

# Packing to Seal Conversion with 442C and SpiralTrac™ in Fiber Feed Pump

Glass Manufacturing | Glass Fiber Stock | Mechanical Seal



No Flush

## Application Info & Challenge

- **Equipment:** Sulzer ZPP double ended split case fiber feed pump
- **Product:** Glass fiber stock
- **Temperature:** 60-70°C
- **Solids:** max 0.2%

Pump was previously packed on both sides with clean external flush into the stuffing box. Excessive sleeve wear resulted in **regular lengthy shutdowns** and extended downtime. Customer is looking to eliminate flush as it is excessively diluting the product, making it difficult to remove added water later in the process. Customer is also looking for a system that minimizes maintenance complexity and downtime.

## Solution & Result

- Chesterton 442C RSC/RSC EP 180mm single split seal
- **SpiralTrac Version F Type S** made of carbon graphite (ESC) material, part# *FM18000RS22000(ESC)* and *FM18000LS22000(ESC)*

The OEM L-shaped bushing was removed from the box, giving the SpiralTrac an unobstructed path to expel any solids that might be present in the stuffing box. During operation, SpiralTrac keeps solids away from the seal, while still promoting active fluid exchange for heat dissipation. This setup with the max 0.2% solid content allows the 442C to operate **without flush**.

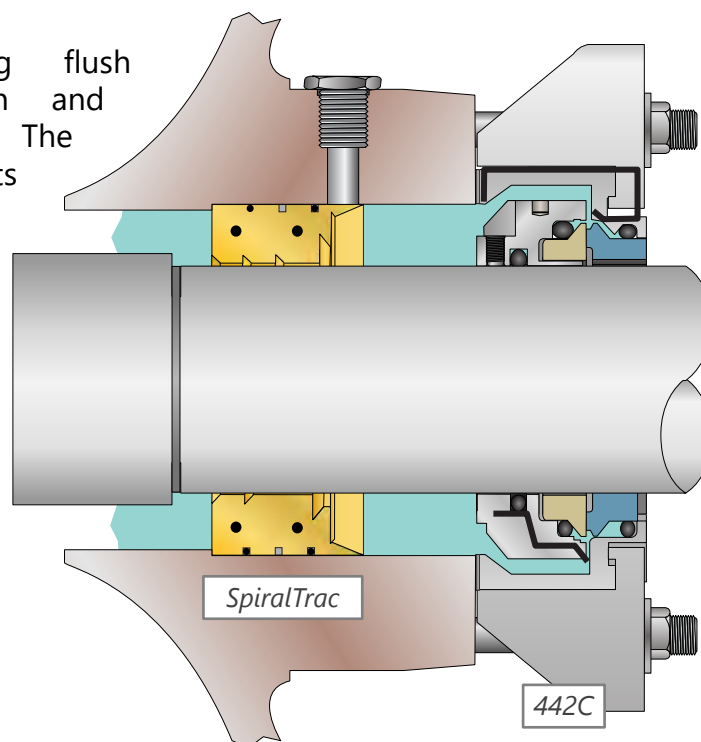
**Downtime reduction:** Repair time in case of unexpected failure is reduced from 3 days to just 3 hours.

**Process efficiency:** Eliminating flush improves product concentration and enhances overall product efficiency. The removal of flush also prevents dilution, resulting in a higher quality product.

As of writing, this solution has been running successfully for months without failure.



Version F Type S SpiralTrac



Original packed arrangement



Pump disassembled, L-shaped bushing removed

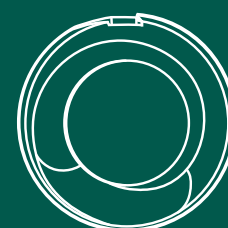


Chesterton solution installed



Chesterton 442C Single Split Seal

For more information please send an email to us at [support@enviroseal.ca](mailto:support@enviroseal.ca). We hope to hear from you!



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