

Data Path : Z:\voasrv\HPCHEM1\MSVOA\_N\Data\VN082923\  
 Data File : VN079088.D  
 Acq On : 29 Aug 2023 12:52  
 Operator : JC\MD  
 Sample : 04092-01DL 20X  
 Misc : 5.0mL/MSVOA\_N/WATER  
 ALS Vial : 9 Sample Multiplier: 1

Instrument :  
 MSVOA\_N  
 ClientSampleId :

Quant Time: Aug 30 00:04:03 2023  
 Quant Method : Z:\voasrv\HPCHEM1\MSVOA\_N\methods\624N081723W.M  
 Quant Title : METHOD 624 VOLATILE ORGANIC ANALYSIS  
 QLast Update : Fri Aug 18 05:21:14 2023  
 Response via : Initial Calibration

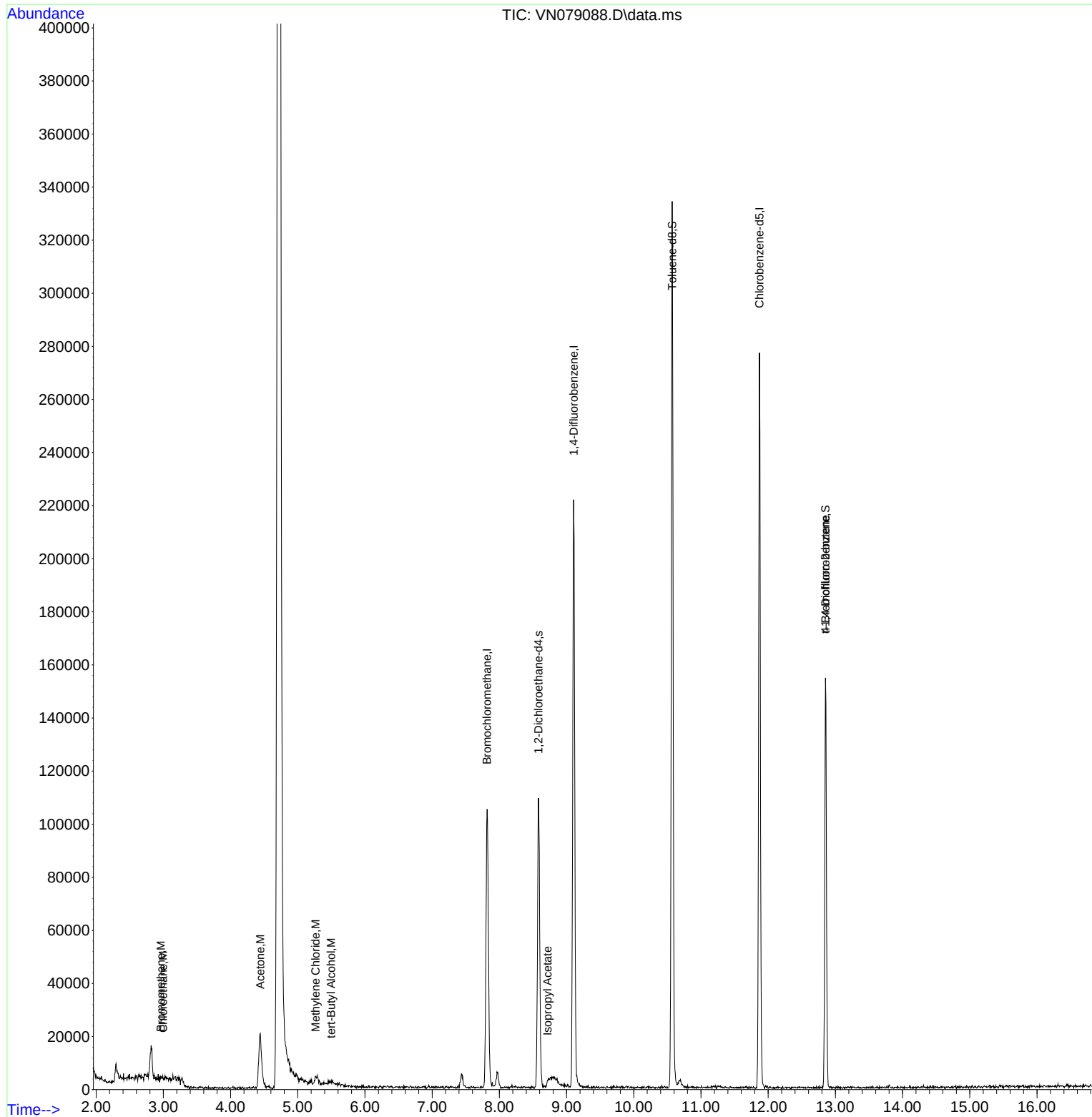
| Compound                    | R.T.   | QIon  | Response | Conc     | Units  | Dev(Min) |
|-----------------------------|--------|-------|----------|----------|--------|----------|
| -----                       |        |       |          |          |        |          |
| Internal Standards          |        |       |          |          |        |          |
| 1) Bromochloromethane       | 7.818  | 128   | 34977    | 30.000   | ug/l   | 0.00     |
| 28) 1,4-Difluorobenzene     | 9.106  | 114   | 184476   | 30.000   | ug/l   | 0.00     |
| 57) Chlorobenzene-d5        | 11.870 | 117   | 156080   | 30.000   | ug/l   | 0.00     |
| System Monitoring Compounds |        |       |          |          |        |          |
| 27) 1,2-Dichloroethane-d4   | 8.582  | 65    | 85426    | 30.147   | ug/l   | 0.00     |
| Spiked Amount               | 30.000 | Range | 91 - 110 | Recovery | =      | 100.500% |
| 60) 4-Bromofluorobenzene    | 12.853 | 95    | 49566    | 21.770   | ug/l   | 0.00     |
| Spiked Amount               | 30.000 | Range | 63 - 112 | Recovery | =      | 72.567%  |
| 63) Toluene-d8              | 10.571 | 98    | 218992   | 30.045   | ug/l   | 0.00     |
| Spiked Amount               | 30.000 | Range | 91 - 112 | Recovery | =      | 100.167% |
| Target Compounds            |        |       |          |          |        |          |
|                             |        |       |          |          | Qvalue |          |
| 5) Bromomethane             | 2.965  | 94    | 684      | 0.423    | ug/l # | 51       |
| 6) Chloroethane             | 2.995  | 64    | 1378     | 0.810    | ug/l   | 95       |
| 15) Acetone                 | 4.442  | 58    | 10443    | 29.822   | ug/l   | 90       |
| 18) Methylene Chloride      | 5.265  | 84    | 1207     | 0.545    | ug/l # | 86       |
| 23) tert-Butyl Alcohol      | 5.494  | 59    | 145      | 0.341    | ug/l # | 100      |
| 44) Isopropyl Acetate       | 8.718  | 43    | 1210     | 0.215    | ug/l # | 63       |
| 77) t-1,4-Dichloro-2-butene | 12.853 | 75    | 29077    | 32.044   | ug/l # | 3        |
| -----                       |        |       |          |          |        |          |

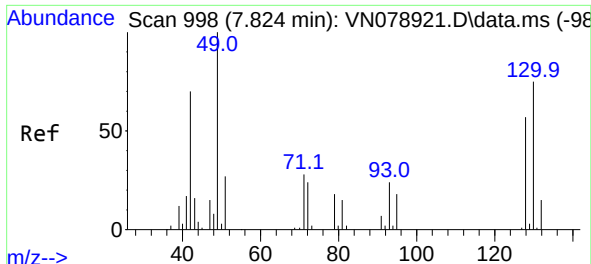
(#) = qualifier out of range (m) = manual integration (+) = signals summed

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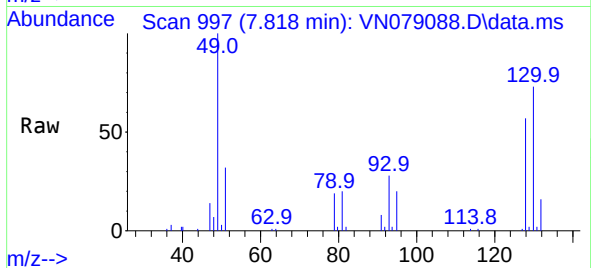
Quant Time: Aug 30 00:04:03 2023  
Quant Method : Z:\voasrv\HPCHEM1\MSVOA\_N\methods\624N081723W.M  
Quant Title : METHOD 624 VOLATILE ORGANIC ANALYSIS  
QLast Update : Fri Aug 18 05:21:14 2023  
Response via : Initial Calibration



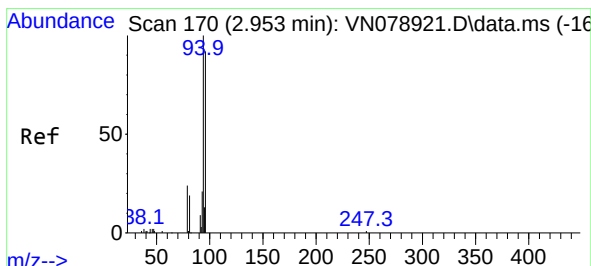
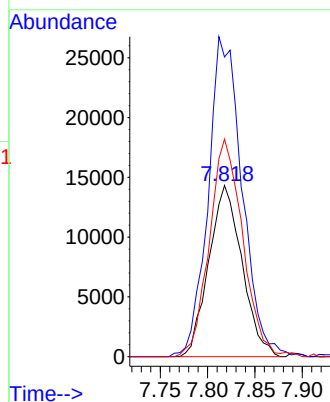
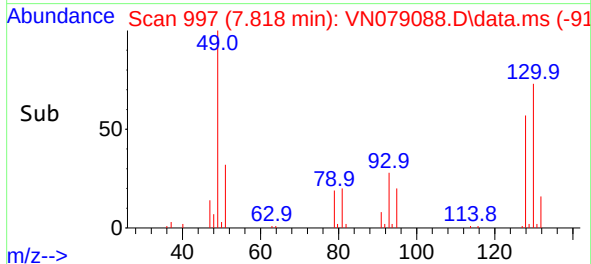


#1  
Bromochloromethane  
Concen: 30.000 ug/l  
RT: 7.818 min Scan# 91  
Delta R.T. -0.006 min  
Lab File: VN079088.D  
Acq: 29 Aug 2023 12:52

Instrument :  
MSVOA\_N  
ClientSampleId :

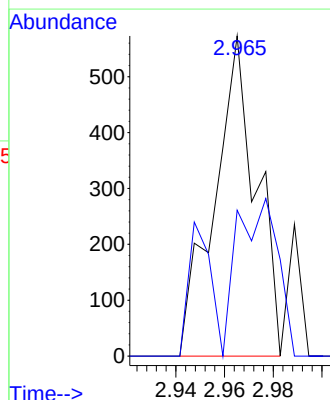
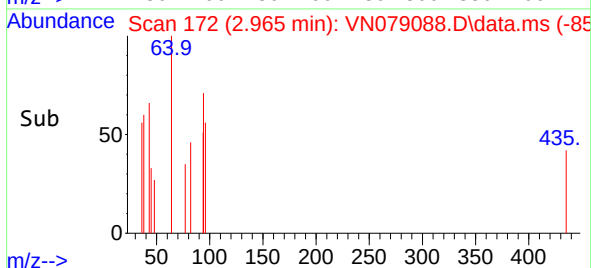
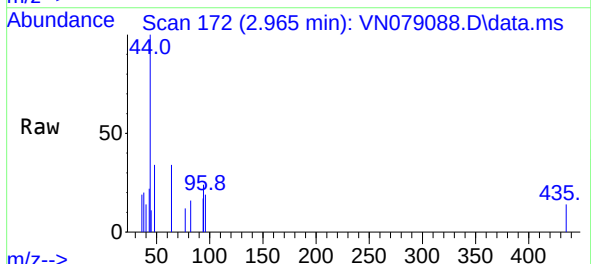


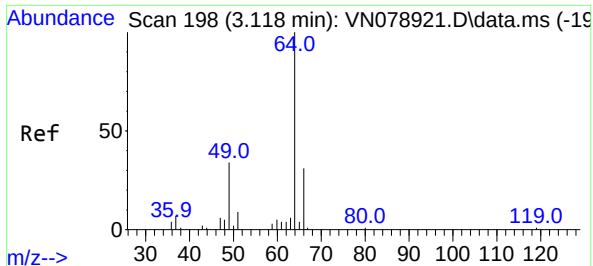
Tgt Ion:128 Resp: 34977  
Ion Ratio Lower Upper  
128 100  
49 190.5 0.0 481.8  
130 127.1 0.0 320.5



#5  
Bromomethane  
Concen: 0.423 ug/l  
RT: 2.965 min Scan# 172  
Delta R.T. 0.012 min  
Lab File: VN079088.D  
Acq: 29 Aug 2023 12:52

Tgt Ion: 94 Resp: 684  
Ion Ratio Lower Upper  
94 100  
96 45.5 73.6 110.4#

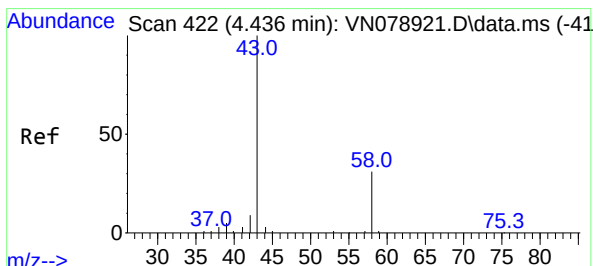
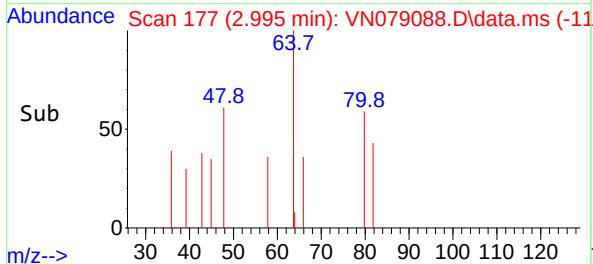
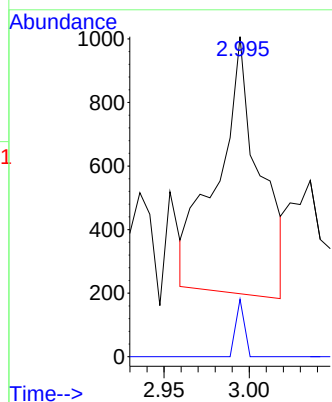
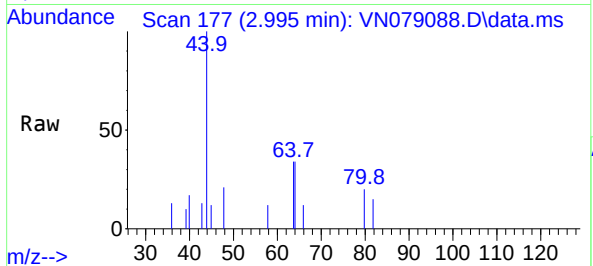




#6  
Chloroethane  
Concen: 0.810 ug/l  
RT: 2.995 min Scan# 11  
Delta R.T. -0.123 min  
Lab File: VN079088.D  
Acq: 29 Aug 2023 12:52

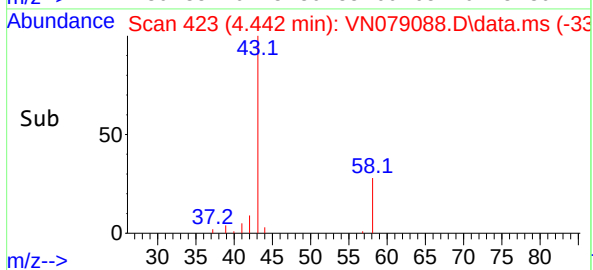
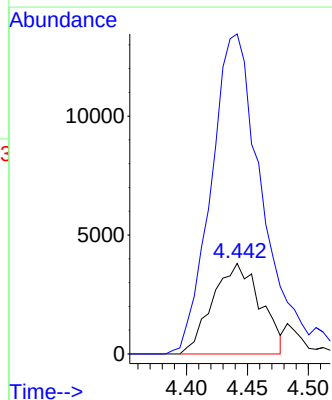
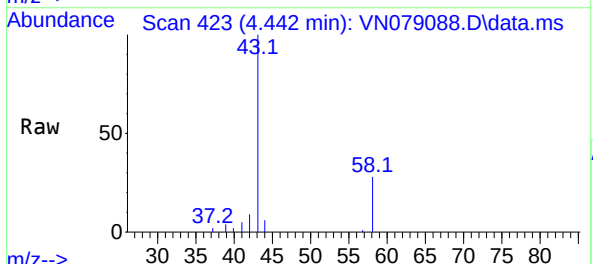
Instrument :  
MSVOA\_N  
ClientSampleId :

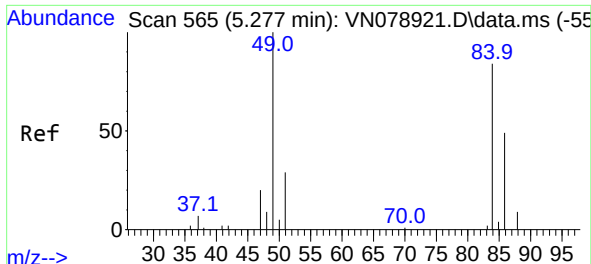
Tgt Ion: 64 Resp: 1378  
Ion Ratio Lower Upper  
64 100  
66 28.2 24.9 37.3



#15  
Acetone  
Concen: 29.822 ug/l  
RT: 4.442 min Scan# 423  
Delta R.T. 0.006 min  
Lab File: VN079088.D  
Acq: 29 Aug 2023 12:52

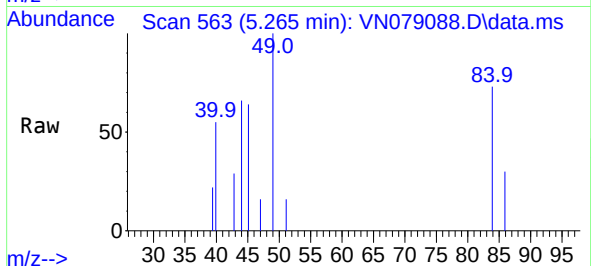
Tgt Ion: 58 Resp: 10443  
Ion Ratio Lower Upper  
58 100  
43 346.3 260.6 390.8





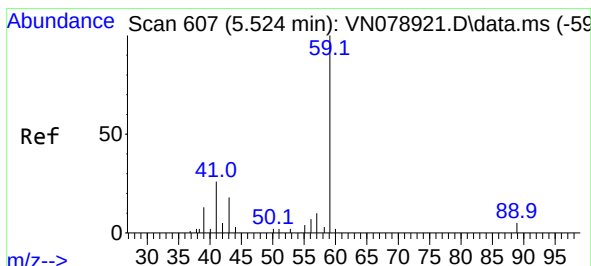
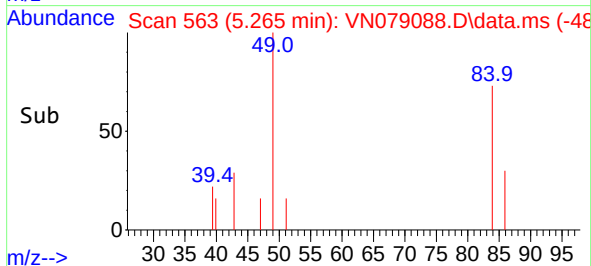
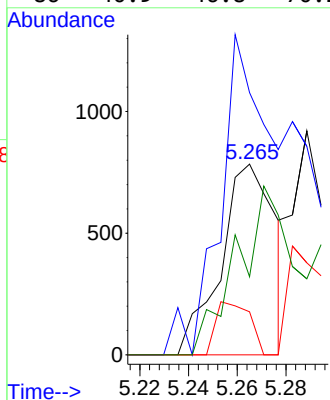
#18  
Methylene Chloride  
Concen: 0.545 ug/l  
RT: 5.265 min Scan# 51  
Delta R.T. -0.012 min  
Lab File: VN079088.D  
Acq: 29 Aug 2023 12:52

Instrument :  
MSVOA\_N  
ClientSampleId :



Tgt Ion: 84 Resp: 1207

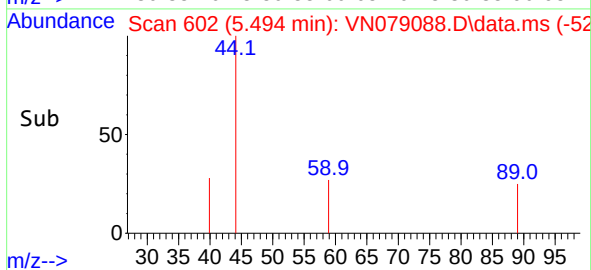
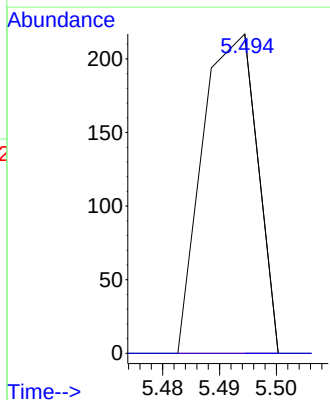
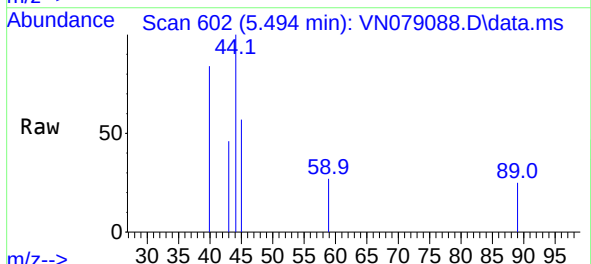
| Ion | Ratio | Lower | Upper |
|-----|-------|-------|-------|
| 84  | 100   |       |       |
| 49  | 112.8 | 95.8  | 143.6 |
| 51  | 22.6  | 28.6  | 43.0# |
| 86  | 40.9  | 46.8  | 70.2# |

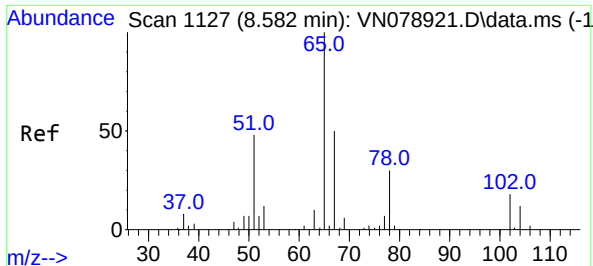


#23  
tert-Butyl Alcohol  
Concen: 0.341 ug/l  
RT: 5.494 min Scan# 602  
Delta R.T. -0.029 min  
Lab File: VN079088.D  
Acq: 29 Aug 2023 12:52

Tgt Ion: 59 Resp: 145

| Ion | Ratio | Lower | Upper |
|-----|-------|-------|-------|
| 59  | 100   |       |       |
| 52  | 0.0   | 0.0   | 0.0   |

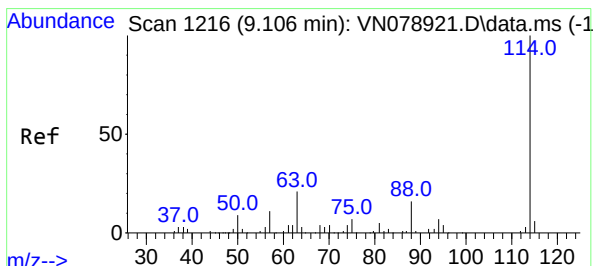
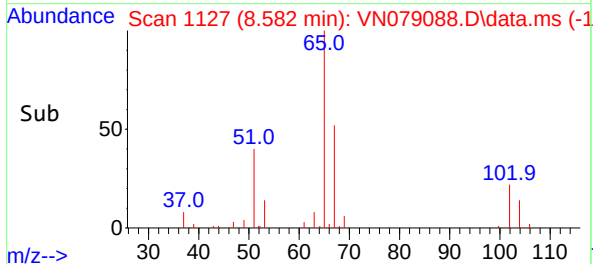
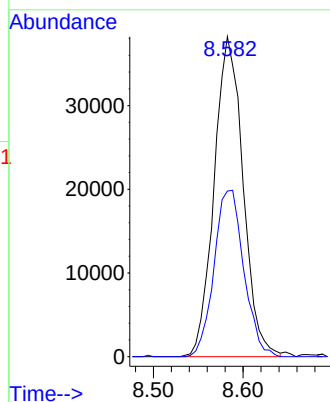
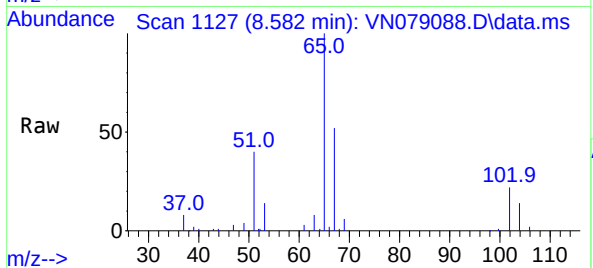




#27  
1,2-Dichloroethane-d4  
Concen: 30.147 ug/l  
RT: 8.582 min Scan# 1127  
Delta R.T. 0.000 min  
Lab File: VN079088.D  
Acq: 29 Aug 2023 12:52

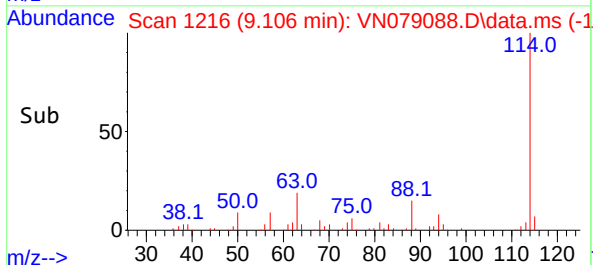
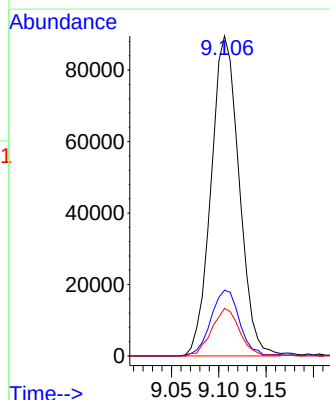
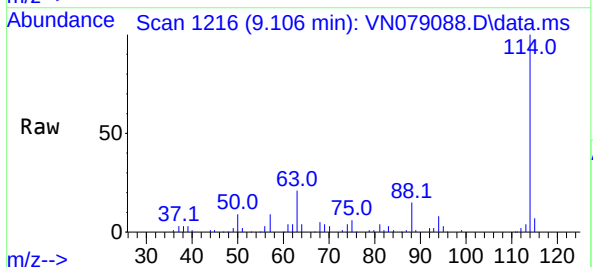
Instrument :  
MSVOA\_N  
ClientSampleId :

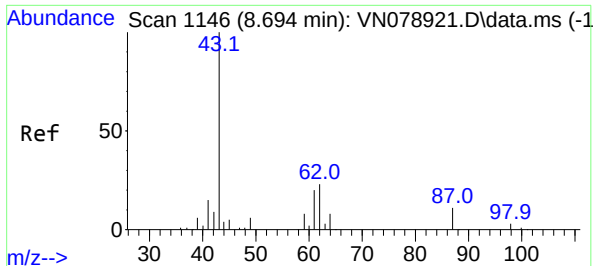
Tgt Ion: 65 Resp: 85426  
Ion Ratio Lower Upper  
65 100  
67 53.6 40.7 61.1



#28  
1,4-Difluorobenzene  
Concen: 30.000 ug/l  
RT: 9.106 min Scan# 1216  
Delta R.T. 0.000 min  
Lab File: VN079088.D  
Acq: 29 Aug 2023 12:52

Tgt Ion: 114 Resp: 184476  
Ion Ratio Lower Upper  
114 100  
63 20.9 17.4 26.2  
88 14.6 12.0 18.0

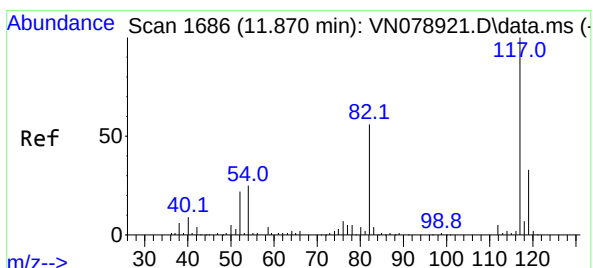
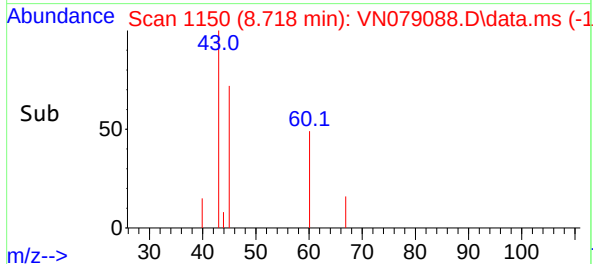
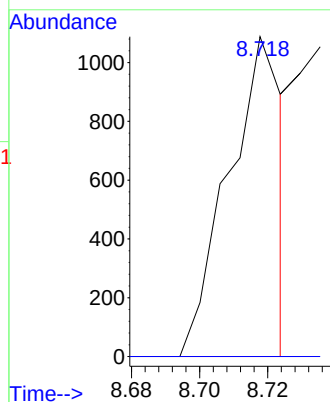
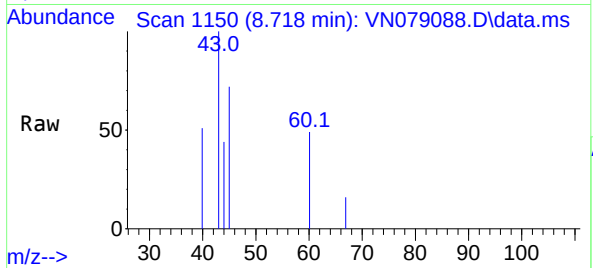




#44  
Isopropyl Acetate  
Concen: 0.215 ug/l  
RT: 8.718 min Scan# 1146  
Delta R.T. 0.024 min  
Lab File: VN079088.D  
Acq: 29 Aug 2023 12:52

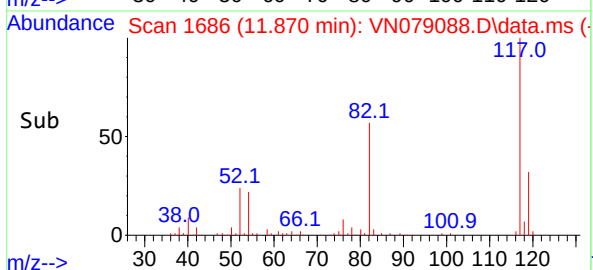
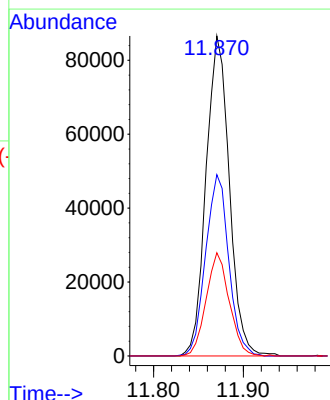
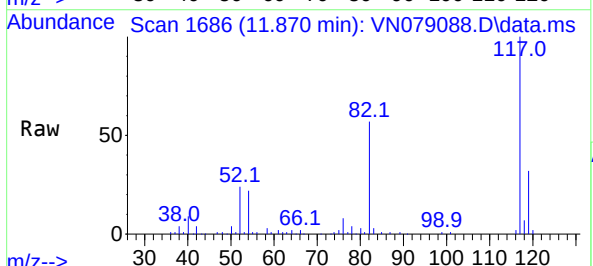
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ClientSampleId :

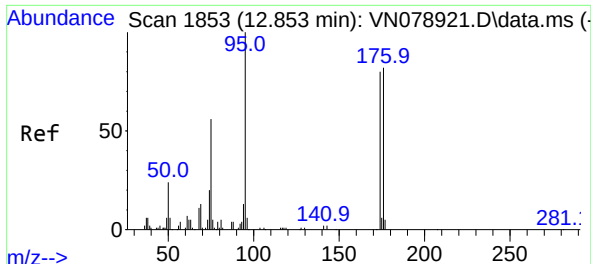
Tgt Ion: 43 Resp: 1210  
Ion Ratio Lower Upper  
43 100  
61 5.4 19.0 28.4#



#57  
Chlorobenzene-d5  
Concen: 30.000 ug/l  
RT: 11.870 min Scan# 1686  
Delta R.T. 0.000 min  
Lab File: VN079088.D  
Acq: 29 Aug 2023 12:52

Tgt Ion: 117 Resp: 156080  
Ion Ratio Lower Upper  
117 100  
82 56.4 43.4 65.0  
119 31.9 25.5 38.3

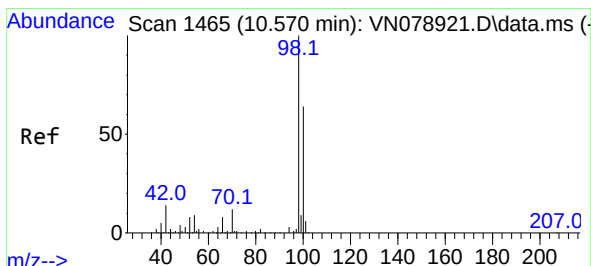
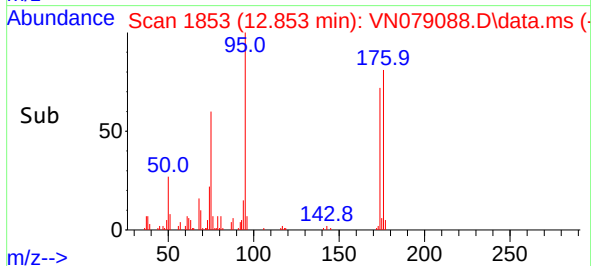
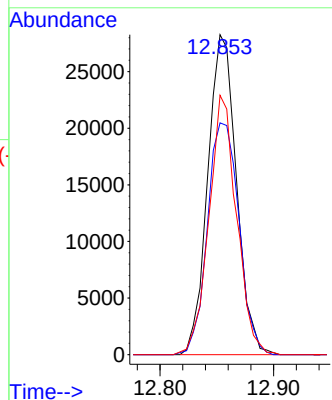
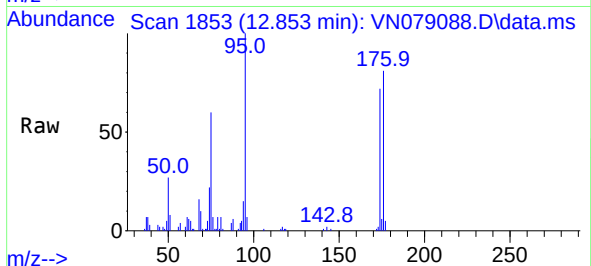




#60  
4-Bromofluorobenzene  
Concen: 21.770 ug/l  
RT: 12.853 min Scan# 11  
Delta R.T. 0.000 min  
Lab File: VN079088.D  
Acq: 29 Aug 2023 12:52

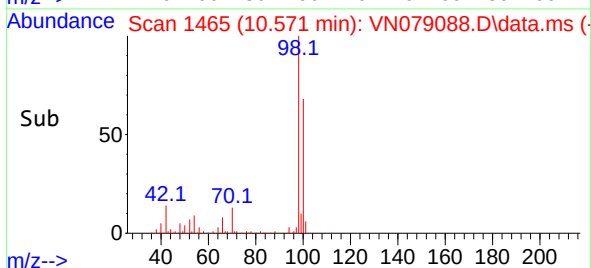
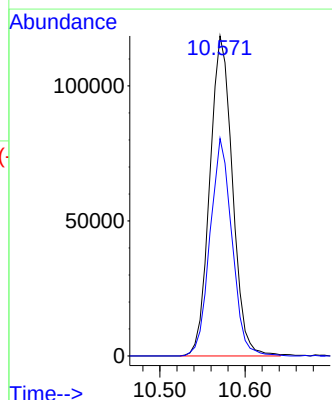
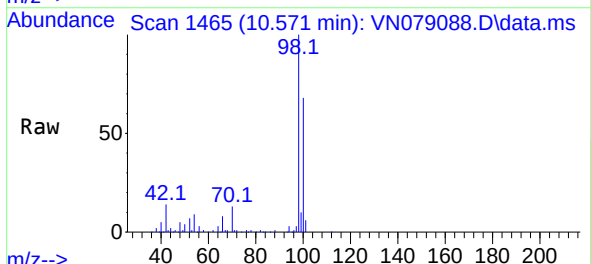
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Tgt Ion: 95 Resp: 49566  
Ion Ratio Lower Upper  
95 100  
174 79.7 64.8 97.2  
176 78.2 63.0 94.6

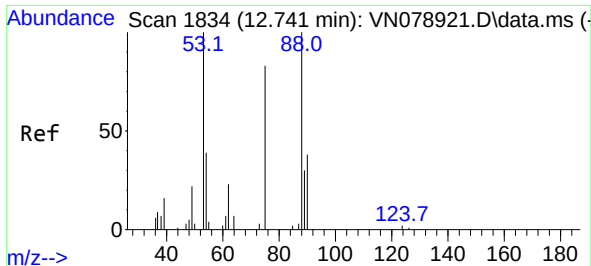


#63  
Toluene-d8  
Concen: 30.045 ug/l  
RT: 10.571 min Scan# 1465  
Delta R.T. 0.000 min  
Lab File: VN079088.D  
Acq: 29 Aug 2023 12:52

Tgt Ion: 98 Resp: 218992  
Ion Ratio Lower Upper  
98 100  
100 65.9 51.1 76.7







#77

t-1,4-Dichloro-2-butene

Concen: 32.044 ug/l

RT: 12.853 min Scan# 11

Delta R.T. 0.112 min

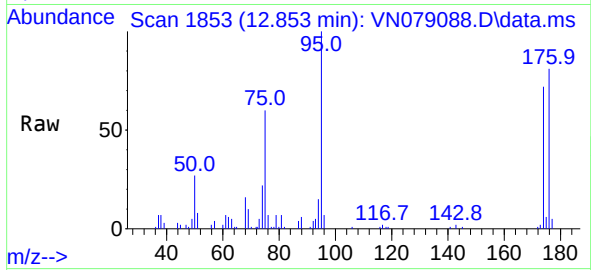
Lab File: VN079088.D

Acq: 29 Aug 2023 12:52

Instrument :

MSVOA\_N

ClientSampleId :



Tgt Ion: 75 Resp: 29077

Ion Ratio Lower Upper

75 100

53 0.0 60.1 180.3#

89 0.0 22.9 68.8#

