

Shell Malleus Grease ET

Extreme-temperature synthetic grease



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|-----------|------|------------------------|--------------------|--------------------|----|-----------------|
| THICKENER | NLGI | TEMP RANGE | BASE OIL VISCOSITY | | EP | SOLID LUBRICANT |
| INORGANIC | 2 | +300°C to +600°C | 40°C 128 cSt | 100°C 25 cSt | ✓ | GRAPHITE |

Shell Malleus Grease ET is an extreme-pressure grease, blended for industrial applications operating at temperatures up to 600 °C

It is fine dispersion of small particle size graphite incorporated in a synthetic fluid with an ashless, inorganic (non-soap), non-abrasive thickening agent.

Applications

Typical applications include:

- Kiln car bearings
- Furnace door gear
- Drying tunnel mechanisms

Grease Performance

High temperature grease performance is severely limited by the nature of the base fluid and thickener which may degrade at high temperatures, destroy the grease structure and form harmful deposits.

At elevated temperatures the liquid phase of Shell Malleus Grease ET evaporates leaving behind a non-abrasive amorphous graphite lubricant.

Graphite is a lamellar solid giving good lubricating performance and low coefficients of friction in severe environments.

Shell Malleus Grease ET also gives good service in lower temperature applications

Application advice

Shell Malleus Grease ET must be applied sparingly, preferably by hand, after fitting and before assembling the bearing housing.

Over lubrication must be avoided. For example, liberal applications of Shell Malleus Grease ET to a stationary rolling bearing might result, at very high temperatures, in graphite wedges being formed between the rolling elements as the base fluid evaporates. This is an unsatisfactory form of lubrication and bearing performance might be inhibited on subsequent bearing rotation.

Shell Malleus Grease ET is unlikely to present any significant health or safety hazard when properly used in the recommended application, and good standards of industrial and personal hygiene are maintained.

For further guidance on Product Health & Safety refer to the appropriate Shell Product Safety Data Sheet.

Advice

Advice on applications not covered in this leaflet may be obtained from your Shell Representative

Typical Physical Characteristics

| | |
|---|----------------|
| NLGI Consistency | 2 |
| Colour | Black |
| Soap Type | Inorganic |
| Base Oil (type) | Synthetic |
| Kinematic Viscosity @ 40°C cSt 100°C cSt (IP 71/ASTM-D445) | 128 24.6 |
| Cone Penetration Worked @ 25°C 0.1mm (IP 50/ASTM-D217) | 265-295 |
| Dropping Point °C (IP 132/ASTM-D566-76) | Not applicable |

These characteristics are typical of current production. Whilst future production will conform to Shell's specification variations in these characteristics may occur.

Health & Safety