1995 Ford Pickup F350

ENGINE OVERHAUL 1995 FORD MOTOR CO. ENGINES 5.0L V8

ENGINE OVERHAUL

1995 FORD MOTOR CO. ENGINES 5.0L V8

ENGINE IDENTIFICATION

NOTE:

Unless otherwise specified, references to Pickup include the F350 Super Duty commercial chassis. NOTE: For engine repair procedures not covered in this article, see ENGINE OVERHAUL PROCEDURES - GENERAL INFORMATION article in the GENERAL INFORMATION section.

Engine may be identified by eighth character of Vehicle Identification Number (VIN). VIN plate is attached to upper left corner of instrument panel, near windshield. VIN is also found on the Safety Compliance Certification Label on left door or left door pillar.

VIN ENGINE CODES

Engine	Code
5.0L PFI	N

ADJUSTMENTS

VALVE CLEARANCE ADJUSTMENT

Hydraulic valve lifters automatically adjust stem-to-rocker arm clearance. Repeated valve and/or valve seat refacing will change stem-to-rocker arm clearance. To compensate for excessive changes in stem-to-rocker arm clearance, a longer or shorter push rod must be installed. Push rods are available in .060" (1.52 mm) longer or shorter than original.

Use following procedure to adjust valve clearance:

1. Using a remote starter (ignition off), rotate crankshaft until No. 1 piston is at TDC of compression stroke. Reference mark "A" indicates TDC. With No. 1 piston at TDC, mark references "B" and "C", 90 degrees apart. See Fig. 1.

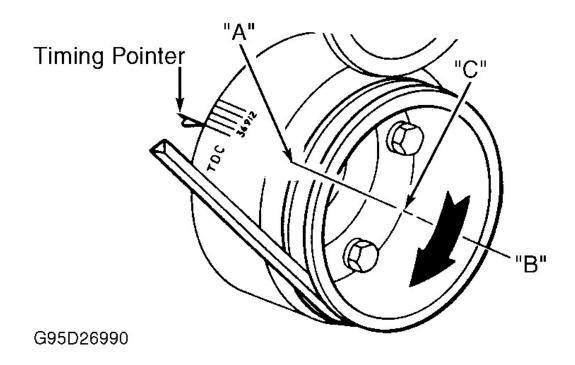


Fig. 1: Identifying Crankshaft Positions For Valve Adjustment Courtesy of FORD MOTOR CO.

- 2. Slowly bleed lifter down (until bottomed) using Tappet Bleed Down Wrench (T71P-6513-B) on appropriate cylinder. See VALVE CLEARANCE ADJUSTMENT table. With lifter plunger bottomed, use a feeler gauge to measure clearance between rocker arm and valve stem tip. See <u>VALVE LIFTERS</u> table under ENGINE SPECIFICATIONS.
- 3. If clearance is insufficient, install .060" (1.52 mm) undersize push rod. If clearance is excessive, install .060" (1.52 mm) oversize push rod. Check and/or adjust valve clearance on proper cylinders in relation to crankshaft position. See VALVE CLEARANCE ADJUSTMENT table.

VALVE CLEARANCE ADJUSTMENT

Crankshaft Position	Check Intake No.	Check Exhaust No.
"A"	1, 7, 8	1, 4, 5
"B"	4, 5	2, 6
"C"	2, 3, 6	3, 7, 8

CAUTION: When battery is disconnected, vehicle computer and memory systems may lose memory data. Driveability problems may exist until computer systems have completed a relearn cycle. See COMPUTER RELEARN PROCEDURES article in GENERAL INFORMATION before disconnecting battery.

1995 Ford Pickup F350

ENGINE OVERHAUL 1995 FORD MOTOR CO. ENGINES 5.0L V8

REMOVAL & INSTALLATION

FUEL PRESSURE RELEASE

Remove fuel cap to release fuel tank pressure. Remove relief valve cap. Relief valve is located on fuel rail. Connect fuel pressure gauge to relief valve. Release fuel into a suitable container.

COOLING SYSTEM BLEEDING

WARNING: When engine is operating, NEVER remove radiator cap under any conditions. Failure to follow instruction could damage cooling system or engine, or cause personal injury. Always wrap protective material around radiator cap to avoid injury from hot steam or hot coolant.

- 1. Fill cooling system with 50/50 mixture of water and coolant. Pause several minutes for circulation. Fill radiator to filler neck seat. Disconnect heater outlet hose at water pump to bleed off trapped air. Fill radiator until coolant begins to escape.
- 2. Connect heater outlet hose. Fill radiator until coolant is between cap seal in filler neck to 1.5" (38 mm) below cap seal. Install radiator cap. Start engine and allow to warm up. Shut engine off. Allow engine to cool. Remove radiator cap and check coolant level. Top off radiator coolant as necessary.

ENGINE

NOTE: Engine removal procedure is for engine only, without transmission attached.

Removal (Bronco & Pickup)

- 1. Drain cooling system and crankcase. Mark hood hinges and remove hood. Remove battery and ground cables. Disconnect EGR tube (if equipped). On 5.0L, remove air intake hoses, PCV tube and carbon canister hose.
- 2. Disconnect radiator hoses. Disconnect transmission cooler lines (if equipped). Disconnect oil cooler lines at oil filter adapter (if equipped).
- 3. Disconnect power steering hoses and air injection hoses. Discharge A/C system using approved refrigerant recovery/recycling equipment (if equipped). Disconnect hoses at compressor and remove A/C condenser. Remove fan shroud, spacer, pulley and radiator. Remove generator.
- 4. Remove brackets for air injection pump, power steering pump, generator and A/C compressor. Disconnect oil pressure sending unit wire. Release fuel pressure. See <u>FUEL PRESSURE RELEASE</u>. Using Spring Lock Coupling Remover (T81P-19623-G1 for 3/8" line or T81P-19623-G2 for 1/2" line), disconnect fuel supply and return lines. See <u>Fig. 2</u>.

1995 Ford Pickup F350

ENGINE OVERHAUL 1995 FORD MOTOR CO. ENGINES 5.0L V8

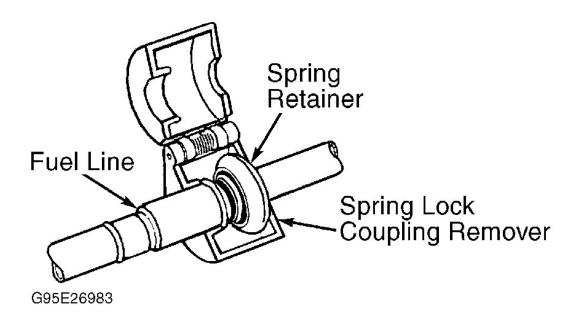


Fig. 2: Disconnecting Fuel Lines Courtesy of FORD MOTOR CO.

- 5. Disconnect accelerator cable, transmission shift rod and speed control linkages from throttle body. Remove throttle bracket from upper intake manifold, and set aside with cables attached. Disconnect vacuum lines, carbon canister hose, heater hoses and electrical wiring from engine. Disconnect primary wire at coil and brake booster hose at engine.
- 6. Remove engine-to-transmission upper bolts. Raise front of vehicle. Remove starter. Separate exhaust pipes from manifolds. Disconnect engine mounts from brackets on frame. On A/T models, remove torque converter inspection plate and flexplate-to-torque converter bolts.
- 7. On all models, remove remaining bellhousing-to-engine bolts. Lower vehicle and support transmission. Attach engine hoist and carefully separate engine from transmission. Carefully lift engine from vehicle without damaging rear cover plate.

Installation

To install, reverse removal procedure. Tighten bolts to specification. See <u>TORQUE SPECIFICATIONS</u>. Check and top off all engine fluids. Fill and bleed air from cooling system. See, in this article, <u>COOLING SYSTEM BLEEDING</u>.

WARNING: Disable air bag system before removing or disconnecting components.

To disable air bag system, see AIR BAG RESTRAINT article in

ACCESSORIES & EQUIPMENT.

Removal (Van)