Quantitation Report (QT Reviewed)

Data Path : Z:\HPCHEM1\BNA_E\DATA\BE102214\
Data File : BE088187.D
Acq On : 22 Oct 2014 18:14
Operator : TP/JJ
Sample : F4337-02MS
Misc :
ALS Vial : 9 Sample Multiplier: 1

**Instrument :**
BNA_E
**ClientSampleId :**
YS19-SB21-1014MS

**Manual Integrations APPROVED**
mohammad
10/28/2014 12:06:49 PM

Quant Time: Oct 27 04:29:41 2014
Quant Method : Z:\HPCHEM1\BNA_E\METHODS\SIM-PAH-BE102014.M
Quant Title : ASP BNA STANDARDS FOR 5 POINT CALIBRATION
QLast Update : Tue Oct 21 02:11:14 2014
Response via : Initial Calibration

| Internal Standards | R.T. | QIon | Response | Conc | Units | Dev(Min) |
|---|---|---|---|---|---|---|
| 1) 1,4-Dichlorobenzene-d4 | 7.14 | 152 | 27953 | 5.00 | ng | 0.00 |
| 3) Naphthalene-d8 | 8.70 | 136 | 111693 | 5.00 | ng | 0.00 |
| 7) Acenaphthene-d10 | 10.85 | 164 | 58727 | 5.00 | ng | 0.00 |
| 12) Phenanthrene-d10 | 12.97 | 188 | 110466 | 5.00 | ng | 0.00 |
| 16) Chrysene-d12 | 18.39 | 240 | 57570 | 5.00 | ng | 0.00 |
| 22) Perylene-d12 | 21.44 | 264 | 56167 | 5.00 | ng | 0.00 |
| **System Monitoring Compounds** | | | | | | |
| 4) Nitrobenzene-d5 | 7.83 | 82 | 52764 | 6.55 | ng | 0.00 |
| 8) 2-Fluorobiphenyl | 10.04 | 172 | 103489 | 6.38 | ng | 0.00 |
| 18) Terphenyl-d14 | 16.15 | 244 | 81559 | 8.80 | ng | 0.00 |
| **Target Compounds** | | | | | | Qvalue |
| 2) 1,4-Dioxane | 2.31 | 88 | 20326 | 5.05 | ng | 98 |
| 5) Naphthalene | 8.72 | 128 | 129150 | 5.61 | ng | 98 |
| 6) 2-Methylnaphthalene | 9.57 | 142 | 84603 | 6.14 | ng | 95 |
| 9) Acenaphthylene | 10.67 | 152 | 467317 | 5.22 | ng | 100 |
| 10) Acenaphthene | 10.88 | 154 | 70351 | 5.09 | ng | 99 |
| 11) Fluorene | 11.55 | 166 | 79308 | 5.42 | ng | 99 |
| 13) Phenanthrene | 13.01 | 178 | 479041 | 5.92 | ng | 95 |
| 14) Anthracene | 13.09 | 178 | 450318 | 5.22 | ng | 99 |
| 15) Fluoranthene | 15.25 | 202 | 108991 | 5.19 | ng | 99 |
| 17) Pyrene | 15.70 | 202 | 107720 | 6.88 | ng | 99 |
| 19) Benzo(a)anthracene | 18.36 | 228 | 284197 | 5.55 | ng | 100 |
| 20) Chrysene | 18.44 | 228 | 277003 | 5.51 | ng | 100 |
| 21) Indeno(1,2,3-cd)pyrene | 23.64 | 276 | 321352m | 5.76 | ng | |
| 23) Benzo(b)fluoranthene | 20.69 | 252 | 70159 | 5.25 | ng | 99 |
| 24) Benzo(k)fluoranthene | 20.75 | 252 | 73226 | 5.12 | ng | 99 |
| 25) Benzo(a)pyrene | 21.33 | 252 | 69582 | 5.65 | ng | 99 |
| 26) Dibenzo(a,h)anthracene | 23.74 | 278 | 62123 | 5.14 | ng | 97 |
| 27) Benzo(g,h,i)perylene | 24.27 | 276 | 292251 | 5.47 | ng | 98 |

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

Quantitation Report (QT Reviewed)

Data Path : Z:\HPCHEM1\BNA_E\DATA\BE102214\
Data File : BE088187.D
Acq On : 22 Oct 2014 18:14
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Misc :
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**Instrument :**
BNA_E
**ClientSampleId :**
YS19-SB21-1014MS

**Manual Integrations APPROVED**
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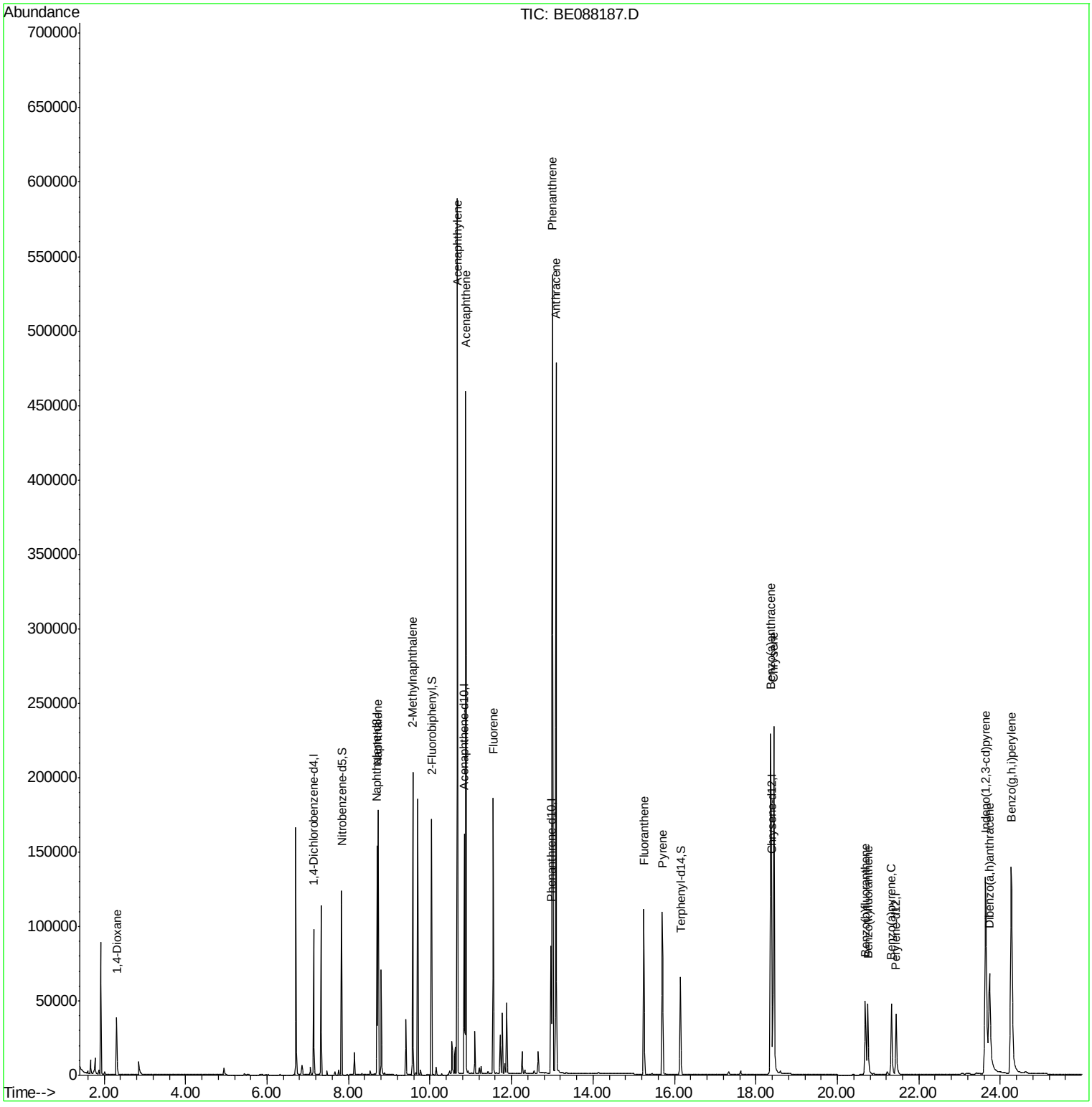
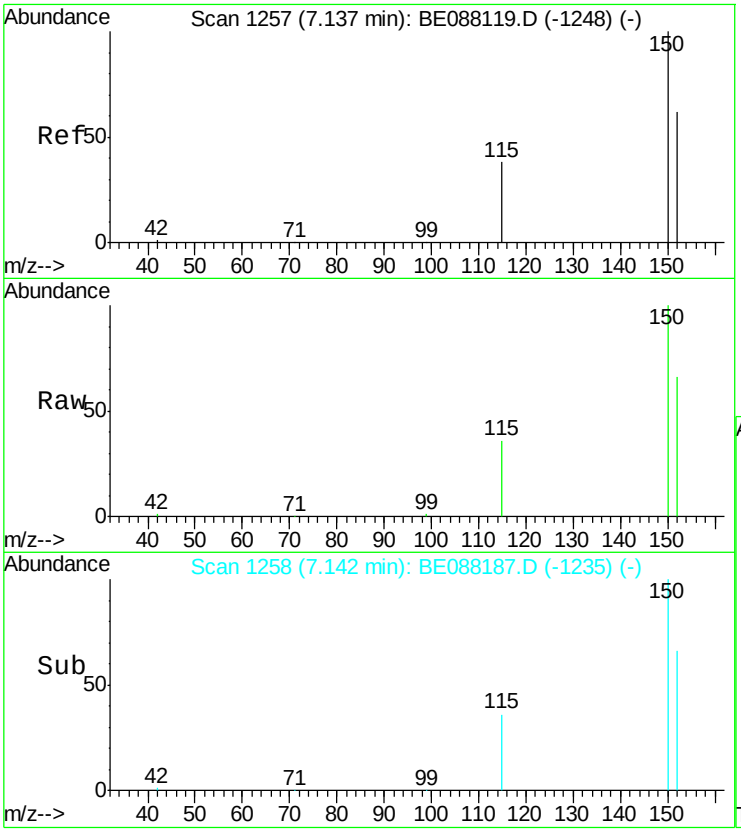
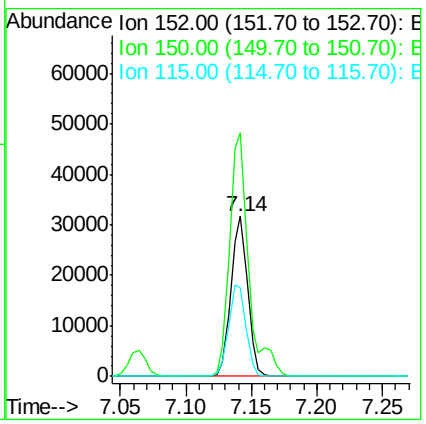





#1
1,4-Dichlorobenzene-d4
Concen: 5.00 ng
RT: 7.14 min Scan# 1258
Delta R.T. 0.00 min
Lab File: BE088187.D
Acq: 22 Oct 2014 18:14

Tgt Ion:152 Resp: 27953

| Ion | Ratio | Lower | Upper |
|---|---|---|---|
| 152 | 100 | | |
| 150 | 151.9 | 129.2 | 193.8 |
| 115 | 55.0 | 49.3 | 73.9 |




**Instrument :**
BNA_E
**ClientSampleId :**
YS19-SB21-1014MS

**Manual Integrations APPROVED**
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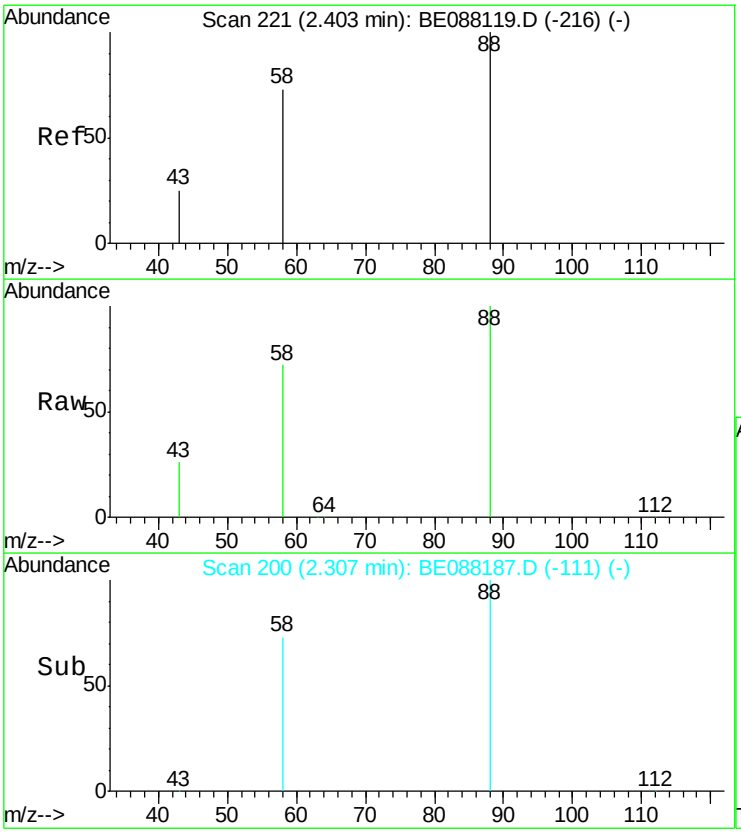
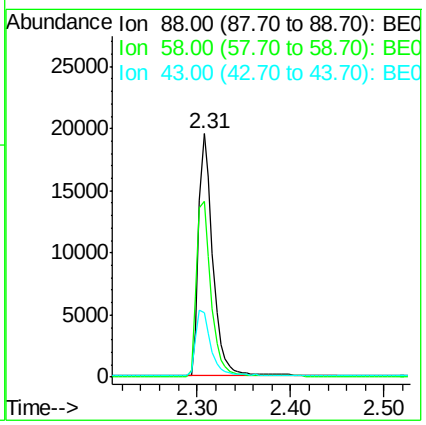
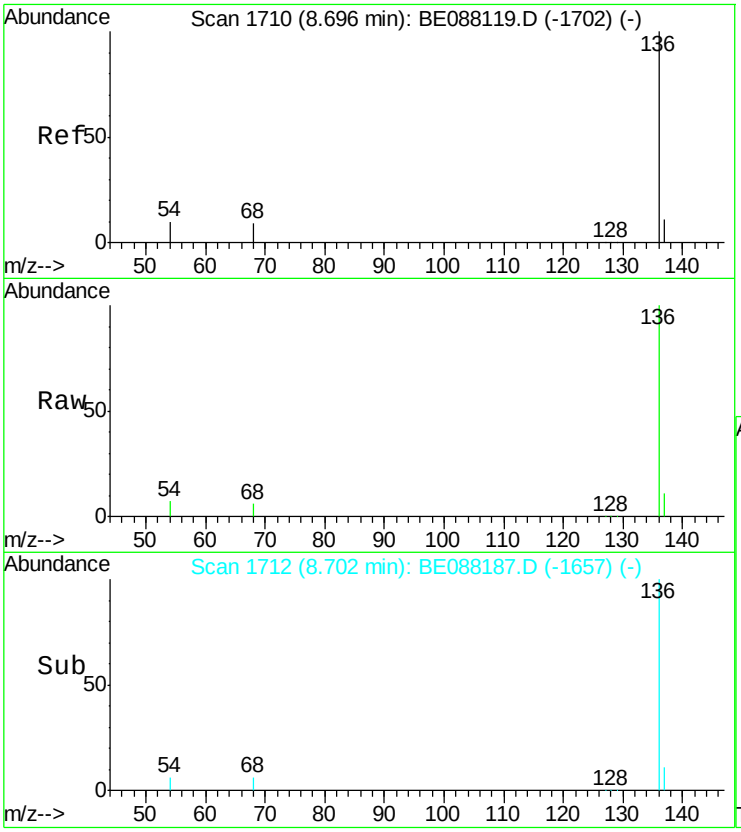



#2
1,4-Dioxane
Concen: 5.05 ng
RT: 2.31 min Scan# 200
Delta R.T. -0.10 min
Lab File: BE088187.D
Acq: 22 Oct 2014 18:14

Tgt Ion: 88 Resp: 20326

| Ion | Ratio | Lower | Upper |
|---|---|---|---|
| 88 | 100 | | |
| 58 | 75.8 | 59.5 | 89.3 |
| 43 | 28.2 | 21.2 | 31.8 |

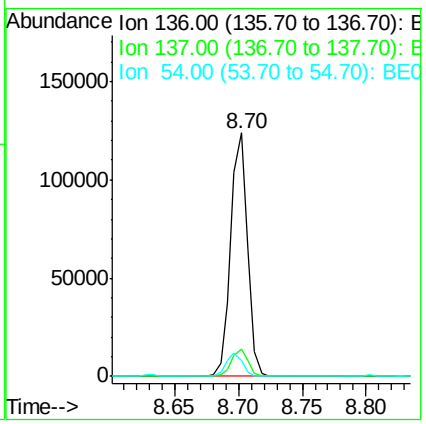





#3
Naphthalene-d8
Concen: 5.00 ng
RT: 8.70 min Scan# 1712
Delta R.T. 0.01 min
Lab File: BE088187.D
Acq: 22 Oct 2014 18:14

Tgt Ion:136 Resp: 111693

| Ion | Ratio | Lower | Upper |
|---|---|---|---|
| 136 | 100 | | |
| 137 | 11.1 | 8.6 | 12.8 |
| 54 | 6.6 | 7.7 | 11.5# |




**Instrument :**
BNA_E
**ClientSampleId :**
YS19-SB21-1014MS

**Manual Integrations APPROVED**
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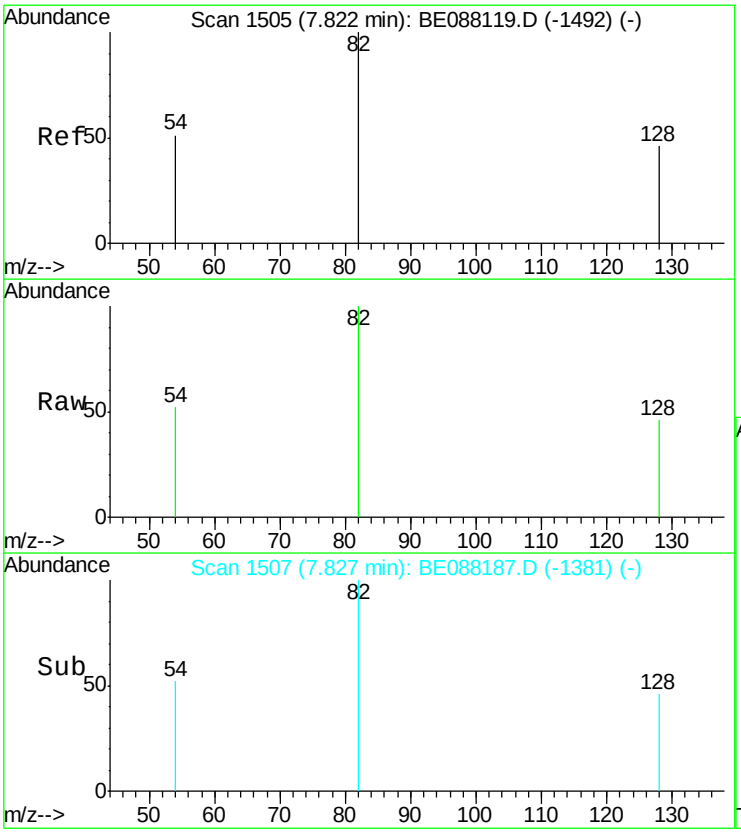
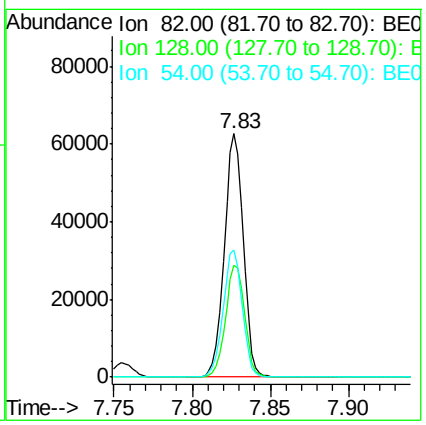
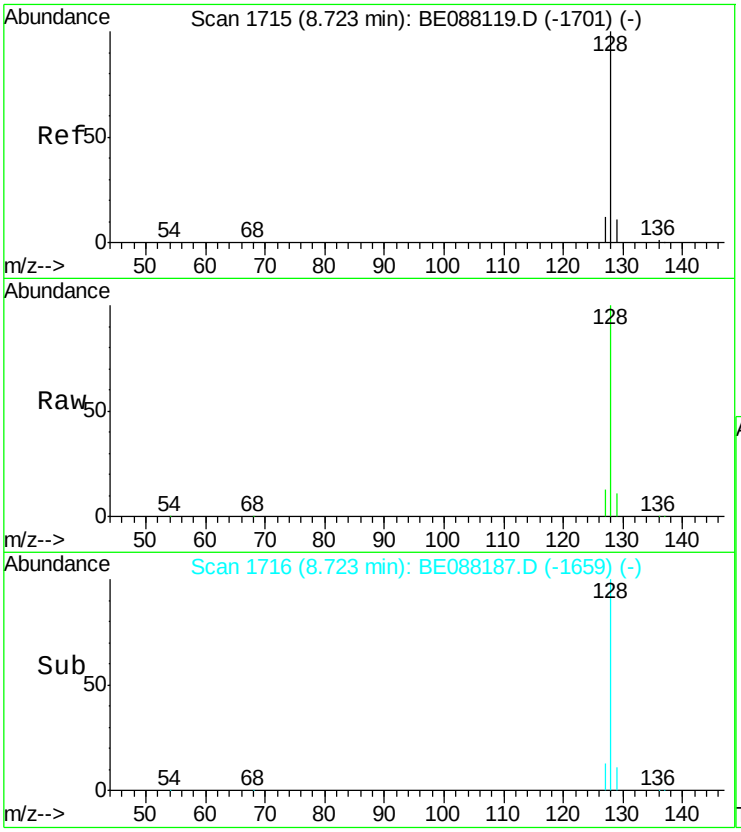



#4
Nitrobenzene-d5
Concen: 6.55 ng
RT: 7.83 min Scan# 1507
Delta R.T. 0.00 min
Lab File: BE088187.D
Acq: 22 Oct 2014 18:14

Tgt Ion: 82 Resp: 52764

| Ion | Ratio | Lower | Upper |
|---|---|---|---|
| 82 | 100 | | |
| 128 | 45.9 | 37.1 | 55.7 |
| 54 | 52.3 | 41.1 | 61.7 |

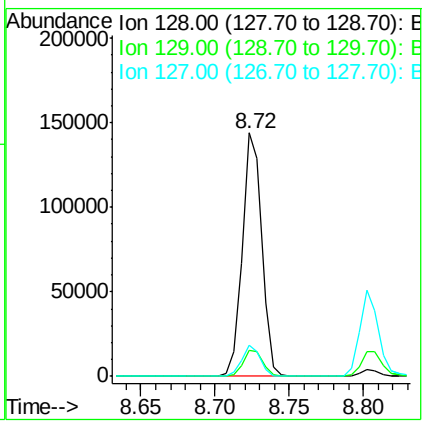





#5
Naphthalene
Concen: 5.61 ng
RT: 8.72 min Scan# 1716
Delta R.T. 0.00 min
Lab File: BE088187.D
Acq: 22 Oct 2014 18:14

Tgt Ion:128 Resp: 129150

| Ion | Ratio | Lower | Upper |
|---|---|---|---|
| 128 | 100 | | |
| 129 | 10.6 | 8.9 | 13.3 |
| 127 | 12.8 | 9.7 | 14.5 |




**Instrument :**
BNA_E
**ClientSampleId :**
YS19-SB21-1014MS

**Manual Integrations APPROVED**
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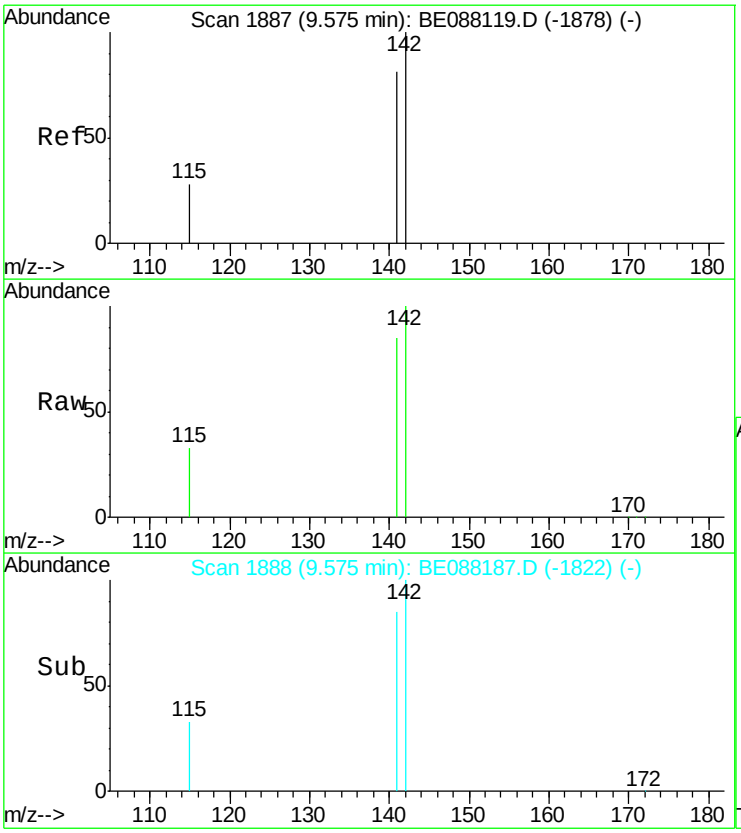
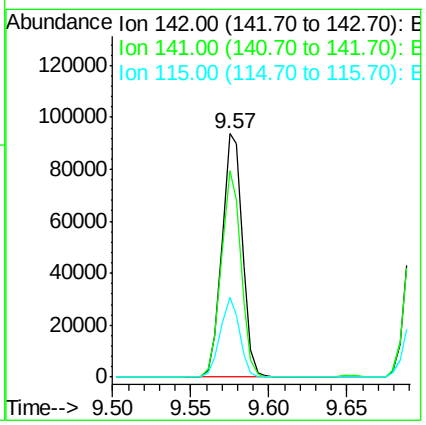
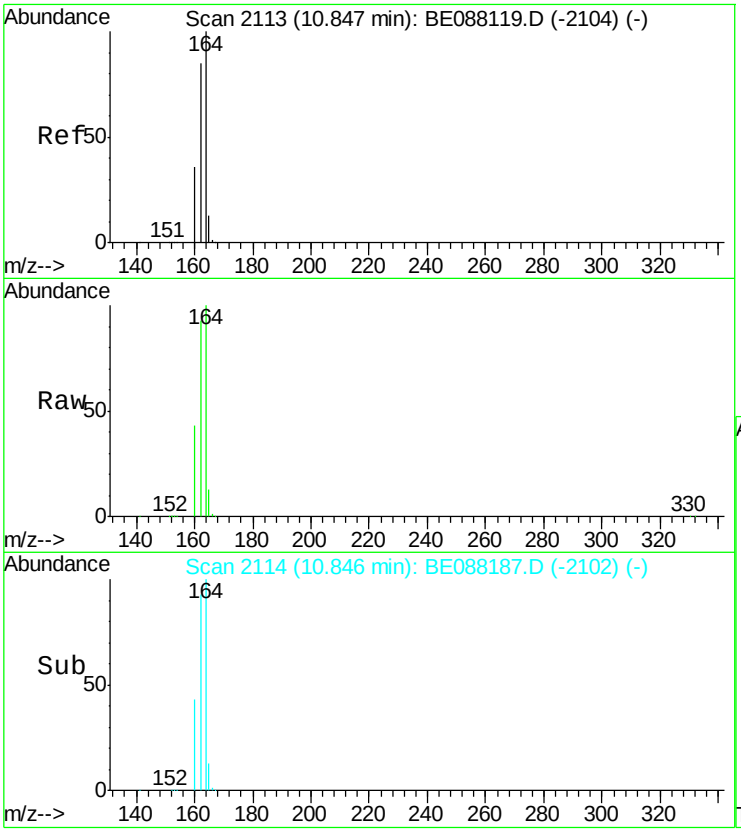



#6
2-Methylnaphthalene
Concen: 6.14 ng
RT: 9.57 min Scan# 1888
Delta R.T. -0.00 min
Lab File: BE088187.D
Acq: 22 Oct 2014 18:14

Tgt Ion:142 Resp: 84603

| Ion | Ratio | Lower | Upper |
|---|---|---|---|
| 142 | 100 | | |
| 141 | 84.6 | 64.6 | 97.0 |
| 115 | 32.7 | 22.6 | 34.0 |

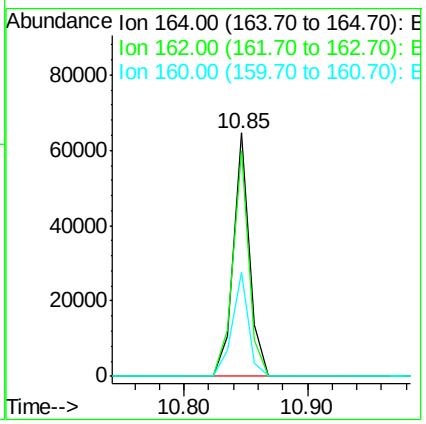





#7
Acenaphthene-d10
Concen: 5.00 ng
RT: 10.85 min Scan# 2114
Delta R.T. -0.00 min
Lab File: BE088187.D
Acq: 22 Oct 2014 18:14

Tgt Ion:164 Resp: 58727

| Ion | Ratio | Lower | Upper |
|---|---|---|---|
| 164 | 100 | | |
| 162 | 92.5 | 68.3 | 102.5 |
| 160 | 42.6 | 28.7 | 43.1 |




**Instrument :**
BNA_E
**ClientSampleId :**
YS19-SB21-1014MS

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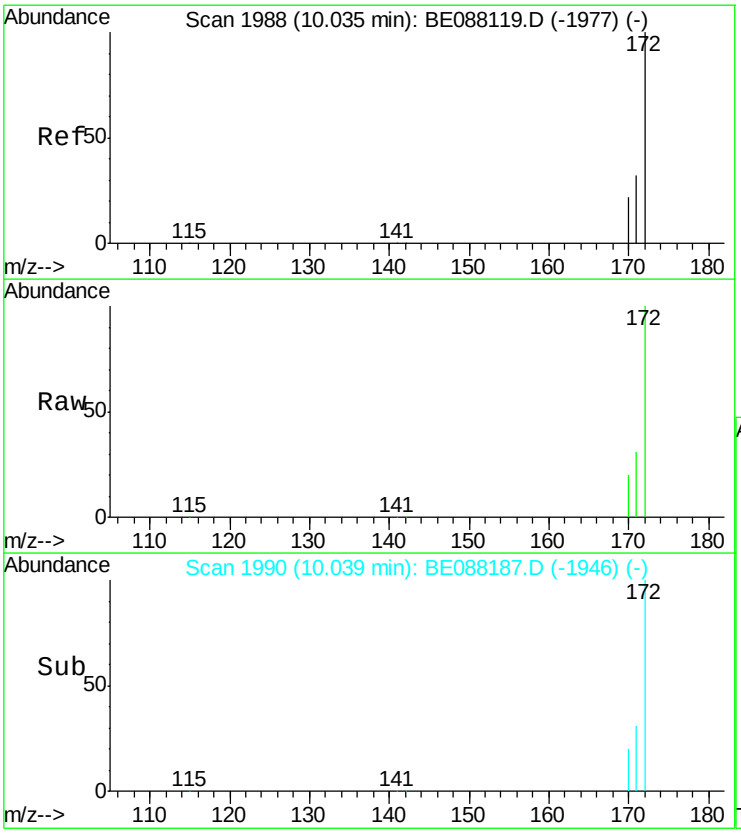
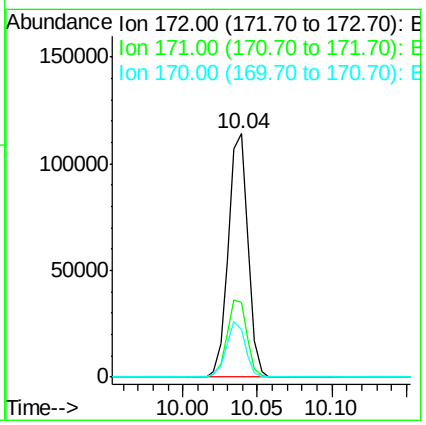
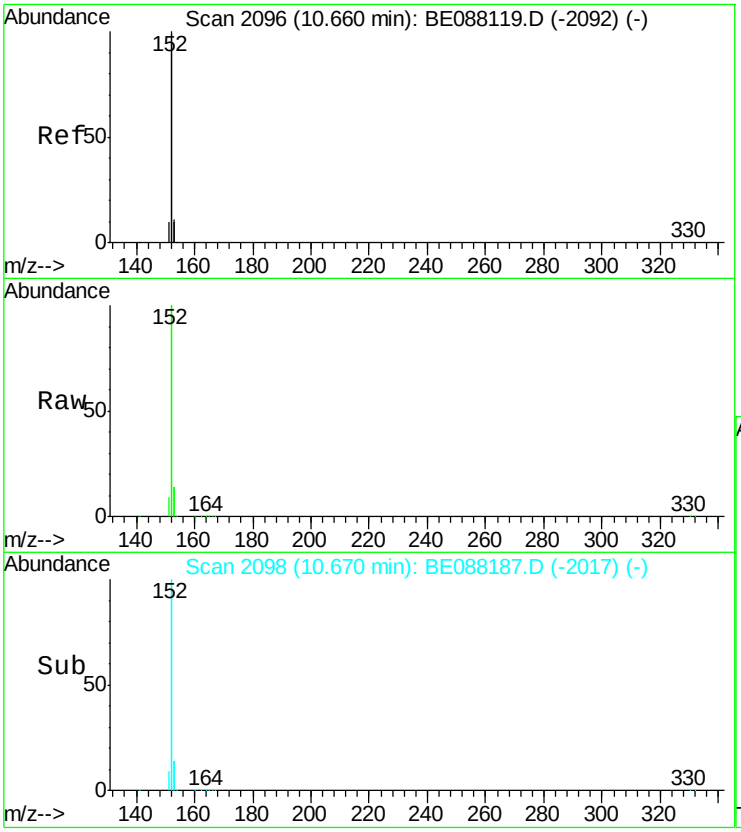



#8
2-Fluorobiphenyl
Concen: 6.38 ng
RT: 10.04 min Scan# 1990
Delta R.T. 0.00 min
Lab File: BE088187.D
Acq: 22 Oct 2014 18:14

Tgt Ion:172 Resp: 103489

| Ion | Ratio | Lower | Upper |
|---|---|---|---|
| 172 | 100 | | |
| 171 | 30.5 | 25.4 | 38.2 |
| 170 | 19.8 | 17.4 | 26.2 |

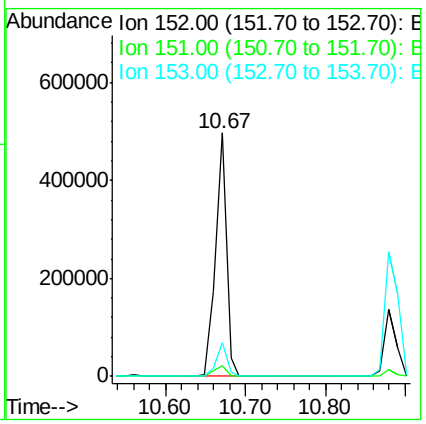





#9
Acenaphthylene
Concen: 5.22 ng
RT: 10.67 min Scan# 2098
Delta R.T. 0.01 min
Lab File: BE088187.D
Acq: 22 Oct 2014 18:14

Tgt Ion:152 Resp: 467317

| Ion | Ratio | Lower | Upper |
|---|---|---|---|
| 152 | 100 | | |
| 151 | 4.7 | 3.7 | 5.5 |
| 153 | 13.1 | 10.4 | 15.6 |

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BNA_E
**ClientSampleId :**
YS19-SB21-1014MS

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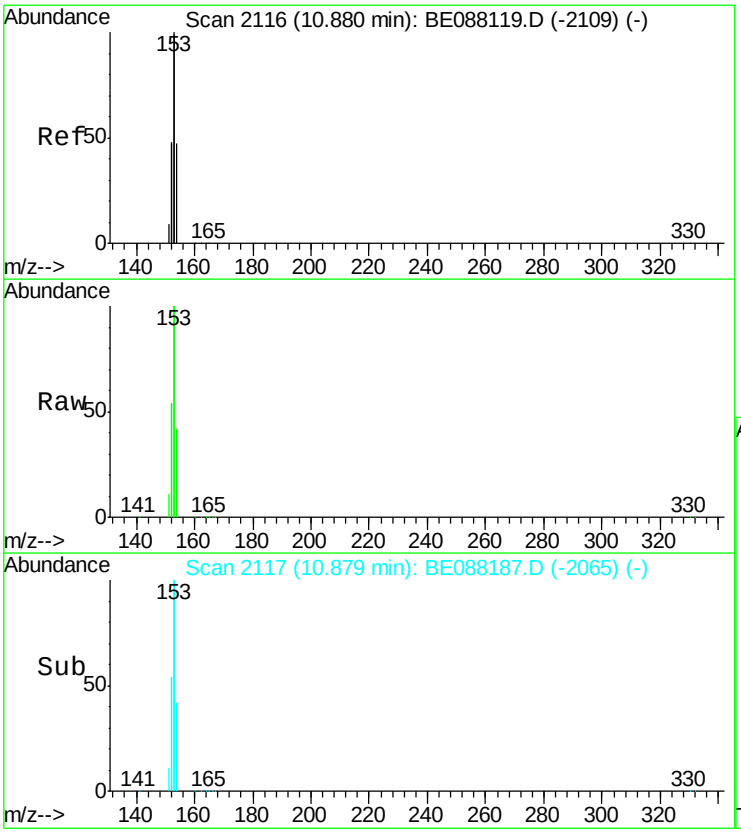
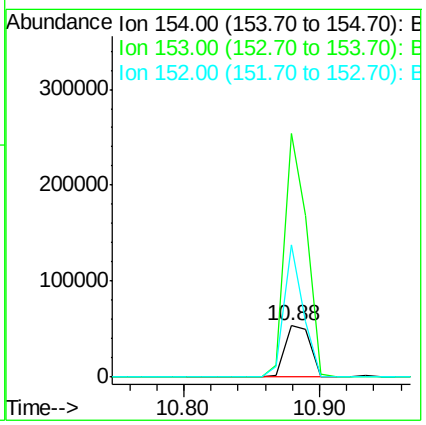
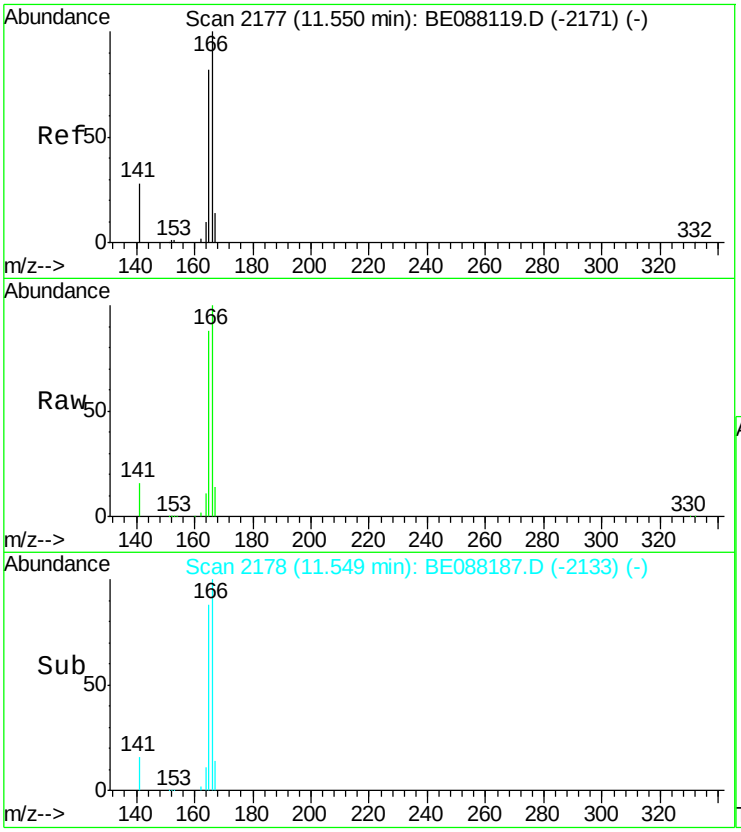



#10
Acenaphthene
Concen: 5.09 ng
RT: 10.88 min Scan# 2117
Delta R.T. -0.00 min
Lab File: BE088187.D
Acq: 22 Oct 2014 18:14

Tgt Ion:154 Resp: 70351

| Ion | Ratio | Lower | Upper |
|---|---|---|---|
| 154 | 100 | | |
| 153 | 410.3 | 327.8 | 491.6 |
| 152 | 194.5 | 157.6 | 236.4 |

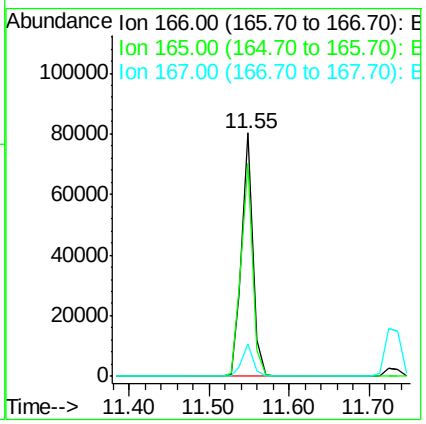





#11
Fluorene
Concen: 5.42 ng
RT: 11.55 min Scan# 2178
Delta R.T. -0.00 min
Lab File: BE088187.D
Acq: 22 Oct 2014 18:14

Tgt Ion:166 Resp: 79308

| Ion | Ratio | Lower | Upper |
|---|---|---|---|
| 166 | 100 | | |
| 165 | 90.3 | 71.4 | 107.2 |
| 167 | 13.5 | 10.6 | 16.0 |




**Instrument :**
BNA_E
**ClientSampleId :**
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**Manual Integrations APPROVED**
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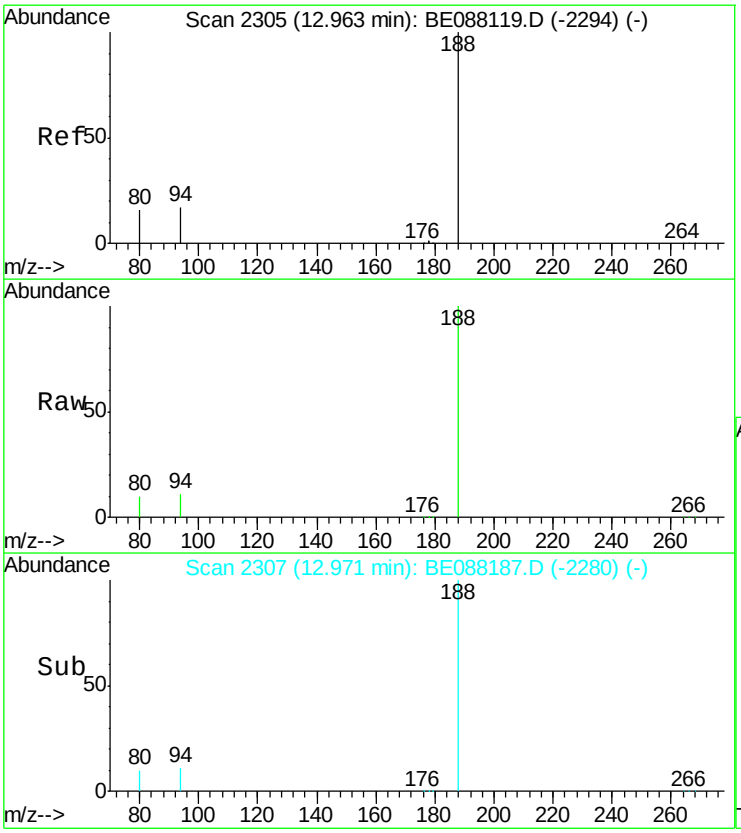
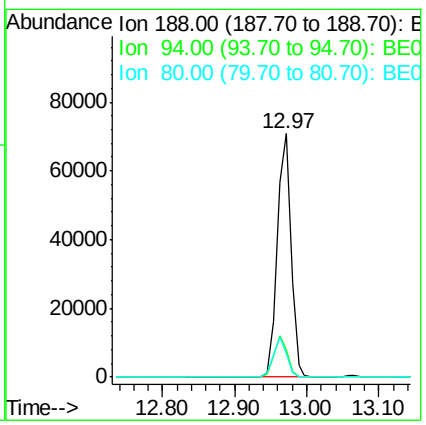
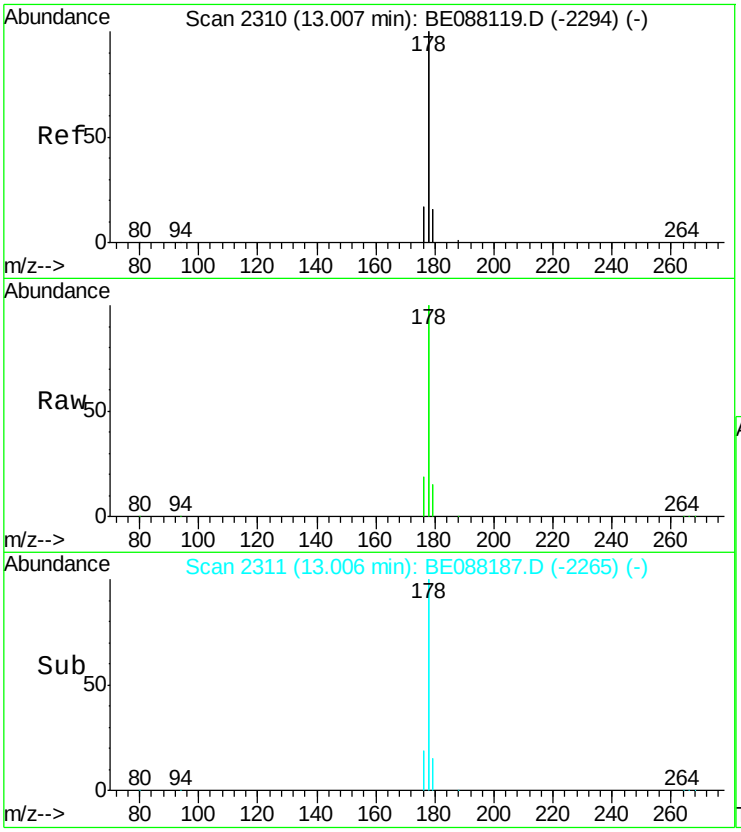



#12
Phenanthrene-d10
Concen: 5.00 ng
RT: 12.97 min Scan# 2307
Delta R.T. 0.01 min
Lab File: BE088187.D
Acq: 22 Oct 2014 18:14

Tgt Ion:188 Resp: 110466

| Ion | Ratio | Lower | Upper |
|---|---|---|---|
| 188 | 100 | | |
| 94 | 11.2 | 13.9 | 20.9# |
| 80 | 9.9 | 12.9 | 19.3# |

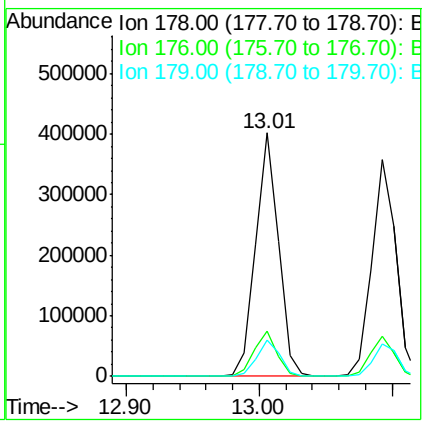





#13
Phenanthrene
Concen: 5.92 ng
RT: 13.01 min Scan# 2311
Delta R.T. -0.00 min
Lab File: BE088187.D
Acq: 22 Oct 2014 18:14

Tgt Ion:178 Resp: 479041

| Ion | Ratio | Lower | Upper |
|---|---|---|---|
| 178 | 100 | | |
| 176 | 18.5 | 12.5 | 18.7 |
| 179 | 15.3 | 13.5 | 20.3 |




**Instrument :**
BNA_E
**ClientSampleId :**
YS19-SB21-1014MS

**Manual Integrations APPROVED**
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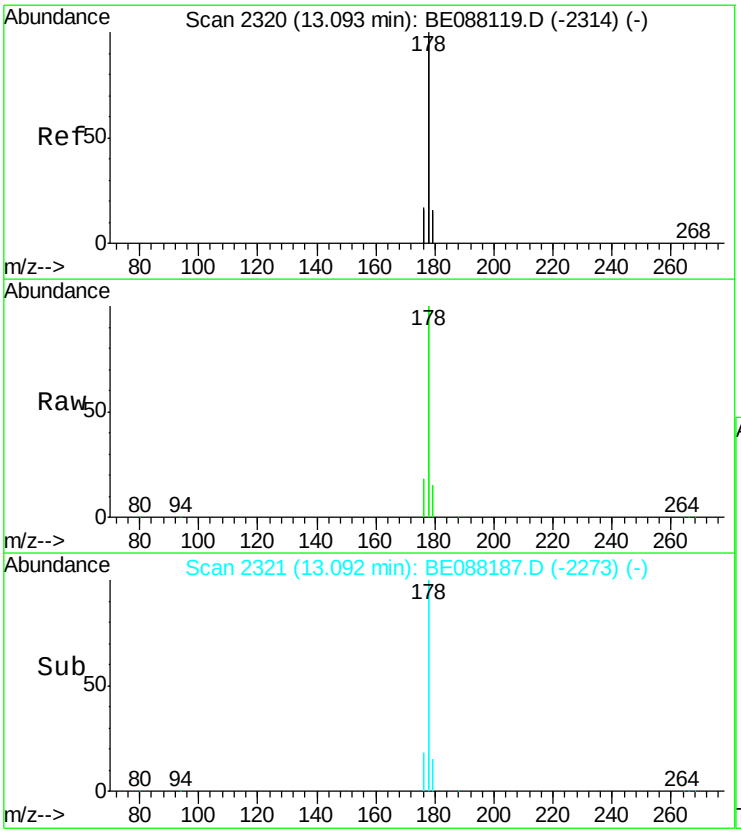
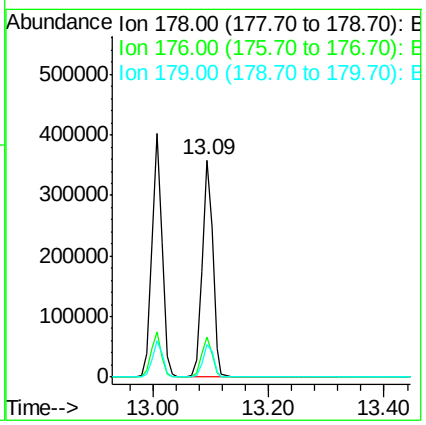
10/28/2014 12:06:49 PM

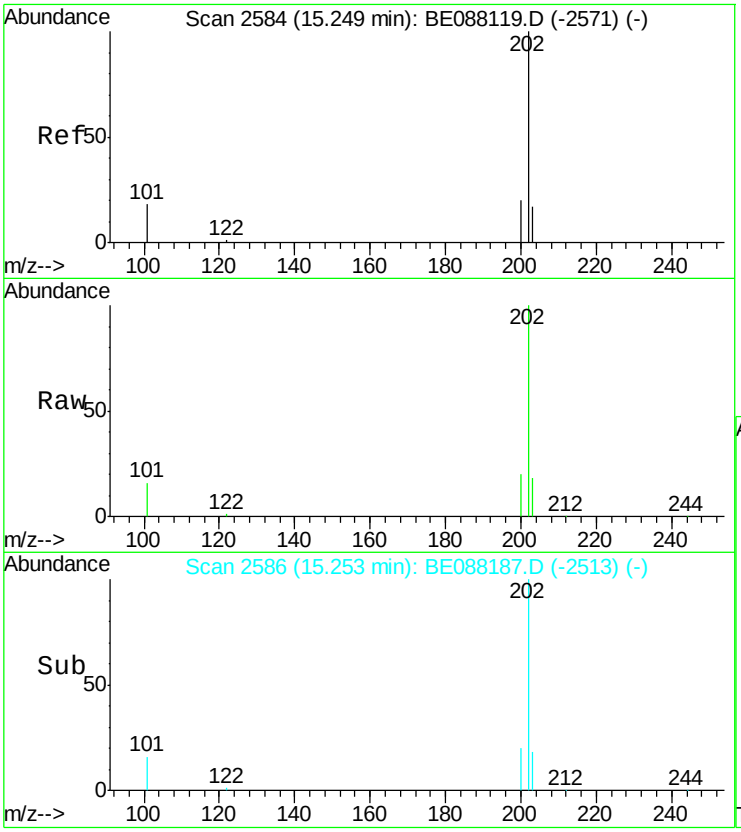



#14
Anthracene
Concen: 5.22 ng
RT: 13.09 min Scan# 2321
Delta R.T. -0.00 min
Lab File: BE088187.D
Acq: 22 Oct 2014 18:14

Tgt Ion:178 Resp: 450318

| Ion | Ratio | Lower | Upper |
|---|---|---|---|
| 178 | 100 | | |
| 176 | 17.9 | 14.6 | 21.8 |
| 179 | 15.1 | 12.5 | 18.7 |

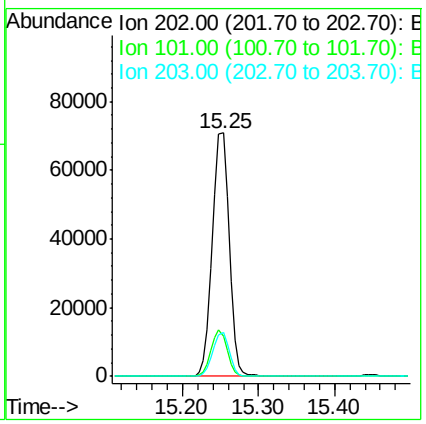





#15
Fluoranthene
Concen: 5.19 ng
RT: 15.25 min Scan# 2586
Delta R.T. 0.00 min
Lab File: BE088187.D
Acq: 22 Oct 2014 18:14

Tgt Ion:202 Resp: 108991

| Ion | Ratio | Lower | Upper |
|---|---|---|---|
| 202 | 100 | | |
| 101 | 18.2 | 14.8 | 22.2 |
| 203 | 17.3 | 13.5 | 20.3 |




**Instrument :**
BNA_E
**ClientSampleId :**
YS19-SB21-1014MS

**Manual Integrations APPROVED**
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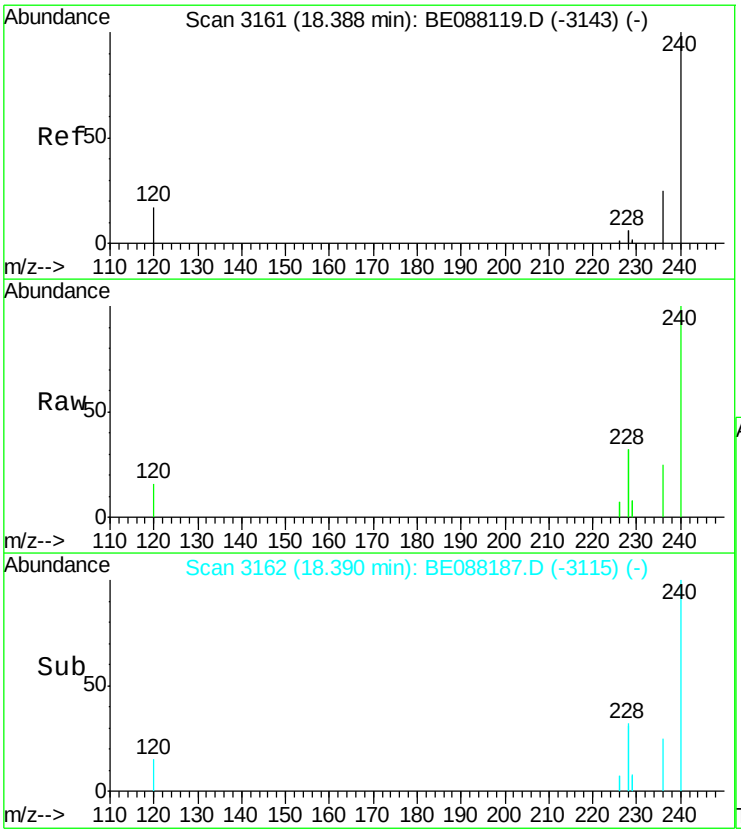
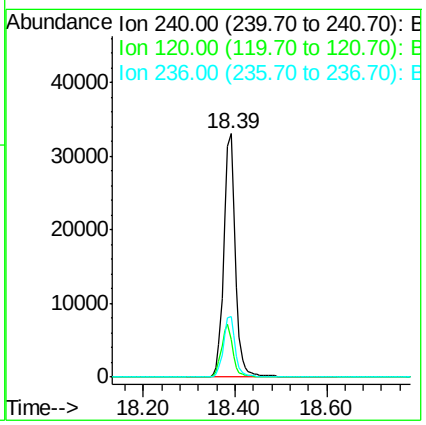
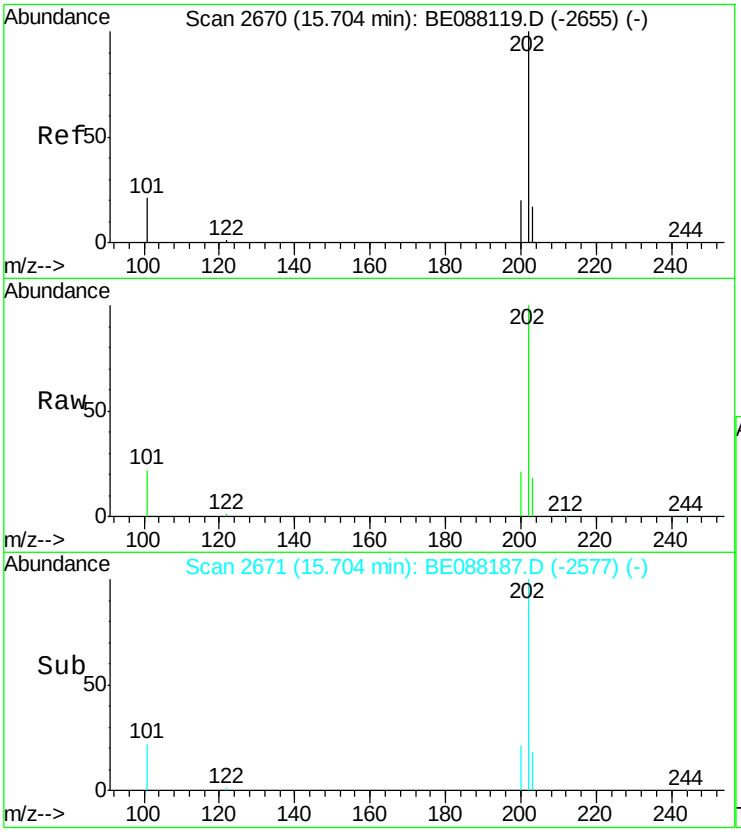



#16
Chrysene-d12
Concen: 5.00 ng
RT: 18.39 min Scan# 3162
Delta R.T. 0.00 min
Lab File: BE088187.D
Acq: 22 Oct 2014 18:14

Tgt Ion:240 Resp: 57570

| Ion | Ratio | Lower | Upper |
|---|---|---|---|
| 240 | 100 | | |
| 120 | 15.7 | 13.9 | 20.9 |
| 236 | 24.9 | 19.9 | 29.9 |

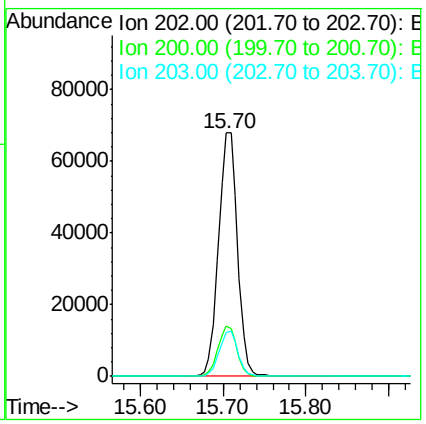





#17
Pyrene
Concen: 6.88 ng
RT: 15.70 min Scan# 2671
Delta R.T. -0.00 min
Lab File: BE088187.D
Acq: 22 Oct 2014 18:14

Tgt Ion:202 Resp: 107720

| Ion | Ratio | Lower | Upper |
|---|---|---|---|
| 202 | 100 | | |
| 200 | 20.2 | 16.1 | 24.1 |
| 203 | 18.1 | 13.9 | 20.9 |




**Instrument :**
BNA_E
**ClientSampleId :**
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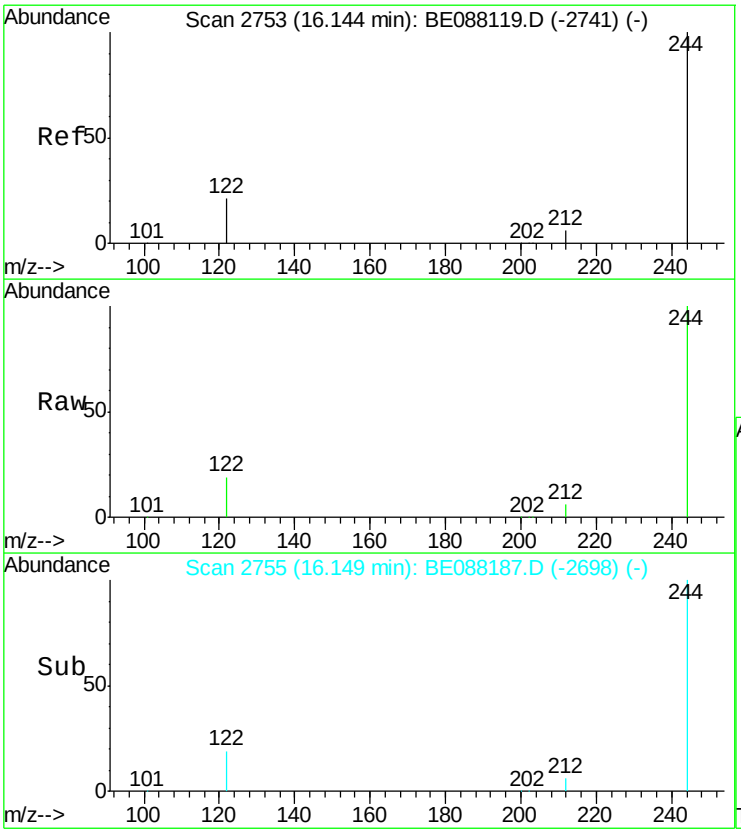
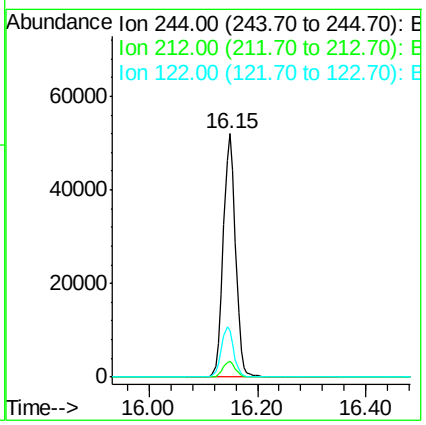
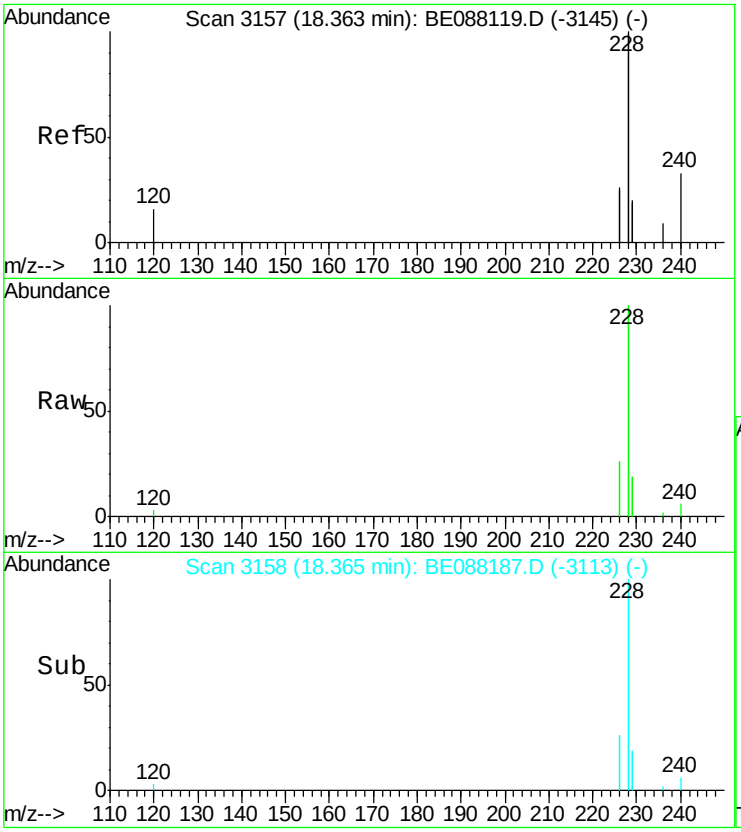



#18
Terphenyl-d14
Concen: 8.80 ng
RT: 16.15 min Scan# 2755
Delta R.T. 0.00 min
Lab File: BE088187.D
Acq: 22 Oct 2014 18:14

Tgt Ion:244 Resp: 81559

| Ion | Ratio | Lower | Upper |
|---|---|---|---|
| 244 | 100 | | |
| 212 | 6.4 | 5.4 | 8.0 |
| 122 | 19.1 | 17.5 | 26.3 |






#19
Benzo(a)anthracene
Concen: 5.55 ng
RT: 18.36 min Scan# 3158
Delta R.T. 0.00 min
Lab File: BE088187.D
Acq: 22 Oct 2014 18:14

Tgt Ion:228 Resp: 284197

| Ion | Ratio | Lower | Upper |
|---|---|---|---|
| 228 | 100 | | |
| 226 | 26.2 | 20.8 | 31.2 |
| 229 | 19.5 | 15.6 | 23.4 |

**Instrument :**
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**ClientSampleId :**
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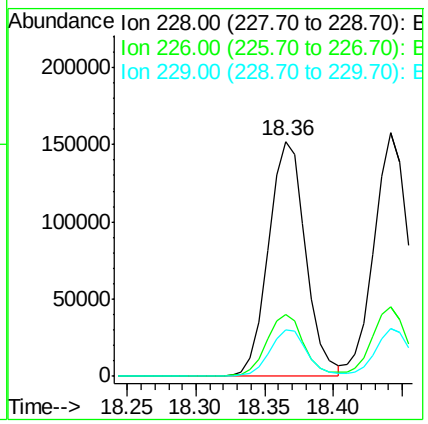
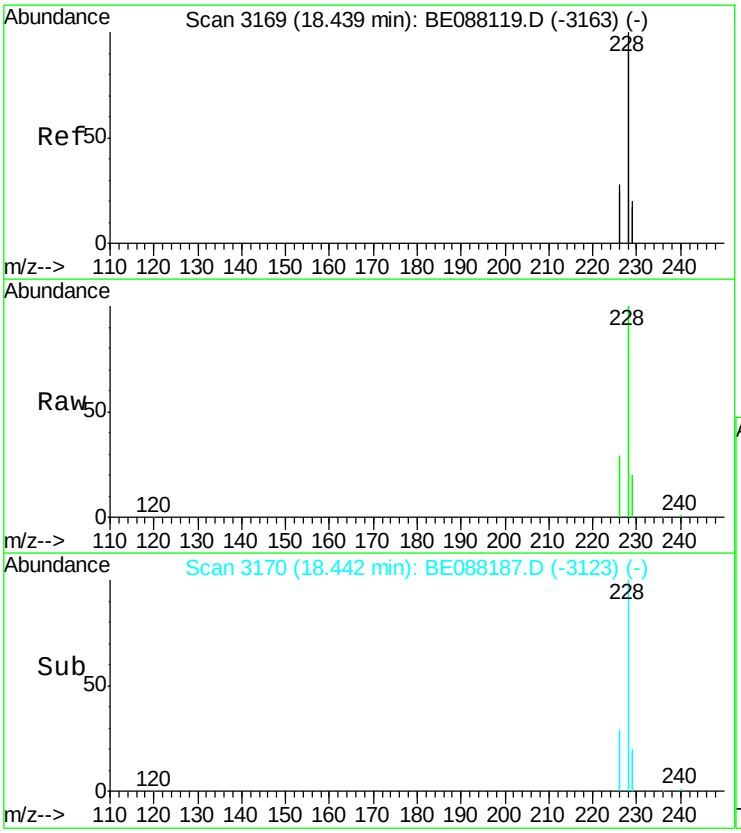
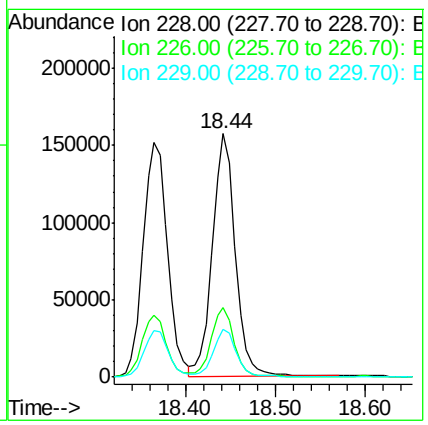


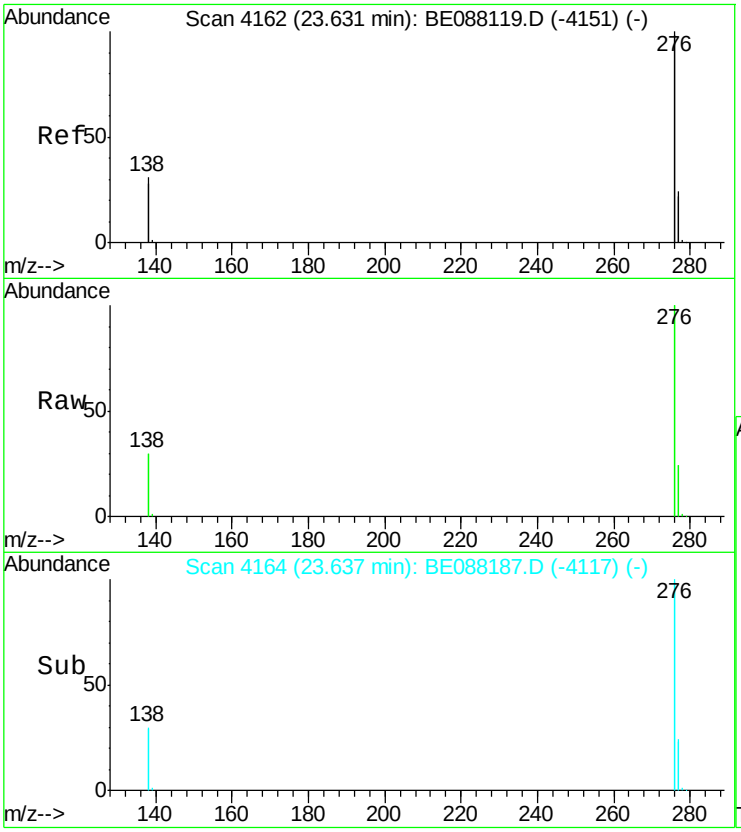




#20
Chrysene
Concen: 5.51 ng
RT: 18.44 min Scan# 3170
Delta R.T. 0.00 min
Lab File: BE088187.D
Acq: 22 Oct 2014 18:14

Tgt Ion:228 Resp: 277003

| Ion | Ratio | Lower | Upper |
|---|---|---|---|
| 228 | 100 | | |
| 226 | 28.7 | 22.7 | 34.1 |
| 229 | 19.5 | 15.8 | 23.6 |

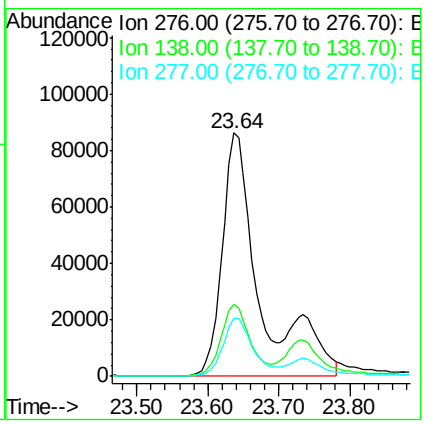





#21
Indeno(1,2,3-cd)pyrene
Concen: 5.76 ng m
RT: 23.64 min Scan# 4164
Delta R.T. 0.01 min
Lab File: BE088187.D
Acq: 22 Oct 2014 18:14

Tgt Ion:276 Resp: 321352

| Ion | Ratio | Lower | Upper |
|---|---|---|---|
| 276 | 100 | | |
| 138 | 22.3 | 18.5 | 27.7 |
| 277 | 18.3 | 14.6 | 21.8 |




**Instrument :**
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**ClientSampleId :**
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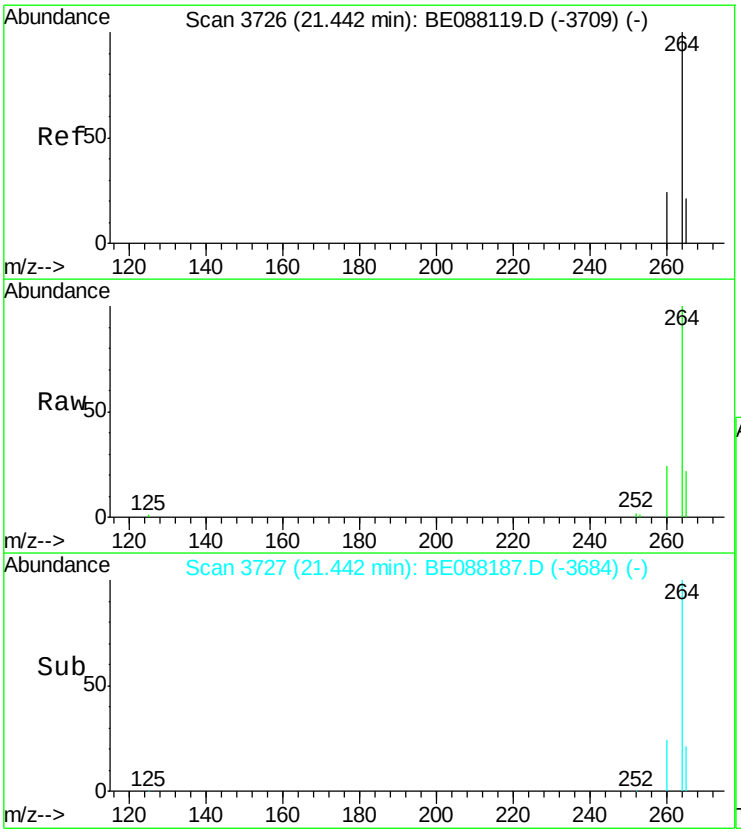
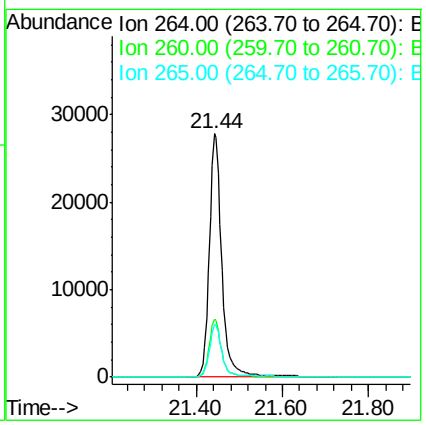
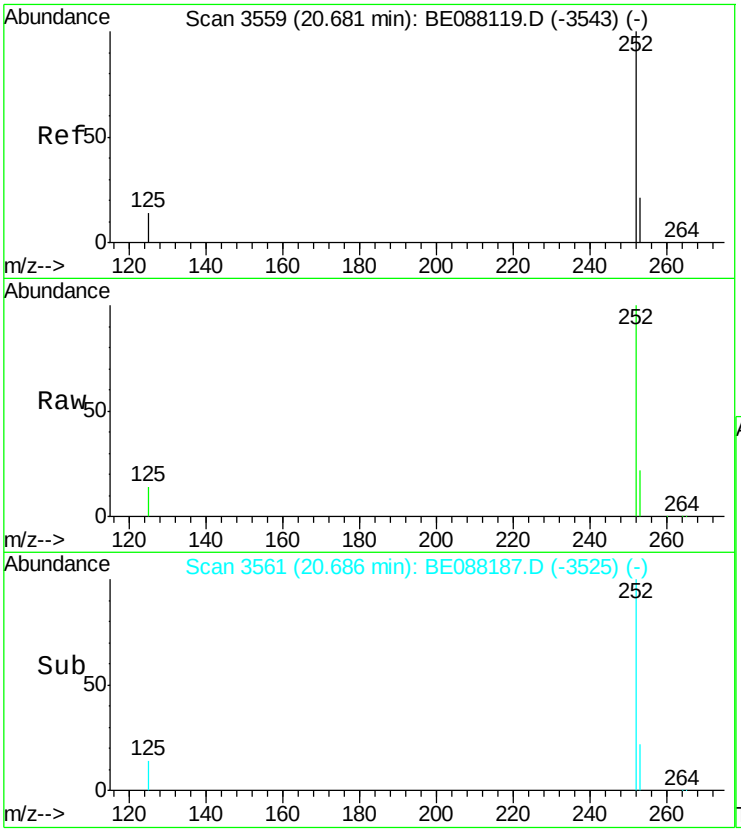



#22
Perylene-d12
Concen: 5.00 ng
RT: 21.44 min Scan# 3727
Delta R.T. -0.00 min
Lab File: BE088187.D
Acq: 22 Oct 2014 18:14

Tgt Ion:264 Resp: 56167

| Ion | Ratio | Lower | Upper |
|---|---|---|---|
| 264 | 100 | | |
| 260 | 24.0 | 19.0 | 28.4 |
| 265 | 21.6 | 17.2 | 25.8 |

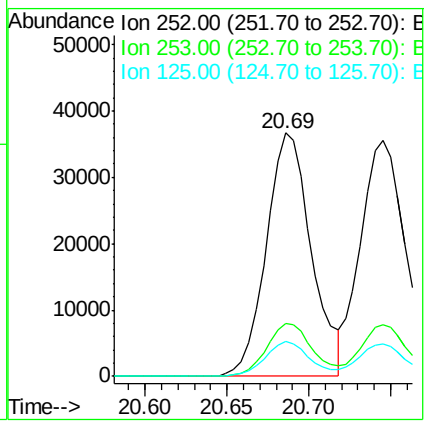





#23
Benzo(b)fluoranthene
Concen: 5.25 ng
RT: 20.69 min Scan# 3561
Delta R.T. 0.00 min
Lab File: BE088187.D
Acq: 22 Oct 2014 18:14

Tgt Ion:252 Resp: 70159

| Ion | Ratio | Lower | Upper |
|---|---|---|---|
| 252 | 100 | | |
| 253 | 21.8 | 17.4 | 26.0 |
| 125 | 14.2 | 11.8 | 17.8 |




**Instrument :**
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**ClientSampleId :**
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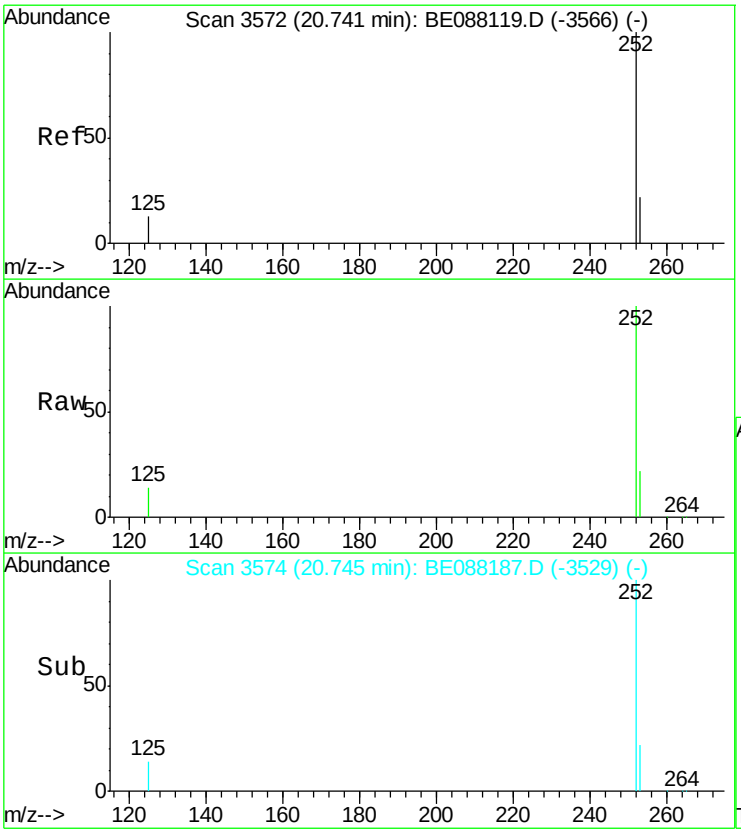
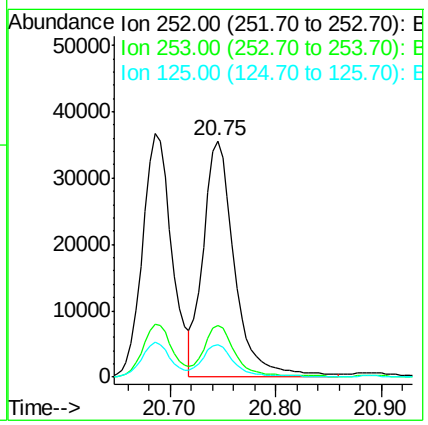
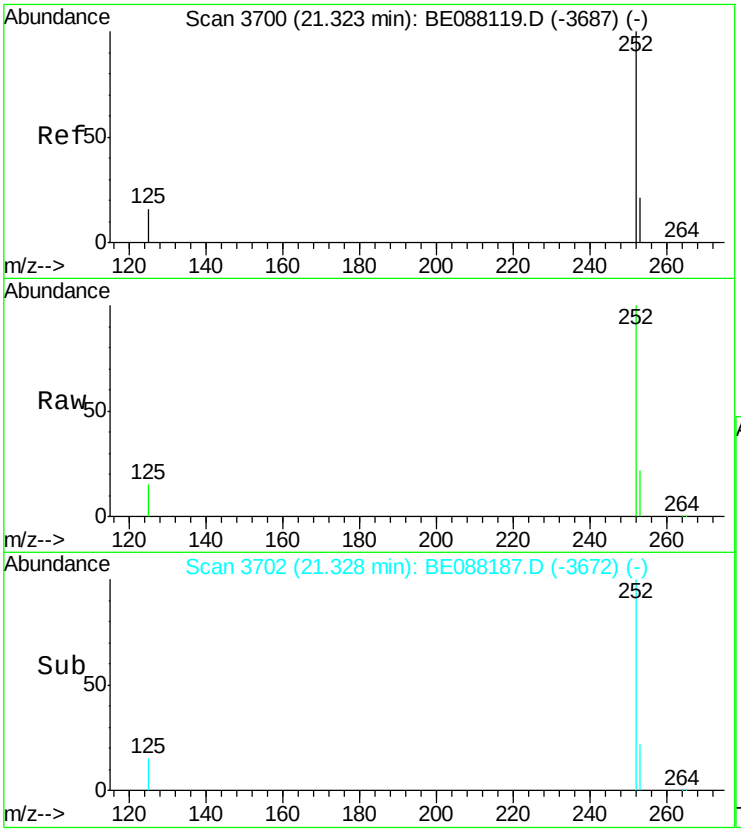



#24
Benzo(k)fluoranthene
Concen: 5.12 ng
RT: 20.75 min Scan# 3574
Delta R.T. 0.00 min
Lab File: BE088187.D
Acq: 22 Oct 2014 18:14

Tgt Ion:252 Resp: 73226

| Ion | Ratio | Lower | Upper |
|---|---|---|---|
| 252 | 100 | | |
| 253 | 21.8 | 17.6 | 26.4 |
| 125 | 13.8 | 11.5 | 17.3 |






#25
Benzo(a)pyrene
Concen: 5.65 ng
RT: 21.33 min Scan# 3702
Delta R.T. 0.00 min
Lab File: BE088187.D
Acq: 22 Oct 2014 18:14

Tgt Ion:252 Resp: 69582

| Ion | Ratio | Lower | Upper |
|---|---|---|---|
| 252 | 100 | | |
| 253 | 21.8 | 17.5 | 26.3 |
| 125 | 15.5 | 13.0 | 19.6 |

**Instrument :**
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**ClientSampleId :**
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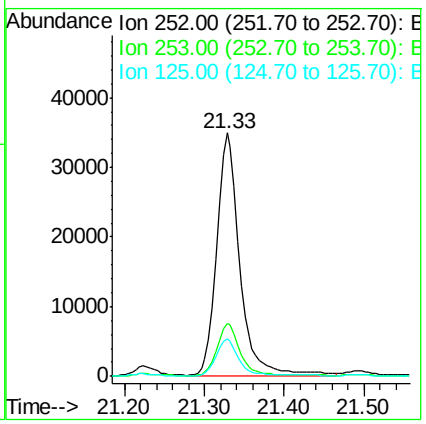
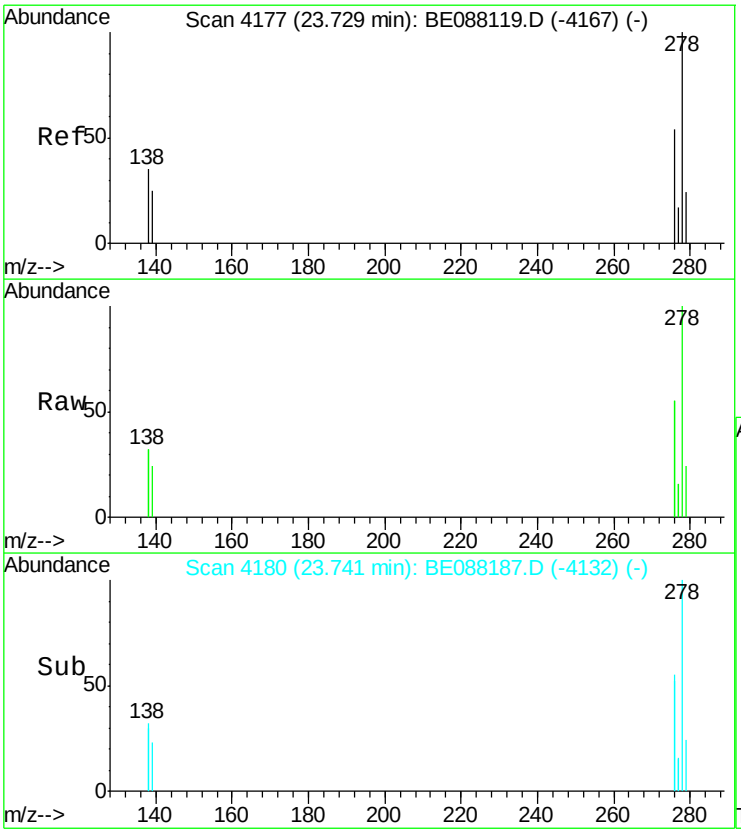
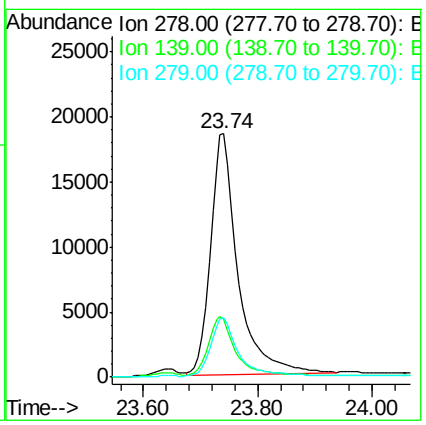


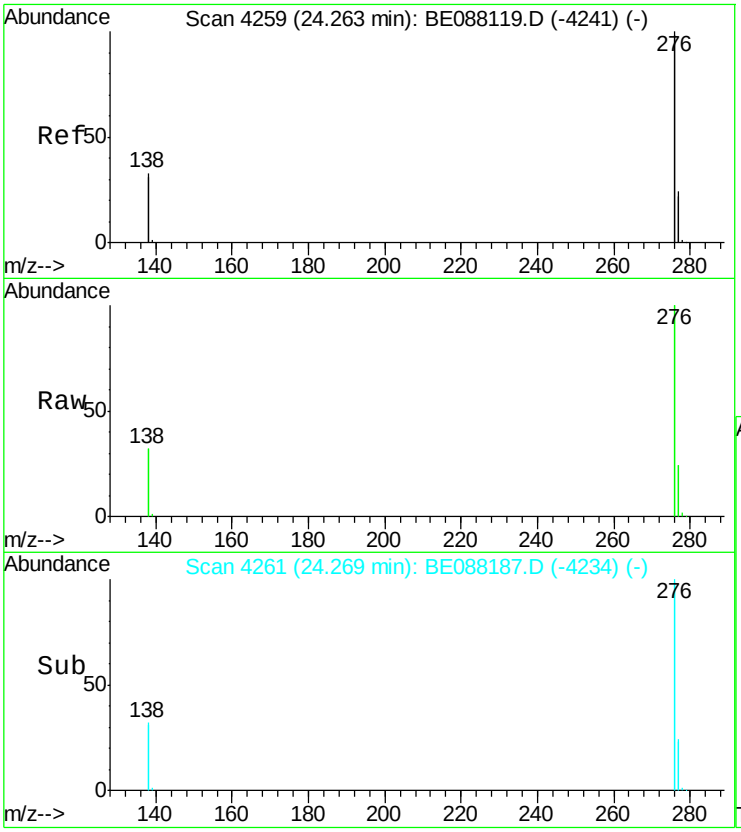




#26
Dibenzo(a,h)anthracene
Concen: 5.14 ng
RT: 23.74 min Scan# 4180
Delta R.T. 0.01 min
Lab File: BE088187.D
Acq: 22 Oct 2014 18:14

Tgt Ion:278 Resp: 62123

| Ion | Ratio | Lower | Upper |
|---|---|---|---|
| 278 | 100 | | |
| 139 | 23.7 | 20.9 | 31.3 |
| 279 | 24.1 | 19.8 | 29.8 |

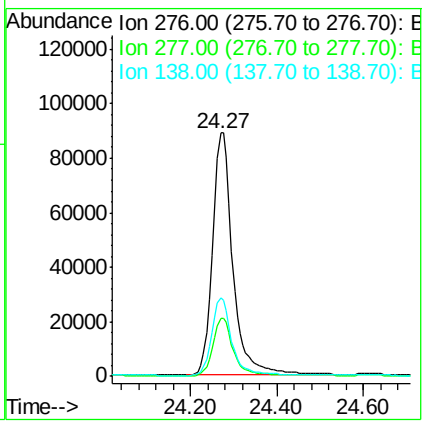





#27
Benzo(g,h,i)perylene
Concen: 5.47 ng
RT: 24.27 min Scan# 4261
Delta R.T. 0.01 min
Lab File: BE088187.D
Acq: 22 Oct 2014 18:14

Tgt Ion:276 Resp: 292251

| Ion | Ratio | Lower | Upper |
|---|---|---|---|
| 276 | 100 | | |
| 277 | 23.7 | 19.2 | 28.8 |
| 138 | 32.1 | 26.6 | 40.0 |




**Instrument :**
BNA_E
**ClientSampleId :**
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