

Data Path : Z:\VOASRV\HPCHEM1\MSVOA U\DATA\VU080119\  
 Data File : VU033545.D  
 Acq On : 01 Aug 2019 13:34  
 Operator : JC/SP  
 Sample : VSTDCCC050  
 Misc : 5.0mL/MSVOA U/WATER  
 ALS Vial : 13 Sample Multiplier: 1

Instrument :  
 MSVOA\_U  
 ClientSampleId :  
 VSTD05044

Quant Time: Aug 02 01:55:35 2019  
 Quant Method : Z:\VOASRV\HPCHEM1\MSVOA\_U\METHOD\SOMULM073119WMA.M  
 Quant Title : VOC Analysis  
 QLast Update : Fri Aug 02 01:49:55 2019  
 Response via : Initial Calibration

| Internal Standards         | R.T.  | QIon | Response | Conc  | Units | Dev(Min) |
|----------------------------|-------|------|----------|-------|-------|----------|
| 1) 1,4-Difluorobenzene     | 5.86  | 114  | 304715   | 50.00 | ug/L  | 0.00     |
| 28) Chlorobenzene-d5       | 9.07  | 117  | 302309   | 50.00 | ug/L  | 0.00     |
| 60) 1,4-Dichlorobenzene-d4 | 11.47 | 152  | 163393   | 50.00 | ug/L  | 0.00     |

## System Monitoring Compounds

|                                |         |       |          |          |      |         |
|--------------------------------|---------|-------|----------|----------|------|---------|
| 4) Vinyl Chloride-d3           | 1.39    | 65    | 91667    | 41.38    | ug/L | 0.00    |
| Spiked Amount                  | 50.000  | Range | 60 - 135 | Recovery | =    | 82.76%  |
| 7) Chloroethane-d5             | 1.67    | 69    | 93004    | 48.93    | ug/L | 0.00    |
| Spiked Amount                  | 50.000  | Range | 70 - 130 | Recovery | =    | 97.86%  |
| 11) 1,1-Dichloroethene-d2      | 2.26    | 63    | 189178   | 47.05    | ug/L | 0.00    |
| Spiked Amount                  | 50.000  | Range | 60 - 125 | Recovery | =    | 94.10%  |
| 21) 2-Butanone-d5              | 4.15    | 46    | 161084   | 109.78   | ug/L | 0.00    |
| Spiked Amount                  | 100.000 | Range | 40 - 130 | Recovery | =    | 109.78% |
| 24) Chloroform-d               | 4.62    | 84    | 184183   | 49.60    | ug/L | 0.00    |
| Spiked Amount                  | 50.000  | Range | 70 - 125 | Recovery | =    | 99.20%  |
| 26) 1,2-Dichloroethane-d4      | 5.29    | 65    | 113483   | 48.25    | ug/L | 0.00    |
| Spiked Amount                  | 50.000  | Range | 70 - 125 | Recovery | =    | 96.50%  |
| 32) Benzene-d6                 | 5.32    | 84    | 350133   | 46.72    | ug/L | 0.00    |
| Spiked Amount                  | 50.000  | Range | 70 - 125 | Recovery | =    | 93.44%  |
| 36) 1,2-Dichloropropane-d6     | 6.31    | 67    | 114434   | 48.71    | ug/L | 0.00    |
| Spiked Amount                  | 50.000  | Range | 70 - 120 | Recovery | =    | 97.42%  |
| 41) Toluene-d8                 | 7.55    | 98    | 327889   | 46.69    | ug/L | 0.00    |
| Spiked Amount                  | 50.000  | Range | 80 - 120 | Recovery | =    | 93.38%  |
| 43) trans-1,3-Dichloropropene- | 7.83    | 79    | 55315    | 47.47    | ug/L | 0.00    |
| Spiked Amount                  | 50.000  | Range | 60 - 125 | Recovery | =    | 94.94%  |
| 47) 2-Hexanone-d5              | 8.29    | 63    | 118960   | 106.66   | ug/L | 0.00    |
| Spiked Amount                  | 100.000 | Range | 45 - 130 | Recovery | =    | 106.66% |
| 57) 1,1,2,2-Tetrachloroethane- | 10.41   | 84    | 182788   | 50.46    | ug/L | 0.00    |
| Spiked Amount                  | 50.000  | Range | 65 - 120 | Recovery | =    | 100.92% |
| 64) 1,2-Dichlorobenzene-d4     | 11.85   | 152   | 140298   | 46.89    | ug/L | 0.00    |
| Spiked Amount                  | 50.000  | Range | 80 - 120 | Recovery | =    | 93.78%  |

## Target Compounds

|                                |      |     |        |         | Ovalue   |
|--------------------------------|------|-----|--------|---------|----------|
| 2) Dichlorodifluoromethane     | 1.20 | 85  | 142166 | 49.474  | ug/L 98  |
| 3) Chloromethane               | 1.32 | 50  | 146549 | 50.631  | ug/L 100 |
| 5) Vinyl chloride              | 1.40 | 62  | 155963 | 50.264  | ug/L 99  |
| 6) Bromomethane                | 1.62 | 94  | 130759 | 47.762  | ug/L 97  |
| 8) Chloroethane                | 1.69 | 64  | 99739  | 52.899  | ug/L 96  |
| 9) Trichlorofluoromethane      | 1.87 | 101 | 206514 | 50.879  | ug/L 100 |
| 10) 1,1,2-Trichloro-1,2,2-trif | 2.27 | 101 | 106941 | 51.971  | ug/L 99  |
| 12) 1,1-Dichloroethene         | 2.27 | 96  | 100964 | 51.165  | ug/L 95  |
| 13) Acetone                    | 2.32 | 43  | 169209 | 112.712 | ug/L 99  |
| 14) Carbon disulfide           | 2.46 | 76  | 296340 | 47.880  | ug/L 99  |
| 15) Methyl Acetate             | 2.60 | 43  | 127305 | 53.264  | ug/L 100 |
| 16) Methylene chloride         | 2.68 | 84  | 116999 | 51.908  | ug/L 99  |
| 17) trans-1,2-Dichloroethene   | 2.96 | 96  | 103801 | 50.209  | ug/L 97  |
| 18) Methyl tert-butyl Ether    | 2.98 | 73  | 327874 | 52.006  | ug/L 100 |
| 19) 1,1-Dichloroethane         | 3.42 | 63  | 201956 | 52.043  | ug/L 99  |
| 20) cis-1,2-Dichloroethene     | 4.20 | 96  | 117328 | 50.561  | ug/L 99  |
| 22) 2-Butanone                 | 4.24 | 43  | 205488 | 114.654 | ug/L 98  |

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 VSTD05044

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 Quant Title : VOC Analysis  
 QLast Update : Fri Aug 02 01:49:55 2019  
 Response via : Initial Calibration

| Internal Standards              | R.T.  | QIon | Response | Conc    | Units | Dev(Min) |
|---------------------------------|-------|------|----------|---------|-------|----------|
| 23) Bromochloromethane          | 4.52  | 128  | 62156    | 51.337  | ug/L  | 98       |
| 25) Chloroform                  | 4.65  | 83   | 207704   | 50.861  | ug/L  | 100      |
| 27) 1,2-Dichloroethane          | 5.38  | 62   | 164808   | 52.412  | ug/L  | 100      |
| 29) Cyclohexane                 | 4.97  | 56   | 166860   | 50.602  | ug/L  | 99       |
| 30) 1,1,1-Trichloroethane       | 4.89  | 97   | 176487   | 50.737  | ug/L  | 99       |
| 31) Carbon tetrachloride        | 5.11  | 117  | 155373   | 51.292  | ug/L  | 100      |
| 33) Benzene                     | 5.37  | 78   | 448283   | 51.402  | ug/L  | 100      |
| 34) Trichloroethene             | 6.16  | 95   | 113818   | 49.475  | ug/L  | 98       |
| 35) Methylcyclohexane           | 6.40  | 83   | 180581   | 50.302  | ug/L  | 98       |
| 37) 1,2-Dichloropropane         | 6.41  | 63   | 120134   | 51.462  | ug/L  | 100      |
| 38) Bromodichloromethane        | 6.74  | 83   | 156347   | 51.809  | ug/L  | 99       |
| 39) cis-1,3-Dichloropropene     | 7.25  | 75   | 190047   | 52.160  | ug/L  | 98       |
| 40) 4-Methyl-2-pentanone        | 7.44  | 43   | 351562   | 109.077 | ug/L  | 99       |
| 42) Toluene                     | 7.62  | 91   | 492376   | 52.505  | ug/L  | 98       |
| 44) trans-1,3-Dichloropropene   | 7.86  | 75   | 169692   | 51.535  | ug/L  | 99       |
| 45) 1,1,2-Trichloroethane       | 8.05  | 97   | 115789   | 52.248  | ug/L  | 99       |
| 46) Tetrachloroethene           | 8.21  | 164  | 94048    | 50.075  | ug/L  | 98       |
| 48) 2-Hexanone                  | 8.34  | 43   | 285455   | 109.570 | ug/L  | 99       |
| 49) Dibromochloromethane        | 8.46  | 129  | 130195   | 51.637  | ug/L  | 99       |
| 50) 1,2-Dibromoethane           | 8.57  | 107  | 125284   | 51.036  | ug/L  | 99       |
| 51) Chlorobenzene               | 9.10  | 112  | 310563   | 50.584  | ug/L  | 98       |
| 52) Ethylbenzene                | 9.23  | 91   | 522469   | 51.740  | ug/L  | 99       |
| 53) m,p-Xylene                  | 9.36  | 106  | 200757   | 51.787  | ug/L  | 96       |
| 54) o-xylene                    | 9.76  | 106  | 196408   | 52.229  | ug/L  | 99       |
| 55) Styrene                     | 9.77  | 104  | 345437   | 54.086  | ug/L  | 98       |
| 56) Isopropylbenzene            | 10.15 | 105  | 511144   | 52.022  | ug/L  | 100      |
| 58) 1,1,1,2,2-Tetrachloroethane | 10.44 | 83   | 207132   | 51.820  | ug/L  | 99       |
| 59) 1,2,3-Trichloropropane      | 10.48 | 75   | 159642   | 51.810  | ug/L  | 99       |
| 61) Bromoform                   | 9.94  | 173  | 100611   | 50.975  | ug/L  | 100      |
| 62) 1,3-Dichlorobenzene         | 11.40 | 146  | 252935   | 50.405  | ug/L  | 99       |
| 63) 1,4-Dichlorobenzene         | 11.49 | 146  | 257705   | 49.432  | ug/L  | 98       |
| 65) 1,2-Dichlorobenzene         | 11.86 | 146  | 254894   | 50.238  | ug/L  | 98       |
| 66) 1,2-Dibromo-3-chloropropan  | 12.64 | 75   | 47372    | 50.535  | ug/L  | 98       |
| 67) 1,3,5-Trichlorobenzene      | 12.87 | 180  | 193974   | 47.914  | ug/L  | 98       |
| 68) 1,2,4-trichlorobenzene      | 13.49 | 180  | 166621   | 48.168  | ug/L  | 98       |
| 69) Naphthalene                 | 13.73 | 128  | 496307   | 50.008  | ug/L  | 100      |
| 70) 1,2,3-Trichlorobenzene      | 13.97 | 180  | 178684   | 49.116  | ug/L  | 98       |

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

