

Data Path : Z:\voasrv\HPCHEM1\MSVOA\_N\Data\VN051622\  
 Data File : VN072501.D  
 Acq On : 16 May 2022 14:40  
 Operator : JC\MD  
 Sample : VSTDICV020  
 Misc : 5.0mL/MSVOA\_N/WATER  
 ALS Vial : 8 Sample Multiplier: 1

Instrument :  
 MSVOA\_N  
 ClientSampleId :  
 ICVVN051622

Quant Time: May 17 07:16:42 2022  
 Quant Method : Z:\voasrv\HPCHEM1\MSVOA\_N\methods\624N051622W.M  
 Quant Title : METHOD 624 VOLATILE ORGANIC ANALYSIS  
 QLast Update : Tue May 17 06:34:50 2022  
 Response via : Initial Calibration

Min. RRF : 0.050 Min. Rel. Area : 20% Max. R.T. Dev 0.50min  
 Max. RRF Dev : 30% Max. Rel. Area : 150%

|      | Compound                    | AvgRF | CCRF   | %Dev  | Area% | Dev(min) |
|------|-----------------------------|-------|--------|-------|-------|----------|
| 1 I  | Bromochloromethane          | 1.000 | 1.000  | 0.0   | 116   | 0.00     |
| 2 M  | Dichlorodifluoromethane     | 2.492 | 2.823  | -13.3 | 123   | 0.00     |
| 3 M  | Chloromethane               | 2.251 | 2.646  | -17.5 | 129   | 0.00     |
| 4 M  | Vinyl Chloride              | 1.900 | 2.191  | -15.3 | 126   | 0.00     |
| 5 M  | Bromomethane                | 1.545 | 1.749  | -13.2 | 144   | 0.00     |
| 6 M  | Chloroethane                | 1.241 | 1.356  | -9.3  | 122   | 0.00     |
| 7 M  | Trichlorofluoromethane      | 4.488 | 5.117  | -14.0 | 122   | 0.00     |
| 8 T  | Diethyl Ether               | 1.350 | 1.593  | -18.0 | 131   | 0.00     |
| 9    | 1,1,2-Trichlorotrifluoroeth | 2.115 | 2.513  | -18.8 | 127   | 0.00     |
| 10 M | 1,1-Dichloroethene          | 1.907 | 2.176  | -14.1 | 128   | 0.00     |
| 11   | Methyl Iodide               | 2.872 | 3.062  | -6.6  | 120   | 0.00     |
| 12   | Methyl Acetate              | 3.085 | 3.718  | -20.5 | 130   | 0.00     |
| 13 M | Acrolein                    | 0.485 | 0.497  | -2.5  | 115   | 0.00     |
| 14 M | Acrylonitrile               | 1.301 | 1.548  | -19.0 | 135   | 0.00     |
| 15 M | Acetone                     | 0.341 | 0.421  | -23.5 | 138   | 0.00     |
| 16 M | Carbon Disulfide            | 4.946 | 5.677  | -14.8 | 127   | 0.00     |
| 17   | Allyl chloride              | 3.442 | 3.905  | -13.5 | 127   | 0.00     |
| 18 M | Methylene Chloride          | 2.257 | 2.602  | -15.3 | 126   | 0.00     |
| 19 M | trans-1,2-Dichloroethene    | 2.094 | 2.424  | -15.8 | 128   | 0.00     |
| 20 T | Diisopropyl ether           | 7.156 | 8.182  | -14.3 | 127   | 0.00     |
| 21 M | 1,1-Dichloroethane          | 4.279 | 4.774  | -11.6 | 124   | 0.00     |
| 22 M | cis-1,2-Dichloroethene      | 2.459 | 2.937  | -19.4 | 134   | 0.00     |
| 23 M | tert-Butyl Alcohol          | 0.571 | 0.696  | -21.9 | 140   | 0.00     |
| 24 M | Methyl tert-Butyl Ether     | 7.823 | 9.069  | -15.9 | 128   | 0.00     |
| 25 M | Chloroform                  | 4.615 | 5.338  | -15.7 | 127   | 0.00     |
| 26   | Cyclohexane                 | 3.473 | 4.188  | -20.6 | 133   | 0.00     |
| 27 s | 1,2-Dichloroethane-d4       | 3.376 | 3.440  | -1.9  | 109   | 0.00     |
| 28 I | 1,4-Difluorobenzene         | 1.000 | 1.000  | 0.0   | 116   | 0.00     |
| 29   | 1,1-Dichloropropene         | 0.597 | 0.645  | -8.0  | 128   | 0.00     |
| 30 M | 2-Butanone                  | 0.346 | 0.395  | -14.2 | 131   | 0.00     |
| 31   | 2,2-Dichloropropane         | 0.741 | 0.834  | -12.6 | 135   | 0.00     |
| 32 M | 1,1,1-Trichloroethane       | 0.852 | 0.914  | -7.3  | 126   | 0.00     |
| 33 M | Carbon Tetrachloride        | 0.757 | 0.817  | -7.9  | 122   | 0.00     |
| 34 M | Benzene                     | 1.698 | 1.864  | -9.8  | 126   | 0.00     |
| 35   | Methacrylonitrile           | 0.366 | 0.399  | -9.0  | 132   | 0.00     |
| 36 M | 1,2-Dichloroethane          | 0.791 | 0.841  | -6.3  | 121   | 0.00     |
| 37 M | Trichloroethene             | 0.461 | 0.501  | -8.7  | 126   | 0.00     |
| 38   | Methylcyclohexane           | 0.691 | 0.772  | -11.7 | 131   | 0.00     |
| 39 M | 1,2-Dichloropropane         | 0.428 | 0.472  | -10.3 | 125   | 0.00     |
| 40   | Dibromomethane              | 0.330 | 0.351  | -6.4  | 121   | 0.00     |
| 41 M | Bromodichloromethane        | 0.699 | 0.742  | -6.2  | 125   | 0.00     |
| 42 M | Vinyl Acetate               | 1.164 | 1.323  | -13.7 | 130   | 0.00     |
| 43   | Ethyl Acetate               | 0.675 | 0.839  | -24.3 | 149   | 0.00     |
| 44   | Isopropyl Acetate           | 1.081 | 1.213  | -12.2 | 131   | 0.00     |
| 45 T | 1,4-Dioxane                 | 0.010 | 0.012# | -20.0 | 131   | 0.00     |
| 46   | Methyl methacrylate         | 0.512 | 0.556  | -8.6  | 137   | 0.00     |
| 47   | n-amyl Acetate              | 0.724 | 0.795  | -9.8  | 138   | 0.00     |
| 48 M | t-1,3-Dichloropropene       | 0.738 | 0.793  | -7.5  | 131   | 0.00     |

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 Sample : VSTDICV020  
 Misc : 5.0mL/MSVOA\_N/WATER  
 ALS Vial : 8 Sample Multiplier: 1

Instrument :  
 MSVOA\_N  
 ClientSampleId :  
 ICSVN051622

Quant Time: May 17 07:16:42 2022  
 Quant Method : Z:\voasrv\HPCHEM1\MSVOA\_N\methods\624N051622W.M  
 Quant Title : METHOD 624 VOLATILE ORGANIC ANALYSIS  
 QLast Update : Tue May 17 06:34:50 2022  
 Response via : Initial Calibration

Min. RRF : 0.050 Min. Rel. Area : 20% Max. R.T. Dev 0.50min  
 Max. RRF Dev : 30% Max. Rel. Area : 150%

|      | Compound                    | AvgRF | CCRF  | %Dev  | Area% | Dev(min) |
|------|-----------------------------|-------|-------|-------|-------|----------|
| 49 T | cis-1,3-Dichloropropene     | 0.744 | 0.832 | -11.8 | 132   | 0.00     |
| 50 M | 1,1,2-Trichloroethane       | 0.455 | 0.502 | -10.3 | 130   | 0.00     |
| 51   | Ethyl methacrylate          | 0.710 | 0.786 | -10.7 | 134   | 0.00     |
| 52   | 1,3-Dichloropropane         | 0.787 | 0.862 | -9.5  | 128   | 0.00     |
| 53 M | Dibromochloromethane        | 0.550 | 0.606 | -10.2 | 127   | 0.00     |
| 54 M | 1,2-Dibromoethane           | 0.484 | 0.531 | -9.7  | 132   | 0.00     |
| 55 M | 2-Chloroethyl vinyl ether   | 0.180 | 0.174 | 3.3   | 127   | 0.00     |
| 56 M | Bromoform                   | 0.415 | 0.444 | -7.0  | 132   | 0.00     |
| 57 I | Chlorobenzene-d5            | 1.000 | 1.000 | 0.0   | 114   | 0.00     |
| 58 M | 4-Methyl-2-Pentanone        | 0.707 | 0.848 | -19.9 | 134   | 0.00     |
| 59 M | 2-Hexanone                  | 0.519 | 0.636 | -22.5 | 137   | 0.00     |
| 60 S | 4-Bromofluorobenzene        | 0.586 | 0.576 | 1.7   | 114   | 0.00     |
| 61 M | Tetrachloroethene           | 0.449 | 0.505 | -12.5 | 124   | 0.00     |
| 62 M | Toluene                     | 2.027 | 2.346 | -15.7 | 130   | 0.00     |
| 63 S | Toluene-d8                  | 1.638 | 1.660 | -1.3  | 113   | 0.00     |
| 64 M | Chlorobenzene               | 1.264 | 1.407 | -11.3 | 129   | 0.00     |
| 65   | 1,1,1,2-Tetrachloroethane   | 0.523 | 0.599 | -14.5 | 127   | 0.00     |
| 66 M | Ethyl Benzene               | 2.280 | 2.578 | -13.1 | 128   | 0.00     |
| 67 M | m/p-Xylenes                 | 0.864 | 0.987 | -14.2 | 130   | 0.00     |
| 68 M | o-Xylene                    | 0.854 | 0.982 | -15.0 | 131   | 0.00     |
| 69 M | Styrene                     | 1.361 | 1.566 | -15.1 | 134   | 0.00     |
| 70   | Isopropylbenzene            | 2.267 | 2.590 | -14.2 | 130   | 0.00     |
| 71 M | 1,1,2,2-Tetrachloroethane   | 0.692 | 0.813 | -17.5 | 129   | 0.00     |
| 72   | 1,2,3-Trichloropropane      | 0.649 | 0.676 | -4.2  | 113   | 0.00     |
| 73   | Bromobenzene                | 0.546 | 0.601 | -10.1 | 128   | 0.00     |
| 74   | n-propylbenzene             | 2.482 | 2.809 | -13.2 | 134   | 0.00     |
| 75   | 2-Chlorotoluene             | 1.603 | 1.801 | -12.4 | 127   | 0.00     |
| 76   | 1,3,5-Trimethylbenzene      | 1.939 | 2.229 | -15.0 | 132   | 0.00     |
| 77   | t-1,4-Dichloro-2-butene     | 0.215 | 0.235 | -9.3  | 140   | 0.00     |
| 78   | 4-Chlorotoluene             | 1.503 | 1.743 | -16.0 | 136   | 0.00     |
| 79   | tert-butylbenzene           | 1.704 | 1.924 | -12.9 | 130   | 0.00     |
| 80   | 1,2,4-Trimethylbenzene      | 1.868 | 2.192 | -17.3 | 135   | 0.00     |
| 81   | sec-Butylbenzene            | 2.259 | 2.553 | -13.0 | 133   | 0.00     |
| 82   | p-Isopropyltoluene          | 1.869 | 2.121 | -13.5 | 133   | 0.00     |
| 83 M | 1,3-Dichlorobenzene         | 0.931 | 1.039 | -11.6 | 133   | 0.00     |
| 84 M | 1,4-Dichlorobenzene         | 0.906 | 1.017 | -12.3 | 134   | 0.00     |
| 85   | n-Butylbenzene              | 1.385 | 1.587 | -14.6 | 147   | 0.00     |
| 86 T | Hexachloroethane            | 0.344 | 0.385 | -11.9 | 138   | 0.00     |
| 87 M | 1,2-Dichlorobenzene         | 0.911 | 1.057 | -16.0 | 134   | 0.00     |
| 88   | 1,2-Dibromo-3-Chloropropane | 0.163 | 0.198 | -21.5 | 141   | 0.00     |
| 89   | 1,2,4-Trichlorobenzene      | 0.412 | 0.497 | -20.6 | 159#  | 0.00     |
| 90   | Hexachlorobutadiene         | 0.255 | 0.305 | -19.6 | 135   | 0.00     |
| 91 M | Naphthalene                 | 1.241 | 1.497 | -20.6 | 168#  | 0.00     |
| 92   | 1,2,3-Trichlorobenzene      | 0.420 | 0.488 | -16.2 | 148   | 0.00     |

(#) = Out of Range

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