

Data Path : Z:\HPCHEM1\BNA F\DATA\BF013118\  
 Data File : BF102669.D  
 Acq On : 31 Jan 2018 21:52  
 Operator : SJ/JU  
 Sample : J1023-07 2X  
 Misc :  
 ALS Vial : 12 Sample Multiplier: 1

Instrument :  
 BNA\_F  
 ClientSampleId :  
 TR-04-013018

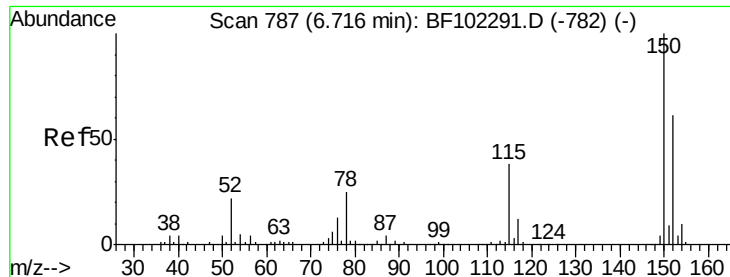
Manual Integrations  
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 2/1/2018 6:00:27 PM

Quant Time: Feb 01 10:43:23 2018  
 Quant Method : Z:\HPCHEM1\BNA F\METHODS\8270-BF012218.M  
 Quant Title : ASP BNA STANDARDS FOR 5 POINT CALIBRATION  
 QLast Update : Wed Jan 31 18:38:00 2018  
 Response via : Initial Calibration

| Internal Standards          | R.T.  | QIon | Response | Conc   | Units | Dev(Min)    |
|-----------------------------|-------|------|----------|--------|-------|-------------|
| 1) 1,4-Dichlorobenzene-d4   | 6.70  | 152  | 147916   | 20.00  | ng    | 0.00        |
| 21) Naphthalene-d8          | 7.99  | 136  | 558608   | 20.00  | ng    | 0.00        |
| 38) Acenaphthene-d10        | 9.74  | 164  | 207754   | 20.00  | ng    | 0.00        |
| 63) Phenanthrene-d10        | 11.23 | 188  | 317136   | 20.00  | ng    | 0.00        |
| 75) Chrysene-d12            | 13.87 | 240  | 302157   | 20.00  | ng    | 0.00        |
| 86) Perylene-d12            | 15.30 | 264  | 208073   | 20.00  | ng    | 0.01        |
| System Monitoring Compounds |       |      |          |        |       |             |
| 5) 2-Fluorophenol           | 5.32  | 112  | 603506   | 61.86  | ng    | 0.00        |
| 7) Phenol-d6                | 6.35  | 99   | 720321   | 61.25  | ng    | 0.00        |
| 23) Nitrobenzene-d5         | 7.27  | 82   | 413516   | 42.54  | ng    | 0.00        |
| 41) 2,4,6-Tribromophenol    | 10.53 | 330  | 100879   | 49.01  | ng    | 0.00        |
| 44) 2-Fluorobiphenyl        | 9.06  | 172  | 642480   | 45.47  | ng    | 0.00        |
| 78) Terphenyl-d14           | 12.82 | 244  | 487992   | 36.41  | ng    | 0.01        |
| Target Compounds            |       |      |          |        |       |             |
| 10) Phenol                  | 6.36  | 94   | 30356    | 2.364  | ng    | Qvalue # 71 |
| 49) Dimethylphthalate       | 9.46  | 163  | 72130    | 4.200  | ng    | 99          |
| 70) Phenanthrene            | 11.25 | 178  | 174377   | 9.436  | ng    | 96          |
| 71) Anthracene              | 11.30 | 178  | 39726    | 2.106  | ng    | 97          |
| 74) Fluoranthene            | 12.45 | 202  | 237461   | 12.601 | ng    | 98          |
| 77) Pyrene                  | 12.71 | 202  | 317570m  | 13.594 | ng    |             |
| 80) Benzo(a)anthracene      | 13.86 | 228  | 112655   | 6.056  | ng    | 97          |
| 82) Chrysene                | 13.90 | 228  | 119896   | 6.347  | ng    | 99          |
| 87) Benzo(b)fluoranthene    | 14.89 | 252  | 87027m   | 6.453  | ng    |             |
| 88) Benzo(k)fluoranthene    | 14.91 | 252  | 31597m   | 2.480  | ng    |             |
| 89) Benzo(a)pyrene          | 15.24 | 252  | 60643    | 4.986  | ng    | # 80        |
| 91) Benzo(a,h,i)perylene    | 17.12 | 276  | 29888    | 3.072  | ng    | # 84        |

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



#1

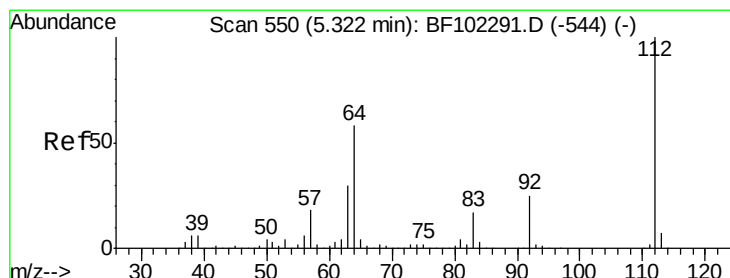
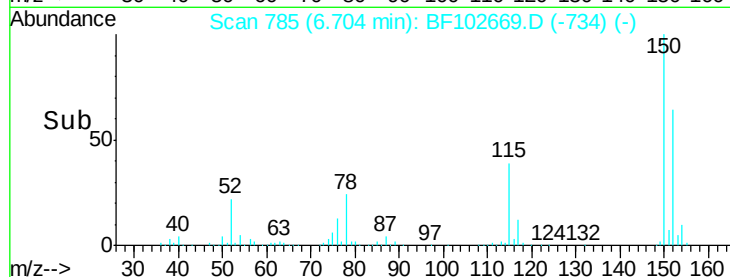
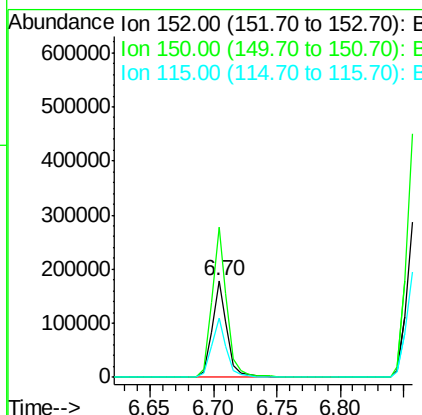
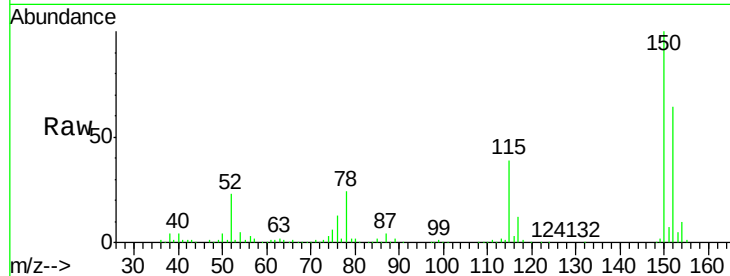
1,4-Dichlorobenzene-d4  
Concen: 20.000 ng  
RT: 6.70 min Scan# 785  
Delta R.T. 0.00 min  
Lab File: BF102669.D  
Acq: 31 Jan 2018 21:52

Instrument :  
BNA\_F  
ClientSampleId :  
TR-04-013018

| Tot Ion | Ratio | Lower | Upper |
|---------|-------|-------|-------|
| 152     | 100   |       |       |
| 150     | 155.3 | 124.6 | 186.8 |
| 115     | 60.8  | 50.1  | 75.1  |

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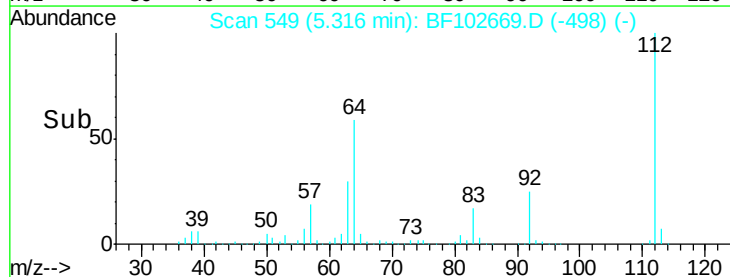
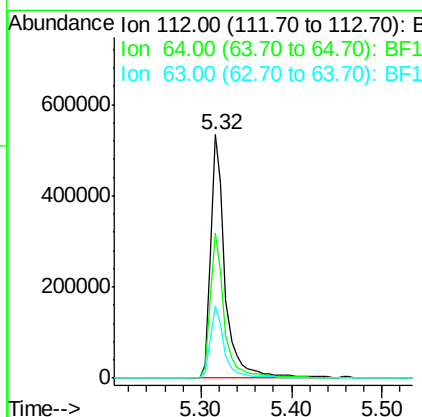
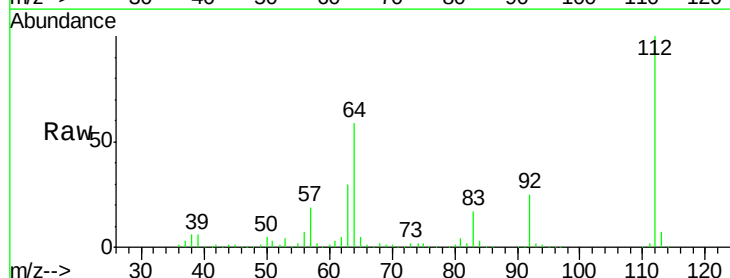
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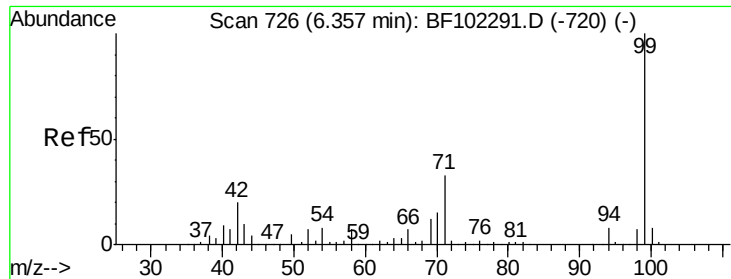


#5

2-Fluorophenol  
Concen: 61.864 ng  
RT: 5.32 min Scan# 549  
Delta R.T. 0.00 min  
Lab File: BF102669.D  
Acq: 31 Jan 2018 21:52

| Tgt Ion | Ratio | Lower | Upper |
|---------|-------|-------|-------|
| 112     | 100   |       |       |
| 64      | 59.4  | 47.9  | 71.9  |
| 63      | 29.9  | 23.7  | 35.5  |





#7

Phenol-d6

Concen: 61.247 ng

RT: 6.35 min Scan# 725

Delta R.T. -0.01 min

Lab File: BF102669.D

Acq: 31 Jan 2018 21:52

Instrument :

BNA\_F

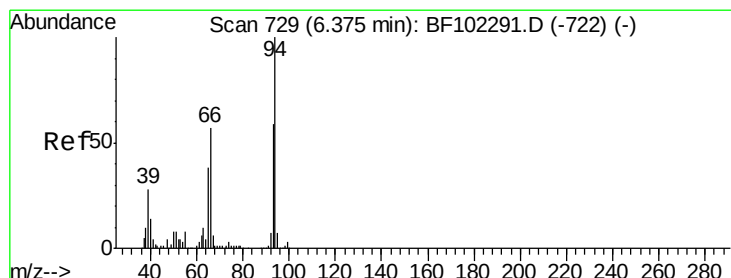
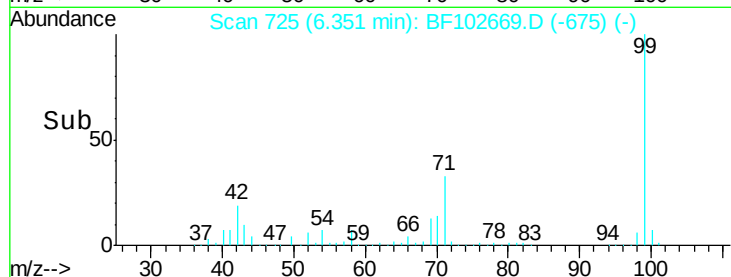
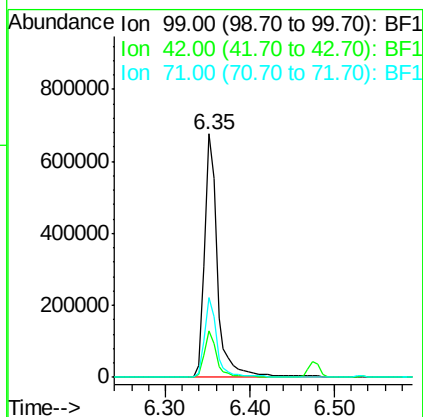
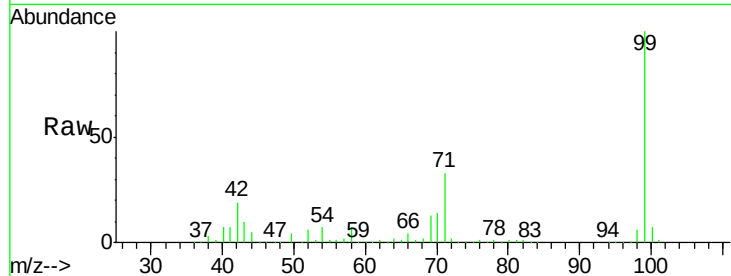
ClientSampled :

TR-04-013018

|           |       |       |        |
|-----------|-------|-------|--------|
| Tot Ion:  | 99    | Resp: | 720321 |
| Ion Ratio | Lower | Upper |        |
| 99        | 100   |       |        |
| 42        | 19.0  | 14.5  | 21.7   |
| 71        | 32.9  | 25.4  | 38.0   |

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#10

Phenol

Concen: 2.364 ng

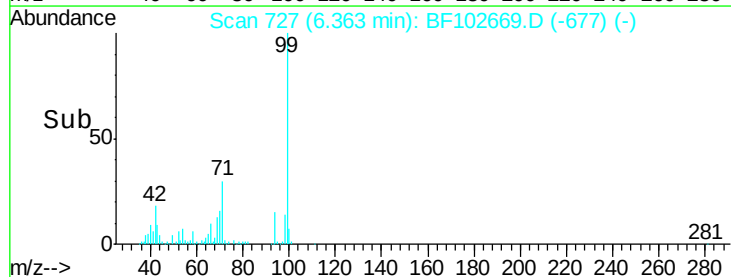
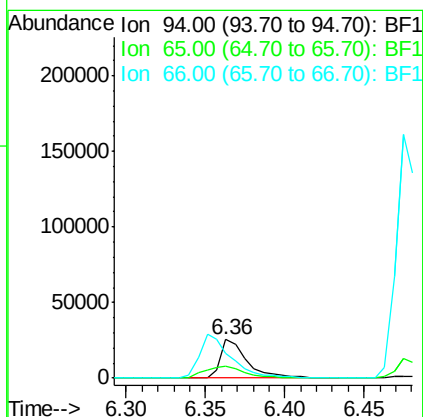
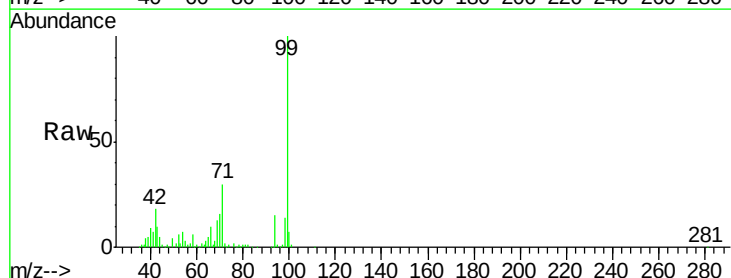
RT: 6.36 min Scan# 727

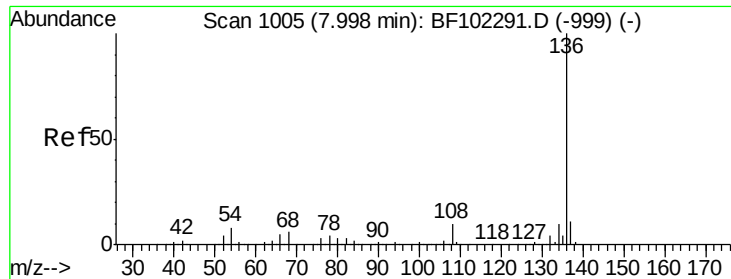
Delta R.T. -0.01 min

Lab File: BF102669.D

Acq: 31 Jan 2018 21:52

|           |       |       |       |
|-----------|-------|-------|-------|
| Tgt Ion:  | 94    | Resp: | 30356 |
| Ion Ratio | Lower | Upper |       |
| 94        | 100   |       |       |
| 65        | 30.1  | 7.9   | 47.9  |
| 66        | 64.7  | 16.2  | 56.2# |





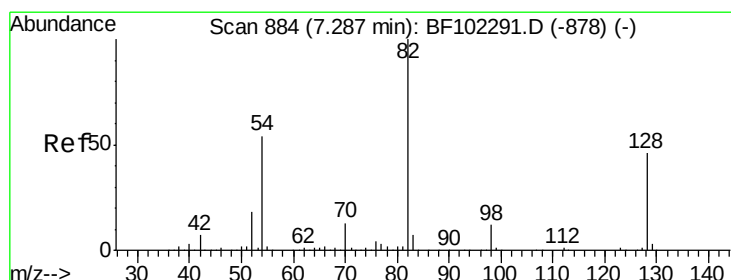
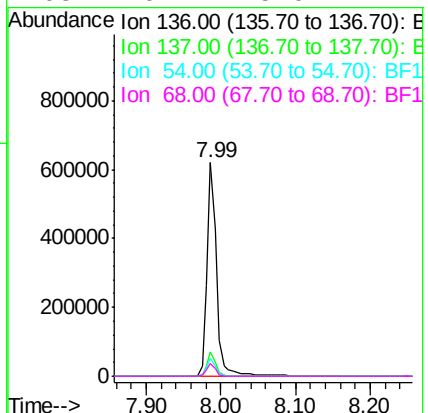
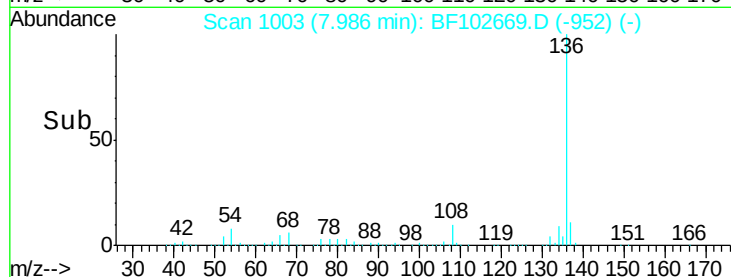
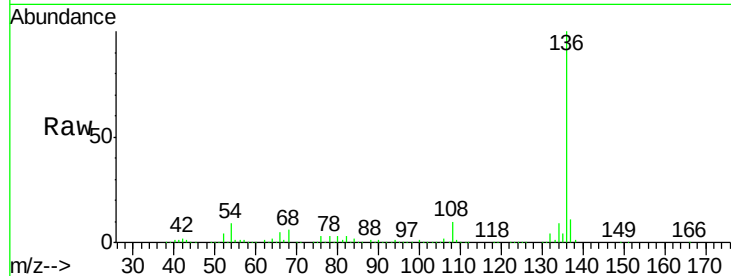
#21  
Naphthalene-d8  
Concen: 20.000 ng  
RT: 7.99 min Scan# 1003  
Delta R.T. 0.00 min  
Lab File: BF102669.D  
Acq: 31 Jan 2018 21:52

Instrument :  
BNA\_F  
ClientSampleId :  
TR-04-013018

| Tot Ion | Ion  | Ratio | Resp   | Lower | Upper |
|---------|------|-------|--------|-------|-------|
| 136     | 100  |       | 558608 |       |       |
| 137     | 11.2 | 8.9   | 13.3   |       |       |
| 54      | 8.5  | 6.6   | 9.8    |       |       |
| 68      | 6.1  | 5.0   | 7.4    |       |       |

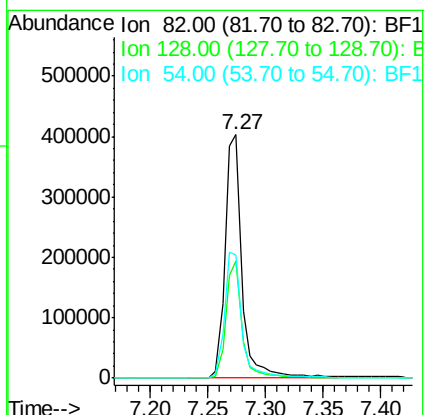
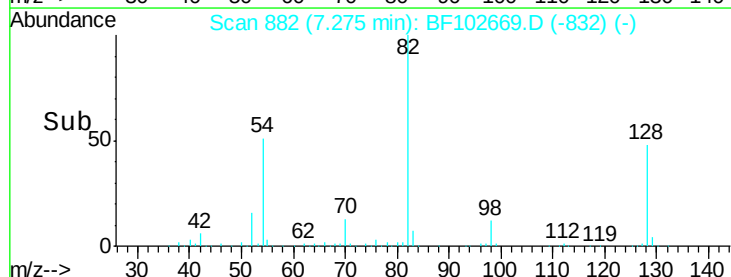
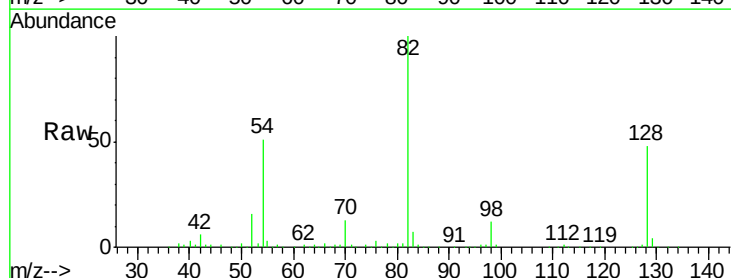
Manual Integrations  
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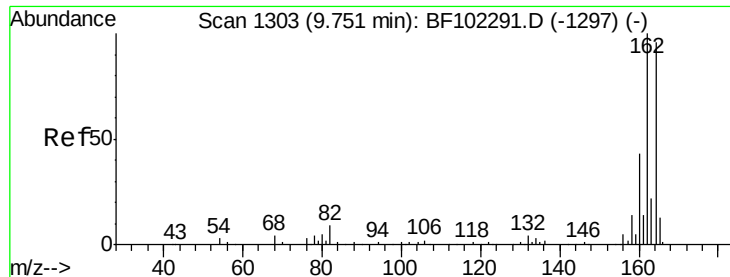
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#23  
Nitrobenzene-d5  
Concen: 42.541 ng  
RT: 7.27 min Scan# 882  
Delta R.T. -0.01 min  
Lab File: BF102669.D  
Acq: 31 Jan 2018 21:52

| Tgt Ion | Ion  | Ratio | Resp   | Lower | Upper |
|---------|------|-------|--------|-------|-------|
| 82      | 100  |       | 413516 |       |       |
| 128     | 48.0 | 36.1  | 54.1   |       |       |
| 54      | 50.6 | 41.4  | 62.2   |       |       |





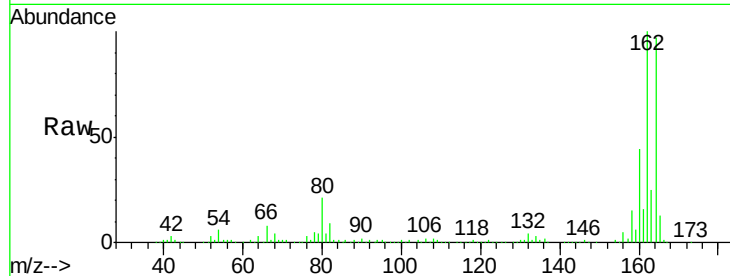
#38  
 Acenaphthene-d10  
 Concen: 20.000 ng  
 RT: 9.74 min Scan# 1301  
 Delta R.T. 0.00 min  
 Lab File: BF102669.D  
 Acq: 31 Jan 2018 21:52

Instrument :  
 BNA\_F  
 ClientSampleId :  
 TR-04-013018

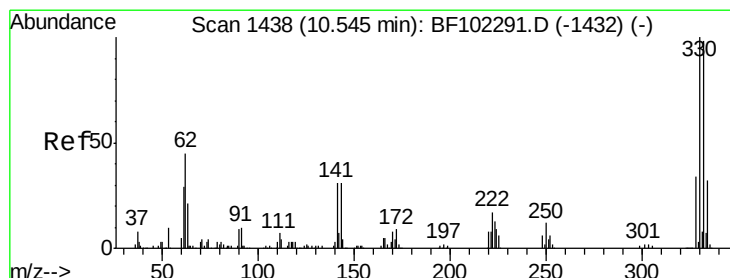
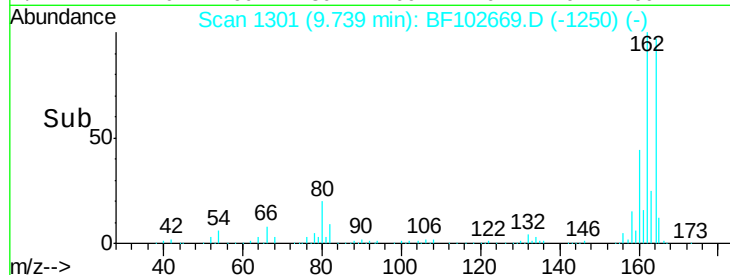
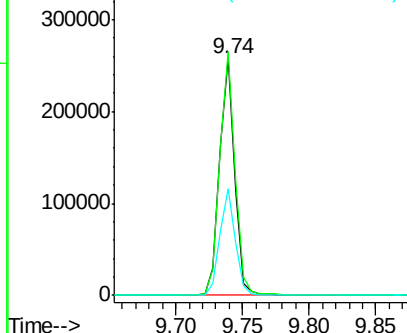
| Tot Ion | Ratio | Resp   | Lower | Upper |
|---------|-------|--------|-------|-------|
| 164     | 100   | 207754 |       |       |
| 162     | 102.7 |        | 86.1  | 129.1 |
| 160     | 44.8  |        | 38.3  | 57.5  |

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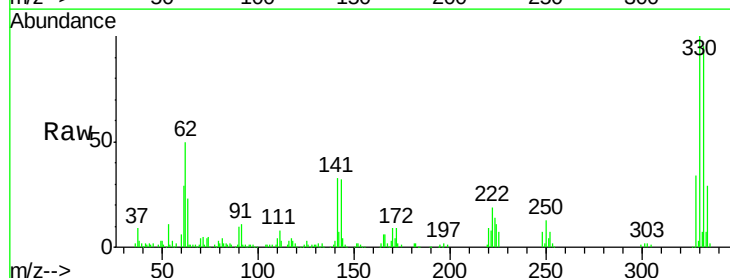


Abundance Ion 164.00 (163.70 to 164.70): E  
 Ion 162.00 (161.70 to 162.70): E  
 Ion 160.00 (159.70 to 160.70): E

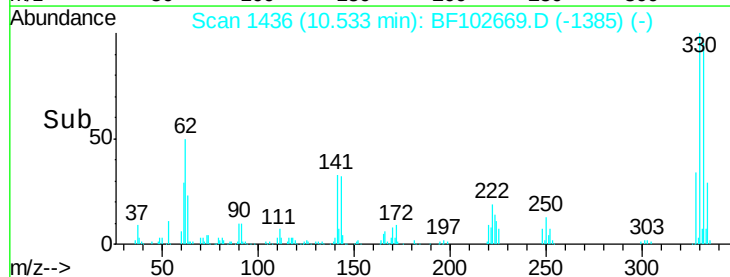
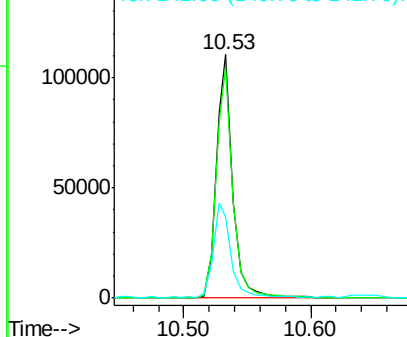


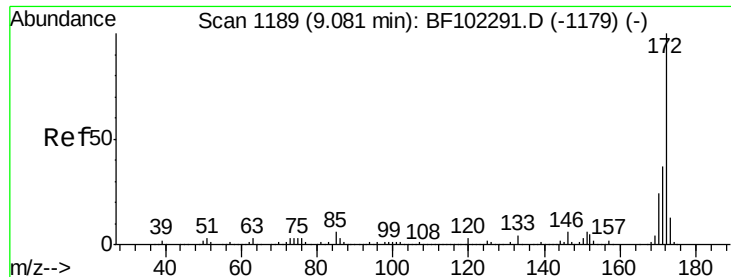
#41  
 2,4,6-Tribromophenol  
 Concen: 49.005 ng  
 RT: 10.53 min Scan# 1436  
 Delta R.T. 0.00 min  
 Lab File: BF102669.D  
 Acq: 31 Jan 2018 21:52

| Tgt Ion | Ratio | Resp   | Lower | Upper |
|---------|-------|--------|-------|-------|
| 330     | 100   | 100879 |       |       |
| 332     | 96.4  |        | 77.0  | 115.6 |
| 141     | 43.7  |        | 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





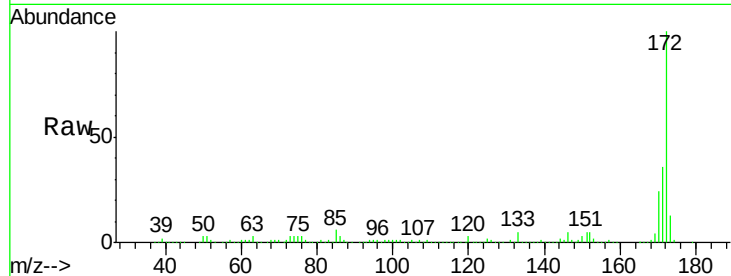
#44  
2-Fluorobiphenyl  
Concen: 45.471 ng  
RT: 9.06 min Scan# 1186  
Delta R.T. 0.00 min  
Lab File: BF102669.D  
Acq: 31 Jan 2018 21:52

Instrument :  
BNA\_F  
ClientSampleId :  
TR-04-013018

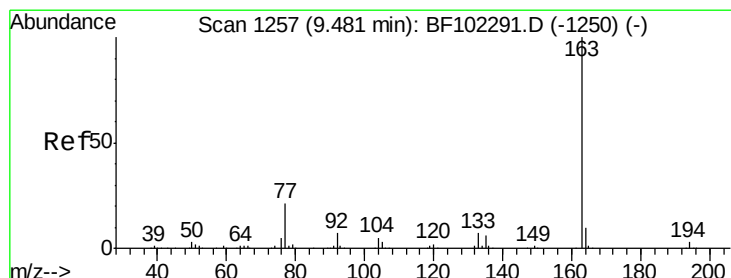
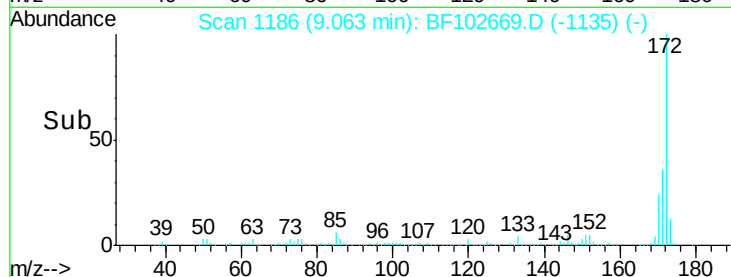
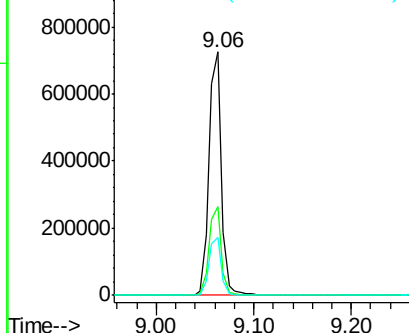
| Tot Ion | Ratio | Lower | Upper |
|---------|-------|-------|-------|
| 172     | 100   |       |       |
| 171     | 36.2  | 29.7  | 44.5  |
| 170     | 23.8  | 19.6  | 29.4  |

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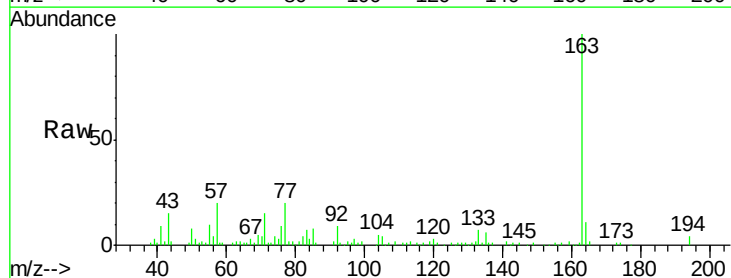


Abundance Ion 172.00 (171.70 to 172.70): E  
Ion 171.00 (170.70 to 171.70): E  
Ion 170.00 (169.70 to 170.70): E

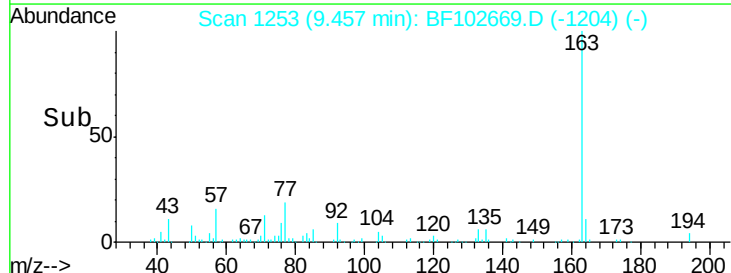
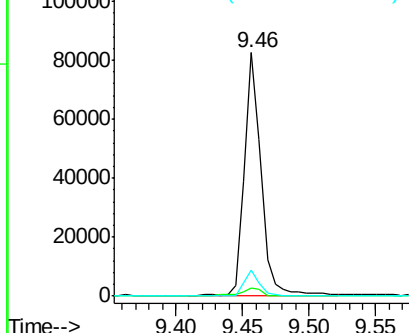


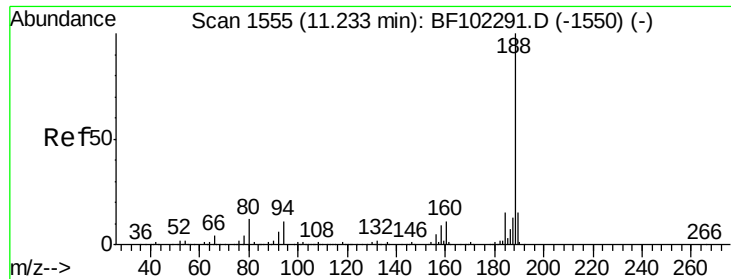
#49  
Dimethylphthalate  
Concen: 4.200 ng  
RT: 9.46 min Scan# 1253  
Delta R.T. -0.01 min  
Lab File: BF102669.D  
Acq: 31 Jan 2018 21:52

| Tgt Ion | Ratio | Lower | Upper |
|---------|-------|-------|-------|
| 163     | 100   |       |       |
| 194     | 3.6   | 2.7   | 4.1   |
| 164     | 10.5  | 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





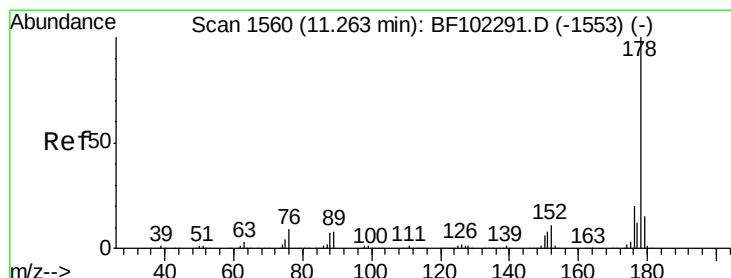
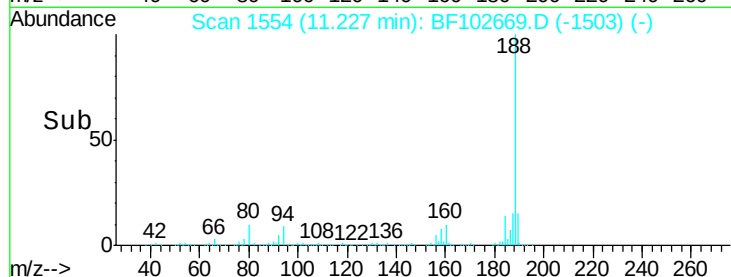
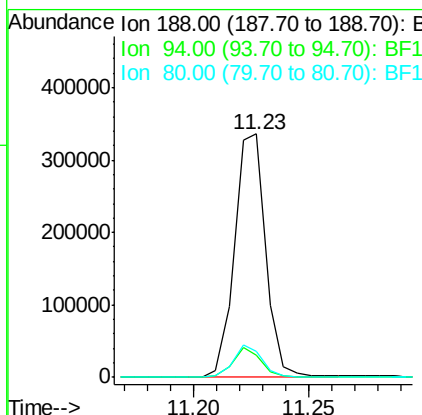
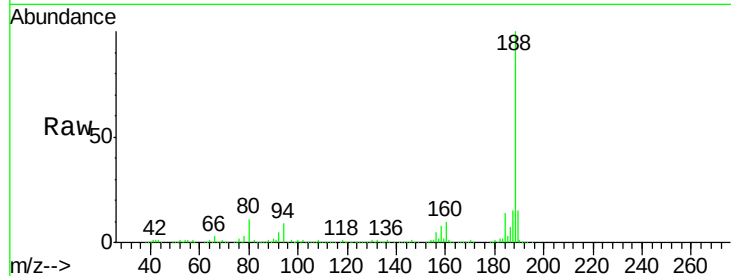
#63  
Phenanthrene-d10  
Concen: 20.000 ng  
RT: 11.23 min Scan# 1554  
Delta R.T. 0.00 min  
Lab File: BF102669.D  
Acq: 31 Jan 2018 21:52

Instrument :  
BNA\_F  
ClientSampleId :  
TR-04-013018

| Tot Ion | Ratio | Resp   | Lower | Upper |
|---------|-------|--------|-------|-------|
| 188     | 100   | 317136 |       |       |
| 94      | 9.2   |        | 8.5   | 12.7  |
| 80      | 10.5  |        | 9.2   | 13.8  |

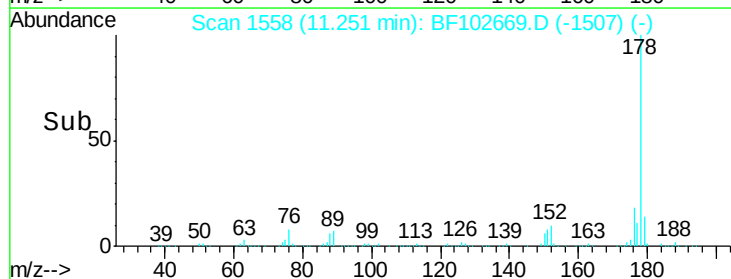
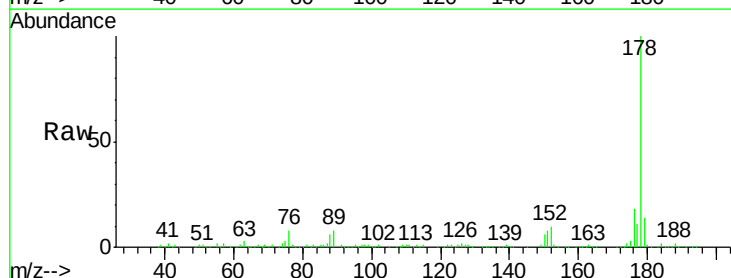
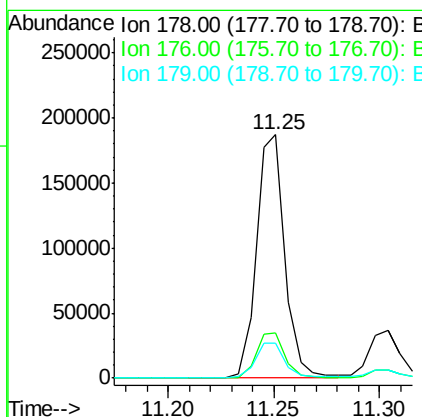
Manual Integrations  
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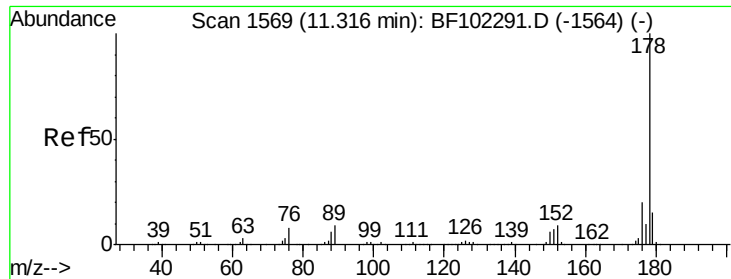
Sohil  
2/1/2018 6:00:27 PM



#70  
Phenanthrene  
Concen: 9.436 ng  
RT: 11.25 min Scan# 1558  
Delta R.T. 0.00 min  
Lab File: BF102669.D  
Acq: 31 Jan 2018 21:52

| Tgt Ion | Ratio | Resp   | Lower | Upper |
|---------|-------|--------|-------|-------|
| 178     | 100   | 174377 |       |       |
| 176     | 18.4  |        | 15.8  | 23.8  |
| 179     | 14.4  |        | 13.0  | 19.6  |





#71

Anthracene

Concen: 2.106 ng

RT: 11.30 min Scan# 1567

Delta R.T. 0.00 min

Lab File: BF102669.D

Acq: 31 Jan 2018 21:52

Instrument :

BNA\_F

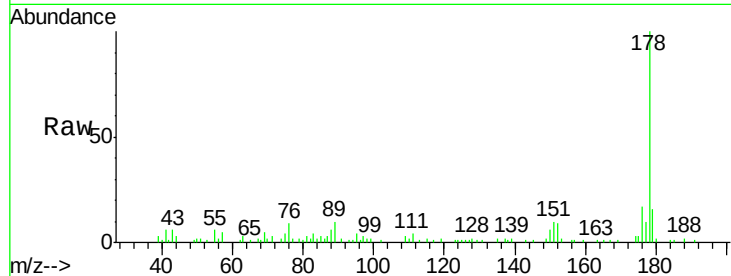
ClientSampleId :

TR-04-013018

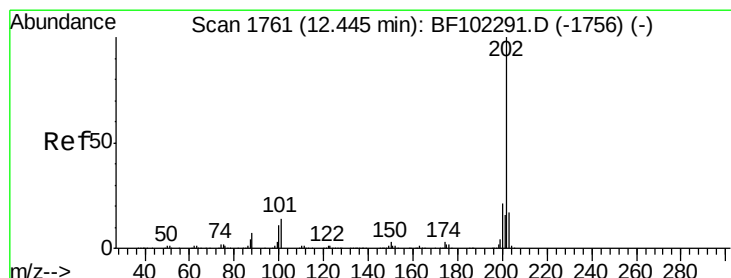
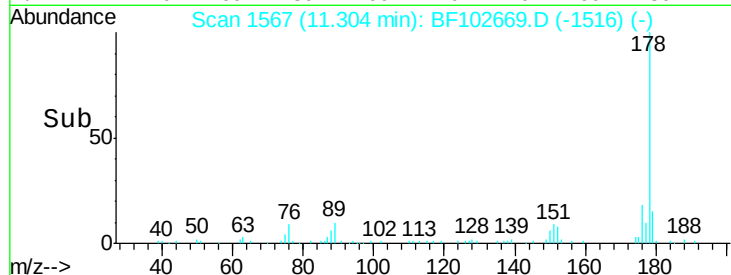
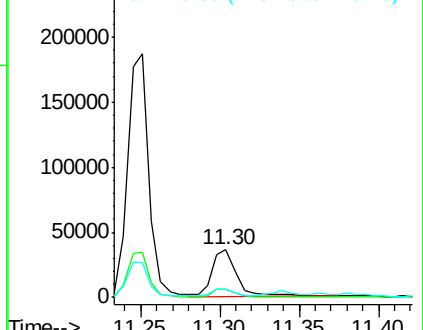
|          |       |       |       |
|----------|-------|-------|-------|
| Tot Ion: | 178   | Resp: | 39726 |
| Ion      | Ratio | Lower | Upper |
| 178      | 100   |       |       |
| 176      | 17.4  | 15.4  | 23.2  |
| 179      | 16.1  | 12.6  | 19.0  |

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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: 12.601 ng

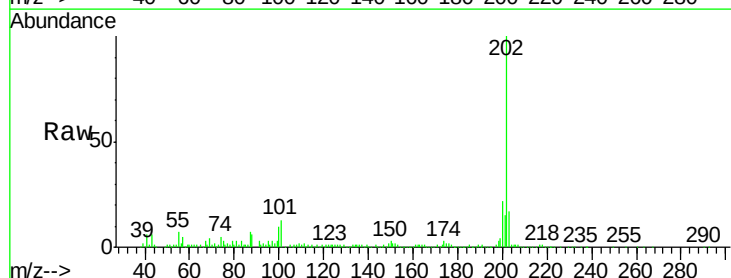
RT: 12.45 min Scan# 1762

Delta R.T. 0.01 min

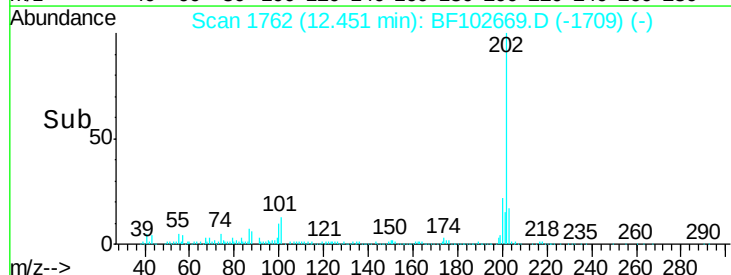
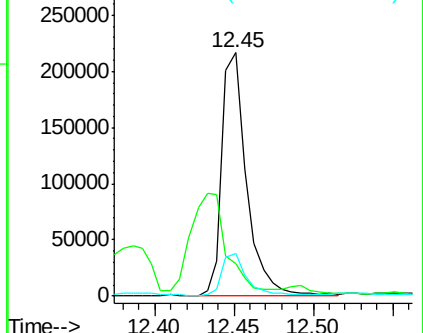
Lab File: BF102669.D

Acq: 31 Jan 2018 21:52

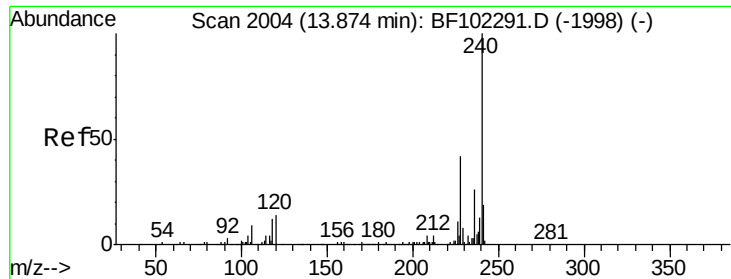
|          |       |       |        |
|----------|-------|-------|--------|
| Tgt Ion: | 202   | Resp: | 237461 |
| Ion      | Ratio | Lower | Upper  |
| 202      | 100   |       |        |
| 101      | 13.1  | 0.0   | 34.1   |
| 203      | 17.5  | 0.0   | 38.1   |



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: 13.87 min Scan# 2004

Delta R.T. 0.01 min

Lab File: BF102669.D

Acq: 31 Jan 2018 21:52

Instrument :

BNA\_F

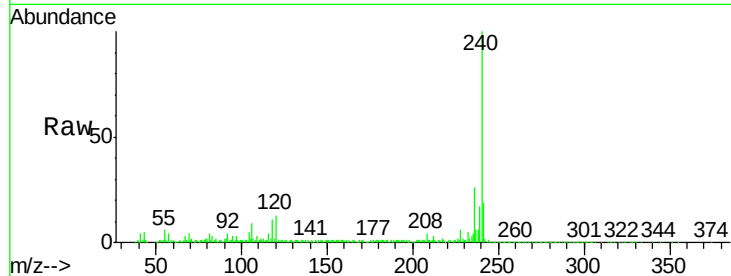
ClientSampleId :

TR-04-013018

|           |       |       |        |
|-----------|-------|-------|--------|
| Tot Ion:  | 240   | Resp: | 302157 |
| Ion Ratio | Lower | Upper |        |
| 240       | 100   |       |        |
| 120       | 12.9  | 9.5   | 14.3   |
| 236       | 26.0  | 20.7  | 31.1   |

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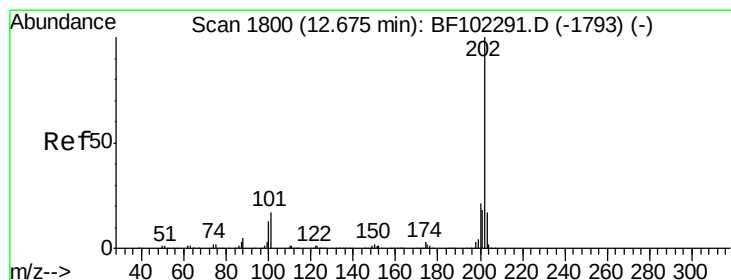
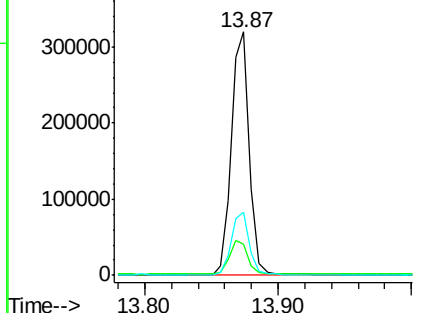
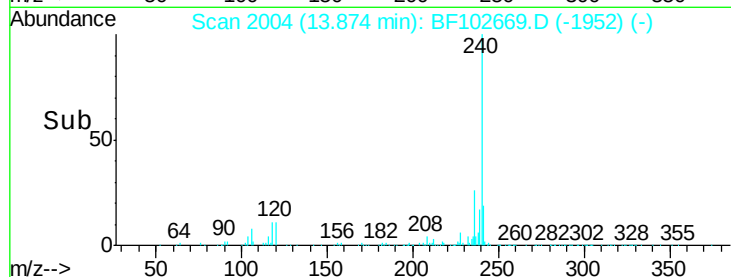
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Abundance Ion 240.00 (239.70 to 240.70): E

Ion 120.00 (119.70 to 120.70): E

Ion 236.00 (235.70 to 236.70): E



#77

Pyrene

Concen: 13.594 ng m

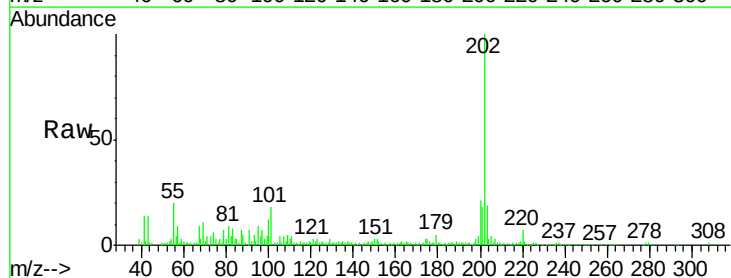
RT: 12.71 min Scan# 1806

Delta R.T. 0.04 min

Lab File: BF102669.D

Acq: 31 Jan 2018 21:52

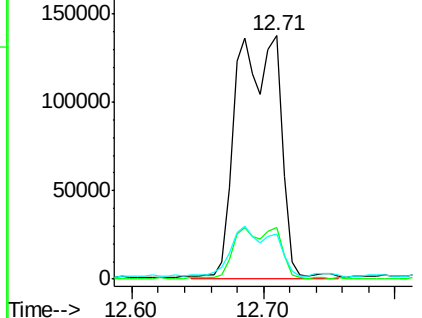
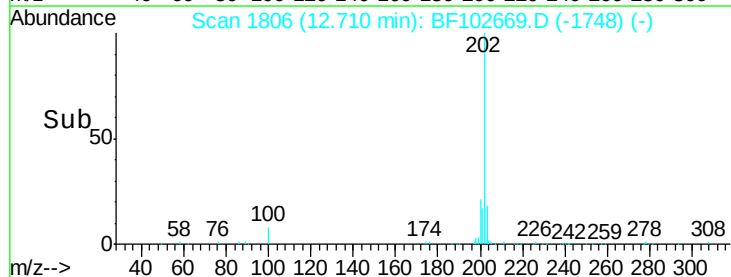
|           |       |       |        |
|-----------|-------|-------|--------|
| Tgt Ion:  | 202   | Resp: | 317570 |
| Ion Ratio | Lower | Upper |        |
| 202       | 100   |       |        |
| 200       | 21.3  | 17.4  | 26.2   |
| 203       | 18.5  | 14.3  | 21.5   |

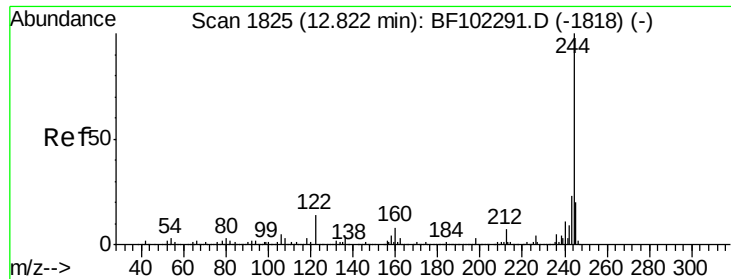


Abundance Ion 202.00 (201.70 to 202.70): E

Ion 200.00 (199.70 to 200.70): E

Ion 203.00 (202.70 to 203.70): E





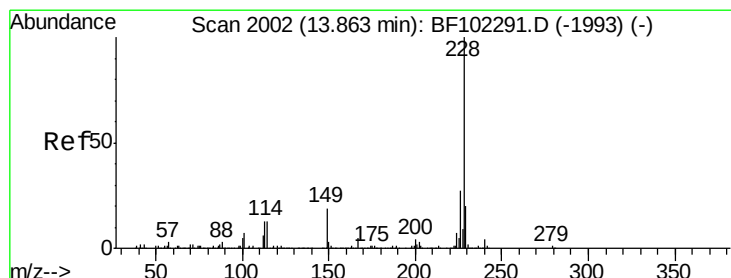
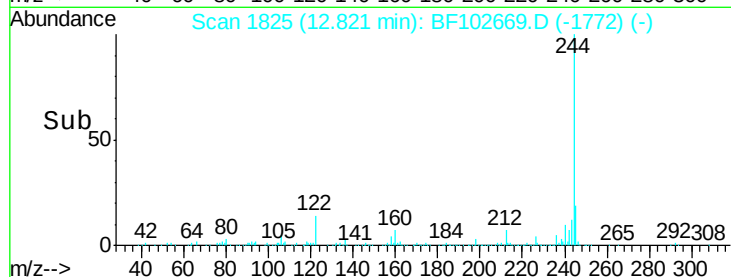
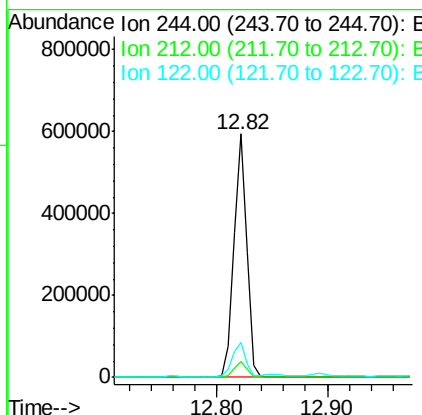
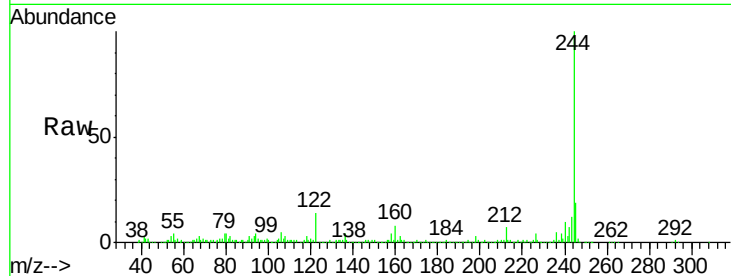
#78  
 Terphenyl-d14  
 Concen: 36.409 ng  
 RT: 12.82 min Scan# 1825  
 Delta R.T. 0.01 min  
 Lab File: BF102669.D  
 Acq: 31 Jan 2018 21:52

Instrument :  
 BNA\_F  
 ClientSampled :  
 TR-04-013018

| Tot Ion | Ratio | Lower | Upper |
|---------|-------|-------|-------|
| 244     | 100   |       |       |
| 212     | 6.7   | 5.4   | 8.0   |
| 122     | 14.1  | 11.0  | 16.4  |

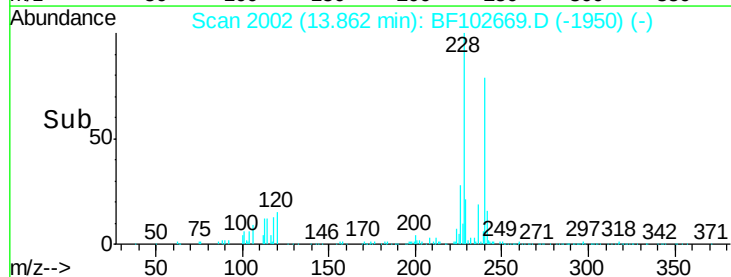
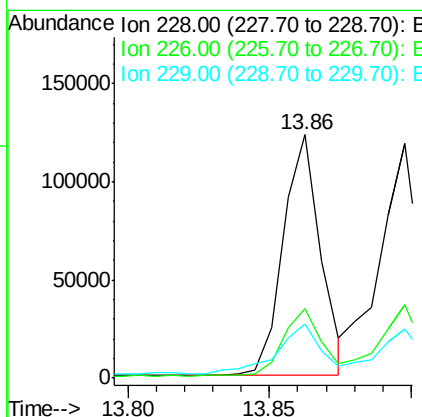
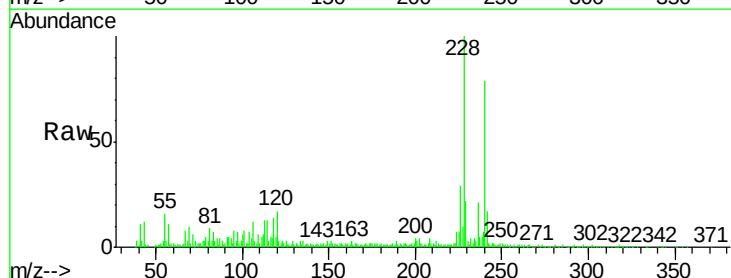
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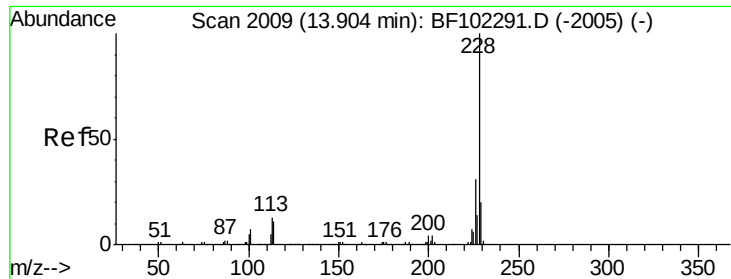
Sohil  
 2/1/2018 6:00:27 PM



#80  
 Benzo(a)anthracene  
 Concen: 6.056 ng  
 RT: 13.86 min Scan# 2002  
 Delta R.T. 0.01 min  
 Lab File: BF102669.D  
 Acq: 31 Jan 2018 21:52

| Tgt Ion | Ratio | Lower | Upper |
|---------|-------|-------|-------|
| 228     | 100   |       |       |
| 226     | 28.8  | 22.6  | 33.8  |
| 229     | 22.2  | 15.8  | 23.6  |





#82

Chrysene

Concen: 6.347 ng

RT: 13.90 min Scan# 2008

Delta R.T. 0.01 min

Lab File: BF102669.D

Acq: 31 Jan 2018 21:52

Instrument :

BNA\_F

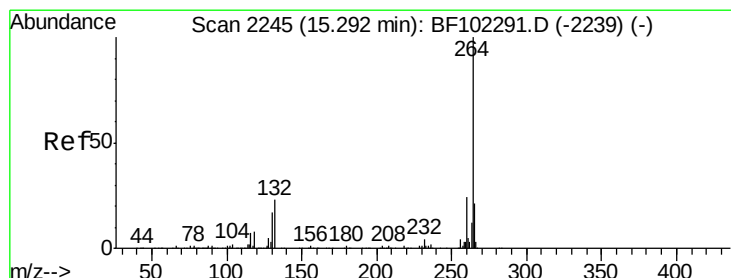
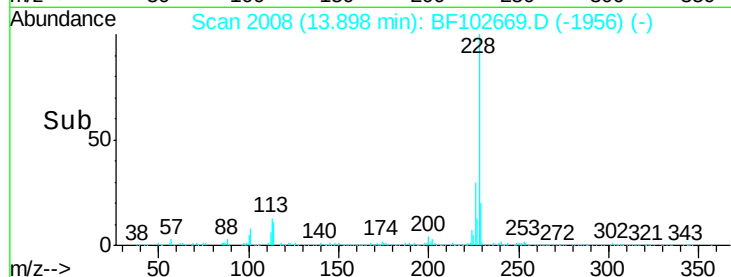
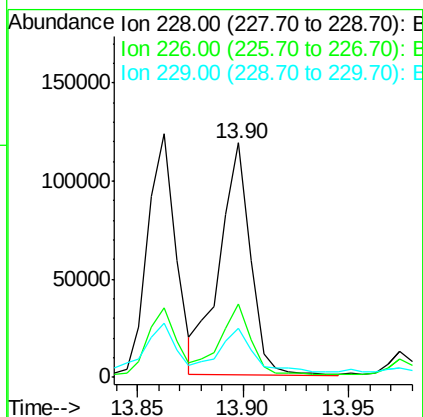
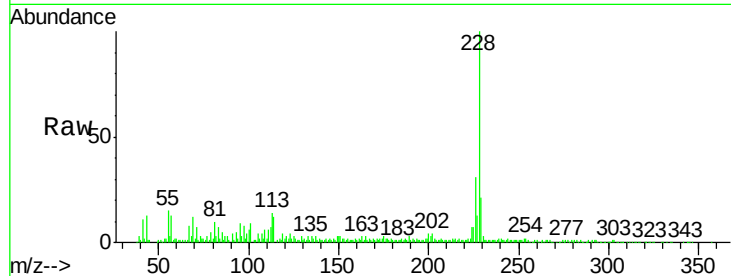
ClientSampleId :

TR-04-013018

|           |       |       |        |
|-----------|-------|-------|--------|
| Tot Ion:  | 228   | Resp: | 119896 |
| Ion Ratio | Lower | Upper |        |
| 228       | 100   |       |        |
| 226       | 31.1  | 25.0  | 37.6   |
| 229       | 21.2  | 16.2  | 24.4   |

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#86

Perylene-d12

Concen: 20.000 ng

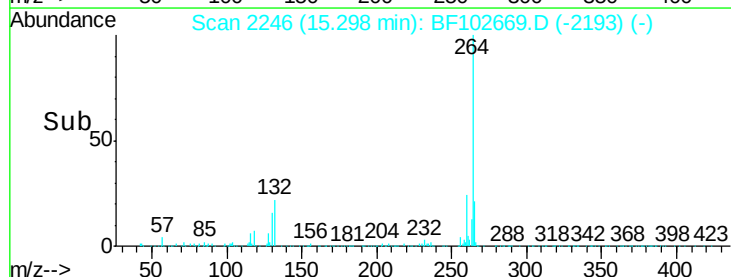
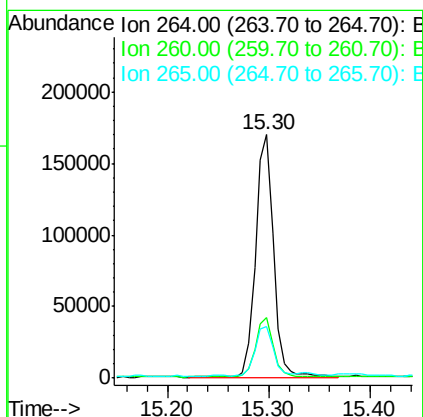
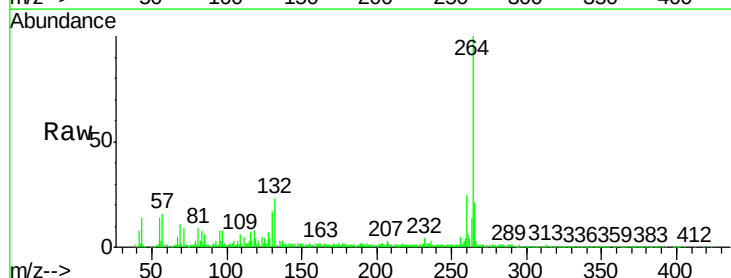
RT: 15.30 min Scan# 2246

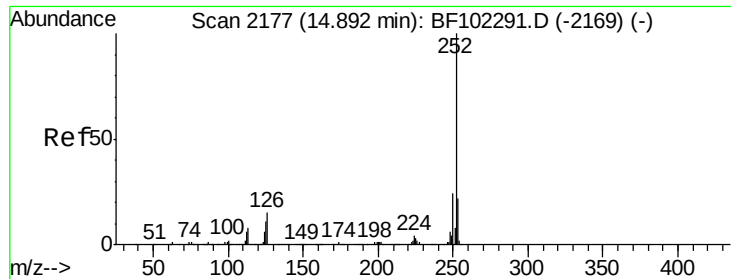
Delta R.T. 0.01 min

Lab File: BF102669.D

Acq: 31 Jan 2018 21:52

|           |       |       |        |
|-----------|-------|-------|--------|
| Tgt Ion:  | 264   | Resp: | 208073 |
| Ion Ratio | Lower | Upper |        |
| 264       | 100   |       |        |
| 260       | 24.9  | 19.2  | 28.8   |
| 265       | 21.3  | 17.5  | 26.3   |





#87

Benzo(b)fluoranthene

Concen: 6.453 ng m

RT: 14.89 min Scan# 2176

Delta R.T. 0.01 min

Lab File: BF102669.D

Acq: 31 Jan 2018 21:52

Instrument :

BNA\_F

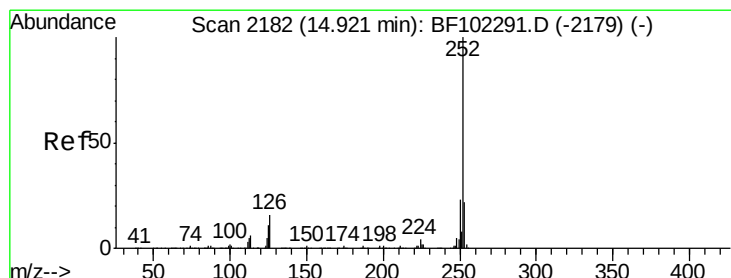
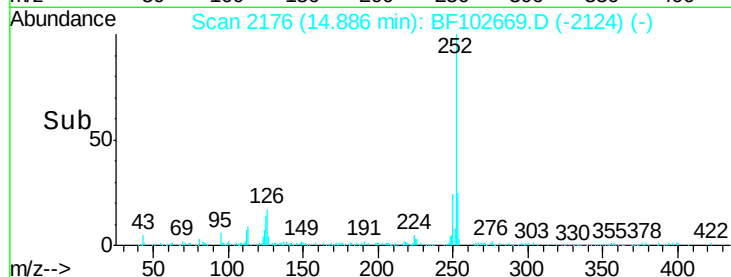
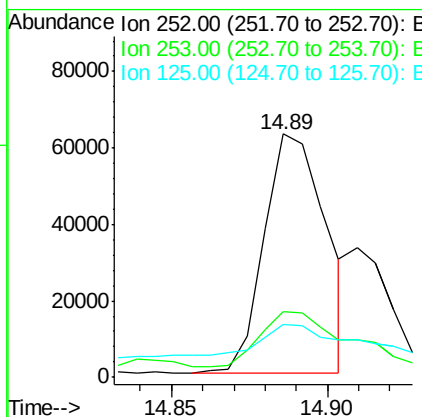
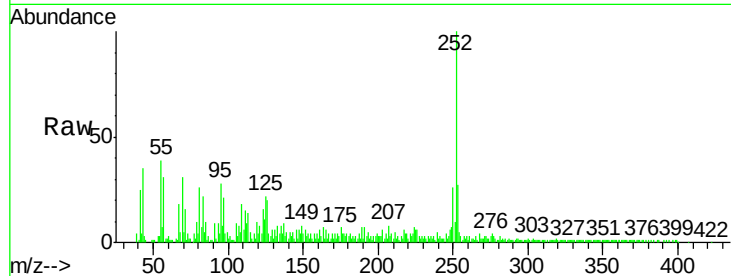
ClientSampleId :

TR-04-013018

|           |       |       |       |
|-----------|-------|-------|-------|
| Tot Ion:  | 252   | Resp: | 87027 |
| Ion Ratio | Lower | Upper |       |
| 252       | 100   |       |       |
| 253       | 27.1  | 17.0  | 25.6# |
| 125       | 21.6  | 9.0   | 13.6# |

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#88

Benzo(k)fluoranthene

Concen: 2.480 ng m

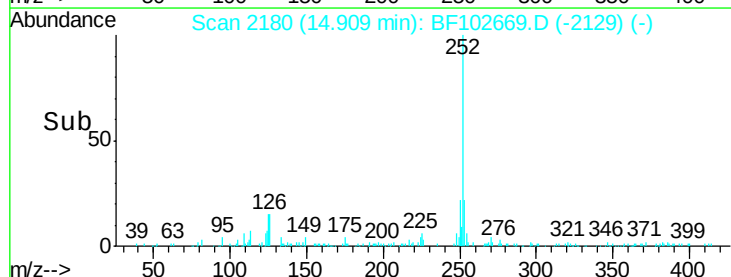
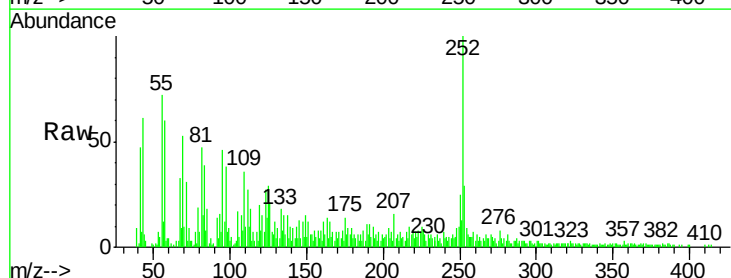
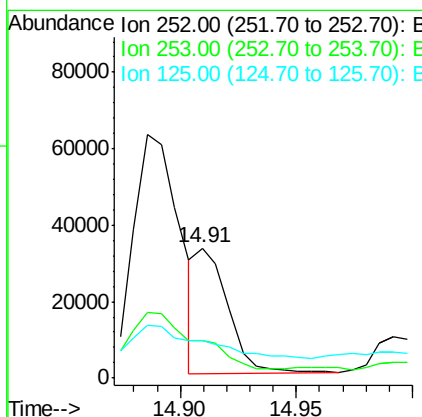
RT: 14.91 min Scan# 2180

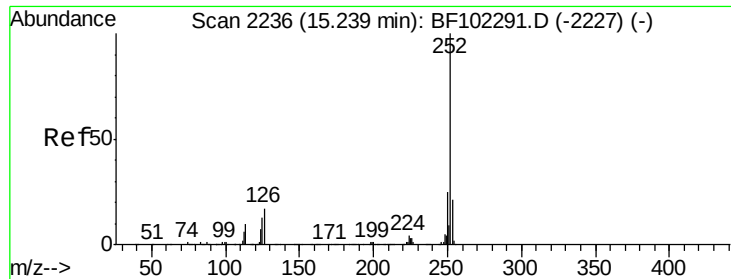
Delta R.T. 0.00 min

Lab File: BF102669.D

Acq: 31 Jan 2018 21:52

|           |       |       |       |
|-----------|-------|-------|-------|
| Tgt Ion:  | 252   | Resp: | 31597 |
| Ion Ratio | Lower | Upper |       |
| 252       | 100   |       |       |
| 253       | 28.6  | 17.9  | 26.9# |
| 125       | 29.1  | 10.2  | 15.2# |





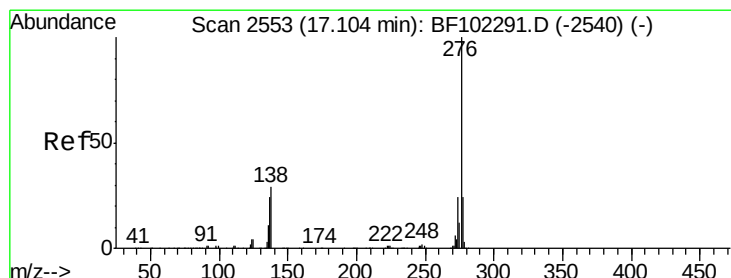
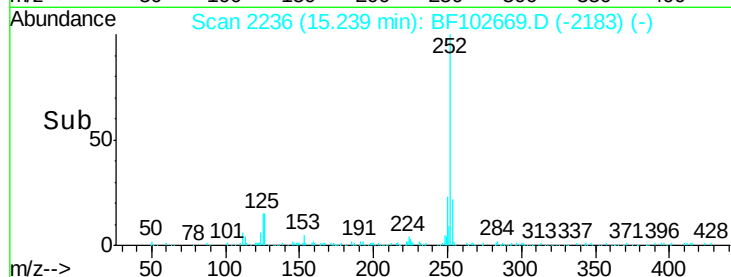
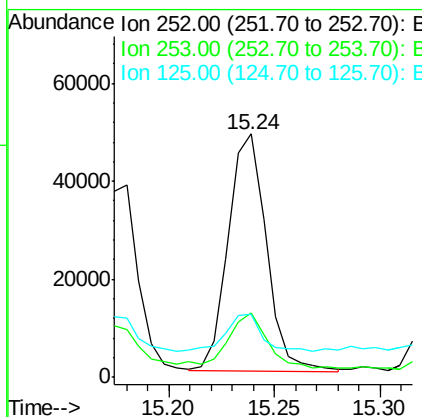
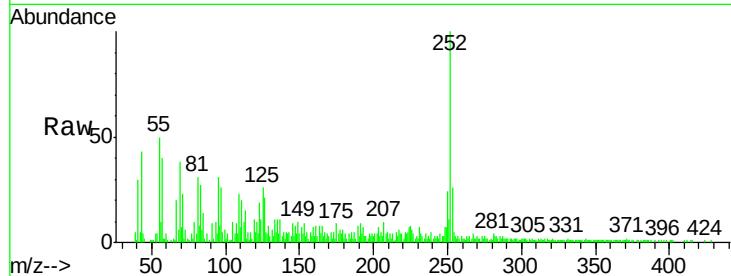
#89  
Benzo(a)pyrene  
Concen: 4.986 ng  
RT: 15.24 min Scan# 2236  
Delta R.T. 0.01 min  
Lab File: BF102669.D  
Acq: 31 Jan 2018 21:52

Instrument :  
BNA\_F  
ClientSampleId :  
TR-04-013018

| Tot Ion | Ratio | Lower | Upper |
|---------|-------|-------|-------|
| 252     | 100   |       |       |
| 253     | 26.4  | 17.1  | 25.7# |
| 125     | 26.2  | 9.8   | 14.6# |

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#91  
Benzo(g,h,i)perylene  
Concen: 3.072 ng  
RT: 17.12 min Scan# 2556  
Delta R.T. 0.02 min  
Lab File: BF102669.D  
Acq: 31 Jan 2018 21:52

| Tgt Ion | Ratio | Lower | Upper |
|---------|-------|-------|-------|
| 276     | 100   |       |       |
| 277     | 28.4  | 17.9  | 26.9# |
| 138     | 36.7  | 21.8  | 32.8# |

