

READILY BIODEGRADABLE ISO 32 HYDRAULIC FLUID

Description

RSC *EnviroLogic*[®] HF 32 hydraulic fluid is a biodegradable and non-hazardous ISO 32 viscosity grade hydraulic oil for use in general purpose hydraulic systems. It is based on unique biodegradable base oil technology and is a direct replacement for petroleum oil based hydraulic fluids of the same viscosity. RSC *EnviroLogic*[®] HF 32 is formulated with performance additive chemistry to exceed the requirements of petroleum hydraulic fluids. It is intended for use in applications with temperature requirements ranging from -30°F to 200°F and pressure requirements up to 5000 psi. It has reduced environmental impact in the event of a leak or spill, as it is readily biodegradable and non-sheening*.

It is an Environmentally Acceptable Lubricant (EAL) compliant with 2013 US EPA Vessel General Permit (VGP).

RSC *EnviroLogic*[®] HF series meets the requirements for various manufacturers. Visit our [website](#) or contact customer service for a full list of OEM approvals.

Property	Method	Requirements	Result
Kinematic Viscosity	D445		
At 40°C, cSt		28.8 – 35.2	32
At 100°C, cSt		5.0 min	7.0
Viscosity Index	D2270	90 min	189
Density (60°F), kg/m ³	D1298	Report	900
Density (60°F), lbs/gal	D4052	Report	7.52
API Gravity	D1298	Report	25.2
Pour Point, °C	D97	-15 max	-39
Flash Point (COC), °C	D92	185 min	205
Acid Number, mgKOH/g	D664	Report	0.30
Steel Pin Corrosion (24 hours, 100°C)	D665	Pass	
Deionized Water			Pass
Synthetic Salt Water			Pass
Copper Corrosion (3 hours, 100°C)	D130	2 max	1B
Foam Properties (after 10 minutes)	D892		
Sequence I, mL	Tendency-Stability	50-0 max	50-0
Sequence II, mL	Tendency-Stability	50-0 max	50-0
Sequence III, mL	Tendency-Stability	50-0 max	-0

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Demulse Properties (54°C) Oil / Water / Emulsion Minutes	D1401	40 / 37 / 3 30 max	40 / 40 / 0 30
Hydrolytic Stability Copper Weight Loss, mg/cm ³ Change in Acid Number, mgKOH/g Appearance of Copper Panel	D2619		0.09 0.09 1B
Four Ball Wear 75°C/ 1200 rpm/ 40 kg/ 1 Hr., mm	D4172		0.58
Vickers 35VQ25 Vane Pump**	35VQ25		Pass
Vickers V104C Vane Pump** Loss of ring, mg Total loss of vanes, mg	ISO 20763	120 max 30 max	1.9 4.8
Denison HF-6 Hybrid Pump** Total loss of pistons mg Total loss of vanes and pins, mg	T6H20C	300 max 15 max	186.7 1.4
FZG (A/8.3/90), fail load**	D5182		10
Biodegradability	D7373	>60	>60
Ecotoxicity Fathead minnow, 96h LC50, ppm Daphnia magna, 48h EC50, ppm Algae, 72h EC50, ppm	OECD 203 OECD 202 OECD 201	>100 >100 >100	>10,000 >100 >100
Elastomer SRE-NBR-1 (100°C 168 hours)	D471	Pass	Pass
Elastomer HNBR (100°C 168 hours)	D471	Pass	Pass
Elastomer FKM (100°C 168 hours)	DIN 1817	Pass	Pass
Compatibility with Select Hydraulic Fluids Biodegradable Competitor stored @ 100°F Biodegradable Competitor stored @ -5°F Petroleum Hydraulic Fluid stored @ 100°F Petroleum Hydraulic Fluid stored @ -5°F		Pass Pass Pass Pass	Pass Pass Pass Pass

*CFR40 Part 435B

**based on read across from RSC *EnviroLogic*® HF 46.

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Updated: 12/21/16

For more information about RSC Bio Solutions, visit us at rscbio.com or call +1 704.684.6100.



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