

Data Path : \\74.0.250.170\SV0ASRV\HPCHEM1\BNA F\DATA\BF030518\  
 Data File : BF103411.D  
 Acq On : 5 Mar 2018 15:57  
 Operator : SJ/JU  
 Sample : J1751-13 2X  
 Misc :  
 ALS Vial : 13 Sample Multiplier: 1

Instrument :  
 BNA\_F  
 ClientSampleId :

Quant Time: Mar 05 16:59:50 2018  
 Quant Method : Z:\HPCHEM1\BNA F\METHODS\8270-BF022218.M  
 Quant Title : ASP BNA STANDARDS FOR 5 POINT CALIBRATION  
 QLast Update : Mon Mar 05 13:40:47 2018  
 Response via : Initial Calibration

| Internal Standards        | R.T.  | QIon | Response | Conc  | Units | Dev(Min) |
|---------------------------|-------|------|----------|-------|-------|----------|
| 1) 1,4-Dichlorobenzene-d4 | 6.87  | 152  | 132081   | 20.00 | ng    | 0.00     |
| 21) Naphthalene-d8        | 8.16  | 136  | 501032   | 20.00 | ng    | 0.00     |
| 38) Acenaphthene-d10      | 9.92  | 164  | 185279   | 20.00 | ng    | 0.00     |
| 63) Phenanthrene-d10      | 11.41 | 188  | 290209   | 20.00 | ng    | 0.00     |
| 75) Chrysene-d12          | 14.07 | 240  | 243406   | 20.00 | ng    | 0.00     |
| 86) Perylene-d12          | 15.59 | 264  | 165341   | 20.00 | ng    | 0.01     |

## System Monitoring Compounds

|                          |       |     |        |       |    |      |
|--------------------------|-------|-----|--------|-------|----|------|
| 5) 2-Fluorophenol        | 5.50  | 112 | 366592 | 41.98 | ng | 0.00 |
| 7) Phenol-d6             | 6.52  | 99  | 445061 | 41.65 | ng | 0.00 |
| 23) Nitrobenzene-d5      | 7.44  | 82  | 249140 | 28.40 | ng | 0.00 |
| 41) 2,4,6-Tribromophenol | 10.71 | 330 | 48514  | 30.93 | ng | 0.00 |
| 44) 2-Fluorobiphenyl     | 9.23  | 172 | 363627 | 27.92 | ng | 0.00 |
| 78) Terphenyl-d14        | 13.00 | 244 | 278753 | 27.53 | ng | 0.00 |

## Target Compounds

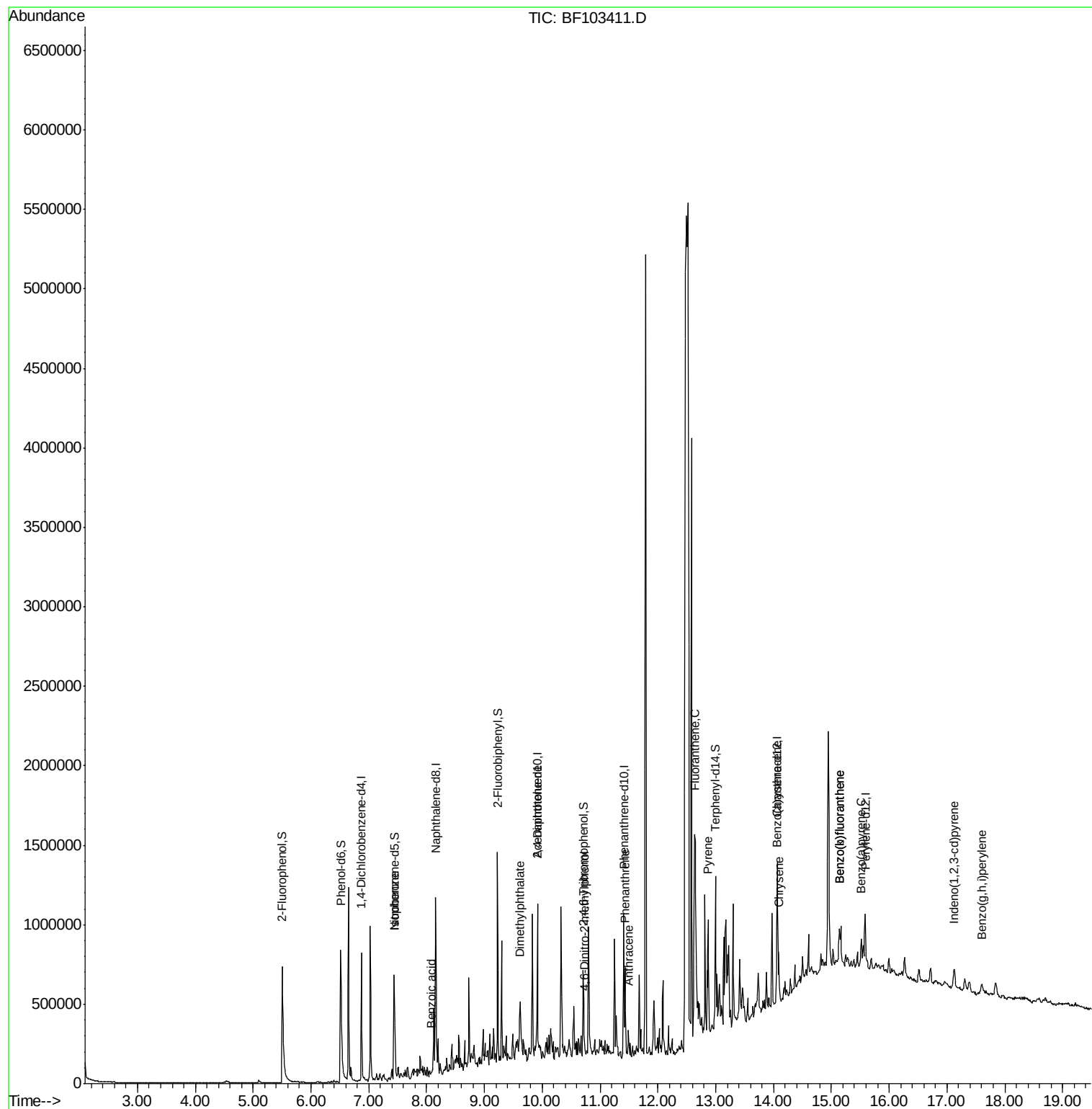
|                                |       |     |        |           |    | Qvalue |
|--------------------------------|-------|-----|--------|-----------|----|--------|
| 9) Benzaldehyde                | 6.44  | 77  | 264    | Below Cal | #  | 42     |
| 25) Isophorone                 | 7.44  | 82  | 247026 | 14.296    | ng | # 65   |
| 32) Benzoic acid               | 8.07  | 122 | 116    | 6.933     | ng | # 1    |
| 49) Dimethylphthalate          | 9.62  | 163 | 61084  | 4.110     | ng | # 99   |
| 56) 2,4-Dinitrotoluene         | 9.92  | 165 | 27345  | 6.932     | ng | # 25   |
| 64) 4,6-Dinitro-2-methylphenol | 10.73 | 198 | 110    | 5.001     | ng | # 1    |
| 70) Phenanthrene               | 11.43 | 178 | 171436 | 10.734    | ng | # 99   |
| 71) Anthracene                 | 11.49 | 178 | 62682  | 3.827     | ng | # 98   |
| 74) Fluoranthene               | 12.63 | 202 | 296750 | 18.490    | ng | # 98   |
| 77) Pyrene                     | 12.87 | 202 | 279627 | 14.735    | ng | # 99   |
| 80) Benzo(a)anthracene         | 14.06 | 228 | 145522 | 9.214     | ng | # 99   |
| 82) Chrysene                   | 14.09 | 228 | 124047 | 8.089     | ng | # 98   |
| 85) Indeno(1,2,3-cd)pyrene     | 17.13 | 276 | 42964  | 3.539     | ng | # 96   |
| 87) Benzo(b)fluoranthene       | 15.14 | 252 | 175110 | 16.108    | ng | # 91   |
| 88) Benzo(k)fluoranthene       | 15.14 | 252 | 175110 | 17.106    | ng | # 94   |
| 89) Benzo(a)pyrene             | 15.52 | 252 | 85916  | 8.850     | ng | # 92   |
| 91) Benzo(a,h,i)perylene       | 17.60 | 276 | 40610  | 5.539     | ng | # 89   |

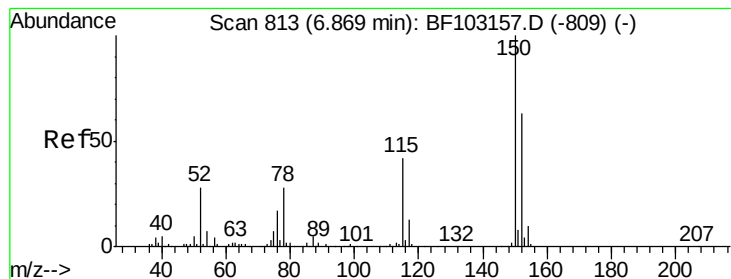
(#) = qualifier out of range (m) = manual integration (+) = signals summed

Data Path : \\74.0.250.170\SVOASRV\HPCHEM1\BNA F\DATA\BF030518\  
Data File : BF103411.D  
Acq On : 5 Mar 2018 15:57  
Operator : SJ/JU  
Sample : J1751-13 2X  
Misc :  
ALS Vial : 13 Sample Multiplier: 1

Instrument :  
BNA\_F  
ClientSampleId :

Quant Time: Mar 05 16:59:50 2018  
Quant Method : Z:\HPCHEM1\BNA F\METHODS\8270-BF022218.M  
Quant Title : ASP BNA STANDARDS FOR 5 POINT CALIBRATION  
QLast Update : Mon Mar 05 13:40:47 2018  
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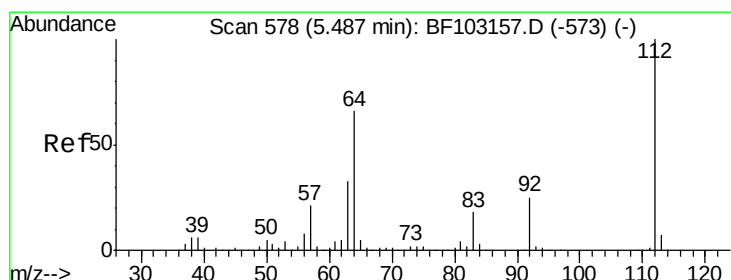
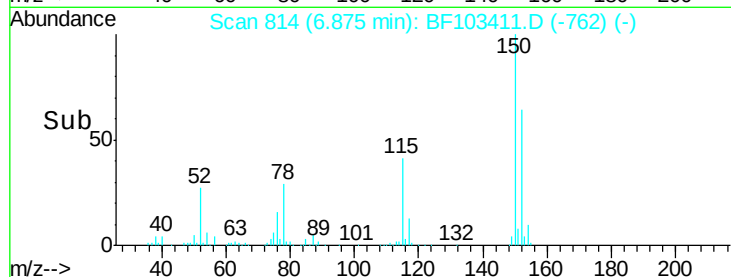
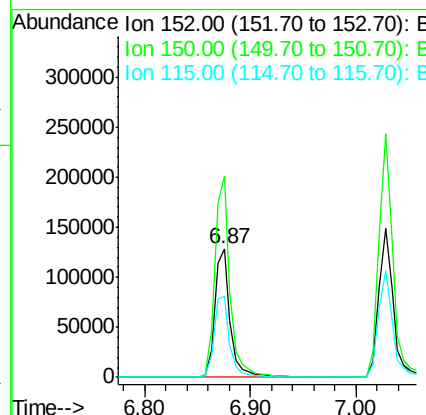
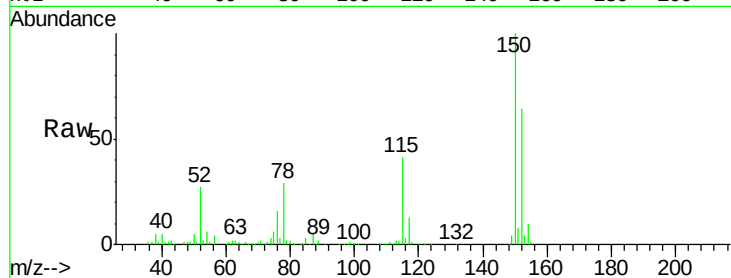


#1

1,4-Dichlorobenzene-d4  
Concen: 20.000 ng  
RT: 6.87 min Scan# 814  
Delta R.T. 0.01 min  
Lab File: BF103411.D  
Acq: 5 Mar 2018 15:57

Instrument :  
BNA\_F  
ClientSampleId :

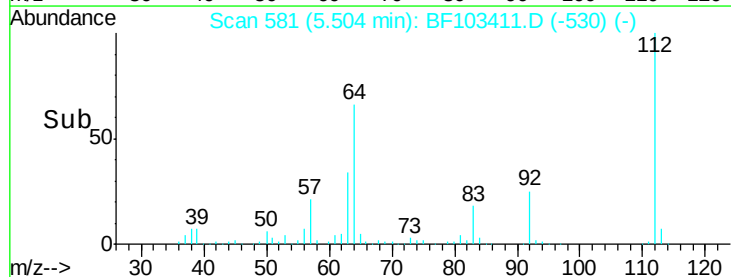
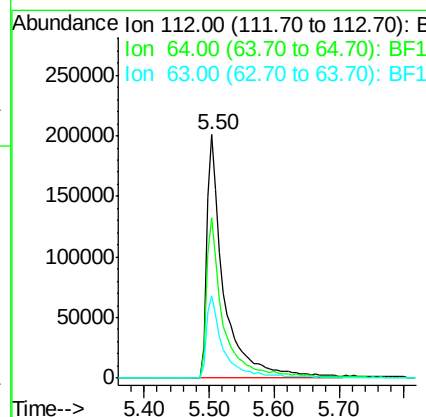
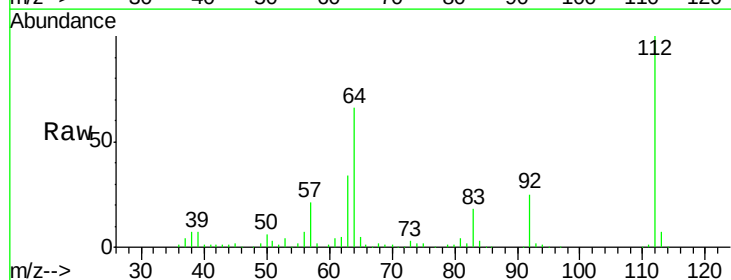
| Tot Ion   | 152   | Resp  | 132081 |
|-----------|-------|-------|--------|
| Ion Ratio | Lower | Upper |        |
| 152       | 100   |       |        |
| 150       | 156.4 | 124.6 | 186.8  |
| 115       | 63.5  | 50.1  | 75.1   |

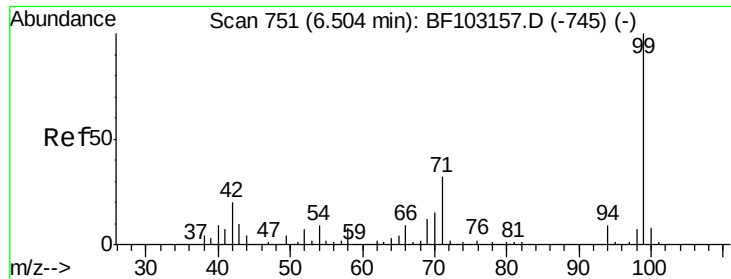


#5

2-Fluorophenol  
Concen: 41.978 ng  
RT: 5.50 min Scan# 581  
Delta R.T. 0.00 min  
Lab File: BF103411.D  
Acq: 5 Mar 2018 15:57

| Tgt Ion   | 112   | Resp  | 366592 |
|-----------|-------|-------|--------|
| Ion Ratio | Lower | Upper |        |
| 112       | 100   |       |        |
| 64        | 66.0  | 47.9  | 71.9   |
| 63        | 34.0  | 23.7  | 35.5   |





#7

Phenol-d6

Concen: 41.648 ng

RT: 6.52 min Scan# 753

Delta R.T. -0.01 min

Lab File: BF103411.D

Acq: 5 Mar 2018 15:57

Instrument :

BNA\_F

ClientSampleId :

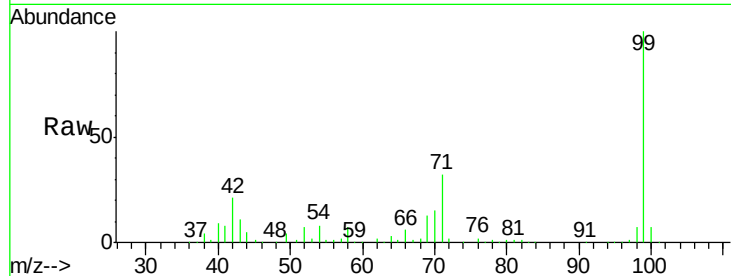
Tot Ion: 99 Resp: 445061

Ion Ratio Lower Upper

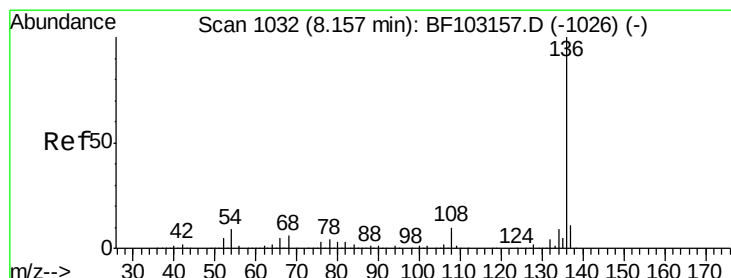
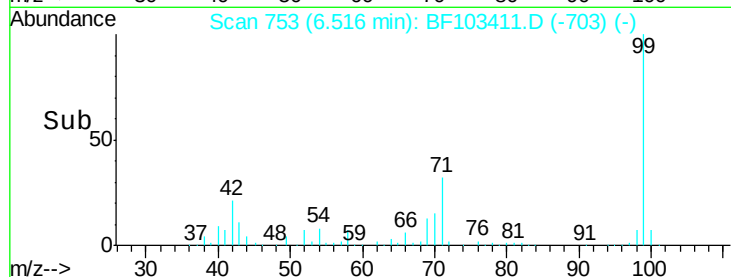
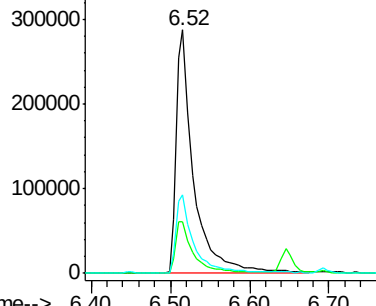
99 100

42 21.1 14.5 21.7

71 32.0 25.4 38.0



Abundance Ion 99.00 (98.70 to 99.70): BF1  
Ion 42.00 (41.70 to 42.70): BF1  
Ion 71.00 (70.70 to 71.70): BF1



#21

Naphthalene-d8

Concen: 20.000 ng

RT: 8.16 min Scan# 1032

Delta R.T. 0.00 min

Lab File: BF103411.D

Acq: 5 Mar 2018 15:57

Tgt Ion: 136 Resp: 501032

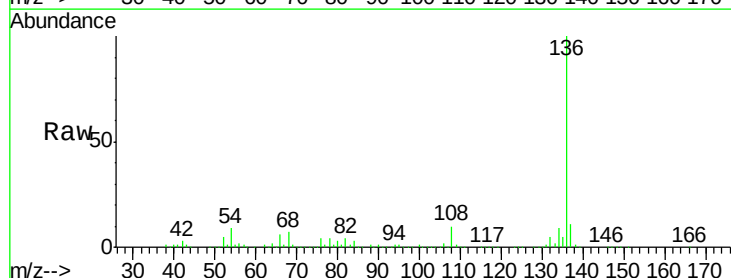
Ion Ratio Lower Upper

136 100

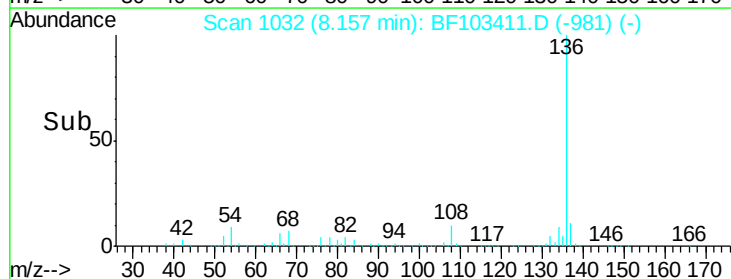
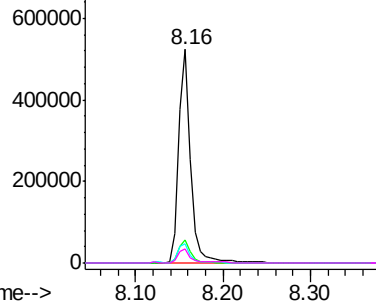
137 11.0 8.9 13.3

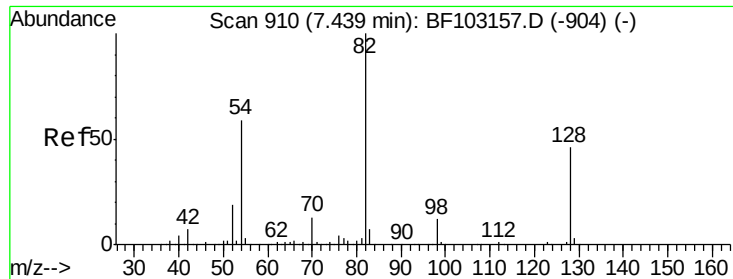
54 8.9 6.6 9.8

68 6.7 5.0 7.4



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): BF1  
Ion 68.00 (67.70 to 68.70): BF1

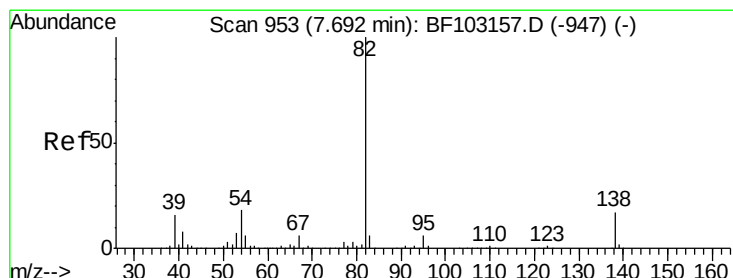
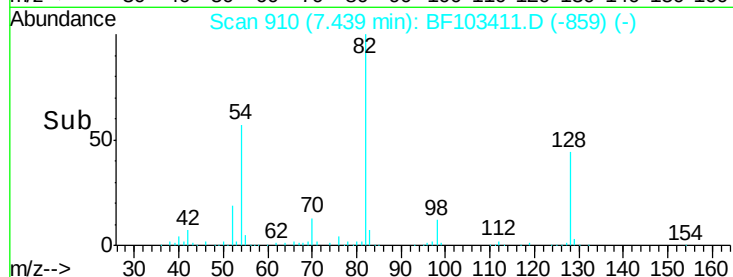
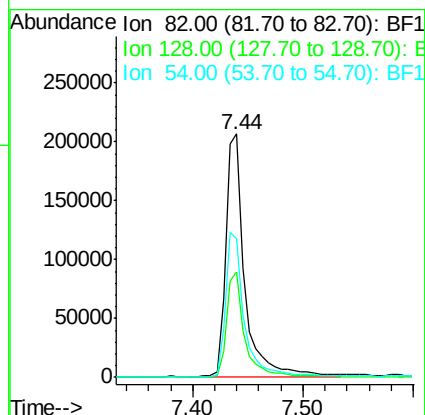
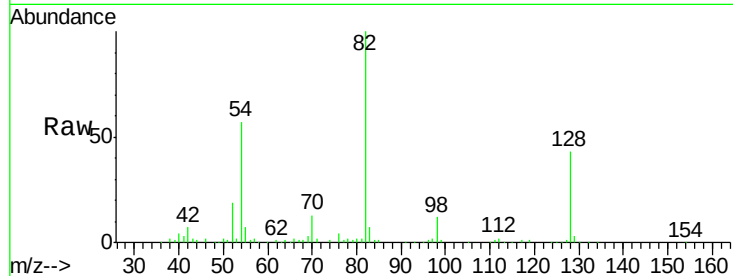




#23  
 Nitrobenzene-d5  
 Concen: 28.397 ng  
 RT: 7.44 min Scan# 910  
 Delta R.T. 0.00 min  
 Lab File: BF103411.D  
 Acq: 5 Mar 2018 15:57

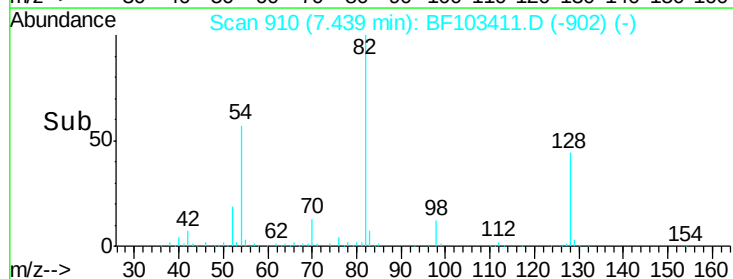
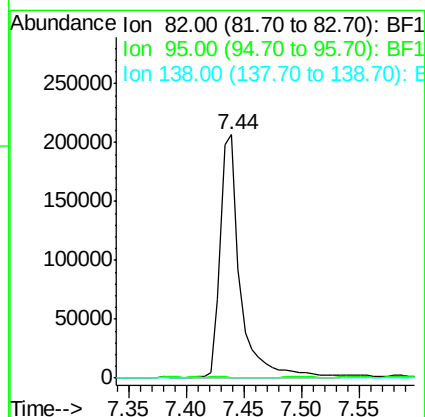
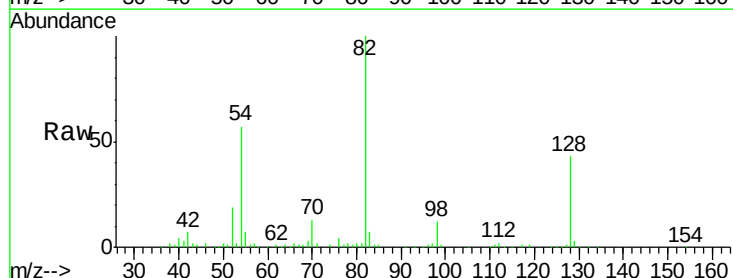
Instrument :  
 BNA\_F  
 ClientSampleId :

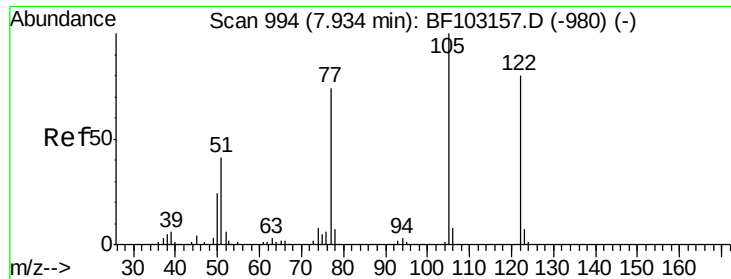
| Tot Ion   | 82    | Resp  | 249140 |
|-----------|-------|-------|--------|
| Ion Ratio | Lower | Upper |        |
| 82        | 100   |       |        |
| 128       | 43.4  | 36.1  | 54.1   |
| 54        | 57.1  | 41.4  | 62.2   |



#25  
 Isophorone  
 Concen: 14.296 ng  
 RT: 7.44 min Scan# 910  
 Delta R.T. -0.25 min  
 Lab File: BF103411.D  
 Acq: 5 Mar 2018 15:57

| Tgt Ion   | 82    | Resp  | 247026 |
|-----------|-------|-------|--------|
| Ion Ratio | Lower | Upper |        |
| 82        | 100   |       |        |
| 95        | 0.4   | 5.2   | 7.8#   |
| 138       | 0.0   | 14.9  | 22.3#  |





#32

Benzoic acid

Concen: 6.933 ng

RT: 8.07 min Scan# 1017

Delta R.T. 0.11 min

Lab File: BF103411.D

Acq: 5 Mar 2018 15:57

Instrument :

BNA\_F

ClientSampled :

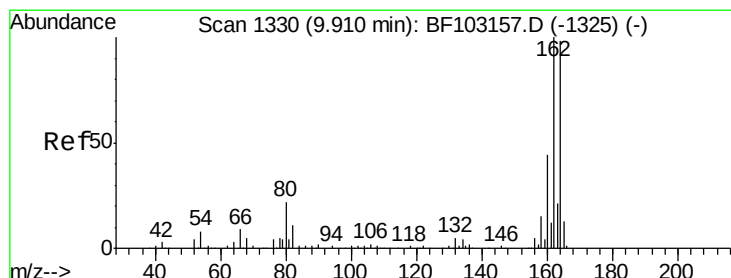
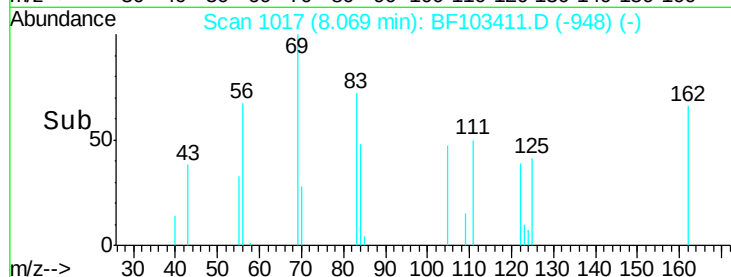
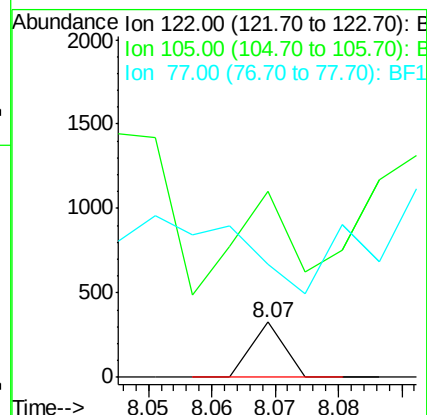
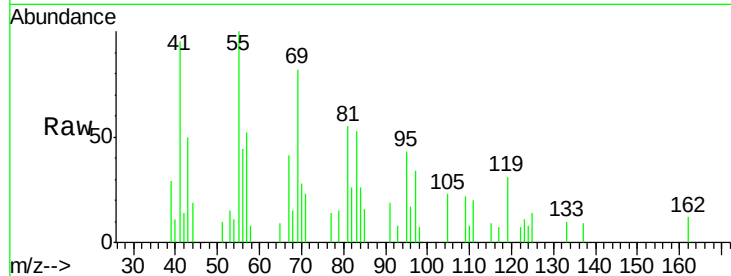
Tot Ion:122 Resp: 116

Ion Ratio Lower Upper

122 100

105 336.3 101.1 141.1#

77 204.9 70.7 110.7#



#38

Acenaphthene-d10

Concen: 20.000 ng

RT: 9.92 min Scan# 1331

Delta R.T. 0.00 min

Lab File: BF103411.D

Acq: 5 Mar 2018 15:57

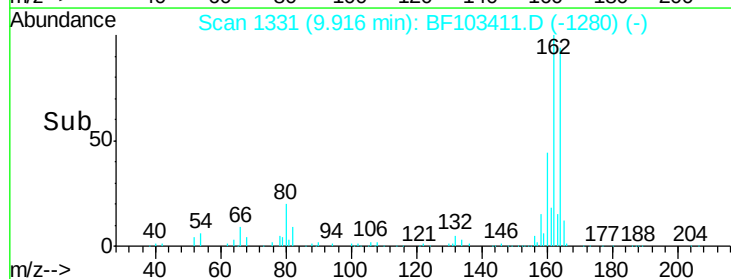
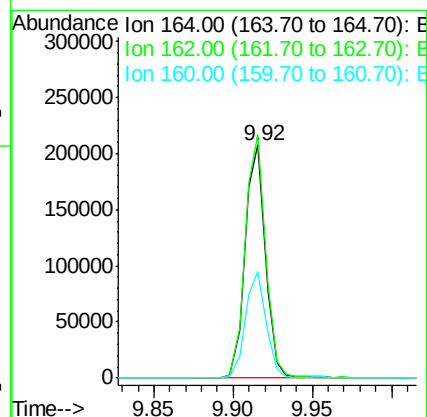
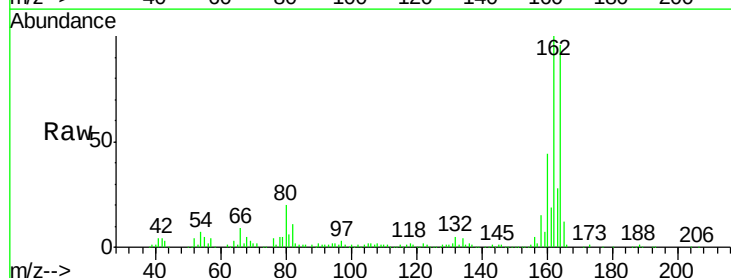
Tgt Ion:164 Resp: 185279

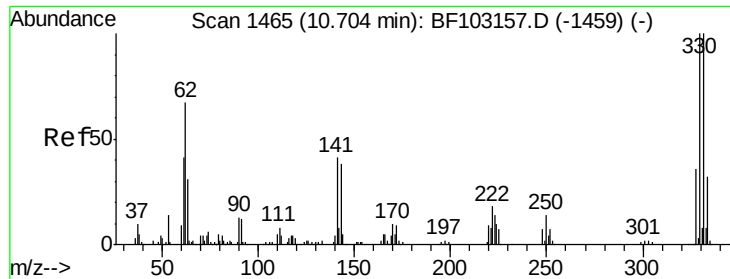
Ion Ratio Lower Upper

164 100

162 104.6 86.1 129.1

160 46.0 38.3 57.5

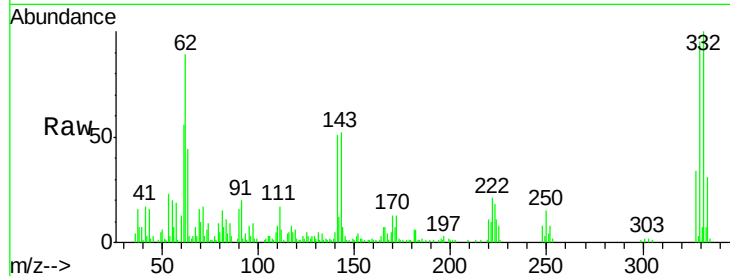




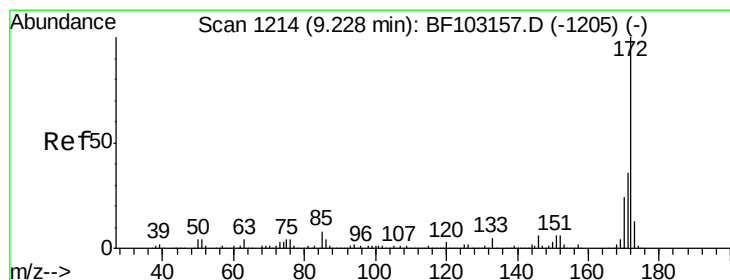
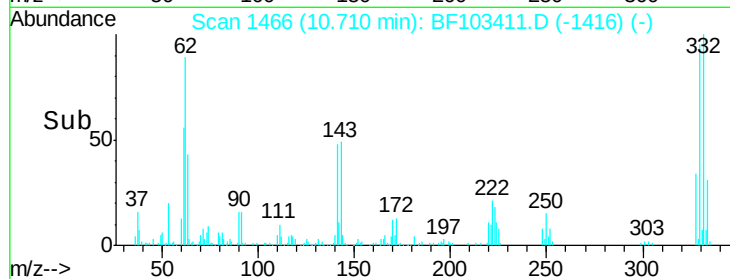
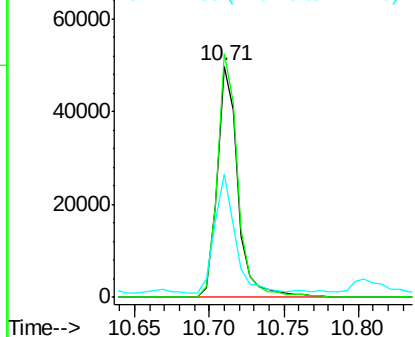
#41  
 2,4,6-Tribromophenol  
 Concen: 30.934 ng  
 RT: 10.71 min Scan# 1466  
 Delta R.T. -0.01 min  
 Lab File: BF103411.D  
 Acq: 5 Mar 2018 15:57

Instrument :  
 BNA\_F  
 ClientSampleId :

Tot Ion:330 Resp: 48514  
 Ion Ratio Lower Upper  
 330 100  
 332 103.9 77.0 115.6  
 141 49.5 29.9 44.9#

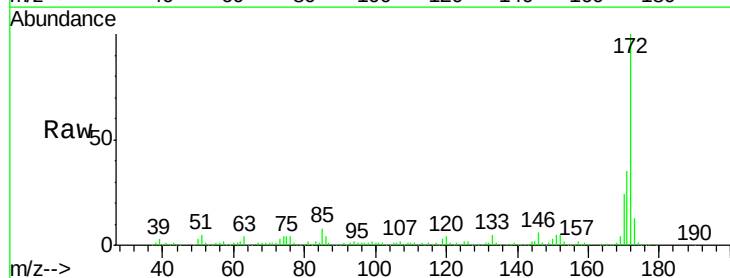


Abundance Ion 329.80 (329.50 to 330.50): E  
 Ion 331.80 (331.50 to 332.50): E  
 Ion 141.00 (140.70 to 141.70): E

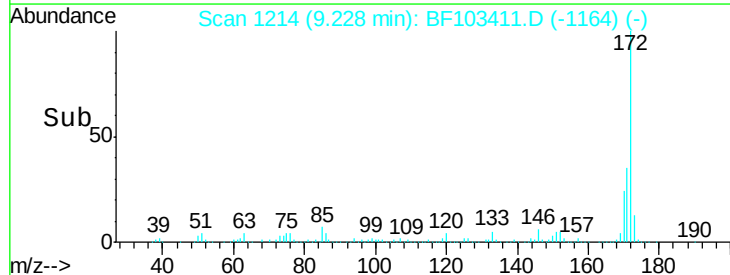
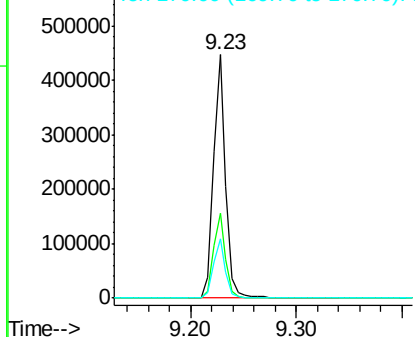


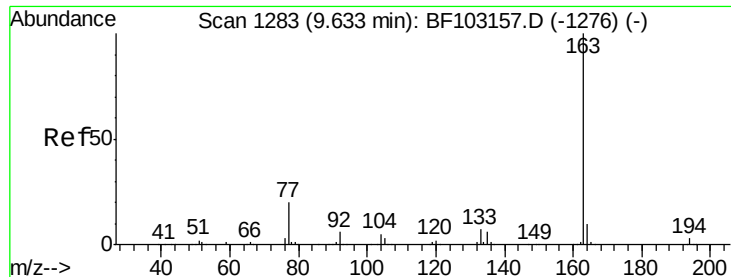
#44  
 2-Fluorobiphenyl  
 Concen: 27.923 ng  
 RT: 9.23 min Scan# 1214  
 Delta R.T. -0.01 min  
 Lab File: BF103411.D  
 Acq: 5 Mar 2018 15:57

Tgt Ion:172 Resp: 363627  
 Ion Ratio Lower Upper  
 172 100  
 171 34.8 29.7 44.5  
 170 24.5 19.6 29.4



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

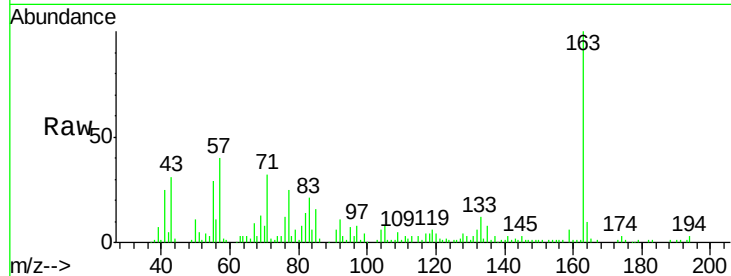




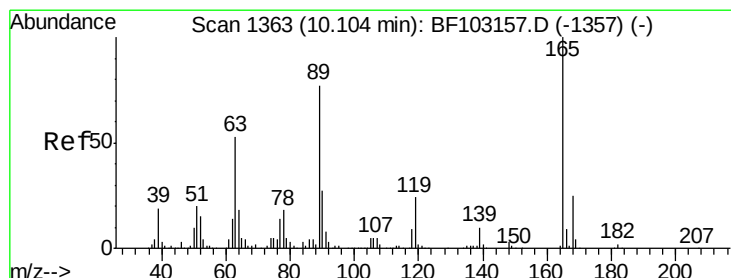
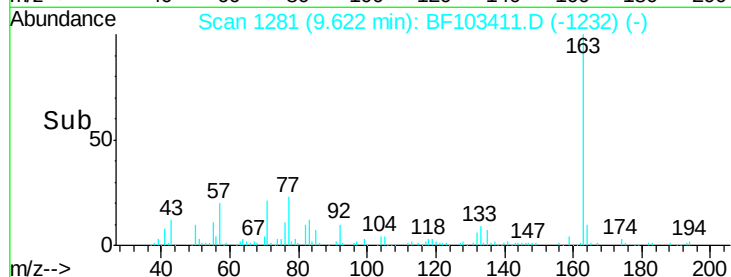
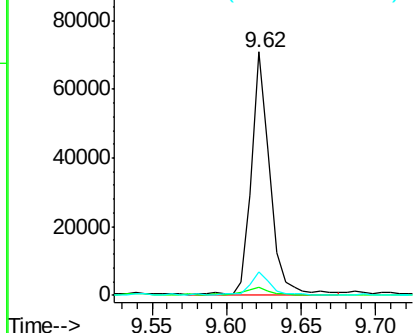
#49  
Dimethylphthalate  
Concen: 4.110 ng  
RT: 9.62 min Scan# 1281  
Delta R.T. -0.01 min  
Lab File: BF103411.D  
Acq: 5 Mar 2018 15:57

Instrument :  
BNA\_F  
ClientSampleId :

Tot Ion:163 Resp: 61084  
Ion Ratio Lower Upper  
163 100  
194 3.2 2.7 4.1  
164 9.6 8.2 12.2

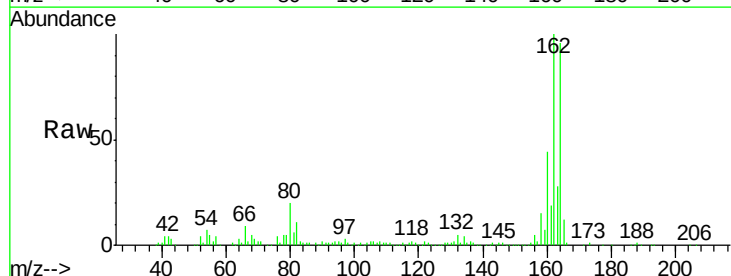


Abundance Ion 163.00 (162.70 to 163.70): E  
Ion 194.00 (193.70 to 194.70): E  
Ion 164.00 (163.70 to 164.70): E

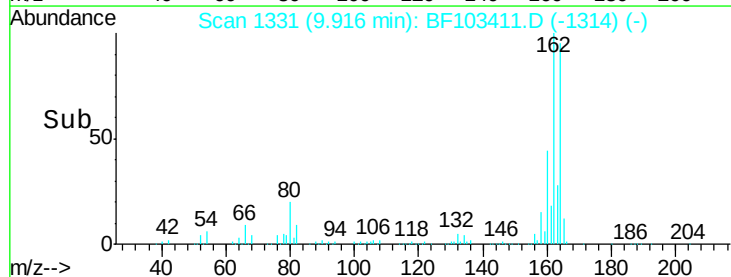
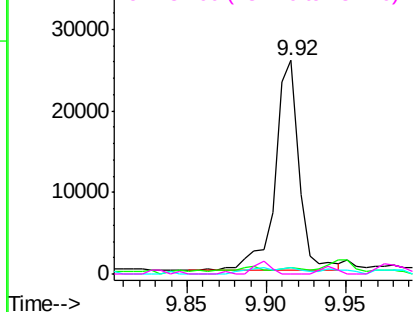


#56  
2,4-Dinitrotoluene  
Concen: 6.932 ng  
RT: 9.92 min Scan# 1331  
Delta R.T. -0.20 min  
Lab File: BF103411.D  
Acq: 5 Mar 2018 15:57

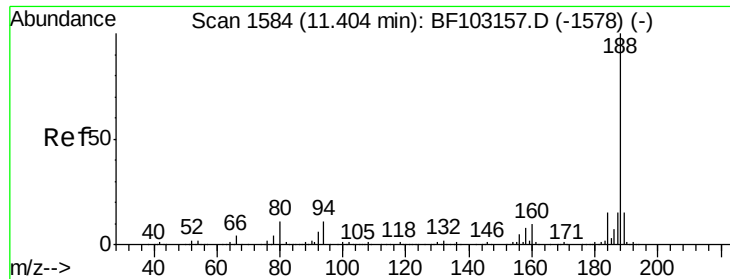
Tgt Ion:165 Resp: 27345  
Ion Ratio Lower Upper  
165 100  
63 2.8 36.4 54.6#  
89 3.2 57.8 86.6#  
182 0.0 1.6 2.4#



Abundance Ion 165.00 (164.70 to 165.70): E  
Ion 63.00 (62.70 to 63.70): BF1  
Ion 89.00 (88.70 to 89.70): BF1  
Ion 182.00 (181.70 to 182.70): E



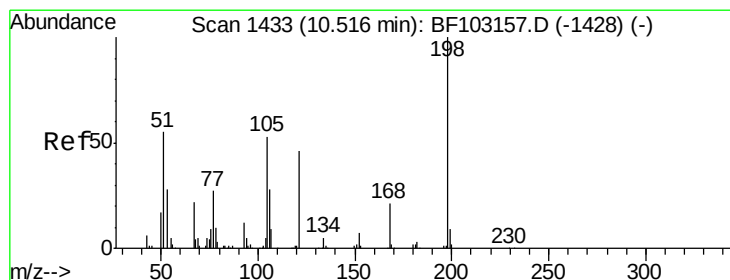
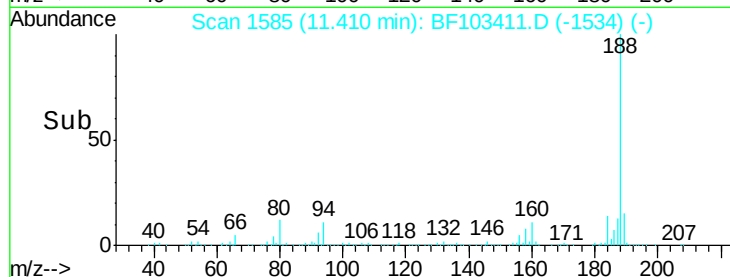
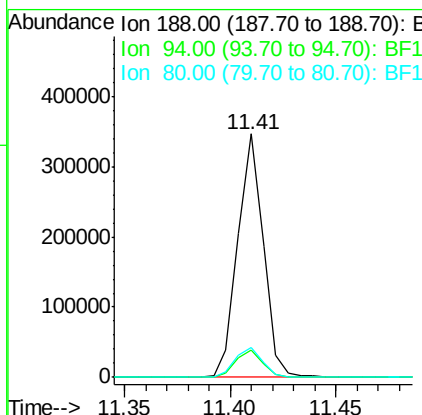
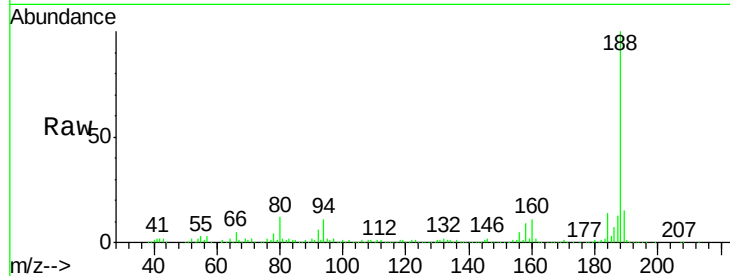




#63  
 Phenanthrene-d10  
 Concen: 20.000 ng  
 RT: 11.41 min Scan# 1585  
 Delta R.T. 0.00 min  
 Lab File: BF103411.D  
 Acq: 5 Mar 2018 15:57

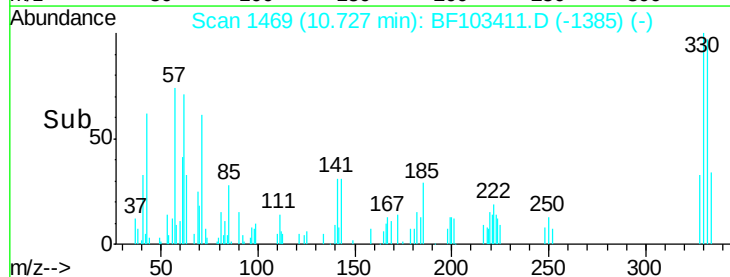
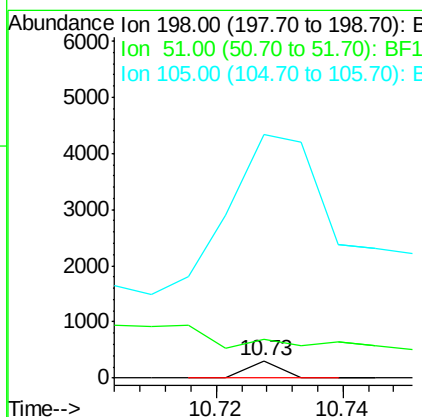
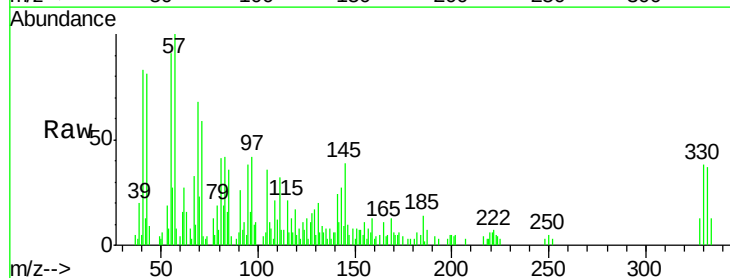
Instrument :  
 BNA\_F  
 ClientSampleId :

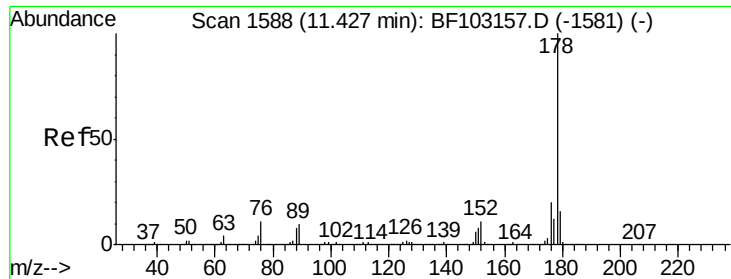
Tot Ion:188 Resp: 290209  
 Ion Ratio Lower Upper  
 188 100  
 94 11.2 8.5 12.7  
 80 12.3 9.2 13.8



#64  
 4,6-Dinitro-2-methylphenol  
 Concen: 5.001 ng  
 RT: 10.73 min Scan# 1469  
 Delta R.T. 0.19 min  
 Lab File: BF103411.D  
 Acq: 5 Mar 2018 15:57

Tgt Ion:198 Resp: 110  
 Ion Ratio Lower Upper  
 198 100  
 51 223.3 37.7 77.7#  
 105 1385.0 36.3 76.3#





#70

Phenanthrene

Concen: 10.734 ng

RT: 11.43 min Scan# 1589

Delta R.T. 0.00 min

Lab File: BF103411.D

Acq: 5 Mar 2018 15:57

Instrument :

BNA\_F

ClientSampleId :

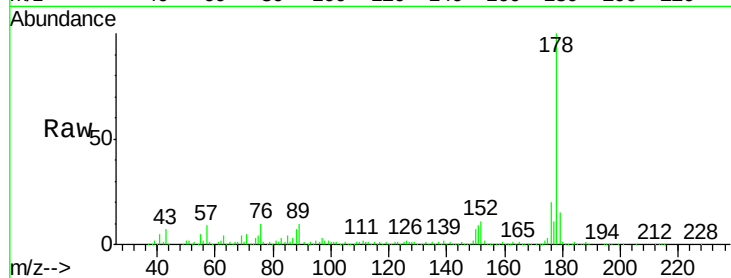
Tot Ion:178 Resp: 171436

Ion Ratio Lower Upper

178 100

176 20.1 15.8 23.8

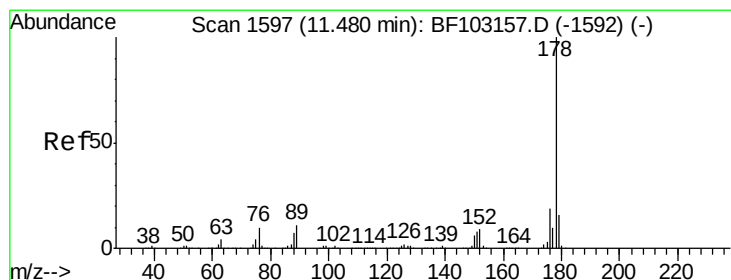
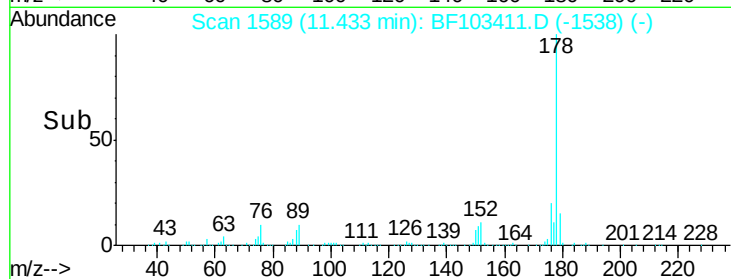
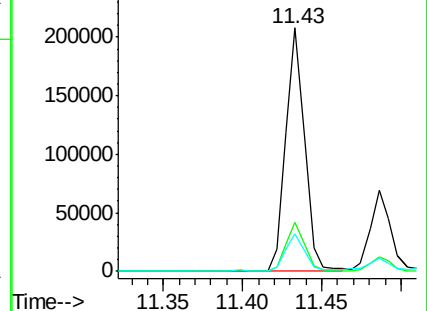
179 15.4 13.0 19.6



Abundance Ion 178.00 (177.70 to 178.70): E

Ion 176.00 (175.70 to 176.70): E

Ion 179.00 (178.70 to 179.70): E



#71

Anthracene

Concen: 3.827 ng

RT: 11.49 min Scan# 1598

Delta R.T. 0.00 min

Lab File: BF103411.D

Acq: 5 Mar 2018 15:57

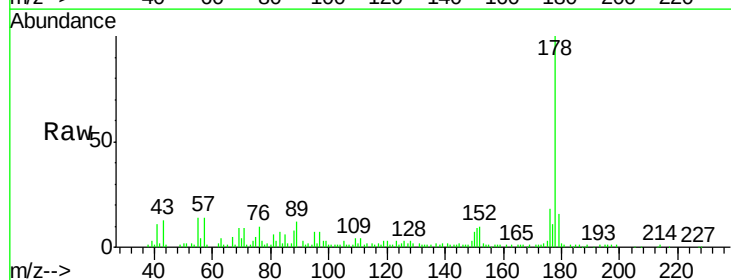
Tgt Ion:178 Resp: 62682

Ion Ratio Lower Upper

178 100

176 18.3 15.4 23.2

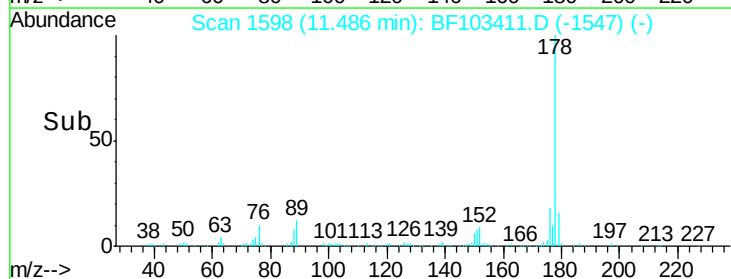
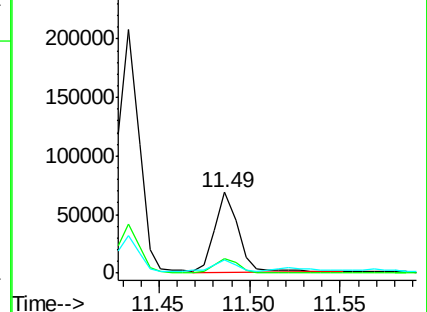
179 16.4 12.6 19.0

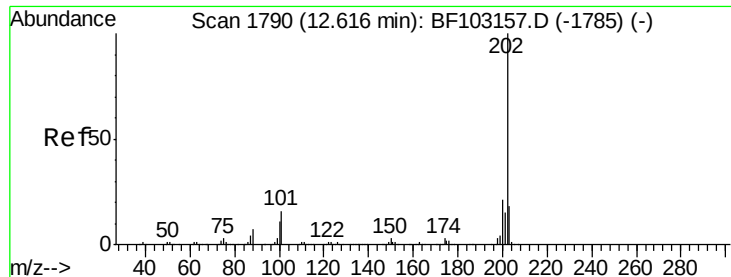


Abundance Ion 178.00 (177.70 to 178.70): E

Ion 176.00 (175.70 to 176.70): E

Ion 179.00 (178.70 to 179.70): E





#74

Fluoranthene

Concen: 18.490 ng

RT: 12.63 min Scan# 1793

Delta R.T. 0.00 min

Lab File: BF103411.D

Acq: 5 Mar 2018 15:57

Instrument :

BNA\_F

ClientSampleId :

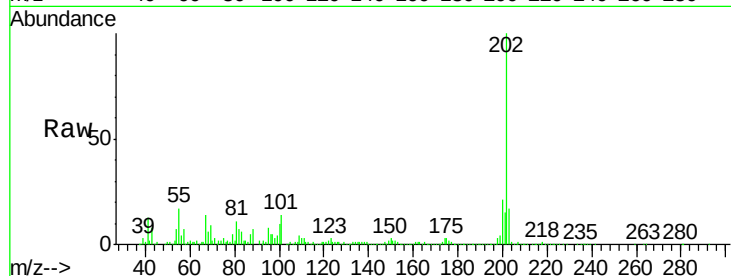
Tot Ion:202 Resp: 296750

Ion Ratio Lower Upper

202 100

101 14.3 0.0 34.1

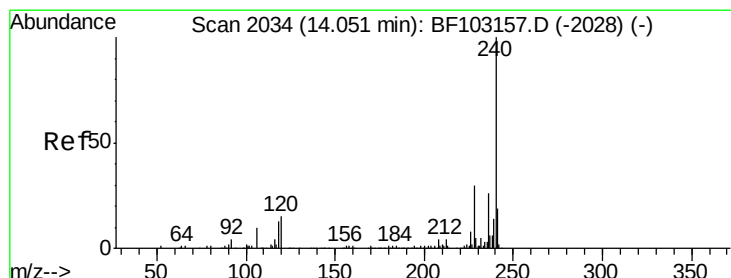
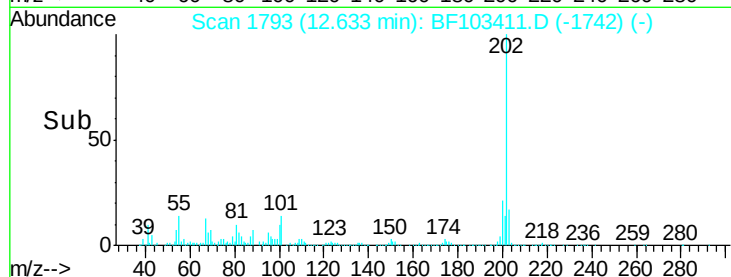
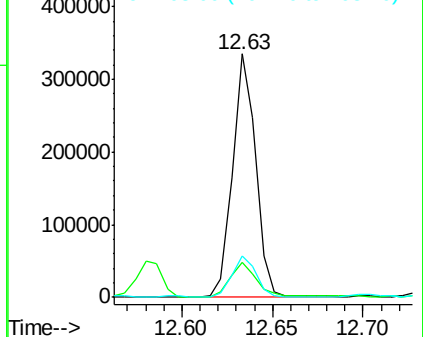
203 17.1 0.0 38.1



Abundance Ion 202.00 (201.70 to 202.70): E

Ion 101.00 (100.70 to 101.70): E

Ion 203.00 (202.70 to 203.70): E



#75

Chrysene-d12

Concen: 20.000 ng

RT: 14.07 min Scan# 2037

Delta R.T. 0.00 min

Lab File: BF103411.D

Acq: 5 Mar 2018 15:57

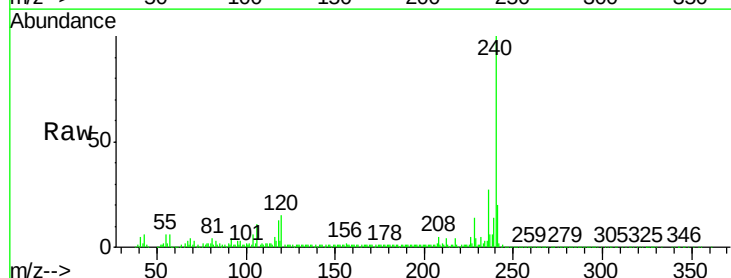
Tgt Ion:240 Resp: 243406

Ion Ratio Lower Upper

240 100

120 15.1 9.5 14.3#

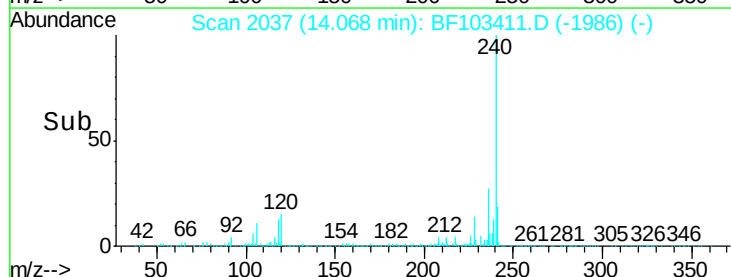
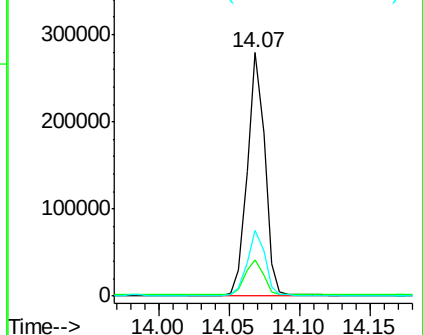
236 27.2 20.7 31.1

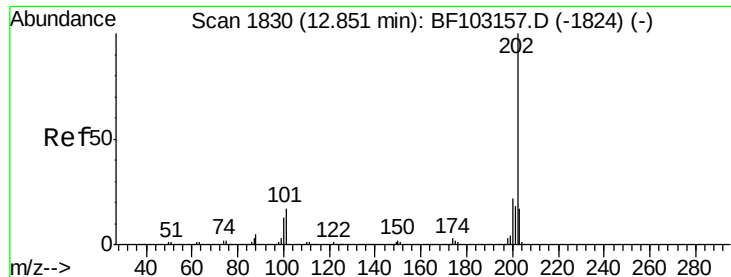


Abundance Ion 240.00 (239.70 to 240.70): E

Ion 120.00 (119.70 to 120.70): E

Ion 236.00 (235.70 to 236.70): E





#77

Pvrene

Concen: 14.735 ng

RT: 12.87 min Scan# 1833

Delta R.T. 0.01 min

Lab File: BF103411.D

Acq: 5 Mar 2018 15:57

Instrument :

BNA\_F

ClientSampleId :

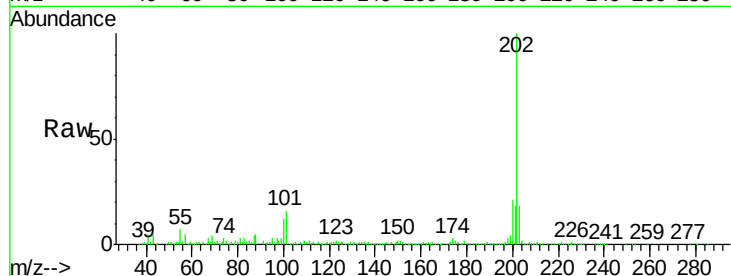
Tot Ion:202 Resp: 279627

Ion Ratio Lower Upper

202 100

200 21.4 17.4 26.2

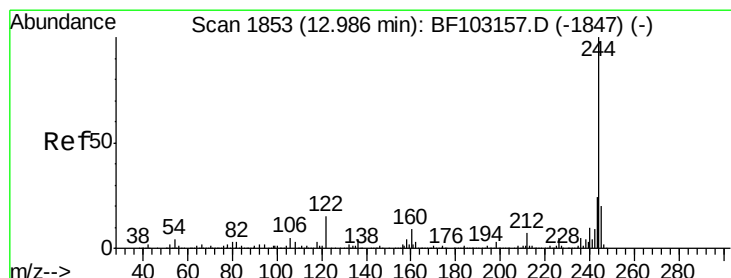
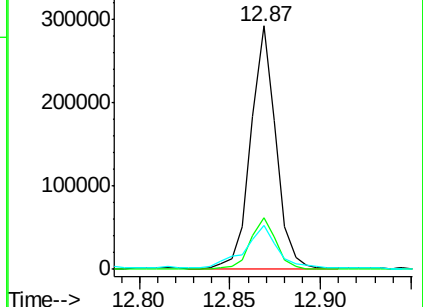
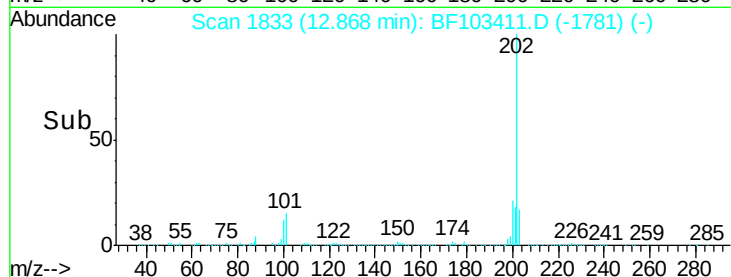
203 18.2 14.3 21.5



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: 27.530 ng

RT: 13.00 min Scan# 1855

Delta R.T. 0.01 min

Lab File: BF103411.D

Acq: 5 Mar 2018 15:57

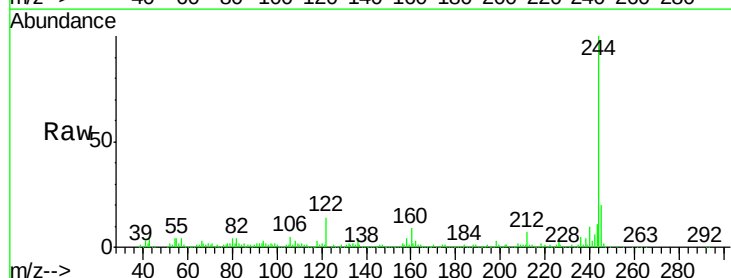
Tgt Ion:244 Resp: 278753

Ion Ratio Lower Upper

244 100

212 6.6 5.4 8.0

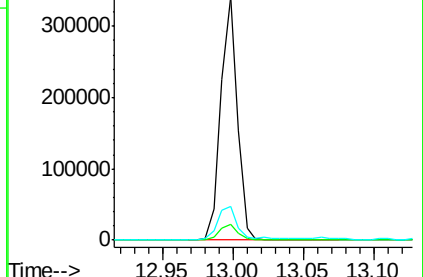
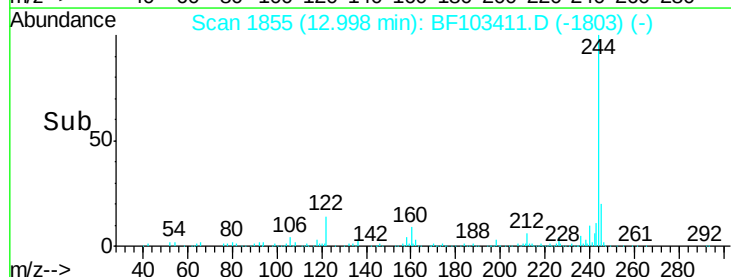
122 14.1 11.0 16.4

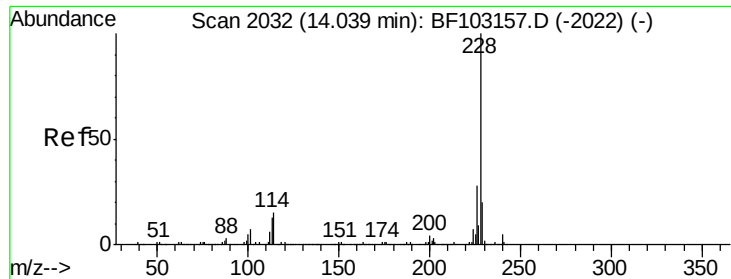


Abundance Ion 244.00 (243.70 to 244.70): E

Ion 212.00 (211.70 to 212.70): E

Ion 122.00 (121.70 to 122.70): E

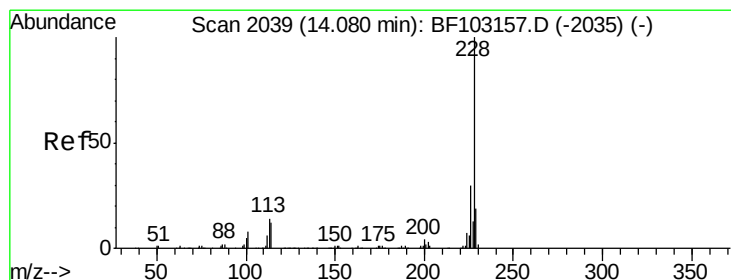
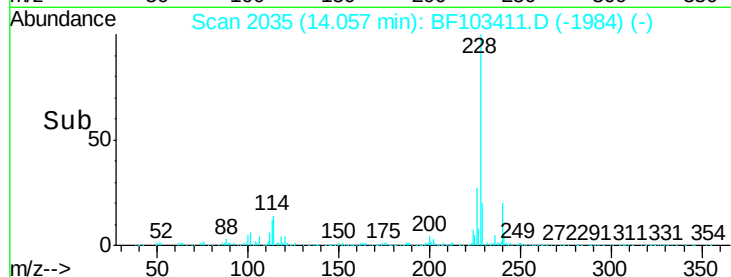
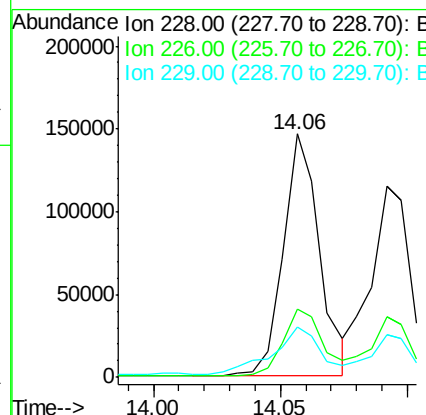
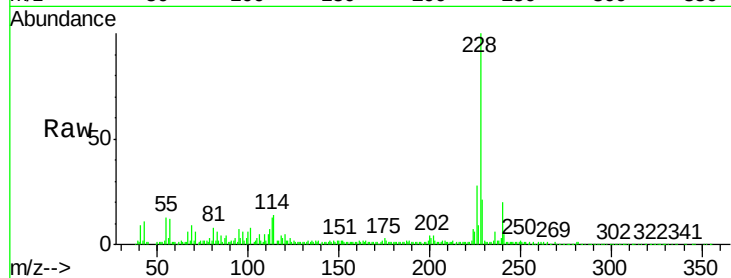




#80  
Benzo(a)anthracene  
Concen: 9.214 ng  
RT: 14.06 min Scan# 2035  
Delta R.T. 0.00 min  
Lab File: BF103411.D  
Acq: 5 Mar 2018 15:57

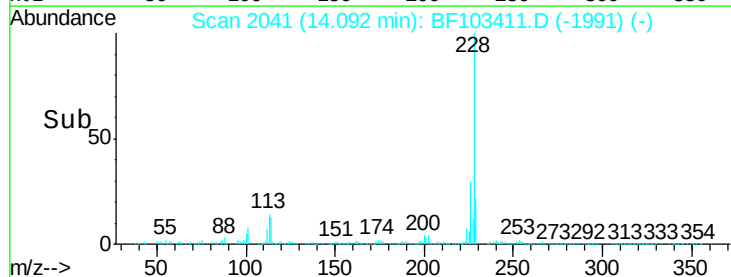
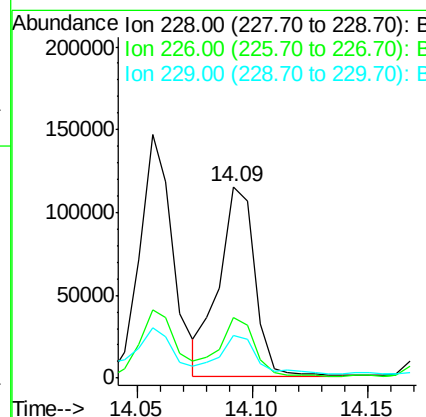
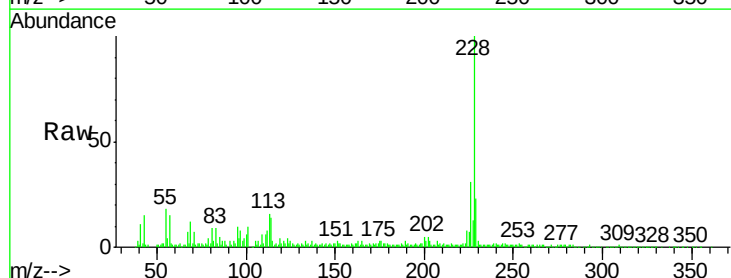
Instrument :  
BNA\_F  
ClientSampleId :

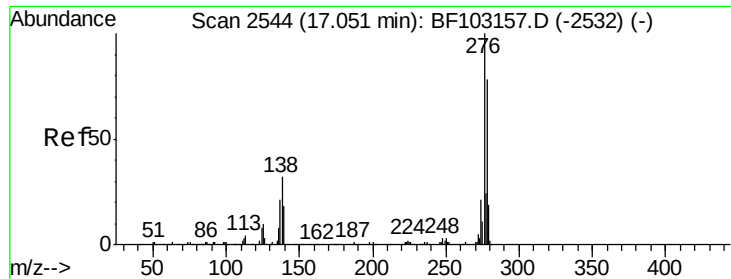
Tot Ion:228 Resp: 145522  
Ion Ratio Lower Upper  
228 100  
226 27.9 22.6 33.8  
229 20.9 15.8 23.6



#82  
Chrysene  
Concen: 8.089 ng  
RT: 14.09 min Scan# 2041  
Delta R.T. -0.01 min  
Lab File: BF103411.D  
Acq: 5 Mar 2018 15:57

Tgt Ion:228 Resp: 124047  
Ion Ratio Lower Upper  
228 100  
226 31.4 25.0 37.6  
229 22.5 16.2 24.4





#85

Indeno(1,2,3-cd)pyrene

Concen: 3.539 ng

RT: 17.13 min Scan# 2558

Delta R.T. 0.00 min

Lab File: BF103411.D

Acq: 5 Mar 2018 15:57

Instrument :

BNA\_F

ClientSampleId :

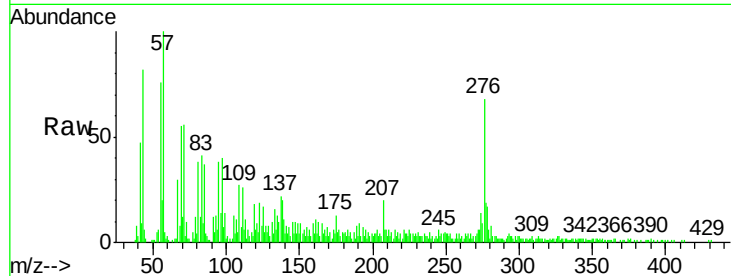
Tot Ion:276 Resp: 42964

Ion Ratio Lower Upper

276 100

138 29.5 25.0 37.6

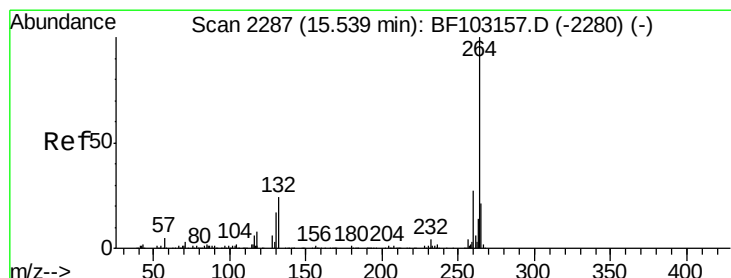
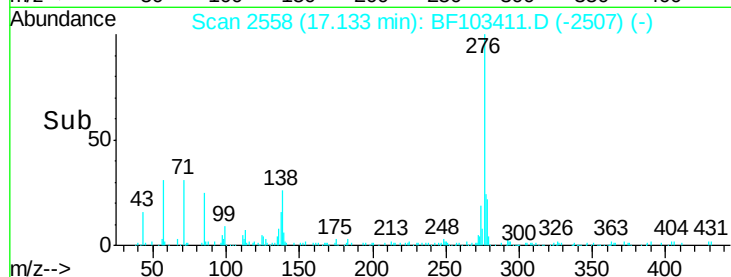
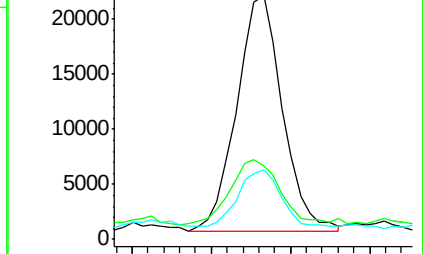
277 22.4 20.1 30.1



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: 20.000 ng

RT: 15.59 min Scan# 2295

Delta R.T. 0.01 min

Lab File: BF103411.D

Acq: 5 Mar 2018 15:57

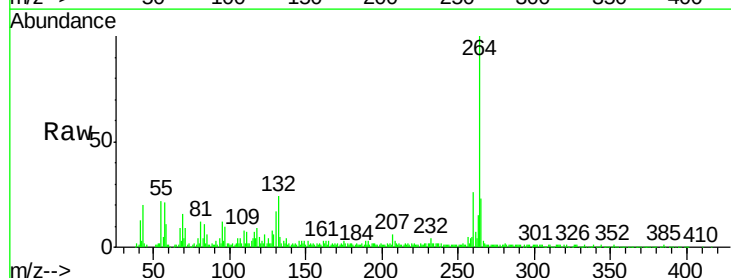
Tgt Ion:264 Resp: 165341

Ion Ratio Lower Upper

264 100

260 25.7 19.2 28.8

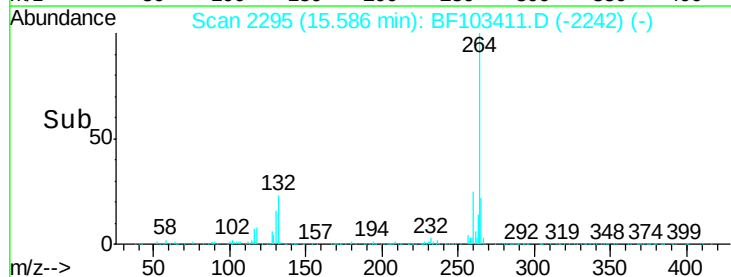
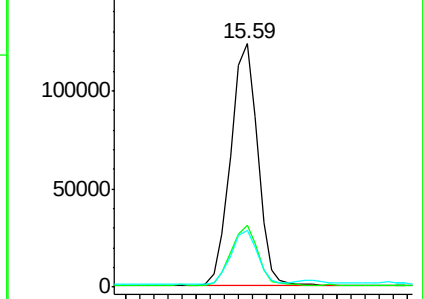
265 23.4 17.5 26.3

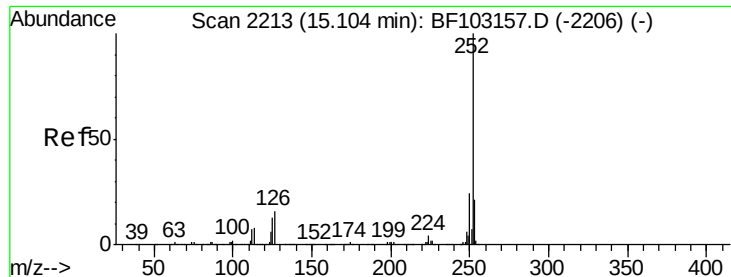


Abundance Ion 264.00 (263.70 to 264.70): E

Ion 260.00 (259.70 to 260.70): E

Ion 265.00 (264.70 to 265.70): E





#87

Benzo(b)fluoranthene

Concen: 16.108 ng

RT: 15.14 min Scan# 2219

Delta R.T. 0.01 min

Lab File: BF103411.D

Acq: 5 Mar 2018 15:57

Instrument :

BNA\_F

ClientSampleId :

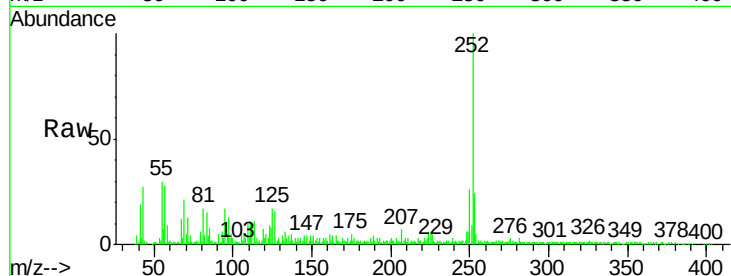
Tot Ion:252 Resp: 175110

Ion Ratio Lower Upper

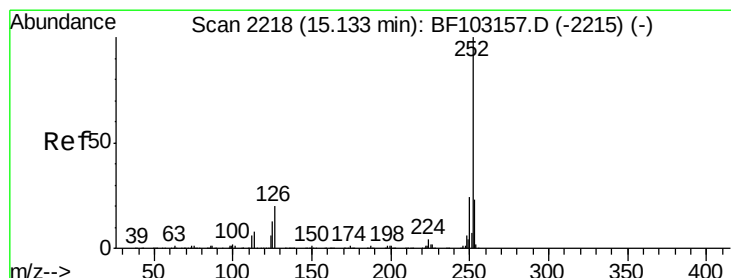
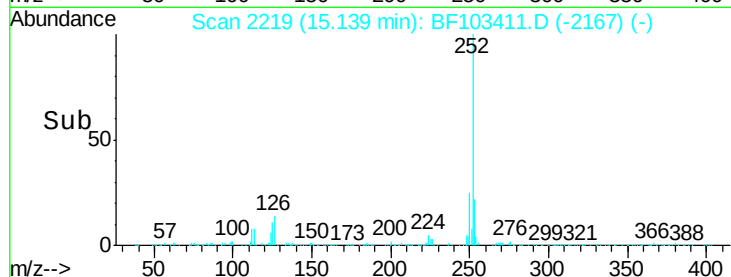
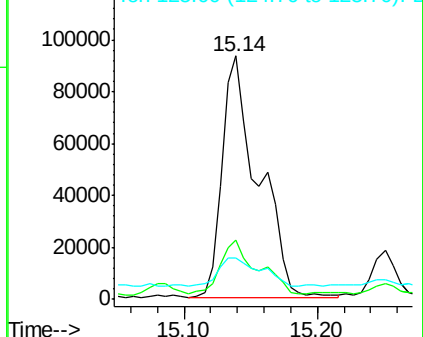
252 100

253 24.4 17.0 25.6

125 16.9 9.0 13.6#



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



#88

Benzo(k)fluoranthene

Concen: 17.106 ng

RT: 15.14 min Scan# 2219

Delta R.T. -0.02 min

Lab File: BF103411.D

Acq: 5 Mar 2018 15:57

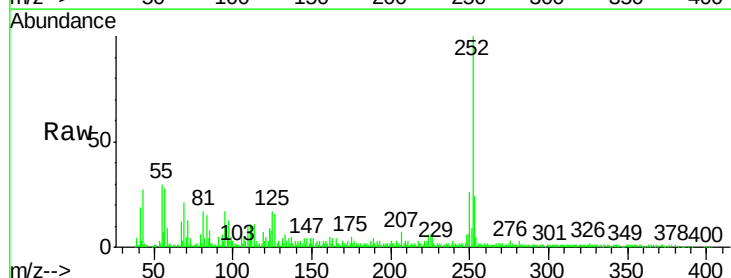
Tgt Ion:252 Resp: 175110

Ion Ratio Lower Upper

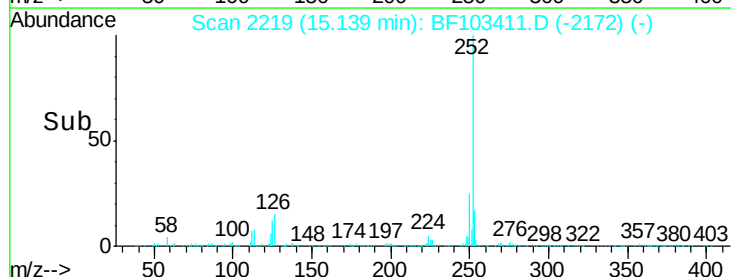
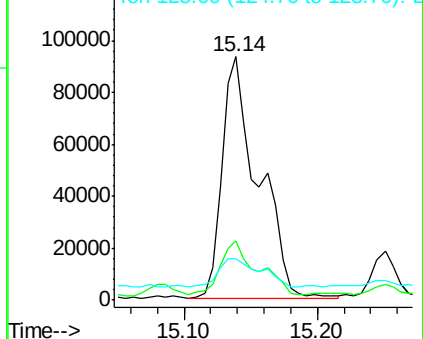
252 100

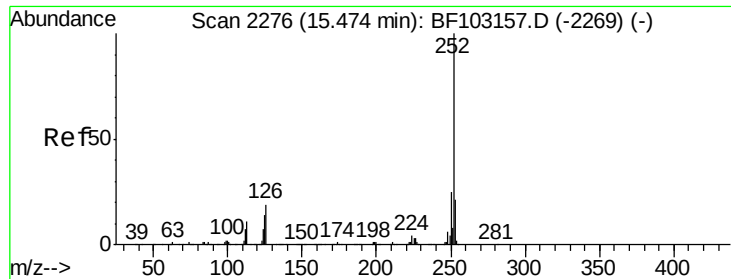
253 24.4 17.9 26.9

125 16.9 10.2 15.2#



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

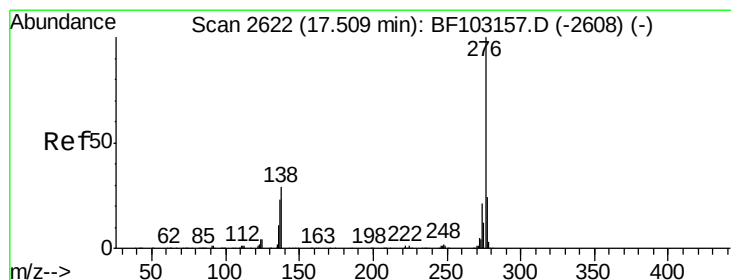
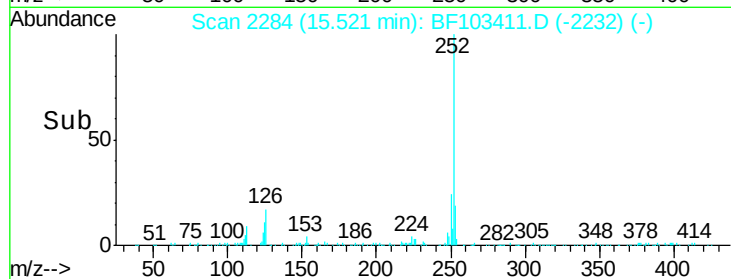
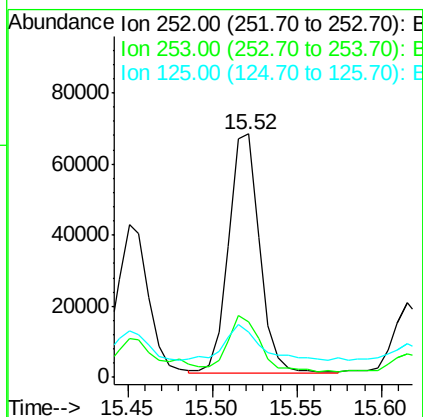
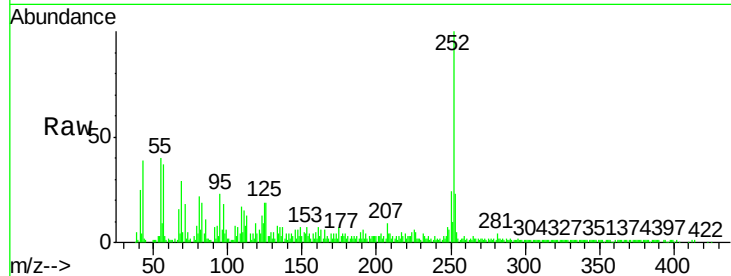




#89  
Benzo(a)pyrene  
Concen: 8.850 ng  
RT: 15.52 min Scan# 2284  
Delta R.T. 0.01 min  
Lab File: BF103411.D  
Acq: 5 Mar 2018 15:57

Instrument :  
BNA\_F  
ClientSampleId :

Tot Ion:252 Resp: 85916  
Ion Ratio Lower Upper  
252 100  
253 22.8 17.1 25.7  
125 18.8 9.8 14.6#



#91  
Benzo(g,h,i)perylene  
Concen: 5.539 ng  
RT: 17.60 min Scan# 2638  
Delta R.T. 0.01 min  
Lab File: BF103411.D  
Acq: 5 Mar 2018 15:57

Tgt Ion:276 Resp: 40610  
Ion Ratio Lower Upper  
276 100  
277 28.9 17.9 26.9#  
138 31.5 21.8 32.8

