

Norgren Pneumatic Valve

"XSz" Norgren Safety Pneumatic Valve



- Inherently fail-safe without residual pressure
- Dynamic self monitoring
- Double valve control system
- CE conforms, BG, OSHA, CSA, SUWA approval
- For pneumatic clutch and brake systems and other 3-way safety functions
- Improves safety and reduces downtime on mechanical power press applications
- No additional electrical monitoring required
- Easily fitted into existing systems
- For safety function

Technical Data

- Medium
- Compressed air, filtered, lubricated, non lubricated
- **Operating Pressure**
- 3...10 bar (XSz 8)
- 2... 10 bar (XSz 10)
- 2... 8 bar (XSz 20/32/50)

Voltage

- 214V d.c. 24V a.c 110V a.c or 230V a.c
- Ambient Temperature
- -10°C to +60°C

The XSz valve uses integral air logic incorporated into the pilot-supply air system. Therefore no moving parts exist, Both main valve poppets are monitored on each cycle by an air chamber and orifice. This design feature eliminates the need for electrical monitoring of the valve. The XSz valves have been assessed as conforming to AS 4024.1 1996 and may be used in applications to the level of Category 4.

The valve is certified by BG to comply with EN 954-1 1997 (Category 4) Safety of Machines - safety related.

Inherently fail safe design: There is no need for an external electrical monitoring to fulfil the safety function of the valve. Available in both 3/2 and 5/2 Configuration

Internal dynamic monitoring: The valve is checked at each cycle for correct functioning and the monitoring is tamper proof.

Crossflow-channel design: No residual pressure in case of malfunction.

Redundancy in safety valve control: Design is according to safety regulations. The pressure increases only when both valves are activated simultaneously. The valve exhausts safely even in case of a malufunction.

Electrical monitoring is NOT required for this valve to conform to any Category level up to and including Cat 4. However if required to provide system diagnostics, etc, the failure indication module is an option that is easily fitted.

Only one valve is required for AS4024 Cat 4, NOT two valves

Available in both 3/2 and 5/2 Configuration

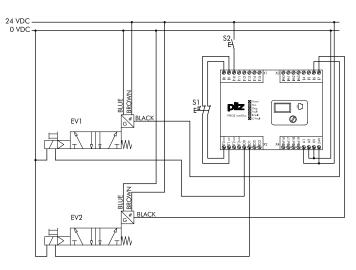
1/4 to 2" Port sizes

Valve	Part Number	Description	Valve	Part Number	Description
XSz 8	2492806305202400	Valve 1/4" 3/2 with 24v dc coils (no plugs)	XSz 20	249303000000000	Valve 3/4" 3/2 no coils
XSz 8	2492806305302450	Valve 1/4" 3/2 with 24v ac coils (no plugs)	XSz 20	2493030020102400	Valve 3/4" 3/2 with 24v dc coils and plugs (no led)
XSz 8	2492806305211050	Valve 1/4" 3/2 with 110v ac coils (no plugs)	XSz 20	2493030020102450	Valve 3/4" 3/2 with 24v ac coils and plugs (no led)
XSz 8	2492806305223050	Valve 1/4" 3/2 with 240v ac coils (no plugs)	XSz 20	0016622	Flanged silencer
XSz 8	0680003	Coil plug - no led (2 required).	XSz 20	0200.****	Coil series (2 required)
XSz 8	0664811	Led coil plug 12-24v ac/dc (2 required).	XSz 20	0570275	Coil plug - no led (2 required)
XSz 8	0664812	Led coil plug 110-240v ac/dc (2 required).	XSz 20	M/P24120/1	Led coil plug 12-24v ac/dc (2 required)
XSz 8	MB002B	1/4" high flow silencer.	XSz 20	M/P24120/3	Led coil plug 150-240v ac/dc (2 required)
XSz 10	249293000000000	Valve 1/2" 3/2 no coils	XSz 32	249313000000000	Valve 1" 3/2 no coils
XSz 10	2492930305311050	Valve 1/2" 3/2 with 110v ac coils and plugs (no led)	XSz 32	249313400000000	Valve 1" 3/2 no coils
XSz 10	2492930305302400	Valve 1/2" 3/2 with 24v dc coils and plugs (no led)	XSz 32	2493134080002400	Valve 1" 3/2 with 24v dc coils (no plugs)
XSz 10	2492932300000000	Valve 1/2" 3/2 no coils with silencer.	XSz 32	1662200	Flanged silencer
XSz 10	2492932305302400	Valve 1/2" 3/2 with 24v dc coils, plugs and silencer.	XSz 32	0700.****	Coil series
XSz 10	0016422	Flanged silencer	XSz 32	0570275	Coil plug - no led (2 required)
XSz 10	3052.****	Coil series (2 required)	XSz 32	M/P24120/1	Led coil plug 12-24v ac/dc (2 required)
XSz 10	0680003	Coil plug - no led (2 required).	XSz 32	M/P24120/3	Led coil plug 150-240v ac/dc (2 required)
XSz 10	0664811	Led coil plug 12-24v ac/dc (2 required).	XSz 50	249323000000000	Valve 1-1/2" 3/2 no coils
XSz 10	0664812	Led coil plug 150-240v ac/dc (2 required).	XSz 50	0700.****	Coil series
XSz 10 5/2	2492982000000000	Valve 1/2" 5/2 no coils	XSz 50	0570275	Coil plug - no led (2 required)
XSz 10 5/2	2492982020102400	Valve 1/2" 5/2 with 24v dc coils and plugs (no led)	XSz 50	M/P24120/1	Led coil plug 12-24v ac/dc (2 required)
XSz 10 5/2	0016422	Flanged silencer	XSz 50	M/P24120/3	Led coil plug 150-240v ac/dc (2 required)
XSz 10 5/2	0200.****	Coil series (2 required)			
XSz 10 5/2	0570275	Coil plug - no led (2 required)			
XSz 10 5/2	M/P24120/1	Led coil plug 12-24v ac/dc (2 required)			
XSz 10 5/2	M/P24120/3	Led coil plug 150-240v ac/dc (2 required)			

Metal Work Pneumatic Valve

METAL WORK Safety Pneumatic Valve





Double Valve ISO 5599/1 SERIES SAFE A					
Technical Data	ISO 1	ISO 2	ISO 3		
Fluid	Filtered lubricated air (50µm); lubrication, if used must be continous				
Operation	5/2 monstable				
Non assisted	from 2.5 to 10				
Pilot assisted	from vacuum to 10				
Minimm pilot pressure bar	2.50				
Operating temperature range °C	from -10°C to +60 (from -10°C to +45°C for Atex version)				
Conductance C NI/min-bar	228	498	720		
Critical ration bar/bar	0.40	0.24	0.44		
Flow rate at 6.3 bar Δp 0.5 bar NI/min	770	1250	2500		
Flow rate at 6.3 bar Δp 1 bar NI/min	1050	1750	3400		
TRA/TRR at 6.3 bar ms/ms	"12/30"	"24/43"	"50/120"		
Condctance C on relief NL/min-bar	267	817	1095		
Critical ration b on relief bar/bar	0.34	0.24	0.56		
Flow rate on relief at 6.3 bar SL NL/min	1600	4000	5300		
Installation	any positon				
Solenoid pilot	to CNOMO				
Manual actator	Monostable on solenoid pilot and valve body				
Recommended Lubricant	ISO and UNI FD 22				
Class of protection	IP 65 with coil and connector mounted				
Noise level	Max 78 dbA with silenced relief				
Max coil ring nut torque NM	1.00				
Safety function	Cuts off the power supply and relieves the air circit connected to port 4				
Type of sensor used	Hall effect				
B10d	20 x 10 cycles				
Category -EN ISO 13849	PL e, Cat 4				
DC (Diagnostics Coverage)	High (≥ 99 %)				
CCF	80.00				
Order Number	7057121110	7058121110	7059121110		
Part Number	ISV 55 SOS DD M8	ISV 65 SOS DD M8	ISV 75 SOS DD M8		
Cable Order Number (for feedback contacts) 2 required per Safety valve.	S49-5M (M8, 3 pins, straight plug, 5 metres) S49-10M (M8, 3 pins, straight plug, 10 metres)				

