RESTRAINTS

08–02 ON-BOARD DIAGNOSTIC

- Air Bag System: 08-10
- Seat Belt: 08-11
- Service Tools: 08-60

DTC Table:
- DTC 01: 08-02-6
- DTC 02: 08-02-7
- DTC 03: 08-02-8
- DTC 06: 08-02-9
- DTC 07: 08-02-12
- DTC 11: 08-02-13
- DTC 12: 08-02-15
- DTC 22: 08-02-17
- DTC 25: 08-02-20
- DTC 26: 08-02-22
- DTC 27: 08-02-25
- DTC 31: 08-02-28
- DTC 32: 08-02-29
- DTC 35: 08-02-30
- DTC 37: 08-02-31
- DTC 91: 08-02-33
FOREWORD

- Use the following flowchart to verify the cause of the trouble.

Flowchart

Note
- While performing the inspection of the past malfunction code, the applicable DTCs may be added to memory by removing or disconnecting the related parts. Inspect only the DTCs that were indicated before inspecting.
- When DTCs of present malfunction are no longer output after present and/or past malfunctions have been repaired, be sure to perform past malfunction display cancellation to prevent repair of malfunctions that have already been repaired.
ON-BOARD DIAGNOSTIC

Post-repair Operation
Past malfunction code display cancellation

Caution
• Connecting the wrong DLC terminal may possibly cause a malfunction. Carefully connect the specified terminal only.

1. Turn the ignition switch to the ON position.
2. Wait until the air bag system warning light illuminates approximately 6 seconds and goes off.
3. Perform both the following steps alternately three times each at 0.5—1.5 seconds intervals.
   (1) Use a jumper wire to short the DLC terminal SCN to body GND.
   (2) Disconnect the jumper wire from body GND.
4. If the DTCs are displayed, wait until they disappear.
5. Using a jumper wire, short the DLC terminal SCN to body GND to verify that the DTCs of the past malfunction are not displayed.
   • If the DTCs are still displayed, perform the past malfunction display cancellation again.
6. Turn the ignition switch to the LOCK position.
7. Disconnect the jumper wire from the DLC.

DTC TABLE

• DTCs are common for present and past malfunction diagnosis.

Note
• When DTCs not shown in the DTC table are displayed, replace the SAS control module.
• After a new SAS control module is installed, the air bag system warning light continuously flashes when the ignition switch is turned to ON position. This is the deployment authorization standby code output by the SAS control module. Perform the deployment authorization and restore the system to an operational state.
• If the air bag system warning light does not illuminate or remains illuminated when the ignition switch is turned to ON position, inspect and repair the air bag system warning light circuitry and then confirm that the air bag system warning light is operational.

<table>
<thead>
<tr>
<th>DTC</th>
<th>Output signal</th>
<th>Malfunction location</th>
<th>Page</th>
</tr>
</thead>
<tbody>
<tr>
<td>01</td>
<td></td>
<td>SAS control module connector poor connection</td>
<td>(See 08–02–6 DTC 01)</td>
</tr>
<tr>
<td>02</td>
<td></td>
<td>SAS control module</td>
<td>(See 08–02–7 DTC 02)</td>
</tr>
<tr>
<td>03</td>
<td></td>
<td>Power supply of SAS control module</td>
<td>(See 08–02–8 DTC 03)</td>
</tr>
<tr>
<td>06</td>
<td></td>
<td>Driver-side air bag module system</td>
<td>(See 08–02–9 DTC 06)</td>
</tr>
</tbody>
</table>

08–02–4
## ON-BOARD DIAGNOSTIC

<table>
<thead>
<tr>
<th>DTC</th>
<th>Output signal</th>
<th>Malfunction location</th>
<th>Page</th>
</tr>
</thead>
<tbody>
<tr>
<td>07</td>
<td></td>
<td>Passenger-side air bag module system</td>
<td>(See 08–02–12 DTC 07)</td>
</tr>
<tr>
<td>11</td>
<td></td>
<td>Driver-side pre-tensioner seat belt system</td>
<td>(See 08–02–13 DTC 11)</td>
</tr>
<tr>
<td>12</td>
<td></td>
<td>Passenger-side pre-tensioner seat belt system</td>
<td>(See 08–02–15 DTC 12)</td>
</tr>
<tr>
<td>22</td>
<td></td>
<td>Driver-side side air bag sensor system (Internal circuit abnormal)</td>
<td>(See 08–02–17 DTC 22)</td>
</tr>
<tr>
<td>25</td>
<td></td>
<td>Driver-side side air bag sensor system (Communication error)</td>
<td>(See 08–02–20 DTC 25)</td>
</tr>
<tr>
<td>26</td>
<td></td>
<td>Driver-side side air bag module system</td>
<td>(See 08–02–22 DTC 26)</td>
</tr>
<tr>
<td>32</td>
<td></td>
<td>Passenger-side side air bag sensor system (Internal circuit abnormal)</td>
<td>(See 08–02–25 DTC 32)</td>
</tr>
<tr>
<td>35</td>
<td></td>
<td>Passenger-side side air bag sensor system (Communication error)</td>
<td>(See 08–02–28 DTC 35)</td>
</tr>
<tr>
<td>37</td>
<td></td>
<td>Passenger-side side air bag module system</td>
<td>(See 08–02–30 DTC 37)</td>
</tr>
<tr>
<td>91</td>
<td></td>
<td>Air bag system warning light system</td>
<td>(See 08–02–33 DTC 91)</td>
</tr>
<tr>
<td>-</td>
<td>Continuously flashes</td>
<td>Deployment authorization standby code</td>
<td>—</td>
</tr>
</tbody>
</table>

---

**08–02–5**
ON-BOARD DIAGNOSTIC

DTC 01

DTC 01 | SAS control module connector poor connection

DETECTION CONDITION

Warning
- Detection conditions are for understanding DTC outline before performing inspection.
- Performing inspection with only detection conditions may cause injury due to operating error or damage the system. When performing inspection, always follow diagnostic procedure.
- There is no continuity between poor connection detector bar terminals of SAS control module.
- Terminal 2AA of SAS control module connector is open. (Vehicles without side air bag)

POSSIBLE CAUSE

• Poor connection of any SAS control module connectors.
• Malfunction of any SAS control module connectors.
• Open or short circuit in wiring harness between SAS control module and ground.
• SAS control module malfunction.

Diagnostic procedure

STEP | INSPECTION | ACTION
--- | --- | ---
1 | VERIFY THAT ALL SAS CONTROL MODULE CONNECTORS ARE CONNECTED WITH SAS CONTROL MODULE | Yes | Go to next step.
| | | No | Reconnect connector properly.
| WARNING | Handling air bag system components improperly can accidentally deploy air bag modules and pre-tensioner seat belts, which may seriously injure you. Read AIR BAG SYSTEM SERVICE WARNINGS before handling air bag system components. (See 08–10–3 AIR BAG SYSTEM SERVICE WARNINGS) | | |
| | Turn ignition switch to LOCK position. | | |
| | Disconnect negative battery cable and wait for more than 1 minute. | | |
| | Remove left side wall. | | |
| | Are all SAS control module connectors securely connected? | Yes | Go to next step.
| | No | Reconnect connector properly. |

2 | INSPECT ALL SAS CONTROL MODULE CONNECTORS | Yes | Go to next step.
| | Remove column cover. | | |
| | Disconnect clock spring connector. | | |
| | Remove glove compartment. | | |
| | Disconnect passenger-side air bag module connector. | | |
| | Disconnect driver- and passenger-side side air bag module connectors. (Vehicles with side air bag) | | |
| | Remove B-pillar lower trims. | | |
| | Disconnect driver-and passenger-side pre-tensioner seat belt connectors. | | |
| | Disconnect all SAS control module connectors. | | |
| | Are poor connection detector bars of all SAS control module connectors okay? | Yes | Go to next step.
| | No | Replace wiring harnesses. |
### ON-BOARD DIAGNOSTIC

#### DIAGNOSTIC PROCEDURE

<table>
<thead>
<tr>
<th>STEP</th>
<th>INSPECTION</th>
<th>ACTION</th>
</tr>
</thead>
</table>
| 3    | Is vehicle equipped with side air bag? | **Yes**<br>Present malfunction diagnosis:  
• Replace SAS control module.  
(See 08–10–12 SAS CONTROL MODULE REMOVAL/INSTALLATION)<br>Past malfunction diagnosis:  
• Complete inspection by DTC. |
|      |            | **No**<br>Go to next step. |
| 4    | VERIFY THAT TERMINAL 2AA OF SAS CONTROL MODULE CONNECTOR IS GROUNDED  
• Inspect wiring harness between terminal 2AA of SAS control module connector and ground for following.  
— Short to power supply  
— Open circuit  
• Is wiring harness okay? | **Yes**<br>Present malfunction diagnosis:  
• Replace SAS control module.  
(See 08–10–12 SAS CONTROL MODULE REMOVAL/INSTALLATION)<br>Past malfunction diagnosis:  
• Complete inspection by DTC. |
|      |            | **No**<br>Replace wiring harness. |

---

### DTC 02

**DTC 02**

**SAS control module**

**DETECTION CONDITION**

- **Warning**: Detection conditions are for understanding DTC outline before performing inspection. Performing inspection with only detection conditions may cause injury due to operating error or damage the system. When performing inspection, always follow diagnostic procedure.
  - Malfunction in SAS control module inner circuit.

**POSSIBLE CAUSE**

- SAS control module malfunction.

**Diagnostic procedure**

- **ACTION**
  - Replace SAS control module.  
(See 08–10–12 SAS CONTROL MODULE REMOVAL/INSTALLATION)
ON-BOARD DIAGNOSTIC

DTC 03 Power supply of SAS control module

Detection Condition

Warning
- Detection conditions are for understanding DTC outline before performing inspection. Performing inspection with only detection conditions may cause injury due to operating error or damage the system. When performing inspection, always follow diagnostic procedure.
- Voltage detected at SAS control module terminals 2E and 2H is 9 V or less.

Note
- DTC 03 is indicated when voltages in both of following wiring harnesses drop simultaneously.
  - Wiring harness between fuse block connector (JB–01) terminal B and SAS control module connector terminal 2E.
  - Wiring harness between fuse block connector (JB–02) terminal D and SAS control module connector terminal 2H.
- Weak battery.
- Malfunction in wiring harness between battery and SAS control module.
- SAS control module malfunction.

Possible Cause

Note
- DTC 03 is indicated when voltages in both of following wiring harnesses drop simultaneously.
  - Wiring harness between fuse block connector (JB–01) terminal B and SAS control module connector terminal 2E.
  - Wiring harness between fuse block connector (JB–02) terminal D and SAS control module connector terminal 2H.
- Weak battery.
- Malfunction in wiring harness between battery and SAS control module.
- SAS control module malfunction.

Diagnostic procedure

<table>
<thead>
<tr>
<th>STEP</th>
<th>INSPECTION</th>
<th>ACTION</th>
</tr>
</thead>
</table>
| 1    | INSPECT BATTERY  
  • Measure voltage of battery.  
  • Is voltage more than 9 V?  
| Yes | Go to next step.  
No | Battery is weak.  
Inspect charge/discharge system.  
(See 01–17–1 BATTERY INSPECTION) |
| 2    | INSPECT WIRING HARNESS BETWEEN BATTERY AND FUSE BLOCK  
  • Remove driver-side front scuff plate.  
  • Remove driver-side front side trim.  
  • Remove fuse block without disconnecting connectors.  
  • Turn ignition switch to ON position.  
  • Measure voltage at terminals B (JB–01) and D (JB–02) of fuse block connectors.  
  • Is voltage of at least either terminal more than 9 V?  
| Yes | Go to next step.  
No | Repair wiring harnesses. (Battery—fuse block) |
### ON-BOARD DIAGNOSTIC

<table>
<thead>
<tr>
<th>STEP</th>
<th>INSPECTION</th>
<th>ACTION</th>
</tr>
</thead>
<tbody>
<tr>
<td>3</td>
<td>INSPECT WIRING HARNESS BETWEEN FUSE BLOCK AND SAS CONTROL MODULE</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Warning</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• Handling air bag system components improperly can accidentally deploy air bag modules and pre-tensioner seat belts, which may seriously injure you. Read AIR BAG SYSTEM SERVICE WARNINGS before handling air bag system components. (See 08–10–3 AIR BAG SYSTEM SERVICE WARNINGS)</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• Turn ignition switch to LOCK position.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• Disconnect negative battery cable and wait for more than 1 minute.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• Remove column cover.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• Disconnect clock spring connector.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• Remove glove compartment.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• Disconnect passenger-side air bag module connector.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• Disconnect driver- and passenger-side side air bag module connectors. (Vehicles with side air bag)</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• Remove B-pillar lower trim.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• Disconnect driver-and passenger-side pre-tensioner seat belt connectors.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• Remove left side side wall.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• Disconnect all SAS control module connectors.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• Connect negative battery cable.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• Turn ignition switch to ON position.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• Measure voltage at terminals 2E and 2H of SAS control module connector.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• Is voltage of at least either terminal more than 9 V?</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Yes</td>
<td>Present malfunction diagnosis:</td>
</tr>
<tr>
<td></td>
<td></td>
<td>• Replace SAS control module. (See 08–10–12 SAS CONTROL MODULE REMOVAL/INSTALLATION)</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Past malfunction diagnosis:</td>
</tr>
<tr>
<td></td>
<td></td>
<td>• Complete inspection by DTC.</td>
</tr>
<tr>
<td></td>
<td>No</td>
<td>Replace wiring harness. (Fuse block-SAS control module)</td>
</tr>
</tbody>
</table>

### DTC 06 Driver-side air bag module system

<table>
<thead>
<tr>
<th>DETECTION CONDITION</th>
<th>WARNING</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Driver-side air bag module malfunction.</td>
</tr>
<tr>
<td></td>
<td>Clock spring malfunction.</td>
</tr>
<tr>
<td></td>
<td>Malfunction of connectors between clock spring and SAS control module.</td>
</tr>
<tr>
<td></td>
<td>Open or short circuit in wiring harness between clock spring and SAS control module.</td>
</tr>
<tr>
<td></td>
<td>SAS control module malfunction.</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>POSSIBLE CAUSE</th>
<th>CLOCK SPRING</th>
<th>CLOCK SPRING CONNECTOR</th>
<th>SAS CONTROL MODULE CONNECTOR</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>COMPONENT SIDE CONNECTOR (VIEW FROM TERMINAL SIDE)</td>
<td>HARNESS SIDE CONNECTOR (VIEW FROM TERMINAL SIDE)</td>
<td>HARNESS SIDE CONNECTOR (VIEW FROM HARNESS SIDE)</td>
</tr>
</tbody>
</table>
### Diagnostic procedure

<table>
<thead>
<tr>
<th>STEP</th>
<th>INSPECTION</th>
<th>ACTION</th>
</tr>
</thead>
</table>
| 1    | INSPECT SEPARATOR* OF CLOCK SPRING | Yes | Present malfunction diagnosis:  
* Go to next step.  
Past malfunction diagnosis:  
* Go to Step 6. |
|      | Warning  
* Handling air bag system components improperly can accidentally deploy air bag modules and pre-tensioner seat belts, which may seriously injure you.  
Read AIR BAG SYSTEM SERVICE WARNINGS before handling air bag system components.  
(See 08–10–3 AIR BAG SYSTEM SERVICE WARNINGS)  
* Turn ignition switch to LOCK position.  
* Disconnect negative battery cable and wait for more than 1 minute.  
* Remove driver-side air bag module.  
(See 08–10–5 DRIVER-SIDE AIR BAG MODULE REMOVAL/INSTALLATION)  
* Is separator* of clock spring okay? |
| 2    | VERIFY WHETHER MALFUNCTION IS IN DRIVER-SIDE AIR BAG MODULE OR OTHER PARTS | Yes | Go to next step.  
No | Replace driver-side air bag module.  
(See 08–10–5 DRIVER-SIDE AIR BAG MODULE REMOVAL/INSTALLATION) |
|      | Connect leads of SST (Fuel And Thermometer checker) or apply 2 ohms resistor to clock spring terminals 3A and 3B.  
* Set resistance of SST (Fuel And Thermometer checker) to 2 ohms.  
* Connect negative battery cable.  
* Turn ignition switch to ON position.  
* Is DTC 06 indicated? |
| 3    | INSPECT SEPARATOR* OF CLOCK SPRING CONNECTOR | Yes | Go to next step.  
No | Replace wiring harness. |
|      | Turn ignition switch to LOCK position.  
* Disconnect negative battery cable and wait for more than 1 minute.  
* Remove column cover.  
* Disconnect clock spring connector.  
* Is separator* of clock spring connector okay? |
| 4    | VERIFY WHETHER MALFUNCTION IS IN CLOCK SPRING OR OTHER PARTS | Yes | Go to next step.  
No | Replace clock spring.  
(See 08–10–9 CLOCK SPRING REMOVAL/INSTALLATION) |
|      | Connect leads of SST (Fuel And Thermometer checker) or apply 2 ohms resistor clock spring connector terminals A and B.  
* Set resistance of SST (Fuel And Thermometer checker) to 2 ohms.  
* Connect negative battery cable.  
* Turn ignition switch to ON position.  
* Is DTC 06 indicated? |
**ON-BOARD DIAGNOSTIC**

<table>
<thead>
<tr>
<th>STEP</th>
<th>INSPECTION</th>
<th>ACTION</th>
</tr>
</thead>
<tbody>
<tr>
<td>5</td>
<td>INSPECT WIRING HARNESS BETWEEN CLOCK SPRING AND SAS CONTROL MODULE</td>
<td>Yes</td>
</tr>
<tr>
<td></td>
<td>- Turn ignition switch to LOCK position.</td>
<td>No</td>
</tr>
<tr>
<td></td>
<td>- Disconnect negative battery cable and wait for more than 1 minute.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>- Remove glove compartment.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>- Disconnect passenger-side air bag module connector.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>- Disconnect driver- and passenger-side side air bag module connectors. (Vehicles with side air bag)</td>
<td></td>
</tr>
<tr>
<td></td>
<td>- Remove B-pillar lower trims.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>- Disconnect driver-and passenger-side pretensioner seat belt connectors.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>- Remove left side side wall.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>- Disconnect all SAS control module connectors.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>- Are wiring harnesses okay?</td>
<td></td>
</tr>
<tr>
<td>6</td>
<td>INSPECT SEPARATOR* OF CLOCK SPRING CONNECTOR</td>
<td>Yes</td>
</tr>
<tr>
<td></td>
<td>- Remove column cover.</td>
<td>No</td>
</tr>
<tr>
<td></td>
<td>- Disconnect clock spring connector.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>- Is separator* of clock spring connector okay?</td>
<td></td>
</tr>
<tr>
<td>7</td>
<td>INSPECT CLOCK SPRING</td>
<td>Yes</td>
</tr>
<tr>
<td></td>
<td>- Remove clock spring.</td>
<td>No</td>
</tr>
<tr>
<td></td>
<td>(See 08–10–9 CLOCK SPRING REMOVAL/INSTALLATION)</td>
<td></td>
</tr>
<tr>
<td></td>
<td>- Inspect clock spring.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>(See 08–10–10 CLOCK SPRING INSPECTION)</td>
<td></td>
</tr>
<tr>
<td></td>
<td>- Is clock spring okay?</td>
<td></td>
</tr>
<tr>
<td>8</td>
<td>INSPECT WIRING HARNESS BETWEEN CLOCK SPRING AND SAS CONTROL MODULE</td>
<td>Yes</td>
</tr>
<tr>
<td></td>
<td>- Remove glove compartment.</td>
<td>No</td>
</tr>
<tr>
<td></td>
<td>- Disconnect passenger-side air bag module connector.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>- Disconnect driver- and passenger-side side air bag module connectors. (Vehicles with side air bag)</td>
<td></td>
</tr>
<tr>
<td></td>
<td>- Remove B-pillar lower trims.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>- Disconnect driver-and passenger-side pretensioner seat belt connectors.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>- Remove left side side wall.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>- Disconnect all SAS control module connectors.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>- Inspect wiring harness between terminal 2D of SAS control module connector and terminal A of clock spring connector, and between terminal 2G of SAS control module connector and terminal B of clock spring connector for following.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>- Short to ground</td>
<td></td>
</tr>
<tr>
<td></td>
<td>- Short to power supply</td>
<td></td>
</tr>
<tr>
<td></td>
<td>- Open circuit</td>
<td></td>
</tr>
<tr>
<td></td>
<td>- Are wiring harnesses okay?</td>
<td></td>
</tr>
</tbody>
</table>

* : Consists of 2 parts of female connector that separate the short bar from the terminal when connected to the male connector.
ON-BOARD DIAGNOSTIC

DTC 07  Passenger-side air bag module system

<table>
<thead>
<tr>
<th>DETECTION CONDITION</th>
<th>POSSIBLE CAUSE</th>
</tr>
</thead>
<tbody>
<tr>
<td>Warning</td>
<td>• Passenger-side air bag module malfunction.</td>
</tr>
<tr>
<td>• Detection conditions are for understanding DTC outline before performing inspection. Performing inspection with only detection conditions may cause injury due to operating error or damage the system. When performing inspection, always follow diagnostic procedure.</td>
<td></td>
</tr>
<tr>
<td>• Resistance detected between terminals 2Y and 2AB of SAS control module is other than 1.63—2.71 ohm.</td>
<td></td>
</tr>
<tr>
<td>• Short circuit in wiring harness related SAS control module terminal 2Y or 2AB.</td>
<td></td>
</tr>
<tr>
<td>• Malfunction of connectors between passenger-side air bag module and SAS control module.</td>
<td></td>
</tr>
<tr>
<td>• Open or short circuit in wiring harness between passenger-side air bag module and SAS control module.</td>
<td></td>
</tr>
<tr>
<td>• SAS control module malfunction.</td>
<td></td>
</tr>
</tbody>
</table>

Diagnostic procedure

<table>
<thead>
<tr>
<th>STEP</th>
<th>INSPECTION</th>
<th>ACTION</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>INSPECT SEPARATOR* OF PASSENGER-SIDE AIR BAG MODULE CONNECTOR</td>
<td>Yes</td>
</tr>
<tr>
<td></td>
<td>Warning</td>
<td>Past malfunction diagnosis:</td>
</tr>
<tr>
<td></td>
<td>• Handling air bag system components improperly can accidentally deploy air bag modules and pre-tensioner seat belts, which may seriously injure you. Read AIR BAG SYSTEM SERVICE WARNINGS before handling air bag system components. (See 08–10–3 AIR BAG SYSTEM SERVICE WARNINGS)</td>
<td>• Go to next step.</td>
</tr>
<tr>
<td></td>
<td>• Turn ignition switch to LOCK position.</td>
<td>• Go to Step 3.</td>
</tr>
<tr>
<td></td>
<td>• Disconnect negative battery cable and wait for more than 1 minute.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• Remove glove compartment.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• Disconnect passenger-side air bag module connector.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• Is separator* of passenger-side air bag module connector okay?</td>
<td>No</td>
</tr>
<tr>
<td>2</td>
<td>VERIFY WHETHER MALFUNCTION IS IN PASSENGER-SIDE AIR BAG MODULE OR OTHER PARTS</td>
<td>Yes</td>
</tr>
<tr>
<td></td>
<td>• Connect leads of SST (Fuel And Thermometer checker) or apply 2 ohms resistor to passenger-side air bag module connector terminals A and B.</td>
<td>No</td>
</tr>
<tr>
<td></td>
<td>• Set resistance of SST (Fuel And Thermometer checker) to 2 ohms.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• Connect negative battery cable.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• Turn ignition switch to ON position.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• Is DTC 07 indicated?</td>
<td></td>
</tr>
</tbody>
</table>
**ON-BOARD DIAGNOSTIC**

<table>
<thead>
<tr>
<th>STEP</th>
<th>INSPECTION</th>
<th>ACTION</th>
</tr>
</thead>
<tbody>
<tr>
<td>3</td>
<td>INSPECT WIRING HARNESS BETWEEN PASSENGER-SIDE AIR BAG MODULE AND SAS CONTROL MODULE</td>
<td>Yes</td>
</tr>
<tr>
<td></td>
<td>• Turn ignition switch to LOCK position.</td>
<td>Present malfunction diagnosis:</td>
</tr>
<tr>
<td></td>
<td>• Disconnect negative battery cable and wait for more than 1 minute.</td>
<td>• Replace SAS control module.</td>
</tr>
<tr>
<td></td>
<td>• Remove column cover.</td>
<td>(See 08–10–12 SAS CONTROL MODULE REMOVAL/INSTALLATION)</td>
</tr>
<tr>
<td></td>
<td>• Disconnect clock spring connector.</td>
<td>Past malfunction diagnosis:</td>
</tr>
<tr>
<td></td>
<td>• Disconnect driver- and passenger-side side air bag module connectors. (Vehicles with side air bag)</td>
<td>• Replace passenger-side air bag module.</td>
</tr>
<tr>
<td></td>
<td>• Remove B-pillar lower trims.</td>
<td>(See 08–10–6 PASSENGER-SIDE AIR BAG MODULE REMOVAL/INSTALLATION)</td>
</tr>
<tr>
<td></td>
<td>• Disconnect driver- and passenger-side pre-tensioner seat belt connectors.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• Remove left side wall.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• Disconnect all SAS control module connectors.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• Inspect wiring harness between terminal 2Y of SAS control module connector and terminal A of passenger-side air bag module connector, and between terminal 2AB of SAS control module connector and terminal B of passenger-side air bag module connector for following.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>— Short to ground</td>
<td></td>
</tr>
<tr>
<td></td>
<td>— Short to power supply</td>
<td></td>
</tr>
<tr>
<td></td>
<td>— Open circuit</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• Are wiring harnesses okay?</td>
<td>No</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Replace wiring harness.</td>
</tr>
</tbody>
</table>

* : Consists of the 2 parts of the female connector that separate the short bar from the terminal when connected to the male connector.

---

**DTC 11**

**Driver-side pre-tensioner seat belt system**

**DETECTION CONDITION**

Warning
- Detection conditions are for understanding DTC outline before performing inspection. Performing inspection with only detection conditions may cause injury due to operating error or damage the system. When performing inspection, always follow diagnostic procedure.
- Abnormal resistance (other than 1.83—2.81 ohm) detected in driver-side pre-tensioner seat belt circuit.
- Short circuit in wiring harness related terminal 3A or 3C of SAS control module.

**POSSIBLE CAUSE**

- Driver-side pre-tensioner seat belt malfunction.
- Malfunction of connectors between driver-side pre-tensioner seat belt and SAS control module.
- Open or short circuit in wiring harness between driver-side pre-tensioner seat belt and SAS control module.
- SAS control module malfunction.

**DRIVER-SIDE PRE-TENSIONER SEAT BELT CONNECTOR**

![Diagram of driver-side pre-tensioner seat belt connector]

**SAS CONTROL MODULE CONNECTOR**

![Diagram of SAS control module connector]
## ON-BOARD DIAGNOSTIC

### Diagnostic procedure

<table>
<thead>
<tr>
<th>STEP</th>
<th>INSPECTION</th>
<th>ACTION</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td><strong>INSPECT DRIVER-SIDE PRE-TENSIONER SEAT BELT CONNECTOR</strong></td>
<td><strong>Yes</strong> Replace wiring harness. <strong>No</strong> Present malfunction diagnosis: • Go to next step. Past malfunction diagnosis: • Go to Step 3.</td>
</tr>
</tbody>
</table>

**Warning**
- Handling air bag system components improperly can accidentally deploy air bag modules and pre-tensioner seat belts, which may seriously injure you. Read AIR BAG SYSTEM SERVICE WARNINGS before handling air bag system components. *(See 08–10–3 AIR BAG SYSTEM SERVICE WARNINGS)*
- Turn ignition switch to LOCK position.
- Disconnect negative battery cable and wait for more than 1 minute.
- Remove driver-side B-pillar lower trim.
- Disconnect driver-side pre-tensioner seat belt connector.
- Is there cracking or chipping in driver-side pre-tensioner seat belt connector?

| 2    | **VERIFY WHETHER MALFUNCTION IS IN DRIVER-SIDE PRE-TENSIONER SEAT BELT OR OTHER PARTS** | **Yes** Go to next step. **No** Replace driver-side pre-tensioner seat belt. |

- Connect leads of SST (Fuel and thermometer checker) or apply 2 ohms resistor to driver-side pre-tensioner seat belt connector terminals A and B.
- Set resistance of SST (Fuel and thermometer checker) to 2 ohms.
- Connect negative battery cable.
- Turn ignition switch to ON position.
- Is DTC 11 indicated?

| 3    | **INSPECT WIRING HARNESS BETWEEN DRIVER-SIDE PRE-TENSIONER SEAT BELT AND SAS CONTROL MODULE** | **Yes** Present malfunction diagnosis: • Replace SAS control module. *(See 08–10–12 SAS CONTROL MODULE REMOVAL/INSTALLATION)* Past malfunction diagnosis: • Replace driver-side pre-tensioner seat belt. **No** Replace wiring harness. |

- Turn ignition switch to LOCK position.
- Disconnect negative battery cable and wait for more than 1 minute.
- Remove column cover.
- Disconnect clock spring connector.
- Remove glove compartment.
- Disconnect passenger-side air bag module connector.
- Disconnect driver- and passenger-side side air bag module connectors. *(Vehicles with side air bag)*
- Remove passenger-side B-pillar lower trim.
- Disconnect passenger-side pre-tensioner seat belt connector.
- Remove left side wall.
- Disconnect all SAS control module connectors.
- Inspect wiring harness between SAS control module connector terminal 3A and driver-side pre-tensioner seat belt connector terminal A, and between SAS control module connector terminal 3C and driver-side pre-tensioner seat belt connector terminal B for following:
  - Short to ground
  - Short to power supply
  - Open circuit
- Are wiring harnesses okay?
ON-BOARD DIAGNOSTIC

DTC 12 Passenger-side pre-tensioner seat belt system

**DETECTION CONDITION**
- Detection conditions are for understanding DTC outline before performing inspection.
- Performing inspection with only detection conditions may cause injury due to operating error or damage the system. When performing inspection, always follow diagnostic procedure.
- Abnormal resistance (other than 1.83—2.81 ohm) detected in passenger-side pre-tensioner seat belt circuit.
- Short circuit in wiring harness related terminal 3l or 3K of SAS control module.

**POSSIBLE CAUSE**
- Passenger-side pre-tensioner seat belt malfunction.
- Malfunction of connectors between passenger-side pre-tensioner seat belt and SAS control module.
- Open or short circuit in wiring harness between passenger-side pre-tensioner seat belt and SAS control module.
- SAS control module malfunction.

---

**Diagnostic procedure**

<table>
<thead>
<tr>
<th>STEP</th>
<th>INSPECTION</th>
<th>ACTION</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>INSPECT PASSENGER-SIDE PRE-TENSIONER SEAT BELT CONNECTOR</td>
<td>Yes Replace wiring harness. No Present malfunction diagnosis: • Go to next step. Past malfunction diagnosis: • Go to Step 3.</td>
</tr>
<tr>
<td></td>
<td>Warning</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Handling air bag system components improperly can accidentally deploy air bag modules and pre-tensioner seat belts, which may seriously injure you. Read AIR BAG SYSTEM SERVICE WARNINGS before handling air bag system components. (See 08–10–3 AIR BAG SYSTEM SERVICE WARNINGS)</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• Turn ignition switch to LOCK position.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• Disconnect negative battery cable and wait for more than 1 minute.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• Remove passenger-side B-pillar lower trim.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• Disconnect passenger-side pre-tensioner seat belt connector.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• Is there cracking or chipping in passenger-side pre-tensioner seat belt connector?</td>
<td></td>
</tr>
<tr>
<td>2</td>
<td>VERIFY WHETHER MALFUNCTION IS IN PASSENGER-SIDE PRE-TENSIONER SEAT BELT OR OTHER PARTS</td>
<td>Yes Go to next step. No Replace passenger-side pre-tensioner seat belt.</td>
</tr>
<tr>
<td></td>
<td>• Connect leads of SST (Fuel and thermometer checker) or apply 2 ohms resistor to passenger-side pre-tensioner seat belt connector terminals A and B.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• Set resistance of SST (Fuel and thermometer checker) to 2 ohms.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• Connect negative battery cable.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• Turn ignition switch to ON position.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• Is DTC 12 indicated?</td>
<td></td>
</tr>
</tbody>
</table>
### ON-BOARD DIAGNOSTIC

<table>
<thead>
<tr>
<th>STEP</th>
<th>INSPECTION</th>
<th>ACTION</th>
</tr>
</thead>
</table>
| 3    | **INSPECT WIRING HARNESS BETWEEN PASSENGER-SIDE PRE-TENSIONER SEAT BELT AND SAS CONTROL MODULE**  
- Turn ignition switch to LOCK position.  
- Disconnect negative battery cable and wait for more than 1 minute.  
- Remove column cover.  
- Disconnect clock spring connector.  
- Remove glove compartment.  
- Disconnect passenger-side air bag module connector  
- Disconnect driver- and passenger-side side air bag module connectors. (Vehicles with side air bag)  
- Remove driver-side B-piller lower trim.  
- Disconnect driver-side pre-tensioner seat belt connector.  
- Remove left side side wall.  
- Disconnect all SAS control module connectors.  
- Inspect wiring harness between SAS control module connector terminal 3I and passenger-side pre-tensioner seat belt connector terminal A, and between SAS control module connector terminal 3K and passenger-side pre-tensioner seat belt connector terminal B for following.  
  - Short to ground  
  - Short to power supply  
  - Open circuit  
- Are wiring harnesses okay? | **Present malfunction diagnosis:**  
- Replace SAS control module.  
(See 08–10–12 SAS CONTROL MODULE REMOVAL/INSTALLATION)  
**Past malfunction diagnosis:**  
- Replace passenger-side pre-tensioner seat belt. |
|      | Yes        | Replace wiring harness. |
|      | No         | Replace wiring harness. |
ON-BOARD DIAGNOSTIC

DTC 22
Driver-side side air bag sensor system (Internal circuit abnormal)

<table>
<thead>
<tr>
<th>DTC 22</th>
<th>Warning</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>• Detection conditions are for understanding DTC outline before performing inspection. Performing inspection with only detection conditions may cause injury due to operating error or damage the system. When performing inspection, always follow diagnostic procedure.</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Note</th>
</tr>
</thead>
<tbody>
<tr>
<td>• For vehicles without side air bag, DTC 22, 25, 26, 32, 35, or 37 may be indicated concurrently. In such a case, perform only the smallest DTC troubleshooting among them.</td>
</tr>
</tbody>
</table>

**DETECTION CONDITION**

**Vehicles with side air bag**
- Malfunction in wiring harness between driver-side side air bag sensor and SAS control module.
- Malfunction in driver-side side air bag sensor circuit.

**Vehicles without side air bag**
- Terminal 2AA of SAS control module connector is open.

**POSSIBLE CAUSE**

**Vehicles with side air bag**
- Driver-side side air bag sensor malfunction.
- Open or short circuit in wiring harness between driver-side side air bag sensor and SAS control module.
- SAS control module malfunction.

**Vehicles without side air bag**
- Malfunction of connector between SAS control module and ground.
- Open or short circuit in wiring harness between SAS control module and ground.
- SAS control module malfunction.

**Diagnostic procedure**

<table>
<thead>
<tr>
<th>STEP</th>
<th>INSPECTION</th>
<th>ACTION</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Is vehicle equipped with side air bag?</td>
<td>Yes: Go to next step. No: Go to Step 6.</td>
</tr>
</tbody>
</table>

---

08–02–17

ASLMM001044W11

---

08–02
2 INPECT WIRING HARNESS BETWEEN DRIVER-SIDE SIDE AIR BAG SENSOR AND SAS CONTROL MODULE

Warning
- Handling air bag system components improperly can accidentally deploy air bag modules and pre-tensioner seat belts, which may seriously injure you. Read AIR BAG SYSTEM SERVICE WARNINGS before handling air bag system components.
   (See 08–10–3 AIR BAG SYSTEM SERVICE WARNINGS)
- Turn ignition switch to LOCK position.
- Disconnect negative battery cable and wait for more than 1 minute.
- Remove column cover.
- Disconnect clock spring connector.
- Remove glove compartment.
- Disconnect passenger-side air bag module connector.
- Disconnect driver- and passenger-side side air bag module connectors.
- Remove B-pillar lower trims.
- Disconnect driver- and passenger-side pre-tensioner seat belt connectors.
- Remove left side side wall.
- Disconnect all SAS control module connectors.
- Disconnect driver-side side air bag sensor connector.
- Inspect wiring harness between terminal 1B of SAS control module connector and terminal A of driver-side side air bag sensor connector, between terminal 1D of SAS control module connector and terminal B of driver-side side air bag sensor connector, between terminal 1F of SAS control module connector and terminal C of driver-side side air bag sensor connector, and between terminal 1E of SAS control module connector and terminal D of driver-side side air bag sensor connector for following.
   - Short to ground
   - Short to power supply
   - Open circuit
- Are wiring harnesses okay?

Yes Present malfunction diagnosis:
- Go to next step.

Past malfunction diagnosis:
- Replace driver-side side air bag sensor.
   (See 08–10–10 SIDE AIR BAG SENSOR REMOVAL/INSTALLATION)

No Replace wiring harness.

3 INSPECT GROUND CIRCUIT IN SAS CONTROL MODULE

- Is there continuity between terminal 1F and 2O of SAS control module?

Yes Go to next step.

No Replace SAS control module.
   (See 08–10–12 SAS CONTROL MODULE REMOVAL/INSTALLATION)

4 INSPECT POWER SUPPLY CIRCUIT OF DRIVER-SIDE SIDE AIR BAG SENSOR

- Connect all SAS control module connectors.
- Connect passenger-side air bag module connector.
- Connect driver- and passenger-side side air bag module connectors.
- Connect driver- and passenger-side pre-tensioner seat belt connectors.
- Connect negative battery cable.
- Turn ignition switch to ON position.
- Measure voltage at terminal A of driver-side side air bag sensor connector.
- Is voltage approximately 5 V?

Yes Replace driver-side side air bag sensor, then go to next step.
   (See 08–10–10 SIDE AIR BAG SENSOR REMOVAL/INSTALLATION)

No Replace SAS control module.
   (See 08–10–12 SAS CONTROL MODULE REMOVAL/INSTALLATION)
### ON-BOARD DIAGNOSTIC

<table>
<thead>
<tr>
<th>STEP</th>
<th>INSPECTION</th>
<th>ACTION</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>5</strong></td>
<td>VERIFY WHETHER SAS CONTROL MODULE IS MALFUNCTIONING OR NOT</td>
<td>Yes</td>
</tr>
<tr>
<td></td>
<td>• Connect driver-side side air bag sensor connector.</td>
<td>No</td>
</tr>
<tr>
<td></td>
<td>• Connect negative battery cable.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• Turn ignition switch to ON position.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• Is DTC 22 indicated?</td>
<td></td>
</tr>
<tr>
<td><strong>6</strong></td>
<td>VERIFY THAT SAS CONTROL MODULE CONNECTOR TERMINAL 2AA IS GROUNDED</td>
<td>Yes</td>
</tr>
<tr>
<td></td>
<td>Warning</td>
<td>Past malfunction diagnosis: Complete inspection by DTC.</td>
</tr>
<tr>
<td></td>
<td>• Handling air bag system components improperly can accidentally deploy air bag modules and pre-tensioner seat belts, which may seriously injure you. Read AIR BAG SYSTEM SERVICE WARNINGS before handling air bag system components. (See 08–10–3 AIR BAG SYSTEM SERVICE WARNINGS)</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• Turn ignition switch to LOCK position.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• Disconnect negative battery cable and wait for more than 1 minute.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• Remove column cover.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• Disconnect clock spring connector.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• Remove glove compartment.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• Disconnect passenger-side air bag module connector.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• Remove B-pillar lower trims.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• Disconnect driver-and passenger-side pre-tensioner seat belt connectors.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• Remove left side side wall.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• Disconnect all SAS control module connectors.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• Disconnect driver-side side air bag sensor connector.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• Inspect wiring harness between terminal 2AA of SAS control module connector and ground for following.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>— Short to power supply</td>
<td></td>
</tr>
<tr>
<td></td>
<td>— Open circuit</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• Is wiring harnesses okay?</td>
<td></td>
</tr>
</tbody>
</table>
ON-BOARD DIAGNOSTIC

DTC 25

Diagnostic procedure

<table>
<thead>
<tr>
<th>STEP</th>
<th>INSPECTION</th>
<th>ACTION</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Is vehicle equipped with side bag?</td>
<td>Yes</td>
</tr>
</tbody>
</table>

WARNING
Detection conditions are for understanding DTC outline before performing inspection. Performing inspection with only detection conditions may cause injury due to operating error or damage the system. When performing inspection, always follow diagnostic procedure.

NOTE
For vehicles without side air bag, DTC 22, 25, 26, 32, 35, or 37 may be indicated concurrently. In such a case, perform only the smallest DTC troubleshooting among them.

DETECTION CONDITION

Vehicles with side air bag
- Malfunction in wiring harness between driver-side side air bag sensor and SAS control module.
- Malfunction in driver-side side air bag sensor circuit.

Vehicles without side air bag
- Terminal 2A of SAS control module connector is open.

POSSIBLE CAUSE

Vehicles with side air bag
- Driver-side side air bag sensor malfunction.
- Open or short circuit in wiring harness between driver-side side air bag sensor and SAS control module.
- SAS control module malfunction.

Vehicles without side air bag
- Malfunction of connector between SAS control module and ground.
- Open or short circuit in wiring harness between SAS control module and ground.
- SAS control module malfunction.

Diagnostic procedure

<table>
<thead>
<tr>
<th>STEP</th>
<th>INSPECTION</th>
<th>ACTION</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Is vehicle equipped with side bag?</td>
<td>Yes</td>
</tr>
</tbody>
</table>


## ON-BOARD DIAGNOSTIC

<table>
<thead>
<tr>
<th>STEP</th>
<th>INSPECTION</th>
<th>ACTION</th>
</tr>
</thead>
</table>
| 2 | INSPECT WIRING HARNESS BETWEEN DRIVER-SIDE SIDE AIR BAG SENSOR AND SAS CONTROL MODULE | **Yes** Present malfunction diagnosis:  
• Go to next step.  
Past malfunction diagnosis:  
• Replace SAS control module.  
(See 08–10–12 SAS CONTROL MODULE REMOVAL/INSTALLATION)  
**No** Replace wiring harness. |
|   | Warning | **Yes** Present malfunction diagnosis:  
• Go to next step.  
Past malfunction diagnosis:  
• Replace SAS control module.  
(See 08–10–12 SAS CONTROL MODULE REMOVAL/INSTALLATION)  
**No** Replace wiring harness. |
|   | • Handling air bag system components improperly can accidentally deploy air bag modules and pre-tensioner seat belts, which may seriously injure you. Read AIR BAG SYSTEM SERVICE WARNINGS before handling air bag system components.  
(See 08–10–3 AIR BAG SYSTEM SERVICE WARNINGS)  
• Turn ignition switch to LOCK position.  
• Disconnect negative battery cable and wait for more than 1 minute.  
• Remove column cover.  
• Disconnect clock spring connector.  
• Remove glove compartment.  
• Disconnect passenger-side air bag module connector.  
• Disconnect driver- and passenger-side side air bag module connectors.  
• Remove B-pillar lower trims.  
• Disconnect driver-and passenger-side pre-tensioner seat belt connectors.  
• Remove left side side wall.  
• Disconnect all SAS control module connectors.  
• Disconnect driver-side side air bag sensor connector.  
• Inspect following wiring harness between SAS control module connector and driver-side side air bag sensor connector terminals (harness side) for short to ground, short to power supply, and open circuit:  
— 1B and A  
— 1D and B  
— 1F and C  
— 1E and D  
• Are wiring harnesses okay? | |
| 3 | INSPECT DRIVER-SIDE SIDE AIR BAG SENSOR | **Yes** Replace SAS control module, then go to next step.  
(See 08–10–12 SAS CONTROL MODULE REMOVAL/INSTALLATION)  
**No** Replace driver-side side air bag sensor.  
(See 08–10–10 SIDE AIR BAG SENSOR REMOVAL/INSTALLATION) |
|   | • Measure resistance between terminals C and D of driver-side side air bag sensor.  
• Is resistance approximately 1 kilohm? | |
| 4 | VERIFY WHETHER DRIVER-SIDE SIDE AIR BAG SENSOR IS MALFUNCTIONING OR NOT | **Yes** Replace driver-side side air bag sensor.  
(See 08–10–10 SIDE AIR BAG SENSOR REMOVAL/INSTALLATION)  
**No** Complete inspection by DTC. |
|   | • Connect all SAS control module connectors and driver-side side air bag sensor connector.  
• Connect clock spring connector. Connect passenger-side air bag module connector.  
• Connect driver- and passenger-side side air bag module connectors.  
• Connect driver- and passenger-side pre-tensioner seat belt connectors.  
• Connect negative battery cable.  
• Turn ignition switch to ON position.  
• Is DTC 25 indicated? | |
### ON-BOARD DIAGNOSTIC

#### STEP 5

**INSPECTION**

- **VERIFY THAT SAS CONTROL MODULE CONNECTOR TERMINAL 2AA IS GROUNDED**

  - Warning
    - Handling air bag system components improperly can accidentally deploy air bag modules and pre-tensioner seat belts, which may seriously injure you. Read AIR BAG SYSTEM SERVICE WARNINGS before handling air bag system components. (See 08–10–3 AIR BAG SYSTEM SERVICE WARNINGS)
    - Turn ignition switch to LOCK position.
    - Disconnect negative battery cable and wait for more than 1 minute.
    - Remove column cover.
    - Disconnect clock spring connector.
    - Remove glove compartment.
    - Disconnect passenger-side air bag module connector.
    - Remove B-pillar lower trims.
    - Disconnect driver-and passenger-side pre-tensioner seat belt connectors.
    - Remove left side side wall.
    - Disconnect all SAS control module connectors.
    - Disconnect driver-side side air bag sensor connector.
    - Inspect wiring harness between terminal 2AA of SAS control module connector and ground for following.
      - Short to power supply
      - Open circuit
    - Is wiring harnesses okay?

  - Yes: Present malfunction diagnosis:
    - Replace SAS control module. (See 08–10–12 SAS CONTROL MODULE REMOVAL/INSTALLATION)
  - No: Replace wiring harness.

#### DETECTION CONDITION

**DTC 26**

**Driver-side side air bag module system**

- **Warning**
  - Detection conditions are for understanding DTC outline before performing inspection. Performing inspection with only detection conditions may cause injury due to operating error or damage the system. When performing inspection, always follow diagnostic procedure.

  - Note
    - For vehicles without side air bag, DTC 22, 25, 26, 32, 35, or 37 may be indicated concurrently. In such a case, perform only the smallest DTC troubleshooting among them.

  - **Vehicles with side air bag**
    - Resistance detected between terminals 1A and 1C of SAS control module is other than 1.63—2.71 ohm.
    - Short circuit in wiring harness related terminal 1A or 1C of SAS control module.

  - **Vehicles without side air bag**
    - Terminal 2AA of SAS control module connector is open.

#### POSSIBLE CAUSE

- **Vehicles with side air bag**
  - Driver-side side air bag module malfunction.
  - Malfunction of connectors between driver-side side air bag module and SAS control module.
  - Open or short circuit in wiring harness between driver-side side air bag module and SAS control module.
  - SAS control module malfunction.

- **Vehicles without side air bag**
  - Malfunction of connector between SAS control module and ground.
  - Open or short circuit in wiring harness between SAS control module and ground.
  - SAS control module malfunction.
## ON-BOARD DIAGNOSTIC

### Diagnostic procedure

<table>
<thead>
<tr>
<th>STEP</th>
<th>INSPECTION</th>
<th>ACTION</th>
</tr>
</thead>
</table>
| 1    | Is vehicle equipped with side air bag? | Yes Go to next step.  
No Go to Step 5. |

**2 INSPECT SEPARATOR* OF DRIVER-SIDE SIDE AIR BAG MODULE CONNECTOR**

**Warning**

- Handling air bag system components improperly can accidentally deploy air bag modules and pre-tensioner seat belts, which may seriously injure you. Read AIR BAG SYSTEM SERVICE WARNINGS before handling air bag system components.  
(See 08–10–3 AIR BAG SYSTEM SERVICE WARNINGS)

- Turn ignition switch to LOCK position.
- Disconnect negative battery cable and wait for more than 1 minute.
- Disconnect driver-side side air bag module connector.
- Is separator* of driver-side side air bag module connector okay?

**Yes** Present malfunction diagnosis:
- Go to next step.

Past malfunction diagnosis:
- Go to Step 3.

**No** Replace wiring harness.

**3 VERIFY WHETHER MALFUNCTION IS IN DRIVER-SIDE SIDE AIR BAG MODULE OR OTHER PARTS**

- Connect leads of SST (Fuel And Thermometer checker) or apply 2 ohms resistor to driver-side side air bag module connector terminals A and B.
- Set resistance of SST (Fuel And Thermometer checker) to 2 ohms.
- Connect negative battery cable.
- Turn ignition switch to ON position.
- Is DTC 26 indicated?

**Yes** Go to next step.

**No** Replace driver-side side air bag module.  
(See 08–10–7 SIDE AIR BAG MODULE REMOVAL/INSTALLATION)
### ON-BOARD DIAGNOSTIC

#### INSPECTION

1. **Inspect wiring harness between driver-side side air bag module and SAS control module:**
   - Turn ignition switch to LOCK position.
   - Disconnect negative battery cable and wait for more than 1 minute.
   - Remove column cover.
   - Disconnect clock spring connector.
   - Remove glove compartment.
   - Disconnect passenger-side air bag module connector.
   - Disconnect passenger-side side air bag module connector.
   - Remove B-pillar lower trims.
   - Disconnect driver-and passenger-side pre-tensioner seat belt connectors.
   - Remove left side wall.
   - Disconnect all SAS control module connectors.
   - Inspect following wiring harness between SAS control module connector and driver-side side air bag module connector terminals (harness side) for short to ground, short to power supply, and open circuit:
     - 1A and A
     - 1C and B
   - Are wiring harnesses okay?

#### ACTION

<table>
<thead>
<tr>
<th>Yes</th>
<th>Present malfunction diagnosis:</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Remove SAS control module.</td>
</tr>
<tr>
<td></td>
<td>(See 08–10–12 SAS CONTROL MODULE REMOVAL/INSTALLATION)</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Past malfunction diagnosis:</th>
</tr>
</thead>
<tbody>
<tr>
<td>Replace driver-side side air bag module.</td>
</tr>
<tr>
<td>(See 08–10–7 SIDE AIR BAG MODULE REMOVAL/INSTALLATION)</td>
</tr>
</tbody>
</table>

| No | Replace wiring harness. |

#### STEP INSPECTION ACTION

2. **Verify that SAS control module connector terminal 2AA is grounded:**

   * **Warning:**
     - Handling air bag system components improperly can accidentally deploy air bag modules and pre-tensioner seat belts, which may seriously injure you. Read AIR BAG SYSTEM SERVICE WARNINGS before handling air bag system components. (See 08–10–3 AIR BAG SYSTEM SERVICE WARNINGS)

   - Turn ignition switch to LOCK position.
   - Disconnect negative battery cable and wait for more than 1 minute.
   - Remove column cover.
   - Disconnect clock spring connector.
   - Remove glove compartment.
   - Disconnect passenger-side air bag module connector.
   - Remove B-pillar lower trims.
   - Disconnect driver-and passenger-side pre-tensioner seat belt connectors.
   - Remove left side wall.
   - Disconnect all SAS control module connectors.
   - Disconnect driver-side side air bag sensor connector.
   - Inspect wiring harness between terminal 2AA of SAS control module connector and ground for following:
     - Short to power supply
     - Open circuit
   - Are wiring harnesses okay?

<table>
<thead>
<tr>
<th>Yes</th>
<th>Present malfunction diagnosis:</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Replace SAS control module.</td>
</tr>
<tr>
<td></td>
<td>(See 08–10–12 SAS CONTROL MODULE REMOVAL/INSTALLATION)</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Past malfunction diagnosis:</th>
</tr>
</thead>
<tbody>
<tr>
<td>Complete inspection by DTC.</td>
</tr>
</tbody>
</table>

| No | Replace wiring harness. |

---

* : Consists of the 2 parts of the female connector that separate the short bar from the terminal when connected to the male connector.
ON-BOARD DIAGNOSTIC

DTC 32 Passenger-side side air bag sensor system (Internal circuit abnormal)

<table>
<thead>
<tr>
<th>DTC 32</th>
<th>DETECTION CONDITION</th>
</tr>
</thead>
<tbody>
<tr>
<td>Warning</td>
<td>Detection conditions are for understanding DTC outline before performing inspection. Performing inspection with only detection conditions may cause injury due to operating error or damage the system. When performing inspection, always follow diagnostic procedure.</td>
</tr>
<tr>
<td>Note</td>
<td>For vehicles without side air bag, DTC 22, 25, 26, 32, 35, or 37 may be indicated concurrently. In such a case, perform only the smallest DTC troubleshooting among them.</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>POSSIBLE CAUSE</th>
</tr>
</thead>
<tbody>
<tr>
<td>Vehicles with side air bag</td>
</tr>
<tr>
<td>• Malfunction in wiring harness between passenger-side side air bag sensor and SAS control module.</td>
</tr>
<tr>
<td>• Malfunction in passenger-side side air bag sensor circuit.</td>
</tr>
<tr>
<td>Vehicles without side air bag</td>
</tr>
<tr>
<td>• Terminal 2AA of SAS control module connector is open.</td>
</tr>
</tbody>
</table>

**Diagnostic procedure**

<table>
<thead>
<tr>
<th>STEP</th>
<th>INSPECTION</th>
<th>ACTION</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Is vehicle equipped with side air bag?</td>
<td>Yes</td>
</tr>
<tr>
<td></td>
<td></td>
<td>No</td>
</tr>
</tbody>
</table>
## On-Board Diagnostic

<table>
<thead>
<tr>
<th>STEP</th>
<th>INSPECTION</th>
<th>ACTION</th>
</tr>
</thead>
</table>
| 2 | **Inspect Wiring Harness Between Passenger-Side Side Air Bag Sensor and SAS Control Module**  
   Warning  
   • Handling air bag system components improperly can accidentally deploy air bag modules and pre-tensioner seat belts, which may seriously injure you. Read AIR BAG SYSTEM SERVICE WARNINGS before handling air bag system components. (See 08–10–3 AIR BAG SYSTEM SERVICE WARNINGS)  
   • Turn ignition switch to LOCK position.  
   • Disconnect negative battery cable and wait for more than 1 minute.  
   • Remove column cover.  
   • Disconnect clock spring connector.  
   • Remove glove compartment.  
   • Disconnect passenger-side air bag module connector.  
   • Disconnect driver- and passenger-side side air bag module connectors.  
   • Remove B-pillar lower trims.  
   • Disconnect driver-and passenger-side pre-tensioner seat belt connectors.  
   • Remove left side side wall.  
   • Disconnect all SAS control module connectors.  
   • Disconnect passenger-side side air bag sensor connector.  
   • Inspect wiring harness between terminal 1L of SAS control module connector and terminal A of passenger-side side air bag sensor connector, between terminal 1J of SAS control module connector and terminal B of passenger-side side air bag sensor connector, between terminal 1H of SAS control module connector and terminal C of passenger-side side air bag sensor connector, and between terminal 1G of SAS control module connector and terminal D of passenger-side side air bag sensor connector for following.  
   — Short to ground  
   — Short to power supply  
   — Open circuit  
   • Are wiring harnesses okay? | **Yes**  
   Present malfunction diagnosis:  
   • Go to next step.  
   Past malfunction diagnosis:  
   • Replace passenger-side side air bag sensor.  
   (See 08–10–10 SIDE AIR BAG SENSOR REMOVAL/INSTALLATION)  
   **No**  
   Replace wiring harness. |
| 3 | **Inspect Ground Circuit in SAS Control Module**  
   • Is there continuity between terminal 1H and 2Q of SAS control module? | **Yes**  
   Go to next step.  
   **No**  
   Replace SAS control module.  
   (See 08–10–12 SAS CONTROL MODULE REMOVAL/INSTALLATION) |
| 4 | **Inspect Power Supply Circuit of Passenger-Side Side Air Bag Sensor**  
   • Connect all SAS control module connectors.  
   • Connect clock spring connector.  
   • Connect passenger-side air bag module connector.  
   • Connect driver- and passenger-side side air bag module connectors.  
   • Connect driver- and passenger-side pre-tensioner seat belt connectors.  
   • Connect negative battery cable.  
   • Turn ignition switch to ON position.  
   • Measure voltage at terminal A of passenger-side side air bag sensor connector.  
   • Is voltage approximately 5 V? | **Yes**  
   Replace passenger-side side air bag sensor, then go to next step.  
   (See 08–10–10 SIDE AIR BAG SENSOR REMOVAL/INSTALLATION)  
   **No**  
   Replace SAS control module.  
   (See 08–10–12 SAS CONTROL MODULE REMOVAL/INSTALLATION) |
### ON-BOARD DIAGNOSTIC

<table>
<thead>
<tr>
<th>STEP</th>
<th>INSPECTION</th>
<th>ACTION</th>
</tr>
</thead>
<tbody>
<tr>
<td>5</td>
<td>VERIFY WHETHER SAS CONTROL MODULE IS MALFUNCTIONING OR NOT</td>
<td><strong>Yes</strong></td>
</tr>
<tr>
<td></td>
<td>• Connect passenger-side side air bag sensor connector.</td>
<td>Replace SAS control module. (See 08–10–12 SAS CONTROL MODULE REMOVAL/INSTALLATION)</td>
</tr>
<tr>
<td></td>
<td>• Connect negative battery cable.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• Turn ignition switch to ON position.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• Is DTC 32 indicated?</td>
<td></td>
</tr>
<tr>
<td></td>
<td><strong>No</strong></td>
<td>Complete inspection by DTC.</td>
</tr>
<tr>
<td>6</td>
<td>VERIFY THAT SAS CONTROL MODULE CONNECTOR TERMINAL 2AA IS GROUNDED</td>
<td><strong>Yes</strong></td>
</tr>
<tr>
<td></td>
<td>Warning</td>
<td>Present malfunction diagnosis:</td>
</tr>
<tr>
<td></td>
<td>• Handling air bag system components improperly can accidentally deploy air bag modules and pre-tensioner seat belts, which may seriously injure you. Read AIR BAG SYSTEM SERVICE WARNINGS before handling air bag system components. (See 08–10–3 AIR BAG SYSTEM SERVICE WARNINGS)</td>
<td>• Replace SAS control module. (See 08–10–12 SAS CONTROL MODULE REMOVAL/INSTALLATION)</td>
</tr>
<tr>
<td></td>
<td>• Turn ignition switch to LOCK position.</td>
<td>Past malfunction diagnosis:</td>
</tr>
<tr>
<td></td>
<td>• Disconnect negative battery cable and wait for more than 1 minute.</td>
<td>• Complete inspection by DTC.</td>
</tr>
<tr>
<td></td>
<td>• Remove column cover.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• Disconnect clock spring connector.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• Remove glove compartment. (Vehicles with passenger-side air bag)</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• Disconnect passenger-side air bag module connector. (Vehicles with passenger-side air bag)</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• Remove B-pillar lower trims.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• Disconnect driver-and passenger-side pre-tensioner seat belt connectors.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• Remove left side wall.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• Disconnect all SAS control module connectors.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• Disconnect driver-side side air bag sensor connector.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• Inspect wiring harness between terminal 2AA of SAS control module connector and ground for following.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>— Short to power supply</td>
<td></td>
</tr>
<tr>
<td></td>
<td>— Open circuit</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• Is wiring harnesses okay?</td>
<td><strong>No</strong></td>
</tr>
<tr>
<td></td>
<td></td>
<td>Replace wiring harness.</td>
</tr>
</tbody>
</table>
ON-BOARD DIAGNOSTIC

DTC 35

DTC 35  Passenger-side side air bag sensor system (Communication error)

<table>
<thead>
<tr>
<th>DETECTION CONDITION</th>
<th>POSSIBLE CAUSE</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Warning</strong></td>
<td>Vehicles with side air bag</td>
</tr>
<tr>
<td>Detection conditions are for understanding DTC outline before performing inspection. Performing inspection with only detection conditions may cause injury due to operating error or damage the system. When performing inspection, always follow diagnostic procedure.</td>
<td>- Malfunction in wiring harness between passenger-side side air bag sensor and SAS control module.</td>
</tr>
<tr>
<td><strong>Note</strong></td>
<td>- Malfunction in passenger-side side air bag sensor circuit.</td>
</tr>
<tr>
<td>For vehicles without side air bag, DTC 22, 25, 26, 32, 35, or 37 may be indicated concurrently. In such a case, perform only the smallest DTC troubleshooting among them.</td>
<td>Vehicles without side air bag</td>
</tr>
<tr>
<td></td>
<td>- Terminal 2AA of SAS control module connector is open.</td>
</tr>
</tbody>
</table>

**Vehicles with side air bag**
- Passenger-side side air bag sensor malfunction.
- Open or short circuit in wiring harness between passenger-side side air bag sensor and SAS control module.
- SAS control module malfunction.

**Vehicles without side air bag**
- Malfunction of connector between SAS control module and ground.
- Open or short circuit in wiring harness between SAS control module and ground.
- SAS control module malfunction.

**Diagnostic procedure**

<table>
<thead>
<tr>
<th>STEP</th>
<th>INSPECTION</th>
<th>ACTION</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Is vehicle equipped with side air bag?</td>
<td>Yes</td>
</tr>
<tr>
<td></td>
<td></td>
<td>No</td>
</tr>
</tbody>
</table>

08–02–28
## ON-BOARD DIAGNOSTIC

<table>
<thead>
<tr>
<th>STEP</th>
<th>INSPECTION</th>
<th>ACTION</th>
</tr>
</thead>
</table>
| 2    | INSPECT WIRING HARNESS BETWEEN PASSENGER-SIDE SIDE AIR BAG SENSOR AND SAS CONTROL MODULE | Yes | Present malfunction diagnosis:  
Go to next step.  
Past malfunction diagnosis:  
- Replace SAS control module.  
(See 08–10–12 SAS CONTROL MODULE REMOVAL/INSTALLATION)  
No | Replace wiring harness. |

--- Warning  
- Handling air bag system components improperly can accidentally deploy air bag modules and pre-tensioner seat belts, which may seriously injure you.  
Read AIR BAG SYSTEM SERVICE WARNINGS before handling air bag system components.  
(See 08–10–3 AIR BAG SYSTEM SERVICE WARNINGS)  
- Turn ignition switch to LOCK position.  
- Disconnect negative battery cable and wait for more than 1 minute.  
- Remove column cover.  
- Disconnect clock spring connector.  
- Remove glove compartment.  
- Disconnect passenger-side side air bag module connector.  
- Disconnect driver- and passenger-side side air bag module connectors.  
- Remove B-pillar lower trim.  
- Disconnect driver- and passenger-side pre-tensioner seat belt connectors.  
- Remove left side side wall.  
- Disconnect all SAS control module connectors.  
- Disconnect passenger-side side air bag sensor connector.  
- Inspect following wiring harness between SAS control module connector and passenger-side side air bag sensor connector terminals (harness side) for short to ground, short to power supply, and open circuit:  
- 1L and A  
- 1J and B  
- 1H and C  
- 1G and D  
- Are wiring harnesses okay? | | | |

| 3    | INSPECT PASSENGER-SIDE SIDE AIR BAG SENSOR | Yes | Replace SAS control module, then go to next step.  
(See 08–10–12 SIDE AIR BAG SENSOR REMOVAL/INSTALLATION)  
No | Replace passenger-side side air bag sensor.  
(See 08–10–10 SIDE AIR BAG SENSOR REMOVAL/INSTALLATION) |

---  
- Measure resistance between terminals C and D of passenger-side side air bag sensor.  
- Is resistance approximately 1 kilohm? |

| 4    | VERIFY WHETHER PASSENGER-SIDE SIDE AIR BAG SENSOR IS MALFUNCTIONING OR NOT | Yes | Replace passenger-side side air bag sensor.  
(See 08–10–10 SIDE AIR BAG SENSOR REMOVAL/INSTALLATION)  
No | Complete inspection by DTC. |

---  
- Connect all SAS control module connectors and passenger-side side air bag sensor connector.  
- Connect clock spring connector.  
- Connect passenger-side side air bag module connector.  
- Connect driver- and passenger-side side air bag module connectors.  
- Connect driver- and passenger-side pre-tensioner seat belt connectors.  
- Connect negative battery cable.  
- Turn ignition switch to ON position.  
- Is DTC 35 indicated? | | | |
### ON-BOARD DIAGNOSTIC

#### STEP 5

**VERIFY THAT SAS CONTROL MODULE CONNECTOR TERMINAL 2AA IS GROUNDED**

**warning**
- Handling air bag system components improperly can accidentally deploy air bag modules and pre-tensioner seat belts, which may seriously injure you.
- Read AIR BAG SYSTEM SERVICE WARNINGS before handling air bag system components.
  (See 08–10–3 AIR BAG SYSTEM SERVICE WARNINGS)

- Turn ignition switch to LOCK position.
- Disconnect negative battery cable and wait for more than 1 minute.
- Remove column cover.
- Disconnect clock spring connector.
- Remove glove compartment.
- Disconnect passenger-side air bag module connector.
- Remove B-pillar lower trims.
- Disconnect driver-and passenger-side pre-tensioner seat belt connectors.
- Remove left side side wall.
- Disconnect all SAS control module connectors.
- Disconnect driver-side side air bag sensor connector.
- Inspect wiring harness between terminal 2AA of SAS control module connector and ground for following.
  - Short to power supply
  - Open circuit
- Is wiring harnesses okay?

**Present malfunction diagnosis:**
- Replace SAS control module.
  (See 08–10–12 SAS CONTROL MODULE REMOVAL/INSTALLATION)

**Past malfunction diagnosis:**
- Complete inspection by DTC.

**No**
- Replace wiring harness.

---

### DTC 37

**Detection Condition**

- Vehicles with side air bag
  - Resistance detected between terminals 1I and 1K of SAS control module is other than 1.63—2.71 ohm.
  - Short circuit in wiring harness related terminal 1I or 1K of SAS control module.

- Vehicles without side air bag
  - Terminal 2AA of SAS control module connector is open.

**Possible Cause**

- Vehicles with side air bag
  - Passenger-side side air bag module malfunction.
  - Malfunction of connectors between passenger-side side air bag module and SAS control module.
  - Open or short circuit in wiring harness between passenger-side side air bag module and SAS control module.
  - SAS control module malfunction.

- Vehicles without side air bag
  - Malfunction of connector between SAS control module and ground.
  - Open or short circuit in wiring harness between SAS control module and ground.
  - SAS control module malfunction.
## ON-BOARD DIAGNOSTIC

### Diagnostic procedure

<table>
<thead>
<tr>
<th>STEP</th>
<th>INSPECTION</th>
<th>ACTION</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Is vehicle equipped with side air bag?</td>
<td>Yes</td>
</tr>
<tr>
<td></td>
<td>No</td>
<td>Go to Step 5.</td>
</tr>
<tr>
<td>2</td>
<td>INSPECT SEPARATOR* OF PASSENGER-SIDE SIDE AIR BAG MODULE CONNECTOR</td>
<td>Yes</td>
</tr>
<tr>
<td></td>
<td>No</td>
<td>Replace wiring harness.</td>
</tr>
<tr>
<td>3</td>
<td>VERIFY WHETHER MALFUNCTION IS IN PASSENGER-SIDE SIDE AIR BAG MODULE OR OTHER PARTS</td>
<td>Yes</td>
</tr>
<tr>
<td></td>
<td>No</td>
<td>Replace passenger-side side air bag module. (See 08–10–7 SIDE AIR BAG MODULE REMOVAL/INSTALLATION)</td>
</tr>
</tbody>
</table>

### Warning

- Handling air bag system components improperly can accidentally deploy air bag modules and pre-tensioner seat belts, which may seriously injure you. Read AIR BAG SYSTEM SERVICE WARNINGS before handling air bag system components. (See 08–10–3 AIR BAG SYSTEM SERVICE WARNINGS)
- Turn ignition switch to LOCK position.
- Disconnect negative battery cable and wait more than 1 minute.
- Disconnect passenger-side side air bag module connector.
- Is separator* of passenger-side side air bag module connector okay?
- Connect leads of SST (Fuel And Thermometer checker) or apply 2 ohms resistor to passenger-side side air bag module connector terminals A and B.
- Set resistance of SST (Fuel And Thermometer checker) to 2 ohms.
- Connect negative battery cable.
- Turn ignition switch to ON position.
- Is DTC 37 indicated?
### ON-BOARD DIAGNOSTIC

<table>
<thead>
<tr>
<th>STEP</th>
<th>INSPECTION</th>
<th>ACTION</th>
</tr>
</thead>
</table>
| 4    | **INSPECT WIRING HARNESS BETWEEN PASSENGER-SIDE SIDE AIR BAG MODULE AND SAS CONTROL MODULE**  
- Turn ignition switch to LOCK position.  
- Disconnect negative battery cable and wait for more than 1 minute.  
- Remove column cover.  
- Disconnect clock spring connector.  
- Remove glove compartment.  
- Disconnect passenger-side air bag module connector.  
- Disconnect driver-side side air bag module connector.  
- Remove B-pillar lower trims.  
- Disconnect driver-and passenger-side pre-tensioner seat belt connectors.  
- Remove left side wall.  
- Disconnect all SAS control module connectors.  
- Inspect following wiring harness between SAS control module connector and passenger-side side air bag module connector terminals (harness side) for short to ground, short to power supply, and open circuit:  
  - 1I and A  
  - 1K and B  
- Are wiring harnesses okay?  
  Yes Present malfunction diagnosis:  
  - Remove SAS control module.  
  (See 08–10–12 SAS CONTROL MODULE REMOVAL/INSTALLATION)  
  Past malfunction diagnosis:  
  - Replace passenger-side side air bag module.  
  (See 08–10–7 SIDE AIR BAG MODULE REMOVAL/INSTALLATION)  
  No Replace wiring harness. |
| 5    | **VERIFY THAT SAS CONTROL MODULE CONNECTOR TERMINAL 2AA IS GROUNDED**  
* Warning  
  - Handling air bag system components improperly can accidentally deploy air bag modules and pre-tensioner seat belts, which may seriously injure you.  
  Read AIR BAG SYSTEM SERVICE WARNINGS before handling air bag system components.  
  (See 08–10–3 AIR BAG SYSTEM SERVICE WARNINGS)  
  - Turn ignition switch to LOCK position.  
  - Disconnect negative battery cable and wait for more than 1 minute.  
  - Remove column cover.  
  - Disconnect clock spring connector.  
  - Remove glove compartment.  
  - Disconnect passenger-side air bag module connector.  
  - Remove B-pillar lower trims.  
  - Disconnect driver-and passenger-side pre-tensioner seat belt connectors.  
  - Remove left side wall.  
  - Disconnect all SAS control module connectors.  
  - Disconnect driver-side side air bag sensor connector.  
  - Inspect wiring harness between terminal 2AA of SAS control module connector and ground for following.  
    - Short to power supply  
    - Open circuit  
- Are wiring harnesses okay?  
  Yes Present malfunction diagnosis:  
  - Replace SAS control module.  
  (See 08–10–12 SAS CONTROL MODULE REMOVAL/INSTALLATION)  
  Past malfunction diagnosis:  
  - Complete inspection by DTC.  
  No Replace wiring harness. |

* : Consists of the 2 parts of the female connector that separate the short bar from the terminal when connected to the male connector.

08–02–32
## ON-BOARD DIAGNOSTIC

### DTC 91

#### Air bag system warning light system

### DETECTION CONDITION

**Warning**
- Detection conditions are for understanding DTC outline before performing inspection. Performing inspection with only detection conditions may cause injury due to operating error or damage the system. When performing inspection, always follow diagnostic procedure.
- Malfunction in air bag system warning light circuit.

### POSSIBLE CAUSE

- Air bag system warning light bulb malfunction.
- METER 10 A fuse malfunction.
- Instrument cluster malfunction.
- Malfunction of connectors between instrument cluster and SAS control module.
- Open or short circuit in wiring harness between instrument cluster and SAS control module.
- SAS control module malfunction.

### DIAGNOSTIC PROCEDURE

<table>
<thead>
<tr>
<th>STEP</th>
<th>INSPECTION</th>
<th>ACTION</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Is this present malfunction diagnosis?</td>
<td>Yes: Replace SAS control module. (See 08–10–12 SAS CONTROL MODULE REMOVAL/INSTALLATION) No: Go to next step.</td>
</tr>
</tbody>
</table>
| 2    | INSPECT METER 10 A FUSE  
- Turn ignition switch to LOCK position.  
- Disconnect negative battery cable.  
- Remove METER 10 A fuse.  
- Is fuse okay? | Yes: Reinstall METER 10 A fuse, then go to next step. No: Replace METER 10 A fuse. |
| 3    | INSPECT AIR BAG SYSTEM WARNING LIGHT BULB  
- Remove instrument cluster. (See 09–22–3 INSTRUMENT CLUSTER REMOVAL/INSTALLATION)  
- Remove air bag system warning light bulb.  
- Is bulb okay? | Yes: Reinstall air bag system warning light bulb, then go to next step. No: Replace air bag system warning light bulb. |
| 4    | INSPECT INSTRUMENT CLUSTER  
- Is there continuity between instrument cluster terminals 1J and 1R? | Yes: Go to next step. No: With tachometer  
- Replace speedometer and tachometer.  
Without tachometer  
- Replace speedometer. (See 09–22–3 INSTRUMENT CLUSTER DISASSEMBLY/ASSEMBLY) |
## ON-BOARD DIAGNOSTIC

<table>
<thead>
<tr>
<th>STEP</th>
<th>INSPECTION</th>
<th>ACTION</th>
</tr>
</thead>
</table>
| 5    | INSPECT FOR CONTINUITY BETWEEN METER 10 A FUSE AND INSTRUMENT CLUSTER | Yes: Go to next step.  
No: Replace wiring harness. |
|      | • Connect negative battery cable.  
• Turn ignition switch to ON position.  
• Measure voltage at instrument cluster connector terminal 1J.  
• Is voltage more than 9 V? |
| 6    | INSPECT WIRING HARNESS BETWEEN INSTRUMENT CLUSTER AND SAS CONTROL MODULE | Yes: Go to next step.  
No: Replace wiring harness. |
|      | Warning  
• Handling air bag system components improperly can accidentally deploy air bag modules and pre-tensioner seat belts, which may seriously injure you. Read AIR BAG SYSTEM SERVICE WARNINGS before handling air bag system components. (See 08–10–3 AIR BAG SYSTEM SERVICE WARNINGS)  
• Turn ignition switch to LOCK position.  
• Disconnect negative battery cable and wait for more than 1 minute.  
• Remove column cover.  
• Disconnect clock spring connector.  
• Remove glove compartment.  
• Disconnect passenger-side air bag module connector.  
• Disconnect driver- and passenger-side side air bag module connectors. (Vehicles with side air bag)  
• Remove B-pillar trims.  
• Disconnect driver- and passenger-side pre-tensioner seat belt connectors.  
• Remove left side side wall.  
• Disconnect all SAS control module connectors.  
• Inspect wiring harness between instrument cluster connector terminal 1R and SAS control module connector terminal 2W for following.  
— Short to ground  
— Short to power supply  
— Open circuit  
• Is wiring harness okay? |
| 7    | INSPECT WIRING HARNESS BETWEEN DLC AND SAS CONTROL MODULE | Yes: Complete inspection by DTC.  
No: Replace wiring harness. |
|      | • Inspect wiring harness between FAB terminal of DLC and terminal 2W of SAS control module connector for following.  
— Short to ground  
— Short to power supply  
• Is wiring harness okay? |