

FIRE PROTECTION

TALIS **FP** RANGE

FDV-R CONTROL VALVE

TALIS model FDV-R Fire Protection valves are elastomeric diaphragm type, open fail-safe streamlined globe & angle pattern valves, featuring direct resilient diaphragm seal, with no wet spring or metallic moving parts inside the valve body. FDV-R valves are used for fixed fire suppression systems, water, foam and seawater based flow control, in manual or remote on-off & pressure control applications. FDV-R valves operate with a patented reinforced diaphragm, which eliminates the need for a compensating metal spring. The special elastic design enables gradual and precise opening or drip tight smooth closing of the valve without vibration, preventing water hammer. FDV-R automatic control valves are designed for installation, optionally in either the vertical or horizontal position.



MARKETS



TECHNICAL DATA

Fluid:

Water, Brackish water, Sea Water

Size range:

40mm to 400mm (1 1/2" to 16")

Available connection ends:

Flanged, Grooved, Threaded

Nominal Pressure (PN):

250PSI (17.2 bar)

Body material:

- Ductile iron ASTM A-536
- Cast Steel ASTM A-216 WCB
- Stainless Steel ASTM A-351 CF8
- Stainless Steel ASTM A-351 CF8M
- Nickel Aluminum Bronze B-148 C95800

Fasteners material:

- Galvanized steel
- Stainless steel A-304 #A2
- Stainless steel A-316 #A4
- Nickel Alloy (seawater service)

Coating:

- Rilsan Polyamid based (Nylon 11)
- Polyester based EPC
- High built Epoxy FBE
- Vitrious Enamel DIN3475 (internal only)

Elastomers:

- NR, 3 layer reinforced natural rubber
- EPDM, 3 layer reinforced EPDM rubber

APPROVALS

LPCB, UL PENDING

ADVANTAGES

└ **Only three parts:** body, diaphragm & cover plate, no wet metal spring inside the control chamber. Full bore unobstructed.

└ **Simple automatic or manual reset** of FDV-R valve to standby position without draining or opening the valve itself, neither closing OS&Y or other valves in the system.

└ **250 psi (17 BAR) seal test 25.5 BAR** to DIN3230 ANSI FCI 70-2 CLASS VI Bubble-Tight.

└ **Low maintenance cost**, the valve is serviced in-line, only one replaceable part, the long-life elastomeric diaphragm.

└ **Conforms with Fire testing** to ISO-6182:5 Rev. 2011.

└ **Conforms with Inspection, Testing, and Maintenance Std.** of water-based Fire Protection Systems, NFPA 25.

CHARACTERISTICS

└ **FDV-R hydro-dynamic pattern design** ensures high flowrates with minimum head loss.

└ **Elastomeric direct seal diaphragm actuator**, is the only moving wet part of the FDV-R control chamber.

└ **Open fail-safe valve maintained in stand-by closed position**, the valve trips open automatically upon release of water pressure from its control chamber, opening gradually and gently to prevent water hammer. Opening speed of FDV-R valves can be controlled.

└ **Soft closing upon pressurization of FDV-R control chamber**, by line pressure or other independent water source, prevents surges. Closing speed of FDV-R valves can be controlled.

└ **FDV-R resets to stand-by close position** by pressurizing its control chamber with system water.

└ All FDV-R valves are designed and built for **on/off and modulating applications**.