

# SOLENOID CONTROLLED VALVE

## Model 410

Hydraulically operated, solenoid controlled valve that either opens fully or shuts off in response to an electric signal. It is available in several models including Normally Open (NO), Normally Closed (NC) or LATCH.

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.



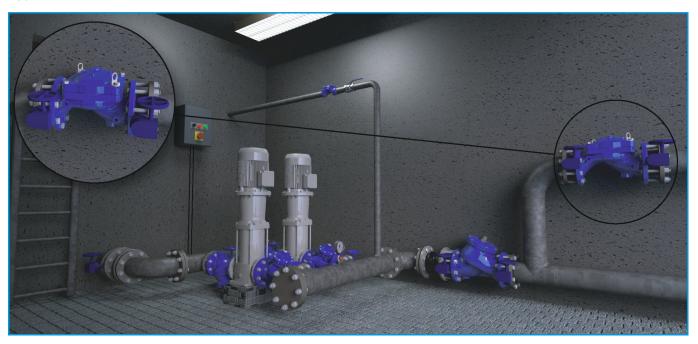
### Features & Benefits

- Line pressure driven Independent operation
- Solenoid controlled
  - Low power consumption
  - Wide ranges of voltages
  - Normally Open, Normally Closed or Latch
- Flexible design Easy addition of features
- 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

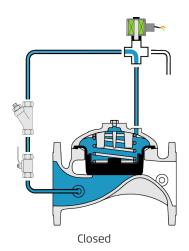
## **Typical Applications**

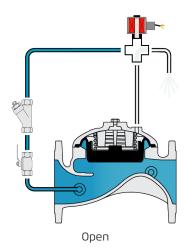
- Water reservoirs Serves as a block valve in tank filling systems
- Water reservoirs Bypass for direct supply during reservoir maintenance
- Filtration system Channeling flow during backflushing in an automatic filtration system

## **Typical Installation**









This drawing refers to 1½ – 8"; 40-200 mm sized valves only. For other sizes please refer to the Model's IOM.

#### Main Valve

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

Pattern: Globe

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

#### Solenoid standard materials:

**Body:** Brass or Stainless Steel **Elastomers:** NBR or FPM **Enclosure:** Molded Epoxy

## Solenoid Electrical Data:

#### Voltages:

(AC): 24, 110-120, 220-240, (50-60Hz)

(DC): 12, 24, 110, 220 Power Consumption:

(AC): 30VA, inrush; 15VA (8W), holding or 70VA,

inrush; 40VA (17.1W), holding

(DC): 8-11.6W

Values may vary according to specific solenoid model. For more details check solenoid product page.

## Notes

- Inlet Pressure, Outlet Pressure and Flow-rate are required for optimal sizing.
- Recommended maximum flow velocity: 6.0 m/sec; 20 ft/sec.
- Minimum operating pressure: 0.7 bar; 10 psi. For lower pressure requirements consult factory.

For detailed Engineering & Specification data, IOM and CAD Drawings, visit the Model Page on the BERMAD website.



#### www.bermad.com