

Data Path : Z:\VOASRV\HPCHEM1\MSVOA D\DATA\VD111620\  
 Data File : VD067639.D  
 Acq On : 16 Nov 2020 14:29  
 Operator : VA/SY  
 Sample : L4687-03  
 Misc : 5.20G/5.01ml/MSVOA D/SOIL  
 ALS Vial : 11 Sample Multiplier: 1

Instrument :  
 MSVOA\_D  
 ClientSampleId :  
 SS-2

Quant Time: Nov 17 01:07:48 2020  
 Quant Method : Z:\VOASRV\HPCHEM1\MSVOA\_D\METHOD\82D110320S.M  
 Quant Title : SW846 8260  
 QLast Update : Wed Nov 04 00:56:28 2020  
 Response via : Initial Calibration

| Internal Standards         | R.T.  | QIon | Response | Conc  | Units | Dev(Min) |
|----------------------------|-------|------|----------|-------|-------|----------|
| 1) Pentafluorobenzene      | 7.99  | 168  | 268397   | 50.00 | ug/l  | 0.00     |
| 34) 1,4-Difluorobenzene    | 8.87  | 114  | 427335   | 50.00 | ug/l  | 0.00     |
| 63) Chlorobenzene-d5       | 11.65 | 117  | 438506   | 50.00 | ug/l  | 0.00     |
| 72) 1,4-Dichlorobenzene-d4 | 13.58 | 152  | 207872   | 50.00 | ug/l  | 0.00     |

| System Monitoring Compounds | R.T.  | QIon | Response | Conc  | Units   | Dev(Min) |
|-----------------------------|-------|------|----------|-------|---------|----------|
| 33) 1,2-Dichloroethane-d4   | 8.34  | 65   | 124730   | 53.15 | ug/l    | 0.00     |
| Spiked Amount               |       |      | Recovery | =     | 106.30% |          |
| 35) Dibromofluoromethane    | 7.92  | 113  | 130595   | 50.72 | ug/l    | 0.00     |
| Spiked Amount               |       |      | Recovery | =     | 101.44% |          |
| 50) Toluene-d8              | 10.34 | 98   | 504297   | 55.74 | ug/l    | 0.00     |
| Spiked Amount               |       |      | Recovery | =     | 111.48% |          |
| 62) 4-Bromofluorobenzene    | 12.64 | 95   | 187957   | 60.17 | ug/l    | 0.00     |
| Spiked Amount               |       |      | Recovery | =     | 120.34% |          |

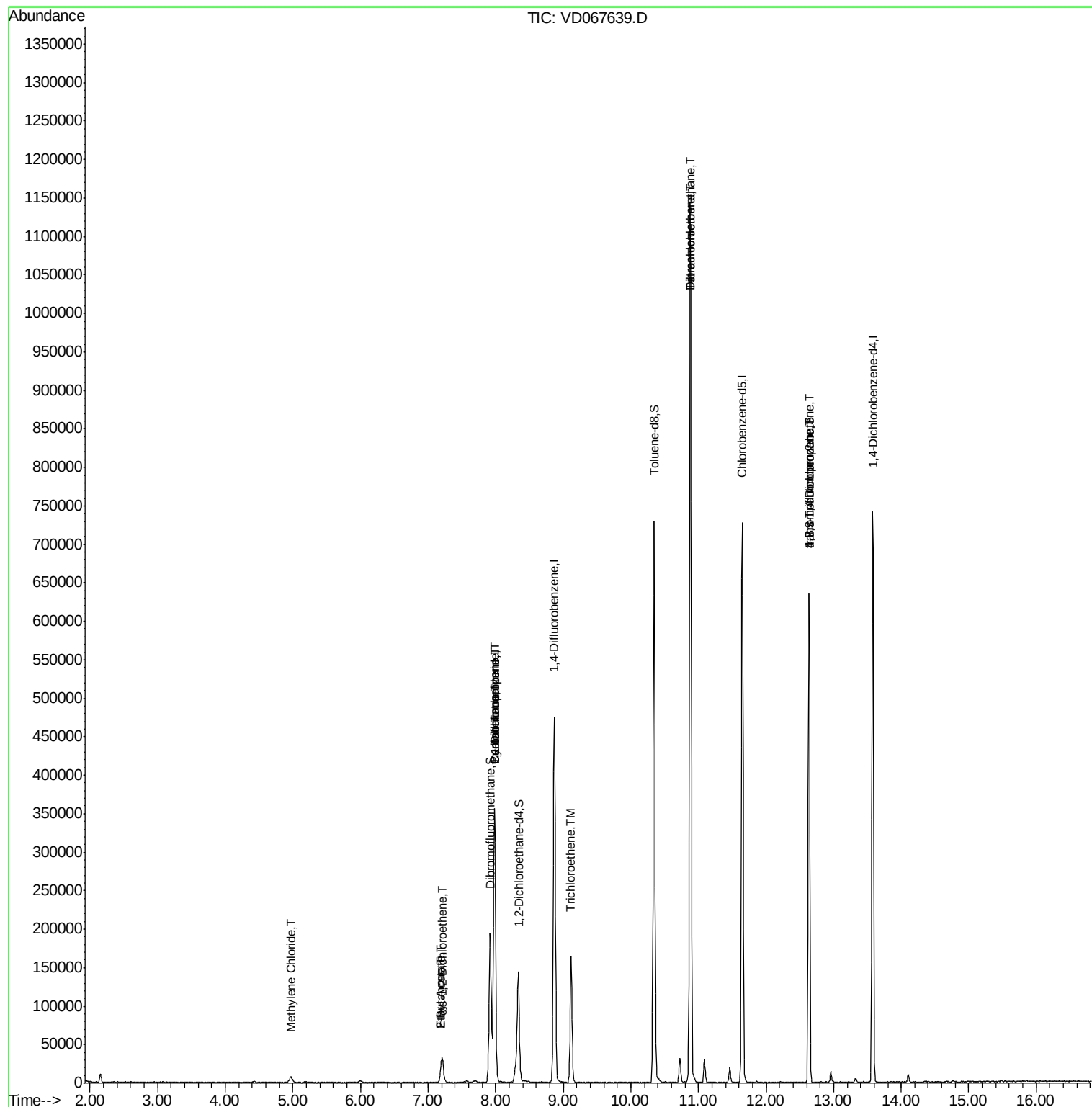
| Target Compounds               | R.T.  | QIon | Response | Conc      | Units  | Qvalue |
|--------------------------------|-------|------|----------|-----------|--------|--------|
| 2) Dichlorodifluoromethane     | 1.99  | 85   | 66       | Below Cal | #      | 44     |
| 11) Tert butyl alcohol         | 5.19  | 59   | 207      | Below Cal | #      | 79     |
| 20) Methylene Chloride         | 4.97  | 84   | 6742     | 2.718     | ug/l # | 77     |
| 25) 2-Butanone                 | 7.17  | 43   | 1022     | 2.723     | ug/l # | 42     |
| 27) cis-1,2-Dichloroethene     | 7.22  | 96   | 13818    | 5.102     | ug/l   | 89     |
| 31) Cyclohexane                | 7.99  | 56   | 4630     | 1.360     | ug/l # | 1      |
| 36) 1,1-Dichloropropene        | 7.99  | 75   | 18351    | 5.017     | ug/l # | 51     |
| 37) Ethyl Acetate              | 7.17  | 43   | 1022     | 1.076     | ug/l # | 63     |
| 38) Carbon Tetrachloride       | 7.99  | 117  | 29990    | 6.310     | ug/l # | 15     |
| 44) Trichloroethene            | 9.11  | 130  | 61489    | 18.873    | ug/l   | 93     |
| 60) Dibromochloromethane       | 10.88 | 129  | 239401   | 89.798    | ug/l # | 11     |
| 64) Tetrachloroethene          | 10.88 | 164  | 268266   | 82.606    | ug/l   | 99     |
| 76) 1,2,3-Trichloropropane     | 12.64 | 75   | 95340    | 76.029    | ug/l # | 100    |
| 81) trans-1,4-Dichloro-2-buten | 12.64 | 75   | 95340    | 154.358   | ug/l # | 10     |

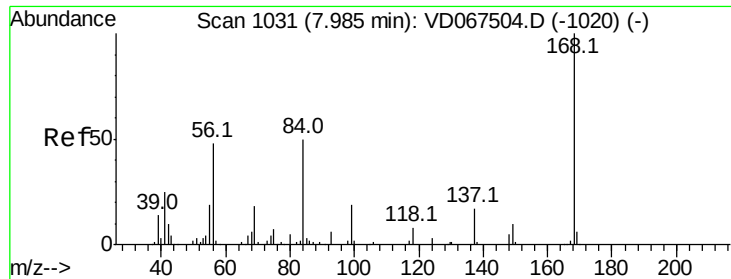
(#) = qualifier out of range (m) = manual integration (+) = signals summed

Data Path : Z:\V0ASRV\HPCHEM1\MSVOA D\DATA\VD111620\  
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Instrument :  
MSVOA\_D  
ClientSampleId :  
SS-2

Quant Time: Nov 17 01:07:48 2020  
Quant Method : Z:\V0ASRV\HPCHEM1\MSVOA\_D\METHOD\82D110320S.M  
Quant Title : SW846 8260  
QLast Update : Wed Nov 04 00:56:28 2020  
Response via : Initial Calibration





#1

Pentafluorobenzene

Concen: 50.000 ug/l

RT: 7.99 min Scan# 1031

Delta R.T. 0.00 min

Lab File: VD067639.D

Acq: 16 Nov 2020 14:29

Instrument :

MSVOA\_D

ClientSampleId :

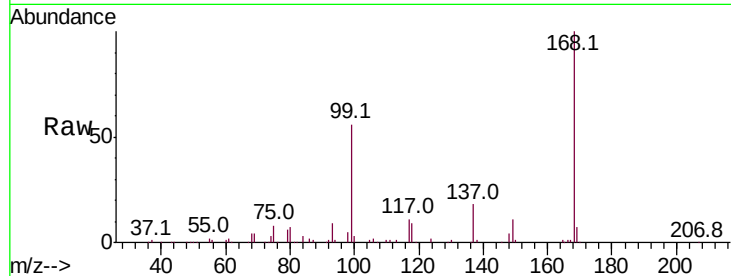
SS-2

Tot Ion:168 Resp: 268397

Ion Ratio Lower Upper

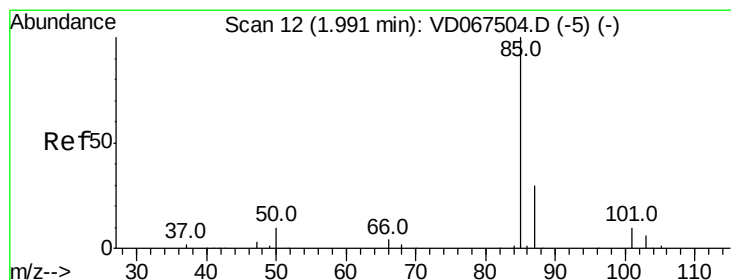
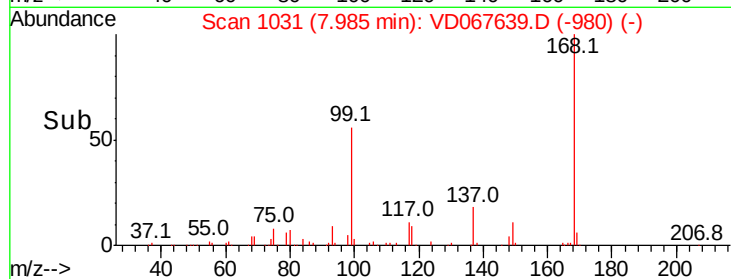
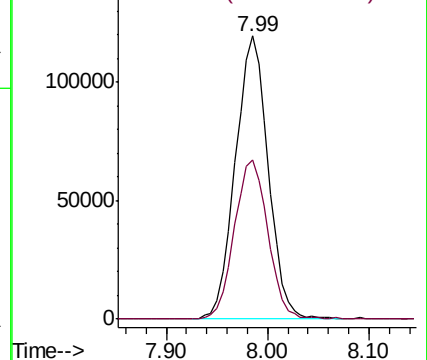
168 100

99 56.3 45.0 67.6



Abundance Ion 167.90 (167.60 to 168.60): V

Ion 98.90 (98.60 to 99.60): VDC



#2

Dichlorodifluoromethane

Concen: Below Cal

RT: 1.99 min Scan# 11

Delta R.T. -0.01 min

Lab File: VD067639.D

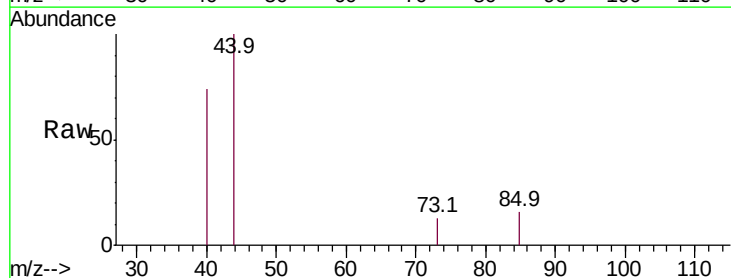
Acq: 16 Nov 2020 14:29

Tgt Ion: 85 Resp: 66

Ion Ratio Lower Upper

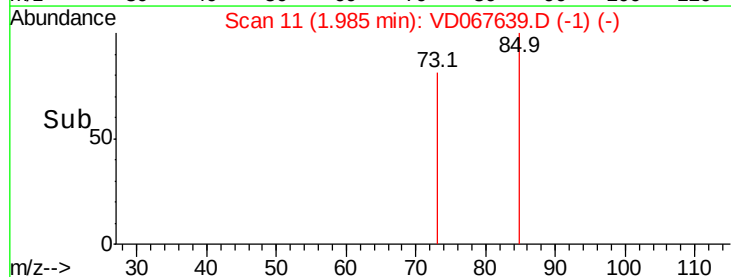
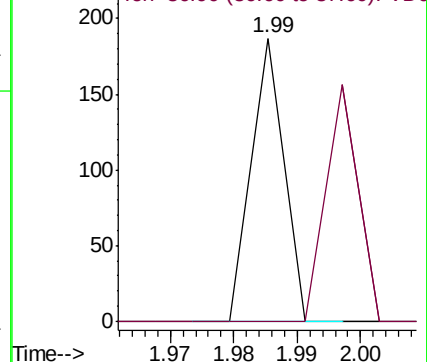
85 100

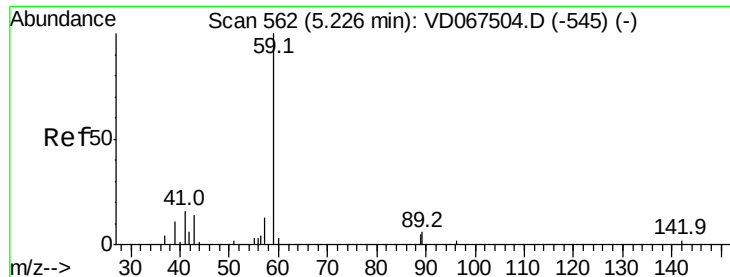
87 0.0 15.3 45.8#



Abundance Ion 84.90 (84.60 to 85.60): VDC

Ion 86.90 (86.60 to 87.60): VDC



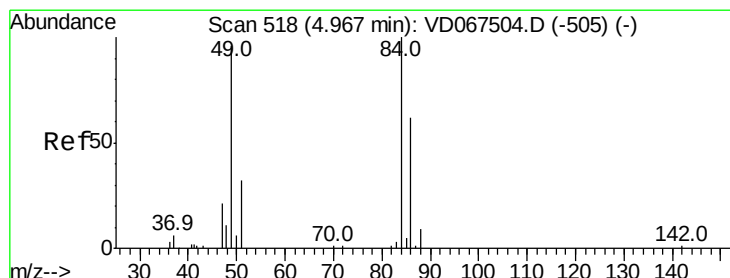
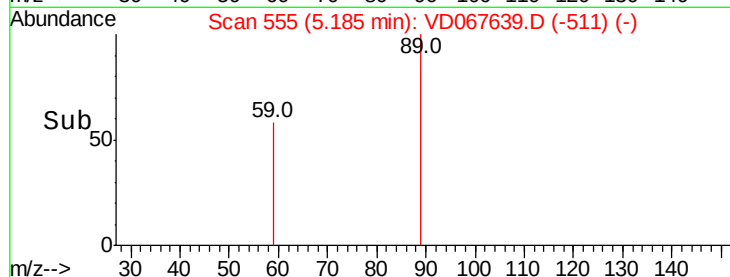
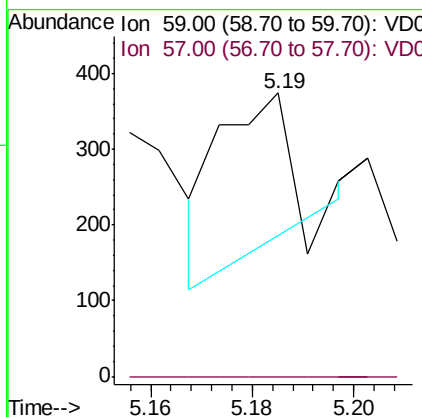
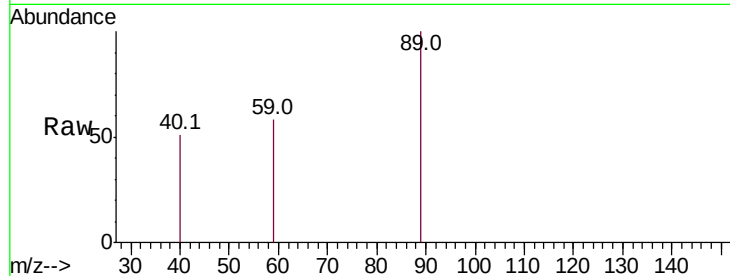


#11

Tert butyl alcohol  
Concen: Below Cal  
RT: 5.19 min Scan# 555  
Delta R.T. -0.04 min  
Lab File: VD067639.D  
Acq: 16 Nov 2020 14:29

Instrument :  
MSVOA\_D  
ClientSampled :  
SS-2

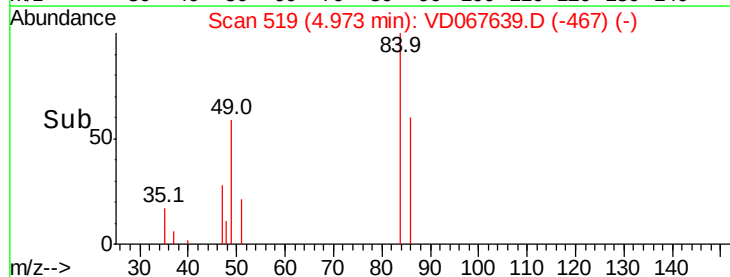
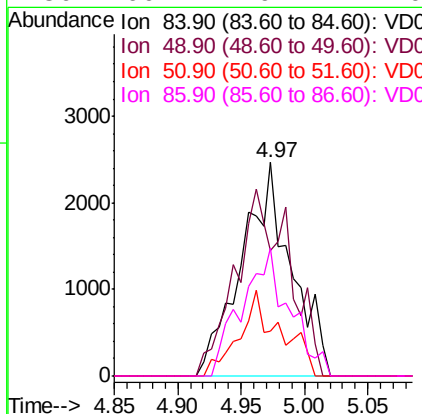
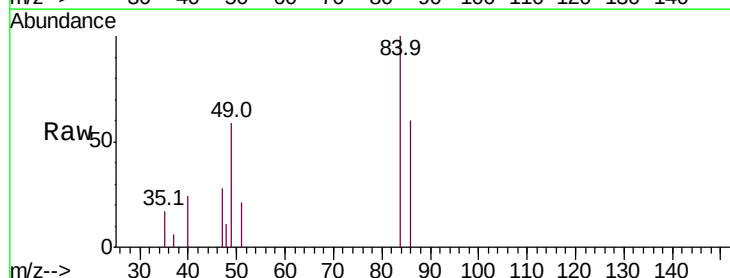
Tot Ion: 59 Resp: 207  
Ion Ratio Lower Upper  
59 100  
57 0.0 5.9 8.9#

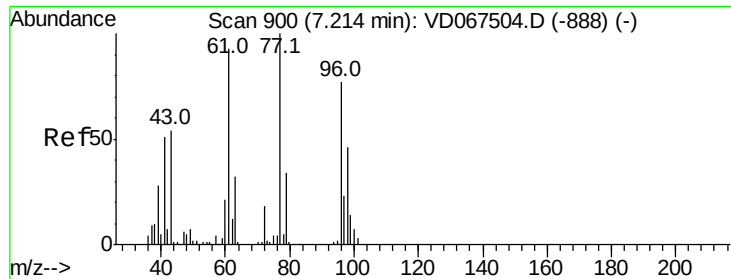


#20

Methylene Chloride  
Concen: 2.718 ug/l  
RT: 4.97 min Scan# 519  
Delta R.T. 0.01 min  
Lab File: VD067639.D  
Acq: 16 Nov 2020 14:29

Tgt Ion: 84 Resp: 6742  
Ion Ratio Lower Upper  
84 100  
49 59.0 77.0 115.4#  
51 21.2 25.4 38.2#  
86 60.2 49.4 74.0





#25

2-Butanone

Concen: 2.723 ug/l

RT: 7.17 min Scan# 893

Delta R.T. -0.04 min

Lab File: VD067639.D

Acq: 16 Nov 2020 14:29

Instrument :

MSVOA\_D

ClientSampled :

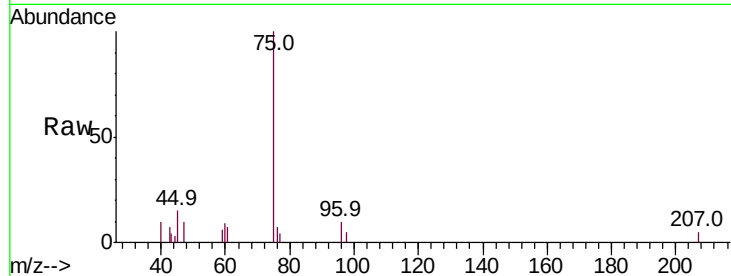
SS-2

Tot Ion: 43 Resp: 1022

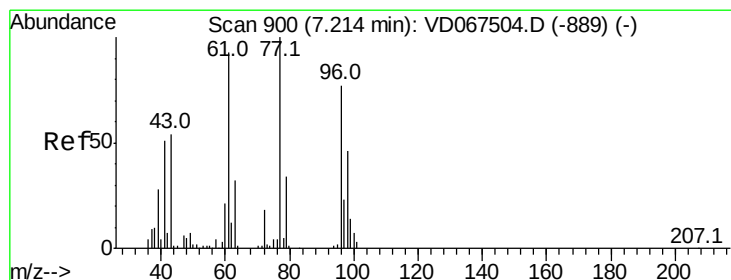
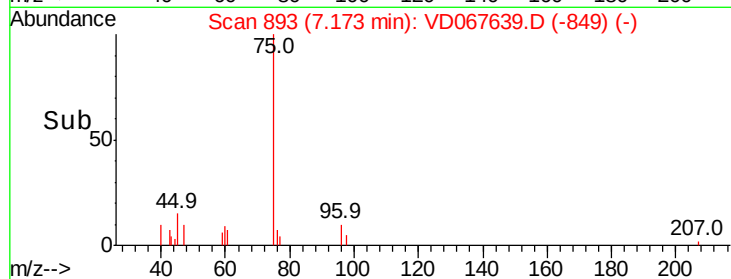
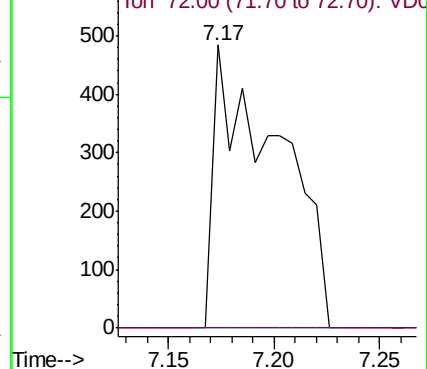
Ion Ratio Lower Upper

43 100

72 0.0 26.4 39.6#



Abundance Ion 43.00 (42.70 to 43.70): VDC



#27

cis-1,2-Dichloroethene

Concen: 5.102 ug/l

RT: 7.22 min Scan# 901

Delta R.T. 0.01 min

Lab File: VD067639.D

Acq: 16 Nov 2020 14:29

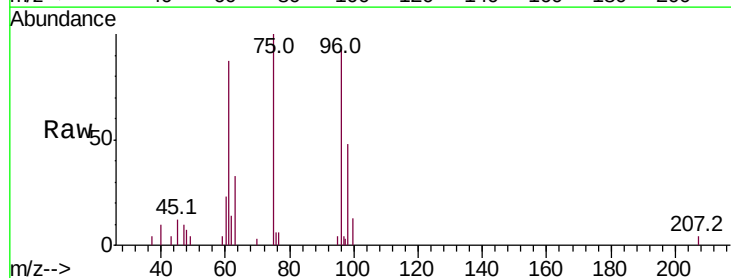
Tgt Ion: 96 Resp: 13818

Ion Ratio Lower Upper

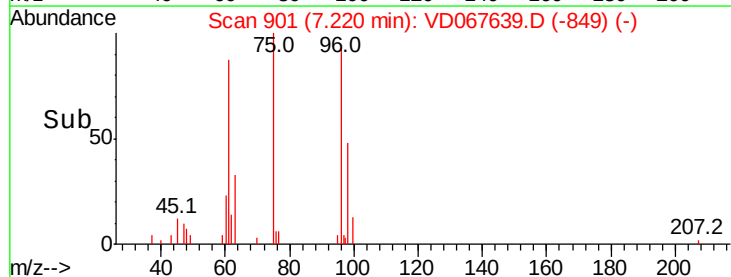
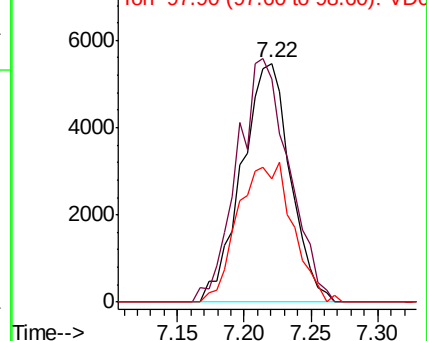
96 100

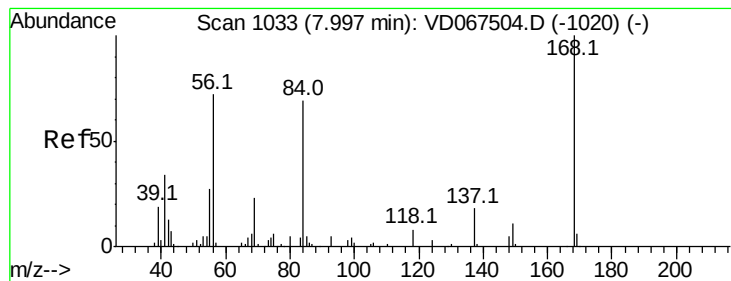
61 108.9 0.0 251.6

98 65.6 0.0 128.0



Abundance Ion 95.90 (95.60 to 96.60): VDC





#31

Cyclohexane

Concen: 1.360 ug/l

RT: 7.99 min Scan# 1031

Delta R.T. -0.01 min

Lab File: VD067639.D

Acq: 16 Nov 2020 14:29

Instrument :

MSVOA\_D

ClientSampleID :

SS-2

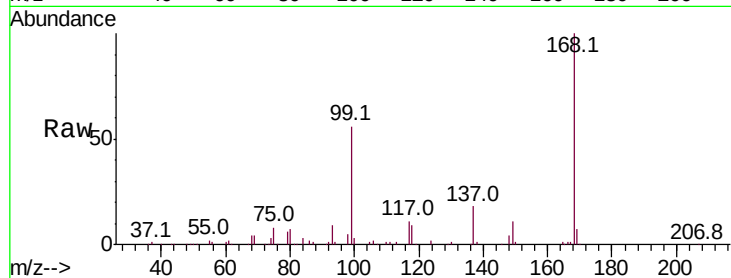
Tot Ion: 56 Resp: 4630

Ion Ratio Lower Upper

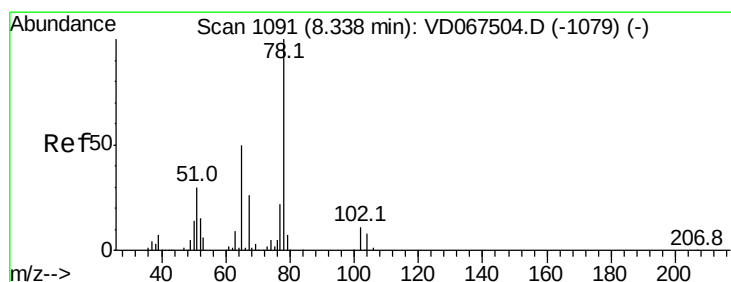
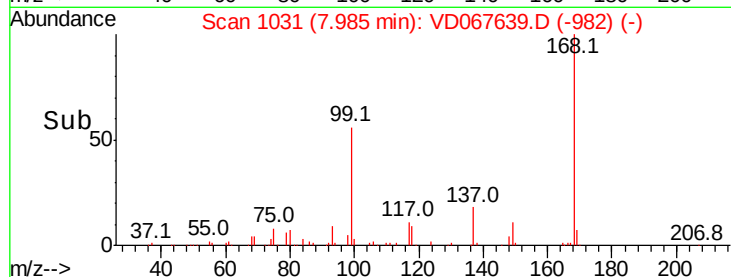
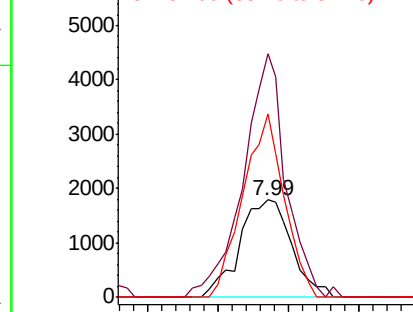
56 100

69 250.5 25.9 38.9#

84 188.9 76.2 114.4#



Abundance Ion 56.00 (55.70 to 56.70): VDC  
Ion 69.00 (68.70 to 69.70): VDC  
Ion 84.00 (83.70 to 84.70): VDC



#33

1,2-Dichloroethane-d4

Concen: 53.148 ug/l

RT: 8.34 min Scan# 1091

Delta R.T. 0.00 min

Lab File: VD067639.D

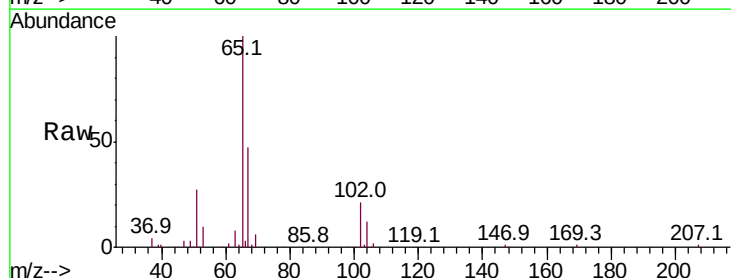
Acq: 16 Nov 2020 14:29

Tgt Ion: 65 Resp: 124730

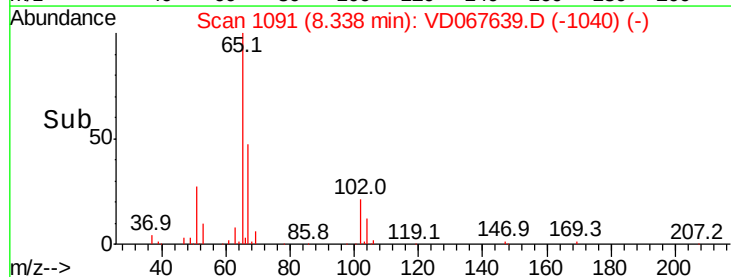
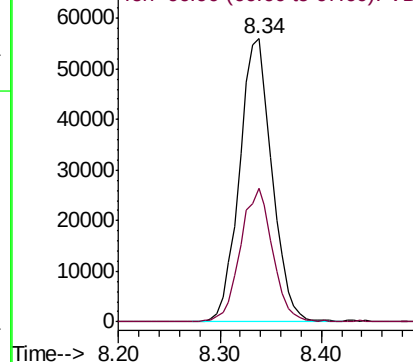
Ion Ratio Lower Upper

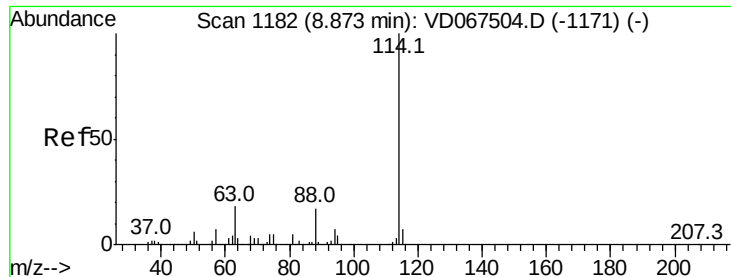
65 100

67 46.6 0.0 99.4



Abundance Ion 64.90 (64.60 to 65.60): VDC  
Ion 66.90 (66.60 to 67.60): VDC

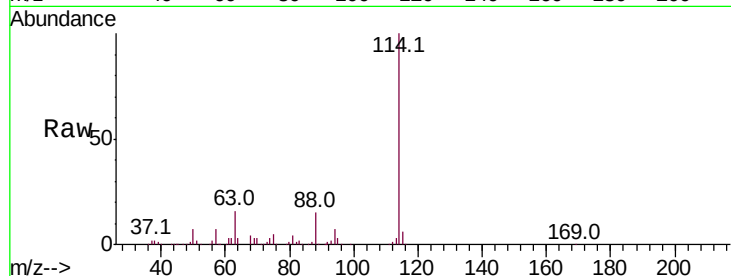




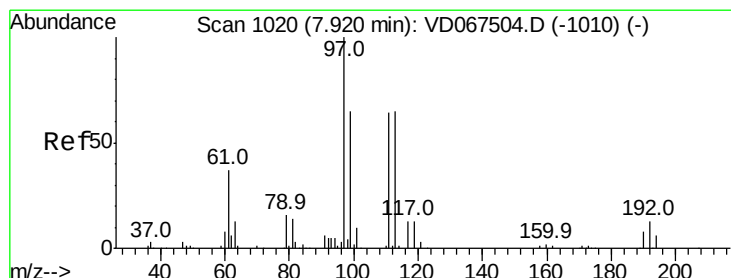
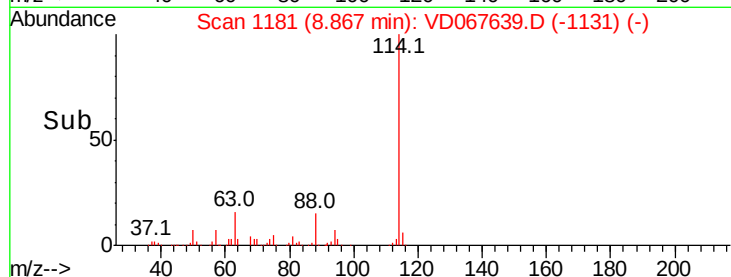
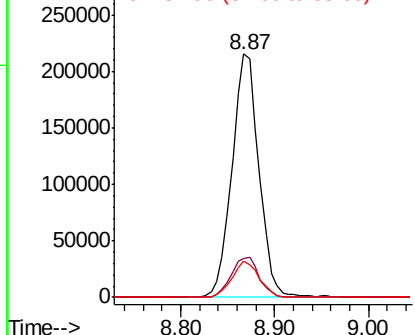
#34  
 1,4-Difluorobenzene  
 Concen: 50.000 ug/l  
 RT: 8.87 min Scan# 1181  
 Delta R.T. -0.01 min  
 Lab File: VD067639.D  
 Acq: 16 Nov 2020 14:29

Instrument :  
 MSVOA\_D  
 ClientSampleId :  
 SS-2

Tot Ion:114 Resp: 427335  
 Ion Ratio Lower Upper  
 114 100  
 63 16.1 0.0 35.0  
 88 14.7 0.0 33.0

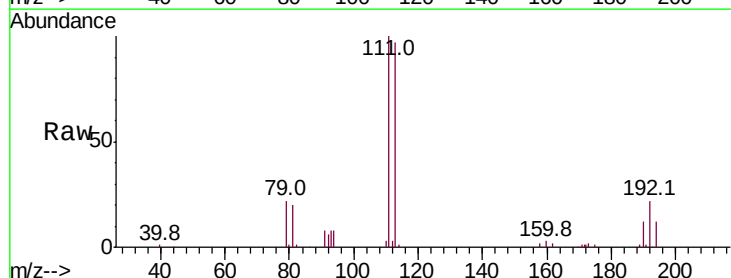


Abundance Ion 113.90 (113.60 to 114.60): V  
 Ion 63.00 (62.70 to 63.70): V  
 Ion 87.90 (87.60 to 88.60): V

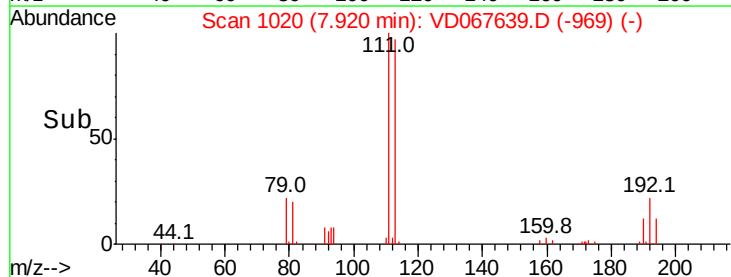
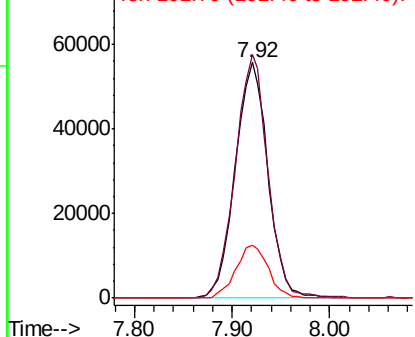


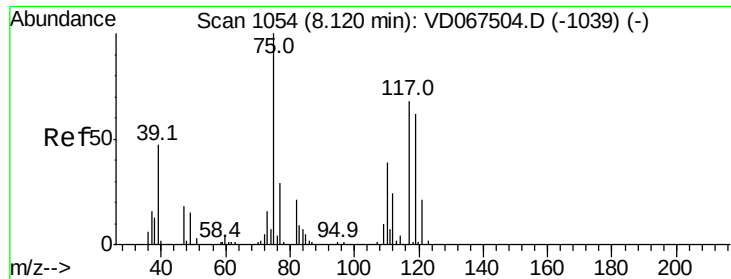
#35  
 Dibromofluoromethane  
 Concen: 50.723 ug/l  
 RT: 7.92 min Scan# 1020  
 Delta R.T. 0.00 min  
 Lab File: VD067639.D  
 Acq: 16 Nov 2020 14:29

Tgt Ion:113 Resp: 130595  
 Ion Ratio Lower Upper  
 113 100  
 111 102.7 80.0 120.0  
 192 22.3 16.3 24.5



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: 5.017 ug/l

RT: 7.99 min Scan# 1031

Delta R.T. -0.14 min

Lab File: VD067639.D

Acq: 16 Nov 2020 14:29

Instrument :

MSVOA\_D

ClientSampleID :

SS-2

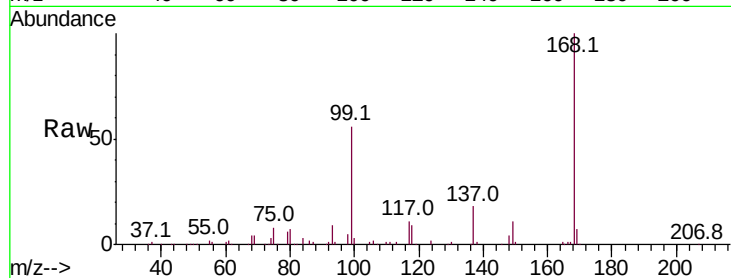
Tot Ion: 75 Resp: 18351

Ion Ratio Lower Upper

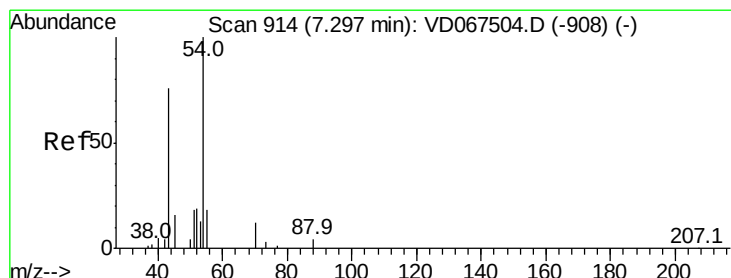
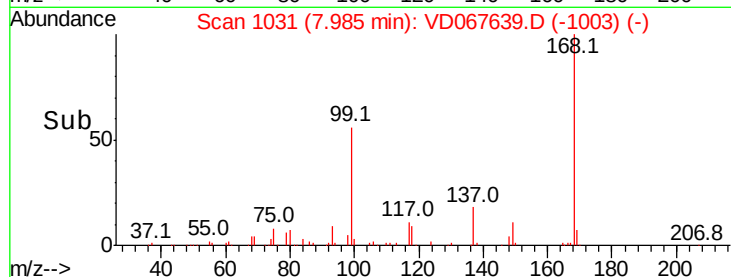
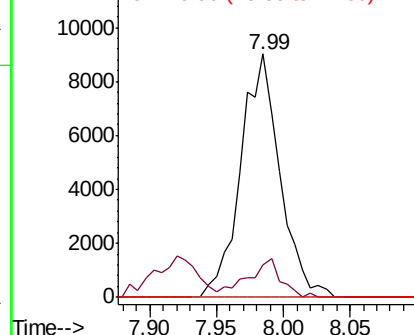
75 100

110 13.4 19.9 59.7#

77 0.0 24.8 37.2#



Abundance Ion 74.90 (74.60 to 75.60): VDC  
Ion 109.90 (109.60 to 110.60): VDC  
Ion 76.90 (76.60 to 77.60): VDC



#37

Ethyl Acetate

Concen: 1.076 ug/l

RT: 7.17 min Scan# 893

Delta R.T. -0.12 min

Lab File: VD067639.D

Acq: 16 Nov 2020 14:29

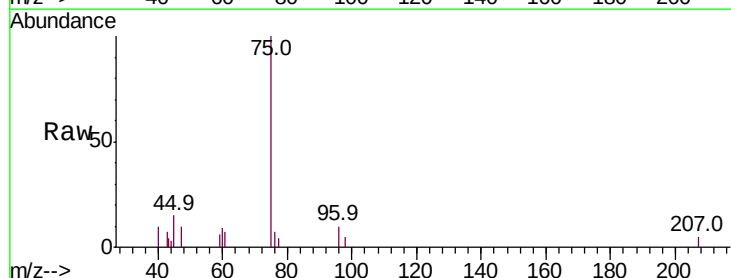
Tgt Ion: 43 Resp: 1022

Ion Ratio Lower Upper

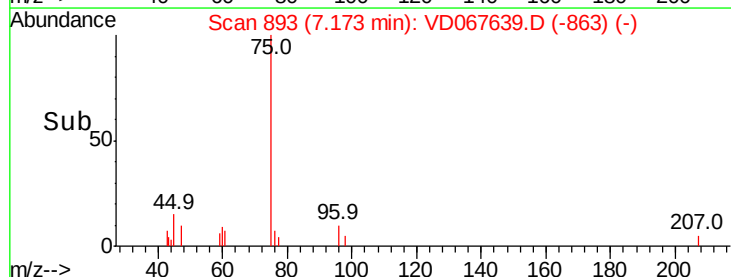
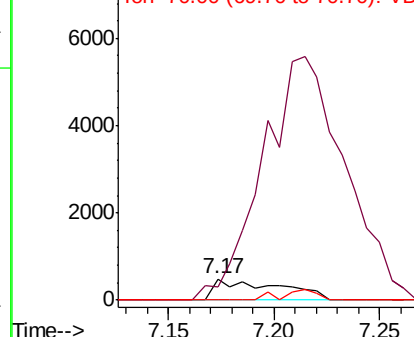
43 100

61 0.0 12.8 19.2#

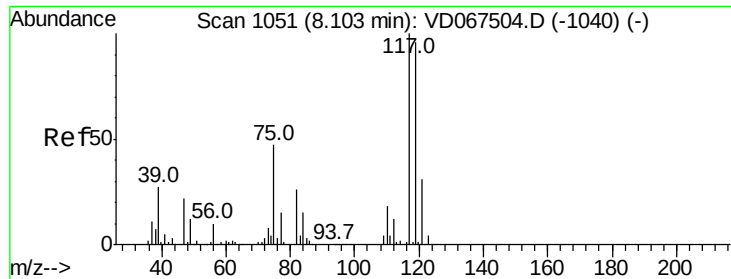
70 0.0 11.7 17.5#



Abundance Ion 43.00 (42.70 to 43.70): VDC  
Ion 60.90 (60.60 to 61.60): VDC  
Ion 70.00 (69.70 to 70.70): VDC



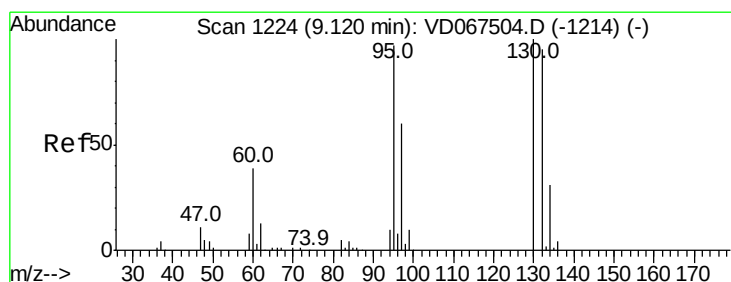
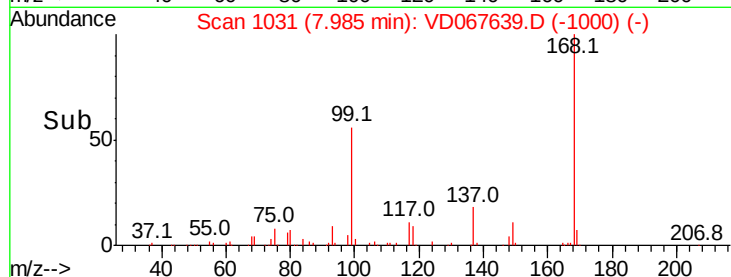
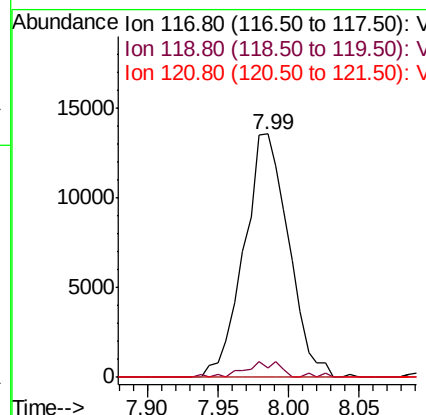
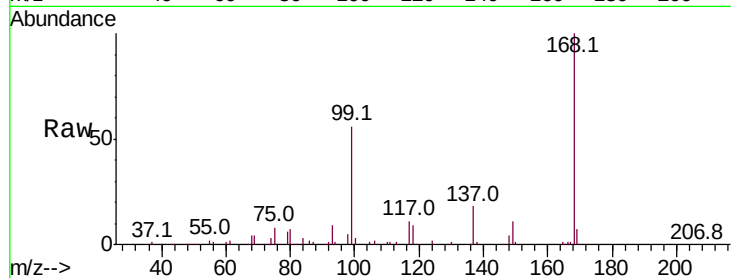




#38  
Carbon Tetrachloride  
Concen: 6.310 ug/l  
RT: 7.99 min Scan# 1031  
Delta R.T. -0.12 min  
Lab File: VD067639.D  
Acq: 16 Nov 2020 14:29

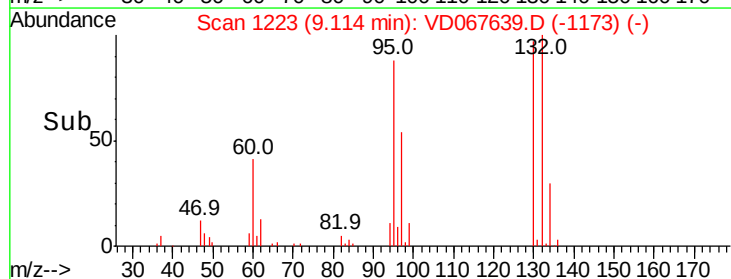
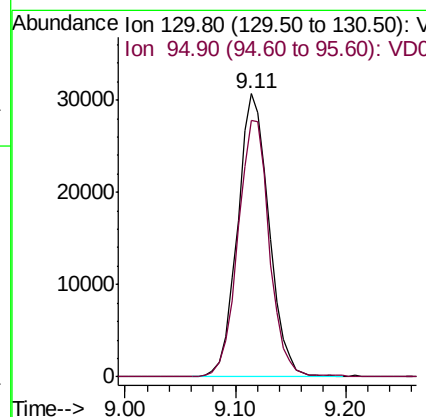
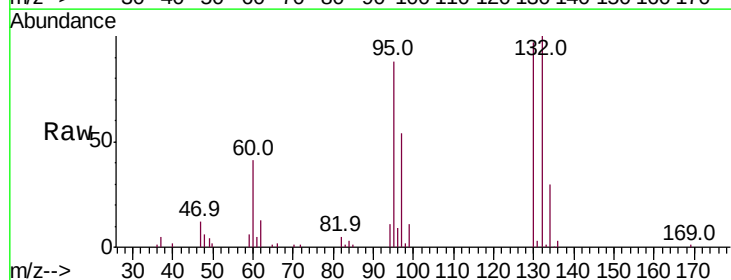
Instrument :  
MSVOA\_D  
ClientSampled :  
SS-2

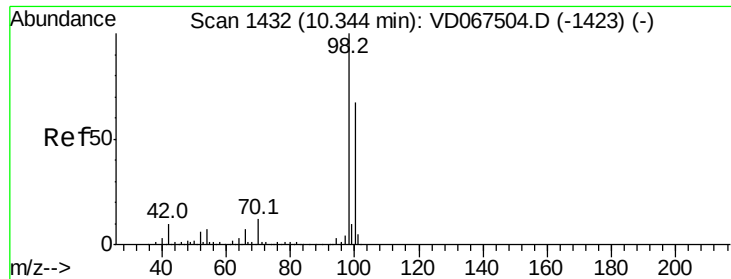
Tot Ion:117 Resp: 29990  
Ion Ratio Lower Upper  
117 100  
119 3.9 76.9 115.3#  
121 0.0 24.5 36.7#



#44  
Trichloroethene  
Concen: 18.873 ug/l  
RT: 9.11 min Scan# 1223  
Delta R.T. -0.01 min  
Lab File: VD067639.D  
Acq: 16 Nov 2020 14:29

Tgt Ion:130 Resp: 61489  
Ion Ratio Lower Upper  
130 100  
95 90.7 0.0 194.4

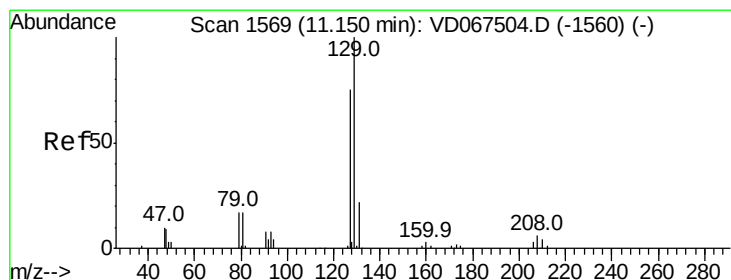
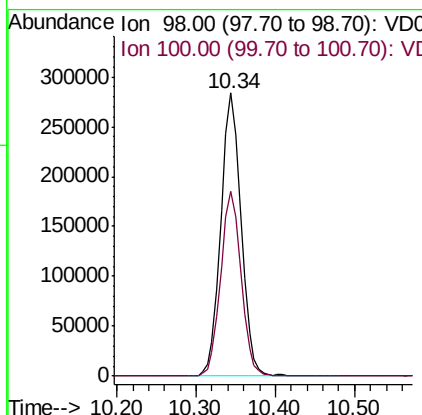
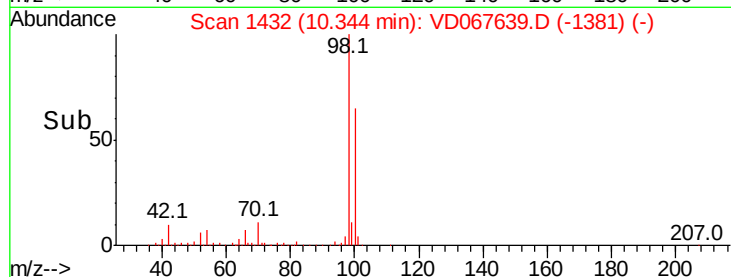
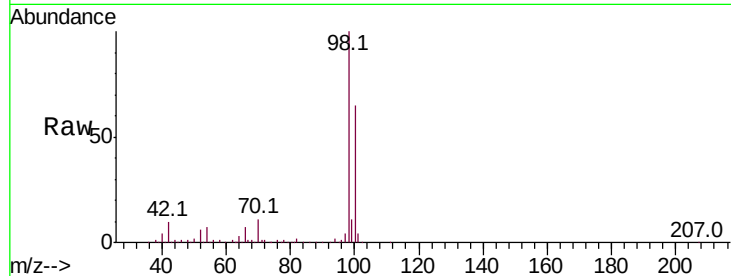




#50  
Toluene-d8  
Concen: 55.736 ug/l  
RT: 10.34 min Scan# 1432  
Delta R.T. 0.00 min  
Lab File: VD067639.D  
Acq: 16 Nov 2020 14:29

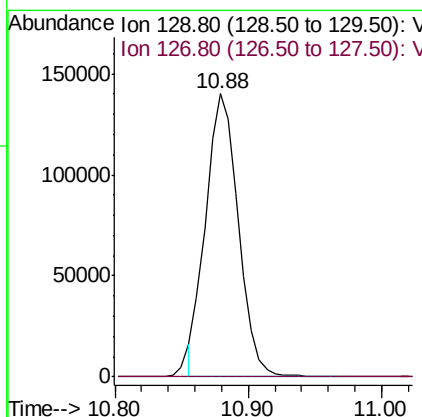
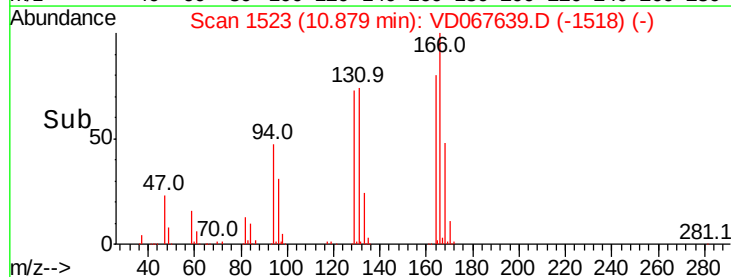
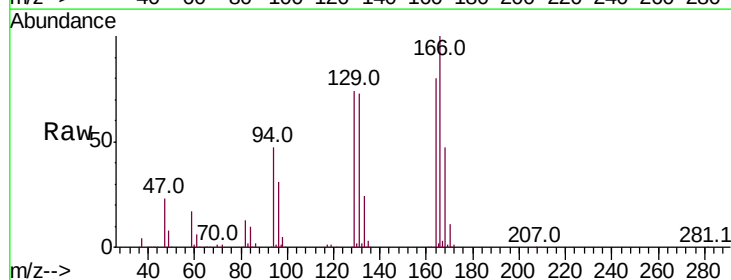
Instrument :  
MSVOA\_D  
ClientSampled :  
SS-2

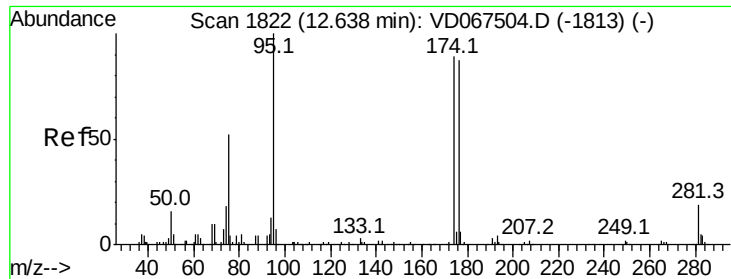
Tot Ion: 98 Resp: 504297  
Ion Ratio Lower Upper  
98 100  
100 65.5 53.0 79.6



#60  
Dibromochloromethane  
Concen: 89.798 ug/l  
RT: 10.88 min Scan# 1523  
Delta R.T. -0.27 min  
Lab File: VD067639.D  
Acq: 16 Nov 2020 14:29

Tgt Ion:129 Resp: 239401  
Ion Ratio Lower Upper  
129 100  
127 0.0 38.0 114.1#

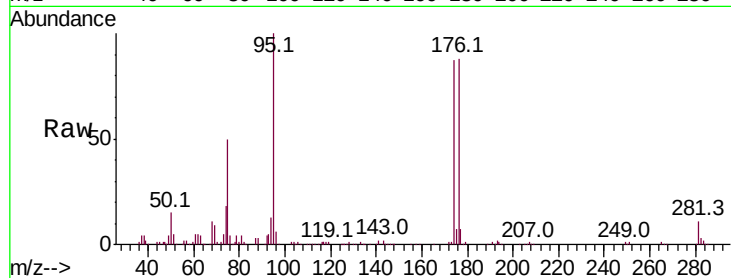




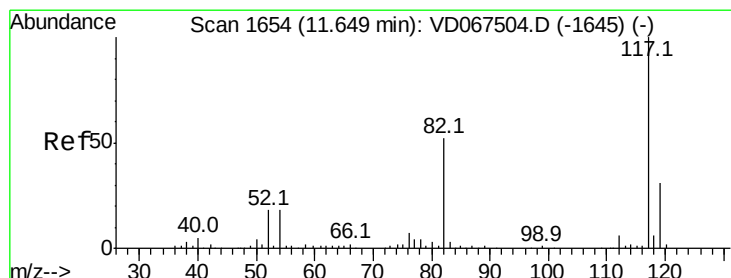
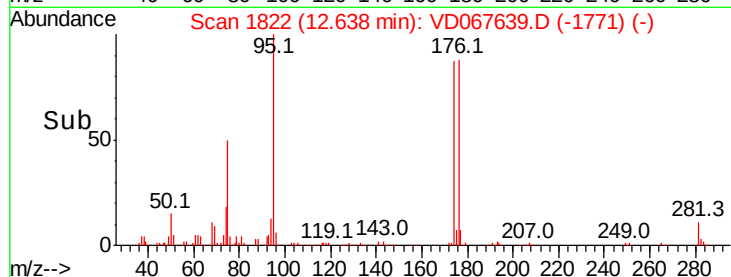
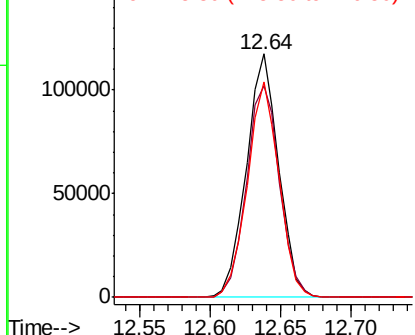
#62  
4-Bromofluorobenzene  
Concen: 60.169 ug/l  
RT: 12.64 min Scan# 1822  
Delta R.T. 0.00 min  
Lab File: VD067639.D  
Acq: 16 Nov 2020 14:29

Instrument :  
MSVOA\_D  
ClientSampled :  
SS-2

Tot Ion: 95 Resp: 187957  
Ion Ratio Lower Upper  
95 100  
174 89.4 0.0 177.8  
176 86.9 0.0 172.0

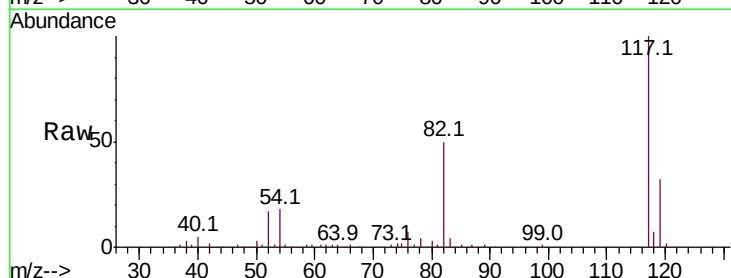


Abundance Ion 94.90 (94.60 to 95.60): V  
Ion 173.80 (173.50 to 174.50): V  
Ion 175.80 (175.50 to 176.50): V

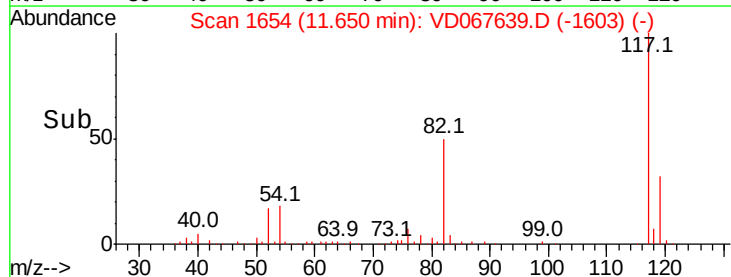
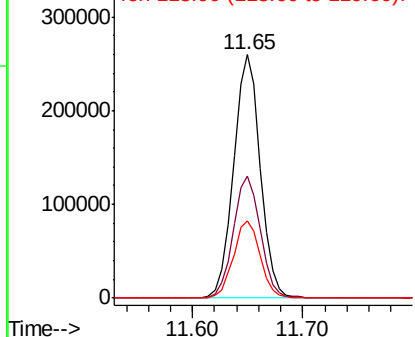


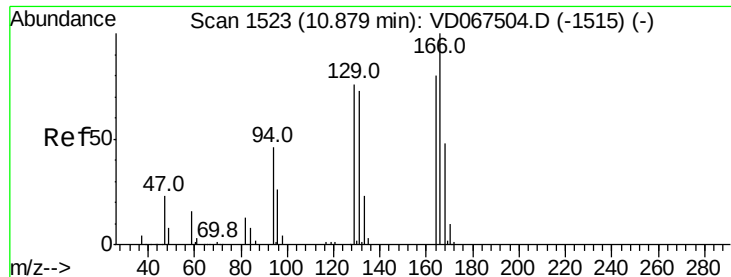
#63  
Chlorobenzene-d5  
Concen: 50.000 ug/l  
RT: 11.65 min Scan# 1654  
Delta R.T. 0.00 min  
Lab File: VD067639.D  
Acq: 16 Nov 2020 14:29

Tgt Ion: 117 Resp: 438506  
Ion Ratio Lower Upper  
117 100  
82 50.2 41.6 62.4  
119 31.9 25.1 37.7



Abundance Ion 116.90 (116.60 to 117.60): V  
Ion 82.00 (81.70 to 82.70): V  
Ion 118.90 (118.60 to 119.60): V

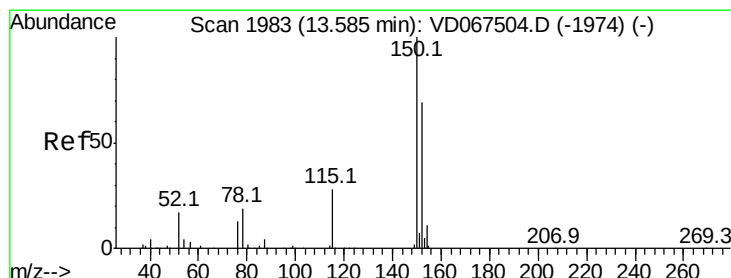
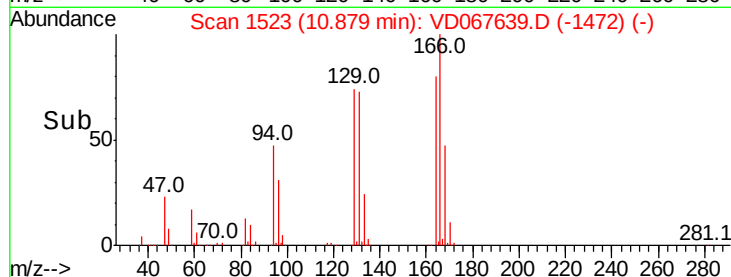
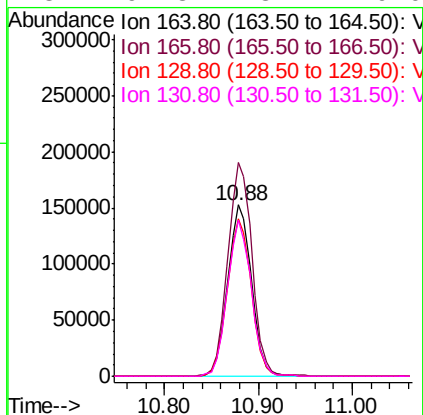
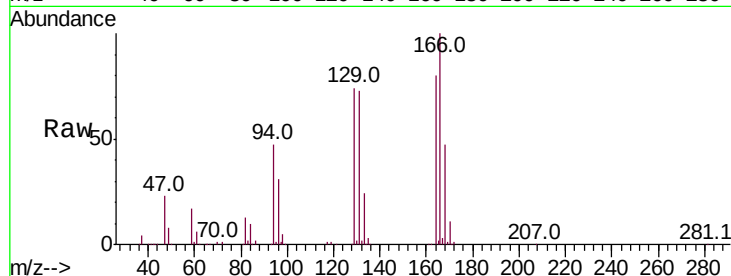




#64  
Tetrachloroethene  
Concen: 82.606 ug/l  
RT: 10.88 min Scan# 1523  
Delta R.T. 0.00 min  
Lab File: VD067639.D  
Acq: 16 Nov 2020 14:29

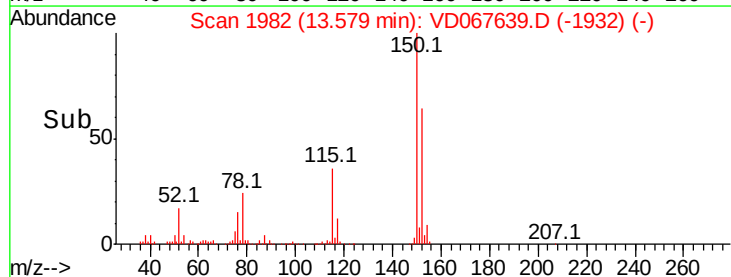
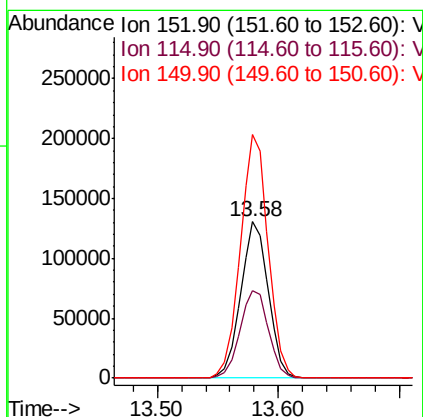
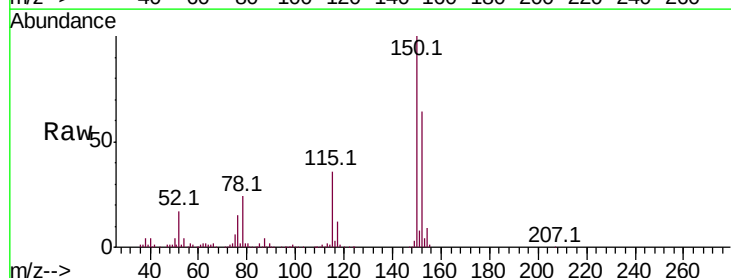
Instrument :  
MSVOA\_D  
ClientSampleId :  
SS-2

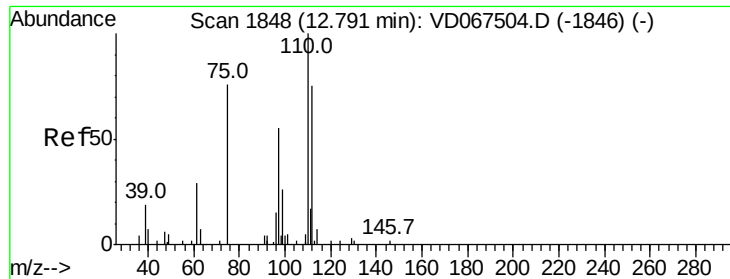
| Tot Ion | Ratio | Lower | Upper |
|---------|-------|-------|-------|
| 164     | 100   |       |       |
| 166     | 124.7 | 99.9  | 149.9 |
| 129     | 91.8  | 75.5  | 113.3 |
| 131     | 91.3  | 73.4  | 110.0 |



#72  
1,4-Dichlorobenzene-d4  
Concen: 50.000 ug/l  
RT: 13.58 min Scan# 1982  
Delta R.T. -0.01 min  
Lab File: VD067639.D  
Acq: 16 Nov 2020 14:29

| Tgt Ion | Ratio | Lower | Upper |
|---------|-------|-------|-------|
| 152     | 100   |       |       |
| 115     | 57.7  | 29.3  | 88.0  |
| 150     | 156.0 | 0.0   | 338.2 |





#76

1,2,3-Trichloropropane

Concen: 76.029 ug/l

RT: 12.64 min Scan# 1822

Delta R.T. -0.15 min

Lab File: VD067639.D

Acq: 16 Nov 2020 14:29

Instrument :

MSVOA\_D

ClientSampleId :

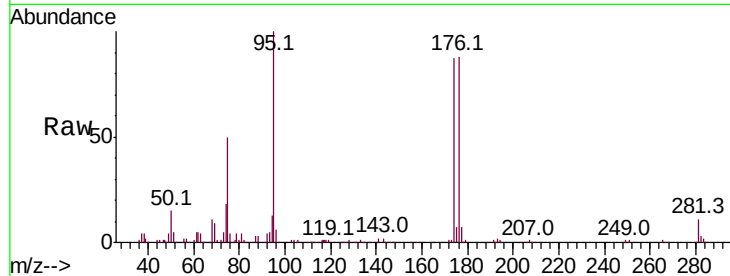
SS-2

Tot Ion: 75 Resp: 95340

Ion Ratio Lower Upper

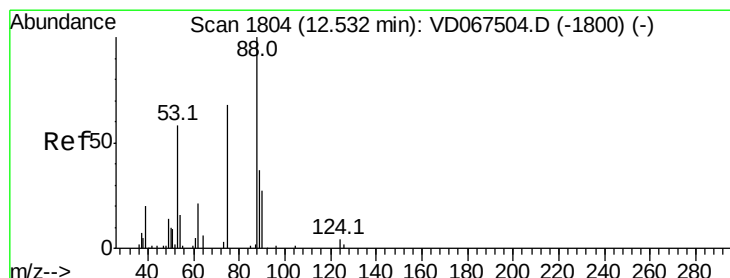
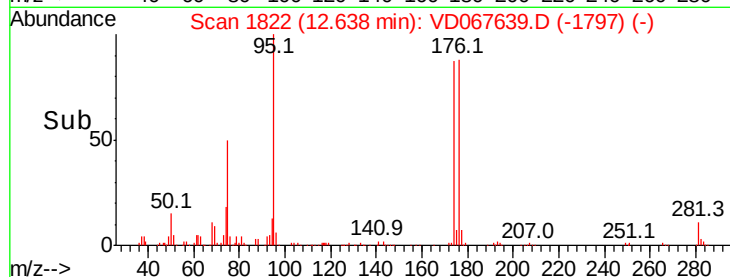
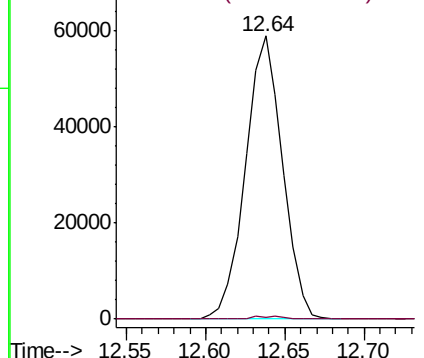
75 100

77 1.0 0.0 0.0#



Abundance Ion 74.90 (74.60 to 75.60): VDC

Ion 77.00 (76.70 to 77.70): VDC



#81

trans-1,4-Dichloro-2-butene

Concen: 154.358 ug/l

RT: 12.64 min Scan# 1822

Delta R.T. 0.11 min

Lab File: VD067639.D

Acq: 16 Nov 2020 14:29

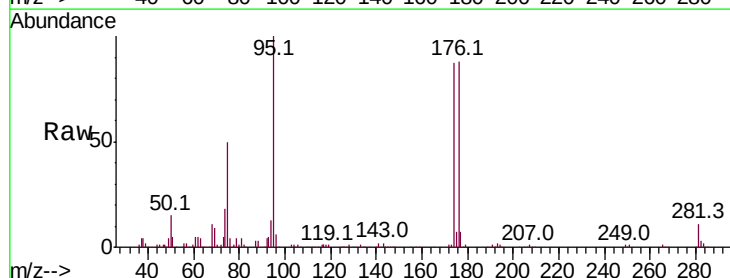
Tgt Ion: 75 Resp: 95340

Ion Ratio Lower Upper

75 100

53 0.1 75.9 113.9#

89 0.0 44.6 67.0#



Abundance Ion 74.90 (74.60 to 75.60): VDC

Ion 53.00 (52.70 to 53.70): VDC

Ion 88.90 (88.60 to 89.60): VDC

