

PWS ID # 4100731

Sample Period: July 2021

Salem Public Works Department

## Chlorine/Turbidity/Fluoride Monitoring Report

Marion County

|                   | Finished Water<br>Turbidity * | Finished Water<br>Total Daily Flow | Minimum<br>Chlorine Residual<br>at First User | Fluoride Grab | Fluoride Feed<br>Rate |
|-------------------|-------------------------------|------------------------------------|-----------------------------------------------|---------------|-----------------------|
| <b>Location:</b>  | Geren Island                  | Geren Island                       | Aldersgate**                                  | Aldersgate**  | Geren Island          |
| <b>Source ID:</b> | WTP-A                         | WTP-A                              | EP-A                                          | EP-A          | WTP-A                 |
| <b>Unit</b>       | <b>ntu</b>                    | <b>MGD</b>                         | <b>mg/L</b>                                   | <b>mg/L</b>   | <b>GPD</b>            |
| 7/1/2021          | 0.06                          | 41.0                               | 1.48                                          | 0.20          | 37                    |
| 7/2/2021          | 0.06                          | 38.8                               | 1.57                                          | 0.60          | 103                   |
| 7/3/2021          | 0.06                          | 40.6                               | 1.40                                          | 0.59          | 109                   |
| 7/4/2021          | 0.06                          | 40.7                               | 1.36                                          | 0.63          | 108                   |
| 7/5/2021          | 0.06                          | 40.8                               | 1.31                                          | 0.63          | 108                   |
| 7/6/2021          | 0.06                          | 40.8                               | 1.26                                          | 0.63          | 109                   |
| 7/7/2021          | 0.06                          | 40.7                               | 1.33                                          | 0.64          | 109                   |
| 7/8/2021          | 0.06                          | 40.8                               | 1.13                                          | 0.63          | 109                   |
| 7/9/2021          | 0.06                          | 40.6                               | 1.30                                          | 0.63          | 108                   |
| 7/10/2021         | 0.06                          | 40.0                               | 1.37                                          | 0.65          | 107                   |
| 7/11/2021         | 0.31                          | 39.2                               | 1.32                                          | 0.61          | 104                   |
| 7/12/2021         | 0.06                          | 40.4                               | 1.34                                          | 0.59          | 107                   |
| 7/13/2021         | 0.07                          | 41.9                               | 1.29                                          | 0.63          | 112                   |
| 7/14/2021         | 0.06                          | 42.2                               | 1.43                                          | 0.63          | 104                   |
| 7/15/2021         | 0.06                          | 42.1                               | 1.43                                          | 0.63          | 112                   |
| 7/16/2021         | 0.06                          | 42.0                               | 1.50                                          | 0.64          | 112                   |
| 7/17/2021         | 0.06                          | 41.8                               | 1.47                                          | 0.64          | 112                   |
| 7/18/2021         | 0.09                          | 41.6                               | 1.60                                          | 0.64          | 111                   |
| 7/19/2021         | 0.06                          | 40.7                               | 1.54                                          | 0.64          | 108                   |
| 7/20/2021         | 0.07                          | 40.1                               | 1.65                                          | 0.62          | 106                   |
| 7/21/2021         | 0.06                          | 40.2                               | 1.43                                          | 0.61          | 106                   |
| 7/22/2021         | 0.06                          | 40.1                               | 1.50                                          | 0.61          | 106                   |
| 7/23/2021         | 0.09                          | 40.2                               | 1.43                                          | 0.62          | 106                   |
| 7/24/2021         | 0.06                          | 40.3                               | 1.52                                          | 0.62          | 107                   |
| 7/25/2021         | 0.06                          | 40.5                               | 1.56                                          | 0.62          | 107                   |
| 7/26/2021         | 0.09                          | 40.9                               | 1.42                                          | 0.62          | 108                   |
| 7/27/2021         | 0.07                          | 41.1                               | 1.47                                          | 0.62          | 109                   |
| 7/28/2021         | 0.07                          | 42.4                               | 1.47                                          | 0.62          | 112                   |
| 7/29/2021         | 0.07                          | 45.1                               | 1.39                                          | 0.63          | 123                   |
| 7/30/2021         | 0.07                          | 47.4                               | 1.40                                          | 0.66          | 133                   |
| 7/31/2021         | 0.07                          | 45.5                               | 1.36                                          | 0.65          | 127                   |
|                   |                               |                                    |                                               |               |                       |
| Total             |                               | 1,280.4                            |                                               |               | 3,339                 |
| Average           | 0.07                          | 41.3                               | 1.4                                           |               |                       |

\*Finished water turbidity results are the highest reading of the day from combined filter effluent samples prior to reservoir

\*\*Aldersgate sample site: Aldersgate 7790 Marion Rd. SE, Turner OR. Entry Point A

Treatment: SSF

| OHA-Drinking Water Program- Surface Water Quality Form |                   |                                                      |                                   |                       |                  |     |                | County               | Marion                              |
|--------------------------------------------------------|-------------------|------------------------------------------------------|-----------------------------------|-----------------------|------------------|-----|----------------|----------------------|-------------------------------------|
| Salem Public Works                                     |                   | ID# OR4100731                                        | WTP-A                             |                       | Mo/Yr            |     | July,2021      |                      |                                     |
| DATE                                                   | Time<br>0000-2400 | Minimum Cl2<br>Residual at<br>first user (C)<br>mg/L | Contact<br>Time<br>(T)<br>Minutes | Actual<br>CT<br>C X T | Temp<br>(Deg. C) | pH  | Required<br>CT | CT<br>Met?<br>Yes/No | Peak Hourly<br>Demand Flow<br>(MGD) |
| 1                                                      | 947               | 1.46                                                 | 126                               | 184                   | 20.0             | 7.5 | 24             | Y                    | 46.1                                |
| 2                                                      | 22                | 1.56                                                 | 141                               | 221                   | 19.5             | 7.5 | 32             | Y                    | 41.0                                |
| 3                                                      | 2042              | 1.39                                                 | 140                               | 194                   | 19.9             | 7.5 | 31             | Y                    | 41.5                                |
| 4                                                      | 2053              | 1.45                                                 | 140                               | 203                   | 20.0             | 7.4 | 24             | Y                    | 41.5                                |
| 5                                                      | 110               | 1.28                                                 | 140                               | 179                   | 20.0             | 7.6 | 28             | Y                    | 41.5                                |
| 6                                                      | 1900              | 1.25                                                 | 140                               | 175                   | 20.2             | 7.4 | 23             | Y                    | 41.5                                |
| 7                                                      | 617               | 1.31                                                 | 141                               | 184                   | 20.1             | 7.4 | 23             | Y                    | 41.2                                |
| 8                                                      | 1642              | 0.95                                                 | 143                               | 135                   | 19.1             | 7.4 | 30             | Y                    | 40.7                                |
| 9                                                      | 1710              | 1.16                                                 | 143                               | 165                   | 18.6             | 7.5 | 31             | Y                    | 40.7                                |
| 10                                                     | 301               | 1.17                                                 | 148                               | 173                   | 20.1             | 7.5 | 23             | Y                    | 39.2                                |
| 11                                                     | 711               | 1.23                                                 | 146                               | 179                   | 20.2             | 7.6 | 28             | Y                    | 39.8                                |
| 12                                                     | 232               | 1.37                                                 | 120                               | 164                   | 19.6             | 7.7 | 38             | Y                    | 48.5                                |
| 13                                                     | 1008              | 1.23                                                 | 133                               | 164                   | 19.3             | 7.4 | 31             | Y                    | 43.5                                |
| 14                                                     | 2144              | 1.30                                                 | 135                               | 175                   | 19.0             | 7.4 | 31             | Y                    | 43.0                                |
| 15                                                     | 1045              | 1.38                                                 | 135                               | 186                   | 18.7             | 7.4 | 31             | Y                    | 43.0                                |
| 16                                                     | 334               | 1.40                                                 | 135                               | 189                   | 18.3             | 7.5 | 31             | Y                    | 43.0                                |
| 17                                                     | 256               | 1.35                                                 | 138                               | 187                   | 18.7             | 7.5 | 31             | Y                    | 41.9                                |
| 18                                                     | 39                | 1.48                                                 | 141                               | 209                   | 19.1             | 7.5 | 32             | Y                    | 41.1                                |
| 19                                                     | 127               | 1.44                                                 | 145                               | 208                   | 18.8             | 7.5 | 32             | Y                    | 40.1                                |
| 20                                                     | 2252              | 1.60                                                 | 141                               | 226                   | 18.8             | 7.5 | 32             | Y                    | 41.0                                |
| 21                                                     | 2019              | 1.50                                                 | 141                               | 212                   | 19.0             | 7.4 | 32             | Y                    | 41.0                                |
| 22                                                     | 346               | 1.40                                                 | 141                               | 198                   | 18.5             | 7.4 | 31             | Y                    | 41.0                                |
| 23                                                     | 515               | 1.39                                                 | 141                               | 197                   | 19.1             | 7.6 | 38             | Y                    | 41.0                                |
| 24                                                     | 1546              | 1.43                                                 | 141                               | 202                   | 18.4             | 7.4 | 32             | Y                    | 41.0                                |
| 25                                                     | 1718              | 1.41                                                 | 141                               | 199                   | 23.1             | 7.5 | 24             | Y                    | 41.0                                |
| 26                                                     | 1050              | 1.44                                                 | 140                               | 201                   | 19.8             | 7.6 | 39             | Y                    | 41.5                                |
| 27                                                     | 1936              | 1.42                                                 | 140                               | 198                   | 18.7             | 7.5 | 32             | Y                    | 41.5                                |
| 28                                                     | 1051              | 1.43                                                 | 135                               | 193                   | 19.0             | 7.5 | 32             | Y                    | 43.0                                |
| 29                                                     | 256               | 1.35                                                 | 135                               | 182                   | 19.9             | 7.5 | 31             | Y                    | 43.0                                |
| 30                                                     | 507               | 1.31                                                 | 121                               | 158                   | 19.6             | 7.5 | 31             | Y                    | 48.0                                |
| 31                                                     | 239               | 1.35                                                 | 118                               | 160                   | 20.0             | 7.5 | 23             | Y                    | 49.0                                |

\* Site: Line 1 Aldersgate CT sample point, 7790 Marion Rd. SE Turner, OR

Report Date: Aug 02, 2021

| OHA-Drinking Water Program- Surface Water Quality Form |                   |                                                      |                                   |                       |                  |     |                | County               | Marion                              |
|--------------------------------------------------------|-------------------|------------------------------------------------------|-----------------------------------|-----------------------|------------------|-----|----------------|----------------------|-------------------------------------|
| Salem Public Works                                     |                   | ID# OR4100731                                        | WTP-A                             |                       | Mo/Yr            |     | July,2021      |                      |                                     |
| DATE                                                   | Time<br>0000-2400 | Minimum Cl2<br>Residual at<br>first user (C)<br>mg/L | Contact<br>Time<br>(T)<br>Minutes | Actual<br>CT<br>C X T | Temp<br>(Deg. C) | pH  | Required<br>CT | CT<br>Met?<br>Yes/No | Peak Hourly<br>Demand Flow<br>(MGD) |
| 1                                                      | 829               | 1.48                                                 | 185                               | 274                   | 19.3             | 7.4 | 32             | Y                    | 46.1                                |
| 2                                                      | 6                 | 1.57                                                 | 208                               | 326                   | 19.2             | 7.5 | 32             | Y                    | 41.0                                |
| 3                                                      | 2224              | 1.40                                                 | 205                               | 287                   | 19.5             | 7.5 | 31             | Y                    | 41.5                                |
| 4                                                      | 2336              | 1.36                                                 | 205                               | 279                   | 19.6             | 7.4 | 31             | Y                    | 41.5                                |
| 5                                                      | 1810              | 1.31                                                 | 205                               | 269                   | 19.8             | 7.5 | 31             | Y                    | 41.5                                |
| 6                                                      | 1800              | 1.26                                                 | 205                               | 259                   | 20.2             | 7.4 | 23             | Y                    | 41.5                                |
| 7                                                      | 611               | 1.33                                                 | 207                               | 275                   | 19.3             | 7.4 | 31             | Y                    | 41.2                                |
| 8                                                      | 1515              | 1.13                                                 | 209                               | 237                   | 19.3             | 7.4 | 31             | Y                    | 40.7                                |
| 9                                                      | 2056              | 1.30                                                 | 209                               | 272                   | 18.6             | 7.5 | 31             | Y                    | 40.7                                |
| 10                                                     | 1756              | 1.37                                                 | 218                               | 298                   | 19.7             | 7.6 | 38             | Y                    | 39.2                                |
| 11                                                     | 2016              | 1.32                                                 | 214                               | 282                   | 19.8             | 7.6 | 38             | Y                    | 39.8                                |
| 12                                                     | 1832              | 1.34                                                 | 176                               | 235                   | 19.9             | 7.7 | 38             | Y                    | 48.5                                |
| 13                                                     | 1904              | 1.29                                                 | 196                               | 253                   | 19.3             | 7.4 | 31             | Y                    | 43.5                                |
| 14                                                     | 1924              | 1.43                                                 | 198                               | 283                   | 18.7             | 7.4 | 32             | Y                    | 43.0                                |
| 15                                                     | 1739              | 1.43                                                 | 198                               | 283                   | 18.5             | 7.4 | 32             | Y                    | 43.0                                |
| 16                                                     | 1004              | 1.50                                                 | 198                               | 297                   | 18.5             | 7.6 | 39             | Y                    | 43.0                                |
| 17                                                     | 1821              | 1.47                                                 | 203                               | 299                   | 18.3             | 7.6 | 39             | Y                    | 41.9                                |
| 18                                                     | 1900              | 1.60                                                 | 207                               | 332                   | 18.9             | 7.6 | 39             | Y                    | 41.1                                |
| 19                                                     | 1400              | 1.54                                                 | 212                               | 327                   | 18.9             | 7.5 | 32             | Y                    | 40.1                                |
| 20                                                     | 1823              | 1.65                                                 | 208                               | 343                   | 18.7             | 7.6 | 40             | Y                    | 41.0                                |
| 21                                                     | 2325              | 1.43                                                 | 208                               | 297                   | 19.0             | 7.4 | 32             | Y                    | 41.0                                |
| 22                                                     | 2044              | 1.50                                                 | 208                               | 312                   | 18.4             | 7.4 | 32             | Y                    | 41.0                                |
| 23                                                     | 1740              | 1.43                                                 | 208                               | 297                   | 18.5             | 7.6 | 39             | Y                    | 41.0                                |
| 24                                                     | 1758              | 1.52                                                 | 208                               | 316                   | 18.2             | 7.4 | 32             | Y                    | 41.0                                |
| 25                                                     | 1934              | 1.56                                                 | 208                               | 324                   | 19.9             | 7.5 | 32             | Y                    | 41.0                                |
| 26                                                     | 1230              | 1.42                                                 | 205                               | 292                   | 19.5             | 7.7 | 39             | Y                    | 41.5                                |
| 27                                                     | 1806              | 1.47                                                 | 205                               | 302                   | 18.7             | 7.5 | 32             | Y                    | 41.5                                |
| 28                                                     | 1051              | 1.47                                                 | 198                               | 291                   | 19.0             | 7.5 | 32             | Y                    | 43.0                                |
| 29                                                     | 1749              | 1.39                                                 | 198                               | 275                   | 19.1             | 7.5 | 31             | Y                    | 43.0                                |
| 30                                                     | 242               | 1.40                                                 | 177                               | 248                   | 19.3             | 7.5 | 31             | Y                    | 48.0                                |
| 31                                                     | 1519              | 1.36                                                 | 174                               | 236                   | 19.7             | 7.5 | 31             | Y                    | 49.0                                |

\* Site: Line 2 at Aldersgate CT point, 7790 Marion Rd. SE. Turner, OR

Report Date: Aug 02, 2021



## Chlorine/Turbidity/CT Summary Report

**PWS ID#:** 4100731  
**System Name:** Salem Public Works Department  
**Address:** 1410 20th St SE, Bldg 2  
Salem OR 97302  
**Contact Person:** Dwayne Barnes, Utility Operations Manager  
**Contact Number:** 503-588-6483  
**Source Water:** North Santiam River  
**Treatment Type:** Slow Sand Filtration  
**Sample Location:** Aldersgate and Geren Island

**Sample Period:** July 2021  
**Laboratory Results:** Willow Lake Lab  
**OHD-Certified Lab:** OR100010  
**Date Report Issued:** 8/3/2021  
**Contact Person:** Paul Mitchell  
**Contact Number:** 503-588-6380  
**Sampler:** Treatment Operators  
**Sample Date:** As reported  
**Source ID #:** EP-A and WTP-A

### Summary Table

|              |                                                                                                                 |     |
|--------------|-----------------------------------------------------------------------------------------------------------------|-----|
| 1. Turbidity | Were 95 percent of the <b>turbidity</b> readings less than or equal to <b>1.0 NTU</b> for the month?            | Yes |
| 2. Turbidity | Were all <b>turbidity</b> readings less than or equal to <b>5.0 NTU</b> for the month?                          | Yes |
| 3. CT        | Were all <b>CTs</b> values met each day of the month?                                                           | Yes |
| 4. Chlorine  | Were all entry point <b>chlorine residuals</b> readings greater than or equal to <b>0.2 mg/L</b> for the month? | Yes |
| 5. Chlorine  | Was a detectable chlorine residual measured in at least 95% of the samples measured for the month?              | Yes |

Print Name: Dwayne Barnes, Utility Operations Manager

Signature:

Date: August 3, 2021