



300 Series Regulators

312 Series Regulator

Dual Stage

Chrome-Plated Brass Barstock Body

Four-Port Configuration

316L Stainless Steel Diaphragm

The 312 Series regulators are intended for primary pressure control of non-corrosive, high purity or liquefied gases for applications requiring constant pressure control and delivery regardless of supply pressure variations.



312-2331 shown

Advanced Features

- Chrome-plated brass barstock body
Smooth surface finish
- 10 micron filtration in both stages
Fail-safe seat performance
- Pressure ranges 0-15 to 0-250 PSIG
Broad range of applications

Typical Applications

- EPA Protocol gases
- Gas and liquid chromatography
- High purity carrier gases
- Zero, span, and calibration gases
- High purity chamber pressurization

300 Series Advantage

- Capsule® seat
Increased serviceability and life
- 316L stainless steel diaphragm
No inboard diffusion
- Low wetted surface area
Minimal purge requirements
- Field-adjustable pressure limit
Safeguard downstream equipment
- Convuluted diaphragm
Smooth pressure changes
- Compact design
Easily transported and integrated into systems

Materials

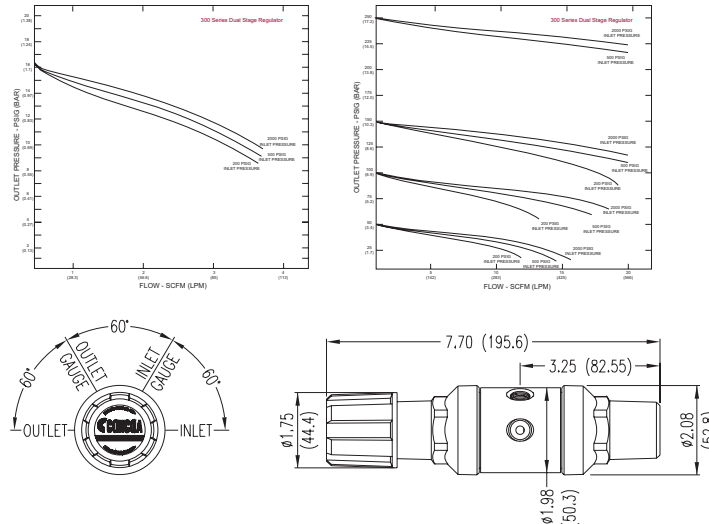
- Body
Chrome-plated brass barstock
- Bonnet
Chrome-plated die cast zinc
- Seat
PTFE
PCTFE with 4500 PSIG inlet option
- Filter
10 micron sintered bronze
- Diaphragm
316L stainless steel
- Internal Seals
PTFE

Specifications

- Maximum Inlet Pressure
3000 PSIG (210 BAR)
4500 PSIG (310 BAR) optional
- Temperature Range
-40°F to 140°F (-40°C to 60°C)
- Gauges
2" diameter chrome-plated
- Ports
1/4" FPT
- Helium Leak Integrity
1 x 10⁻⁸ scc/sec
- Cv
0.1
- Weight (312-2331-58)
4.4 lbs. (1.98 kg)

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Technical Information



Ordering Information

312	A	B	C	D	-Inlet	Options	
Series 312	Outlet Pressure	Outlet Gauge	Inlet Gauge	Outlet Assemblies	Assembly Gauges	Inlet Connections	Installed Options
	1: 0-15	30"-0-30 PSIG	0: None	0: ¼" FPT Port	0: Bare Body	000: ¼" FPT	A: Protocol Alarm Station (110V)
	2: 0-50	30"-0-100 PSIG	3: 0-4000 PSIG	1: ¼" MPT	1: Standard Assembly (PSIG/kPa Gauges)	TF2: ⅙" Tube	B: Protocol Alarm Station (220V)
	3: 0-100	30"-0-200 PSIG	5: 0-1000 PSIG	2: ¼" Tube Fitting	2: Standard Assembly (BAR/PSIG Gauges)	TF4: ¼" Tube	C: Protocol Switchover Station
	4: 0-250	0-400 PSIG	6: 0-300 PSIG	3: Diaphragm Valve ¼" Tube Fitting		TF6: ⅜" Tube	G: Protocol Switchover Station with Alarm (110V)
	7: 0-150	30"-0-200 PSIG	7: 0-400 PSIG	4: Diaphragm Valve ¼" MPT		M06: 6mm Tube	H: Protocol Switchover Station with Alarm (210V)
			8: 0-6000 PSIG*	5: Needle Valve ¼" MPT		CGA DIN 477 BS 341 and others available	M: Protocol Station
			Maximum inlet pressure 4500 PSIG (310 BAR) with PCTFE Seat Capsule®	6: ⅙" Tube Fitting			Q: Protocol Purge Station
				7: ⅜" Tube Fitting			T: Tee Purge*
				8: Diaphragm Valve ⅙" Tube Fitting			*Not available with 4500 PSIG max inlet pressure
				9: Diaphragm Valve ¼" FPT			
				A: ⅜" BSP Right Hand Fitting			
				B: Diaphragm Valve ⅜" Tube Fitting			
				C: ⅜" BSP Left Hand Fitting			
				D: 6mm Brass Hose Barb (not available if A=4 or 5)			
				G: ⅙" Stainless Steel Tube Fitting			
				H: ¼" Stainless Steel Tube Fitting			
				M: 6mm Tube Fitting			
				S: Diaphragm Valve 6mm Tube Fitting			