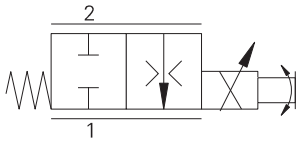
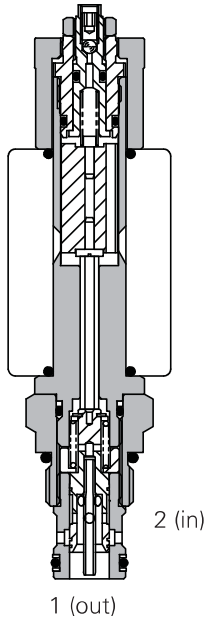


# PFR24A - Proportional valve

Proportional bi-directional, normally closed poppet  
18 L/min at 75% • 210 bar (3000 psi)



## Sectional view



## Operation

In the de-energized condition the valve is closed. As current is applied to the coil the valve opens proportionally allowing flow from port 2 to port 1.

## Features

- High flow capacity with reduced space requirements.
- Standard valve bodies and common cavities.
- One-piece encapsulated coil with minimal amperage draw.
- Oil immersed armature solenoid.
- Various coil terminals and voltages.
- Coil interchangeability with valves of same series.
- Manual override, seal variations and other options available.
- Sealed coil arrangement to protect stem from corrosion.
- Reversible coil without affecting performance.

## Performance data

### Ratings and specifications

Performance data is typical with fluid at 32 cST (150 SUS)

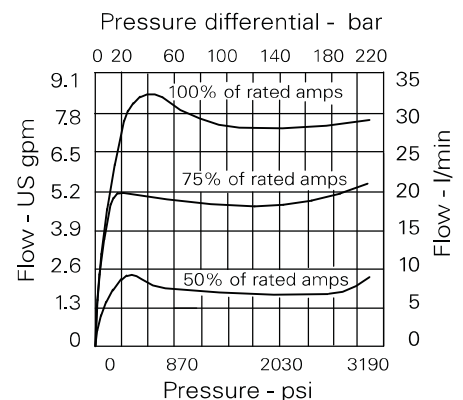
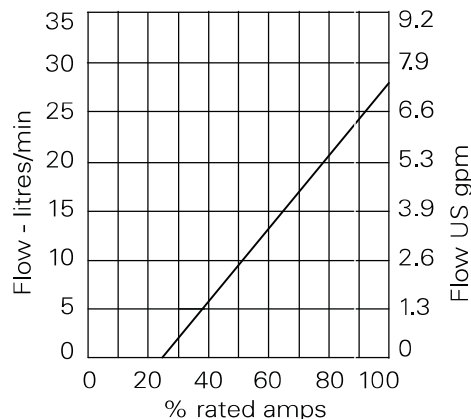
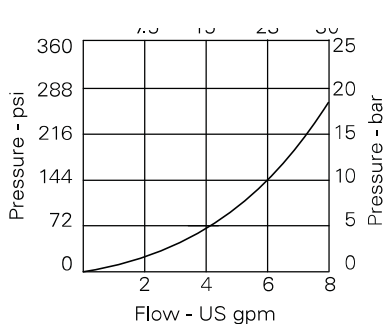
Max inlet pressure	210 bar (3000 psi)
Rated flow	28 L/min @ 100%, 23 L/min @ 85%, 18 L/min @ 75%
Hysteresis	8% maximum without PWM, 4% maximum with PWM
Frequency	200 Hz to 400 Hz - 200 recommended
Dead band	25-35% of rated current
Response time	300 ms
Internal leakage	Up to 200 ml/min, 210 bar differential
Temperature range	-30° to 120°C (-22° to 248°F)
Cavity	A6701 (see section M)
Electrical data	See coil data sheet
Torque cartridge into cavity	30 Nm (22 lbs ft)
Mounting position	Unrestricted
Fluids	All general purpose hydraulics fluids such as: MIL-H-5606, SAE 10, SAE 20, etc
Seal Material	Standard nitrile with PTFE back up rings
Filtration	BS5540/4 Class 16/13 (25 micron or better)
Nominal viscosity range	15 to 250 cSt
Standard housing materials	Aluminium alloy
Coil Weight	0.3 kg (.6 lbs)
Weight	0.2 kg (.44 lbs)
Seal kit	SK1138 (Nitrile) SK1138V (Viton®)

Viton is a registered trademark of E.I. DuPont

## Description

This is a compact 2 ported proportional, pressure compensated, spool type flow regulator. Ideal for speed regulation of actuators in many applications.

## Pressure drop curves

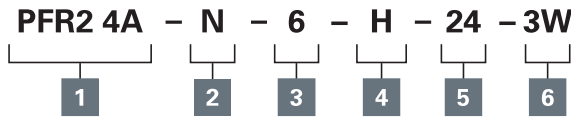


Where measurements are critical request certified drawings. We reserve the right to change specifications without notice.

# PFR24A - Proportional Valve

Proportional bi-directional, normally closed poppet  
18 L/min at 75% • 210 bar (3000 psi)

## Model code



### 1 Function

**PFR2 4A** - Cartridge only

### 2 Seal material

**N** - Nitrile  
**V** - Viton®

### 3 Manual override

**6** - Screw

### 4 Coil termination

**H** - DIN43650  
**F** - Flying Lead  
**DM** - Deutsch moulded  
Other terminations available on request.

### 5 Voltage

**12** - 12 VDC  
**24** - 24 VDC

### 6 Port size

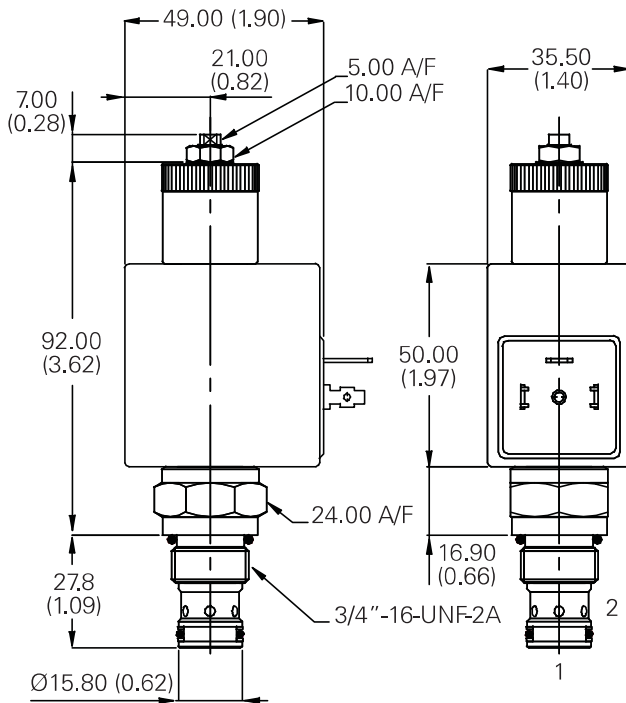
Code	Port size	Housing number
<b>Aluminium</b>		
<b>0</b>		Cartridge only
<b>2W</b>	1/4" BSP	A12592
<b>3W</b>	3/8" BSP	A7450
<b>6T</b>	3/8" SAE	A19355

See section J for housing details.

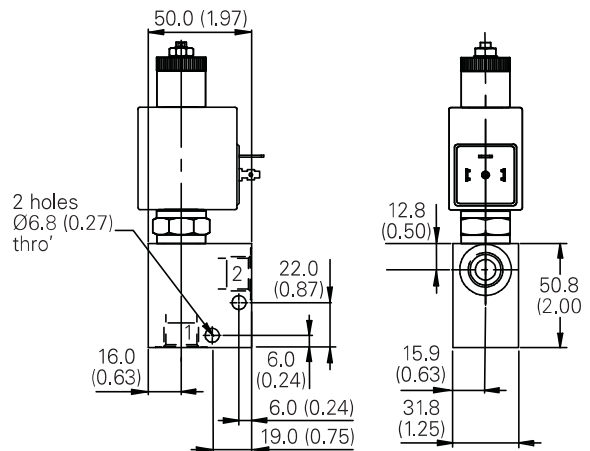
## Dimensions

mm (inch)

### Cartridge only



### Installation drawing



Where measurements are critical request certified drawings. We reserve the right to change specifications without notice.