

Data Path : Z:\voasrv\HPCHEM1\MSVOA_U\Data\VU100922\
 Data File : VU051305.D
 Acq On : 09 Oct 2022 17:16
 Operator : JC/MD
 Sample : N5013-04
 Misc : 25.0mL/MSVOA_U/WATER
 ALS Vial : 13 Sample Multiplier: 1

Instrument :
 MSVOA_U
 ClientSampleId :
 BHA41

Quant Time: Oct 10 01:28:42 2022
 Quant Method : Z:\voasrv\HPCHEM1\MSVOA_U\Method\SFAMUTR100722WMA.M
 Quant Title : TRACE VOA SFAM1.0
 QLast Update : Mon Oct 10 01:25:26 2022
 Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)

Internal Standards						
1) 1,4-Difluorobenzene	6.247	114	248041	5.000	ug/L	0.00
28) Chlorobenzene-d5	9.414	117	240054	5.000	ug/L	0.00
58) 1,4-Dichlorobenzene-d4	11.809	152	130299	5.000	ug/L	0.00
System Monitoring Compounds						
4) Vinyl Chloride-d3	1.598	65	67963	3.397	ug/L	0.00
Spiked Amount	5.000	Range	40 - 130	Recovery	=	68.000%
7) Chloroethane-d5	1.909	69	67659	3.936	ug/L	0.00
Spiked Amount	5.000	Range	65 - 130	Recovery	=	78.800%
11) 1,1-Dichloroethene-d2	2.562	65	28284	3.576	ug/L	0.00
Spiked Amount	5.000	Range	60 - 125	Recovery	=	71.600%
20) 2-Butanone-d5	4.620	46	259215	58.844	ug/L	-0.01
Spiked Amount	50.000	Range	40 - 130	Recovery	=	117.680%
24) Chloroform-d	5.060	84	161790	4.337	ug/L	0.00
Spiked Amount	5.000	Range	70 - 125	Recovery	=	86.800%
26) 1,2-Dichloroethane-d4	5.700	65	89650	4.660	ug/L	0.00
Spiked Amount	5.000	Range	70 - 130	Recovery	=	93.200%
32) Benzene-d6	5.726	84	317744	4.812	ug/L	0.00
Spiked Amount	5.000	Range	70 - 125	Recovery	=	96.200%
36) 1,2-Dichloropropane-d6	6.687	67	108889	4.855	ug/L	0.00
Spiked Amount	5.000	Range	60 - 140	Recovery	=	97.200%
41) Toluene-d8	7.896	98	262505	4.443	ug/L	0.00
Spiked Amount	5.000	Range	70 - 130	Recovery	=	88.800%
43) trans-1,3-Dichloroprop...	8.176	79	38645	5.245	ug/L	0.00
Spiked Amount	5.000	Range	55 - 130	Recovery	=	104.800%
46) 2-Hexanone-d5	8.629	63	172388	69.417	ug/L	0.00
Spiked Amount	50.000	Range	45 - 130	Recovery	=	138.840%#
56) 1,1,2,2-Tetrachloroeth...	10.755	84	97289	5.430	ug/L	0.00
Spiked Amount	5.000	Range	65 - 120	Recovery	=	108.600%
66) 1,2-Dichlorobenzene-d4	12.192	152	114159	5.041	ug/L	0.00
Spiked Amount	5.000	Range	80 - 120	Recovery	=	100.800%
Target Compounds						
					Qvalue	
5) Vinyl chloride	1.601	62	60661	2.177	ug/L	94
8) Chloroethane	1.932	64	141122	7.941	ug/L	99
10) 1,1,2-Trichloro-1,2,2-...	2.559	101	1437	0.075	ug/L #	58
13) Acetone	2.623	43	143809	43.526	ug/L	99
17) Methyl tert-butyl Ether	3.363	73	8229	0.199	ug/L #	1
18) trans-1,2-Dichloroethene	3.353	96	2925	0.154	ug/L	92
19) 1,1-Dichloroethane	3.868	63	51494	1.311	ug/L	97
21) 2-Butanone	4.707	43	49589	9.524	ug/L	76
22) cis-1,2-Dichloroethene	4.665	96	559232	26.530	ug/L	96
27) 1,2-Dichloroethane	5.774	62	113556	4.622	ug/L #	74
29) 1,1,1-Trichloroethane	5.318	97	2994	0.104	ug/L	98
30) Cyclohexane	5.385	56	8530	0.350	ug/L	94
33) Benzene	5.774	78	13524567	168.760	ug/L	100
35) Methylcyclohexane	6.758	83	7514	0.298	ug/L	94
40) 4-Methyl-2-pentanone	7.790	43	57363	4.978	ug/L	96
44) trans-1,3-Dichloropropene	7.970	75	130626	5.722	ug/L #	1
49) Dibromochloromethane	8.552	129	2178	0.126	ug/L #	11
51) Chlorobenzene	9.446	112	2199338	43.271	ug/L	100
52) Ethylbenzene	9.568	91	2531106	33.111	ug/L	99

Data Path : Z:\voasrv\HPCHEM1\MSVOA_U\Data\VU100922\
 Data File : VU051305.D
 Acq On : 09 Oct 2022 17:16
 Operator : JC/MD
 Sample : N5013-04
 Misc : 25.0mL/MSVOA_U/WATER
 ALS Vial : 13 Sample Multiplier: 1

Instrument :
 MSVOA_U
 ClientSampleId :
 BHA41

Quant Time: Oct 10 01:28:42 2022
 Quant Method : Z:\voasrv\HPCHEM1\MSVOA_U\Method\SFAMUTR100722WMA.M
 Quant Title : TRACE VOA SFAM1.0
 QLast Update : Mon Oct 10 01:25:26 2022
 Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)

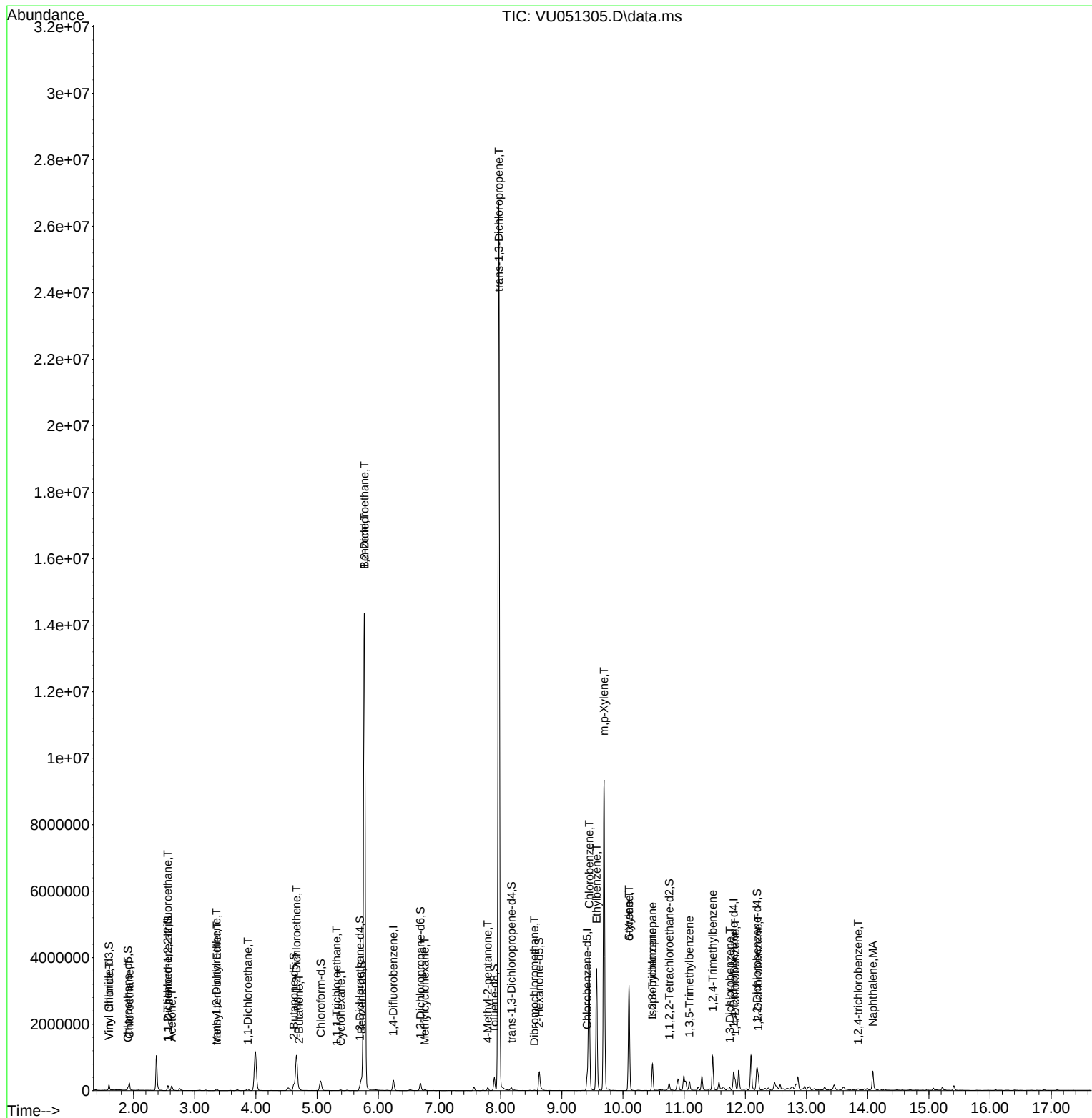
53) m,p-Xylene	9.691	106	2522859	85.095	ug/L	98
54) o-Xylene	10.099	106	813297	28.992	ug/L	99
55) Styrene	10.099	104	44339	0.918	ug/L #	1
60) Isopropylbenzene	10.481	105	498286	6.038	ug/L	99
61) 1,2,3-Trichloropropane	10.481	75	6491	0.395	ug/L #	1
62) 1,3,5-Trimethylbenzene	11.086	105	130673	5.969	ug/L	99
63) 1,2,4-Trimethylbenzene	11.465	105	542762	8.766	ug/L	100
64) 1,3-Dichlorobenzene	11.745	146	20287	0.497	ug/L	96
65) 1,4-Dichlorobenzene	11.835	146	105754	2.628	ug/L	98
67) 1,2-Dichlorobenzene	12.211	146	122450	3.086	ug/L	99
70) 1,2,4-trichlorobenzene	13.841	180	3292	0.165	ug/L #	79
71) Naphthalene	14.083	128	438031	11.783	ug/L	98

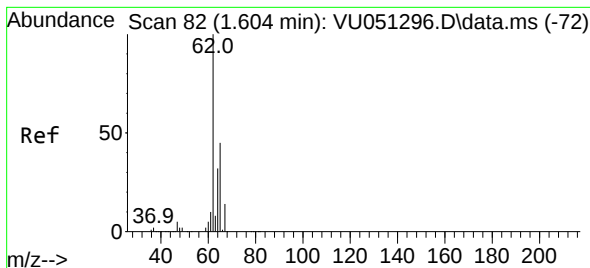
(#) = qualifier out of range (m) = manual integration (+) = signals summed

Data Path : Z:\voasrv\HPCHEM1\MSVOA_U\Data\VU100922\
Data File : VU051305.D
Acq On : 09 Oct 2022 17:16
Operator : JC/MD
Sample : N5013-04
Misc : 25.0mL/MSVOA_U/WATER
ALS Vial : 13 Sample Multiplier: 1

Instrument :
MSVOA_U
ClientSampleId :
BHA41

Quant Time: Oct 10 01:28:42 2022
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_U\Method\SFAMUTR100722WMA.M
Quant Title : TRACE VOA SFAM1.0
QLast Update : Mon Oct 10 01:25:26 2022
Response via : Initial Calibration





#5

Vinyl chloride

Concen: 2.177 ug/L

RT: 1.601 min Scan# 81

Delta R.T. -0.003 min

Lab File: VU051305.D

Acq: 09 Oct 2022 17:16

Instrument :

MSVOA_U

ClientSampleId :

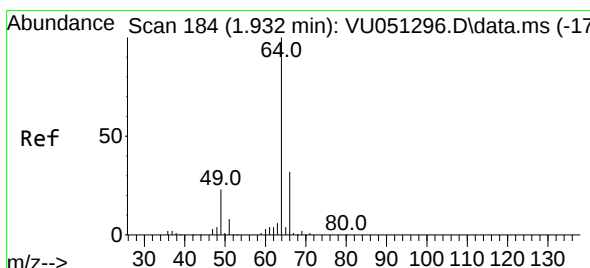
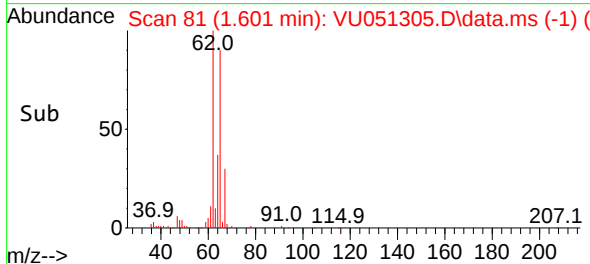
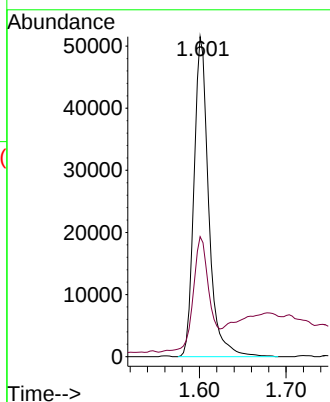
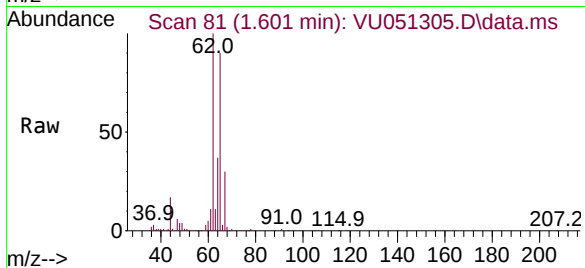
BHA41

Tgt Ion: 62 Resp: 60661

Ion Ratio Lower Upper

62 100

64 37.5 24.0 44.6



#8

Chloroethane

Concen: 7.941 ug/L

RT: 1.932 min Scan# 184

Delta R.T. 0.000 min

Lab File: VU051305.D

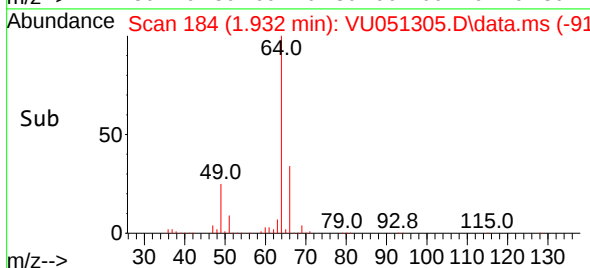
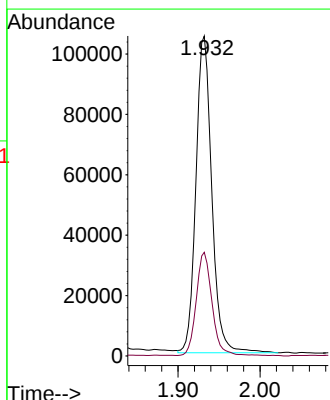
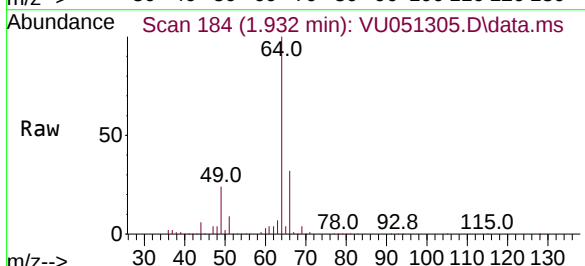
Acq: 09 Oct 2022 17:16

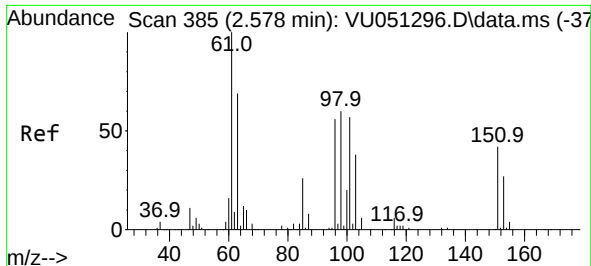
Tgt Ion: 64 Resp: 141122

Ion Ratio Lower Upper

64 100

66 32.4 22.3 41.3

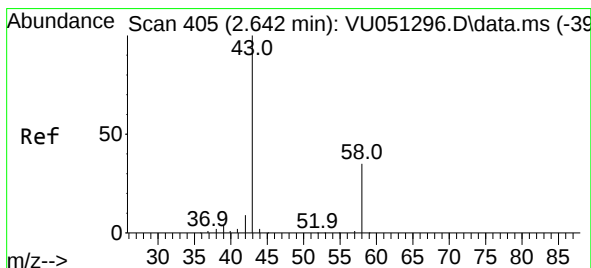
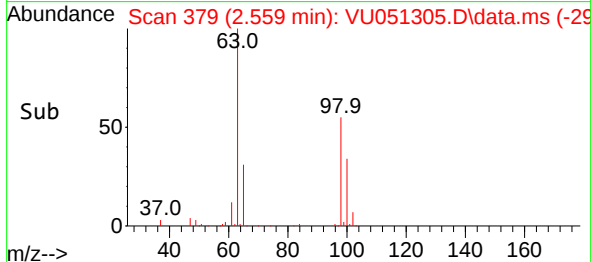
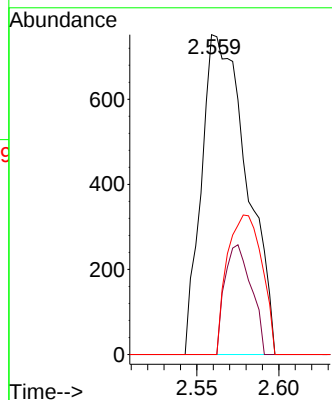
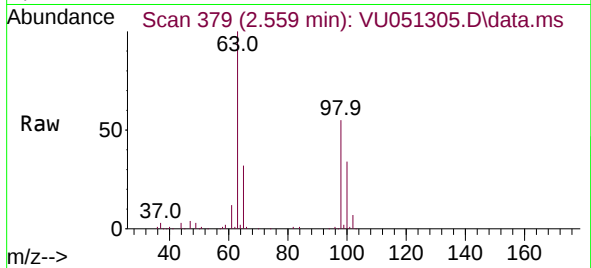




#10
1,1,2-Trichloro-1,2,2-trifluoroethane
Concen: 0.075 ug/L
RT: 2.559 min Scan# 31
Delta R.T. -0.019 min
Lab File: VU051305.D
Acq: 09 Oct 2022 17:16

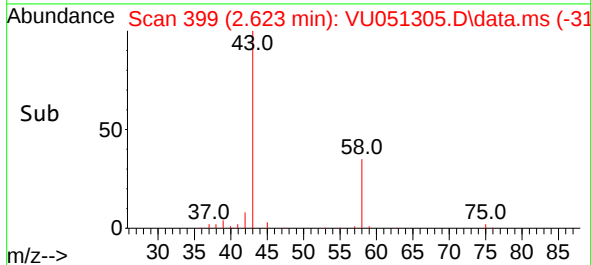
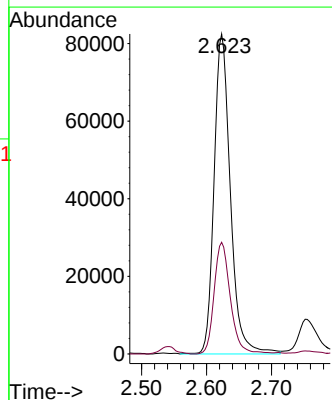
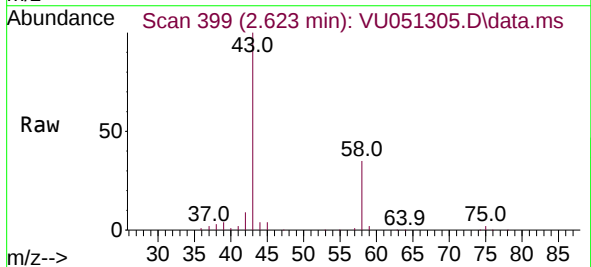
Instrument :
MSVOA_U
ClientSampleId :
BHA41

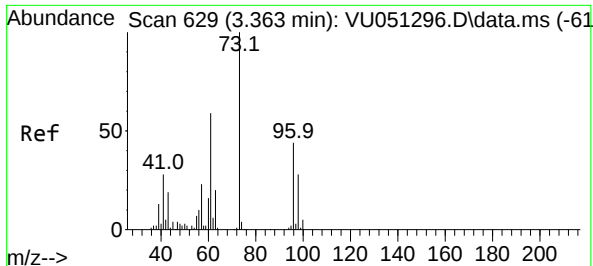
Tgt Ion:101 Resp: 1437
Ion Ratio Lower Upper
101 100
85 20.1 34.6 51.8#
151 33.3 56.5 84.7#



#13
Acetone
Concen: 43.526 ug/L
RT: 2.623 min Scan# 399
Delta R.T. -0.019 min
Lab File: VU051305.D
Acq: 09 Oct 2022 17:16

Tgt Ion: 43 Resp: 143809
Ion Ratio Lower Upper
43 100
58 34.8 0.0 68.8

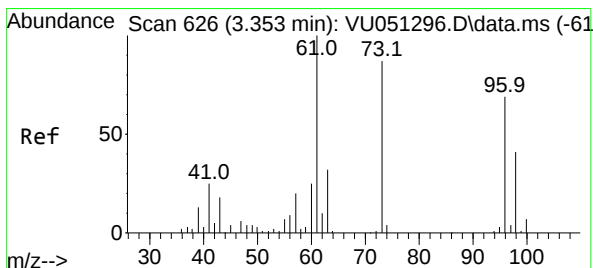
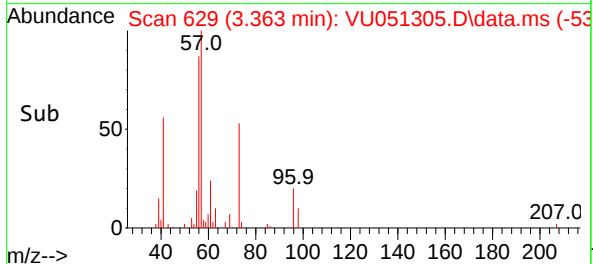
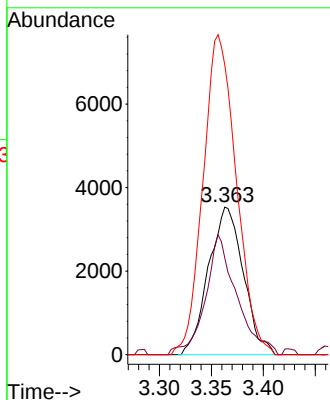
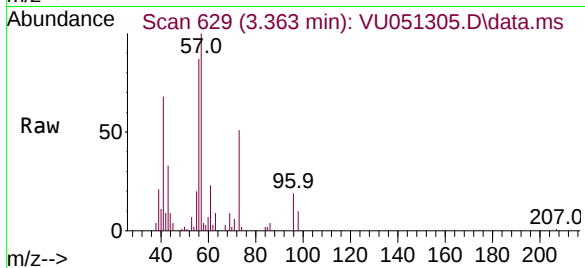




#17
Methyl tert-butyl Ether
Concen: 0.199 ug/L
RT: 3.363 min Scan# 61
Delta R.T. 0.000 min
Lab File: VU051305.D
Acq: 09 Oct 2022 17:16

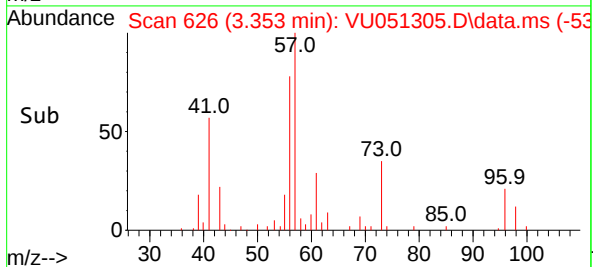
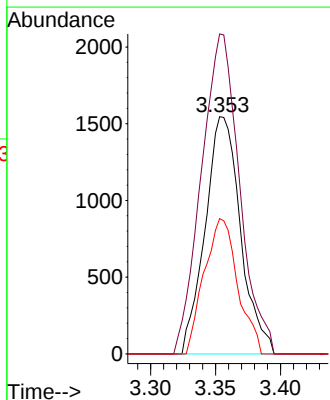
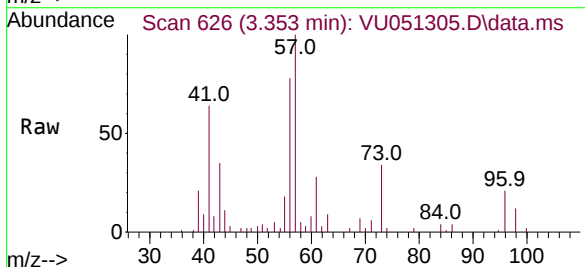
Instrument :
MSVOA_U
ClientSampleId :
BHA41

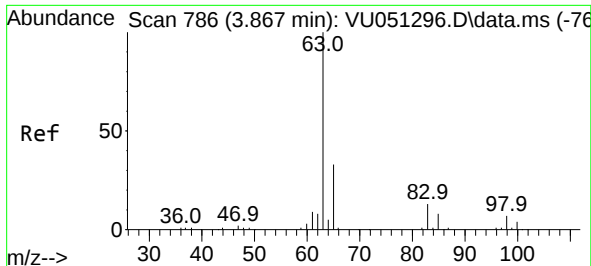
Tgt Ion: 73 Resp: 8229
Ion Ratio Lower Upper
73 100
43 72.8 15.4 23.0#
57 207.2 18.9 28.3#



#18
trans-1,2-Dichloroethene
Concen: 0.154 ug/L
RT: 3.353 min Scan# 626
Delta R.T. 0.000 min
Lab File: VU051305.D
Acq: 09 Oct 2022 17:16

Tgt Ion: 96 Resp: 2925
Ion Ratio Lower Upper
96 100
61 134.9 101.4 188.2
98 57.1 44.9 83.5





#19

1,1-Dichloroethane

Concen: 1.311 ug/L

RT: 3.868 min Scan# 786

Delta R.T. 0.000 min

Lab File: VU051305.D

Acq: 09 Oct 2022 17:16

Instrument :

MSVOA_U

ClientSampleId :

BHA41

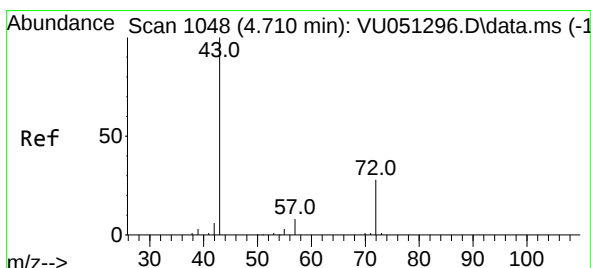
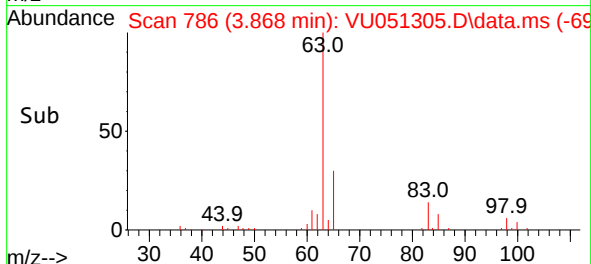
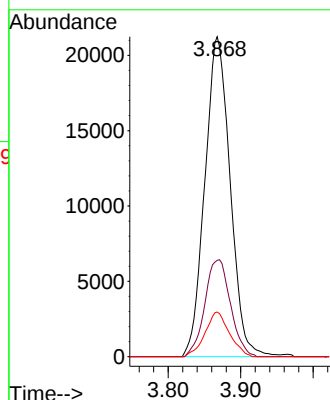
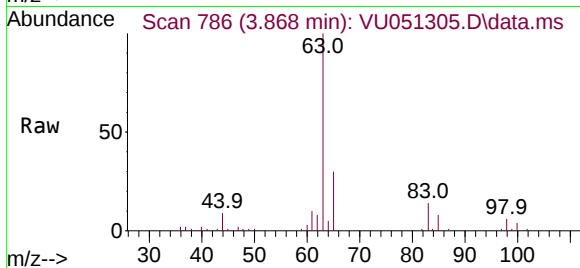
Tgt Ion: 63 Resp: 51494

Ion Ratio Lower Upper

63 100

65 30.1 22.0 41.0

83 14.0 9.0 16.6



#21

2-Butanone

Concen: 9.524 ug/L

RT: 4.707 min Scan# 1047

Delta R.T. -0.003 min

Lab File: VU051305.D

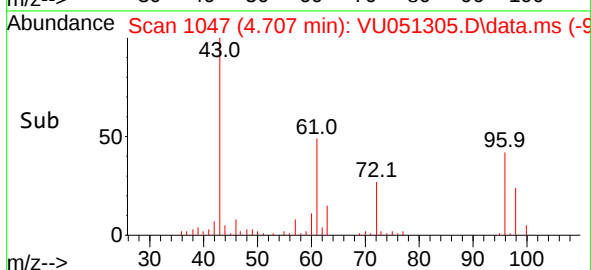
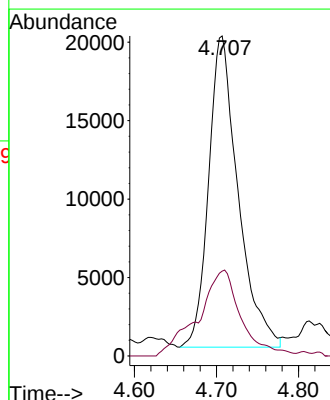
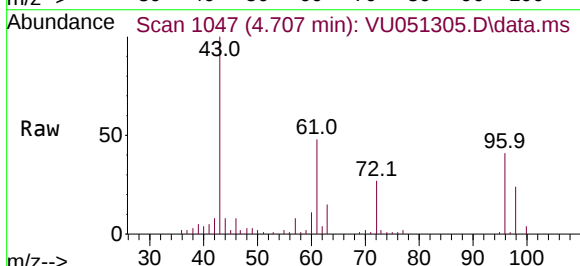
Acq: 09 Oct 2022 17:16

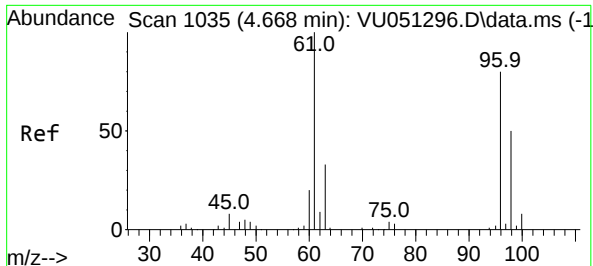
Tgt Ion: 43 Resp: 49589

Ion Ratio Lower Upper

43 100

72 40.0 13.8 41.4

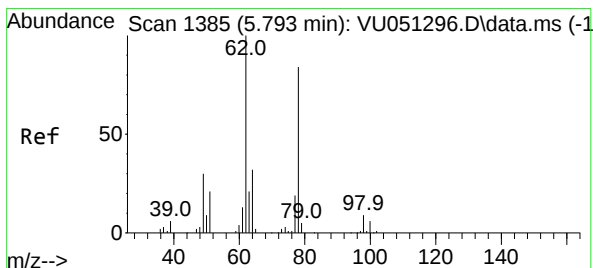
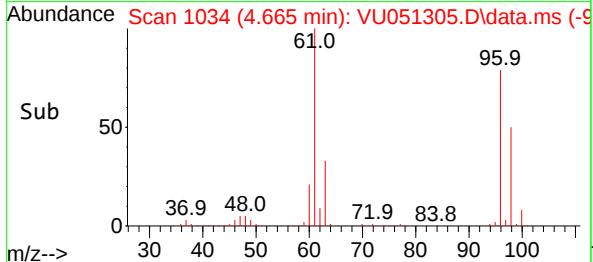
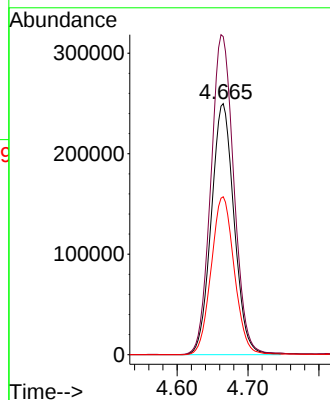
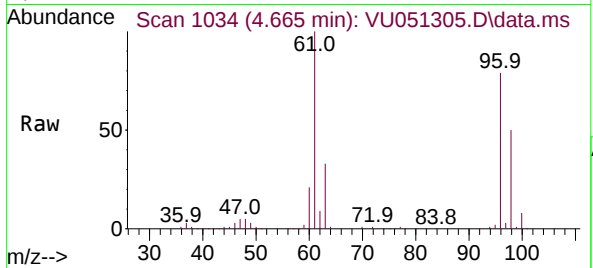




#22
 cis-1,2-Dichloroethene
 Concen: 26.530 ug/L
 RT: 4.665 min Scan# 1035
 Delta R.T. -0.003 min
 Lab File: VU051305.D
 Acq: 09 Oct 2022 17:16

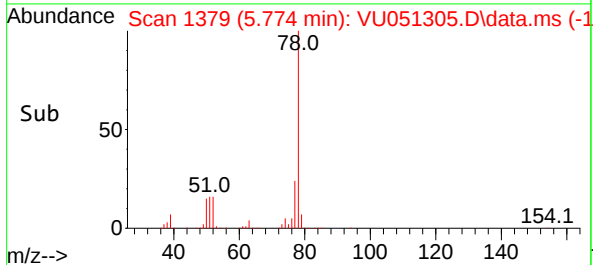
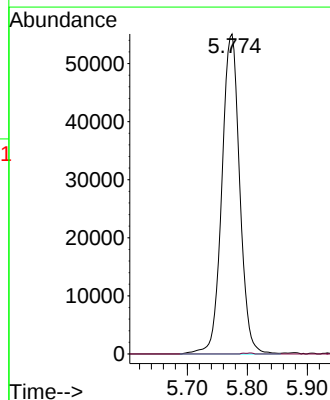
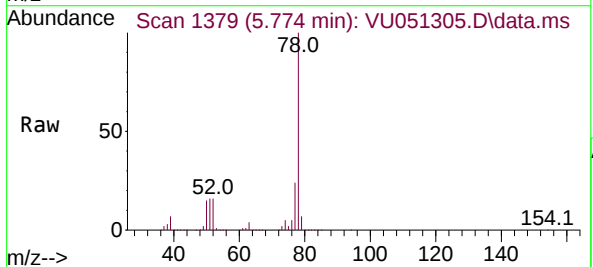
Instrument :
 MSVOA_U
 ClientSampleId :
 BHA41

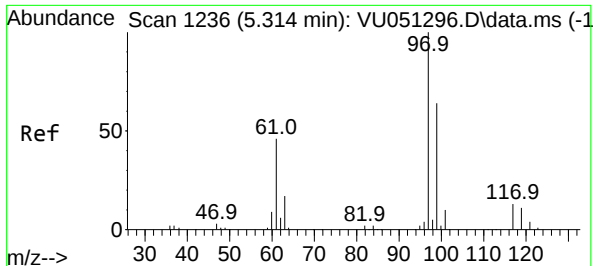
Tgt Ion: 96 Resp: 559232
 Ion Ratio Lower Upper
 96 100
 61 126.6 90.6 168.2
 98 62.9 47.5 88.3



#27
 1,2-Dichloroethane
 Concen: 4.622 ug/L
 RT: 5.774 min Scan# 1379
 Delta R.T. -0.019 min
 Lab File: VU051305.D
 Acq: 09 Oct 2022 17:16

Tgt Ion: 62 Resp: 113556
 Ion Ratio Lower Upper
 62 100
 98 0.0 7.7 11.5#





#29

1,1,1-Trichloroethane

Concen: 0.104 ug/L

RT: 5.318 min Scan# 1

Delta R.T. 0.003 min

Lab File: VU051305.D

Acq: 09 Oct 2022 17:16

Instrument :

MSVOA_U

ClientSampleId :

BHA41

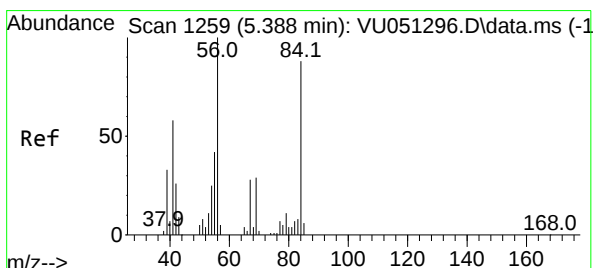
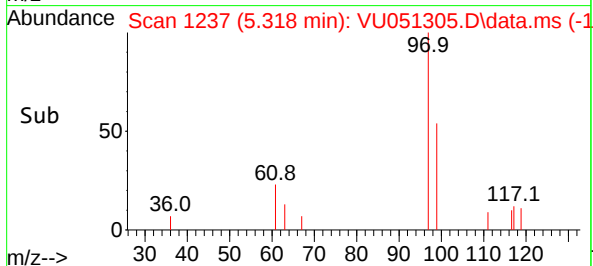
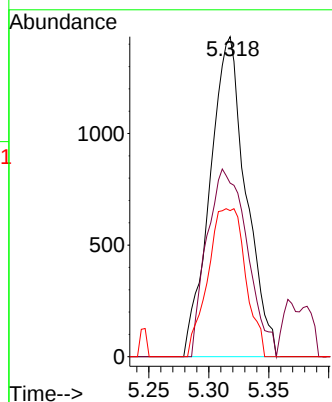
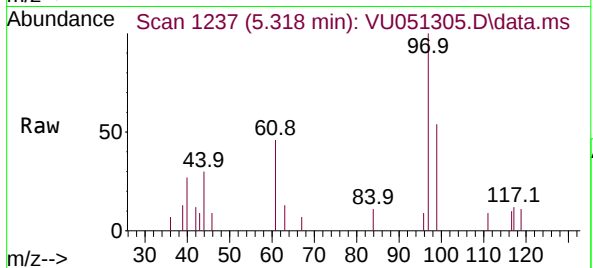
Tgt Ion: 97 Resp: 2994

Ion Ratio Lower Upper

97 100

99 65.8 50.2 75.4

61 48.3 38.7 58.1



#30

Cyclohexane

Concen: 0.350 ug/L

RT: 5.385 min Scan# 1258

Delta R.T. -0.003 min

Lab File: VU051305.D

Acq: 09 Oct 2022 17:16

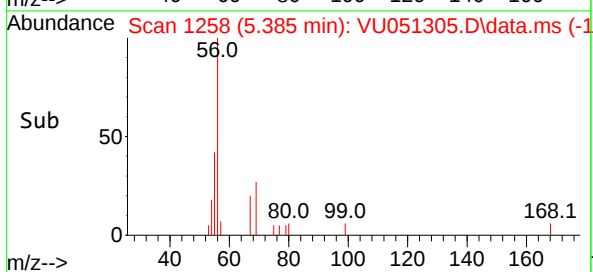
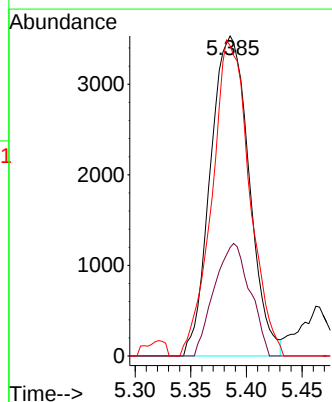
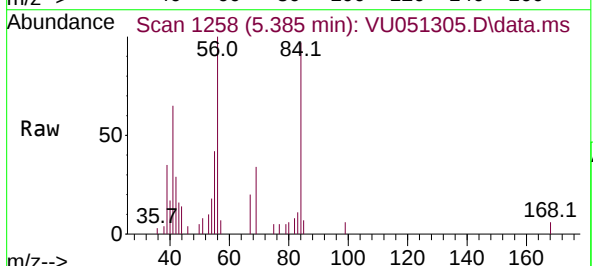
Tgt Ion: 56 Resp: 8530

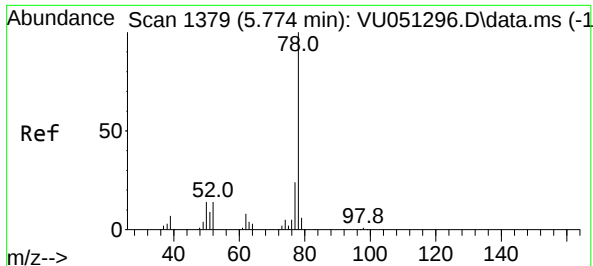
Ion Ratio Lower Upper

56 100

69 32.4 25.1 37.7

84 95.7 70.9 106.3

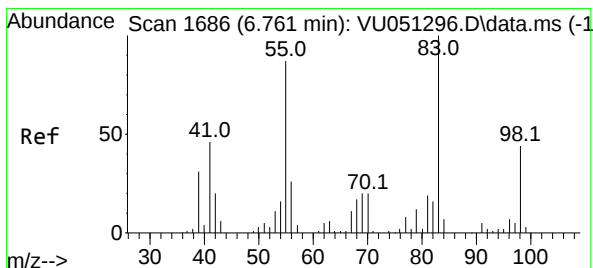
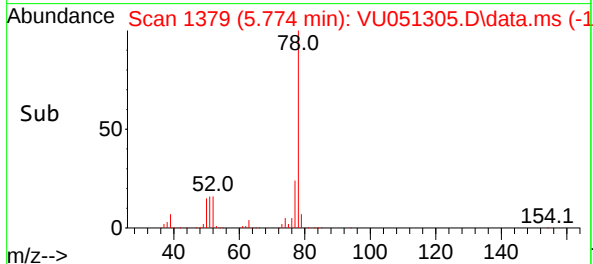
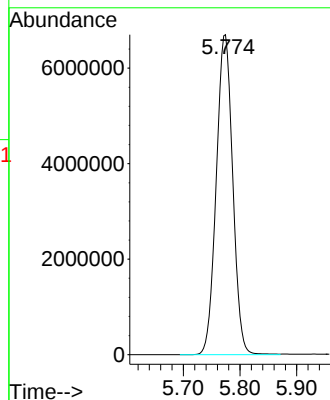
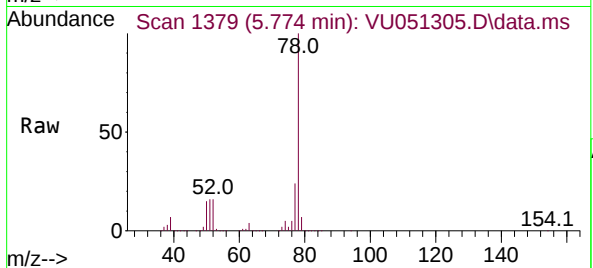




#33
Benzene
Concen: 168.760 ug/L
RT: 5.774 min Scan# 1379
Delta R.T. 0.000 min
Lab File: VU051305.D
Acq: 09 Oct 2022 17:16

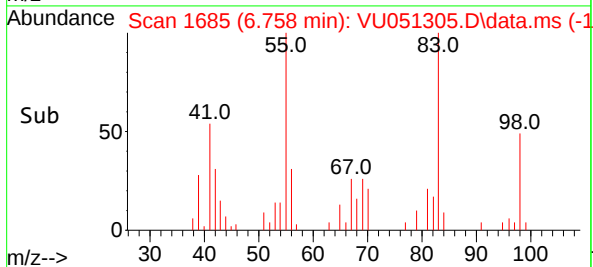
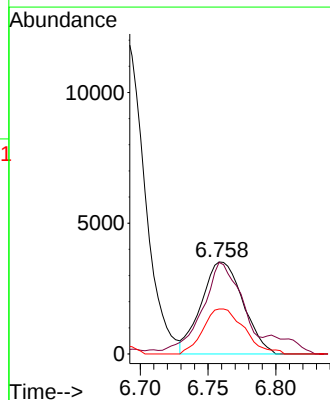
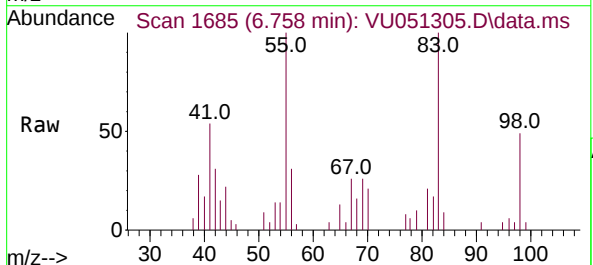
Instrument :
MSVOA_U
ClientSampleId :
BHA41

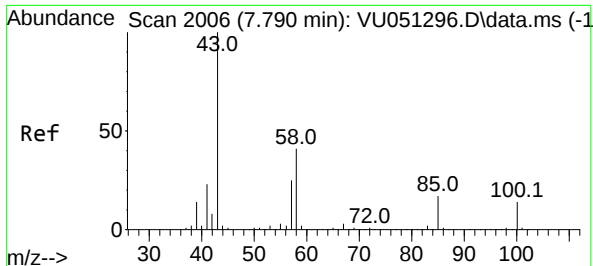
Tgt Ion: 78 Resp:13524567



#35
Methylcyclohexane
Concen: 0.298 ug/L
RT: 6.758 min Scan# 1685
Delta R.T. -0.003 min
Lab File: VU051305.D
Acq: 09 Oct 2022 17:16

Tgt Ion: 83 Resp: 7514
Ion Ratio Lower Upper
83 100
55 87.6 65.8 98.6
98 48.1 35.9 53.9





#40

4-Methyl-2-pentanone

Concen: 4.978 ug/L

RT: 7.790 min Scan# 2006

Delta R.T. 0.000 min

Lab File: VU051305.D

Acq: 09 Oct 2022 17:16

Instrument :

MSVOA_U

ClientSampleId :

BHA41

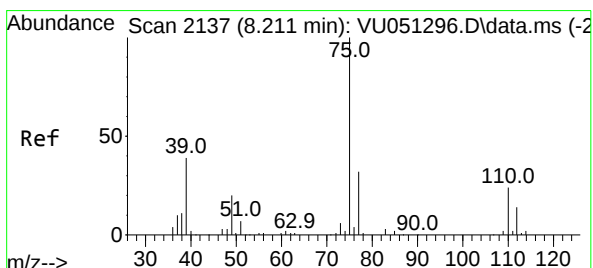
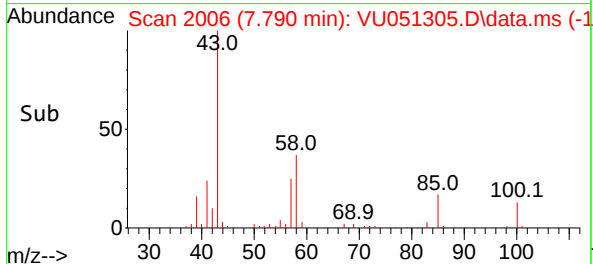
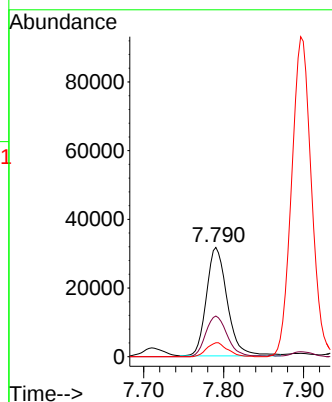
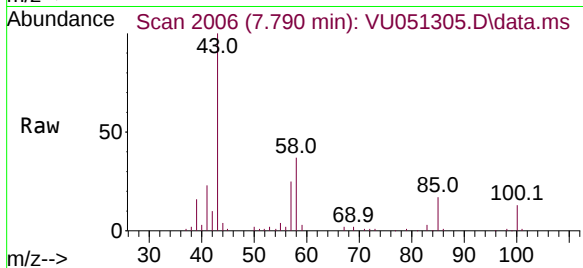
Tgt Ion: 43 Resp: 57363

Ion Ratio Lower Upper

43 100

58 38.9 33.0 49.6

100 12.8 11.8 17.6



#44

trans-1,3-Dichloropropene

Concen: 5.722 ug/L

RT: 7.970 min Scan# 2062

Delta R.T. -0.241 min

Lab File: VU051305.D

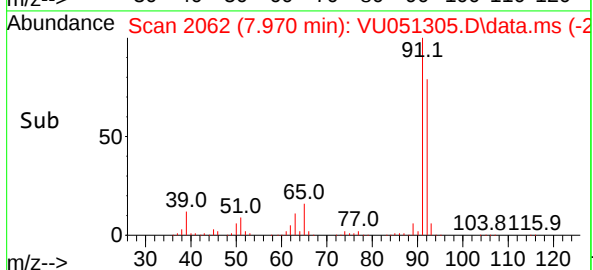
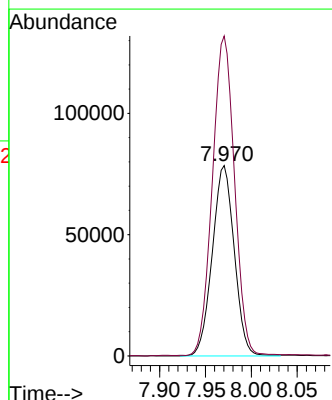
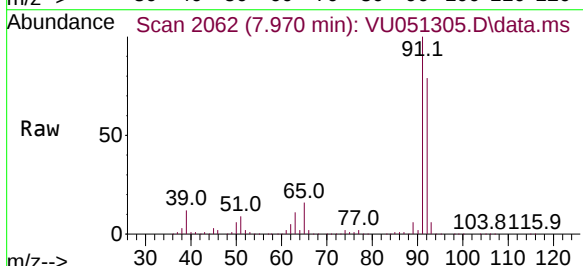
Acq: 09 Oct 2022 17:16

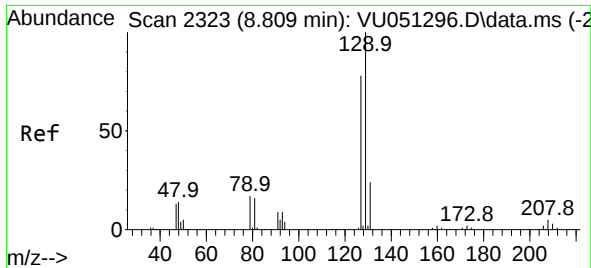
Tgt Ion: 75 Resp: 130626

Ion Ratio Lower Upper

75 100

77 168.1 21.8 40.6#

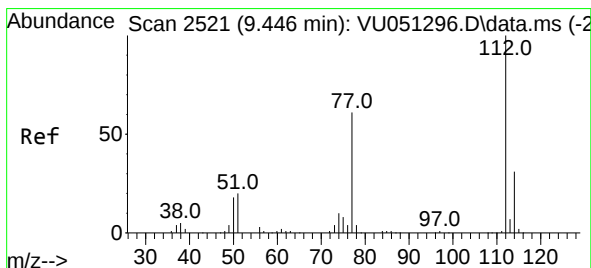
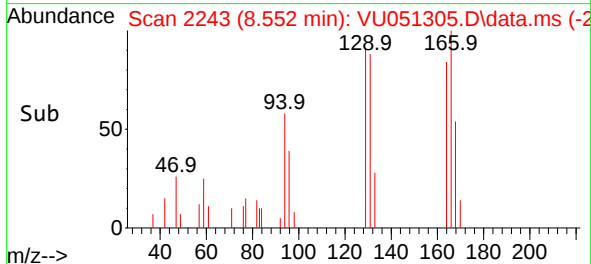
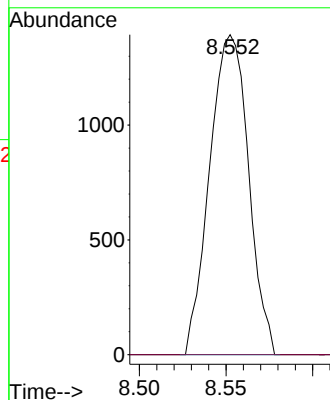
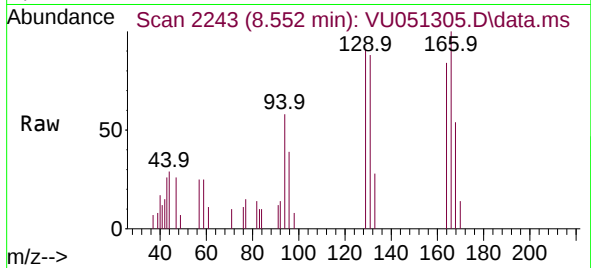




#49
Dibromochloromethane
Concen: 0.126 ug/L
RT: 8.552 min Scan# 2178
Delta R.T. -0.257 min
Lab File: VU051305.D
Acq: 09 Oct 2022 17:16

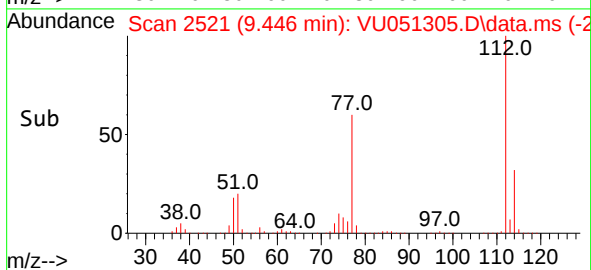
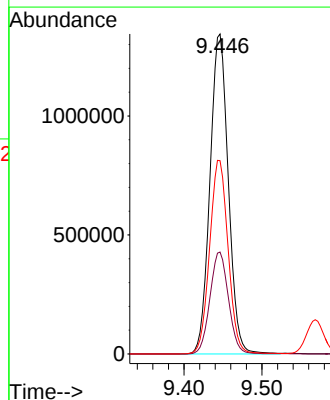
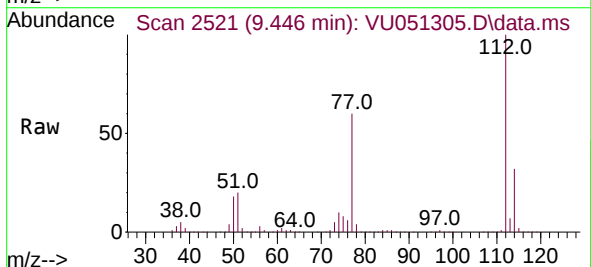
Instrument :
MSVOA_U
ClientSampleId :
BHA41

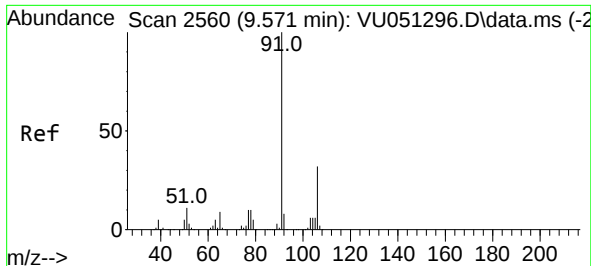
Tgt Ion:129 Resp: 2178
Ion Ratio Lower Upper
129 100
127 0.0 53.5 99.3#



#51
Chlorobenzene
Concen: 43.271 ug/L
RT: 9.446 min Scan# 2521
Delta R.T. 0.000 min
Lab File: VU051305.D
Acq: 09 Oct 2022 17:16

Tgt Ion:112 Resp: 2199338
Ion Ratio Lower Upper
112 100
114 31.8 22.3 41.5
77 60.4 48.1 72.1

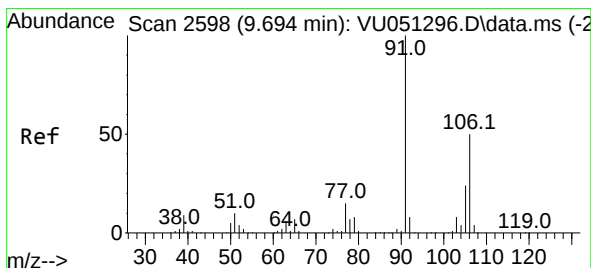
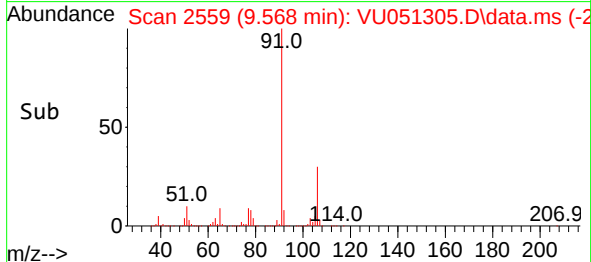
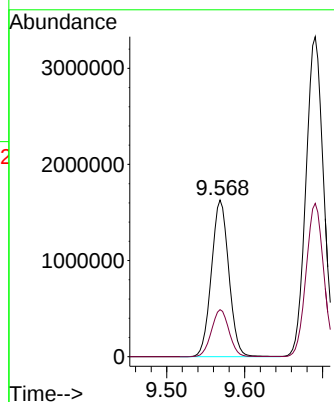
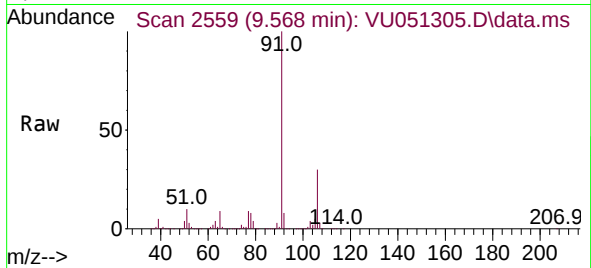




#52
Ethylbenzene
Concen: 33.111 ug/L
RT: 9.568 min Scan# 2559
Delta R.T. -0.003 min
Lab File: VU051305.D
Acq: 09 Oct 2022 17:16

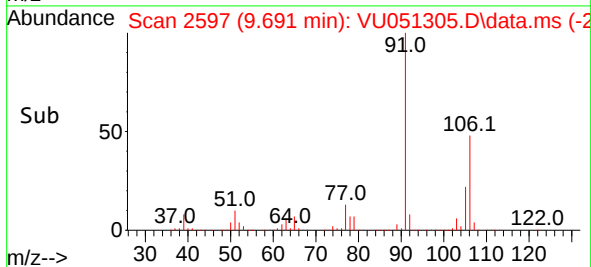
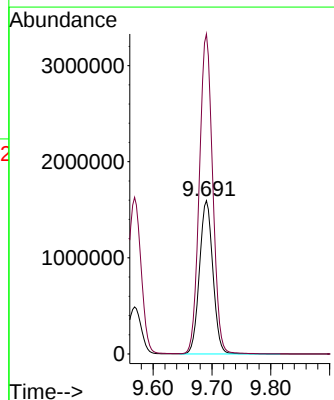
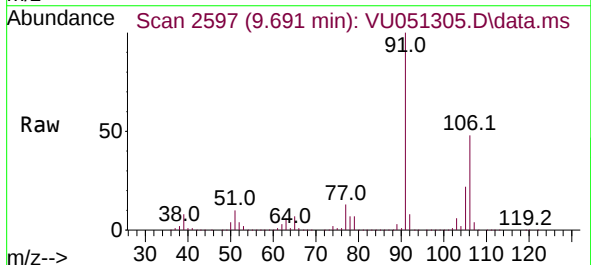
Instrument :
MSVOA_U
ClientSampleId :
BHA41

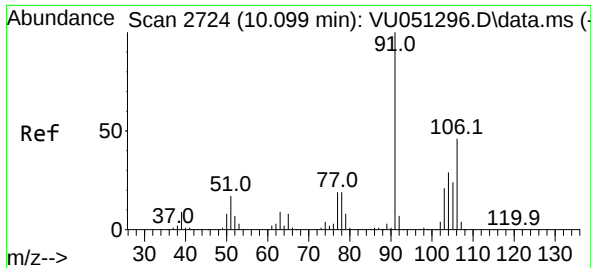
Tgt Ion: 91 Resp: 2531106
Ion Ratio Lower Upper
91 100
106 30.1 20.9 38.7



#53
m,p-Xylene
Concen: 85.095 ug/L
RT: 9.691 min Scan# 2597
Delta R.T. -0.003 min
Lab File: VU051305.D
Acq: 09 Oct 2022 17:16

Tgt Ion: 106 Resp: 2522859
Ion Ratio Lower Upper
106 100
91 208.7 143.9 267.3

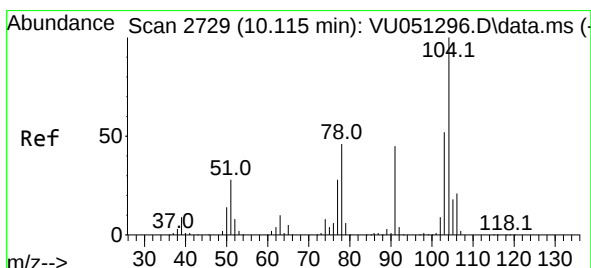
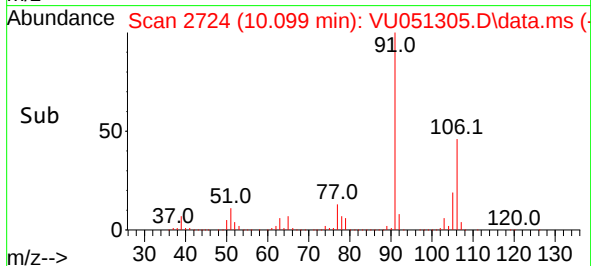
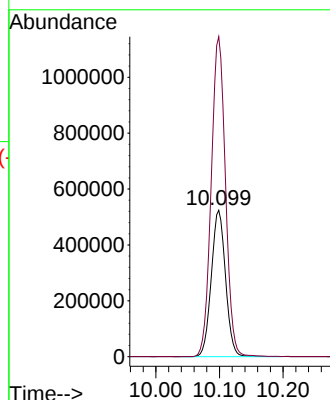
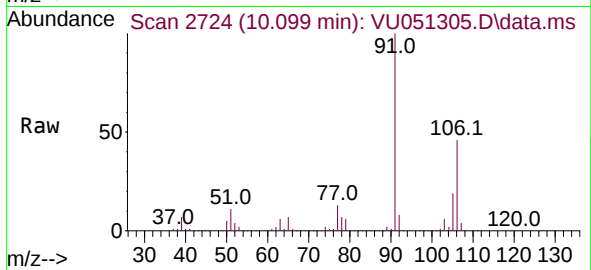




#54
o-Xylene
Concen: 28.992 ug/L
RT: 10.099 min Scan# 2724
Delta R.T. 0.000 min
Lab File: VU051305.D
Acq: 09 Oct 2022 17:16

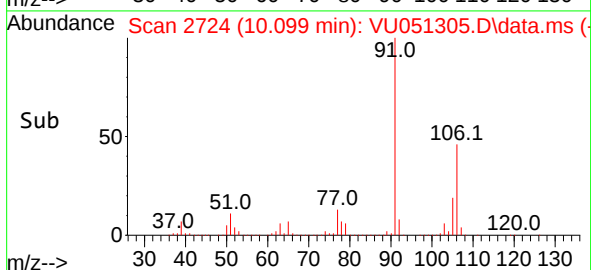
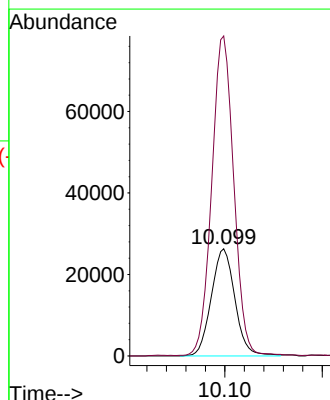
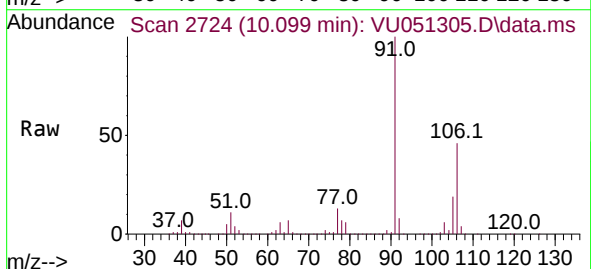
Instrument :
MSVOA_U
ClientSampleId :
BHA41

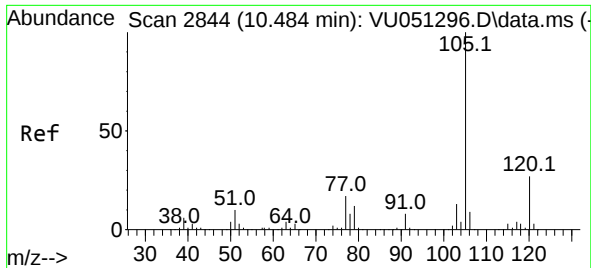
Tgt Ion:106 Resp: 813297
Ion Ratio Lower Upper
106 100
91 218.7 154.4 286.8



#55
Styrene
Concen: 0.918 ug/L
RT: 10.099 min Scan# 2724
Delta R.T. -0.016 min
Lab File: VU051305.D
Acq: 09 Oct 2022 17:16

Tgt Ion:104 Resp: 44339
Ion Ratio Lower Upper
104 100
78 298.5 32.1 59.7#

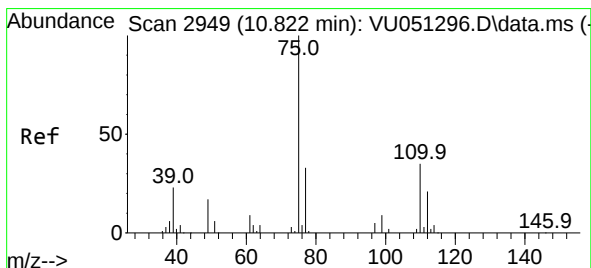
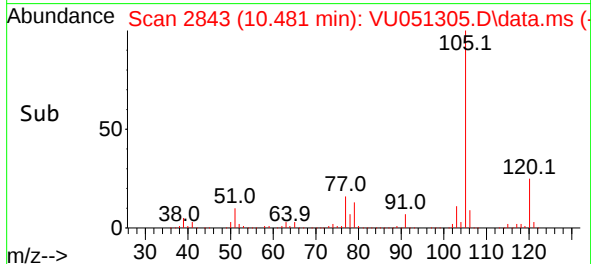
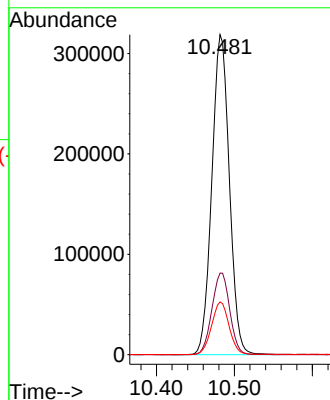
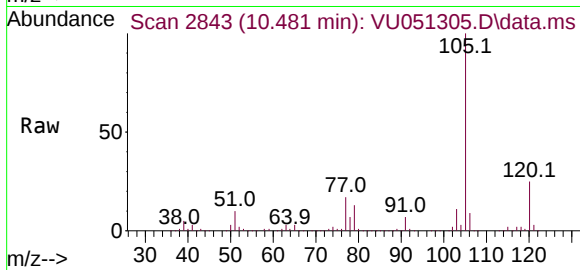




#60
Isopropylbenzene
Concen: 6.038 ug/L
RT: 10.481 min Scan# 2843
Delta R.T. -0.003 min
Lab File: VU051305.D
Acq: 09 Oct 2022 17:16

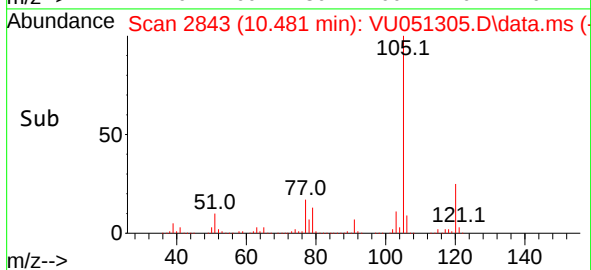
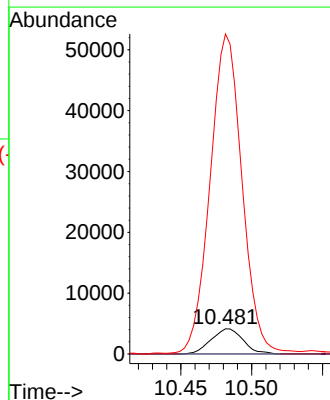
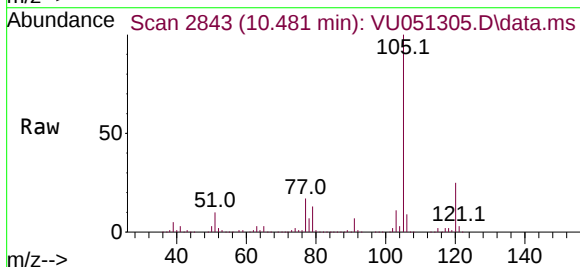
Instrument :
MSVOA_U
ClientSampleId :
BHA41

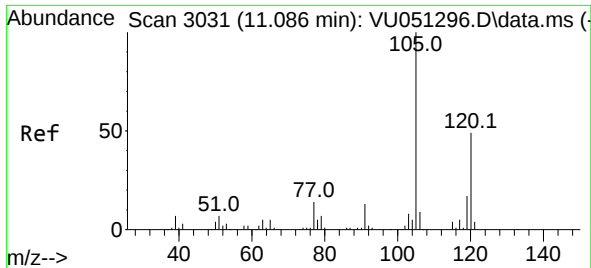
Tgt Ion:105 Resp: 498286
Ion Ratio Lower Upper
105 100
120 26.0 20.6 30.8
77 16.5 13.5 20.3



#61
1,2,3-Trichloropropane
Concen: 0.395 ug/L
RT: 10.481 min Scan# 2843
Delta R.T. -0.341 min
Lab File: VU051305.D
Acq: 09 Oct 2022 17:16

Tgt Ion: 75 Resp: 6491
Ion Ratio Lower Upper
75 100
110 4.4 27.0 40.6#
77 1263.0 26.4 39.6#

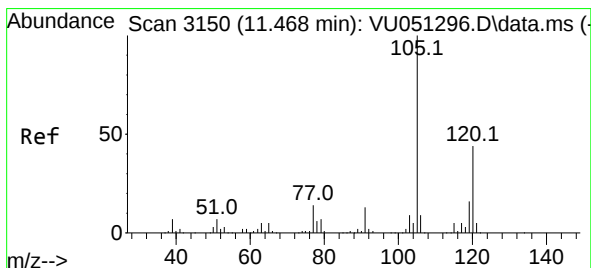
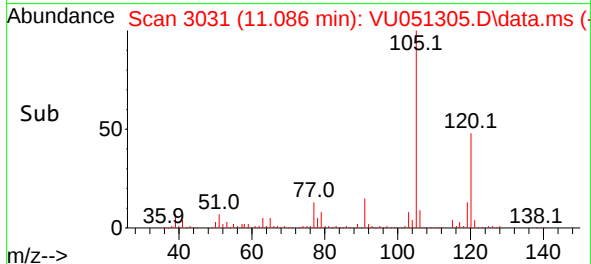
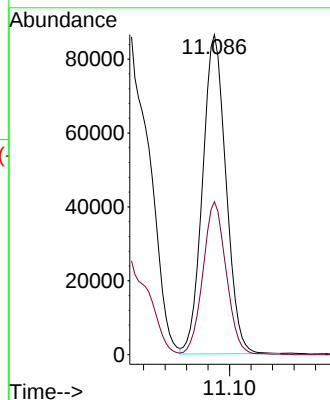
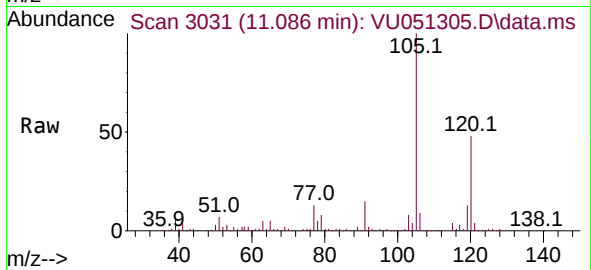




#62
 1,3,5-Trimethylbenzene
 Concen: 5.969 ug/L
 RT: 11.086 min Scan# 3031
 Delta R.T. 0.000 min
 Lab File: VU051305.D
 Acq: 09 Oct 2022 17:16

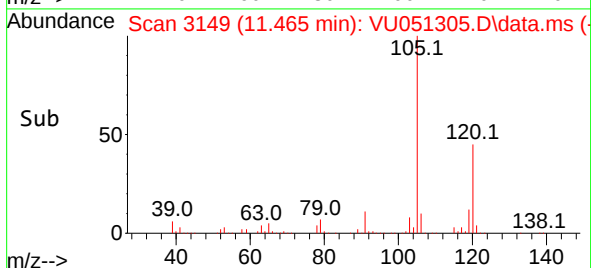
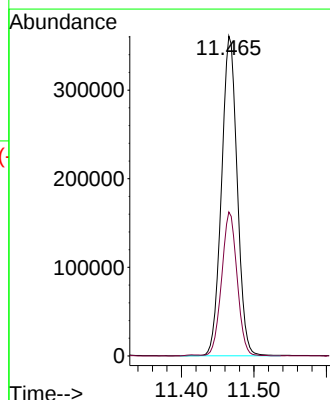
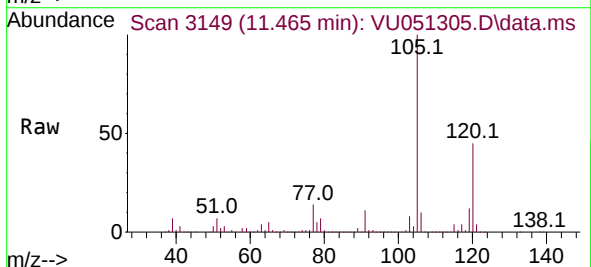
Instrument :
 MSVOA_U
 ClientSampleId :
 BHA41

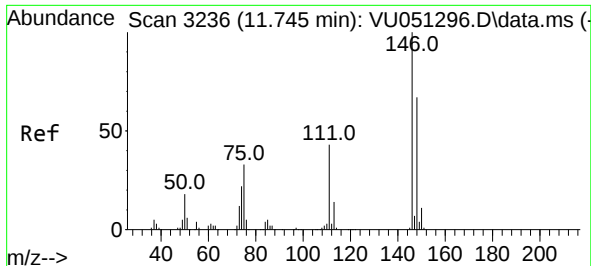
Tgt Ion:105 Resp: 130673
 Ion Ratio Lower Upper
 105 100
 120 47.8 37.7 56.5



#63
 1,2,4-Trimethylbenzene
 Concen: 8.766 ug/L
 RT: 11.465 min Scan# 3149
 Delta R.T. -0.003 min
 Lab File: VU051305.D
 Acq: 09 Oct 2022 17:16

Tgt Ion:105 Resp: 542762
 Ion Ratio Lower Upper
 105 100
 120 44.2 35.6 53.4

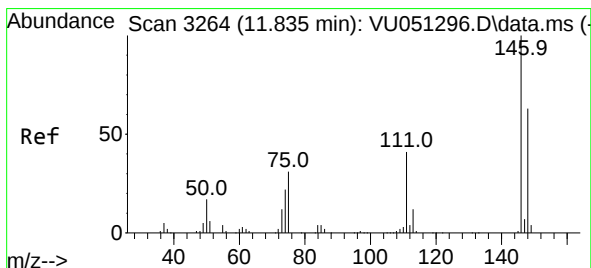
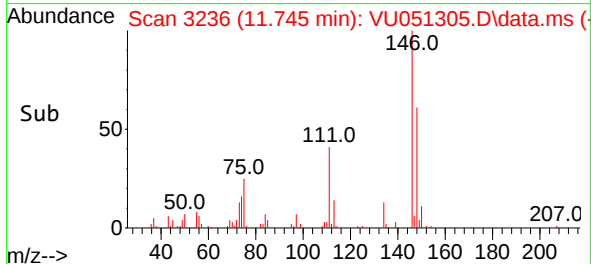
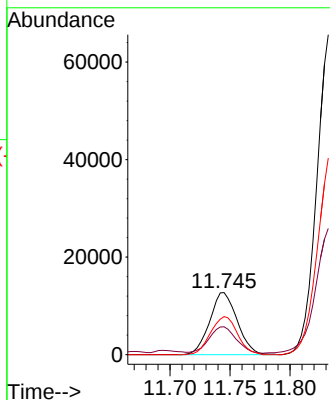
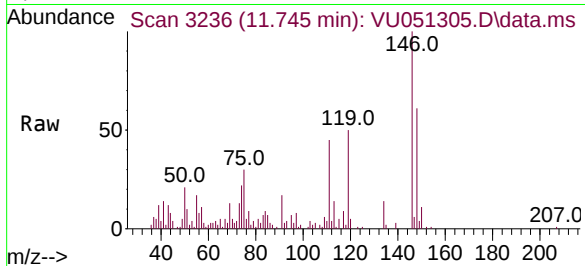




#64
1,3-Dichlorobenzene
Concen: 0.497 ug/L
RT: 11.745 min Scan# 31
Delta R.T. 0.000 min
Lab File: VU051305.D
Acq: 09 Oct 2022 17:16

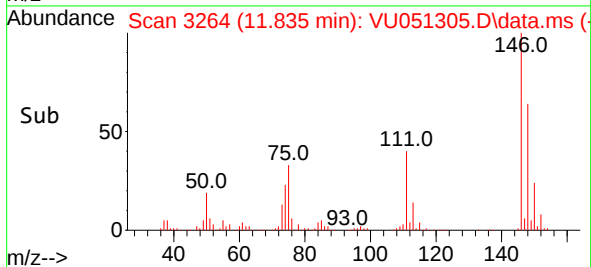
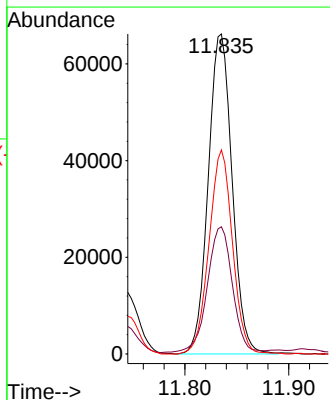
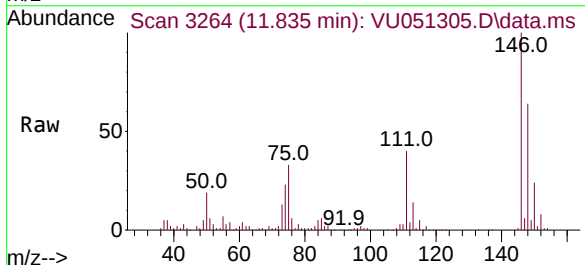
Instrument :
MSVOA_U
ClientSampleId :
BHA41

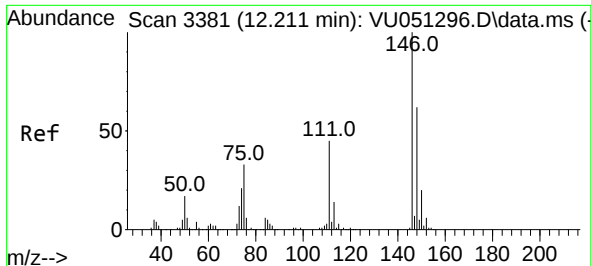
Tgt Ion:146 Resp: 20287
Ion Ratio Lower Upper
146 100
111 44.8 28.3 52.7
148 61.2 43.8 81.4



#65
1,4-Dichlorobenzene
Concen: 2.628 ug/L
RT: 11.835 min Scan# 3264
Delta R.T. 0.000 min
Lab File: VU051305.D
Acq: 09 Oct 2022 17:16

Tgt Ion:146 Resp: 105754
Ion Ratio Lower Upper
146 100
111 39.7 29.1 54.1
148 63.8 44.2 82.0





#67

1,2-Dichlorobenzene

Concen: 3.086 ug/L

RT: 12.211 min Scan# 3381

Delta R.T. 0.000 min

Lab File: VU051305.D

Acq: 09 Oct 2022 17:16

Instrument :

MSVOA_U

ClientSampleId :

BHA41

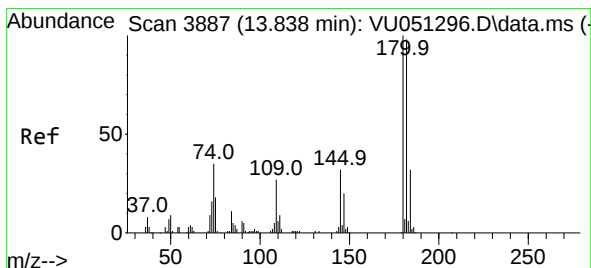
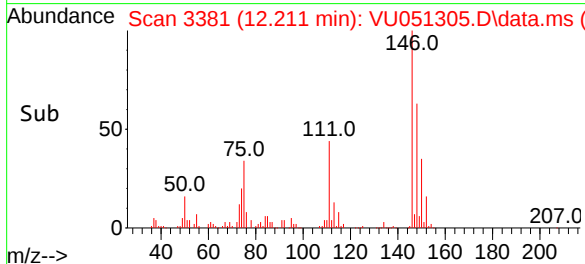
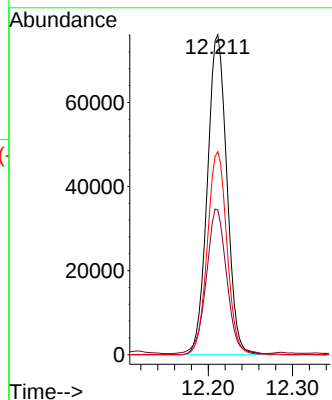
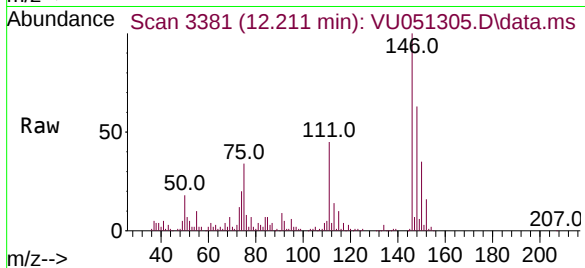
Tgt Ion:146 Resp: 122450

Ion Ratio Lower Upper

146 100

111 45.3 35.5 53.3

148 63.5 50.9 76.3



#70

1,2,4-trichlorobenzene

Concen: 0.165 ug/L

RT: 13.841 min Scan# 3888

Delta R.T. 0.003 min

Lab File: VU051305.D

Acq: 09 Oct 2022 17:16

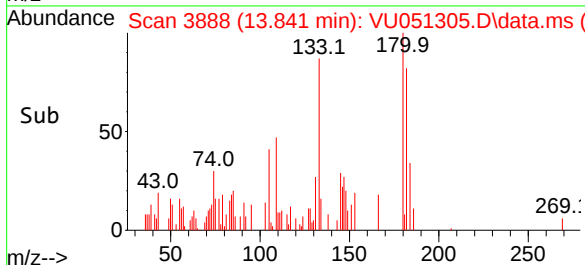
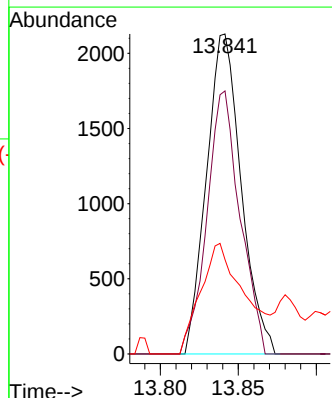
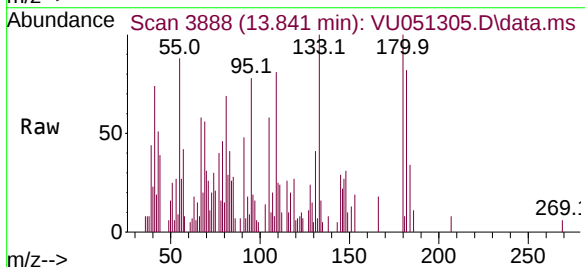
Tgt Ion:180 Resp: 3292

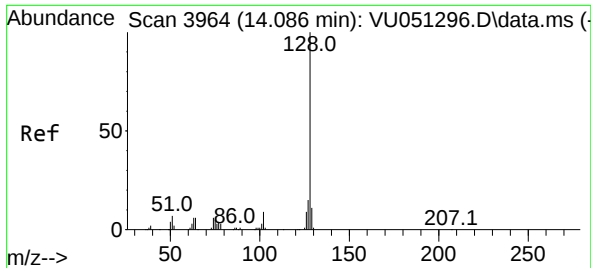
Ion Ratio Lower Upper

180 100

182 78.3 78.7 118.1#

145 44.4 25.0 37.4#





#71

Naphthalene

Concen: 11.783 ug/L

RT: 14.083 min Scan# 3963

Delta R.T. -0.003 min

Lab File: VU051305.D

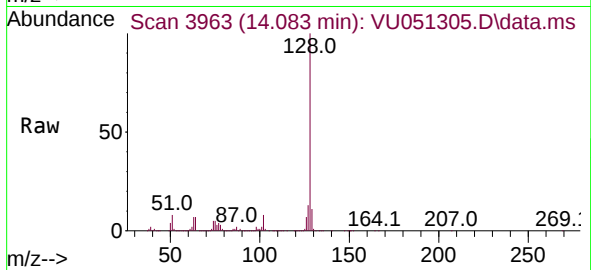
Acq: 09 Oct 2022 17:16

Instrument :

MSVOA_U

ClientSampleId :

BHA41



Tgt Ion:128 Resp: 438031

Ion Ratio Lower Upper

128 100

129 10.9 8.5 12.7

127 12.8 11.1 16.7

