

Data File : VL036006.D
Acq On : 24 Nov 2020 23:01
Operator : SY/AP
Sample : L4843-03 10X
Misc : 400ml/MSVOA_L
ALS Vial : 1 Sample Multiplier: 1

Instrument :
MSVOA_L
ClientSampleId :
SVP-03

Quant Time: Nov 25 00:37:54 2020
Quant Method : Z:\VOASRV\HPCHEM1\MSVOA_L\METHODS\VL110320AIR.M
Quant Title : AIR ANALYSIS BY METHOD TO-15 Instrument: MSVOA_LWed Nov 04 02:40:06 2020
QLast Update : Wed Nov 04 02:40:06 2020
Response via : Initial Calibration

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Bromochloromethane	5.64	49	1348969	10.00	ppbv	-0.03
33) 1,4-Difluorobenzene	7.15	114	4922055	10.00	ppbv	-0.03
55) Chlorobenzene-d5	12.06	117	4660959	10.00	ppbv	-0.04

System Monitoring Compounds
68) 1-Bromo-4-Fluorobenzene 14.39 95 3489493 10.54 ppbv -0.04
Spiked Amount 10.000 Range 65 - 135 Recovery = 105.40%

Target Compounds	R.T.	QIon	Response	Conc	Units	Qvalue
2) Dichlorodifluoromethane	3.02	85	9962	0.039	ppbv	99
3) Chlorodifluoromethane	2.97	51	6851	0.042	ppbv	96
4) Chloromethane	3.12	50	3206	0.041	ppbv	90
7) Chloroethane	3.53	64	2977	0.085	ppbv	97
9) Propene	3.18	41	1587114	26.843	ppbv	91
10) Heptane	8.10	43	752019	4.605	ppbv	99
13) Ethanol	3.60	45	6352	0.495	ppbv #	57
15) Acetone	3.85	43	2530501	17.546	ppbv #	55
16) 1,3-Butadiene	3.29	39	411287	6.624	ppbv #	22
20) Methylene Chloride	4.32	84	181138	1.784	ppbv	99
21) Allyl Chloride	4.34	41	35003	0.449	ppbv #	9
23) Vinyl Acetate	5.03	43	303182	1.500	ppbv #	1
25) Ethyl Acetate	5.66	43	1378338	4.851	ppbv #	72
26) Hexane	5.66	57	2394469	15.282	ppbv #	46
27) Carbon Disulfide	4.53	76	145742	0.621	ppbv #	95
30) Cyclohexane	7.10	84	154468	0.905	ppbv #	90
34) 2-Butanone	5.23	43	53566	0.335	ppbv	97
39) 1,2-Dichloropropane	7.15	63	1030629	8.366	ppbv #	31
41) Tetrahydrofuran	5.74	42	20309	0.224	ppbv #	25
42) Bromodichloromethane	7.76	83	12614	0.045	ppbv #	30
44) 2,2,4-Trimethylpentane	8.10	57	455585	0.941	ppbv #	1
51) 2-Hexanone	10.08	43	113349	0.578	ppbv #	23
53) Toluene	9.77	91	46083	0.104	ppbv	97

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



#1

Bromochloromethane

Concen: 10.000 ppbv

RT: 5.64 min Scan# 887

Delta R.T. -0.03 min

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SVP-03

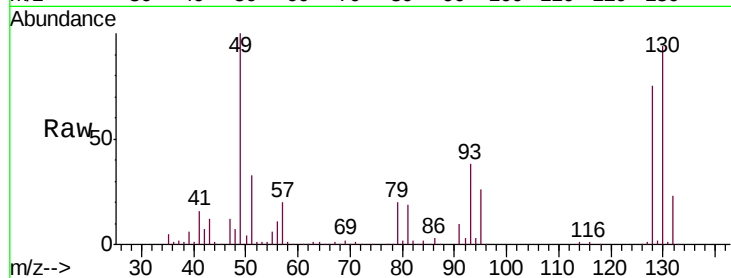
Tgt Ion: 49 Resp: 1348969

Ion Ratio Lower Upper

49 100

128 76.7 41.5 124.6

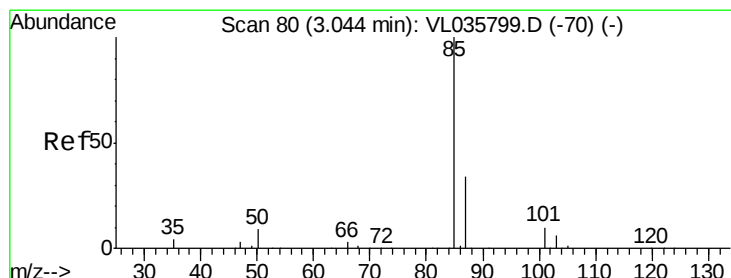
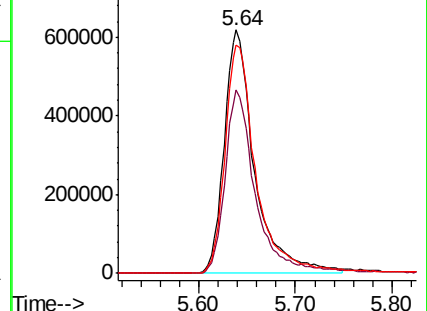
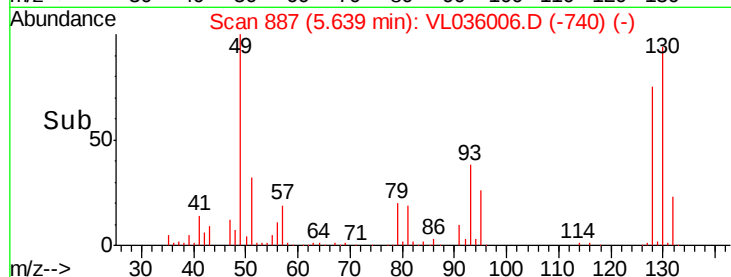
130 98.2 53.7 161.1



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



#2

Dichlorodifluoromethane

Concen: 0.039 ppbv

RT: 3.02 min Scan# 74

Delta R.T. -0.02 min

Lab File: VL036006.D

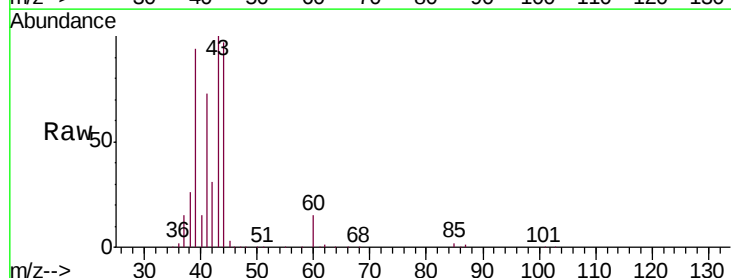
Acq: 24 Nov 2020 23:01

Tgt Ion: 85 Resp: 9962

Ion Ratio Lower Upper

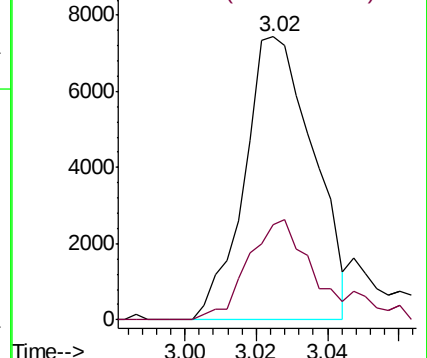
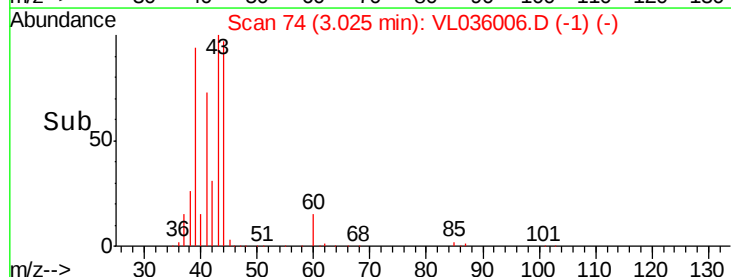
85 100

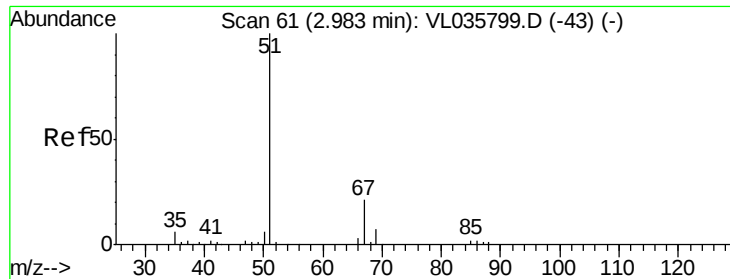
87 33.5 27.1 40.7



Abundance Ion 85.00 (84.70 to 85.70): VL0

Ion 87.00 (86.70 to 87.70): VL0





#3

Chlorodifluoromethane

Concen: 0.042 ppbv

RT: 2.97 min Scan# 57

Delta R.T. -0.01 min

Lab File: VL036006.D

Acq: 24 Nov 2020 23:01

Instrument :

MSVOA_L

ClientSampleId :

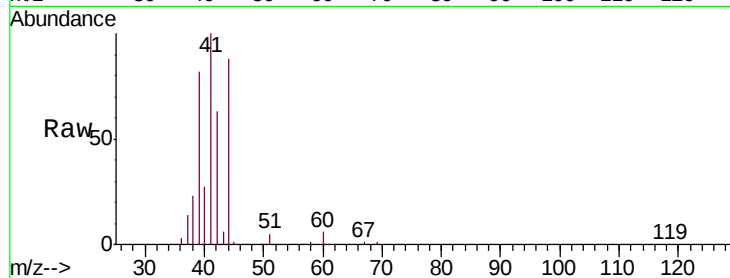
SVP-03

Tgt Ion: 51 Resp: 6851

Ion Ratio Lower Upper

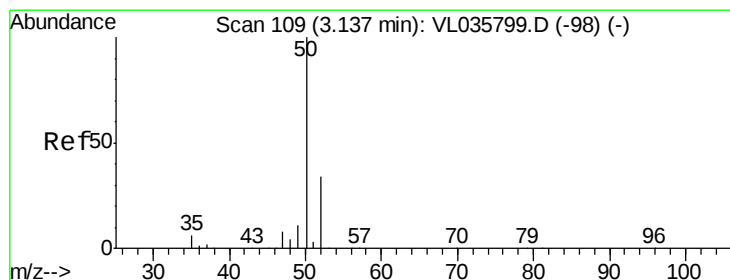
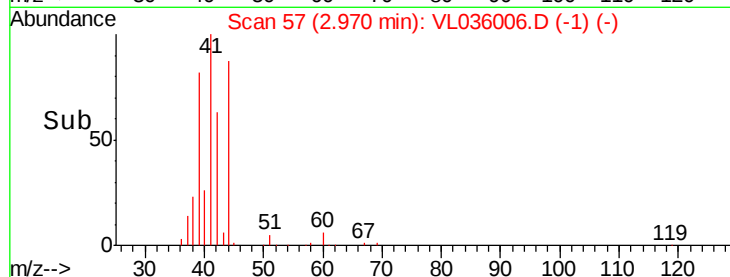
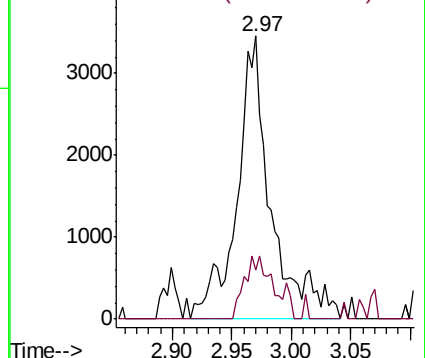
51 100

67 19.2 17.0 25.4



Abundance Ion 51.00 (50.70 to 51.70): VL0

Ion 67.00 (66.70 to 67.70): VL0



#4

Chloromethane

Concen: 0.041 ppbv

RT: 3.12 min Scan# 105

Delta R.T. -0.01 min

Lab File: VL036006.D

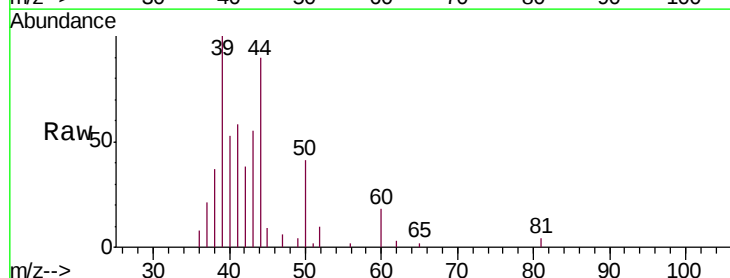
Acq: 24 Nov 2020 23:01

Tgt Ion: 50 Resp: 3206

Ion Ratio Lower Upper

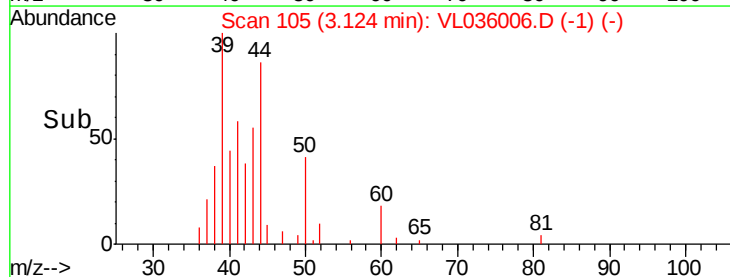
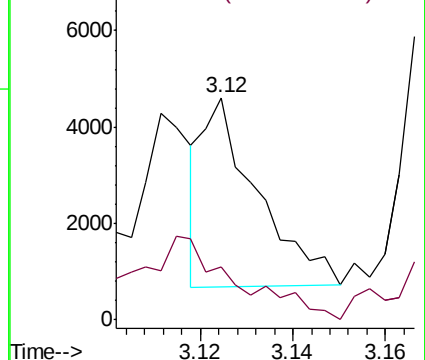
50 100

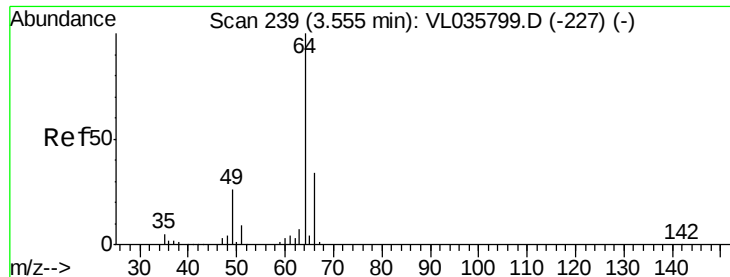
52 28.4 27.1 40.7



Abundance Ion 50.10 (49.80 to 50.80): VL0

Ion 52.10 (51.80 to 52.80): VL0





#7

Chloroethane

Concen: 0.085 ppbv

RT: 3.53 min Scan# 232

Delta R.T. -0.02 min

Lab File: VL036006.D

Acq: 24 Nov 2020 23:01

Instrument :

MSVOA_L

ClientSampleId :

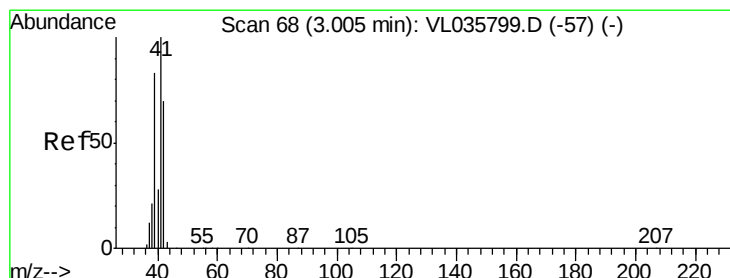
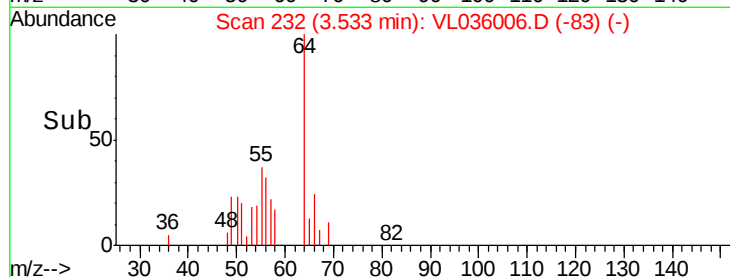
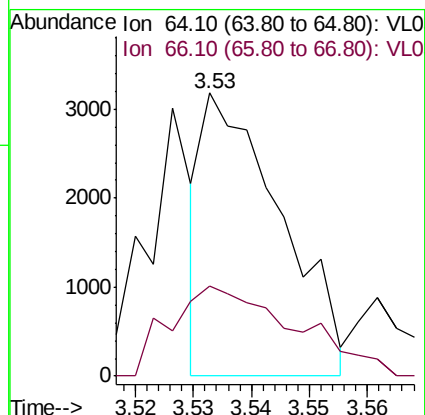
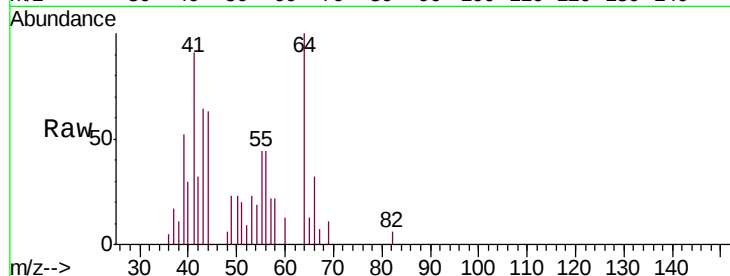
SVP-03

Tgt Ion: 64 Resp: 2977

Ion Ratio Lower Upper

64 100

66 31.9 27.0 40.6



#9

Propene

Concen: 26.843 ppbv

RT: 3.18 min Scan# 123

Delta R.T. 0.18 min

Lab File: VL036006.D

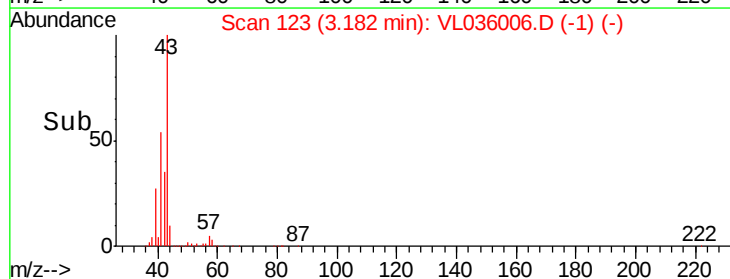
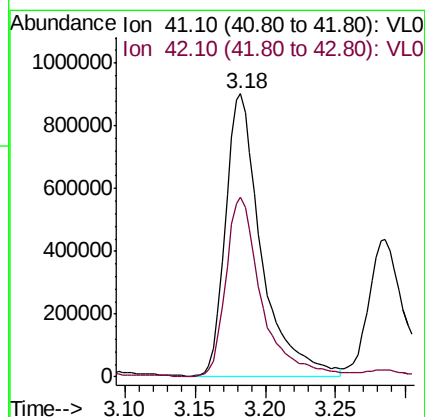
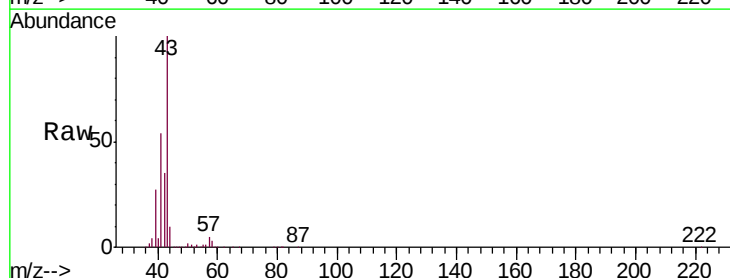
Acq: 24 Nov 2020 23:01

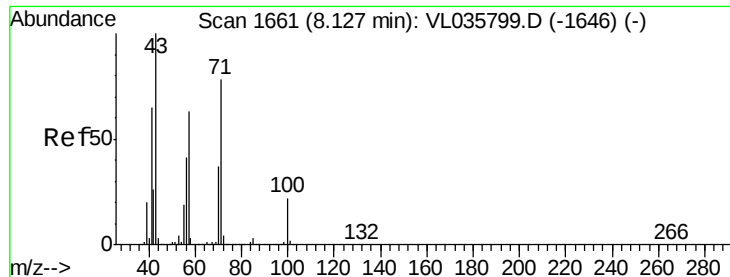
Tgt Ion: 41 Resp: 1587114

Ion Ratio Lower Upper

41 100

42 63.2 56.2 84.4





#10

Heptane

Concen: 4.605 ppbv

RT: 8.10 min Scan# 1651

Delta R.T. -0.03 min

Lab File: VL036006.D

Acq: 24 Nov 2020 23:01

Instrument :

MSVOA_L

ClientSampleId :

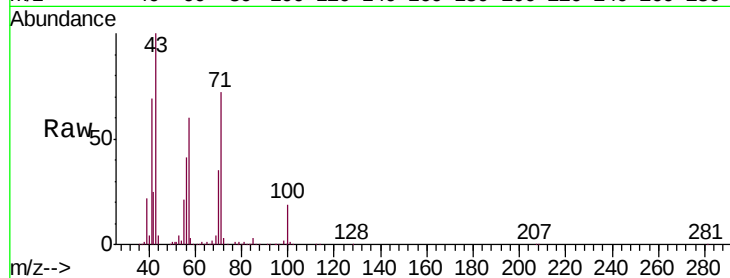
SVP-03

Tgt Ion: 43 Resp: 752019

Ion Ratio Lower Upper

43 100

57 61.5 50.0 75.0



Abundance Ion 43.10 (42.80 to 43.80): VL0

Ion 57.10 (56.80 to 57.80): VL0

8.10

400000

300000

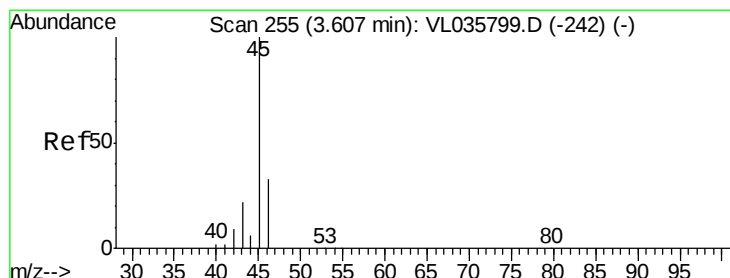
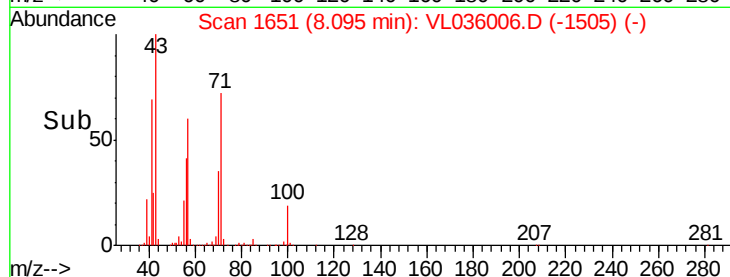
200000

100000

0

8.00 8.05 8.10 8.15 8.20

Time-->



#13

Ethanol

Concen: 0.495 ppbv

RT: 3.60 min Scan# 253

Delta R.T. -0.01 min

Lab File: VL036006.D

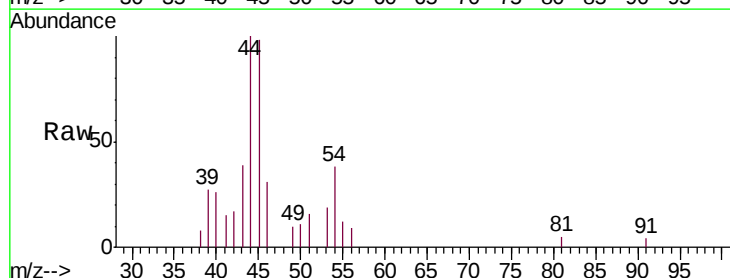
Acq: 24 Nov 2020 23:01

Tgt Ion: 45 Resp: 6352

Ion Ratio Lower Upper

45 100

46 66.9 16.1 64.5#



Abundance Ion 45.10 (44.80 to 45.80): VL0

Ion 46.10 (45.80 to 46.80): VL0

5000

4000

3000

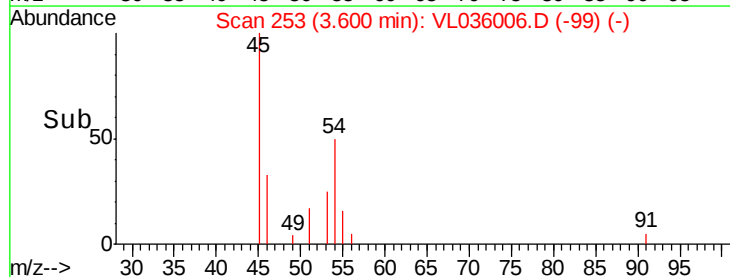
2000

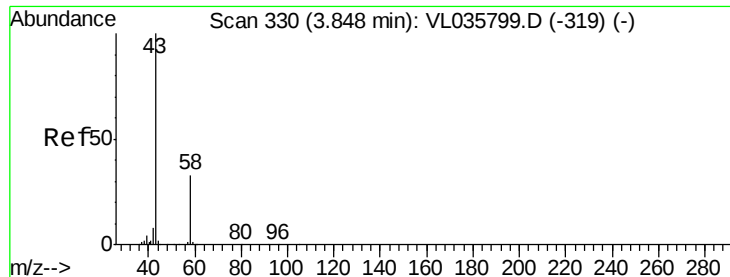
1000

0

3.56 3.58 3.60 3.62

Time-->





#15

Acetone

Concen: 17.546 ppbv

RT: 3.85 min Scan# 330

Delta R.T. 0.00 min

Lab File: VL036006.D

Acq: 24 Nov 2020 23:01

Instrument :

MSVOA_L

ClientSampled :

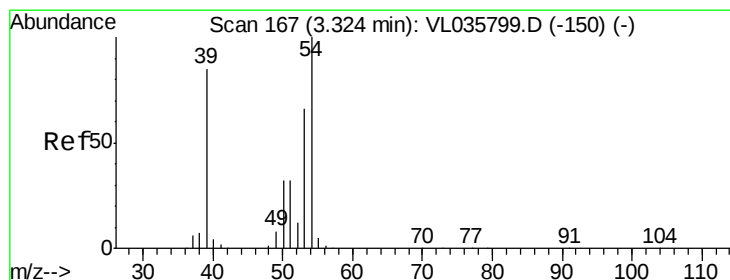
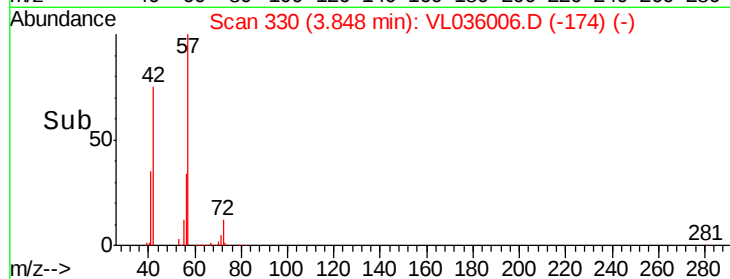
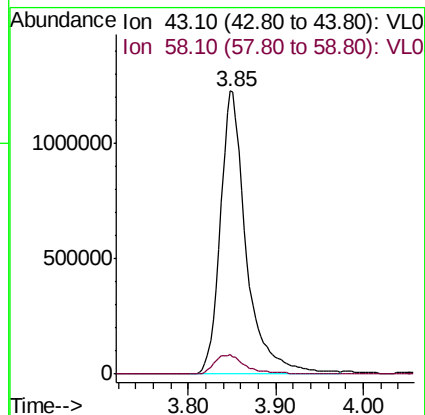
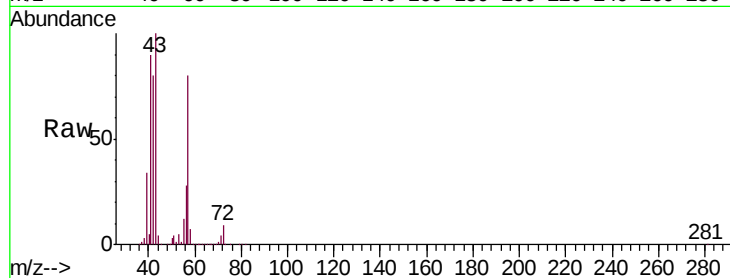
SVP-03

Tgt Ion: 43 Resp: 2530501

Ion Ratio Lower Upper

43 100

58 8.4 27.5 41.3#



#16

1,3-Butadiene

Concen: 6.624 ppbv

RT: 3.29 min Scan# 155

Delta R.T. -0.04 min

Lab File: VL036006.D

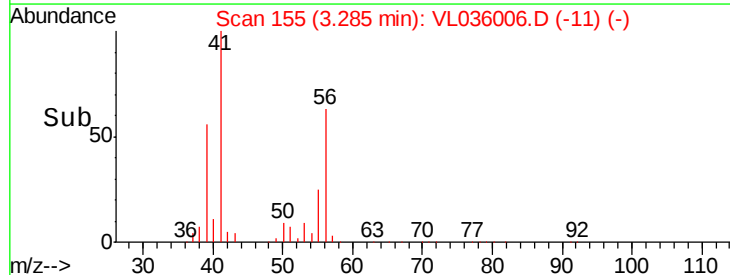
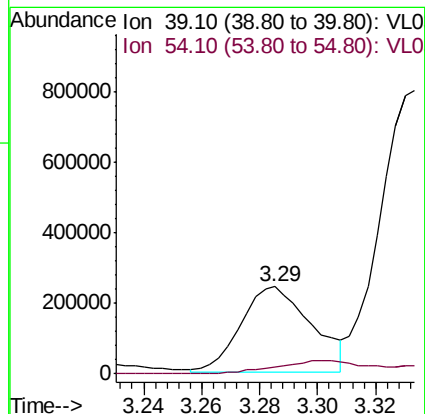
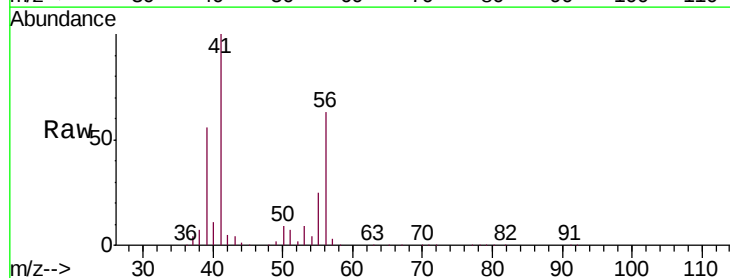
Acq: 24 Nov 2020 23:01

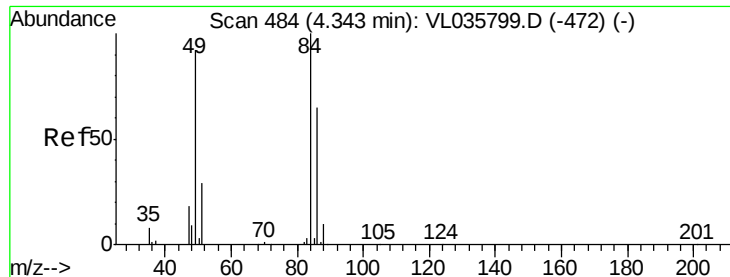
Tgt Ion: 39 Resp: 411287

Ion Ratio Lower Upper

39 100

54 26.5 87.1 130.7#

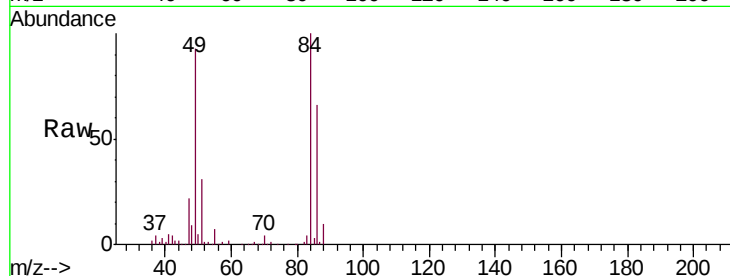




#20
Methylene Chloride
Concen: 1.784 ppbv
RT: 4.32 min Scan# 476
Delta R.T. -0.03 min
Lab File: VL036006.D
Acq: 24 Nov 2020 23:01

Instrument :
MSVOA_L
ClientSampleID :
SVP-03

Tgt Ion:	84	Resp:	181138
Ion	Ratio	Lower	Upper
84	100		
49	93.1	73.8	110.8
51	29.9	23.0	34.4
86	65.8	52.1	78.1



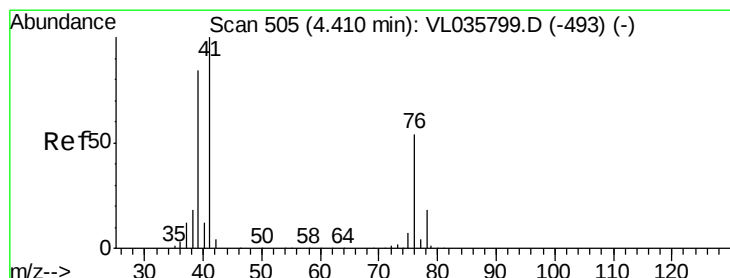
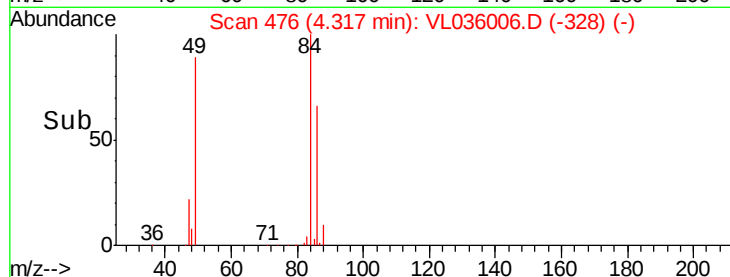
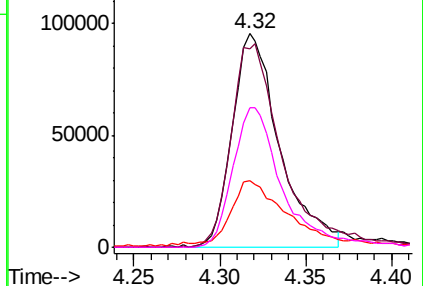
Abundance

Ion 84.00 (83.70 to 84.70): VL0

Ion 49.10 (48.80 to 49.80): VL0

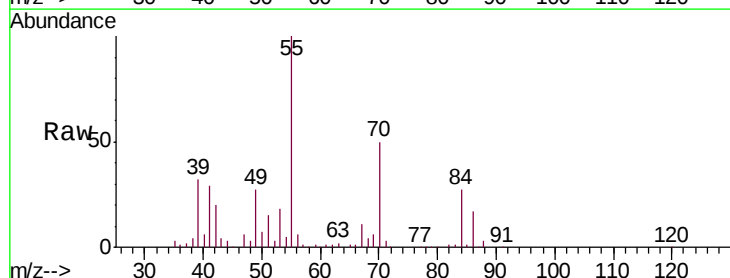
Ion 51.10 (50.80 to 51.80): VL0

Ion 86.00 (85.70 to 86.70): VL0



#21
Allyl Chloride
Concen: 0.449 ppbv
RT: 4.34 min Scan# 484
Delta R.T. -0.07 min
Lab File: VL036006.D
Acq: 24 Nov 2020 23:01

Tgt Ion:	41	Resp:	35003
Ion	Ratio	Lower	Upper
41	100		
76	0.0	42.6	63.8#
39	175.1	67.0	100.4#

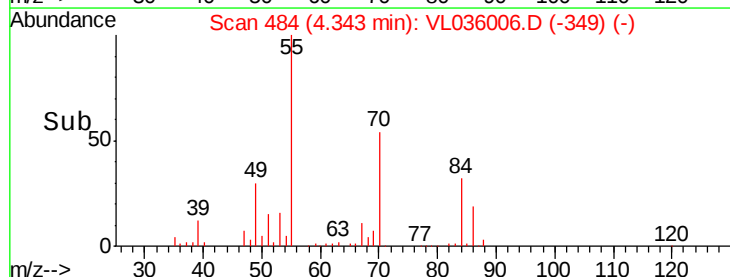
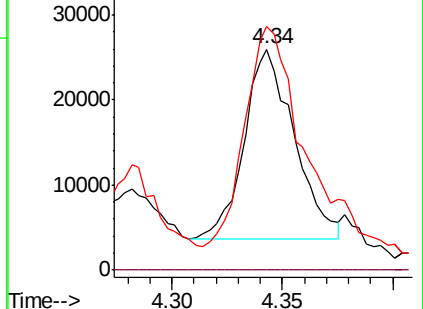


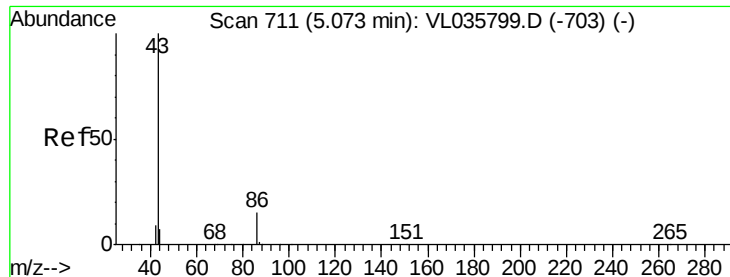
Abundance

Ion 41.10 (40.80 to 41.80): VL0

Ion 76.10 (75.80 to 76.80): VL0

Ion 39.10 (38.80 to 39.80): VL0

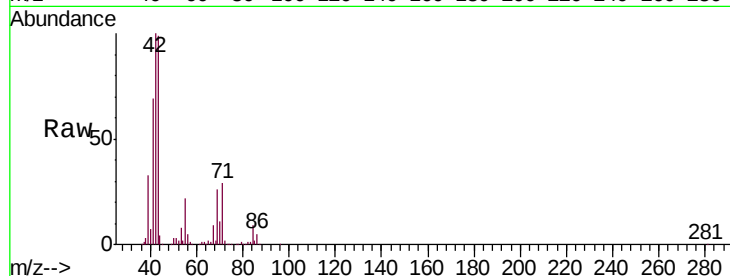




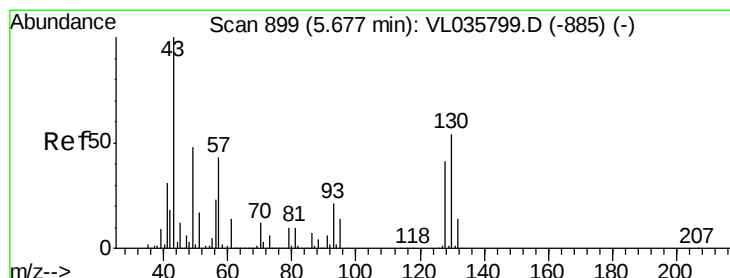
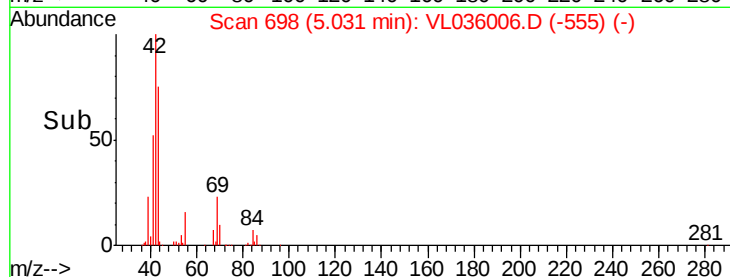
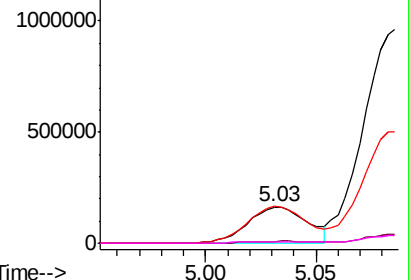
#23
 Vinyl Acetate
 Concen: 1.500 ppbv
 RT: 5.03 min Scan# 698
 Delta R.T. -0.04 min
 Lab File: VL036006.D
 Acq: 24 Nov 2020 23:01

Instrument :
 MSVOA_L
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Tgt Ion:	43	Resp:	303182
Ion	Ratio	Lower	Upper
43	100		
86	5.0	9.8	14.6#
42	101.4	8.1	12.1#
44	3.0	4.2	6.4#

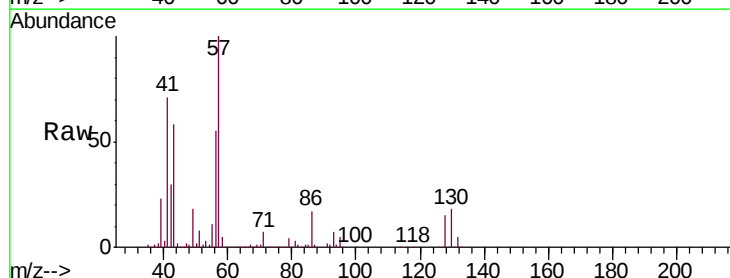


Abundance Ion 43.10 (42.80 to 43.80): VL0
 1500000 Ion 86.10 (85.80 to 86.80): VL0
 Ion 42.10 (41.80 to 42.80): VL0
 Ion 44.10 (43.80 to 44.80): VL0

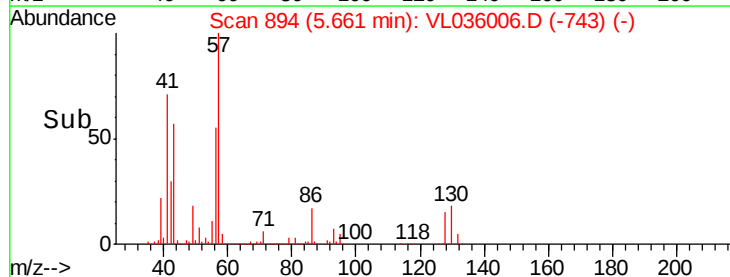
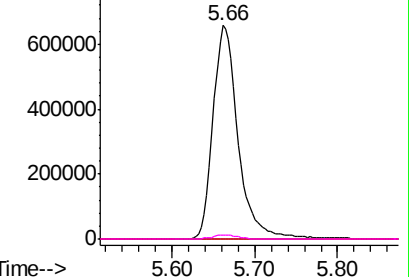


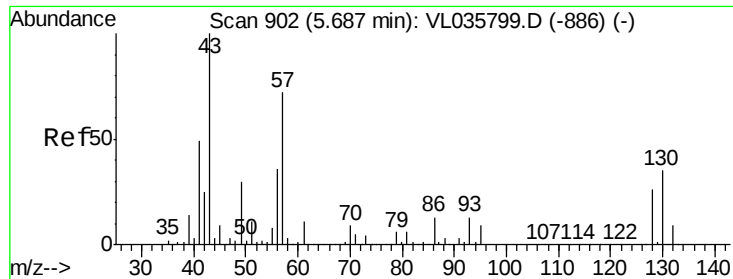
#25
 Ethyl Acetate
 Concen: 4.851 ppbv
 RT: 5.66 min Scan# 894
 Delta R.T. -0.02 min
 Lab File: VL036006.D
 Acq: 24 Nov 2020 23:01

Tgt Ion:	43	Resp:	1378338
Ion	Ratio	Lower	Upper
43	100		
45	0.1	8.5	12.7#
61	0.2	10.7	16.1#
70	2.0	8.6	12.8#



Abundance Ion 43.10 (42.80 to 43.80): VL0
 1000000 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

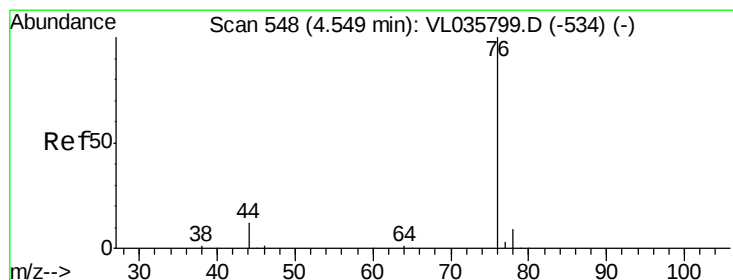
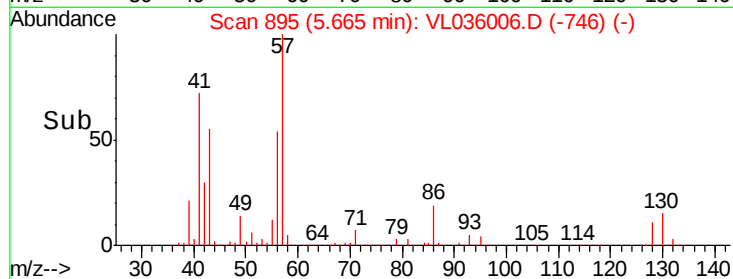
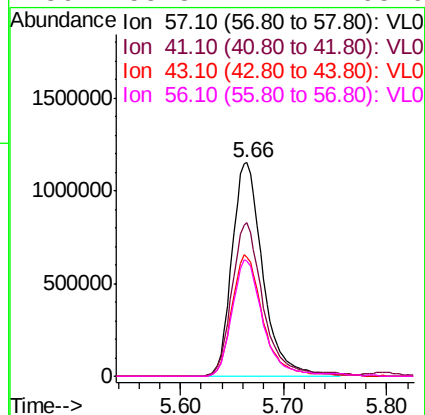
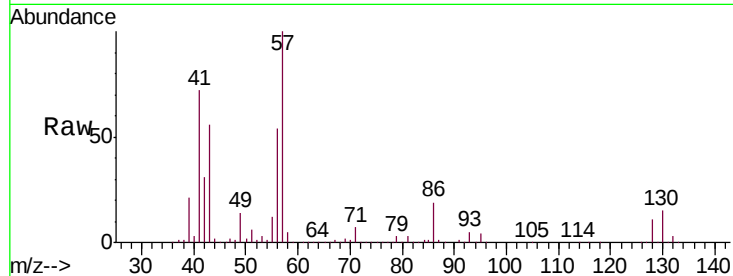




#26
Hexane
Concen: 15.282 ppbv
RT: 5.66 min Scan# 895
Delta R.T. -0.02 min
Lab File: VL036006.D
Acq: 24 Nov 2020 23:01

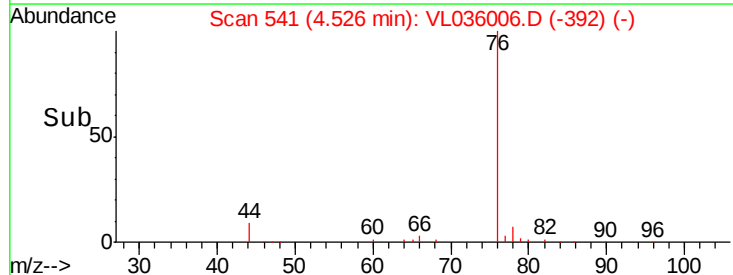
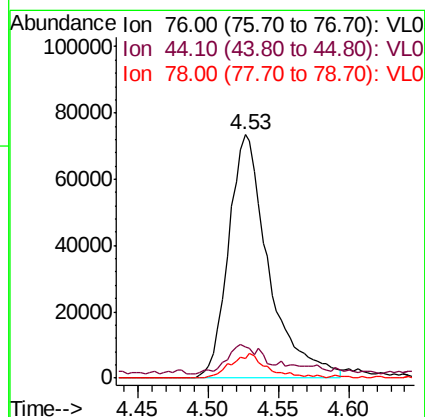
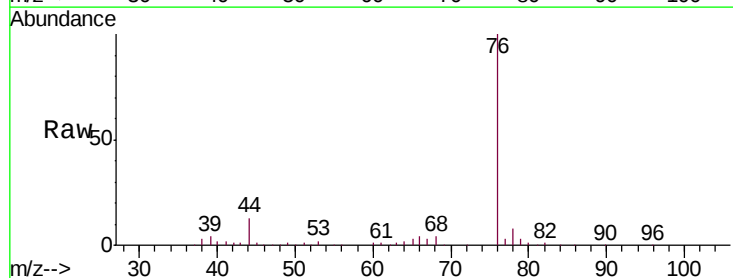
Instrument :
MSVOA_L
ClientSampleId :
SVP-03

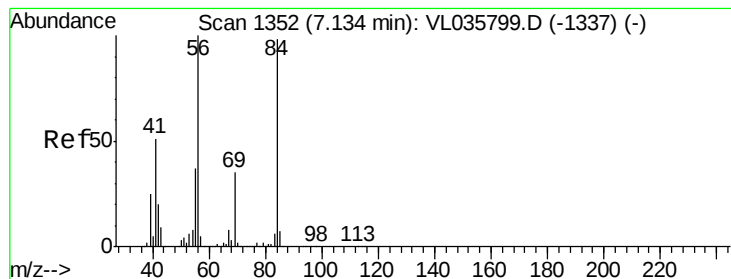
Tgt Ion: 57 Resp: 2394469
Ion Ratio Lower Upper
57 100
41 73.8 58.9 88.3
43 57.8 150.2 225.2#
56 55.8 42.4 63.6



#27
Carbon Disulfide
Concen: 0.621 ppbv
RT: 4.53 min Scan# 541
Delta R.T. -0.02 min
Lab File: VL036006.D
Acq: 24 Nov 2020 23:01

Tgt Ion: 76 Resp: 145742
Ion Ratio Lower Upper
76 100
44 16.0 9.9 14.9#
78 10.1 8.1 12.1





#30

Cyclohexane

Concen: 0.905 ppbv

RT: 7.10 min Scan# 1342

Delta R.T. -0.03 min

Lab File: VL036006.D

Acq: 24 Nov 2020 23:01

Instrument :

MSVOA_L

ClientSampleId :

SVP-03

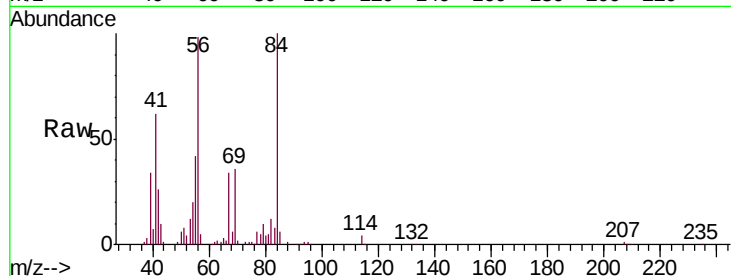
Tgt Ion: 84 Resp: 154468

Ion Ratio Lower Upper

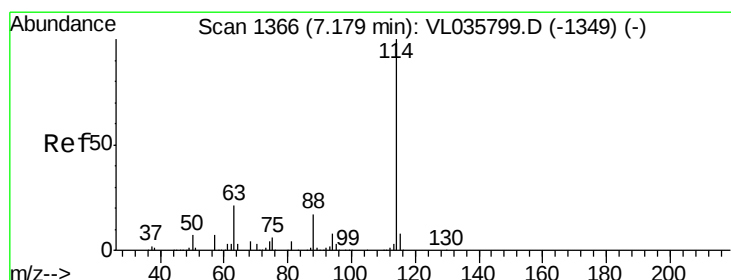
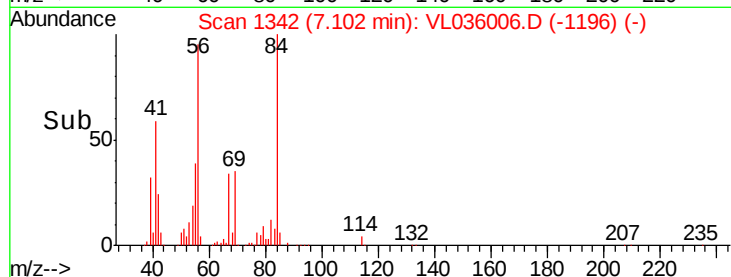
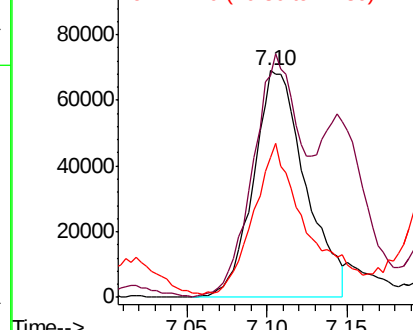
84 100

56 103.1 86.4 129.6

41 66.5 42.1 63.1#



Abundance Ion 84.20 (83.90 to 84.90): VL0
Ion 56.10 (55.80 to 56.80): VL0
Ion 41.10 (40.80 to 41.80): VL0



#33

1,4-Difluorobenzene

Concen: 10.000 ppbv

RT: 7.15 min Scan# 1356

Delta R.T. -0.03 min

Lab File: VL036006.D

Acq: 24 Nov 2020 23:01

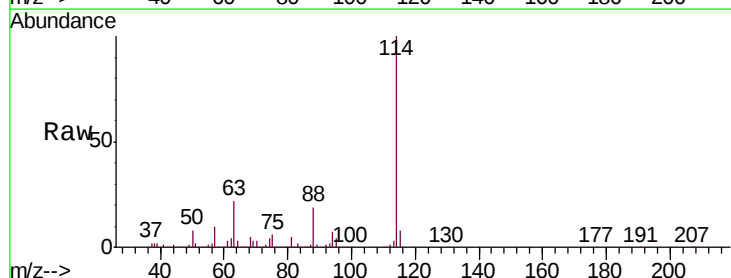
Tgt Ion: 114 Resp: 4922055

Ion Ratio Lower Upper

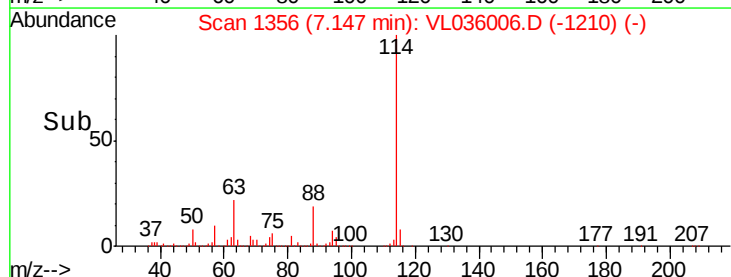
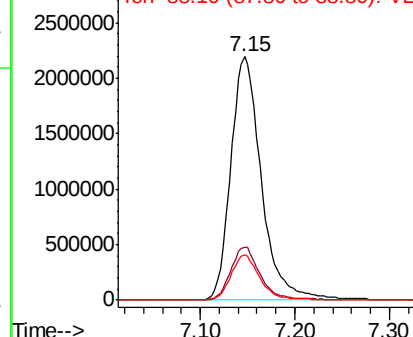
114 100

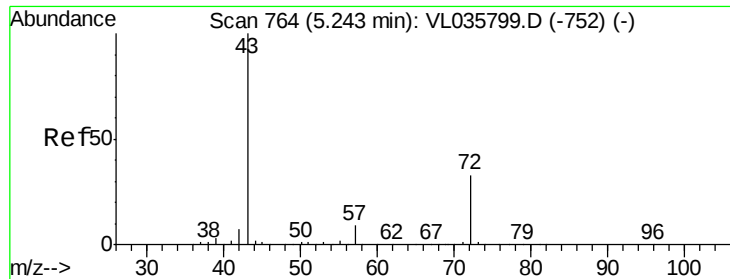
63 21.4 16.1 24.1

88 17.8 13.7 20.5



Abundance Ion 114.10 (113.80 to 114.80): V
Ion 63.10 (62.80 to 63.80): VL0
Ion 88.10 (87.80 to 88.80): VL0

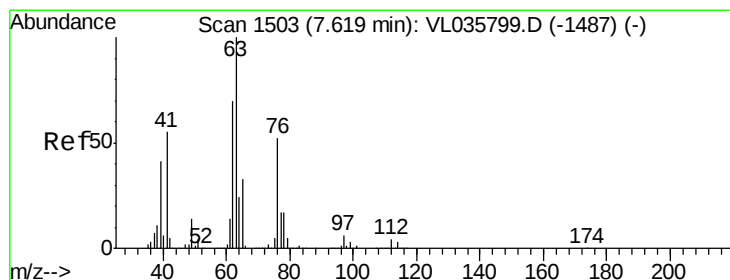
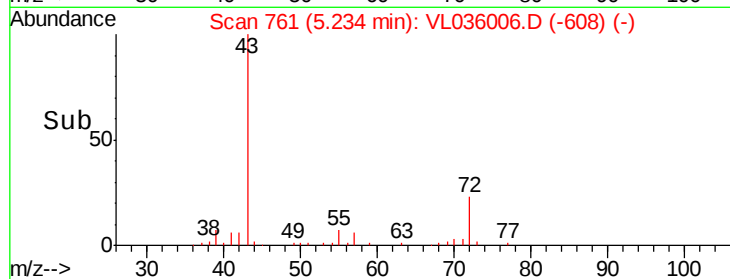
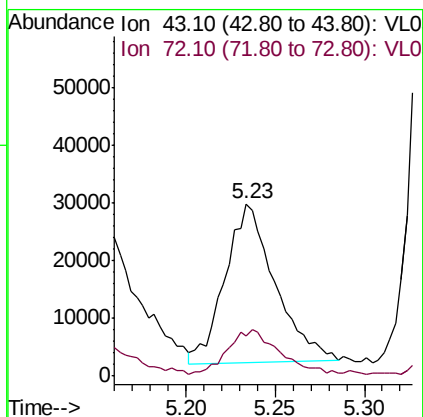
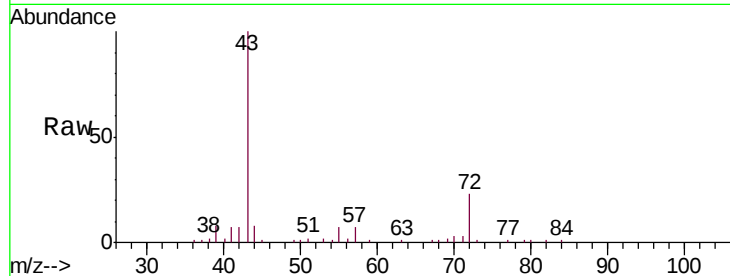




#34
 2-Butanone
 Concen: 0.335 ppbv
 RT: 5.23 min Scan# 761
 Delta R.T. -0.01 min
 Lab File: VL036006.D
 Acq: 24 Nov 2020 23:01

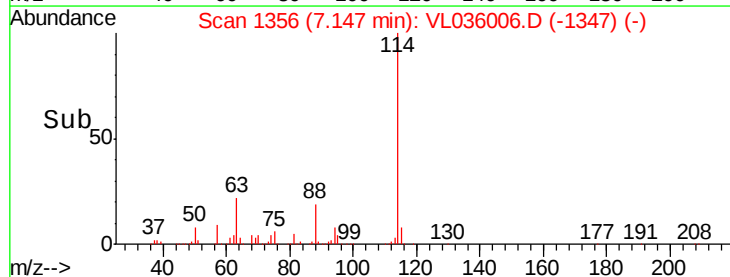
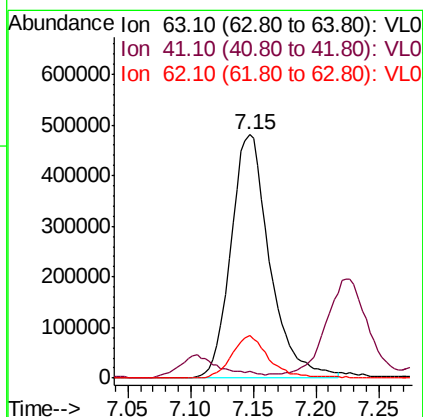
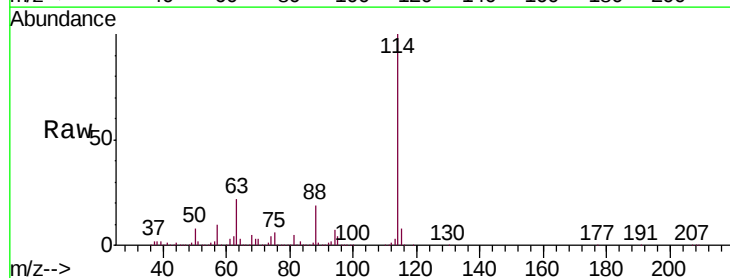
Instrument :
 MSVOA_L
 ClientSampleId :
 SVP-03

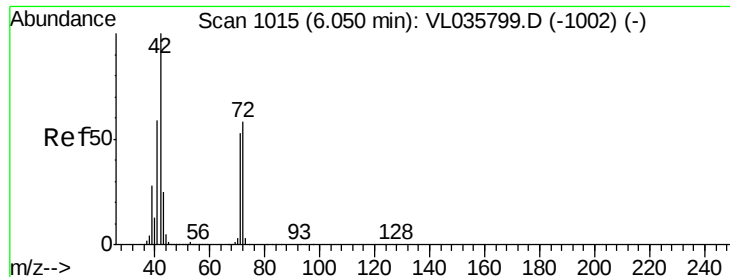
Tgt Ion: 43 Resp: 53566
 Ion Ratio Lower Upper
 43 100
 72 31.3 26.5 39.7



#39
 1,2-Dichloropropane
 Concen: 8.366 ppbv
 RT: 7.15 min Scan# 1356
 Delta R.T. -0.47 min
 Lab File: VL036006.D
 Acq: 24 Nov 2020 23:01

Tgt Ion: 63 Resp: 1030629
 Ion Ratio Lower Upper
 63 100
 41 0.0 43.8 65.6#
 62 17.3 56.2 84.2#

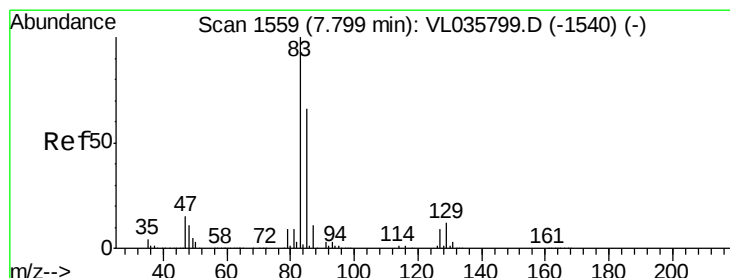
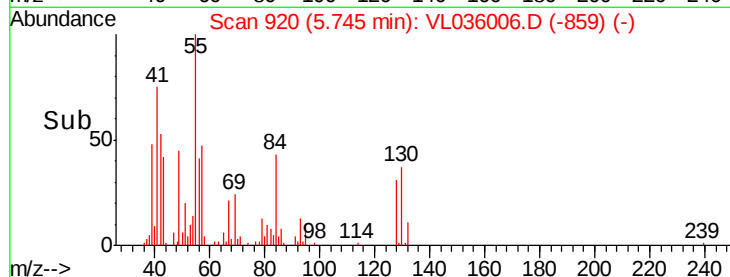
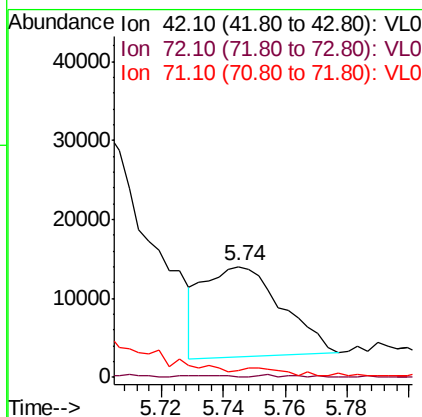
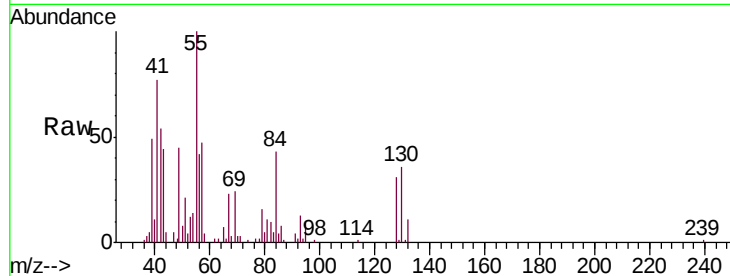




#41
Tetrahydrofuran
Concen: 0.224 ppbv
RT: 5.74 min Scan# 920
Delta R.T. -0.31 min
Lab File: VL036006.D
Acq: 24 Nov 2020 23:01

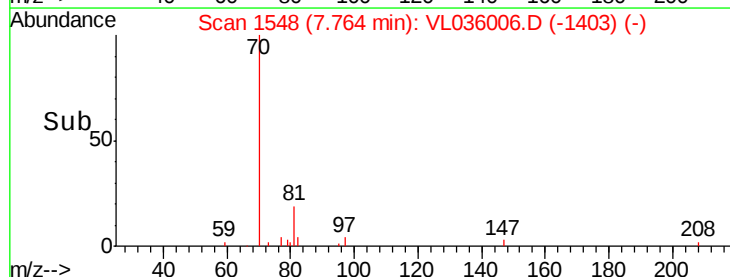
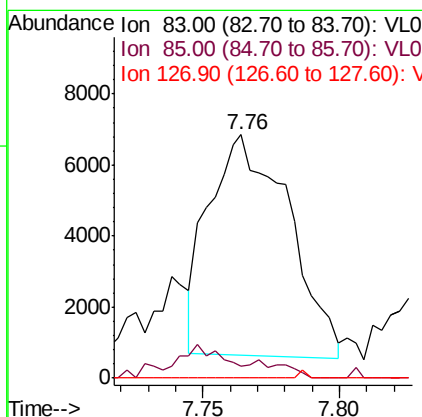
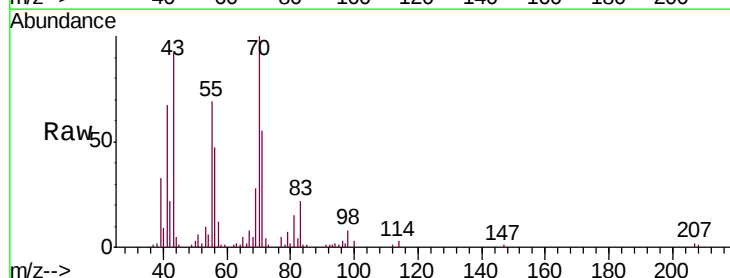
Instrument :
MSVOA_L
ClientSampled :
SVP-03

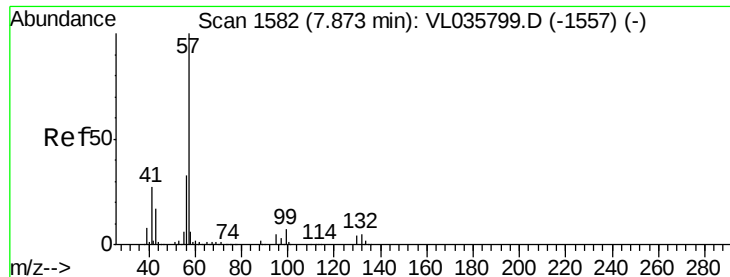
Tgt Ion: 42 Resp: 20309
Ion Ratio Lower Upper
42 100
72 1.7 45.4 68.0#
71 0.0 43.4 65.2#



#42
Bromodichloromethane
Concen: 0.045 ppbv
RT: 7.76 min Scan# 1548
Delta R.T. -0.04 min
Lab File: VL036006.D
Acq: 24 Nov 2020 23:01

Tgt Ion: 83 Resp: 12614
Ion Ratio Lower Upper
83 100
85 5.5 53.1 79.7#
127 0.0 7.3 10.9#

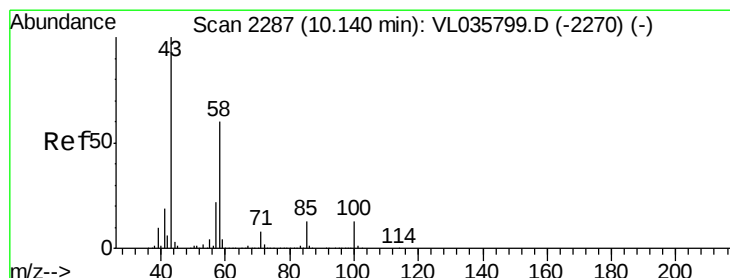
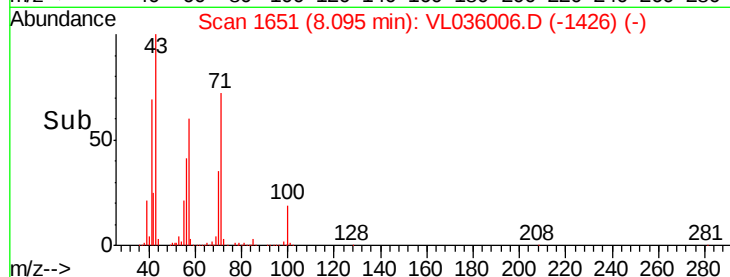
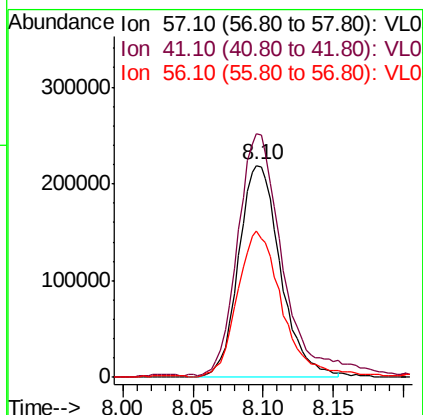
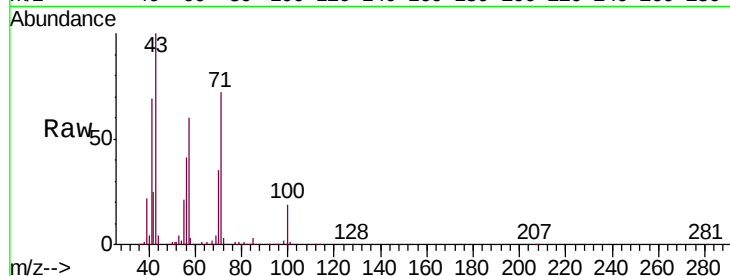




#44
 2,2,4-Trimethylpentane
 Concen: 0.941 ppbv
 RT: 8.10 min Scan# 1651
 Delta R.T. 0.22 min
 Lab File: VL036006.D
 Acq: 24 Nov 2020 23:01

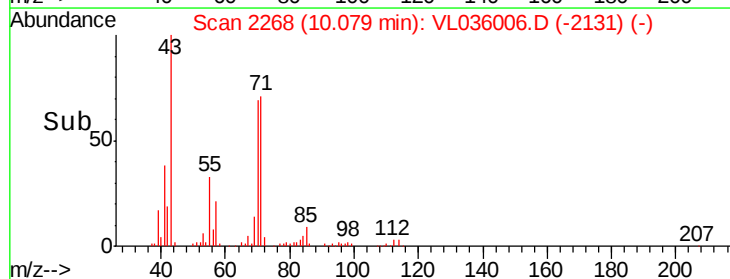
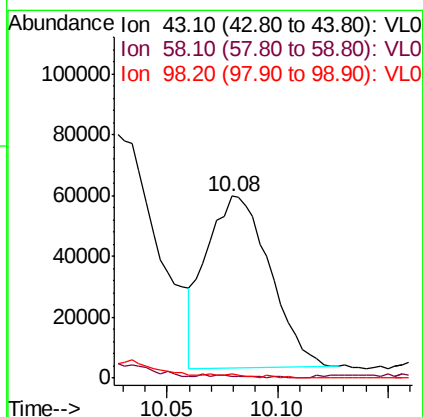
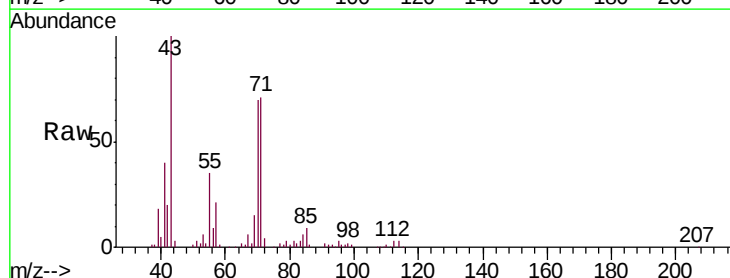
Instrument :
 MSVOA_L
 ClientSampleId :
 SVP-03

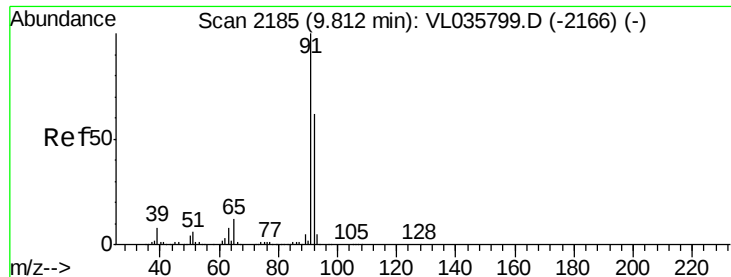
Tgt Ion: 57 Resp: 455585
 Ion Ratio Lower Upper
 57 100
 41 122.0 21.0 31.4#
 56 72.7 25.4 38.0#



#51
 2-Hexanone
 Concen: 0.578 ppbv
 RT: 10.08 min Scan# 2268
 Delta R.T. -0.06 min
 Lab File: VL036006.D
 Acq: 24 Nov 2020 23:01

Tgt Ion: 43 Resp: 113349
 Ion Ratio Lower Upper
 43 100
 58 1.2 48.3 72.5#
 98 0.0 0.6 0.8#





#53

Toluene

Concen: 0.104 ppbv

RT: 9.77 min Scan# 2173

Delta R.T. -0.04 min

Lab File: VL036006.D

Acq: 24 Nov 2020 23:01

Instrument :

MSVOA_L

ClientSampleId :

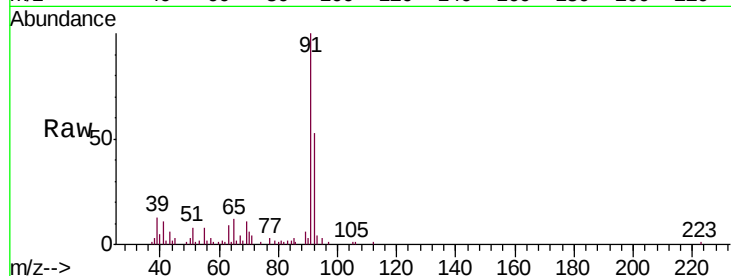
SVP-03

Tgt Ion: 91 Resp: 46083

Ion Ratio Lower Upper

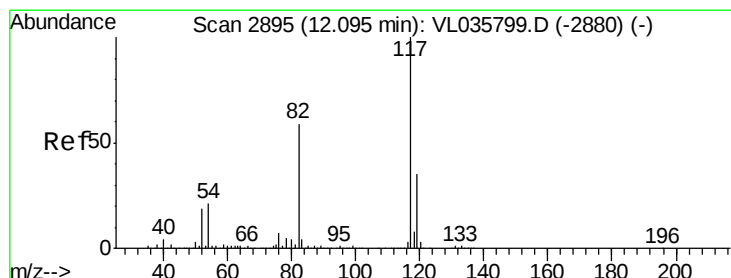
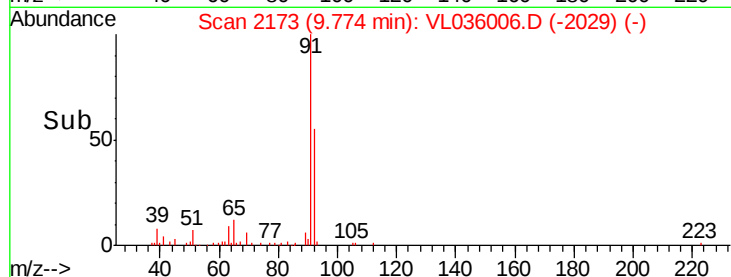
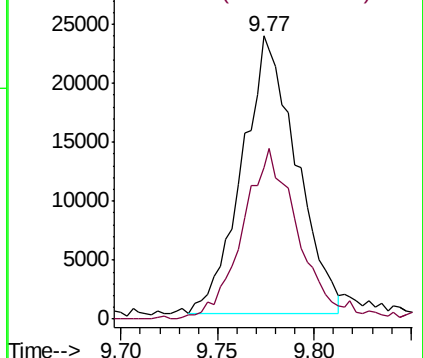
91 100

92 64.7 49.8 74.6



Abundance Ion 91.10 (90.80 to 91.80): VL0

Ion 92.10 (91.80 to 92.80): VL0



#55

Chlorobenzene-d5

Concen: 10.000 ppbv

RT: 12.06 min Scan# 2883

Delta R.T. -0.04 min

Lab File: VL036006.D

Acq: 24 Nov 2020 23:01

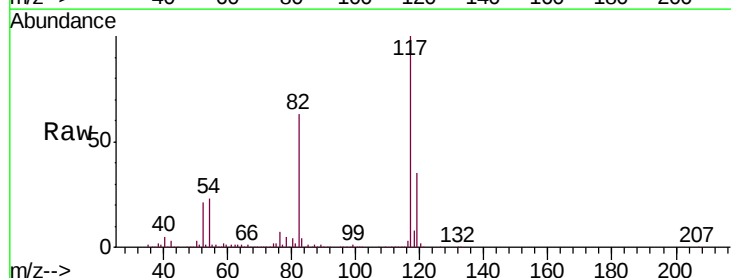
Tgt Ion: 117 Resp: 4660959

Ion Ratio Lower Upper

117 100

82 62.5 50.6 76.0

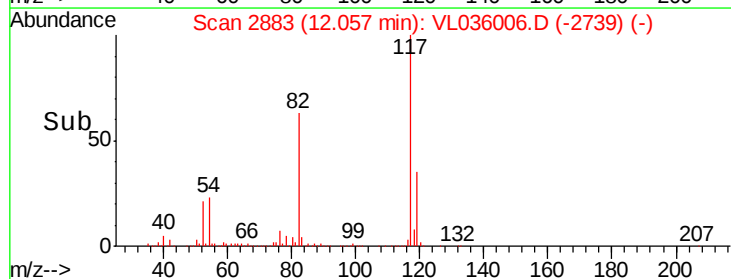
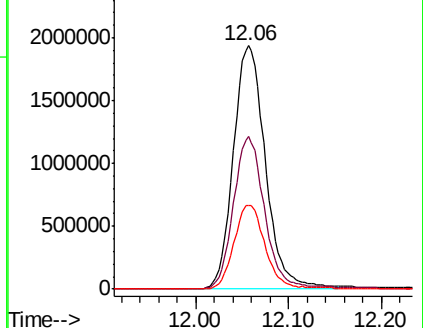
119 34.1 52.6 78.8#

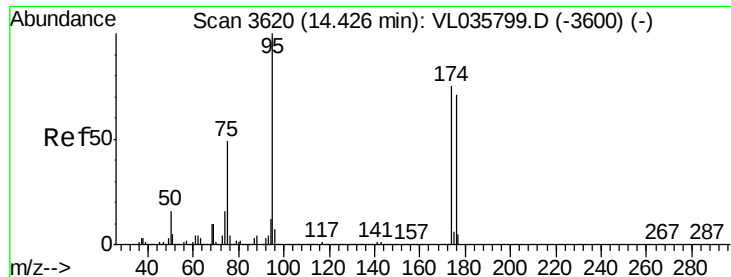


Abundance Ion 117.10 (116.80 to 117.80): V

Ion 82.10 (81.80 to 82.80): VL0

Ion 119.10 (118.80 to 119.80): V





#68
 1-Bromo-4-Fluorobenzene
 Concen: 10.537 ppbv
 RT: 14.39 min Scan# 3608
 Delta R.T. -0.04 min
 Lab File: VL036006.D
 Acq: 24 Nov 2020 23:01

Instrument :
 MSVOA_L
 ClientSampleId :
 SVP-03

Tgt Ion: 95 Resp: 3489493
 Ion Ratio Lower Upper
 95 100
 174 70.2 59.8 89.6
 175 4.8 4.3 6.5

