



VAT Vakuumventile AG
CH-9469 Haag, Schweiz

Product data sheet

Variable Leak Valve, Series 590 DN 16 (ID 5/8")

Ordering No. 59024-GE01-0003

Description

Flange	DN 16 CF-R
Position Indication	- Linear scale - Scale ring

Technical data

Leak rate	
- To the outside	$\leq 1 \cdot 10^{-10} \text{ mbar ls}^{-1}$
- Seat "closed position"	$\leq 1 \cdot 10^{-10} \text{ mbar ls}^{-1}$
Molecular conductance	0.05 ls^{-1}
Adjustable gas flow [air, 1 bar, RT]	$1 \cdot 10^{-10} \text{ mbar ls}^{-1} - 500 \text{ mbar ls}^{-1}$
Dead volume	
- Seat port	2.7 cm^3
- Side port	1.1 cm^3
Pressure range	UHV to 10 bar (abs)
Test pressure	1 bar
Differential pressure	$\leq 10 \text{ bar}$
Max. differential pressure at opening	$\leq 10 \text{ bar}$
Cycles until first service	20 000
Bake-out temperature	
- open	$\leq 300^\circ\text{C}$
- closed	$\leq 300^\circ\text{C}$
- actuator	$\leq 300^\circ\text{C}$
Heating and cooling rate	$\leq 60^\circ\text{Ch}^{-1}$
Material	
- Body	1.4943, AISI 660 / 1.4404, AISI 316 L
- Diaphragm	1.4310, AISI 301, gold plated
Mounting position	any
Radiation resistance	$10^8 \text{ Gy (} 10^{10} \text{ rad)}$
Turns from open to close	22
Weight	0.94kg / 2.07 lbs

Dimensions

Dimensional drawing no. 549274

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