

Technical Data Sheet

SILVERHOOK EXTENDED LIFE COOLANT

Ref: SHBR1/SHBR2/SHBR4/SHBR55/SHBR7/SHBR8/SHBR9/SHBR9IBC

PRODUCTS

Silverhook Extended Life Coolant – SHBR1 (1L), SHBR2 (2L), SHBR4 (4.54L), SHBR55 (20L), SHBR7 (20L), SHBR8 (199L), SHBR9 (205L), SHBR9IBC (1000L)

PRODUCT DESCRIPTION

Silverhook Extended Life Coolant is an ethylene glycol based ready to use engine coolant, which uses Organic Acid Inhibitor Technology and is free from nitrites, amines, phosphates, borates and silicates. BTC Classification Type 4E. Fleet trials have shown that when used at the correct concentration coolants based on Organic Acid Inhibitor Technology continue to provide effective corrosion protection for up to 250,000 km for passenger cars and 500,000km in commercial vehicles. It is recommended that the coolant is replaced when the above mileages have been reached or after 5 years, whichever is the sooner. Unlike traditional coolants which employ inorganic inhibitors, it has excellent hard water stability and very low inhibitor depletion rates. Includes molybdate to aid corrosion inhibition and effectively inhibit damage caused by cavitation

TYPICAL PHYSICAL PROPERTIES

Parameter		Method	Silverhook Extended Life	ASTM D3306
Appearance		Visual	Clear red – pink	Not Specified
Specific Gravity 15/15°C		ASTM D 4052	1.074	1.06 – 1.110
Equilibrium Reflux Boiling Point °C		ASTM D 1120	169	163 min
Freezing Point °C		ASTM D 1177	-37	-37 max
Freezing Point °C (50% Dilution by vol.)		ASTM D 1177	-12	
pH (50% vol.)		ASTM D 1287	8.2	7.5 – 11.0
Reserve Alkalinity 0.1N HCl		ASTM D 1121	5.6	Report
Foaming Properties	Vol. (ml)	ASTM D1881	50	150 max
	Break (s)		1	5 max

Freeze Protection

	Concentration by Volume %		
	50		100
Specific Gravity @20°C	1.030		1.074
Freeze Protection * °C	-12		-37

**Average of freezing point and pour point*

SPECIFICATIONS

Silverhook Extended Life Coolant is made from concentrate that exceeds the requirements of most European and International Standards including:

ASTM D3306
 ASTM D 4985
 SAE J 1034
 BS 6580 (1992) AFNOR
 NF R15-601 * FFV Heft
 R443
 CUNA NC 956-16
 UNE 26361 - 88
 JIS K 2234 *
 NATO S 759

(with the exception of reserve alkalinity)*

It also meets the requirements of the following OEM specifications:

Chrysler MS 9176
 Cummins 85T8-2 & 90T8-4 & CES14603
 Ford ESE M97B49-A, WSS-M97B44-D & ESD M97 B49-A GM
 1899 M, US 6277 M & OPEL GM QL130100
 John Deere H 24 B1 & C1
 Leyland Trucks LTS 22 AF 10
 Mack 014GS 17004
 MAN 248, 324 (SNF) & B&W D 36 5600
 Mercedes MB 325.3
 Renault 41-01-001
 VAG TL 774F G12, G12+, G13
 VOLVO VCS

Corrosion Protection

ASTM D1384 Glassware Corrosion Test Results.

	Weight Loss mg/ Coupon					
	Copper	Solder	Brass	Steel	Cast Iron	Aluminium
ASTM D3306 (max)	10	30	10	10	10	30
Silverhook Extended Life	1.0	1.5	1.6	1.1	2.0	1.5

ASTM D 4340 Corrosion of Aluminium under heat rejecting conditions

	Weight Loss mg/ cm ² /week
ASTM D 3306 (max)	1.0
Silverhook Extended Life	0.5

ASTM D2570 Simulated Service Corrosion Test

	Weight Loss mg/ Coupon					
	Copper	Solder	Brass	Steel	Cast Iron	Aluminium
ASTM D2570 (max)	20	60	20	20	20	60
Silverhook Extended Life	2	3	2	2	1	5

ASTM D2809 Cavitation Corrosion Characteristics of Aluminium Pumps

	Visual Rating
ASTM D 2809 (min)	8
Silverhook Extended Life	9

COMPATIBILITY WITH OTHER COMPONENTS

Corrosion Protection

Silverhook Extended Life Coolant is compatible with other ethylene glycol based coolants and can be safely mixed with them. As Silverhook Extended Life Antifreeze/Coolant employs an inhibitor technology that is significantly different from that used in traditional coolants, we recommend that prior to using Silverhook Extended Life Coolant in systems previously filled with traditional coolant, that the cooling system is drained and flushed with clean water before filling with Silverhook Extended Life Coolant.

The content of this data sheet is given in good faith but without warranty.