STATE OF MONTANA: DEPT OF ENVIRONMENTAL QUALITY

 **CT COMPLIANCE REPORT AND DISTRIBUTION SYSTEM DISINFECTANT RESIDUAL DATA FOR SURFACE WATER SYSTEMS**

 Return Completed Form to Public Water Supply Section, Metcalf Building, P.O. Box 200901, Helena, MT 59620 - By the 10th of the Following Month

Month       Year       PWSID# MT      System/Water Source       Prepared By       Date

|  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- |
| Date | 1Minimum Disinfectant Residual at Point-of-Entry to Distribution System (mg/L) | Inactivation Ratio(Form UF-3/F-3) | 2Total Inactivation Ratio | 3No. of Sites Where Disinfectant Residual Was Measured (=a)and Record Chlorine Residual Value | 3No. of Sites Where No Disinfectant Residual Measured, but HPC Sample(s) Was Analyzed (=b) | 4No. of Sites Where Disinfectant Residual Not Detected, No HPC Sample(s) Analyzed (=c) | 4No. of Sites Where Disinfectant Residual Not Detected and HPC > 500/ml (=d) | No. of Sites Where Disinfectant Residual Not Measured and HPC > 500 ml (=e) |
|  |  | Disinfectant Sequence |  |  |  |  |  |  |
|  |  | 1st | 2nd | 3rd | 4th | 5th | 6th |  |  |  |  |  |  |
| 1 |       |       |       |       |       |       |       |       |       |       |       |       |       |       |
| 2 |       |       |       |       |       |       |       |       |       |       |       |       |       |       |
| 3 |       |       |       |       |       |       |       |       |       |       |       |       |       |       |
| 4 |       |       |       |       |       |       |       |       |       |       |       |       |       |       |
| 5 |       |       |       |       |       |       |       |       |       |       |       |       |       |       |
| 6 |       |       |       |       |       |       |       |       |       |       |       |       |       |       |
| 7 |       |       |       |       |       |       |       |       |       |       |       |       |       |       |
| 8 |       |       |       |       |       |       |       |       |       |       |       |       |       |       |
| 9 |       |       |       |       |       |       |       |       |       |       |       |       |       |       |
| 10 |       |       |       |       |       |       |       |       |       |       |       |       |       |       |
| 11 |       |       |       |       |       |       |       |       |       |       |       |       |       |       |
| 12 |       |       |       |       |       |       |       |       |       |       |       |       |       |       |
| 13 |       |       |       |       |       |       |       |       |       |       |       |       |       |       |
| 14 |       |       |       |       |       |       |       |       |       |       |       |       |       |       |
| 15 |       |       |       |       |       |       |       |       |       |       |       |       |       |       |
| 16 |       |       |       |       |       |       |       |       |       |       |       |       |       |       |
| 17 |       |       |       |       |       |       |       |       |       |       |       |       |       |       |
| 18 |       |       |       |       |       |       |       |       |       |       |       |       |       |       |
| 19 |       |       |       |       |       |       |       |       |       |       |       |       |       |       |
| 20 |       |       |       |       |       |       |       |       |       |       |       |       |       |       |
| 21 |       |       |       |       |       |       |       |       |       |       |       |       |       |       |
| 22 |       |       |       |       |       |       |       |       |       |       |       |       |       |       |
| 23 |       |       |       |       |       |       |       |       |       |       |       |       |       |       |
| 24 |       |       |       |       |       |       |       |       |       |       |       |       |       |       |
| 25 |       |       |       |       |       |       |       |       |       |       |       |       |       |       |
| 26 |       |       |       |       |       |       |       |       |       |       |       |       |       |       |
| 27 |       |       |       |       |       |       |       |       |       |       |       |       |       |       |
| 28 |       |       |       |       |       |       |       |       |       |       |       |       |       |       |
| 29 |       |       |       |       |       |       |       |       |       |       |       |       |       |       |
| 30 |       |       |       |       |       |       |       |       |       |       |       |       |       |       |
| 31 |       |       |       |       |       |       |       |       |       |       |       |       |       |       |

|  |
| --- |
| Days the Residual was < 0.2 mg/L |
| Day | Duration of Low Level (hrs.) | Date Report to Department |
|  |  |  |
|  |  |  |
|  |  |  |

5. The value of a, b, c, d and e from above, as specified in ARM 16.20.225(xv) (A-F)

 V = c+d+e x 100 = (     +     +     )/(     +     ) x 100 =      %

 a+b

See back for footnotes Form UF-4/F-4 (9-93)

1. If less than 0.2 mg/L, the lowest residual level and duration of the period must be reported in the box at the bottom of the page, (e.g., "0.1 ppm - 3 hrs" and notify the Water Quality Bureau at 444-4549).

2. Total inactivation ratio is the sum of inactivation ratio (CTcalc/CT Required) values from the first disinfectant sequence to the last. If the total inactivation ratio is less than 1.0, a treatment technique violation has occured.

3. "Measured" criteria means a sample was analyzed and may or may not have had a "detected residual." If more than 1 measurement is taken, record the lowest chlorine residual.

4. Distribution system disinfection residuals measured as free chlorine, total chlorine, combined chlorine or chlorine dioxide, must be greater than or equal to 0.2 ppm using DPD color wheels or 0.1 ppm using amperometric titration for purposes of meeting "detected" criteria.

5. "V" must equal 5% or less.

Form UF-4/F-4 (9-93)