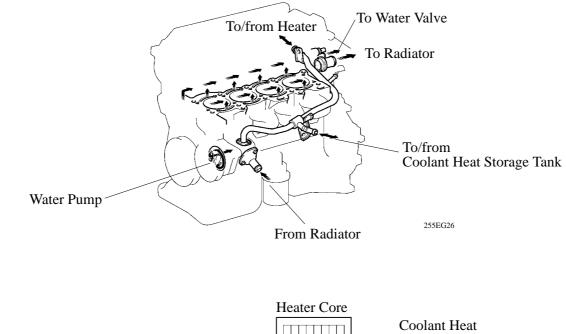
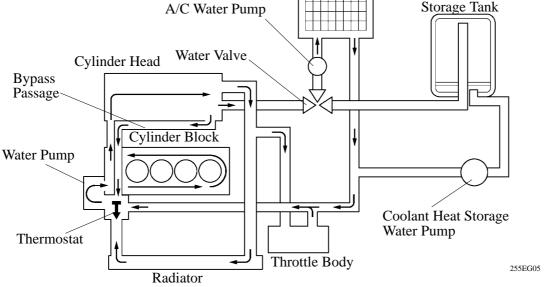
# ■COOLING SYSTEM

## 1. General

- Along with the adoption of the coolant heat storage system on the '04 Prius, a coolant heat storage tank, coolant heat storage water pump, and a water valve have been provided in the cooling system piping. For details on the coolant heat storage system control, see page EG-22.
- The radiator for the engine and the radiator for the inverter have been integrated to minimize the space they occupy in the engine compartment. Furthermore, the A/C condenser has been integrated with the radiator through the use of brackets.
- The radiator reservoir tank and the fan shroud have been integrated.
- The TOYOTA genuine super long life coolant (SLLC) has been adopted. As a result, the maintenance interval has been extended.





#### **ENGINE** — 1NZ-FXE ENGINE

- SLLC is pre-mixed (50% coolant and 50% distilled water), so no dilution is needed when adding or replacing SLLC in the vehicle.
- If LLC is mixed with SLLC, the interval for LLC (every 25,000 miles / 40,000 km or 24 months) should be used.
- You can also apply the new maintenance interval (every 50,000 miles/ 80,000 km) to vehicles initially filled with LLC (red-colored), if you use SLLC (pink-colored) for the engine coolant change.

### ► Specifications ◀

Model			'04 Prius	'03 Prius
Engine Coolant	Capacity liters (US qts, Imp. qts)		8.6 (9.1, 7.6)	4.9 (5.2, 4.3)
	Туре		TOYOTA Genuine Super Long Life Coolant (SLLC) or Equivalent	TOYOTA Genuine Long Life Coolant (LLC) or Equivalent
	Color		Pink	Red
	Maintenance Intervals	First Time	100,000 mile (160,000 km)	U.S.A. Model: Every 30,000 miles or 24 months whichever come first Canada Model: Every 32,000 km or 24 months whichever come first
		Subsequent	Every 50,000 mile (80,000 km)	
Thermostat	Opening Temperature °C (°F)		80 - 84 (176 - 183)	$\leftarrow$

## Service Tip

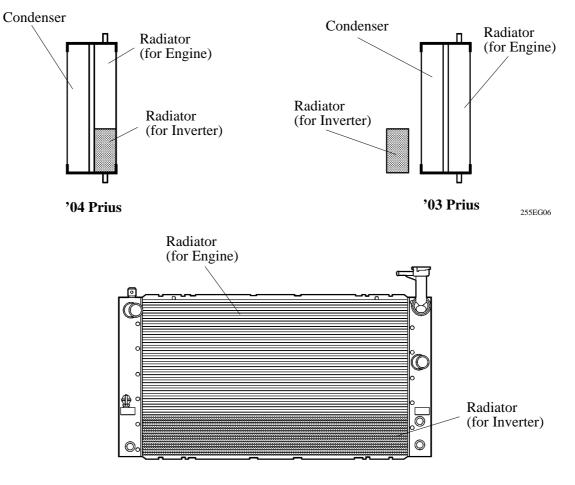
The engine coolant in the coolant heat storage tank is kept hot even if the engine and the radiator are cold. To verify the thermal insulation of the coolant heat storage tank and abnormality in the coolant heat storage water pump, the ECM may cause the coolant heat storage water pump to actuate even when the power switch is OFF (IG-OFF). Therefore, the user should never attempt to change the engine coolant. Because of the reason above, the engine coolant change method has been changed on the '04 Prius. An outline of the change as follow:

- Remove the coolant heat storage water pump connector prior to replacement, in order to prevent the pump from activating when draining the engine coolant.
- Drain the engine coolant from the coolant heat storage tank.
- When refilling engine coolant, operate the coolant heat storage water pump to help the inflow of the coolant into the coolant heat storage tank.
- Due to the aforementioned function of the ECM, the ECM may operate the coolant heat storage water pump while the engine coolant is being changed. If this occurs, the ECM will determine that a failure has occurred in the coolant heat storage system, it will record DTC P1151 or P2601 in its memory, and illuminate the MIL (Malfunction Indicator Lamp). However, this condition is not actual system fail. If the MIL has illuminated, make sure to delete the DTC after changing the engine coolant. For detailed information of changing the engine coolant, refer to the 2004 Prius Repair Manual (Pub.

No. RM1075U).

# 2. Radiator

On the '03 Prius, the cooling module integrates the radiator for the engine and the A/C condenser. Instead, the '04 Prius has adopted a cooling module in which a radiator (which integrates the radiators for both the engine and the inverter) is integrated with an A/C condenser through the use of brackets. As a result, the space they occupy in the engine compartment has been minimized.



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