

Klübersynth GE 4 80 W 140

Fully synthetic high-performance gear oil



Your benefits at a glance

- Maximum protection against scuffing: API GL-5
- Excellent wear protection for gear teeth and rolling bearings
- Good shear stability for reliable lubricant film formation
- High micropitting resistance
- Excellent ageing and oxidation resistance
- Wide service temperature range due to good viscosity-temperature behaviour
- Good anti-foaming characteristics
- Especially developed for rail vehicle gears subject to high stresses
- Complements Klübersynth GE 4 75 W 90 with a higher viscosity

Your requirements - our solution

Klübersynth GE 4 80 W 140 is a fully synthetic high-performance gear oil based on polyalphaolefin (PAO) offering high stability and protection even under shock loads.

It was especially developed for rail vehicle gearboxes operating under high loads. The product is based on Klübersynth GE 4 75 W 90, which has been tried and tested on the market and is approved by many OEMs. Its viscosity, however is higher: SAE 80 W 140.

Klübersynth GE 4 80 W 140 offers a very high scuffing load capacity of API GL-5 and can therefore be used in gearboxes requiring API GL-4 or API GL-5. The excellent wear protection of both gears and rolling bearings ensures a long service life of the lubricated components, leading to lower maintenance costs. The oil's high micropitting resistance of GFT ≥ 10 according to FVA 54/7 offers sufficient protection to gears that are subject to high loads and would normally be susceptible to this type of damage. The product's low foaming tendency and anti-corrosive properties enable problem-free gear operation.

The good shear stability of the synthetic base oil contained in Klübersynth GE 4 80 W 140 effectively prevents a decrease of the

lubricant film thickness even at high loads. The excellent ageing and oxidation stability of the synthetic base oil facilitates considerably longer oil change intervals compared to mineral oils or other synthetic oils, contributing to reduced maintenance costs.

Application

Klübersynth GE 4 80 W 140 was especially developed for the lubrication of spur, bevel and hypoid gears with maximum antiwear and lifetime requirements even under shock loads. It may be used in drive units for rail vehicles, industrial robots, textile machines or metal-forming presses.

Application notes

The oil can be applied by means of immersion, immersion circulation or injection lubrication. Drip-feed lubrication as well as application by brush, oil can or automatic lubricating systems are also possible.

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 GE 4 80 W 140
Can 20 l	+
Canister 5 l	+
Canister 20 l	+

Klübersynth GE 4 80 W 140

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Pack sizes	Klübersynth GE 4 80 W 140
Drum 200 l	+

Characteristics	Klübersynth GE 4 80 W 140
Article number	012329
Lower service temperature	-30 °C
Upper service temperature	150 °C
Colour space	yellow
Density, DIN 51757, 20 °C	ca. 0,87 g/cm ³
Minimum shelf life from the date of manufacture - in a dry, frost-free place and in the unopened original container, approx.	36 months
Kinematic viscosity, DIN 51562 pt. 01/ASTM D-445/ASTM D 7042, 40 °C	ca. 250 mm ² /s
Kinematic viscosity, DIN 51562 pt. 01/ASTM D-445/ASTM D 7042, 100 °C	ca. 30 mm ² /s
Anticorrosive properties on steel, DIN ISO 7120, method A, steel, 24 h/60 °C	no rust corrosion degree
Pour point, DIN ISO 3016	<= -35 °C
SAE-viscosity grade	80 W 140
Viscosity index, DIN ISO 2909	>= 150
Four-ball EP tester, welding load, DIN 51350 part 2	>= 3000 N
Flash point, DIN EN ISO 2592, Cleveland, open-cup apparatus	>= 200 °C
FZG scuffing test, DIN ISO 14635-1, A/8.3/90, scuffing load stage	>= 14
FZG scuffing test, based on DIN ISO 14635-1, A/16.6/90, scuffing load stage	>= 12
FZG micropitting test, FVA 54, GF-C/8,3/90, failure load stage	>= 10
FAG FE8 rolling bearing test, DIN 51819-3, D 7,5/80-80, wear of rolling element	<= 30 mg
FAG FE8 rolling bearing test, DIN 51819-3, D 7,5/80-80, wear of cage	<= 200 mg
API scuffing load capacity	API GL 5
Flender foaming test with original oil, increase in volume	<= 15 %

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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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