

Natural Oils for Precision Micromechanics

The basic raw materials of Moebius Natural Oils 8000, 8030 and 8040 are highly refined hoof oils in combination with very special mineral oils. Natural oils have a wide field of application within the precision micromechanic industry. Moebius Natural Oils contain specially selected additives

which increase their life span. Moebius Natural Oils have excellent oiliness properties resulting in very high friction reduction and increased pressure resistance. Moebius 8000 and 8030 have excellent adherence, and when used under normal conditions they do not spread or creep.

Technical Data	8000	8030	8040
viscosity at 0°C	280 cSt	440 cSt	570 cSt
viscosity at 20°C	95 cSt	115 cSt	145 cSt
viscosity at 50°C	29,5 cSt	31 cSt	34,7 cSt
pour point	-18°C	-27°C	-32°C
surface tension at 25°C: dyn/cm	34,5	33,5	33,7
saponification number in mg KOH/g	160	93	37
evaporation loss after 5 days at 100°C	1,5%	1,4%	1,4%
density at 20°C	0,908	0,900	0,886
contact angle on ruby	25-32°	24-28°	7-10°
contact angle on steel	20-25°	18-22°C	4- 6°
temperature range for usage	-15 to +80°C	-18 to +80°C	-27 to +80°C
Baader ageing test: change in viscosity after 12 days	+18%	+10%	+5%

MOEBIUS 8000 is an all-purpose natural oil with properties allowing its use in precision micro-mechanics.

MOEBIUS 8030 is a natural oil with greater viscosity than MOEBIUS 8000. This type is used in precision mechanics.

MOEBIUS 8040 is a natural oil with high mineral oil content and thus exhibits high quality characteristics when used at low temperatures. To increase adherence, precoating with antispreading agent (Fixodrop) is recommended.



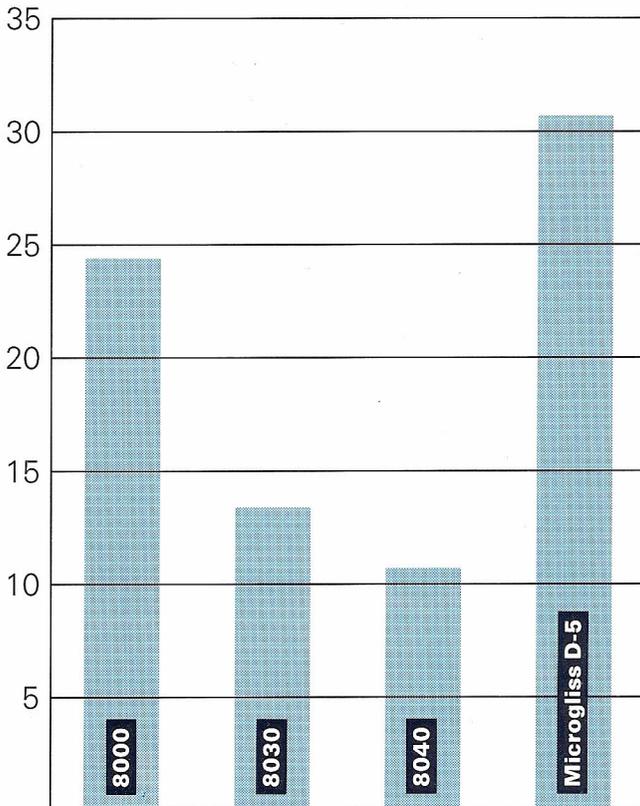
Range of application

Natural oils are generally used in precision micro-mechanics, in particular for:

– wrist watches, clocks, pendulums

- printing and writing equipment, computer printers
- turntables, cassette recorders
- gas, water and electricity meters
- miniball bearings

Maximum load for various oils



First seizing in kp



MOEBIUS

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