

Data Path : Z:\VOASRV\HPCHEM1\MSVOA X\DATA\VX123019\  
 Data File : VX014357.D  
 Acq On : 30 Dec 2019 16:33  
 Operator : JC/SP  
 Sample : K6431-15  
 Misc : 5.0mL/MSVOA X/WATER  
 ALS Vial : 16 Sample Multiplier: 1

Instrument :  
 MSVOA\_X  
 ClientSampleId :  
 GW-1

Quant Time: Dec 31 01:20:08 2019  
 Quant Method : Z:\VOASRV\HPCHEM1\MSVOA\_X\METHOD\82X121319W.M  
 Quant Title : SW846 8260  
 QLast Update : Tue Dec 17 03:01:07 2019  
 Response via : Initial Calibration

| Internal Standards         | R.T.  | QIon | Response | Conc  | Units | Dev(Min) |
|----------------------------|-------|------|----------|-------|-------|----------|
| 1) Pentafluorobenzene      | 5.65  | 168  | 520606   | 50.00 | ug/l  | 0.00     |
| 34) 1,4-Difluorobenzene    | 6.85  | 114  | 810380   | 50.00 | ug/l  | 0.00     |
| 63) Chlorobenzene-d5       | 10.11 | 117  | 723670   | 50.00 | ug/l  | 0.00     |
| 72) 1,4-Dichlorobenzene-d4 | 12.07 | 152  | 317507   | 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   | 292800   | 49.62 | ug/l    | 0.00     |
| Spiked Amount               |       |      | Recovery | =     | 99.24%  |          |
| 35) Dibromofluoromethane    | 5.49  | 113  | 242145   | 49.15 | ug/l    | 0.00     |
| Spiked Amount               |       |      | Recovery | =     | 98.30%  |          |
| 50) Toluene-d8              | 8.71  | 98   | 963084   | 50.22 | ug/l    | 0.00     |
| Spiked Amount               |       |      | Recovery | =     | 100.44% |          |
| 62) 4-Bromofluorobenzene    | 11.14 | 95   | 320568   | 45.73 | ug/l    | 0.00     |
| Spiked Amount               |       |      | Recovery | =     | 91.46%  |          |

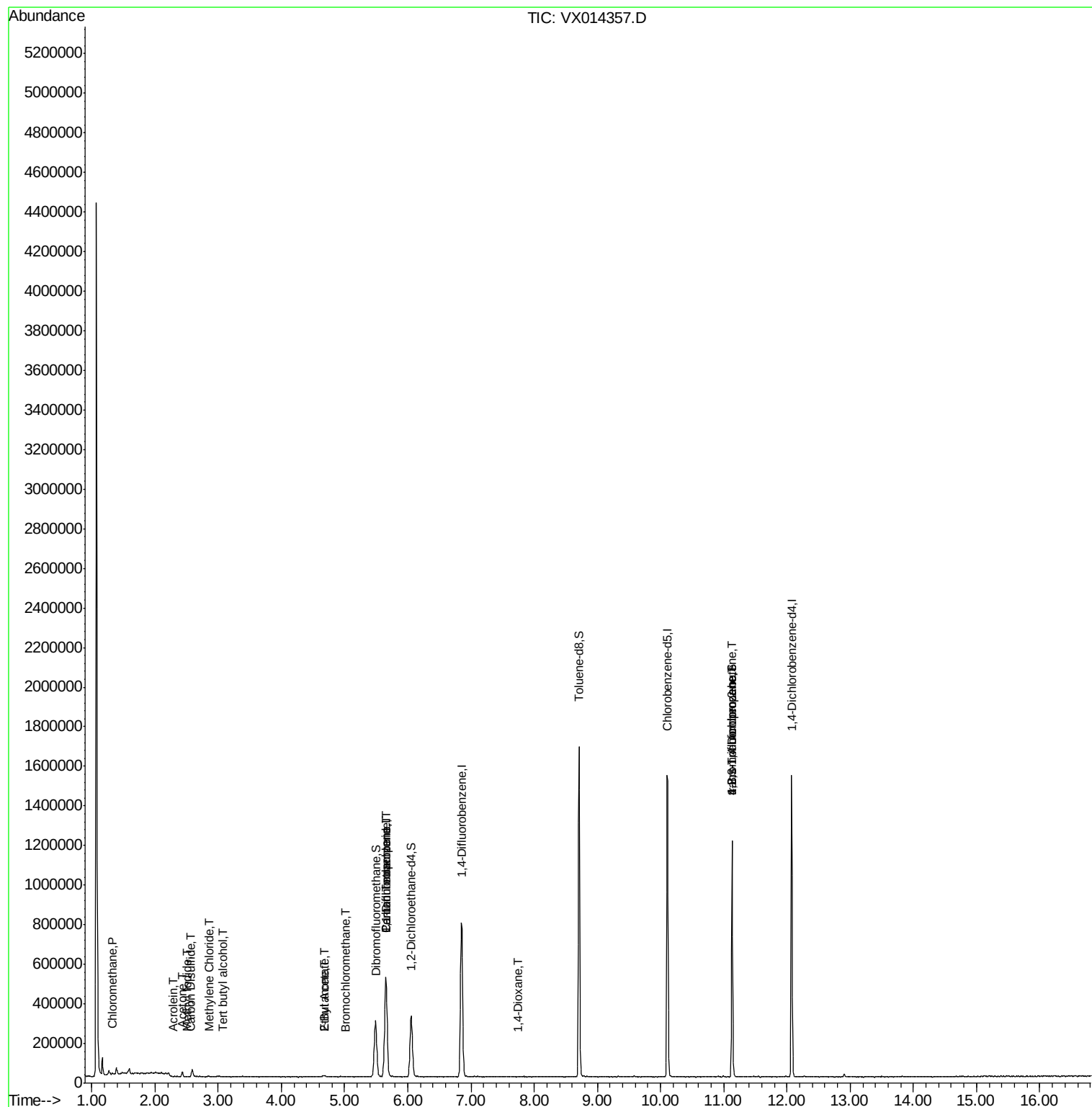
| Target Compounds               | R.T.  | QIon | Response | Conc   | Units  | Qvalue |
|--------------------------------|-------|------|----------|--------|--------|--------|
| 3) Chloromethane               | 1.32  | 50   | 3839     | 0.614  | ug/l   | 93     |
| 10) Methyl Iodide              | 2.51  | 142  | 1003     | 2.767  | ug/l # | 89     |
| 11) Tert butyl alcohol         | 3.06  | 59   | 342      | 0.268  | ug/l # | 1      |
| 13) Acrolein                   | 2.30  | 56   | 512      | 0.702  | ug/l # | 14     |
| 16) Acetone                    | 2.43  | 43   | 24311    | 6.347  | ug/l   | 96     |
| 17) Carbon Disulfide           | 2.56  | 76   | 2076     | 0.897  | ug/l # | 78     |
| 20) Methylene Chloride         | 2.85  | 84   | 2533     | 0.420  | ug/l # | 57     |
| 25) 2-Butanone                 | 4.68  | 43   | 2360     | 0.500  | ug/l # | 73     |
| 28) Bromochloromethane         | 5.01  | 49   | 393      | 0.556  | ug/l # | 37     |
| 36) 1,1-Dichloropropene        | 5.65  | 75   | 35208    | 4.735  | ug/l # | 52     |
| 37) Ethyl Acetate              | 4.68  | 43   | 2360     | 0.287  | ug/l   | 97     |
| 38) Carbon Tetrachloride       | 5.65  | 117  | 45925    | 6.780  | ug/l # | 16     |
| 49) 1,4-Dioxane                | 7.75  | 88   | 214      | 1.580  | ug/l # | 23     |
| 76) 1,2,3-Trichloropropane     | 11.13 | 75   | 155229   | 22.520 | ug/l # | 40     |
| 81) trans-1,4-Dichloro-2-buten | 11.13 | 75   | 155229   | 63.562 | ug/l # | 12     |

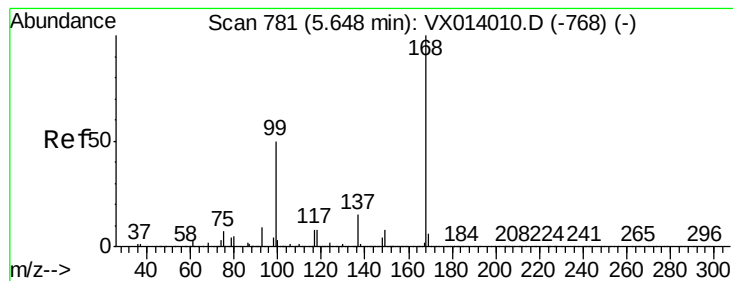
(#) = qualifier out of range (m) = manual integration (+) = signals summed

Data Path : Z:\V0ASRV\HPCHEM1\MSVOA X\DATA\VX123019\  
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ALS Vial : 16 Sample Multiplier: 1

Instrument :  
MSVOA\_X  
ClientSampleId :  
GW-1

Quant Time: Dec 31 01:20:08 2019  
Quant Method : Z:\V0ASRV\HPCHEM1\MSVOA\_X\METHOD\82X121319W.M  
Quant Title : SW846 8260  
QLast Update : Tue Dec 17 03:01:07 2019  
Response via : Initial Calibration





#1

Pentafluorobenzene

Concen: 50.000 ug/l

RT: 5.65 min Scan# 782

Delta R.T. 0.01 min

Lab File: VX014357.D

Acq: 30 Dec 2019 16:33

Instrument :

MSVOA\_X

ClientSampled :

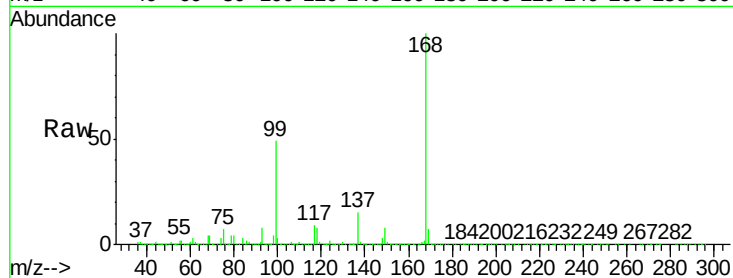
GW-1

Tot Ion:168 Resp: 520606

Ion Ratio Lower Upper

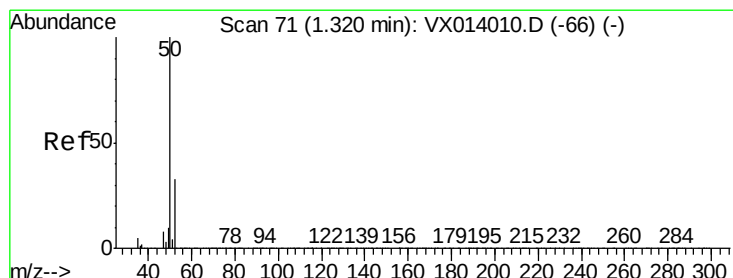
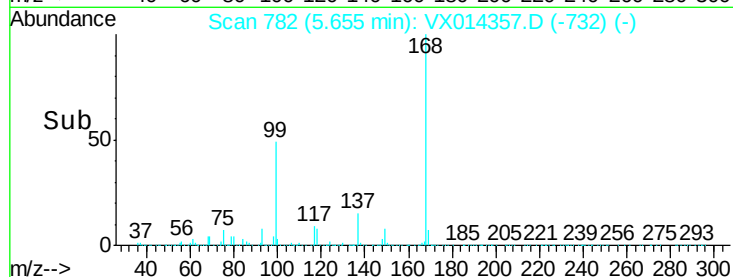
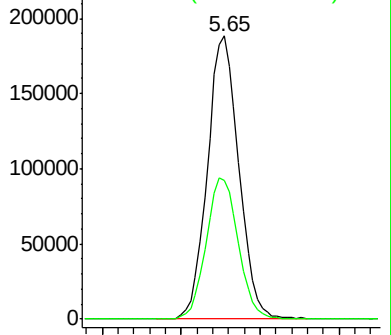
168 100

99 48.7 40.3 60.5



Abundance Ion 167.90 (167.60 to 168.60): V

Ion 98.90 (98.60 to 99.60): VX0



#3

Chloromethane

Concen: 0.614 ug/l

RT: 1.32 min Scan# 71

Delta R.T. 0.00 min

Lab File: VX014357.D

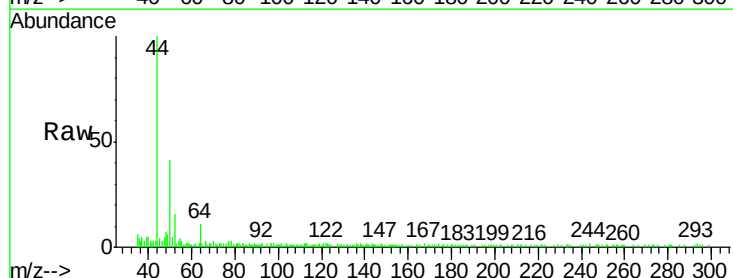
Acq: 30 Dec 2019 16:33

Tgt Ion: 50 Resp: 3839

Ion Ratio Lower Upper

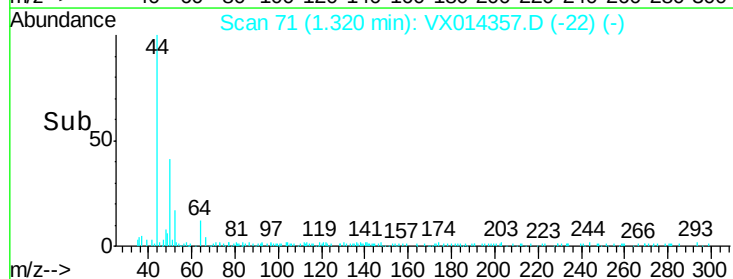
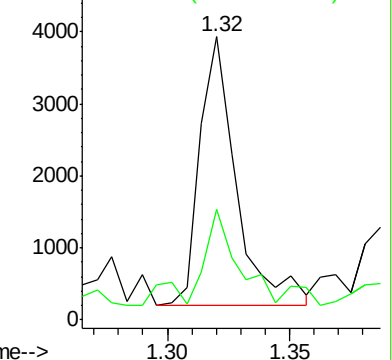
50 100

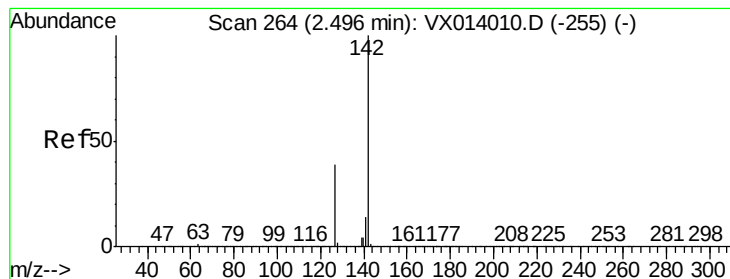
52 29.0 26.2 39.4



Abundance Ion 49.90 (49.60 to 50.60): VX0

Ion 51.90 (51.60 to 52.60): VX0





#10

Methvl Iodide

Concen: 2.767 ug/l

RT: 2.51 min Scan# 266

Delta R.T. 0.01 min

Lab File: VX014357.D

Acq: 30 Dec 2019 16:33

Instrument :

MSVOA\_X

ClientSampled :

GW-1

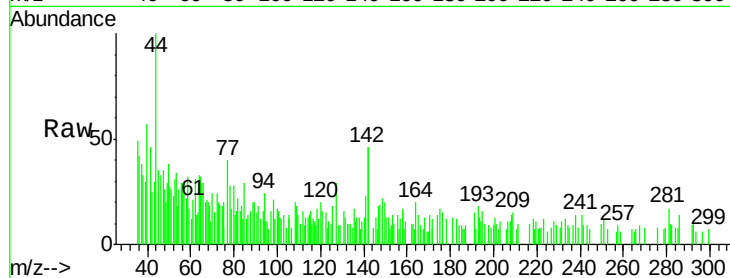
Tot Ion:142 Resp: 1003

Ion Ratio Lower Upper

142 100

127 31.3 31.6 47.4#

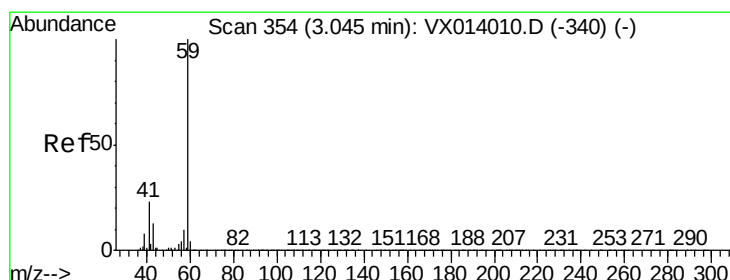
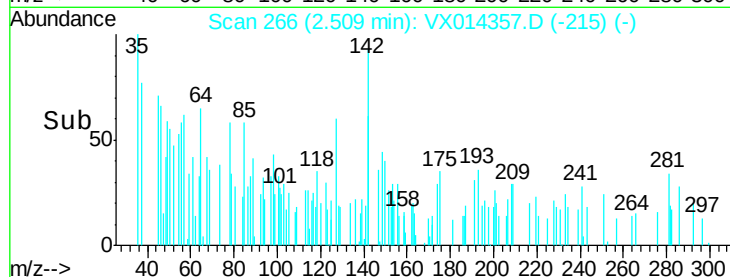
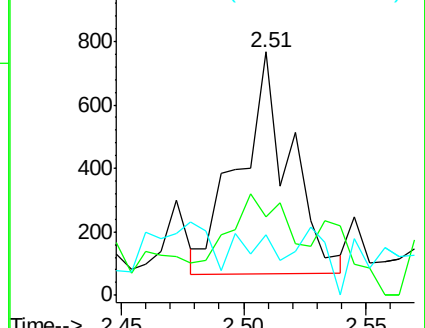
141 11.9 11.6 17.4



Abundance Ion 141.80 (141.50 to 142.50): V

Ion 126.80 (126.50 to 127.50): V

Ion 140.80 (140.50 to 141.50): V



#11

Tert butyl alcohol

Concen: 0.268 ug/l

RT: 3.06 min Scan# 357

Delta R.T. 0.02 min

Lab File: VX014357.D

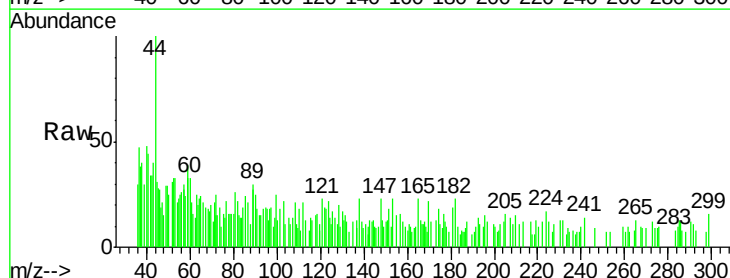
Acq: 30 Dec 2019 16:33

Tgt Ion: 59 Resp: 342

Ion Ratio Lower Upper

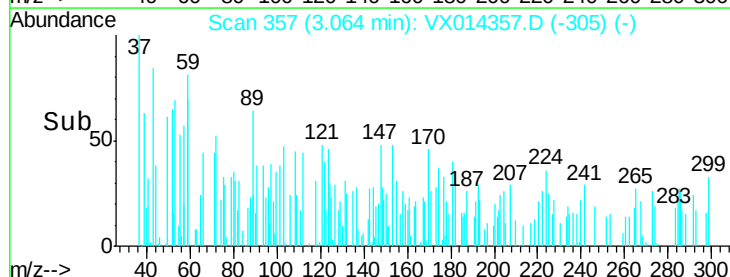
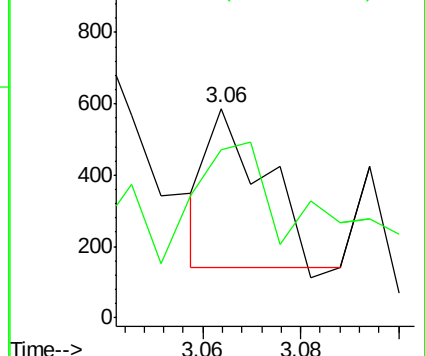
59 100

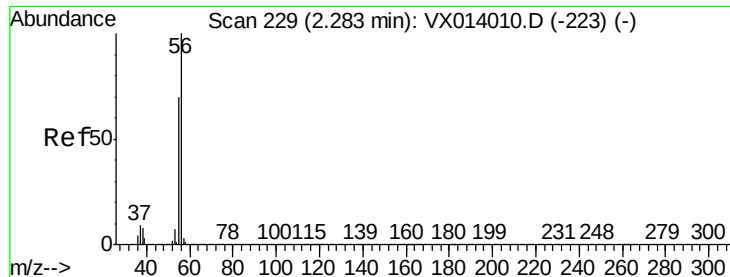
57 152.9 8.4 12.6#



Abundance Ion 59.00 (58.70 to 59.70): VX0

Ion 57.00 (56.70 to 57.70): VX0





#13

Acrolein

Concen: 0.702 ug/l

RT: 2.30 min Scan# 231

Delta R.T. 0.01 min

Lab File: VX014357.D

Acq: 30 Dec 2019 16:33

Instrument :

MSVOA\_X

ClientSampled :

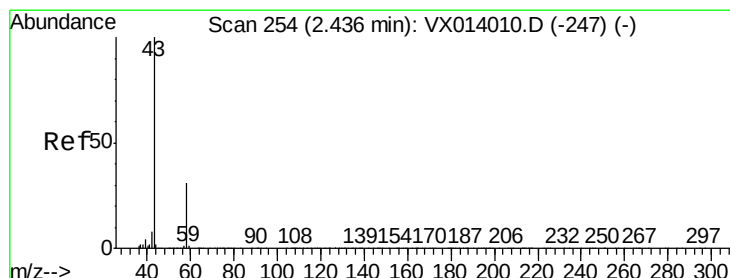
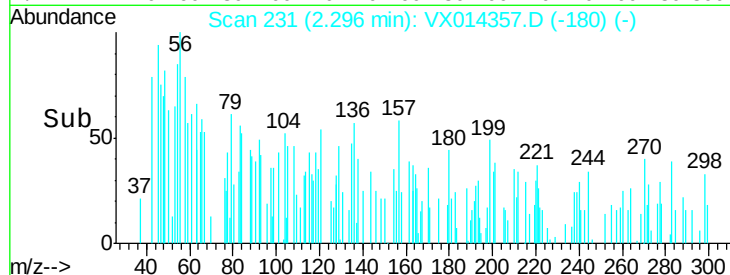
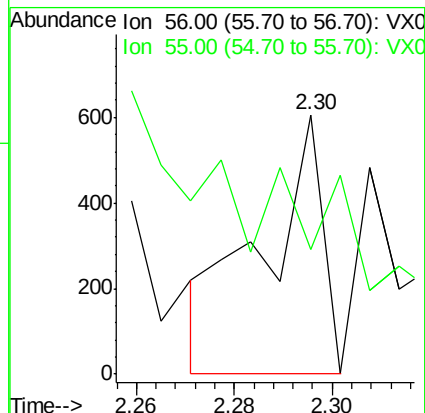
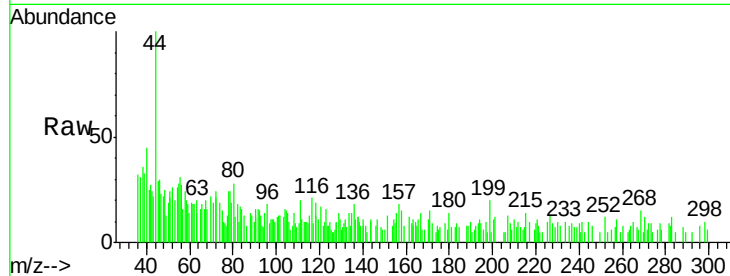
GW-1

Tot Ion: 56 Resp: 512

Ion Ratio Lower Upper

56 100

55 0.0 56.9 85.3#



#16

Acetone

Concen: 6.347 ug/l

RT: 2.43 min Scan# 253

Delta R.T. -0.01 min

Lab File: VX014357.D

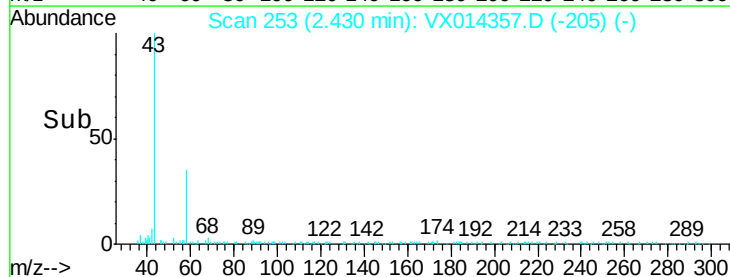
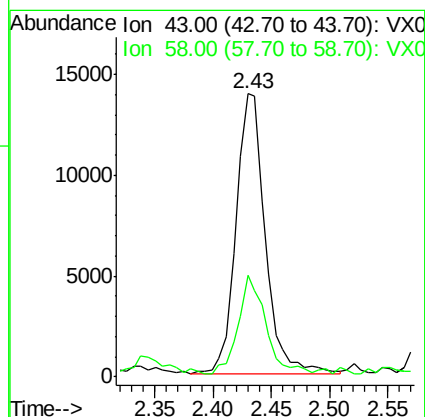
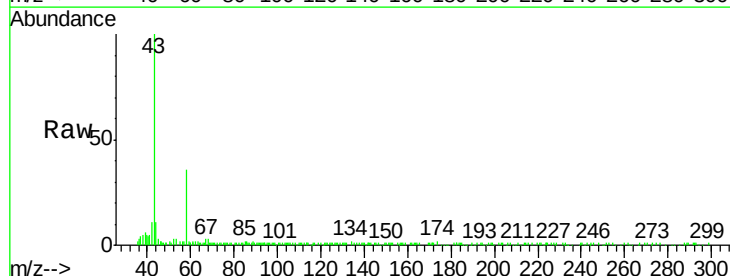
Acq: 30 Dec 2019 16:33

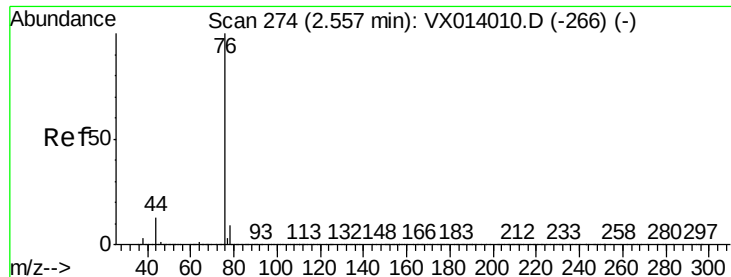
Tgt Ion: 43 Resp: 24311

Ion Ratio Lower Upper

43 100

58 33.3 24.9 37.3





#17

Carbon Disulfide

Concen: 0.897 ug/l

RT: 2.56 min Scan# 274

Delta R.T. 0.00 min

Lab File: VX014357.D

Acq: 30 Dec 2019 16:33

Instrument :

MSVOA\_X

ClientSampled :

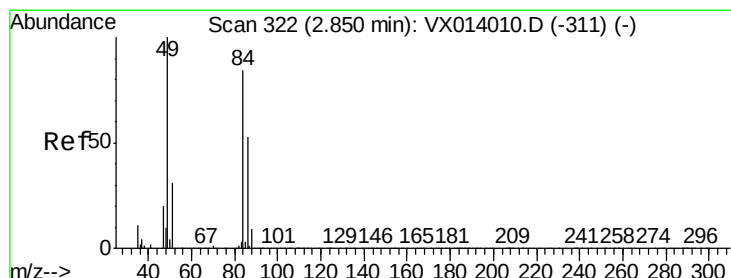
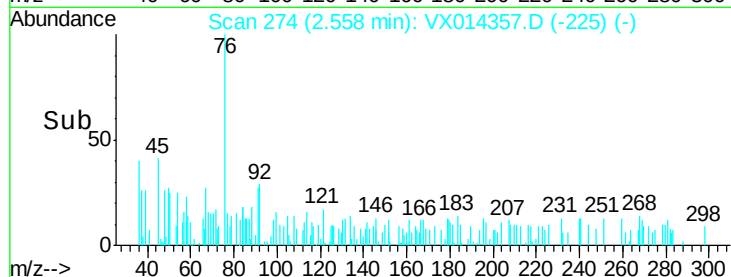
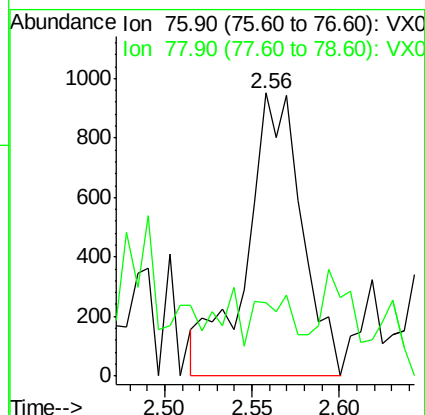
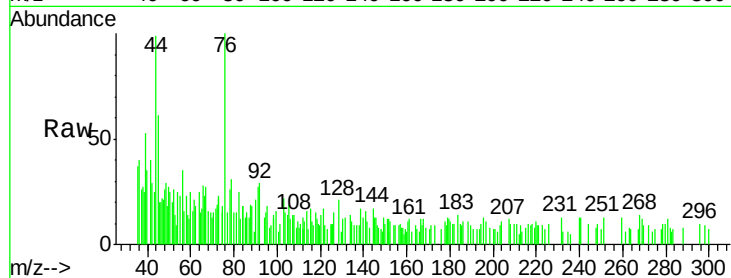
GW-1

Tot Ion: 76 Resp: 2076

Ion Ratio Lower Upper

76 100

78 1.1 7.2 10.8#



#20

Methylene Chloride

Concen: 0.420 ug/l

RT: 2.85 min Scan# 322

Delta R.T. 0.00 min

Lab File: VX014357.D

Acq: 30 Dec 2019 16:33

Tgt Ion: 84 Resp: 2533

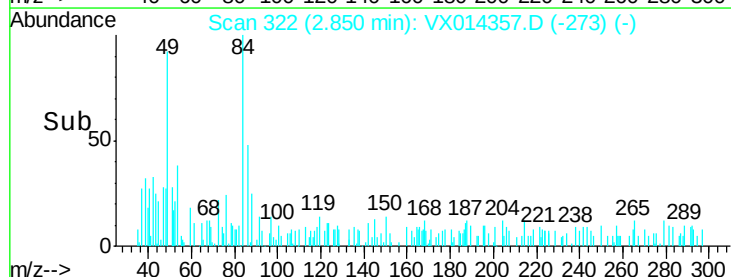
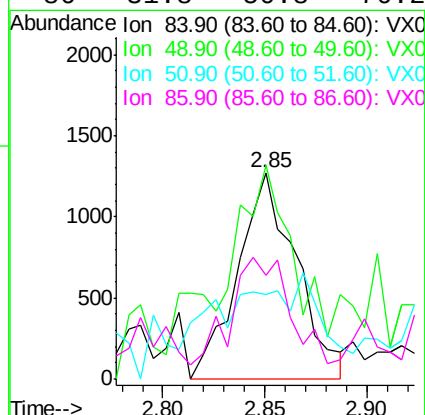
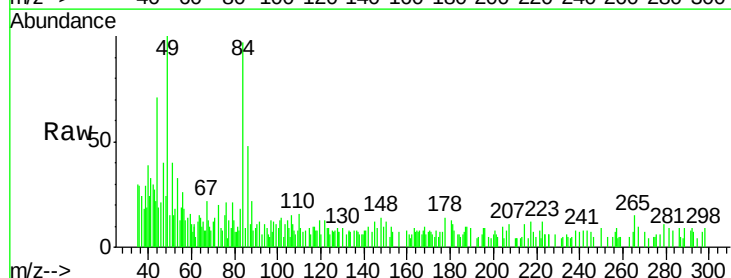
Ion Ratio Lower Upper

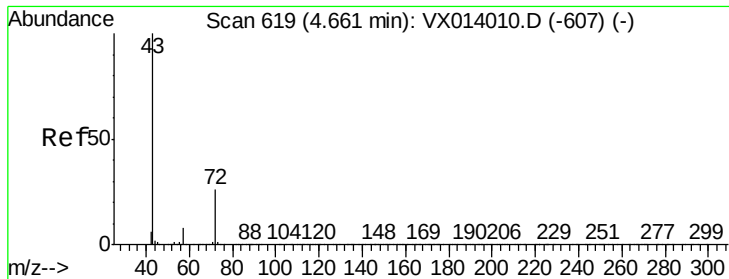
84 100

49 62.7 95.8 143.6#

51 25.4 29.8 44.8#

86 31.8 50.8 76.2#





#25

2-Butanone

Concen: 0.500 ug/l

RT: 4.68 min Scan# 622

Delta R.T. 0.02 min

Lab File: VX014357.D

Acq: 30 Dec 2019 16:33

Instrument :

MSVOA\_X

ClientSampled :

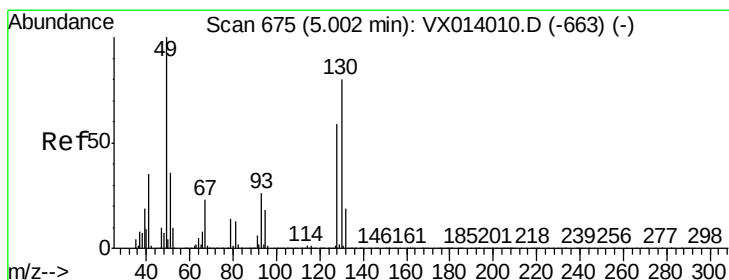
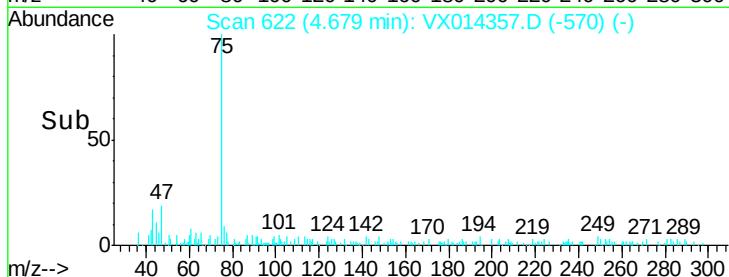
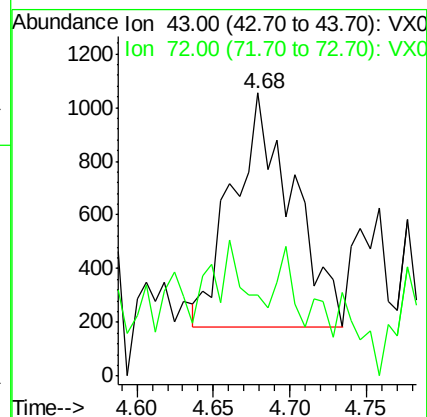
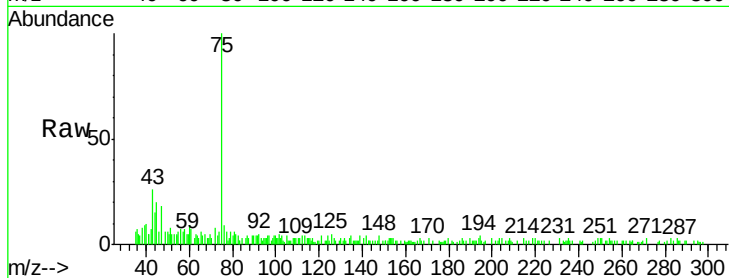
GW-1

Tot Ion: 43 Resp: 2360

Ion Ratio Lower Upper

43 100

72 12.5 21.0 31.4#



#28

Bromochloromethane

Concen: 0.556 ug/l

RT: 5.01 min Scan# 676

Delta R.T. 0.01 min

Lab File: VX014357.D

Acq: 30 Dec 2019 16:33

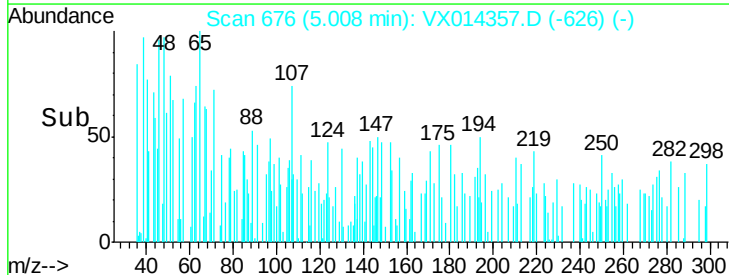
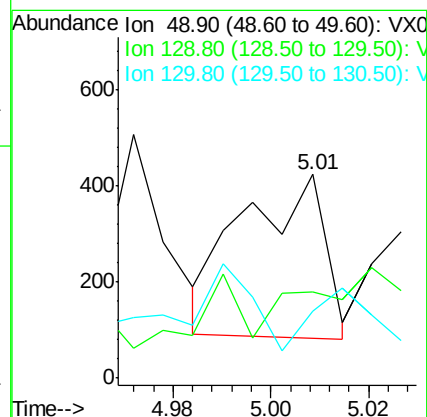
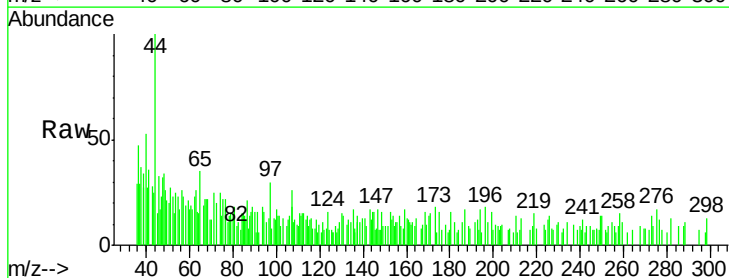
Tgt Ion: 49 Resp: 393

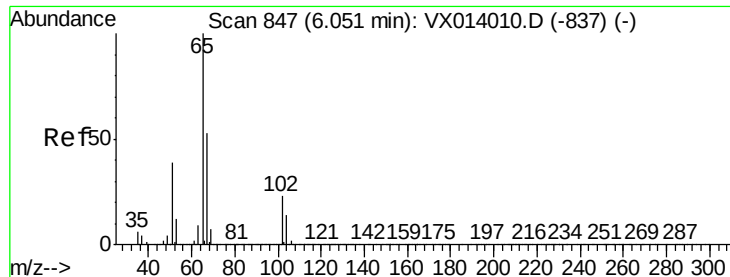
Ion Ratio Lower Upper

49 100

129 114.5 0.0 5.0#

130 31.8 64.6 97.0#

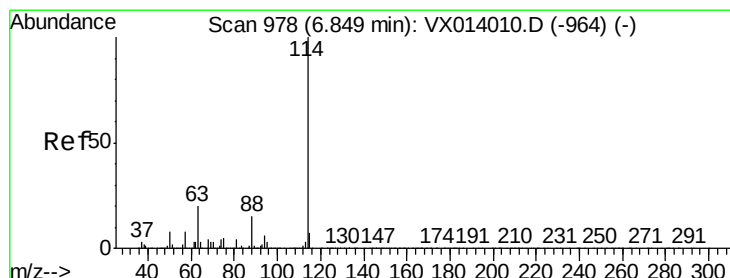
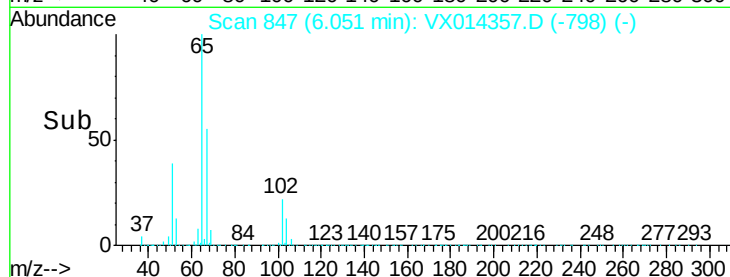
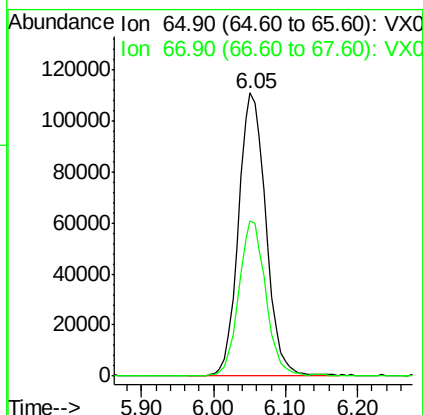
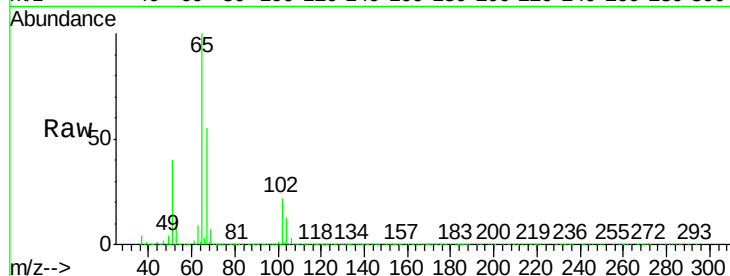




#33  
 1,2-Dichloroethane-d4  
 Concen: 49.624 ug/l  
 RT: 6.05 min Scan# 847  
 Delta R.T. 0.00 min  
 Lab File: VX014357.D  
 Acq: 30 Dec 2019 16:33

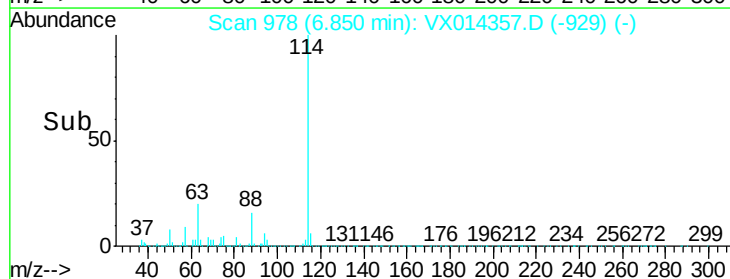
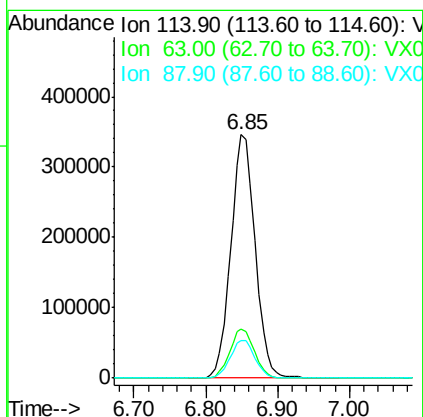
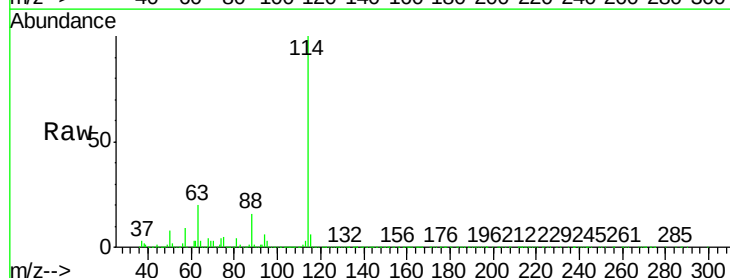
Instrument :  
 MSVOA\_X  
 ClientSampleId :  
 GW-1

Tot Ion: 65 Resp: 292800  
 Ion Ratio Lower Upper  
 65 100  
 67 53.4 0.0 106.4

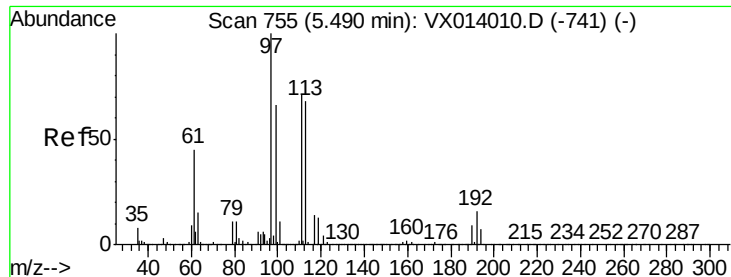


#34  
 1,4-Difluorobenzene  
 Concen: 50.000 ug/l  
 RT: 6.85 min Scan# 978  
 Delta R.T. 0.00 min  
 Lab File: VX014357.D  
 Acq: 30 Dec 2019 16:33

Tgt Ion: 114 Resp: 810380  
 Ion Ratio Lower Upper  
 114 100  
 63 20.1 0.0 40.8  
 88 15.5 0.0 30.4



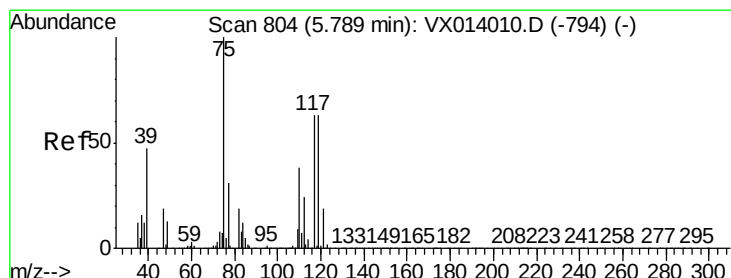
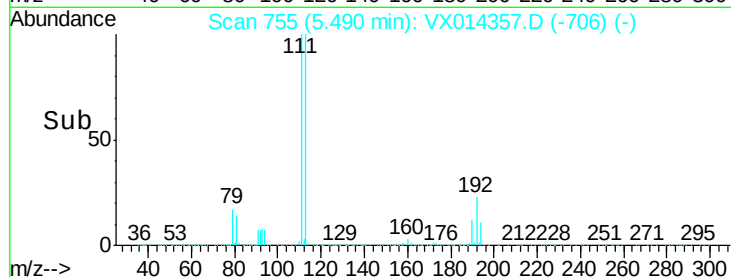
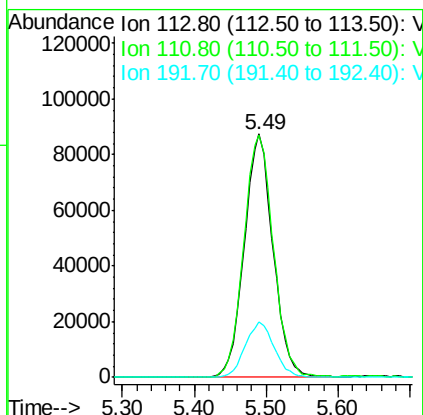
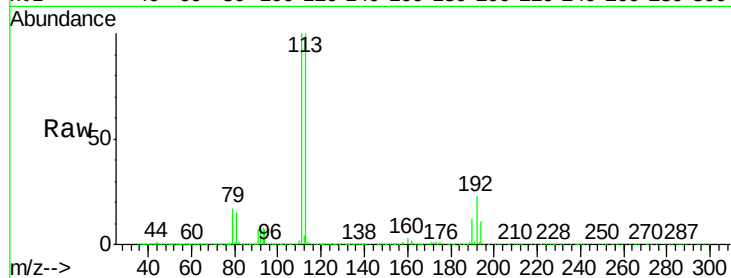




#35  
Dibromofluoromethane  
Concen: 49.154 ug/l  
RT: 5.49 min Scan# 755  
Delta R.T. 0.00 min  
Lab File: VX014357.D  
Acq: 30 Dec 2019 16:33

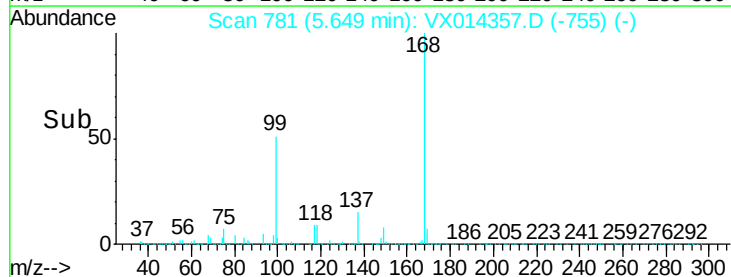
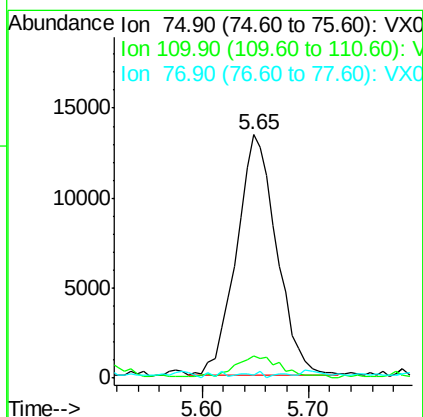
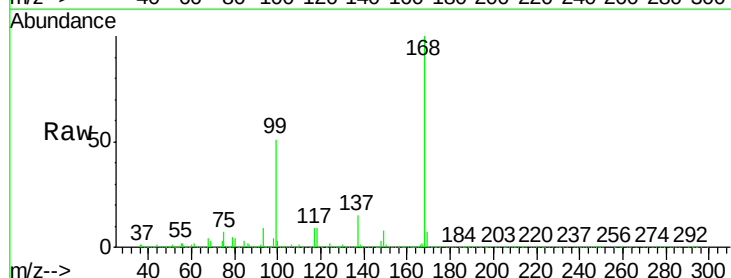
Instrument :  
MSVOA\_X  
ClientSampleId :  
GW-1

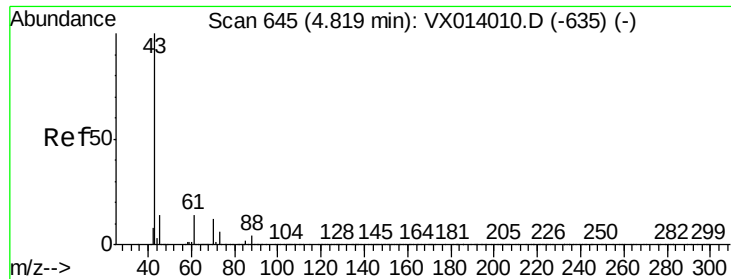
Tot Ion:113 Resp: 242145  
Ion Ratio Lower Upper  
113 100  
111 102.4 82.0 123.0  
192 23.1 19.3 28.9



#36  
1,1-Dichloropropene  
Concen: 4.735 ug/l  
RT: 5.65 min Scan# 781  
Delta R.T. -0.14 min  
Lab File: VX014357.D  
Acq: 30 Dec 2019 16:33

Tgt Ion: 75 Resp: 35208  
Ion Ratio Lower Upper  
75 100  
110 11.6 18.3 54.9#  
77 1.1 24.8 37.2#

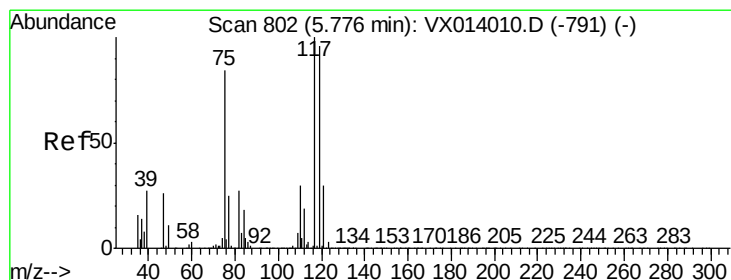
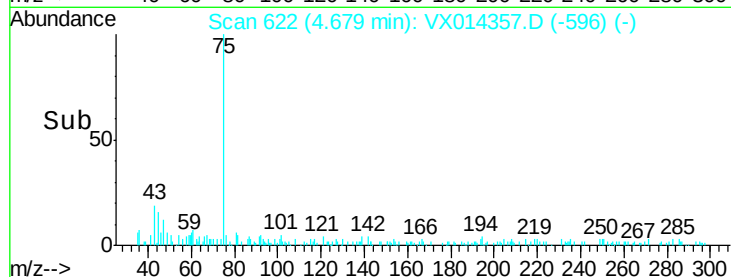
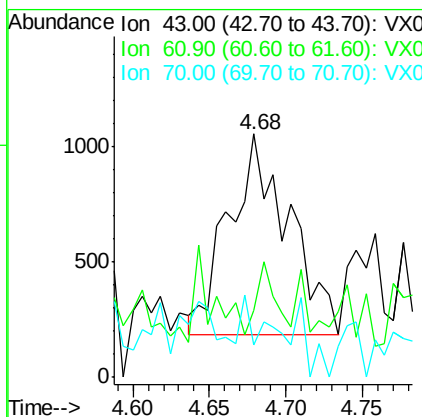
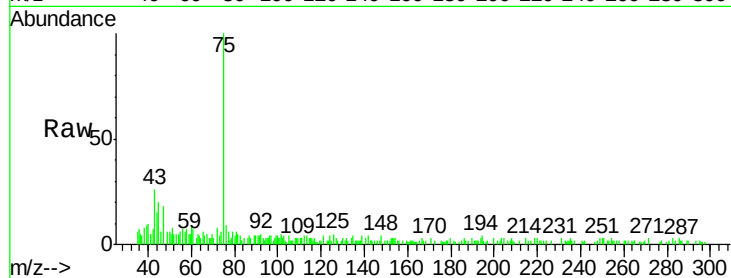




#37  
Ethyl Acetate  
Concen: 0.287 ug/l  
RT: 4.68 min Scan# 622  
Delta R.T. -0.14 min  
Lab File: VX014357.D  
Acq: 30 Dec 2019 16:33

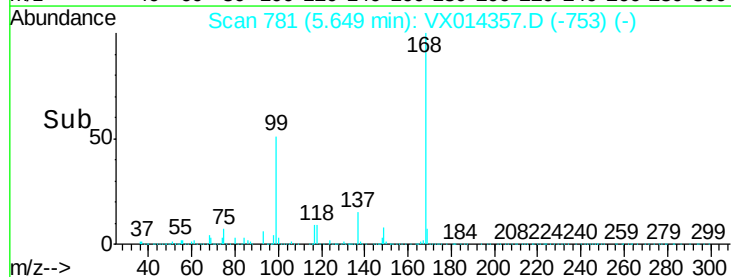
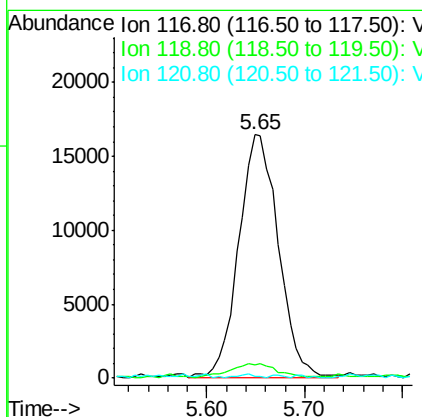
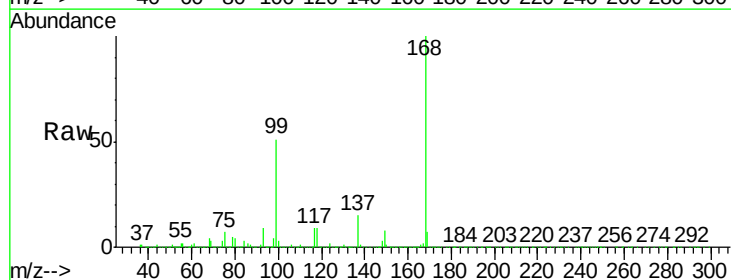
Instrument :  
MSVOA\_X  
ClientSampled :  
GW-1

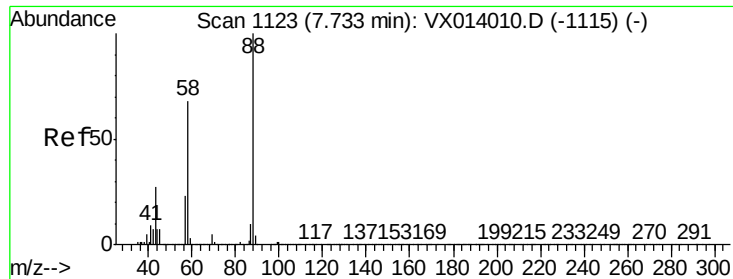
Tot Ion: 43 Resp: 2360  
Ion Ratio Lower Upper  
43 100  
61 11.3 10.8 16.2  
70 10.8 8.6 12.8



#38  
Carbon Tetrachloride  
Concen: 6.780 ug/l  
RT: 5.65 min Scan# 781  
Delta R.T. -0.13 min  
Lab File: VX014357.D  
Acq: 30 Dec 2019 16:33

Tgt Ion: 117 Resp: 45925  
Ion Ratio Lower Upper  
117 100  
119 4.6 76.2 114.4#  
121 0.2 23.6 35.4#

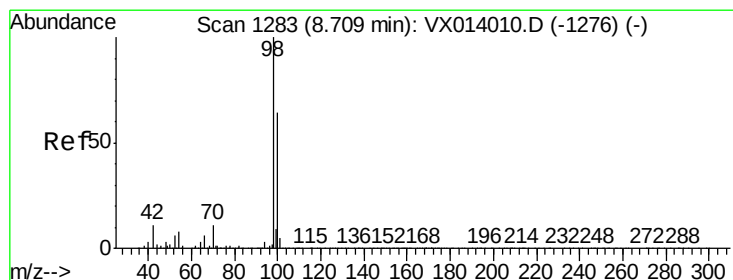
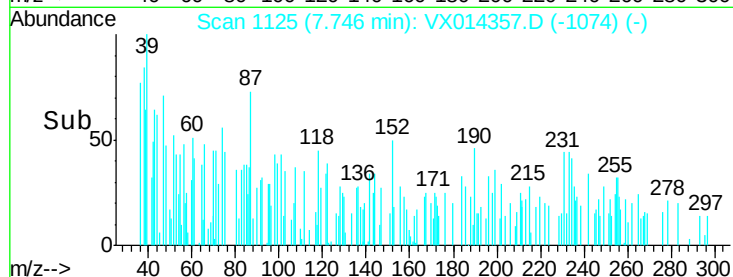
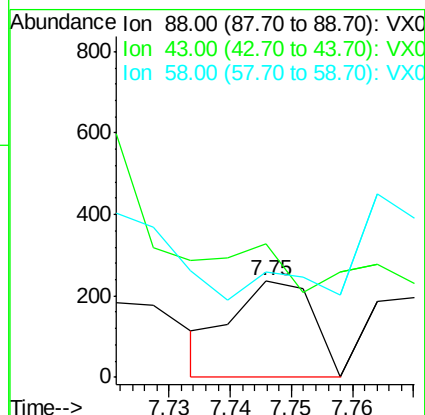
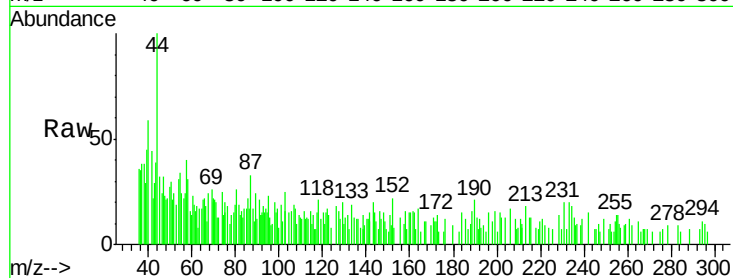




#49  
1,4-Dioxane  
Concen: 1.580 ug/l  
RT: 7.75 min Scan# 1125  
Delta R.T. 0.01 min  
Lab File: VX014357.D  
Acq: 30 Dec 2019 16:33

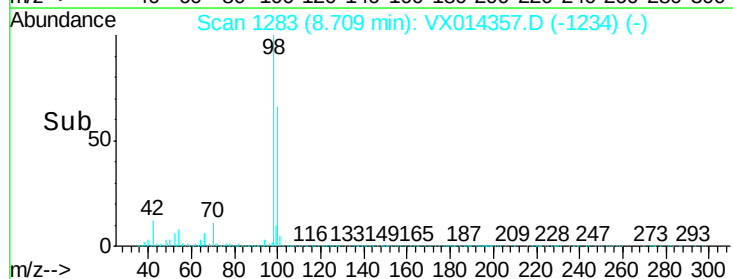
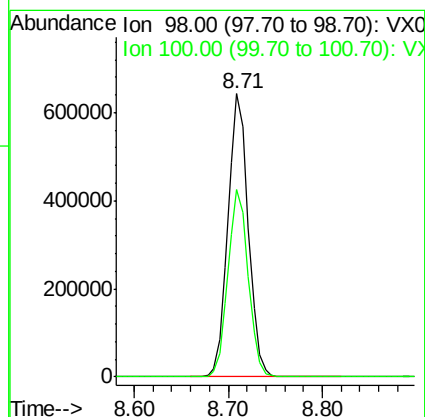
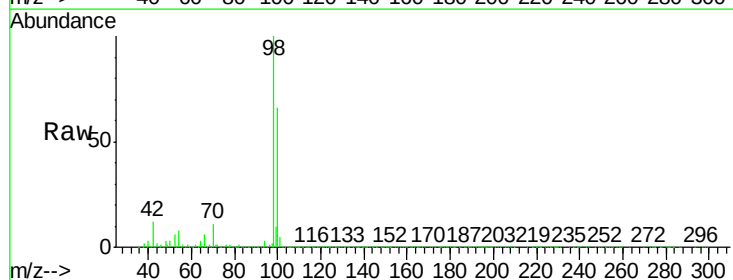
Instrument :  
MSVOA\_X  
ClientSampleId :  
GW-1

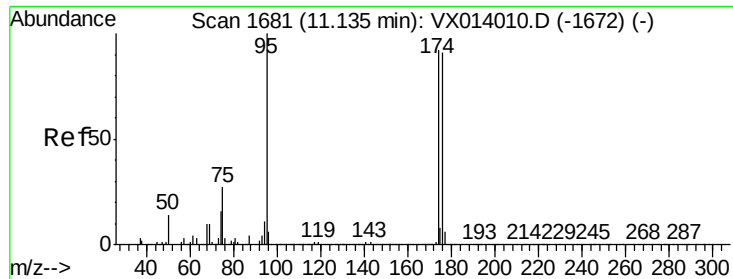
| Tot Ion | Ratio | Lower | Upper |
|---------|-------|-------|-------|
| 88      | 100   |       |       |
| 43      | 0.0   | 26.5  | 39.7# |
| 58      | 0.0   | 56.8  | 85.2# |



#50  
Toluene-d8  
Concen: 50.216 ug/l  
RT: 8.71 min Scan# 1283  
Delta R.T. 0.00 min  
Lab File: VX014357.D  
Acq: 30 Dec 2019 16:33

| Tgt Ion | Ratio | Lower | Upper |
|---------|-------|-------|-------|
| 98      | 100   |       |       |
| 100     | 65.8  | 52.9  | 79.3  |

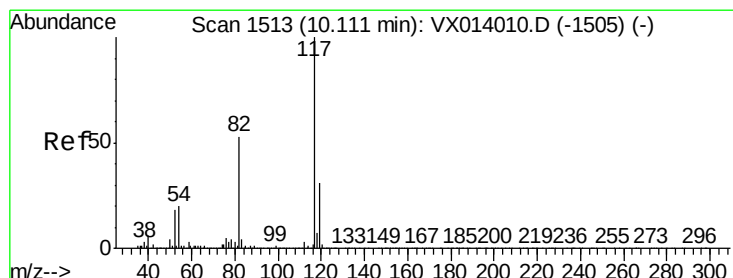
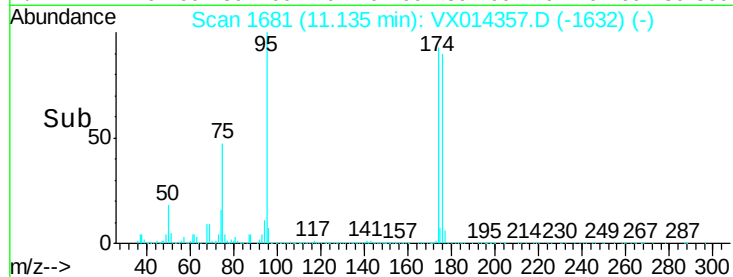
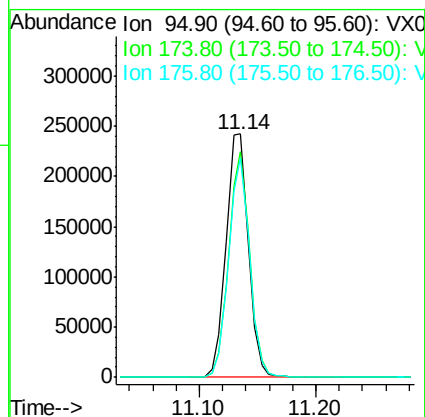
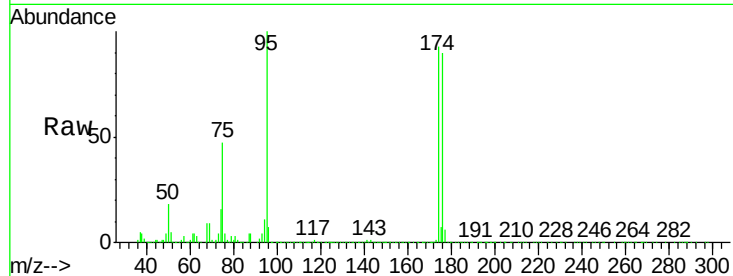




#62  
4-Bromofluorobenzene  
Concen: 45.725 ug/l  
RT: 11.14 min Scan# 1681  
Delta R.T. 0.00 min  
Lab File: VX014357.D  
Acq: 30 Dec 2019 16:33

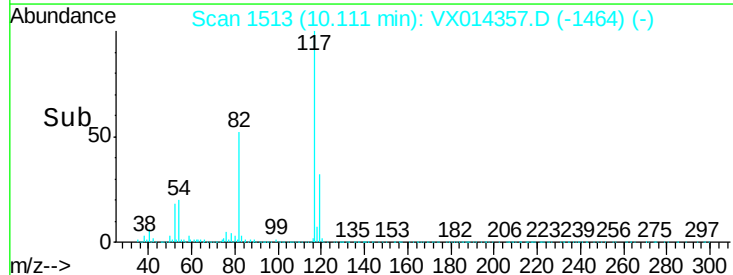
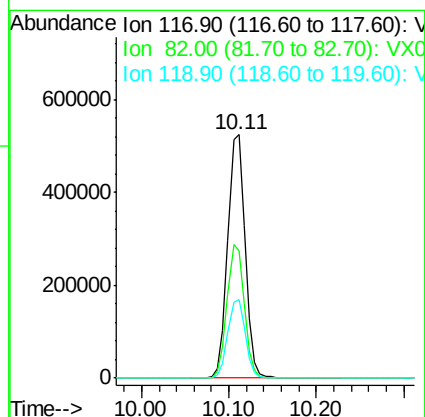
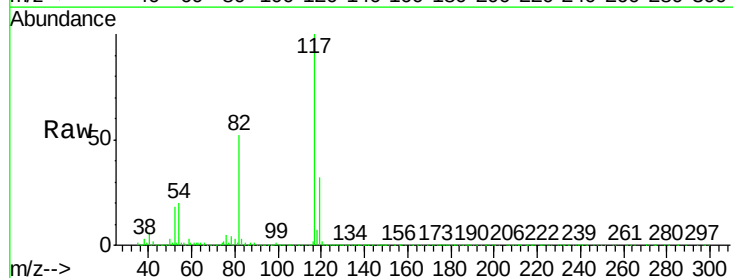
Instrument :  
MSVOA\_X  
ClientSampleId :  
GW-1

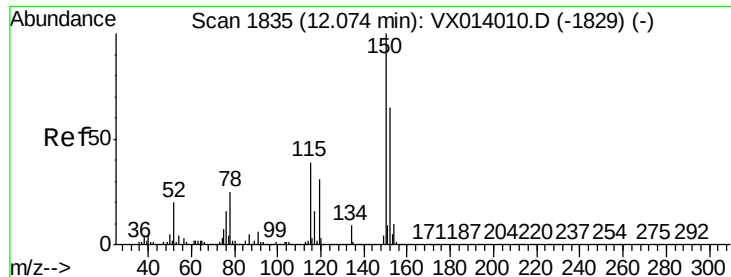
Tot Ion: 95 Resp: 320568  
Ion Ratio Lower Upper  
95 100  
174 87.8 0.0 175.8  
176 85.4 0.0 173.0



#63  
Chlorobenzene-d5  
Concen: 50.000 ug/l  
RT: 10.11 min Scan# 1513  
Delta R.T. 0.00 min  
Lab File: VX014357.D  
Acq: 30 Dec 2019 16:33

Tgt Ion: 117 Resp: 723670  
Ion Ratio Lower Upper  
117 100  
82 52.1 42.2 63.4  
119 32.2 25.1 37.7





#72

1,4-Dichlorobenzene-d4

Concen: 50.000 ug/l

RT: 12.07 min Scan# 1835

Delta R.T. 0.00 min

Lab File: VX014357.D

Acq: 30 Dec 2019 16:33

Instrument :

MSVOA\_X

ClientSampleId :

GW-1

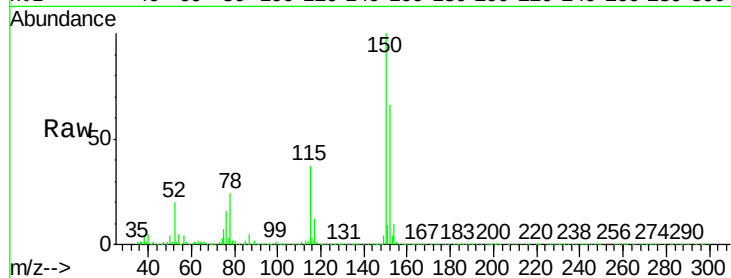
Tot Ion:152 Resp: 317507

Ion Ratio Lower Upper

152 100

115 55.5 38.3 114.9

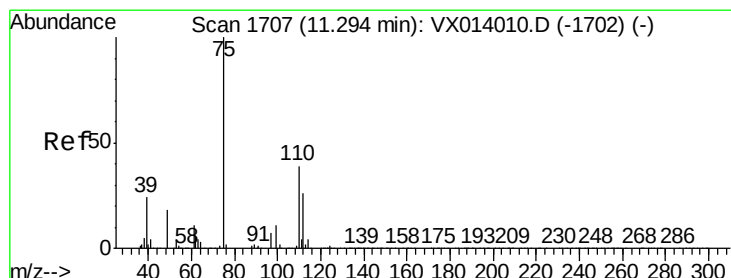
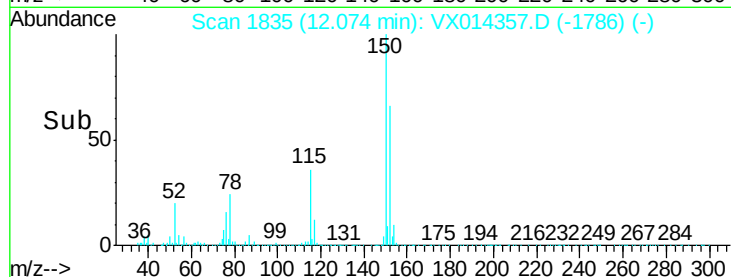
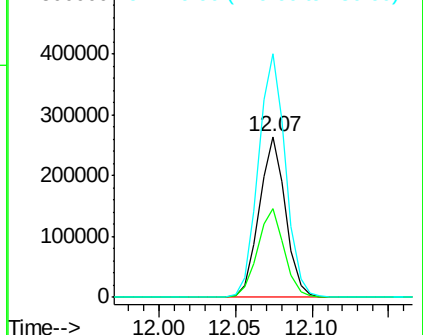
150 155.7 0.0 345.4



Abundance Ion 151.90 (151.60 to 152.60): V

Ion 114.90 (114.60 to 115.60): V

Ion 149.90 (149.60 to 150.60): V



#76

1,2,3-Trichloropropane

Concen: 22.520 ug/l

RT: 11.13 min Scan# 1680

Delta R.T. -0.16 min

Lab File: VX014357.D

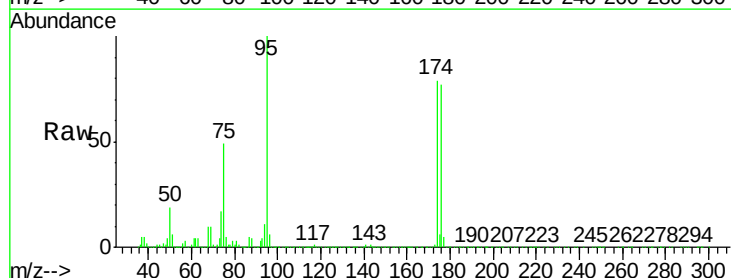
Acq: 30 Dec 2019 16:33

Tgt Ion: 75 Resp: 155229

Ion Ratio Lower Upper

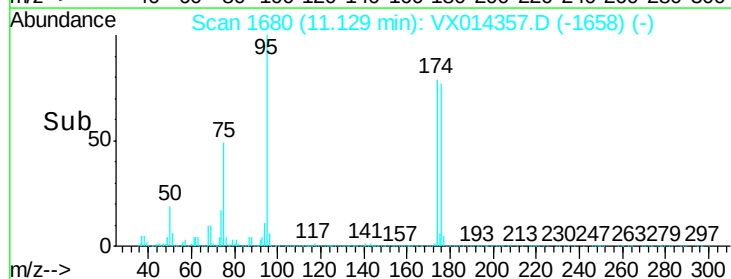
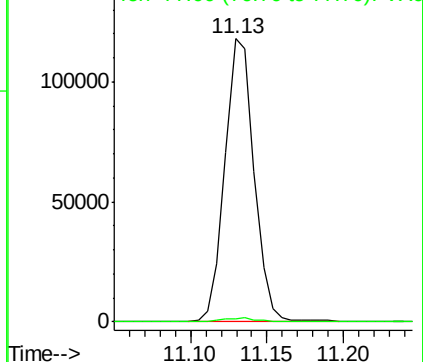
75 100

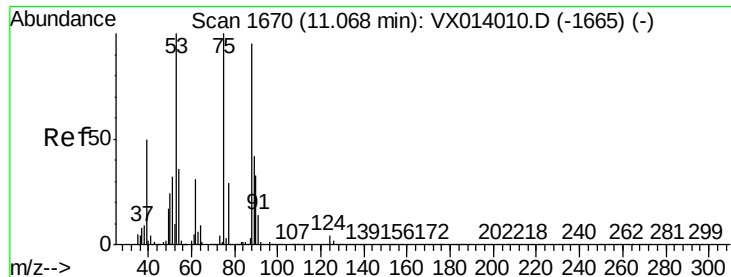
77 1.8 19.3 57.8#



Abundance Ion 74.90 (74.60 to 75.60): VX0

Ion 77.00 (76.70 to 77.70): VX0





#81

trans-1,4-Dichloro-2-butene

Concen: 63.562 ug/l

RT: 11.13 min Scan# 1680

Delta R.T. 0.06 min

Lab File: VX014357.D

Acq: 30 Dec 2019 16:33

Instrument :

MSVOA\_X

ClientSampleId :

GW-1

Tot Ion: 75 Resp: 155229

Ion Ratio Lower Upper

75 100

53 0.3 76.7 115.1#

89 0.3 34.6 51.8#

