



**Features**

- Maximum flow & Compact designed inner capacity.
- Minimal contributions of moisture, Oxygen and Hydrocarbon, Minimal particle generation.
- DK-Lok's own electropolished.
- D.I water cleaned, assembled, tested & packaged in a certified clean room.
- Elgiloy diaphragm material with strong durability as well as corrosion resistance for long cycle life.
- PCTFE seat material with remarkable chemical & thermal resistance.

**Specification**

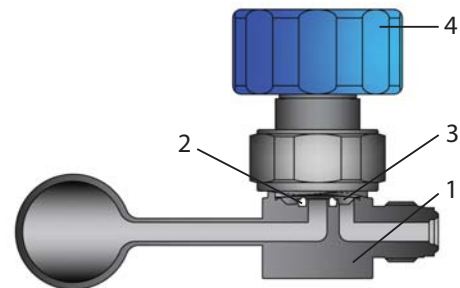
Size	1/4"	3/8" , 1/2"	3/4"
Cv Value	0.3	0.7	0.7
Orifice Size	4.5	7.0	7.0
Max. Working Pressure	10 bar (145 psig)		
Max. Working Temperature	-10 ~ 80°C (-23~176°F)		
Internal Leakage Allowance - He Holding Time ≥ 30 sec	≤ 1x10 <sup>-9</sup> atm.cc/s		
External Leakage Allowance - He Holding Time ≥ 1 min	≤ 1x10 <sup>-9</sup> atm.cc/s		
Particle Inspection (EP Only) Pressure : 60~80 psi N2 Gas Sample Volume : 1CFM 0.1 μm and Larger	No count		

**Product Grade**

Level	AP	BA	EP
Inner Surface Roughness	Ry ≤ 25 μm	Ry ≤ 3.0 μm / Ra 10 μin	Ry ≤ 0.7 μm / Ra 5 μin
	Cut off Length : 2.5mm	Cut off Length : 0.8mm	Cut off Length : 0.25mm
	Measuring Length : 12.5mm	Measuring Length : 4mm	Measuring Length : 1.25mm
Polishing	Machining Finish	Machining Finish	Electro Polishing Finish

**Material of Construction**

No.	Component	Materials
1	Body	316L Stainless Steel
		316L Stainless Steel VAR
2	Seat	PCTFE
3	Diaphragm	Ni-Co Alloy
4	Handle	Aluminum



\* Wetted Components are listed in blue.

**Ordering Information and Dimensions**

Model	Basic Ordering Number	End Connections	Dimensions (mm)					
			ℓ	h	H	B	A	L
	U-TVDC4-DM-	1/4" DCR Male	98.5	11.0	64.3	26.0	40.0	115.5
	U-TVDC6-DM-	3/8" DCR Male	122.6	16.0	76.8	28.0	40.0	135.1
	U-TVDC8-DM-	1/2" DCR Male	122.6	16.0	76.8	28.0	40.0	125.1
	U-TVDC12-DM-	3/4" DCR Male	158.9	22.0	82.8	28.0	40.0	172.5
	U-TVDC4-DF-	1/4" DCR Female	105.9	11.0	64.3	26.0	40.0	122.9
	U-TVDC6-DF-	3/8" DCR Female	114.5	16.0	76.8	28.0	40.0	131.5
	U-TVDC8-DF-	1/2" DCR Female	114.5	16.0	76.8	28.0	40.0	131.5
	U-TVDC12-DF-	3/4" DCR Female	141.8	22.0	82.8	28.0	40.0	155.4
	U-TVDC4-DK-	1/4" DK-Lok	105.0	11.0	64.3	26.0	40.0	114.7
	U-TVDC6-DK-	3/8" DK-Lok	118.5	16.0	76.8	28.0	40.0	135.5
	U-TVDC8-DK-	1/2" DK-Lok	118.5	16.0	76.8	28.0	40.0	135.5
	U-TVDC12-DK-	3/4" DK-Lok	155.0	22.0	82.8	28.0	40.0	168.6
	U-TVDC4-TW-	1/4" Tube Butt Weld	97.2	11.0	64.3	26.0	40.0	114.2
	U-TVDC6-TW-	3/8" Tube Butt Weld	126.0	16.0	76.8	28.0	40.0	143.0
	U-TVDC8-TW-	1/2" Tube Butt Weld	126.0	16.0	76.8	28.0	40.0	143.0
	U-TVDC12-TW-	3/4" Tube Butt Weld	155.0	16.0	82.8	28.0	40.0	168.6

**How to Order**



Valve Type	Size	End Connector Type	Material	Surface Level
TVDC	4 : 1/4"	DM : DCR Male	SL : 316L Stainless Steel	B : BA Grade
	6 : 3/8"	DF : DCR Female	DL : 316L Stainless Steel VAR	P : EP Grade
	8 : 1/2"	DK : DK-Lok		
	12 : 3/4"	TW : Tube Butt Weld		

Note) DCR : DK-Metal Face Seal

**Safe Valve Selection**

The selection of a valve for any application or system design must be considered to ensure safe performance. Valve function, valve rating, material compatibility, proper installation, operation and maintenance remain the sole responsibility of the system designer and the user. DK-Lok accepts no liability for any improper selection, installation, operation or maintenance.