14756,V14801,V14814,V14837,W3112,

VOC STANDARD PREPARATION LOG

<u>Recipe ID</u>	<u>NAME</u>	<u>NO.</u>	<u>Prep Date</u>	<u>Expiration Date</u>	<u>Prepared By</u>	<u>ScaleID</u>	<u>PipetteID</u>	<u>Supervised By</u>
218	BFB, 25PPM	VP131767	11/22/2024	05/18/2025	Semsettin Yesilyurt	None	None	Maresh Dadoda
11/27/2024								

FROM 0.50000ml of V13391 + 49.50000ml of V14154 = Final Quantity: 50.000 ml

<u>Recipe ID</u>	<u>NAME</u>	<u>NO.</u>	<u>Prep Date</u>	<u>Expiration Date</u>	<u>Prepared By</u>	<u>ScaleID</u>	<u>PipetteID</u>	<u>Supervised By</u>
252	8260 Working STD (BCM)-First source, 100PPM	VP132098	12/12/2024	06/10/2025	Semsettin Yesilyurt	None	None	Maresh Dadoda
12/19/2024								

FROM 1.25000ml of V13466 + 23.75000ml of V14614 = Final Quantity: 25.000 ml

VOC STANDARD PREPARATION LOG

<u>Recipe ID</u>	<u>NAME</u>	<u>NO.</u>	<u>Prep Date</u>	<u>Expiration Date</u>	<u>Prepared By</u>	<u>ScaleID</u>	<u>PipetteID</u>	<u>Supervised By</u>
257	8260 Calibration Working STD Mix-First source, 160PPM	VP132613	01/20/2025	02/28/2025	Semsettin Yesilyurt	None	None	Maresh Dadoda 01/29/2025

FROM 0.40000ml of V13446 + 1.00000ml of V14175 + 1.00000ml of V14176 + 1.00000ml of V14433 + 1.00000ml of V14439 + 1.00000ml of V14521 + 1.00000ml of V14522 + 1.00000ml of V14722 + 1.00000ml of V14754 + 1.00000ml of V14756 + 1.00000ml of V14801 + 1.00000ml of V14814 + 1.50000ml of V14723 + 1.50000ml of V14724 + 10.60000ml of V14624 = Final Quantity: 25.000 ml

<u>Recipe ID</u>	<u>NAME</u>	<u>NO.</u>	<u>Prep Date</u>	<u>Expiration Date</u>	<u>Prepared By</u>	<u>ScaleID</u>	<u>PipetteID</u>	<u>Supervised By</u>
244	8260 Calibration Working STD Mix-First source, 100PPM	VP132614	01/20/2025	02/28/2025	Semsettin Yesilyurt	None	None	Maresh Dadoda 01/29/2025

FROM 5.62500ml of V14624 + 9.37500ml of VP132613 = Final Quantity: 15.000 ml

VOC STANDARD PREPARATION LOG

<u>Recipe ID</u>	<u>NAME</u>	<u>NO.</u>	<u>Prep Date</u>	<u>Expiration Date</u>	<u>Prepared By</u>	<u>ScaleID</u>	<u>PipetteID</u>	<u>Supervised By</u>
553	524 Calibration CC Mix Working STD, 25 PPM	VP132883	02/05/2025	04/07/2025	Semsettin Yesilyurt	None	None	Maresh Dadoda
02/14/2025								

FROM 0.12500ml of V13879 + 0.12500ml of V14419 + 0.12500ml of V14756 + 0.12500ml of V14837 + 0.25000ml of V14724 + 9.24600ml of V14624 = Final Quantity: 10.000 ml

<u>Recipe ID</u>	<u>NAME</u>	<u>NO.</u>	<u>Prep Date</u>	<u>Expiration Date</u>	<u>Prepared By</u>	<u>ScaleID</u>	<u>PipetteID</u>	<u>Supervised By</u>
552	524 Internal STD and Surrogate Mix, 5 PPM	VP132884	02/05/2025	07/13/2025	Semsettin Yesilyurt	None	None	Maresh Dadoda
02/14/2025								

FROM 0.02500ml of V14134 + 9.97500ml of V14624 = Final Quantity: 10.000 ml

VOC STANDARD PREPARATION LOG

<u>Recipe ID</u>	<u>NAME</u>	<u>NO.</u>	<u>Prep Date</u>	<u>Expiration Date</u>	<u>Prepared By</u>	<u>ScaleID</u>	<u>PipetteID</u>	<u>Supervised By</u>
1580	BFB TUNE CHECK-524.2	VP132989	02/11/2025	02/12/2025	Amit Patel	None	None	Maresh Dadoda
02/14/2025								

FROM 39.99000ml of W3112 + 0.00160ml of VP131767 = Final Quantity: 40.000 ml

<u>Recipe ID</u>	<u>NAME</u>	<u>NO.</u>	<u>Prep Date</u>	<u>Expiration Date</u>	<u>Prepared By</u>	<u>ScaleID</u>	<u>PipetteID</u>	<u>Supervised By</u>
1099	10 PPB ICV, 524.2	VP132990	02/11/2025	02/12/2025	Amit Patel	None	None	Maresh Dadoda
02/14/2025								

FROM 39.98400ml of W3112 + 0.00400ml of VP132098 + 0.00400ml of VP132614 + 0.00800ml of VP132884 = Final Quantity: 40.000 ml

VOC STANDARD PREPARATION LOG

<u>Recipe ID</u>	<u>NAME</u>	<u>NO.</u>	<u>Prep Date</u>	<u>Expiration Date</u>	<u>Prepared By</u>	<u>ScaleID</u>	<u>PipetteID</u>	<u>Supervised By</u>
1131	10 PPB CCC, 524.2	VP132991	02/11/2025	02/12/2025	Amit Patel	None	None	Maresh Dadoda
02/14/2025								

FROM 39.97600ml of W3112 + 0.00800ml of VP132884 + 0.01600ml of VP132883 = Final Quantity: 40.000 ml

<u>Recipe ID</u>	<u>NAME</u>	<u>NO.</u>	<u>Prep Date</u>	<u>Expiration Date</u>	<u>Prepared By</u>	<u>ScaleID</u>	<u>PipetteID</u>	<u>Supervised By</u>
1131	10 PPB CCC, 524.2	VP132992	02/11/2025	02/12/2025	Amit Patel	None	None	Maresh Dadoda
02/14/2025								

FROM 39.97600ml of W3112 + 0.00800ml of VP132884 + 0.01600ml of VP132883 = Final Quantity: 40.000 ml

VOC STANDARD PREPARATION LOG

<u>Recipe ID</u>	<u>NAME</u>	<u>NO.</u>	<u>Prep Date</u>	<u>Expiration Date</u>	<u>Prepared By</u>	<u>ScaleID</u>	<u>PipetteID</u>	<u>Supervised By</u>
3160	0.4 PPB 524 LOD	VP132994	02/11/2025	02/12/2025	Amit Patel	None	None	Maresh Dadoda
02/14/2025								

FROM 39.99000ml of W3112 + 0.00060ml of VP132883 + 0.00800ml of VP132884 = Final Quantity: 40.000 ml

<u>Recipe ID</u>	<u>NAME</u>	<u>NO.</u>	<u>Prep Date</u>	<u>Expiration Date</u>	<u>Prepared By</u>	<u>ScaleID</u>	<u>PipetteID</u>	<u>Supervised By</u>
3918	524 METH.LOD 0.8 PPB	VP132995	02/11/2025	02/12/2025	Amit Patel	None	None	Maresh Dadoda
02/14/2025								

FROM 39.99000ml of W3112 + 0.00130ml of VP132883 + 0.00800ml of VP132884 = Final Quantity: 40.000 ml

VOC STANDARD PREPARATION LOG

<u>Recipe ID</u>	<u>NAME</u>	<u>NO.</u>	<u>Prep Date</u>	<u>Expiration Date</u>	<u>Prepared By</u>	<u>ScaleID</u>	<u>PipetteID</u>	<u>Supervised By</u>
1898	524 LOD LOQ, 1PPB	VP132997	02/11/2025	02/12/2025	Amit Patel	None	None	Maresh Dadoda
FROM 39.99000ml of W3112 + 0.00160ml of VP132883 + 0.00800ml of VP132884 = Final Quantity: 40.000 ml								

1
2
3
4
5
6
7
8
9
10
11
12
13
14
15
16

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	30470 / VOA Stock Solution, tert-butanol std, 1mL, P&TM	A0181905	02/28/2025	01/10/2025 / SAM	01/23/2023 / SAM	V13446

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	A0193071	06/12/2025	12/12/2024 / SAM	01/27/2023 / SAM	V13466

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Restek	564323 / Custom Oxygenates Standard	A0199211	04/17/2025	10/17/2024 / SAM	06/30/2023 / SAM	V13879

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Restek	30201 / VOA Mix, 500 series method, 524 Internal Std., 2000ug/mL. P&TM, 1mL/ampul	A0168982	02/05/2026	02/05/2025 / SAM	01/18/2024 / SAM	V14134

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)	22L0562016	05/18/2025	11/18/2024 / pedro	02/06/2024 / SAM	V14154

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	07/10/2025	01/10/2025 / SAM	02/20/2024 / SAM	V14175

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	07/10/2025	01/10/2025 / SAM	02/20/2024 / SAM	V14176

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Restek	30601 / VOA Mega Mix, Drinking Water VOA Mega Mix, 524.2 Rev 4.1, 1mL, 2000ug/mL P&TM	A0204639	10/17/2025	10/17/2024 / SAM	06/04/2024 / SAM	V14419

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	A0209618	07/10/2025	01/10/2025 / SAM	08/15/2024 / SAM	V14433

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	A0209618	07/10/2025	01/10/2025 / SAM	08/15/2024 / SAM	V14439

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	07/10/2025	01/10/2025 / SAM	09/18/2024 / SAM	V14521

CHEMICAL RECEIPT LOG BOOK

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	07/10/2025	01/10/2025 / SAM	09/18/2024 / SAM	V14522

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)	22L0562016	06/10/2025	12/10/2024 / SAM	11/26/2024 / SAM	V14614

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	07/13/2025	01/13/2025 / SAM	11/26/2024 / SAM	V14624

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	A02110618	07/10/2025	01/10/2025 / SAM	12/17/2024 / SAM	V14722

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	A02110618	07/10/2025	01/10/2025 / SAM	12/17/2024 / SAM	V14723

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	A02110618	07/10/2025	01/10/2025 / SAM	12/17/2024 / SAM	V14724

CHEMICAL RECEIPT LOG BOOK

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	05/31/2031	01/10/2025 / SAM	12/17/2024 / SAM	V14754

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	07/10/2025	01/10/2025 / SAM	12/17/2024 / SAM	V14756

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	A0220563	06/30/2026	01/10/2025 / SAM	01/08/2025 / SAM	V14801

LOTS

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	A0220471	07/10/2025	01/10/2025 / SAM	01/08/2025 / SAM	V14814

LOTS

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Restek	560065 / Custom Standard, 524 Std w/ COC [CS 8005]	A0220861	07/20/2025	01/20/2025 / SAM	01/16/2025 / SAM	V14837

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

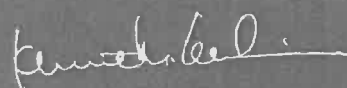
Material No.: 9077-02
Batch No.: 23I0762004
Manufactured Date: 2023-08-11
Expiration Date: 2026-08-10
Revision No.: 0

Certificate of Analysis

Test	Specification	Result
Assay (CH ₃ OH) (by GC, corrected for water)	≥ 99.9 %	100.0 %
Residue after Evaporation	≤ 1.0 ppm	0.5 ppm
Titration Acid (μeq/g)	≤ 0.3	0.2
Titration 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

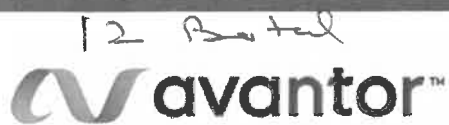
For Laboratory, Research, or Manufacturing Use
Performance Tested for Use in EPA Methods
500 Series for Drinking Water
600 Series for Wastewater
846 for Solid Waste

Country of Origin: USA
Packaging Site: Phillipsburg Mfg Ctr & DC



Ken Koehnlein
Sr. Manager, Quality Assurance

Methanol
ULTRA RESI-ANALYZED
For Purge and Trap Analysis



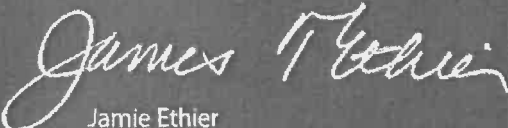
Material No.: 9077-02
Batch No.: 22L0562016
Manufactured Date: 2022-10-26
Expiration Date: 2025-10-25
Revision No.: 0

Certificate of Analysis

Test	Specification	Result
Assay (CH ₃ OH) (by GC, corrected for water)	≥ 99.9 %	100.0 %
Residue after Evaporation	≤ 1.0 ppm	0.2 ppm
Titration Acid (μeq/g)	≤ 0.3	0.2
Titration 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


Jamie Ethier
Vice President Global Quality



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#: 8UTB

Solvent(s): **Methanol**
Lot#: **EG359-USQ12**

Formulated By: <i>Prashant Chauhan</i>		021624
		DATE
Reviewed By: <i>Pedro L. Rentes</i>		021624
		DATE

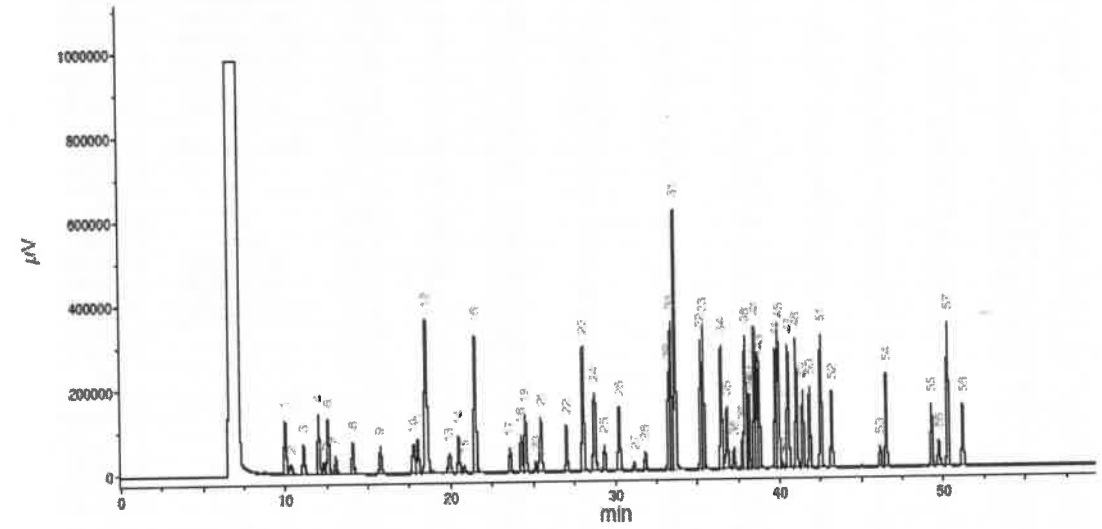
Weight(s) shown below were combined and diluted to (mL): **100.0** **0.021** Balance Uncertainty: **5E-05** Flask Uncertainty: **0.021**

Compound	(RM#)	Lot	Di.	Initial	Initial	Nominal	Purity	Purity	Uncertainty	Target	Actual	Actual	Expanded	SDS Information		
	Part Number	Number	Factor	Vol. (mL)	Conc. (µg/mL)	Conc. (µg/mL)	(%)	Uncertainty	Pipette (mL)	Weight(g)	Weight(g)	Conc (µg/mL)	(+/-) (µg/mL)	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)	or-rat 2400mg/kg
2. Allyl chloride (3-Chloropropene)	(0325)	102395	NA	NA	NA	2000	99	0.2	NA	0.20207	0.20221	2001.4	8.2	107-05-1	1 ppm (3mg/m3/8H)	or-rat 7000mg/kg
3. Carbon disulfide	(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)	or-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	6.5	1476-11-5	N/A	N/A
5. trans-1,4-Dichloro-2-butene	(0486)	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)	IK18CA5000K	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)	06126PK	NA	NA	NA	2000	99	0.2	NA	0.20207	0.20230	2002.3	8.2	97-63-2	N/A	N/A
8. Iodomethane	(0489)	5HBF8718V	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)	or-rat 14800mg/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)	or-rat 70mg/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)	or-rat 1200mg/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)	or-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)	or-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)	or-rat 700mg/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)	or-rat 720mg/kg
15. Perfluorooctane	(0450)	HGA01	NA	NA	NA	2000	98	0.2	NA	0.20413	0.20430	2001.8	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 (7800mg/m3/8H)	or-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	or-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	or-rat 840mg/kg
19. cis-1,2-Dichloroethane	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-Dichloroethane	35171	101623	0.05	5.00	40002.4	2000	NA	NA	0.017	NA	NA	1999.6	23.0	156-60-5	N/A	or-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	or-rat 820mg/kg
22. 1,1-Dichloroethene	32251	102023	0.10	10.00	20001.6	2000	NA	NA	0.042	NA	NA	1999.6	22.9	75-35-4	1 ppm (4mg/m3/8H)	or-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)	or-rat 930mg/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)	or-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)	or-rat 900mg/kg
26. Dibromomethane	95321	020724	0.10	10.00	20002.9	2000	NA	NA	0.042	NA	NA	1999.8	20.5	74-85-3	N/A	or-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	N/A	or-rat 108mg/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	100 ppm	or-rat 725mg/kg
29. Tetrachloroethane	95321	020724	0.10	10.00	20201.1	2000	NA	NA	0.042	NA	NA	1999.8	20.4	584-20-7	N/A	N/A
30. 1,1,1-Trichloroethane	95321	020724	0.10	10.00	20003.0	2000	NA	NA	0.042	NA	NA	2019.6	20.8	127-18-4	25 ppm (170mg/m3/8H) (final)	or-rat 2629mg/kg
31. 1,2-Dibromo-3-chloropropane	35161	112322	0.05	5.00	40016.5	2000	NA	NA	0.017	NA	NA	1999.8	20.5	71-55-6	350 ppm (1900mg/m3/8H)	or-rat 10300mg/kg
32. 1,2-Dibromomethane	35161	112322	0.05	5.00	40024.8	2000	NA	NA	0.017	NA	NA	2000.3	22.9	96-12-6	0.001 ppm	or-rat 170mg/kg
33. 1,2-Dichloroethane	35161	112322	0.05	5.00	40018.0	2000	NA	NA	0.017	NA	NA	2000.4	22.9	106-93-4	20 ppm (8H)	or-rat 108mg/kg
34. 1,2-Dichloropropane	35161	112322	0.05	5.00	40051.0	2000	NA	NA	0.017	NA	NA	2002.0	22.9	107-08-2	50 ppm (8H)	or-rat 870mg/kg
35. 1,3-Dichloropropane	35161	112322	0.05	5.00	40005.9	2000	NA	NA	0.017	NA	NA	1999.8	22.9	78-57-5	75 ppm (350mg/m3/8H)	or-rat 1947mg/kg
36. 1,1-Dichloropropene	35161	112322	0.05	5.00	40012.1	2000	NA	NA	0.017	NA	NA	1999.8	22.9	142-28-9	N/A	un-rat 3600mg/kg
37. cis-1,3-Dichloropropene	35161	112322	0.05	5.00	40010.0	2000	NA	NA	0.017	NA	NA	2000.1	29.7	563-56-6	N/A	N/A
38. trans-1,3-Dichloropropene	35161	112322	0.05	5.00	40017.8	2000	NA	NA	0.017	NA	NA	2000.0	23.0	10061-01-5	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)	or-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	or-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)	or-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 (46mg/m3/8H) (skin)	or-rat 636mg/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	80 ppm (270mg/m3/8H)	or-rat 2400mg/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 (50mg/m3/8H)	or-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	or-rat 4694mg/kg
46. Bromobenzene	35162	050823	0.05	5.00	40006.9	2000	NA	NA	0.017	NA	NA	1999.7	22.9	104-51-8	N/A	N/A
47. n-Butyl benzene	35162	050823	0.05	5.00	40003.8	2000	NA	NA	0.017	NA	NA	1999.7	22.9	100-41-4	100 ppm (435mg/m3/8H)	or-rat >2000mg/kg
48. Ethyl benzene	35162	050823	0.05	5.00	40004.8	2000	NA	NA	0.017	NA	NA	1999.7	22.9	99-87-6	N/A	or-rat 4750mg/kg
49. p-Isopropyl toluene	35162	050823	0.05	5.00	40005.8	2000	NA	NA	0.017	NA	NA	1999.8	22.9	91-20-3	10 ppm (50mg/m3/8H)	or-rat 4900mg/kg
50. Naphthalene	35162	050823	0.05	5.00	40006.2	2000	NA	NA	0.017	NA	NA	1999.7	22.9	100-42-5	100 ppm	or-rat 5000mg/kg
51. Styrene	35162	050823	0.05	5.00	40006.2	2000	NA	NA	0.017	NA	NA	1999.8	22.9	108-98-3	200 ppm	or-rat 5000mg/kg
52. Toluene	35162	050823	0.05	5.00	40003.1	2000	NA	NA	0.017	NA	NA	1999.7	22.9	87-61-6	N/A	or-rat 1390mg/kg
53. 1,2,3-Trichlorobenzene	35162	050823	0.05	5.00	40003.1	2000	NA	NA	0.017	NA	NA	1999.8	22.9	120-82-1	5 ppm (CL) (40mg/m3)	or-rat 750mg/kg
54. 1,2,4-Trichlorobenzene	35162	050823	0.05	5.00	40006.8	2000	NA	NA	0.017	NA	NA	1999.8	23.0	95-63-6	N/A	or-rat 5g/kg
55. 1,2,4-Trimethylbenzene	35162	050823	0.05	5.00	40001.6	2000	NA	NA	0.017	NA	NA	1999.8	22.9	106-57-8	N/A	or-rat 5000mg/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	108-38-3	100 ppm (435mg/m3/8H)	or-rat 5g/kg
57. m-Xylene	35162	050823	0.05	5.00	40005.8	2000	NA	NA	0.017	NA	NA	1999.8	22.9	98-06-6	N/A	N/A
58. tert-Butyl benzene	35163	101923	0.05	5.00	40001.2	2000	NA	NA	0.017	NA	NA	1999.6	22.9	135-98-8	N/A	or-rat 2240mg/kg
59. sec-Butyl benzene	35163	101923	0.05	5.00	40002.4	2000	NA	NA	0.017	NA	NA	1999.6	22.9	108-90-7	75 ppm (350mg/m3/8H)	or-rat 2290mg/kg
60. Chlorobenzene	35163	101923	0.05	5.00	40003.8	2000	NA	NA	0.017	NA	NA	1999.5	22.9	95-49-8	80 ppm (250mg/m3/8H)	or-rat 3900mg/kg
61. 2-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	or-rat 2100mg/kg
62. 4-Chlorotoluene	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)	or-rat 500mg/kg
63. 1,2-Dichlorobenzene	35163	101923	0.05	5.00	40003.8	2000	NA	NA	0.017	NA	NA	1999.6	23.0	541-73-1	N/A	or-rat 1063mg/kg
64. 1,3-Dichlorobenzene	35163	101923	0.05	5.00	40001.7	2000	NA	NA	0.017	NA						

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., Hydrogen(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-1,2,2-trifluoroethane	10.33
3	1,1-Dichloroethane	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-Dichloroethane	14.07
9	1,1-Dichloroethane	15.74
10	2,2-Dichloropropane	17.24
11	cis-1,2-Dichloroethane	18.00
12	Methacrylonitrile/methyl acrylate/Chloroform	18.46
13	Isobutane/1,1,1-Trichloroethane	19.01
14	1,1-Dichloropropane	20.46
15	Carbon tetrachloride	20.79
16	Benzene/1,2-Dichloroethane	21.49
17	Trichloroethane	23.58
18	1,2-Dichloropropane	24.38
19	Methyl methacrylate	24.52
20	Bromochloromethane	25.13
21	Dibromomethane/2-Helopropene	25.46
22	cis-1,3-Dichloropropene	27.02
23	Toluene	28.05
24	Ethyl methacrylate/trans-1,3-Dichloropropene	28.73
25	1,1,2-Trichloroethane	29.34
26	Tetrachloroethene/1,3-Dichloropropene	30.24
27	Dibromochloromethane	31.16
28	1,2-Dibromomethane	31.84
29	Chlorobenzene	33.26
30	Ethylbenzene/1,1,1,2-Tetrachloroethane	33.40
31	m-Xylene/p-Xylene	33.66
32	o-Xylene	35.22
33	Styrene	35.39
34	Isopropylbenzene/Bromoforn	36.18
35	cis-1,4-Dichloro-3-butene	36.80
36	1,1,2,2-Tetrachloroethane	37.23
37	1,2,3-Trichloropropene	37.77
38	n-Propylbenzene	37.93
39	trans-1,4-Dichloro-3-butene	38.05
40	Bromobenzene	38.14
41	1,3,5-Trimethylbenzene	38.80
42	2-Chlorotoluene	38.82
43	4-Chlorotoluene	38.77
44	tert-Butylbenzene	39.74
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	41.83
51	n-Butylbenzene	42.53
52	1,2-Dichlorobenzene	43.18
53	1,2-Dibromo-3-chloropropane	46.12
54	Nitrobenzene	46.46
55	1,2,4-Trichlorobenzene	49.26
56	Hexachlorobutadiene	49.72
57	Naphthalene	50.26
58	1,2,3-Trichlorobenzene	51.16

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	1-352-323-3500
		Date Prepared/Revised	January 1, 2023

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 shield
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.
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 (H ₂ O = 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)	IATA
UN number: 1230 Class: 3 Packing group: II	UN number: 1230 Class: 3 Packing group: II
Proper shipping name: Methanol	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.



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#: 8UTB

Solvent(s): **Methanol**
Lot#: **EG359-USQ12**

<i>Prashant Chauhan</i>		021624
Formulated By:	Prashant Chauhan	DATE
<i>Pedro L. Rentes</i>		021624
Reviewed By:	Pedro L. Rentes	DATE

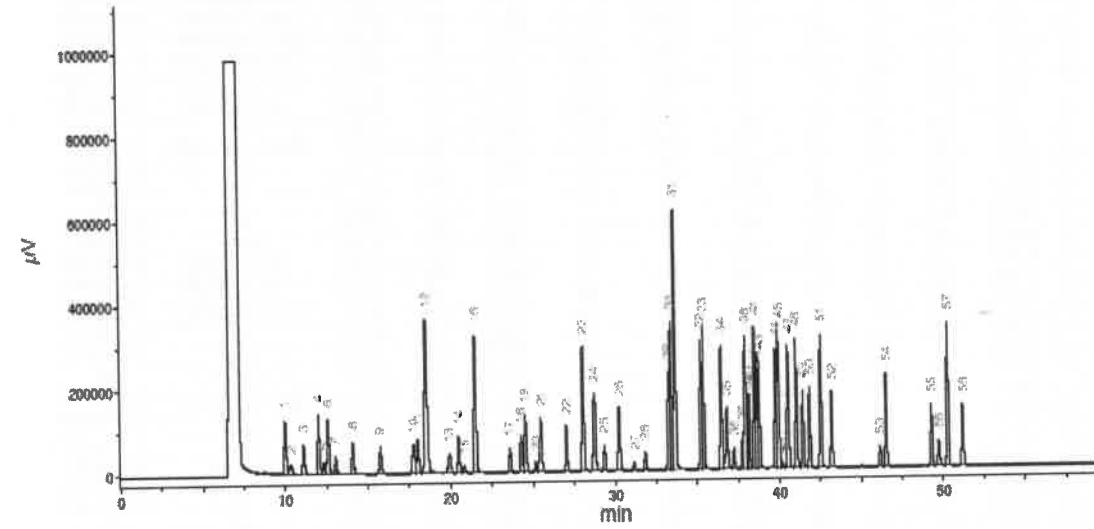
Weight(s) shown below were combined and diluted to (mL): **100.0** **0.021** Balance Uncertainty
Flask Uncertainty

Compound	(RM#)	Lot	Di.	Initial	Initial	Nominal	Purity	Purity	Uncertainty	Target	Actual	Actual	Expanded	SDS Information			
	Part Number	Number	Factor	Vol. (mL)	Conc.(µg/mL)	Conc.(µg/mL)	(%)	Uncertainty	Pipette (mL)	Weight(g)	Weight(g)	Conc (µg/mL)	Uncertainty	(+/-) (µg/mL)	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)	or-rat 2400mg/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)	or-rat 700mg/kg	
3. Carbon disulphide	(0060)	MKCR8581	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)	or-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	(0486)	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)	IK18CA5000K	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)	06126PK	NA	NA	NA	2000	99	0.2	NA	0.20207	0.20230	2002.3	8.2	97-63-2	N/A	or-rat 14800mg/kg	
8. Iodomethane	(0489)	5HBF8718V	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)	or-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)	or-rat 3480mg/kg	
10. Methacrylonitrile	(0442)	00427ET	NA	NA	NA	2000	99	0.2	NA	0.20207	0.20221	2001.4	8.2	128-98-7	1 ppm (3mg/m3/8H) (skin)	or-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)	or-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)	or-rat 7872mg/kg	
13. Nitrobenzene	(0228)	01213TV	NA	NA	NA	2000	99	0.2	NA	0.20207	0.20220	2001.3	8.2	99-05-3	1 ppm (5mg/m3/8H) (skin)	or-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)	or-rat 720mg/kg	
15. Perfluorooctane	(0450)	HGA01	NA	NA	NA	2000	98	0.2	NA	0.20413	0.20430	2001.8	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 (7800mg/m3/8H)	or-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	or-rat 918mg/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	or-rat 840mg/kg	
19. cis-1,2-Dichloroethane	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-Dichloroethane	35171	101623	0.05	5.00	40002.4	2000	NA	NA	0.017	NA	NA	1999.6	23.0	156-60-5	N/A	N/A	
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	or-rat 1235mg/kg	
22. 1,1-Dichloroethene	32251	102023	0.10	10.00	20001.6	2000	NA	NA	0.042	NA	NA	1999.6	22.9	75-35-4	1 ppm (4mg/m3/8H)	or-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)	or-rat 930mg/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)	or-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)	or-rat 900mg/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	or-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	or-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. Tetrachloroethane	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)	or-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)	or-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	96-12-6	0.001 ppm	or-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)	or-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	107-08-2	50 ppm (8H)	or-rat 870mg/kg	
34. 1,3-Dichloropropane	35161	112322	0.05	5.00	40005.9	2000	NA	NA	0.017	NA	NA	2002.0	22.9	78-57-5	75 ppm (350mg/m3/8H)	or-rat 1947mg/kg	
35. 1,1-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	un-rat 3600mg/kg	
36. cis-1,3-Dichloropropene	35161	112322	0.05	5.00	40012.1	2000	NA	NA	0.017	NA	NA	2000.1	29.7	563-56-6	N/A	N/A	
37. trans-1,3-Dichloropropene	35161	112322	0.05	5.00	40017.8	2000	NA	NA	0.017	NA	NA	2000.0	23.0	10061-01-5	N/A	N/A	
38. Hexachloro-1,3-butadiene	35161	112322	0.05	5.00	40021.9	2000	NA	NA	0.017	NA	NA	2000.4	23.0	10061-02-6	N/A	N/A	
39. 1,1,1,2-Tetrachloroethane	35161	112322	0.05	5.00	40011.9	2000	NA	NA	0.017	NA	NA	2000.6	29.7	67-66-3	0.02 ppm (0.24mg/m3/8H)	or-rat 82mg/kg	
40. 1,1,2,2-Tetrachloroethane	35161	112322	0.05	5.00	40007.5	2000	NA	NA	0.017	NA	NA	2000.1	22.9	630-20-6	N/A	or-rat 670mg/kg	
41. 1,1,2-Trichloroethane	35161	112322	0.05	5.00	40006.6	2000	NA	NA	0.017	NA	NA	1999.9	22.9	79-34-5	5 ppm (35mg/m3/8H) (skin)	or-rat 800mg/kg	
42. Trichloroethene	35161	112322	0.05	5.00	40029.0	2000	NA	NA	0.017	NA	NA	1999.8	23.0	79-00-5	10 ppm (46mg/m3/8H) (skin)	or-rat 836mg/kg	
43. 1,2,3-Trichloropropane	35161	112322	0.05	5.00	40007.5	2000	NA	NA	0.017	NA	NA	2000.9	22.9	79-01-6	50 ppm (270mg/m3/8H)	or-rat 2400mg/kg	
44. Benzene	35162	050823	0.05	5.00	40005.0	2000	NA	NA	0.017	NA	NA	1999.9	22.9	96-18-4	10 ppm (50mg/m3/8H)	or-rat 149.6mg/kg	
45. Bromobenzene	35162	050823	0.05	5.00	40006.9	2000	NA	NA	0.017	NA	NA	1999.7	22.9	71-43-2	1 ppm	or-rat 4694mg/kg	
46. 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	or-rat 2699mg/kg	
47. 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)	or-rat >2000mg/kg	
48. 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	or-rat 4750mg/kg	
49. 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)	or-rat 490mg/kg	
50. Styrene	35162	050823	0.05	5.00	40004.6	2000	NA	NA	0.017	NA	NA	1999.7	22.9	100-42-5	100 ppm	or-rat 5000mg/kg	
51. Toluene	35162	050823	0.05	5.00	40006.2	2000	NA	NA	0.017	NA	NA	1999.8	22.9	108-98-3	200 ppm	or-rat 5000mg/kg	
52. 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	or-rat 1390mg/kg	
53. 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)	or-rat 750mg/kg	
54. 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	or-rat 5g/kg	
55. 1,3,5-Trimethylbenzene	35162	050823	0.05	5.00	40006.7	2000	NA	NA	0.017	NA	NA	1999.6	22.9	106-67-8	N/A	or-rat 5000mg/kg	
56. 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)	or-rat 5g/kg	
57. tert-Butyl benzene	35163	101923	0.05	5.00	40001.2	2000	NA	NA	0.017	NA	NA	1999.6	22.9	98-06-6	N/A	N/A	
58. sec-Butyl benzene	35163	101923	0.05	5.00	40002.4	2000	NA	NA	0.017	NA	NA	1999.6	22.9	135-98-8	N/A	or-rat 2240mg/kg	
59. 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)	or-rat 2290mg/kg	
60. 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)	or-rat 3900mg/kg	
61. 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	or-rat 2100mg/kg	
62. 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)	or-rat 500mg/kg	
63. 1,3-Dichlorobenzene	3516																

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., Hydrogen(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-1,2,2-trifluoroethane	10.33
3	1,1-Dichloroethane	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-Dichloroethane	14.07
9	1,1-Dichloroethane	15.74
10	2,2-Dichloropropane	17.24
11	cis-1,2-Dichloroethane	18.00
12	Methacrylonitrile/methyl acrylate/Chloroform	18.46
13	Isobutane/1,1,1-Trichloroethane	19.01
14	1,1-Dichloropropane	20.46
15	Carbon tetrachloride	20.79
16	Benzene/1,2-Dichloroethane	21.49
17	Trichloroethane	23.58
18	1,2-Dichloropropane	24.38
19	Methyl methacrylate	24.52
20	Bromochloromethane	25.13
21	Dibromomethane/2-Hexopropane	25.46
22	cis-1,3-Dichloropropene	27.02
23	Toluene	28.05
24	Ethyl methacrylate/trans-1,3-Dichloropropene	28.73
25	1,1,2-Trichloroethane	29.34
26	Tetrachloroethene/1,3-Dichloropropene	30.24
27	Dibromochloromethane	31.16
28	1,2-Dibromomethane	31.84
29	Chlorobenzene	33.26
30	Ethylbenzene/1,1,1,2-Tetrachloroethane	33.40
31	m-Xylene/p-Xylene	33.66
32	o-Xylene	35.22
33	Styrene	35.39
34	Isopropylbenzene/Bromoforn	36.18
35	cis-1,4-Dichloro-3-Butene	36.48
36	1,1,2,2-Tetrachloroethane	37.23
37	1,2,3-Trichloropropene	37.77
38	n-Propylbenzene	37.93
39	trans-1,4-Dichloro-3-Butene	38.05
40	Bromobenzene	38.14
41	1,3,5-Trimethylbenzene	38.80
42	2-Chlorotoluene	38.82
43	4-Chlorotoluene	38.77
44	tert-Butylbenzene	39.74
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	41.83
51	n-Butylbenzene	42.53
52	1,2-Dichlorobenzene	43.18
53	1,2-Dibromo-3-chloropropane	46.12
54	Nitrobenzene	46.46
55	1,2,4-Trichlorobenzene	49.26
56	Hexachlorobutadiene	49.72
57	Naphthalene	50.26
58	1,2,3-Trichlorobenzene	51.16

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	1-352-323-3500
		Date Prepared/Revised	January 1, 2023

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 shield
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.
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 (H ₂ O = 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)	IATA
UN number: 1230 Class: 3 Packing group: II	UN number: 1230 Class: 3 Packing group: II
Proper shipping name: Methanol	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.



Certified Reference Material CRM

Dec 09/17/24

2 vial

ANAB ISO 17034 Accredited
AR-1539 Certificate Number
https://Absolutestandards.com

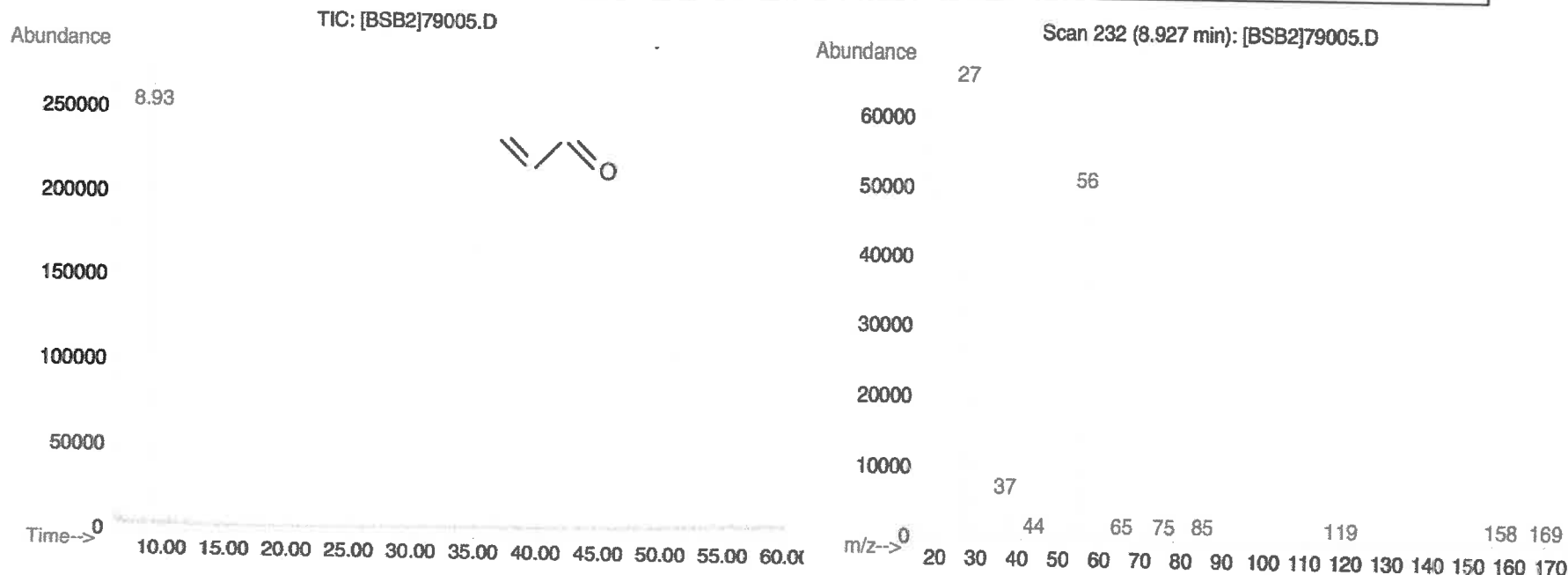
CERTIFIED WEIGHT REPORT

Part Number: **91980**
Lot Number: **091424**
Description: **Acrolein**Solvent(s):
Water Lot#
072324QExpiration Date: 101424
Recommended Storage: Refrigerate (4 °C)
Nominal Concentration (µg/mL): 5000
NIST Test ID#: 6UTBWeight(s) shown below were combined and diluted to (mL): 10.0
5E-05 Balance Uncertainty
0.001 Flask Uncertainty

<i>Justin Dippold</i>	
Formulated By: Justin Dippold	091424 DATE
<i>Pedro L. Rentas</i>	
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	ori-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.





Certified Reference Material CRM

Dec 09/17/24

2 vials

ANAB ISO 17034 Accredited
AR-1539 Certificate Number
https://Absolutestandards.com

CERTIFIED WEIGHT REPORT

Part Number: **91980**
Lot Number: **091424**
Description: **Acrolein**Solvent(s):
Water Lot#
072324Q

<i>Justin Dippold</i>		091424
Formulated By:	Justin Dippold	DATE
<i>Pedro L. Rentas</i>		091424
Reviewed By:	Pedro L. Rentas	DATE

Expiration Date: 101424

Recommended Storage: Refrigerate (4 °C)

Nominal Concentration (µg/mL): 5000

NIST Test ID#: 6UTB

5E-05 Balance Uncertainty

Weight(s) shown below were combined and diluted to (mL): 10.0 0.001 Flask Uncertainty

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	ori-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.

Abundance TIC: [BSB2]79005.D

Abundance Scan 232 (8.927 min): [BSB2]79005.D

250000 8.93

200000

150000

100000

50000

Time--> 0

10.00 15.00 20.00 25.00 30.00 35.00 40.00 45.00 50.00 55.00 60.00



m/z--> 0

20 30 40 50 60 70 80 90 100 110 120 130 140 150 160 170

- 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).



CERTIFIED REFERENCE MATERIAL

110 Benner Circle
Bellefonte, PA 16823-8812
Tel: (800)356-1688
Fax: (814)353-1309

www.restek.com

Certificate of Analysis



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. : 30201 Lot No.: A0168982
Description : 524 Internal Std / Surrogate Mix
524 Internal Std/Surrogate Mix 2000µg/mL, P&T Methanol, 1mL/ampul
Container Size : 2 mL Pkg Amt: > 1 mL
Expiration Date : February 29, 2028 Storage: 0°C or colder
Ship: Ambient

CERTIFIED VALUES

Elution Order	Compound		Grav. Conc. (weight/volume)	Expanded Uncertainty (95% C.L.; K=2)			
1	Fluorobenzene	(Lot BCBK8171V)	2,008.0 µg/mL	+/-	11.7841	µg/mL	Gravimetric
	CAS # 462-06-6			+/-	112.5980	µg/mL	Unstressed
	Purity 99%			+/-	115.2321	µg/mL	Stressed
2	1-Bromo-4-fluorobenzene (BFB)	(Lot 20401KO)	2,010.0 µg/mL	+/-	11.7958	µg/mL	Gravimetric
	CAS # 460-00-4			+/-	112.7101	µg/mL	Unstressed
	Purity 99%			+/-	115.3469	µg/mL	Stressed
3	1,2-Dichlorobenzene-d4	(Lot M-2097)	2,015.5 µg/mL	+/-	11.8281	µg/mL	Gravimetric
	CAS # 2199-69-1			+/-	113.0185	µg/mL	Unstressed
	Purity 99%			+/-	115.6625	µg/mL	Stressed
Solvent:	P&T Methanol						
	CAS # 67-56-1						
	Purity 99%						

Column:
105m x 0.53mm x 3.0µm
Rtx-502.2 (cat.#10910)

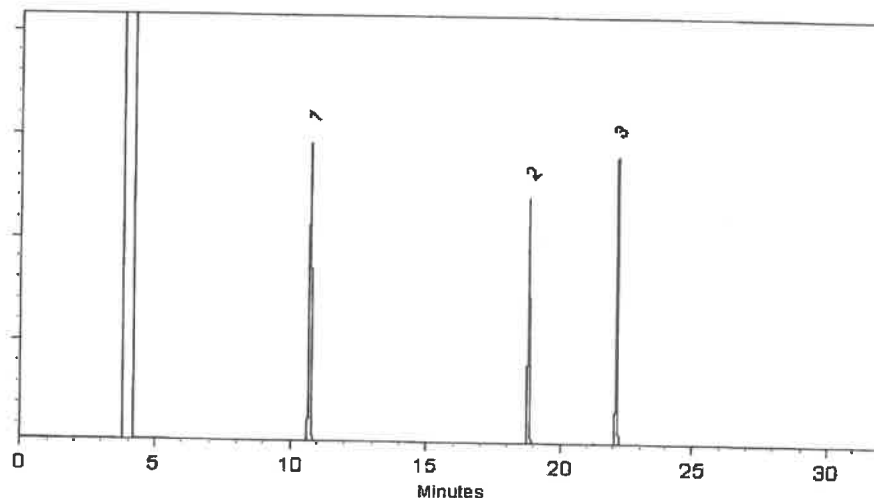
Carrier Gas:
hydrogen-constant pressure 11.0 psi.

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



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.

Sam Moodler
Sam Moodler - Operations Tech I

Date Mixed: 11-Feb-2021 Balance: 1128360905

Alexis Shelow
Alexis Shelow - Operations Tech I

Date Passed: 12-Feb-2021

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/ μ ECD, 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 combined stressed uncertainty value (includes gravimetric uncertainty, homogeneity between-ampul uncertainty, storage stability uncertainty and shipping stability uncertainty and were combined using the following formula:

$$U_{combined\ stressed} = k \sqrt{U_{gravimetric}^2 + U_{homogeneity}^2 + U_{storage\ stability}^2 + U_{shipping\ stability}^2}$$

k is a coverage factor of 2, which gives a level of confidence of approximately 95%.

- It is important to note that the shipping stability uncertainty was obtained under temperature extremes for specific time intervals; therefore, the certified combined stressed uncertainty value should only be applied to the product if it was stored at non-standard temperature conditions up to and including 7 days. Contact Restek Technical Service at www.restek.com/Contact-Us for use recommendations if your shipment was in-transit for more than 7 days at non-standard temperature conditions.
- Apply the certified combined unstressed uncertainty value if the product was received under standard shipping conditions. Apply the certified combined stressed uncertainty value if the product was received under non-standard conditions as specified below.

Label Conditions	Standard Conditions	Non-Standard Conditions
25°C Nominal (Room Temperature)	< 60°C	≥ 60°C up to 7 days
10°C or colder (Refrigerate)	< 40°C	≥ 40°C up to 7 days
0°C or colder (Freezer) -20°C or colder (Deep Freezer)	< 25°C	≥ 25°C up to 7 days

- Separate (not combined) uncertainty values for gravimetric uncertainty are also displayed on the certificate, if needed, separate homogeneity between-ampul uncertainty, storage stability uncertainty and shipping stability uncertainty values are available by contacting Restek Technical Service at www.restek.com/Contact-Us.
- The packaged amount is the minimum sample size for which uncertainty is valid. The ampules 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 ampules. 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.



110 Benner Circle
Bellefonte, PA 16823-8812
Tel: (800)356-1688
Fax: (814)353-1309

www.restek.com

CERTIFIED REFERENCE MATERIAL

Certificate of Analysis



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.: A0181905
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 : February 28, 2025 Storage: 0°C or colder
Ship: Ambient

CERTIFIED VALUES

Elution Order	Compound	Grav. Conc. (weight/volume)	Expanded Uncertainty (95% C.L.; K=2)												
1	tert-Butanol (TBA) CAS # 75-65-0 Purity 99% (Lot SHBM7694)	50,126.0 µg/mL	<table><tr><td>+/-</td><td>293.4988</td><td>µg/mL</td><td>Gravimetric</td></tr><tr><td>+/-</td><td>1,073.7654</td><td>µg/mL</td><td>Unstressed</td></tr><tr><td>+/-</td><td>1,104.9494</td><td>µg/mL</td><td>Stressed</td></tr></table>	+/-	293.4988	µg/mL	Gravimetric	+/-	1,073.7654	µg/mL	Unstressed	+/-	1,104.9494	µg/mL	Stressed
+/-	293.4988	µg/mL	Gravimetric												
+/-	1,073.7654	µg/mL	Unstressed												
+/-	1,104.9494	µg/mL	Stressed												

Solvent: P&T Methanol
CAS # 67-56-1
Purity 99%

Column:
105m x 0.53mm x 3.0µm
Rtx-502.2 (cat.#10910)

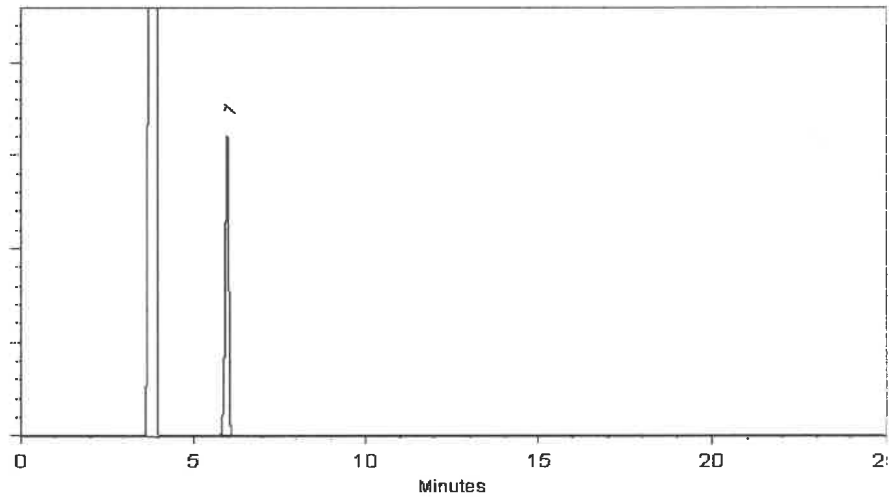
Carrier Gas:
hydrogen-constant pressure 11.0 psi.

Temp. Program:
40°C (hold 2 min.) to 240°C
@ 8°C/min. (hold 5 min.)

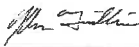
Inj. Temp:
200°C

Det. Temp:
250°C

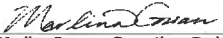
Det. Type:
FID



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.


John Friedline - Operations Technician I

Date Mixed: 16-Feb-2022 Balance: B442140311


Marlene Cowan - Operations Tech I

Date Passed: 21-Feb-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 combined stressed uncertainty value (includes gravimetric uncertainty, homogeneity between-ampul uncertainty, storage stability uncertainty and shipping stability uncertainty and were combined using the following formula:

$$U_{combined\ stressed} = k \sqrt{U_{gravimetric}^2 + U_{homogeneity}^2 + U_{storage\ stability}^2 + U_{shipping\ stability}^2}$$

k is a coverage factor of 2, which gives a level of confidence of approximately 95%.

- It is important to note that the shipping stability uncertainty was obtained under temperature extremes for specific time intervals; therefore, the certified combined stressed uncertainty value should only be applied to the product if it was stored at non-standard temperature conditions up to and including 7 days. Contact Restek Technical Service at www.restek.com/Contact-Us for use recommendations if your shipment was in-transit for more than 7 days at non-standard temperature conditions.
- Apply the certified combined unstressed uncertainty value if the product was received under standard shipping conditions. Apply the certified combined stressed uncertainty value if the product was received under non-standard conditions as specified below.

Label Conditions	Standard Conditions	Non-Standard Conditions
25°C Nominal (Room Temperature)	< 60°C	≥ 60°C up to 7 days
10°C or colder (Refrigerate)	< 40°C	≥ 40°C up to 7 days
0°C or colder (Freezer) -20°C or colder (Deep Freezer)	< 25°C	≥ 25°C up to 7 days

- Separate (not combined) uncertainty values for gravimetric uncertainty are also displayed on the certificate, if needed, separate homogeneity between-ampul uncertainty, storage stability uncertainty and shipping stability uncertainty values are available by contacting Restek Technical Service at www.restek.com/Contact-Us.
- The packaged amount is the minimum sample size for which uncertainty is valid. The ampules 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 ampules. 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.



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



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:

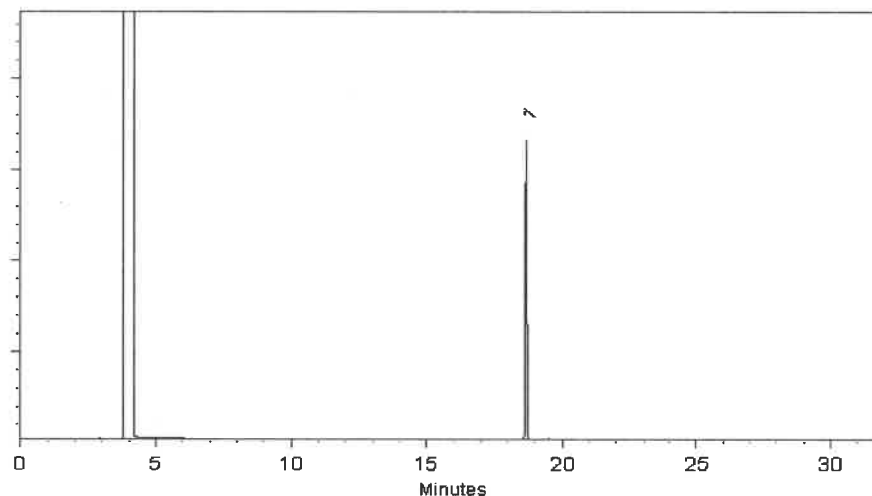
FID

Split Vent:

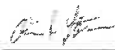
40 ml/min

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:

$$U_{combined\ uncertainty} = k \sqrt{u_{gravimetric}^2 + u_{homogeneity}^2 + u_{storage\ stability}^2 + u_{shipping\ stability}^2}$$

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.



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



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.:** A0193071

Description : Bromochloromethane Standard
Bromochloromethane 2000µg/mL, P&T Methanol, 1mL/ampul

Container Size : 2 mL **Pkg Amt:** > 1 mL

Expiration Date : December 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	Bromochloromethane	74-97-5	00008541	99%	2,018.0 µg/mL	+/- 113.3890

* 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:

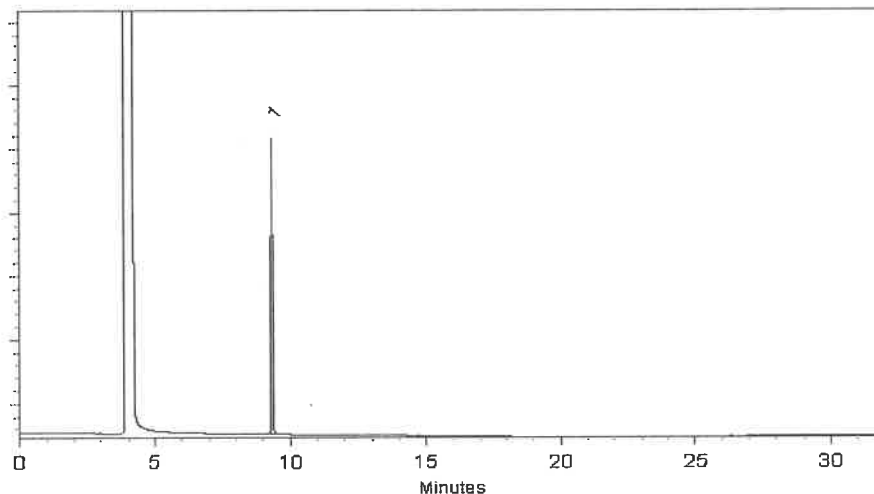
FID

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.


Tom Suckar - Mix Technician

Date Mixed: 29-Dec-2022 Balance Serial # B707717271


Christie Mills - Operations Tech II - ARM QC

Date Passed: 03-Jan-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:

$$U_{combined\ uncertainty} = k \sqrt{u_{gravimetric}^2 + u_{homogeneity}^2 + u_{storage\ stability}^2 + u_{shipping\ stability}^2}$$

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.



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



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. : 564323 **Lot No.:** A0199211

Description : Custom Oxygenates Standard

Custom Oxygenates Standard 2,000-10,000µg/mL, P&T Methanol, 1mL/ampul

Container Size : 2 mL **Pkg Amt:** > 1 mL

Expiration Date : June 30, 2028 **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	101619K21F-1	99%	10,093.2 µg/mL	+/- 125.6116
2	Diisopropyl ether (DIPE)	108-20-3	STBK3450	99%	2,011.0 µg/mL	+/- 25.0950
3	Ethyl-tert-butyl ether (ETBE)	637-92-3	MKCP5997	99%	2,009.8 µg/mL	+/- 25.0800
4	tert-Amyl methyl ether (TAME)	994-05-8	HMBJ0825	99%	2,009.2 µg/mL	+/- 25.0726
5	tert-Amyl ethyl ether (TAEE)	919-94-8	IKVYB	97%	2,010.4 µg/mL	+/- 25.0878

* 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:

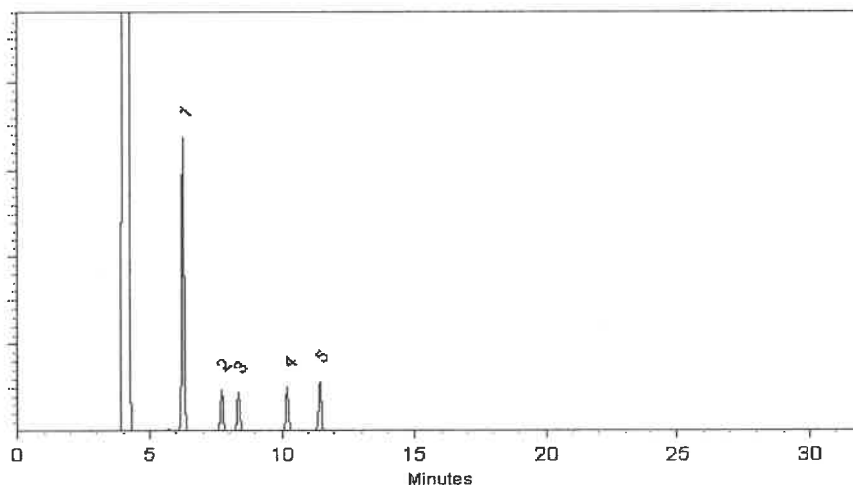
FID

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.


Bryan Snyder - Operations Tech I

Date Mixed: 22-Jun-2023

Balance Serial # 1128342314


Jennifer Pollino - Operations Tech III - ARM QC

Date Passed: 23-Jun-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:

$$U_{combined\ uncertainty} = k \sqrt{u_{gravimetric}^2 + u_{homogeneity}^2 + u_{storage\ stability}^2 + u_{shipping\ stability}^2}$$

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.



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



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. : 30601 **Lot No.:** A0204639

Description : Drinking Water VOA MegaMix™, 524.2 Rev 4.1
Drinking Water VOA Mega Mix 524.2 Rev 4.1, 2000µg/mL, P&T
Methanol, 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	Diethyl ether (ethyl ether)	60-29-7	SHBQ1495	99%	2,016.9 µg/mL	+/- 70.1908
2	1,1-dichloroethene	75-35-4	SHBG8609V	99%	2,009.6 µg/mL	+/- 69.9229
3	Iodomethane (methyl iodide)	74-88-4	MKCN8012	99%	2,016.5 µg/mL	+/- 70.1787
4	Allyl chloride (3-chloropropene)	107-05-1	RD221118RSR	99%	2,017.0 µg/mL	+/- 69.7168
5	Methylene chloride (dichloromethane)	75-09-2	231383	99%	2,013.2 µg/mL	+/- 70.0499
6	Carbon disulfide	75-15-0	N28F701	99%	2,017.0 µg/mL	+/- 70.1961
7	Acrylonitrile	107-13-1	102466R02E	99%	2,017.1 µg/mL	+/- 70.1995
8	Methyl-tert-butyl ether (MTBE)	1634-04-4	SHBP0179	99%	2,017.0 µg/mL	+/- 69.7168
9	trans-1,2-Dichloroethene	156-60-5	MKCP9516	99%	2,011.9 µg/mL	+/- 70.0038
10	1,1-Dichloroethane	75-34-3	852900	99%	2,010.5 µg/mL	+/- 69.9560
11	Propionitrile	107-12-0	BCCH7430	99%	2,017.0 µg/mL	+/- 70.1943
12	2,2-Dichloropropane	594-20-7	RD230426	99%	2,013.2 µg/mL	+/- 70.0652
13	cis-1,2-Dichloroethene	156-59-2	MKCP7830	99%	2,014.0 µg/mL	+/- 70.0903
14	Methacrylonitrile	126-98-7	1012014	99%	2,015.7 µg/mL	+/- 70.1491
15	Methyl acrylate	96-33-3	SHBG6616V	99%	2,019.0 µg/mL	+/- 70.2639
16	chloroform	67-66-3	SHBN8469	99%	2,009.7 µg/mL	+/- 69.9273

17	Bromochloromethane	74-97-5	230810JLM	99%	2,016.0	µg/mL	+/- 70.1613
18	Tetrahydrofuran	109-99-9	SHBQ0910	99%	2,019.6	µg/mL	+/- 70.2865
19	1,1,1-trichloroethane	71-55-6	RD230728RSR	99%	2,011.1	µg/mL	+/- 69.9769
20	1-Chlorobutane (Butyl chloride)	109-69-3	SHBC2651V	99%	2,015.0	µg/mL	+/- 69.6476
21	1,1-Dichloropropene	563-58-6	230825JLM	99%	2,018.9	µg/mL	+/- 70.2629
22	carbon tetrachloride	56-23-5	SHBP4875	99%	2,011.5	µg/mL	+/- 69.9890
23	1,2-Dichloroethane	107-06-2	SHBQ0693	99%	2,008.7	µg/mL	+/- 69.8916
24	Benzene	71-43-2	MKCS3357	99%	2,017.4	µg/mL	+/- 70.2100
25	Trichloroethene	79-01-6	SHBN3720	99%	2,008.3	µg/mL	+/- 69.8786
26	1,2-Dichloropropane	78-87-5	BCBR0882V	99%	2,012.1	µg/mL	+/- 70.0117
27	Methyl methacrylate	80-62-6	MKCQ2756	99%	2,017.7	µg/mL	+/- 70.2204
28	Chloroacetonitrile	107-14-2	MKBG6249V	99%	2,006.0	µg/mL	+/- 69.3366
29	bromodichloromethane	75-27-4	MKCF8470	99%	2,012.6	µg/mL	+/- 70.0273
30	Dibromomethane	74-95-3	10233302	99%	2,014.7	µg/mL	+/- 70.1153
31	2-Nitropropane	79-46-9	BCCB9352	97%	2,015.9	µg/mL	+/- 70.1562
32	cis-1,3-Dichloropropene	10061-01-5	RD230406RSR	99%	2,005.0	µg/mL	+/- 69.7655
33	Toluene	108-88-3	MKCS9989	99%	2,019.0	µg/mL	+/- 70.2643
34	Ethyl methacrylate	97-63-2	MKCN6206	97%	2,015.4	µg/mL	+/- 70.1393
35	trans-1,3-Dichloropropene	10061-02-6	RD230727RSR	99%	2,011.3	µg/mL	+/- 69.9838
36	1,1,2-Trichloroethane	79-00-5	FGB01	99%	2,013.2	µg/mL	+/- 70.0491
37	1,3-Dichloropropane	142-28-9	BCCH5357	99%	2,017.1	µg/mL	+/- 70.2002
38	Tetrachloroethene	127-18-4	SHBQ0051	99%	2,011.5	µg/mL	+/- 69.9908
39	dibromochloromethane	124-48-1	MKCQ4517	99%	2,006.6	µg/mL	+/- 69.8185
40	1,2-Dibromoethane (EDB)	106-93-4	BCCH7113	99%	2,009.0	µg/mL	+/- 69.9176
41	Chlorobenzene	108-90-7	SHBN6640	99%	2,009.8	µg/mL	+/- 69.9299
42	1,1,1,2-Tetrachloroethane	630-20-6	GC01	99%	2,013.8	µg/mL	+/- 70.0833
43	Ethylbenzene	100-41-4	094632L21G	99%	2,006.8	µg/mL	+/- 69.8411
44	m-Xylene	108-38-3	SHBN6673	99%	2,018.7	µg/mL	+/- 70.2559
45	p-Xylene	106-42-3	SHBP5191	99%	2,008.0	µg/mL	+/- 69.8828
46	o-Xylene	95-47-6	SHBN5105	99%	2,016.3	µg/mL	+/- 70.1724
47	Styrene	100-42-5	MKCQ3390	99%	2,014.8	µg/mL	+/- 70.1209
48	Isopropylbenzene (cumene)	98-82-8	Z20D022	99%	2,011.4	µg/mL	+/- 70.0026
49	bromoform	75-25-2	050494L04R	99%	2,009.6	µg/mL	+/- 69.9255
50	1,1,2,2-Tetrachloroethane	79-34-5	OXACF	99%	2,011.7	µg/mL	+/- 69.9986
51	1,2,3-Trichloropropane	96-18-4	Q91-34	98%	2,013.8	µg/mL	+/- 70.0841
52	trans-1,4-dichloro-2-butene	110-57-6	RP231113CTH	94%	2,017.2	µg/mL	+/- 69.7251

53	n-Propylbenzene	103-65-1	095067T18C	99%	2,018.4	µg/mL	+/- 70.2434
54	Bromobenzene	108-86-1	MKCQ7174	99%	2,016.9	µg/mL	+/- 70.1919
55	1,3,5-Trimethylbenzene	108-67-8	BCCF4166	99%	2,017.0	µg/mL	+/- 70.1961
56	2-Chlorotoluene	95-49-8	235783M23T	99%	2,017.8	µg/mL	+/- 70.2253
57	4-Chlorotoluene	106-43-4	BCCG9286	99%	2,014.1	µg/mL	+/- 70.0958
58	tert-Butylbenzene	98-06-6	STBJ1937	99%	2,005.2	µg/mL	+/- 69.7868
59	1,2,4-Trimethylbenzene	95-63-6	MKCS3775	99%	2,015.9	µg/mL	+/- 70.1571
60	Pentachloroethane	76-01-7	13550700	97%	2,012.8	µg/mL	+/- 69.5699
61	sec-Butylbenzene	135-98-8	MKCP2266	99%	2,011.0	µg/mL	+/- 69.9872
62	p-Isopropyltoluene (p-Cymene)	99-87-6	MKCR6143	99%	2,014.6	µg/mL	+/- 70.1111
63	1,3-Dichlorobenzene	541-73-1	BCCD5315	99%	2,003.2	µg/mL	+/- 69.7020
64	1,4-Dichlorobenzene	106-46-7	MKBS7929V	99%	2,015.0	µg/mL	+/- 70.1108
65	n-Butylbenzene	104-51-8	09418JJ	99%	2,005.3	µg/mL	+/- 69.7882
66	1,2-Dichlorobenzene	95-50-1	SHBN3835	99%	2,009.0	µg/mL	+/- 69.9020
67	Hexachloroethane	67-72-1	QTORH	99%	2,016.0	µg/mL	+/- 69.6822
68	1,2-Dibromo-3-chloropropane	96-12-8	HBMVB	97%	2,005.1	µg/mL	+/- 69.7821
69	Nitrobenzene	98-95-3	10224044	99%	2,017.9	µg/mL	+/- 70.2256
70	1,2,4-Trichlorobenzene	120-82-1	SHBP5900	99%	2,015.0	µg/mL	+/- 70.1251
71	Hexachlorobutadiene	87-68-3	RP230823RSR	98%	2,001.7	µg/mL	+/- 69.6639
72	Naphthalene	91-20-3	STBL1057	99%	2,008.9	µg/mL	+/- 69.9149
73	1,2,3-Trichlorobenzene	87-61-6	MKBX7627V	99%	2,012.3	µg/mL	+/- 70.0318

* 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 pressure 30 psi

Temp. Program:
40°C (hold 6 min.) to 240°C
@ 6°C/min. (hold 10 min.)

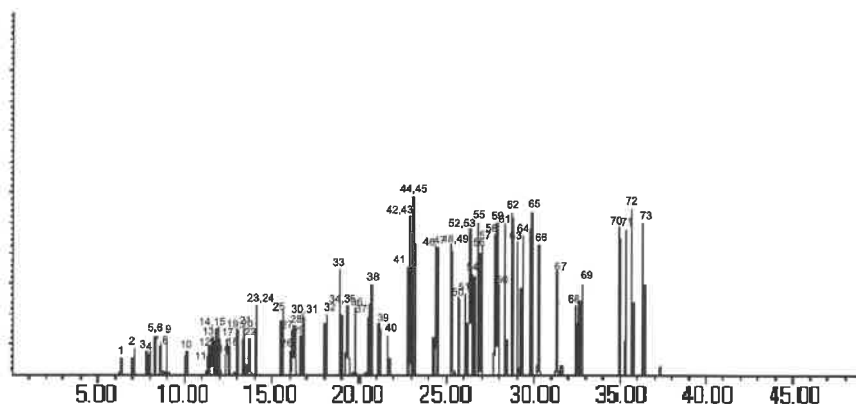
Inj. Temp:
200°C

Det. Temp:
250°C

Det. Type:
MSD

Split Vent:
20.0 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.

John Friedline - Operations Technician I

Date Mixed: 20-Nov-2023

Balance Serial # 1128342314

Dillan Murphy - Operations Technician I

Date Passed: 29-Nov-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:

$$U_{combined\ uncertainty} = k \sqrt{u_{gravimetric}^2 + u_{homogeneity}^2 + u_{storage\ stability}^2 + u_{shipping\ stability}^2}$$

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.



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



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.:** A0209618

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 : September 30, 2025 **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	SHBP3100	99%	2,019.3 µg/mL	+/- 69.7974
2	Vinyl acetate	108-05-4	RP231030CTH	98%	2,016.8 µg/mL	+/- 69.7112
3	Ethyl acetate	141-78-6	SHBQ9682	99%	2,010.7 µg/mL	+/- 69.4979
4	Isopropyl acetate	108-21-4	BCCG7069	99%	2,016.0 µg/mL	+/- 69.6822
5	Propyl acetate	109-60-4	P8XLN	99%	2,008.0 µg/mL	+/- 69.4057
6	Butyl acetate	123-86-4	SHBP6314	99%	2,007.3 µg/mL	+/- 69.3826
7	Amyl acetate	628-63-7	41325/1	97%	2,004.7 µg/mL	+/- 69.2905

* 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.)

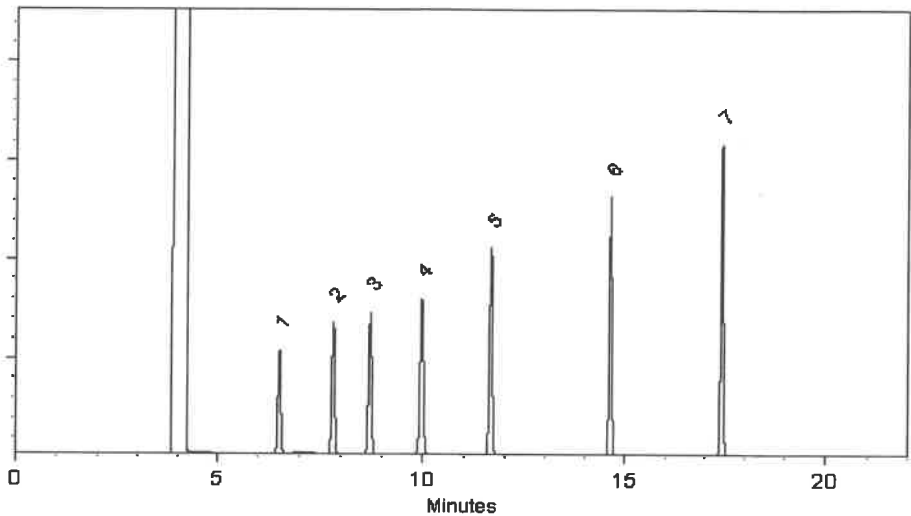
Inj. Temp:
200°C

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.

Sam Moodler
Sam Moodler - Operations Tech I

Date Mixed: 28-Mar-2024 Balance Serial # B707717271

Dylan Murphy
Dylan Murphy - Operations Technician I

Date Passed: 01-Apr-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/ μ ECD, 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:

$$U_{combined\ uncertainty} = k \sqrt{u_{gravimetric}^2 + u_{homogeneity}^2 + u_{storage\ stability}^2 + u_{shipping\ stability}^2}$$

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.



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



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.:** A0209618

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 : September 30, 2025 **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	SHBP3100	99%	2,019.3 µg/mL	+/- 69.7974
2	Vinyl acetate	108-05-4	RP231030CTH	98%	2,016.8 µg/mL	+/- 69.7112
3	Ethyl acetate	141-78-6	SHBQ9682	99%	2,010.7 µg/mL	+/- 69.4979
4	Isopropyl acetate	108-21-4	BCCG7069	99%	2,016.0 µg/mL	+/- 69.6822
5	Propyl acetate	109-60-4	P8XLN	99%	2,008.0 µg/mL	+/- 69.4057
6	Butyl acetate	123-86-4	SHBP6314	99%	2,007.3 µg/mL	+/- 69.3826
7	Amyl acetate	628-63-7	41325/1	97%	2,004.7 µg/mL	+/- 69.2905

* 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.)

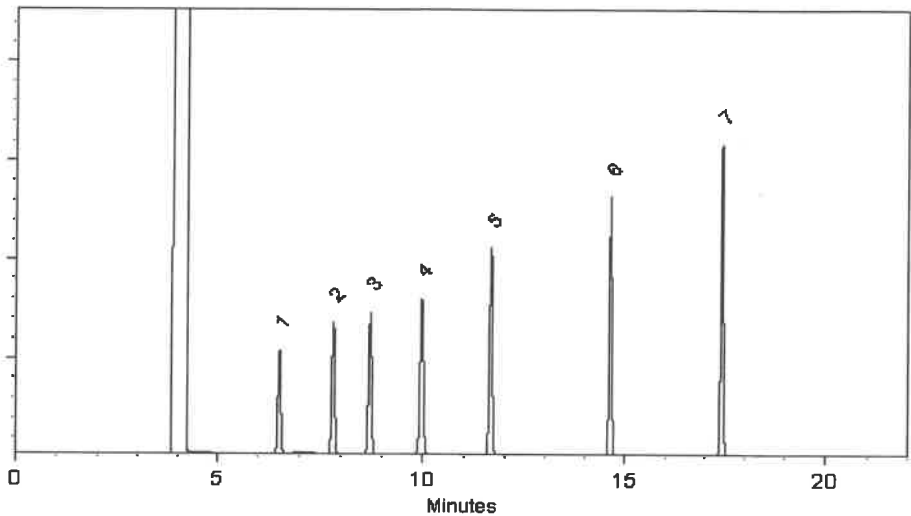
Inj. Temp:
200°C

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.

Sam Moodler
Sam Moodler - Operations Tech I

Date Mixed: 28-Mar-2024 Balance Serial # B707717271

Dylan Murphy
Dylan Murphy - Operations Technician I

Date Passed: 01-Apr-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:

$$U_{combined\ uncertainty} = k \sqrt{u_{gravimetric}^2 + u_{homogeneity}^2 + u_{storage\ stability}^2 + u_{shipping\ stability}^2}$$

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.



110 Benner Circle
Bellefonte, PA 16823-8812
Tel: 1-814-353-1300
Fax: 1-814-353-1309

www.restek.com

Dec 12/17/24
30 v. 4
CERTIFIED REFERENCE MATERIAL

Certificate of Analysis
chromatographic plus
V14697-to-14726



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.:** A0210618
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 : July 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	Acetone	67-64-1	SHBQ8504	99%	5,014.8 µg/mL	+/- 173.2883
2	2-Butanone (MEK)	78-93-3	SHBQ4704	99%	5,012.4 µg/mL	+/- 173.2054
3	4-Methyl-2-pentanone (MIBK)	108-10-1	SHBP9200	99%	5,011.6 µg/mL	+/- 173.1777
4	2-Hexanone	591-78-6	MKCQ6663	99%	5,013.0 µg/mL	+/- 173.2261

* 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:

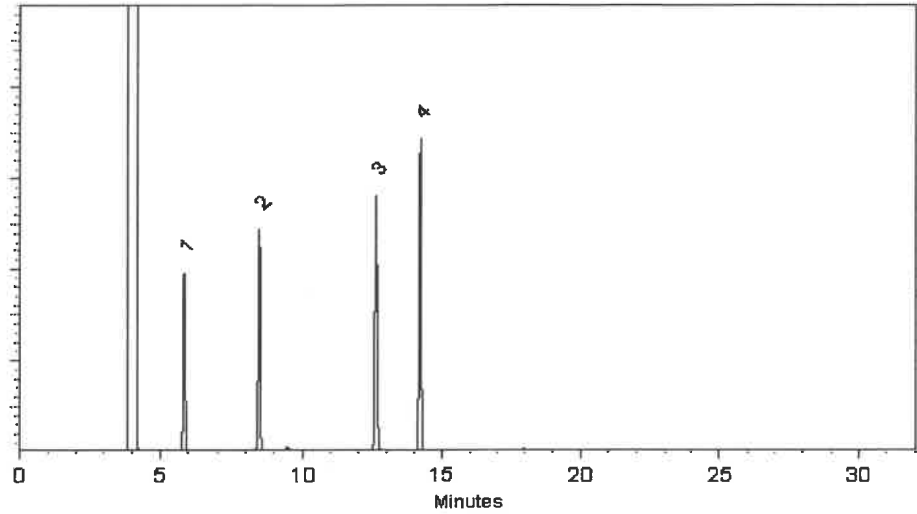
FID

Split Vent:

40 ml/min

Inj. Vol

1µl

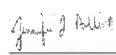


This chromatogram represents a general set of testing conditions chosen for product acceptance. For optimal results in your lab, conditions should be adjusted for your specific instrument, method, and application.


Dakota Parson - Operations Technician I

Date Mixed: 22-Apr-2024

Balance Serial # B707717271


Jennifer Pollino - Operations Tech III - ARM QC

Date Passed: 24-Apr-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:

$$U_{combined\ uncertainty} = k \sqrt{u_{gravimetric}^2 + u_{homogeneity}^2 + u_{storage\ stability}^2 + u_{shipping\ stability}^2}$$

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.



110 Benner Circle
Bellefonte, PA 16823-8812
Tel: 1-814-353-1300
Fax: 1-814-353-1309

www.restek.com

Dec 12/17/24
30 v. 4
CERTIFIED REFERENCE MATERIAL

Certificate of Analysis
chromatographic plus
V14697-to-14726



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.:** A0210618
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 : July 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	Acetone	67-64-1	SHBQ8504	99%	5,014.8 µg/mL	+/- 173.2883
2	2-Butanone (MEK)	78-93-3	SHBQ4704	99%	5,012.4 µg/mL	+/- 173.2054
3	4-Methyl-2-pentanone (MIBK)	108-10-1	SHBP9200	99%	5,011.6 µg/mL	+/- 173.1777
4	2-Hexanone	591-78-6	MKCQ6663	99%	5,013.0 µg/mL	+/- 173.2261

* 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:

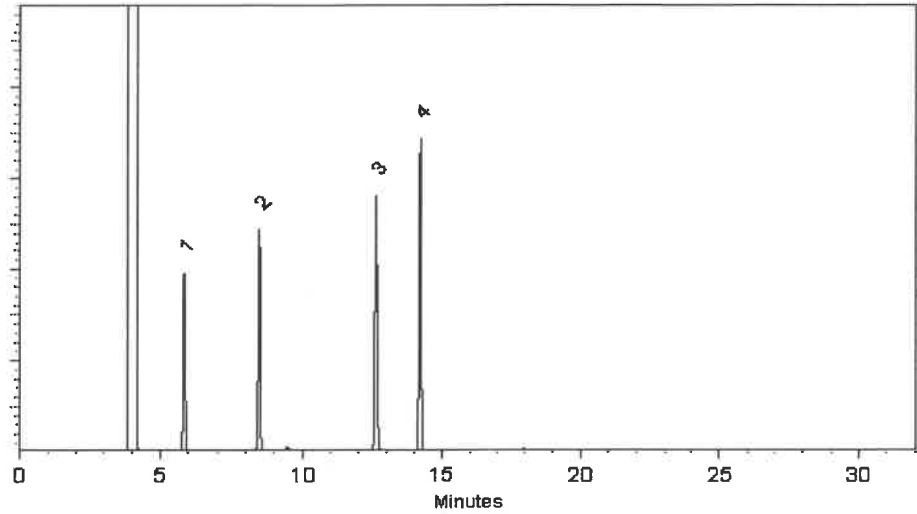
FID

Split Vent:

40 ml/min

Inj. Vol

1µl

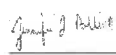


This chromatogram represents a general set of testing conditions chosen for product acceptance. For optimal results in your lab, conditions should be adjusted for your specific instrument, method, and application.


Dakota Parson - Operations Technician I

Date Mixed: 22-Apr-2024

Balance Serial # B707717271


Jennifer Pollino - Operations Tech III - ARM QC

Date Passed: 24-Apr-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:

$$U_{combined\ uncertainty} = k \sqrt{u_{gravimetric}^2 + u_{homogeneity}^2 + u_{storage\ stability}^2 + u_{shipping\ stability}^2}$$

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.



110 Benner Circle
Bellefonte, PA 16823-8812
Tel: 1-814-353-1300
Fax: 1-814-353-1309

www.restek.com

Dec 12/17/24
30 v. 4
CERTIFIED REFERENCE MATERIAL

Certificate of Analysis
chromatographic plus
V14697-to-14726



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.:** A0210618
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 : July 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	Acetone	67-64-1	SHBQ8504	99%	5,014.8 µg/mL	+/- 173.2883
2	2-Butanone (MEK)	78-93-3	SHBQ4704	99%	5,012.4 µg/mL	+/- 173.2054
3	4-Methyl-2-pentanone (MIBK)	108-10-1	SHBP9200	99%	5,011.6 µg/mL	+/- 173.1777
4	2-Hexanone	591-78-6	MKCQ6663	99%	5,013.0 µg/mL	+/- 173.2261

* 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:

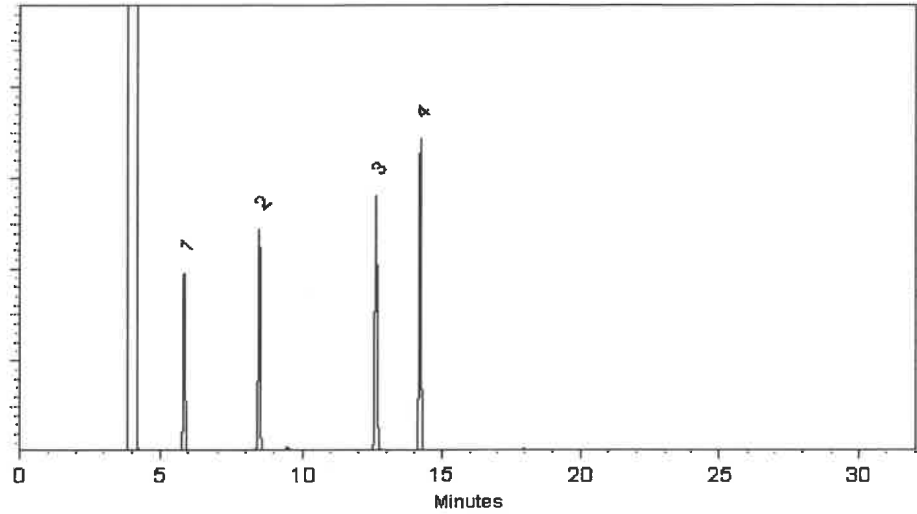
FID

Split Vent:

40 ml/min

Inj. Vol

1µl

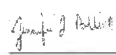


This chromatogram represents a general set of testing conditions chosen for product acceptance. For optimal results in your lab, conditions should be adjusted for your specific instrument, method, and application.


Dakota Parson - Operations Technician I

Date Mixed: 22-Apr-2024

Balance Serial # B707717271


Jennifer Pollino - Operations Tech III - ARM QC

Date Passed: 24-Apr-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:

$$U_{combined\ uncertainty} = k \sqrt{u_{gravimetric}^2 + u_{homogeneity}^2 + u_{storage\ stability}^2 + u_{shipping\ stability}^2}$$

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.



110 Benner Circle
Bellefonte, PA 16823-8812
Tel: 1-814-353-1300
Fax: 1-814-353-1309

www.restek.com

Rec 12/17/24
CERTIFIED REFERENCE MATERIAL
30 ml

Certificate of Analysis

chromatographic plus

V14727 to
V14756



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:

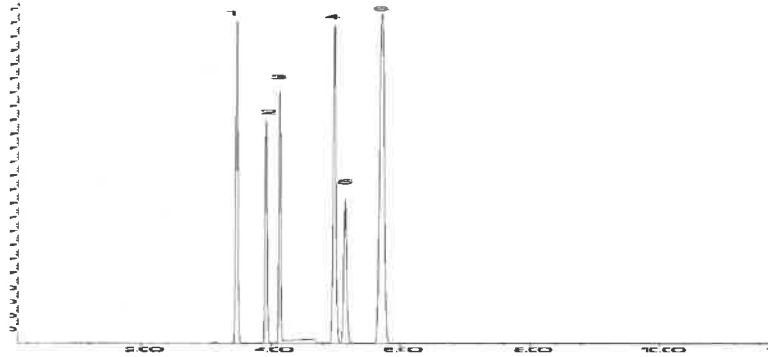
MSD

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 Suckal - 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.
- 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:

$$U_{combined\ uncertainty} = k \sqrt{u_{gravimetric}^2 + u_{homogeneity}^2 + u_{storage\ stability}^2 + u_{shipping\ stability}^2}$$

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.



110 Benner Circle
Bellefonte, PA 16823-8812
Tel: 1-814-353-1300
Fax: 1-814-353-1309

www.restek.com

Rec 12/17/24
30 ml
CERTIFIED REFERENCE MATERIAL

Certificate of Analysis
chromatographic plus
V14727 to
V14756



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:

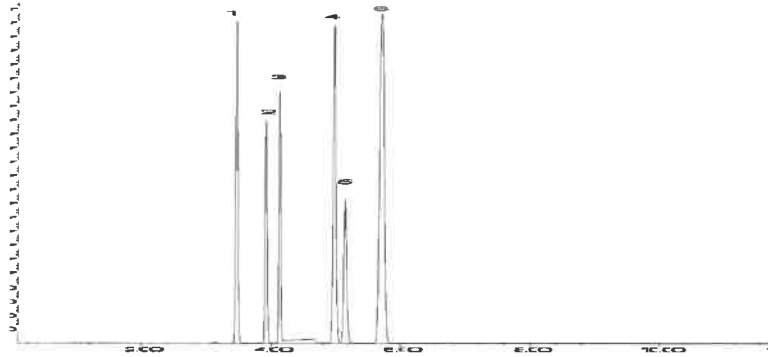
MSD

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 Suckal - 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.
- 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:

$$U_{combined\ uncertainty} = k \sqrt{u_{gravimetric}^2 + u_{homogeneity}^2 + u_{storage\ stability}^2 + u_{shipping\ stability}^2}$$

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.



110 Benner Circle
Bellefonte, PA 16823-8812
Tel: 1-814-353-1300
Fax: 1-814-353-1309

www.restek.com

2014 Dec 01/08/21
CERTIFIED REFERENCE MATERIAL

Certificate of Analysis

chromatographic

V14803 - V14822



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:

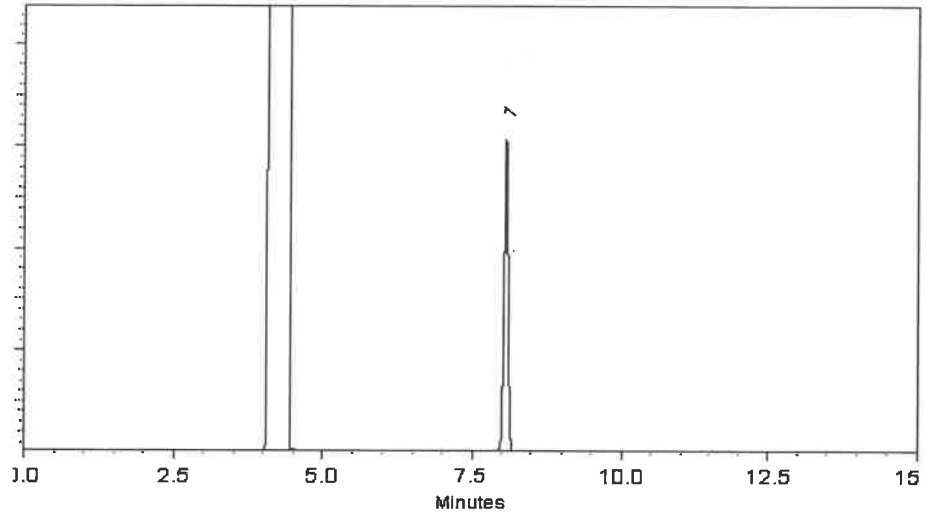
FID

Split Vent:

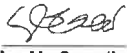
40 ml/min

Inj. Vol

1µl

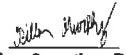


This chromatogram represents a general set of testing conditions chosen for product acceptance. For optimal results in your lab, conditions should be adjusted for your specific instrument, method, and application.


Ethan Winiarski - Operations Tech I

Date Mixed: 24-Dec-2024

Balance Serial # 1127510105


Dillan Murphy - Operations Technician I

Date Passed: 02-Jan-2025

REVIEWED
By Jennifer Pollock at 7:12 am, Jan 05, 2025

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:

$$U_{combined\ uncertainty} = k \sqrt{u_{gravimetric}^2 + u_{homogeneity}^2 + u_{storage\ stability}^2 + u_{shipping\ stability}^2}$$

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.



110 Benner Circle
Bellefonte, PA 16823-8812
Tel: 1-814-353-1300
Fax: 1-814-353-1309

www.restek.com

10 vol Rec 01/08/25
CERTIFIED REFERENCE MATERIAL

Certificate of Analysis

chromatographic

V14793 to 14802



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-FL **Lot No.:** A0220563
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%	8,060.0 µg/mL	+/- 278.5905

* 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:

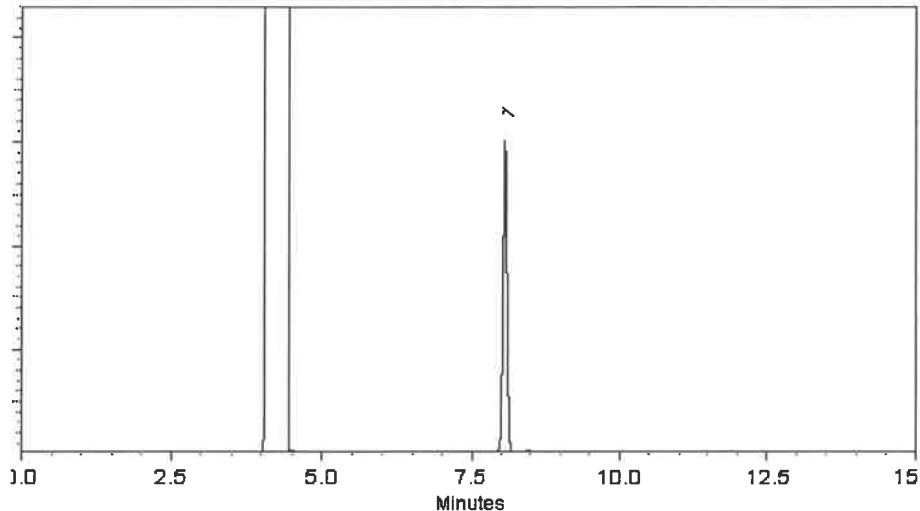
FID

Split Vent:

40 ml/min

Inj. Vol

1µl

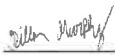


This chromatogram represents a general set of testing conditions chosen for product acceptance. For optimal results in your lab, conditions should be adjusted for your specific instrument, method, and application.


Tom Suckal - Mix Technician

Date Mixed: 30-Dec-2024

Balance Serial # B345965662


Dillan Murphy - Operations Technician I

Date Passed: 02-Jan-2025

REVIEWED
By Jennifer Poffine at 7:11 am, Jan 03, 2025

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:

$$U_{combined\ uncertainty} = k \sqrt{u_{gravimetric}^2 + u_{homogeneity}^2 + u_{storage\ stability}^2 + u_{shipping\ stability}^2}$$

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.



110 Benner Circle
Bellefonte, PA 16823-8812
Tel: 1-814-353-1300
Fax: 1-814-353-1309

www.restek.com

Dec 01/16/25
5 vial
CERTIFIED REFERENCE MATERIAL

Certificate of Analysis

chromatographic
V14837 to
V14841



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. : 560065 **Lot No.:** A0220861
Description : Custom 524 Standard
Custom 524 Standard 2,000-10,000µg/mL, P&T Methanol, 1mL/ampul
Container Size : 2 mL **Pkg Amt:** > 1 mL
Expiration Date : January 31, 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	1,1,2-Trichlorotrifluoroethane (CFC-113)	76-13-1	00022779	99%	2,009.0 µg/mL	+/- 69.4402
2	tert-Butanol (TBA)	75-65-0	SHBR5545	99%	10,036.0 µg/mL	+/- 346.8674
3	Acrylonitrile	107-13-1	102466R02E	99%	2,015.0 µg/mL	+/- 69.6476
4	Propionitrile	107-12-0	BCCL0691	99%	8,074.0 µg/mL	+/- 279.0744
5	Tetrahydrofuran	109-99-9	SHBR7392	99%	2,009.0 µg/mL	+/- 69.4402
6	Cyclohexane	110-82-7	SHBS0091	99%	2,014.0 µg/mL	+/- 69.6131
7	Methylcyclohexane	108-87-2	SHBR3777	99%	2,015.0 µg/mL	+/- 69.6476
8	Methyl methacrylate	80-62-6	MKCQ2756	99%	2,011.0 µg/mL	+/- 69.5094
9	trans-1,4-dichloro-2-butene	110-57-6	RD240719ECSB	97%	2,013.7 µg/mL	+/- 69.6034
10	Nitrobenzene	98-95-3	10224044	99%	8,026.0 µg/mL	+/- 277.4153

* 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 pressure 30 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:

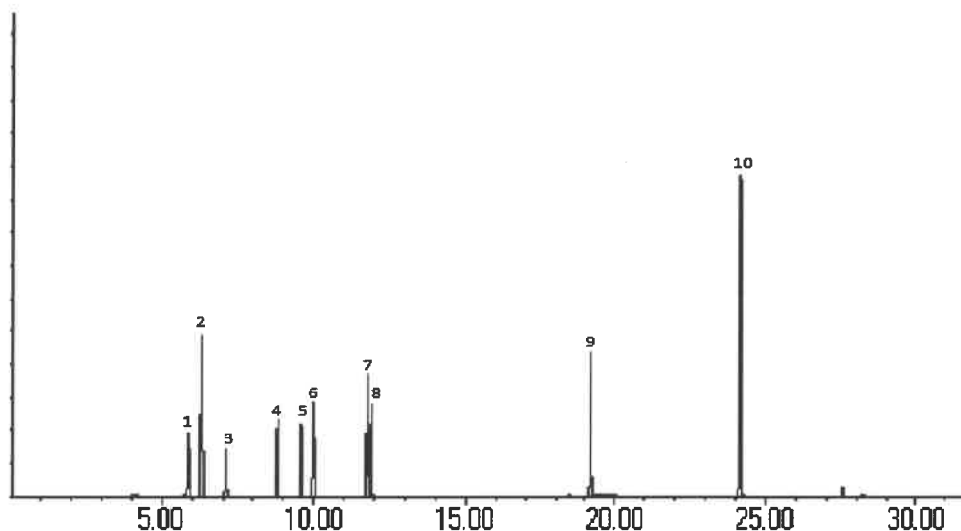
MSD

Split Vent:

25.0 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.

Morgan Cralghead - Mix Technician

Date Mixed: 07-Jan-2025

Balance Serial # 1128342314

Dillan Murphy - Operations Technician I

Date Passed: 10-Jan-2025



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:

$$U_{combined\ uncertainty} = k \sqrt{u_{gravimetric}^2 + u_{homogeneity}^2 + u_{storage\ stability}^2 + u_{shipping\ stability}^2}$$

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
ULTRA RESI-ANALYZED
For Purge and Trap Analysis



Material No.: 9077-02
Batch No.: 22L0562016
Manufactured Date: 2022-10-26
Expiration Date: 2025-10-25
Revision No.: 0

Certificate of Analysis

Test	Specification	Result
Assay (CH ₃ OH) (by GC, corrected for water)	≥ 99.9 %	100.0 %
Residue after Evaporation	≤ 1.0 ppm	0.2 ppm
Titration Acid (μeq/g)	≤ 0.3	0.2
Titration 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

Jamie Ethier
Vice President Global Quality



SHIPPING DOCUMENTS

- 1
- 2
- 3
- 4
- 5
- 6
- 7
- 8
- 9
- 10
- 11
- 12
- 13
- 14
- 15
- 16



A Phenomenex®
Company

Packing List

6390 Joyce Dr., #100
Golden, CO 80403

Tel: +1-303-940-0033
Fax: +1-303-940-0043
info@phenova.com
www.phenova.com

Date	Order #
01/13/2025	333291



For terms and conditions of your order, please visit:
www.phenova.com/home/termsofsale

Ship To

Alliance Tech Group - Newark
ATTN: Sohil Jodhani
284 Sheffield St., #1
Mountainside, NJ 07092
USA

Received by: MA
01/15/2025 10:00

Customer PO #	Terms	PT Acct #	Customer #	Ship Via	F.O.B.
PO2-974	Net 30	ZCM-100	1500470	FedEx 2nd Day	Golden, CO

Qty Ordered	Qty Shipped	Qty Backorder	Part Number	Part Description	Study Number	Lot Number
			PT-TMSET-WS	WS Trace Metals Set : (TM and HG)		
1	1	0	PT-TM-WS	WS Trace Metals 1	WS0125	9099-04B
1	1	0	PT-HG-WS	WS Trace Metals Mercury	WS0125	9099-05
1	1	0	PT-MIN-WS	WS Minerals Only	WS0125	9099-51
1	1	0	PT-TURB-WS	WS Turbidity	WS0125	9099-13
1	1	0	PT-SIO2-WS	WS Silica	WS0125	9099-17
1	1	0	PT-RVOA-WS	WS Regulated Volatiles	WS0125	9099-21
1	1	0	PT-UNRVOA-WS	WS Unregulated Volatiles	WS0125	9099-22
1	1	0	PT-THM-WS	WS Trihalomethanes	WS0125	9099-23
1	1	0	PT-EDBCP-WS	WS EDB/DBCP/TCP	WS0125	9099-27
1	1	0	PT-ADD-WS	WS Gasoline Additives	WS0125	9099-36

Laboratory Certification

Certified By	License No.
CAS EPA CLP Contract	68HERH20D0011
Connecticut	PH-0830
DOD ELAP (ANAB)	L2219
Maine	2024021
Maryland	296
New Hampshire	255424 Rev 1
New Jersey	20012
New York	11376
Pennsylvania	68-00548
Soil Permit	525-24-234-08441
Texas	T104704488