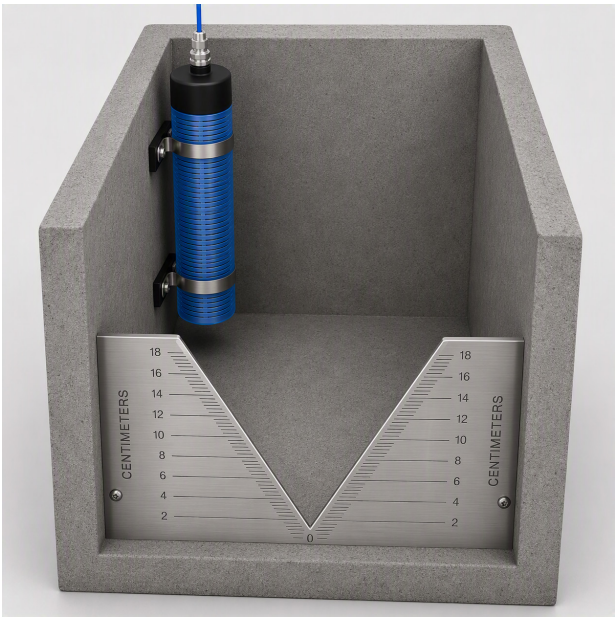
DATASHEET

VW Weir Monitor VWM-2000

The Geosense VWM-2000 vibrating wire Weir Monitor provides high precision water level measurements for monitoring of weirs, tanks, streams and reservoirs.







GEOSENSE

VW Weir Monitor VWM-2000

Overview



APPLICATIONS

Precise water level measurement of:

- Weirs
- Streams
- Reservoirs
- Tanks

FEATURES

- Accurate (0.1mm changes can be measured)
- High resolution
- Long-term stability
- Insensitive to long cable lengths
- High accuracy
- Integral thermistor
- Suitable for remote reading and data logging

The Geosense® VWM-2000 Vibrating Wire Weir Monitor is a precision water-level monitoring system designed for long-term, continuous measurement with minimal maintenance. Combining a vented vibrating wire force transducer with a suspended cylindrical weight, the VWM-2000 delivers highly accurate, stable and reliable water-level measurements over extended monitoring periods.

The system operates by measuring the vertical movement of the cylindrical weight as it rises and falls with changes in water level. The weight is hollow, providing natural buoyancy that helps to stabilise the system and minimise fluctuations in readings.

The transducer and suspended weight are housed within a slotted PVC pipe, which acts as a baffle to reduce the effects of light turbulence and help maintain stable measurements. The PVC casing can be installed either alongside or within the weir or tank, providing flexibility to suit different installation requirements.

The vibrating wire transducer is vented to atmosphere, automatically compensating for changes in atmospheric pressure. A vented termination box is also provided, allowing longer cable runs to be achieved using non-vented cables. The termination box incorporates a desiccant, which may require periodic replacement depending on environmental conditions.



Like all vibrating wire sensors, the VWM-2000 provides a frequency-based output unaffected by cable resistance, enabling long cable runs without compromising accuracy - ideal for remote, long-term monitoring applications.

VW Weir Monitor VWM-2000

Specifications

GENERAL	
Operating temperature range	-20°C to +80°C
Standard ranges	300mm, 600mm
Resolution	0.025% FS
Accuracy	±0.1% FS
Linearity	±0.5% FS
Cable	4 x 22 AWG (shielded with vent tube)
Cable Type	Type 920 - Vented multi-core with foil screen & drain wire x 5m Type 900 - VW Sensor with Foil Screen & Drain Wire x 1m
Dimensions	Sensor dimensions – 25.4mm x 190mm 300mm System Dimensions – 115.5mm x 805.5mm 600mm System Dimensions – 90mm x 995mm
ORDERING INFORMATION	
Cable length	
Range	

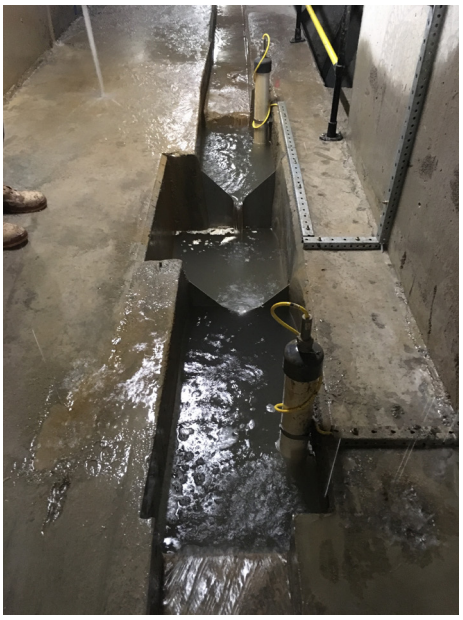
READOUT

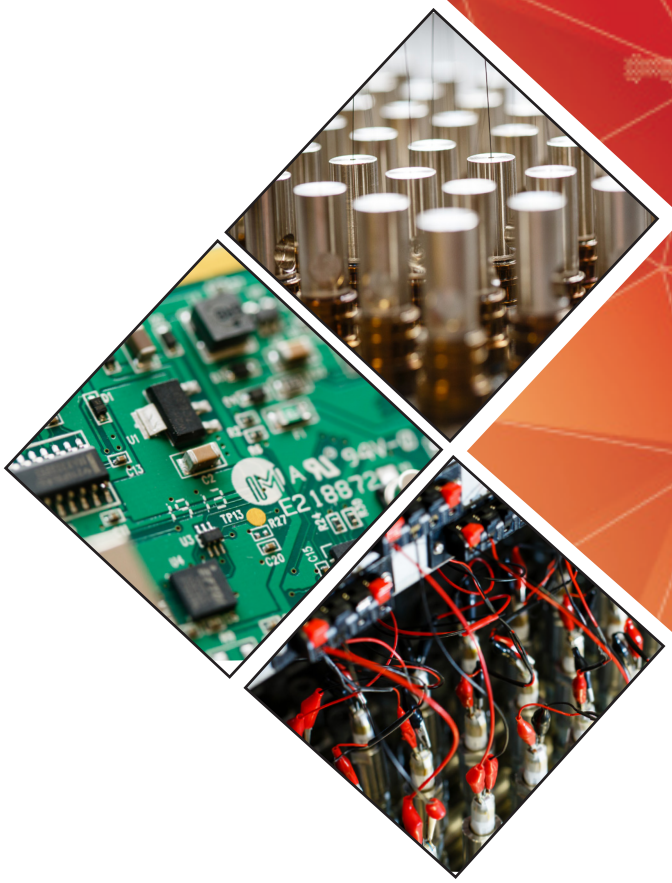
VWM-2000 may be read by the VWR1 or any vibrating wire readout device or any other data logger with vibrating wire interface modules.

The vented cable can be terminated in a special junction box close to the weir monitor where it can be extended with Type 900 cable to a data logger or Remote Multiplexer.

ADDITIONAL ITEMS

The Geosense VWM-2000 can be used in conjunction with V Notch weir plates and tanks. Both are sold seperately.





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