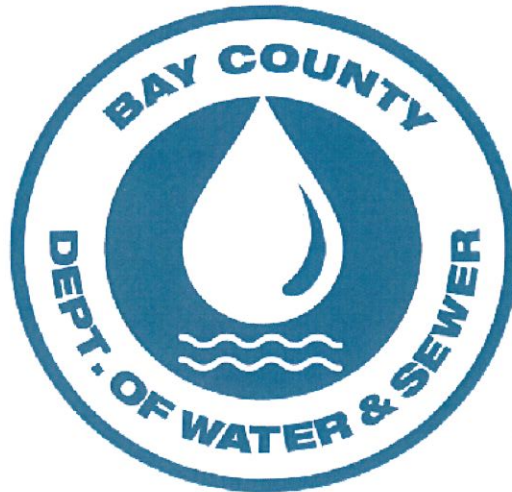


# Bay Area WTP

## Monthly Operations Report



December, 2024

Water Systems Serial Number: 0465

  
Carl J. Overly

Water Plant Superintendent  
Title

F-1, S-3, D-4  
Classification

  
Mike Wagar

Operations Supervisor  
Title

F-1, S-4  
Classification

# Bay Area Water Treatment Plant

## Monthly Operations Report

Supply Name: Bay Area Water System  
 WSSN: 0465

Carl J. Overly  
 Operator-in-charge

December, 2024  
 Month, Year

F-1, S-3, D-4  
 Certification of Operator-in-charge

F-1  
 Water Plant Classification

20001  
 Operator Identification Number for Operator-in-charge

Bay  
 County

### Treatment Rate and Membrane Data

Treatment Rate, Approved Rated Plant Capacity	<u>17.4</u>	Millions of Gallons per Day
Treatment Rate, Maximum	<u>7.2</u>	Millions of Gallons per Day
Maximum Approved Transmembrane Pressure	<u>22</u>	PSI
Maximum Operating Transmembrane Pressure	<u>17.81</u>	PSI
Maximum Approved Flux Rate	<u>36.25</u>	gpd/sq. ft.
Maximum Operating Flux Rate	<u>29.56</u>	gpd/sq. ft.

### Chemical Data

Sodium Hypochlorite on hand:	<u>4,762</u>	Gallons	Estimated Supply:	<u>112.2</u>	days
Caustic Soda on hand:	<u>2,472</u>	Gallons	Estimated Supply:	<u>169.3</u>	days
Corrosion Inhibitor on hand:	<u>1,054</u>	Gallons	Estimated Supply:	<u>51.0</u>	days
Hydrofluosilicic Acid on hand:	<u>535</u>	Gallons	Estimated Supply:	<u>36.6</u>	days
Aluminum Chlorohydrate on hand:	<u>1,030</u>	Gallons	Estimated Supply:	<u>263.3</u>	days
Sulfuric Acid on hand:	<u>658</u>	Gallons	Estimated Supply:	<u>329.0</u>	days
Sodium Bisulfite on hand:	<u>1,122</u>	Gallons	Estimated Supply:	<u>386.7</u>	days
Citric Acid on hand:	<u>2,409</u>	Gallons	Estimated Supply:	<u>192.7</u>	days
Cost of All Chemicals per Million Gallons:	<u>96.73</u>	Dollars			

### Utility Data

Estimated Electrical Kilo Watts per Million Gallons:	<u>677.07</u>	KW
Estimated Natural Gas Million Cubic Feet per Million Gallons:	<u>12.7</u>	Mcf

### Remarks

Number of periods of filter confluence turbidity samples > 0.3 NTU	<u>0</u>
Percent of membrane period confluence samples > 0.3 NTU:	<u>0.00%</u>
Was continuous (every 15 minutes) filter monitoring equipment off-line during the month? If yes, indicate date(s), duration, and individual filter grab sampling frequency on a separate sheet.	<u>No</u>
Did POE disinfectant residual fall below 0.2 ppm during the month? If yes, indicate date(s) and duration on a separate sheet.	<u>No</u>
Was minimum C*T credit achieved for the entire month? If no, indicate on a separate sheet the date(s) not achieved.	<u>Yes</u>
Was continuous POE chlorine residual monitoring equipment off-line during the month? If yes, date(s) and duration will be indicated on the rule page.	<u>No</u>

### Notes

Upon an audit of lab equipment data logger, on 12/16 evidence was discovered that indicates tests for sulfates were not ran on the 3rd. Not having a Sulfate result corrupts two corrosion index calculations reported on this page.  
 Train 1 (Skids 1, 3, 5, and 7) was taken down for a few days during the first week of December.  
 The Raw Vent and Filtrate Exhaust process pipes were replaced by Conti with new piping that had internal coatings.  
 With the skids being down for extended periods of time, they missed air hold tests. 1 and 3 missed the 2nd, all skids missed 3rd and 4th.

## Bay Area WTP Monthly Operating Report

Flows									
Date	Raw Water (MG)			Clarified (MG)	Sludge (MG)	Treated (MG)	Finished Water Pumped (MG)		
	N. Euclid	Lauria Road	Total	Total	Total	Total	N. Euclid	Lauria Road	Total
	FIT-1000-1	FIT-1000-2	Calculated	FIT-5520-1	FIT-5180	FIT-4000-1	FIT-4040-1	FIT-4040-2	Calculated
12/1/2024	0.00	6.95	6.95	0.17	0.08	7.04	3.37	2.94	6.31
12/2/2024	0.00	6.86	6.86	0.16	0.08	6.34	3.08	2.61	5.69
12/3/2024	0.00	6.10	6.10	0.16	0.08	6.34	3.10	2.63	5.73
12/4/2024	0.00	6.15	6.15	0.16	0.08	6.58	3.21	2.74	5.95
12/5/2024	0.00	6.96	6.96	0.17	0.08	6.83	3.37	2.84	6.21
12/6/2024	0.00	7.20	7.20	0.17	0.08	6.54	3.11	2.70	5.80
12/7/2024	0.00	6.45	6.45	0.19	0.08	6.24	3.04	2.63	5.67
12/8/2024	0.00	6.10	6.10	0.18	0.08	6.84	3.26	2.87	6.14
12/9/2024	0.00	6.60	6.60	0.16	0.09	6.16	3.06	2.59	5.66
12/10/2024	0.00	6.84	6.84	0.17	0.10	6.51	3.12	2.62	5.74
12/11/2024	0.00	6.54	6.54	0.15	0.09	6.45	3.18	2.70	5.88
12/12/2024	0.00	6.29	6.29	0.17	0.08	6.48	3.10	2.59	5.70
12/13/2024	0.00	6.28	6.28	0.16	0.08	6.33	3.09	2.61	5.69
12/14/2024	0.00	6.40	6.40	0.16	0.08	6.20	3.11	2.55	5.66
12/15/2024	0.00	6.19	6.19	0.16	0.08	6.49	3.20	2.68	5.88
12/16/2024	0.00	6.50	6.50	0.16	0.08	6.58	3.19	2.61	5.79
12/17/2024	0.00	6.90	6.90	0.18	0.08	6.67	3.34	2.74	6.08
12/18/2024	0.00	6.73	6.73	0.19	0.08	6.64	3.32	2.78	6.10
12/19/2024	0.00	6.54	6.54	0.19	0.08	6.70	3.18	2.78	5.95
12/20/2024	0.00	6.58	6.58	0.18	0.08	6.40	3.06	2.69	5.75
12/21/2024	0.00	6.11	6.11	0.16	0.09	6.76	3.32	2.92	6.24
12/22/2024	0.00	6.60	6.60	0.16	0.08	6.55	3.17	2.73	5.89
12/23/2024	0.00	7.02	7.02	0.17	0.08	6.44	3.14	2.69	5.83
12/24/2024	0.00	6.93	6.93	0.18	0.08	6.78	3.28	2.83	6.11
12/25/2024	0.00	6.93	6.93	0.18	0.08	6.69	3.12	2.75	5.86
12/26/2024	0.00	6.61	6.61	0.15	0.09	6.38	3.14	2.78	5.92
12/27/2024	0.00	6.45	6.45	0.15	0.08	6.70	3.19	2.83	6.01
12/28/2024	0.00	6.59	6.59	0.15	0.08	6.69	3.10	2.77	5.87
12/29/2024	0.00	6.31	6.31	0.17	0.08	6.02	2.97	2.65	5.61
12/30/2024	0.00	6.42	6.42	0.19	0.08	7.24	3.33	3.04	6.37
12/31/2024	0.00	6.62	6.62	0.17	0.08	6.63	3.23	2.94	6.16
Total	0.00	203.76	203.76	5.20	2.53	203.25	98.44	84.83	183.27
Avg	0.00	6.57	6.57	0.17	0.08	6.56	3.18	2.74	5.91
Min	0.00	6.10	6.10	0.15	0.08	6.02	2.97	2.55	5.61
Max	0.00	7.20	7.20	0.19	0.10	7.24	3.37	3.04	6.37

Raw Water Analysis								
Date	Temp	pH	Turbidity		F	Free Cl	Bacti	
	Average	Average	Average	Maximum	Grab	Average	Positive/Negative	
	°C		NTU		mg/L	mg/L	Total Coliform	E. coli
	TIT-1000	AIT-1000-2	AIT-1000-1		Lab	AIT-1035-2	Lab	
12/1/2024	9.9	7.90	0.39	0.68	0.09	0.73	Negative	Negative
12/2/2024	9.6	7.92	0.30	0.37	0.09	0.64	Negative	Negative
12/3/2024	9.7	7.94	0.25	0.34	0.09	0.57	Negative	Negative
12/4/2024	9.8	7.94	0.21	0.26	0.09	0.53	Negative	Negative
12/5/2024	9.6	7.95	0.23	0.51	0.08	0.47	Negative	Negative
12/6/2024	9.1	7.97	0.85	1.37	0.08	0.36	Negative	Negative
12/7/2024	8.9	7.96	0.50	0.65	0.08	0.44	Negative	Negative
12/8/2024	8.6	7.95	0.41	0.57	0.08	0.49	Negative	Negative
12/9/2024	8.3	7.96	0.49	1.11	0.08	0.50	Negative	Negative
12/10/2024	7.8	7.94	0.32	0.73	0.08	0.55	Negative	Negative
12/11/2024	7.3	7.89	0.40	0.58	0.08	0.57	Negative	Negative
12/12/2024	7.0	7.74	0.23	0.44	0.10	0.61	Negative	Negative
12/13/2024	7.1	7.74	0.22	0.31	0.09	0.58	Negative	Negative
12/14/2024	7.0	7.74	0.35	0.47	0.12	0.59	Negative	Negative
12/15/2024	6.9	8.02	0.32	0.55	0.09	0.64	Negative	Negative
12/16/2024	7.3	8.05	0.23	0.29	0.09	0.57	Negative	Negative
12/17/2024	6.9	8.06	0.19	0.30	0.09	0.49	Negative	Negative
12/18/2024	6.6	8.08	0.17	1.76	0.08	0.40	Negative	Negative
12/19/2024	6.6	7.96	0.15	0.27	0.08	0.39	Negative	Negative
12/20/2024	6.5	7.86	0.16	0.18	0.08	0.42	Negative	Negative
12/21/2024	6.2	7.86	0.41	1.65	0.08	0.41	Negative	Negative
12/22/2024	5.9	7.85	1.22	2.13	0.08	0.47	Negative	Negative
12/23/2024	5.6	7.85	0.60	0.93	0.08	0.51	Negative	Negative
12/24/2024	5.5	7.86	0.33	0.44	0.09	0.49	Negative	Negative
12/25/2024	5.5	7.86	0.30	0.38	0.08	0.49	Negative	Negative
12/26/2024	5.4	7.86	0.33	0.41	0.08	0.47	Negative	Negative
12/27/2024	5.2	7.86	0.37	0.48	0.09	0.46	Negative	Negative
12/28/2024	5.9	7.85	0.38	0.55	0.07	0.51	Negative	Negative
12/29/2024	5.7	7.85	0.42	0.62	0.08	0.51	Negative	Negative
12/30/2024	5.5	7.85	0.28	0.44	0.08	0.53	Negative	Negative
12/31/2024	5.4	7.84	2.31	7.68	0.08	0.40	Negative	Negative
Avg	7.2	7.90	0.43	0.89	0.09	0.51	NA	NA
Min	5.2	7.74	0.15	0.18	0.07	0.36	NA	NA
Max	9.9	8.08	2.31	7.68	0.12	0.73	NA	NA

Finished Water Analysis																			
Date	Temp	pH	Phosphate	Fluoride		Free Cl <sub>2</sub>	Hardness	Alkalinity (as CaCO <sub>3</sub> )		Chloride	Sulfate	Calcium (as CaCO <sub>3</sub> )	Dissolved Oxygen	Conductivity	Langelier Saturation Index	Chloride: Sulfate Mass Ratio	Larson-Skold Index	Bacti	
	Average	Average	Average	Tap	Dist	Average	Grab	Carbonate	Bicarbonate	Grab	Grab	Grab	Grab	Grab				Positive/Negative	Total Coliform
	°C		mg/L	mg/L		mg/L	mg/L	mg/L		mg/L	mg/L	mg/L	mg/L	uS/cm	Calculated	Lab			
	AIT-4040-1	AIT-4050-2	AIT-4040-5	Lab		AIT-4050-1	Lab	Lab		Lab	Lab	Lab	Lab	Lab	Calculated	Lab			
12/1/2024	9.6	7.55	3.34	0.71		1.22	104.00	0	80	12	12	70	10.3	252	-0.91	0.98	0.45	Negative	Negative
12/2/2024	9.5	7.55	3.34	0.73	0.73	1.18	102.00	0	82	12	12	70	10.4	246	-0.91	1.01	0.44	Negative	Negative
12/3/2024	9.5	7.47	3.34	0.73		1.10	102.00	0	83	12	No Result	72	10.3	243	-0.97			Negative	Negative
12/4/2024	9.5	7.44	3.38	0.72		1.08	106.00	0	82	9	13	72	10.9	240	-1.00	0.69	0.39	Negative	Negative
12/5/2024	9.4	7.50	3.38	0.71		1.09	98.00	0	76	10	13	76	10.2	238	-0.95	0.77	0.45	Negative	Negative
12/6/2024	9.1	7.57	3.38	0.71		1.08	98.00	0	76	10	12	76	10.5	243	-0.90	0.83	0.43	Negative	Negative
12/7/2024	8.9	7.58	3.37	0.71		1.08	96.00	0	76	10	11	76	10.7	243	-0.89	0.91	0.41	Negative	Negative
12/8/2024	8.6	7.60	3.37	0.71		1.11	96.00	0	76	10	11	74	10.7	243	-0.88	0.89	0.41	Negative	Negative
12/9/2024	8.3	7.56	3.35	0.72	0.69	1.06	96.00	0	76	10	10	74	10.4	238	-0.93	0.98	0.39	Negative	Negative
12/10/2024	7.9	7.63	3.35	0.72		1.00	98.00	0	76	9	11	74	10.6	241	-0.87	0.83	0.39	Negative	Negative
12/11/2024	7.7	7.63	3.34	0.72		1.01	100.00	0	75	11	12	72	10.7	240	-0.90	0.91	0.46	Negative	Negative
12/12/2024	7.1	7.65	3.35	0.73		1.02	100.00	0	76	12	10	86	11.2	235	-0.81	1.20	0.44	Negative	Negative
12/13/2024	7.0	7.64	3.35	0.71		1.04	98.00	0	78	12	11	80	6.7	209	-0.84	1.09	0.45	Negative	Negative
12/14/2024	7.0	7.64	3.36	0.76		1.02	100.00	0	79	11	12	70	11.0	241	-0.89	0.90	0.43	Negative	Negative
12/15/2024	7.1	7.62	3.37	0.71		1.04	100.00	0	81	11	10	68	10.6	240	-0.91	1.11	0.40	Negative	Negative
12/16/2024	7.2	7.55	3.36	0.70	0.73	1.03	96.00	0	75	7	11	76	11.0	241	-0.96	0.67	0.36	Negative	Negative
12/17/2024	7.1	7.60	3.35	0.71		0.99	98.00	0	75	10	11	74	10.6	238	-0.93	0.86	0.41	Negative	Negative
12/18/2024	6.9	7.64	3.36	0.70		0.97	100.00	0	77	9	11	76	10.3	240	-0.87	0.85	0.39	Negative	Negative
12/19/2024	6.8	7.65	3.36	0.69		0.98	98.00	0	75	9	11	74	11.2	241	-0.89	0.83	0.40	Negative	Negative
12/20/2024	6.8	7.66	3.36	0.70		0.99	98.00	0	75	10	10	76	11.1	219	-0.86	0.96	0.39	Negative	Negative
12/21/2024	6.6	7.69	3.35	0.70		0.99	96.00	0	75	9	12	74	11.3	220	-0.85	0.78	0.42	Negative	Negative
12/22/2024	6.3	7.69	3.36	0.70		1.00	98.00	0	75	10	11	74	12.0	219	-0.85	0.86	0.41	Negative	Negative
12/23/2024	6.0	7.71	3.36	0.70	0.69	1.02	98.00	0	75	10	11	76	11.7	220	-0.83	0.89	0.41	Negative	Negative
12/24/2024	5.7	7.64	3.35	0.71		1.02	98.00	0	75	10	11	74	12.4	222	-0.92	0.88	0.41	Negative	Negative
12/25/2024	5.6	7.55	3.35	0.70		1.02	100.00	0	73	9	11	70	11.1	222	-1.05	0.85	0.42	Negative	Negative
12/26/2024	5.6	7.54	3.35	0.71		1.01	98.00	0	75	10	10	74	12.1	221	-1.03	0.97	0.39	Negative	Negative
12/27/2024	5.5	7.53	3.34	0.71		1.00	100.00	0	78	9	12	76	11.6	224	-1.01	0.77	0.40	Negative	Negative
12/28/2024	5.4	7.50	3.34	0.72		1.00	100.00	0	80	10	11	78	11.5	224	-1.01	0.86	0.38	Negative	Negative
12/29/2024	5.4	7.51	3.34	0.69		1.01	96.00	0	76	9	12	76	11.9	225	-1.05	0.78	0.42	Negative	Negative
12/30/2024	5.2	7.55	3.33	0.70		1.01	98.00	0	76	10	11	76	11.9	225	-1.01	0.92	0.42	Negative	Negative
12/31/2024	5.2	7.54	3.33	0.69		1.01	98.00	0	75	9	10	76	11.9	223	-1.02	0.92	0.38	Negative	Negative
Avg	7.2	7.59	3.35	0.71	0.71	1.04	98.84	0	77	10	11	75	10.9	233	-0.93	0.89	0.41	NA	NA
Min	5.2	7.44	3.33	0.69	0.69	0.97	96.00	0	73	7	10	68	6.7	209	-1.05	0.67	0.36	NA	NA
Max	9.6	7.71	3.38	0.76	0.73	1.22	106.00	0	83	12	13	86	12.4	252	-0.81	1.20	0.46	NA	NA

Note: Upon an audit of lab equipment data logger, on 12/16 evidence was discovered that indicates tests for sulfates were not ran on the 3rd. Not having a Sulfate result corrupts two corrosion index calculations reported on this page. Those values have been left blank so the monthly Avg, Min, and Max can be calculated and reported.

Plant Tap Disinfection Byproduct Monitoring - Results In ppb						
Date	Total Trihalomethanes - TTHM			Haloacetic Acids - HAA5		
	Result	LRAA	OEL	Result	LRAA	OEL
12/2/24	21	34	29	11	12	12

Turbidity										
Date	Raw Water		Clarified Water	Membrane Feed Water	Combined Membrane Filtrate					Finished Water
	Avg	Max	Avg	Avg	Avg	Max	# Samples	# > 0.3	% Exceeded	Avg
	NTU									
	AIT-1000-1		AIT-5030-1	AIT-1035-3	AIT-4000-1					Calculated
12/1/2024	0.39	0.68	4.29	0.50	0.020	0.021	96	0	0.0	0.021
12/2/2024	0.30	0.37	4.54	0.43	0.019	0.021	96	0	0.0	0.021
12/3/2024	0.25	0.34	5.32	0.33	0.019	0.021	96	0	0.0	0.020
12/4/2024	0.21	0.26	8.06	0.27	0.020	0.020	96	0	0.0	0.020
12/5/2024	0.23	0.51	1.84	0.27	0.019	0.021	96	0	0.0	0.020
12/6/2024	0.85	1.37	3.00	0.47	0.019	0.020	96	0	0.0	0.020
12/7/2024	0.50	0.65	5.19	0.52	0.019	0.021	96	0	0.0	0.020
12/8/2024	0.41	0.57	7.38	0.45	0.019	0.020	96	0	0.0	0.020
12/9/2024	0.49	1.11	3.19	0.43	0.019	0.019	96	0	0.0	0.020
12/10/2024	0.32	0.73	2.36	0.42	0.021	0.024	96	0	0.0	0.021
12/11/2024	0.40	0.58	2.58	0.36	0.022	0.024	96	0	0.0	0.023
12/12/2024	0.23	0.44	1.74	0.33	0.023	0.023	96	0	0.0	0.024
12/13/2024	0.22	0.31	1.68	0.26	0.022	0.023	96	0	0.0	0.023
12/14/2024	0.35	0.47	1.72	0.28	0.022	0.023	96	0	0.0	0.023
12/15/2024	0.32	0.55	2.31	0.31	0.022	0.023	96	0	0.0	0.023
12/16/2024	0.23	0.29	3.53	0.28	0.022	0.023	96	0	0.0	0.023
12/17/2024	0.19	0.30	3.44	0.24	0.022	0.023	96	0	0.0	0.023
12/18/2024	0.17	1.76	1.70	0.20	0.022	0.023	96	0	0.0	0.023
12/19/2024	0.15	0.27	1.87	0.19	0.022	0.023	96	0	0.0	0.023
12/20/2024	0.16	0.18	2.62	0.17	0.022	0.023	96	0	0.0	0.023
12/21/2024	0.41	1.65	1.70	0.18	0.022	0.023	96	0	0.0	0.023
12/22/2024	1.22	2.13	2.48	0.50	0.023	0.023	96	0	0.0	0.023
12/23/2024	0.60	0.93	3.43	0.54	0.023	0.023	96	0	0.0	0.023
12/24/2024	0.33	0.44	3.86	0.42	0.023	0.023	96	0	0.0	0.023
12/25/2024	0.30	0.38	4.73	0.35	0.023	0.023	96	0	0.0	0.023
12/26/2024	0.33	0.41	12.79	0.31	0.023	0.023	96	0	0.0	0.023
12/27/2024	0.37	0.48	3.12	0.33	0.023	0.023	96	0	0.0	0.023
12/28/2024	0.38	0.55	2.47	0.33	0.023	0.023	96	0	0.0	0.023
12/29/2024	0.42	0.62	2.97	0.35	0.023	0.023	96	0	0.0	0.023
12/30/2024	0.28	0.44	4.04	0.32	0.023	0.023	96	0	0.0	0.023
12/31/2024	2.31	7.68	5.20	0.41	0.023	0.023	96	0	0.0	0.023
Avg	0.43	0.89	3.71	0.35	0.021	0.022	96	0	0.0	0.022
Min	0.15	0.18	1.68	0.17	0.019	0.019	96	0	0.0	0.020
Max	2.31	7.68	12.79	0.54	0.023	0.024	96	0	0.0	0.024

Note: % Exceeded are 4 hr compliance periods where the average of samples are greater than 0.3 NTU

Date	Membrane LRV/Integrity/Max Turbidity																									
	Membrane 1			Membrane 2			Membrane 3			Membrane 4			Membrane 5			Membrane 6			Membrane 7			Membrane 8				
	LRV	Integrity	Turbidity	LRV	Integrity	Turbidity	LRV	Integrity	Turbidity	LRV	Integrity	Turbidity	LRV	Integrity	Turbidity	LRV	Integrity	Turbidity	LRV	Integrity	Turbidity	LRV	Integrity	Turbidity		
	Minimum	Max	Max	Minimum	Max	Max	Minimum	Max	Max	Minimum	Max	Max	Minimum	Max	Max	Minimum	Max	Max	Minimum	Max	Max	Minimum	Max	Max		
Daily Value	Pass/Fail	NTU	Daily Value	Pass/Fail	NTU	Daily Value	Pass/Fail	NTU	Daily Value	Pass/Fail	NTU	Daily Value	Pass/Fail	NTU	Daily Value	Pass/Fail	NTU	Daily Value	Pass/Fail	NTU	Daily Value	Pass/Fail	NTU	Daily Value	Pass/Fail	NTU
12/1/2024	5.36	PASS	0.021	5.14	PASS	0.022	5.28	PASS	0.022	4.03	PASS	0.023	5.15	PASS	0.021	5.01	PASS	0.022	4.02	PASS	0.021	5.46	PASS	0.022		
12/2/2024	5.37	PASS	0.021	5.15	PASS	0.022	5.29	PASS	0.022	4.02	PASS	0.023	5.14	PASS	0.021	5.40	PASS	0.021	4.03	PASS	0.021	5.48	PASS	0.028		
12/3/2024	Train 1 was down due to a pipe replacement project			5.14	PASS	0.022	Train 1 was down due to a pipe replacement project			4.01	PASS	0.023	Train 1 was down due to a pipe replacement project			5.42	PASS	0.021	Train 1 was down due to a pipe replacement project			5.47	PASS	0.023		
12/4/2024	Train 1 was down due to a pipe replacement project			5.14	PASS	0.022	Train 1 was down due to a pipe replacement project			4.03	PASS	0.023	Train 1 was down due to a pipe replacement project			5.57	PASS	0.021	Train 1 was down due to a pipe replacement project			5.52	PASS	0.020		
12/5/2024	5.61	PASS	0.024	5.13	PASS	0.022	5.41	PASS	0.025	4.03	PASS	0.023	5.26	PASS	0.065	5.58	PASS	0.021	4.08	PASS	0.021	5.54	PASS	0.020		
12/6/2024	5.57	PASS	0.020	5.18	PASS	0.025	5.40	PASS	0.021	4.05	PASS	0.023	5.26	PASS	0.020	5.58	PASS	0.020	4.07	PASS	0.021	5.36	PASS	0.020		
12/7/2024	5.17	PASS	0.020	5.24	PASS	0.022	5.39	PASS	0.021	4.04	PASS	0.023	5.39	PASS	0.023	5.50	PASS	0.021	4.12	PASS	0.021	5.36	PASS	0.020		
12/8/2024	5.15	PASS	0.021	5.16	PASS	0.022	5.47	PASS	0.021	4.05	PASS	0.022	5.34	PASS	0.020	5.50	PASS	0.021	4.15	PASS	0.021	5.37	PASS	0.020		
12/9/2024	5.59	PASS	0.021	5.15	PASS	0.022	5.47	PASS	0.021	4.07	PASS	0.022	5.34	PASS	0.025	5.53	PASS	0.021	4.15	PASS	0.021	5.36	PASS	0.020		
12/10/2024	5.58	PASS	0.024	5.17	PASS	0.025	5.44	PASS	0.024	4.04	PASS	0.024	5.38	PASS	0.023	5.29	PASS	0.023	4.16	PASS	0.023	5.38	PASS	0.023		
12/11/2024	5.58	PASS	0.024	5.17	PASS	0.025	5.40	PASS	0.024	4.02	PASS	0.024	5.37	PASS	0.022	5.16	PASS	0.023	4.16	PASS	0.023	5.47	PASS	0.023		
12/12/2024	5.61	PASS	0.024	5.15	PASS	0.025	5.35	PASS	0.024	4.02	PASS	0.023	5.37	PASS	0.025	5.13	PASS	0.023	4.15	PASS	0.023	5.48	PASS	0.023		
12/13/2024	5.62	PASS	0.024	5.15	PASS	0.025	5.35	PASS	0.023	4.00	PASS	0.023	5.37	PASS	0.023	5.13	PASS	0.023	4.14	PASS	0.023	5.46	PASS	0.023		
12/14/2024	5.61	PASS	0.024	5.19	PASS	0.025	5.32	PASS	0.023	3.99	PASS	0.023	5.35	PASS	0.022	5.54	PASS	0.023	4.13	PASS	0.023	5.46	PASS	0.023		
12/15/2024	5.63	PASS	0.024	5.22	PASS	0.025	5.32	PASS	0.023	4.00	PASS	0.023	5.35	PASS	0.023	5.47	PASS	0.023	4.14	PASS	0.023	5.54	PASS	0.023		
12/16/2024	5.59	PASS	0.024	5.21	PASS	0.025	5.33	PASS	0.024	4.07	PASS	0.023	5.38	PASS	0.024	5.46	PASS	0.023	4.14	PASS	0.023	5.62	PASS	0.023		
12/17/2024	5.59	PASS	0.024	5.19	PASS	0.025	5.32	PASS	0.023	4.03	PASS	0.023	5.41	PASS	0.023	5.57	PASS	0.023	4.14	PASS	0.023	5.59	PASS	0.023		
12/18/2024	5.62	PASS	0.024	5.18	PASS	0.025	5.34	PASS	0.023	4.03	PASS	0.023	5.36	PASS	0.022	5.50	PASS	0.023	4.16	PASS	0.023	5.52	PASS	0.023		
12/19/2024	5.60	PASS	0.025	5.14	PASS	0.025	5.37	PASS	0.024	4.06	PASS	0.024	5.40	PASS	0.023	5.50	PASS	0.023	4.19	PASS	0.026	5.50	PASS	0.025		
12/20/2024	5.60	PASS	0.024	5.15	PASS	0.025	5.53	PASS	0.023	4.05	PASS	0.023	5.39	PASS	0.027	5.14	PASS	0.023	4.20	PASS	0.023	5.56	PASS	0.023		
12/21/2024	5.55	PASS	0.024	5.19	PASS	0.025	5.55	PASS	0.023	4.06	PASS	0.023	5.43	PASS	0.023	5.12	PASS	0.023	4.20	PASS	0.023	5.53	PASS	0.023		
12/22/2024	5.58	PASS	0.024	5.15	PASS	0.025	5.56	PASS	0.023	4.02	PASS	0.023	5.41	PASS	0.023	5.11	PASS	0.023	4.21	PASS	0.023	5.35	PASS	0.023		
12/23/2024	5.57	PASS	0.025	5.16	PASS	0.025	5.53	PASS	0.024	4.01	PASS	0.023	5.41	PASS	0.023	5.61	PASS	0.023	4.19	PASS	0.023	5.36	PASS	0.024		
12/24/2024	5.66	PASS	0.025	5.17	PASS	0.025	5.52	PASS	0.027	4.01	PASS	0.023	5.39	PASS	0.026	5.45	PASS	0.023	4.19	PASS	0.023	5.53	PASS	0.023		
12/25/2024	5.68	PASS	0.025	5.16	PASS	0.025	5.50	PASS	0.024	4.02	PASS	0.024	5.38	PASS	0.023	5.44	PASS	0.023	4.25	PASS	0.023	5.51	PASS	0.023		
12/26/2024	5.61	PASS	0.025	5.21	PASS	0.025	5.57	PASS	0.024	4.02	PASS	0.024	5.35	PASS	0.023	5.09	PASS	0.023	4.26	PASS	0.023	5.48	PASS	0.023		
12/27/2024	5.64	PASS	0.025	5.21	PASS	0.025	5.55	PASS	0.024	4.02	PASS	0.024	5.34	PASS	0.023	5.08	PASS	0.023	4.30	PASS	0.023	5.48	PASS	0.023		
12/28/2024	5.59	PASS	0.025	5.15	PASS	0.025	5.54	PASS	0.025	4.01	PASS	0.024	5.34	PASS	0.023	5.65	PASS	0.023	4.28	PASS	0.023	5.46	PASS	0.023		
12/29/2024	5.59	PASS	0.025	5.20	PASS	0.025	5.52	PASS	0.024	4.05	PASS	0.024	5.33	PASS	0.023	5.07	PASS	0.023	4.23	PASS	0.023	5.46	PASS	0.024		
12/30/2024	5.62	PASS	0.025	5.20	PASS	0.025	5.52	PASS	0.024	4.03	PASS	0.024	5.31	PASS	0.023	5.09	PASS	0.023	4.23	PASS	0.023	5.46	PASS	0.023		
12/31/2024	5.60	PASS	0.025	5.16	PASS	0.025	5.51	PASS	0.024	4.02	PASS	0.023	5.35	PASS	0.023	5.12	PASS	0.023	4.24	PASS	0.023	5.48	PASS	0.024		
Avg	5.56		0.024	5.17		0.024	5.44		0.024	4.03		0.023	5.35		0.024	5.35		0.022	4.17		0.023	5.47		0.023		
Min	5.15		0.020	5.13		0.022	5.28		0.021	3.99		0.022	5.14		0.020	5.01		0.020	4.02		0.021	5.35		0.020		
Max	5.68		0.025	5.24		0.025	5.57		0.027	4.07		0.024	5.43		0.065	5.65		0.023	4.30		0.026	5.62		0.028		

Note: As calculated by the manufacturer, the Upper Control Limit (UCL) for the installed membrane filtration system is 3.32 psi/min.

Per the manufacturer's UCL calculation: Q = 1,848 gpm, ALCR = 44.6, P atm = 14.4 psi, LRC = 3, V sys = 356.9 gallons, and VCF = 1.

Operational Guidelines: We have established the following parameter values as control limits to trigger skids to be taken out of service and evaluated.

Min LRV: A value of 3.3.

Max Air Hold Test Result: While not shown on this page, an AHT result of 0.84 PSI/Min or greater.

Max NTU: A turbidity reading of 0.15 NTU or greater.

Flow or Q: While not shown on this page, a skid will be evaluated if it cannot sustain a flow above 1,000 GPM

In Service Dates For Modules			
Train 1		Train 2	
Skid 1	8/2024	12/2023	Skid 2
Skid 3	11/2023	8/2015	Skid 4
Skid 5	2/2023	10/2024	Skid 6
Skid 7	8/2015	1/2023	Skid 8

Treatment Chemical Dosages											
Date	Treated Water	Sodium Hypochlorite					Phosphoric Acid		Hydrofluorosilicic Acid		
		Raw Water	Membrane Feed Water	Dose pre-FW Tanks	Treated Water	Post FW Tanks	Dose pre-FW Tanks	Post FW Tanks	Raw Water	Dose pre-FW Tanks	Post FW Tanks
	Volume	Free Cl <sub>2</sub>					PO <sub>4</sub>		F		
	MG	mg/L					mg/L		mg/L		
	FIT-4000-1	AIT-1035-2	AIT-1035-4	Added	AIT-4030-1	AIT-4050-1	Added	AIT-4040-5	Lab	Added	Lab
12/1/2024	7.0	0.73	0.42	0.74	1.34	1.22	3.30	3.34	0.09	0.53	0.71
12/2/2024	6.3	0.64	0.47	0.62	1.23	1.18	3.30	3.34	0.09	0.53	0.73
12/3/2024	6.3	0.57	0.46	0.62	1.18	1.10	3.30	3.34	0.09	0.53	0.73
12/4/2024	6.6	0.53	0.43	0.66	1.18	1.08	3.30	3.38	0.09	0.53	0.72
12/5/2024	6.8	0.47	0.41	0.68	1.20	1.09	3.30	3.38	0.08	0.53	0.71
12/6/2024	6.5	0.36	0.33	0.76	1.19	1.08	3.30	3.38	0.08	0.53	0.71
12/7/2024	6.2	0.44	0.31	0.78	1.21	1.08	3.30	3.37	0.08	0.53	0.71
12/8/2024	6.8	0.49	0.34	0.78	1.24	1.11	3.30	3.37	0.08	0.53	0.71
12/9/2024	6.2	0.50	0.36	0.62	1.10	1.06	3.30	3.35	0.08	0.53	0.72
12/10/2024	6.5	0.55	0.39	0.64	1.12	1.00	3.30	3.35	0.08	0.53	0.72
12/11/2024	6.5	0.57	0.41	0.60	1.11	1.01	3.30	3.34	0.08	0.53	0.72
12/12/2024	6.5	0.61	0.44	0.60	1.13	1.02	3.30	3.35	0.10	0.53	0.73
12/13/2024	6.3	0.58	0.46	0.56	1.13	1.04	3.30	3.35	0.09	0.53	0.71
12/14/2024	6.2	0.59	0.46	0.58	1.12	1.02	3.30	3.36	0.12	0.52	0.76
12/15/2024	6.5	0.64	0.48	0.56	1.14	1.04	3.30	3.37	0.09	0.50	0.71
12/16/2024	6.6	0.57	0.49	0.54	1.11	1.03	3.30	3.36	0.09	0.50	0.70
12/17/2024	6.7	0.49	0.45	0.58	1.08	0.99	3.30	3.35	0.09	0.50	0.71
12/18/2024	6.6	0.40	0.39	0.66	1.08	0.97	3.30	3.36	0.08	0.50	0.70
12/19/2024	6.7	0.39	0.35	0.70	1.09	0.98	3.30	3.36	0.08	0.50	0.69
12/20/2024	6.4	0.42	0.33	0.70	1.10	0.99	3.30	3.36	0.08	0.50	0.70
12/21/2024	6.8	0.41	0.33	0.70	1.10	0.99	3.30	3.35	0.08	0.50	0.70
12/22/2024	6.6	0.47	0.34	0.70	1.11	1.00	3.30	3.36	0.08	0.50	0.70
12/23/2024	6.4	0.51	0.37	0.70	1.14	1.02	3.30	3.36	0.08	0.50	0.70
12/24/2024	6.8	0.49	0.39	0.66	1.13	1.02	3.30	3.35	0.09	0.50	0.71
12/25/2024	6.7	0.49	0.40	0.66	1.12	1.02	3.30	3.35	0.08	0.50	0.70
12/26/2024	6.4	0.47	0.39	0.66	1.11	1.01	3.30	3.35	0.08	0.50	0.71
12/27/2024	6.7	0.46	0.38	0.66	1.10	1.00	3.30	3.34	0.09	0.50	0.71
12/28/2024	6.7	0.51	0.39	0.66	1.11	1.00	3.30	3.34	0.07	0.50	0.72
12/29/2024	6.0	0.51	0.40	0.66	1.11	1.01	3.30	3.34	0.08	0.50	0.69
12/30/2024	7.2	0.53	0.41	0.66	1.12	1.01	3.30	3.33	0.08	0.50	0.70
12/31/2024	6.6	0.40	0.41	0.64	1.10	1.01	3.30	3.33	0.08	0.50	0.69
Avg	6.6	0.51	0.40	0.66	1.14	1.04	3.30	3.35	0.09	0.51	0.71
Min	6.0	0.36	0.31	0.54	1.08	0.97	3.30	3.33	0.07	0.50	0.69
Max	7.2	0.73	0.49	0.78	1.34	1.22	3.30	3.38	0.12	0.53	0.76



Disinfection CT														
Date	Pipeline CT				FW Tank CT						Compliance			
	Whitestone	Travel Time	Residual	CT	FW Tank 1	FW Tank 2	Plant	Contact Time	Free Cl <sub>2</sub>	CT	Total CT	Temp	CT	CT
	Flow	Min	RW	Achieved	Min Level	Min Level	Flow	Min	Min	Achieved	Achieved	Avg	Required	Met
	MGD	Minutes	mg/L	mg-min/L	ft	ft	MGD	Minutes	mg/L	mg-min/L	mg-min/L	°C	mg-min/L	Y/N
Entry	Calculated	AIT-1035-2	Calculated	LIT-4005-1	LIT-4005-2	Calculated	Calculated	Calculated	Calculated	Calculated	Calculated	AIT-4040-1	Calculated	Calculated
12/1/2024	54.0	2,316	0.73	1684	28.5	23.2	6.3	562	1.18	333	2017	9.6	8.00	Y
12/2/2024	43.3	2,890	0.64	1843	28.6	22.5	5.7	616	1.11	341	2184	9.5	8.00	Y
12/3/2024	38.6	3,240	0.57	1840	28.4	24.1	5.7	628	1.06	333	2174	9.5	8.00	Y
12/4/2024	39.3	3,185	0.53	1704	28.7	24.8	5.9	616	1.03	316	2020	9.5	8.00	Y
12/5/2024	41.0	3,050	0.47	1423	28.7	22.1	6.2	561	1.06	298	1720	9.4	8.00	Y
12/6/2024	40.4	3,093	0.36	1111	28.6	24.8	5.8	630	1.05	330	1441	9.1	8.00	Y
12/7/2024	50.9	2,458	0.44	1075	28.6	22.2	5.7	614	1.04	319	1394	8.9	8.00	Y
12/8/2024	52.3	2,391	0.49	1168	28.6	24.2	6.1	589	1.06	312	1481	8.6	8.00	Y
12/9/2024	45.3	2,759	0.50	1371	28.2	22.4	5.7	613	0.98	302	1672	8.3	8.00	Y
12/10/2024	40.1	3,116	0.55	1701	28.6	21.7	5.7	600	0.94	283	1984	7.9	8.00	Y
12/11/2024	40.0	3,128	0.57	1783	28.5	24.9	5.9	622	0.96	298	2081	7.7	8.00	Y
12/12/2024	37.7	3,321	0.61	2029	28.6	23.9	5.7	631	0.97	306	2335	7.1	8.00	Y
12/13/2024	41.0	3,048	0.58	1780	28.6	24.1	5.7	633	0.97	307	2087	7.0	8.00	Y
12/14/2024	54.4	2,301	0.59	1358	28.5	23.2	5.7	627	0.96	300	1657	7.0	8.00	Y
12/15/2024	51.1	2,446	0.64	1575	28.5	22.6	5.9	596	0.98	294	1868	7.1	8.00	Y
12/16/2024	38.8	3,223	0.57	1842	28.5	23.3	5.8	613	0.88	270	2112	7.2	8.00	Y
12/17/2024	36.0	3,475	0.49	1713	28.6	23.9	6.1	592	0.89	263	1976	7.1	8.00	Y
12/18/2024	36.5	3,425	0.40	1380	28.7	24.6	6.1	599	0.93	279	1658	6.9	8.00	Y
12/19/2024	38.1	3,283	0.39	1289	28.7	22.7	6.0	591	0.96	283	1572	6.8	8.00	Y
12/20/2024	38.6	3,241	0.42	1348	28.6	23.9	5.8	625	0.96	301	1649	6.8	8.00	Y
12/21/2024	55.2	2,264	0.41	923	28.6	22.3	6.2	559	0.94	264	1186	6.6	8.00	Y
12/22/2024	53.0	2,362	0.47	1101	28.7	22.9	5.9	600	0.97	292	1392	6.3	8.00	Y
12/23/2024	42.2	2,967	0.51	1504	28.7	23.2	5.8	610	0.98	298	1803	6.0	8.00	Y
12/24/2024	38.0	3,292	0.49	1609	28.6	21.0	6.1	556	0.98	274	1882	5.7	8.00	Y
12/25/2024	38.5	3,253	0.49	1602	28.6	21.5	5.9	585	0.98	288	1890	5.6	8.00	Y
12/26/2024	39.7	3,154	0.47	1476	28.5	22.5	5.9	590	0.98	289	1765	5.6	8.00	Y
12/27/2024	39.3	3,182	0.46	1459	28.5	22.8	6.0	585	0.97	284	1743	5.5	8.00	Y
12/28/2024	53.4	2,342	0.51	1197	28.5	21.9	5.9	588	0.96	283	1480	5.4	8.00	Y
12/29/2024	51.1	2,449	0.51	1240	28.5	21.8	5.6	614	0.98	302	1542	5.4	8.00	Y
12/30/2024	43.1	2,906	0.53	1543	28.7	21.1	6.4	536	1.00	268	1811	5.2	8.00	Y
12/31/2024	36.3	3,444	0.40	1370	28.6	21.7	6.2	559	0.98	273	1643	5.2	8.00	Y
Avg	43.5	2,936	0.51	1485	28.6	23.0	5.9	598	0.99	296	1781	7.2	8.00	NA
Min	36.0	2,264	0.36	923	28.2	21.0	5.6	536	0.88	263	1186	5.2	8.00	NA
Max	55.2	3,475	0.73	2029	28.7	24.9	6.4	633	1.18	341	2335	9.6	8.00	NA

**Notes:**

Pipeline volume factor in SMMWSC to RW tank: 125,090 MG-min/day

Distribution System Monitoring

Chlorine Residual at Bacteriological Monitoring Stations (mg/L Free Cl<sub>2</sub>)

WSSN:	0072	0390				0400			0470							0485					0517	0518		2180
	Akron	Bangor Twp.				Bangor Monitor Dist.			Bay City							Bay County					Beaver Rd	Beaver Twp		Essexville
Date	1	3	4	5	6	7	9	10	11	12	13	14	15	16	17	18	19	20	23	24	26	29	30	32
12/1/2024																								
12/2/2024																								1.11
12/3/2024	0.04	0.55	0.47	0.46	1.05				0.94	0.61	0.79	0.48	0.87	1.13	0.74	0.84	0.85	1.00	0.78	0.57		0.23		
12/4/2024																								
12/5/2024						0.84	0.87		1.06		0.92	1.12	0.61		0.98									
12/6/2024																								
12/7/2024																								
12/8/2024																								
12/9/2024																								0.99
12/10/2024				0.42	0.82				0.99	0.69	1.19		0.82		1.19	0.91	0.89	0.97	0.70	0.67		0.33		
12/11/2024																								
12/12/2024								0.82	0.83	0.40	0.81	0.85	0.34	1.07	0.63						0.72			
12/13/2024																								
12/14/2024																								
12/15/2024																								
12/16/2024																								0.94
12/17/2024																								
12/18/2024																								
12/19/2024		0.46	0.38	0.45	0.89				1.11	0.64	0.67	0.69	0.41	1.03	0.66									
12/20/2024																								
12/21/2024																								
12/22/2024																								
12/23/2024																								0.89
12/24/2024																								
12/25/2024																								
12/26/2024									0.79	0.50	0.71	0.86	0.92	1.05										
12/27/2024																								
12/28/2024																								
12/29/2024																								
12/30/2024																								
12/31/2024																								
Average	0.04			0.60				0.84				0.81						0.82			0.72		0.28	0.98
Min	0.04			0.38				0.82				0.34						0.57			0.72		0.23	0.89
Max	0.04			1.05				0.87				1.19						1.00			0.72		0.33	1.11

MONITORING STATION ADDRESSES

- |                                              |                                                   |                                                 |
|----------------------------------------------|---------------------------------------------------|-------------------------------------------------|
| 1. Sample station at corner of 5758 M-25 & R | 11. Number 1 Fire Station, 1401 Center Ave        | 19. Dore's M-84 Party Store, 6183 WS Saginaw Rd |
| 3. Bangor Fire Station, 3921 Wheeler         | 12. Number 2 Fire Station, 1000 Fremont Ave       | 20. Pump Station #13, 6000 WS Saginaw Rd        |
| 4. BCDWS Admin. Bldg. 3933 Patterson Rd.     | 13. Jack's Fruit Market, 1000 Salzburg Ave        | 23. Rail Trail Pump Station, 366 N. Tuscola Rd. |
| 5. 7-11, 3543 S. Old Kawkawlin Rd.           | 14. Number 4 Fire Station, 212 S. Dean St         | 24. Little Learners Daycare, 1694 Cass Ave.     |
| 6. Admiral Petroleum, 314 S Euclid Ave.      | 15. Number 5 Fire Station, 1209 Smith St          | 26. Wieland Contracting, 2443 S Mackinaw Rd     |
| 7. Sequin Lumber, 3881 Euclid Ave            | 16. Bay City Hall, 301 Washington Ave             | 29. Sample Station, 2515 S. 11 Mile Rd          |
| 9. Top Gun Liquor, 2981 Midland Rd           | 17. Skipper Buds Marina, 1809 S Water St          | 30. Sample Station, 340 W. Beaver Rd            |
| 10. Little Caesars, 3475 E North Union Rd    | 18. Bay Valley Animal Hospital 6015 WS Saginaw Rd | 32. Essexville City Hall, 1107 Woodside Ave     |

Distribution System Monitoring																												
Chlorine Residual at Bacteriological Monitoring Stations (mg/L Free Cl2)																												
WSSN:	2465		2960				3565			3570		3910		4280		4440			5330		5335		5540	7125			7134	
	Fraser Twp.		Hampton Twp.				Kawkawlin Twp.			Kawkawlin Met.		Linwood, LMWD		Merritt Twp.		Monitor Twp.			City Pinconning		Pinconning Twp.		Portsmouth	Williams Twp.			Wisner	
Date	34	35	36	37	38	39	40	41	42	43	45	73	74	46	48	49	52	55	58	59	61	63	65	68	69	70	72	
12/1/2024																												
12/2/2024																												
12/3/2024														0.43									0.60	0.80	0.82	0.67	0.23	
12/4/2024																												
12/5/2024		0.86	0.80	0.53	0.39	0.49	0.63	0.65		0.90		0.69				0.88	0.74	0.84			0.58							
12/6/2024																												
12/7/2024																												
12/8/2024																												
12/9/2024																												
12/10/2024														0.70										0.42	0.73	0.50		
12/11/2024																												
12/12/2024	0.62			0.48	0.31	0.42			0.66	0.69						0.81	0.69	0.59	0.48		0.66							
12/13/2024																												
12/14/2024																												
12/15/2024																												
12/16/2024																												
12/17/2024																												
12/18/2024				0.59	0.43	0.49													0.60									
12/19/2024																												
12/20/2024																												
12/21/2024																												
12/22/2024																												
12/23/2024																												
12/24/2024																												
12/25/2024																												
12/26/2024																												
12/27/2024																												
12/28/2024																												
12/29/2024																												
12/30/2024																												
12/31/2024																												
Average	0.74			0.49			0.65			0.80		0.69		0.57		0.76		0.54		0.62		0.60		0.66		0.23		
Min	0.62			0.31			0.63			0.69		0.69		0.43		0.59		0.48		0.58		0.60		0.42		0.23		
Max	0.86			0.80			0.66			0.90		0.69		0.70		0.88		0.60		0.66		0.60		0.82		0.23		

MONITORING STATION ADDRESSES

34. Fraser Elevated Tank, 2949 1/2 N. Huron Rd	43. Speedway, 106 S. Huron Rd.	59. Marathon Gas Station, 511 S Mabel St	73. Larry Chambers, 407 W. Clara Street
35. Lloyd's Cabinet, 1947 N Huron Rd	45. Kawkawlin Restaurant, 103 S Huron Rd	61. Pinconning Meter Pit, 3005 N Huron Rd	74. Linwood Party and Sporting Goods, 211 W. Center St.
36. Shirts Mugs & More, 2728 Center Ave	46. John's Bar, 1476 S Tuscola Rd	63. Master Meter Pit, 2865 Pinconning Rd	
37. Hampton DPW, 950 Wagner Rd.	48. Tool Shed Bar, 12 W Munger Rd	65. Ike's Welding, 50 N Finn Rd	
38. Bay County Golf Course, 584 W Hampton Rd.	49. Wilder Rd Party Store, 2951 E Wilder Rd	68. Williams Township Hall, 1080 W Midland Rd	
39. Sewer Lift Station, 902 Nebobish Rd.	52. Monitor Twp. Elevated Tank, 1611 E. Midland Rd	69. Pump Station, 490 W. Salzburg & 9 Mile Rd	
40. Bay Co. Road Commisison, 2600 E Beaver Rd	55. Auburn Fertilizer, 4640 S 7 Mile Rd	70. 11 Mile Elevated Tank, 5003 S. 11 Mile Rd	
41. Parish Rd. Elevated Tank, 1770 E. Parish Rd	58. Pinconning City Hall, 208 S Manitou St	72. Lindy's Sales, 9051 M-25	
42. Linwood Tile, 205 S Huron Rd			

Distribution System Bacteriological							
Water Supplier Bacteriological Analysis Report							
MICHIGAN DEPARTMENT OF PUBLIC HEALTH Bureau of Environmental Health Water Supplier Bacteriological Analysis Report				Name of Water Supply			
				Bay Area Water Treatment Plant			
				December, 2024			
COUNTY	COMMUNITY	WSSN NUMBER	DISTRIBUTION SYSTEM SAMPLES				
			avg free cl2 mg/L	NUMBER REQUIRED	NUMBER COLLECTED	NUMBER POSITIVE	NUMBER REPEAT SAMPLES
Tuscola	Akron	0072	0.04	1	1	0	0
BAY	Bangor Township	0390	0.60	10	10	0	0
BAY	Bangor-Monitor Dist.	0400	0.84	3	3	0	0
BAY	Bay City	0470	0.81	30	37	0	0
BAY	Bay County (Frankl./Monitor/Portsm.)	0485	0.82	9	10	0	0
BAY	Beaver Road Area	0517	0.72	1	1	0	0
BAY	Beaver Township	0518	0.28	2	2	0	0
BAY	Essexville	2180	0.98	4	4	0	0
BAY	Fraser Township	2465	0.74	2	2	0	0
BAY	Hampton Township	2960	0.49	10	10	0	0
BAY	Kawkawlin Township	3565	0.65	3	3	0	0
BAY	Kawkawlin Metro Dist.	3570	0.80	2	2	0	0
BAY	Linwood Metro Water District	3910	0.69	1	1	0	0
BAY	Merritt Township	4280	0.57	2	2	0	0
BAY	Monitor Township	4440	0.76	6	6	0	0
BAY	City of Pinconning	5330	0.54	2	2	0	0
BAY	Pinconning Township	5335	0.62	2	2	0	0
BAY	Portsmouth Township	5540	0.60	1	1	0	0
BAY	Williams Township	7125	0.66	6	6	0	0
Tuscola	Wisner	7134	0.23	1	1	0	0
Average Free Cl2 Residual of All Distribution Sites			0.62	98 mg/L			
1. Total distribution samples			106				
2. Total distribution samples with detectable free cl2 residual			106				
3. Total distribution samples with no detectable free cl2 residual			0				
4. Total distribution samples with no detectable free cl2 residual and HPC was <500			0				
5. Total distribution samples with no detectable free cl2 residual and HPC was >500			0				
6. Percent of distribution samples with no detectable free cl2 residual			0.00	%			
7. Percent shown line #6 in previous monthly report			0	%			