

QUICK PRESSURE RELIEF VALVE

Model 43Q

Hydraulically operated, diaphragm actuated quick pressure relief valve that relieves excessive system pressure when such pressure rises above a pre-set value. It responds immediately, accurately, and with high repeatability to a rise in system pressure by opening fully. It also provides smooth drip tight closing.

The BERMAD 400 Series valves have an advanced design with a full-bore seat and unobstructed flow path. Their one-piece elastomeric assembly ensures long life and reliable actuation in harsh conditions.



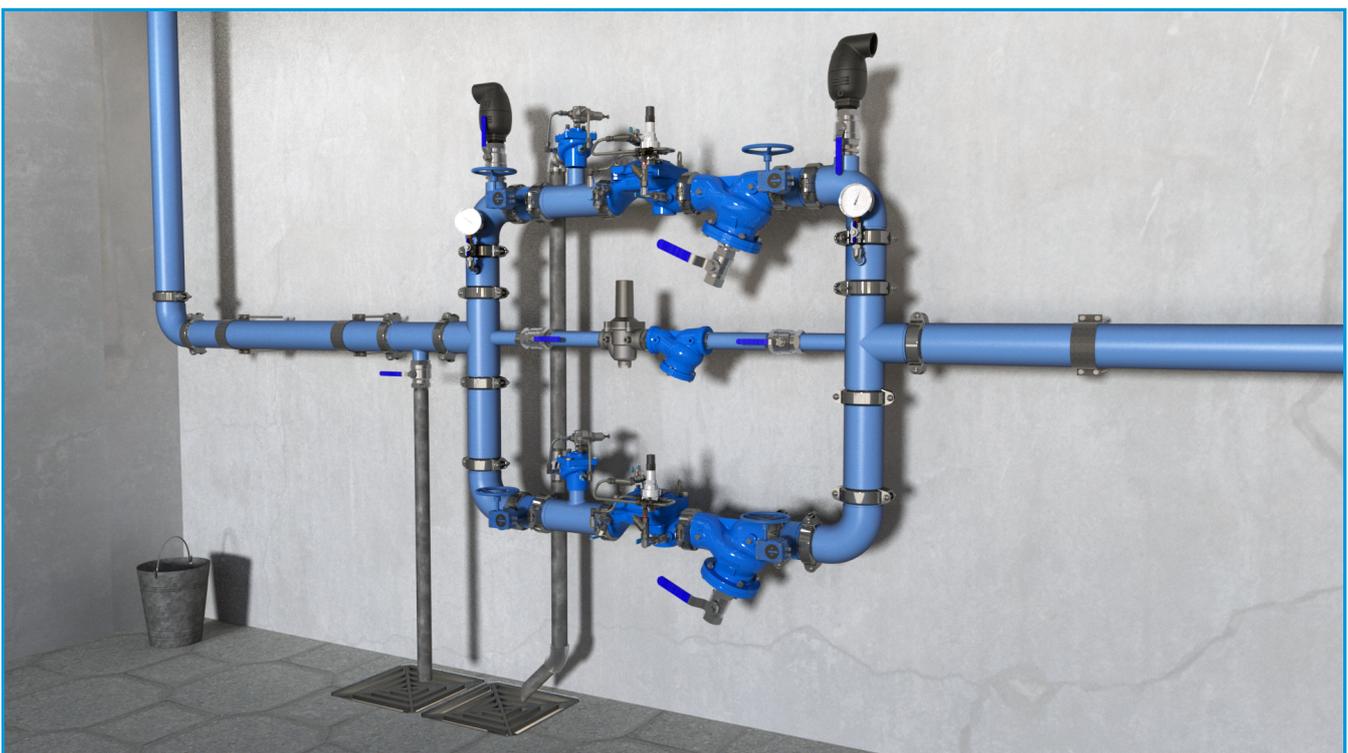
Features & Benefits

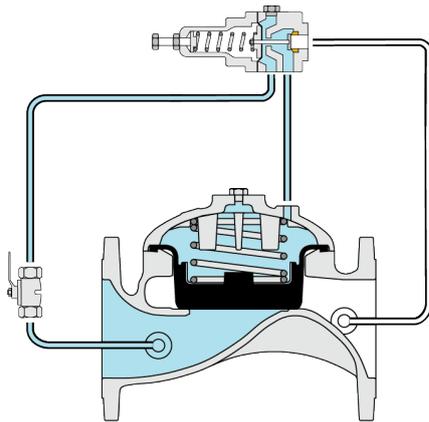
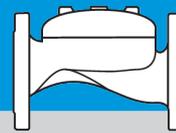
- Line pressure driven – Independent operation
- High performance control trim
 - High accuracy
 - Drip tight sealing
- Advanced globe hydro-efficient design
 - Unobstructed flow path
 - Single moving part
 - Non-turbulent flow
 - High flow capacity
- Fully supported & balanced diaphragm
 - Progressively restrains valve closing
 - Prevents diaphragm distortion
- In-line serviceable
 - Easy maintenance
 - Minimal down time

Typical Applications

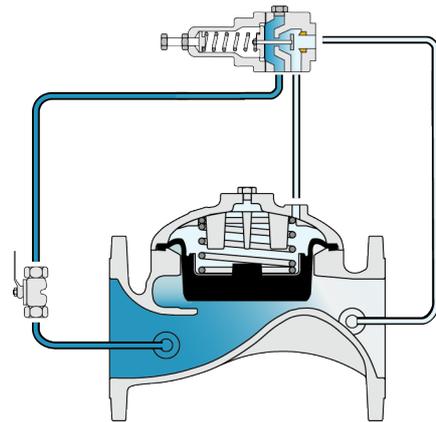
- Pressure reducing systems - Protection against pressure rise during sudden demand stoppage or failure
- Old pipe systems - Installed at sensitive spots and line ends to protect against bursts during pressure surges

Typical Installation





Closed



Open

This drawing refers to 1½ – 4"; 40-100 mm sized valves only. For other sizes please refer to the Model's IOM.

Main Valve

Size Range: 1"-12"; DN25-300

Pattern: Globe & Angle

Pressure Rating: 250 psi

End Connection: Flanged, Threaded, Grooved

Temperature Rating: 140°F

Optional higher temperature: Consult BERMAD

Standard Materials:

Body & Cover: Ductile Iron

Cover Bolts: Steel

Diaphragm: Reinforced EPDM with vulcanized radial seal disk

Spring: St. St. 302

Coating: Dark blue Fusion bonded epoxy

For other materials contact BERMAD

Control System

Standard Materials:

Accessories: Stainless Steel, Bronze & Brass

Tubing: Stainless Steel or Copper

Fittings: Stainless Steel or Brass

Pilot standard materials:

Body: Stainless Steel, Bronze & Brass

Elastomers: Synthetic Rubber

Internals and Spring: Stainless Steel

Pilot Options:

Various pilots and calibration springs are available. Select according to valve size and operating conditions. For more details check relevant pilots product pages.

Notes

- Main pipe diameter, pressure rating, flow rate and relief pressure are required for optimal sizing
- Recommended continuous flow velocity: 0.3-15 m/sec; 1-50 ft/sec.

For detailed Engineering & Specification data, IOM and CAD Drawings, visit the Model Page on the [BERMAD](https://www.bermad.com) website.