

Data Path : Z:\VOASRV\HPCHEM1\MSVOA\_L\DATA\VL112718\  
 Data File : VL032821.D  
 Acq On : 28 Nov 2018 00:05  
 Operator : SY/AP  
 Sample : J6046-03DL 10X  
 Misc : 400ml/MSVOA\_L  
 ALS Vial : 1 Sample Multiplier: 1

Instrument :  
 MSVOA\_L  
 ClientSampleId :  
 EP2-SV-05DL

Manual Integrations  
 APPROVED

MMDadoda  
 11/28/2018 4:21:36 PM

Quant Time: Nov 28 16:00:26 2018  
 Quant Method : Z:\VOASRV\HPCHEM1\MSVOA\_L\METHODS\VL111418AIR.M  
 Quant Title : AIR ANALYSIS BY METHOD TO-15 Instrument: MSVOA\_L Wed Nov 14 2018  
 QLast Update : Wed Nov 14 07:00:23 2018  
 Response via : Initial Calibration

| Internal Standards      | R.T.  | QIon | Response | Conc  | Units | Dev(Min) |
|-------------------------|-------|------|----------|-------|-------|----------|
| 1) Bromochloromethane   | 5.77  | 49   | 1220319  | 10.00 | ppbv  | 0.00     |
| 33) 1,4-Difluorobenzene | 7.30  | 114  | 3149059  | 10.00 | ppbv  | 0.00     |
| 55) Chlorobenzene-d5    | 12.25 | 117  | 2904926  | 10.00 | ppbv  | 0.00     |

System Monitoring Compounds

|                             |        |       |          |          |      |        |
|-----------------------------|--------|-------|----------|----------|------|--------|
| 68) 1-Bromo-4-Fluorobenzene | 14.59  | 95    | 2122896  | 9.77     | ppbv | 0.00   |
| Spiked Amount               | 10.000 | Range | 65 - 135 | Recovery | =    | 97.70% |

| Target Compounds           | R.T.  | QIon | Response  | Conc   | Units  | Qvalue |
|----------------------------|-------|------|-----------|--------|--------|--------|
| 2) Dichlorodifluoromethane | 3.08  | 85   | 106227    | 0.61   | ppbv   | 99     |
| 3) Chlorodifluoromethane   | 3.02  | 51   | 13236590m | 136.82 | ppbv   |        |
| 9) Propene                 | 3.05  | 41   | 85894     | 2.22   | ppbv   | 96     |
| 11) Trichlorofluoromethane | 4.01  | 101  | 544382    | 3.29   | ppbv   | 99     |
| 13) Ethanol                | 3.66  | 45   | 110575m   | 8.72   | ppbv   |        |
| 15) Acetone                | 3.92  | 43   | 254050    | 2.28   | ppbv # | 63     |
| 19) Isopropyl Alcohol      | 4.07  | 45   | 98826m    | 1.33   | ppbv   |        |
| 34) 2-Butanone             | 5.34  | 43   | 1140487   | 6.98   | ppbv   | 99     |
| 52) Tetrachloroethene      | 11.39 | 164  | 33999     | 0.39   | ppbv   | 92     |
| 53) Toluene                | 9.96  | 91   | 31691m    | 0.12   | ppbv   |        |

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

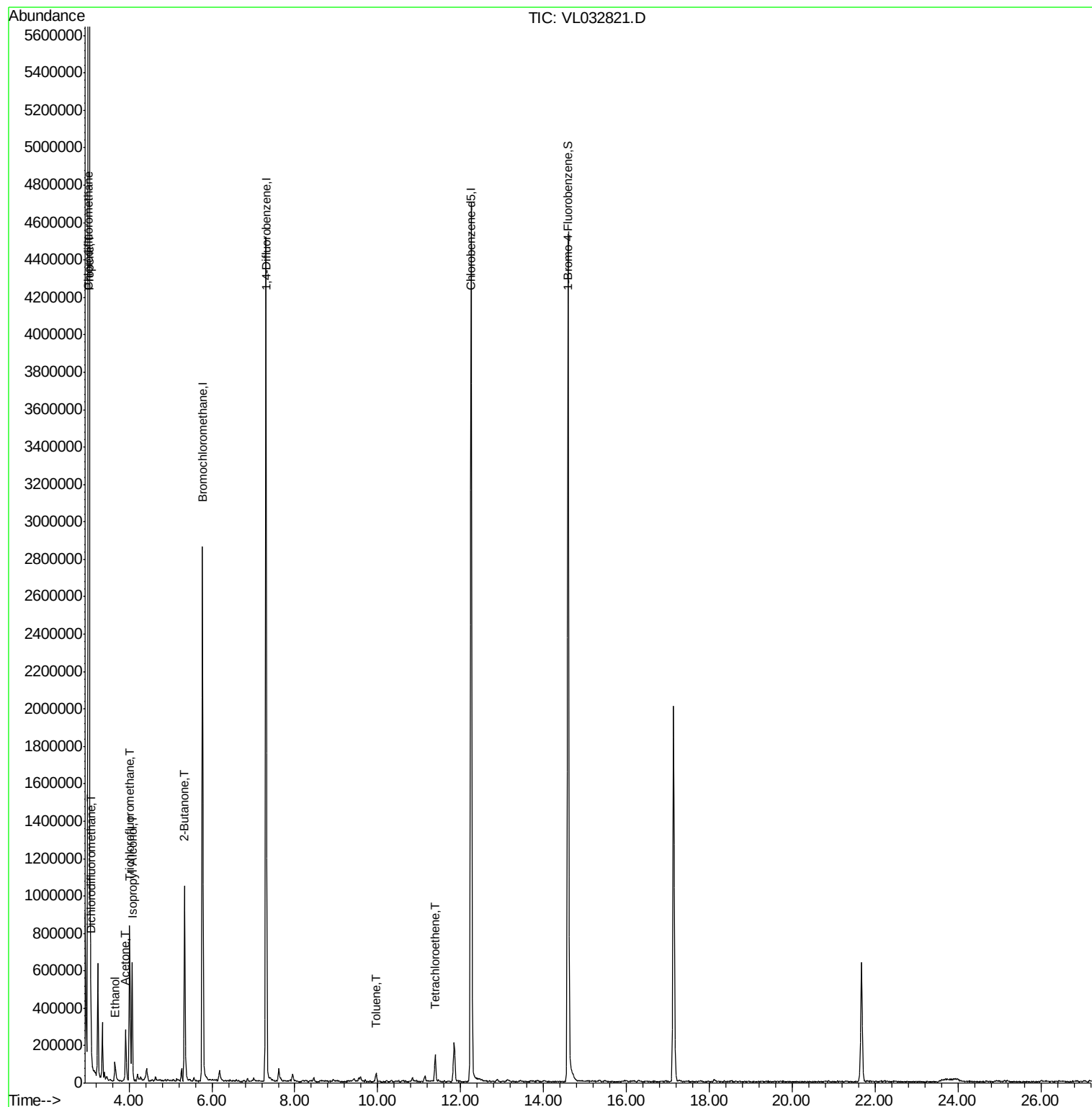
Data Path : Z:\V0ASRV\HPCHEM1\MSVOA\_L\DATA\VL112718\  
Data File : VL032821.D  
Acq On : 28 Nov 2018 00:05  
Operator : SY/AP  
Sample : J6046-03DL 10X  
Misc : 400ml/MSVOA\_L  
ALS Vial : 1 Sample Multiplier: 1

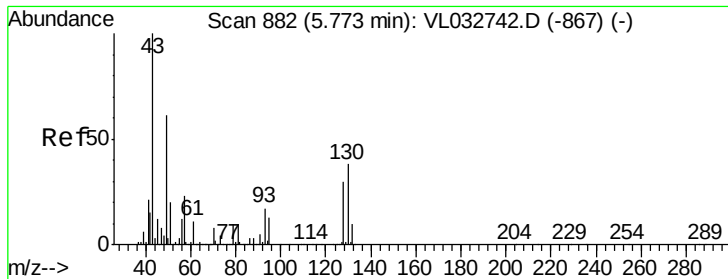
Instrument :  
MSVOA\_L  
ClientSampleId :  
EP2-SV-05DL

Manual Integrations  
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Quant Time: Nov 28 16:00:26 2018  
Quant Method : Z:\V0ASRV\HPCHEM1\MSVOA\_L\METHODS\VL111418AIR.M  
Quant Title : AIR ANALYSIS BY METHOD TO-15 Instrument: MSVOA\_L Wed Nov  
QLast Update : Wed Nov 14 07:00:23 2018  
Response via : Initial Calibration





#1

Bromochloromethane

Concen: 10.00 ppbv

RT: 5.77 min Scan# 881

Delta R.T. -0.00 min

Lab File: VL032821.D

Acq: 28 Nov 2018 00:05

Instrument :

MSVOA\_L

ClientSampleId :

EP2-SV-05DL

Tgt Ion: 49 Resp: 1220319

Ion Ratio Lower Upper

49 100

128 52.8 24.9 74.6

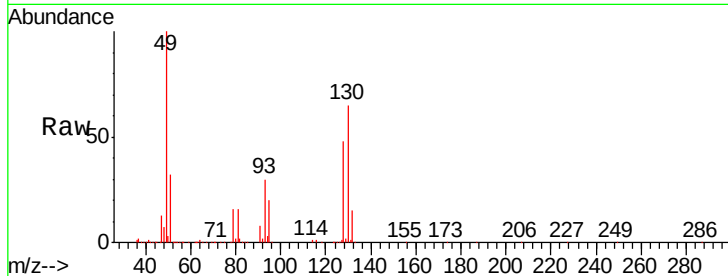
130 67.3 31.4 94.2

Manual Integrations

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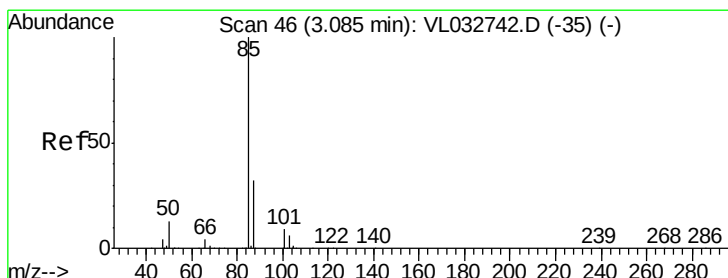
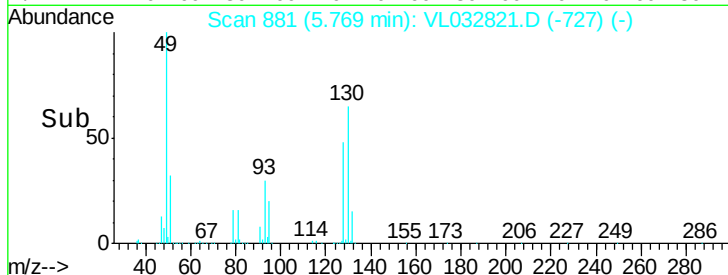
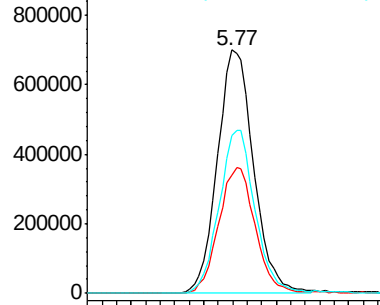
11/28/2018 4:21:36 PM



Abundance Ion 49.10 (48.80 to 49.80): VL0

Ion 128.00 (127.70 to 128.70): VL0

Ion 130.00 (129.70 to 130.70): VL0



#2

Dichlorodifluoromethane

Concen: 0.61 ppbv

RT: 3.08 min Scan# 46

Delta R.T. -0.00 min

Lab File: VL032821.D

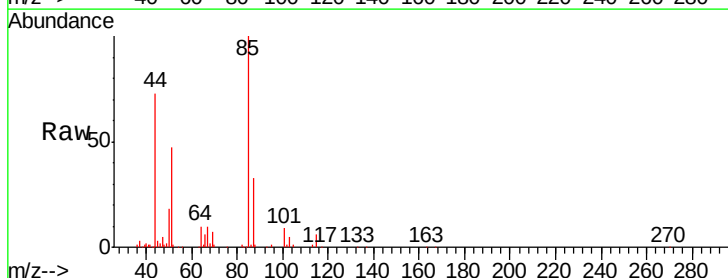
Acq: 28 Nov 2018 00:05

Tgt Ion: 85 Resp: 106227

Ion Ratio Lower Upper

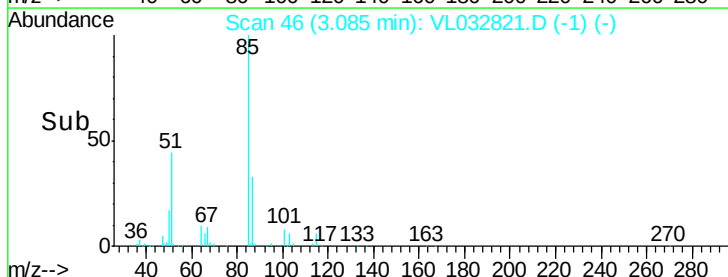
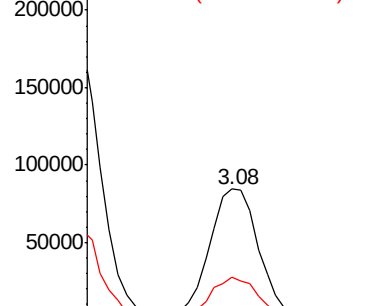
85 100

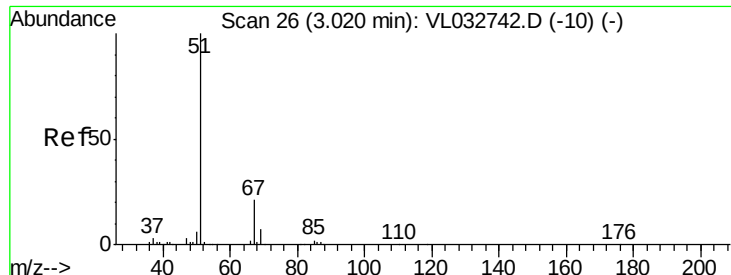
87 32.9 26.0 39.0



Abundance Ion 85.00 (84.70 to 85.70): VL0

Ion 87.00 (86.70 to 87.70): VL0





#3

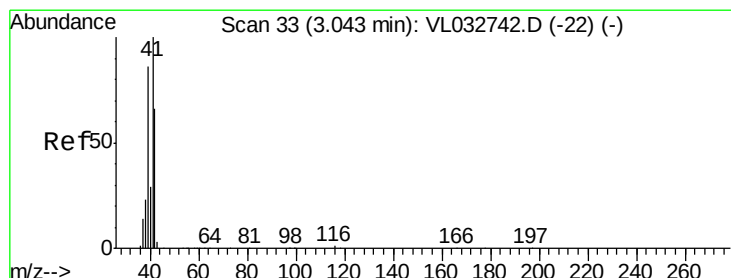
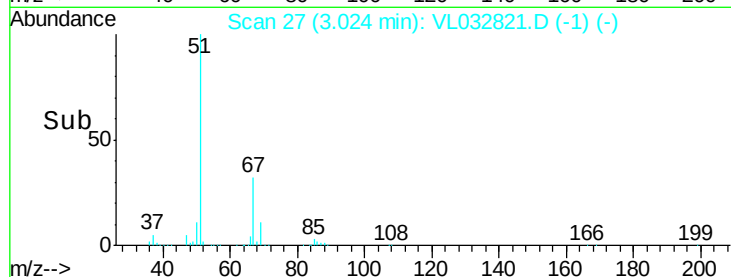
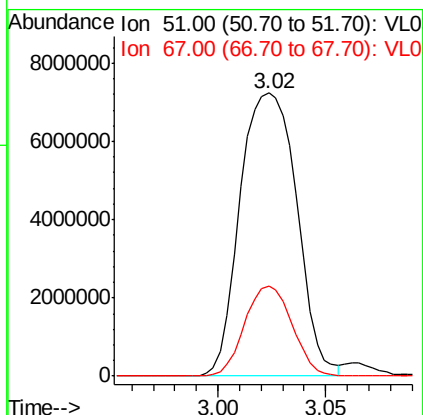
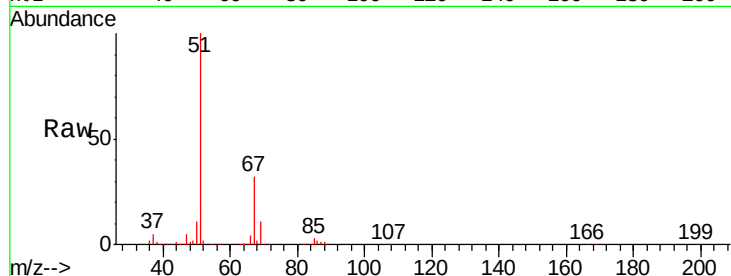
Chlorodifluoromethane  
Concen: 136.82 ppbv m  
RT: 3.02 min Scan# 27  
Delta R.T. 0.00 min  
Lab File: VL032821.D  
Acq: 28 Nov 2018 00:05

Instrument :  
MSVOA\_L  
ClientSampleId :  
EP2-SV-05DL

Tgt Ion: 51 Resp:13236590  
Ion Ratio Lower Upper  
51 100  
67 26.8 16.1 24.1#

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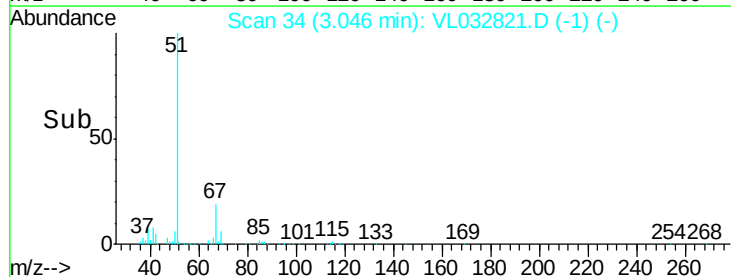
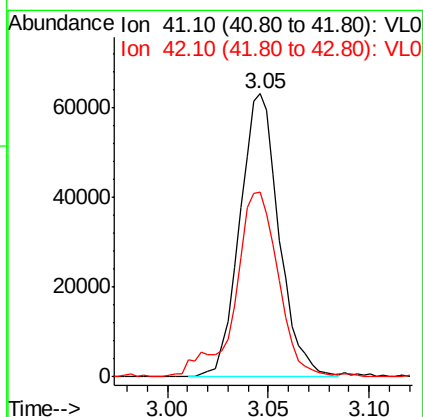
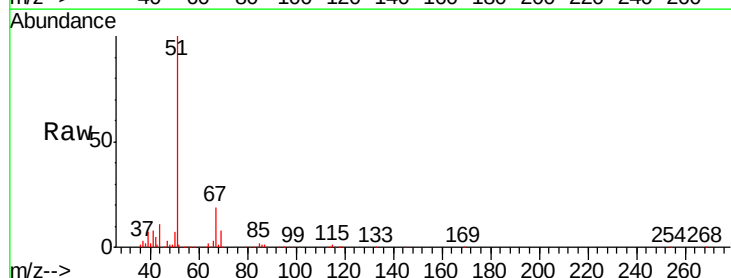
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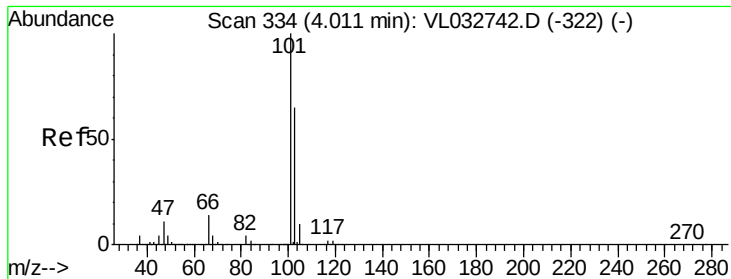


#9

Propene  
Concen: 2.22 ppbv  
RT: 3.05 min Scan# 34  
Delta R.T. 0.00 min  
Lab File: VL032821.D  
Acq: 28 Nov 2018 00:05

Tgt Ion: 41 Resp: 85894  
Ion Ratio Lower Upper  
41 100  
42 72.3 55.0 82.6





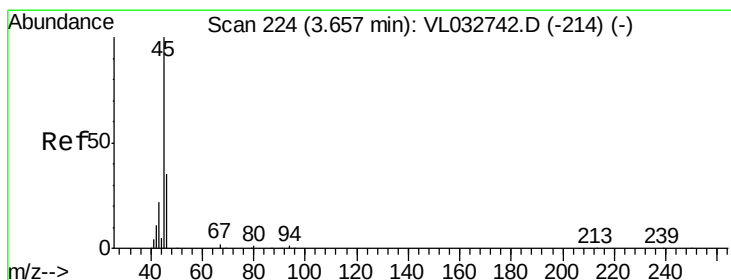
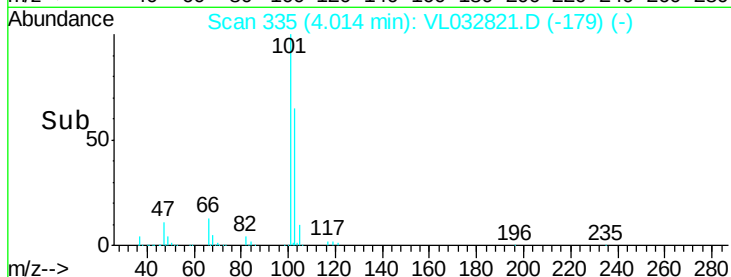
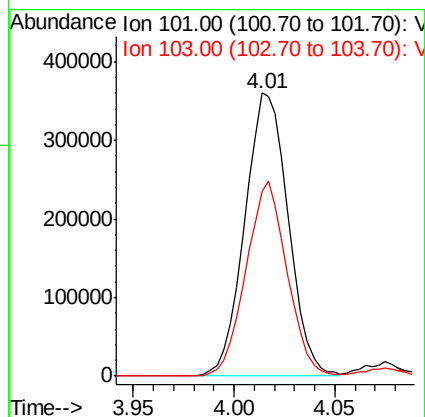
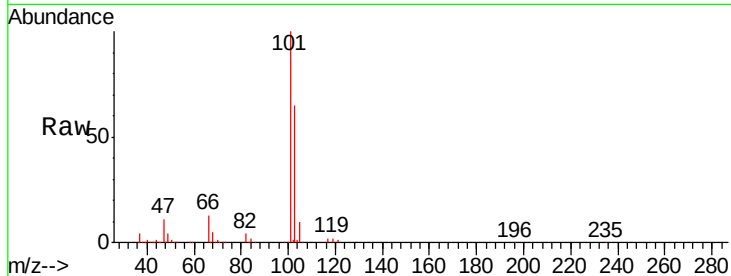
#11  
Trichlorofluoromethane  
Concen: 3.29 ppbv  
RT: 4.01 min Scan# 335  
Delta R.T. 0.00 min  
Lab File: VL032821.D  
Acq: 28 Nov 2018 00:05

Instrument :  
MSVOA\_L  
ClientSampleId :  
EP2-SV-05DL

Tgt Ion: 101 Resp: 544382  
Ion Ratio Lower Upper  
101 100  
103 65.3 51.6 77.4

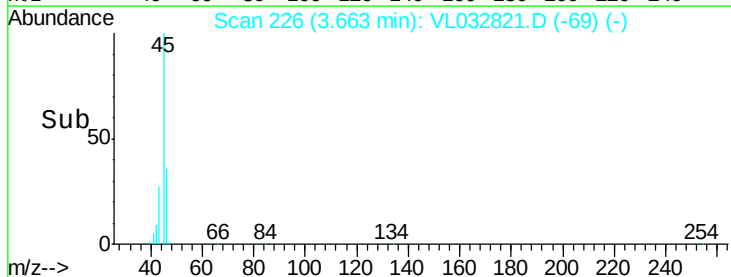
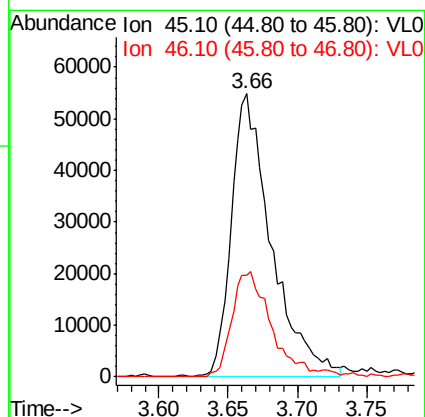
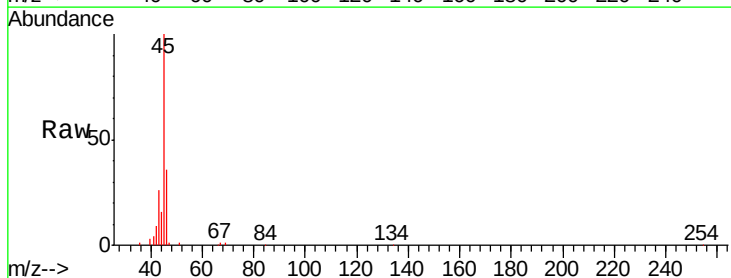
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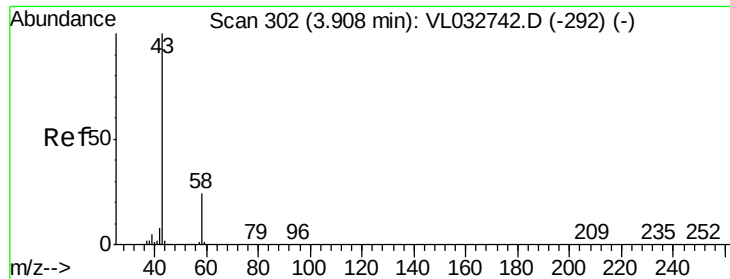
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#13  
Ethanol  
Concen: 8.72 ppbv m  
RT: 3.66 min Scan# 226  
Delta R.T. 0.01 min  
Lab File: VL032821.D  
Acq: 28 Nov 2018 00:05

Tgt Ion: 45 Resp: 110575  
Ion Ratio Lower Upper  
45 100  
46 38.4 14.5 57.9





#15

Acetone

Concen: 2.28 ppbv

RT: 3.92 min Scan# 305

Delta R.T. 0.01 min

Lab File: VL032821.D

Acq: 28 Nov 2018 00:05

Instrument :

MSVOA\_L

ClientSampleId :

EP2-SV-05DL

Tgt Ion: 43 Resp: 254050

Ion Ratio Lower Upper

43 100

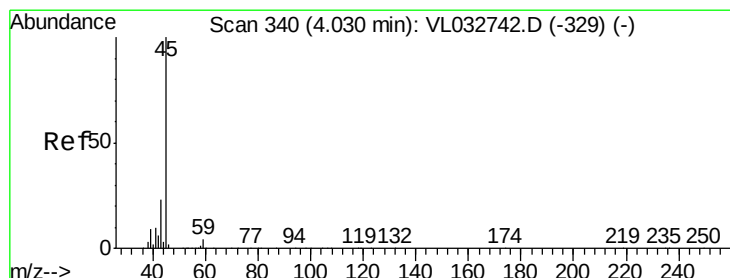
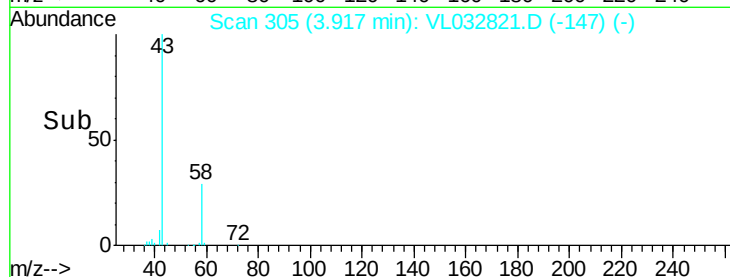
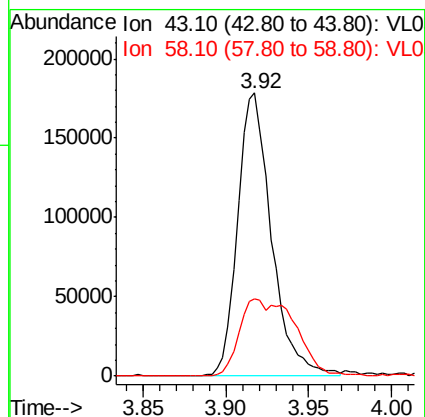
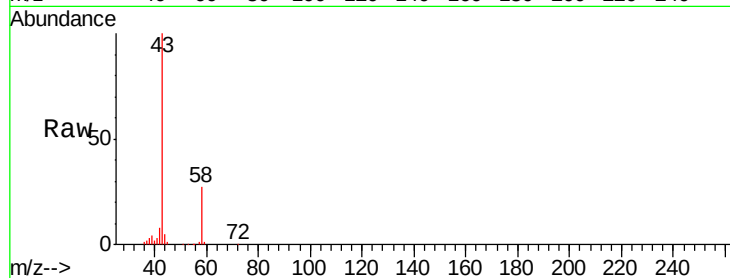
58 45.4 21.1 31.7#

Manual Integrations

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#19

Isopropyl Alcohol

Concen: 1.33 ppbv m

RT: 4.07 min Scan# 352

Delta R.T. 0.04 min

Lab File: VL032821.D

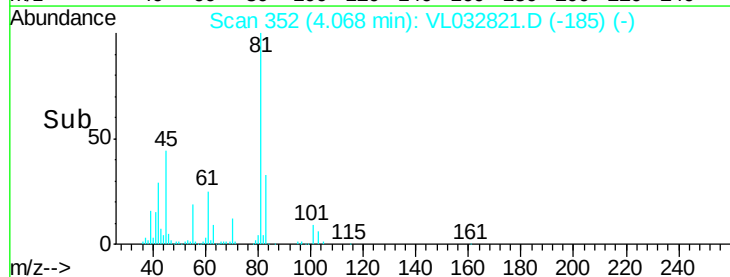
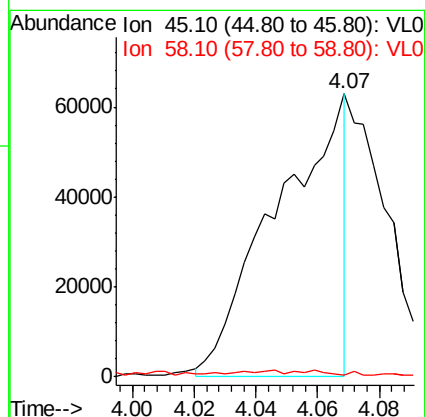
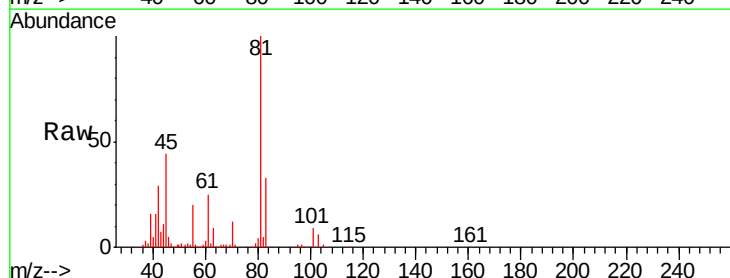
Acq: 28 Nov 2018 00:05

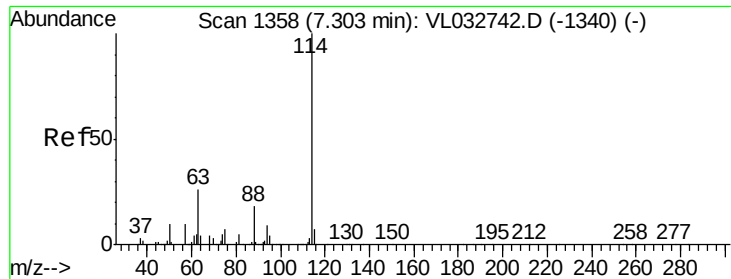
Tgt Ion: 45 Resp: 98826

Ion Ratio Lower Upper

45 100

58 0.0 1.4 2.0#





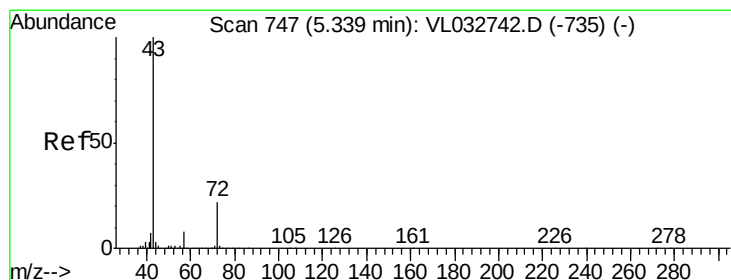
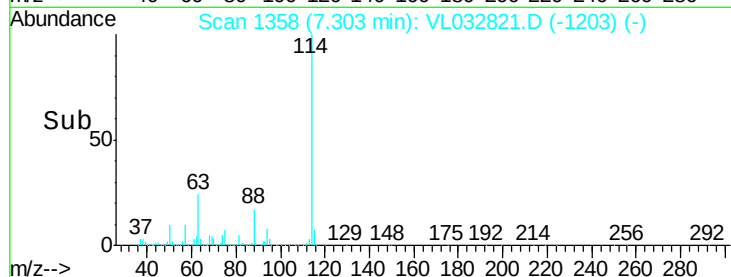
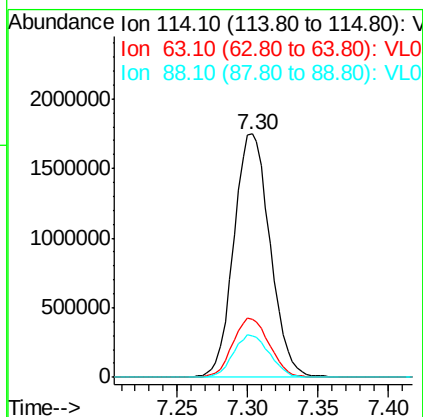
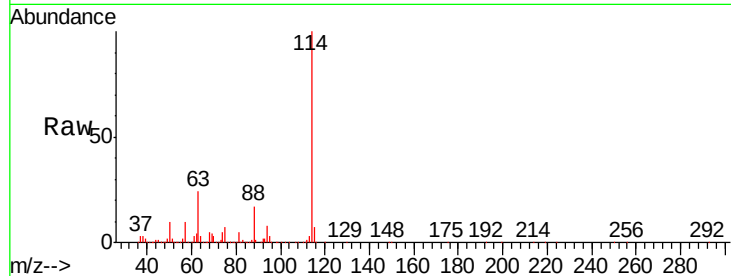
#33  
 1,4-Difluorobenzene  
 Concen: 10.00 ppbv  
 RT: 7.30 min Scan# 1358  
 Delta R.T. -0.00 min  
 Lab File: VL032821.D  
 Acq: 28 Nov 2018 00:05

Instrument :  
 MSVOA\_L  
 ClientSampleId :  
 EP2-SV-05DL

| Tgt Ion | Ratio | Lower | Upper |
|---------|-------|-------|-------|
| 114     | 100   |       |       |
| 63      | 24.6  | 20.9  | 31.3  |
| 88      | 17.4  | 14.4  | 21.6  |

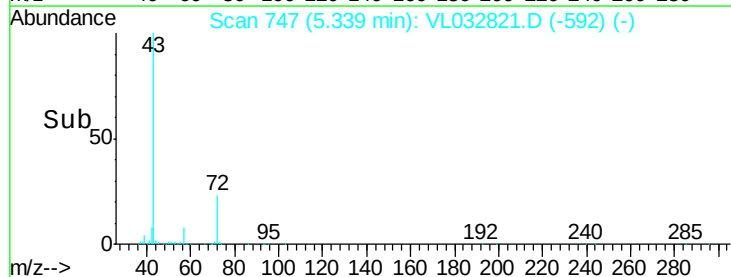
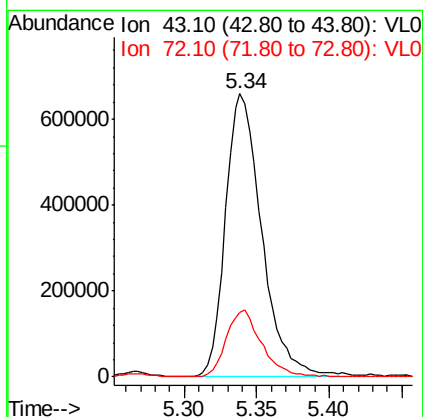
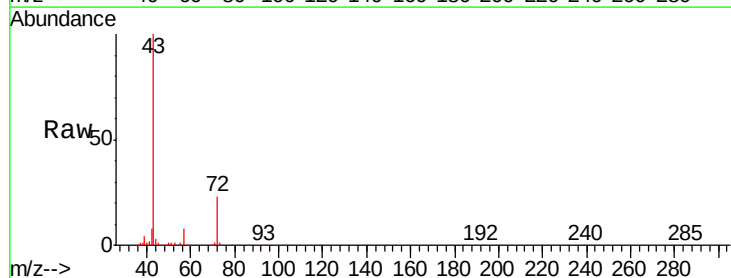
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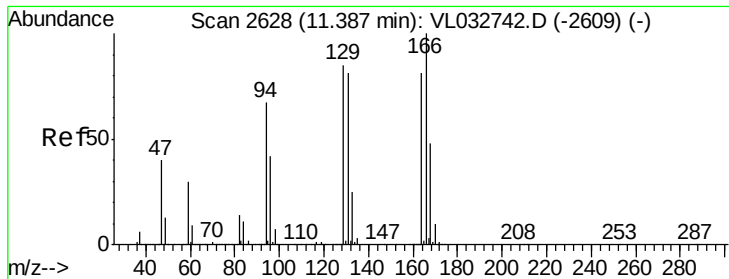
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#34  
 2-Butanone  
 Concen: 6.98 ppbv  
 RT: 5.34 min Scan# 747  
 Delta R.T. -0.00 min  
 Lab File: VL032821.D  
 Acq: 28 Nov 2018 00:05

| Tgt Ion | Ratio | Lower | Upper |
|---------|-------|-------|-------|
| 43      | 100   |       |       |
| 72      | 23.5  | 18.4  | 27.6  |





#52

Tetrachloroethene

Concen: 0.39 ppbv

RT: 11.39 min Scan# 2628

Delta R.T. -0.00 min

Lab File: VL032821.D

Acq: 28 Nov 2018 00:05

Instrument :

MSVOA\_L

ClientSampleId :

EP2-SV-05DL

Tgt Ion:164 Resp: 33999

Ion Ratio Lower Upper

164 100

166 123.2 99.3 148.9

129 95.4 83.9 125.9

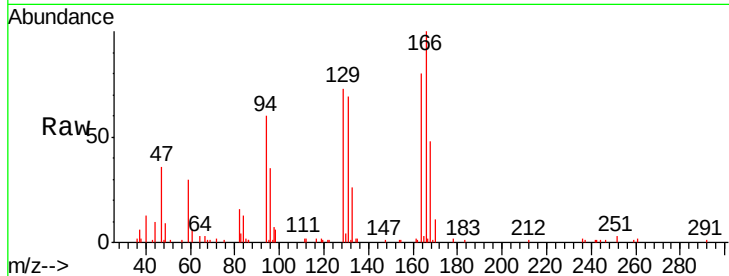
131 86.6 80.8 121.2

Manual Integrations

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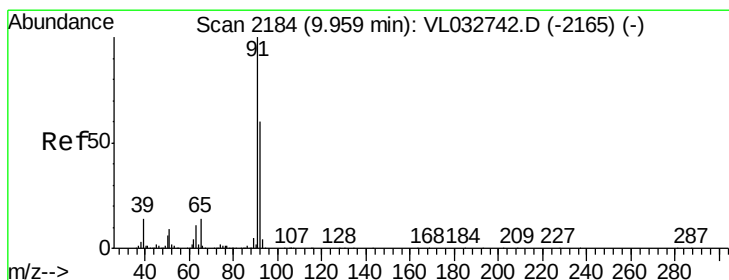
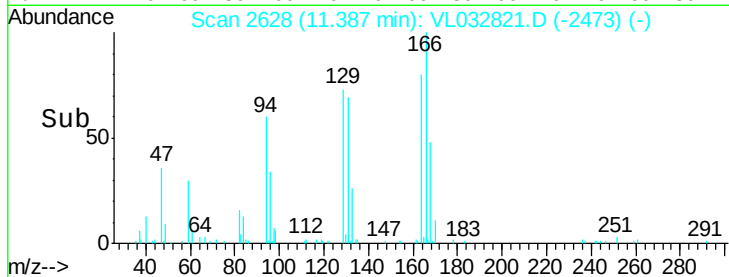
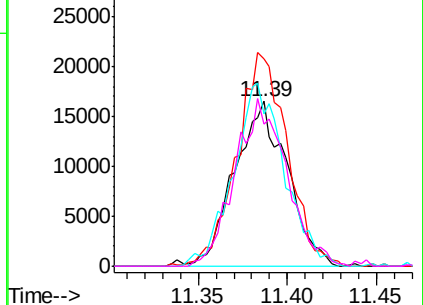


Abundance Ion 163.90 (163.60 to 164.60): V

Ion 165.90 (165.60 to 166.60): V

Ion 129.00 (128.70 to 129.70): V

Ion 131.00 (130.70 to 131.70): V



#53

Toluene

Concen: 0.12 ppbv m

RT: 9.96 min Scan# 2184

Delta R.T. -0.00 min

Lab File: VL032821.D

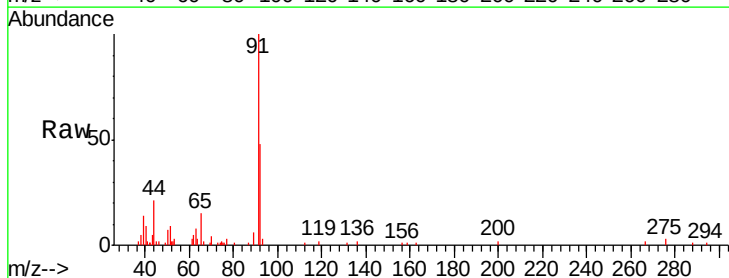
Acq: 28 Nov 2018 00:05

Tgt Ion: 91 Resp: 31691

Ion Ratio Lower Upper

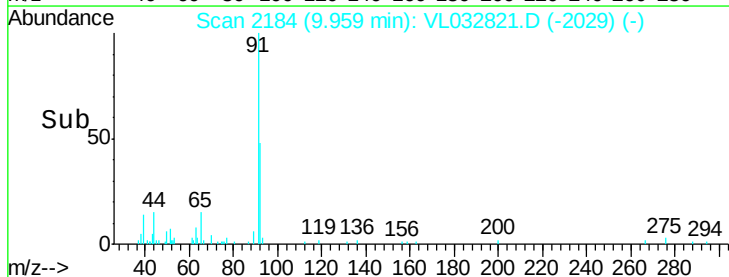
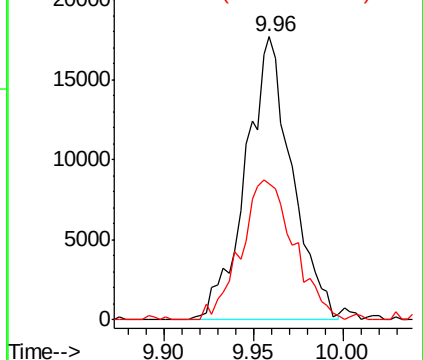
91 100

92 57.2 47.9 71.9

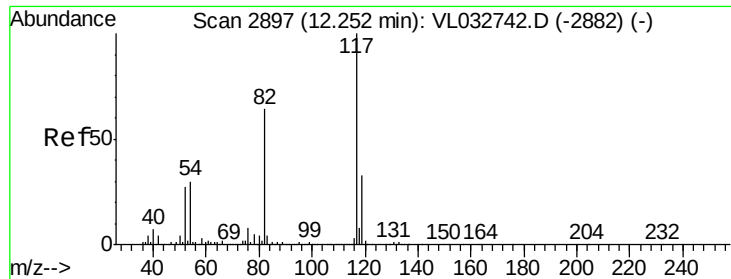


Abundance Ion 91.10 (90.80 to 91.80): VL0

Ion 92.10 (91.80 to 92.80): VL0







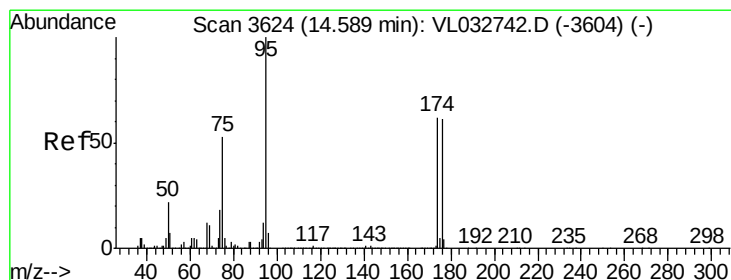
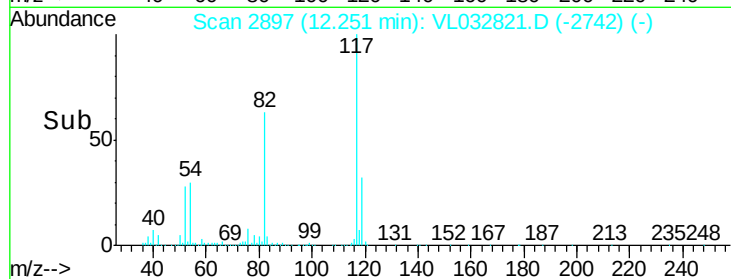
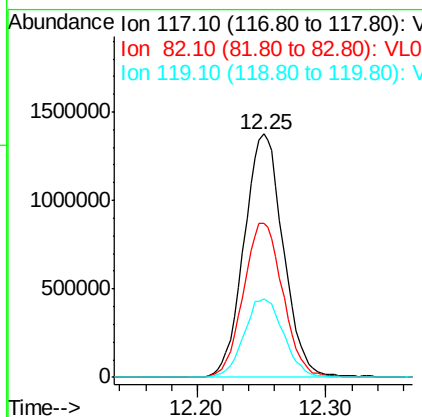
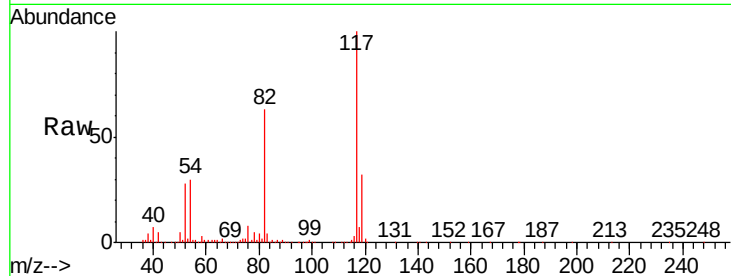
#55  
Chlorobenzene-d5  
Concen: 10.00 ppbv  
RT: 12.25 min Scan# 2897  
Delta R.T. -0.00 min  
Lab File: VL032821.D  
Acq: 28 Nov 2018 00:05

Instrument :  
MSVOA\_L  
ClientSampleId :  
EP2-SV-05DL

Tgt Ion: 117 Resp: 2904926  
Ion Ratio Lower Upper  
117 100  
82 64.6 51.0 76.6  
119 33.0 28.0 42.0

Manual Integrations  
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11/28/2018 4:21:36 PM



#68  
1-Bromo-4-Fluorobenzene  
Concen: 9.77 ppbv  
RT: 14.59 min Scan# 3624  
Delta R.T. -0.00 min  
Lab File: VL032821.D  
Acq: 28 Nov 2018 00:05

Tgt Ion: 95 Resp: 2122896  
Ion Ratio Lower Upper  
95 100  
174 66.1 50.7 76.1  
175 4.9 3.8 5.6

