

OHA - Drinking Water Services - Turbidity Monitoring Report Form

County: Multnomah

Slow Sand, Membrane, Diatomaceous Earth Filtration, or Unfiltered Systems

Portland Water Bureau

ID #: OR 4100657

WTP-A

Month/Year: 03/2021

DAY	12 AM (NTU)	4 AM (NTU)	8 AM (NTU)	NOON (NTU)	4 PM (NTU)	8 PM (NTU)	Highest Reading (NTU)
1	0.46	0.45	0.45	0.44	0.45	0.47	0.47
2	0.47	0.47	0.46	0.48	0.48	0.49	0.49
3	0.51	0.49	0.49	0.50	0.48	0.49	0.51
4	0.50	0.50	0.48	0.49	0.50	0.50	0.50
5	0.49	0.49	0.49	0.50	0.48	0.48	0.50
6	0.49	0.47	0.48	0.47	0.48	0.47	0.49
7	0.47	0.47	0.47	0.48	0.47	0.47	0.48
8	0.47	0.45	0.45	0.45	0.45	0.47	0.47
9	0.46	0.46	0.50	0.46	0.45	0.46	0.50
10	0.45	0.47	0.45	0.46	0.45	0.44	0.47
11	0.45	0.45	0.44	0.45	0.44	0.45	0.45
12	0.45	0.44	0.45	0.44	0.44	0.44	0.45
13	0.45	0.45	0.44	0.45	0.44	0.43	0.45
14	0.43	0.43	0.43	0.44	0.43	0.43	0.44
15	0.41	0.39	0.39	0.40	0.40	0.41	0.41
16	0.39	0.40	0.40	0.40	0.39	0.39	0.40
17	0.43	0.42	0.40	0.40	0.42	0.39	0.43
18	0.41	0.42	0.41	0.40	0.40	0.39	0.42
19	0.40	0.40	0.39	0.39	0.39	0.38	0.40
20	0.39	0.38	0.38	0.37	0.36	0.38	0.39
21	0.36	0.37	0.35	0.38	0.38	0.38	0.38
22	0.36	0.36	0.34	0.34	0.35	0.37	0.37
23	0.35	0.35	0.34	0.38	0.36	0.35	0.38
24	0.35	0.35	0.37	0.38	0.35	0.38	0.38
25	0.35	0.35	0.34	0.35	0.34	0.35	0.35
26	0.36	0.36	0.35	0.35	0.35	0.34	0.36
27	0.34	0.35	0.34	0.35	0.34	0.33	0.35
28	0.36	0.35	0.35	0.34	0.32	0.39	0.39
29	0.34	0.32	0.32	0.34	0.34	0.34	0.34
30	0.35	0.35	0.35	0.34	0.34	0.34	0.35
31	0.34	0.35	0.35	0.35	0.36	0.34	0.36

Slow Sand/Membrane/DE Filtration/Unfiltered		Monthly summary	
95% of daily turbidity readings ≤ 1 NTU? ¹	N/A	CT's met everyday?	Chlorine residual at entry point always ≥ 0.2 mg/L?
All daily turbidity readings ≤ 5 NTU?	Yes	Yes	Yes

¹Filtered systems only

Signature: Anna Vosa
 Anna Vosa, P.E.

Date: 4/7/21

OHA - Drinking Water Services

Surface Water Quality Data Conduit 3

Portland Water Bureau

ID#: OR 4100657

WTP-A

Month/Year: 03/2021

Date / Time	Peak Hourly Flow	Minimum Hourly Average Free Chlorine (C)	Contact Time (T)	Actual CT	Temp	pH	Req'd CT	CT Met?	Min. Hourly Average Total Chlorine at First User
	MGD	ppm or mg/L	min.	C x T	°C		Tables	Y/N	ppm or mg/L
1 / 2	39.06	2.20	252.3	555.4	4.7	6.49	153.4	Y	2.19
2 / 4	38.92	2.21	253.2	560.7	4.7	6.48	151.3	Y	2.20
3 / 3	38.69	2.22	254.6	565.6	4.8	6.47	149.7	Y	2.21
4 / 21	38.96	2.21	252.9	559.5	5.0	6.47	150.7	Y	2.18
5 / 2	39.00	2.21	252.7	558.8	5.0	6.46	150.6	Y	2.19
6 / 0	38.71	2.23	254.7	567.1	4.9	6.48	149.6	Y	2.20
7 / 23	38.46	2.21	256.3	566.1	4.9	6.49	152.6	Y	2.20
8 / 5	38.47	2.17	256.0	556.1	5.0	6.51	134.3	Y	2.20
9 / 10	38.01	2.17	259.3	561.7	5.0	6.56	146.9	Y	2.19
10 / 8	37.68	2.18	261.6	569.8	5.0	6.53	135.4	Y	2.18
11 / 6	28.24	2.21	349.1	773.2	5.0	6.51	139.4	Y	2.20
12 / 6	28.06	2.18	351.2	764.7	5.2	6.54	135.7	Y	2.16
13 / 8	27.90	2.17	353.1	766.2	5.3	6.54	136.6	Y	2.15
14 / 10	27.91	2.21	353.0	781.2	5.5	6.50	139.3	Y	2.20
15 / 8	27.96	2.24	352.3	789.6	5.2	6.47	135.9	Y	2.18
16 / 1	27.93	2.23	352.5	786.0	5.2	6.46	136.5	Y	2.14
17 / 1	27.94	2.20	352.5	775.9	5.3	6.47	138.5	Y	2.11
18 / 9	27.94	2.20	352.2	775.0	5.5	6.53	141.6	Y	2.10
19 / 5	28.45	2.17	346.3	751.2	5.4	6.50	134.2	Y	2.14
20 / 22	24.08	2.18	409.2	893.4	5.3	6.55	136.1	Y	2.18
21 / 10	24.37	2.19	404.4	887.3	5.2	6.59	137.8	Y	2.16
22 / 22	24.88	2.20	396.5	872.4	5.4	6.57	144.0	Y	2.21
23 / 0	24.87	2.19	396.2	868.5	5.4	6.56	136.4	Y	2.19
24 / 23	24.57	2.16	401.7	868.2	5.6	6.56	138.3	Y	2.15
25 / 21	24.95	2.18	395.0	859.5	5.3	6.52	134.8	Y	2.16
26 / 0	24.91	2.18	395.8	864.3	5.5	6.53	134.7	Y	2.18
27 / 8	29.46	2.21	334.2	739.7	5.5	6.53	141.0	Y	2.17
28 / 0	29.15	2.18	338.0	736.6	5.4	6.54	136.0	Y	2.16
29 / 7	29.86	2.20	329.8	726.5	5.4	6.56	143.6	Y	2.19
30 / 23	34.60	2.20	284.8	625.2	5.8	6.54	135.0	Y	2.18
31 / 9	34.64	2.18	283.9	619.0	5.9	6.62	139.8	Y	2.19

Notes for Conduit 3 (C3):

March 1 to 31, 2021: Conduit 3 in service from Headworks through Lusted and on to town.

Signature: Anna Vosa
 Anna Vosa, P.E., Water Quality Engineer

Date: 4/7/21

OHA - Drinking Water Services

Surface Water Quality Data Conduit 2

Portland Water Bureau

ID#: OR 4100657

WTP-A

Month/Year: 03/2021

Date / Time	Peak Hourly Flow	Minimum Hourly Average Free Chlorine (C)	Contact Time (T)	Actual CT	Temp	pH	Req'd CT	CT Met?	Min. Hourly Average Total Chlorine at First User
	MGD	ppm or mg/L	min.	C x T	°C		Tables	Y/N	ppm or mg/L
1 / 8	42.24	2.18	269.6	587.4	4.7	6.42	138.8	Y	2.16
2 / 6	42.02	2.20	270.8	595.5	4.7	6.51	139.6	Y	2.18
3 / 6	41.80	2.21	272.3	602.7	4.8	6.49	151.7	Y	2.17
4 / 19	42.13	2.19	270.2	591.0	5.0	6.48	140.3	Y	2.15
5 / 6	42.23	2.19	270.0	590.0	5.0	6.48	140.6	Y	2.14
6 / 6	41.57	2.22	272.3	603.4	4.9	6.48	150.8	Y	2.20
7 / 19	41.59	2.22	273.9	607.2	4.9	6.48	150.6	Y	2.20
8 / 18	41.10	2.17	274.4	596.0	5.0	6.49	133.6	Y	2.05
9 / 9	41.12	2.19	277.1	606.3	5.0	6.51	141.3	Y	2.16
10 / 7	40.75	2.16	227.5	492.0	5.0	6.51	135.1	Y	2.12
11 / 6	24.50	2.19	261.8	573.9	5.0	6.51	133.1	Y	2.13
12									
13									
14									
15									
16									
17									
18									
19									
20									
21	Conduit 2 Out of Service from Headworks through Lusted to Gresham								
22									
23									
24									
25									
26									
27									
28									
29									
30									
31									

Notes for Conduit 2 (C2):

March 1 to 11, 2021: Conduit 2 out of service from Headworks to Hudsons Intertie; Conduit 4 feeding Conduit 2 at Hudsons Intertie, Conduit 2 in service from Hudsons through Lusted and on to town.

March 11 to 31, 2011: Conduit 2 out of service from Headworks through Lusted to Gresham. Gresham backfed by Conduit 2 from Powell Butte.

Signature: Anna Vosa
 Anna Vosa, P.E., Water Quality Engineer

Date: 4/7/21

OHA - Drinking Water Services

Surface Water Quality Data Conduit 4

Portland Water Bureau

ID#: OR 4100657

WTP-A

Month/Year: 03/2021

Date / Time	Peak Hourly Flow	Minimum Hourly Average Free Chlorine (C)	Contact Time (T)	Actual CT	Temp	pH	Req'd CT	CT Met?	Min. Hourly Average Total Chlorine at First User
	MGD	ppm or mg/L	min.	C x T	°C		Tables	Y/N	ppm or mg/L
1									
2									
3									
4									
5	Conduit 4 Out of Service from Hudsons Intertie through Lusted and on to Town								
6									
7									
8									
9									
10 / 20	28.17	1.72	298.5	512.1	5.0	6.39	139.5	Y	1.34
11 / 19	51.71	2.27	243.0	552.0	5.0	6.62	141.9	Y	2.03
12 / 6	51.63	2.17	244.4	530.0	5.2	6.64	141.4	Y	2.12
13 / 21	51.42	2.20	245.7	540.6	5.3	6.49	139.5	Y	2.13
14 / 8	51.43	2.19	245.6	536.8	5.5	6.50	133.1	Y	2.14
15 / 22	51.55	2.22	245.1	544.2	5.2	6.49	138.3	Y	2.13
16 / 10	51.98	2.22	244.5	543.1	5.2	6.52	139.8	Y	2.19
17 / 11	51.89	2.20	244.6	538.3	5.3	6.56	143.3	Y	2.16
18 / 8	52.06	2.15	244.4	525.5	5.5	6.54	137.7	Y	2.15
19 / 22	52.97	2.18	239.8	523.7	5.4	6.57	137.0	Y	2.19
20 / 22	53.25	2.22	238.0	528.4	5.3	6.58	143.2	Y	2.14
21 / 10	54.06	2.19	235.2	513.9	5.2	6.61	138.5	Y	2.11
22 / 20	55.21	2.20	229.9	505.7	5.4	6.59	137.2	Y	2.15
23 / 7	55.16	2.13	230.0	490.8	5.4	6.60	142.4	Y	2.14
24 / 22	49.14	2.16	257.2	556.3	5.6	6.58	139.6	Y	2.14
25 / 20	50.36	2.18	252.3	549.8	5.3	6.57	137.5	Y	2.07
26 / 12	50.24	2.19	252.7	552.8	5.5	6.59	138.5	Y	2.16
27 / 8	49.65	2.23	256.2	572.5	5.5	6.56	141.3	Y	2.19
28 / 17	48.89	2.14	259.5	556.1	5.4	6.60	141.7	Y	2.12
29 / 11	50.20	2.19	252.9	553.1	5.4	6.61	138.7	Y	2.13
30 / 10	48.95	2.21	257.8	569.8	5.8	6.65	148.0	Y	2.18
31 / 7	48.69	2.22	261.0	578.2	5.9	6.61	145.5	Y	2.17

Notes for Conduit 4 (C4):

March 1 to 10, 2021: Conduit 4 out of service from Hudsons Intertie through Lusted and on to town; Conduit 4 feeding Conduit 2 at Hudsons Intertie.

March 10 to 31, 2021: Conduit 4 in service from Headworks through Lusted and on to town.

Signature: Anna Vosa
 Anna Vosa, P.E., Water Quality Engineer

Date: 4/7/21

OHA Drinking Water Services - Raw Coliform Data (Unfiltered)

Portland Water Bureau

ID#: OR 4100657

Month/Year: 03/2021

Date	Fecal Coliform (CFU/100mL)	Comments
3/1/2021	<1	
3/2/2021	<1	
3/3/2021	<1	
3/4/2021	<1	
3/5/2021	<1	
3/6/2021	1	
3/7/2021	<1	
3/8/2021	1	
3/9/2021	1	
3/10/2021	<1	
3/11/2021	<1	
3/12/2021	1	
3/13/2021	<1	
3/14/2021	<1	
3/15/2021	<1	
3/16/2021	<1	
3/17/2021	<1	
3/18/2021	<1	
3/19/2021	<1	
3/20/2021	<1	
3/21/2021	<1	
3/22/2021	<1	
3/23/2021	<1	
3/24/2021	<1	
3/25/2021	<1	
3/26/2021	<1	
3/27/2021	<1	
3/28/2021	<1	
3/29/2021	<1	
3/30/2021	<1	
3/31/2021	1	

Note: Fecal Coliform sampled at active Headworks Raw Water Intake (either 2P or 2PIS)

Six Month Summary:

# of Samples For Fecal Coliform:	179
# of Samples > 20 CFU/100mL:	0
Percent:	0.0%