

# TX80 Series Flow Sensor Specifications



## General Information

The TX80 Series are turbine-type insertion meters designed for use in pipe sizes 1" to 8". High-quality jewel bearings and nickel-bound tungsten carbide shaft are used for maximum life and extreme low friction. Bodies are machined from solid rod for maximum precision. Low-flow performance is superior. The rotation of the rotor is detected by a non-drag Hall-effect sensor. Output is a pulse-type square wave, which can be sent long distances (up to 2,000 feet) without a transmitter. This signal can be connected directly to controls, as well as PLC's, counters, and computer cards. Battery operation using the FT415 battery-operated Flow Computer is also available as an option.

Muis Controls TX80 meters are ideal for chemical proportioning applications. If no display is required, a simple divider such as the PD10 provides adjustable pump pacing. For rate and total display, as well as pump pacing, the FT420 flow indicator can be mounted directly on the TX80 Series, or remotely on a wall or panel.

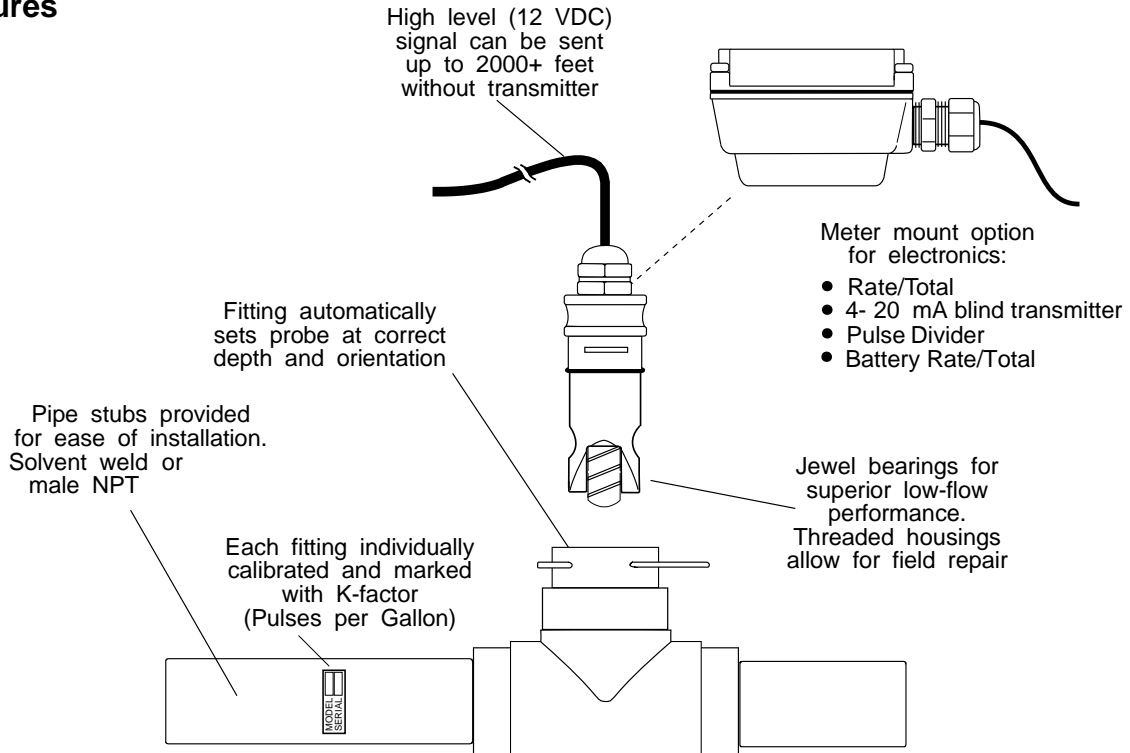
The TX80 Series require special fittings, since they are not depth-adjustable, installation in the fitting ensures correct depth placement in the pipe. Fittings are available in PVC, brass, and stainless steel. Sensors are available in brass, 316 stainless steel, and polypropylene. In plastic pipe 3"-8", use an IP82 sensor, which is 1.00" longer than the IP81 to accommodate the larger fittings.

## Specifications

<b>Sensor</b>	Hall Effect Sensor	12 VDC current sinking pulse
<b>Materials</b>	Sensor Body	Polypro, Brass, or 316 SS
	Rotor	Polypro, Kynar opt.
	Shaft	Nickel-bound tungsten carbide, ceramic opt.
	Bearings	Ruby
<b>Maximum pressure</b>	Polypro	175 psi at 75° (12 bar)
	Brass	200 psi (14 bar)
	316 SS	250 psi (17 bar)
<b>Maximum Temperature</b>	Polypro	130° F (55° C) at 0 psi
	Brass, SS	200° F (93° C)
<b>Power Signal</b>		6-24VDC, 8 mA current sinking pulse (NPN), 20 mA max
<b>Flow Range (GPM)</b>		
	1" 1-1/2" 2" 3" 4" 6" 8"	
Min.	0.8 1.9 3.1 6.9 12 27 47	
Max.	80 190 314 691 1200 2700 4700	
<b>Cable</b>		#22 AWG 3-con, 18'

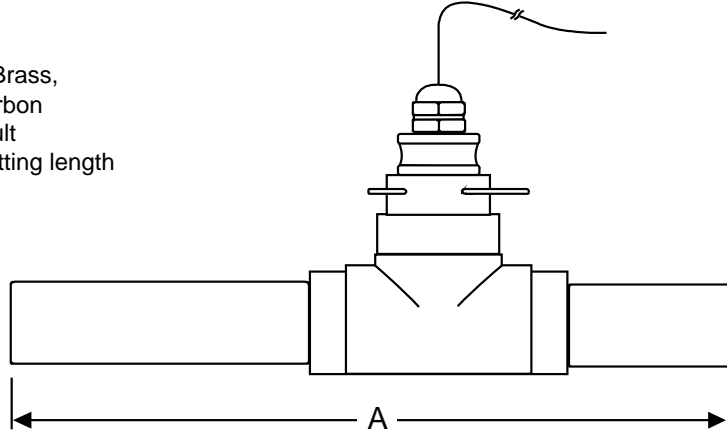
Fittings Compatibility Chart		
Material	TX81	TX82
Bronze	1"-4" Tee	3"-8" Braze fitting
PVC	1/2"-2" Tee	3"-8" Saddle
Polypro	N/A	3"-8" Tee
Stainless steel	1/2"-2" Tee	3"-8" Weld fitting
Carbon steel	1/2"-2" Tee	3"-8" Weld fitting

## Features



Fitting Length	
Size	Dim. A
1"	18-1/2"
1-1/2"	20"
2"	20"
3"	*
4"	*
6"	*

**Note:** For Brass, SS, and Carbon Steel, consult factory for fitting length dimensions.



\* Requires saddle

## How To Order

Material Code: **Y** = Polypro, **B** = Brass,  
**S** = Stainless 316

Option Code: (See right)

**TX81** \_\_\_\_\_ - \_\_\_\_\_

**TX82** \_\_\_\_\_ - \_\_\_\_\_

### Option Codes:

- 04** Micropower sensor
- 05** PVDF rotor/ceramic shaft
- 06** LMI connector
- 07** Connector

## Muis Controls Ltd.

10610 - 172 Street, Edmonton, Alberta, Canada, T5S 1H8 ☐  
 Phone: 780-486-2400 • Fax: 780-486-2500 • Toll Free: 1-800-661-8823 ☐  
 www.muiscontrols.com • email: info@muiscontrols.com