



PROFESSIONAL
HEAVY DUTY
**ANTIFREEZE/
COOLANT**

LOW SILICATE • PHOSPHATE & AMINE FREE • CAT EC-1 COMPATIBLE

PREMIUM
EXTENDED LIFE DIESEL

UP TO
6 YEARS / **960,000 KM** / **12,000**
/ **600,000 MILES** / **HOURS**

YOUR ENGINE DESERVES PREMIUM

A low silicate, nitrite based Hybrid technology offering an extended service life, Premium is designed for both light & heavy duty diesel engines.

FORMULATION FEATURES & BENEFITS:

Extended Service Life: Provides up to 960,000 km, 600,000 miles, 12,000 hours or 6 years under normal operating conditions provided the coolant is kept in good condition with nitrite levels in line with the engine's OEM's requirements.

Wide Application: It is designed for use in older model light and heavy duty diesel applications where an extended service interval is required and is recommended for use in on-road truck, off-road, farm, marine and stationary applications including, but not limited to, Caterpillar, Cummins, Detroit Diesel/MTU, GM Heavy Truck, Freightliner, PACCAR and Volvo Mack.

Proven Protection: Protects all coolant system metals including aluminum from erosion, corrosion and rust and provides excellent wet sleeve liner cavitation protection. Being CAT EC-1 compatible, it provides excellent heat transfer capabilities.

Field Compatibility: Recommended for use where an extended service interval is required, it does not require a charge of SCA or coolant extender at initial fill however is compatible with both. Its compatibility extends to use with other similarly formulated extended life low silicate, nitrite containing hybrid engine antifreeze/ coolants.

All Climate Performance: Provides protection against low temperature freeze-up or high temperature boil-over and suitable for all season use throughout winter and summer. When used as 50% diluted with high quality water, provides freeze protection down to -37°C/-34°F and boil-over protection up to +132°C/+269°F (with the use of a 100 kPa pressure cap). Available in Concentrate and 50-50 Pre-diluted formats.





PROFESSIONAL HEAVY DUTY ANTIFREEZE/COOLANT

PREMIUM Extended Life Diesel protects all coolant system metals and provides excellent wet sleeve liner cavitation protection. A low silicate, nitrite based hybrid technology offering an extended service life, Premium is designed for use in older model light and heavy duty diesel applications where an extended service interval is required. It is recommended for use in on-road truck, off-road, farm, marine and stationary applications including, but not limited to, Caterpillar, Cummins, Detroit Diesel/MTU, GM Heavy Truck, Freightliner, PACCAR and Volvo Mack.

Approvals & Specifications

Meets or exceeds performance requirements of:	Recommended and suitable for use with:		
<ul style="list-style-type: none"> • ASTM D3306, D4985, D6210, D7583 • AS/NZS 2108.1:1997 Type A • Cummins 3666132 • DDC 7SE 298, 93K217 • GB 29743-2013 • GM 1825M, 1899M • JIS K2234 • MTU MTL 5048 • TMC RP329B 	<ul style="list-style-type: none"> • CAT EC-1 • Cummins 14603 • Ford WSS-M97B51-A1 • MAN 324 • MB DBL 7700 	<ul style="list-style-type: none"> • Kenworth RO26-170-97 • Mack 014GS17004 • New Holland WSN-M97B18-D • PACCAR 	<ul style="list-style-type: none"> • Peterbilt 8502.002 • Scania 6901 • Volvo Heavy Truck

Typical Physical and Chemical Characteristics

CHARACTERISTIC	PERFORMANCE		TEST METHOD
	CONCENTRATE	50/50 PREMIX	
Appearance	Clear and transparent fluid	Clear and transparent fluid	
Colour	Red	Red	
pH	7.5 – 9.0	7.5 – 9.0	ASTM D1287
Reserve Alkalinity, ml	6.0 min.	3.0 min.	ASTM D1121
Specific gravity	1.110 – 1.140	1.075 - 1.090	ASTM D1122
Freeze point, °C/°F	60/40: -52/-61 70/30: -64/-83	-37/-34	ASTM D1177
Foam volume, ml	50 max.	50 max.	ASTM D1881
Foam break time, second	5 max.	5 max.	ASTM D1881
Chloride, ppm	< 25	< 25	ASTM D3634
Silicon	< 500	< 250	ASTM D6130
Phosphate	< 10	< 10	ASTM D5827
Nitrite	1500 min.	780 min.	ASTM D5827
Shelf Life, (Unopened, original container)	2 years	2 years	

These characteristics are typical of current production. While future production will conform to Recochem's specification, variations in these characteristics may occur.



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Dilution Chart

Protection against Freezing (°C/°F)	-37 / -34	-52 / -61	-64 / -83
Volume % Antifreeze	50	60	70
Volume % Deionized Water	50	40	30
**Protection against Boil-Over (°C/°F)	129 / 264	132 / 269	136 / 276

***with a 100 kilopascals (15 psi) radiator cap in good condition

Coolant concentrate must be diluted with water prior to use. Antifreeze/Coolant should not be used in concentrated form. A 50% dilution is generally recommended for the best balance of protection against freezing, corrosion and summer boil-over. For increased freeze protection in extremely cold areas, a 60% volume concentration can be used. Concentrations of greater than 70% by volume are not recommended. High quality soft, de-ionized or distilled water should always be used to dilute coolant concentrate.

Typical Coolant Performance Testing Results

METAL TYPE	ASTM D 1384 GLASSWARE CORROSION		ASTM D 2570 SIMULATED SERVICE	
	Test Results ¹	Max. Spec.	Test Results ¹	Max. Spec.
Copper	2	10	8	20
Solder	4	30	4	60
Brass	1	10	7	20
Steel	0	10	1	20
Cast Iron	-1	10	9	20
Aluminum	0	30	0	60

¹ Weight loss, except minus signs which indicate weight gain, per coupon in milligrams. Values are for coolant made from virgin ethylene glycol.

Typical Coolant Performance Testing Results (continued)

	Test Results ¹	Specification
ASTM D4340 Heat Rejecting Aluminum Corrosion (mg/cm²/week)	0.2	1.0 maximum
ASTM D2809 Aluminum Water Pump Cavitation - Erosion Corrosion Rating	8	8 minimum

¹ Weight loss per coupon in milligrams (average for 2 tests). Values are for coolant made from virgin ethylene glycol.



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Product Packaging Specifications

CANADA

Item No.	Formulation	Container Size	Case Pack	UPC	SCC
16-734	Concentrate	3.78 L	4	0-56438-16734-1	400-56438-16734-9
16-834	50-50 premixed	3.78 L	4	0-56438-16834-8	400-56438-16834-6
16-835	50-50 premixed	9.46 L	2	0-56438-16835-5	500-56438-16835-0

USA

Item No.	Formulation	Container Size	Case Pack	UPC	SCC
86-734	Concentrate	1 gal	4	0-56438-86734-0	400-56438-86734-8
86-834	50-50 pre-diluted	1 gal	4	0-56438-86834-7	400-56438-86834-5

DRUM/TOTE

Item No.	Formulation	Container Size	Case Pack	UPC	SCC
26-739	Concentrate	208 L / 55 gal	NA	0-56438-26739-3	NA
26-839	50-50 premixed	208 L / 55 gal	NA	0-56438-26839-0	NA
26-739-1000	Concentrate	1000 L / 264 gal	NA	0-56438-90789-3	NA
26-839-1000	50-50 premixed	1000 L / 264 gal	NA	0-56438-90790-9	NA

Warranty

When added as an initial fill and properly maintained in accordance with engine manufacturer's maintenance recommendation, this product will provide an in-service life of up to 600,000 miles/960,000 km, 12,000 hours or 6 years, whichever comes first. While deleterious effects are not expected to be significant, mixing with conventional coolants will result in a lower than expected lifetime.

Handling, Storage & Shelf Life

Product should be stored in original container or appropriate dedicated tank or vessel. Although temperature fluctuations will not adversely affect coolant, unused coolant should be stored at ambient conditions. Under typical conditions and when the container integrity is maintained, product can be stored for up to 2 years without any adverse effect on quality. Product should be agitated before use.

Health, Safety & Environment

For detailed information and recommended practices related to Health and Safety, please refer to the appropriate Safety Data Sheet (SDS). New or spent coolant is never to be disposed of into a septic system, storm sewer or onto the ground. Always dispose coolant in accordance with local, provincial/ state and federal guidelines. Contain any spilled coolant and contact appropriate authorities on appropriate clean-up instructions.

NOTICE: This product is shipped in compliance with applicable laws and regulations regarding classification, packaging, shipping and handling. The performance and physical property data described for this product are typical results not sale specifications, except where maximum or minimum is indicated. Refer to Safety Data Sheets for further information.

Because use conditions and applicable laws may differ from one location to another and may change with time, the customer is responsible for determining whether product and the information in this document are appropriate for their use and for ensuring that their workplace and disposal practices are in compliance with applicable laws and other governmental enactments. Recochem's warranty is limited to the claims of product meeting stated performance specifications. It is the responsibility of the end-user to determine product suitability as recommended in the owner's manual and to follow engine manufacturer's instructions.