

Data Path : Z:\HPCHEM1\BNA\_G\DATA\BG110316\  
 Data File : BG024668.D  
 Acq On : 4 Nov 2016 4:49  
 Operator : UM/SJ  
 Sample : H5509-12  
 Misc :  
 ALS Vial : 38 Sample Multiplier: 1

Instrument :  
 BNA\_G  
 ClientSampleId :  
 SB-96-17.5-18.0

Integration Parameters: rteint.p  
 Integrator: RTE  
 Smoothing : ON  
 Sampling : 1  
 Start Thrs: 0.2  
 Stop Thrs : 0  
 Filtering: 5  
 Min Area: 3 % of largest Peak  
 Max Peaks: 100  
 Peak Location: TOP

If leading or trailing edge < 100 prefer < Baseline drop else tangent >  
 Peak separation: 5

Method : Z:\HPCHEM1\BNA\_G\METHODS\8270-BG102516.M  
 Title : ASP BNA STANDARDS FOR 5 POINT CALIBRATION

Signal : TIC

| peak<br># | R.T.<br>min | first<br>scan | max<br>scan | last<br>scan | PK<br>TY | peak<br>height | corr.<br>area | corr.<br>% max. | % of<br>total |
|-----------|-------------|---------------|-------------|--------------|----------|----------------|---------------|-----------------|---------------|
| 1         | 3.128       | 43            | 49          | 68           | rVB      | 6616620        | 11351325      | 100.00%         | 18.464%       |
| 2         | 5.332       | 417           | 424         | 431          | rBV      | 407518         | 681324        | 6.00%           | 1.108%        |
| 3         | 5.796       | 495           | 503         | 512          | rBV      | 1958303        | 3300683       | 29.08%          | 5.369%        |
| 4         | 7.406       | 768           | 777         | 788          | rBV      | 2062837        | 3780111       | 33.30%          | 6.149%        |
| 5         | 7.793       | 834           | 843         | 851          | rBV      | 1931812        | 3461569       | 30.49%          | 5.631%        |
| 6         | 8.269       | 915           | 924         | 934          | rVB2     | 337768         | 632330        | 5.57%           | 1.029%        |
| 7         | 8.592       | 972           | 979         | 987          | rVB      | 1406288        | 2530724       | 22.29%          | 4.117%        |
| 8         | 9.439       | 1114          | 1123        | 1133         | rBV      | 1264119        | 2334897       | 20.57%          | 3.798%        |
| 9         | 11.095      | 1397          | 1405        | 1413         | rBV      | 432208         | 830718        | 7.32%           | 1.351%        |
| 10        | 13.504      | 1807          | 1815        | 1823         | rBV      | 2885798        | 4733866       | 41.70%          | 7.700%        |
| 11        | 14.321      | 1946          | 1954        | 1960         | rBV      | 1055117        | 1547635       | 13.63%          | 2.517%        |
| 12        | 14.885      | 2043          | 2050        | 2056         | rBV      | 748943         | 1230926       | 10.84%          | 2.002%        |
| 13        | 16.366      | 2294          | 2302        | 2313         | rBV      | 3428461        | 5304679       | 46.73%          | 8.629%        |
| 14        | 17.623      | 2510          | 2516        | 2522         | rBV      | 1134517        | 1754281       | 15.45%          | 2.854%        |
| 15        | 17.958      | 2565          | 2573        | 2580         | rBV2     | 340071         | 534886        | 4.71%           | 0.870%        |
| 16        | 18.469      | 2655          | 2660        | 2670         | rBV2     | 171740         | 288632        | 2.54%           | 0.469%        |
| 17        | 19.309      | 2798          | 2803        | 2822         | rBV      | 1647818        | 2428548       | 21.39%          | 3.950%        |
| 18        | 19.662      | 2858          | 2863        | 2868         | rVB2     | 88572          | 124200        | 1.09%           | 0.202%        |
| 19        | 20.202      | 2949          | 2955        | 2962         | rBV      | 6279730        | 8767903       | 77.24%          | 14.262%       |
| 20        | 20.455      | 2993          | 2998        | 3003         | rBV6     | 67332          | 137366        | 1.21%           | 0.223%        |
| 21        | 20.813      | 3052          | 3059        | 3063         | rBV4     | 181456         | 290437        | 2.56%           | 0.472%        |
| 22        | 20.925      | 3072          | 3078        | 3083         | rBV4     | 74654          | 126607        | 1.12%           | 0.206%        |
| 23        | 21.495      | 3171          | 3175        | 3186         | rBV4     | 230498         | 402795        | 3.55%           | 0.655%        |
| 24        | 21.759      | 3215          | 3220        | 3225         | rVB      | 124284         | 191323        | 1.69%           | 0.311%        |
| 25        | 21.918      | 3240          | 3247        | 3254         | rBV      | 1381455        | 2358554       | 20.78%          | 3.836%        |
| 26        | 25.349      | 3820          | 3831        | 3844         | rVB2     | 745237         | 2350769       | 20.71%          | 3.824%        |

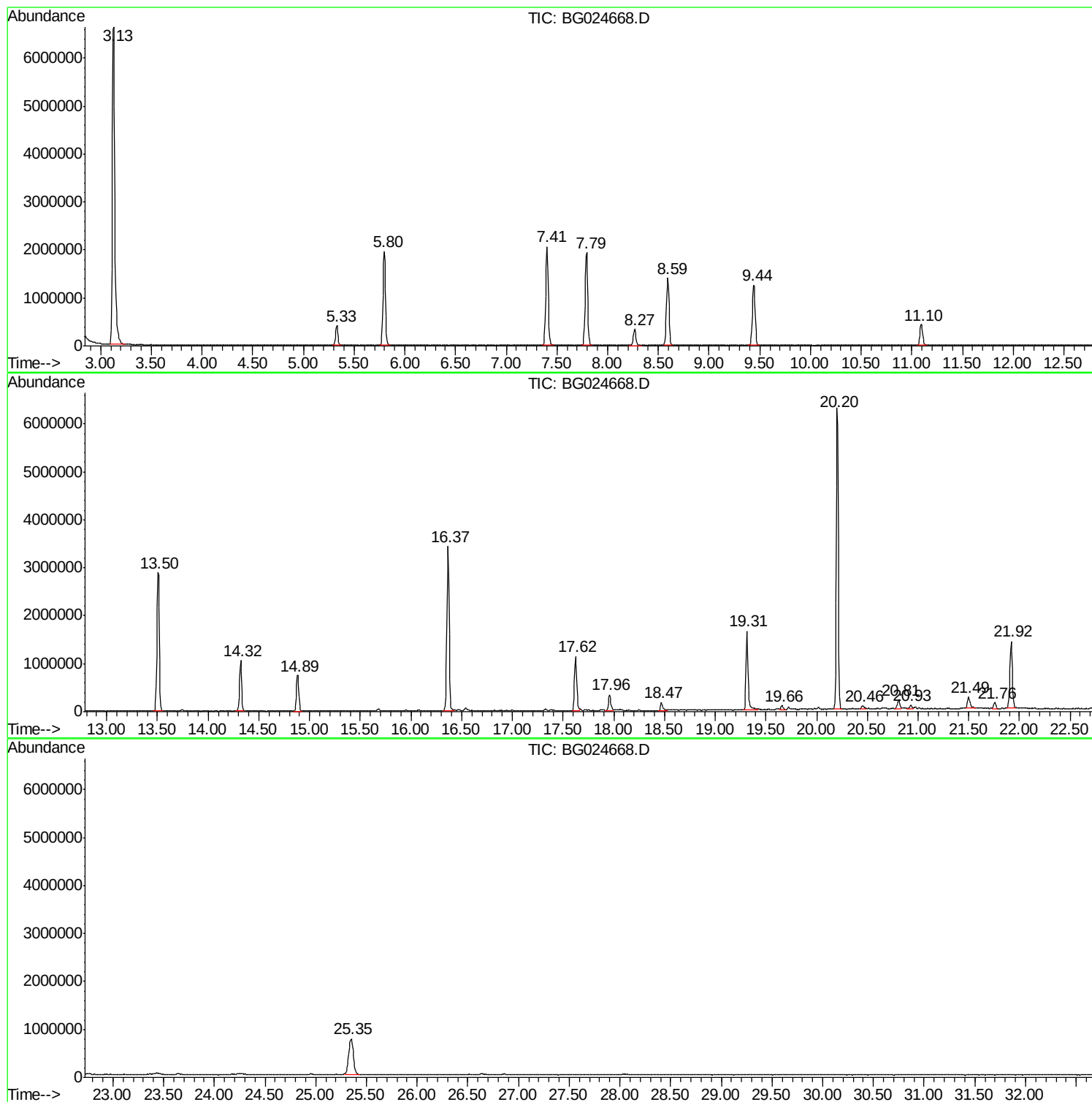
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ClientSampleId :  
SB-96-17.5-18.0

Quant Method : Z:\HPCHEM1\BNA\_G\METHODS\8270-BG102516.M  
Quant Title : ASP BNA STANDARDS FOR 5 POINT CALIBRATION

TIC Library : C:\DATABASE\NIST11.L  
TIC Integration Parameters: LSCINT.P



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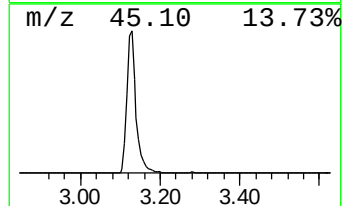
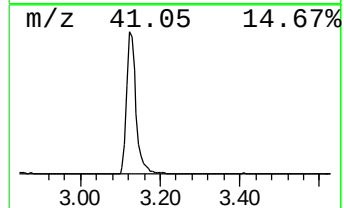
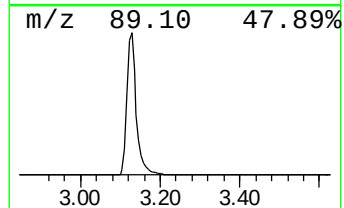
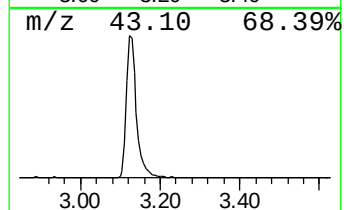
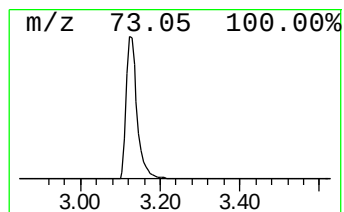
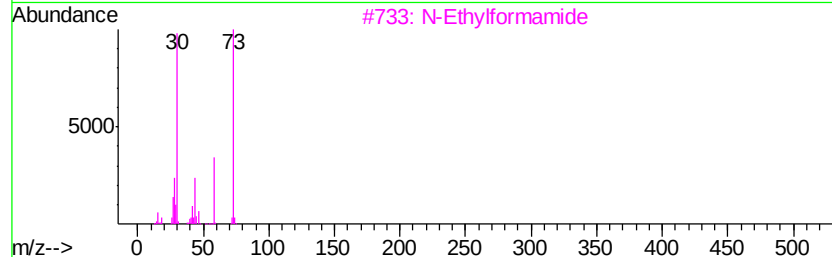
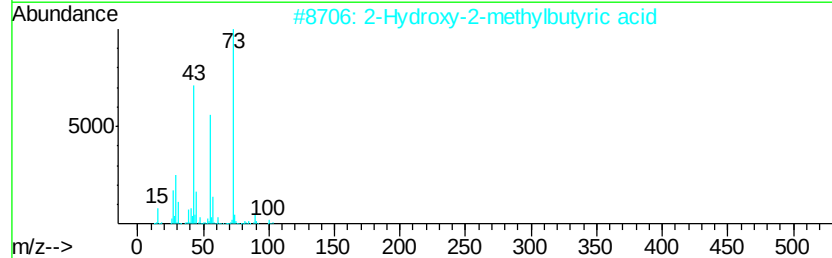
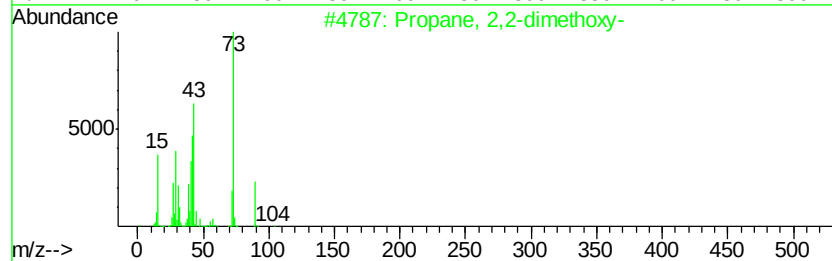
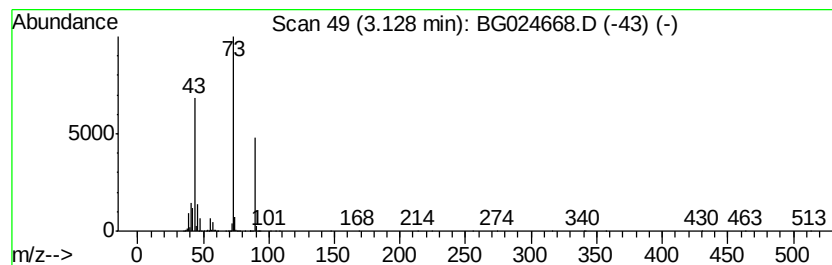
TIC Library : C:\DATABASE\NIST11.L  
TIC Integration Parameters: LSCINT.P

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Peak Number 1 unknown3.13 Concentration Rank 1

| R.T. | EstConc   | Area     | Relative to ISTD       | R.T. |
|------|-----------|----------|------------------------|------|
| 3.13 | 359.03 ng | 11351300 | 1,4-Dichlorobenzene-d4 | 8.26 |

| Hit# | of | Tentative ID                        | MW  | MolForm | CAS#         | Qual |
|------|----|-------------------------------------|-----|---------|--------------|------|
| 1    | 5  | Propane, 2,2-dimethoxy-             | 104 | C5H12O2 | 000077-76-9  | 28   |
| 2    |    | 2-Hydroxy-2-methylbutyric acid      | 118 | C5H10O3 | 003739-30-8  | 17   |
| 3    |    | N-Ethylformamide                    | 73  | C3H7NO  | 000627-45-2  | 9    |
| 4    |    | Acetamide, N-methyl-                | 73  | C3H7NO  | 000079-16-3  | 9    |
| 5    |    | 1-(2-Methoxyethoxy)-2-methyl-2-p... | 162 | C8H18O3 | 1000364-24-4 | 9    |



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Quant Title : ASP BNA STANDARDS FOR 5 POINT CALIBRATION

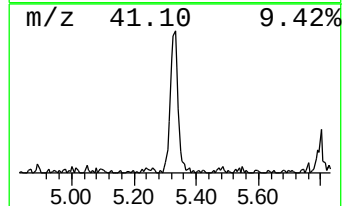
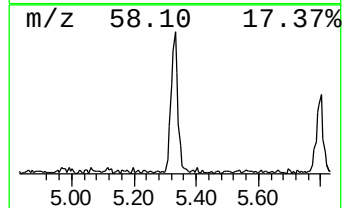
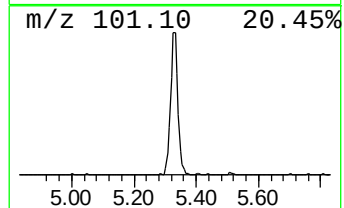
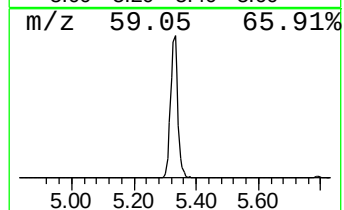
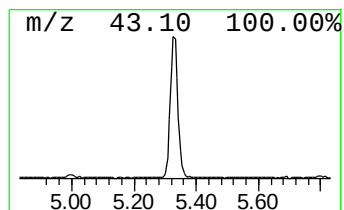
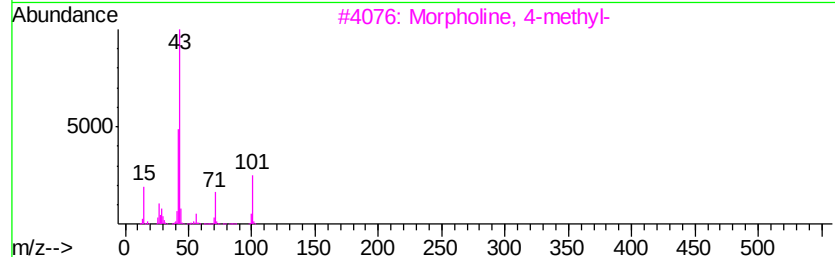
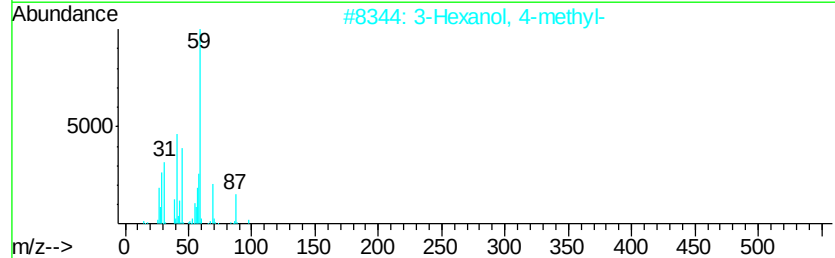
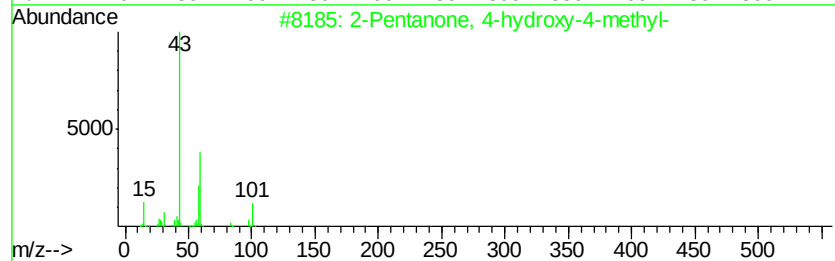
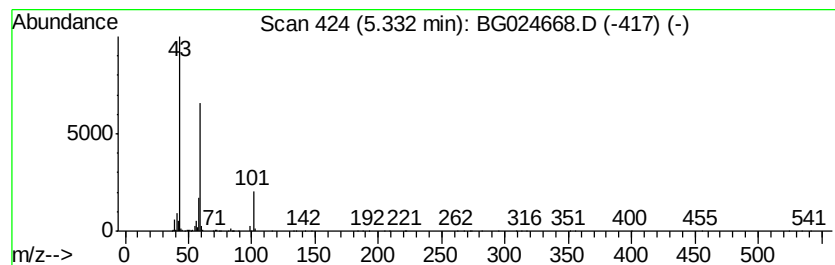
TIC Library : C:\DATABASE\NIST11.L  
TIC Integration Parameters: LSCINT.P

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Peak Number 2 2-Pentanone, 4-hydroxy-4-me... Concentration Rank 5

| R.T. | EstConc  | Area   | Relative to ISTD       | R.T. |
|------|----------|--------|------------------------|------|
| 5.33 | 21.55 ng | 681324 | 1,4-Dichlorobenzene-d4 | 8.26 |

| Hit# | of | Tentative ID                     | MW  | MolForm | CAS#        | Qual |
|------|----|----------------------------------|-----|---------|-------------|------|
| 1    | 5  | 2-Pentanone, 4-hydroxy-4-methyl- | 116 | C6H12O2 | 000123-42-2 | 50   |
| 2    |    | 3-Hexanol, 4-methyl-             | 116 | C7H16O  | 000615-29-2 | 25   |
| 3    |    | Morpholine, 4-methyl-            | 101 | C5H11NO | 000109-02-4 | 9    |
| 4    |    | 3-Heptadecanol                   | 256 | C17H36O | 084534-30-5 | 9    |
| 5    |    | 2,5,8,11-Tetraoxadodecane        | 178 | C8H18O4 | 000112-49-2 | 9    |



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Quant Method : Z:\HPCHEM1\BNA\_G\METHODS\8270-BG102516.M  
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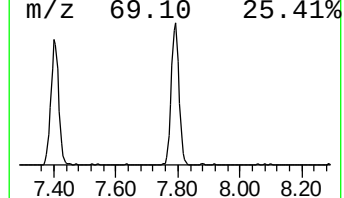
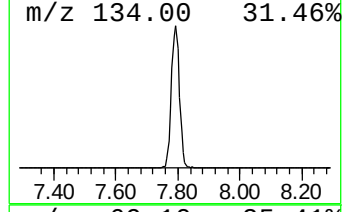
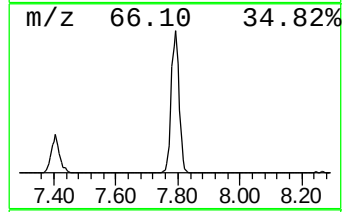
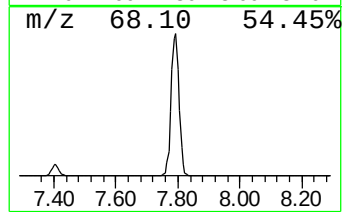
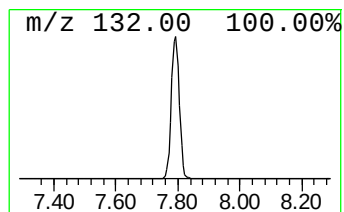
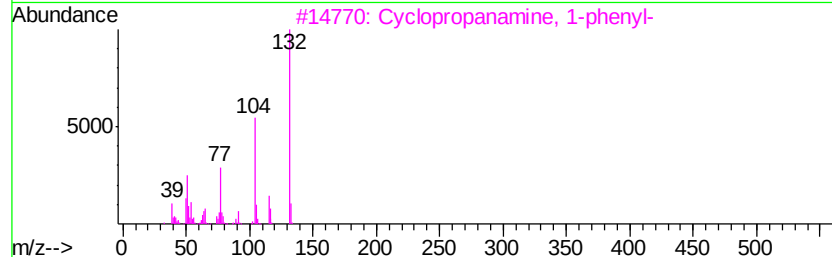
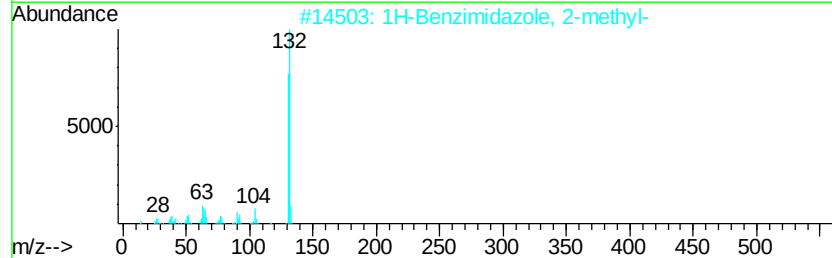
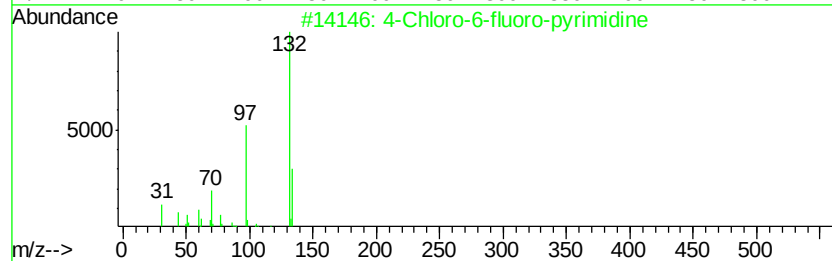
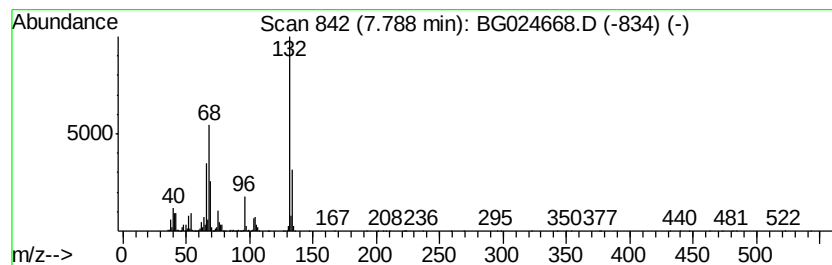
TIC Library : C:\DATABASE\NIST11.L  
TIC Integration Parameters: LSCINT.P

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Peak Number 3 unknown7.79 Concentration Rank 2

| R.T. | EstConc   | Area    | Relative to ISTD       | R.T. |
|------|-----------|---------|------------------------|------|
| 7.79 | 109.49 ng | 3461570 | 1,4-Dichlorobenzene-d4 | 8.26 |

| Hit# | of | Tentative ID                        | MW  | MolForm   | CAS#         | Qual |
|------|----|-------------------------------------|-----|-----------|--------------|------|
| 1    | 5  | 4-Chloro-6-fluoro-pyrimidine        | 132 | C4H2ClFN2 | 051422-01-6  | 27   |
| 2    |    | 1H-Benzimidazole, 2-methyl-         | 132 | C8H8N2    | 000615-15-6  | 22   |
| 3    |    | Cyclopropanamine, 1-phenyl-         | 133 | C9H11N    | 1000351-26-2 | 22   |
| 4    |    | 2H-Cyclopenta[d]pyridazine, 2-me... | 132 | C8H8N2    | 022291-85-6  | 16   |
| 5    |    | 3-(3,4-Dihydro-1H-isoquinolin-2-... | 377 | C24H27N03 | 1000295-80-7 | 12   |



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Quant Method : Z:\HPCHEM1\BNA\_G\METHODS\8270-BG102516.M  
Quant Title : ASP BNA STANDARDS FOR 5 POINT CALIBRATION

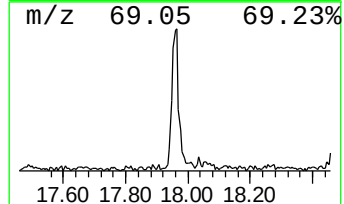
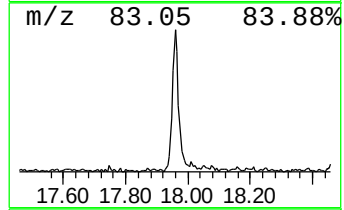
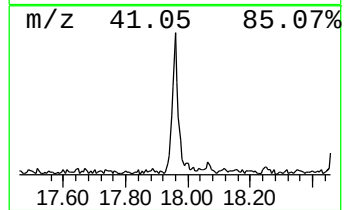
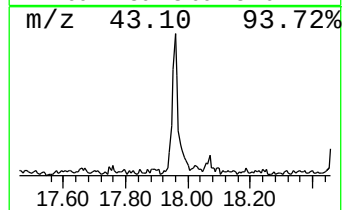
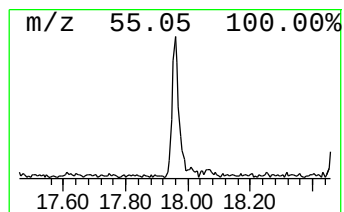
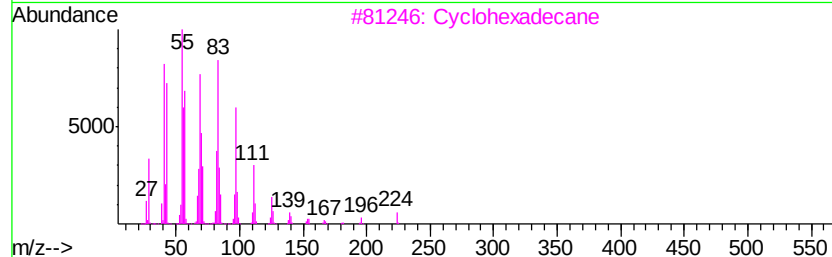
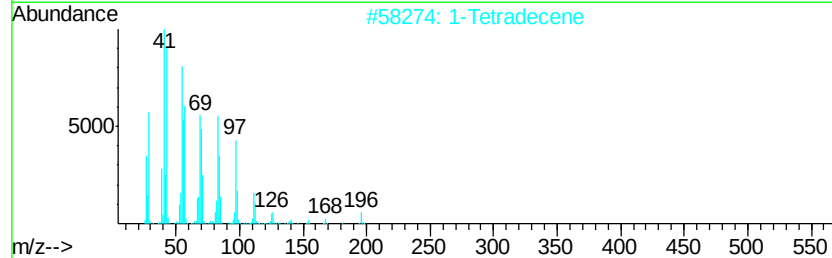
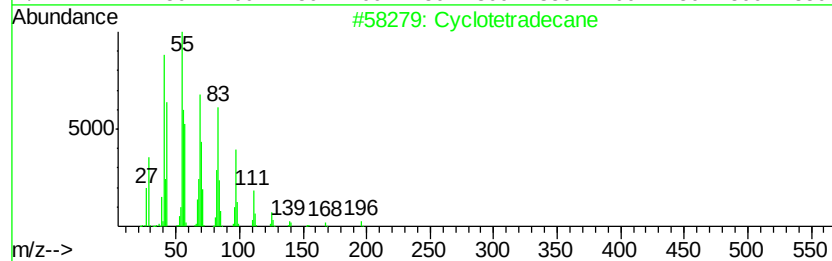
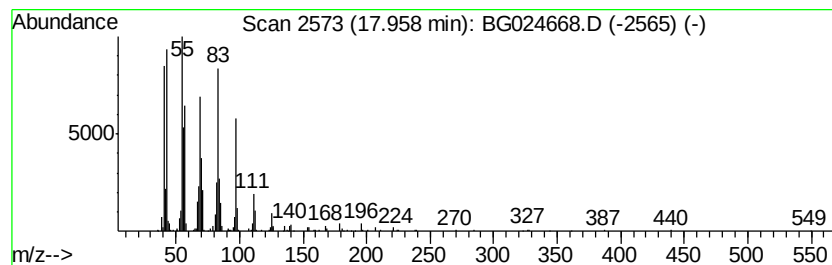
TIC Library : C:\DATABASE\NIST11.L  
TIC Integration Parameters: LSCINT.P

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Peak Number 5 Cyclotetradecane Concentration Rank 6

| R.T.  | EstConc | Area   | Relative to ISTD | R.T.  |
|-------|---------|--------|------------------|-------|
| 17.96 | 6.10 ng | 534886 | Phenanthrene-d10 | 17.62 |

| Hit# of | 5 | Tentative ID        | MW  | MolForm | CAS#        | Qual |
|---------|---|---------------------|-----|---------|-------------|------|
| 1       |   | Cyclotetradecane    | 196 | C14H28  | 000295-17-0 | 96   |
| 2       |   | 1-Tetradecene       | 196 | C14H28  | 001120-36-1 | 93   |
| 3       |   | Cyclohexadecane     | 224 | C16H32  | 000295-65-8 | 91   |
| 4       |   | 7-Tetradecene, (E)- | 196 | C14H28  | 041446-63-3 | 87   |
| 5       |   | 1-Hexadecanol       | 242 | C16H34O | 036653-82-4 | 70   |



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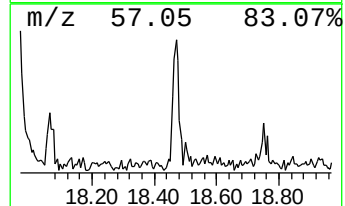
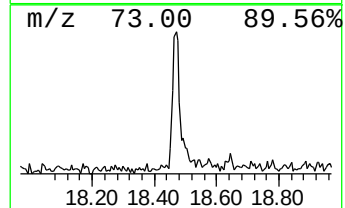
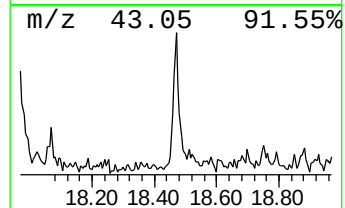
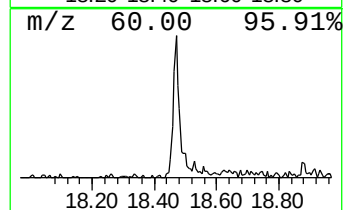
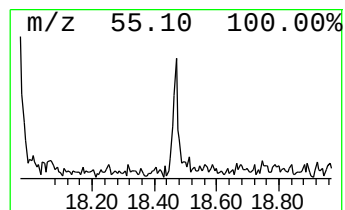
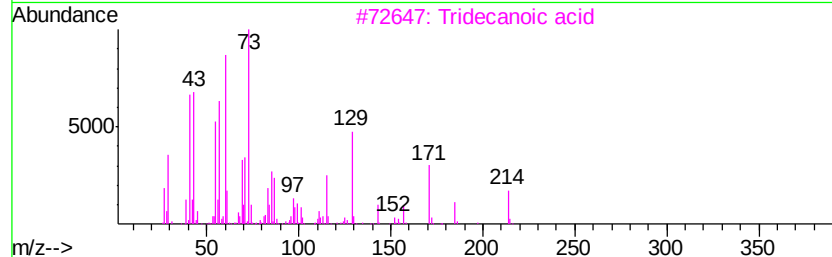
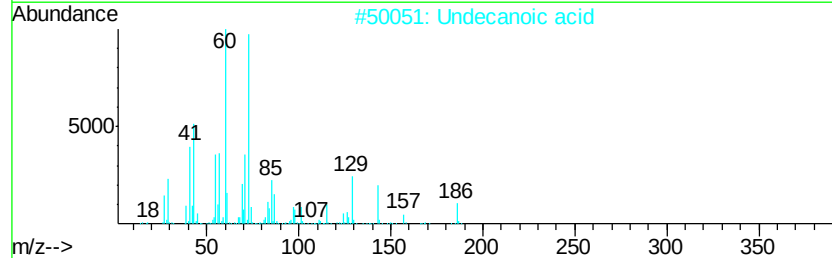
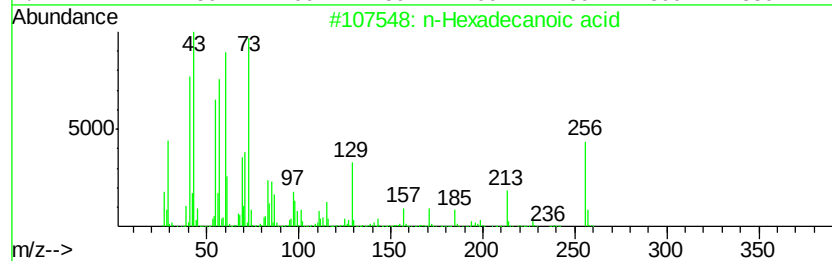
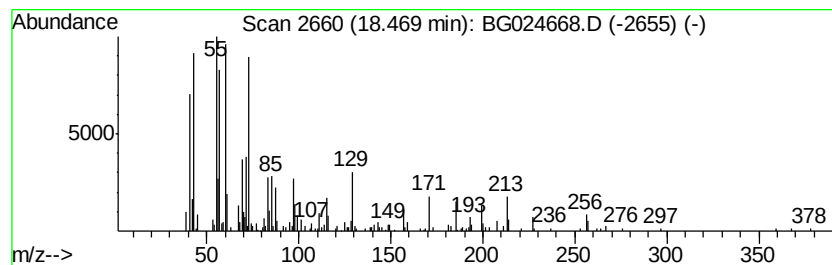
Instrument :  
BNA\_G  
ClientSampleId :  
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TIC Library : C:\DATABASE\NIST11.L  
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Peak Number 6 n-Hexadecanoic acid Concentration Rank 8

| R.T.    | EstConc | Area                | Relative to ISTD | R.T.           |
|---------|---------|---------------------|------------------|----------------|
| 18.47   | 3.29 ng | 288632              | Phenanthrene-d10 | 17.62          |
| Hit# of | 5       | Tentative ID        | MW MolForm       | CAS# Qual      |
| 1       |         | n-Hexadecanoic acid | 256 C16H32O2     | 000057-10-3 91 |
| 2       |         | Undecanoic acid     | 186 C11H22O2     | 000112-37-8 83 |
| 3       |         | Tridecanoic acid    | 214 C13H26O2     | 000638-53-9 78 |
| 4       |         | Dodecanoic acid     | 200 C12H24O2     | 000143-07-7 72 |
| 5       |         | n-Decanoic acid     | 172 C10H20O2     | 000334-48-5 64 |



Data Path : Z:\HPCHEM1\BNA\_G\DATA\BG110316\  
Data File : BG024668.D  
Acq On : 4 Nov 2016 4:49  
Operator : UM/SJ  
Sample : H5509-12  
Misc :  
ALS Vial : 38 Sample Multiplier: 1

Instrument :  
BNA\_G  
ClientSampleId :  
SB-96-17.5-18.0

Quant Method : Z:\HPCHEM1\BNA\_G\METHODS\8270-BG102516.M  
Quant Title : ASP BNA STANDARDS FOR 5 POINT CALIBRATION

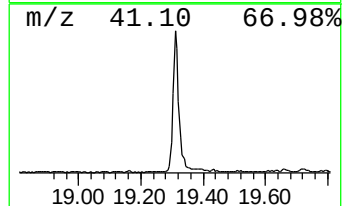
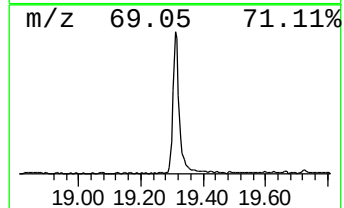
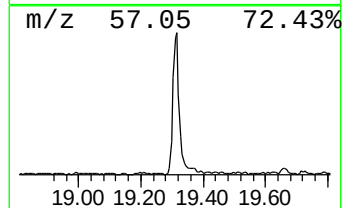
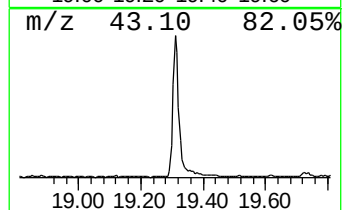
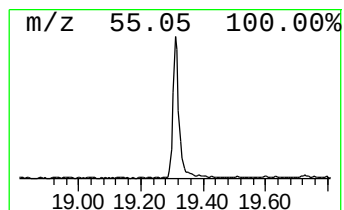
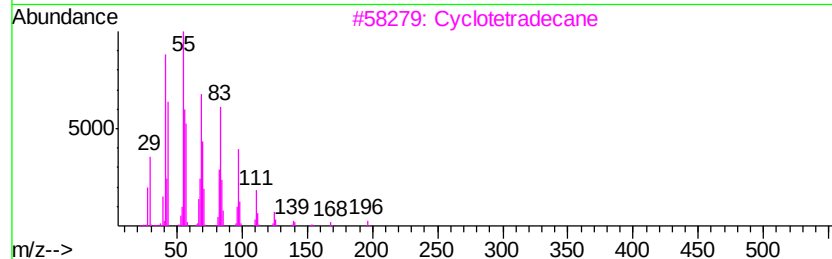
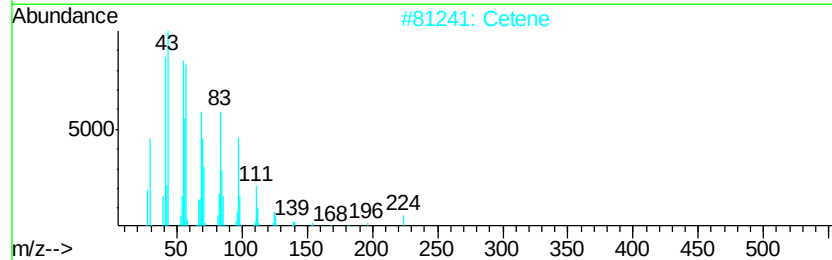
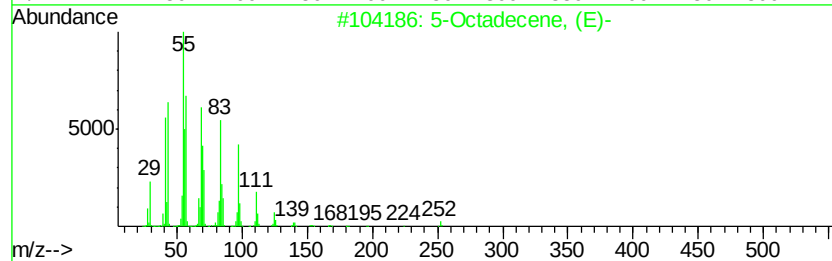
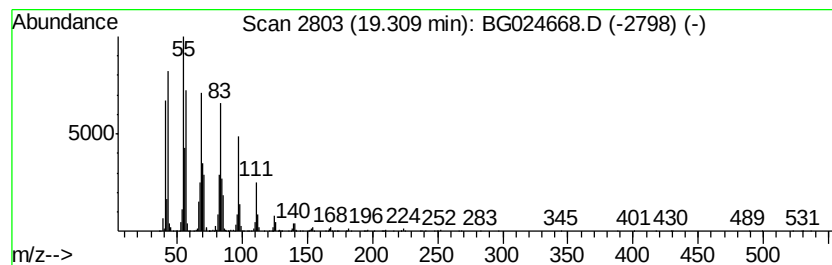
TIC Library : C:\DATABASE\NIST11.L  
TIC Integration Parameters: LSCINT.P

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Peak Number 7 5-Octadecene, (E)- Concentration Rank 4

| R.T.  | EstConc  | Area    | Relative to ISTD | R.T.  |
|-------|----------|---------|------------------|-------|
| 19.31 | 27.69 ng | 2428550 | Phenanthrene-d10 | 17.62 |

| Hit# | of | Tentative ID                | MW  | MolForm    | CAS#        | Qual |
|------|----|-----------------------------|-----|------------|-------------|------|
| 1    | 5  | 5-Octadecene, (E)-          | 252 | C18H36     | 007206-21-5 | 98   |
| 2    |    | Cetene                      | 224 | C16H32     | 000629-73-2 | 98   |
| 3    |    | Cyclotetradecane            | 196 | C14H28     | 000295-17-0 | 95   |
| 4    |    | 1-Hexadecanol               | 242 | C16H34O    | 036653-82-4 | 94   |
| 5    |    | Tetradecyl trifluoroacetate | 310 | C16H29F3O2 | 006222-02-2 | 91   |





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Data File : BG024668.D  
Acq On : 4 Nov 2016 4:49  
Operator : UM/SJ  
Sample : H5509-12  
Misc :  
ALS Vial : 38 Sample Multiplier: 1

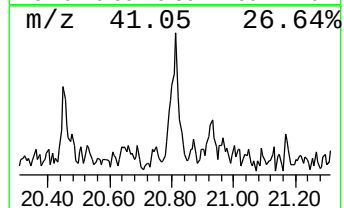
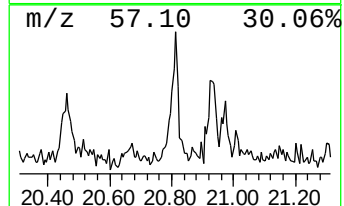
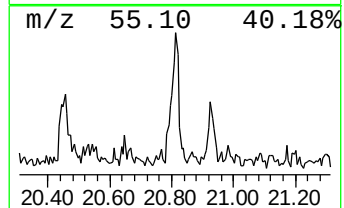
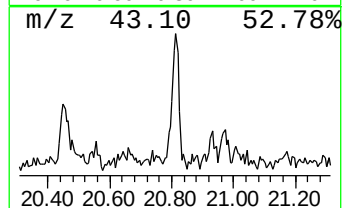
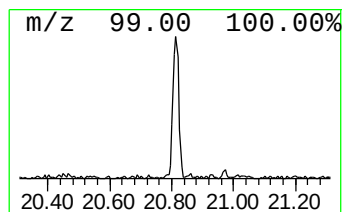
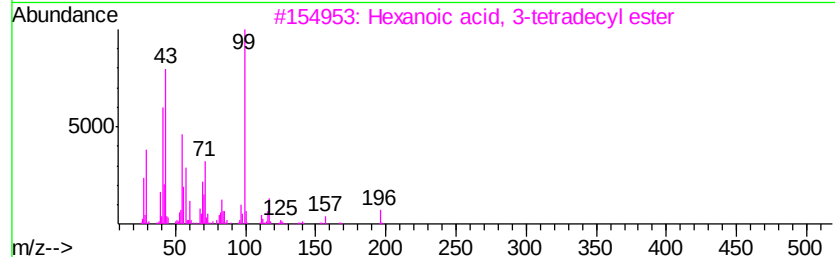
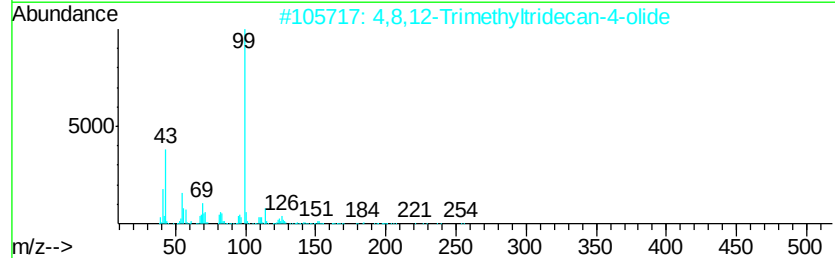
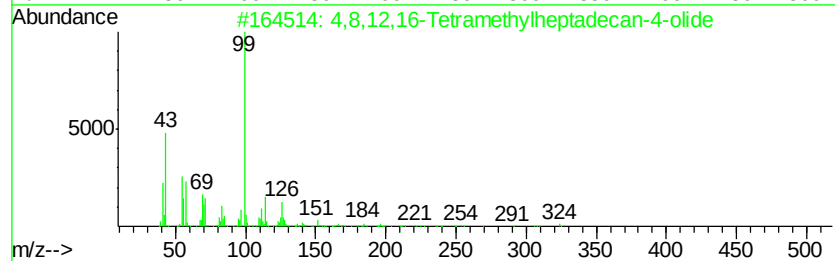
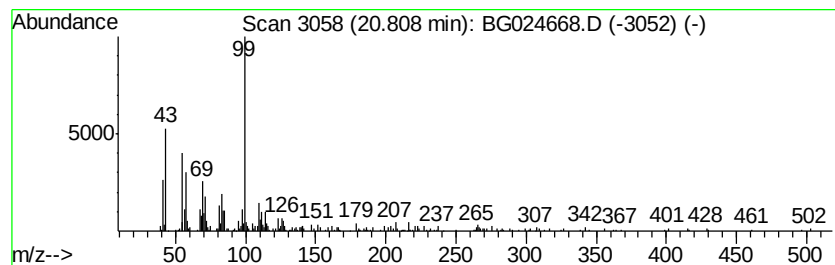
Instrument :  
BNA\_G  
ClientSampleId :  
SB-96-17.5-18.0

Quant Method : Z:\HPCHEM1\BNA\_G\METHODS\8270-BG102516.M  
Quant Title : ASP BNA STANDARDS FOR 5 POINT CALIBRATION

TIC Library : C:\DATABASE\NIST11.L  
TIC Integration Parameters: LSCINT.P

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Peak Number 8 4,8,12,16-Tetramethylheptad... Concentration Rank 9

| R.T.      | EstConc                             | Area   | Relative to ISTD | R.T.         |      |
|-----------|-------------------------------------|--------|------------------|--------------|------|
| 20.81     | 2.46 ng                             | 290437 | Chrysene-d12     | 21.92        |      |
| Hit# of 5 | Tentative ID                        | MW     | MolForm          | CAS#         | Qual |
| 1         | 4,8,12,16-Tetramethylheptadecan-... | 324    | C21H40O2         | 096168-15-9  | 80   |
| 2         | 4,8,12-Trimethyltridecan-4-olide    | 254    | C16H30O2         | 220904-24-5  | 50   |
| 3         | Hexanoic acid, 3-tetradecyl ester   | 312    | C20H40O2         | 1000279-29-7 | 47   |
| 4         | Hexanoic acid, 4-hexadecyl ester    | 340    | C22H44O2         | 1000282-83-8 | 47   |
| 5         | Tripropyl phosphate                 | 224    | C9H21O4P         | 000513-08-6  | 47   |



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Operator : UM/SJ  
Sample : H5509-12  
Misc :  
ALS Vial : 38 Sample Multiplier: 1

Instrument :  
BNA\_G  
ClientSampleId :  
SB-96-17.5-18.0

Quant Method : Z:\HPCHEM1\BNA\_G\METHODS\8270-BG102516.M  
Quant Title : ASP BNA STANDARDS FOR 5 POINT CALIBRATION

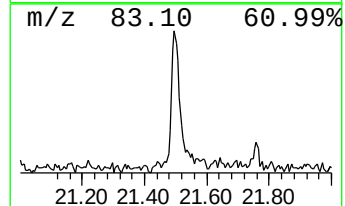
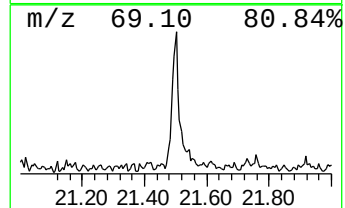
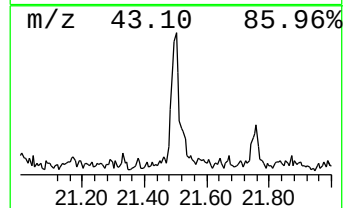
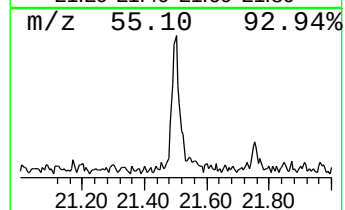
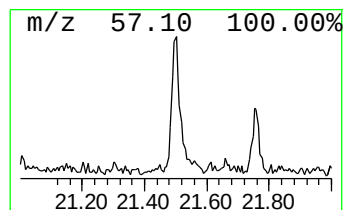
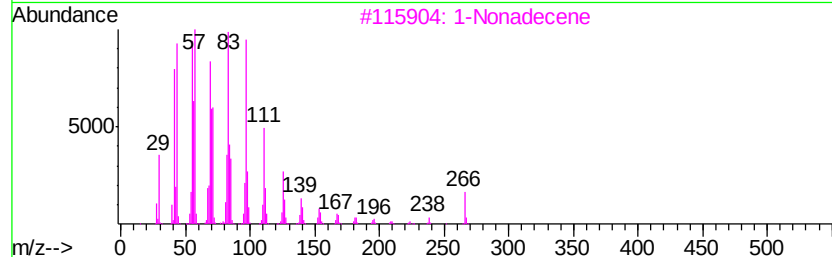
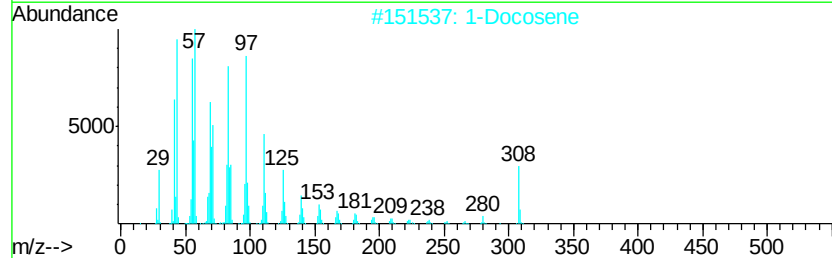
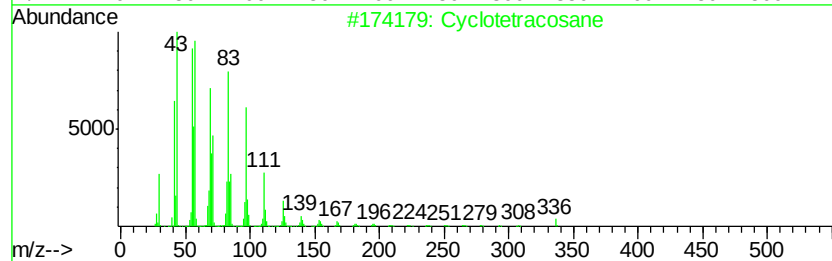
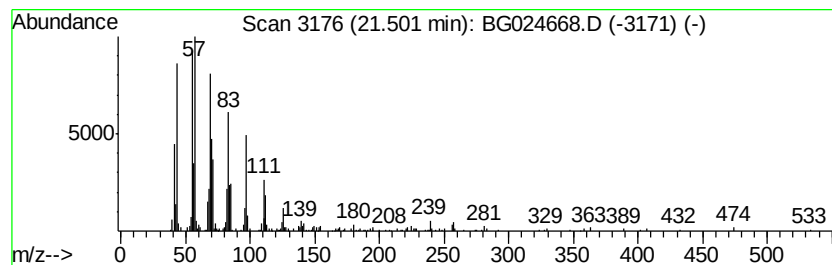
TIC Library : C:\DATABASE\NIST11.L  
TIC Integration Parameters: LSCINT.P

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Peak Number 9 Cyclotetracosane Concentration Rank 7

| R.T.  | EstConc | Area   | Relative to ISTD | R.T.  |
|-------|---------|--------|------------------|-------|
| 21.50 | 3.42 ng | 402795 | Chrysene-d12     | 21.92 |

| Hit# of | 5 | Tentative ID                        | MW  | MolForm    | CAS#         | Qual |
|---------|---|-------------------------------------|-----|------------|--------------|------|
| 1       |   | Cyclotetracosane                    | 336 | C24H48     | 000297-03-0  | 94   |
| 2       |   | 1-Docosene                          | 308 | C22H44     | 001599-67-3  | 94   |
| 3       |   | 1-Nonadecene                        | 266 | C19H38     | 018435-45-5  | 91   |
| 4       |   | Acetic acid, chloro-, octadecyl ... | 346 | C20H39ClO2 | 005348-82-3  | 90   |
| 5       |   | Z-5-Nonadecene                      | 266 | C19H38     | 1000131-11-8 | 87   |



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Sample : H5509-12  
Misc :  
ALS Vial : 38 Sample Multiplier: 1

Instrument :  
BNA\_G  
ClientSampleId :  
SB-96-17.5-18.0

Quant Method : Z:\HPCHEM1\BNA\_G\METHODS\8270-BG102516.M  
Quant Title : ASP BNA STANDARDS FOR 5 POINT CALIBRATION

TIC Library : C:\DATABASE\NIST11.L  
TIC Integration Parameters: LSCINT.P

| TIC Top Hit name     | RT    | EstConc | Units | Response | ---Internal Standard--- |       |         |      |
|----------------------|-------|---------|-------|----------|-------------------------|-------|---------|------|
|                      |       |         |       |          | #                       | RT    | Resp    | Conc |
| unknown3.13          | 3.13  | 359.0   | ng    | 11351300 | 1                       | 8.26  | 632330  | 20.0 |
| 2-Pentanone, 4-hy... | 5.33  | 21.6    | ng    | 681324   | 1                       | 8.26  | 632330  | 20.0 |
| unknown7.79          | 7.79  | 109.5   | ng    | 3461570  | 1                       | 8.26  | 632330  | 20.0 |
| Cyclotetradecane     | 17.96 | 6.1     | ng    | 534886   | 4                       | 17.62 | 1754280 | 20.0 |
| n-Hexadecanoic acid  | 18.47 | 3.3     | ng    | 288632   | 4                       | 17.62 | 1754280 | 20.0 |
| 5-Octadecene, (E)-   | 19.31 | 27.7    | ng    | 2428550  | 4                       | 17.62 | 1754280 | 20.0 |
| 4,8,12,16-Tetrame... | 20.81 | 2.5     | ng    | 290437   | 5                       | 21.92 | 2358550 | 20.0 |
| Cyclotetracosane     | 21.50 | 3.4     | ng    | 402795   | 5                       | 21.92 | 2358550 | 20.0 |