

DESCRIPTION

COOLANT LLO is a premium quality, organic, long life anti boil/anti-freeze coolant concentrate. COOLANT LLO is based on carboxylate technology and contains no silicates, borates, phosphates, nitrites, nitrates or amines. It is suitable for both automotive and heavy duty diesel engines.

COOLANT LLO contains 90% monoethylene glycol and a double inhibitor package ensuring ultimate corrosion protection and extended service life. Anti boil and anti freeze protection is equally afforded with a substantially higher rust and corrosion protection than competitor products. It is the ultimate in up to date coolant technology.

COOLANT LLO protects all metals found in cooling systems and gives excellent protection against cavitation's erosion and wet-sleeve liner pitting. It significantly increases the operating life of water pumps and exceeds corrosion performance levels required to meet Australian Standard AS2108.1-2004 and numerous performance specifications of OEM's including Ford & GMH. This coolant has been independently verified to all relevant ASTM's for automotive and heavy duty diesel use.

Provides maximum protection against 'hot spot' corrosion, common in aluminium cylinder heads.

COOLANT LLO has a service life of up to 5 years / 500,000kms* in automotive applications and up to 6 years / 600,000kms / 6,000hrs* in heavy duty diesels. This has obvious environmental advantages as a result of fewer coolant changes. There are no deleterious effects on hoses or gaskets. (* at 50/50 dilution ratio)

Has a proven record over many years with marine engines, mining equipment, taxi fleets, government departments, bus companies and several large fleet truck companies. Meets the phosphate-free requirements of European Manufacturers and the silicate-free requirements of Japanese Manufacturers.

TYPICAL PROPERTIES

Appearance:	Mobile Liquid (Available in Green, Red)
pH (50/50 vol/vol):	7.7 – 8.6
Glycol by Weight (gm/L):	501.5
Density:	1.1103 kg/L (Concentrate)
Freezing Point:	-36.2°C (50% by vol)
Boiling Point:	108.2°C (50% by vol) (at atmospheric conditions, boiling point up to 130°C with 105 kPa radiator cap)
Reserve Alkalinity (mL):	4.6
Hazard Class:	Hazardous Substance
DG Class:	Non Dangerous Goods
Glassware Corrosion Test:	Pass (ASTM D-1384)
Aluminium Corrosion Test:	Pass (ASTM D-4340)
Water Pump Cavitation Test:	Pass (ASTM D-2809)
Foaming Tendencies Test:	Pass (ASTM D-1881)
Cummins Anti Scale Test:	Pass (per AES 14603)

TEST RESULTS

ATSM D 1384 – GLASSWARE CORROSION TEST		
Metal	Allowable Weight Loss	Typical Weight Loss
Copper	10mg / coupon	0
Solder	30mg / coupon	0.05
Brass	10mg / coupon	0.01
Steel	10mg / coupon	0
Cats Iron	0.03	
Aluminium	0.14	
ASTM D 4340 – ALUMINIUM HEAT REJECTION TEST		
Allowable Weight Loss	Typical Result	
1.0mg / cm ² / week	-0.01	
ASTM D2809 – CAVITATION EROSION CORROSION		
Rating (minimum)	HDD Coolant	
8	8	

SPECIFICATIONS

AFNOR NFR 15-601	Ford ESE FM 97B18-C, M97-B44-A, WSS M97B44	Liebherr MD 1-36-130
AS 2108.1 : 2004 Type A	Freightliner Fleet Charge Powercool	Mack VCS Coolant
ASTM D3306, D4645, D4985, D4656	Fuso SAE J814-C	MAN 324 Type SNF
Alfa Romeo – Parafllu UP	Glysantin G05, G12++, G30, G33, G34	Mazda Ethylene Glycol Coolant, FL22
Audi Skoda VW G12, G13	GM 1825 M, 1899M, 6277M,	MB 325.0, 325.5, 326.0
BMW N 600 69.0	Hino Genuine LL Coolant	Mitsubishi LL Coolant, FUSO Genuine Diesel
British Leyland	Holden HN1897, HN2217, HN2043	Nissan NES 5059 LLC, M5509, EG LL Coolant
BS 6580	Honda Longlife Type 2 All Season	Peugeot-Procot 2000 Glysantin G33
Caterpillar 1 EO 535, Caterpillar ELC	Hyundai Ethylene Glycol Coolant	Porsche 000 043 203 78
Castrol Antifreeze NF, Caltex CX Engine Coolant	Isuzu (GM6277M, HN2217)	Renault EG Long Life Coolant
Citroen 9979.70 / 71 / 72	IVECO Parafllu 11, GM6038M, AC9-50	Saab Scania 6901
Cummins 3666132	Jaguar – WSS-M97B44-A	SAE J 1034, J 1941, JASO M 324,
Daewoo Ethylene Glycol Coolant	Japanese JIS K 2234	Subaru Super Long Life Coolant
DAF 742002/BTPS 606A/DCEA 615	Jenbacher	Toyota K2601G, K2601-1G
Daihatsu Ethylene Glycol Coolant	Kenworth Allcool	UD Long Life (Nissan)
Dodge Mopar HOAT	KIA	VW G12+, G12, G11, TL-774-C
Daimler Chrysler MS-7170, MS-976	Komatsu KES 07.892	Volvo, Volvo VCS
Dennis Eagle Fleetguard	Land Rover Ethylene Glycol Coolant	Waukesha 4-1974D
Fiat – Parafllu UP	Lexus Toyota Super LL Coolant	Western Star ASTM D6210

- Safety Data Sheet for this product can be obtained by visiting TriTech Lubricants Website www.tritechlubricants.com
- All Packages should be stored under cover to avoid water contamination and fading. Products should not be stored over 60°C