

U61 SERIES TIED-DIAPHRAGM ULTRA HIGH PURITY REGULATOR

U61 series Tied-Diaphragm ultra high purity regulator is developed for the semiconductor industry, it is manufactured in accordance with SEMI requirement and assembled, tested and packaged in a class 100 clean room.



» U61SLAK-DHW-VSF8-E

Features

- 316L stainless steel body
- Based on the proven bellows technology
- Bellows seal valves to safeguard against leakage
- Rear bracket mounting
- Gauge ports are standard with 1/4" face seal male
- Fully internal electropolished
- Cleaned, assembled, and packaged for high-purity semiconductor applications
- High-cycle life
- 100% Helium-leak tested

Materials

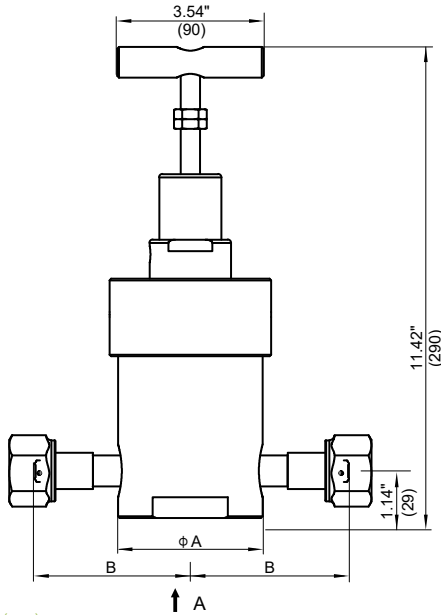
- Body: 316L
- Seat: PCTFE*, Vespel®
- Bellows: 316L, HC22

Specifications

- Max. Inlet Pressure: 500psi (35 bar), 1500psi (103 bar), 2200psi (152 bar), 3000psi (206 bar)
- Max. Outlet Pressure: 0~25psi (1.7 bar), 0~50psi (3 bar), 0~75psi (5.2 bar), 0~100psi (7bar), 0~150psi (10bar), 0~250psi (17 bar)
- Temperature: -40°F ~ 165°F (-40°C ~ 74°C)
- U61 Series Cv: 3.0
U61A Series Cv: 4.0
- Inboard leakage: 1×10^{-9} atm/sec He
- Across seat leakage: 4×10^{-8} atm/sec He
- Proof pressure: 150% of maximum rated pressure
- Burst pressure: 400% of maximum rated pressure
- Surface Finish: 10 uin
- Internal Volume: 197 cc

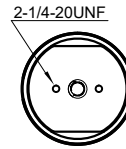
*: Standard material

Dimensions

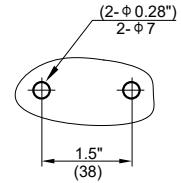


Dimension: in.(mm)

Connection Type	Dimension in.(mm)	
	A	B
VSF8	1/2" swivel female FSR	3.11" (79)
VSM8	1/2" swivel male FSR	3.11" (79)
VSF12	3/4" swivel female FSR	3.64" (92.5)
VSM12	3/4" swivel male FSR	3.64" (92.5)
VSF16	1" swivel female FSR	3.92" (99.6)
VSM16	1" swivel male FSR	3.92" (99.6)
TW12	3/4" weld stub	4.75" (120.7)
TW16	1" weld stub	4.75" (120.7)

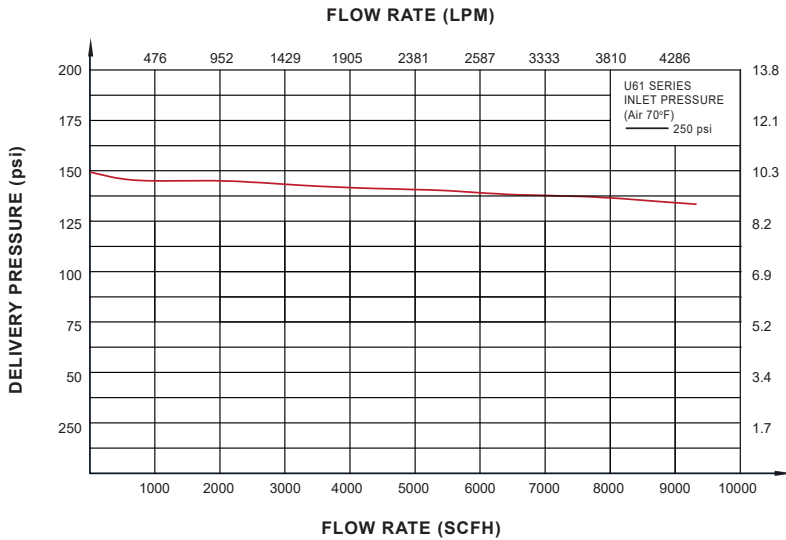


A

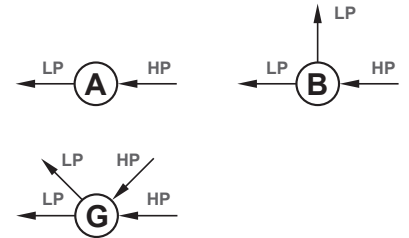


Rear bracket mounting

Flow Data



Regulator Port Configurations



Material Configuration		
	U61SL	U61SL***-SH
Body	316L	316L
Diaphragm	HC-22	HC-22
Stem	316L	HC-22
Nozzle	316L	316L
Seat	PCTFE	PCTFE
Surface Finish	10 μ in	10 μ in

Ordering Information

EX:	U61	SL	B	K	- D	I	P	- VSF8	- E	- H
	Series	Body	Ports	Seat	Inlet Pressure	Outlet Pressure	Pressure Gauge	Inlet / Outlet Connection	Surface Finish	Corrosion Resistance
	U61 U61A	SL: 316L	A B G	K: PCTFE V: Vespel®	D: 3000 psi X: 2200 psi E: 1500 psi F: 500 psi	G: 0 ~ 250 psi H: 0 ~ 150 psi I: 0 ~ 100 psi J: 0 ~ 75 psi K: 0 ~ 50 psi L: 0 ~ 25 psi	W: Without Gauge P: psi / bar Gauge K: psi / kPa Gauge	VSF8, VSM8 VSF12, VSM12 VSF16, VSM16 TW12, TW16	E: Ra 10 μ in	None: 316L nozzle and stem SH: HC22 stem and 316L nozzle

