SBF/SBP Single Seals

Mechanical Seals For Pumps - Engineered Seals



Product Description

- 1. Single seal configuration
- 2. Balanced design
- 3. Independent of direction of rotation
- 4. Cartridge construction
- 5. Stationary design with multiple springs
- 6. Designed with integrated pumping device for increased efficiency in circulation
- 7. Robust construction with shrink-fitted seal face
- 8. Heavy duty design of solid stationary seat

Technical Features

- 1. Accommodates shaft deflections due to stationary design
- Can be designed for individual pump application with corresponding connection parts to be adapted to the pump seal chamber
- Optimum heat dissipation due to integrated pumping device available for increased efficiency in circulation and optimized seat design
- Cartridge unit factory assembled for easy installation, which reduces downtime.
- 5. Trouble-free long-term operation due to heavy duty single seat design with bandage
- 6. Can operate under high sliding velocities and medium pressures

14 9 1.1.3 1.1.1 1.2

Note: The item numbers as depicted above are based on our technical experience and knowledge and are placed in the chronological order of their assembly procedure.

Item	Description
1.1.1	Seal face
1.1.3	Spring
1.2	Seat
2	Shaft sleeve
6	Cover
8	Pumping screw with flow guide
9	Assembly fixture
14	Shrink disk

Typical Industrial Applications

Boiler feed water pumps Power plant technology

Performance Capabilities		
Sizes	d ₁ * = Upto 250 mm (Upto 10.000")	
Pressure	p ₁ = 50 bar (725 PSI)	
Temperature	t = 300 °C (572 °F)	
Speed	60 m/s (197 ft/s)	
* Other sizes on request		

Permissible Axial Movement

±3 mm

Materials		
Seal face	Silicon carbide (Q), Carbon graphite antimony impregnated (A), Carbon graphite resin impregnated (B)	
Seat	Silicon carbide (Q)	
Secondary seals	EPDM (E), FFKM (K)	
Springs	CrNiMo steel (G)	
Metal parts	CrNiMo steel (G)	

Design Variations

SBF400

Single Mechanical Seal with integrated jacket cooling, for boiler feed pumps

The specifications, drawings, images etc included in this catalogue are intended to be generic and must be interpreted as equivalent or functionally equivalent, more specifically the performance capabilities mentioned in this catalogue is based on optimum values, however the performance of the product is dependent on size, material of construction, media, pressure, temperature, sliding velocity etc and it shall vary from size to size or application to application. Customers are requested to consult with Sealmatic before employing the product from this catalogue for any application.

