

Data Path : Z:\VOASRV\HPCHEM1\MSVOA D\DATA\VD110718\  
 Data File : VD060297.D  
 Acq On : 7 Nov 2018 13:25  
 Operator : JC/SY  
 Sample : J5839-07  
 Misc : 5.99g/5ml/MSVOA D/SOIL  
 ALS Vial : 7 Sample Multiplier: 1

Instrument :  
 MSVOA\_D  
 ClientSampleId :

Quant Time: Nov 08 08:16:04 2018  
 Quant Method : Z:\VOASRV\HPCHEM1\MSVOA\_D\METHOD\82D110618S.M  
 Quant Title : SW846 8260  
 QLast Update : Tue Nov 06 13:56:04 2018  
 Response via : Initial Calibration

| Internal Standards         | R.T.  | QIon | Response | Conc  | Units | Dev(Min) |
|----------------------------|-------|------|----------|-------|-------|----------|
| 1) Pentafluorobenzene      | 6.40  | 168  | 1374527  | 50.00 | ug/l  | -0.02    |
| 34) 1,4-Difluorobenzene    | 7.45  | 114  | 1908332  | 50.00 | ug/l  | -0.01    |
| 63) Chlorobenzene-d5       | 11.29 | 117  | 1568931  | 50.00 | ug/l  | -0.01    |
| 72) 1,4-Dichlorobenzene-d4 | 13.37 | 152  | 772584   | 50.00 | ug/l  | -0.01    |

| System Monitoring Compounds | R.T.  | QIon | Response | Conc  | Units  | Dev(Min) |
|-----------------------------|-------|------|----------|-------|--------|----------|
| 33) 1,2-Dichloroethane-d4   | 6.79  | 65   | 394723   | 40.11 | ug/l   | -0.01    |
| Spiked Amount               |       |      | Recovery | =     | 80.22% |          |
| 35) Dibromofluoromethane    | 6.33  | 113  | 561497   | 39.46 | ug/l   | -0.01    |
| Spiked Amount               |       |      | Recovery | =     | 78.92% |          |
| 50) Toluene-d8              | 9.47  | 98   | 1524015  | 36.59 | ug/l   | 0.00     |
| Spiked Amount               |       |      | Recovery | =     | 73.18% |          |
| 62) 4-Bromofluorobenzene    | 12.43 | 95   | 559606   | 37.08 | ug/l   | -0.01    |
| Spiked Amount               |       |      | Recovery | =     | 74.16% |          |

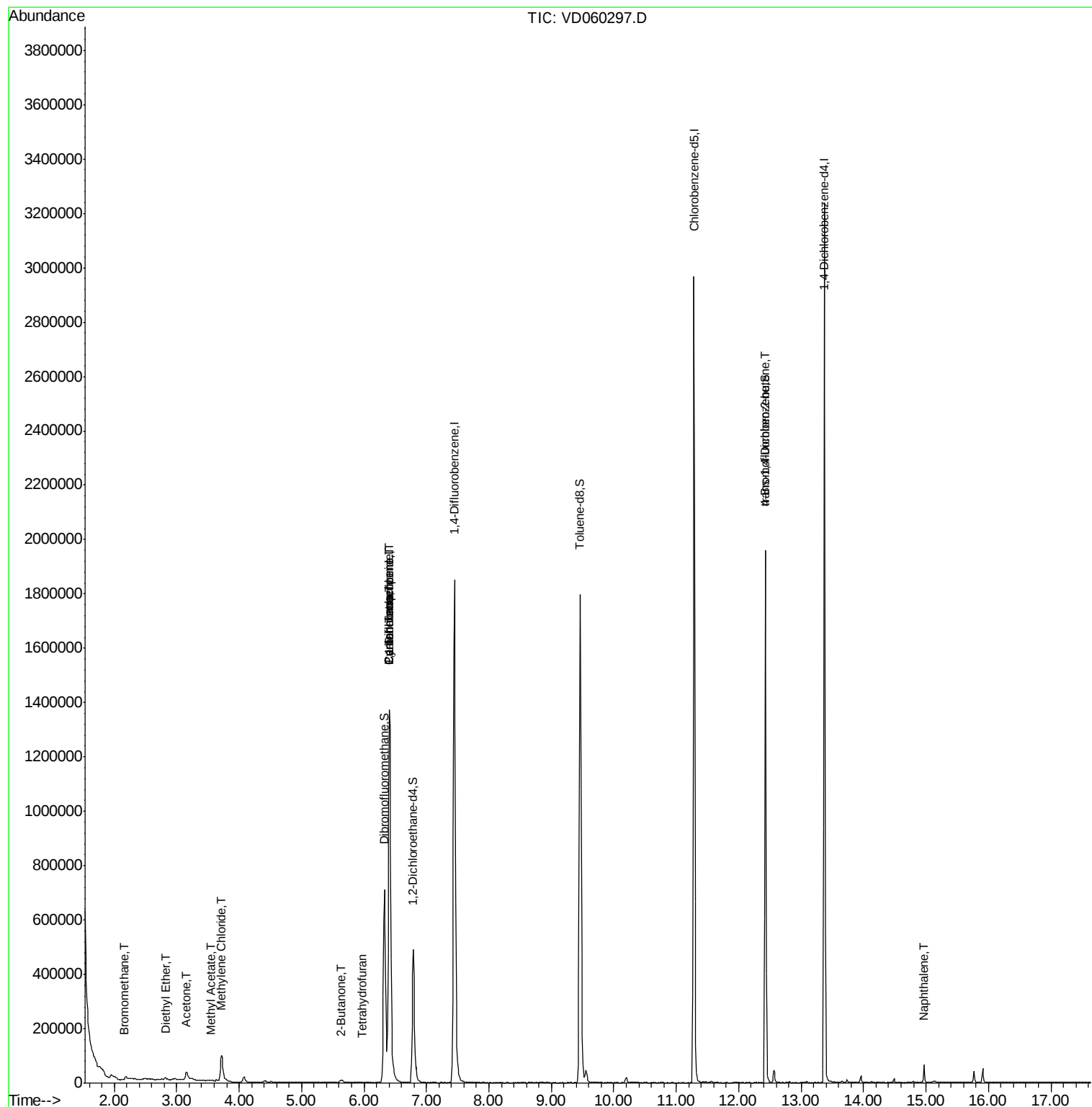
| Target Compounds               | R.T.  | QIon | Response | Conc      | Units  | Qvalue |
|--------------------------------|-------|------|----------|-----------|--------|--------|
| 2) Dichlorodifluoromethane     | 1.58  | 85   | 280      | Below Cal | #      | 41     |
| 5) Bromomethane                | 2.15  | 94   | 2649     | 1.05      | ug/l # | 79     |
| 8) Diethyl Ether               | 2.82  | 74   | 2641     | 1.16      | ug/l   | 80     |
| 16) Acetone                    | 3.16  | 43   | 60987    | 35.72     | ug/l   | 97     |
| 18) Methyl Acetate             | 3.55  | 43   | 7072     | 1.94      | ug/l # | 63     |
| 20) Methylene Chloride         | 3.72  | 84   | 65641    | 4.33      | ug/l   | 92     |
| 25) 2-Butanone                 | 5.62  | 43   | 16530    | 4.66      | ug/l   | 97     |
| 29) Tetrahydrofuran            | 5.97  | 42   | 2110     | 1.13      | ug/l # | 41     |
| 31) Cyclohexane                | 6.40  | 56   | 24650    | 1.05      | ug/l # | 1      |
| 36) 1,1-Dichloropropene        | 6.40  | 75   | 92266    | 4.89      | ug/l # | 46     |
| 38) Carbon Tetrachloride       | 6.40  | 117  | 106227   | 6.07      | ug/l # | 15     |
| 81) trans-1,4-Dichloro-2-buten | 12.43 | 75   | 223553   | 84.96     | ug/l # | 15     |
| 89) n-Butylbenzene             | 13.65 | 91   | 1070     | Below Cal | #      | 68     |
| 95) Naphthalene                | 14.98 | 128  | 46631    | 2.20      | ug/l # | 96     |

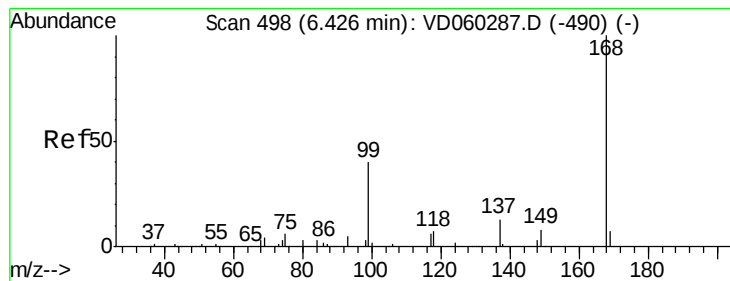
(#) = qualifier out of range (m) = manual integration (+) = signals summed

Data Path : Z:\V0ASRV\HPCHEM1\MSVOA D\DATA\VD110718\  
Data File : VD060297.D  
Acq On : 7 Nov 2018 13:25  
Operator : JC/SY  
Sample : J5839-07  
Misc : 5.99µl/5ml/MSVOA D/SOIL  
ALS Vial : 7 Sample Multiplier: 1

Instrument :  
MSVOA\_D  
ClientSampleId :

Quant Time: Nov 08 08:16:04 2018  
Quant Method : Z:\V0ASRV\HPCHEM1\MSVOA\_D\METHOD\82D110618S.M  
Quant Title : SW846 8260  
QLast Update : Tue Nov 06 13:56:04 2018  
Response via : Initial Calibration





#1

Pentafluorobenzene

Concen: 50.00 ug/l

RT: 6.40 min Scan# 496

Delta R.T. -0.02 min

Lab File: VD060297.D

Acq: 7 Nov 2018 13:25

Instrument :

MSVOA\_D

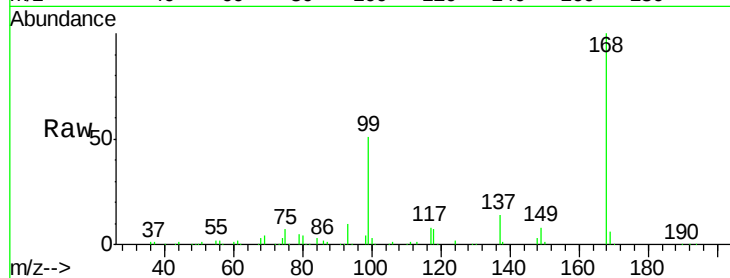
ClientSampleId :

Tot Ion:168 Resp: 1374527

Ion Ratio Lower Upper

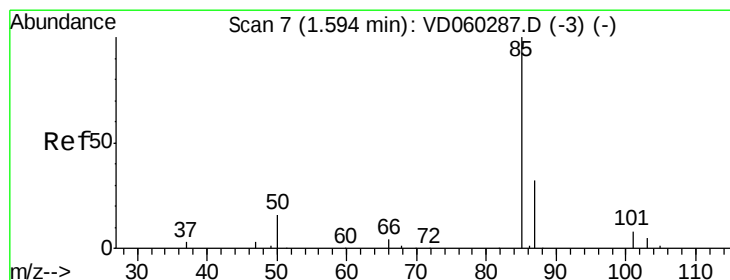
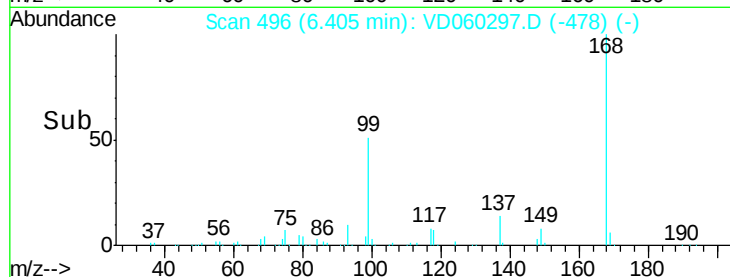
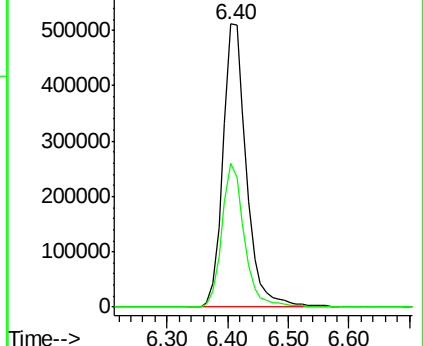
168 100

99 50.8 39.8 59.8



Abundance Ion 167.90 (167.60 to 168.60):

Ion 98.95 (98.65 to 99.65): VD



#2

Dichlorodifluoromethane

Concen: Below Cal

RT: 1.58 min Scan# 6

Delta R.T. -0.01 min

Lab File: VD060297.D

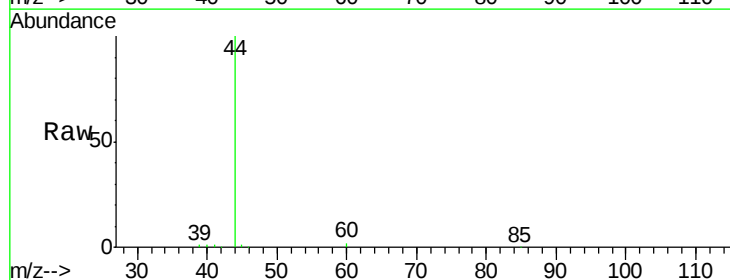
Acq: 7 Nov 2018 13:25

Tgt Ion: 85 Resp: 280

Ion Ratio Lower Upper

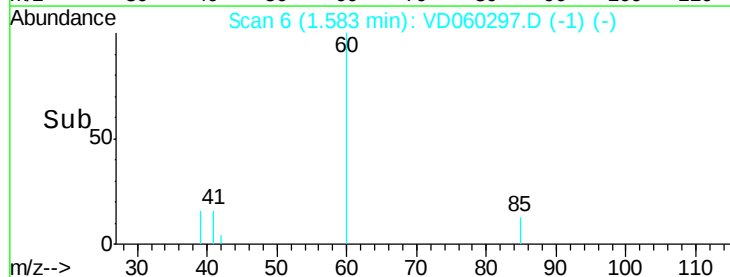
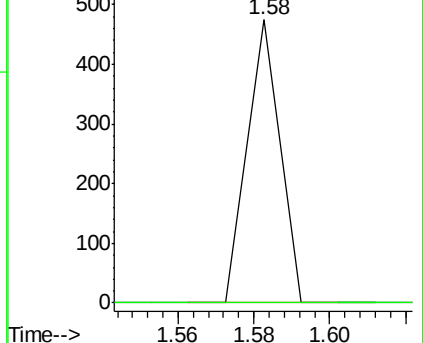
85 100

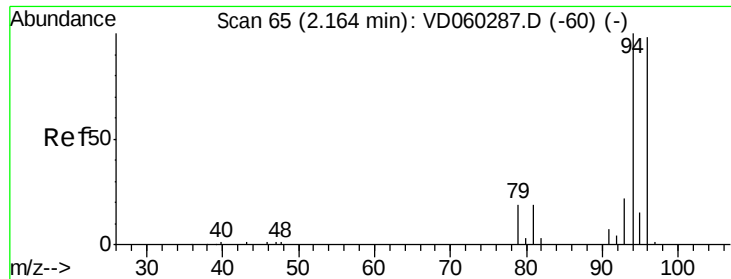
87 0.0 16.8 50.4#



Abundance Ion 84.95 (84.65 to 85.65): VD

Ion 86.90 (86.60 to 87.60): VD

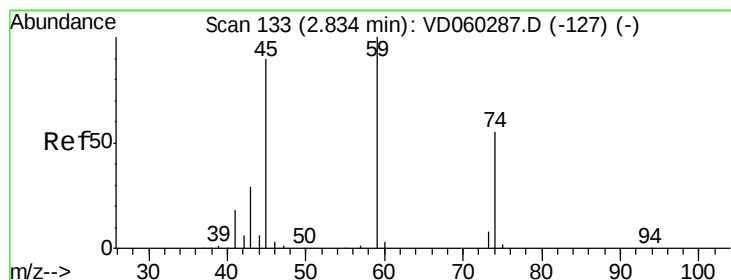
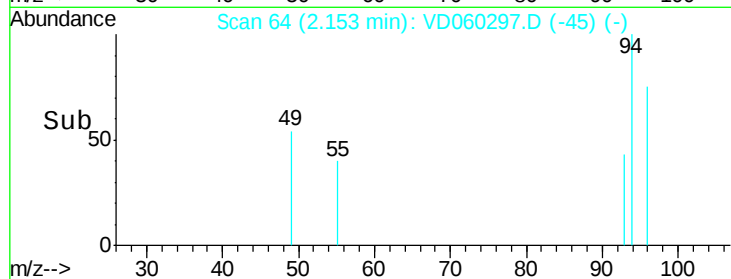
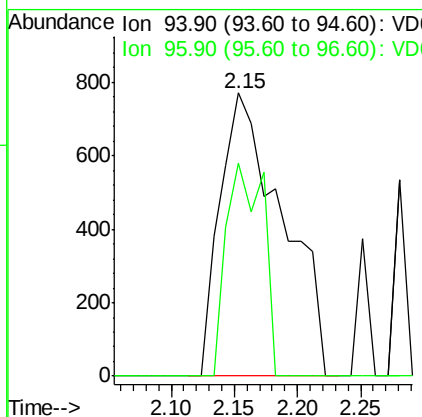
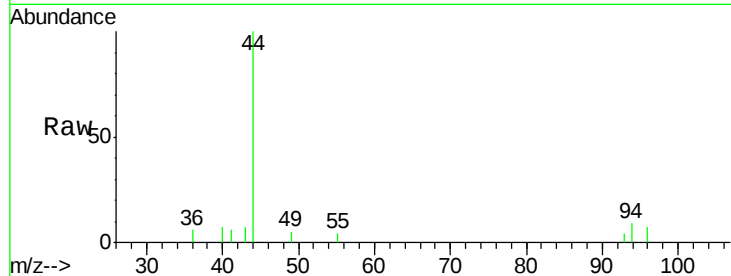




#5  
Bromomethane  
Concen: 1.05 ug/l  
RT: 2.15 min Scan# 64  
Delta R.T. -0.01 min  
Lab File: VD060297.D  
Acq: 7 Nov 2018 13:25

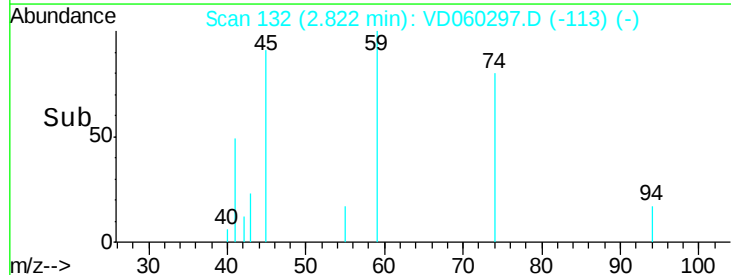
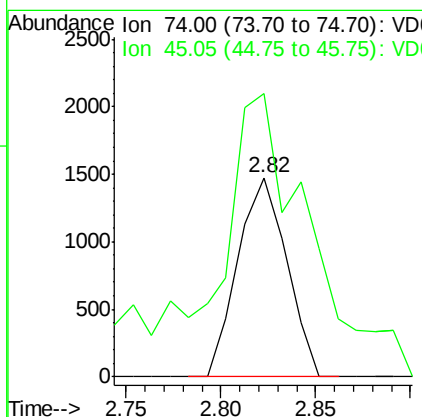
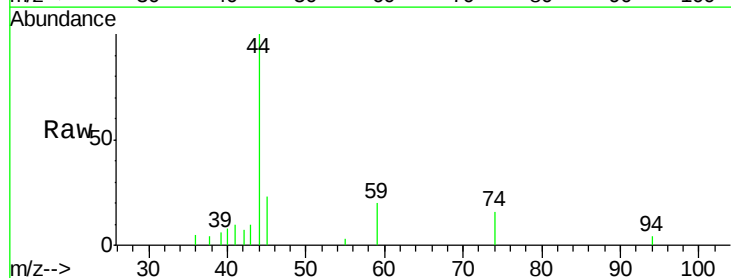
Instrument :  
MSVOA\_D  
ClientSampled :

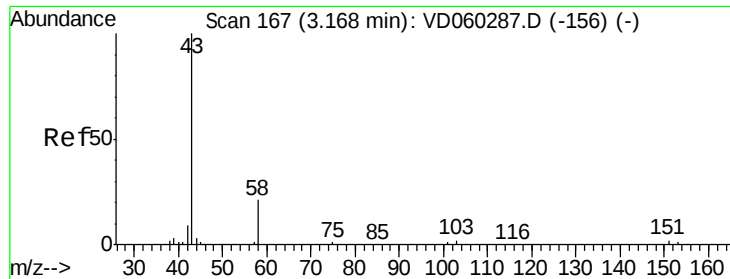
Tot Ion: 94 Resp: 2649  
Ion Ratio Lower Upper  
94 100  
96 75.2 76.6 114.8#



#8  
Diethyl Ether  
Concen: 1.16 ug/l  
RT: 2.82 min Scan# 132  
Delta R.T. -0.01 min  
Lab File: VD060297.D  
Acq: 7 Nov 2018 13:25

Tgt Ion: 74 Resp: 2641  
Ion Ratio Lower Upper  
74 100  
45 141.9 84.8 254.4





#16

Acetone

Concen: 35.72 ug/l

RT: 3.16 min Scan# 166

Delta R.T. -0.01 min

Lab File: VD060297.D

Acq: 7 Nov 2018 13:25

Instrument :

MSVOA\_D

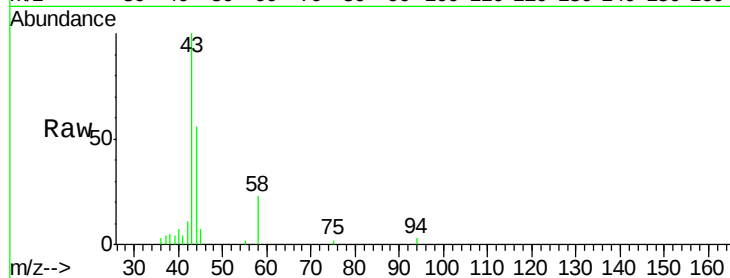
ClientSampled :

Tot Ion: 43 Resp: 60987

Ion Ratio Lower Upper

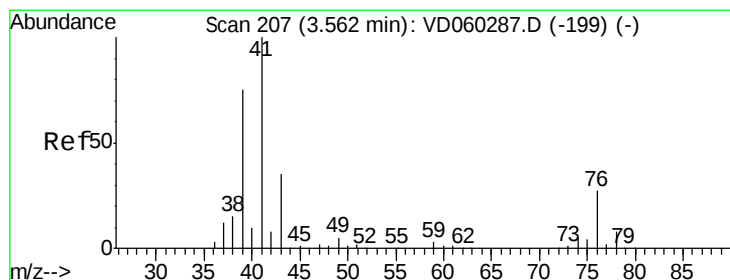
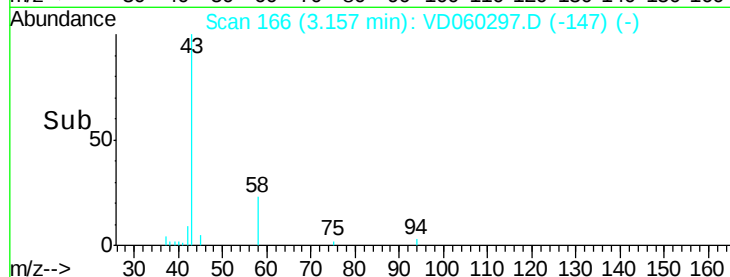
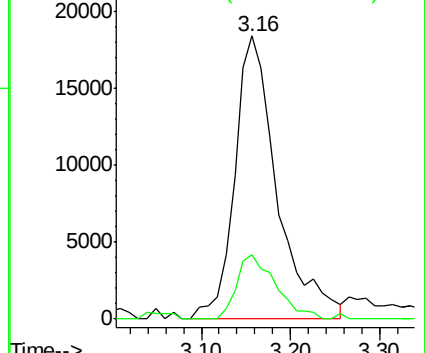
43 100

58 22.6 16.9 25.3



Abundance Ion 42.95 (42.65 to 43.65): VD

Ion 57.95 (57.65 to 58.65): VD



#18

Methyl Acetate

Concen: 1.94 ug/l

RT: 3.55 min Scan# 206

Delta R.T. -0.01 min

Lab File: VD060297.D

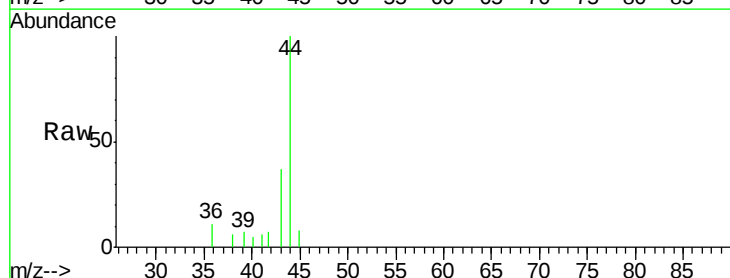
Acq: 7 Nov 2018 13:25

Tgt Ion: 43 Resp: 7072

Ion Ratio Lower Upper

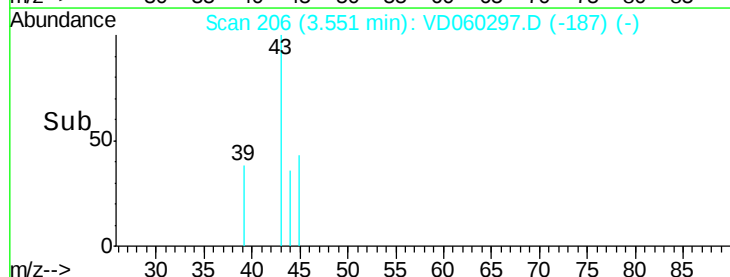
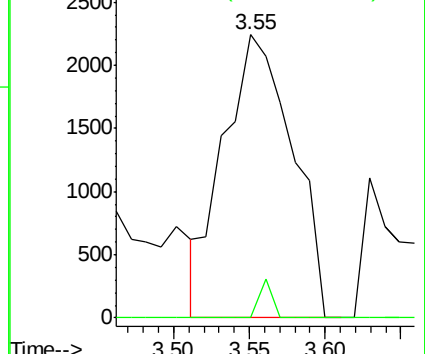
43 100

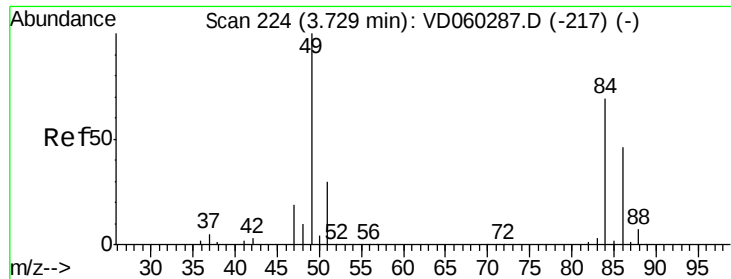
74 0.0 12.4 18.6#



Abundance Ion 42.95 (42.65 to 43.65): VD

Ion 74.00 (73.70 to 74.70): VD

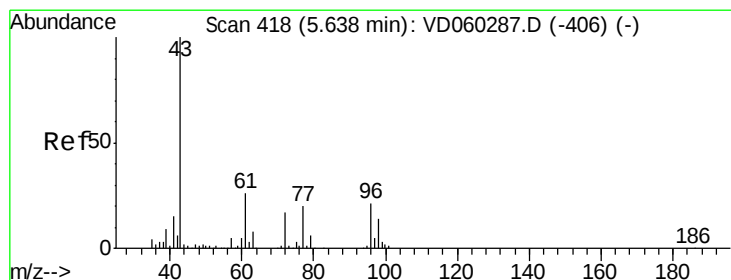
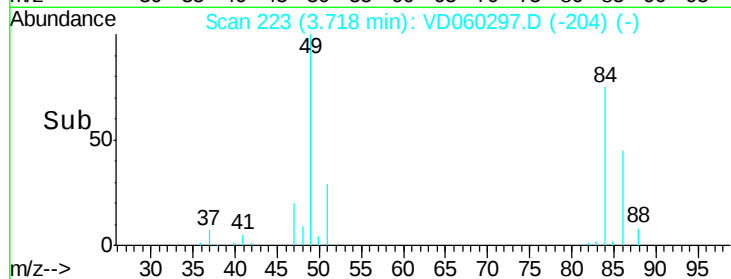
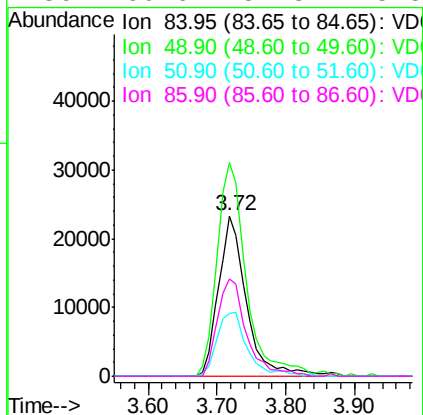
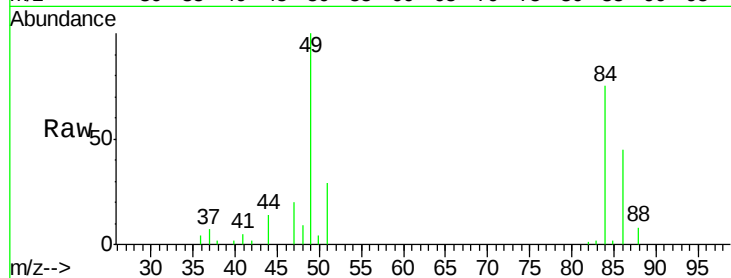




#20  
Methvlene Chloride  
Concen: 4.33 ug/l  
RT: 3.72 min Scan# 223  
Delta R.T. -0.01 min  
Lab File: VD060297.D  
Acq: 7 Nov 2018 13:25

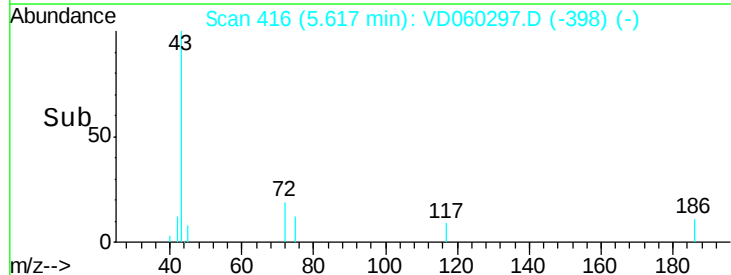
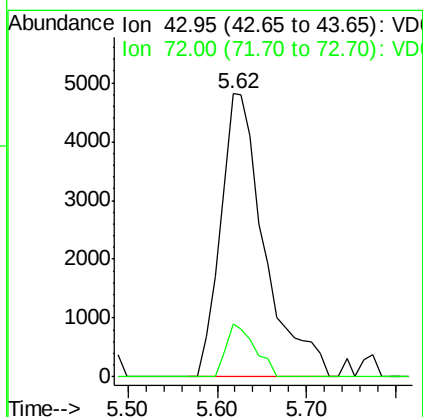
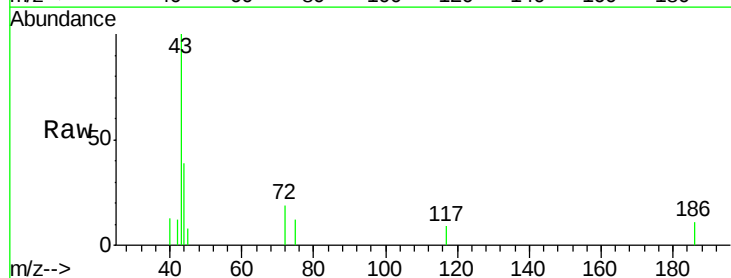
Instrument :  
MSVOA\_D  
ClientSampleId :

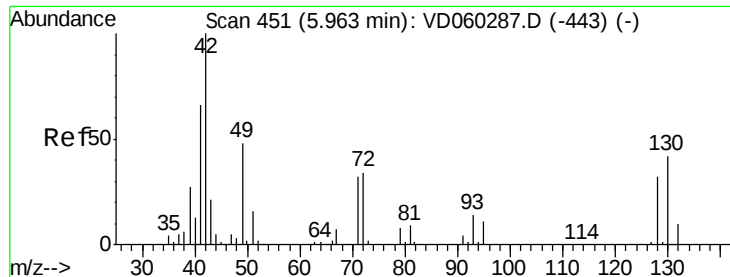
Tot Ion: 84 Resp: 65641  
Ion Ratio Lower Upper  
84 100  
49 133.3 115.6 173.4  
51 38.8 35.6 53.4  
86 60.6 52.3 78.5



#25  
2-Butanone  
Concen: 4.66 ug/l  
RT: 5.62 min Scan# 416  
Delta R.T. -0.02 min  
Lab File: VD060297.D  
Acq: 7 Nov 2018 13:25

Tgt Ion: 43 Resp: 16530  
Ion Ratio Lower Upper  
43 100  
72 18.5 13.8 20.8

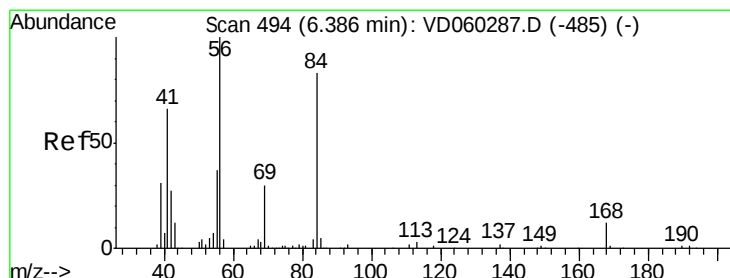
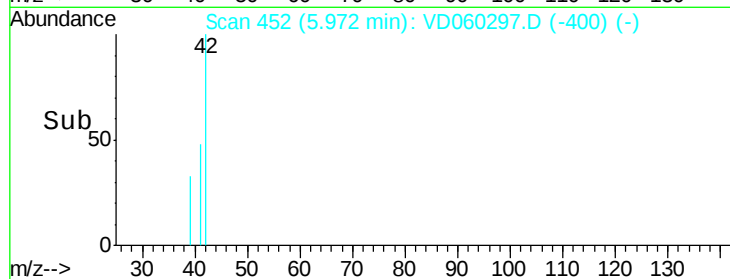
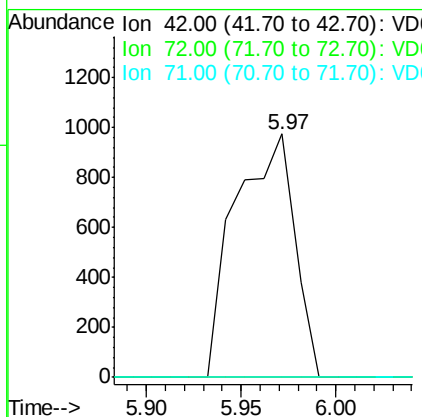
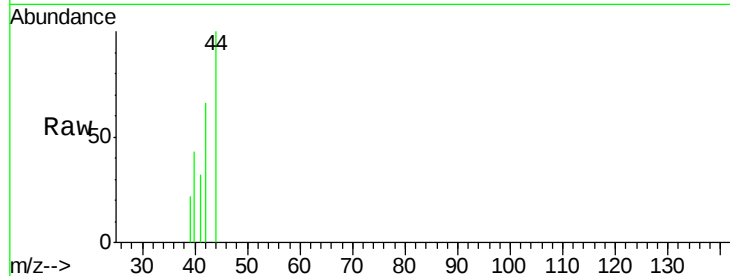




#29  
Tetrahydrofuran  
Concen: 1.13 ug/l  
RT: 5.97 min Scan# 452  
Delta R.T. 0.01 min  
Lab File: VD060297.D  
Acq: 7 Nov 2018 13:25

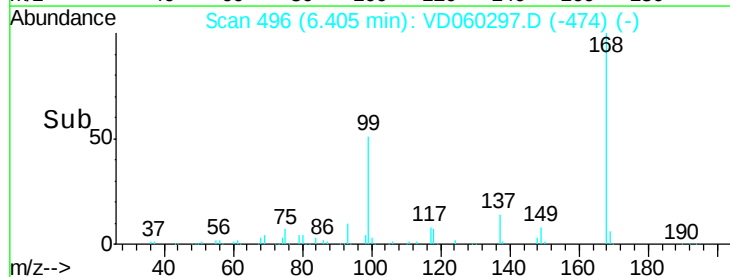
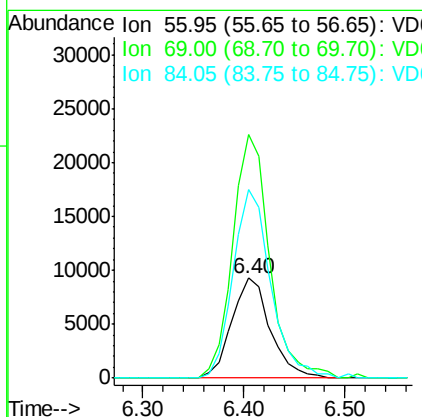
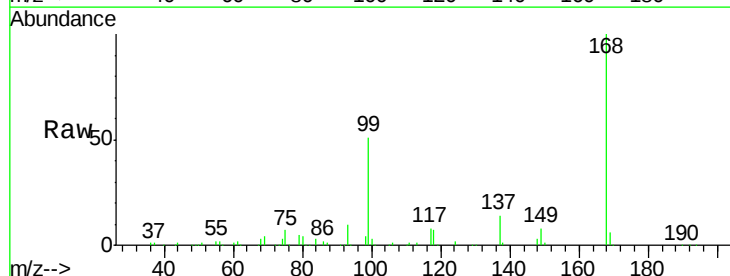
Instrument :  
MSVOA\_D  
ClientSampleId :

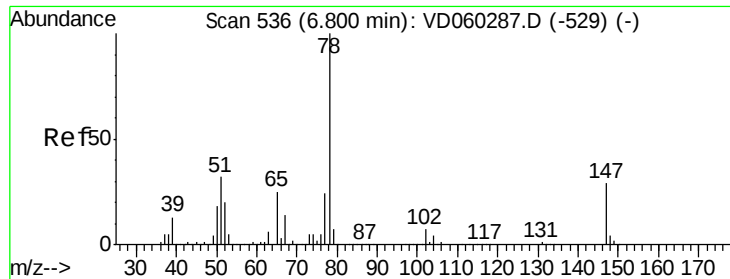
Tot Ion: 42 Resp: 2110  
Ion Ratio Lower Upper  
42 100  
72 0.0 27.6 41.4#  
71 0.0 26.5 39.7#



#31  
Cyclohexane  
Concen: 1.05 ug/l  
RT: 6.40 min Scan# 496  
Delta R.T. 0.02 min  
Lab File: VD060297.D  
Acq: 7 Nov 2018 13:25

Tgt Ion: 56 Resp: 24650  
Ion Ratio Lower Upper  
56 100  
69 244.1 22.2 33.2#  
84 189.5 63.0 94.4#

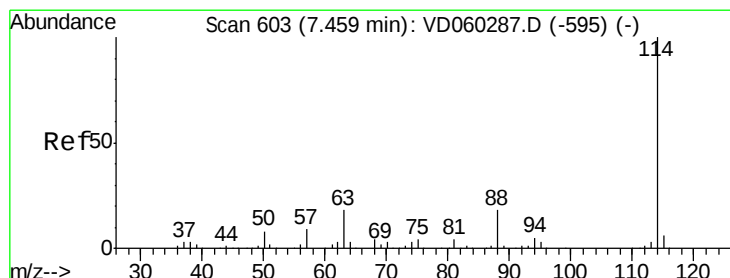
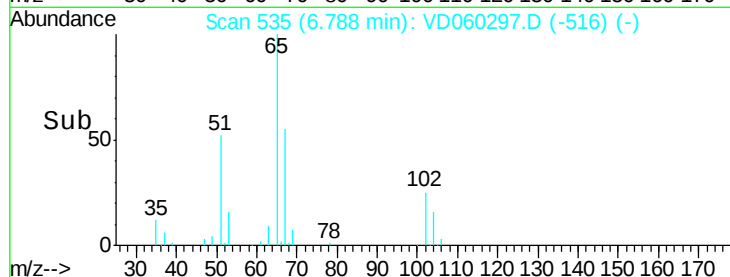
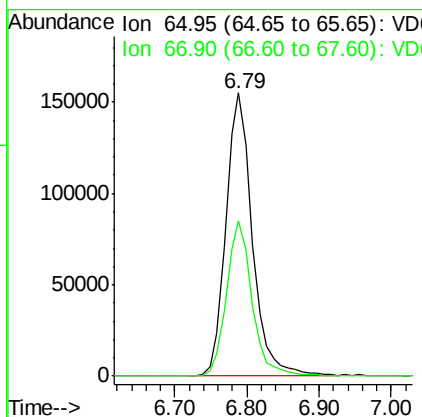
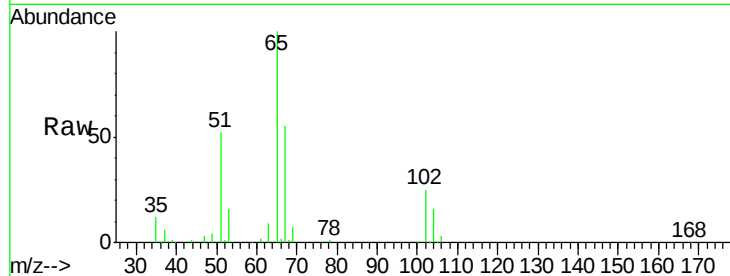




#33  
 1,2-Dichloroethane-d4  
 Concen: N.D. ug/l  
 RT: 6.79 min Scan# 535  
 Delta R.T. -0.01 min  
 Lab File: VD060297.D  
 Acq: 7 Nov 2018 13:25

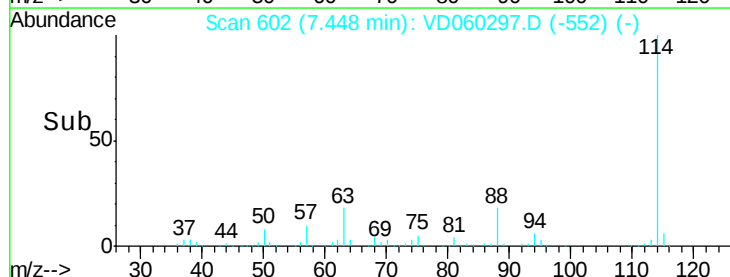
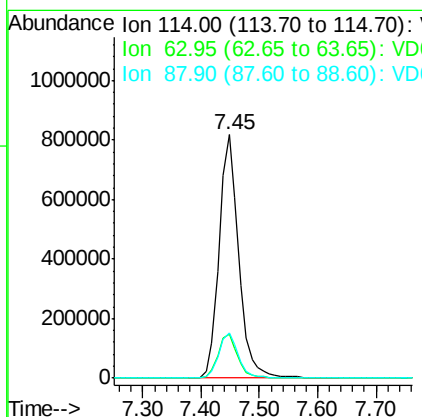
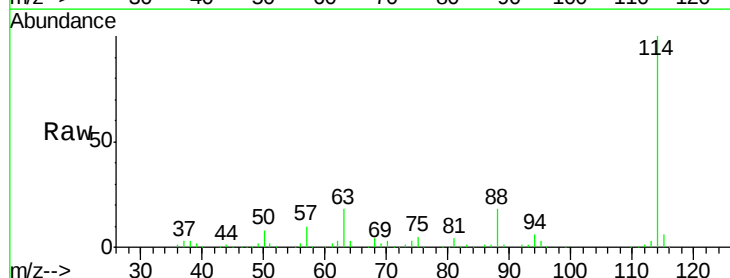
Instrument :  
 MSVOA\_D  
 ClientSampleId :

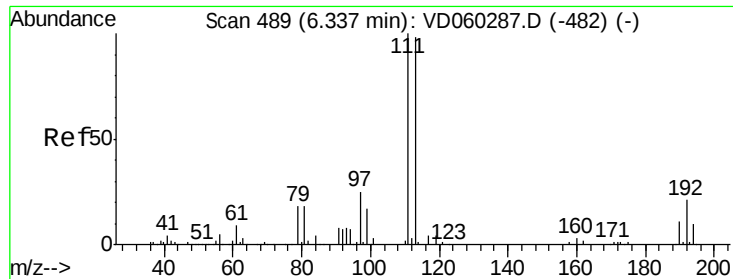
Tot Ion: 65 Resp: 394723  
 Ion Ratio Lower Upper  
 65 100  
 67 54.9 0.0 109.8



#34  
 1,4-Difluorobenzene  
 Concen: 50.00 ug/l  
 RT: 7.45 min Scan# 602  
 Delta R.T. -0.01 min  
 Lab File: VD060297.D  
 Acq: 7 Nov 2018 13:25

Tgt Ion: 114 Resp: 1908332  
 Ion Ratio Lower Upper  
 114 100  
 63 18.2 0.0 34.0  
 88 18.4 0.0 35.4





#35

Dibromofluoromethane

Concen: 50.00 ug/l

RT: 6.33 min Scan# 488

Delta R.T. -0.01 min

Lab File: VD060297.D

Acq: 7 Nov 2018 13:25

Instrument :

MSVOA\_D

ClientSampled :

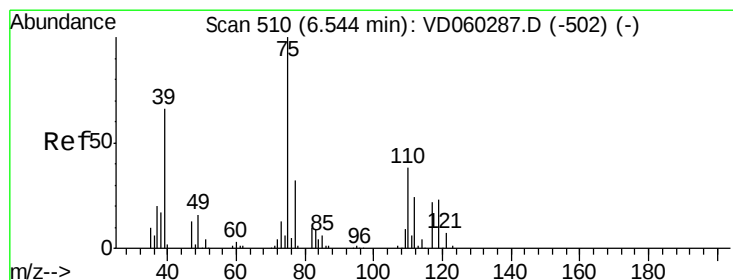
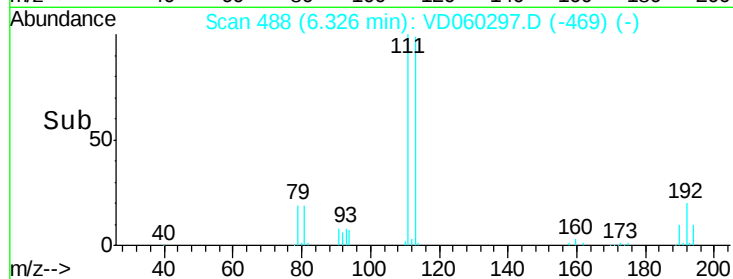
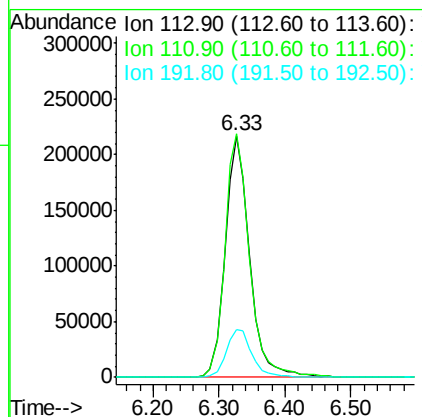
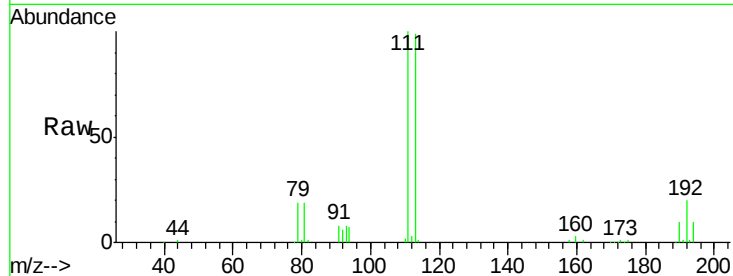
Tot Ion:113 Resp: 561497

Ion Ratio Lower Upper

113 100

111 100.9 81.6 122.4

192 19.8 16.5 24.7



#36

1,1-Dichloropropene

Concen: 4.89 ug/l

RT: 6.40 min Scan# 496

Delta R.T. -0.14 min

Lab File: VD060297.D

Acq: 7 Nov 2018 13:25

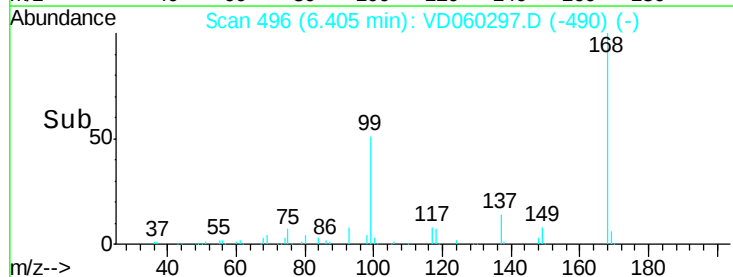
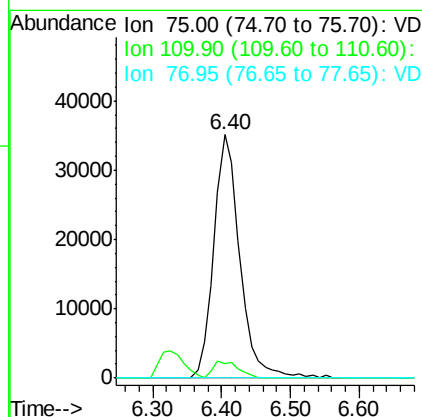
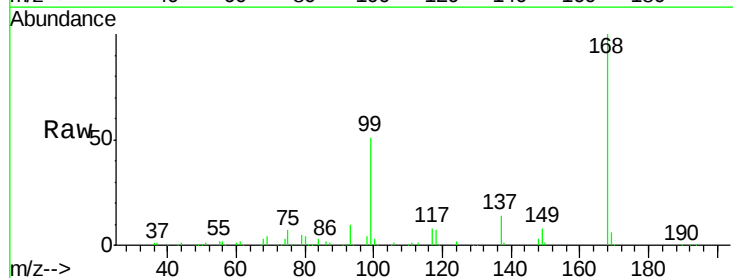
Tgt Ion: 75 Resp: 92266

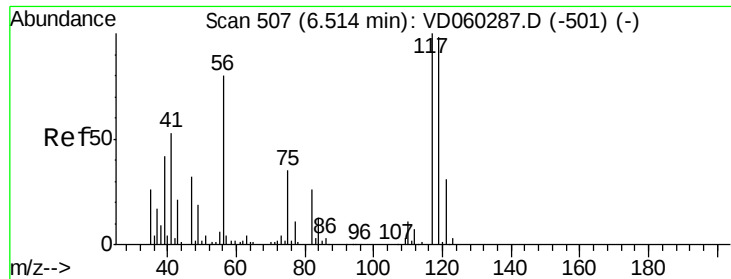
Ion Ratio Lower Upper

75 100

110 6.2 18.0 54.0#

77 0.0 25.6 38.4#

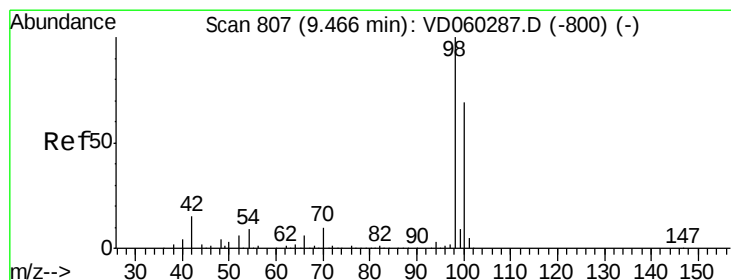
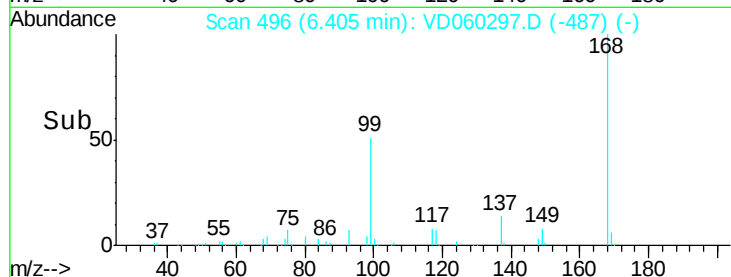
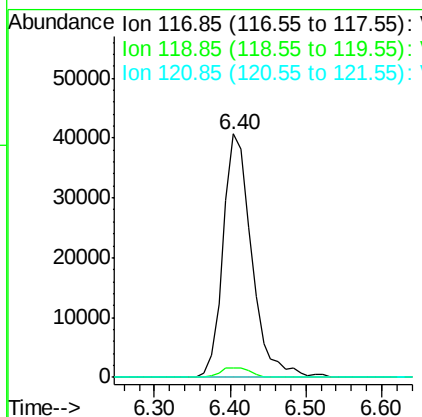
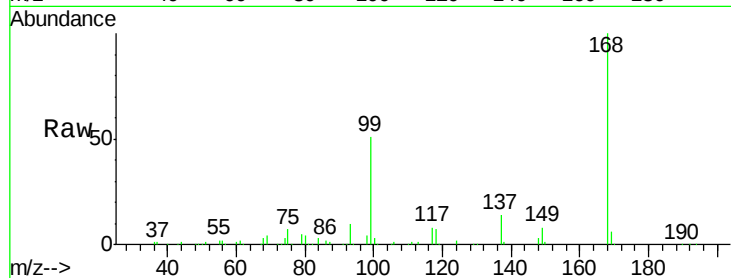




#38  
Carbon Tetrachloride  
Concen: 6.07 ug/l  
RT: 6.40 min Scan# 496  
Delta R.T. -0.11 min  
Lab File: VD060297.D  
Acq: 7 Nov 2018 13:25

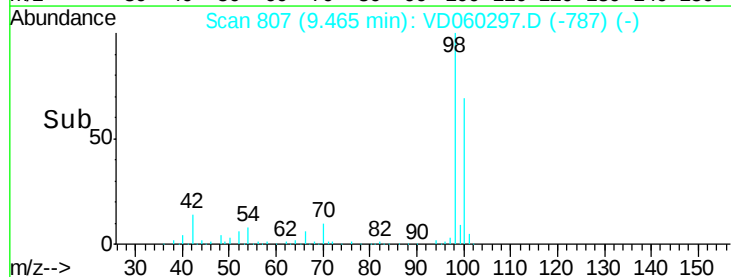
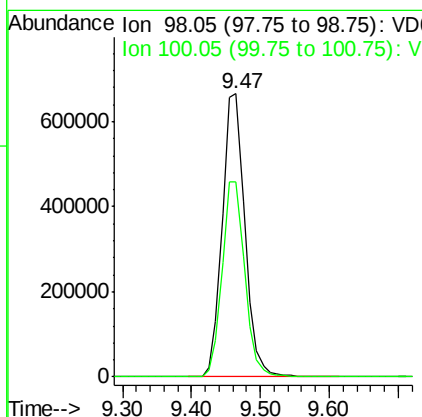
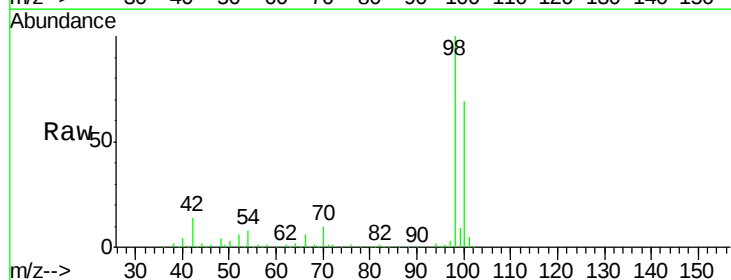
Instrument :  
MSVOA\_D  
ClientSampleId :

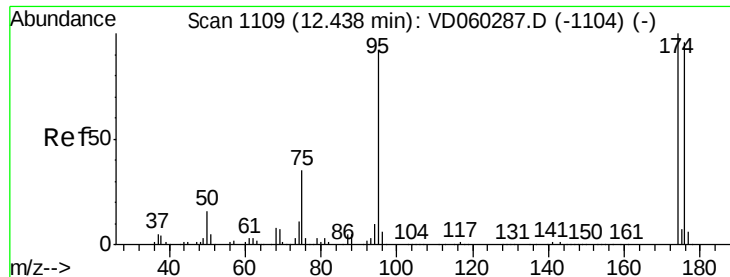
Tot Ion:117 Resp: 106227  
Ion Ratio Lower Upper  
117 100  
119 4.0 76.6 115.0#  
121 0.0 24.3 36.5#



#50  
Toluene-d8  
Concen: N.D. ug/l  
RT: 9.47 min Scan# 807  
Delta R.T. -0.00 min  
Lab File: VD060297.D  
Acq: 7 Nov 2018 13:25

Tgt Ion: 98 Resp: 1524015  
Ion Ratio Lower Upper  
98 100  
100 68.8 55.2 82.8





#62

4-Bromofluorobenzene

Concen: N.D. ug/l

RT: 12.43 min Scan# 1108

Delta R.T. -0.01 min

Lab File: VD060297.D

Acq: 7 Nov 2018 13:25

Instrument :

MSVOA\_D

ClientSampleId :

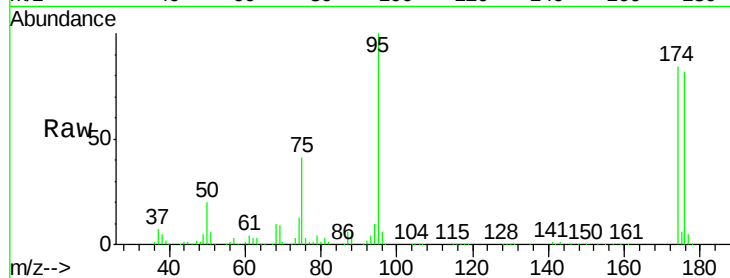
Tot Ion: 95 Resp: 559606

Ion Ratio Lower Upper

95 100

174 83.9 0.0 160.8

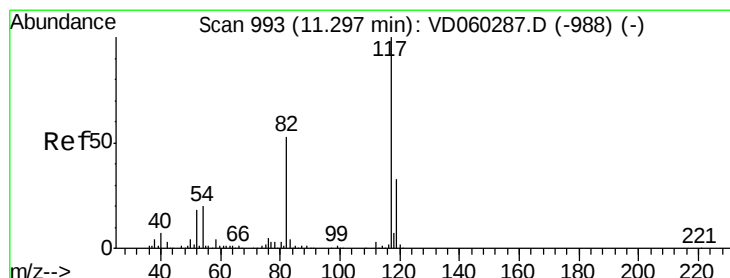
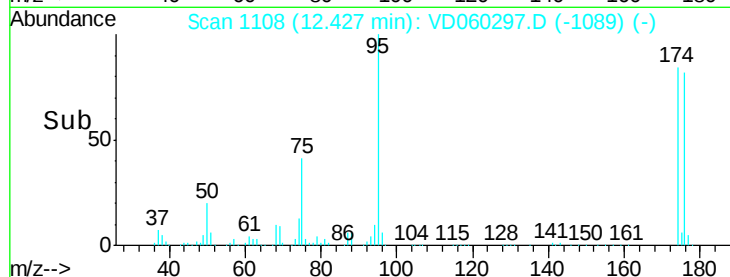
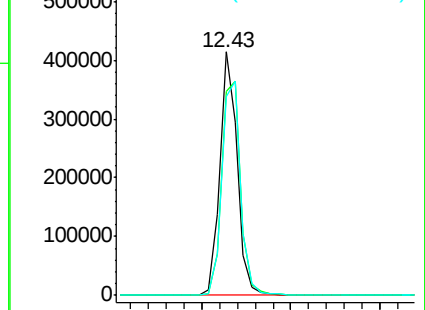
176 81.8 0.0 154.6



Abundance Ion 95.00 (94.70 to 95.70): VD

Ion 173.90 (173.60 to 174.60):

Ion 175.90 (175.60 to 176.60):



#63

Chlorobenzene-d5

Concen: 50.00 ug/l

RT: 11.29 min Scan# 992

Delta R.T. -0.01 min

Lab File: VD060297.D

Acq: 7 Nov 2018 13:25

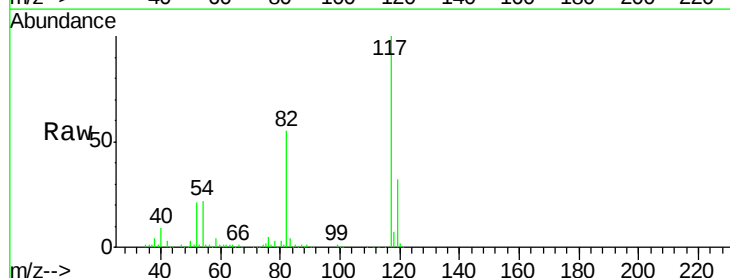
Tgt Ion: 117 Resp: 1568931

Ion Ratio Lower Upper

117 100

82 55.1 43.7 65.5

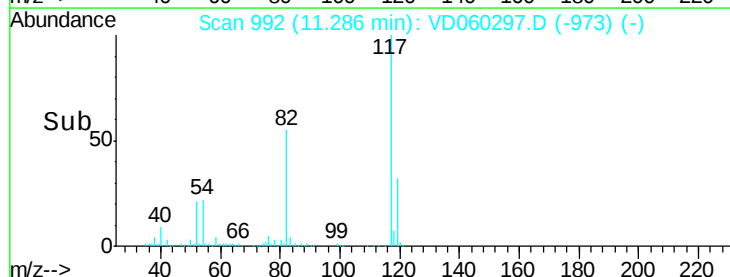
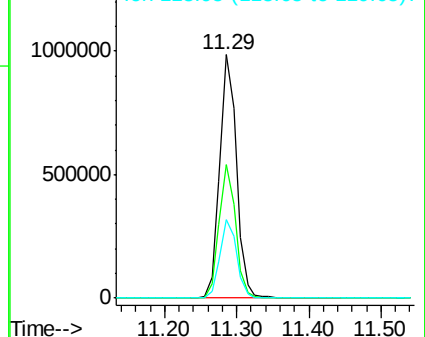
119 32.4 26.1 39.1

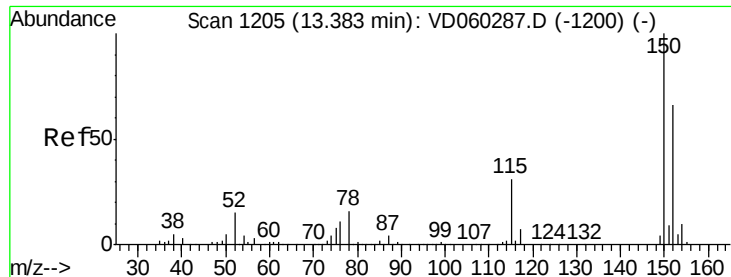


Abundance Ion 116.95 (116.65 to 117.65):

Ion 82.05 (81.75 to 82.75): VD

Ion 118.95 (118.65 to 119.65):





#72

1,4-Dichlorobenzene-d4

Concen: 50.00 ug/l

RT: 13.37 min Scan# 1204

Delta R.T. -0.01 min

Lab File: VD060297.D

Acq: 7 Nov 2018 13:25

Instrument :

MSVOA\_D

ClientSampleId :

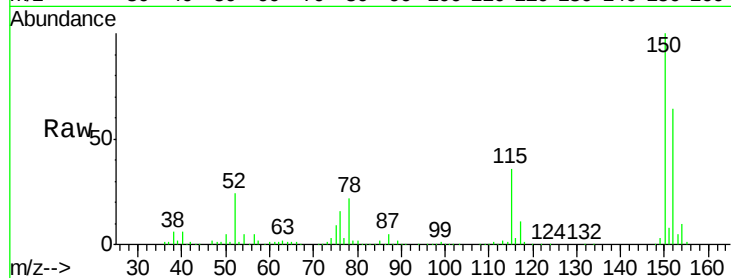
Tot Ion:152 Resp: 772584

Ion Ratio Lower Upper

152 100

115 56.8 24.1 72.3

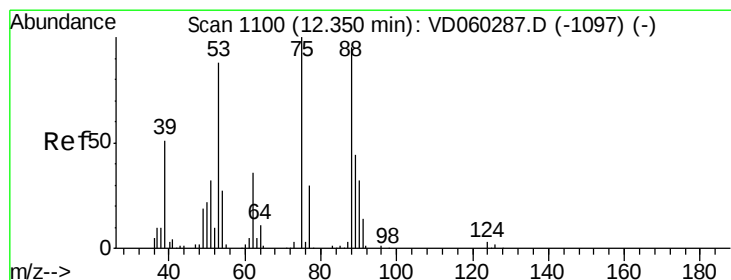
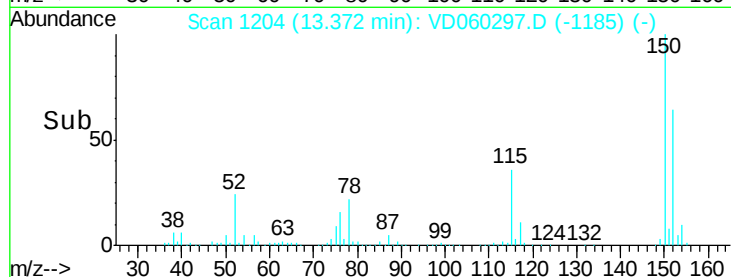
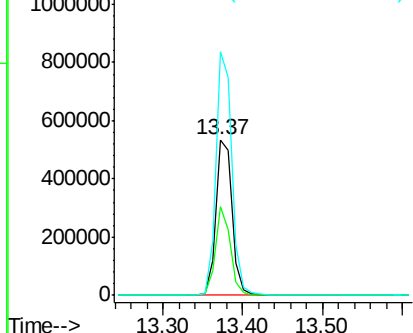
150 156.3 0.0 310.6



Abundance Ion 151.90 (151.60 to 152.60):

Ion 115.00 (114.70 to 115.70):

Ion 149.90 (149.60 to 150.60):



#81

trans-1,4-Dichloro-2-butene

Concen: 84.96 ug/l

RT: 12.43 min Scan# 1108

Delta R.T. 0.08 min

Lab File: VD060297.D

Acq: 7 Nov 2018 13:25

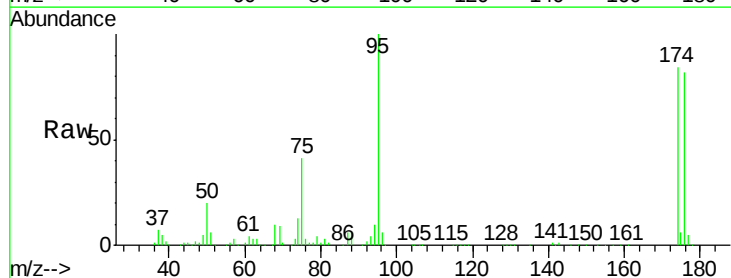
Tgt Ion: 75 Resp: 223553

Ion Ratio Lower Upper

75 100

53 0.0 68.6 103.0#

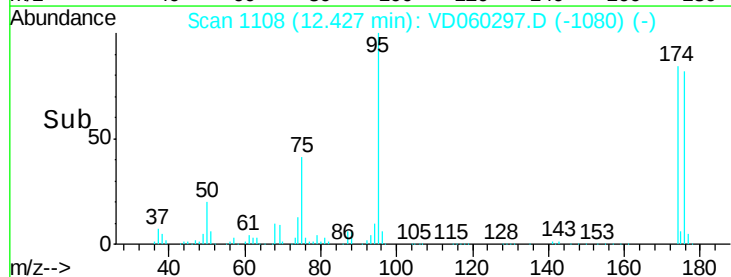
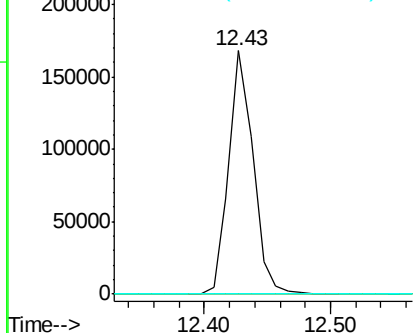
89 0.0 34.1 51.1#

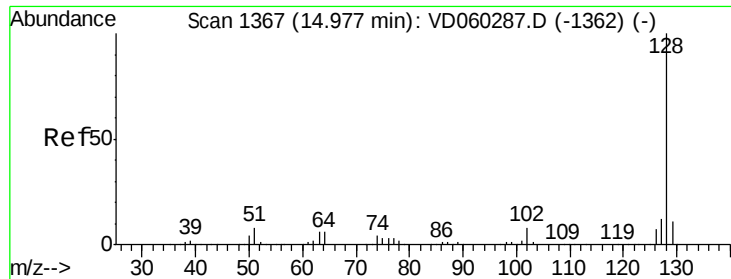


Abundance Ion 75.00 (74.70 to 75.70): VD

Ion 53.00 (52.70 to 53.70): VD

Ion 89.00 (88.70 to 89.70): VD





#95

Naphthalene

Concen: 2.20 ug/l

RT: 14.98 min Scan# 1367

Delta R.T. -0.00 min

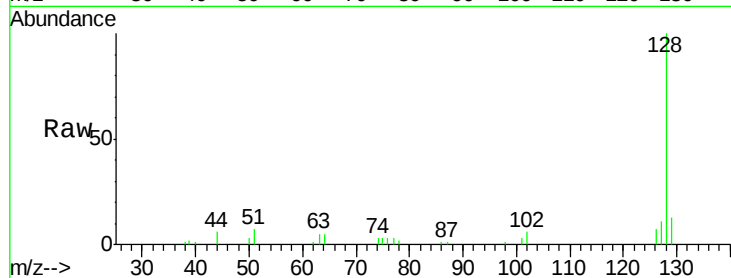
Lab File: VD060297.D

Acq: 7 Nov 2018 13:25

Instrument :

MSVOA\_D

ClientSampleId :



Tot Ion:128 Resp: 46631

Ion Ratio Lower Upper

128 100

127 10.8 9.6 14.4

129 12.9 8.6 12.8#

