



DEX-COOL™ EXTENDED LIFE ANTIFREEZE AND SUMMER COOLANT

PRODUCT DESCRIPTION

PENNZOIL® DEX-COOL™ EXTENDED LIFE ANTIFREEZE AND SUMMER COOLANT is an extended life antifreeze/coolant formula that enables a five-year or 150,000 mile service change interval. A General Motors- (GM) approved formulation, PENNZOIL® DEX-COOL™ EXTENDED LIFE ANTIFREEZE AND SUMMER COOLANT is equivalent to the factory-filled coolant for most GM cars manufactured after July 1995 and for all 1996 and later models, including Saturns manufactured after May, 1996. Geo, the GM-Japanese joint venture, does not utilize this coolant at this time.

PENNZOIL® DEX-COOL™ EXTENDED LIFE ANTIFREEZE AND SUMMER COOLANT is a reconfiguration of conventional coolant. It is a silicate-free, phosphate-free, ethylene glycol-based antifreeze/coolant with a patented carboxylate inhibitor formula that extends the standard coolant system service interval from two years/30,000 miles (conventional antifreeze) to five years/150,000 miles when properly installed.

PENNZOIL® DEX-COOL™ EXTENDED LIFE ANTIFREEZE AND SUMMER COOLANT's unique orange color is designed to indicate its presence in the vehicle's coolant system and to clearly distinguish it from conventional coolant that is green in color.

APPLICATION

PENNZOIL® DEX-COOL™ EXTENDED LIFE ANTIFREEZE AND SUMMER COOLANT has been approved for use in all 1995 and 1996 GM cars and light-duty trucks and in most 1994 models. Beginning with the 1996 GM model year, DEX-COOL™ technology is specified for warranty maintenance in GM vehicle owner's manuals.

PENNZOIL® DEX-COOL™ EXTENDED LIFE ANTIFREEZE AND SUMMER COOLANT can be used in Saturns manufactured after May, 1996. Geo does NOT utilize this antifreeze at this time.

PENNZOIL® DEX-COOL™ EXTENDED LIFE ANTIFREEZE AND SUMMER COOLANT application is clearly distinct. *A coolant system utilizing this product should not be contaminated with conventional coolants.*

The formulation of PENNZOIL® DEX-COOL™ EXTENDED LIFE ANTIFREEZE AND SUMMER COOLANT has met GM's qualification of 16.1 million miles for four-, six-, and eight-cylinder gasoline and diesel engines.

PENNZOIL® DEX-COOL™ EXTENDED LIFE ANTIFREEZE AND SUMMER COOLANT can be safely used as top-off with other conventional coolant products. However, when conventional antifreeze/coolants are added to PENNZOIL® DEX-COOL™ EXTENDED LIFE ANTIFREEZE AND SUMMER COOLANT, its long life benefits may be diminished.

BENEFITS

- Meets GM 6277M Long Life Coolant specification
- Passes ASTM D-3306 requirements for automotive service
- Passes ASTM D-4985 requirements for heavy duty diesel service
- Passes ASTM D-4340 requirements for hot surface aluminum protection
- Excellent protection in high operating temperatures
- Improved water pump life - reduced water pump seal wear
- Effective long-term corrosion protection for aluminum, brass, cast iron, steel, solder and copper
- Long shelf life (five years) - less "spent" coolant disposal - less environmental impact
- Long service interval - five years/150,000 miles
- Nitrate-, nitrite-, phosphate-, silicate-, borate- and amine-free formulation

**TYPICAL PHYSICAL AND CHEMICAL PROPERTIES
 PENNZOIL® DEX-COOL™ EXTENDED LIFE ANTIFREEZE AND SUMMER COOLANT**

TEST	METHOD	TYPICAL RESULTS
Specific Gravity, 60/60°F	ASTM D-1122	1.130
pH (50% Solution)	ASTM D-1287	8.3
Freezing Pt., 50% Solution °C(°F)	ASTM D-1177	-37(-34)
Reserve Alkalinity	ASTM D-1121	6.0
Boiling Protection, °C(°F) 50% Solution, 15 lb pressure cap		129.4(265)
Freezing Protection, °C(°F)		
40% Solution		-24.4(-12)
50% Solution		-37.2(-34)
60% Solution		-52.2(-62)
Silicate, max. % wt.		None
Color		Orange
Material Number		
6/1 Gallon Containers		8562

Cooling System Capacity In Quarts

Quarts of PENNZOIL® DEX-COOL™ Extended Life Antifreeze and Summer Coolant Required for protection to temperature (°F) shown

	4	5	6	7	8	9
8	-34	-67				
9	-21	-50	-82			
10	-12	-34	-62	-84		
11		-23	-47	-76		
12		-15	-34	-57	-82	
13			-25	-45	-66	-84
14			-18	-34	-54	-76
15			-12	-26	-43	-62

For cooling systems larger than shown, double the quantity required for a system one-half as large.
 Reverse procedure for systems smaller than shown.