

Data Path : Z:\VOASRV\HPCHEM1\MSVOA L\DATA\VL052220\  
 Data File : VL035078.D  
 Acq On : 22 May 2020 9:47  
 Operator : SY/AP  
 Sample : VSTDCCC010  
 Misc : 400ml/MSVOA L  
 ALS Vial : 1 Sample Multiplier: 1

Instrument :  
 MSVOA\_L  
 ClientSampleId :

Quant Time: May 22 23:12:06 2020  
 Quant Method : Z:\VOASRV\HPCHEM1\MSVOA L\METHODS\VL050620AIR.M  
 Quant Title : AIR ANALYSIS BY METHOD TO-15 Instrument: MSVOA\_LWed May 06 14:49:39 2020  
 QLast Update : Wed May 06 14:49:39 2020  
 Response via : Initial Calibration

| Internal Standards      | R.T.  | QIon | Response | Conc  | Units | Dev(Min) |
|-------------------------|-------|------|----------|-------|-------|----------|
| 1) Bromochloromethane   | 5.65  | 49   | 1115603  | 10.00 | ppbv  | -0.02    |
| 33) 1,4-Difluorobenzene | 7.17  | 114  | 2585220  | 10.00 | ppbv  | -0.02    |
| 55) Chlorobenzene-d5    | 12.10 | 117  | 3159900  | 10.00 | ppbv  | -0.02    |

|                             |        |       |          |          |      |        |
|-----------------------------|--------|-------|----------|----------|------|--------|
| System Monitoring Compounds |        |       |          |          |      |        |
| 68) 1-Bromo-4-Fluorobenzene | 14.44  | 95    | 2135533  | 8.35     | ppbv | -0.02  |
| Spiked Amount               | 10.000 | Range | 65 - 135 | Recovery | =    | 83.50% |

| Target Compounds               |      |     |         |        | Ovalue    |
|--------------------------------|------|-----|---------|--------|-----------|
| 2) Dichlorodifluoromethane     | 3.00 | 85  | 1247316 | 7.878  | ppbv 98   |
| 3) Chlorodifluoromethane       | 2.94 | 51  | 1253562 | 9.842  | ppbv 98   |
| 4) Chloromethane               | 3.09 | 50  | 721783  | 9.888  | ppbv 94   |
| 5) Vinyl Chloride              | 3.21 | 62  | 706567  | 9.922  | ppbv 98   |
| 6) Bromomethane                | 3.43 | 94  | 428664  | 10.082 | ppbv 88   |
| 7) Chloroethane                | 3.51 | 64  | 265132  | 10.367 | ppbv 97   |
| 8) Dichlorotetrafluoroethane   | 3.14 | 85  | 1628520 | 9.938  | ppbv 99   |
| 9) Propene                     | 2.96 | 41  | 522431  | 9.452  | ppbv 97   |
| 10) Heptane                    | 8.12 | 43  | 1481968 | 10.703 | ppbv 100  |
| 11) Trichlorofluoromethane     | 3.91 | 101 | 1679840 | 10.289 | ppbv 100  |
| 12) 1,1,2-Trichlorotrifluoroet | 4.45 | 101 | 1168775 | 10.054 | ppbv 99   |
| 13) Ethanol                    | 3.56 | 45  | 157987  | 8.662  | ppbv 96   |
| 14) Bromoethene                | 3.70 | 108 | 517488  | 10.772 | ppbv 98   |
| 15) Acetone                    | 3.81 | 43  | 1322464 | 8.967  | ppbv 99   |
| 16) 1,3-Butadiene              | 3.28 | 39  | 642403  | 10.121 | ppbv 99   |
| 17) tert-Butyl alcohol         | 4.25 | 59  | 1269167 | 9.672  | ppbv 100  |
| 18) 1,1-Dichloroethene         | 4.25 | 96  | 542711  | 10.761 | ppbv 97   |
| 19) Isopropyl Alcohol          | 3.93 | 45  | 952599  | 9.685  | ppbv # 99 |
| 20) Methylene Chloride         | 4.31 | 84  | 480020  | 9.832  | ppbv 93   |
| 21) Allyl Chloride             | 4.38 | 41  | 898831  | 10.789 | ppbv 99   |
| 22) trans-1,2-Dichloroethene   | 4.85 | 96  | 534905  | 10.707 | ppbv 98   |
| 23) Vinyl Acetate              | 5.04 | 43  | 1953156 | 10.444 | ppbv 99   |
| 24) 1,1-Dichloroethane         | 4.98 | 63  | 1437296 | 9.978  | ppbv 99   |
| 25) Ethyl Acetate              | 5.65 | 43  | 2538438 | 10.246 | ppbv 100  |
| 26) Hexane                     | 5.66 | 57  | 1124470 | 10.470 | ppbv 100  |
| 27) Carbon Disulfide           | 4.51 | 76  | 1400897 | 11.066 | ppbv 98   |
| 28) Methyl tert-Butyl Ether    | 5.00 | 73  | 1626969 | 9.946  | ppbv 99   |
| 29) Chloroform                 | 5.73 | 83  | 1766528 | 10.052 | ppbv 100  |
| 30) Cyclohexane                | 7.12 | 84  | 936840  | 11.303 | ppbv 98   |
| 31) cis-1,2-Dichloroethene     | 5.53 | 61  | 1142004 | 10.898 | ppbv 97   |
| 32) 1,1,1-Trichloroethane      | 6.50 | 97  | 1686109 | 10.624 | ppbv 100  |
| 34) 2-Butanone                 | 5.21 | 43  | 1631478 | 10.154 | ppbv 99   |
| 35) Carbon Tetrachloride       | 7.01 | 117 | 1745786 | 10.699 | ppbv 98   |
| 36) Benzene                    | 6.88 | 78  | 2238578 | 10.503 | ppbv 98   |
| 37) 1,2-Dichloroethane         | 6.29 | 62  | 1376120 | 10.467 | ppbv 100  |
| 38) Trichloroethene            | 7.83 | 130 | 861767  | 10.437 | ppbv 96   |
| 39) 1,2-Dichloropropane        | 7.61 | 63  | 867966  | 10.158 | ppbv 96   |
| 40) 1,4-Dioxane                | 7.82 | 88  | 348501  | 10.035 | ppbv 94   |
| 41) Tetrahydrofuran            | 6.02 | 42  | 906682  | 10.718 | ppbv 98   |
| 42) Bromodichloromethane       | 7.78 | 83  | 1888827 | 10.652 | ppbv 97   |
| 43) Methyl Methacrylate        | 8.01 | 69  | 1028045 | 11.423 | ppbv 99   |

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 Acq On : 22 May 2020 9:47  
 Operator : SY/AP  
 Sample : VSTDCCC010  
 Misc : 400ml/MSVOA L  
 ALS Vial : 1 Sample Multiplier: 1

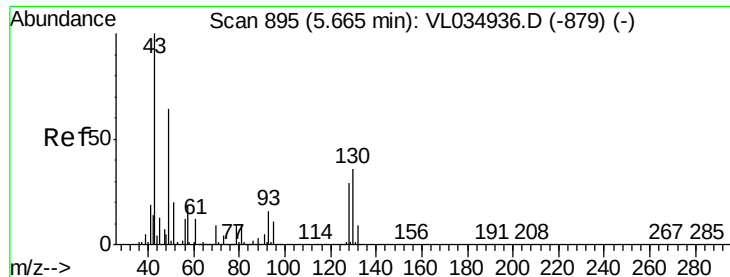
Instrument :  
 MSVOA\_L  
 ClientSampleId :

Quant Time: May 22 23:12:06 2020  
 Quant Method : Z:\VOASRV\HPCHEM1\MSVOA L\METHODS\VL050620AIR.M  
 Quant Title : AIR ANALYSIS BY METHOD TO-15 Instrument: MSVOA\_LWed May 06 14:49:39 2020  
 QLast Update : Wed May 06 14:49:39 2020  
 Response via : Initial Calibration

| Internal Standards            | R.T.  | QIon | Response | Conc   | Units  | Dev(Min) |
|-------------------------------|-------|------|----------|--------|--------|----------|
| 44) 2,2,4-Trimethylpentane    | 7.86  | 57   | 3897906  | 10.286 | ppbv   | 100      |
| 45) t-1,3-Dichloropropene     | 9.28  | 75   | 1136598  | 12.514 | ppbv   | 98       |
| 46) cis-1,3-Dichloropropene   | 8.71  | 75   | 1347632  | 12.085 | ppbv   | 100      |
| 47) 1,1,2-Trichloroethane     | 9.48  | 97   | 943797   | 10.467 | ppbv   | 95       |
| 48) Dibromochloromethane      | 10.31 | 129  | 1560824  | 11.257 | ppbv   | 100      |
| 49) Bromoform                 | 13.06 | 173  | 1347822  | 11.297 | ppbv   | 100      |
| 50) 4-Methyl-2-Pentanone      | 8.74  | 43   | 2446303  | 10.677 | ppbv   | 100      |
| 51) 2-Hexanone                | 10.13 | 43   | 2018973  | 11.266 | ppbv   | 100      |
| 52) Tetrachloroethene         | 11.23 | 164  | 788371   | 10.402 | ppbv   | 97       |
| 53) Toluene                   | 9.81  | 91   | 2604031  | 11.525 | ppbv   | 100      |
| 54) 1,2-Dibromoethane         | 10.62 | 107  | 1419979  | 10.724 | ppbv   | 100      |
| 56) 1,1,1,2-Tetrachloroethane | 12.14 | 131  | 1146811  | 8.048  | ppbv   | 98       |
| 57) Chlorobenzene             | 12.16 | 112  | 1969929  | 7.869  | ppbv   | 98       |
| 58) Ethyl Benzene             | 12.72 | 91   | 3482557  | 8.913  | ppbv   | 98       |
| 59) m/p-Xylene                | 13.01 | 91   | 2165857  | 6.300  | ppbv # | 57       |
| 60) o-Xylene                  | 13.71 | 91   | 2879427  | 8.488  | ppbv   | 100      |
| 61) Styrene                   | 13.54 | 104  | 2049263  | 9.545  | ppbv   | 99       |
| 62) Isopropylbenzene          | 14.69 | 105  | 4225990  | 8.344  | ppbv   | 99       |
| 63) 1,1,2,2-Tetrachloroethane | 13.70 | 83   | 2008784  | 7.522  | ppbv   | 99       |
| 64) n-propylbenzene           | 15.58 | 120  | 1109332  | 8.539  | ppbv   | 100      |
| 65) tert-Butylbenzene         | 16.77 | 119  | 3638650  | 8.283  | ppbv   | 99       |
| 66) Benzyl Chloride           | 17.01 | 91   | 1377642  | 9.238  | ppbv   | 99       |
| 67) sec-Butylbenzene          | 17.32 | 105  | 5187900  | 8.273  | ppbv   | 99       |
| 69) p-Isopropyltoluene        | 17.67 | 119  | 4217902  | 8.314  | ppbv   | 99       |
| 70) n-Butylbenzene            | 18.58 | 91   | 4493879  | 8.323  | ppbv   | 99       |
| 71) 2-Chlorotoluene           | 15.47 | 91   | 3258782  | 8.523  | ppbv   | 100      |
| 72) 4-Ethyltoluene            | 15.86 | 105  | 3338989  | 8.822  | ppbv   | 99       |
| 73) 1,3,5-Trimethylbenzene    | 16.02 | 105  | 3112022  | 8.449  | ppbv   | 98       |
| 74) 1,2,4-Trimethylbenzene    | 16.78 | 105  | 3203263  | 7.967  | ppbv # | 88       |
| 75) 1,3-Dichlorobenzene       | 17.02 | 146  | 1840505  | 7.796  | ppbv   | 98       |
| 76) 1,4-Dichlorobenzene       | 17.17 | 146  | 1827425  | 8.147  | ppbv   | 100      |
| 77) 1,2-Dichlorobenzene       | 17.84 | 146  | 1762318  | 7.923  | ppbv   | 99       |
| 78) Hexachloro-1,3-Butadiene  | 23.41 | 225  | 1497568  | 7.898  | ppbv   | 98       |
| 79) Naphthalene               | 22.24 | 128  | 3182559  | 10.165 | ppbv   | 100      |
| 80) Naphthalene, 2-methyl-    | 25.00 | 142  | 1464584  | 19.030 | ppbv   | 97       |
| 81) 1,2,4-Trichlorobenzene    | 21.97 | 180  | 929937   | 4.898  | ppbv # | 30       |

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

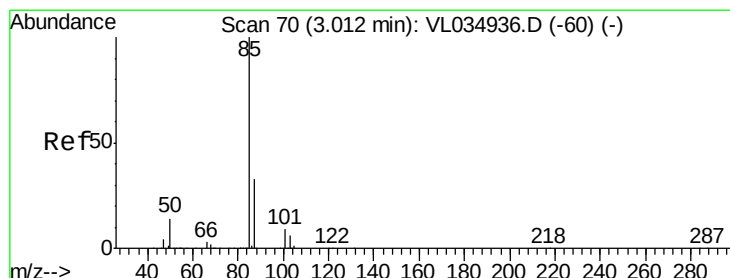
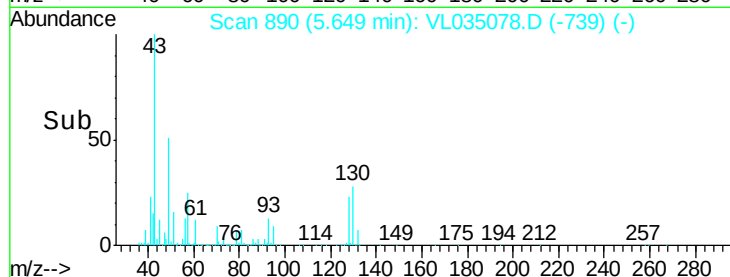
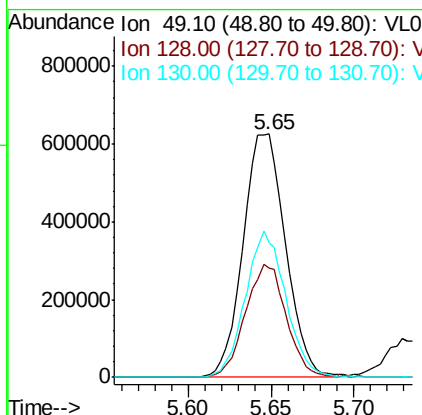
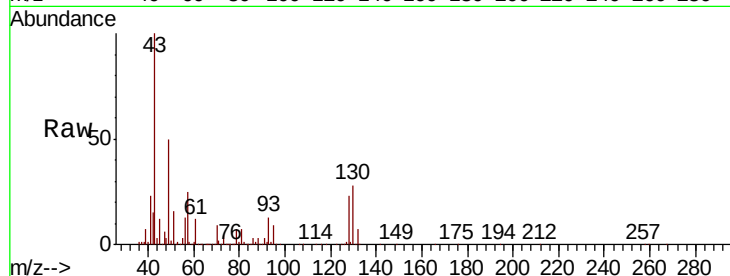




#1  
 Bromochloromethane  
 Concen: 10.000 ppbv  
 RT: 5.65 min Scan# 890  
 Delta R.T. -0.02 min  
 Lab File: VL035078.D  
 Acq: 22 May 2020 9:47

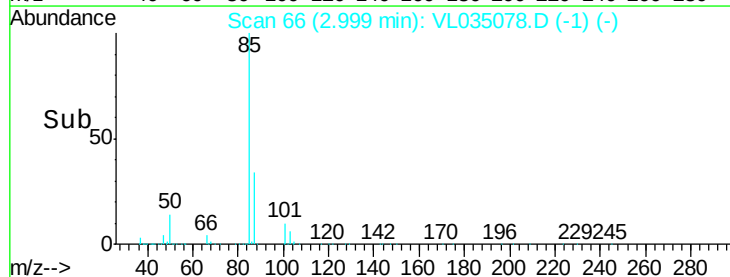
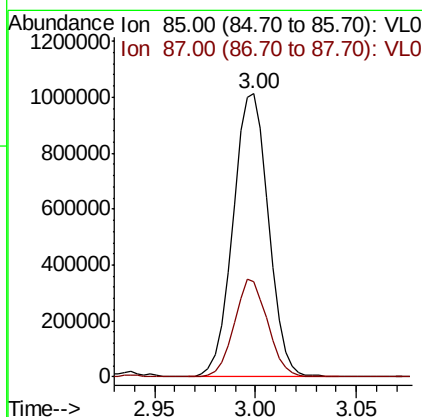
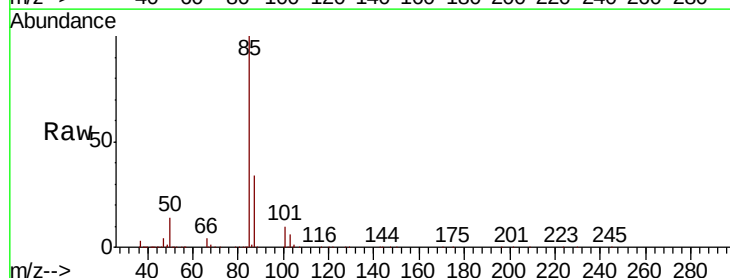
Instrument :  
 MSVOA\_L  
 ClientSampleId :

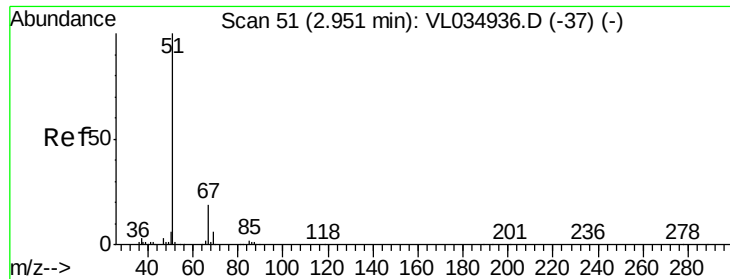
Tot Ion: 49 Resp: 1115603  
 Ion Ratio Lower Upper  
 49 100  
 128 45.0 22.1 66.5  
 130 57.2 29.1 87.3



#2  
 Dichlorodifluoromethane  
 Concen: 7.878 ppbv  
 RT: 3.00 min Scan# 66  
 Delta R.T. -0.01 min  
 Lab File: VL035078.D  
 Acq: 22 May 2020 9:47

Tgt Ion: 85 Resp: 1247316  
 Ion Ratio Lower Upper  
 85 100  
 87 33.7 26.2 39.2





#3

Chlorodifluoromethane

Concen: 9.842 ppbv

RT: 2.94 min Scan# 47

Delta R.T. -0.01 min

Lab File: VL035078.D

Acq: 22 May 2020 9:47

Instrument :

MSVOA\_L

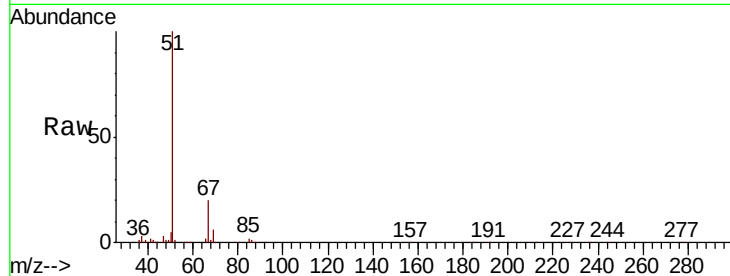
ClientSampleId :

Tot Ion: 51 Resp: 1253562

Ion Ratio Lower Upper

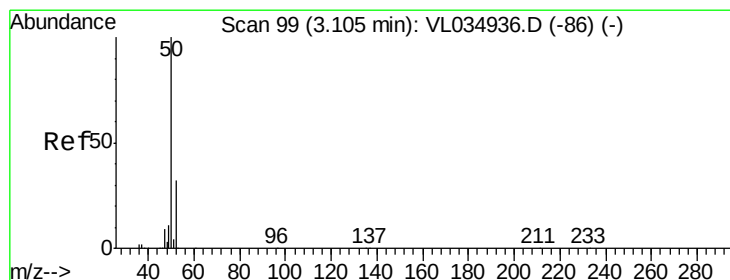
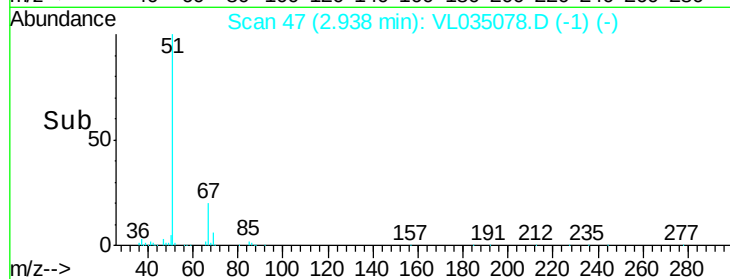
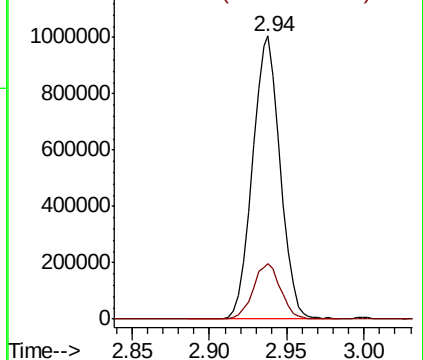
51 100

67 19.6 15.0 22.6



Abundance Ion 51.00 (50.70 to 51.70): VL0

Ion 67.00 (66.70 to 67.70): VL0



#4

Chloromethane

Concen: 9.888 ppbv

RT: 3.09 min Scan# 94

Delta R.T. -0.02 min

Lab File: VL035078.D

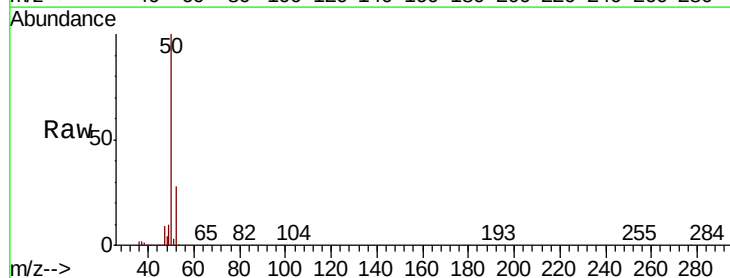
Acq: 22 May 2020 9:47

Tgt Ion: 50 Resp: 721783

Ion Ratio Lower Upper

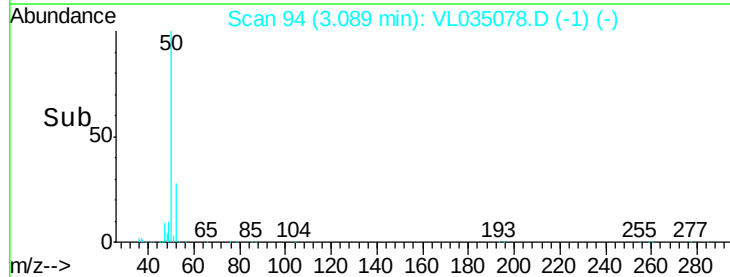
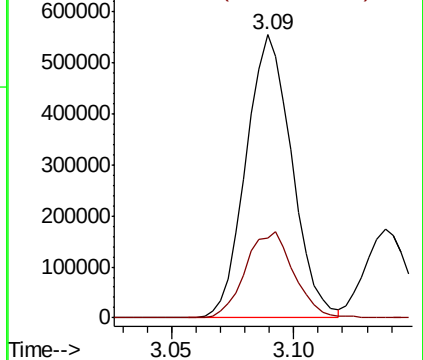
50 100

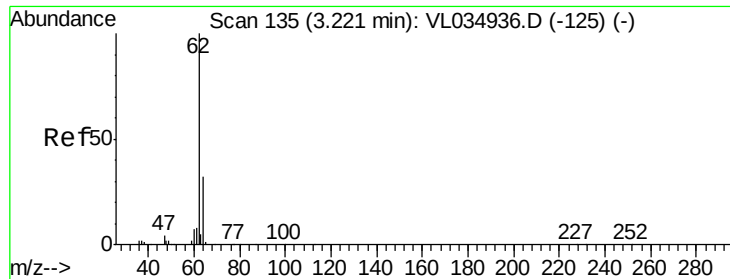
52 28.3 25.4 38.2



Abundance Ion 50.10 (49.80 to 50.80): VL0

Ion 52.10 (51.80 to 52.80): VL0





#5

Vinyl Chloride

Concen: 9.922 ppbv

RT: 3.21 min Scan# 131

Delta R.T. -0.01 min

Lab File: VL035078.D

Acq: 22 May 2020 9:47

Instrument :

MSVOA\_L

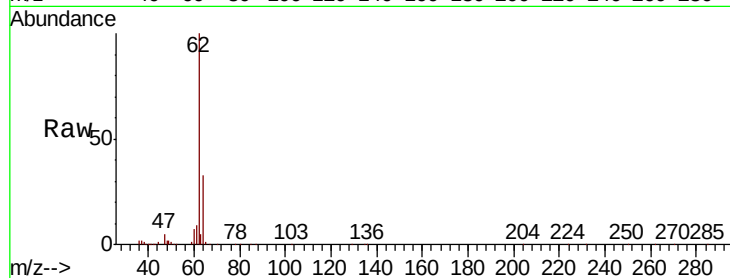
ClientSampled :

Tot Ion: 62 Resp: 706567

Ion Ratio Lower Upper

62 100

64 33.0 25.7 38.5



Abundance Ion 62.10 (61.80 to 62.80): VL0

Ion 64.10 (63.80 to 64.80): VL0

3.21

600000

500000

400000

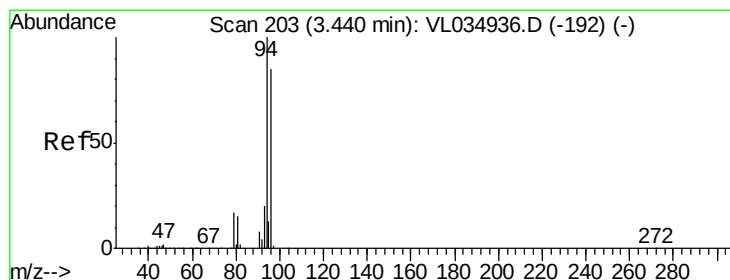
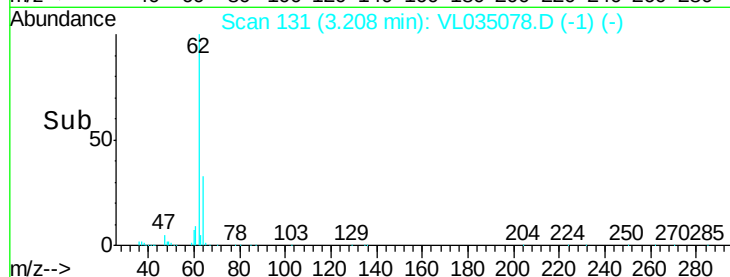
300000

200000

100000

0

Time-->



#6

Bromomethane

Concen: 10.082 ppbv

RT: 3.43 min Scan# 199

Delta R.T. -0.01 min

Lab File: VL035078.D

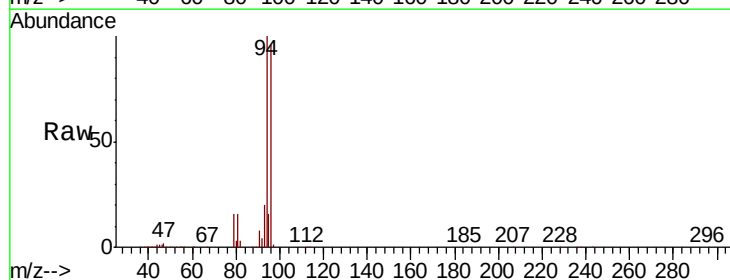
Acq: 22 May 2020 9:47

Tgt Ion: 94 Resp: 428664

Ion Ratio Lower Upper

94 100

96 95.7 67.9 101.9



Abundance Ion 94.00 (93.70 to 94.70): VL0

Ion 96.00 (95.70 to 96.70): VL0

3.43

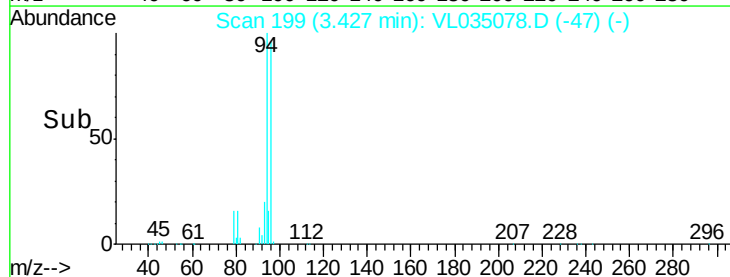
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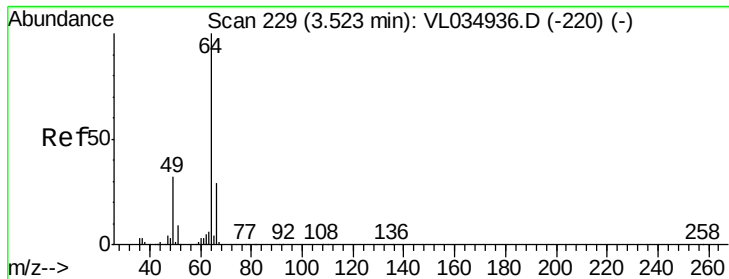
200000

100000

0

Time-->





#7

Chloroethane

Concen: 10.367 ppbv

RT: 3.51 min Scan# 225

Delta R.T. -0.01 min

Lab File: VL035078.D

Acq: 22 May 2020 9:47

Instrument :

MSVOA\_L

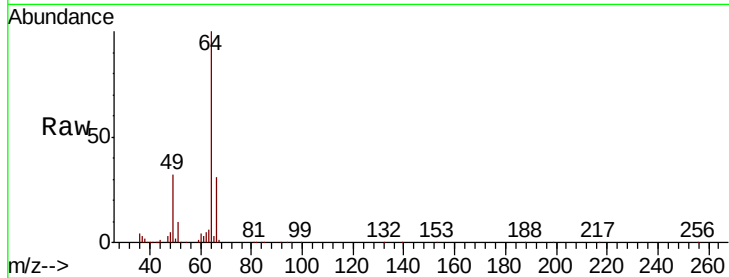
ClientSampleId :

Tot Ion: 64 Resp: 265132

Ion Ratio Lower Upper

64 100

66 30.7 23.2 34.8



Abundance Ion 64.10 (63.80 to 64.80): VL0

Ion 66.10 (65.80 to 66.80): VL0

3.51

200000

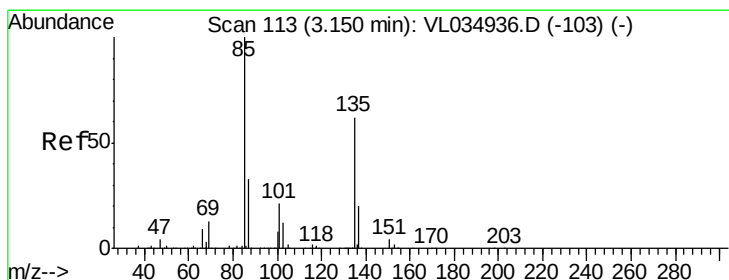
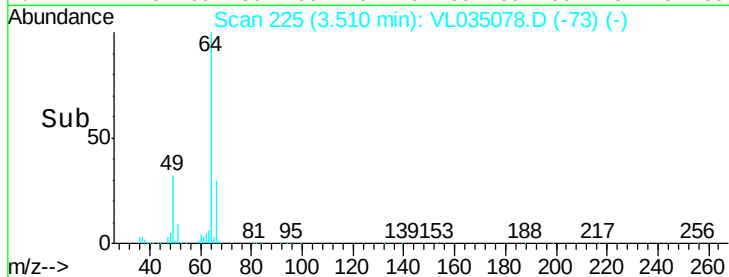
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100000

50000

0

Time-->



#8

Dichlorotetrafluoroethane

Concen: 9.938 ppbv

RT: 3.14 min Scan# 109

Delta R.T. -0.01 min

Lab File: VL035078.D

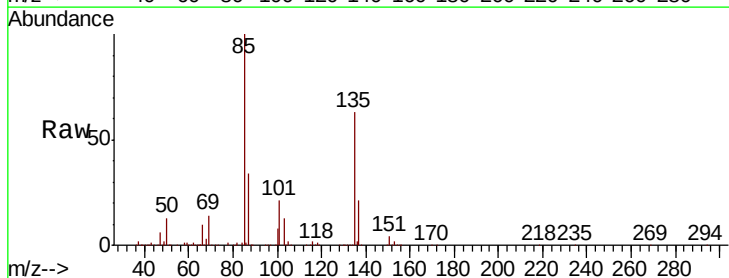
Acq: 22 May 2020 9:47

Tgt Ion: 85 Resp: 1628520

Ion Ratio Lower Upper

85 100

135 62.9 50.9 76.3



Abundance Ion 85.00 (84.70 to 85.70): VL0

Ion 135.00 (134.70 to 135.70): V

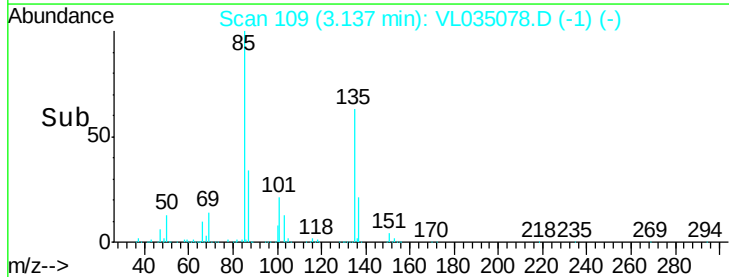
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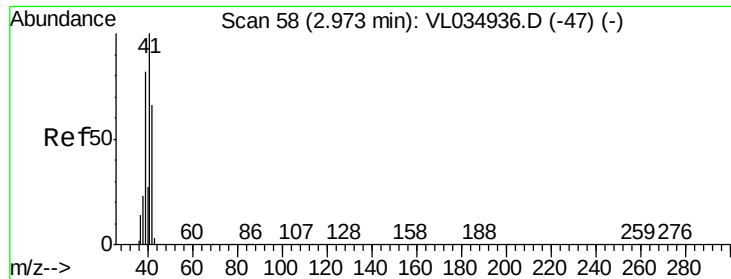
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0

Time-->







#9

Propene

Concen: 9.452 ppbv

RT: 2.96 min Scan# 53

Delta R.T. -0.02 min

Lab File: VL035078.D

Acq: 22 May 2020 9:47

Instrument :

MSVOA\_L

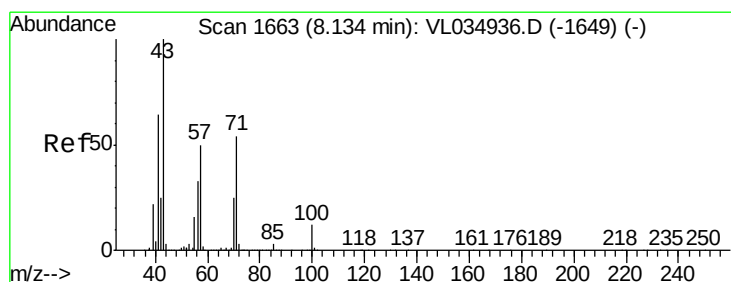
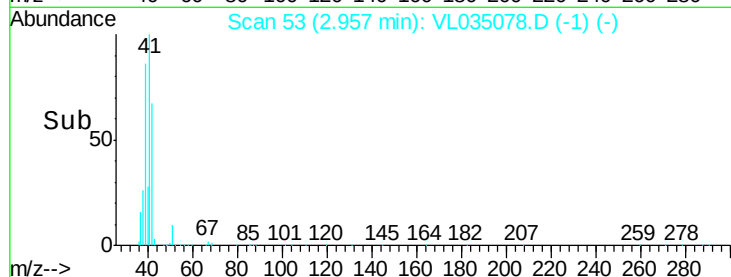
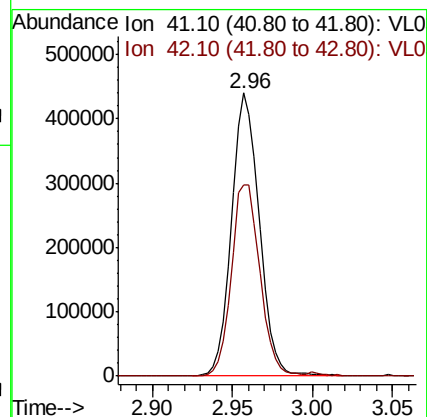
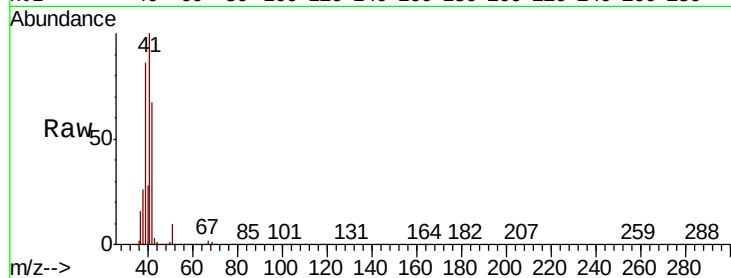
ClientSampleId :

Tot Ion: 41 Resp: 522431

Ion Ratio Lower Upper

41 100

42 70.3 54.5 81.7



#10

Heptane

Concen: 10.703 ppbv

RT: 8.12 min Scan# 1658

Delta R.T. -0.02 min

Lab File: VL035078.D

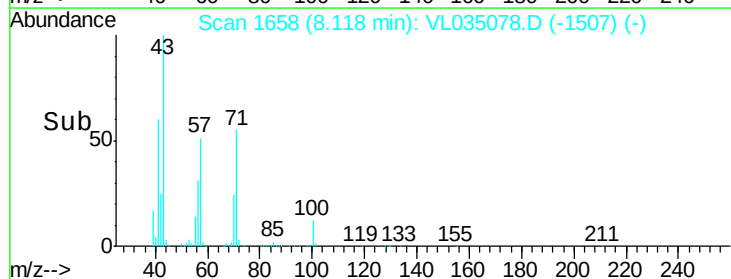
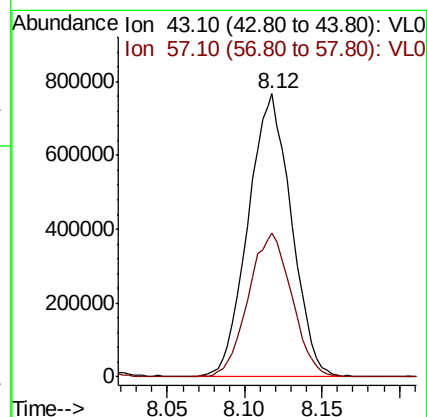
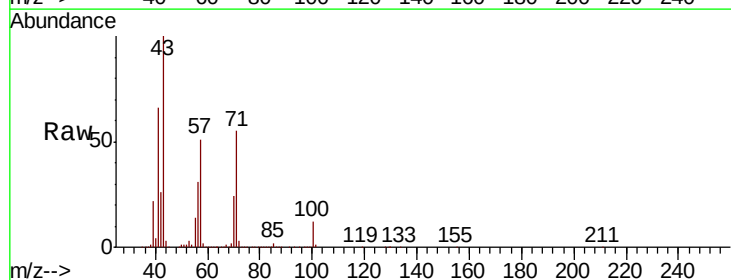
Acq: 22 May 2020 9:47

Tgt Ion: 43 Resp: 1481968

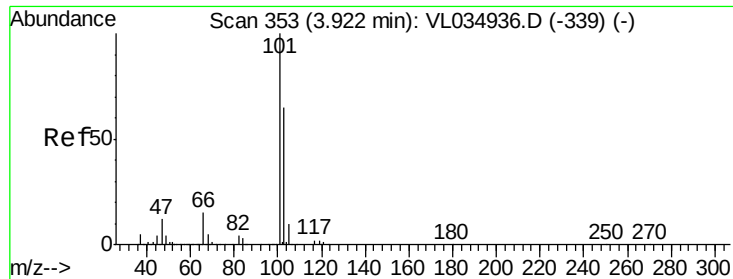
Ion Ratio Lower Upper

43 100

57 51.5 41.1 61.7







#11

Trichlorofluoromethane

Concen: 10.289 ppbv

RT: 3.91 min Scan# 349

Delta R.T. -0.01 min

Lab File: VL035078.D

Acq: 22 May 2020 9:47

Instrument :

MSVOA\_L

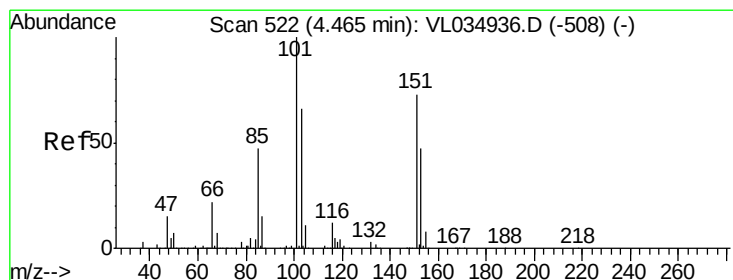
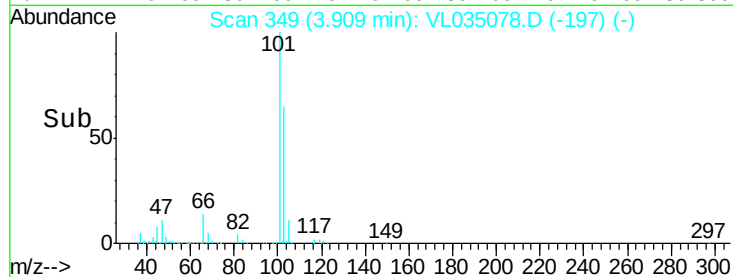
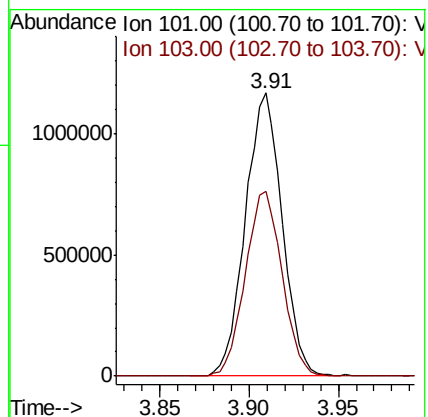
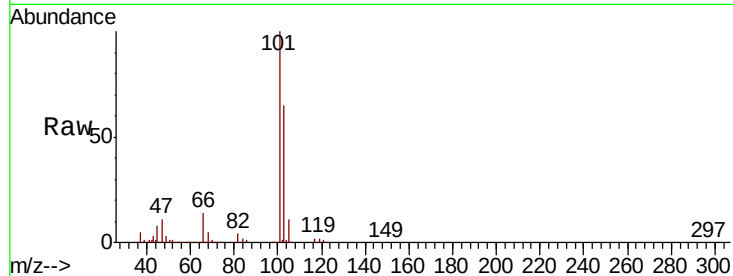
ClientSampled :

Tot Ion:101 Resp: 1679840

Ion Ratio Lower Upper

101 100

103 65.2 51.9 77.9



#12

1,1,2-Trichlorotrifluoroethane

Concen: 10.054 ppbv

RT: 4.45 min Scan# 516

Delta R.T. -0.02 min

Lab File: VL035078.D

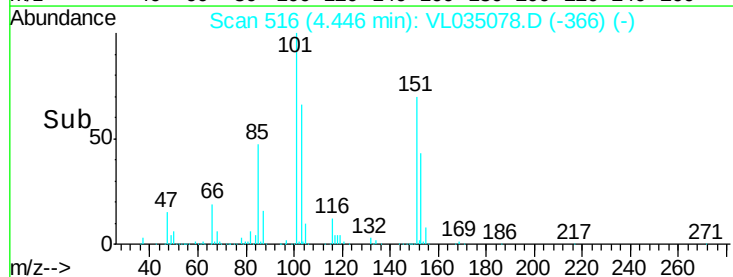
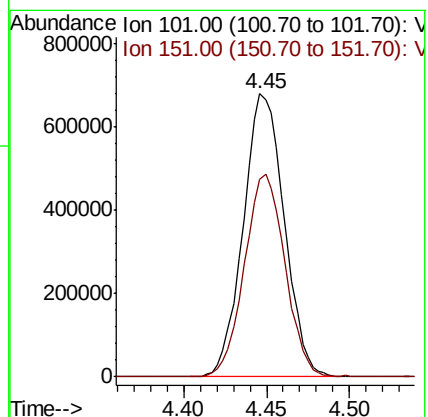
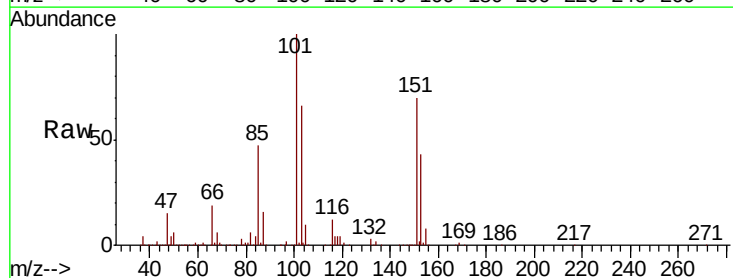
Acq: 22 May 2020 9:47

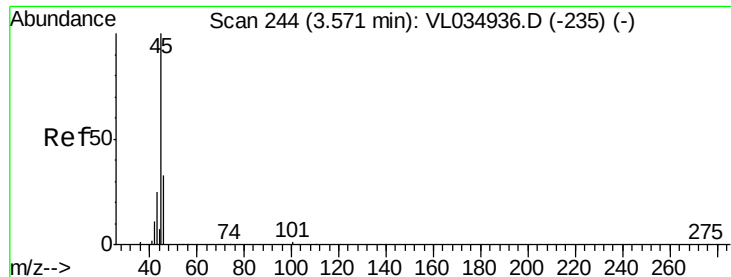
Tgt Ion:101 Resp: 1168775

Ion Ratio Lower Upper

101 100

151 70.9 57.6 86.4

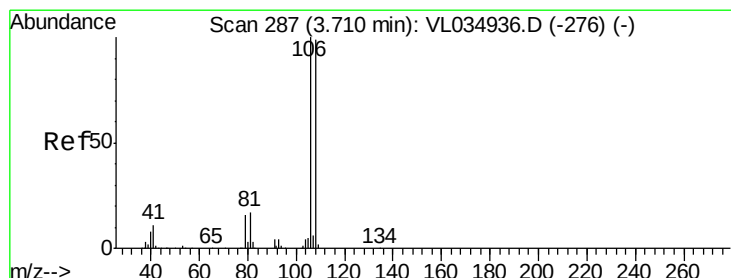
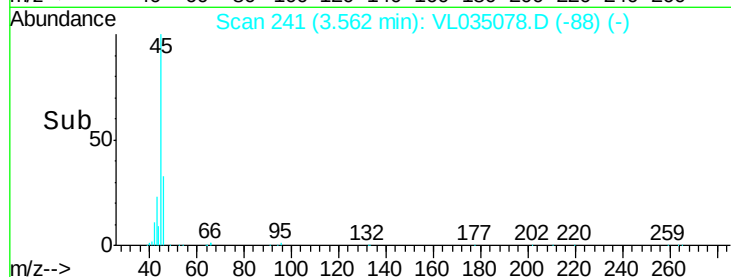
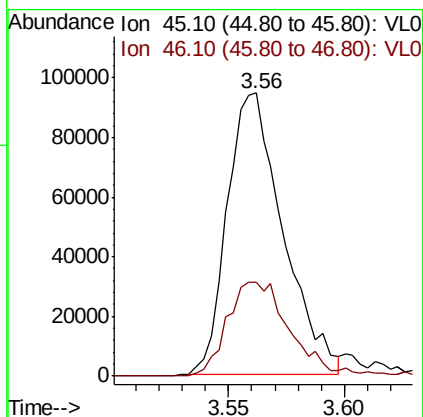
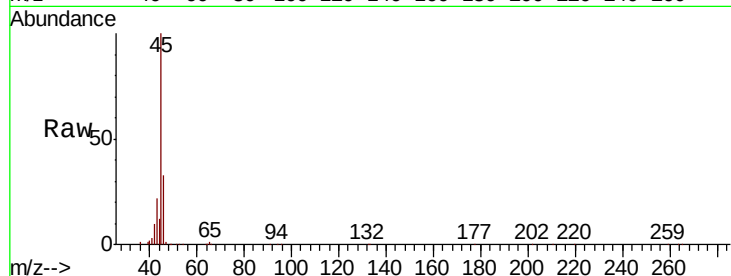




#13  
Ethanol  
Concen: 8.662 ppbv  
RT: 3.56 min Scan# 241  
Delta R.T. -0.01 min  
Lab File: VL035078.D  
Acq: 22 May 2020 9:47

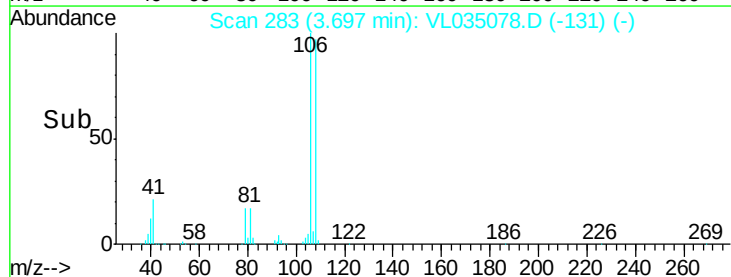
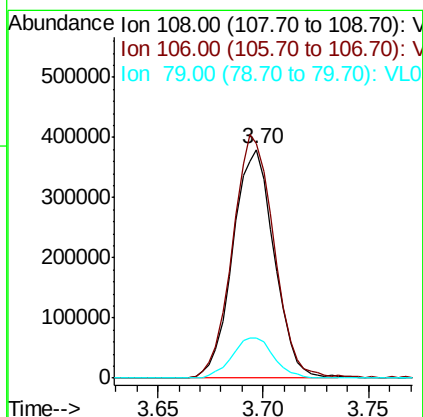
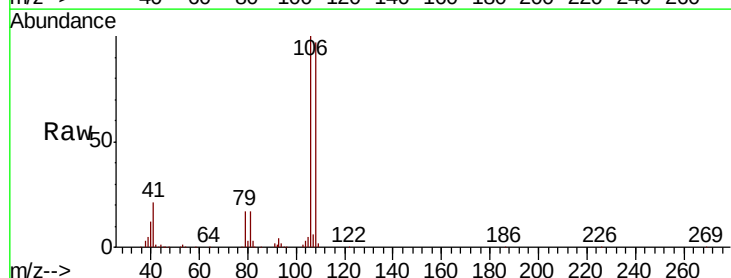
Instrument :  
MSVOA\_L  
ClientSampled :

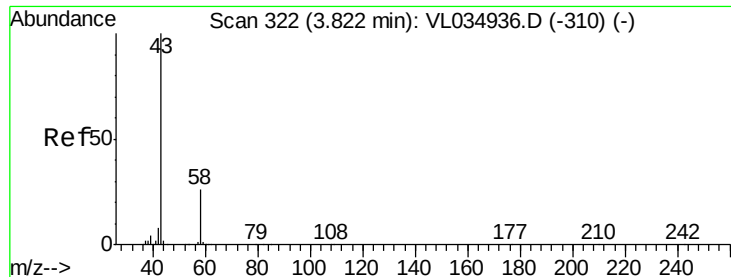
Tot Ion: 45 Resp: 157987  
Ion Ratio Lower Upper  
45 100  
46 38.1 14.3 57.3



#14  
Bromoethene  
Concen: 10.772 ppbv  
RT: 3.70 min Scan# 283  
Delta R.T. -0.01 min  
Lab File: VL035078.D  
Acq: 22 May 2020 9:47

Tgt Ion: 108 Resp: 517488  
Ion Ratio Lower Upper  
108 100  
106 107.6 84.9 127.3  
79 18.3 14.1 21.1





#15

Acetone

Concen: 8.967 ppbv

RT: 3.81 min Scan# 317

Delta R.T. -0.02 min

Lab File: VL035078.D

Acq: 22 May 2020 9:47

Instrument :

MSVOA\_L

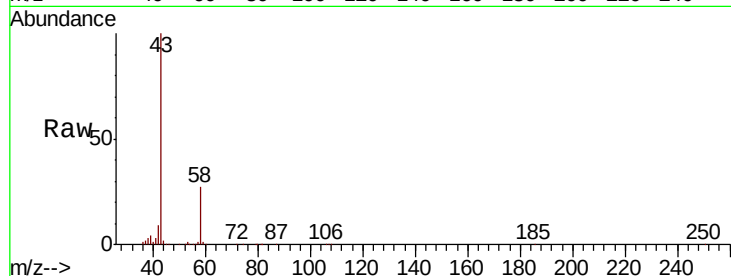
ClientSampleId :

Tot Ion: 43 Resp: 1322464

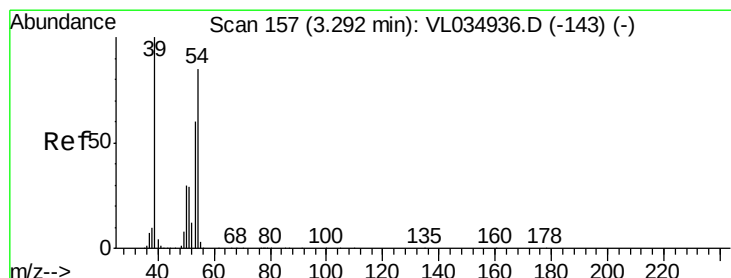
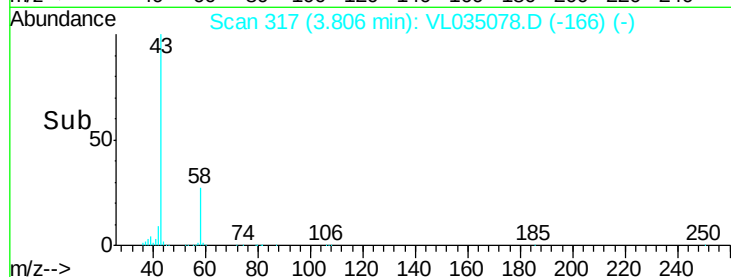
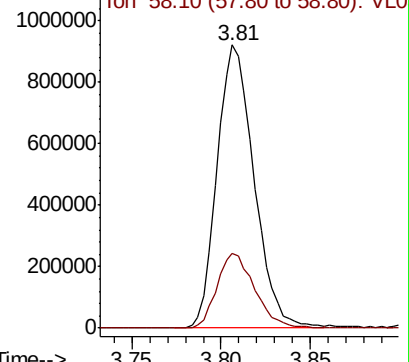
Ion Ratio Lower Upper

43 100

58 26.8 21.7 32.5



Abundance Ion 43.10 (42.80 to 43.80): VL0



#16

1,3-Butadiene

Concen: 10.121 ppbv

RT: 3.28 min Scan# 153

Delta R.T. -0.01 min

Lab File: VL035078.D

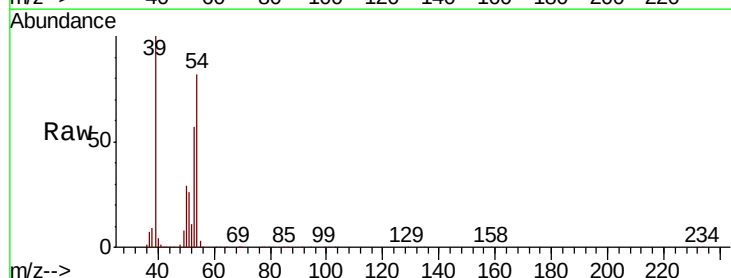
Acq: 22 May 2020 9:47

Tgt Ion: 39 Resp: 642403

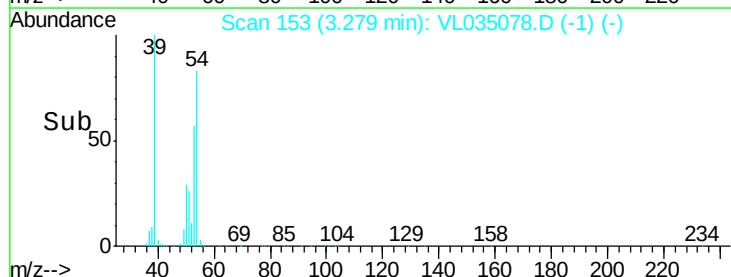
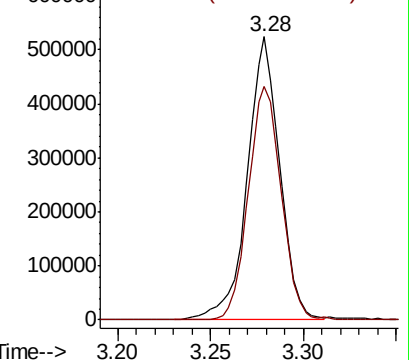
Ion Ratio Lower Upper

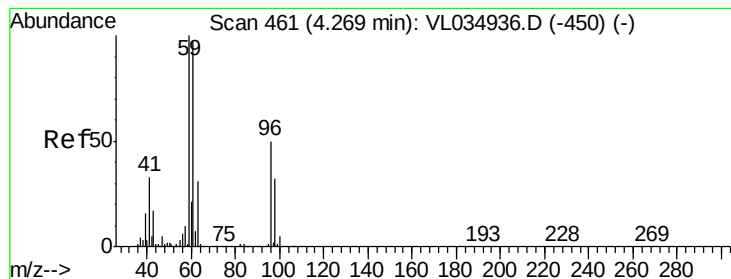
39 100

54 84.0 66.6 100.0



Abundance Ion 39.10 (38.80 to 39.80): VL0





#17

tert-Butyl alcohol

Concen: 9.672 ppbv

RT: 4.25 min Scan# 456

Delta R.T. -0.02 min

Lab File: VL035078.D

Acq: 22 May 2020 9:47

Instrument :

MSVOA\_L

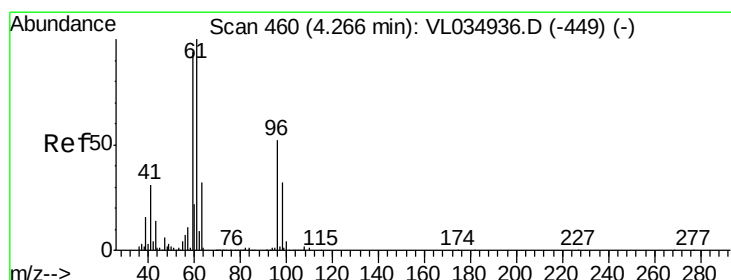
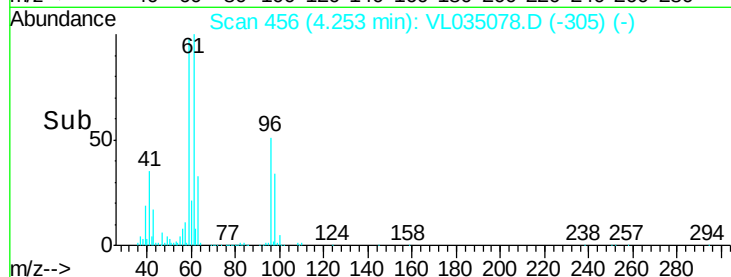
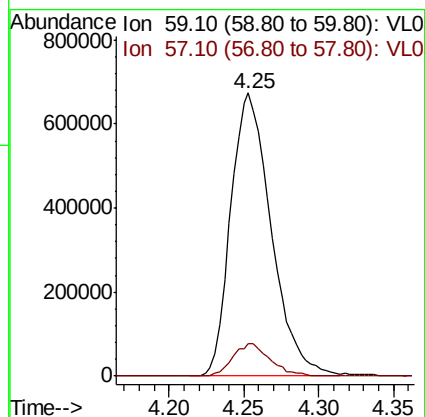
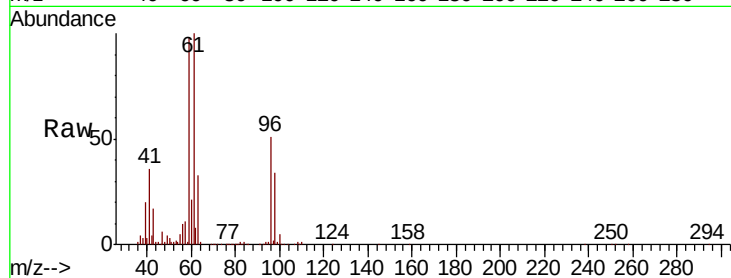
ClientSampleId :

Tot Ion: 59 Resp: 1269167

Ion Ratio Lower Upper

59 100

57 10.9 8.7 13.1



#18

1,1-Dichloroethene

Concen: 10.761 ppbv

RT: 4.25 min Scan# 455

Delta R.T. -0.02 min

Lab File: VL035078.D

Acq: 22 May 2020 9:47

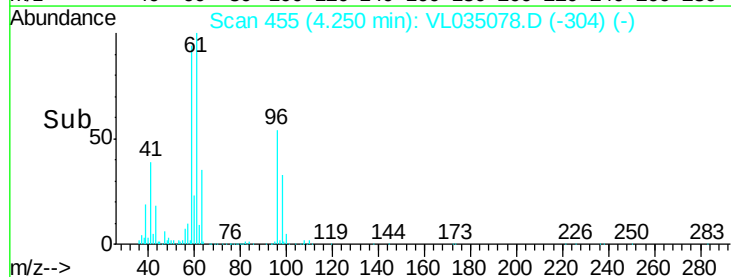
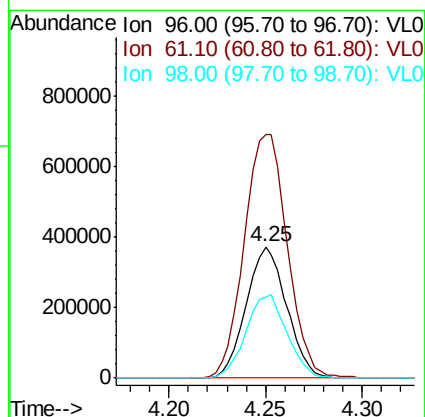
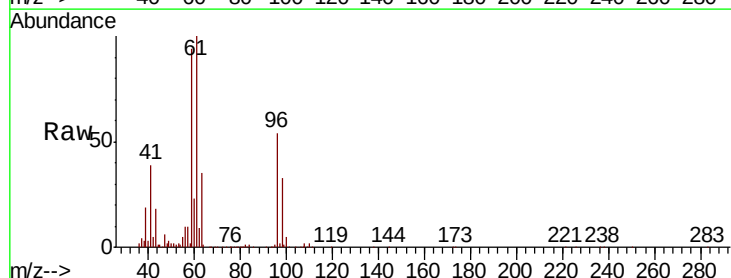
Tgt Ion: 96 Resp: 542711

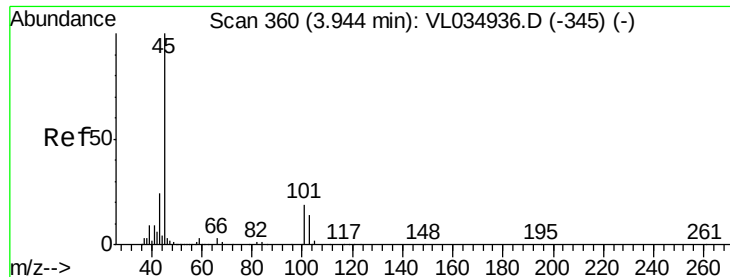
Ion Ratio Lower Upper

96 100

61 185.1 152.4 228.6

98 61.7 48.8 73.2





#19

Isopropyl Alcohol

Concen: 9.685 ppbv

RT: 3.93 min Scan# 354

Delta R.T. -0.02 min

Lab File: VL035078.D

Acq: 22 May 2020 9:47

Instrument :

MSVOA\_L

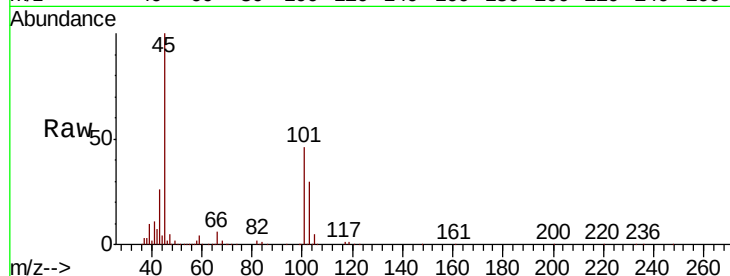
ClientSampleId :

Tot Ion: 45 Resp: 952599

Ion Ratio Lower Upper

45 100

58 2.6 1.7 2.5#



Abundance Ion 45.10 (44.80 to 45.80): VL0

Ion 58.10 (57.80 to 58.80): VL0

3.93

600000

500000

400000

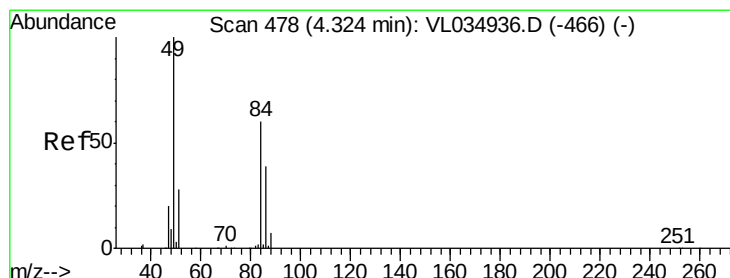
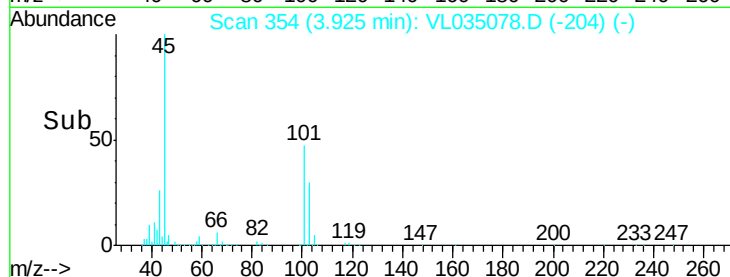
300000

200000

100000

0

Time--> 3.85 3.90 3.95 4.00



#20

Methylene Chloride

Concen: 9.832 ppbv

RT: 4.31 min Scan# 473

Delta R.T. -0.02 min

Lab File: VL035078.D

Acq: 22 May 2020 9:47

Tgt Ion: 84 Resp: 480020

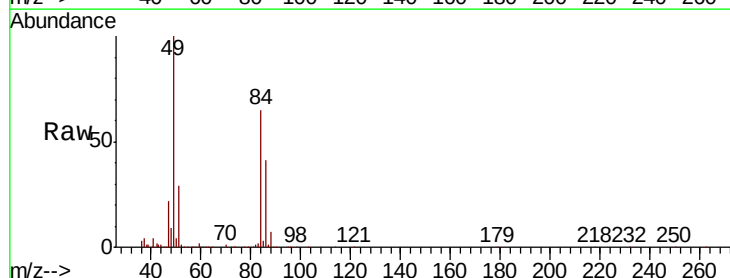
Ion Ratio Lower Upper

84 100

49 151.7 132.5 198.7

51 44.0 38.4 57.6

86 63.3 51.2 76.8



Abundance Ion 84.00 (83.70 to 84.70): VL0

Ion 49.10 (48.80 to 49.80): VL0

Ion 51.10 (50.80 to 51.80): VL0

Ion 86.00 (85.70 to 86.70): VL0

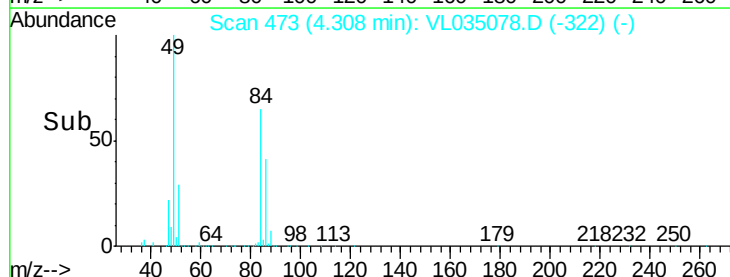
600000

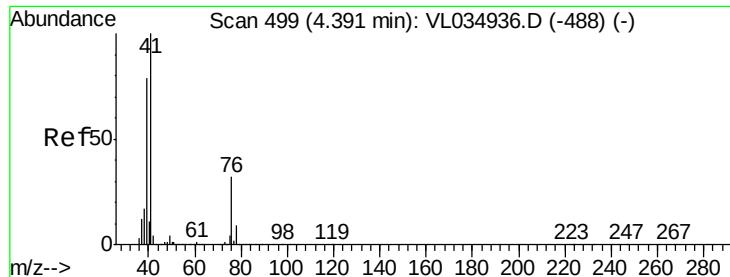
400000

200000

0

Time--> 4.25 4.30 4.35

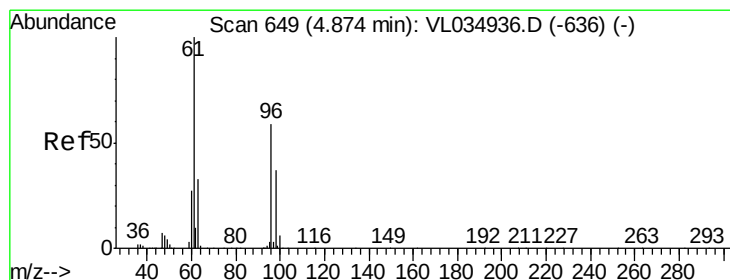
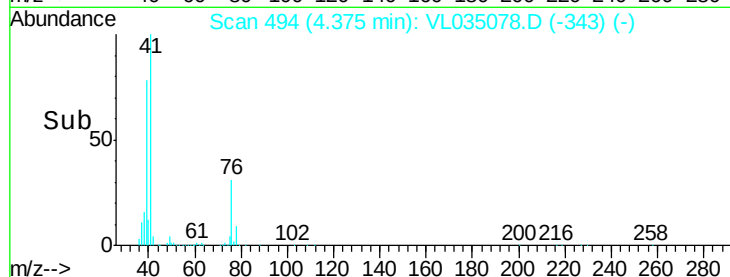
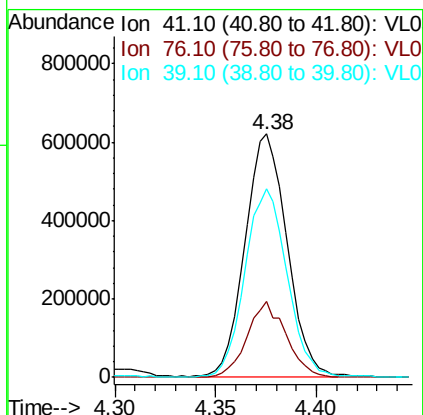
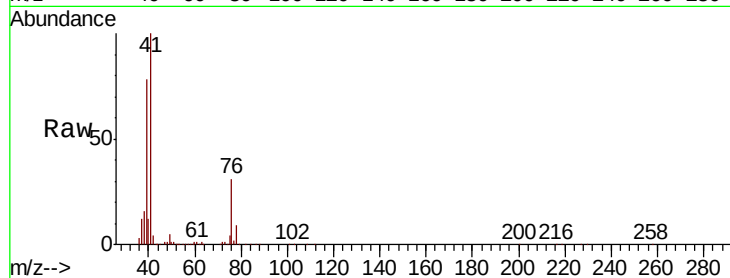




#21  
Allvl Chloride  
Concen: 10.789 ppbv  
RT: 4.38 min Scan# 494  
Delta R.T. -0.02 min  
Lab File: VL035078.D  
Acq: 22 May 2020 9:47

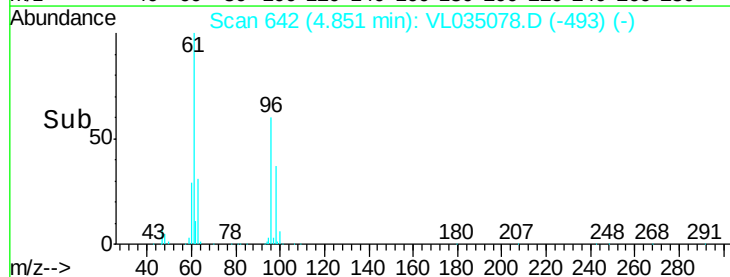
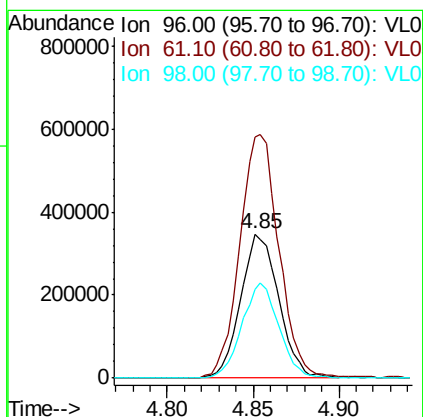
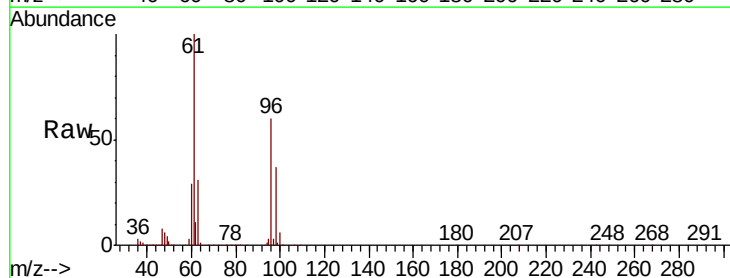
Instrument :  
MSVOA\_L  
ClientSampleId :

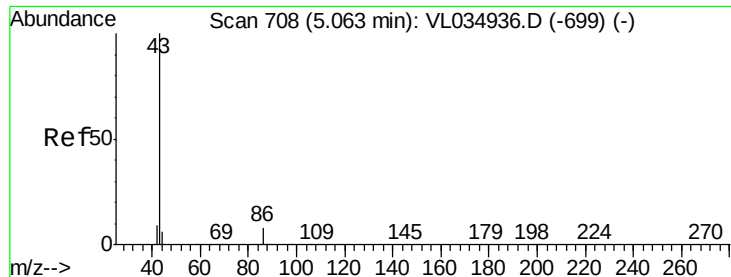
Tot Ion: 41 Resp: 898831  
Ion Ratio Lower Upper  
41 100  
76 29.4 23.6 35.4  
39 78.6 61.9 92.9



#22  
trans-1,2-Dichloroethene  
Concen: 10.707 ppbv  
RT: 4.85 min Scan# 642  
Delta R.T. -0.02 min  
Lab File: VL035078.D  
Acq: 22 May 2020 9:47

Tgt Ion: 96 Resp: 534905  
Ion Ratio Lower Upper  
96 100  
61 167.3 135.3 202.9  
98 61.1 50.4 75.6





#23

Vinyl Acetate

Concen: 10.444 ppbv

RT: 5.04 min Scan# 702

Delta R.T. -0.02 min

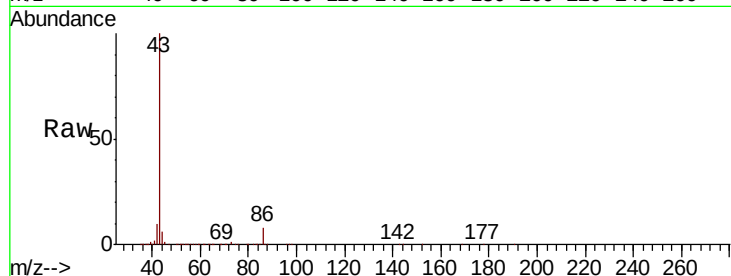
Lab File: VL035078.D

Acq: 22 May 2020 9:47

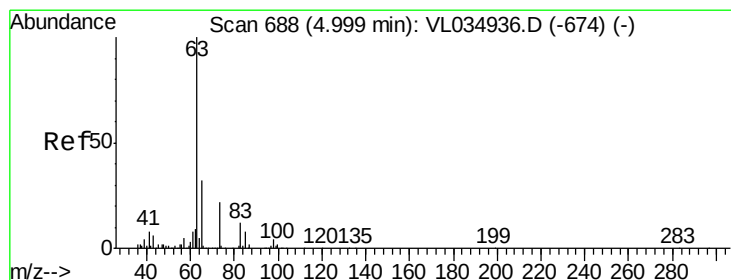
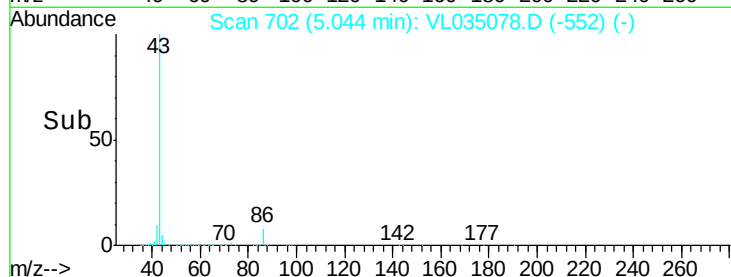
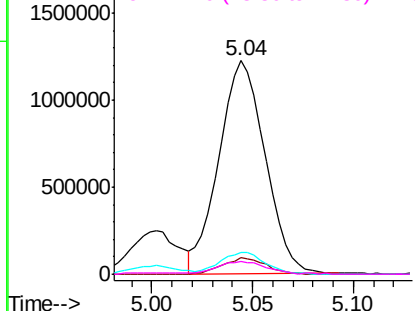
Instrument :  
MSVOA\_L  
ClientSampleId :

Tot Ion: 43 Resp: 1953156

| Ion | Ratio | Lower | Upper |
|-----|-------|-------|-------|
| 43  | 100   |       |       |
| 86  | 7.9   | 5.5   | 8.3   |
| 42  | 9.9   | 8.0   | 12.0  |
| 44  | 5.7   | 4.5   | 6.7   |



Abundance Ion 43.10 (42.80 to 43.80): VL0  
Ion 86.10 (85.80 to 86.80): VL0  
Ion 42.10 (41.80 to 42.80): VL0  
Ion 44.10 (43.80 to 44.80): VL0



#24

1,1-Dichloroethane

Concen: 9.978 ppbv

RT: 4.98 min Scan# 682

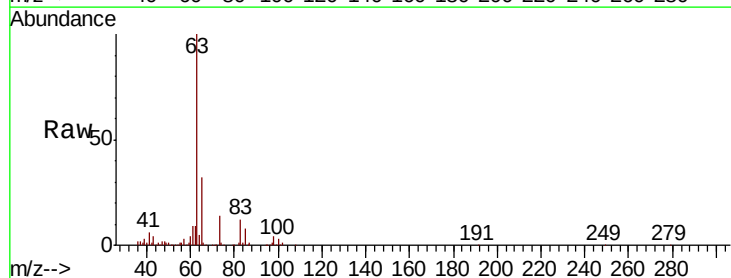
Delta R.T. -0.02 min

Lab File: VL035078.D

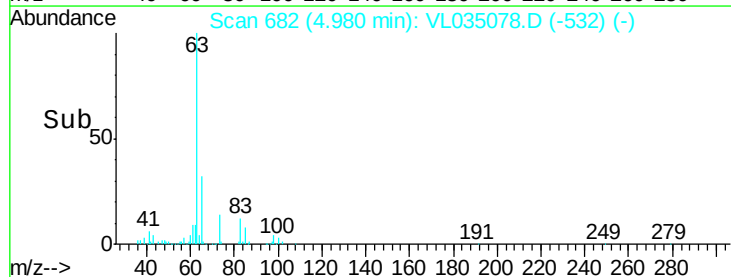
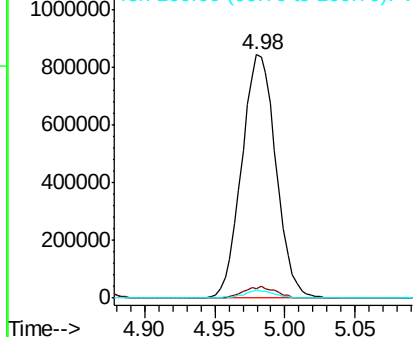
Acq: 22 May 2020 9:47

Tgt Ion: 63 Resp: 1437296

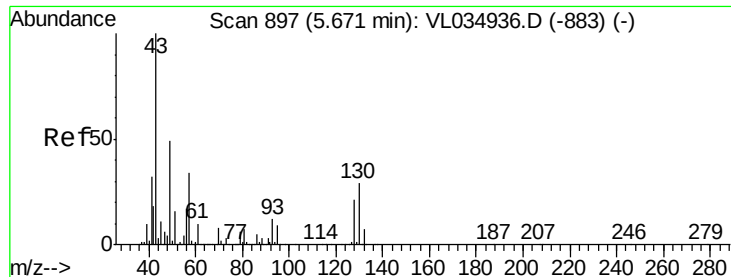
| Ion | Ratio | Lower | Upper |
|-----|-------|-------|-------|
| 63  | 100   |       |       |
| 98  | 3.9   | 2.0   | 6.0   |
| 100 | 3.3   | 1.1   | 3.5   |



Abundance Ion 63.10 (62.80 to 63.80): VL0  
Ion 98.00 (97.70 to 98.70): VL0  
Ion 100.00 (99.70 to 100.70): VL0





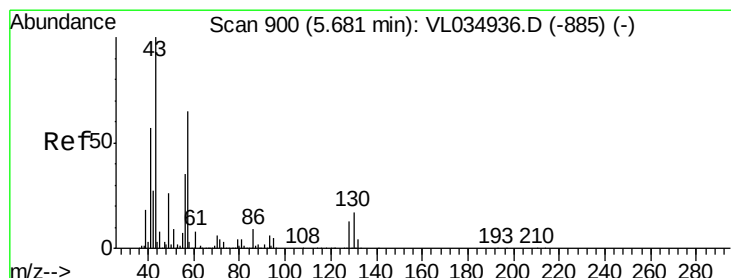
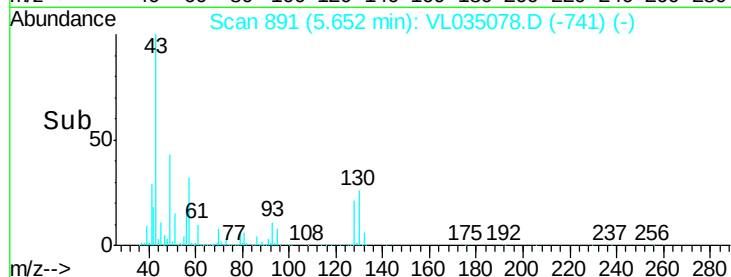
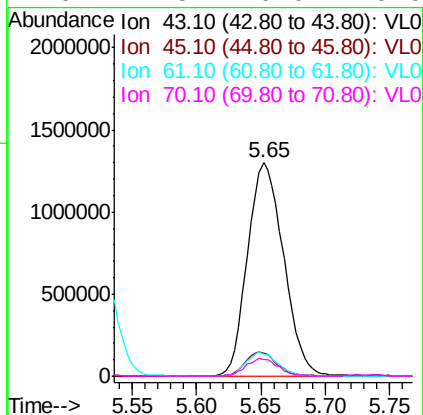
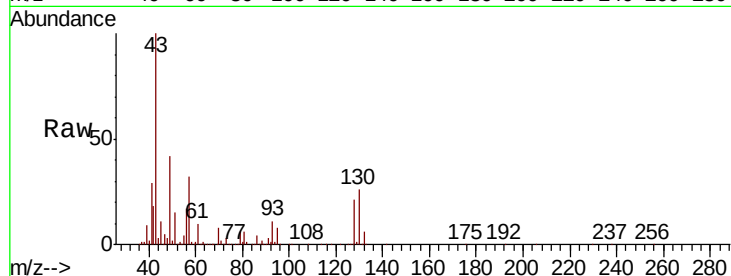


#25  
Ethyl Acetate  
Concen: 10.246 ppbv  
RT: 5.65 min Scan# 891  
Delta R.T. -0.02 min  
Lab File: VL035078.D  
Acq: 22 May 2020 9:47

Instrument :  
MSVOA\_L  
ClientSampleId :

Tot Ion: 43 Resp: 2538438

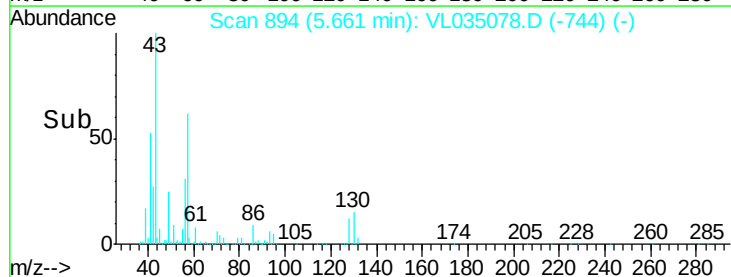
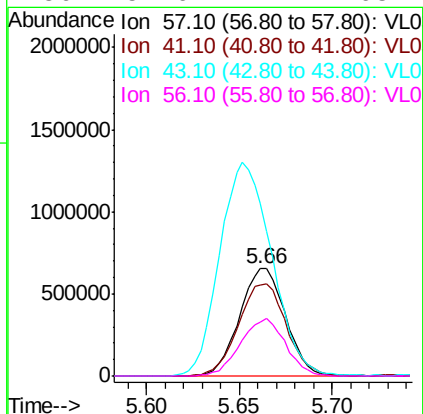
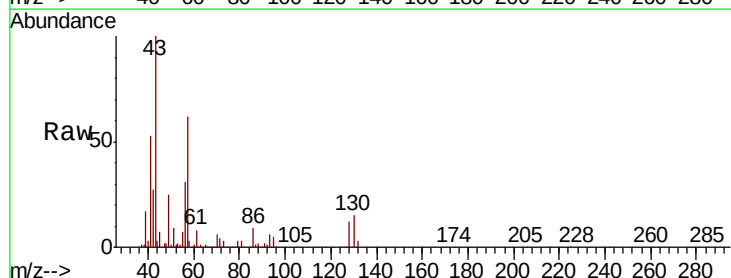
| Ion | Ratio | Lower | Upper |
|-----|-------|-------|-------|
| 43  | 100   |       |       |
| 45  | 10.1  | 8.1   | 12.1  |
| 61  | 9.9   | 7.8   | 11.8  |
| 70  | 7.5   | 6.0   | 9.0   |

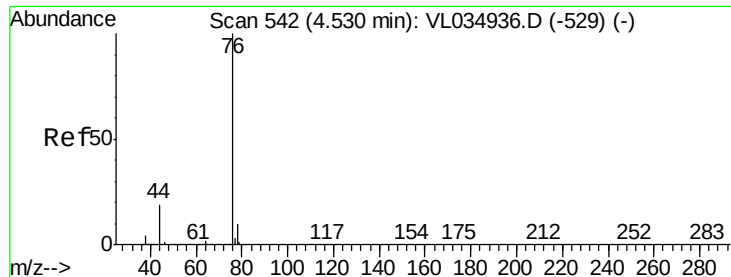


#26  
Hexane  
Concen: 10.470 ppbv  
RT: 5.66 min Scan# 894  
Delta R.T. -0.02 min  
Lab File: VL035078.D  
Acq: 22 May 2020 9:47

Tgt Ion: 57 Resp: 1124470

| Ion | Ratio | Lower | Upper |
|-----|-------|-------|-------|
| 57  | 100   |       |       |
| 41  | 90.5  | 72.7  | 109.1 |
| 43  | 226.6 | 182.1 | 273.1 |
| 56  | 52.6  | 42.2  | 63.2  |





#27

Carbon Disulfide

Concen: 11.066 ppbv

RT: 4.51 min Scan# 537

Delta R.T. -0.02 min

Lab File: VL035078.D

Acq: 22 May 2020 9:47

Instrument :

MSVOA\_L

ClientSampleId :

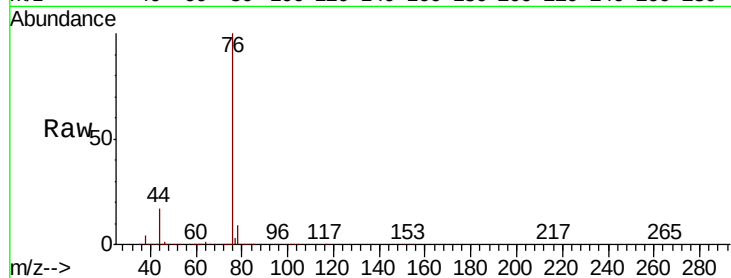
Tot Ion: 76 Resp: 1400897

Ion Ratio Lower Upper

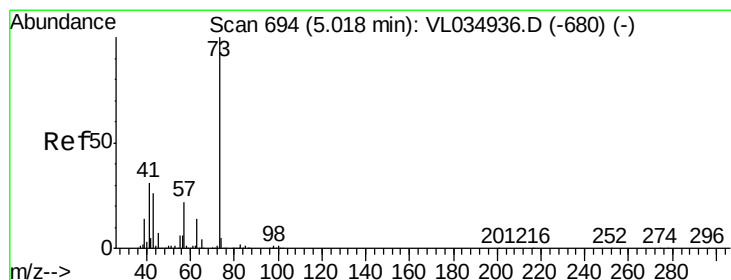
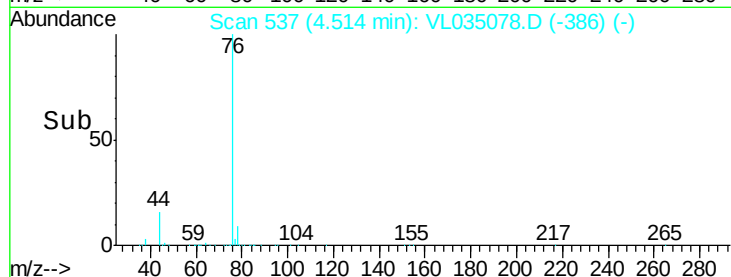
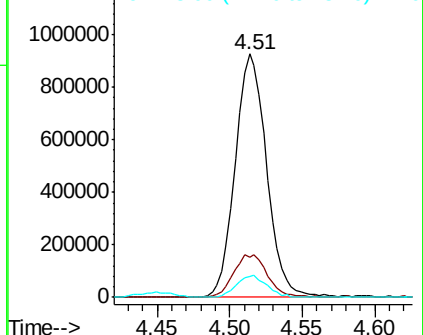
76 100

44 18.2 15.2 22.8

78 9.0 7.7 11.5



Abundance Ion 76.00 (75.70 to 76.70): VL0  
Ion 44.10 (43.80 to 44.80): VL0  
Ion 78.00 (77.70 to 78.70): VL0



#28

Methyl tert-Butyl Ether

Concen: 9.946 ppbv

RT: 5.00 min Scan# 689

Delta R.T. -0.02 min

Lab File: VL035078.D

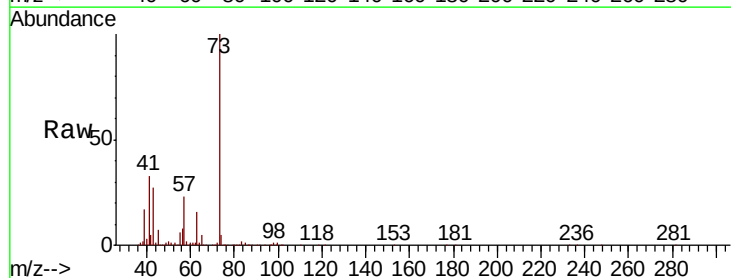
Acq: 22 May 2020 9:47

Tgt Ion: 73 Resp: 1626969

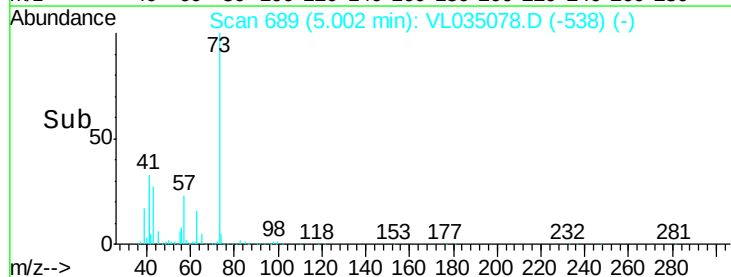
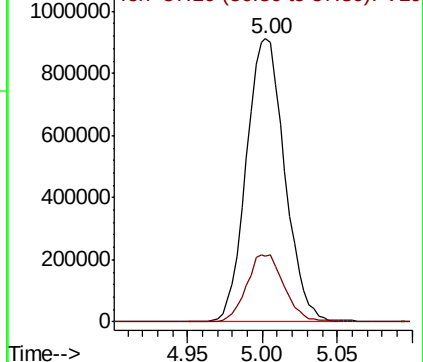
Ion Ratio Lower Upper

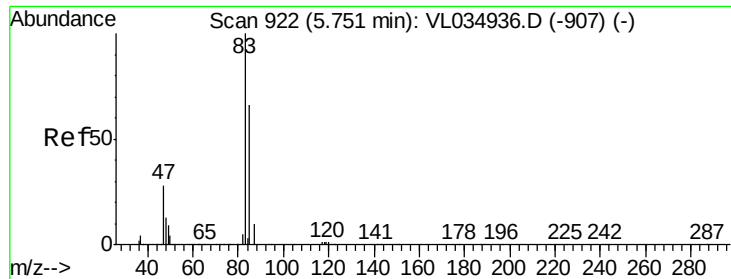
73 100

57 23.4 18.3 27.5



Abundance Ion 73.10 (72.80 to 73.80): VL0  
Ion 57.10 (56.80 to 57.80): VL0

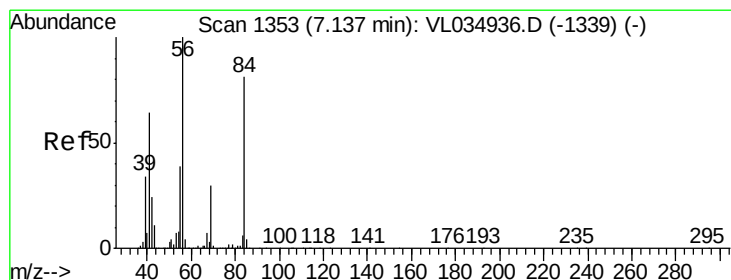
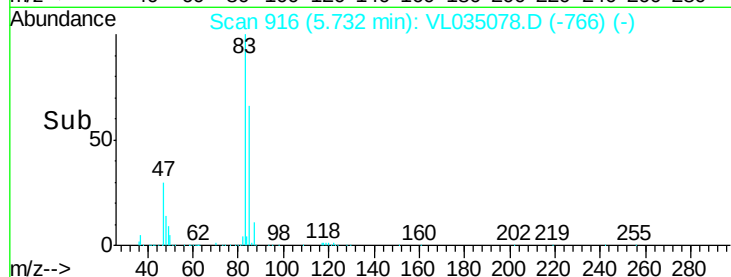
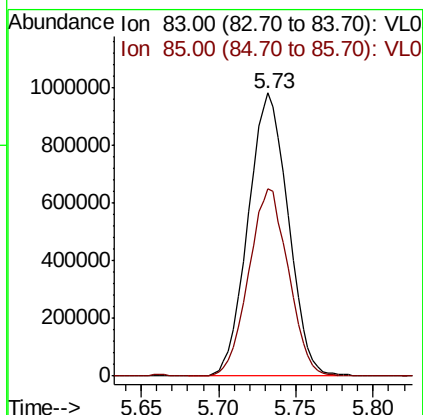
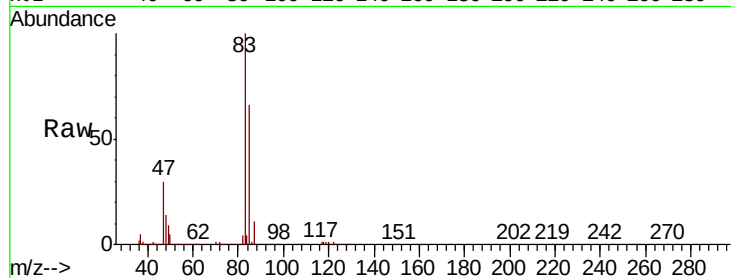




#29  
Chloroform  
Concen: 10.052 ppbv  
RT: 5.73 min Scan# 916  
Delta R.T. -0.02 min  
Lab File: VL035078.D  
Acq: 22 May 2020 9:47

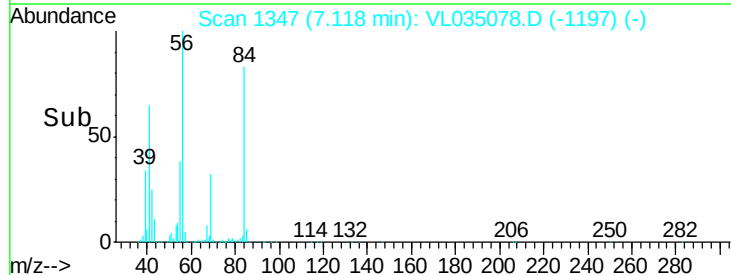
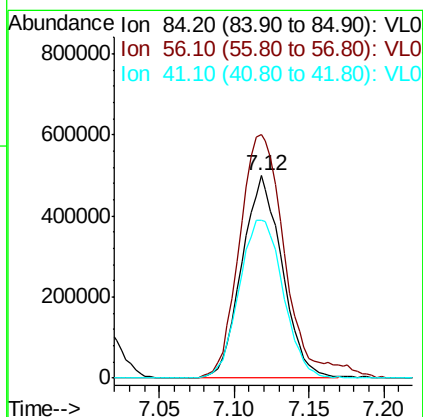
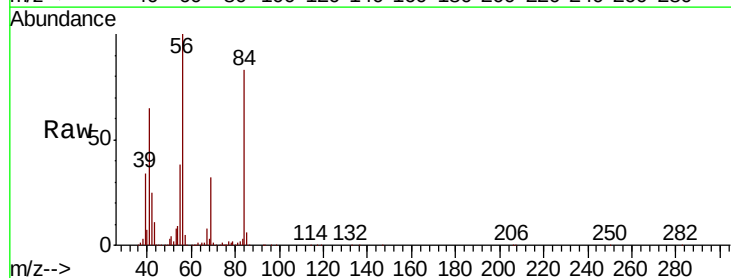
Instrument :  
MSVOA\_L  
ClientSampleId :

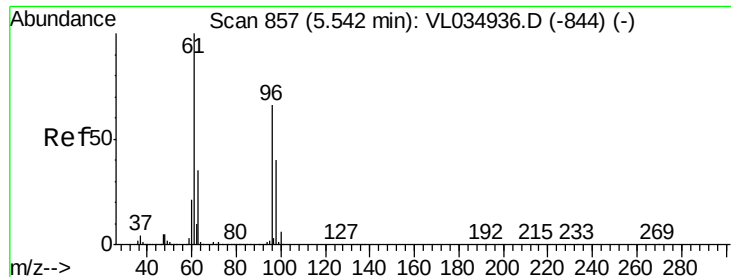
Tot Ion: 83 Resp: 1766528  
Ion Ratio Lower Upper  
83 100  
85 66.0 53.0 79.6



#30  
Cyclohexane  
Concen: 11.303 ppbv  
RT: 7.12 min Scan# 1347  
Delta R.T. -0.02 min  
Lab File: VL035078.D  
Acq: 22 May 2020 9:47

Tgt Ion: 84 Resp: 936840  
Ion Ratio Lower Upper  
84 100  
56 136.4 111.4 167.2  
41 85.3 66.7 100.1



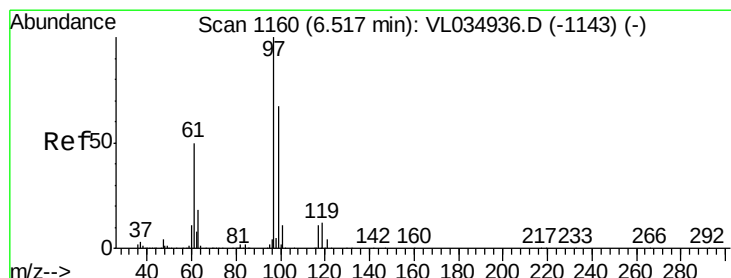
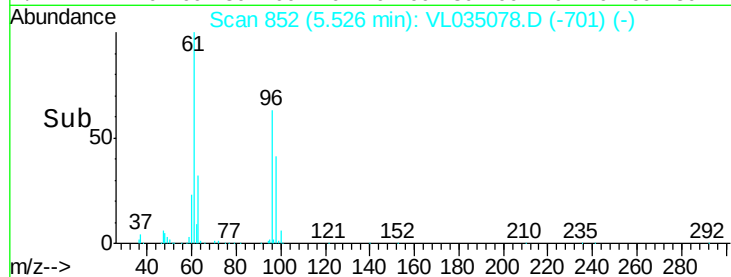
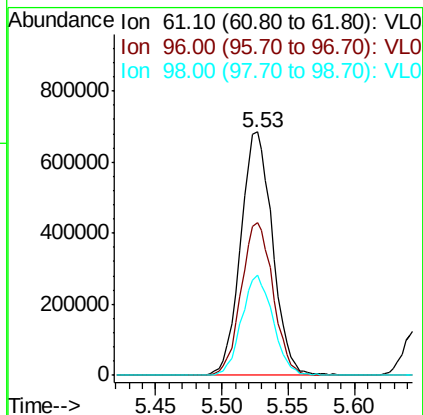
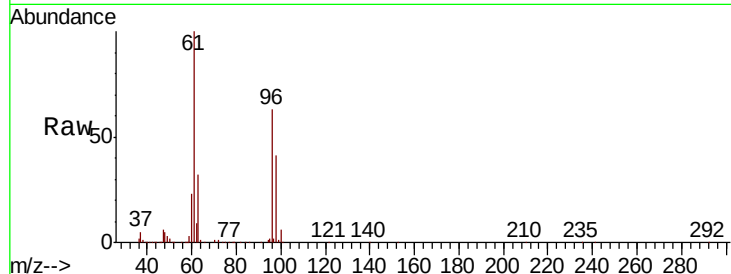


#31

cis-1,2-Dichloroethene  
 Concen: 10.898 ppbv  
 RT: 5.53 min Scan# 852  
 Delta R.T. -0.02 min  
 Lab File: VL035078.D  
 Acq: 22 May 2020 9:47

Instrument :  
 MSVOA\_L  
 ClientSampleId :

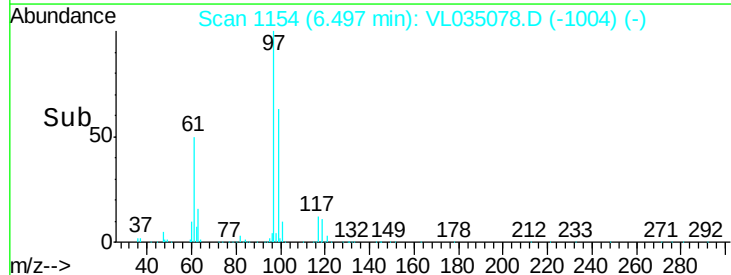
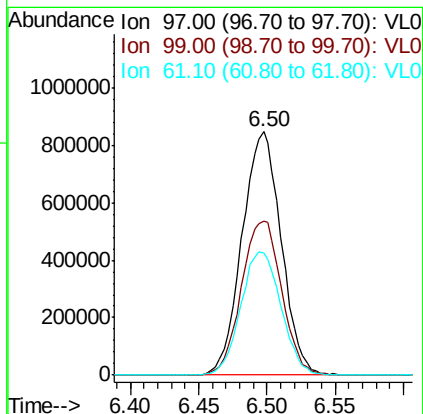
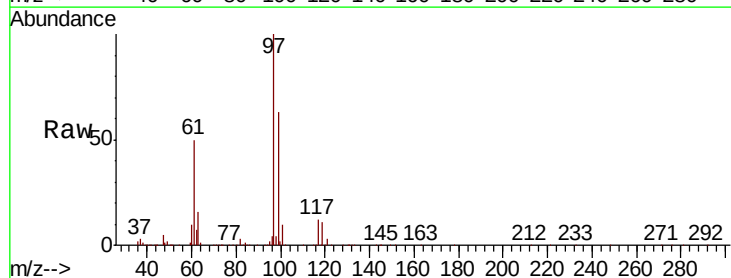
Tot Ion: 61 Resp: 1142004  
 Ion Ratio Lower Upper  
 61 100  
 96 62.7 53.0 79.6  
 98 40.9 32.2 48.2

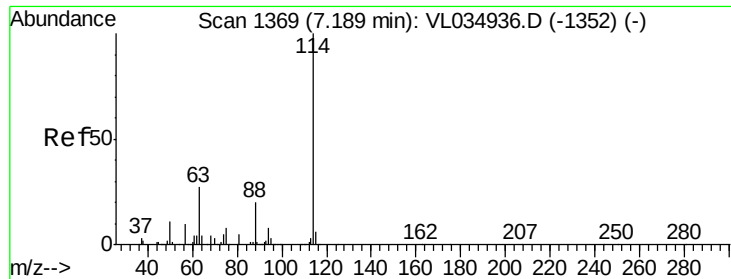


#32

1,1,1-Trichloroethane  
 Concen: 10.624 ppbv  
 RT: 6.50 min Scan# 1154  
 Delta R.T. -0.02 min  
 Lab File: VL035078.D  
 Acq: 22 May 2020 9:47

Tgt Ion: 97 Resp: 1686109  
 Ion Ratio Lower Upper  
 97 100  
 99 65.1 52.1 78.1  
 61 52.4 41.8 62.8

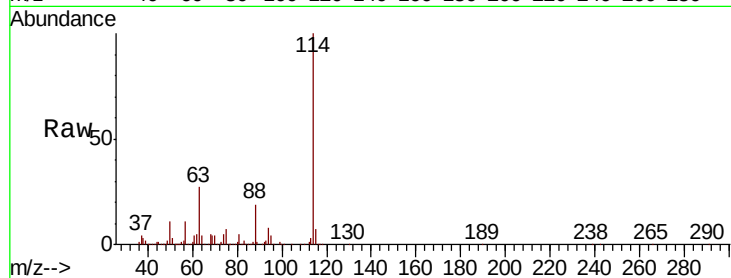




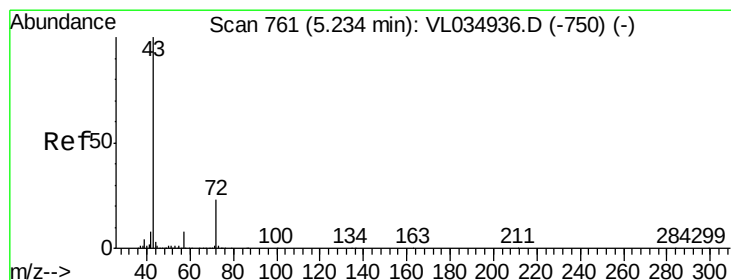
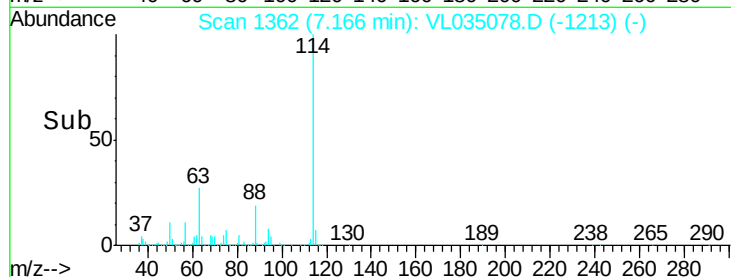
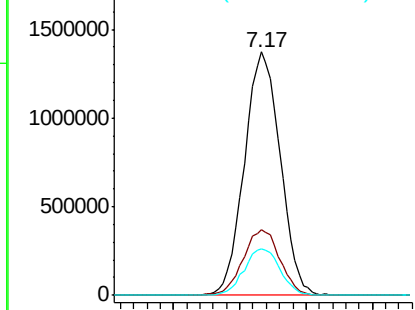
#33  
 1,4-Difluorobenzene  
 Concen: 10.000 ppbv  
 RT: 7.17 min Scan# 1362  
 Delta R.T. -0.02 min  
 Lab File: VL035078.D  
 Acq: 22 May 2020 9:47

Instrument :  
 MSVOA\_L  
 ClientSampleId :

Tot Ion:114 Resp: 2585220  
 Ion Ratio Lower Upper  
 114 100  
 63 28.1 22.2 33.4  
 88 19.2 15.5 23.3

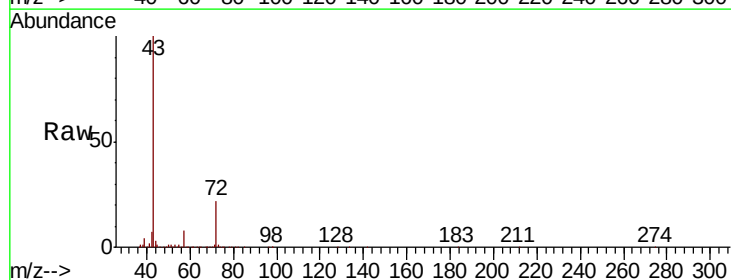


Abundance Ion 114.10 (113.80 to 114.80): V  
 Ion 63.10 (62.80 to 63.80): VL0  
 Ion 88.10 (87.80 to 88.80): VL0

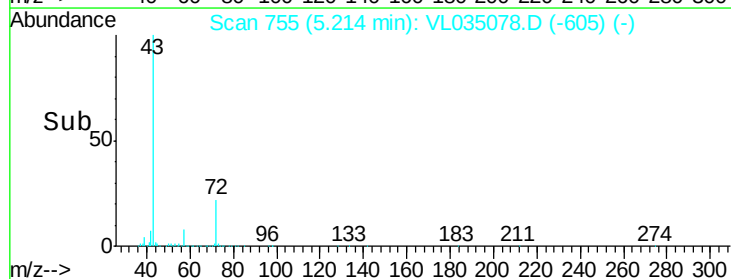
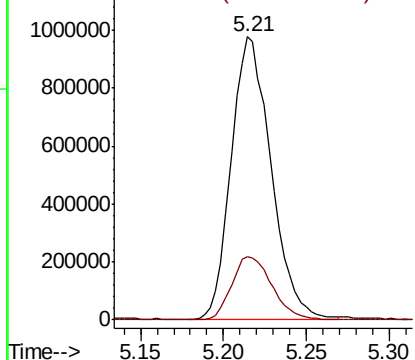


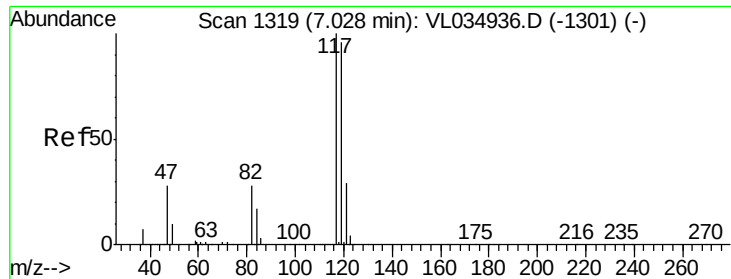
#34  
 2-Butanone  
 Concen: 10.154 ppbv  
 RT: 5.21 min Scan# 755  
 Delta R.T. -0.02 min  
 Lab File: VL035078.D  
 Acq: 22 May 2020 9:47

Tgt Ion: 43 Resp: 1631478  
 Ion Ratio Lower Upper  
 43 100  
 72 23.0 18.0 27.0



Abundance Ion 43.10 (42.80 to 43.80): VL0  
 Ion 72.10 (71.80 to 72.80): VL0





#35

Carbon Tetrachloride

Concen: 10.699 ppbv

RT: 7.01 min Scan# 1312

Delta R.T. -0.02 min

Lab File: VL035078.D

Acq: 22 May 2020 9:47

Instrument :

MSVOA\_L

ClientSampled :

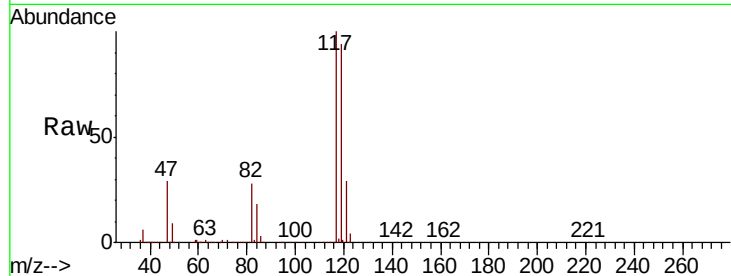
Tot Ion:117 Resp: 1745786

Ion Ratio Lower Upper

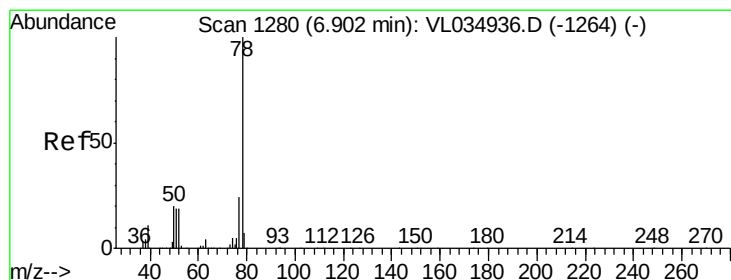
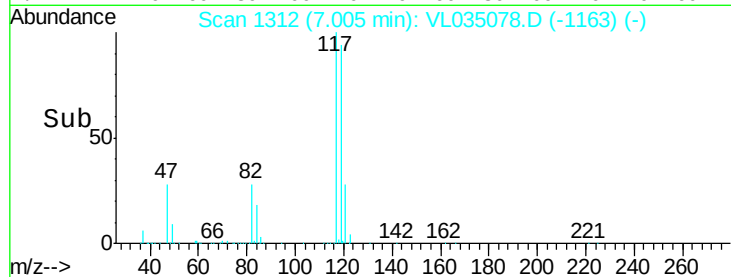
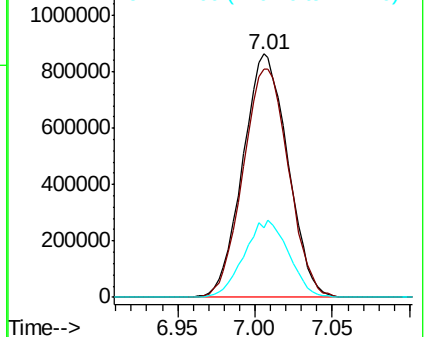
117 100

119 93.8 77.0 115.6

121 28.5 23.0 34.6



Abundance Ion 117.00 (116.70 to 117.70): V  
Ion 119.00 (118.70 to 119.70): V  
Ion 121.00 (120.70 to 121.70): V



#36

Benzene

Concen: 10.503 ppbv

RT: 6.88 min Scan# 1273

Delta R.T. -0.02 min

Lab File: VL035078.D

Acq: 22 May 2020 9:47

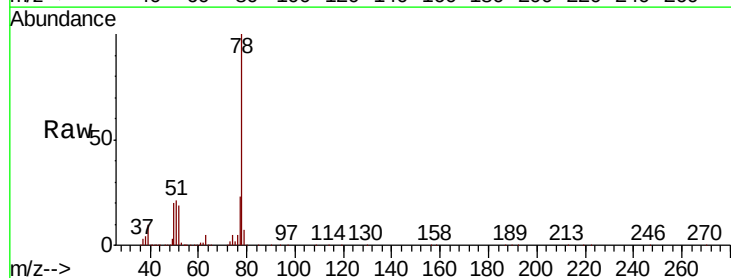
Tgt Ion: 78 Resp: 2238578

Ion Ratio Lower Upper

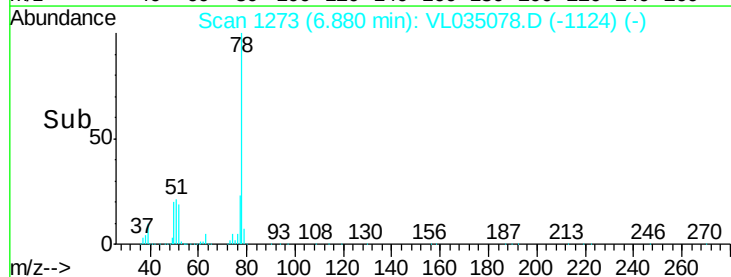
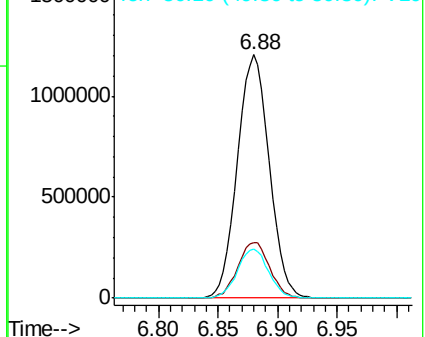
78 100

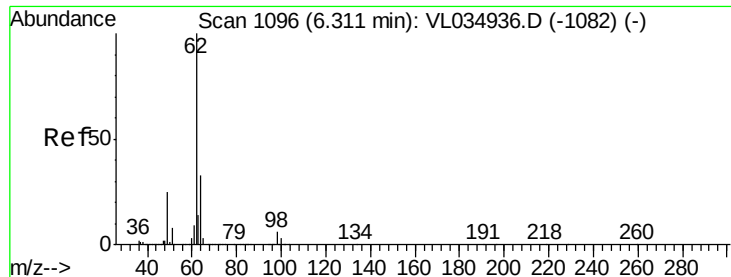
77 22.8 19.0 28.6

50 20.4 15.8 23.8



Abundance Ion 78.10 (77.80 to 78.80): VL0  
Ion 77.10 (76.80 to 77.80): VL0  
Ion 50.10 (49.80 to 50.80): VL0

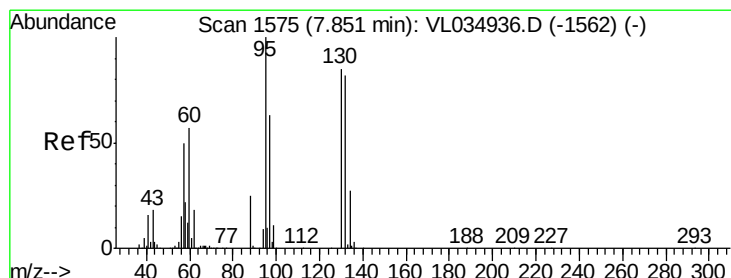
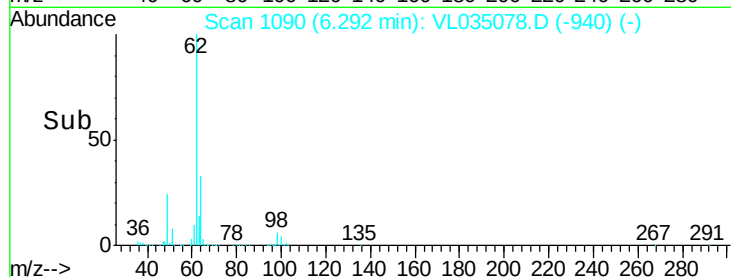
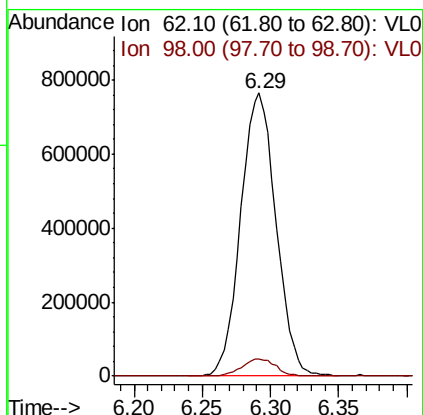
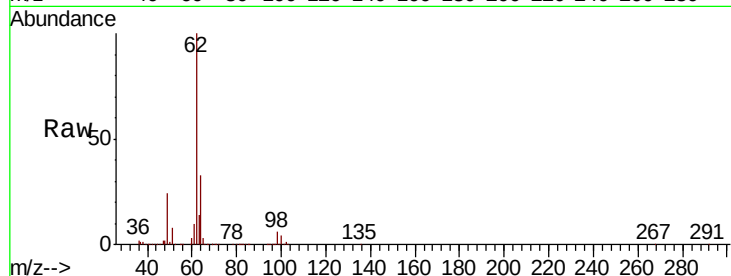




#37  
 1,2-Dichloroethane  
 Concen: 10.467 ppbv  
 RT: 6.29 min Scan# 1090  
 Delta R.T. -0.02 min  
 Lab File: VL035078.D  
 Acq: 22 May 2020 9:47

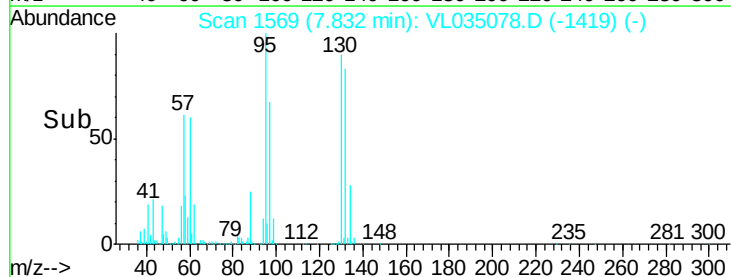
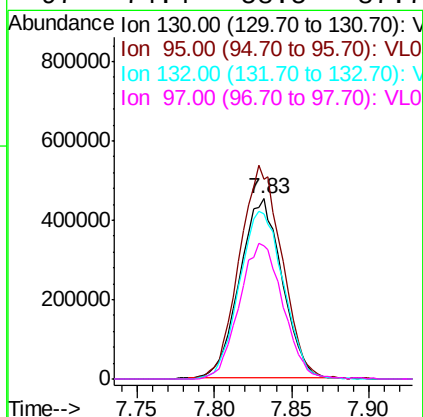
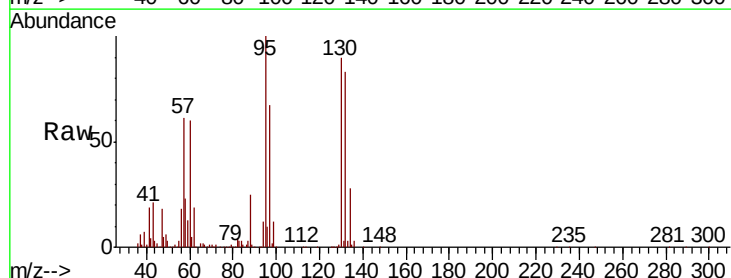
Instrument :  
 MSVOA\_L  
 ClientSampleId :

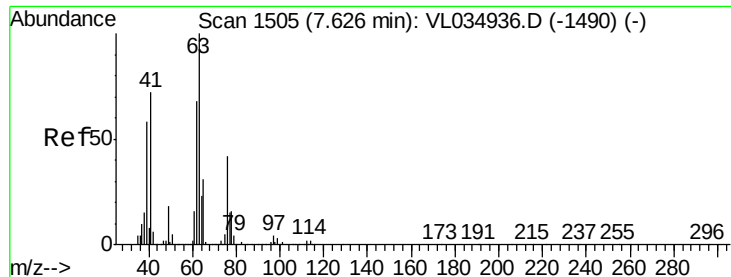
Tot Ion: 62 Resp: 1376120  
 Ion Ratio Lower Upper  
 62 100  
 98 6.0 4.8 7.2



#38  
 Trichloroethene  
 Concen: 10.437 ppbv  
 RT: 7.83 min Scan# 1569  
 Delta R.T. -0.02 min  
 Lab File: VL035078.D  
 Acq: 22 May 2020 9:47

Tgt Ion: 130 Resp: 861767  
 Ion Ratio Lower Upper  
 130 100  
 95 111.0 93.4 140.0  
 132 92.3 76.4 114.6  
 97 74.4 58.5 87.7





#39

1,2-Dichloropropane

Concen: 10.158 ppbv

RT: 7.61 min Scan# 1499

Delta R.T. -0.02 min

Lab File: VL035078.D

Acq: 22 May 2020 9:47

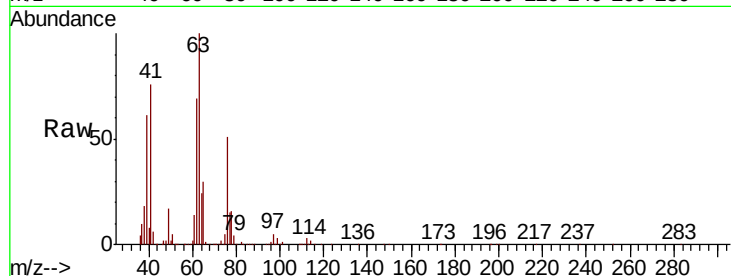
Instrument :

MSVOA\_L

ClientSampleId :

Tot Ion: 63 Resp: 867966

| Ion | Ratio | Lower | Upper |
|-----|-------|-------|-------|
| 63  | 100   |       |       |
| 41  | 76.5  | 57.8  | 86.8  |
| 62  | 69.4  | 54.2  | 81.2  |

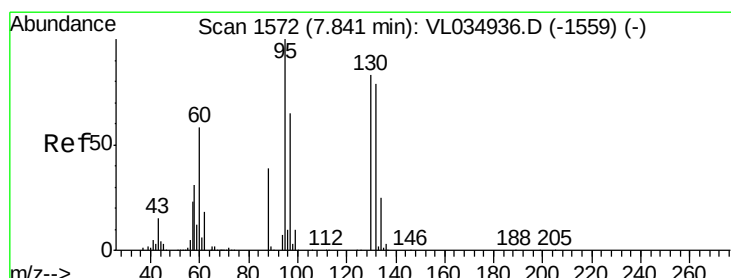
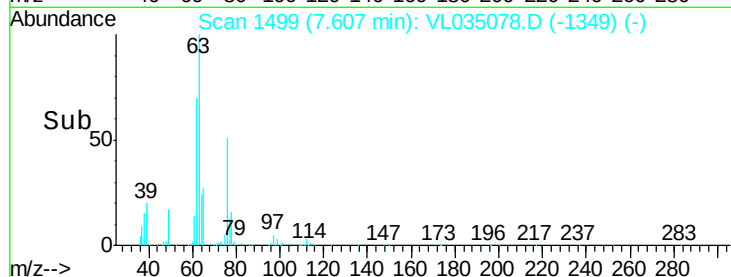
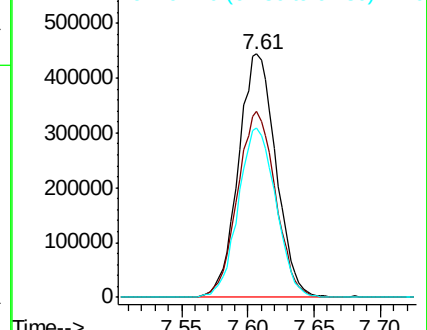


Abundance

Ion 63.10 (62.80 to 63.80): VL0

Ion 41.10 (40.80 to 41.80): VL0

Ion 62.10 (61.80 to 62.80): VL0



#40

1,4-Dioxane

Concen: 10.035 ppbv

RT: 7.82 min Scan# 1565

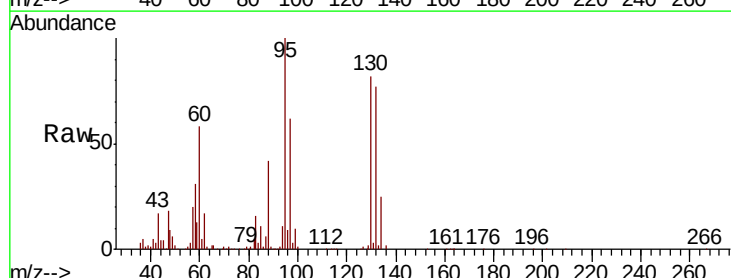
Delta R.T. -0.02 min

Lab File: VL035078.D

Acq: 22 May 2020 9:47

Tgt Ion: 88 Resp: 348501

| Ion | Ratio  | Lower | Upper  |
|-----|--------|-------|--------|
| 88  | 100    |       |        |
| 58  | 130.7  | 105.1 | 157.7  |
| 43  | 258.4  | 202.6 | 303.8  |
| 57  | 1120.5 | 869.4 | 1304.0 |



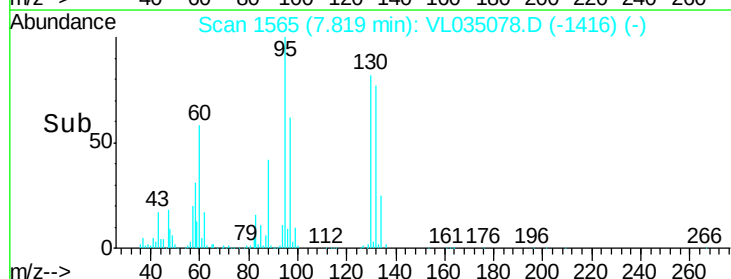
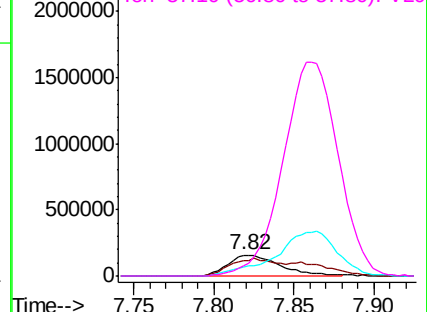
Abundance

Ion 88.10 (87.80 to 88.80): VL0

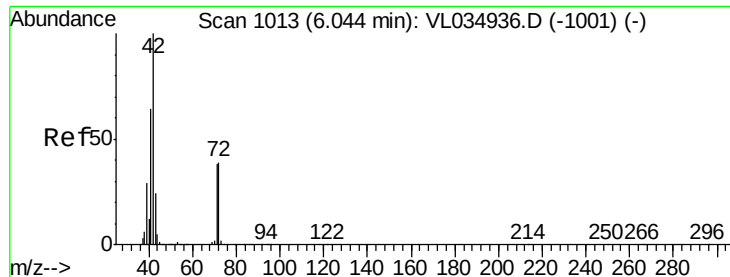
Ion 58.10 (57.80 to 58.80): VL0

Ion 43.10 (42.80 to 43.80): VL0

Ion 57.10 (56.80 to 57.80): VL0



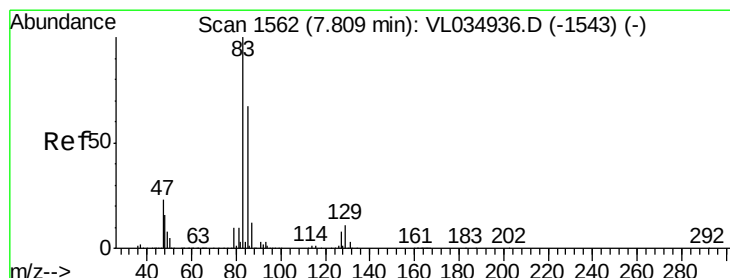
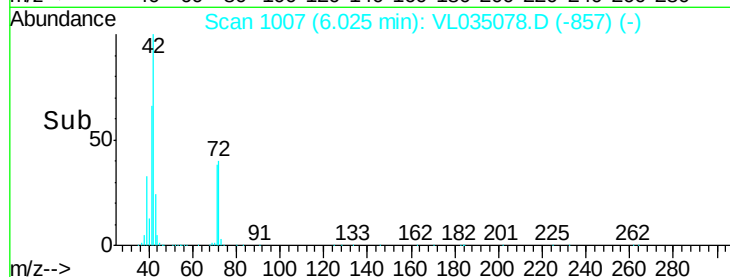
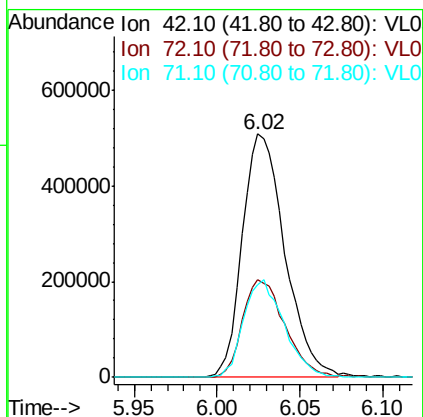
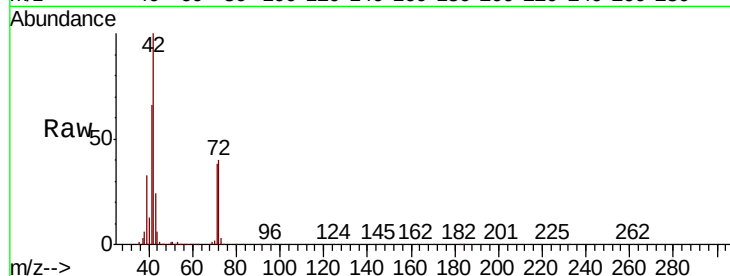




#41  
Tetrahydrofuran  
Concen: 10.718 ppbv  
RT: 6.02 min Scan# 1007  
Delta R.T. -0.02 min  
Lab File: VL035078.D  
Acq: 22 May 2020 9:47

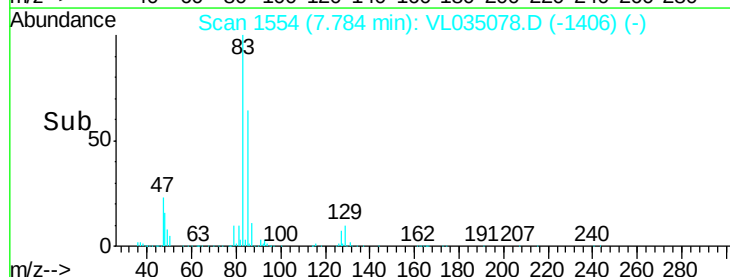
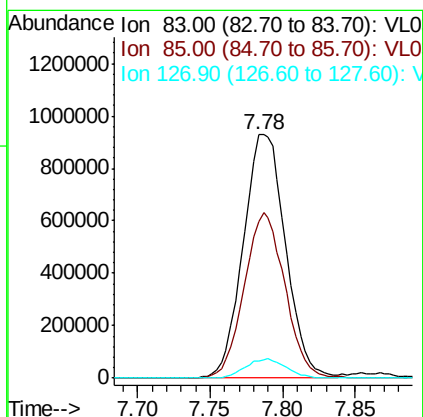
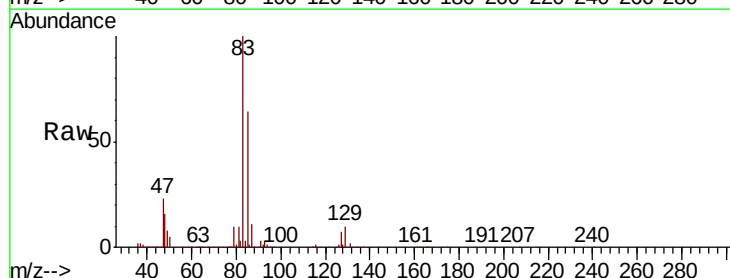
Instrument :  
MSVOA\_L  
ClientSampleId :

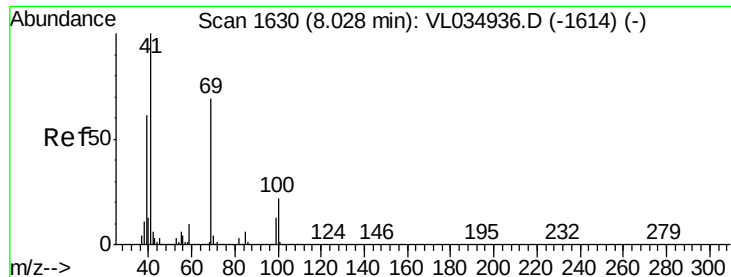
| Tot Ion | Ratio | Lower | Upper |
|---------|-------|-------|-------|
| 42      | 100   |       |       |
| 72      | 40.4  | 31.4  | 47.0  |
| 71      | 38.6  | 29.8  | 44.8  |



#42  
Bromodichloromethane  
Concen: 10.652 ppbv  
RT: 7.78 min Scan# 1554  
Delta R.T. -0.03 min  
Lab File: VL035078.D  
Acq: 22 May 2020 9:47

| Tgt Ion | Ratio | Lower | Upper |
|---------|-------|-------|-------|
| 83      | 100   |       |       |
| 85      | 64.1  | 53.4  | 80.0  |
| 127     | 7.1   | 6.1   | 9.1   |

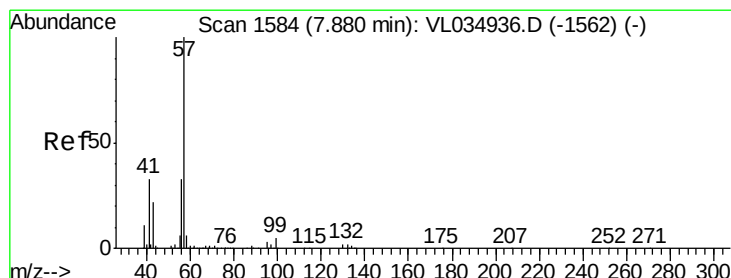
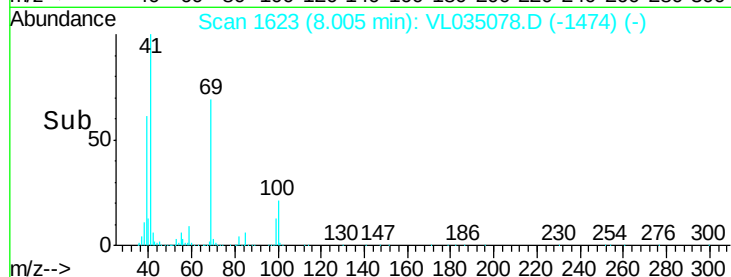
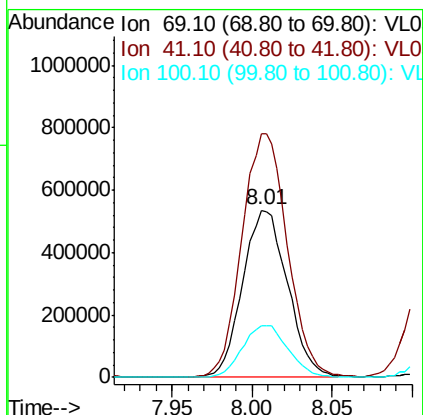
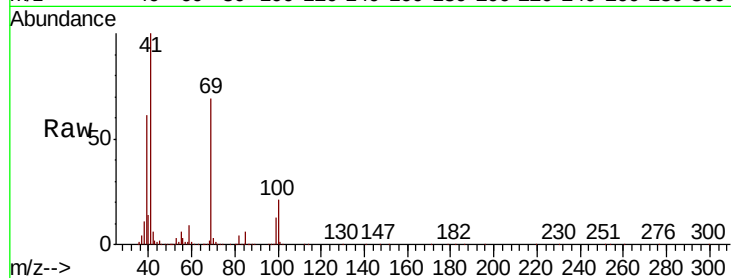




#43  
Methyl Methacrylate  
Concen: 11.423 ppbv  
RT: 8.01 min Scan# 1623  
Delta R.T. -0.02 min  
Lab File: VL035078.D  
Acq: 22 May 2020 9:47

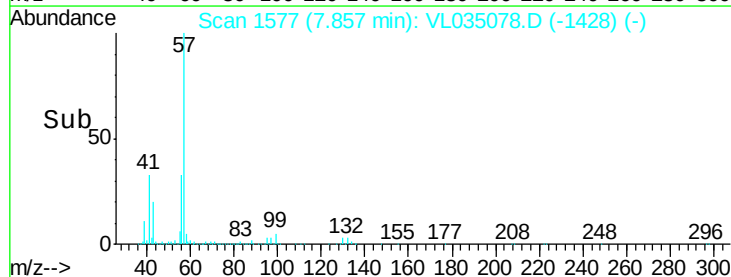
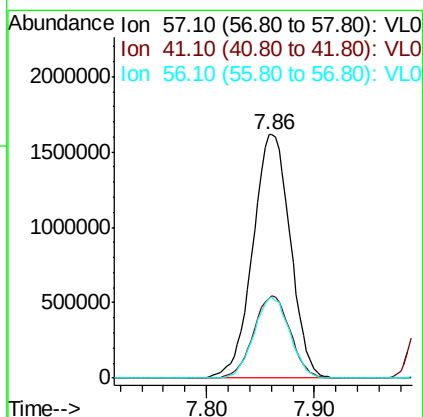
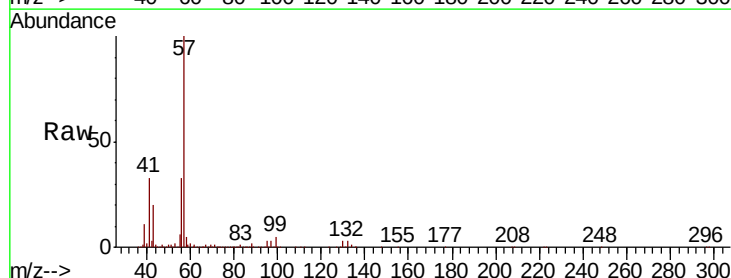
Instrument :  
MSVOA\_L  
ClientSampled :

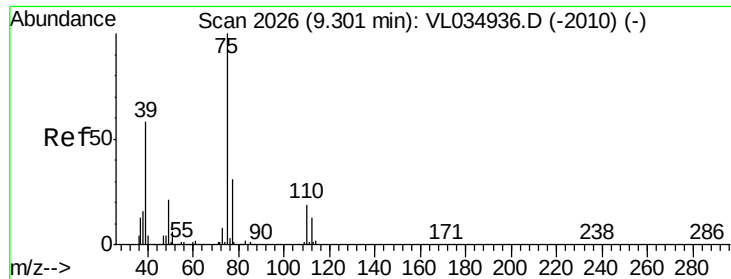
Tot Ion: 69 Resp: 1028045  
Ion Ratio Lower Upper  
69 100  
41 148.0 119.8 179.6  
100 31.5 25.0 37.6



#44  
2,2,4-Trimethylpentane  
Concen: 10.286 ppbv  
RT: 7.86 min Scan# 1577  
Delta R.T. -0.02 min  
Lab File: VL035078.D  
Acq: 22 May 2020 9:47

Tgt Ion: 57 Resp: 3897906  
Ion Ratio Lower Upper  
57 100  
41 33.0 26.4 39.6  
56 31.5 25.5 38.3





#45

t-1,3-Dichloropropene

Concen: 12.514 ppbv

RT: 9.28 min Scan# 2020

Delta R.T. -0.02 min

Lab File: VL035078.D

Acq: 22 May 2020 9:47

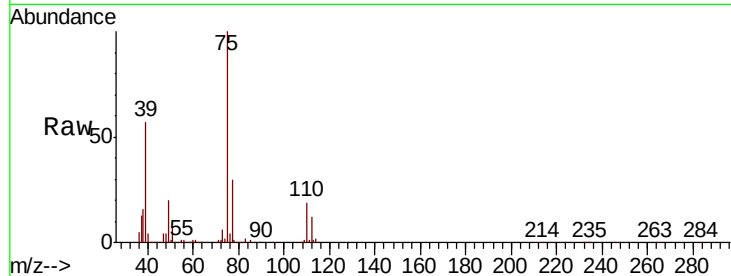
Instrument :  
MSVOA\_L  
ClientSampleId :

Tot Ion: 75 Resp: 1136598

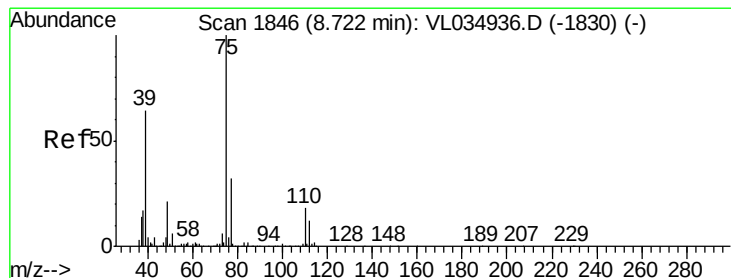
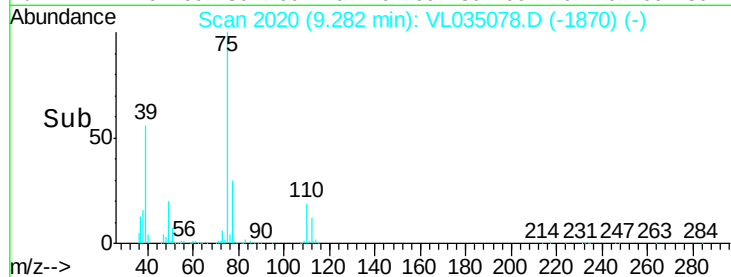
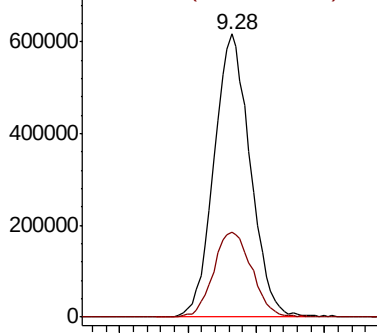
Ion Ratio Lower Upper

75 100

77 30.0 24.9 37.3



Abundance Ion 75.10 (74.80 to 75.80): VL0  
Ion 77.10 (76.80 to 77.80): VL0



#46

cis-1,3-Dichloropropene

Concen: 12.085 ppbv

RT: 8.71 min Scan# 1841

Delta R.T. -0.02 min

Lab File: VL035078.D

Acq: 22 May 2020 9:47

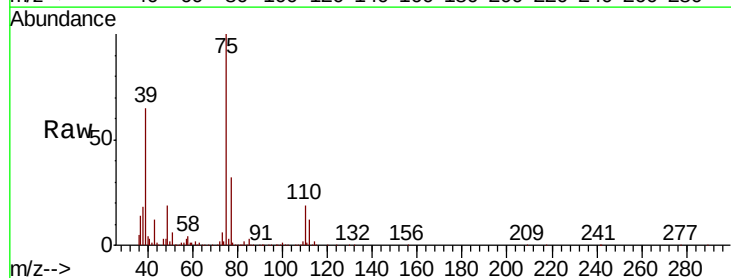
Tgt Ion: 75 Resp: 1347632

Ion Ratio Lower Upper

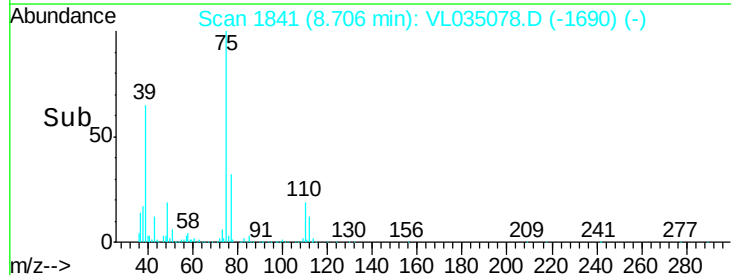
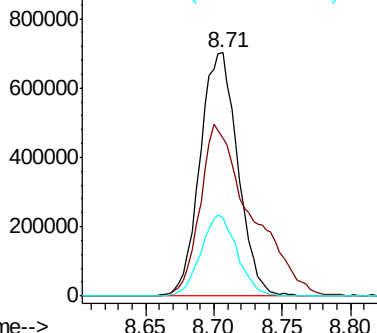
75 100

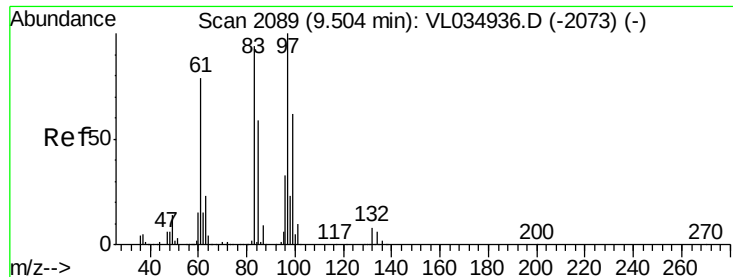
39 64.7 51.5 77.3

77 32.0 25.5 38.3



Abundance Ion 75.00 (74.70 to 75.70): VL0  
Ion 39.00 (38.70 to 39.70): VL0  
Ion 77.00 (76.70 to 77.70): VL0

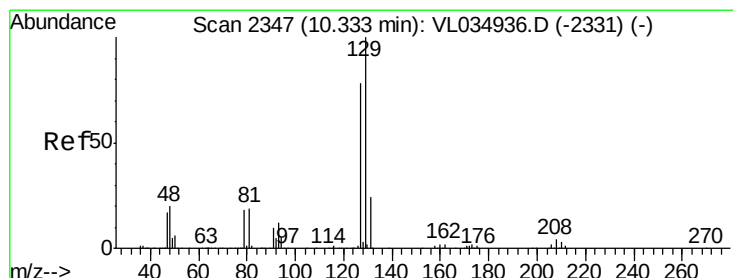
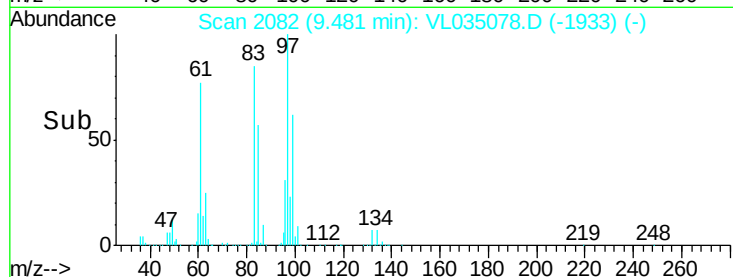
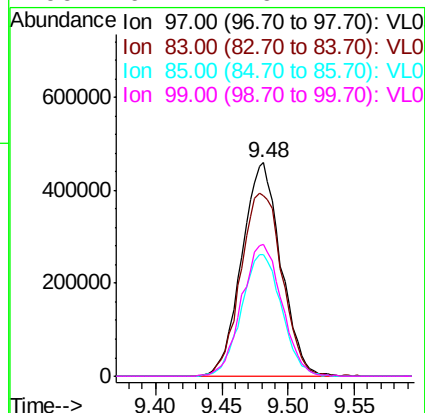
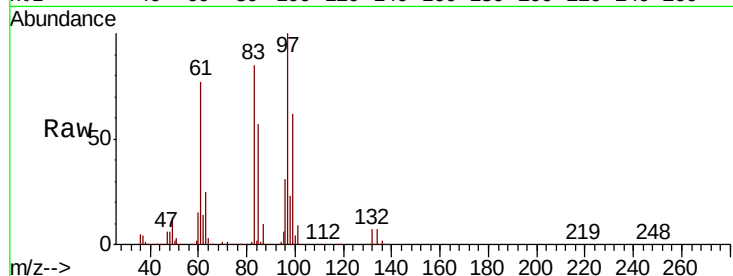




#47  
 1,1,2-Trichloroethane  
 Concen: 10.467 ppbv  
 RT: 9.48 min Scan# 2082  
 Delta R.T. -0.02 min  
 Lab File: VL035078.D  
 Acq: 22 May 2020 9:47

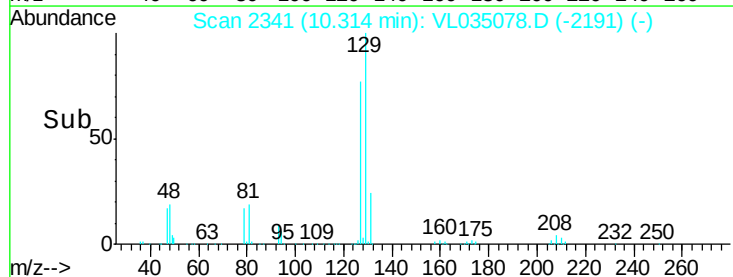
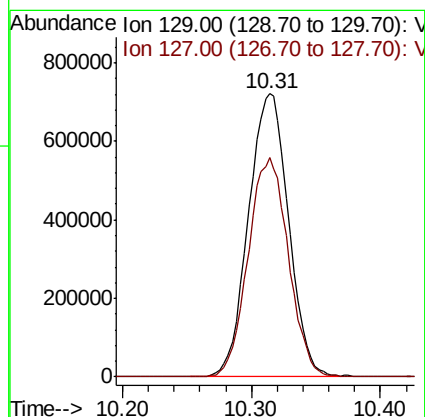
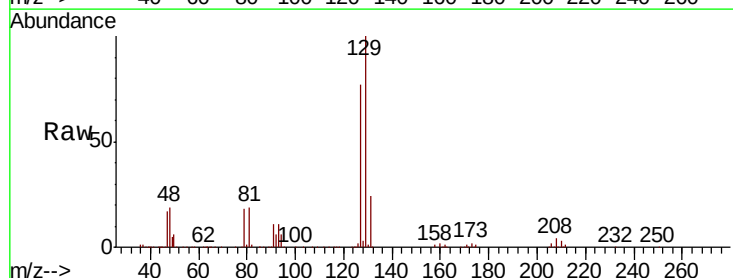
Instrument :  
 MSVOA\_L  
 ClientSampleId :

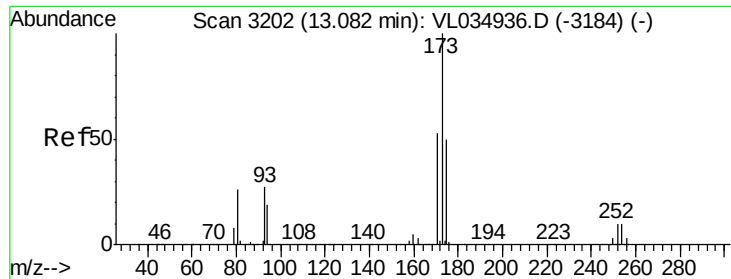
Tot Ion: 97 Resp: 943797  
 Ion Ratio Lower Upper  
 97 100  
 83 84.3 75.6 113.4  
 85 56.9 47.0 70.6  
 99 61.7 49.4 74.2



#48  
 Dibromochloromethane  
 Concen: 11.257 ppbv  
 RT: 10.31 min Scan# 2341  
 Delta R.T. -0.02 min  
 Lab File: VL035078.D  
 Acq: 22 May 2020 9:47

Tgt Ion: 129 Resp: 1560824  
 Ion Ratio Lower Upper  
 129 100  
 127 77.9 39.1 117.2





#49

Bromoform

Concen: 11.297 ppbv

RT: 13.06 min Scan# 3195

Delta R.T. -0.02 min

Lab File: VL035078.D

Acq: 22 May 2020 9:47

Instrument :

MSVOA\_L

ClientSampleId :

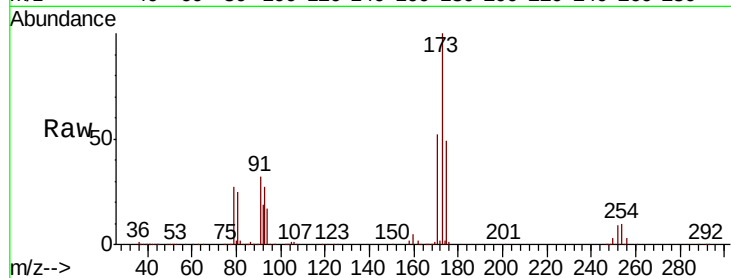
Tot Ion:173 Resp: 1347822

Ion Ratio Lower Upper

173 100

175 49.1 39.0 58.6

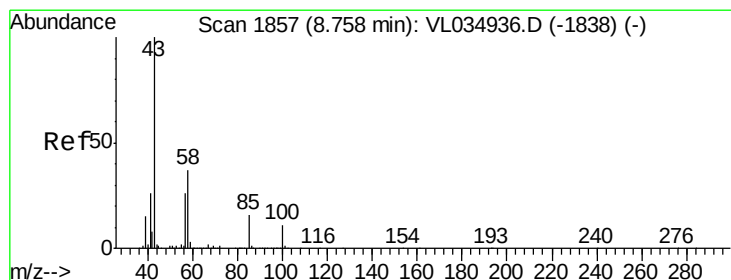
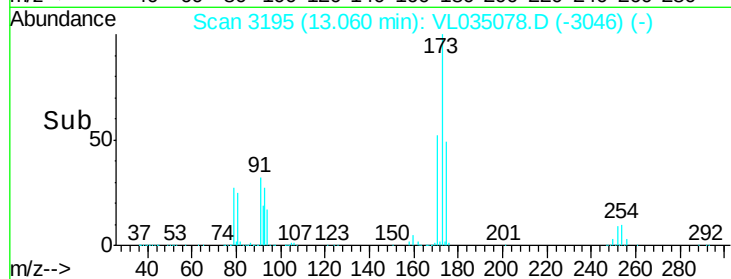
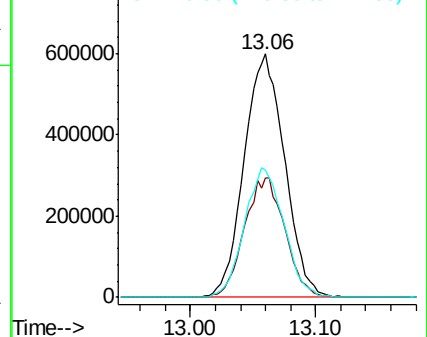
171 51.8 41.4 62.2



Abundance Ion 172.90 (172.60 to 173.60): V

Ion 174.90 (174.60 to 175.60): V

Ion 170.90 (170.60 to 171.60): V



#50

4-Methyl-2-Pentanone

Concen: 10.677 ppbv

RT: 8.74 min Scan# 1850

Delta R.T. -0.02 min

Lab File: VL035078.D

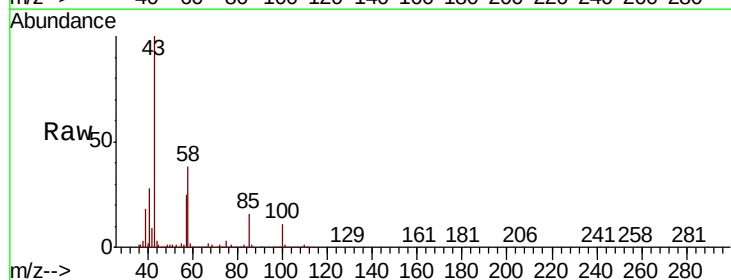
Acq: 22 May 2020 9:47

Tgt Ion: 43 Resp: 2446303

Ion Ratio Lower Upper

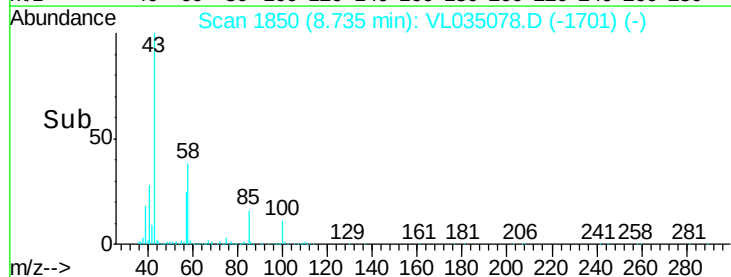
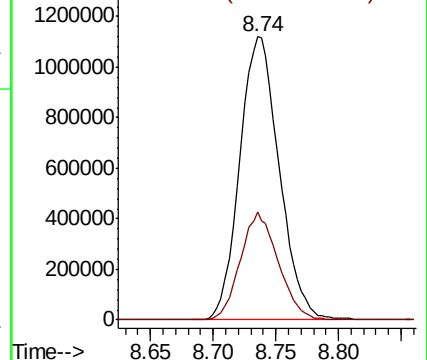
43 100

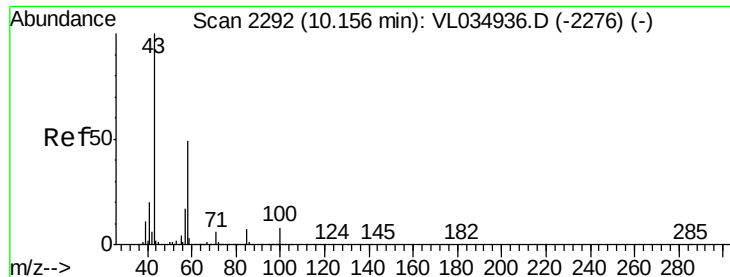
58 36.7 29.1 43.7



Abundance Ion 43.10 (42.80 to 43.80): VL0

Ion 58.10 (57.80 to 58.80): VL0

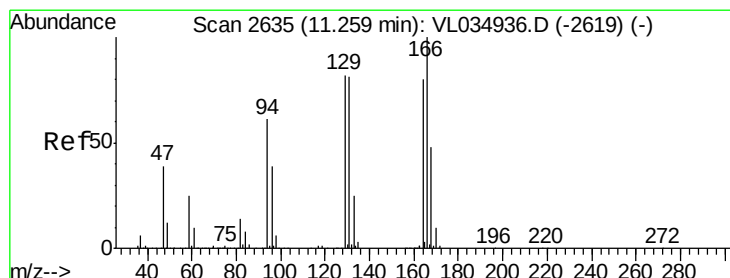
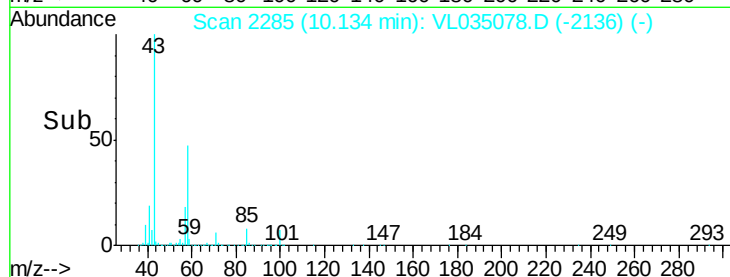
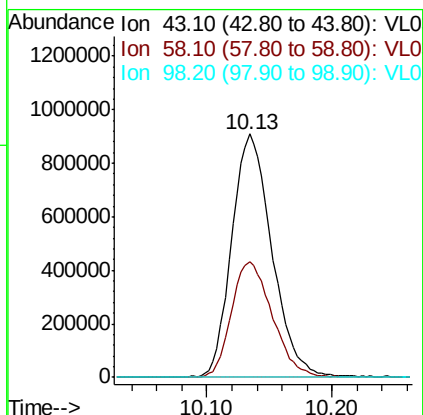
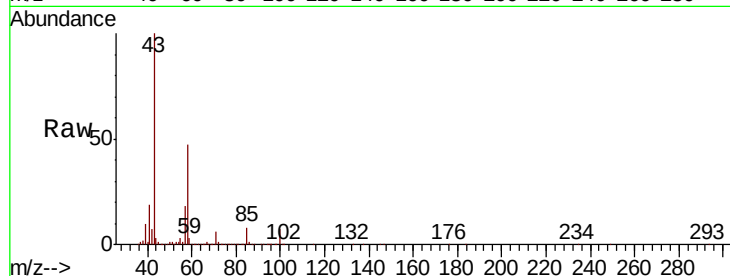




#51  
2-Hexanone  
Concen: 11.266 ppbv  
RT: 10.13 min Scan# 2285  
Delta R.T. -0.02 min  
Lab File: VL035078.D  
Acq: 22 May 2020 9:47

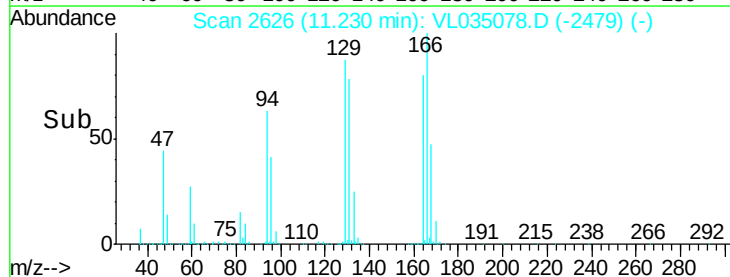
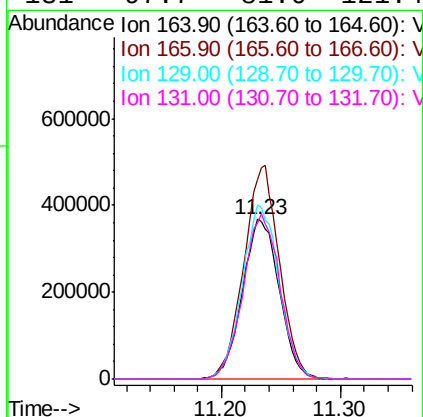
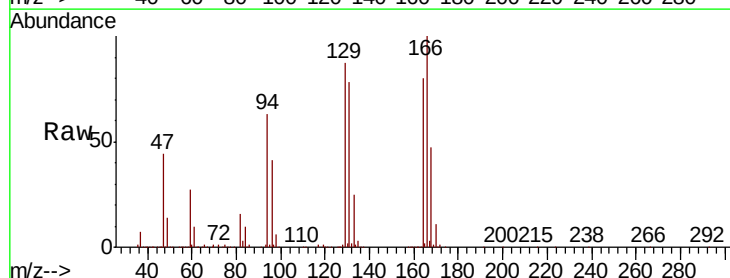
Instrument :  
MSVOA\_L  
ClientSampleId :

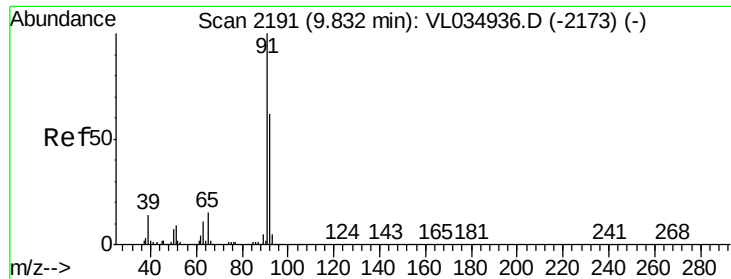
Tot Ion: 43 Resp: 2018973  
Ion Ratio Lower Upper  
43 100  
58 48.6 39.1 58.7  
98 0.4 0.3 0.5



#52  
Tetrachloroethene  
Concen: 10.402 ppbv  
RT: 11.23 min Scan# 2626  
Delta R.T. -0.03 min  
Lab File: VL035078.D  
Acq: 22 May 2020 9:47

Tgt Ion: 164 Resp: 788371  
Ion Ratio Lower Upper  
164 100  
166 124.7 100.7 151.1  
129 109.0 83.0 124.4  
131 97.7 81.0 121.4





#53

Toluene

Concen: 11.525 ppbv

RT: 9.81 min Scan# 2184

Delta R.T. -0.02 min

Lab File: VL035078.D

Acq: 22 May 2020 9:47

Instrument :

MSVOA\_L

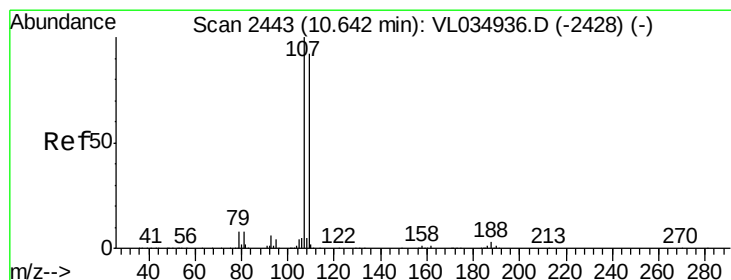
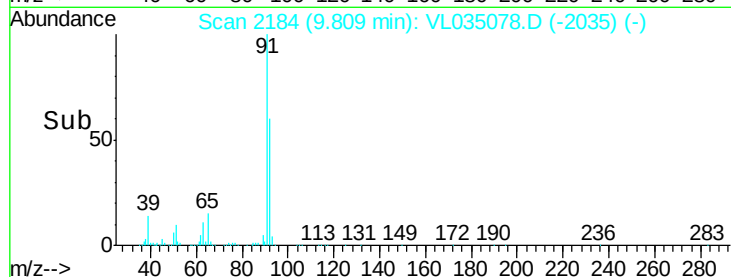
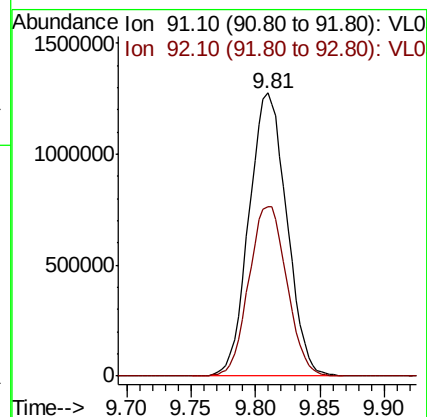
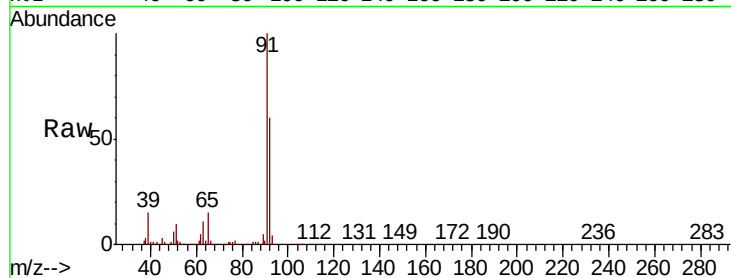
ClientSampleId :

Tot Ion: 91 Resp: 2604031

Ion Ratio Lower Upper

91 100

92 60.5 48.6 73.0



#54

1,2-Dibromoethane

Concen: 10.724 ppbv

RT: 10.62 min Scan# 2436

Delta R.T. -0.02 min

Lab File: VL035078.D

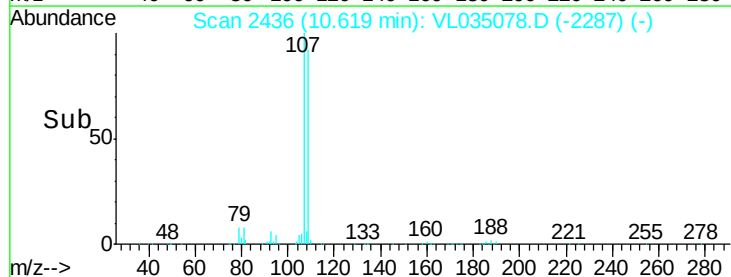
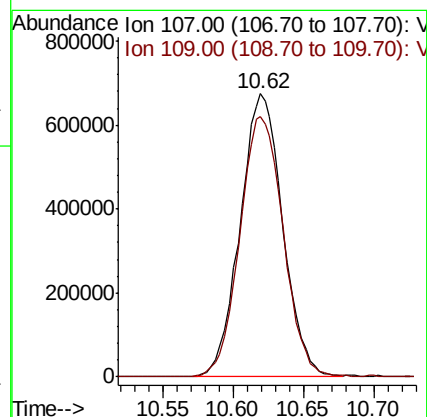
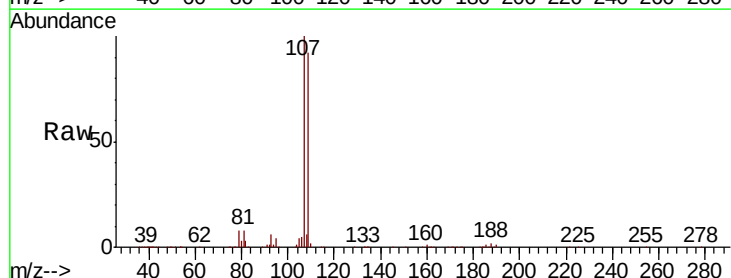
Acq: 22 May 2020 9:47

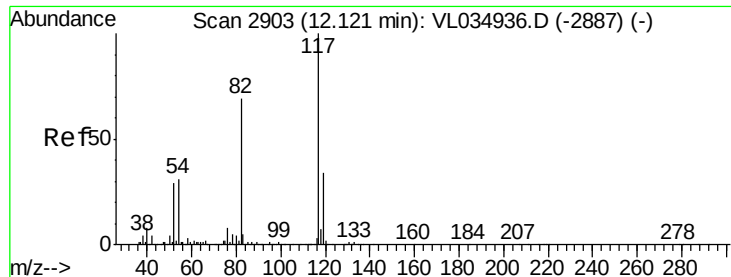
Tgt Ion: 107 Resp: 1419979

Ion Ratio Lower Upper

107 100

109 92.0 73.2 109.8





#55

Chlorobenzene-d5

Concen: 10.000 ppbv

RT: 12.10 min Scan# 2897

Delta R.T. -0.02 min

Lab File: VL035078.D

Acq: 22 May 2020 9:47

Instrument :

MSVOA\_L

ClientSampled :

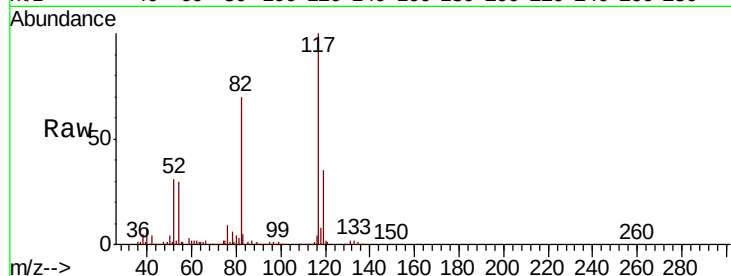
Tot Ion:117 Resp: 3159900

Ion Ratio Lower Upper

117 100

82 55.1 53.1 79.7

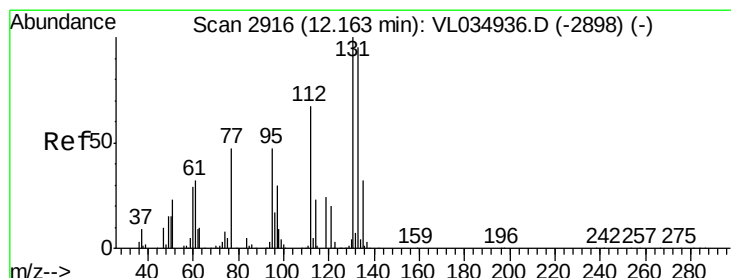
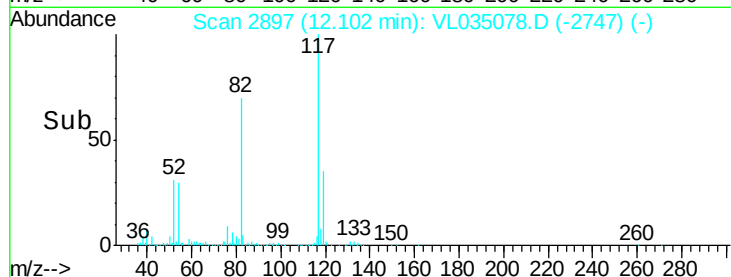
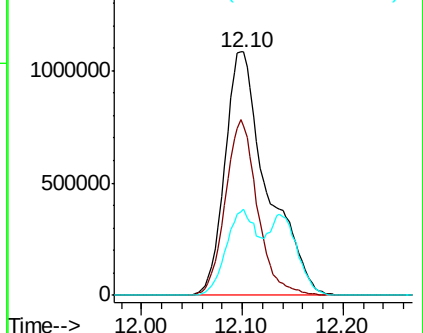
119 23.3 26.7 40.1#



Abundance Ion 117.10 (116.80 to 117.80): V

Ion 82.10 (81.80 to 82.80): VL0

Ion 119.10 (118.80 to 119.80): V



#56

1,1,1,2-Tetrachloroethane

Concen: 8.048 ppbv

RT: 12.14 min Scan# 2908

Delta R.T. -0.03 min

Lab File: VL035078.D

Acq: 22 May 2020 9:47

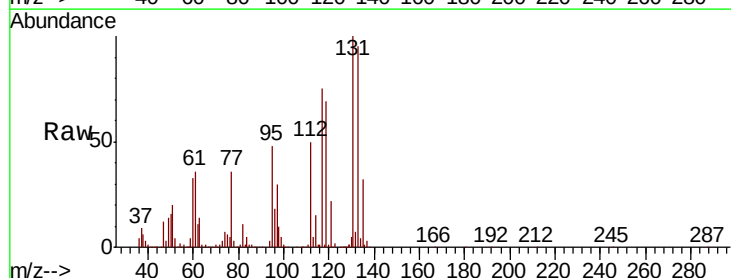
Tgt Ion:131 Resp: 1146811

Ion Ratio Lower Upper

131 100

133 96.9 77.7 116.5

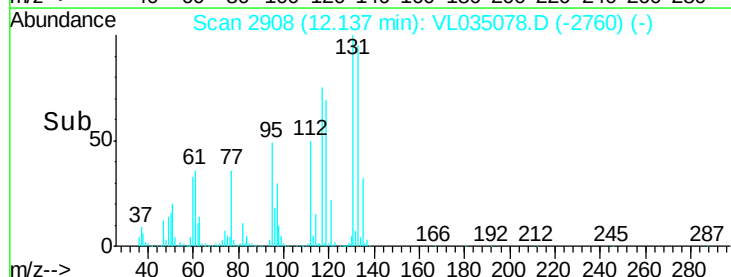
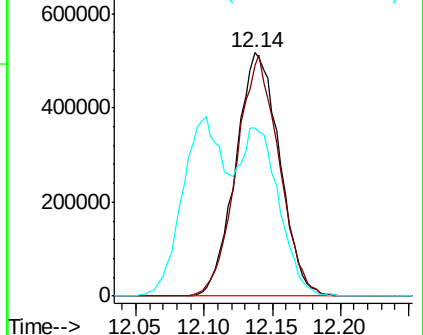
119 66.4 49.8 74.6



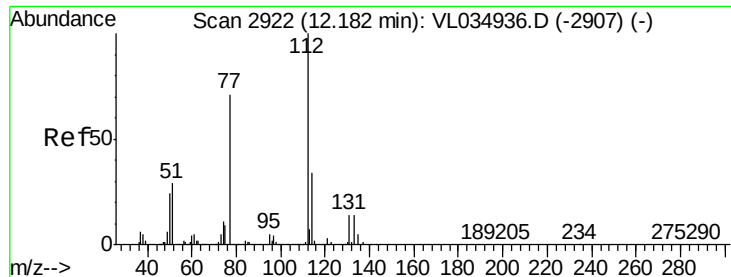
Abundance Ion 131.00 (130.70 to 131.70): V

Ion 133.00 (132.70 to 133.70): V

Ion 119.00 (118.70 to 119.70): V







#57

Chlorobenzene

Concen: 7.869 ppbv

RT: 12.16 min Scan# 2915

Delta R.T. -0.02 min

Lab File: VL035078.D

Acq: 22 May 2020 9:47

Instrument :

MSVOA\_L

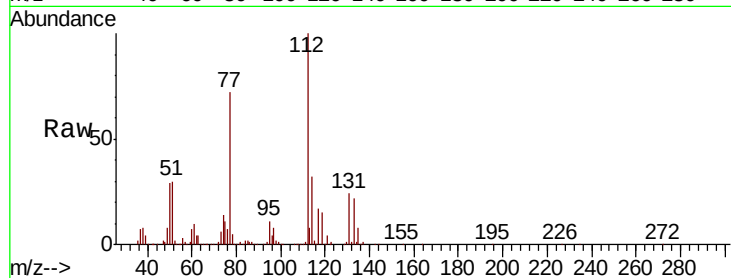
ClientSampleId :

Tot Ion:112 Resp: 1969929

| Ion | Ratio | Lower | Upper |
|-----|-------|-------|-------|
| 112 | 100   |       |       |
| 77  | 71.7  | 57.0  | 85.6  |
| 114 | 31.9  | 30.8  | 37.6  |

77 71.7 57.0 85.6

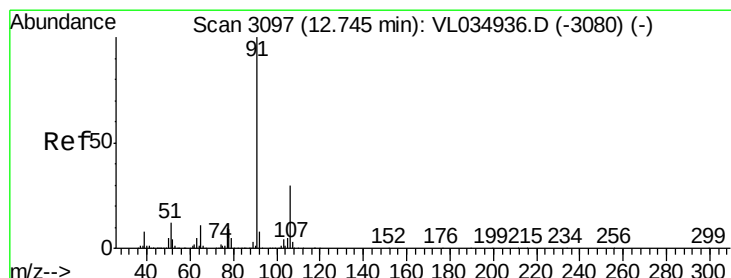
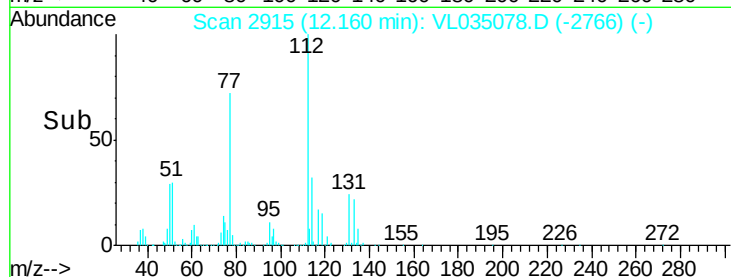
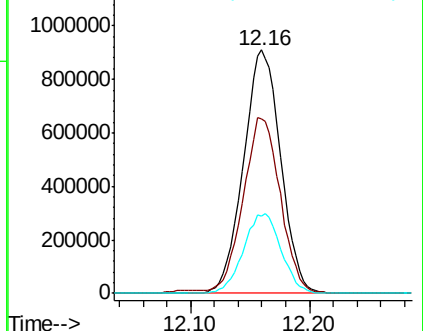
114 31.9 30.8 37.6



Abundance Ion 112.10 (111.80 to 112.80): V

Ion 77.10 (76.80 to 77.80): VL0

Ion 114.10 (113.80 to 114.80): V



#58

Ethyl Benzene

Concen: 8.913 ppbv

RT: 12.72 min Scan# 3090

Delta R.T. -0.02 min

Lab File: VL035078.D

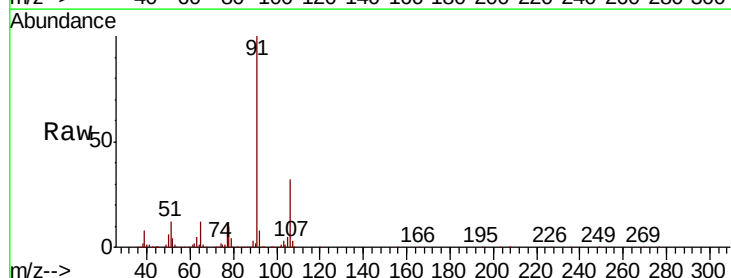
Acq: 22 May 2020 9:47

Tgt Ion: 91 Resp: 3482557

| Ion | Ratio | Lower | Upper |
|-----|-------|-------|-------|
| 91  | 100   |       |       |
| 106 | 31.6  | 24.2  | 36.4  |

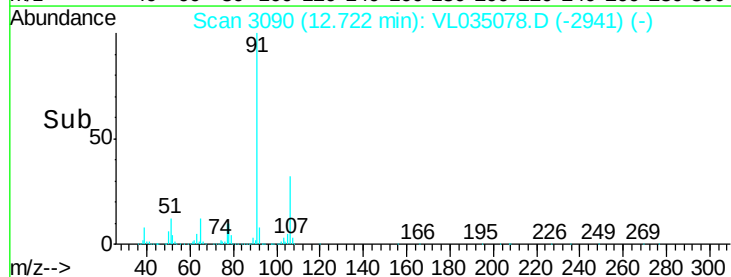
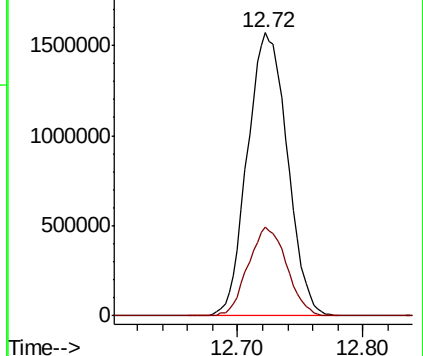
91 100

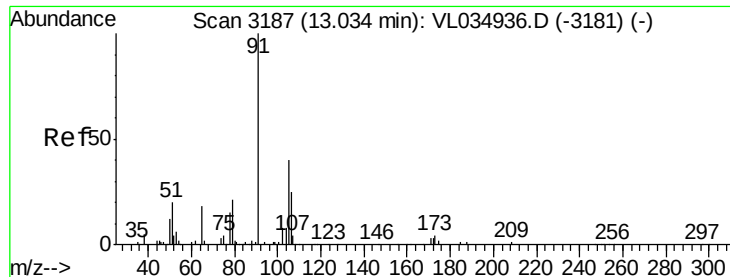
106 31.6 24.2 36.4



Abundance Ion 91.10 (90.80 to 91.80): VL0

Ion 106.10 (105.80 to 106.80): V





#59

m/p-Xylene

Concen: 6.300 ppbv

RT: 13.01 min Scan# 3179

Delta R.T. -0.03 min

Lab File: VL035078.D

Acq: 22 May 2020 9:47

Instrument :

MSVOA\_L

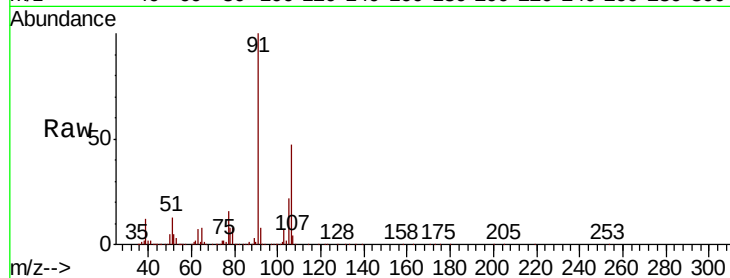
ClientSampleId :

Tot Ion: 91 Resp: 2165857

Ion Ratio Lower Upper

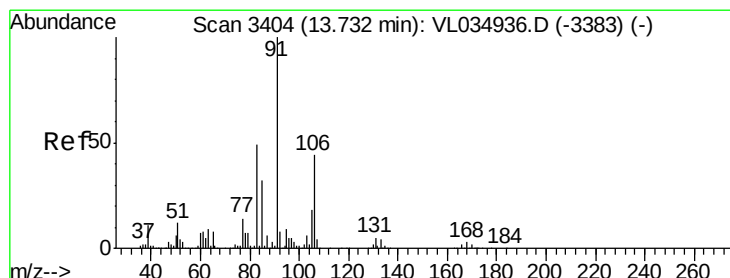
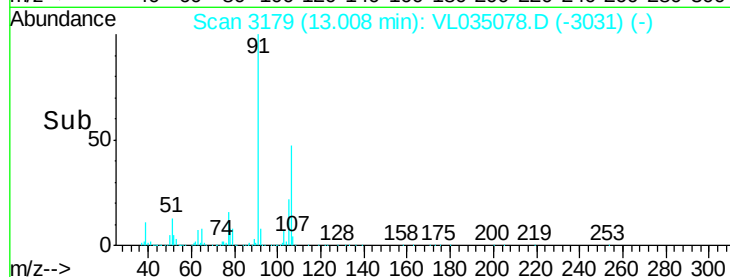
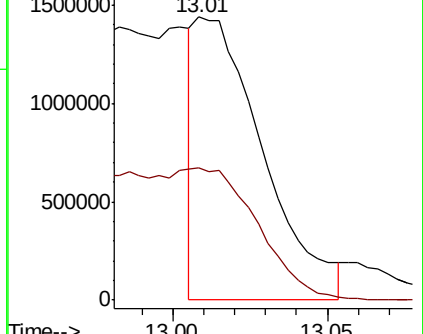
91 100

106 121.2 66.0 99.0#



Abundance Ion 91.10 (90.80 to 91.80): VL0

Ion 106.10 (105.80 to 106.80): V



#60

o-Xylene

Concen: 8.488 ppbv

RT: 13.71 min Scan# 3398

Delta R.T. -0.02 min

Lab File: VL035078.D

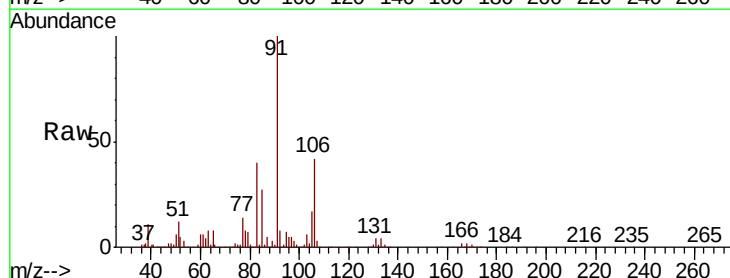
Acq: 22 May 2020 9:47

Tgt Ion: 91 Resp: 2879427

Ion Ratio Lower Upper

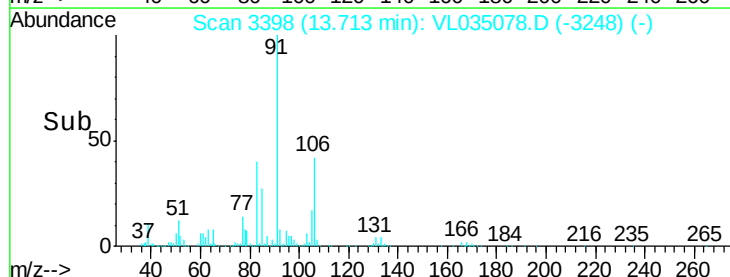
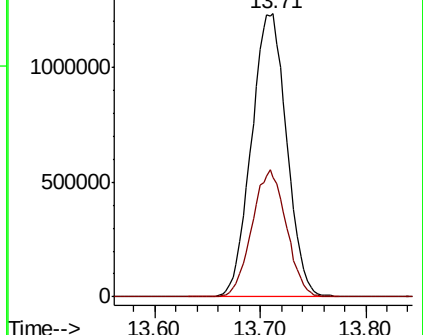
91 100

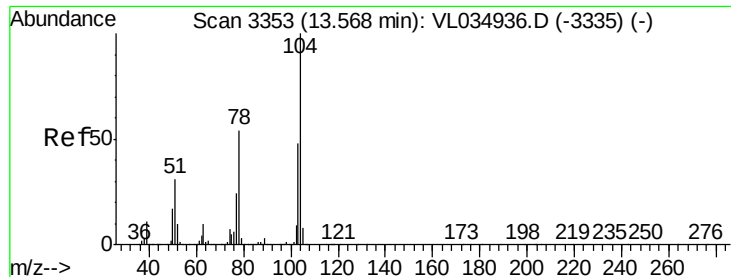
106 43.6 21.9 65.5



Abundance Ion 91.10 (90.80 to 91.80): VL0

Ion 106.10 (105.80 to 106.80): V





#61

Stvrene

Concen: 9.545 ppbv

RT: 13.54 min Scan# 3345

Delta R.T. -0.03 min

Lab File: VL035078.D

Acq: 22 May 2020 9:47

Instrument :

MSVOA\_L

ClientSampleId :

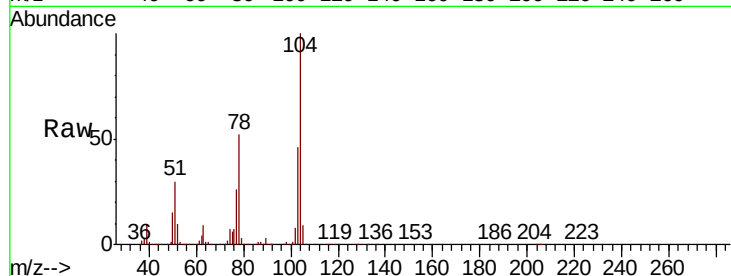
Tot Ion:104 Resp: 2049263

Ion Ratio Lower Upper

104 100

78 54.3 43.7 65.5

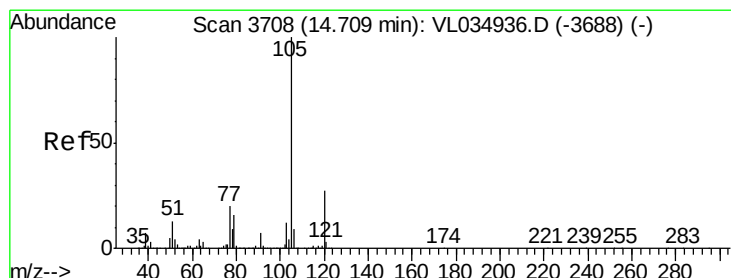
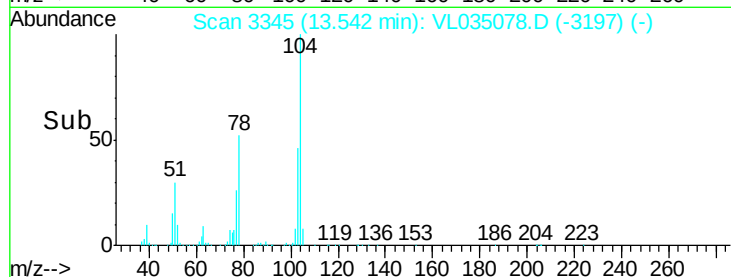
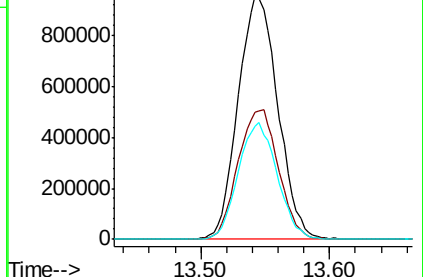
103 47.0 38.8 58.2



Abundance Ion 104.10 (103.80 to 104.80): V

Ion 78.10 (77.80 to 78.80): VL0

Ion 103.10 (102.80 to 103.80): V



#62

Isopropylbenzene

Concen: 8.344 ppbv

RT: 14.69 min Scan# 3701

Delta R.T. -0.02 min

Lab File: VL035078.D

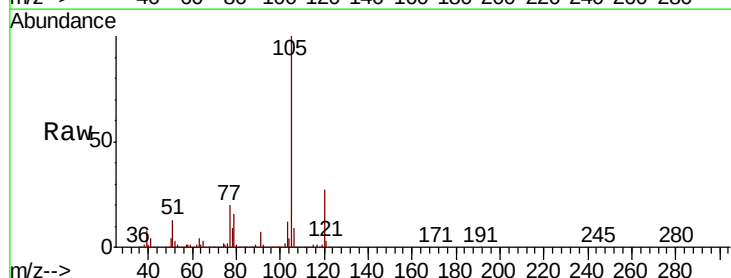
Acq: 22 May 2020 9:47

Tgt Ion:105 Resp: 4225990

Ion Ratio Lower Upper

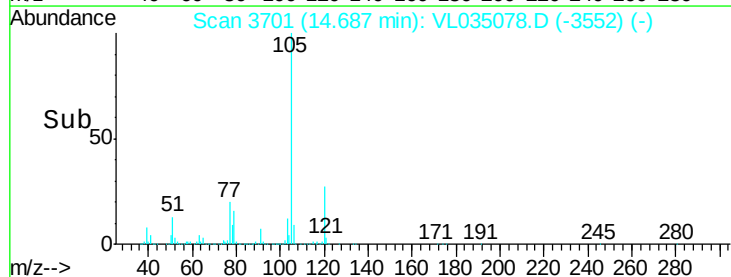
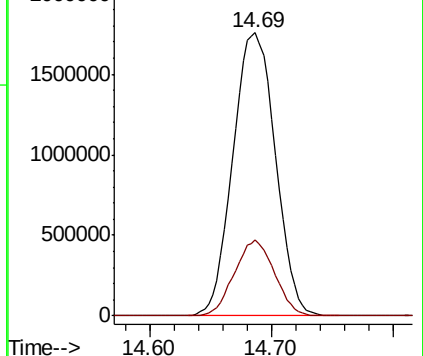
105 100

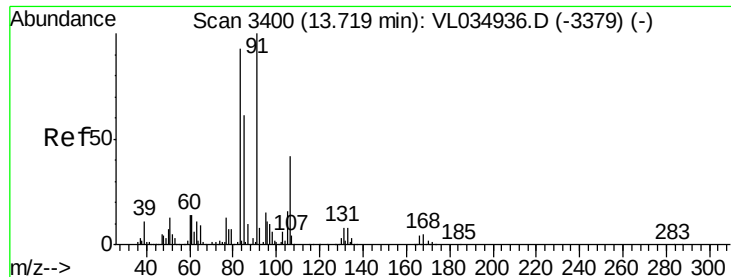
120 25.4 20.6 31.0



Abundance Ion 105.10 (104.80 to 105.80): V

Ion 120.20 (119.90 to 120.90): V





#63

1,1,2,2-Tetrachloroethane

Concen: 7.522 ppbv

RT: 13.70 min Scan# 3393

Delta R.T. -0.02 min

Lab File: VL035078.D

Acq: 22 May 2020 9:47

Instrument :

MSVOA\_L

ClientSampleId :

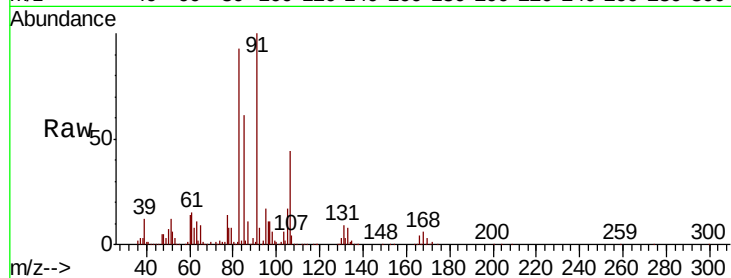
Tot Ion: 83 Resp: 2008784

Ion Ratio Lower Upper

83 100

131 9.2 4.7 14.0

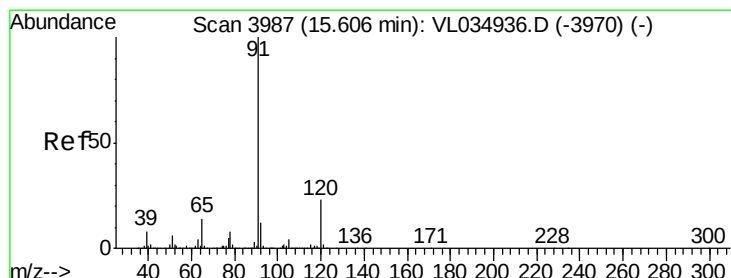
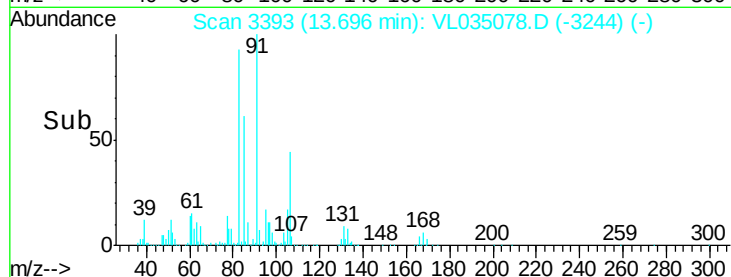
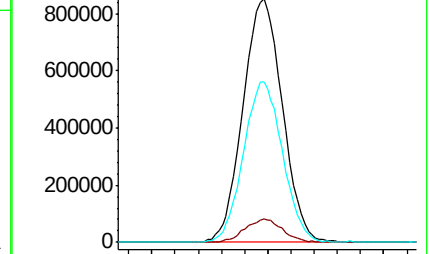
85 65.8 32.5 97.4



Abundance Ion 83.00 (82.70 to 83.70): VL0

Ion 131.00 (130.70 to 131.70): V

Ion 85.00 (84.70 to 85.70): VL0



#64

n-propylbenzene

Concen: 8.539 ppbv

RT: 15.58 min Scan# 3980

Delta R.T. -0.02 min

Lab File: VL035078.D

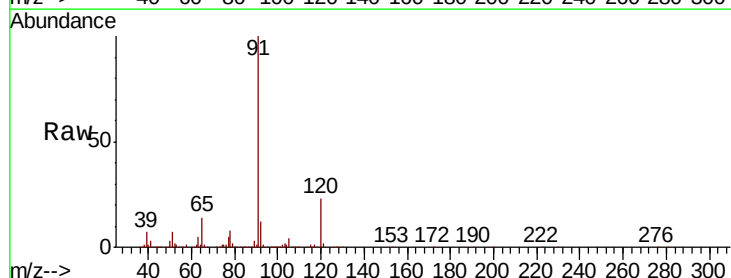
Acq: 22 May 2020 9:47

Tgt Ion:120 Resp: 1109332

Ion Ratio Lower Upper

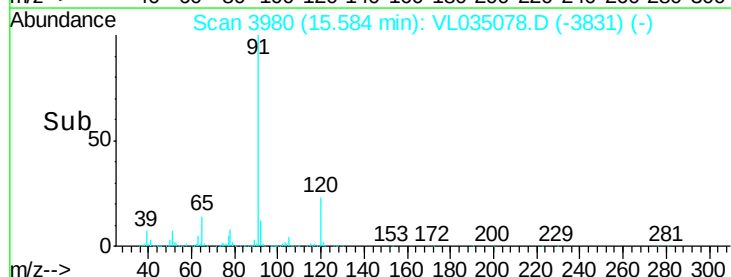
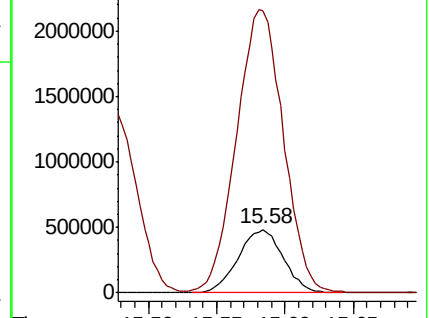
120 100

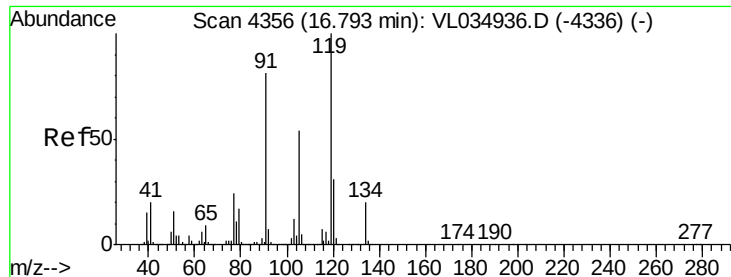
91 467.0 373.5 560.3



Abundance Ion 120.20 (119.90 to 120.90): V

Ion 91.10 (90.80 to 91.80): VL0





#65

tert-Butylbenzene

Concen: 8.283 ppbv

RT: 16.77 min Scan# 4349

Delta R.T. -0.02 min

Lab File: VL035078.D

Acq: 22 May 2020 9:47

Instrument :

MSVOA\_L

ClientSampleId :

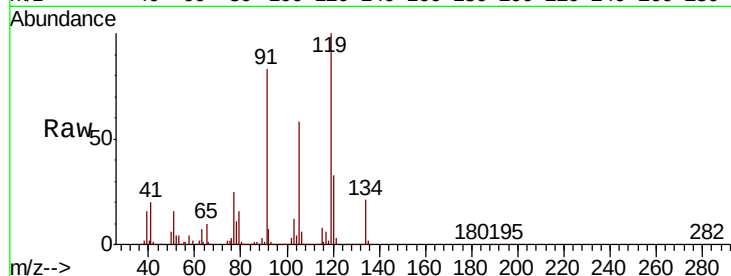
Tot Ion:119 Resp: 3638650

Ion Ratio Lower Upper

119 100

91 84.9 67.5 101.3

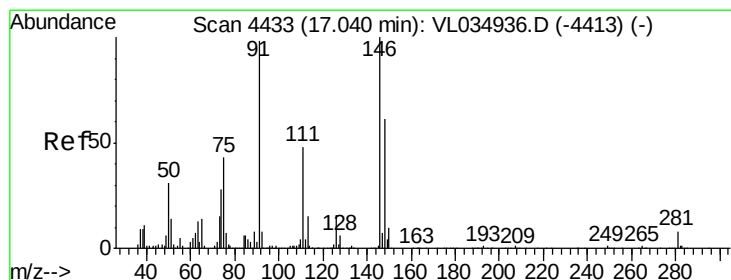
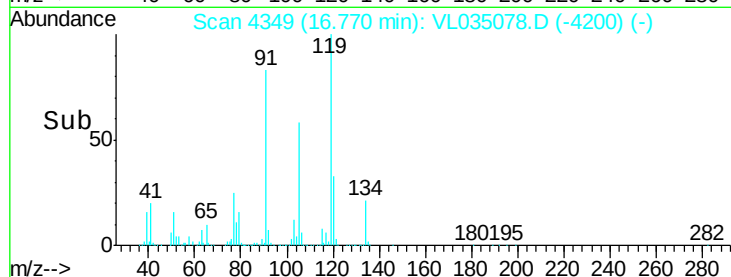
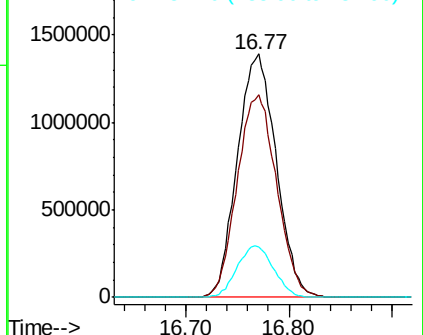
134 20.0 16.1 24.1



Abundance Ion 119.20 (118.90 to 119.90): V

Ion 91.10 (90.80 to 91.80): VL0

Ion 134.20 (133.90 to 134.90): V



#66

Benzyl Chloride

Concen: 9.238 ppbv

RT: 17.01 min Scan# 4425

Delta R.T. -0.03 min

Lab File: VL035078.D

Acq: 22 May 2020 9:47

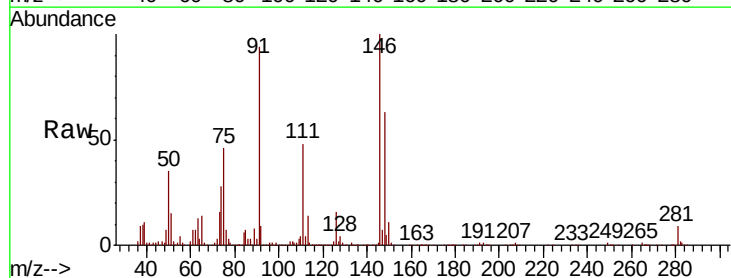
Tgt Ion: 91 Resp: 1377642

Ion Ratio Lower Upper

91 100

126 16.4 13.8 20.6

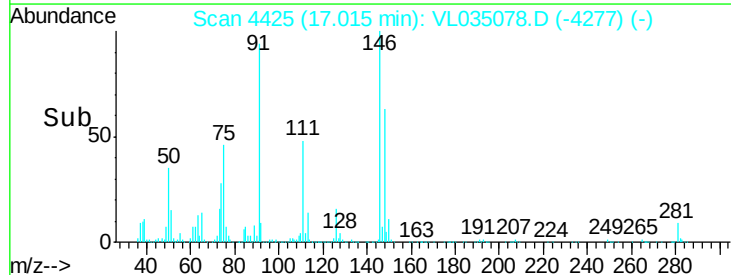
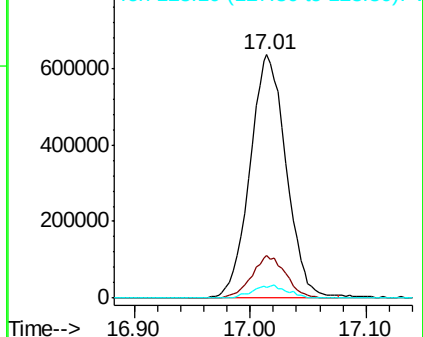
128 5.2 4.3 6.5

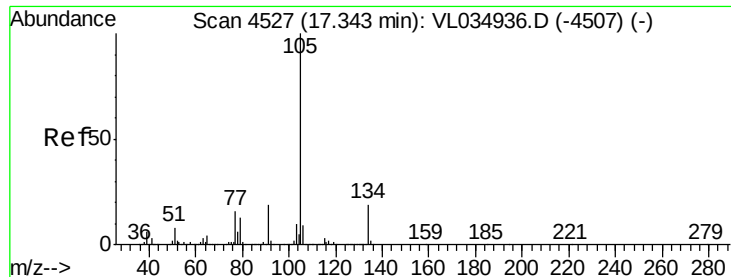


Abundance Ion 91.10 (90.80 to 91.80): VL0

Ion 126.10 (125.80 to 126.80): V

Ion 128.10 (127.80 to 128.80): V





#67

sec-Butylbenzene

Concen: 8.273 ppbv

RT: 17.32 min Scan# 4520

Delta R.T. -0.02 min

Lab File: VL035078.D

Acq: 22 May 2020 9:47

Instrument :

MSVOA\_L

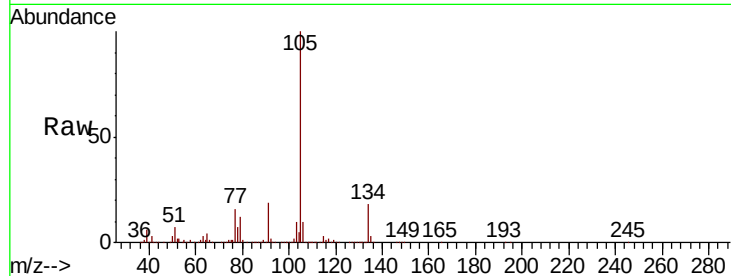
ClientSampleId :

Tot Ion:105 Resp: 5187900

Ion Ratio Lower Upper

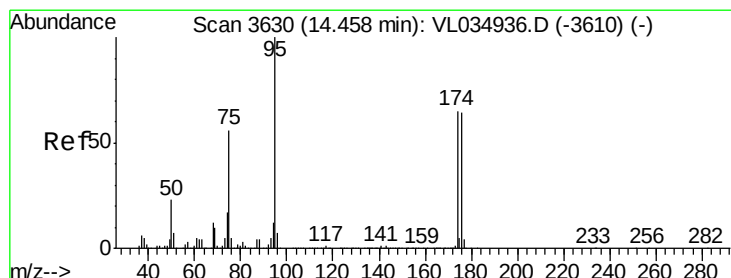
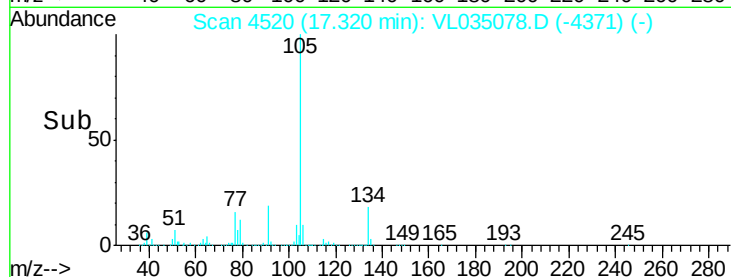
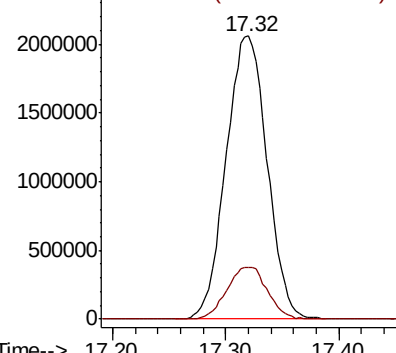
105 100

134 18.2 14.8 22.2



Abundance Ion 105.10 (104.80 to 105.80): V

Ion 134.20 (133.90 to 134.90): V



#68

1-Bromo-4-Fluorobenzene

Concen: 8.349 ppbv

RT: 14.44 min Scan# 3623

Delta R.T. -0.02 min

Lab File: VL035078.D

Acq: 22 May 2020 9:47

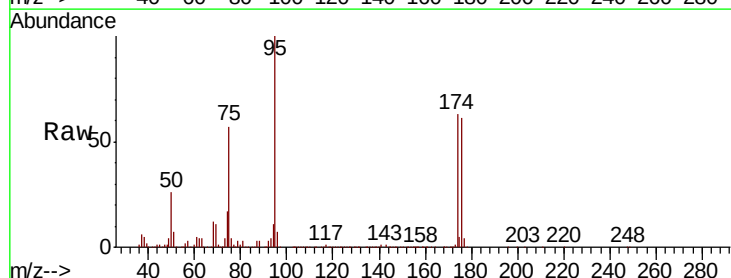
Tgt Ion: 95 Resp: 2135533

Ion Ratio Lower Upper

95 100

174 63.5 51.5 77.3

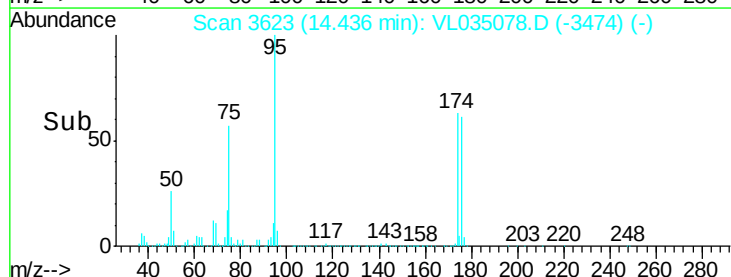
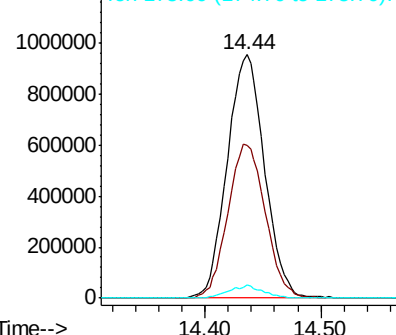
175 4.8 3.8 5.8

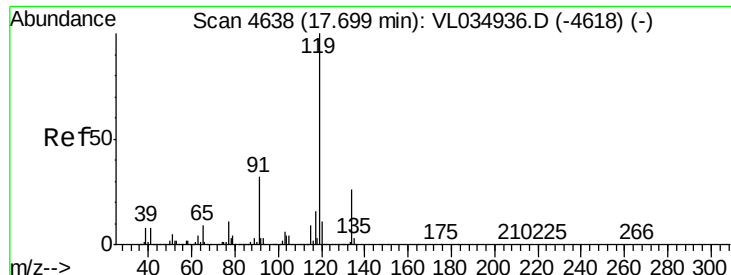


Abundance Ion 95.10 (94.80 to 95.80): VL0

Ion 174.00 (173.70 to 174.70): V

Ion 175.00 (174.70 to 175.70): V

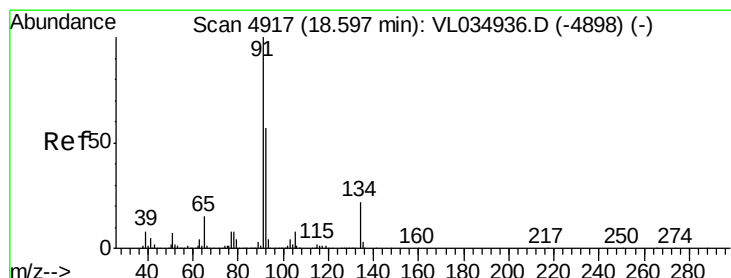
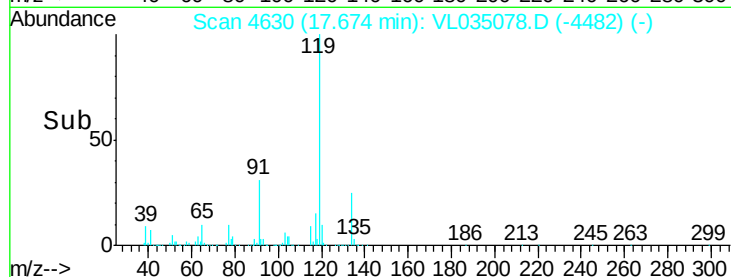
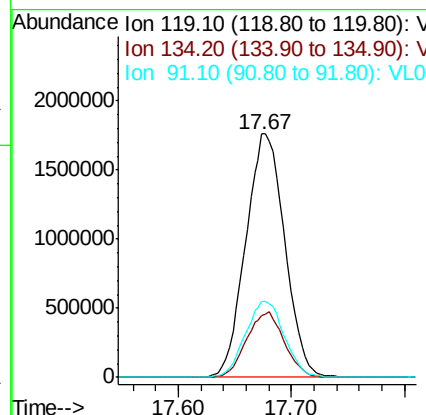
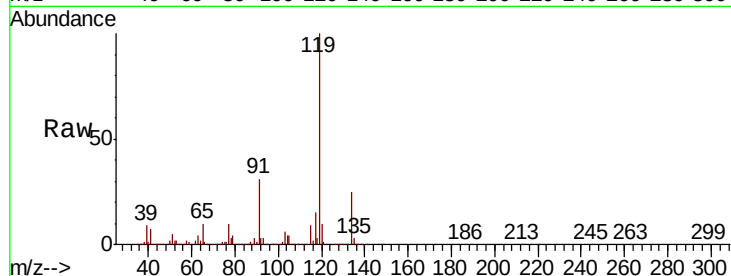




#69  
 p-Isopropyltoluene  
 Concen: 8.314 ppbv  
 RT: 17.67 min Scan# 4630  
 Delta R.T. -0.03 min  
 Lab File: VL035078.D  
 Acq: 22 May 2020 9:47

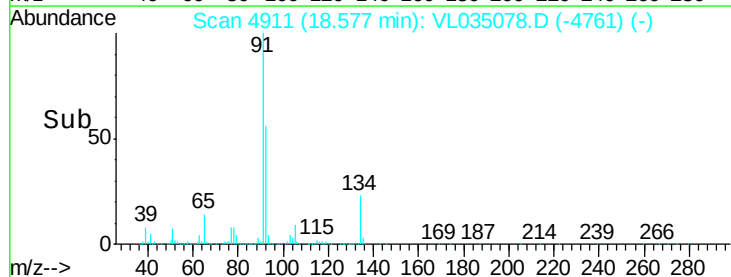
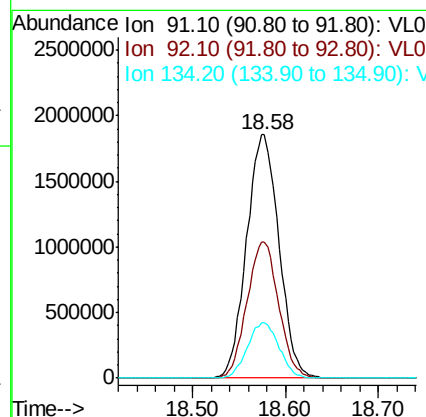
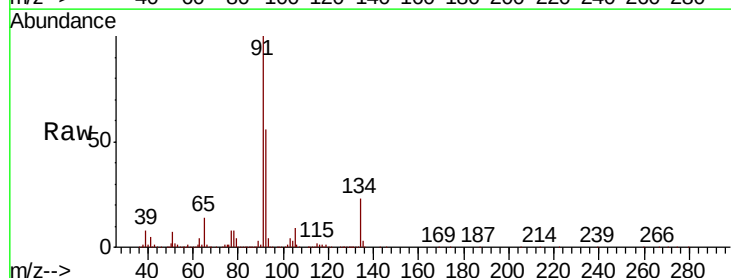
Instrument :  
 MSVOA\_L  
 ClientSampleId :

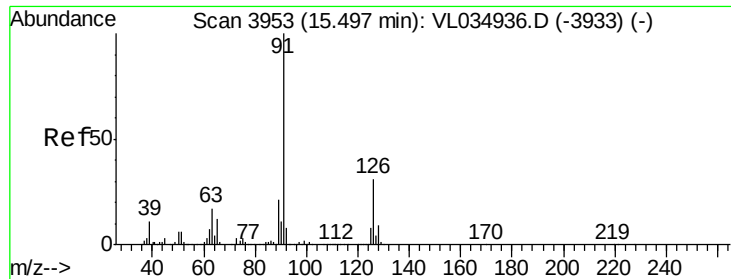
Tot Ion:119 Resp: 4217902  
 Ion Ratio Lower Upper  
 119 100  
 134 25.9 20.3 30.5  
 91 31.3 24.6 36.8



#70  
 n-Butylbenzene  
 Concen: 8.323 ppbv  
 RT: 18.58 min Scan# 4911  
 Delta R.T. -0.02 min  
 Lab File: VL035078.D  
 Acq: 22 May 2020 9:47

Tgt Ion: 91 Resp: 4493879  
 Ion Ratio Lower Upper  
 91 100  
 92 54.9 44.4 66.6  
 134 22.2 18.0 27.0

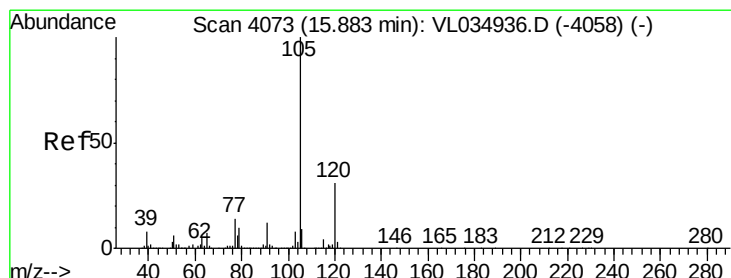
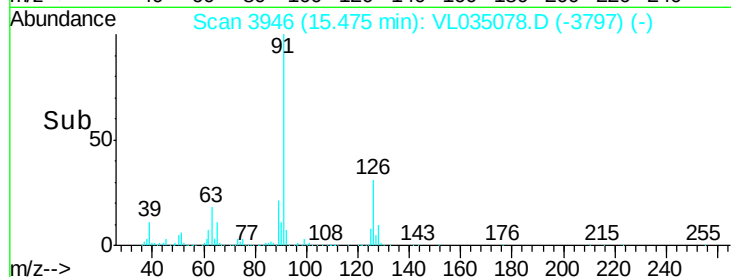
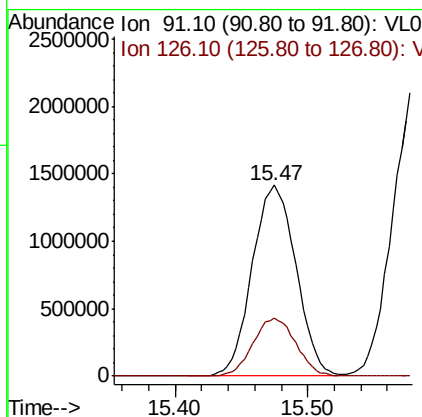
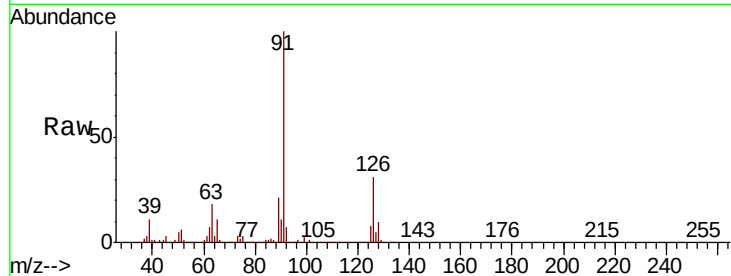




#71  
 2-Chlorotoluene  
 Concen: 8.523 ppbv  
 RT: 15.47 min Scan# 3946  
 Delta R.T. -0.02 min  
 Lab File: VL035078.D  
 Acq: 22 May 2020 9:47

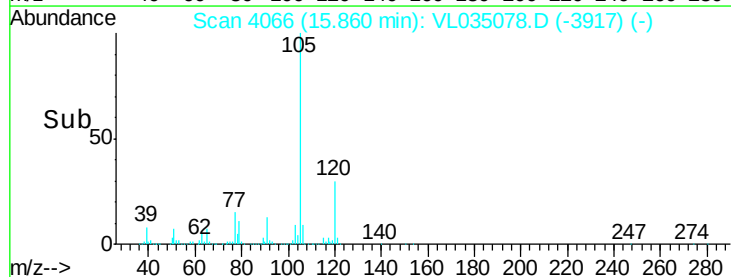
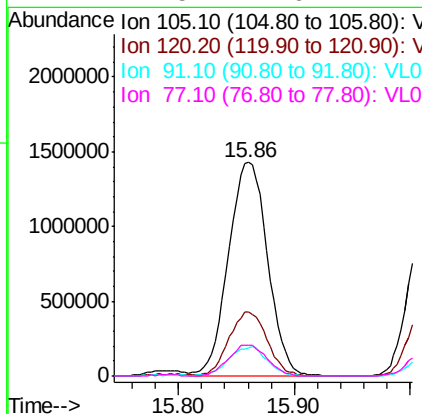
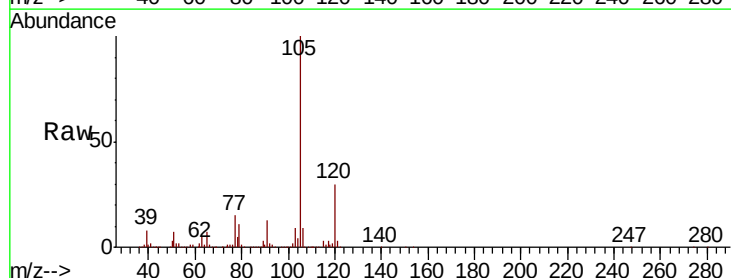
Instrument :  
 MSVOA\_L  
 ClientSampleId :

Tot Ion: 91 Resp: 3258782  
 Ion Ratio Lower Upper  
 91 100  
 126 29.9 12.0 47.8

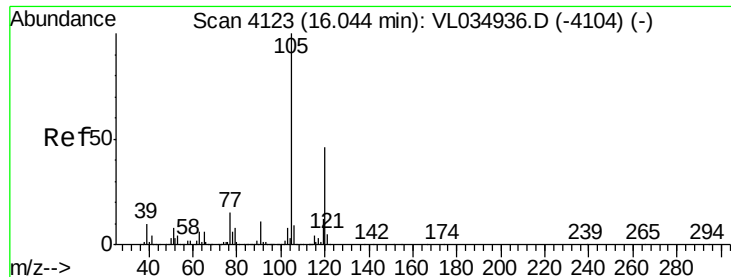


#72  
 4-Ethyltoluene  
 Concen: 8.822 ppbv  
 RT: 15.86 min Scan# 4066  
 Delta R.T. -0.02 min  
 Lab File: VL035078.D  
 Acq: 22 May 2020 9:47

Tgt Ion: 105 Resp: 3338989  
 Ion Ratio Lower Upper  
 105 100  
 120 29.3 23.8 35.8  
 91 13.5 10.6 15.8  
 77 14.5 11.6 17.4







#73

1,3,5-Trimethylbenzene

Concen: 8.449 ppbv

RT: 16.02 min Scan# 4115

Delta R.T. -0.03 min

Lab File: VL035078.D

Acq: 22 May 2020 9:47

Instrument :

MSVOA\_L

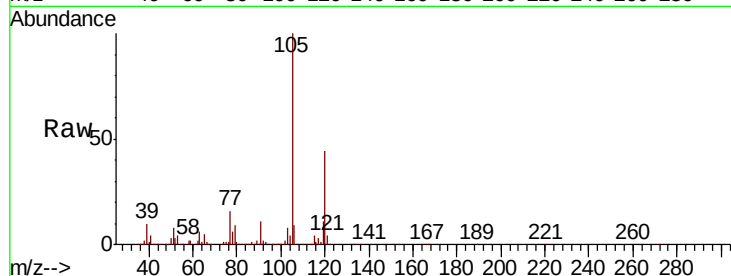
ClientSampleId :

Tot Ion:105 Resp: 3112022

Ion Ratio Lower Upper

105 100

120 43.9 36.4 54.6



Abundance Ion 105.10 (104.80 to 105.80): V

Ion 120.20 (119.90 to 120.90): V

16.02

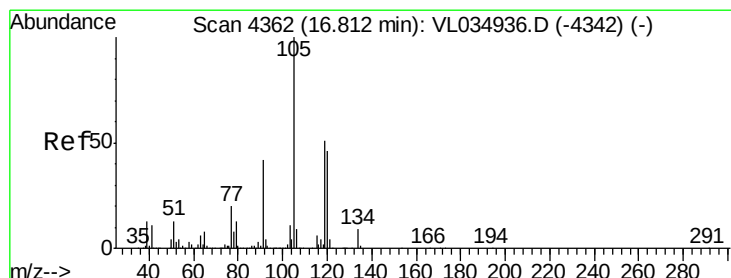
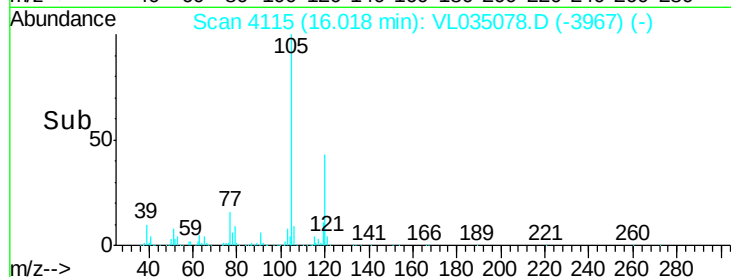
1500000

1000000

500000

0

Time--> 15.90 16.00 16.10



#74

1,2,4-Trimethylbenzene

Concen: 7.967 ppbv

RT: 16.78 min Scan# 4353

Delta R.T. -0.03 min

Lab File: VL035078.D

Acq: 22 May 2020 9:47

Tgt Ion:105 Resp: 3203263

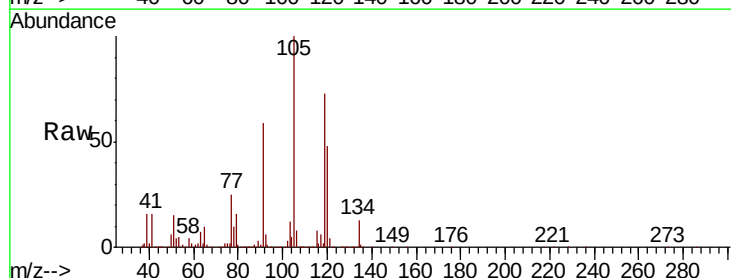
Ion Ratio Lower Upper

105 100

120 47.5 36.8 55.2

91 58.5 35.4 53.0#

77 24.8 16.2 24.2#



Abundance Ion 105.10 (104.80 to 105.80): V

Ion 120.20 (119.90 to 120.90): V

Ion 91.10 (90.80 to 91.80): VL0

Ion 77.10 (76.80 to 77.80): VL0

2000000

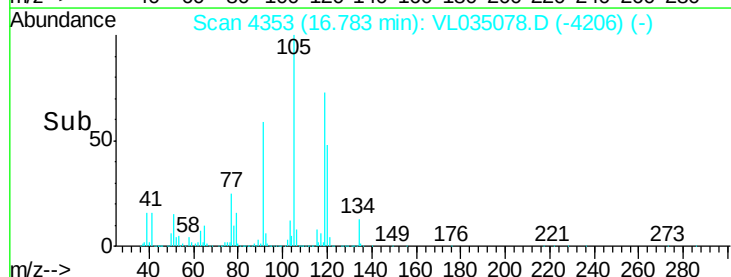
1500000

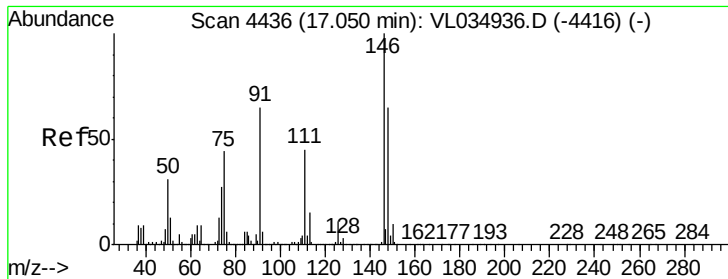
1000000

500000

0

Time--> 16.70 16.80





#75

1,3-Dichlorobenzene

Concen: 7.796 ppbv

RT: 17.02 min Scan# 4427

Delta R.T. -0.03 min

Lab File: VL035078.D

Acq: 22 May 2020 9:47

Instrument :

MSVOA\_L

ClientSampleId :

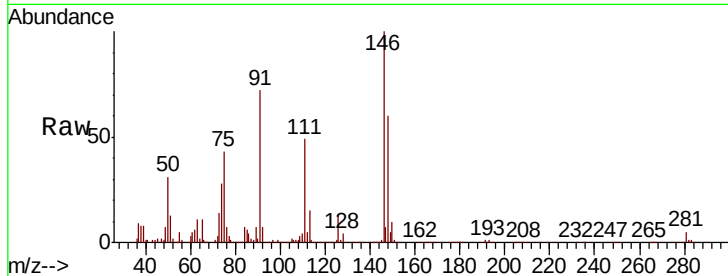
Tot Ion:146 Resp: 1840505

Ion Ratio Lower Upper

146 100

111 48.4 24.0 72.0

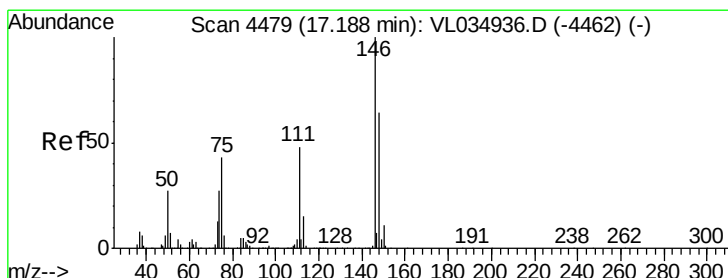
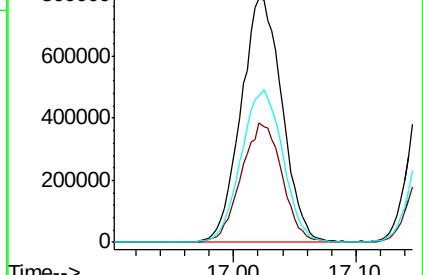
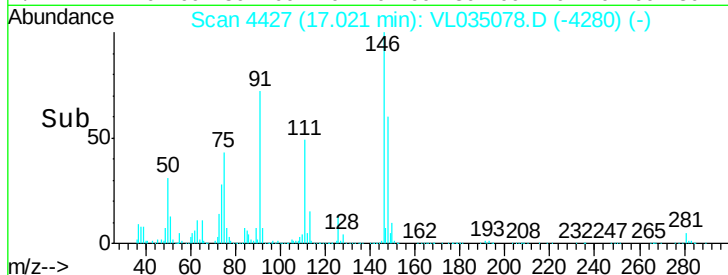
148 63.2 32.6 97.7



Abundance Ion 146.00 (145.70 to 146.70): V

Ion 111.10 (110.80 to 111.80): V

Ion 148.00 (147.70 to 148.70): V



#76

1,4-Dichlorobenzene

Concen: 8.147 ppbv

RT: 17.17 min Scan# 4472

Delta R.T. -0.02 min

Lab File: VL035078.D

Acq: 22 May 2020 9:47

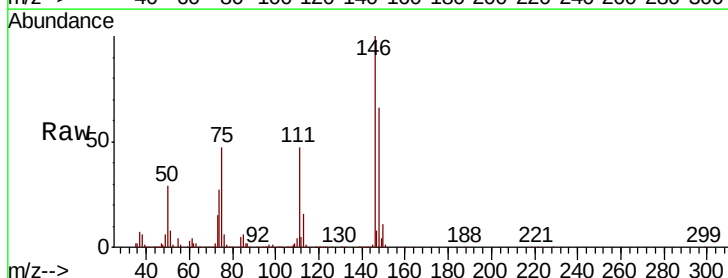
Tgt Ion:146 Resp: 1827425

Ion Ratio Lower Upper

146 100

111 46.7 23.7 71.1

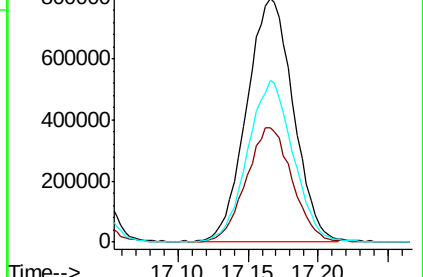
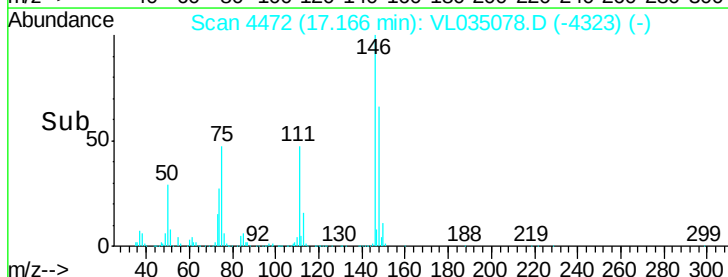
148 65.2 32.6 97.8

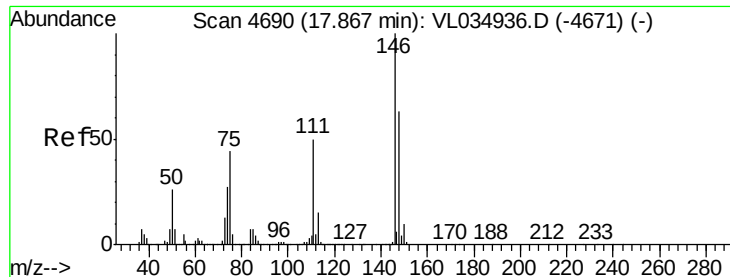


Abundance Ion 146.00 (145.70 to 146.70): V

Ion 111.10 (110.80 to 111.80): V

Ion 148.00 (147.70 to 148.70): V

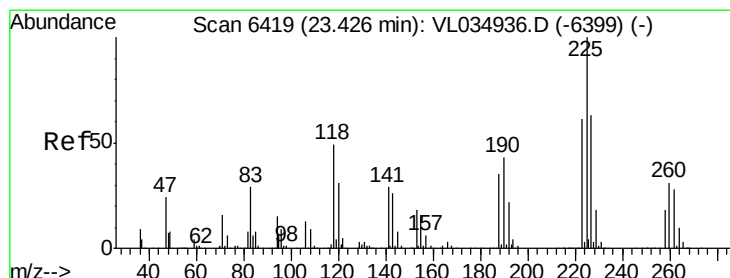
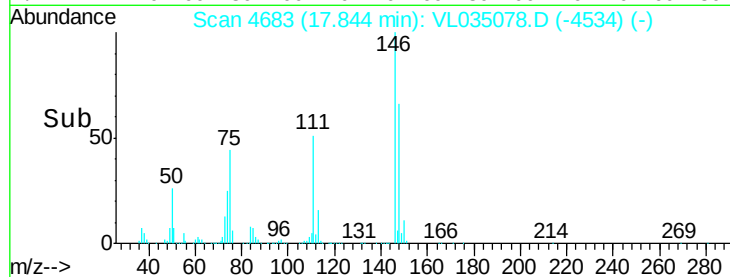
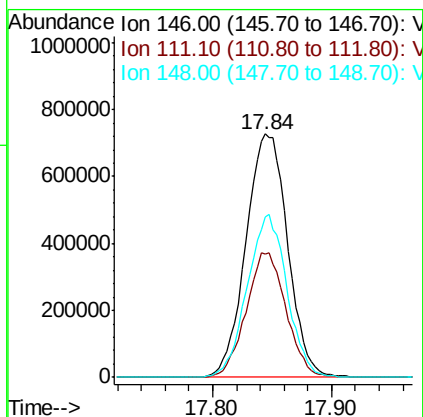
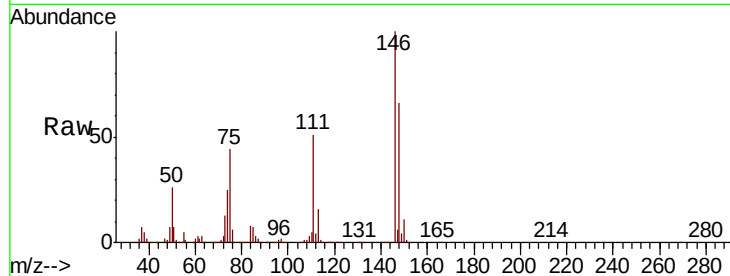




#77  
 1,2-Dichlorobenzene  
 Concen: 7.923 ppbv  
 RT: 17.84 min Scan# 4683  
 Delta R.T. -0.02 min  
 Lab File: VL035078.D  
 Acq: 22 May 2020 9:47

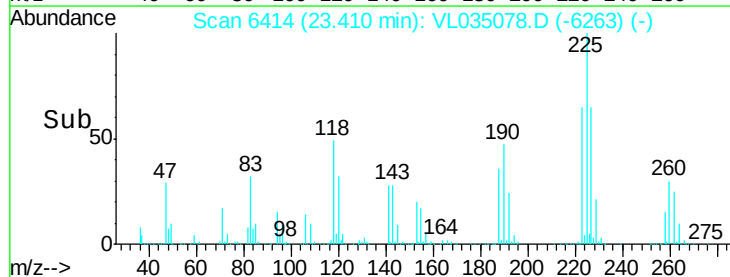
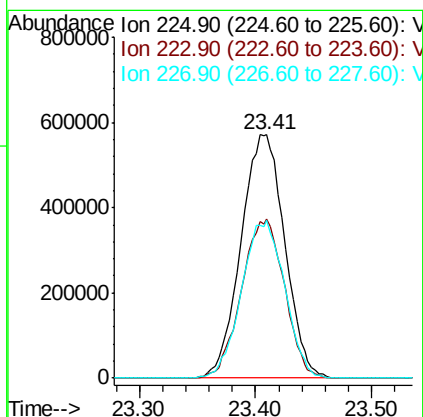
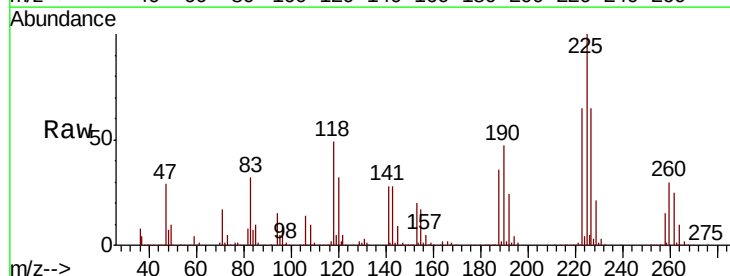
Instrument :  
 MSVOA\_L  
 ClientSampled :

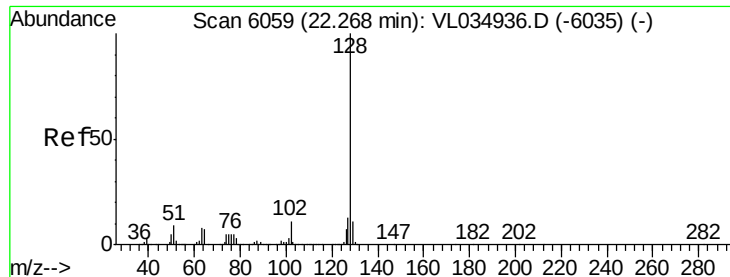
Tot Ion:146 Resp: 1762318  
 Ion Ratio Lower Upper  
 146 100  
 111 49.3 24.5 73.5  
 148 63.9 31.7 95.1



#78  
 Hexachloro-1,3-Butadiene  
 Concen: 7.898 ppbv  
 RT: 23.41 min Scan# 6414  
 Delta R.T. -0.02 min  
 Lab File: VL035078.D  
 Acq: 22 May 2020 9:47

Tgt Ion:225 Resp: 1497568  
 Ion Ratio Lower Upper  
 225 100  
 223 64.1 49.8 74.8  
 227 63.8 51.8 77.6

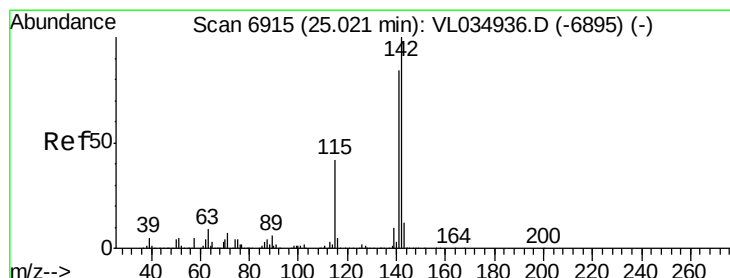
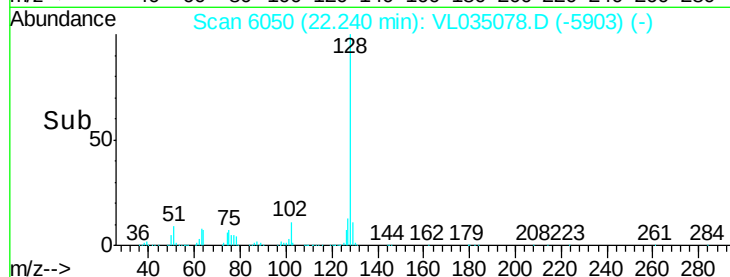
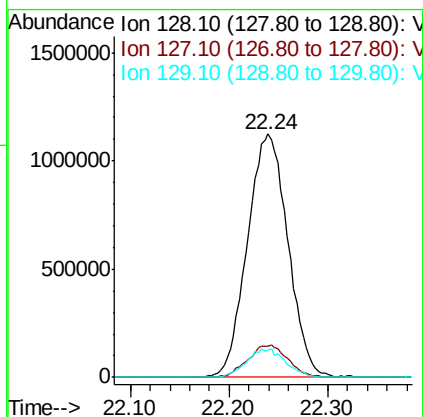
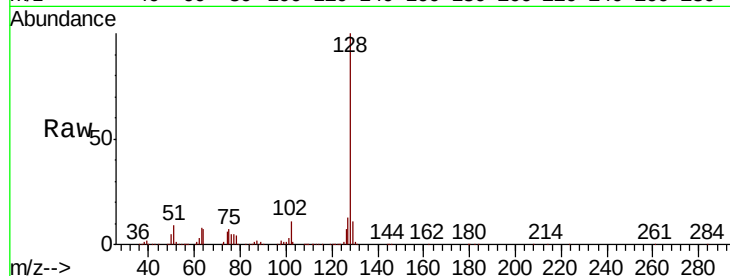




#79  
Naphthalene  
Concen: 10.165 ppbv  
RT: 22.24 min Scan# 6050  
Delta R.T. -0.03 min  
Lab File: VL035078.D  
Acq: 22 May 2020 9:47

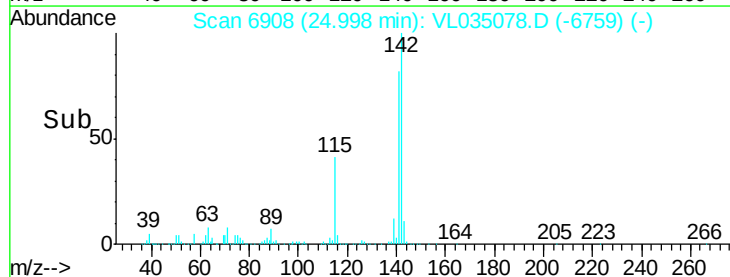
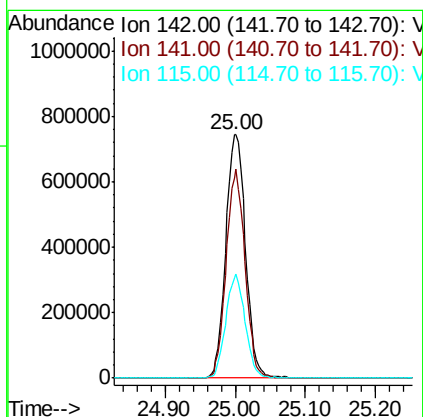
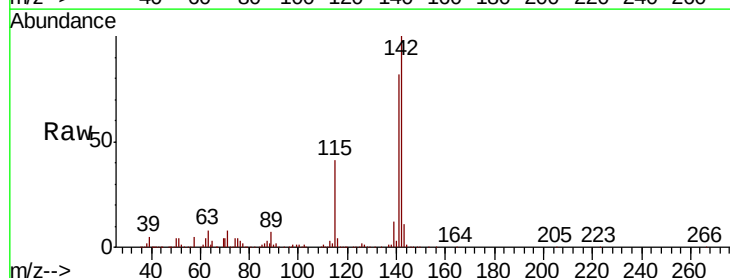
Instrument :  
MSVOA\_L  
ClientSampled :

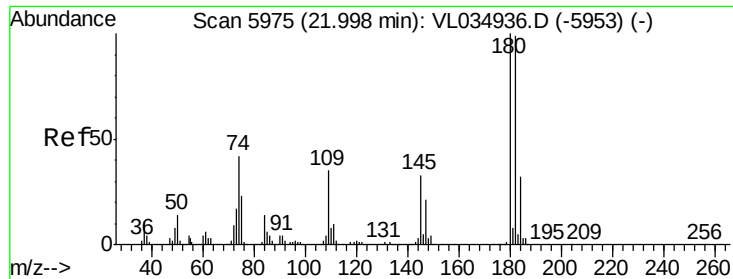
Tot Ion:128 Resp: 3182559  
Ion Ratio Lower Upper  
128 100  
127 13.0 10.5 15.7  
129 11.2 9.0 13.4



#80  
Naphthalene, 2-methyl-  
Concen: 19.030 ppbv  
RT: 25.00 min Scan# 6908  
Delta R.T. -0.02 min  
Lab File: VL035078.D  
Acq: 22 May 2020 9:47

Tgt Ion:142 Resp: 1464584  
Ion Ratio Lower Upper  
142 100  
141 82.0 68.6 102.8  
115 41.9 33.9 50.9





#81

1,2,4-Trichlorobenzene

Concen: 4.898 ppbv

RT: 21.97 min Scan# 5965

Delta R.T. -0.03 min

Lab File: VL035078.D

Acq: 22 May 2020 9:47

Instrument :

MSVOA\_L

ClientSampleId :

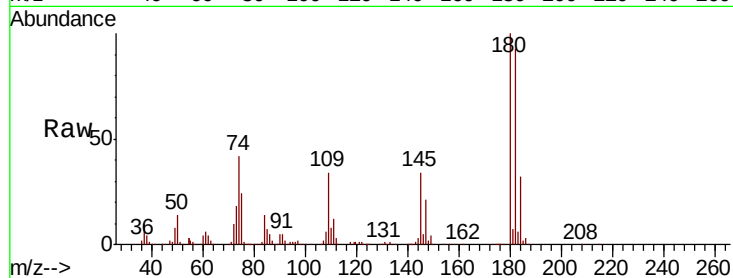
Tot Ion:180 Resp: 929937

Ion Ratio Lower Upper

180 100

182 173.7 77.5 116.3#

184 55.1 24.8 37.2#



Abundance Ion 180.00 (179.70 to 180.70): V

Ion 182.00 (181.70 to 182.70): V

Ion 184.00 (183.70 to 184.70): V

