

Data Path : Z:\VOASRV\HPCHEM1\MSVOA L\DATA\VL110921\
 Data File : VL037997.D
 Acq On : 10 Nov 2021 2:41
 Operator : SY/AP
 Sample : M4597-01
 Misc : 400mL/MSVOA L
 ALS Vial : 1 Sample Multiplier: 1

Instrument :
 MSVOA_L
 ClientSampleId :

Quant Time: Nov 10 04:50:55 2021
 Quant Method : Z:\VOASRV\HPCHEM1\MSVOA L\METHODS\VL110121AIR.M
 Quant Title : AIR ANALYSIS BY METHOD TO-15 Instrument: MSVOA_LTue Nov 02 05:54:07 2021
 QLast Update : Tue Nov 02 05:54:07 2021
 Response via : Initial Calibration

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Bromochloromethane	5.67	49	1288556	10.00	ppbv	0.00
33) 1,4-Difluorobenzene	7.18	114	3723067	10.00	ppbv	0.00
55) Chlorobenzene-d5	12.08	117	3092041	10.00	ppbv	0.00

System Monitoring Compounds

68) 1-Bromo-4-Fluorobenzene	14.41	95	2181343	9.71	ppbv	0.00
Spiked Amount	10.000	Range	65 - 135	Recovery	=	97.10%

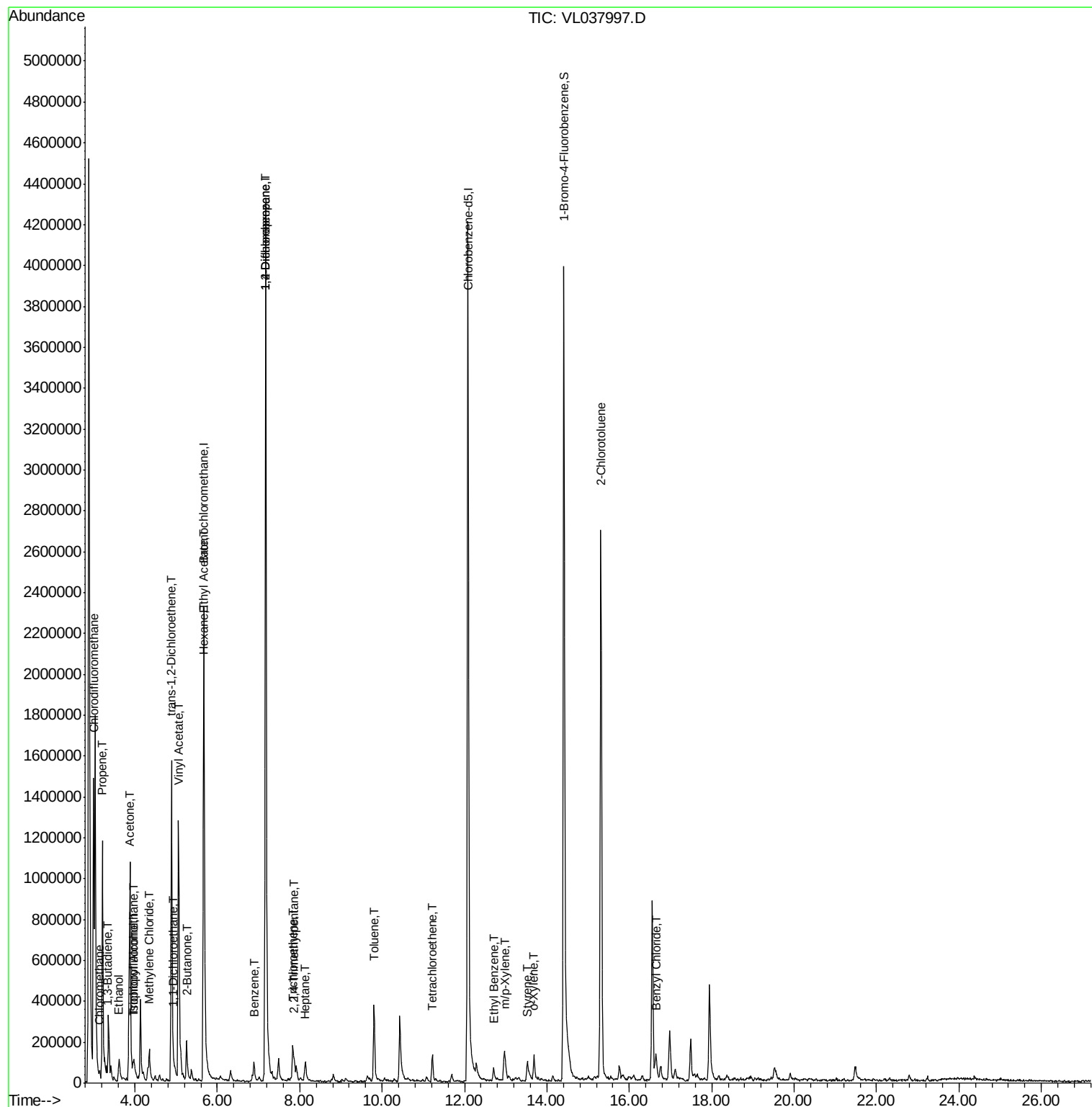
Target Compounds					Ovalue
3) Chlorodifluoromethane	3.00	51	2483782	10.354	ppbv # 91
4) Chloromethane	3.14	50	26948	0.296	ppbv 89
9) Propene	3.21	41	406336	4.725	ppbv 97
10) Heptane	8.12	43	8851	0.044	ppbv # 28
11) Trichlorofluoromethane	3.95	101	36583	0.202	ppbv 100
13) Ethanol	3.62	45	29532	3.404	ppbv # 32
15) Acetone	3.86	43	343997	3.231	ppbv # 61
16) 1,3-Butadiene	3.34	39	2733	0.033	ppbv # 10
19) Isopropyl Alcohol	3.98	45	90548	1.330	ppbv # 85
20) Methylene Chloride	4.35	84	19347	0.331	ppbv # 74
22) trans-1,2-Dichloroethene	4.89	96	565039	8.767	ppbv 94
23) Vinyl Acetate	5.07	43	8587	0.054	ppbv # 1
24) 1,1-Dichloroethane	4.94	63	6404	0.048	ppbv # 1
25) Ethyl Acetate	5.68	43	30035	0.095	ppbv # 85
26) Hexane	5.69	57	68073	0.454	ppbv # 49
34) 2-Butanone	5.25	43	251224	1.821	ppbv 95
36) Benzene	6.89	78	78378	0.259	ppbv 97
38) Trichloroethene	7.83	130	35970	0.286	ppbv # 84
39) 1,2-Dichloropropane	7.17	63	864140	7.575	ppbv # 29
44) 2,2,4-Trimethylpentane	7.87	57	36259	0.070	ppbv # 26
52) Tetrachloroethene	11.21	164	11990	0.104	ppbv 83
53) Toluene	9.81	91	296792	0.913	ppbv 99
58) Ethyl Benzene	12.71	91	48036	0.127	ppbv 98
59) m/p-Xylene	12.99	91	18625	0.055	ppbv # 30
60) o-Xylene	13.69	91	72282	0.228	ppbv 88
61) Styrene	13.53	104	21143	0.145	ppbv # 1
66) Benzyl Chloride	16.66	91	2285	0.110	ppbv # 62
71) 2-Chlorotoluene	15.31	91	692842	2.204	ppbv # 41

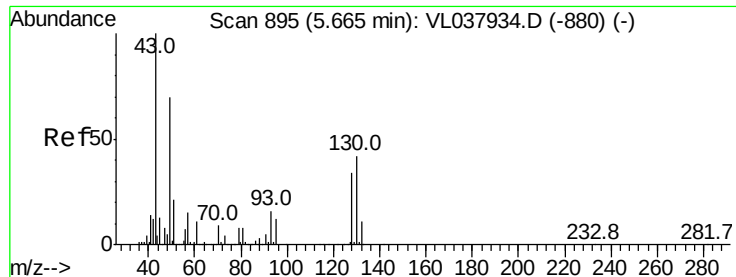
(#) = qualifier out of range (m) = manual integration (+) = signals summed

Data Path : Z:\V0ASRV\HPCHEM1\MSVOA L\DATA\VL110921\
Data File : VL037997.D
Acq On : 10 Nov 2021 2:41
Operator : SY/AP
Sample : M4597-01
Misc : 400mL/MSVOA L
ALS Vial : 1 Sample Multiplier: 1

Instrument :
MSVOA_L
ClientSampleId :

Quant Time: Nov 10 04:50:55 2021
Quant Method : Z:\V0ASRV\HPCHEM1\MSVOA L\METHODS\VL110121AIR.M
Quant Title : AIR ANALYSIS BY METHOD TO-15 Instrument: MSVOA_L Tue Nov 02 05:54:07 2021
QLast Update : Tue Nov 02 05:54:07 2021
Response via : Initial Calibration





#1

Bromochloromethane

Concen: 10.000 ppbv

RT: 5.67 Instrument:

Delta R.T. MSVOA_L

Lab File: ClientSampleId:

Acq: 10 Nov 2021 2:41

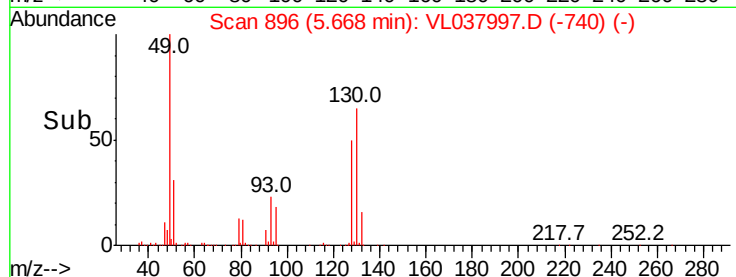
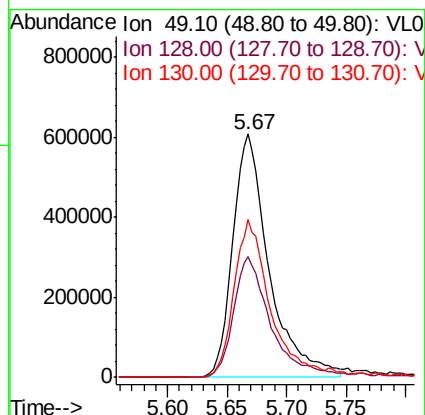
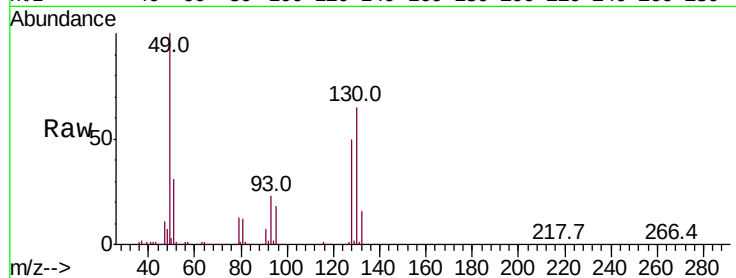
Tot Ion: 49 Resp: 1288556

Ion Ratio Lower Upper

49 100

128 52.1 27.0 81.0

130 67.7 33.4 100.2



#3

Chlorodifluoromethane

Concen: 10.354 ppbv

RT: 3.00 min Scan# 65

Delta R.T. 0.00 min

Lab File: VL037997.D

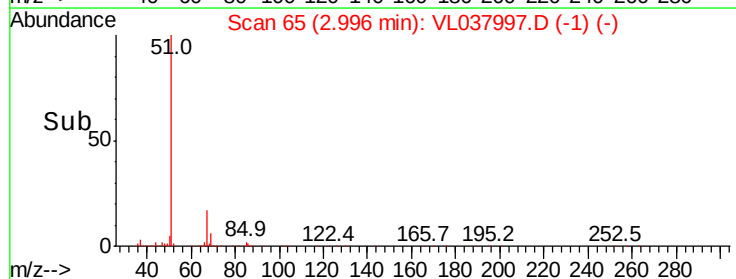
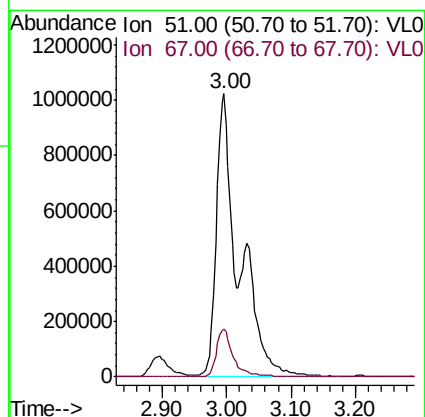
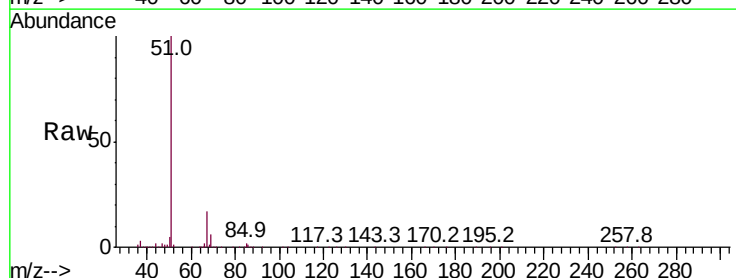
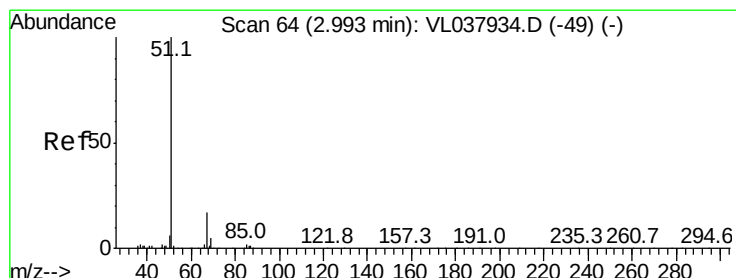
Acq: 10 Nov 2021 2:41

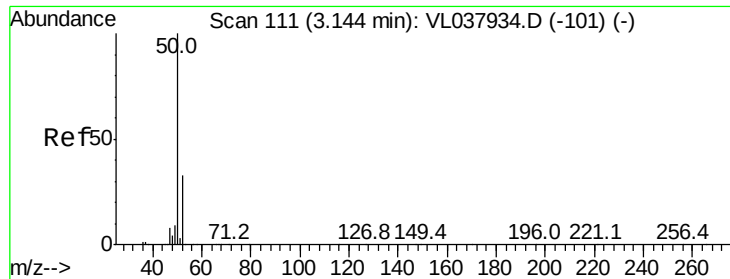
Tgt Ion: 51 Resp: 2483782

Ion Ratio Lower Upper

51 100

67 12.9 13.4 20.0#





#4

Chloromethane

Concen: 0.296 ppbv

RT: 3.14 Instrument:

Delta R.T. MSVOA_1

Lab File: ClientSampleId:

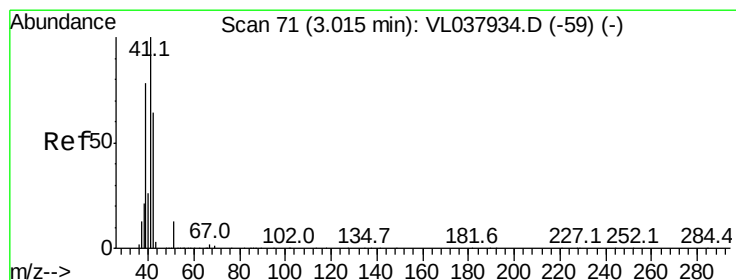
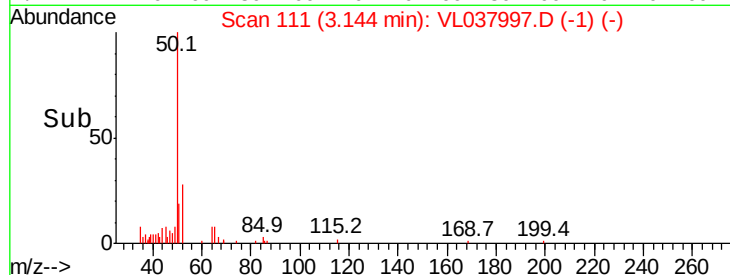
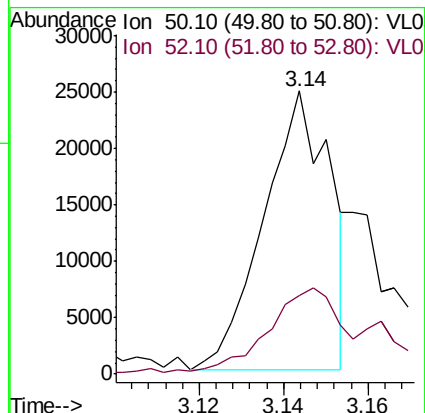
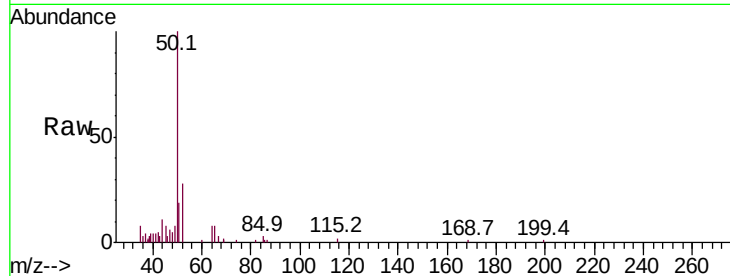
Acq: 10 Nov 2021 2:41

Tot Ion: 50 Resp: 26948

Ion Ratio Lower Upper

50 100

52 26.9 26.3 39.5



#9

Propene

Concen: 4.725 ppbv

RT: 3.21 min Scan# 132

Delta R.T. 0.20 min

Lab File: VL037997.D

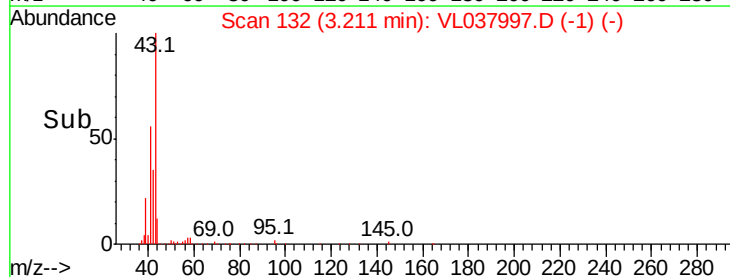
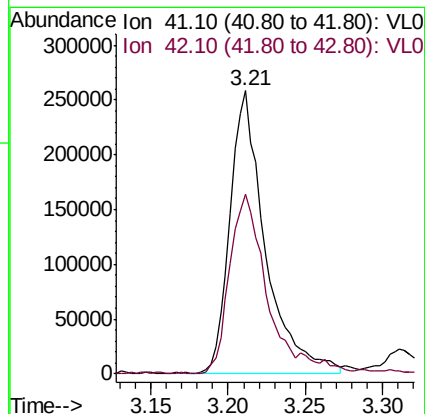
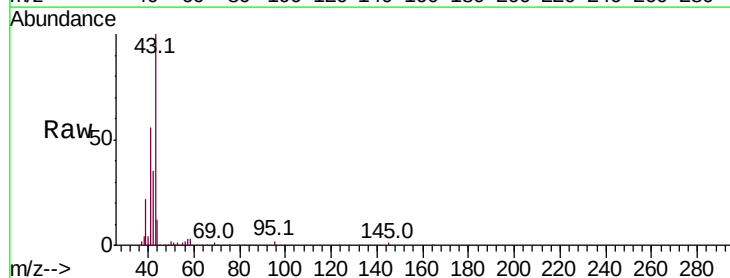
Acq: 10 Nov 2021 2:41

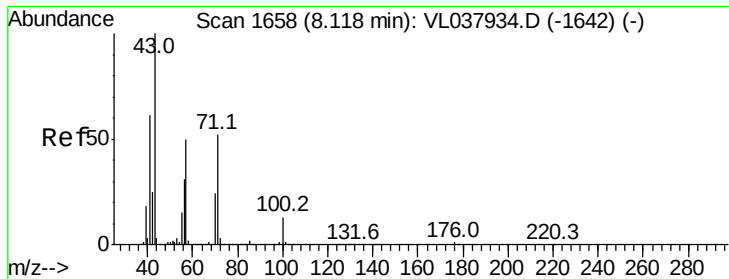
Tgt Ion: 41 Resp: 406336

Ion Ratio Lower Upper

41 100

42 69.8 57.6 86.4





#10

Heptane

Concen: 0.044 ppbv

RT: 8.12 Instrument:

Delta R.T. MSVOA_L

Lab File:

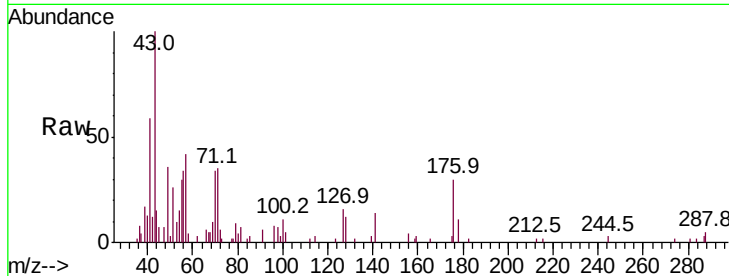
Acq: 10 Nov 2021 2:41

Tot Ion: 43 Resp: 8851

Ion Ratio Lower Upper

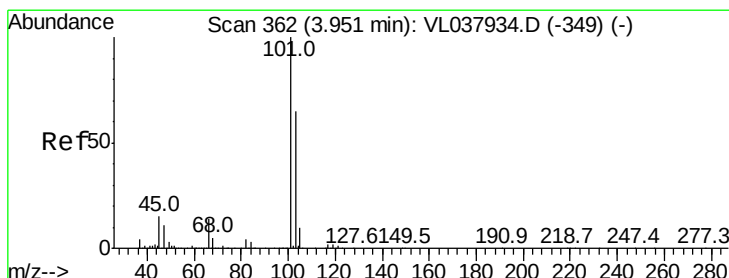
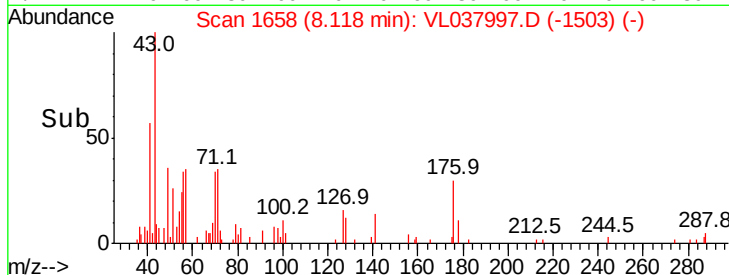
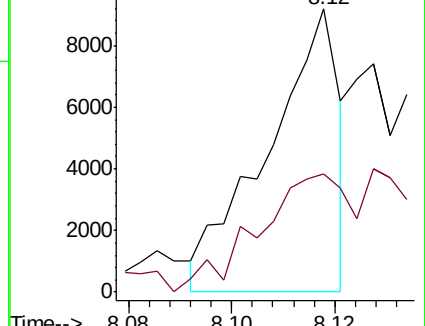
43 100

57 0.0 39.8 59.8#



Abundance Ion 43.10 (42.80 to 43.80): VL0

Ion 57.10 (56.80 to 57.80): VL0



#11

Trichlorofluoromethane

Concen: 0.202 ppbv

RT: 3.95 min Scan# 363

Delta R.T. 0.00 min

Lab File: VL037997.D

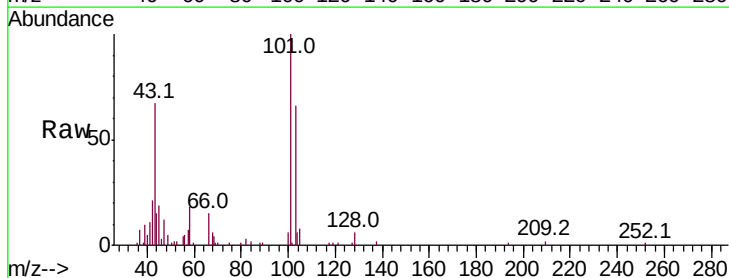
Acq: 10 Nov 2021 2:41

Tgt Ion: 101 Resp: 36583

Ion Ratio Lower Upper

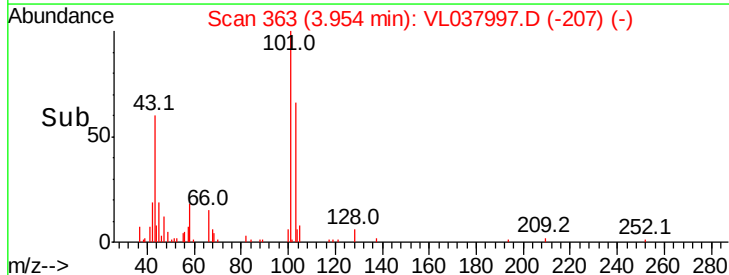
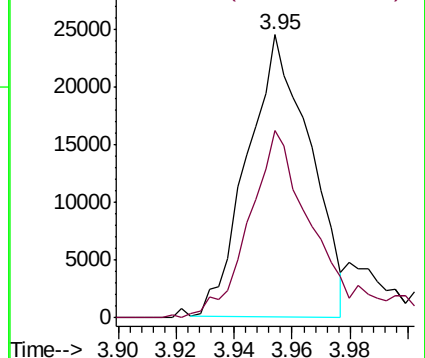
101 100

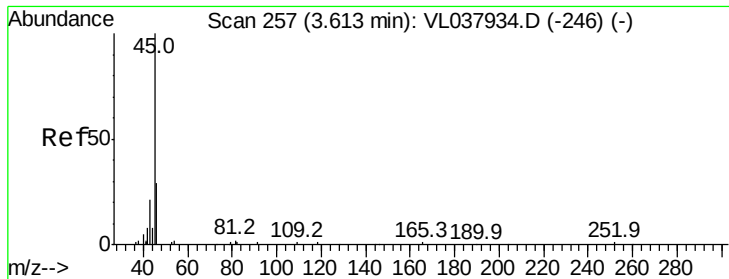
103 64.9 52.0 78.0



Abundance Ion 101.00 (100.70 to 101.70): V

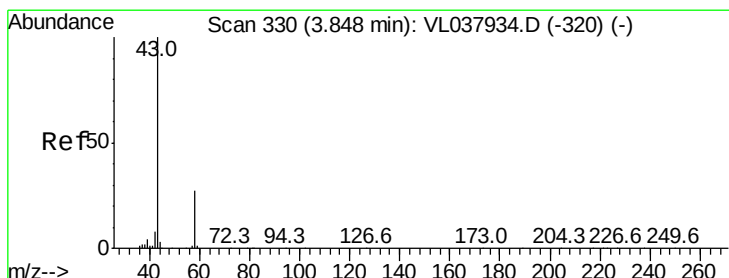
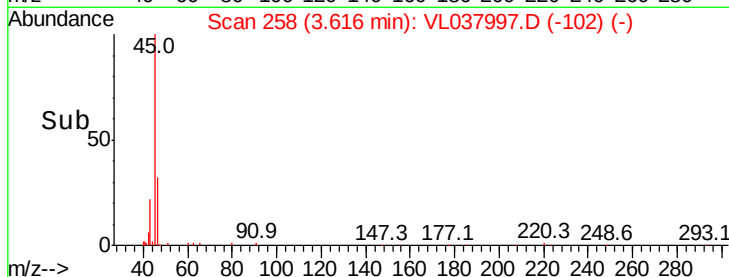
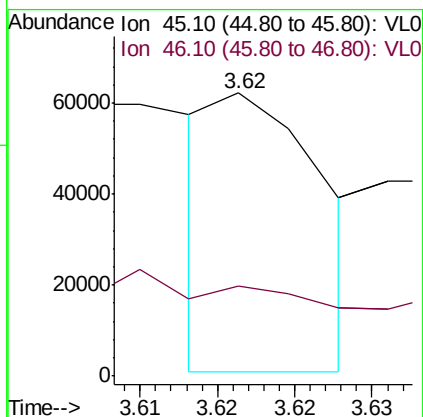
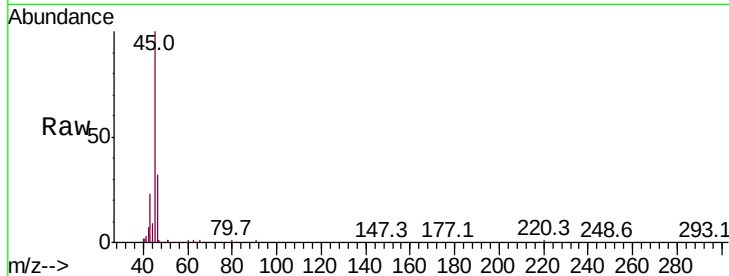
Ion 103.00 (102.70 to 103.70): V





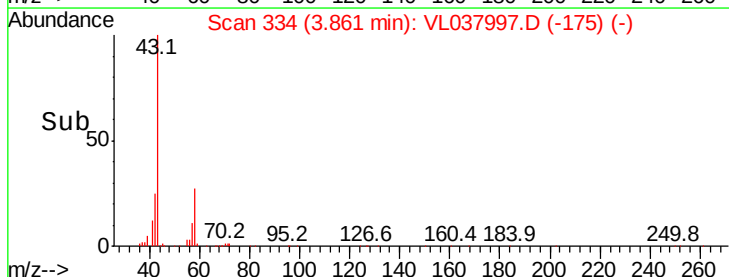
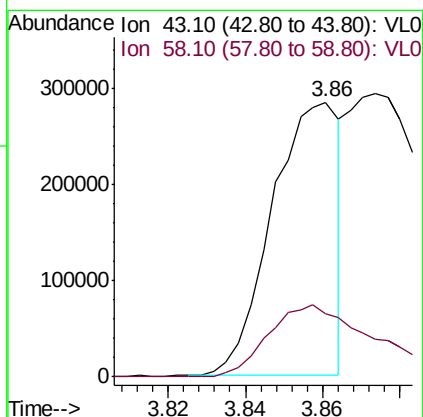
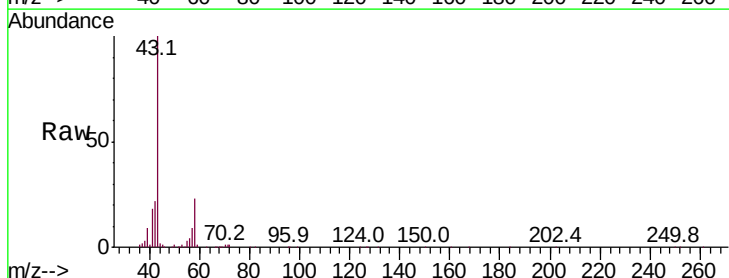
#13
Ethanol
Concen: 3.404 ppbv
RT: 3.62
Delta R.T. MSVOA_1
Lab File: ClientSampleId :
Acq: 10 Nov 2021 2:41

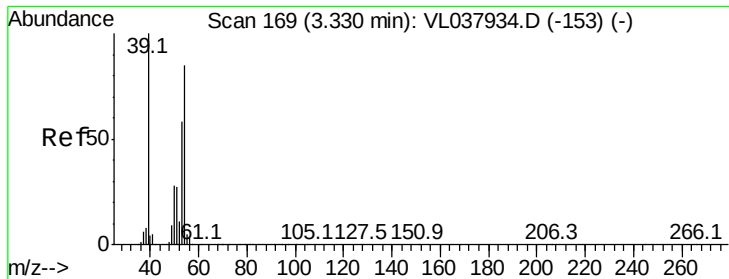
Tot Ion: 45 Resp: 29532
Ion Ratio Lower Upper
45 100
46 0.0 17.4 69.8#



#15
Acetone
Concen: 3.231 ppbv
RT: 3.86 min Scan# 334
Delta R.T. 0.01 min
Lab File: VL037997.D
Acq: 10 Nov 2021 2:41

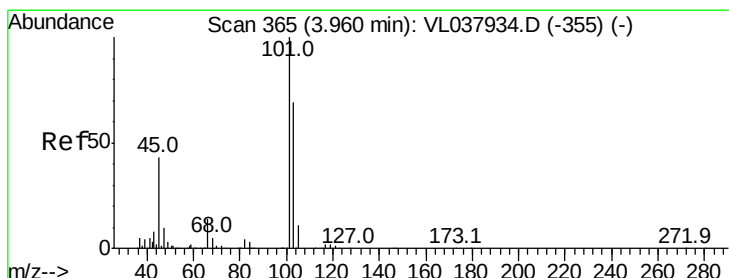
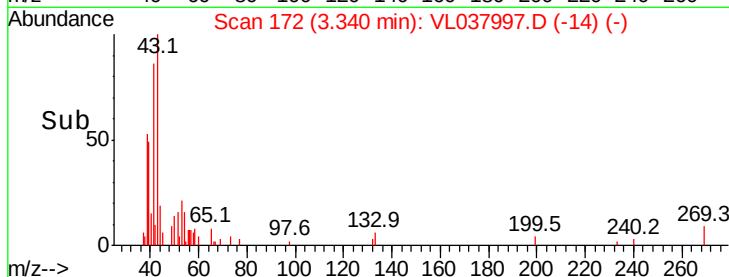
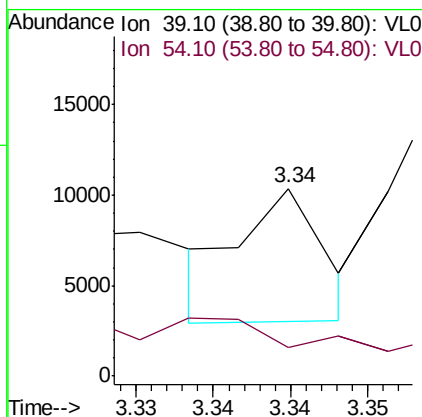
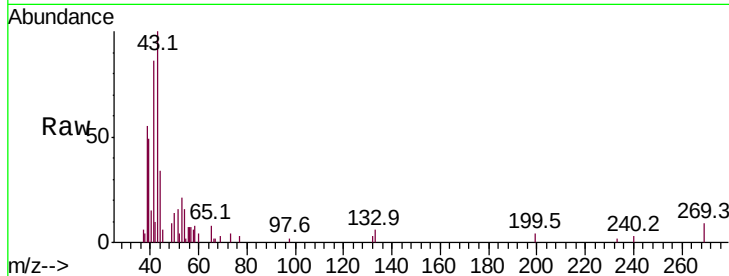
Tgt Ion: 43 Resp: 343997
Ion Ratio Lower Upper
43 100
58 49.8 23.3 34.9#





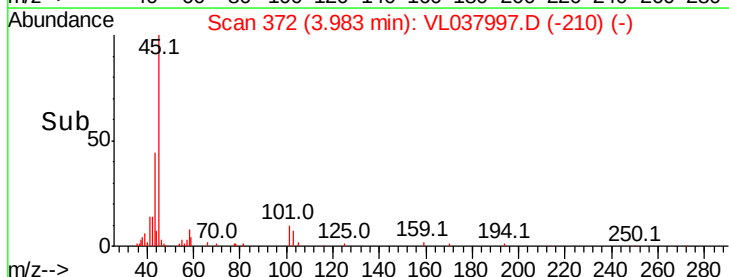
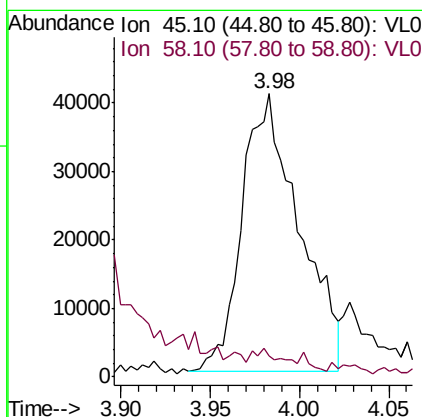
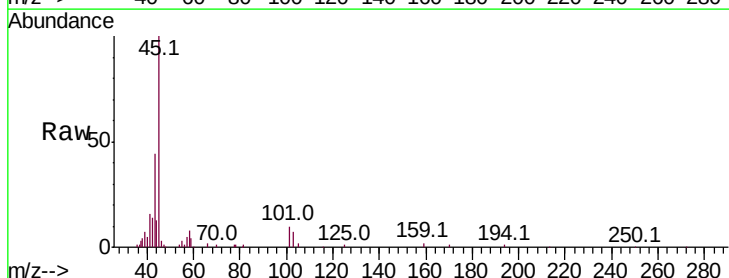
#16
 1,3-Butadiene
 Concen: 0.033 ppbv
 RT: 3.34
 Delta R.T. MSVOA.L
 Lab File: ClientSampleId:
 Acq: 10 Nov 2021 2:41

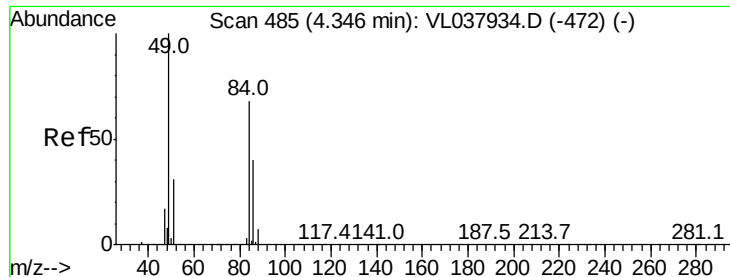
Tot Ion: 39 Resp: 2733
 Ion Ratio Lower Upper
 39 100
 54 0.0 62.6 93.8#



#19
 Isopropyl Alcohol
 Concen: 1.330 ppbv
 RT: 3.98 min Scan# 372
 Delta R.T. 0.02 min
 Lab File: VL037997.D
 Acq: 10 Nov 2021 2:41

Tgt Ion: 45 Resp: 90548
 Ion Ratio Lower Upper
 45 100
 58 0.0 4.0 6.0#





#20

Methylene Chloride

Concen: 0.331 ppbv

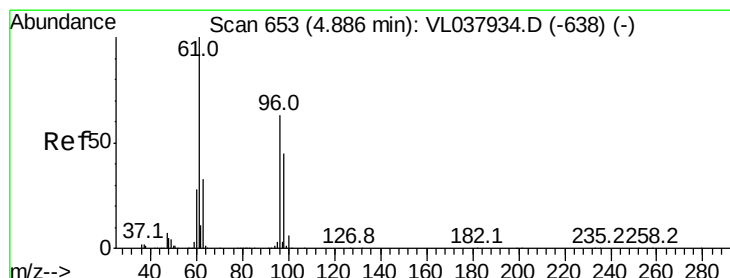
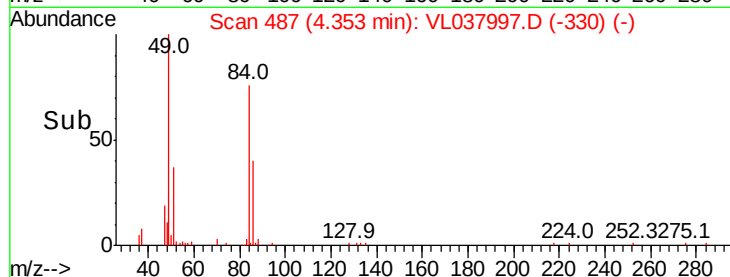
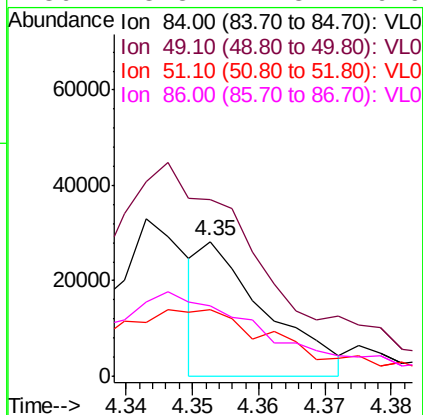
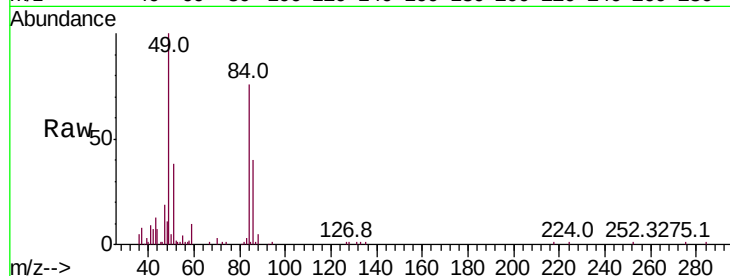
RT: 4.35 Instrument: MSVOA_1

Delta R.T. ClientSampleId:

Lab File:

Acq: 10 Nov 2021 2:41

Tot Ion:	84	Resp:	19347
Ion	Ratio	Lower	Upper
84	100		
49	102.7	117.5	176.3#
51	43.0	35.9	53.9
86	43.3	47.3	70.9#



#22

trans-1,2-Dichloroethene

Concen: 8.767 ppbv

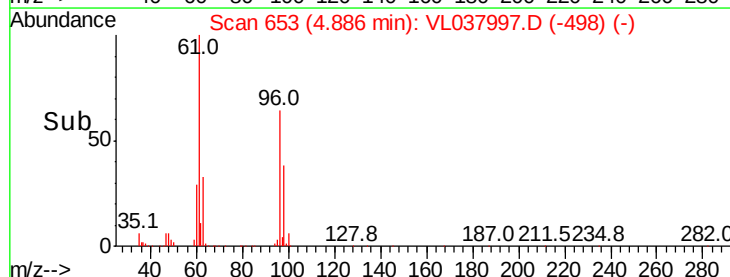
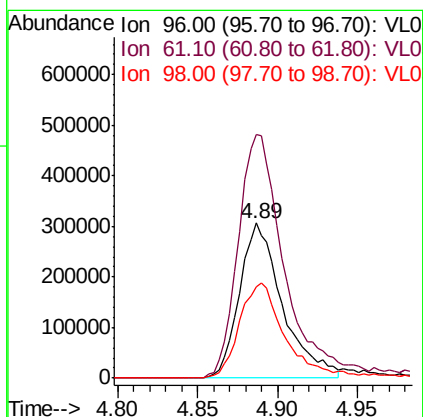
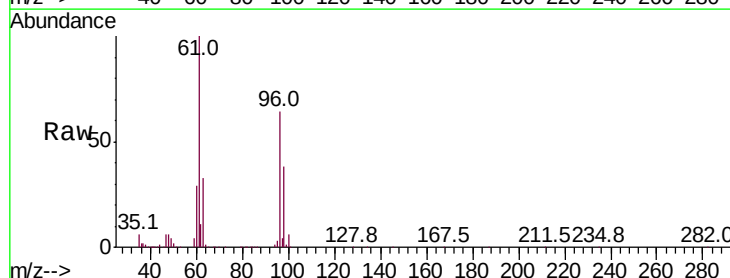
RT: 4.89 min Scan# 653

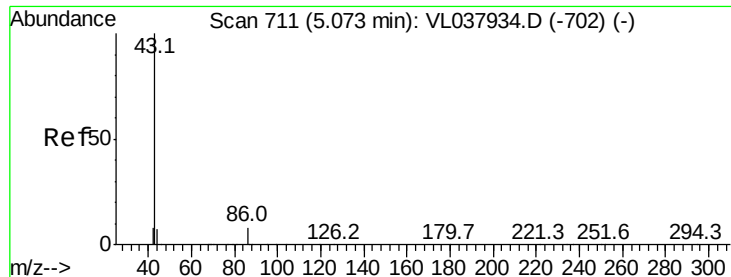
Delta R.T. -0.00 min

Lab File: VL037997.D

Acq: 10 Nov 2021 2:41

Tgt Ion:	96	Resp:	565039
Ion	Ratio	Lower	Upper
96	100		
61	157.4	127.8	191.6
98	59.1	56.9	85.3





#23

Vinyl Acetate

Concen: 0.054 ppbv

RT: 5.07

Delta R.T. MSVOA_1

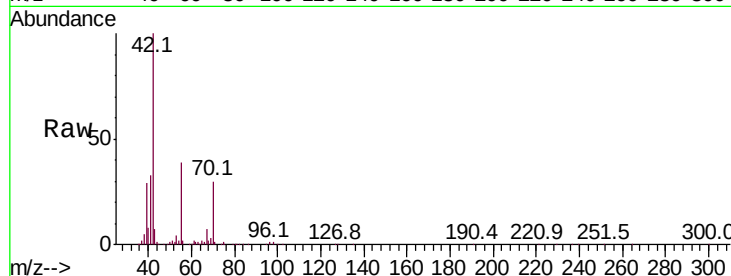
Lab File:

Acq: 10 Nov 2021 2:41

Tot Ion: 43 Resp: 8587

Ion Ratio Lower Upper

43	100		
86	7.7	5.5	8.3
42	1374.4	7.4	11.2#
44	1.2	4.7	7.1#

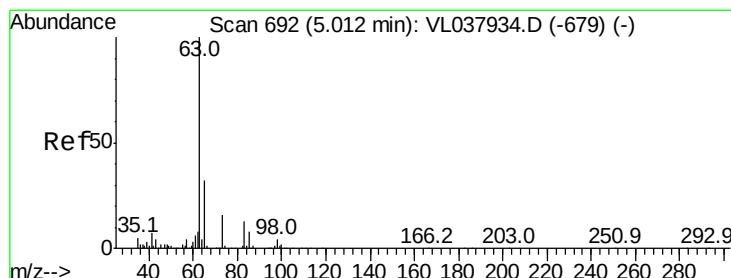
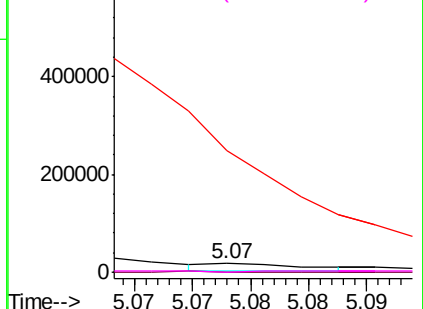
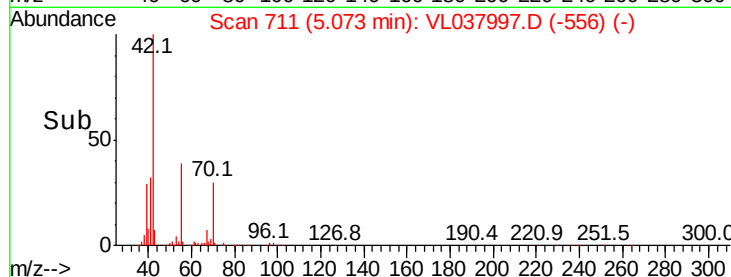


Abundance Ion 43.10 (42.80 to 43.80): VL0

Ion 86.10 (85.80 to 86.80): VL0

Ion 42.10 (41.80 to 42.80): VL0

Ion 44.10 (43.80 to 44.80): VL0



#24

1,1-Dichloroethane

Concen: 0.048 ppbv

RT: 4.94 min Scan# 670

Delta R.T. -0.07 min

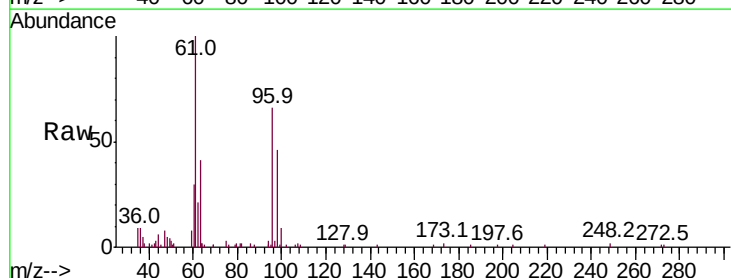
Lab File: VL037997.D

Acq: 10 Nov 2021 2:41

Tgt Ion: 63 Resp: 6404

Ion Ratio Lower Upper

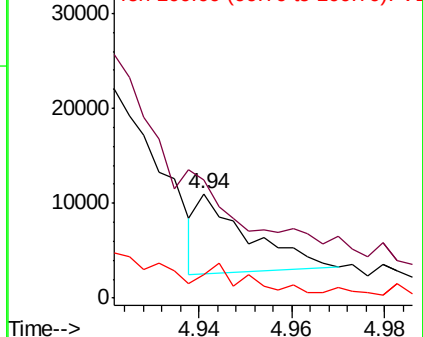
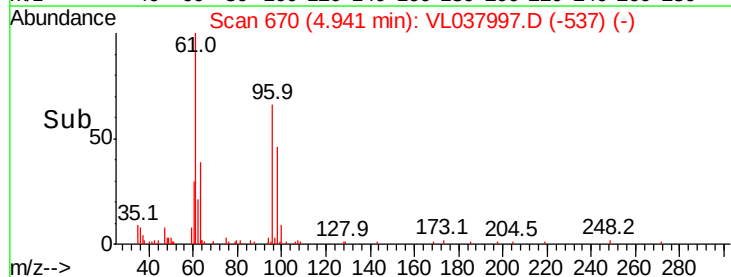
63	100		
98	70.6	2.3	6.9#
100	16.7	1.2	3.6#

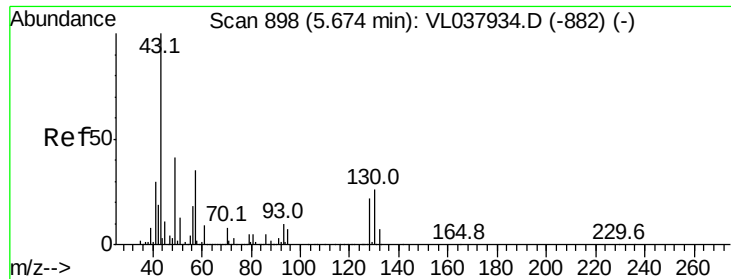


Abundance Ion 63.10 (62.80 to 63.80): VL0

Ion 98.00 (97.70 to 98.70): VL0

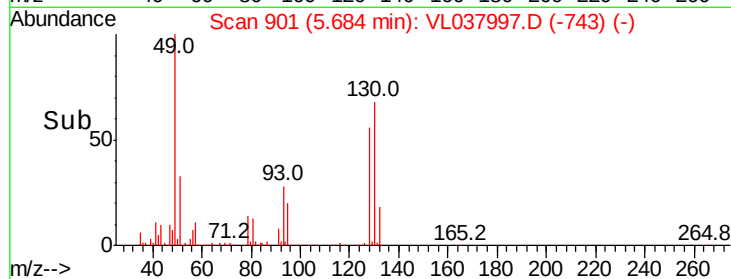
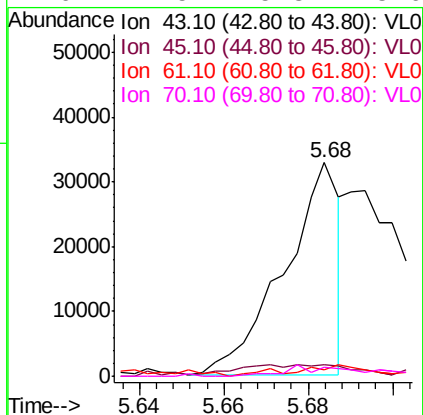
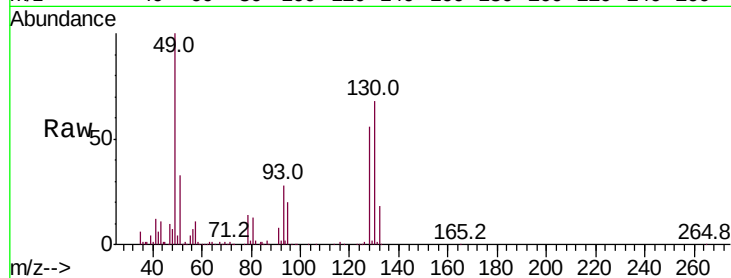
Ion 100.00 (99.70 to 100.70): VL0





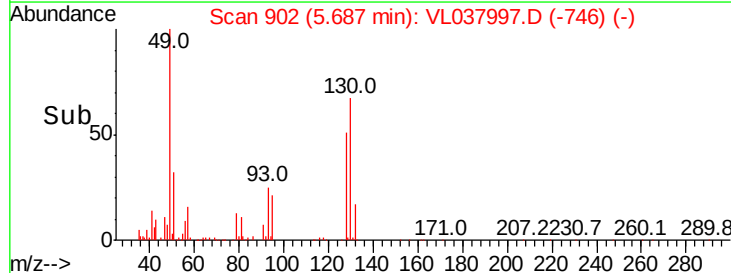
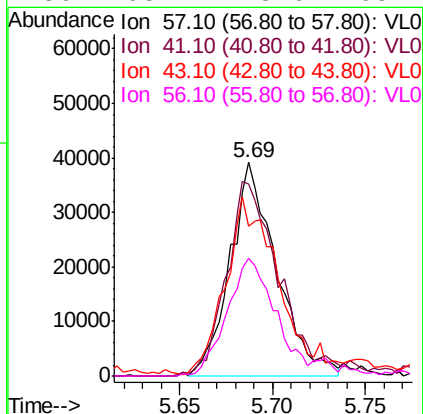
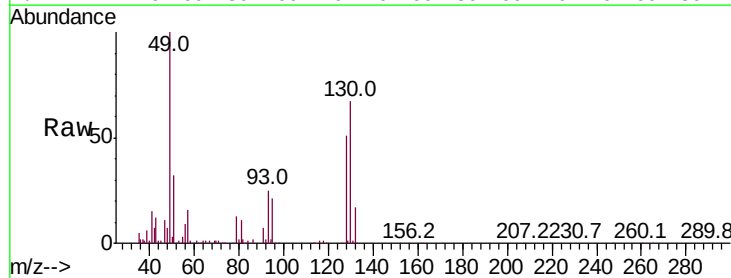
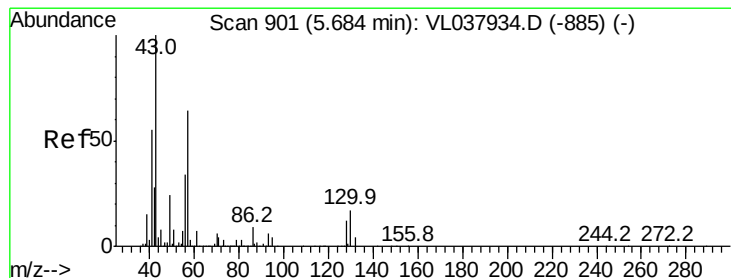
#25
Ethyl Acetate
Concen: 0.095 ppbv
RT: 5.68 min
Delta R.T. MSVOA_L
Lab File: ClientSampleId :
Acq: 10 Nov 2021 2:41

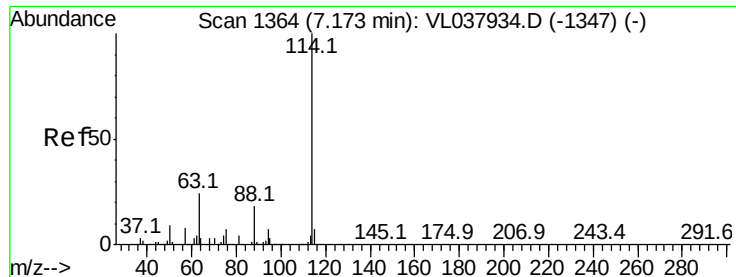
Tot Ion:	43	Resp:	30035
Ion Ratio	Lower	Upper	
43	100		
45	15.2	8.1	12.1#
61	3.0	8.1	12.1#
70	11.5	5.8	8.6#



#26
Hexane
Concen: 0.454 ppbv
RT: 5.69 min Scan# 902
Delta R.T. 0.00 min
Lab File: VL037997.D
Acq: 10 Nov 2021 2:41

Tgt Ion:	57	Resp:	68073
Ion Ratio	Lower	Upper	
57	100		
41	111.2	71.0	106.6#
43	101.5	173.0	259.6#
56	63.4	43.6	65.4





#33

1,4-Difluorobenzene

Concen: 10.000 ppbv

RT: 7.18

Instrument: MSVOA_1

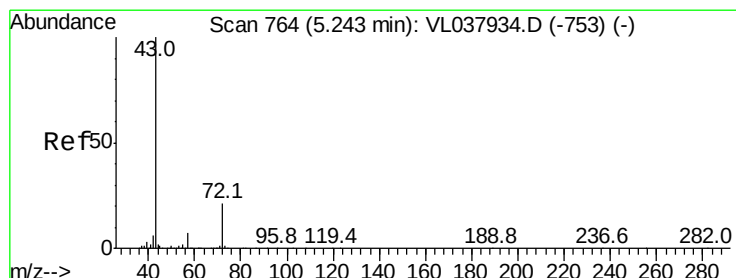
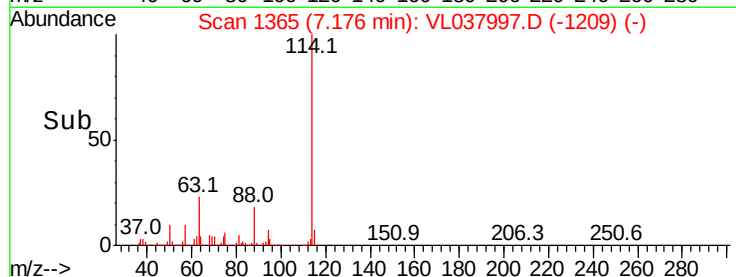
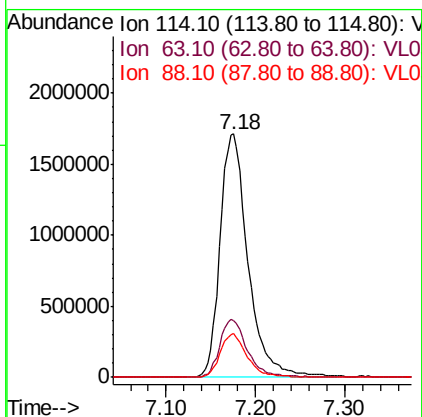
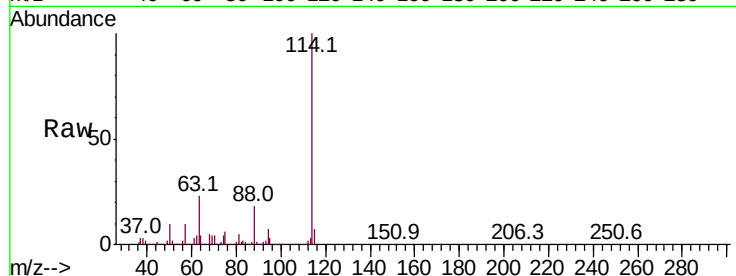
Delta R.T.

Lab File: ClientSampleId :

Acq: 10 Nov 2021 2:41

Tot Ion:114 Resp: 3723067

Ion	Ratio	Lower	Upper
114	100		
63	23.7	19.4	29.0
88	17.5	14.2	21.4



#34

2-Butanone

Concen: 1.821 ppbv

RT: 5.25 min Scan# 767

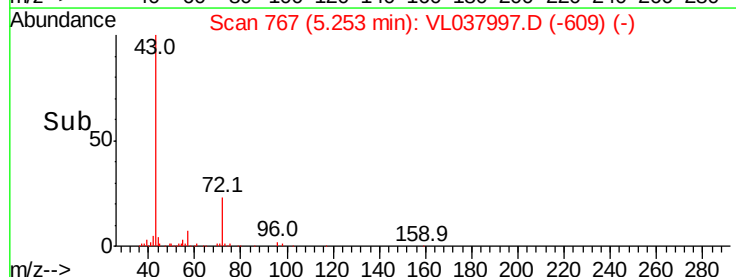
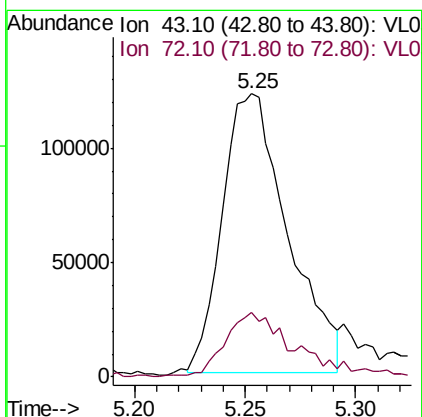
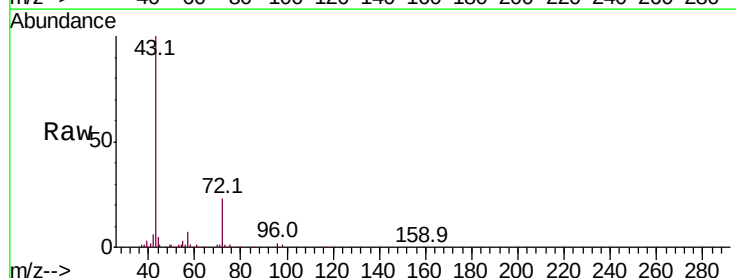
Delta R.T. 0.01 min

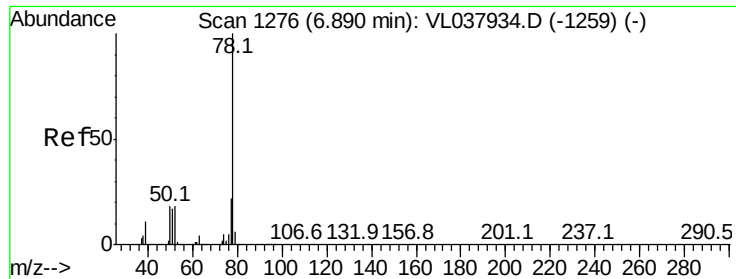
Lab File: VL037997.D

Acq: 10 Nov 2021 2:41

Tgt Ion: 43 Resp: 251224

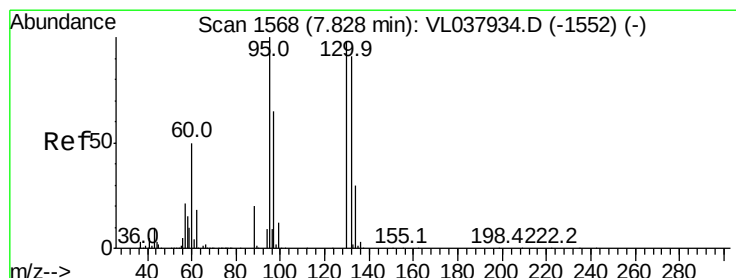
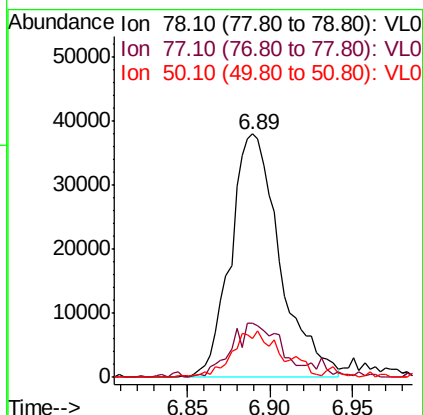
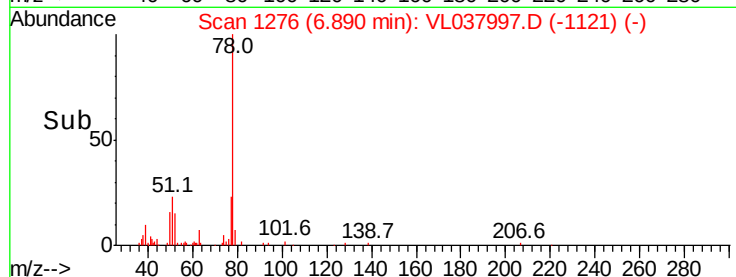
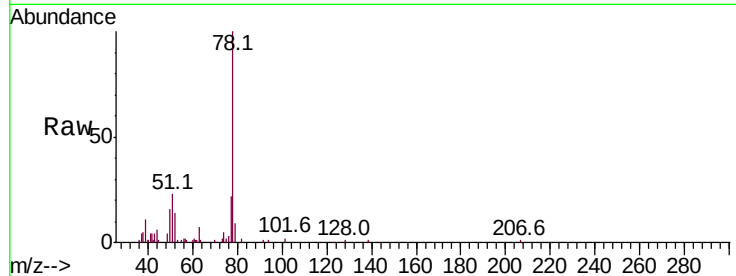
Ion	Ratio	Lower	Upper
43	100		
72	25.3	18.3	27.5





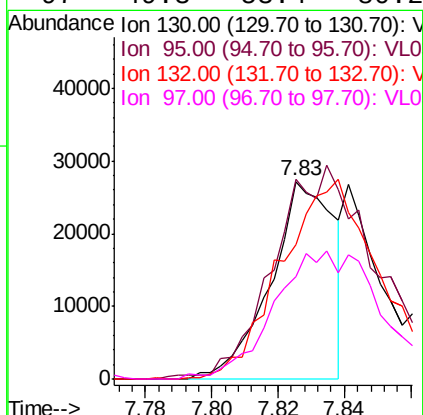
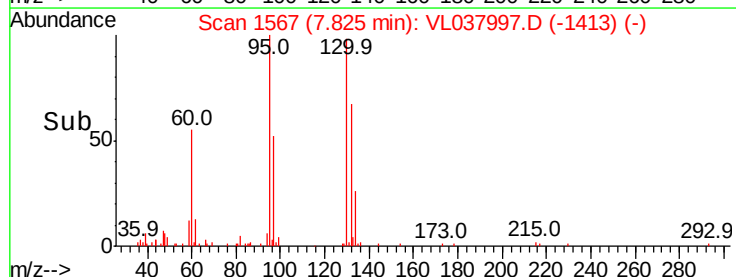
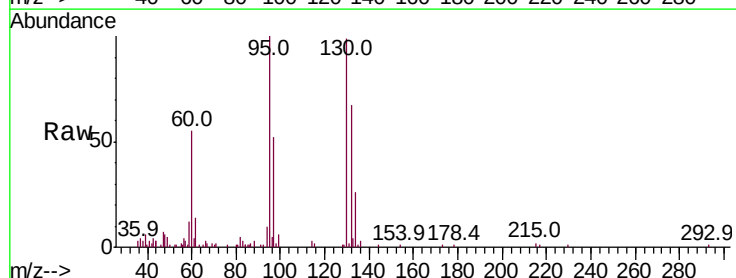
#36
Benzene
Concen: 0.259 ppbv
RT: 6.89
Delta R.T. MSVOA_L
Lab File: ClientSampleId :
Acq: 10 Nov 2021 2:41

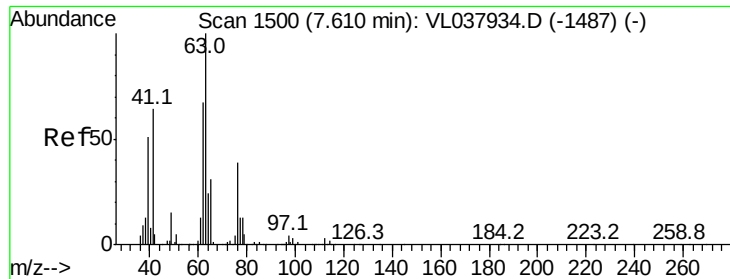
Tot Ion	Ratio	Lower	Upper
78	100		
77	22.1	17.9	26.9
50	15.4	14.4	21.6



#38
Trichloroethene
Concen: 0.286 ppbv
RT: 7.83 min Scan# 1567
Delta R.T. -0.00 min
Lab File: VL037997.D
Acq: 10 Nov 2021 2:41

Tgt Ion	Ratio	Lower	Upper
130	100		
95	98.9	81.8	122.8
132	67.1	74.2	111.2#
97	49.3	53.4	80.2#





#39

1,2-Dichloropropane

Concen: 7.575 ppbv

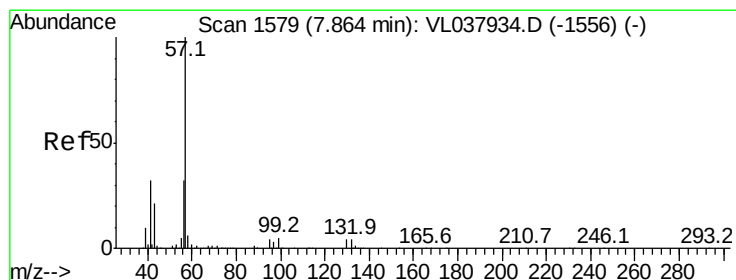
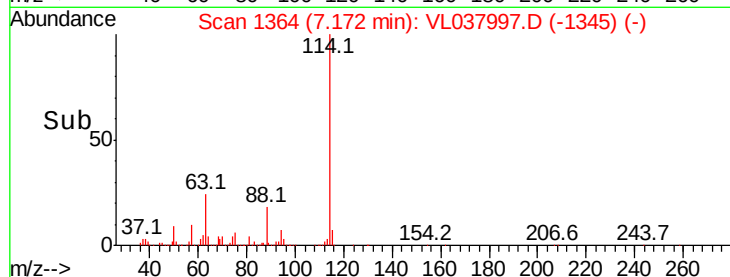
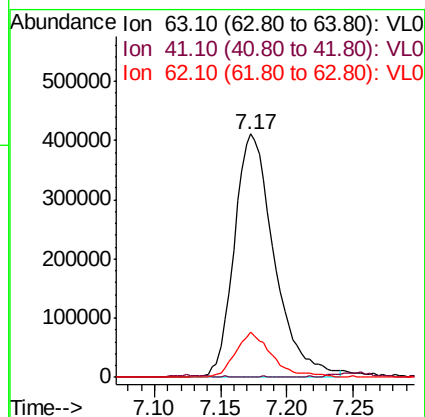
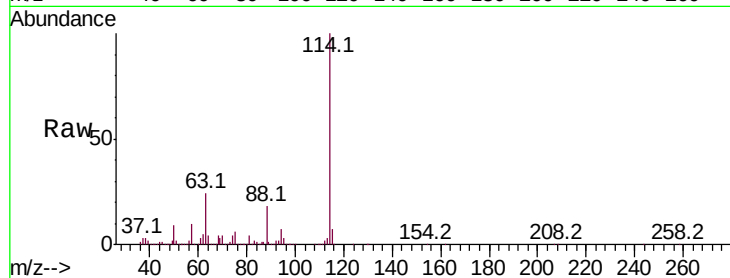
RT: 7.17 Instrument:

Delta R.T. MSVOA_1

Lab File: ClientSampleId:

Acq: 10 Nov 2021 2:41

Tot Ion:	63	Resp:	864140
Ion Ratio	Lower	Upper	
63	100		
41	0.0	51.6	77.4#
62	18.7	53.5	80.3#



#44

2,2,4-Trimethylpentane

Concen: 0.070 ppbv

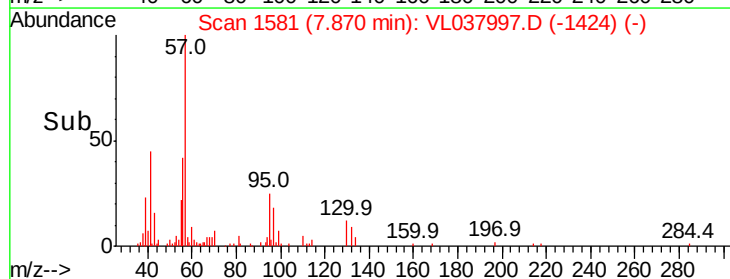
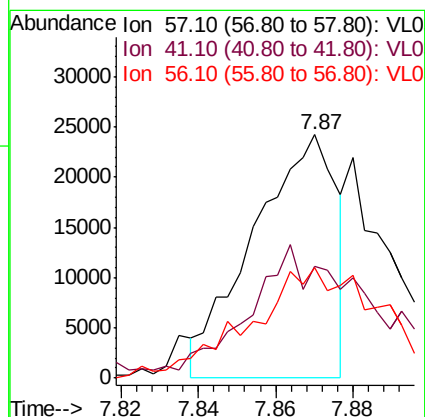
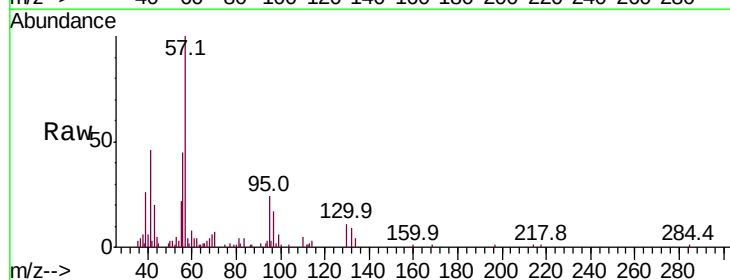
RT: 7.87 min Scan# 1581

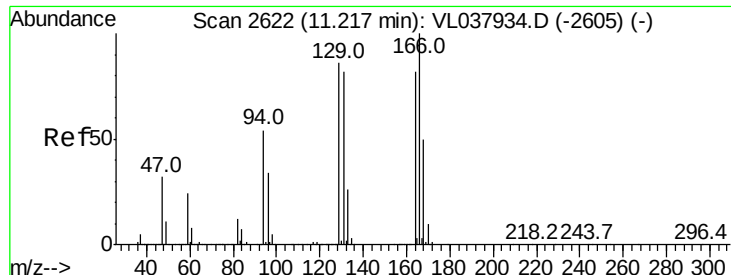
Delta R.T. 0.01 min

Lab File: VL037997.D

Acq: 10 Nov 2021 2:41

Tgt Ion:	57	Resp:	36259
Ion Ratio	Lower	Upper	
57	100		
41	76.8	25.8	38.8#
56	71.1	25.9	38.9#





#52

Tetrachloroethene

Concen: 0.104 ppbv

RT: 11.21

Delta R.T. MSVOA_L

Lab File:

Acq: 10 Nov 2021 2:41

Tot Ion: 164 Resp: 11990

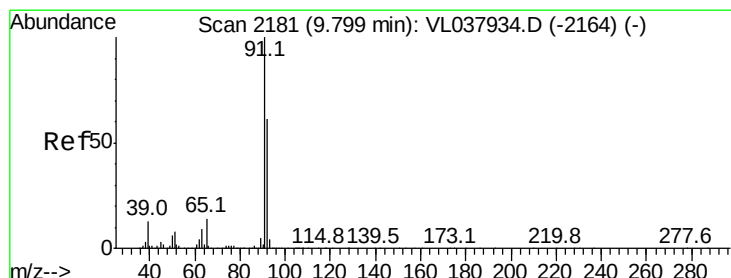
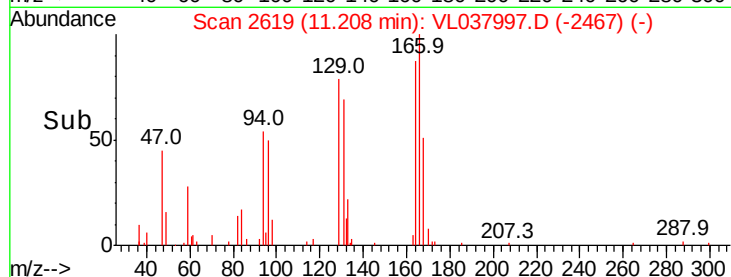
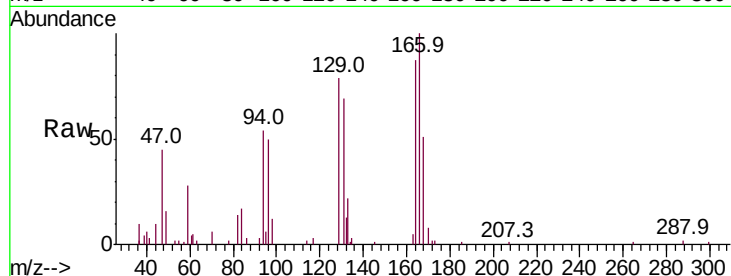
Ion Ratio Lower Upper

164 100

166 104.0 97.6 146.4

129 90.0 84.2 126.2

131 79.7 79.6 119.4



#53

Toluene

Concen: 0.913 ppbv

RT: 9.81 min Scan# 2184

Delta R.T. 0.01 min

Lab File: VL037997.D

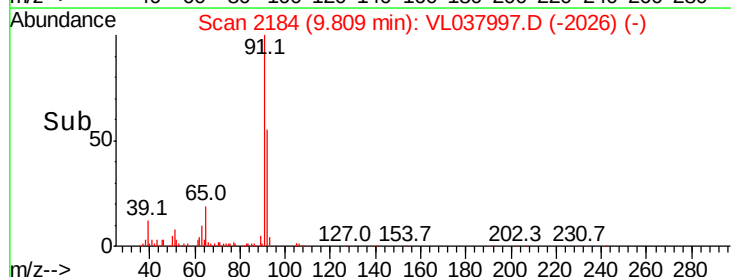
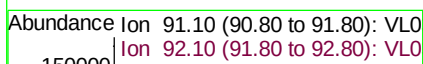
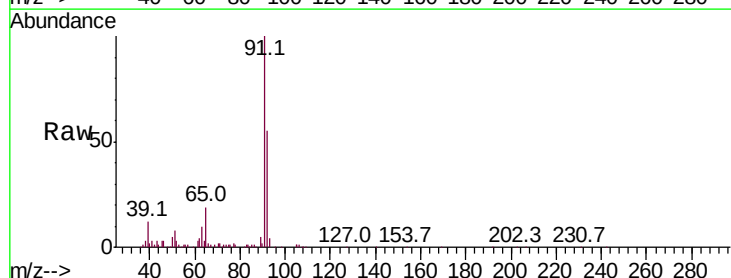
Acq: 10 Nov 2021 2:41

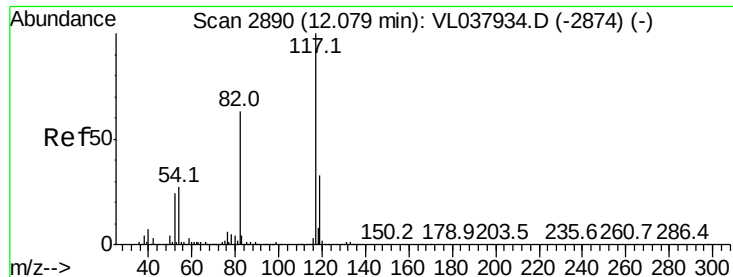
Tgt Ion: 91 Resp: 296792

Ion Ratio Lower Upper

91 100

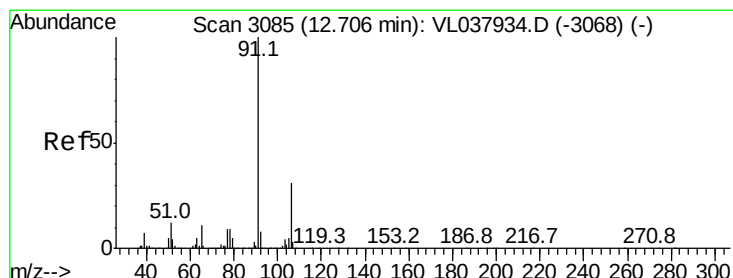
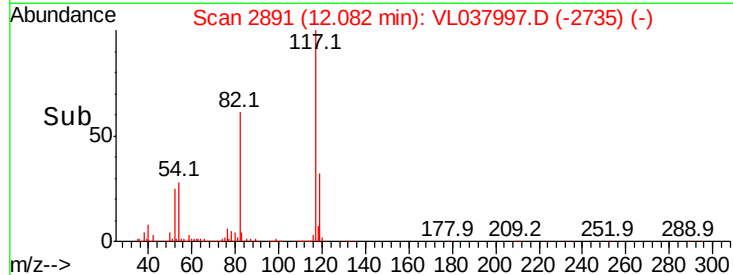
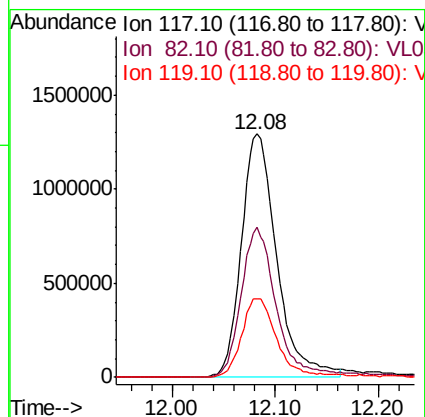
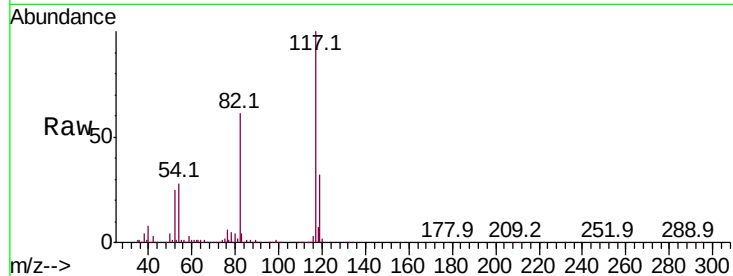
92 60.9 48.2 72.4





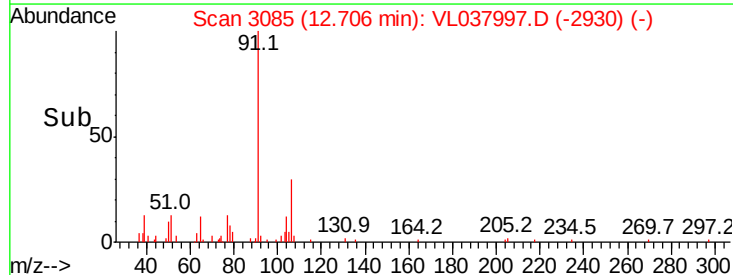
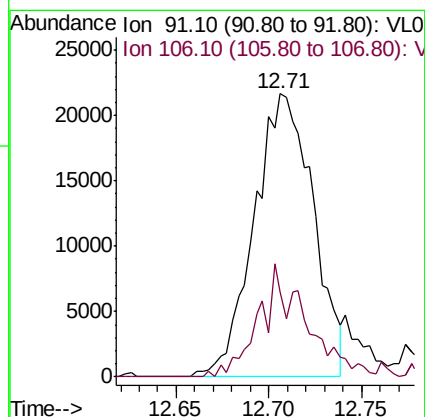
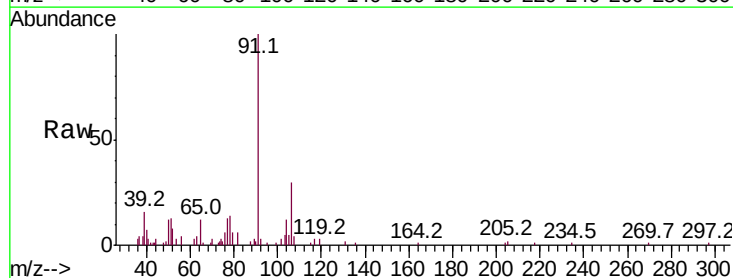
#55
Chlorobenzene-d5
Concen: 10.000 ppbv
RT: 12.08 min
Instrument: MSVOA_1
Delta R.T.:
Lab File: ClientSampleId:
Acq: 10 Nov 2021 2:41

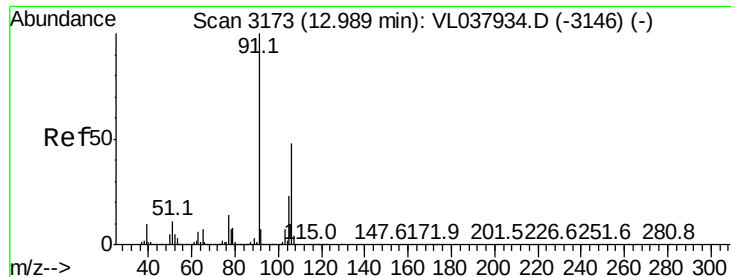
Tot Ion: 117 Resp: 3092041
Ion Ratio Lower Upper
117 100
82 64.4 51.0 76.6
119 33.3 26.9 40.3



#58
Ethyl Benzene
Concen: 0.127 ppbv
RT: 12.71 min Scan# 3085
Delta R.T.: -0.00 min
Lab File: VL037997.D
Acq: 10 Nov 2021 2:41

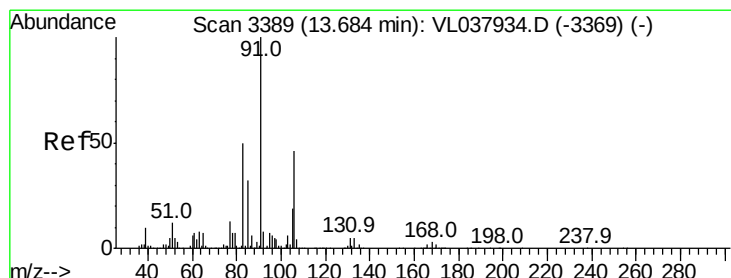
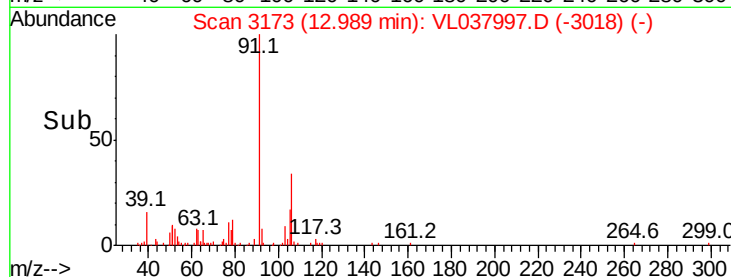
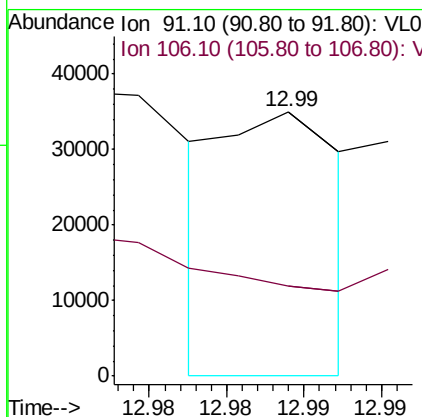
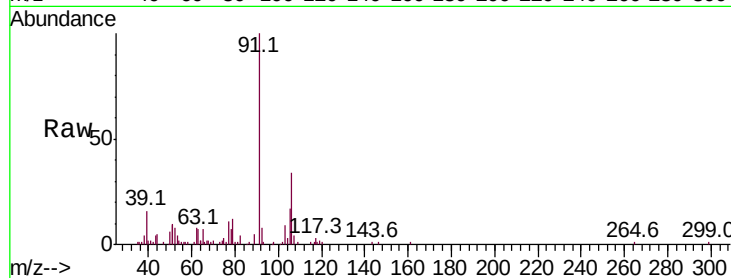
Tgt Ion: 91 Resp: 48036
Ion Ratio Lower Upper
91 100
106 30.1 25.1 37.7





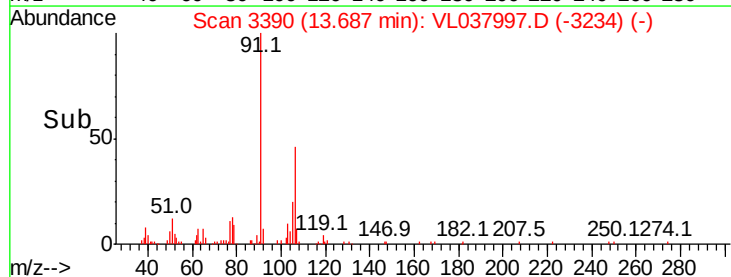
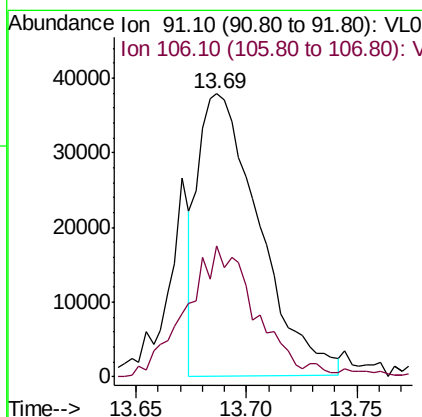
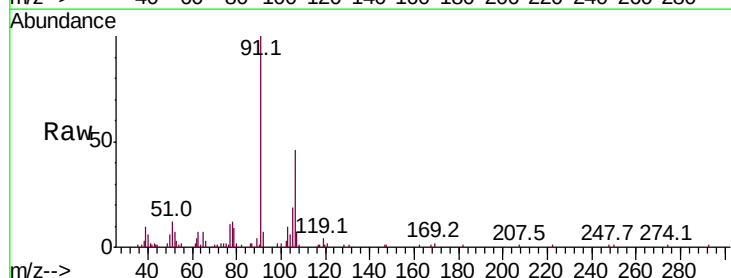
#59
m/p-Xylene
Concen: 0.055 ppbv
RT: 12.99 min
Delta R.T. MSVOA_L
Lab File: ClientSampleId :
Acq: 10 Nov 2021 2:41

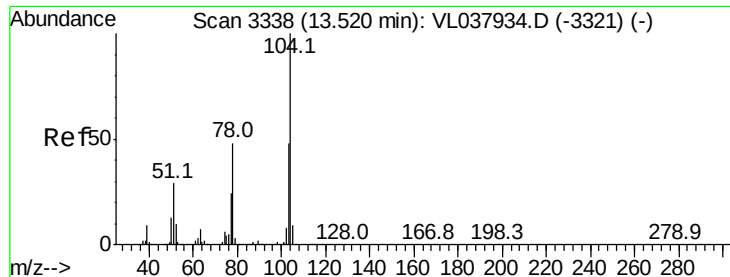
Tot Ion: 91 Resp: 18625
Ion Ratio Lower Upper
91 100
106 0.0 37.1 55.7#



#60
o-Xylene
Concen: 0.228 ppbv
RT: 13.69 min Scan# 3390
Delta R.T. 0.00 min
Lab File: VL037997.D
Acq: 10 Nov 2021 2:41

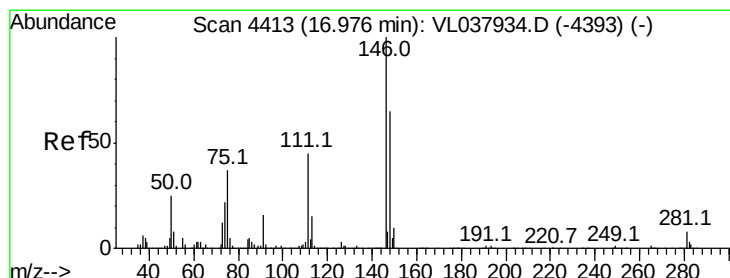
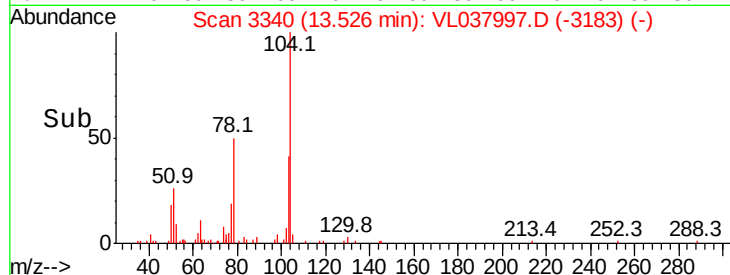
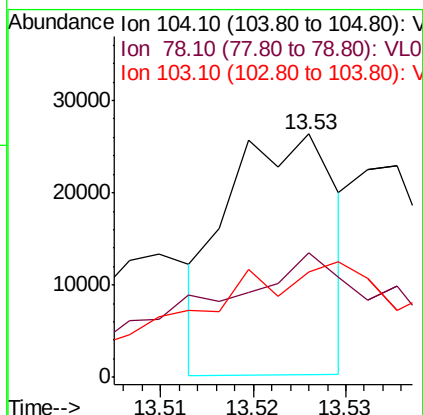
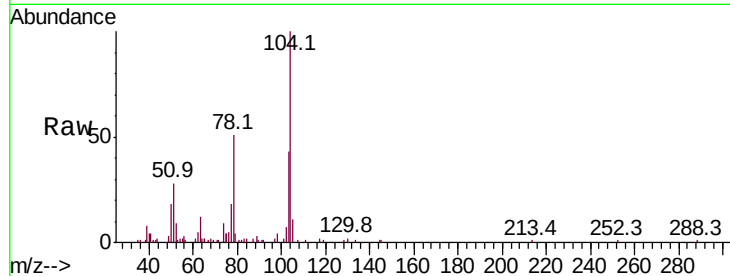
Tgt Ion: 91 Resp: 72282
Ion Ratio Lower Upper
91 100
106 55.1 23.5 70.6





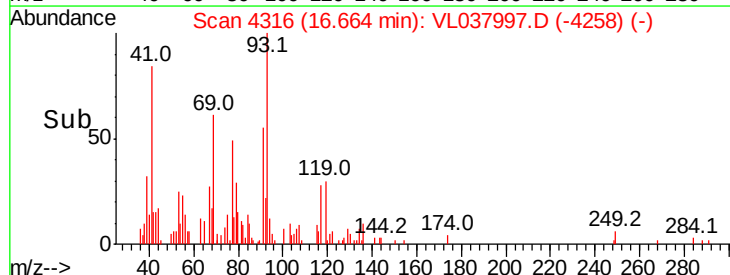
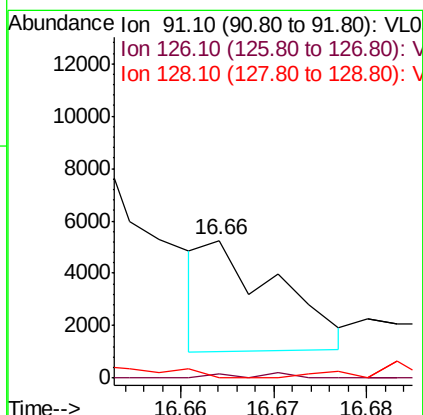
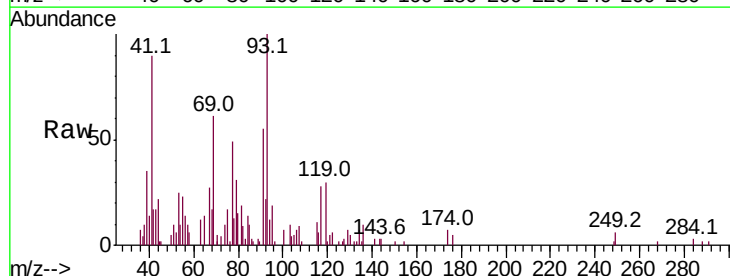
#61
Stvrene
Concen: 0.145 ppbv
RT: 13.53
Delta R.T. MSVOA_L
Lab File: ClientSampleId :
Acq: 10 Nov 2021 2:41

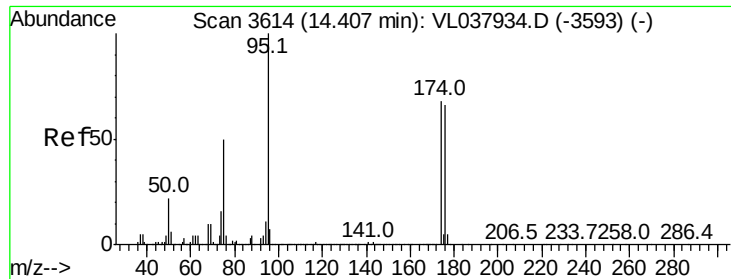
Tot Ion: 104 Resp: 21143
Ion Ratio Lower Upper
104 100
78 130.3 39.3 58.9#
103 147.3 39.6 59.4#



#66
Benzyl Chloride
Concen: 0.110 ppbv
RT: 16.66 min Scan# 4316
Delta R.T. -0.31 min
Lab File: VL037997.D
Acq: 10 Nov 2021 2:41

Tgt Ion: 91 Resp: 2285
Ion Ratio Lower Upper
91 100
126 3.3 13.8 20.6#
128 24.8 5.1 7.7#





#68

1-Bromo-4-Fluorobenzene

Concen: 9.705 ppbv

RT: 14.41 min

Delta R.T. MSVOA_L

Lab File: ClientSampleId :

Acq: 10 Nov 2021 2:41

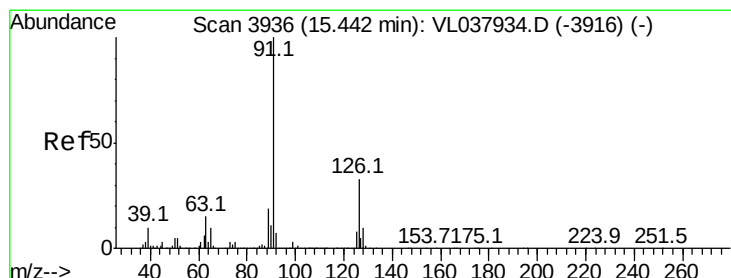
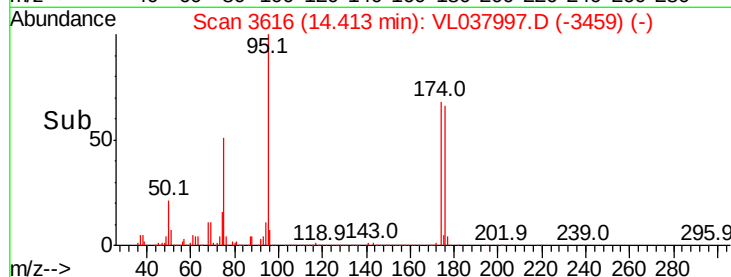
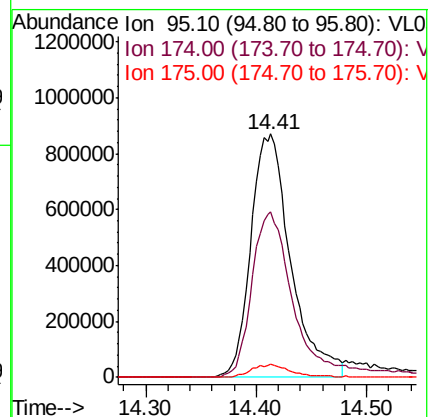
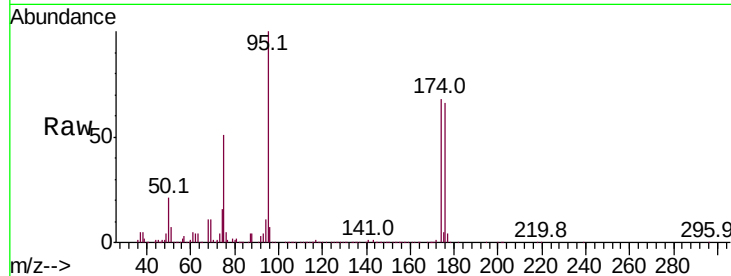
Tot Ion: 95 Resp: 2181343

Ion Ratio Lower Upper

95 100

174 74.9 58.3 87.5

175 5.5 4.6 6.8



#71

2-Chlorotoluene

Concen: 2.204 ppbv

RT: 15.31 min Scan# 3896

Delta R.T. -0.13 min

Lab File: VL037997.D

Acq: 10 Nov 2021 2:41

Tgt Ion: 91 Resp: 692842

Ion Ratio Lower Upper

91 100

126 0.1 13.3 53.3#

