



Hyspin XP 46

Hydraulic and machine tool oil

Description

Hyspin™ XP 46 is a high-performance anti-wear hydraulic oil meeting the performance requirements of DIN 51 524 Part 2 'Hydraulic Oils Type HLP' and of ISO 6743/4 'Hydraulic Oils Type HM'. The properties of its solvent-refined base oils are enhanced by carefully selected zinc-free additives to minimize machinery wear, corrosion, oxidation and foaming.

Application

Hyspin XP 46 offers superior anti-wear performance and is particularly suitable for highly stressed hydraulic systems requiring a Brugger value higher than 30 N/mm². It is a non-detergent type hydraulic fluid providing good water separation and corrosion protection characteristics. Hyspin XP 46 is also suitable for hydraulic systems of high performance machine tools. It is compatible with elastomer materials commonly used for static and dynamic seals, such as nitrile, silicone and fluorinated (e.g. Viton) polymers. Hyspin XP 46 meets the requirements of Schuler Mueller-Weingarten for their hydraulic presses.

Advantages

- Reliable, trouble-free operation in hydraulic systems, such as used on modern machine tools.
- Safely usable in machine tools for high performance machining operations.
- Recommended by Schuler Mueller-Weingarten for their hydraulic presses.

Typical Characteristics

Name	Method	Units	Hyspin XP 46
Density @ 15°C / 59°F	ISO 12185 / ASTM D4052	kg/m ³	873
Kinematic Viscosity @ 40°C / 104°F	ISO 3104 / ASTM D445	mm ² /s	48.8
Kinematic Viscosity @ 100°C / 212°F	ISO 3104 / ASTM D445	mm ² /s	7.0
Viscosity Index	ISO 2909 / ASTM D2270	-	100
Pour Point	ISO 3016 / ASTM D97	°C/°F	-27/-17
Acid Number	ISO 6619 / ASTM D664	mgKOH/g	0.27
Air Release @ 50°C / 122°F	ISO 9120 / ASTM D3427	min	7
Water Separation @ 54°C / 129°F (40/37/3)	ISO 6614 / ASTM D1401	min	15
Flash Point - open cup method	ISO 2592 / ASTM D92	°C/°F	228/442
Rust test - distilled water (24 hrs)	ISO 7120 / ASTM D665A	Rating	Pass
Copper corrosion (3 hrs@100°C/212°F)	ISO 2160 / ASTM D130	Rating	1b
Oxide Ash content	ISO 6244 / ASTM D482	%wt	<0.01
FZG Gear Scuffing test - A/8.3/90	ISO 14635-1	Failure Load Stage	12
Brugger test	DIN 51347	N/mm ²	43

Subject to usual manufacturing tolerances.

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Castrol Industrial, Technology Centre , Whitchurch Hill , Pangbourne , Reading , RG8 7QR , United Kingdom

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