

process  
**atrato**™

## Industrial Process Ultrasonic Flowmeter



Titan's Process Atrato® ultrasonic flowmeter is based on our standard, wide ranging, Atrato® meter but packaged to address the more challenging industrial process and control environment. The body is 316 stainless steel, rated at 20 Bar, and the electronics are built-in and sealed to IP65. The only other wetted materials are PEEK and

calibrated with a pre-set 'K' factor so all meters of the same flow range are fully interchangeable, simplifying assembly and set-up procedures for OEM manufacturers. There are two frequency outputs: PNP and NPN. Two multicolour LEDs indicate signal strength, power malfunctions and pulse outputs. Electrical connections are through a standard M12, four pin, sensor connector. Four flow ranges are available from 2 ml/min to 15 litres per minute, with an accuracy of ±1% over the whole flow range.



### IDEAL FOR

- Cooling equipment
- Pharmaceutical
- Drink dispense
- Chemical dosing
- Industrial Flow monitoring
- Semiconductor plant



### FEATURES

- Ultrasonic technology
- No moving parts
- 4 flow ranges
- Accuracy
  - ±1% of reading 2-100% of range
  - ±2% of reading 0-2% of range
- Repeatability ±0.1% +0.005% FSD
- Pulse output: NPN and PNP
- 20 bar rating
- 8 to 24Vdc operation
- Large turndown ratio
- ¼" BSP-F fittings / ¼" NPT-F fittings
- IP65 enclosure
- -10 to +65°C operation
- Pre-set 'K' factors



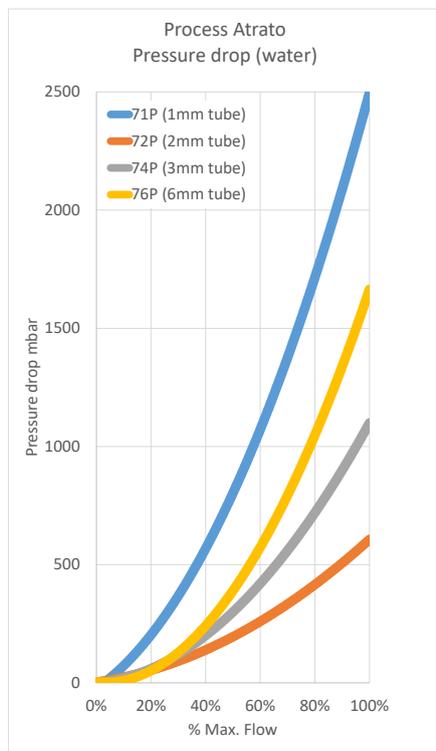
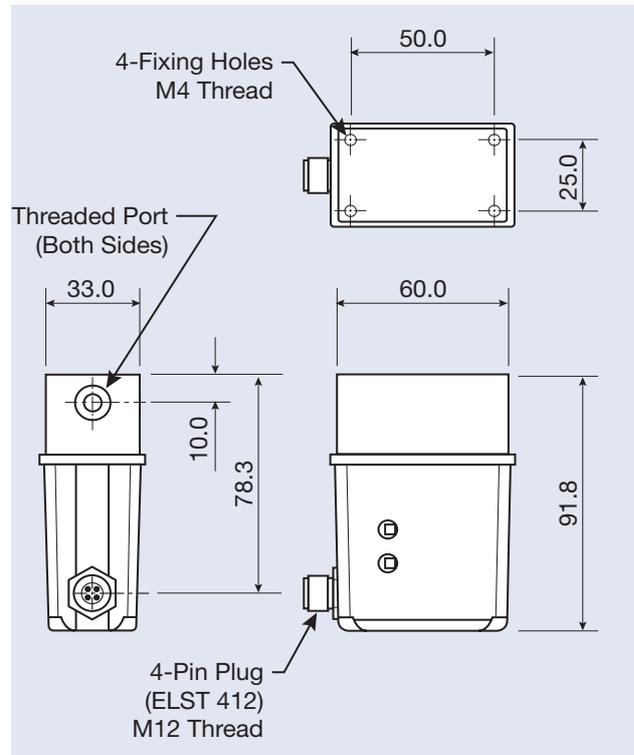
### TECHNICAL SPECIFICATIONS

Model	Flow range L/Min	Approx 'K' Factor
71P	0.002 - 0.5	100000
72P	0.01 - 1.5	20000
74P	0.03 - 5	10000
76P	0.1 - 15	2000

## Ordering Codes

Model
71P
72P
74P
76P
Seal Material (seal temperature range)
V = Viton™ (-20 to +150°C)
N = Nitrile (-20 to +100°C)
E = EPDM (-30 to +150°C)
S = Silicone (-50 to +230°C)
K = Kalrez® (-10 to +150°C)
Process Fitting Size
Q = ¼"
Process Fitting Type
B = BSP (Female)
N = NPT (Female)
Internal Tube Materials
O = PEEK/316 St St

e.g. **76P-VQB-O** is a flow range of 0.1 to 15 L/min with Viton™ seals, quarter inch BSP fittings and a 316 stainless steel flow tube with PEEK internal fittings with a pre-set 'K' factor of 2000 pulses per litre.



### Process Atrato

Linearity - Green line  $\pm 1.0\%$  of reading from 2 to 100% of range  
 - Black line  $\pm 2.0\%$  of reading minimum flow to 2% of range  
 Repeatability - Red line  $\pm 0.1\%$  of reading plus 0.005% of full scale

