



High Sensitivity Pressure Sustaining Pilot Valve

Model #83

This pilot integrates all principal functions of a 2-Way control circuit in a single assembly.

It is a high sensitivity, direct acting pilot valve, actuated by a pressure responsive diaphragm, which tends to reach equilibrium with the set spring force.

The pilot modulates open as upstream pressure rises above set point. An integral needle valve acts as an upstream flow restrictor as well as a closing speed control.

Typical Applications

- Modulating Altitude Level Control Valves
(at reservoir outlet) sizes 1 1/2-14"
- High Sensitivity Pressure Sustaining Valves sizes 1 1/2-14"

Technical Data

Pressure Rating: 16 bar; 230 psi

Working Temperature: Water up to 80°C; 180°F

Flow Factor: Kv 1.1 m³/h @ 1bar ΔP; Cv 1.3 GPM @ 1psi ΔP

Standard Materials:

Body & cover: Brass

Diaphragm Covers: Fusion bonded epoxy coated Steel

Elastomers: NBR

Internals: Stainless Steel & Brass

Spring: Galvanized Steel

Optional Materials:

Metal Parts: Stainless Steel, Nickel Aluminum Bronze, Hastalloy

Elastomers: FPM (Viton®)

Adjustment Range

Code	Pilot		
	Meter	Feet	
M6	2-14	7-46	Standard Optional
M5	5-22	17-72	
M4	15-35	49-115	
M8	25-70	82-230	

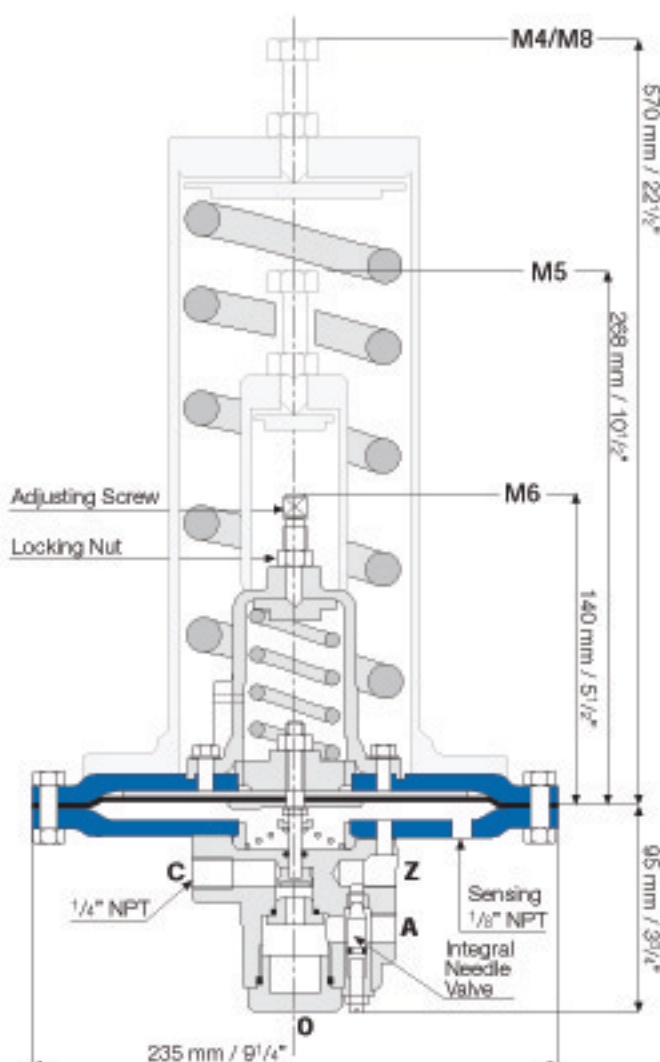
Connections

Z - Upstream

A - Valve control chamber

C - Downstream

Sensing - For altitude control – still point at reservoir bottom
For pressure sustaining – to valve upstream



Weights: M6 -10 Kg; 22 lbs. M5 -11 Kg; 24 lbs.
M4 -19 Kg; 42 lbs. M8 -22 Kg; 49 lbs.