



## Sealmatic Delivers Its Mechanical Seal Type SB – D (API 682) Seal Size 127mm For Refinery Application

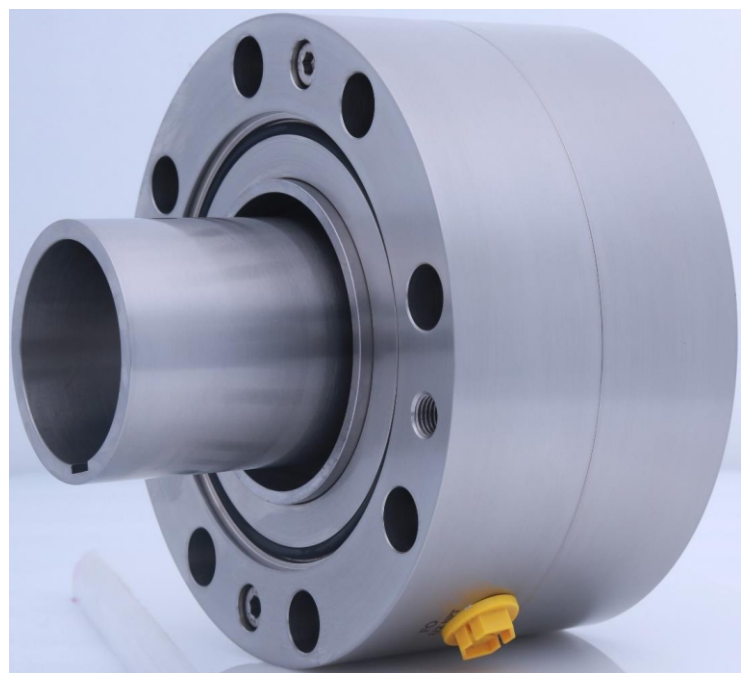
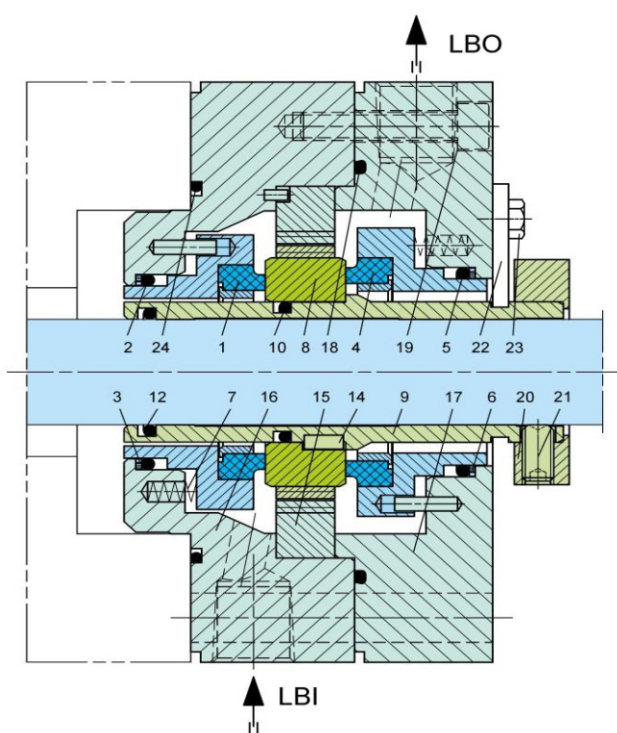
The processing of crude oil in refineries is a complex and multi-stage process in which crude oil is transformed into refined, high-quality end products or feed materials for petrochemical industry. Mechanical seals within these environments are required to function flawlessly despite critical challenges. Sealing technology for such diverse applications have to meet challenges in various respects; risk of insufficient lubrication and dry running, media with a diversity of physical properties, high and low temperature ranges and the handling of hazardous substances and all other conditions which need to be controlled with absolute reliability. Mechanical Type SB – D, meticulously engineered to not only meet but surpass the exacting demands of such environments. Designed in compliance with API 682 standards, this mechanical seal boasts a superior construction and utilizes cutting-edge materials that empower it to endure the severe temperatures and pressures. Its exceptional design not only ensures the integrity of refinery operations but also contributes significantly to safety protocols. By offering unparalleled performance in the face of such challenges, the SB – D seal emerges as a crucial asset in safeguarding the efficiency and security of refinery processes.

Operating Parameters Of Type SB – D Mechanical Seal									
Sr. No	Seal Type	RPM	API Plan	Media	Temperature (°C)	Stuffing Box Pressure (kg/cm <sup>2</sup> )	Suction Pressure (kg/cm <sup>2</sup> )	Discharge Pressure (kg/cm <sup>2</sup> )	Viscosity (cSt)
1	91-SBF-D1/127-G911 R1 (DE)	2980	53B	Crude Oil	60°C	7.153 kg/cm <sup>2</sup>	6 kg/cm <sup>2</sup>	64.53 kg/cm <sup>2</sup>	6.340 cSt
1	91-SBF-D1/127-G912 R1 (NDE)	2980	53B	Crude Oil	60°C	7.153 kg/cm <sup>2</sup>	6 kg/cm <sup>2</sup>	64.53 kg/cm <sup>2</sup>	6.340 cSt

As per the above-mentioned operating parameters. We are pleased to announce that Sealmatic Mechanical Seal Type SB – D (API 682 compliant) has been successfully delivered for refinery application. Thus, with a comprehensive range of API complaint quality seals and supply systems Sealmatic is playing a key role towards ensuring the reliability and safety of refinery processes. Utilizing high-quality materials and a meticulously engineered structure, this seal can withstand extreme temperatures and pressures found within refinery equipment.

### Sealmatic Mechanical Seal Type SB – D (API 682 compliant) For Refinery Application

Type SB – D is a balanced cartridge API mechanical seal category 2 and 3, Type A, Arrangement 3 seal suitably designed for refinery application and other process industries. It has the mechanical seal configuration as 3CW – FF (Contacting Wet – Face-to-Face). Type SB – D can operate under high sliding velocities and high pressures. The mechanical seal is designed with integrated pumping device for increased efficiency in circulation. Also the optimum heat dissipation is achieved due to integrated pumping device available for increased efficiency in circulation and optimized seat design.



#### Performance Capabilities

- Shaft diameter: d1 = 40 ... 110 (250) mm (1.57" ... 4.33 (9.84)"
- Pressure: p1 = 42 (150) bar (609 (2,175) PSI)
- Temperature: t = -40 °C ... +176 (+200) °C (-40 °F ... +350 (+394) °F)
- Sliding velocity: v<sub>g</sub> = 23 (60) m/s (76 (197) ft/s)
- Axial movement: ±3.0 mm
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#### Technical Features

- Accommodates shaft deflections due to stationary design
- Can be designed for individual pump application with corresponding connection parts to be adopted to the pump seal chamber
- Cartridge unit factory assembled for easy installation, which reduces downtime
- Trouble-free long-term operation due to heavy duty single seat design with bandage.

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