

BP-MF690 (05) Datasheet

MEDIUM-FLOW BACK PRESSURE REGULATOR



Gas Liquid | Diaphragm Piston | Max Rating: 550 bar (7,975 psi) | Control Range: 414 bar (6,000 psi) | Cv 0.5



INTRODUCING THE BP-MF690 (05)...

The BP-MF690 (05) is a piston-sensed medium-flow back pressure regulator for gas or liquid applications. The gas version includes a PEEK™ seat, whilst the liquid version features Hastelloy® seating for excellent protection from cavitation and positive shut-off on medium-flow applications.

The BP-MF690 (05) accurately controls inlet pressures of up to 414 bar (6,000 psi) and vents excess pressure back via the threaded NPT, BSP or MP outlet port.

SPECIFICATION

Max. Rating	550 bar (7,975 psi)
Control Range	Up to 414 bar (6,000 psi)
Design Proof Pressure	150% max. working pressure
Seat Leakage	In accordance with ANSI/FCI 70-3
Weight	5kg (11lbs)

Note: Pressure regulator rating may be limited by connection type, Cv and/or seat material. Contact the office for specific pressure requirements.

FEATURES AND BENEFITS

1 PISTON SENSING ELEMENT

Perfect for use in challenging conditions.

2 PRECISION MACHINED SENSING ELEMENT

For accurate pressure control.

3 OPTIONAL AIR ACTUATOR

For fine remote adjustment.

4 OPTIONAL FLANGED CONNECTION

For compatibility with flanged systems.

STANDARD MATERIALS OF CONSTRUCTION

PART	MATERIALS
Body and Bonnet	ASTM A479 316/316L Stainless Steel (UNS S31600/S31603) <i>Approx. Temperatures: -196°C to 538°C</i>
Main Valve Pin	Inconel® 718 (UNS N07718) <i>Approx. Temperatures: -196°C to 425°C</i>
Seat	PEEK™ (450G) <i>Approx. Temperatures: -50°C to 204°C</i>
	Hastelloy® C276 (UNS N10276) <i>Approx. Temperatures: -196°C to 675°C</i>
Valve Spring	Elgiloy® (UNS R30003) <i>Approx. Temperatures: -196°C to 450°C</i>
Piston	ASTM A479 316/316L Stainless Steel
Handwheel	Nylon
O-Rings	NBR N70 (Nitrile Buna N) <i>Approx. Temperatures: -30°C to 120°C</i>
	FKM/FPM (Viton) <i>Approx. Temperatures: -20°C to 200°C</i>
Loading Spring	Silicon Chrome Wire

For the full list of material temperature ranges, please visit www.pressure-tech.com.

Note: Temperature details are provided as nominal values for guidance purposes only. No warranty is made, expressed or implied. Contact the office for specific temperature requirements.

Product availability and specifications contained herein are subject to change without notice. Consult local distributor or factory for potential revisions and/or service related issues. Pressure Tech Ltd support with product selection recommendations only - it is the users responsibility to ensure the product is suitable for their specific application requirements.



DESIGNED AND BUILT IN THE UK

PRESSURE TECH LTD

Unit 24, Graphite Way, Hadfield, Glossop, Derbyshire, UK, SK13 1QH
 T +44 (0)1457 899 307
 E sales@pressure-tech.com
 W www.pressure-tech.com

190721

PAGE:
1 OF 4

BP-MF690 (05) Datasheet

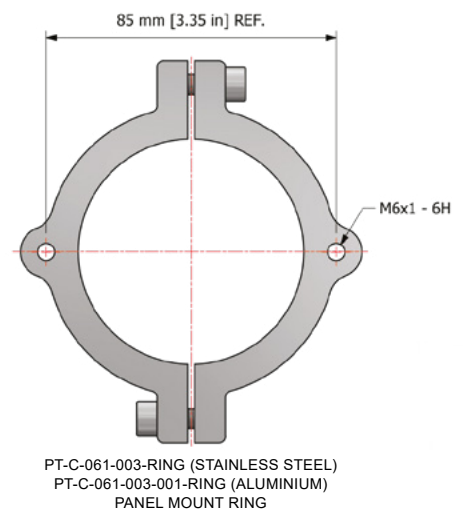
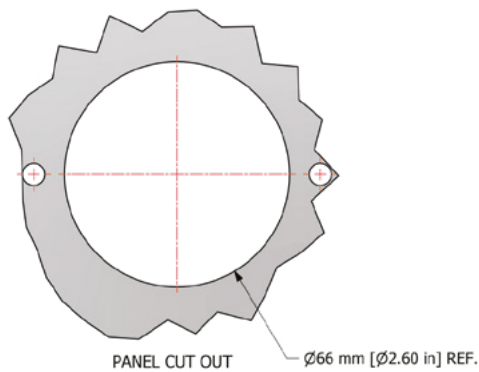
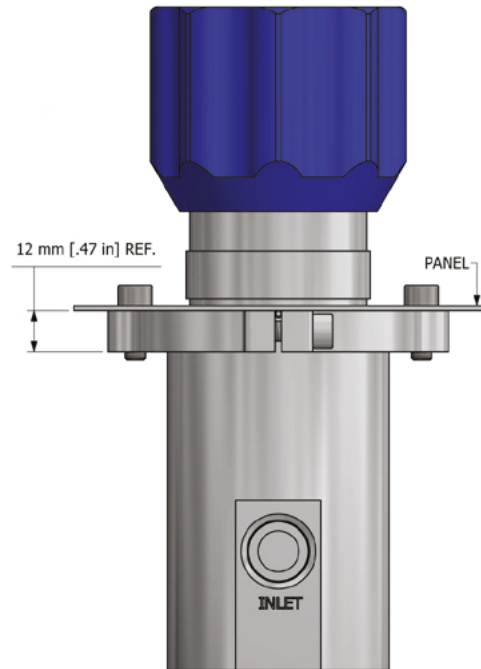
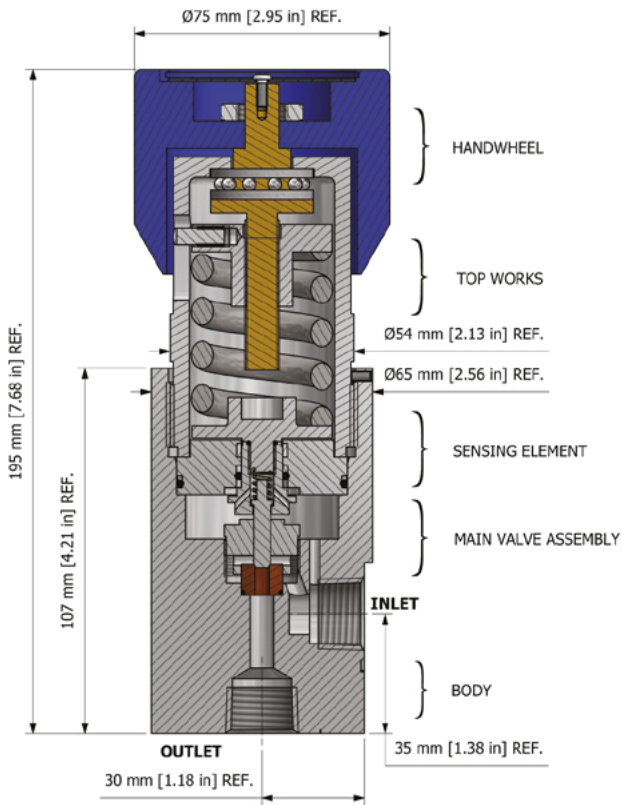
MEDIUM-FLOW BACK PRESSURE REGULATOR



Gas Liquid | Diaphragm Piston | Max Rating: 550 bar (7,975 psi) | Control Range: 414 bar (6,000 psi) | Cv 0.5

DRAWINGS AND INSTALLATION DIMENSIONS

Dimensions shown for 1/2" NPT option - please contact the office for additional connection options.



Note:

All gauge ports are 1/4" NPT as standard.

Product availability and specifications contained herein are subject to change without notice. Consult local distributor or factory for potential revisions and/or service related issues. Pressure Tech Ltd support with product selection recommendations only - it is the users responsibility to ensure the product is suitable for their specific application requirements.



DESIGNED AND BUILT IN THE UK

PRESSURE TECH LTD

Unit 24, Graphite Way, Hadfield, Glossop, Derbyshire, UK, SK13 1QH
 T +44 (0)1457 899 307
 E sales@pressure-tech.com
 W www.pressure-tech.com

BP-MF690 (05) Datasheet

MEDIUM-FLOW BACK PRESSURE REGULATOR

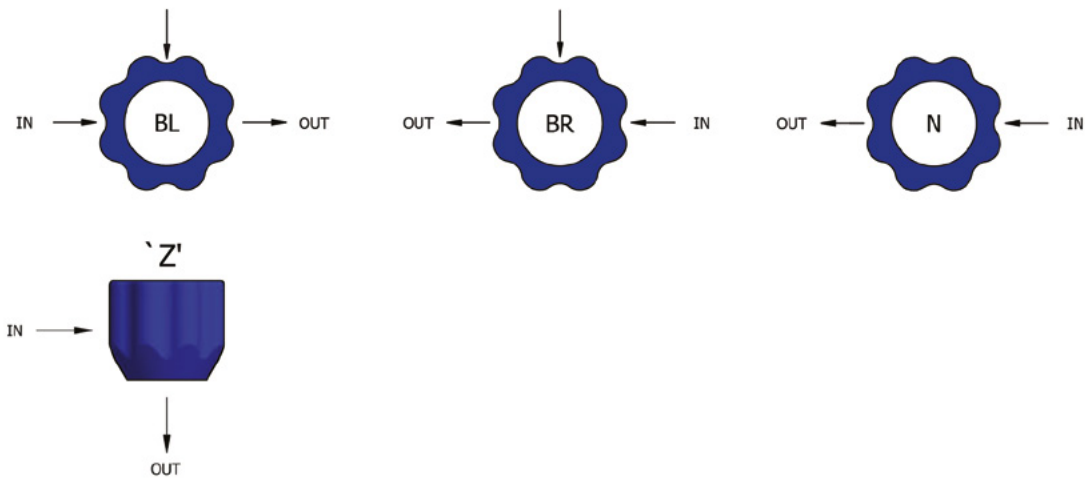


Gas Liquid | Diaphragm Piston | Max Rating: 550 bar (7,975 psi) | Control Range: 414 bar (6,000 psi) | Cv 0.5

FLOW CURVE

Please contact the office for further information.

PORTING CONFIGURATIONS



Note:

Additional porting configurations are available - please contact the office for further information.

Product availability and specifications contained herein are subject to change without notice. Consult local distributor or factory for potential revisions and/or service related issues. Pressure Tech Ltd support with product selection recommendations only - it is the users responsibility to ensure the product is suitable for their specific application requirements.



DESIGNED AND BUILT IN THE UK

PRESSURE TECH LTD

Unit 24, Graphite Way, Hadfield, Glossop, Derbyshire, UK, SK13 1QH
T +44 (0)1457 899 307
E sales@pressure-tech.com
W www.pressure-tech.com

190721

PAGE:
3 OF 4

BP-MF690 (05) Datasheet

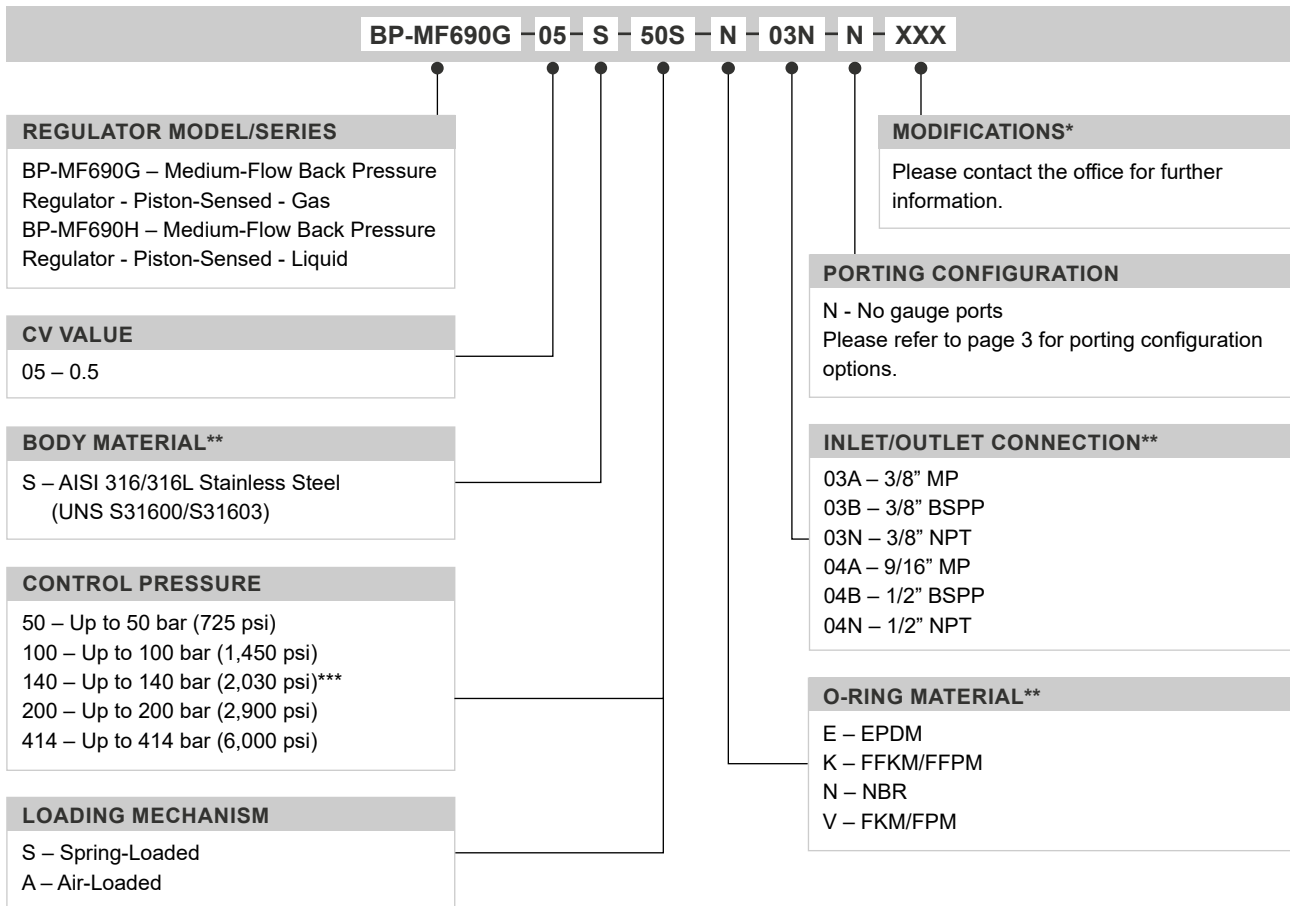
MEDIUM-FLOW BACK PRESSURE REGULATOR



Gas Liquid | Diaphragm Piston | Max Rating: 550 bar (7,975 psi) | Control Range: 414 bar (6,000 psi) | Cv 0.5

ORDERING INFORMATION

To build a Pressure Tech part number, simply combine the characters identified below in sequence:



OPTIONAL EXTRAS		
	PART NUMBER	DESCRIPTION
Service Kit	SRK-BP-MF690-05...	Various options available
Panel Mounting Ring	PT-C-061-003-RING	Stainless Steel panel mount ring
Panel Mounting Ring	PT-C-061-003-001-RING	Aluminium panel mount ring

Note:
Ancillary equipment also available

TRADEMARK: Elgiloy® is a registered trademark of Elgiloy Specialty Metals
Inconel® is a registered trademark of Inco Alloys International
PEEK™ is a trademark of Victrex PLC
Hastelloy® is a registered trademark of Haynes International, Inc

* Where applicable
** Other materials/connections may be available - please contact the office
*** Air-loaded only

Product availability and specifications contained herein are subject to change without notice. Consult local distributor or factory for potential revisions and/or service related issues.
Pressure Tech Ltd support with product selection recommendations only - it is the users responsibility to ensure the product is suitable for their specific application requirements.



DESIGNED AND BUILT IN THE UK

PRESSURE TECH LTD
Unit 24, Graphite Way, Hadfield, Glossop, Derbyshire, UK, SK13 1QH
T +44 (0)1457 899 307
E sales@pressure-tech.com
W www.pressure-tech.com

190721

PAGE:
4 OF 4