VAH016 ... 040-A/X
VIH016 ... 040-A/X

Angle (VAH) and Inline (VIH) Valves
Manually actuated

The INFICON ISO–KF valve line, VAH / VIH016 … 040-A/X performs as a gauge isolation, bypass, roughing or venting valve and is well suited for all general high vacuum and semiconductor processes. The improved industrial design results in a rugged, compact, easy to operate valve. The visual position indicator shows the open / close status of the valve for clear understanding of valve status. The extremely long service life and easy to maintain design results in a highly reliable valve with low cost of ownership. The new line is compatible with the current INFICON VAH / VIH016 … 040-A/X valve line.

ADVANTAGES

- Ergonomically designed knob for secure grip
- Fast open / close actuation with one 130° turn; or a soft continuously variable actuation for controlled venting / pumping of vacuum systems
- Low operating force required, even if the valve is opened against vacuum
- Drive locks into final open / close position
- Visual position indicator, standard
- 316L stainless steel bellows
- Easy maintenance, fast bellows and seal replacement
- High conductance for fast pump down or venting
- High differential pressure resistance
- FPM sealing standard, other sealing materials available upon request
- High purity aluminum or stainless steel housing

ORDERING INFORMATION
SELECTION DATA

Vacuum connection		DN 16 ISO-KF		DN 25 ISO-KF		DN 40 ISO-KF	
Aluminum housing	AISI/DIN	-/EN AW-6082		-/EN AW-6082		-/EN AW-6082	
Stainless steel housing	AISI/DIN		304/1.4301		304/1.4301		304/1.4301

ANGLE VALVE

Type	VAH016-A	VAH016-X	VAH025-A	VAH025-X	VAH040-A	VAH040-X
	253-200	**253-245**	**253-300**	**253-345**	**253-400**	**253-445**

INLINE VALVE

Type	VIH016-A	VIH016-X	VIH025-A	VIH025-X	VIH040-A	VIH040-X
	253-225	**253-265**	**253-325**	**253-365**	**235-425**	**253-465**

SPECIFICATIONS

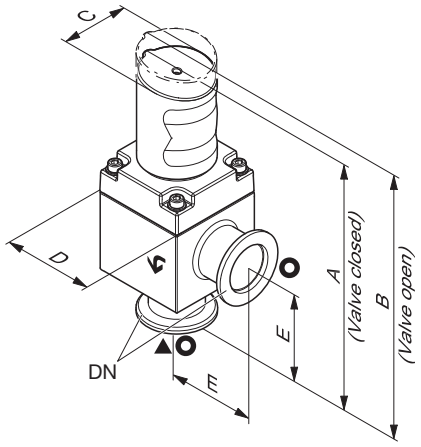
Cycle life	Cycles	10000		10000		10000	
Conductance for molecular flow							
Angle valve	l/s	5		14		45	
Inline Valve	l/s	2.5		7		20	
Tightness	mbar l/s	1×10^{-9}		1×10^{-9}		1×10^{-9}	
Operating pressure min. / max.	mbar / bar	1×10^{-8} / 2		1×10^{-8} / 2		1×10^{-8} / 1.5	
Pressure, max. (absolute)	bar	4		4		4	
Pressure difference							
In closing direction	bar	4		4		2	
In opening direction	bar	2	2	1.5			
Ambiance temperature	°C	0 … +50		0 … +50		0 … +50	
Mounting orientation		any		any		any	
Seals		FPM		FPM		FPM	
Weight							
Angle valve	kg	0.31	0.34	0.42	0.49	0.85	0.96
Inline valve	kg	0.38	0.71	0.52	1.09	1.06	1.83

SPARE PARTS

Vacuum connection	DN 16 ISO-KF	DN 25 ISO-KF	DN 40 ISO-KF
Seal kit O-rings for one valve	**299-001**	**299-006**	**299-011**
Bellows cpl. Bellows & seal kit	**299-002**	**299-007**	**299-012**

DIMENSIONS
ANGLE VALVE

Aluminum housing

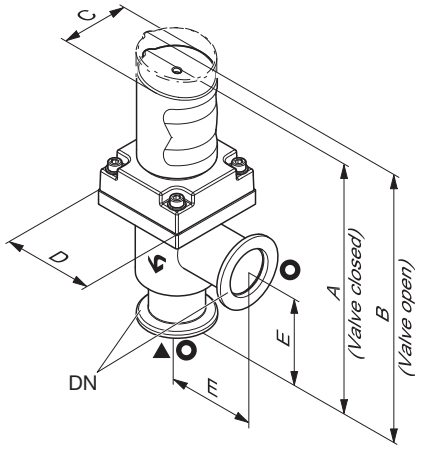


[mm]

DN	A	B	C	D	E
DN 16 ISO-KF	141.3	149.5	39.6	45	40
DN 25 ISO-KF	145.3	155.7	39.6	54	50
DN 40 ISO-KF	186.2	201.4	50	69	65

- Protective lid
- Valve seat site
- Flow direction

Stainless steel housing

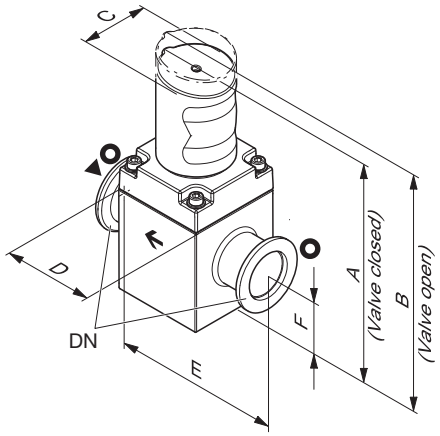


[mm]

DN	A	B	C	D	E
DN 16 ISO-KF	143.9	152.1	39.6	45	40
DN 25 ISO-KF	148.7	159.1	39.6	54	50
DN 40 ISO-KF	189.2	204.4	50	69	65

- Protective lid
- Valve seat site
- Flow direction

DIMENSIONS
INLINE VALVE



Protective lid

Valve seat site

Flow direction

Aluminum housing

[mm]

DN	A	B	C	D	E	F
DN 16 ISO-KF	132.4	140.6	39.6	45	80	18.7
DN 25 ISO-KF	136	146.4	39.6	54	100	25
DN 40 ISO-KF	174.5	189.7	50	69	130	30

Stainless steel housing

[mm]

DN	A	B	C	D	E	F
DN 16 ISO-KF	125.4	133.6	39.6	45	80	20
DN 25 ISO-KF	132	142.4	39.6	54	100	31.8
DN 40 ISO-KF	166.5	181.7	50	69	130	40.8