

Data Path : Z:\VOASRV\HPCHEM1\MSVOA X\DATA\VX072018\
 Data File : VX003538.D
 Acq On : 21 Jul 2018 04:54
 Operator : JC/SP
 Sample : J4014-16
 Misc : 5.0mL/MSVOA X/WATER
 ALS Vial : 45 Sample Multiplier: 1

Instrument :
 MSVOA_X
 ClientSampleId :
 RE104D2-071318

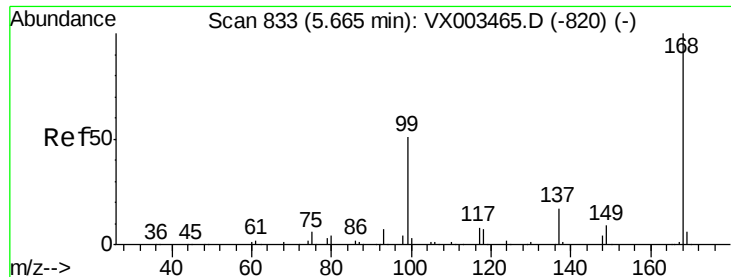
Quant Time: Jul 21 06:17:38 2018
 Quant Method : Z:\VOASRV\HPCHEM1\MSVOA_X\METHOD\82X071918W.M
 Quant Title : SW846 8260
 QLast Update : Thu Jul 19 17:09:44 2018
 Response via : Initial Calibration

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) Pentafluorobenzene	5.67	168	303019	50.00	ug/l	0.00
34) 1,4-Difluorobenzene	6.87	114	426199	50.00	ug/l	0.00
63) Chlorobenzene-d5	10.12	117	401359	50.00	ug/l	0.00
72) 1,4-Dichlorobenzene-d4	12.08	152	217942	50.00	ug/l	0.00

System Monitoring Compounds	R.T.	QIon	Response	Conc	Units	Dev(Min)
33) 1,2-Dichloroethane-d4	6.07	65	184453	51.42	ug/l	0.00
Spiked Amount			Recovery	=	102.84%	
35) Dibromofluoromethane	5.51	113	179942	55.43	ug/l	0.00
Spiked Amount			Recovery	=	110.86%	
50) Toluene-d8	8.72	98	603274	49.44	ug/l	0.00
Spiked Amount			Recovery	=	98.88%	
62) 4-Bromofluorobenzene	11.14	95	204887	46.01	ug/l	0.00
Spiked Amount			Recovery	=	92.02%	

Target Compounds	R.T.	QIon	Response	Conc	Units	Qvalue
3) Chloromethane	1.32	50	650	Below Cal		93
5) Bromomethane	1.66	94	1018	Below Cal	#	58
12) 1,1-Dichloroethene	2.37	96	1151	0.37	ug/l	84
13) Acrolein	2.29	56	73	0.23	ug/l	# 1
14) Allyl chloride	2.62	41	3284	0.60	ug/l	# 66
16) Acetone	2.45	43	2750	2.03	ug/l	90
18) Methyl Acetate	2.78	43	855	0.20	ug/l	# 85
20) Methylene Chloride	2.86	84	451	Below Cal	#	88
21) trans-1,2-Dichloroethene	3.16	96	1440	0.42	ug/l	# 76
24) 1,1-Dichloroethane	3.70	63	2596	0.43	ug/l	# 83
27) cis-1,2-Dichloroethene	4.60	96	88358	23.04	ug/l	89
28) Bromochloromethane	5.22	49	1349	0.51	ug/l	# 13
30) Chloroform	5.21	83	18384	3.11	ug/l	93
31) Cyclohexane	5.67	56	4984	0.92	ug/l	# 1
36) 1,1-Dichloropropene	5.67	75	19156	4.16	ug/l	# 50
38) Carbon Tetrachloride	5.67	117	26222	5.81	ug/l	# 16
42) 1,2-Dichloroethane	6.20	62	4333	0.99	ug/l	95
44) Trichloroethene	7.21	130	260298	62.82	ug/l	97
49) 1,4-Dioxane	7.77	88	220	2.78	ug/l	# 50
51) 4-Methyl-2-Pentanone	8.71	43	2469	0.56	ug/l	# 1
76) 1,2,3-Trichloropropane	11.14	75	97531	24.91	ug/l	# 33
81) trans-1,4-Dichloro-2-buten	11.14	75	97531	69.77	ug/l	# 7

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



#1

Pentafluorobenzene

Concen: 50.00 ug/l

RT: 5.67 min Scan# 834

Delta R.T. 0.01 min

Lab File: VX003538.D

Acq: 21 Jul 2018 04:54

Instrument :

MSVOA_X

ClientSampleId :

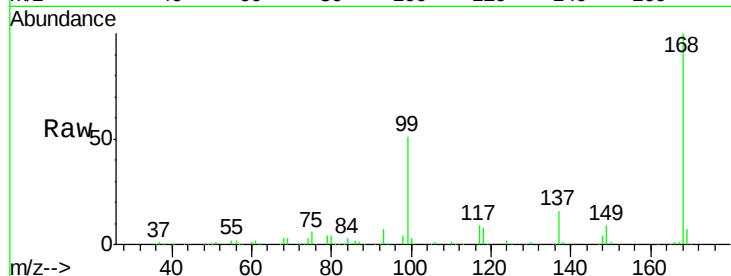
RE104D2-071318

Tot Ion:168 Resp: 303019

Ion Ratio Lower Upper

168 100

99 50.8 39.3 58.9



Abundance Ion 167.90 (167.60 to 168.60): V

Ion 98.90 (98.60 to 99.60): VX0

5.67

120000

100000

80000

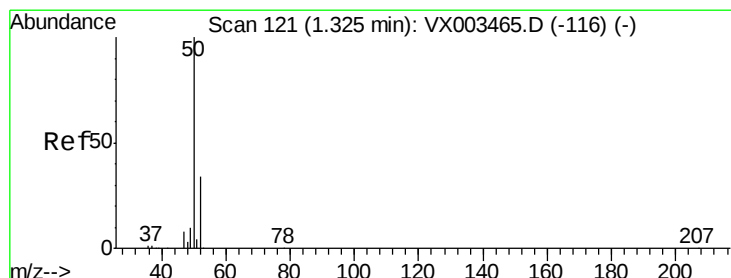
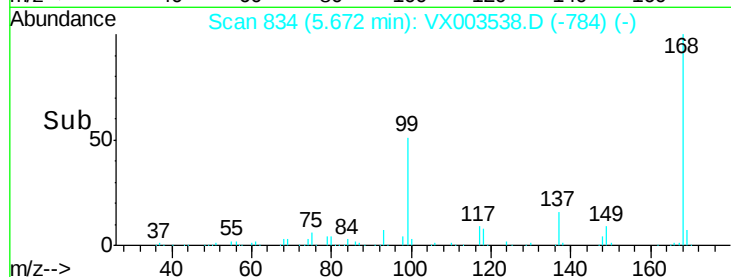
60000

40000

20000

0

Time--> 5.50 5.60 5.70 5.80



#3

Chloromethane

Concen: Below Cal

RT: 1.32 min Scan# 121

Delta R.T. 0.00 min

Lab File: VX003538.D

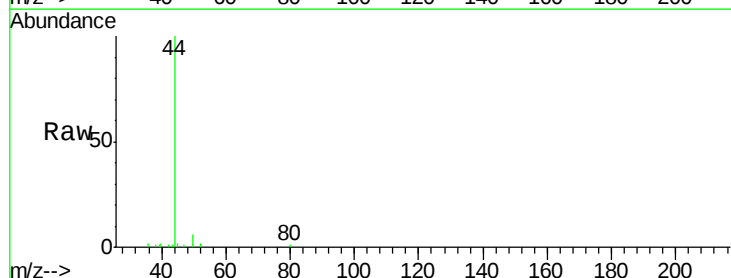
Acq: 21 Jul 2018 04:54

Tgt Ion: 50 Resp: 650

Ion Ratio Lower Upper

50 100

52 27.9 25.7 38.5



Abundance Ion 49.90 (49.60 to 50.60): VX0

Ion 51.90 (51.60 to 52.60): VX0

1.32

600

500

400

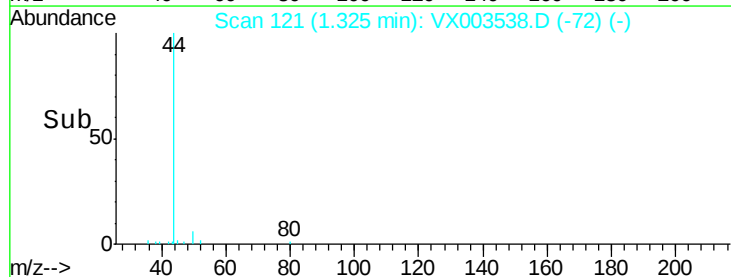
300

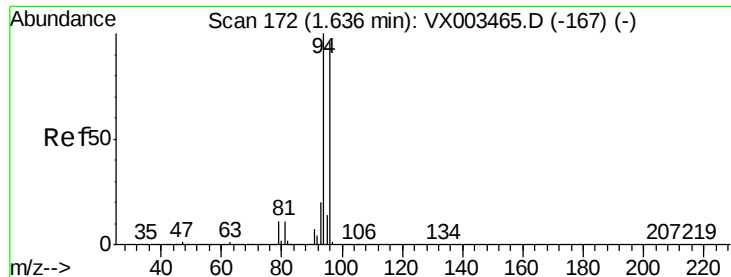
200

100

0

Time--> 1.30 1.35 1.40





#5

Bromomethane

Concen: Below Cal

RT: 1.66 min Scan# 176

Delta R.T. 0.03 min

Lab File: VX003538.D

Acq: 21 Jul 2018 04:54

Instrument :

MSVOA_X

ClientSampleId :

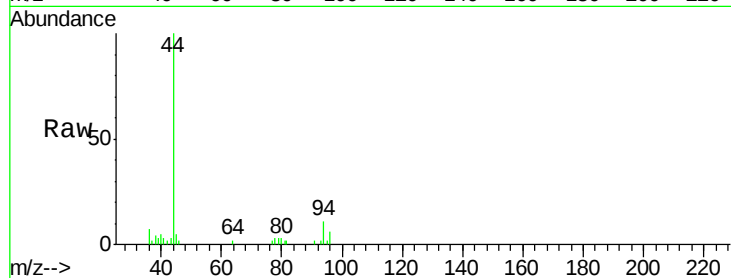
RE104D2-071318

Tot Ion: 94 Resp: 1018

Ion Ratio Lower Upper

94 100

96 52.8 74.9 112.3#



Abundance Ion 93.90 (93.60 to 94.60): VX0

Ion 95.90 (95.60 to 96.60): VX0

1.66

400

300

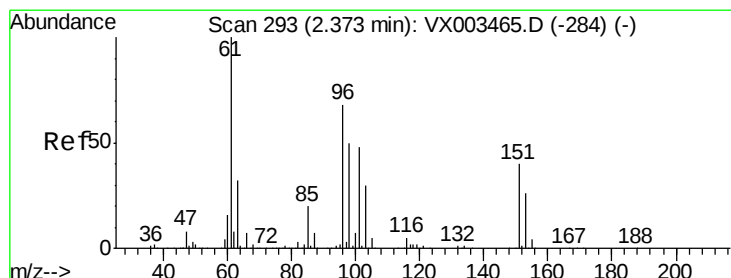
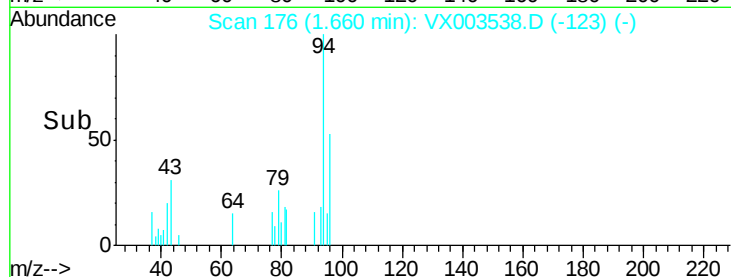
200

100

0

1.60 1.65 1.70

Time-->



#12

1,1-Dichloroethene

Concen: 0.37 ug/l

RT: 2.37 min Scan# 293

Delta R.T. 0.00 min

Lab File: VX003538.D

Acq: 21 Jul 2018 04:54

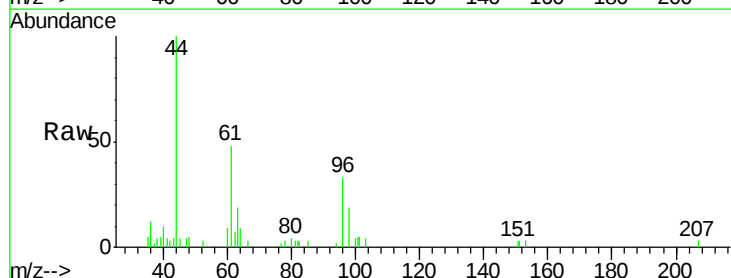
Tgt Ion: 96 Resp: 1151

Ion Ratio Lower Upper

96 100

61 147.0 137.9 206.9

98 58.0 51.6 77.4



Abundance Ion 95.90 (95.60 to 96.60): VX0

Ion 60.90 (60.60 to 61.60): VX0

Ion 97.90 (97.60 to 98.60): VX0

1500

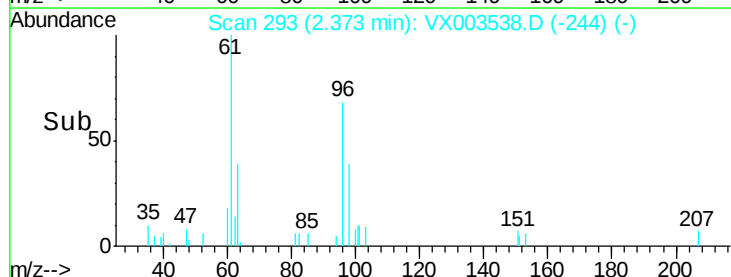
1000

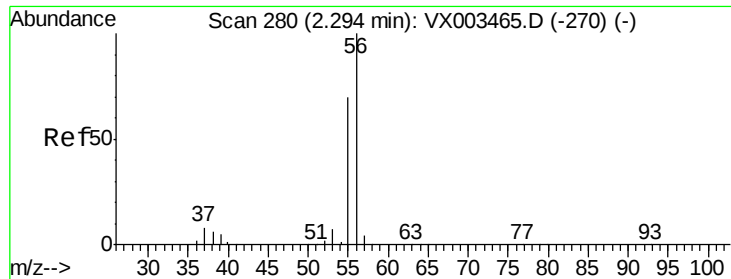
500

0

2.35 2.40

Time-->





#13

Acrolein

Concen: 0.23 ug/l

RT: 2.29 min Scan# 280

Delta R.T. 0.00 min

Lab File: VX003538.D

Acq: 21 Jul 2018 04:54

Instrument :

MSVOA_X

ClientSampleId :

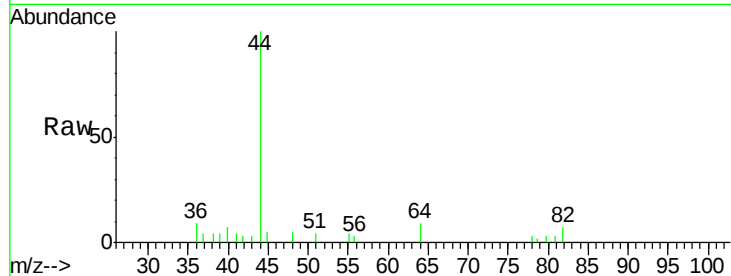
RE104D2-071318

Tot Ion: 56 Resp: 73

Ion Ratio Lower Upper

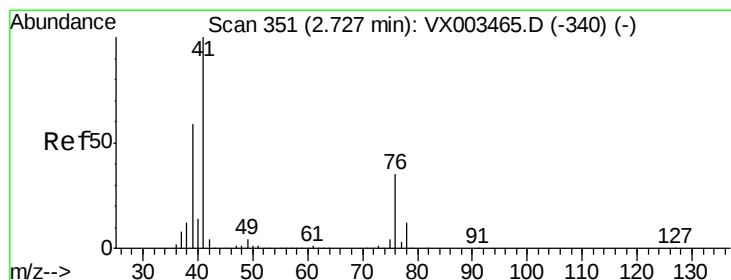
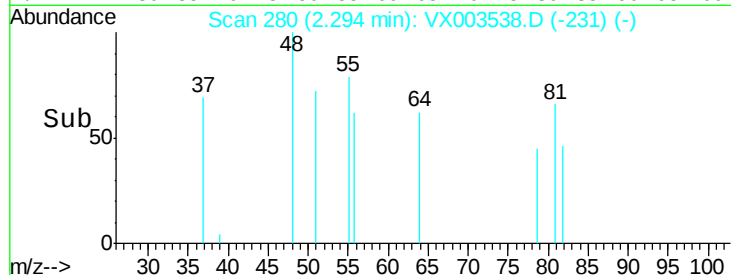
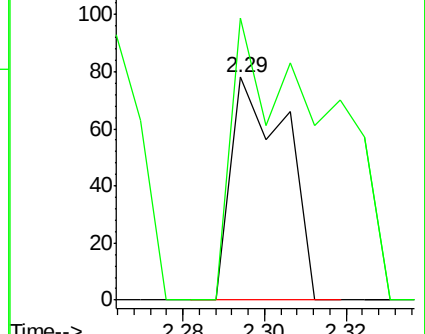
56 100

55 216.4 57.0 85.4#



Abundance Ion 56.00 (55.70 to 56.70): VX0

Ion 55.00 (54.70 to 55.70): VX0



#14

Allyl chloride

Concen: 0.60 ug/l

RT: 2.62 min Scan# 333

Delta R.T. -0.11 min

Lab File: VX003538.D

Acq: 21 Jul 2018 04:54

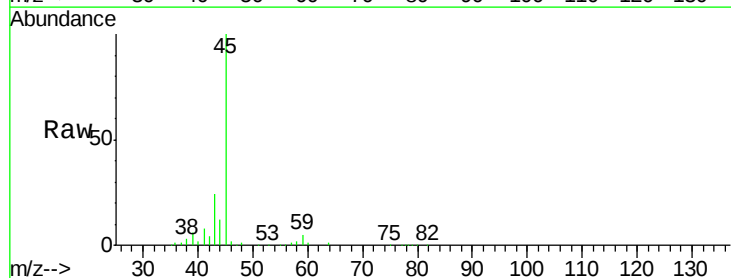
Tgt Ion: 41 Resp: 3284

Ion Ratio Lower Upper

41 100

39 91.4 56.8 85.2#

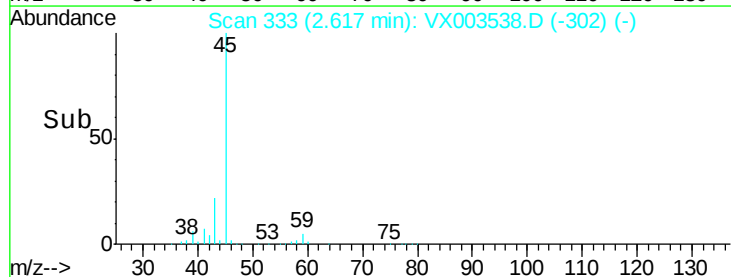
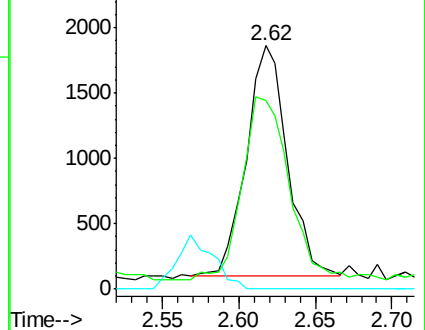
76 0.0 23.8 35.8#

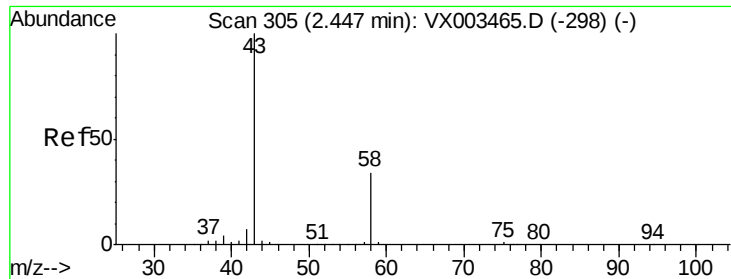


Abundance Ion 41.00 (40.70 to 41.70): VX0

Ion 39.00 (38.70 to 39.70): VX0

Ion 75.90 (75.60 to 76.60): VX0





#16

Acetone

Concen: 2.03 ug/l

RT: 2.45 min Scan# 305

Delta R.T. 0.00 min

Lab File: VX003538.D

Acq: 21 Jul 2018 04:54

Instrument :

MSVOA_X

ClientSampleId :

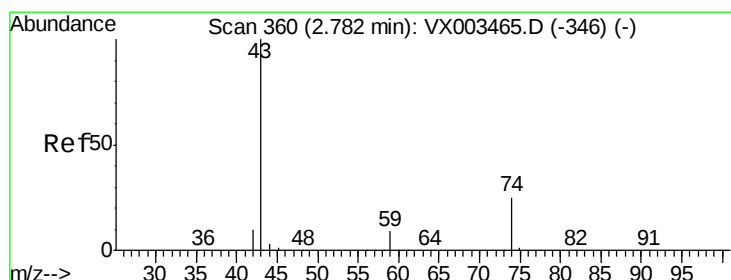
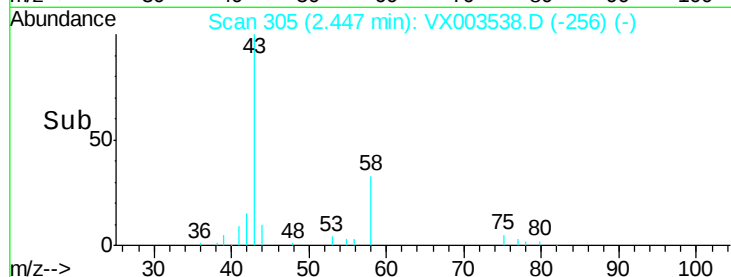
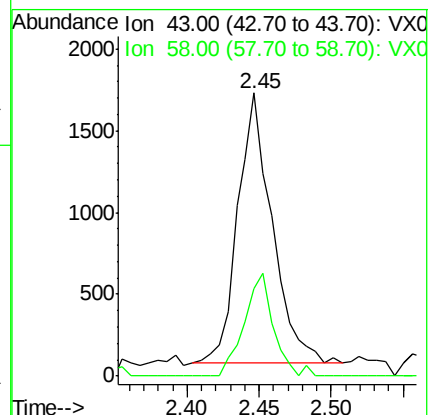
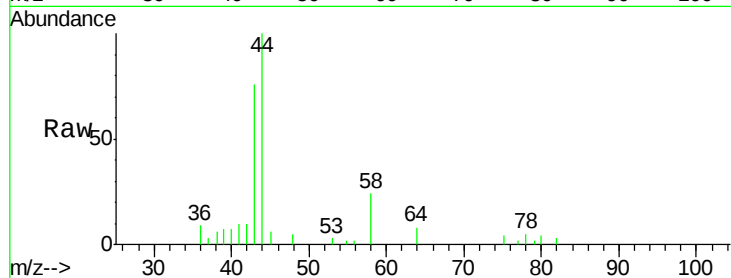
RE104D2-071318

Tot Ion: 43 Resp: 2750

Ion Ratio Lower Upper

43 100

58 32.6 22.1 33.1



#18

Methyl Acetate

Concen: 0.20 ug/l

RT: 2.78 min Scan# 360

Delta R.T. 0.00 min

Lab File: VX003538.D

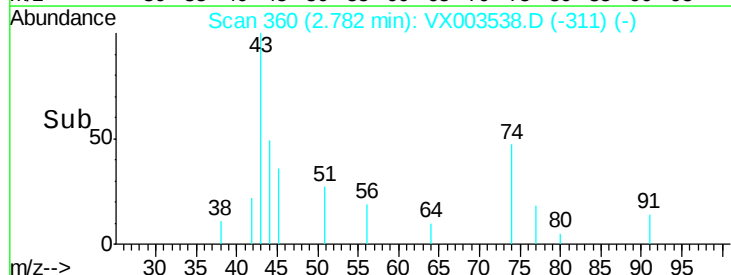
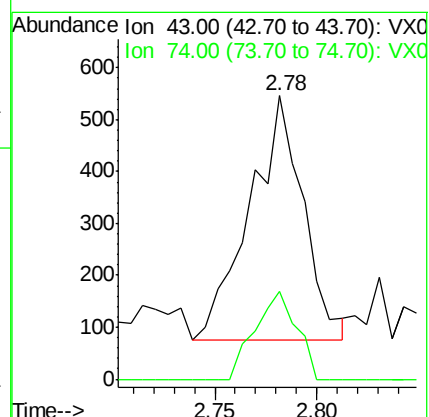
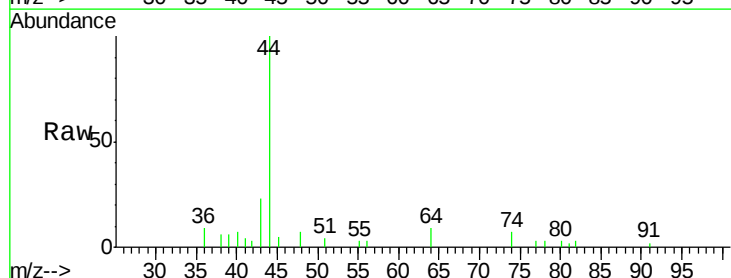
Acq: 21 Jul 2018 04:54

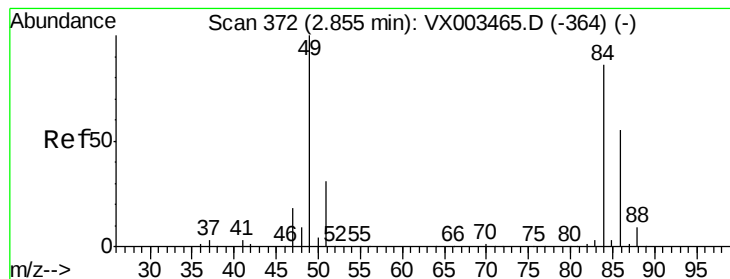
Tgt Ion: 43 Resp: 855

Ion Ratio Lower Upper

43 100

74 28.0 16.7 25.1#





#20

Methylene Chloride

Concen: Below Cal

RT: 2.86 min Scan# 372

Delta R.T. 0.00 min

Lab File: VX003538.D

Acq: 21 Jul 2018 04:54

Instrument :

MSVOA_X

ClientSampleId :

RE104D2-071318

Tot Ion: 84 Resp: 451

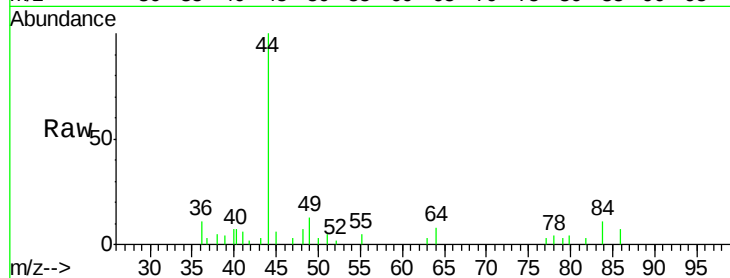
Ion Ratio Lower Upper

84 100

49 122.1 107.8 161.6

51 23.0 32.8 49.2#

86 61.5 52.5 78.7

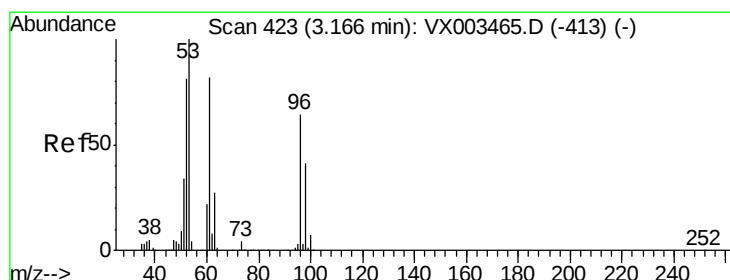
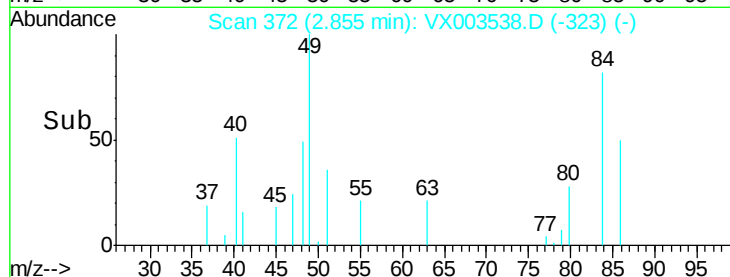
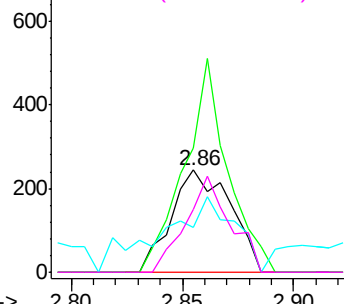


Abundance Ion 83.90 (83.60 to 84.60): VX0

Ion 48.90 (48.60 to 49.60): VX0

Ion 50.90 (50.60 to 51.60): VX0

Ion 85.90 (85.60 to 86.60): VX0



#21

trans-1,2-Dichloroethene

Concen: 0.42 ug/l

RT: 3.16 min Scan# 422

Delta R.T. -0.01 min

Lab File: VX003538.D

Acq: 21 Jul 2018 04:54

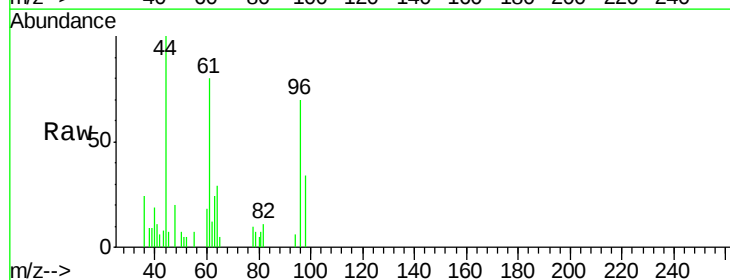
Tgt Ion: 96 Resp: 1440

Ion Ratio Lower Upper

96 100

61 114.5 117.0 175.4#

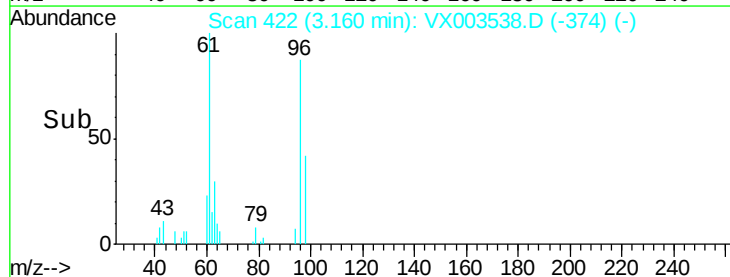
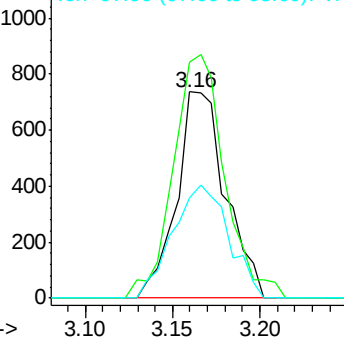
98 48.6 52.4 78.6#

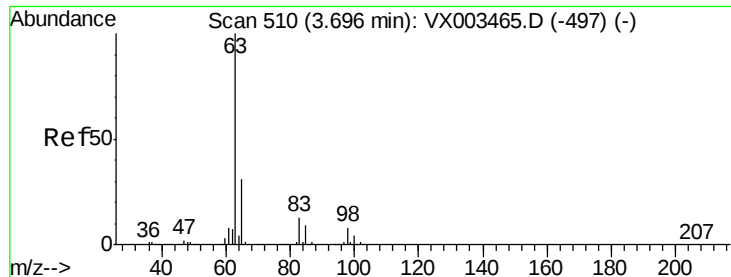


Abundance Ion 95.90 (95.60 to 96.60): VX0

Ion 60.90 (60.60 to 61.60): VX0

Ion 97.90 (97.60 to 98.60): VX0





#24

1,1-Dichloroethane

Concen: 0.43 ug/l

RT: 3.70 min Scan# 510

Delta R.T. 0.00 min

Lab File: VX003538.D

Acq: 21 Jul 2018 04:54

Instrument :

MSVOA_X

ClientSampleId :

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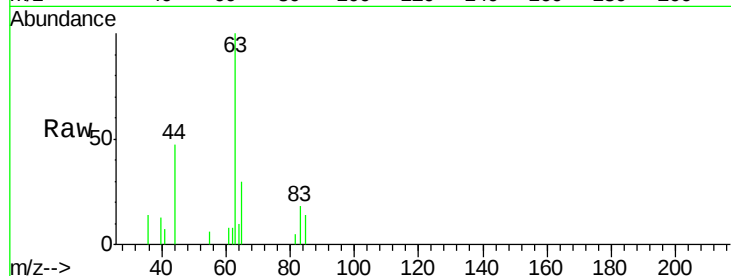
Tot Ion: 63 Resp: 2596

Ion Ratio Lower Upper

63 100

98 0.0 3.4 10.2#

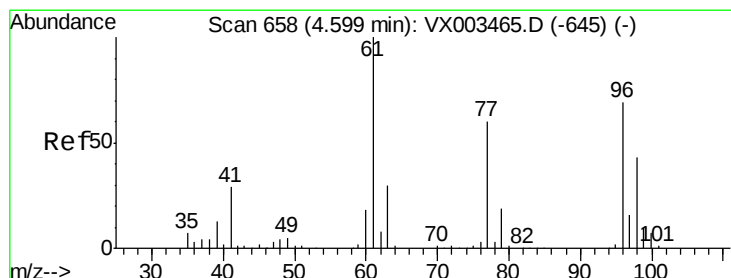
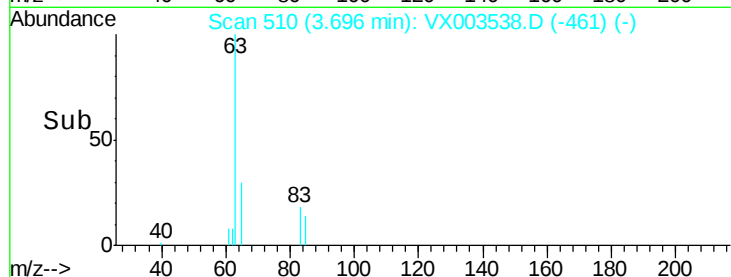
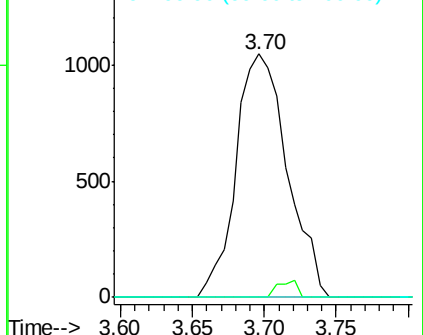
100 0.0 2.0 6.0#



Abundance Ion 62.90 (62.60 to 63.60): VX0

Ion 97.90 (97.60 to 98.60): VX0

Ion 99.90 (99.60 to 100.60): VX0



#27

cis-1,2-Dichloroethene

Concen: 23.04 ug/l

RT: 4.60 min Scan# 658

Delta R.T. 0.00 min

Lab File: VX003538.D

Acq: 21 Jul 2018 04:54

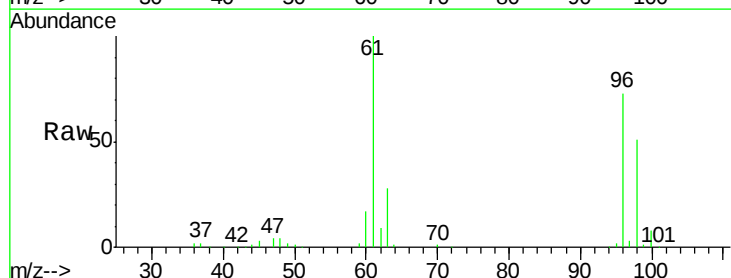
Tgt Ion: 96 Resp: 88358

Ion Ratio Lower Upper

96 100

61 145.0 0.0 330.2

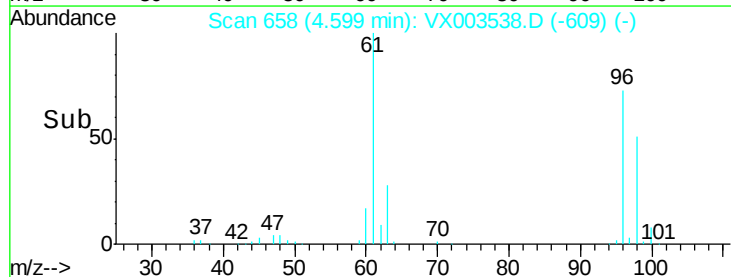
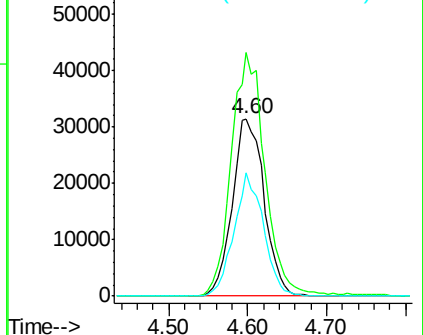
98 64.3 0.0 130.2

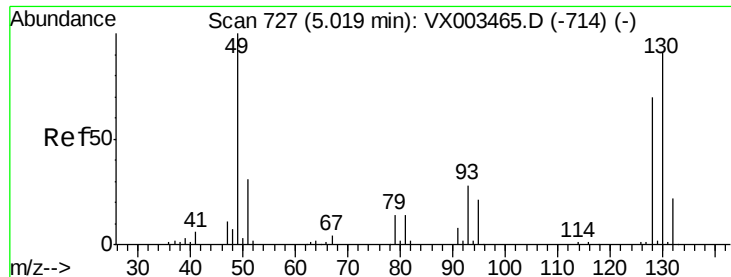


Abundance Ion 95.90 (95.60 to 96.60): VX0

Ion 60.90 (60.60 to 61.60): VX0

Ion 97.90 (97.60 to 98.60): VX0





#28

Bromochloromethane

Concen: 0.51 ug/l

RT: 5.22 min Scan# 760

Delta R.T. 0.20 min

Lab File: VX003538.D

Acq: 21 Jul 2018 04:54

Instrument :

MSVOA_X

ClientSampleId :

RE104D2-071318

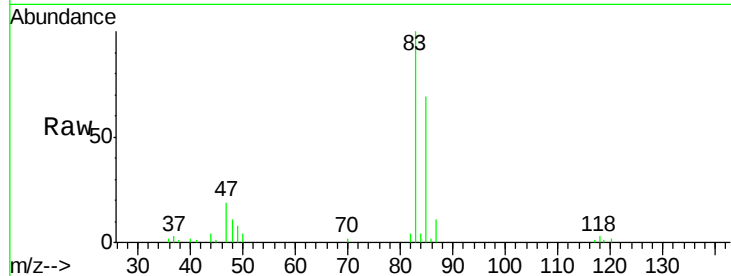
Tot Ion: 49 Resp: 1349

Ion Ratio Lower Upper

49 100

129 0.0 0.0 4.2

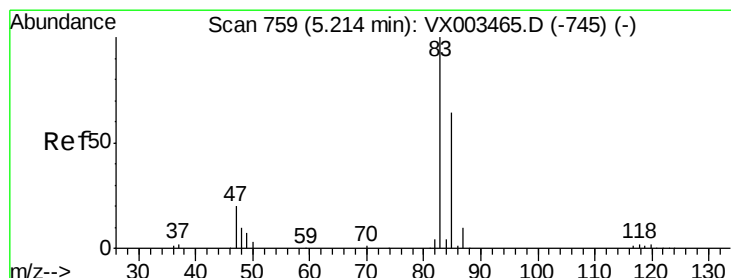
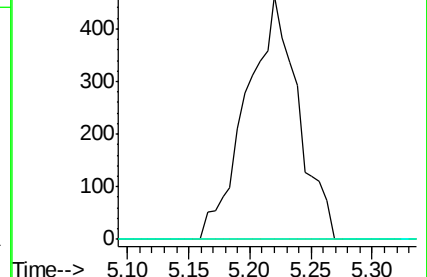
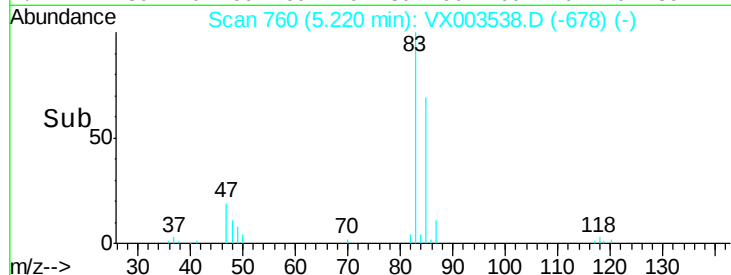
130 0.0 61.2 91.8#



Abundance Ion 48.90 (48.60 to 49.60): VX0

Ion 128.80 (128.50 to 129.50): V

Ion 129.80 (129.50 to 130.50): V



#30

Chloroform

Concen: 3.11 ug/l

RT: 5.21 min Scan# 759

Delta R.T. 0.00 min

Lab File: VX003538.D

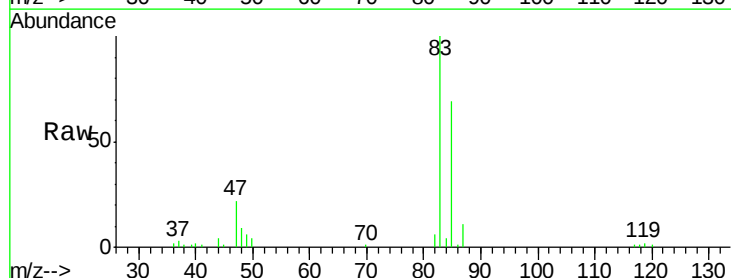
Acq: 21 Jul 2018 04:54

Tgt Ion: 83 Resp: 18384

Ion Ratio Lower Upper

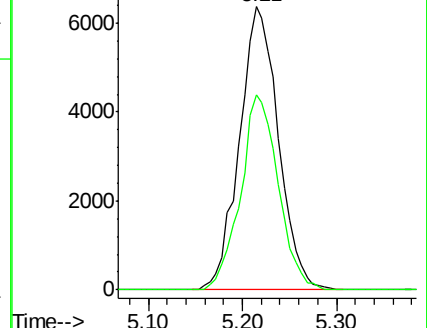
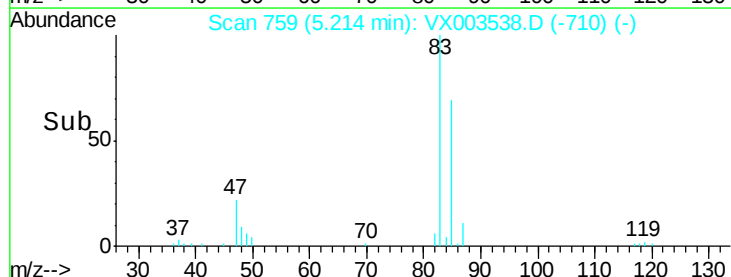
83 100

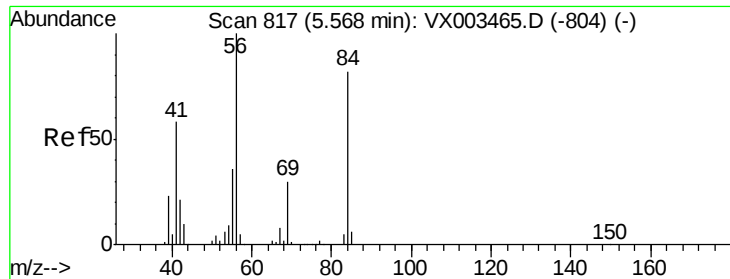
85 68.7 50.4 75.6



Abundance Ion 82.90 (82.60 to 83.60): VX0

Ion 84.90 (84.60 to 85.60): VX0

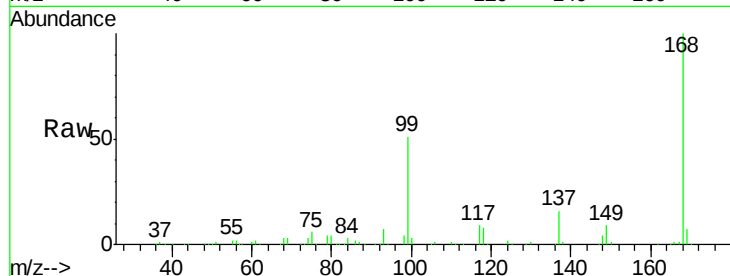




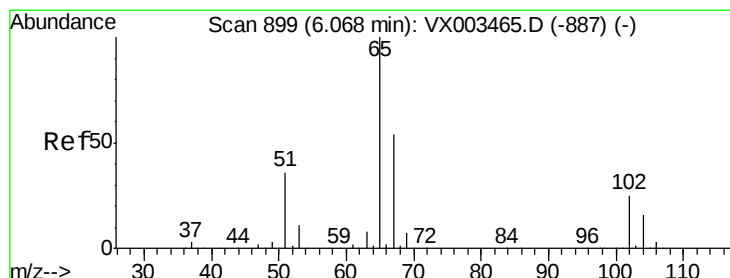
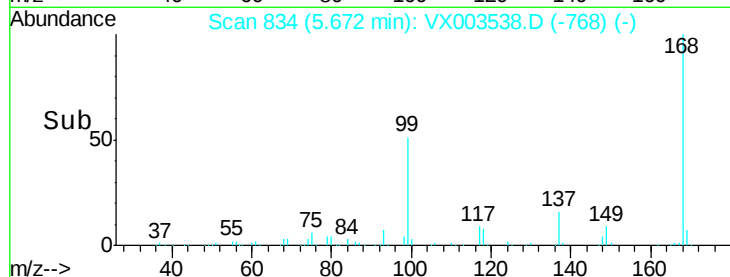
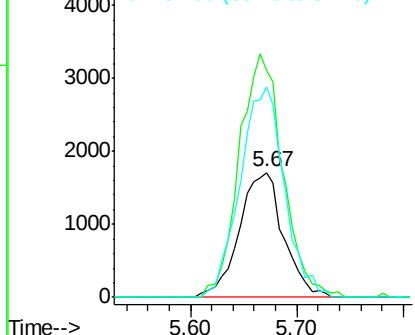
#31
Cyclohexane
Concen: 0.92 ug/l
RT: 5.67 min Scan# 834
Delta R.T. 0.10 min
Lab File: VX003538.D
Acq: 21 Jul 2018 04:54

Instrument :
MSVOA_X
ClientSampleId :
RE104D2-071318

Tot Ion: 56 Resp: 4984
Ion Ratio Lower Upper
56 100
69 181.9 23.7 35.5#
84 168.4 64.1 96.1#

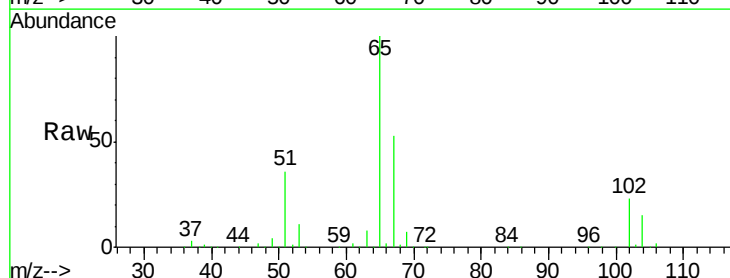


Abundance Ion 56.00 (55.70 to 56.70): VX0
Ion 69.00 (68.70 to 69.70): VX0
Ion 84.00 (83.70 to 84.70): VX0

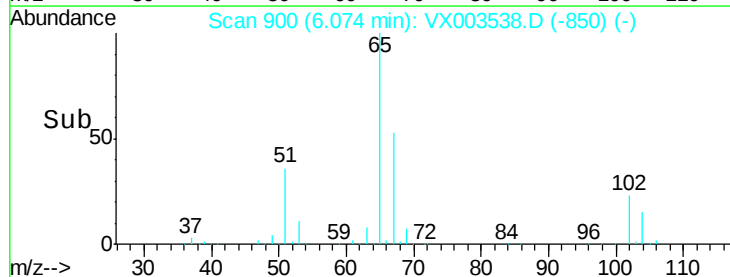
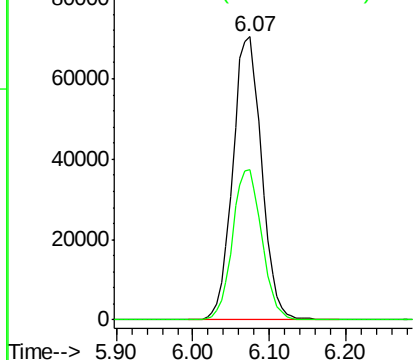


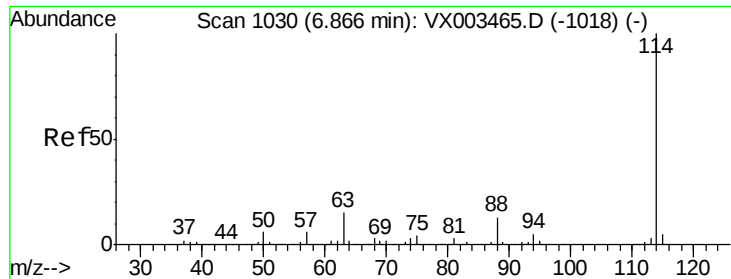
#33
1,2-Dichloroethane-d4
Concen: 51.42 ug/l
RT: 6.07 min Scan# 900
Delta R.T. 0.01 min
Lab File: VX003538.D
Acq: 21 Jul 2018 04:54

Tgt Ion: 65 Resp: 184453
Ion Ratio Lower Upper
65 100
67 53.7 0.0 102.6



Abundance Ion 64.90 (64.60 to 65.60): VX0
Ion 66.90 (66.60 to 67.60): VX0

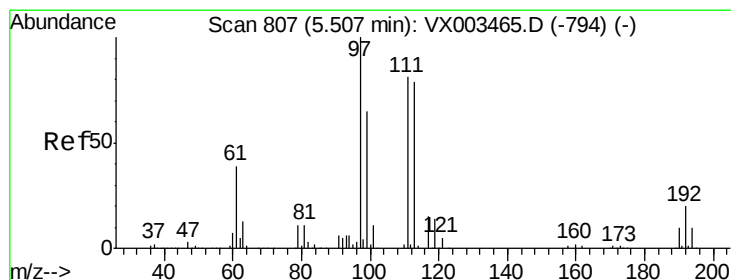
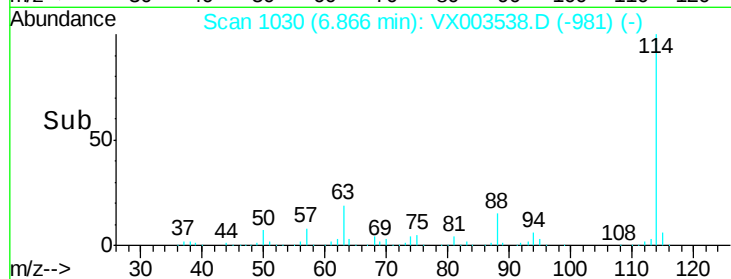
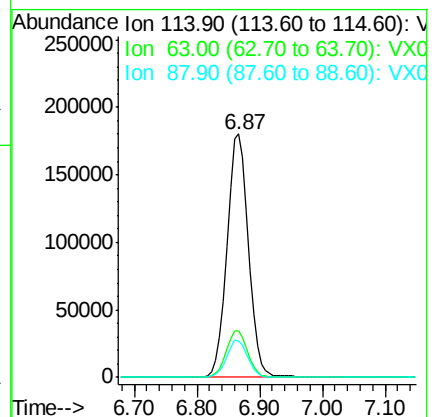
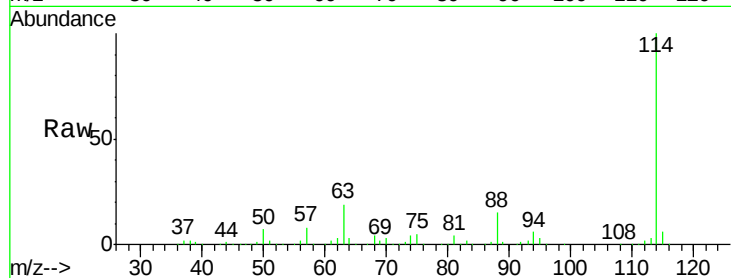




#34
 1,4-Difluorobenzene
 Concen: 50.00 ug/l
 RT: 6.87 min Scan# 1030
 Delta R.T. 0.00 min
 Lab File: VX003538.D
 Acq: 21 Jul 2018 04:54

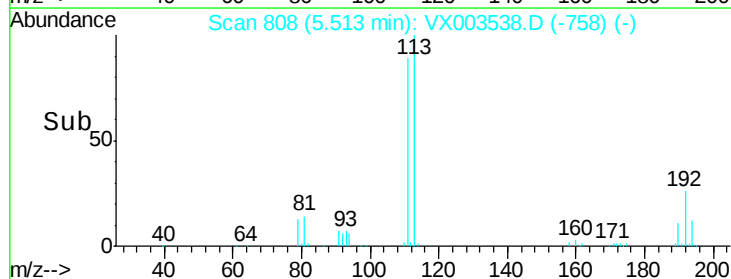
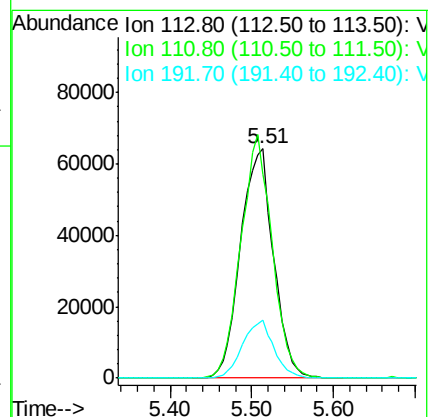
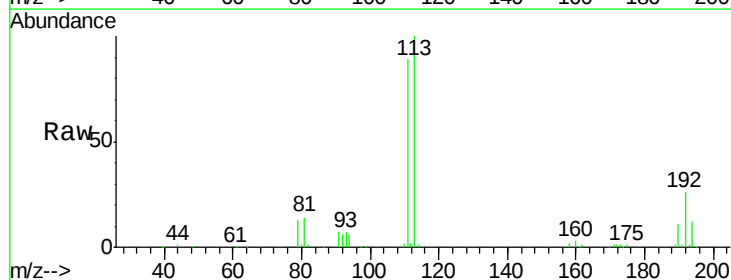
Instrument :
 MSVOA_X
 ClientSampleId :
 RE104D2-071318

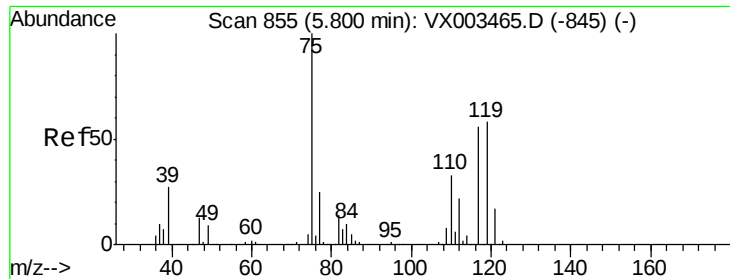
Tot Ion:114 Resp: 426199
 Ion Ratio Lower Upper
 114 100
 63 19.0 0.0 41.4
 88 15.0 0.0 30.0



#35
 Dibromofluoromethane
 Concen: 55.43 ug/l
 RT: 5.51 min Scan# 808
 Delta R.T. 0.01 min
 Lab File: VX003538.D
 Acq: 21 Jul 2018 04:54

Tgt Ion:113 Resp: 179942
 Ion Ratio Lower Upper
 113 100
 111 101.1 81.4 122.0
 192 23.9 19.1 28.7

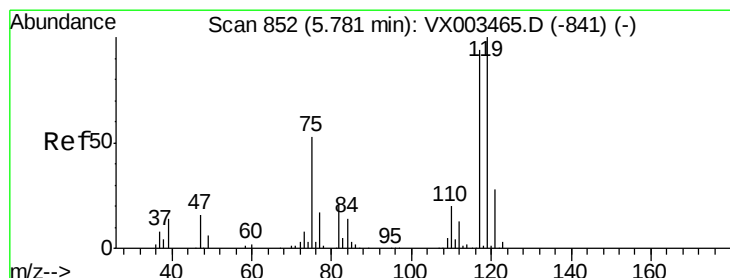
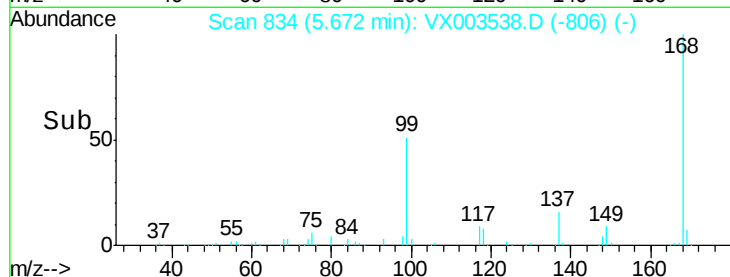
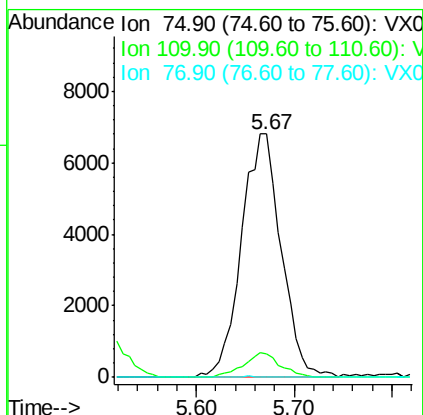
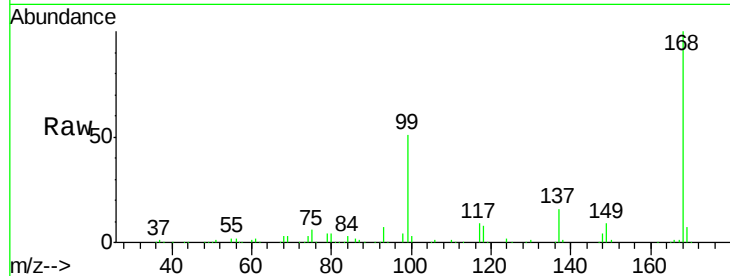




#36
 1,1-Dichloropropene
 Concen: 4.16 ug/l
 RT: 5.67 min Scan# 834
 Delta R.T. -0.13 min
 Lab File: VX003538.D
 Acq: 21 Jul 2018 04:54

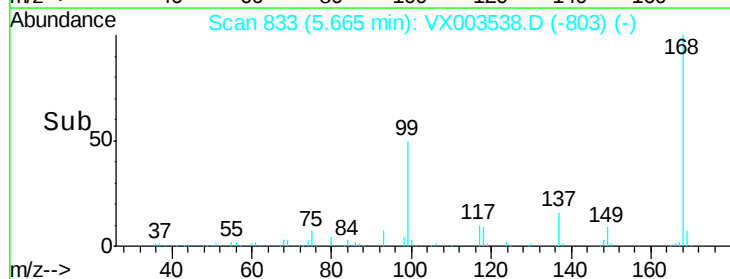
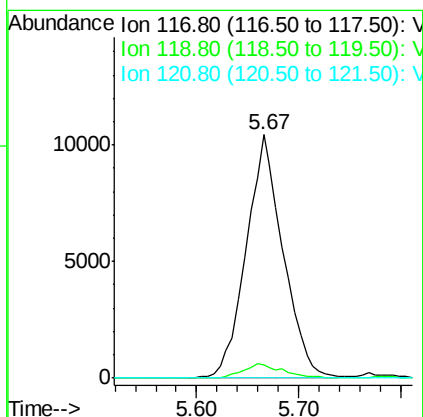
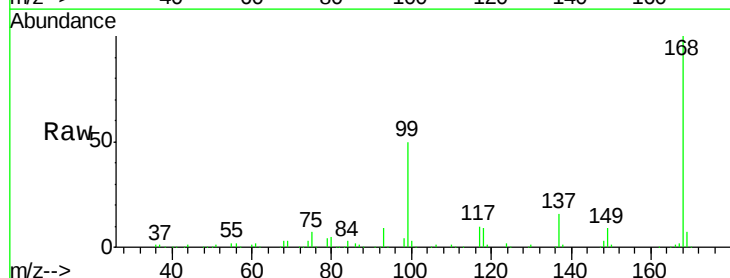
Instrument :
 MSVOA_X
 ClientSampleId :
 RE104D2-071318

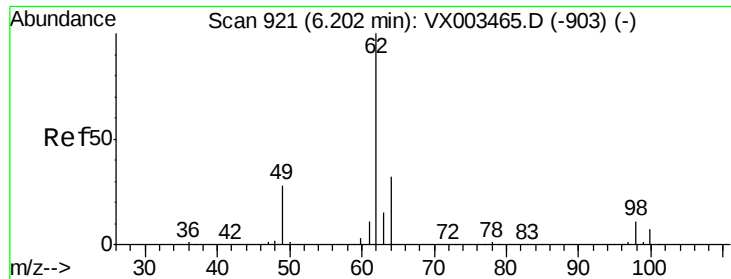
Tot Ion	Ratio	Lower	Upper
75	100		
110	9.4	18.1	54.4#
77	0.1	24.3	36.5#



#38
 Carbon Tetrachloride
 Concen: 5.81 ug/l
 RT: 5.67 min Scan# 833
 Delta R.T. -0.12 min
 Lab File: VX003538.D
 Acq: 21 Jul 2018 04:54

Tgt Ion	Ratio	Lower	Upper
117	100		
119	5.2	77.4	116.0#
121	0.0	24.4	36.6#

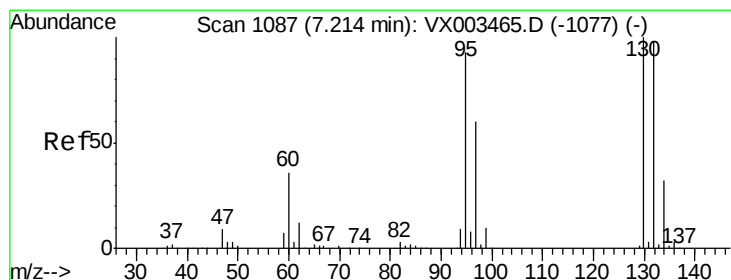
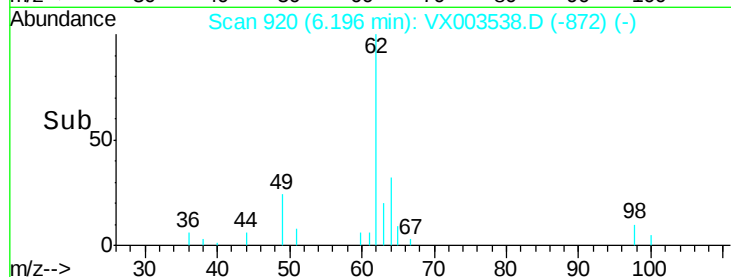
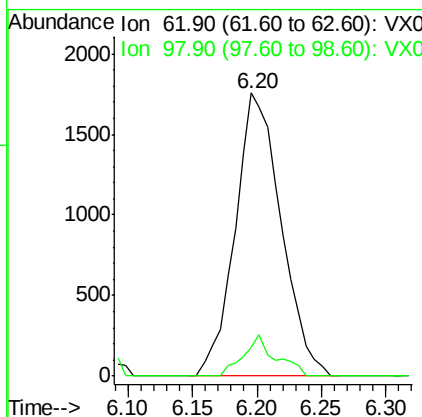
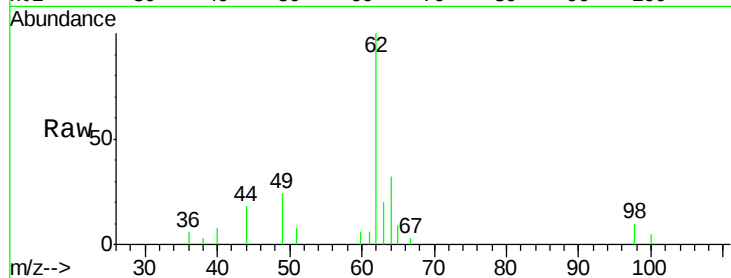




#42
1,2-Dichloroethane
Concen: 0.99 ug/l
RT: 6.20 min Scan# 920
Delta R.T. -0.01 min
Lab File: VX003538.D
Acq: 21 Jul 2018 04:54

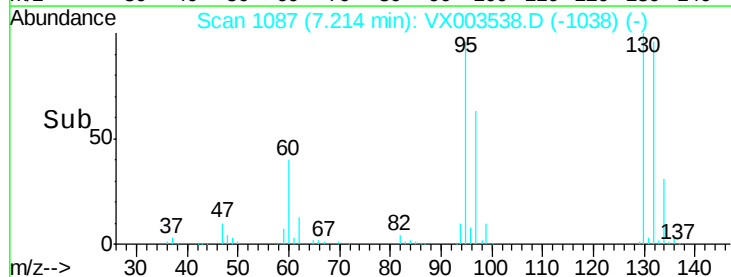
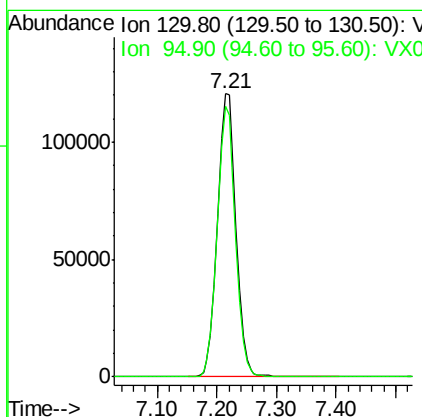
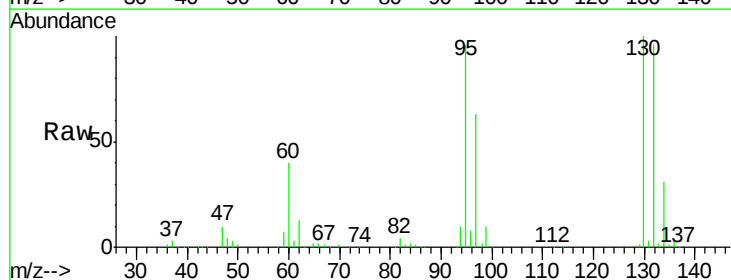
Instrument :
MSVOA_X
ClientSampleId :
RE104D2-071318

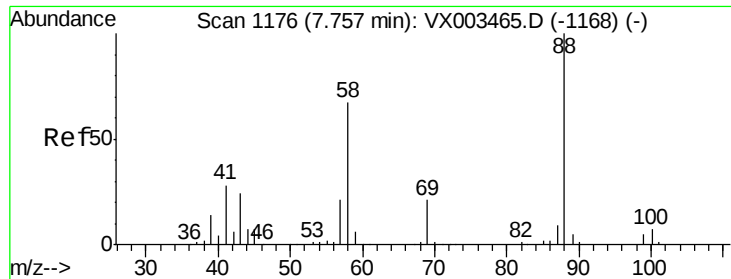
Tot Ion: 62 Resp: 4333
Ion Ratio Lower Upper
62 100
98 10.2 0.0 16.6



#44
Trichloroethene
Concen: 62.82 ug/l
RT: 7.21 min Scan# 1087
Delta R.T. 0.00 min
Lab File: VX003538.D
Acq: 21 Jul 2018 04:54

Tgt Ion:130 Resp: 260298
Ion Ratio Lower Upper
130 100
95 95.7 0.0 185.4





#49

1,4-Dioxane

Concen: 2.78 ug/l

RT: 7.77 min Scan# 1178

Delta R.T. 0.01 min

Lab File: VX003538.D

Acq: 21 Jul 2018 04:54

Instrument :

MSVOA_X

ClientSampleId :

RE104D2-071318

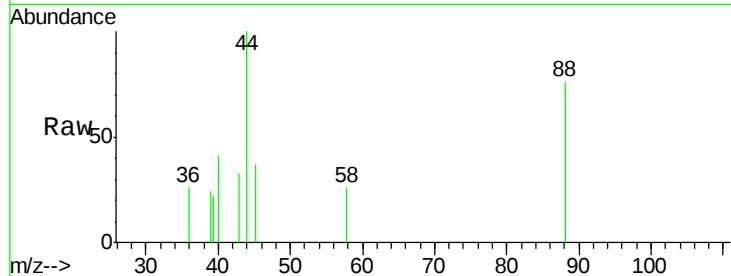
Tot Ion: 88 Resp: 220

Ion Ratio Lower Upper

88 100

43 92.3 29.8 44.6#

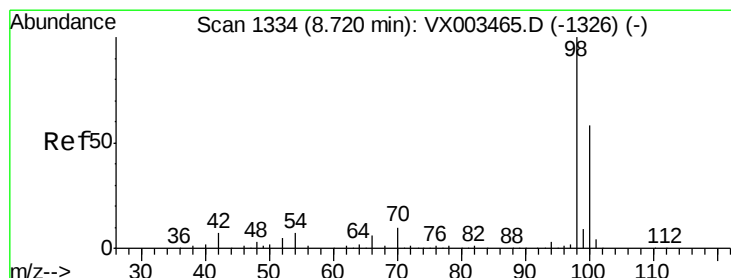
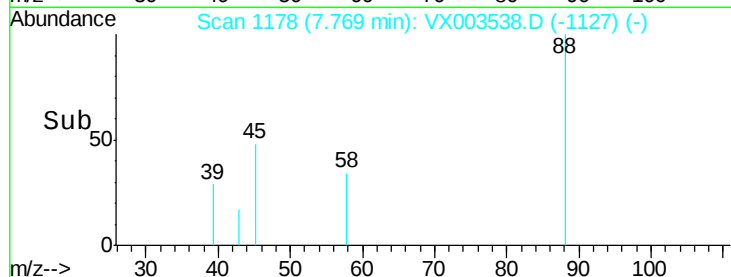
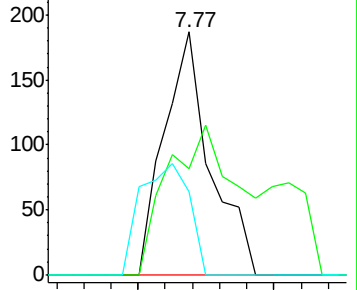
58 48.2 57.1 85.7#



Abundance Ion 88.00 (87.70 to 88.70): VX0

Ion 43.00 (42.70 to 43.70): VX0

Ion 58.00 (57.70 to 58.70): VX0



#50

Toluene-d8

Concen: 49.44 ug/l

RT: 8.72 min Scan# 1334

Delta R.T. 0.00 min

Lab File: VX003538.D

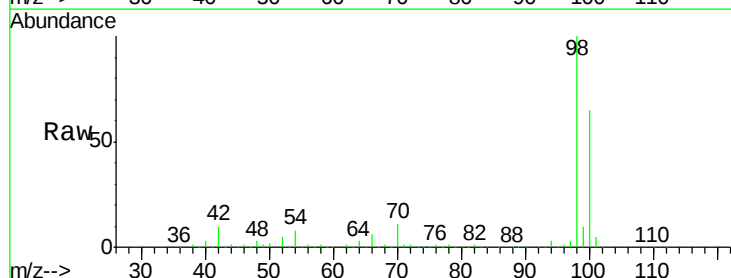
Acq: 21 Jul 2018 04:54

Tgt Ion: 98 Resp: 603274

Ion Ratio Lower Upper

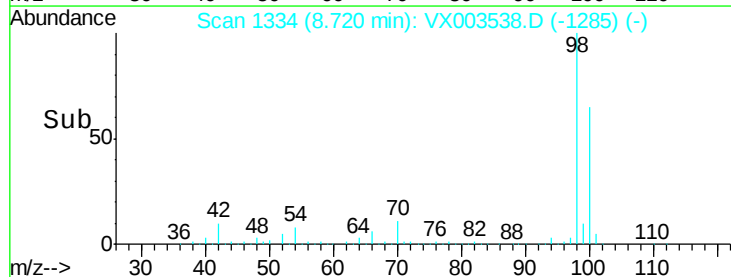
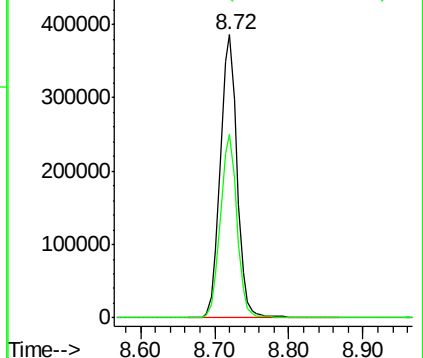
98 100

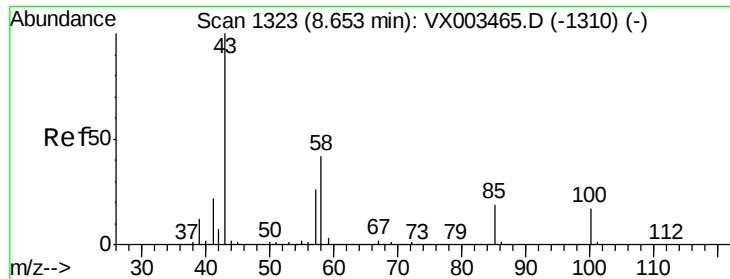
100 64.2 50.9 76.3



Abundance Ion 98.00 (97.70 to 98.70): VX0

Ion 100.00 (99.70 to 100.70): VX0





#51

4-Methyl-2-Pentanone

Concen: 0.56 ug/l

RT: 8.71 min Scan# 1333

Delta R.T. 0.06 min

Lab File: VX003538.D

Acq: 21 Jul 2018 04:54

Instrument :

MSVOA_X

ClientSampleId :

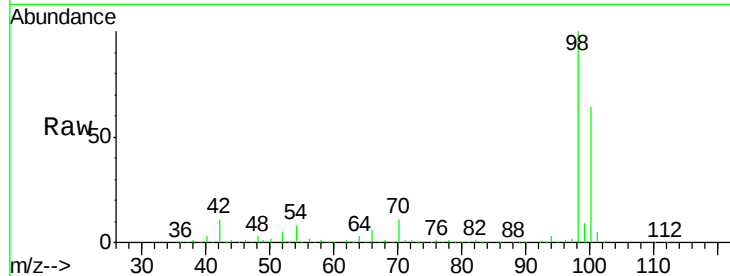
RE104D2-071318

Tot Ion: 43 Resp: 2469

Ion Ratio Lower Upper

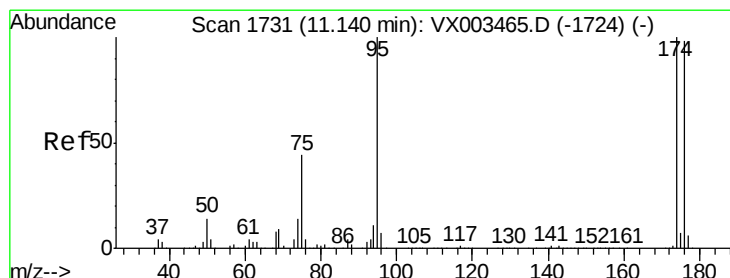
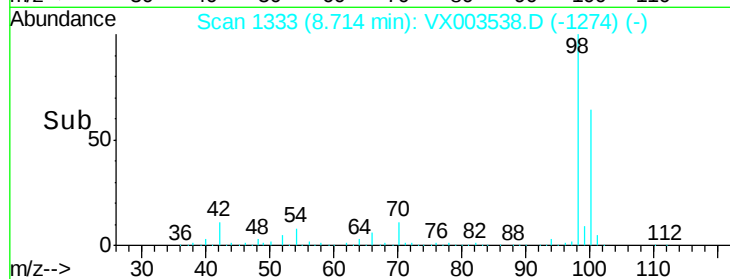
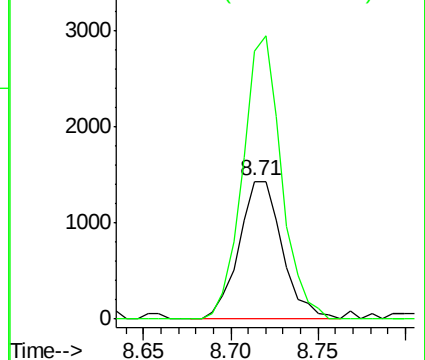
43 100

58 182.9 28.6 42.8#



Abundance Ion 43.00 (42.70 to 43.70): VX0

Ion 58.00 (57.70 to 58.70): VX0



#62

4-Bromofluorobenzene

Concen: 46.01 ug/l

RT: 11.14 min Scan# 1731

Delta R.T. 0.00 min

Lab File: VX003538.D

Acq: 21 Jul 2018 04:54

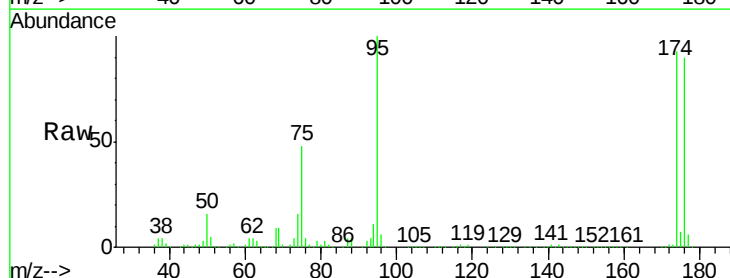
Tgt Ion: 95 Resp: 204887

Ion Ratio Lower Upper

95 100

174 95.3 0.0 187.4

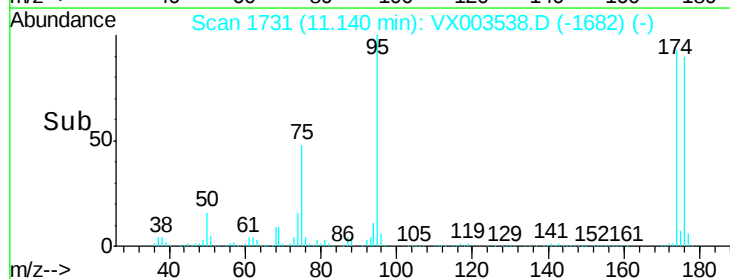
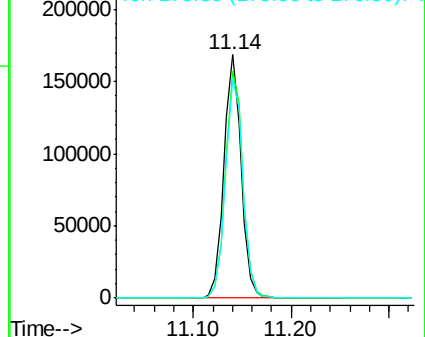
176 92.1 0.0 181.0

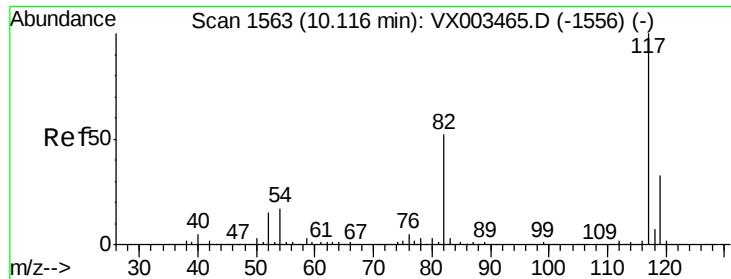


Abundance Ion 94.90 (94.60 to 95.60): VX0

Ion 173.80 (173.50 to 174.50): V

Ion 175.80 (175.50 to 176.50): V

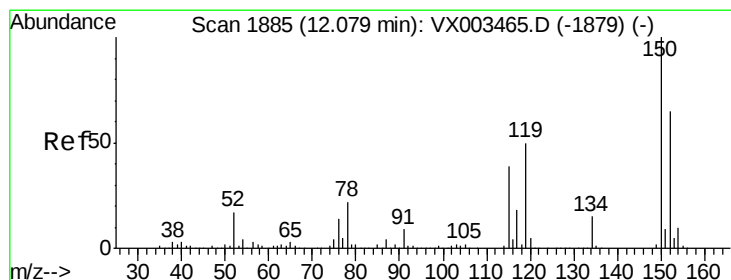
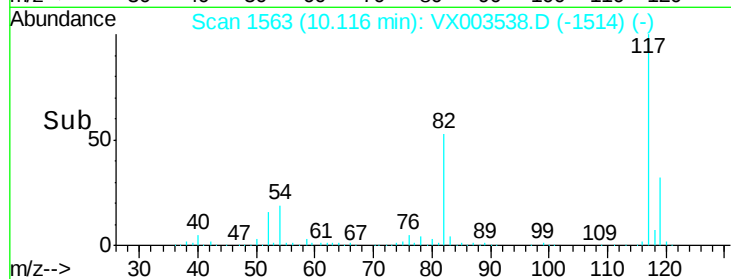
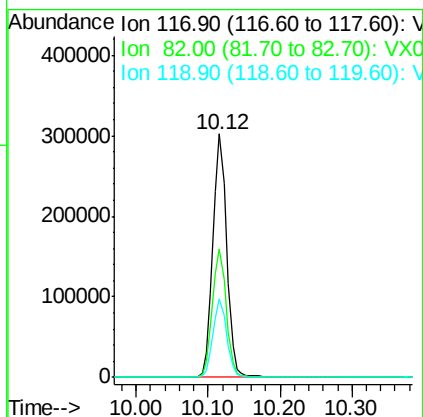
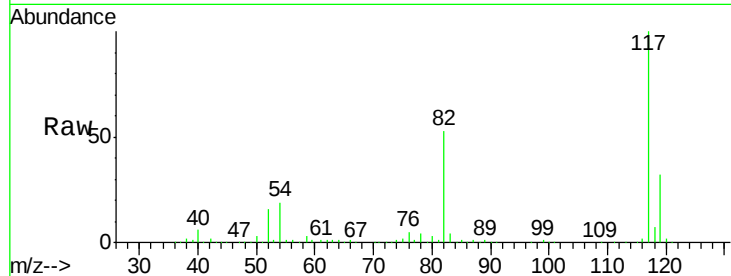




#63
Chlorobenzene-d5
Concen: 50.00 ug/l
RT: 10.12 min Scan# 1563
Delta R.T. 0.00 min
Lab File: VX003538.D
Acq: 21 Jul 2018 04:54

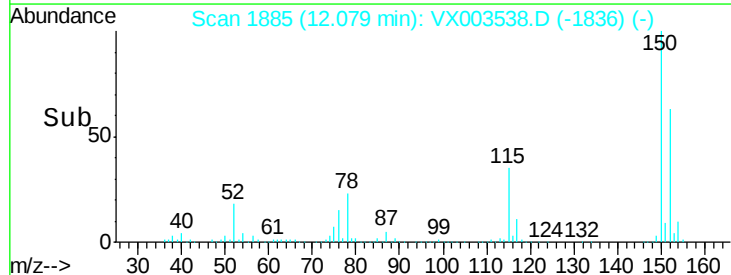
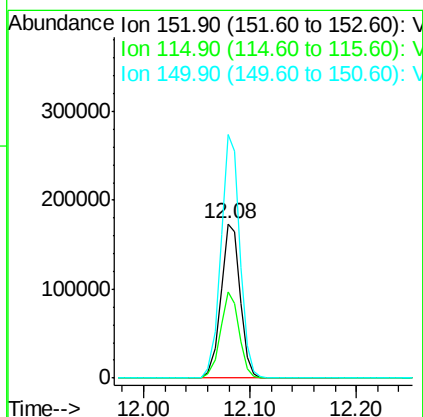
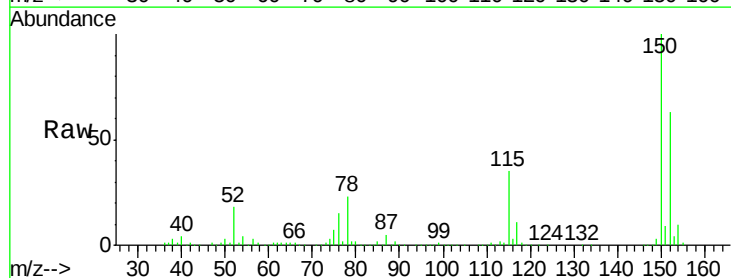
Instrument :
MSVOA_X
ClientSampleId :
RE104D2-071318

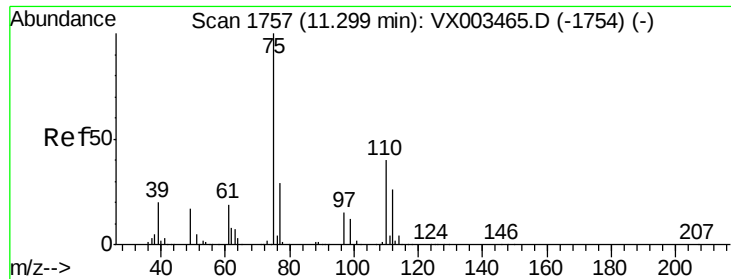
Tot Ion:117 Resp: 401359
Ion Ratio Lower Upper
117 100
82 52.8 45.0 67.4
119 32.1 25.8 38.6



#72
1,4-Dichlorobenzene-d4
Concen: 50.00 ug/l
RT: 12.08 min Scan# 1885
Delta R.T. 0.00 min
Lab File: VX003538.D
Acq: 21 Jul 2018 04:54

Tgt Ion:152 Resp: 217942
Ion Ratio Lower Upper
152 100
115 54.1 40.1 120.2
150 155.7 0.0 347.2





#76

1,2,3-Trichloropropane

Concen: 24.91 ug/l

RT: 11.14 min Scan# 1731

Delta R.T. -0.16 min

Lab File: VX003538.D

Acq: 21 Jul 2018 04:54

Instrument :

MSVOA_X

ClientSampleId :

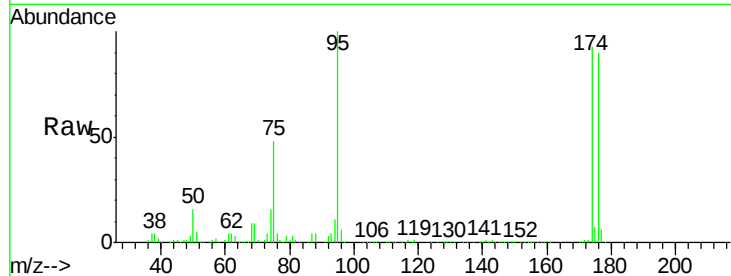
RE104D2-071318

Tot Ion: 75 Resp: 97531

Ion Ratio Lower Upper

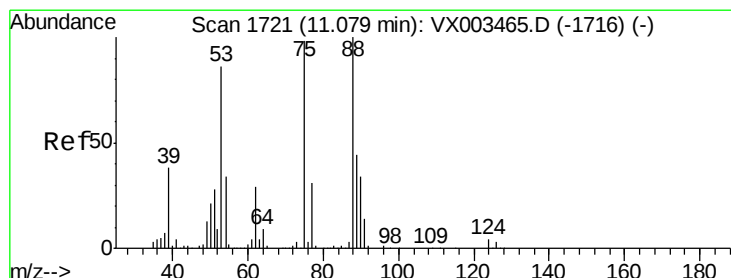
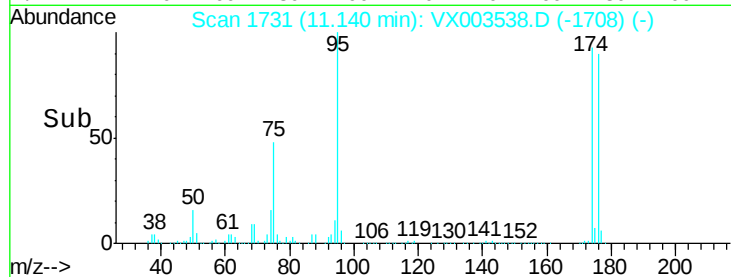
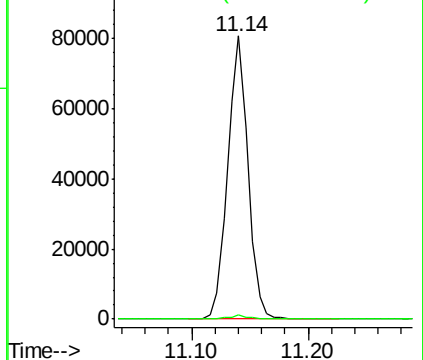
75 100

77 1.3 22.8 68.3#



Abundance Ion 74.90 (74.60 to 75.60): VX0

Ion 77.00 (76.70 to 77.70): VX0



#81

trans-1,4-Dichloro-2-butene

Concen: 69.77 ug/l

RT: 11.14 min Scan# 1731

Delta R.T. 0.06 min

Lab File: VX003538.D

Acq: 21 Jul 2018 04:54

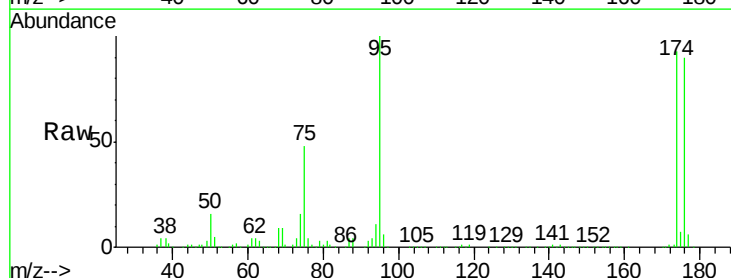
Tgt Ion: 75 Resp: 97531

Ion Ratio Lower Upper

75 100

53 0.2 86.8 130.2#

89 0.0 38.2 57.2#



Abundance Ion 74.90 (74.60 to 75.60): VX0

Ion 53.00 (52.70 to 53.70): VX0

Ion 88.90 (88.60 to 89.60): VX0

