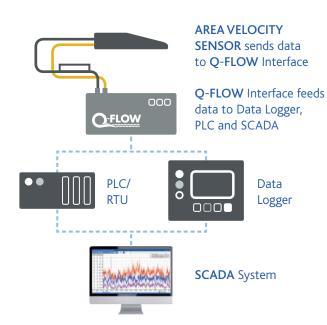


# Q-FLOW 25

THE **Q-FLOW 25** IS DESIGNED TO BE AN ADAPTABLE AREA VELOCITY FLOW METER THAT CAN BE CONNECTED TO ANY DATA LOGGER OR INTEGRATE INTO AN ESTABLISHED SCADA SYSTEM.



# **HOW IT WORKS**



Installed within the open channel, the sensor simultaneously uses ultrasound waves to measure the velocity of the liquid flow and pressure sensing technology to establish depth.

Pre-configured dimensions of the pipe or channel are used to determine the overall volume of flow.

The Q-FLOW 25 interface converts the raw data received from the sensor into recognised languages, including Modbus and frequency outputs are all optional.

The Q-FLOW 25 interface can be connected to a data logger or integrated directly into a SCADA system via a PLC or RTU, giving the user full control.

DATA SHEET Q-FLOW 25 MMS D043 Iss.3

# **Q-FLOW** 25

## **KEY FEATURES** •

### **ON-BOARD FLOW CALCULATION**

Works in rectangular, circular or trapezoidal pipes. Pulse output can be used for flow proportional sampling.

### **IN-BUILT TEMPERATURE SENSORS**

In-built temperature sensors measure both the water and ambient temperature. Hugely beneficial for inflow and infiltration studies.

### MARKET LEADING ACCURACY

Uses velocity and depth to calculate the overall flow.

### **COST EFFECTIVE**

The **Q-FLOW** interface can be connected directly to the customer's data management system, negating the need for additional data loggers, transmitters and controllers.

# **TECHNICAL** SPECIFICATION

### **VELOCITY SENSOR**

Dual piezoelectric elements.

### **DEPTH SENSOR**

Hydrostatic pressure.

### INTEGRATED TEMPERATURE COMPENSATION

Titanium diaphragm isolated silicon sensor.

### **PHYSICAL**

Sensor cable 10m as standard, up to 20m.

### **ENVIRONMENTAL**

Sensor module protection: IP68. Operating temperature: -20°C to +60°C.

### **APPROVALS**

ATFX 7 one 1

Sira 18ATEX2194X and IECEx SIR 18.0049X, II 1G, Ex ia IIB T4 Ga, Ta = -40°C to +60°C.

### PERFORMANCE - VELOCITY SENSOR

Velocity range: 0.03m/s to 4.00m/s (resolution 1mm/s).

Linearity: ±1%.

Velocity Sensor Accuracy: ±2.5% FS

 $(\pm 1\% \text{ in calibrated range } 0.05\text{m/s} - 2.00\text{m/s}).$ 

### **PERFORMANCE - DEPTH SENSOR**

Range: 0.0m to 3.5m (resolution 1.0mm).

Linearity: 0.1% BSL. Accuracy: ±0.2% FS

 $(\pm 0.1\%$  in calibrated range 0.03m - 2.00m).

### **PERFORMANCE - TEMPERATURE SENSOR**

Range -20°C to +60°C. Resolution ±0.5°C.

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