VAT Vakuumventile AG
CH-9469 Haag, Schweiz

Product data sheet
Low particle HV gate valve, Series 151, DN 160 (ID 6'')
Ordering No. 15144-PA44

Description

Flange	ISO-F 160
Actuator	Pneumatic, double acting
	– with solenoid valve
	– with position indicator
Feedthrough	Bellows

Technical data

Leak rate	– Valve body	$< 1 \cdot 10^{-9}$ mbar ls^{-1}
	– Valve seat	$< 1 \cdot 10^{-9}$ mbar ls^{-1}
Pressure range		$1 \cdot 10^{-8}$ mbar to 1 bar (abs)
Differential pressure on the gate		≤ 1.2 bar
Differential pressure at opening		≤ 30 mbar
Conductance (molecular flow)		6 000 ls^{-1}
Cycles until first service		500 000 (unheated and under clean conditions)
Temperature	– Valve Body	≤ 120 °C (bake-out max. 24h)
(Maximum values: depending	– Actuator	≤ 100 °C
on operating conditions and	– Solenoid valve	≤ 50 °C
sealing materials)	– Position indicator	≤ 80 °C
Heating and cooling rate		30 °C h^{-1}
Material (main components)	– Valve Body	EN AW-6082 (3.2315)
	– Gate	EN AW-6082 (3.2315)
	– Bellows	AISI 633 (AM350)
Seal	– Bonnet	FKM (Viton®)
	– Gate	FKM (Viton®), vulcanized
	– Actuator	FKM (Viton®)
Mounting position		Any
Volume of pneumatic actuator		0.46 l / 0.016 ft^3
Compressed air min. – max. overpressure		4 – 7 bar / 58 – 102 psi
Compressed air connection		G⅛'' (⅛'' NPT for USA)

VAT Vakuumventile AG
CH-9469 Haag, Schweiz

Product data sheet
Low particle HV gate valve, Series 151, DN 160 (ID 6'')
Ordering No. 15144-PA44

Actuation time	– closing	≤ 3.1 s
	– opening	≤ 3.1 s
Weight		14.0 kg / 30.9 lbs

Behavior in case of compressed air pressure drop	– Valve closed	- Undefined (not mechanically locked)
	– Valve open	- Undefined (not mechanically locked)
Behavior in case of power failure	– Valve closed	- Valve remains closed
	– Valve open	- Valve closes

Electrical connections

Solenoid valve

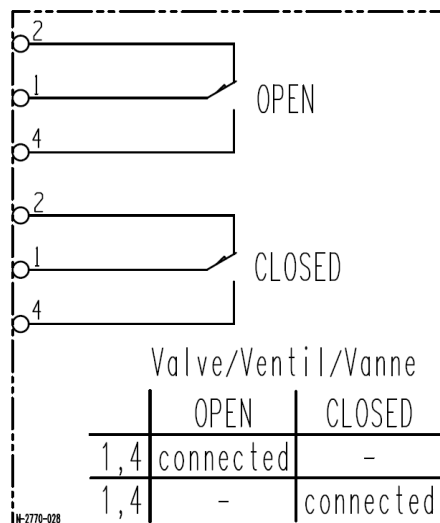| Type | 4/2 way |
| Voltage | Defined by order |
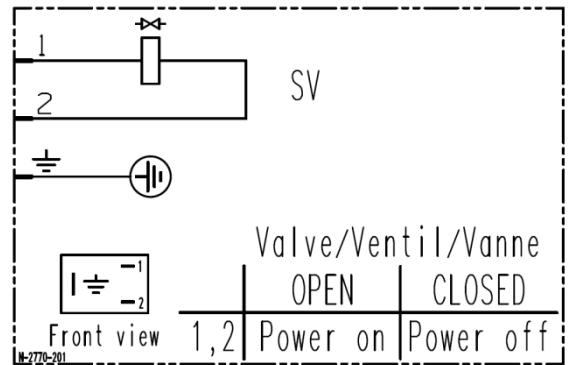
Wiring diagram

Position indicator

Type	Micro switch	
Voltage	≤ 250 V AC	≤ 50 V DC
Current max.	≤ 2 A	≤ 1.2 A

Wiring diagram