

Data Path : Z:\VOASRV\HPCHEM1\MSVOA L\DATA\VL022421\
 Data File : VL036351.D
 Acq On : 24 Feb 2021 15:21
 Operator : SY/AP
 Sample : M1463-02
 Misc : 400ml/MSVOA L
 ALS Vial : 1 Sample Multiplier: 1

Instrument :
 MSVOA_L
 ClientSampleId :
 NS-9

Quant Time: Feb 25 05:17:54 2021
 Quant Method : Z:\VOASRV\HPCHEM1\MSVOA L\METHODS\VL021021AIR.M
 Quant Title : AIR ANALYSIS BY METHOD TO-15 Instrument: MSVOA_LWed Feb 10 16:04:02 2021
 QLast Update : Wed Feb 10 16:04:02 2021
 Response via : Initial Calibration

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Bromochloromethane	5.67	49	1644820	10.00	ppbv	0.03
33) 1,4-Difluorobenzene	7.18	114	3519629	10.00	ppbv	0.02
55) Chlorobenzene-d5	12.09	117	3135549	10.00	ppbv	0.03

System Monitoring Compounds						
68) 1-Bromo-4-Fluorobenzene	14.43	95	2565641	9.94	ppbv	0.03
Spiked Amount	10.000	Range	65 - 135	Recovery	=	99.40%

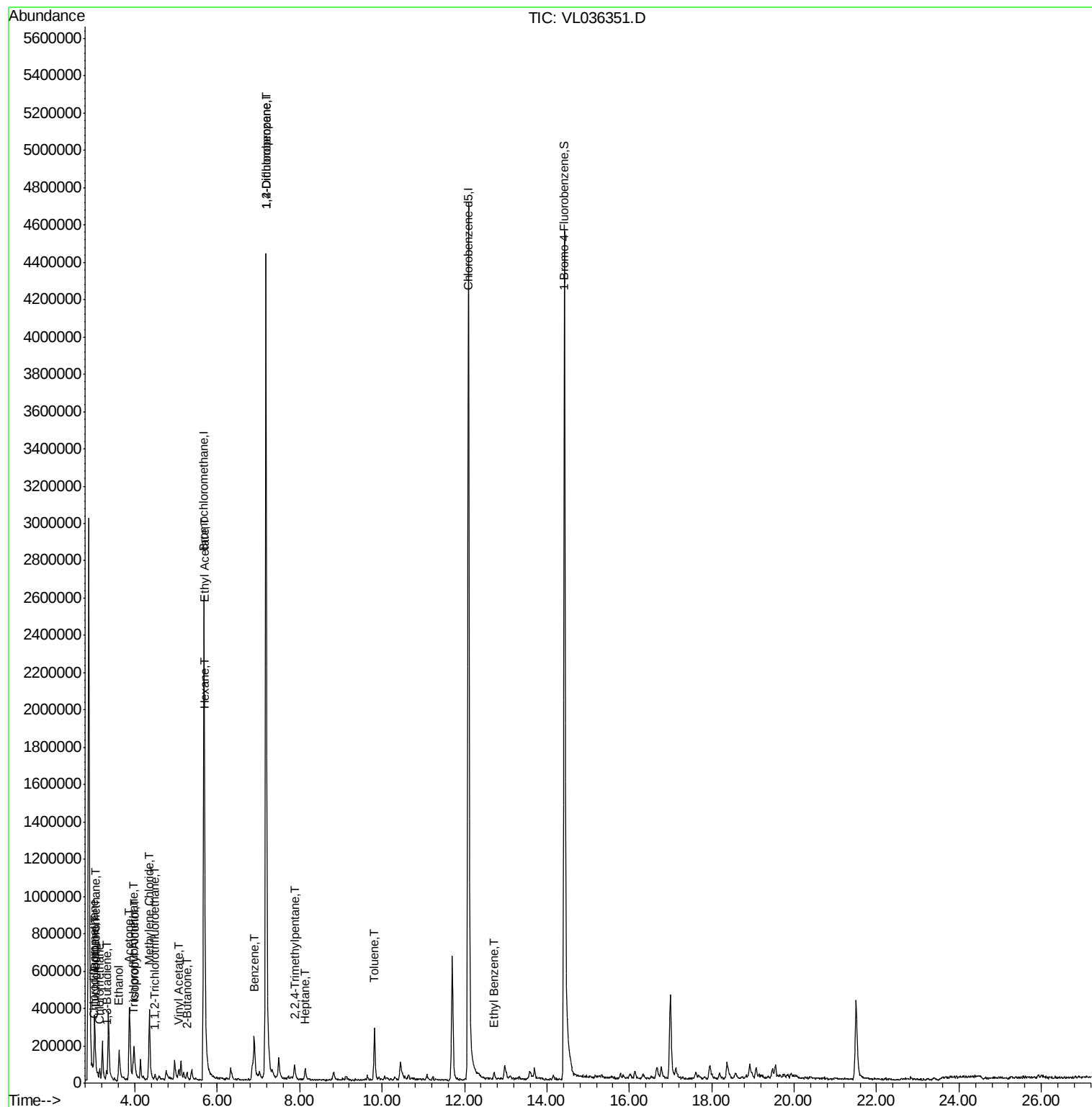
Target Compounds	R.T.	QIon	Response	Conc	Units	Ovalue
2) Dichlorodifluoromethane	3.05	85	35485	0.145	ppbv	91
3) Chlorodifluoromethane	2.99	51	94632	0.463	ppbv #	86
4) Chloromethane	3.14	50	18031	0.183	ppbv #	86
9) Propene	3.02	41	110499	1.450	ppbv	86
10) Heptane	8.14	43	7866	0.035	ppbv #	28
11) Trichlorofluoromethane	3.95	101	49929	0.208	ppbv	94
12) 1,1,2-Trichlorotrifluoroet	4.48	101	5078	0.034	ppbv #	15
13) Ethanol	3.61	45	202176	14.126	ppbv	97
15) Acetone	3.86	43	505735	2.515	ppbv	100
16) 1,3-Butadiene	3.31	39	10163	0.106	ppbv	98
19) Isopropyl Alcohol	3.98	45	195259	1.753	ppbv #	94
20) Methylene Chloride	4.36	84	147816	2.279	ppbv #	80
23) Vinyl Acetate	5.07	43	19756	0.084	ppbv #	3
25) Ethyl Acetate	5.69	43	50331	0.130	ppbv #	89
26) Hexane	5.70	57	42497	0.266	ppbv #	1
34) 2-Butanone	5.25	43	14575	0.062	ppbv #	55
36) Benzene	6.90	78	152318	0.509	ppbv	97
39) 1,2-Dichloropropane	7.18	63	1026976	8.456	ppbv #	23
44) 2,2,4-Trimethylpentane	7.87	57	26786	0.049	ppbv #	1
53) Toluene	9.81	91	206925	0.639	ppbv	98
58) Ethyl Benzene	12.72	91	17790	0.041	ppbv	92

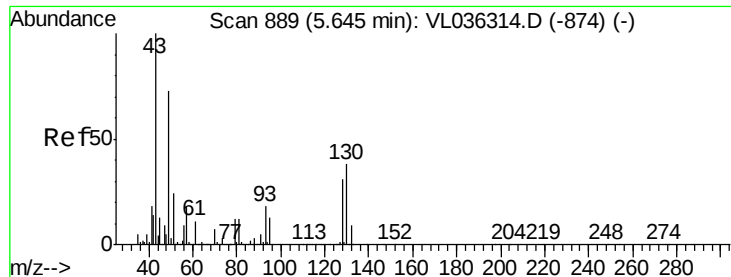
(#) = qualifier out of range (m) = manual integration (+) = signals summed

Data Path : Z:\VOASRV\HPCHEM1\MSVOA L\DATA\VL022421\
Data File : VL036351.D
Acq On : 24 Feb 2021 15:21
Operator : SY/AP
Sample : M1463-02
Misc : 400ml/MSVOA L
ALS Vial : 1 Sample Multiplier: 1

Instrument :
MSVOA_L
ClientSampleId :
NS-9

Quant Time: Feb 25 05:17:54 2021
Quant Method : Z:\VOASRV\HPCHEM1\MSVOA L\METHODS\VL021021AIR.M
Quant Title : AIR ANALYSIS BY METHOD TO-15 Instrument: MSVOA_L Wed Feb 10 16:04:02 2021
QLast Update : Wed Feb 10 16:04:02 2021
Response via : Initial Calibration





#1

Bromochloromethane

Concen: 10.000 ppbv

RT: 5.67 min Scan# 898

Delta R.T. 0.03 min

Lab File: VL036351.D

Acq: 24 Feb 2021 15:21

Instrument :

MSVOA_L

ClientSampleId :

NS-9

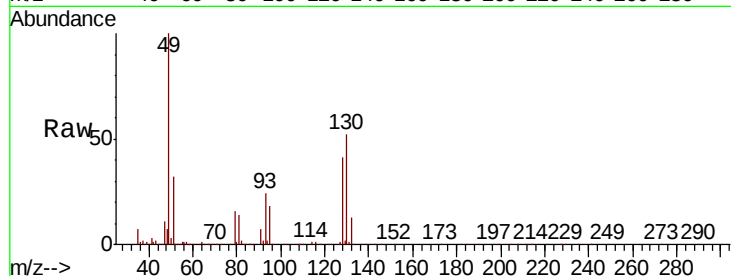
Tot Ion: 49 Resp: 1644820

Ion Ratio Lower Upper

49 100

128 42.0 20.8 62.5

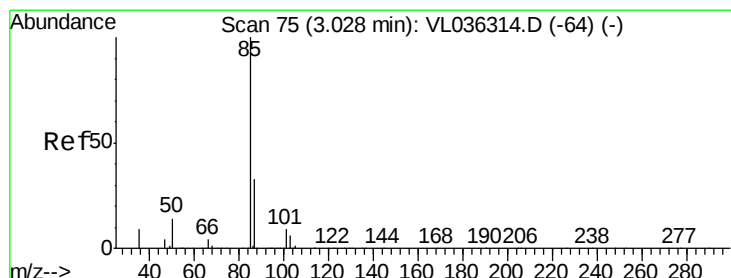
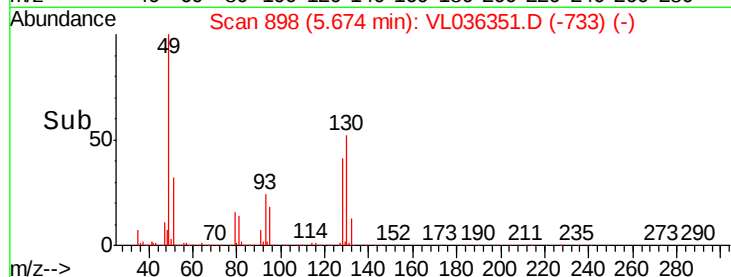
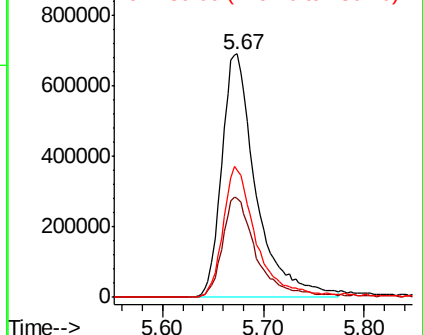
130 53.0 26.7 80.1



Abundance Ion 49.10 (48.80 to 49.80): VL0

Ion 128.00 (127.70 to 128.70): V

Ion 130.00 (129.70 to 130.70): V



#2

Dichlorodifluoromethane

Concen: 0.145 ppbv

RT: 3.05 min Scan# 82

Delta R.T. 0.02 min

Lab File: VL036351.D

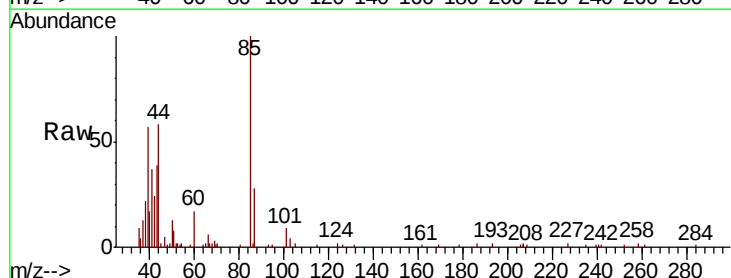
Acq: 24 Feb 2021 15:21

Tgt Ion: 85 Resp: 35485

Ion Ratio Lower Upper

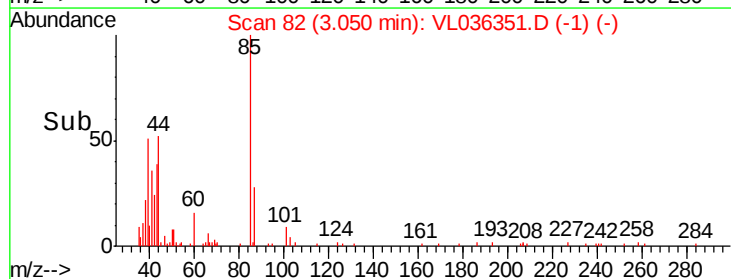
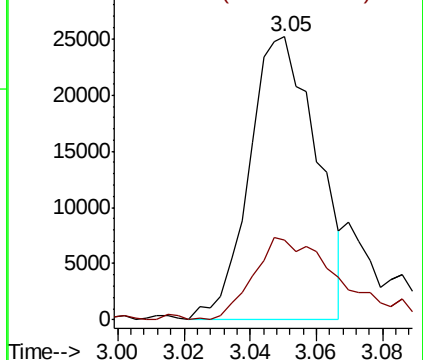
85 100

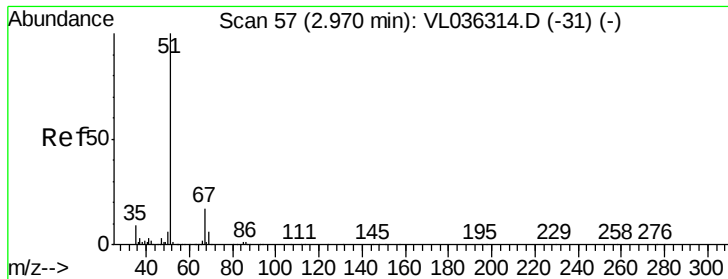
87 28.1 26.5 39.7



Abundance Ion 85.00 (84.70 to 85.70): VL0

Ion 87.00 (86.70 to 87.70): VL0





#3

Chlorodifluoromethane

Concen: 0.463 ppbv

RT: 2.99 min Scan# 63

Delta R.T. 0.02 min

Lab File: VL036351.D

Acq: 24 Feb 2021 15:21

Instrument :

MSVOA_L

ClientSampleId :

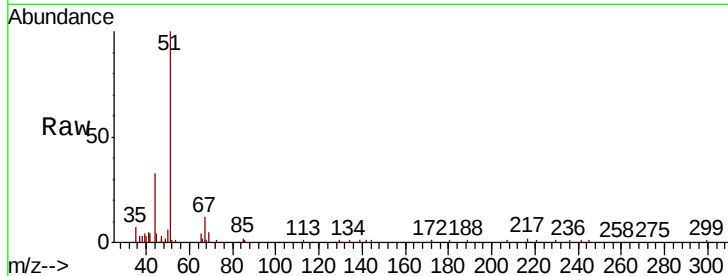
NS-9

Tot Ion: 51 Resp: 94632

Ion Ratio Lower Upper

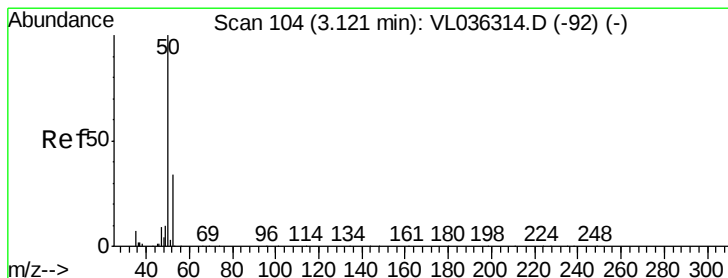
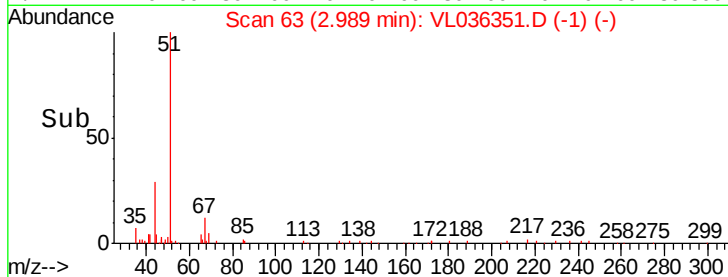
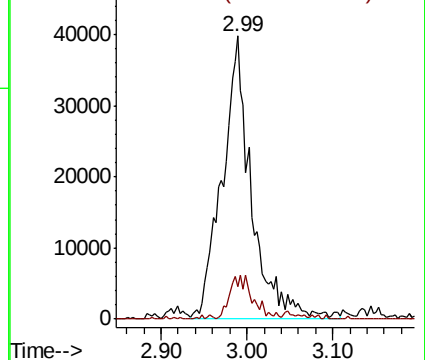
51 100

67 12.2 14.7 22.1#



Abundance Ion 51.00 (50.70 to 51.70): VL0

Ion 67.00 (66.70 to 67.70): VL0



#4

Chloromethane

Concen: 0.183 ppbv

RT: 3.14 min Scan# 109

Delta R.T. 0.02 min

Lab File: VL036351.D

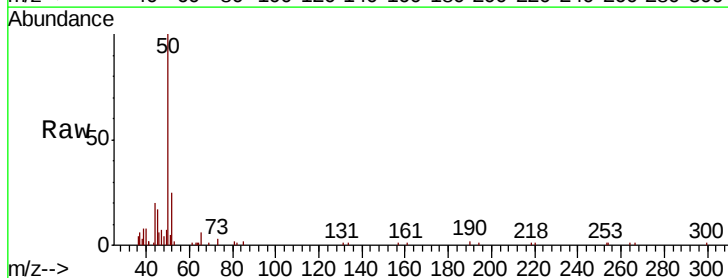
Acq: 24 Feb 2021 15:21

Tgt Ion: 50 Resp: 18031

Ion Ratio Lower Upper

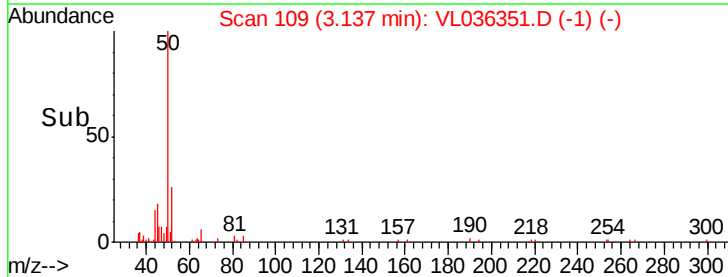
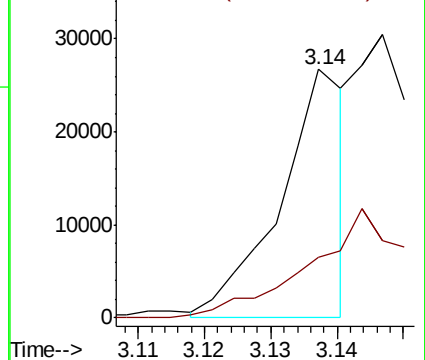
50 100

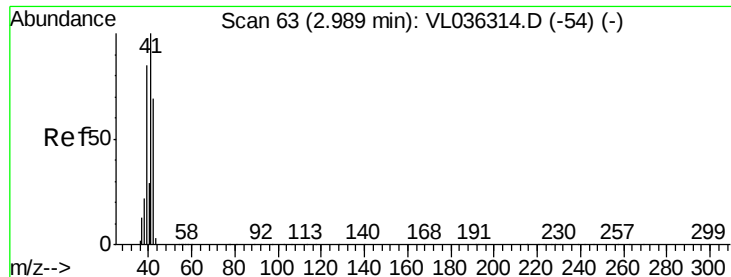
52 25.6 27.0 40.4#



Abundance Ion 50.10 (49.80 to 50.80): VL0

Ion 52.10 (51.80 to 52.80): VL0





#9

Propene

Concen: 1.450 ppbv

RT: 3.02 min Scan# 72

Delta R.T. 0.03 min

Lab File: VL036351.D

Acq: 24 Feb 2021 15:21

Instrument :

MSVOA_L

ClientSampleId :

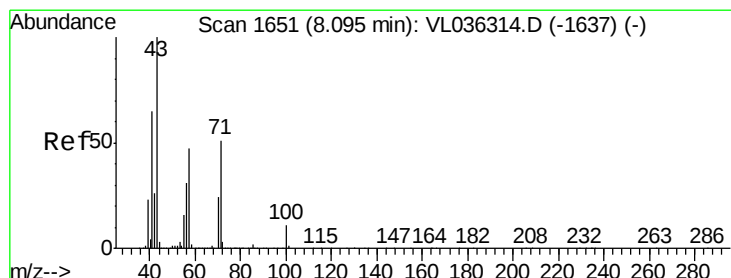
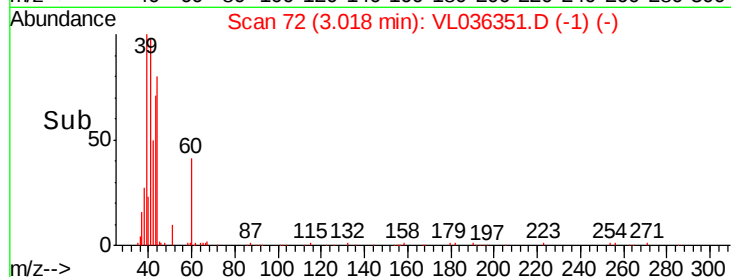
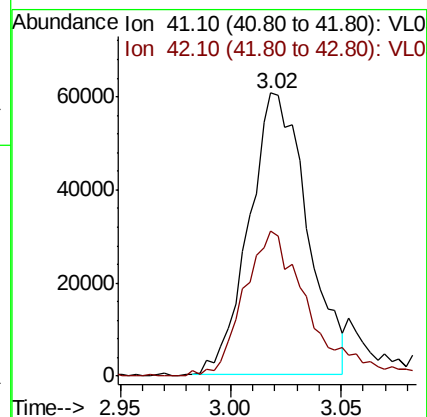
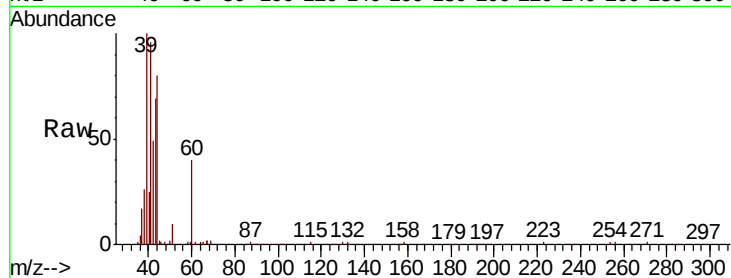
NS-9

Tot Ion: 41 Resp: 110499

Ion Ratio Lower Upper

41 100

42 59.0 56.2 84.2



#10

Heptane

Concen: 0.035 ppbv

RT: 8.14 min Scan# 1664

Delta R.T. 0.04 min

Lab File: VL036351.D

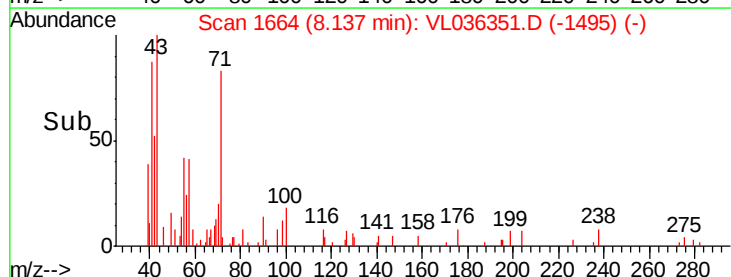
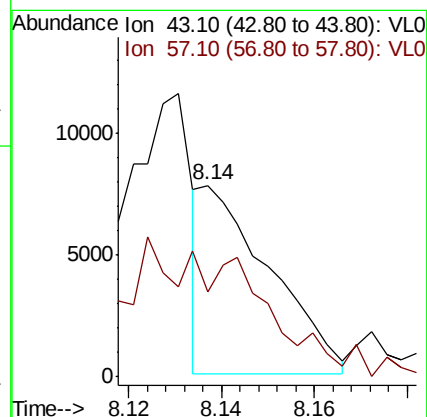
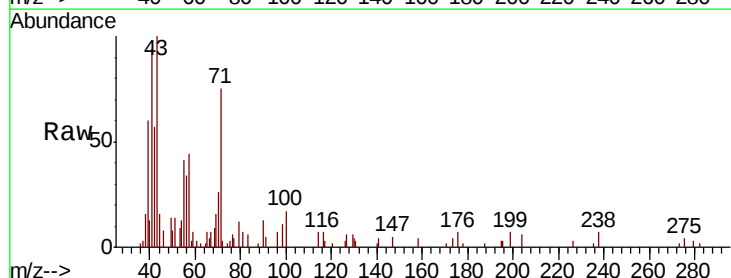
Acq: 24 Feb 2021 15:21

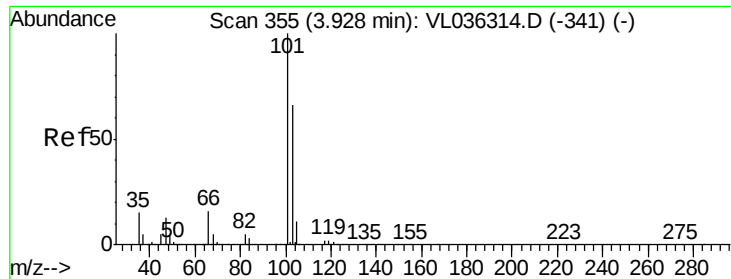
Tgt Ion: 43 Resp: 7866

Ion Ratio Lower Upper

43 100

57 0.0 39.4 59.2#





#11

Trichlorofluoromethane

Concen: 0.208 ppbv

RT: 3.95 min Scan# 363

Delta R.T. 0.03 min

Lab File: VL036351.D

Acq: 24 Feb 2021 15:21

Instrument :

MSVOA_L

ClientSampleId :

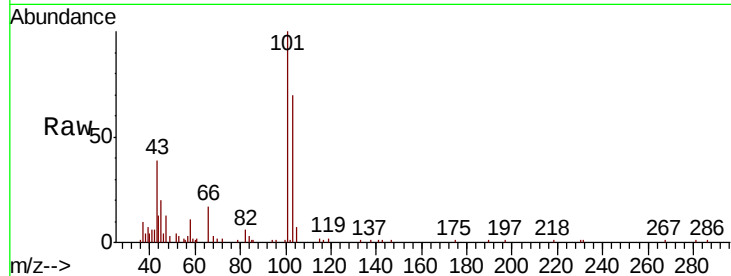
NS-9

Tot Ion:101 Resp: 49929

Ion Ratio Lower Upper

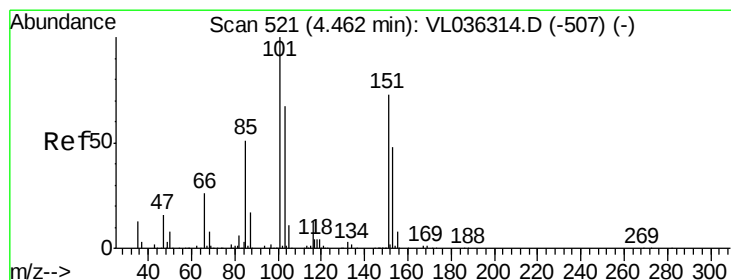
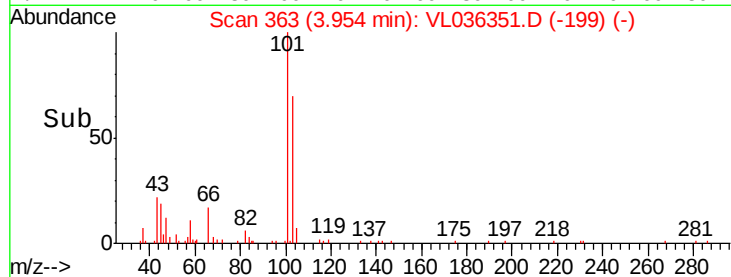
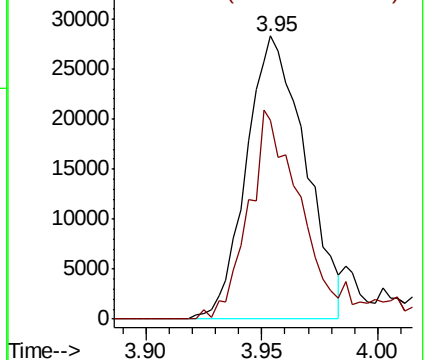
101 100

103 70.5 52.9 79.3



Abundance Ion 101.00 (100.70 to 101.70): V

Ion 103.00 (102.70 to 103.70): V



#12

1,1,2-Trichlorotrifluoroethane

Concen: 0.034 ppbv

RT: 4.48 min Scan# 527

Delta R.T. 0.02 min

Lab File: VL036351.D

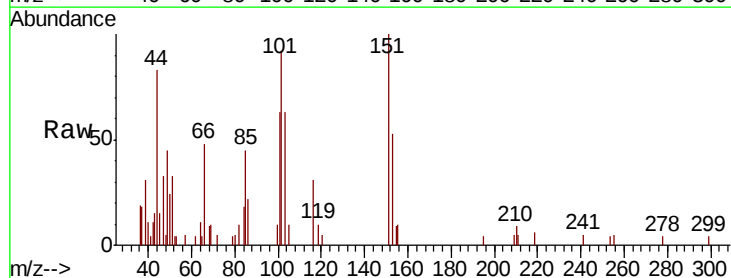
Acq: 24 Feb 2021 15:21

Tgt Ion:101 Resp: 5078

Ion Ratio Lower Upper

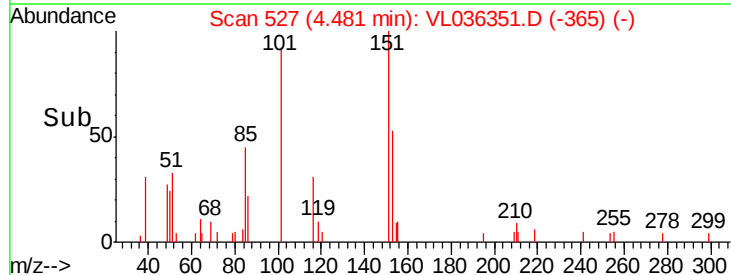
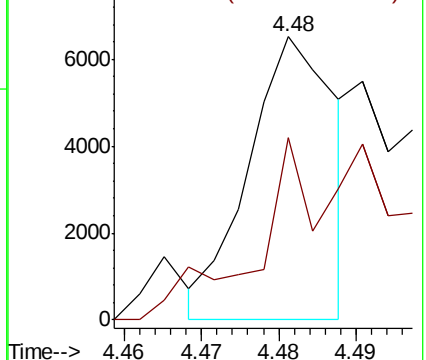
101 100

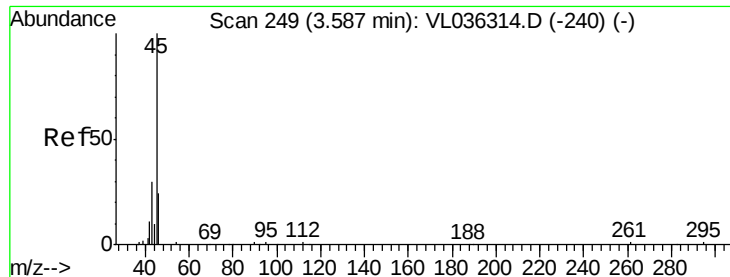
151 144.2 58.2 87.4#



Abundance Ion 101.00 (100.70 to 101.70): V

Ion 151.00 (150.70 to 151.70): V





#13

Ethanol

Concen: 14.126 ppbv

RT: 3.61 min Scan# 257

Delta R.T. 0.03 min

Lab File: VL036351.D

Acq: 24 Feb 2021 15:21

Instrument :

MSVOA_L

ClientSampleId :

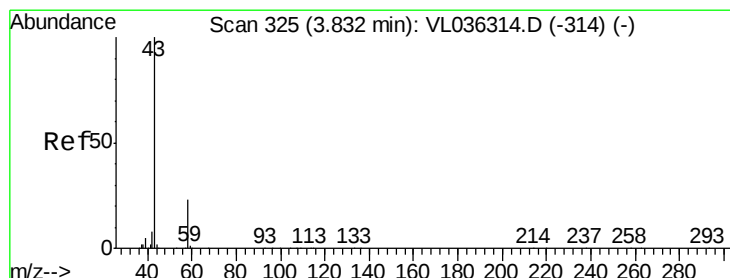
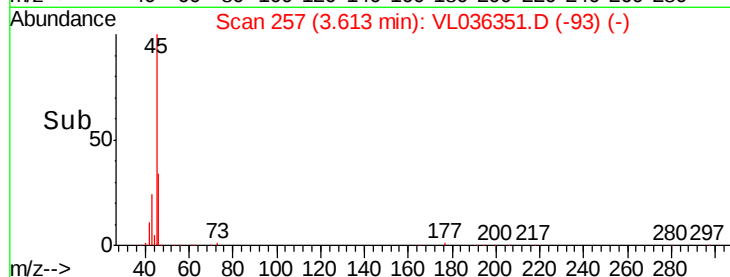
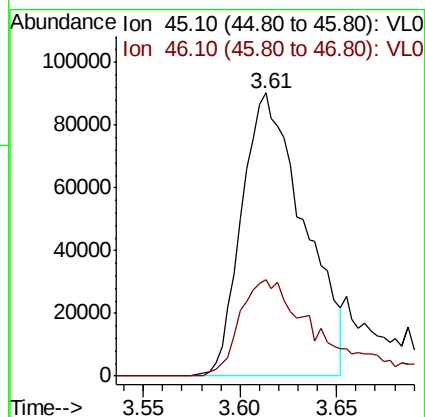
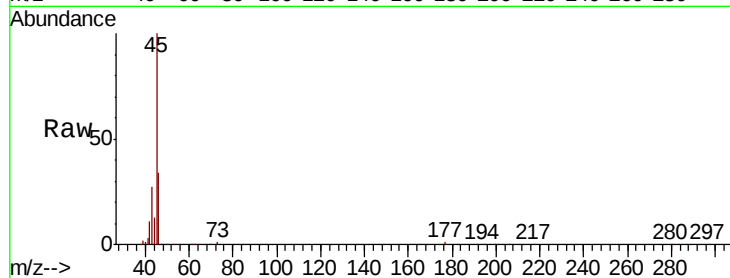
NS-9

Tot Ion: 45 Resp: 202176

Ion Ratio Lower Upper

45 100

46 46.4 17.7 70.7



#15

Acetone

Concen: 2.515 ppbv

RT: 3.86 min Scan# 333

Delta R.T. 0.03 min

Lab File: VL036351.D

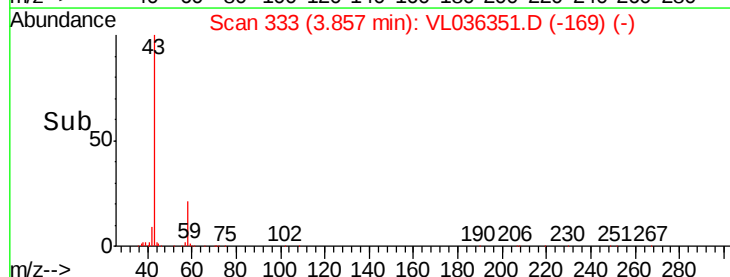
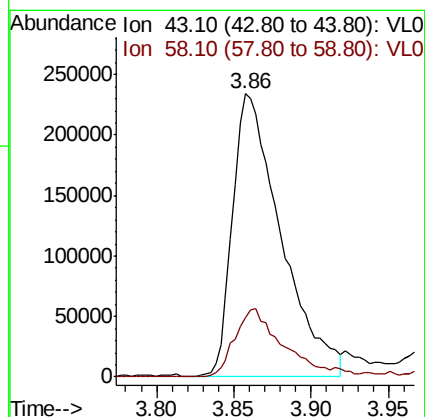
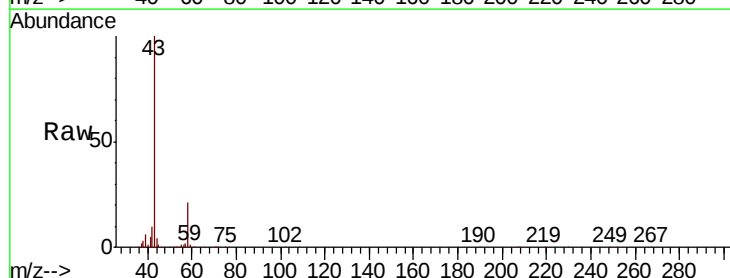
Acq: 24 Feb 2021 15:21

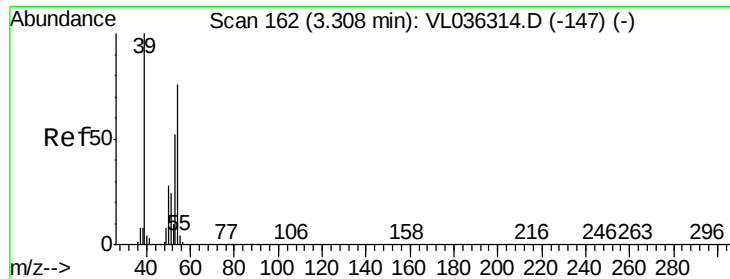
Tgt Ion: 43 Resp: 505735

Ion Ratio Lower Upper

43 100

58 25.6 20.3 30.5

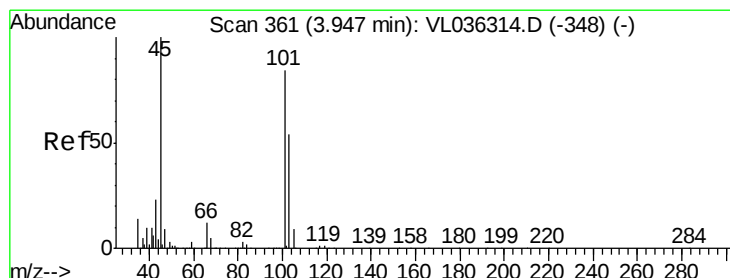
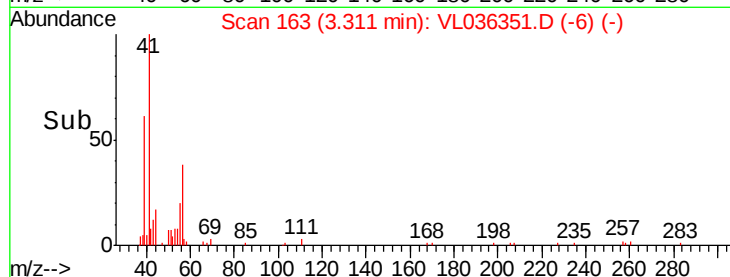
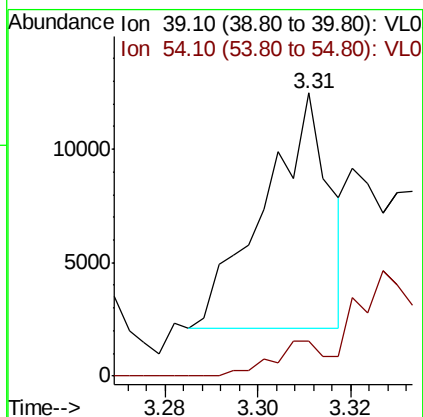
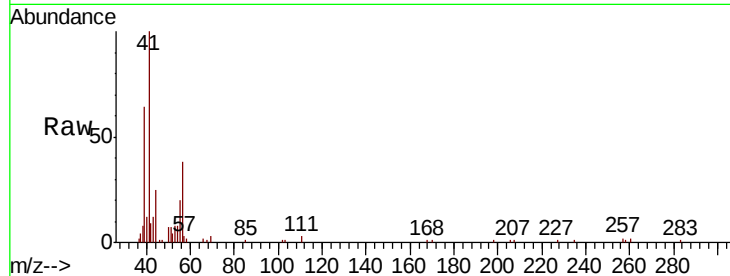




#16
 1,3-Butadiene
 Concen: 0.106 ppbv
 RT: 3.31 min Scan# 163
 Delta R.T. 0.00 min
 Lab File: VL036351.D
 Acq: 24 Feb 2021 15:21

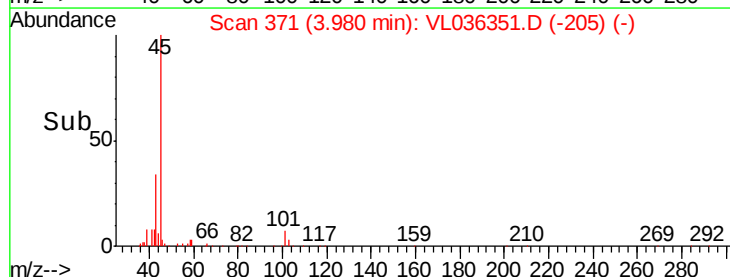
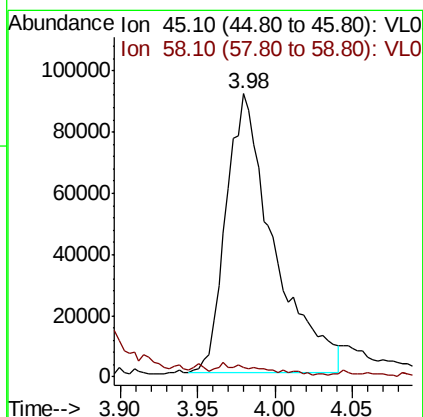
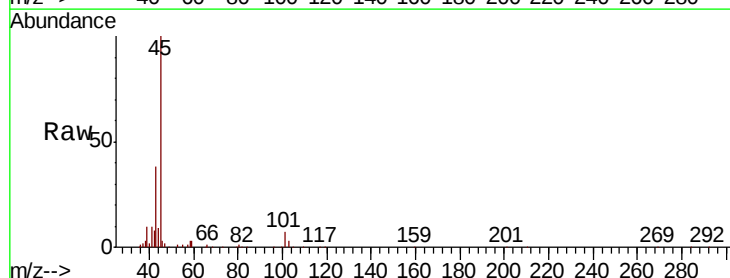
Instrument :
 MSVOA_L
 ClientSampleId :
 NS-9

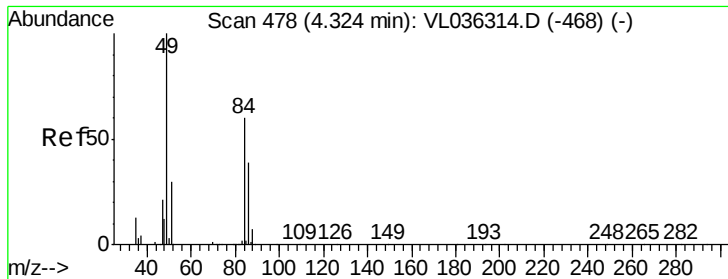
Tot Ion: 39 Resp: 10163
 Ion Ratio Lower Upper
 39 100
 54 78.9 64.4 96.6



#19
 Isopropyl Alcohol
 Concen: 1.753 ppbv
 RT: 3.98 min Scan# 371
 Delta R.T. 0.03 min
 Lab File: VL036351.D
 Acq: 24 Feb 2021 15:21

Tgt Ion: 45 Resp: 195259
 Ion Ratio Lower Upper
 45 100
 58 4.6 1.9 2.9#

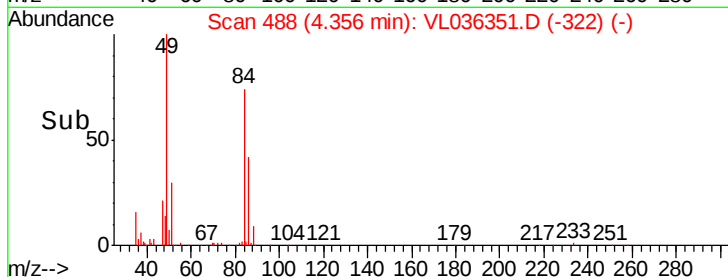
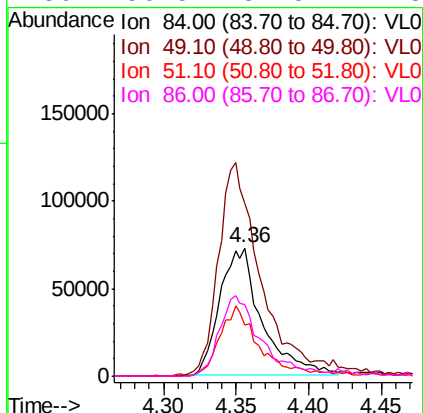
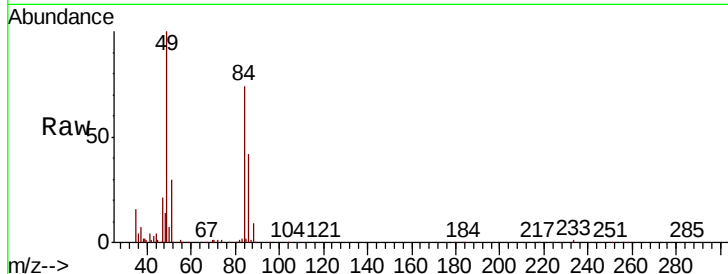




#20
Methylene Chloride
Concen: 2.279 ppbv
RT: 4.36 min Scan# 488
Delta R.T. 0.03 min
Lab File: VL036351.D
Acq: 24 Feb 2021 15:21

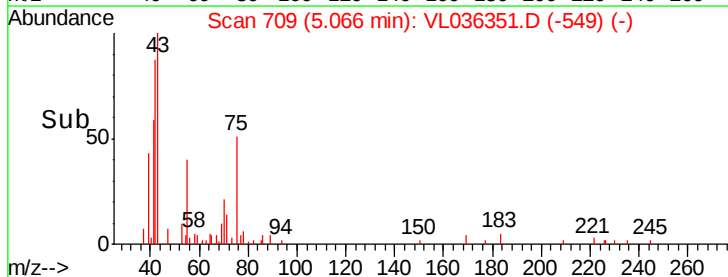
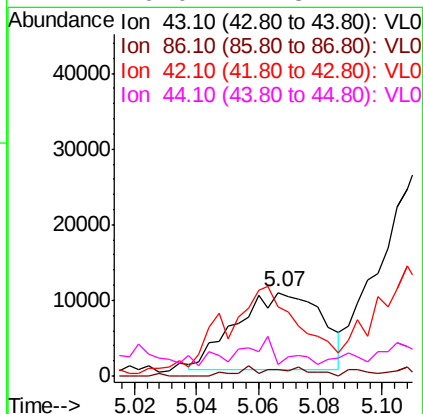
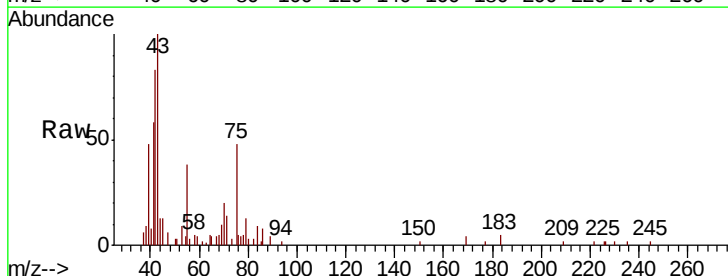
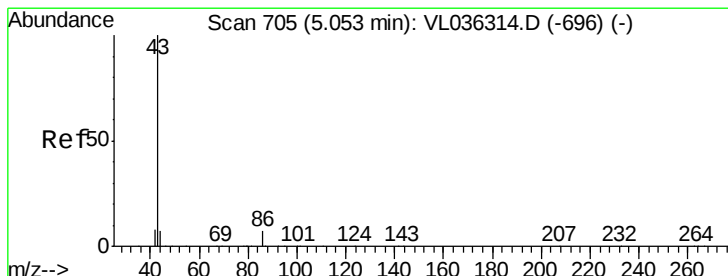
Instrument :
MSVOA_L
ClientSampleId :
NS-9

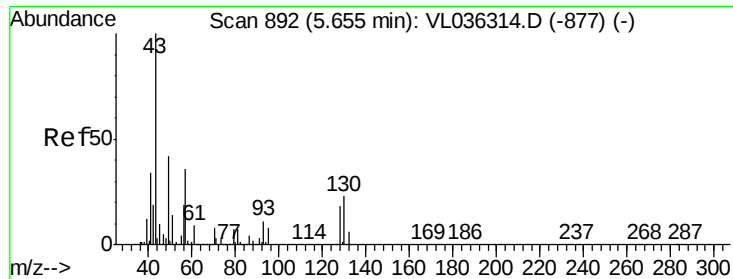
Tot Ion:	84	Resp:	147816
Ion	Ratio	Lower	Upper
84	100		
49	133.9	133.8	200.8
51	40.1	41.4	62.0#
86	56.5	51.5	77.3



#23
Vinyl Acetate
Concen: 0.084 ppbv
RT: 5.07 min Scan# 709
Delta R.T. 0.01 min
Lab File: VL036351.D
Acq: 24 Feb 2021 15:21

Tgt Ion:	43	Resp:	19756
Ion	Ratio	Lower	Upper
43	100		
86	8.8	4.8	7.2#
42	84.2	7.4	11.0#
44	0.0	4.8	7.2#

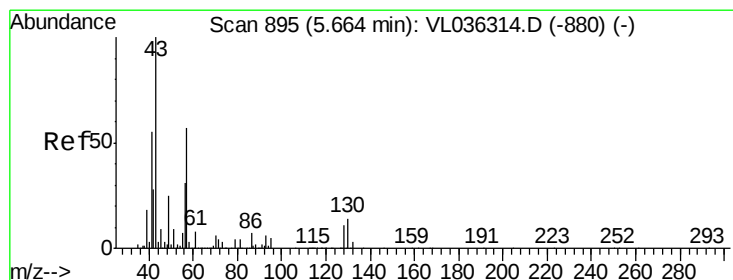
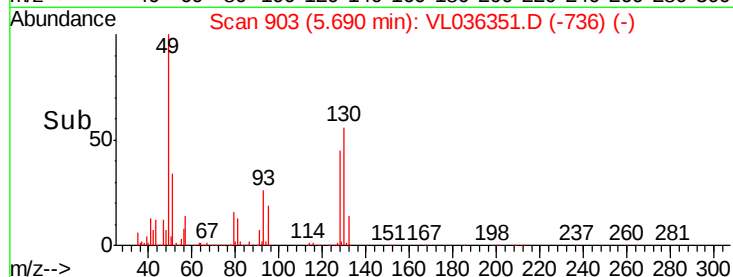
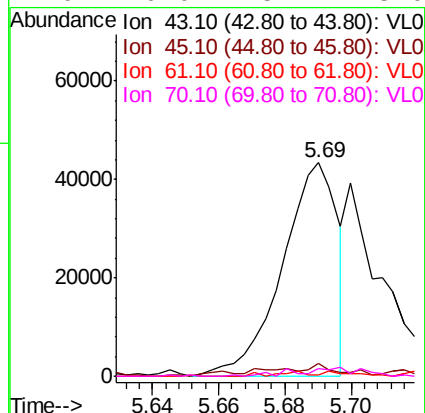
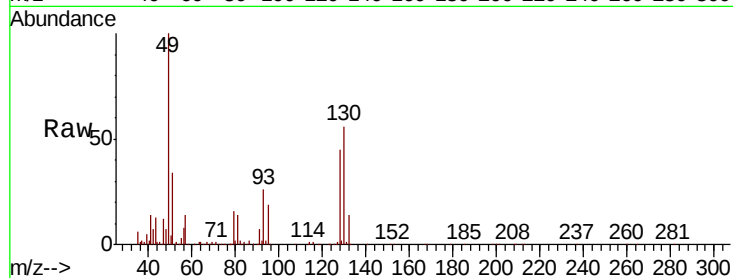




#25
Ethyl Acetate
Concen: 0.130 ppbv
RT: 5.69 min Scan# 903
Delta R.T. 0.04 min
Lab File: VL036351.D
Acq: 24 Feb 2021 15:21

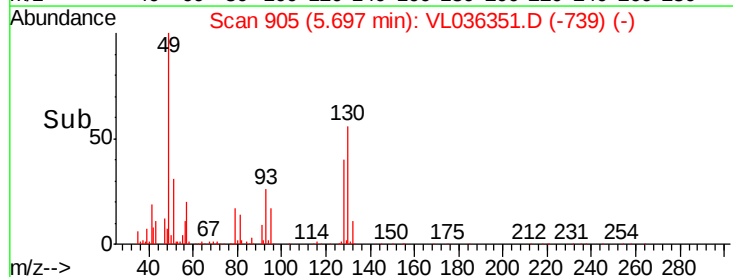
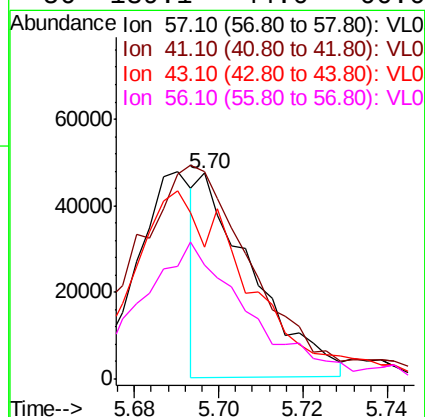
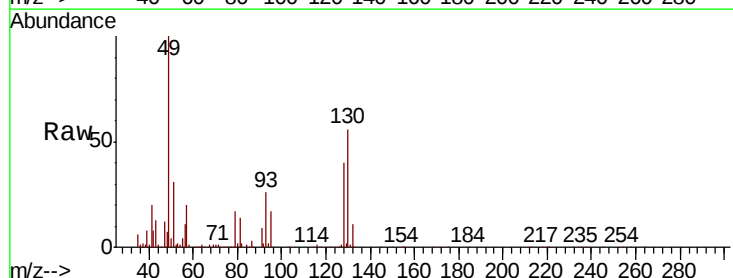
Instrument :
MSVOA_L
ClientSampleID :
NS-9

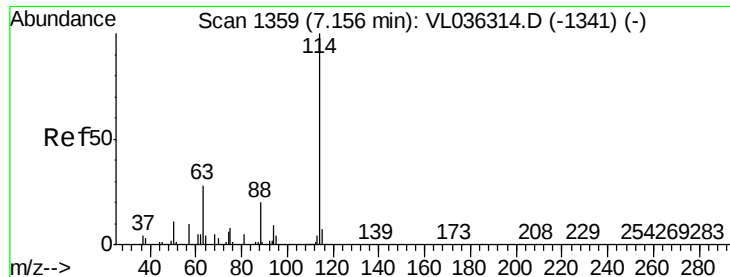
Tot Ion:	43	Resp:	50331
Ion	Ratio	Lower	Upper
43	100		
45	10.7	8.3	12.5
61	3.1	7.3	10.9#
70	0.0	5.4	8.0#



#26
Hexane
Concen: 0.266 ppbv
RT: 5.70 min Scan# 905
Delta R.T. 0.03 min
Lab File: VL036351.D
Acq: 24 Feb 2021 15:21

Tgt Ion:	57	Resp:	42497
Ion	Ratio	Lower	Upper
57	100		
41	244.5	81.7	122.5#
43	0.0	199.1	298.7#
56	139.1	44.0	66.0#

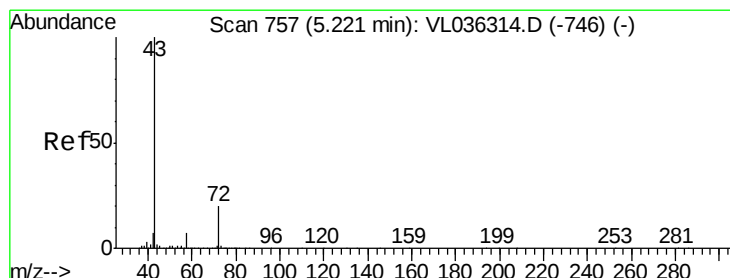
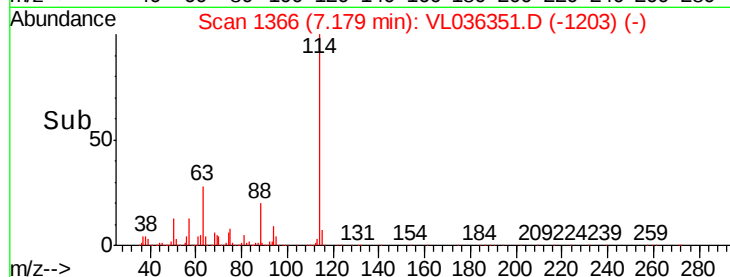
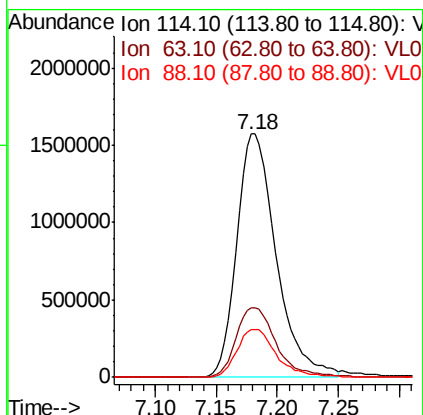
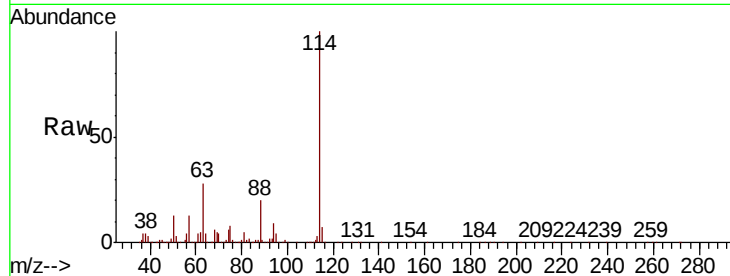




#33
 1,4-Difluorobenzene
 Concen: 10.000 ppbv
 RT: 7.18 min Scan# 1366
 Delta R.T. 0.02 min
 Lab File: VL036351.D
 Acq: 24 Feb 2021 15:21

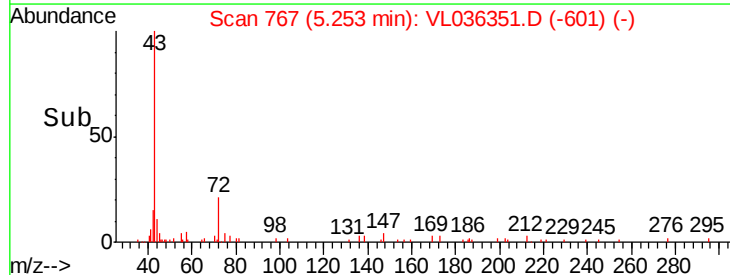
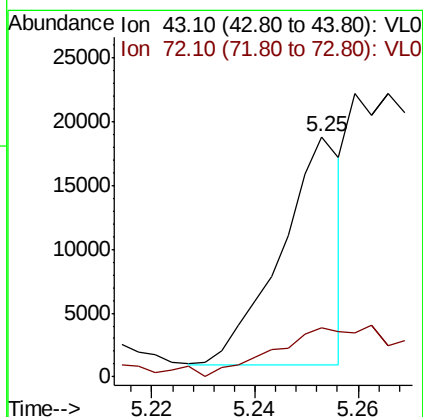
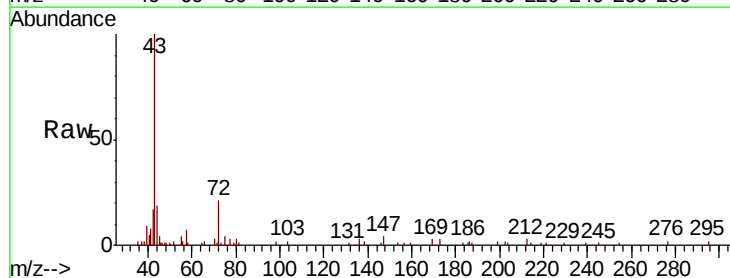
Instrument :
 MSVOA_L
 ClientSampleId :
 NS-9

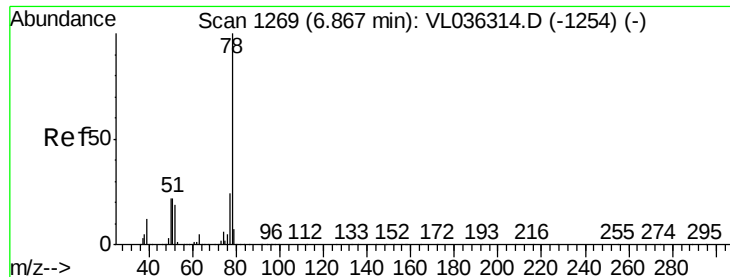
Tot Ion:114 Resp: 3519629
 Ion Ratio Lower Upper
 114 100
 63 29.8 24.1 36.1
 88 20.1 16.0 24.0



#34
 2-Butanone
 Concen: 0.062 ppbv
 RT: 5.25 min Scan# 767
 Delta R.T. 0.03 min
 Lab File: VL036351.D
 Acq: 24 Feb 2021 15:21

Tgt Ion: 43 Resp: 14575
 Ion Ratio Lower Upper
 43 100
 72 0.0 16.7 25.1#





#36

Benzene

Concen: 0.509 ppbv

RT: 6.90 min Scan# 1278

Delta R.T. 0.03 min

Lab File: VL036351.D

Acq: 24 Feb 2021 15:21

Instrument :

MSVOA_L

ClientSampleId :

NS-9

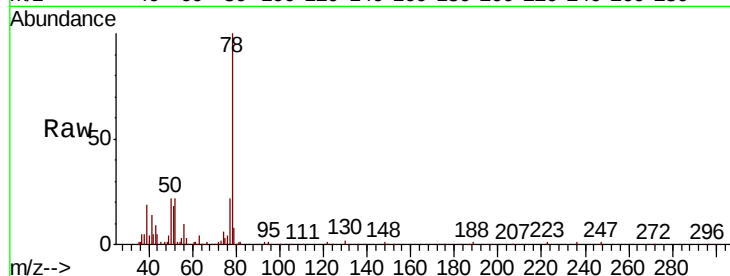
Tot Ion: 78 Resp: 152318

Ion Ratio Lower Upper

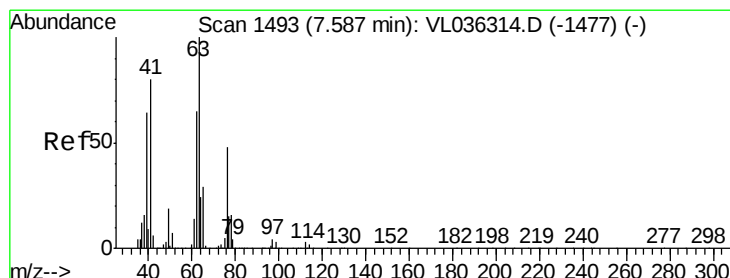
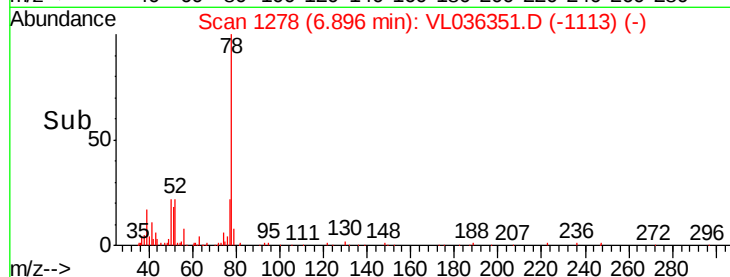
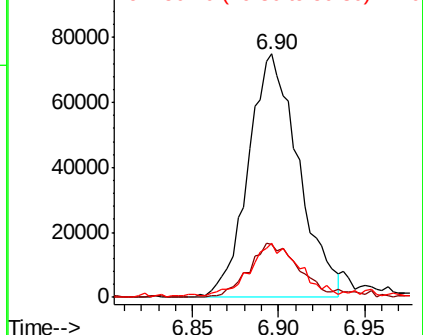
78 100

77 21.7 18.9 28.3

50 21.1 17.3 25.9



Abundance Ion 78.10 (77.80 to 78.80): VL0
Ion 77.10 (76.80 to 77.80): VL0
Ion 50.10 (49.80 to 50.80): VL0



#39

1,2-Dichloropropane

Concen: 8.456 ppbv

RT: 7.18 min Scan# 1367

Delta R.T. -0.41 min

Lab File: VL036351.D

Acq: 24 Feb 2021 15:21

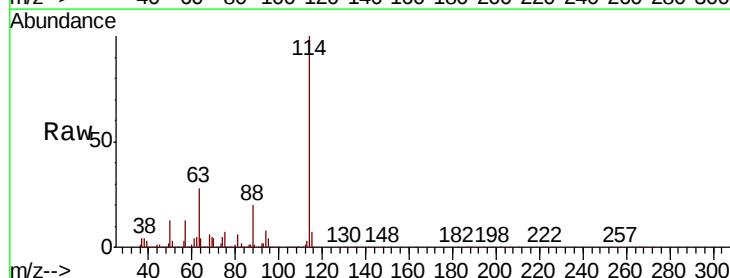
Tgt Ion: 63 Resp: 1026976

Ion Ratio Lower Upper

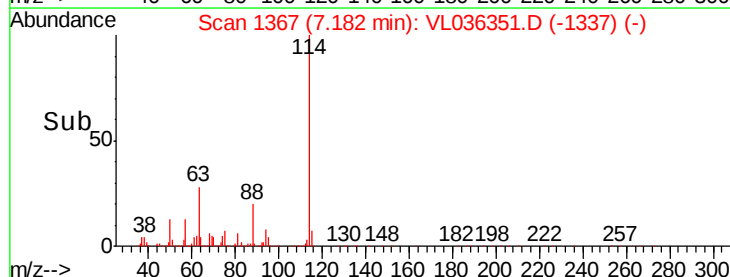
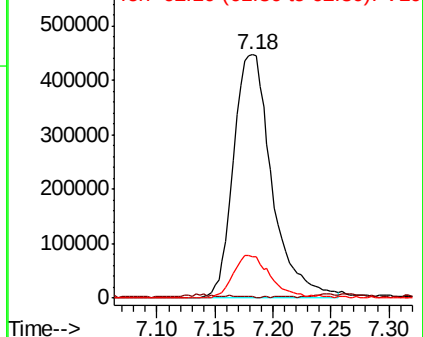
63 100

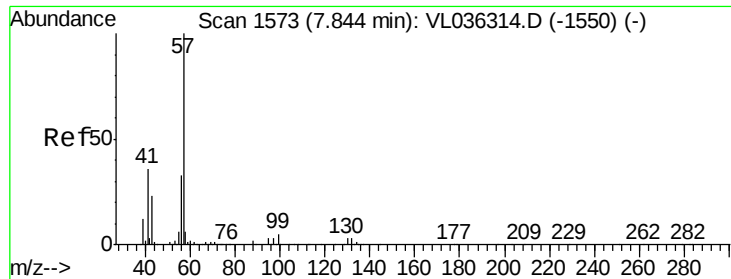
41 0.0 63.8 95.6#

62 16.9 52.3 78.5#



Abundance Ion 63.10 (62.80 to 63.80): VL0
Ion 41.10 (40.80 to 41.80): VL0
Ion 62.10 (61.80 to 62.80): VL0

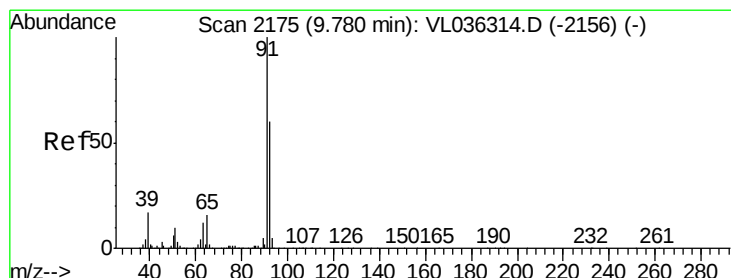
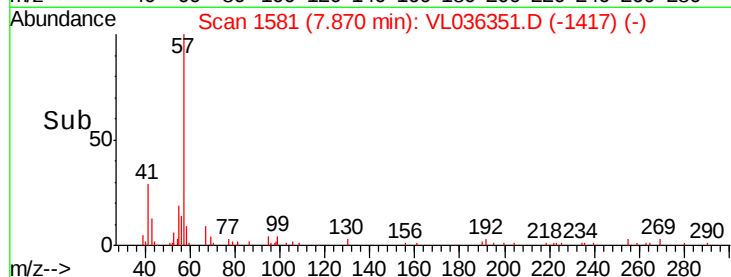
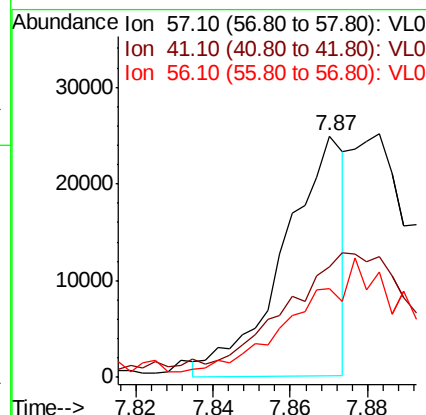
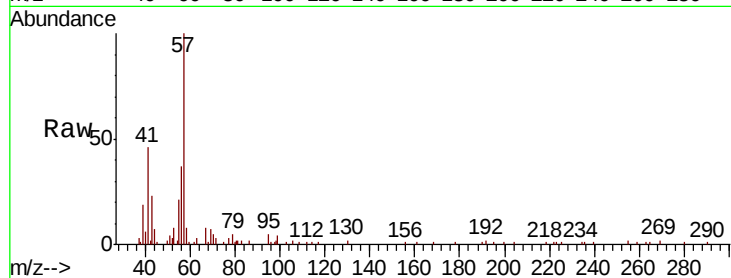




#44
 2,2,4-Trimethylpentane
 Concen: 0.049 ppbv
 RT: 7.87 min Scan# 1581
 Delta R.T. 0.03 min
 Lab File: VL036351.D
 Acq: 24 Feb 2021 15:21

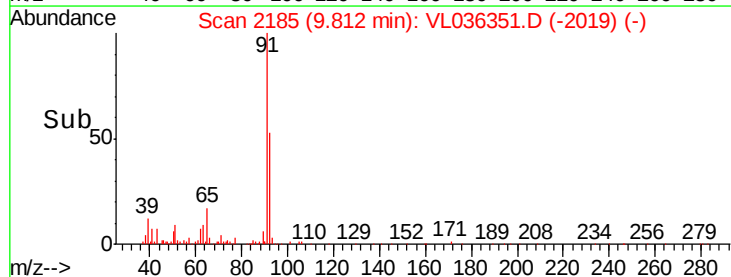
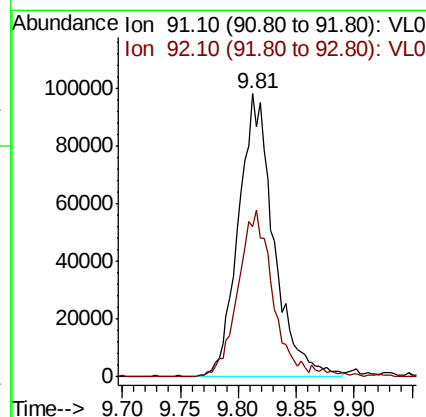
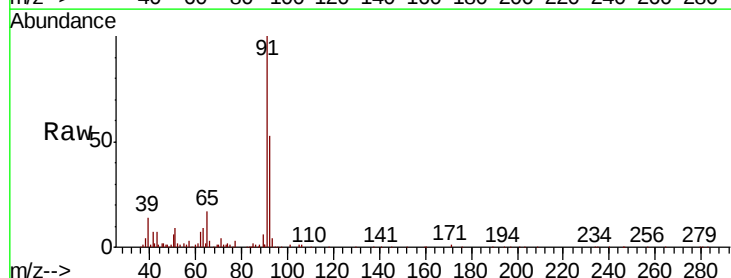
Instrument :
 MSVOA_L
 ClientSampleId :
 NS-9

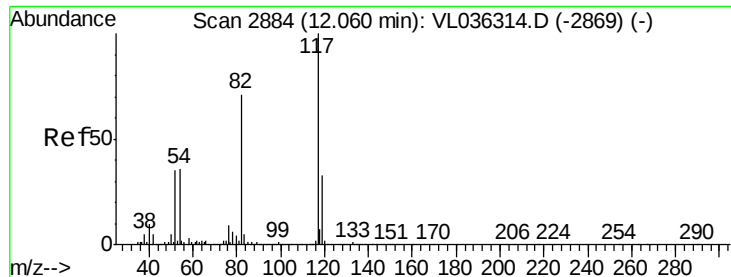
Tot Ion: 57 Resp: 26786
 Ion Ratio Lower Upper
 57 100
 41 125.0 28.8 43.2#
 56 89.4 25.8 38.6#



#53
 Toluene
 Concen: 0.639 ppbv
 RT: 9.81 min Scan# 2185
 Delta R.T. 0.03 min
 Lab File: VL036351.D
 Acq: 24 Feb 2021 15:21

Tgt Ion: 91 Resp: 206925
 Ion Ratio Lower Upper
 91 100
 92 59.4 48.6 72.8

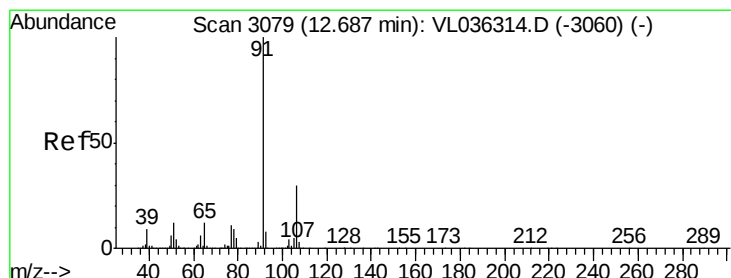
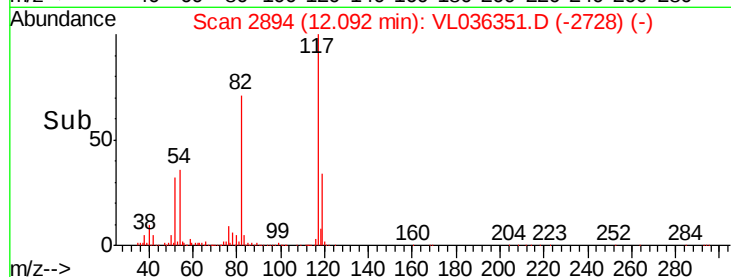
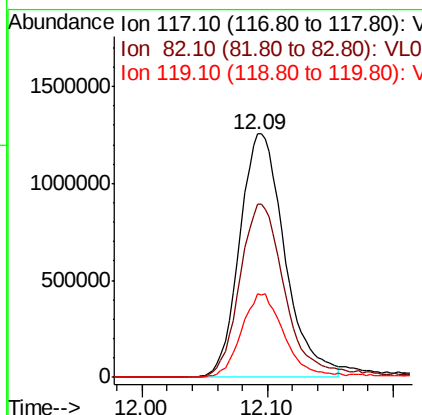
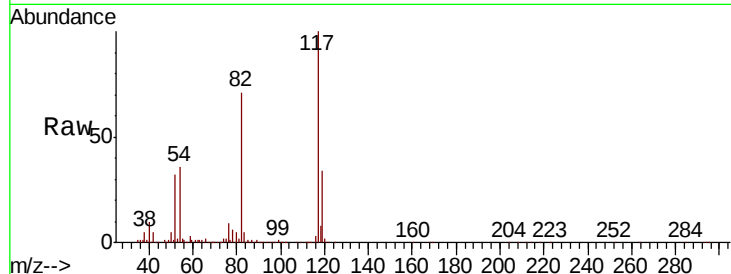




#55
Chlorobenzene-d5
Concen: 10.000 ppbv
RT: 12.09 min Scan# 2894
Delta R.T. 0.03 min
Lab File: VL036351.D
Acq: 24 Feb 2021 15:21

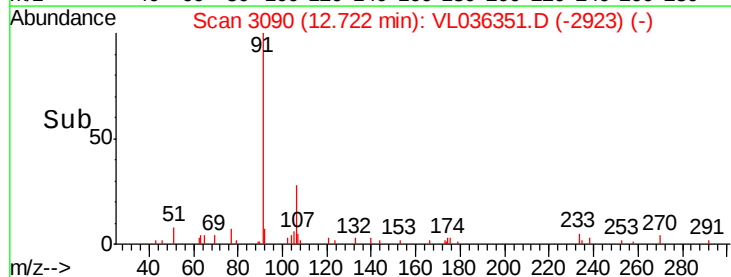
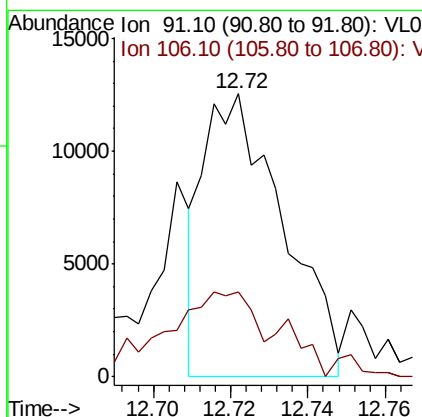
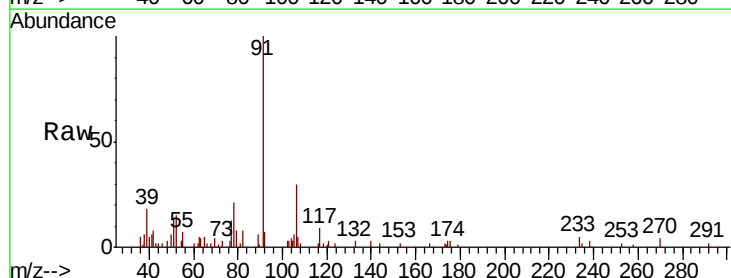
Instrument :
MSVOA_L
ClientSampleId :
NS-9

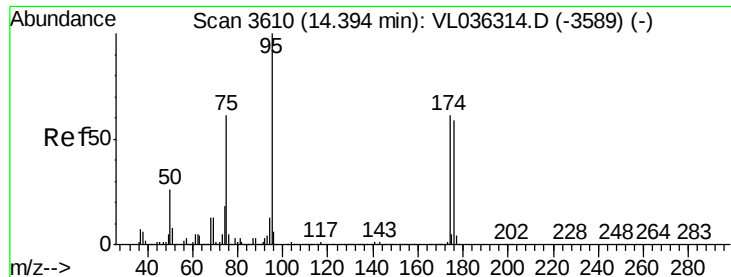
Tot Ion:117 Resp: 3135549
Ion Ratio Lower Upper
117 100
82 74.7 59.1 88.7
119 34.0 46.3 69.5#



#58
Ethyl Benzene
Concen: 0.041 ppbv
RT: 12.72 min Scan# 3090
Delta R.T. 0.04 min
Lab File: VL036351.D
Acq: 24 Feb 2021 15:21

Tgt Ion: 91 Resp: 17790
Ion Ratio Lower Upper
91 100
106 25.6 23.8 35.6





#68

1-Bromo-4-Fluorobenzene

Concen: 9.945 ppbv

RT: 14.43 min Scan# 3620

Delta R.T. 0.03 min

Lab File: VL036351.D

Acq: 24 Feb 2021 15:21

Instrument :

MSVOA_L

ClientSampleId :

NS-9

Tot Ion: 95 Resp: 2565641

Ion Ratio Lower Upper

95 100

174 63.0 49.8 74.6

175 4.7 3.7 5.5

