



Hydrostatic Level Sensors

Aquameta - Australian Made

The 420 series of 4-20mA pressure transducers are a cost effective and robust solution designed for continuous water level measurement where a 4-20mA output is required. It may be used with other liquids that are compatible with its wetting materials which are UPVC, Nitrile and Aluminum Oxide. Different choice of seals is available for other applications. The sensor includes temperature and barometric pressure compensation.

Transducer Construction

This state of the art pressure sensor uses a flush Aluminum Oxide Ceramic diaphragm in conjunction with on-board signal conditioning to measure pressures. Pressure and temperature calibration is done electronically with the internal applicationspecific integrated circuit (ASIC). When pressures and temperatures change, the electronics provide an offset and span correction. It also includes aging detection and compensation. This new method guarantees good precision and long term stability. The sensor is encapsulated in a UPVC body that is filled with an epoxy. The sensor cable is molded into the transducer eliminating problems associated with threaded plugs. This design ensures a very high level of reliability.

Output Signals

The 420 transducer uses a two wire 4-20mA output signal. The signal is linear with pressure. The sensor will operate with a supply voltage that can range from 9V



to 30V DC. The Aquameta Junction box may be used to extend the transducer cable with any other cable. The vented junction box has a Gortex covered opening that allows venting to atmosphere to take place whilst restricting the ingress of moisture.

Features

- 4-20mA output
- Power Supply 9 to 30V DC
- Temperature compensated
- Barometric pressure compensation via vented cable
- High linearity and low hysteresis values
- EMI Certified
- Excellent resistance to corrosion and abrasion
- Automated offset and span correction
- Age compensation

Applications

- Dams
- Resevoirs
- Storage Tanks

This sensor can be used with BXD17 controller on page 10

Technical Specifications Aquameta Sensors

For the entire range of Hydrostatic Sensors visit www.roycewater.com.au

Part #	Description	Medium	Pressure Range	Power Supply	Output	Medium Temp.	Accuracy	Cable Length
PF420- xxbar- xxmetres	Hydrostatic level sensor, semi flush face with standard PVC cable	General water and wastewater sensor	0.5, 1.0, 5.0 bar	9 - 30 VDC	4-20 mA	0-40°C	+/- 0.5% FSO	10.0 m Custom available
CR420- xxbar- xxmetres	Hydrostatic level sensor, closed face with standard PVC cable	General water and wastewater sensor	0.5, 1.0, 5.0 bar	9 - 30 VDC	4-20 mA	0-40°C	+/- 0.5% FSO	10.0 m Custom available