

Series 4700 Lightweight Pinch Valve



- Lightweight, economical design
- Body functions as built-in actuator
- Closes on entrapped solids
- Full port design means no crevices or dead spots to bind valve operation
- No packing to maintain

Materials of Construction

- **Body:** Spun aluminum
 - **Sleeves:** Pure Gum Rubber, Ethylene Propylene Diene Terpolymer (EPDM)*, Acrylonitrile-Butadiene (NBR), Fluoroelastomer (FKM)*, Chloroprene (CR)*, Chlorosulfonated Polyethylene (CSM), Chloro-Isobutylene-Isoprene (CIIR)
- * White food grade options available.

The Series 4700 Lightweight Pinch valve is designed for low-pressure service, in on/off applications. The Series 4700 is similar to the Type A, but the body is constructed entirely of spun aluminum for lighter weight and ease of installation.

The Series 4700 is ideal for gravity flow applications, pneumatic conveying systems and waste treatment plants. Their unique design makes them a cost-effective and virtually maintenance-free valve.

The key to the Series 4700 is in the flexible reinforced elastomer sleeve, the only wetted part of the valve. Actuation of the valve, or the pinching action, is accomplished by air or hydraulic pressure placed upon the sleeve. The valve body acts as a built-in actuator, eliminating costly pneumatic, hydraulic or electric actuators. Adding air pressure within the annular space between the housing and sleeve can open, throttle or close the valve. In general, 25 to 35 psi over line pressure is required for full closure.

The sleeve's flexibility allows the valve to close drop tight around entrapped solids, eliminating hang-ups without ever damaging the valve itself. Sealing area is equal to 95% of the valve's length. With the Series 4700, there are no seats or packing to replace, cavities or dead spots to collect debris and bind valve operation. When the valve is open, it is like a straight piece of pipe in the line. These valves are often used in remote locations or harsh environments because there are no external links, levers, pistons or rotating parts to cause downtime. The Series 4700 can even be buried underground. When installing the Series 4700, it is recommended that galvanized steel back-up rings are used behind the valve flanges.

Series 4700

VALVE SIZE D	DIMENSIONS in/mm		AIR INLET NPT C	WORKING PRESSURE psi/kPa	WEIGHT ALUMINUM lbs/kg
	LENGTH F to F	BODY WIDTH A			
3" 80mm	8.00 203	7.75 197	0.25	125 860	6 3
4" 100mm	9.50 241	9.25 235	0.25	125 860	7 3
6" 150mm	12.00 305	11.25 286	0.50	100 690	12 5
8" 200mm	16.00 406	13.75 349	0.50	75 520	25 11
10" 250mm	30.00 762	18.00 457	0.50	50 350	55 25
12" 300mm	35.75 908	20.25 514	0.50	50 350	66 30

