# 6LS-2 Harness for EFI Vehicles PN 88862

**IMPORTANT:** Read instuctions thoroughly before attempting installation.

## Parts Included:

- 1 Cam Sensor Harness
- 1 Crank Sensor Harness
- 1 Map Sensor Harness
- 2 Coil Simulators

- 2 Coil Simulator Clips
- 1 Crank Sensor Tool Body
- 1 Crank Sensor Tool Blade
- 2 6-32 x .250 Screws

**WARNING:** Before installing the 6LS-2 Harness, disconnect the battery cables. When disconnecting the battery cables, always remove the Negative (-) cable first and install it last.

This Harness Kit allows the installation of the MSD 6LS-2 Ignition Controller on LS2 or LS7 based vehicles equipped with factory EFI systems. The Harness connects inline to factory sensors and provides the 12 volt supply and ground of the Controller.

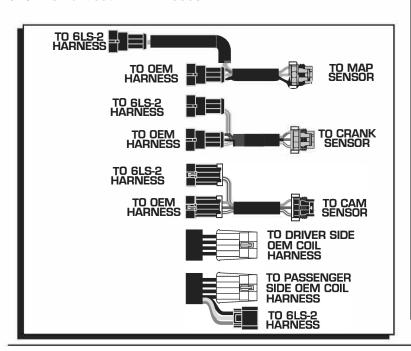
# **COIL CONNECTIONS**

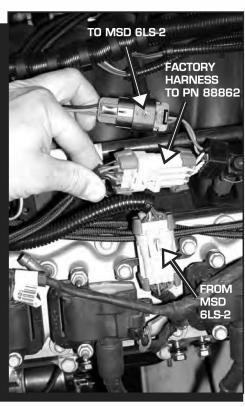
**Note:** One of the Coil Simulators has a 3-Pin pigtail. This assembly connects to the passenger side coil bank.

Disconnect the factory connector from the coil harness (Figure 1). Connect the MSD Coil Simulators inline with the factory harness. Use the supplied clips to secure the Simulators.

Connect the 3-pin pigtail to the MSD 6LS-2.

Note: The 3-pin harness with the ring lug terminal, part of the MSD 6LS-2 is not used with PN 88862.





# **MAP SENSOR**

Disconnect the MAP sensor harness and install the MSD Harness inline. The Gray Connector of the Harness goes to the MAP sensor. Connect the MAP connector of the 6LS-2 into the connector with a single signal wire (Figure 2).



Figure 2 Map Sensor Connection.

### **CAMSHAFT SENSOR**

Locate the Camshaft Sensor and the extension cable. On LS2/LS7 based engines, the Cam Sensor is on the front of the block.

Disconnect the extension cable from factory harness and install the MSD Harness (Black connector) inline. Connect the Cam Connector of the 6LS-2 to the connector with a single signal wire.



Figure 3 Camshaft Sensor Location.

#### **CRANKSHAFT SENSOR**

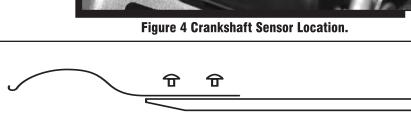
This sensor is located just above/behind the starter. If the engine is in the car, you will need to assemble the supplied special tool to access the sensor connector (Figure 4), or remove the starter. If the engine is out of the car the sensor should be easy to reach.

Disconnect the crank sensor and install the MSD Harness with three wires to the factory connectors. Connect the single wire connector to the Crank Sensor connector of the 6LS-2 Control.

# CRANKSHAFT CONNECTOR SPECIAL TOOL

This tool will help you access the crankshaft sensor from behind the starter when the engine is in the vehicle.

Assemble the Tool as shown in Figure 5.



STARTER

SOLENOID

CRANK

SENSOR

Figure 5 Assembling the Special Tool.

- Insert the tool through the casting hole with the bend in the blade facing the rear of the car.
- Rotate the tool clockwise about
   10-degrees and push the tool further through the casting hole.
- 3. Rotate the tool clockwise until the blade meets the Connector tab. At this point, push the tool towards the rear of the car in order to disconnect the crank sensor.
- 4. Use the tool to connect the 3-pin MSD harness connector to the sensor (Figure 6).
- 5. Connect the factory sensor connector to the MSD harness.
- 6. Connect the single wire harness to the matching 6LS connector.

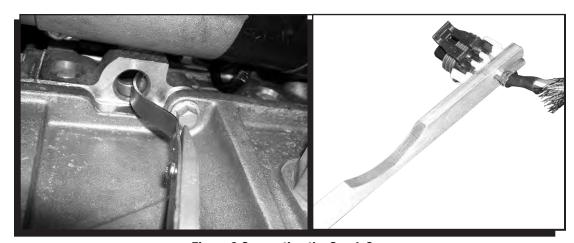


Figure 6 Connecting the Crank Sensor.