

Data Path : Z:\HPCHEM1\BNA F\Data\BF051817\  
 Data File : BF095253.D  
 Acq On : 19 May 2017 8:20  
 Operator : SJ/MA  
 Sample : I3172-01DL 2X  
 Misc :  
 ALS Vial : 30 Sample Multiplier: 1

Instrument :  
 BNA\_F  
 ClientSampleId :

Quant Time: May 19 11:16:55 2017  
 Quant Method : Z:\HPCHEM1\BNA F\METHODS\8270-BF050217.M  
 Quant Title : ASP BNA STANDARDS FOR 5 POINT CALIBRATION  
 QLast Update : Thu May 18 17:07:53 2017  
 Response via : Initial Calibration

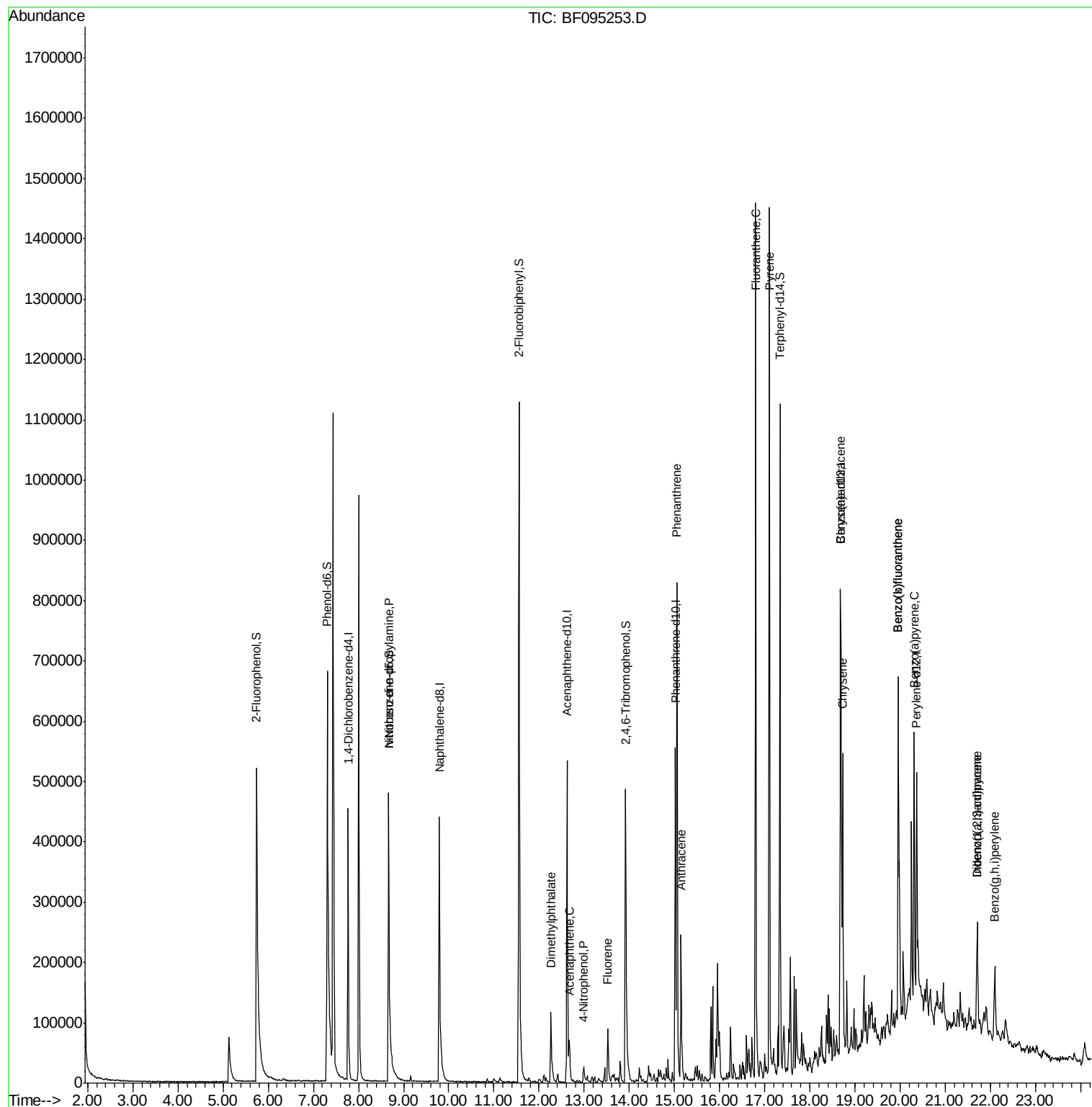
| Internal Standards             | R.T.  | QIon | Response | Conc  | Units | Dev(Min) |
|--------------------------------|-------|------|----------|-------|-------|----------|
| 1) 1,4-Dichlorobenzene-d4      | 7.77  | 152  | 105575   | 20.00 | ng    | 0.00     |
| 21) Naphthalene-d8             | 9.79  | 136  | 427790   | 20.00 | ng    | 0.00     |
| 38) Acenaphthene-d10           | 12.62 | 164  | 175786   | 20.00 | ng    | 0.00     |
| 63) Phenanthrene-d10           | 15.02 | 188  | 279610   | 20.00 | ng    | 0.00     |
| 75) Chrysene-d12               | 18.69 | 240  | 175021   | 20.00 | ng    | 0.00     |
| 86) Perylene-d12               | 20.36 | 264  | 176806   | 20.00 | ng    | 0.00     |
| System Monitoring Compounds    |       |      |          |       |       |          |
| 5) 2-Fluorophenol              | 5.74  | 112  | 477075   | 75.34 | ng    | 0.00     |
| 7) Phenol-d6                   | 7.31  | 99   | 626531   | 82.46 | ng    | 0.00     |
| 23) Nitrobenzene-d5            | 8.67  | 82   | 350916   | 51.73 | ng    | 0.00     |
| 41) 2,4,6-Tribromophenol       | 13.92 | 330  | 104981   | 72.92 | ng    | 0.00     |
| 44) 2-Fluorobiphenyl           | 11.55 | 172  | 629901   | 51.58 | ng    | 0.00     |
| 78) Terphenyl-d14              | 17.34 | 244  | 393114   | 49.47 | ng    | -0.01    |
| Target Compounds               |       |      |          |       |       | Qvalue   |
| 19) n-Nitroso-di-n-propylamine | 8.67  | 70   | 40240    | 7.83  | ng    | # 75     |
| 49) Dimethylphthalate          | 12.27 | 163  | 107687   | 7.46  | ng    | 99       |
| 51) Acenaphthene               | 12.67 | 154  | 23459    | 2.10  | ng    | 97       |
| 55) 4-Nitrophenol              | 12.99 | 139  | 8290     | 4.37  | ng    | # 25     |
| 57) Fluorene                   | 13.52 | 166  | 44766    | 3.33  | ng    | 98       |
| 70) Phenanthrene               | 15.05 | 178  | 499658   | 31.10 | ng    | 98       |
| 71) Anthracene                 | 15.15 | 178  | 169276   | 10.32 | ng    | 98       |
| 74) Fluoranthene               | 16.80 | 202  | 790117   | 47.94 | ng    | 99       |
| 77) Pyrene                     | 17.10 | 202  | 648288   | 49.53 | ng    | 95       |
| 80) Benzo(a)anthracene         | 18.68 | 228  | 288620   | 28.33 | ng    | 97       |
| 82) Chrysene                   | 18.72 | 228  | 245960   | 24.97 | ng    | 97       |
| 85) Indeno(1,2,3-cd)pyrene     | 21.71 | 276  | 116791   | 14.60 | ng    | 91       |
| 87) Benzo(b)fluoranthene       | 19.96 | 252  | 415261   | 38.01 | ng    | 98       |
| 88) Benzo(k)fluoranthene       | 19.96 | 252  | 415261   | 39.40 | ng    | 97       |
| 89) Benzo(a)pyrene             | 20.31 | 252  | 216211   | 21.45 | ng    | 98       |
| 90) Dibenzo(a,h)anthracene     | 21.71 | 278  | 31196    | 3.75  | ng    | # 78     |
| 91) Benzo(a,h,i)perylene       | 22.09 | 276  | 99283    | 12.15 | ng    | 99       |

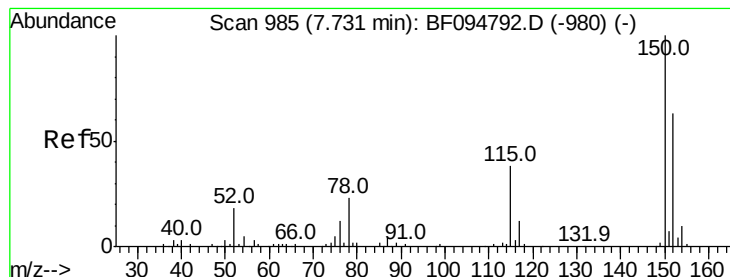
(#) = qualifier out of range (m) = manual integration (+) = signals summed

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ALS Vial : 30 Sample Multiplier: 1

Instrument :  
BNA\_F  
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Quant Time: May 19 11:16:55 2017  
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QLast Update : Thu May 18 17:07:53 2017  
Response via : Initial Calibration





#1

1,4-Dichlorobenzene-d4

Concen: 20.00 ng

RT: 7.77 min Scan# 991

Delta R.T. -0.00 min

Lab File: BF095253.D

Acq: 19 May 2017 8:20

Instrument :

BNA\_F

ClientSampleId :

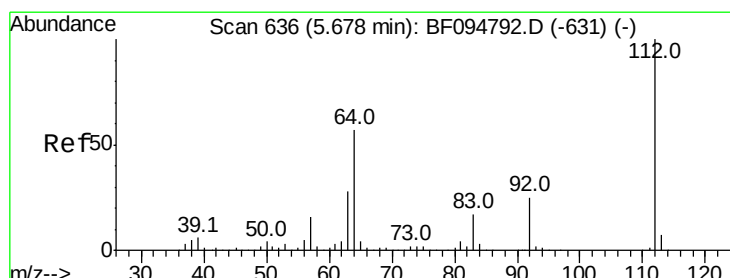
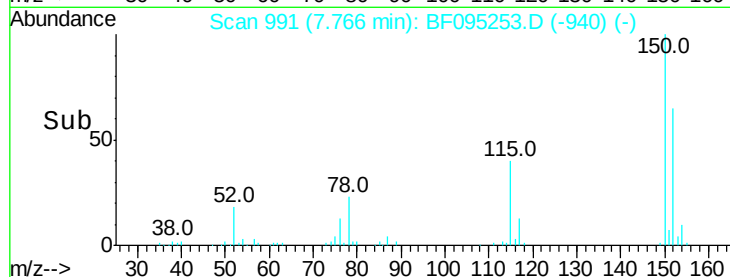
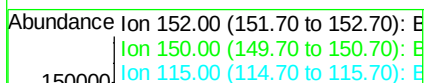
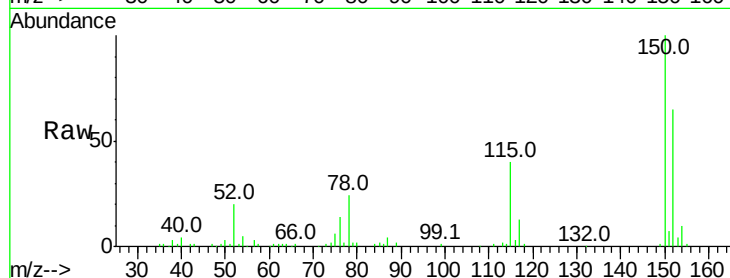
Tot Ion:152 Resp: 105575

Ion Ratio Lower Upper

152 100

150 153.0 126.2 189.2

115 60.5 52.2 78.2



#5

2-Fluorophenol

Concen: 75.34 ng

RT: 5.74 min Scan# 647

Delta R.T. 0.01 min

Lab File: BF095253.D

Acq: 19 May 2017 8:20

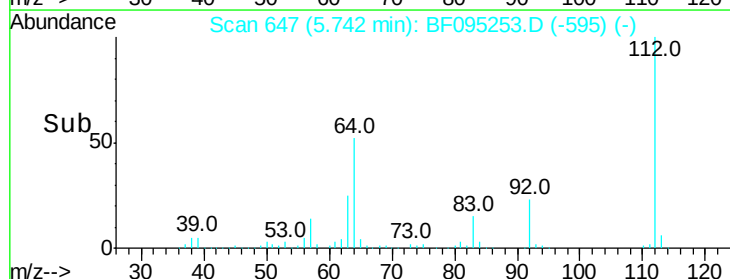
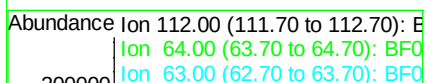
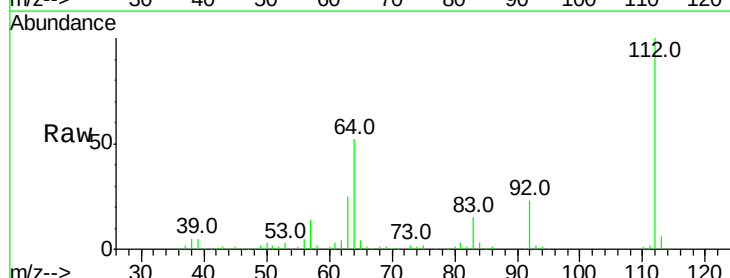
Tgt Ion:112 Resp: 477075

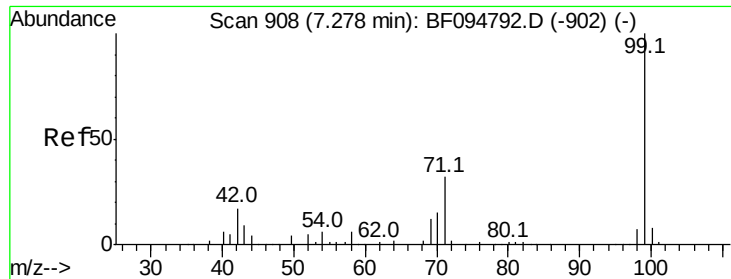
Ion Ratio Lower Upper

112 100

64 52.2 46.0 69.0

63 24.7 23.4 35.0





#7

Phenol-d6

Concen: 82.46 ng

RT: 7.31 min Scan# 913

Delta R.T. -0.01 min

Lab File: BF095253.D

Acq: 19 May 2017 8:20

Instrument :

BNA\_F

ClientSampleId :

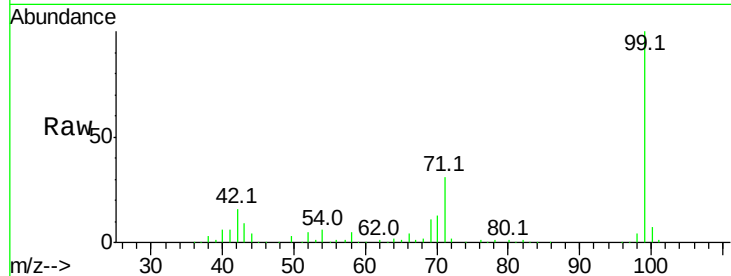
Tot Ion: 99 Resp: 626531

Ion Ratio Lower Upper

99 100

42 15.6 13.5 20.3

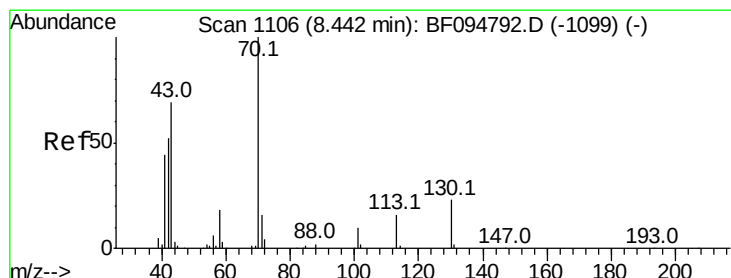
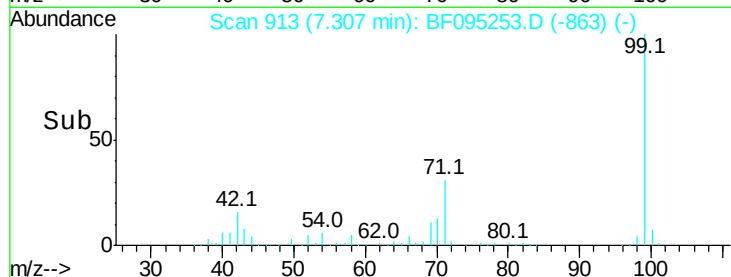
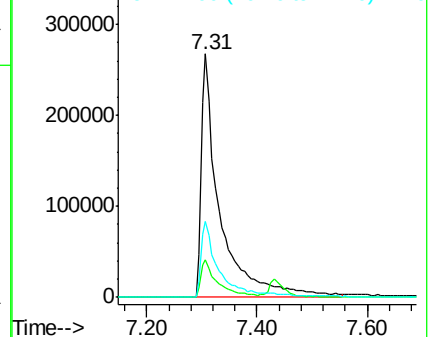
71 31.2 24.5 36.7



Abundance Ion 99.00 (98.70 to 99.70): BF0

Ion 42.00 (41.70 to 42.70): BF0

Ion 71.00 (70.70 to 71.70): BF0



#19

n-Nitroso-di-n-propylamine

Concen: 7.83 ng

RT: 8.67 min Scan# 1144

Delta R.T. 0.19 min

Lab File: BF095253.D

Acq: 19 May 2017 8:20

Tgt Ion: 70 Resp: 40240

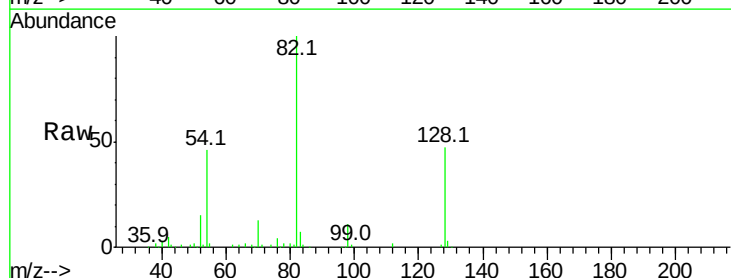
Ion Ratio Lower Upper

70 100

42 43.3 47.2 70.8#

101 0.0 7.2 10.8#

130 2.3 15.9 23.9#

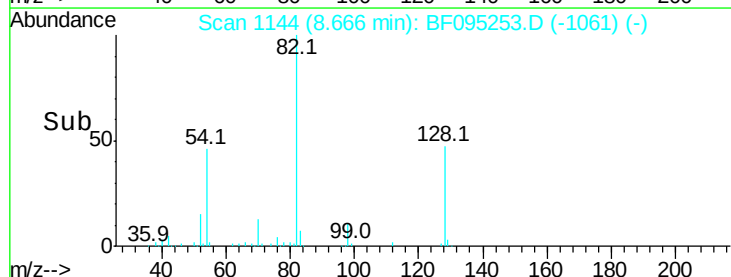
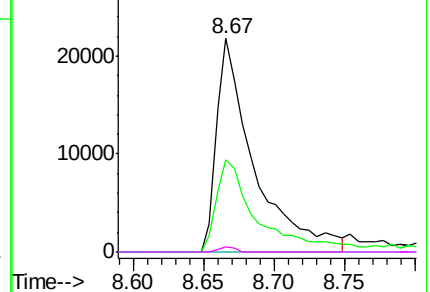


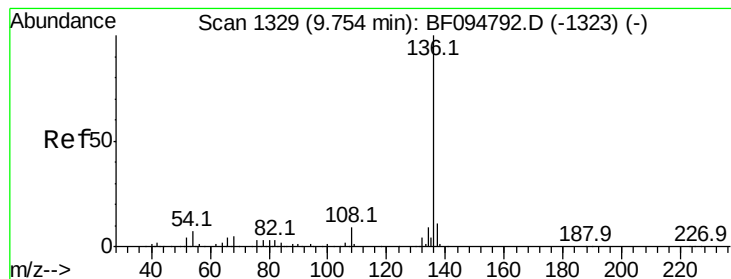
Abundance Ion 70.00 (69.70 to 70.70): BF0

Ion 42.00 (41.70 to 42.70): BF0

Ion 101.00 (100.70 to 101.70): BF0

Ion 130.00 (129.70 to 130.70): BF0





#21

Naphthalene-d8

Concen: 20.00 ng

RT: 9.79 min Scan# 1335

Delta R.T. 0.01 min

Lab File: BF095253.D

Acq: 19 May 2017 8:20

Instrument :

BNA\_F

ClientSampleId :

Tot Ion:136 Resp: 427790

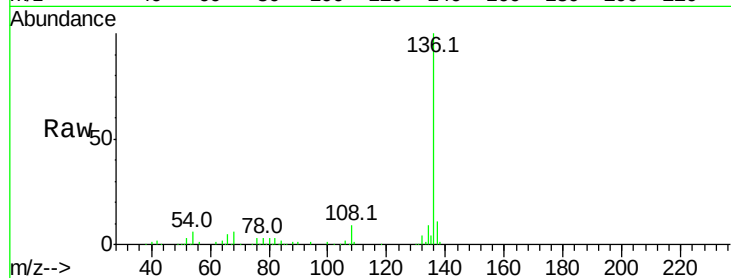
Ion Ratio Lower Upper

136 100

137 10.9 8.5 12.7

54 6.4 4.9 7.3

68 5.8 4.1 6.1

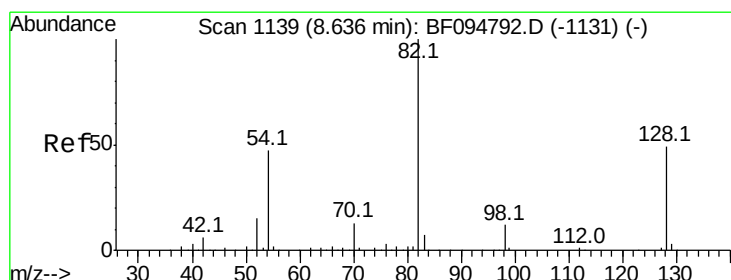
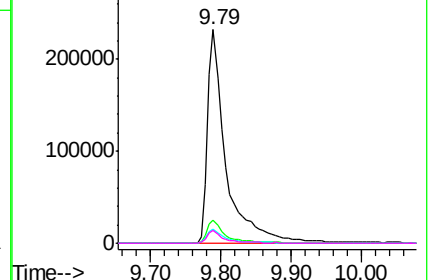
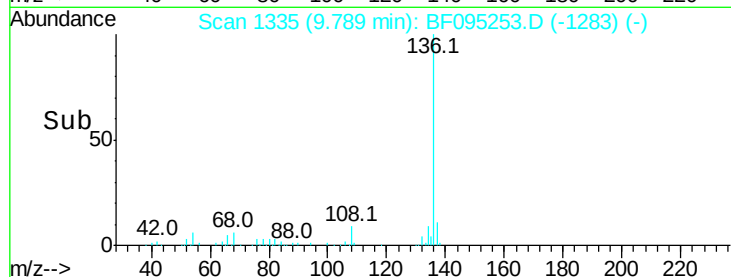


Abundance Ion 136.00 (135.70 to 136.70): E

Ion 137.00 (136.70 to 137.70): E

Ion 54.00 (53.70 to 54.70): BF0

Ion 68.00 (67.70 to 68.70): BF0



#23

Nitrobenzene-d5

Concen: 51.73 ng

RT: 8.67 min Scan# 1144

Delta R.T. -0.01 min

Lab File: BF095253.D

Acq: 19 May 2017 8:20

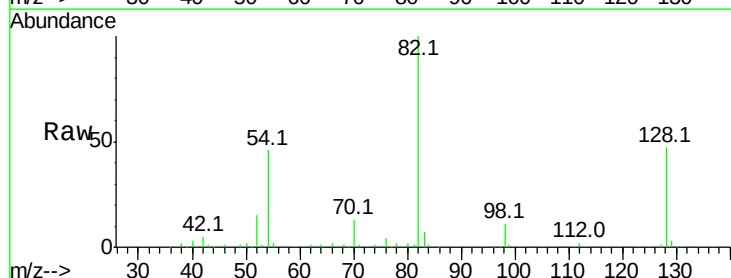
Tgt Ion: 82 Resp: 350916

Ion Ratio Lower Upper

82 100

128 46.6 34.0 51.0

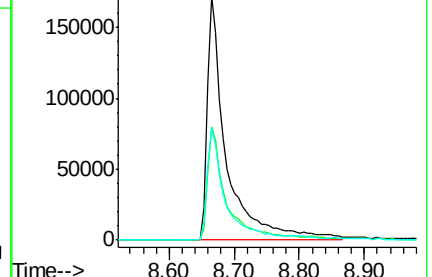
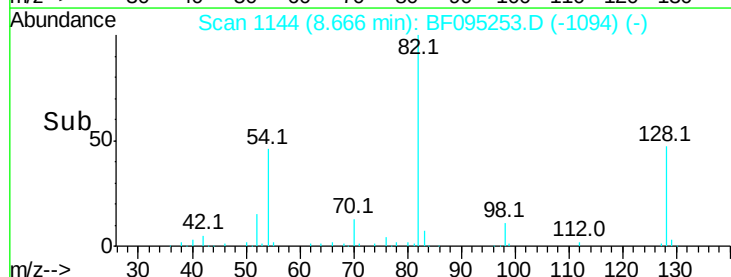
54 45.8 42.2 63.2

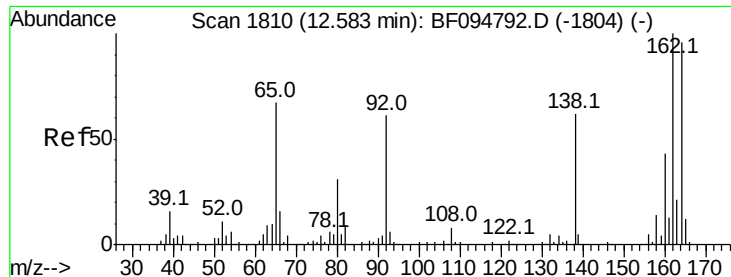


Abundance Ion 82.00 (81.70 to 82.70): BF0

Ion 128.00 (127.70 to 128.70): E

Ion 54.00 (53.70 to 54.70): BF0





#38

Acenaphthene-d10

Concen: 20.00 ng

RT: 12.62 min Scan# 1816

Delta R.T. -0.00 min

Lab File: BF095253.D

Acq: 19 May 2017 8:20

Instrument :

BNA\_F

ClientSampleId :

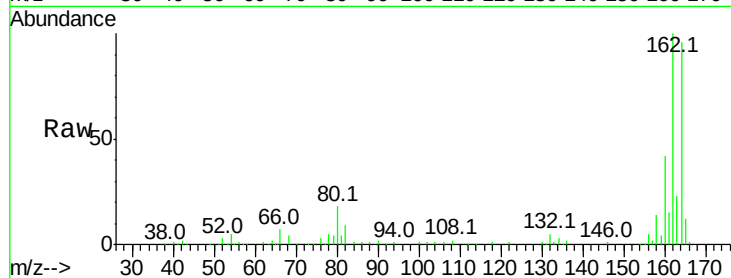
Tot Ion:164 Resp: 175786

Ion Ratio Lower Upper

164 100

162 104.0 82.6 123.8

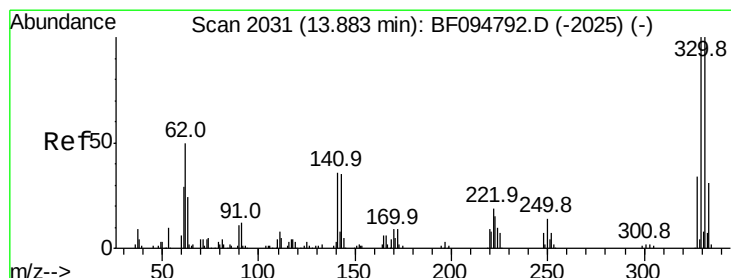
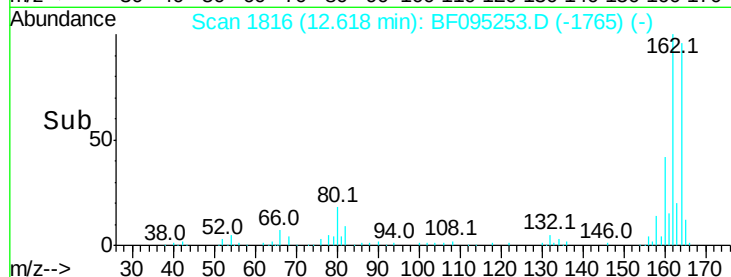
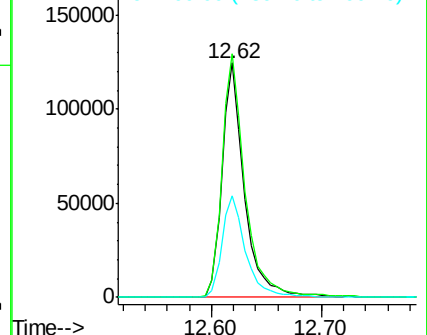
160 43.4 36.2 54.2



Abundance Ion 164.00 (163.70 to 164.70): E

Ion 162.00 (161.70 to 162.70): E

Ion 160.00 (159.70 to 160.70): E



#41

2,4,6-Tribromophenol

Concen: 72.92 ng

RT: 13.92 min Scan# 2037

Delta R.T. -0.00 min

Lab File: BF095253.D

Acq: 19 May 2017 8:20

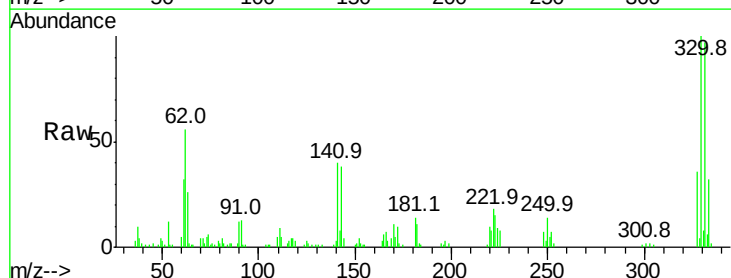
Tgt Ion:330 Resp: 104981

Ion Ratio Lower Upper

330 100

332 96.5 76.6 115.0

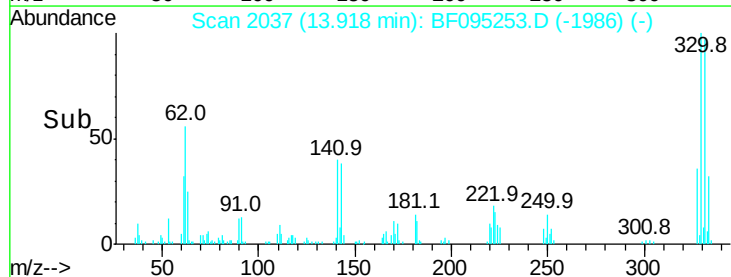
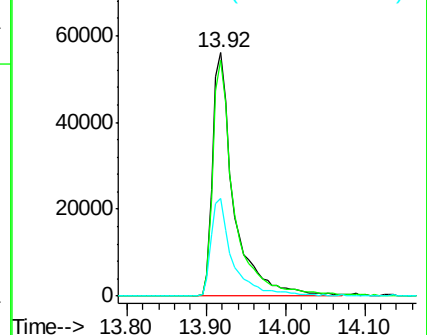
141 40.8 31.4 47.2

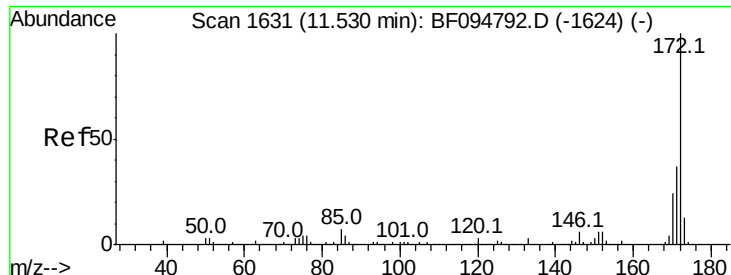


Abundance Ion 329.80 (329.50 to 330.50): E

Ion 331.80 (331.50 to 332.50): E

Ion 141.00 (140.70 to 141.70): E

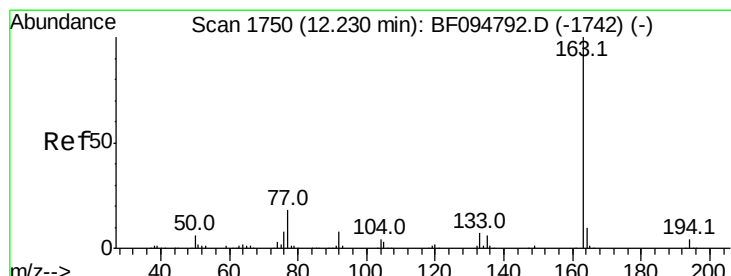
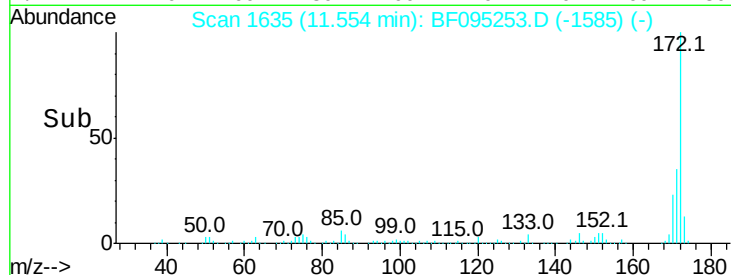
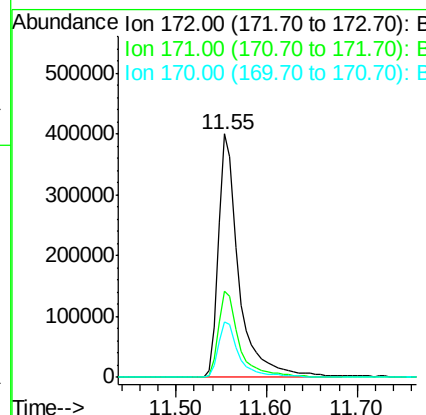
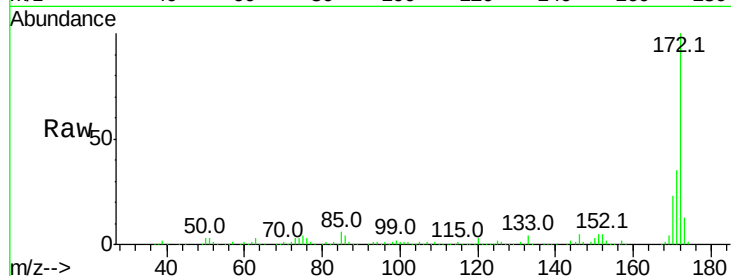




#44  
 2-Fluorobiphenyl  
 Concen: 51.58 ng  
 RT: 11.55 min Scan# 1635  
 Delta R.T. -0.01 min  
 Lab File: BF095253.D  
 Acq: 19 May 2017 8:20

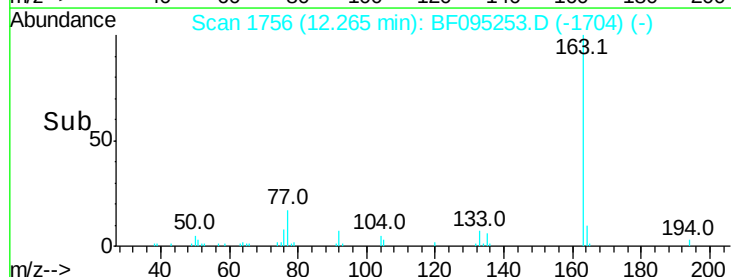
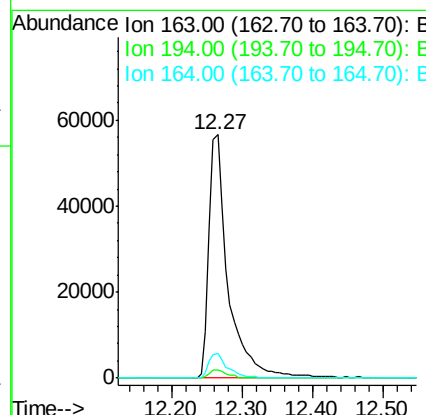
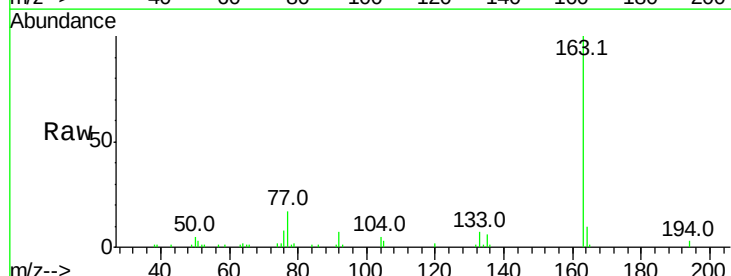
Instrument :  
 BNA\_F  
 ClientSampled :

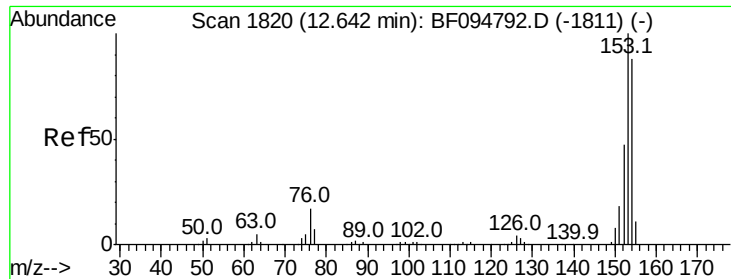
Tot Ion:172 Resp: 629901  
 Ion Ratio Lower Upper  
 172 100  
 171 35.3 29.6 44.4  
 170 23.0 19.8 29.8



#49  
 Dimethylphthalate  
 Concen: 7.46 ng  
 RT: 12.27 min Scan# 1756  
 Delta R.T. 0.01 min  
 Lab File: BF095253.D  
 Acq: 19 May 2017 8:20

Tgt Ion:163 Resp: 107687  
 Ion Ratio Lower Upper  
 163 100  
 194 3.3 2.6 4.0  
 164 10.0 8.4 12.6





#51

Acenaphthene

Concen: 2.10 ng

RT: 12.67 min Scan# 1825

Delta R.T. -0.00 min

Lab File: BF095253.D

Acq: 19 May 2017 8:20

Instrument :

BNA\_F

ClientSampleId :

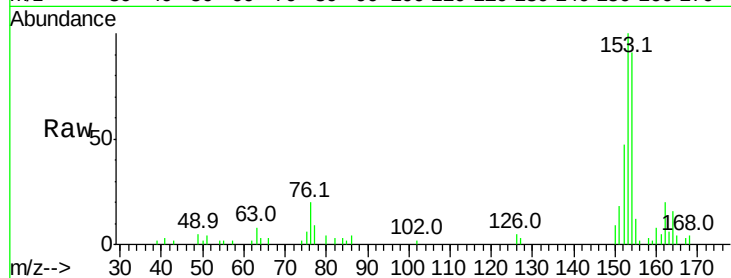
Tot Ion:154 Resp: 23459

Ion Ratio Lower Upper

154 100

153 109.5 90.5 135.7

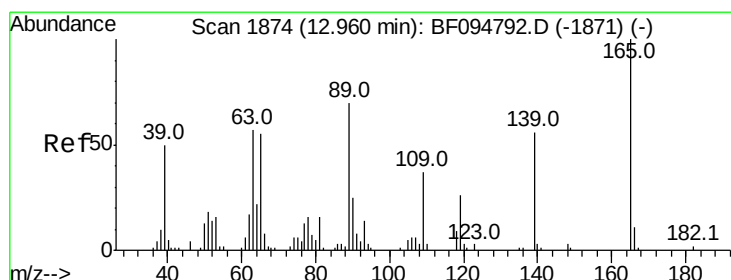
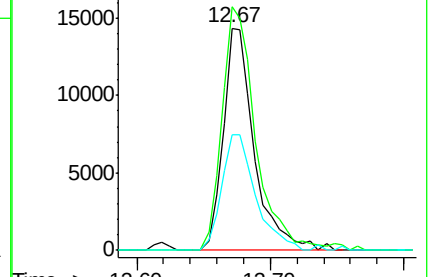
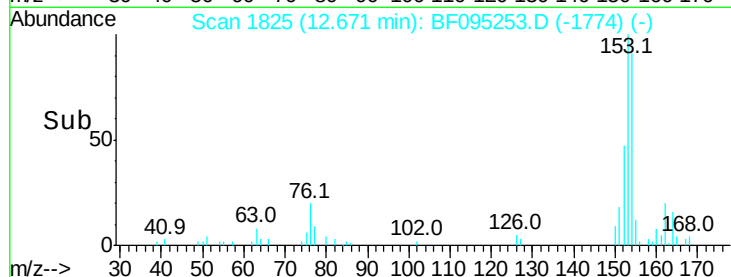
152 51.7 43.6 65.4



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



#55

4-Nitrophenol

Concen: 4.37 ng

RT: 12.99 min Scan# 1879

Delta R.T. -0.05 min

Lab File: BF095253.D

Acq: 19 May 2017 8:20

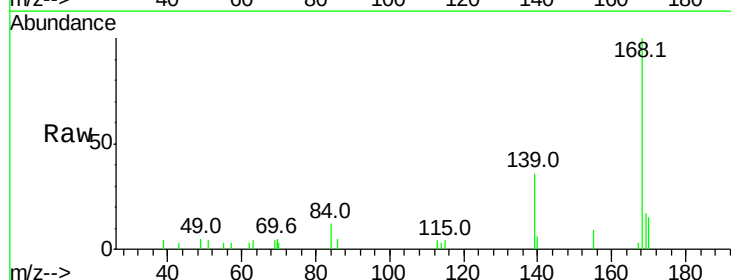
Tgt Ion:139 Resp: 8290

Ion Ratio Lower Upper

139 100

109 0.0 34.1 74.1#

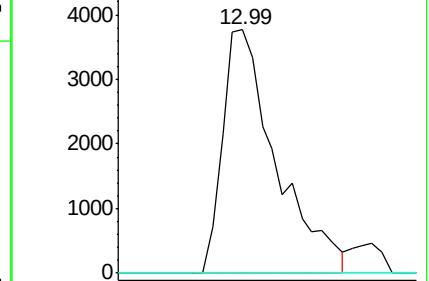
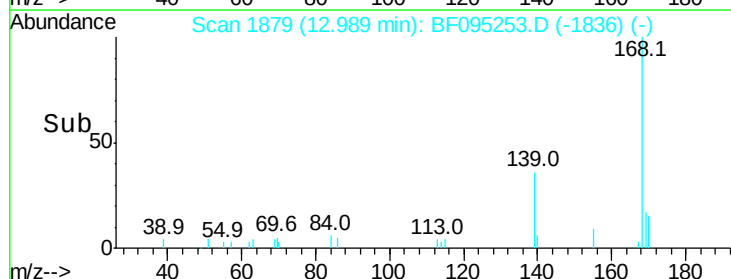
65 0.0 31.4 71.4#



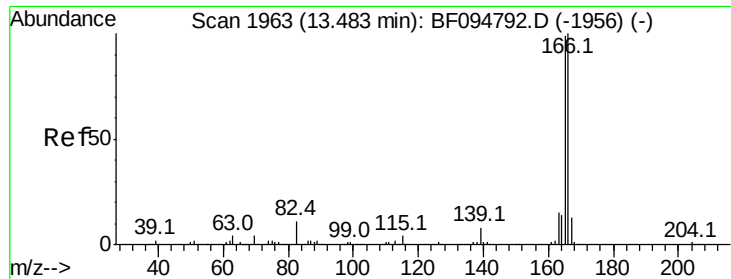
Abundance Ion 139.00 (138.70 to 139.70): E

Ion 109.00 (108.70 to 109.70): E

Ion 65.00 (64.70 to 65.70): BF0



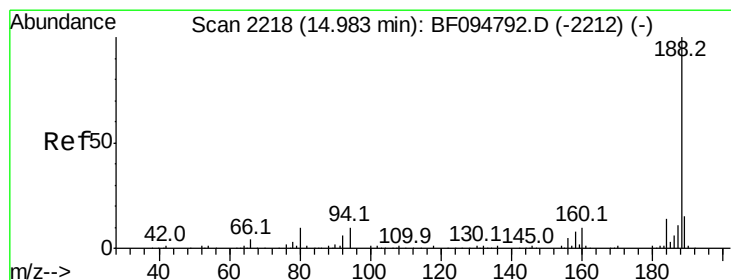
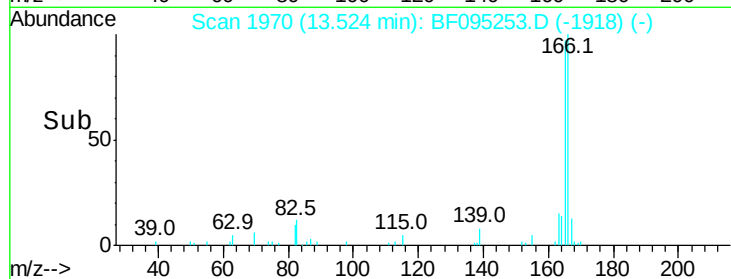
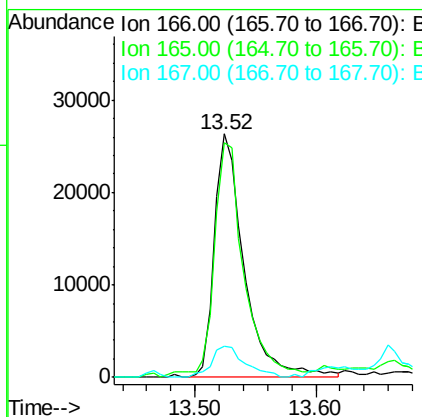
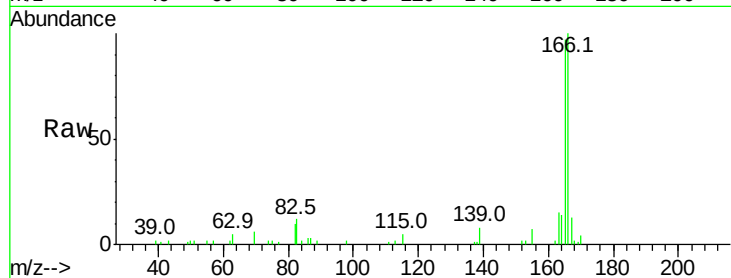




#57  
 Fluorene  
 Concen: 3.33 ng  
 RT: 13.52 min Scan# 1970  
 Delta R.T. 0.01 min  
 Lab File: BF095253.D  
 Acq: 19 May 2017 8:20

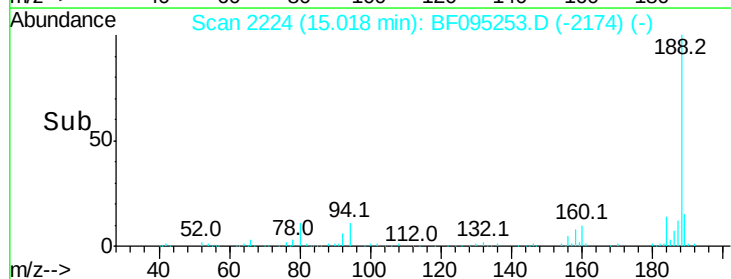
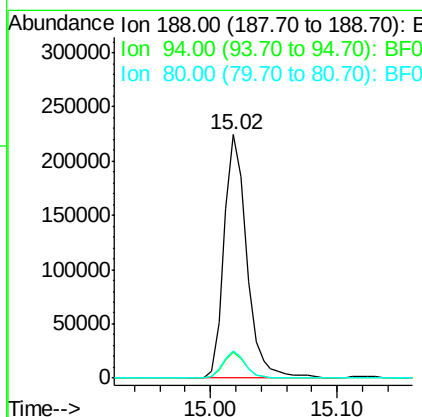
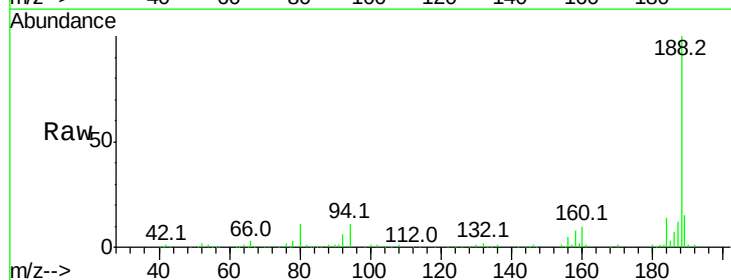
Instrument :  
 BNA\_F  
 ClientSampleId :

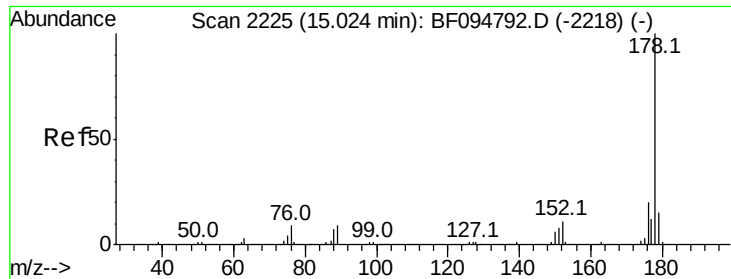
Tot Ion:166 Resp: 44766  
 Ion Ratio Lower Upper  
 166 100  
 165 96.6 78.8 118.2  
 167 12.9 10.6 16.0



#63  
 Phenanthrene-d10  
 Concen: 20.00 ng  
 RT: 15.02 min Scan# 2224  
 Delta R.T. -0.01 min  
 Lab File: BF095253.D  
 Acq: 19 May 2017 8:20

Tgt Ion:188 Resp: 279610  
 Ion Ratio Lower Upper  
 188 100  
 94 10.8 9.4 14.2  
 80 11.2 10.2 15.2

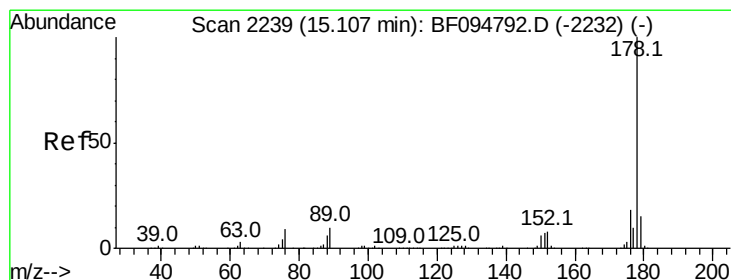
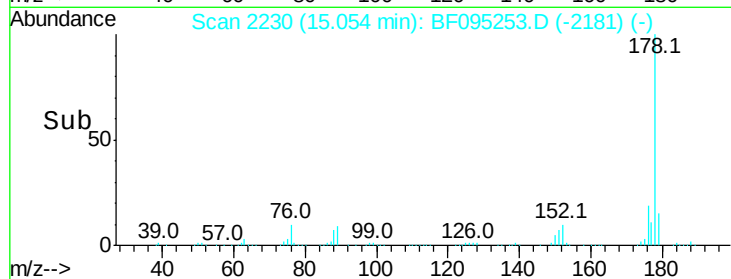
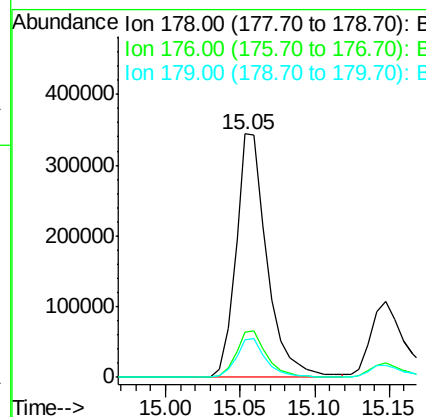
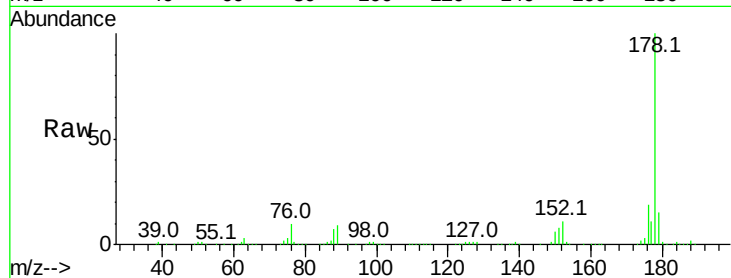




#70  
Phenanthrene  
Concen: 31.10 ng  
RT: 15.05 min Scan# 2230  
Delta R.T. -0.01 min  
Lab File: BF095253.D  
Acq: 19 May 2017 8:20

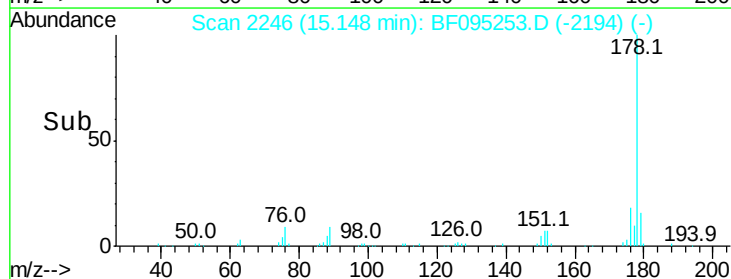
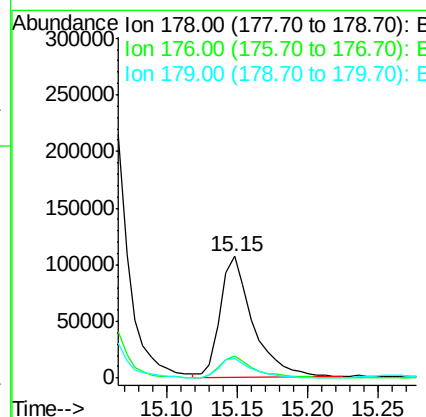
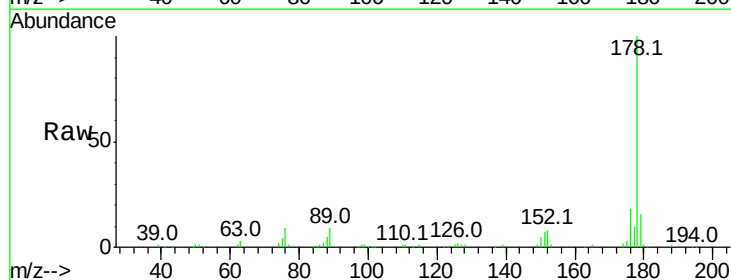
Instrument :  
BNA\_F  
ClientSampleId :

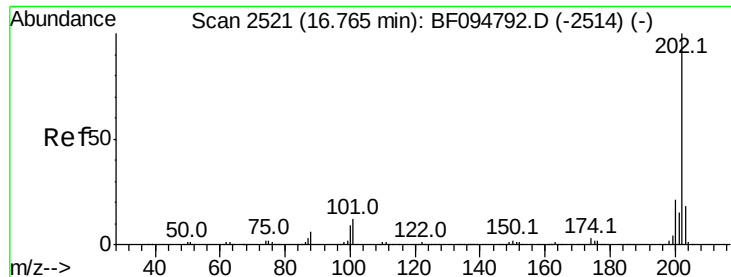
Tot Ion:178 Resp: 499658  
Ion Ratio Lower Upper  
178 100  
176 18.7 16.2 24.4  
179 15.4 12.6 19.0



#71  
Anthracene  
Concen: 10.32 ng  
RT: 15.15 min Scan# 2246  
Delta R.T. 0.01 min  
Lab File: BF095253.D  
Acq: 19 May 2017 8:20

Tgt Ion:178 Resp: 169276  
Ion Ratio Lower Upper  
178 100  
176 18.5 15.8 23.8  
179 16.4 12.7 19.1

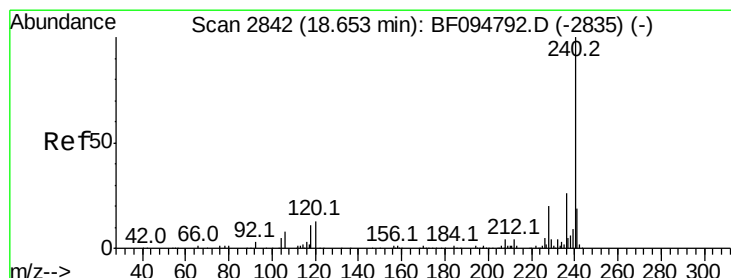
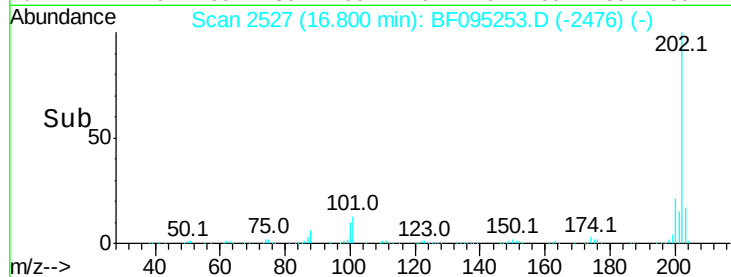
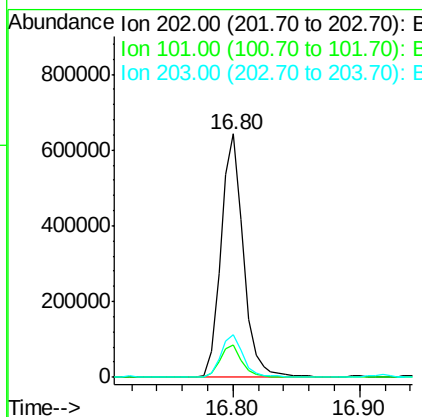
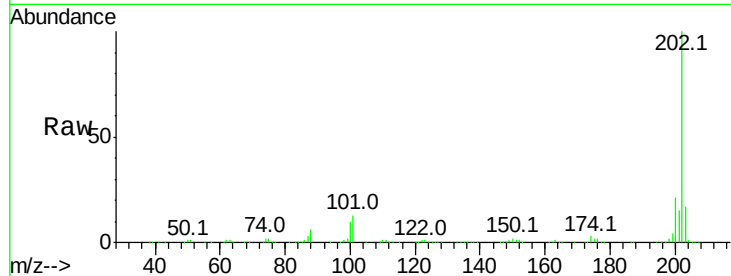




#74  
 Fluoranthene  
 Concen: 47.94 ng  
 RT: 16.80 min Scan# 2527  
 Delta R.T. -0.00 min  
 Lab File: BF095253.D  
 Acq: 19 May 2017 8:20

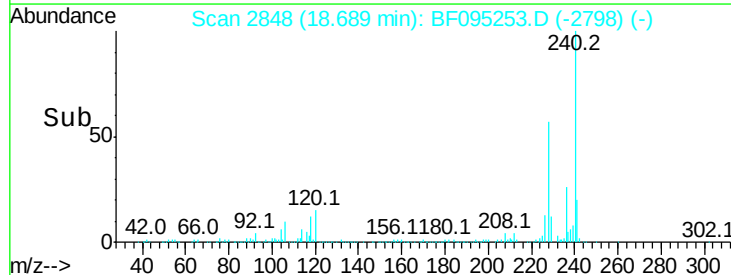
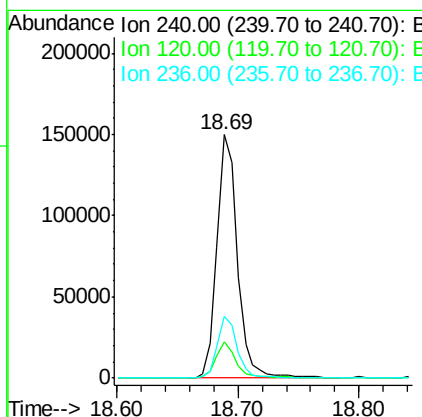
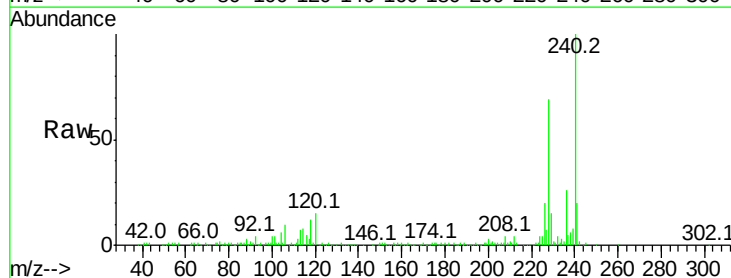
Instrument :  
 BNA\_F  
 ClientSampleId :

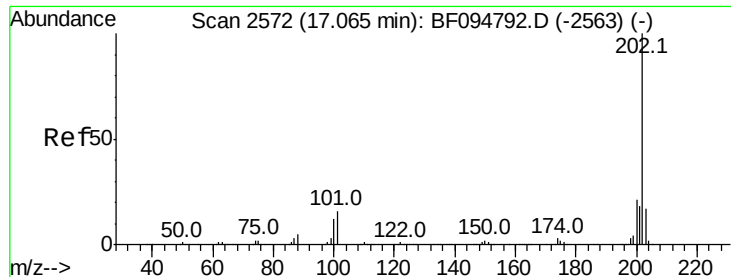
|           |       |       |        |
|-----------|-------|-------|--------|
| Tot Ion:  | 202   | Resp: | 790117 |
| Ion Ratio | Lower | Upper |        |
| 202       | 100   |       |        |
| 101       | 13.1  | 0.0   | 33.2   |
| 203       | 17.5  | 0.0   | 38.1   |



#75  
 Chrysene-d12  
 Concen: 20.00 ng  
 RT: 18.69 min Scan# 2848  
 Delta R.T. -0.01 min  
 Lab File: BF095253.D  
 Acq: 19 May 2017 8:20

|           |       |       |        |
|-----------|-------|-------|--------|
| Tgt Ion:  | 240   | Resp: | 175021 |
| Ion Ratio | Lower | Upper |        |
| 240       | 100   |       |        |
| 120       | 14.7  | 5.8   | 8.8#   |
| 236       | 25.5  | 20.5  | 30.7   |





#77

Pvrene

Concen: 49.53 ng

RT: 17.10 min Scan# 2578

Delta R.T. -0.01 min

Lab File: BF095253.D

Acq: 19 May 2017 8:20

Instrument :

BNA\_F

ClientSampleId :

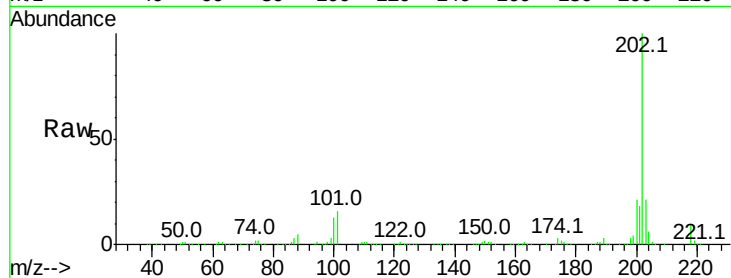
Tot Ion:202 Resp: 648288

Ion Ratio Lower Upper

202 100

200 20.9 17.6 26.4

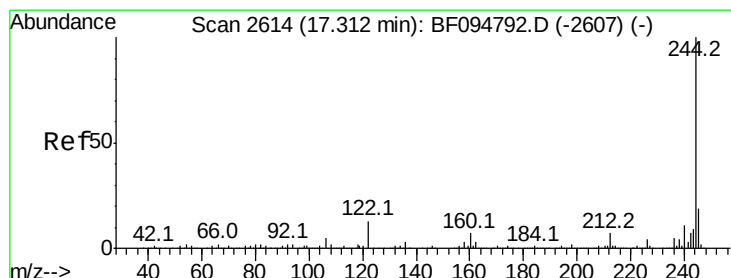
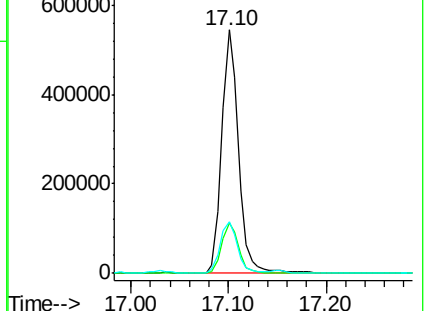
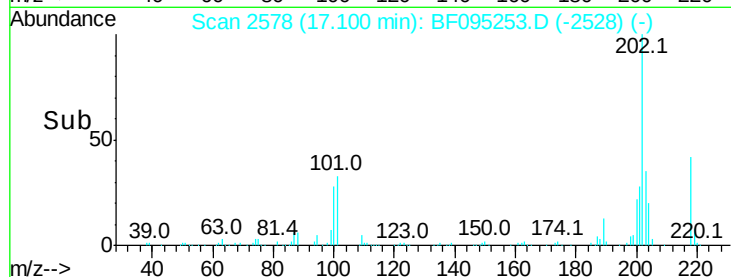
203 21.3 14.4 21.6



Abundance Ion 202.00 (201.70 to 202.70): E

Ion 200.00 (199.70 to 200.70): E

Ion 203.00 (202.70 to 203.70): E



#78

Terphenyl-d14

Concen: 49.47 ng

RT: 17.34 min Scan# 2618

Delta R.T. -0.01 min

Lab File: BF095253.D

Acq: 19 May 2017 8:20

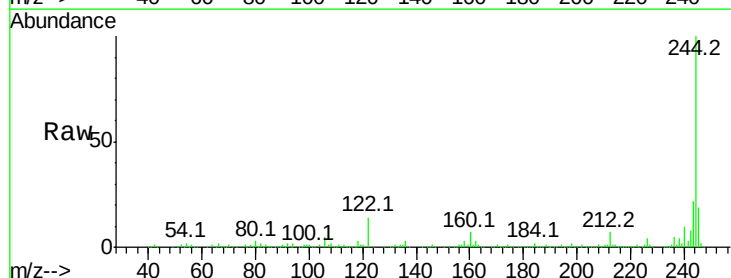
Tgt Ion:244 Resp: 393114

Ion Ratio Lower Upper

244 100

212 6.7 6.0 9.0

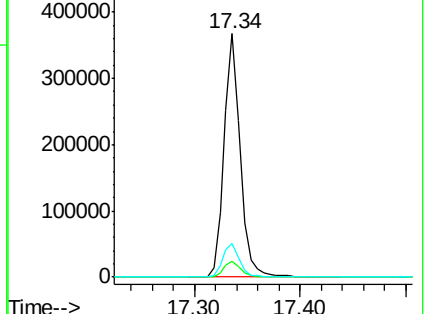
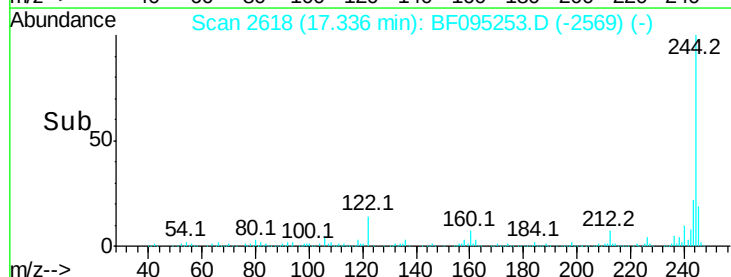
122 13.8 10.3 15.5

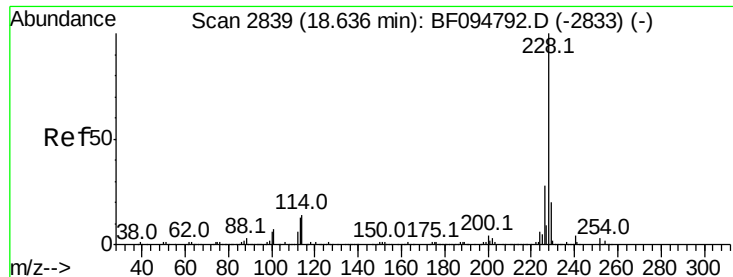


Abundance Ion 244.00 (243.70 to 244.70): E

Ion 212.00 (211.70 to 212.70): E

Ion 122.00 (121.70 to 122.70): E

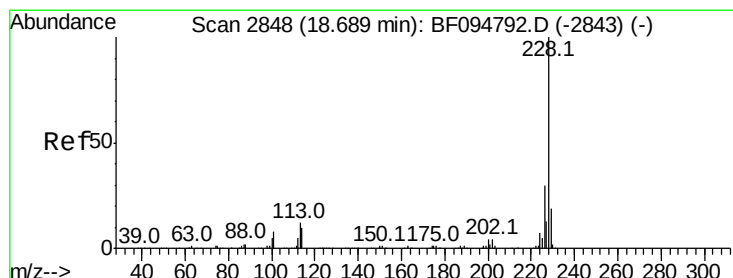
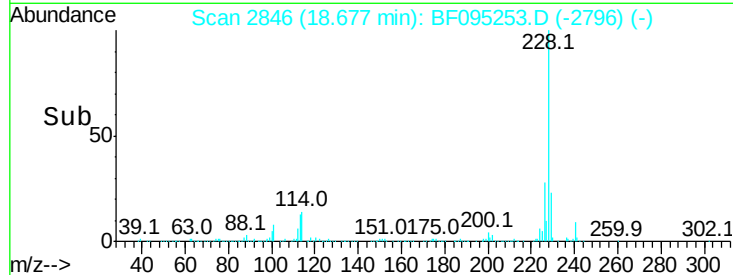
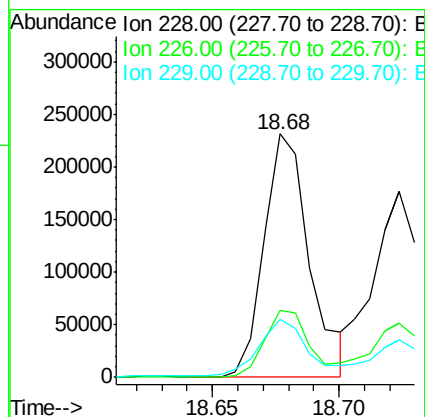
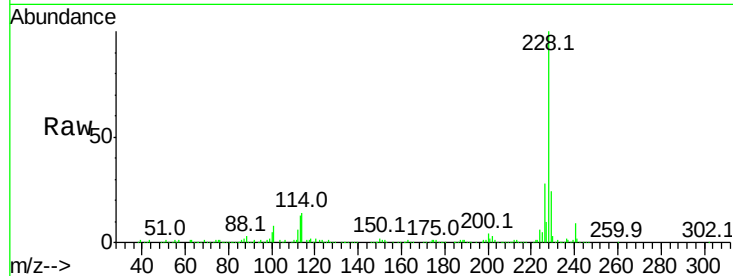




#80  
Benzo(a)anthracene  
Concen: 28.33 ng  
RT: 18.68 min Scan# 2846  
Delta R.T. -0.01 min  
Lab File: BF095253.D  
Acq: 19 May 2017 8:20

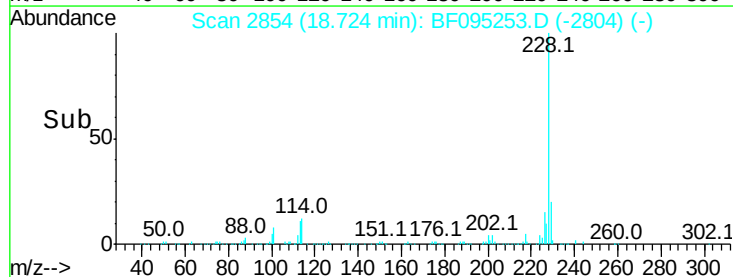
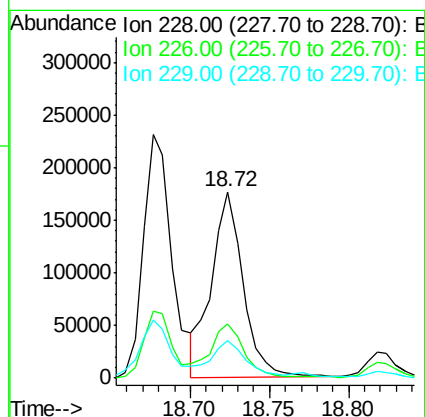
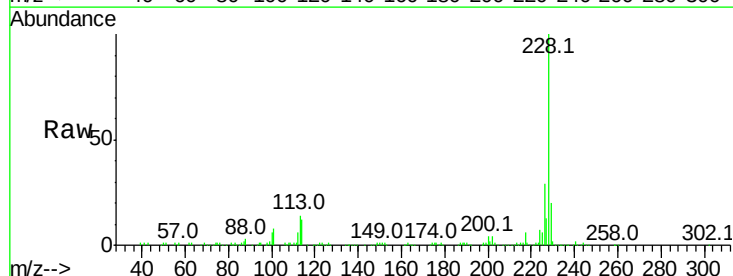
Instrument :  
BNA\_F  
ClientSampleId :

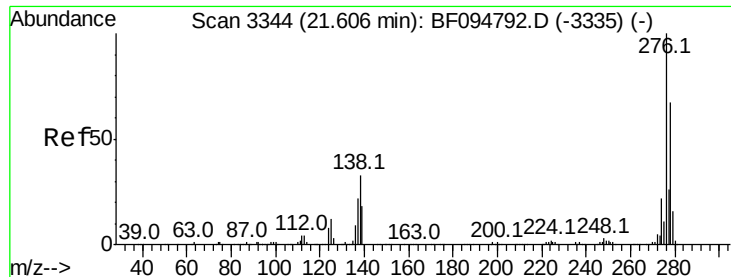
Tot Ion:228 Resp: 288620  
Ion Ratio Lower Upper  
228 100  
226 27.7 22.6 33.8  
229 23.6 16.3 24.5



#82  
Chrysene  
Concen: 24.97 ng  
RT: 18.72 min Scan# 2854  
Delta R.T. -0.01 min  
Lab File: BF095253.D  
Acq: 19 May 2017 8:20

Tgt Ion:228 Resp: 245960  
Ion Ratio Lower Upper  
228 100  
226 29.4 24.9 37.3  
229 20.5 15.8 23.6

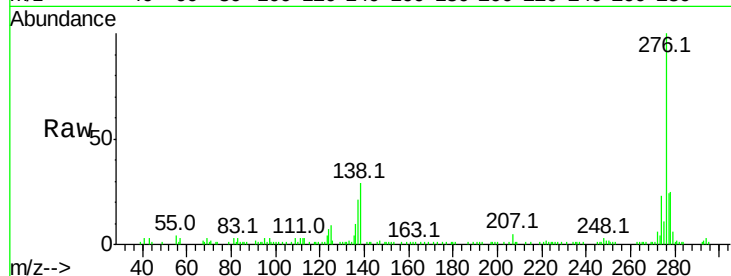




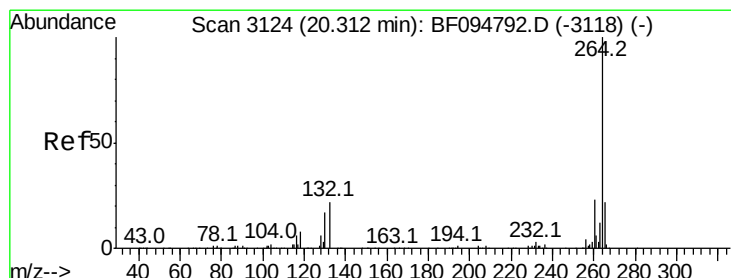
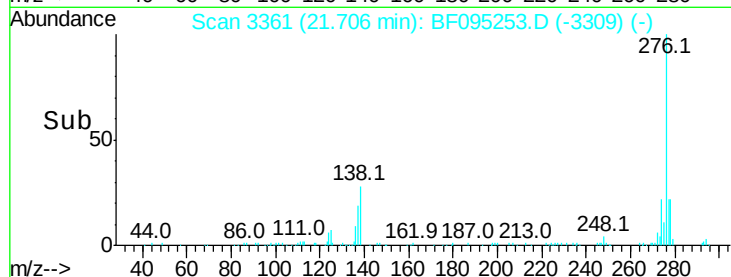
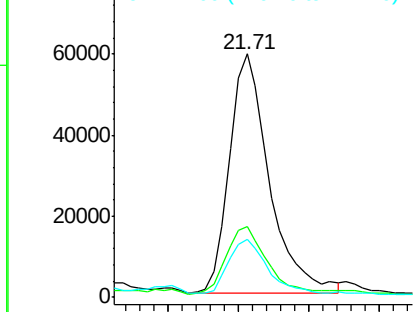
#85  
Indeno(1,2,3-cd)pyrene  
Concen: 14.60 ng  
RT: 21.71 min Scan# 3361  
Delta R.T. 0.01 min  
Lab File: BF095253.D  
Acq: 19 May 2017 8:20

Instrument :  
BNA\_F  
ClientSampleId :

Tot Ion:276 Resp: 116791  
Ion Ratio Lower Upper  
276 100  
138 28.3 27.8 41.6  
277 21.9 20.2 30.4

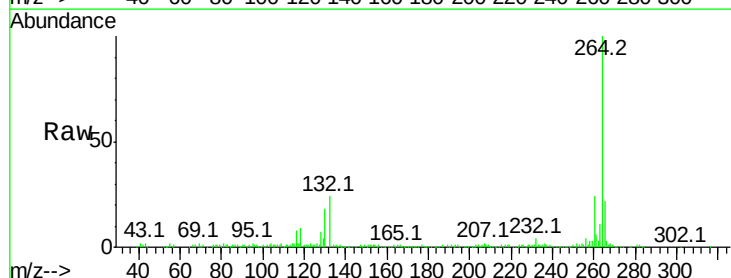


Abundance Ion 276.00 (275.70 to 276.70): E  
Ion 138.00 (137.70 to 138.70): E  
Ion 277.00 (276.70 to 277.70): E

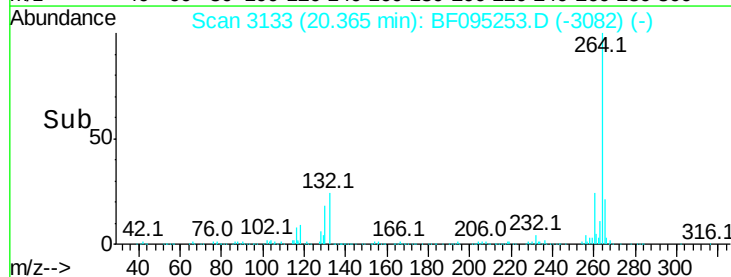
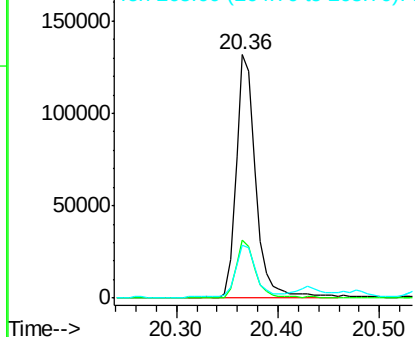


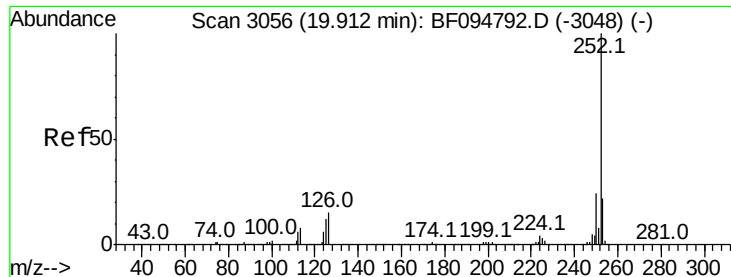
#86  
Perylene-d12  
Concen: 20.00 ng  
RT: 20.36 min Scan# 3133  
Delta R.T. -0.00 min  
Lab File: BF095253.D  
Acq: 19 May 2017 8:20

Tgt Ion:264 Resp: 176806  
Ion Ratio Lower Upper  
264 100  
260 23.7 19.5 29.3  
265 21.7 17.2 25.8



Abundance Ion 264.00 (263.70 to 264.70): E  
Ion 260.00 (259.70 to 260.70): E  
Ion 265.00 (264.70 to 265.70): E





#87

Benzo(b)fluoranthene

Concen: 38.01 ng

RT: 19.96 min Scan# 3064

Delta R.T. -0.00 min

Lab File: BF095253.D

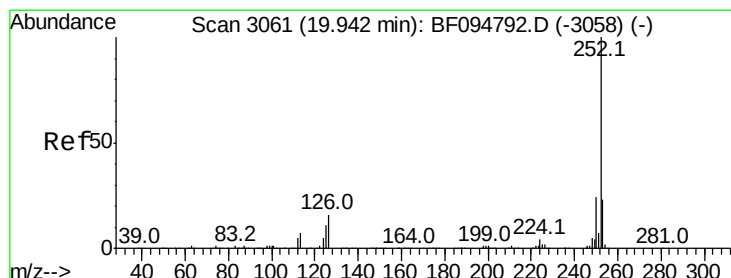
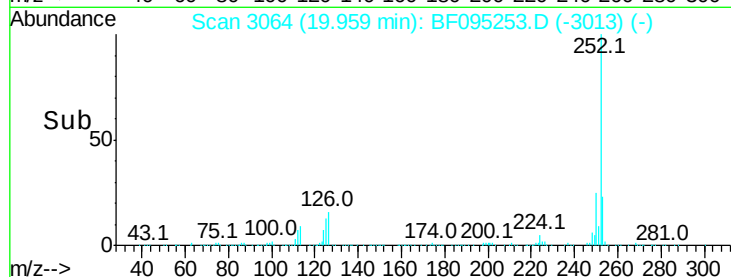
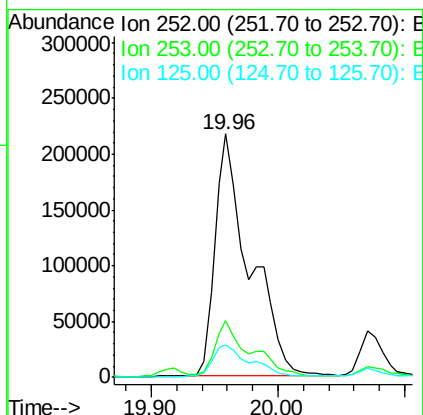
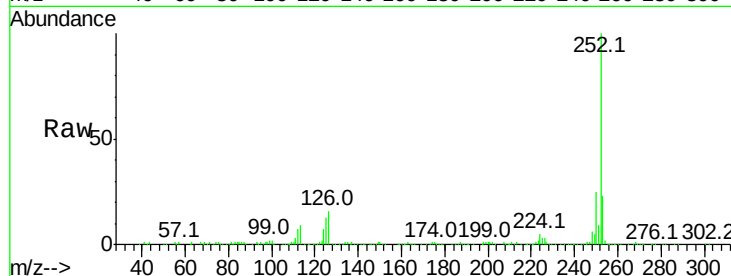
Acq: 19 May 2017 8:20

Instrument :

BNA\_F

ClientSampled :

|             |       |           |
|-------------|-------|-----------|
| Tot Ion:252 | Resp: | 415261    |
| Ion Ratio   | Lower | Upper     |
| 252         | 100   |           |
| 253         | 23.2  | 18.1 27.1 |
| 125         | 13.3  | 9.8 14.8  |



#88

Benzo(k)fluoranthene

Concen: 39.40 ng

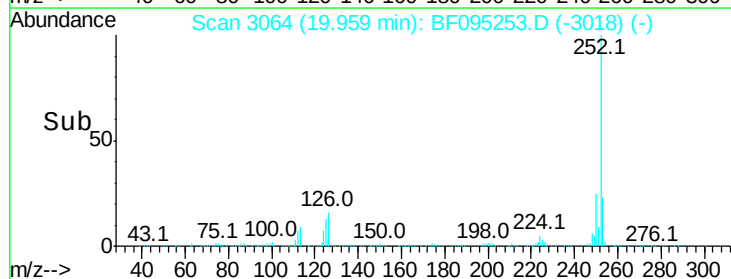
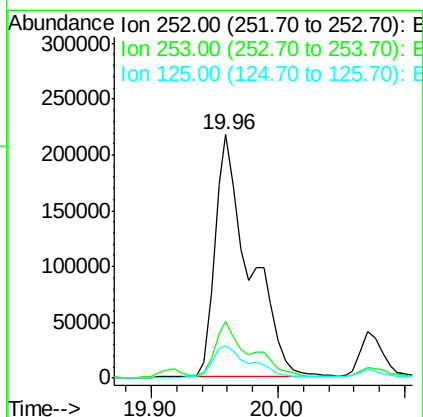
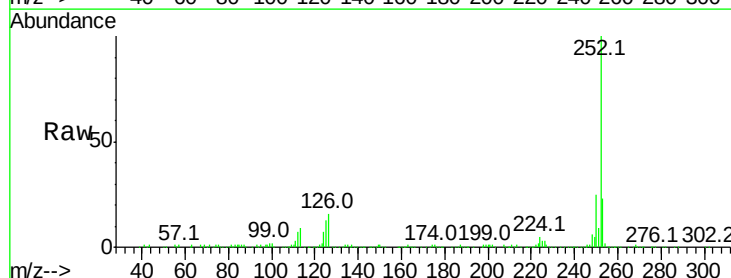
RT: 19.96 min Scan# 3064

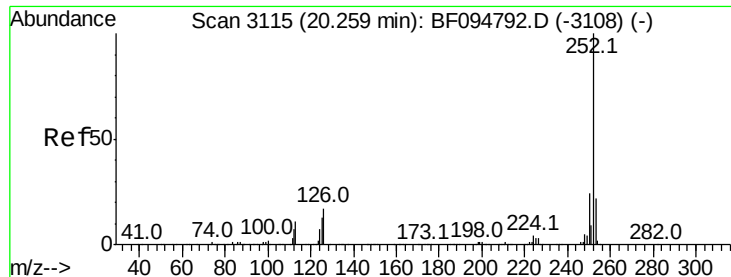
Delta R.T. -0.03 min

Lab File: BF095253.D

Acq: 19 May 2017 8:20

|             |       |           |
|-------------|-------|-----------|
| Tgt Ion:252 | Resp: | 415261    |
| Ion Ratio   | Lower | Upper     |
| 252         | 100   |           |
| 253         | 23.2  | 18.4 27.6 |
| 125         | 13.3  | 13.1 19.7 |





#89

Benzo(a)pyrene

Concen: 21.45 ng

RT: 20.31 min Scan# 3124

Delta R.T. -0.00 min

Lab File: BF095253.D

Acq: 19 May 2017 8:20

Instrument :

BNA\_F

ClientSampled :

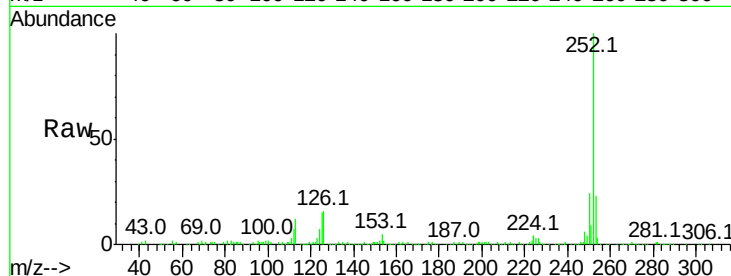
Tot Ion:252 Resp: 216211

Ion Ratio Lower Upper

252 100

253 22.5 17.5 26.3

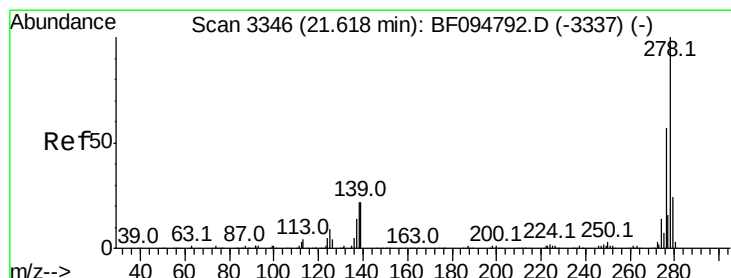
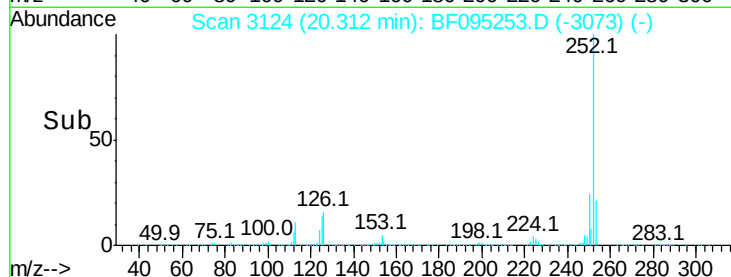
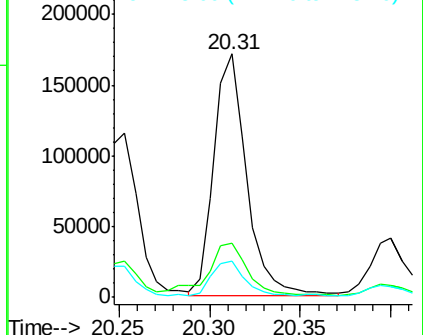
125 14.7 11.0 16.4



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



#90

Dibenzo(a,h)anthracene

Concen: 3.75 ng

RT: 21.71 min Scan# 3361

Delta R.T. 0.01 min

Lab File: BF095253.D

Acq: 19 May 2017 8:20

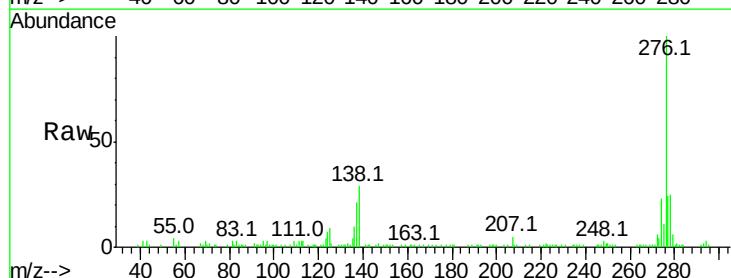
Tgt Ion:278 Resp: 31196

Ion Ratio Lower Upper

278 100

139 0.0 16.6 24.8#

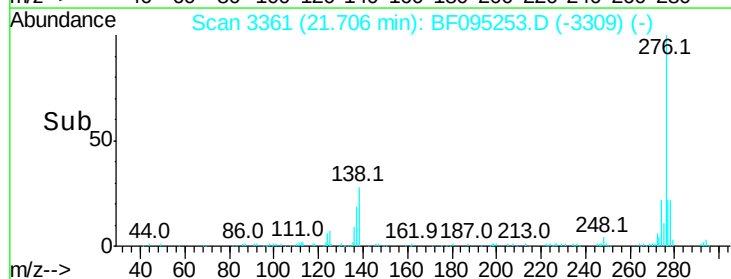
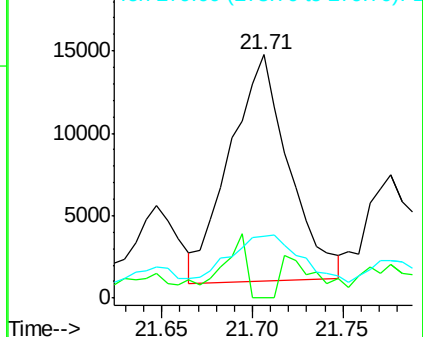
279 25.3 19.3 28.9



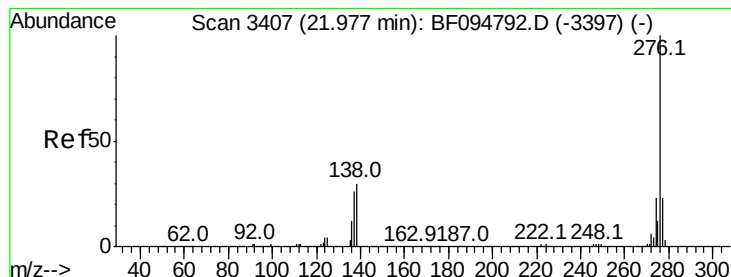
Abundance Ion 278.00 (277.70 to 278.70): E

Ion 139.00 (138.70 to 139.70): E

Ion 279.00 (278.70 to 279.70): E







#91

Benzo(a,h,i)perylene

Concen: 12.15 ng

RT: 22.09 min Scan# 3427

Delta R.T. 0.01 min

Lab File: BF095253.D

Acq: 19 May 2017 8:20

Instrument :

BNA\_F

ClientSampleId :

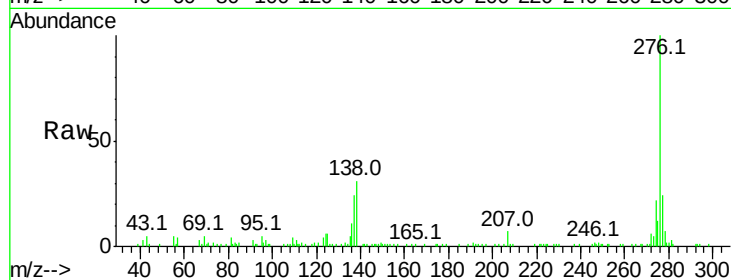
Tot Ion:276 Resp: 99283

Ion Ratio Lower Upper

276 100

277 23.7 18.6 28.0

138 30.7 25.4 38.0



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

