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Catalog No. H-CW100 May 2014

CVW Series

All Welded Check Valves



Design and Engineering

- All Welded design provides excellent sealing of fluid
- Compact Design
- Maximum working pressure is up to 3000 psig (206bar)
- Temperature rating is up to 400°F (204°C)
- ZCR, tube butt weld, and Hy-Lok tube fitting
- 100% helium leak tested

Application

- Semiconductor
- Biotech
- Pharmaceutical
- Ultra-Pure, Flammable, or toxic Fluid line

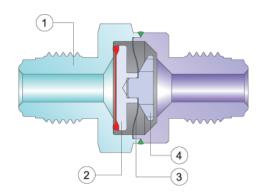












Cleaning & Testing

Passivation is done at Nitrogen environment. Fine cleaning is one by Ultrasonic cleansing with resistivity over $18M\Omega$ D.I water after finishing the passivation. Inboard helium leak tested to a rate of 4 x 10.9 cm³/s.

Assembly & Packaging

Assembly and Packaging is performed in the clean room of Class 10. Valves are packed with anti-static polyethylene bag that is pressured into the high purity nitrogen gas.

Material

No.	Description	Material / ASTM Specification
1	Body	Single Vacuum Melt 316L / A479
2	Poppet	Type 316 / A479
3	Spring	Elgiloy / AMS5876
4	Stopper	Type 316 / A479

Specification

	Cracking Pressure	Max. Pressure Drop	Pressure - Temperature Ratings		
			Temperature F°(°C)	Working Pressure psig (bar)	
_	Less than	145 psig	-10(-23) to 100(37)	3000(206)	
			200(93)	2530(174)	
	2 psig		300(148)	2270(156)	
			400(204)	2065(142)	

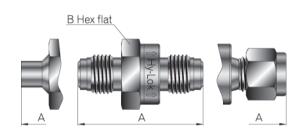
Internal Surface Grade

Grade	Designator	Roughness Average Ra. (E.P)	Packing Standard Class 10
B.A.	В	0.25 μm (10 μin)	Double
High	Н	0.13 μm (5 μ in)	Double

[•] Grade "B.A." is standard.

Dimensions

All Dimensions are in millimeters, except for the O.D size. In case of the end connection for Hy-Lok tube fitting, dimensions shown with Hy-Lok nuts in finger-tight position, where applicable.



End Connection	Ordering No.	Size	Cv	А	В
Male ZCR Fitting	CVWVM-4	1/4"	0.7	45.7	22.2 (7/8")
Male ZON Hitting	CVWVM-8	1/2"		52.3	
Hy-Lok Tube Fitting	CVWH-4	1/4"	٥.	49.8	
ny-Lok rube ritting	CVWH-6M	6mm	0.55		
Female ZCR Fitting	CVWVF-4	1/4"	0.7	53.8	
remale ZCK ritting	CVWVF-8	1/2"	0.7		25.4 (1")
	CVWBW-4	1/4"	0.55	31.5	22.2 (7/8")
Tube Butt Weld	CVWBW-6	3/8"	0.00		
Tabe Batt Weld	CVWBW-8	1/2"	0.7		
	CVWBW-6M	6mm			

Ordering Informations





End Connection Designator • VM - Male ZCR Fitting

BW - Tube Butt Weld H - Hy-Lok Tube Fitting VF - Female ZCR Fitting

Size Designator • 4 - 1/4" • 6 - 3/8"

· 8 - 1/2"



SAFETY in VALVE SELECTION

to ensure optimal performance and safety.

Proper installation, material compatibility, operation and maintenance of the valves is the responsibility of the user.

The total system design must be taken into consideration



· Nil - Grade "B.A" • H - Grade "High"



Body Material Designator

• SM6L - Single Vacuum Melt 316L ASTM A479

■ QUALITY SYSTEM CERTIFICATES



CERTIFICATE NO.GQC 212

ASME SECT III (MO) CERTIFICATE NO. QSC 584

■ TYPE APPROVALS (for Hy-Lok Tube Fittings)



American Bureau Shipping CERTIFICATE NO.05-BK576227-X



Lloyd's Register CERTIFICATE NO.01/10075







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