



Signal® Mirror Installation Instructions

Standard West Coast Mirror



THE safety accessory of the 21st Century. TM

Note: Professional Installation Recommended

Warranty does not cover damage to the vehicle or mirror housing due to improper installation. The following installation instructions are to be considered as a guide only. Door removal procedures, indicator wire color and location may have changed since publication of these instructions. The installer is responsible for any damage that may occur during installation.

INCLUDED ITEMS:

1 left-hand *Signal*® mirror with 4-conductor cable

1 right-hand Signal® mirror with 4-conductor cable

1 22 ft. of wire

2 terminal ring connectors

8 butt splices

2 wire taps (dark blue)

2 male quick connects (light blue)

2 rubber grommets

1 instruction manual

REQUIRED TOOLS:

Electric/Portable drill

5/16" drill bit

1/2" Wrench

9/16" Wrench

Wire crimper and stripper

Pliers

Multimeter

Sturdy gloves

Safety glasses or goggles

Please read instructions prior to installation.

PROBLEMS OR QUESTIONS?

Technical Assistance is available by calling Muth Mirror Systems Technicians at:

1-800-844-6616

Monday through Friday Between 8:00 a.m. and 5:00 p.m. CST

Or through the Muth web site: www.muthco.com

Or via E-mail: techsupport@muthco.com

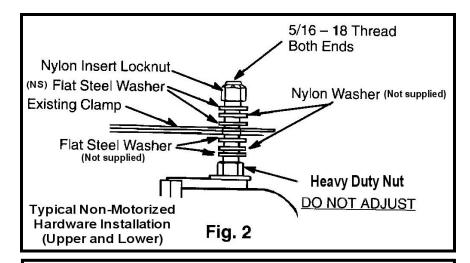
IMPORTANT NOTICE!

Locate the vehicle's turn indicator wires before starting the installation (**See Pg. 3**). Knowing the location of the turn indicator wires will determine which length of *Signal*[®] mirror wire harness will go on either side of the vehicle during the installation. Turn indicator wires are usually located on the driver side behind a kick panel or underneath the dash, however, some turn indicator wires are also found on the passenger side.

Mirror Replacement

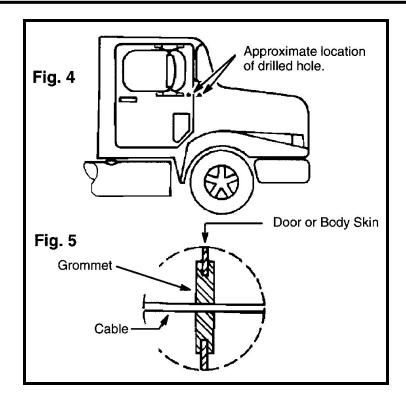
The following procedures indicate how to properly attach non-motorized mirror heads to the mounting bracket.

- 1. Install head into the existing brackets with wires located at the bottom of the mirror head.
- 2. Adjust mirror head to the approximate viewing position and tighten locknuts see Fig. 2. (Torque to 60-80 inch lb.)



Note: When using existing wire harness, disregard the following steps.

- 3. Determine the best path for routing the cable to an area under the dash nearest to your switch mounting location. Remove inner door panel and/or the dash if routing is through the door. Caution: Routing must not cause wire to be kinked or come in contact with any sharp edges.
- 4. Drill hole 5/16" for manual mirror in the door skin or body just in front of the door. See Fig. 4 for approximate position of drilled hole. Note: Make certain the area behind drilled hole is clear to avoid possible damage when drilling.



- 5. Deburr edges of the hole with a file or sandpaper. Rust preventative material may need to be added to exposed metal for corrosion protection.
- 6. Insert end of cable into door hole, push grommet into door skin (see Fig. 5). Allow enough slack for the door to fully open and close.

Mirror Replacement Continued

- 7. Feed cable under dash to approximate location of the control heater switch. Using a butt splice, splice the GREEN wire on the *Signal*[®] mirror wire harness to the OE heater wire (BLACK). Splice the WHITE wire on the *Signal*[®] mirror wire harness to the OE heater wire (Red +) with another butt splice.
- 8. Butt splice the RED wire on the *Signal*[®] mirror wire harness to the supplied 22 ft. of wire. Route this RED wire the rest of the way to the approximate location of the vehicle turn indicator wires.

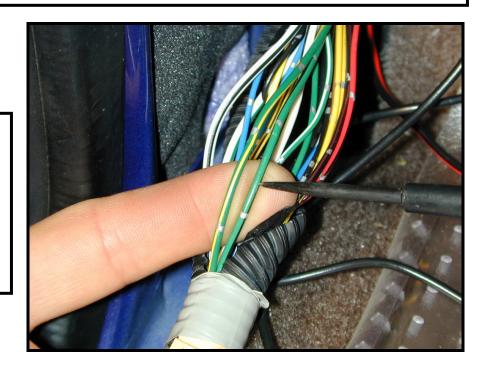
<u>Note:</u> Turn indicator wires are usually located on the driver side behind a kick panel or underneath the dash, however, some turn indicator wires are also found on the passenger side. For splicing wire together, please refers to the 4-step diagrams on page 3.

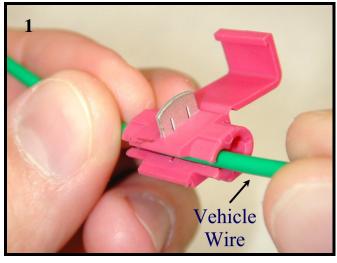
- 9. Re-install door panel and/or dash, if necessary.
- 10. Using nylon tie straps (not supplied) attach cable to the lower mirror bracket. Make certain to provide adequate slack for mirror head rotation.
- 11. Repeat all of the previous steps to replace the factory mirror on the other side with the new Signal® mirror.

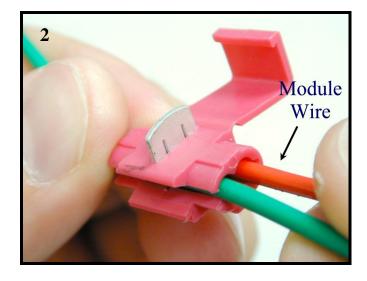
Probing for Turn Signal Wires

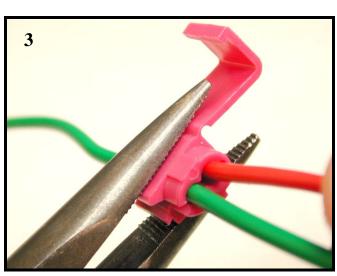
Turn indicator wires are often bundled with other wires and wrapped with tape. Be careful when slicing the tape on the wire bundle.

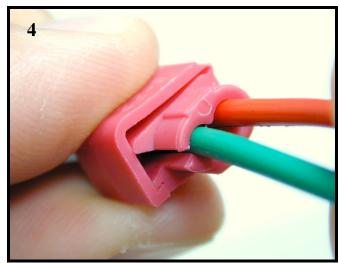
Driver Side Turn Indicator: Using a multimeter, probe each wire until you read a pulsing overload that is consistent with the vehicles front, rear, and interior turn indicators. Label that wire as 'driver side turn'. Repeat wire probing steps for **Passenger Side Turn Indicator:** Label that wire as 'passenger side turn'.











USE THE INCLUDED WIRE TAPS AND FOLLOW THE FOUR STEPS ABOVE TO SPLICE INTO THE TURN INDICATOR WIRES

- 1. Guide the Signal® mirror wire harnesses down to the vehicle's turn indicator wires.
- 2. Splice the RED wire from the driver side harness into the driver side turn indicator wire.
- 3. Splice the RED wire from the passenger side harness into passenger side turn indicator wire.
- 4. Strip the end of the black wire from both harnesses and crimp them onto the supplied ring connector. Bolt the ring connector to a suitable ground location on the framework of the vehicle.
- 5. Activate each turn indicator to verify that the Signal® mirrors are working.