

Data Path : Z:\VOASRV\HPCHEM1\MSVOA X\DATA\VX112719\
 Data File : VX013679.D
 Acq On : 28 Nov 2019 02:44
 Operator : JC/SP
 Sample : K5968-13
 Misc : 5.0mL/MSVOA X/WATER
 ALS Vial : 42 Sample Multiplier: 1

Instrument :
 MSVOA_X
 ClientSampleId :

Quant Time: Nov 28 04:23:31 2019
 Quant Method : Z:\VOASRV\HPCHEM1\MSVOA_X\METHOD\82X112619W.M
 Quant Title : SW846 8260
 QLast Update : Tue Nov 26 15:53:00 2019
 Response via : Initial Calibration

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Pentafluorobenzene	5.65	168	696670	50.00	ug/l	0.00
34) 1,4-Difluorobenzene	6.85	114	1086742	50.00	ug/l	0.00
63) Chlorobenzene-d5	10.11	117	966809	50.00	ug/l	0.00
72) 1,4-Dichlorobenzene-d4	12.07	152	441157	50.00	ug/l	0.00

System Monitoring Compounds	R.T.	QIon	Response	Conc	Units	Dev(Min)
33) 1,2-Dichloroethane-d4	6.05	65	390815	48.33	ug/l	0.00
Spiked Amount			Recovery	=	96.66%	
35) Dibromofluoromethane	5.48	113	319371	47.54	ug/l	0.00
Spiked Amount			Recovery	=	95.08%	
50) Toluene-d8	8.71	98	1276895	48.78	ug/l	0.00
Spiked Amount			Recovery	=	97.56%	
62) 4-Bromofluorobenzene	11.14	95	434913	46.08	ug/l	0.00
Spiked Amount			Recovery	=	92.16%	

Target Compounds	R.T.	QIon	Response	Conc	Units	Qvalue
2) Dichlorodifluoromethane	1.19	85	2647	0.341	ug/l	75
4) Vinyl Chloride	1.40	62	3539	0.361	ug/l #	79
7) Trichlorofluoromethane	1.92	101	11995	1.103	ug/l	85
9) 1,1,2-Trichlorotrifluoroet	2.37	101	2820	0.425	ug/l #	83
11) Tert butyl alcohol	3.05	59	707	0.354	ug/l #	1
12) 1,1-Dichloroethene	2.37	96	1772	0.267	ug/l	94
13) Acrolein	2.28	56	466	6.344	ug/l #	69
16) Acetone	2.44	43	5454	1.366	ug/l	97
21) trans-1,2-Dichloroethene	3.17	96	4015	0.556	ug/l	97
27) cis-1,2-Dichloroethene	4.59	96	220112	26.537	ug/l	89
29) Tetrahydrofuran	5.12	42	756	0.207	ug/l #	56
31) Cyclohexane	5.65	56	11566	0.968	ug/l #	1
36) 1,1-Dichloropropene	5.64	75	46642	4.728	ug/l #	42
38) Carbon Tetrachloride	5.65	117	60741	6.678	ug/l #	17
44) Trichloroethene	7.21	130	362731	43.990	ug/l	100
49) 1,4-Dioxane	7.74	88	568	2.866	ug/l #	24
64) Tetrachloroethene	9.34	164	1572	0.218	ug/l #	63
76) 1,2,3-Trichloropropane	11.14	75	213214	21.488	ug/l #	39
81) trans-1,4-Dichloro-2-buten	11.14	75	213214	58.788	ug/l #	11
84) 1,2,4-Trimethylbenzene	11.80	105	5984	0.232	ug/l	86
95) Naphthalene	13.83	128	37941	1.270	ug/l	97

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



#1

Pentafluorobenzene

Concen: 50.000 ug/l

RT: 5.65 min Scan# 782

Delta R.T. 0.01 min

Lab File: VX013679.D

Acq: 28 Nov 2019 02:44

Instrument :

MSVOA_X

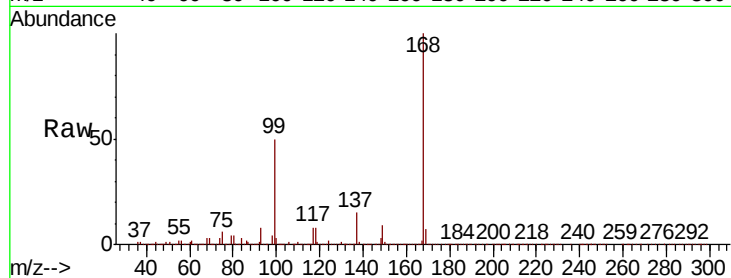
ClientSampled :

Tot Ion:168 Resp: 696670

Ion Ratio Lower Upper

168 100

99 49.5 39.8 59.8



Abundance Ion 167.90 (167.60 to 168.60): V

Ion 98.90 (98.60 to 99.60): VX0

5.65

250000

200000

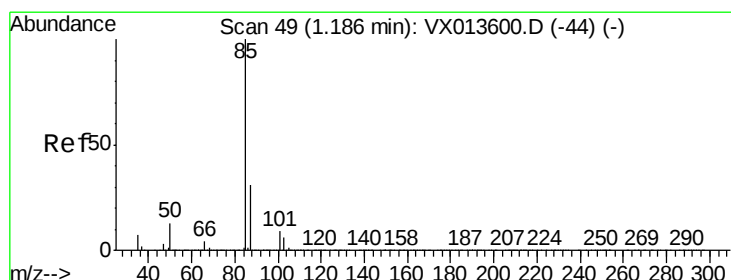
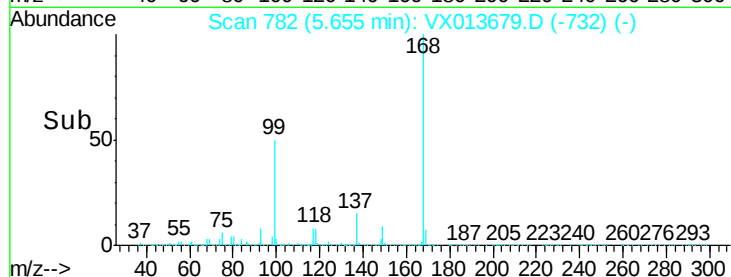
150000

100000

50000

0

Time-->



#2

Dichlorodifluoromethane

Concen: 0.341 ug/l

RT: 1.19 min Scan# 50

Delta R.T. 0.01 min

Lab File: VX013679.D

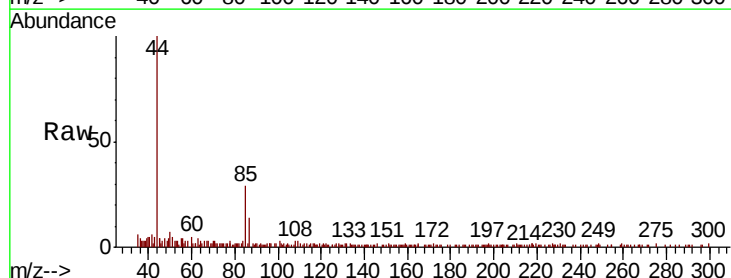
Acq: 28 Nov 2019 02:44

Tgt Ion: 85 Resp: 2647

Ion Ratio Lower Upper

85 100

87 45.3 15.7 47.1



Abundance Ion 84.90 (84.60 to 85.60): VX0

Ion 86.90 (86.60 to 87.60): VX0

1.19

3000

2500

2000

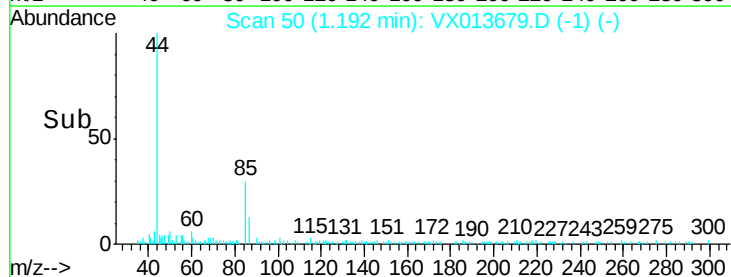
1500

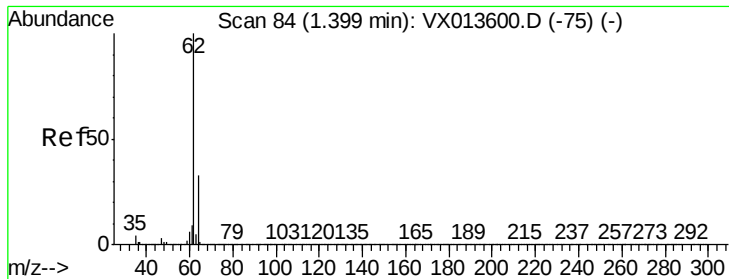
1000

500

0

Time-->





#4

Vinyl Chloride

Concen: 0.361 ug/l

RT: 1.40 min Scan# 84

Delta R.T. 0.00 min

Lab File: VX013679.D

Acq: 28 Nov 2019 02:44

Instrument :

MSVOA_X

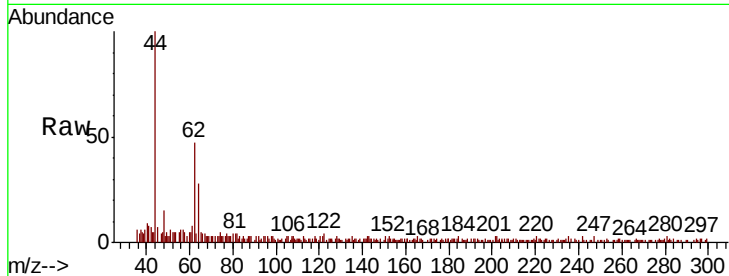
ClientSampleId :

Tot Ion: 62 Resp: 3539

Ion Ratio Lower Upper

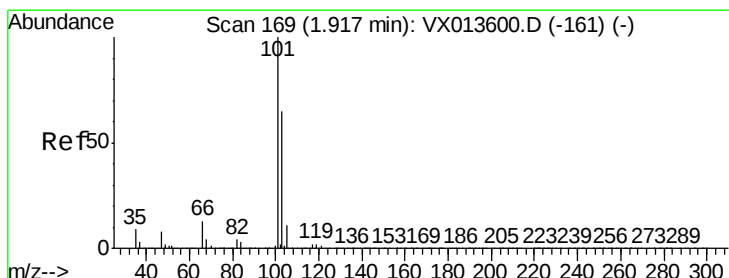
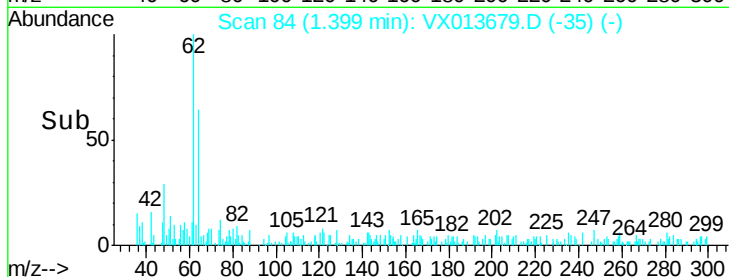
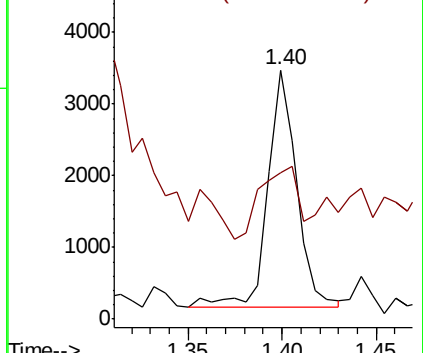
62 100

64 20.5 26.0 39.0#



Abundance Ion 61.90 (61.60 to 62.60): VX0

Ion 63.90 (63.60 to 64.60): VX0



#7

Trichlorofluoromethane

Concen: 1.103 ug/l

RT: 1.92 min Scan# 170

Delta R.T. 0.01 min

Lab File: VX013679.D

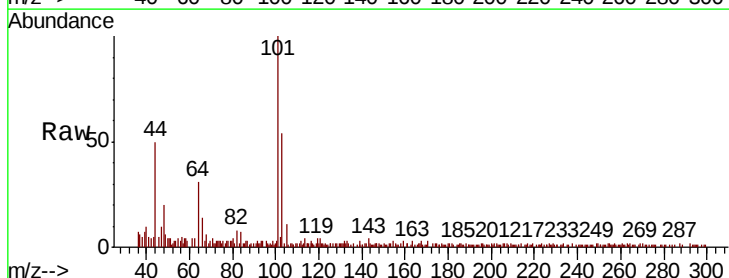
Acq: 28 Nov 2019 02:44

Tgt Ion: 101 Resp: 11995

Ion Ratio Lower Upper

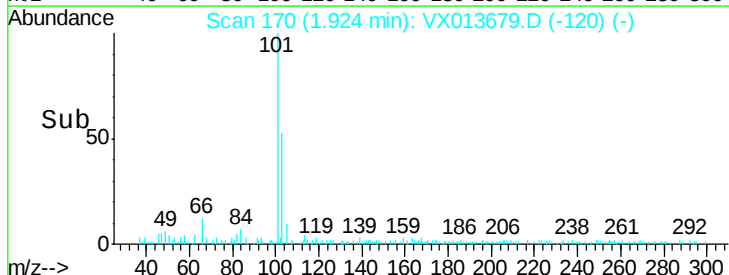
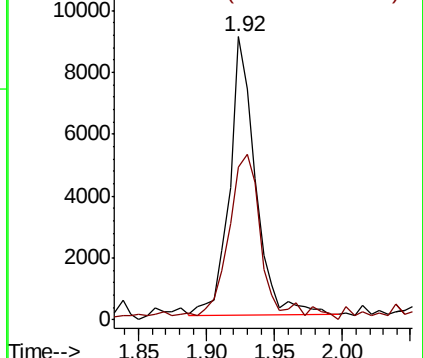
101 100

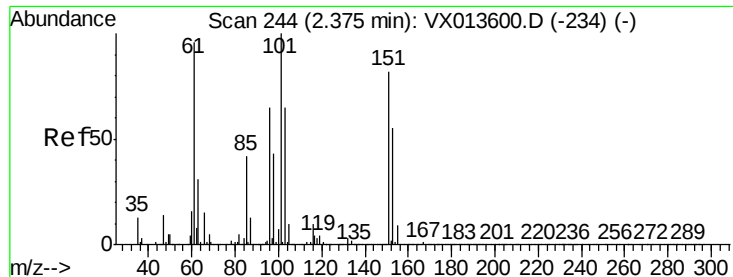
103 52.8 51.8 77.6



Abundance Ion 100.90 (100.60 to 101.60): V

Ion 102.80 (102.50 to 103.50): V





#9

1,1,2-Trichlorotrifluoroethane

Concen: 0.425 ug/l

RT: 2.37 min Scan# 244

Delta R.T. 0.00 min

Lab File: VX013679.D

Acq: 28 Nov 2019 02:44

Instrument :

MSVOA_X

ClientSampled :

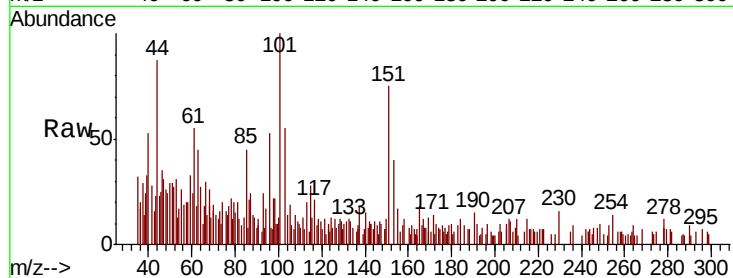
Tot Ion:101 Resp: 2820

Ion Ratio Lower Upper

101 100

85 52.7 33.9 50.9#

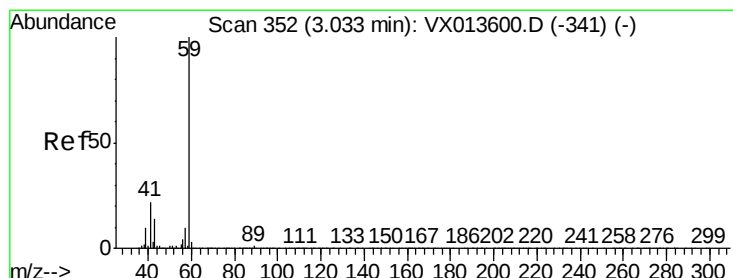
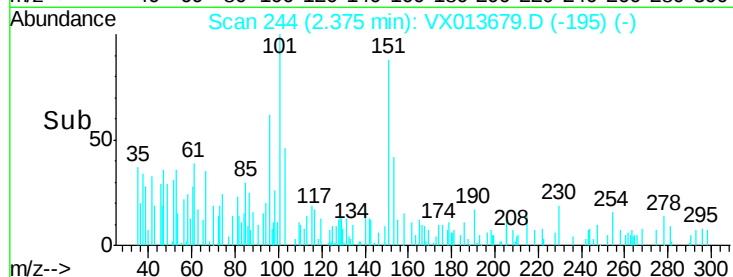
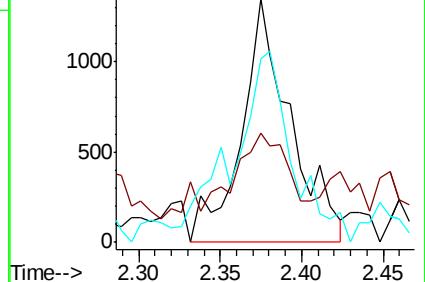
151 95.4 64.2 96.2



Abundance Ion 100.90 (100.60 to 101.60): V

Ion 84.90 (84.60 to 85.60): VX0

Ion 150.80 (150.50 to 151.50): V



#11

Tert butyl alcohol

Concen: 0.354 ug/l

RT: 3.05 min Scan# 355

Delta R.T. 0.02 min

Lab File: VX013679.D

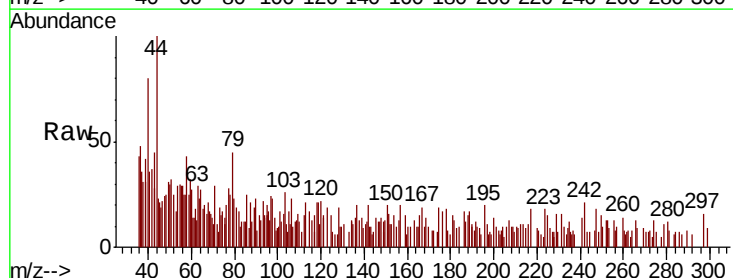
Acq: 28 Nov 2019 02:44

Tgt Ion: 59 Resp: 707

Ion Ratio Lower Upper

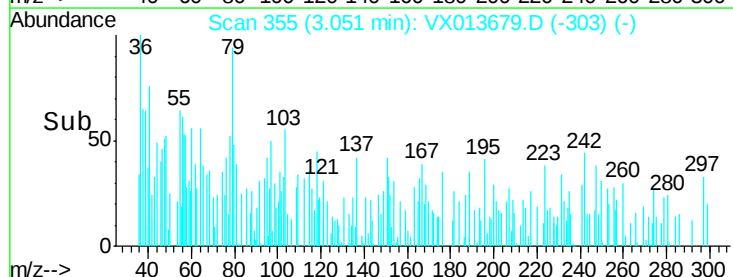
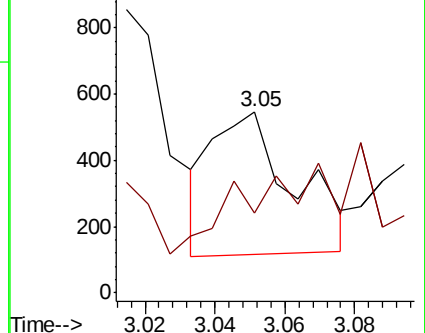
59 100

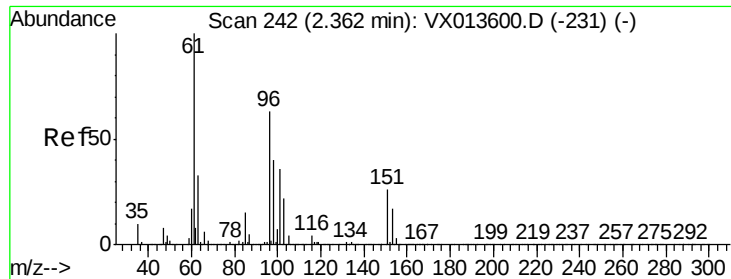
57 68.2 7.8 11.6#



Abundance Ion 59.00 (58.70 to 59.70): VX0

Ion 57.00 (56.70 to 57.70): VX0





#12

1,1-Dichloroethene

Concen: 0.267 ug/l

RT: 2.37 min Scan# 243

Delta R.T. 0.01 min

Lab File: VX013679.D

Acq: 28 Nov 2019 02:44

Instrument :

MSVOA_X

ClientSampled :

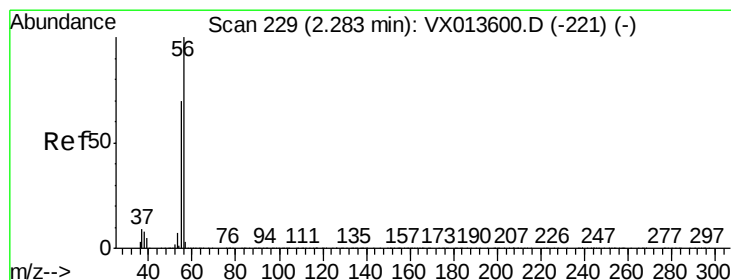
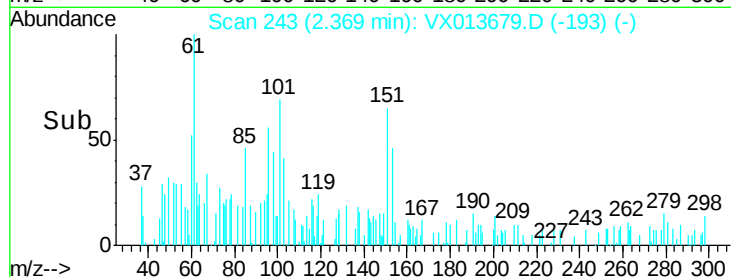
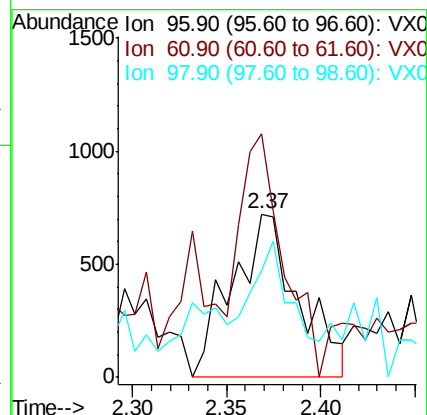
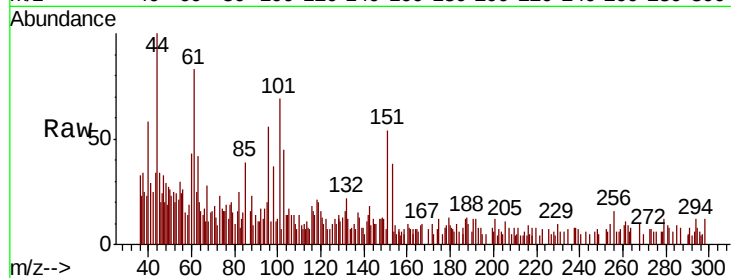
Tot Ion: 96 Resp: 1772

Ion Ratio Lower Upper

96 100

61 168.3 126.6 190.0

98 62.1 50.6 76.0



#13

Acrolein

Concen: 6.344 ug/l

RT: 2.28 min Scan# 229

Delta R.T. 0.00 min

Lab File: VX013679.D

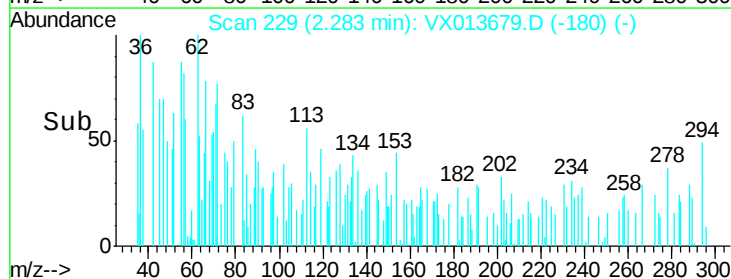
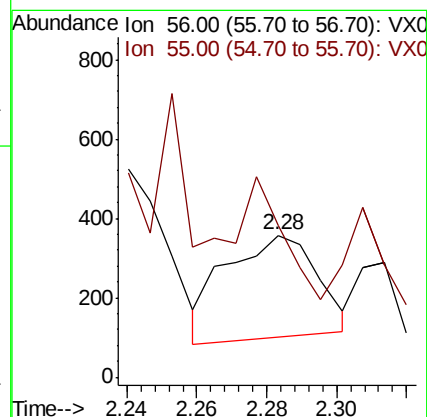
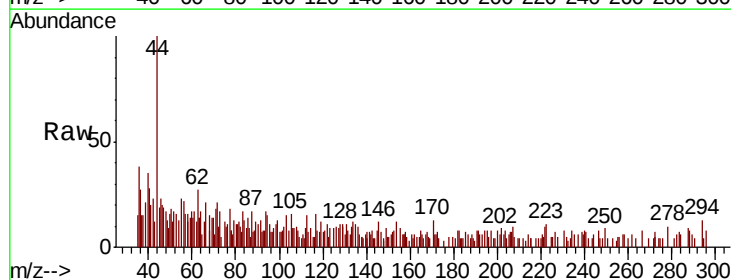
Acq: 28 Nov 2019 02:44

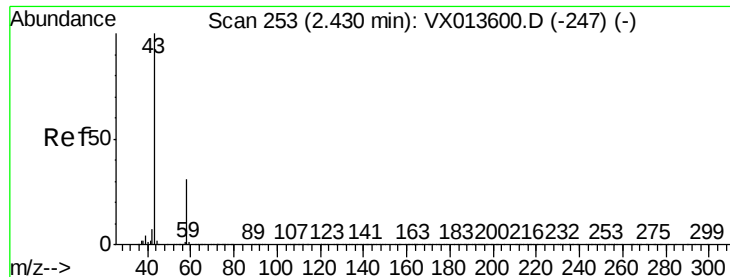
Tgt Ion: 56 Resp: 466

Ion Ratio Lower Upper

56 100

55 45.1 56.2 84.4#





#16

Acetone

Concen: 1.366 ug/l

RT: 2.44 min Scan# 254

Delta R.T. 0.01 min

Lab File: VX013679.D

Acq: 28 Nov 2019 02:44

Instrument :

MSVOA_X

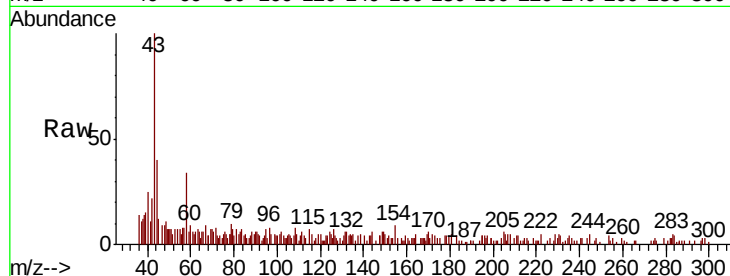
ClientSampleId :

Tot Ion: 43 Resp: 5454

Ion Ratio Lower Upper

43 100

58 28.9 24.6 36.8



Abundance Ion 43.00 (42.70 to 43.70): VX0

Ion 58.00 (57.70 to 58.70): VX0

2.44

4000

3000

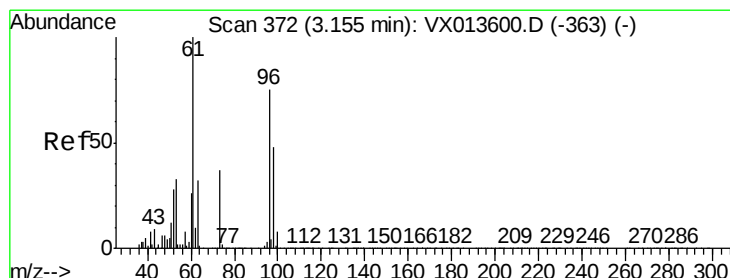
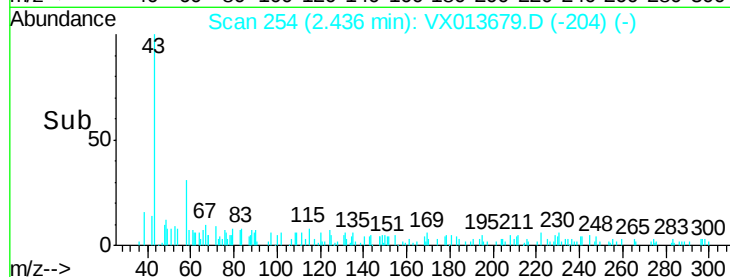
2000

1000

0

Time-->

2.35 2.40 2.45 2.50



#21

trans-1,2-Dichloroethene

Concen: 0.556 ug/l

RT: 3.17 min Scan# 374

Delta R.T. 0.01 min

Lab File: VX013679.D

Acq: 28 Nov 2019 02:44

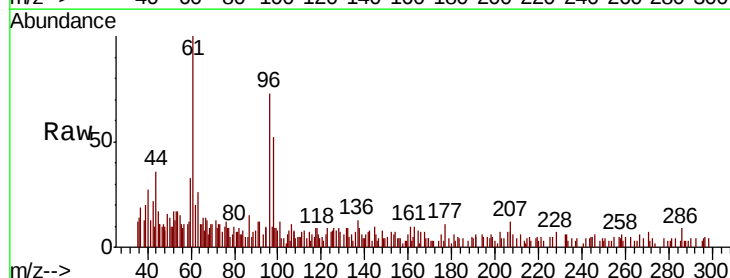
Tgt Ion: 96 Resp: 4015

Ion Ratio Lower Upper

96 100

61 129.0 107.2 160.8

98 65.5 51.4 77.0



Abundance Ion 95.90 (95.60 to 96.60): VX0

Ion 60.90 (60.60 to 61.60): VX0

Ion 97.90 (97.60 to 98.60): VX0

3000

2500

2000

1500

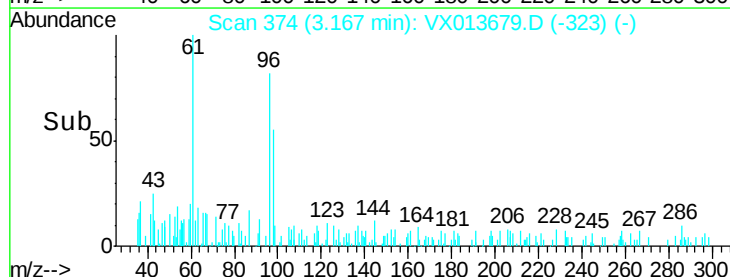
1000

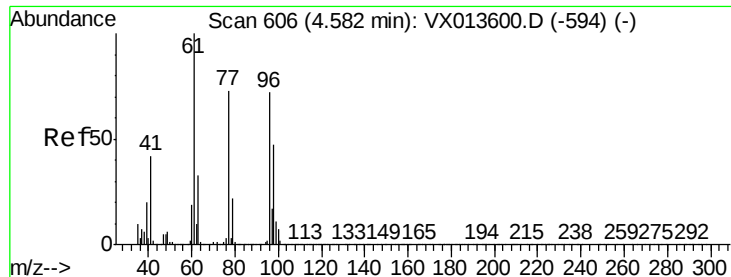
500

0

Time-->

3.10 3.15 3.20



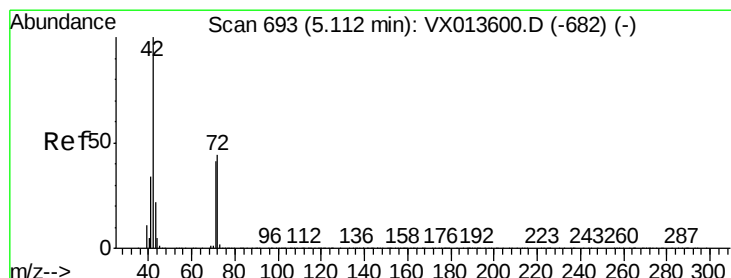
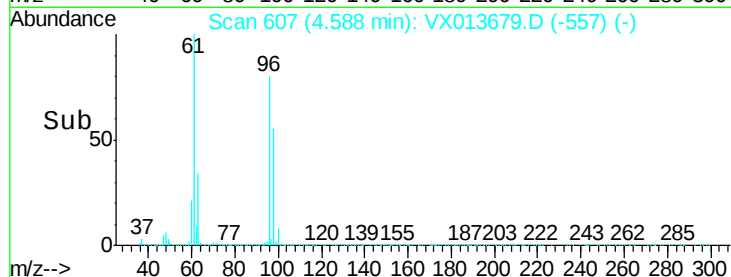
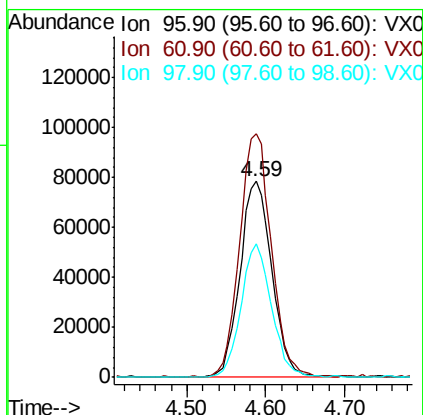
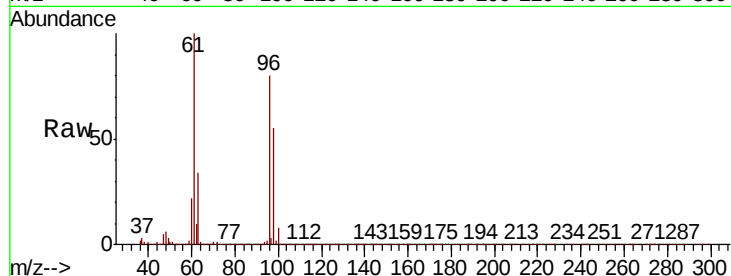


#27

cis-1,2-Dichloroethene
Concen: 26.537 ug/l
RT: 4.59 min Scan# 607
Delta R.T. 0.01 min
Lab File: VX013679.D
Acq: 28 Nov 2019 02:44

Instrument :
MSVOA_X
ClientSampleId :

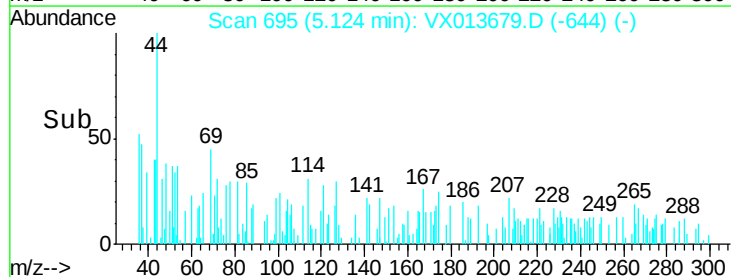
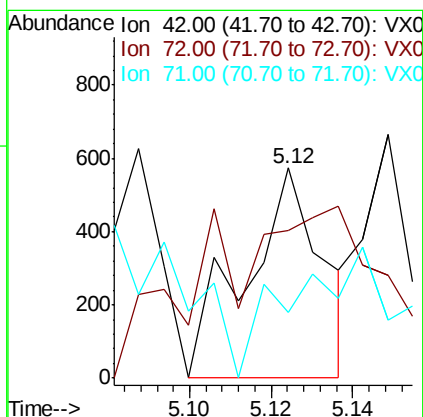
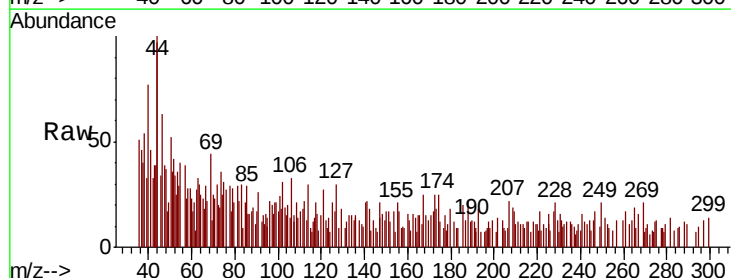
Tot Ion	Ratio	Lower	Upper
96	100		
61	124.9	0.0	286.4
98	64.9	0.0	127.4

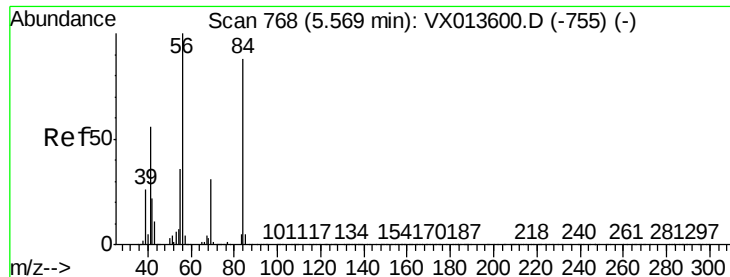


#29

Tetrahydrofuran
Concen: 0.207 ug/l
RT: 5.12 min Scan# 695
Delta R.T. 0.01 min
Lab File: VX013679.D
Acq: 28 Nov 2019 02:44

Tgt Ion	Ratio	Lower	Upper
42	100		
72	61.1	36.3	54.5#
71	0.0	33.2	49.8#





#31

Cyclohexane

Concen: 0.968 ug/l

RT: 5.65 min Scan# 782

Delta R.T. 0.09 min

Lab File: VX013679.D

Acq: 28 Nov 2019 02:44

Instrument :

MSVOA_X

ClientSampled :

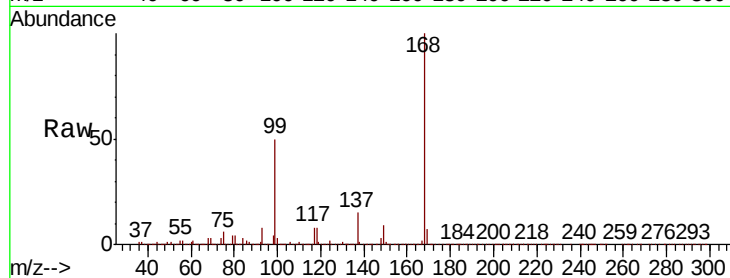
Tot Ion: 56 Resp: 11566

Ion Ratio Lower Upper

56 100

69 151.0 24.6 36.8#

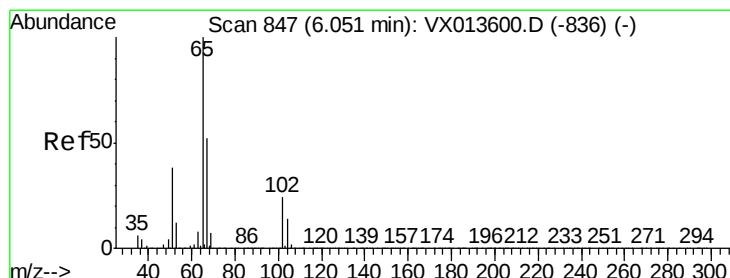
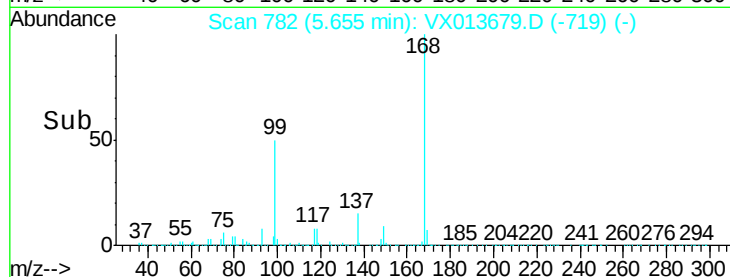
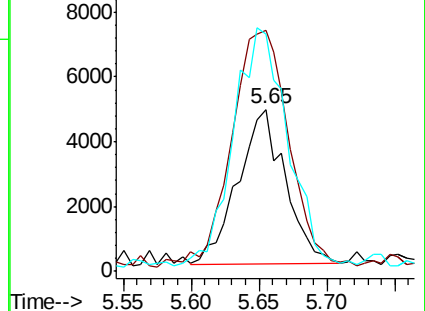
84 148.6 70.0 105.0#



Abundance Ion 56.00 (55.70 to 56.70): VX0

Ion 69.00 (68.70 to 69.70): VX0

Ion 84.00 (83.70 to 84.70): VX0



#33

1,2-Dichloroethane-d4

Concen: 48.328 ug/l

RT: 6.05 min Scan# 847

Delta R.T. 0.00 min

Lab File: VX013679.D

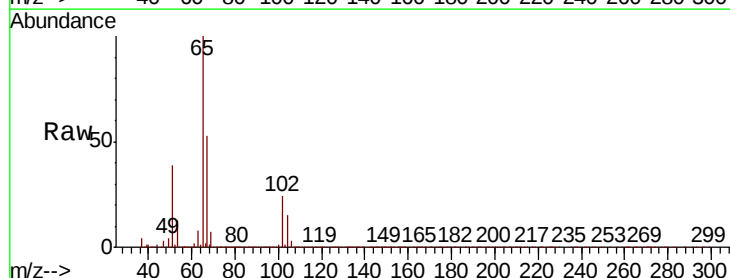
Acq: 28 Nov 2019 02:44

Tgt Ion: 65 Resp: 390815

Ion Ratio Lower Upper

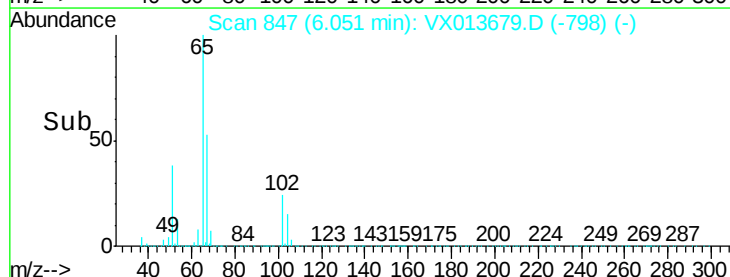
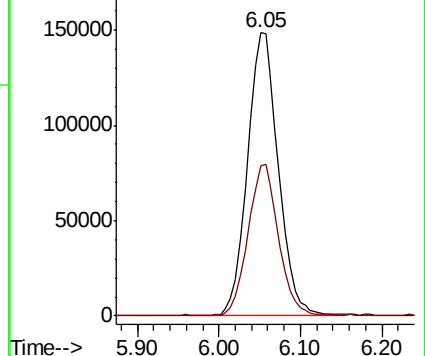
65 100

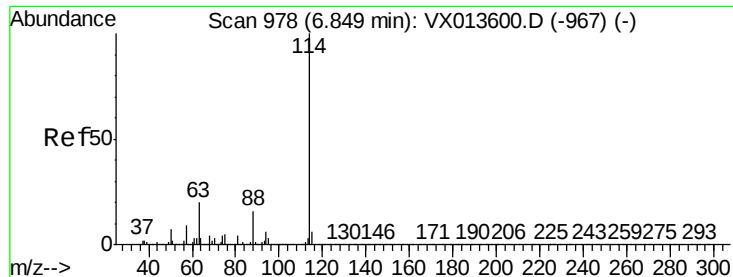
67 52.5 0.0 104.4



Abundance Ion 64.90 (64.60 to 65.60): VX0

Ion 66.90 (66.60 to 67.60): VX0





#34

1,4-Difluorobenzene

Concen: 50.000 ug/l

RT: 6.85 min Scan# 978

Delta R.T. 0.00 min

Lab File: VX013679.D

Acq: 28 Nov 2019 02:44

Instrument :

MSVOA_X

ClientSampleId :

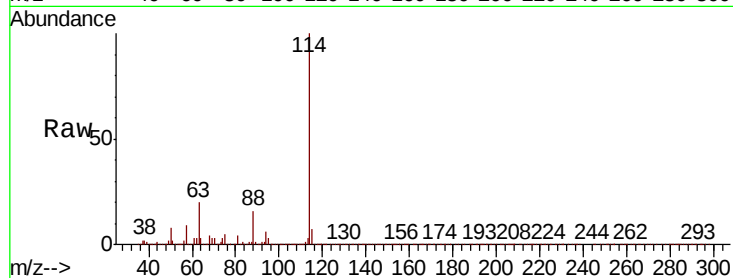
Tot Ion:114 Resp: 1086742

Ion Ratio Lower Upper

114 100

63 19.9 0.0 39.6

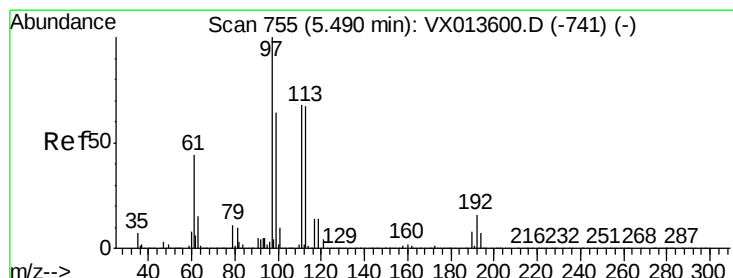
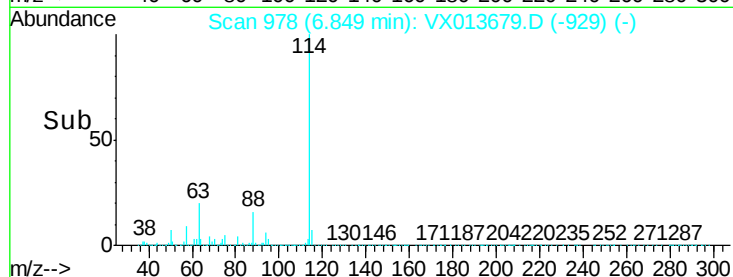
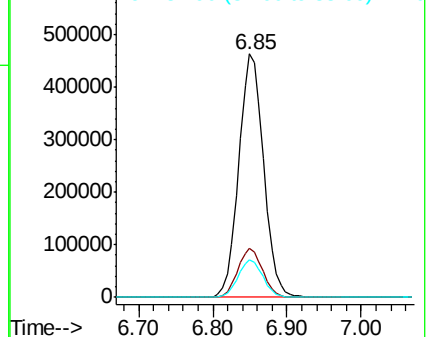
88 15.5 0.0 31.4



Abundance Ion 113.90 (113.60 to 114.60): V

Ion 63.00 (62.70 to 63.70): VX0

Ion 87.90 (87.60 to 88.60): VX0



#35

Dibromofluoromethane

Concen: 47.537 ug/l

RT: 5.48 min Scan# 754

Delta R.T. -0.01 min

Lab File: VX013679.D

Acq: 28 Nov 2019 02:44

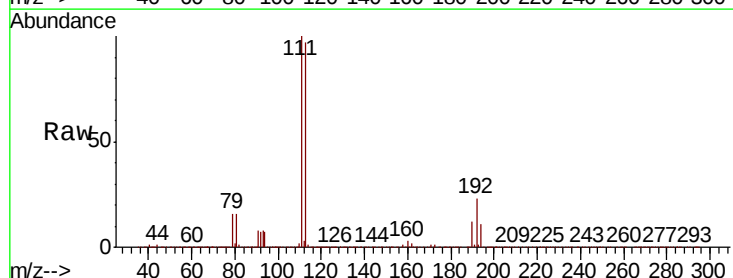
Tgt Ion:113 Resp: 319371

Ion Ratio Lower Upper

113 100

111 103.7 83.6 125.4

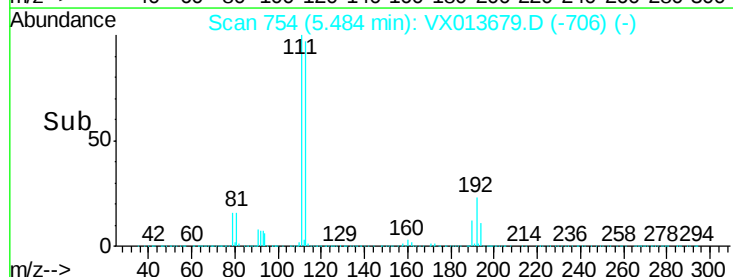
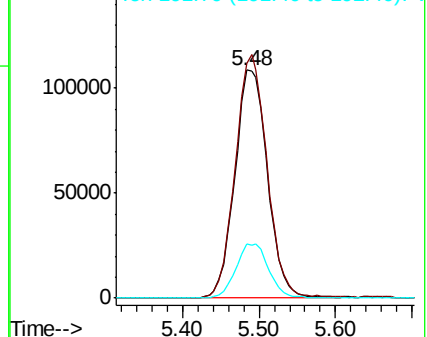
192 24.0 19.2 28.8

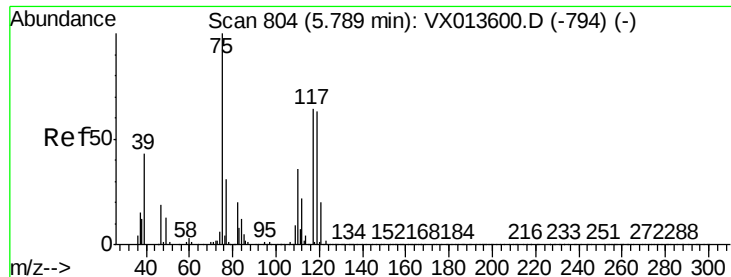


Abundance Ion 112.80 (112.50 to 113.50): V

Ion 110.80 (110.50 to 111.50): V

Ion 191.70 (191.40 to 192.40): V

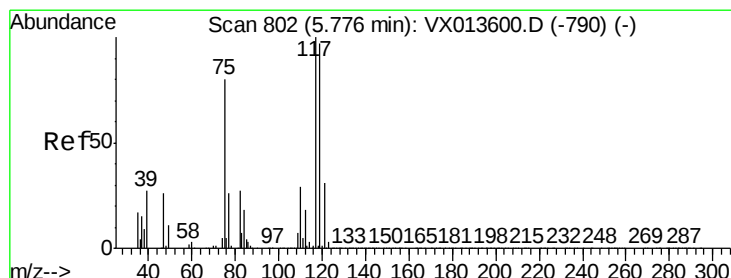
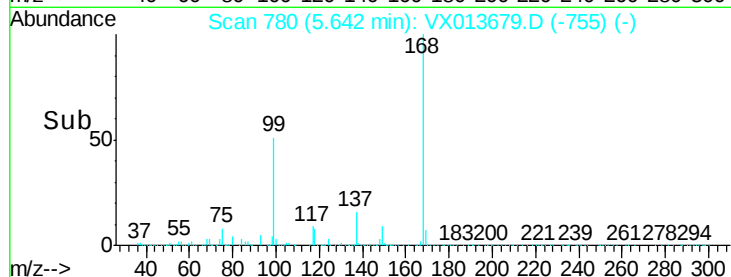
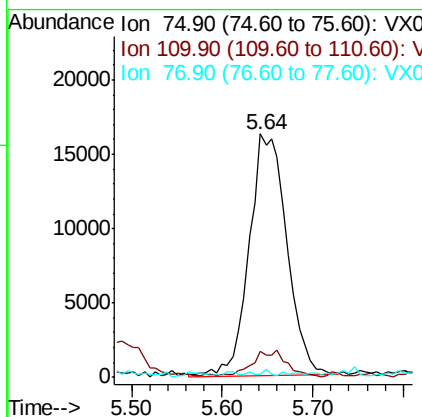
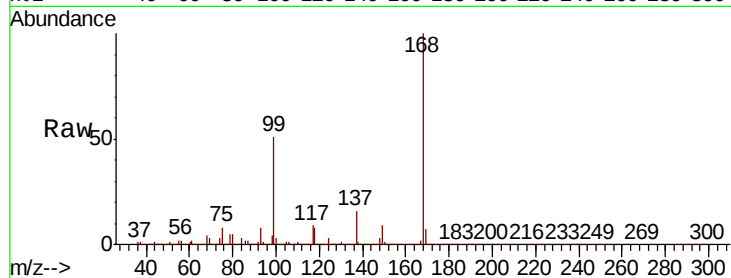




#36
 1,1-Dichloropropene
 Concen: 4.728 ug/l
 RT: 5.64 min Scan# 780
 Delta R.T. -0.15 min
 Lab File: VX013679.D
 Acq: 28 Nov 2019 02:44

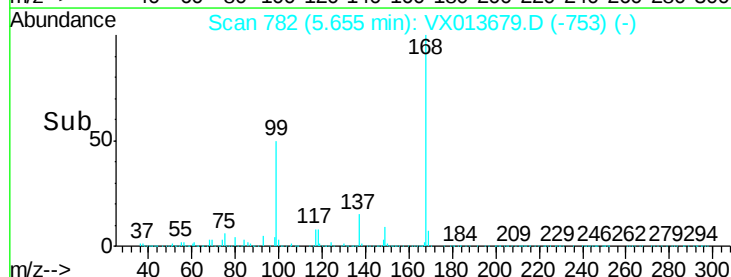
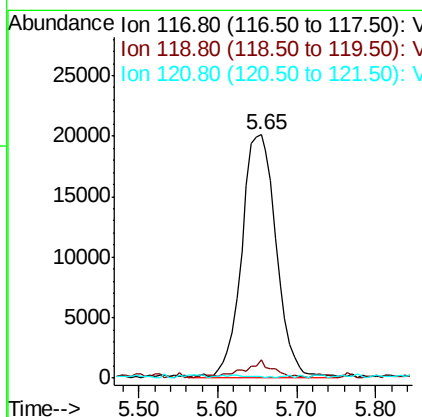
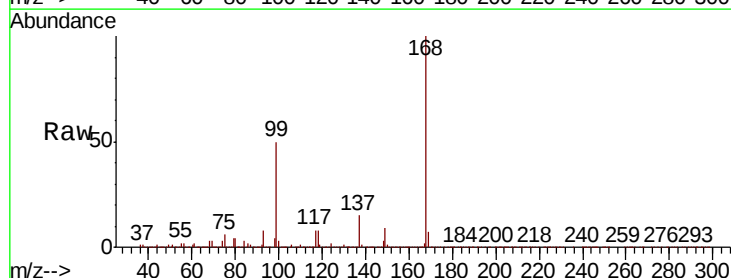
Instrument :
 MSVOA_X
 ClientSampleId :

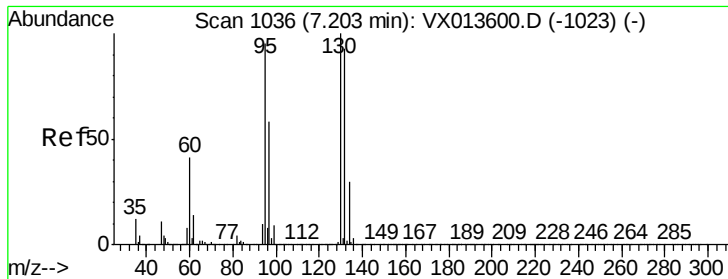
Tot Ion	Ratio	Lower	Upper
75	100		
110	0.0	18.1	54.1#
77	0.5	24.5	36.7#



#38
 Carbon Tetrachloride
 Concen: 6.678 ug/l
 RT: 5.65 min Scan# 782
 Delta R.T. -0.12 min
 Lab File: VX013679.D
 Acq: 28 Nov 2019 02:44

Tgt Ion	Ratio	Lower	Upper
117	100		
119	7.0	77.5	116.3#
121	0.2	25.0	37.6#





#44

Trichloroethene

Concen: 43.990 ug/l

RT: 7.21 min Scan# 1037

Delta R.T. 0.01 min

Lab File: VX013679.D

Acq: 28 Nov 2019 02:44

Instrument :

MSVOA_X

ClientSampled :

Tot Ion:130 Resp: 362731

Ion Ratio Lower Upper

130 100

95 95.8 0.0 190.8



Abundance Ion 129.80 (129.50 to 130.50): V

Ion 94.90 (94.60 to 95.60): VX0

7.21

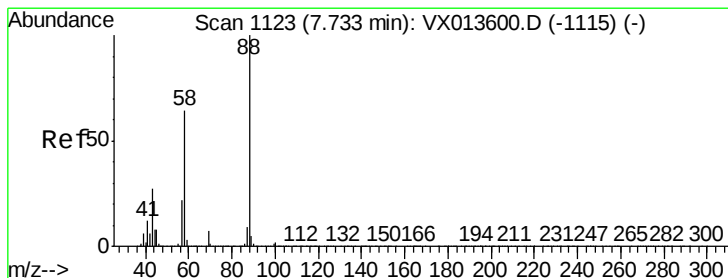
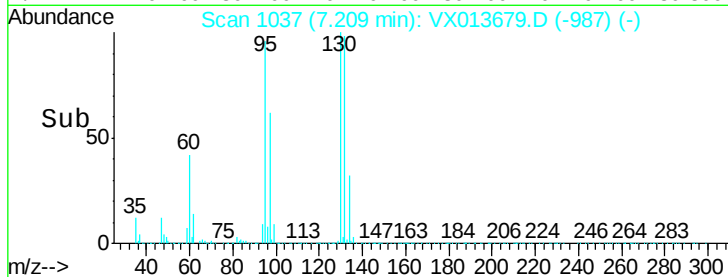
150000

100000

50000

0

Time-->



#49

1,4-Dioxane

Concen: 2.866 ug/l

RT: 7.74 min Scan# 1124

Delta R.T. 0.01 min

Lab File: VX013679.D

Acq: 28 Nov 2019 02:44

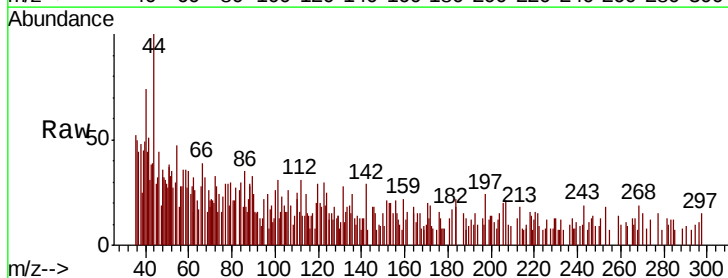
Tgt Ion: 88 Resp: 568

Ion Ratio Lower Upper

88 100

43 0.0 25.8 38.6#

58 0.0 54.6 82.0#



Abundance Ion 88.00 (87.70 to 88.70): VX0

Ion 43.00 (42.70 to 43.70): VX0

Ion 58.00 (57.70 to 58.70): VX0

800

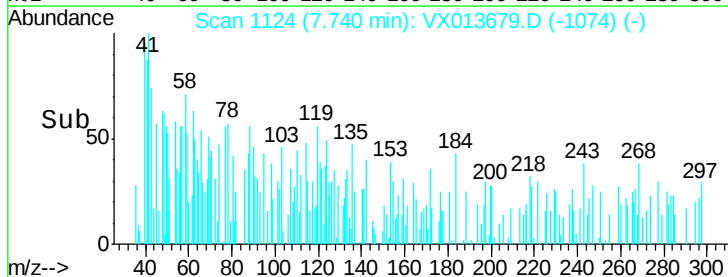
600

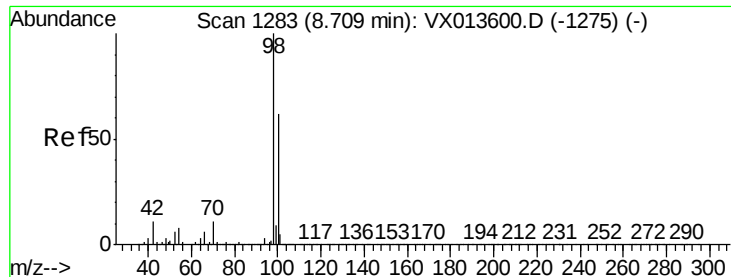
400

200

0

Time-->

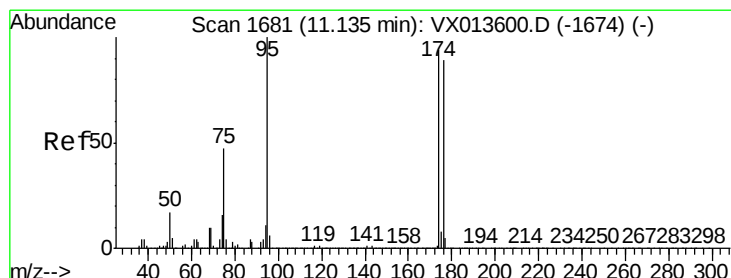
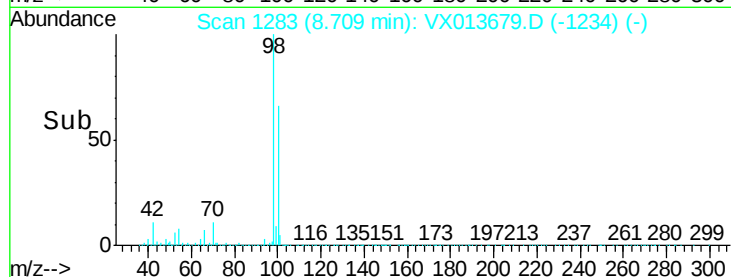
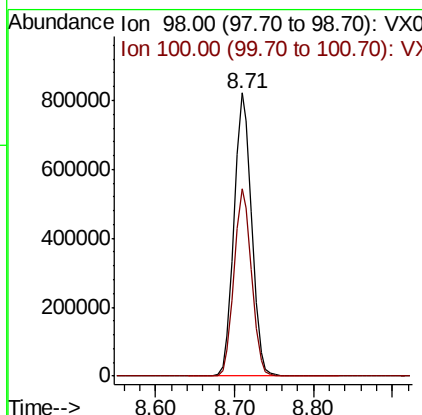
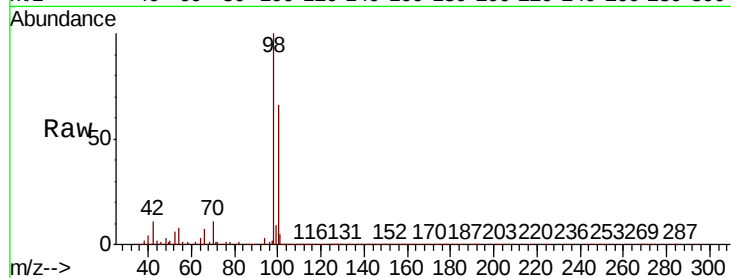




#50
Toluene-d8
Concen: 48.782 ug/l
RT: 8.71 min Scan# 1283
Delta R.T. 0.00 min
Lab File: VX013679.D
Acq: 28 Nov 2019 02:44

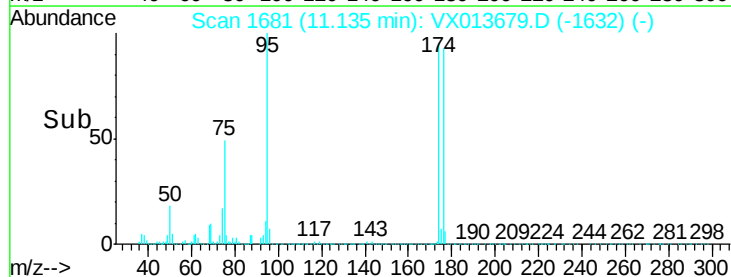
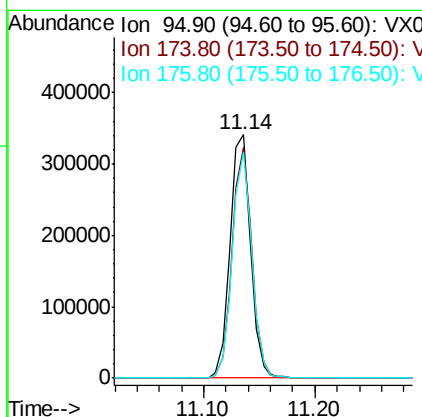
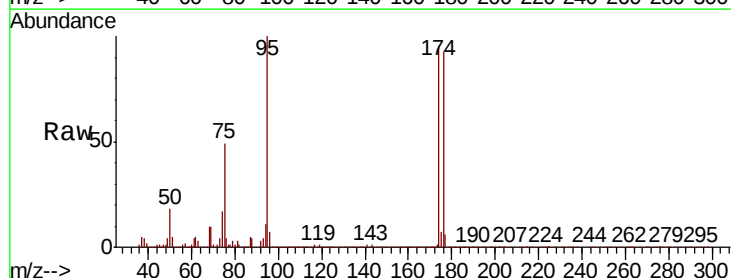
Instrument :
MSVOA_X
ClientSampleId :

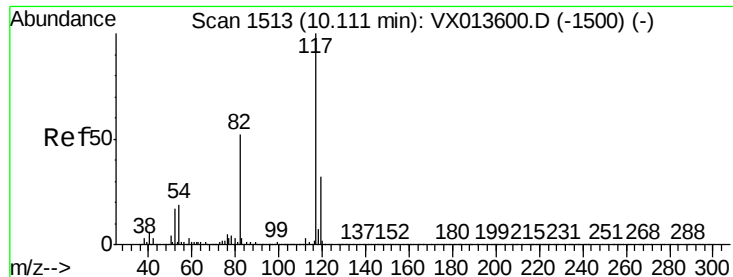
Tot Ion: 98 Resp: 1276895
Ion Ratio Lower Upper
98 100
100 65.7 53.1 79.7



#62
4-Bromofluorobenzene
Concen: 46.076 ug/l
RT: 11.14 min Scan# 1681
Delta R.T. 0.00 min
Lab File: VX013679.D
Acq: 28 Nov 2019 02:44

Tgt Ion: 95 Resp: 434913
Ion Ratio Lower Upper
95 100
174 91.5 0.0 180.0
176 88.9 0.0 173.6





#63

Chlorobenzene-d5

Concen: 50.000 ug/l

RT: 10.11 min Scan# 1513

Delta R.T. 0.00 min

Lab File: VX013679.D

Acq: 28 Nov 2019 02:44

Instrument :

MSVOA_X

ClientSampleId :

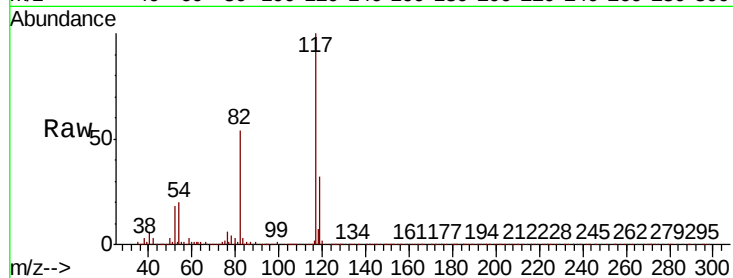
Tot Ion:117 Resp: 966809

Ion Ratio Lower Upper

117 100

82 53.6 41.8 62.8

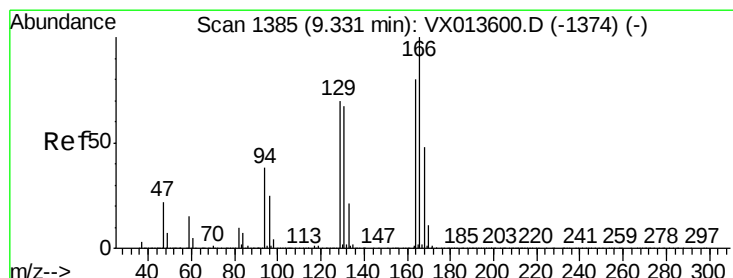
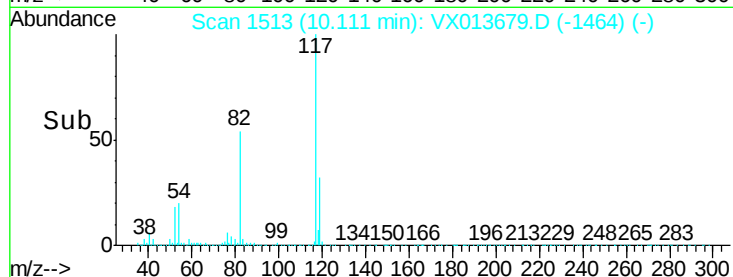
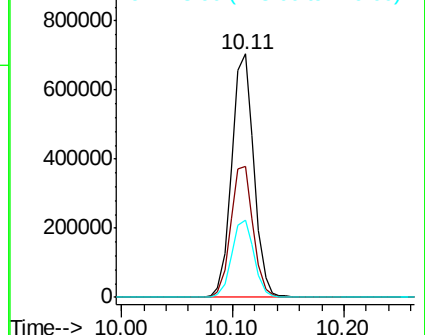
119 31.5 25.8 38.8



Abundance Ion 116.90 (116.60 to 117.60): V

Ion 82.00 (81.70 to 82.70): VX0

Ion 118.90 (118.60 to 119.60): V



#64

Tetrachloroethene

Concen: 0.218 ug/l

RT: 9.34 min Scan# 1386

Delta R.T. 0.01 min

Lab File: VX013679.D

Acq: 28 Nov 2019 02:44

Tgt Ion:164 Resp: 1572

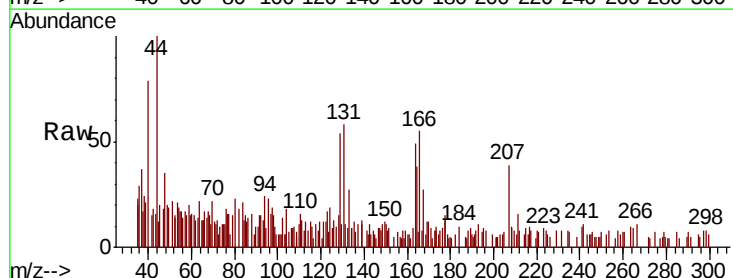
Ion Ratio Lower Upper

164 100

166 52.1 99.7 149.5#

129 67.2 70.1 105.1#

131 71.6 66.9 100.3

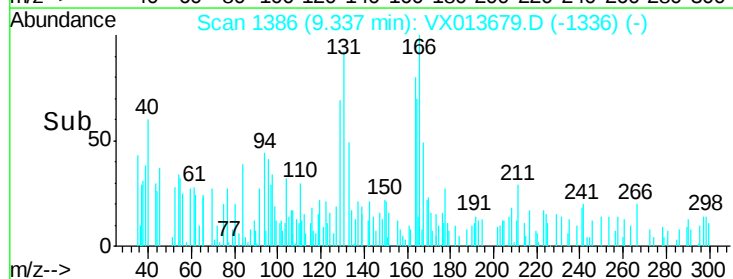
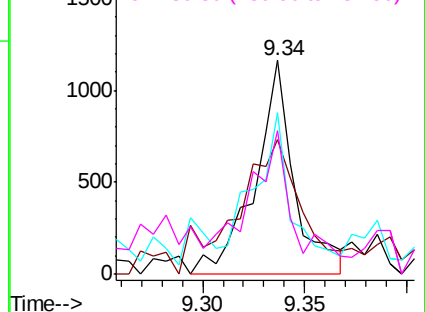


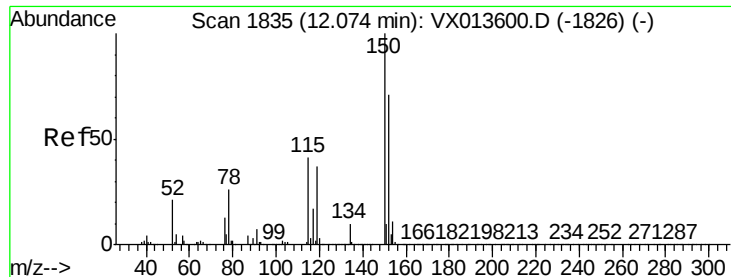
Abundance Ion 163.80 (163.50 to 164.50): V

Ion 165.80 (165.50 to 166.50): V

Ion 128.80 (128.50 to 129.50): V

Ion 130.80 (130.50 to 131.50): V



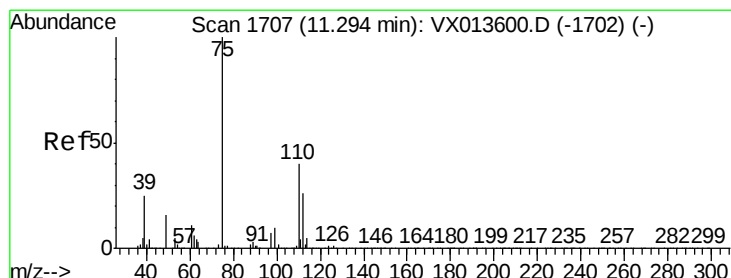
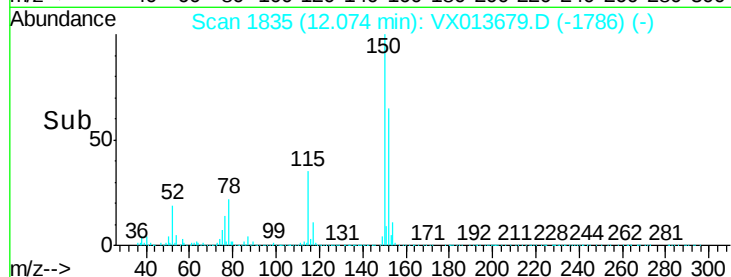
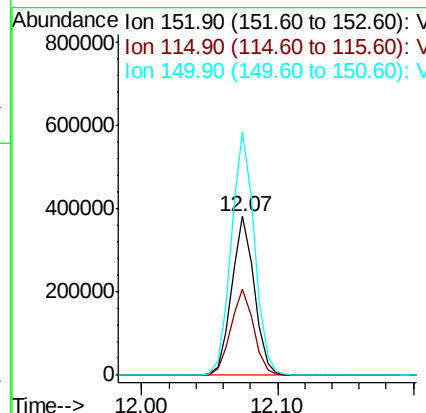
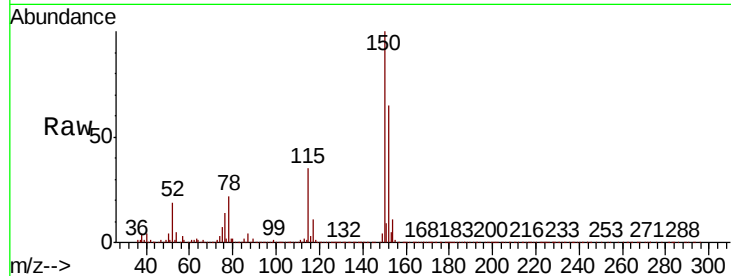


#72

1,4-Dichlorobenzene-d4
Concen: 50.000 ug/l
RT: 12.07 min Scan# 1835
Delta R.T. 0.00 min
Lab File: VX013679.D
Acq: 28 Nov 2019 02:44

Instrument :
MSVOA_X
ClientSampleId :

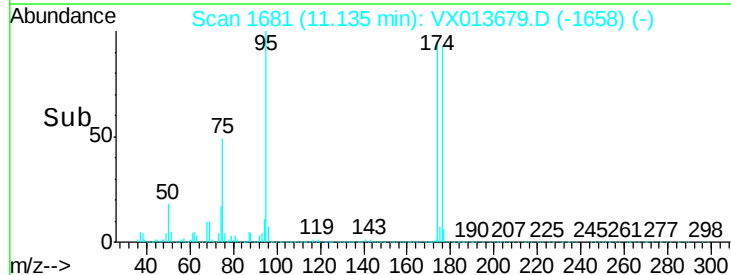
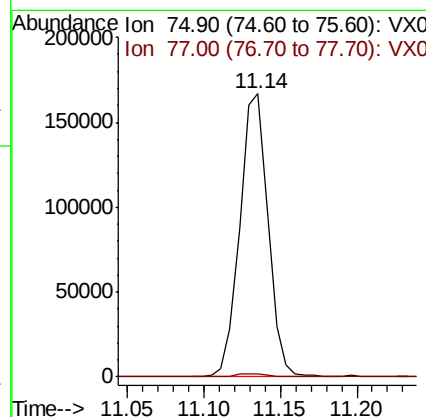
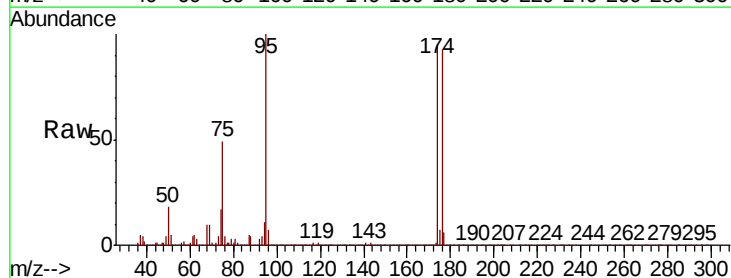
Tot Ion	Ratio	Lower	Upper
152	100		
115	55.2	38.4	115.1
150	156.5	0.0	346.8

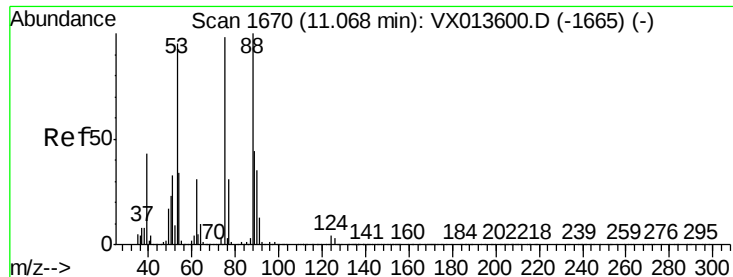


#76

1,2,3-Trichloropropane
Concen: 21.488 ug/l
RT: 11.14 min Scan# 1681
Delta R.T. -0.16 min
Lab File: VX013679.D
Acq: 28 Nov 2019 02:44

Tgt Ion	Ratio	Lower	Upper
75	100		
77	1.4	19.1	57.5#





#81

trans-1,4-Dichloro-2-butene

Concen: 58.788 ug/l

RT: 11.14 min Scan# 1681

Delta R.T. 0.07 min

Lab File: VX013679.D

Acq: 28 Nov 2019 02:44

Instrument :

MSVOA_X

ClientSampleId :

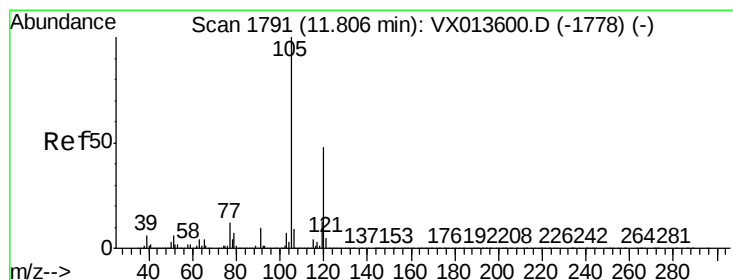
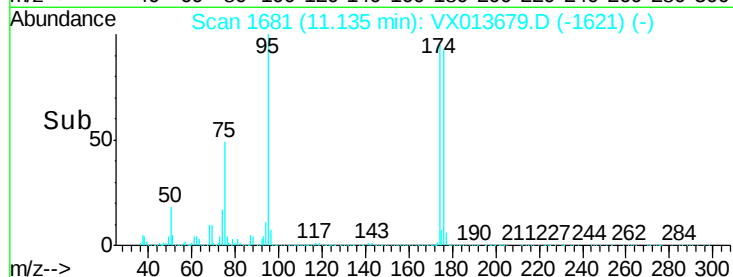
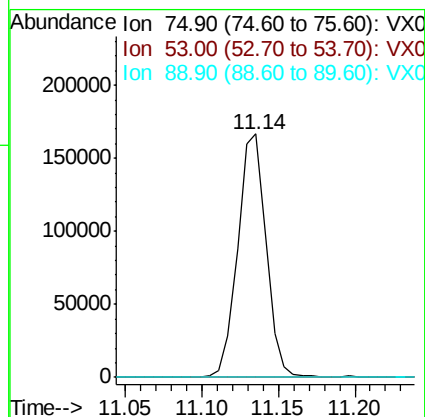
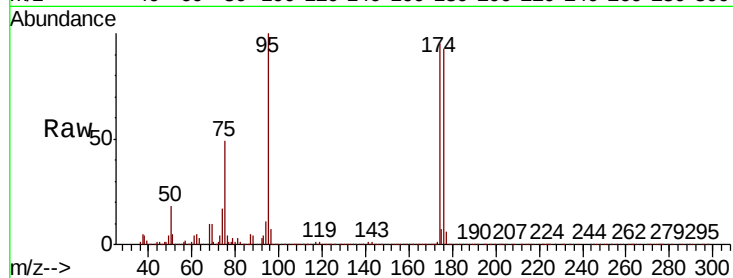
Tot Ion: 75 Resp: 213214

Ion Ratio Lower Upper

75 100

53 0.1 78.2 117.2#

89 0.2 35.4 53.2#



#84

1,2,4-Trimethylbenzene

Concen: 0.232 ug/l

RT: 11.80 min Scan# 1790

Delta R.T. -0.01 min

Lab File: VX013679.D

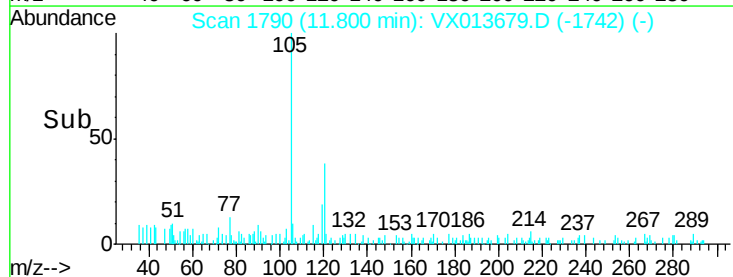
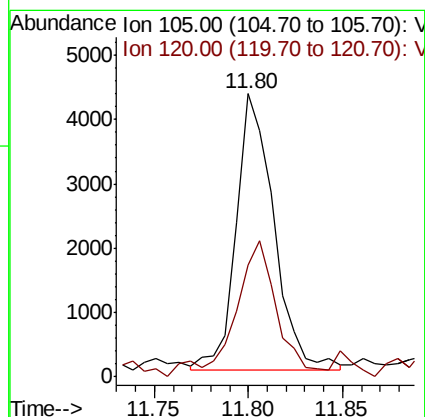
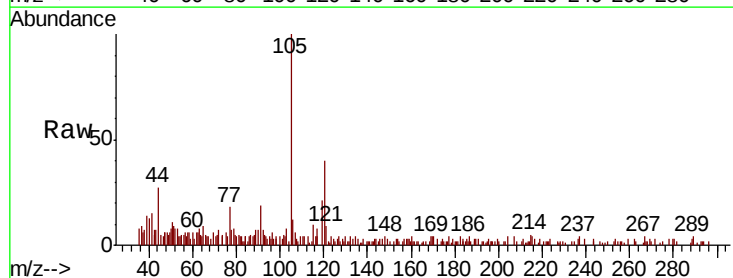
Acq: 28 Nov 2019 02:44

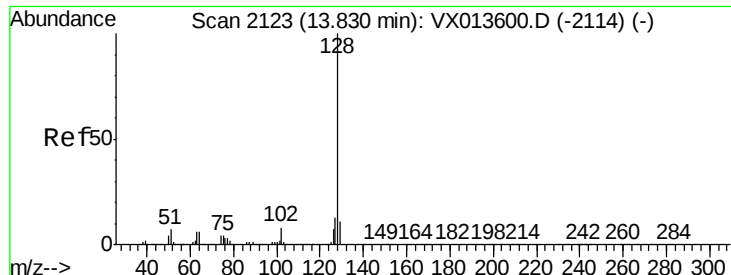
Tgt Ion:105 Resp: 5984

Ion Ratio Lower Upper

105 100

120 55.8 23.1 69.3

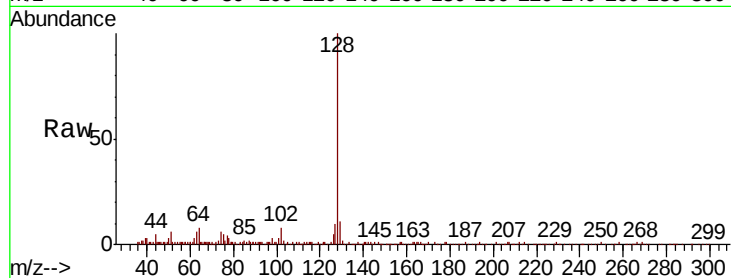




#95
Naphthalene
Concen: 1.270 ug/l
RT: 13.83 min Scan# 2123
Delta R.T. 0.00 min
Lab File: VX013679.D
Acq: 28 Nov 2019 02:44

Instrument :
MSVOA_X
ClientSampleId :

Tot Ion:128 Resp: 37941
Ion Ratio Lower Upper
128 100
127 14.7 10.3 15.5
129 10.4 8.7 13.1



Abundance Ion 128.00 (127.70 to 128.70): V
Ion 127.00 (126.70 to 127.70): V
Ion 129.00 (128.70 to 129.70): V

