

Data Path : Z:\VOASRV\HPCHEM1\MSVOA U\DATA\VU080118\  
 Data File : VU025748.D  
 Acq On : 31 Jul 2018 18:54  
 Operator : MD/SY  
 Sample : J4140-11  
 Misc : 5.61g/5.0mL/100uL/5.00mL/MSVOA\_U/MEOH  
 ALS Vial : 15 Sample Multiplier: 1

Instrument :  
 MSVOA\_U  
 ClientSampleId :  
 EPE-F-8(145-147)

Quant Time: Aug 01 05:30:05 2018  
 Quant Method : Z:\VOASRV\HPCHEM1\MSVOA\_U\METHOD\82U072718W.M  
 Quant Title : SW846 8260  
 QLast Update : Tue Jul 31 16:07:47 2018  
 Response via : Initial Calibration

| Internal Standards         | R.T.  | QIon | Response | Conc  | Units | Dev(Min) |
|----------------------------|-------|------|----------|-------|-------|----------|
| 1) Pentafluorobenzene      | 4.98  | 168  | 191011   | 50.00 | ug/l  | 0.00     |
| 34) 1,4-Difluorobenzene    | 5.89  | 114  | 304237   | 50.00 | ug/l  | 0.00     |
| 63) Chlorobenzene-d5       | 9.09  | 117  | 309678   | 50.00 | ug/l  | 0.00     |
| 72) 1,4-Dichlorobenzene-d4 | 11.49 | 152  | 207828   | 50.00 | ug/l  | 0.00     |

| System Monitoring Compounds | R.T.  | QIon | Response | Conc  | Units   | Dev(Min) |
|-----------------------------|-------|------|----------|-------|---------|----------|
| 33) 1,2-Dichloroethane-d4   | 5.31  | 65   | 146105   | 49.09 | ug/l    | 0.00     |
| Spiked Amount               |       |      | Recovery | =     | 98.18%  |          |
| 35) Dibromofluoromethane    | 4.88  | 113  | 121846   | 46.05 | ug/l    | 0.00     |
| Spiked Amount               |       |      | Recovery | =     | 92.10%  |          |
| 50) Toluene-d8              | 7.57  | 98   | 442488   | 47.79 | ug/l    | 0.00     |
| Spiked Amount               |       |      | Recovery | =     | 95.58%  |          |
| 62) 4-Bromofluorobenzene    | 10.31 | 95   | 191623   | 53.32 | ug/l    | 0.00     |
| Spiked Amount               |       |      | Recovery | =     | 106.64% |          |

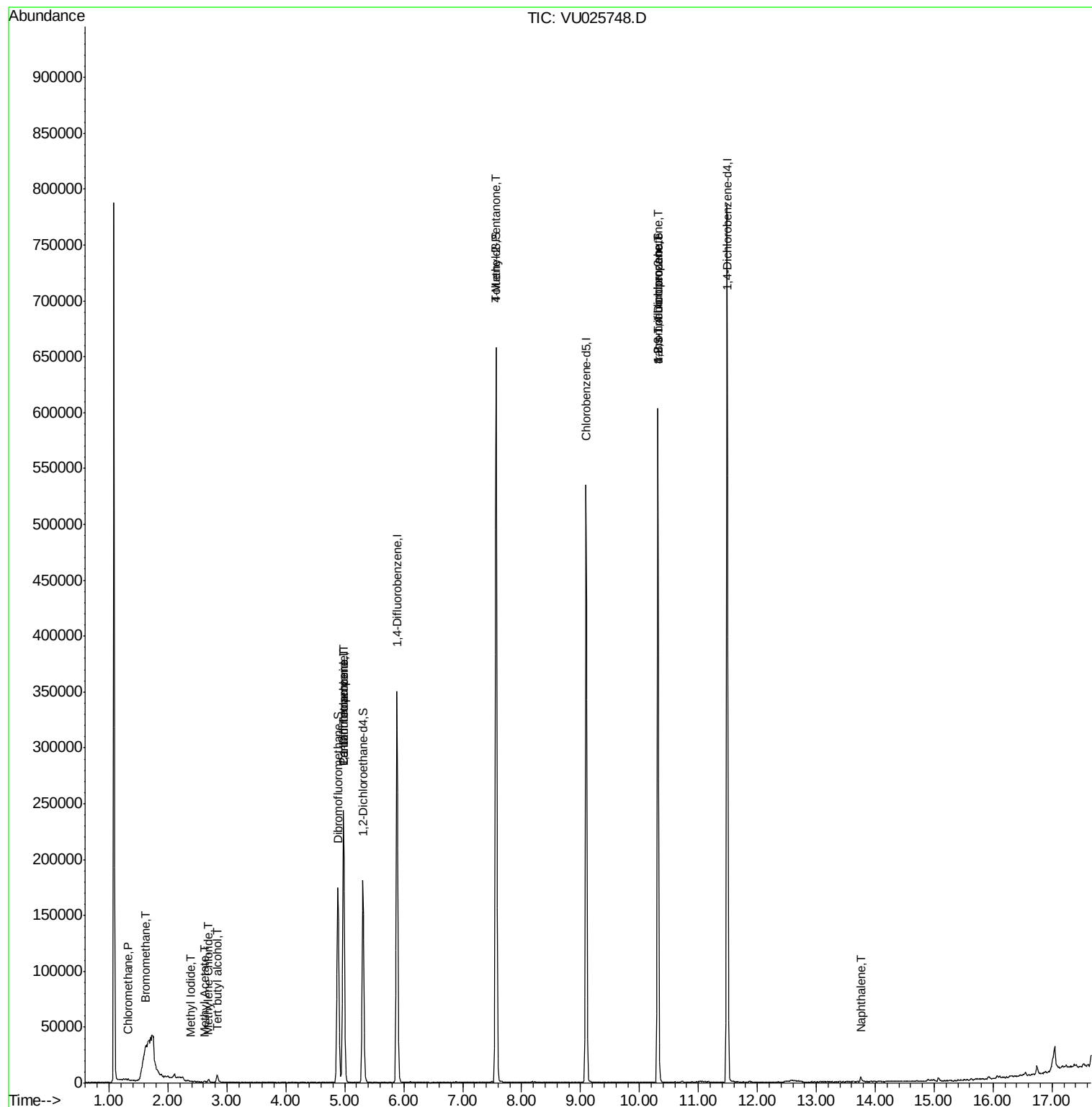
| Target Compounds               | R.T.  | QIon | Response | Conc      | Units  | Qvalue |
|--------------------------------|-------|------|----------|-----------|--------|--------|
| 3) Chloromethane               | 1.32  | 50   | 909      | 0.33      | ug/l # | 84     |
| 5) Bromomethane                | 1.60  | 94   | 811      | 0.64      | ug/l   | 95     |
| 10) Methyl Iodide              | 2.39  | 142  | 343      | 8.74      | ug/l # | 39     |
| 11) Tert butyl alcohol         | 2.83  | 59   | 3805     | 5.84      | ug/l # | 73     |
| 13) Acrolein                   | 2.20  | 56   | 96       | Below Cal | #      | 1      |
| 18) Methyl Acetate             | 2.62  | 43   | 1123     | 0.32      | ug/l # | 75     |
| 20) Methylene Chloride         | 2.68  | 84   | 963      | 0.37      | ug/l # | 87     |
| 31) Cyclohexane                | 4.98  | 56   | 3631     | Below Cal | #      | 1      |
| 36) 1,1-Dichloropropene        | 4.98  | 75   | 14156    | 3.98      | ug/l # | 49     |
| 38) Carbon Tetrachloride       | 4.98  | 117  | 17697    | 4.39      | ug/l # | 17     |
| 51) 4-Methyl-2-Pentanone       | 7.57  | 43   | 2014     | 0.53      | ug/l # | 1      |
| 76) 1,2,3-Trichloropropane     | 10.31 | 75   | 97495    | 21.29     | ug/l # | 36     |
| 81) trans-1,4-Dichloro-2-buten | 10.31 | 75   | 97495    | 53.39     | ug/l # | 100    |
| 95) Naphthalene                | 13.75 | 128  | 5663     | 1.61      | ug/l # | 87     |

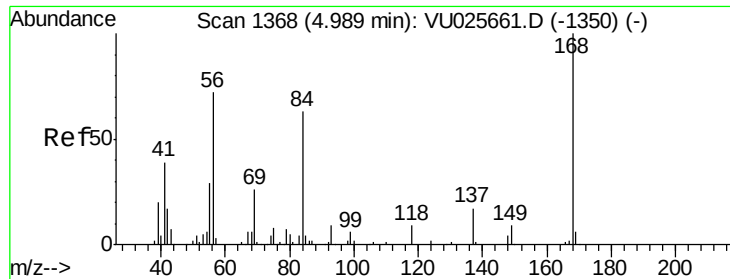
(#) = qualifier out of range (m) = manual integration (+) = signals summed

Data Path : Z:\V0ASRV\HPCHEM1\MSVOA U\DATA\VU080118\  
Data File : VU025748.D  
Acq On : 31 Jul 2018 18:54  
Operator : MD/SY  
Sample : J4140-11  
Misc : 5.61µ/5.0mL/100µL/5.00mL/MSVOA\_U/MEOH  
ALS Vial : 15 Sample Multiplier: 1

Instrument :  
MSVOA\_U  
ClientSampleId :  
EPE-F-8(145-147)

Quant Time: Aug 01 05:30:05 2018  
Quant Method : Z:\V0ASRV\HPCHEM1\MSVOA\_U\METHOD\82U072718W.M  
Quant Title : SW846 8260  
QLast Update : Tue Jul 31 16:07:47 2018  
Response via : Initial Calibration





#1

Pentafluorobenzene

Concen: 50.00 ug/l

RT: 4.98 min Scan# 1366

Delta R.T. -0.01 min

Lab File: VU025748.D

Acq: 31 Jul 2018 18:54

Instrument :

MSVOA\_U

ClientSampleId :

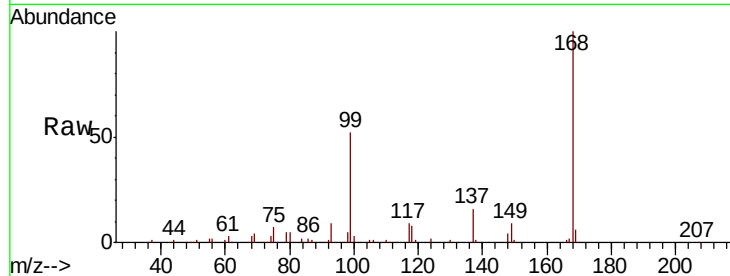
EPE-F-8(145-147)

Tot Ion:168 Resp: 191011

Ion Ratio Lower Upper

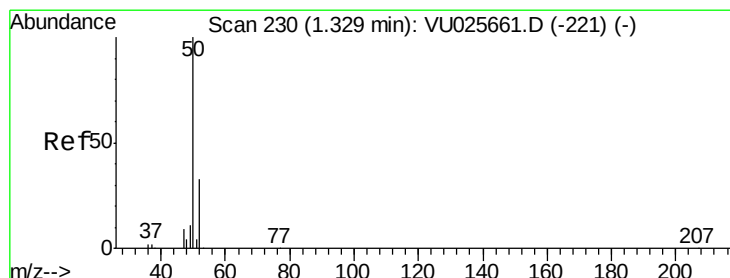
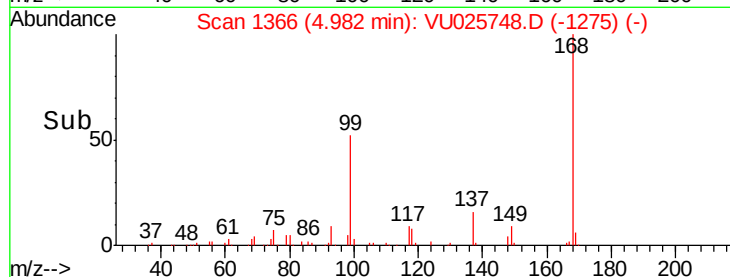
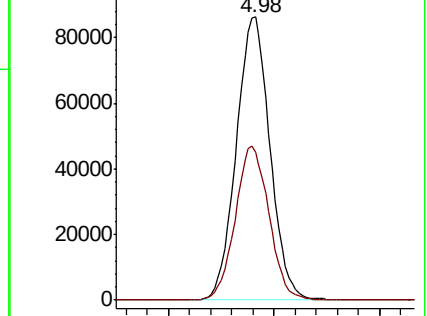
168 100

99 52.3 42.8 64.2



Abundance Ion 167.90 (167.60 to 168.60): VU025661.D (-1350) (-)

Ion 98.90 (98.60 to 99.60): VU025661.D (-1350) (-)



#3

Chloromethane

Concen: 0.33 ug/l

RT: 1.32 min Scan# 228

Delta R.T. -0.01 min

Lab File: VU025748.D

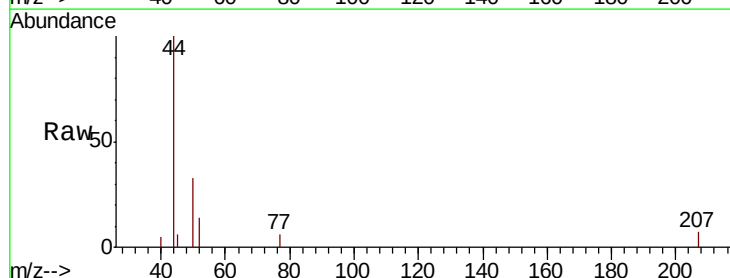
Acq: 31 Jul 2018 18:54

Tgt Ion: 50 Resp: 909

Ion Ratio Lower Upper

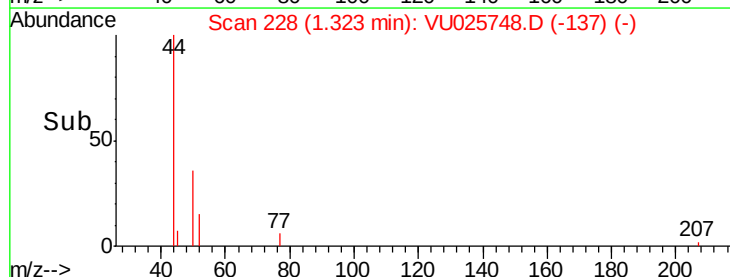
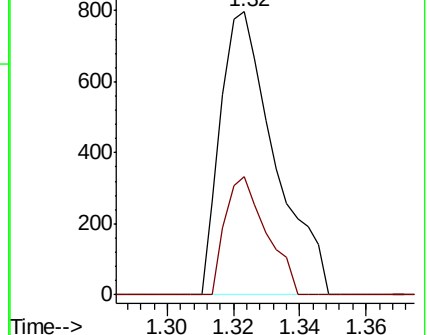
50 100

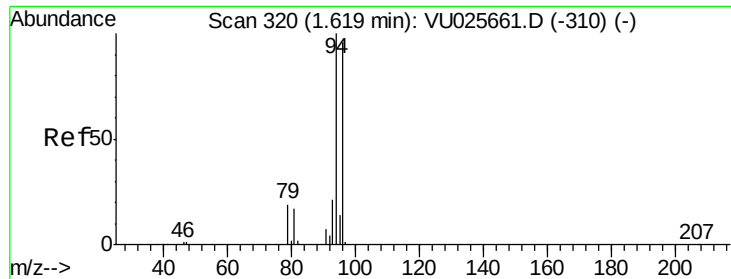
52 41.9 26.5 39.7#



Abundance Ion 49.90 (49.60 to 50.60): VU025661.D (-221) (-)

Ion 51.90 (51.60 to 52.60): VU025661.D (-221) (-)





#5

Bromomethane

Concen: 0.64 ug/l

RT: 1.60 min Scan# 315

Delta R.T. -0.02 min

Lab File: VU025748.D

Acq: 31 Jul 2018 18:54

Instrument :

MSVOA\_U

ClientSampleId :

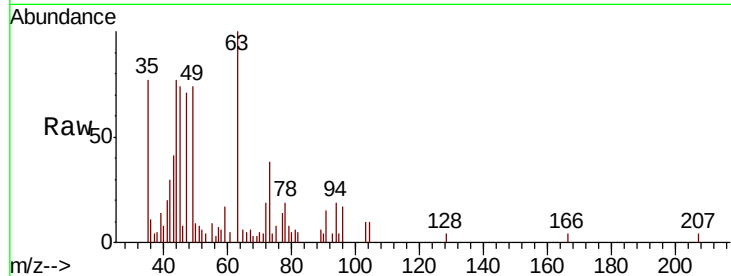
EPE-F-8(145-147)

Tot Ion: 94 Resp: 811

Ion Ratio Lower Upper

94 100

96 88.6 75.0 112.4



Abundance Ion 93.90 (93.60 to 94.60): VU0

Ion 95.90 (95.60 to 96.60): VU0

1.60

600

400

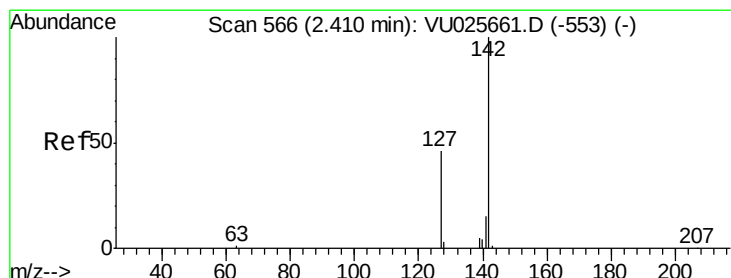
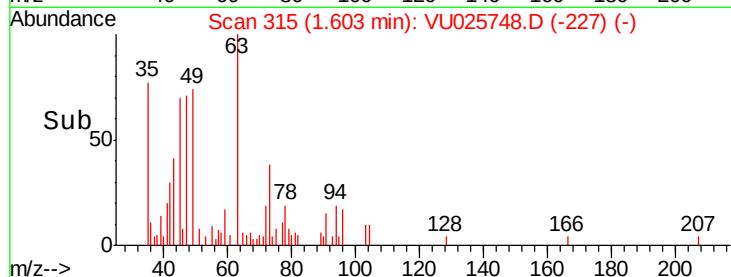
200

0

Time--> 1.55

1.60

1.65



#10

Methyl Iodide

Concen: 8.74 ug/l

RT: 2.39 min Scan# 559

Delta R.T. -0.02 min

Lab File: VU025748.D

Acq: 31 Jul 2018 18:54

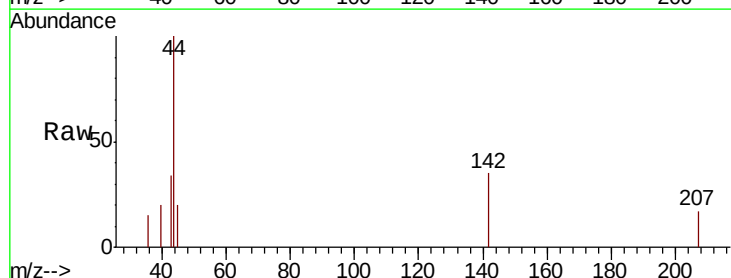
Tgt Ion:142 Resp: 343

Ion Ratio Lower Upper

142 100

127 0.0 36.5 54.7#

141 0.0 11.4 17.2#



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

300

250

200

150

100

50

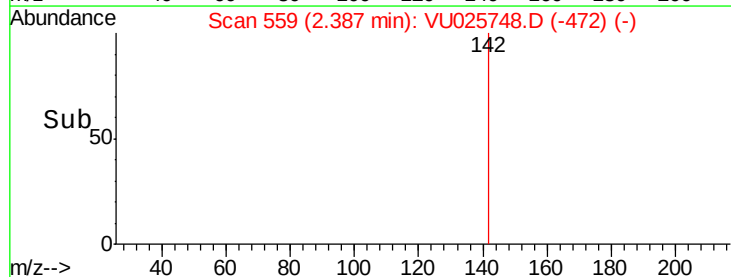
0

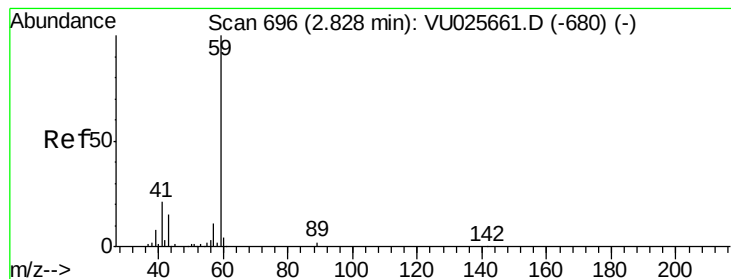
Time--> 2.36

2.38

2.40

2.42



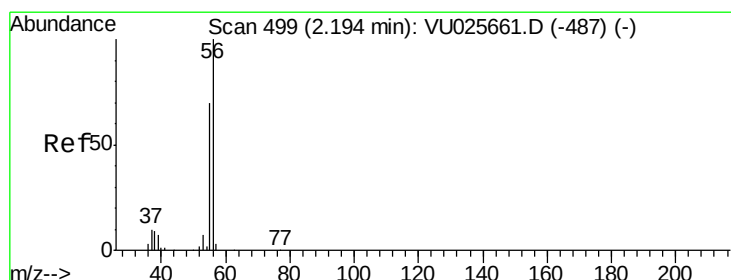
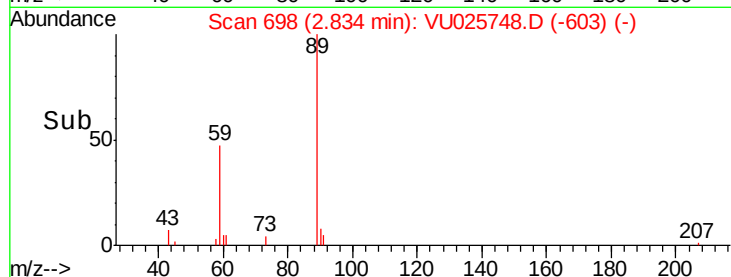
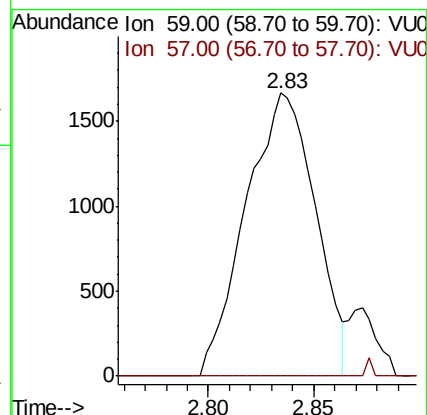
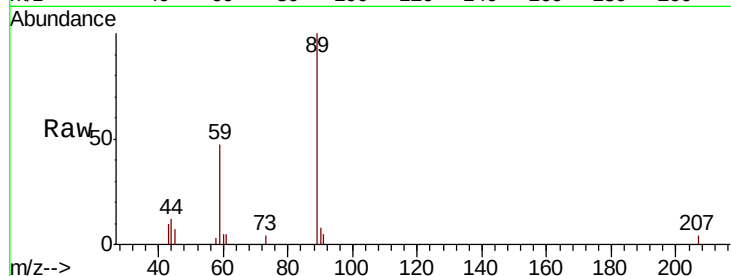


#11

Tert butyl alcohol  
 Concen: 5.84 ug/l  
 RT: 2.83 min Scan# 698  
 Delta R.T. 0.01 min  
 Lab File: VU025748.D  
 Acq: 31 Jul 2018 18:54

Instrument :  
 MSVOA\_U  
 ClientSampleId :  
 EPE-F-8(145-147)

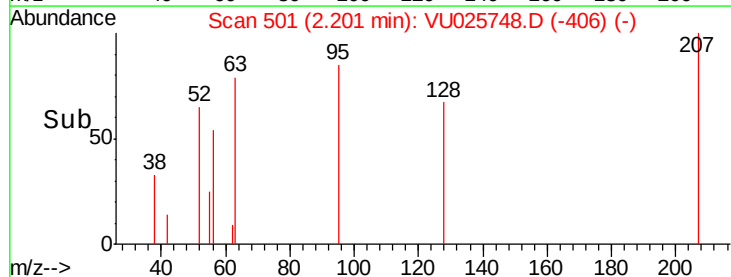
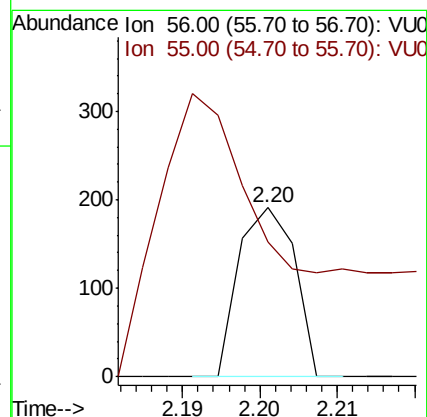
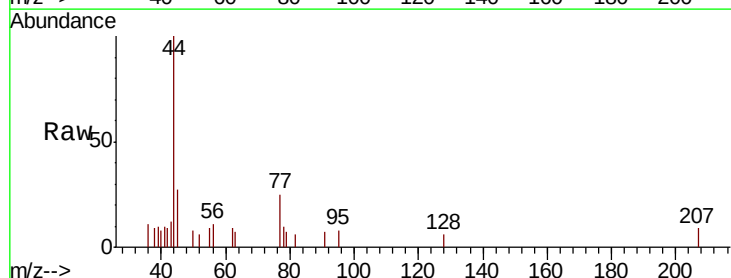
Tot Ion: 59 Resp: 3805  
 Ion Ratio Lower Upper  
 59 100  
 57 0.0 8.2 12.2#

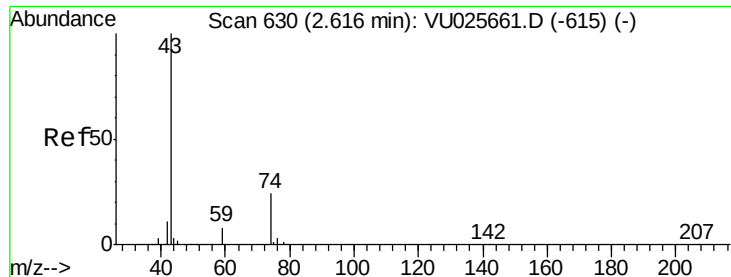


#13

Acrolein  
 Concen: Below Cal  
 RT: 2.20 min Scan# 501  
 Delta R.T. 0.01 min  
 Lab File: VU025748.D  
 Acq: 31 Jul 2018 18:54

Tgt Ion: 56 Resp: 96  
 Ion Ratio Lower Upper  
 56 100  
 55 366.7 57.2 85.8#

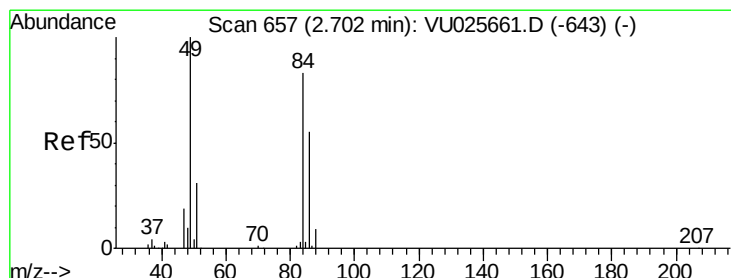
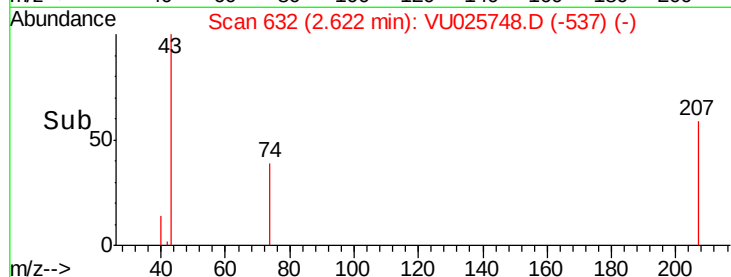
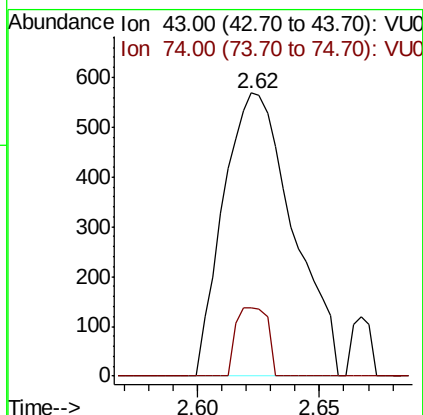
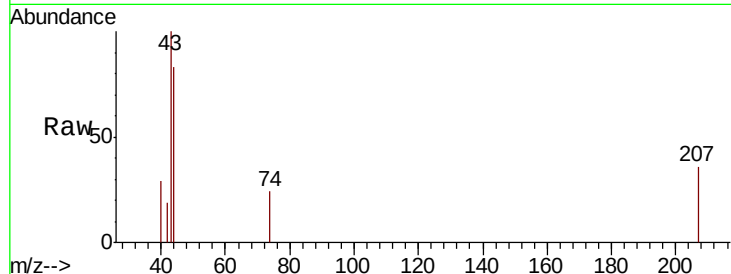




#18  
Methyl Acetate  
Concen: 0.32 ug/l  
RT: 2.62 min Scan# 632  
Delta R.T. 0.01 min  
Lab File: VU025748.D  
Acq: 31 Jul 2018 18:54

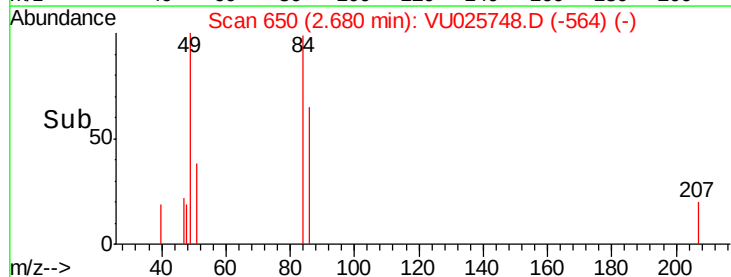
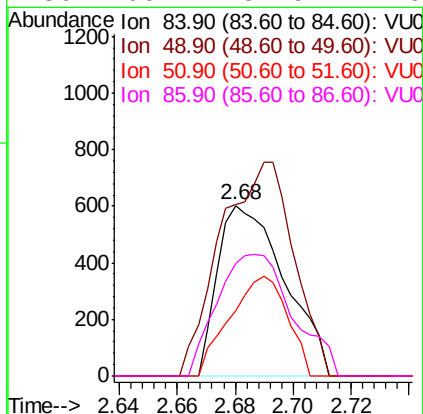
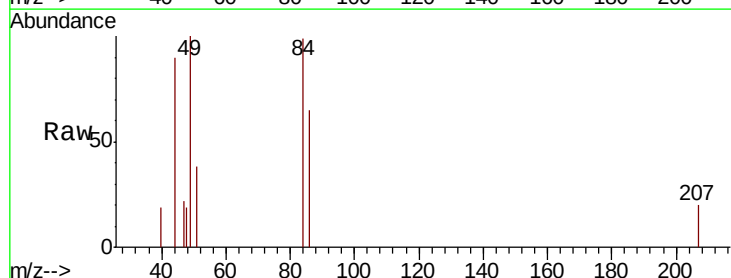
Instrument :  
MSVOA\_U  
ClientSampleId :  
EPE-F-8(145-147)

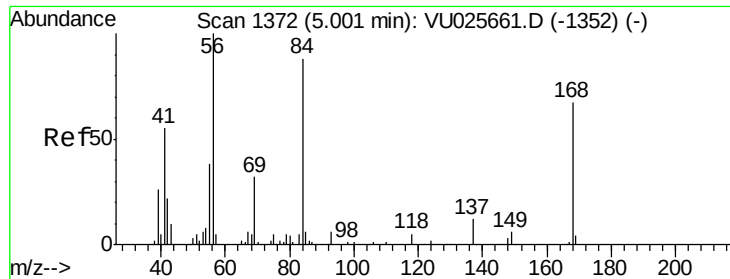
Tot Ion: 43 Resp: 1123  
Ion Ratio Lower Upper  
43 100  
74 11.0 18.5 27.7#



#20  
Methylene Chloride  
Concen: 0.37 ug/l  
RT: 2.68 min Scan# 650  
Delta R.T. -0.02 min  
Lab File: VU025748.D  
Acq: 31 Jul 2018 18:54

Tgt Ion: 84 Resp: 963  
Ion Ratio Lower Upper  
84 100  
49 101.0 101.8 152.6#  
51 38.4 30.8 46.2  
86 66.1 51.9 77.9

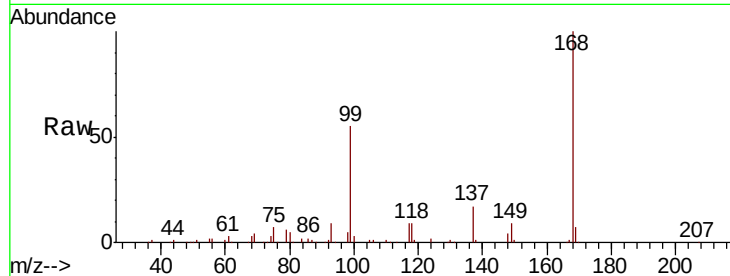




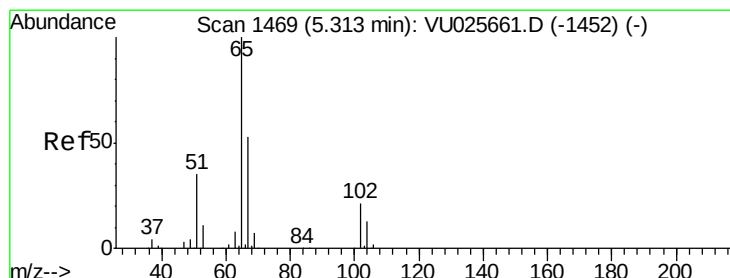
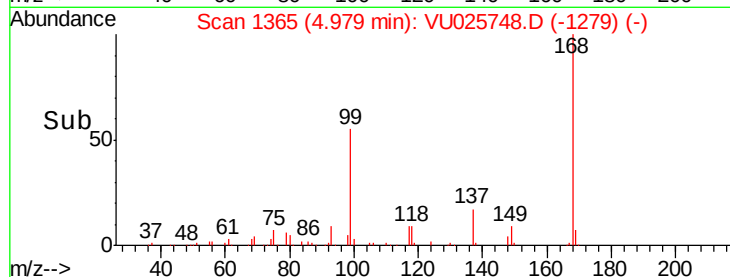
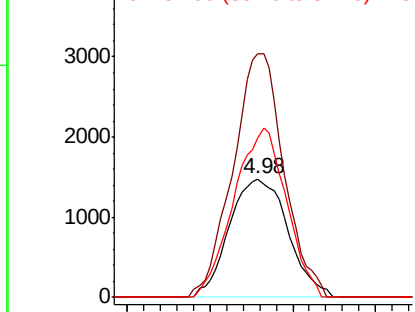
#31  
Cyclohexane  
Concen: Below Cal  
RT: 4.98 min Scan# 1365  
Delta R.T. -0.02 min  
Lab File: VU025748.D  
Acq: 31 Jul 2018 18:54

Instrument :  
MSVOA\_U  
ClientSampleId :  
EPE-F-8(145-147)

Tot Ion: 56 Resp: 3631  
Ion Ratio Lower Upper  
56 100  
69 205.7 26.8 40.2#  
84 134.3 69.7 104.5#

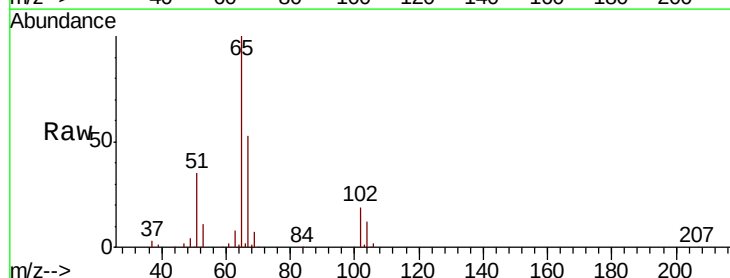


Abundance Ion 56.00 (55.70 to 56.70): VU0  
Ion 69.00 (68.70 to 69.70): VU0  
Ion 84.00 (83.70 to 84.70): VU0

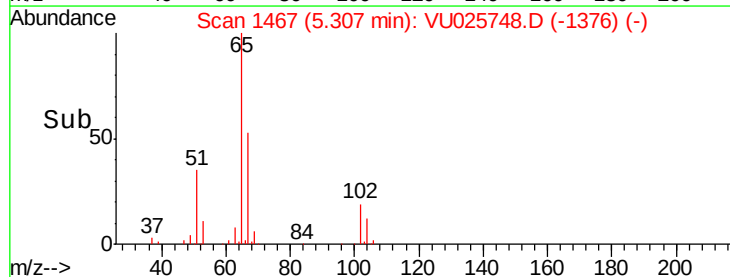
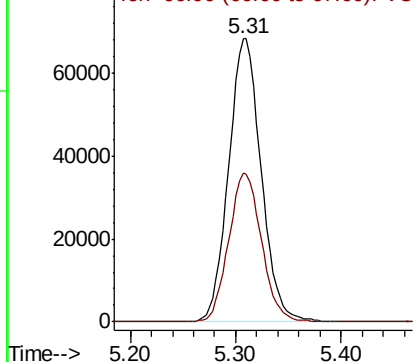


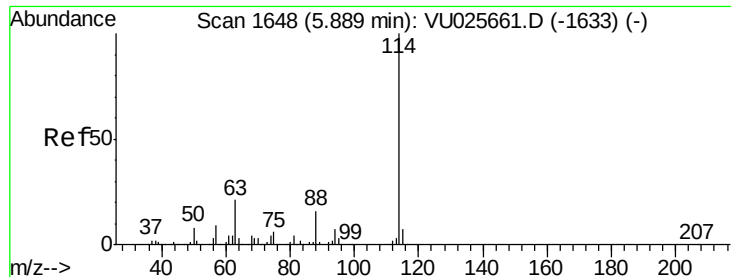
#33  
1,2-Dichloroethane-d4  
Concen: 49.09 ug/l  
RT: 5.31 min Scan# 1467  
Delta R.T. -0.01 min  
Lab File: VU025748.D  
Acq: 31 Jul 2018 18:54

Tgt Ion: 65 Resp: 146105  
Ion Ratio Lower Upper  
65 100  
67 53.0 0.0 103.6



Abundance Ion 64.90 (64.60 to 65.60): VU0  
Ion 66.90 (66.60 to 67.60): VU0





#34

1,4-Difluorobenzene

Concen: 50.00 ug/l

RT: 5.89 min Scan# 1647

Delta R.T. -0.00 min

Lab File: VU025748.D

Acq: 31 Jul 2018 18:54

Instrument :

MSVOA\_U

ClientSampleId :

EPE-F-8(145-147)

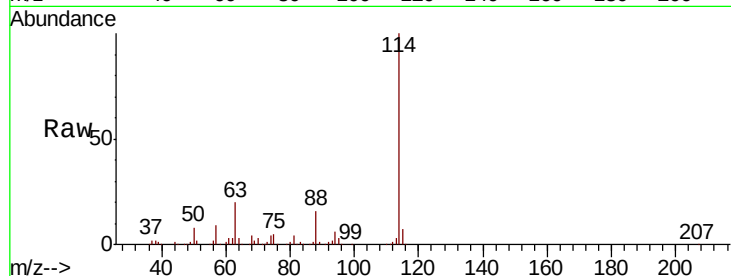
Tot Ion:114 Resp: 304237

Ion Ratio Lower Upper

114 100

63 20.4 0.0 41.6

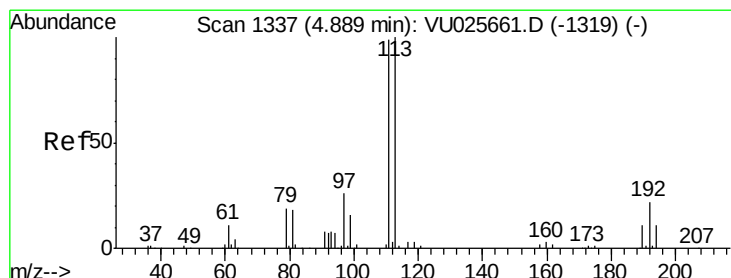
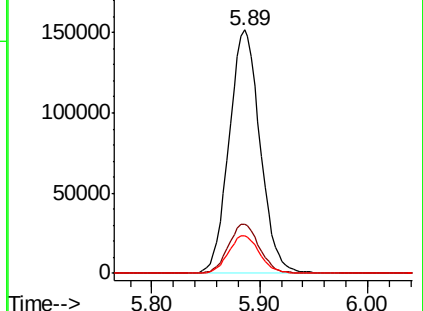
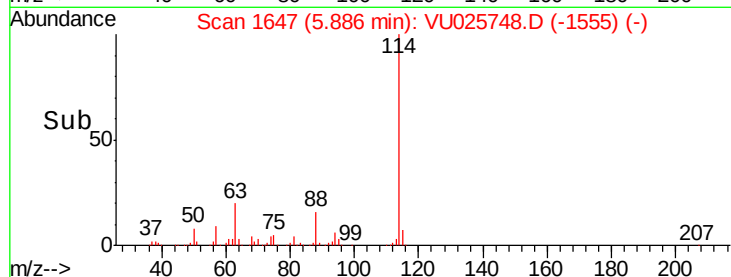
88 15.6 0.0 32.4



Abundance Ion 113.90 (113.60 to 114.60): V

Ion 63.00 (62.70 to 63.70): VU0

Ion 87.90 (87.60 to 88.60): VU0



#35

Dibromofluoromethane

Concen: 46.05 ug/l

RT: 4.88 min Scan# 1335

Delta R.T. -0.01 min

Lab File: VU025748.D

Acq: 31 Jul 2018 18:54

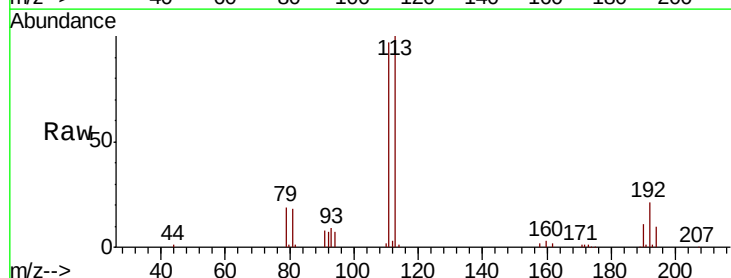
Tgt Ion:113 Resp: 121846

Ion Ratio Lower Upper

113 100

111 101.7 81.7 122.5

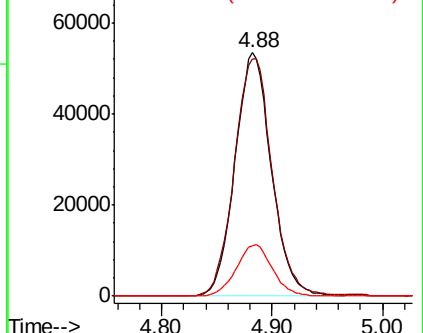
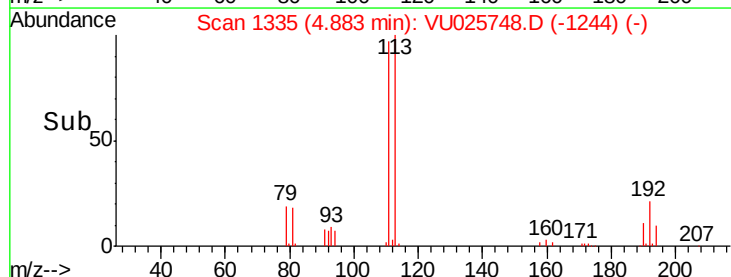
192 21.0 17.1 25.7



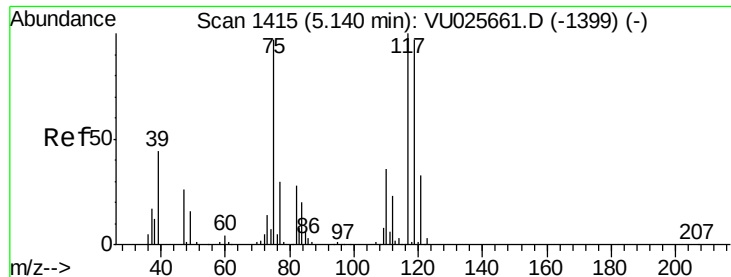
Abundance Ion 112.80 (112.50 to 113.50): V

Ion 110.80 (110.50 to 111.50): V

Ion 191.70 (191.40 to 192.40): V



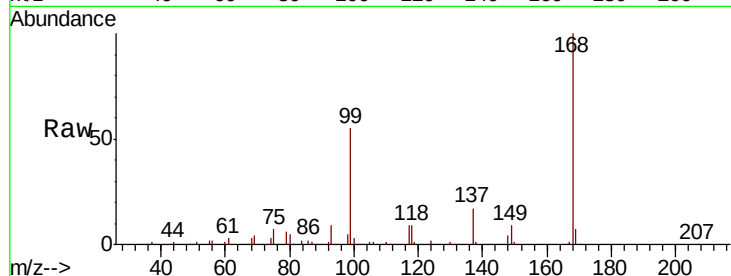




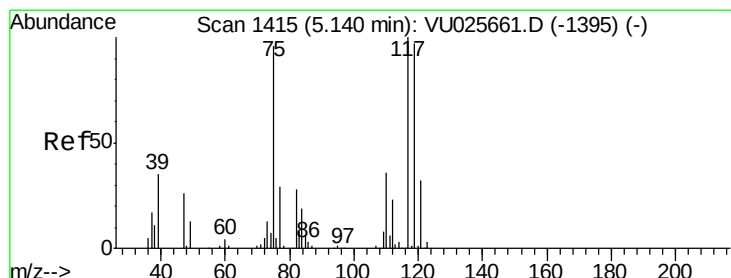
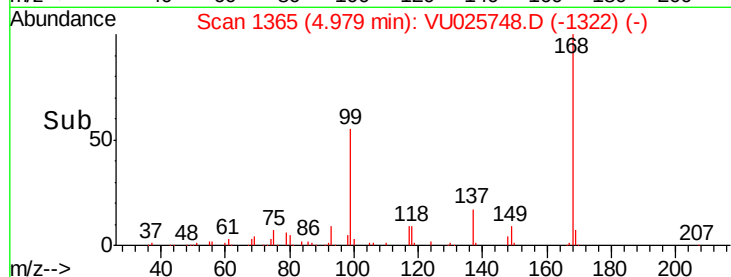
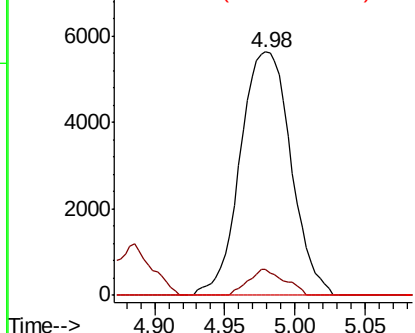
#36  
 1,1-Dichloropropene  
 Concen: 3.98 ug/l  
 RT: 4.98 min Scan# 1365  
 Delta R.T. -0.16 min  
 Lab File: VU025748.D  
 Acq: 31 Jul 2018 18:54

Instrument :  
 MSVOA\_U  
 ClientSampleId :  
 EPE-F-8(145-147)

| Tot Ion | Ratio | Lower | Upper |
|---------|-------|-------|-------|
| 75      | 100   |       |       |
| 110     | 7.7   | 17.6  | 52.9# |
| 77      | 0.0   | 24.4  | 36.6# |

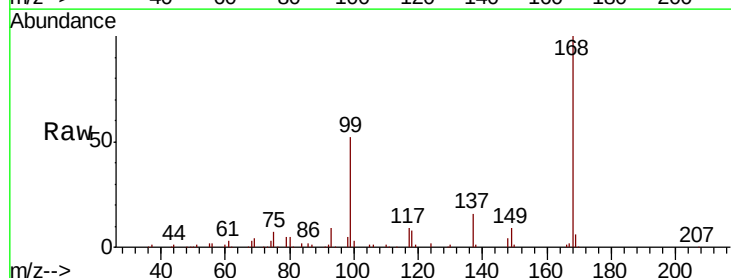


Abundance Ion 74.90 (74.60 to 75.60): VU0  
 Ion 109.90 (109.60 to 110.60): V  
 Ion 76.90 (76.60 to 77.60): VU0

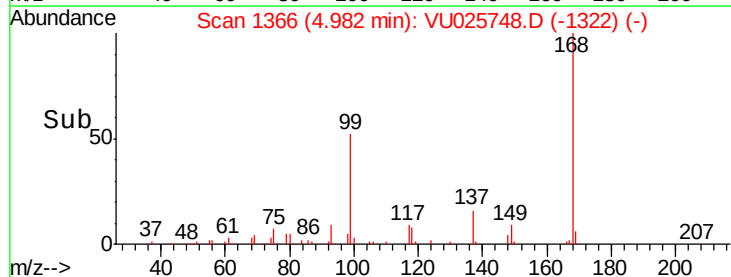
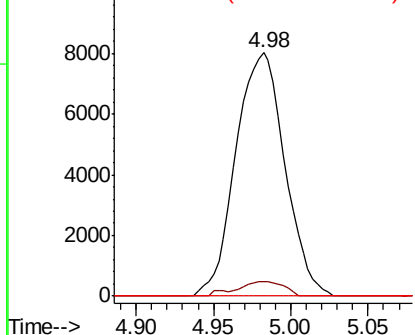


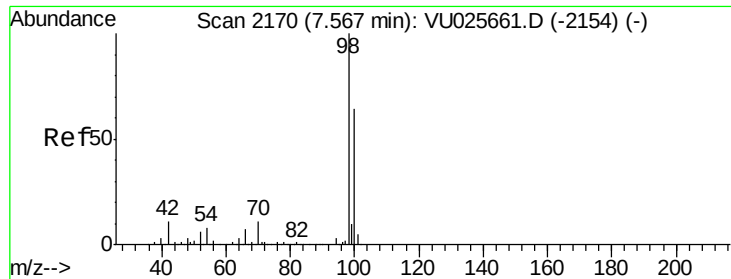
#38  
 Carbon Tetrachloride  
 Concen: 4.39 ug/l  
 RT: 4.98 min Scan# 1366  
 Delta R.T. -0.16 min  
 Lab File: VU025748.D  
 Acq: 31 Jul 2018 18:54

| Tgt Ion | Ratio | Lower | Upper  |
|---------|-------|-------|--------|
| 117     | 100   |       |        |
| 119     | 5.9   | 75.7  | 113.5# |
| 121     | 0.0   | 24.6  | 36.8#  |



Abundance Ion 116.80 (116.50 to 117.50): V  
 Ion 118.80 (118.50 to 119.50): V  
 Ion 120.80 (120.50 to 121.50): V

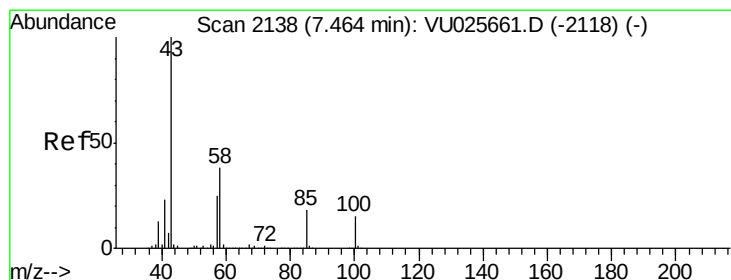
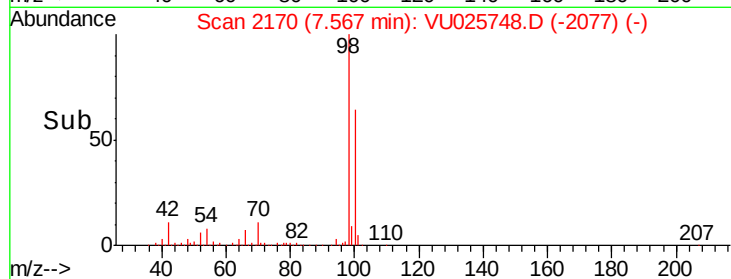
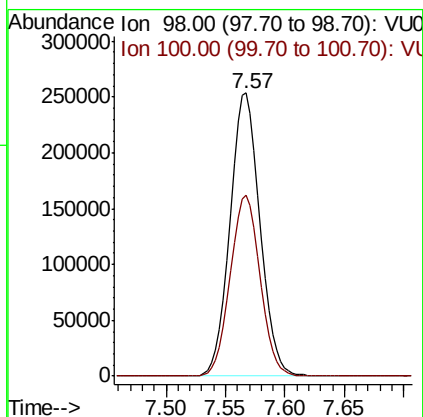
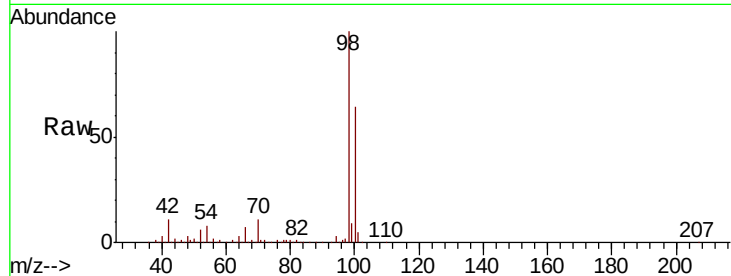




#50  
Toluene-d8  
Concen: 47.79 ug/l  
RT: 7.57 min Scan# 2170  
Delta R.T. 0.00 min  
Lab File: VU025748.D  
Acq: 31 Jul 2018 18:54

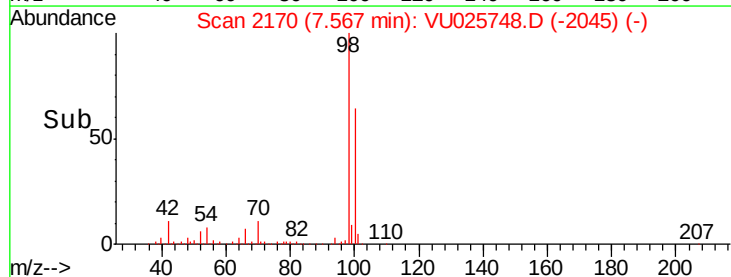
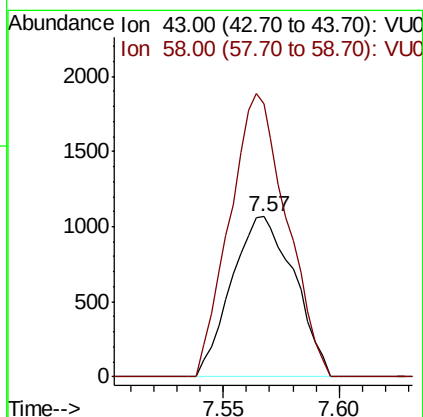
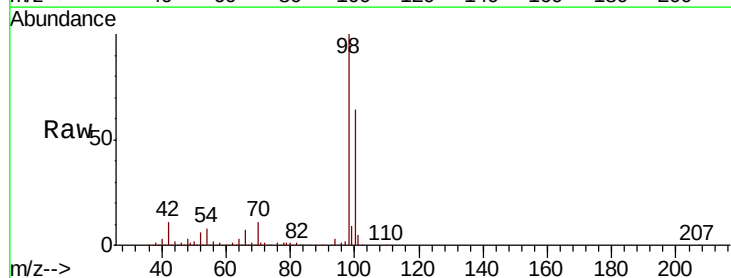
Instrument :  
MSVOA\_U  
ClientSampleId :  
EPE-F-8(145-147)

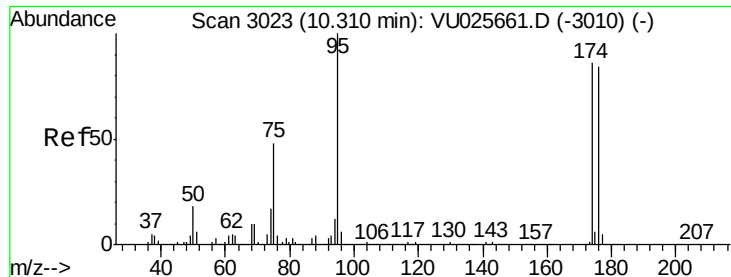
Tot Ion: 98 Resp: 442488  
Ion Ratio Lower Upper  
98 100  
100 63.8 51.1 76.7



#51  
4-Methyl-2-Pentanone  
Concen: 0.53 ug/l  
RT: 7.57 min Scan# 2170  
Delta R.T. 0.10 min  
Lab File: VU025748.D  
Acq: 31 Jul 2018 18:54

Tgt Ion: 43 Resp: 2014  
Ion Ratio Lower Upper  
43 100  
58 160.1 31.0 46.4#





#62

4-Bromofluorobenzene

Concen: 53.32 ug/l

RT: 10.31 min Scan# 3024

Delta R.T. 0.00 min

Lab File: VU025748.D

Acq: 31 Jul 2018 18:54

Instrument :

MSVOA\_U

ClientSampleId :

EPE-F-8(145-147)

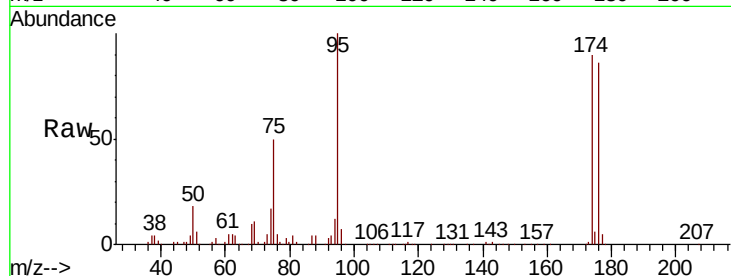
Tot Ion: 95 Resp: 191623

Ion Ratio Lower Upper

95 100

174 88.5 0.0 172.2

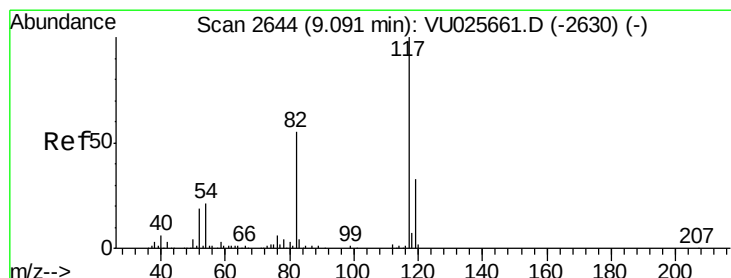
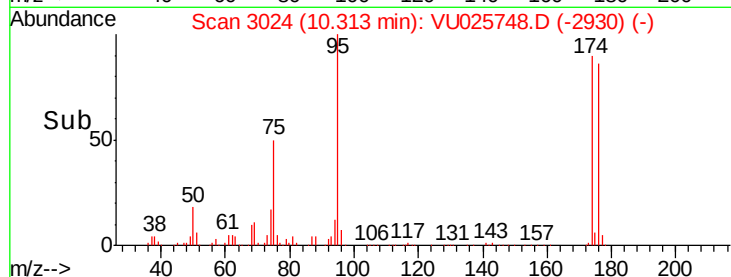
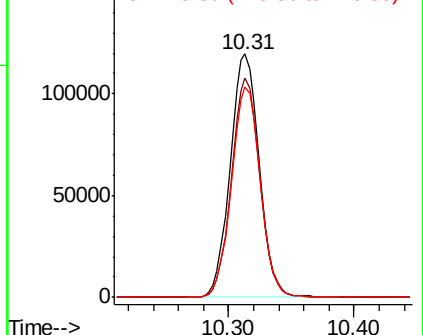
176 85.6 0.0 162.6



Abundance Ion 94.90 (94.60 to 95.60): VU0

Ion 173.80 (173.50 to 174.50): V

Ion 175.80 (175.50 to 176.50): V



#63

Chlorobenzene-d5

Concen: 50.00 ug/l

RT: 9.09 min Scan# 2645

Delta R.T. 0.00 min

Lab File: VU025748.D

Acq: 31 Jul 2018 18:54

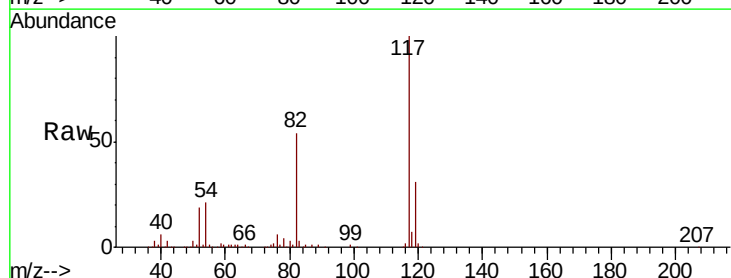
Tgt Ion: 117 Resp: 309678

Ion Ratio Lower Upper

117 100

82 54.0 46.0 69.0

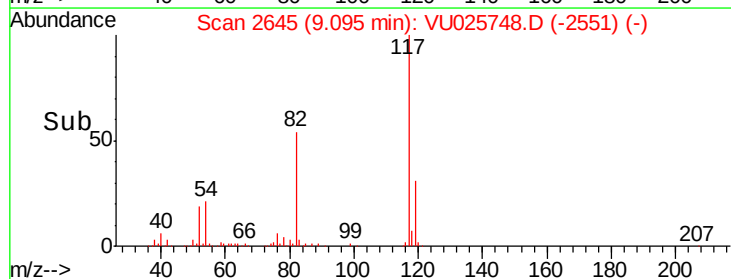
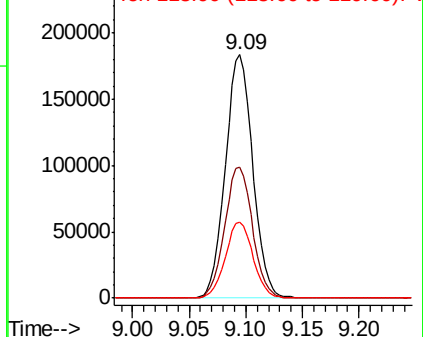
119 31.5 26.0 39.0

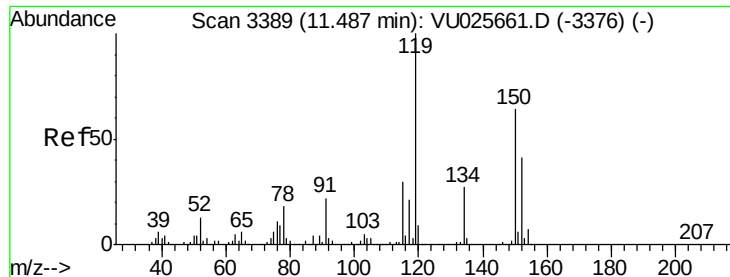


Abundance Ion 116.90 (116.60 to 117.60): V

Ion 82.00 (81.70 to 82.70): VU0

Ion 118.90 (118.60 to 119.60): V





#72

1,4-Dichlorobenzene-d4

Concen: 50.00 ug/l

RT: 11.49 min Scan# 3389

Delta R.T. 0.00 min

Lab File: VU025748.D

Acq: 31 Jul 2018 18:54

Instrument :

MSVOA\_U

ClientSampleId :

EPE-F-8(145-147)

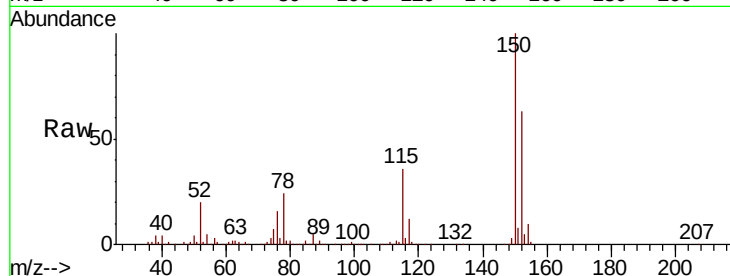
Tot Ion:152 Resp: 207828

Ion Ratio Lower Upper

152 100

115 57.0 40.1 120.3

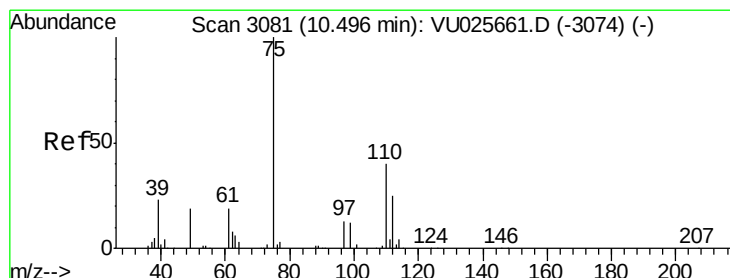
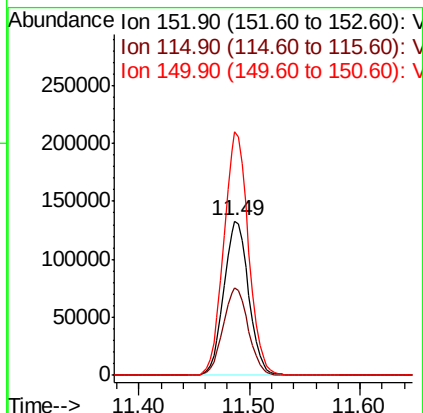
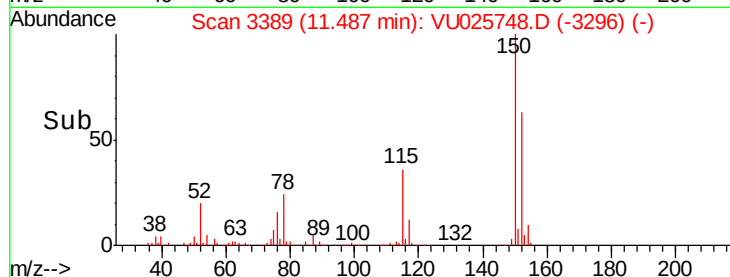
150 156.6 0.0 351.4



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: 21.29 ug/l

RT: 10.31 min Scan# 3024

Delta R.T. -0.18 min

Lab File: VU025748.D

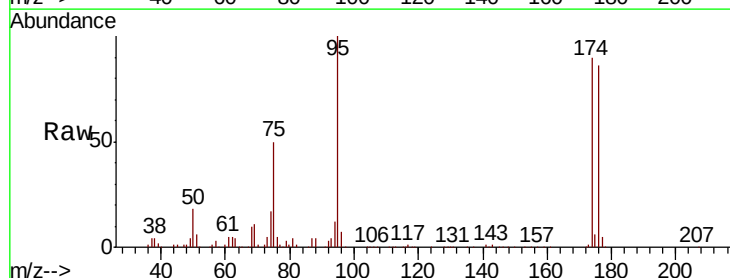
Acq: 31 Jul 2018 18:54

Tgt Ion: 75 Resp: 97495

Ion Ratio Lower Upper

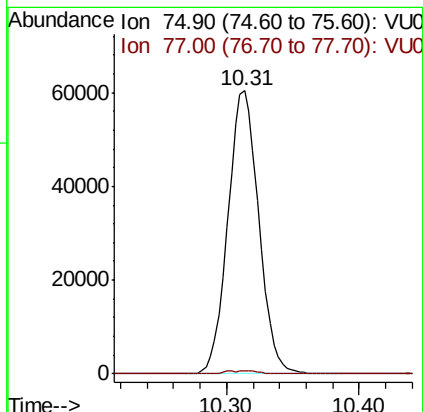
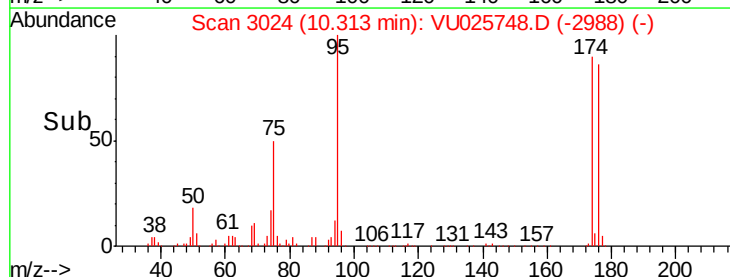
75 100

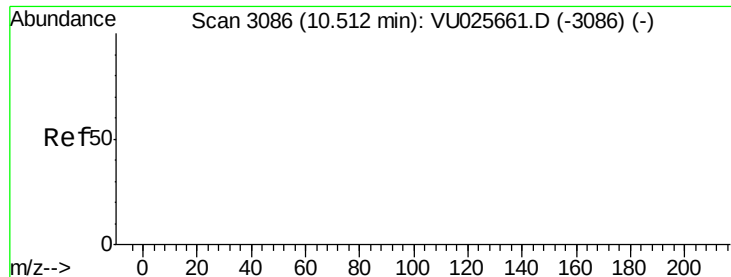
77 1.2 20.4 61.3#



Abundance Ion 74.90 (74.60 to 75.60): VU0

Ion 77.00 (76.70 to 77.70): VU0





#81

trans-1,4-Dichloro-2-butene

Concen: 53.39 ug/l

RT: 10.31 min Scan# 3024

Delta R.T. -0.18 min

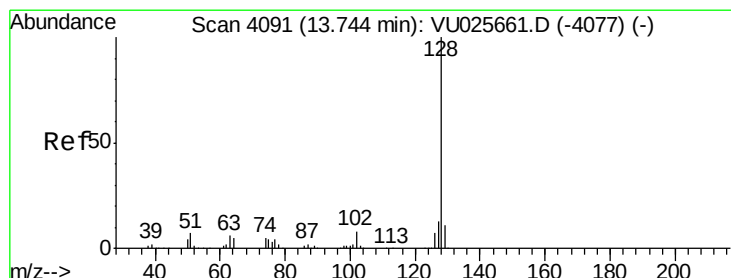
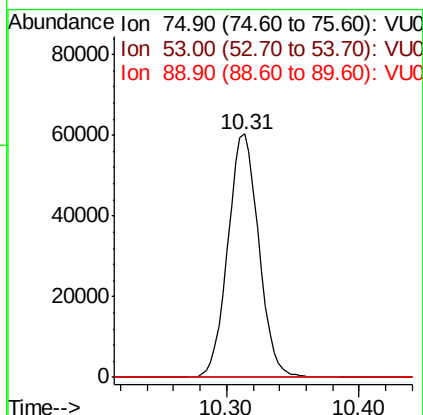
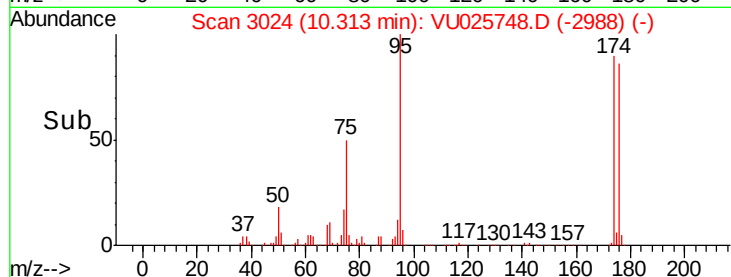
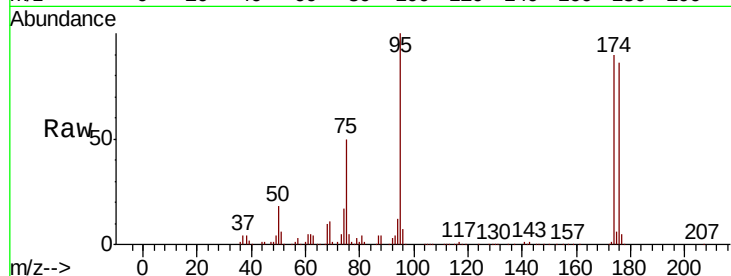
Lab File: VU025748.D

Acq: 31 Jul 2018 18:54

Instrument :  
MSVOA\_U  
ClientSampleId :  
EPE-F-8(145-147)

Tot Ion: 75 Resp: 97495

| Ion | Ratio | Lower | Upper |
|-----|-------|-------|-------|
| 75  | 100   |       |       |
| 53  | 0.0   | 0.0   | 0.0   |
| 89  | 0.0   | 0.0   | 0.0   |



#95

Naphthalene

Concen: 1.61 ug/l

RT: 13.75 min Scan# 4094

Delta R.T. 0.01 min

Lab File: VU025748.D

Acq: 31 Jul 2018 18:54

Tgt Ion: 128 Resp: 5663

| Ion | Ratio | Lower | Upper |
|-----|-------|-------|-------|
| 128 | 100   |       |       |
| 127 | 5.3   | 10.5  | 15.7# |
| 129 | 8.5   | 8.3   | 12.5  |

