



Berusynth GPX –
the new generation of synthetic gear oils



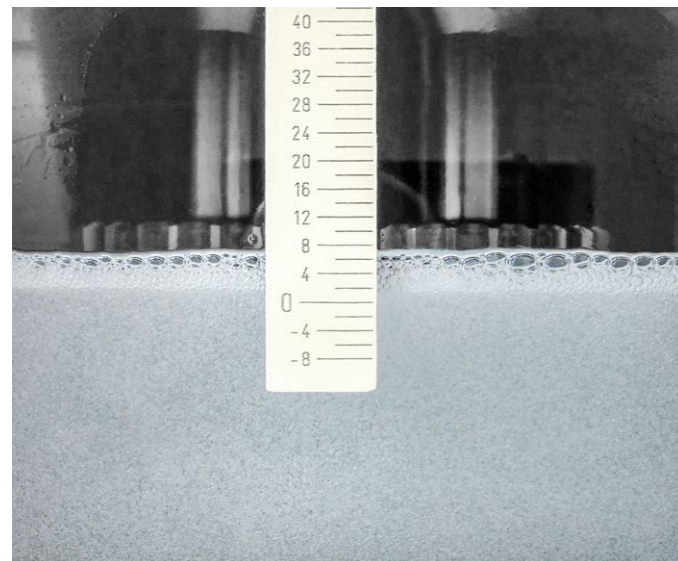
BECHEM
LUBRICATION
TECHNOLOGY

Sustainable and extremely powerful

The fully synthetic high-performance **Berusynth GPX series** gear oils are based on the latest generation of base oils. The polyalphaolefins used in the oils are produced with metallocene catalyst technology, which enables a high viscosity with a narrow distribution of the molecular weight and a very even structure without short side chains. Together with a modern high-performance additive package, the properties achieved far exceed most polyalphaolefin-based gear oils offered on the market.

The special formulation of the Berusynth GPX series ensures improved oxidation resistance, enables longer oil change intervals, reduces the friction value in tooth contact and decreases power losses. With these trend-setting high-performance gear oils, BECHEM supports the sustainable, resource-efficient operation of gear boxes and systems and a reduced carbon footprint. The Berusynth GPX series is approved by gear manufacturer Flender.

Extremely low tendency to foam

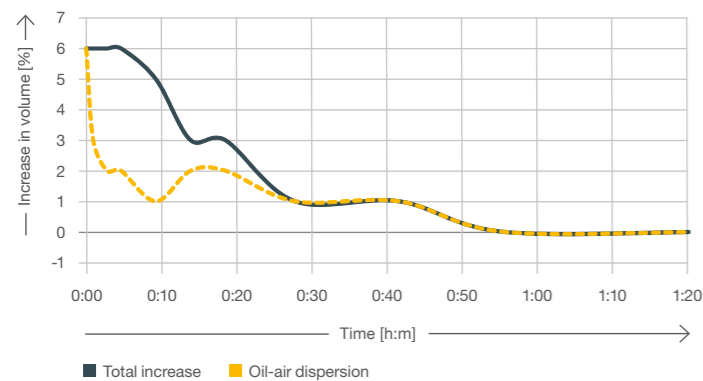


Berusynth GPX 320 in the Flender foam test 5 minutes after switching off the testing equipment

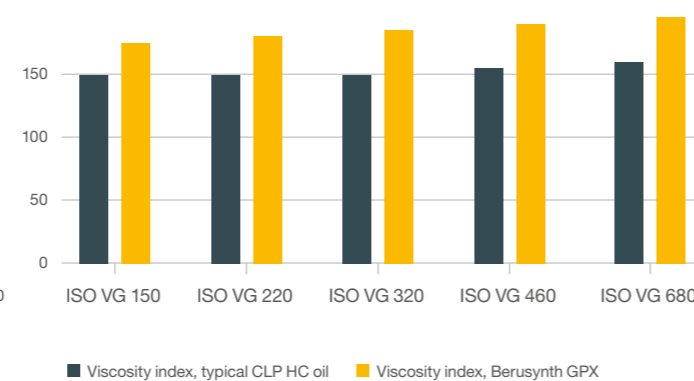
Advantages of Berusynth GPX gear oil

- Extremely high viscosity index and therefore thicker lubricating film at higher operating temperatures
- Extremely low tendency to foam
- High working temperature range
- Excellent deep temperature properties
- Very high oxidation stability and therefore longer oil change intervals
- Improved protection against wear and seizing
- Very high resistance to micro-pitting
- Low friction value resulting in lower power loss
- Improved filterability

Test result, tendency to foam



Higher viscosity index



Excellent wear protection

The threshold for the wear of rolling elements in the FAG FE 8 test for CLP gear oils according to DIN 51517-3 is only 30 mg. The products of the Berusynth GPX series achieve a particularly excellent wear of rolling elements of ≤ 8 mg.



Rolling elements and cage of a FAG FE 8 bearing after the test run with Berusynth GPX gear oil

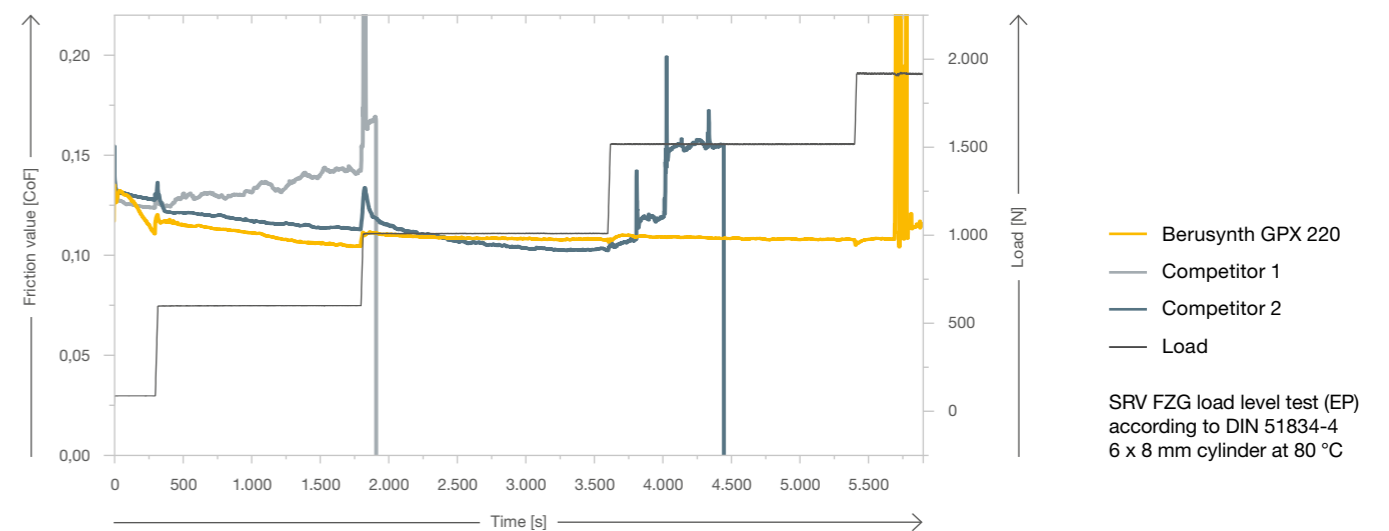
More stable lubricating film and lower friction value

The oils in the Berusynth GPX series achieve a better result compared with similarly structured competitor oils in the SRV FZG load level test according to DIN 51834-4. At 80 °C and with friction pairing cylinder (6 x 8 mm) against lapped plate, “gluttons” occur with competitor oils in ISO VG 220 at a lower force and the lubricating film breaks down after a shorter running time. Berusynth GPX 220 achieves a longer running time, withstands higher loads and achieves a lower friction value over the entire running time.

Exceeds the requirements of the gear oil specifications

- DIN 51517-3: 2018-09 CLP
- ANSI/AGMA 9005-F16: 2016 AS
- ISO 12925-1: 2018-01 CKD
- ISO 12925-1-2018-01 CKSMP
- GB 5903: 2011 L-CKD

SRV FZG load level test



SRV FZG load level test (EP) according to DIN 51834-4 6 x 8 mm cylinder at 80 °C

Lubrication solutions for industry



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