

Klübersynth BEH 42-232

Special grease for rolling bearings with wide service temperature range



Your benefits at a glance

- Tried-and-tested lithium-based lubrication with innovative composition
 - Longer relubrication intervals than with conventional lithium-based greases
 - Better pressure absorption capacity due to special EP additives reduces wear
 - Good compatibility with FKM elastomers
- Versatile uses
 - Very wide service temperature grease – extraordinary for a lithium-based grease
 - High ageing and oxidation stability enable long component life
 - Optimised oil release reduces friction resistance and contributes to higher efficiency

Your requirements - our solution

Your experience with lithium soap products has been very positive, which is why you would like to stick to this technology also in the face of increasing requirements. This kind of experience has also been the basis of the development of Klübersynth BEH 42-232. What's new in this product is the combination of a lithium complex soap with a special, fully synthetic base oil mixture consisting of ester and ether oils. Moreover, the carefully selected additives prevent premature material fatigue, enabling longer component life even at elevated temperatures and loads. With its wide service temperature range from -40 °C to +180 °C in combination with excellent wear and corrosion protection, Klübersynth BEH 42-232 is a high-performance grease for a wide range of challenging applications.

Application

Klübersynth BEH 42-232 was especially developed for the long-term or for-life lubrication of heavily loaded rolling bearings. Because of its performance characteristics proven on FAG FE8 and FAG FE9 rolling bearing testers, Klübersynth BEH 42-232 is preferably used in rolling bearing applications with both linear or point-to-point contact.

Such for-life-lubricated rolling bearings are found e.g. in

- machines for agriculture and the building industry
- conveyors
- textile and paper making-machines
- wheel bearing applications

Application notes

Klübersynth BEH 42-232 can be applied by grease gun, brush or spatula. Pumpability via centralised lubricating systems should be checked with the system manufacturer prior to use. The friction point can be pre-cleaned using commercial cleaning agents.

Behaviour towards elastomers and plastics

Because of its innovative composition, Klübersynth BEH 42-232 shows particularly good compatibility with FKM elastomers as are frequently used for seals in rolling bearings subject to high temperatures.

However, we recommend checking compatibility with the material used especially prior to series application.

Material safety data sheets

Material safety data sheets can be requested via our website www.klueber.com. You may also obtain them through your contact person at Klüber Lubrication.

Pack sizes	Klübersynth BEH 42-232
Cartridge 400 g	+
Can 1 kg	+

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Pack sizes	Klübersynth BEH 42-232
Bucket 18 kg	+
Bucket 25 kg	+
Characteristics	Klübersynth BEH 42-232
Article number	004333
Composition, thickener	lithium complex soap
Composition, type of oil	ester oil , ether oil
Colour space	yellow
Service temperature, lower limit	-40 °C
Service temperature, upper limit	180 °C
Lubricating greases - K, DIN 51825@DIN 51502	KPE2R-40
Density, Klüber method: PN 024, 20°C	approx. 0.9 g/cm ³
NLGI grade, DIN 51818	2
Kinematic viscosity of the base oil, DIN EN ISO 3104 / DIN 51562-1 / ASTM D445 / ASTM D7042, 100°C	approx. 22.5 mm ² /s
Kinematic viscosity of the base oil, DIN EN ISO 3104 / DIN 51562-1 / ASTM D445 / ASTM D7042, 40°C	approx. 230 mm ² /s
Copper corrosion, DIN 51811, 24 h, 150°C	1 - 150 - 24 corrosion degree
SKF-EMCOR, DIN 51802, Klüber method: distilled water, 168 h	≤ 1 corrosion degree
Oil separation, ASTM D6184, based on standard, 30 h, 150°C	≤ 10 % by weight
Flow pressure, DIN 51805-2, -40°C	≤ 1400 mbar
Dropping point, DIN ISO 2176 / IP 396	≥ 250 °C
Four-ball tester: wear characteristics, DIN 51350-5, E: 1000 N, 1 min, wear scar diameter	≤ 1.8 mm
Speed factor (n x dm)	approx. 600000 mm/min
Water resistance, DIN 51807-1, 3 h, 90°C	≤ 1 - 90 rating
Minimum shelf life from the date of manufacture - in a dry, frost-free place and in the unopened original container, approx.	36 months

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Klüber Lubrication – your global specialist

Innovative tribological solutions are our passion. Through personal contact and consultation, we help our customers to be successful worldwide, in all industries and markets. With our ambitious technical concepts and experienced, competent staff we have been fulfilling increasingly demanding requirements by manufacturing efficient high-performance lubricants for more than 90 years.

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