

Data Path : Z:\VOASRV\HPCHEM1\MSVOA L\DATA\VL061319\
 Data File : VL033906.D
 Acq On : 13 Jun 2019 20:44
 Operator : SY/AP
 Sample : K3357-01DL 10X
 Misc : 400ml/MSVOA L
 ALS Vial : 1 Sample Multiplier: 1

Instrument :
 MSVOA_L
 ClientSampleId :

Quant Time: Jun 14 05:34:35 2019
 Quant Method : Z:\VOASRV\HPCHEM1\MSVOA L\METHODS\VL060719AIR.M
 Quant Title : AIR ANALYSIS BY METHOD TO-15 Instrument: MSVOA_L Fri Jun 07 08:53:27 2019
 QLast Update : Fri Jun 07 08:53:27 2019
 Response via : Initial Calibration

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Bromochloromethane	5.75	49	955687	10.00	ppbv	0.00
33) 1,4-Difluorobenzene	7.28	114	2258126	10.00	ppbv	0.00
55) Chlorobenzene-d5	12.22	117	2329993	10.00	ppbv	0.00

System Monitoring Compounds						
68) 1-Bromo-4-Fluorobenzene	14.56	95	1875233	9.80	ppbv	0.00
Spiked Amount	10.000	Range	65 - 135	Recovery	=	98.00%

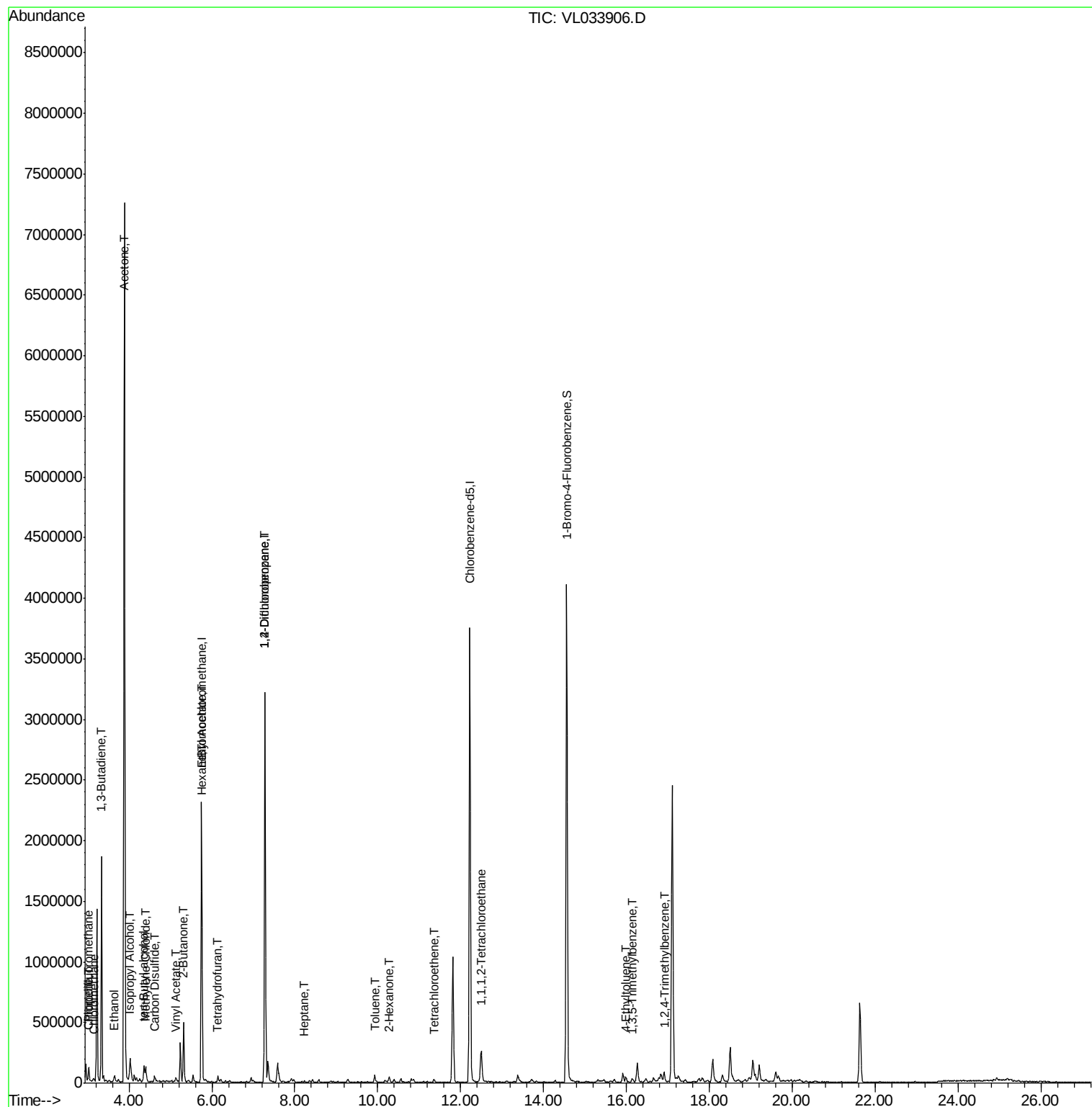
Target Compounds					Ovalue
3) Chlorodifluoromethane	3.01	51	9847	0.088 ppbv #	84
4) Chloromethane	3.16	50	4512	0.070 ppbv #	69
9) Propene	3.03	41	37831	0.899 ppbv	95
10) Heptane	8.23	43	3236	0.030 ppbv #	74
13) Ethanol	3.64	45	25980	1.897 ppbv #	37
15) Acetone	3.89	43	7464992	53.557 ppbv	90
16) 1,3-Butadiene	3.34	39	446704	8.420 ppbv #	13
17) tert-Butyl alcohol	4.35	59	110003	1.010 ppbv #	94
19) Isopropyl Alcohol	4.02	45	204202	2.565 ppbv #	94
20) Methylene Chloride	4.40	84	37754	0.695 ppbv	92
23) Vinyl Acetate	5.13	43	29651	0.183 ppbv #	92
25) Ethyl Acetate	5.76	43	19878	0.094 ppbv #	90
26) Hexane	5.77	57	18982	0.196 ppbv #	35
27) Carbon Disulfide	4.61	76	5085	0.038 ppbv #	1
34) 2-Butanone	5.32	43	552444	4.337 ppbv	100
39) 1,2-Dichloropropane	7.28	63	574916	8.636 ppbv #	26
41) Tetrahydrofuran	6.13	42	4545	0.070 ppbv #	35
51) 2-Hexanone	10.27	43	37187	0.251 ppbv #	95
52) Tetrachloroethene	11.35	164	2853	0.047 ppbv #	86
53) Toluene	9.93	91	38500	0.202 ppbv	99
56) 1,1,1,2-Tetrachloroethane	12.49	131	89668	0.881 ppbv #	26
72) 4-Ethyltoluene	15.98	105	15591	0.056 ppbv #	63
73) 1,3,5-Trimethylbenzene	16.14	105	16499	0.060 ppbv	97
74) 1,2,4-Trimethylbenzene	16.91	105	50534	0.159 ppbv #	71

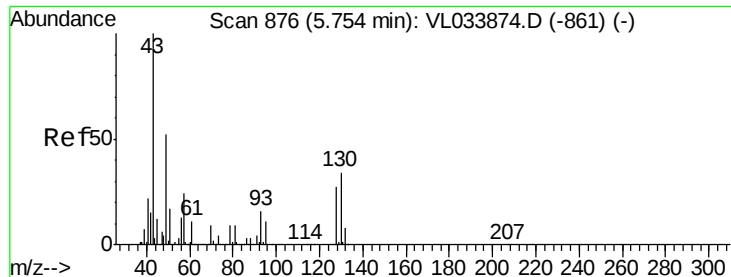
(#) = qualifier out of range (m) = manual integration (+) = signals summed

Data Path : Z:\VOASRV\HPCHEM1\MSVOA L\DATA\VL061319\
Data File : VL033906.D
Acq On : 13 Jun 2019 20:44
Operator : SY/AP
Sample : K3357-01DL 10X
Misc : 400ml/MSVOA L
ALS Vial : 1 Sample Multiplier: 1

Instrument :
MSVOA_L
ClientSampleId :

Quant Time: Jun 14 05:34:35 2019
Quant Method : Z:\VOASRV\HPCHEM1\MSVOA L\METHODS\VL060719AIR.M
Quant Title : AIR ANALYSIS BY METHOD TO-15 Instrument: MSVOA_L Fri Jun 07 08:53:27 2019
QLast Update : Fri Jun 07 08:53:27 2019
Response via : Initial Calibration





#1

Bromochloromethane

Concen: 10.000 ppbv

RT: 5.75 min Scan# 875

Delta R.T. -0.00 min

Lab File: VL033906.D

Acq: 13 Jun 2019 20:44

Instrument :
MSVOA_L
ClientSampleId :

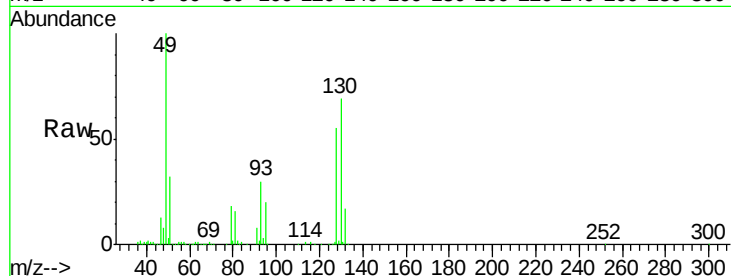
Tot Ion: 49 Resp: 955687

Ion Ratio Lower Upper

49 100

128 52.0 25.5 76.5

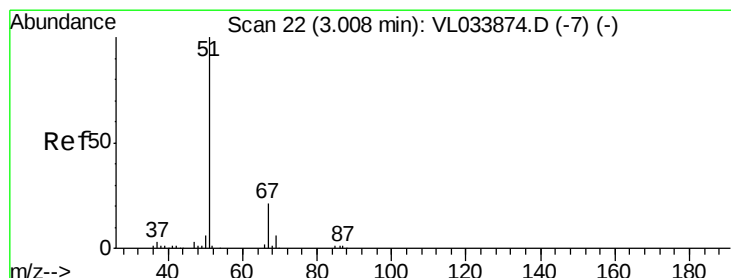
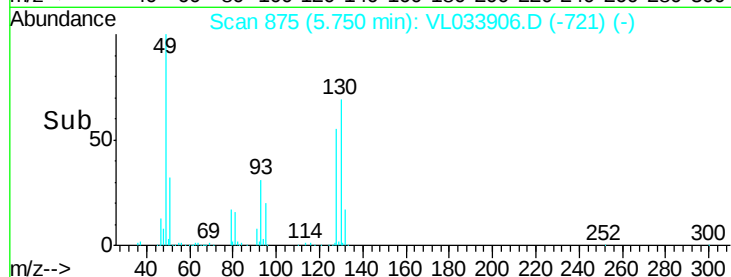
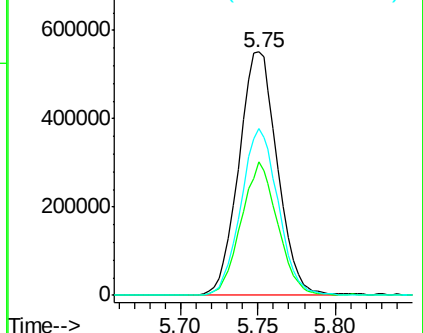
130 66.9 32.5 97.4



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



#3

Chlorodifluoromethane

Concen: 0.088 ppbv

RT: 3.01 min Scan# 22

Delta R.T. -0.00 min

Lab File: VL033906.D

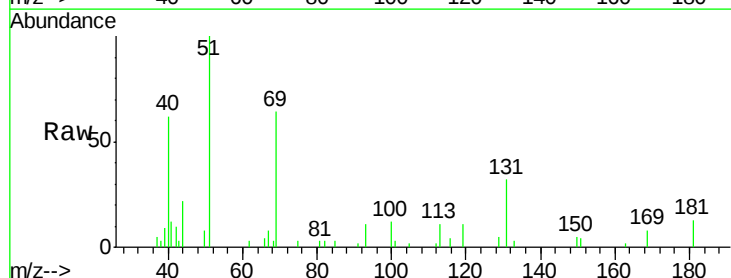
Acq: 13 Jun 2019 20:44

Tgt Ion: 51 Resp: 9847

Ion Ratio Lower Upper

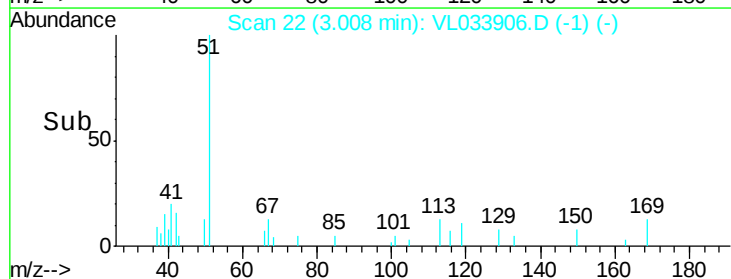
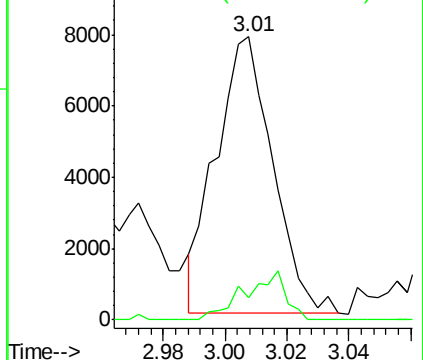
51 100

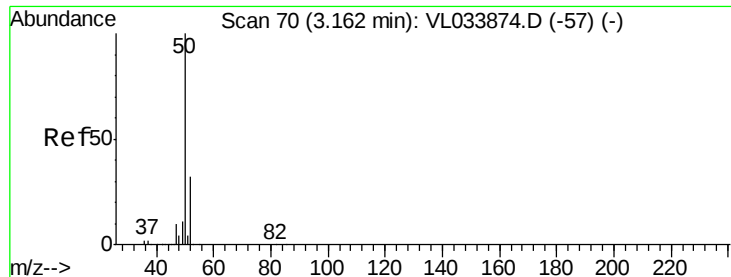
67 12.9 16.4 24.6#



Abundance Ion 51.00 (50.70 to 51.70): VL0

Ion 67.00 (66.70 to 67.70): VL0





#4

Chloromethane

Concen: 0.070 ppbv

RT: 3.16 min Scan# 70

Delta R.T. -0.00 min

Lab File: VL033906.D

Acq: 13 Jun 2019 20:44

Instrument :

MSVOA_L

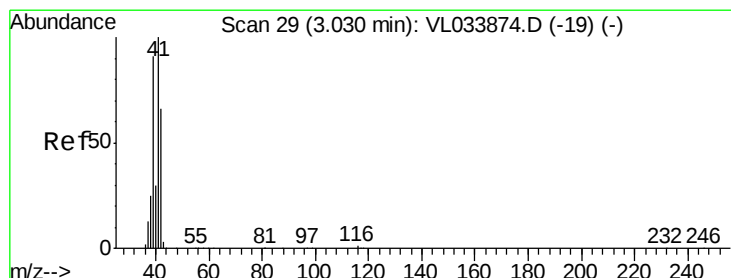
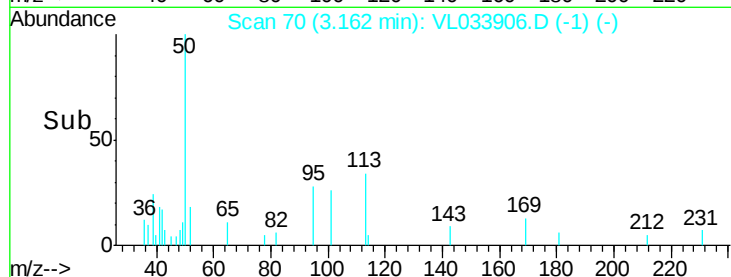
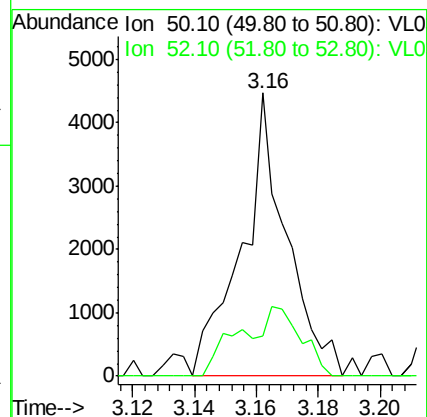
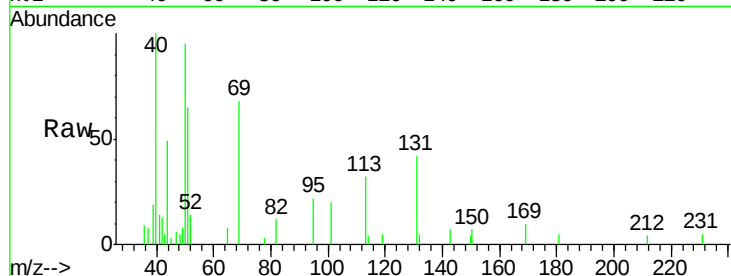
ClientSampleId :

Tot Ion: 50 Resp: 4512

Ion Ratio Lower Upper

50 100

52 14.2 25.4 38.0#



#9

Propene

Concen: 0.899 ppbv

RT: 3.03 min Scan# 28

Delta R.T. -0.00 min

Lab File: VL033906.D

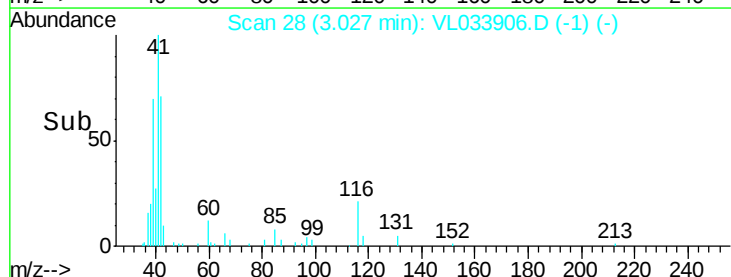
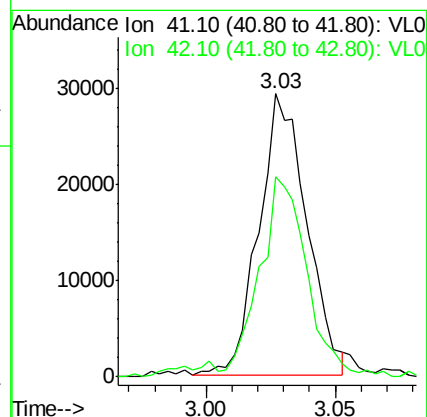
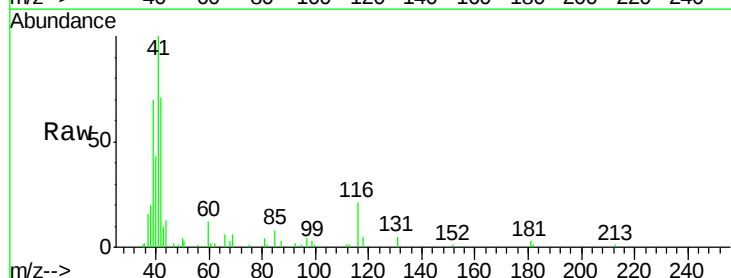
Acq: 13 Jun 2019 20:44

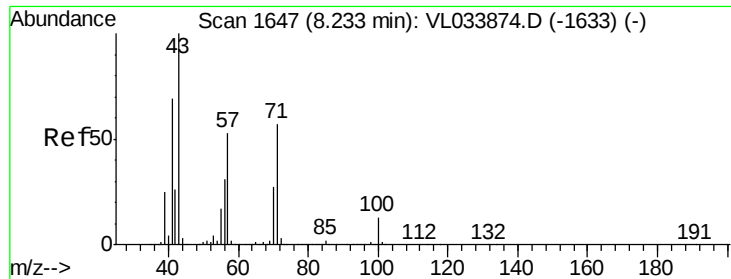
Tgt Ion: 41 Resp: 37831

Ion Ratio Lower Upper

41 100

42 74.9 56.3 84.5

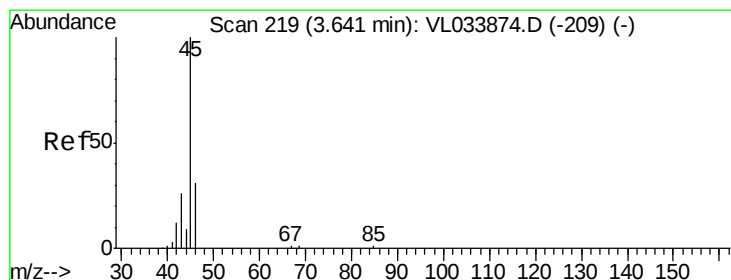
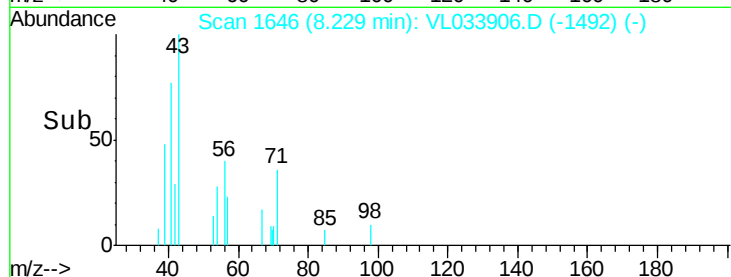
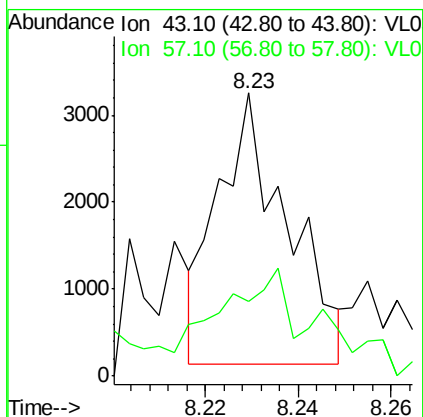
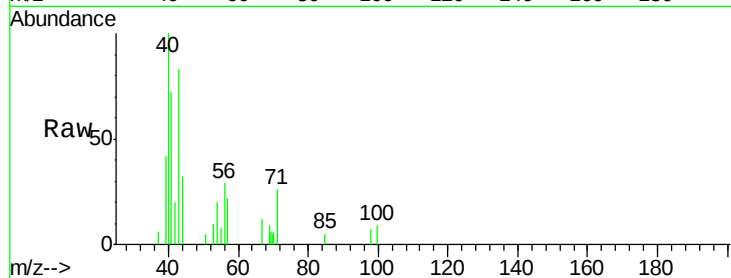




#10
Heptane
Concen: 0.030 ppbv
RT: 8.23 min Scan# 1646
Delta R.T. -0.00 min
Lab File: VL033906.D
Acq: 13 Jun 2019 20:44

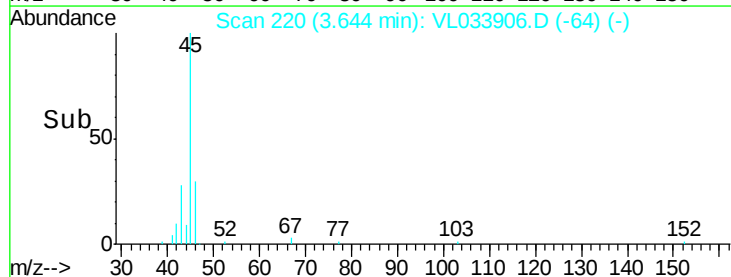
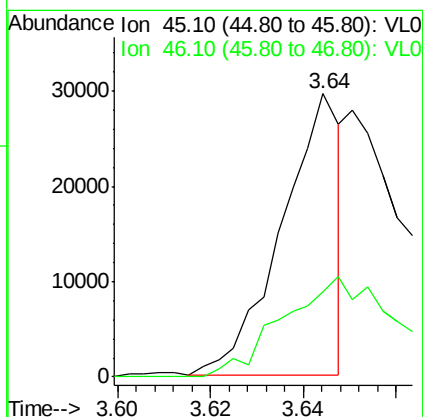
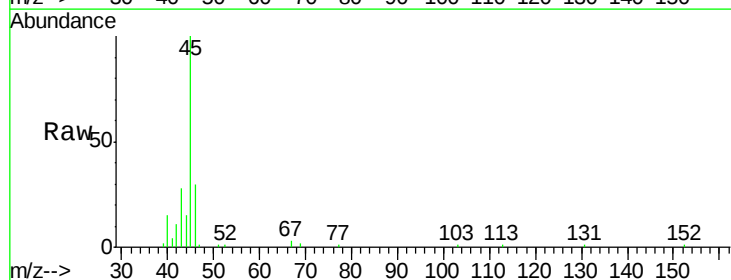
Instrument :
MSVOA_L
ClientSampled :

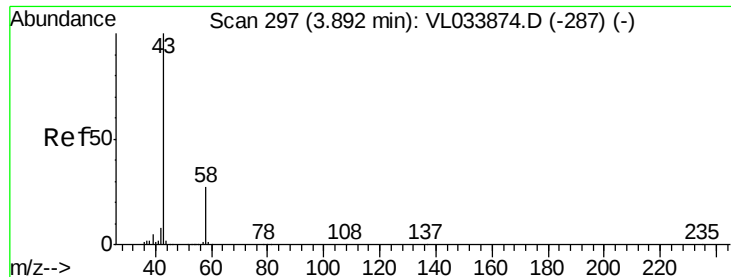
Tot Ion: 43 Resp: 3236
Ion Ratio Lower Upper
43 100
57 70.4 41.7 62.5#



#13
Ethanol
Concen: 1.897 ppbv
RT: 3.64 min Scan# 220
Delta R.T. 0.00 min
Lab File: VL033906.D
Acq: 13 Jun 2019 20:44

Tgt Ion: 45 Resp: 25980
Ion Ratio Lower Upper
45 100
46 0.0 15.3 61.1#





#15

Acetone

Concen: 53.557 ppbv

RT: 3.89 min Scan# 295

Delta R.T. -0.01 min

Lab File: VL033906.D

Acq: 13 Jun 2019 20:44

Instrument :

MSVOA_L

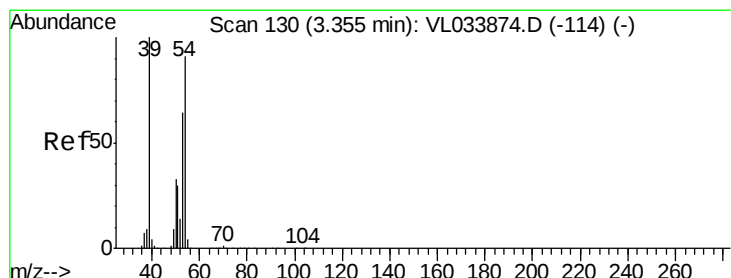
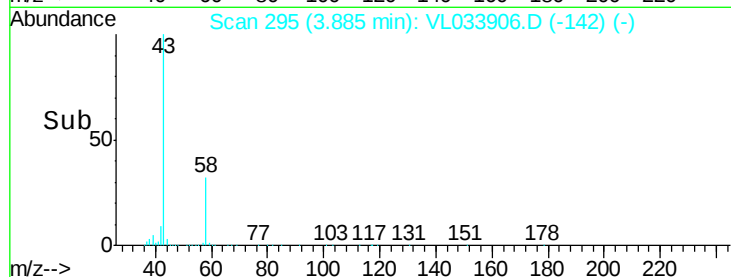
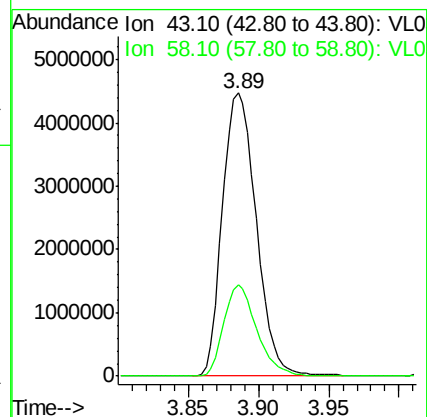
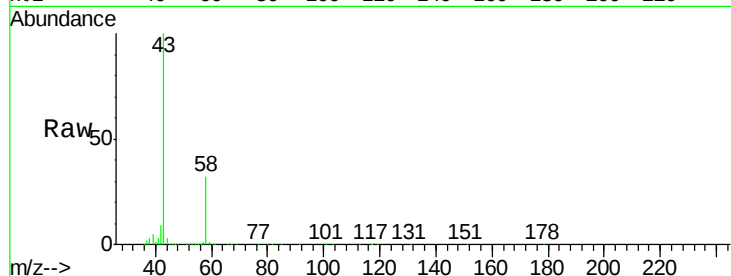
ClientSampleId :

Tot Ion: 43 Resp: 7464992

Ion Ratio Lower Upper

43 100

58 31.8 21.3 31.9



#16

1,3-Butadiene

Concen: 8.420 ppbv

RT: 3.34 min Scan# 124

Delta R.T. -0.02 min

Lab File: VL033906.D

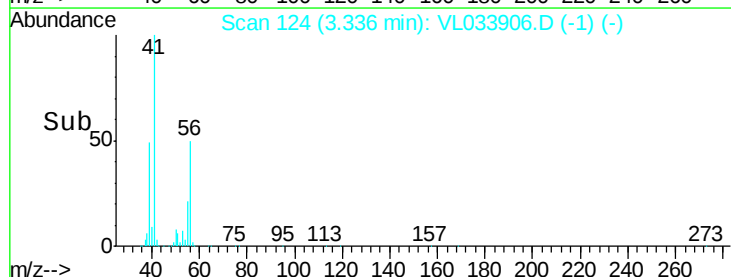
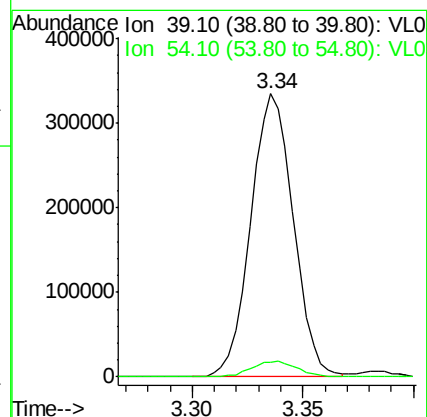
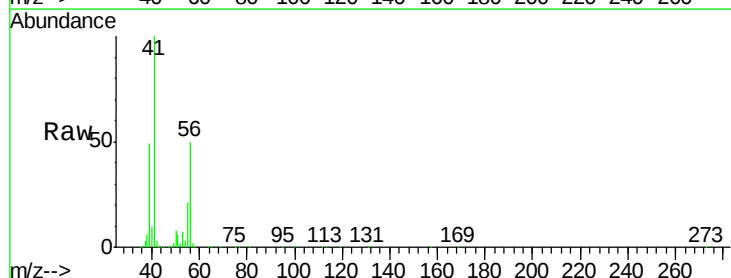
Acq: 13 Jun 2019 20:44

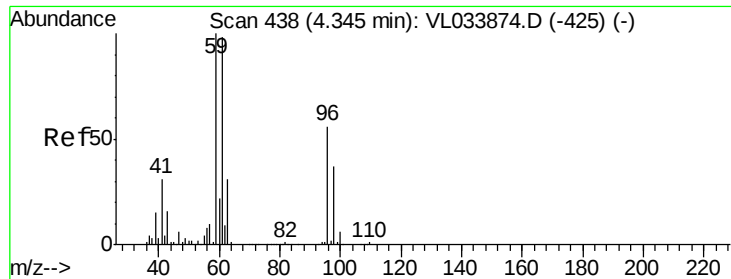
Tgt Ion: 39 Resp: 446704

Ion Ratio Lower Upper

39 100

54 6.1 68.6 103.0#

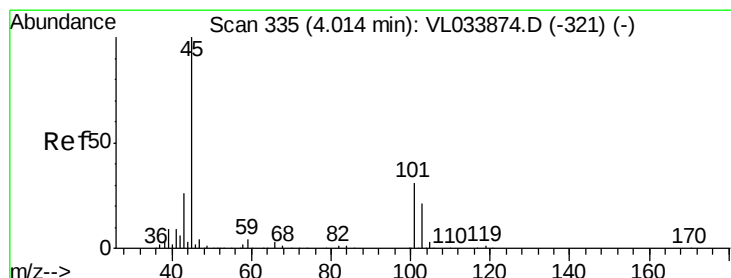
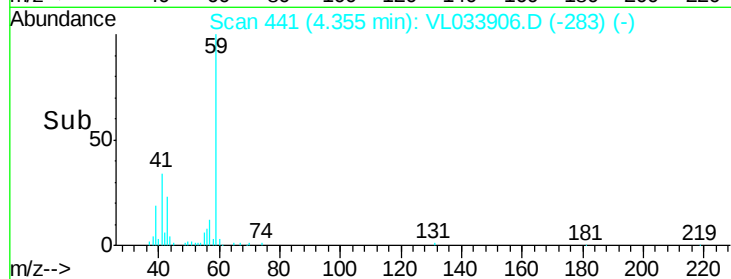
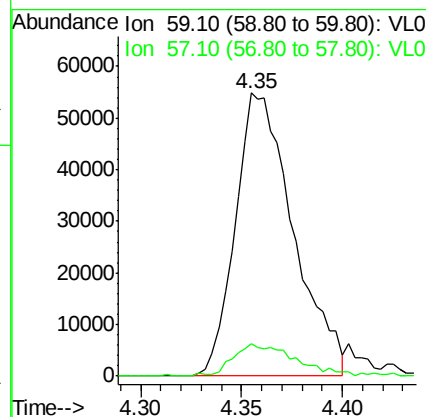
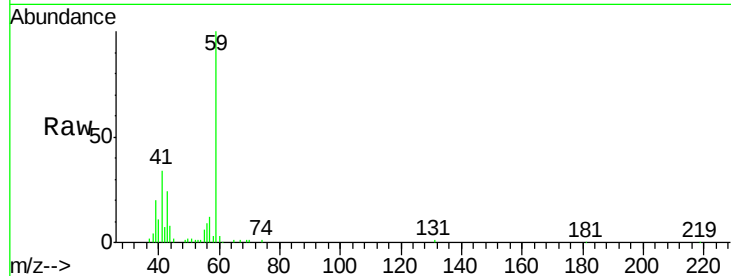




#17
tert-Butyl alcohol
Concen: 1.010 ppbv
RT: 4.35 min Scan# 441
Delta R.T. 0.01 min
Lab File: VL033906.D
Acq: 13 Jun 2019 20:44

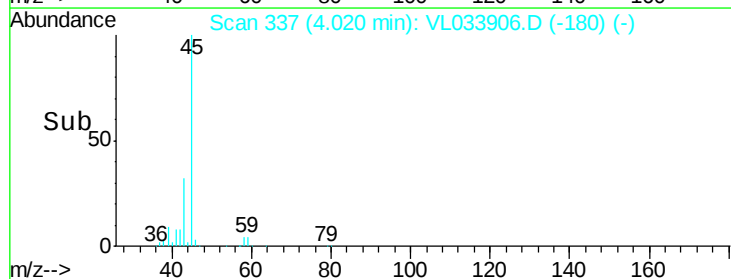
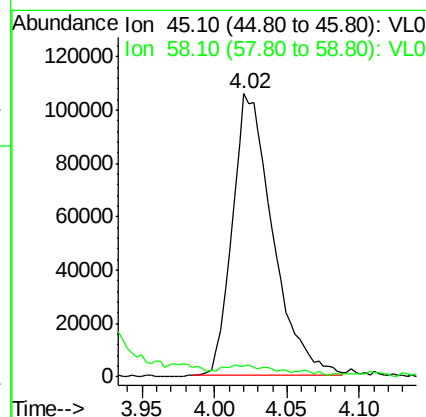
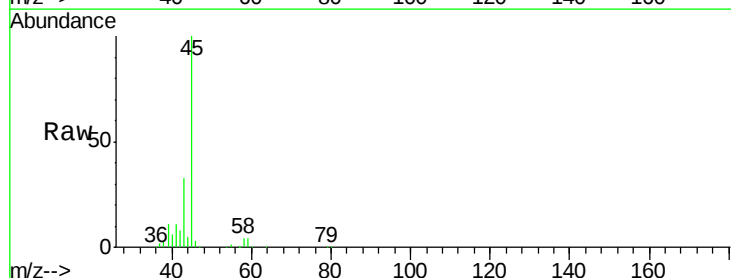
Instrument :
MSVOA_L
ClientSampleId :

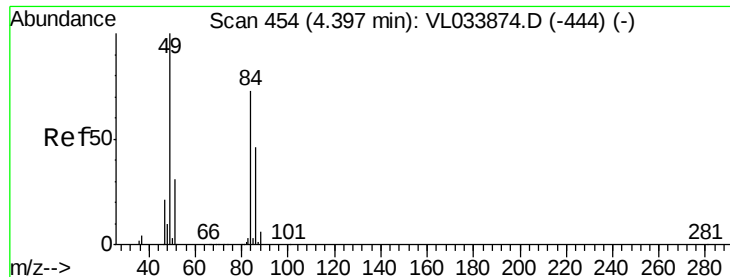
Tot Ion: 59 Resp: 110003
Ion Ratio Lower Upper
59 100
57 12.7 8.4 12.6#



#19
Isopropyl Alcohol
Concen: 2.565 ppbv
RT: 4.02 min Scan# 337
Delta R.T. 0.01 min
Lab File: VL033906.D
Acq: 13 Jun 2019 20:44

Tgt Ion: 45 Resp: 204202
Ion Ratio Lower Upper
45 100
58 0.0 1.8 2.6#

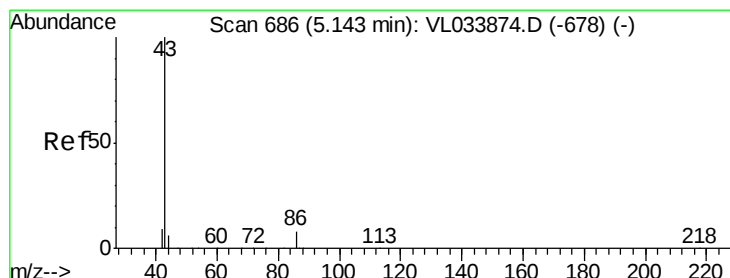
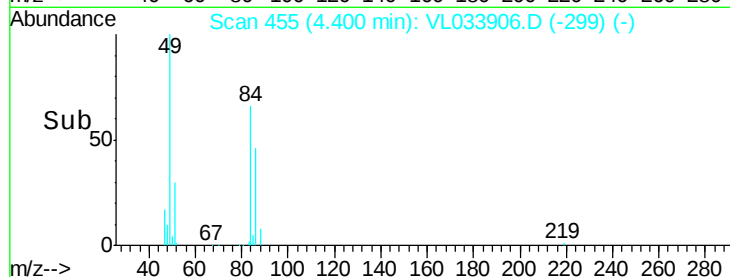
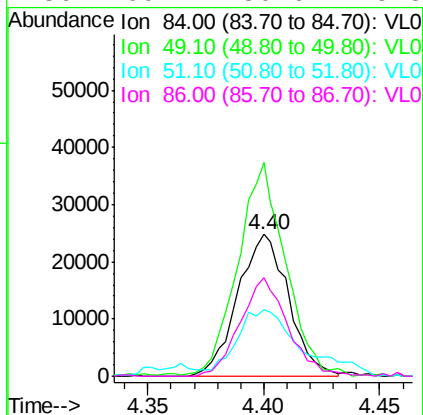
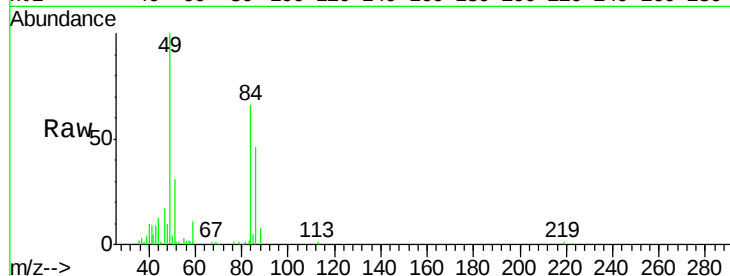




#20
Methvlene Chloride
Concen: 0.695 ppbv
RT: 4.40 min Scan# 455
Delta R.T. 0.00 min
Lab File: VL033906.D
Acq: 13 Jun 2019 20:44

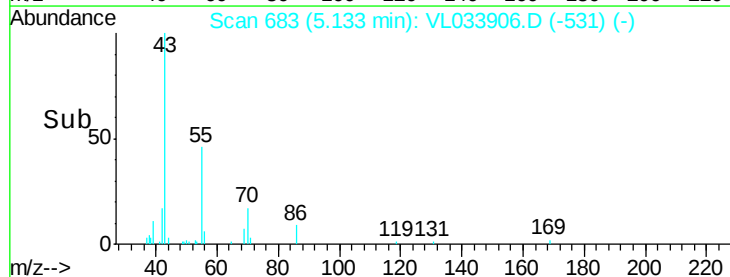
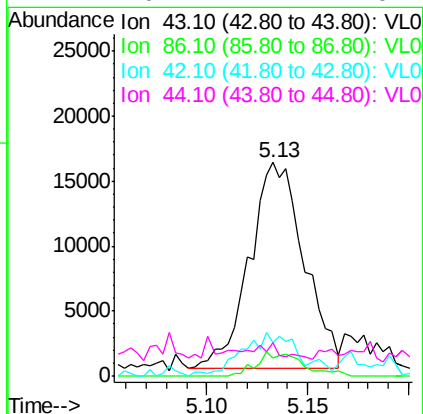
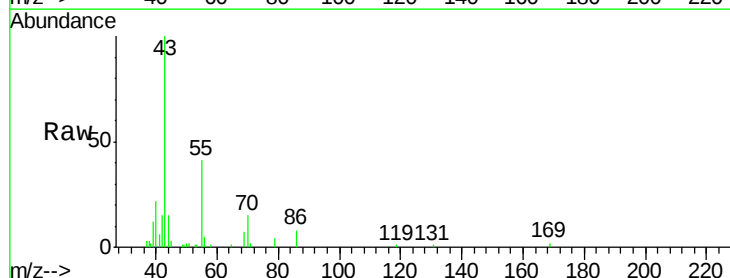
Instrument :
MSVOA_L
ClientSampleId :

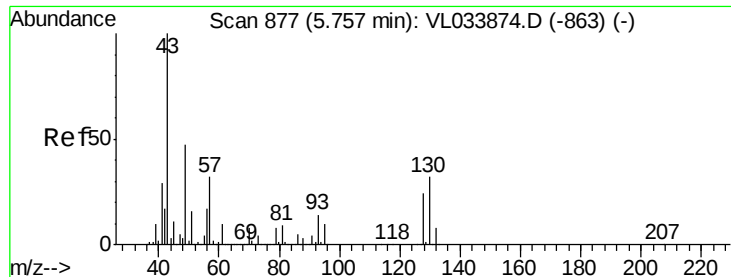
Tot Ion:	84	Resp:	37754
Ion	Ratio	Lower	Upper
84	100		
49	148.9	110.0	165.0
51	44.2	34.6	51.8
86	69.4	50.6	75.8



#23
Vinyl Acetate
Concen: 0.183 ppbv
RT: 5.13 min Scan# 683
Delta R.T. -0.01 min
Lab File: VL033906.D
Acq: 13 Jun 2019 20:44

Tgt Ion:	43	Resp:	29651
Ion	Ratio	Lower	Upper
43	100		
86	8.6	5.8	8.8
42	12.0	7.8	11.8#
44	10.4	4.2	6.4#





#25

Ethyl Acetate

Concen: 0.094 ppbv

RT: 5.76 min Scan# 879

Delta R.T. 0.01 min

Lab File: VL033906.D

Acq: 13 Jun 2019 20:44

Instrument :
MSVOA_L
ClientSampleId :

Tot Ion: 43 Resp: 19878

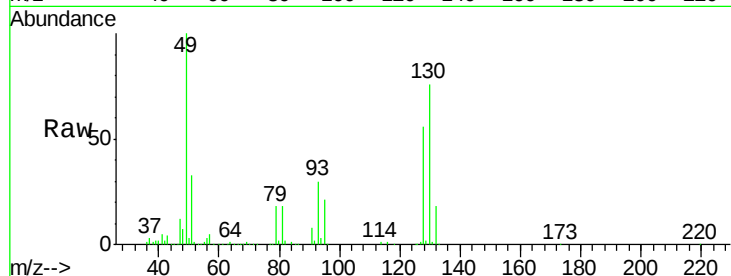
Ion Ratio Lower Upper

43 100

45 15.7 7.9 11.9#

61 5.8 7.8 11.6#

70 6.5 5.8 8.6

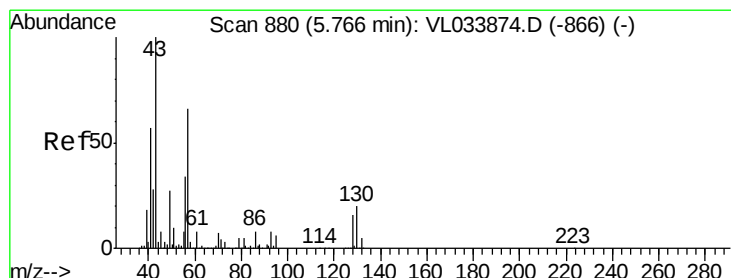
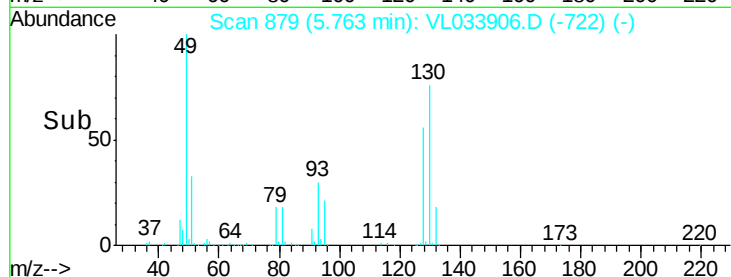
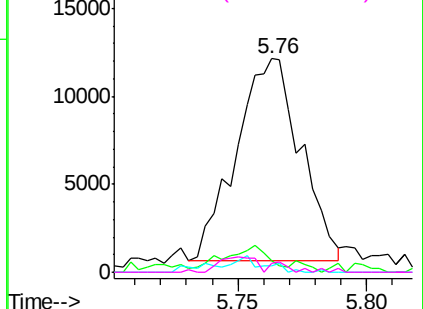


Abundance Ion 43.10 (42.80 to 43.80): VL0

Ion 45.10 (44.80 to 45.80): VL0

Ion 61.10 (60.80 to 61.80): VL0

Ion 70.10 (69.80 to 70.80): VL0



#26

Hexane

Concen: 0.196 ppbv

RT: 5.77 min Scan# 880

Delta R.T. -0.00 min

Lab File: VL033906.D

Acq: 13 Jun 2019 20:44

Tgt Ion: 57 Resp: 18982

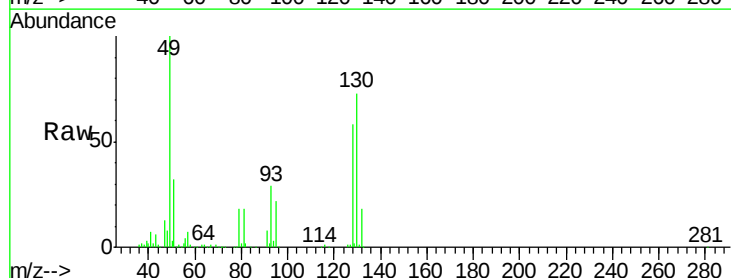
Ion Ratio Lower Upper

57 100

41 163.3 71.4 107.2#

43 121.4 183.7 275.5#

56 81.9 42.7 64.1#

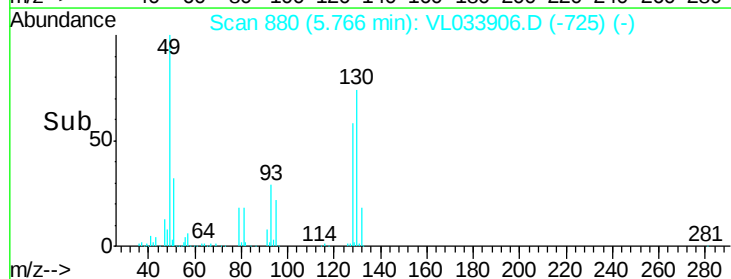
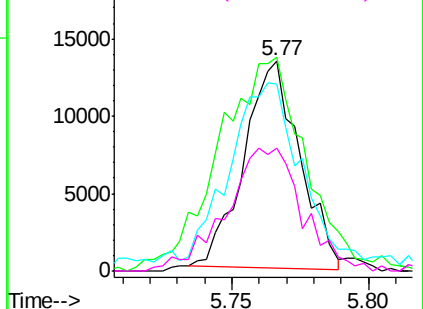


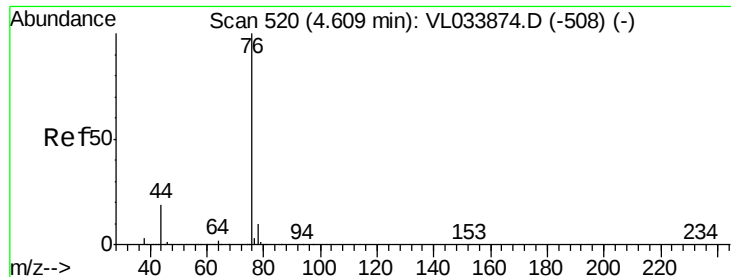
Abundance Ion 57.10 (56.80 to 57.80): VL0

Ion 41.10 (40.80 to 41.80): VL0

Ion 43.10 (42.80 to 43.80): VL0

Ion 56.10 (55.80 to 56.80): VL0





#27

Carbon Disulfide

Concen: 0.038 ppbv

RT: 4.61 min Scan# 520

Delta R.T. -0.00 min

Lab File: VL033906.D

Acq: 13 Jun 2019 20:44

Instrument :

MSVOA_L

ClientSampleId :

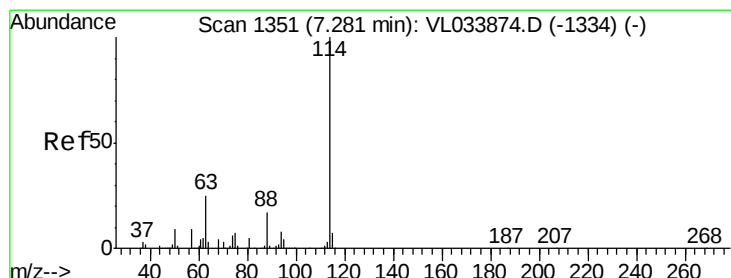
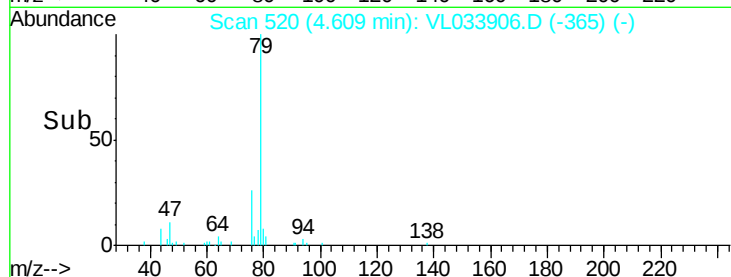
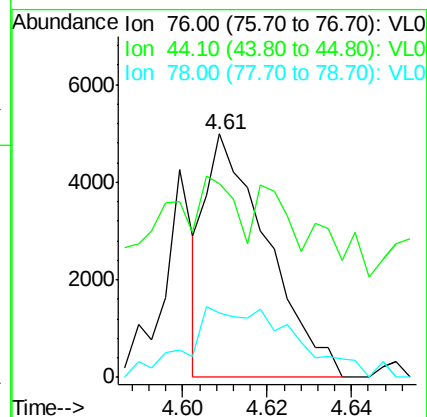
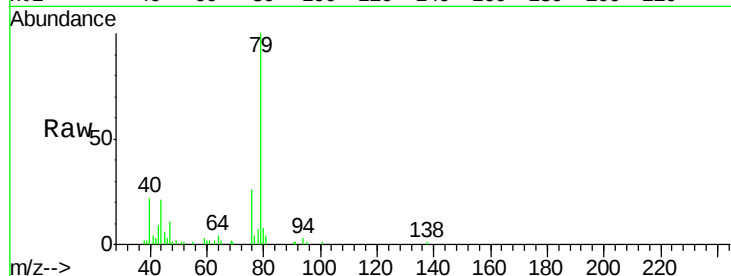
Tot Ion: 76 Resp: 5085

Ion Ratio Lower Upper

76 100

44 133.6 14.4 21.6#

78 54.3 7.5 11.3#



#33

1,4-Difluorobenzene

Concen: 10.000 ppbv

RT: 7.28 min Scan# 1350

Delta R.T. -0.00 min

Lab File: VL033906.D

Acq: 13 Jun 2019 20:44

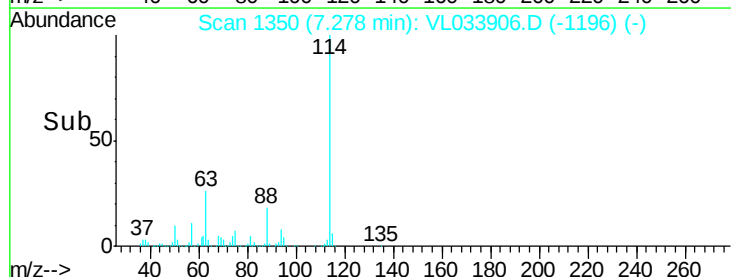
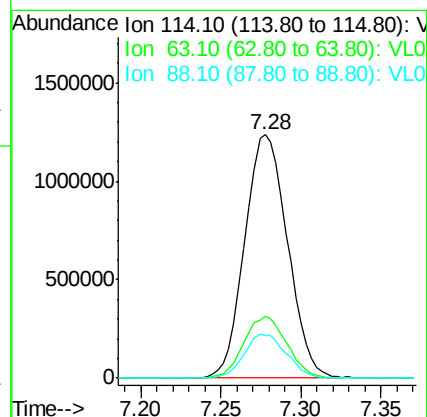
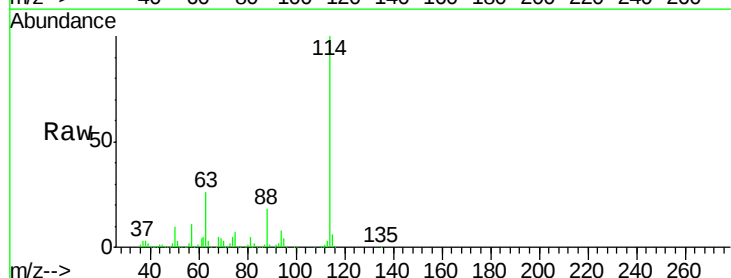
Tgt Ion: 114 Resp: 2258126

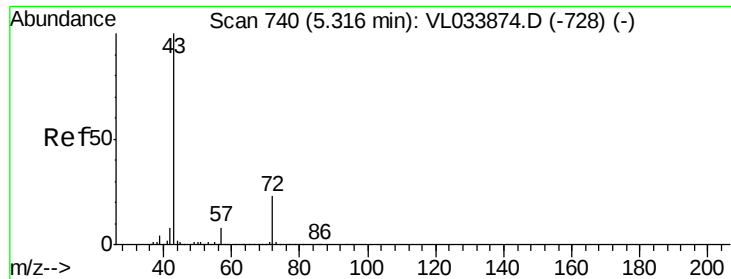
Ion Ratio Lower Upper

114 100

63 25.6 21.1 31.7

88 17.8 14.2 21.4

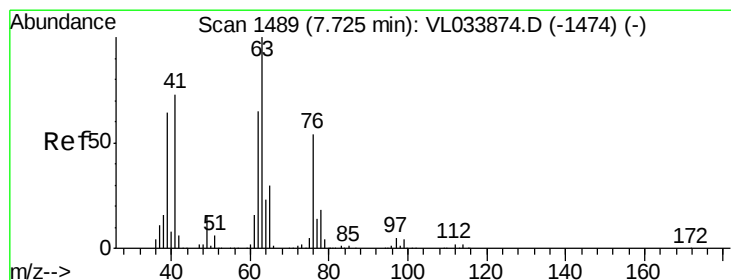
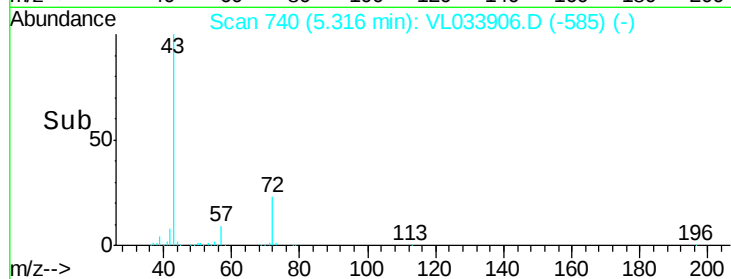
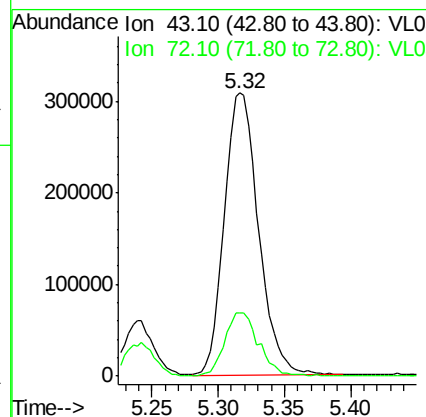
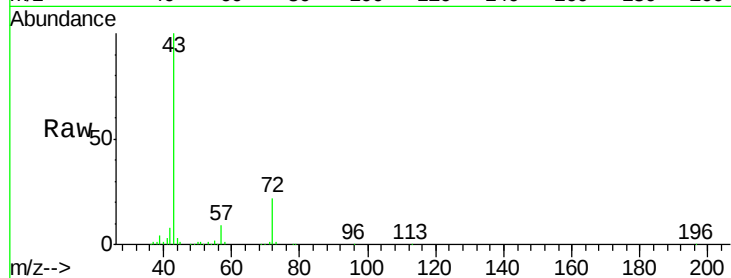




#34
2-Butanone
Concen: 4.337 ppbv
RT: 5.32 min Scan# 740
Delta R.T. -0.00 min
Lab File: VL033906.D
Acq: 13 Jun 2019 20:44

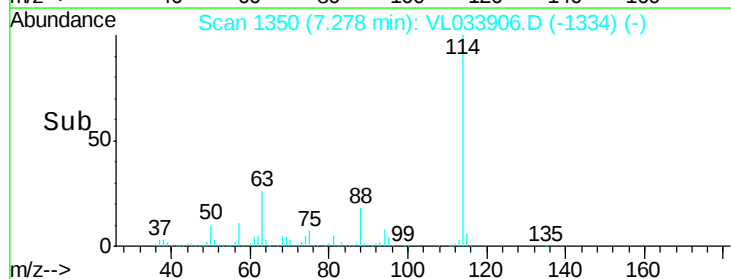
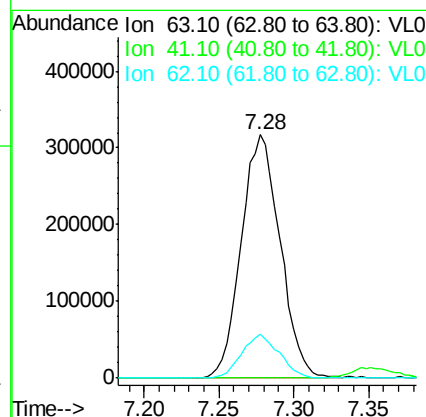
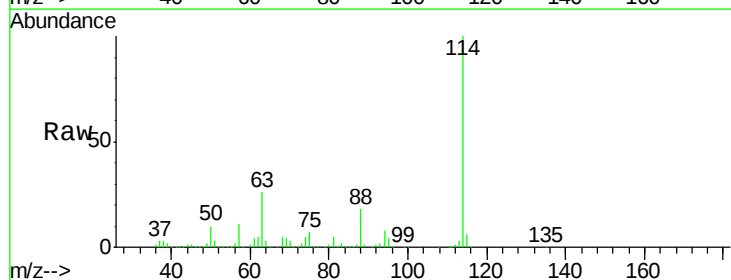
Instrument :
MSVOA_L
ClientSampleId :

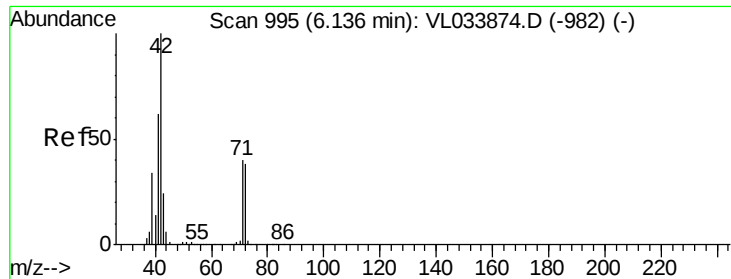
Tot Ion: 43 Resp: 552444
Ion Ratio Lower Upper
43 100
72 22.5 17.9 26.9



#39
1,2-Dichloropropane
Concen: 8.636 ppbv
RT: 7.28 min Scan# 1350
Delta R.T. -0.45 min
Lab File: VL033906.D
Acq: 13 Jun 2019 20:44

Tgt Ion: 63 Resp: 574916
Ion Ratio Lower Upper
63 100
41 0.2 58.7 88.1#
62 18.0 51.9 77.9#





#41

Tetrahydrofuran

Concen: 0.070 ppbv

RT: 6.13 min Scan# 993

Delta R.T. -0.01 min

Lab File: VL033906.D

Acq: 13 Jun 2019 20:44

Instrument :

MSVOA_L

ClientSampleId :

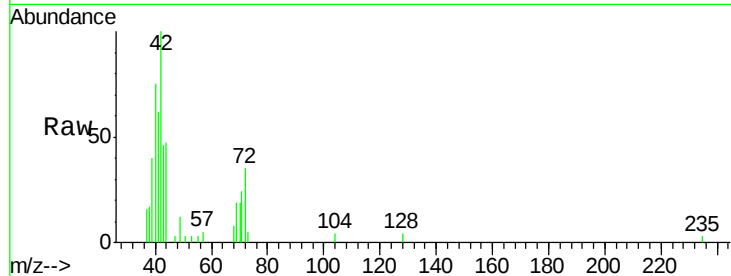
Tot Ion: 42 Resp: 4545

Ion Ratio Lower Upper

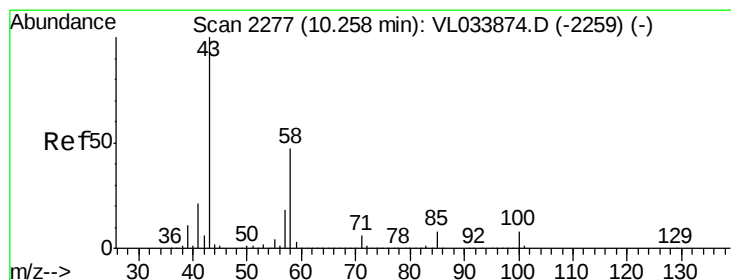
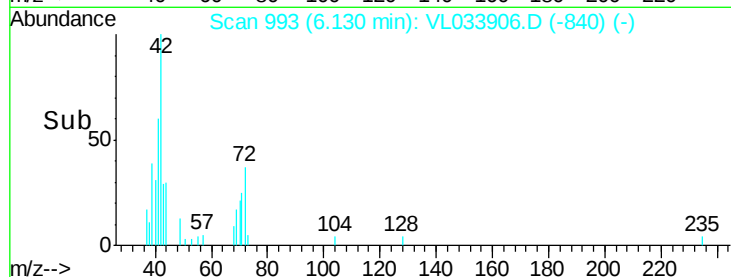
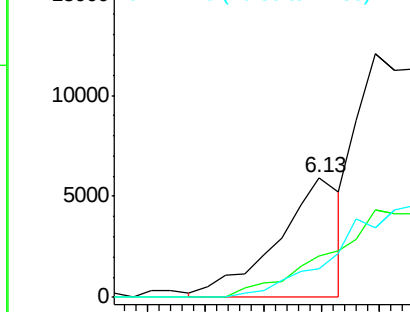
42 100

72 0.0 32.2 48.4#

71 0.0 31.7 47.5#



Abundance Ion 42.10 (41.80 to 42.80): VL0
Ion 72.10 (71.80 to 72.80): VL0
Ion 71.10 (70.80 to 71.80): VL0



#51

2-Hexanone

Concen: 0.251 ppbv

RT: 10.27 min Scan# 2282

Delta R.T. 0.02 min

Lab File: VL033906.D

Acq: 13 Jun 2019 20:44

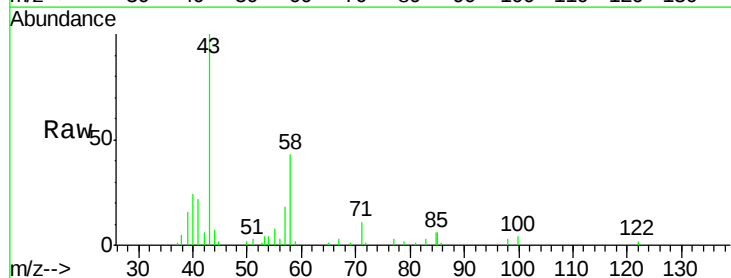
Tgt Ion: 43 Resp: 37187

Ion Ratio Lower Upper

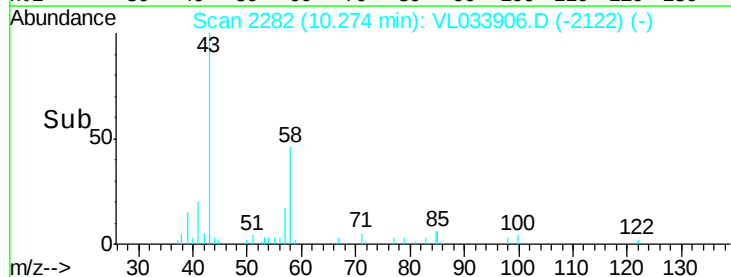
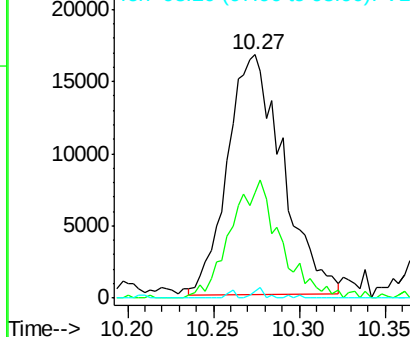
43 100

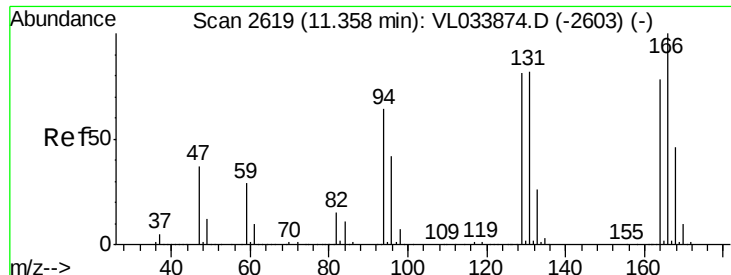
58 44.6 38.2 57.4

98 1.5 0.2 0.2#



Abundance Ion 43.10 (42.80 to 43.80): VL0
Ion 58.10 (57.80 to 58.80): VL0
Ion 98.20 (97.90 to 98.90): VL0





#52

Tetrachloroethene

Concen: 0.047 ppbv

RT: 11.35 min Scan# 2617

Delta R.T. -0.01 min

Lab File: VL033906.D

Acq: 13 Jun 2019 20:44

Instrument :

MSVOA_L

ClientSampleId :

Tot Ion:164 Resp: 2853

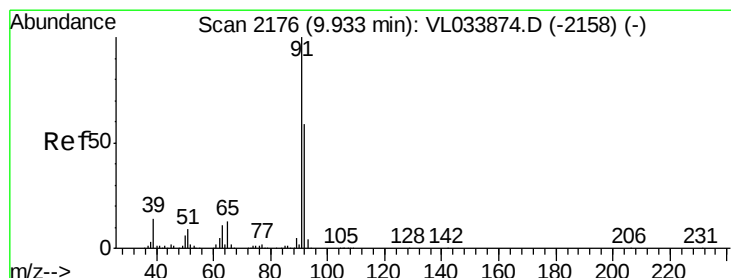
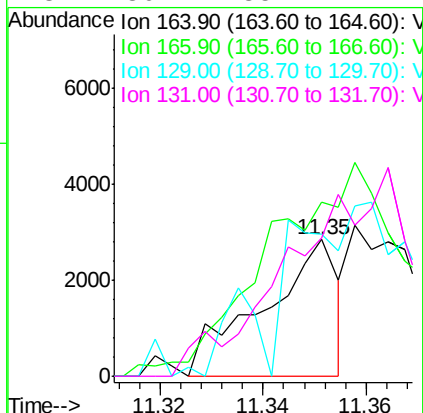
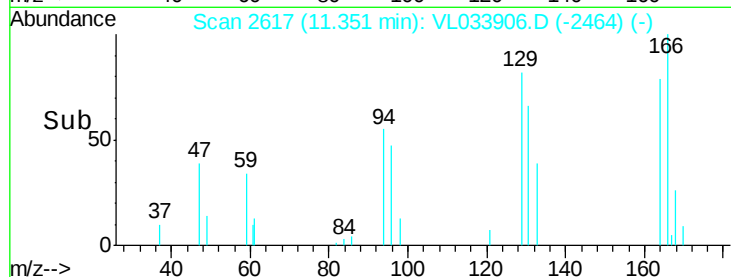
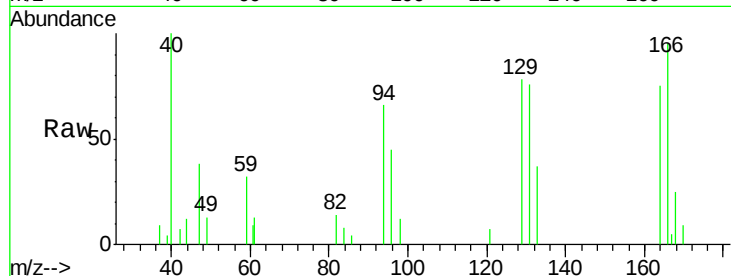
Ion Ratio Lower Upper

164 100

166 116.9 103.1 154.7

129 97.5 83.9 125.9

131 80.1 85.1 127.7#



#53

Toluene

Concen: 0.202 ppbv

RT: 9.93 min Scan# 2175

Delta R.T. -0.00 min

Lab File: VL033906.D

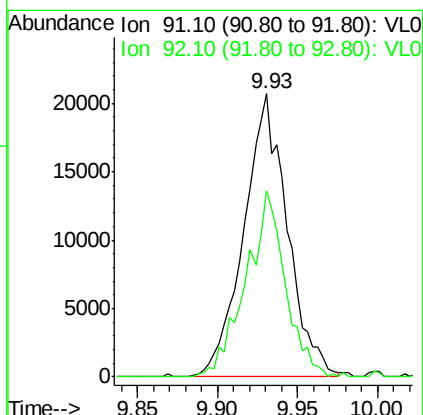
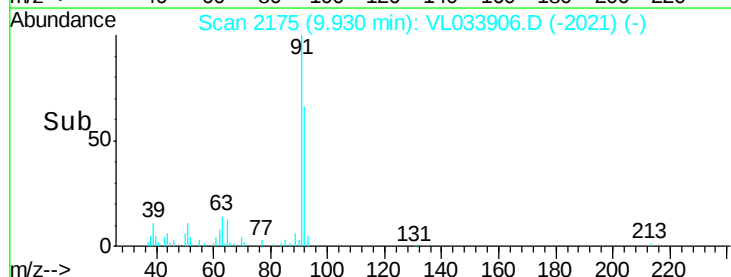
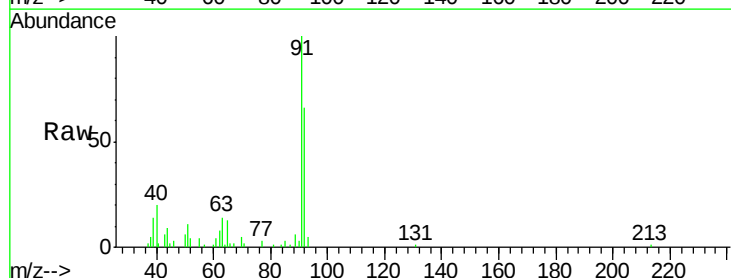
Acq: 13 Jun 2019 20:44

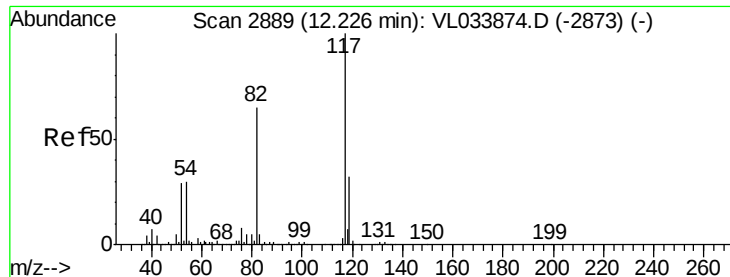
Tgt Ion: 91 Resp: 38500

Ion Ratio Lower Upper

91 100

92 59.8 47.0 70.6

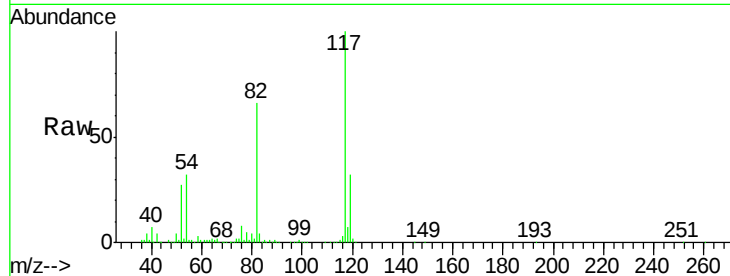




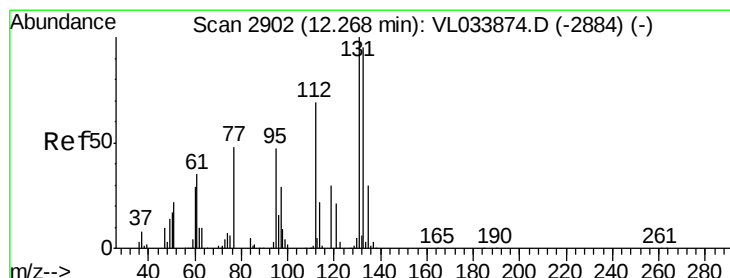
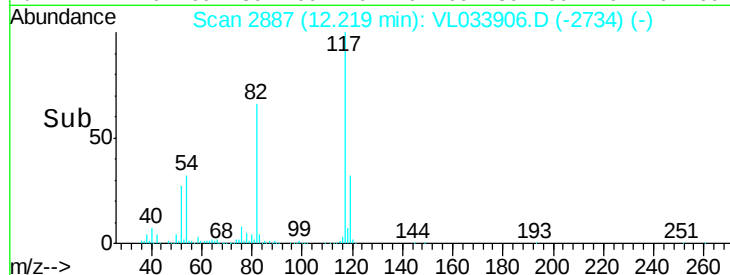
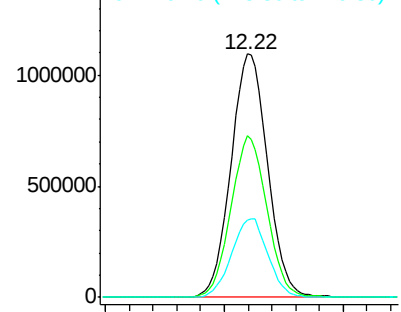
#55
Chlorobenzene-d5
Concen: 10.000 ppbv
RT: 12.22 min Scan# 2887
Delta R.T. -0.01 min
Lab File: VL033906.D
Acq: 13 Jun 2019 20:44

Instrument :
MSVOA_L
ClientSampled :

Tot Ion:117 Resp: 2329993
Ion Ratio Lower Upper
117 100
82 65.5 50.2 75.2
119 32.4 24.8 37.2

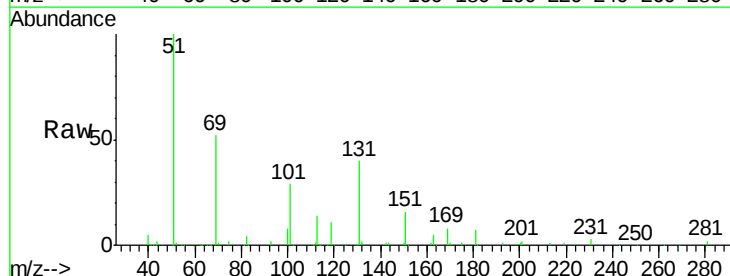


Abundance Ion 117.10 (116.80 to 117.80): V
Ion 82.10 (81.80 to 82.80): VL0
Ion 119.10 (118.80 to 119.80): V

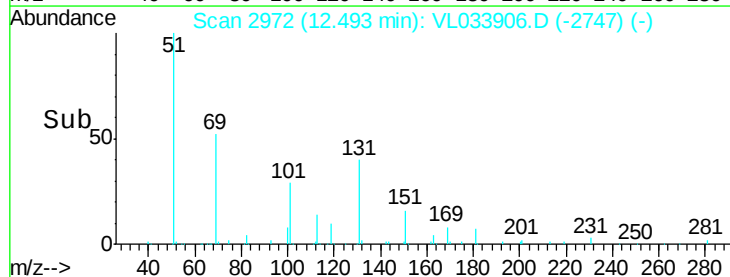
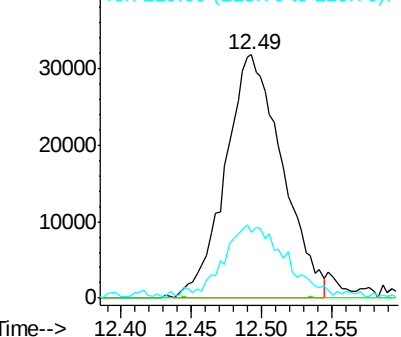


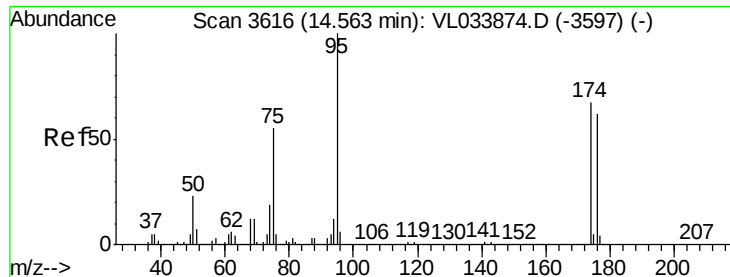
#56
1,1,1,2-Tetrachloroethane
Concen: 0.881 ppbv
RT: 12.49 min Scan# 2972
Delta R.T. 0.23 min
Lab File: VL033906.D
Acq: 13 Jun 2019 20:44

Tgt Ion:131 Resp: 89668
Ion Ratio Lower Upper
131 100
133 0.0 76.5 114.7#
119 32.1 42.6 64.0#



Abundance Ion 131.00 (130.70 to 131.70): V
Ion 133.00 (132.70 to 133.70): V
Ion 119.00 (118.70 to 119.70): V





#68

1-Bromo-4-Fluorobenzene

Concen: 9.798 ppbv

RT: 14.56 min Scan# 3614

Delta R.T. -0.01 min

Lab File: VL033906.D

Acq: 13 Jun 2019 20:44

Instrument :

MSVOA_L

ClientSampled :

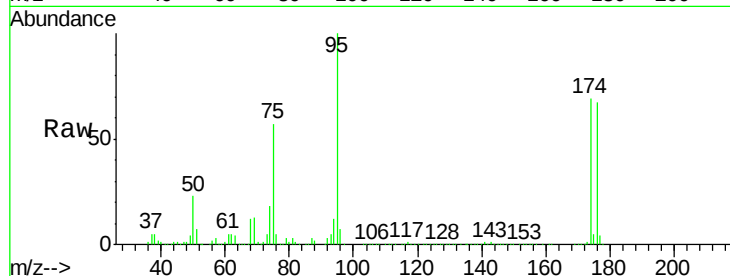
Tot Ion: 95 Resp: 1875233

Ion Ratio Lower Upper

95 100

174 68.0 54.0 81.0

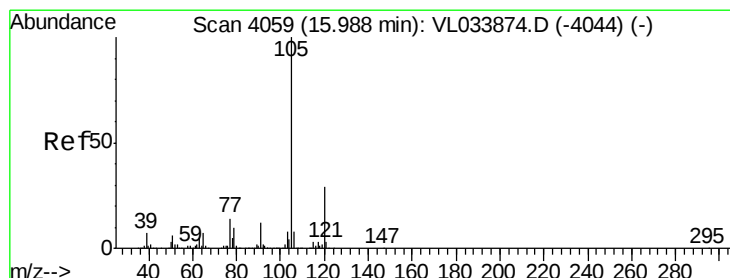
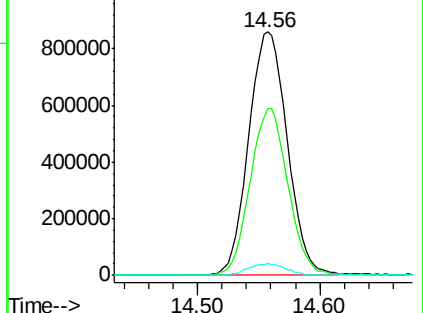
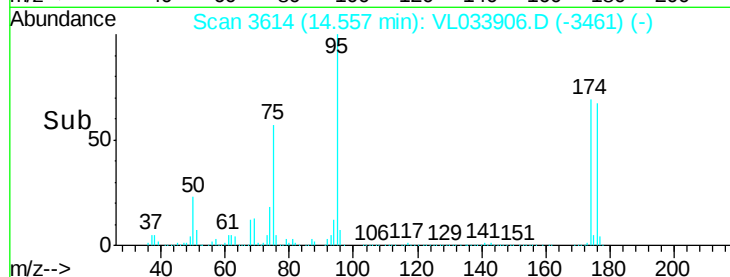
175 4.8 3.8 5.8



Abundance Ion 95.10 (94.80 to 95.80): VL0

Ion 174.00 (173.70 to 174.70): V

Ion 175.00 (174.70 to 175.70): V



#72

4-Ethyltoluene

Concen: 0.056 ppbv

RT: 15.98 min Scan# 4056

Delta R.T. -0.01 min

Lab File: VL033906.D

Acq: 13 Jun 2019 20:44

Tgt Ion: 105 Resp: 15591

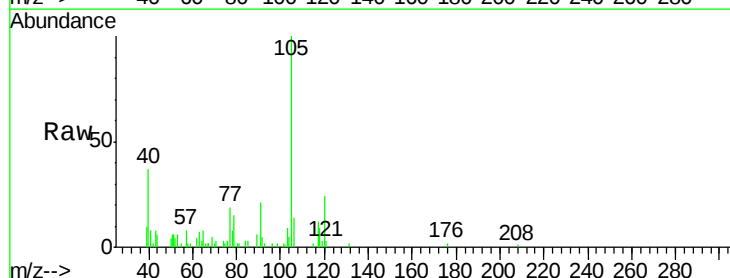
Ion Ratio Lower Upper

105 100

120 41.4 23.5 35.3#

91 41.1 10.4 15.6#

77 0.0 11.7 17.5#

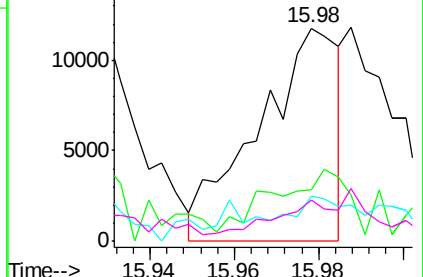
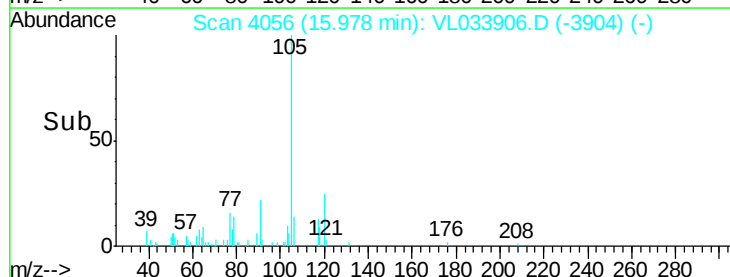


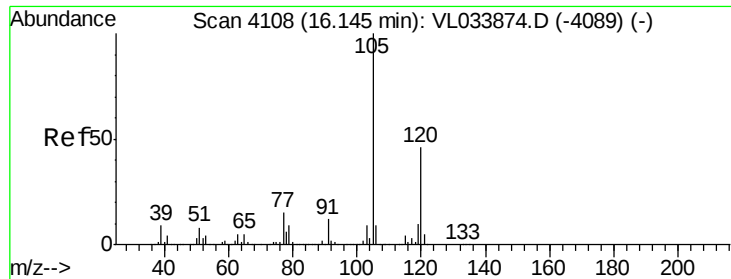
Abundance Ion 105.10 (104.80 to 105.80): V

Ion 120.20 (119.90 to 120.90): V

Ion 91.10 (90.80 to 91.80): VL0

Ion 77.10 (76.80 to 77.80): VL0





#73

1,3,5-Trimethylbenzene

Concen: 0.060 ppbv

RT: 16.14 min Scan# 4107

Delta R.T. -0.00 min

Lab File: VL033906.D

Acq: 13 Jun 2019 20:44

Instrument :

MSVOA_L

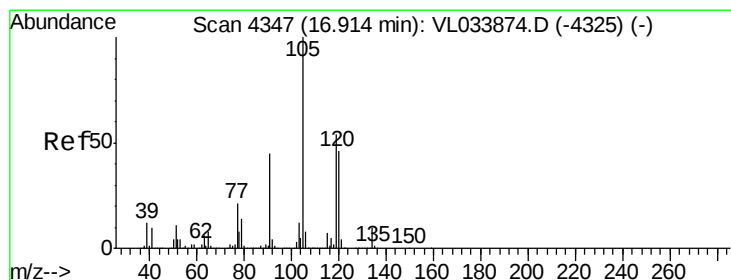
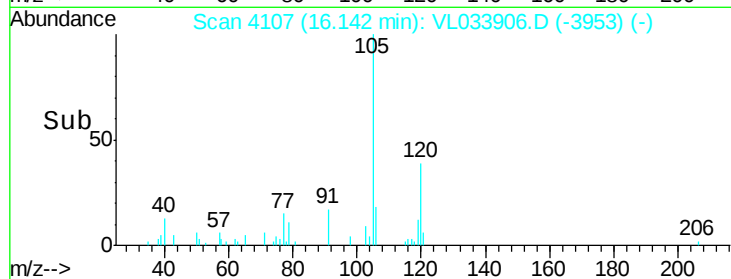
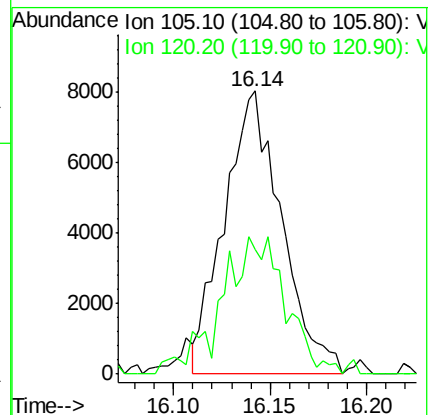
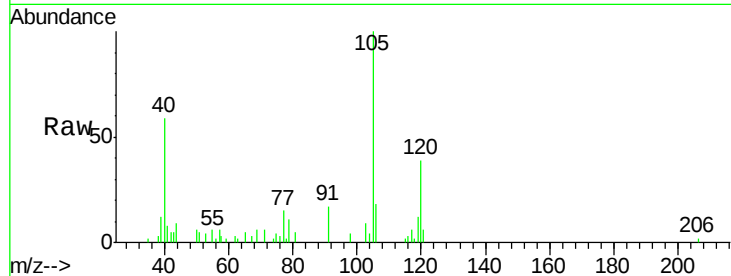
ClientSampleId :

Tot Ion:105 Resp: 16499

Ion Ratio Lower Upper

105 100

120 44.3 37.1 55.7



#74

1,2,4-Trimethylbenzene

Concen: 0.159 ppbv

RT: 16.91 min Scan# 4346

Delta R.T. -0.00 min

Lab File: VL033906.D

Acq: 13 Jun 2019 20:44

Tgt Ion:105 Resp: 50534

Ion Ratio Lower Upper

105 100

120 39.1 36.7 55.1

91 9.8 35.8 53.8#

77 12.5 16.9 25.3#

