

Data Path : Z:\SVOASRV\HPCHEM1\BNA M\DATA\BM083119\  
 Data File : BM022469.D  
 Acq On : 31 Aug 2019 13:10  
 Operator : HP/JU  
 Sample : K4568-16  
 Misc :  
 ALS Vial : 7 Sample Multiplier: 1

Instrument :  
 BNA\_M  
 ClientSampleId :  
 SB-36-COMP

Manual Integrations  
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mohammad  
 9/5/2019 9:13:02 AM

Quant Time: Aug 31 16:02:32 2019  
 Quant Method : Z:\SVOASRV\HPCHEM1\BNA M\METHODS\8270-BM082919.M  
 Quant Title : ASP BNA STANDARDS FOR 5 POINT CALIBRATION  
 QLast Update : Thu Aug 29 16:51:32 2019  
 Response via : Initial Calibration

| Internal Standards          | R.T.  | QIon | Response | Conc   | Units | Dev(Min)       |
|-----------------------------|-------|------|----------|--------|-------|----------------|
| 1) 1,4-Dichlorobenzene-d4   | 7.52  | 152  | 25208    | 20.00  | ng    | -0.01          |
| 21) Naphthalene-d8          | 10.29 | 136  | 90067    | 20.00  | ng    | 0.00           |
| 39) Acenaphthene-d10        | 14.18 | 164  | 57797    | 20.00  | ng    | 0.00           |
| 64) Phenanthrene-d10        | 16.95 | 188  | 132189   | 20.00  | ng    | 0.00           |
| 76) Chrysene-d12            | 21.17 | 240  | 173203   | 20.00  | ng    | 0.00           |
| 87) Perylene-d12            | 23.36 | 264  | 201166   | 20.00  | ng    | 0.00           |
| System Monitoring Compounds |       |      |          |        |       |                |
| 5) 2-Fluorophenol           | 5.15  | 112  | 185147   | 128.92 | ng    | 0.00           |
| 7) Phenol-d6                | 6.72  | 99   | 233205   | 121.43 | ng    | 0.00           |
| 23) Nitrobenzene-d5         | 8.69  | 82   | 167432   | 81.42  | ng    | 0.00           |
| 42) 2,4,6-Tribromophenol    | 15.69 | 330  | 143873   | 121.65 | ng    | 0.00           |
| 45) 2-Fluorobiphenyl        | 12.79 | 172  | 389037   | 76.25  | ng    | 0.00           |
| 79) Terphenyl-d14           | 19.60 | 244  | 951287   | 72.48  | ng    | 0.00           |
| Target Compounds            |       |      |          |        |       |                |
| 10) Phenol                  | 6.75  | 94   | 5123     | 2.655  | ng    | Qvalue<br># 59 |
| 49) Acenaphthylene          | 13.90 | 152  | 46311    | 8.183  | ng    | 98             |
| 50) Dimethylphthalate       | 13.66 | 163  | 43712    | 8.696  | ng    | 99             |
| 72) Anthracene              | 17.09 | 178  | 22750    | 3.001  | ng    | 99             |
| 75) Fluoranthene            | 19.02 | 202  | 26987    | 2.630  | ng    | 97             |
| 78) Pyrene                  | 19.39 | 202  | 80563    | 6.825  | ng    | 97             |
| 81) Benzo(a)anthracene      | 21.15 | 228  | 39285    | 3.160  | ng    | # 89           |
| 83) Chrysene                | 21.20 | 228  | 44283    | 3.742  | ng    | 93             |
| 86) Indeno(1,2,3-cd)pyrene  | 25.53 | 276  | 51880    | 4.359  | ng    | 97             |
| 88) Benzo(b)fluoranthene    | 22.70 | 252  | 98319m   | 7.035  | ng    |                |
| 90) Benzo(a)pyrene          | 23.26 | 252  | 81673    | 6.584  | ng    | 95             |
| 92) Benzo(a,h,i)perylene    | 26.20 | 276  | 50327    | 4.668  | ng    | 98             |

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

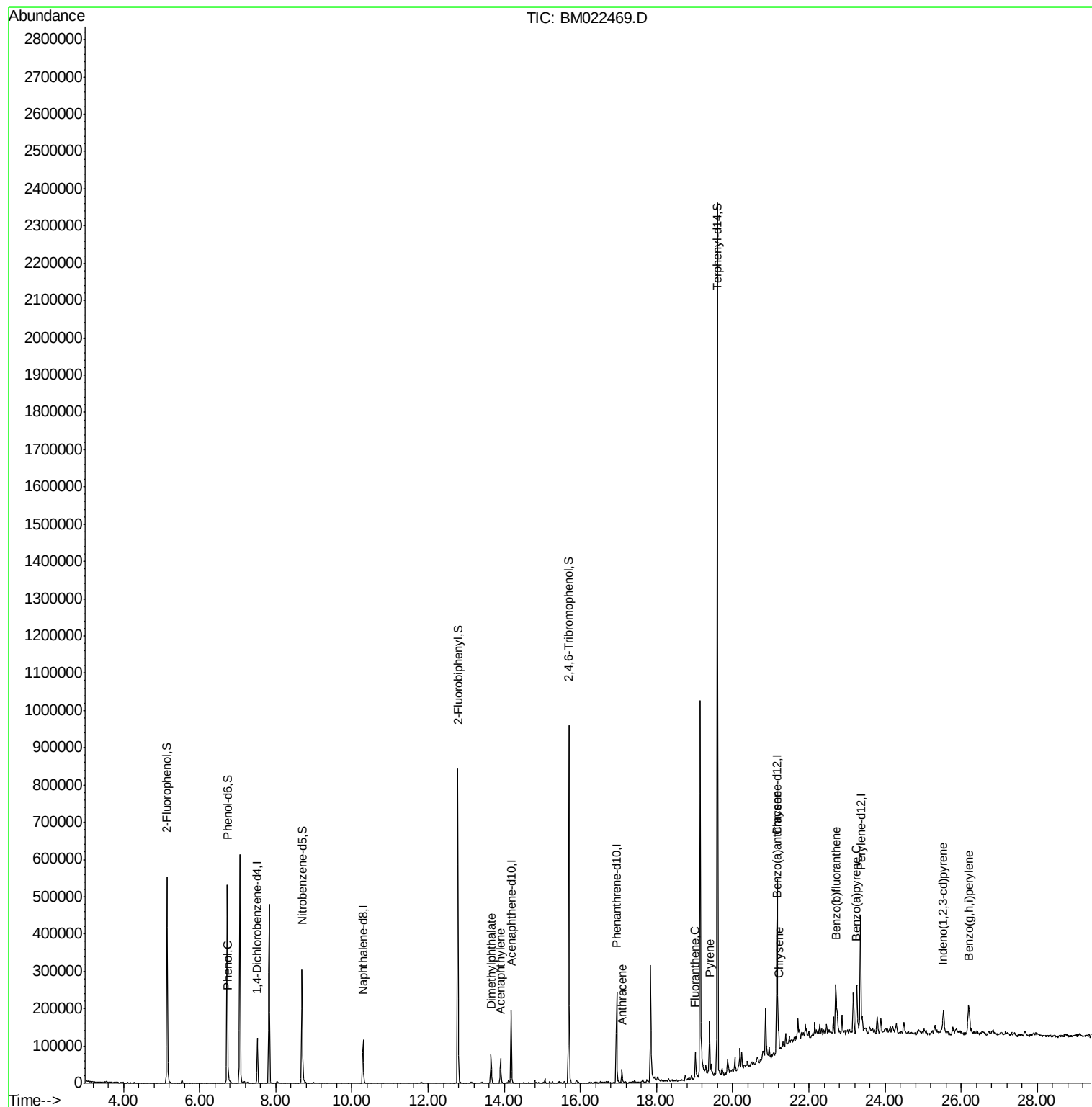
Data Path : Z:\SVOASRV\HPCHEM1\BNA M\DATA\BM083119\  
Data File : BM022469.D  
Acq On : 31 Aug 2019 13:10  
Operator : HP/JU  
Sample : K4568-16  
Misc :  
ALS Vial : 7 Sample Multiplier: 1

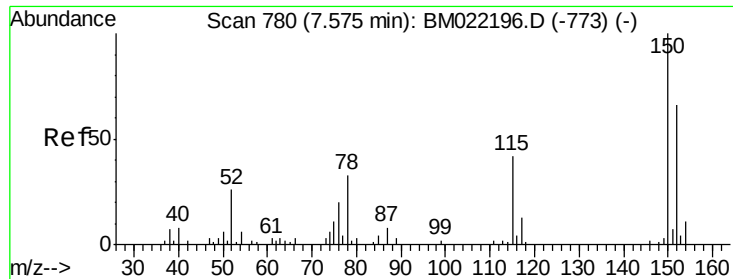
Instrument :  
BNA\_M  
ClientSampleId :  
SB-36-COMP

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Quant Time: Aug 31 16:02:32 2019  
Quant Method : Z:\SVOASRV\HPCHEM1\BNA M\METHODS\8270-BM082919.M  
Quant Title : ASP BNA STANDARDS FOR 5 POINT CALIBRATION  
QLast Update : Thu Aug 29 16:51:32 2019  
Response via : Initial Calibration





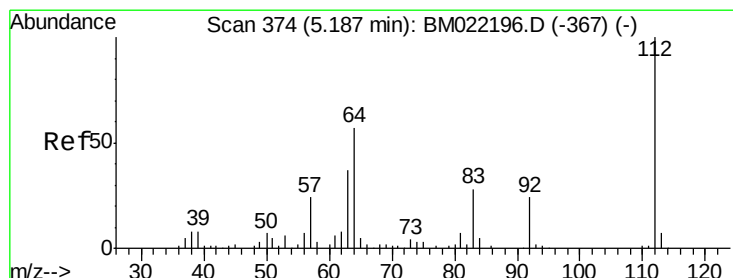
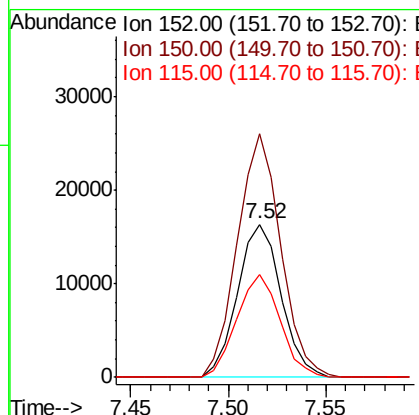
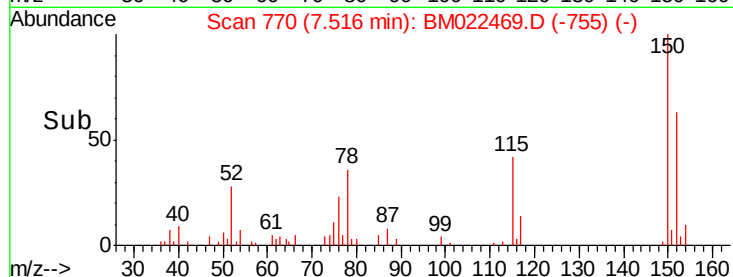
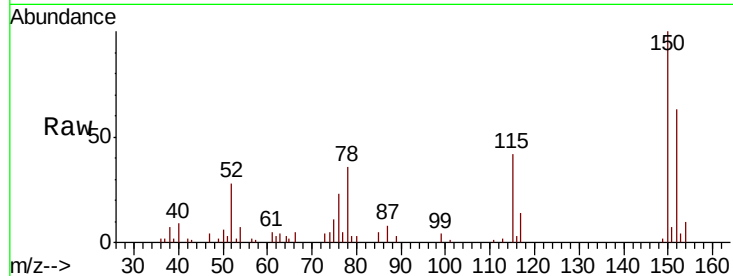
#1  
 1,4-Dichlorobenzene-d4  
 Concen: 20.000 ng  
 RT: 7.52 min Scan# 770  
 Delta R.T. -0.01 min  
 Lab File: BM022469.D  
 Acq: 31 Aug 2019 13:10

Instrument :  
 BNA\_M  
 ClientSampleId :  
 SB-36-COMP

| Tot Ion | Ratio | Lower | Upper |
|---------|-------|-------|-------|
| 152     | 100   |       |       |
| 150     | 159.0 | 125.4 | 188.0 |
| 115     | 67.1  | 50.3  | 75.5  |

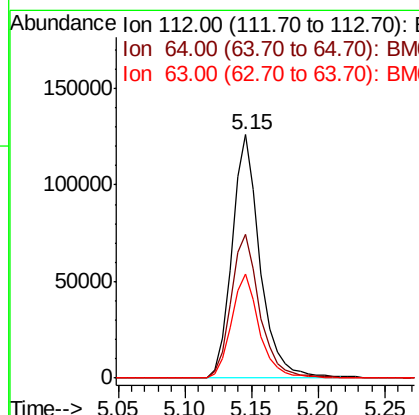
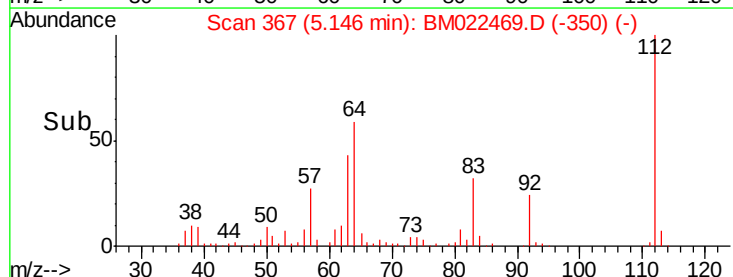
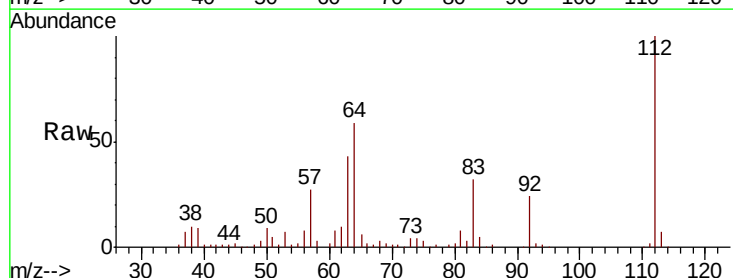
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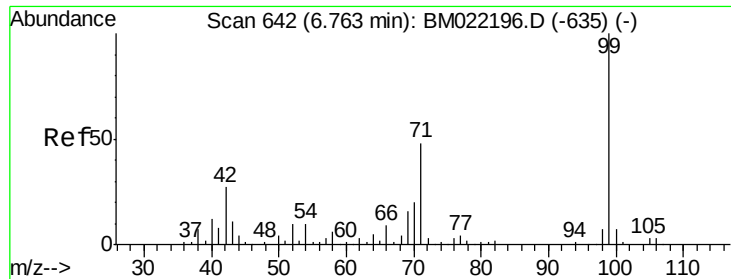
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#5  
 2-Fluorophenol  
 Concen: 128.925 ng  
 RT: 5.15 min Scan# 367  
 Delta R.T. -0.00 min  
 Lab File: BM022469.D  
 Acq: 31 Aug 2019 13:10

| Tgt Ion | Ratio | Lower | Upper |
|---------|-------|-------|-------|
| 112     | 100   |       |       |
| 64      | 58.8  | 45.4  | 68.2  |
| 63      | 42.6  | 34.5  | 51.7  |





#7

Phenol-d6

Concen: 121.434 ng

RT: 6.72 min Scan# 635

Delta R.T. -0.00 min

Lab File: BM022469.D

Acq: 31 Aug 2019 13:10

Instrument :

BNA\_M

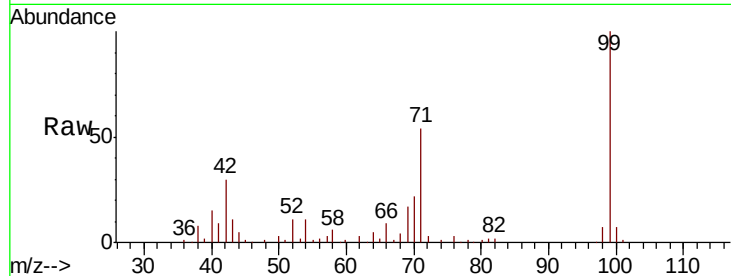
ClientSampleId :

SB-36-COMP

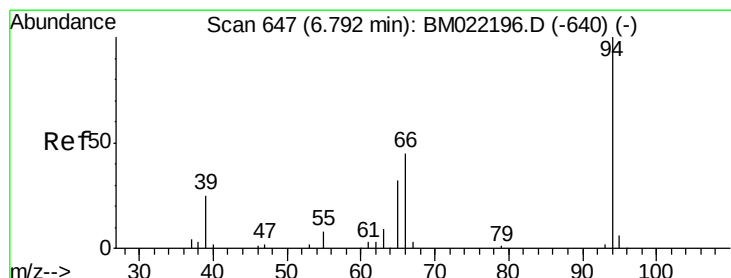
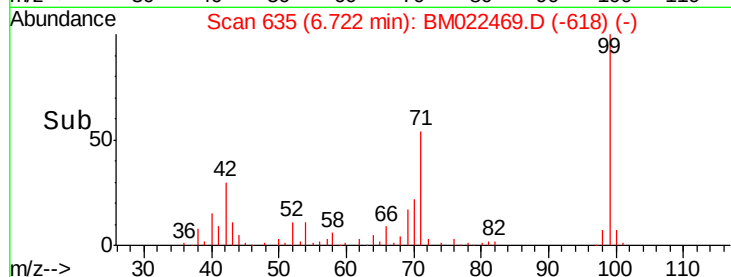
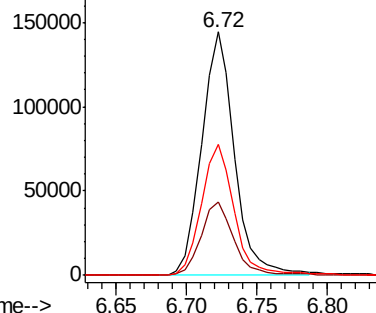
|           |       |       |        |
|-----------|-------|-------|--------|
| Tot Ion:  | 99    | Resp: | 233205 |
| Ion Ratio | Lower | Upper |        |
| 99        | 100   |       |        |
| 42        | 30.4  | 26.3  | 39.5   |
| 71        | 53.8  | 46.6  | 69.8   |

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



#10

Phenol

Concen: 2.655 ng

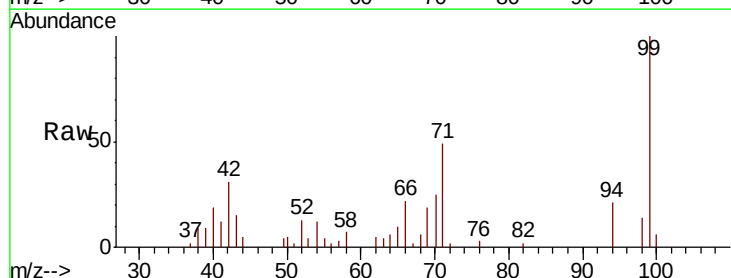
RT: 6.75 min Scan# 639

Delta R.T. -0.01 min

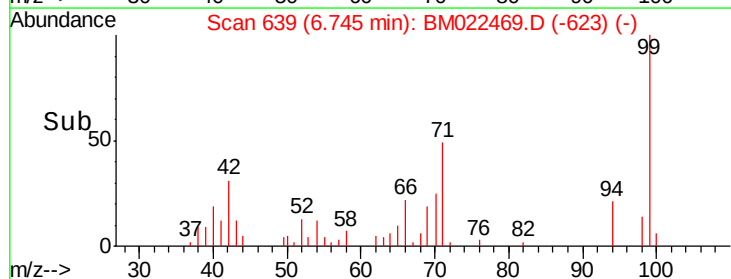
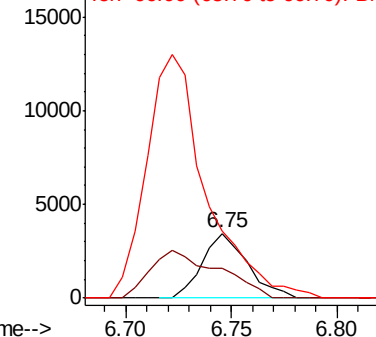
Lab File: BM022469.D

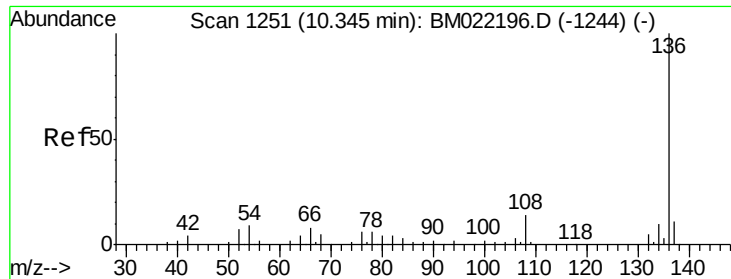
Acq: 31 Aug 2019 13:10

|           |       |       |       |
|-----------|-------|-------|-------|
| Tgt Ion:  | 94    | Resp: | 5123  |
| Ion Ratio | Lower | Upper |       |
| 94        | 100   |       |       |
| 65        | 46.4  | 17.7  | 57.7  |
| 66        | 103.4 | 39.6  | 79.6# |



Abundance Ion 94.00 (93.70 to 94.70): BMO  
Ion 65.00 (64.70 to 65.70): BMO  
Ion 66.00 (65.70 to 66.70): BMO





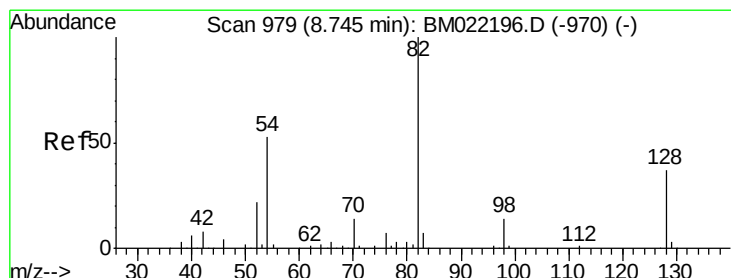
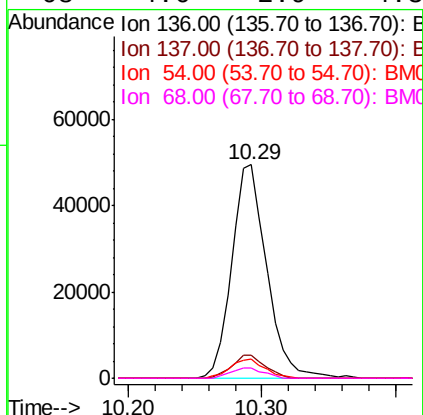
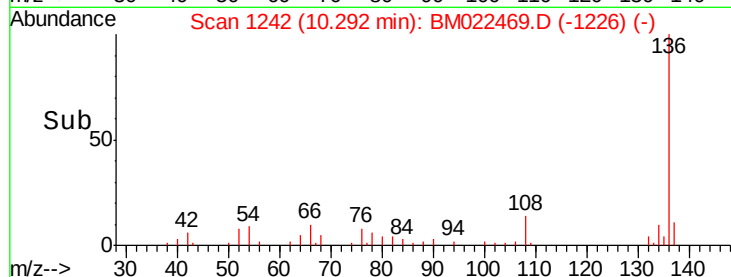
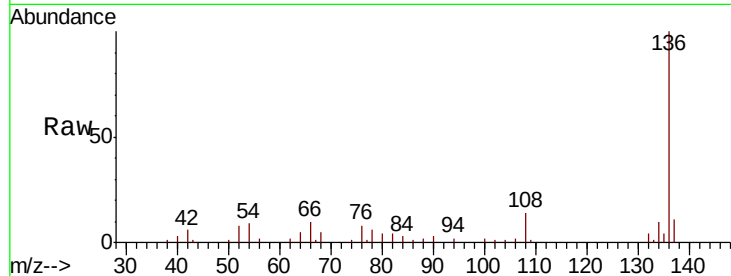
#21  
Naphthalene-d8  
Concen: 20.000 ng  
RT: 10.29 min Scan# 1242  
Delta R.T. -0.01 min  
Lab File: BM022469.D  
Acq: 31 Aug 2019 13:10

Instrument :  
BNA\_M  
ClientSampleId :  
SB-36-COMP

| Tot Ion | Ratio | Resp  | Lower | Upper |
|---------|-------|-------|-------|-------|
| 136     | 100   | 90067 |       |       |
| 137     | 10.9  |       | 8.6   | 13.0  |
| 54      | 9.3   |       | 7.0   | 10.6  |
| 68      | 4.6   |       | 2.9   | 4.3#  |

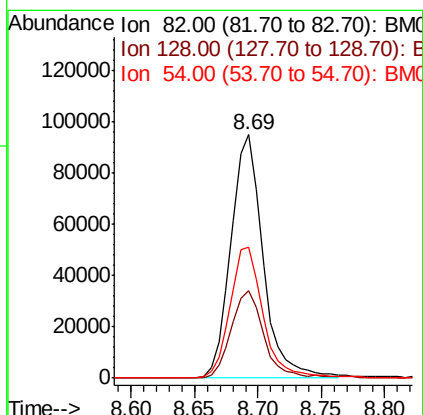
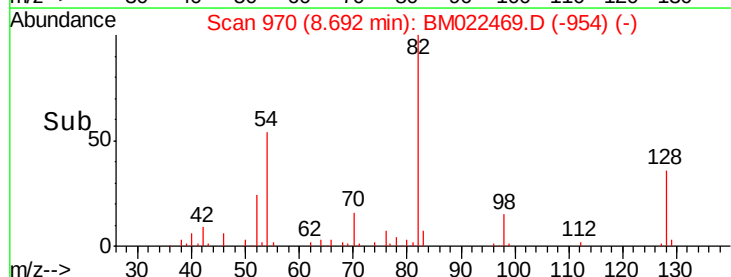
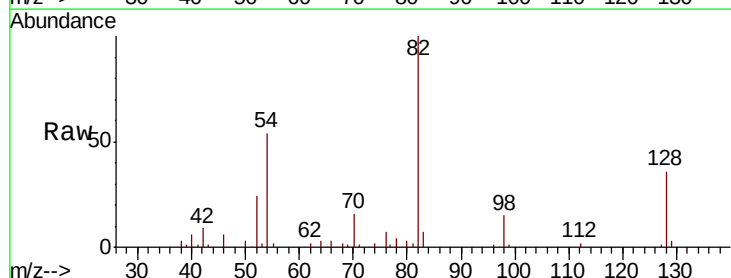
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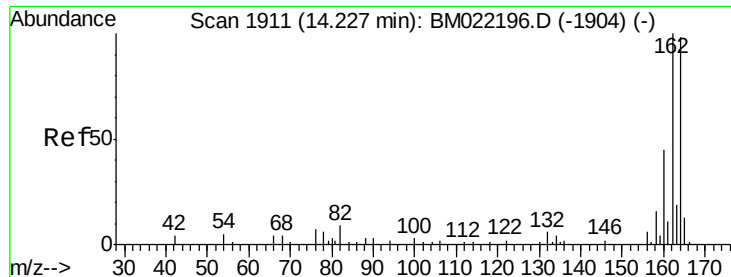
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#23  
Nitrobenzene-d5  
Concen: 81.424 ng  
RT: 8.69 min Scan# 970  
Delta R.T. -0.01 min  
Lab File: BM022469.D  
Acq: 31 Aug 2019 13:10

| Tgt Ion | Ratio | Resp   | Lower | Upper |
|---------|-------|--------|-------|-------|
| 82      | 100   | 167432 |       |       |
| 128     | 35.9  |        | 27.9  | 41.9  |
| 54      | 53.8  |        | 45.2  | 67.8  |





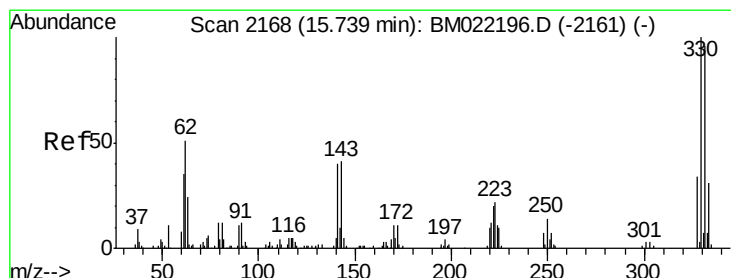
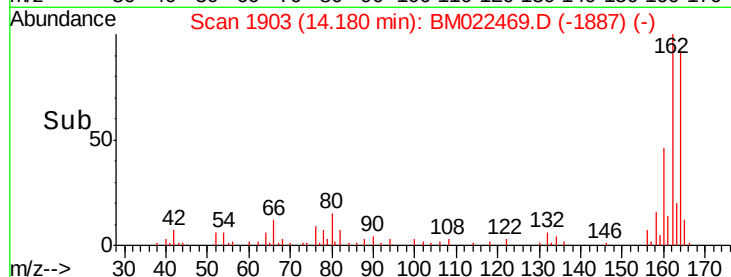
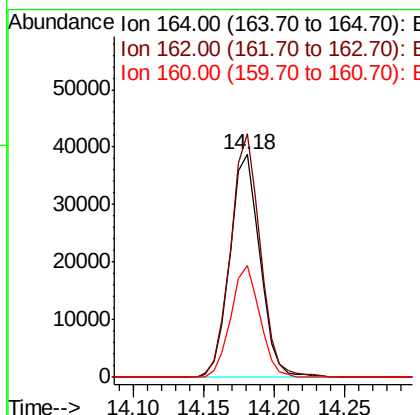
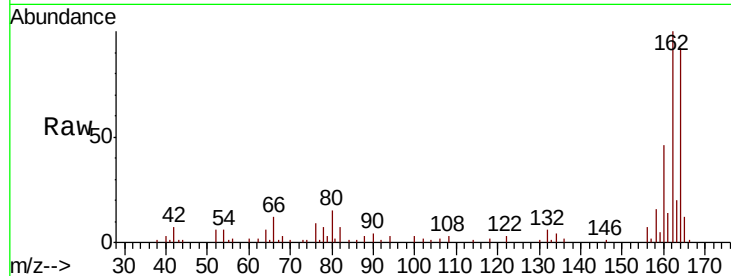
#39  
Acenaphthene-d10  
Concen: 20.000 ng  
RT: 14.18 min Scan# 1903  
Delta R.T. -0.01 min  
Lab File: BM022469.D  
Acq: 31 Aug 2019 13:10

Instrument :  
BNA\_M  
ClientSampleId :  
SB-36-COMP

| Tot Ion | Ratio | Lower | Upper |
|---------|-------|-------|-------|
| 164     | 100   |       |       |
| 162     | 109.2 | 80.6  | 121.0 |
| 160     | 50.1  | 37.3  | 55.9  |

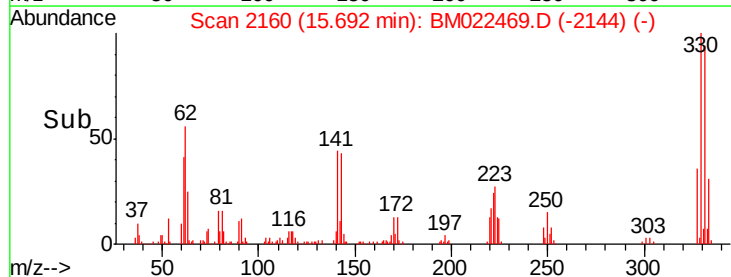
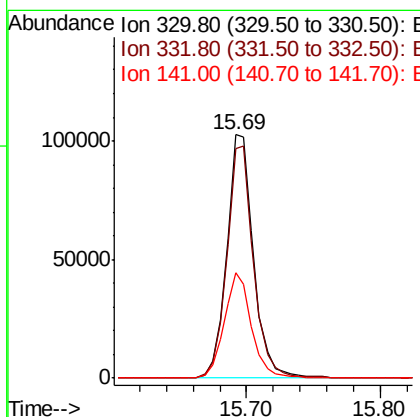
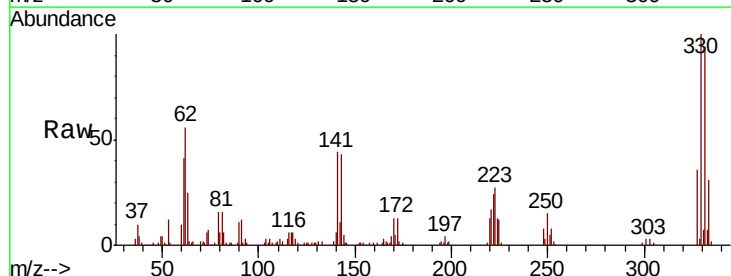
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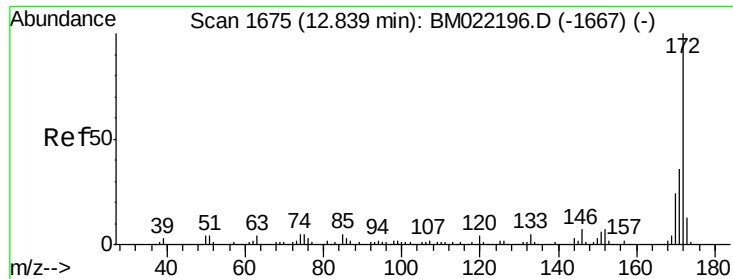
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#42  
2,4,6-Tribromophenol  
Concen: 121.649 ng  
RT: 15.69 min Scan# 2160  
Delta R.T. -0.01 min  
Lab File: BM022469.D  
Acq: 31 Aug 2019 13:10

| Tgt Ion | Ratio | Lower | Upper |
|---------|-------|-------|-------|
| 330     | 100   |       |       |
| 332     | 95.4  | 77.8  | 116.8 |
| 141     | 44.2  | 35.6  | 53.4  |





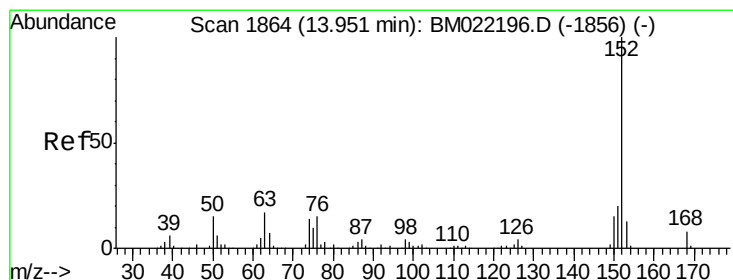
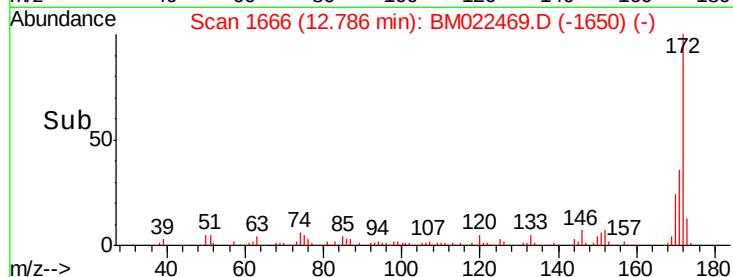
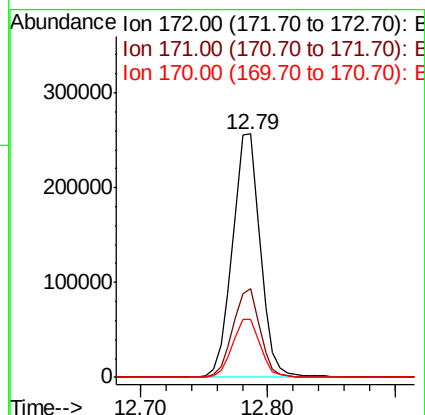
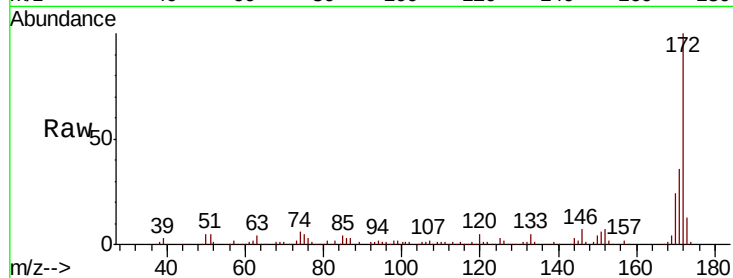
#45  
2-Fluorobiphenyl  
Concen: 76.253 ng  
RT: 12.79 min Scan# 1666  
Delta R.T. -0.01 min  
Lab File: BM022469.D  
Acq: 31 Aug 2019 13:10

Instrument :  
BNA\_M  
ClientSampleId :  
SB-36-COMP

| Tot Ion | Ratio | Resp   | Lower | Upper |
|---------|-------|--------|-------|-------|
| 172     | 100   | 389037 |       |       |
| 171     | 36.2  |        | 28.5  | 42.7  |
| 170     | 24.0  |        | 18.9  | 28.3  |

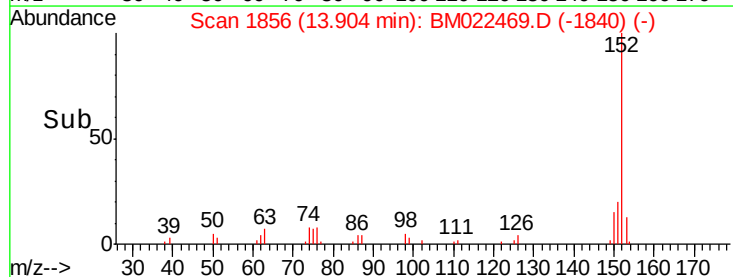
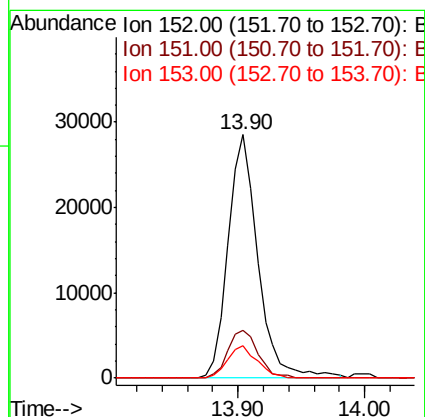
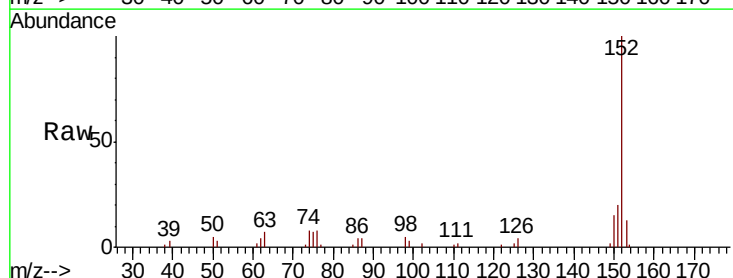
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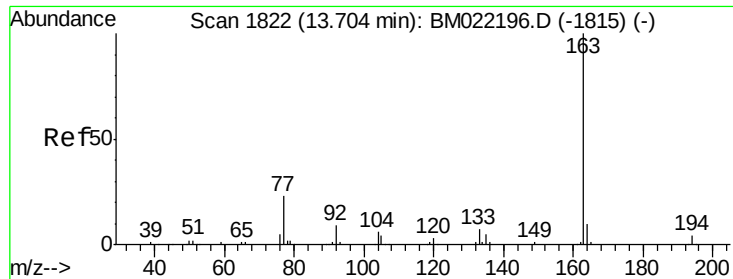
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#49  
Acenaphthylene  
Concen: 8.183 ng  
RT: 13.90 min Scan# 1856  
Delta R.T. -0.01 min  
Lab File: BM022469.D  
Acq: 31 Aug 2019 13:10

| Tgt Ion | Ratio | Resp  | Lower | Upper |
|---------|-------|-------|-------|-------|
| 152     | 100   | 46311 |       |       |
| 151     | 19.5  |       | 16.9  | 25.3  |
| 153     | 13.3  |       | 10.4  | 15.6  |





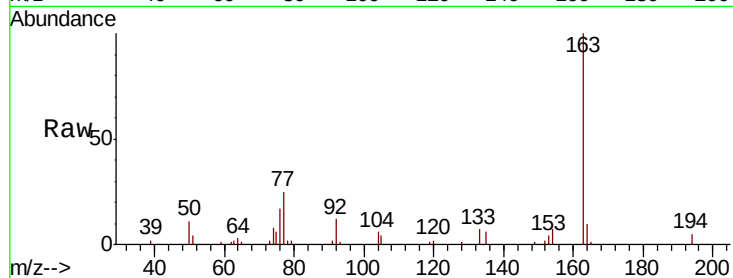
#50  
Dimethylphthalate  
Concen: 8.696 ng  
RT: 13.66 min Scan# 1814  
Delta R.T. -0.01 min  
Lab File: BM022469.D  
Acq: 31 Aug 2019 13:10

Instrument :  
BNA\_M  
ClientSampleId :  
SB-36-COMP

| Tot Ion | Ratio | Resp  | Lower | Upper |
|---------|-------|-------|-------|-------|
| 163     | 100   | 43712 |       |       |
| 194     | 4.9   |       | 3.4   | 5.2   |
| 164     | 10.4  |       | 8.2   | 12.2  |

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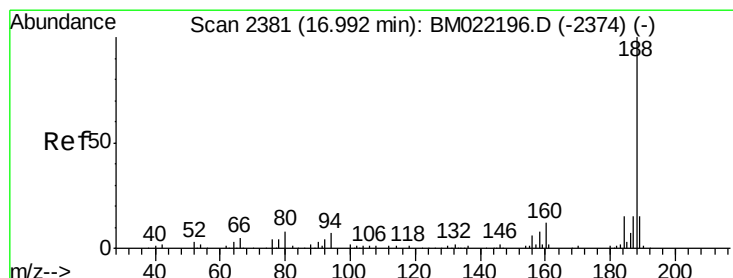
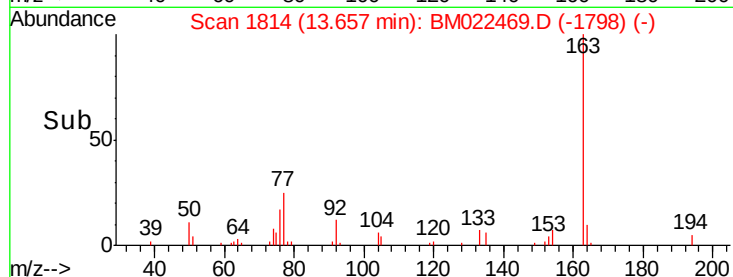
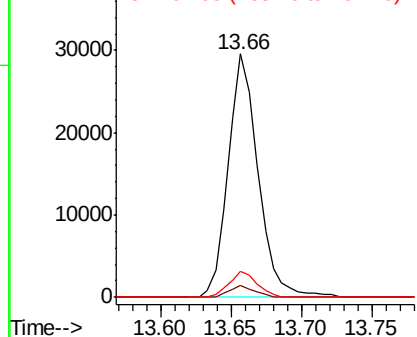


Abundance

Ion 163.00 (162.70 to 163.70): E

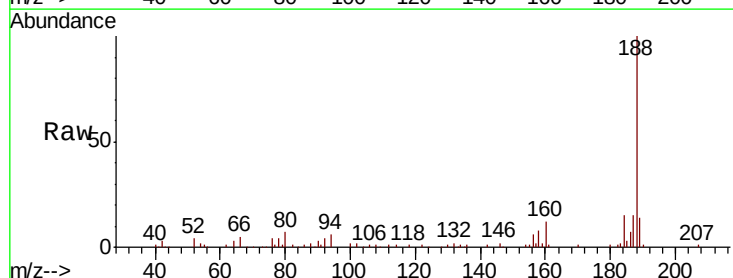
Ion 194.00 (193.70 to 194.70): E

Ion 164.00 (163.70 to 164.70): E



#64  
Phenanthrene-d10  
Concen: 20.000 ng  
RT: 16.95 min Scan# 2374  
Delta R.T. -0.00 min  
Lab File: BM022469.D  
Acq: 31 Aug 2019 13:10

| Tgt Ion | Ratio | Resp   | Lower | Upper |
|---------|-------|--------|-------|-------|
| 188     | 100   | 132189 |       |       |
| 94      | 6.1   |        | 4.4   | 6.6   |
| 80      | 7.2   |        | 5.0   | 7.6   |

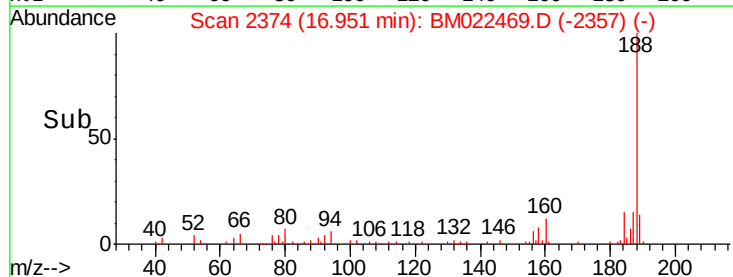
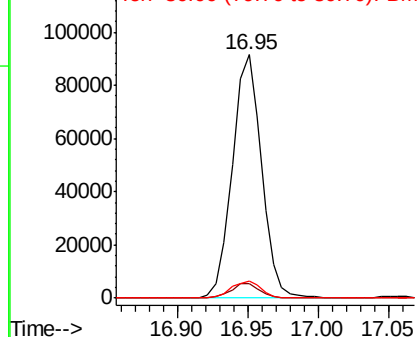


Abundance

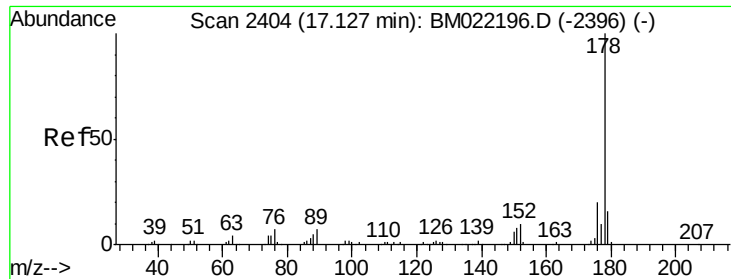
Ion 188.00 (187.70 to 188.70): E

Ion 94.00 (93.70 to 94.70): BM

Ion 80.00 (79.70 to 80.70): BM







#72

Anthracene

Concen: 3.001 ng

RT: 17.09 min Scan# 2398

Delta R.T. -0.00 min

Lab File: BM022469.D

Acq: 31 Aug 2019 13:10

Instrument :

BNA\_M

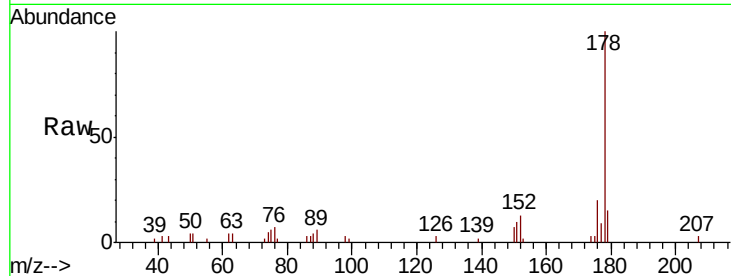
ClientSampleId :

SB-36-COMP

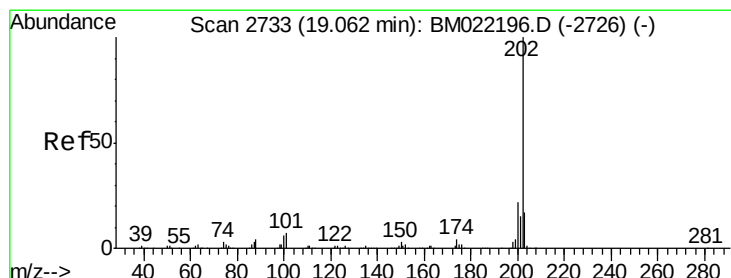
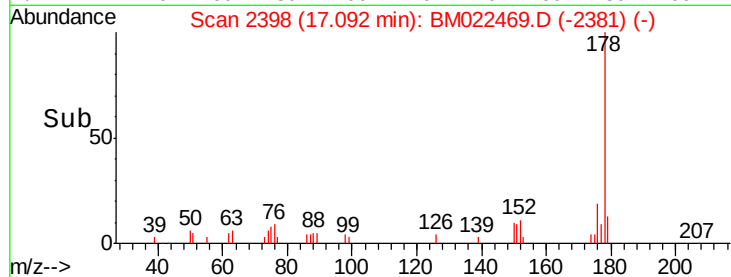
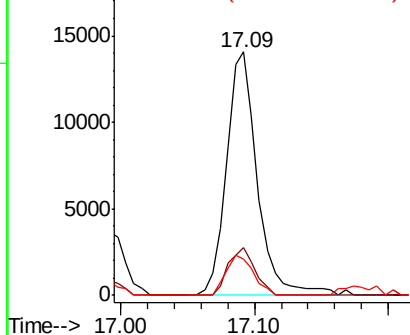
|           |       |       |       |
|-----------|-------|-------|-------|
| Tot Ion:  | 178   | Resp: | 22750 |
| Ion Ratio | Lower | Upper |       |
| 178       | 100   |       |       |
| 176       | 19.5  | 15.0  | 22.4  |
| 179       | 14.6  | 11.8  | 17.6  |

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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



#75

Fluoranthene

Concen: 2.630 ng

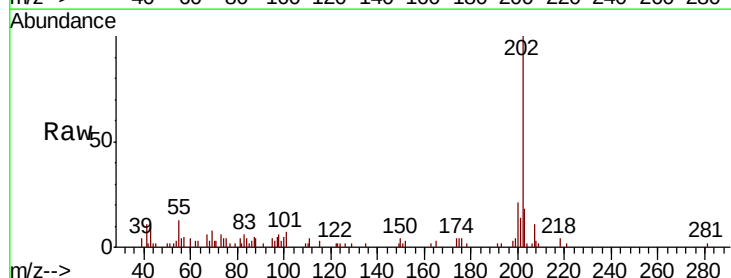
RT: 19.02 min Scan# 2726

Delta R.T. -0.01 min

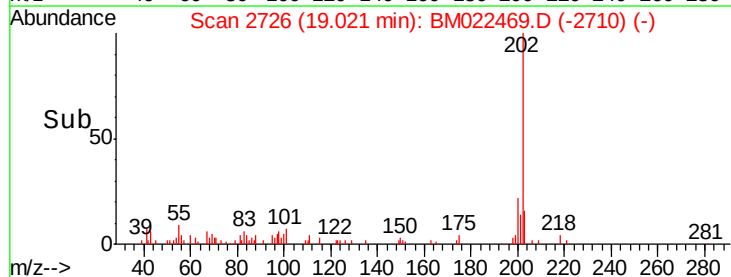
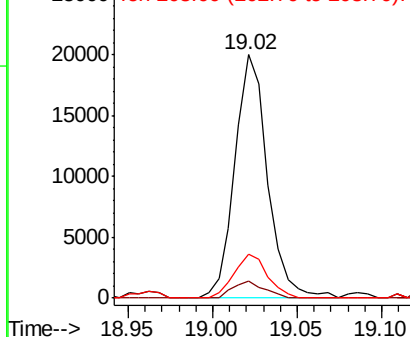
Lab File: BM022469.D

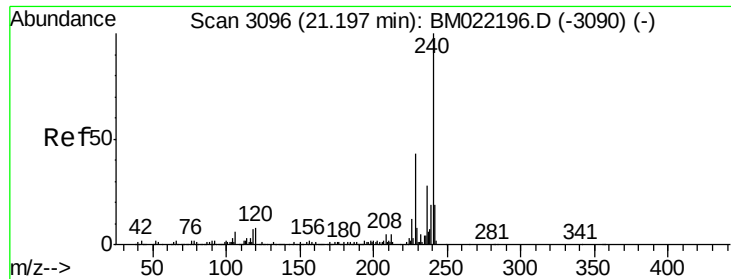
Acq: 31 Aug 2019 13:10

|           |       |       |       |
|-----------|-------|-------|-------|
| Tgt Ion:  | 202   | Resp: | 26987 |
| Ion Ratio | Lower | Upper |       |
| 202       | 100   |       |       |
| 101       | 7.2   | 0.0   | 25.1  |
| 203       | 18.0  | 0.0   | 37.1  |



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





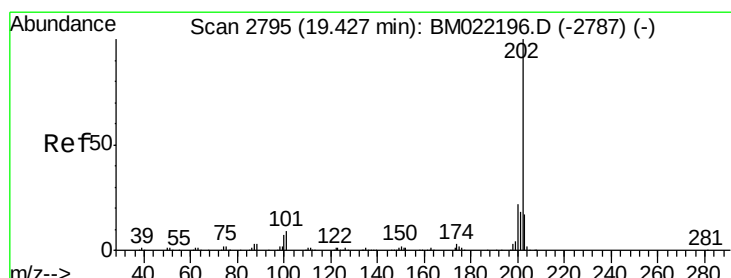
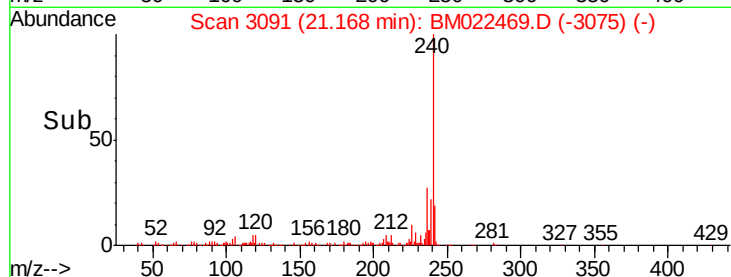
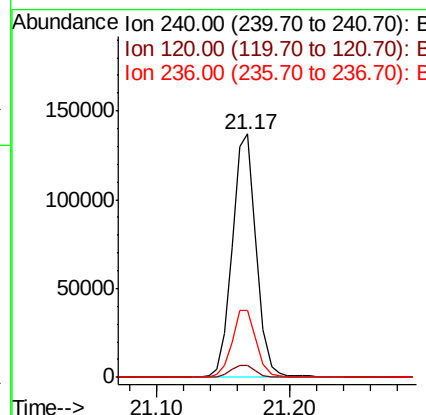
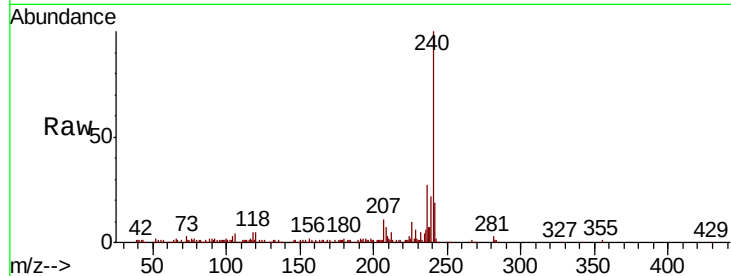
#76  
Chrysene-d12  
Concen: 20.000 ng  
RT: 21.17 min Scan# 3091  
Delta R.T. -0.01 min  
Lab File: BM022469.D  
Acq: 31 Aug 2019 13:10

Instrument :  
BNA\_M  
ClientSampleId :  
SB-36-COMP

| Tot Ion | Ratio | Lower | Upper |
|---------|-------|-------|-------|
| 240     | 100   |       |       |
| 120     | 4.9   | 3.9   | 5.9   |
| 236     | 27.5  | 21.4  | 32.2  |

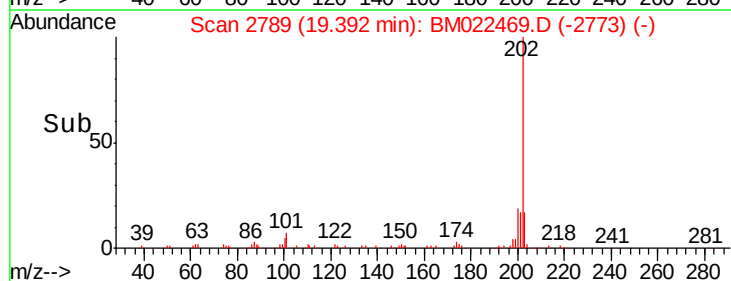
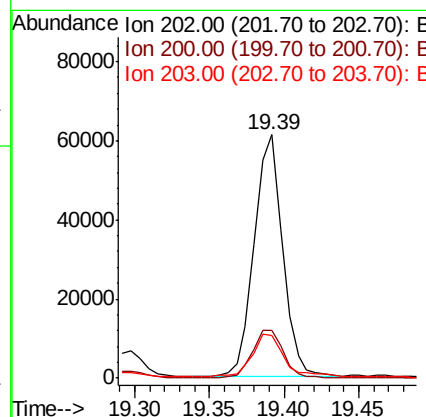
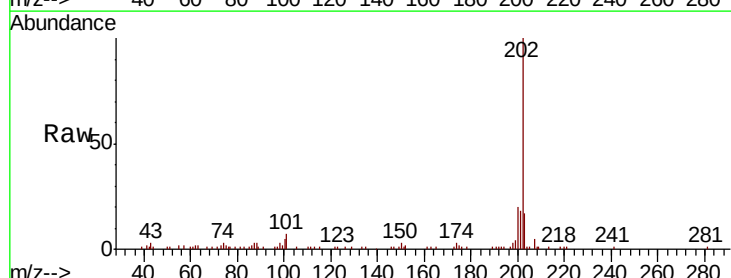
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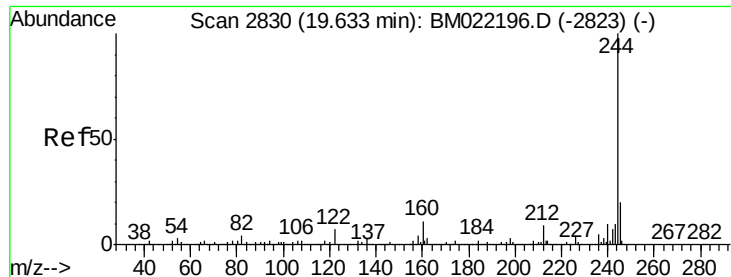
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#78  
Pyrene  
Concen: 6.825 ng  
RT: 19.39 min Scan# 2789  
Delta R.T. -0.01 min  
Lab File: BM022469.D  
Acq: 31 Aug 2019 13:10

| Tgt Ion | Ratio | Lower | Upper |
|---------|-------|-------|-------|
| 202     | 100   |       |       |
| 200     | 19.7  | 17.7  | 26.5  |
| 203     | 17.3  | 13.8  | 20.8  |





#79

Terphenyl-d14

Concen: 72.485 ng

RT: 19.60 min Scan# 2824

Delta R.T. -0.01 min

Lab File: BM022469.D

Acq: 31 Aug 2019 13:10

Instrument :

BNA\_M

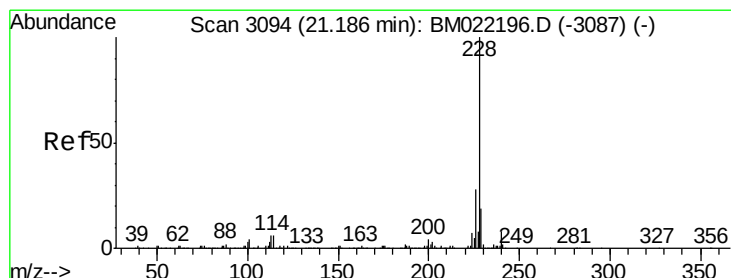
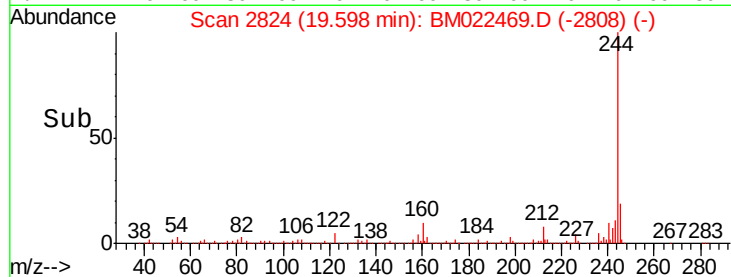
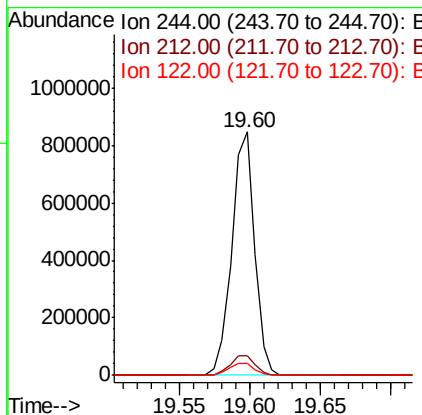
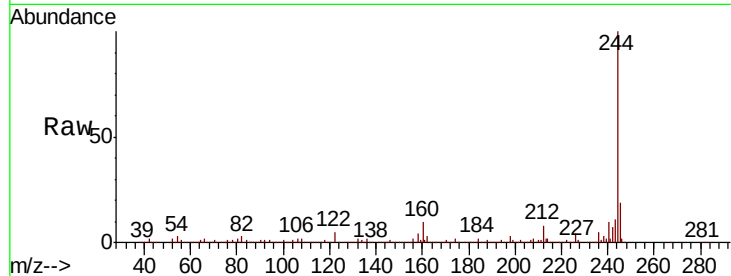
ClientSampleId :

SB-36-COMP

|           |     |       |        |
|-----------|-----|-------|--------|
| Tot Ion:  | 244 | Resp: | 951287 |
| Ion Ratio |     | Lower | Upper  |
| 244       | 100 |       |        |
| 212       | 8.1 | 7.0   | 10.4   |
| 122       | 4.7 | 3.9   | 5.9    |

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#81

Benzo(a)anthracene

Concen: 3.160 ng

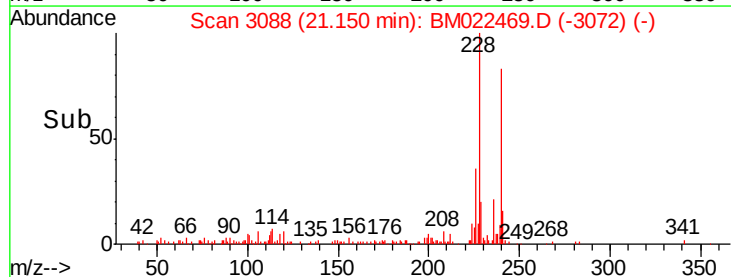
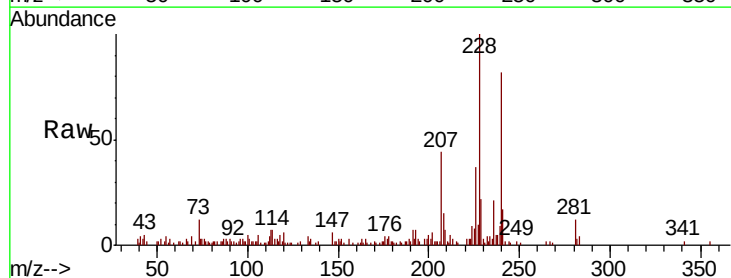
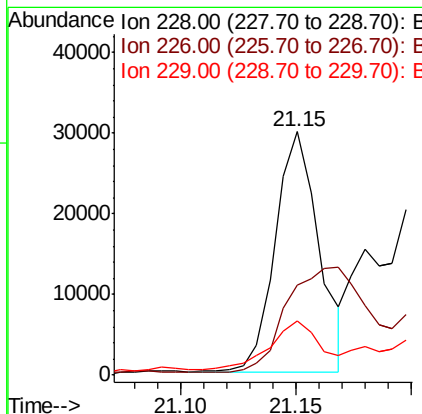
RT: 21.15 min Scan# 3088

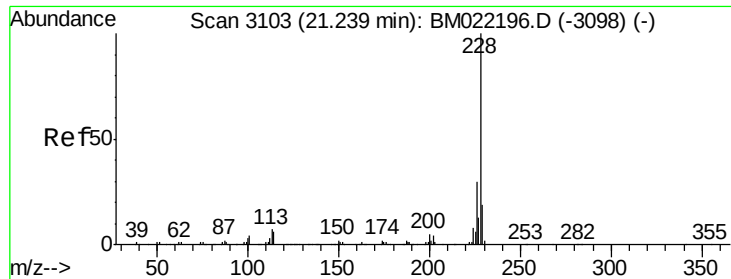
Delta R.T. -0.01 min

Lab File: BM022469.D

Acq: 31 Aug 2019 13:10

|           |      |       |       |
|-----------|------|-------|-------|
| Tgt Ion:  | 228  | Resp: | 39285 |
| Ion Ratio |      | Lower | Upper |
| 228       | 100  |       |       |
| 226       | 36.7 | 22.6  | 34.0# |
| 229       | 22.2 | 15.9  | 23.9  |





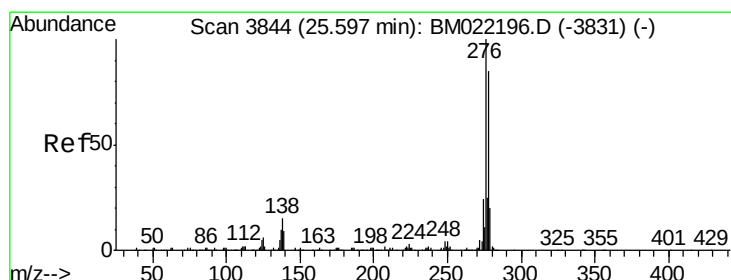
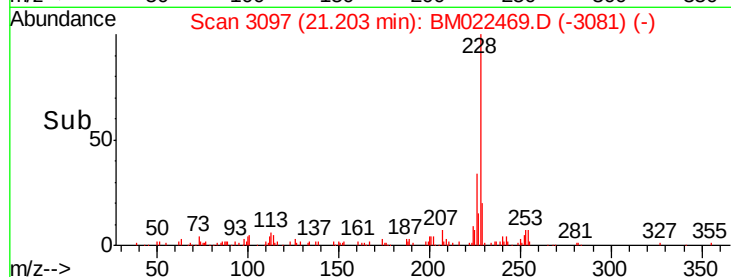
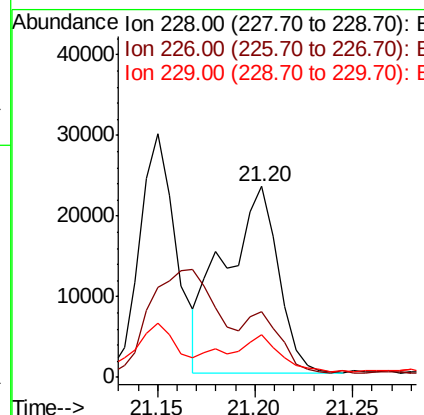
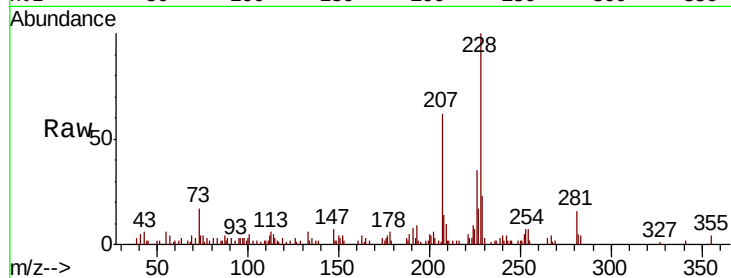
#83  
Chrysene  
Concen: 3.742 ng  
RT: 21.20 min Scan# 3097  
Delta R.T. -0.01 min  
Lab File: BM022469.D  
Acq: 31 Aug 2019 13:10

Instrument :  
BNA\_M  
ClientSampleId :  
SB-36-COMP

| Tot Ion | Ratio | Lower | Upper |
|---------|-------|-------|-------|
| 228     | 100   |       |       |
| 226     | 34.7  | 24.5  | 36.7  |
| 229     | 22.7  | 15.7  | 23.5  |

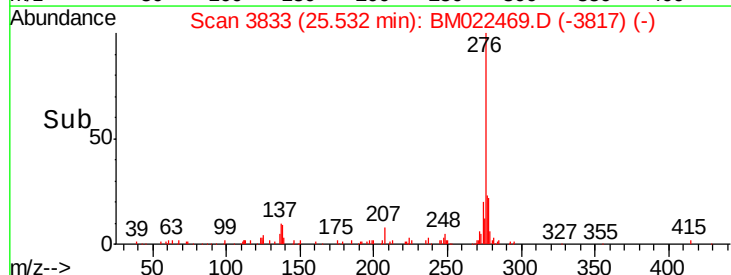
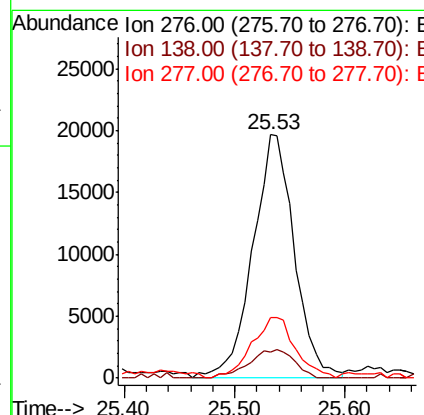
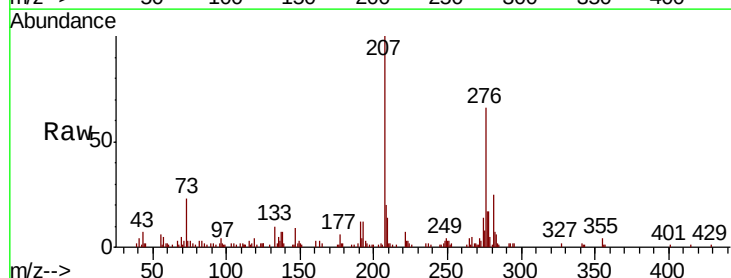
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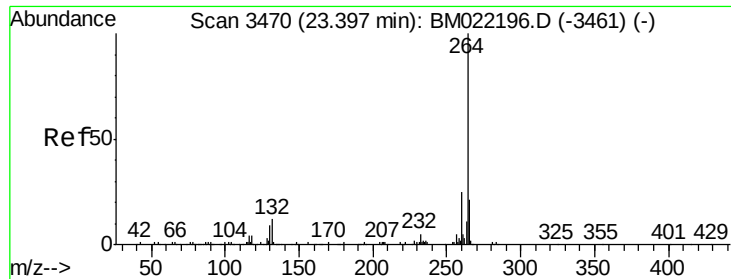
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#86  
Indeno(1,2,3-cd)pyrene  
Concen: 4.359 ng  
RT: 25.53 min Scan# 3833  
Delta R.T. -0.01 min  
Lab File: BM022469.D  
Acq: 31 Aug 2019 13:10

| Tgt Ion | Ratio | Lower | Upper |
|---------|-------|-------|-------|
| 276     | 100   |       |       |
| 138     | 12.8  | 9.1   | 13.7  |
| 277     | 26.0  | 20.0  | 30.0  |





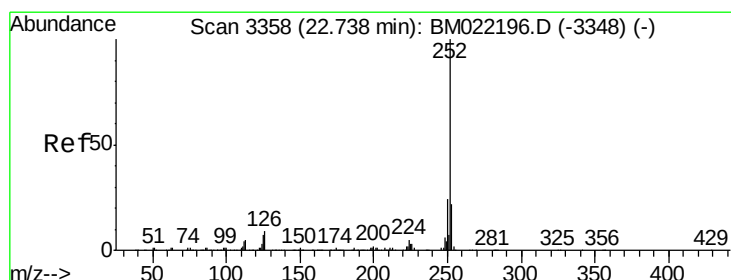
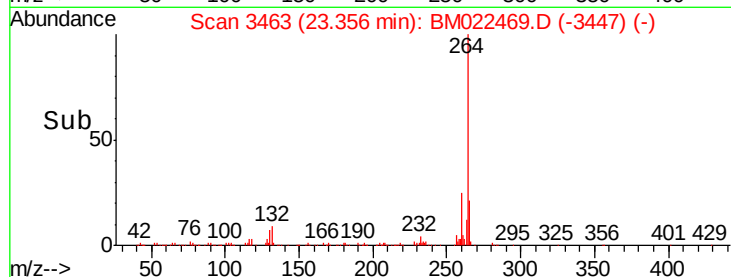
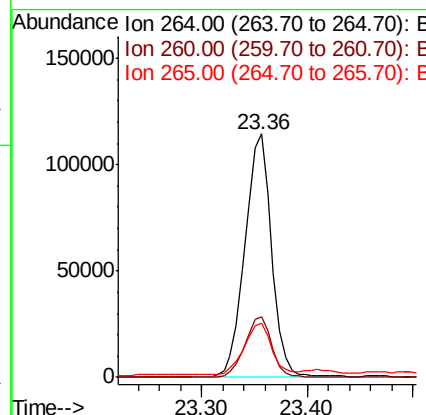
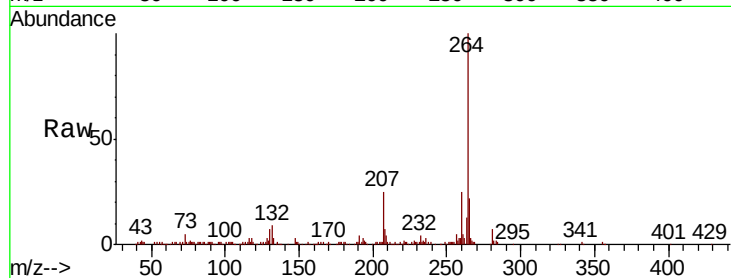
#87  
Pervlene-d12  
Concen: 20.000 ng  
RT: 23.36 min Scan# 3463  
Delta R.T. -0.01 min  
Lab File: BM022469.D  
Acq: 31 Aug 2019 13:10

Instrument :  
BNA\_M  
ClientSampleId :  
SB-36-COMP

| Tot Ion | Ratio | Lower | Upper |
|---------|-------|-------|-------|
| 264     | 100   |       |       |
| 260     | 24.7  | 20.2  | 30.2  |
| 265     | 22.1  | 18.2  | 27.2  |

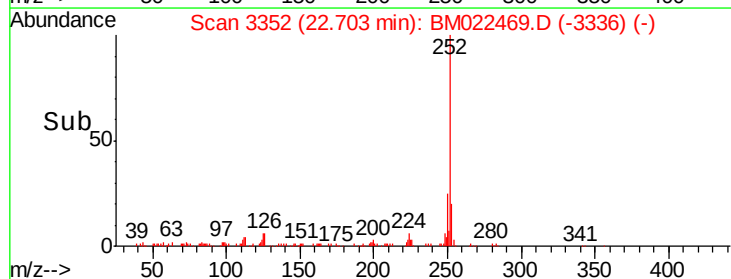
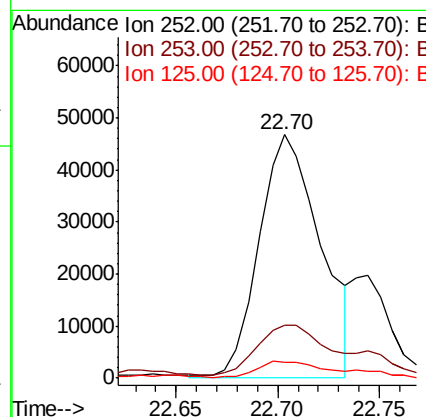
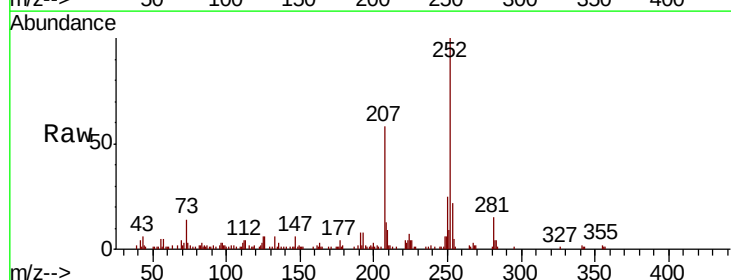
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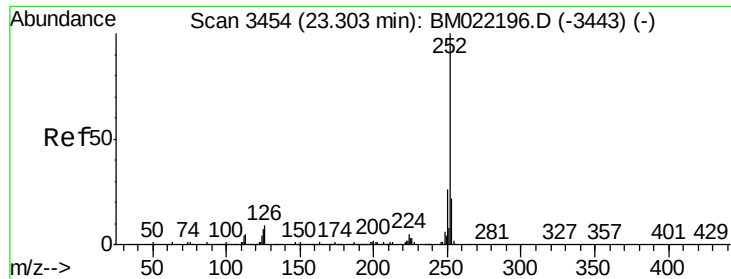
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#88  
Benzo(b)fluoranthene  
Concen: 7.035 ng m  
RT: 22.70 min Scan# 3352  
Delta R.T. -0.01 min  
Lab File: BM022469.D  
Acq: 31 Aug 2019 13:10

| Tgt Ion | Ratio | Lower | Upper |
|---------|-------|-------|-------|
| 252     | 100   |       |       |
| 253     | 22.0  | 17.9  | 26.9  |
| 125     | 6.4   | 3.5   | 5.3#  |





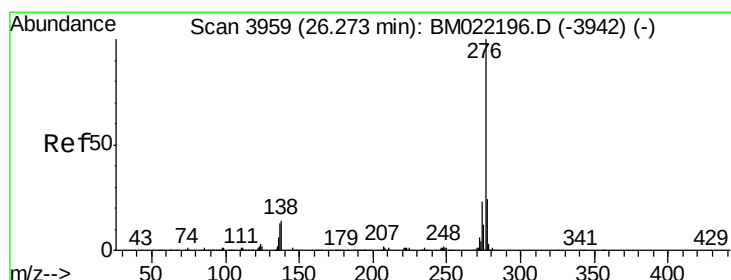
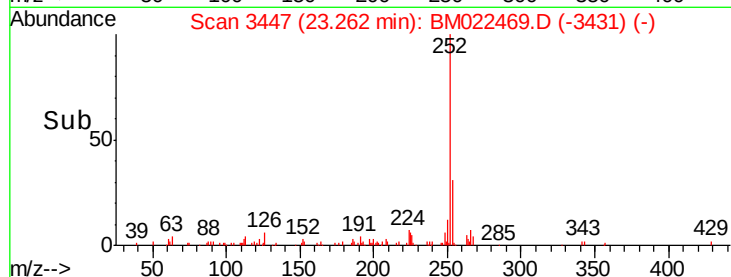
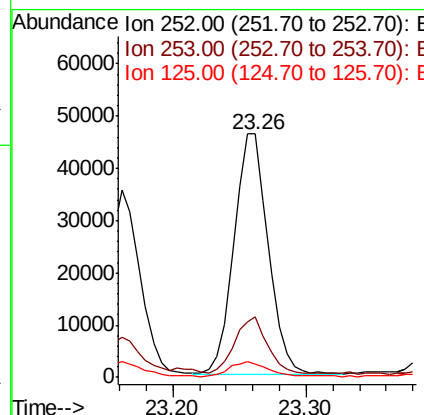
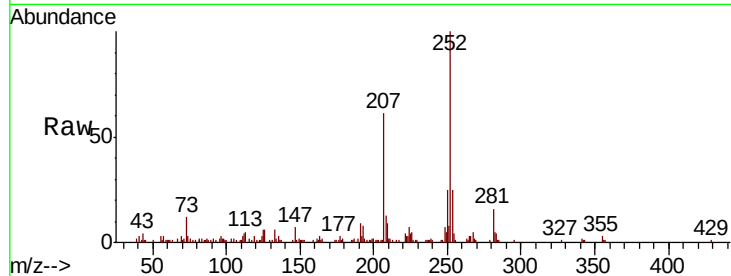
#90  
Benzo(a)pyrene  
Concen: 6.584 ng  
RT: 23.26 min Scan# 3447  
Delta R.T. -0.01 min  
Lab File: BM022469.D  
Acq: 31 Aug 2019 13:10

Instrument :  
BNA\_M  
ClientSampleId :  
SB-36-COMP

| Tot Ion | Ratio | Lower | Upper |
|---------|-------|-------|-------|
| 252     | 100   |       |       |
| 253     | 25.1  | 18.2  | 27.2  |
| 125     | 5.6   | 3.8   | 5.8   |

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#92  
Benzo(g,h,i)perylene  
Concen: 4.668 ng  
RT: 26.20 min Scan# 3947  
Delta R.T. -0.01 min  
Lab File: BM022469.D  
Acq: 31 Aug 2019 13:10

| Tgt Ion | Ratio | Lower | Upper |
|---------|-------|-------|-------|
| 276     | 100   |       |       |
| 277     | 23.3  | 19.4  | 29.0  |
| 138     | 12.3  | 8.8   | 13.2  |

