

L81 Series

RoHS Directive Products

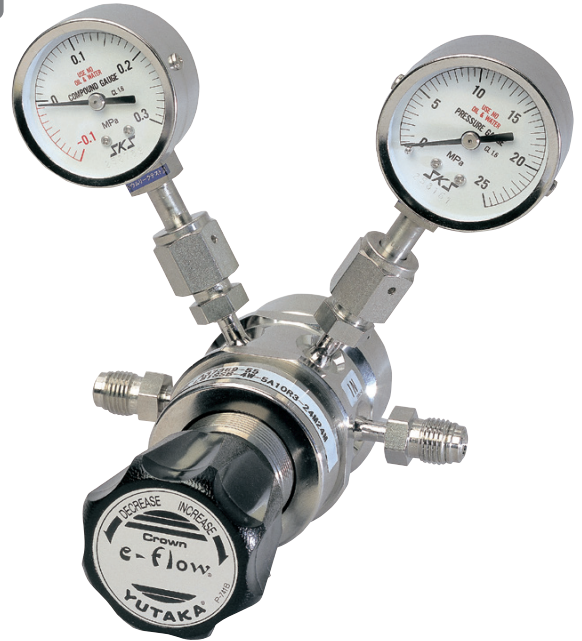
High Pressure Regulator

Inlet Pressure	Max.24 MPaG (Max.3,480 PSIG)
Outlet Pressure	Max.0.8 MPaG (Max.116 PSIG) (Pressure Range: 0~0.2 MPa, 0~0.4 MPa, 0~0.6 MPa, 0~0.8 MPa)
Supply Pressure Effect	0.000007 MPaG (0.10 PSIG) per 0.1 MPaG (14.5 PSIG)
Proof Pressure	31.5 MPa (4,567 PSIG)
CV	0.03
Temperature	-10°C to +40°C
Outboard Leakage	1×10^{-11} Pa·m ³ /sec·He (1×10^{-10} atm·cc/sec·He)
Internal Volume	8.9 cc (0.54 in ³) w/o fittings
Approximate weight	2.0 kg (4 lbs. 7 oz.)
Installation	Threaded holes on the rear surface or Panel mounting

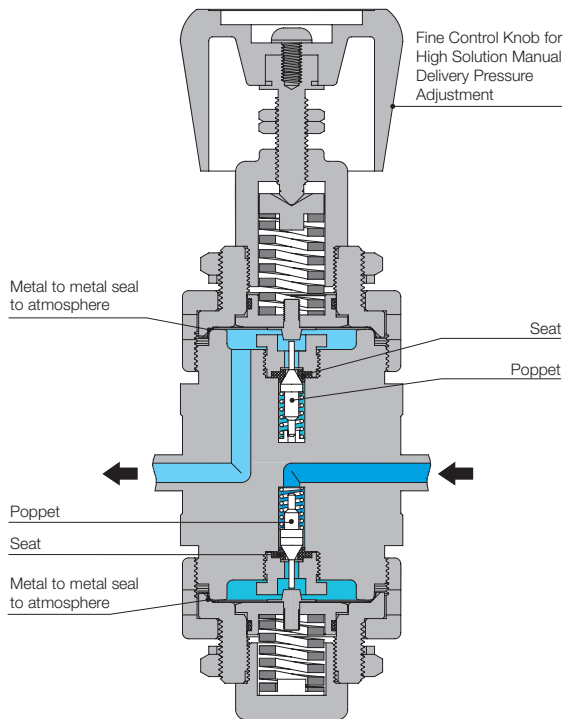
[NOTE]

1MPa = 10.2 kgf/cm² = 145.04 PSI

1MPa = 7504.36 mmHg = 295.4 inHg



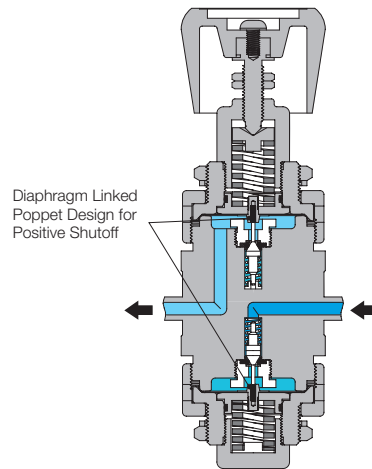
Cross sectional drawing



[NOTE]

- Avoid turning the control knob excessively.
- No filter in this unit.

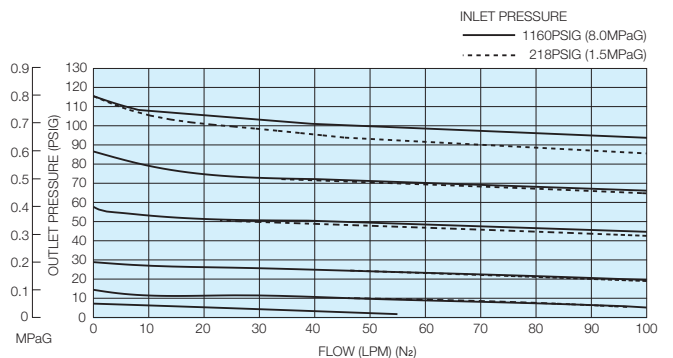
Tied Diaphragm (Optional)



[NOTE]

Operating the Tied Diaphragm Type: In order to minimize premature wear of regulator's internal parts. Be sure not to close regulator while under pressure.

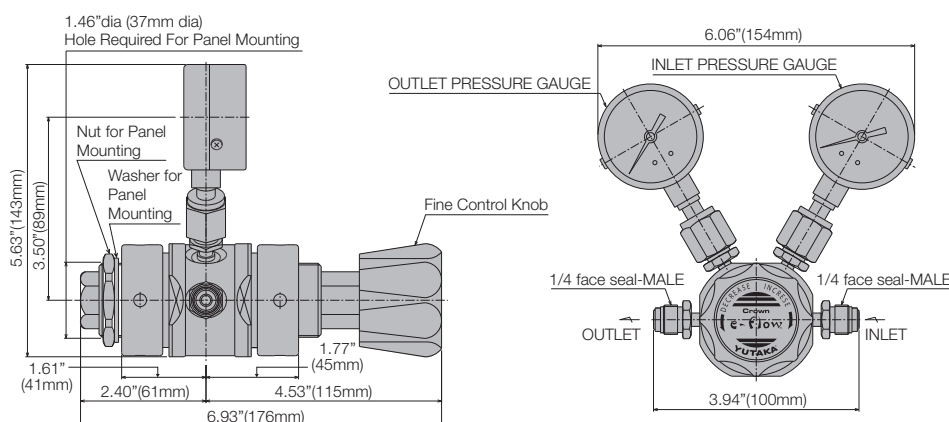
Flow characteristics



[NOTE]

- These tests were performed at ambient conditions.

Outline drawing



[NOTE]

- Dimensions are in inches and (mm) for reference only.
- Face to face length of the male and female are the same.
- Subject to change without notice.

Materials of construction

MODEL & TYPE	L81SS	L81SH	L81SS-N20	L81SS-CO	L81SS-NH3
Wetted Parts					
Body	SUS316L				
Poppet & Seat Retainer	SUS316L	Hastelloy® C-22	SUS316L		
Diaphragm	Hastelloy® C-22		SUS316L	Hastelloy® C-22	
Seat	PCTFE		Vespel®	PCTFE	Special Fluoroplastics
Spring	SUS316	Hastelloy® C-22	SUS316		
Gasket to seal for gauge	Ni		SUS316	Ni	
Non-wetted Parts					
Bonnet	SUS316				
Control Knob	ABS Resin				
O-ring	NBR				

Wetted surface finishes

Standard Ra (GRADE "B")	32µin. (0.80µm) or less
Optional Ra (GRADE "A")	7µin. (0.18µm) or less

Standard connections

1/4" face to face length of the male and female are the same. **3.94in. (100mm)**
1/4" Tube stubs and other connections available as options.

[NOTE]

- Any combination of Face Seal male and/or female fittings are available for inlet and outlet.
- Size and configuration of pressure gauge port is 1/4" Face Seal male.

Ordering information

