

BPR50 Series

Back Pressure Regulator



Customer Value Proposition:

The BPR50 is a piston style back pressure regulator designed to control upstream or back pressure with corrosive media and environments.

The materials of construction in this regulator make it suitable for use where high pressure corrosive and noncorrosive liquids and gasses at pressures up to 2,000 psig.



Contact Information:

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Product Features:

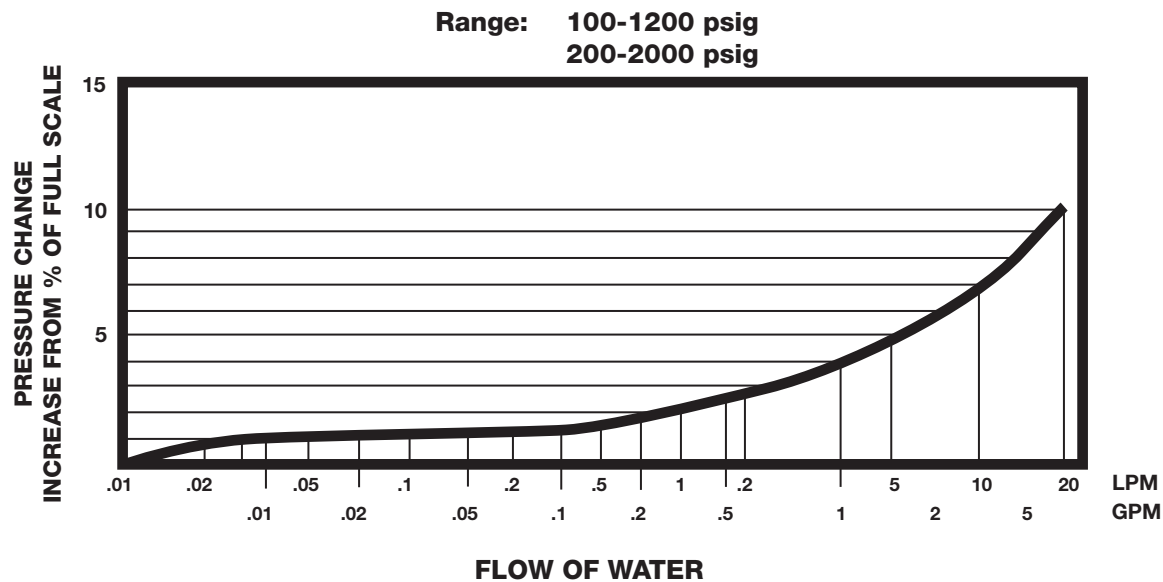
- 316L Stainless Steel construction
- Cleaned for O₂ service is standard.
- Gas or Liquid Service.
- Simple construction makes maintenance easy.
- Panel mount option is available.
- Adjustable pressures from 100 to 1,200 psig and 200 to 2,000 psig.
- Flow Coefficient of 0.45 C_v.



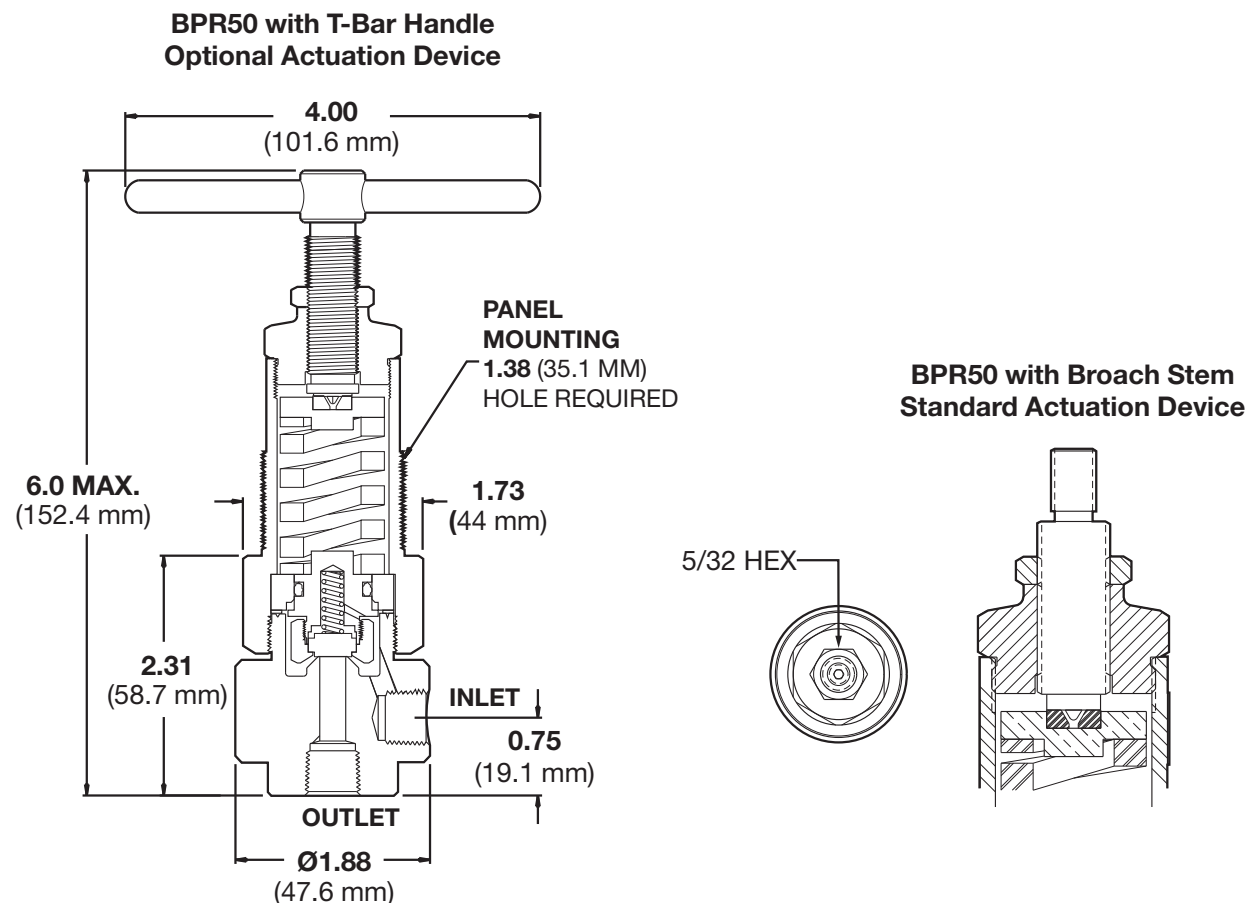
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BPR50

Flow Curve



Dimensional Drawing



Safety Guide and Installation and Operating Instructions available at
www.parker.com/veriflo

BPR50

Ordering Information

Build an BPR50 Regulator by replacing the numbered symbols with an option from the corresponding tables below.

1

2

3

4

5

Sample: **BPR50** **S** **3PB** **1** **BH** **PM**
Finished Order: **BPR50S3PB1BHPM**

- 1

Body Material
S = 316L Stainless Steel
- 2

Porting
2PB= 2 Ports - *Outlet through bottom*
3BP= 3 Ports
3PB= 3 Ports - *Outlet through bottom*
- 3

Adjustment Range
1 = 100 - 1200 psig
2 = 200 - 2000 psig
- 4

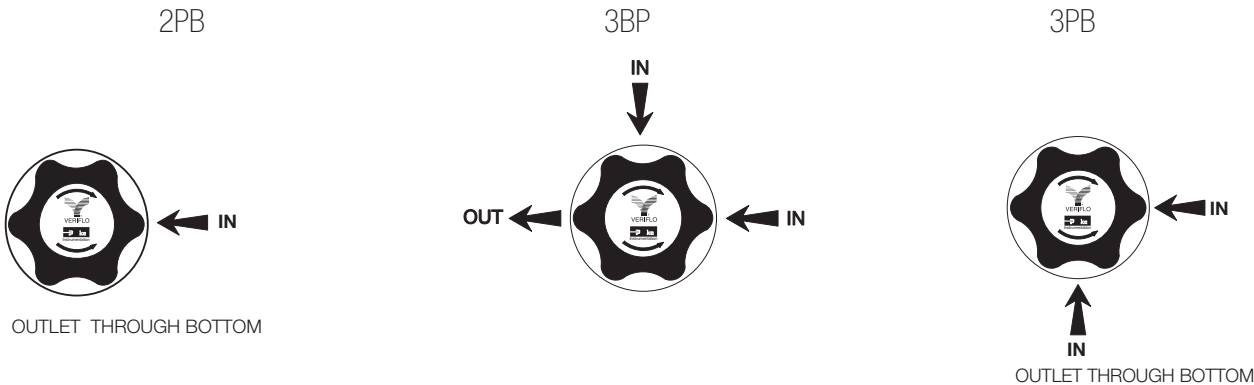
Actuation Devices
BH = T Bar Handle
Omit = Broach Stem *(Standard)*
- 5

Optional Features
This section can have multiple options
K = Perfluoroelastomer (FFKM) O-ring with PCTFE Seal
PM = Panel Mount

Additional configurations available upon request

Note: Veriflo reserves the right to plug NPT ports. If a true ported body is required, please contact Customer Service.

Porting Configurations



BPR50

Specifications

Materials of Construction	
Wetted	
Body	316L Stainless Steel
Seal Options	Glass filled PTFE (std) PCTFE
Seal Holder	316L Stainless Steel
O-ring Options	FKM (std) FFKM
Piston	316L Stainless Steel
Gasket	PCTFE
Spring	316L Stainless Steel
Non-wetted	
Cap	Nickel Plated Brass
Broach Stem	316L Stainless Steel
T Bar Handle	Nickel Plated Brass
Operating Conditions	
Control Pressure	100 - 1,200 psig (7 - 83 barg) 200 - 2,000 psig (14 - 138 barg)
Temperature	-40°F to 150°F (-40°C to 66°C)

Functional Performance	
Design	
Proof Pressure	3,000 psig (207 barg)
Burst Pressure	6,000 psig (414 barg)
Flow Capacity	
C _v	0.45
Leak Rate	
Internal:	Bubble Tight
External:	Bubble Tight
Maximum Liquid Flow	20 lpm (5 gpm)
Hysteresis	20 psig (1.4 barg)
Sensitivity	0.5 psig (0.03 barg)
Internal Volume	5 cc
Approximate Weight	2.2 lbs (1.0 kgm)

For additional information on materials of construction, functional performance and operating conditions, see Regulator Technical Bulletin.

OFFER OF SALE:

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