

Data Path : Z:\SVOASRV\HPCHEM1\BNA G\DATA\BG120118\  
 Data File : BG038287.D  
 Acq On : 1 Dec 2018 14:47  
 Operator : JU/SJ  
 Sample : PB115178BS  
 Misc :  
 ALS Vial : 3 Sample Multiplier: 1

Instrument :  
 BNA\_G  
 ClientSampleId :  
 PB115178BS

Manual Integrations  
 APPROVED

mohammad  
 12/3/2018 5:13:20 PM

Quant Time: Dec 03 06:44:52 2018  
 Quant Method : Z:\SVOASRV\HPCHEM1\BNA G\METHODS\8270-BG111318.M  
 Quant Title : ASP BNA STANDARDS FOR 5 POINT CALIBRATION  
 QLast Update : Tue Nov 13 16:39:28 2018  
 Response via : Initial Calibration

| Internal Standards        | R.T.  | QIon | Response | Conc  | Units | Dev(Min) |
|---------------------------|-------|------|----------|-------|-------|----------|
| 1) 1,4-Dichlorobenzene-d4 | 8.08  | 152  | 26727    | 20.00 | ng    | -0.01    |
| 21) Naphthalene-d8        | 10.90 | 136  | 113696   | 20.00 | ng    | -0.01    |
| 39) Acenaphthene-d10      | 14.71 | 164  | 73408    | 20.00 | ng    | -0.01    |
| 64) Phenanthrene-d10      | 17.46 | 188  | 181192   | 20.00 | ng    | -0.01    |
| 76) Chrysene-d12          | 21.74 | 240  | 172202   | 20.00 | ng    | -0.01    |
| 87) Perylene-d12          | 25.06 | 264  | 178643   | 20.00 | ng    | -0.02    |

|                             |       |     |        |        |    |       |
|-----------------------------|-------|-----|--------|--------|----|-------|
| System Monitoring Compounds |       |     |        |        |    |       |
| 5) 2-Fluorophenol           | 5.62  | 112 | 172579 | 111.49 | ng | -0.01 |
| 7) Phenol-d6                | 7.23  | 99  | 240262 | 108.73 | ng | 0.00  |
| 23) Nitrobenzene-d5         | 9.25  | 82  | 150601 | 70.91  | ng | -0.01 |
| 42) 2,4,6-Tribromophenol    | 16.20 | 330 | 100417 | 119.94 | ng | -0.01 |
| 45) 2-Fluorobiphenyl        | 13.34 | 172 | 352456 | 69.95  | ng | -0.01 |
| 79) Terphenyl-d14           | 20.06 | 244 | 607801 | 83.05  | ng | -0.01 |

|                                |       |     |        |        |    |      |
|--------------------------------|-------|-----|--------|--------|----|------|
| Target Compounds               |       |     |        | Qvalue |    |      |
| 2) 1,4-Dioxane                 | 3.51  | 88  | 21068  | 28.814 | ng | # 94 |
| 3) Pyridine                    | 3.91  | 79  | 60118  | 28.823 | ng | 90   |
| 4) n-Nitrosodimethylamine      | 3.84  | 42  | 35087  | 46.369 | ng | 83   |
| 6) Aniline                     | 7.40  | 93  | 56824  | 19.925 | ng | 97   |
| 8) 2-Chlorophenol              | 7.64  | 128 | 72868  | 40.568 | ng | 99   |
| 9) Benzaldehyde                | 7.22  | 77  | 43362  | 27.136 | ng | 95   |
| 10) Phenol                     | 7.25  | 94  | 96450  | 41.209 | ng | 93   |
| 11) bis(2-Chloroethyl)ether    | 7.50  | 93  | 66850  | 34.986 | ng | 97   |
| 12) 1,3-Dichlorobenzene        | 7.96  | 146 | 72043  | 34.816 | ng | 97   |
| 13) 1,4-Dichlorobenzene        | 8.11  | 146 | 74103  | 35.452 | ng | 98   |
| 14) 1,2-Dichlorobenzene        | 8.43  | 146 | 70935  | 35.545 | ng | 97   |
| 15) Benzyl Alcohol             | 8.32  | 79  | 68228  | 42.672 | ng | 95   |
| 16) 2,2'-oxybis(1-Chloropropan | 8.59  | 45  | 153354 | 43.222 | ng | 95   |
| 17) 2-Methylphenol             | 8.51  | 107 | 64988  | 41.070 | ng | # 91 |
| 18) Hexachloroethane           | 9.16  | 117 | 27676  | 36.381 | ng | 88   |
| 19) n-Nitroso-di-n-propylamine | 8.88  | 70  | 57724  | 36.103 | ng | 89   |
| 20) 3+4-Methylphenols          | 8.84  | 107 | 91954  | 40.993 | ng | 95   |
| 22) Acetophenone               | 8.91  | 105 | 108363 | 38.307 | ng | # 94 |
| 24) Nitrobenzene               | 9.29  | 77  | 87488  | 40.266 | ng | 98   |
| 25) Isophorone                 | 9.81  | 82  | 168395 | 44.049 | ng | 98   |
| 26) 2-Nitrophenol              | 10.00 | 139 | 42353  | 39.047 | ng | 90   |
| 27) 2,4-Dimethylphenol         | 10.05 | 122 | 77978  | 47.714 | ng | 99   |
| 28) bis(2-Chloroethoxy)methane | 10.29 | 93  | 97581  | 39.918 | ng | 98   |
| 29) 2,4-Dichlorophenol         | 10.54 | 162 | 78917  | 42.931 | ng | 95   |
| 30) 1,2,4-Trichlorobenzene     | 10.75 | 180 | 76712  | 37.241 | ng | 96   |
| 31) Naphthalene                | 10.94 | 128 | 229279 | 41.000 | ng | 99   |
| 32) Benzoic acid               | 10.18 | 122 | 34627  | 36.784 | ng | 97   |
| 33) 4-Chloroaniline            | 11.06 | 127 | 36301  | 13.955 | ng | 97   |
| 34) Hexachlorobutadiene        | 11.21 | 225 | 46598  | 36.756 | ng | 97   |
| 35) Caprolactam                | 11.84 | 113 | 30984m | 42.110 | ng |      |
| 36) 4-Chloro-3-methylphenol    | 12.17 | 107 | 89112  | 44.372 | ng | 95   |
| 37) 2-Methylnaphthalene        | 12.54 | 142 | 171518 | 42.700 | ng | 96   |
| 38) 1-Methylnaphthalene        | 12.77 | 142 | 162447 | 42.014 | ng | 99   |
| 40) 1,2,4,5-Tetrachlorobenzene | 12.91 | 216 | 89756  | 36.591 | ng | 97   |

Data Path : Z:\SVOASRV\HPCHEM1\BNA G\DATA\BG120118\  
 Data File : BG038287.D  
 Acq On : 1 Dec 2018 14:47  
 Operator : JU/SJ  
 Sample : PB115178BS  
 Misc :  
 ALS Vial : 3 Sample Multiplier: 1

Instrument :  
 BNA\_G  
 ClientSampleId :  
 PB115178BS

Manual Integrations  
 APPROVED

mohammad  
 12/3/2018 5:13:20 PM

Quant Time: Dec 03 06:44:52 2018  
 Quant Method : Z:\SVOASRV\HPCHEM1\BNA G\METHODS\8270-BG111318.M  
 Quant Title : ASP BNA STANDARDS FOR 5 POINT CALIBRATION  
 QLast Update : Tue Nov 13 16:39:28 2018  
 Response via : Initial Calibration

| Internal Standards             | R.T.  | QIon | Response | Conc   | Units | Dev(Min) |
|--------------------------------|-------|------|----------|--------|-------|----------|
| 41) Hexachlorocyclopentadiene  | 12.87 | 237  | 105920   | 80.639 | nq    | 98       |
| 43) 2,4,6-Trichlorophenol      | 13.15 | 196  | 65782    | 39.354 | nq    | 96       |
| 44) 2,4,5-Trichlorophenol      | 13.22 | 196  | 73727    | 41.920 | nq    | 95       |
| 46) 1,1'-Biphenyl              | 13.55 | 154  | 222590   | 36.093 | nq    | 99       |
| 47) 2-Chloronaphthalene        | 13.59 | 162  | 178282   | 37.884 | nq    | 99       |
| 48) 2-Nitroaniline             | 13.81 | 65   | 65195    | 44.018 | nq    | 97       |
| 49) Acenaphthylene             | 14.44 | 152  | 297822   | 42.084 | nq    | 99       |
| 50) Dimethylphthalate          | 14.16 | 163  | 246394   | 42.339 | nq    | 99       |
| 51) 2,6-Dinitrotoluene         | 14.29 | 165  | 54921    | 41.697 | nq    | 90       |
| 52) Acenaphthene               | 14.78 | 154  | 168996   | 39.667 | nq    | 98       |
| 53) 3-Nitroaniline             | 14.63 | 138  | 25402    | 17.478 | nq    | # 96     |
| 54) 2,4-Dinitrophenol          | 14.83 | 184  | 67689    | 93.455 | nq    | # 82     |
| 55) Dibenzofuran               | 15.11 | 168  | 281029   | 39.892 | nq    | 96       |
| 56) 4-Nitrophenol              | 14.92 | 139  | 96221    | 85.839 | nq    | 83       |
| 57) 2,4-Dinitrotoluene         | 15.08 | 165  | 79942    | 44.609 | nq    | 96       |
| 58) Fluorene                   | 15.76 | 166  | 230165   | 43.789 | nq    | 99       |
| 59) 2,3,4,6-Tetrachlorophenol  | 15.33 | 232  | 67842    | 46.098 | nq    | 97       |
| 60) Diethylphthalate           | 15.52 | 149  | 259786   | 42.028 | nq    | 98       |
| 61) 4-Chlorophenyl-phenylether | 15.74 | 204  | 120597   | 39.211 | nq    | 99       |
| 62) 4-Nitroaniline             | 15.79 | 138  | 59244    | 41.033 | nq    | 92       |
| 63) Azobenzene                 | 16.04 | 77   | 237372   | 42.950 | nq    | 97       |
| 65) 4,6-Dinitro-2-methylphenol | 15.84 | 198  | 48387    | 42.221 | nq    | 93       |
| 66) n-Nitrosodiphenylamine     | 15.96 | 169  | 212916   | 38.842 | nq    | 99       |
| 67) 4-Bromophenyl-phenylether  | 16.64 | 248  | 79348    | 39.899 | nq    | 97       |
| 68) Hexachlorobenzene          | 16.76 | 284  | 81857    | 39.876 | nq    | 96       |
| 69) Atrazine                   | 16.90 | 200  | 85537    | 42.331 | nq    | 98       |
| 70) Pentachlorophenol          | 17.10 | 266  | 101221   | 72.603 | nq    | 92       |
| 71) Phenanthrene               | 17.50 | 178  | 400923   | 43.218 | nq    | 98       |
| 72) Anthracene                 | 17.60 | 178  | 410479   | 44.888 | nq    | 99       |
| 73) Carbazole                  | 17.87 | 167  | 372130   | 40.561 | nq    | 100      |
| 74) Di-n-butylphthalate        | 18.40 | 149  | 455649   | 44.243 | nq    | 98       |
| 75) Fluoranthene               | 19.51 | 202  | 488117   | 46.118 | nq    | 98       |
| 77) Benzidine                  | 19.69 | 184  | 160530   | 26.567 | nq    | 99       |
| 78) Pyrene                     | 19.88 | 202  | 490076   | 43.529 | nq    | 96       |
| 80) Butylbenzylphthalate       | 20.74 | 149  | 203983   | 41.430 | nq    | 98       |
| 81) Benzo(a)anthracene         | 21.72 | 228  | 445666   | 42.826 | nq    | 99       |
| 82) 3,3'-Dichlorobenzidine     | 21.64 | 252  | 79200    | 19.538 | nq    | 99       |
| 83) Chrysene                   | 21.79 | 228  | 414857   | 41.666 | nq    | 98       |
| 84) Bis(2-ethylhexyl)phthalate | 21.59 | 149  | 286971   | 40.870 | nq    | 98       |
| 85) Di-n-octyl phthalate       | 22.82 | 149  | 486922   | 42.865 | nq    | 98       |
| 86) Indeno(1,2,3-cd)pyrene     | 28.86 | 276  | 489727   | 44.286 | nq    | # 97     |
| 88) Benzo(b)fluoranthene       | 23.99 | 252  | 430882   | 43.830 | nq    | 97       |
| 89) Benzo(k)fluoranthene       | 24.06 | 252  | 426369   | 43.953 | nq    | 99       |
| 90) Benzo(a)pyrene             | 24.90 | 252  | 424759   | 45.211 | nq    | 99       |
| 91) Dibenzo(a,h)anthracene     | 28.93 | 278  | 404058   | 44.698 | nq    | 99       |
| 92) Benzo(g,h,i)perylene       | 30.06 | 276  | 403997   | 44.947 | nq    | 97       |

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

