

Data Path : Z:\VOASRV\HPCHEM1\MSVOA U\DATA\VU093019\  
 Data File : VU034878.D  
 Acq On : 30 Sep 2019 13:41  
 Operator : JC/SP  
 Sample : VSTD00506  
 Misc : 25.0mL/MSVOA U/WATER  
 ALS Vial : 5 Sample Multiplier: 1

Instrument :  
 MSVOA\_U  
 ClientSampleId :

Quant Time: Sep 30 17:01:38 2019  
 Quant Method : Z:\VOASRV\HPCHEM1\MSVOA\_U\METHOD\SOMUTR093019WMA.M  
 Quant Title : TRACE VOA SOM01.0  
 QLast Update : Mon Sep 30 16:58:42 2019  
 Response via : Initial Calibration

| Internal Standards         | R.T.  | QIon | Response | Conc | Units | Dev(Min) |
|----------------------------|-------|------|----------|------|-------|----------|
| 1) 1,4-Difluorobenzene     | 5.86  | 114  | 171721   | 5.00 | ug/L  | 0.00     |
| 28) Chlorobenzene-d5       | 9.07  | 117  | 163087   | 5.00 | ug/L  | 0.00     |
| 60) 1,4-Dichlorobenzene-d4 | 11.46 | 152  | 81455    | 5.00 | ug/L  | 0.00     |

## System Monitoring Compounds

|                                |       |     |        |       |      |      |
|--------------------------------|-------|-----|--------|-------|------|------|
| 4) Vinyl Chloride-d3           | 1.39  | 65  | 61219  | 4.55  | ug/L | 0.00 |
| 7) Chloroethane-d5             | 1.67  | 69  | 50260  | 4.58  | ug/L | 0.00 |
| 11) 1,1-Dichloroethene-d2      | 2.26  | 63  | 103834 | 4.40  | ug/L | 0.00 |
| 20) 2-Butanone-d5              | 4.18  | 46  | 182027 | 53.51 | ug/L | 0.00 |
| 24) Chloroform-d               | 4.62  | 84  | 100712 | 4.85  | ug/L | 0.00 |
| 26) 1,2-Dichloroethane-d4      | 5.29  | 65  | 64466  | 5.30  | ug/L | 0.00 |
| 32) Benzene-d6                 | 5.31  | 84  | 208468 | 4.84  | ug/L | 0.00 |
| 36) 1,2-Dichloropropane-d6     | 6.31  | 67  | 68613  | 4.72  | ug/L | 0.00 |
| 41) Toluene-d8                 | 7.54  | 98  | 197190 | 4.83  | ug/L | 0.00 |
| 43) trans-1,3-Dichloropropene- | 7.83  | 79  | 25084  | 4.32  | ug/L | 0.00 |
| 46) 2-Hexanone-d5              | 8.30  | 63  | 128271 | 48.95 | ug/L | 0.00 |
| 57) 1,1,2,2-Tetrachloroethane- | 10.41 | 84  | 54240  | 4.77  | ug/L | 0.00 |
| 64) 1,2-Dichlorobenzene-d4     | 11.84 | 152 | 66181  | 4.72  | ug/L | 0.00 |

## Target Compounds

|                                |      |     |        |        | Qvalue   |
|--------------------------------|------|-----|--------|--------|----------|
| 2) Dichlorodifluoromethane     | 1.20 | 85  | 50337  | 4.030  | ug/L 100 |
| 3) Chloromethane               | 1.32 | 50  | 38660  | 3.385  | ug/L 100 |
| 5) Vinyl chloride              | 1.40 | 62  | 45253  | 3.703  | ug/L 100 |
| 6) Bromomethane                | 1.62 | 94  | 21061  | 3.475  | ug/L 100 |
| 8) Chloroethane                | 1.69 | 64  | 26069  | 3.686  | ug/L 100 |
| 9) Trichlorofluoromethane      | 1.87 | 101 | 62242  | 3.822  | ug/L 100 |
| 10) 1,1,2-Trichloro-1,2,2-trif | 2.27 | 101 | 37998  | 4.109  | ug/L 100 |
| 12) 1,1-Dichloroethene         | 2.27 | 96  | 29020  | 3.617  | ug/L 100 |
| 13) Acetone                    | 2.32 | 43  | 121577 | 46.649 | ug/L 100 |
| 14) Carbon disulfide           | 2.46 | 76  | 46561  | 2.388  | ug/L 100 |
| 15) Methyl Acetate             | 2.61 | 43  | 25166  | 4.103  | ug/L 100 |
| 16) Methylene chloride         | 2.68 | 84  | 39021  | 3.605  | ug/L 100 |
| 17) Methyl tert-butyl Ether    | 2.99 | 73  | 126879 | 4.372  | ug/L 100 |
| 18) trans-1,2-Dichloroethene   | 2.96 | 96  | 29503  | 3.531  | ug/L 100 |
| 19) 1,1-Dichloroethane         | 3.42 | 63  | 91161  | 4.355  | ug/L 100 |
| 21) 2-Butanone                 | 4.26 | 43  | 198195 | 52.853 | ug/L 100 |
| 22) cis-1,2-Dichloroethene     | 4.20 | 96  | 46188  | 4.061  | ug/L 100 |
| 23) Bromochloromethane         | 4.52 | 128 | 18114  | 4.310  | ug/L 100 |
| 25) Chloroform                 | 4.65 | 83  | 107253 | 4.510  | ug/L 100 |
| 27) 1,2-Dichloroethane         | 5.38 | 62  | 64132  | 4.695  | ug/L 100 |
| 29) 1,1,1-Trichloroethane      | 4.89 | 97  | 75592  | 4.487  | ug/L 100 |
| 30) Cyclohexane                | 4.97 | 56  | 56842  | 3.382  | ug/L 100 |
| 31) Carbon tetrachloride       | 5.11 | 117 | 58603  | 4.307  | ug/L 100 |
| 33) Benzene                    | 5.36 | 78  | 167163 | 3.957  | ug/L 100 |
| 34) Trichloroethene            | 6.16 | 95  | 43755  | 4.134  | ug/L 100 |
| 35) Methylcyclohexane          | 6.39 | 83  | 55544  | 3.358  | ug/L 100 |
| 37) 1,2-Dichloropropane        | 6.41 | 63  | 55928  | 4.219  | ug/L 100 |
| 38) Bromodichloromethane       | 6.74 | 83  | 71630  | 4.465  | ug/L 100 |
| 39) cis-1,3-Dichloropropene    | 7.25 | 75  | 74038  | 4.031  | ug/L 100 |
| 40) 4-Methyl-2-pentanone       | 7.44 | 43  | 499997 | 48.935 | ug/L 100 |

Data Path : Z:\VOASRV\HPCHEM1\MSVOA U\DATA\VU093019\  
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 Operator : JC/SP  
 Sample : VSTD00506  
 Misc : 25.0mL/MSVOA U/WATER  
 ALS Vial : 5 Sample Multiplier: 1

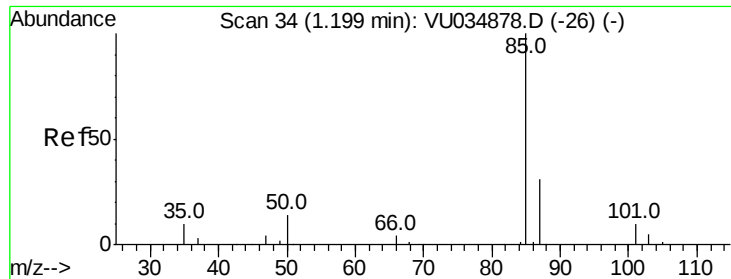
Instrument :  
 MSVOA\_U  
 ClientSampleId :

Quant Time: Sep 30 17:01:38 2019  
 Quant Method : Z:\VOASRV\HPCHEM1\MSVOA\_U\METHOD\SOMUTR093019WMA.M  
 Quant Title : TRACE VOA SOM01.0  
 QLast Update : Mon Sep 30 16:58:42 2019  
 Response via : Initial Calibration

| Internal Standards             | R.T.  | QIon | Response | Conc   | Units | Dev(Min) |
|--------------------------------|-------|------|----------|--------|-------|----------|
| 42) Toluene                    | 7.61  | 91   | 183279   | 4.004  | ug/L  | 100      |
| 44) trans-1,3-Dichloropropene  | 7.86  | 75   | 61765    | 4.112  | ug/L  | 100      |
| 45) 1,1,2-Trichloroethane      | 8.05  | 97   | 40749    | 4.736  | ug/L  | 100      |
| 47) Tetrachloroethene          | 8.21  | 164  | 29519    | 4.516  | ug/L  | 100      |
| 48) 2-Hexanone                 | 8.35  | 43   | 346374   | 50.221 | ug/L  | 100      |
| 49) Dibromochloromethane       | 8.46  | 129  | 46991    | 4.672  | ug/L  | 100      |
| 50) 1,2-Dibromoethane          | 8.57  | 107  | 31883    | 4.184  | ug/L  | 100      |
| 51) Chlorobenzene              | 9.10  | 112  | 121181   | 4.203  | ug/L  | 100      |
| 52) Ethylbenzene               | 9.23  | 91   | 214895   | 4.058  | ug/L  | 100      |
| 53) m,p-Xylene                 | 9.35  | 106  | 74927    | 3.996  | ug/L  | 100      |
| 54) o-Xylene                   | 9.76  | 106  | 77695    | 4.106  | ug/L  | 100      |
| 55) Styrene                    | 9.77  | 104  | 135632   | 4.292  | ug/L  | 100      |
| 56) Isopropylbenzene           | 10.14 | 105  | 225617   | 4.267  | ug/L  | 100      |
| 58) 1,1,2,2-Tetrachloroethane  | 10.44 | 83   | 58022    | 4.626  | ug/L  | 100      |
| 59) 1,2,3-Trichloropropane     | 10.47 | 75   | 39963    | 4.560  | ug/L  | 100      |
| 61) Bromoform                  | 9.94  | 173  | 25009    | 4.681  | ug/L  | 100      |
| 62) 1,3-Dichlorobenzene        | 11.40 | 146  | 103749   | 4.410  | ug/L  | 100      |
| 63) 1,4-Dichlorobenzene        | 11.49 | 146  | 102948   | 4.401  | ug/L  | 100      |
| 65) 1,2-Dichlorobenzene        | 11.85 | 146  | 107063   | 4.600  | ug/L  | 100      |
| 66) 1,2-Dibromo-3-chloropropan | 12.64 | 75   | 8813     | 4.325  | ug/L  | 100      |
| 67) 1,3,5-Trichlorobenzene     | 12.86 | 180  | 79180    | 5.033  | ug/L  | 100      |
| 68) 1,2,4-trichlorobenzene     | 13.48 | 180  | 62014    | 4.975  | ug/L  | 100      |
| 69) Naphthalene                | 13.72 | 128  | 102818   | 3.526  | ug/L  | 100      |
| 70) 1,2,3-Trichlorobenzene     | 13.97 | 180  | 60592    | 5.138  | ug/L  | 100      |

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





#2

Dichlorodifluoromethane

Concen: 4.030 ug/L

RT: 1.20 min Scan# 34

Delta R.T. 0.00 min

Lab File: VU034878.D

Acq: 30 Sep 2019 13:41

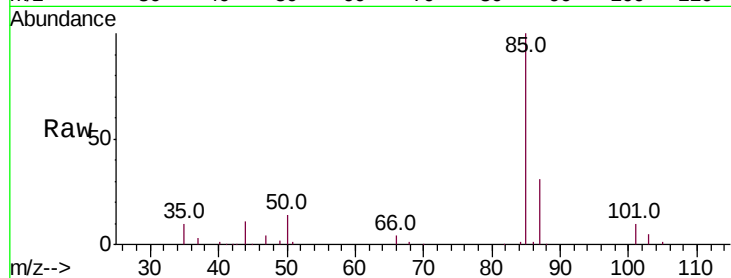
Instrument :  
MSVOA\_U  
ClientSampleId :

Tot Ion: 85 Resp: 50337

Ion Ratio Lower Upper

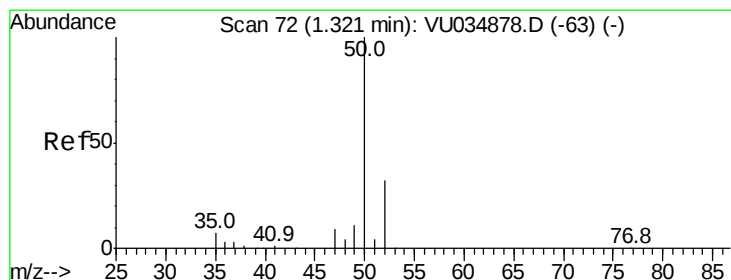
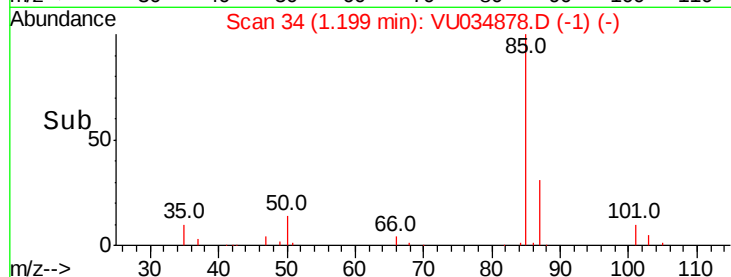
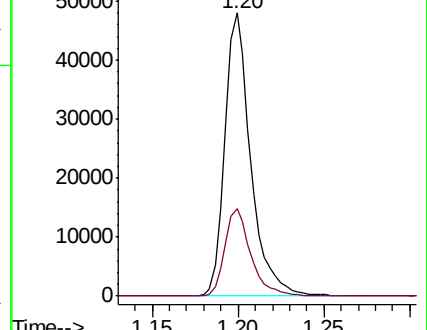
85 100

87 31.3 25.0 37.6



Abundance Ion 85.00 (84.70 to 85.70): VU034878.D (-26) (-)

Ion 87.00 (86.70 to 87.70): VU034878.D (-26) (-)



#3

Chloromethane

Concen: 3.385 ug/L

RT: 1.32 min Scan# 72

Delta R.T. 0.00 min

Lab File: VU034878.D

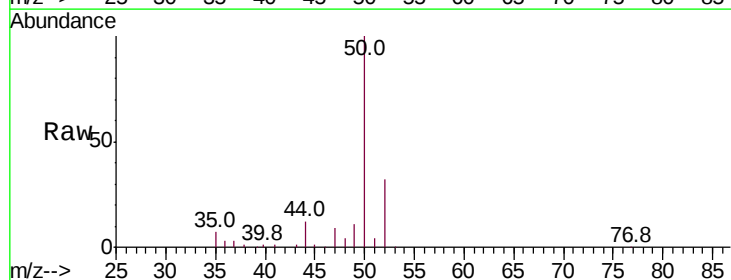
Acq: 30 Sep 2019 13:41

Tgt Ion: 50 Resp: 38660

Ion Ratio Lower Upper

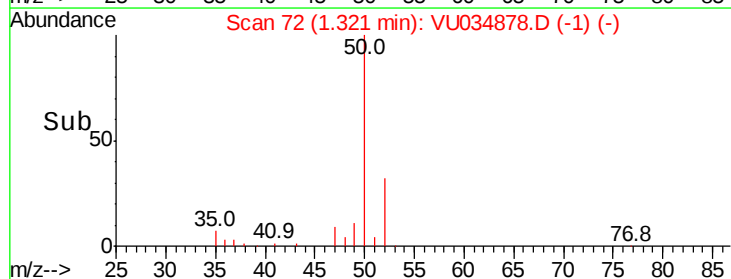
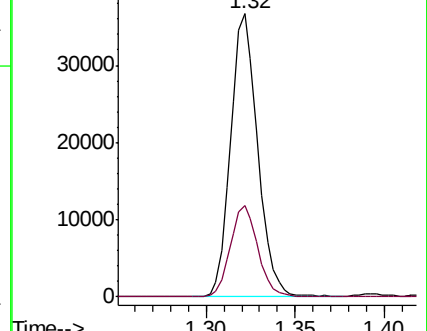
50 100

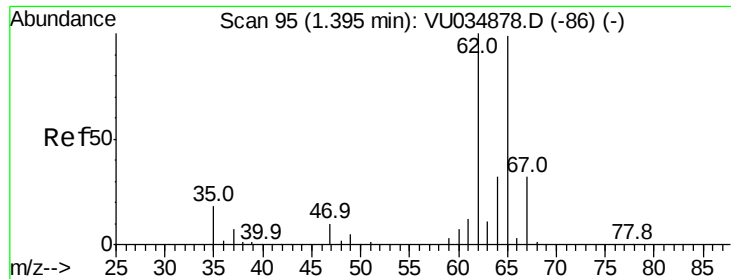
52 32.4 22.7 42.1



Abundance Ion 50.05 (49.75 to 50.75): VU034878.D (-63) (-)

Ion 52.05 (51.75 to 52.75): VU034878.D (-63) (-)





#5

Vinyl chloride

Concen: 3.703 ug/L

RT: 1.40 min Scan# 95

Delta R.T. 0.00 min

Lab File: VU034878.D

Acq: 30 Sep 2019 13:41

Instrument :

MSVOA\_U

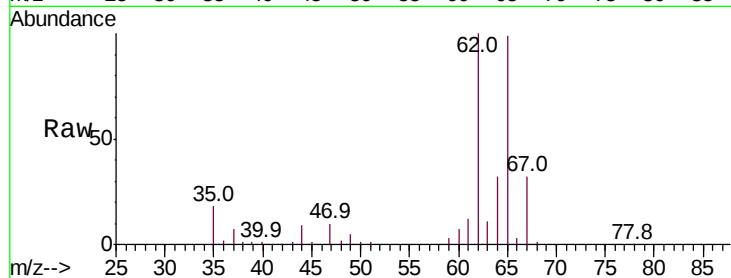
ClientSampleId :

Tot Ion: 62 Resp: 45253

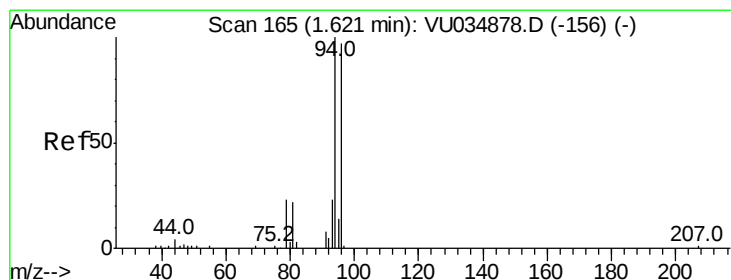
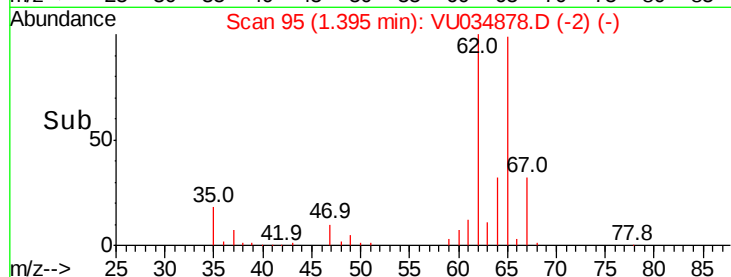
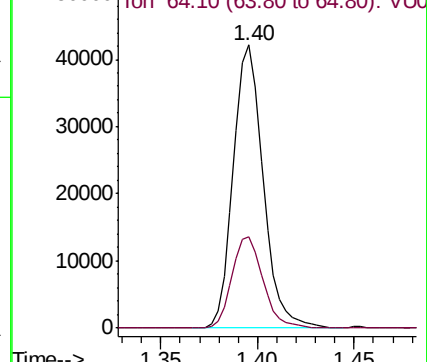
Ion Ratio Lower Upper

62 100

64 32.3 22.6 42.0



Abundance Ion 62.00 (61.70 to 62.70): VU034878.D (-86) (-)



#6

Bromomethane

Concen: 3.475 ug/L

RT: 1.62 min Scan# 165

Delta R.T. 0.00 min

Lab File: VU034878.D

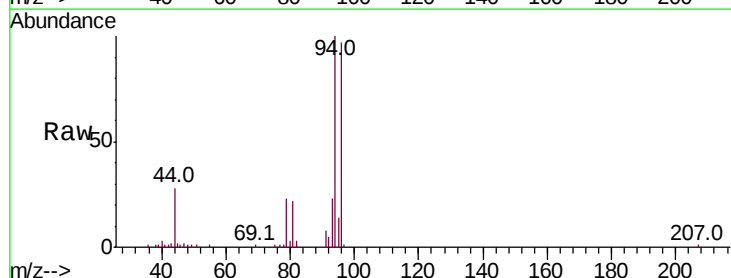
Acq: 30 Sep 2019 13:41

Tgt Ion: 94 Resp: 21061

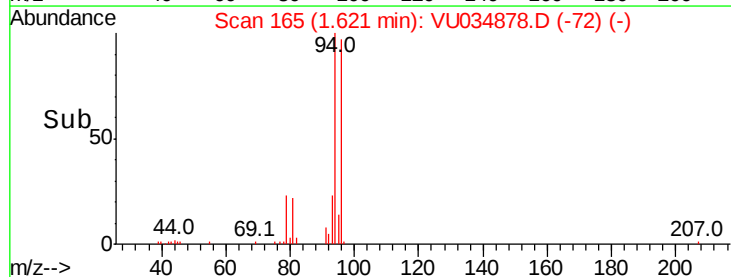
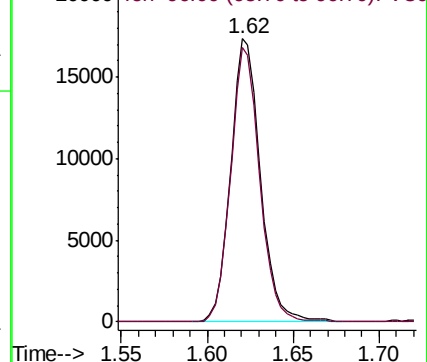
Ion Ratio Lower Upper

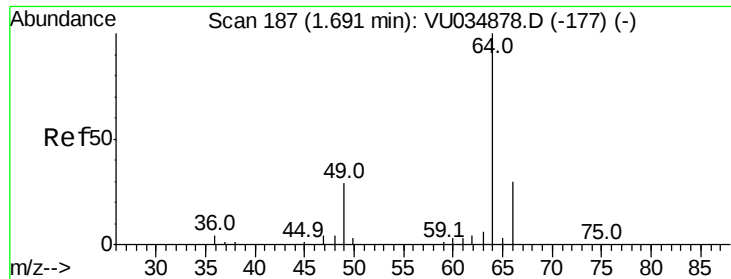
94 100

96 96.7 67.7 125.7



Abundance Ion 94.00 (93.70 to 94.70): VU034878.D (-156) (-)





#8

Chloroethane

Concen: 3.686 ug/L

RT: 1.69 min Scan# 187

Delta R.T. 0.00 min

Lab File: VU034878.D

Acq: 30 Sep 2019 13:41

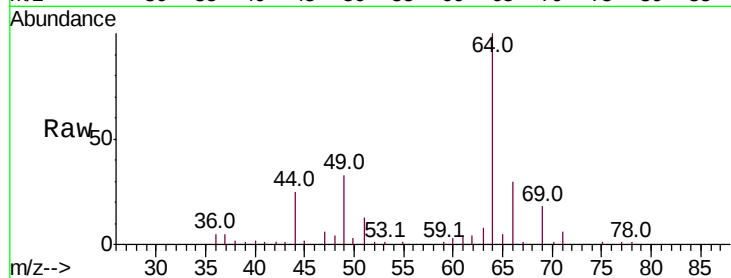
Instrument :  
MSVOA\_U  
ClientSampleId :

Tot Ion: 64 Resp: 26069

Ion Ratio Lower Upper

64 100

66 29.9 20.9 38.9

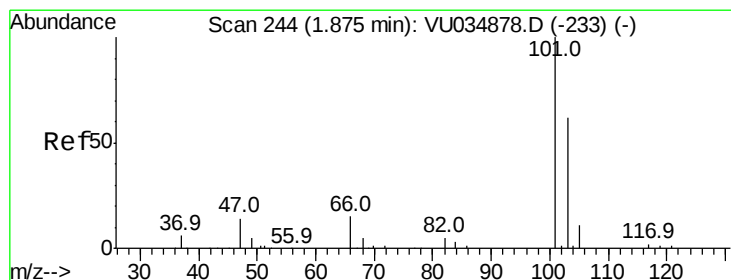
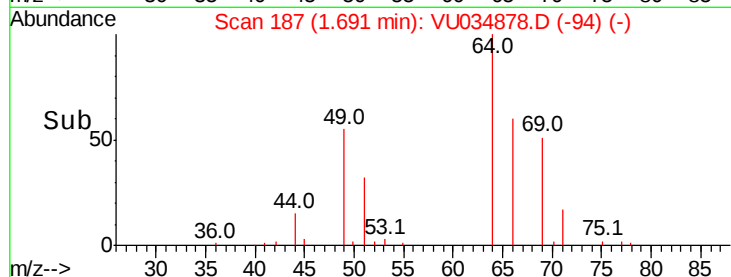


Abundance Ion 64.10 (63.80 to 64.80): VU034878.D (-177) (-)

Ion 66.05 (65.75 to 66.75): VU034878.D (-177) (-)

1.69

Time-->



#9

Trichlorofluoromethane

Concen: 3.822 ug/L

RT: 1.87 min Scan# 244

Delta R.T. 0.00 min

Lab File: VU034878.D

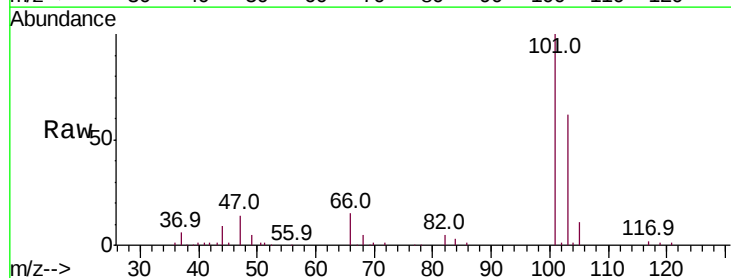
Acq: 30 Sep 2019 13:41

Tgt Ion:101 Resp: 62242

Ion Ratio Lower Upper

101 100

103 62.9 50.3 75.5

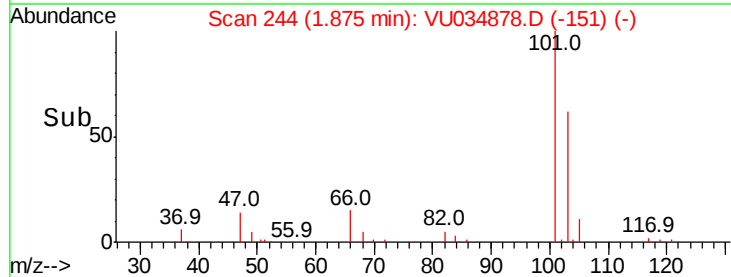


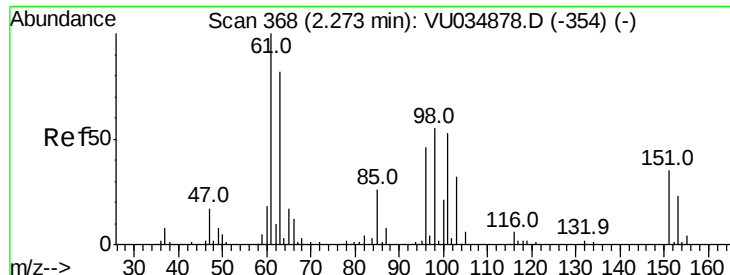
Abundance Ion 101.00 (100.70 to 101.70): VU034878.D (-233) (-)

Ion 103.00 (102.70 to 103.70): VU034878.D (-233) (-)

1.87

Time-->





#10

1,1,2-Trichloro-1,2,2-trifluoroethane

Concen: 4.109 ug/L

RT: 2.27 min Scan# 368

Delta R.T. 0.00 min

Lab File: VU034878.D

Acq: 30 Sep 2019 13:41

Instrument :

MSVOA\_U

ClientSampleId :

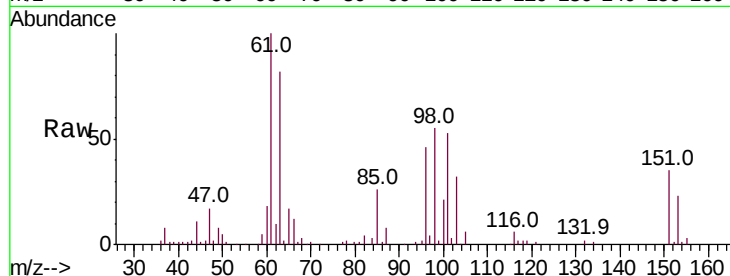
Tot Ion:101 Resp: 37998

Ion Ratio Lower Upper

101 100

85 46.6 37.3 55.9

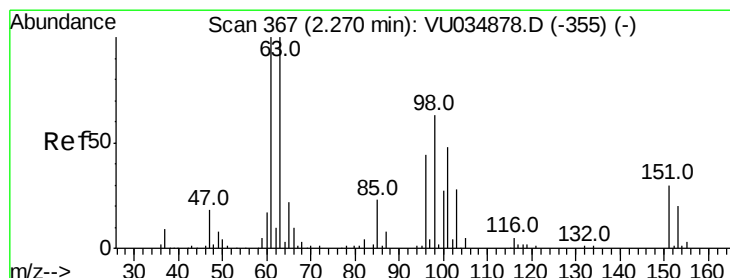
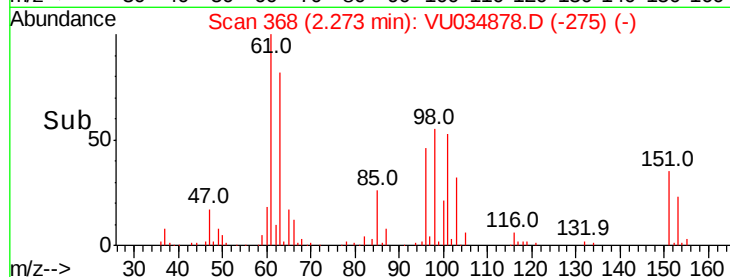
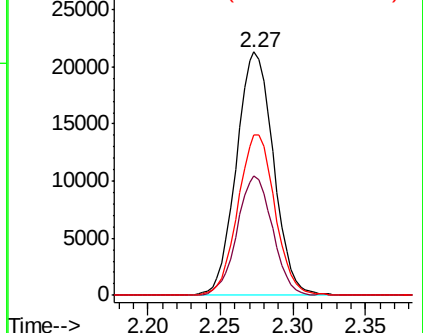
151 65.7 52.6 78.8



Abundance Ion 101.00 (100.70 to 101.70): V

Ion 85.00 (84.70 to 85.70): VU0

Ion 151.00 (150.70 to 151.70): V



#12

1,1-Dichloroethene

Concen: 3.617 ug/L

RT: 2.27 min Scan# 367

Delta R.T. 0.00 min

Lab File: VU034878.D

Acq: 30 Sep 2019 13:41

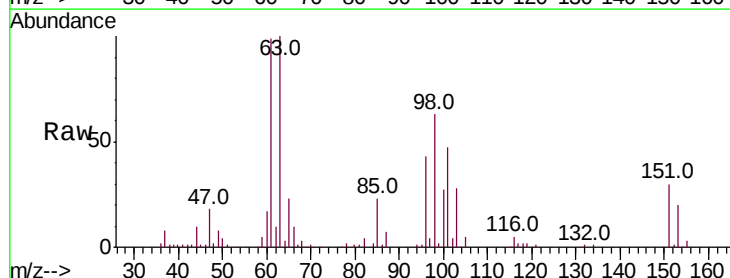
Tgt Ion: 96 Resp: 29020

Ion Ratio Lower Upper

96 100

61 229.3 160.5 298.1

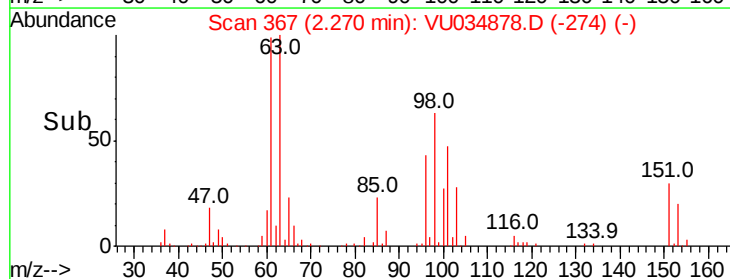
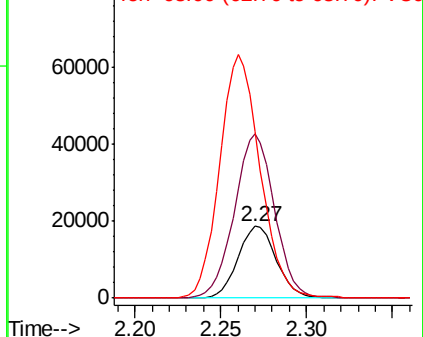
63 231.9 162.3 301.5

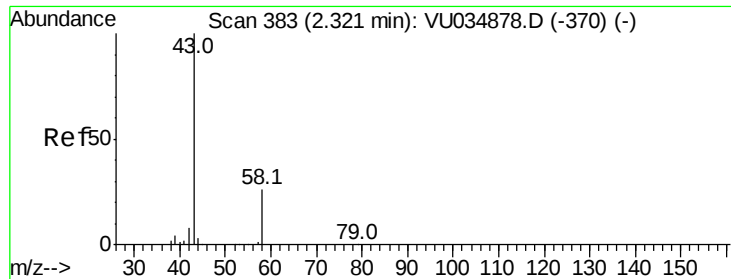


Abundance Ion 96.00 (95.70 to 96.70): VU0

Ion 61.05 (60.75 to 61.75): VU0

Ion 63.00 (62.70 to 63.70): VU0





#13

Acetone

Concen: 46.649 ug/L

RT: 2.32 min Scan# 383

Delta R.T. 0.00 min

Lab File: VU034878.D

Acq: 30 Sep 2019 13:41

Instrument :

MSVOA\_U

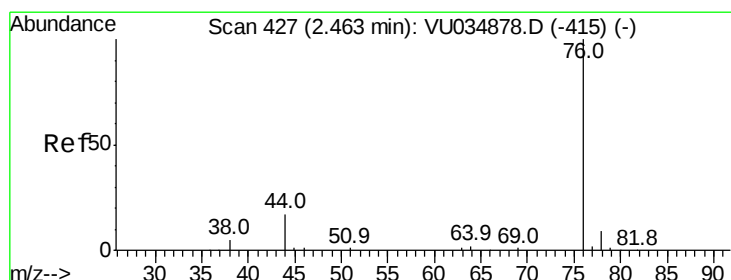
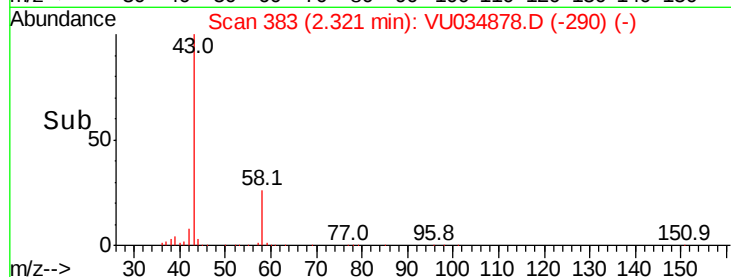
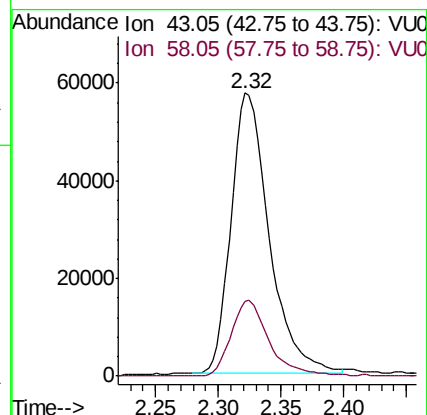
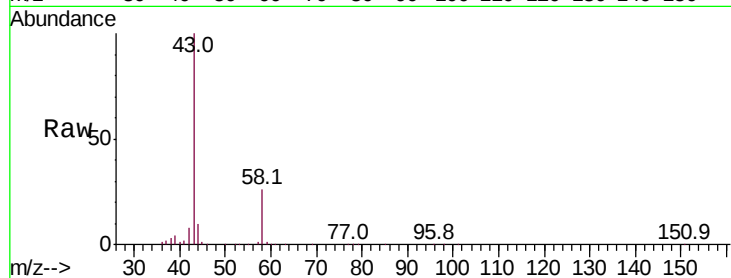
ClientSampleId :

Tot Ion: 43 Resp: 121577

Ion Ratio Lower Upper

43 100

58 27.0 0.0 54.0



#14

Carbon disulfide

Concen: 2.388 ug/L

RT: 2.46 min Scan# 427

Delta R.T. 0.00 min

Lab File: VU034878.D

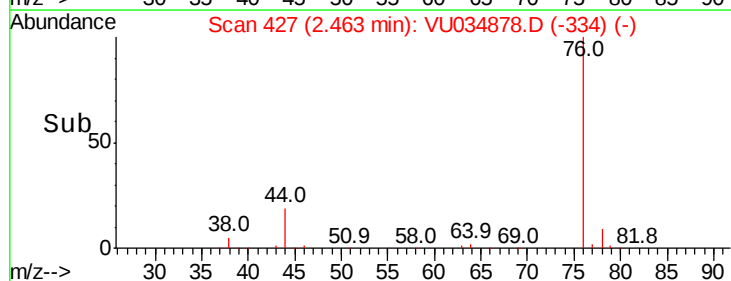
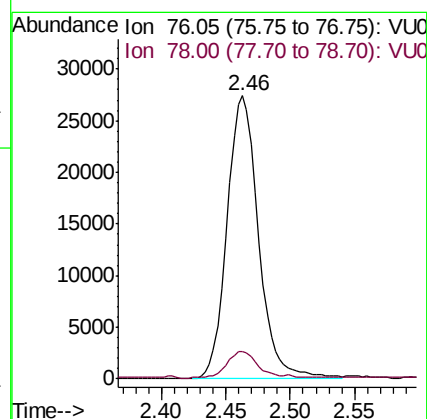
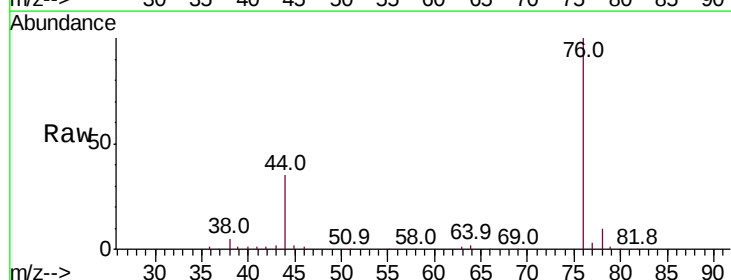
Acq: 30 Sep 2019 13:41

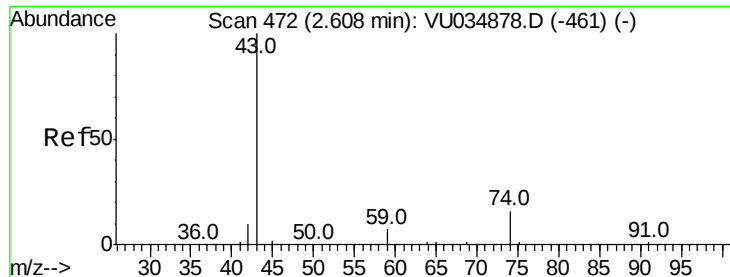
Tgt Ion: 76 Resp: 46561

Ion Ratio Lower Upper

76 100

78 9.9 7.9 11.9

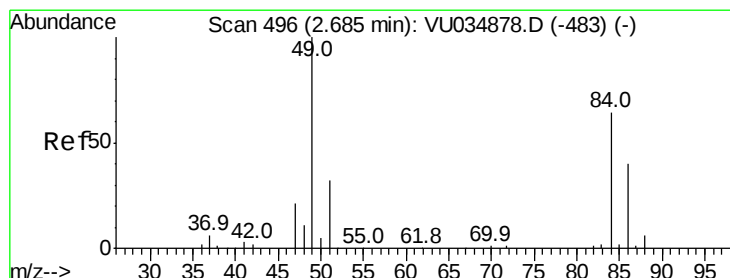
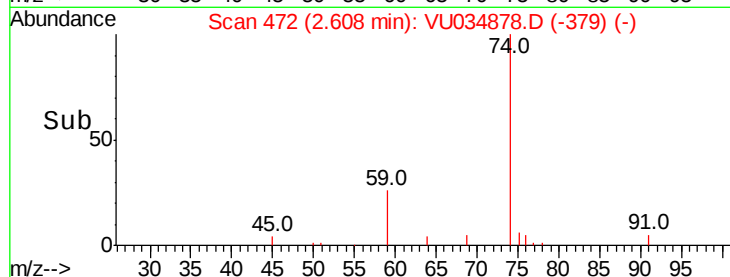
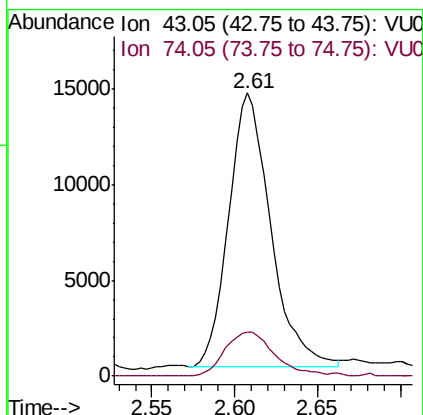
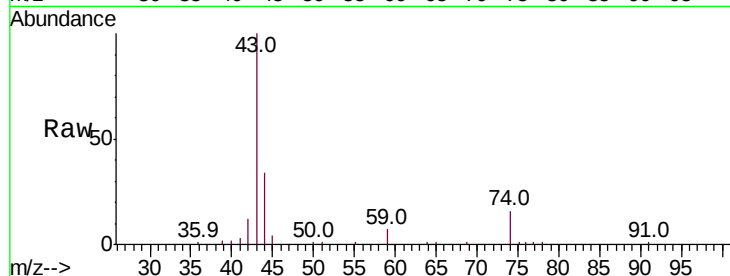




#15  
Methyl Acetate  
Concen: 4.103 ug/L  
RT: 2.61 min Scan# 472  
Delta R.T. 0.00 min  
Lab File: VU034878.D  
Acq: 30 Sep 2019 13:41

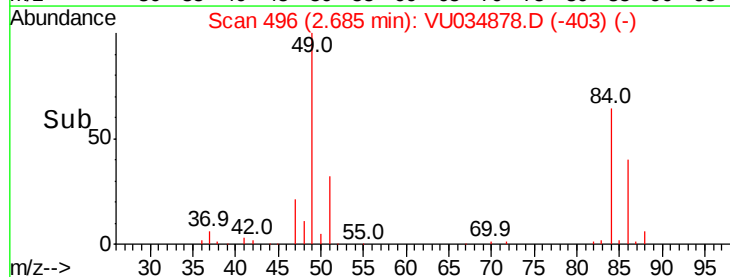
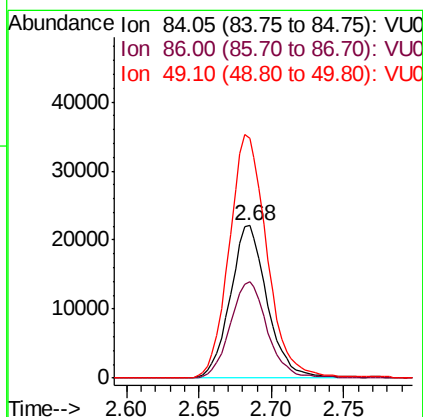
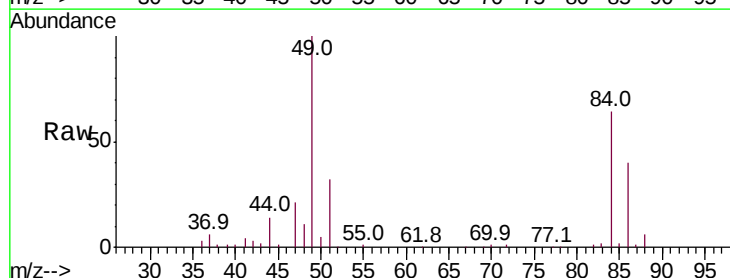
Instrument :  
MSVOA\_U  
ClientSampleId :

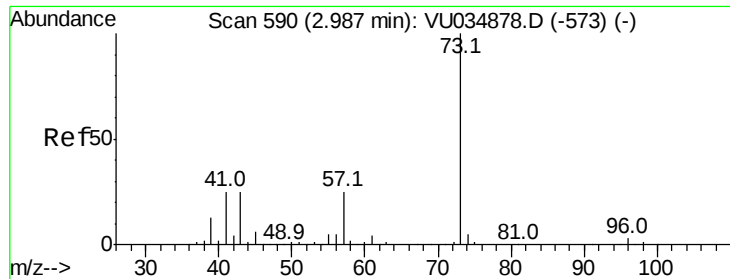
Tot Ion: 43 Resp: 25166  
Ion Ratio Lower Upper  
43 100  
74 19.4 15.5 23.3



#16  
Methylene chloride  
Concen: 3.605 ug/L  
RT: 2.68 min Scan# 496  
Delta R.T. 0.00 min  
Lab File: VU034878.D  
Acq: 30 Sep 2019 13:41

Tgt Ion: 84 Resp: 39021  
Ion Ratio Lower Upper  
84 100  
86 63.2 44.2 82.2  
49 157.2 110.0 204.4

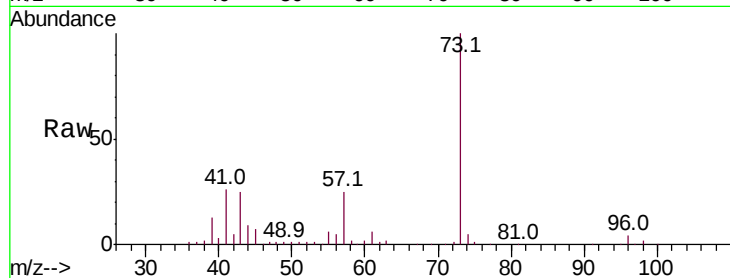




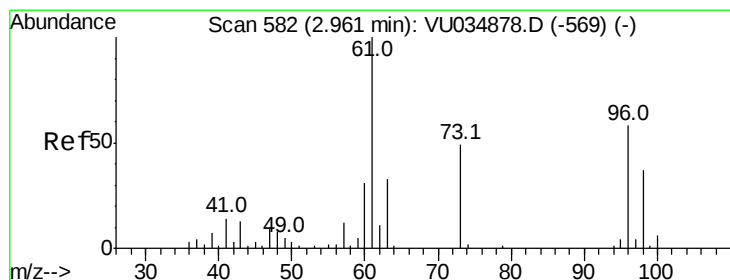
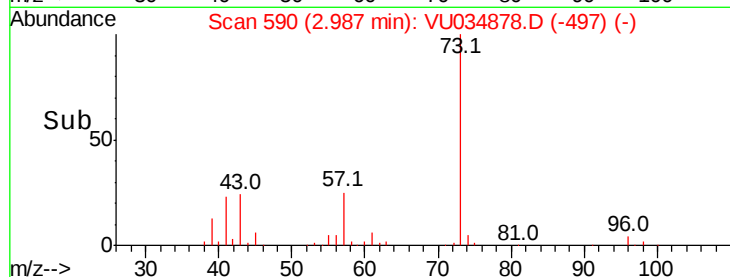
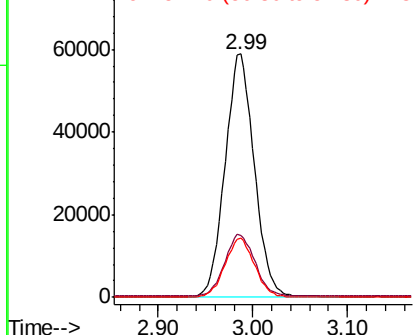
#17  
Methvl tert-butvl Ether  
Concen: 4.372 ug/L  
RT: 2.99 min Scan# 590  
Delta R.T. 0.00 min  
Lab File: VU034878.D  
Acq: 30 Sep 2019 13:41

Instrument :  
MSVOA\_U  
ClientSampleId :

Tot Ion: 73 Resp: 126879  
Ion Ratio Lower Upper  
73 100  
43 26.0 20.8 31.2  
57 24.7 19.8 29.6

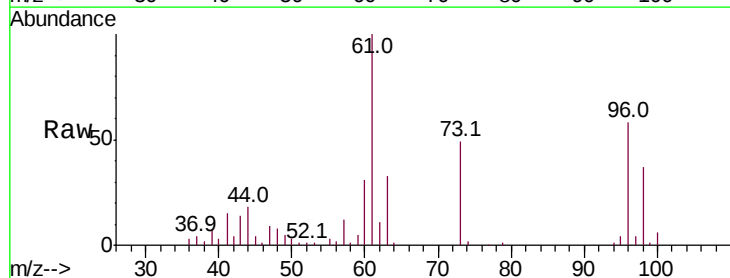


Abundance Ion 73.10 (72.80 to 73.80): VU0  
Ion 43.05 (42.75 to 43.75): VU0  
Ion 57.10 (56.80 to 57.80): VU0

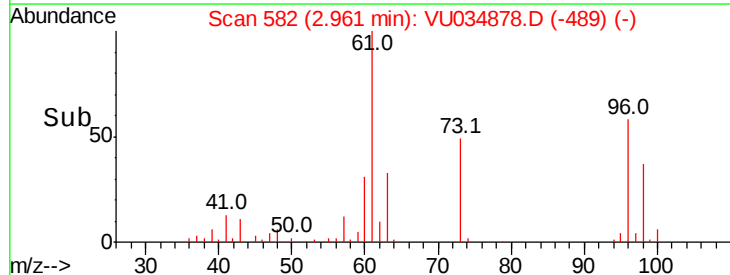
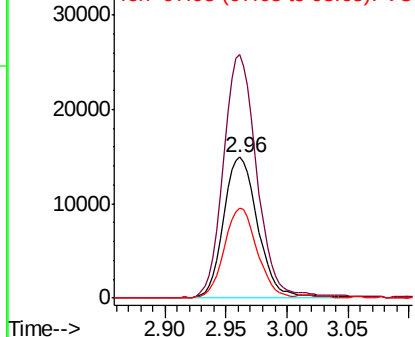


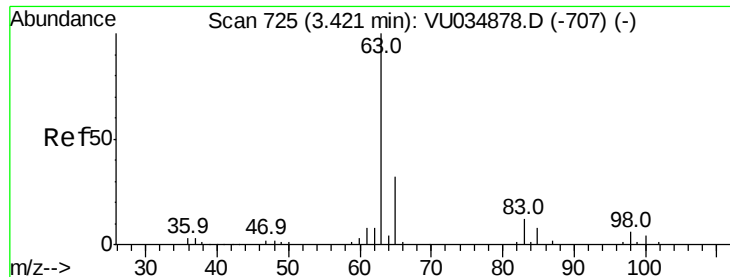
#18  
trans-1,2-Dichloroethene  
Concen: 3.531 ug/L  
RT: 2.96 min Scan# 582  
Delta R.T. 0.00 min  
Lab File: VU034878.D  
Acq: 30 Sep 2019 13:41

Tgt Ion: 96 Resp: 29503  
Ion Ratio Lower Upper  
96 100  
61 172.9 121.0 224.8  
98 63.9 44.7 83.1



Abundance Ion 96.00 (95.70 to 96.70): VU0  
Ion 61.05 (60.75 to 61.75): VU0  
Ion 97.95 (97.65 to 98.65): VU0





#19

1,1-Dichloroethane

Concen: 4.355 ug/L

RT: 3.42 min Scan# 725

Delta R.T. 0.00 min

Lab File: VU034878.D

Acq: 30 Sep 2019 13:41

Instrument :

MSVOA\_U

ClientSampled :

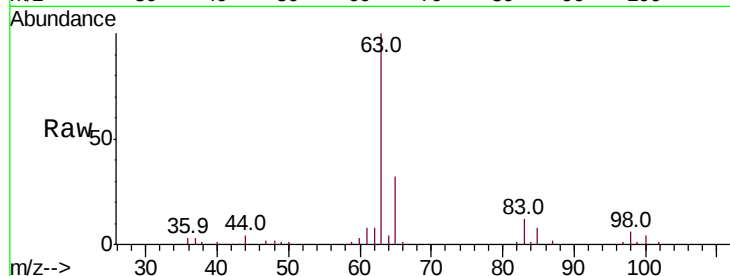
Tot Ion: 63 Resp: 91161

Ion Ratio Lower Upper

63 100

65 32.4 22.7 42.1

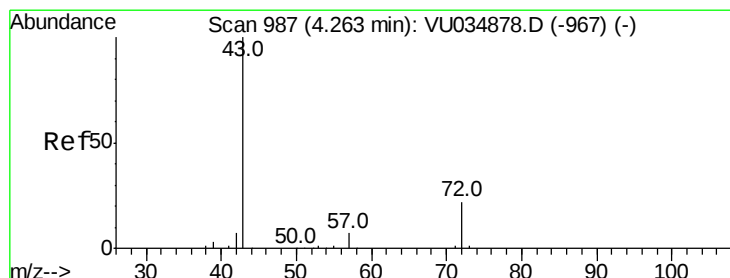
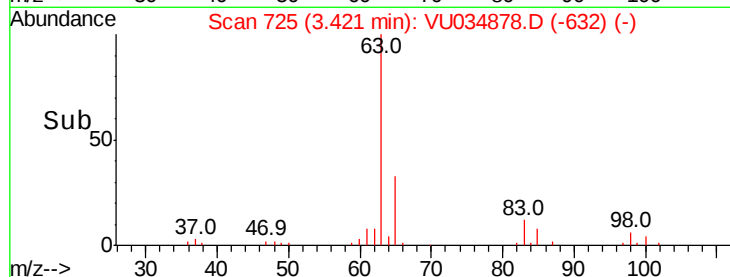
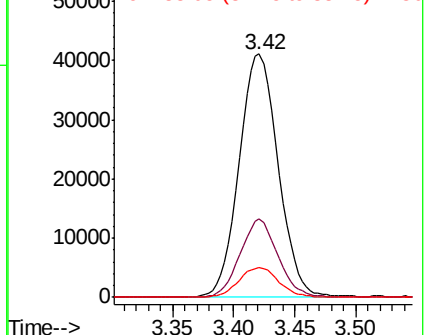
83 12.0 8.4 15.6



Abundance Ion 63.10 (62.80 to 63.80): VU034878.D (-707) (-)

Ion 65.10 (64.80 to 65.80): VU034878.D (-707) (-)

Ion 83.05 (82.75 to 83.75): VU034878.D (-707) (-)



#21

2-Butanone

Concen: 52.853 ug/L

RT: 4.26 min Scan# 987

Delta R.T. 0.00 min

Lab File: VU034878.D

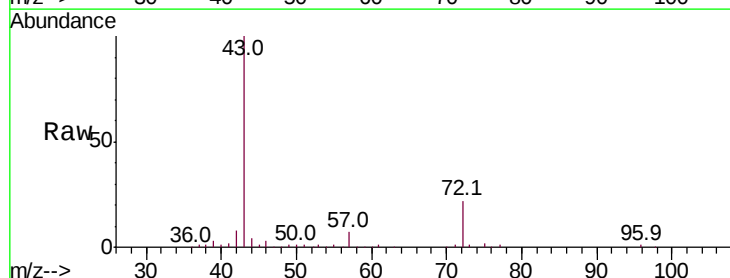
Acq: 30 Sep 2019 13:41

Tgt Ion: 43 Resp: 198195

Ion Ratio Lower Upper

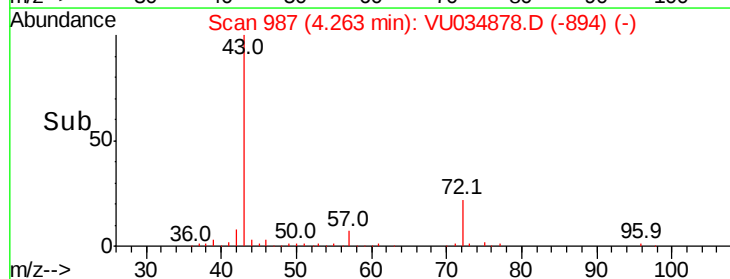
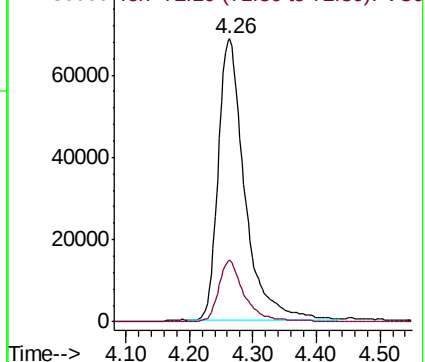
43 100

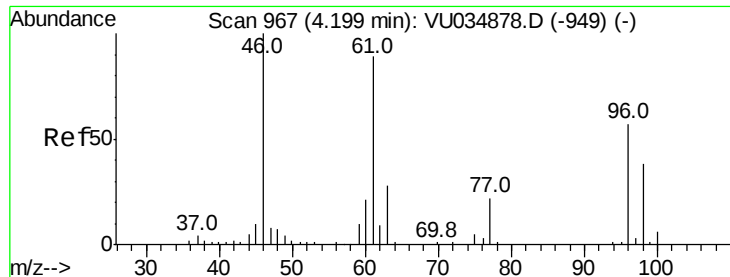
72 20.1 10.1 30.1



Abundance Ion 43.05 (42.75 to 43.75): VU034878.D (-967) (-)

Ion 72.10 (71.80 to 72.80): VU034878.D (-967) (-)



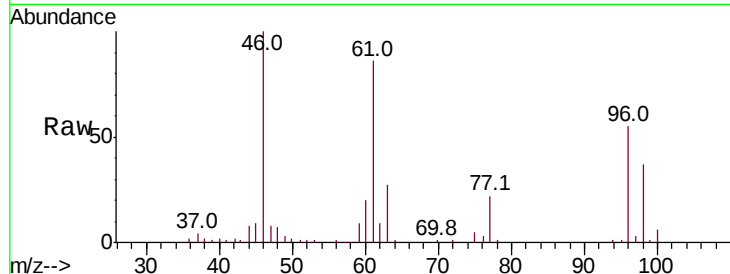


#22

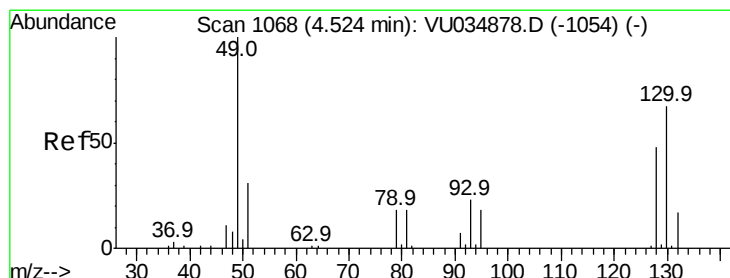
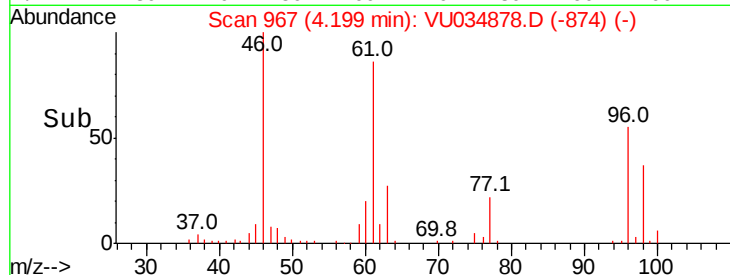
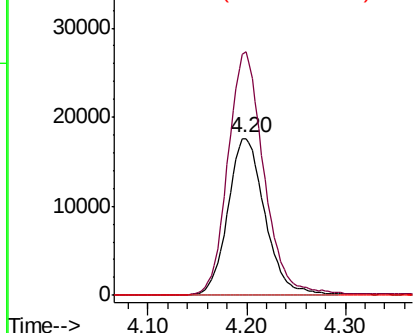
cis-1,2-Dichloroethene  
Concen: 4.061 ug/L  
RT: 4.20 min Scan# 967  
Delta R.T. 0.00 min  
Lab File: VU034878.D  
Acq: 30 Sep 2019 13:41

Instrument :  
MSVOA\_U  
ClientSampleId :

Tot Ion: 96 Resp: 46188  
Ion Ratio Lower Upper  
96 100  
61 155.2 108.6 201.8  
68 0.0 0.0 0.0



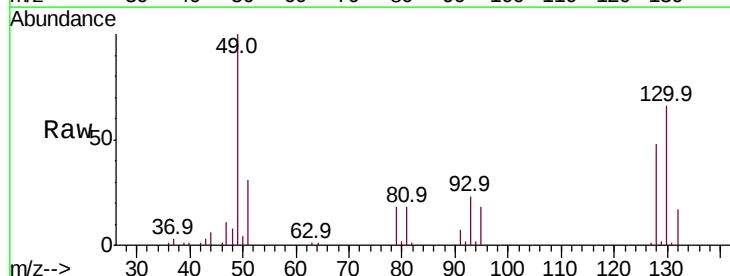
Abundance Ion 96.00 (95.70 to 96.70): VU0  
Ion 61.05 (60.75 to 61.75): VU0  
Ion 68.15 (67.85 to 68.85): VU0



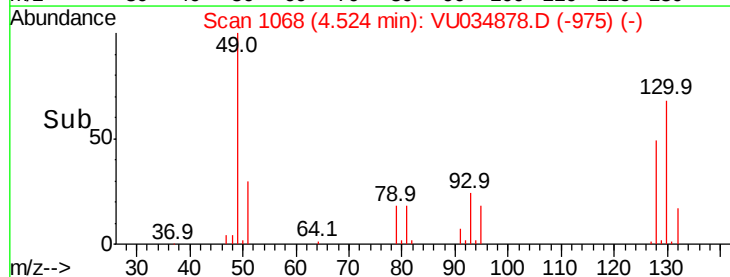
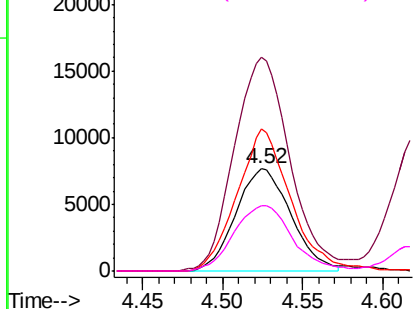
#23

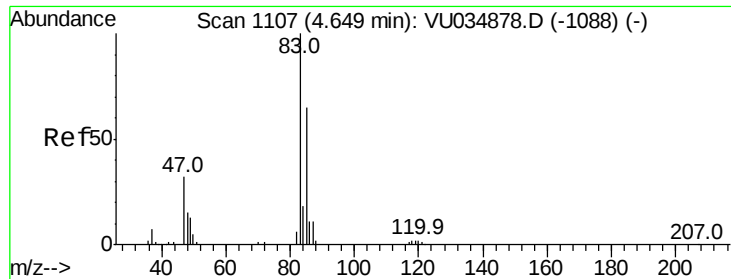
Bromochloromethane  
Concen: 4.310 ug/L  
RT: 4.52 min Scan# 1068  
Delta R.T. 0.00 min  
Lab File: VU034878.D  
Acq: 30 Sep 2019 13:41

Tgt Ion:128 Resp: 18114  
Ion Ratio Lower Upper  
128 100  
49 209.3 146.5 272.1  
130 138.8 97.2 180.4  
51 64.1 51.3 76.9



Abundance Ion 127.90 (127.60 to 128.60): V  
Ion 49.10 (48.80 to 49.80): VU0  
Ion 129.95 (129.65 to 130.65): V  
Ion 51.05 (50.75 to 51.75): VU0

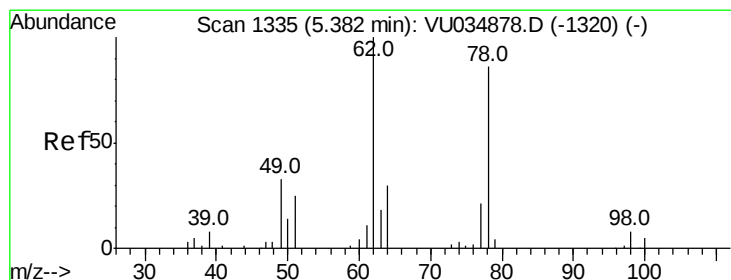
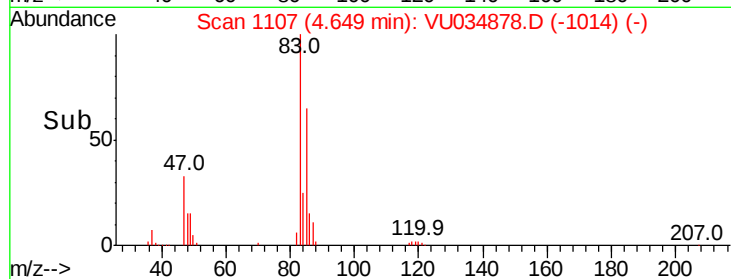
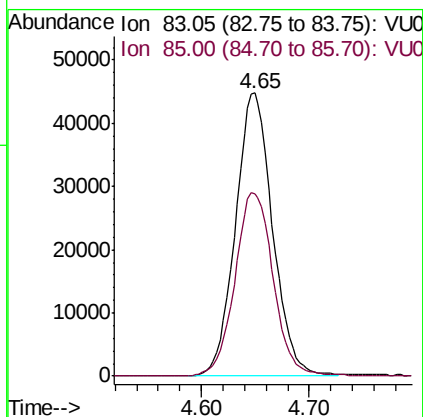
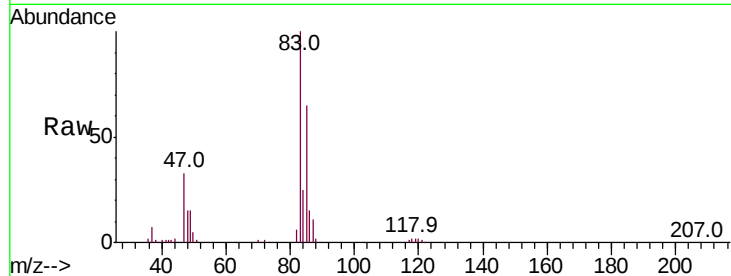




#25  
Chloroform  
Concen: 4.510 ug/L  
RT: 4.65 min Scan# 1107  
Delta R.T. 0.00 min  
Lab File: VU034878.D  
Acq: 30 Sep 2019 13:41

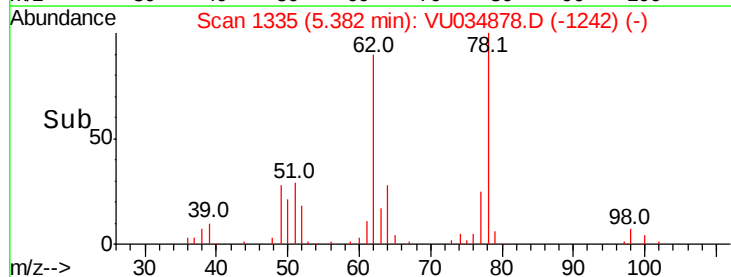
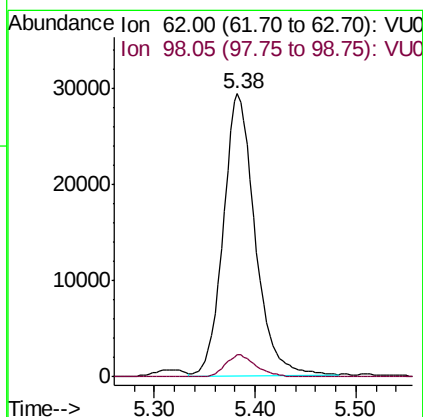
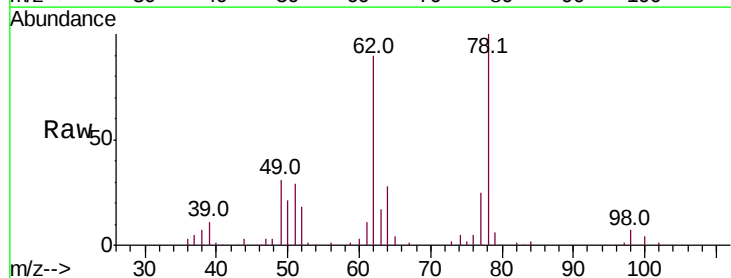
Instrument :  
MSVOA\_U  
ClientSampleId :

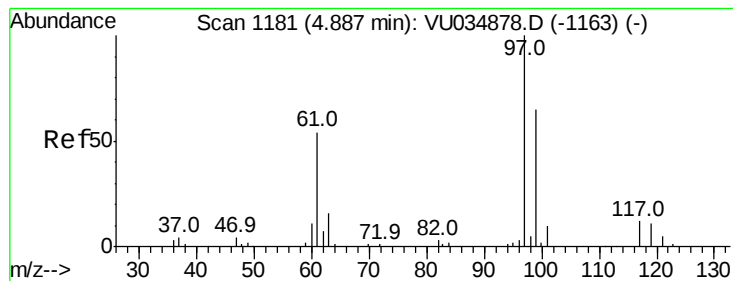
Tot Ion: 83 Resp: 107253  
Ion Ratio Lower Upper  
83 100  
85 64.6 45.2 84.0



#27  
1,2-Dichloroethane  
Concen: 4.695 ug/L  
RT: 5.38 min Scan# 1335  
Delta R.T. 0.00 min  
Lab File: VU034878.D  
Acq: 30 Sep 2019 13:41

Tgt Ion: 62 Resp: 64132  
Ion Ratio Lower Upper  
62 100  
98 7.8 6.2 9.4





#29

1,1,1-Trichloroethane

Concen: 4.487 ug/L

RT: 4.89 min Scan# 1181

Delta R.T. 0.00 min

Lab File: VU034878.D

Acq: 30 Sep 2019 13:41

Instrument :  
MSVOA\_U  
ClientSampled :

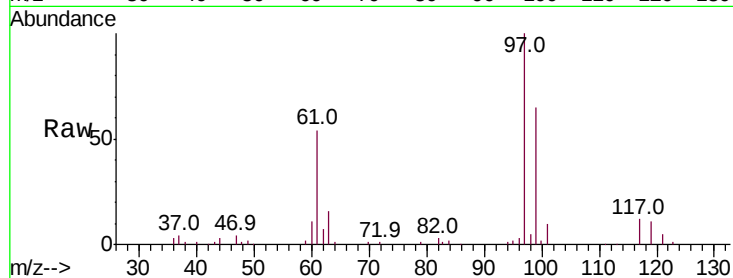
Tot Ion: 97 Resp: 75592

Ion Ratio Lower Upper

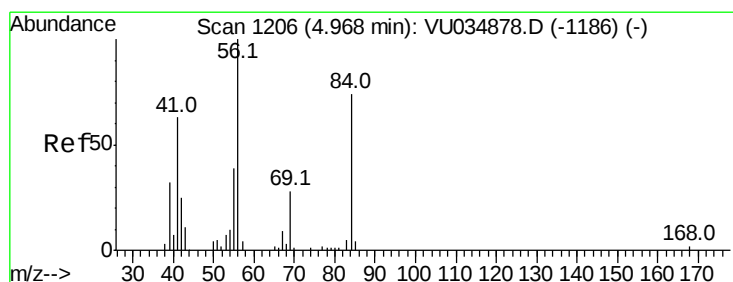
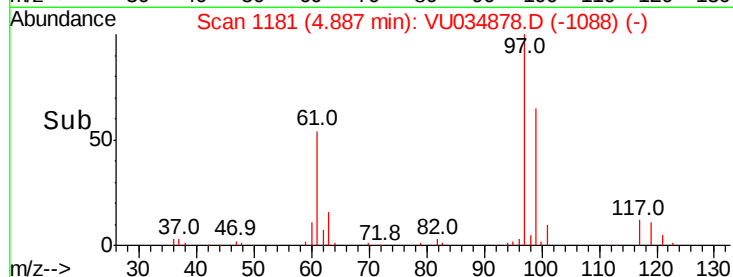
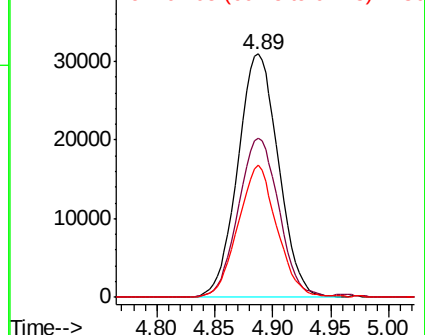
97 100

99 65.3 52.2 78.4

61 51.8 41.4 62.2



Abundance Ion 96.95 (96.65 to 97.65): VU0  
Ion 99.05 (98.75 to 99.75): VU0  
Ion 61.05 (60.75 to 61.75): VU0



#30

Cyclohexane

Concen: 3.382 ug/L

RT: 4.97 min Scan# 1206

Delta R.T. 0.00 min

Lab File: VU034878.D

Acq: 30 Sep 2019 13:41

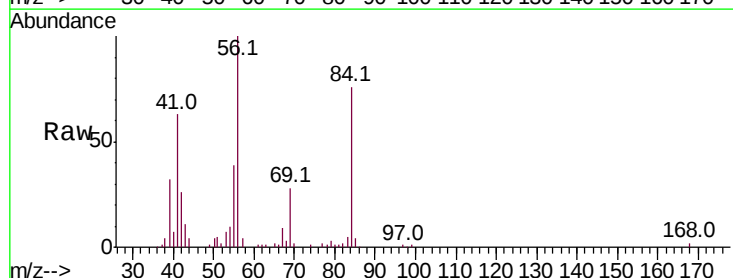
Tgt Ion: 56 Resp: 56842

Ion Ratio Lower Upper

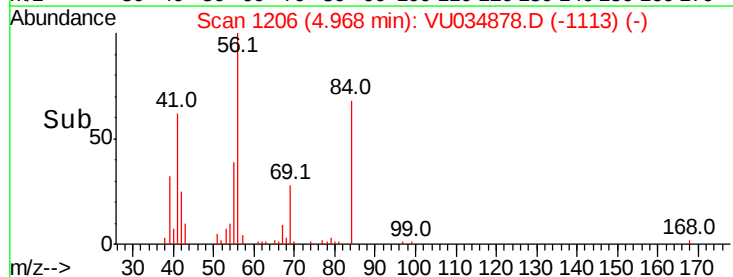
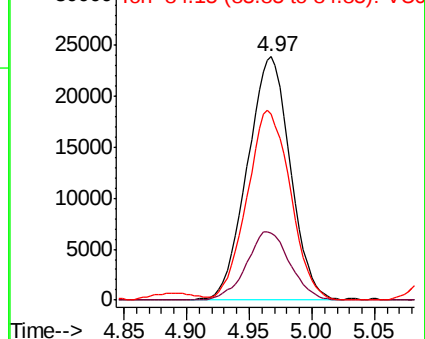
56 100

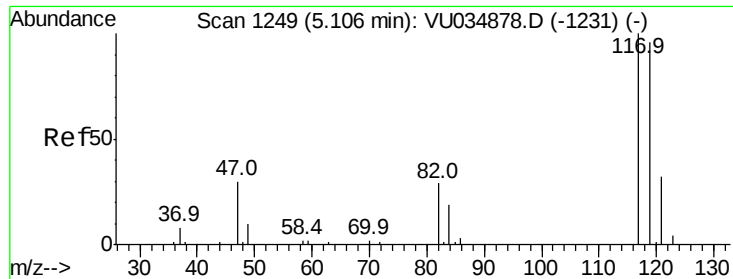
69 28.3 22.6 34.0

84 79.3 63.4 95.2



Abundance Ion 56.10 (55.80 to 56.80): VU0  
Ion 69.15 (68.85 to 69.85): VU0  
Ion 84.15 (83.85 to 84.85): VU0

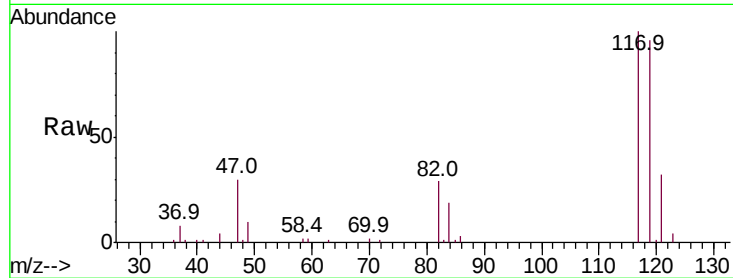




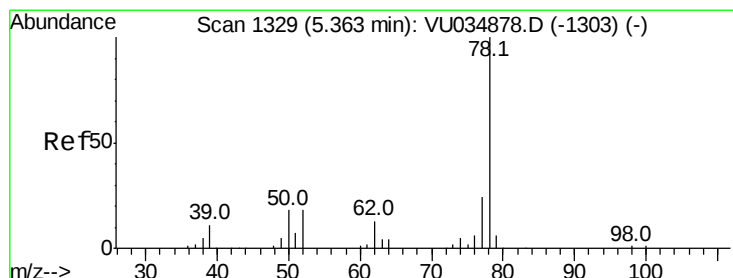
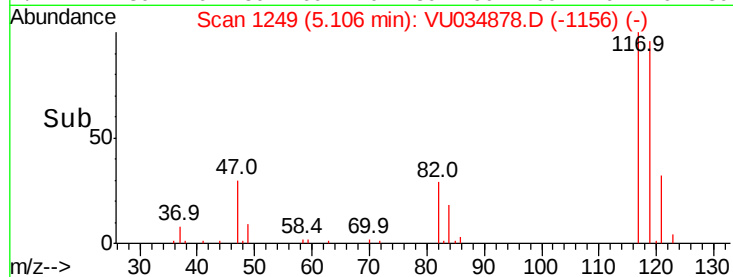
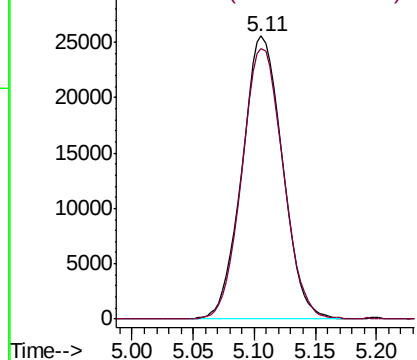
#31  
Carbon tetrachloride  
Concen: 4.307 ug/L  
RT: 5.11 min Scan# 1249  
Delta R.T. 0.00 min  
Lab File: VU034878.D  
Acq: 30 Sep 2019 13:41

Instrument :  
MSVOA\_U  
ClientSampleId :

Tot Ion:117 Resp: 58603  
Ion Ratio Lower Upper  
117 100  
119 97.3 77.8 116.8

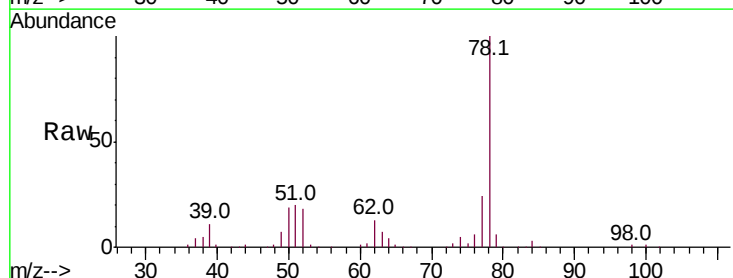


Abundance Ion 116.90 (116.60 to 117.60): V  
Ion 118.90 (118.60 to 119.60): V

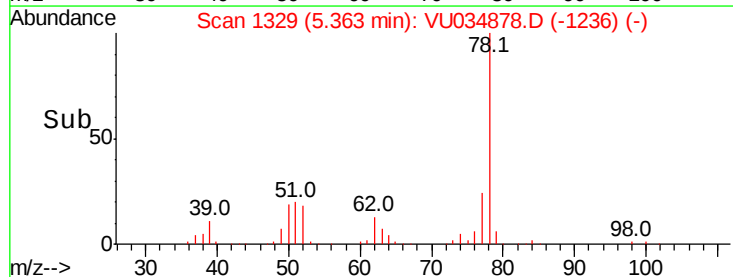
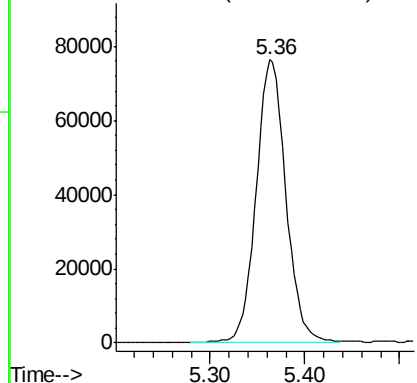


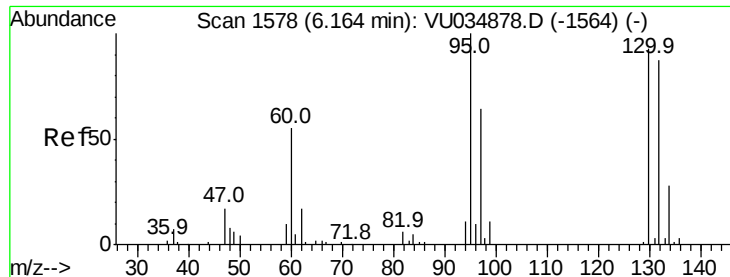
#33  
Benzene  
Concen: 3.957 ug/L  
RT: 5.36 min Scan# 1329  
Delta R.T. 0.00 min  
Lab File: VU034878.D  
Acq: 30 Sep 2019 13:41

Tgt Ion: 78 Resp: 167163



Abundance Ion 78.10 (77.80 to 78.80): VU0





#34

Trichloroethene

Concen: 4.134 ug/L

RT: 6.16 min Scan# 1578

Delta R.T. 0.00 min

Lab File: VU034878.D

Acq: 30 Sep 2019 13:41

Instrument :

MSVOA\_U

ClientSampleId :

Tot Ion: 95 Resp: 43755

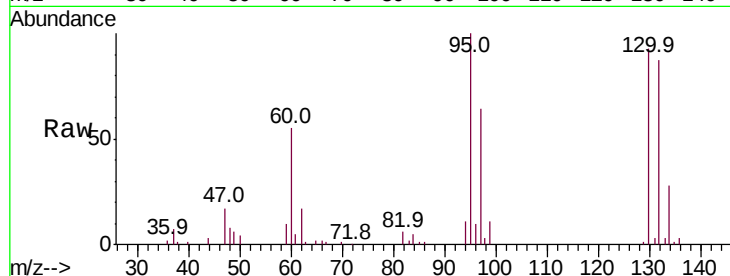
Ion Ratio Lower Upper

95 100

97 64.4 45.1 83.7

132 87.5 61.2 113.8

130 93.0 65.1 120.9

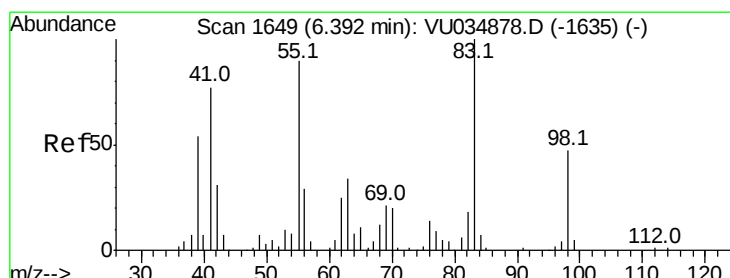
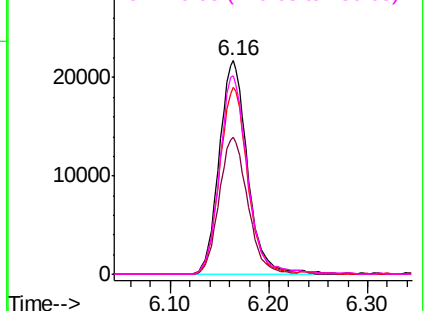
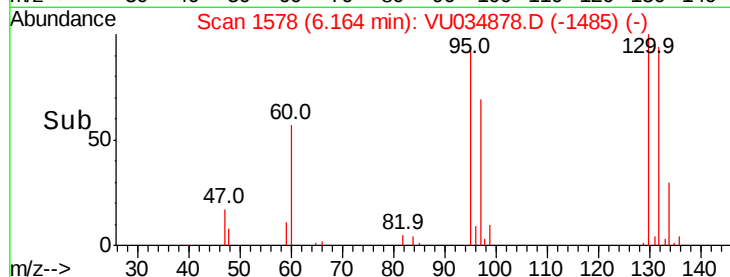


Abundance Ion 95.00 (94.70 to 95.70): VU034878.D (-1564) (-)

Ion 96.95 (96.65 to 97.65): VU034878.D (-1564) (-)

Ion 131.95 (131.65 to 132.65): VU034878.D (-1564) (-)

Ion 129.95 (129.65 to 130.65): VU034878.D (-1564) (-)



#35

Methylcyclohexane

Concen: 3.358 ug/L

RT: 6.39 min Scan# 1649

Delta R.T. 0.00 min

Lab File: VU034878.D

Acq: 30 Sep 2019 13:41

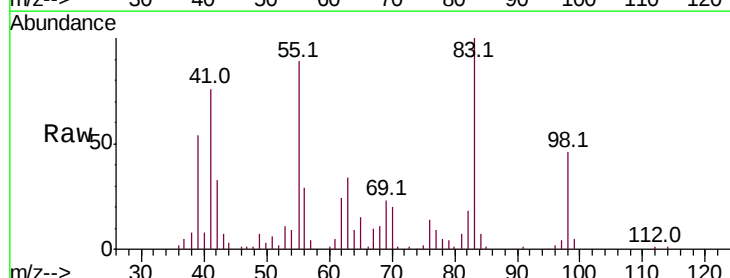
Tgt Ion: 83 Resp: 55544

Ion Ratio Lower Upper

83 100

55 86.1 68.9 103.3

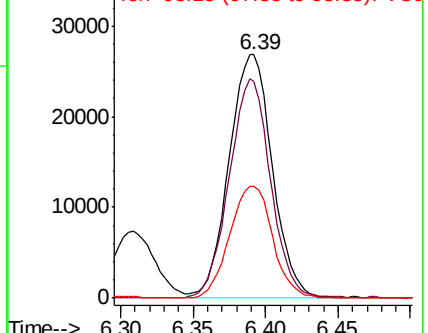
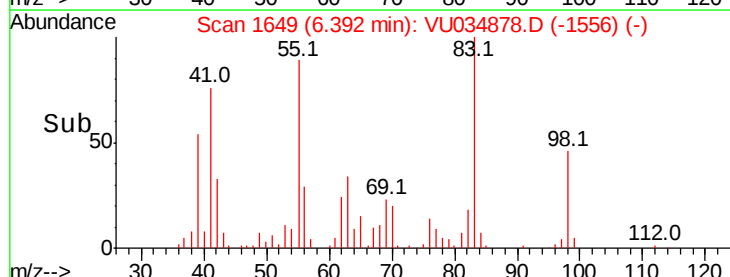
98 45.7 36.6 54.8

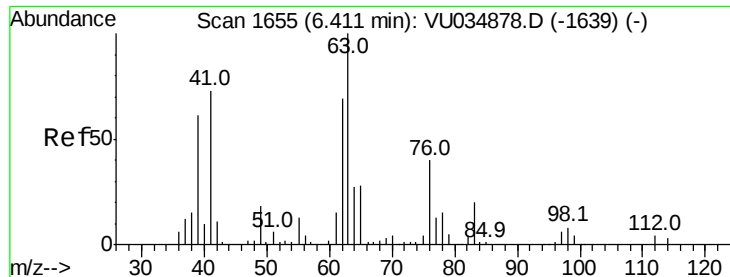


Abundance Ion 83.15 (82.85 to 83.85): VU034878.D (-1635) (-)

Ion 55.10 (54.80 to 55.80): VU034878.D (-1635) (-)

Ion 98.15 (97.85 to 98.85): VU034878.D (-1635) (-)

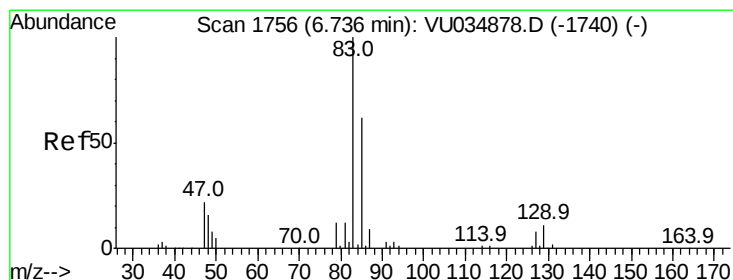
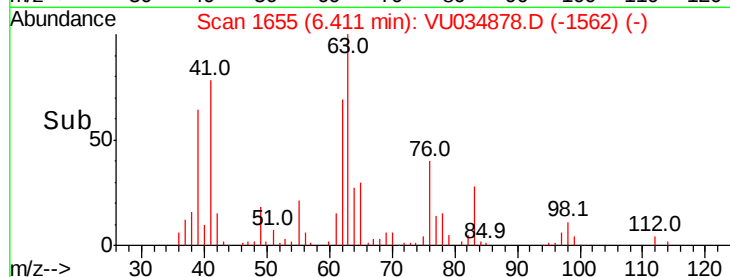
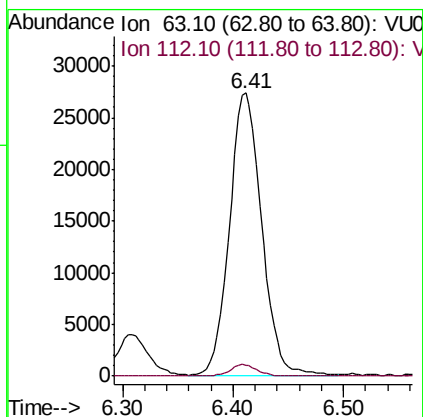
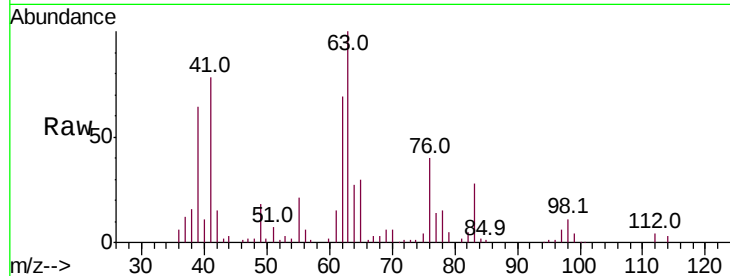




#37  
 1,2-Dichloropropane  
 Concen: 4.219 ug/L  
 RT: 6.41 min Scan# 1655  
 Delta R.T. 0.00 min  
 Lab File: VU034878.D  
 Acq: 30 Sep 2019 13:41

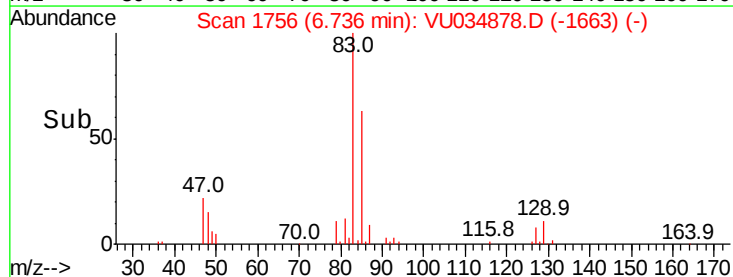
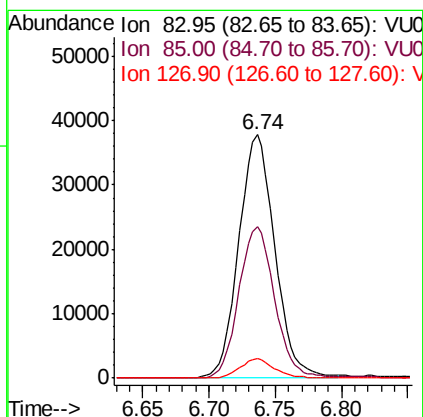
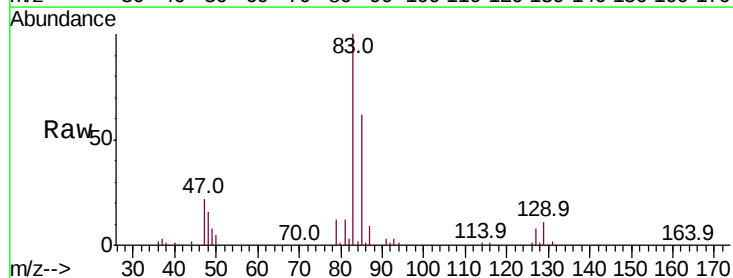
Instrument :  
 MSVOA\_U  
 ClientSampleId :

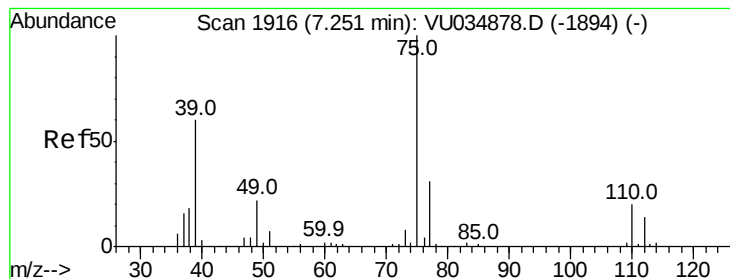
Tot Ion: 63 Resp: 55928  
 Ion Ratio Lower Upper  
 63 100  
 112 3.3 2.6 4.0



#38  
 Bromodichloromethane  
 Concen: 4.465 ug/L  
 RT: 6.74 min Scan# 1756  
 Delta R.T. 0.00 min  
 Lab File: VU034878.D  
 Acq: 30 Sep 2019 13:41

Tgt Ion: 83 Resp: 71630  
 Ion Ratio Lower Upper  
 83 100  
 85 62.1 43.5 80.7  
 127 7.8 6.2 9.4



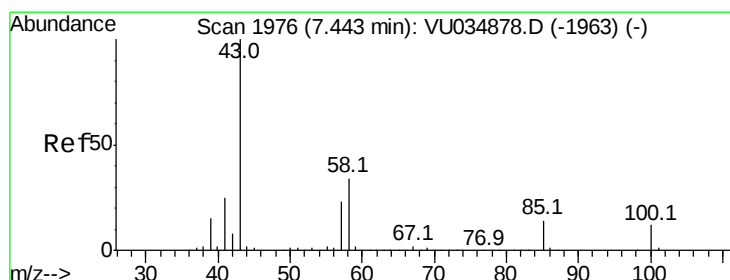
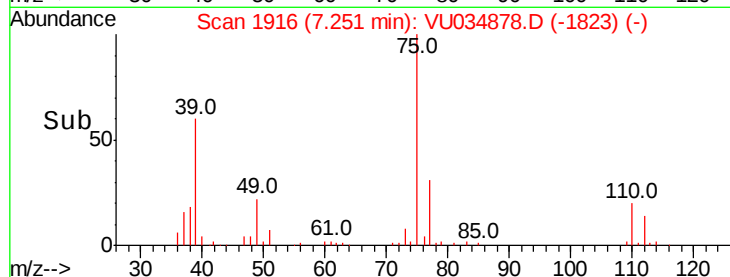
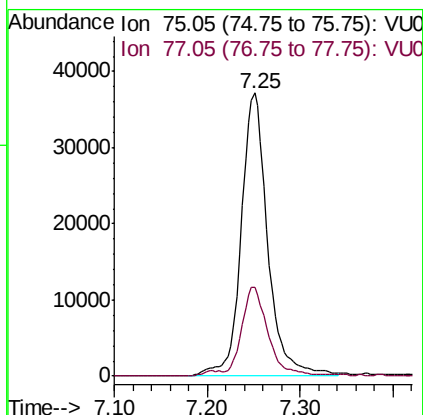
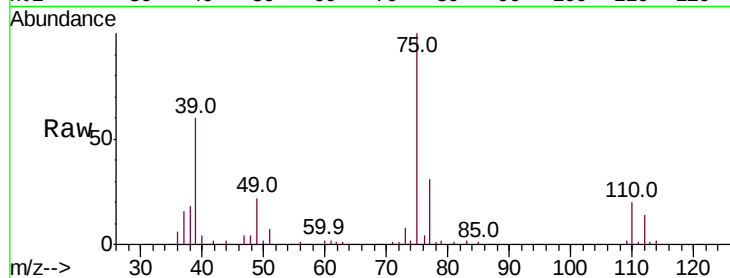


#39

cis-1,3-Dichloropropene  
Concen: 4.031 ug/L  
RT: 7.25 min Scan# 1916  
Delta R.T. 0.00 min  
Lab File: VU034878.D  
Acq: 30 Sep 2019 13:41

Instrument :  
MSVOA\_U  
ClientSampleId :

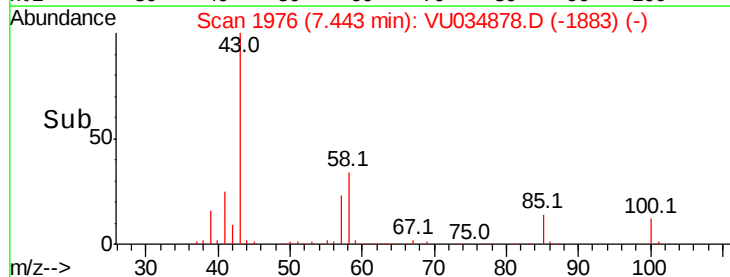
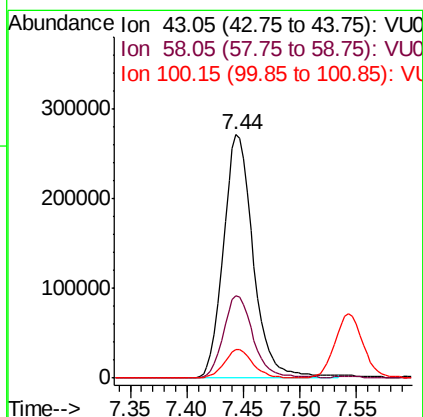
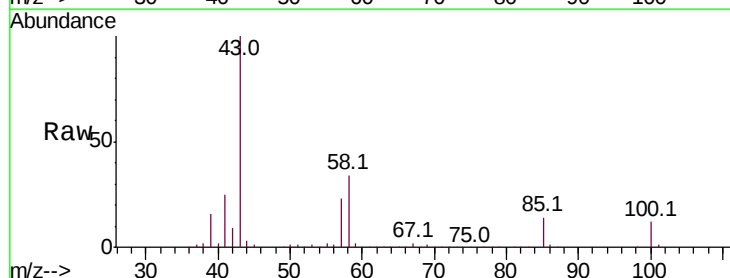
Tot Ion: 75 Resp: 74038  
Ion Ratio Lower Upper  
75 100  
77 31.3 21.9 40.7

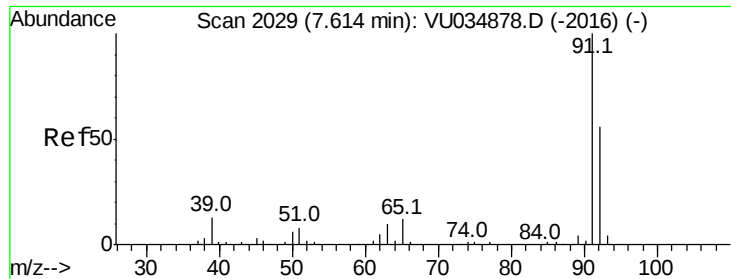


#40

4-Methyl-2-pentanone  
Concen: 48.935 ug/L  
RT: 7.44 min Scan# 1976  
Delta R.T. 0.00 min  
Lab File: VU034878.D  
Acq: 30 Sep 2019 13:41

Tgt Ion: 43 Resp: 499997  
Ion Ratio Lower Upper  
43 100  
58 33.8 27.0 40.6  
100 11.5 9.2 13.8





#42

Toluene

Concen: 4.004 ug/L

RT: 7.61 min Scan# 2029

Delta R.T. 0.00 min

Lab File: VU034878.D

Acq: 30 Sep 2019 13:41

Instrument :

MSVOA\_U

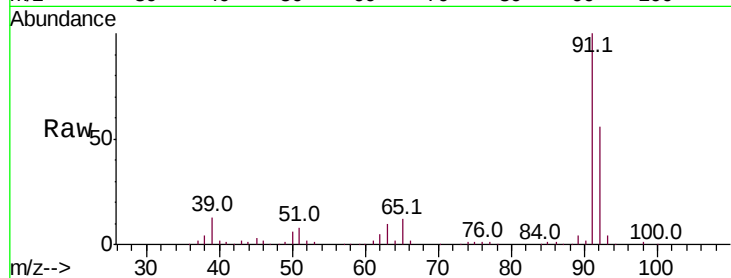
ClientSampled :

Tot Ion: 91 Resp: 183279

Ion Ratio Lower Upper

91 100

92 56.1 39.3 72.9



Abundance Ion 91.15 (90.85 to 91.85): VU034878.D (-2016) (-)

Ion 92.15 (91.85 to 92.85): VU034878.D (-2016) (-)

7.61

100000

80000

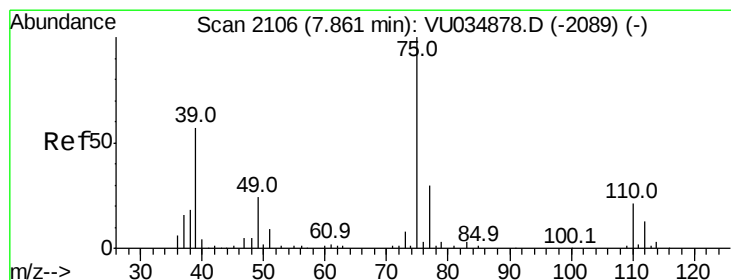
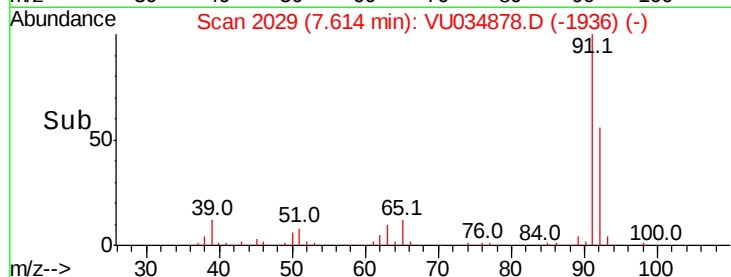
60000

40000

20000

0

Time-->



#44

trans-1,3-Dichloropropene

Concen: 4.112 ug/L

RT: 7.86 min Scan# 2106

Delta R.T. 0.00 min

Lab File: VU034878.D

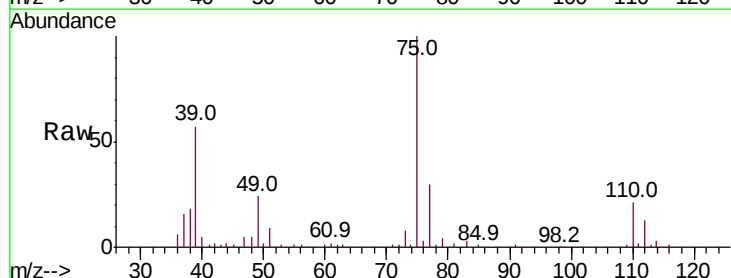
Acq: 30 Sep 2019 13:41

Tgt Ion: 75 Resp: 61765

Ion Ratio Lower Upper

75 100

77 30.3 21.2 39.4



Abundance Ion 75.05 (74.75 to 75.75): VU034878.D (-2089) (-)

Ion 77.05 (76.75 to 77.75): VU034878.D (-2089) (-)

7.86

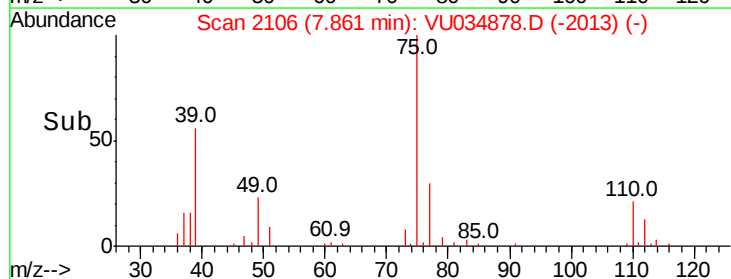
30000

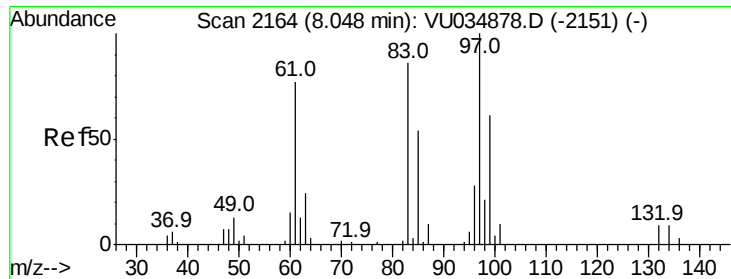
20000

10000

0

Time-->

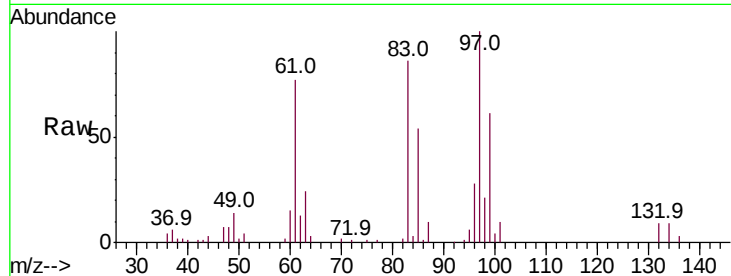




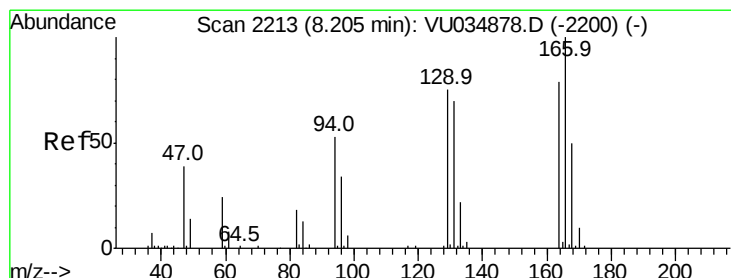
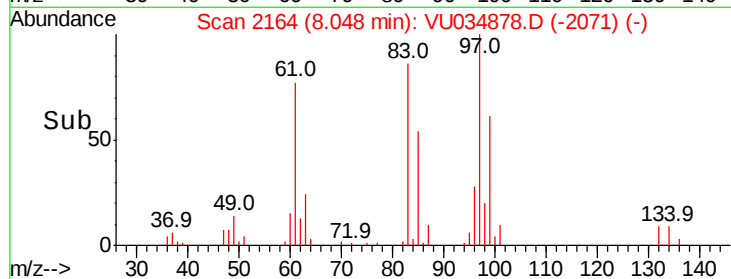
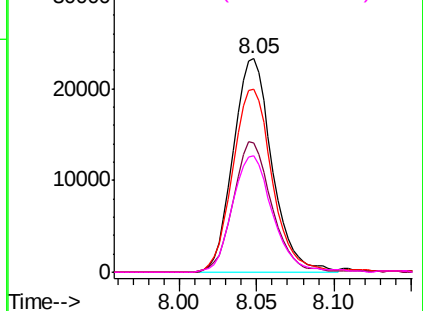
#45  
 1,1,2-Trichloroethane  
 Concen: 4.736 ug/L  
 RT: 8.05 min Scan# 2164  
 Delta R.T. 0.00 min  
 Lab File: VU034878.D  
 Acq: 30 Sep 2019 13:41

Instrument :  
 MSVOA\_U  
 ClientSampleId :

|          |       |       |       |
|----------|-------|-------|-------|
| Tot Ion: | 97    | Resp: | 40749 |
| Ion      | Ratio | Lower | Upper |
| 97       | 100   |       |       |
| 99       | 60.8  | 42.6  | 79.0  |
| 83       | 85.9  | 60.1  | 111.7 |
| 85       | 54.3  | 38.0  | 70.6  |

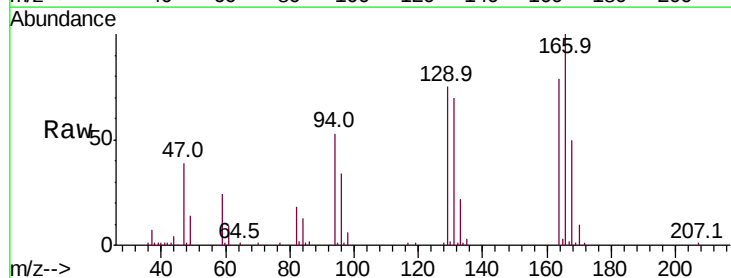


Abundance Ion 96.95 (96.65 to 97.65): VU0  
 Ion 99.05 (98.75 to 99.75): VU0  
 Ion 82.95 (82.65 to 83.65): VU0  
 Ion 85.00 (84.70 to 85.70): VU0

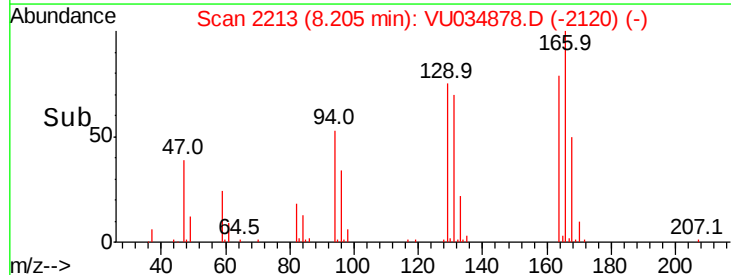
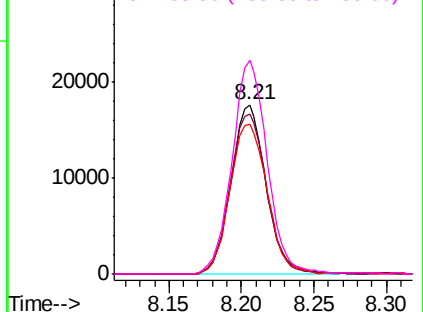


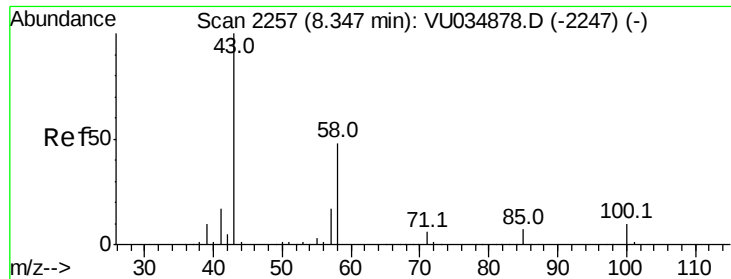
#47  
 Tetrachloroethene  
 Concen: 4.516 ug/L  
 RT: 8.21 min Scan# 2213  
 Delta R.T. 0.00 min  
 Lab File: VU034878.D  
 Acq: 30 Sep 2019 13:41

|          |       |       |       |
|----------|-------|-------|-------|
| Tgt Ion: | 164   | Resp: | 29519 |
| Ion      | Ratio | Lower | Upper |
| 164      | 100   |       |       |
| 129      | 94.7  | 66.3  | 123.1 |
| 131      | 88.8  | 62.2  | 115.4 |
| 166      | 126.3 | 88.4  | 164.2 |



Abundance Ion 163.90 (163.60 to 164.60): V  
 Ion 128.95 (128.65 to 129.65): V  
 Ion 130.95 (130.65 to 131.65): V  
 Ion 165.90 (165.60 to 166.60): V

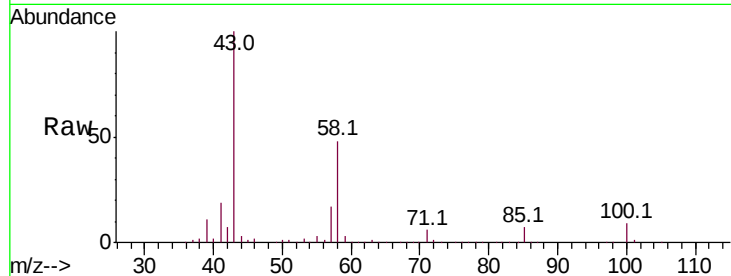




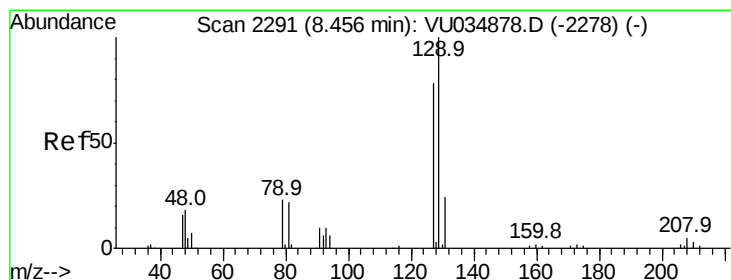
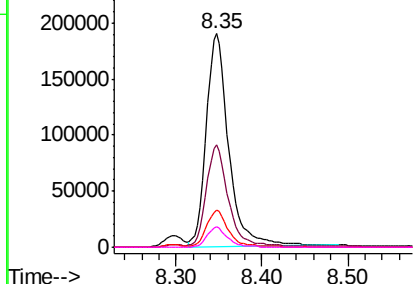
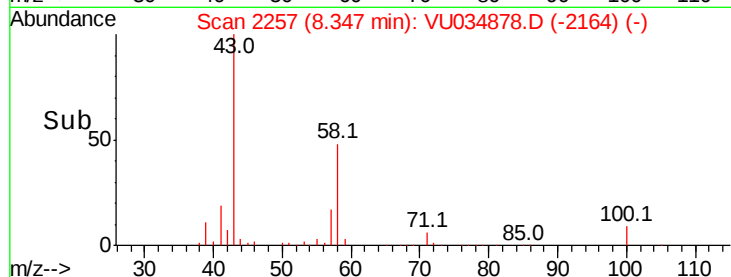
#48  
2-Hexanone  
Concen: 50.221 ug/L  
RT: 8.35 min Scan# 2257  
Delta R.T. 0.00 min  
Lab File: VU034878.D  
Acq: 30 Sep 2019 13:41

Instrument :  
MSVOA\_U  
ClientSampled :

Tot Ion: 43 Resp: 346374  
Ion Ratio Lower Upper  
43 100  
58 46.4 37.1 55.7  
57 16.7 13.4 20.0  
100 8.7 7.0 10.4

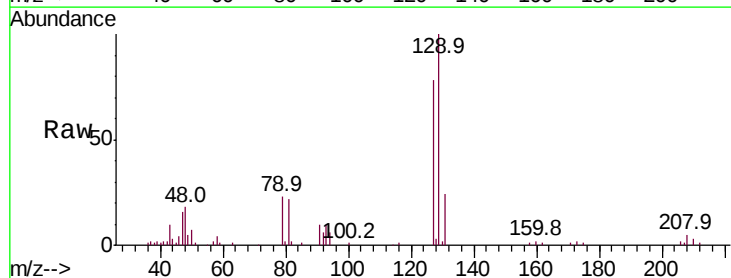


Abundance Ion 43.05 (42.75 to 43.75): VU0  
Ion 58.05 (57.75 to 58.75): VU0  
Ion 57.20 (56.90 to 57.90): VU0  
Ion 100.15 (99.85 to 100.85): VU0

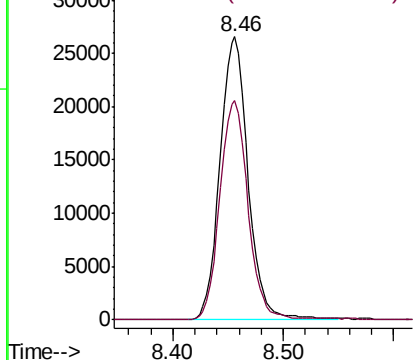
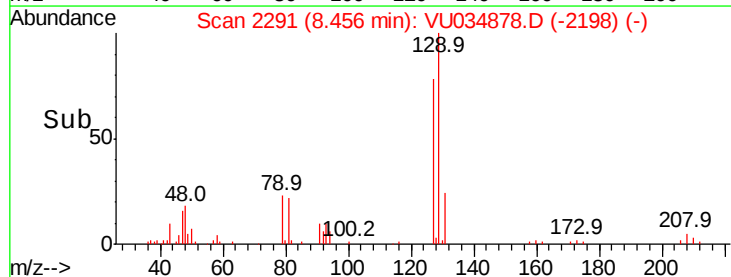


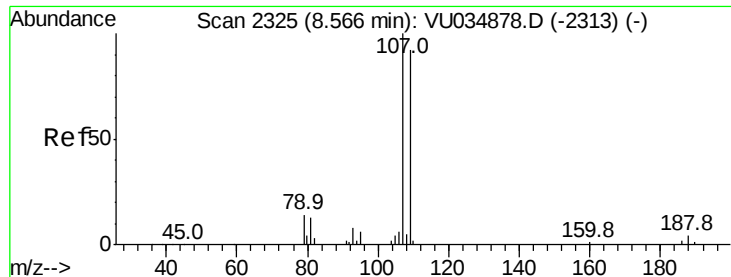
#49  
Dibromochloromethane  
Concen: 4.672 ug/L  
RT: 8.46 min Scan# 2291  
Delta R.T. 0.00 min  
Lab File: VU034878.D  
Acq: 30 Sep 2019 13:41

Tgt Ion: 129 Resp: 46991  
Ion Ratio Lower Upper  
129 100  
127 77.6 54.3 100.9



Abundance Ion 128.95 (128.65 to 129.65): V  
Ion 126.90 (126.60 to 127.60): V

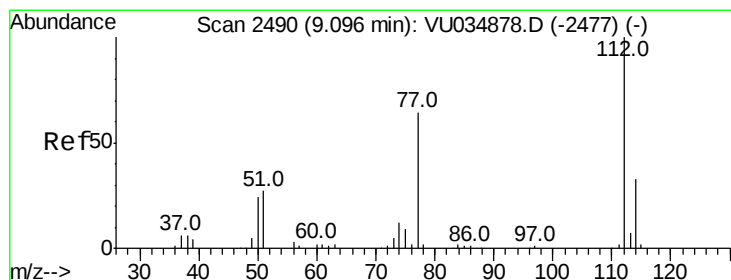
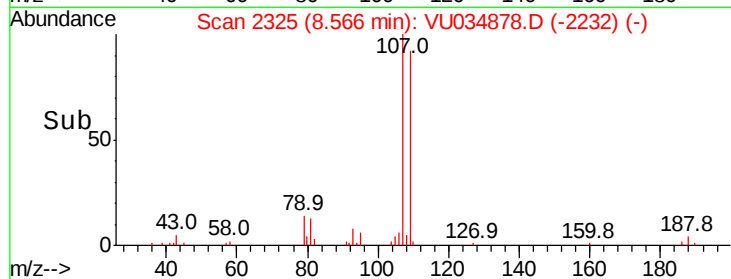
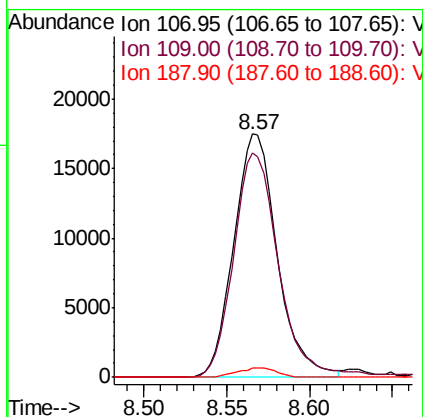
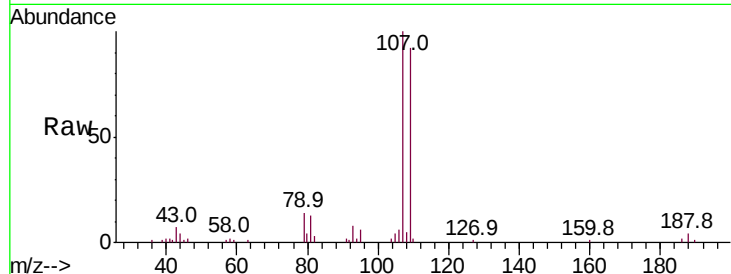




#50  
 1,2-Dibromoethane  
 Concen: 4.184 ug/L  
 RT: 8.57 min Scan# 2325  
 Delta R.T. 0.00 min  
 Lab File: VU034878.D  
 Acq: 30 Sep 2019 13:41

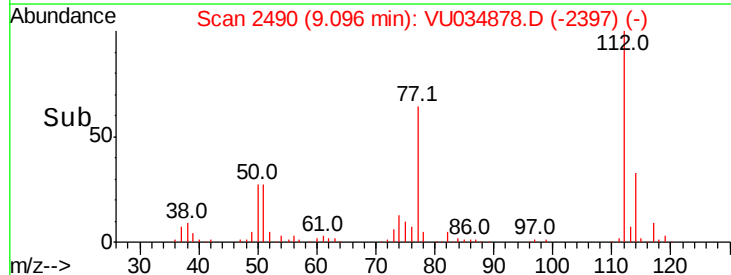
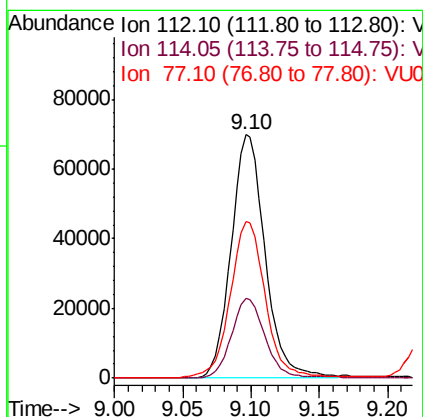
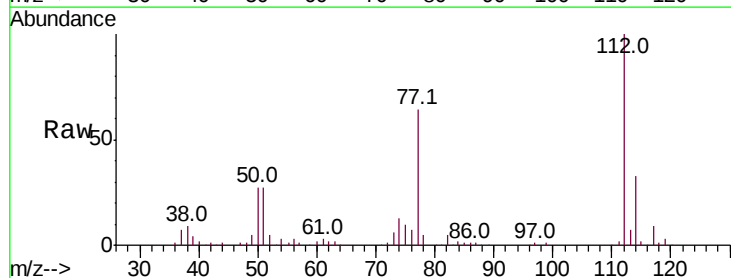
Instrument :  
 MSVOA\_U  
 ClientSampleId :

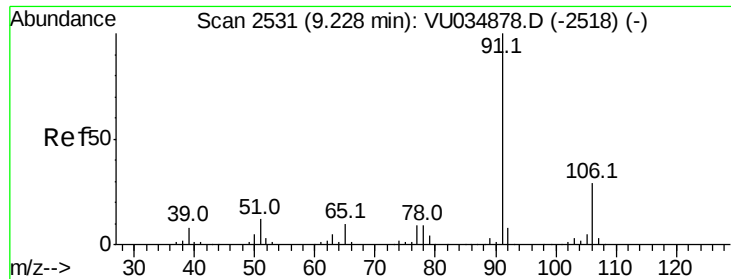
Tot Ion:107 Resp: 31883  
 Ion Ratio Lower Upper  
 107 100  
 109 92.3 64.6 120.0  
 188 3.6 2.9 4.3



#51  
 Chlorobenzene  
 Concen: 4.203 ug/L  
 RT: 9.10 min Scan# 2490  
 Delta R.T. 0.00 min  
 Lab File: VU034878.D  
 Acq: 30 Sep 2019 13:41

Tgt Ion:112 Resp: 121181  
 Ion Ratio Lower Upper  
 112 100  
 114 32.5 22.7 42.3  
 77 64.4 51.5 77.3

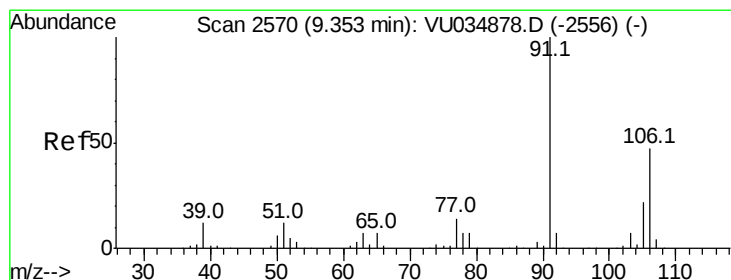
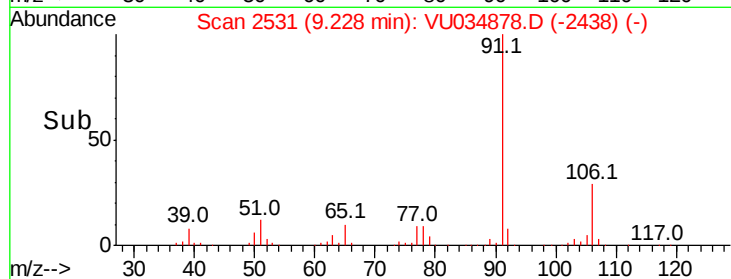
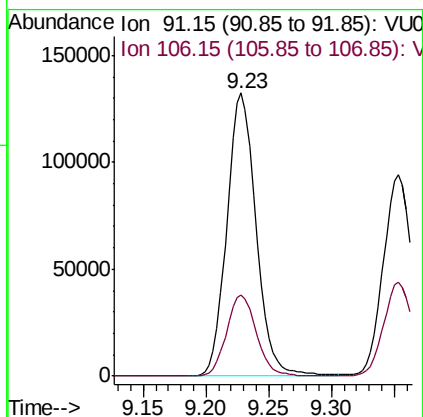
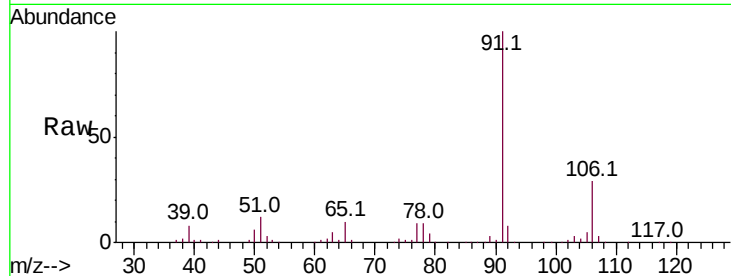




#52  
Ethylbenzene  
Concen: 4.058 ug/L  
RT: 9.23 min Scan# 2531  
Delta R.T. 0.00 min  
Lab File: VU034878.D  
Acq: 30 Sep 2019 13:41

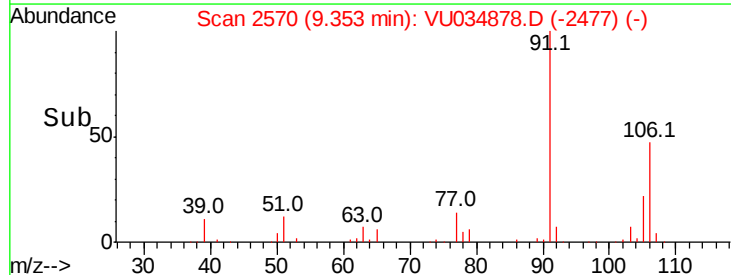
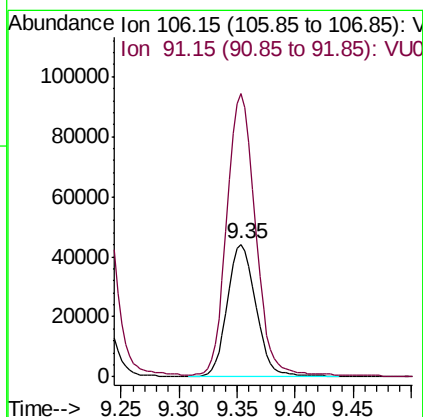
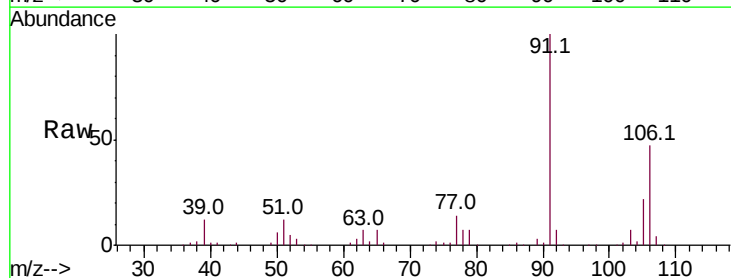
Instrument :  
MSVOA\_U  
ClientSampled :

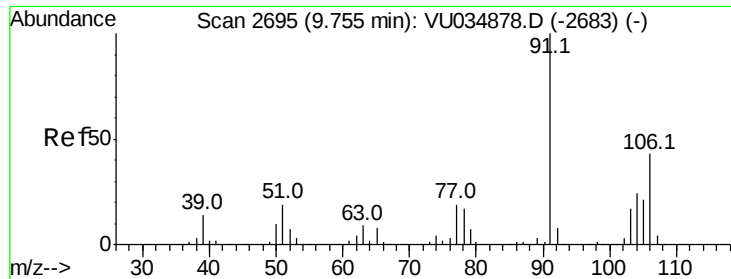
Tot Ion: 91 Resp: 214895  
Ion Ratio Lower Upper  
91 100  
106 28.8 20.2 37.4



#53  
m,p-Xylene  
Concen: 3.996 ug/L  
RT: 9.35 min Scan# 2570  
Delta R.T. 0.00 min  
Lab File: VU034878.D  
Acq: 30 Sep 2019 13:41

Tgt Ion: 106 Resp: 74927  
Ion Ratio Lower Upper  
106 100  
91 213.5 149.4 277.5

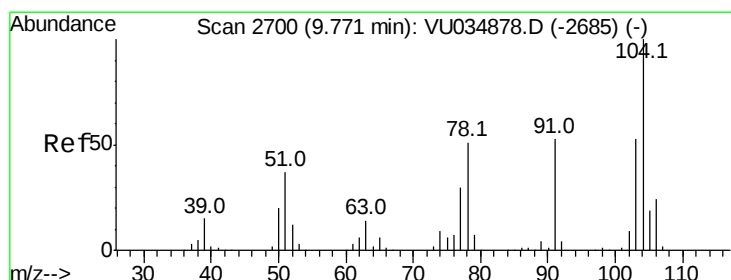
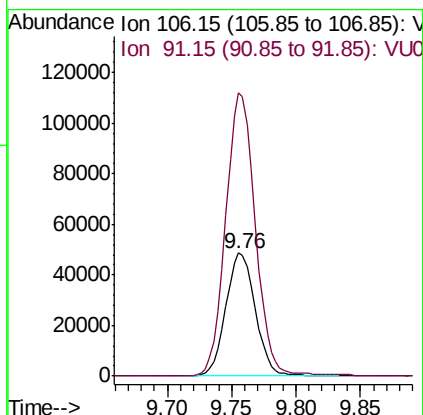
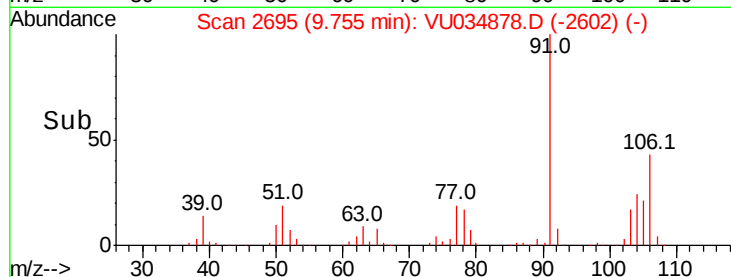
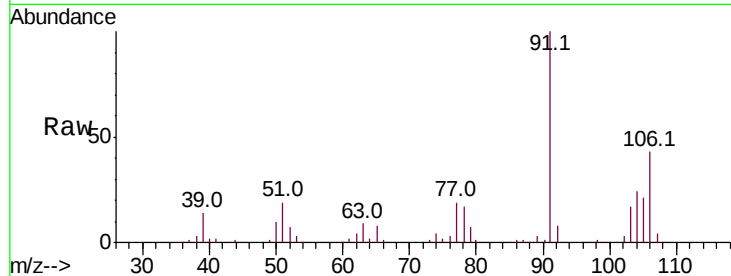




#54  
o-Xylene  
Concen: 4.106 ug/L  
RT: 9.76 min Scan# 2695  
Delta R.T. 0.00 min  
Lab File: VU034878.D  
Acq: 30 Sep 2019 13:41

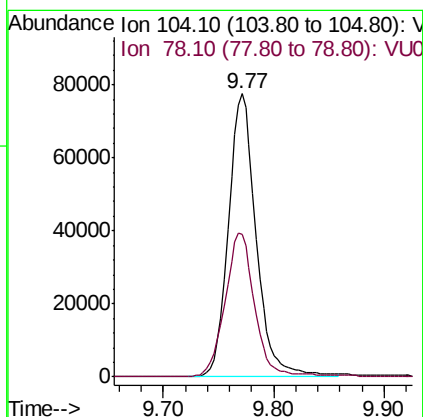
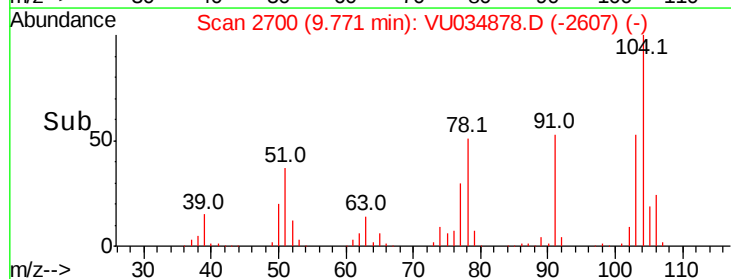
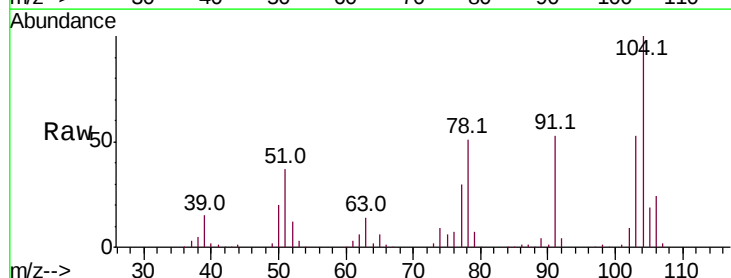
Instrument :  
MSVOA\_U  
ClientSampleId :

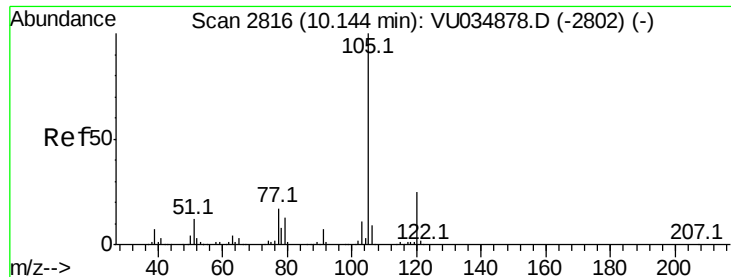
Tot Ion:106 Resp: 77695  
Ion Ratio Lower Upper  
106 100  
91 230.6 161.4 299.8



#55  
Styrene  
Concen: 4.292 ug/L  
RT: 9.77 min Scan# 2700  
Delta R.T. 0.00 min  
Lab File: VU034878.D  
Acq: 30 Sep 2019 13:41

Tgt Ion:104 Resp: 135632  
Ion Ratio Lower Upper  
104 100  
78 50.5 35.4 65.7





#56

Isopropylbenzene

Concen: 4.267 ug/L

RT: 10.14 min Scan# 2816

Delta R.T. 0.00 min

Lab File: VU034878.D

Acq: 30 Sep 2019 13:41

Instrument :

MSVOA\_U

ClientSampleId :

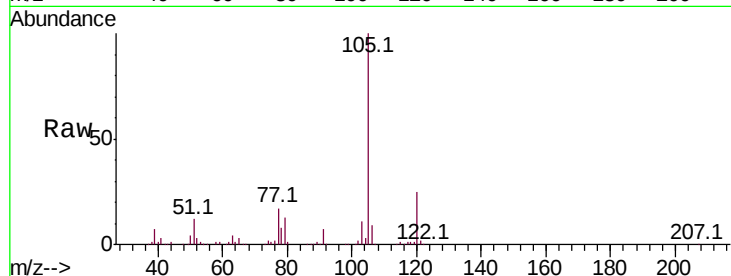
Tot Ion:105 Resp: 225617

Ion Ratio Lower Upper

105 100

120 25.3 20.2 30.4

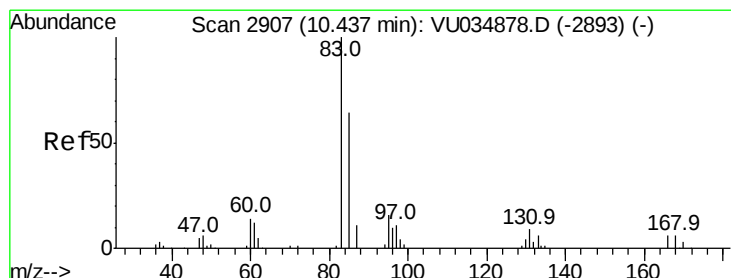
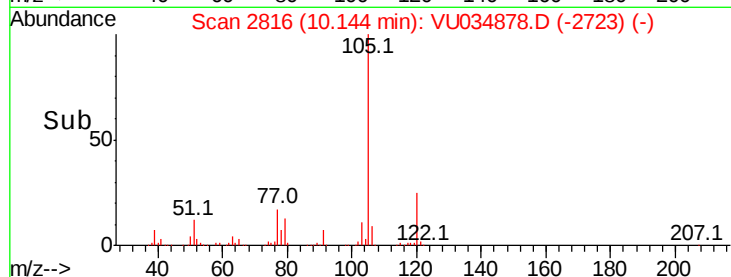
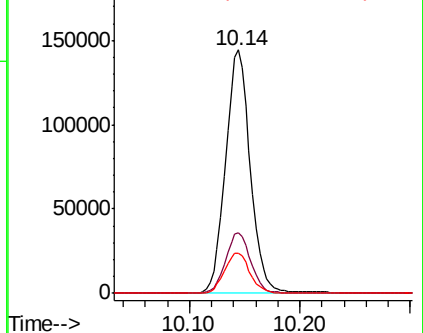
77 17.2 13.8 20.6



Abundance Ion 105.05 (104.75 to 105.75): V

Ion 120.10 (119.80 to 120.80): V

Ion 77.10 (76.80 to 77.80): V



#58

1,1,2,2-Tetrachloroethane

Concen: 4.626 ug/L

RT: 10.44 min Scan# 2907

Delta R.T. 0.00 min

Lab File: VU034878.D

Acq: 30 Sep 2019 13:41

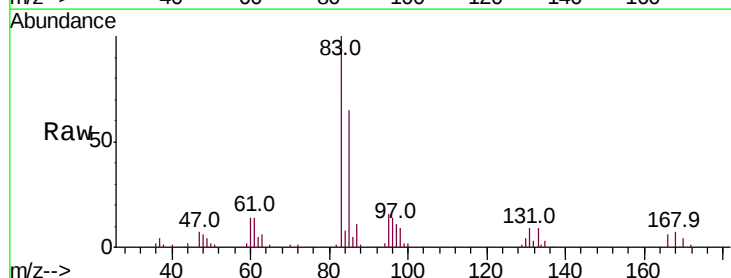
Tgt Ion: 83 Resp: 58022

Ion Ratio Lower Upper

83 100

85 64.6 45.2 84.0

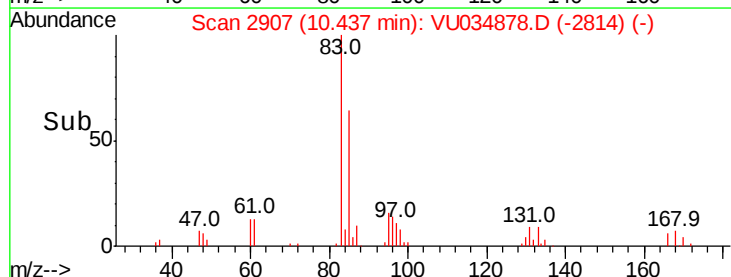
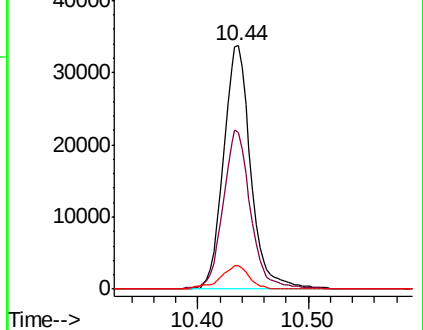
131 9.5 7.6 11.4

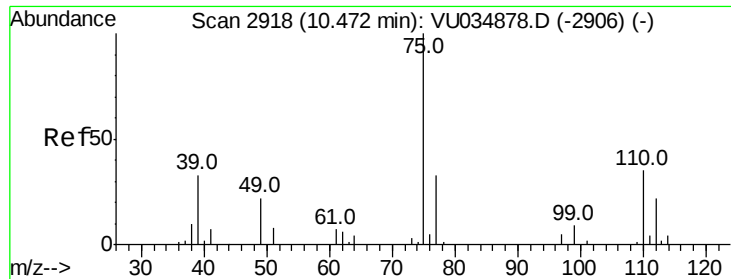


Abundance Ion 82.95 (82.65 to 83.65): V

Ion 85.00 (84.70 to 85.70): V

Ion 130.95 (130.65 to 131.65): V

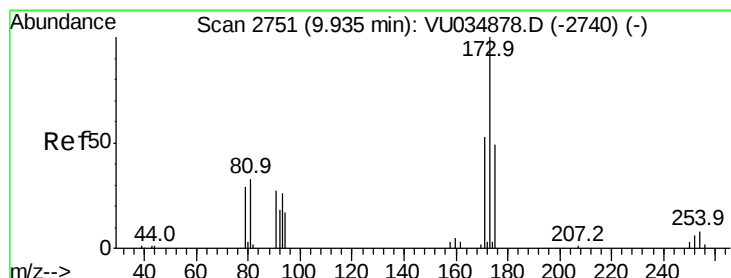
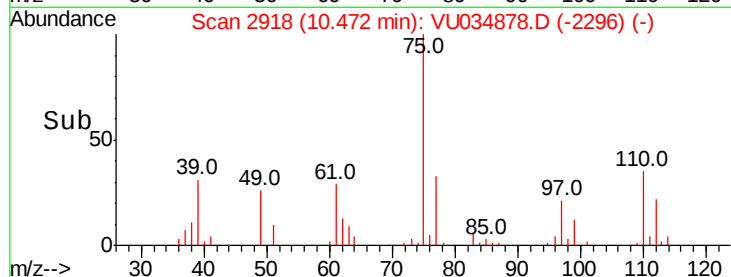
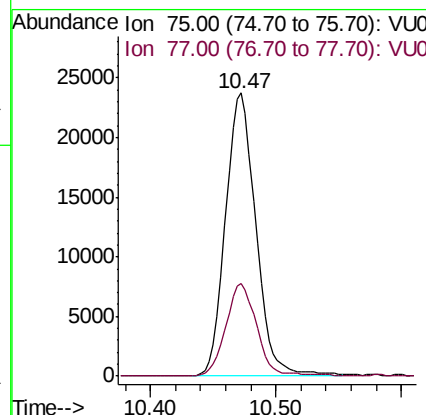
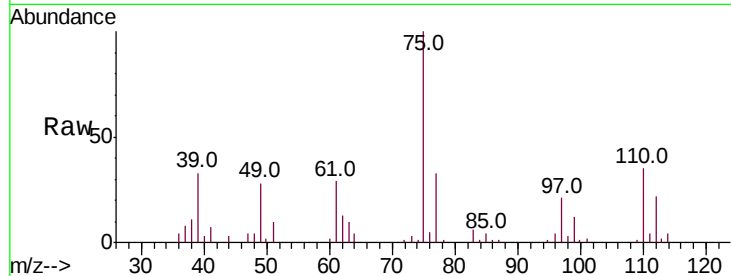




#59  
 1,2,3-Trichloropropane  
 Concen: 4.560 ug/L  
 RT: 10.47 min Scan# 2918  
 Delta R.T. 0.00 min  
 Lab File: VU034878.D  
 Acq: 30 Sep 2019 13:41

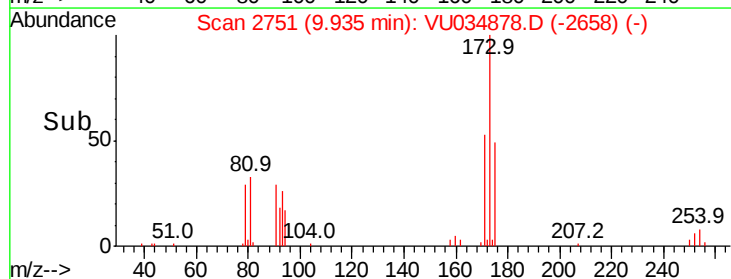
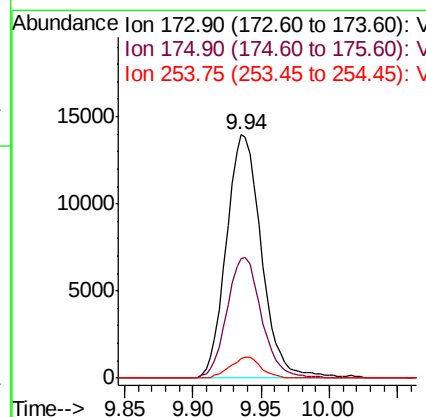
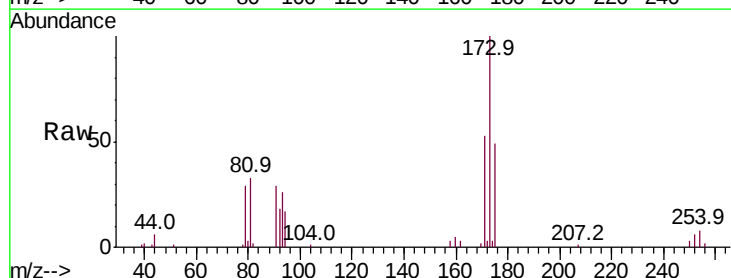
Instrument :  
 MSVOA\_U  
 ClientSampled :

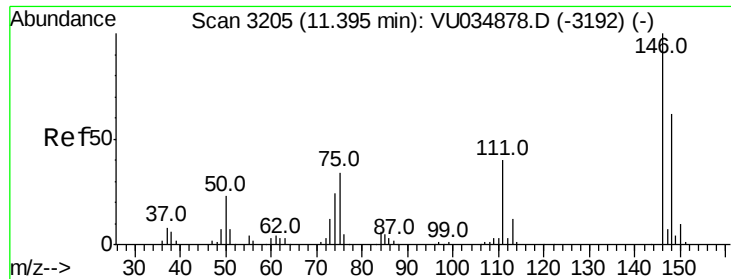
Tot Ion: 75 Resp: 39963  
 Ion Ratio Lower Upper  
 75 100  
 77 33.1 26.5 39.7



#61  
 Bromoform  
 Concen: 4.681 ug/L  
 RT: 9.94 min Scan# 2751  
 Delta R.T. 0.00 min  
 Lab File: VU034878.D  
 Acq: 30 Sep 2019 13:41

Tgt Ion:173 Resp: 25009  
 Ion Ratio Lower Upper  
 173 100  
 175 48.8 39.0 58.6  
 254 7.6 6.1 9.1

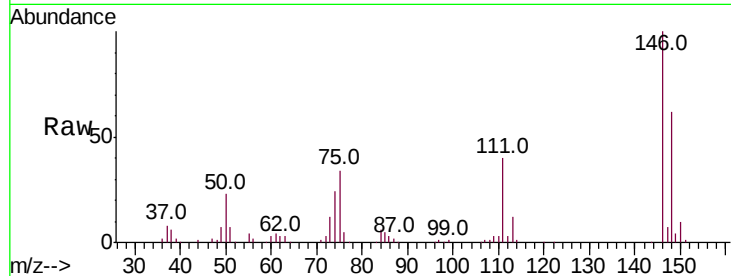




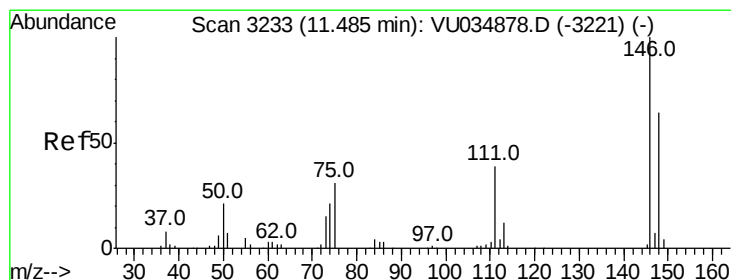
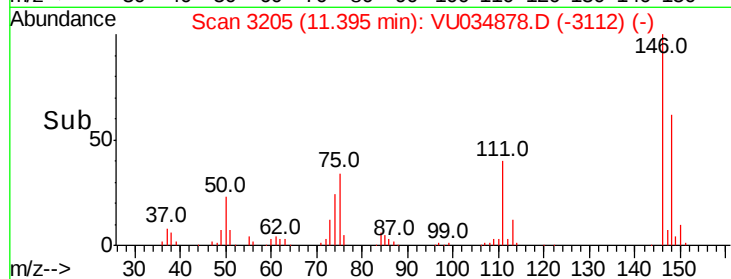
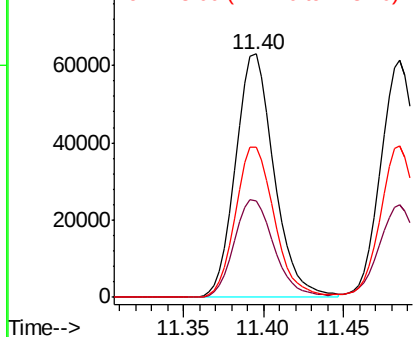
#62  
 1,3-Dichlorobenzene  
 Concen: 4.410 ug/L  
 RT: 11.40 min Scan# 3205  
 Delta R.T. 0.00 min  
 Lab File: VU034878.D  
 Acq: 30 Sep 2019 13:41

Instrument :  
 MSVOA\_U  
 ClientSampleId :

Tot Ion:146 Resp: 103749  
 Ion Ratio Lower Upper  
 146 100  
 111 39.6 27.7 51.5  
 148 61.8 43.3 80.3

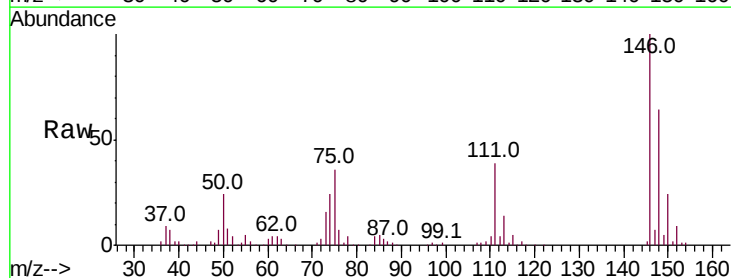


Abundance Ion 145.95 (145.65 to 146.65): V  
 Ion 111.00 (110.70 to 111.70): V  
 Ion 148.00 (147.70 to 148.70): V

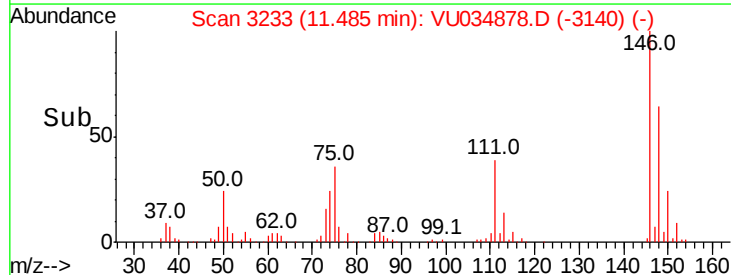
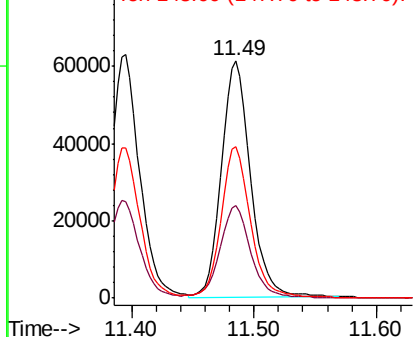


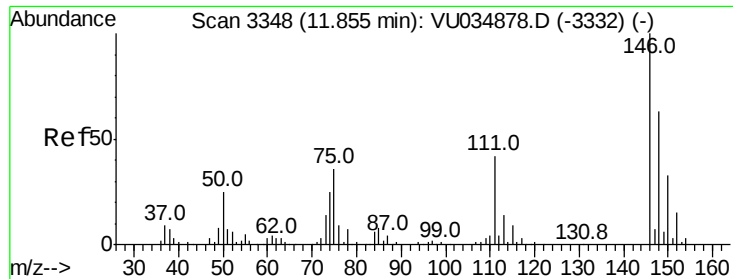
#63  
 1,4-Dichlorobenzene  
 Concen: 4.401 ug/L  
 RT: 11.49 min Scan# 3233  
 Delta R.T. 0.00 min  
 Lab File: VU034878.D  
 Acq: 30 Sep 2019 13:41

Tgt Ion:146 Resp: 102948  
 Ion Ratio Lower Upper  
 146 100  
 111 39.1 27.4 50.8  
 148 63.7 44.6 82.8



Abundance Ion 145.95 (145.65 to 146.65): V  
 Ion 111.00 (110.70 to 111.70): V  
 Ion 148.00 (147.70 to 148.70): V





#65

1,2-Dichlorobenzene

Concen: 4.600 ug/L

RT: 11.85 min Scan# 3348

Delta R.T. 0.00 min

Lab File: VU034878.D

Acq: 30 Sep 2019 13:41

Instrument :

MSVOA\_U

ClientSampleId :

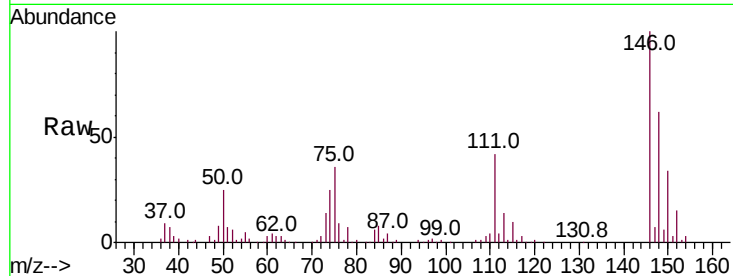
Tot Ion:146 Resp: 107063

Ion Ratio Lower Upper

146 100

111 41.8 33.4 50.2

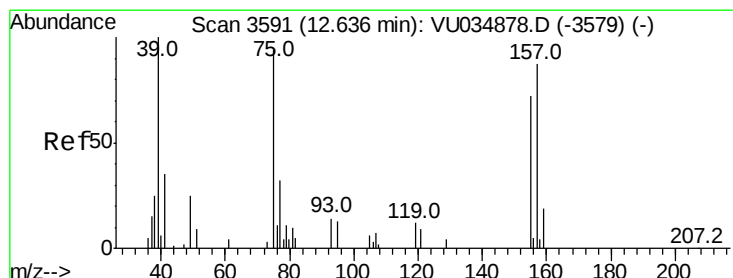
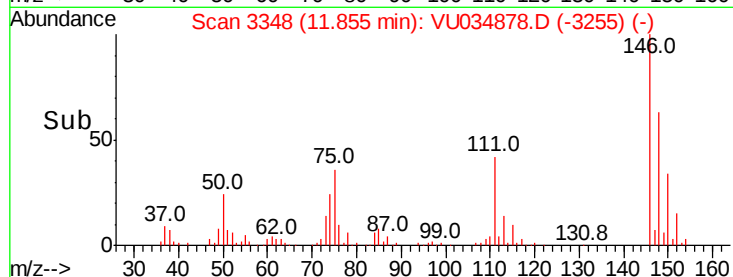
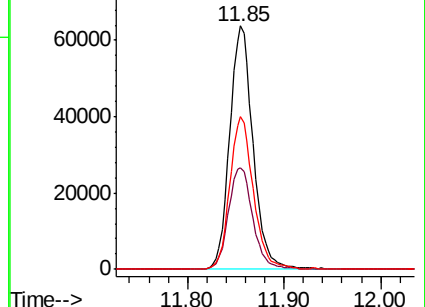
148 62.5 50.0 75.0



Abundance Ion 145.95 (145.65 to 146.65): V

Ion 111.00 (110.70 to 111.70): V

Ion 148.00 (147.70 to 148.70): V



#66

1,2-Dibromo-3-chloropropane

Concen: 4.325 ug/L

RT: 12.64 min Scan# 3591

Delta R.T. 0.00 min

Lab File: VU034878.D

Acq: 30 Sep 2019 13:41

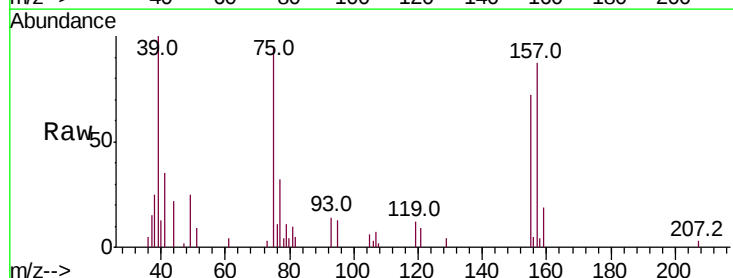
Tgt Ion: 75 Resp: 8813

Ion Ratio Lower Upper

75 100

155 76.4 61.1 91.7

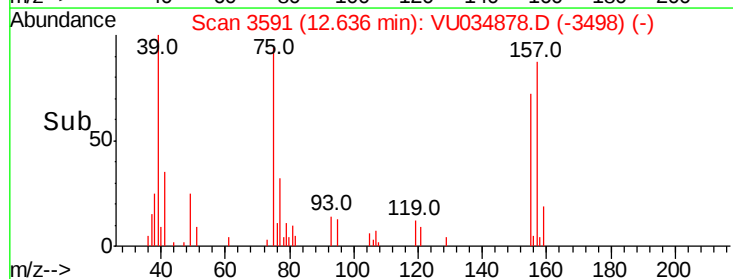
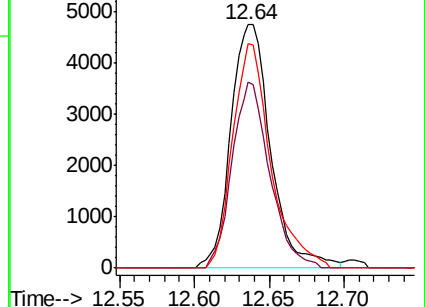
157 92.3 73.8 110.8

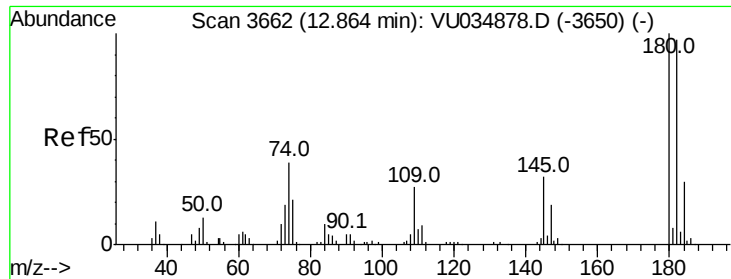


Abundance Ion 75.05 (74.75 to 75.75): VU0

Ion 154.95 (154.65 to 155.65): V

Ion 156.90 (156.60 to 157.60): V

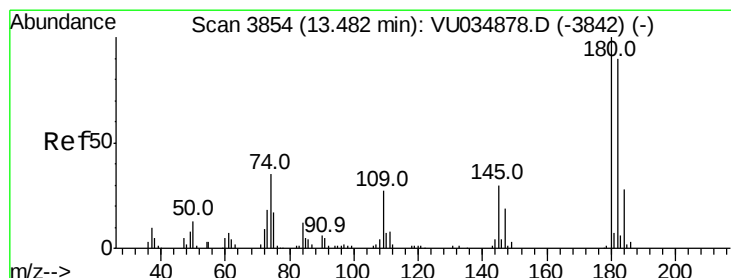
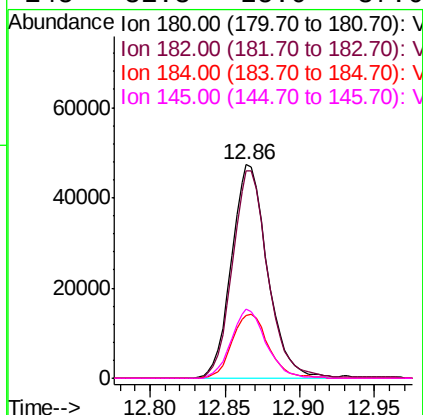
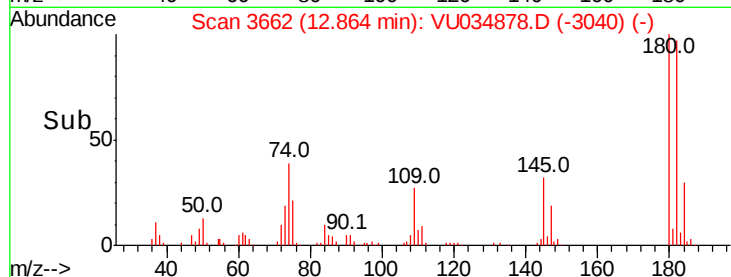
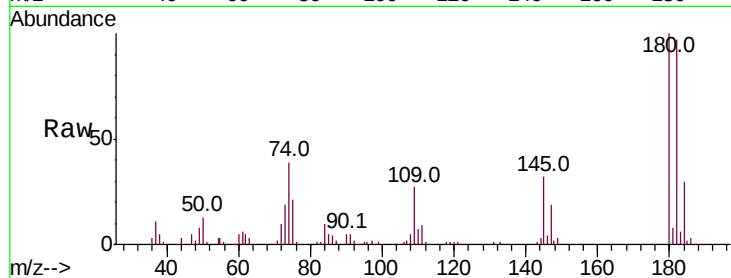




#67  
 1,3,5-Trichlorobenzene  
 Concen: 5.033 ug/L  
 RT: 12.86 min Scan# 3662  
 Delta R.T. 0.00 min  
 Lab File: VU034878.D  
 Acq: 30 Sep 2019 13:41

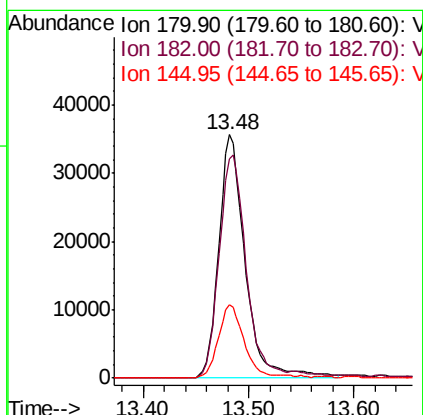
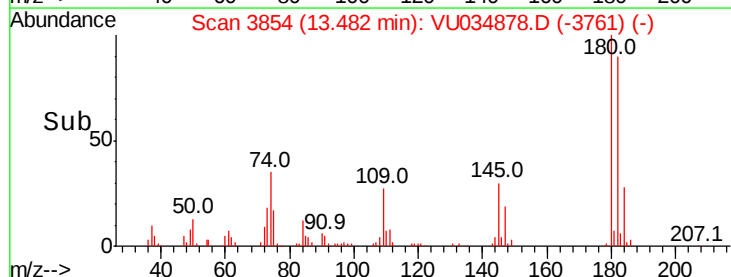
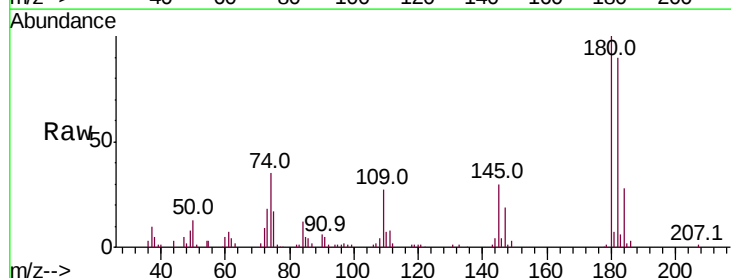
Instrument :  
 MSVOA\_U  
 ClientSampleId :

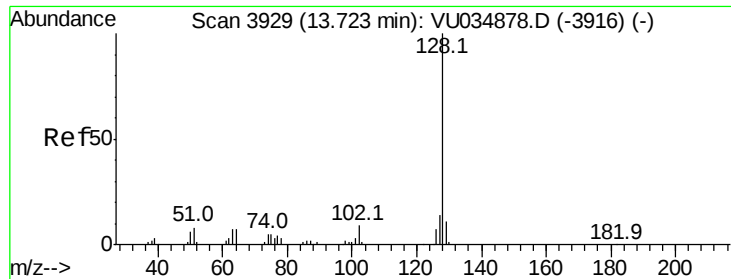
|             |       |       |  |
|-------------|-------|-------|--|
| Tot Ion:180 | Resp: | 79180 |  |
| Ion Ratio   | Lower | Upper |  |
| 180 100     |       |       |  |
| 182 96.2    | 77.0  | 115.4 |  |
| 184 30.5    | 24.4  | 36.6  |  |
| 145 31.3    | 25.0  | 37.6  |  |



#68  
 1,2,4-trichlorobenzene  
 Concen: 4.975 ug/L  
 RT: 13.48 min Scan# 3854  
 Delta R.T. 0.00 min  
 Lab File: VU034878.D  
 Acq: 30 Sep 2019 13:41

|             |             |
|-------------|-------------|
| Tgt Ion:180 | Resp: 62014 |
| Ion Ratio   | Lower Upper |
| 180 100     |             |
| 182 92.9    | 74.3 111.5  |
| 145 30.0    | 24.0 36.0   |





#69

Naphthalene

Concen: 3.526 ug/L

RT: 13.72 min Scan# 3929

Delta R.T. 0.00 min

Lab File: VU034878.D

Acq: 30 Sep 2019 13:41

Instrument :

MSVOA\_U

ClientSampleId :

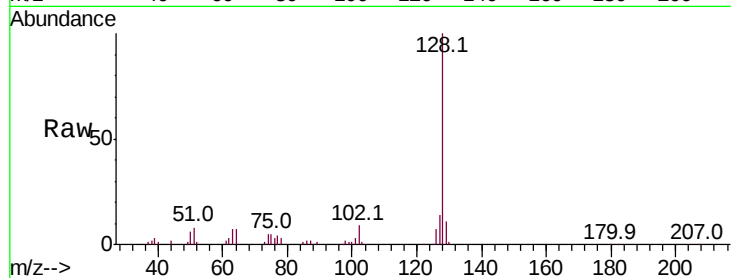
Tot Ion:128 Resp: 102818

Ion Ratio Lower Upper

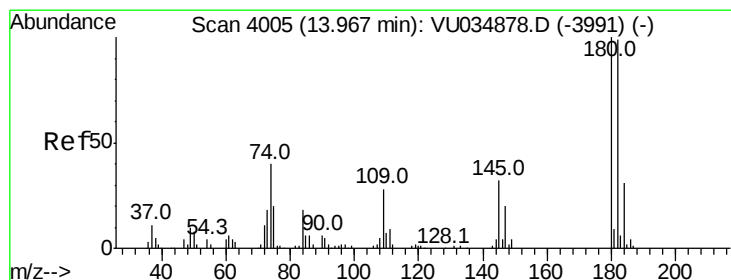
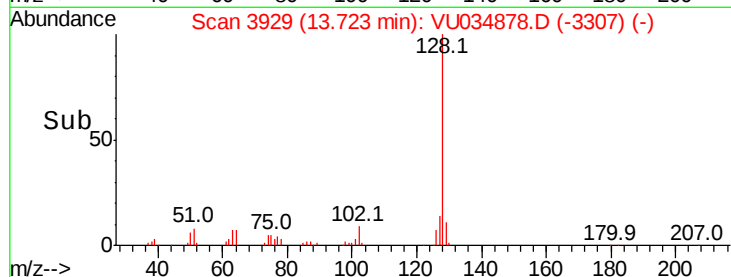
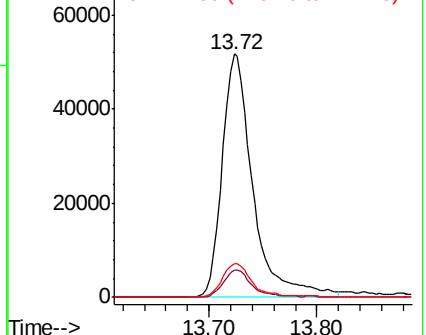
128 100

129 10.6 8.5 12.7

127 13.8 11.0 16.6



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



#70

1,2,3-Trichlorobenzene

Concen: 5.138 ug/L

RT: 13.97 min Scan# 4005

Delta R.T. 0.00 min

Lab File: VU034878.D

Acq: 30 Sep 2019 13:41

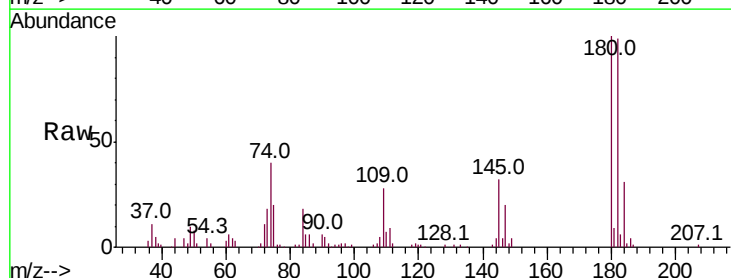
Tgt Ion:180 Resp: 60592

Ion Ratio Lower Upper

180 100

182 97.7 78.2 117.2

145 31.7 25.4 38.0



Abundance Ion 179.90 (179.60 to 180.60): V  
Ion 181.90 (181.60 to 182.60): V  
Ion 144.95 (144.65 to 145.65): V

