

Data Path : Z:\VOASRV\HPCHEM1\MSVOA L\DATA\VL031819\
 Data File : VL033386.D
 Acq On : 19 Mar 2019 11:37
 Operator : SY/AP
 Sample : K1805-07 2X
 Misc : 400ml/MSVOA L
 ALS Vial : 1 Sample Multiplier: 1

Instrument :
 MSVOA_L
 ClientSampleId :
 ST-SS-3

Manual Integrations
 APPROVED

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 3/21/2019 12:16:04 PM

Quant Time: Mar 20 11:42:49 2019
 Quant Method : Z:\VOASRV\HPCHEM1\MSVOA L\METHODS\VL031519AIR.M
 Quant Title : AIR ANALYSIS BY METHOD TO-15 Instrument: MSVOA_L Fri Mar 1
 QLast Update : Fri Mar 15 14:52:14 2019
 Response via : Initial Calibration

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Bromochloromethane	5.76	49	873641	10.00	ppbv	0.00
33) 1,4-Difluorobenzene	7.29	114	1908997	10.00	ppbv	-0.01
55) Chlorobenzene-d5	12.24	117	1855737	10.00	ppbv	0.00

System Monitoring Compounds

68) 1-Bromo-4-Fluorobenzene	14.57	95	1600993	11.64	ppbv	0.00
Spiked Amount	10.000	Range	65 - 135	Recovery	=	116.40%

Target Compounds	R.T.	QIon	Response	Conc	Units	Ovalue
2) Dichlorodifluoromethane	3.07	85	35645	0.232	ppbv	92
3) Chlorodifluoromethane	3.01	51	11086m	0.111	ppbv	
9) Propene	3.04	41	42913m	0.959	ppbv	
13) Ethanol	3.65	45	25857m	1.212	ppbv	
15) Acetone	3.90	43	398522	2.934	ppbv	100
19) Isopropyl Alcohol	4.03	45	24315m	0.376	ppbv	
20) Methylene Chloride	4.40	84	42378	0.957	ppbv #	91
22) trans-1,2-Dichloroethene	4.96	96	180141	4.005	ppbv	98
26) Hexane	5.78	57	59872m	0.678	ppbv	
27) Carbon Disulfide	4.62	76	32190	0.317	ppbv #	75
29) Chloroform	5.84	83	14551m	0.101	ppbv	
31) cis-1,2-Dichloroethene	5.63	61	3640249	41.253	ppbv	95
32) 1,1,1-Trichloroethane	6.61	97	168373	1.187	ppbv	97
34) 2-Butanone	5.34	43	69740	0.556	ppbv	97
36) Benzene	7.00	78	128175	0.750	ppbv	95
38) Trichloroethene	7.96	130	1503350	23.254	ppbv	99
39) 1,2-Dichloropropane	7.73	63	20114	0.314	ppbv	92
52) Tetrachloroethene	11.39	164	9944335	139.717	ppbv	89
53) Toluene	9.95	91	149777	0.772	ppbv	99
58) Ethyl Benzene	12.87	91	39461m	0.150	ppbv	
59) m/p-Xylene	13.12	91	146460m	0.649	ppbv	
60) o-Xylene	13.84	91	64087m	0.291	ppbv	
62) Isopropylbenzene	14.82	105	90652m	0.296	ppbv	
67) sec-Butylbenzene	17.47	105	162168m	0.415	ppbv	
72) 4-Ethyltoluene	16.01	105	256441	1.026	ppbv #	77
73) 1,3,5-Trimethylbenzene	16.16	105	425580	1.748	ppbv	96
74) 1,2,4-Trimethylbenzene	16.94	105	871473	3.379	ppbv #	69

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

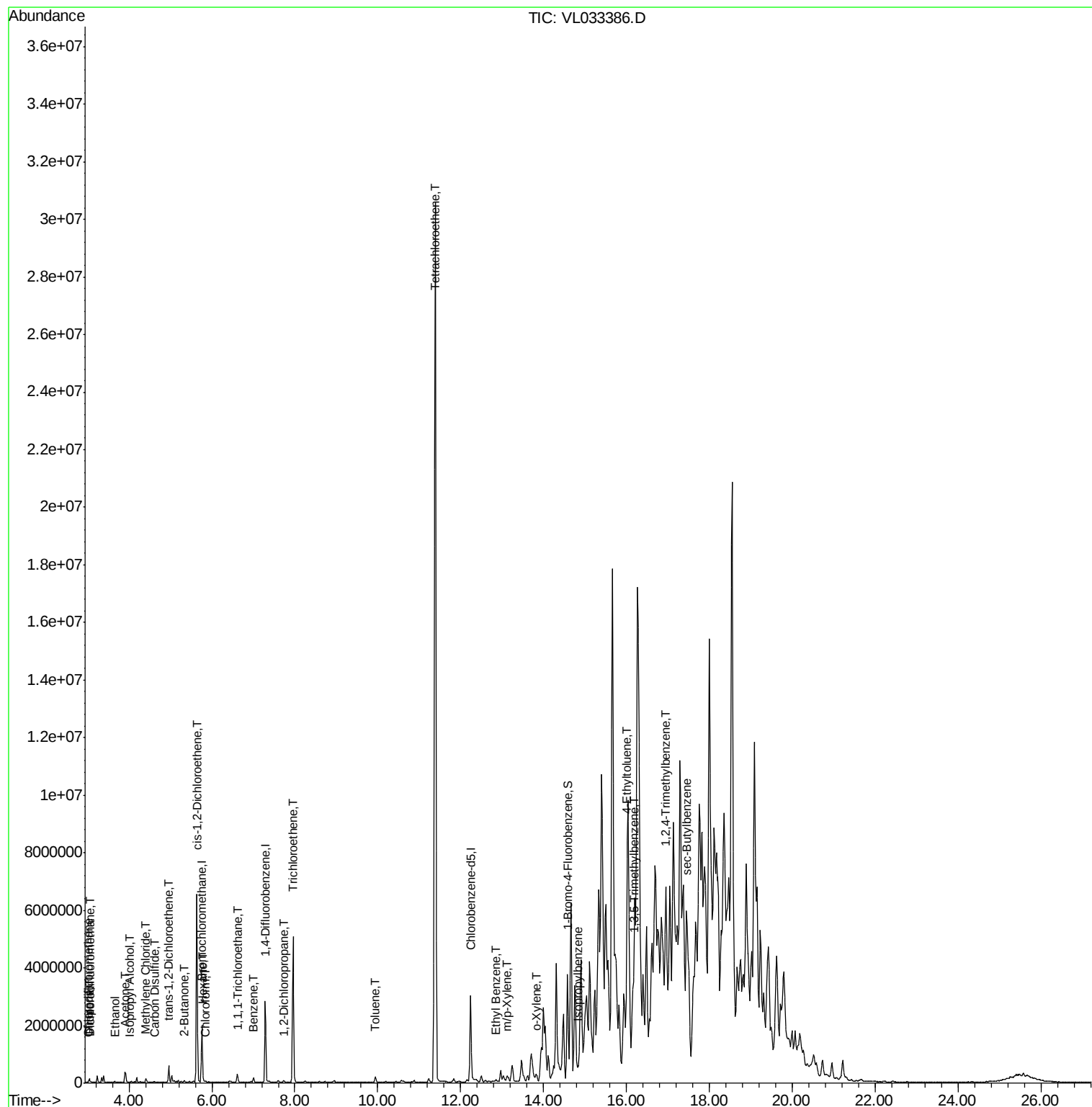
Data Path : Z:\V0ASRV\HPCHEM1\MSVOA L\DATA\VL031819\
Data File : VL033386.D
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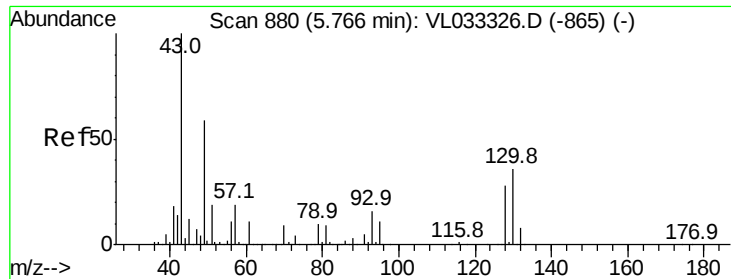
Instrument :
MSVOA_L
ClientSampleId :
ST-SS-3

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Quant Time: Mar 20 11:42:49 2019
Quant Method : Z:\V0ASRV\HPCHEM1\MSVOA L\METHODS\VL031519AIR.M
Quant Title : AIR ANALYSIS BY METHOD TO-15 Instrument: MSVOA_L Fri Mar
QLast Update : Fri Mar 15 14:52:14 2019
Response via : Initial Calibration





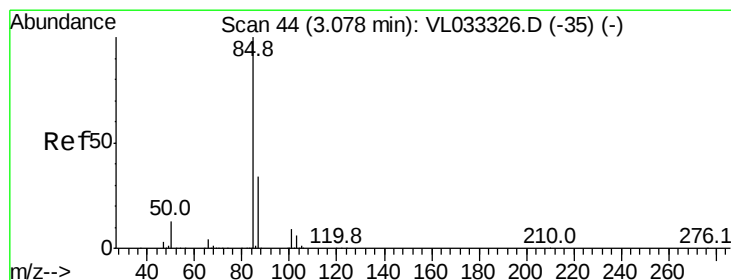
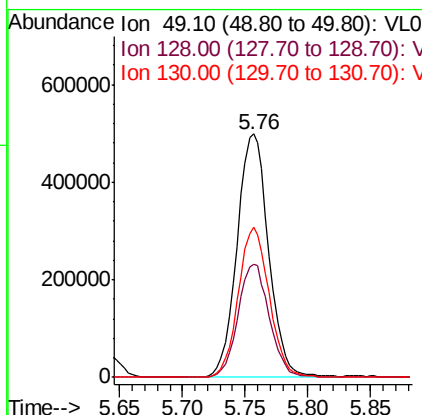
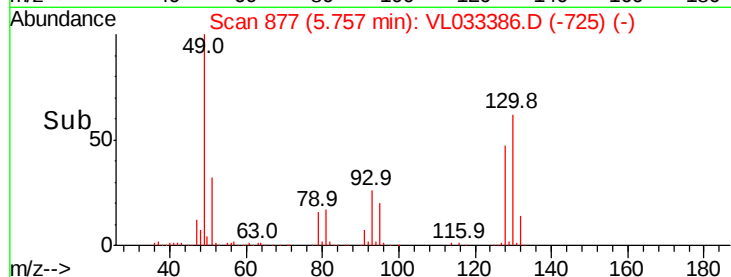
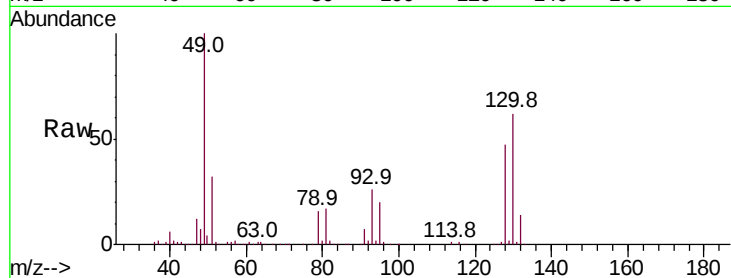
#1
Bromochloromethane
Concen: 10.000 ppbv
RT: 5.76 min Scan# 877
Delta R.T. -0.01 min
Lab File: VL033386.D
Acq: 19 Mar 2019 11:37

Instrument :
MSVOA_L
ClientSampleId :
ST-SS-3

Tot Ion	Ratio	Lower	Upper
49	100		
128	46.4	23.5	70.6
130	60.6	30.1	90.3

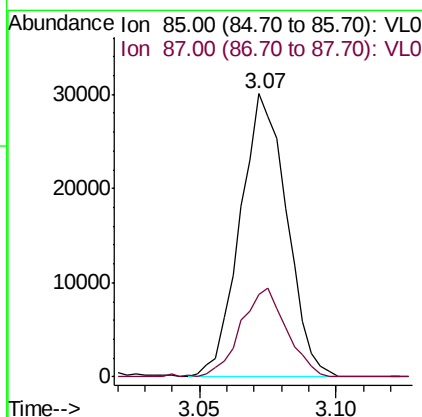
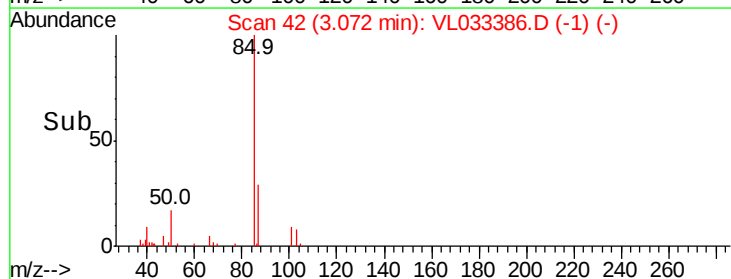
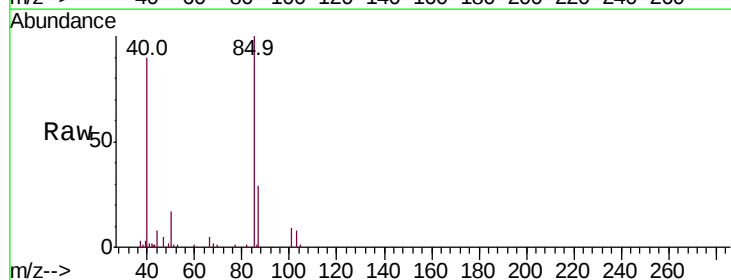
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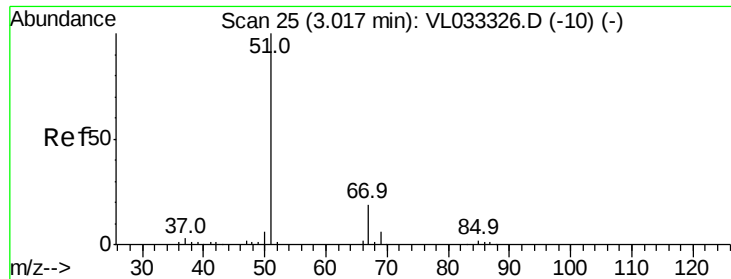
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#2
Dichlorodifluoromethane
Concen: 0.232 ppbv
RT: 3.07 min Scan# 42
Delta R.T. -0.01 min
Lab File: VL033386.D
Acq: 19 Mar 2019 11:37

Tgt Ion	Ratio	Lower	Upper
85	100		
87	29.1	26.9	40.3





#3

Chlorodifluoromethane

Concen: 0.111 ppbv m

RT: 3.01 min Scan# 22

Delta R.T. -0.01 min

Lab File: VL033386.D

Acq: 19 Mar 2019 11:37

Instrument :

MSVOA_L

ClientSampleId :

ST-SS-3

Tot Ion: 51 Resp: 11086

Ion Ratio Lower Upper

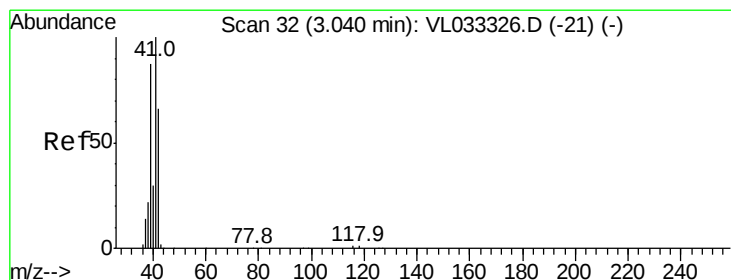
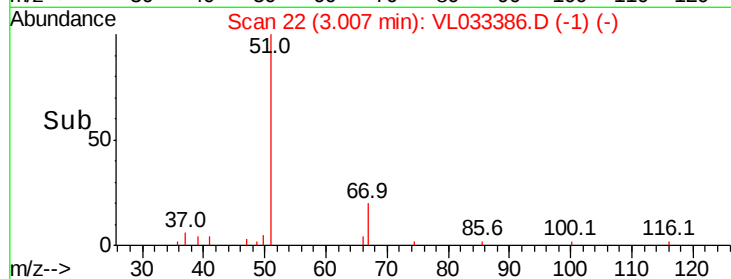
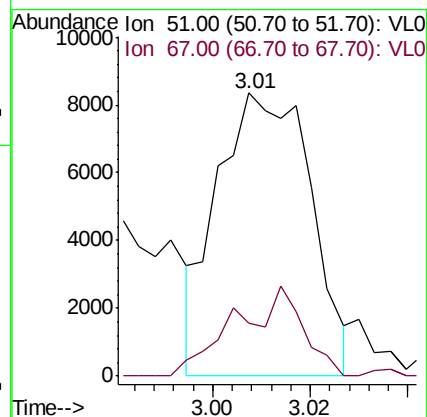
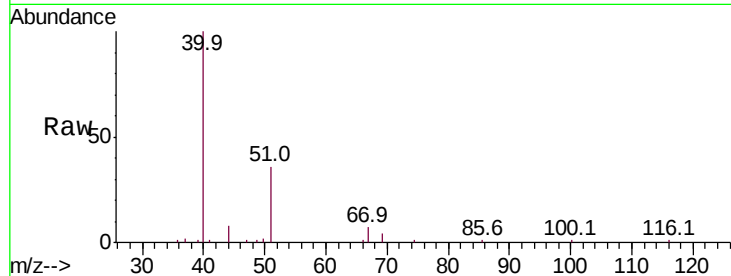
51 100

67 23.8 14.9 22.3#

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#9

Propene

Concen: 0.959 ppbv m

RT: 3.04 min Scan# 32

Delta R.T. -0.00 min

Lab File: VL033386.D

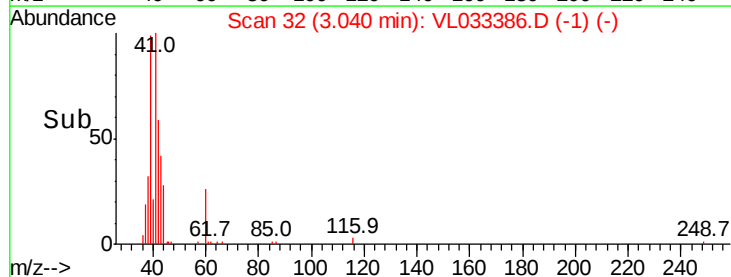
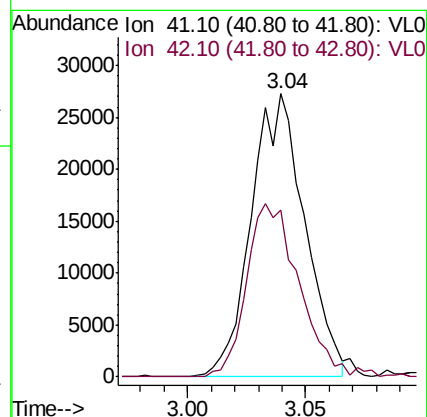
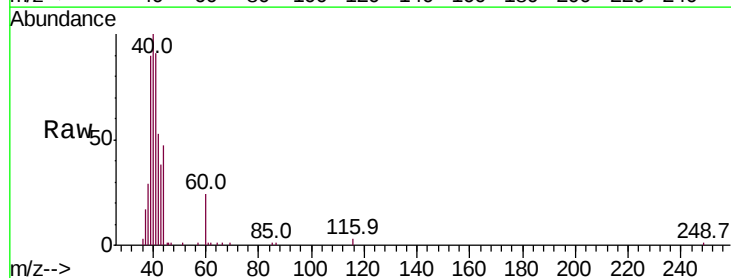
Acq: 19 Mar 2019 11:37

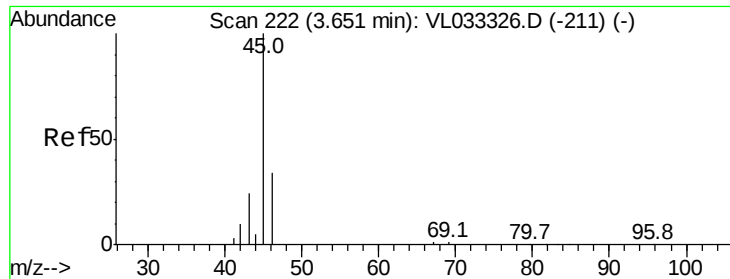
Tgt Ion: 41 Resp: 42913

Ion Ratio Lower Upper

41 100

42 61.3 55.2 82.8





#13

Ethanol

Concen: 1.212 ppbv m

RT: 3.65 min Scan# 223

Delta R.T. 0.00 min

Lab File: VL033386.D

Acq: 19 Mar 2019 11:37

Instrument :

MSVOA_L

ClientSampleId :

ST-SS-3

Tot Ion: 45 Resp: 25857

Ion Ratio Lower Upper

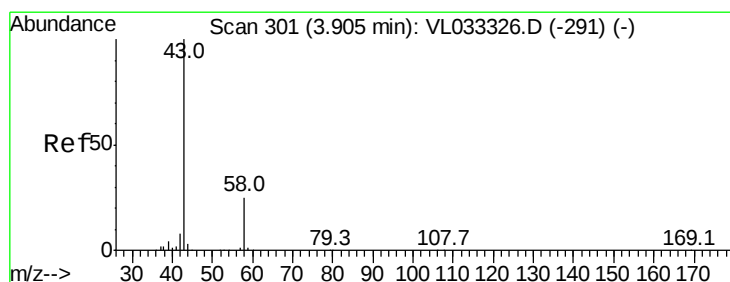
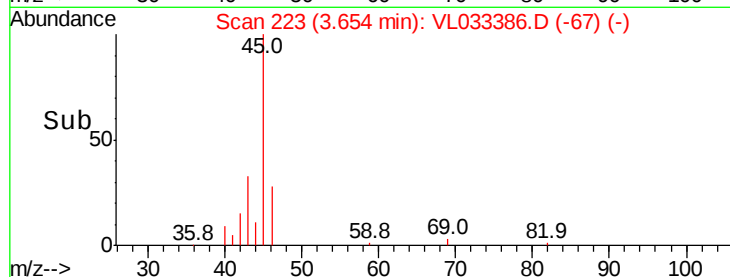
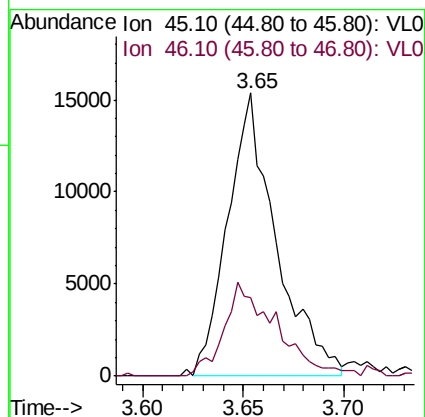
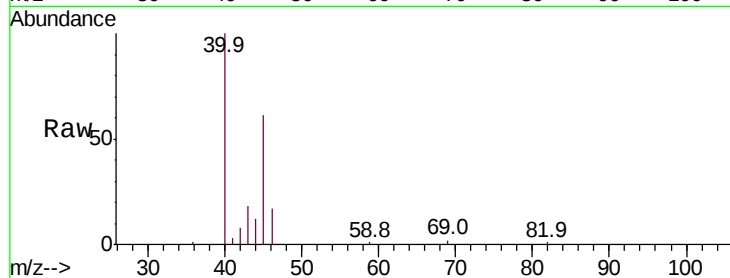
45 100

46 36.8 14.9 59.7

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#15

Acetone

Concen: 2.934 ppbv

RT: 3.90 min Scan# 300

Delta R.T. -0.00 min

Lab File: VL033386.D

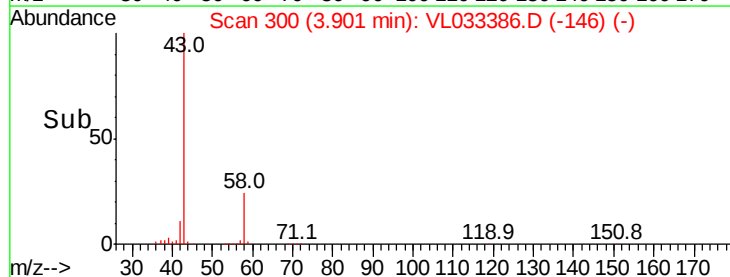
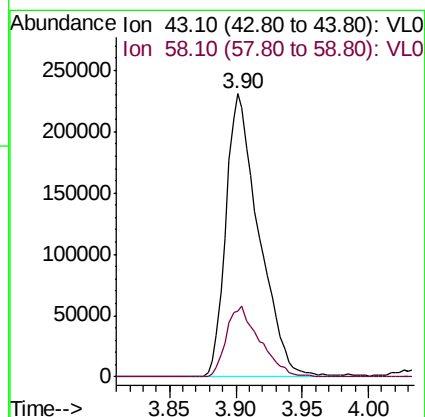
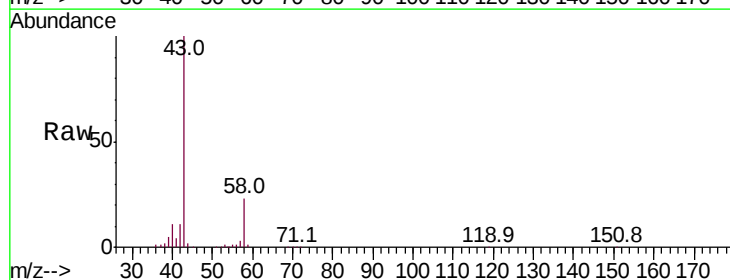
Acq: 19 Mar 2019 11:37

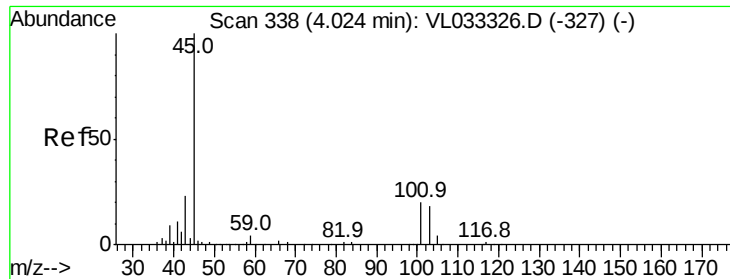
Tgt Ion: 43 Resp: 398522

Ion Ratio Lower Upper

43 100

58 25.6 20.4 30.6





#19

Isopropyl Alcohol

Concen: 0.376 ppbv

RT: 4.03 min Scan# 340

Delta R.T. 0.01 min

Lab File: VL033386.D

Acq: 19 Mar 2019 11:37

Instrument :

MSVOA_L

ClientSampleId :

ST-SS-3

Tot Ion: 45 Resp: 24315

Ion Ratio Lower Upper

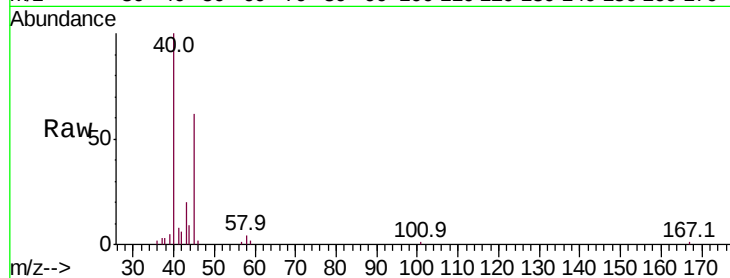
45 100

58 0.0 1.5 2.3#

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Abundance Ion 45.10 (44.80 to 45.80): VL0

Ion 58.10 (57.80 to 58.80): VL0

4.03

15000

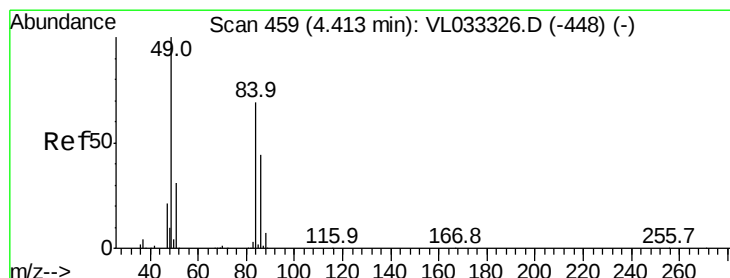
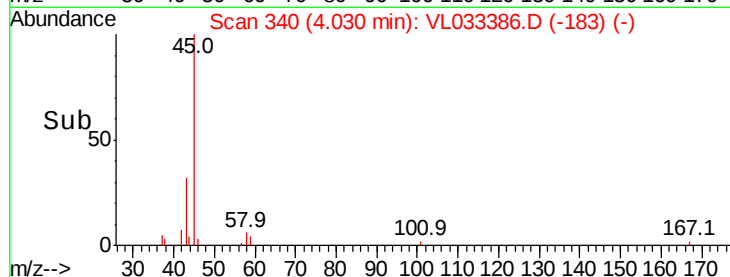
10000

5000

0

Time-->

3.95 4.00 4.05 4.10



#20

Methylene Chloride

Concen: 0.957 ppbv

RT: 4.40 min Scan# 456

Delta R.T. -0.01 min

Lab File: VL033386.D

Acq: 19 Mar 2019 11:37

Tgt Ion: 84 Resp: 42378

Ion Ratio Lower Upper

84 100

49 154.1 115.4 173.0

51 34.5 35.8 53.6#

86 56.9 50.6 75.8

Abundance Ion 84.00 (83.70 to 84.70): VL0

Ion 49.10 (48.80 to 49.80): VL0

Ion 51.10 (50.80 to 51.80): VL0

Ion 86.00 (85.70 to 86.70): VL0

60000

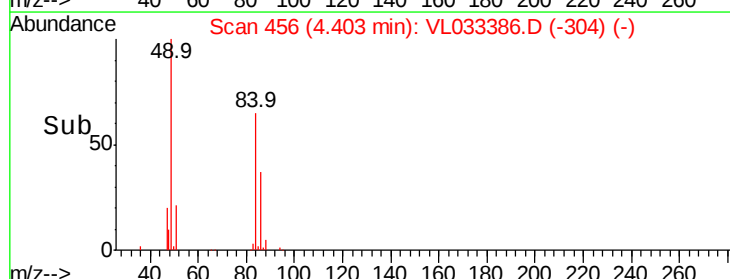
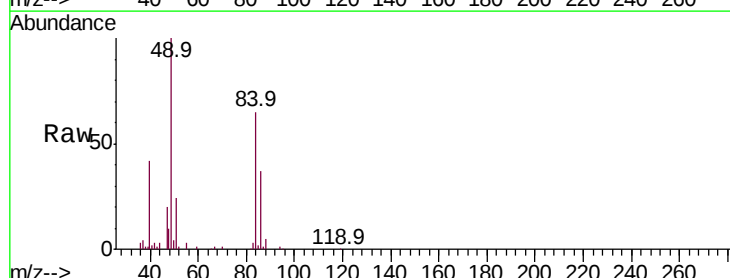
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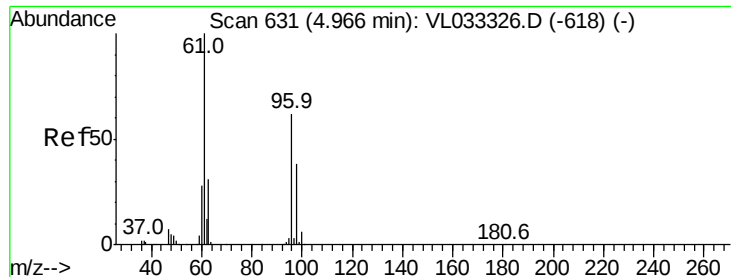
20000

0

Time-->

4.35 4.40 4.45





#22

trans-1,2-Dichloroethene

Concen: 4.005 ppbv

RT: 4.96 min Scan# 628

Delta R.T. -0.01 min

Lab File: VL033386.D

Acq: 19 Mar 2019 11:37

Instrument :

MSVOA_L

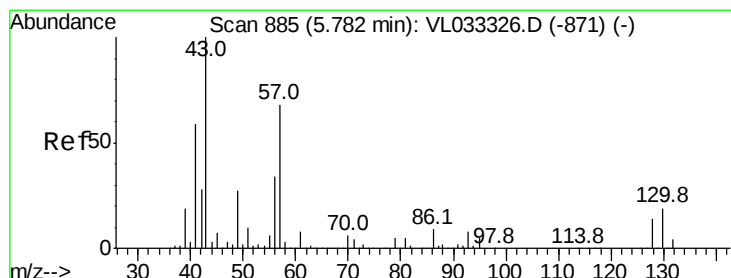
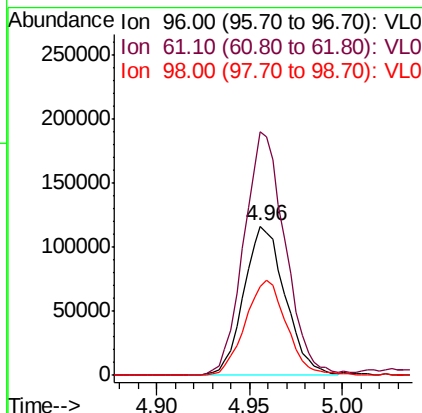
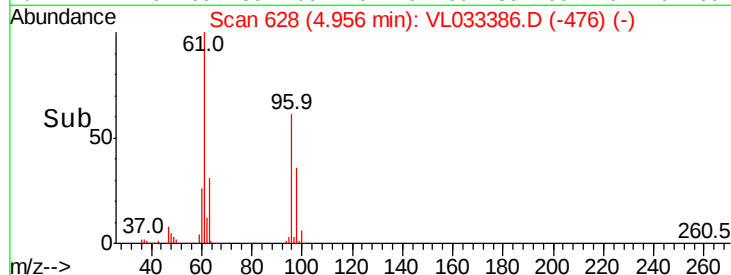
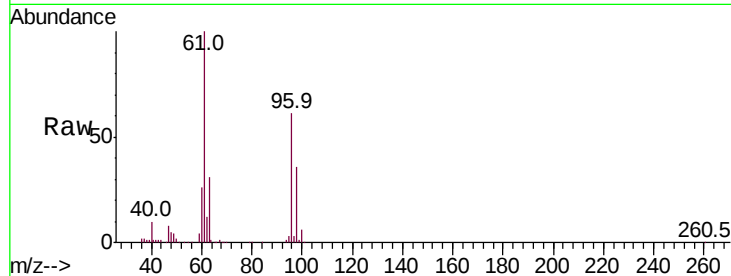
ClientSampled :

ST-SS-3

Tot Ion:	96	Resp:	180141
Ion Ratio	Lower	Upper	
96	100		
61	163.5	130.0	195.0
98	59.3	50.0	75.0

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#26

Hexane

Concen: 0.678 ppbv m

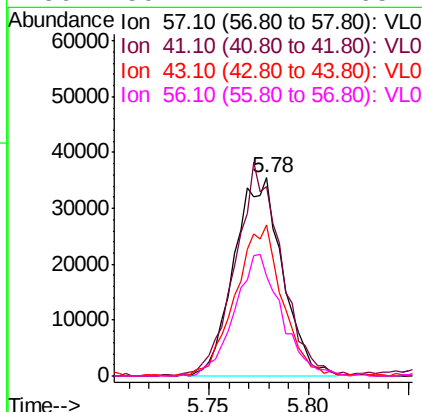
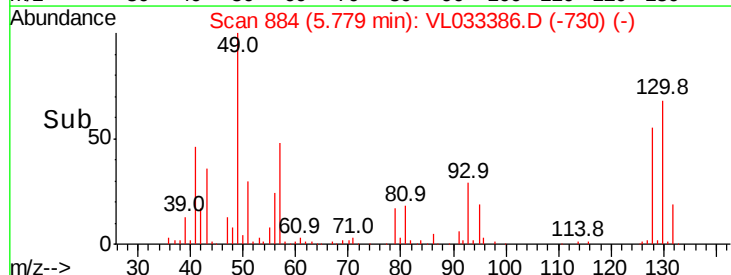
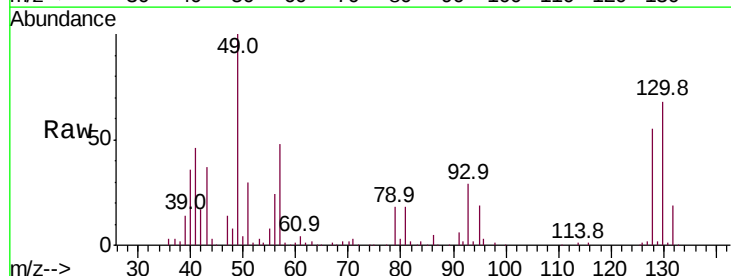
RT: 5.78 min Scan# 884

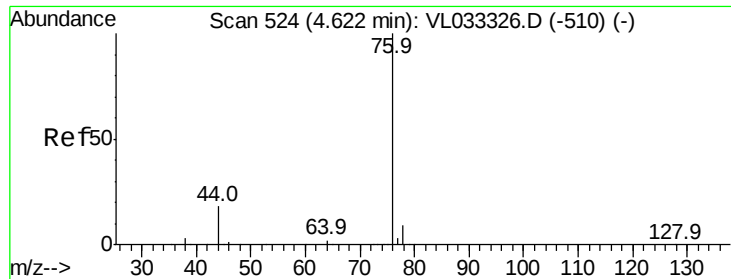
Delta R.T. -0.00 min

Lab File: VL033386.D

Acq: 19 Mar 2019 11:37

Tgt Ion:	57	Resp:	59872
Ion Ratio	Lower	Upper	
57	100		
41	102.5	70.5	105.7
43	74.4	181.8	272.8#
56	59.4	42.2	63.2





#27

Carbon Disulfide

Concen: 0.317 ppbv

RT: 4.62 min Scan# 523

Delta R.T. -0.00 min

Lab File: VL033386.D

Acq: 19 Mar 2019 11:37

Instrument :

MSVOA_L

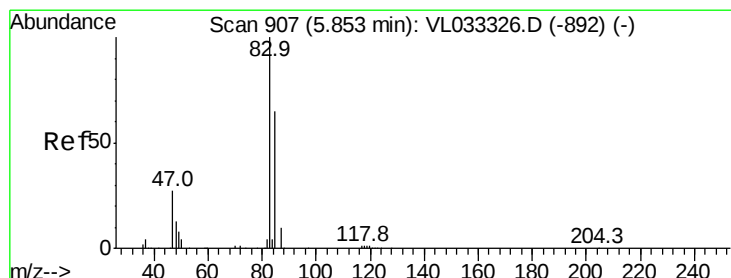
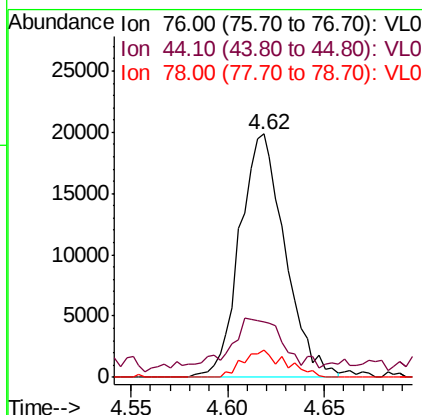
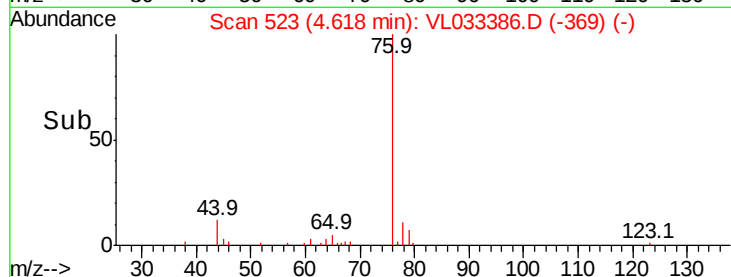
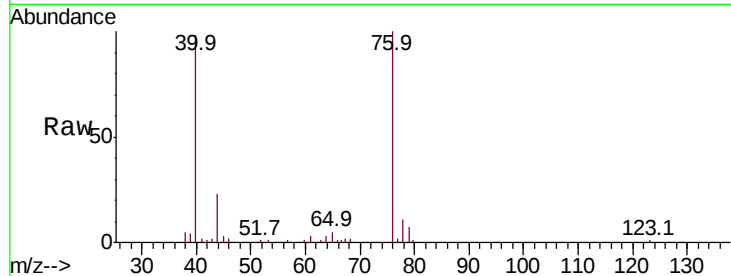
ClientSampled :

ST-SS-3

Tot Ion	Ratio	Lower	Upper
76	100		
44	34.4	15.2	22.8#
78	10.7	7.2	10.8

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#29

Chloroform

Concen: 0.101 ppbv m

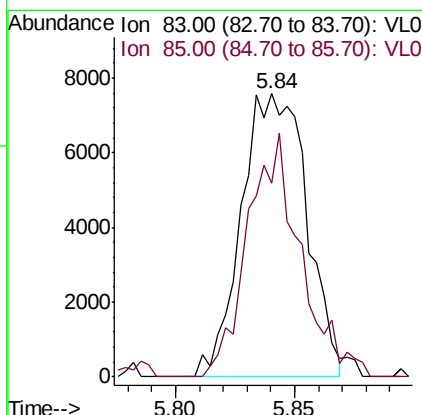
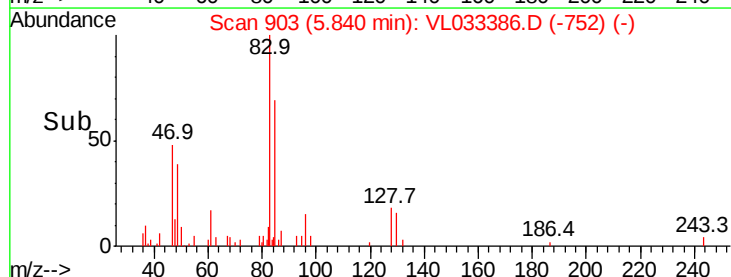
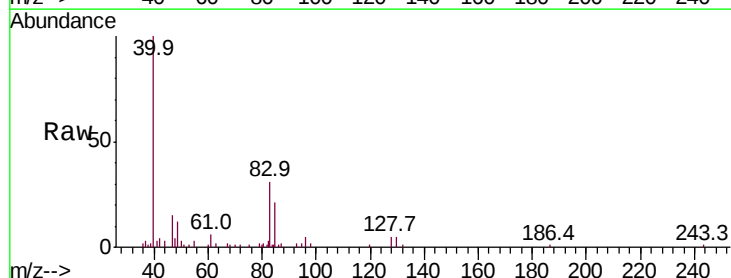
RT: 5.84 min Scan# 903

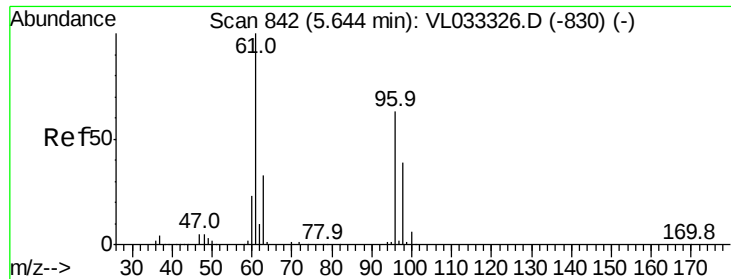
Delta R.T. -0.01 min

Lab File: VL033386.D

Acq: 19 Mar 2019 11:37

Tgt Ion	Ratio	Lower	Upper
83	100		
85	68.6	52.0	78.0





#31
 cis-1,2-Dichloroethene
 Concen: 41.253 ppbv
 RT: 5.63 min Scan# 839
 Delta R.T. -0.01 min
 Lab File: VL033386.D
 Acq: 19 Mar 2019 11:37

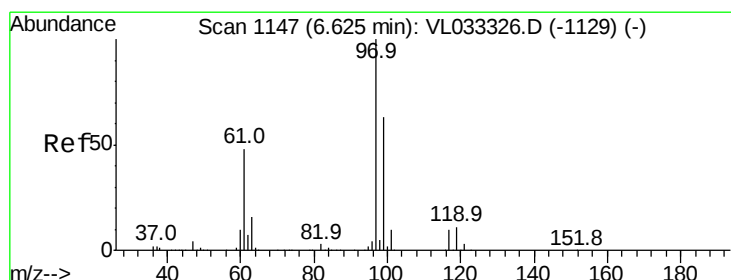
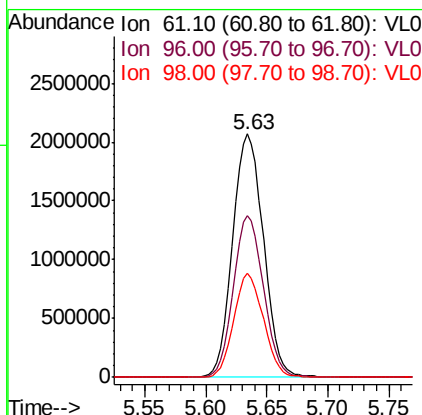
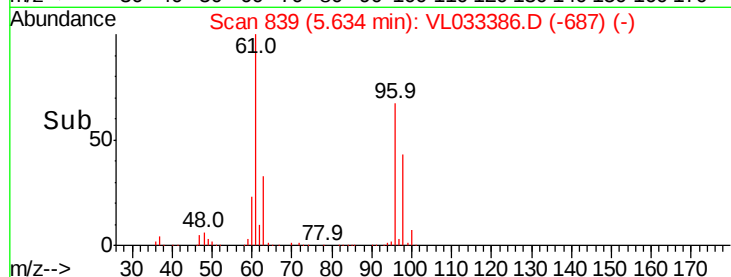
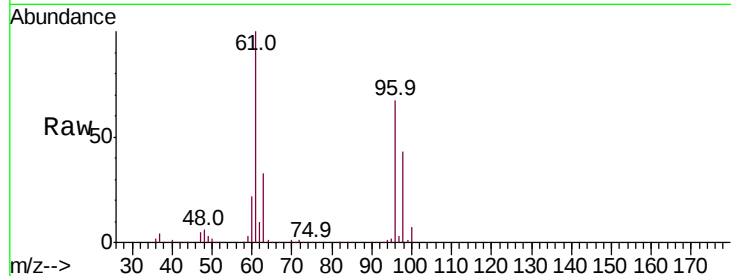
Instrument :
 MSVOA_L
 ClientSampled :
 ST-SS-3

Tot Ion: 61 Resp: 3640249

Ion	Ratio	Lower	Upper
61	100		
96	66.7	50.3	75.5
98	43.0	31.5	47.3

Manual Integrations
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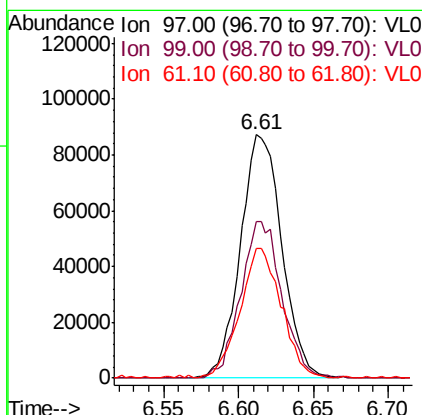
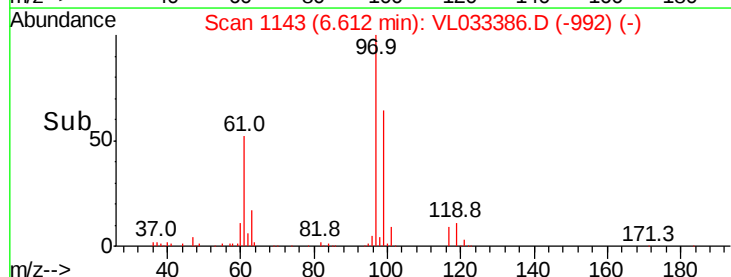
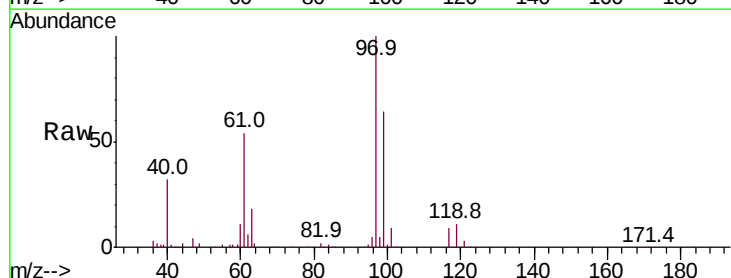
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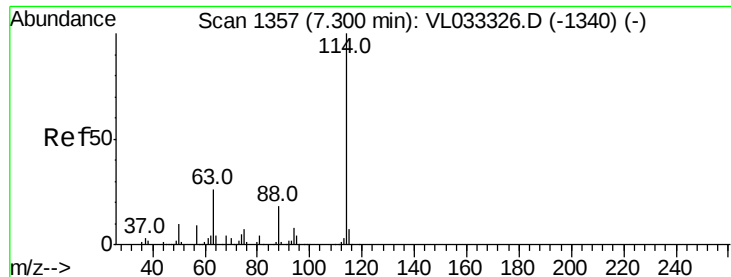


#32
 1,1,1-Trichloroethane
 Concen: 1.187 ppbv
 RT: 6.61 min Scan# 1143
 Delta R.T. -0.01 min
 Lab File: VL033386.D
 Acq: 19 Mar 2019 11:37

Tgt Ion: 97 Resp: 168373

Ion	Ratio	Lower	Upper
97	100		
99	63.9	51.0	76.6
61	53.6	39.3	58.9





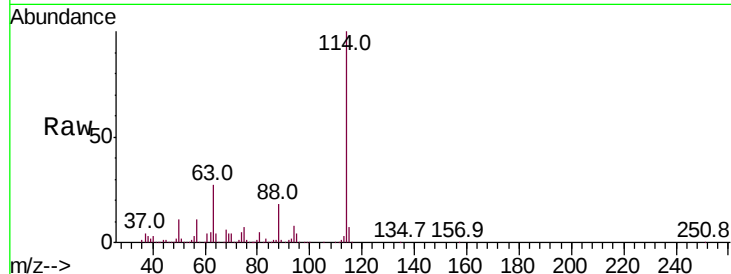
#33
 1,4-Difluorobenzene
 Concen: 10.000 ppbv
 RT: 7.29 min Scan# 1353
 Delta R.T. -0.01 min
 Lab File: VL033386.D
 Acq: 19 Mar 2019 11:37

Instrument :
 MSVOA_L
 ClientSampleID :
 ST-SS-3

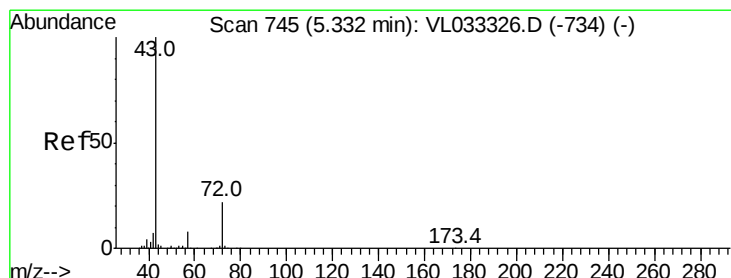
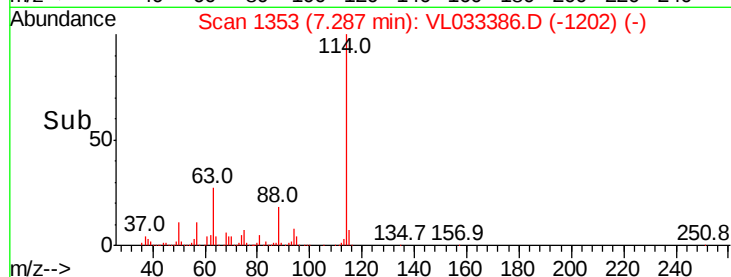
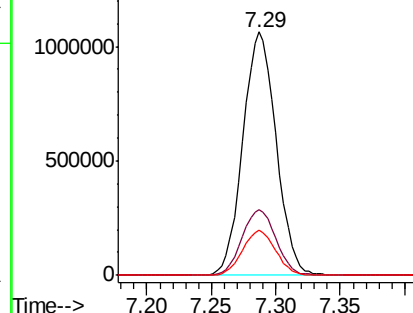
Tot Ion	Ratio	Lower	Upper
114	100		
63	27.5	21.4	32.2
88	18.5	14.5	21.7

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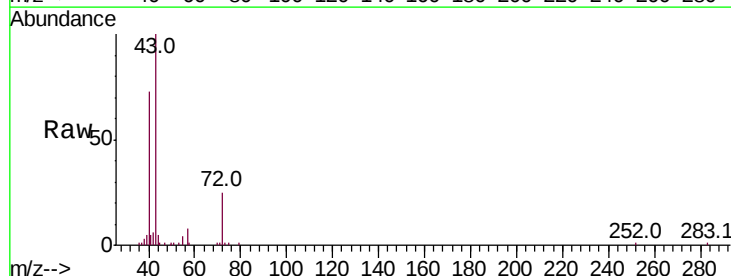


Abundance Ion 114.10 (113.80 to 114.80): VL0
 Ion 63.10 (62.80 to 63.80): VL0
 Ion 88.10 (87.80 to 88.80): VL0

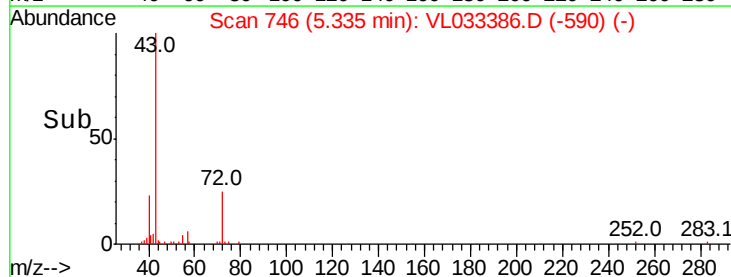
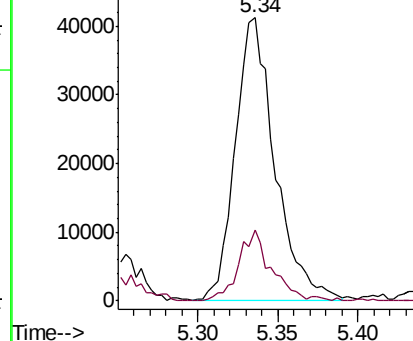


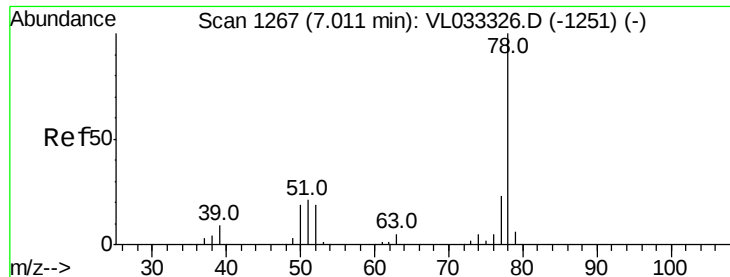
#34
 2-Butanone
 Concen: 0.556 ppbv
 RT: 5.34 min Scan# 746
 Delta R.T. 0.00 min
 Lab File: VL033386.D
 Acq: 19 Mar 2019 11:37

Tgt Ion	Ratio	Lower	Upper
43	100		
72	20.7	17.7	26.5



Abundance Ion 43.10 (42.80 to 43.80): VL0
 Ion 72.10 (71.80 to 72.80): VL0





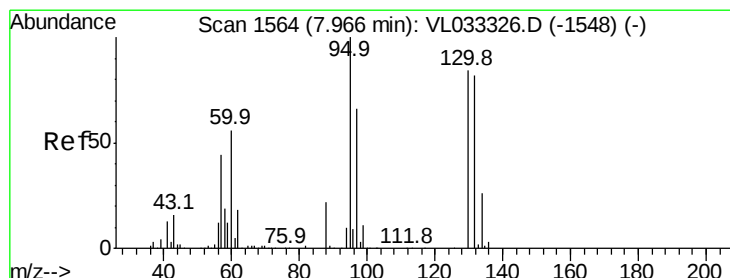
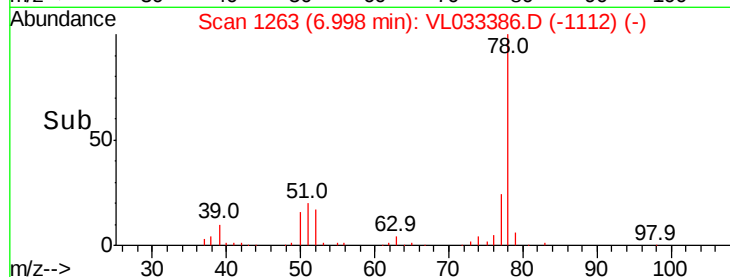
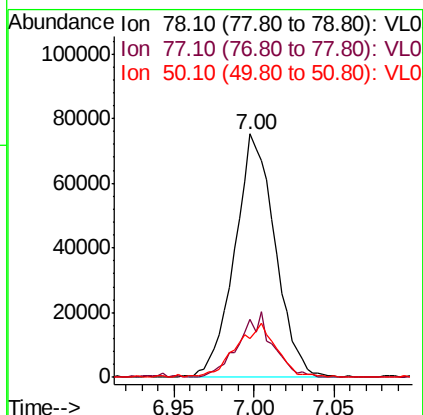
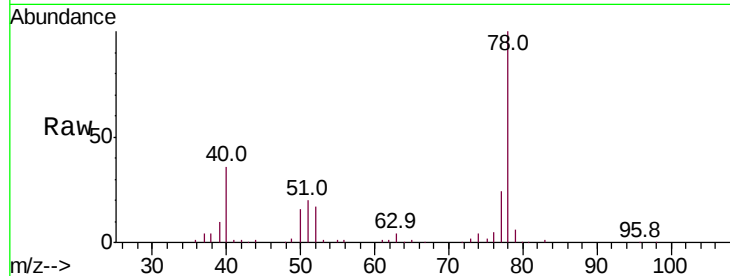
#36
Benzene
Concen: 0.750 ppbv
RT: 7.00 min Scan# 1263
Delta R.T. -0.01 min
Lab File: VL033386.D
Acq: 19 Mar 2019 11:37

Instrument :
MSVOA_L
ClientSampled :
ST-SS-3

Tot Ion	Ratio	Lower	Upper
78	100		
77	23.9	18.1	27.1
50	16.0	15.2	22.8

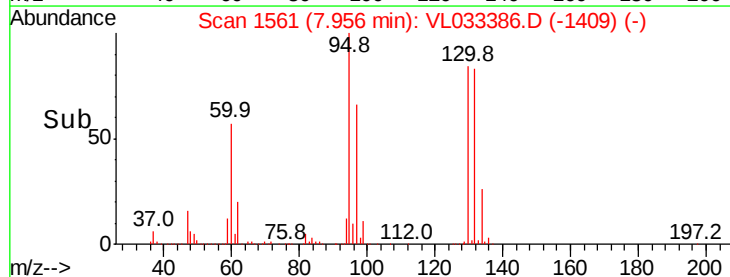
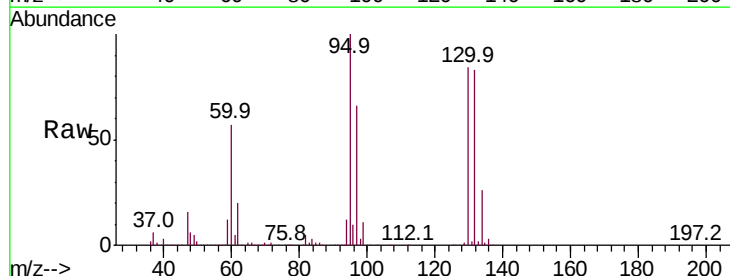
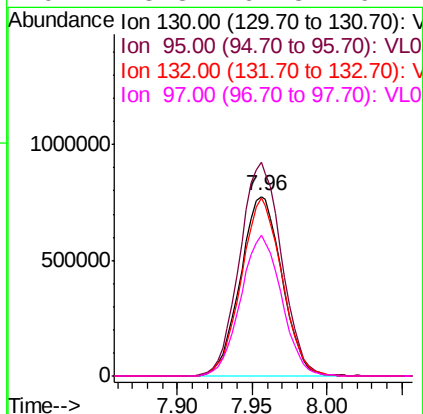
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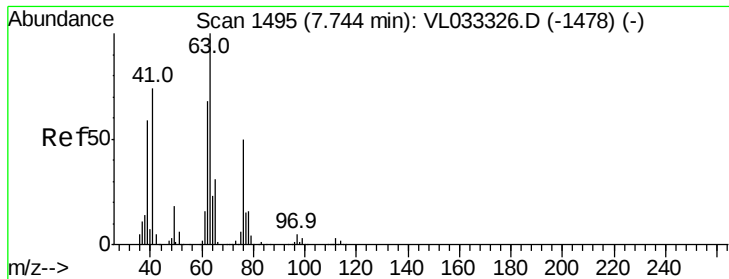
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#38
Trichloroethene
Concen: 23.254 ppbv
RT: 7.96 min Scan# 1561
Delta R.T. -0.01 min
Lab File: VL033386.D
Acq: 19 Mar 2019 11:37

Tgt Ion	Ratio	Lower	Upper
130	100		
95	118.8	95.2	142.8
132	99.0	77.7	116.5
97	78.3	62.8	94.2





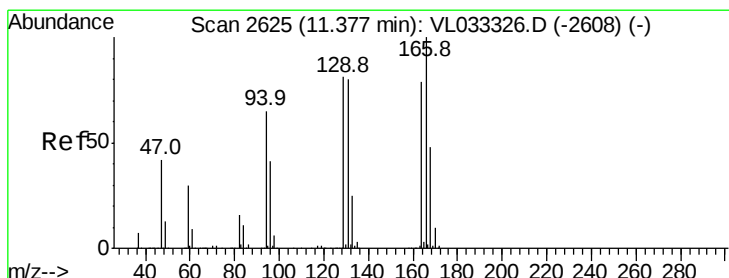
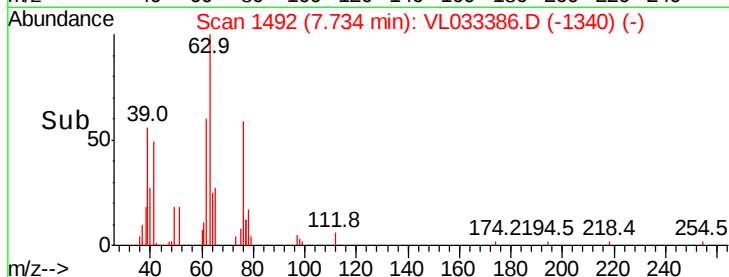
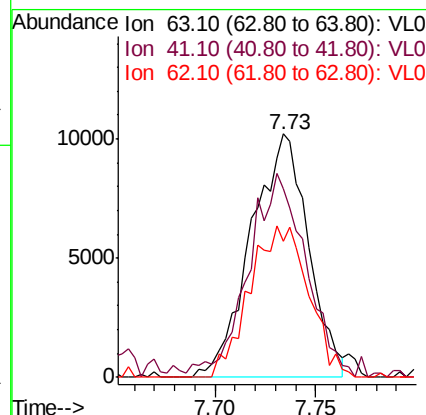
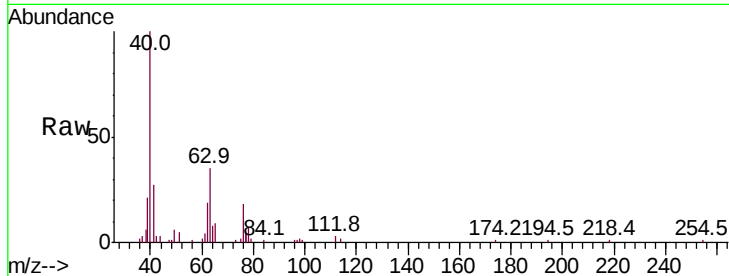
#39
 1,2-Dichloropropane
 Concen: 0.314 ppbv
 RT: 7.73 min Scan# 1492
 Delta R.T. -0.01 min
 Lab File: VL033386.D
 Acq: 19 Mar 2019 11:37

Instrument :
 MSVOA_L
 ClientSampled :
 ST-SS-3

Tot Ion	Ratio	Lower	Upper
63	100		
41	72.7	59.5	89.3
62	55.8	54.7	82.1

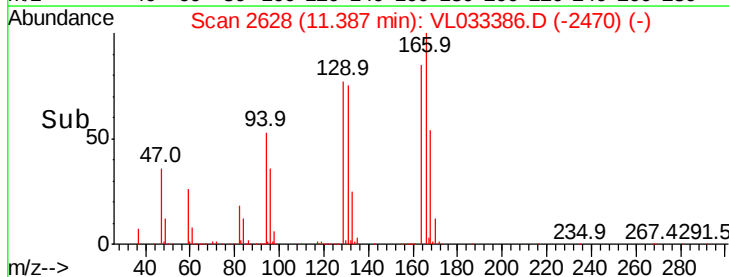
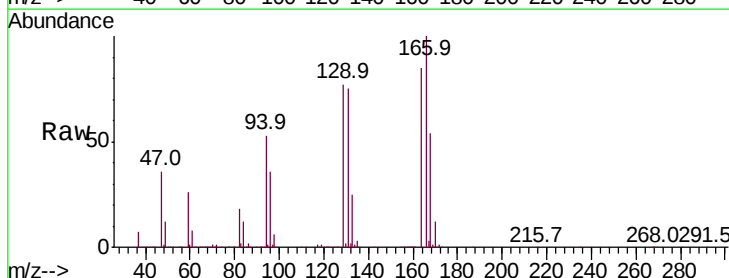
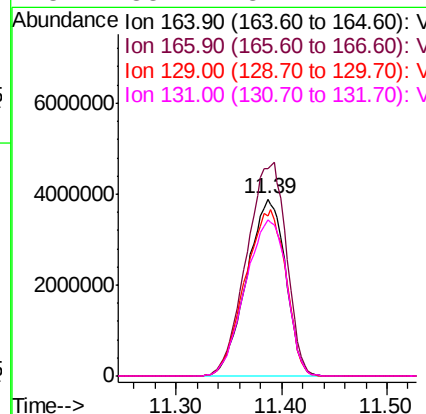
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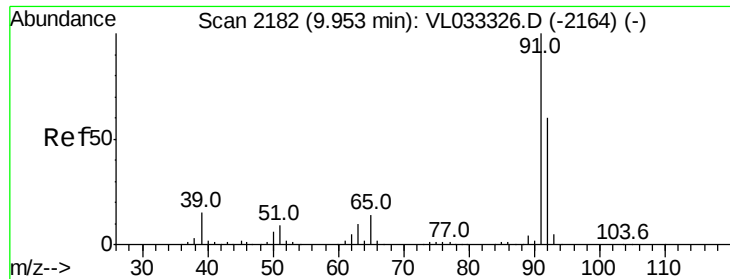
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#52
 Tetrachloroethene
 Concen: 139.717 ppbv
 RT: 11.39 min Scan# 2628
 Delta R.T. 0.01 min
 Lab File: VL033386.D
 Acq: 19 Mar 2019 11:37

Tgt Ion	Ratio	Lower	Upper
164	100		
166	117.6	101.5	152.3
129	90.7	82.2	123.2
131	88.2	81.1	121.7





#53

Toluene

Concen: 0.772 ppbv

RT: 9.95 min Scan# 2180

Delta R.T. -0.01 min

Lab File: VL033386.D

Acq: 19 Mar 2019 11:37

Instrument :

MSVOA_L

ClientSampleId :

ST-SS-3

Tot Ion: 91 Resp: 149777

Ion Ratio Lower Upper

91 100

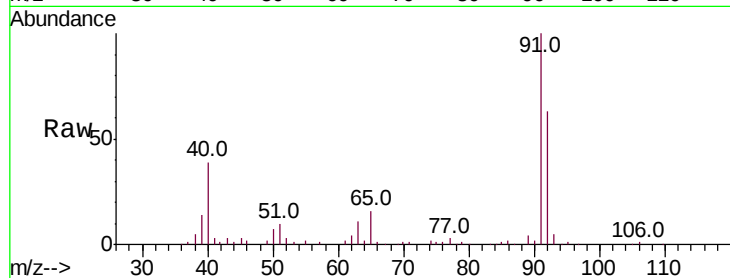
92 60.0 47.4 71.0

Manual Integrations

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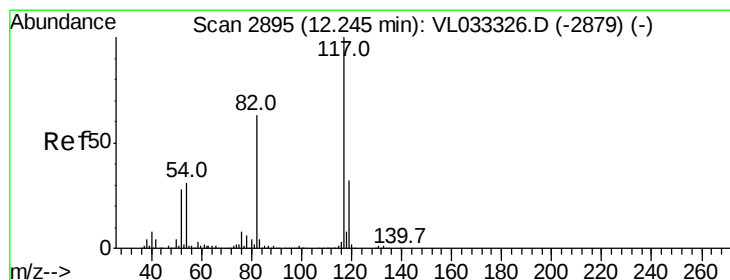
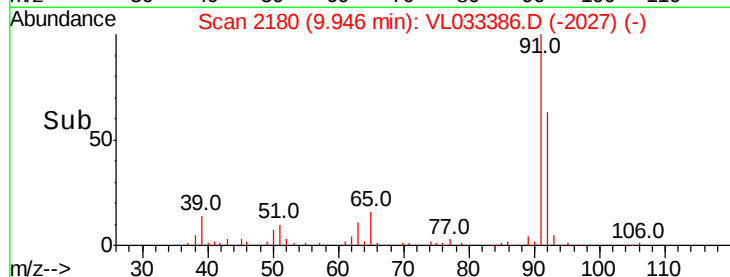
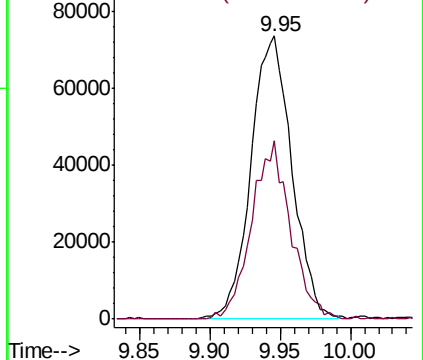
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Abundance Ion 91.10 (90.80 to 91.80): VL0

Ion 92.10 (91.80 to 92.80): VL0



#55

Chlorobenzene-d5

Concen: 10.000 ppbv

RT: 12.24 min Scan# 2893

Delta R.T. -0.01 min

Lab File: VL033386.D

Acq: 19 Mar 2019 11:37

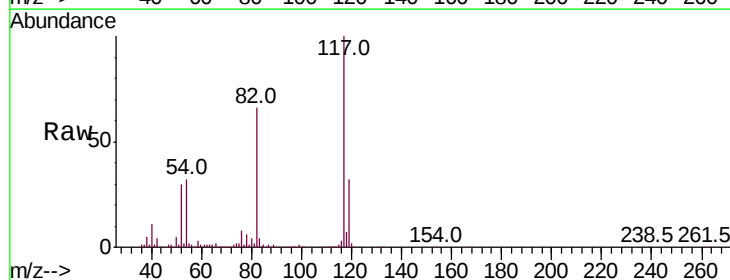
Tgt Ion: 117 Resp: 1855737

Ion Ratio Lower Upper

117 100

82 68.0 53.4 80.2

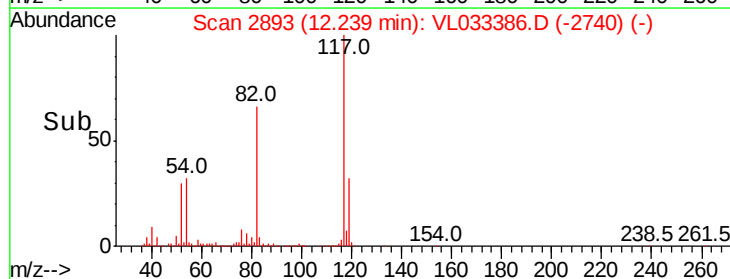
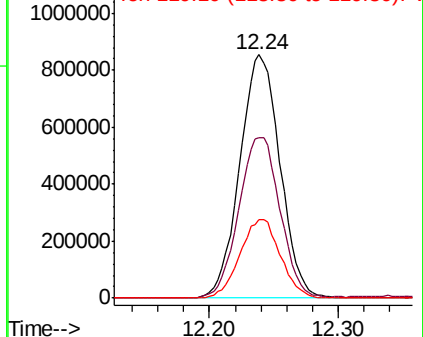
119 32.4 27.3 40.9

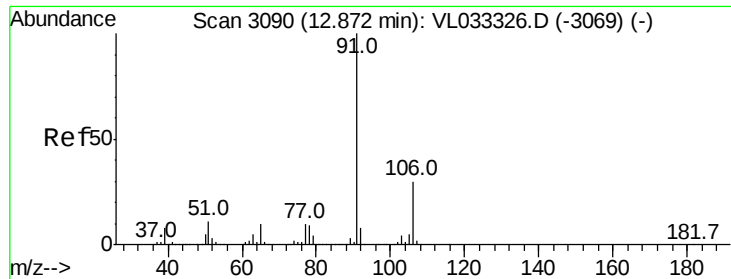


Abundance Ion 117.10 (116.80 to 117.80): V

Ion 82.10 (81.80 to 82.80): VL0

Ion 119.10 (118.80 to 119.80): V





#58

Ethyl Benzene

Concen: 0.150 ppbv m

RT: 12.87 min Scan# 3089

Delta R.T. -0.00 min

Lab File: VL033386.D

Acq: 19 Mar 2019 11:37

Instrument :

MSVOA_L

ClientSampleId :

ST-SS-3

Tot Ion: 91 Resp: 39461

Ion Ratio Lower Upper

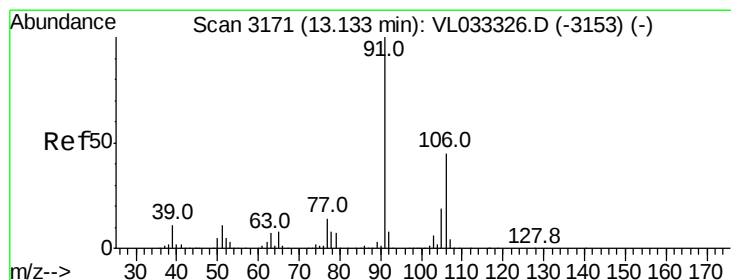
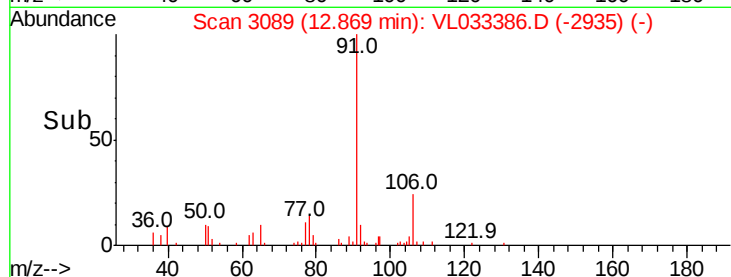
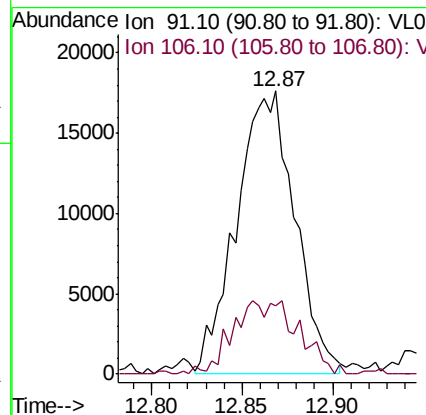
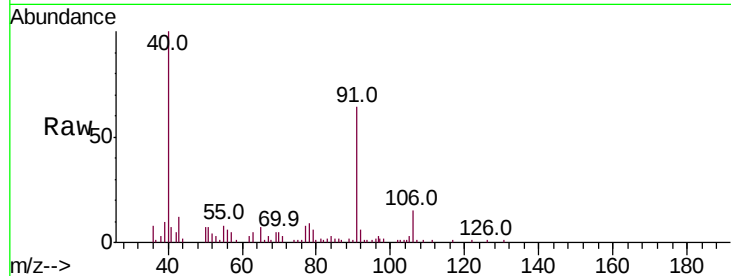
91 100

106 24.1 24.2 36.2#

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#59

m/p-Xylene

Concen: 0.649 ppbv m

RT: 13.12 min Scan# 3168

Delta R.T. -0.01 min

Lab File: VL033386.D

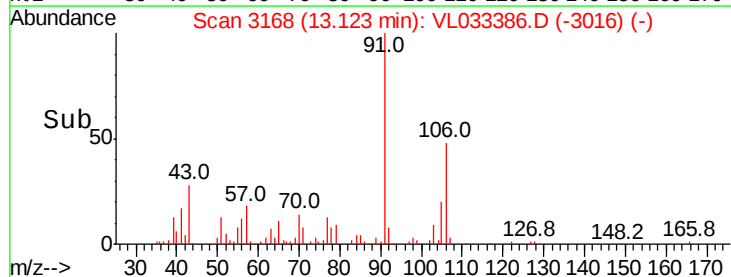
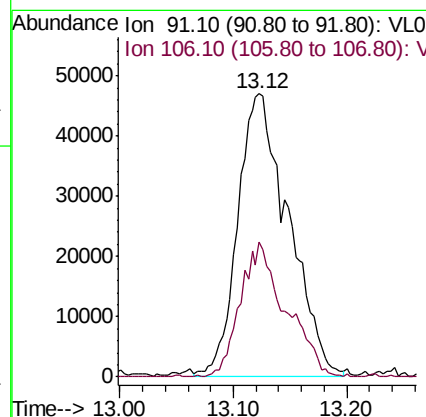
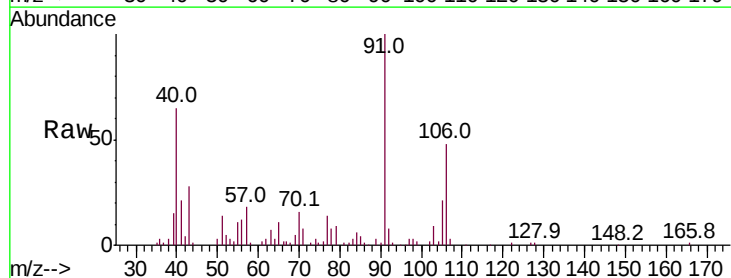
Acq: 19 Mar 2019 11:37

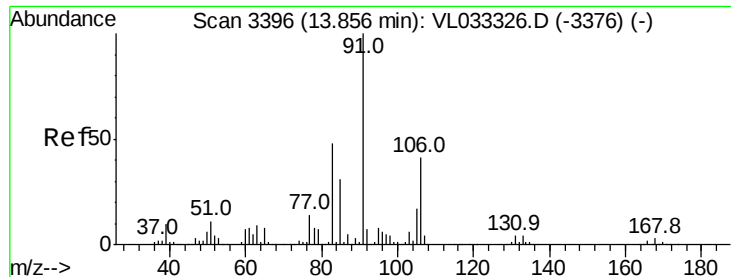
Tgt Ion: 91 Resp: 146460

Ion Ratio Lower Upper

91 100

106 42.5 0.0 0.0#





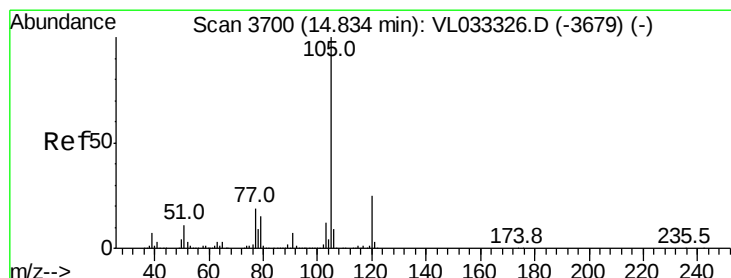
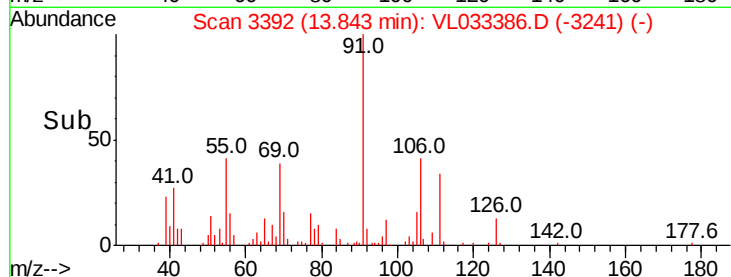
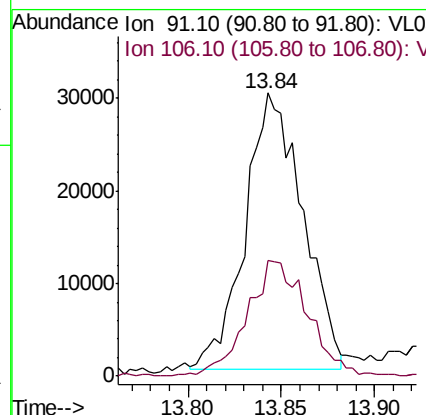
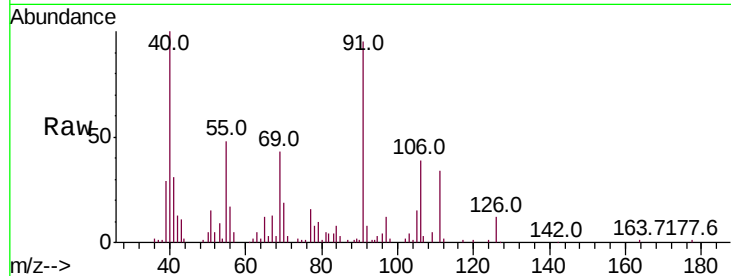
#60
o-Xylene
Concen: 0.291 ppbv m
RT: 13.84 min Scan# 3392
Delta R.T. -0.01 min
Lab File: VL033386.D
Acq: 19 Mar 2019 11:37

Instrument :
MSVOA_L
ClientSampled :
ST-SS-3

Tot Ion: 91 Resp: 64087
Ion Ratio Lower Upper
91 100
106 43.9 21.3 63.9

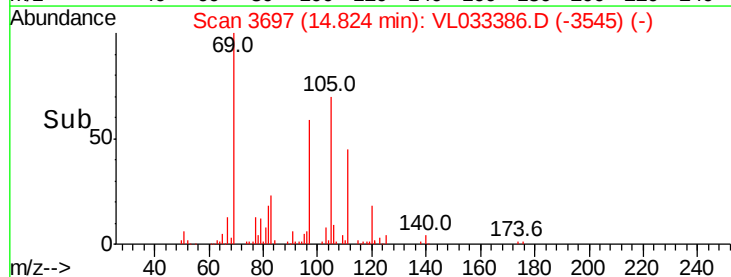
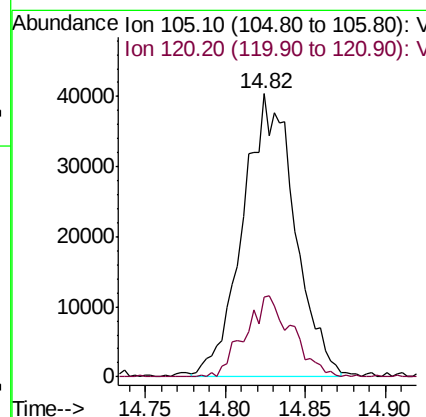
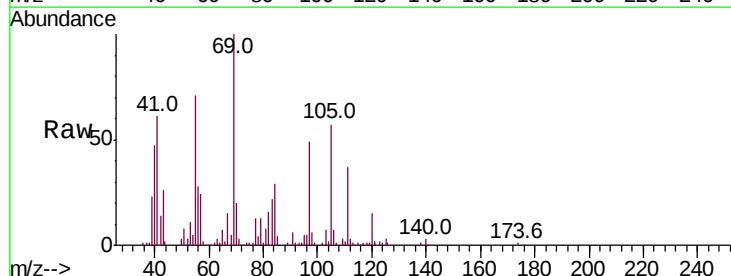
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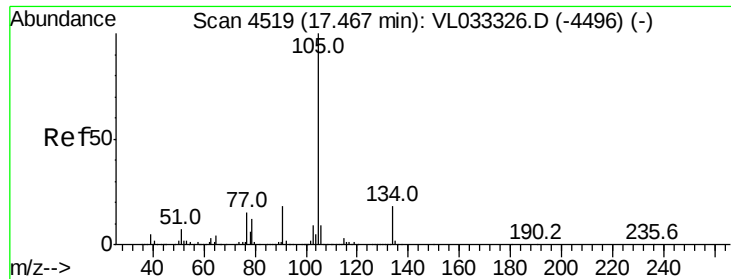
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#62
Isopropylbenzene
Concen: 0.296 ppbv m
RT: 14.82 min Scan# 3697
Delta R.T. -0.01 min
Lab File: VL033386.D
Acq: 19 Mar 2019 11:37

Tgt Ion: 105 Resp: 90652
Ion Ratio Lower Upper
105 100
120 25.8 19.9 29.9





#67

sec-Butylbenzene

Concen: 0.415 ppbv m

RT: 17.47 min Scan# 4521

Delta R.T. 0.01 min

Lab File: VL033386.D

Acq: 19 Mar 2019 11:37

Instrument :

MSVOA_L

ClientSampled :

ST-SS-3

Tot Ion:105 Resp: 162168

Ion Ratio Lower Upper

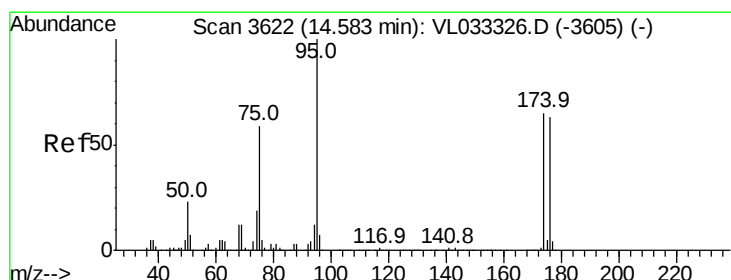
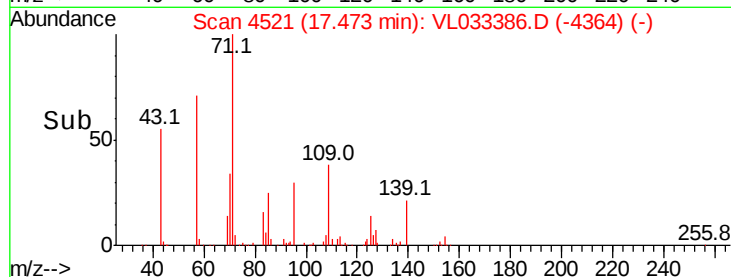
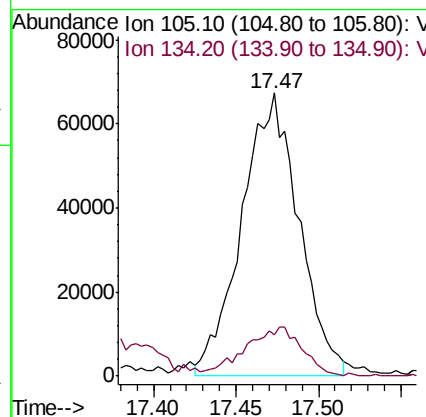
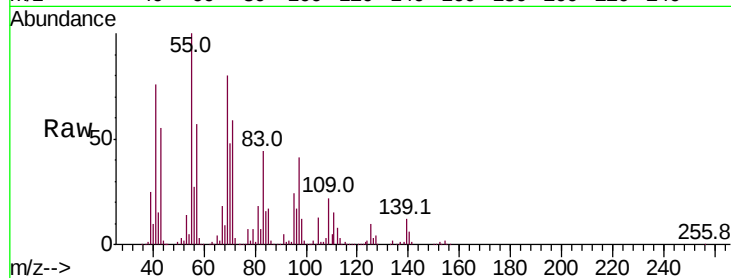
105 100

134 0.0 14.2 21.4#

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#68

1-Bromo-4-Fluorobenzene

Concen: 11.643 ppbv

RT: 14.57 min Scan# 3619

Delta R.T. -0.01 min

Lab File: VL033386.D

Acq: 19 Mar 2019 11:37

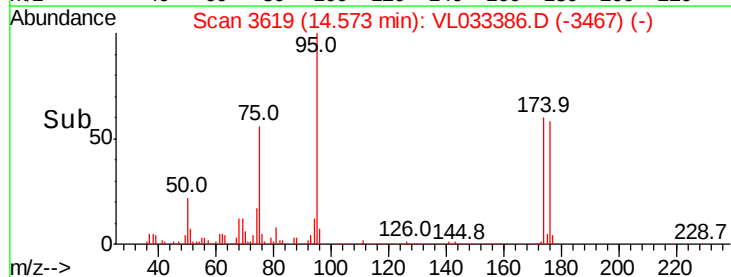
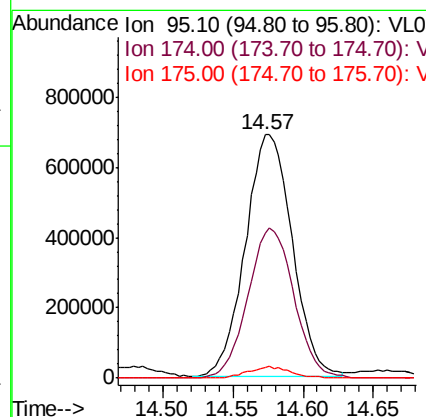
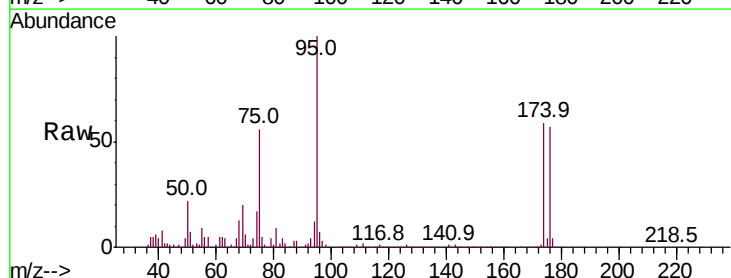
Tgt Ion: 95 Resp: 1600993

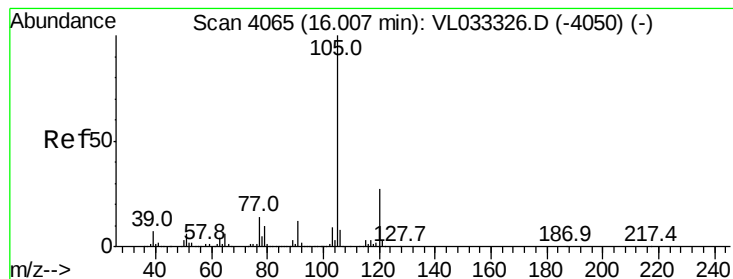
Ion Ratio Lower Upper

95 100

174 61.3 51.5 77.3

175 4.3 3.8 5.6





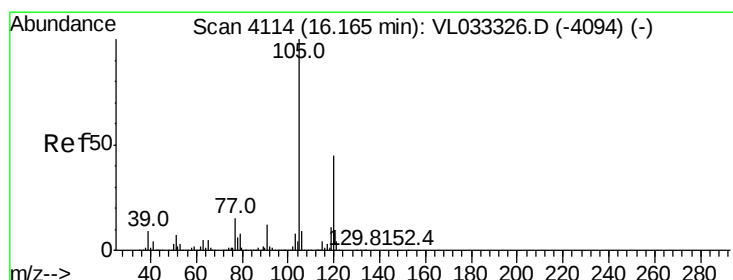
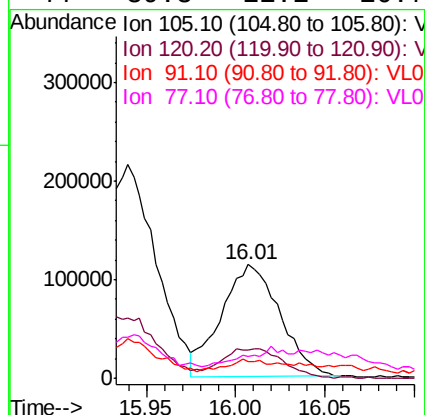
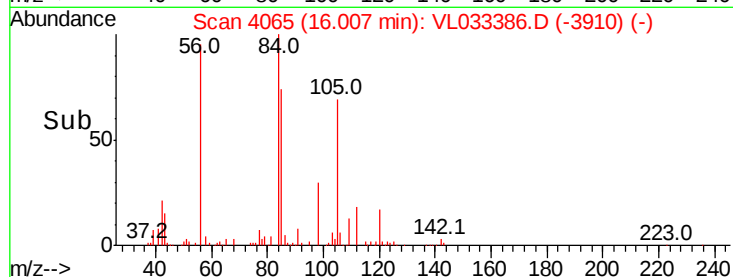
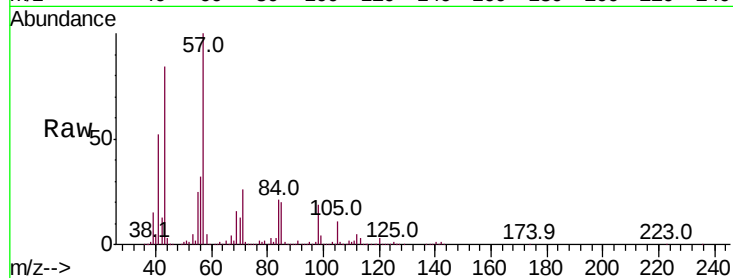
#72
4-Ethyltoluene
Concen: 1.026 ppbv
RT: 16.01 min Scan# 4065
Delta R.T. -0.00 min
Lab File: VL033386.D
Acq: 19 Mar 2019 11:37

Instrument :
MSVOA_L
ClientSampleId :
ST-SS-3

Tot Ion:	105	Resp:	256441
Ion Ratio	Lower	Upper	
105	100		
120	28.4	22.9	34.3
91	24.5	10.2	15.2#
77	39.3	11.1	16.7#

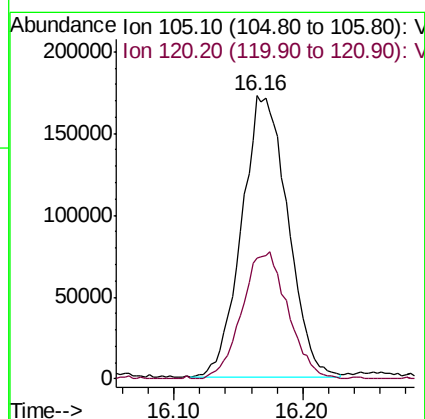
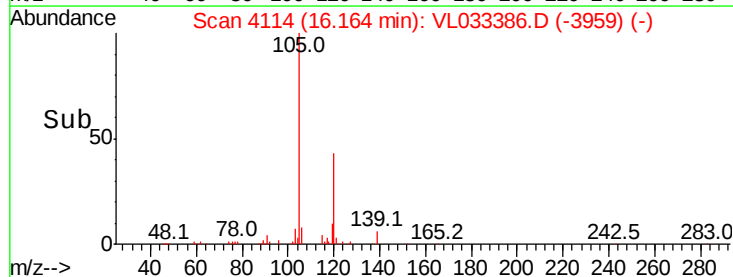
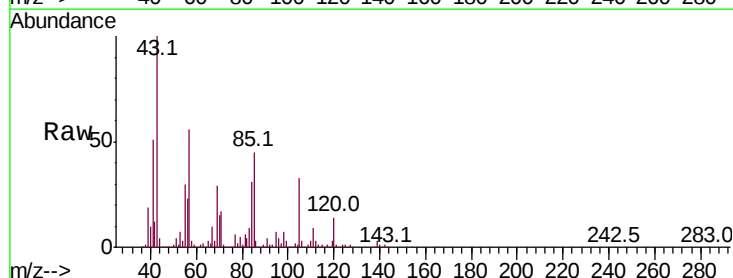
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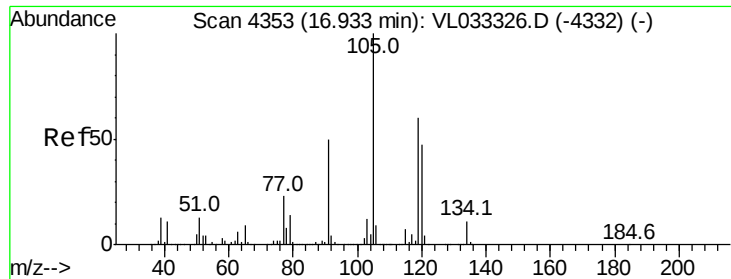
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#73
1,3,5-Trimethylbenzene
Concen: 1.748 ppbv
RT: 16.16 min Scan# 4114
Delta R.T. -0.00 min
Lab File: VL033386.D
Acq: 19 Mar 2019 11:37

Tgt Ion:	105	Resp:	425580
Ion Ratio	Lower	Upper	
105	100		
120	42.8	36.2	54.4





#74
 1,2,4-Trimethylbenzene
 Concen: 3.379 ppbv
 RT: 16.94 min Scan# 4354
 Delta R.T. 0.00 min
 Lab File: VL033386.D
 Acq: 19 Mar 2019 11:37

Instrument :
 MSVOA_L
 ClientSampleId :
 ST-SS-3

Tot Ion	Ratio	Resp Lower	Upper
105	100		
120	39.2	37.4	56.2
91	12.4	41.0	61.4#
77	14.2	18.5	27.7#

Manual Integrations
 APPROVED

MMDadoda
 3/21/2019 12:16:04 PM

