Important! Please read instructions completely before installing gauges.

**INTRODUCTION**
This Speedometer assembly utilizes advanced technology and components to provide superior performance. The temp and fuel gauges may require minor wiring revisions. Please note that the required wiring conversion directions are included. Improper installation can cause damage to the gauges and/or other vehicle parts. Installation should be performed by qualified personnel.

**SPEEDOMETER CLUSTER REMOVAL**
Disconnect the battery to eliminate the possibility of an electrical short. Disconnect the speedometer cable. Remove the (4) nuts that hold the cluster into the dash. The cluster can now be easily accessed. Label the wires and their respective locations prior to removing them. Remove the old speedometer cluster.

**INSTALLATION PROCEDURE**
Reattach the wiring to the cluster. Refer to the diagram for proper location of each wire and light. It is critical to follow the wiring revisions for the gauges.

Attach all wiring as illustrated. Reinstall the speedometer cluster using the (4) nuts to attach it to the dash. Connect the speedometer cable. Complete the assembly process.

**GROUNDS**
Check all ground points. All ground connections should be cleaned and free of rust and corrosion. If a grounding point has been painted, it must be sanded or cleaned to ensure a proper ground. Please refer to the chart to the right to help track a possible ground fault or malfunctioning gauge.

<table>
<thead>
<tr>
<th>Temp Gauge Readings</th>
<th>Fuel Gauge Readings</th>
</tr>
</thead>
<tbody>
<tr>
<td>Cold- (130 Deg.) 73 ohms</td>
<td>Empty- 73 ohms</td>
</tr>
<tr>
<td>Slightly Warm- (171 Deg) 36 ohms</td>
<td>1/2 Tank- 23 ohms</td>
</tr>
<tr>
<td>Beginning of Band- (242 Deg) 13 ohms</td>
<td>Full Tank- 10 ohms</td>
</tr>
</tbody>
</table>

**Typical wiring of Jeep CJ Gauge Cluster. Different models may vary.**

- **Hi Beam Indicator** - Gray w/ Tracer
- **Cluster Light** - Orange
- **Left Turn/ Hazard** - Green w/ Tracer
- **Brake Warning** - Black + Black w/ Tracer
- **Temp Sender** - Purple w/ Tracer
- **Quadra-Trac/ 4wd** - Orange + Red
- **Fuel Sender** - Pink
- **FUEL GAUGE** - Ignition-Switched 12v, Red
- **Jumper Wire** - Red or Black
- **Typical wiring of Jeep CJ Gauge Cluster. Different models may vary.**

- **Gauge does not register**
  - Ground tank or engine with jumper wire
  - Gauge works
  - Add ground wire to tank or repair ground strap at motor support
  - Gauge does not work
  - Ground sending wire
  - Gauge works
  - Clean connections & recheck to confirm correct operation. Replace gauge if defective.

- **Gauge registers “FULL” or “HOT” at all times.**
  - Disconnect sending unit at tank or engine.
  - Gauge drops to “E”/“C”
  - Gauge remains “H”/“F”
  - Replace sending unit.
  - Gauge or sending wire shorted. Replace or replace as needed.