

# BX KNIFE GATE VALVE



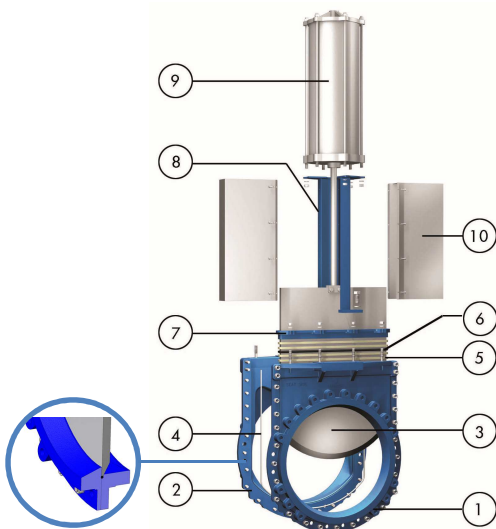
The BX model knife gate valve is a bi-directional wafer type valve specifically designed for the isolation of pulverized coal burner lines on coal fired boilers during maintenance operations. The valve is dust tight which makes it suitable for other bulk handling applications, such as silo outlet valves. This valve has been designed for use in potentially explosive areas (ATEX) and it complies with DIN EN 14460 standard (Explosion Resistant Equipment). In the closed position, the valve can be used as an effective measure against flame propagation in the event of an explosion.

## Product description:

- Bi-directional wafer type knife gate valve
- Size range of DN700-1000 (other sizes upon request). See Dimension Charts for pressure rating
- Rising stem
- Standard flange connection: DIN PN 10 (EN 1092-2)
- Manual (bevel gear) and pneumatic (double-acting) actuation options available
- Directives: 2006/42/EC (MACHINES), 2014/68/EU (PED) Fluid: Group 1(b), 2 (Cat. I. mod. A) and 2014/34/EU (ATEX). Limits of 2014/34/EU

## Features:

- Two-part bolted body, internally machined, with a fully guided gate along the complete stroke
- Wide face to face and internal design with flushing areas avoid any build up of solids that would prevent the valve from closing
- Stainless steel gate polished both sides to avoid jamming and seat damage
- Viton O-ring seat suitable for bi-directional service
- Long life PTFE impregnated synthetic fibre plus EPDM o-ring packing with easy access and adjustable gland follower. Wide range of packing materials available
- RAL-5015 blue epoxy-coating on all cast iron/carbon steel components
- Automated valves provided with gate guards in accordance with EU Safety Standards
- Other options: special materials, fabricated valves, etc.
- Actuation accessories: limit & proximity switches, mechanical stops, positioners, solenoid valves, manual overrides, locking devices and fail safe systems

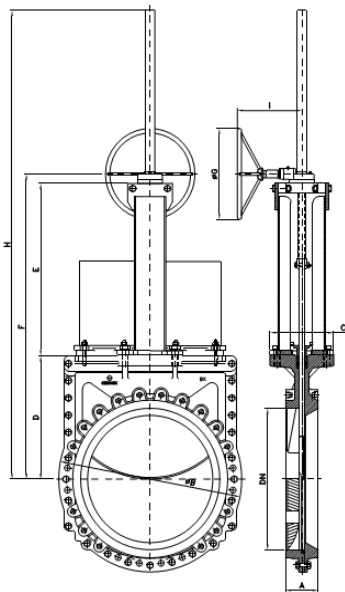
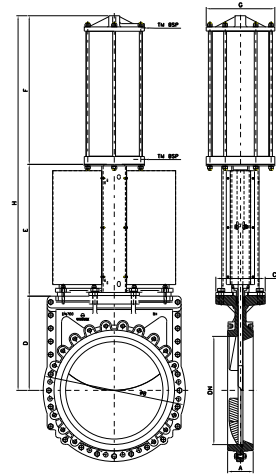


## STANDARD PARTS LIST

Part	Material
1 Body	Ductile Iron GJS400 /0.7040/A536 60-40-18
2 Counterbody	Ductile Iron GJS400 /0.7040/A536 60-40-18
3 Gate	AISI 304 (1.4301)
4 Seal	Viton
5 Packing	PTFE impregnated synthetic fibre
6 O-Ring	EPDM
7 Gland Followers	1.0044 / A570 Gr40
8 Yoke	1.0044 / A570 Gr40
9 Pneumatic Cylinder	-
10 Protection Guards	AISI 304 (1.4301)

## DIMENSIONS (mm) Pneumatic Actuator (D/A)

DN	Pressure	A	B	C	D	E	F	G	H	Standard Cyl.	Connect.
700	3 bar	165	920	320	615	860	960	444	2435	C350/730	3/4"G
800	3 bar	190	1040	320	700	990	1095	444	2785	C350/830	3/4"G
900	3 bar	203	1125	320	820	1118	1185	515	3123	C400/930	3/4"G
1000	3 bar	216	1240	335	885	1225	1285	515	3395	C400/1030	3/4"G



## DIMENSIONS (mm) Bevel Gear Rising Stem

DN	Pressure	A	B	C	D	E	F	G	H	GEAR BOX
700	3 bar	165	920	320	615	900	1560	450	2460	RKO.3
800	3 bar	190	1040	320	700	968	1770	450	2870	FL1.4
900	3 bar	203	1125	320	820	1118	2040	650	3140	FL1.4
1000	3 bar	216	1240	335	885	1220	2207	650	3307	FL1.4

These valves have been classified in Device Group II and fall in the following categories:

II 1GD / 3GD c → Category 1G or 1D inside the valve/Category 3G or 3D outside the valve

II 1GD / 2GD c → Category 1G or 1D inside the valve/Category 2G or 2D outside the valve

DIN EN 14460 (DN 700-1000)

Valve housing resistance to explosion pressure and ignition disrupting resistance against St1 dust explosion in closed position:

DN 700-800: 9,6 bar

DN900-1000: 10,5 bar

**\*IMPORTANT:** Pressure rating of the valve refers to maximum working pressure of the valve. The maximum explosion pressure exceeds many times the working pressure, so 94/9/EC limits must always be observed