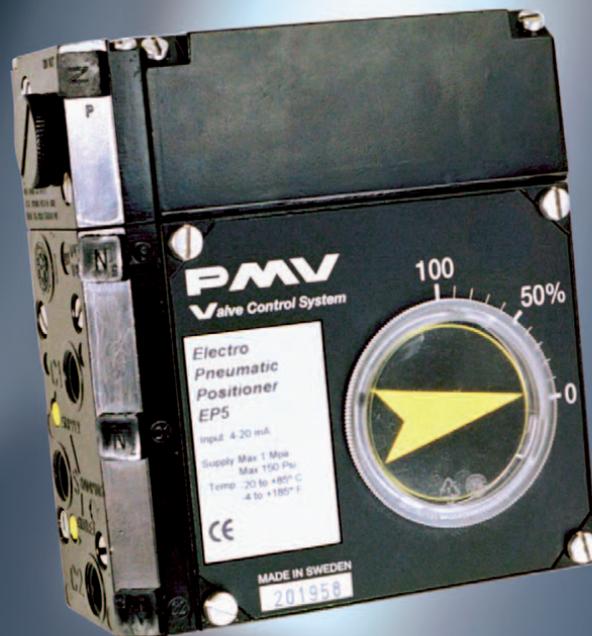
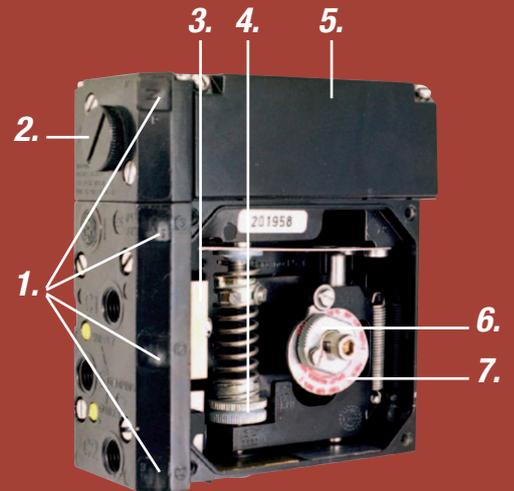


EP5 Electropneumatic positioner

Product
Information



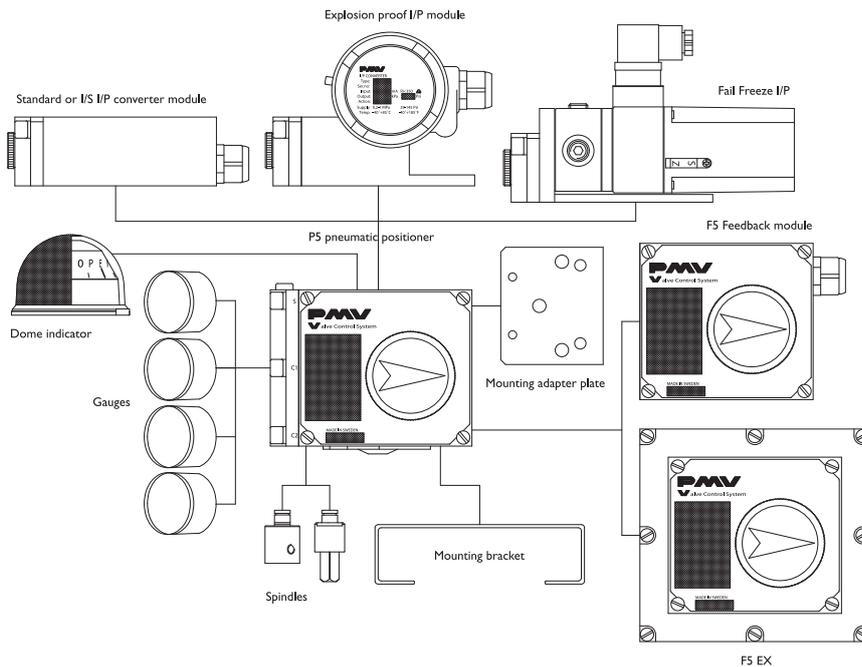
1. Gauge ports
2. Filter plug
3. Spool valve (High performance or Normal Gain)
4. Simple calibration of span & zero
5. I/P converter
6. Simple cam locking
7. Stainless cam



EP5 Electropneumatic Positioner

EP5

- Modular, sturdy, simple, reliable design.
- Tapped exhaust port.
- Easy to add on Feedback Unit F5.
- Simple calibration, external zero adjustment.
- High gain pilot valve.
- Built in gauge ports.
- Bright visible indicator, flat or Dome style.
- Stainless steel cam.





Technical data

Deadband	≤ 0.15%
Input signal	4–20 mA
Linearity	≤ 1%*
Hysteresis	≤ 0.75%*
Repeatability	≤ 0.5%*
Air supply	Max. 1 MPa/150 Psi, Oil, water and dustfree Min. 0.14 MPa/21 Psi
Connector threads	1/4" NPT or G (BSP)
Gauge threads	1/8" NPT or G (BSP)
Conduit entry	1/2" NPT or M20 x 1,5
Terminals	2.5 mm ² (AWG 14) Screw terminals

Gain factor at: 600 KPa/87 Psi

High Performance Version

Normal Gain Version

Min: 1000 KPa/KPa

Min: 450 KPa/KPa

Min: 66%/ % ISA S75.13-1989

Min: 30%/ %

Max. air consumption at supply pressure:

0.2 MPa/29 Psi	6.1 nl/min (0.22 SCFM)	2.7 nl/min (0.1 SCFM)
0.4 MPa/58 Psi	13.6 nl/min (0.48 SCFM)	6.1 nl/min (0.21 SCFM)
0.6 MPa/87 Psi	22 nl/min (0.78 SCFM)	9.9 nl/min (0.35 SCFM)
0.8 MPa/116 Psi	30.5 nl/min (1.08 SCFM)	13.7 nl/min (0.48 SCFM)
1 MPa/145 Psi	39 nl/min (1.38 SCFM)	17.5 nl/min (0.62 SCFM)

Min. air delivery at supply pressure:

0.2 MPa/29 Psi	200 nl/min (6.9 SCFM)	156 nl/min (5.5 SCFM)
0.4 MPa/58 Psi	370 nl/min (12.8 SCFM)	288 nl/min (10.1 SCFM)
0.6 MPa/87 Psi	540 nl/min (18.8 SCFM)	421 nl/min (14.8 SCFM)
0.8 MPa/116 Psi	710 nl/min (24.7 SCFM)	553 nl/min (19.4 SCFM)
1 MPa/145 Psi	880 nl/min (30.6 SCFM)	686 nl/min (24 SCFM)

Input impedance	170–260 Ohms at 20°C (71°F)
RFI influence	Not measurable
Capacitance	Negligible
Position sensitivity	None
Supply pressure effect	0.5%/0.1 MPa (15 Psi)
Temperature range	–20°C to +85°C/(–4°F to +185°F)
Low temp option	–40°C to +85°C/(–40°F to +185°F)
Weight	1.5 kg/3.4 lbs
Housing	Die cast aluminum
Surface treatment	ED Epoxy paint, black
Fasteners	A2/A4 Stainless
Ingress protection	IP 66/NEMA 4

Approvals

ATEX	Intrinsically safe	EEX ia IIC T4–T6 Ⓢ II 1 G	Non-electrical device P5 Ⓢ II 1 G
	Flameproof**	EEX d IIC T4–T6 Ⓢ II 2 G	
FM	Intrinsically safe	Div.1, Class 1 Group ABCD	
	Explosion proof**	Div.1, Class 1 Group BCD	
CSA	Intrinsically safe	Div.1, Class 1 Group ABCD	
	Explosion proof**	Div.1, Class 1,2,3 Group BCDEFG	

* Percent of full scale

** I/P in round housing



Modular

- EP5 For all normal applications
- EP5-EX Explosion proof
- EP5-FS Fail freeze
- EP5-IS Intrinsically safe



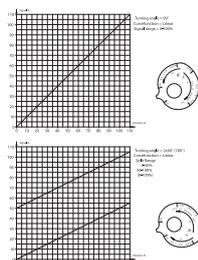
EP5 Series Coding

Model	
EP5XX	EP5 Double acting pneumatic
EP5FS	Fail freeze function
EP5IS	Intrinsically safe, ATEX, FM, CSA, IEC
EP5EX	Explosion proof ATEX, IEC, FM/CSA
Spool valve	
HP	High performance
LB	Normal Gain
Connections	
N	NPT 1/4" , El. 1/2" NPT
G	G 1/4" air, M20 x 1,5 electric
M	NPT 1/4" air, M20 x 1,5 electric
Surface treatment	
U	Epoxy coating
M	Tufram
Spindle	
01, 23 etc	01 to 39. See dwg SPNDLS_P5
Cam	
K01, K08 etc	K01 to K34
D01	Splined cam, enhanced security
Front cover	
PV9DA*	90°, Direct, arrow indicator
Input signal	
4	4-20 mA input
Temperature	
N	Nitrile seals -20°C to +85°C
Q	Silicon seals -40°C to +85°C

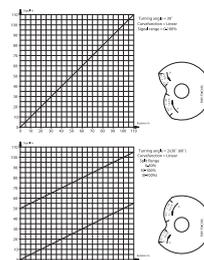
*For 30, 45, 60 deg rotation, change PV9 to PV3, PV4 or PV6

Example
EP5XX-HPNU-23K01-PV9DA-4Z

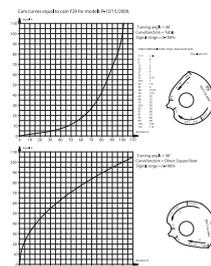
Cams



K1

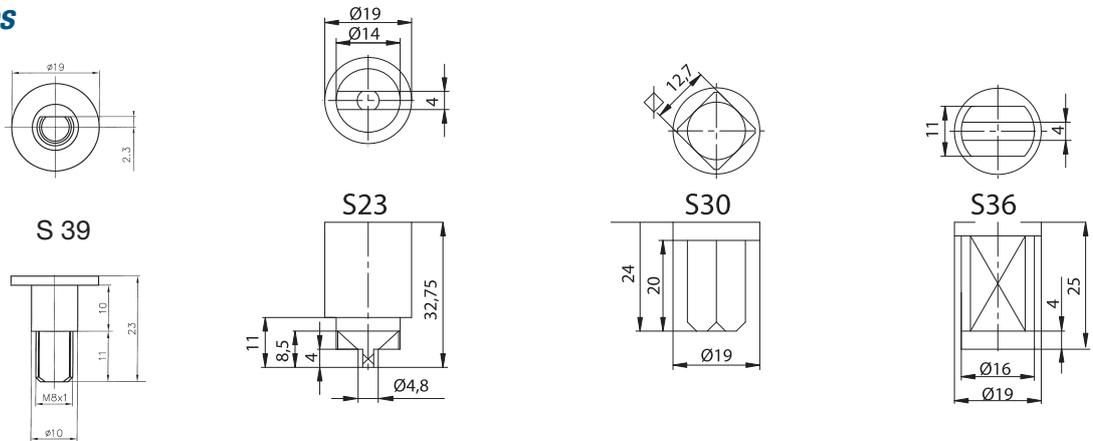


K3

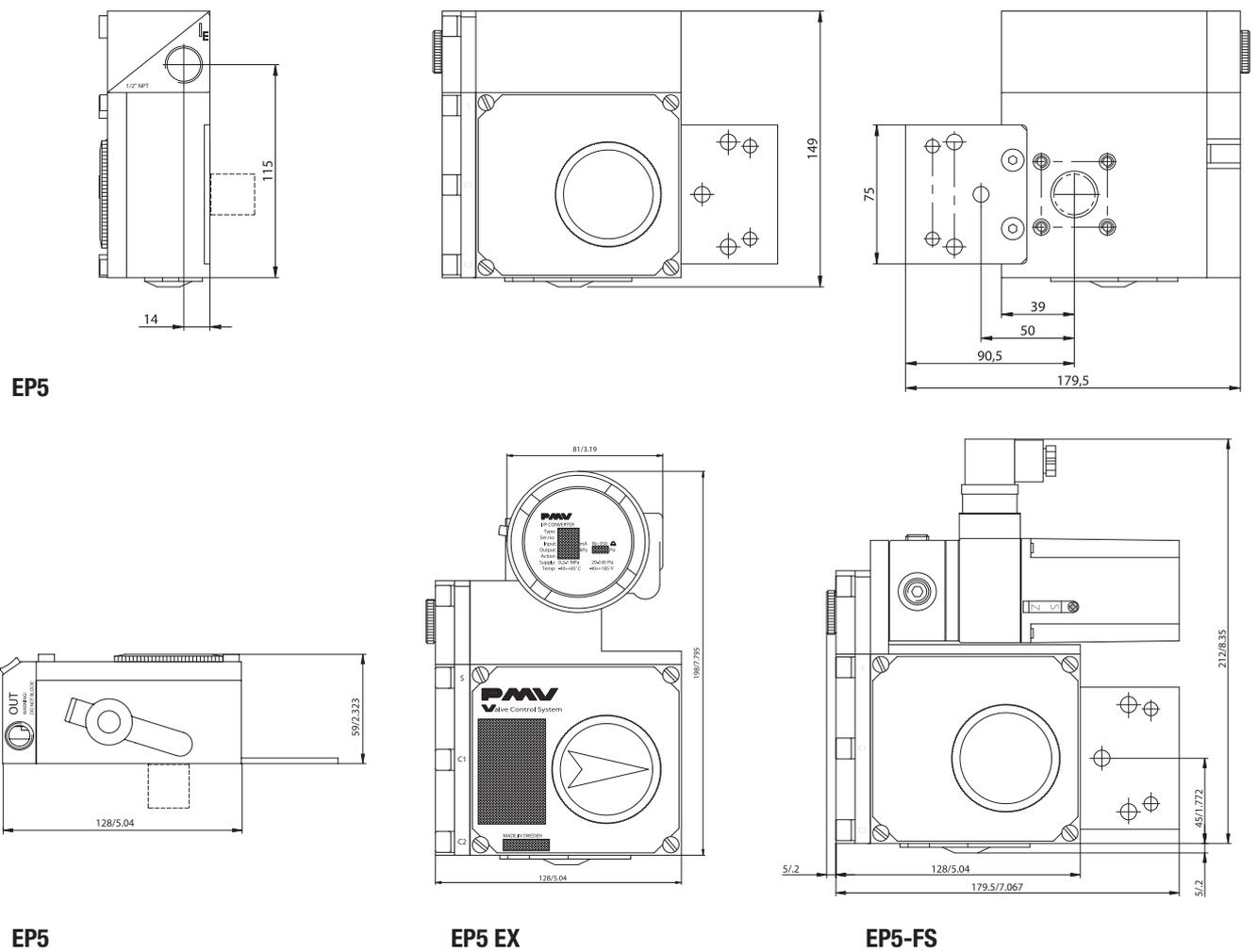


K8

Spindles



Dimensions drawings (mm)





p/n: FCD PMENBR0006-02



Hazardous Locations



Intrinsically safe:

ATEX EEX ia IIC T4-T6 (Ex) II 1 G CSA, FM Class 1, Div 1, Group ABCD

Explosion proof:

ATEX EEX d IIB+H2, T4-T6 (Ex) II 2 G CSA, FM Div 1, Class 1, 2 & 3 Group BCDEFG

Flowserve Corporation has established industry leadership in the design and manufacture of its products. When properly selected, this Flowserve product is designed to perform its intended function safely during its useful life. However, the purchaser or user of Flowserve products should be aware that Flowserve products might be used in numerous applications under a wide variety of industrial service conditions. Although Flowserve can (and often does) provide general guidelines, it cannot provide specific data and warnings for all possible applications. The purchaser/user must therefore assume the ultimate responsibility for the proper sizing and selection, installation, operation, and maintenance of Flowserve products. The purchaser/user should read and understand the Installation and Maintenance (I & M) instructions included with the product, and train its employees and contractors in the safe use of Flowserve products in connection with the specific application.

While the information and specifications contained in this literature are believed to be accurate, they are supplied for informative purposes only and should not be considered certified or as a guarantee of satisfactory results by reliance thereon. Nothing contained herein is to be construed as a warranty or guarantee, express or implied, regarding any matter with respect to this product. Because Flowserve is continually improving and upgrading its product design, the specifications, dimensions and information contained herein are subject to change without notice. Should any question arise concerning these provisions, the purchaser/user should contact Flowserve Corporation at any one of its worldwide operations or offices.

©2008 Flowserve Corporation, Irving, Texas, USA. Flowserve and PMV are registered trademarks of Flowserve Corporation.

Palmstierna International AB

Korta Gatan 9
SE-171 54 Solna
SWEDEN
Tel: +46 (0) 8 555 106 00
Fax: +46 (0) 8 555 106 01
E-mail: infopmv@flowserve.com

Germany

Flowserve
Sperberweg 16
D-41468 Neuss
GERMANY
Tel: +49 (0) 2131 795 74 80
Fax: +49 (0) 2131 795 74 99
E-mail: pmvgermany@flowserve.com

UK

Flowserve
Abex Road
Newbury, Berkshire, RG14 5EY
UK
Tel: +44 (0) 1635 46 999
Fax: +44 (0) 1635 36 034
E-mail: pmvukinfo@flowserve.com

Italy

Flowserve Spa
Via Prealpi, 30
20032 Cormano (Milano)
ITALY
Tel: +39 (0) 2 663 251
Fax: +39 (0) 2 615 18 63
E-mail: infoitaly@flowserve.com

USA, Mexico

PMV-USA
14219 Westfair West Drive
Houston, TX 77041
USA
Tel: +1 281 671 9209
Fax: +1 281 671 9268
E-mail: pmvusa@flowserve.com

Canada

Cancoppas Limited
2595 Dunwin Drive, Unit 2
Mississauga, Ont L5L 3N9
CANADA
Tel: +1 905 569 6246
Fax: +1 905 569 6244
E-mail: controls@cancoppas.com

Asia Pacific Headquarters

Flowserve Pte Ltd.
No. 12 Tuas Avenue 20
REPUBLIC OF SINGAPORE 638824
Tel: +65 (0) 687 98900
Fax: +65 (0) 686 24940
E-mail: fcdasiaprocess@flowserve.com

South Africa

Flowserve
Unit 1, 12 Director Road
Spartan Ext. 2
1613 Kempton Park, Gauteng
SOUTH AFRICA
Tel: +27 (0) 11 397 3150
Fax: +27 (0) 11 397 5300

The Netherlands

Fabromatic BV
Rechtzaad 17
4703 RC Roosendaal
THE NETHERLANDS
Tel: +31 (0) 30 6771946
Fax: +27 (0) 30 6772471
E-mail: fcbinfo@flowserve.com

China

Flowserve
Hanwei Building
No. 7 Guanghua Road
Chao Yang District
100004 Beijing
CHINA
Tel: +86 (10) 6561 1900
Fax: +86 (10) 6561 1899

www.pmv.nu