

SERIES SL 5400

SPRINGLESS REGULATOR

Intermediate pressure and flow range



- Single stage
- 10 μ m. surface finish (7 and 5 μ m. optional)
- 316L SS VAR secondary remelt construction
- Vacuum to 1000 psig (69 bar) inlet
- UHP Semiconductor cleaned, assembled, tested and packaged
- Cylinder and point of use applications
- Knob LOTO (refer to AP KL data sheet)
- Installation and operating instructions available at www.aptech-online.com in the Tech Briefs section

Operating Parameters

Source pressure	vacuum to 1,000 psig (69 bar)
Delivery pressure	SL 5402 1 to 30 psig (0.07 to 2 bar)
	SL 5406 1 to 60 psig (0.07 to 4 bar)
	SL 5410 2 to 100 psig (0.14 to 7 bar)
Proof pressure	150% of operating pressures
Burst pressure	300% of operating pressures

Other Parameters

Inlet /outlet connectors	1/4, 3/8 or 1/2 inch face seal or tube weld
Bonnet port	1/8 inch NPT
Flow coefficient (Cv)**	0.23
Internal volume	1.2 in ³ (19.7 cm ³)
Operating temperature	-40° to +160°F (-40° to +71°C)*
Surface finish	10 μ m (0.25 μ m) Ra max standard; 7 μ m (0.18 μ m); and 5 μ m (0.13 μ m) optional
Inboard leakage	2 x 10 ⁻¹⁰ sccs
Outboard leakage	2 x 10 ⁻⁹ sccs He at 1,000 psig inlet pressure
Leakage across seat	4 x 10 ⁻⁸ sccs He at 1,000 psig inlet pressure
Installation	surface or panel (optional)
Supply pressure effect	1.6 psig per 100 psig source pressure change

*VS option 14° to 194°F (-10° to + 90°C).

**A pressure regulator Cv is a nominal value which indicates the point of choked flow. Please refer to a flow curve or a recommendation guide for usable flow range.

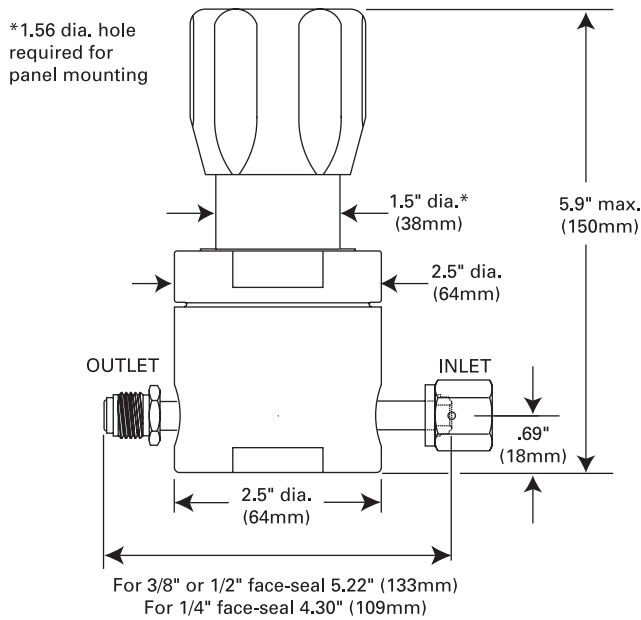
Materials

Type of Service	Series SL 5400 S Noncorrosive	Series SL 5400 SH Corrosive
Wetted Parts		
Body	SS 316L secondary remelt	SS 316L secondary remelt
Diaphragm	SS 316L	SS 316L
Poppet	stainless steel 316L	Ni-Cr-Mo alloy / UNS N06022
Finish	electropolished and passivated	electropolished and passivated
Seat	PCTFE (Polyimide optional)	PCTFE

All specifications subject to change without notice.

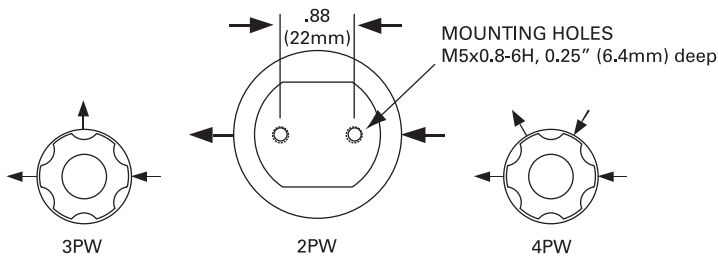
SERVICE AND SUPPORT BEYOND COMPARE

DIMENSIONAL INFORMATION

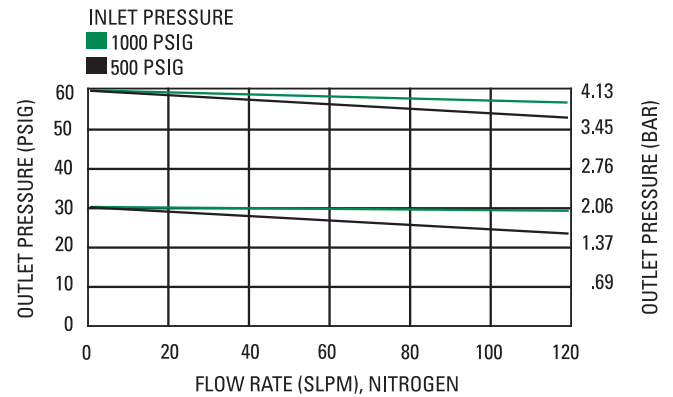
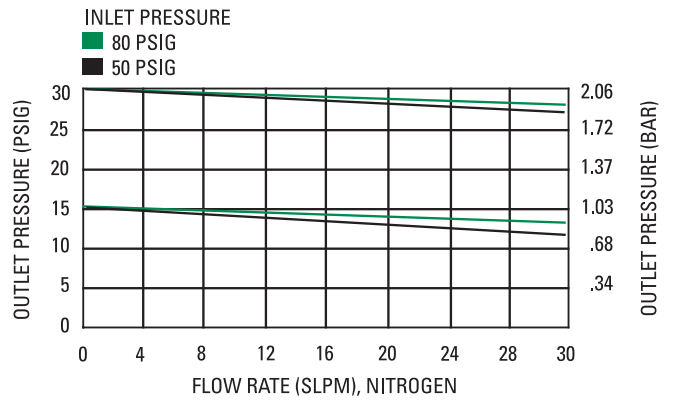


All dimensions in inches (mm). Metric dimensions are for reference only.

PORTING CONFIGURATIONS



CAUTION: Product selection is the sole responsibility of the user, regardless of any recommendations or suggestions made by the factory. The user shall make selections based upon their own analysis and testing with regard to function, material compatibility and product ratings. Proper installation, operation and maintenance are also required to assure safe, trouble free performance.



ORDERING INFORMATION

Sample Order Number **SL 5406SM 4PW FV4 FV4 10 L P**

SL 5406 Series	SL 5402 = 1-30 psig (.07 to 2 bar) SL 5406 = 1-60 psig (.07 to 4 bar) SL 5410 = 2-100 psig (.14 to 7 bar)
S Material	S = Stainless steel (SS) SH = SS/Ni-Cr-Mo alloy poppet
M Surface Finish Options	M = 10 μin. Ra max (standard) V = 7 μin. Ra max X = 5 μin. Ra max
4PW Ports	2PW = 2 ports butt weld 3PW = 3 ports butt weld 4PW = 4 ports butt weld

FV4 FV4 Connections Inlet / Outlet	FV4 = 1/4 inch face seal female MV4 = 1/4 inch face seal male FV6 = 3/8 inch face seal female MV6 = 3/8 inch face seal male FV8 = 1/2 inch face seal female MV8 = 1/2 inch face seal male
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Tube weld stub available

10 L Gauges* Source / Delivery	0 = No gauge V3 = 30-0-30 psig/bar L = 30-0-60 psig/bar 1 = 30-0-100 psig/bar 2 = 0-200 psig/bar 4 = 0-400 psig/bar 10 = 0-1000 psig/bar
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* Standard gauge ports are 1/4 inch face seal male

P Options	P = Panel installation** VS = Polyimide seat KL = Knob LOTO (refer to AP KL data sheet)
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** On panel mount option, bonnet port is not threaded. Panel hole 1.56" diameter.

AP Tech has product options and variations which are not documented in data sheets. If you have a model number that is not defined by the ordering information, please consult the factory or your local representative.