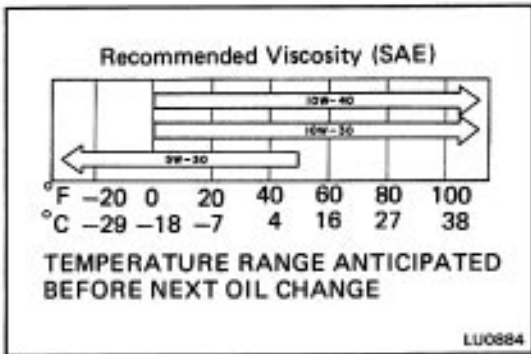


TROUBLESHOOTING

| Problem | Possible cause | Remedy | Page |
|-------------------|--|---|--|
| Oil leakage | Cylinder head, cylinder block or oil pump body damaged or cracked Oil seal faulty Gasket faulty | Repair as necessary Replace oil seal Replace gasket | EM-148 |
| Low oil pressure | Oil leakage Relief valve faulty Oil pump faulty Poor quality engine oil Crankshaft bearing faulty Connecting rod bearing faulty Oil filter clogged | Repair as necessary Repair relief valve Repair oil pump Replace engine oil Replace bearing Replace bearing Replace oil filter | LU-12, LU-14 LU-9 LU-6 EM-137 EM-134 LU-7 |
| High oil pressure | Relief valve faulty | Repair relief valve | LU-12, LU-14 |



OIL PRESSURE CHECK

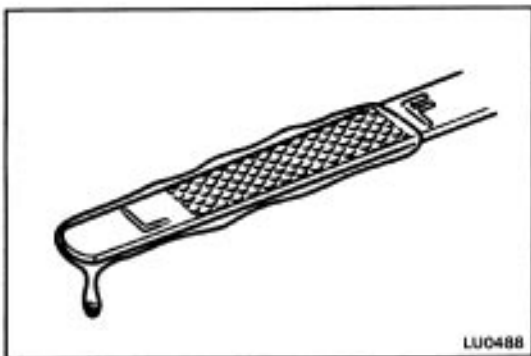
1. CHECK ENGINE OIL QUALITY

Check the oil for deterioration, entry of water, discoloring or thinning.

If the quality is poor, replace the oil.

Oil grade : API grade SG.

Determine the viscosity for your climate. Recommended viscosity is as shown. Using multigrade and fuel-efficient engine oil is recommended.



2. CHECK ENGINE OIL LEVEL

The oil level should be between the "L" and "F" marks on the dipstick.

If low, check for leakage and add oil up to the "F" mark.

3. (with A/C)

REMOVE A/C, DRIVE BELT, COMPRESSOR AND BRACKET

4. (4A-GE w/ PS)

REMOVE PS, DRIVE BELT, IDLER PULLEY AND PUMP BRACKET

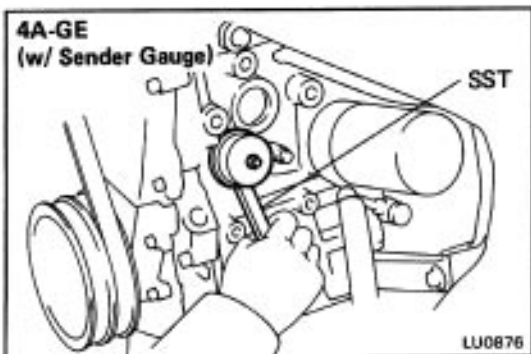
5. (4A-FE)

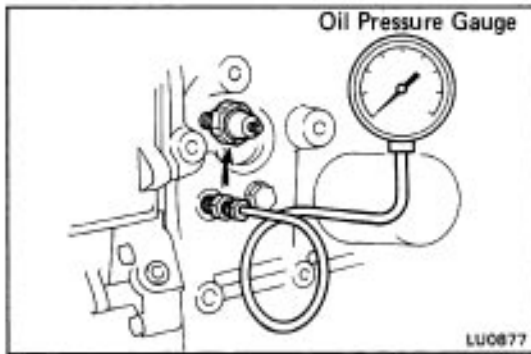
REMOVE DRIVE BELT, ALTERNATOR AND BRACKET

6. REMOVE OIL PRESSURE SWITCH OR SENDER GAUGE AND INSTALL OIL PRESSURE GAUGE

HINT: Use SST if sender gauge is installed.

SST 09027-12140





7. (4A-FE)

INSTALL BRACKET, ALTERNATOR AND DRIVE BELT

8. START ENGINE

Start the engine and warm it up to normal operating temperature.

9. MEASURE OIL PRESSURE

Oil pressure:

At idle 0.3 kg/cm² (4.3 psi, 29 kPa) or more

At 3,000 rpm 2.5 – 5.0 kg/cm²

(36 – 71 psi, 245 – 490 kPa)

10. REMOVE OIL PRESSURE GAUGE AND REINSTALL OIL PRESSURE SWITCH OR SENDER GAUGE

Apply adhesive to two or three threads.

Adhesive: Pant No.08833-00080, THREE BOND 1344, LOCTITE 242 or equivalent

11. (4A-GE w/ PS)

REINSTALL PS PUMP BRACKET, IDLER PULLEY AND DRIVE BELT

72. (with A/C)

REINSTALL A/C COMPRESSOR BRACKET, COMPRESSOR AND DRIVE BELT

13. ADJUST DRIVE BELTS

4A-FE (See page [EM-40](#))

4A-GE (See page [EM-52](#))

74. START ENGINE AND CHECK FOR LEAKS

REPLACEMENT OF ENGINE OIL AND OIL FILTER

CAUTION:

- Prolonged and repeated contact with mineral oil will result in the removal of natural fats from the skin, leading to dryness, irritation and dermatitis. In addition, used engine oil contains potentially harmful contaminants which may cause skin cancer. Adequate means of skin protection and washing facilities should be provided.
- Care should be taken, therefore, when changing engine oil, to minimize the frequency and length of time your skin is exposed to used engine oil. Protective clothing and gloves, that cannot be penetrated by oil, should be worn. The skin should be thoroughly washed with soap and water, or use waterless hand cleaner, to remove any used engine oil. Do not use gasoline, thinners, or solvents.
- In order to preserve the environment, used oil must be disposed of only at designated disposal sites.

1. DRAIN ENGINE OIL

- Remove the oil filler cap.
- Remove the oil drain plug and drain the oil into a container.

