

Data Path : Z:\VOASRV\HPCHEM1\MSVOA U\DATA\VU080618\  
 Data File : VU025905.D  
 Acq On : 06 Aug 2018 22:46  
 Operator : MD/SY  
 Sample : VSTDCCC050  
 Misc : 5.0mL/MSVOA U/WATER  
 ALS Vial : 28 Sample Multiplier: 1

Instrument :  
 MSVOA\_U  
 ClientSampleId :  
 VSTDCCC050EC

Manual Integrations  
 APPROVED

MMDadoda  
 8/7/2018 1:51:45 PM

Quant Time: Aug 07 04:24:07 2018  
 Quant Method : Z:\VOASRV\HPCHEM1\MSVOA\_U\METHOD\82U072718W.M  
 Quant Title : SW846 8260  
 QLast Update : Tue Aug 07 00:49:55 2018  
 Response via : Initial Calibration

| Internal Standards         | R.T.  | QIon | Response | Conc  | Units | Dev(Min) |
|----------------------------|-------|------|----------|-------|-------|----------|
| 1) Pentafluorobenzene      | 4.99  | 168  | 179854   | 50.00 | ug/l  | 0.00     |
| 34) 1,4-Difluorobenzene    | 5.89  | 114  | 272539   | 50.00 | ug/l  | 0.00     |
| 63) Chlorobenzene-d5       | 9.09  | 117  | 266409   | 50.00 | ug/l  | 0.00     |
| 72) 1,4-Dichlorobenzene-d4 | 11.49 | 152  | 166574   | 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   | 137624     | 49.11  | ug/l  | 0.00     |
| Spiked Amount 50.000        |       |      | Recovery = | 98.22% |       |          |
| 35) Dibromofluoromethane    | 4.89  | 113  | 114604     | 48.35  | ug/l  | 0.00     |
| Spiked Amount 50.000        |       |      | Recovery = | 96.70% |       |          |
| 50) Toluene-d8              | 7.57  | 98   | 409143     | 49.32  | ug/l  | 0.00     |
| Spiked Amount 50.000        |       |      | Recovery = | 98.64% |       |          |
| 62) 4-Bromofluorobenzene    | 10.31 | 95   | 158365     | 49.19  | ug/l  | 0.00     |
| Spiked Amount 50.000        |       |      | Recovery = | 98.38% |       |          |

| Target Compounds              | R.T. | QIon | Response | Conc   | Units | Qvalue |
|-------------------------------|------|------|----------|--------|-------|--------|
| 2) Dichlorodifluoromethane    | 1.20 | 85   | 106555   | 39.20  | ug/l  | 100    |
| 3) Chloromethane              | 1.33 | 50   | 108219   | 41.65  | ug/l  | 99     |
| 4) Vinyl Chloride             | 1.40 | 62   | 115307   | 47.16  | ug/l  | 98     |
| 5) Bromomethane               | 1.62 | 94   | 64797    | 54.26  | ug/l  | 99     |
| 6) Chloroethane               | 1.70 | 64   | 69243    | 48.43  | ug/l  | 97     |
| 7) Trichlorofluoromethane     | 1.89 | 101  | 172203   | 48.71  | ug/l  | 98     |
| 8) Diethyl Ether              | 2.10 | 74   | 62187    | 48.62  | ug/l  | 99     |
| 9) 1,1,2-Trichlorotrifluoroet | 2.28 | 101  | 101036   | 49.39  | ug/l  | 99     |
| 10) Methyl Iodide             | 2.41 | 142  | 79231    | 42.98  | ug/l  | 99     |
| 11) Tert butyl alcohol        | 2.83 | 59   | 140701   | 229.33 | ug/l  | 99     |
| 12) 1,1-Dichloroethene        | 2.28 | 96   | 97050    | 50.26  | ug/l  | 94     |
| 13) Acrolein                  | 2.19 | 56   | 90461    | 408.41 | ug/l  | 98     |
| 14) Allyl chloride            | 2.59 | 41   | 166175   | 47.88  | ug/l  | 99     |
| 15) Acrylonitrile             | 2.94 | 53   | 326131   | 266.23 | ug/l  | 100    |
| 16) Acetone                   | 2.32 | 43   | 361743   | 264.77 | ug/l  | 98     |
| 17) Carbon Disulfide          | 2.48 | 76   | 307591   | 49.22  | ug/l  | 100    |
| 18) Methyl Acetate            | 2.62 | 43   | 151776   | 46.16  | ug/l  | 99     |
| 19) Methyl tert-butyl Ether   | 3.00 | 73   | 370673   | 52.97  | ug/l  | 100    |
| 20) Methylene Chloride        | 2.70 | 84   | 117248   | 48.42  | ug/l  | 98     |
| 21) trans-1,2-Dichloroethene  | 2.98 | 96   | 113062   | 50.65  | ug/l  | 98     |
| 22) Diisopropyl ether         | 3.58 | 45   | 363268   | 53.12  | ug/l  | 94     |
| 23) Vinyl Acetate             | 3.53 | 43   | 1601982  | 268.80 | ug/l  | 99     |
| 24) 1,1-Dichloroethane        | 3.45 | 63   | 210767   | 51.34  | ug/l  | 99     |
| 25) 2-Butanone                | 4.27 | 43   | 571717   | 307.40 | ug/l  | 99     |
| 26) 2,2-Dichloropropane       | 4.23 | 77   | 154579   | 41.43  | ug/l  | 100    |
| 27) cis-1,2-Dichloroethene    | 4.23 | 96   | 128697   | 51.13  | ug/l  | 97     |
| 28) Bromochloromethane        | 4.55 | 49   | 93590    | 50.99  | ug/l  | 99     |
| 29) Tetrahydrofuran           | 4.64 | 42   | 289123   | 259.48 | ug/l  | 99     |
| 30) Chloroform                | 4.68 | 83   | 217775   | 50.26  | ug/l  | 100    |
| 31) Cyclohexane               | 5.00 | 56   | 184741   | 51.78  | ug/l  | 99     |
| 32) 1,1,1-Trichloroethane     | 4.92 | 97   | 201850   | 51.74  | ug/l  | 98     |
| 36) 1,1-Dichloropropene       | 5.14 | 75   | 163693   | 51.39  | ug/l  | 98     |
| 37) Ethyl Acetate             | 4.38 | 43   | 174052   | 52.70  | ug/l  | 100    |
| 38) Carbon Tetrachloride      | 5.14 | 117  | 184627   | 51.18  | ug/l  | 98     |

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 Sample : VSTDCCC050  
 Misc : 5.0mL/MSVOA U/WATER  
 ALS Vial : 28 Sample Multiplier: 1

Instrument :  
 MSVOA\_U  
 ClientSampleId :  
 VSTDCCC050EC

Manual Integrations  
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MMDadoda  
 8/7/2018 1:51:45 PM

Quant Time: Aug 07 04:24:07 2018  
 Quant Method : Z:\VOASRV\HPCHEM1\MSVOA\_U\METHOD\82U072718W.M  
 Quant Title : SW846 8260  
 QLast Update : Tue Aug 07 00:49:55 2018  
 Response via : Initial Calibration

| Internal Standards             | R.T.  | QIon | Response | Conc   | Units | Dev(Min) |
|--------------------------------|-------|------|----------|--------|-------|----------|
| 39) Methylcyclohexane          | 6.42  | 83   | 182651   | 50.05  | ug/l  | 98       |
| 40) Benzene                    | 5.39  | 78   | 463187   | 49.75  | ug/l  | 99       |
| 41) Methacrylonitrile          | 4.55  | 41   | 95175    | 51.89  | ug/l  | 97       |
| 42) 1,2-Dichloroethane         | 5.41  | 62   | 179877   | 50.18  | ug/l  | 99       |
| 43) Isopropyl Acetate          | 5.55  | 43   | 279576   | 51.23  | ug/l  | 98       |
| 44) Trichloroethene            | 6.19  | 130  | 131018   | 50.53  | ug/l  | 98       |
| 45) 1,2-Dichloropropane        | 6.44  | 63   | 123070   | 50.69  | ug/l  | 99       |
| 46) Dibromomethane             | 6.56  | 93   | 88757    | 50.45  | ug/l  | 98       |
| 47) Bromodichloromethane       | 6.76  | 83   | 172425   | 51.38  | ug/l  | 98       |
| 48) Methyl methacrylate        | 6.63  | 41   | 139158   | 52.03  | ug/l  | 97       |
| 49) 1,4-Dioxane                | 6.62  | 88   | 59324    | 911.42 | ug/l  | 98       |
| 51) 4-Methyl-2-Pentanone       | 7.46  | 43   | 1110830  | 325.12 | ug/l  | 100      |
| 52) Toluene                    | 7.64  | 92   | 296952   | 51.34  | ug/l  | 99       |
| 53) t-1,3-Dichloropropene      | 7.88  | 75   | 194821   | 51.70  | ug/l  | 99       |
| 54) cis-1,3-Dichloropropene    | 7.27  | 75   | 198218   | 51.21  | ug/l  | 98       |
| 55) 1,1,2-Trichloroethane      | 8.07  | 97   | 123195   | 51.25  | ug/l  | 97       |
| 56) Ethyl methacrylate         | 8.02  | 69   | 186049   | 54.17  | ug/l  | 97       |
| 57) 1,3-Dichloropropane        | 8.25  | 76   | 207581   | 51.35  | ug/l  | 99       |
| 58) 2-Chloroethyl Vinyl ether  | 7.13  | 63   | 349307   | 225.33 | ug/l  | 99       |
| 59) 2-Hexanone                 | 8.36  | 43   | 863929   | 322.57 | ug/l  | 100      |
| 60) Dibromochloromethane       | 8.48  | 129  | 147012   | 51.86  | ug/l  | 99       |
| 61) 1,2-Dibromoethane          | 8.59  | 107  | 136802   | 51.18  | ug/l  | 99       |
| 64) Tetrachloroethene          | 8.23  | 164  | 120388   | 51.34  | ug/l  | 98       |
| 65) Chlorobenzene              | 9.12  | 112  | 345677   | 50.33  | ug/l  | 99       |
| 66) 1,1,1,2-Tetrachloroethane  | 9.21  | 131  | 132128   | 53.18  | ug/l  | 99       |
| 67) Ethyl Benzene              | 9.25  | 91   | 583927   | 51.32  | ug/l  | 100      |
| 68) m/p-Xylenes                | 9.38  | 106  | 457271   | 104.69 | ug/l  | 100      |
| 69) o-Xylene                   | 9.78  | 106  | 223268   | 52.30  | ug/l  | 100      |
| 70) Styrene                    | 9.80  | 104  | 373116   | 54.11  | ug/l  | 98       |
| 71) Bromoform                  | 9.96  | 173  | 116076   | 53.88  | ug/l  | # 100    |
| 73) Isopropylbenzene           | 10.17 | 105  | 596566   | 52.47  | ug/l  | 100      |
| 74) N-amyl acetate             | 10.01 | 43   | 254341   | 54.80  | ug/l  | 99       |
| 75) 1,1,2,2-Tetrachloroethane  | 10.46 | 83   | 198790   | 50.56  | ug/l  | 98       |
| 76) 1,2,3-Trichloropropane     | 10.50 | 75   | 169366m  | 46.15  | ug/l  |          |
| 77) Bromobenzene               | 10.45 | 156  | 159431   | 50.84  | ug/l  | 98       |
| 78) n-propylbenzene            | 10.59 | 91   | 696916   | 52.52  | ug/l  | 99       |
| 79) 2-Chlorotoluene            | 10.66 | 91   | 410166   | 52.77  | ug/l  | 99       |
| 80) 1,3,5-Trimethylbenzene     | 10.78 | 105  | 511395   | 52.96  | ug/l  | 99       |
| 81) trans-1,4-Dichloro-2-buten | 10.51 | 75   | 62957m   | 43.01  | ug/l  |          |
| 82) 4-Chlorotoluene            | 10.78 | 91   | 487697   | 53.23  | ug/l  | 99       |
| 83) tert-Butylbenzene          | 11.10 | 119  | 492197   | 51.31  | ug/l  | 98       |
| 84) 1,2,4-Trimethylbenzene     | 11.15 | 105  | 529410   | 54.11  | ug/l  | 98       |
| 85) sec-Butylbenzene           | 11.33 | 105  | 600739   | 51.29  | ug/l  | 100      |
| 86) p-Isopropyltoluene         | 11.48 | 119  | 542714   | 51.75  | ug/l  | 99       |
| 87) 1,3-Dichlorobenzene        | 11.42 | 146  | 294994   | 50.68  | ug/l  | 99       |
| 88) 1,4-Dichlorobenzene        | 11.51 | 146  | 299943   | 49.43  | ug/l  | 100      |
| 89) n-Butylbenzene             | 11.89 | 91   | 477399   | 49.33  | ug/l  | 100      |
| 90) Hexachloroethane           | 12.15 | 117  | 93843    | 50.33  | ug/l  | 98       |
| 91) 1,2-Dichlorobenzene        | 11.88 | 146  | 293518   | 51.45  | ug/l  | 98       |
| 92) 1,2-Dibromo-3-Chloropropan | 12.66 | 75   | 48337    | 51.86  | ug/l  | 99       |

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Sample : VSTDCCC050  
Misc : 5.0mL/MSVOA U/WATER  
ALS Vial : 28 Sample Multiplier: 1

Instrument :  
MSVOA\_U  
ClientSampleId :  
VSTDCCC050EC

Manual Integrations  
APPROVED

MMDadoda  
8/7/2018 1:51:45 PM

Quant Time: Aug 07 04:24:07 2018  
Quant Method : Z:\VOASRV\HPCHEM1\MSVOA\_U\METHOD\82U072718W.M  
Quant Title : SW846 8260  
QLast Update : Tue Aug 07 00:49:55 2018  
Response via : Initial Calibration

| Internal Standards         | R.T.  | QIon | Response | Conc  | Units | Dev(Min) |
|----------------------------|-------|------|----------|-------|-------|----------|
| 93) 1,2,4-Trichlorobenzene | 13.51 | 180  | 201898   | 52.43 | ug/l  | 99       |
| 94) Hexachlorobutadiene    | 13.70 | 225  | 88378    | 43.54 | ug/l  | 96       |
| 95) Naphthalene            | 13.74 | 128  | 625196   | 50.53 | ug/l  | 99       |
| 96) 1,2,3-Trichlorobenzene | 13.99 | 180  | 202909   | 52.82 | ug/l  | 100      |

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

