

Data Path : Z:\VOASRV\HPCHEM1\MSVOA U\DATA\VU062518\  
 Data File : VU024892.D  
 Acq On : 25 Jun 2018 22:36  
 Operator : MD/SY  
 Sample : VSTDCCC050  
 Misc : 5.0mL/MSVOA U/WATER  
 ALS Vial : 30 Sample Multiplier: 1

Instrument :  
 MSVOA\_U  
 ClientSampleId :  
 VSTDCCC050

Manual Integrations  
 APPROVED

apatel  
 6/27/2018 11:20:19 AM

Quant Time: Jun 26 07:40:21 2018  
 Quant Method : Z:\VOASRV\HPCHEM1\MSVOA\_U\METHOD\82U061318W.M  
 Quant Title : SW846 8260  
 QLast Update : Wed Jun 13 13:55:26 2018  
 Response via : Initial Calibration

| Internal Standards         | R.T.  | QIon | Response | Conc  | Units | Dev(Min) |
|----------------------------|-------|------|----------|-------|-------|----------|
| 1) Pentafluorobenzene      | 4.99  | 168  | 171048   | 50.00 | ug/l  | 0.00     |
| 34) 1,4-Difluorobenzene    | 5.89  | 114  | 268587   | 50.00 | ug/l  | 0.00     |
| 63) Chlorobenzene-d5       | 9.09  | 117  | 255848   | 50.00 | ug/l  | 0.00     |
| 72) 1,4-Dichlorobenzene-d4 | 11.49 | 152  | 156920   | 50.00 | ug/l  | 0.00     |

| System Monitoring Compounds | R.T.  | QIon | Response   | Conc   | Units | Dev(Min) |
|-----------------------------|-------|------|------------|--------|-------|----------|
| 33) 1,2-Dichloroethane-d4   | 5.31  | 65   | 135902     | 48.67  | ug/l  | 0.00     |
| Spiked Amount 50.000        |       |      | Recovery = | 97.34% |       |          |
| 35) Dibromofluoromethane    | 4.89  | 113  | 107782     | 48.35  | ug/l  | 0.00     |
| Spiked Amount 50.000        |       |      | Recovery = | 96.70% |       |          |
| 50) Toluene-d8              | 7.57  | 98   | 376059     | 46.25  | ug/l  | 0.00     |
| Spiked Amount 50.000        |       |      | Recovery = | 92.50% |       |          |
| 62) 4-Bromofluorobenzene    | 10.31 | 95   | 155946     | 48.31  | ug/l  | 0.00     |
| Spiked Amount 50.000        |       |      | Recovery = | 96.62% |       |          |

| Target Compounds              | R.T. | QIon | Response | Conc   | Units | Qvalue |
|-------------------------------|------|------|----------|--------|-------|--------|
| 2) Dichlorodifluoromethane    | 1.20 | 85   | 92410    | 43.16  | ug/l  | 98     |
| 3) Chloromethane              | 1.33 | 50   | 91999    | 42.06  | ug/l  | 100    |
| 4) Vinyl Chloride             | 1.40 | 62   | 101938   | 45.19  | ug/l  | 100    |
| 5) Bromomethane               | 1.61 | 94   | 60656    | 55.62  | ug/l  | 96     |
| 6) Chloroethane               | 1.69 | 64   | 68661    | 54.57  | ug/l  | 97     |
| 7) Trichlorofluoromethane     | 1.88 | 101  | 166527   | 48.37  | ug/l  | 99     |
| 8) Diethyl Ether              | 2.10 | 74   | 62278    | 53.28  | ug/l  | 90     |
| 9) 1,1,2-Trichlorotrifluoroet | 2.29 | 101  | 96268    | 45.08  | ug/l  | 96     |
| 10) Methyl Iodide             | 2.41 | 142  | 97599    | 53.58  | ug/l  | 99     |
| 11) Tert butyl alcohol        | 2.82 | 59   | 156377   | 230.26 | ug/l  | 99     |
| 12) 1,1-Dichloroethene        | 2.28 | 96   | 88970    | 45.68  | ug/l  | 93     |
| 13) Acrolein                  | 2.19 | 56   | 58953    | 165.31 | ug/l  | 99     |
| 14) Allyl chloride            | 2.59 | 41   | 156781   | 43.35  | ug/l  | 98     |
| 15) Acrylonitrile             | 2.93 | 53   | 320201   | 242.33 | ug/l  | 99     |
| 16) Acetone                   | 2.32 | 43   | 303487   | 202.28 | ug/l  | 99     |
| 17) Carbon Disulfide          | 2.48 | 76   | 240214   | 38.52  | ug/l  | 98     |
| 18) Methyl Acetate            | 2.62 | 43   | 173831   | 54.04  | ug/l  | 98     |
| 19) Methyl tert-butyl Ether   | 3.00 | 73   | 366045   | 50.00  | ug/l  | 95     |
| 20) Methylene Chloride        | 2.70 | 84   | 111935   | 47.55  | ug/l  | 98     |
| 21) trans-1,2-Dichloroethene  | 2.98 | 96   | 97931    | 45.65  | ug/l  | 98     |
| 22) Diisopropyl ether         | 3.57 | 45   | 354640   | 49.47  | ug/l  | 94     |
| 23) Vinyl Acetate             | 3.53 | 43   | 1517018  | 236.24 | ug/l  | 99     |
| 24) 1,1-Dichloroethane        | 3.45 | 63   | 200188   | 48.54  | ug/l  | 98     |
| 25) 2-Butanone                | 4.26 | 43   | 471495   | 233.96 | ug/l  | 96     |
| 26) 2,2-Dichloropropane       | 4.23 | 77   | 165682   | 42.31  | ug/l  | 99     |
| 27) cis-1,2-Dichloroethene    | 4.23 | 96   | 120182   | 48.73  | ug/l  | 98     |
| 28) Bromochloromethane        | 4.55 | 49   | 82961    | 45.67  | ug/l  | 87     |
| 29) Tetrahydrofuran           | 4.64 | 42   | 296828   | 237.84 | ug/l  | 97     |
| 30) Chloroform                | 4.68 | 83   | 212889   | 51.00  | ug/l  | 100    |
| 31) Cyclohexane               | 5.00 | 56   | 174268   | 47.49  | ug/l  | 96     |
| 32) 1,1,1-Trichloroethane     | 4.92 | 97   | 191051   | 49.50  | ug/l  | 97     |
| 36) 1,1-Dichloropropene       | 5.14 | 75   | 146792   | 46.51  | ug/l  | 98     |
| 37) Ethyl Acetate             | 4.38 | 43   | 173088   | 50.32  | ug/l  | 97     |
| 38) Carbon Tetrachloride      | 5.14 | 117  | 168076   | 48.43  | ug/l  | 98     |

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 Sample : VSTDCCC050  
 Misc : 5.0mL/MSVOA U/WATER  
 ALS Vial : 30 Sample Multiplier: 1

Instrument :  
 MSVOA\_U  
 ClientSampleID :  
 VSTDCCC050

Manual Integrations  
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apatel  
 6/27/2018 11:20:19 AM

Quant Time: Jun 26 07:40:21 2018  
 Quant Method : Z:\VOASRV\HPCHEM1\MSVOA\_U\METHOD\82U061318W.M  
 Quant Title : SW846 8260  
 QLast Update : Wed Jun 13 13:55:26 2018  
 Response via : Initial Calibration

| Internal Standards             | R.T.  | QIon | Response | Conc    | Units  | Dev(Min) |
|--------------------------------|-------|------|----------|---------|--------|----------|
| 39) Methylcyclohexane          | 6.42  | 83   | 178386   | 45.29   | ug/l   | 94       |
| 40) Benzene                    | 5.39  | 78   | 433378   | 48.19   | ug/l   | 99       |
| 41) Methacrylonitrile          | 4.54  | 41   | 98183    | 52.94   | ug/l   | 99       |
| 42) 1,2-Dichloroethane         | 5.41  | 62   | 177871   | 51.93   | ug/l   | 99       |
| 43) Isopropyl Acetate          | 5.55  | 43   | 281991   | 47.42   | ug/l   | 99       |
| 44) Trichloroethene            | 6.19  | 130  | 120122   | 46.93   | ug/l   | 96       |
| 45) 1,2-Dichloropropane        | 6.44  | 63   | 119301   | 49.72   | ug/l   | 98       |
| 46) Dibromomethane             | 6.56  | 93   | 83811    | 49.72   | ug/l   | 93       |
| 47) Bromodichloromethane       | 6.76  | 83   | 167087   | 49.78   | ug/l   | 100      |
| 48) Methyl methacrylate        | 6.62  | 41   | 143997   | 49.73   | ug/l   | 98       |
| 49) 1,4-Dioxane                | 6.62  | 88   | 67950    | 1200.05 | ug/l   | 96       |
| 51) 4-Methyl-2-Pentanone       | 7.46  | 43   | 924371   | 247.45  | ug/l   | 98       |
| 52) Toluene                    | 7.64  | 92   | 285395   | 49.33   | ug/l   | 98       |
| 53) t-1,3-Dichloropropene      | 7.88  | 75   | 177531   | 47.10   | ug/l   | 98       |
| 54) cis-1,3-Dichloropropene    | 7.27  | 75   | 186437   | 46.42   | ug/l   | 98       |
| 55) 1,1,2-Trichloroethane      | 8.07  | 97   | 119693   | 50.89   | ug/l   | 99       |
| 56) Ethyl methacrylate         | 8.02  | 69   | 193004   | 49.03   | ug/l   | 98       |
| 57) 1,3-Dichloropropane        | 8.25  | 76   | 201985   | 50.91   | ug/l   | 100      |
| 58) 2-Chloroethyl Vinyl ether  | 7.13  | 63   | 53735    | 35.63   | ug/l   | 97       |
| 59) 2-Hexanone                 | 8.36  | 43   | 737598   | 241.85  | ug/l   | 99       |
| 60) Dibromochloromethane       | 8.48  | 129  | 139564   | 47.59   | ug/l   | 100      |
| 61) 1,2-Dibromoethane          | 8.59  | 107  | 129194   | 49.35   | ug/l   | 99       |
| 64) Tetrachloroethene          | 8.23  | 164  | 113273   | 46.58   | ug/l   | 99       |
| 65) Chlorobenzene              | 9.12  | 112  | 324276   | 49.61   | ug/l   | 99       |
| 66) 1,1,1,2-Tetrachloroethane  | 9.21  | 131  | 125680   | 50.61   | ug/l   | 98       |
| 67) Ethyl Benzene              | 9.25  | 91   | 564503   | 49.27   | ug/l   | 99       |
| 68) m/p-Xylenes                | 9.38  | 106  | 435740   | 99.03   | ug/l   | 98       |
| 69) o-Xylene                   | 9.78  | 106  | 219438   | 50.39   | ug/l   | 97       |
| 70) Styrene                    | 9.80  | 104  | 360029   | 50.31   | ug/l   | 99       |
| 71) Bromoform                  | 9.96  | 173  | 111228   | 47.13   | ug/l # | 97       |
| 73) Isopropylbenzene           | 10.17 | 105  | 596506   | 49.51   | ug/l   | 99       |
| 74) N-amyl acetate             | 10.01 | 43   | 268170   | 46.80   | ug/l   | 98       |
| 75) 1,1,2,2-Tetrachloroethane  | 10.46 | 83   | 201681   | 49.96   | ug/l   | 99       |
| 76) 1,2,3-Trichloropropane     | 10.50 | 75   | 184071m  | 53.28   | ug/l   |          |
| 77) Bromobenzene               | 10.45 | 156  | 151023   | 49.52   | ug/l   | 96       |
| 78) n-propylbenzene            | 10.59 | 91   | 672959   | 47.42   | ug/l   | 98       |
| 79) 2-Chlorotoluene            | 10.66 | 91   | 407745   | 48.72   | ug/l   | 98       |
| 80) 1,3,5-Trimethylbenzene     | 10.78 | 105  | 515436   | 49.36   | ug/l   | 100      |
| 81) trans-1,4-Dichloro-2-buten | 10.51 | 75   | 64308m   | 43.08   | ug/l   |          |
| 82) 4-Chlorotoluene            | 10.78 | 91   | 470829   | 48.33   | ug/l   | 100      |
| 83) tert-Butylbenzene          | 11.10 | 119  | 510967   | 50.87   | ug/l   | 99       |
| 84) 1,2,4-Trimethylbenzene     | 11.15 | 105  | 523456   | 49.19   | ug/l   | 100      |
| 85) sec-Butylbenzene           | 11.33 | 105  | 624581   | 49.68   | ug/l   | 98       |
| 86) p-Isopropyltoluene         | 11.48 | 119  | 547949   | 48.66   | ug/l   | 99       |
| 87) 1,3-Dichlorobenzene        | 11.42 | 146  | 278790   | 49.48   | ug/l   | 100      |
| 88) 1,4-Dichlorobenzene        | 11.51 | 146  | 279384   | 49.26   | ug/l   | 99       |
| 89) n-Butylbenzene             | 11.89 | 91   | 457241   | 45.74   | ug/l   | 97       |
| 90) Hexachloroethane           | 12.15 | 117  | 100102   | 45.57   | ug/l   | 98       |
| 91) 1,2-Dichlorobenzene        | 11.88 | 146  | 292837   | 51.88   | ug/l   | 100      |
| 92) 1,2-Dibromo-3-Chloropropan | 12.66 | 75   | 55976    | 50.25   | ug/l   | 96       |

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Operator : MD/SY  
Sample : VSTDCCC050  
Misc : 5.0mL/MSVOA U/WATER  
ALS Vial : 30 Sample Multiplier: 1

Instrument :  
MSVOA\_U  
ClientSampleId :  
VSTDCCC050

Manual Integrations  
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apatel  
6/27/2018 11:20:19 AM

Quant Time: Jun 26 07:40:21 2018  
Quant Method : Z:\V0ASRV\HPCHEM1\MSVOA\_U\METHOD\82U061318W.M  
Quant Title : SW846 8260  
QLast Update : Wed Jun 13 13:55:26 2018  
Response via : Initial Calibration

| Internal Standards         | R.T.  | QIon | Response | Conc  | Units | Dev(Min) |
|----------------------------|-------|------|----------|-------|-------|----------|
| 93) 1,2,4-Trichlorobenzene | 13.51 | 180  | 191667   | 54.99 | ug/l  | 99       |
| 94) Hexachlorobutadiene    | 13.70 | 225  | 98888    | 50.41 | ug/l  | 99       |
| 95) Naphthalene            | 13.74 | 128  | 632329   | 54.74 | ug/l  | 99       |
| 96) 1,2,3-Trichlorobenzene | 13.99 | 180  | 201435   | 58.00 | ug/l  | 98       |

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

