

Approved hydraulic fluids for Putzmeister concrete pumps

Mineral hydraulic fluids

- As a general rule, **only mineral hydraulic fluids of type HLP** may be used for concrete pumps and industrial technologies. These hydraulic fluids must also meet the minimum requirements of **DIN 51524-2**.
- **The use of H, HL, HLPD or HVLPD fluids as well as zinc-free hydraulic oils is prohibited.**
- As standard the viscosity grade ISO VG 46 has to be used (range from -10 °C to 90 °C).
- Only fluids that meet the minimum requirements of **DIN 51524-2 and these Putzmeister specifications for the viscosity grade ISO VG 46 and are confirmed in writing by the manufacturer** may be used.

ISO VG 32 (Range of application -15 °C to 80 °C):

Due to lower viscosity, the maximum temperature limit of the machine must be adjusted to 80 °C (90 °C standard).

Addinol	Hydraulic oil HLP 32	Lube-Tech	LTI AW 32
Benz	Oil PTL 32	Mobil	DTE 24
BP	Energol HLP-HM 32	Mobil	DTE 24 Ultra
Castrol	Hyspin AWS 32	Total	Azolla ZS 32
Eni	Precis HLP 32		

ISO
VG 32

ISO VG 46 (Range of application -10 °C to 90 °C):

As a standard use viscosity grade ISO VG 46.

Addinol	Hydraulic oil HLP 46	GS Caltex India	KIXX HYDRO HD 46
Aral	Vitam GX 46	Liqui-Moli	HLP 46 SG-Z
Avia	Avilub Hydraulic PM 46	Lube-Tech	LTI AW 46
Avia	Avilub Hydraulic oil HLP 46	Mobil	DTE 25
Benz Oil	PTL 46	Mobil	DTE 25 Ultra
BP	Energol HLP-HM 46	Petro-Canada	Hydrex AW 46
Castrol	Hyspin AWS 46	Shell	Tellus S2 MX 46
Delta Specialty	DROP 380 EP	SRS	Wiolan HS 46
Eni	Precis HLP 46	Strub	Vulcolube HLP 46
EuroLub	HLP AF 46	Total	Azolla ZS 46
Fuchs	Renolin B 46 CP		

ISO
VG 46

ISO VG 68 (Range of application 0 °C to 95 °C):

Due to higher viscosity, the maximum temperature limit of the machine may be adjusted to 95 °C (90 °C standard).

Addinol	Hydraulic oil HLP 68	Gulf Oil	Harmony PM 68
Aral	Vitam GX 68	Lube-Tech	LTI AW 68
Avia	Avilub Hydraulic oil HLP 68	MAK	Hydrol HLP 68
Benz Oil	PTL 68	Mobil	DTE 26 Ultra
BP	Energol HLP-HM 68	Mobil	DTE 26
Castrol	Hyspin AWS 68	Shell	Tellus S2 MX 68
Eni	Precis HLP 68	SRS	Wiolan HS 68
EuroLub	HLP 68	Total	Azolla ZS 68
GS Caltex India	KIXX HYDRO HD 68		

ISO
VG 68

Approved hydraulic fluids for Putzmeister concrete pumps

Flame-retardant hydraulic oils

- The use of **flame-retardant hydraulic fluids is mandatory** for concrete pumps and in plant engineering when operating in underground mining.
- The flame-retardant hydraulic fluid must be tested and approved in accordance with the 7th Luxembourg Report and must at least meet the technical requirements of the VDMA 24317 standard sheet.
- An approval for the German hard coal mining industry must be presented. Only hydraulic fluids of the HFC group according to DIN 51502 of ISO VG 46 may be used.
- When using flame retardant hydraulic fluid type HFC, the maximum operating temperature must be limited to 60 °C.
- The use of FPM seals is critical. In individual cases, the seal manufacturer must be consulted. The same applies to the hydraulic hoses and paints used in the system.

Polymer solution HFC ISO VG 46:

Fuchs	Hydrotherm 46M
-------	----------------

HFC
ISO VG 46

Bio-degradable hydraulic fluids

- As a general rule, **only bio-degradable hydraulic fluids of category 4 (HEES – synthetic ester) of DIN ISO 15380** may be used for concrete pumps and industrial technologies. These hydraulic fluids must also meet the minimum requirements of this standard.
- Only fluids that meet the minimum requirements of **DIN ISO 15380 and the Putzmeister specifications and are confirmed in writing by the manufacturer** may be used.

ISO VG 32/46 (Range of application -10 °C to 80 °C):

Due to the sealing compatibility of the esters with the seals used, the maximum temperature limit of the machine must be set to 80 °C (standard 90 °C).

Motorex	ECOSYNT HEES 32
Panolin	HLP Synth E 32
Panolin	HLP Synth 32

Bechem	Hydrostar HEES 46 EEL
Fuchs	Plantosyn 46 HVI
Motorex	ECOSYNT HEES 46
Panolin	HLP Synth 46

Putzmeister Concrete Pumps GmbH

Max-Eyth-Straße 10 · 72631 Aichtal / Germany
Phone +49 (7127) 599-0 · Fax +49 (7127) 599-520
pmw@putzmeister.com · www.putzmeister.com

