

Data Path : Z:\HPCHEM1\BNA F\DATA\BF080817\  
 Data File : BF097477.D  
 Acq On : 8 Aug 2017 19:20  
 Operator : SJ/JU  
 Sample : I4555-01  
 Misc :  
 ALS Vial : 3 Sample Multiplier: 1

Instrument :  
 BNA\_F  
 ClientSampleId :

Quant Time: Aug 08 19:51:45 2017  
 Quant Method : Z:\HPCHEM1\BNA F\METHODS\8270-BF072517.M  
 Quant Title : ASP BNA STANDARDS FOR 5 POINT CALIBRATION  
 QLast Update : Mon Aug 07 16:02:51 2017  
 Response via : Initial Calibration

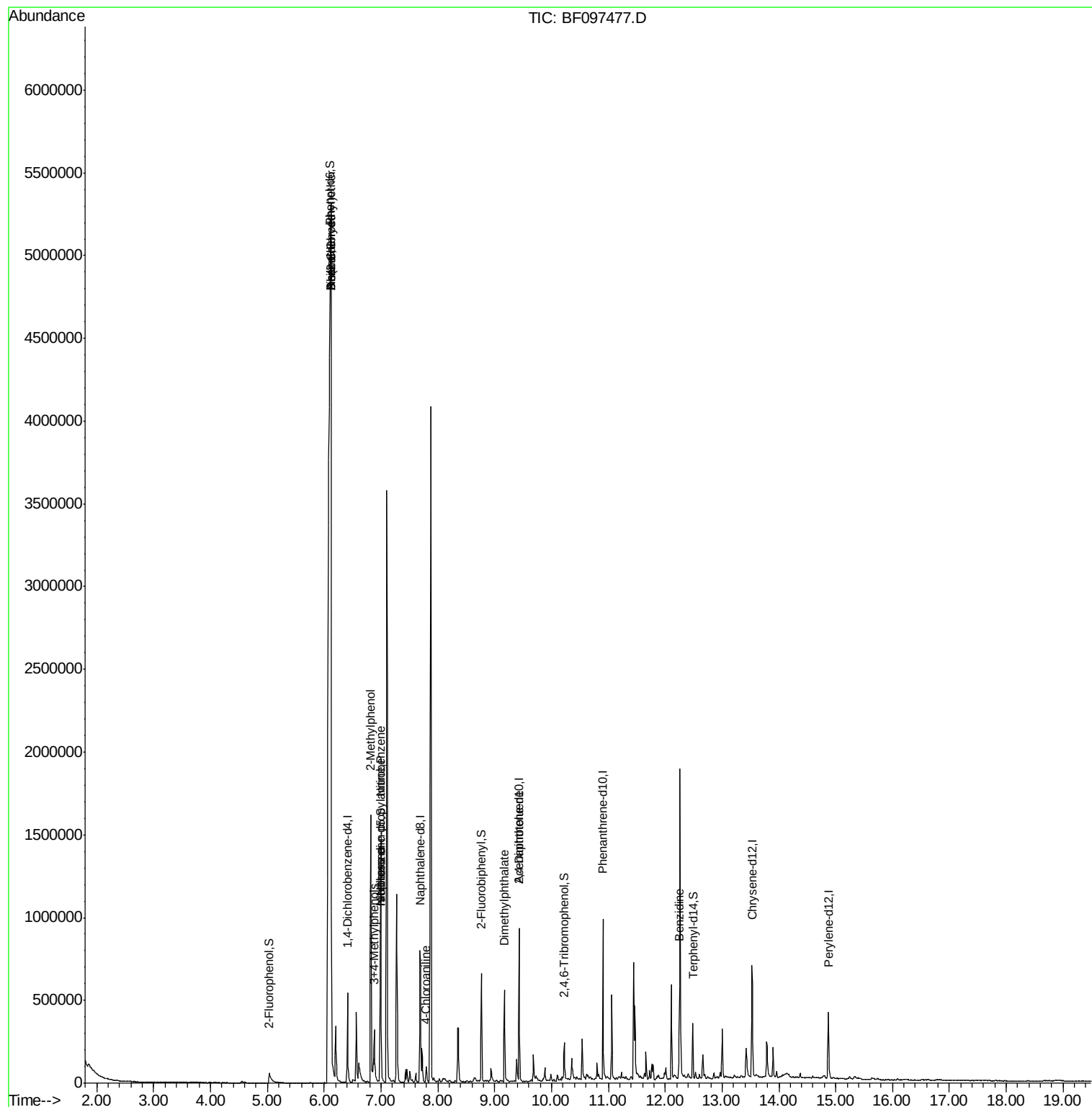
| Internal Standards             | R.T.  | QIon | Response | Conc    | Units | Dev(Min) |
|--------------------------------|-------|------|----------|---------|-------|----------|
| 1) 1,4-Dichlorobenzene-d4      | 6.41  | 152  | 90715    | 20.00   | ng    | 0.00     |
| 21) Naphthalene-d8             | 7.69  | 136  | 387231   | 20.00   | ng    | -0.01    |
| 38) Acenaphthene-d10           | 9.43  | 164  | 187918   | 20.00   | ng    | -0.01    |
| 63) Phenanthrene-d10           | 10.90 | 188  | 313181   | 20.00   | ng    | -0.01    |
| 75) Chrysene-d12               | 13.53 | 240  | 234150   | 20.00   | ng    | -0.01    |
| 86) Perylene-d12               | 14.87 | 264  | 167556   | 20.00   | ng    | 0.00     |
| System Monitoring Compounds    |       |      |          |         |       |          |
| 5) 2-Fluorophenol              | 5.03  | 112  | 57674    | 9.58    | ng    | 0.03     |
| 7) Phenol-d6                   | 6.10  | 99   | 30223    | 4.40    | ng    | 0.01     |
| 23) Nitrobenzene-d5            | 6.98  | 82   | 126238   | 19.12   | ng    | -0.01    |
| 41) 2,4,6-Tribromophenol       | 10.22 | 330  | 23207    | 15.63   | ng    | -0.01    |
| 44) 2-Fluorobiphenyl           | 8.76  | 172  | 193802   | 17.50   | ng    | -0.01    |
| 78) Terphenyl-d14              | 12.49 | 244  | 97066    | 8.45    | ng    | -0.01    |
| Target Compounds               |       |      |          |         |       |          |
| 6) Aniline                     | 6.12  | 93   | 5871918  | 679.234 | ng    | 95       |
| 9) Benzaldehyde                | 6.12  | 77   | 71940    | 17.692  | ng    | # 1      |
| 10) Phenol                     | 6.11  | 94   | 585255   | 71.822  | ng    | # 1      |
| 11) bis(2-Chloroethyl)ether    | 6.12  | 93   | 5871918  | 911.102 | ng    | # 24     |
| 17) 2-Methylphenol             | 6.82  | 107  | 340505   | 68.566  | ng    | # 33     |
| 19) n-Nitroso-di-n-propylamine | 6.98  | 70   | 16698    | 3.693   | ng    | # 66     |
| 20) 3+4-Methylphenols          | 6.88  | 107  | 132640   | 20.450  | ng    | # 54     |
| 24) Nitrobenzene               | 6.99  | 77   | 86540    | 12.588  | ng    | # 48     |
| 25) Isophorone                 | 6.98  | 82   | 126238   | 9.766   | ng    | # 67     |
| 33) 4-Chloroaniline            | 7.79  | 127  | 28472    | 3.833   | ng    | # 91     |
| 49) Dimethylphthalate          | 9.17  | 163  | 205393   | 14.393  | ng    | 100      |
| 56) 2,4-Dinitrotoluene         | 9.43  | 165  | 23336    | 6.707   | ng    | # 34     |
| 76) Benzidine                  | 12.24 | 184  | 25114    | 2.891   | ng    | # 89     |

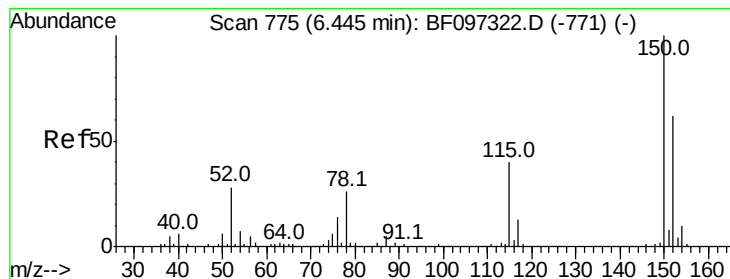
(#) = qualifier out of range (m) = manual integration (+) = signals summed

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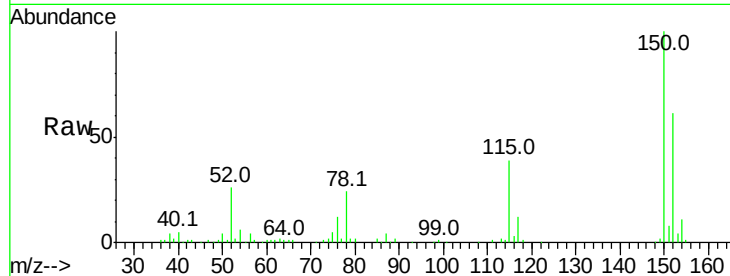


#1

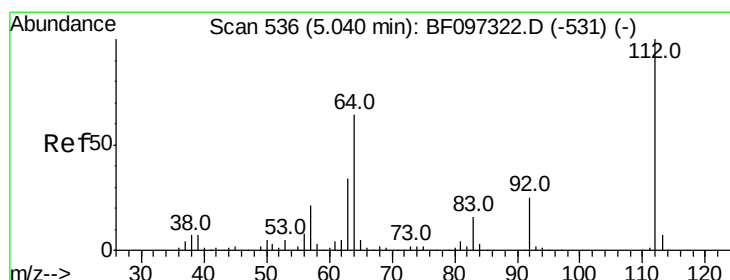
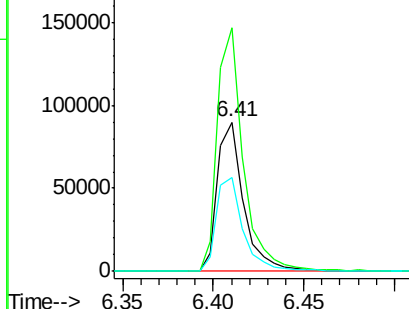
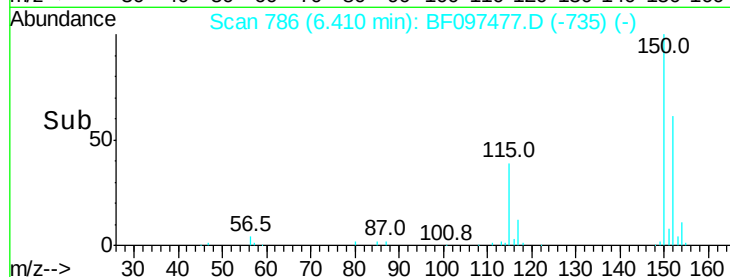
1,4-Dichlorobenzene-d4  
 Concen: 20.000 ng  
 RT: 6.41 min Scan# 786  
 Delta R.T. 0.00 min  
 Lab File: BF097477.D  
 Acq: 8 Aug 2017 19:20

Instrument :  
 BNA\_F  
 ClientSampleId :

Tot Ion:152 Resp: 90715  
 Ion Ratio Lower Upper  
 152 100  
 150 163.2 126.2 189.2  
 115 63.2 52.2 78.2



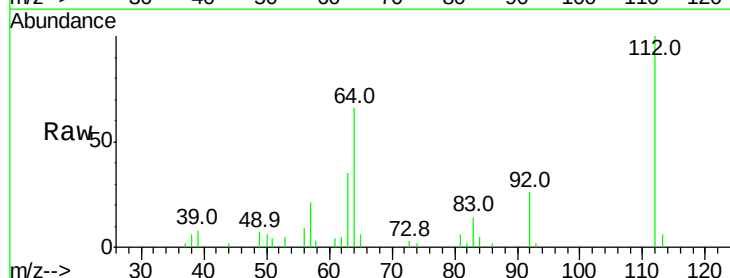
Abundance Ion 152.00 (151.70 to 152.70): E  
 Ion 150.00 (149.70 to 150.70): E  
 Ion 115.00 (114.70 to 115.70): E



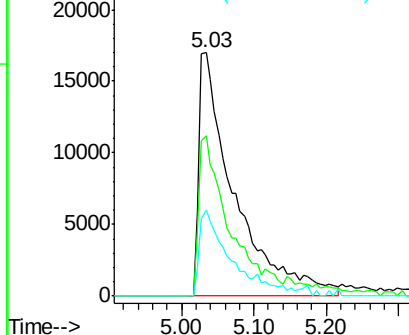
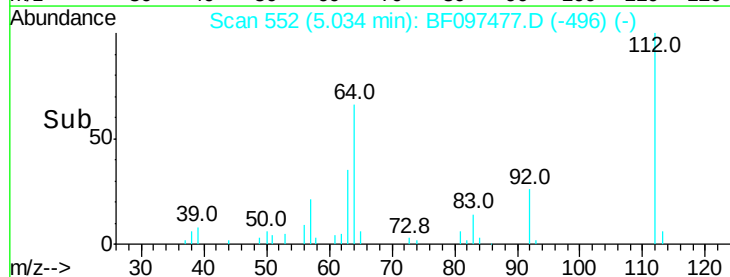
#5

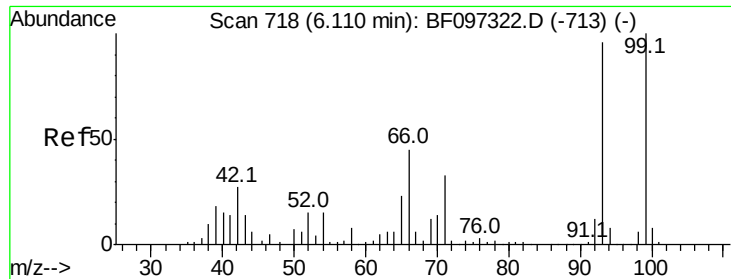
2-Fluorophenol  
 Concen: 9.584 ng  
 RT: 5.03 min Scan# 552  
 Delta R.T. 0.03 min  
 Lab File: BF097477.D  
 Acq: 8 Aug 2017 19:20

Tgt Ion:112 Resp: 57674  
 Ion Ratio Lower Upper  
 112 100  
 64 65.9 46.0 69.0  
 63 35.3 23.4 35.0#



Abundance Ion 112.00 (111.70 to 112.70): E  
 Ion 64.00 (63.70 to 64.70): BF0  
 Ion 63.00 (62.70 to 63.70): BF0





#6

Aniline

Concen: 679.234 ng

RT: 6.12 min Scan# 737

Delta R.T. 0.05 min

Lab File: BF097477.D

Acq: 8 Aug 2017 19:20

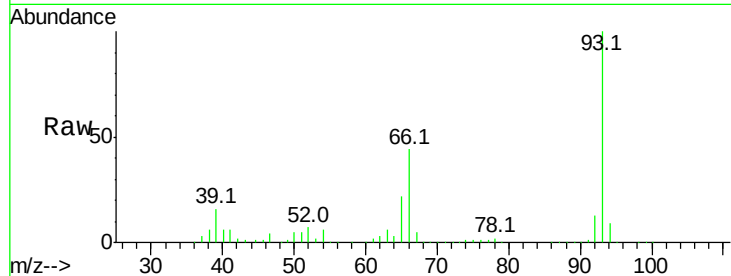
Instrument :

BNA\_F

ClientSampled :

Tot Ion: 93 Resp: 5871918

| Ion | Ratio | Lower | Upper |
|-----|-------|-------|-------|
| 93  | 100   |       |       |
| 66  | 44.5  | 32.9  | 49.3  |
| 65  | 22.5  | 16.0  | 24.0  |

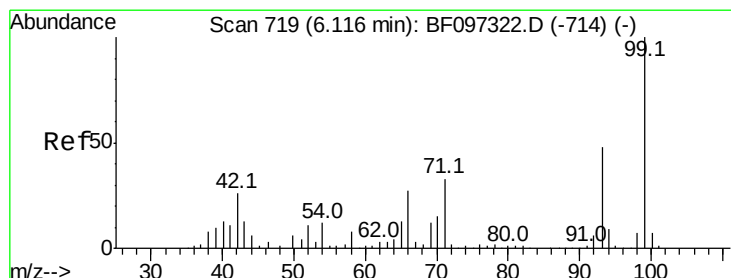
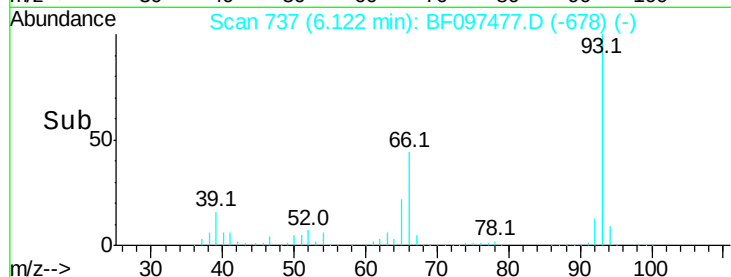
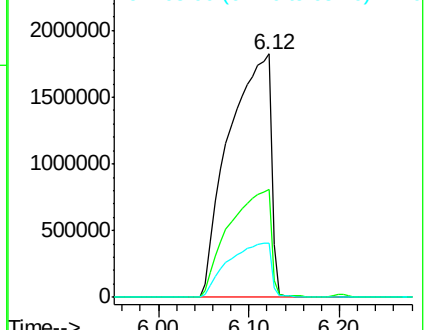


Abundance

Ion 93.00 (92.70 to 93.70): BF0

Ion 66.00 (65.70 to 66.70): BF0

Ion 65.00 (64.70 to 65.70): BF0



#7

Phenol-d6

Concen: 4.399 ng

RT: 6.10 min Scan# 733

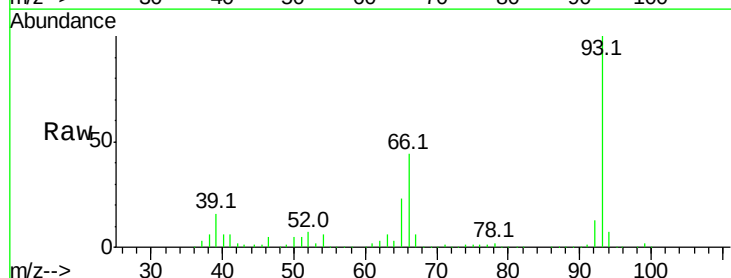
Delta R.T. 0.01 min

Lab File: BF097477.D

Acq: 8 Aug 2017 19:20

Tgt Ion: 99 Resp: 30223

| Ion | Ratio | Lower | Upper |
|-----|-------|-------|-------|
| 99  | 100   |       |       |
| 42  | 95.2  | 13.5  | 20.3# |
| 71  | 36.4  | 24.5  | 36.7  |

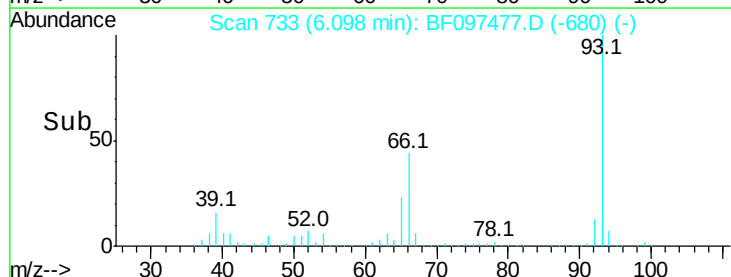
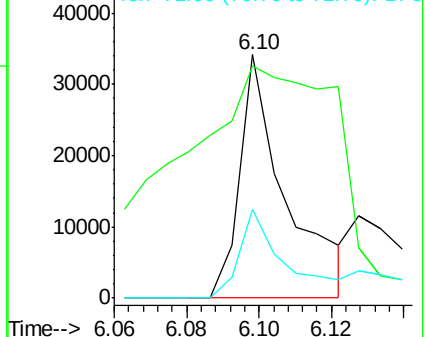


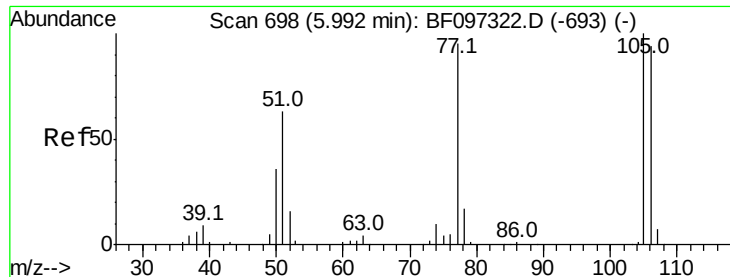
Abundance

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





#9

Benzaldehyde

Concen: 17.692 ng

RT: 6.12 min Scan# 737

Delta R.T. 0.16 min

Lab File: BF097477.D

Acq: 8 Aug 2017 19:20

Instrument :

BNA\_F

ClientSampleId :

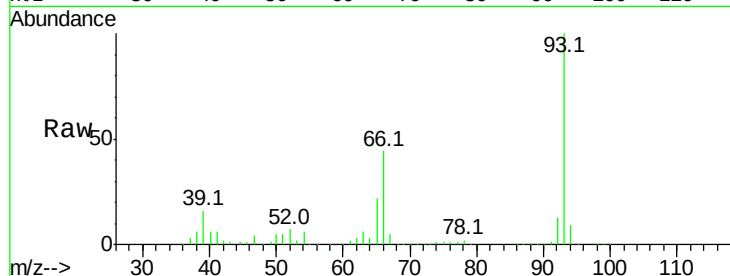
Tot Ion: 77 Resp: 71940

Ion Ratio Lower Upper

77 100

105 0.0 83.8 123.8#

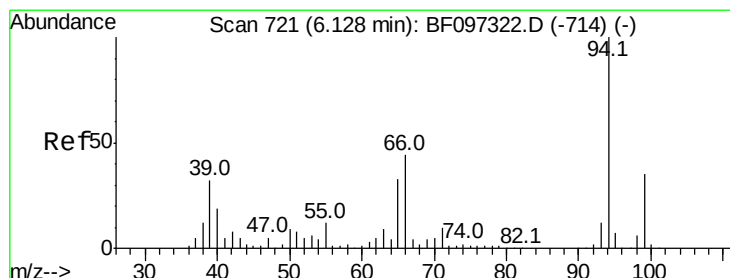
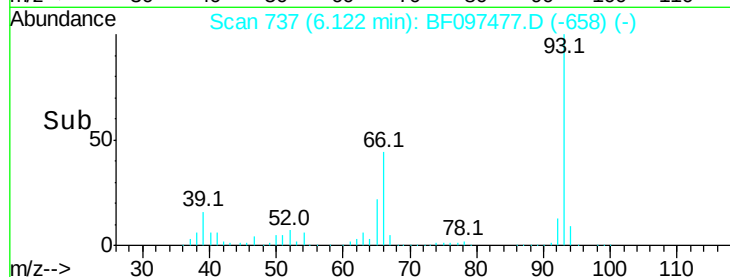
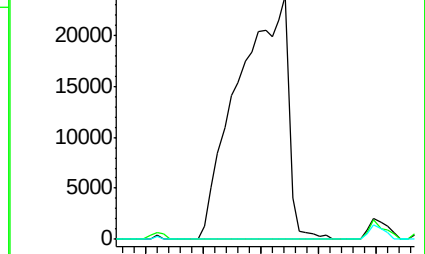
106 0.0 79.1 119.1#



Abundance Ion 77.00 (76.70 to 77.70): BF0

Ion 105.00 (104.70 to 105.70): BF0

Ion 106.00 (105.70 to 106.70): BF0



#10

Phenol

Concen: 71.822 ng

RT: 6.11 min Scan# 735

Delta R.T. 0.01 min

Lab File: BF097477.D

Acq: 8 Aug 2017 19:20

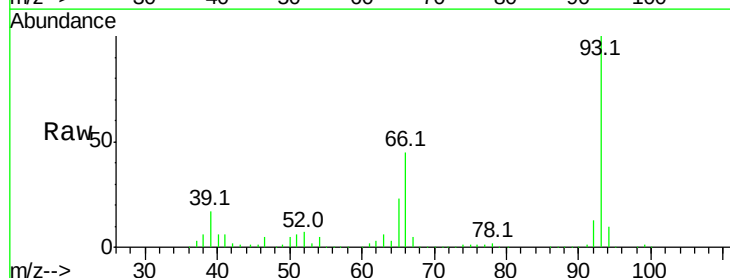
Tgt Ion: 94 Resp: 585255

Ion Ratio Lower Upper

94 100

65 227.3 9.9 49.9#

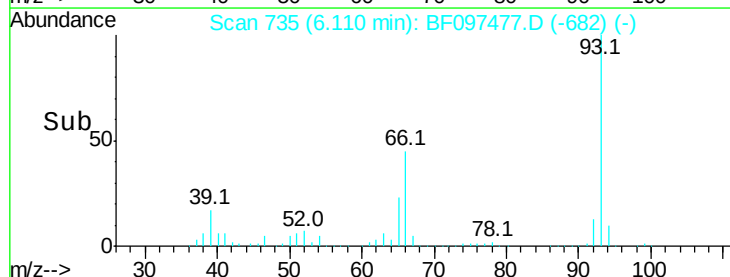
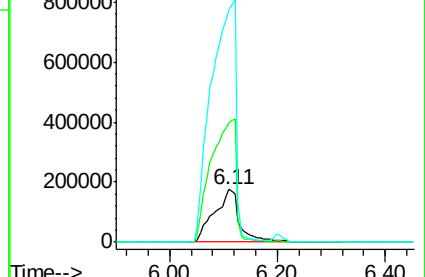
66 442.7 23.1 63.1#

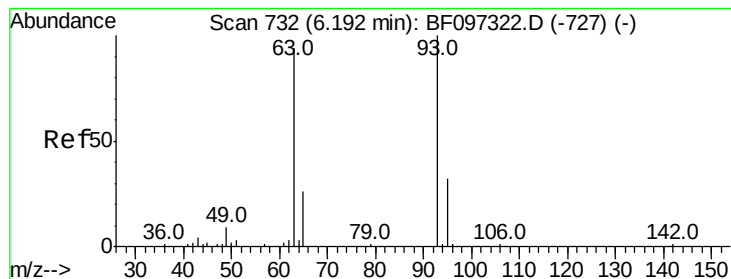


Abundance Ion 94.00 (93.70 to 94.70): BF0

Ion 65.00 (64.70 to 65.70): BF0

Ion 66.00 (65.70 to 66.70): BF0





#11

bis(2-Chloroethyl)ether

Concen: 911.102 ng

RT: 6.12 min Scan# 737

Delta R.T. -0.04 min

Lab File: BF097477.D

Acq: 8 Aug 2017 19:20

Instrument :

BNA\_F

ClientSampleId :

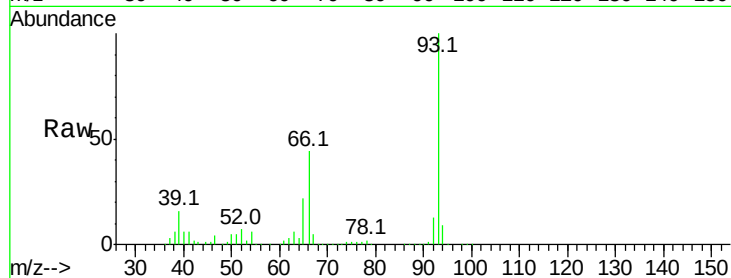
Tot Ion: 93 Resp: 5871918

Ion Ratio Lower Upper

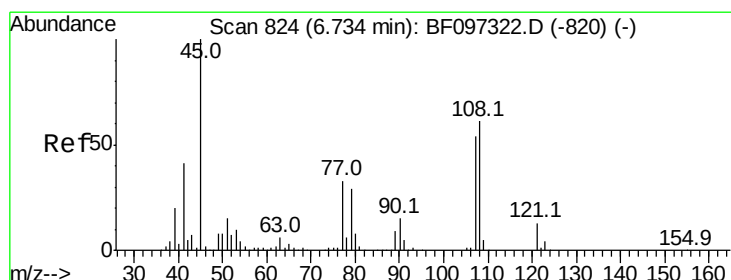
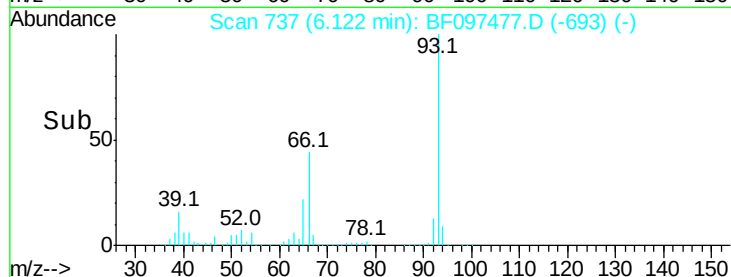
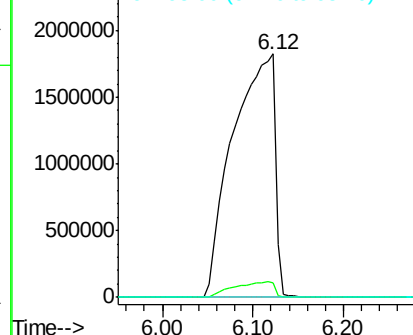
93 100

63 6.2 59.2 99.2#

95 0.3 12.8 52.8#



Abundance Ion 93.00 (92.70 to 93.70): BF0  
Ion 63.00 (62.70 to 63.70): BF0  
Ion 95.00 (94.70 to 95.70): BF0



#17

2-Methylphenol

Concen: 68.566 ng

RT: 6.82 min Scan# 855

Delta R.T. 0.11 min

Lab File: BF097477.D

Acq: 8 Aug 2017 19:20

Tgt Ion:107 Resp: 340505

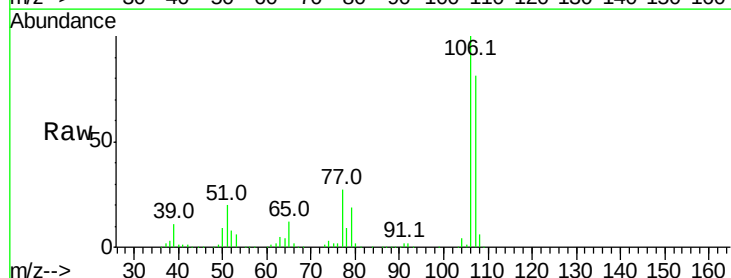
Ion Ratio Lower Upper

107 100

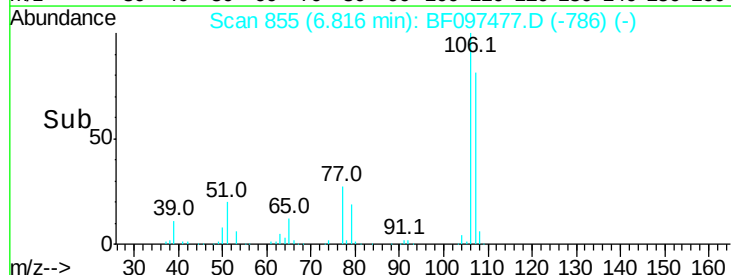
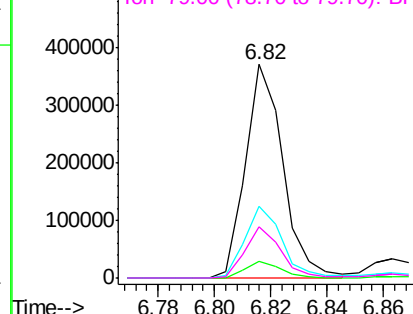
108 7.6 93.4 140.0#

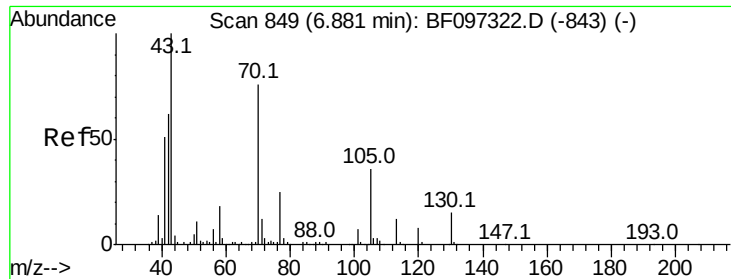
77 33.9 35.8 53.6#

79 23.9 34.8 52.2#



Abundance Ion 107.00 (106.70 to 107.70): E  
Ion 108.00 (107.70 to 108.70): E  
Ion 77.00 (76.70 to 77.70): BF0  
Ion 79.00 (78.70 to 79.70): BF0

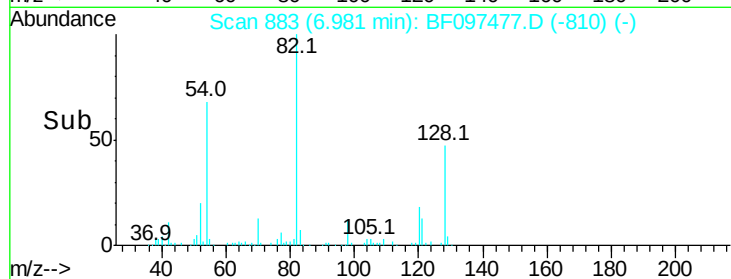
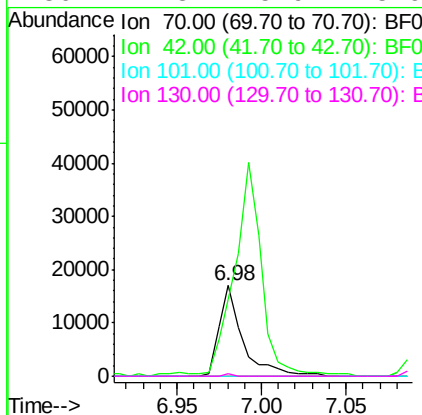
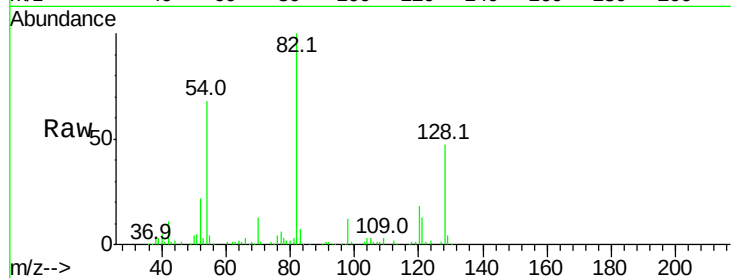




#19  
n-Nitroso-di-n-propylamine  
Concen: 3.693 ng  
RT: 6.98 min Scan# 883  
Delta R.T. 0.13 min  
Lab File: BF097477.D  
Acq: 8 Aug 2017 19:20

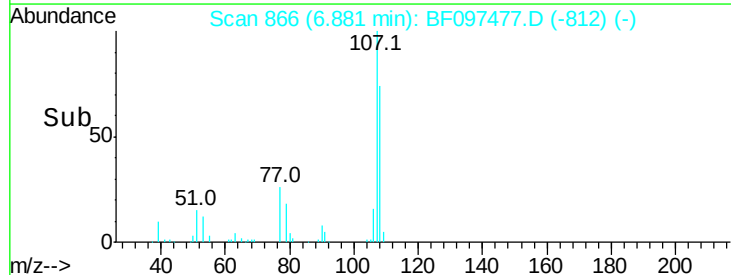
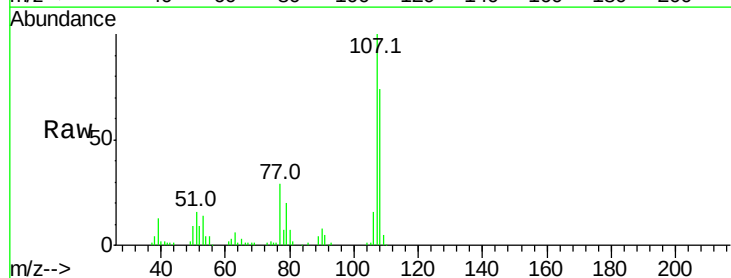
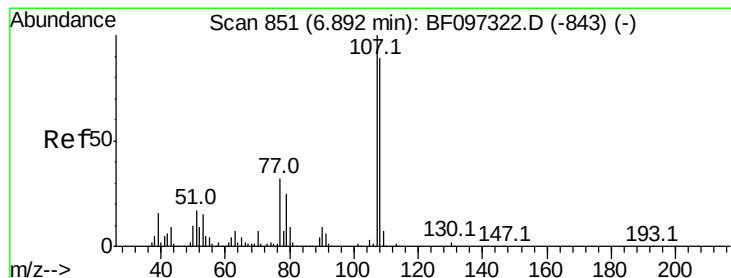
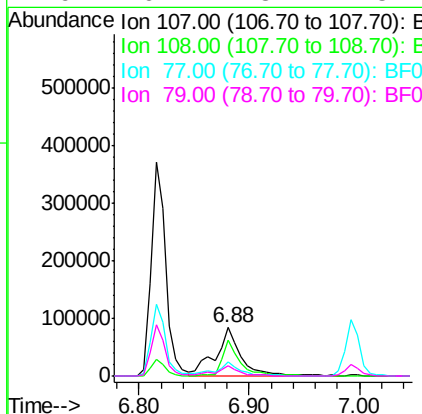
Instrument :  
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ClientSampleId :

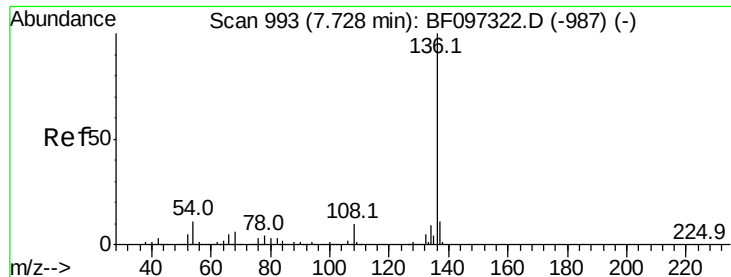
Tot Ion: 70 Resp: 16698  
Ion Ratio Lower Upper  
70 100  
42 84.4 47.2 70.8#  
101 0.0 7.2 10.8#  
130 2.3 15.9 23.9#



#20  
3+4-Methylphenols  
Concen: 20.450 ng  
RT: 6.88 min Scan# 866  
Delta R.T. 0.02 min  
Lab File: BF097477.D  
Acq: 8 Aug 2017 19:20

Tgt Ion:107 Resp: 132640  
Ion Ratio Lower Upper  
107 100  
108 74.1 71.0 111.0  
77 29.2 90.5 130.5#  
79 20.1 8.4 48.4

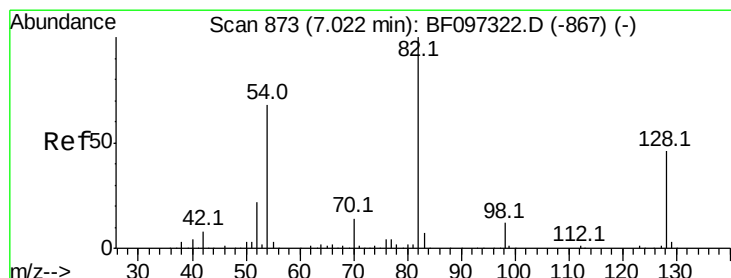
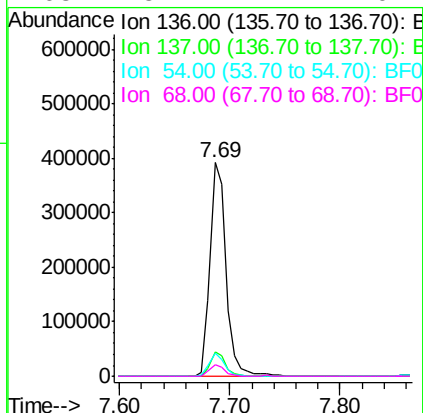
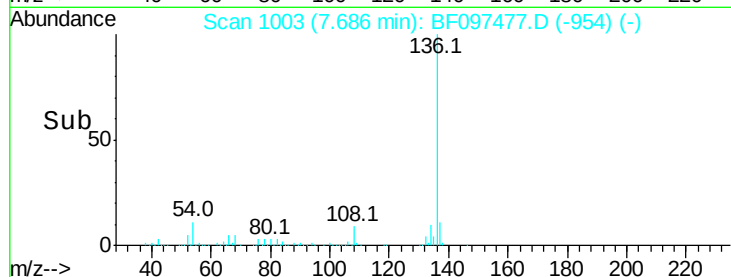
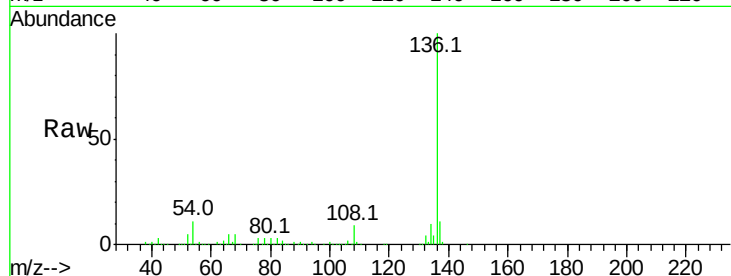




#21  
Naphthalene-d8  
Concen: 20.000 ng  
RT: 7.69 min Scan# 1003  
Delta R.T. -0.01 min  
Lab File: BF097477.D  
Acq: 8 Aug 2017 19:20

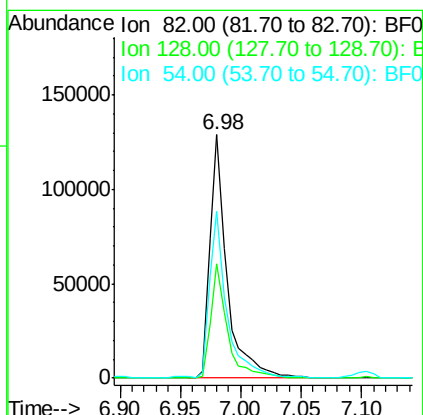
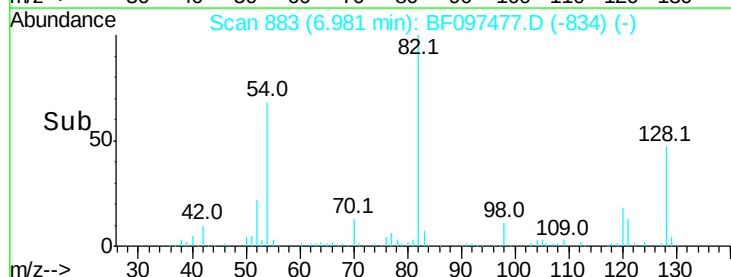
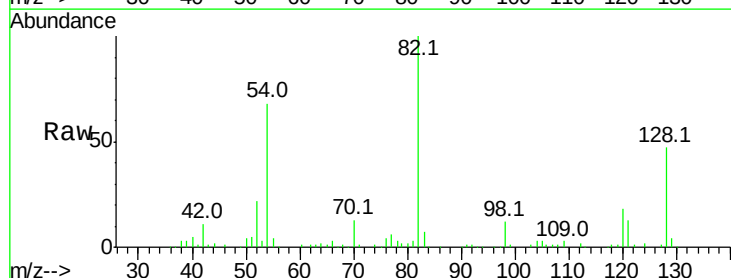
Instrument :  
BNA\_F  
ClientSampleId :

Tot Ion:136 Resp: 387231  
Ion Ratio Lower Upper  
136 100  
137 11.3 8.5 12.7  
54 10.5 4.9 7.3#  
68 5.1 4.1 6.1

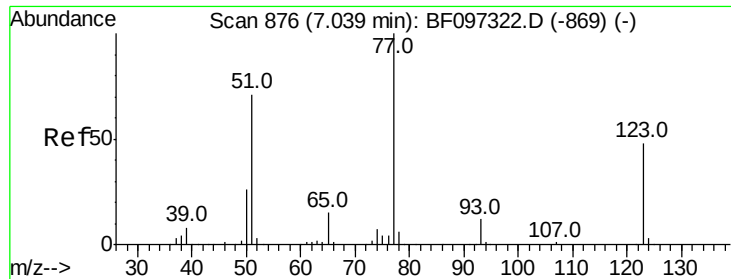


#23  
Nitrobenzene-d5  
Concen: 19.125 ng  
RT: 6.98 min Scan# 883  
Delta R.T. -0.01 min  
Lab File: BF097477.D  
Acq: 8 Aug 2017 19:20

Tgt Ion: 82 Resp: 126238  
Ion Ratio Lower Upper  
82 100  
128 47.2 34.0 51.0  
54 68.3 42.2 63.2#







#24

Nitrobenzene

Concen: 12.588 ng

RT: 6.99 min Scan# 885

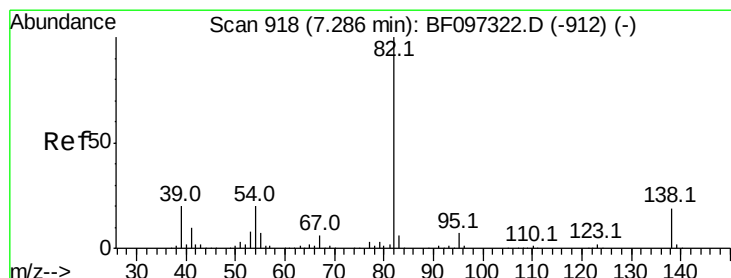
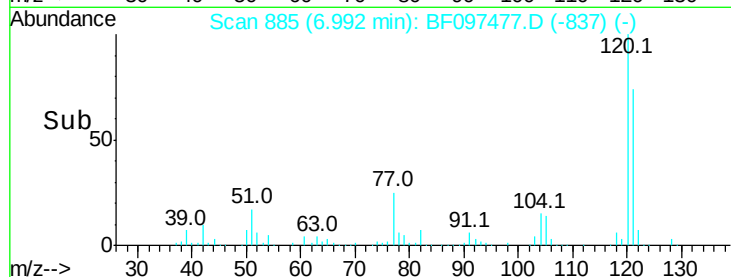
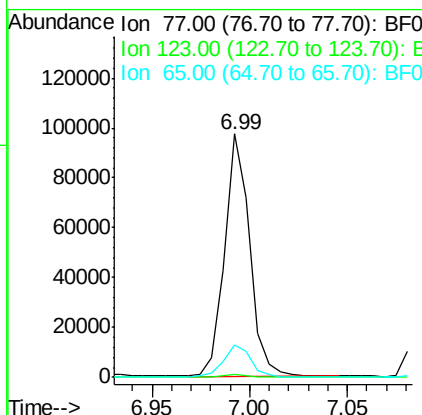
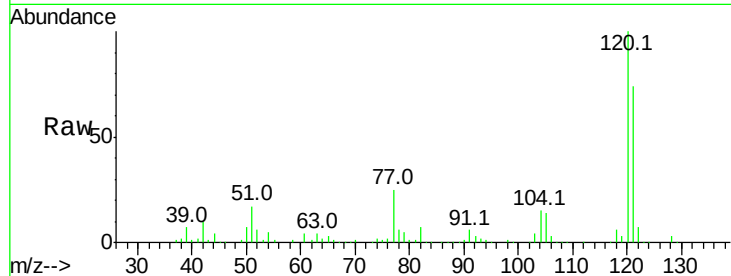
Delta R.T. -0.02 min

Lab File: BF097477.D

Acq: 8 Aug 2017 19:20

Instrument :  
BNA\_F  
ClientSampled :

| Tot Ion | Ratio | Lower | Upper |
|---------|-------|-------|-------|
| 77      | 100   |       |       |
| 123     | 1.0   | 35.8  | 53.8# |
| 65      | 13.4  | 10.6  | 15.8  |



#25

Isophorone

Concen: 9.766 ng

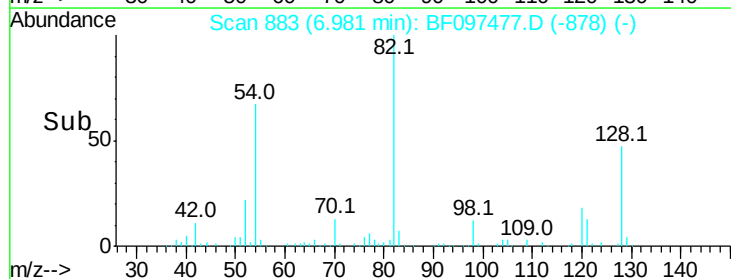
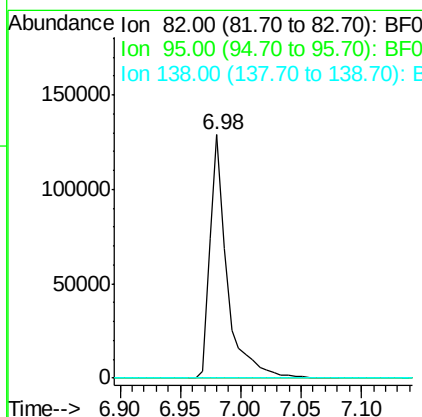
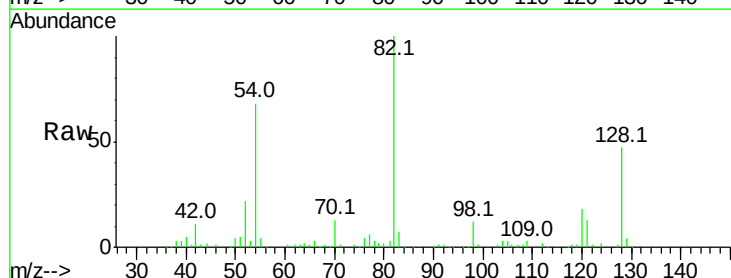
RT: 6.98 min Scan# 883

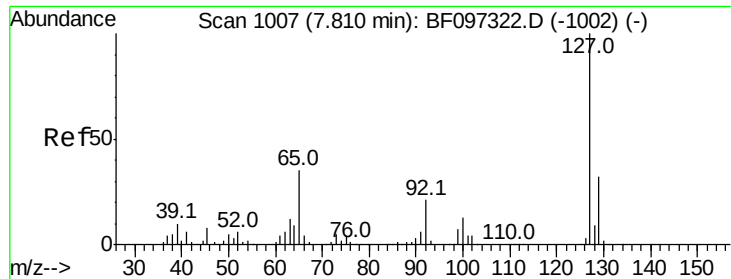
Delta R.T. -0.27 min

Lab File: BF097477.D

Acq: 8 Aug 2017 19:20

| Tgt Ion | Ratio | Lower | Upper |
|---------|-------|-------|-------|
| 82      | 100   |       |       |
| 95      | 0.0   | 5.3   | 7.9#  |
| 138     | 0.0   | 13.1  | 19.7# |

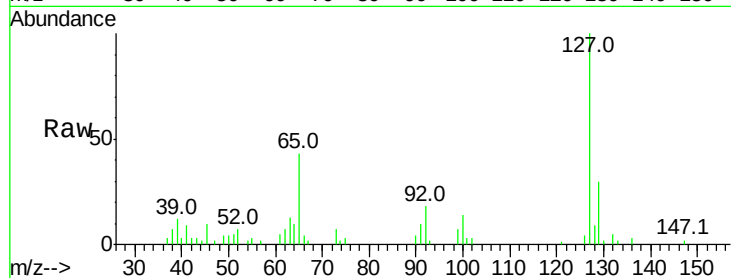




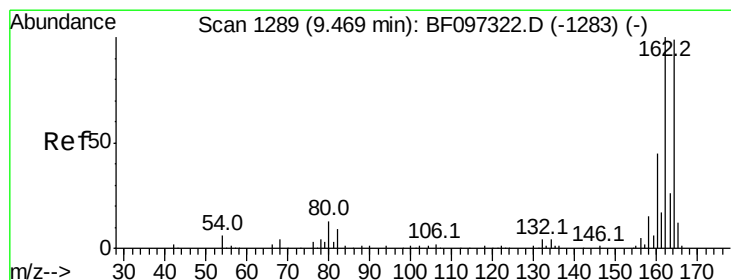
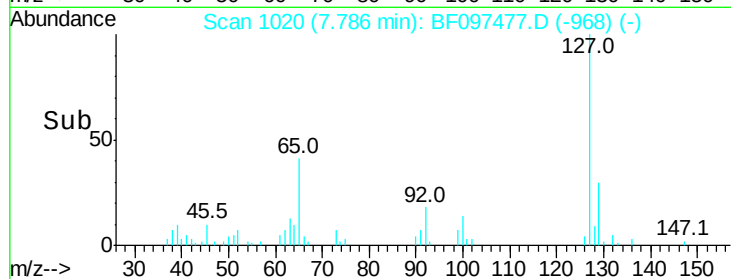
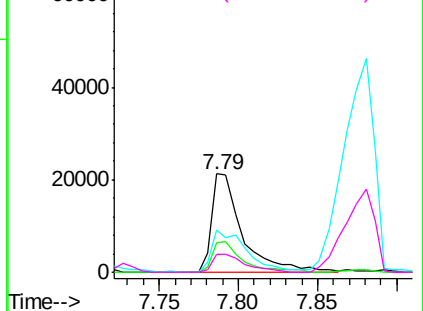
#33  
4-Chloroaniline  
Concen: 3.833 ng  
RT: 7.79 min Scan# 1020  
Delta R.T. 0.01 min  
Lab File: BF097477.D  
Acq: 8 Aug 2017 19:20

Instrument :  
BNA\_F  
ClientSampleId :

|             |       |            |
|-------------|-------|------------|
| Tot Ion:127 | Resp: | 28472      |
| Ion Ratio   | Lower | Upper      |
| 127         | 100   |            |
| 129         | 30.2  | 26.2 39.2  |
| 65          | 42.8  | 27.8 41.8# |
| 92          | 18.1  | 16.8 25.2  |

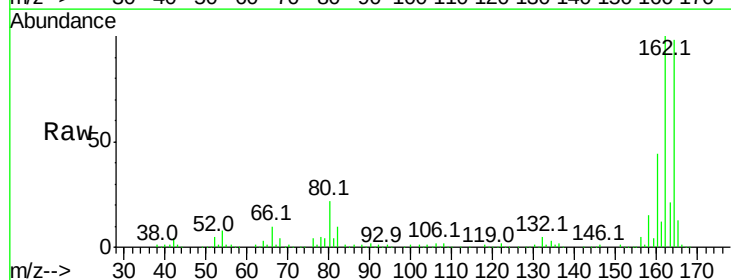


Abundance Ion 127.00 (126.70 to 127.70): E  
Ion 129.00 (128.70 to 129.70): E  
Ion 65.00 (64.70 to 65.70): BF0  
Ion 92.00 (91.70 to 92.70): BF0

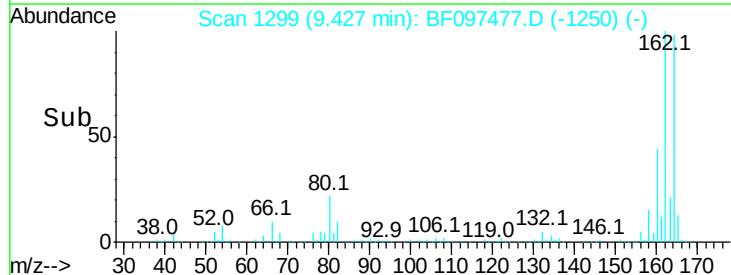
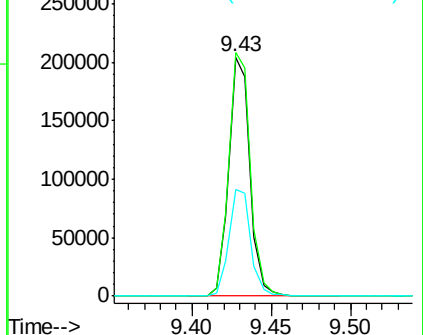


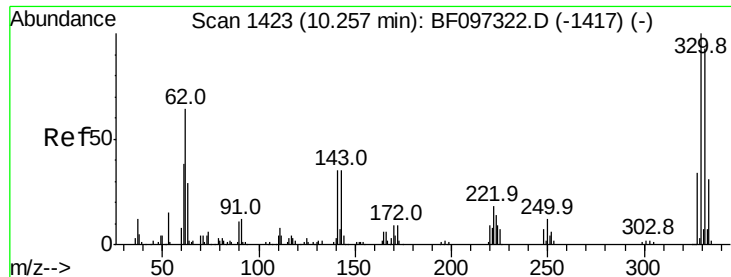
#38  
Acenaphthene-d10  
Concen: 20.000 ng  
RT: 9.43 min Scan# 1299  
Delta R.T. -0.01 min  
Lab File: BF097477.D  
Acq: 8 Aug 2017 19:20

|             |       |            |
|-------------|-------|------------|
| Tgt Ion:164 | Resp: | 187918     |
| Ion Ratio   | Lower | Upper      |
| 164         | 100   |            |
| 162         | 102.1 | 82.6 123.8 |
| 160         | 44.6  | 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

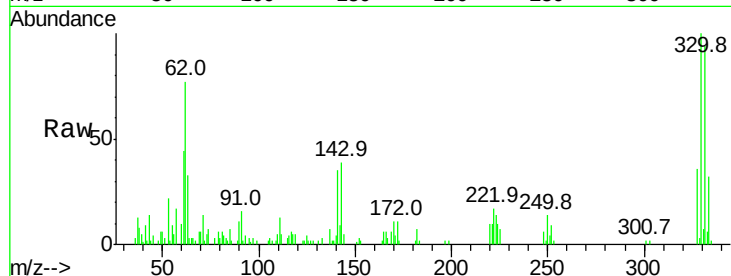




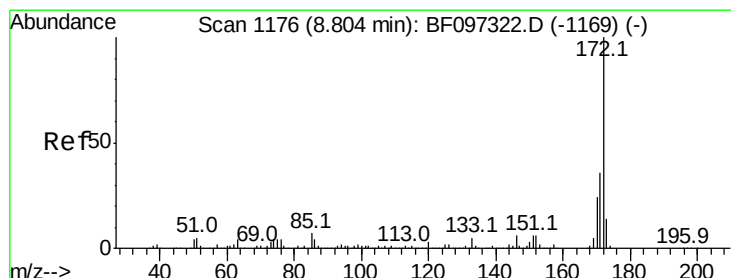
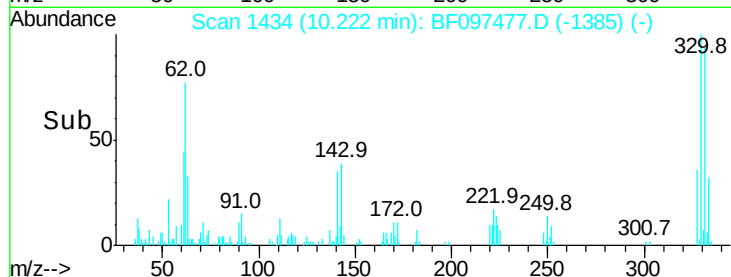
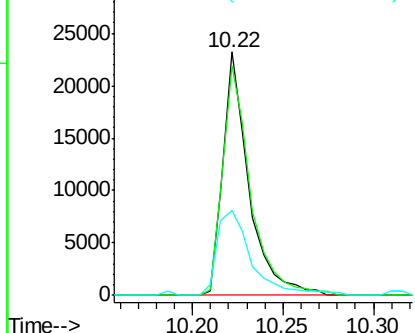
#41  
 2,4,6-Tribromophenol  
 Concen: 15.630 ng  
 RT: 10.22 min Scan# 1434  
 Delta R.T. -0.01 min  
 Lab File: BF097477.D  
 Acq: 8 Aug 2017 19:20

Instrument :  
 BNA\_F  
 ClientSampleId :

Tot Ion:330 Resp: 23207  
 Ion Ratio Lower Upper  
 330 100  
 332 101.0 76.6 115.0  
 141 46.4 31.4 47.2

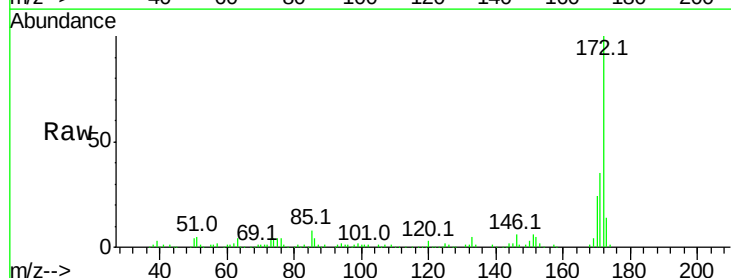


Abundance Ion 329.80 (329.50 to 330.50): E  
 Ion 331.80 (331.50 to 332.50): E  
 Ion 141.00 (140.70 to 141.70): E

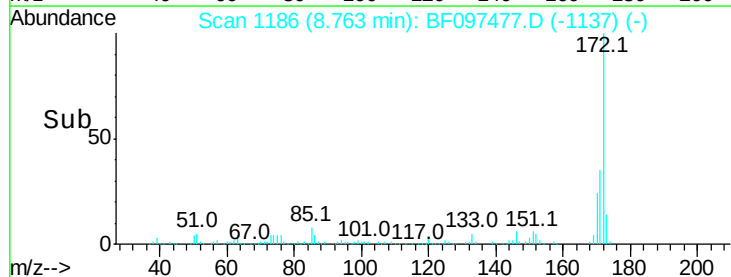
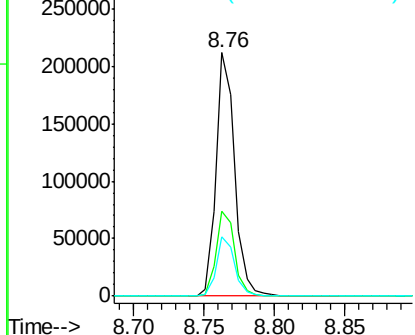


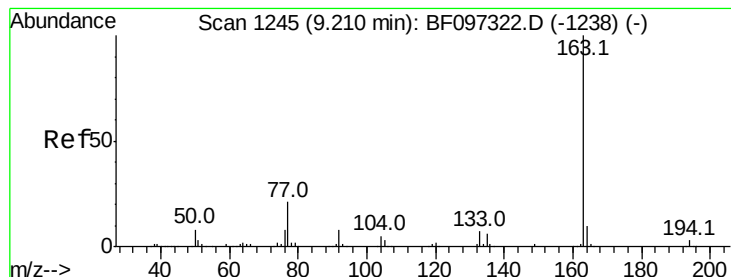
#44  
 2-Fluorobiphenyl  
 Concen: 17.502 ng  
 RT: 8.76 min Scan# 1186  
 Delta R.T. -0.01 min  
 Lab File: BF097477.D  
 Acq: 8 Aug 2017 19:20

Tgt Ion:172 Resp: 193802  
 Ion Ratio Lower Upper  
 172 100  
 171 35.0 29.6 44.4  
 170 24.5 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: 14.393 ng

RT: 9.17 min Scan# 1255

Delta R.T. -0.02 min

Lab File: BF097477.D

Acq: 8 Aug 2017 19:20

Instrument :

BNA\_F

ClientSampleId :

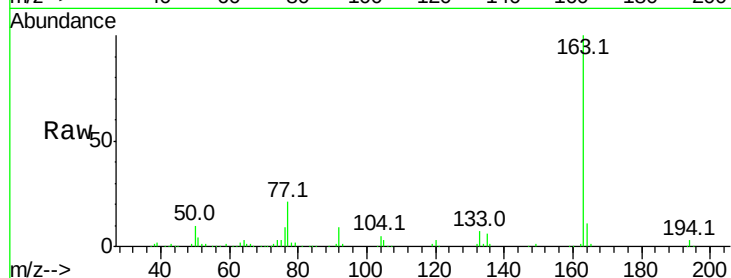
Tot Ion:163 Resp: 205393

Ion Ratio Lower Upper

163 100

194 3.0 2.6 4.0

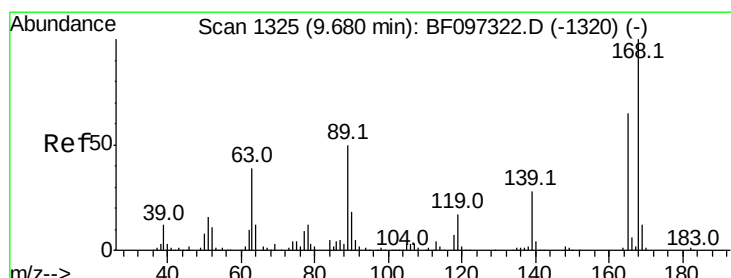
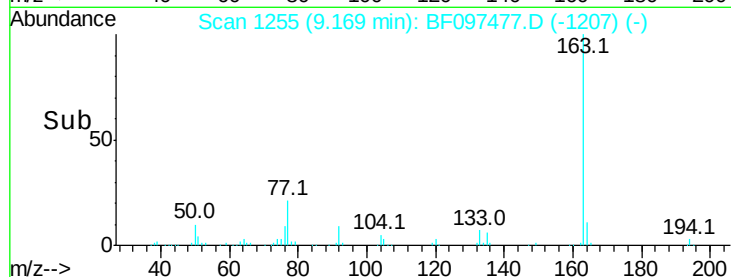
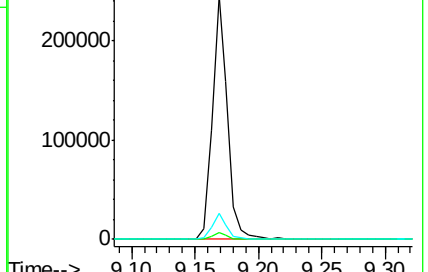
164 10.6 8.4 12.6



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: 6.707 ng

RT: 9.43 min Scan# 1299

Delta R.T. -0.24 min

Lab File: BF097477.D

Acq: 8 Aug 2017 19:20

Tgt Ion:165 Resp: 23336

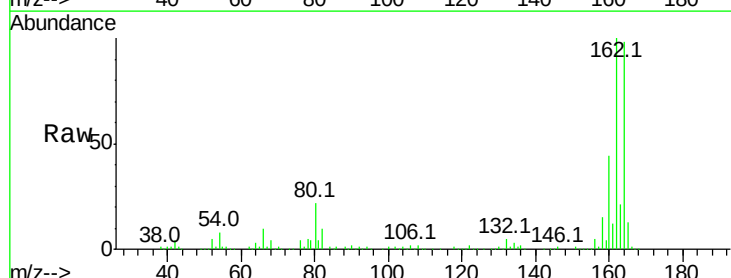
Ion Ratio Lower Upper

165 100

63 2.9 25.4 38.0#

89 1.5 46.4 69.6#

182 0.0 1.8 2.6#

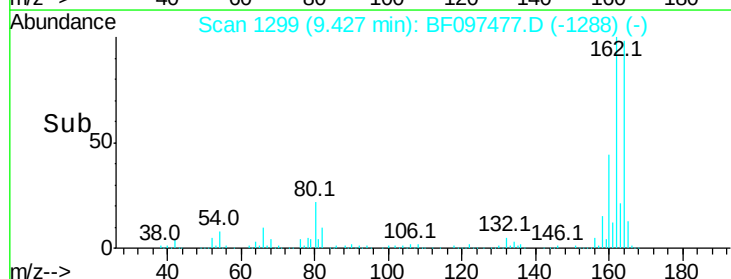
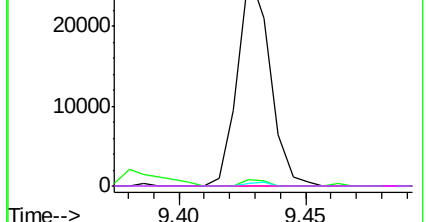


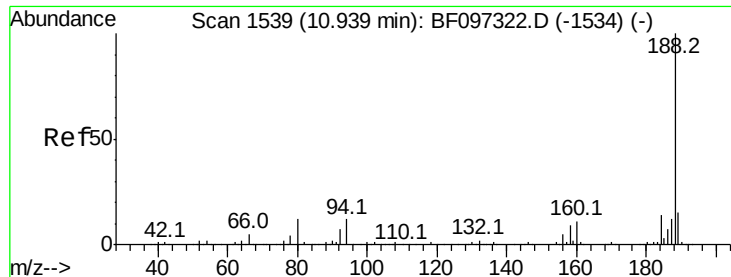
Abundance Ion 165.00 (164.70 to 165.70): E

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: 20.000 ng

RT: 10.90 min Scan# 1550

Delta R.T. -0.01 min

Lab File: BF097477.D

Acq: 8 Aug 2017 19:20

Instrument :

BNA\_F

ClientSampled :

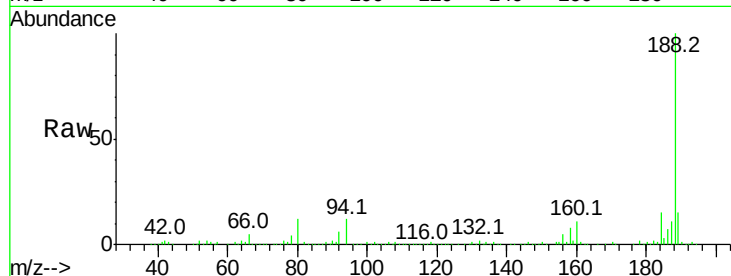
Tot Ion:188 Resp: 313181

Ion Ratio Lower Upper

188 100

94 12.1 9.4 14.2

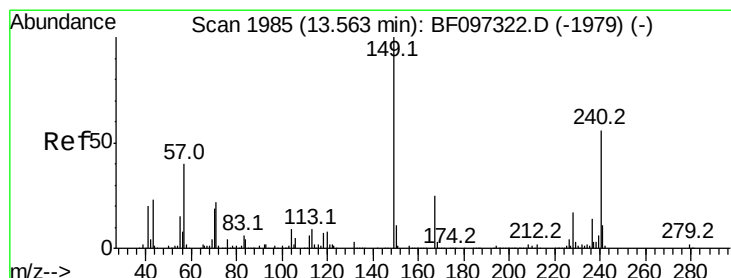
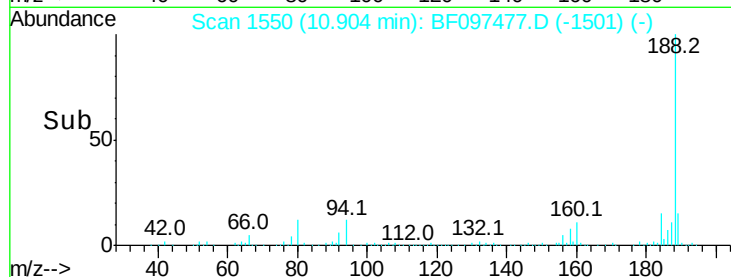
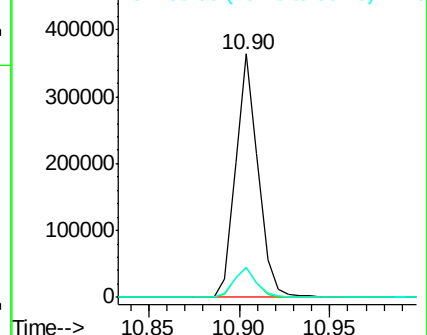
80 12.3 10.2 15.2



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



#75

Chrysene-d12

Concen: 20.000 ng

RT: 13.53 min Scan# 1996

Delta R.T. -0.01 min

Lab File: BF097477.D

Acq: 8 Aug 2017 19:20

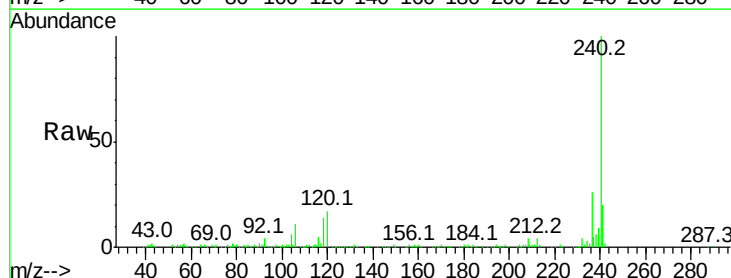
Tgt Ion:240 Resp: 234150

Ion Ratio Lower Upper

240 100

120 16.8 5.8 8.8#

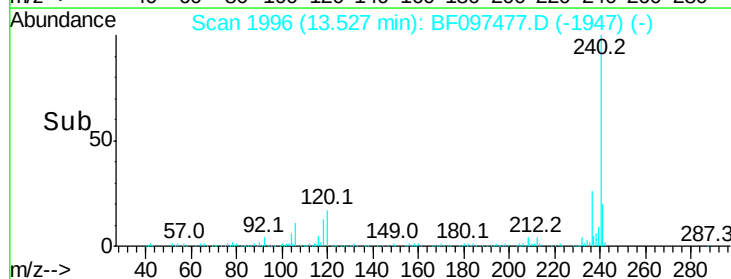
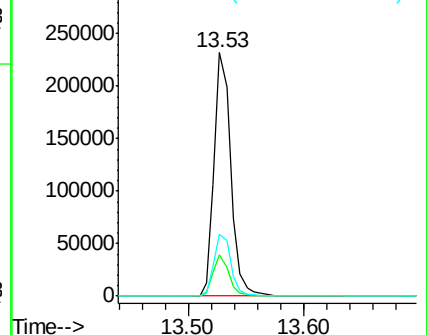
236 25.6 20.5 30.7

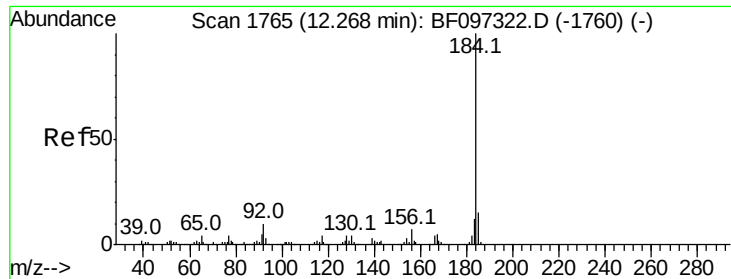


Abundance Ion 240.00 (239.70 to 240.70): E

Ion 120.00 (119.70 to 120.70): E

Ion 236.00 (235.70 to 236.70): E

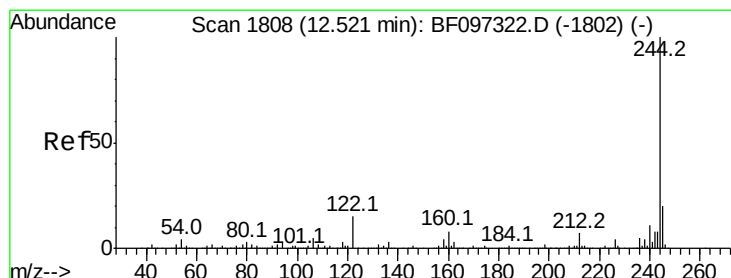
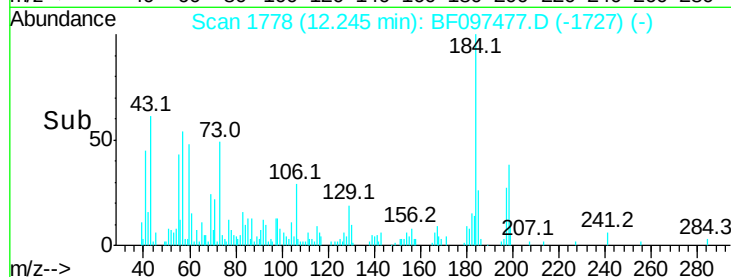
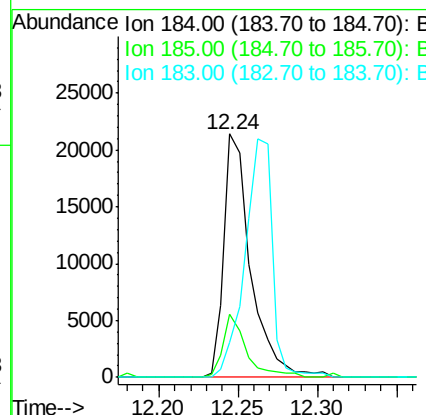
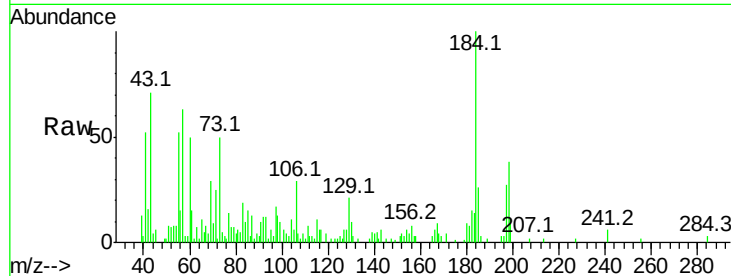




#76  
Benzidine  
Concen: 2.891 ng  
RT: 12.24 min Scan# 1778  
Delta R.T. 0.00 min  
Lab File: BF097477.D  
Acq: 8 Aug 2017 19:20

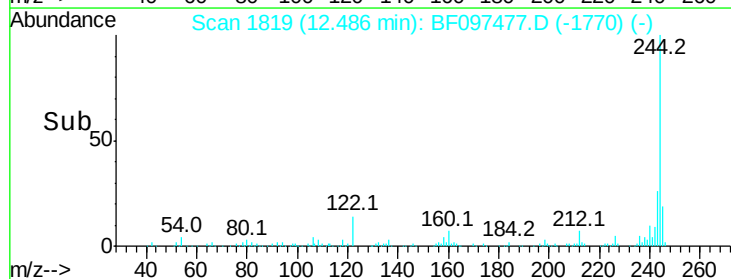
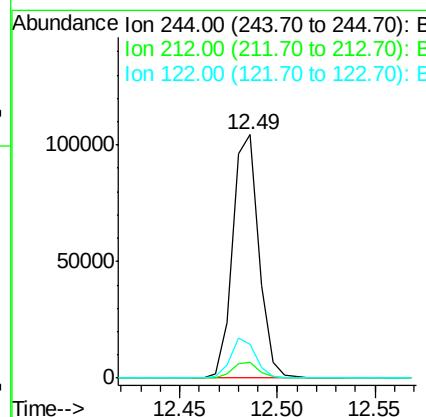
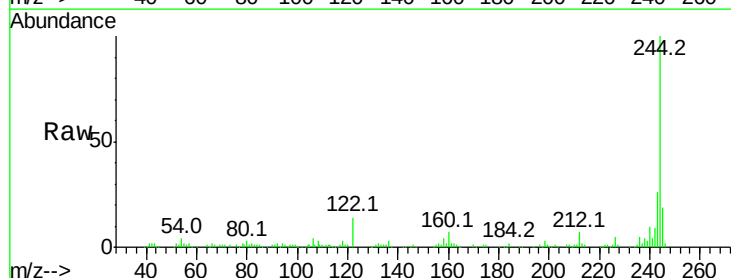
Instrument :  
BNA\_F  
ClientSampleId :

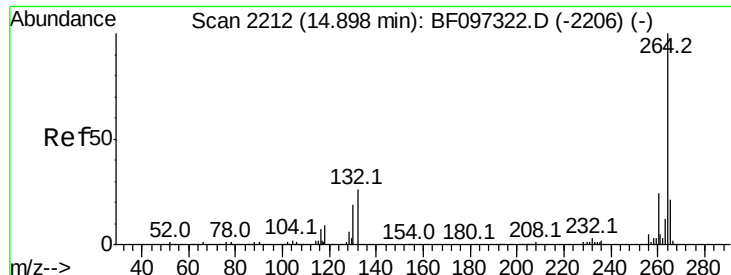
Tot Ion:184 Resp: 25114  
Ion Ratio Lower Upper  
184 100  
185 26.0 15.5 23.3#  
183 14.3 9.8 14.6



#78  
Terphenyl-d14  
Concen: 8.452 ng  
RT: 12.49 min Scan# 1819  
Delta R.T. -0.01 min  
Lab File: BF097477.D  
Acq: 8 Aug 2017 19:20

Tgt Ion:244 Resp: 97066  
Ion Ratio Lower Upper  
244 100  
212 6.6 6.0 9.0  
122 13.7 10.3 15.5

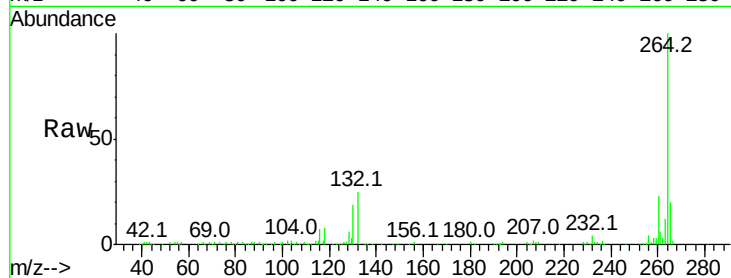




#86  
 Pervlene-d12  
 Concen: 20.000 ng  
 RT: 14.87 min Scan# 2224  
 Delta R.T. 0.00 min  
 Lab File: BF097477.D  
 Acq: 8 Aug 2017 19:20

Instrument :  
 BNA\_F  
 ClientSampleId :

| Tot Ion | Ratio | Lower | Upper |
|---------|-------|-------|-------|
| 264     | 100   |       |       |
| 260     | 23.1  | 19.5  | 29.3  |
| 265     | 20.4  | 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

