



Perkins® Extended Life Coolant

The **difference** is in the **detail**

Better protection for your engine

Perkins® Extended Life Coolant (ELC) provides better protection for your engine and is more cost effective in the long-term than conventional coolant technology.

Years of research, knowledge and technical excellence have gone into the development of this advanced product, designed to give optimum performance and protection for your engine.

Developed, tested and approved by Perkins, ELC lasts at least twice as long as conventional coolants in Perkins industrial engines.

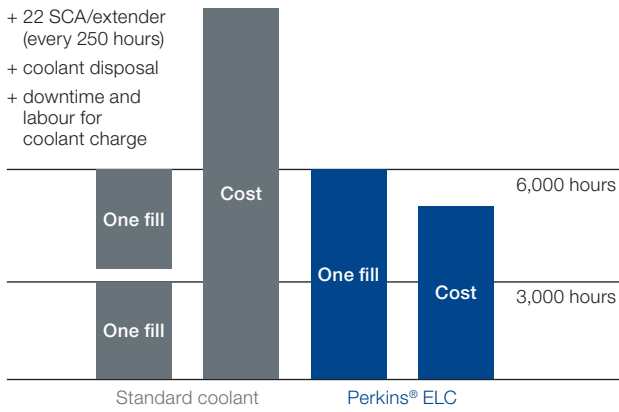
The pre-mixed formula is designed to be used for initial fill and top-up, and provides freeze protection down to -37°C.

It is supplied ready mixed as a 50/50 coolant to purified water mix, eliminating the need to source de-ionised water. It ensures the correct ratio of mix is maintained and it requires no supplemental coolant additives (SCAs).

The benefits of Perkins® Extended Life Coolant

- Reduces costs by up to 50% compared to standard coolants
- One coolant for entire gasoline and diesel fleet
- 50/50 Premix formula provides the correct antifreeze/water mix
- Ensures quality of water in mix
- Requires no SCAs
- Provides excellent protection for all cooling system metals including aluminium
- Prevents gel formation and reduces likelihood of hard water scale
- Contains no silicates, phosphates or borates
- Anti-boil properties reduce damage from steam
- Reduces disposal cost and is recyclable

Comparison of coolant costs



ELC (50/50 premixed) characteristics*

Appearance		Strawberry red
Specific gravity	ASTM D1122	1.110
pH (33% solution)	ASTM D1287	8.3
Reserve alkalinity	ASTM D1121	5.5
Ash content, % maximum	ASTM D1119	5.0
Boiling protection, 1 bar pressure cap		129°C
Freezing protection		-37°C
Nitrites		550 ppm
Molybdates		950 ppm
Silicate		0
Phosphate		0
Amine		0
Borate		0
Nitrates		0

*The values shown are typical values and should not be used as quality control parameters to either accept or reject product. Specifications are subject to change without notice.

Boiling protection with 15 psi (1 bar) radiator cap

50% ELC/50% water 129°C (265°F)

Freezing protection

50% ELC/50% water -37°C (-34°F)

Perkins ELC meets or exceeds the requirements of the following specifications and guidelines:

- ASTM D-3306
- ASTM D-6210
- SAE J1034
- Cat EC-1
- ELC is suitable for use in a wide range of industrial diesel engines.

How to use Perkins ELC

Mixing Perkins ELC with other antifreeze/coolants

Whilst Perkins ELC is compatible with conventional antifreeze/coolants we do not recommend you mix the two. Perkins ELC corrosion chemical system is different to that of conventional antifreeze/coolants. If they are mixed, do not add more than 10% of the conventional coolant. If you exceed 10% treat the system as if it contains conventional coolant or drain and flush the system and refill with Perkins ELC.

Cleaning your cooling system

When draining Perkins ELC from your cooling system, flush the system with clean water; no cleaning agents are required when you drain Perkins ELC at the change interval.

Converting to Perkins ELC

First clean your system with a commercial coolant cleaner at the change interval. After draining the cleaner, flush the system thoroughly with water three times to remove the cleaning agent. It's imperative to remove all the cleaning agent from the system.

Perkins ELC reduces coolant disposal costs

Disposal of used coolants can be difficult and expensive, and must be done in accordance with local or national laws. Perkins ELC reduces coolant disposal volume and costs by up to 50%.

Perkins ELC change interval

We recommend replacing Perkins ELC after 6,000 hours

How to get the best out of Perkins ELC

Perkins ELC uses patented carboxylate inhibitors which allow engines to run for 6,000 hours or three years before a coolant change is needed. These carboxylate inhibitors deplete very slowly meaning no SCAs are needed. When the cooling system is maintained properly and Perkins ELC (or equivalent) is used for top-up, there is no need to conduct routine testing for inhibitor levels.

Best maintenance practice

For best maintenance practice we recommend attention be given to: freeze point testing, proper top-up and visual inspection.

Freeze point testing

Cooling systems should be checked twice a year or at regular maintenance intervals to ensure proper water glycol concentration (i.e. freeze point). A 50/50 mixture is recommended and provides freeze protection down to -37°C as well as optimum corrosion protection.

Proper top-up

Use of Perkins ELC pre-diluted 50/50 for top-up ensures glycol/water concentrations remain balanced.

Visual inspection

At the same time as freeze point testing, a visual inspection of the coolant should be made. The coolant should be red/orange in colour and should appear free of dirt, debris, rust, and other contaminants. If the coolant appears to be significantly contaminated a fluid sample should be submitted for analysis

Fluid sample testing services for early problem detection

Protect your investment with Perkins Fluid Sample Testing Services, the detection and diagnostic tool for your equipment. Refer to the Perkins Fluids Operation and Maintenance Manual for the recommended intervals of Coolant Analysis.

Health and Safety

Under normal conditions of intended use, this product does not pose a risk to health. Read and understand the Material Safety Data Sheet (MSDS) before using this product. For a copy of the MSDS, talk to your distributor or visit www.perkins.com/msds