

Data Path : Z:\HPCHEM1\BNA_E\DATA\BE013015\
 Data File : BE089491.D
 Acq On : 1 Feb 2015 8:22
 Operator : TP/IZ
 Sample : MDL-06-S
 Misc : MDL-SOIL-0.2/0.4
 ALS Vial : 53 Sample Multiplier: 1

Instrument :
 BNA_E
 ClientSampleId :

Quant Time: Feb 02 04:12:22 2015
 Quant Method : Z:\HPCHEM1\BNA_E\METHODS\SIMPAH-BE013015.M
 Quant Title : ASP BNA STANDARDS FOR 5 POINT CALIBRATION
 QLast Update : Sat Jan 31 05:05:18 2015
 Response via : Initial Calibration

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) 1,4-Dichlorobenzene-d4	9.58	152	66391	5.00	ng	0.00
2) Naphthalene-d8	12.49	136	275469	5.00	ng	-0.01
6) Acenaphthene-d10	16.69	164	144775	5.00	ng	-0.01
11) Phenanthrene-d10	19.99	188	229148	5.00	ng	0.00
16) Chrysene-d12	23.84	240	175143	5.00	ng	0.00
22) Perylene-d12	25.55	264	151678	5.00	ng	0.00

System Monitoring Compounds						
3) Nitrobenzene-d5	10.85	82	179260	9.83	ng	0.00
7) 2-Fluorobiphenyl	15.13	172	319544	8.38	ng	0.00
18) Terphenyl-d14	22.48	244	278732	10.63	ng	0.00

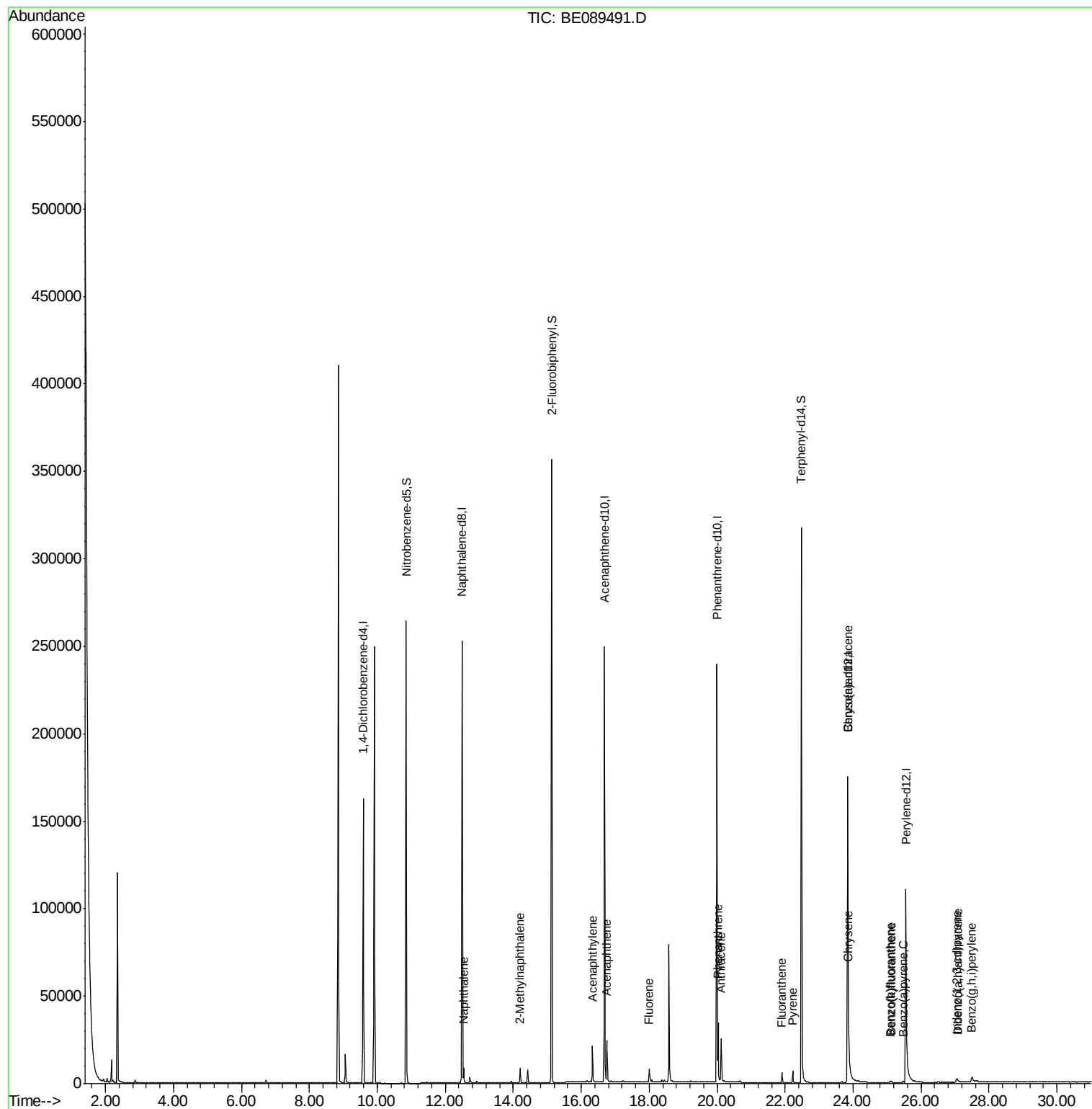
Target Compounds						Qvalue
4) Naphthalene	12.54	128	9077	0.14	ng	99
5) 2-Methylnaphthalene	14.20	142	5354	0.14	ng	99
8) Acenaphthylene	16.33	152	28040	0.11	ng	99
9) Acenaphthene	16.75	154	4869	0.12	ng	96
10) Fluorene	18.00	166	5347	0.12	ng	99
12) Pentachlorophenol	19.65	266	114	Below Cal		89
13) Phenanthrene	20.03	178	33142	0.15	ng	98
14) Anthracene	20.12	178	24891	0.12	ng	100
15) Fluoranthene	21.91	202	5708	0.12	ng	98
17) Pyrene	22.22	202	6246	0.13	ng	99
19) Benzo(a)anthracene	23.83	228	15411	0.10	ng	96
20) Chrysene	23.86	228	26551	0.16	ng	# 97
21) Indeno(1,2,3-cd)pyrene	27.05	276	4300	0.03	ng	# 92
23) Benzo(b)fluoranthene	25.09	252	1081	0.22	ng	# 85
24) Benzo(k)fluoranthene	25.12	252	1824	0.05	ng	# 84
25) Benzo(a)pyrene	25.47	252	1096	0.16	ng	# 80
26) Dibenzo(a,h)anthracene	27.08	278	725	0.15	ng	# 76
27) Benzo(g,h,i)perylene	27.50	276	6310	0.05	ng	# 81

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

Data Path : Z:\HPCHEM1\BNA_E\DATA\BE013015\
Data File : BE089491.D
Acq On : 1 Feb 2015 8:22
Operator : TP/IZ
Sample : MDL-06-S
Misc : MDL-SOIL-0.2/0.4
ALS Vial : 53 Sample Multiplier: 1

Instrument :
BNA_E
ClientSampleId :

Quant Time: Feb 02 04:12:22 2015
Quant Method : Z:\HPCHEM1\BNA_E\METHODS\SIMPAH-BE013015.M
Quant Title : ASP BNA STANDARDS FOR 5 POINT CALIBRATION
QLast Update : Sat Jan 31 05:05:18 2015
Response via : Initial Calibration





#1

1,4-Dichlorobenzene-d4

Concen: 5.00 ng

RT: 9.58 min Scan# 1794

Delta R.T. -0.01 min

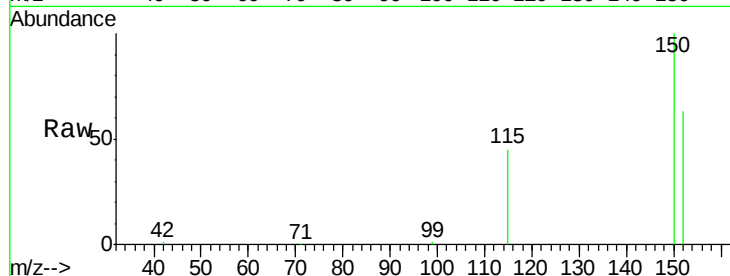
Lab File: BE089491.D

Acq: 1 Feb 2015 8:22

Instrument :

BNA_E

ClientSampled :



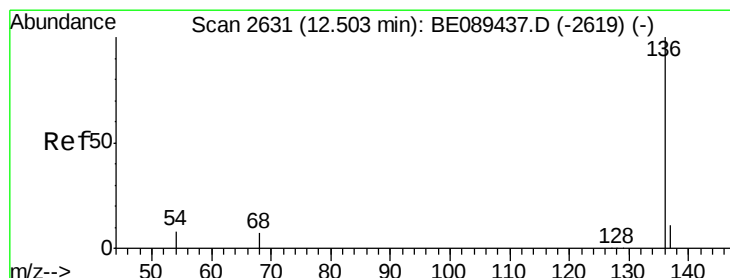
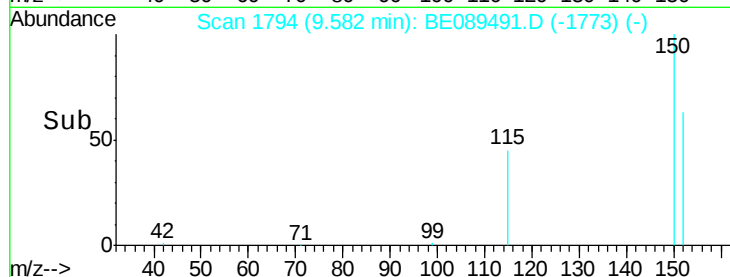
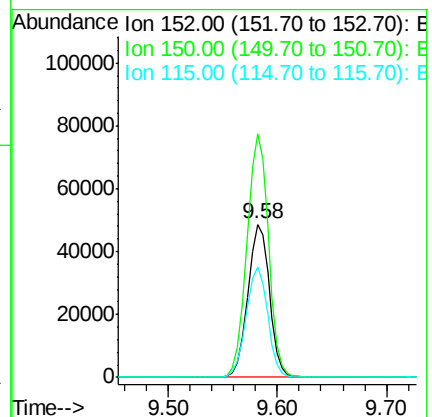
Tgt Ion:152 Resp: 66391

Ion Ratio Lower Upper

152 100

150 159.0 127.2 190.8

115 72.3 57.5 86.3



#2

Naphthalene-d8

Concen: 5.00 ng

RT: 12.49 min Scan# 2629

Delta R.T. -0.01 min

Lab File: BE089491.D

Acq: 1 Feb 2015 8:22

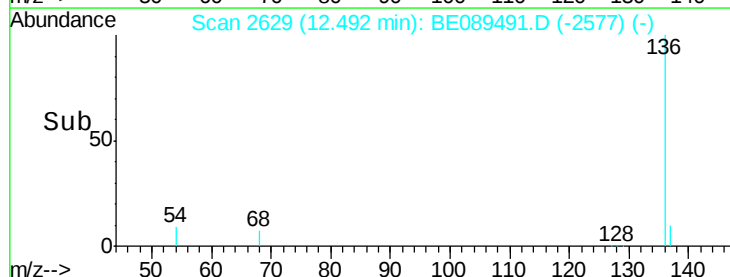
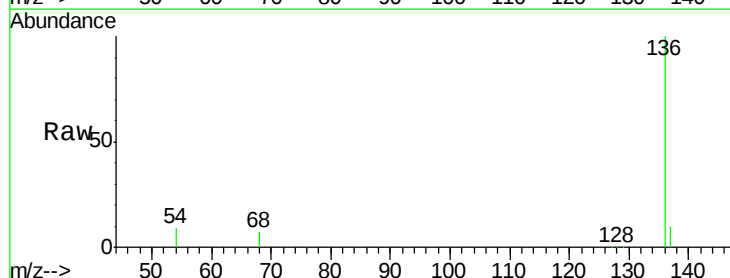
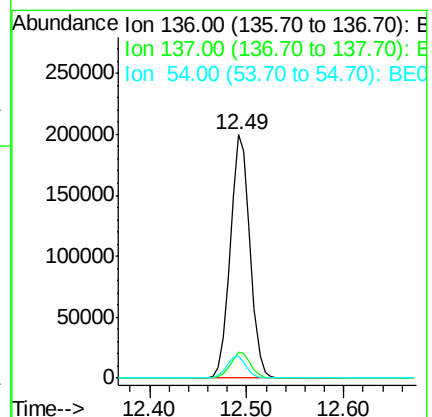
Tgt Ion:136 Resp: 275469

Ion Ratio Lower Upper

136 100

137 10.5 8.7 13.1

54 9.0 6.6 10.0





#3

Nitrobenzene-d5

Concen: 9.83 ng

RT: 10.85 min Scan# 2223

Delta R.T. -0.00 min

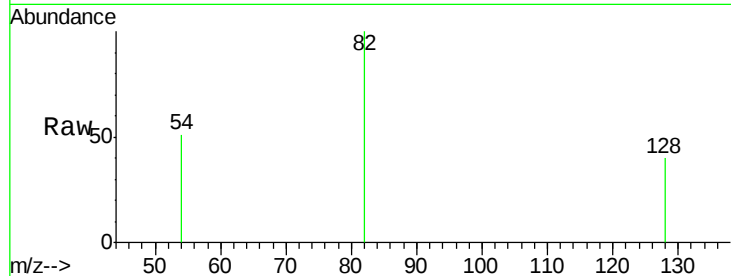
Lab File: BE089491.D

Acq: 1 Feb 2015 8:22

Instrument :

BNA_E

ClientSampleId :



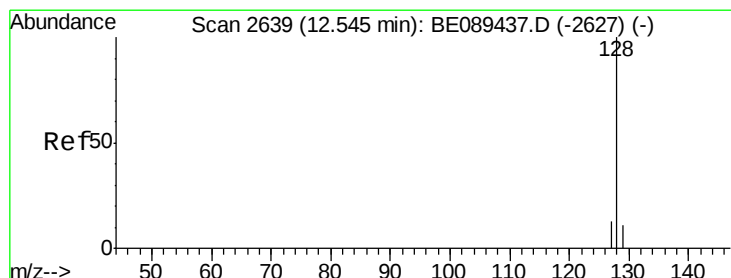
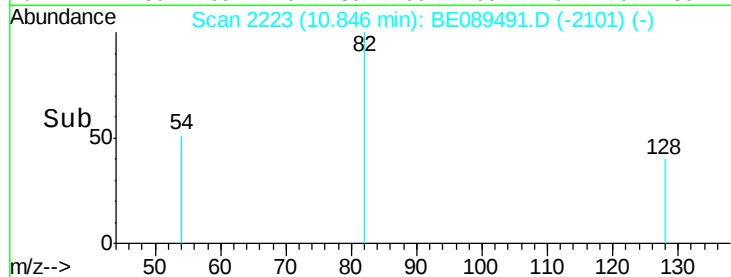
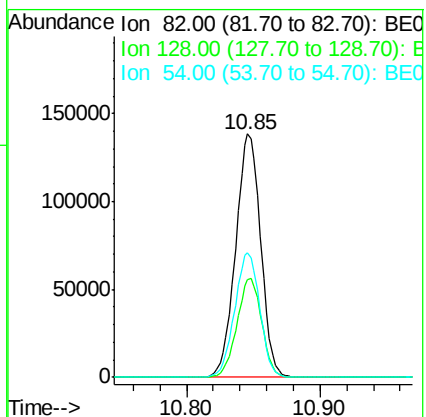
Tgt Ion: 82 Resp: 179260

Ion Ratio Lower Upper

82 100

128 40.1 31.2 46.8

54 51.1 41.9 62.9



#4

Naphthalene

Concen: 0.14 ng

RT: 12.54 min Scan# 2638

Delta R.T. -0.01 min

Lab File: BE089491.D

Acq: 1 Feb 2015 8:22

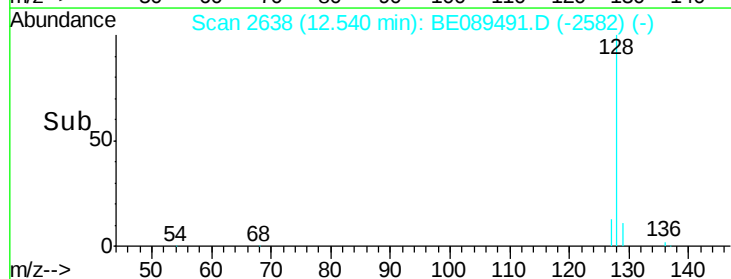
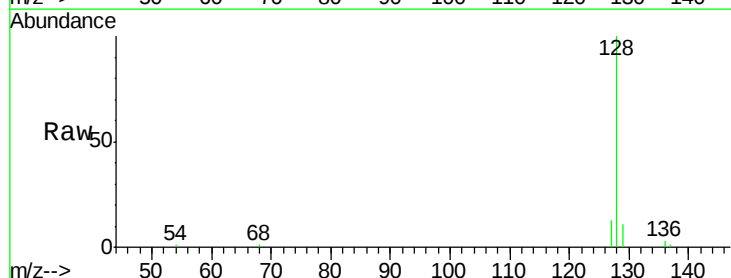
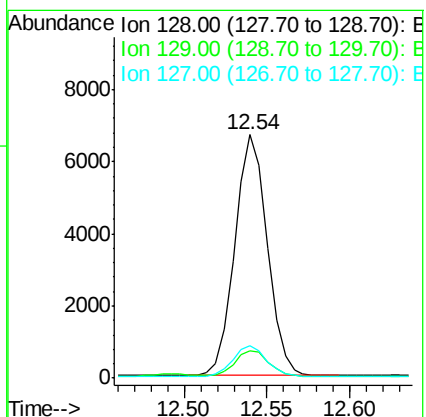
Tgt Ion: 128 Resp: 9077

Ion Ratio Lower Upper

128 100

129 11.4 8.8 13.2

127 13.3 10.6 16.0





#5

2-Methylnaphthalene

Concen: 0.14 ng

RT: 14.20 min Scan# 2976

Delta R.T. -0.00 min

Lab File: BE089491.D

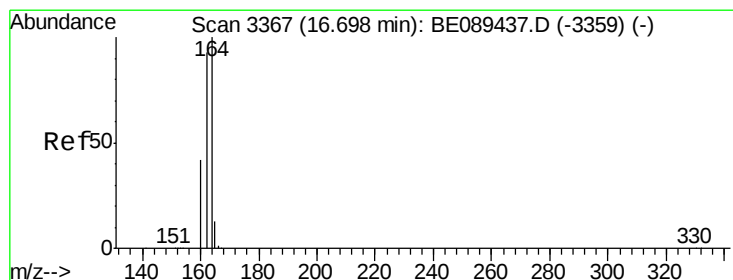
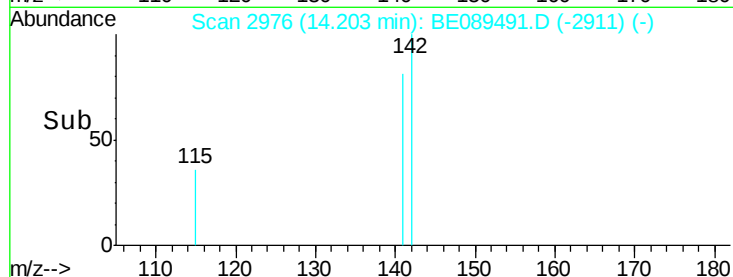
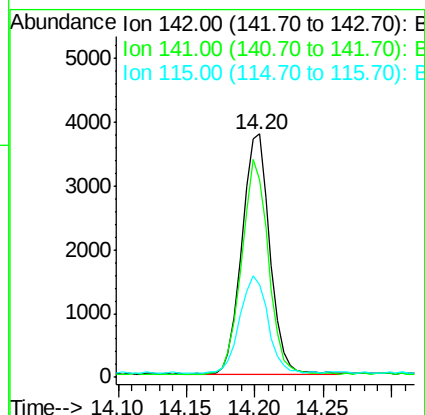
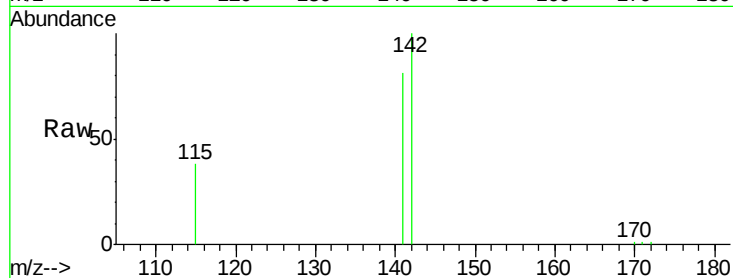
Acq: 1 Feb 2015 8:22

Instrument :

BNA_E

ClientSampleId :

Tgt Ion:	142	Resp:	5354
Ion Ratio	Lower	Upper	
142	100		
141	81.2	66.1	99.1
115	37.8	29.9	44.9



#6

Acenaphthene-d10

Concen: 5.00 ng

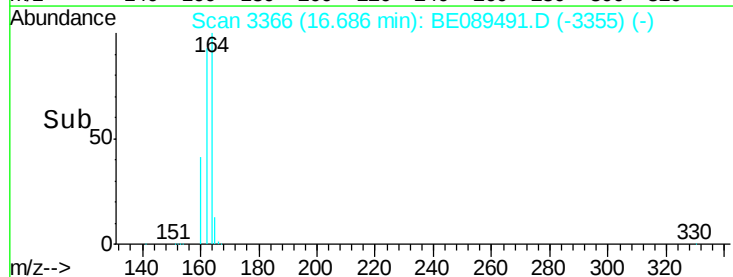
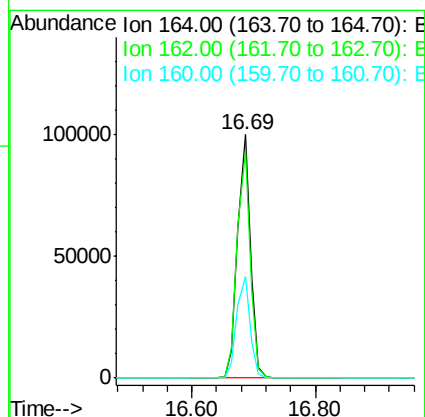
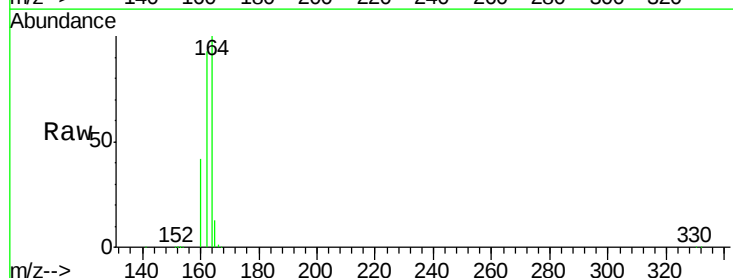
RT: 16.69 min Scan# 3366

Delta R.T. -0.01 min

Lab File: BE089491.D

Acq: 1 Feb 2015 8:22

Tgt Ion:	164	Resp:	144775
Ion Ratio	Lower	Upper	
164	100		
162	93.2	74.7	112.1
160	41.5	33.4	50.0





#7

2-Fluorobiphenyl

Concen: 8.38 ng

RT: 15.13 min Scan# 3180

Delta R.T. -0.00 min

Lab File: BE089491.D

Acq: 1 Feb 2015 8:22

Instrument :

BNA_E

ClientSampleId :

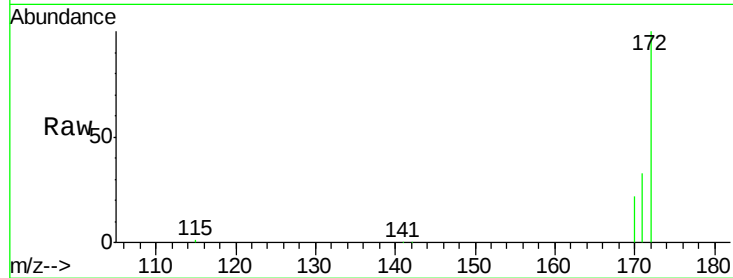
Tgt Ion:172 Resp: 319544

Ion Ratio Lower Upper

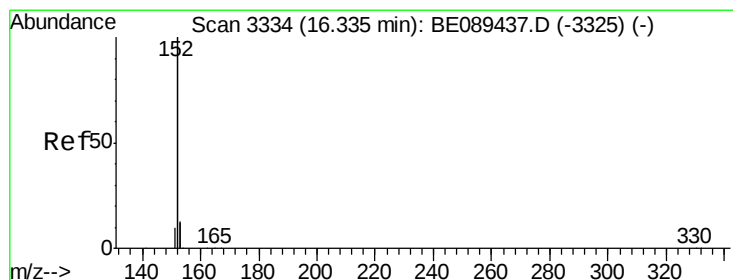
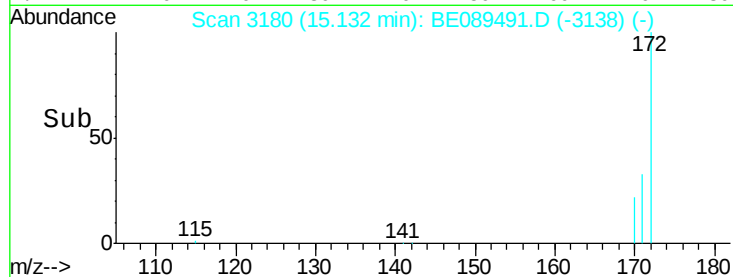
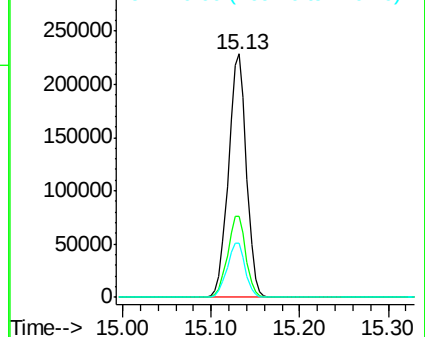
172 100

171 33.3 26.2 39.4

170 22.1 16.5 24.7



Abundance Ion 172.00 (171.70 to 172.70): E
Ion 171.00 (170.70 to 171.70): E
Ion 170.00 (169.70 to 170.70): E



#8

Acenaphthylene

Concen: 0.11 ng

RT: 16.33 min Scan# 3334

Delta R.T. -0.00 min

Lab File: BE089491.D

Acq: 1 Feb 2015 8:22

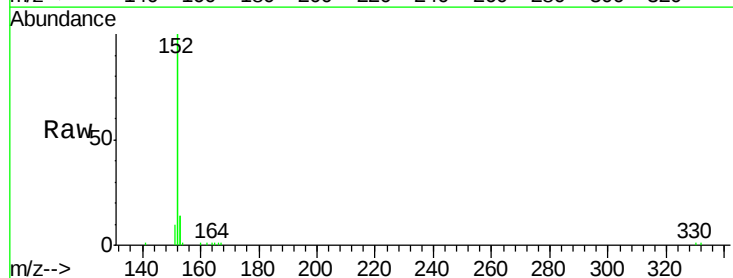
Tgt Ion:152 Resp: 28040

Ion Ratio Lower Upper

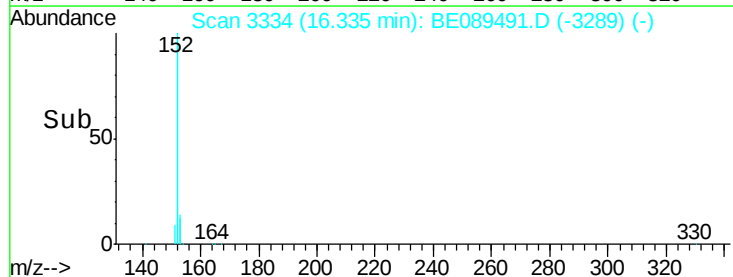
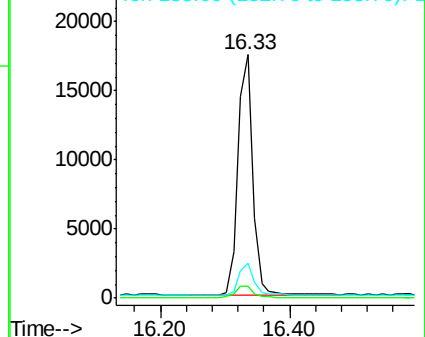
152 100

151 5.2 3.9 5.9

153 13.1 10.3 15.5



Abundance Ion 152.00 (151.70 to 152.70): E
Ion 151.00 (150.70 to 151.70): E
Ion 153.00 (152.70 to 153.70): E





#9

Acenaphthene

Concen: 0.12 ng

RT: 16.75 min Scan# 3372

Delta R.T. -0.01 min

Lab File: BE089491.D

Acq: 1 Feb 2015 8:22

Instrument :

BNA_E

ClientSampleId :

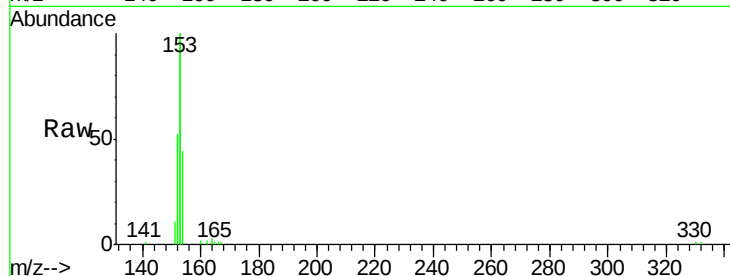
Tgt Ion:154 Resp: 4869

Ion Ratio Lower Upper

154 100

153 432.2 342.3 513.5

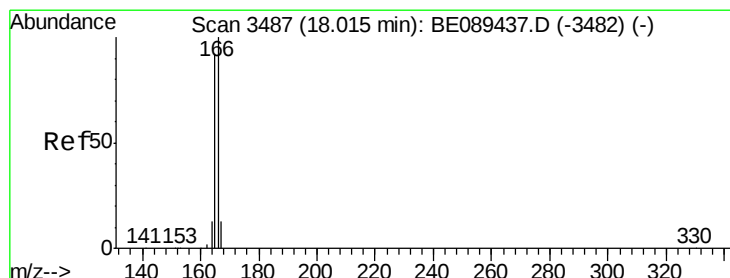
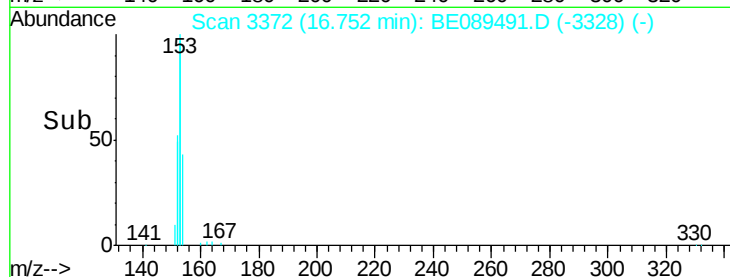
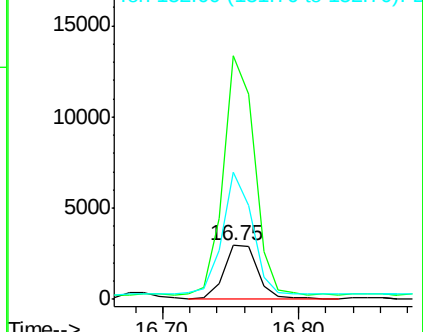
152 222.0 165.5 248.3



Abundance Ion 154.00 (153.70 to 154.70): E

Ion 153.00 (152.70 to 153.70): E

Ion 152.00 (151.70 to 152.70): E



#10

Fluorene

Concen: 0.12 ng

RT: 18.00 min Scan# 3486

Delta R.T. -0.01 min

Lab File: BE089491.D

Acq: 1 Feb 2015 8:22

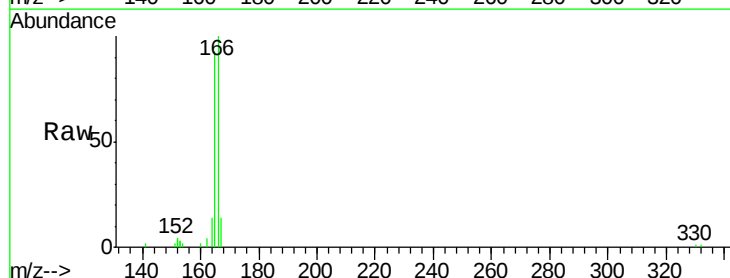
Tgt Ion:166 Resp: 5347

Ion Ratio Lower Upper

166 100

165 91.7 74.4 111.6

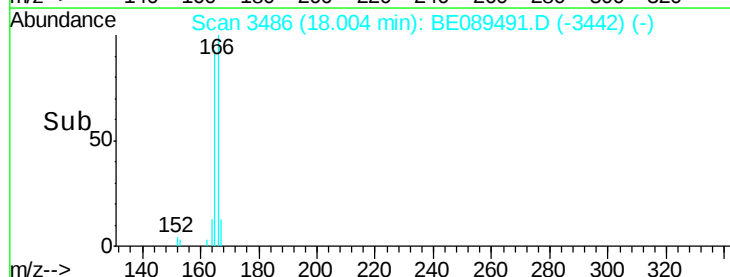
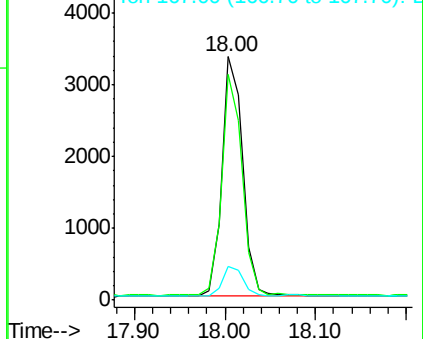
167 12.8 10.6 15.8



Abundance Ion 166.00 (165.70 to 166.70): E

Ion 165.00 (164.70 to 165.70): E

Ion 167.00 (166.70 to 167.70): E

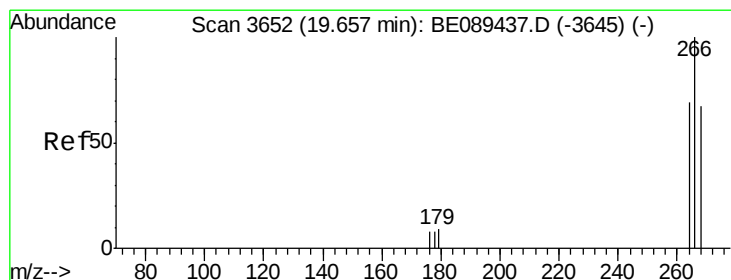
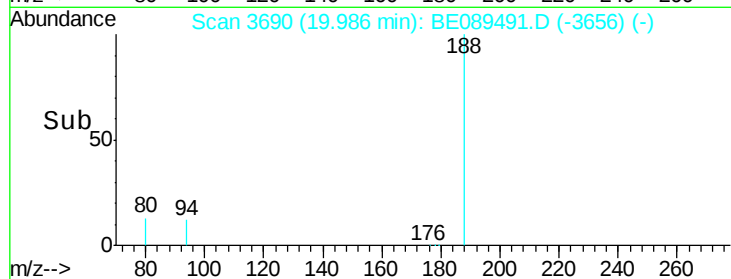
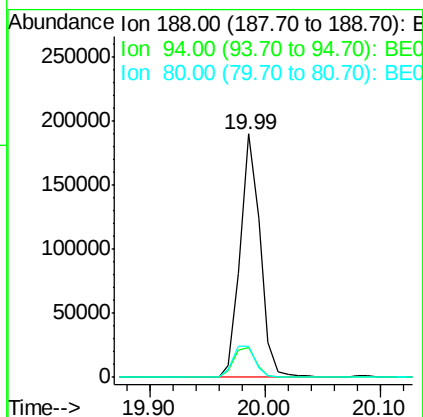
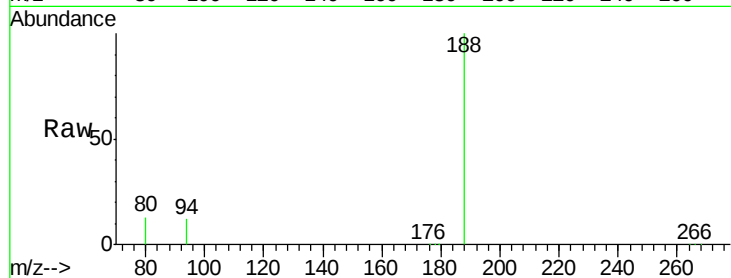




#11
Phenanthrene-d10
Concen: 5.00 ng
RT: 19.99 min Scan# 3690
Delta R.T. -0.01 min
Lab File: BE089491.D
Acq: 1 Feb 2015 8:22

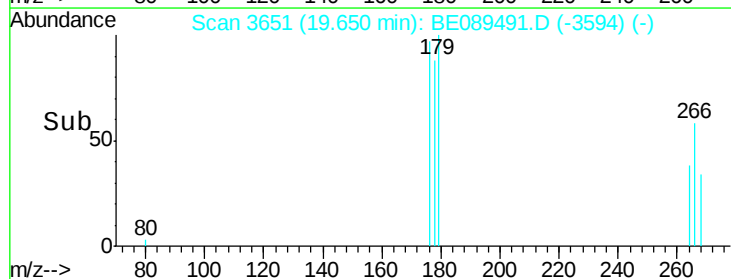
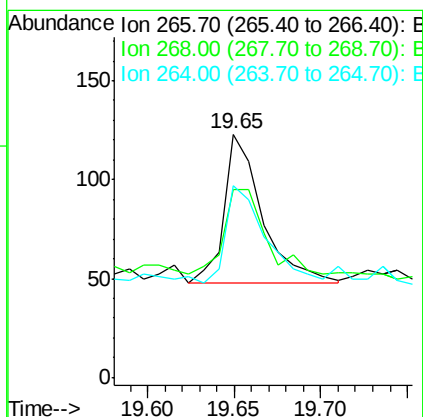
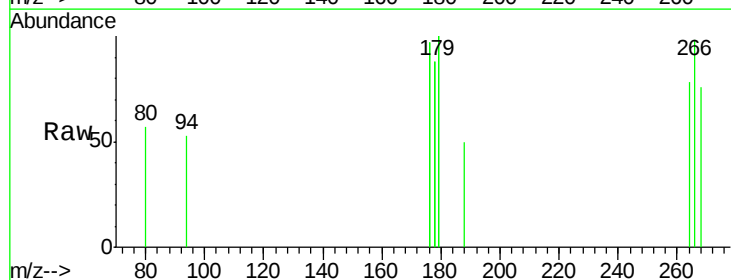
Instrument :
BNA_E
ClientSampled :

Tgt Ion	Ratio	Lower	Upper
188	100		
94	12.4	9.4	14.0
80	12.9	9.3	13.9



#12
Pentachlorophenol
Concen: Below Cal
RT: 19.65 min Scan# 3651
Delta R.T. -0.01 min
Lab File: BE089491.D
Acq: 1 Feb 2015 8:22

Tgt Ion	Ratio	Lower	Upper
266	100		
268	77.2	54.2	81.4
264	78.9	56.2	84.2

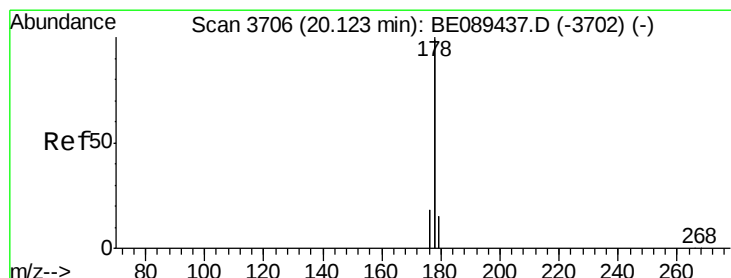
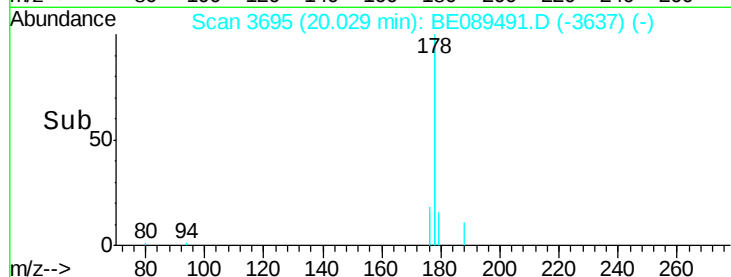
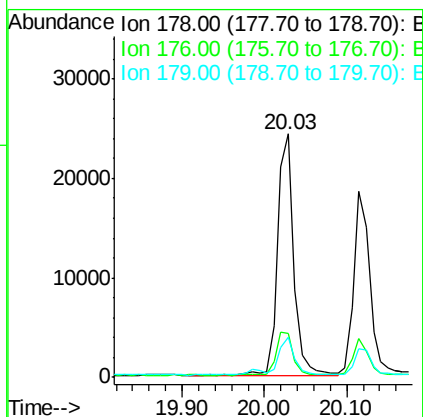
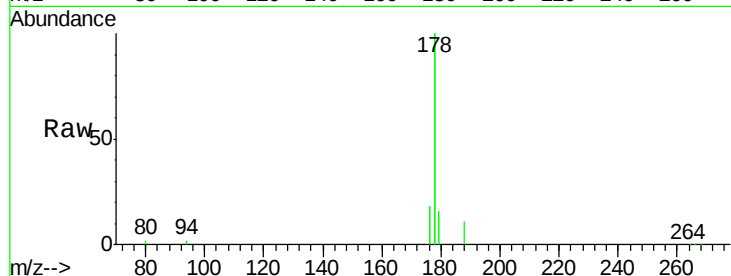




#13
Phenanthrene
Concen: 0.15 ng
RT: 20.03 min Scan# 3695
Delta R.T. 0.00 min
Lab File: BE089491.D
Acq: 1 Feb 2015 8:22

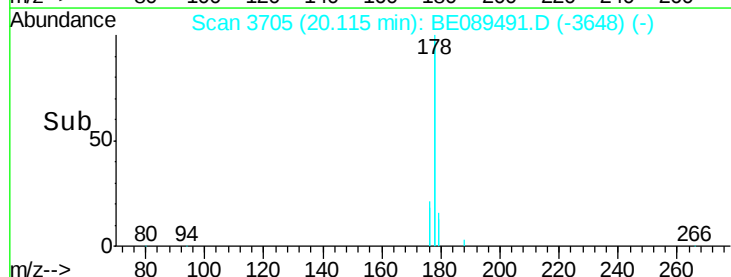
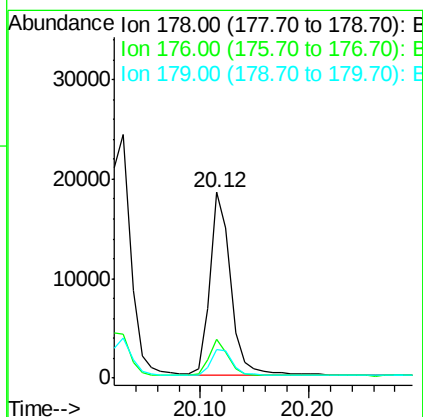
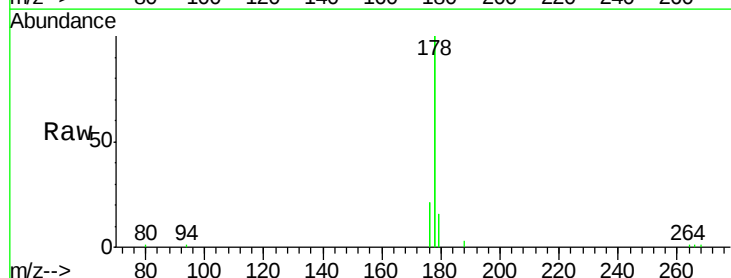
Instrument :
BNA_E
ClientSampleId :

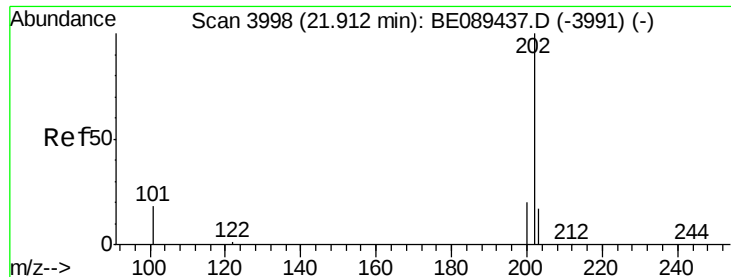
Tgt Ion:178 Resp: 33142
Ion Ratio Lower Upper
178 100
176 18.9 15.1 22.7
179 16.9 12.3 18.5



#14
Anthracene
Concen: 0.12 ng
RT: 20.12 min Scan# 3705
Delta R.T. -0.01 min
Lab File: BE089491.D
Acq: 1 Feb 2015 8:22

Tgt Ion:178 Resp: 24891
Ion Ratio Lower Upper
178 100
176 18.5 14.6 22.0
179 15.3 12.2 18.2

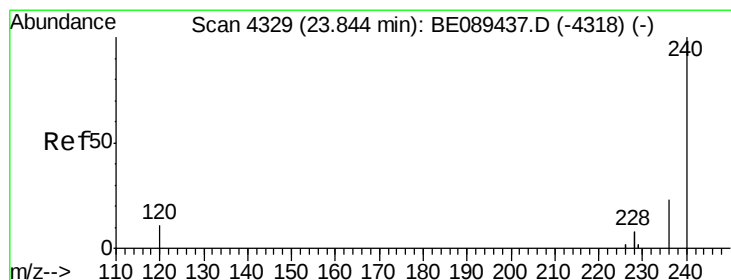
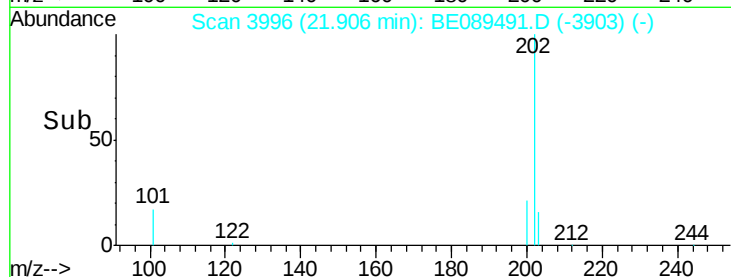
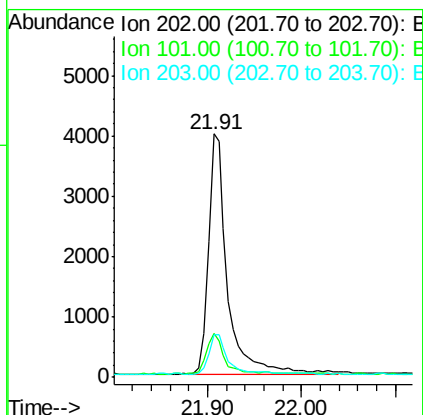
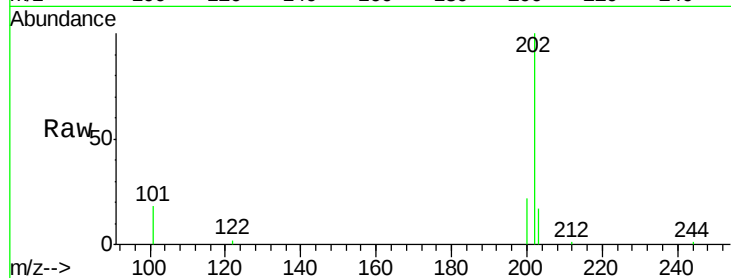




#15
 Fluoranthene
 Concen: 0.12 ng
 RT: 21.91 min Scan# 3996
 Delta R.T. -0.01 min
 Lab File: BE089491.D
 Acq: 1 Feb 2015 8:22

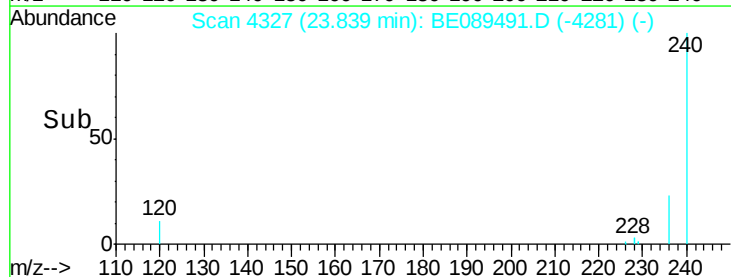
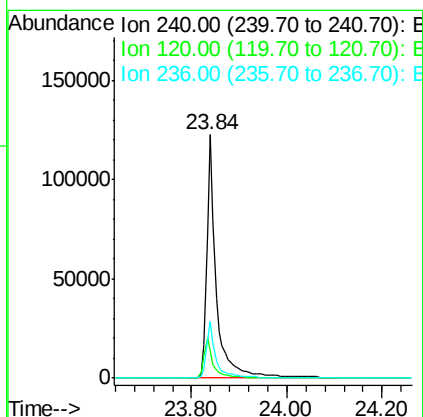
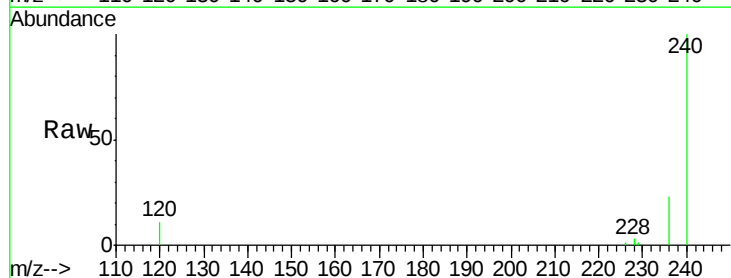
Instrument :
 BNA_E
 ClientSampleId :

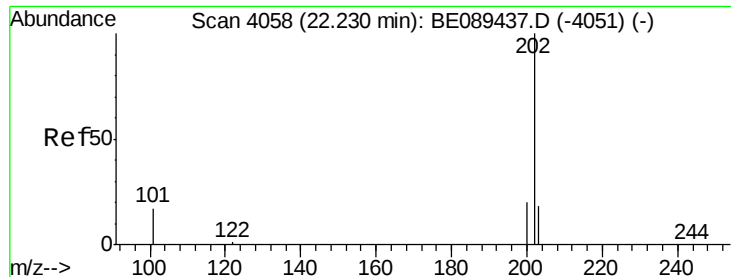
Tgt Ion:202 Resp: 5708
 Ion Ratio Lower Upper
 202 100
 101 15.9 13.6 20.4
 203 16.4 13.8 20.6



#16
 Chrysene-d12
 Concen: 5.00 ng
 RT: 23.84 min Scan# 4327
 Delta R.T. -0.01 min
 Lab File: BE089491.D
 Acq: 1 Feb 2015 8:22

Tgt Ion:240 Resp: 175143
 Ion Ratio Lower Upper
 240 100
 120 11.4 8.6 13.0
 236 23.5 18.7 28.1

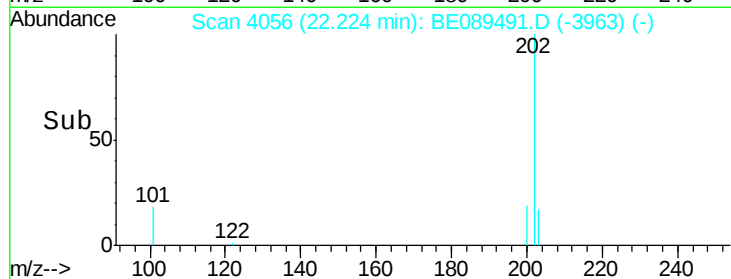
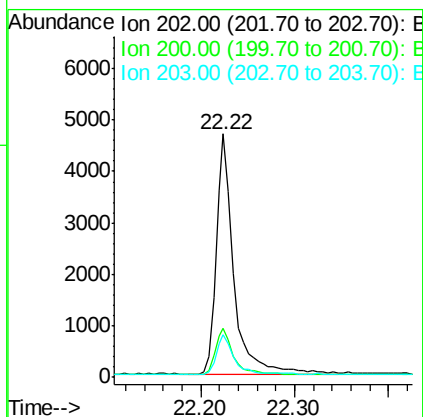
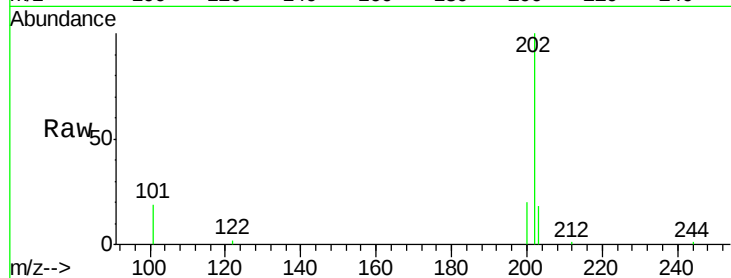




#17
 Pyrene
 Concen: 0.13 ng
 RT: 22.22 min Scan# 4056
 Delta R.T. -0.01 min
 Lab File: BE089491.D
 Acq: 1 Feb 2015 8:22

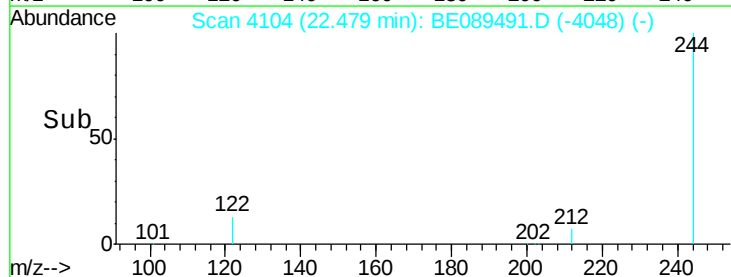
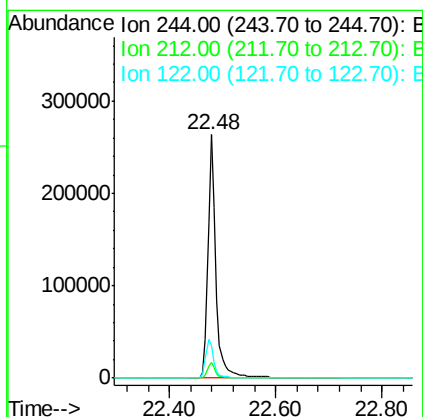
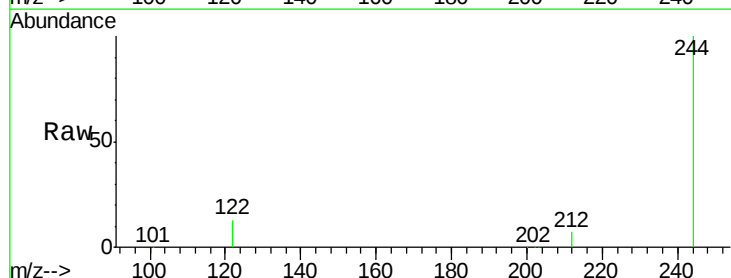
Instrument :
 BNA_E
 ClientSampleId :

Tgt Ion: 202 Resp: 6246
 Ion Ratio Lower Upper
 202 100
 200 19.3 16.2 24.4
 203 17.0 13.8 20.8



#18
 Terphenyl-d14
 Concen: 10.63 ng
 RT: 22.48 min Scan# 4104
 Delta R.T. -0.01 min
 Lab File: BE089491.D
 Acq: 1 Feb 2015 8:22

Tgt Ion: 244 Resp: 278732
 Ion Ratio Lower Upper
 244 100
 212 6.7 5.0 7.6
 122 13.3 10.2 15.4





#19

Benzo(a)anthracene

Concen: 0.10 ng

RT: 23.83 min Scan# 4326

Delta R.T. 0.00 min

Lab File: BE089491.D

Acq: 1 Feb 2015 8:22

Instrument :

BNA_E

ClientSampleId :

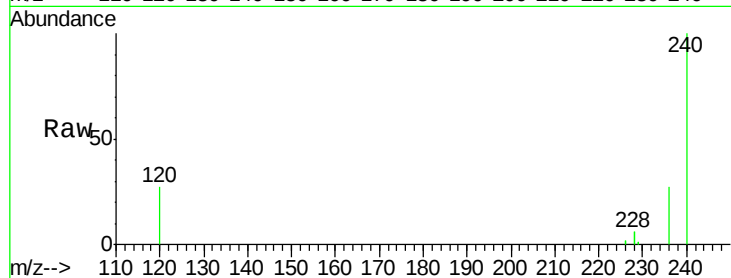
Tgt Ion:228 Resp: 15411

Ion Ratio Lower Upper

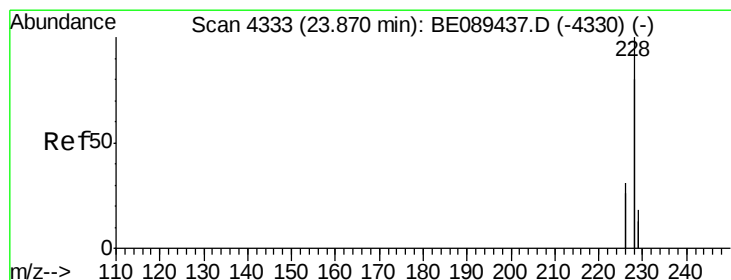
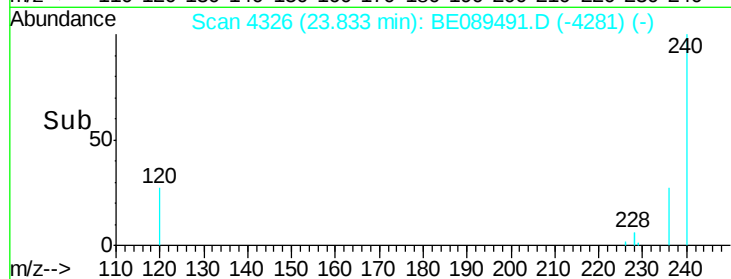
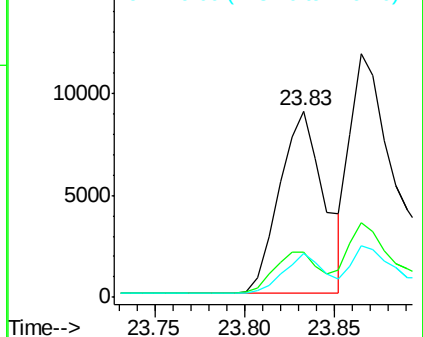
228 100

226 24.6 20.0 30.0

229 23.3 16.0 24.0



Abundance Ion 228.00 (227.70 to 228.70): E
Ion 226.00 (225.70 to 226.70): E
Ion 229.00 (228.70 to 229.70): E



#20

Chrysene

Concen: 0.16 ng

RT: 23.86 min Scan# 4331

Delta R.T. -0.01 min

Lab File: BE089491.D

Acq: 1 Feb 2015 8:22

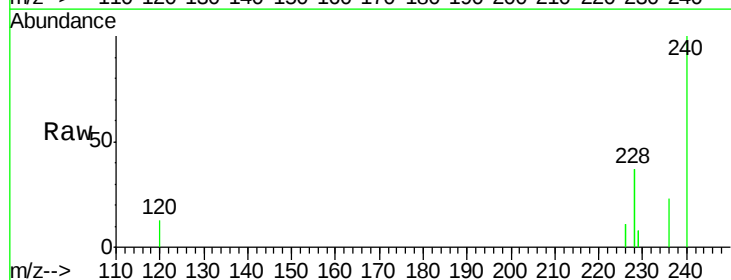
Tgt Ion:228 Resp: 26551

Ion Ratio Lower Upper

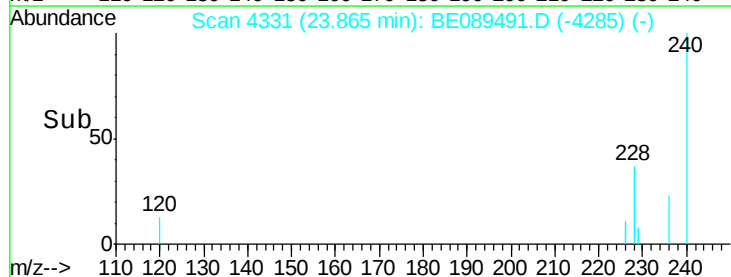
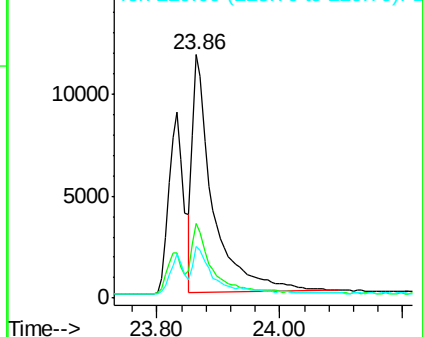
228 100

226 30.7 24.5 36.7

229 21.3 14.1 21.1#



Abundance Ion 228.00 (227.70 to 228.70): E
Ion 226.00 (225.70 to 226.70): E
Ion 229.00 (228.70 to 229.70): E

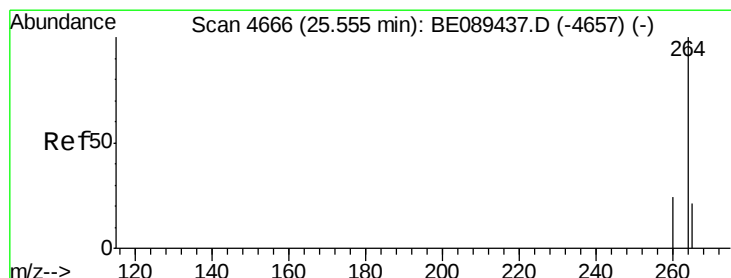
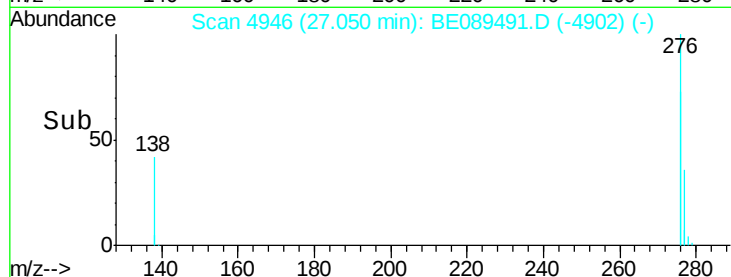
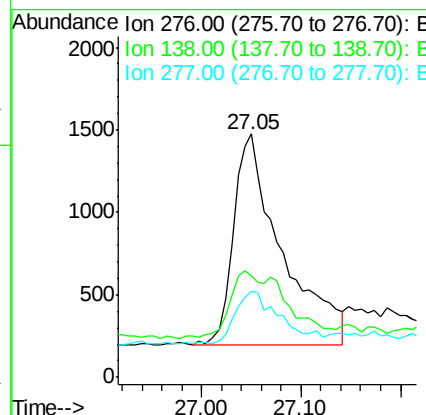
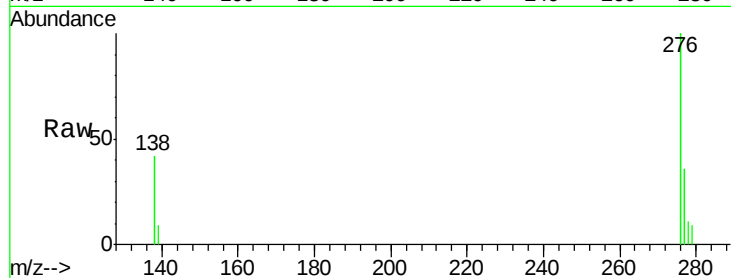




#21
 Indeno(1,2,3-cd)pyrene
 Concen: 0.03 ng
 RT: 27.05 min Scan# 4946
 Delta R.T. -0.01 min
 Lab File: BE089491.D
 Acq: 1 Feb 2015 8:22

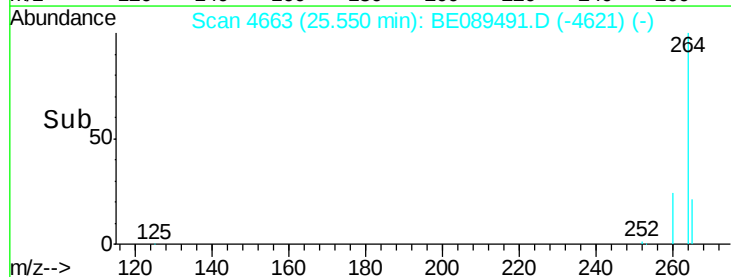
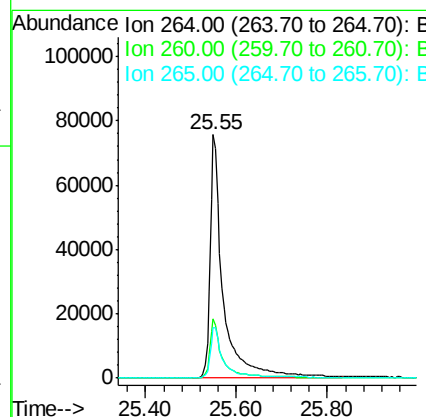
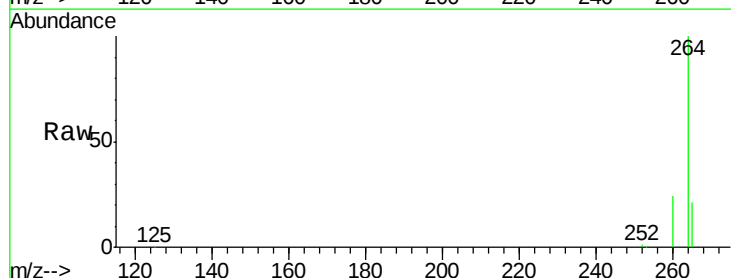
Instrument :
 BNA_E
 ClientSampleId :

Tgt Ion: 276 Resp: 4300
 Ion Ratio Lower Upper
 276 100
 138 38.6 25.4 38.0#
 277 23.6 19.8 29.6



#22
 Perylene-d12
 Concen: 5.00 ng
 RT: 25.55 min Scan# 4663
 Delta R.T. -0.01 min
 Lab File: BE089491.D
 Acq: 1 Feb 2015 8:22

Tgt Ion: 264 Resp: 151678
 Ion Ratio Lower Upper
 264 100
 260 24.1 19.4 29.0
 265 20.9 17.0 25.6





#23

Benzo(b)fluoranthene

Concen: 0.22 ng

RT: 25.09 min Scan# 4562

Delta R.T. -0.01 min

Lab File: BE089491.D

Acq: 1 Feb 2015 8:22

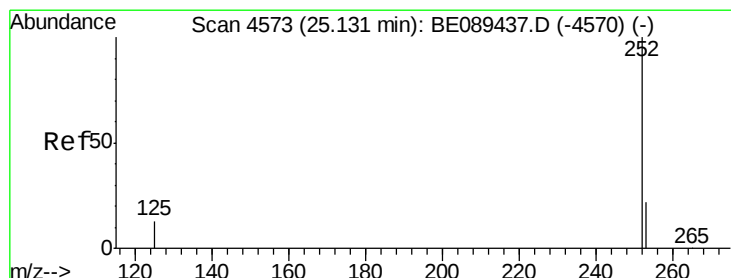
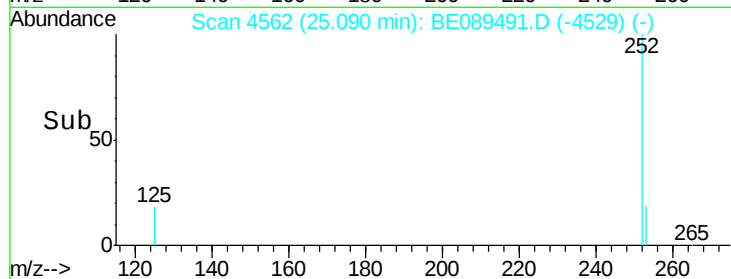
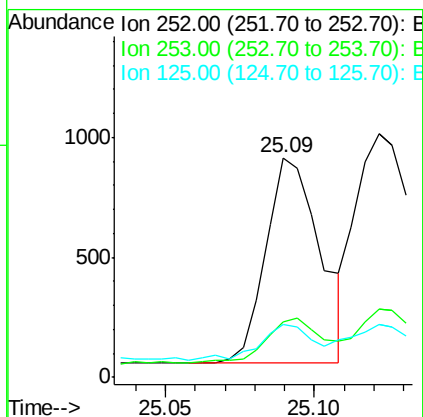
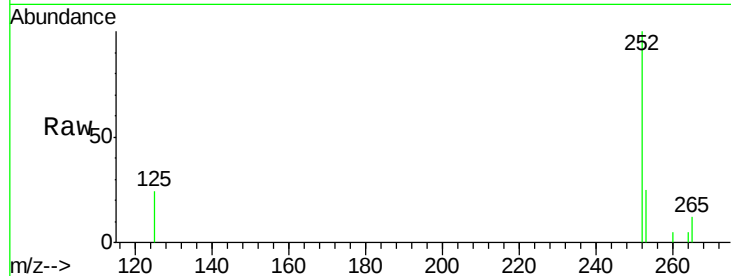
Instrument :

BNA_E

ClientSampleId :

Tgt Ion:252 Resp: 1081

Ion	Ratio	Lower	Upper
252	100		
253	25.2	17.0	25.6
125	24.4	11.4	17.0#



#24

Benzo(k)fluoranthene

Concen: 0.05 ng

RT: 25.12 min Scan# 4569

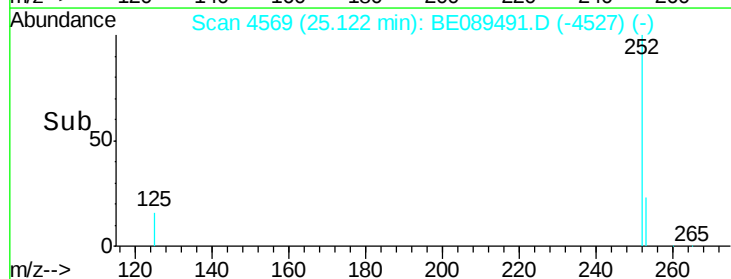
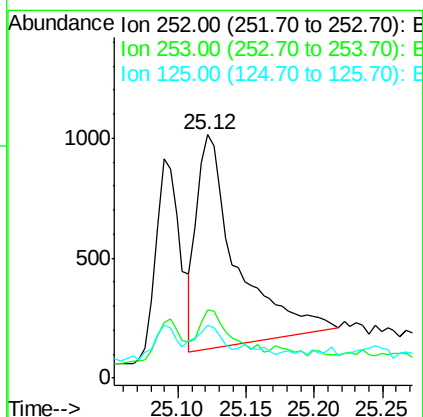
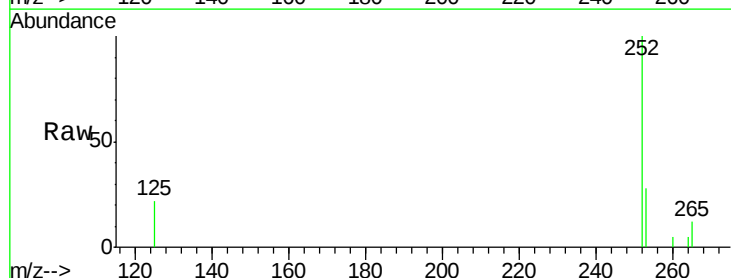
Delta R.T. -0.01 min

Lab File: BE089491.D

Acq: 1 Feb 2015 8:22

Tgt Ion:252 Resp: 1824

Ion	Ratio	Lower	Upper
252	100		
253	28.3	17.4	26.2#
125	21.8	10.9	16.3#





#25

Benzo(a)pyrene

Concen: 0.16 ng

RT: 25.47 min Scan# 4646

Delta R.T. -0.01 min

Lab File: BE089491.D

Acq: 1 Feb 2015 8:22

Instrument :

BNA_E

ClientSampleId :

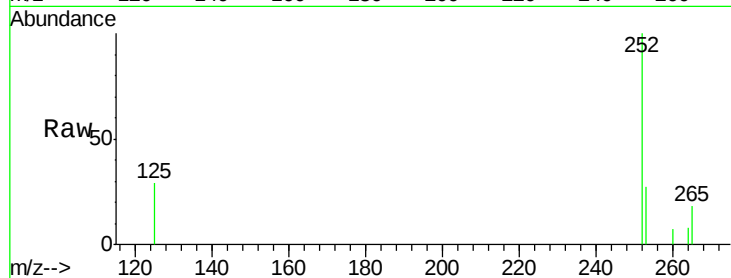
Tgt Ion: 252 Resp: 1096

Ion Ratio Lower Upper

252 100

253 26.5 17.3 25.9#

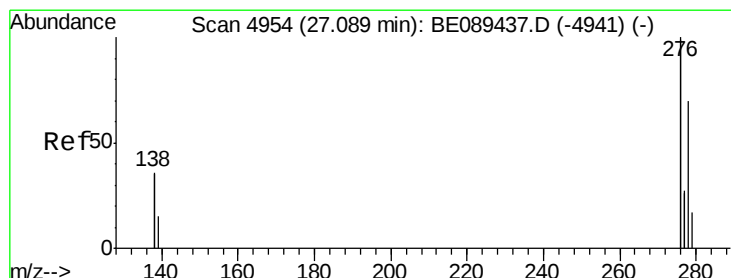
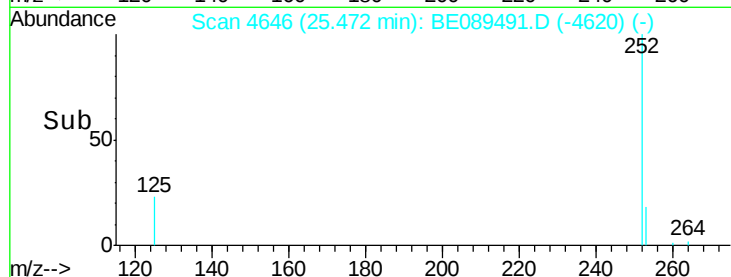
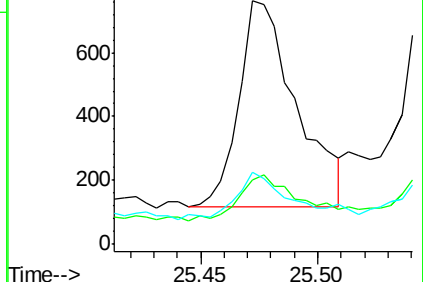
125 29.4 12.0 18.0#



Abundance Ion 252.00 (251.70 to 252.70): E

Ion 253.00 (252.70 to 253.70): E

Ion 125.00 (124.70 to 125.70): E



#26

Dibenzo(a,h)anthracene

Concen: 0.15 ng

RT: 27.08 min Scan# 4951

Delta R.T. -0.01 min

Lab File: BE089491.D

Acq: 1 Feb 2015 8:22

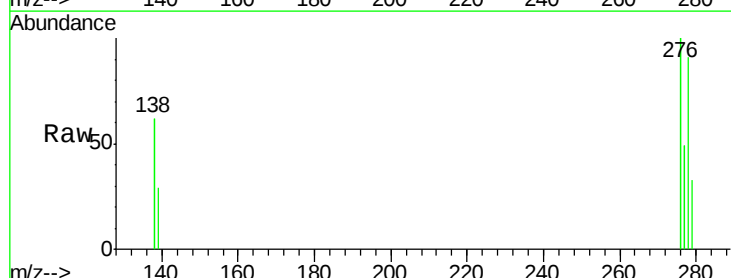
Tgt Ion: 278 Resp: 725

Ion Ratio Lower Upper

278 100

139 31.9 17.0 25.4#

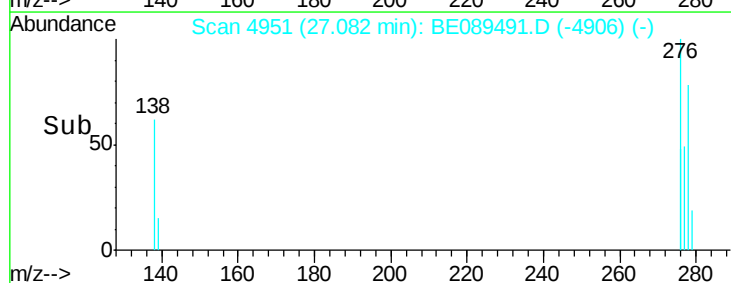
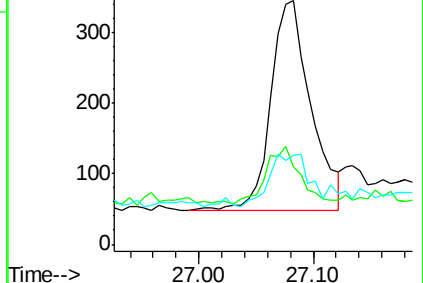
279 36.5 19.1 28.7#



Abundance Ion 278.00 (277.70 to 278.70): E

Ion 139.00 (138.70 to 139.70): E

Ion 279.00 (278.70 to 279.70): E





#27

Benzo(g,h,i)perylene

Concen: 0.05 ng

RT: 27.50 min Scan# 5015

Delta R.T. -0.01 min

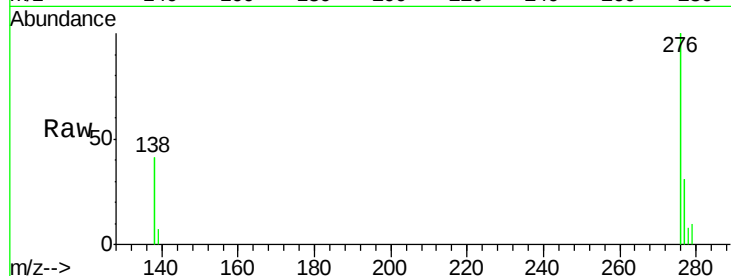
Lab File: BE089491.D

Acq: 1 Feb 2015 8:22

Instrument :

BNA_E

ClientSampleId :



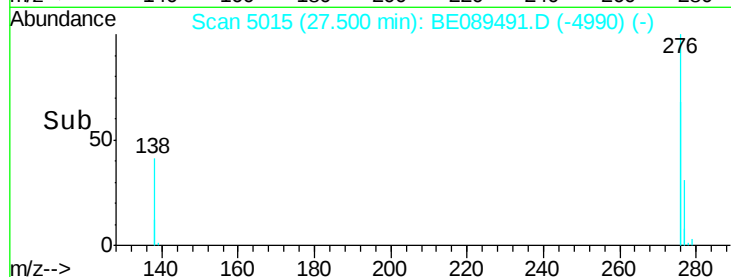
Tgt Ion: 276 Resp: 6310

Ion Ratio Lower Upper

276 100

277 31.0 18.4 27.6#

138 41.4 23.7 35.5#



Abundance Ion 276.00 (275.70 to 276.70): E

Ion 277.00 (276.70 to 277.70): E

Ion 138.00 (137.70 to 138.70): E

