AIR BAG RESTRAINT SYSTEM 1997 ACCESSORIES/SAFETY EQUIPMENT Mazda - Air Bag Restraint System

AIR BAG RESTRAINT SYSTEM

1997 ACCESSORIES/SAFETY EQUIPMENT Mazda - Air Bag Restraint System

DESCRIPTION & OPERATION

WARNING: To avoid injury from accidental air bag deployment, read and carefully follow all WARNINGS and SERVICE PRECAUTIONS.

The Supplemental Restraint System (SRS), when used in conjunction with seat belt, provides increased protection for driver and front passenger in a frontal collision. The air bag restraint system consists of AIR BAG warning light, driver-side air bag module, passenger-side air bag module, clockspring, SAS unit, and wiring harness. See **Fig. 1**.

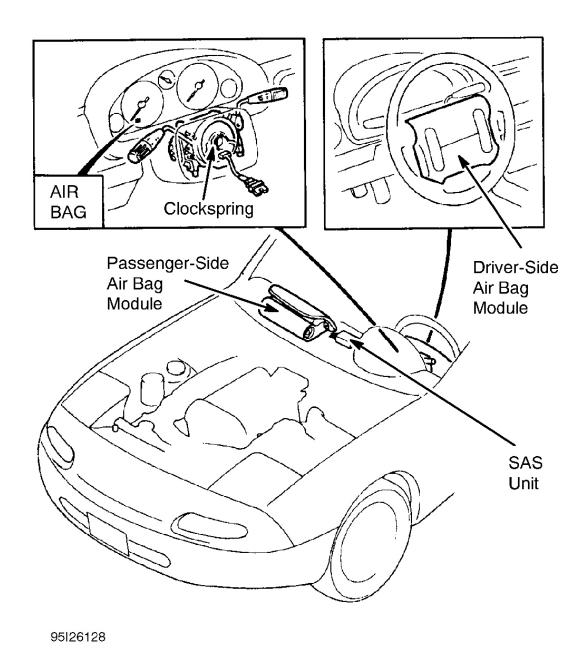


Fig. 1: Air Bag System Component Identification Courtesy of MAZDA MOTORS CORP.

Air bag deploys when ignition is on, crash sensor senses adequate deceleration, and SAS unit logic circuits determine that the impact is sufficient to warrant deployment.

The SAS unit monitors the air bag system for failures. If a failure occurs, the SAS unit turns the AIR BAG warning light on. If AIR BAG warning light is burned out, SAS unit will sound a buzzer to alert driver of a system malfunction.

AIR BAG RESTRAINT SYSTEM 1997 ACCESSORIES/SAFETY EQUIPMENT Mazda - Air Bag Restraint System

SYSTEM OPERATION CHECK

Turn ignition on. AIR BAG warning light in instrument cluster should glow for 6 seconds and then turn off. If AIR BAG warning light does not function as described, a failure has occurred in Supplemental Restraint System (SRS). Repair malfunctioning SRS. See **DIAGNOSIS**. Also, see **SERVICE PRECAUTIONS**.

SERVICE PRECAUTIONS

The following precautions should be observed when working with air bag systems:

- Disable air bag before servicing any air bag system/steering column component. See **DISABLING & ACTIVATING AIR BAG SYSTEM**.
- Because of critical system operating requirements, **DO NOT** service any air bag system component or wiring harness. Corrections are made by replacement only.
- **DO NOT** use an ohmmeter to check resistance of air bag module, as it may cause air bag deployment.
- When carrying a live (undeployed) module, ensure trim cover is pointed away from your body. This minimizes chance of injury in event of accidental air bag deployment.
- When placing a live air bag module on any surface, always face trim cover upward to reduce motion of module if it is accidentally deployed.
- SAS unit must always be installed with arrow facing the front of the vehicle.
- DO NOT disconnect SAS unit until unit is firmly mounted in vehicle.
- Disconnecting or removing SAS unit with ignition switch in ON position can cause accidental deployment and serious personal injury. Before disconnecting or removing SAS unit connector or removing SAS unit, turn ignition to LOCK position.
- Air bag system clockspring MUST be aligned in neutral position, since its rotation ability is limited. **DO NOT** turn steering wheel or column after removal of steering gear.
- A double-lock mechanism is used on clockspring connectors. **DO NOT** use excessive force when disconnecting connectors, as damage to connector may occur.

ADJUSTMENTS

CLOCKSPRING CENTERING

Turn clockspring clockwise until it stops, then turn clockspring counterclockwise 2.75 turns. Align marks on clockspring with marks on outer housing. See $\underline{\mathbf{Fig. 2}}$.

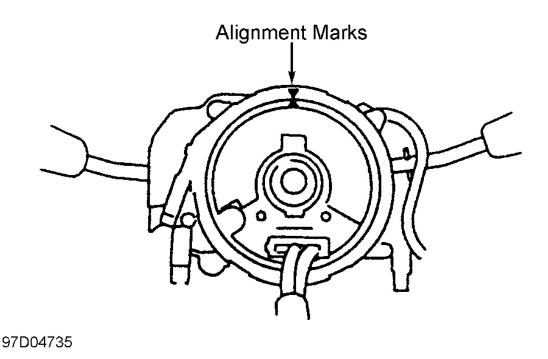


Fig. 2: Locating Clockspring Alignment Marks Courtesy of MAZDA MOTORS CORP.

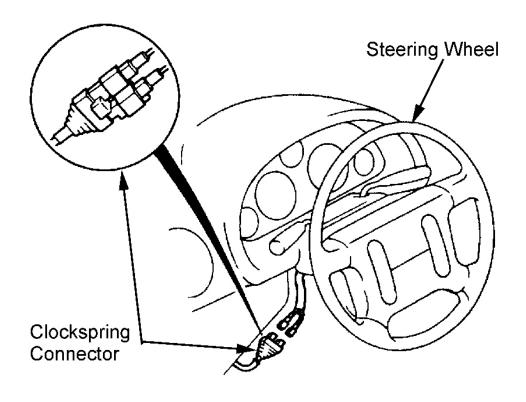
DISABLING & ACTIVATING AIR BAG SYSTEM

WARNING: After disabling the air bag system, wait at least one minute before servicing. Air bag system voltage is maintained for more than minute after system is disabled. Failure to wait at least minute may cause accidental air bag deployment and possible personal injury.

DISABLING SYSTEM

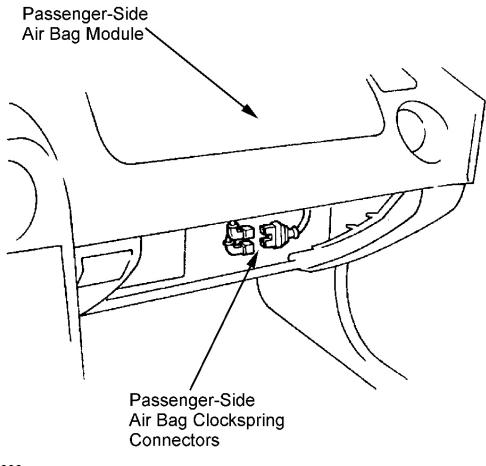
Disconnect and shield negative battery cable. Wait at least one minute for back-up power supply to be depleted. Remove cover panel below left side of instrument panel. Disconnect clockspring connectors for driver-side air bag. See <u>Fig. 3</u>. Remove glove compartment. Disconnect passenger-side air bag module connectors. See <u>Fig. 4</u>.

AIR BAG RESTRAINT SYSTEM 1997 ACCESSORIES/SAFETY EQUIPMENT Mazda - Air Bag Restraint System



96F14097

Fig. 3: Locating Driver-Side Air Bag Clockspring Connectors Courtesy of MAZDA MOTORS CORP.



96G14098

Fig. 4: Locating Passenger-Side Air Bag Connectors Courtesy of MAZDA MOTORS CORP.

ACTIVATING SYSTEM

Ensure negative battery cable is disconnected. Connect Orange and Blue passenger-side air bag module connectors. See $\underline{Fig. 4}$. Install glove compartment. Connect driver-side air bag Orange and Blue clockspring connectors. See $\underline{Fig. 3}$. Install lower cover panel. Connect negative battery cable. See \underline{SYSTEM} OPERATION CHECK.

DISPOSAL PROCEDURES

DEPLOYED AIR BAG

Wrap deployed air bag module in a plastic bag and dispose of as you would any other part. Wear gloves and safety glasses when handling air bag module.

AIR BAG RESTRAINT SYSTEM 1997 ACCESSORIES/SAFETY EQUIPMENT Mazda - Air Bag Restraint System

SCRAPPED VEHICLE

NOTE: When scrapping vehicles with an undeployed air bag(s), air bag(s) must be

deployed inside vehicle.

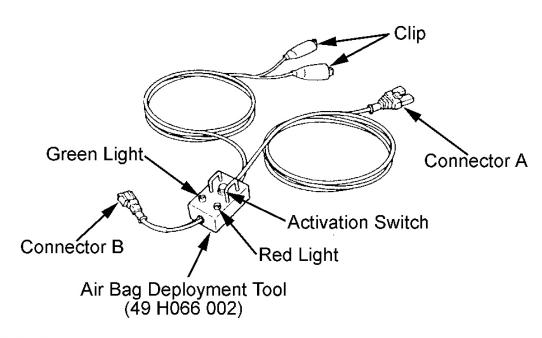
INSPECTING DEPLOYMENT TOOL

NOTE: Deployment tool should always be inspected for proper operation before deploying air bag.

- 1. Connect Red deployment tool clip to battery positive terminal. Connect Black deployment tool clip to battery negative terminal. Observe deployment tool lights. Green light should be on with Red light off.
- 2. Connect deployment tool connector "A" to connector "B". See <u>Fig. 5</u>. Green light should be off with Red light on. Press deployment tool activation switch. Green light should be on with Red light off.
- 3. If deployment tool lights function as described, it is safe to use deployment tool to activate air bag. If deployment tool lights do not function as described, **DO NOT** use deployment tool. Replace deployment tool with another unit and repeat procedure.

Driver-Side Air Bag

- 1. Before deploying air bag, inspect operating condition of Deployment Tool (49 H066 002). See **INSPECTING DEPLOYMENT TOOL** under DISPOSAL PROCEDURES. Ensure vehicle is in an open space and away from other vehicles and people. Open doors. Open convertible top (if equipped). Disconnect negative battery cable.
- 2. Remove lower center panel. Disconnect clockspring connectors from driver-side air bag. See Fig. 3.
- 3. Connect deployment tool (49 H066 002) to clockspring connector. See **Fig. 5**. Connect Red deployment tool clip to battery positive terminal. Connect Black deployment tool clip to battery negative terminal. Verify deployment tool Red light is on.
- 4. Ensure all persons are at least 20 feet from vehicle. Press deployment tool activation switch to deploy air bag. Because of heat generated from air bag deployment, wait at least 15 minutes before handling deployed air bag module.



96H14099

Fig. 5: Air Bag Deployment Tool Connector Identification Courtesy of MAZDA MOTORS CORP.

Passenger-Side Air Bag

- 1. Before deploying air bag, inspect operating condition of Deployment Tool (49 H066 002). See **INSPECTING DEPLOYMENT TOOL** under DISPOSAL PROCEDURES. Ensure vehicle is in an open space and away from other vehicles and people. Open doors. Open convertible top (if equipped). Disconnect negative battery cable.
- 2. Remove glove compartment. Disconnect passenger-side air bag module connectors. See <u>Fig. 4</u>. Connect deployment tool connector to passenger-side air bag connector. See <u>Fig. 5</u>. Connect Red deployment tool clip to battery positive terminal. Connect Black deployment tool clip to battery negative terminal. Verify deployment tool Red light is on.
- 3. Ensure all persons are at least 20 feet from vehicle. Press deployment tool activation switch to deploy air bag. Because of heat generated from air bag deployment, wait at least 15 minutes before handling deployed air bag module.

POST-COLLISION INSPECTION

POST-COLLISION AIR BAG SAFETY INSPECTION

Action	Components
Replace After Deployment	Air Bag Module(s), Air Bag Sensor Unit
Inspect & If Damaged, Replace Component (Even	Clockspring, Impact Sensors & Sensor Mountings,

AIR BAG RESTRAINT SYSTEM 1997 ACCESSORIES/SAFETY EQUIPMENT Mazda - Air Bag Restraint System

If Air Bag Did Not Deploy)	Steering Column, Steering Wheel, Wiring Harness
Comments	DO NOT attempt wiring harness repairs. Replace
	entire harness. Impact sensors must always be
	installed with arrow on sensor facing front of
	vehicle.

REMOVAL & INSTALLATION

WARNING: Follow air bag service precautions to prevent accidental air bag deployment and personal injury. See <u>SERVICE PRECAUTIONS</u>.

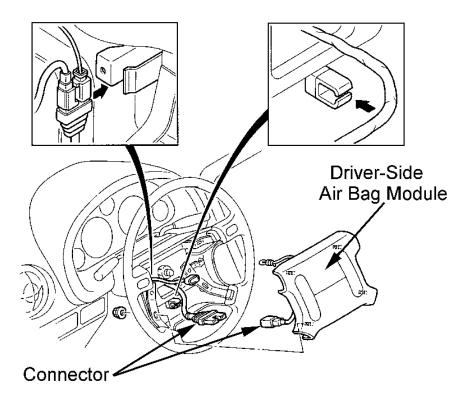
WARNING: DO NOT install driver-side air bag module unless DTC 6 is set. This can cause accidental deployment of the air bag. Verify DTC 6 is indicated before installing driver-side air bag module.

NOTE: After replacing components, check system to ensure proper operation. See SERVICE PRECAUTIONS.

DRIVER-SIDE AIR BAG MODULE

Removal

Before proceeding, see <u>SERVICE PRECAUTIONS</u>. Disable air bag system. See <u>DISABLING & ACTIVATING AIR BAG SYSTEM</u>. Remove driver-side air bag module nuts. Disconnect driver-side air bag module connector. Disconnect support rope. See <u>Fig. 6</u>. Remove driver-side air bag module.



96A14100

Fig. 6: Removing Driver-Side Air Bag Module Courtesy of MAZDA MOTORS CORP.

Installation

- 1. Connect negative battery cable. Turn ignition switch on. Verify that Air Bag warning light comes on for 6 seconds and then goes off. Verify that DTC 6 is set. If another diagnostic trouble code is set, perform appropriate diagnosis and testing. See **DIAGNOSIS**.
- 2. If DTC 6 is set, turn ignition switch to LOCK position. Disconnect negative battery cable and wait for one minute. Connect driver-side air bag connector. Install support rope and driver-side air bag module. Tighten air bag module retaining nuts to specification. See **TORQUE SPECIFICATIONS**.
- 3. Activate air bag system. See **DISABLING & ACTIVATING AIR BAG SYSTEM**. Check AIR BAG warning light to ensure system is functioning properly. See **SYSTEM OPERATION CHECK**.

PASSENGER-SIDE AIR BAG MODULE

WARNING: DO NOT install passenger-side air bag module unless DTC 7 is set. This can cause accidental deployment of the air bag. Verify DTC 7 is indicated before installing passenger-side air bag module.

AIR BAG RESTRAINT SYSTEM 1997 ACCESSORIES/SAFETY EQUIPMENT Mazda - Air Bag Restraint System

Removal

Before proceeding, see <u>SERVICE PRECAUTIONS</u>. Disable air bag system. See <u>DISABLING & ACTIVATING AIR BAG SYSTEM</u>. Remove passenger-side air bag module retaining bolts. See <u>Fig. 7</u>. Remove passenger-side air bag module.

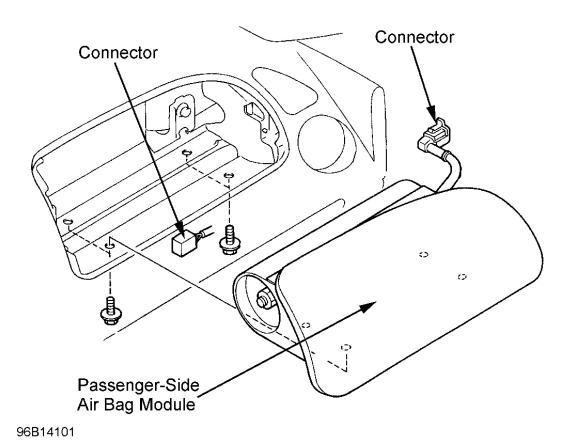
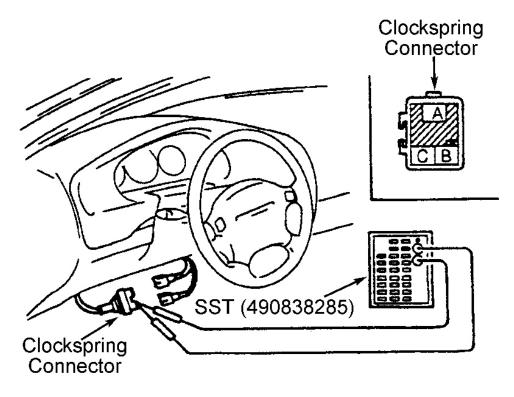


Fig. 7: Removing Passenger-Side Air Bag Module Courtesy of MAZDA MOTORS CORP.



97A04734

Fig. 8: Connecting SST (490839285) To Clockspring Connector Courtesy of MAZDA MOTORS CORP.

Installation

- 1. Connect leads of SST (490839285) to terminals B and C of clockspring connector. Set resistance of SST (490839285) to 2 ohms. Connect negative battery cable. Turn ignition switch on. Verify that air bag warning light comes on for 6 seconds and then goes Off. See **Fig. 8**.
- 2. Verify that DTC 7 is set. Turn ignition switch to LOCK position. Disconnect negative battery cable and wait for one minute. Install passenger-side air bag module and retaining bolts. Activate air bag system. See **TORQUE SPECIFICATIONS**.
- 3. Activate air bag system. See **DISABLING & ACTIVATING AIR BAG SYSTEM**. Check AIR BAG warning light to ensure system is functioning properly. See **SYSTEM OPERATION CHECK**.

SAS UNIT

Removal

1. Before proceeding, see **SERVICE PRECAUTIONS** . Disable air bag system. See **DISABLING & ACTIVATING AIR BAG SYSTEM** .

AIR BAG RESTRAINT SYSTEM 1997 ACCESSORIES/SAFETY EQUIPMENT Mazda - Air Bag Restraint System

2. Drain cooling system. Remove dashboard. Remove heater unit. SAS unit connectors. Remove 4 SAS unit mounting bracket nuts. Remove 2 SAS unit retaining screws. Remove SAS unit. See <u>Fig. 9</u>.

Installation

To install, reverse removal procedure. Position SAS unit and bracket with arrow toward front of vehicle. Tighten fasteners to specification. See **TORQUE SPECIFICATIONS**. After SAS unit is installed, activate air bag system. See **DISABLING & ACTIVATING AIR BAG SYSTEM**. Check AIR BAG warning light to ensure system is functioning properly. See **SYSTEM OPERATION CHECK**.

CLOCKSPRING

NOTE: Clockspring is part of combination switch. When replacing clockspring, replace the clockspring and combination switch as an assembly.

Removal

- 1. Set front wheels in straight-ahead position. Before proceeding, see **SERVICE PRECAUTIONS**. Disable air bag system. See **DISABLING & ACTIVATING AIR BAG SYSTEM**.
- 2. Remove driver-side air bag module. See **DRIVER-SIDE AIR BAG MODULE**. Remove steering wheel nut. Using a puller, remove steering wheel. Remove steering column covers. Remove clockspring screws. Remove clockspring and combination switch as an assembly.

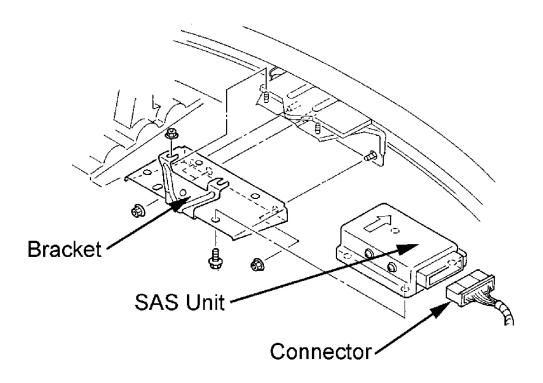
Installation

- 1. To install, reverse removal procedure. Tighten steering wheel nut to specification. See **TORQUE SPECIFICATIONS**.
- 2. After installation, activate air bag system. See <u>DISABLING & ACTIVATING AIR BAG SYSTEM</u>. Check AIR BAG warning light to ensure system is functioning properly. See <u>SYSTEM OPERATION</u> CHECK.

SAS UNIT

Removal

- 1. Before proceeding, see **SERVICE PRECAUTIONS**. Disable air bag system. See **DISABLING & ACTIVATING AIR BAG SYSTEM**.
- 2. SAS unit is located under center of dashboard. See <u>Fig. 1</u>. Remove dashboard. Remove heater assembly. Disconnect SAS unit connectors. Remove 4 SAS unit mounting bracket nuts. Remove 2 SAS unit retaining screws. Remove SAS unit. See <u>Fig. 9</u>.



96C14102

Fig. 9: Removing/Installing SAS Unit Courtesy of MAZDA MOTORS CORP.

Installation

To install, reverse removal procedure. Position SAS unit and bracket with arrow toward front of vehicle. Tighten fasteners to specification. See **TORQUE SPECIFICATIONS**. After SAS unit is installed, activate air bag system. See **DISABLING & ACTIVATING AIR BAG SYSTEM**. Check AIR BAG warning light to ensure system is functioning properly. See **SYSTEM OPERATION CHECK**.

AIR BAG SYSTEM DEPLOYMENT AUTHORIZATION NOTE

New SAS units are not input with a deployment approval signal to prevent accidental deployment during installation and will not operate properly until the signal is input.

- 1. Install new SAS unit and verify air bag warning light continuously flashes approximately 6 seconds after ignition is turned on. Turn ignition to LOCK position and then back to ON position while warning light is flashing.
- 2. Air bag warning light should illuminate and then go out after approximately 6 seconds. If warning light does not go out, repeat procedure.

AIR BAG RESTRAINT SYSTEM 1997 ACCESSORIES/SAFETY EQUIPMENT Mazda - Air Bag Restraint System

DIAGNOSIS

WARNING: Follow air bag service precautions to prevent accidental air bag deployment and personal injury. See <u>SERVICE PRECAUTIONS</u>.

SELF-DIAGNOSTIC SYSTEM

NOTE: If AIR BAG warning light does not come on and buzzer sounds when ignition is turned on, check and repair warning light circuit first.

SAS unit will only display one code at a time. SAS unit will always display highest priority code first. After repairing system, perform **SYSTEM OPERATION CHECK**. If AIR BAG warning light is still flashing during SYSTEM OPERATION CHECK, record code displayed. Repair system as necessary.

Retrieving & Clearing Codes

If codes are stored, AIR BAG warning light will flash or remain on when ignition is turned on. Codes are automatically cleared when fault is corrected.

AIR BAG Warning Light Flashes

AIR BAG warning light indicates fault codes by flashing. Count the number of flashes between pauses to determine code. See <u>AIR BAG CODES</u> table. Codes are prioritized. If 2 or more faults are present, SAS unit will display highest priority code first. After identifying code, go to appropriate code test.

AIR BAG Warning Light Remains On

Illumination of AIR BAG warning light continuously when ignition is turned on indicates a Code 0 (zero). See AIR BAG CODES table.

AIR BAG Warning Light Does Not Come On

Check for blown fuses, burned-out bulb, disconnected SAS unit, or open circuit between warning light and SAS unit.

AIR BAG CODES

IN BIG CODES	
Code	Possible Cause
0 (1)	SAS unit
3	Power Source Circuit
6	Driver-Side Air Bag Module Circuit
7	Passenger-Side Air Bag Module Circuit
(1) AIR BAG warning light remains on, indicating a Code 0.	

WARNING LIGHT DOES NOT COME ON

AIR BAG RESTRAINT SYSTEM 1997 ACCESSORIES/SAFETY EQUIPMENT Mazda - Air Bag Restraint System

NOTE: For connector terminal identification, see <u>WIRING DIAGRAM</u>.

- 1. Disable air bag system. See **DISABLING & ACTIVATING AIR BAG SYSTEM**. Remove meter hood. Ensure instrument cluster 12 pin connector is securely connected and that terminal No. 1 E is not damaged. Check continuity between terminal No. 1E of 12 pin cluster connector and terminal No. 2K of print plate of instrument cluster. If there is continuity, go to next step. If there is no continuity, replace print plate and then go to next step.
- 2. Disable air bag system. See <u>DISABLING & ACTIVATING AIR BAG SYSTEM</u>. Check if terminal No. Q of 21 pin SAS unit connector is securely connected and is not damaged. If ok, go to next step. If terminal Q is not securely connected or is damaged, replace air bag harness, then go to next step.
- 3. Disconnect 21 pin SAS unit connector and 12 pin instrument cluster connector. Check continuity between terminal No. Q of SAS unit connector and terminal No. 1 E of instrument cluster connector. If there is continuity, replace SAS unit and then go to next step. See **SAS UNIT** under REMOVAL & INSTALLATION. If there is no continuity, go to next step.
- 4. Activate air bag system. See **DISABLING & ACTIVATING AIR BAG SYSTEM**. Check AIR BAG warning light for proper system function. See **SYSTEM OPERATION CHECK**.

WARNING LIGHT DOES NOT COME ON

NOTE: For connector terminal identification, see <u>WIRING DIAGRAM</u>.

Disable air bag system. See <u>DISABLING & ACTIVATING AIR BAG SYSTEM</u>. Remove meter hood. Ensure instrument cluster 12 pin connector is securely connected and that terminal No. 1 E is not damaged. Check continuity between terminal No. 1E of 12 pin cluster connector and terminal No. 2K of print plate of instrument cluster. If there is continuity, go to next step. If there is no continuity, replace print plate and then go to next step.

WARNING LIGHT REMAINS ON

NOTE: For connector terminal identification, see <u>WIRING DIAGRAM</u>.

- 1. Measure battery voltage. If voltage is more than 9 volts, go to next step. If voltage is not more than 9 volts, check charging system.
- 2. Disable air bag system. See **DISABLING & ACTIVATING AIR BAG SYSTEM**. Remove dashboard. Remove heater unit. Check if SAS unit connector is securely connected. Check short bar between SAS unit terminal No. Q and terminal No. S. If short bar is bent, replace wiring harness and then go to next step. If short bar is OK, go to next step.
- 3. Check short bar hook on SAS unit. If hook is OK, go to next step. If hook is damaged, replace SAS unit. See **SAS UNIT** under REMOVAL & INSTALLATION.
- 4. Disconnect SAS unit 21 pin connector and instrument panel 12 pin connector. Carefully insert an insulation material between terminal No. Q and terminal No. S of SAS unit so short bar cannot move.

NOTE: Use care not to damage short bar when inserting insulation material.

AIR BAG RESTRAINT SYSTEM 1997 ACCESSORIES/SAFETY EQUIPMENT Mazda - Air Bag Restraint System

- 5. Check continuity between terminal No. Q and ground. If continuity exists, replace or repair wiring harness between instrument cluster and SAS unit. If no continuity exists, replace SAS unit. See <u>SAS</u> UNIT under REMOVAL & INSTALLATION.
- 6. Activate air bag system and perform **SYSTEM OPERATION CHECK**. Check that AIR BAG warning light is operating properly. If not, reconfirm malfunction symptoms.

DTC 0 - SAS UNIT

NOTE:

When air bag warning light remains on, it can indicate a DTC 0 caused by no continuity between terminal No. V and terminal No. Y of SAS unit This can be due to a damaged SAS unit, an open or short circuit in wiring harness or poor connections.

NOTE: For connector terminal identification, see <u>WIRING DIAGRAM</u>.

- 1. Disable system. See **DISABLING & ACTIVATING AIR BAG SYSTEM**. Remove dashboard. Remove heater unit. Check if SAS unit connector is securely connected. If not, reconnect connector and go next step. If ok, go to next step.
- 2. Disconnect SAS unit connector and check for continuity between terminal No. V and terminal No. Y of SAS unit connector. If there is continuity, replace SAS unit. If there is no continuity, replace wiring harness. Perform **SYSTEM OPERATION CHECK**.

DTC 3 - BATTERY

NOTE:

When voltage supplied to SAS unit is less than 1 volt due to weak battery, open or short in wiring harness, poor connection of connector or damaged SAS unit, DTC 3 will set

NOTE: For connector terminal identification, see <u>WIRING DIAGRAM</u>.

- 1. Check that battery voltage is at least 8 volts. If not, check battery and/or charging system. Turn ignition on and check voltage at joint connector terminals A or E (X-33).
- 2. If voltage is over 8 volts, replace SAS unit. See <u>SAS UNIT</u> under REMOVAL & INSTALLATION. If voltage is not over 8 volts, replace wiring harness from battery to fuse box. Perform <u>SYSTEM</u> <u>OPERATION CHECK</u>.

DTC 6 - DRIVER-SIDE AIR BAG MODULE

NOTE: When resistance Is detected between terminals M-O of SAS unit is NOT 2 ohms, DTC 6 will set.

NOTE: For connector terminal identification, see <u>WIRING DIAGRAM</u>.

1 Disable air bag system. See procedures under DISABLING & ACTIVATING AIR BAG SYSTEM

AIR BAG RESTRAINT SYSTEM 1997 ACCESSORIES/SAFETY EQUIPMENT Mazda - Air Bag Restraint System

- Remove driver-side air bag module. See **DRIVER-SIDE AIR BAG MODULE** under REMOVAL & INSTALLATION.
- 2. Inspect clockspring connectors for damage. If connectors are okay, go to next step. If connectors are damaged, replace clockspring. Perform **SYSTEM OPERATION CHECK**.
- 3. Connect Special Service Tool (49 0839 285) to terminal No. 3B and terminal No. 3C of clockspring. Set SST resistance to 2 ohms. Connect clockspring connector. Connect negative battery cable. Turn ignition switch to ON position and cheek for codes. If CODE 6 is displayed, go to next step. If CODE 6 is not present, replace driver-side air bag module. Perform **SYSTEM OPERATION CHECK**.
- 4. Turn ignition switch to LOCK position. Disconnect negative battery cable and wait for 1 minute. Disconnect clockspring connector and inspect. If pins are ok go next step. If pins are damaged, replace wiring harness from clockspring to SAS unit.
- 5. Connect Special Service Tool (49 0839 285) to terminal No. A and terminal No. B of clockspring connector. Set SST resistance to 2 ohms. Connect clockspring connector and connect negative battery cable. Turn ignition switch to ON position and cheek for codes. If CODE 6 is displayed, go to next step. If CODE 6 is not present, replace clockspring. See CLOCKSPRING under REMOVAL & INSTALLATION. Perform **SYSTEM OPERATION CHECK**.
- 6. Turn ignition switch to LOCK position. Disconnect negative battery cable. Wait for 1 minute. Remove dashboard and heater unit. Disconnect SAS unit connector.
- 7. Check wiring harness between terminal No. O of SAS unit connector and between terminal No. A of clockspring connector. Also check between terminal No. M of SAS unit connector and terminal No. B of clockspring connector. Check for short to ground, short to power or open circuit. If wiring is OK, replace SAS unit. See <u>SAS UNIT</u> under REMOVAL & INSTALLATION.If wiring is not OK, replace wiring harness from clockspring to SAS unit. Perform <u>SYSTEM OPERATION CHECK</u>.

DTC 7 - PASSENGER-SIDE AIR BAG MODULE

NOTE: For connector terminal identification, see <u>WIRING DIAGRAM</u>.

NOTE: When resistance is detected between terminals I-K of SAS unit is NOT 2 ohms and/or there is no continuity between terminal No. E of SAS unit and ground, DTC 7 will set

- 1. Disable air bag system. See **DISABLING & ACTIVATING AIR BAG SYSTEM**. Inspect passenger-side air bag module connectors for damage. If connectors are okay, go to next step. If connectors are damaged, replace wiring harness from passenger-side air bag module to SAS unit. Perform **SYSTEM OPERATION CHECK**.
- 2. Connect Special Service Tool (49 0839 285) to terminal No A and terminal No. B of passenger-side air bag module connector. Set Special Service Tool resistance to 2 ohms. Connect clockspring connector. Connect negative battery cable. Turn ignition switch to ON position and check for codes. If DTC 7 is displayed, go to next step. If CODE 7 is not present replace passenger-side air bag module. See PASSENGER-SIDE AIR BAG MODULE under REMOVAL & INSTALLATION. Perform SYSTEM OPERATION CHECK.
- 3. Turn ignition switch to LOCK position. Disconnect negative battery cable and wait 1 minute. Disconnect clockspring connector. Remove dashboard and heater unit.

AIR BAG RESTRAINT SYSTEM 1997 ACCESSORIES/SAFETY EQUIPMENT Mazda - Air Bag Restraint System

4. Disconnect SAS unit connector. Check wiring between terminal K of SAS unit connector and terminal C of passenger-side air bag module connector for short to ground, short to power or open circuit. If wiring is OK, replace SAS unit. See <u>SAS UNIT</u> under REMOVAL & INSTALLATION. If wiring is not OK, replace wiring harness between passenger-side air bag module and SAS unit. Perform <u>SYSTEM</u> OPERATION CHECK.

WIRE REPAIR

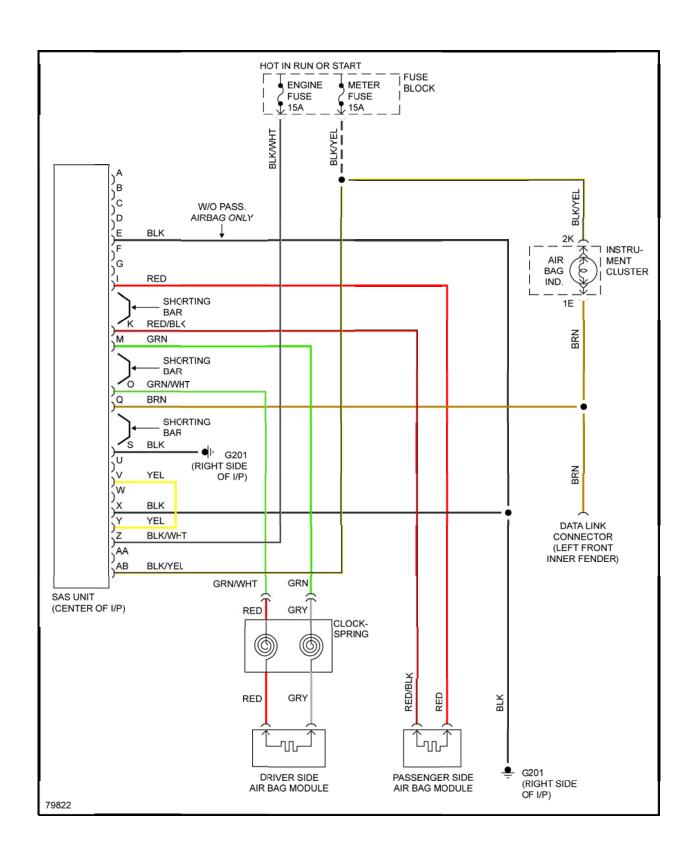
DO NOT repair air bag system wiring. If a problem is found with air bag system wiring, replace faulty wiring.

TORQUE SPECIFICATIONS

TORQUE SPECIFICATIONS

Application	Ft. Lbs. (N.m)
Passenger-Side Air Bag Module Retaining Bolts	13-20 (18-27)
Steering Wheel Nut	29-36 (39-49)
	INCH Lbs. (N.m)
Driver-Side Air Bag Module Retaining Nuts	35-52 (4.0-5.8)
SAS Unit Retaining Nuts	61-86 (6.7-9.8)

WIRING DIAGRAM



AIR BAG RESTRAINT SYSTEM 1997 ACCESSORIES/SAFETY EQUIPMENT Mazda - Air Bag Restraint System

Fig. 10: SRS Wiring Diagram