

Data Path : Z:\SVOASRV\HPCHEM1\BNA\_N\DATA\BN042619\  
 Data File : BN005344.D  
 Acq On : 27 Apr 2019 07:25  
 Operator : JU/SJ  
 Sample : K2456-12  
 Misc :  
 ALS Vial : 27 Sample Multiplier: 1

Instrument :  
 BNA\_N  
 ClientSampleId :  
 GAHQ0

Manual Integrations  
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Sohil  
 4/29/2019 1:44:19 PM

Quant Time: Apr 29 09:43:46 2019  
 Quant Method : Z:\SVOASRV\HPCHEM1\BNA\_N\METHODS\SOM-EPA-BN041919MA.M  
 Quant Title : SVOA CALIBRATION  
 QLast Update : Thu Apr 25 03:19:34 2019  
 Response via : Initial Calibration

| Internal Standards        | R.T.  | QIon | Response | Conc  | Units | Dev(Min) |
|---------------------------|-------|------|----------|-------|-------|----------|
| 1) 1,4-Dichlorobenzene-d4 | 7.59  | 152  | 445695   | 20.00 | ng/ul | 0.00     |
| 18) Naphthalene-d8        | 10.36 | 136  | 1890111  | 20.00 | ng/ul | 0.00     |
| 35) Acenaphthene-d10      | 14.23 | 164  | 1159471  | 20.00 | ng/ul | 0.00     |
| 61) Phenanthrene-d10      | 16.99 | 188  | 2571610  | 20.00 | ng/ul | 0.00     |
| 77) Chrysene-d12          | 21.24 | 240  | 1744714  | 20.00 | ng/ul | 0.01     |
| 85) Perylene-d12          | 23.46 | 264  | 2077602  | 20.00 | ng/ul | 0.02     |

## System Monitoring Compounds

|                                |       |     |         |       |       |      |
|--------------------------------|-------|-----|---------|-------|-------|------|
| 3) 1,4-Dioxane-d8              | 3.22  | 96  | 22979   | 2.49  | ng/uL | 0.00 |
| 5) Phenol-d5                   | 6.78  | 99  | 565661  | 16.16 | ng/ul | 0.00 |
| 7) Bis-(2-Chloroethyl)ether-d  | 6.94  | 67  | 332088  | 15.21 | ng/ul | 0.00 |
| 9) 2-Chlorophenol-d4           | 7.13  | 132 | 463878  | 17.32 | ng/ul | 0.00 |
| 13) 4-Methylphenol-d8          | 8.29  | 113 | 474167  | 17.33 | ng/ul | 0.00 |
| 19) Nitrobenzene-d5            | 8.73  | 128 | 241916  | 20.80 | ng/ul | 0.00 |
| 22) 2-Nitrophenol-d4           | 9.45  | 143 | 270178  | 22.91 | ng/ul | 0.00 |
| 26) 2,4-Dichlorophenol-d3      | 9.98  | 165 | 493987  | 18.27 | ng/ul | 0.00 |
| 29) 4-Chloroaniline-d4         | 10.49 | 131 | 235503m | 8.45  | ng/ul | 0.00 |
| 43) Dimethylphthalate-d6       | 13.65 | 166 | 1487096 | 17.67 | ng/ul | 0.00 |
| 46) Acenaphthylene-d8          | 13.92 | 160 | 1836356 | 17.76 | ng/ul | 0.00 |
| 51) 4-Nitrophenol-d4           | 14.45 | 143 | 270360  | 20.34 | ng/ul | 0.01 |
| 57) Fluorene-d10               | 15.23 | 176 | 1297415 | 18.37 | ng/ul | 0.00 |
| 62) 4,6-Dinitro-2-methylphenol | 15.37 | 200 | 51457   | 4.45  | ng/ul | 0.01 |
| 70) Anthracene-d10             | 17.09 | 188 | 2028969 | 18.82 | ng/ul | 0.00 |
| 78) Pyrene-d10                 | 19.41 | 212 | 1915582 | 21.46 | ng/ul | 0.01 |
| 89) Benzo(a)pyrene-d12         | 23.32 | 264 | 1569512 | 17.29 | ng/ul | 0.01 |

## Target Compounds

|                            |       |     |           |         | Qvalue |    |
|----------------------------|-------|-----|-----------|---------|--------|----|
| 4) Benzaldehyde            | 6.75  | 77  | 27890     | 1.124   | ng/ul# | 52 |
| 14) Acetophenone           | 8.40  | 105 | 148038    | 3.380   | ng/ul  | 98 |
| 28) Naphthalene            | 10.40 | 128 | 88679     | 1.009   | ng/ul# | 81 |
| 34) 2-Methylnaphthalene    | 12.03 | 142 | 473439    | 7.359   | ng/ul  | 98 |
| 44) Dimethylphthalate      | 13.70 | 163 | 408101    | 4.866   | ng/ul  | 96 |
| 47) Acenaphthylene         | 13.96 | 152 | 14040891  | 138.207 | ng/ul  | 95 |
| 49) Acenaphthene           | 14.29 | 153 | 236964    | 3.417   | ng/ul# | 94 |
| 58) Fluorene               | 15.31 | 166 | 1399160   | 17.956  | ng/ul# | 55 |
| 69) Phenanthrene           | 17.03 | 178 | 4161090   | 33.225  | ng/ul  | 99 |
| 71) Anthracene             | 17.13 | 178 | 8786507   | 68.869  | ng/ul  | 99 |
| 74) Carbazole              | 17.40 | 167 | 140514    | 1.282   | ng/ul# | 38 |
| 76) Fluoranthene           | 19.07 | 202 | 11303996  | 81.373  | ng/ul  | 99 |
| 79) Pyrene                 | 19.44 | 202 | 19575261m | 174.255 | ng/ul  |    |
| 82) Benzo(a)anthracene     | 21.22 | 228 | 13727487  | 126.475 | ng/ul# | 77 |
| 84) Chrysene               | 21.28 | 228 | 15078137  | 149.682 | ng/ul# | 91 |
| 87) Benzo(b)fluoranthene   | 22.81 | 252 | 14931956  | 127.856 | ng/ul  | 97 |
| 88) Benzo(k)fluoranthene   | 22.84 | 252 | 5698327m  | 51.088  | ng/ul  |    |
| 90) Benzo(a)pyrene         | 23.38 | 252 | 16232529  | 147.871 | ng/ul  | 95 |
| 91) Indeno(1,2,3-cd)pyrene | 25.67 | 276 | 8298024   | 68.371  | ng/ul  | 96 |
| 92) Dibenzo(a,h)anthracene | 25.67 | 278 | 3329529   | 32.325  | ng/ul  | 95 |
| 93) Benzo(g,h,i)perylene   | 26.35 | 276 | 7096670   | 70.716  | ng/ul  | 95 |

Data Path : Z:\SVOASRV\HPCHEM1\BNA\_N\DATA\BN042619\  
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Operator : JU/SJ  
Sample : K2456-12  
Misc :  
ALS Vial : 27 Sample Multiplier: 1

Instrument :  
BNA\_N  
ClientSampleId :  
GAHQ0

Manual Integrations  
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Quant Time: Apr 29 09:43:46 2019  
Quant Method : Z:\SVOASRV\HPCHEM1\BNA\_N\METHODS\SOM-EPA-BN041919MA.M  
Quant Title : SVOA CALIBRATION  
QLast Update : Thu Apr 25 03:19:34 2019  
Response via : Initial Calibration

| Internal Standards | R.T. | QIon | Response | Conc | Units | Dev(Min) |
|--------------------|------|------|----------|------|-------|----------|
|--------------------|------|------|----------|------|-------|----------|

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

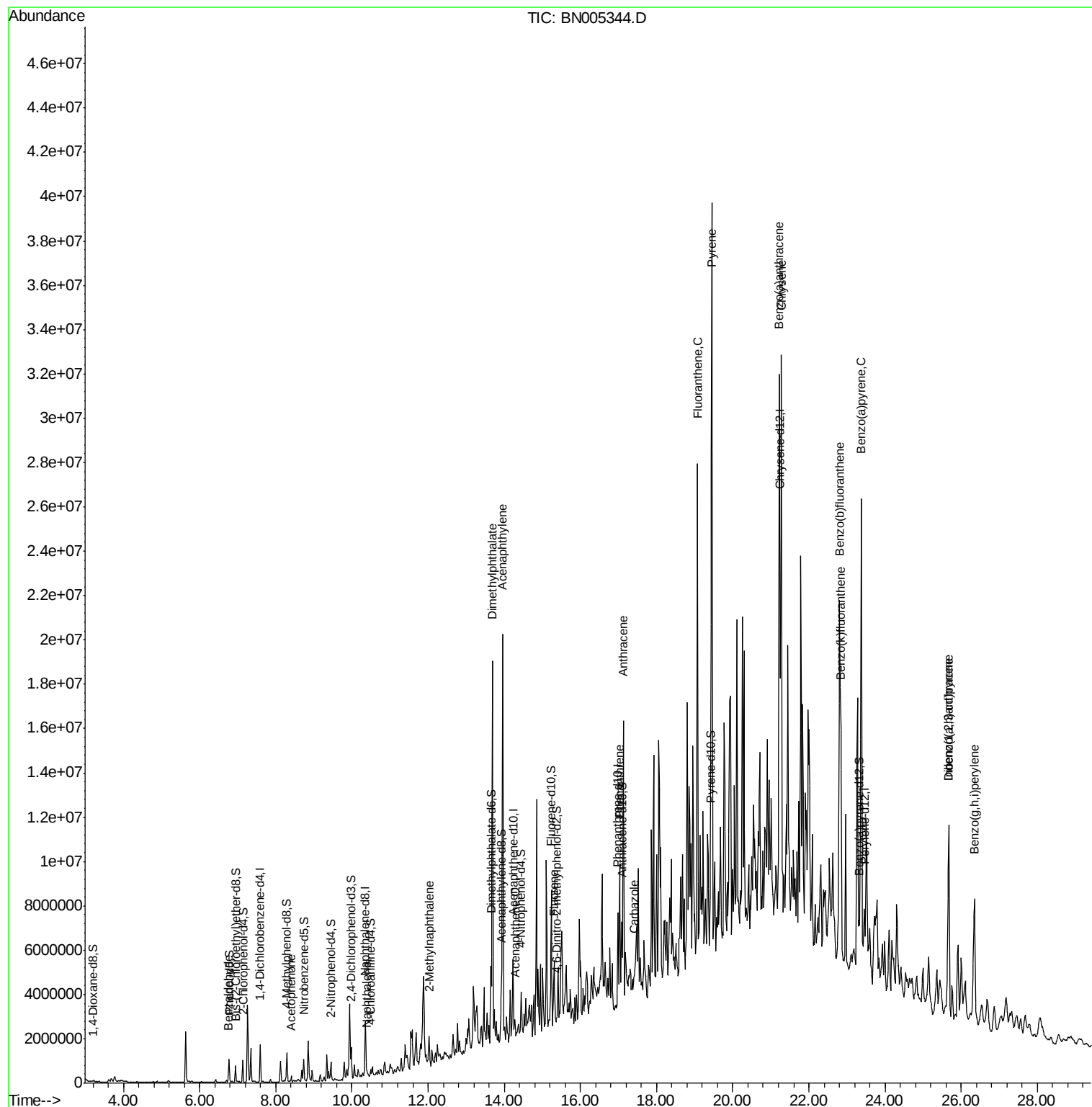
Data Path : Z:\SVOASRV\HPCHEM1\BNA\_N\DATA\BN042619\  
Data File : BN005344.D  
Acq On : 27 Apr 2019 07:25  
Operator : JU/SJ  
Sample : K2456-12  
Misc :  
ALS Vial : 27 Sample Multiplier: 1

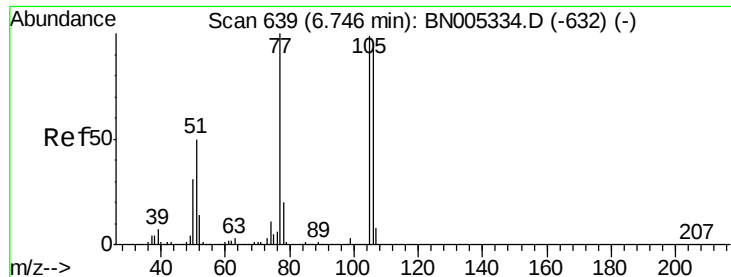
Instrument :  
BNA\_N  
ClientSampleId :  
GAHQ0

Manual Integrations  
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4/29/2019 1:44:19 PM

Quant Time: Apr 29 09:43:46 2019  
Quant Method : Z:\SVOASRV\HPCHEM1\BNA\_N\METHODS\SOM-EPA-BN041919MA.M  
Quant Title : SVOA CALIBRATION  
QLast Update : Thu Apr 25 03:19:34 2019  
Response via : Initial Calibration





#4

Benzaldehyde

Concen: 1.124 ng/ul

RT: 6.75 min Scan# 640

Delta R.T. 0.00 min

Lab File: BN005344.D

Acq: 27 Apr 2019 07:25

Instrument :

BNA\_N

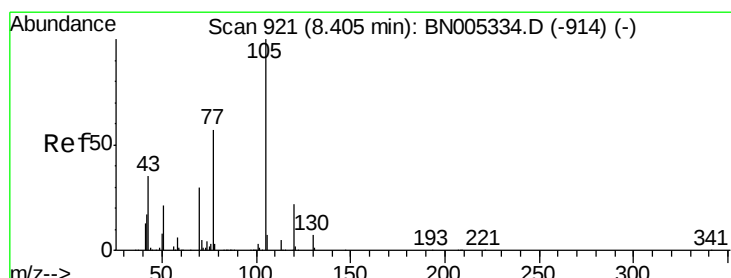
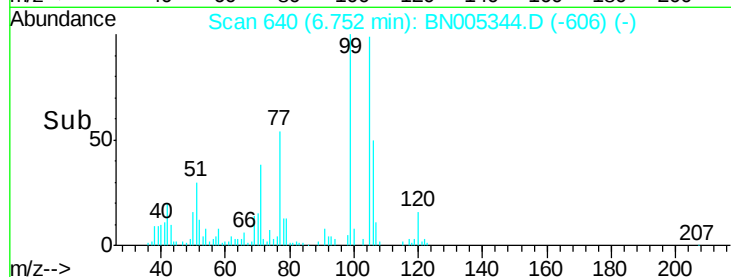
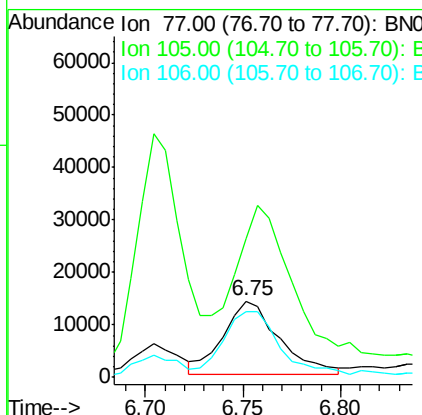
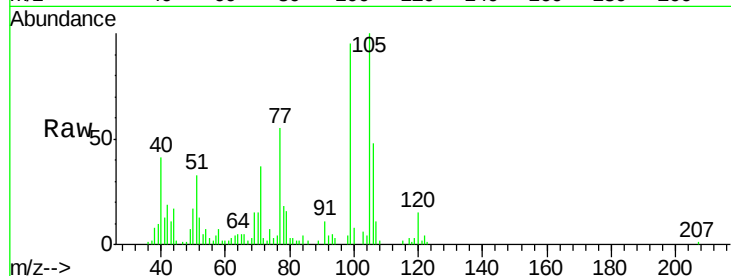
ClientSampled :

GAHQ0

|           |       |       |        |
|-----------|-------|-------|--------|
| Tgt Ion:  | 77    | Resp: | 27890  |
| Ion Ratio | Lower | Upper |        |
| 77        | 100   |       |        |
| 105       | 181.5 | 77.4  | 116.2# |
| 106       | 86.3  | 76.3  | 114.5  |

Manual Integrations  
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#14

Acetophenone

Concen: 3.380 ng/ul

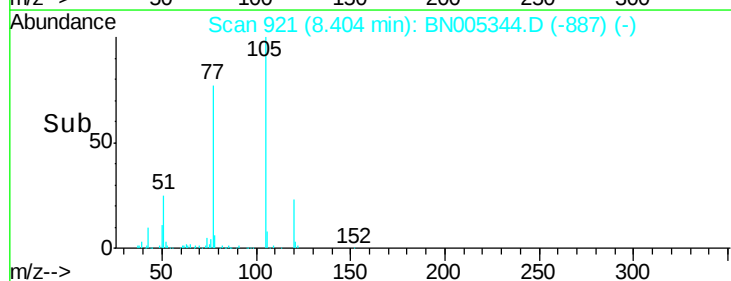
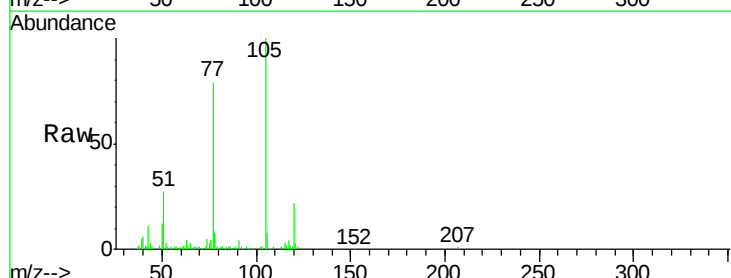
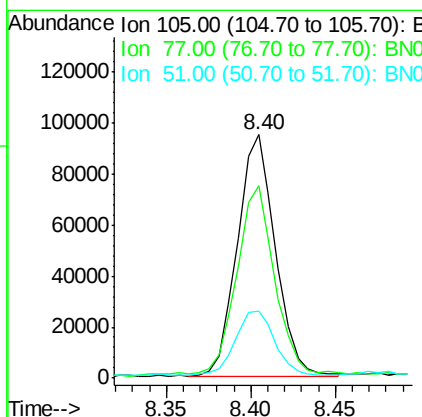
RT: 8.40 min Scan# 921

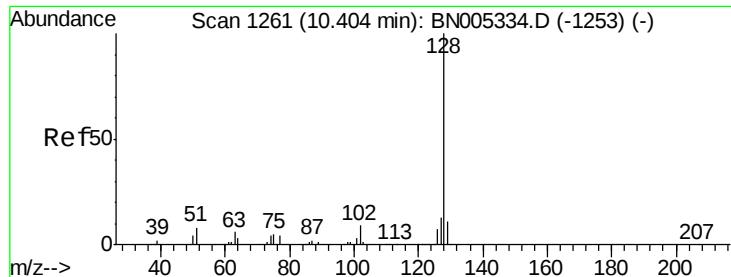
Delta R.T. 0.00 min

Lab File: BN005344.D

Acq: 27 Apr 2019 07:25

|           |       |       |        |
|-----------|-------|-------|--------|
| Tgt Ion:  | 105   | Resp: | 148038 |
| Ion Ratio | Lower | Upper |        |
| 105       | 100   |       |        |
| 77        | 78.8  | 63.4  | 95.0   |
| 51        | 27.3  | 24.2  | 36.4   |





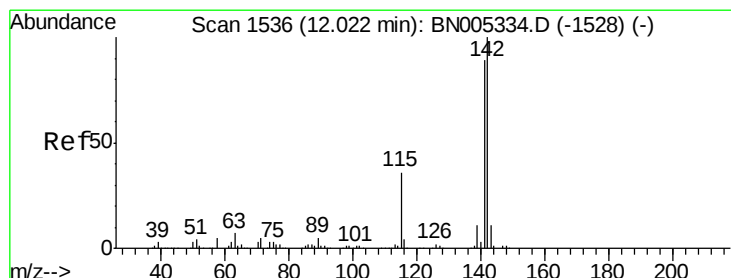
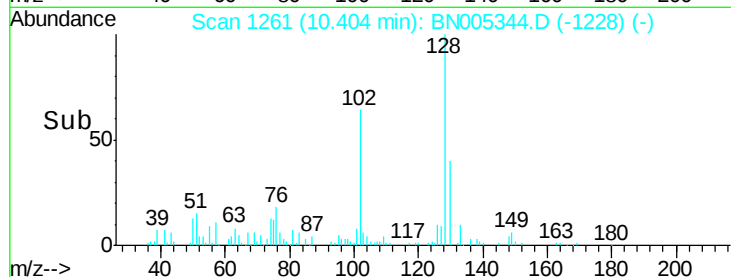
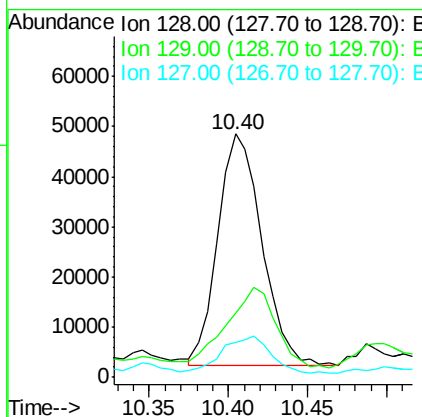
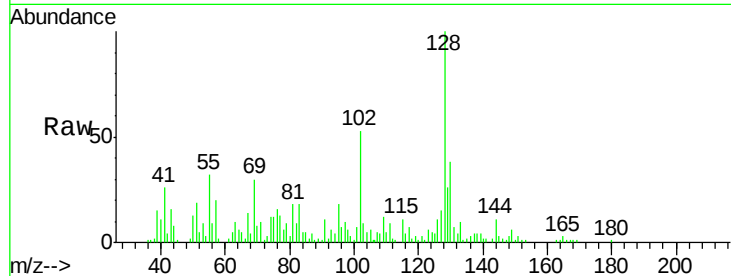
#28  
Naphthalene  
Concen: 1.009 ng/ul  
RT: 10.40 min Scan# 1261  
Delta R.T. -0.01 min  
Lab File: BN005344.D  
Acq: 27 Apr 2019 07:25

Instrument :  
BNA\_N  
ClientSampleId :  
GAHQ0

| Tgt Ion | Ratio | Lower | Upper |
|---------|-------|-------|-------|
| 128     | 100   |       |       |
| 129     | 26.2  | 9.2   | 13.8# |
| 127     | 14.6  | 10.7  | 16.1  |

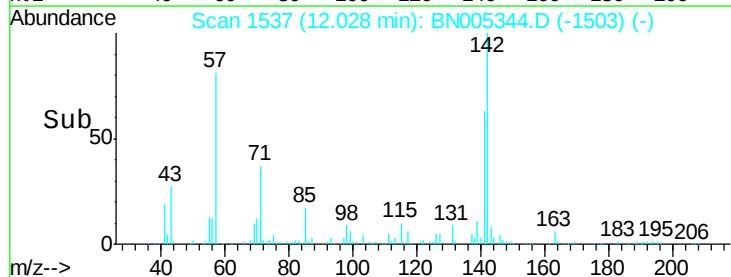
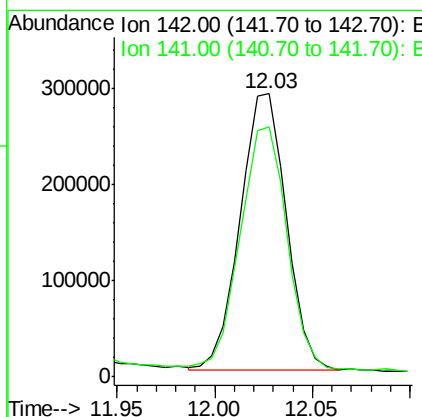
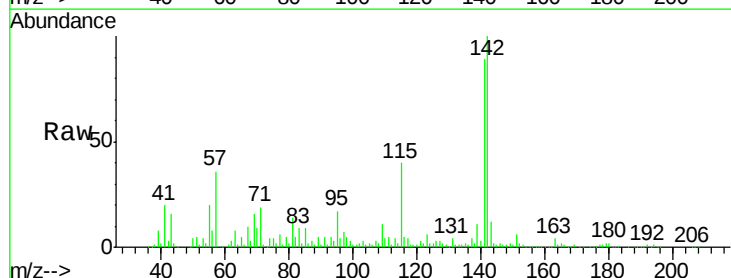
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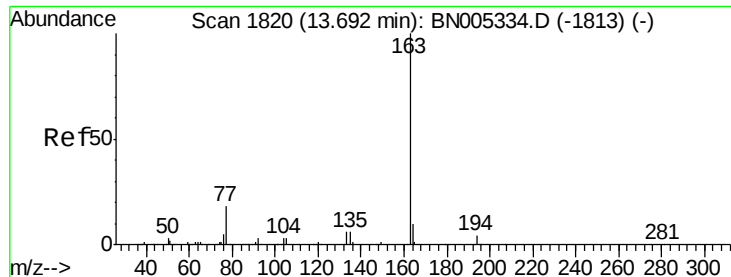
Sohil  
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#34  
2-Methylnaphthalene  
Concen: 7.359 ng/ul  
RT: 12.03 min Scan# 1537  
Delta R.T. 0.00 min  
Lab File: BN005344.D  
Acq: 27 Apr 2019 07:25

| Tgt Ion | Ratio | Lower | Upper |
|---------|-------|-------|-------|
| 142     | 100   |       |       |
| 141     | 88.6  | 72.0  | 108.0 |





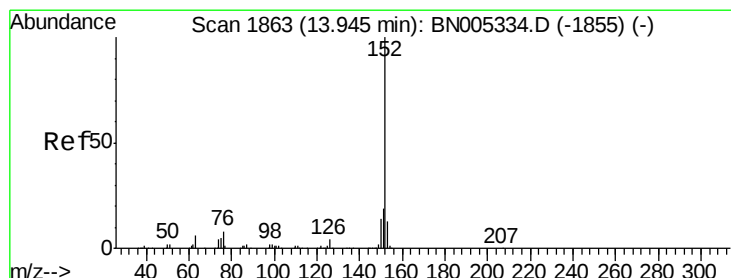
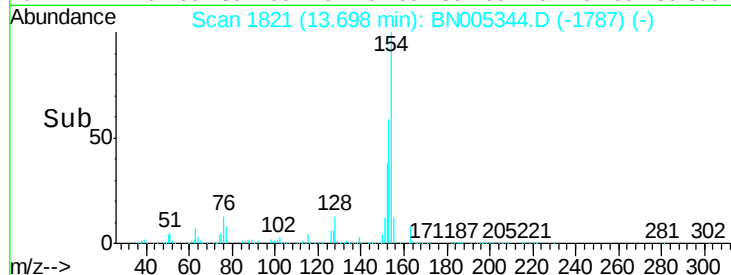
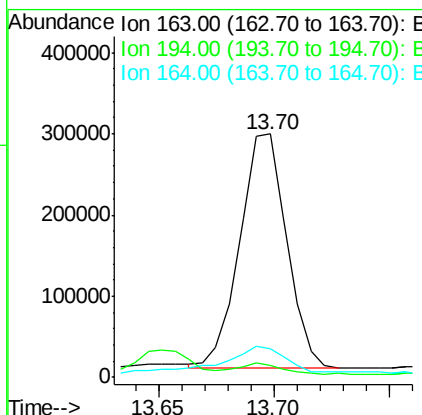
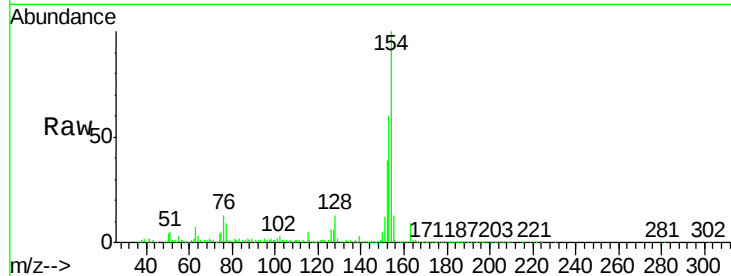
#44  
Dimethylphthalate  
Concen: 4.866 ng/ul  
RT: 13.70 min Scan# 1821  
Delta R.T. 0.00 min  
Lab File: BN005344.D  
Acq: 27 Apr 2019 07:25

Instrument :  
BNA\_N  
ClientSampleId :  
GAHQ0

| Tgt Ion | Ratio | Resp   | Lower | Upper |
|---------|-------|--------|-------|-------|
| 163     | 100   | 408101 |       |       |
| 194     | 4.9   | 3.4    | 5.0   |       |
| 164     | 11.6  | 8.1    | 12.1  |       |

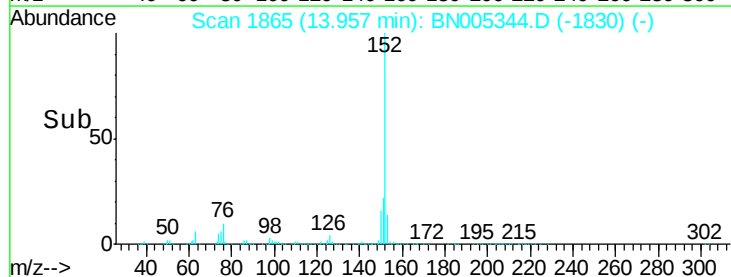
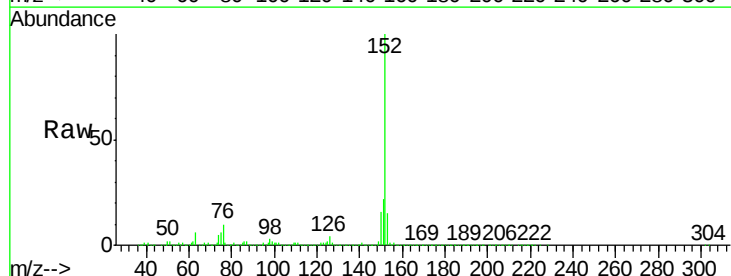
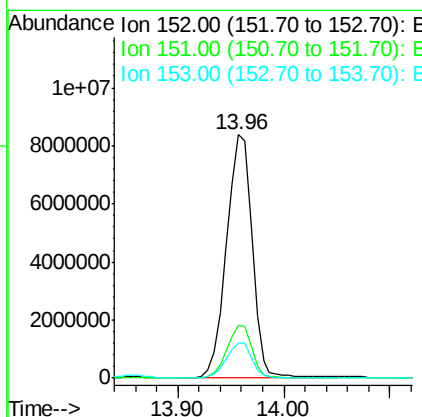
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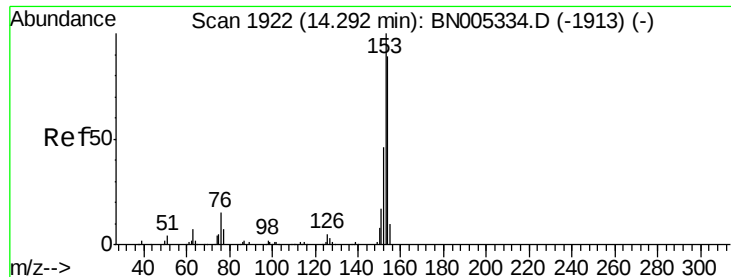
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#47  
Acenaphthylene  
Concen: 138.207 ng/ul  
RT: 13.96 min Scan# 1865  
Delta R.T. 0.01 min  
Lab File: BN005344.D  
Acq: 27 Apr 2019 07:25

| Tgt Ion | Ratio | Resp     | Lower | Upper |
|---------|-------|----------|-------|-------|
| 152     | 100   | 14040891 |       |       |
| 151     | 21.9  | 15.8     | 23.8  |       |
| 153     | 14.6  | 9.8      | 14.8  |       |





#49

Acenaphthene

Concen: 3.417 ng/ul

RT: 14.29 min Scan# 1922

Delta R.T. -0.01 min

Lab File: BN005344.D

Acq: 27 Apr 2019 07:25

Instrument :

BNA\_N

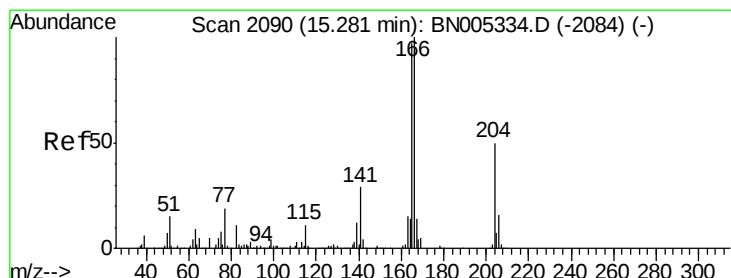
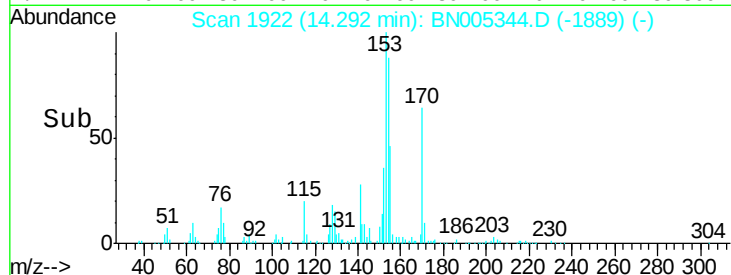
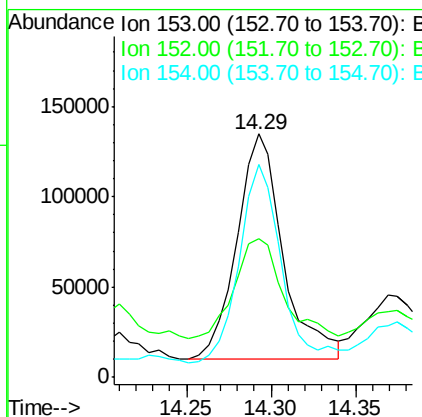
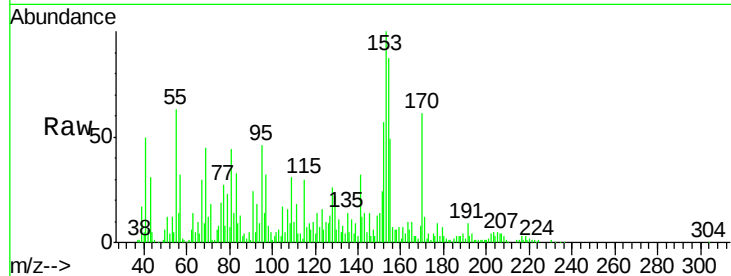
ClientSampleId :

GAHQ0

|           |       |       |        |
|-----------|-------|-------|--------|
| Tgt Ion:  | 153   | Resp: | 236964 |
| Ion Ratio | Lower | Upper |        |
| 153       | 100   |       |        |
| 152       | 57.0  | 37.4  | 56.0#  |
| 154       | 87.5  | 71.2  | 106.8  |

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#58

Fluorene

Concen: 17.956 ng/ul

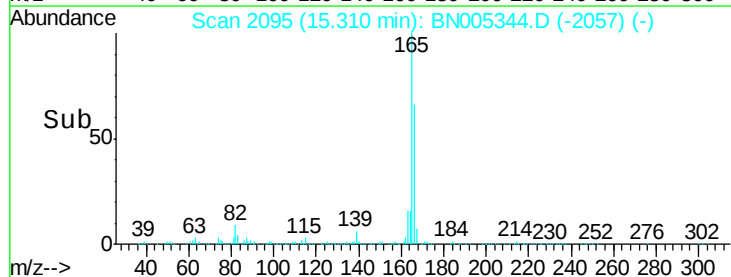
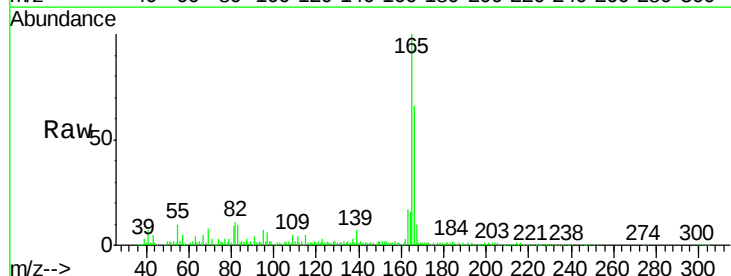
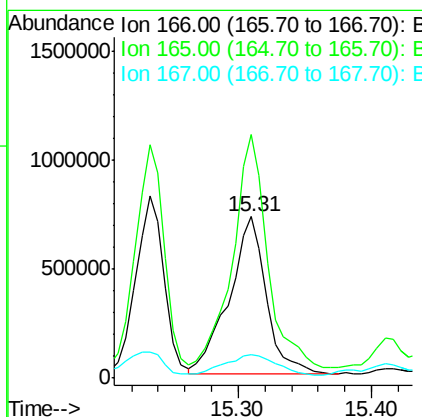
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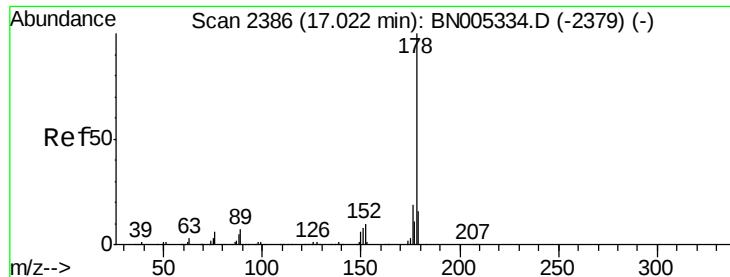
Delta R.T. 0.02 min

Lab File: BN005344.D

Acq: 27 Apr 2019 07:25

|           |       |       |         |
|-----------|-------|-------|---------|
| Tgt Ion:  | 166   | Resp: | 1399160 |
| Ion Ratio | Lower | Upper |         |
| 166       | 100   |       |         |
| 165       | 150.9 | 80.0  | 120.0#  |
| 167       | 14.6  | 10.7  | 16.1    |





#69

Phenanthrene

Concen: 33.225 ng/ul

RT: 17.03 min Scan# 2388

Delta R.T. 0.01 min

Lab File: BN005344.D

Acq: 27 Apr 2019 07:25

Instrument :

BNA\_N

ClientSampleId :

GAHQ0

Tgt Ion:178 Resp: 4161090

Ion Ratio Lower Upper

178 100

179 16.7 12.2 18.4

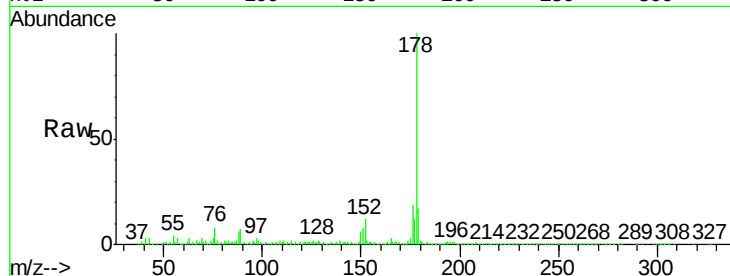
176 18.9 15.1 22.7

Manual Integrations

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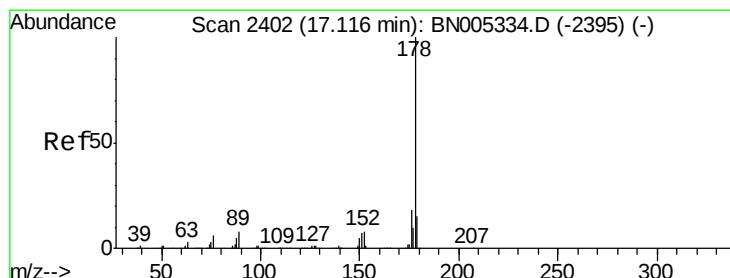
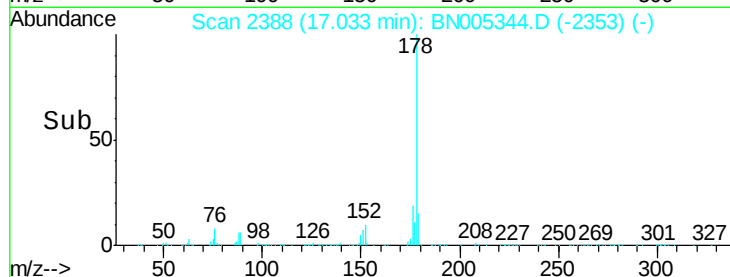
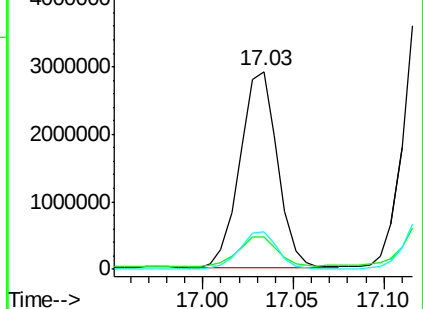
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Abundance Ion 178.00 (177.70 to 178.70): E

Ion 179.00 (178.70 to 179.70): E

Ion 176.00 (175.70 to 176.70): E



#71

Anthracene

Concen: 68.869 ng/ul

RT: 17.13 min Scan# 2404

Delta R.T. 0.01 min

Lab File: BN005344.D

Acq: 27 Apr 2019 07:25

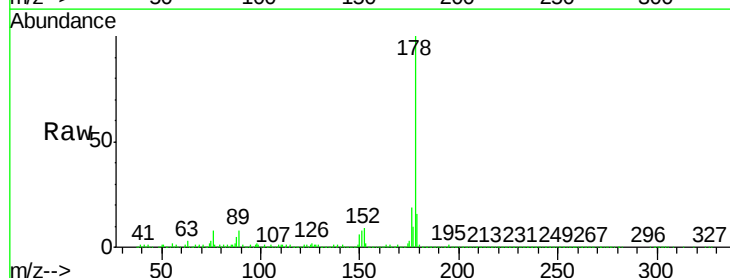
Tgt Ion:178 Resp: 8786507

Ion Ratio Lower Upper

178 100

179 16.5 12.3 18.5

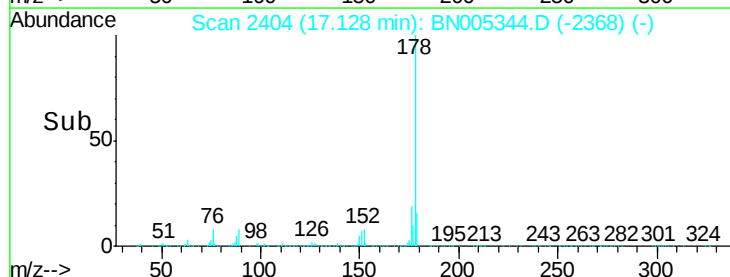
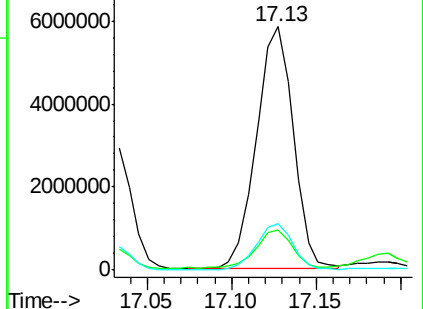
176 19.1 15.1 22.7

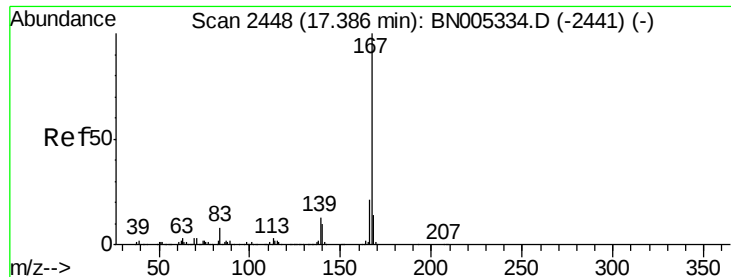


Abundance Ion 178.00 (177.70 to 178.70): E

Ion 179.00 (178.70 to 179.70): E

Ion 176.00 (175.70 to 176.70): E





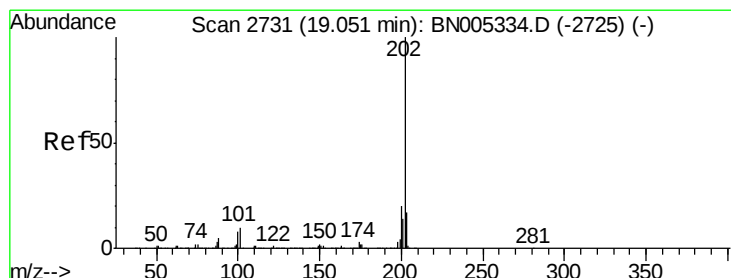
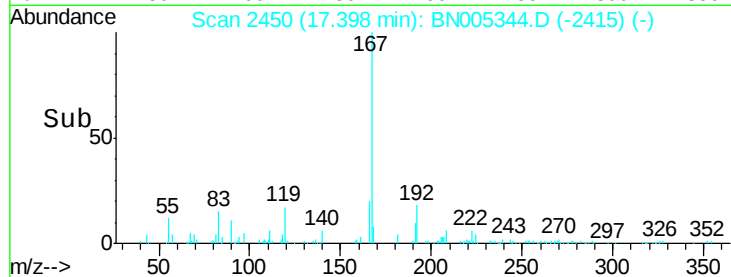
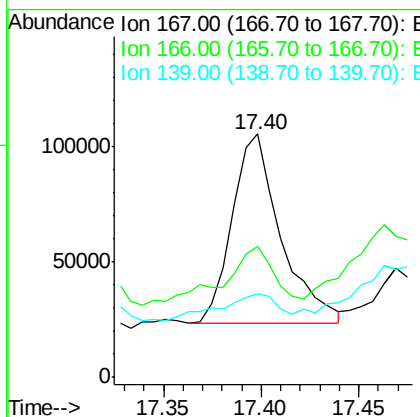
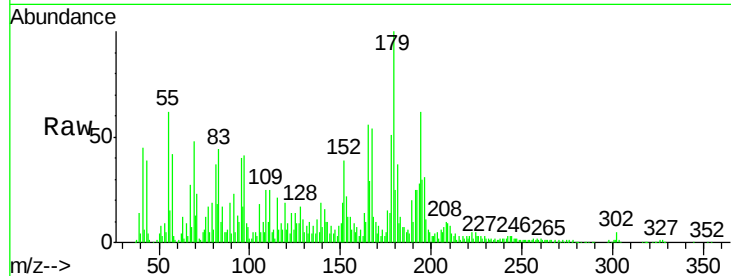
#74  
 Carbazole  
 Concen: 1.282 ng/ul  
 RT: 17.40 min Scan# 2450  
 Delta R.T. 0.01 min  
 Lab File: BN005344.D  
 Acq: 27 Apr 2019 07:25

Instrument :  
 BNA\_N  
 ClientSampled :  
 GAHQ0

| Tgt Ion | Ratio | Lower | Upper |
|---------|-------|-------|-------|
| 167     | 100   |       |       |
| 166     | 53.6  | 17.2  | 25.8# |
| 139     | 34.6  | 10.6  | 16.0# |

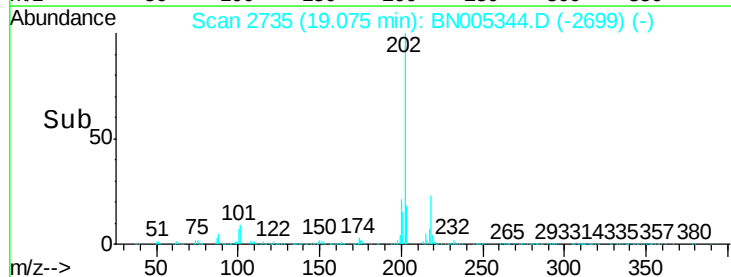
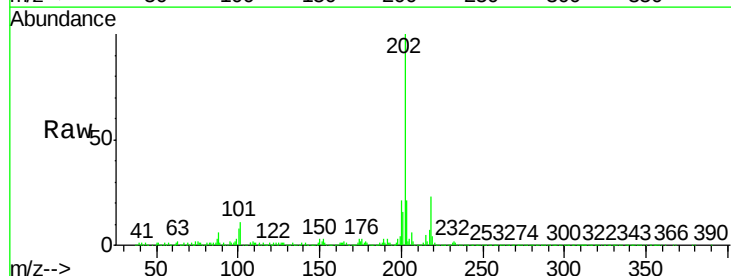
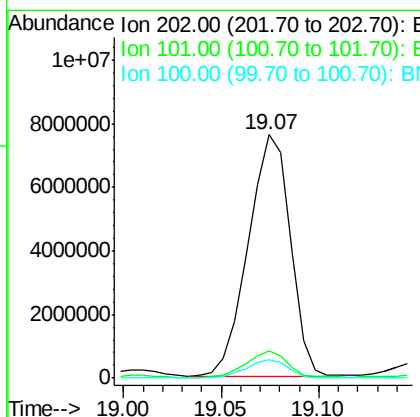
Manual Integrations  
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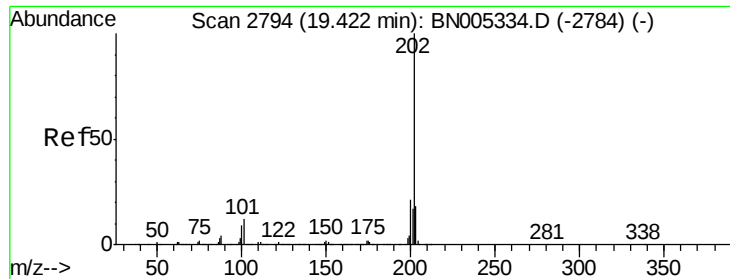
Sohil  
 4/29/2019 1:44:19 PM



#76  
 Fluoranthene  
 Concen: 81.373 ng/ul  
 RT: 19.07 min Scan# 2735  
 Delta R.T. 0.01 min  
 Lab File: BN005344.D  
 Acq: 27 Apr 2019 07:25

| Tgt Ion | Ratio | Lower | Upper |
|---------|-------|-------|-------|
| 202     | 100   |       |       |
| 101     | 11.1  | 8.6   | 12.8  |
| 100     | 7.6   | 6.3   | 9.5   |





#79

Pyrene

Concen: 174.255 ng/ul m

RT: 19.44 min Scan# 2797

Delta R.T. 0.01 min

Lab File: BN005344.D

Acq: 27 Apr 2019 07:25

Instrument :

BNA\_N

ClientSampleId :

GAHQ0

Tgt Ion:202 Resp:19575261

Ion Ratio Lower Upper

202 100

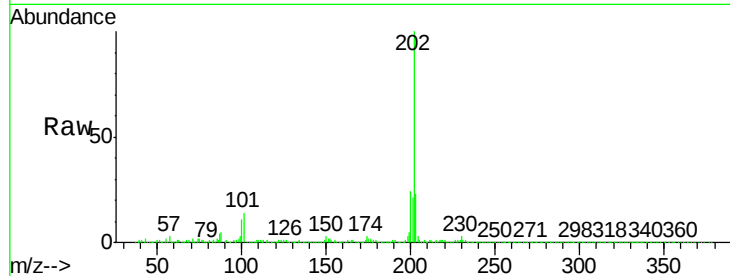
101 14.0 10.3 15.5

100 11.4 7.9 11.9

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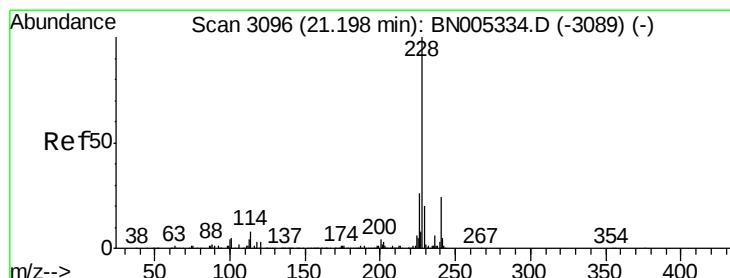
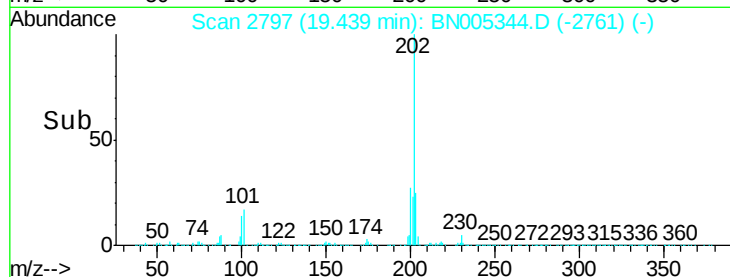
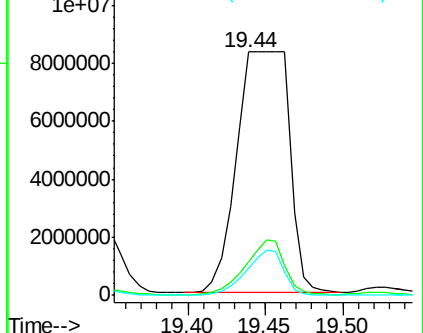
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Abundance Ion 202.00 (201.70 to 202.70): E

Ion 101.00 (100.70 to 101.70): E

Ion 100.00 (99.70 to 100.70): B



#82

Benzo(a)anthracene

Concen: 126.475 ng/ul

RT: 21.22 min Scan# 3100

Delta R.T. 0.01 min

Lab File: BN005344.D

Acq: 27 Apr 2019 07:25

Tgt Ion:228 Resp:13727487

Ion Ratio Lower Upper

228 100

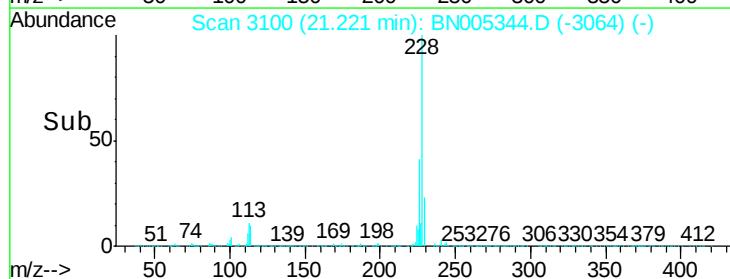
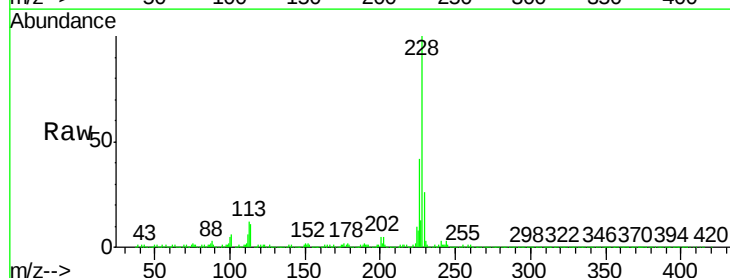
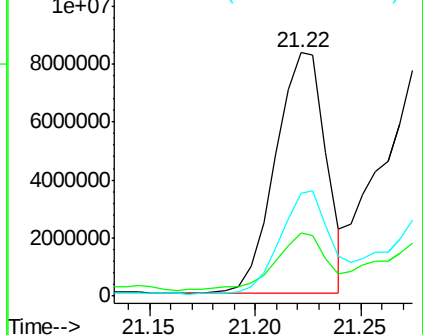
229 26.0 15.8 23.6#

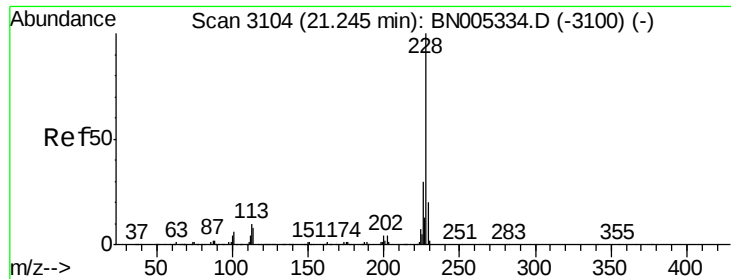
226 42.4 21.4 32.2#

Abundance Ion 228.00 (227.70 to 228.70): E

Ion 229.00 (228.70 to 229.70): E

Ion 226.00 (225.70 to 226.70): E





#84

Chrysene

Concen: 149.682 ng/ul

RT: 21.28 min Scan# 3110

Delta R.T. 0.02 min

Lab File: BN005344.D

Acq: 27 Apr 2019 07:25

Instrument :

BNA\_N

ClientSampled :

GAHQ0

Tgt Ion:228 Resp:15078137

Ion Ratio Lower Upper

228 100

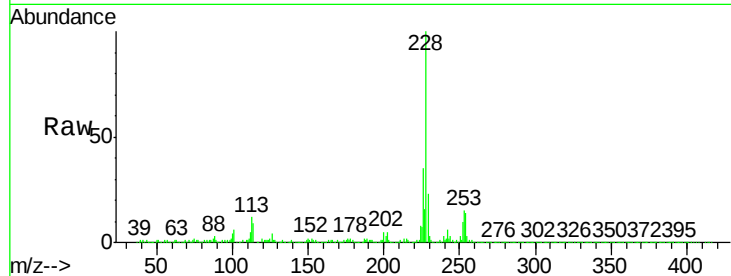
226 34.6 24.0 36.0

229 23.4 15.4 23.0#

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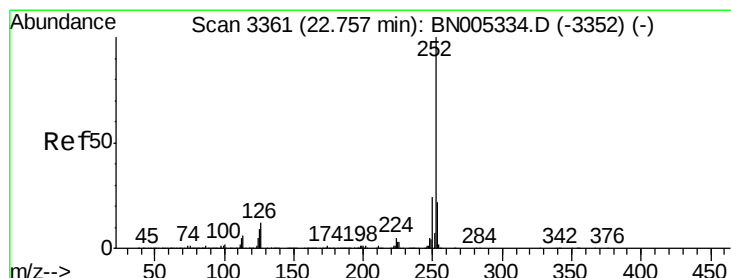
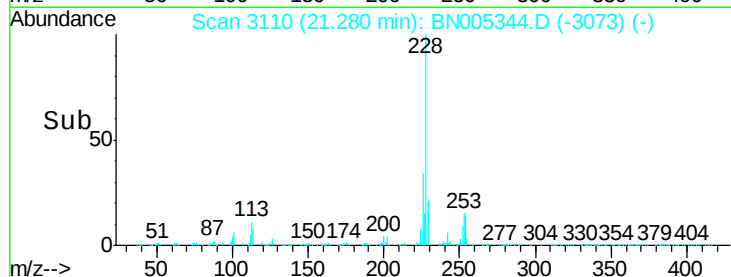
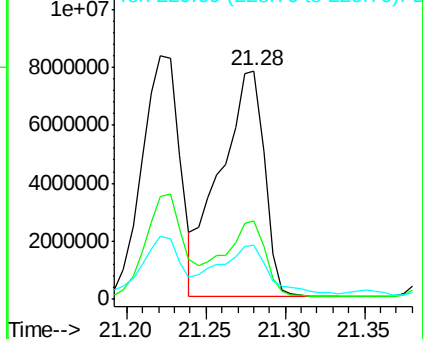
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Abundance Ion 228.00 (227.70 to 228.70): E

Ion 226.00 (225.70 to 226.70): E

Ion 229.00 (228.70 to 229.70): E



#87

Benzo(b)fluoranthene

Concen: 127.856 ng/ul

RT: 22.81 min Scan# 3370

Delta R.T. 0.02 min

Lab File: BN005344.D

Acq: 27 Apr 2019 07:25

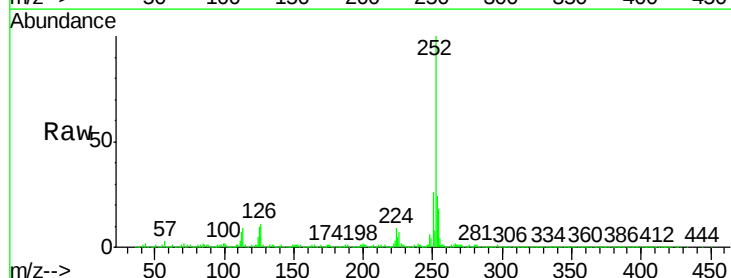
Tgt Ion:252 Resp:14931956

Ion Ratio Lower Upper

252 100

253 24.0 17.7 26.5

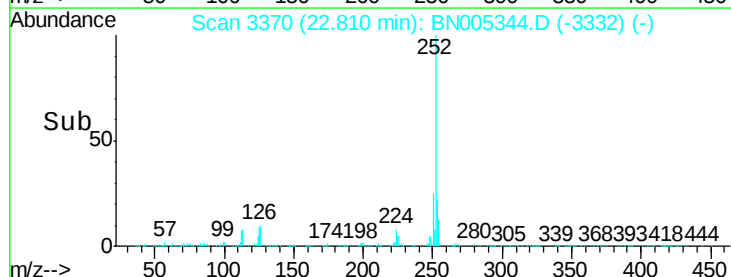
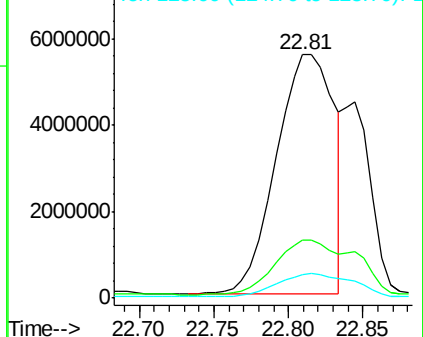
125 9.7 8.4 12.6

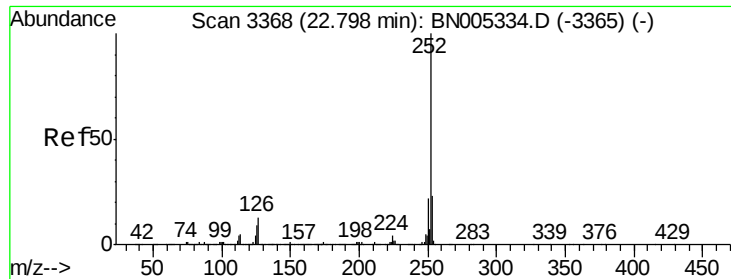


Abundance Ion 252.00 (251.70 to 252.70): E

Ion 253.00 (252.70 to 253.70): E

Ion 125.00 (124.70 to 125.70): E





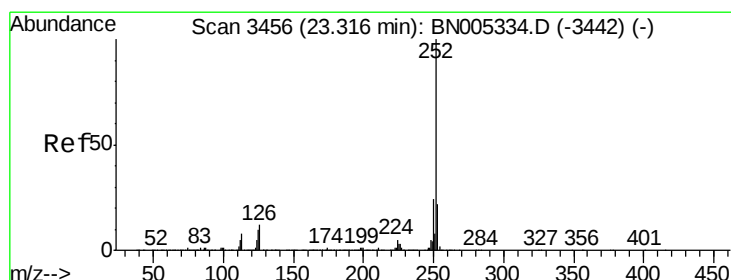
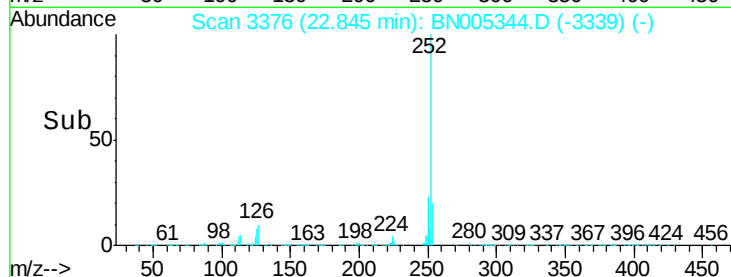
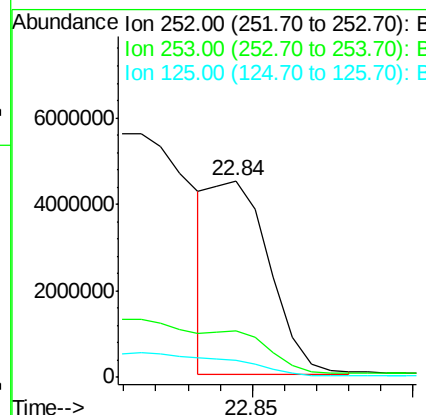
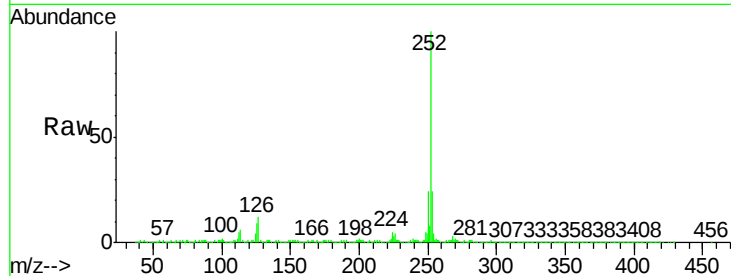
#88  
Benzo(k)fluoranthene  
Concen: 51.088 ng/ul m  
RT: 22.84 min Scan# 3376  
Delta R.T. 0.02 min  
Lab File: BN005344.D  
Acq: 27 Apr 2019 07:25

Instrument :  
BNA\_N  
ClientSampleId :  
GAHQ0

Tgt Ion:252 Resp: 5698327  
Ion Ratio Lower Upper  
252 100  
253 23.5 17.4 26.0  
125 8.8 7.5 11.3

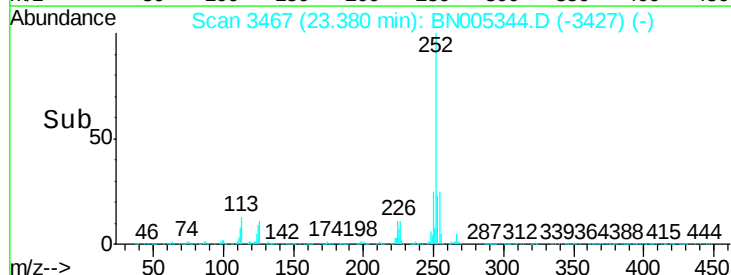
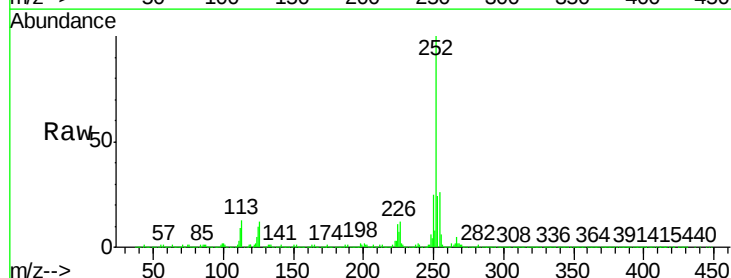
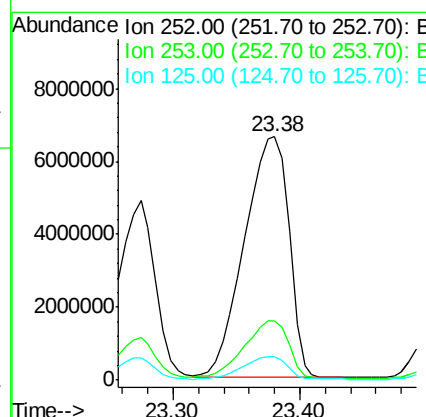
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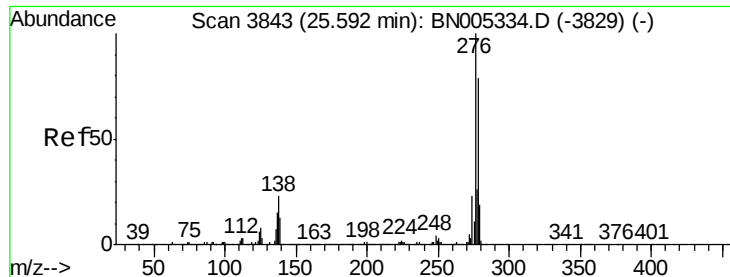
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#90  
Benzo(a)pyrene  
Concen: 147.871 ng/ul  
RT: 23.38 min Scan# 3467  
Delta R.T. 0.04 min  
Lab File: BN005344.D  
Acq: 27 Apr 2019 07:25

Tgt Ion:252 Resp:16232529  
Ion Ratio Lower Upper  
252 100  
253 24.3 17.3 25.9  
125 9.8 8.6 13.0





#91

Indeno(1,2,3-cd)pyrene

Concen: 68.371 ng/ul

RT: 25.67 min Scan# 3857

Delta R.T. 0.05 min

Lab File: BN005344.D

Acq: 27 Apr 2019 07:25

Instrument :

BNA\_N

ClientSampleId :

GAHQ0

Tgt Ion:276 Resp: 8298024

Ion Ratio Lower Upper

276 100

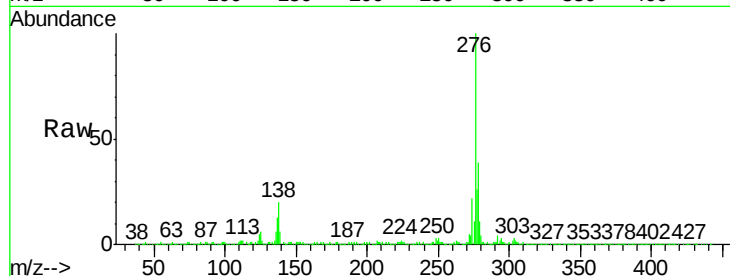
138 19.8 17.9 26.9

277 25.6 19.7 29.5

Manual Integrations  
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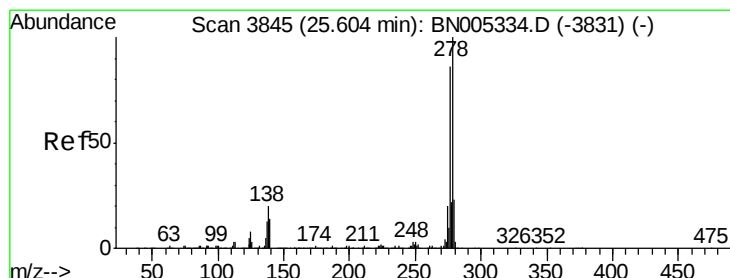
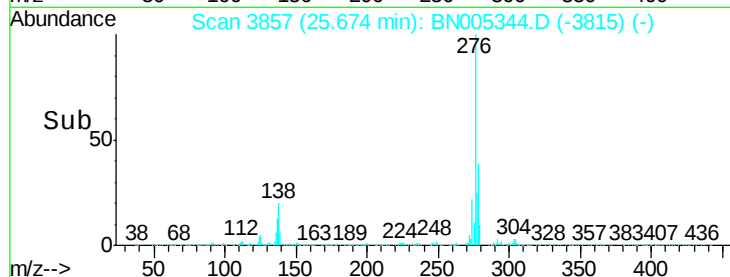
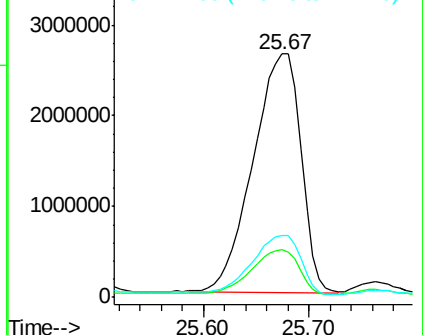
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Abundance Ion 276.00 (275.70 to 276.70): E

Ion 138.00 (137.70 to 138.70): E

Ion 277.00 (276.70 to 277.70): E



#92

Dibenzo(a,h)anthracene

Concen: 32.325 ng/ul

RT: 25.67 min Scan# 3857

Delta R.T. 0.04 min

Lab File: BN005344.D

Acq: 27 Apr 2019 07:25

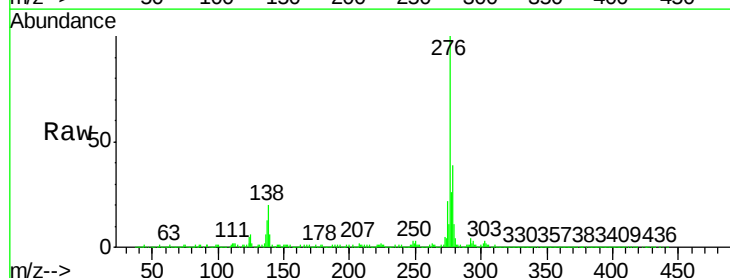
Tgt Ion:278 Resp: 3329529

Ion Ratio Lower Upper

278 100

139 16.0 13.1 19.7

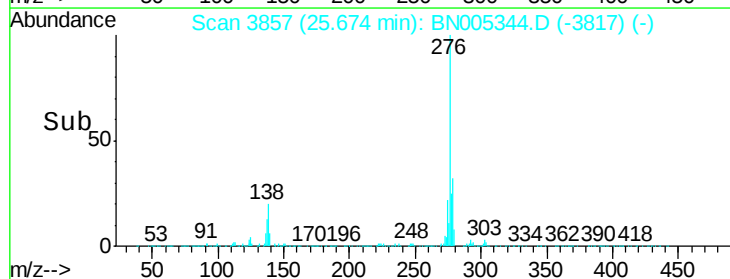
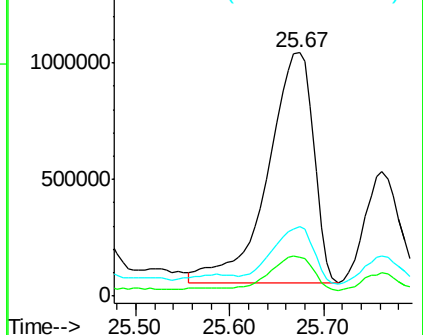
279 28.4 19.4 29.0

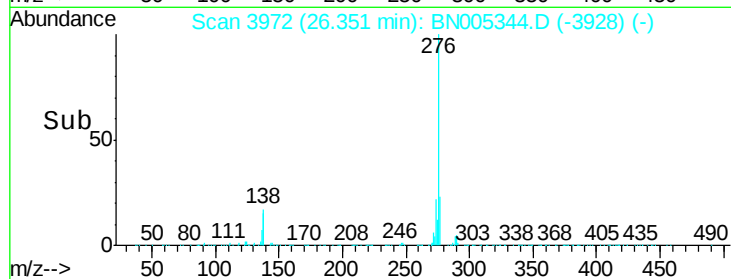
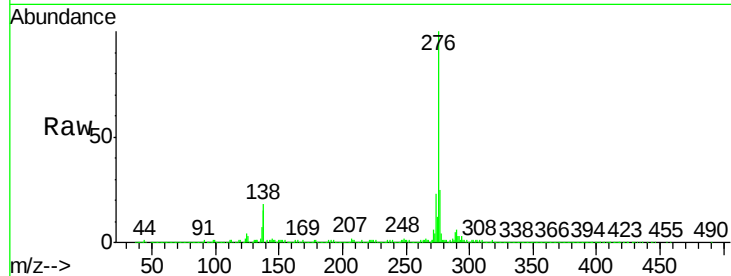
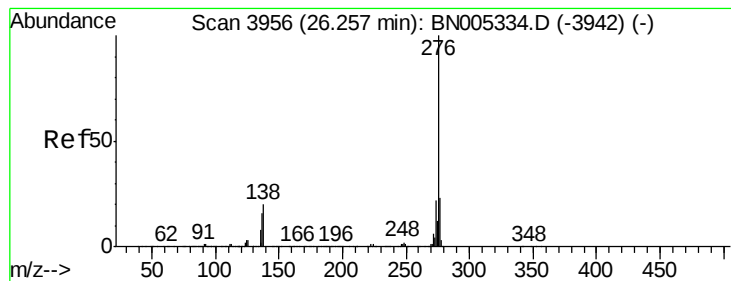


Abundance Ion 278.00 (277.70 to 278.70): E

Ion 139.00 (138.70 to 139.70): E

Ion 279.00 (278.70 to 279.70): E





#93

Benzo(g,h,i)perylene

Concen: 70.716 ng/ul

RT: 26.35 min Scan# 3972

Delta R.T. 0.06 min

Lab File: BN005344.D

Acq: 27 Apr 2019 07:25

Instrument :

BNA\_N

ClientSampleId :

GAHQ0

Tgt Ion:276 Resp: 7096670

Ion Ratio Lower Upper

276 100

138 18.2 16.7 25.1

277 24.6 18.2 27.2

Manual Integrations

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