

Data File : VL031228.D

Acq On : 14 Dec 2017 12:33

Operator : SY/AP

Sample : I6808-01DUP

Misc : 400ml/MSVOA_L

ALS Vial : 1 Sample Multiplier: 1

Instrument :

MSVOA_L

ClientSampleId :

AIR-UNIT-3DUP

Manual Integrations
APPROVEDMMDadoda
12/15/2017 4:07:08 PM

Quant Time: Dec 16 02:57:37 2017

Quant Method : W:\HPCHEM1\MSVOA_L\METHODS\VL121317AIR.M

Quant Title : AIR ANALYSIS BY METHOD TO-15 Instrument: MSVOA_LThu Dec 14

QLast Update : Thu Dec 14 04:29:58 2017

Response via : Initial Calibration

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Bromochloromethane	5.91	49	1427022	10.00	ppbv	0.00
33) 1,4-Difluorobenzene	7.45	114	3278149	10.00	ppbv	0.00
55) Chlorobenzene-d5	12.41	117	2625020	10.00	ppbv	0.00

System Monitoring Compounds

68) 1-Bromo-4-Fluorobenzene	14.75	95	2288195	12.25	ppbv	0.00
Spiked Amount	10.000	Range	65 - 135	Recovery	=	122.50%

Target Compounds

						Qvalue
2) Dichlorodifluoromethane	3.18	85	40977	0.34	ppbv	98
3) Chlorodifluoromethane	3.12	51	165178m	1.02	ppbv	
4) Chloromethane	3.28	50	44146	0.50	ppbv	91
9) Propene	3.14	41	54805	0.69	ppbv	86
11) Trichlorofluoromethane	4.13	101	53975	0.27	ppbv	97
13) Ethanol	3.77	45	336199	14.64	ppbv	99
15) Acetone	4.03	43	968141	5.14	ppbv	100
19) Isopropyl Alcohol	4.16	45	177066	1.49	ppbv #	1
20) Methylene Chloride	4.54	84	82991	1.33	ppbv	92
26) Hexane	5.93	57	520835	2.85	ppbv #	44
34) 2-Butanone	5.48	43	44948	0.19	ppbv	94
35) Carbon Tetrachloride	7.30	117	16482m	0.07	ppbv	
36) Benzene	7.16	78	97763	0.28	ppbv	96
44) 2,2,4-Trimethylpentane	8.15	57	45213	0.09	ppbv #	78
53) Toluene	10.11	91	186948	0.50	ppbv	97
58) Ethyl Benzene	13.03	91	39274	0.09	ppbv	100
59) m/p-Xylene	13.29	91	94520m	0.27	ppbv	
60) o-Xylene	14.02	91	40578	0.12	ppbv	100
61) Styrene	13.86	104	9735m	0.10	ppbv	
73) 1,3,5-Trimethylbenzene	16.32	105	38166	0.11	ppbv #	80
74) 1,2,4-Trimethylbenzene	17.09	105	91686	0.26	ppbv #	76
79) Naphthalene	22.62	128	33965m	0.12	ppbv	

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

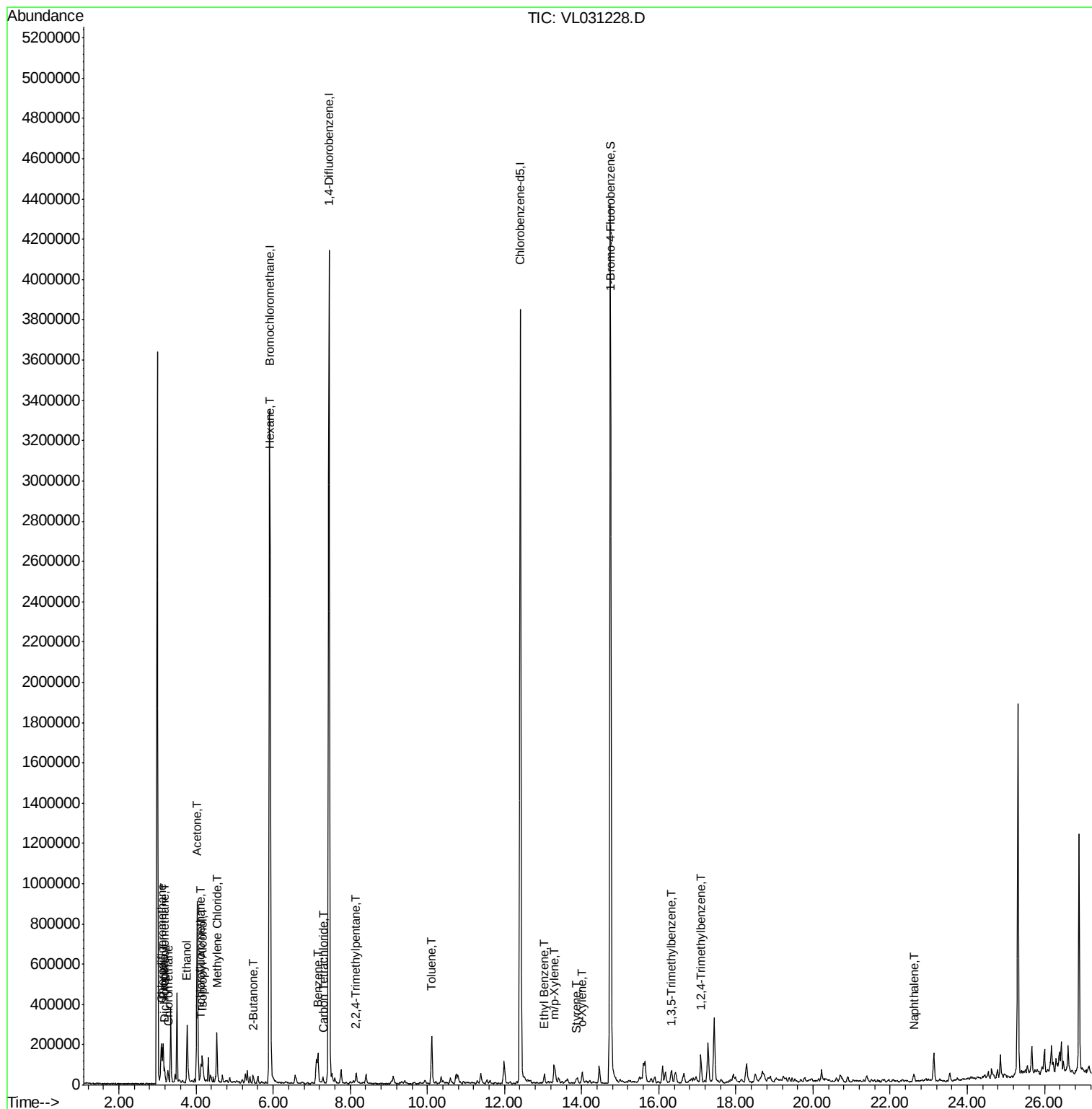
Data File : VL031228.D
Acq On : 14 Dec 2017 12:33
Operator : SY/AP
Sample : I6808-01DUP
Misc : 400ml/MSVOA_L
ALS Vial : 1 Sample Multiplier: 1

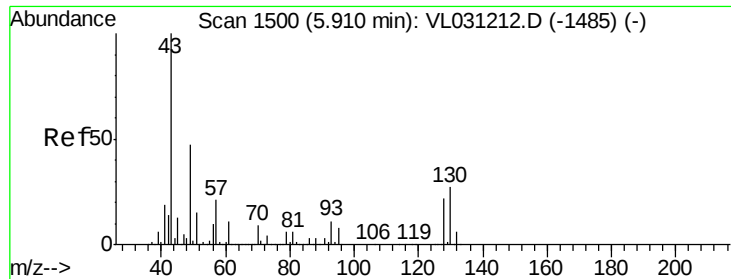
Instrument :
MSVOA_L
ClientSampleId :
AIR-UNIT-3DUP

Manual Integrations
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12/15/2017 4:07:08 PM

Quant Time: Dec 16 02:57:37 2017
Quant Method : W:\HPCHEM1\MSVOA_L\METHODS\VL121317AIR.M
Quant Title : AIR ANALYSIS BY METHOD TO-15 Instrument: MSVOA_L Thu Dec
QLast Update : Thu Dec 14 04:29:58 2017
Response via : Initial Calibration





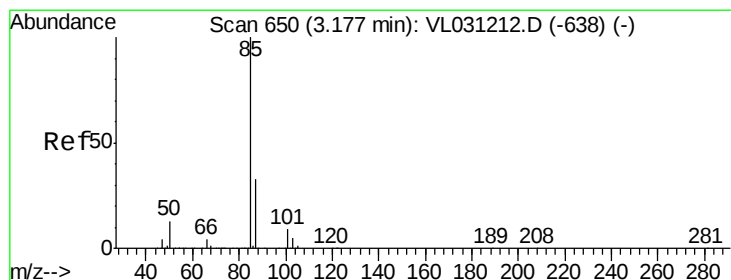
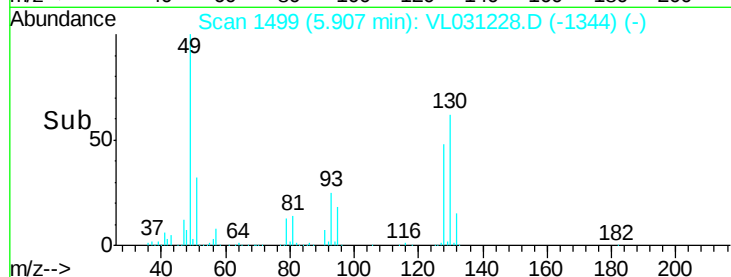
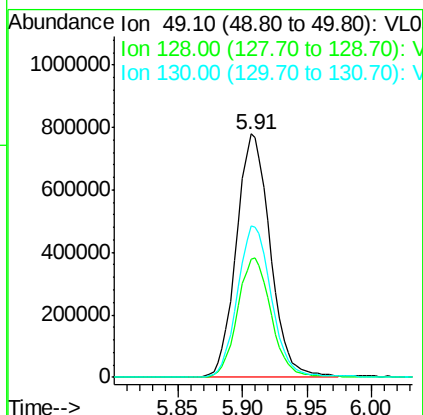
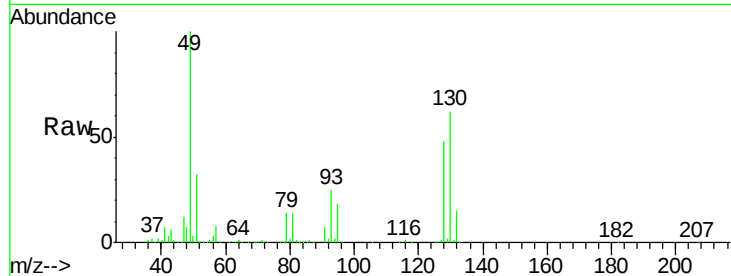
#1
Bromochloromethane
Concen: 10.00 ppbv
RT: 5.91 min Scan# 1499
Delta R.T. -0.00 min
Lab File: VL031228.D
Acq: 14 Dec 2017 12:33

Instrument :
MSVOA_L
ClientSampleId :
AIR-UNIT-3DUP

Tgt Ion: 49 Resp: 1427022
Ion Ratio Lower Upper
49 100
128 49.3 23.2 69.5
130 63.0 29.6 88.8

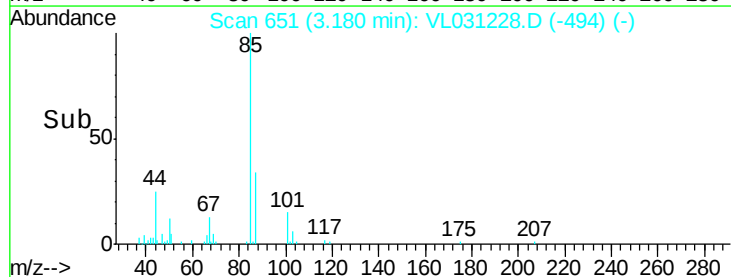
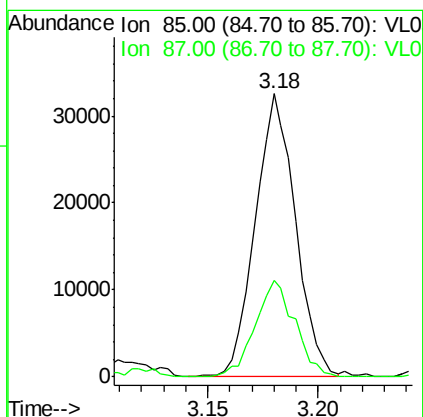
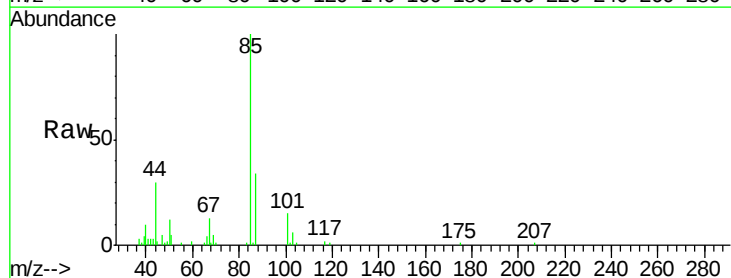
Manual Integrations
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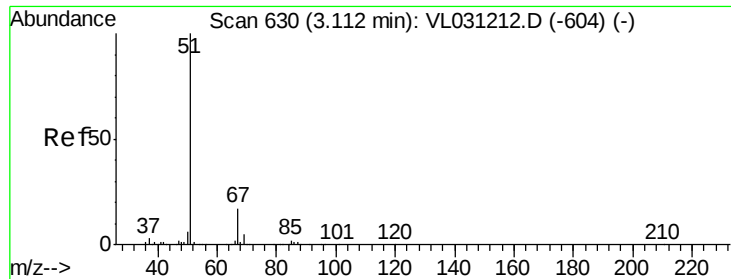
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#2
Dichlorodifluoromethane
Concen: 0.34 ppbv
RT: 3.18 min Scan# 651
Delta R.T. 0.00 min
Lab File: VL031228.D
Acq: 14 Dec 2017 12:33

Tgt Ion: 85 Resp: 40977
Ion Ratio Lower Upper
85 100
87 34.0 26.2 39.2





#3

Chlorodifluoromethane

Concen: 1.02 ppbv m

RT: 3.12 min Scan# 631

Delta R.T. 0.00 min

Lab File: VL031228.D

Acq: 14 Dec 2017 12:33

Instrument :

MSVOA_L

ClientSampleId :

AIR-UNIT-3DUP

Tgt Ion: 51 Resp: 165178

Ion Ratio Lower Upper

51 100

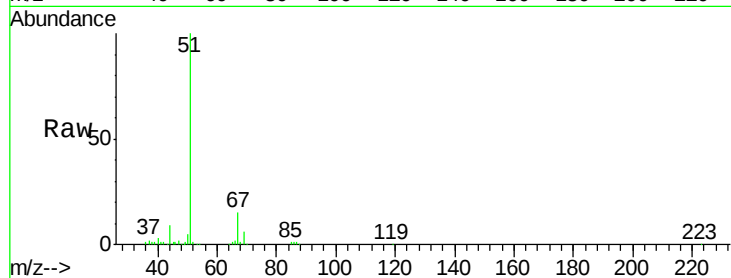
67 15.9 13.8 20.6

Manual Integrations

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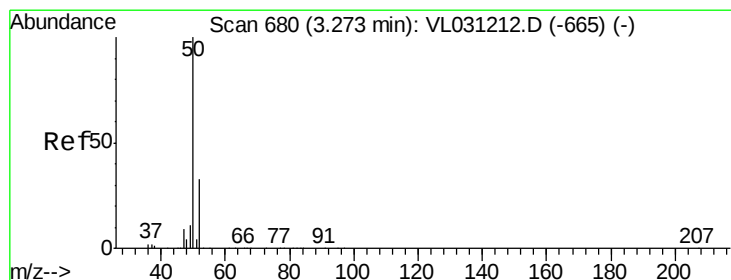
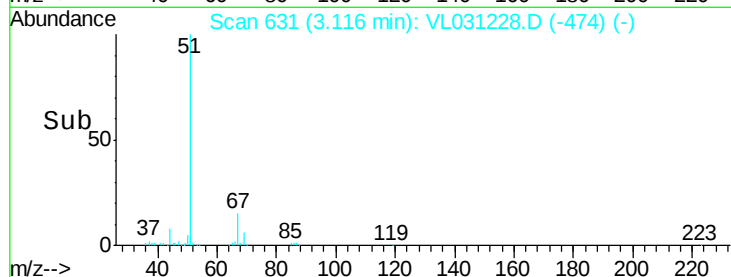
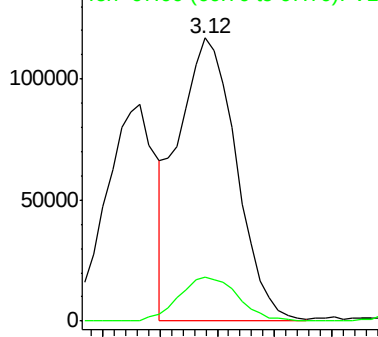
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Abundance Ion 51.00 (50.70 to 51.70): VL0

Ion 67.00 (66.70 to 67.70): VL0



#4

Chloromethane

Concen: 0.50 ppbv

RT: 3.28 min Scan# 681

Delta R.T. 0.00 min

Lab File: VL031228.D

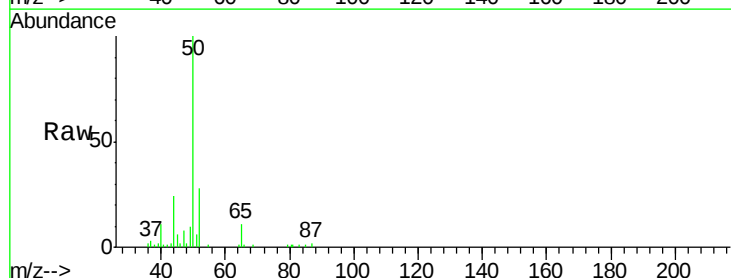
Acq: 14 Dec 2017 12:33

Tgt Ion: 50 Resp: 44146

Ion Ratio Lower Upper

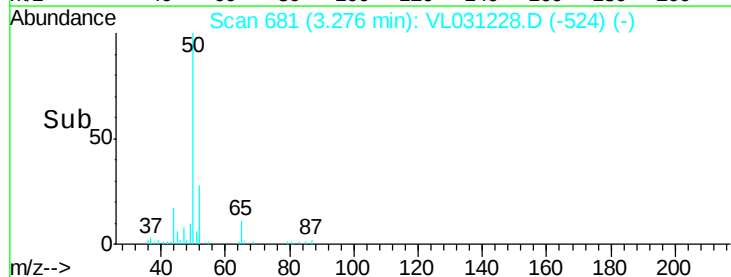
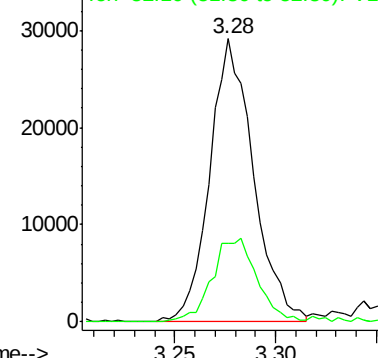
50 100

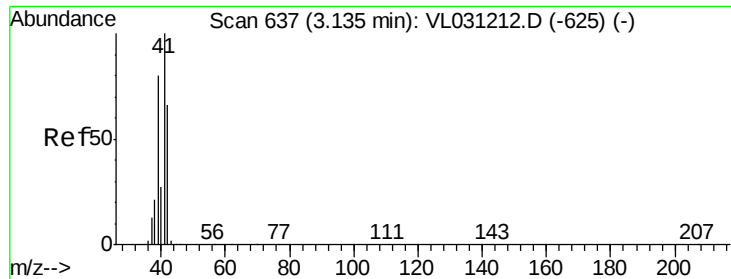
52 27.8 26.5 39.7



Abundance Ion 50.10 (49.80 to 50.80): VL0

Ion 52.10 (51.80 to 52.80): VL0





#9

Propene

Concen: 0.69 ppbv

RT: 3.14 min Scan# 640

Delta R.T. 0.01 min

Lab File: VL031228.D

Acq: 14 Dec 2017 12:33

Instrument :

MSVOA_L

ClientSampleId :

AIR-UNIT-3DUP

Tgt Ion: 41 Resp: 54805

Ion Ratio Lower Upper

41 100

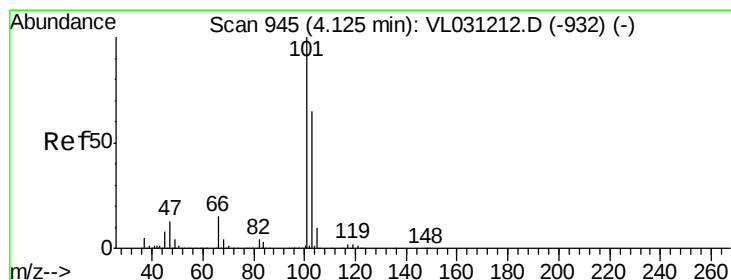
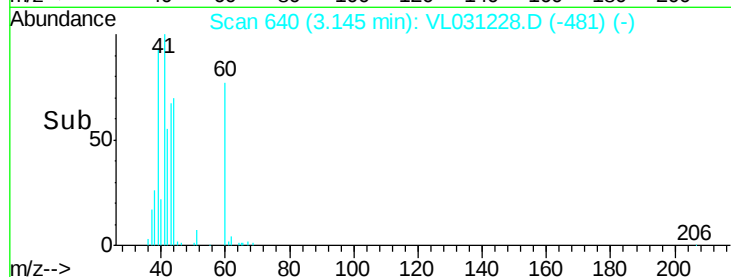
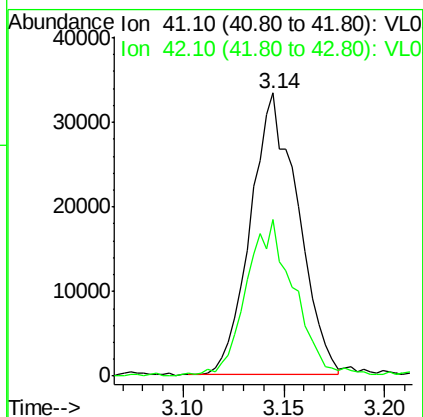
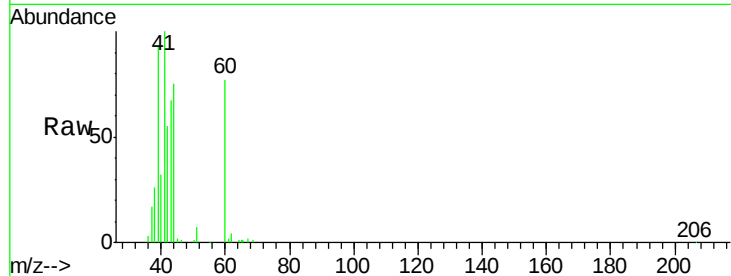
42 56.3 54.3 81.5

Manual Integrations

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#11

Trichlorofluoromethane

Concen: 0.27 ppbv

RT: 4.13 min Scan# 946

Delta R.T. 0.00 min

Lab File: VL031228.D

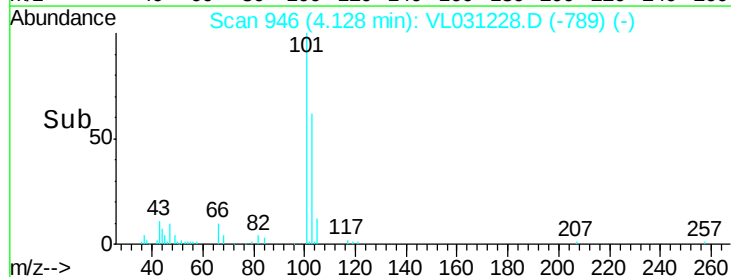
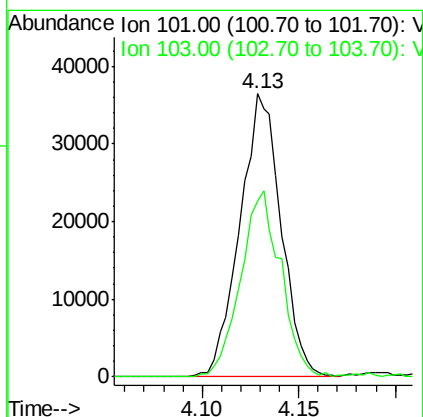
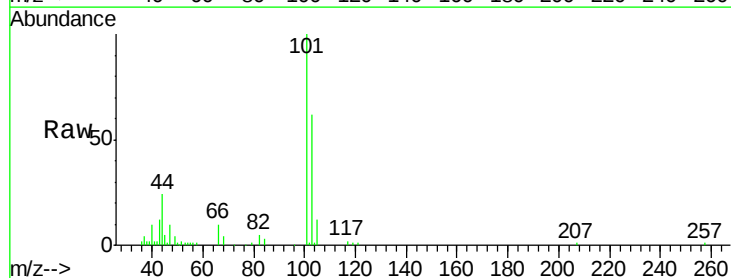
Acq: 14 Dec 2017 12:33

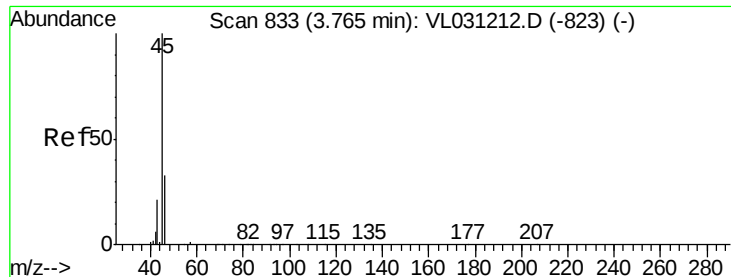
Tgt Ion: 101 Resp: 53975

Ion Ratio Lower Upper

101 100

103 62.2 51.8 77.8





#13

Ethanol

Concen: 14.64 ppbv

RT: 3.77 min Scan# 835

Delta R.T. 0.01 min

Lab File: VL031228.D

Acq: 14 Dec 2017 12:33

Instrument :

MSVOA_L

ClientSampleId :

AIR-UNIT-3DUP

Tgt Ion: 45 Resp: 336199

Ion Ratio Lower Upper

45 100

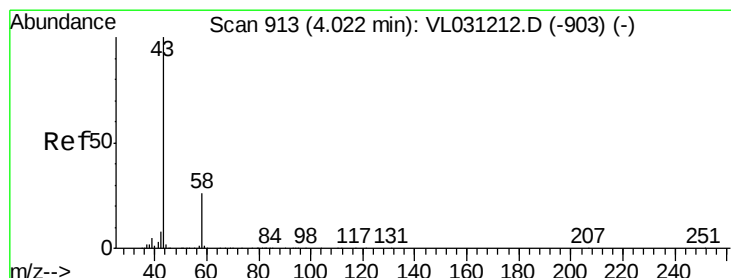
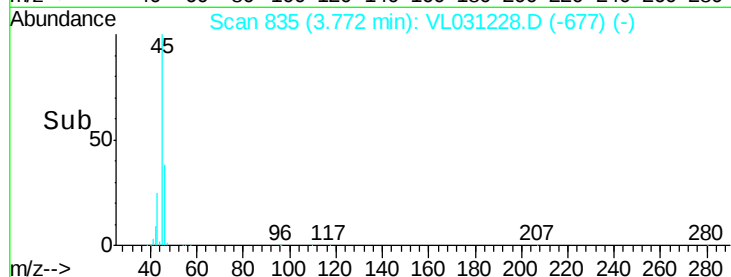
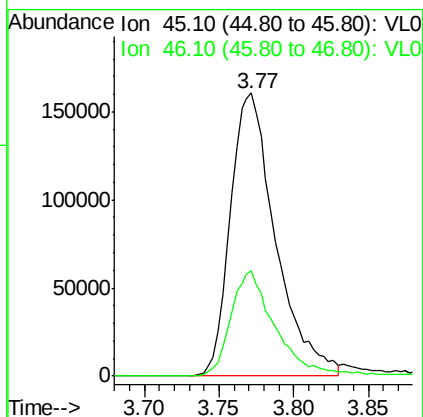
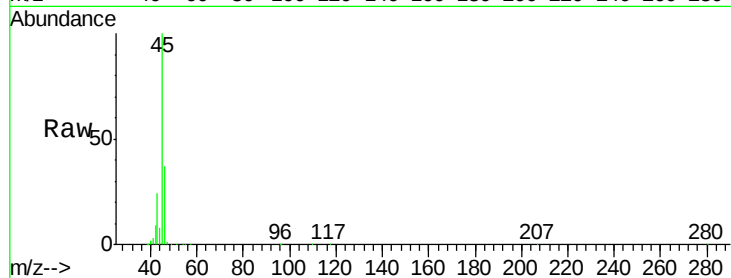
46 37.3 14.6 58.4

Manual Integrations

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#15

Acetone

Concen: 5.14 ppbv

RT: 4.03 min Scan# 914

Delta R.T. 0.00 min

Lab File: VL031228.D

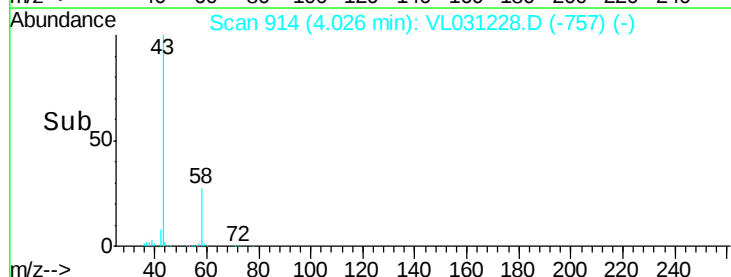
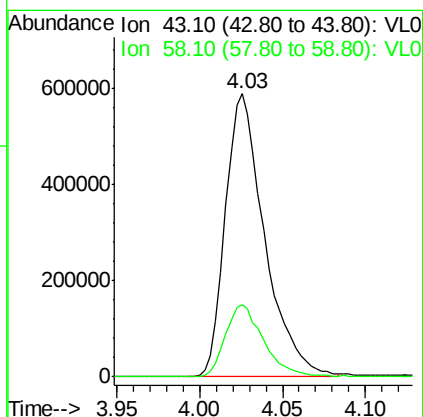
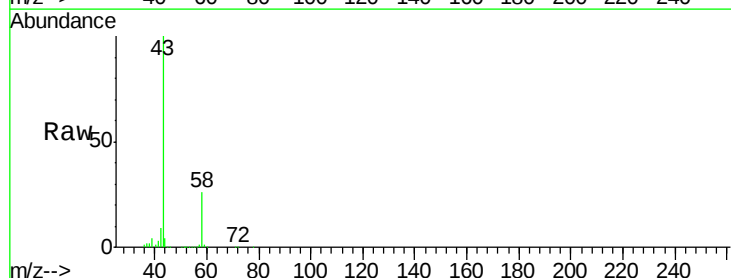
Acq: 14 Dec 2017 12:33

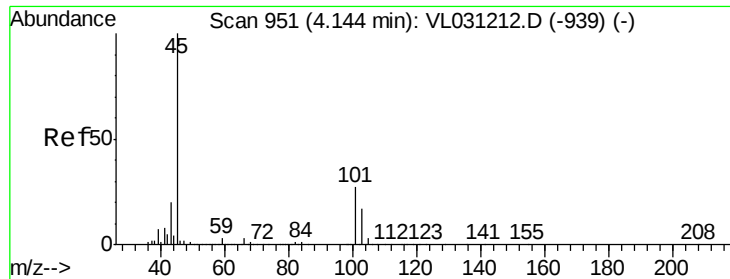
Tgt Ion: 43 Resp: 968141

Ion Ratio Lower Upper

43 100

58 25.3 20.3 30.5





#19

Isopropyl Alcohol

Concen: 1.49 ppbv

RT: 4.16 min Scan# 956

Delta R.T. 0.02 min

Lab File: VL031228.D

Acq: 14 Dec 2017 12:33

Instrument :

MSVOA_L

ClientSampleId :

AIR-UNIT-3DUP

Tgt Ion: 45 Resp: 177066

Ion Ratio Lower Upper

45 100

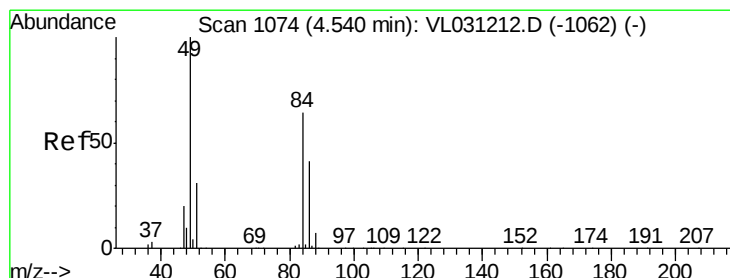
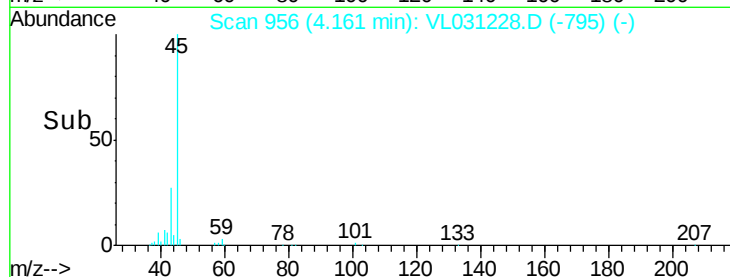
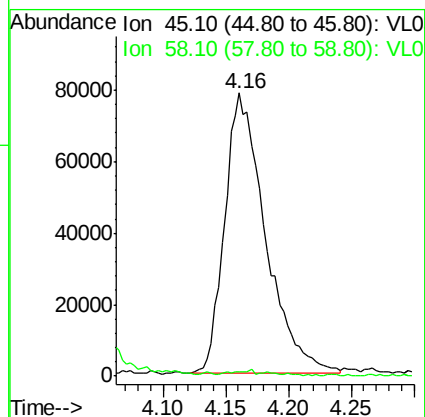
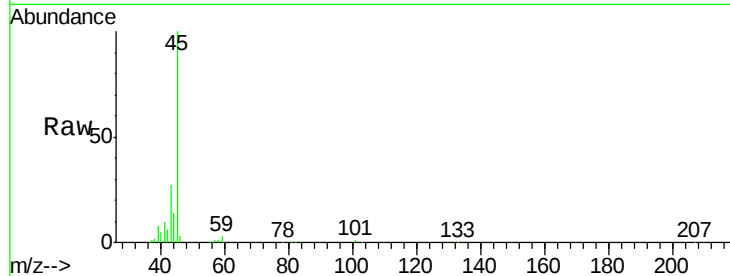
58 138.2 27.2 40.8#

Manual Integrations

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#20

Methylene Chloride

Concen: 1.33 ppbv

RT: 4.54 min Scan# 1074

Delta R.T. 0.00 min

Lab File: VL031228.D

Acq: 14 Dec 2017 12:33

Tgt Ion: 84 Resp: 82991

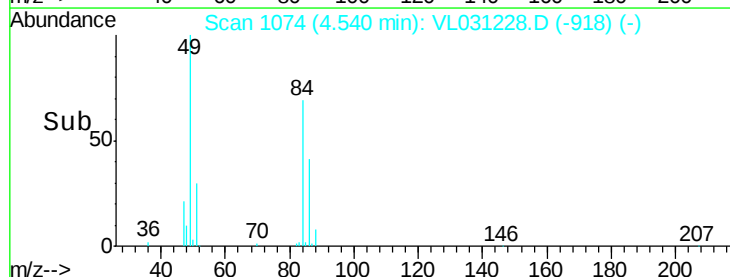
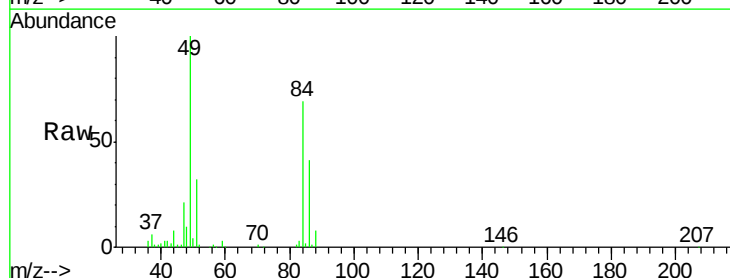
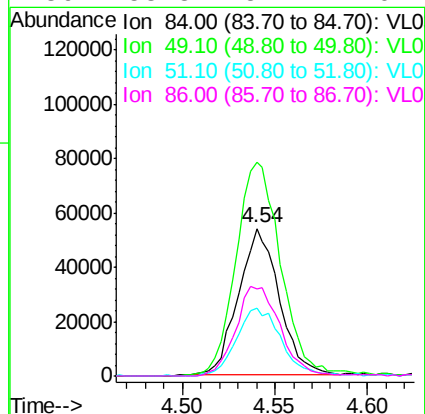
Ion Ratio Lower Upper

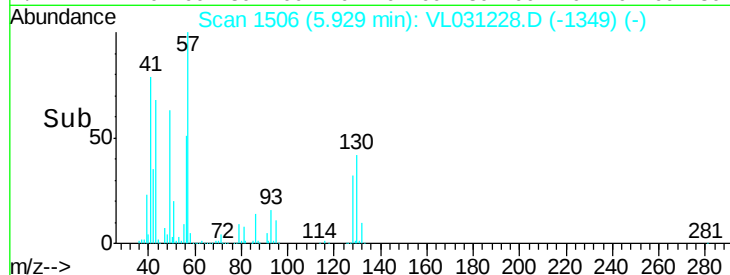
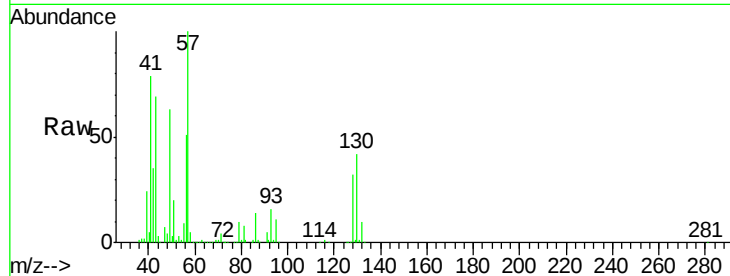
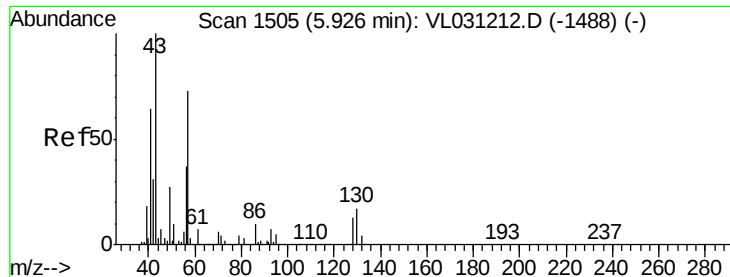
84 100

49 144.7 125.8 188.6

51 46.3 39.3 58.9

86 58.8 51.1 76.7





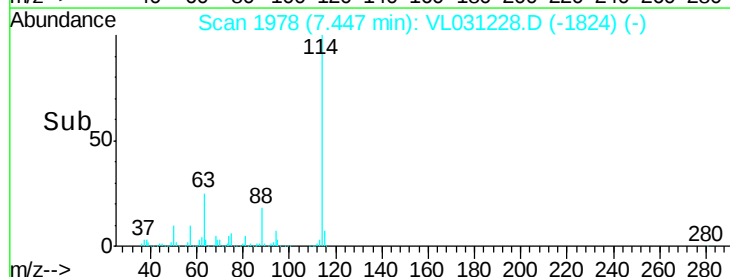
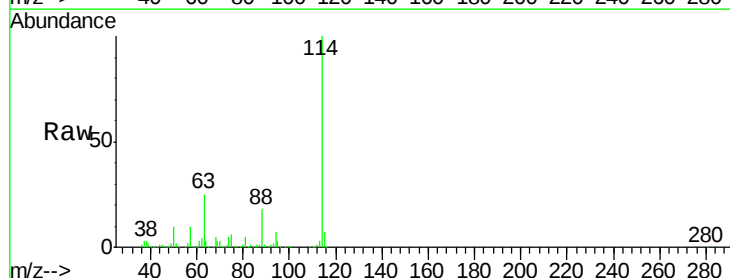
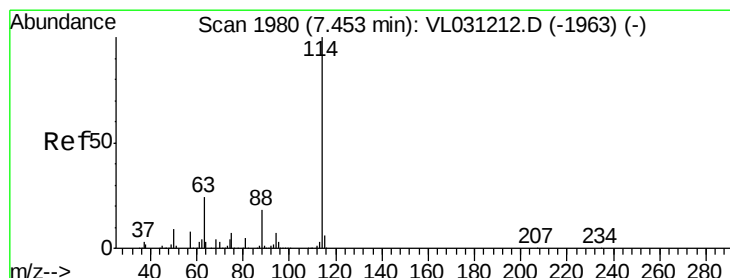
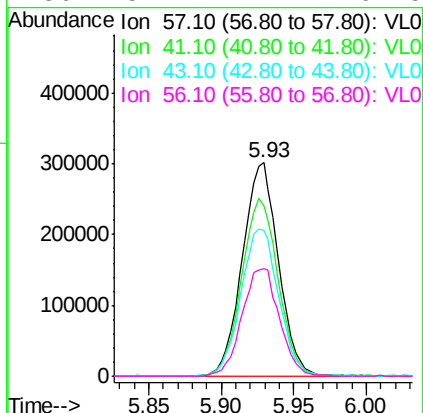
#26
Hexane
Concen: 2.85 ppbv
RT: 5.93 min Scan# 1506
Delta R.T. 0.00 min
Lab File: VL031228.D
Acq: 14 Dec 2017 12:33

Tgt Ion	Ratio	Lower	Upper
57	100		
41	84.8	70.3	105.5
43	72.9	173.8	260.8#
56	52.7	41.7	62.5

Instrument :
MSVOA_L
ClientSampleId :
AIR-UNIT-3DUP

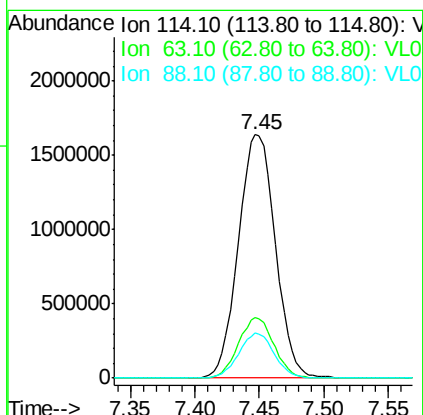
Manual Integrations
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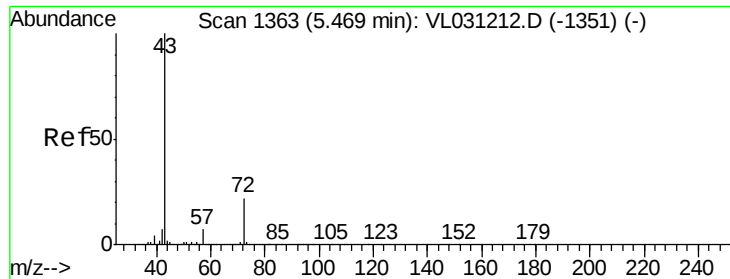
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12/15/2017 4:07:08 PM



#33
1,4-Difluorobenzene
Concen: 10.00 ppbv
RT: 7.45 min Scan# 1978
Delta R.T. -0.01 min
Lab File: VL031228.D
Acq: 14 Dec 2017 12:33

Tgt Ion	Ratio	Lower	Upper
114	100		
63	24.0	19.8	29.8
88	17.6	14.2	21.4





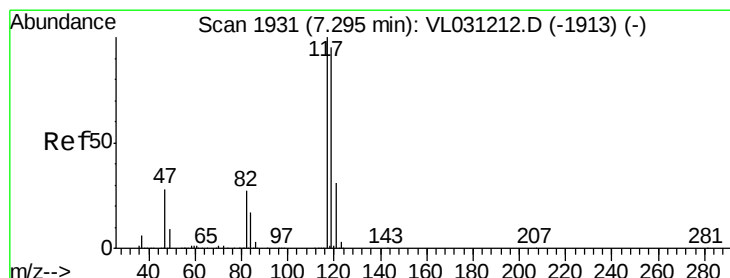
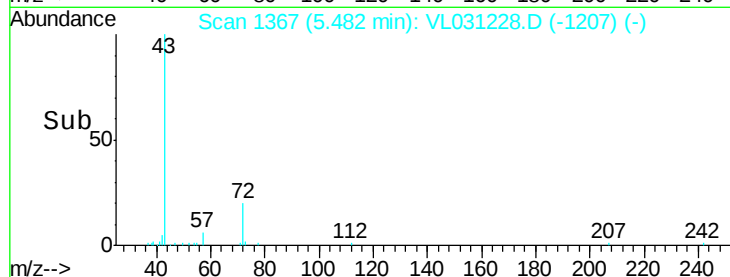
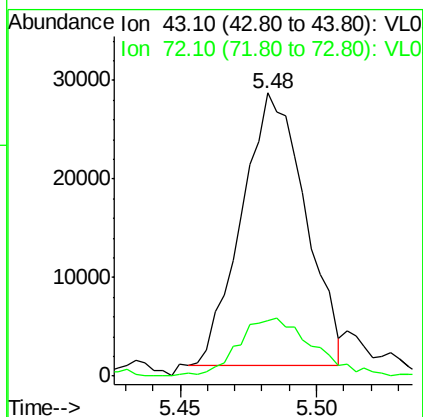
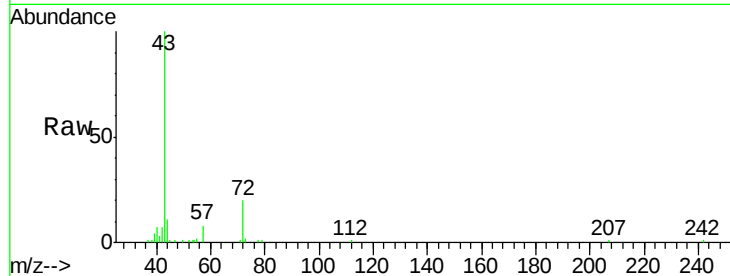
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2-Butanone
Concen: 0.19 ppbv
RT: 5.48 min Scan# 1367
Delta R.T. 0.01 min
Lab File: VL031228.D
Acq: 14 Dec 2017 12:33

Instrument :
MSVOA_L
ClientSampleId :
AIR-UNIT-3DUP

Tgt Ion: 43 Resp: 44948
Ion Ratio Lower Upper
43 100
72 25.7 18.1 27.1

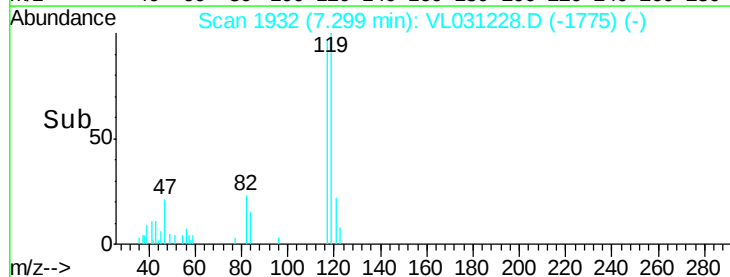
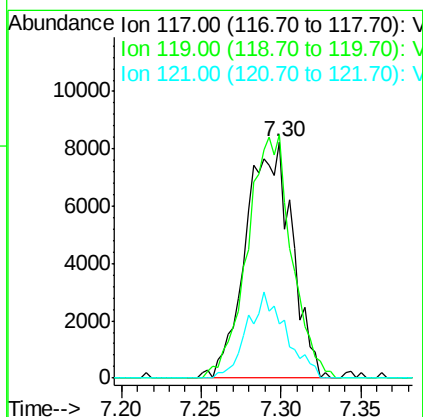
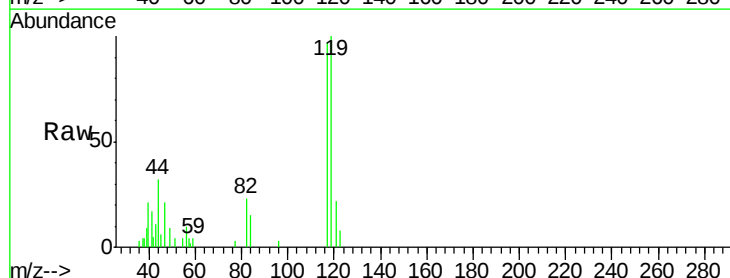
Manual Integrations
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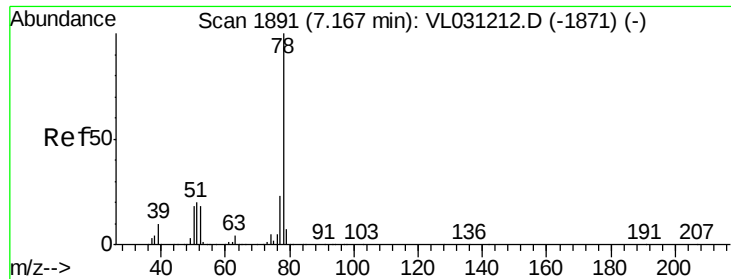
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#35
Carbon Tetrachloride
Concen: 0.07 ppbv m
RT: 7.30 min Scan# 1932
Delta R.T. 0.00 min
Lab File: VL031228.D
Acq: 14 Dec 2017 12:33

Tgt Ion: 117 Resp: 16482
Ion Ratio Lower Upper
117 100
119 103.0 75.9 113.9
121 22.9 24.6 37.0#





#36

Benzene

Concen: 0.28 ppbv

RT: 7.16 min Scan# 1890

Delta R.T. -0.00 min

Lab File: VL031228.D

Acq: 14 Dec 2017 12:33

Instrument :

MSVOA_L

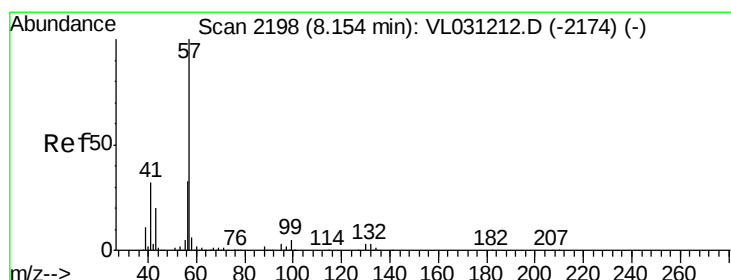
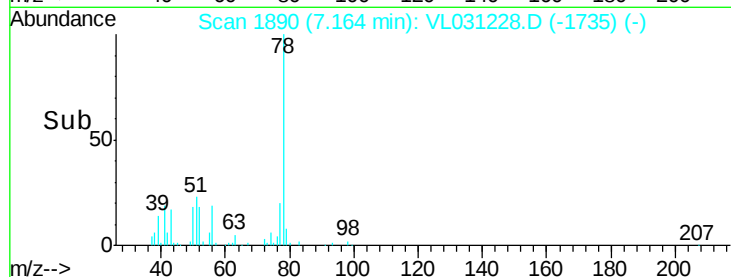
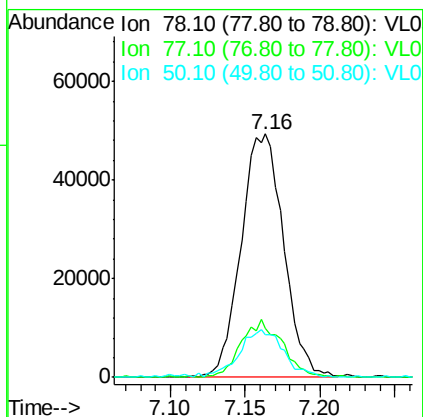
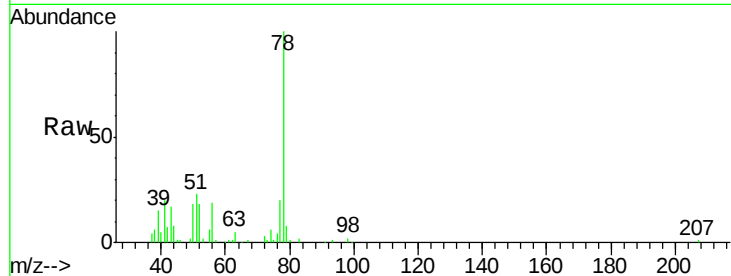
ClientSampleId :

AIR-UNIT-3DUP

Tgt Ion:	78	Resp:	97763
Ion	Ratio	Lower	Upper
78	100		
77	19.9	18.1	27.1
50	17.7	14.6	21.8

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#44

2,2,4-Trimethylpentane

Concen: 0.09 ppbv

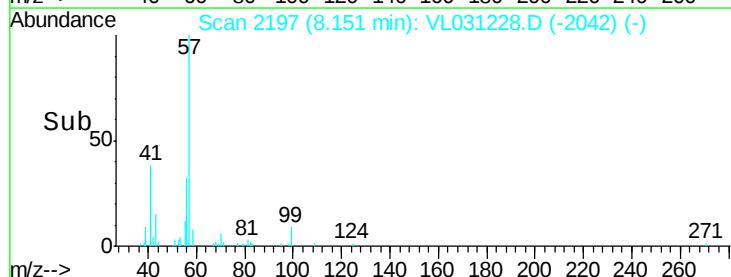
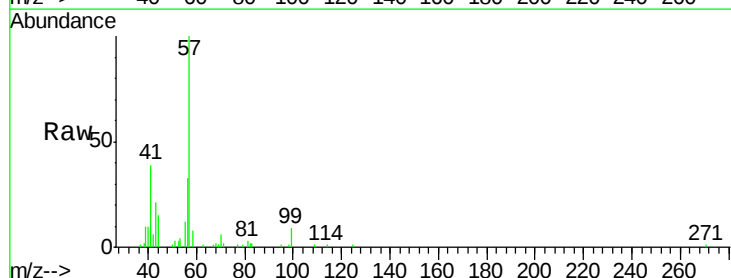
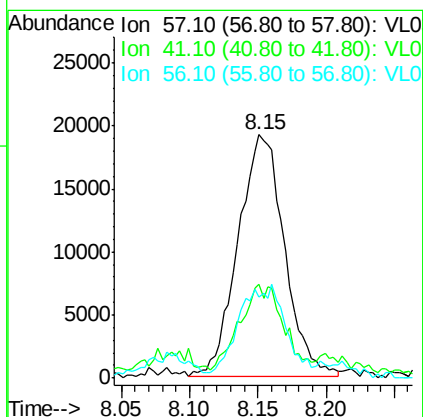
RT: 8.15 min Scan# 2197

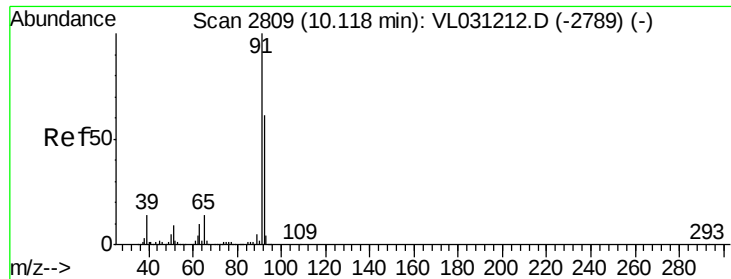
Delta R.T. -0.00 min

Lab File: VL031228.D

Acq: 14 Dec 2017 12:33

Tgt Ion:	57	Resp:	45213
Ion	Ratio	Lower	Upper
57	100		
41	43.7	25.5	38.3#
56	44.3	25.0	37.6#





#53

Toluene

Concen: 0.50 ppbv

RT: 10.11 min Scan# 2807

Delta R.T. -0.01 min

Lab File: VL031228.D

Acq: 14 Dec 2017 12:33

Instrument :

MSVOA_L

ClientSampleId :

AIR-UNIT-3DUP

Tgt Ion: 91 Resp: 186948

Ion Ratio Lower Upper

91 100

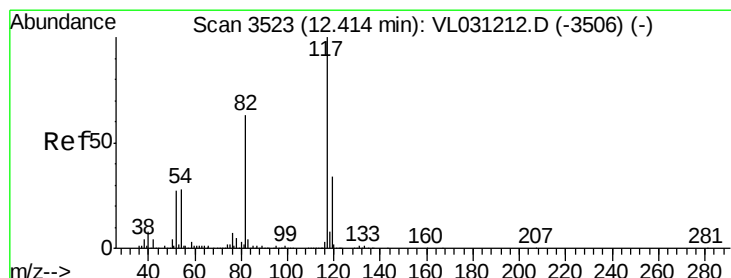
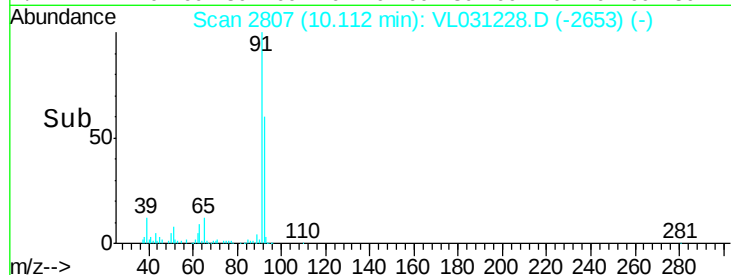
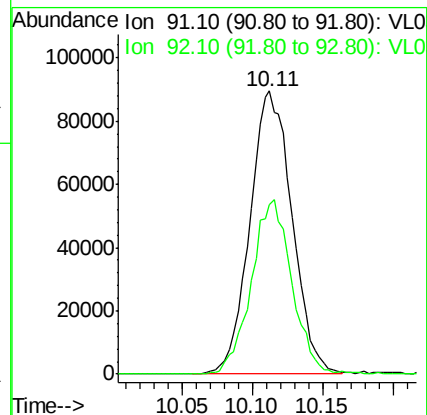
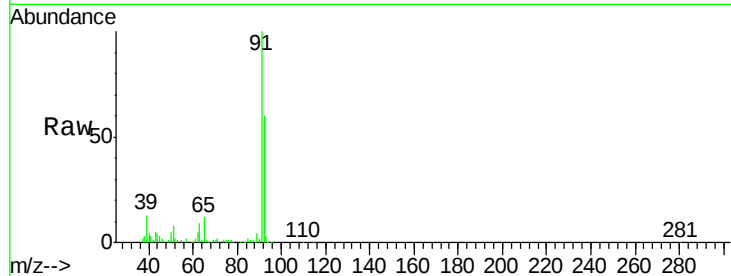
92 59.2 49.1 73.7

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#55

Chlorobenzene-d5

Concen: 10.00 ppbv

RT: 12.41 min Scan# 3521

Delta R.T. -0.01 min

Lab File: VL031228.D

Acq: 14 Dec 2017 12:33

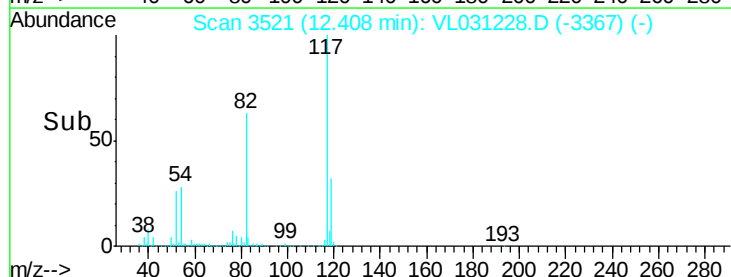
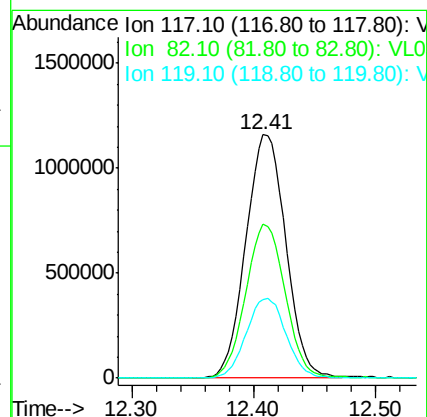
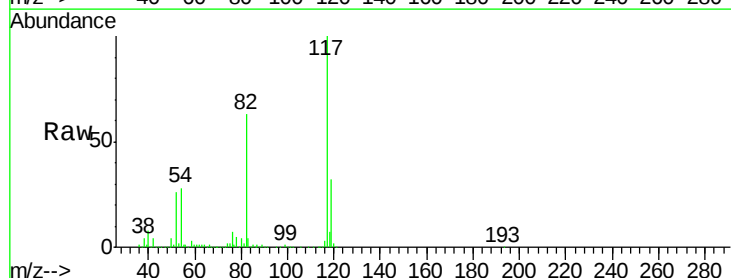
Tgt Ion: 117 Resp: 2625020

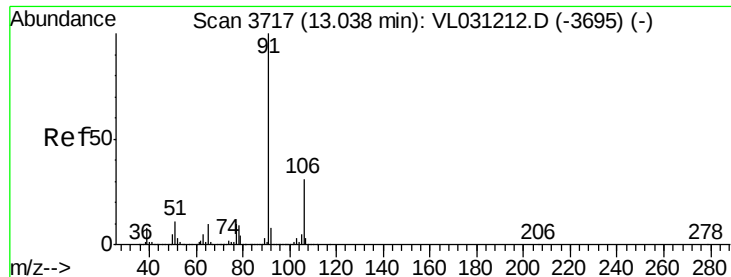
Ion Ratio Lower Upper

117 100

82 63.4 48.1 72.1

119 33.0 23.1 34.7





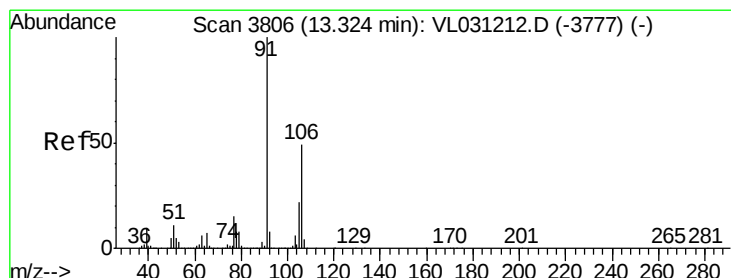
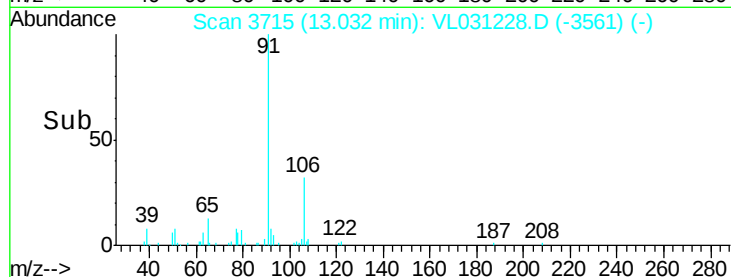
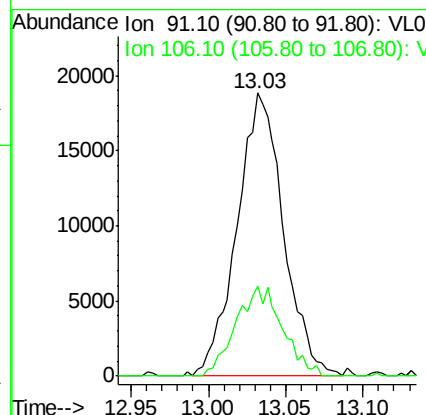
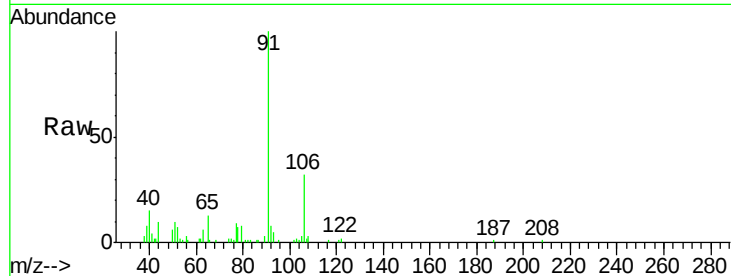
#58
Ethyl Benzene
Concen: 0.09 ppbv
RT: 13.03 min Scan# 3715
Delta R.T. -0.01 min
Lab File: VL031228.D
Acq: 14 Dec 2017 12:33

Instrument :
MSVOA_L
ClientSampleId :
AIR-UNIT-3DUP

Tgt Ion: 91 Resp: 39274
Ion Ratio Lower Upper
91 100
106 31.6 25.1 37.7

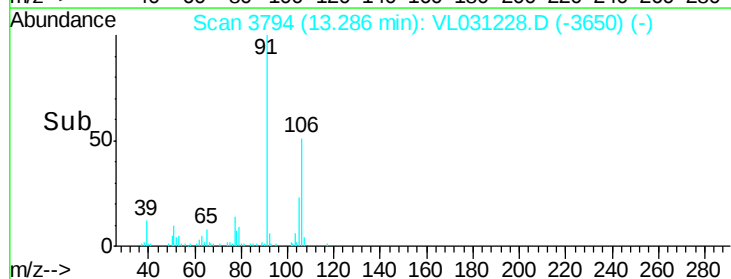
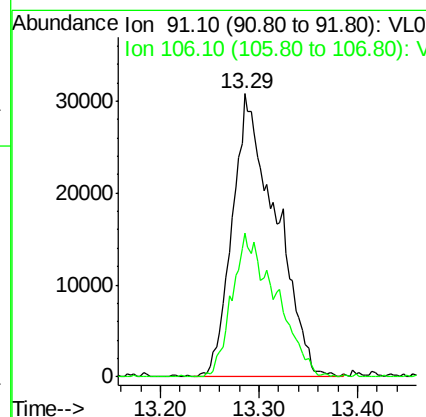
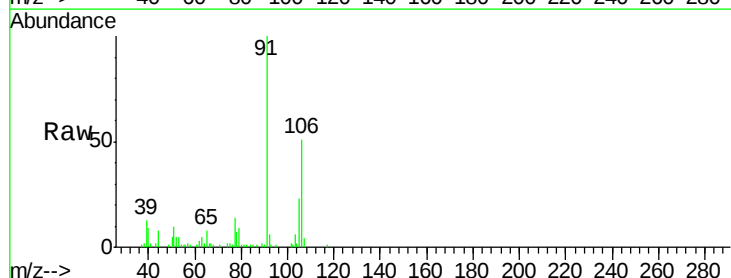
Manual Integrations
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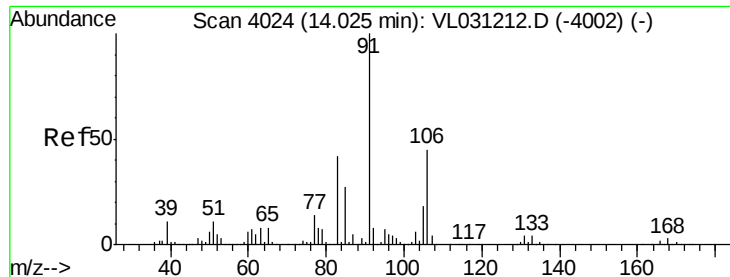
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#59
m/p-Xylene
Concen: 0.27 ppbv m
RT: 13.29 min Scan# 3794
Delta R.T. -0.04 min
Lab File: VL031228.D
Acq: 14 Dec 2017 12:33

Tgt Ion: 91 Resp: 94520
Ion Ratio Lower Upper
91 100
106 0.0 38.5 57.7#





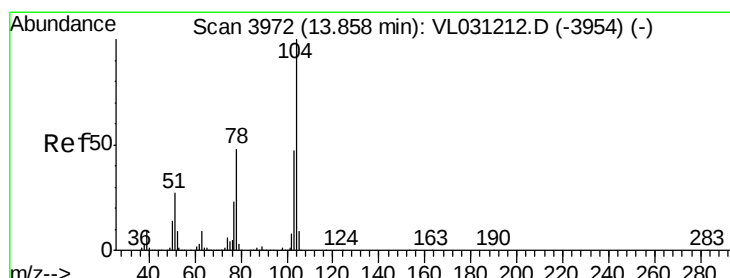
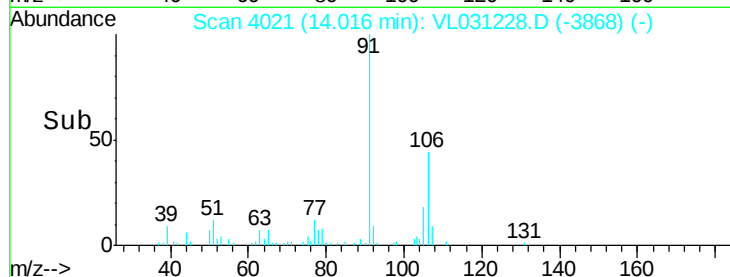
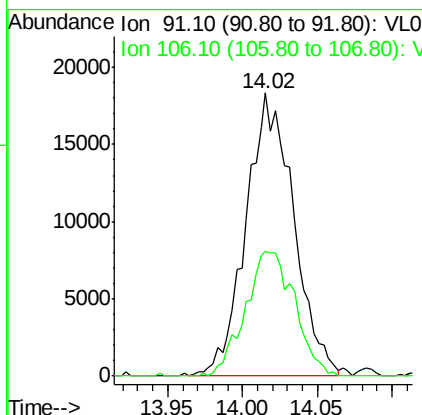
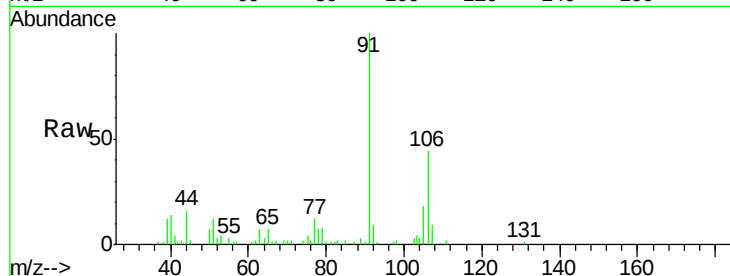
#60
o-Xylene
Concen: 0.12 ppbv
RT: 14.02 min Scan# 4021
Delta R.T. -0.01 min
Lab File: VL031228.D
Acq: 14 Dec 2017 12:33

Instrument :
MSVOA_L
ClientSampleId :
AIR-UNIT-3DUP

Tgt Ion: 91 Resp: 40578
Ion Ratio Lower Upper
91 100
106 45.6 22.7 68.1

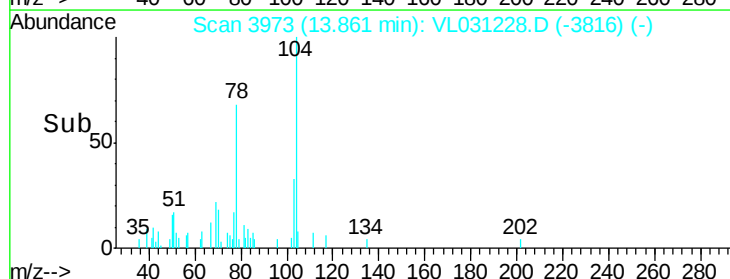
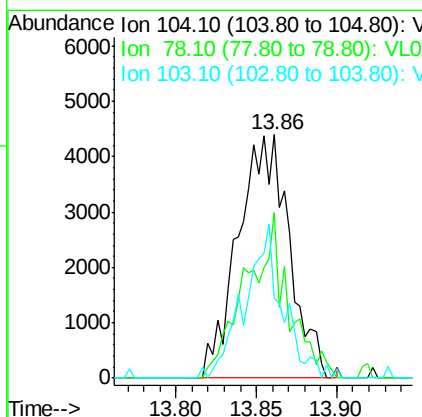
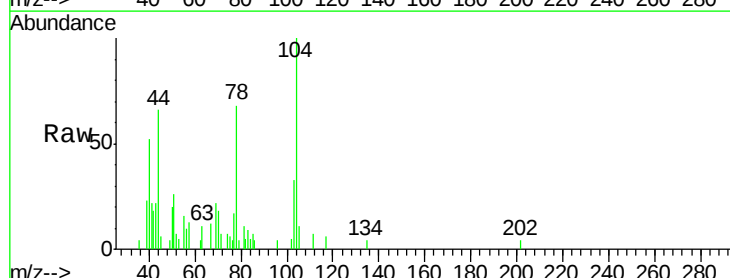
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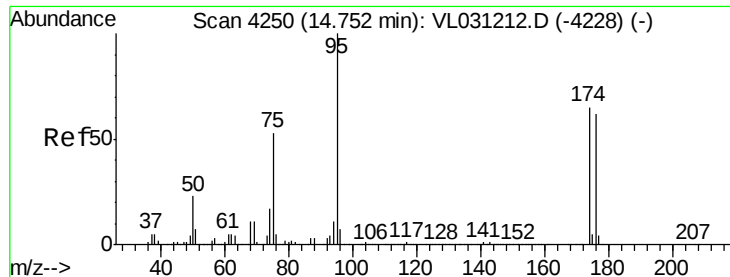
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#61
Styrene
Concen: 0.10 ppbv m
RT: 13.86 min Scan# 3973
Delta R.T. 0.00 min
Lab File: VL031228.D
Acq: 14 Dec 2017 12:33

Tgt Ion: 104 Resp: 9735
Ion Ratio Lower Upper
104 100
78 0.0 39.1 58.7#
103 0.0 37.3 55.9#





#68

1-Bromo-4-Fluorobenzene

Concen: 12.25 ppbv

RT: 14.75 min Scan# 4248

Delta R.T. -0.01 min

Lab File: VL031228.D

Acq: 14 Dec 2017 12:33

Instrument :

MSVOA_L

ClientSampleId :

AIR-UNIT-3DUP

Tgt Ion: 95 Resp: 2288195

Ion Ratio Lower Upper

95 100

174 64.6 52.5 78.7

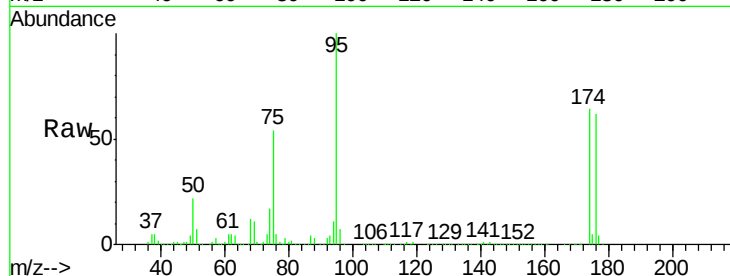
175 4.7 4.1 6.1

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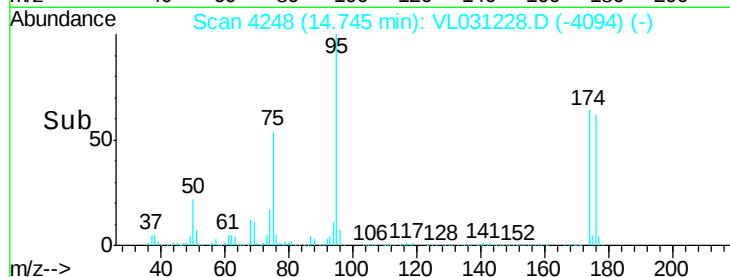


Abundance Ion 95.10 (94.80 to 95.80): VL031212.D (-4228) (-)

Ion 174.00 (173.70 to 174.70): VL031212.D (-4228) (-)

Ion 175.00 (174.70 to 175.70): VL031212.D (-4228) (-)

Time-->



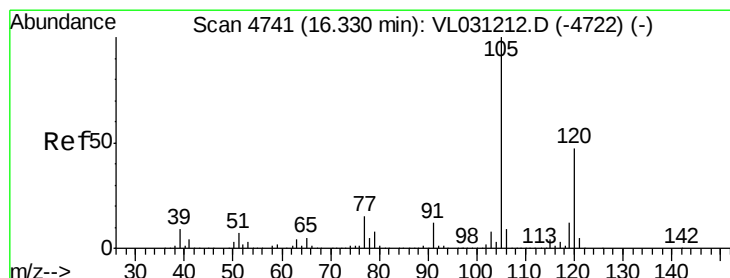
Abundance

Ion 95.10 (94.80 to 95.80): VL031212.D (-4228) (-)

Ion 174.00 (173.70 to 174.70): VL031212.D (-4228) (-)

Ion 175.00 (174.70 to 175.70): VL031212.D (-4228) (-)

Time-->



#73

1,3,5-Trimethylbenzene

Concen: 0.11 ppbv

RT: 16.32 min Scan# 4739

Delta R.T. -0.01 min

Lab File: VL031228.D

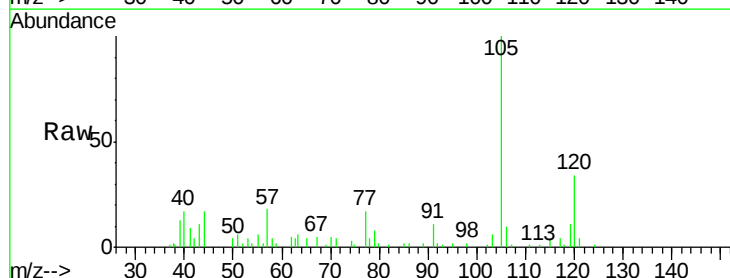
Acq: 14 Dec 2017 12:33

Tgt Ion: 105 Resp: 38166

Ion Ratio Lower Upper

105 100

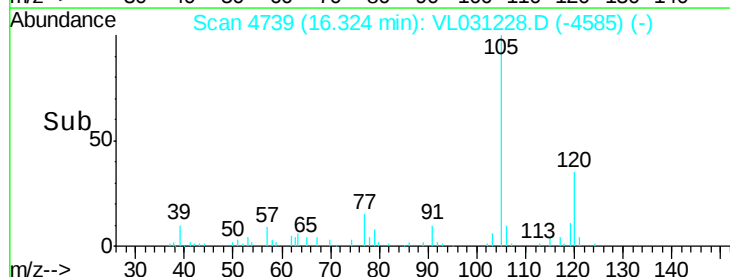
120 33.5 37.8 56.6#



Abundance Ion 105.10 (104.80 to 105.80): VL031212.D (-4722) (-)

Ion 120.20 (119.90 to 120.90): VL031212.D (-4722) (-)

Time-->

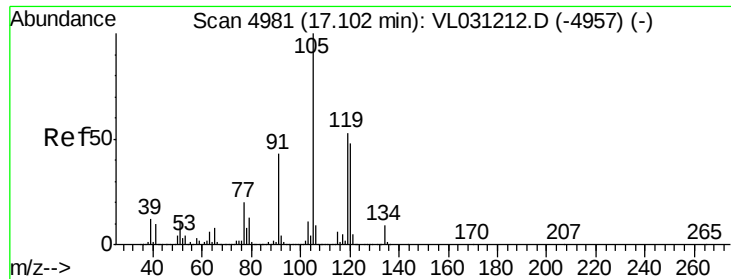


Abundance

Ion 105.10 (104.80 to 105.80): VL031212.D (-4722) (-)

Ion 120.20 (119.90 to 120.90): VL031212.D (-4722) (-)

Time-->



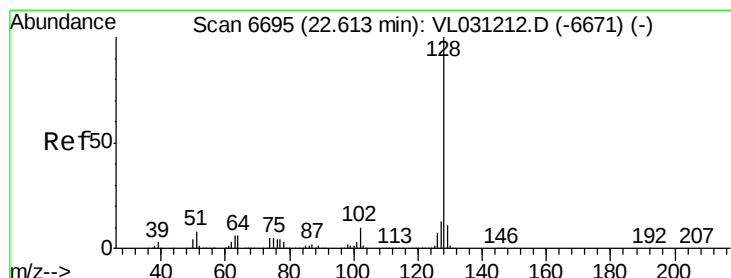
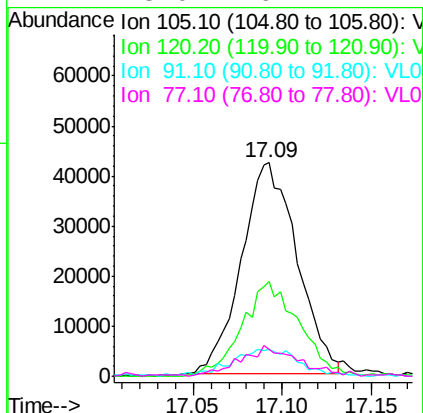
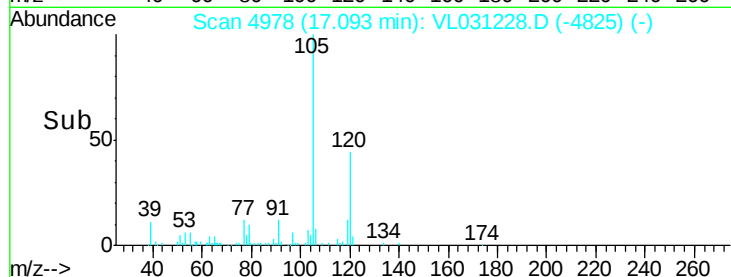
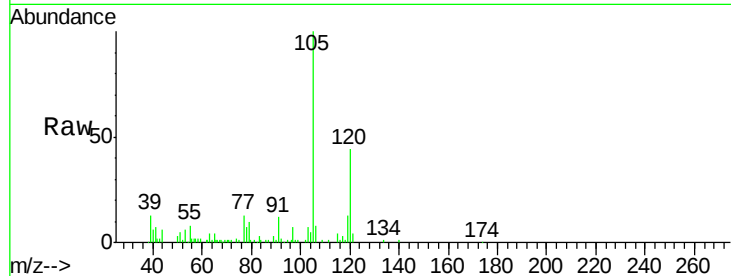
#74
1,2,4-Trimethylbenzene
Concen: 0.26 ppbv
RT: 17.09 min Scan# 4978
Delta R.T. -0.01 min
Lab File: VL031228.D
Acq: 14 Dec 2017 12:33

Instrument :
MSVOA_L
ClientSampleId :
AIR-UNIT-3DUP

Tgt Ion	Ratio	Resp	Lower	Upper
105	100	91686		
120	44.0	38.6	58.0	
91	11.6	34.2	51.4	
77	13.0	16.1	24.1	

Manual Integrations
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#79
Naphthalene
Concen: 0.12 ppbv m
RT: 22.62 min Scan# 6697
Delta R.T. 0.01 min
Lab File: VL031228.D
Acq: 14 Dec 2017 12:33

Tgt Ion	Ratio	Resp	Lower	Upper
128	100	33965		
127	18.9	10.2	15.2	
129	11.2	8.9	13.3	

