Double Compression Plate Seal (DL5)

General Information:

The double seal is a rim-mounted system suitable for floating roof tanks of all sizes storing all grades of crude and refined products.

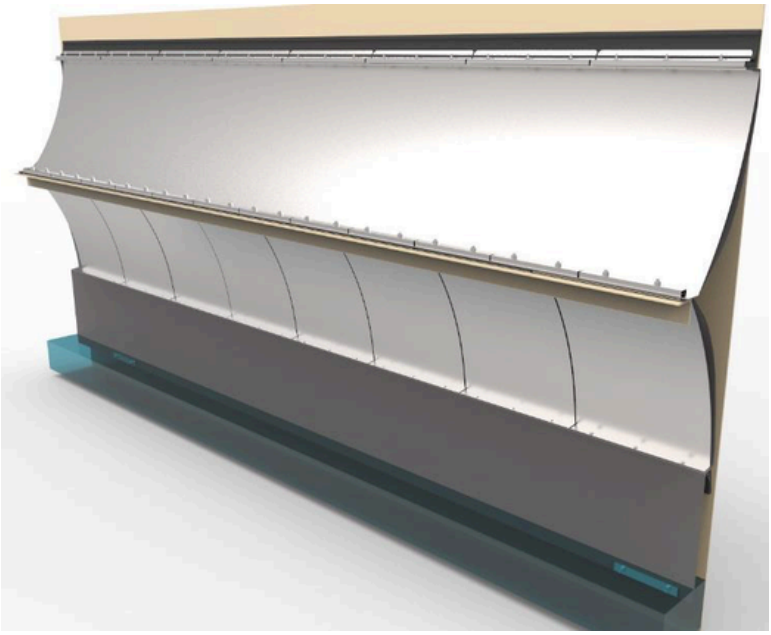
Design Features:

The seal incorporates a compression plate, a synthetic rubber wiper and a vapour barrier membrane.

The compression plate can be made from either galvanised steel or stainless steel.

The vapour barrier membrane is normally manufactured from polyurethane-coated nylon fabric with very low vapour permeability properties. PVC, nitrile, PTFE/Teflon or firestop materials may be adopted depending on customers' requirements.

The seal design is such that all the fixings are on the outside of the seal; i.e. the tank shell side is completely smooth. The smooth outer surface of the seal ensures that the risk of damage is minimised if the roof is floating above the tank shell.



The seal can be fixed to either a vertical upstand or horizontal angle. The dimensions of the compression plate can be varied to suit a wide range of nominal rim spaces. The wiper maintains approximately 65 mm contact with the wall of annular spaces.

Vapour Membrane:

We recommend the following materials for membrane:

- **Calcium Silicate:** 1.90mm thick. It complies with DIN 22118, DIN 22100 (Part 1) and the Health and Safety Committee Guide of Shell. Meets the LASTFIRE 6.1 specifications. They are 85% compatible with aromatic products.
- **PTFE (Teflon):** 0.25 and 0.35mm thick. They comply with DIN 22118 and DIN 22100 (Part 1). Meets the LASTFIRE 6.1 specifications. They are 100% compatible with aromatic products.
- **Polyurethane (PU):** 0.4 and 1mm thick. They are 100% compatible with aromatic products.
- **VITON:** 1.0mm thick. They are 100% compatible with aromatic products.

Technical Data

Rim space: 200 mm ± 120 mm

Aromatic resistance: 100%

Material Specification

Compression plate: 1.6mm Galvanised Steel
1.5mm Stainless Steel

Clamp channels: Galvanised or Stainless Steel

Wiper: Synthetic rubber, high tensile strength, good wear resistance, excellent weathering.

Vapour barrier: CS, PTFE, Polyurethane, Viton

Shunts: Stainless Steel