PROPORTIONAL PRESSURE REGULATOR FOR FLOW APPLICATIONS

Description The pneumatic proportional regulator controls the outlet pressure in proportion to an electrical command input signal. It comprises a complete closed loop servo system in a compact mono block assembly with proportional solenoid valve, electronic regulator and internal pressure transducer. The valve works as a slide valve and is designed for flow

applications such as thermal cutting. The digital control system offers advantages at installation and commissioning for adapting the valve to special applications. The regulator can be set and optimised using a PC, PR adapter and software. Data record can be saved and used for further valves. The valve has a constant bleed. At absence of input signal or supply voltage the valve exhausts.

Signal range Electr. connection

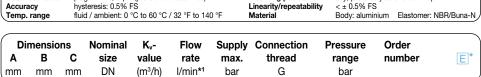
Display: signal, outlet pressure, PID parameters, pressure switch signal etc. view setpoint, outlet pressure, internal signals from PID control Software Scope function

dy, lubricated, unlubricated and 50 μ m filtered compressed air or non-corrosive gases 24 V DC \pm 10 V, residual ripple < 10% **Power consumption** 14 W (810mA current consumption) Media Supply voltage

0-10 V, 100 kΩ impedance 0/4-20 mA, 250 Ω impedance plug M12x1, 5-pin (protection class IP65) Mounting position hysteresis: 0.5% FS Linearity/repeatabi

any, preferably solenoid on top

Linearity/repeatability < ± 0.5% FS





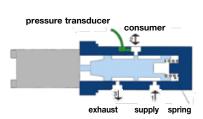




G%

0...6 bar/50 bar





The position of the slide is continuously shifting according to command signal and pressure change at the outlet. Thereby a constant outlet pressure is achieved.

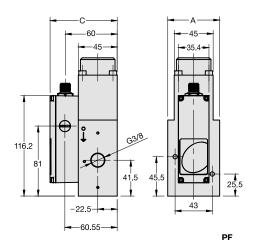
c, PF	oply voltage 24 V L t	mand signal, sup 2 coupling socke	0-10 V com without M1	ulator	ure reg	pressi	nal p	portic	Pro
PF000-0600	0 6	G¾	12	1700	1,45	8	78	160	60
PF000-1000	0 10		18						
PF000-1600	0 16		18						
PF000-2000	0 20		22						
PF000-3000	0 30		40						
PF000-4000	0 40		50						
PF000-5000	0 50		60						

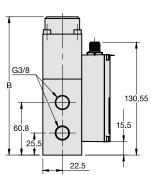
Special options, add the appropriate letter or number

commmand signal	0-20 mA	PF 1
	4-20 mA	PF 2
monitor signal	0-10 V	PF. 1
	4-20 mA	PF. 3
deviant pressure range	indicate on order	PF -XX
for oxygen	specially cleaned, FKM elastomers	PF 15

Accessories, enclosed

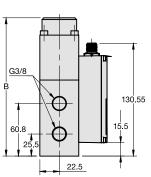
PR adapter	with USB plug and 1 m cable		PDUSB
software	basic version "light"		PDSOFT1*2
coupling socket	M12x1, 5-pin, with 2 m cable, 5 x 0.25	angular	KM12-C5-2
	M12x1, 5-pin, with 5 m cable, 5 x 0.25	angular	KM12-C5-5



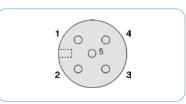


at 6 bar supply pressure and 5 bar outlet pressure

*2 You do not need any software to use the valve!







view from solder pin side

pin	description	5-wire cable (2m)
1	24 V supply voltage	brown
2	analog input signal	white
3	supply ground	blue
	analog ground	
4	analog outlet signal	black
5	digital pressure switch signal	grey
housing	EMC shield	shield

connection diagram



