MIRRORS - POWER 1997 ACCESSORIES & EQUIPMENT Ford Motor Co. - Power Mirrors

MIRRORS - POWER

1997 ACCESSORIES & EQUIPMENT Ford Motor Co. - Power Mirrors

DESCRIPTION & OPERATION

Power side view mirror system consists of mirror head with integral reversible servomotor assembly and mirror control switch. Some models are equipped with an electric heating element in outside mirror glass.

Automatic dimming is an option on the inside and left side mirrors on some models. The auto-dimming mirror is controlled by 2 light-sensitive photocells. Outside light level is measured by a sensor on backside of mirror housing. A second sensor, located on reflective side of mirror, detects approaching rear lights. The mirror photochromatically dims when glare is detected from rear of vehicle. Mirror switches to normal state whenever transmission gear selector is placed in Reverse.

TESTING

BOTH SIDE MIRRORS INOPERATIVE

1. **Power & Ground Circuit Check** - Remove power mirror control switch and unplug harness connector. Measure voltage between mirror control switch connector Black wire (Pink/Orange wire on Town Car) and appropriate power wire. See POWER WIRE COLOR IDENTIFICATION TABLE. If battery voltage is present, go to step 6). If battery voltage is not present, go to next step.

POWER WIRE COLOR IDENTIFICATION

Application	Wire Color
Pickup	Light Green/Yellow

- 2. **Ground Circuit Check** Disconnect mirror switch harness connector. Measure resistance between ground and mirror switch harness connector Black wire. If resistance is 5 ohms or less, go to next step. If resistance is more than 5 ohms, repair open Black wire. Reconnect harness connector and retest system.
- 3. **Power Supply Check** Turn ignition on. Measure voltage between ground and appropriate mirror switch harness connector power wire. See POWER WIRE COLOR IDENTIFICATION TABLE. If battery voltage is present, go to step 6). If battery voltage is not present, go to next step.
- 4. **Short To Ground Check** Turn ignition off. Remove power mirror system fuse. See **WIRING DIAGRAM**, for fuse identification. Measure resistance between chassis ground and power wire at mirror switch harness connector. If resistance is more than 10 k/ohms, go to next step. If resistance is less than 10 k/ohms, repair short to ground in power wire.
- 5. **Power Supply Circuit Continuity Check** Remove power mirror system fuse. See <u>WIRING</u> <u>DIAGRAM</u>, for fuse identification. Check continuity of power wire between mirror control switch and fuse cavity. If resistance is 5 ohms or less, replace fuse and to next step. If resistance is more than 5 ohms, repair open in power wire and retest system.
- 6. **Mirror Function Check** Unplug mirror control switch. Using fused jumper wires, check mirror operation by applying battery voltage and ground to appropriate wire terminals. See MIRROR FUNCTION TEST TABLE. Mirror should move in one direction. To move mirror in opposite direction

MIRRORS - POWER 1997 ACCESSORIES & EQUIPMENT Ford Motor Co. - Power Mirrors

reverse polarity of jumper wires. If mirrors operate in all directions, replace mirror control switch and retest system. If mirrors do not operate in all directions, go to next step.

MIRROR FUNCTION TEST

Mirror Function	Wire Color
Right Mirror	
Up/Down	Purple & Yellow
Operation	
Left/Right	Dark Green & Yellow
Operation	
Left Mirror	
Up/Down	Dark Blue & Yellow
Operation	
Left/Right	Red & Yellow
Operation	

7. **Mirror Circuit Continuity Check** - Unplug mirror switch. Unplug harness connector at suspect mirror. See <u>SIDE MIRROR ASSEMBLY</u> under REMOVAL & INSTALLATION. Using ohmmeter, check continuity of each wire between mirror and mirror switch harness connectors. For wire color identification, see <u>WIRING DIAGRAMS</u>. Measure resistance between each wire at mirror harness connector and ground. If ohmmeter indicates any wire open or shorted to ground, repair open shorted wire(s). If all mirror circuits are okay, replace mirror motor.

ONE SIDE MIRROR INOPERATIVE

Check mirror for evidence of damage or foreign object affecting mirror movement. Service as necessary. If mirrors appear okay, perform steps 6) and 7) in BOTH SIDE MIRRORS INOPERATIVE test. Repair as necessary.

REMOVAL & INSTALLATION

WARNING: 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.

INSIDE MIRROR

Removal & Installation

If equipped with auto-dimming, unplug harness connectors at rear of mirror. Grasp mirror firmly, insert small flat-bladed screwdriver into slot at base of mirror mount and pry mirror off mount. To install, use Mirror Replacer (T91P-17700-AH). Slide mirror onto mounting bracket. Reconnect wiring.

MIRRORS - POWER 1997 ACCESSORIES & EQUIPMENT Ford Motor Co. - Power Mirrors

SIDE MIRROR ASSEMBLY

Removal & Installation

Remove door panel. Remove mirror mounting hole cover. See <u>Fig. 1</u>. Disconnect mirror wiring harness connector. Remove mirror attaching nuts. Remove mirror assembly while guiding wiring and connector through hole in door. To install, reverse removal procedure. Tighten nuts to approximately 53 INCH lbs. (6 N.m).

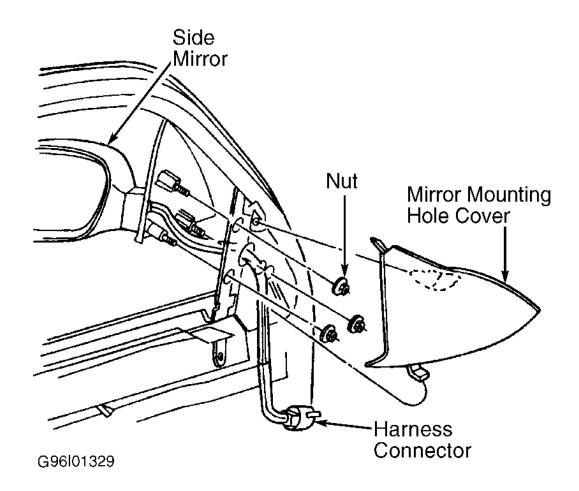


Fig. 1: Removing Side Mirror (Typical) Courtesy of FORD MOTOR CO.

SIDE MIRROR GLASS & MOTOR

Removal & Installation

Point mirror glass as far inward as possible to allow clearance between glass and mirror housing at outer edge

MIRRORS - POWER 1997 ACCESSORIES & EQUIPMENT Ford Motor Co. - Power Mirrors

of mirror. Insert fingers into clearance, and pull mirror glass. If fingers will not fit between glass and housing, use a screwdriver and cloth to pry mirror glass out. Glass will snap out without being damaged. Disconnect heater wires (if equipped). Remove motor attaching screws. Unplug motor connector, and remove motor. To install, reverse removal procedure. Ensure mirror glass locking tabs align before snapping in glass.

WIRING DIAGRAMS

MIRRORS - POWER 1997 ACCESSORIES & EQUIPMENT Ford Motor Co. - Power Mirrors

