



REGIONAL DISTRICT NORTH OKANAGAN

Whitevale Water Utility Water Quality Report for August 2022

The following is the water quality summary for the Whitevale Water (WVW) Utility.

1. Source

The WVW system draws raw water from a groundwater well, Well 2 (well plate identification number (WPID) 16643 and well tag number (WTN) 90803) which is then chlorinated and pumped into an in-ground concrete reservoir. Water is then pumped into the distribution system. Tables 1 and 2 summarize the results for bacterial and turbidity for the untreated water at the treatment plant.

Table 1 Whitevale Well 2 Bacteria

Parameter	Laboratory		# of Samples	# of Deviations	Result
E.coli ¹	Caro	CFU/100 mL	1	-----	<1
Total Coliform ¹	Caro	CFU/100 mL	1	-----	<1

¹Drinking Water Treatment Objectives (Microbiological) for Ground Water Supplies in BC (Sec 2.3): No detectable bacteria per 100 mL of drinking water. Where more than 1 sample is collected in a 30 day period the standard for total coliform is at least 90% of the samples may have no detectable total coliform per 100 mL and no sample has more than 10 total coliform bacteria per 100 mL.

Table 2 Whitevale Well 2 Turbidity

Parameter	Laboratory		# of Samples	# of Deviations	Min	Max	Average
Turbidity ¹	Operator Grab Sample	NTU	9	-----	0.06	0.11	0.07

¹WQ Deviation Response Plan - Turbidity > 1 NTU

2. Treatment Plant

The Whitevale Water Utility utilizes chlorine disinfection only. Table 3 summarizes chlorine and turbidity levels from the sample line that comes off the reservoir outlet pipe that feeds the distribution system.

Table 3 Whitevale Water Treatment Reservoir

Parameter	Laboratory		# of Samples	# of Deviations	Min	Max	Average
Free Chlorine ²	SCADA ¹ Daily Average	mg/L	31 Days	-----	0.72	1.08	0.88
Turbidity ²	SCADA ¹ Daily Average	NTU	31 Days	-----	0.03	0.11	0.05

¹SCADA: Supervisory Control and Data Acquisition

²WQ Deviation Response Plan - Free Chlorine <0.20 mg/L; Turbidity > 1.0 NTU

3. Distribution

WVW provides potable water to 92 residential connections and 1 institutional connection (not in use, supplies storage for fire suppression). There are no large scale industrial or irrigation customers on this system. Table 4 summarizes the results for chlorine, turbidity, and bacteria for the distribution system. The monthly water volume used at Whitevale this month was 7,133 m³.

Table 4 Whitevale Distribution Parameters

Parameter	Laboratory		# of Samples	# of Deviations	Min	Max	Average
Free Chlorine ¹	Operator Grab Sample	mg/L	21	-----	0.66	1.04	0.86
Total Chlorine	Operator Grab Sample	mg/L	21	-----	0.72	1.11	0.93
Turbidity ¹	Operator Grab Sample	NTU	21	-----	0.06	0.11	0.08
E.coli	Caro	CFU/100 mL	6	-----	<1	<1	<1
Total Coliform	Caro	CFU/100 mL	6	2 ²	<1	5	1

¹WQ Deviation Response Plan - Free Chlorine <0.20 mg/L or >2.20 mg/L; Turbidity > 1.0 NTU

²Two samples had total coliform counts from Caro Laboratory; Whitevale Reservoir (1 CFU/100 mL) and Eastwood Road SS (5 CFU/100 mL). These sites were resampled and the results were non-detect.

4. Customer Calls and Notifications

Customer calls within the Whitevale Water Utility service area are tracked and recorded. There were no customer calls in August.

5. Operational or Maintenance Activity

Operational activities within the Whitevale Water service area are tracked and recorded. There were no distribution operational activities in August.