

# **High Temperature Grease**

Multipurpose high temperature grease

#### Description

High Temperature Grease is a high performance, multipurpose lithium complex grease developed using an optimised combination of high quality mineral oil, proprietary thickener technology and a specially selected additive system enabling reliable performance across a wide range of temperatures whilst exposed to a variety of operational loads, speeds and environmental conditions.

### Application

High Temperature Grease is intended for use in a wide range of plain and rolling element bearings within both the Automotive and Industrial markets, especially targeting those applications where upper operating temperatures are likely to exceed the limits of conventional, lithium thickened greases.

The excellent thermal and mechanical stability of High Temperature Grease make it particularly suitable for use in automotive bearing applications where rotational speeds may be higher or prolonged heavy braking may generate higher than normal hub temperatures. Specific examples may include cars fitted with disc brakes or commercial vehicles such as trucks or buses.

High Temperature Grease also offers good resistance to water and corrosion as well as very good load carrying performance making it suitable for general vehicle chassis lubrication or bearings on off-road construction vehicles where greater extremes of pressure may be prevalent.

#### **Advantages**

- Excellent thermal and mechanical stability ensure prolonged product integrity across a wider operating temperature range, thus enabling extended relubrication intervals and reduced maintenance.
- Good extreme pressure and anti-wear properties provide the potential for prolonged component life.
- Good water resistance provides enhanced protection in applications where the potential for exposure and contamination are higher.
- Good corrosion protection.
- Excellent multipurpose potential enabling a reduction in product inventory.

## **Typical Characteristics**

| Name  | Method         | Units    | High Temperature Grease        |
|---|----------------|----------|--------------------------------|
| Thickener   | -              | -        | Lithium Complex                |
| Base Oil  | -              | -        | Mineral                        |
| Appearance  | Visual         | -        | Smooth, Brown &<br>Homogeneous |
| NLGI Grade  | ASTM D 217     |          | 2                              |
| Cone Penetration, Worked 60 Strokes                 | IP 50          | 10ths/mm | 275                            |
| Cone Penetration, Worked 100,000 Strokes            | IP 50          | 10ths/mm | 285                            |
| Base Oil Viscosity @ 40°C                           | ASTM D445      | cSt      | 180                            |
| Drop Point  | IP 396         | °C       | 260                            |
| Oil Separation, 18 hrs @ 100°C                      | IP 121         | %        | 7.5                            |
| Oil Separation                                      | ASTM D<br>1742 | %        | 3.6                            |
| Water Washout, 1 hr @ 79°C                          | ASTM D<br>1264 | % wt     | 3.5                            |
| Emcor Corrosion Protection, Distilled Water         | IP 220         | Rating   | 0 - 0                          |
| Corrosion Prevention                                | ASTM D<br>1743 | Rating   | Pass                           |
| Pressure Vessel Oxidation, Pressure Drop at 100 hrs | ASTM D 942     | psi      | 2.0                            |
| 4 Ball Weld Point                                   | IP 239         | kg       | 310                            |
| Wheel Bearing Leakage @ 105°C                       | ASTM D<br>1263 | g        | 2.3                            |
| Temperature Range                                   |                |          | -30°C to +140°C                |

The above figures are typical of those obtained with normal production tolerance and do not constitute a specification.

#### Storage

All packages should be stored under cover. Where outside storage is unavoidable drums should be laid horizontally to avoid the possible ingress of water and the obliteration of drum markings. Products should not be stored above 60°C, exposed to hot sun or freezing conditions.

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