

Data Path : Z:\VOASRV\HPCHEM1\MSVOA X\DATA\VX081319\  
 Data File : VX011524.D  
 Acq On : 13 Aug 2019 10:09  
 Operator : JC/SP  
 Sample : VSTDCCC050  
 Misc : 5.0mL/MSVOA X/WATER  
 ALS Vial : 2 Sample Multiplier: 1

Instrument :  
 MSVOA\_X  
 LabSampleId :  
 VSTDCCC050

Quant Time: Aug 14 01:18:32 2019  
 Quant Method : Z:\VOASRV\HPCHEM1\MSVOA\_X\METHOD\82X080119W.M  
 Quant Title : SW846 8260  
 QLast Update : Fri Aug 02 01:55:00 2019  
 Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min  
 Max. RRF Dev : 20% Max. Rel. Area : 150%

|       | Compound                    | AvqRF | CCRF  | %Dev  | Area% | Dev(min) |
|-------|-----------------------------|-------|-------|-------|-------|----------|
| 1 I   | Pentafluorobenzene          | 1.000 | 1.000 | 0.0   | 121   | 0.00     |
| 2 T   | Dichlorodifluoromethane     | 0.386 | 0.340 | 11.9  | 108   | 0.00     |
| 3 P   | Chloromethane               | 0.434 | 0.343 | 21.0# | 99    | 0.00     |
| 4 C   | Vinyl Chloride              | 0.477 | 0.384 | 19.5# | 98    | 0.00     |
| 5 T   | Bromomethane                | 0.340 | 0.291 | 14.4  | 106   | 0.00     |
| 6 T   | Chloroethane                | 0.335 | 0.255 | 23.9# | 98    | 0.00     |
| 7 T   | Trichlorofluoromethane      | 0.848 | 0.726 | 14.4  | 102   | 0.00     |
| 8 T   | Diethyl Ether               | 0.303 | 0.250 | 17.5  | 104   | 0.00     |
| 9 T   | 1,1,2-Trichlorotrifluoroeth | 0.459 | 0.438 | 4.6   | 117   | 0.00     |
| 10 T  | Methyl Iodide               | 0.579 | 0.520 | 10.2  | 100   | 0.00     |
| 11 T  | Tert butyl alcohol          | 0.106 | 0.091 | 14.2  | 107   | 0.00     |
| 12 CM | 1,1-Dichloroethene          | 0.455 | 0.399 | 12.3# | 108   | 0.00     |
| 13 T  | Acrolein                    | 0.066 | 0.057 | 13.6  | 112   | 0.00     |
| 14 T  | Allyl chloride              | 0.606 | 0.620 | -2.3  | 118   | 0.00     |
| 15 T  | Acrylonitrile               | 0.240 | 0.228 | 5.0   | 111   | 0.00     |
| 16 T  | Acetone                     | 0.240 | 0.256 | -6.7  | 131   | 0.00     |
| 17 T  | Carbon Disulfide            | 1.068 | 0.884 | 17.2  | 98    | 0.00     |
| 18 T  | Methyl Acetate              | 0.548 | 0.546 | 0.4   | 123   | 0.00     |
| 19 T  | Methyl tert-butyl Ether     | 1.341 | 1.380 | -2.9  | 122   | 0.00     |
| 20 T  | Methylene Chloride          | 0.525 | 0.462 | 12.0  | 111   | 0.00     |
| 21 T  | trans-1,2-Dichloroethene    | 0.481 | 0.433 | 10.0  | 107   | 0.00     |
| 22 T  | Diisopropyl ether           | 1.333 | 1.338 | -0.4  | 122   | 0.00     |
| 23 T  | Vinyl Acetate               | 1.106 | 1.161 | -5.0  | 118   | 0.00     |
| 24 P  | 1,1-Dichloroethane          | 0.786 | 0.765 | 2.7   | 118   | 0.00     |
| 25 T  | 2-Butanone                  | 0.341 | 0.338 | 0.9   | 117   | 0.00     |
| 26 T  | 2,2-Dichloropropane         | 0.611 | 0.673 | -10.1 | 129   | 0.00     |
| 27 T  | cis-1,2-Dichloroethene      | 0.554 | 0.518 | 6.5   | 115   | 0.00     |
| 28 T  | Bromochloromethane          | 0.358 | 0.372 | -3.9  | 132   | 0.00     |
| 29 T  | Tetrahydrofuran             | 0.209 | 0.197 | 5.7   | 110   | 0.00     |
| 30 C  | Chloroform                  | 0.854 | 0.868 | -1.6# | 124   | 0.00     |
| 31 T  | Cyclohexane                 | 0.648 | 0.604 | 6.8   | 111   | -0.01    |
| 32 T  | 1,1,1-Trichloroethane       | 0.732 | 0.763 | -4.2  | 124   | 0.00     |
| 33 S  | 1,2-Dichloroethane-d4       | 0.504 | 0.579 | -14.9 | 147   | 0.00     |
| 34 I  | 1,4-Difluorobenzene         | 1.000 | 1.000 | 0.0   | 119   | 0.00     |
| 35 S  | Dibromofluoromethane        | 0.326 | 0.349 | -7.1  | 131   | 0.00     |
| 36 T  | 1,1-Dichloropropene         | 0.437 | 0.422 | 3.4   | 116   | 0.00     |
| 37 T  | Ethyl Acetate               | 0.438 | 0.427 | 2.5   | 116   | 0.00     |
| 38 T  | Carbon Tetrachloride        | 0.439 | 0.475 | -8.2  | 124   | -0.01    |
| 39 T  | Methylcyclohexane           | 0.517 | 0.479 | 7.4   | 111   | 0.00     |
| 40 TM | Benzene                     | 1.303 | 1.267 | 2.8   | 113   | 0.00     |
| 41 T  | Methacrylonitrile           | 0.239 | 0.237 | 0.8   | 116   | 0.00     |
| 42 TM | 1,2-Dichloroethane          | 0.441 | 0.479 | -8.6  | 131   | 0.00     |
| 43 T  | Isopropyl Acetate           | 0.700 | 0.707 | -1.0  | 119   | 0.00     |
| 44 TM | Trichloroethene             | 0.394 | 0.372 | 5.6   | 113   | 0.00     |
| 45 C  | 1,2-Dichloropropane         | 0.337 | 0.324 | 3.9#  | 115   | 0.00     |

Data Path : Z:\VOASRV\HPCHEM1\MSVOA X\DATA\VX081319\  
 Data File : VX011524.D  
 Acq On : 13 Aug 2019 10:09  
 Operator : JC/SP  
 Sample : VSTDCCC050  
 Misc : 5.0mL/MSVOA X/WATER  
 ALS Vial : 2 Sample Multiplier: 1

Instrument :  
 MSVOA\_X  
 LabSampleId :  
 VSTDCCC050

Quant Time: Aug 14 01:18:32 2019  
 Quant Method : Z:\VOASRV\HPCHEM1\MSVOA\_X\METHOD\82X080119W.M  
 Quant Title : SW846 8260  
 QLast Update : Fri Aug 02 01:55:00 2019  
 Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min  
 Max. RRF Dev : 20% Max. Rel. Area : 150%

|       | Compound                    | AvqRF | CCRF  | %Dev  | Area% | Dev(min) |
|-------|-----------------------------|-------|-------|-------|-------|----------|
| 46 T  | Dibromomethane              | 0.246 | 0.238 | 3.3   | 117   | 0.00     |
| 47 T  | Bromodichloromethane        | 0.417 | 0.450 | -7.9  | 125   | 0.00     |
| 48 T  | Methyl methacrylate         | 0.329 | 0.349 | -6.1  | 123   | 0.00     |
| 49 T  | 1,4-Dioxane                 | 0.010 | 0.008 | 20.0  | 98    | 0.00     |
| 50 S  | Toluene-d8                  | 1.232 | 1.293 | -5.0  | 129   | 0.00     |
| 51 T  | 4-Methyl-2-Pentanone        | 0.452 | 0.459 | -1.5  | 115   | 0.00     |
| 52 CM | Toluene                     | 0.861 | 0.849 | 1.4#  | 115   | 0.00     |
| 53 T  | t-1,3-Dichloropropene       | 0.423 | 0.492 | -16.3 | 125   | 0.00     |
| 54 T  | cis-1,3-Dichloropropene     | 0.487 | 0.531 | -9.0  | 120   | 0.00     |
| 55 T  | 1,1,2-Trichloroethane       | 0.354 | 0.361 | -2.0  | 119   | 0.00     |
| 56 T  | Ethyl methacrylate          | 0.505 | 0.531 | -5.1  | 119   | 0.00     |
| 57 T  | 1,3-Dichloropropane         | 0.560 | 0.566 | -1.1  | 120   | 0.00     |
| 58 T  | 2-Chloroethyl Vinyl ether   | 0.248 | 0.259 | -4.4  | 120   | 0.00     |
| 59 T  | 2-Hexanone                  | 0.350 | 0.356 | -1.7  | 112   | 0.00     |
| 60 T  | Dibromochloromethane        | 0.363 | 0.395 | -8.8  | 122   | 0.00     |
| 61 T  | 1,2-Dibromoethane           | 0.383 | 0.386 | -0.8  | 117   | 0.00     |
| 62 S  | 4-Bromofluorobenzene        | 0.440 | 0.487 | -10.7 | 134   | 0.00     |
| 63 I  | Chlorobenzene-d5            | 1.000 | 1.000 | 0.0   | 122   | 0.00     |
| 64 T  | Tetrachloroethene           | 0.425 | 0.401 | 5.6   | 118   | 0.00     |
| 65 PM | Chlorobenzene               | 1.072 | 1.027 | 4.2   | 117   | 0.00     |
| 66 T  | 1,1,1,2-Tetrachloroethane   | 0.367 | 0.395 | -7.6  | 123   | 0.00     |
| 67 C  | Ethyl Benzene               | 1.795 | 1.801 | -0.3# | 119   | 0.00     |
| 68 T  | m/p-Xylenes                 | 0.694 | 0.685 | 1.3   | 115   | 0.00     |
| 69 T  | o-Xylene                    | 0.682 | 0.663 | 2.8   | 116   | 0.00     |
| 70 T  | Styrene                     | 1.129 | 1.137 | -0.7  | 115   | 0.00     |
| 71 P  | Bromoform                   | 0.285 | 0.307 | -7.7  | 117   | 0.00     |
| 72 I  | 1,4-Dichlorobenzene-d4      | 1.000 | 1.000 | 0.0   | 117   | 0.00     |
| 73 T  | Isopropylbenzene            | 3.420 | 3.512 | -2.7  | 119   | 0.00     |
| 74 T  | N-amyl acetate              | 1.236 | 1.270 | -2.8  | 111   | 0.00     |
| 75 P  | 1,1,2,2-Tetrachloroethane   | 1.140 | 1.073 | 5.9   | 109   | 0.00     |
| 76 T  | 1,2,3-Trichloropropane      | 0.911 | 0.954 | -4.7  | 118   | 0.00     |
| 77 T  | Bromobenzene                | 0.948 | 0.921 | 2.8   | 113   | 0.00     |
| 78 T  | n-propylbenzene             | 3.803 | 3.921 | -3.1  | 118   | 0.00     |
| 79 T  | 2-Chlorotoluene             | 2.267 | 2.312 | -2.0  | 120   | 0.00     |
| 80 T  | 1,3,5-Trimethylbenzene      | 2.863 | 2.928 | -2.3  | 118   | 0.00     |
| 81 T  | trans-1,4-Dichloro-2-butene | 0.312 | 0.318 | -1.9  | 111   | 0.00     |
| 82 T  | 4-Chlorotoluene             | 2.642 | 2.687 | -1.7  | 118   | 0.00     |
| 83 T  | tert-Butylbenzene           | 2.808 | 2.894 | -3.1  | 118   | 0.00     |
| 84 T  | 1,2,4-Trimethylbenzene      | 2.850 | 2.958 | -3.8  | 116   | 0.00     |
| 85 T  | sec-Butylbenzene            | 3.373 | 3.450 | -2.3  | 117   | 0.00     |
| 86 T  | p-Isopropyltoluene          | 3.103 | 3.209 | -3.4  | 117   | 0.00     |
| 87 T  | 1,3-Dichlorobenzene         | 1.675 | 1.647 | 1.7   | 113   | 0.00     |
| 88 T  | 1,4-Dichlorobenzene         | 1.728 | 1.655 | 4.2   | 112   | 0.00     |
| 89 T  | n-Butylbenzene              | 2.674 | 2.784 | -4.1  | 117   | 0.00     |

Data Path : Z:\VOASRV\HPCHEM1\MSVOA X\DATA\VX081319\  
Data File : VX011524.D  
Acq On : 13 Aug 2019 10:09  
Operator : JC/SP  
Sample : VSTDCCC050  
Misc : 5.0mL/MSVOA X/WATER  
ALS Vial : 2 Sample Multiplier: 1

Instrument :  
MSVOA\_X  
LabSampleId :  
VSTDCCC050

Quant Time: Aug 14 01:18:32 2019  
Quant Method : Z:\VOASRV\HPCHEM1\MSVOA\_X\METHOD\82X080119W.M  
Quant Title : SW846 8260  
QLast Update : Fri Aug 02 01:55:00 2019  
Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min  
Max. RRF Dev : 20% Max. Rel. Area : 150%

|      | Compound                    | AvgRF | CCRF  | %Dev | Area% | Dev(min) |
|------|-----------------------------|-------|-------|------|-------|----------|
| 90 T | Hexachloroethane            | 0.459 | 0.503 | -9.6 | 118   | 0.00     |
| 91 T | 1,2-Dichlorobenzene         | 1.683 | 1.623 | 3.6  | 111   | 0.00     |
| 92 T | 1,2-Dibromo-3-Chloropropane | 0.221 | 0.228 | -3.2 | 113   | 0.00     |
| 93 T | 1,2,4-Trichlorobenzene      | 1.116 | 1.106 | 0.9  | 111   | 0.00     |
| 94 T | Hexachlorobutadiene         | 0.566 | 0.568 | -0.4 | 116   | 0.00     |
| 95 T | Naphthalene                 | 3.265 | 3.291 | -0.8 | 109   | 0.00     |
| 96 T | 1,2,3-Trichlorobenzene      | 1.135 | 1.108 | 2.4  | 111   | 0.00     |

(#) = Out of Range

SPCC's out = 0 CCC's out = 6