



Applications

The Model BSIL-W10 Vibrating Wire V-Notch Weir Monitor is a water level monitoring system that uses a vibrating wire force transducer to provide a highly stable and sensitive means of monitoring water levels.

Vibrating Wire V-Notch Weir Monitor is used predominately in dams, open channels such as streams and in tunnels. The system comprises a Stainless Steel plate with a notch profile chosen to suit predicted flow rates.

Description

The main component is a cylindrical weight suspended from the force transducer. The cylinder hangs partially submerged in the water whose level is to be monitored. As the water level changes the changing buoyancy force on the cylinder acts directly on the vibrating wire transducer and alters its tension and hence its resonant frequency.

Flow of water over the weir head can be measured optically with a manual steel scale, or by using a Vibrating Wire transducer.

Readings can be taken manually with a Vibrating Wire readout or remotely by means of a data acquisition system.

Key Features

- ♦ Accurate and sensitive water level monitoring
- ♦ Rectangular or triangular notched plate
- ♦ Robust design and reliable
- ♦ Fit for manual or remote reading
- ♦ Intergal thermistor



Comprehensive information about this product and our full range is available at www.bsil.com.cn

If you would prefer to speak with someone directly, please call +86-10-63780922 or email info@bsil.com.cn

Main Specifications

Model	BSIL-W10
Range	150, 300, 600mm
Resolution	0.025% F.S.
Accuracy	±0.1% F.S.
Temperature range	-20 to + 80°C

Operation

The measuring point for the head of water is located upstream of the weir plate and comprises either an optical Stainless Steel scale fixed to the basin wall for manual readings by eye, or a Vibrating Wire transducer suspended in the head of water.

The cylinder and force transducer of BSIL-W10 Vibrating Wire V-Notch Weir Monitor system are contained within a housing made from slotted PVC pipe. This pipe can be positioned within the weir or tank or it can be installed in a Stilling Well connected hydraulically to the tank or weir.

The vibrating wire transducer is vented to the atmosphere so that barometric fluctuations are compensated for automatically. The vent line terminates in a moisture trap which requires periodic maintenance to replace the desiccant.

