

Data Path : Z:\voasrv\HPCHEM1\MSVOA L\Data\VL091621\
 Data File : VL037624.D
 Acq On : 16 Sep 2021 20:46
 Operator : SY/AP
 Sample : M3780-01DL 10X
 Misc : 400mL/MSVOA L
 ALS Vial : 1 Sample Multiplier: 1

Instrument :
 MSVOA_L
 ClientSampleId :
 SV1DL

Manual Integrations
 APPROVED

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 9/20/2021 5:27:20 PM

Quant Time: Sep 17 10:04:09 2021
 Quant Method : Z:\VOASRV\HPCHEM1\MSVOA L\METHODS\VL091621AIR.M
 Quant Title : AIR ANALYSIS BY METHOD TO-15 Instrument: MSVOA_L Thu Sep 17 10:04:09 2021
 QLast Update : Thu Sep 16 13:42:46 2021
 Response via : Initial Calibration

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Bromochloromethane	5.65	49	1577285	10.00	ppbv	0.00
33) 1,4-Difluorobenzene	7.16	114	4483981	10.00	ppbv	0.00
55) Chlorobenzene-d5	12.06	117	3962762	10.00	ppbv	0.00

System Monitoring Compounds						
68) 1-Bromo-4-Fluorobenzene	14.39	95	2855783	9.97	ppbv	0.00
Spiked Amount	10.000	Range	65 - 135	Recovery	=	99.70%

Target Compounds	R.T.	QIon	Response	Conc	Units	Ovalue
9) Propene	3.01	41	159382m	1.519	ppbv	
10) Heptane	8.10	43	42289m	0.173	ppbv	
13) Ethanol	3.59	45	607170m	59.149	ppbv	
15) Acetone	3.83	43	2075110	12.663	ppbv	97
19) Isopropyl Alcohol	3.95	45	223624m	2.508	ppbv	
26) Hexane	5.67	57	361168	1.916	ppbv #	38
29) Chloroform	5.74	83	433452	1.574	ppbv	99
34) 2-Butanone	5.23	43	259403m	1.424	ppbv	
41) Tetrahydrofuran	6.05	42	26346m	0.308	ppbv	
51) 2-Hexanone	10.12	43	136476m	1.337	ppbv	
52) Tetrachloroethene	11.20	164	32810m	0.229	ppbv	
53) Toluene	9.78	91	125516	0.302	ppbv	95
58) Ethyl Benzene	12.69	91	74874m	0.142	ppbv	
59) m/p-Xylene	12.95	91	259240m	0.566	ppbv	
60) o-Xylene	13.67	91	152701	0.350	ppbv	99
72) 4-Ethyltoluene	15.82	105	92707m	0.185	ppbv	
73) 1,3,5-Trimethylbenzene	15.97	105	76018	0.163	ppbv	97
74) 1,2,4-Trimethylbenzene	16.74	105	413211	0.840	ppbv #	72
79) Naphthalene	22.15	128	42501m	0.141	ppbv	

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

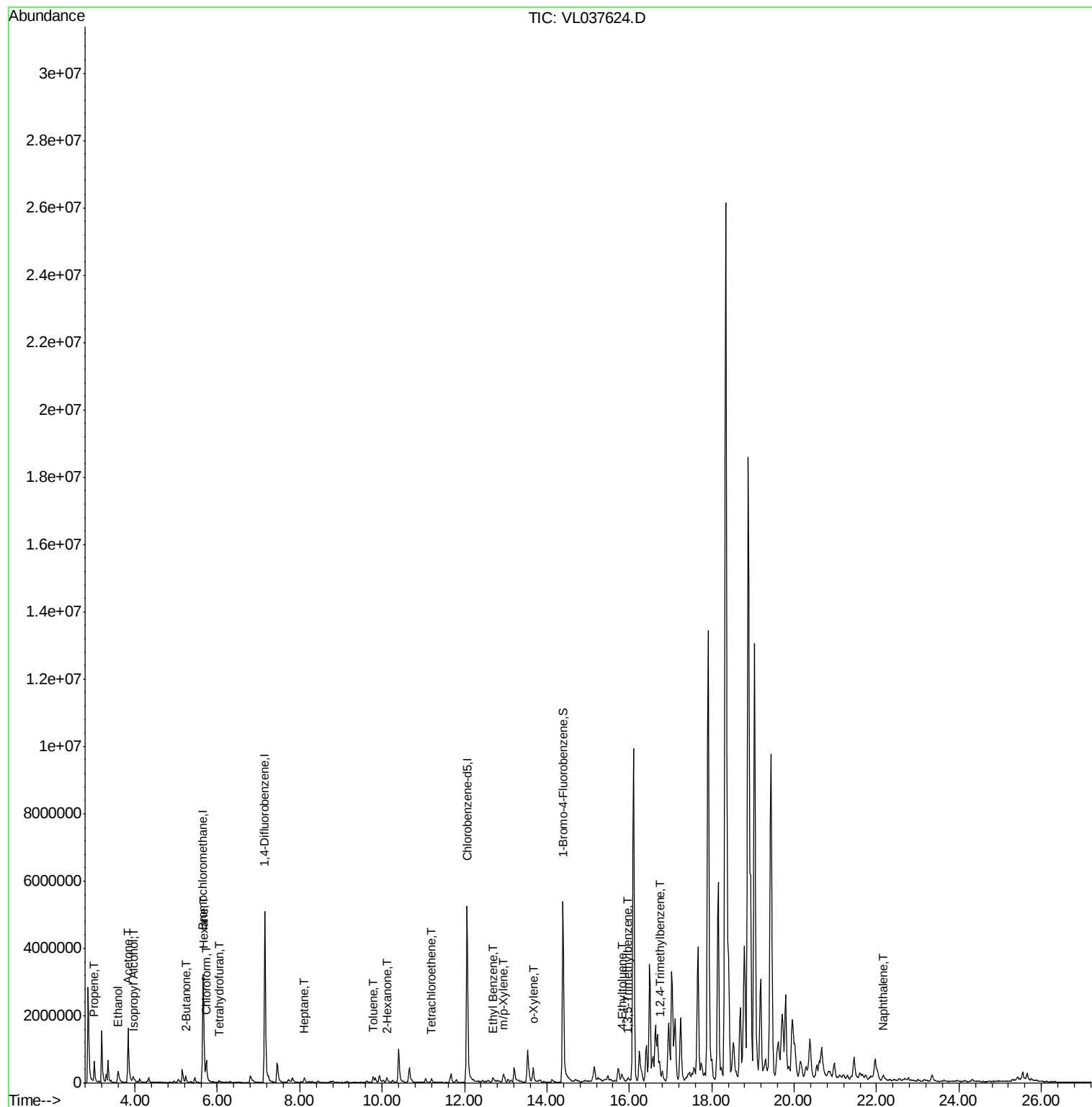
Data Path : Z:\voasrv\HPCHEM1\MSVOA L\Data\VL091621\
Data File : VL037624.D
Acq On : 16 Sep 2021 20:46
Operator : SY/AP
Sample : M3780-01DL 10X
Misc : 400mL/MSVOA L
ALS Vial : 1 Sample Multiplier: 1

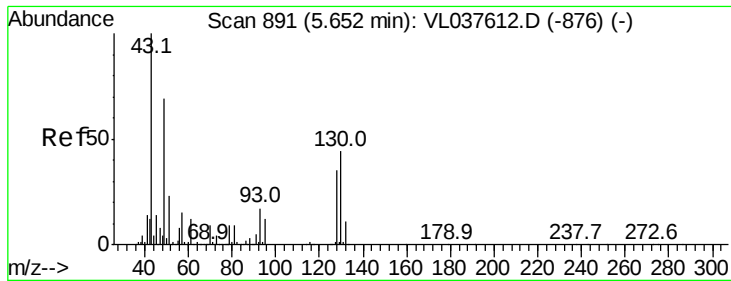
Instrument :
MSVOA_L
ClientSampleId :
SV1DL

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Quant Time: Sep 17 10:04:09 2021
Quant Method : Z:\VOASRV\HPCHEM1\MSVOA L\METHODS\VL091621AIR.M
Quant Title : AIR ANALYSIS BY METHOD TO-15 Instrument: MSVOA_L Thu Sep
QLast Update : Thu Sep 16 13:42:46 2021
Response via : Initial Calibration





#1

Bromochloromethane

Concen: 10.000 ppbv

RT: 5.65 min Scan# 890

Delta R.T. -0.00 min

Lab File: VL037624.D

Acq: 16 Sep 2021 20:46

Instrument :

MSVOA_L

ClientSampled :

SV1DL

Tot Ion: 49 Resp: 1577285

Ion Ratio Lower Upper

49 100

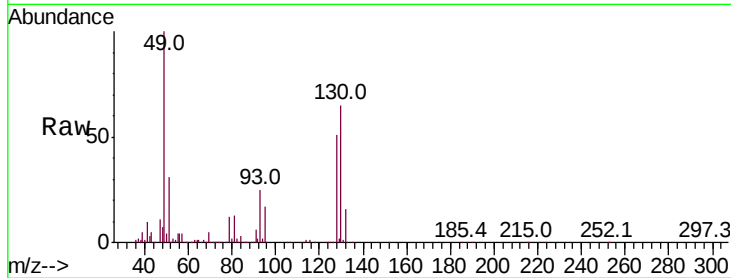
128 53.5 27.9 83.6

130 67.9 33.9 101.7

Manual Integrations
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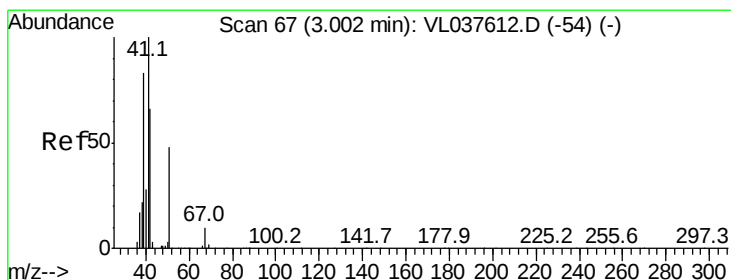
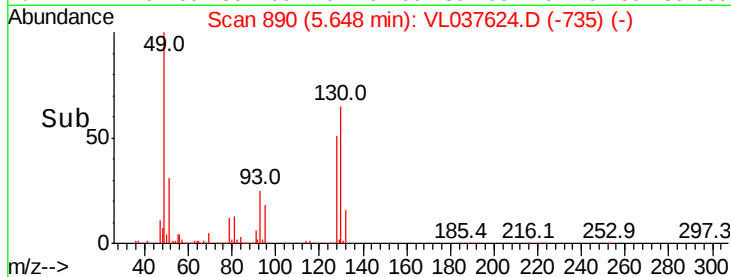
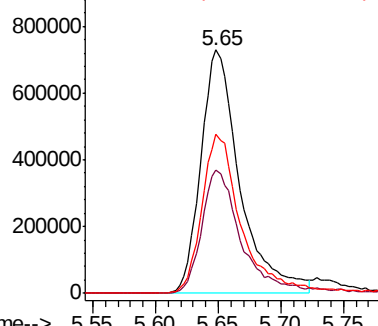
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Abundance Ion 49.10 (48.80 to 49.80): VL0

Ion 128.00 (127.70 to 128.70): VL0

Ion 130.00 (129.70 to 130.70): VL0



#9

Propene

Concen: 1.519 ppbv m

RT: 3.01 min Scan# 70

Delta R.T. 0.01 min

Lab File: VL037624.D

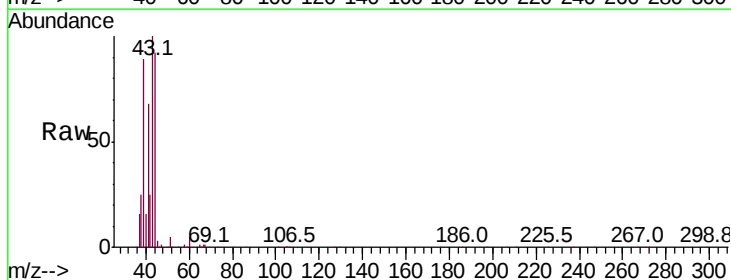
Acq: 16 Sep 2021 20:46

Tgt Ion: 41 Resp: 159382

Ion Ratio Lower Upper

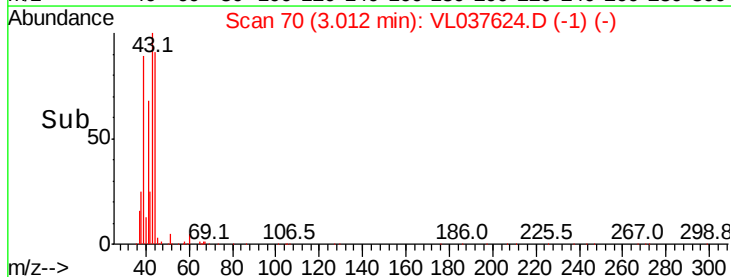
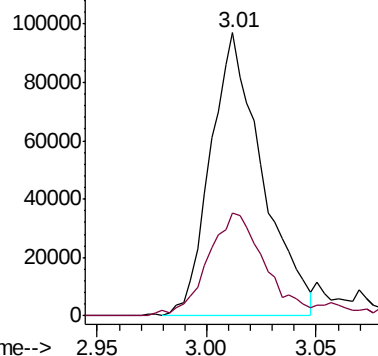
41 100

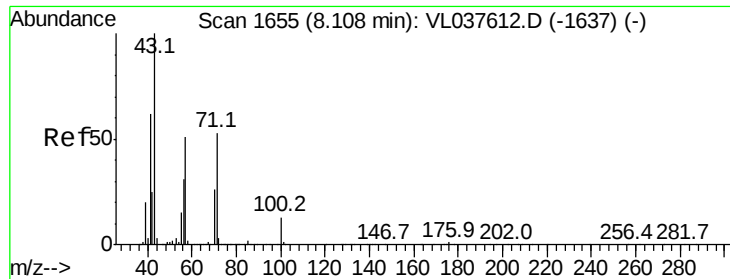
42 233.9 57.2 85.8#



Abundance Ion 41.10 (40.80 to 41.80): VL0

Ion 42.10 (41.80 to 42.80): VL0





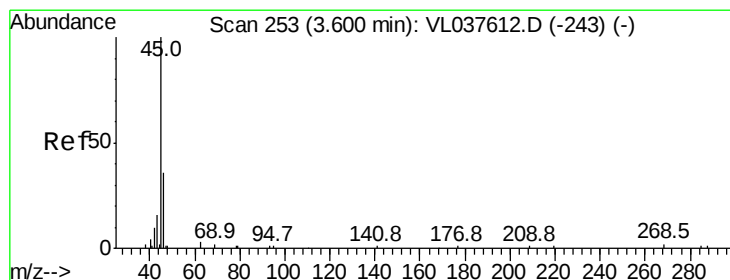
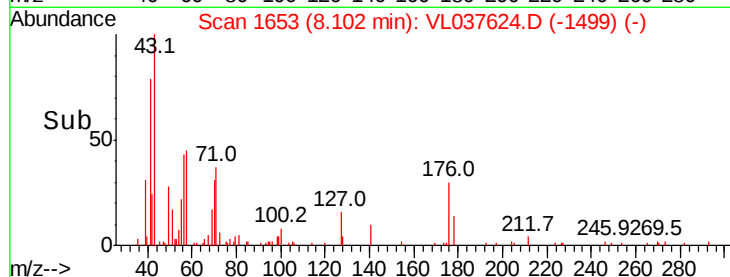
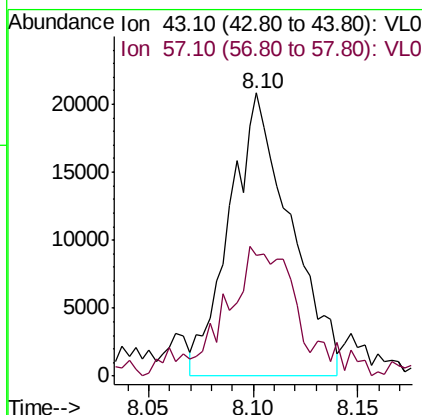
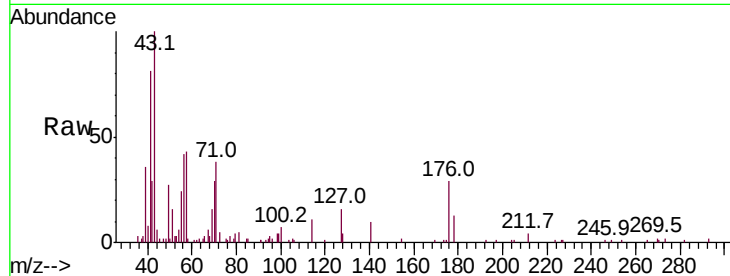
#10
Heptane
Concen: 0.173 ppbv m
RT: 8.10 min Scan# 1653
Delta R.T. -0.01 min
Lab File: VL037624.D
Acq: 16 Sep 2021 20:46

Instrument :
MSVOA_L
ClientSampleId :
SV1DL

Tot Ion: 43 Resp: 42289
Ion Ratio Lower Upper
43 100
57 57.5 40.1 60.1

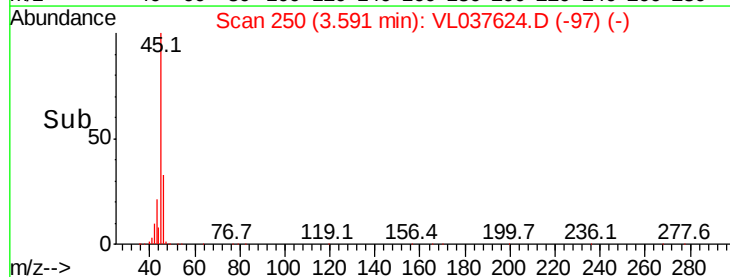
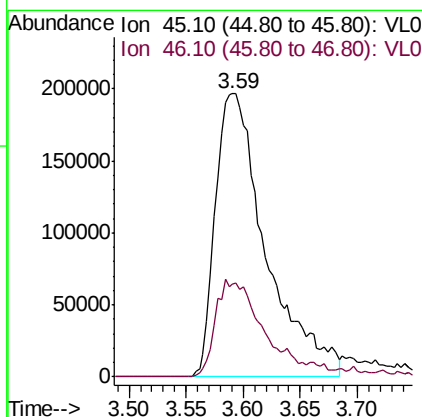
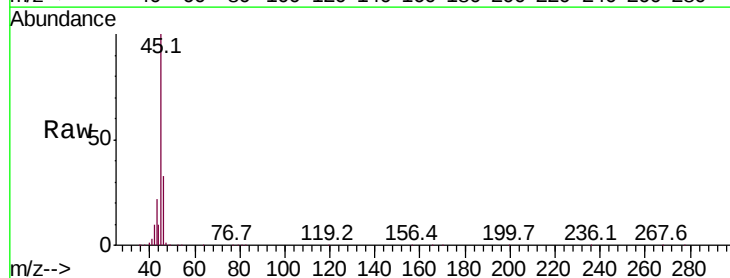
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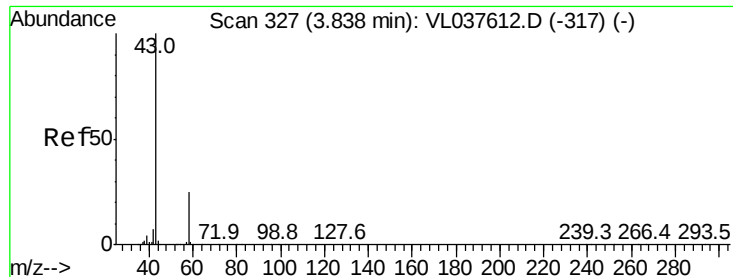
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#13
Ethanol
Concen: 59.149 ppbv m
RT: 3.59 min Scan# 250
Delta R.T. -0.01 min
Lab File: VL037624.D
Acq: 16 Sep 2021 20:46

Tgt Ion: 45 Resp: 607170
Ion Ratio Lower Upper
45 100
46 36.7 17.2 68.8





#15

Acetone

Concen: 12.663 ppbv

RT: 3.83 min Scan# 326

Delta R.T. -0.00 min

Lab File: VL037624.D

Acq: 16 Sep 2021 20:46

Instrument :

MSVOA_L

ClientSampleId :

SV1DL

Tot Ion: 43 Resp: 2075110

Ion Ratio Lower Upper

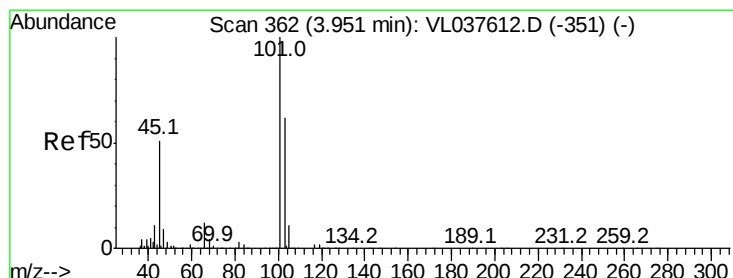
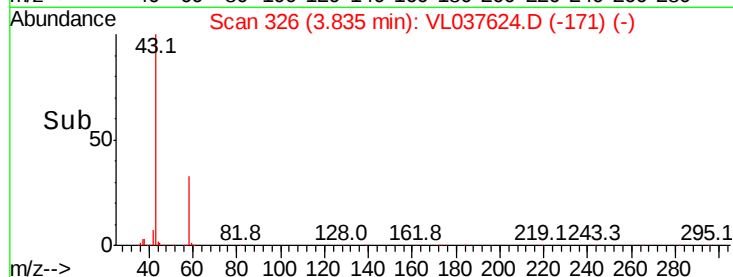
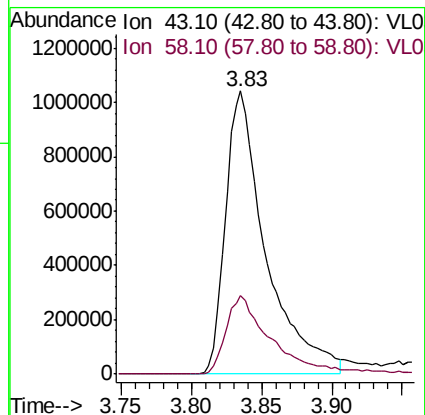
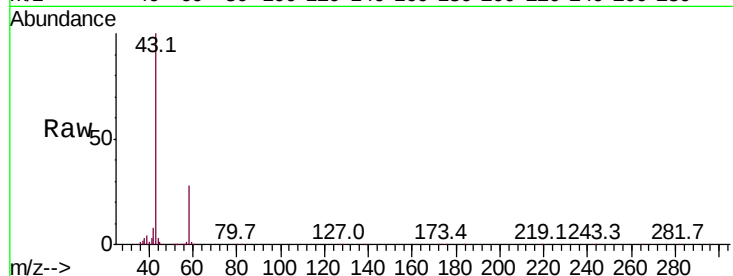
43 100

58 32.9 24.9 37.3

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#19

Isopropyl Alcohol

Concen: 2.508 ppbv m

RT: 3.95 min Scan# 362

Delta R.T. 0.00 min

Lab File: VL037624.D

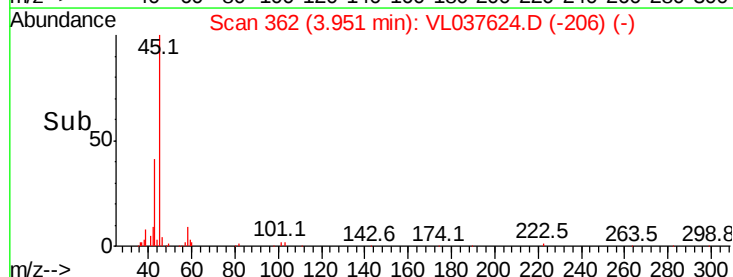
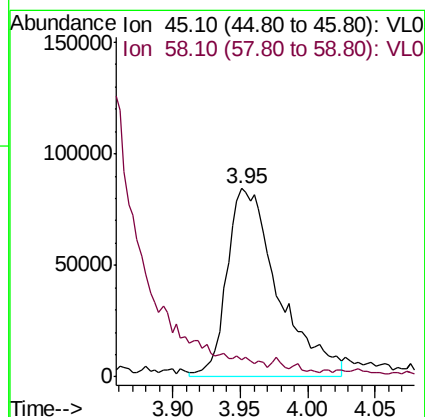
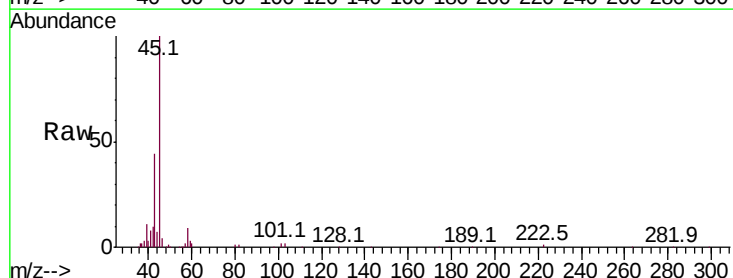
Acq: 16 Sep 2021 20:46

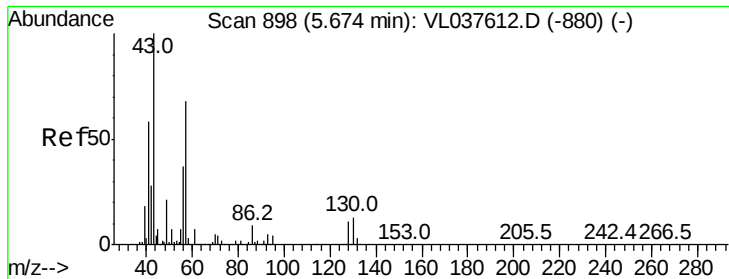
Tgt Ion: 45 Resp: 223624

Ion Ratio Lower Upper

45 100

58 0.0 2.9 4.3#





#26

Hexane

Concen: 1.916 ppbv

RT: 5.67 min Scan# 897

Delta R.T. -0.00 min

Lab File: VL037624.D

Acq: 16 Sep 2021 20:46

Instrument :

MSVOA_L

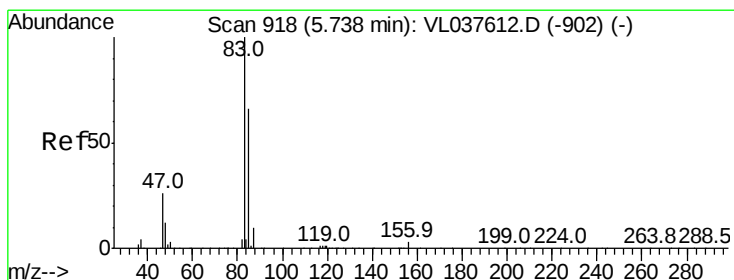
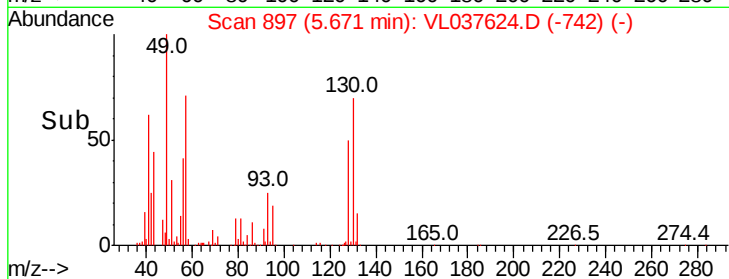
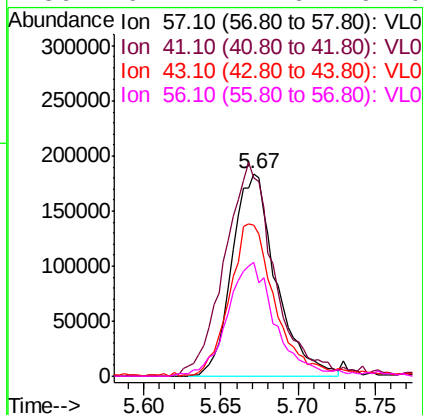
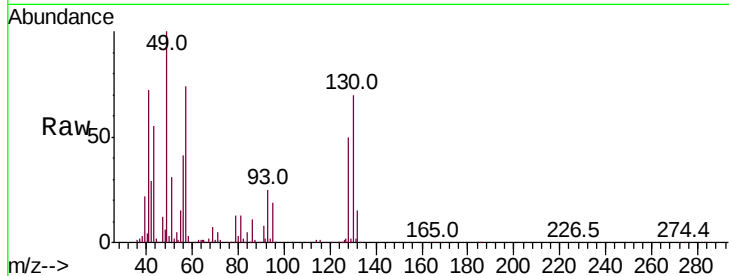
ClientSampleID :

SV1DL

Tot Ion	57	Resp	361168
Ion Ratio	Lower	Upper	
57	100		
41	122.8	70.9	106.3#
43	79.0	170.4	255.6#
56	62.2	42.6	64.0

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#29

Chloroform

Concen: 1.574 ppbv

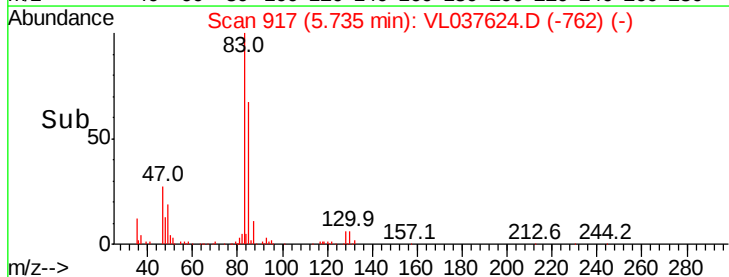
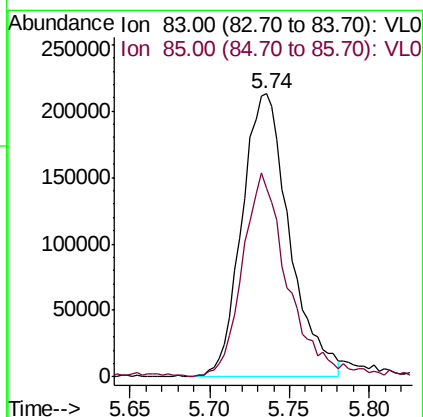
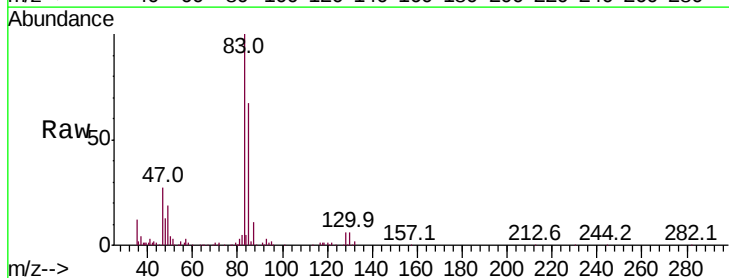
RT: 5.74 min Scan# 917

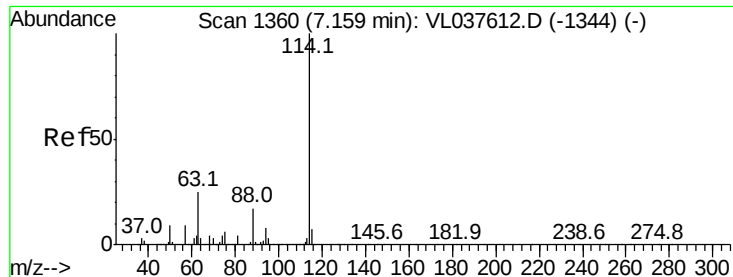
Delta R.T. -0.00 min

Lab File: VL037624.D

Acq: 16 Sep 2021 20:46

Tgt Ion	83	Resp	433452
Ion Ratio	Lower	Upper	
83	100		
85	66.3	52.6	79.0





#33

1,4-Difluorobenzene

Concen: 10.000 ppbv

RT: 7.16 min Scan# 1359

Delta R.T. -0.00 min

Lab File: VL037624.D

Acq: 16 Sep 2021 20:46

Instrument :

MSVOA_L

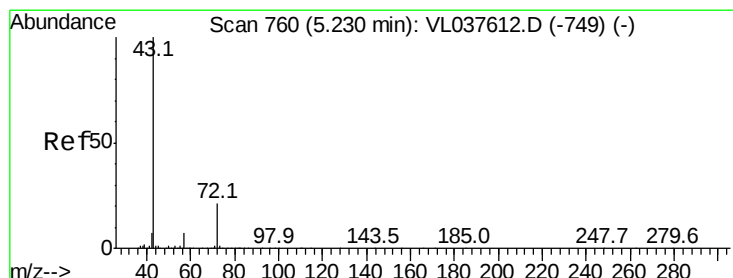
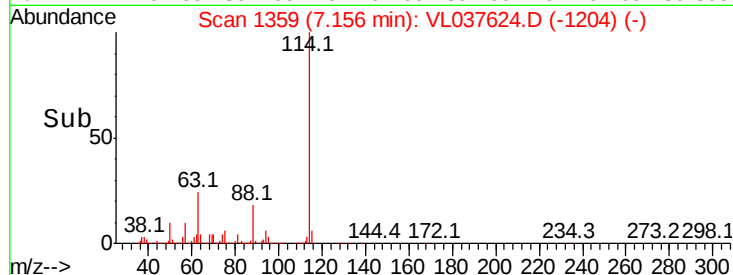
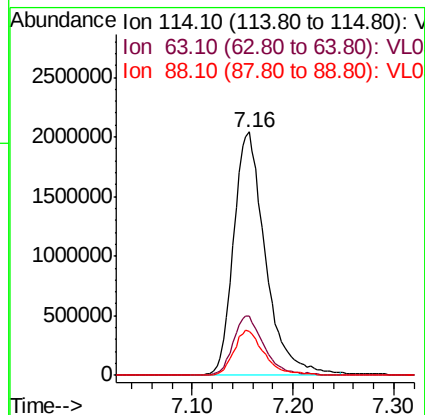
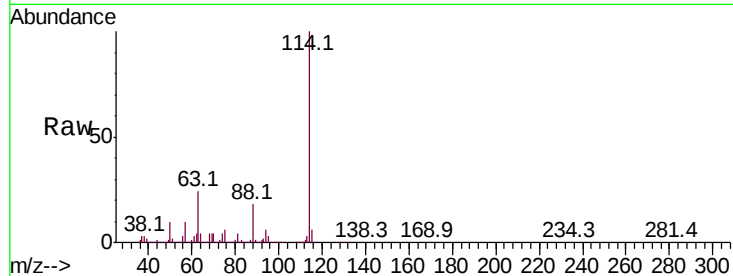
ClientSampled :

SV1DL

Tot Ion:	114	Resp:	4483981
Ion	Ratio	Lower	Upper
114	100		
63	24.0	19.6	29.4
88	18.1	14.2	21.4

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#34

2-Butanone

Concen: 1.424 ppbv m

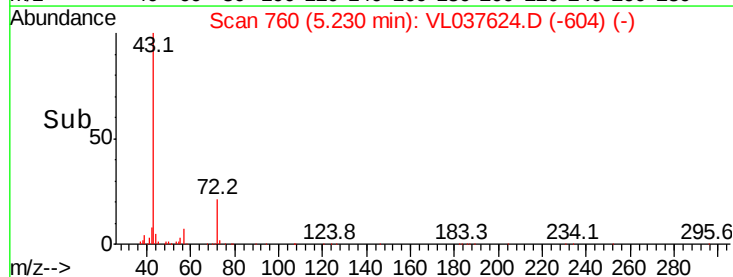
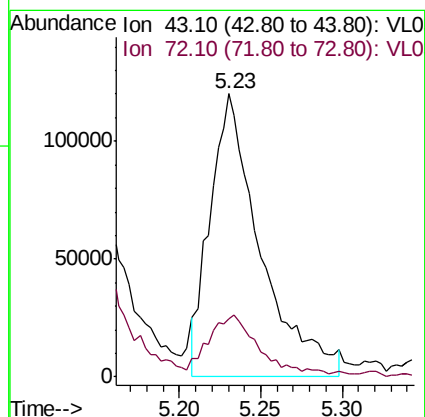
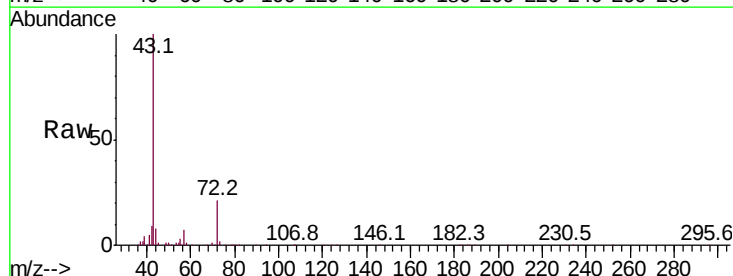
RT: 5.23 min Scan# 760

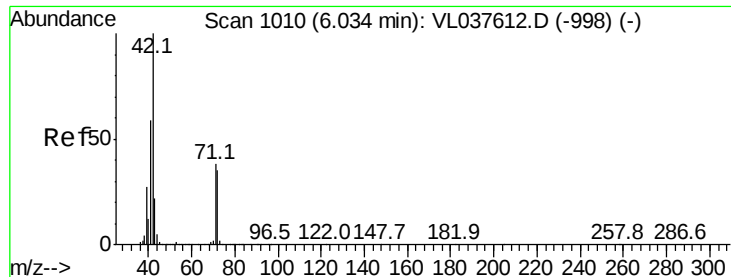
Delta R.T. 0.00 min

Lab File: VL037624.D

Acq: 16 Sep 2021 20:46

Tgt Ion:	43	Resp:	259403
Ion	Ratio	Lower	Upper
43	100		
72	24.2	18.4	27.6





#41

Tetrahydrofuran

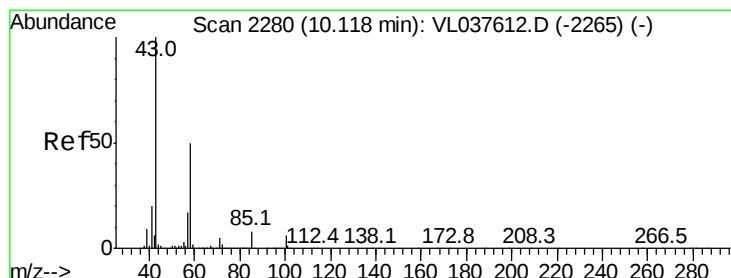
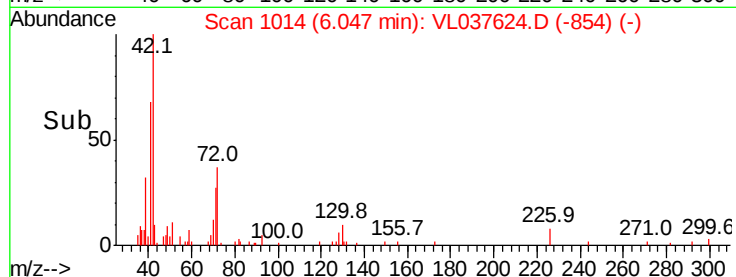
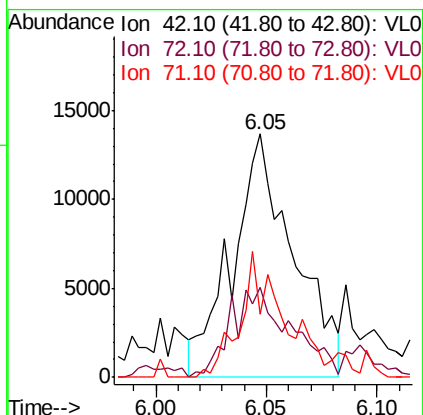
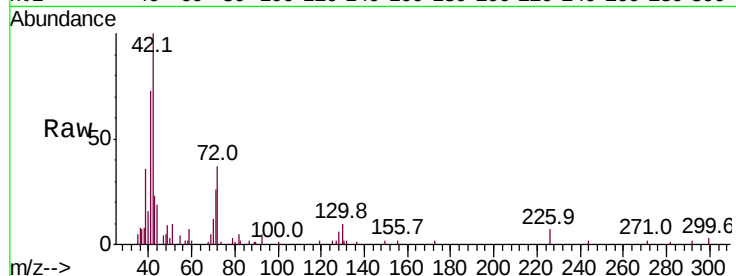
Concen: 0.308 ppbv m
RT: 6.05 min Scan# 1014
Delta R.T. 0.01 min
Lab File: VL037624.D
Acq: 16 Sep 2021 20:46

Instrument :
MSVOA_L
ClientSampleId :
SV1DL

Tot Ion	Ratio	Lower	Upper
42	100		
72	39.0	31.4	47.2
71	40.6	30.6	46.0

Manual Integrations
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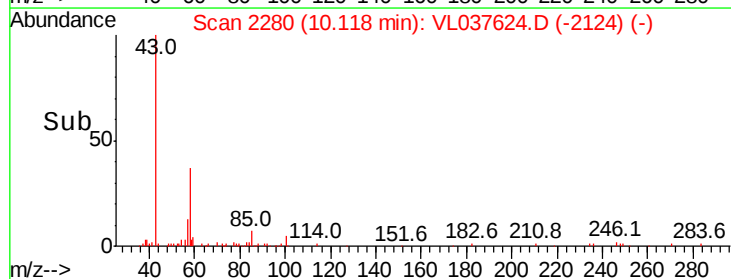
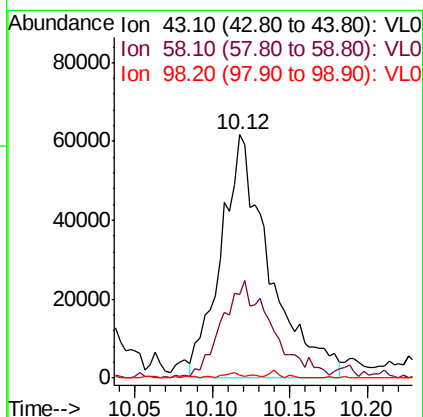
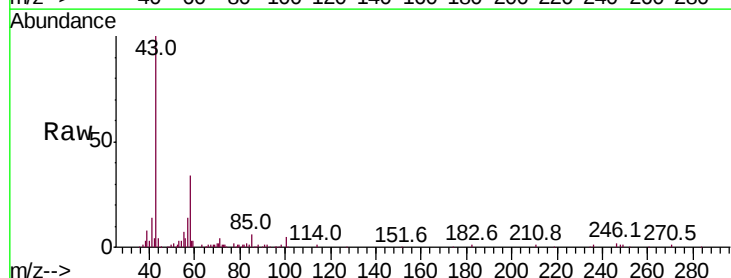


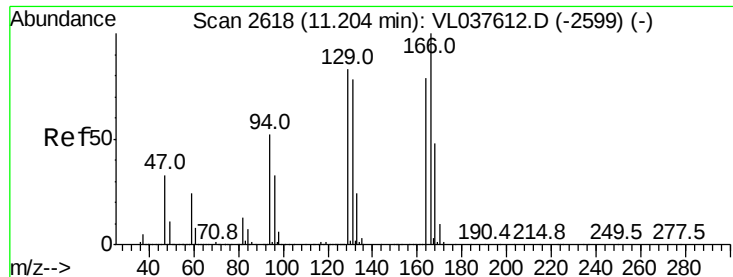
#51

2-Hexanone

Concen: 1.337 ppbv m
RT: 10.12 min Scan# 2280
Delta R.T. 0.00 min
Lab File: VL037624.D
Acq: 16 Sep 2021 20:46

Tgt Ion	Ratio	Lower	Upper
43	100		
58	44.6	39.3	58.9
98	0.0	0.4	0.6#





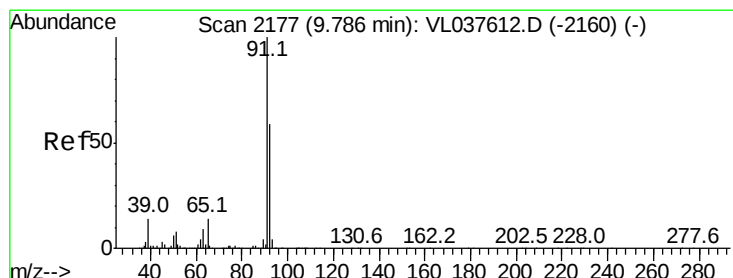
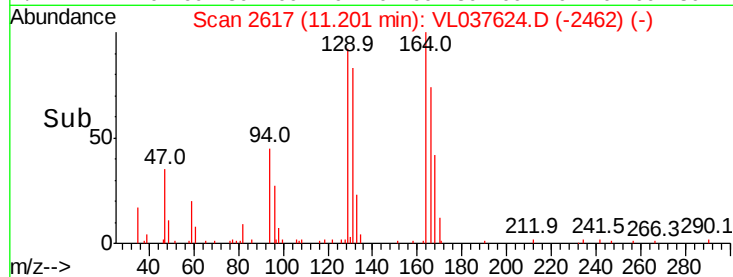
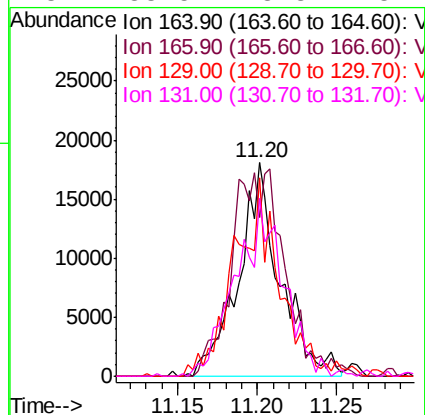
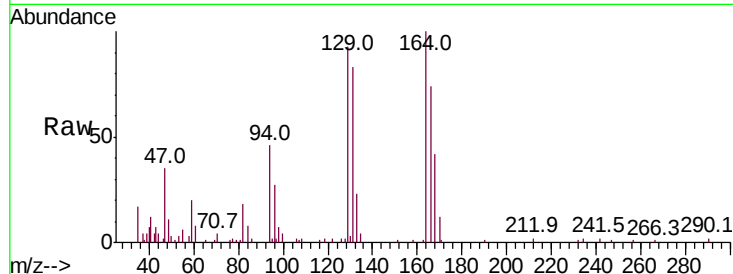
#52
Tetrachloroethene
Concen: 0.229 ppbv m
RT: 11.20 min Scan# 2617
Delta R.T. -0.00 min
Lab File: VL037624.D
Acq: 16 Sep 2021 20:46

Instrument :
MSVOA_L
ClientSampled :
SV1DL

Tot Ion	Ratio	Lower	Upper
164	100		
166	74.4	101.2	151.8#
129	93.0	84.0	126.0
131	83.5	78.8	118.2

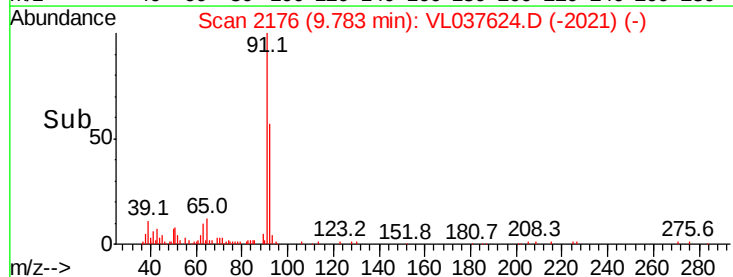
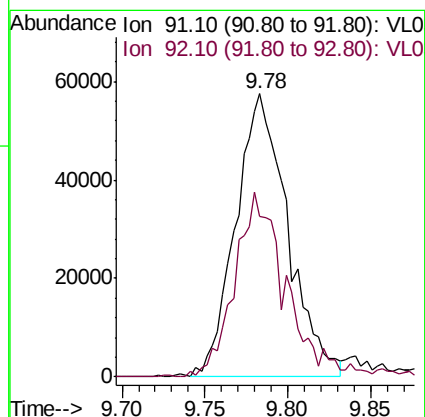
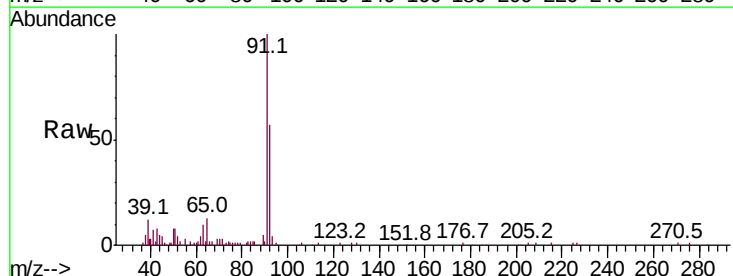
Manual Integrations
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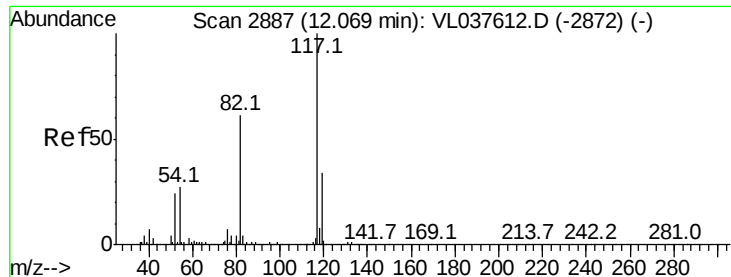
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#53
Toluene
Concen: 0.302 ppbv
RT: 9.78 min Scan# 2176
Delta R.T. -0.00 min
Lab File: VL037624.D
Acq: 16 Sep 2021 20:46

Tgt Ion	Ratio	Lower	Upper
91	100		
92	65.2	48.9	73.3





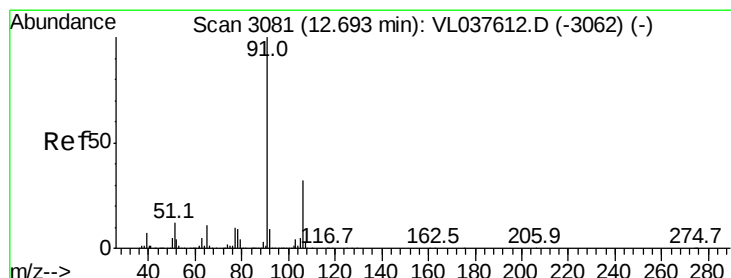
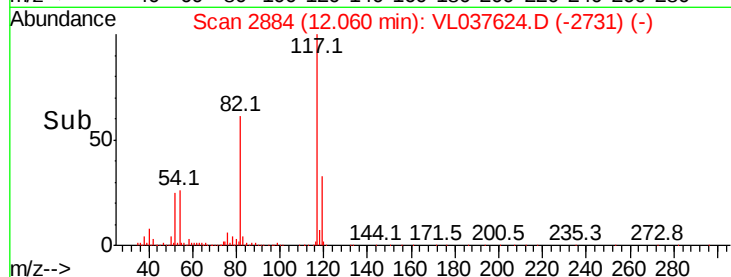
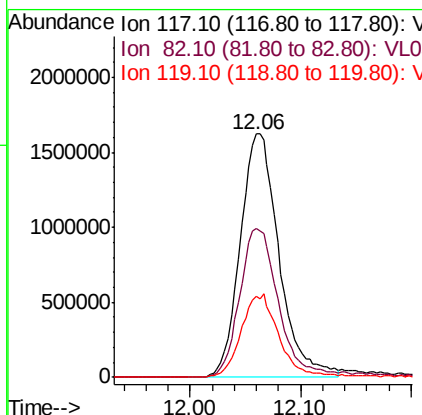
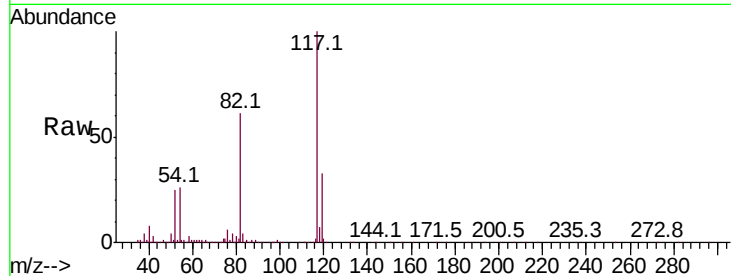
#55
Chlorobenzene-d5
Concen: 10.000 ppbv
RT: 12.06 min Scan# 2884
Delta R.T. -0.01 min
Lab File: VL037624.D
Acq: 16 Sep 2021 20:46

Instrument :
MSVOA_L
ClientSampleId :
SV1DL

Tot Ion:117 Resp: 3962762
Ion Ratio Lower Upper
117 100
82 64.5 50.6 75.8
119 34.4 26.2 39.2

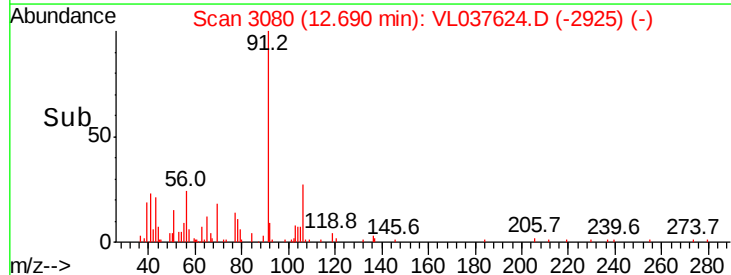
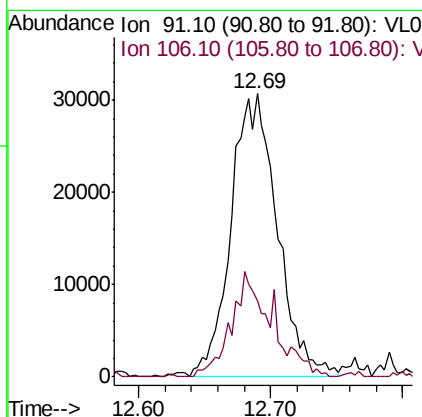
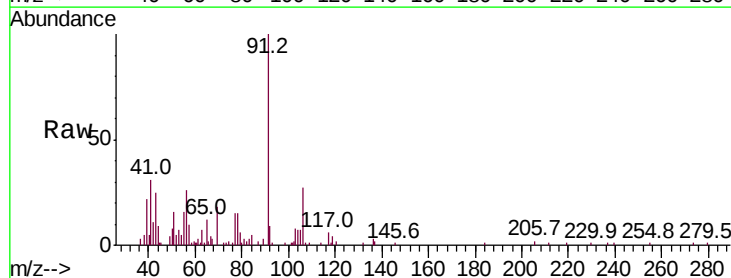
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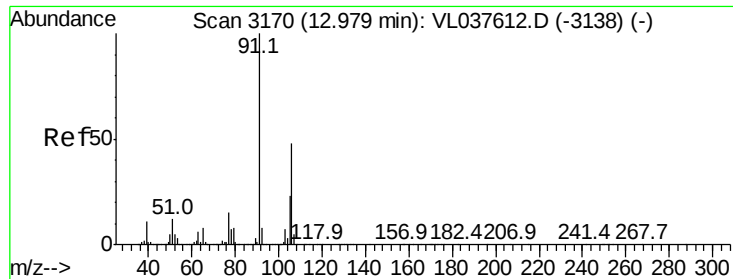
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#58
Ethyl Benzene
Concen: 0.142 ppbv m
RT: 12.69 min Scan# 3080
Delta R.T. -0.00 min
Lab File: VL037624.D
Acq: 16 Sep 2021 20:46

Tgt Ion: 91 Resp: 74874
Ion Ratio Lower Upper
91 100
106 26.9 25.3 37.9





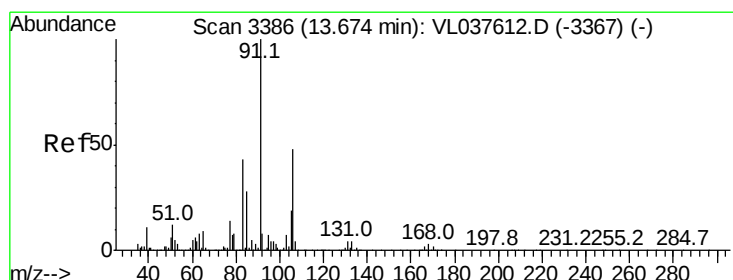
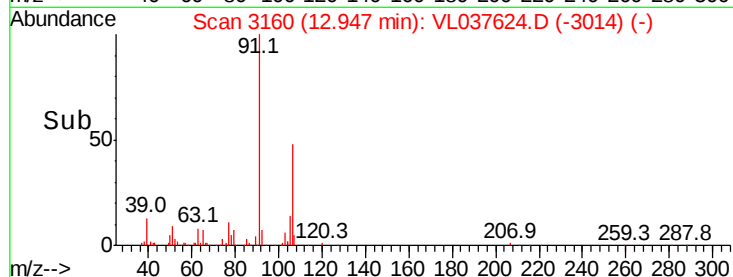
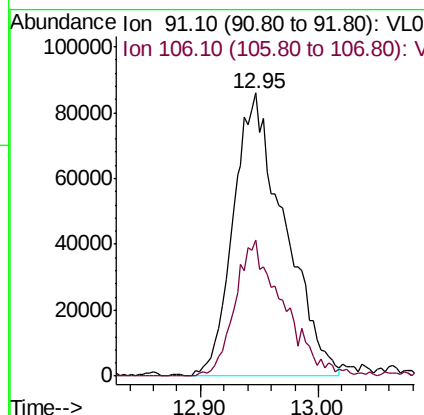
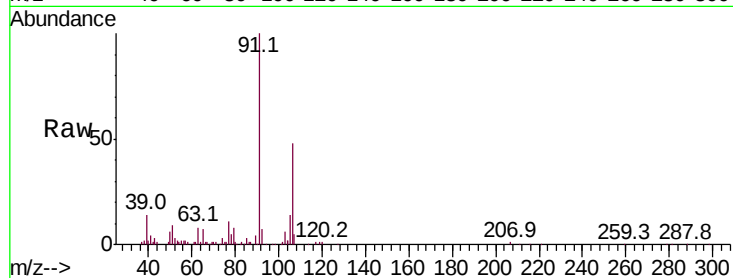
#59
m/p-Xylene
Concen: 0.566 ppbv m
RT: 12.95 min Scan# 3160
Delta R.T. -0.03 min
Lab File: VL037624.D
Acq: 16 Sep 2021 20:46

Instrument :
MSVOA_L
ClientSampled :
SV1DL

Tot Ion: 91 Resp: 259240
Ion Ratio Lower Upper
91 100
106 0.0 36.6 55.0#

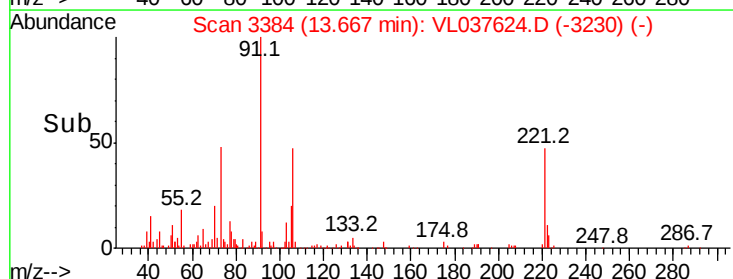
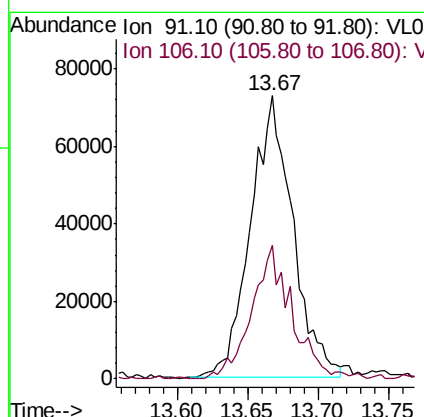
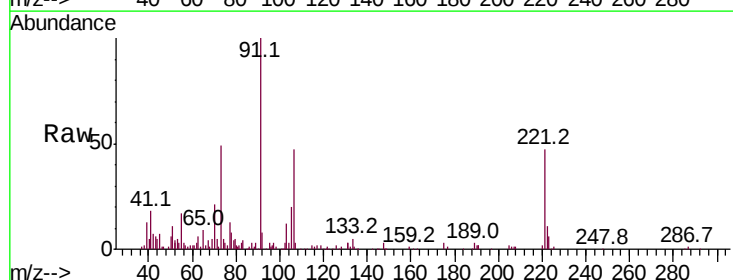
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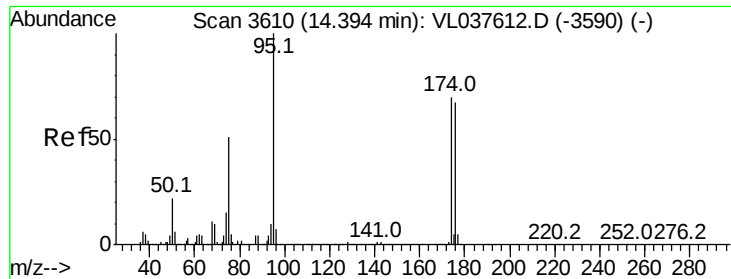
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#60
o-Xylene
Concen: 0.350 ppbv
RT: 13.67 min Scan# 3384
Delta R.T. -0.01 min
Lab File: VL037624.D
Acq: 16 Sep 2021 20:46

Tgt Ion: 91 Resp: 152701
Ion Ratio Lower Upper
91 100
106 45.4 23.0 69.0





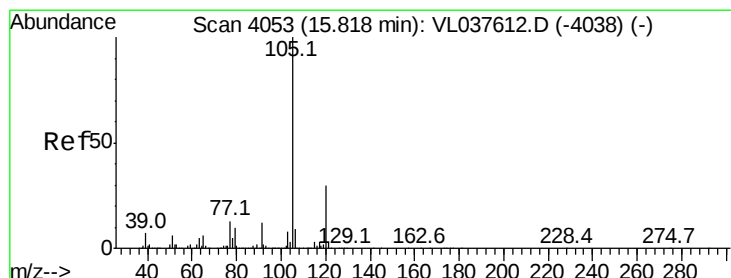
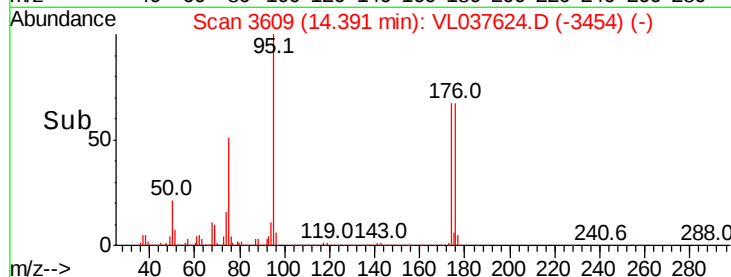
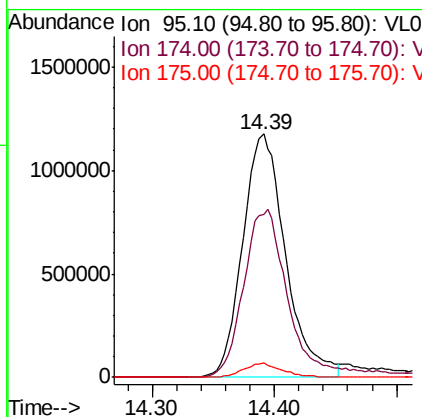
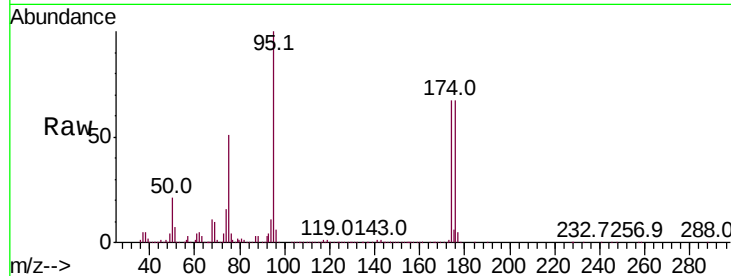
#68
 1-Bromo-4-Fluorobenzene
 Concen: 9.972 ppbv
 RT: 14.39 min Scan# 3609
 Delta R.T. -0.00 min
 Lab File: VL037624.D
 Acq: 16 Sep 2021 20:46

Instrument :
 MSVOA_L
 ClientSampleId :
 SV1DL

Tot Ion: 95 Resp: 2855783
 Ion Ratio Lower Upper
 95 100
 174 75.0 56.3 84.5
 175 5.6 4.4 6.6

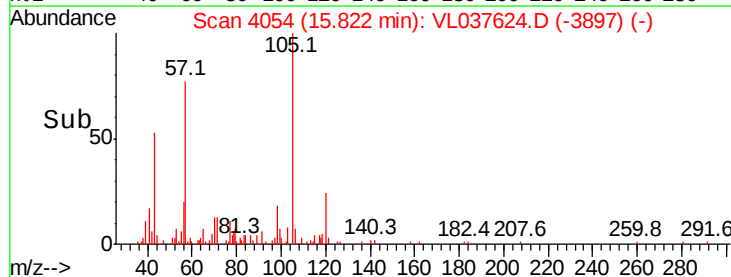
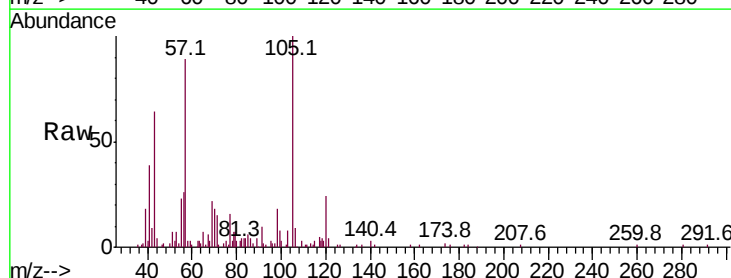
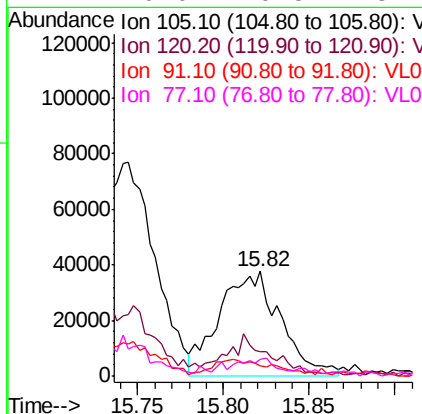
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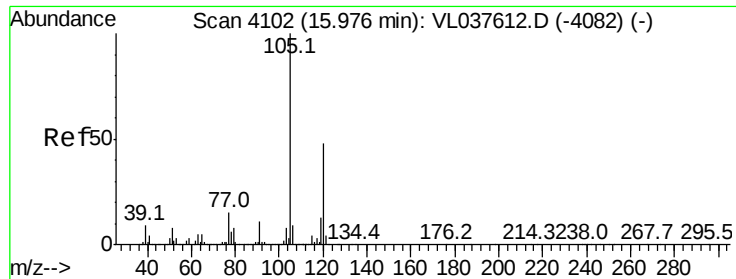
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#72
 4-Ethyltoluene
 Concen: 0.185 ppbv m
 RT: 15.82 min Scan# 4054
 Delta R.T. 0.00 min
 Lab File: VL037624.D
 Acq: 16 Sep 2021 20:46

Tgt Ion: 105 Resp: 92707
 Ion Ratio Lower Upper
 105 100
 120 33.4 24.7 37.1
 91 13.8 9.9 14.9
 77 0.0 10.5 15.7#





#73

1,3,5-Trimethylbenzene

Concen: 0.163 ppbv

RT: 15.97 min Scan# 4100

Delta R.T. -0.01 min

Lab File: VL037624.D

Acq: 16 Sep 2021 20:46

Instrument :

MSVOA_L

ClientSampleId :

SV1DL

Tot Ion:105 Resp: 76018

Ion Ratio Lower Upper

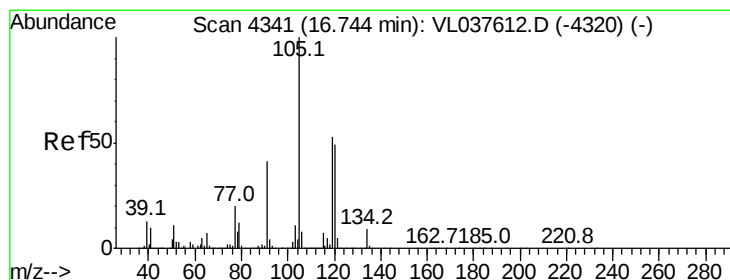
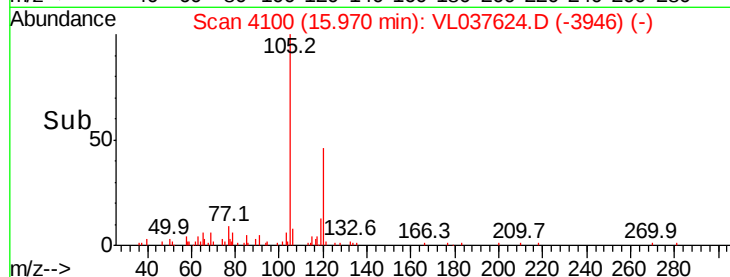
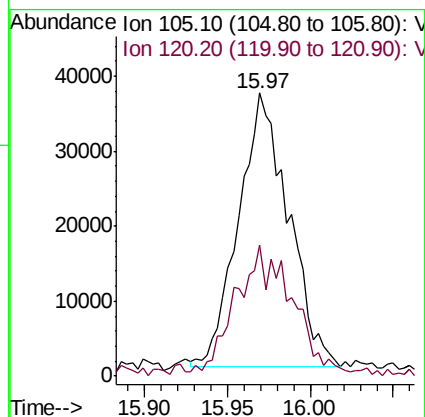
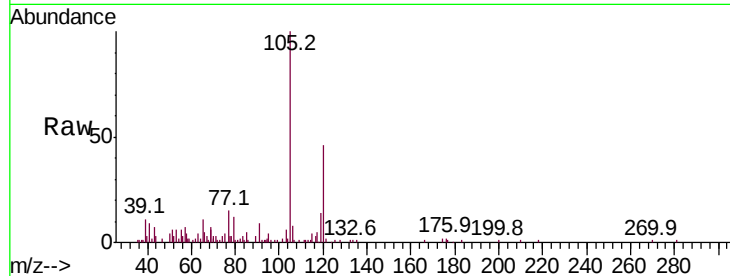
105 100

120 45.9 38.3 57.5

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#74

1,2,4-Trimethylbenzene

Concen: 0.840 ppbv

RT: 16.74 min Scan# 4339

Delta R.T. -0.01 min

Lab File: VL037624.D

Acq: 16 Sep 2021 20:46

Tgt Ion:105 Resp: 413211

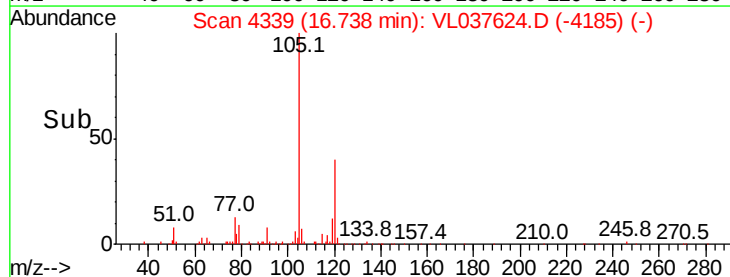
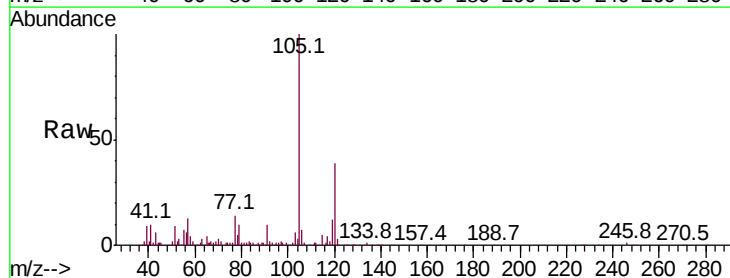
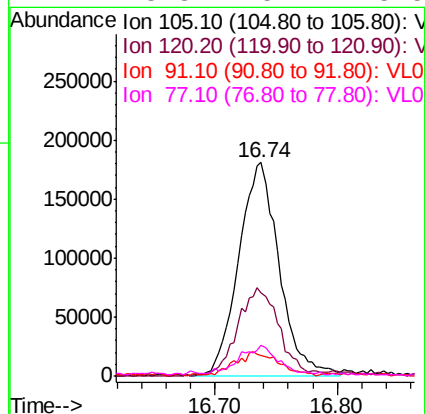
Ion Ratio Lower Upper

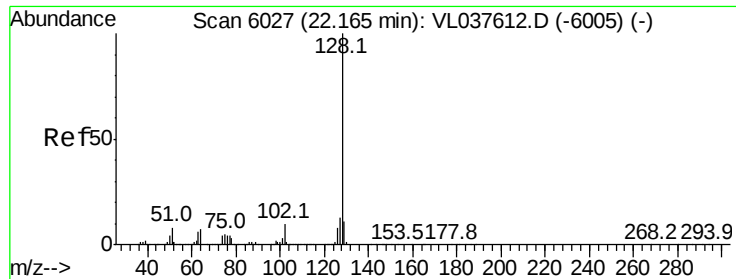
105 100

120 39.0 39.4 59.0#

91 9.3 33.3 49.9#

77 13.3 15.7 23.5#





#79

Naphthalene

Concen: 0.141 ppbv m

RT: 22.15 min Scan# 6023

Delta R.T. -0.01 min

Lab File: VL037624.D

Acq: 16 Sep 2021 20:46

Instrument :

MSVOA_L

ClientSampleId :

SV1DL

Tot Ion:	128	Resp:	42501
Ion Ratio	Lower	Upper	
128	100		
127	12.9	10.6	16.0
129	5.6	8.6	12.8#

Manual Integrations
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