Solenoid Valves

Available in 2/2 Normally Open (NO), 2/2 Normally Closed (NC) and 3/2 Universal configurations. Our valves are opened and closed via a highly efficient solenoid coil. Coils are offered in numerous configurations including a range of voltages, powers, conduit connections and also in Automatic, Manual reset and Manual override versions. 2/2 and 3/2 valves can be offered with both balanced poppets or pressure biased versions.

Solenoids Valves

The Wells range of high-pressure solenoid valves control pressure up to 415 bar (6,000 psi), and orifices from 1.6mm to 12.7mm diameter (1/16" to 1/2"). 2/2 NO, 2/2 NC and 3/2 arrangements are included in the range.

For the smallest orifice (E20 to E29) a porous bronze filter disk is fitted as standard into the valve port.

For all larger sizes of valve, it is recommended that a Wells high-pressure filter is fitted upstream of the solenoid valve.

The largest orifice range (E50 to E57) incorporates a pilot valve to operate the main valve due to the need to overcome the spring loads and friction on the main valve steam, a minimum pressure of 10 bar (150 psi) is needed to operate the valve.

In the case of solenoid valves E26 E27 and E50 to E57 the vent is not ported. These valves can only be used for gas applications.

E20 Valve with ATEX and IECEx certified Ex db Hazardous area solenoid.

Solenoid Coils

Our industry leading solenoid coils have been designed and optimised to give the highest force with minimal power consumption. We offer a range of voltages, reset options, conduit and certification types to suit a wide range of applications.

- Ingress protection: IP68
- ATEX and IECEx certification for used in hazardous areas
- Ambient temperatures from -60°C to +90°C allowing arctic service through to remote desert conditions

Solenoid Coils

Certification	Conduit	Voltage	Reset	Power
Ex db	M20	12 DC	Automatic	2 ~ 12 Watts Depending on valve Requirements
Ex mb	½ NPT	24 DC	Manual	
None	Hirschmann *(Not Ex)*	48 DC	Override	
Consult BiS Wells for correct coil selection and configuration for your application. Please note, not all configurations are possible.		110 ~ 115 DC *(Not Ex mb)*		
		24 AC *(Not Ex mb)*		
		48 AC *(Not Ex mb)*		
		110 ~ 115 AC *(Not Ex mb)*		
		230 AC *(Not Ex mb)*		

2 port 2 position Solenoid Valves

Valve Type	Orifice mm (ins)	Ports (standard)	Pressure bar (psi) Max Inlet	Outlet Range	Gas or Liquid
E20	1.6 (1/16)	1/4" BSP	415 (6,000)	2 way - Energise to open	Both
E21	1.6 (1/16)	1/4" BSP	415 (6,000)	2 way - Energise to close	Both
E30	3.2 (1/8)	1/4" BSP	138 (2,000)	2 way - Energise to open	Both
E31	3.2 (1/8)	1/4" BSP	138 (2,000)	2 way - Energise to close	Both
E40	6.4 (1/4)	3/8" BSP	276 (4,000)	2 way - Energise to open	Both
E41	6.4 (1/4)	3/8" BSP	276 (4,000)	2 way - Energise to close	Both
E50	12.7 (1/2)	3/4" BSP	415 (6,000)	2 way - Energise to open	Gas
E51	12.7 (1/2)	3/4" BSP	415 (6,000)	2 way - Energise to close	Gas

3 port 2 position Solenoid Valves

Valve Type	Orifice mm (ins)	Ports (standard)	Pressure bar (psi) Max Inlet	Outlet Range	Gas or Liquid
E26	1.6 (1/16)	1/4" BSP	415 (6,000)	3 way - Energise inlet to line	Gas
E27	1.6 (1/16)	1/4" BSP	415 (6,000)	3 way - Energise line to vent	Gas
E28	1.6 (1/16)	1/4" BSP	415 (6,000)	3 way - Energise inlet to line	Both
E29	1.6 (1/16)	1/4" BSP	415 (6,000)	3 way - Energise line to vent	Both
E36	3.2 (1/8)	1/4" BSP	138 (2,000)	3 way - Energise inlet to line	Both
E37	3.2 (1/8)	1/4" BSP	138 (2,000)	3 way - Energise line to vent	Both
E56	12.7 (1/2)	3/4" BSP	415 (6,000)	3 way - Energise inlet to line	Gas
E57	12.7 (1/2)	3/4" BSP	415 (6,000)	3 way - Energise line to vent	Gas