CERTAIN 2005-2006 F-150 AND MARK LT VEHICLES EQUIPPED WITH 5.4L 3-VALVE ENGINES — BRAKE BOOSTER VACUUM HOSE REPLACEMENT

OVERVIEW

This program involves replacing the brake booster vacuum hose at the rear of the engine intake manifold.

SERVICE PROCEDURE

Brake Booster Vacuum Hose Removal

- 1. Lift the vehicle.
- 2. **4x4 only**, index mark the front driveshaft. Remove the 4 front driveshaft bolts and position the front driveshaft aside. See Figure 1.

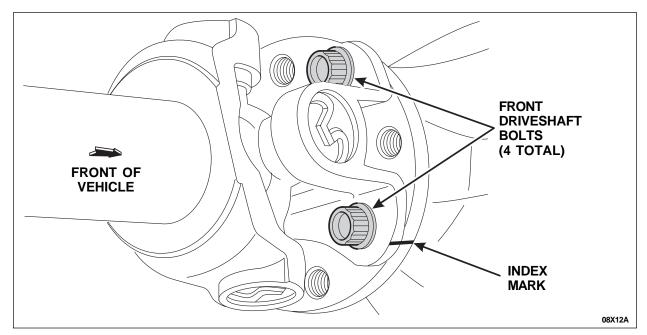


FIGURE 1

3. Remove the 2 shifter cable bracket bolts and disconnect the shifter cable and position the bracket aside. See Figure 2.

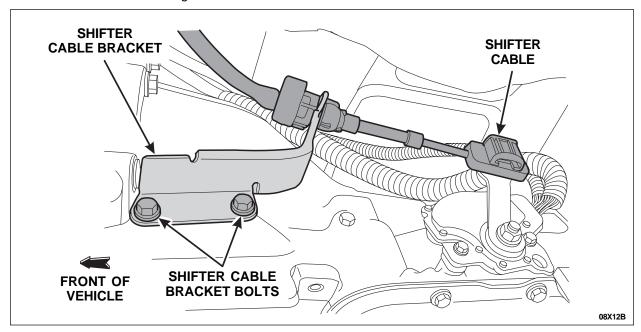


FIGURE 2

NOTE: Leave the transmission electrical harness clipped to the fuel line bracket.

4. Unclip the fuel lines from the fuel line bracket and remove the fuel line bracket bolt from the transmission bell housing. See Figure 3.



FIGURE 3

5. If present, disconnect the oxygen sensor wire harness retainer. See Figure 4.

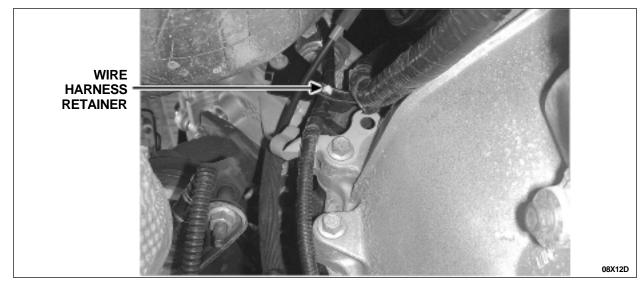


FIGURE 4

6. To improve access to the brake booster vacuum hose, position the fuel lines and transmission wiring harness on top of the transmission. Hold the fuel lines in the raised position by using a block of wood or equivalent. See Figure 5.

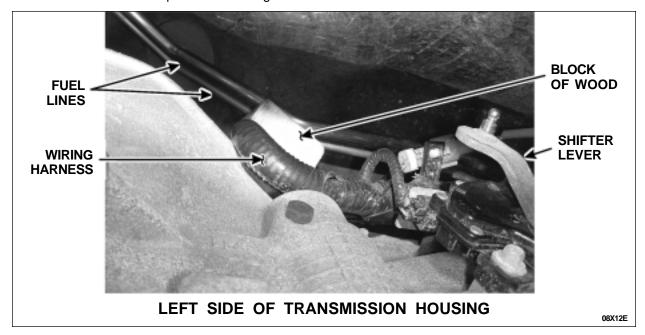


FIGURE 5

CAUTION: To avoid breaking the intake manifold fitting, do not use a pry bar to remove the <u>short end</u> of the brake booster vacuum hose from the intake manifold. See Figure 6. A pry bar may be used to remove the <u>long end</u> of the brake booster vacuum hose that is attached to the brake booster vacuum stand-pipe. See Figure 7.

7. Remove the brake booster vacuum hose from the intake manifold. See Figure 6.

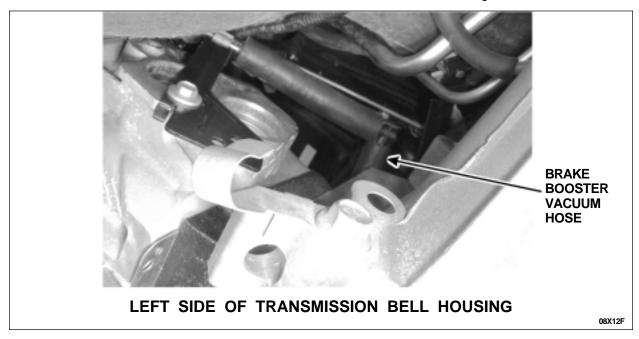


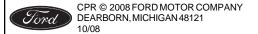
FIGURE 6

8. Using a pry bar or other suitable tool, pry the brake booster vacuum hose off the brake booster vacuum stand-pipe. See Figure 7.

NOTE: Make sure that the brake booster vacuum stand-pipe remains clipped into the retainer during removal of the brake booster vacuum hose.



FIGURE 7



Brake Booster Vacuum Hose Installation

 Make sure that the brake booster vacuum stand-pipe remains clipped into the retainer during installation of the brake booster vacuum hose. See Figure 8.

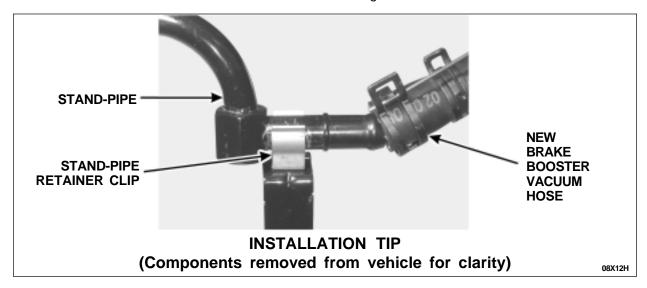


FIGURE 8

NOTE: Water is the only approved hose lubricant. **Do not use any other lubricants such as silicone or soap**.

- 2. Install the long end of the brake booster vacuum hose onto the stand-pipe.
 - **INSTALLATION TIP:** When installing the *new* brake booster vacuum hose, position the hose at an angle to the stand-pipe fitting. Then, slowly twist the hose assembly as you push it onto the stand-pipe fitting. See figure 8.
- 3. Install the short end of the brake booster vacuum hose on the intake manifold vacuum nipple and release the hose clamps. See Figure 9.

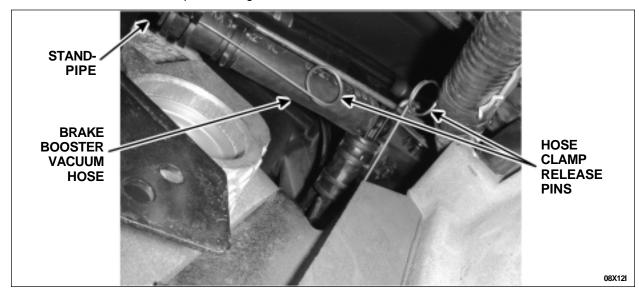


FIGURE 9

- 4. Remove the block of wood and reposition the wiring harness and fuel lines.
- 5. Install the fuel line bracket and transmission bell housing bolt. Torque the bolt to 48 Nm. See Figure 3.
- 6. If present, attach the oxygen sensor wire harness retainer. See Figure 4.
- 7. Align the fuel lines to the fuel line bracket retainers and engage the fuel lines into the bracket clips. See Figure 3.
- 8. Position and install the 2 shifter cable bolts and attach the cable. Torque the bolts to 25 Nm. See Figure 2.
- NOTE: Coat the threads of the original driveshaft bolts with blue Threadlock and Sealer TA-25 (specification WSK-M2G351-A5).
 - 9. **4x4 only**, align the driveshaft index marks and install the 4 front driveshaft bolts. Torque the bolts to 103 Nm. See Figure 1.