

Data Path : Z:\voasrv\HPCHEM1\MSVOA_L\Data\VL052322\
 Data File : VL039109.D
 Acq On : 24 May 2022 7:42
 Operator : SY/AP
 Sample : N2957-05DL 4X
 Misc : 400mL/MSVOA_L
 ALS Vial : 1 Sample Multiplier: 1

Instrument :
 MSVOA_L
 ClientSampleId :
 VP-2DL

Manual Integrations
 APPROVED

Reviewed By :Semsettin Yesilyurt 05/25/2022
 Supervised By :Mahesh Dadoda 05/26/2022

Quant Time: May 24 08:47:06 2022

Quant Method : Z:\VOASRV\HPCHEM1\MSVOA_L\METHODS\VL050522AIR.M

Quant Title : AIR ANALYSIS BY METHOD TO-15 Instrument: MSVOA_LThu May 26 13:06:51 2022

QLast Update : Thu May 05 10:12:15 2022

Response via : Initial Calibration

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

Internal Standards						
1) Bromochloromethane	5.648	49	1185578	10.000	ppbv	-0.02
33) 1,4-Difluorobenzene	7.150	114	3051580	10.000	ppbv	-0.02
55) Chlorobenzene-d5	12.057	117	2656049	10.000	ppbv	-0.02
System Monitoring Compounds						
68) 1-Bromo-4-Fluorobenzene	14.381	95	2088589	9.929	ppbv	-0.02
Spiked Amount	10.000	Range	65 - 135	Recovery	=	99.300%
Target Compounds						Qvalue
2) Dichlorodifluoromethane	3.041	85	23773	0.128	ppbv	98
9) Propene	3.012	41	66300m	1.032	ppbv	
10) Heptane	8.095	43	47885	0.304	ppbv	88
13) Ethanol	3.591	45	129946m	28.581	ppbv	
15) Acetone	3.832	43	2504581	22.395	ppbv	97
17) tert-Butyl alcohol	4.288	59	19220m	0.224	ppbv	
19) Isopropyl Alcohol	3.960	45	26859m	0.505	ppbv	
20) Methylene Chloride	4.327	84	102729	2.437	ppbv	97
26) Hexane	5.671	57	165877	1.395	ppbv #	40
27) Carbon Disulfide	4.539	76	38015	0.336	ppbv #	73
29) Chloroform	5.732	83	504879	2.624	ppbv	94
30) Cyclohexane	7.111	84	53689m	0.539	ppbv	
34) 2-Butanone	5.227	43	242080	1.555	ppbv	95
36) Benzene	6.861	78	64314m	0.246	ppbv	
38) Trichloroethene	7.809	130	52738m	0.454	ppbv	
41) Tetrahydrofuran	6.050	42	34324m	0.328	ppbv	
44) 2,2,4-Trimethylpentane	7.838	57	52778m	0.115	ppbv	
51) 2-Hexanone	10.124	43	40311m	0.202	ppbv	
52) Tetrachloroethene	11.195	164	698463	7.484	ppbv	99
53) Toluene	9.777	91	348183	1.190	ppbv	98
58) Ethyl Benzene	12.677	91	112324	0.294	ppbv	96
59) m/p-Xylene	12.938	91	403787m	1.237	ppbv	
60) o-Xylene	13.664	91	171739	0.559	ppbv	95
64) n-propylbenzene	15.529	120	13720m	0.126	ppbv	
72) 4-Ethyltoluene	15.806	105	110924m	0.317	ppbv	
73) 1,3,5-Trimethylbenzene	15.960	105	114663m	0.364	ppbv	
74) 1,2,4-Trimethylbenzene	16.725	105	400455	1.161	ppbv #	66
79) Naphthalene	22.159	128	39987m	0.143	ppbv	

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

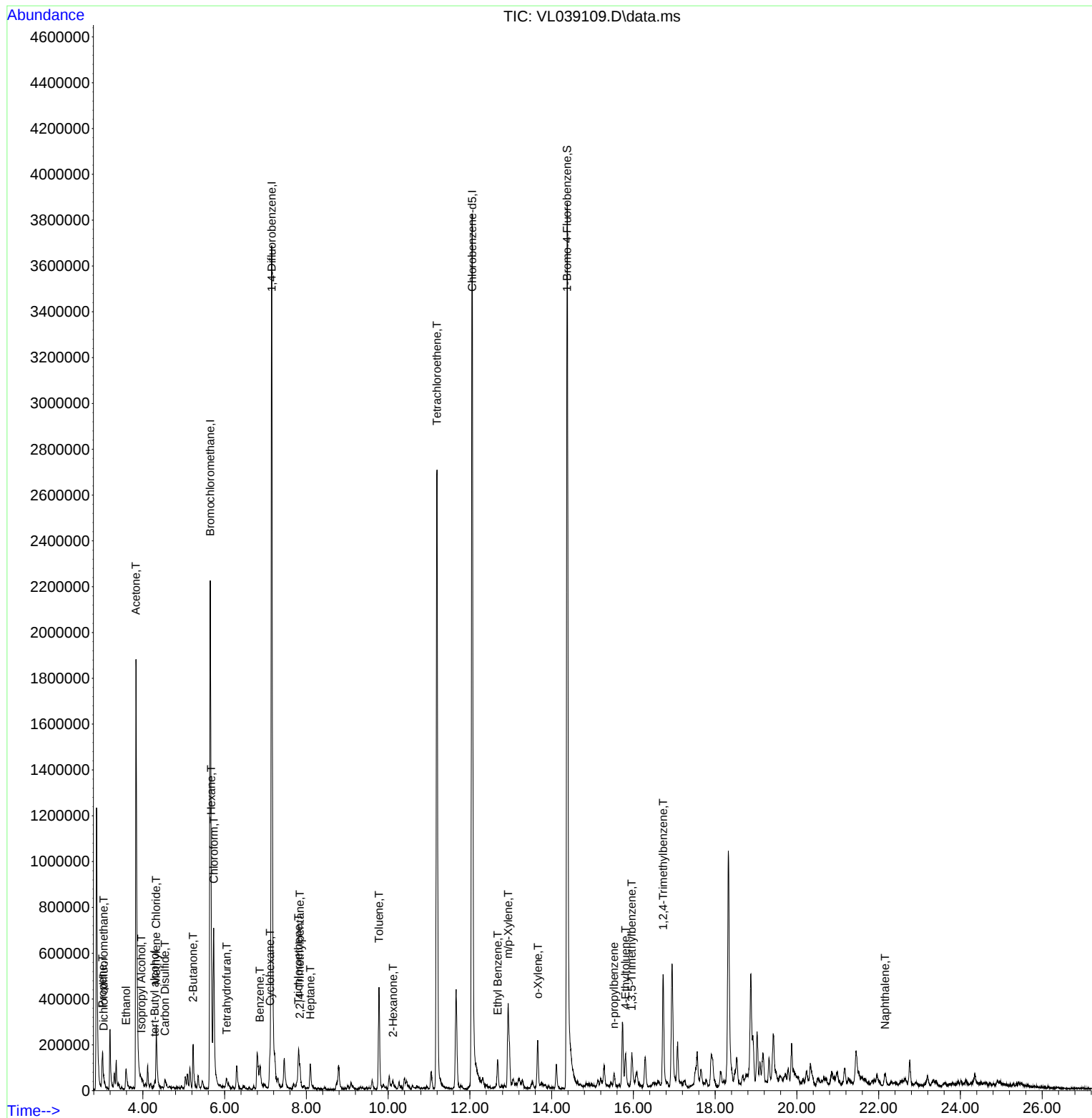
Data Path : Z:\voasrv\HPCHEM1\MSVOA_L\Data\VL052322\
Data File : VL039109.D
Acq On : 24 May 2022 7:42
Operator : SY/AP
Sample : N2957-05DL 4X
Misc : 400mL/MSVOA_L
ALS Vial : 1 Sample Multiplier: 1

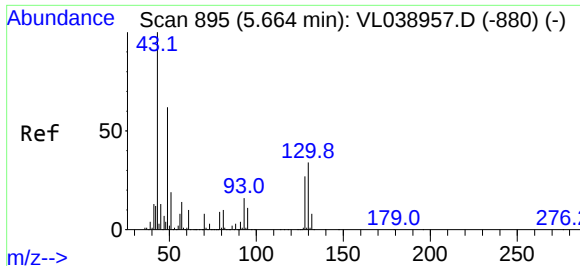
Instrument :
MSVOA_L
ClientSampleId :
VP-2DL

Quant Time: May 24 08:47:06 2022
Quant Method : Z:\VOASRV\HPCHEM1\MSVOA_L\METHODS\VL050522AIR.M
Quant Title : AIR ANALYSIS BY METHOD TO-15 Instrument: MSVOA_LThu May
QLast Update : Thu May 05 10:12:15 2022
Response via : Initial Calibration

Manual Integrations
APPROVED

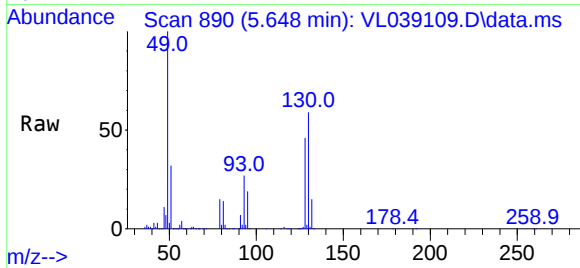
Reviewed By :Semsettin Yesilyurt 05/25/2022
Supervised By :Mahesh Dadoda 05/26/2022





#1
Bromochloromethane
Concen: 10.000 ppbv
RT: 5.648 min Scan# 89
Delta R.T. -0.016 min
Lab File: VL039109.D
Acq: 24 May 2022 7:42

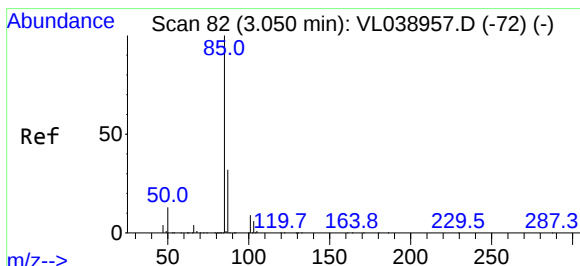
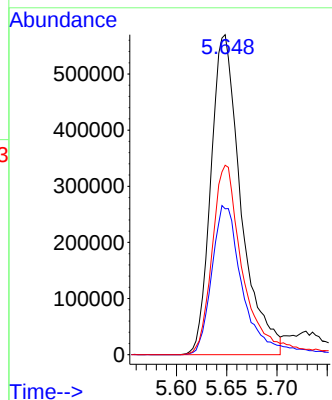
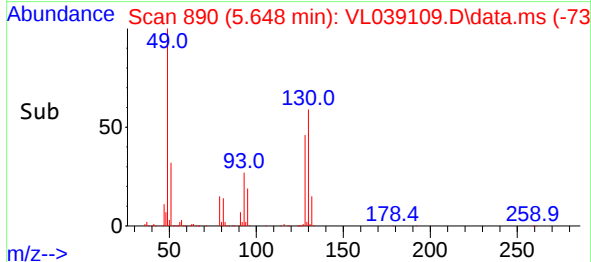
Instrument :
MSVOA_L
ClientSampleId :
VP-2DL



Tgt Ion: 49 Resp: 1185578
Ion Ratio Lower Upper
49 100
128 49.5 23.3 69.8
130 61.9 29.8 89.3

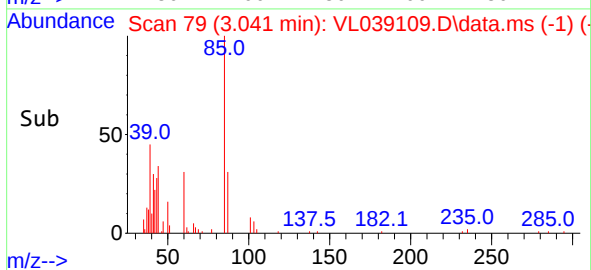
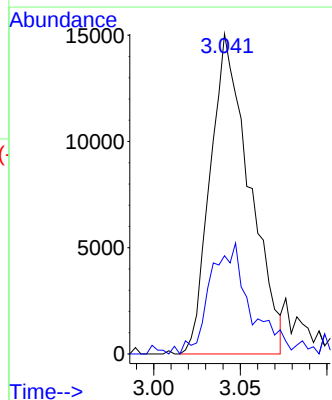
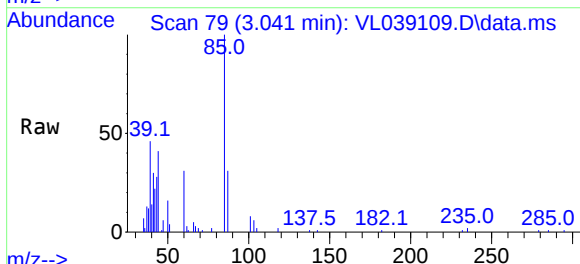
Manual Integrations
APPROVED

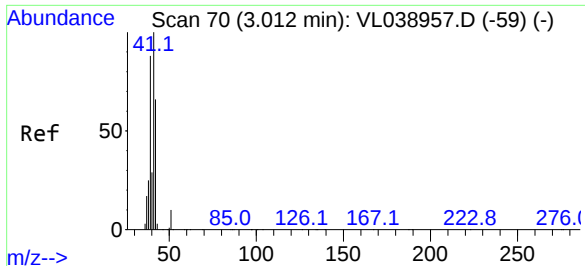
Reviewed By :Semsettin Yesilyurt 05/25/2022
Supervised By :Mahesh Dadoda 05/26/2022



#2
Dichlorodifluoromethane
Concen: 0.128 ppbv
RT: 3.041 min Scan# 79
Delta R.T. -0.010 min
Lab File: VL039109.D
Acq: 24 May 2022 7:42

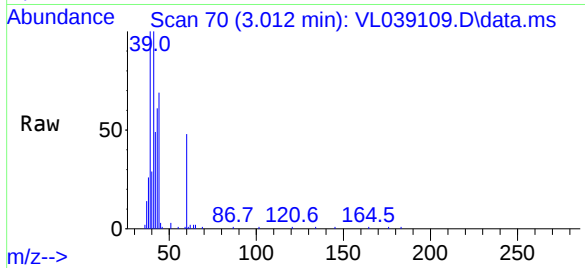
Tgt Ion: 85 Resp: 23773
Ion Ratio Lower Upper
85 100
87 30.7 25.7 38.5





#9
 Propene
 Concen: 1.032 ppbv m
 RT: 3.012 min Scan# 70
 Delta R.T. 0.000 min
 Lab File: VL039109.D
 Acq: 24 May 2022 7:42

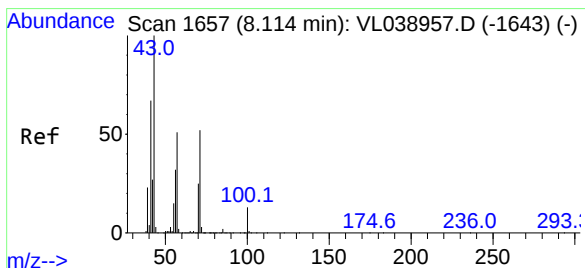
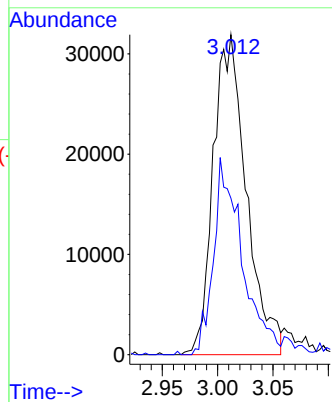
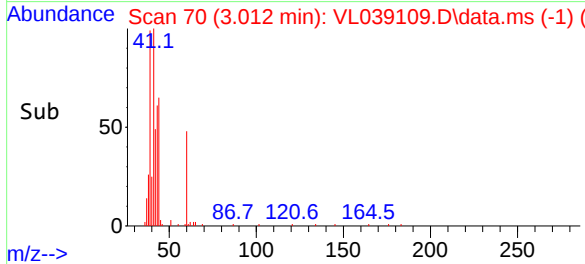
Instrument :
 MSVOA_L
 ClientSampleId :
 VP-2DL



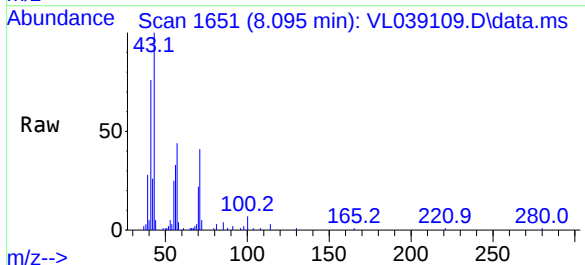
Tgt Ion: 41 Resp: 66300
 Ion Ratio Lower Upper
 41 100
 42 55.8 58.3 87.5

Manual Integrations
 APPROVED

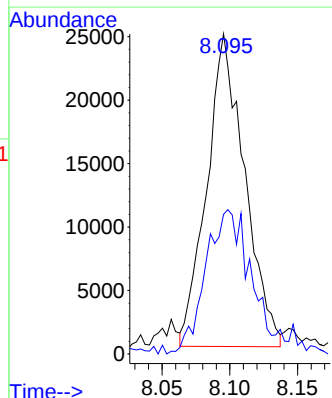
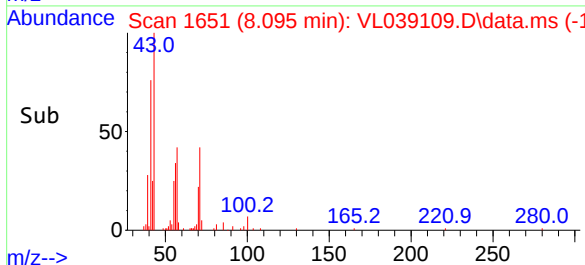
Reviewed By :Semsettin Yesilyurt 05/25/2022
 Supervised By :Mahesh Dadoda 05/26/2022

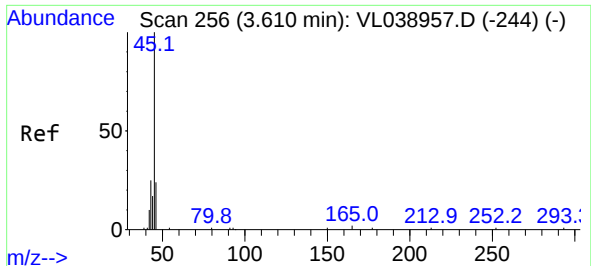


#10
 Heptane
 Concen: 0.304 ppbv
 RT: 8.095 min Scan# 1651
 Delta R.T. -0.019 min
 Lab File: VL039109.D
 Acq: 24 May 2022 7:42



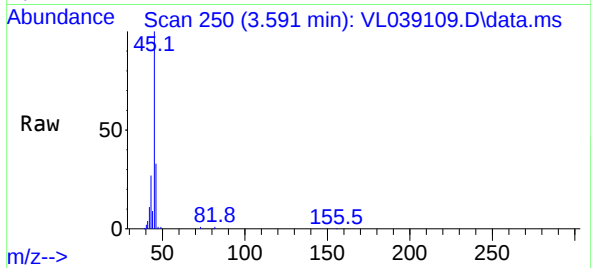
Tgt Ion: 43 Resp: 47885
 Ion Ratio Lower Upper
 43 100
 57 58.6 40.5 60.7





#13
Ethanol
Concen: 28.581 ppbv m
RT: 3.591 min Scan# 21
Delta R.T. -0.019 min
Lab File: VL039109.D
Acq: 24 May 2022 7:42

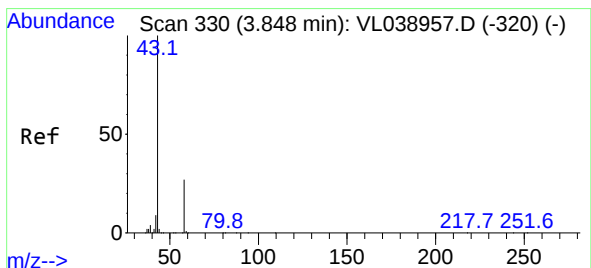
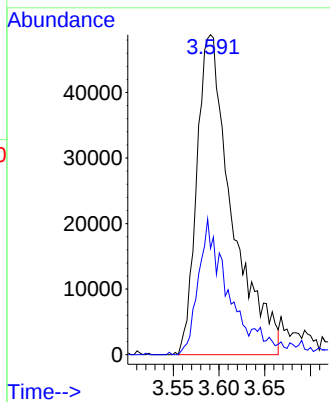
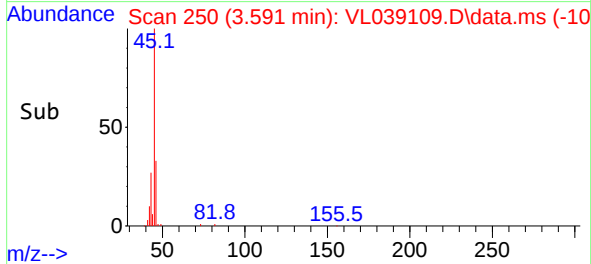
Instrument :
MSVOA_L
ClientSampleId :
VP-2DL



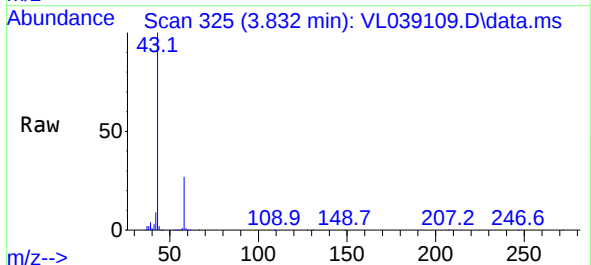
Tgt Ion: 45 Resp: 129940
Ion Ratio Lower Upper
45 100
46 37.5 18.0 72.2

Manual Integrations
APPROVED

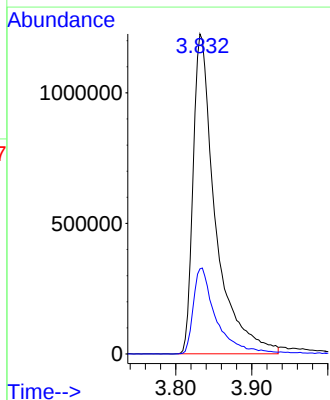
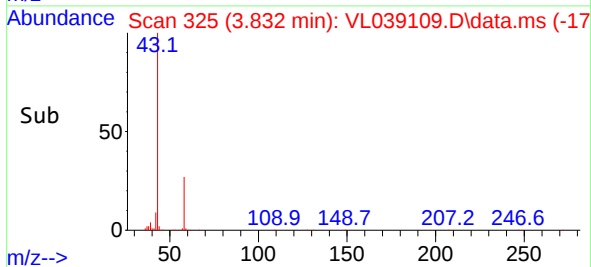
Reviewed By :Semsettin Yesilyurt 05/25/2022
Supervised By :Mahesh Dadoda 05/26/2022

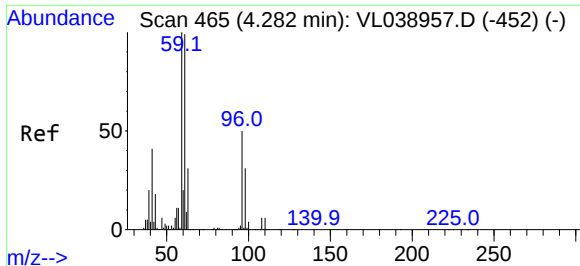


#15
Acetone
Concen: 22.395 ppbv
RT: 3.832 min Scan# 325
Delta R.T. -0.016 min
Lab File: VL039109.D
Acq: 24 May 2022 7:42



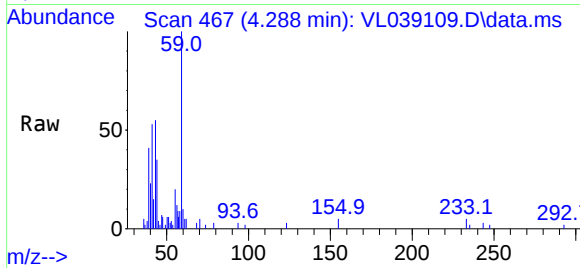
Tgt Ion: 43 Resp: 2504581
Ion Ratio Lower Upper
43 100
58 28.2 21.3 31.9





#17
tert-Butyl alcohol
Concen: 0.224 ppbv m
RT: 4.288 min Scan# 465
Delta R.T. 0.007 min
Lab File: VL039109.D
Acq: 24 May 2022 7:42

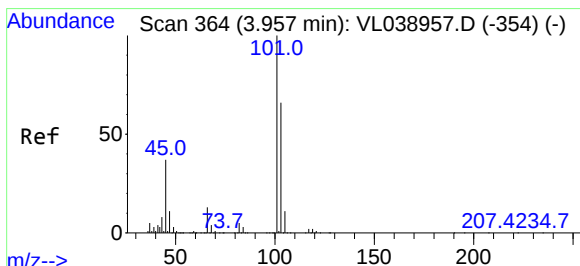
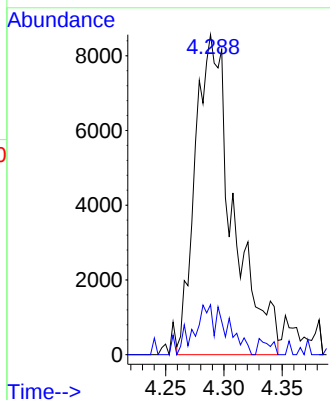
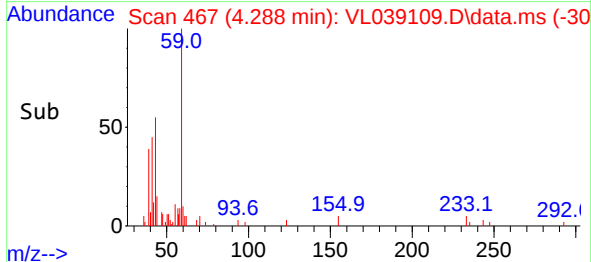
Instrument :
MSVOA_L
ClientSampleId :
VP-2DL



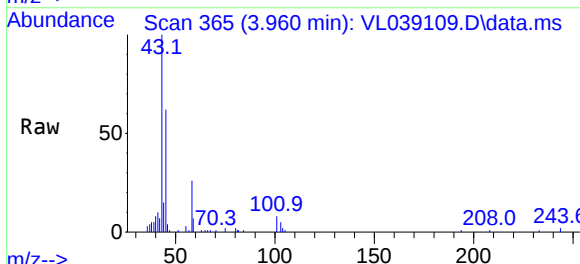
Tgt Ion: 59 Resp: 19220
Ion Ratio Lower Upper
59 100
57 0.0 9.2 13.8

Manual Integrations
APPROVED

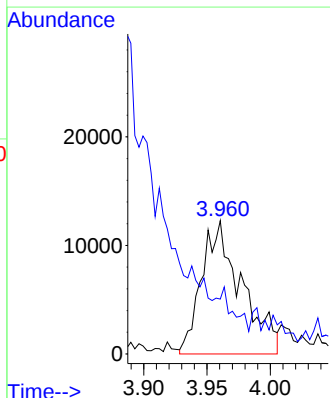
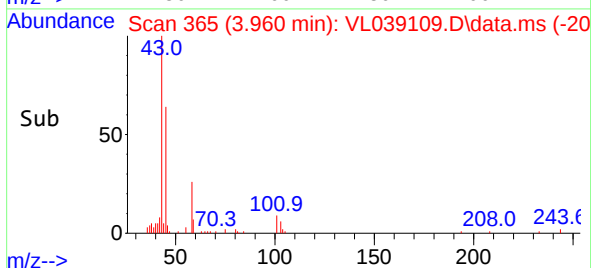
Reviewed By :Semsettin Yesilyurt 05/25/2022
Supervised By :Mahesh Dadoda 05/26/2022

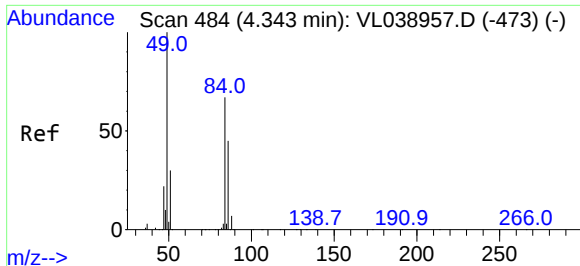


#19
Isopropyl Alcohol
Concen: 0.505 ppbv m
RT: 3.960 min Scan# 365
Delta R.T. 0.003 min
Lab File: VL039109.D
Acq: 24 May 2022 7:42



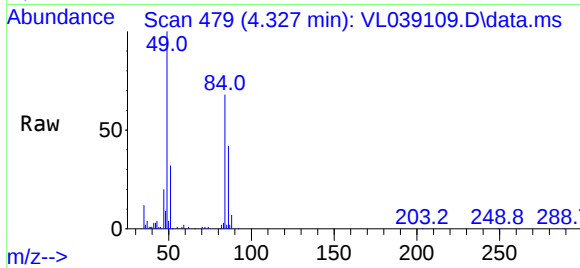
Tgt Ion: 45 Resp: 26859
Ion Ratio Lower Upper
45 100
58 0.0 1.4 2.2





#20
Methylene Chloride
Concen: 2.437 ppbv
RT: 4.327 min Scan# 41
Delta R.T. -0.016 min
Lab File: VL039109.D
Acq: 24 May 2022 7:42

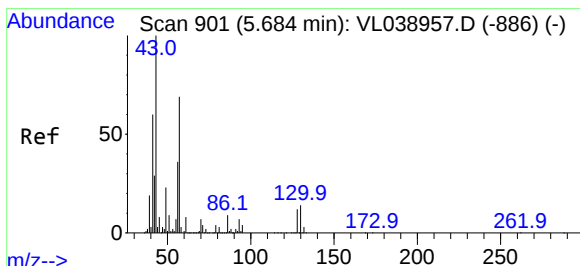
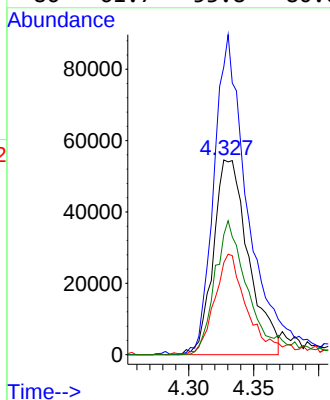
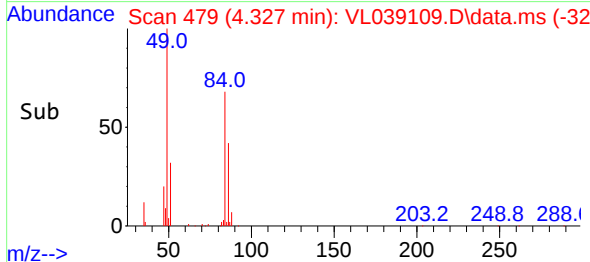
Instrument :
MSVOA_L
ClientSampleId :
VP-2DL



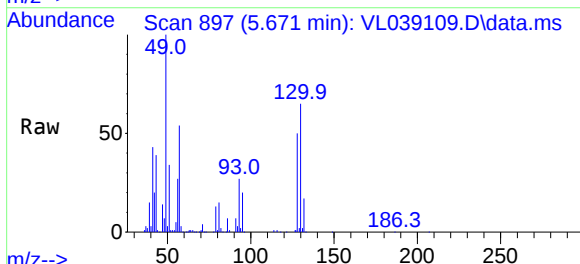
Tgt Ion: 84 Resp: 102729
Ion Ratio Lower Upper
84 100
49 147.8 119.9 179.9
51 46.7 35.7 53.5
86 61.7 53.8 80.6

Manual Integrations
APPROVED

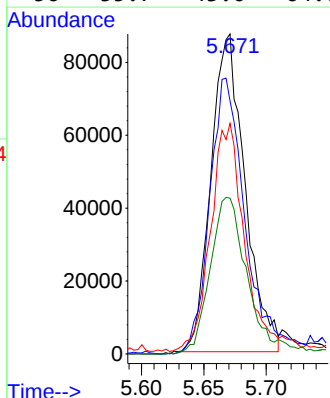
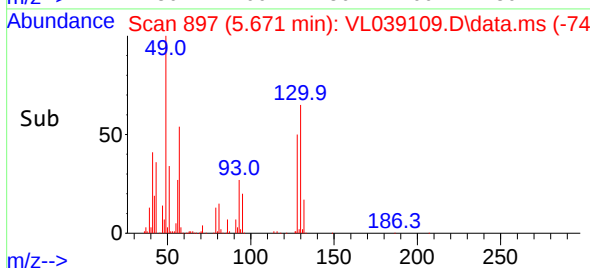
Reviewed By :Semsettin Yesilyurt 05/25/2022
Supervised By :Mahesh Dadoda 05/26/2022

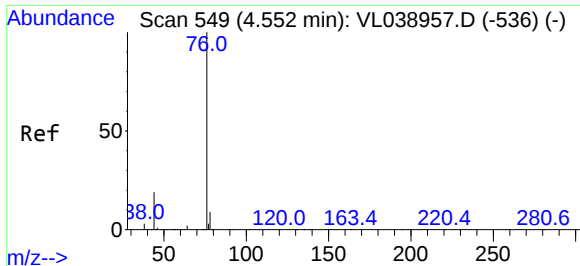


#26
Hexane
Concen: 1.395 ppbv
RT: 5.671 min Scan# 897
Delta R.T. -0.013 min
Lab File: VL039109.D
Acq: 24 May 2022 7:42



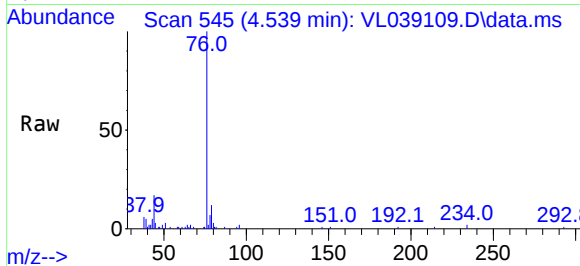
Tgt Ion: 57 Resp: 165877
Ion Ratio Lower Upper
57 100
41 96.1 75.2 112.8
43 76.2 190.8 286.2#
56 55.7 43.0 64.6





#27
Carbon Disulfide
Concen: 0.336 ppbv
RT: 4.539 min Scan# 549
Delta R.T. -0.013 min
Lab File: VL039109.D
Acq: 24 May 2022 7:42

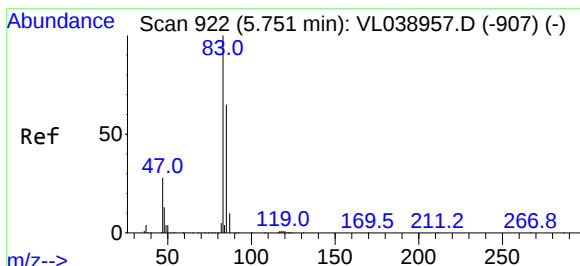
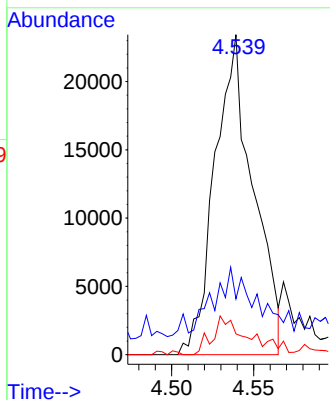
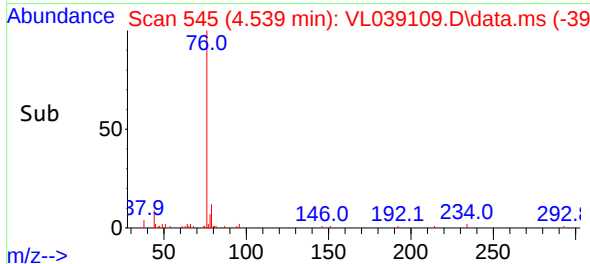
Instrument :
MSVOA_L
ClientSampleId :
VP-2DL



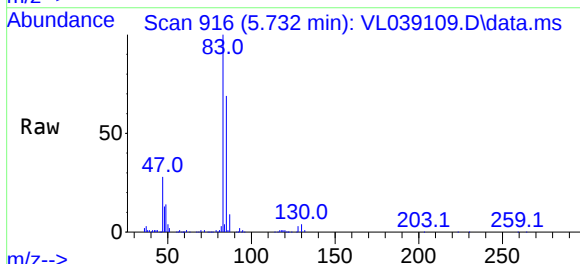
Tgt Ion: 76 Resp: 38015
Ion Ratio Lower Upper
76 100
44 36.1 15.3 22.9
78 13.3 8.2 12.2

Manual Integrations
APPROVED

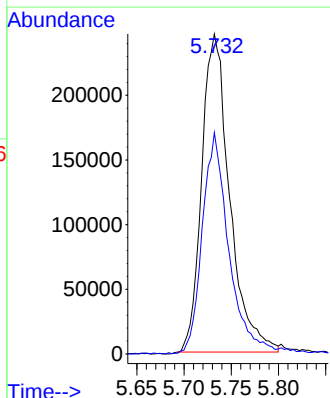
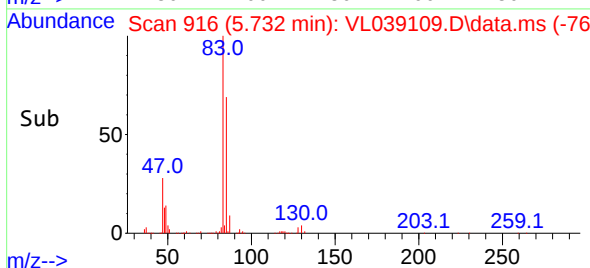
Reviewed By :Semsettin Yesilyurt 05/25/2022
Supervised By :Mahesh Dadoda 05/26/2022

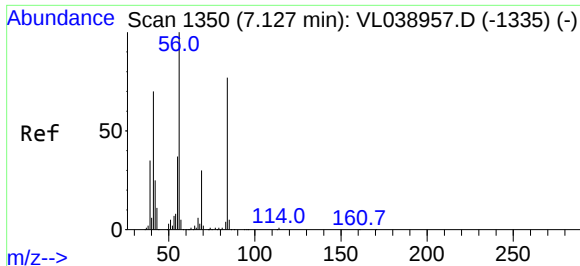


#29
Chloroform
Concen: 2.624 ppbv
RT: 5.732 min Scan# 916
Delta R.T. -0.019 min
Lab File: VL039109.D
Acq: 24 May 2022 7:42



Tgt Ion: 83 Resp: 504879
Ion Ratio Lower Upper
83 100
85 69.3 51.8 77.6





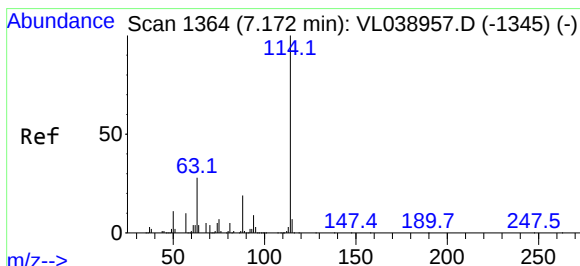
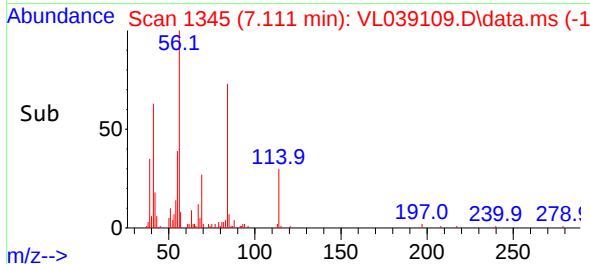
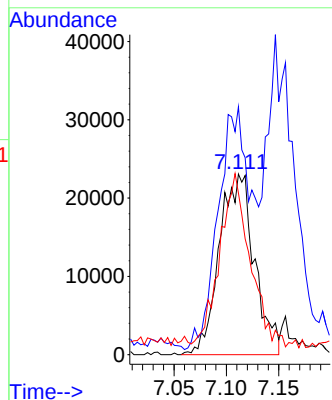
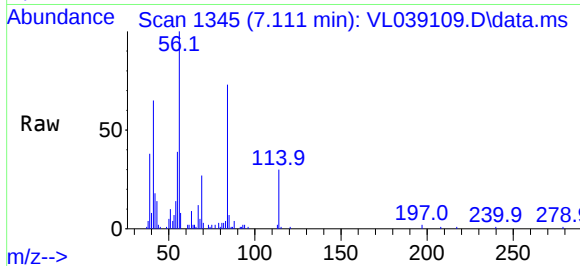
#30
Cyclohexane
Concen: 0.539 ppbv m
RT: 7.111 min Scan# 1345
Delta R.T. -0.016 min
Lab File: VL039109.D
Acq: 24 May 2022 7:42

Instrument :
MSVOA_L
ClientSampleId :
VP-2DL

Tgt Ion: 84 Resp: 53689
Ion Ratio Lower Upper
84 100
56 127.6 115.3 172.9
41 91.9 72.0 108.0

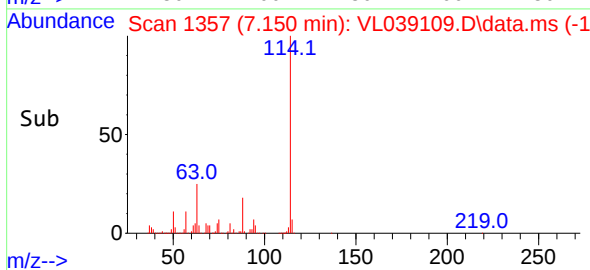
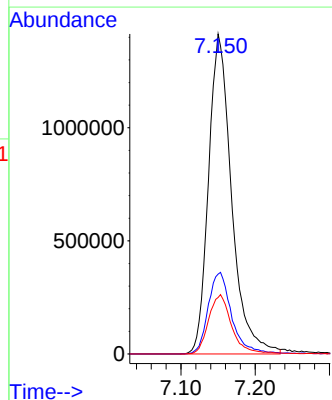
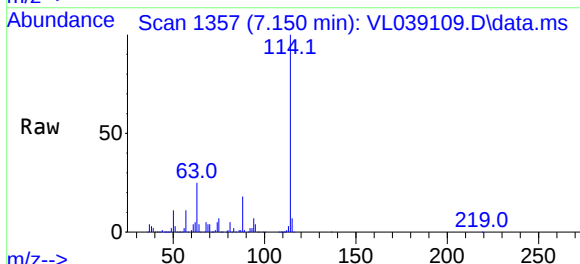
Manual Integrations
APPROVED

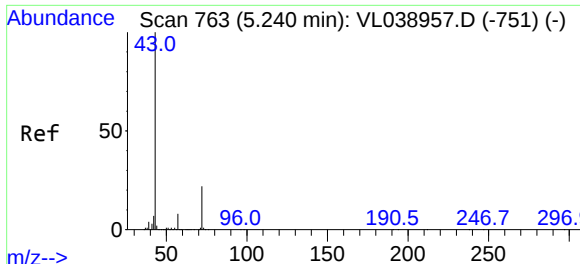
Reviewed By :Semsettin Yesilyurt 05/25/2022
Supervised By :Mahesh Dadoda 05/26/2022



#33
1,4-Difluorobenzene
Concen: 10.000 ppbv
RT: 7.150 min Scan# 1357
Delta R.T. -0.022 min
Lab File: VL039109.D
Acq: 24 May 2022 7:42

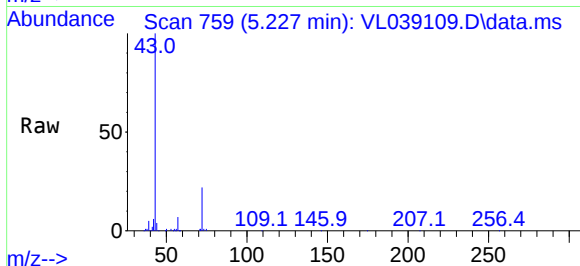
Tgt Ion:114 Resp: 3051580
Ion Ratio Lower Upper
114 100
63 26.4 22.6 33.8
88 18.8 15.4 23.0





#34
2-Butanone
Concen: 1.555 ppbv
RT: 5.227 min Scan# 71
Delta R.T. -0.013 min
Lab File: VL039109.D
Acq: 24 May 2022 7:42

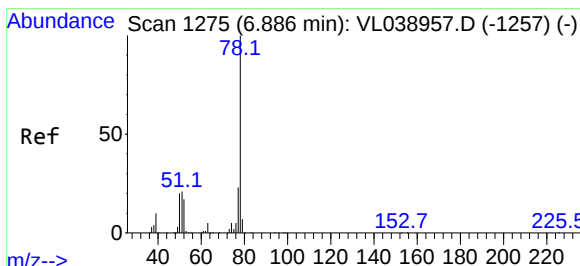
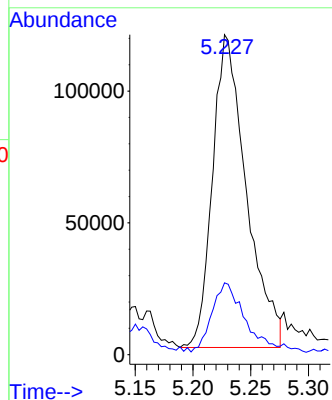
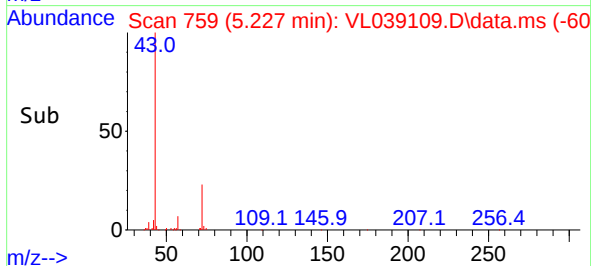
Instrument :
MSVOA_L
ClientSampleId :
VP-2DL



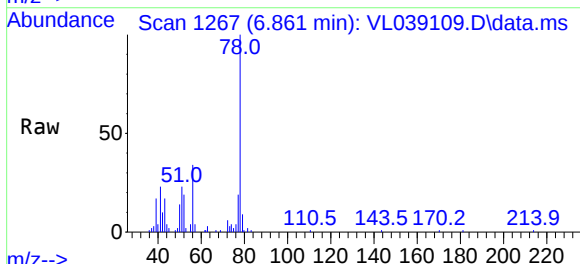
Tgt Ion: 43 Resp: 242080
Ion Ratio Lower Upper
43 100
72 24.5 17.8 26.6

Manual Integrations
APPROVED

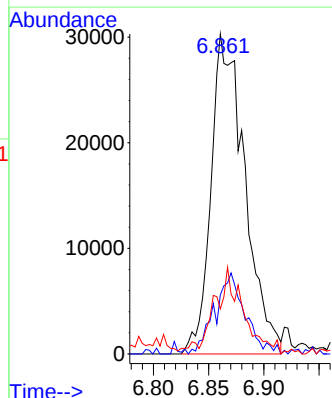
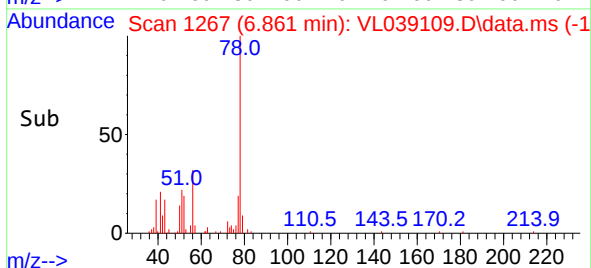
Reviewed By :Semsettin Yesilyurt 05/25/2022
Supervised By :Mahesh Dadoda 05/26/2022

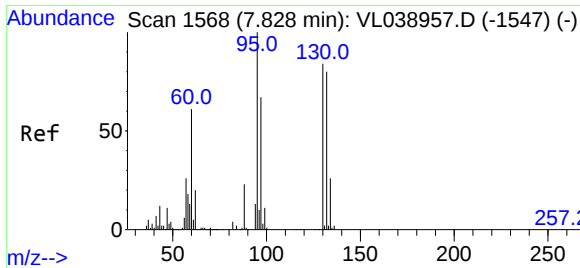


#36
Benzene
Concen: 0.246 ppbv m
RT: 6.861 min Scan# 1267
Delta R.T. -0.026 min
Lab File: VL039109.D
Acq: 24 May 2022 7:42



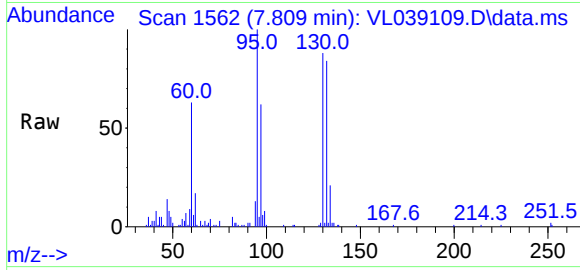
Tgt Ion: 78 Resp: 64314
Ion Ratio Lower Upper
78 100
77 18.5 18.6 28.0#
50 14.1 15.6 23.4#





#38
Trichloroethene
Concen: 0.454 ppbv m
RT: 7.809 min Scan# 1
Delta R.T. -0.019 min
Lab File: VL039109.D
Acq: 24 May 2022 7:42

Instrument :
MSVOA_L
ClientSampleId :
VP-2DL

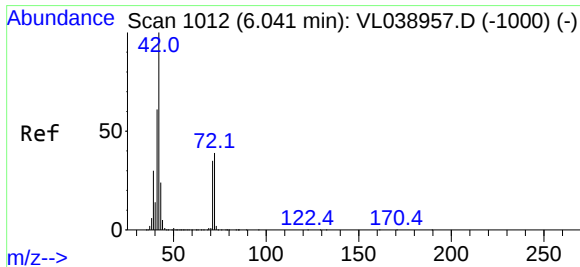
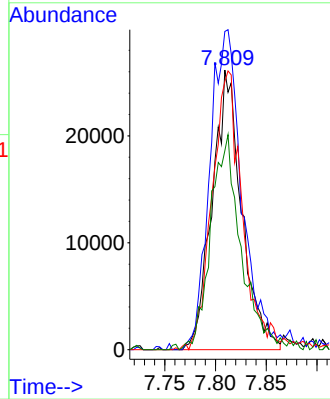
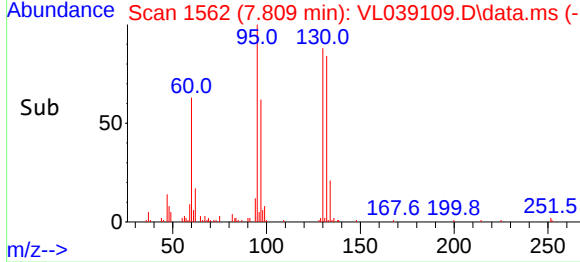


Tgt Ion:130 Resp: 52738

Ion	Ratio	Lower	Upper
130	100		
95	113.8	94.8	142.2
132	95.8	75.8	113.8
97	71.1	63.6	95.4

Manual Integrations
APPROVED

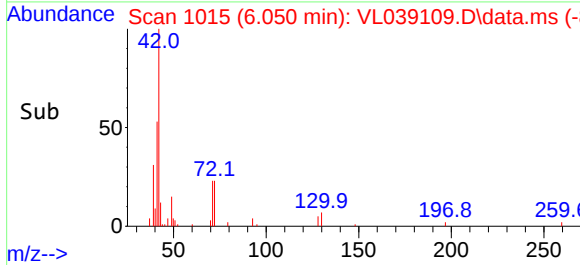
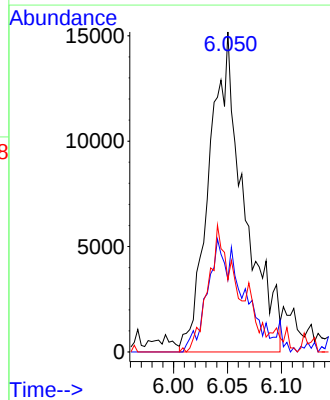
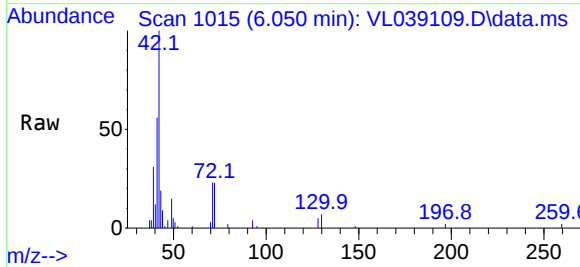
Reviewed By :Semsettin Yesilyurt 05/25/2022
Supervised By :Mahesh Dadoda 05/26/2022

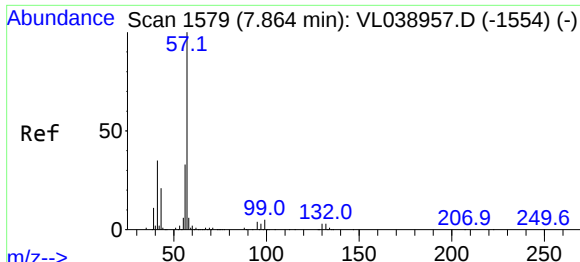


#41
Tetrahydrofuran
Concen: 0.328 ppbv m
RT: 6.050 min Scan# 1015
Delta R.T. 0.010 min
Lab File: VL039109.D
Acq: 24 May 2022 7:42

Tgt Ion: 42 Resp: 34324

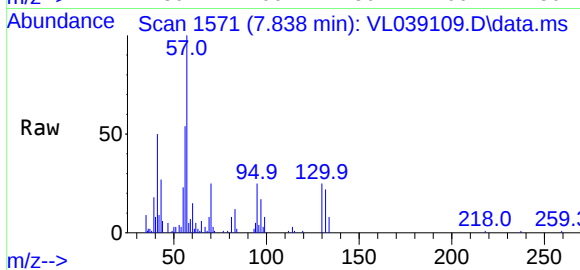
Ion	Ratio	Lower	Upper
42	100		
72	37.3	31.8	47.6
71	37.2	30.6	45.8





#44
2,2,4-Trimethylpentane
Concen: 0.115 ppbv m
RT: 7.838 min Scan# 1579
Delta R.T. -0.026 min
Lab File: VL039109.D
Acq: 24 May 2022 7:42

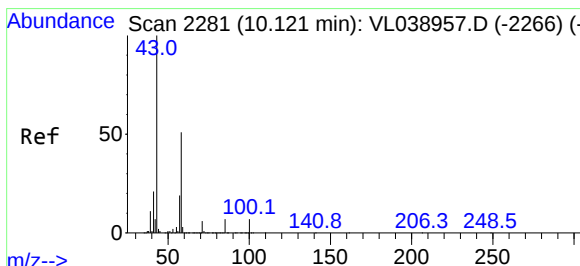
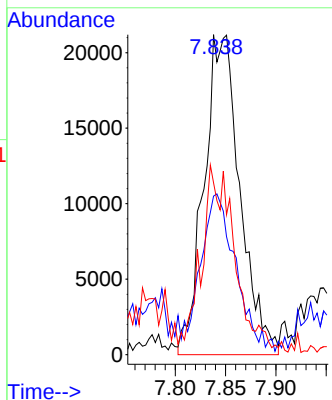
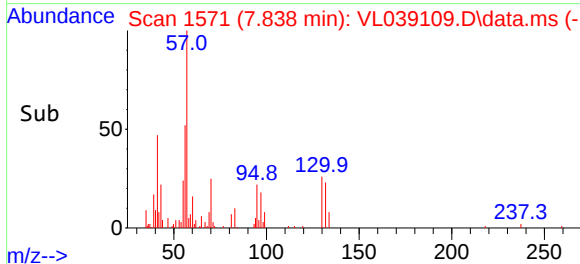
Instrument :
MSVOA_L
ClientSampleId :
VP-2DL



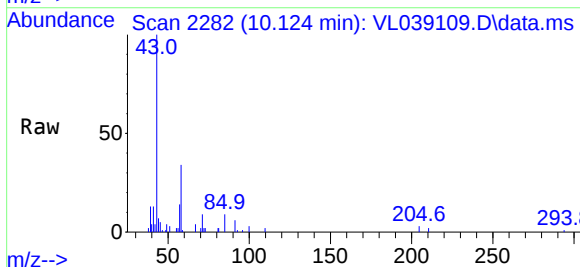
Tgt Ion: 57 Resp: 52778
Ion Ratio Lower Upper
57 100
41 51.9 26.3 39.5#
56 54.1 24.6 37.0#

Manual Integrations
APPROVED

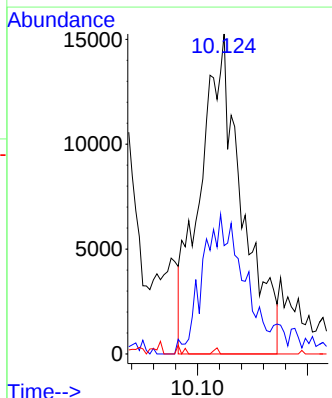
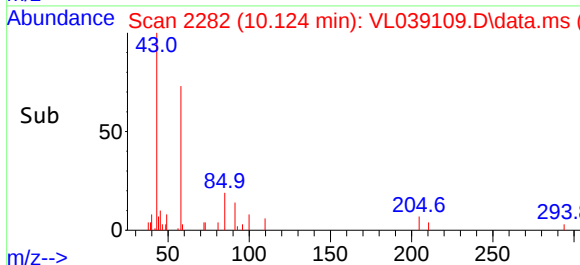
Reviewed By :Semsettin Yesilyurt 05/25/2022
Supervised By :Mahesh Dadoda 05/26/2022

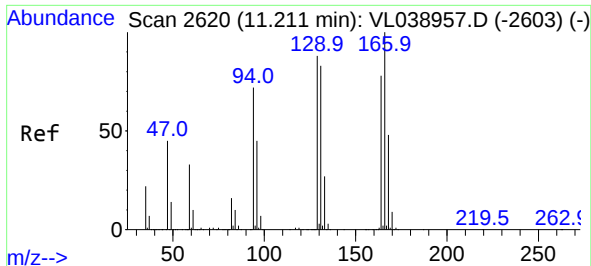


#51
2-Hexanone
Concen: 0.202 ppbv m
RT: 10.124 min Scan# 2282
Delta R.T. 0.003 min
Lab File: VL039109.D
Acq: 24 May 2022 7:42



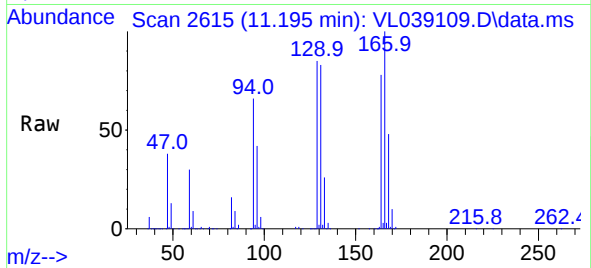
Tgt Ion: 43 Resp: 40311
Ion Ratio Lower Upper
43 100
58 0.0 39.3 58.9#
98 0.0 0.2 0.2#





#52
Tetrachloroethene
Concen: 7.484 ppbv
RT: 11.195 min Scan# 2174
Delta R.T. -0.016 min
Lab File: VL039109.D
Acq: 24 May 2022 7:42

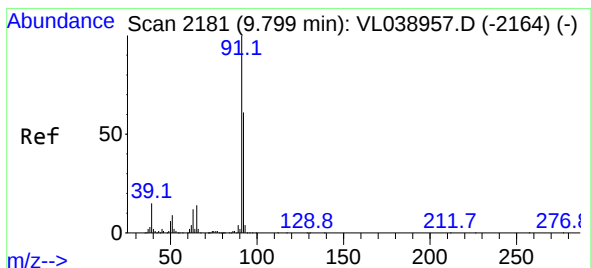
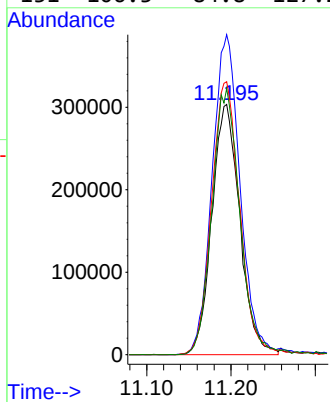
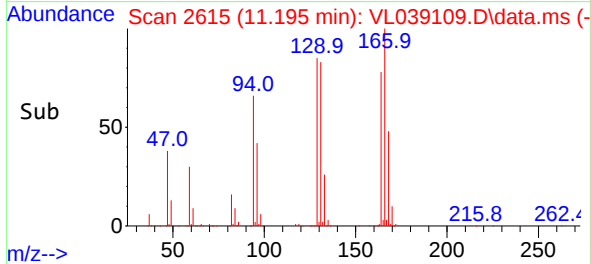
Instrument :
MSVOA_L
ClientSampleId :
VP-2DL



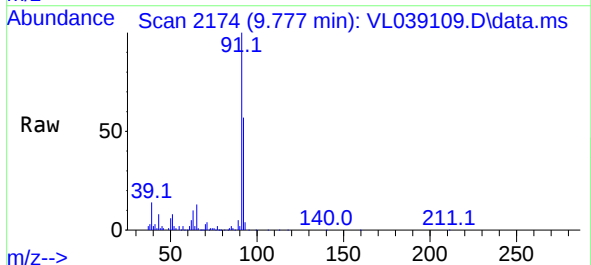
Tgt Ion:164 Resp: 69846
Ion Ratio Lower Upper
164 100
166 127.7 102.5 153.7
129 109.1 90.1 135.1
131 106.3 84.8 127.2

Manual Integrations
APPROVED

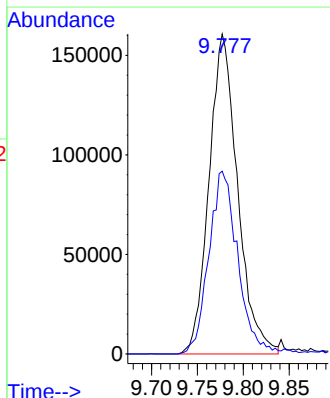
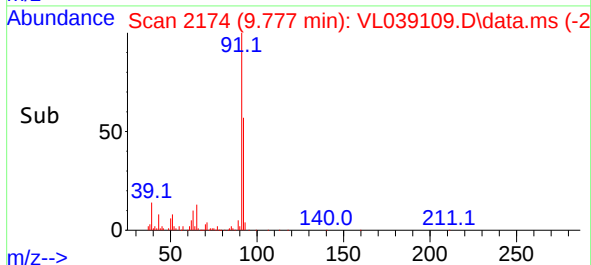
Reviewed By :Semsettin Yesilyurt 05/25/2022
Supervised By :Mahesh Dadoda 05/26/2022

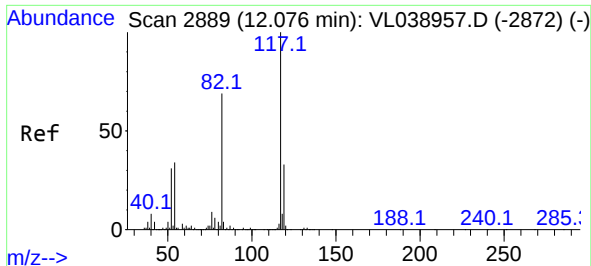


#53
Toluene
Concen: 1.190 ppbv
RT: 9.777 min Scan# 2174
Delta R.T. -0.022 min
Lab File: VL039109.D
Acq: 24 May 2022 7:42



Tgt Ion: 91 Resp: 348183
Ion Ratio Lower Upper
91 100
92 58.6 48.2 72.2





#55

Chlorobenzene-d5

Concen: 10.000 ppbv

RT: 12.057 min Scan# 2883

Delta R.T. -0.019 min

Lab File: VL039109.D

Acq: 24 May 2022 7:42

Instrument :

MSVOA_L

ClientSampleId :

VP-2DL

Tgt Ion:117 Resp: 2656049

Ion Ratio Lower Upper

117 100

82 70.5 57.0 85.6

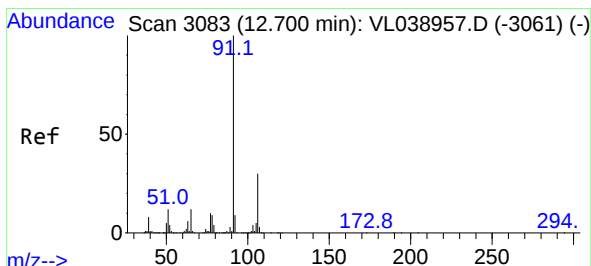
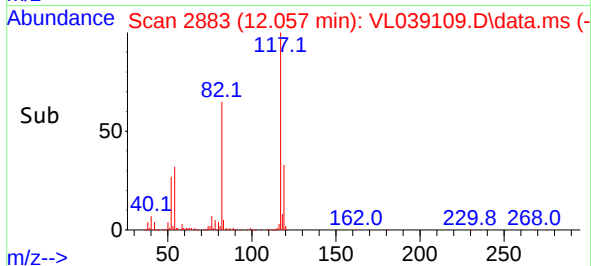
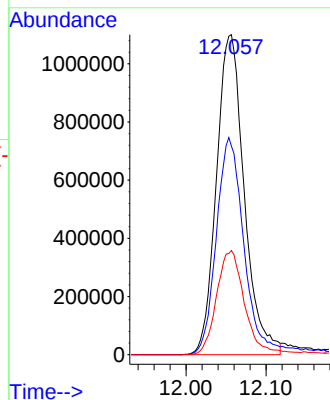
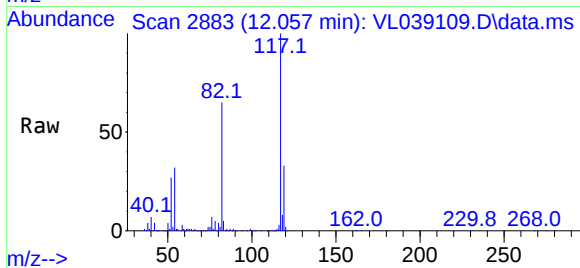
119 33.7 27.2 40.8

Manual Integrations

APPROVED

Reviewed By :Semsettin Yesilyurt 05/25/2022

Supervised By :Mahesh Dadoda 05/26/2022



#58

Ethyl Benzene

Concen: 0.294 ppbv

RT: 12.677 min Scan# 3076

Delta R.T. -0.022 min

Lab File: VL039109.D

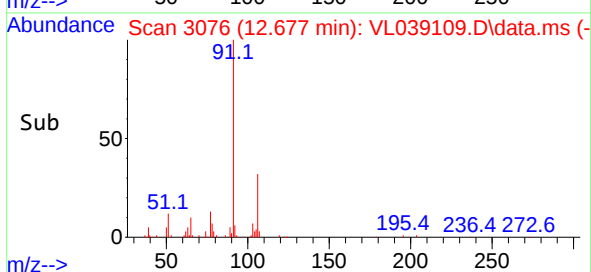
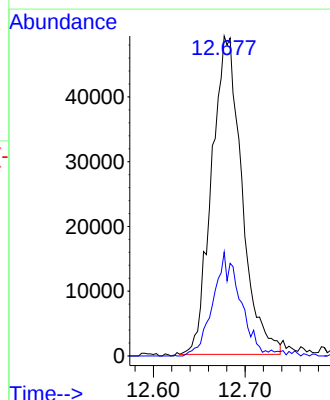
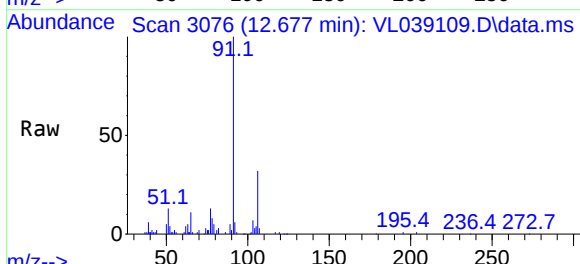
Acq: 24 May 2022 7:42

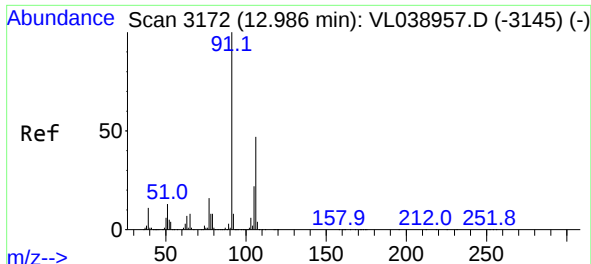
Tgt Ion: 91 Resp: 112324

Ion Ratio Lower Upper

91 100

106 32.6 24.2 36.4





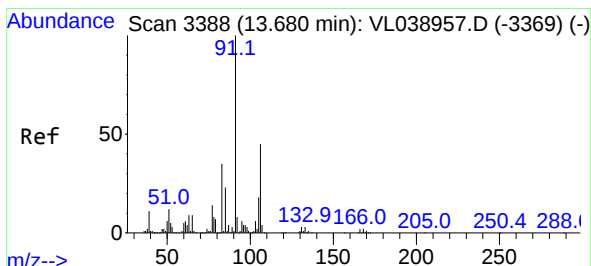
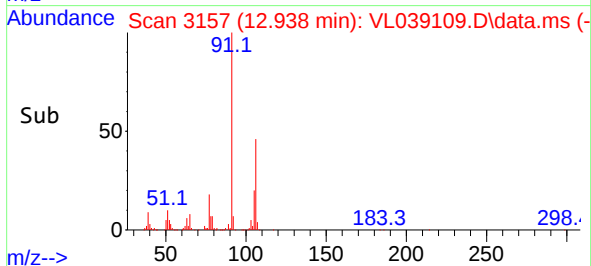
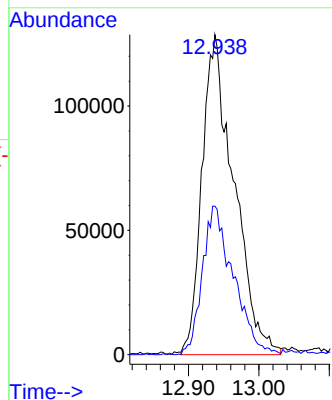
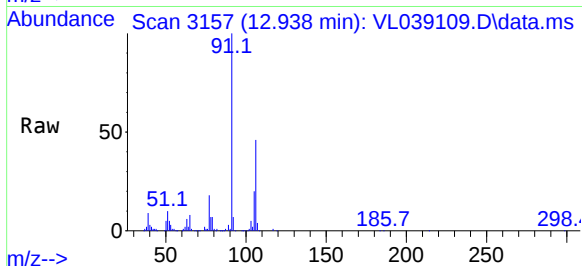
#59
m/p-Xylene
Concen: 1.237 ppbv m
RT: 12.938 min Scan# 3172
Delta R.T. -0.048 min
Lab File: VL039109.D
Acq: 24 May 2022 7:42

Instrument :
MSVOA_L
ClientSampleId :
VP-2DL

Tgt Ion: 91 Resp: 40378
Ion Ratio Lower Upper
91 100
106 0.0 34.6 52.0

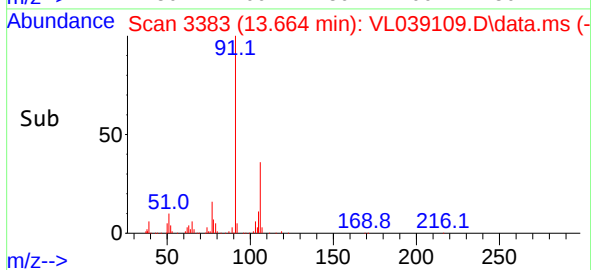
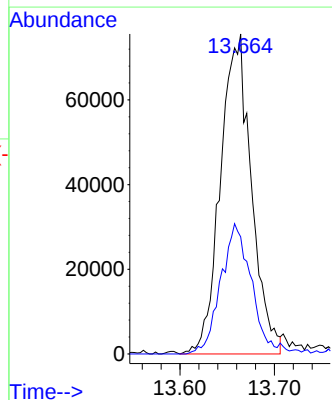
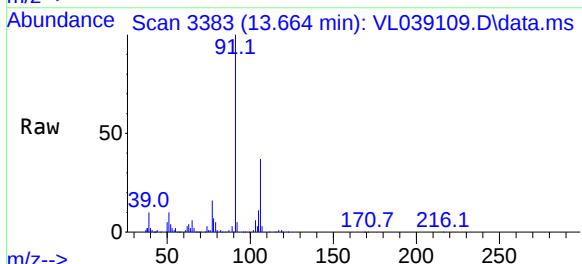
Manual Integrations
APPROVED

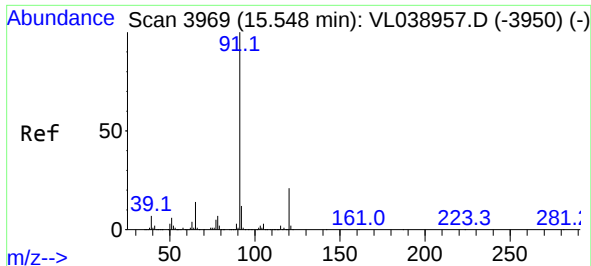
Reviewed By :Semsettin Yesilyurt 05/25/2022
Supervised By :Mahesh Dadoda 05/26/2022



#60
o-Xylene
Concen: 0.559 ppbv
RT: 13.664 min Scan# 3383
Delta R.T. -0.016 min
Lab File: VL039109.D
Acq: 24 May 2022 7:42

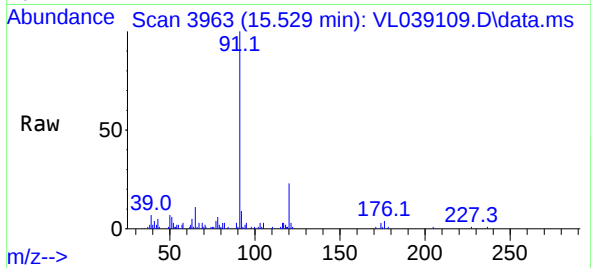
Tgt Ion: 91 Resp: 171739
Ion Ratio Lower Upper
91 100
106 40.9 22.2 66.6





#64
n-propylbenzene
Concen: 0.126 ppbv m
RT: 15.529 min Scan# 3963
Delta R.T. -0.019 min
Lab File: VL039109.D
Acq: 24 May 2022 7:42

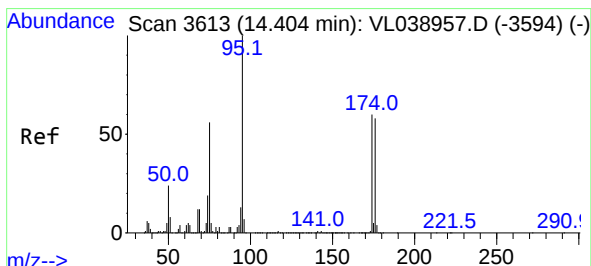
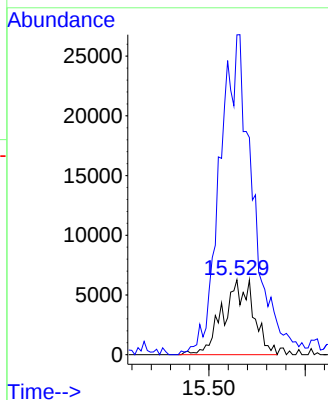
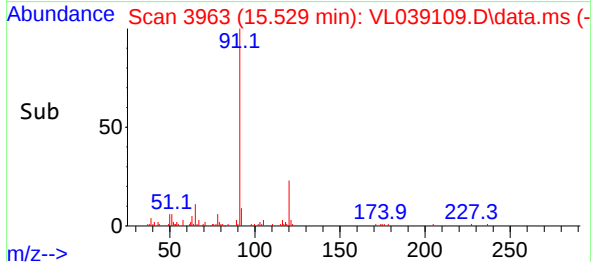
Instrument :
MSVOA_L
ClientSampleId :
VP-2DL



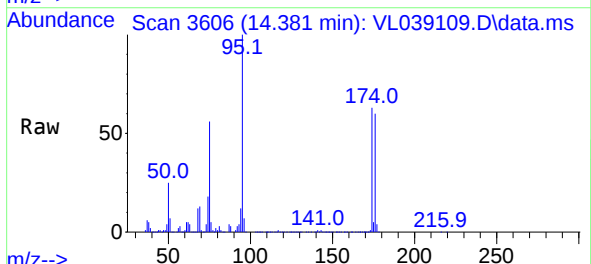
Tgt Ion:120 Resp: 13720
Ion Ratio Lower Upper
120 100
91 469.8 400.6 601.0

Manual Integrations
APPROVED

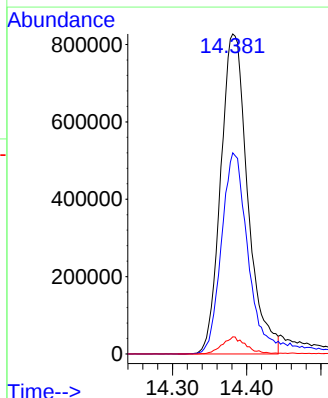
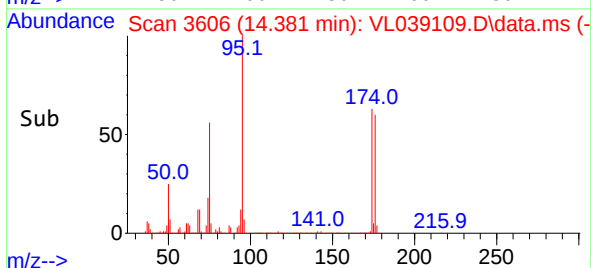
Reviewed By :Semsettin Yesilyurt 05/25/2022
Supervised By :Mahesh Dadoda 05/26/2022

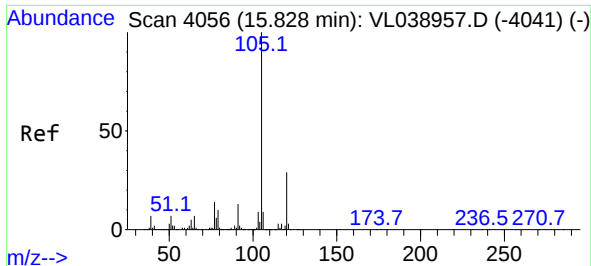


#68
1-Bromo-4-Fluorobenzene
Concen: 9.929 ppbv
RT: 14.381 min Scan# 3606
Delta R.T. -0.022 min
Lab File: VL039109.D
Acq: 24 May 2022 7:42



Tgt Ion: 95 Resp: 2088589
Ion Ratio Lower Upper
95 100
174 66.6 50.8 76.2
175 4.7 3.8 5.6





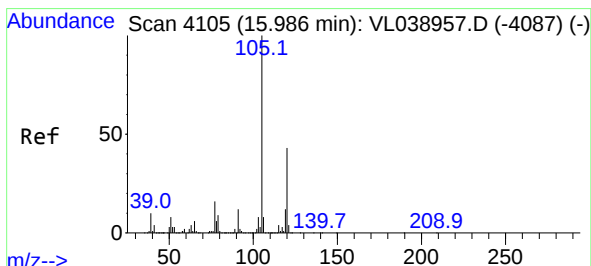
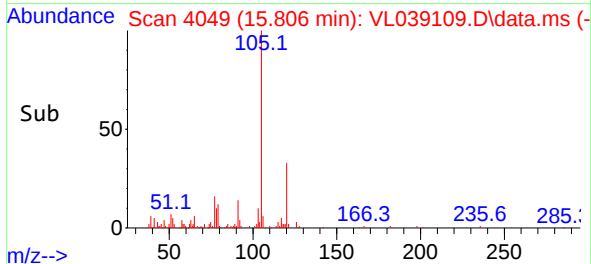
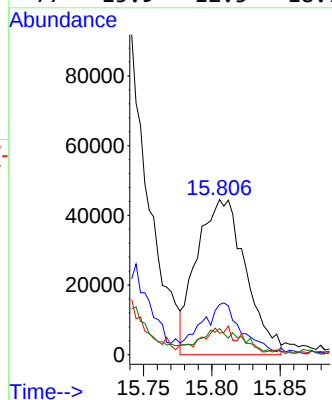
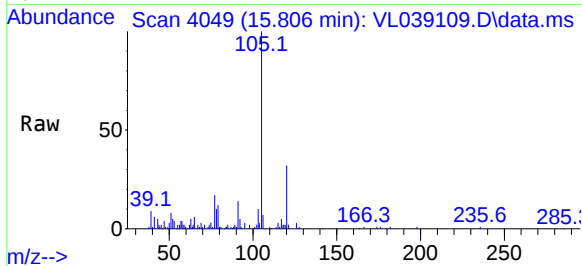
#72
4-Ethyltoluene
Concen: 0.317 ppbv m
RT: 15.806 min Scan# 4049
Delta R.T. -0.022 min
Lab File: VL039109.D
Acq: 24 May 2022 7:42

Instrument :
MSVOA_L
ClientSampleId :
VP-2DL

Tgt Ion:105 Resp: 110924
Ion Ratio Lower Upper
105 100
120 26.4 23.4 35.0
91 12.7 10.6 16.0
77 15.9 12.5 18.7

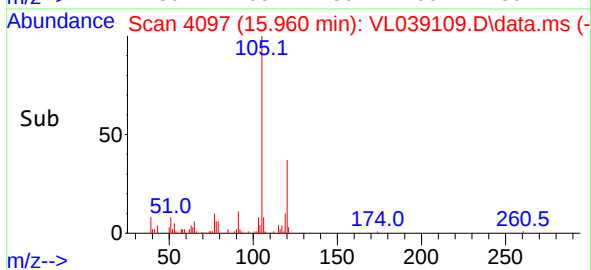
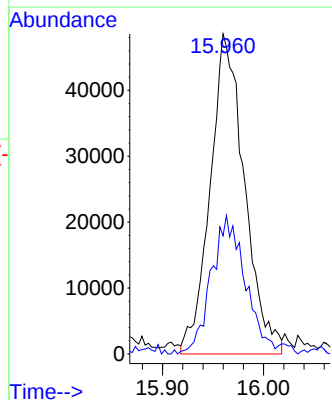
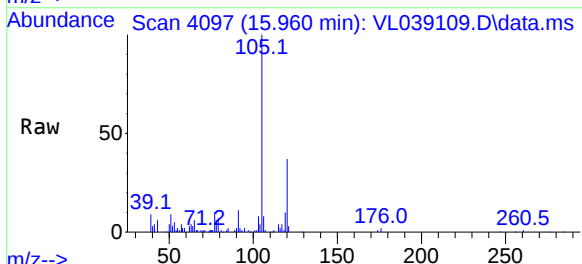
Manual Integrations
APPROVED

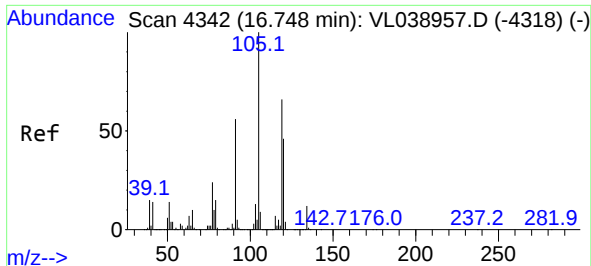
Reviewed By :Semsettin Yesilyurt 05/25/2022
Supervised By :Mahesh Dadoda 05/26/2022



#73
1,3,5-Trimethylbenzene
Concen: 0.364 ppbv m
RT: 15.960 min Scan# 4097
Delta R.T. -0.026 min
Lab File: VL039109.D
Acq: 24 May 2022 7:42

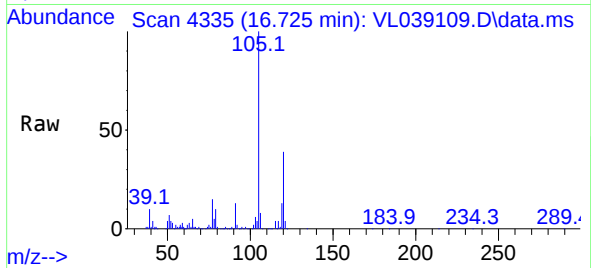
Tgt Ion:105 Resp: 114663
Ion Ratio Lower Upper
105 100
120 37.0 34.4 51.6





#74
1,2,4-Trimethylbenzene
Concen: 1.161 ppbv
RT: 16.725 min Scan# 41
Delta R.T. -0.022 min
Lab File: VL039109.D
Acq: 24 May 2022 7:42

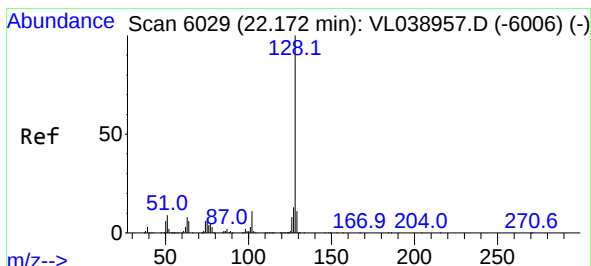
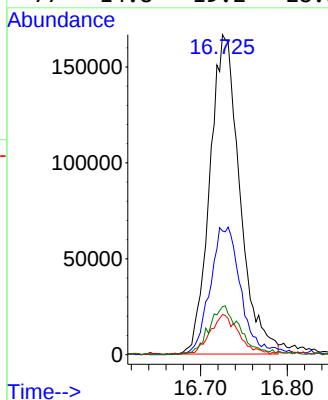
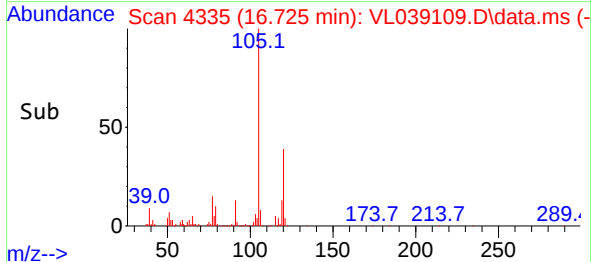
Instrument :
MSVOA_L
ClientSampleId :
VP-2DL



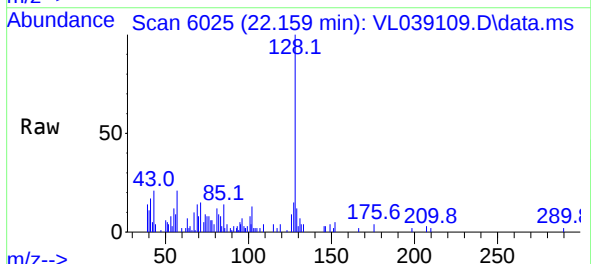
Tgt Ion:105 Resp: 40045
Ion Ratio Lower Upper
105 100
120 38.5 36.9 55.3
91 12.6 45.0 67.4
77 14.8 19.2 28.8

Manual Integrations
APPROVED

Reviewed By :Semsettin Yesilyurt 05/25/2022
Supervised By :Mahesh Dadoda 05/26/2022



#79
Naphthalene
Concen: 0.143 ppbv m
RT: 22.159 min Scan# 6025
Delta R.T. -0.013 min
Lab File: VL039109.D
Acq: 24 May 2022 7:42



Tgt Ion:128 Resp: 39987
Ion Ratio Lower Upper
128 100
127 15.2 10.2 15.2
129 11.8 8.9 13.3

