

## GENERAL DESIGN FEATURES

- ▶ Designed for High Pressure Applications of 15,000 PSI
- ▶ High Pressure Stage (HPS): Multi-Stage Design for continuous operation with high pressure drops.
- ▶ Field proven design with variable orifice and pressure balanced piston
- ✓ **Maximum debris and filming tolerance** - The ceramic coated surface eliminates filming and helps prevent clogging
- ✓ **High turndown ratios**; Flow ranges from **0.6 GPD 2500 GPD**
- ▶ Compatible sealing with most chemicals (Scale, Corrosion, Asphaltene, Wax Inhibitors, Demulsifier, Antifoam, and Methanol)
- ▶ Available with SkoFlo's automated SF3 model (combination of actuator, valve, and flowmeter packaged into one modular structure), actuator mount, or handle for manual operation
- ▶ Proven and reliable technology since 1988

## HIGH PRESSURE STAGE

- ▶ SkoFlo's Multi-Stage CIMVs utilize the same primary stage design that has demonstrated reliable and accurate chemical injection for over 25 years.
- ▶ High Pressure Stage limits pressure drop across primary stage to minimize cavitation for maximum reliability
- ▶ Reliably manages a maximum intermittent pressure drop at full scale flow up to 15,000 psi and a **maximum continuous pressure drop (MCDP) up to 9,000 psi** at full scale flow

## PRESSURE-BALANCED PISTON

- ▶ **Pressure Independence** – Upstream and downstream pressure fluctuations create a net force on the patented pressure balanced piston which is countered by a spring force to maintain constant flow
- ▶ **Stable and Accurate Flow Delivery** – Pressure-balanced piston provides instantaneous means of control at different injection points from a common line that is more tolerant to debris and fluid filming. No Pneumatic or electric power sources are required for control.
- ▶ **Debris Management** – Accumulated debris results in a net force on the piston that instantly sheds the debris

## SKOFLO BENEFITS

- ▶ 30-year experience, industry expert and solution provider
- ▶ Pressure Independent Valve Technology (PIVT)
- ▶ Significant chemical OPEX cost savings
- ▶ Unmatched flow delivery accuracy, proven reliability





## FLOW CHARACTERISTICS

Flow Range	0.6-600 GPD (0.09-94.63 LPH)	25-2500 GPD (3.94-394.28 LPH)
Minimum Differential Pressure (@ maximum calibrated flow)	300 psi (21 bar) required to regulate flow independent of pressure at max flow capacity of the valve. (For fluid viscosities 50-100cP, consult factory for minimum required pressure drop)	
Maximum Continuous Differential Pressure (@ full scale flow)	9000 psi (620 bar) Specific allowable pressure drop is dependent on application parameters, consult factory for application specific requirements and capabilities	
Flow Delivery Accuracy*	±5% of reading	

## DESIGN RATINGS

Design Standards	API6A: Bolting NACE MR0175: Material Selection
Design Life	25 years
Working Pressure Rating	15,000 psig (1034 barg)
Proof Test Pressure	22,500 psig (1551 barg)
Operating Temperature Rating	-15° to 85°C (5° to 185°F) Consult factory for lower temperature applications
Storage Temperature Rating	-20° to 85°C (-4° to 185°F)
Weight	20 lbs (9.1 Kg)

## INTERFACE

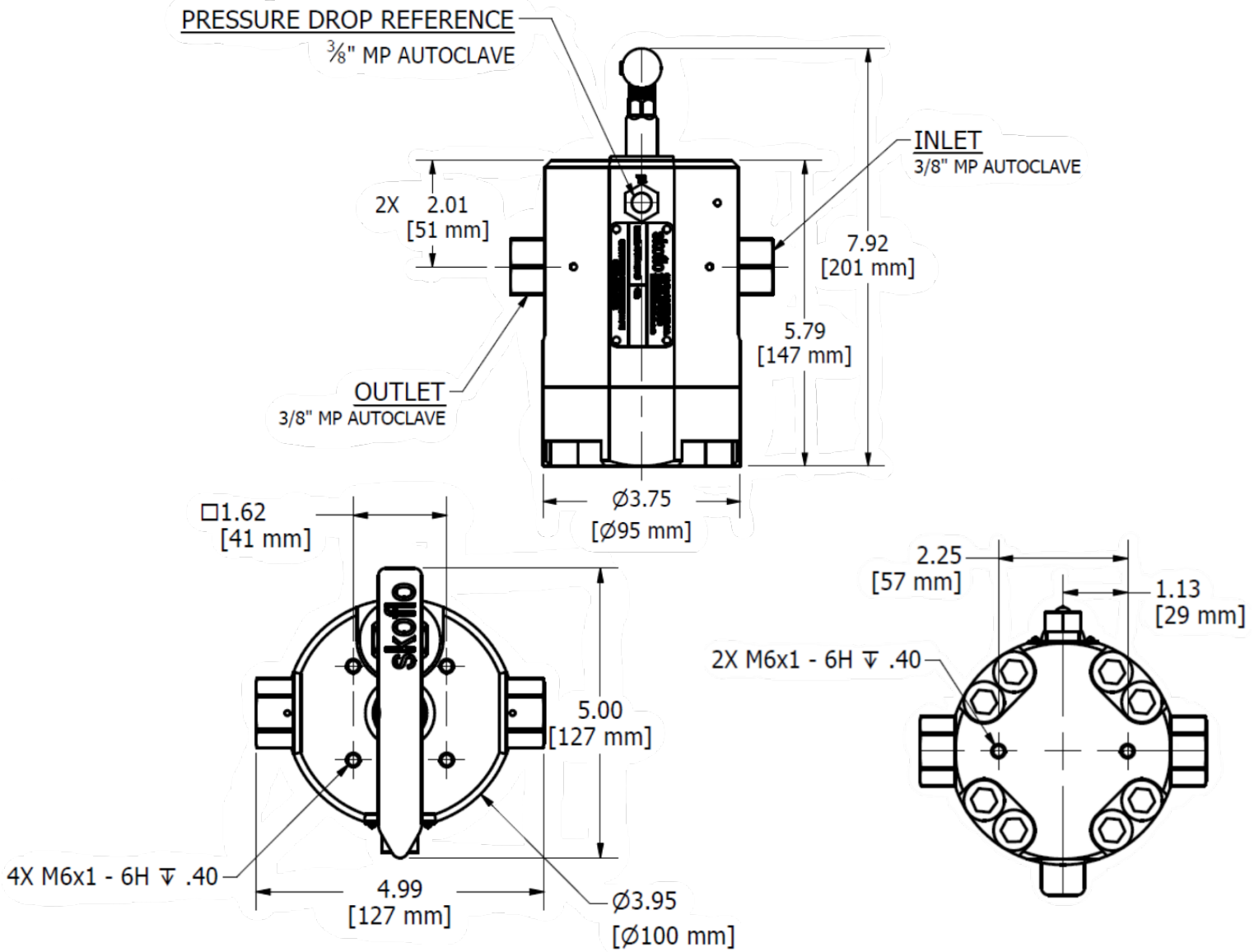
Process Connection	3/8" MP Female Autoclave, 1/2" FKO Tube Stub Consult factory for additional options
Mounting	Base: 2 x M6 x 1 holes Top: 4 x M6 x 1 holes
Handle Torque	<7 ft-lbf (at max rated working pressure)

## MATERIALS

Chemically wetted Material	NACE MR0175 3.1 certification per EN 10204
Pressure Containing Material	3.1 certification per EN 10204
Metallic components	Nitronic 50HS, Inconel 718, Elgiloy, Hastelloy
Non-metallic Material	FFKM, PTFE, PEEK, Ceramic
Valve Trim	Ceramic

\*The accuracy that a CIMV delivers chemical in relation to the target/set flow rate regardless of any pressure fluctuations or debris.

OUTLINE DIMENSIONS



CONFIGURATION NUMBER GUIDE

FASTENER MATERIAL		FASTENER CODE		HUB CODE		HUB TYPE		
A4-70		A4		AE		3/8" MP AUTOCLAVE		
SUPER DUPLEX		SD		XX				
SF15000HTVB	XXXX	XXXX	XX	XX	X	XX	XX	
0.6-600gpd	600D	FFKM	N5	NITRONIC 50 HS	L	LIGHT	MA	MANUAL
25-2500gpd	2500D	FKM	MATERIAL CODE	BODY MATERIAL	H	HEAVY	RV	ROTORK VALVE ONLY
FLOW RANGE	FLOW CODE	EPDM			SPRING CODE	SPRING	SV	SF3 VALVE ONLY
		SEAL MATERIAL					ACTUATION CODE	ACTUATION TYPE