



APPLICATION BRIEF

MEASUREMENT OF OILS AND GREASES FOR HEAVY MINING EQUIPMENT

May 3, 2024

PROJECT OVERVIEW

In the mining industry, heavy equipment is an integral part of the operation. Service vehicles must deliver oils and greases accurately and precisely during maintenance events.

Heavy mining equipment is expensive to run and must stay on task. Downtime is costly and using time to bring equipment out of the mine is wasteful and, in some cases, not possible. Mobile service trucks must bring the maintenance to the equipment. Ensuring the appropriate amounts of oil and grease are dispensed is critical.

Flow Meter Requirements:

- Able to handle wide range of viscosities
- Easy-to-read display
- Accurate measurement
- Low maintenance

PRODUCT SPECIFICATIONS

Oval Gear Flow Meter – Positive Displacement

- Capable of wide range of viscosity
- 0.26 GPH - 660 GPM
- No need for flow conditioning
- Stainless, Aluminum, or Ryton®
- Multiple seals and rotor materials to ensure fluid compatibility
- Uses only 2 moving parts increasing reliability

PRODUCT SOLUTIONS

The FLOMEC® OM025 and OM050 flow meters were specified for this process. Oval gear flow meters are able to process a wide range of viscosities accurately without the need for fluid conditioning. While meters utilizing such tech as Coriolis are very accurate, they can be cost prohibitive and unsuitable for high vibration environments. FLOMEC's OM Series Flow Meters shine in this application because of their easy-to-read displays and accuracies of 0.2%.

Benefits of adding the flow meter to this process included realized costs savings:

- According to experts, a typical downtime event can average \$180,000
- Oval Gear flow meters ensure that the service technician is able to accurately follow manufacturer's recommendations for amounts of oils and lubes
- Onboard flow meters can be integrated into inventory management ensuring your service vehicles never arrive on site without appropriate amount of fluids
- Meter cost is negligible when considering the cost of one downtime event.
- Remote-mounted display option

