AL: Air-lock 101 Device

The Air-Lock pressure static device (model AL) is composed of a TP Pneumatic pressure switch (see page 30) combined with 2 x 3 way valves ND 1/4" (see page 16) in a single body. The Air-Lock pressure static device is mounted on pneumatic actuators when they need to be isolated from control devices (for example positioners or electro-pneumatic distributors) in the event air pressure falls below the pre-determined operating safety point. The Air-Lock device consists mainly of a pneumatic pressure switch with an adjustable set point. This device synchronously drives the 2 x 3 way valves. The switching device operates immediately, even in the case of a gradual air-pressure decrease to the set value. The device will automatically reset after a failure when the line pressure is 1 bar greater than set pressure, to avoid instability around the device set point.



Small and lightweight

Key features

- > Suitable for:
 - Standard, offshore, sandstorm and copper-free ambient conditions
 - Single and double acting actuators
 - Low and high ambient temperature
- > Exclusive STI design for double 3 way valve in one body, to reduce assembly time, space and cost
- > Small dimension and lightweight

Benefits

- > Accurate pressure setting
- > Set screw lockable with nut
- > Insensitive to vibrations
- > Reset hysteresis with established safety
- > Synchronous drive for set pressure group + 2 x 3 way valve in one body



Aluminium (left) Stainless steel 316 (right)



Technical specifications

Materials

Anodized aluminium Stainless steel 316

Operating temperature*

- -20°C to 70°C
- -40°C to 70°C available on request
- -20°C to 85°C available on request

Feeding connections

1/4" NPT

Pilot signal connection

1/8" NPT

CV max

Inlet = 1 Outlet = 1

Operating pressure

Design = 10 bar Operating = 7 bar Minimum operating = 2 bar

Output connections

1/4" NPT

Weight

Aluminium = 1kg Stainless steel 316 = 2.5kg

* Lower or higher temperature available on request

Dimensional drawing

