VAT Vakuumventile AG
CH-9469 Haag, Schweiz

Product data sheet

Vacuum angle valve
Series 244, DN 100 (ID 4'')
Ordering No. 24440-QA11-0001

Description

Flange	ISO-K 100
Actuator	Pneumatic, single acting with closing spring – without solenoid valve – without position indicator
Feedthrough	Shaft feedthrough

Technical data

Leak rate (static)	– Valve body	$< 1 \cdot 10^{-9}$ mbar ls^{-1}
	– Valve seat	$< 1 \cdot 10^{-9}$ mbar ls^{-1}
Pressure range		$1 \cdot 10^{-7}$ mbar to 2 bar (abs)
Differential pressure on the plate	– In opening direction	≤ 1.2 bar
	– In closing direction	≤ 2 bar
Differential pressure at opening		≤ 1 bar
Conductance (molecular flow)		440 ls^{-1}
Actuation time	– Closing	≤ 1 sec.
	– Opening	≤ 1 sec.
Cycles until first service (Tmax 80°C, under clean conditions)		1 million
Temperature (Maximum values: depending on operating conditions and sealing materials)	– Valve body	≤ 150 °C
	– Actuator	≤ 120 °C
Material	– Valve body	Aluminum (EN AC-42000)
	– Actuator	Aluminum
	– Plate	Aluminum (EN AW 6082)
	– Shaft feedthrough	Aluminum (EN AW 6082)
	– Spring	AISI 301 (1.4310)
	– Snap ring for axle	AISI 301 (1.4310)
Seal	– Bonnet O-ring	FKM (Viton®)
	– Plate O-ring	FKM (Viton®)
	– Feedthrough O-ring	FKM (Viton®)
	– Actuator O-ring	FKM (Viton®)
Weight		9 kg / 20 lbs
Mounting position		any
Volume of pneumatic actuator		0.3 l / 0.01 ft^3
Compressed air min. – max. overpressure		4.5 – 7 bar / 65 – 102 psi
Compressed air connection		⅛" ISO/NPT female
Behavior in case of compressed air pressure drop	– Valve closed	Valve remains closed and leaktight
	– Valve opened	Valve closes leaktight
	– During actuation	Valve closes leaktight

Behavior in case of power failure	– Valve closed	Valve remains closed and leaktight
	– Valve opened	Depending on customer installation
	– During actuation	Depending on customer installation