Product Data

Castrol Spheerol LMM

Bearing grease

Description

Castrol Spheerol™ LMM is a multi-purpose lithium grease containing molybdenum disulphide solid lubricant to enhance its load carrying properties under conditions of high or shock loading or to prevent scuffing or fretting. It contains oxidation and corrosion inhibitors, anti-wear additives, has good mechanical stability and can be used in the presence
of moisture.

Application

Spheerol LMM grease is suitable for most types of bearing and a wide range of other industrial applications, which require a molybdenum disulphide grease, including grease lubricated gears.

Spheerol LMM may be used in plain and rolling element bearings, including heavily loaded bearings at low and medium speeds, and those subject to shock loading and excessive vibrations.

The incorporation of solid lubricant in Spheerol LMM greases makes this grease particularly suited for the lubrication of reciprocating and sliding motion elements, where the prevention of scuffing and fretting is desirable. Typical applications include pivot pins, cams, screws, splined shafts, slides, flexible joints (ball, universal, CV joints etc). It is also useful for the lubrication of chains, swivels and shackles to prevent scuffing.

Advantages

- Good load carrying capacity – protects equipment against extreme loading and helps prevents damage caused by shock loading and excessive vibration
- Resistance to scuffing and fretting – provides protection against fretting that can occur on splined shafts, pivot pins and other parts subject to reciprocating and sliding motion
- Good water resistance – the grease film remains on the surface even in the presence of water
- Resistant to copper and steel corrosion – helps prevent rust and oxidation on metal surfaces
- High mechanical stability – the grease keeps its consistency in service ensuring long term protection
- Good adhesion – continuous lubrication and reduced consumption as film stays between lubricated surfaces

Typical Characteristics

Test	Method	Units	LMM
Appearance, Visual	-	-	Dark grey, smooth
Thickener Type	-	-	Lithium
Base Oil Type	-	-	Mineral oil
NLGI Grade	-	-	2
Density @ 20°C/68°F	ASTM D1475	g/ml	0.9
Worked Penetration, 60 strokes @ 25°C/77°F	ISO 2137 ASTM D217	0.1 mm	265-295
Dropping Point	ISO 2176 ASTM D2265	°C/°F	185/365
Base Oil Viscosity @ 40°C/104°F	ISO 3104 ASTM D 445	mm^2/s	150
Rust Test, 48 hrs @ 52°C/126°F	ASTM D1743	Rating	Pass
Copper Corrosion, 24 hrs, 100°C/212°F	ISO 2160 ASTM D4048	Rating	1a
Corrosion Protection (SKF Emcor)	ISO 11007 ASTM D6138	Rating	01/01
Four Ball EP, Weld Load	ASTM D2596	kg	200
Timken EP Test, OK Load	ASTM D2509 IP 326	kgs/lbs	18/40
DIN Classification	DIN 51502	-	KF2K-20
ISO Classification	ISO 6743/9	-	L-XBCEB 2

Subject to usual manufacturing tolerances.

Additional Information

In order to minimise potential incompatibilities when converting to a new grease, all previous lubricant should be removed as much as possible prior to operation. During initial operation, relubrication intervals should be monitored closely to ensure all previous lubricant is purged.

Castrol Limited, Pipers Way, Swindon, Wiltshire SN3 1RE, UK
www.castrol.com/industrial