

Data Path : Z:\HPCHEM1\BNA F\DATA\BF042716\  
 Data File : BF086466.D  
 Acq On : 28 Apr 2016 11:23  
 Operator : UM/SJ  
 Sample : H2702-02RE  
 Misc :  
 ALS Vial : 40 Sample Multiplier: 1

Instrument :  
 BNA\_F  
 ClientSampleId :  
 TEC-COMP-B1ARE

Quant Time: Apr 28 12:27:21 2016  
 Quant Method : Z:\HPCHEM1\BNA F\METHODS\8270-BF042716.M  
 Quant Title : ASP BNA STANDARDS FOR 5 POINT CALIBRATION  
 QLast Update : Wed Apr 27 14:20:52 2016  
 Response via : Initial Calibration

| Internal Standards        | R.T.  | QIon | Response | Conc  | Units | Dev(Min) |
|---------------------------|-------|------|----------|-------|-------|----------|
| 1) 1,4-Dichlorobenzene-d4 | 6.81  | 152  | 241148   | 20.00 | ng    | 0.00     |
| 21) Naphthalene-d8        | 8.09  | 136  | 884765   | 20.00 | ng    | -0.01    |
| 38) Acenaphthene-d10      | 9.85  | 164  | 342941   | 20.00 | ng    | 0.00     |
| 63) Phenanthrene-d10      | 11.32 | 188  | 564830   | 20.00 | ng    | 0.00     |
| 75) Chrysene-d12          | 13.96 | 240  | 589133   | 20.00 | ng    | 0.00     |
| 86) Perylene-d12          | 15.37 | 264  | 411831   | 20.00 | ng    | 0.01     |

| System Monitoring Compounds | R.T.  | QIon | Response | Conc  | Units | Dev(Min) |
|-----------------------------|-------|------|----------|-------|-------|----------|
| 5) 2-Fluorophenol           | 5.40  | 112  | 811801   | 58.07 | ng    | 0.01     |
| 7) Phenol-d6                | 6.44  | 99   | 1100406  | 56.39 | ng    | 0.00     |
| 23) Nitrobenzene-d5         | 7.37  | 82   | 616520   | 37.56 | ng    | -0.01    |
| 41) 2,4,6-Tribromophenol    | 10.62 | 330  | 162239   | 44.86 | ng    | -0.01    |
| 44) 2-Fluorobiphenyl        | 9.17  | 172  | 929644   | 40.90 | ng    | 0.00     |
| 78) Terphenyl-d14           | 12.91 | 244  | 753319   | 28.17 | ng    | 0.00     |

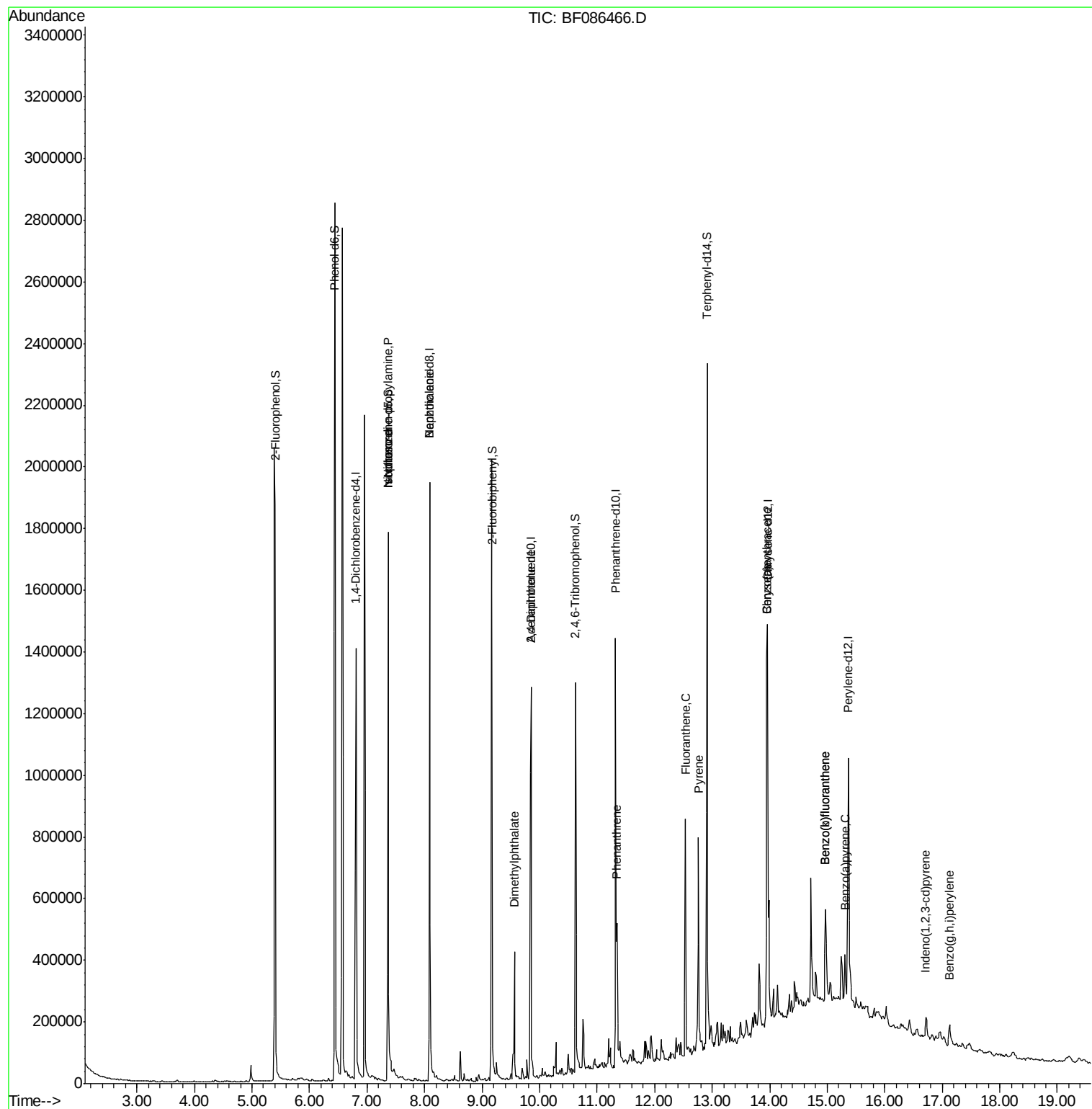
| Target Compounds               | R.T.  | QIon | Response | Conc  | Units | Qvalue |
|--------------------------------|-------|------|----------|-------|-------|--------|
| 19) n-Nitroso-di-n-propylamine | 7.37  | 70   | 83500    | 6.47  | ng    | # 74   |
| 25) Isophorone                 | 7.37  | 82   | 506350   | 16.03 | ng    | # 68   |
| 32) Benzoic acid               | 8.09  | 122  | 221      | 8.80  | ng    | # 1    |
| 49) Dimethylphthalate          | 9.56  | 163  | 156280   | 6.05  | ng    | 100    |
| 56) 2,4-Dinitrotoluene         | 9.85  | 165  | 43587    | 6.41  | ng    | # 17   |
| 70) Phenanthrene               | 11.35 | 178  | 154635   | 5.22  | ng    | 99     |
| 74) Fluoranthene               | 12.53 | 202  | 329398   | 11.01 | ng    | 95     |
| 77) Pyrene                     | 12.76 | 202  | 337301   | 7.95  | ng    | 100    |
| 80) Benzo(a)anthracene         | 13.95 | 228  | 174280   | 5.55  | ng    | 97     |
| 82) Chrysene                   | 13.95 | 228  | 174341   | 5.11  | ng    | 97     |
| 85) Indeno(1,2,3-cd)pyrene     | 16.72 | 276  | 57639    | 2.28  | ng    | 93     |
| 87) Benzo(b)fluoranthene       | 14.97 | 252  | 237016   | 9.78  | ng    | 98     |
| 88) Benzo(k)fluoranthene       | 14.97 | 252  | 237016   | 9.38  | ng    | # 96   |
| 89) Benzo(a)pyrene             | 15.31 | 252  | 118428   | 5.18  | ng    | 97     |
| 91) Benzo(a,h,i)perylene       | 17.13 | 276  | 59119    | 3.15  | ng    | 97     |

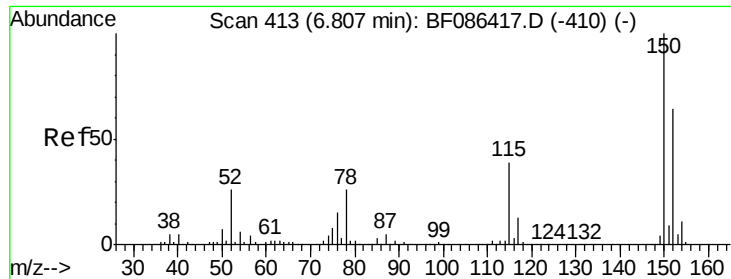
(#) = qualifier out of range (m) = manual integration (+) = signals summed

Data Path : Z:\HPCHEM1\BNA F\DATA\BF042716\  
Data File : BF086466.D  
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Sample : H2702-02RE  
Misc :  
ALS Vial : 40 Sample Multiplier: 1

Instrument :  
BNA\_F  
ClientSampleId :  
TEC-COMP-B1ARE

Quant Time: Apr 28 12:27:21 2016  
Quant Method : Z:\HPCHEM1\BNA F\METHODS\8270-BF042716.M  
Quant Title : ASP BNA STANDARDS FOR 5 POINT CALIBRATION  
QLast Update : Wed Apr 27 14:20:52 2016  
Response via : Initial Calibration





#1

1,4-Dichlorobenzene-d4

Concen: 20.00 ng

RT: 6.81 min Scan# 413

Delta R.T. 0.00 min

Lab File: BF086466.D

Acq: 28 Apr 2016 11:23

Instrument :

BNA\_F

ClientSampleId :

TEC-COMP-B1ARE

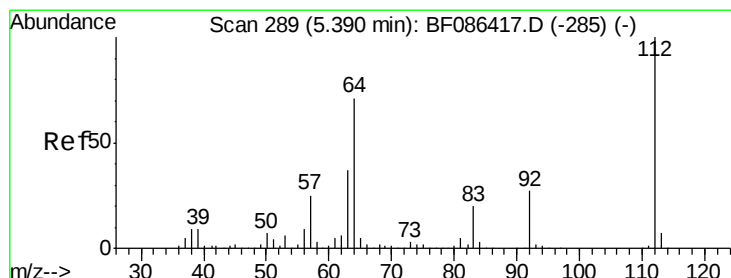
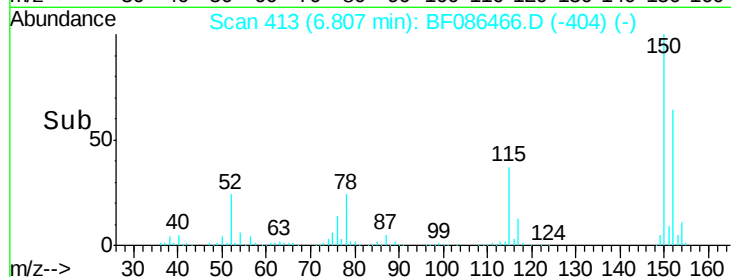
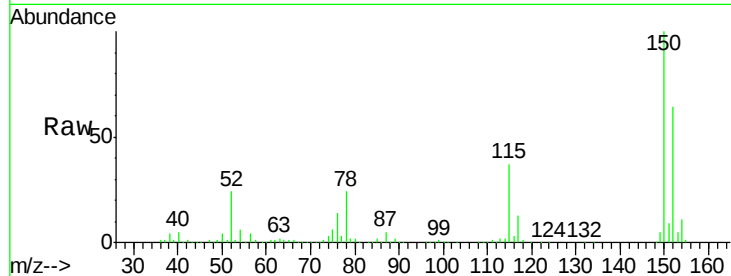
Tot Ion:152 Resp: 241148

Ion Ratio Lower Upper

152 100

150 155.2 125.8 188.6

115 58.1 51.5 77.3



#5

2-Fluorophenol

Concen: 58.07 ng

RT: 5.40 min Scan# 290

Delta R.T. 0.01 min

Lab File: BF086466.D

Acq: 28 Apr 2016 11:23

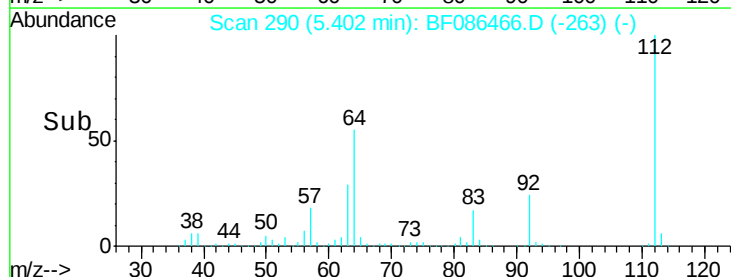
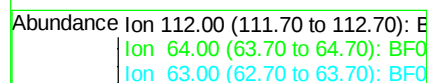
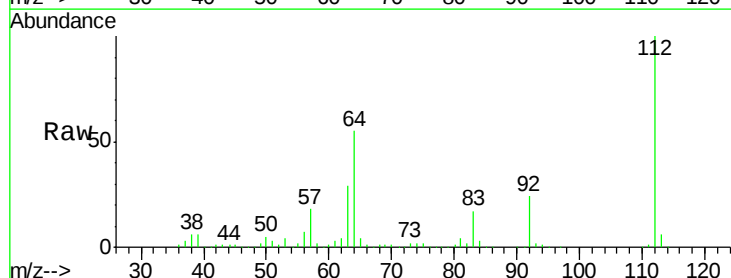
Tgt Ion:112 Resp: 811801

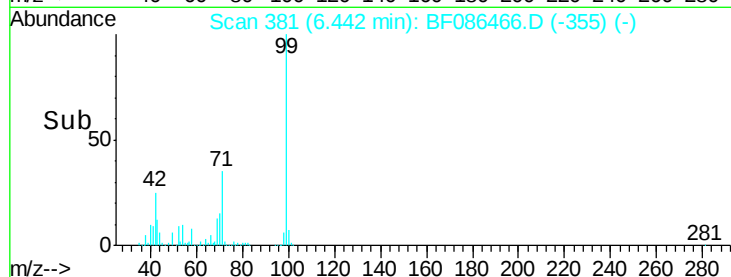
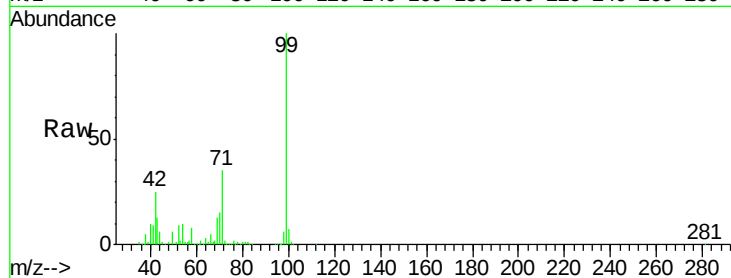
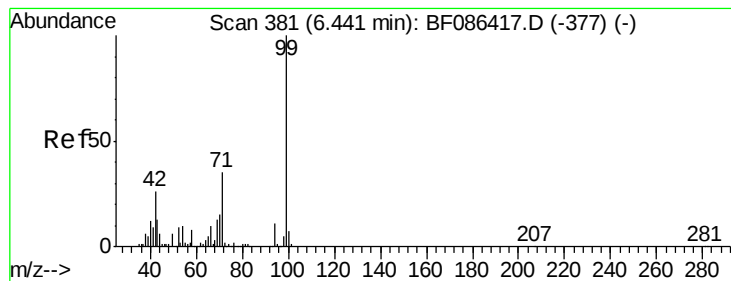
Ion Ratio Lower Upper

112 100

64 54.8 52.1 78.1

63 28.5 25.7 38.5





#7

Phenol-d6

Concen: 56.39 ng

RT: 6.44 min Scan# 381

Delta R.T. 0.00 min

Lab File: BF086466.D

Acq: 28 Apr 2016 11:23

Instrument :

BNA\_F

ClientSampleId :

TEC-COMP-B1ARE

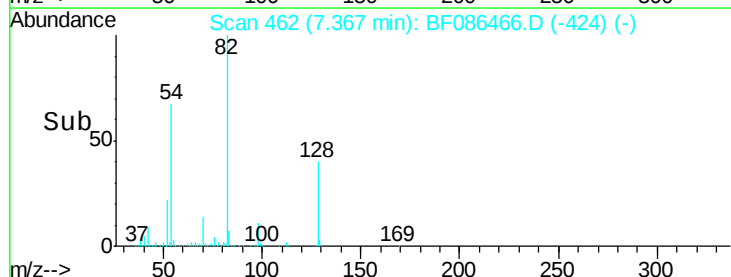
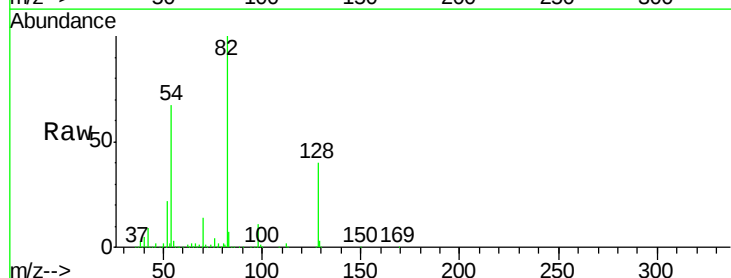
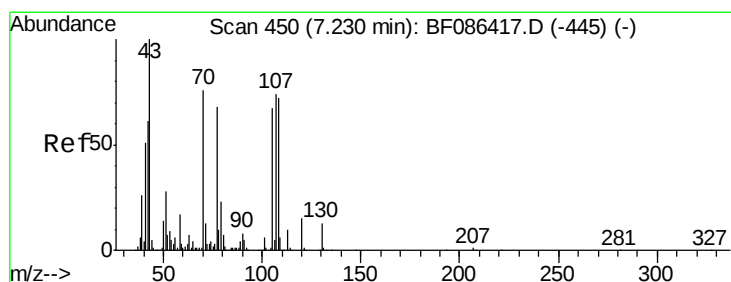
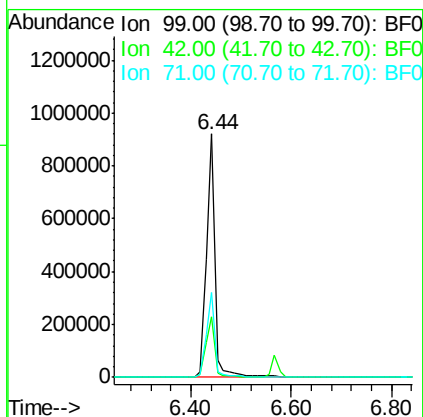
Tot Ion: 99 Resp: 1100406

Ion Ratio Lower Upper

99 100

42 25.1 13.6 20.4#

71 34.7 24.6 36.8



#19

n-Nitroso-di-n-propylamine

Concen: 6.47 ng

RT: 7.37 min Scan# 462

Delta R.T. 0.14 min

Lab File: BF086466.D

Acq: 28 Apr 2016 11:23

Tgt Ion: 70 Resp: 83500

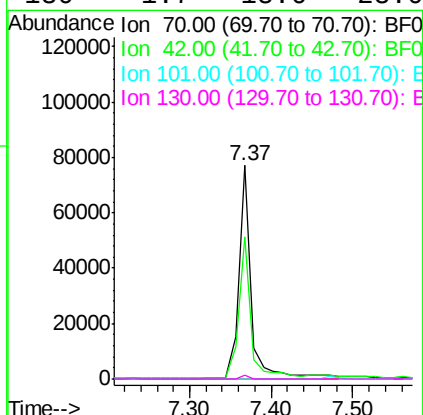
Ion Ratio Lower Upper

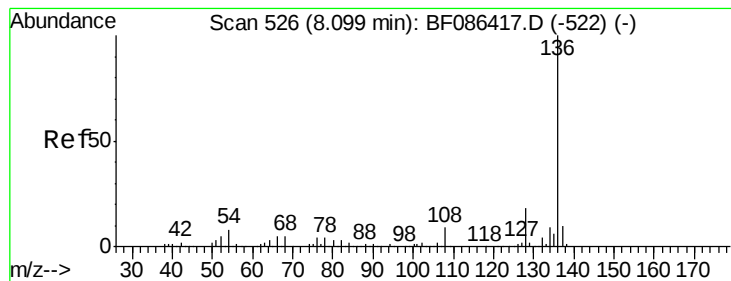
70 100

42 66.3 43.1 64.7#

101 0.0 8.1 12.1#

130 1.7 18.6 28.0#





#21

Naphthalene-d8

Concen: 20.00 ng

RT: 8.09 min Scan# 525

Delta R.T. -0.01 min

Lab File: BF086466.D

Acq: 28 Apr 2016 11:23

Instrument :

BNA\_F

ClientSampleId :

TEC-COMP-B1ARE

Tot Ion:136 Resp: 884765

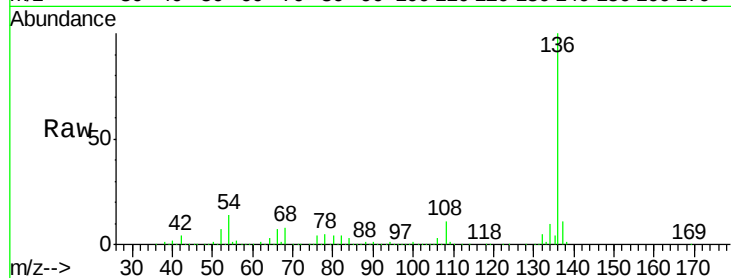
Ion Ratio Lower Upper

136 100

137 11.3 8.8 13.2

54 13.7 5.0 7.4#

68 8.0 4.4 6.6#

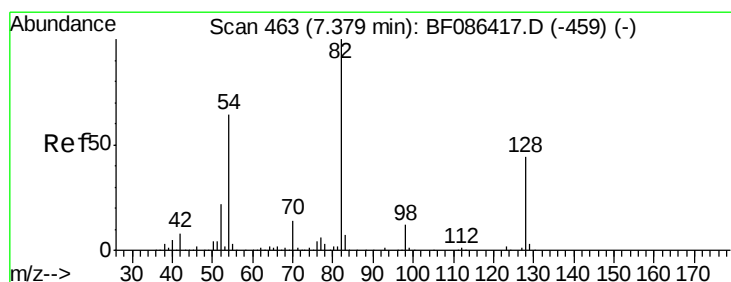
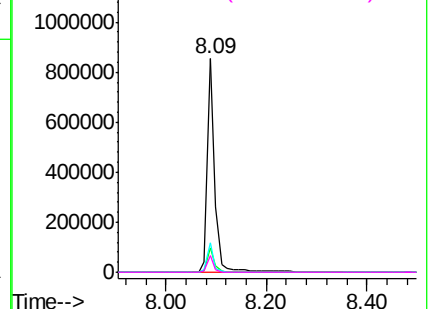
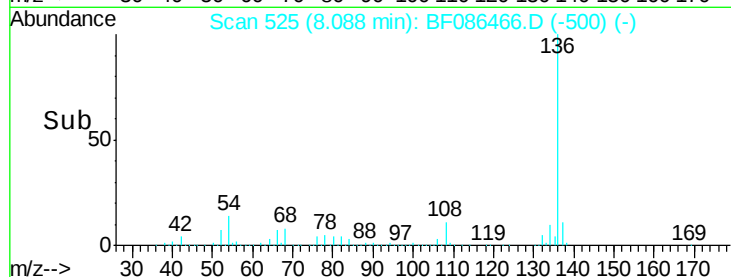


Abundance Ion 136.00 (135.70 to 136.70): E

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: 37.56 ng

RT: 7.37 min Scan# 462

Delta R.T. -0.01 min

Lab File: BF086466.D

Acq: 28 Apr 2016 11:23

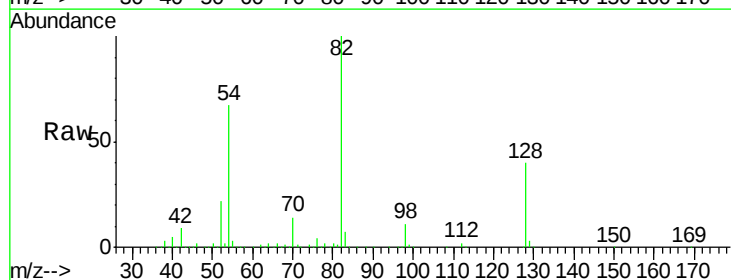
Tgt Ion: 82 Resp: 616520

Ion Ratio Lower Upper

82 100

128 40.0 40.6 61.0#

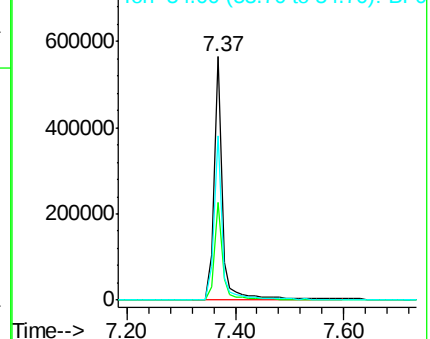
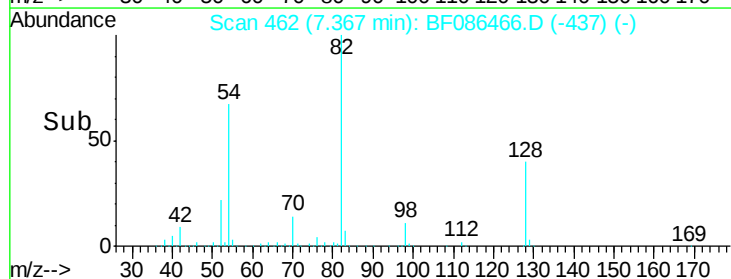
54 67.4 38.1 57.1#

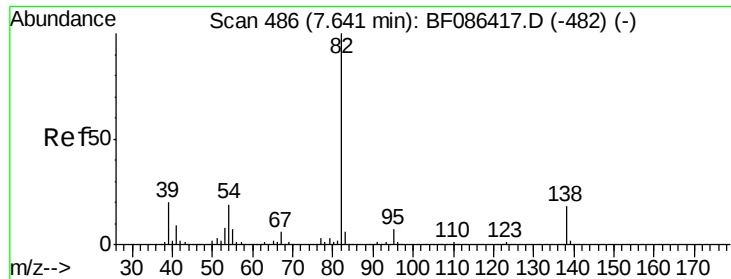


Abundance Ion 82.00 (81.70 to 82.70): BF0

Ion 128.00 (127.70 to 128.70): E

Ion 54.00 (53.70 to 54.70): BF0





#25

Isophorone

Concen: 16.03 ng

RT: 7.37 min Scan# 462

Delta R.T. -0.27 min

Lab File: BF086466.D

Acq: 28 Apr 2016 11:23

Instrument :

BNA\_F

ClientSampleId :

TEC-COMP-BIARE

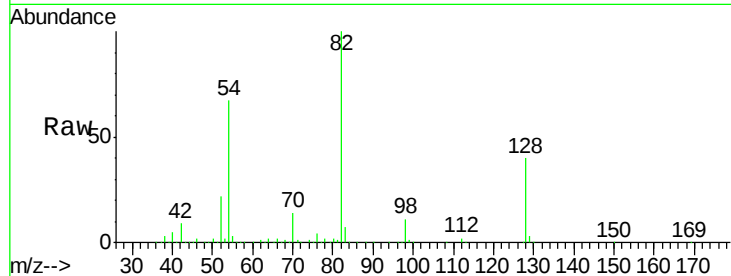
Tot Ion: 82 Resp: 506350

Ion Ratio Lower Upper

82 100

95 0.0 5.1 7.7#

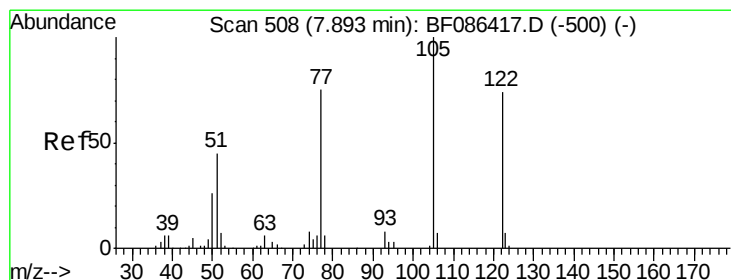
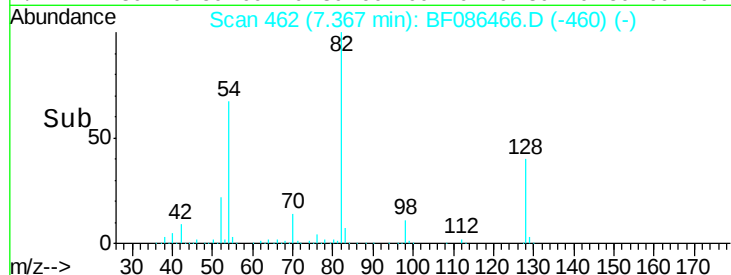
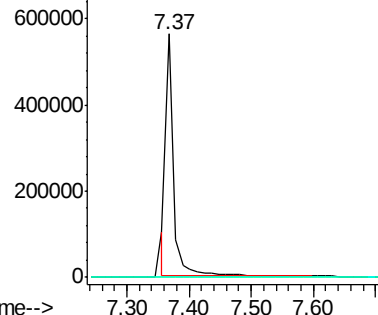
138 0.0 12.4 18.6#



Abundance Ion 82.00 (81.70 to 82.70): BF0

Ion 95.00 (94.70 to 95.70): BF0

Ion 138.00 (137.70 to 138.70): BF0



#32

Benzoic acid

Concen: 8.80 ng

RT: 8.09 min Scan# 525

Delta R.T. 0.20 min

Lab File: BF086466.D

Acq: 28 Apr 2016 11:23

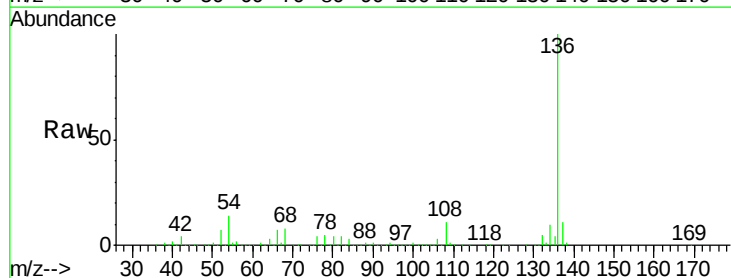
Tgt Ion:122 Resp: 221

Ion Ratio Lower Upper

122 100

105 292.0 92.6 132.6#

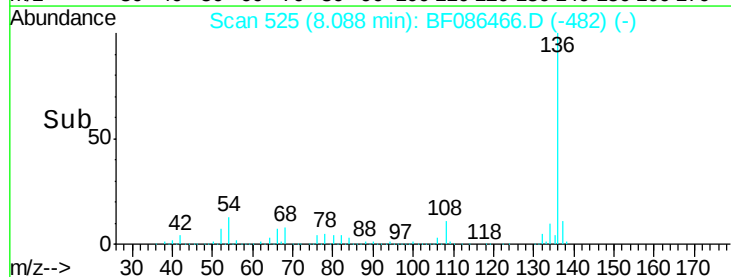
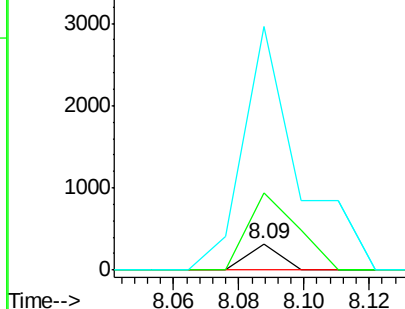
77 916.7 60.0 100.0#

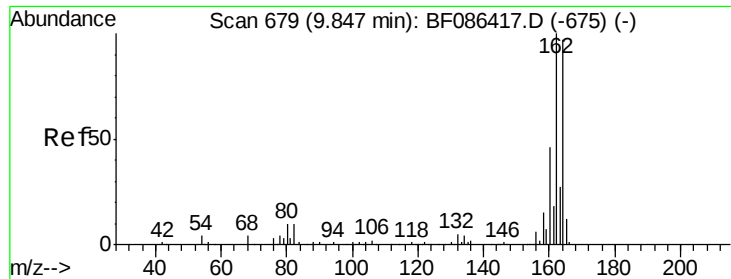


Abundance Ion 122.00 (121.70 to 122.70): E

Ion 105.00 (104.70 to 105.70): E

Ion 77.00 (76.70 to 77.70): BF0

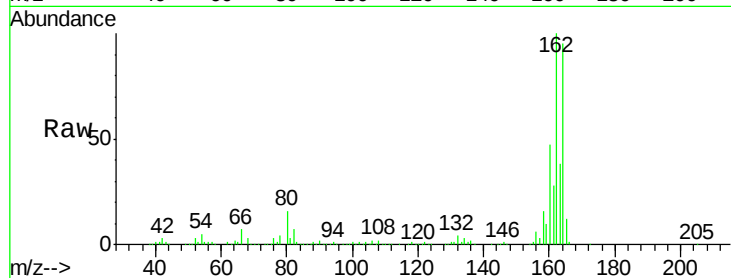




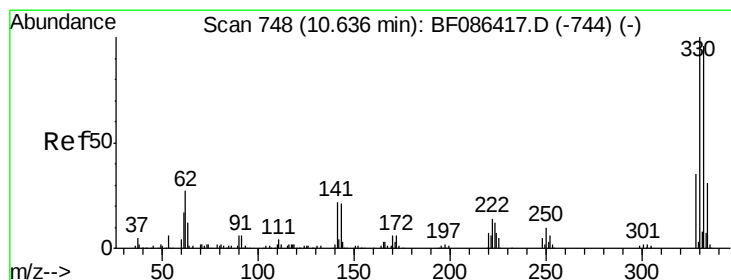
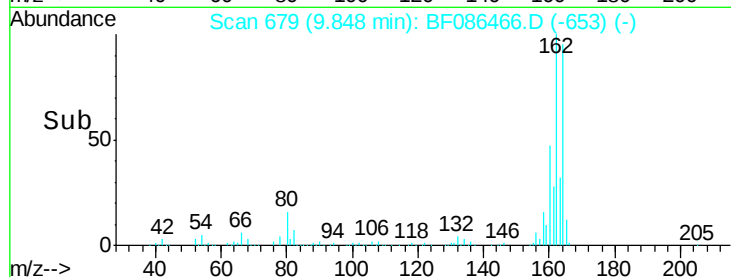
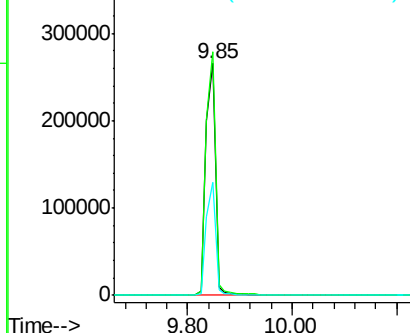
#38  
 Acenaphthene-d10  
 Concen: 20.00 ng  
 RT: 9.85 min Scan# 679  
 Delta R.T. 0.00 min  
 Lab File: BF086466.D  
 Acq: 28 Apr 2016 11:23

Instrument :  
 BNA\_F  
 ClientSampleId :  
 TEC-COMP-B1ARE

Tot Ion:164 Resp: 342941  
 Ion Ratio Lower Upper  
 164 100  
 162 104.9 82.8 124.2  
 160 48.9 36.9 55.3

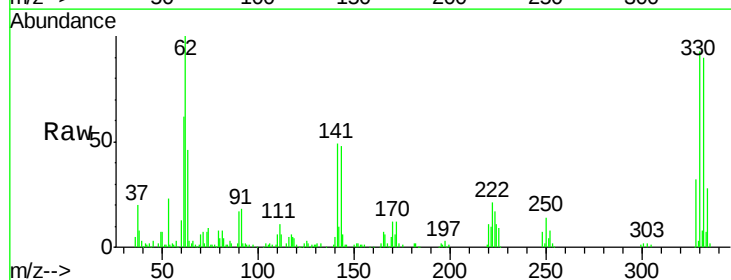


Abundance Ion 164.00 (163.70 to 164.70): E  
 Ion 162.00 (161.70 to 162.70): E  
 Ion 160.00 (159.70 to 160.70): E

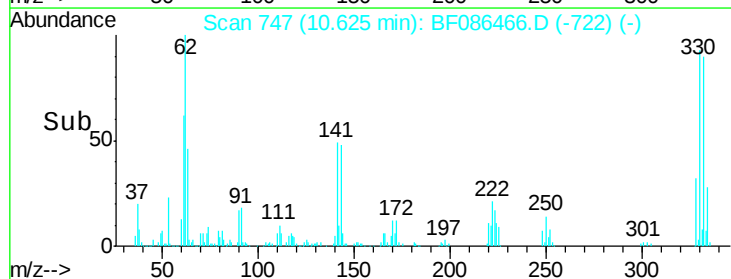
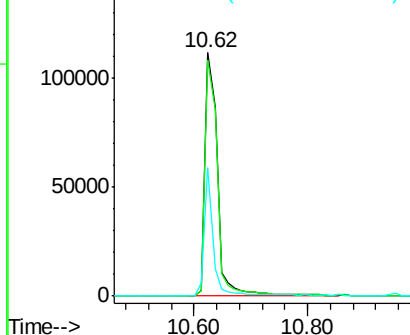


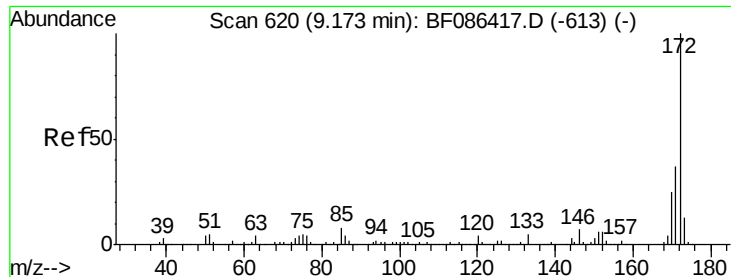
#41  
 2,4,6-Tribromophenol  
 Concen: 44.86 ng  
 RT: 10.62 min Scan# 747  
 Delta R.T. -0.01 min  
 Lab File: BF086466.D  
 Acq: 28 Apr 2016 11:23

Tgt Ion:330 Resp: 162239  
 Ion Ratio Lower Upper  
 330 100  
 332 97.1 79.0 118.4  
 141 38.0 31.2 46.8



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

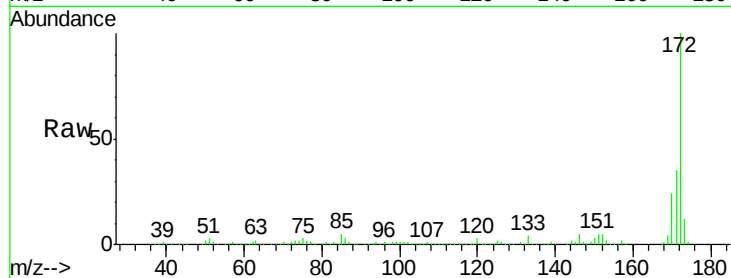




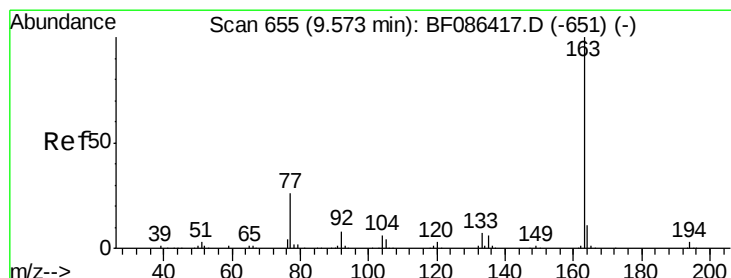
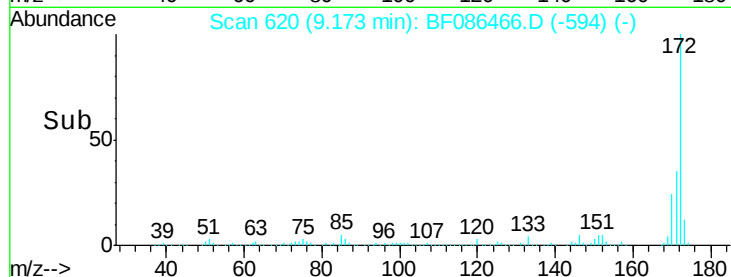
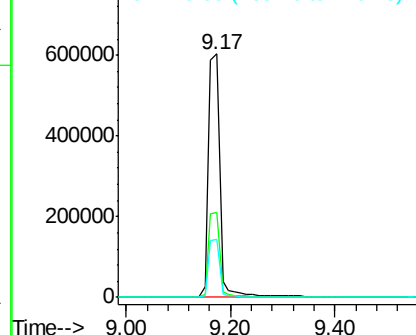
#44  
 2-Fluorobiphenyl  
 Concen: 40.90 ng  
 RT: 9.17 min Scan# 620  
 Delta R.T. 0.00 min  
 Lab File: BF086466.D  
 Acq: 28 Apr 2016 11:23

Instrument :  
 BNA\_F  
 ClientSampleId :  
 TEC-COMP-B1ARE

Tot Ion:172 Resp: 929644  
 Ion Ratio Lower Upper  
 172 100  
 171 34.8 29.0 43.6  
 170 23.6 19.8 29.8

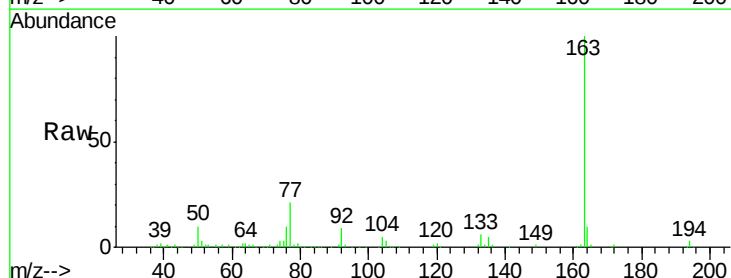


Abundance Ion 172.00 (171.70 to 172.70): E  
 Ion 171.00 (170.70 to 171.70): E  
 Ion 170.00 (169.70 to 170.70): E

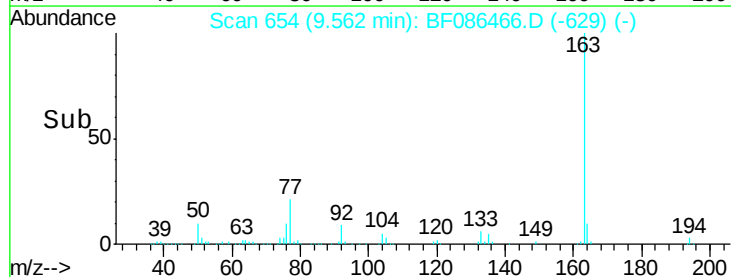
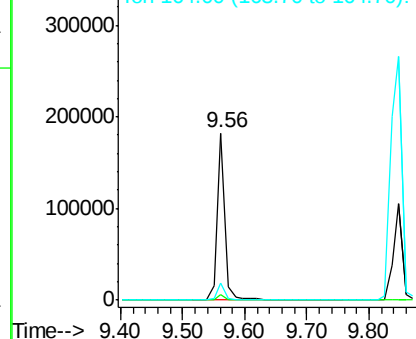


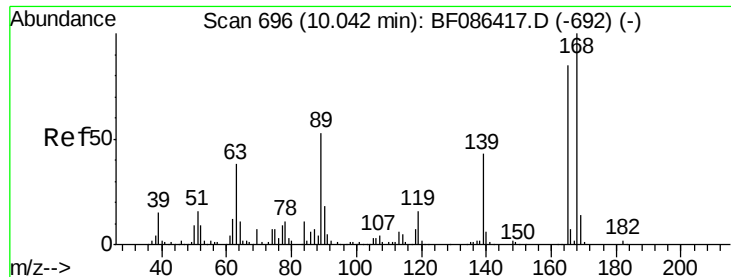
#49  
 Dimethylphthalate  
 Concen: 6.05 ng  
 RT: 9.56 min Scan# 654  
 Delta R.T. -0.01 min  
 Lab File: BF086466.D  
 Acq: 28 Apr 2016 11:23

Tgt Ion:163 Resp: 156280  
 Ion Ratio Lower Upper  
 163 100  
 194 3.2 2.6 4.0  
 164 10.2 8.2 12.4



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

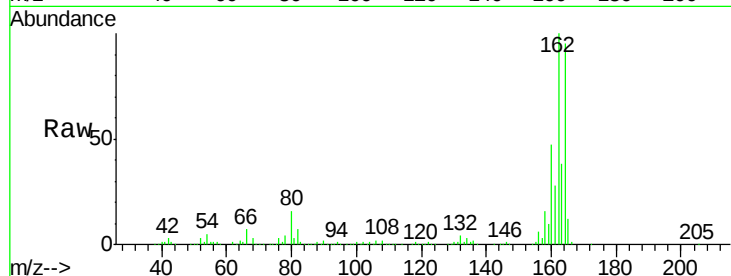




#56  
 2,4-Dinitrotoluene  
 Concen: 6.41 ng  
 RT: 9.85 min Scan# 679  
 Delta R.T. -0.19 min  
 Lab File: BF086466.D  
 Acq: 28 Apr 2016 11:23

Instrument :  
 BNA\_F  
 ClientSampleId :  
 TEC-COMP-B1ARE

| Tot Ion | Ratio | Lower | Upper  |
|---------|-------|-------|--------|
| 165     | 100   |       |        |
| 63      | 2.5   | 44.3  | 66.5#  |
| 89      | 2.2   | 70.0  | 105.0# |
| 182     | 0.0   | 1.8   | 2.6#   |

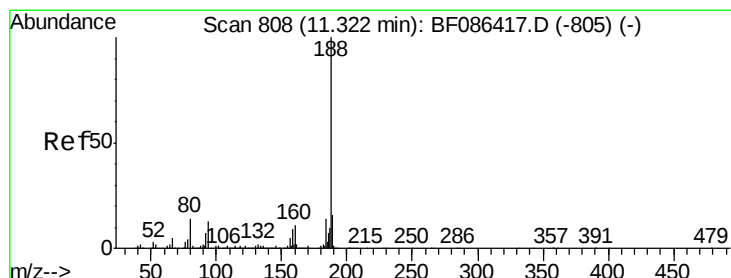
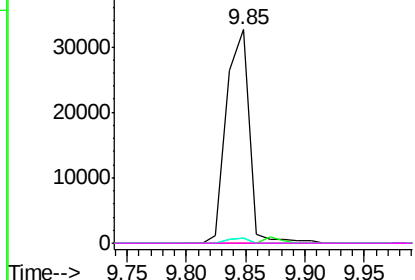
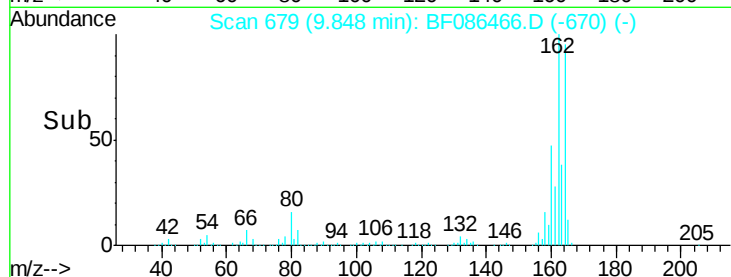


Abundance Ion 165.00 (164.70 to 165.70): E

Ion 63.00 (62.70 to 63.70): BF0

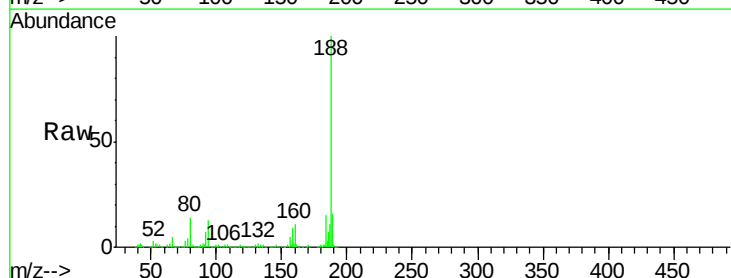
Ion 89.00 (88.70 to 89.70): BF0

Ion 182.00 (181.70 to 182.70): E



#63  
 Phenanthrene-d10  
 Concen: 20.00 ng  
 RT: 11.32 min Scan# 808  
 Delta R.T. 0.00 min  
 Lab File: BF086466.D  
 Acq: 28 Apr 2016 11:23

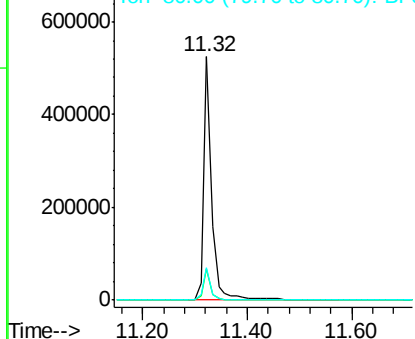
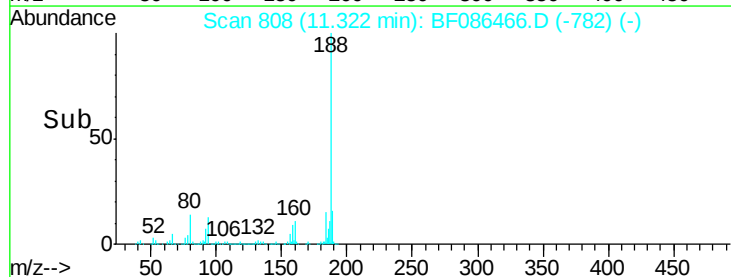
| Tgt Ion | Ratio | Lower | Upper |
|---------|-------|-------|-------|
| 188     | 100   |       |       |
| 94      | 12.6  | 6.8   | 10.2# |
| 80      | 13.5  | 7.1   | 10.7# |

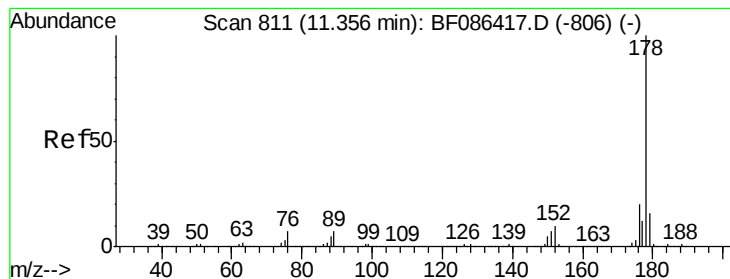


Abundance Ion 188.00 (187.70 to 188.70): E

Ion 94.00 (93.70 to 94.70): BF0

Ion 80.00 (79.70 to 80.70): BF0





#70

Phenanthrene

Concen: 5.22 ng

RT: 11.35 min Scan# 810

Delta R.T. -0.01 min

Lab File: BF086466.D

Acq: 28 Apr 2016 11:23

Instrument :

BNA\_F

ClientSampleId :

TEC-COMP-B1ARE

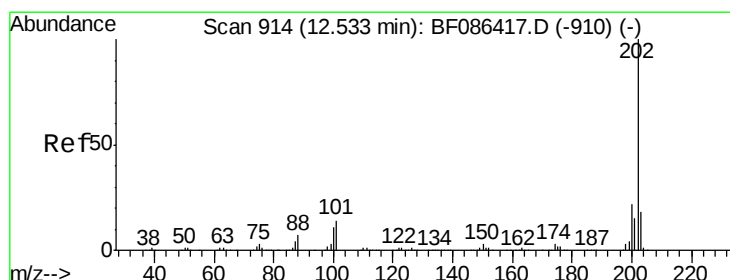
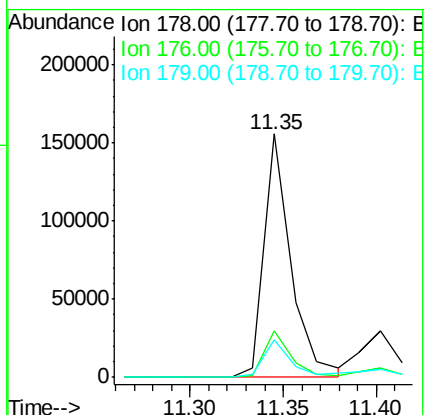
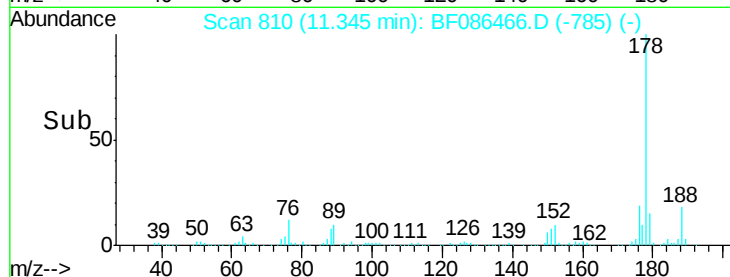
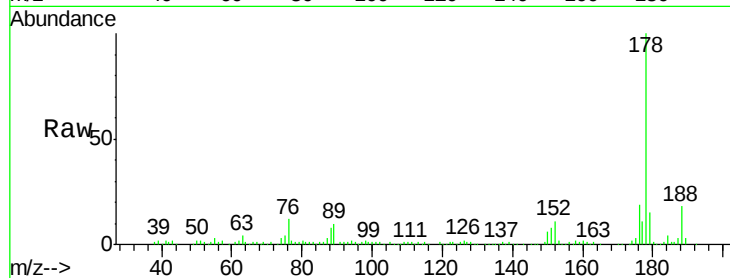
Tot Ion:178 Resp: 154635

Ion Ratio Lower Upper

178 100

176 19.1 16.0 24.0

179 15.3 12.6 18.8



#74

Fluoranthene

Concen: 11.01 ng

RT: 12.53 min Scan# 914

Delta R.T. 0.00 min

Lab File: BF086466.D

Acq: 28 Apr 2016 11:23

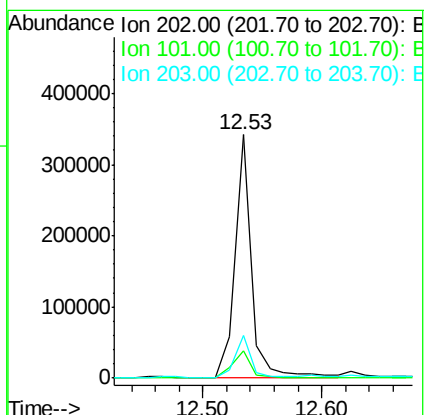
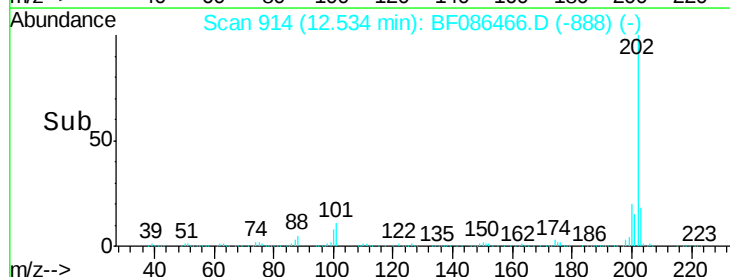
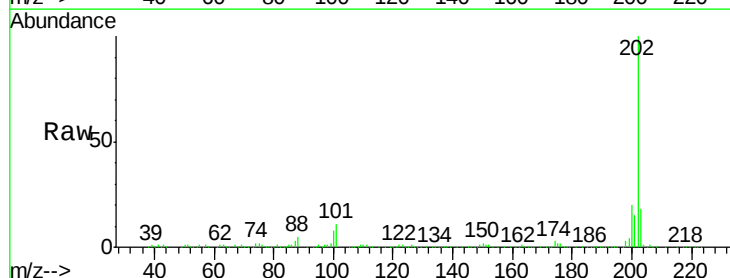
Tgt Ion:202 Resp: 329398

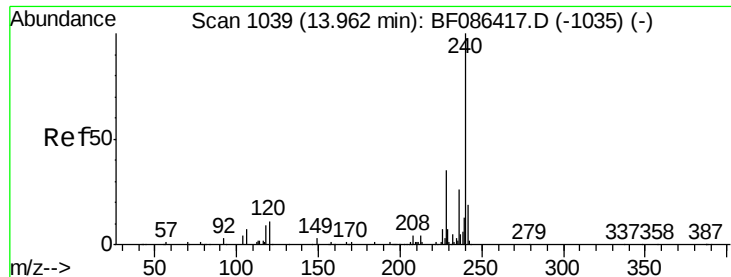
Ion Ratio Lower Upper

202 100

101 11.3 0.0 35.4

203 17.7 0.0 38.1





#75

Chrysene-d12

Concen: 20.00 ng

RT: 13.96 min Scan# 1039

Delta R.T. 0.00 min

Lab File: BF086466.D

Acq: 28 Apr 2016 11:23

Instrument :

BNA\_F

ClientSampleId :

TEC-COMP-B1ARE

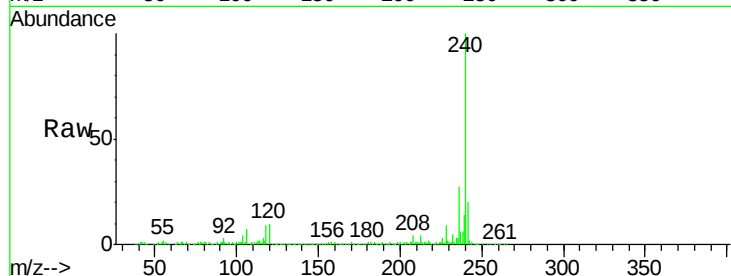
Tot Ion:240 Resp: 589133

Ion Ratio Lower Upper

240 100

120 10.1 11.2 16.8#

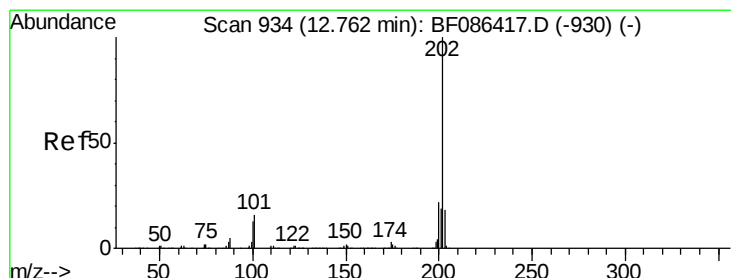
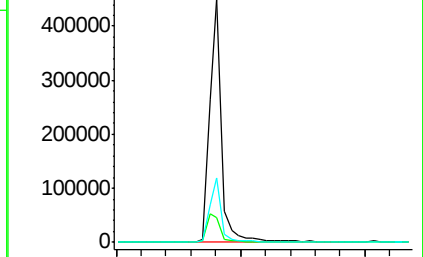
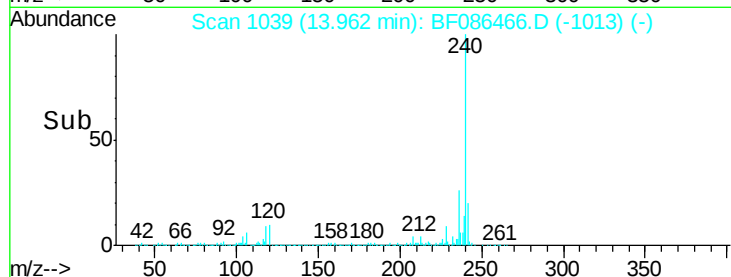
236 26.5 21.2 31.8



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

Pyrene

Concen: 7.95 ng

RT: 12.76 min Scan# 934

Delta R.T. 0.00 min

Lab File: BF086466.D

Acq: 28 Apr 2016 11:23

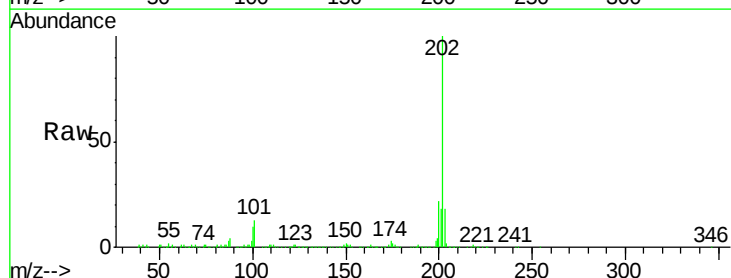
Tgt Ion:202 Resp: 337301

Ion Ratio Lower Upper

202 100

200 22.2 17.7 26.5

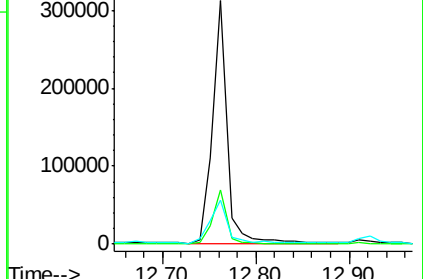
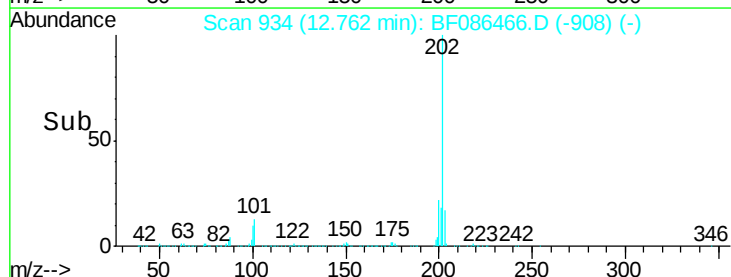
203 17.9 14.2 21.4

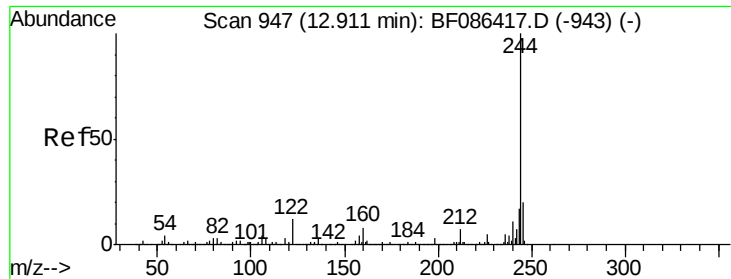


Abundance Ion 202.00 (201.70 to 202.70): E

Ion 200.00 (199.70 to 200.70): E

Ion 203.00 (202.70 to 203.70): E





#78

Terphenyl-d14

Concen: 28.17 ng

RT: 12.91 min Scan# 947

Delta R.T. 0.00 min

Lab File: BF086466.D

Acq: 28 Apr 2016 11:23

Instrument :  
BNA\_F  
ClientSampleId :  
TEC-COMP-B1ARE

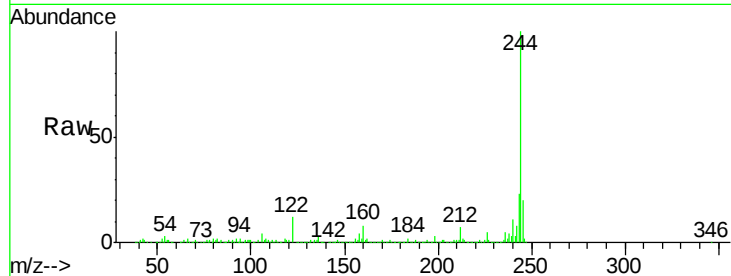
Tot Ion:244 Resp: 753319

Ion Ratio Lower Upper

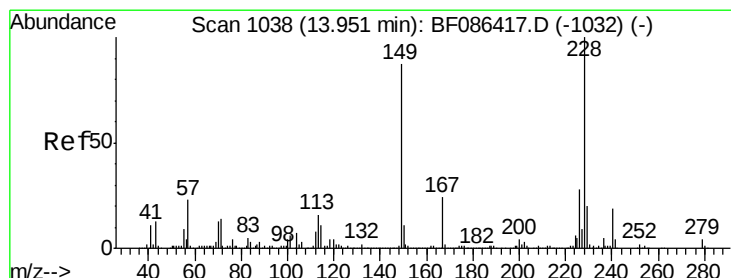
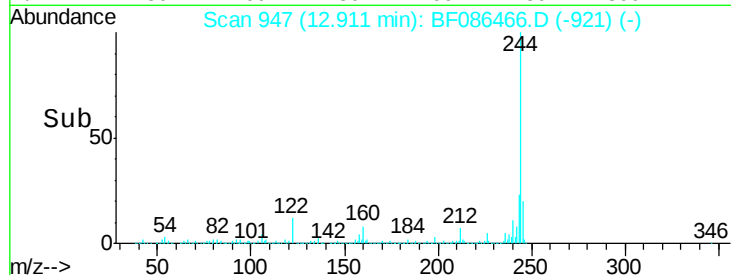
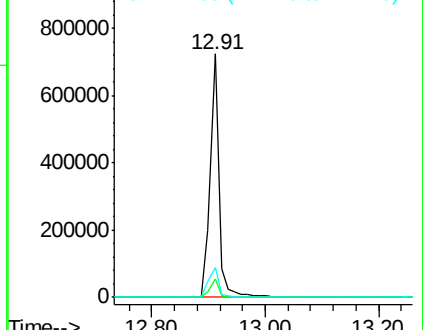
244 100

212 7.4 6.2 9.2

122 12.4 12.0 18.0



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: 5.55 ng

RT: 13.95 min Scan# 1038

Delta R.T. 0.00 min

Lab File: BF086466.D

Acq: 28 Apr 2016 11:23

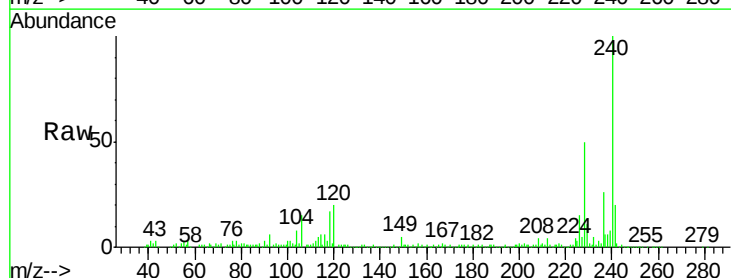
Tgt Ion:228 Resp: 174280

Ion Ratio Lower Upper

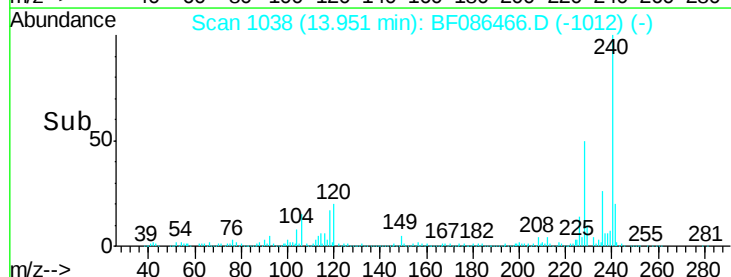
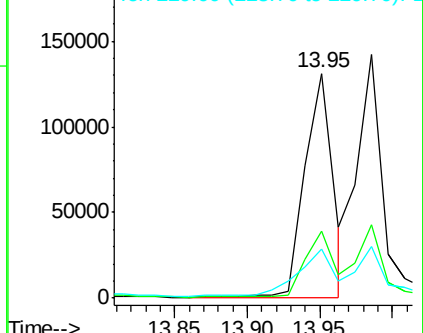
228 100

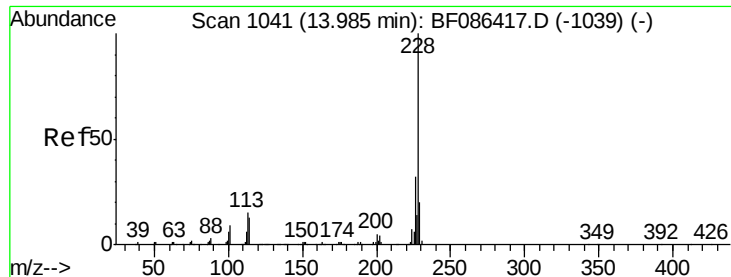
226 29.7 22.5 33.7

229 21.9 16.6 25.0



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





#82

Chrysene

Concen: 5.11 ng

RT: 13.95 min Scan# 1038

Delta R.T. -0.03 min

Lab File: BF086466.D

Acq: 28 Apr 2016 11:23

Instrument :

BNA\_F

ClientSampleId :

TEC-COMP-B1ARE

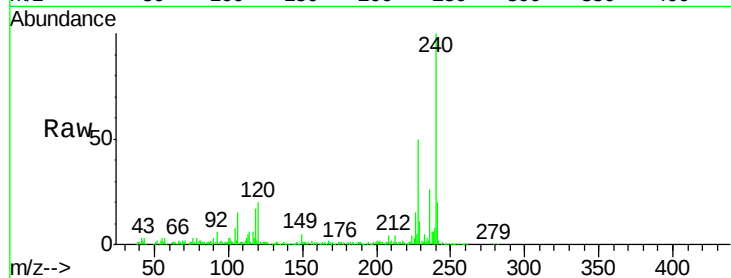
Tot Ion:228 Resp: 174341

Ion Ratio Lower Upper

228 100

226 29.7 24.4 36.6

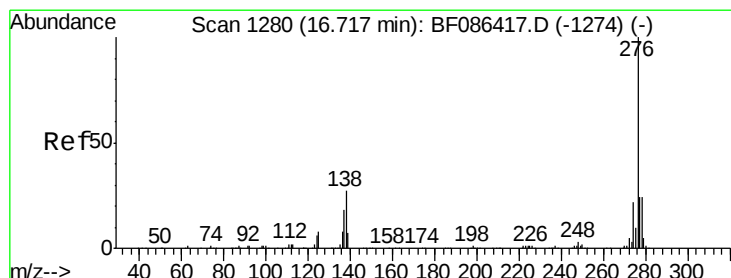
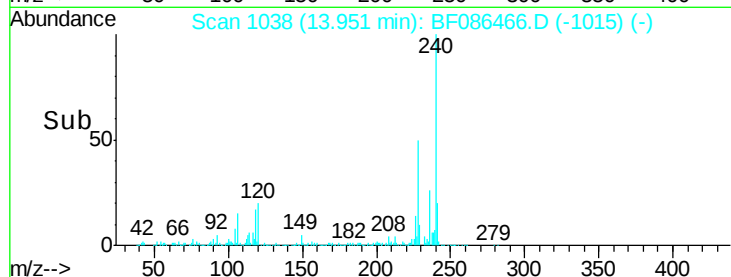
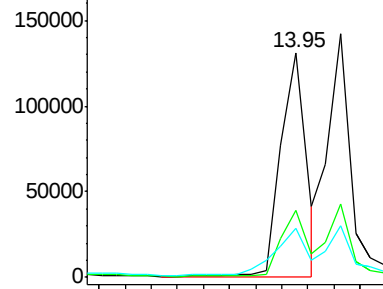
229 21.9 15.8 23.8



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



#85

Indeno(1,2,3-cd)pyrene

Concen: 2.28 ng

RT: 16.72 min Scan# 1280

Delta R.T. 0.00 min

Lab File: BF086466.D

Acq: 28 Apr 2016 11:23

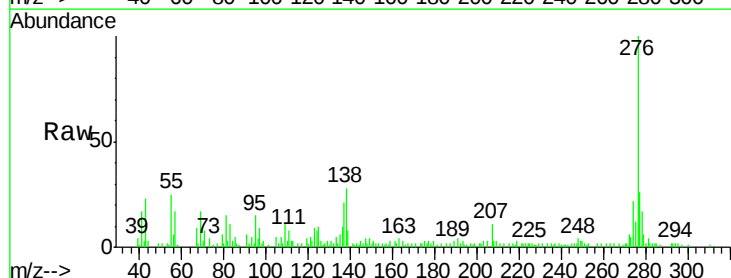
Tgt Ion:276 Resp: 57639

Ion Ratio Lower Upper

276 100

138 26.5 25.6 38.4

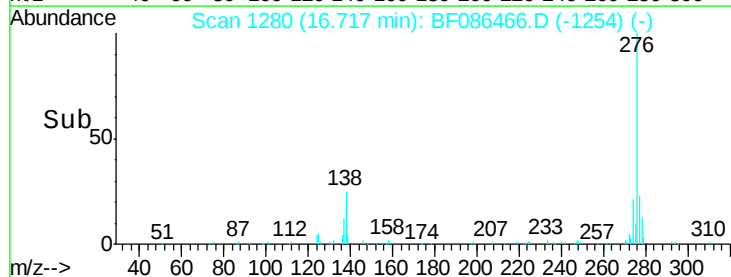
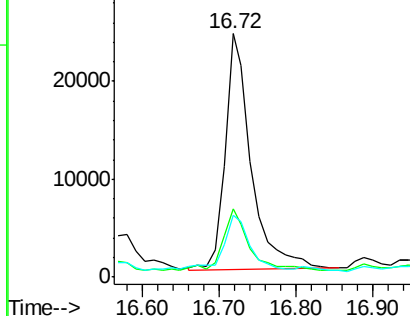
277 24.4 20.5 30.7

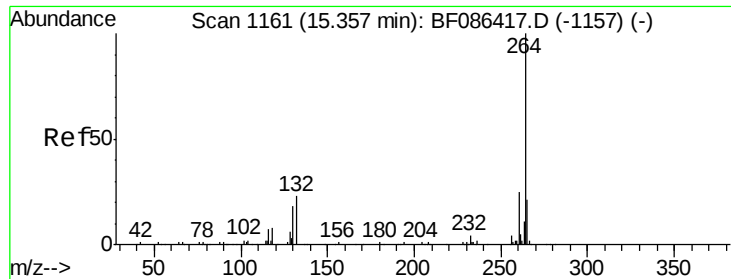


Abundance Ion 276.00 (275.70 to 276.70): E

Ion 138.00 (137.70 to 138.70): E

Ion 277.00 (276.70 to 277.70): E





#86

Pervlene-d12

Concen: 20.00 ng

RT: 15.37 min Scan# 1162

Delta R.T. 0.01 min

Lab File: BF086466.D

Acq: 28 Apr 2016 11:23

Instrument :

BNA\_F

ClientSampleId :

TEC-COMP-B1ARE

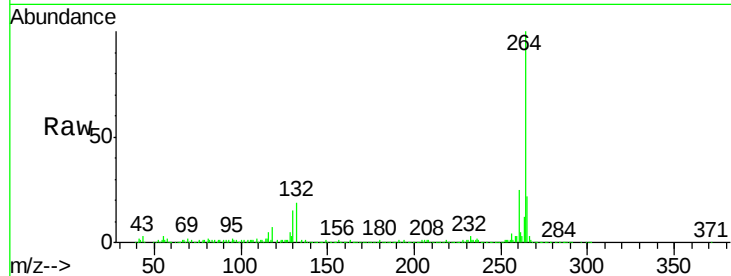
Tot Ion:264 Resp: 411831

Ion Ratio Lower Upper

264 100

260 24.8 19.5 29.3

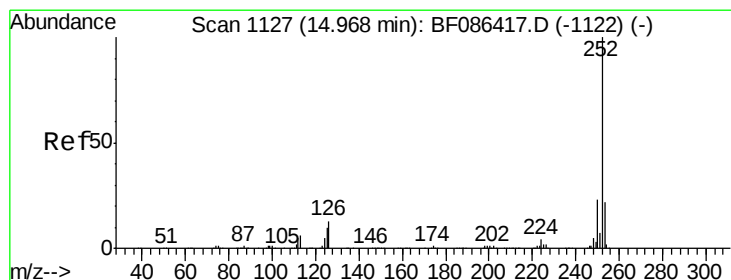
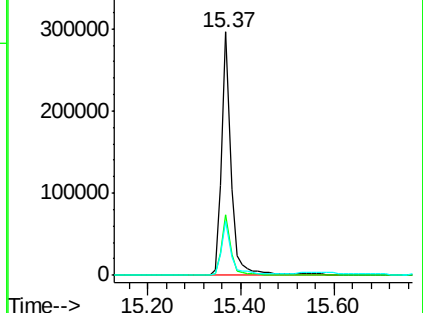
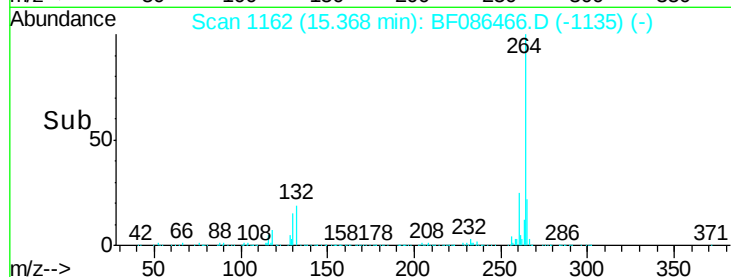
265 22.3 17.3 25.9



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: 9.78 ng

RT: 14.97 min Scan# 1127

Delta R.T. 0.00 min

Lab File: BF086466.D

Acq: 28 Apr 2016 11:23

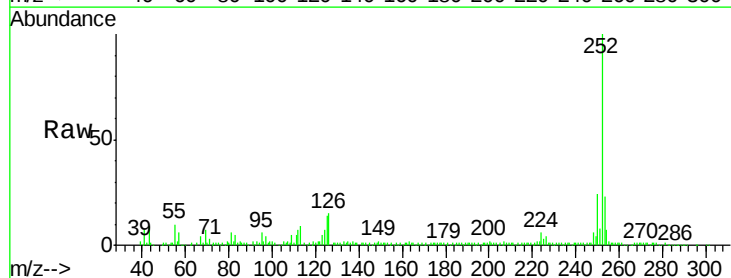
Tgt Ion:252 Resp: 237016

Ion Ratio Lower Upper

252 100

253 23.3 17.8 26.6

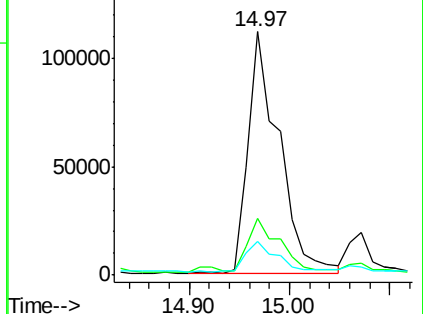
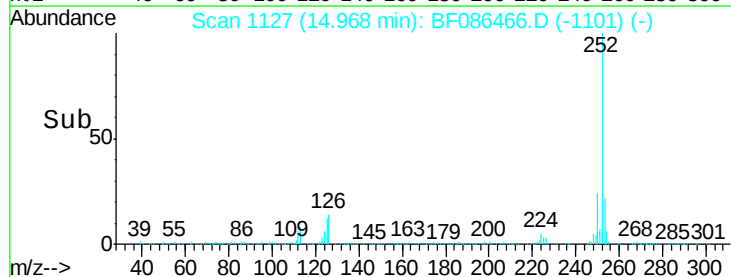
125 13.9 11.4 17.0

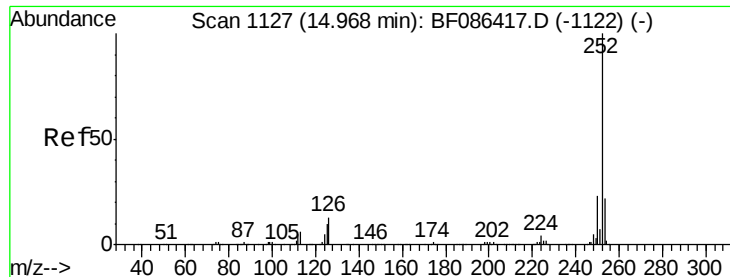


Abundance Ion 252.00 (251.70 to 252.70): E

Ion 253.00 (252.70 to 253.70): E

Ion 125.00 (124.70 to 125.70): E





#88

Benzo(k)fluoranthene

Concen: 9.38 ng

RT: 14.97 min Scan# 1127

Delta R.T. -0.02 min

Lab File: BF086466.D

Acq: 28 Apr 2016 11:23

Instrument :

BNA\_F

ClientSampleId :

TEC-COMP-B1ARE

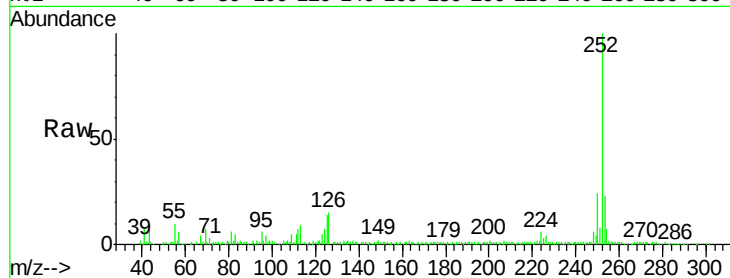
Tot Ion:252 Resp: 237016

Ion Ratio Lower Upper

252 100

253 23.3 17.8 26.6

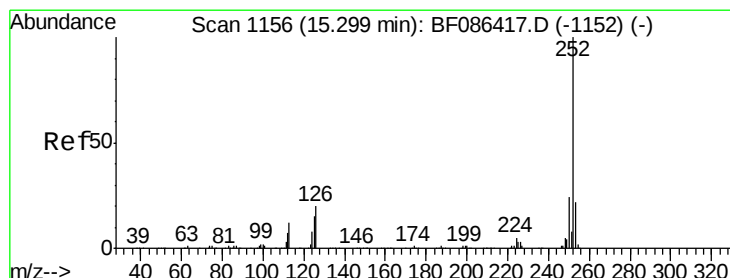
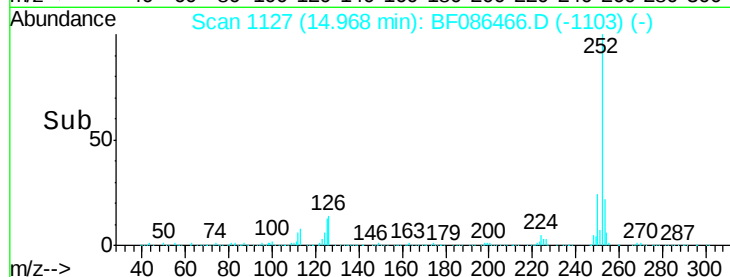
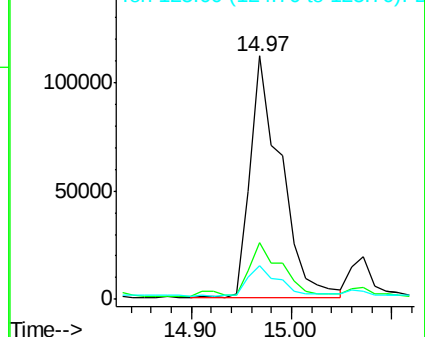
125 13.9 9.1 13.7#



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: 5.18 ng

RT: 15.31 min Scan# 1157

Delta R.T. 0.01 min

Lab File: BF086466.D

Acq: 28 Apr 2016 11:23

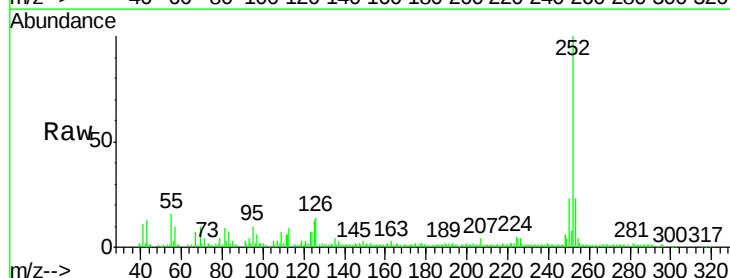
Tgt Ion:252 Resp: 118428

Ion Ratio Lower Upper

252 100

253 23.2 17.2 25.8

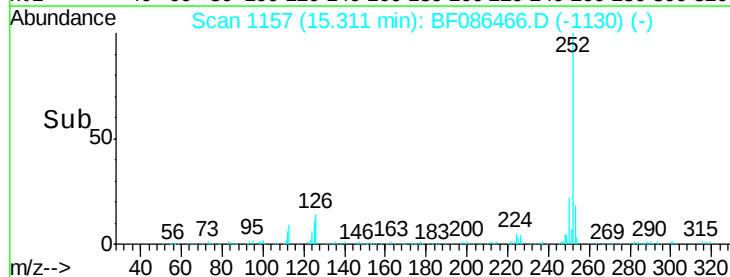
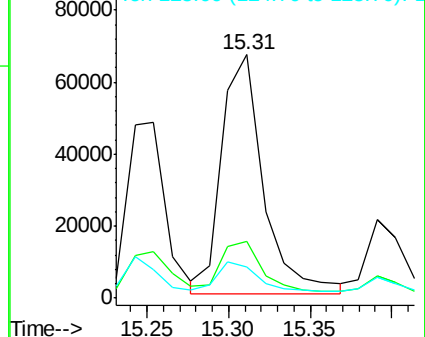
125 12.6 9.0 13.6

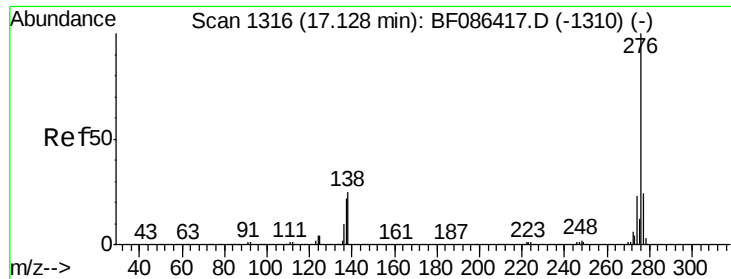


Abundance Ion 252.00 (251.70 to 252.70): E

Ion 253.00 (252.70 to 253.70): E

Ion 125.00 (124.70 to 125.70): E

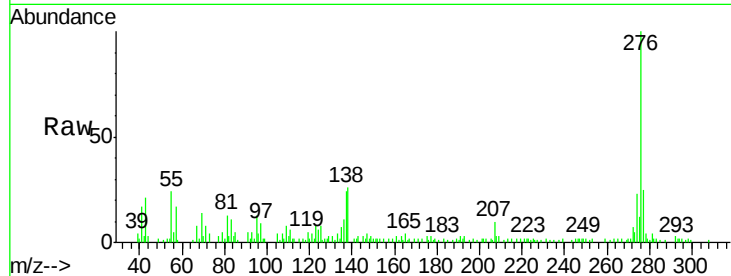




#91  
 Benzo(a,h,i)perylene  
 Concen: 3.15 ng  
 RT: 17.13 min Scan# 1316  
 Delta R.T. 0.00 min  
 Lab File: BF086466.D  
 Acq: 28 Apr 2016 11:23

Instrument :  
 BNA\_F  
 ClientSampleId :  
 TEC-COMP-B1ARE

| Tot Ion | Ratio | Lower | Upper |
|---------|-------|-------|-------|
| 276     | 100   |       |       |
| 277     | 24.6  | 19.6  | 29.4  |
| 138     | 26.4  | 23.6  | 35.4  |



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

