

## Village of Lions Bay Pressure Reducing Valve Stations - 2021

BI Pure Water supplied and installed two pressure reducing valve (PRV) stations and one control valve station, each housed inside an above-ground kiosk, within the Bayview and Upper Bayview Roads, and Mountain Drive areas of The Municipality of the Village of Lions Bay. The supplied stations included electrical, instrumentation, and SCADA works.

Designed and manufactured in Surrey, BC by BI Pure Water Canada Inc., the PRV and control valve stations were factory fabricated as fully-enclosed units on structural steel skids. This approach allowed factory testing of the stations in-house and therefore greatly reduced construction time on site.

## Bay View Road School and Upper Bay View Road PRV Stations

The Bay View Road School and Upper Bay View Road PRV stations each include an 8" PRV and 4" PRV parallel piping assembly mounted on a CWB-certified structural steel frame. The above-ground stations were supplied with downturned connections to tie into the underground piping on-site.

120/240V, 1-ph electrical power from BC Hydro enters the site through overhead service into the NEMA 3R, 240V, 100A, 4 JAW utility meter base that is installed in the kiosk. A power distribution panel distributes power to the control panel (future provision), lights, heater, ventilation, and receptacles. A future provision is provided for the control panel to be powered through an uninterruptable power supply (UPS). Additionally, the Upper Bay View Road PRV station includes a PLC with analog and digital modules.

## **Mountain Drive Control Valve Station**

The Mountain Drive Control Valve station consists of an 8" control valve assembly mounted on a CWB-certified structural steel frame. The above-ground stations were supplied with downturned connections to tie into the underground piping on-site.

120/240V, 1-ph electrical power from BC Hydro enters the site through overhead service into the NEMA 3R, 240V, 100A, 4 JAW utility meter base that is installed in the kiosk. A power distribution panel distributes power to the control panel (future provision), lights, heater, ventilation, and receptacles. A future provision is provided for the control panel to be powered through an uninterruptable power supply (UPS). A PLC with analog and digital modules is included.

These package PRV stations are cost-effective because:

- The plants can be built in the Port Kells factory where our experienced team of engineers and skilled manufacturing team are available for new custom-designed systems.
- The completed PRV station is factory tested and certified in-house.

For more information, you can contact BI Pure Water at 604-882-6650 or <a href="mailto:info@bipurewater.com">info@bipurewater.com</a>. Please visit our website at <a href="mailto:www.bipurewater.com">www.bipurewater.com</a> for more information about our projects and services.



Figure 1 – Upper Bay View Road PRV Station with Installed Piping Assembly



Figure 2 – Electrical Compartment of Kiosk Figure 3 – Inside of PRV Station

