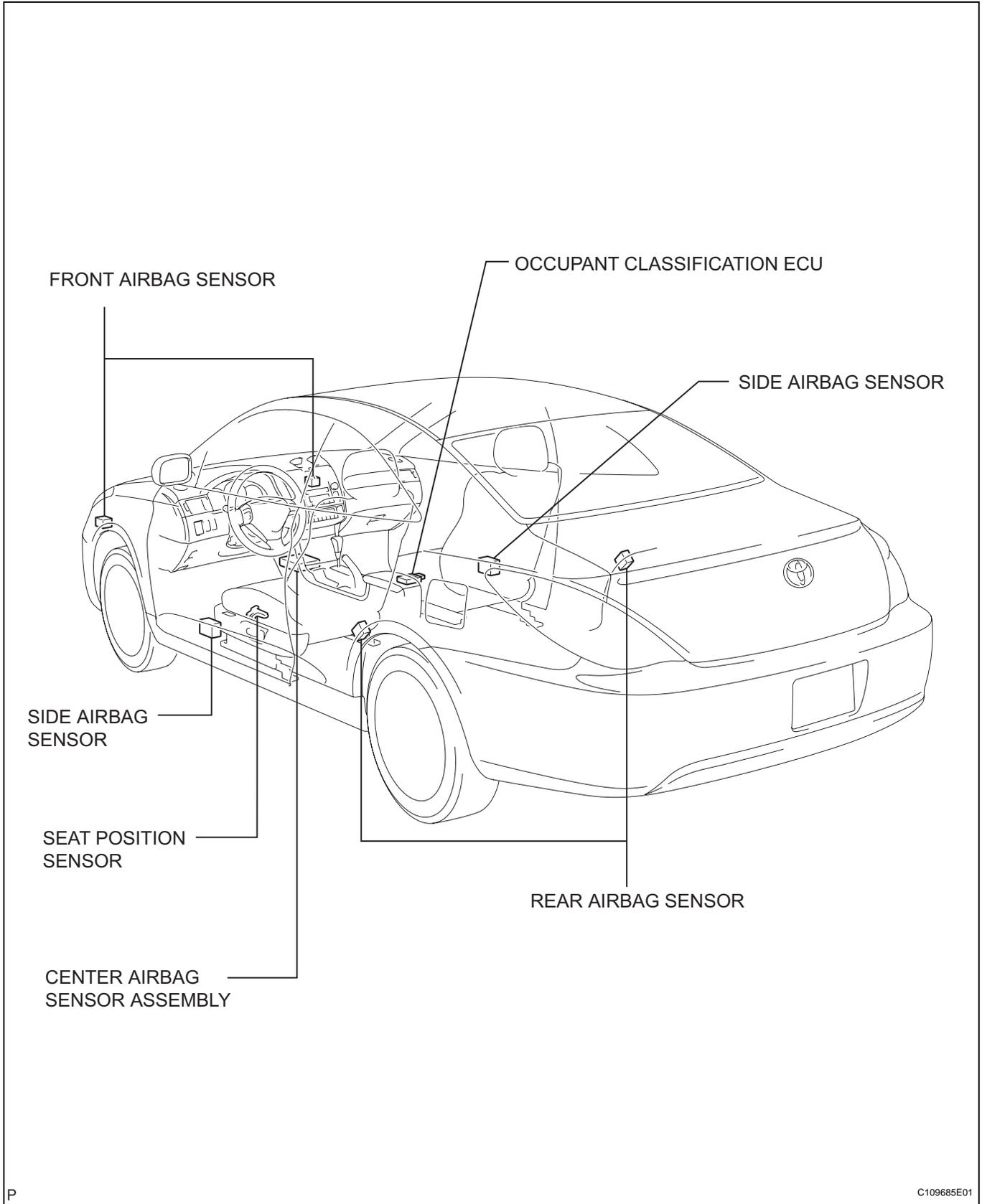
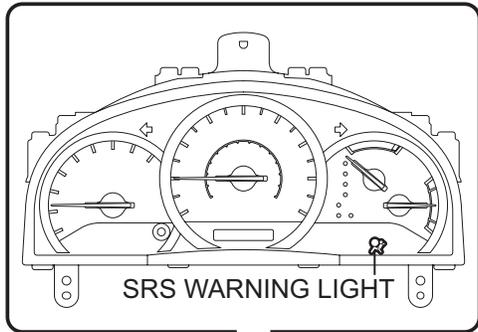


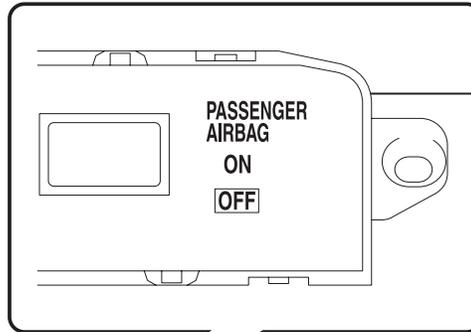
# PARTS LOCATION



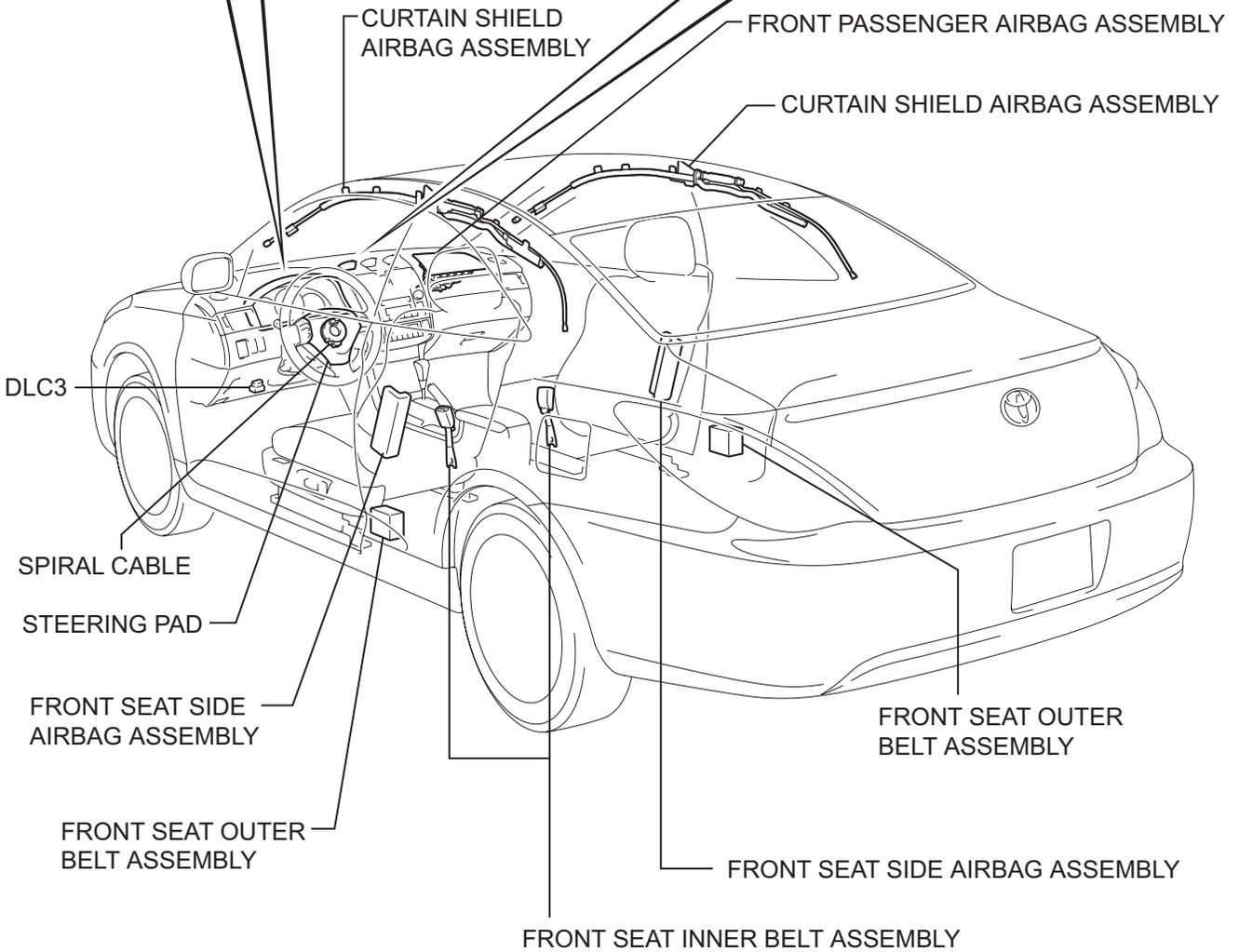
COMBINATION METER:



CLOCK ASSEMBLY:

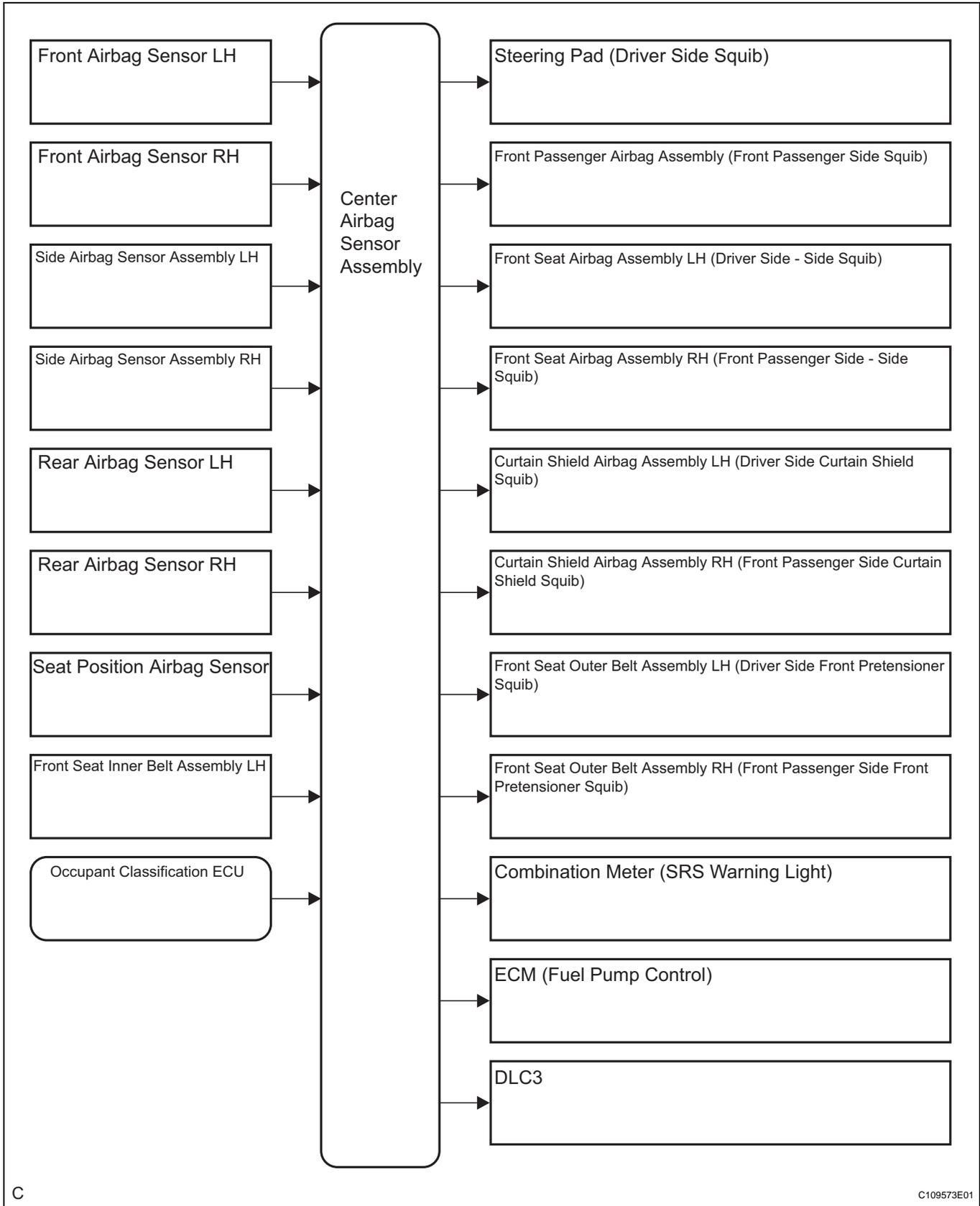


PASSENGER AIRBAG ON/OFF INDICATOR



RS

# SYSTEM DIAGRAM



## SYSTEM DESCRIPTION

### 1. GENERAL

- (a) In conjunction with impact absorbing structure for a frontal collision, the SRS (Supplemental Restraint System) driver airbag, front passenger airbag were designed to supplement seat belts in the event of a frontal collision in order to help reduce shock to the head and chest of the driver and front passenger. This system is a 3-sensor type airbag system to detect the impact during a frontal collision using the center airbag sensor assembly and front airbag sensors. It also operates the airbag system and seat belt pretensioner.
- (b) In order to detect the extent of the collision during the initial stages of the collision in further detail, the front airbag sensors have been changed from mechanical type to electrical type deceleration sensors. Accordingly, the deployment of the driver airbag and front passenger airbag is controlled in two stages according to the severity of the impact.
- (c) In conjunction with impact absorbing structure for a side collision, the front seat airbag and curtain shield airbag were designed to help reduce shock to the driver, front passenger, and rear outer passengers in the event of a side collision.
- (d) The curtain shield airbag that helps reduce shock to the front and rear seat occupants with a single curtain shield airbag has been adopted. In conjunction with this system, the side airbag sensor assemblies have been installed at the bottom of the center pillars and the rear airbag sensors has been installed at the bottom of the rear pillars respectively.
- (e) In this system, a front side collision is detected by the side airbag sensor assembly in order to simultaneously deploy the side airbags. A rear side collision is detected by the rear airbag sensor and the center airbag sensor assembly in order to deploy the side airbag and curtain shield airbag.
- (f) The center airbag sensor assembly sends the airbag deployment signal to ECM via discrete line to operate the fuel pump control.

### 2. CONSTRUCTION AND OPERATION

- (a) FRONT AIRBAG SENSOR
  - (1) The front airbag sensors are installed on the right and left radiator supports respectively.
  - (2) The front airbag sensor consists of the deceleration sensor.
  - (3) The deceleration sensor is built into the front airbag sensor, and the distortion that is created in the sensor is converted into an electric signal based on the vehicle deceleration rate during a frontal collision. Accordingly, the extent of the initial collision can be detected in detail.

- (b) SIDE AIRBAG SENSOR ASSEMBLY
- (1) The side airbag sensor assemblies are installed on the bottom of the right and left center pillars respectively.
  - (2) The side airbag sensor assembly consists of the deceleration sensor and ignition control circuit.
  - (3) The deceleration sensor is built into the side airbag sensor assembly, and the distortion that is created in the sensor is converted into an electric signal based on the vehicle deceleration rate during a front side collision. Accordingly, the extent of the initial collision can be detected in detail.
- (c) REAR AIRBAG SENSOR
- (1) The rear airbag sensors are installed on the right and left rear pillars respectively.
  - (2) The rear airbag sensor consists of the deceleration sensor and ignition control circuit.
  - (3) The deceleration sensor is built into the rear airbag sensor, and the distortion that is created in the sensor is converted into an electric signal based on the vehicle deceleration rate during a rear side collision. Accordingly, the extent of the initial collision can be detected in detail.
- (d) CENTER AIRBAG SENSOR ASSEMBLY
- (1) General
    - The center airbag sensor assembly is installed on the center floor under the A/C unit.
    - The center airbag sensor assembly consists of the deceleration sensor, safing sensor, electronic safing sensor, ignition control circuit and diagnostic circuit.
    - The center airbag sensor assembly receives signals from the deceleration sensor and safing sensor built into the center airbag sensor assembly and front airbag sensor. Then the center airbag sensor assembly determines whether or not the driver airbag, front passenger airbag and front seat belt pretensioners should be activated, and diagnoses system malfunctions.
    - The center airbag sensor assembly causes the front seat airbag and the curtain shield airbag to deploy when receiving signals from the side airbag sensor assembly.
    - The center airbag sensor assembly receives signals from the deceleration sensor and the electronic safing sensor built into the center airbag sensor assembly and the rear airbag sensor, and determines whether or not the side airbag and curtain shield airbag should be activated, and diagnoses system malfunctions.

- The center airbag sensor assembly sends the airbag deployment signal to ECM via discrete line to operate the fuel pump control.
- (2) Deceleration sensor and ignition control circuit
- The deceleration sensor is built into the center airbag sensor assembly.
  - The ignition control circuit performs calculations based on the signal output from the deceleration sensors of the center airbag sensor assembly and front airbag sensor. If the calculated values are greater than the specified values, it activates ignition operation.
- (3) Safing sensor
- The safing sensor is built into the center airbag sensor assembly. During a frontal collision, the sensor turns on and outputs an ON signal to the center airbag sensor assembly if a deceleration rate greater than the specified value is applied to the safing sensor.
- (4) Electronic safing sensor
- The electronic safing sensor is built into the center airbag sensor assembly. During a side collision, the sensor turns on and outputs an ON signal to the center airbag sensor assembly if a deceleration rate greater than the specified value is applied to the electronic safing sensor.
- (5) Backup power source
- The backup power source consists of a power supply capacitor and a DC-DC converter. When the power system does not function during a collision, the power supply capacitor discharges and supplies electric power to the system. The DC-DC converter operates as a boosting transformer when the battery voltage falls below a predetermined level.
- (6) Diagnostic circuit
- This circuit constantly diagnoses system malfunctions. When a malfunction is detected, it lights up the SRS warning light on the clock assembly to inform the driver.
- (7) Memory circuit
- When a malfunction is detected in the diagnostic circuit, it is coded and stored in the memory circuit.

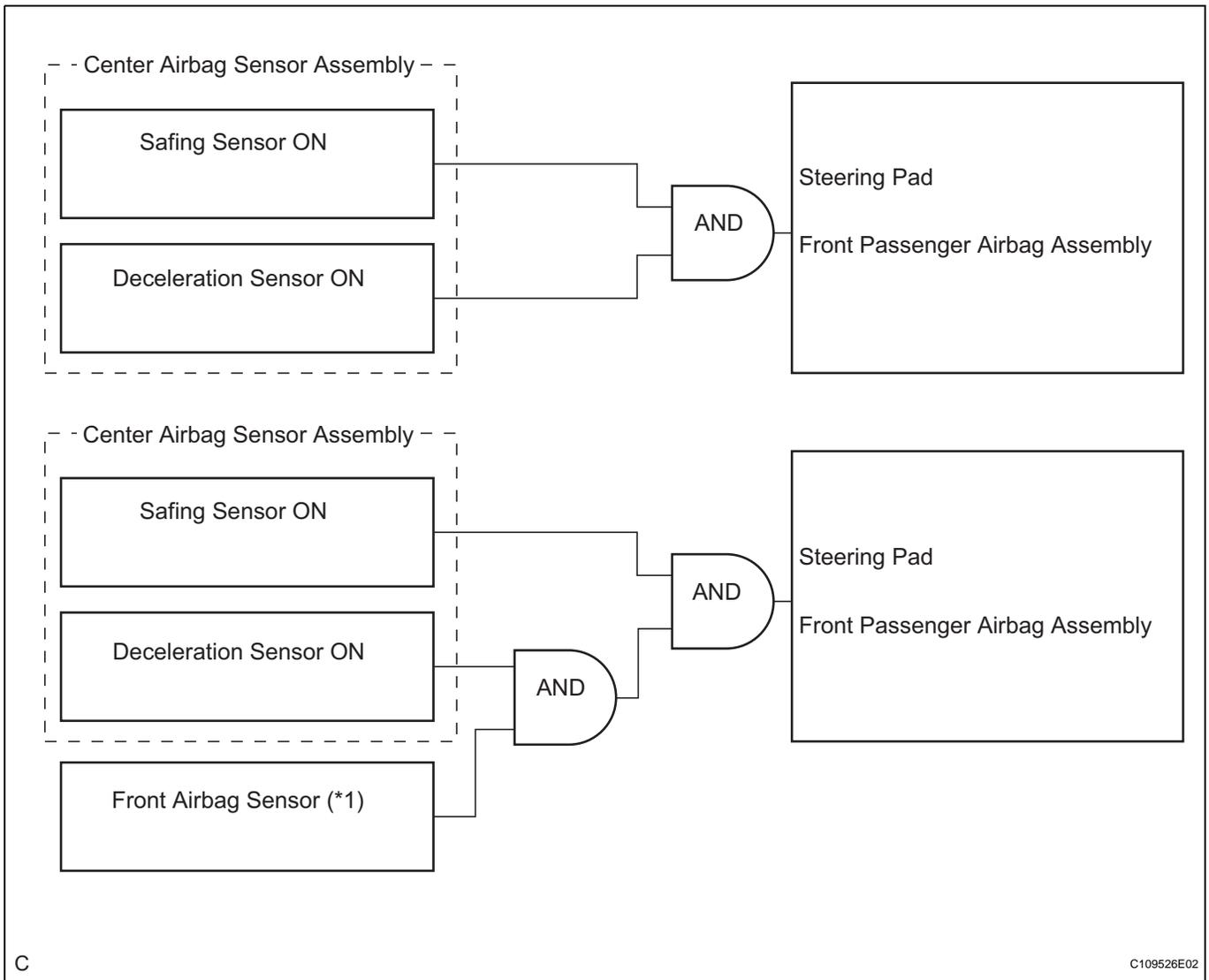
## (e) SRS WARNING LIGHT

- (1) The SRS warning light is located on the clock assembly. It comes on to inform the driver of system trouble when a malfunction is detected in self-diagnosis of the center airbag sensor assembly. Under normal operating conditions when the ignition switch is turned to the ON position, it comes on for approximately 6 seconds and then goes off.

**3. DEPLOYMENT CONDITION**

When the vehicle collides and the shock is greater than the specified value, the SRS is activated automatically. The center airbag sensor assembly includes the safing sensor and deceleration sensor. The safing sensor was designed to be turned on at a smaller deceleration rate than the deceleration sensor.

- (a) The center airbag sensor assembly determines whether or not ignition is necessary based on signals from the deceleration sensor and the front airbag sensor (\*1). If the safing sensor turns on simultaneously, current flows to the squibs to deploy the SRS as shown in the illustration below.



**RS**

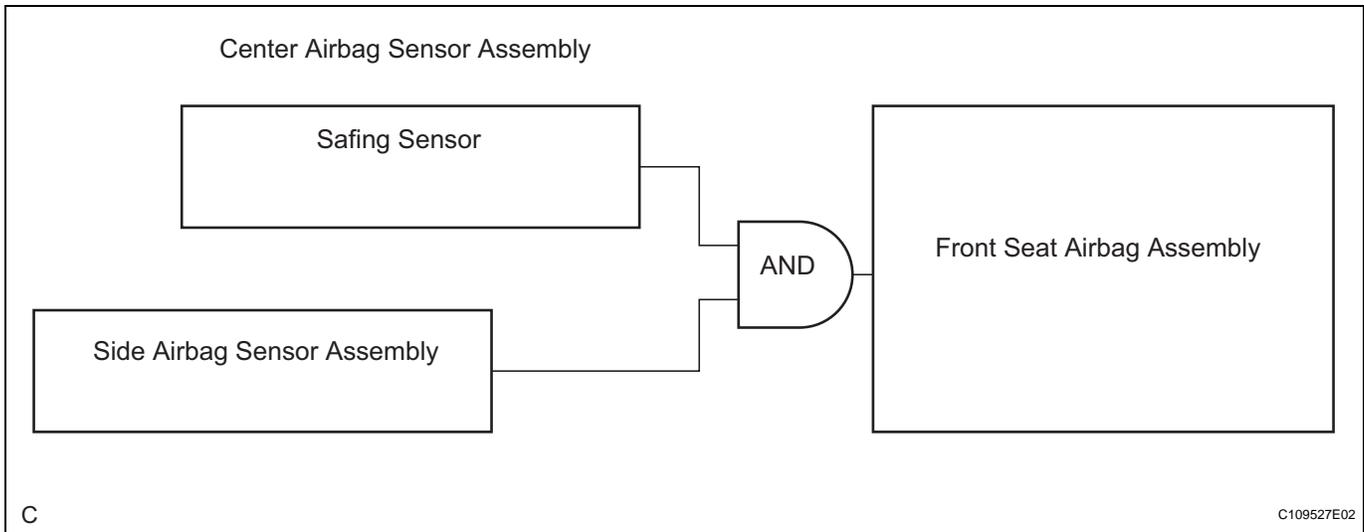
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**HINT:**

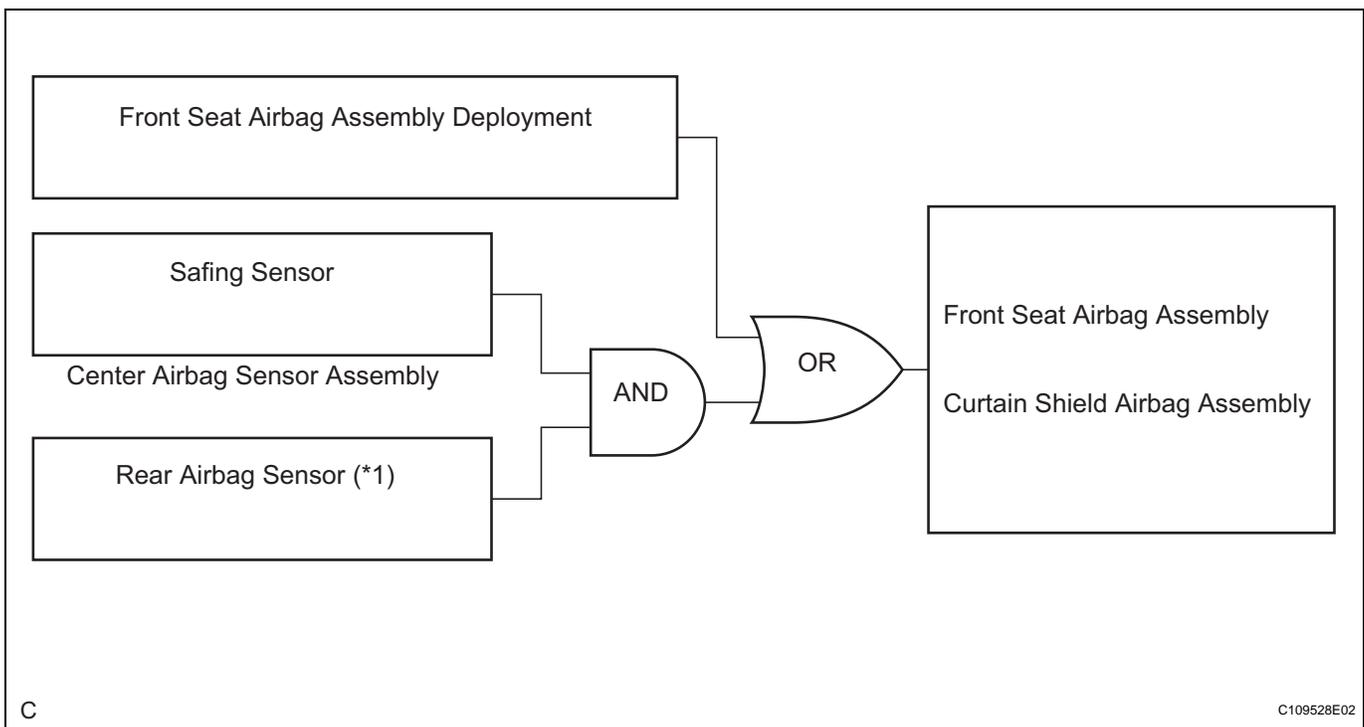
\*1: In case of front collision, the ignition signal could be output with the deceleration sensor ON signal even without a signal from the front airbag sensor.

- (b) The center airbag sensor assembly determines whether or not ignition is necessary based on signals from the side airbag sensor assembly. If the safing sensor turns on simultaneously, current flows to the squib to deploy the SRS as shown in the illustration below.



- (c) The center airbag sensor assembly determines whether or not ignition is necessary based on signals from the rear airbag sensor. If the safing sensor turns on simultaneously, current flows to the squib to deploy the SRS as shown in the illustration below (\*1).

RS



HINT:

\*1: If the front seat airbag assembly deploys, the curtain shield airbag assembly will also deploy, regardless of whether the signal is output from the rear airbag sensor.

## HOW TO PROCEED WITH TROUBLESHOOTING

The intelligent tester can be used in steps 4, 6, 8 and 9.

**1** VEHICLE BROUGHT TO WORKSHOP

NEXT

**2** CUSTOMER PROBLEM ANALYSIS

(a) Confirm problem symptoms.

NEXT

**3** WARNING LIGHT CHECK

NEXT

**4** CHECK DTC (Present and Past DTCs)



DTC IS OUTPUT (INCLUDING NORMAL SYSTEM CODE): Go to step 5



DTC IS NOT OUTPUT: PROBLEM SYMPTOMS TABLE

**5** DTC CHART

NEXT

**6** CIRCUIT INSPECTION

NEXT

**7** REPAIR

NEXT

**8** CLEAR DTC (Present and Past DTCs)

NEXT

<b>9</b>	<b>CHECK DTC (Present and Past DTCs)</b>
----------	--



<b>DTC IS NOT OUTPUT: Go to step 10</b>
---



<b>DTC IS OUTPUT: Go to step 5</b>
------------------------------------

<b>10</b>	<b>CONFIRMATION TEST</b>
-----------	--------------------------

<b>NEXT</b>
-------------

<b>END</b>
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<b>DTC</b>	<b>B1630/23</b>	<b>Driver Side Rear Airbag Sensor Circuit Malfunction</b>
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**DESCRIPTION**

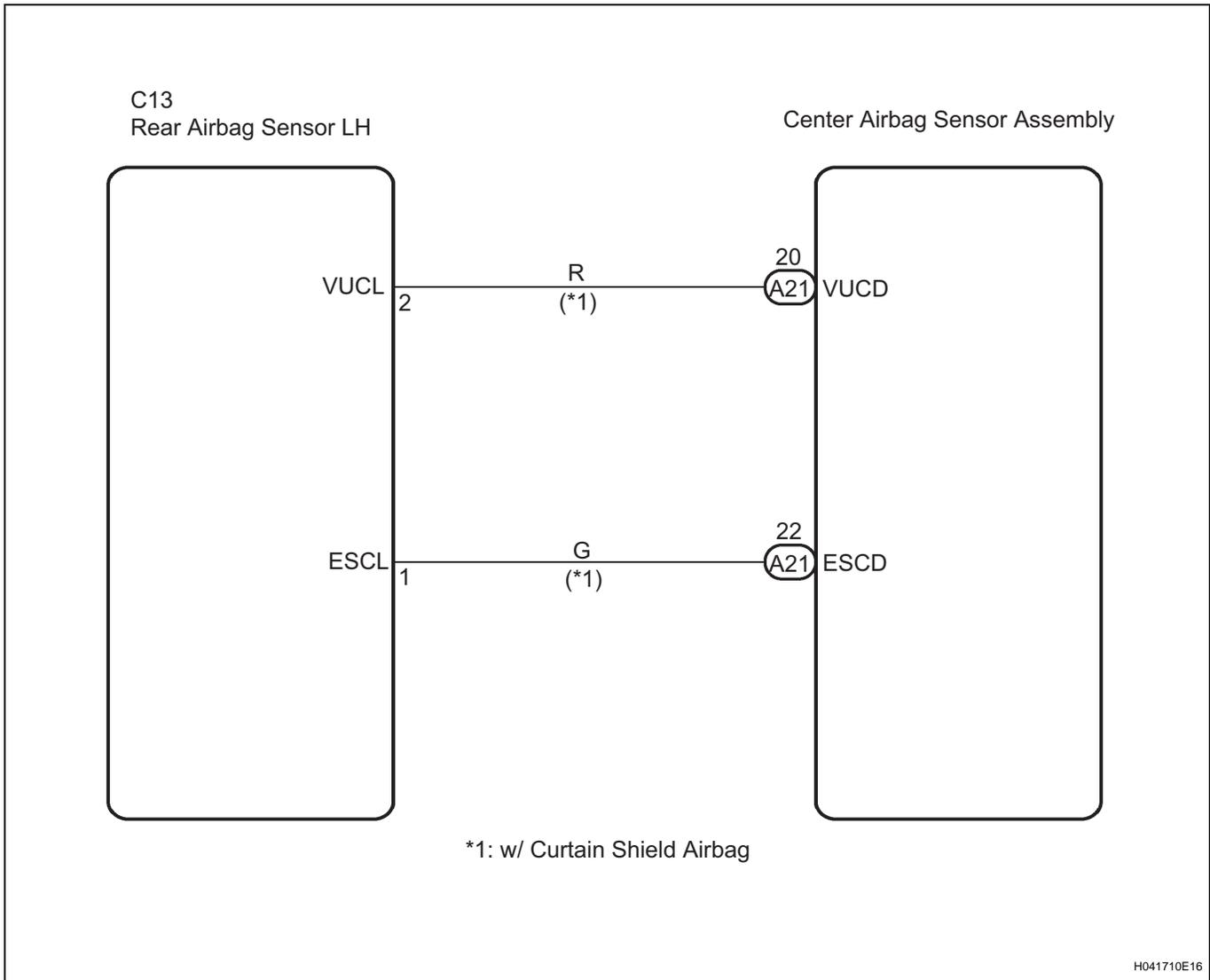
The rear airbag sensor LH consists of the safing sensor, the diagnostic circuit, the lateral deceleration sensor, etc.

If the center airbag sensor assembly receives signals from the lateral deceleration sensor, it determines whether or not the SRS should be activated.

DTC B1630/23 is recorded when a malfunction is detected in the driver side rear airbag sensor circuit.

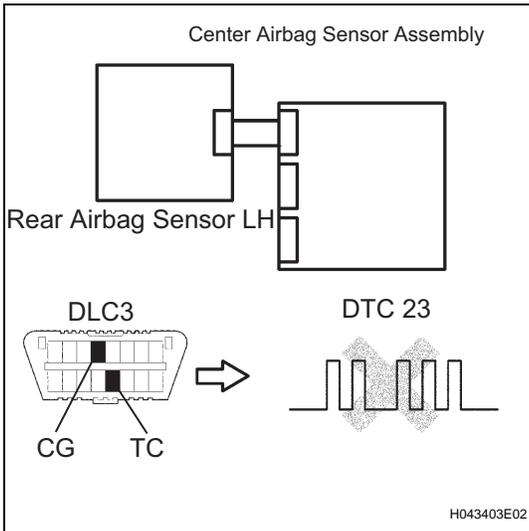
DTC No.	DTC Detecting Condition	Trouble Area
B1630/23	<ul style="list-style-type: none"> <li>The center airbag sensor assembly receives a line short circuit signal, an open circuit signal, a short circuit to ground signal or a short circuit to B+ signal in the driver side rear airbag sensor circuit for 2 seconds.</li> <li>Rear airbag sensor LH malfunction</li> <li>Center airbag sensor assembly malfunction</li> </ul>	<ul style="list-style-type: none"> <li>Floor wire</li> <li>Rear airbag sensor LH</li> <li>Center airbag sensor assembly</li> </ul>

**WIRING DIAGRAM**



RS

**1 CHECK DTC**



- (a) Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- (b) Clear the DTCs stored in memory (See page RS-36).
- (c) Turn the ignition switch to the LOCK position.
- (d) Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- (e) Check the DTCs (See page RS-36).

**OK:**

**DTC B1630/23 is not output.**

**HINT:**

Codes other than DTC B1630/23 may be output at this time, but they are not related to this check.

**OK** → **USE SIMULATION METHOD TO CHECK**

**NG**

**2 CHECK CONNECTION OF CONNECTORS**

- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery, and wait for at least 90 seconds.
- (c) Check that the connectors are properly connected to the center airbag sensor assembly and the rear airbag sensor LH.

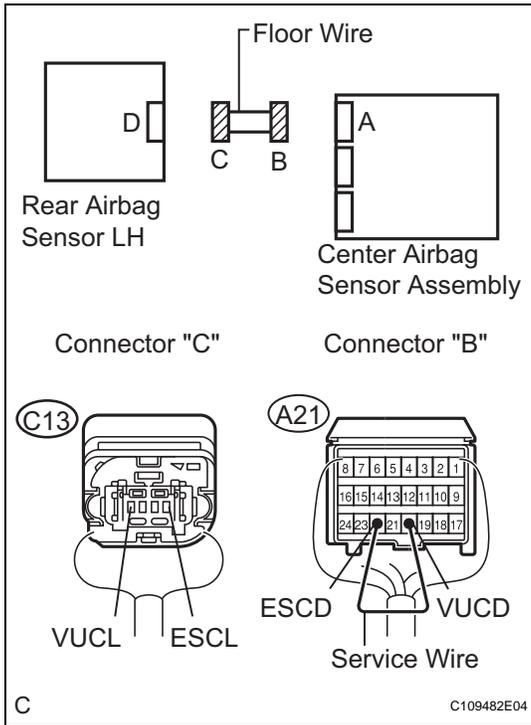
**OK:**

**The connectors are connected.**

**NG** → **CONNECT CONNECTORS, THEN GO TO STEP 1**

**OK**

**3 CHECK FLOOR WIRE (OPEN)**



(a) Disconnect the connectors from the center airbag sensor assembly and the rear airbag sensor LH.

(b) Using a service wire, connect A21-20 (VUCD) and A21-22 (ESCD) of connector "B".

**NOTICE:**

**Do not forcibly insert a service wire into the terminals of the connector when connecting.**

(c) Measure the resistance according to the value(s) in the table below.

**Resistance**

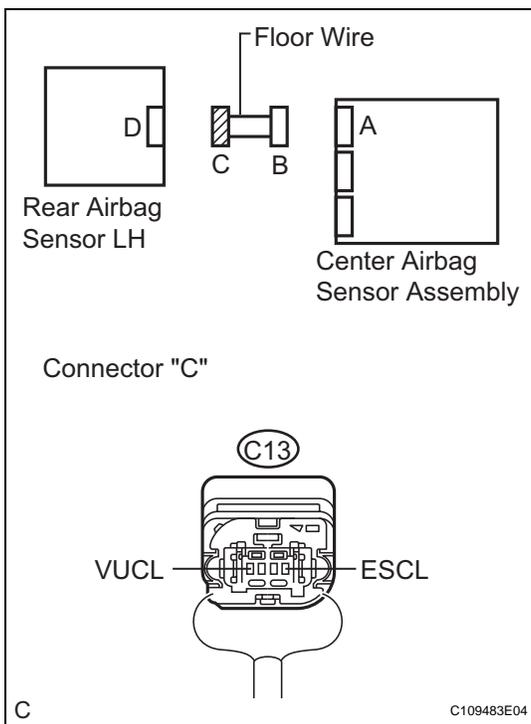
Tester connection	Condition	Specified condition
C13-2 (VUCL) - C13-1 (ESCL)	Always	Below 1 Ω

**NG** REPAIR OR REPLACE FLOOR WIRE

**OK**

RS

**4 CHECK FLOOR WIRE (SHORT)**



(a) Disconnect the service wire from connector "B".

(b) Measure the resistance according to the value(s) in the table below.

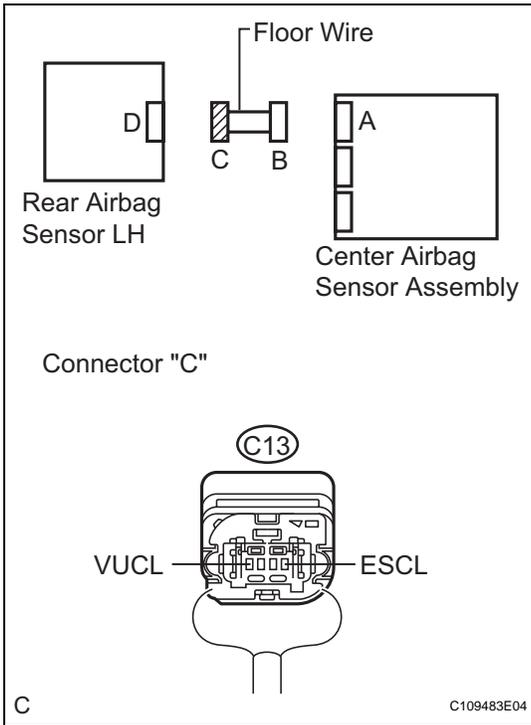
**Resistance**

Tester connection	Condition	Specified condition
C13-2 (VUCL) - C13-1 (ESCL)	Always	1 MΩ or higher

**NG** REPAIR OR REPLACE FLOOR WIRE

**OK**

**5 CHECK FLOOR WIRE (SHORT TO B+)**



- (a) Connect the negative (-) terminal cable to the battery, and wait for at least 2 seconds.
- (b) Turn the ignition switch to the ON position.
- (c) Measure the voltage according to the value(s) in the table below.

**Voltage**

Tester connection	Condition	Specified condition
C13-2 (VUCL) - Body ground	Ignition switch ON	Below 1 V
C13-1 (ESCL) - Body ground	Ignition switch ON	Below 1 V

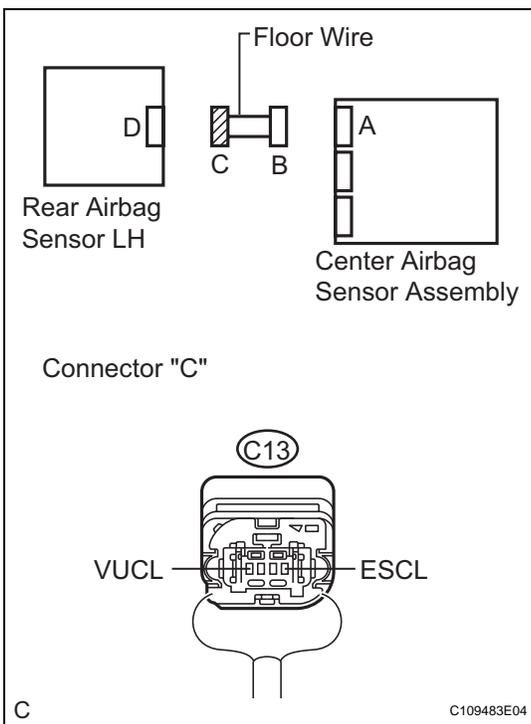
**NG**

**REPAIR OR REPLACE FLOOR WIRE**

**OK**

**RS**

**6 CHECK FLOOR WIRE (SHORT TO GROUND)**



- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery, and wait for at least 90 seconds.
- (c) Measure the resistance according to the value(s) in the table below.

**Resistance**

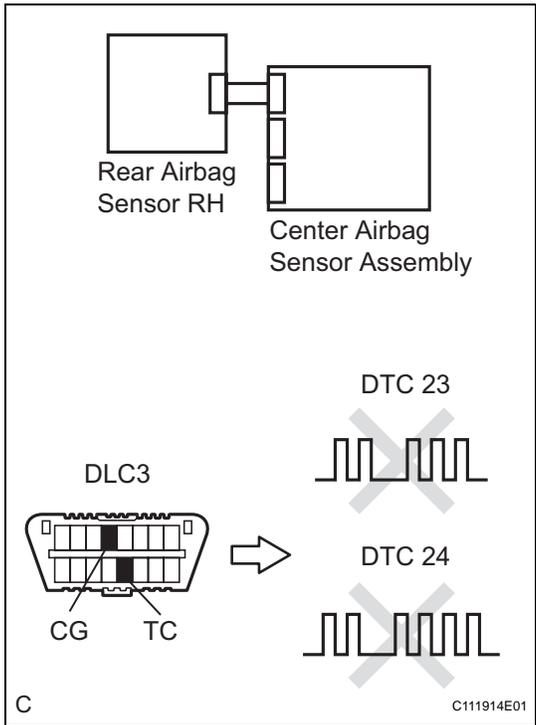
Tester connection	Condition	Specified condition
C13-2 (VUCL) - Body ground	Always	1 MΩ or higher
C13-1 (ESCL) - Body ground	Always	1 MΩ or higher

**NG**

**REPAIR OR REPLACE FLOOR WIRE**

**OK**

**7 CHECK REAR AIRBAG SENSOR LH**



- (a) Connect the connectors to the center airbag sensor assembly.
- (b) Interchange the rear airbag sensor LH with RH and connect the connectors to them.
- (c) Connect the negative (-) terminal cable to the battery, and wait for at least 2 seconds.
- (d) Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- (e) Clear the DTCs stored in memory (See page RS-36).
- (f) Turn the ignition switch to the LOCK position.
- (g) Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- (h) Check the DTCs (See page RS-36).

**Result**

Result	Proceed to
DTC B1630/23 is output.	A
DTC B1635/24 is output.	B
DTC B1630/23 and B1635/24 are not output.	C

- A** → REPLACE CENTER AIRBAG SENSOR ASSEMBLY
- B** → REPLACE REAR AIRBAG SENSOR LH

**C**

**USE SIMULATION METHOD TO CHECK**

**RS**

# AIRBAG SYSTEM

## PRECAUTION

### CAUTION:

- The vehicle is equipped with a Supplemental Restraint System (SRS). It consists of a driver airbag, front passenger airbag, side airbag and curtain shield airbag. Failure to carry out service operations in the correct sequence could cause the SRS to unexpectedly deploy during servicing, possibly leading to a serious accident. Further, if a mistake is made in servicing the SRS, it is possible that the SRS may fail to operate when required. Before performing servicing (including removal or installation of parts, inspection or replacement), be sure to read the following items carefully, then follow the correct procedures indicated in the repair manual.
- Wait at least 90 seconds after the ignition switch is turned to the LOCK position and the negative (-) terminal cable is disconnected from the battery before starting the operation.  
(The SRS is equipped with a backup power source, so that if work is started within 90 seconds after disconnecting the negative (-) terminal cable of the battery, the SRS may be deployed.)
- Do not expose the steering pad, front passenger airbag assembly, center airbag sensor assembly, front airbag sensor, front seat inner belt assembly, seat position airbag sensor, front seat airbag assembly, side airbag sensor assembly, curtain shield airbag assembly, or rear airbag sensor directly to hot air or flames.

### NOTICE:

- Malfunction symptoms of the SRS are difficult to confirm, so DTCs are the most important source of information when troubleshooting. When troubleshooting the SRS, always inspect DTCs before disconnecting the battery.
- Even in the case of a minor collision when the SRS does not deploy, the steering pad, front passenger airbag assembly, center airbag sensor assembly, front airbag sensor, front seat inner belt assembly, seat position airbag sensor, front seat airbag assembly, side airbag sensor assembly, curtain shield airbag assembly, or rear airbag sensor should be inspected.
- Before repair work, remove the airbag sensor if any kind of shock is likely to occur to the airbag sensor during the operation.
- Never use SRS parts from another vehicle. When replacing parts, replace them with new ones.

- Never disassemble or repair any of the following parts in order to reuse them. If any of these parts have been dropped, or a defect is found (e.g. cracks, dents or any other defects) in any of the housings, brackets or connectors, then replace the part with a new one.
  - (a) Steering Pad
  - (b) Front Passenger Airbag Assembly
  - (c) Front Seat Airbag Assembly
  - (d) Curtain Shield Airbag Assembly
  - (e) Center Airbag Sensor Assembly
  - (f) Front Airbag Sensor
  - (g) Front Seat Outer Belt Assembly
  - (h) Front Seat Inner Belt Assembly
  - (i) Seat Position Airbag Sensor
  - (j) Side Airbag Sensor Assembly
  - (k) Rear Airbag Sensor
- Use a volt/ohmmeter with high impedance (10 k $\Omega$ /V minimum) for troubleshooting the electrical circuits.
- Information labels are attached near the SRS components. Follow the instructions in the caution.
- After work on the SRS is completed, perform the SRS warning light check (See page [RS-30](#)).
- When the negative (-) terminal cable is disconnected from the battery, the memory will be cleared. Because of this, be sure to make a record of the contents memorized in each system before starting work. When work is finished, adjust each system as it was before. Never attempt to avoid erasing vehicle system memories by using a backup power supply from outside the vehicle.
- If the vehicle is equipped with a mobile communication system, refer to the precaution in the INTRODUCTION section.
- When disconnecting the negative (-) battery cable, initialize the following systems after the cable is reconnected.

RS

System Name	See procedure
Power Window Control System	<a href="#">IN-24</a>
Sliding Roof System	<a href="#">IN-24</a>

## 1. HANDLING PRECAUTIONS FOR AIRBAG SENSORS

### HINT:

In the airbag system, the center airbag sensor assembly, front airbag sensor LH and RH, side airbag sensor assembly LH and RH, rear airbag sensor LH and RH are collectively referred to as the airbag sensors.

- (a) Before starting the following operations, wait for at least 90 seconds after disconnecting the negative (-) terminal cable from the battery:
  - (1) Replacement of the airbag sensors.
  - (2) Adjustment of the front/rear doors of the vehicle equipped with the side airbag and curtain shield airbag (fitting adjustment).

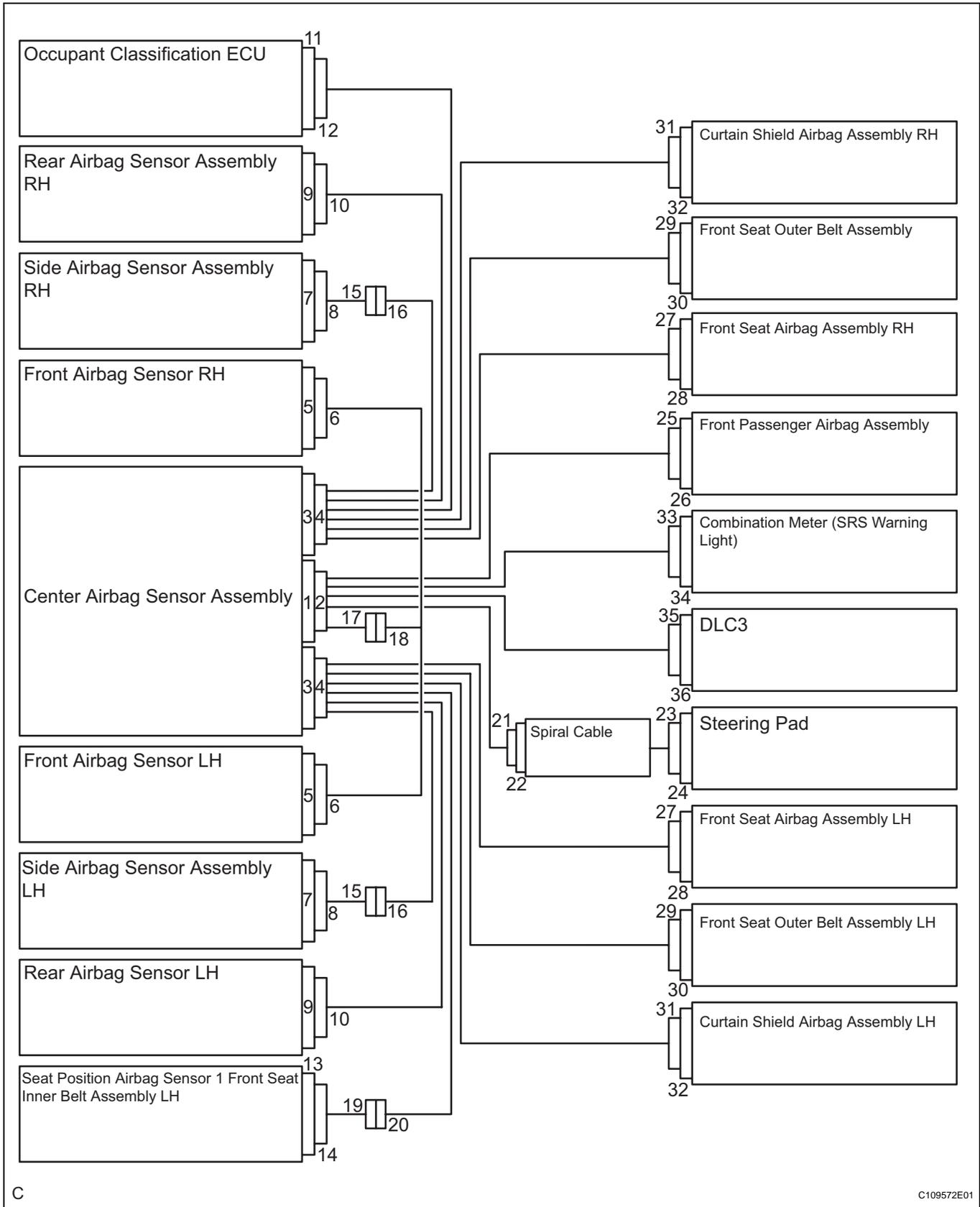
- (b) When connecting or disconnecting the airbag sensor connectors, ensure that each sensor is installed in the vehicle.
- (c) Do not use the airbag sensors which has been dropped during the operation or transportation.
- (d) Do not disassemble the airbag sensors.

**2. INSPECTION PROCEDURE FOR VEHICLE INVOLVED IN ACCIDENT**

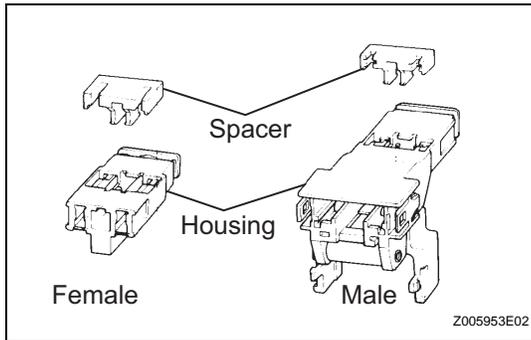
- (a) When the airbag has not deployed, confirm the DTCs by checking the SRS warning light. If there is any malfunction in the SRS airbag system, perform troubleshooting.
- (b) When any of the airbags have deployed, replace the airbag sensors and check the installation condition.

### 3. SRS CONNECTORS

(a) SRS connectors are located as shown in the following illustration.



No.	Item	Application
(1)	Terminal Twin-Lock Mechanism	Connectors 2, 4, 6, 8, 10, 14, 15, 16, 17, 18, 20, 21, 27, 28, 31, 32
(2)	Activation Prevention Mechanism	Connectors 2, 4, 22, 24, 26, 28, 30, 32
(3)	Half Connection Prevention Mechanism	Connectors 6, 8, 10, 15, 18, 21, 27, 31
(4)	Connector Lock Mechanism (1)	Connectors 23, 25, 29
(5)	Connector Lock Mechanism (2)	Connectors 2, 4
(6)	Improper Connection Prevention Lock Mechanism	Connectors 1, 3

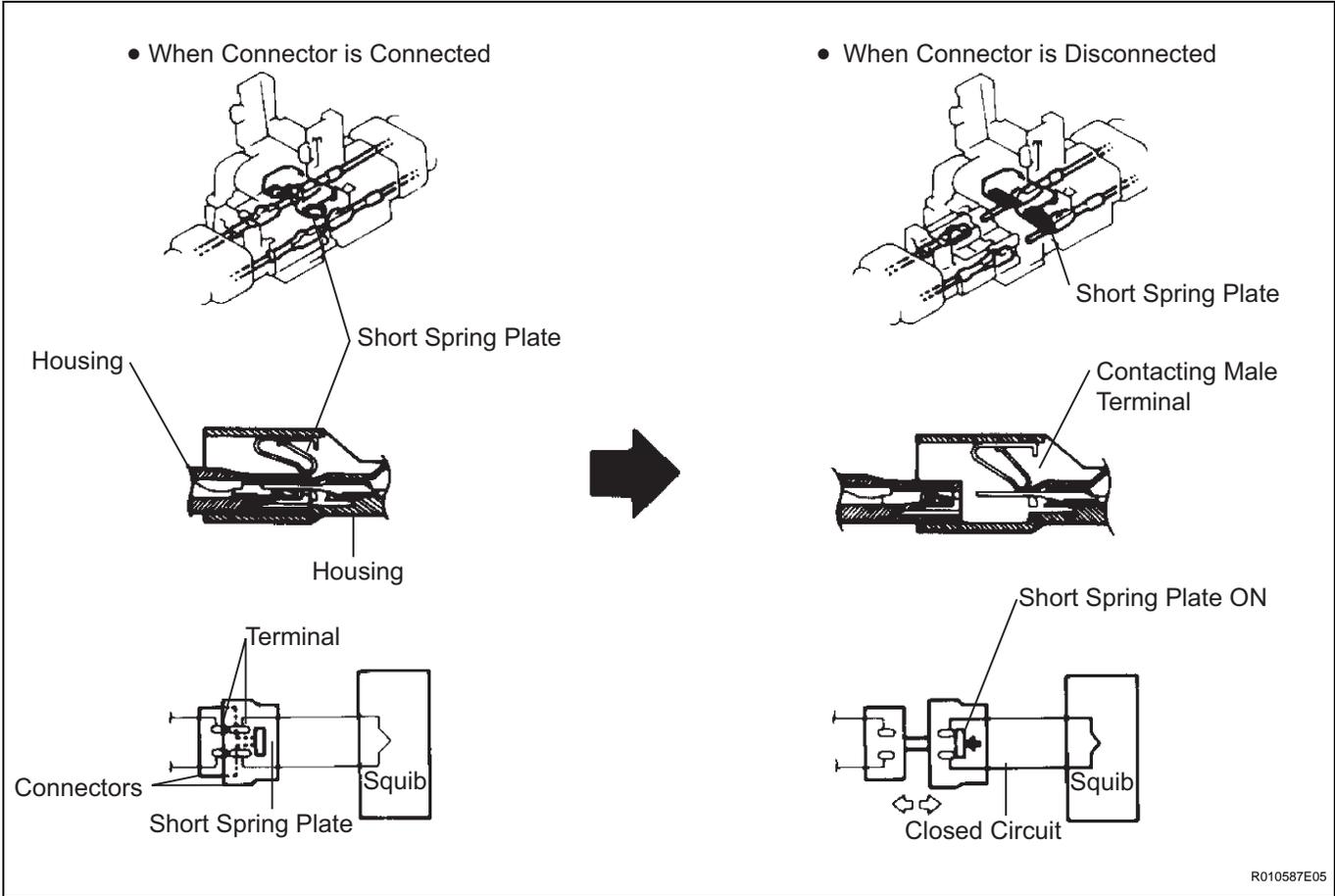


(b) All connectors in the SRS, except the seat position airbag sensor connector, are colored yellow to distinguish them from other connectors. These connectors have special functions, and are specially designed for the SRS. All SRS connectors use durable gold-plated terminals, and are placed in the locations shown on the previous page to ensure high reliability.

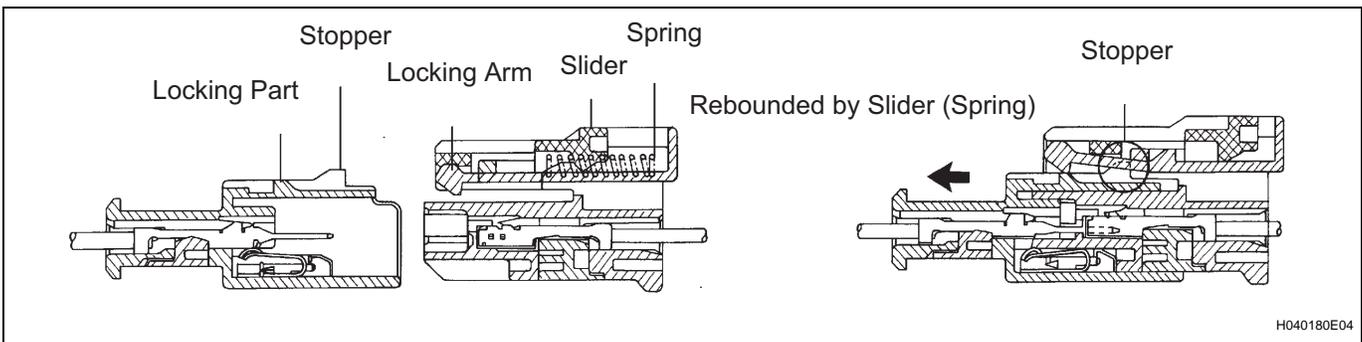
(1) Terminal twin-lock mechanism:

All connectors with a terminal twin-lock mechanism have a two-piece component consisting of a housing and a spacer. This design enables the terminal to be locked securely by two locking devices (the retainer and the lance) to prevent terminals from coming out.

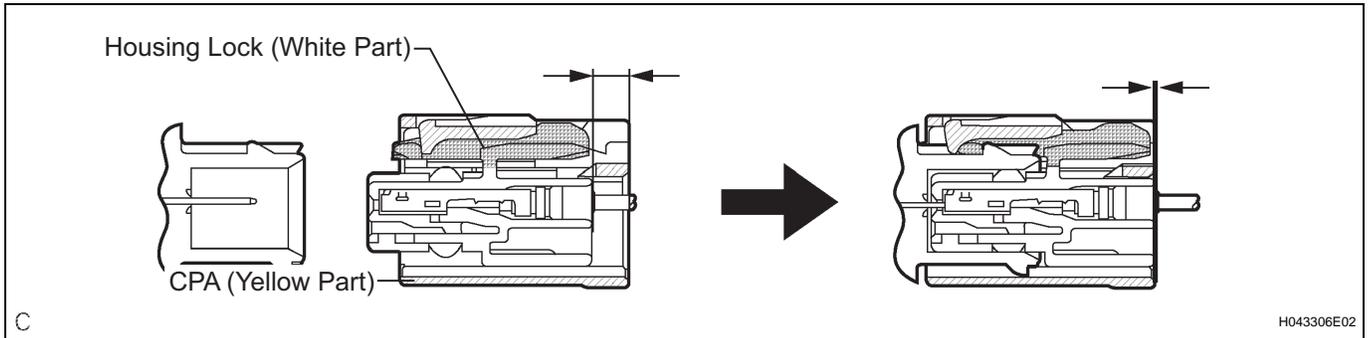
(2) Activation prevention mechanism:  
All connectors with an activation prevention mechanism contain a short spring plate. When these connectors are disconnected, the short spring plate creates a short circuit by automatically connecting the positive (+) and negative (-) terminals of the squib.



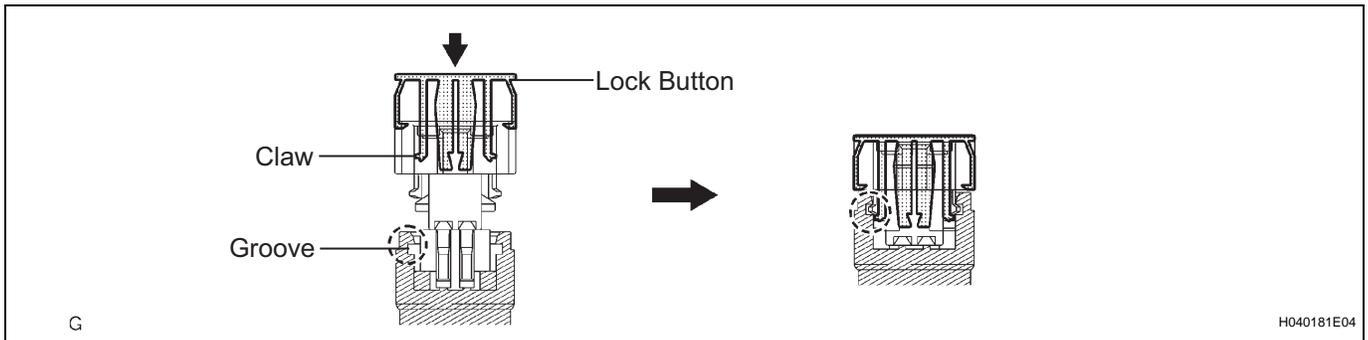
(3) Half connection prevention mechanism:  
If the connector is not completely connected, the connector is disconnected due to the spring operation so that no continuity exists.



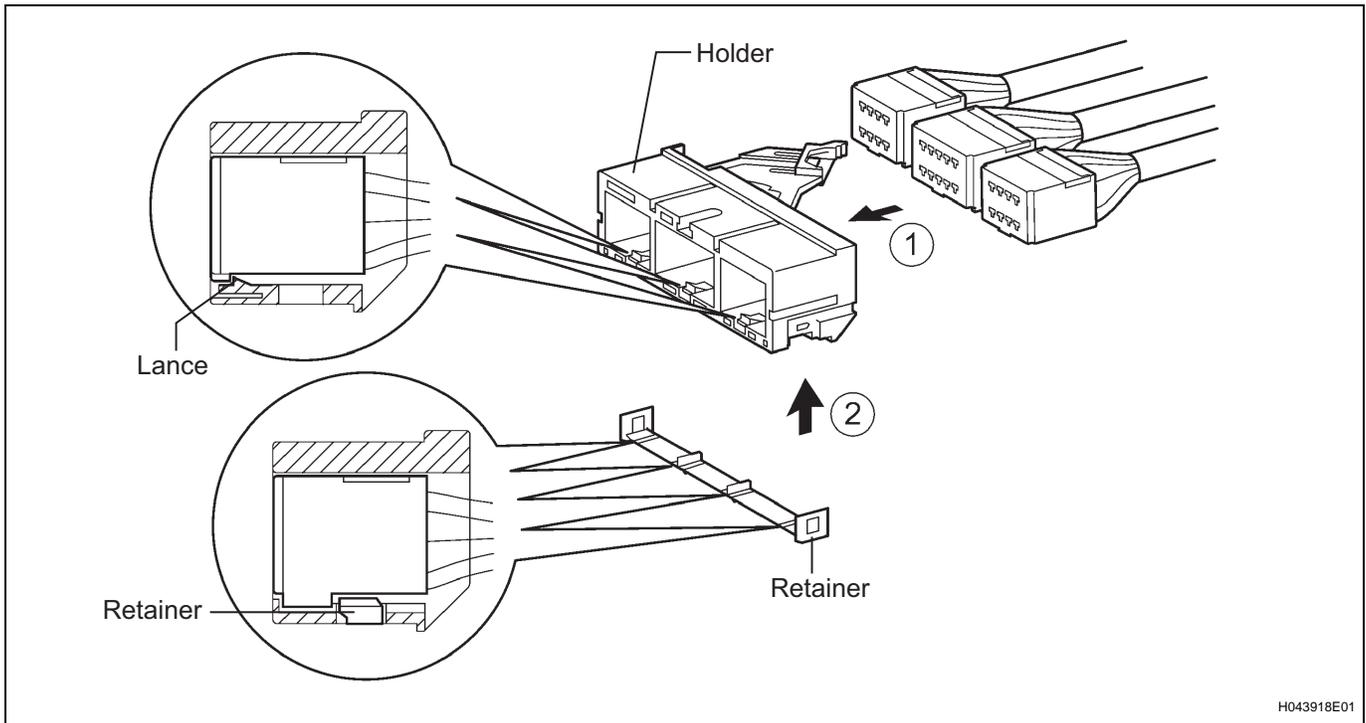
- (4) Connector position assurance mechanism:  
 Only when the housing lock (white part) is completely engaged, the CPA (yellow part) slides, which completes the connector engagement.



- (5) Connector lock mechanism (1):  
 Locking the connector lock button connects the connector securely.



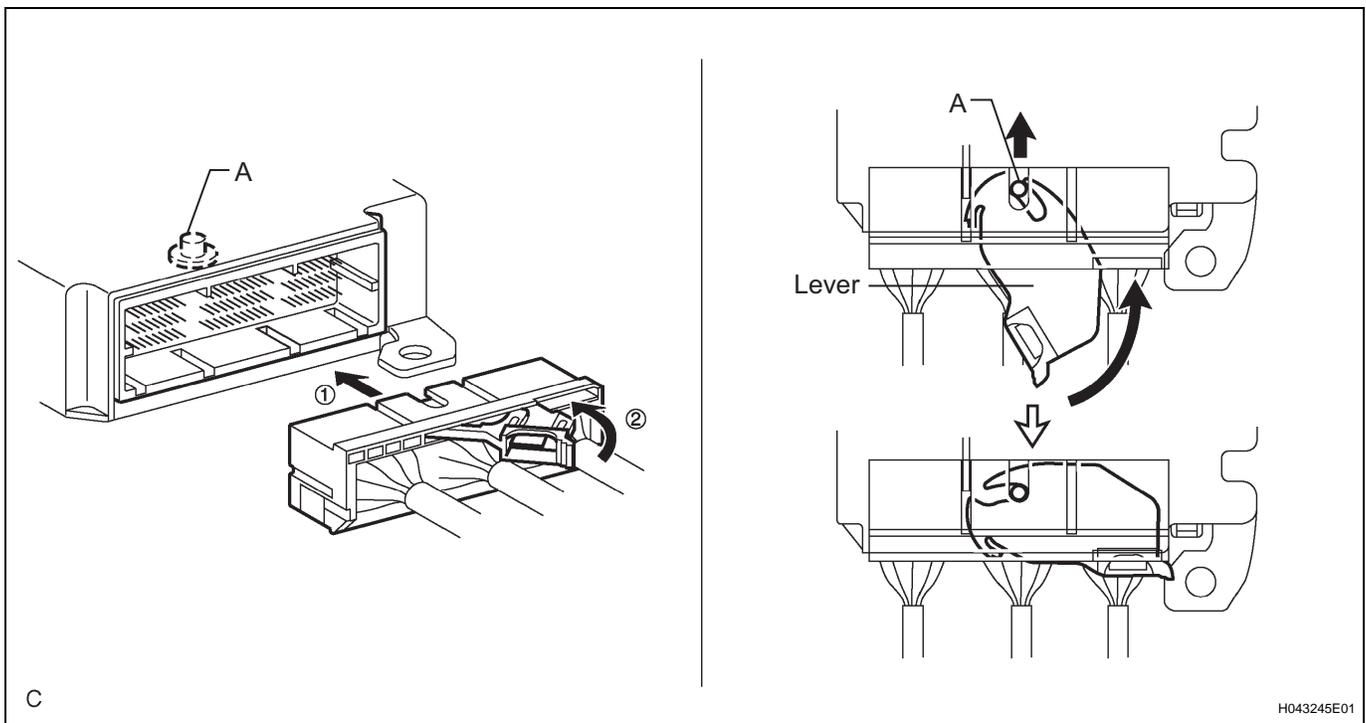
(6) Connector lock mechanism (2):  
Both the primary lock with holder lances and the secondary lock with retainer prevent the connectors from becoming disconnected.



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(7) Improper connection prevention lock mechanism:  
When connecting the holder, the lever is pushed into the end by rotating around the A axis to lock the holder securely.



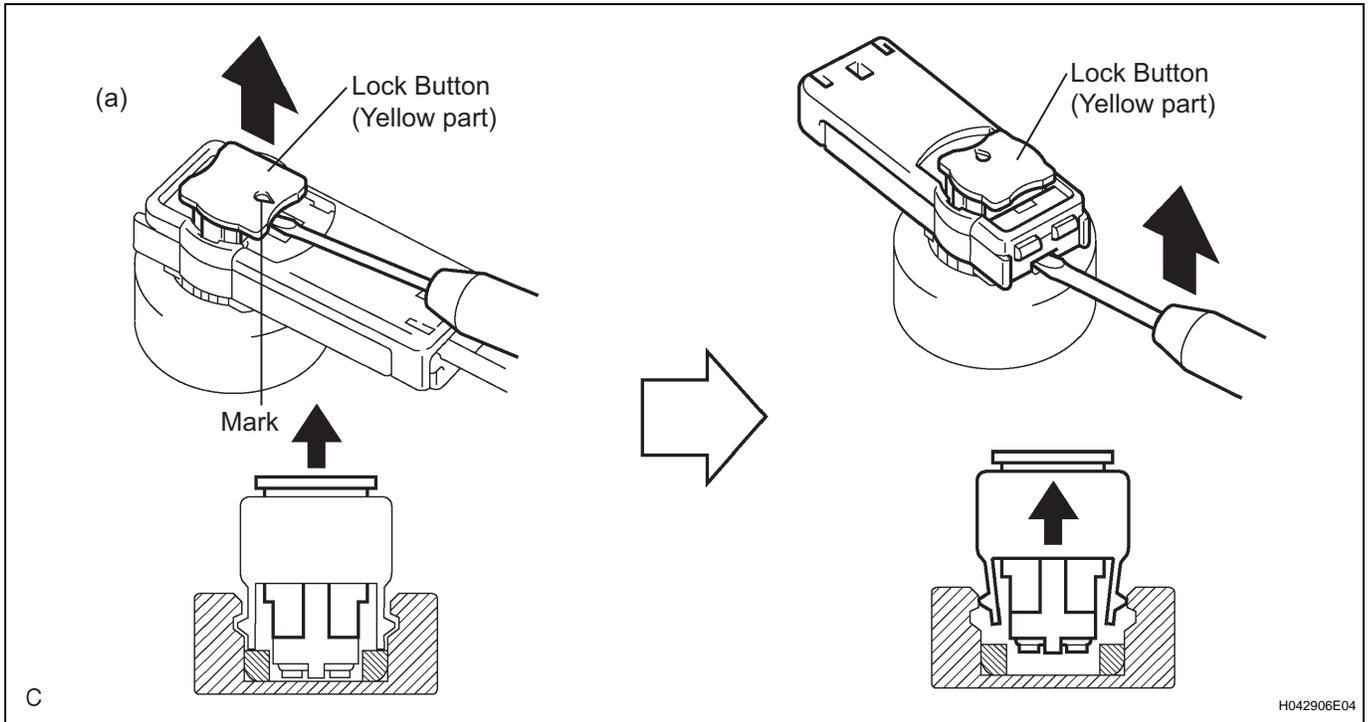
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**4. DISCONNECTION OF CONNECTORS FOR STEERING PAD, FRONT PASSENGER AIRBAG ASSEMBLY (SQUIB SIDE) AND FRONT SEAT OUTER BELT ASSEMBLY**

HINT:

Tape up the screwdriver tip before use.

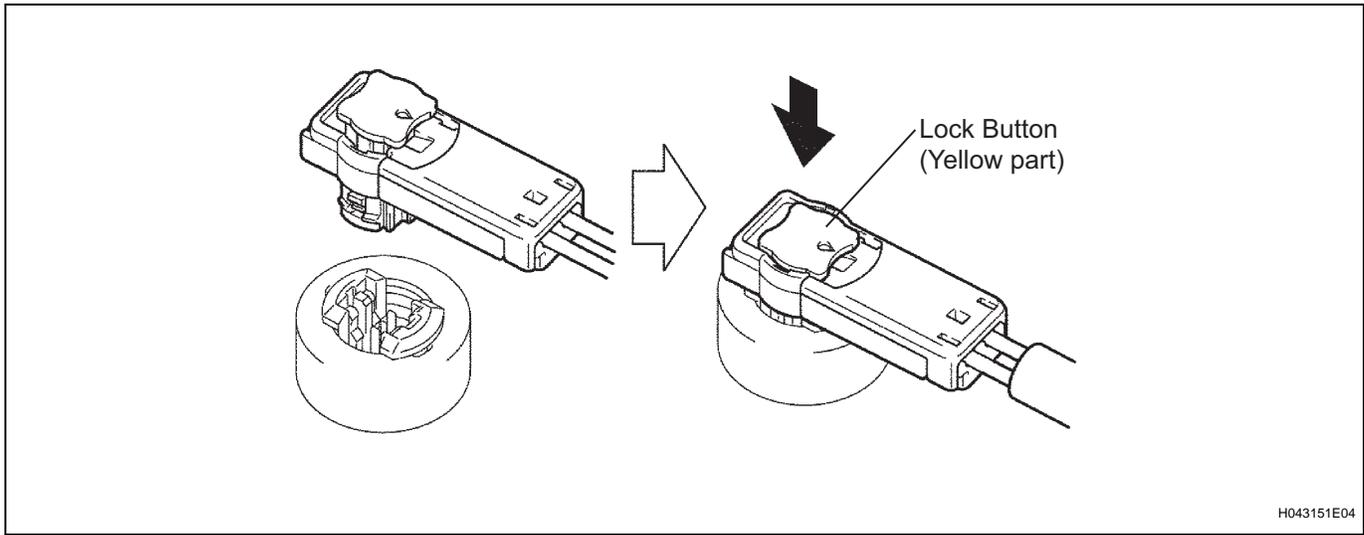
- (a) Release the lock button (yellow part) of the connector using a screwdriver.
- (b) Insert the screwdriver tip between the connector and the base, and then raise the connector.



**5. CONNECTION OF CONNECTORS FOR STEERING PAD, FRONT PASSENGER AIRBAG ASSEMBLY (SQUIB SIDE) AND FRONT SEAT OUTER BELT ASSEMBLY**

- (a) Connect the connector.

- (b) Push down securely on the lock button (yellow part) of the connector. (When locking, a click sound can be heard.)

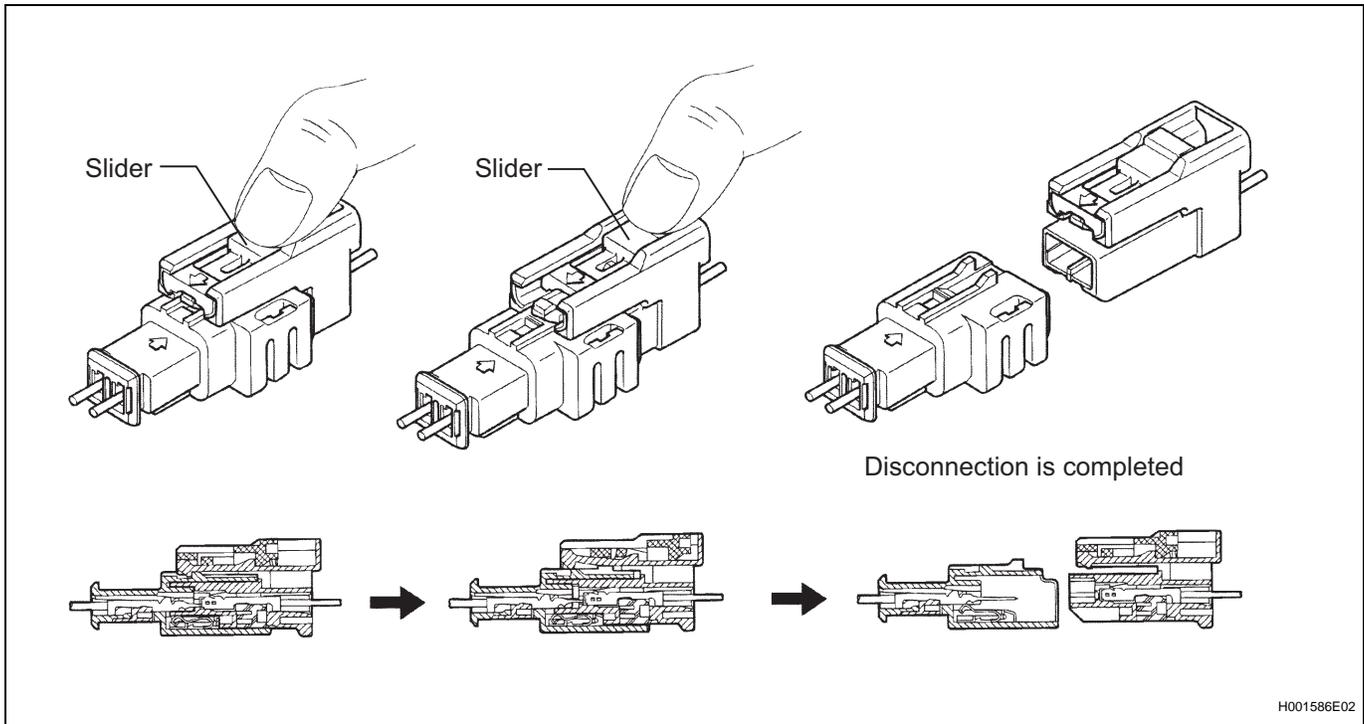


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**6. DISCONNECTION OF CONNECTOR FOR FRONT PASSENGER AIRBAG ASSEMBLY (INSTRUMENT PANEL WIRE SIDE) AND CURTAIN SHIELD AIRBAG ASSEMBLY**

- (a) Place a finger on the slider, slide the slider to release the lock, and then disconnect the connector.

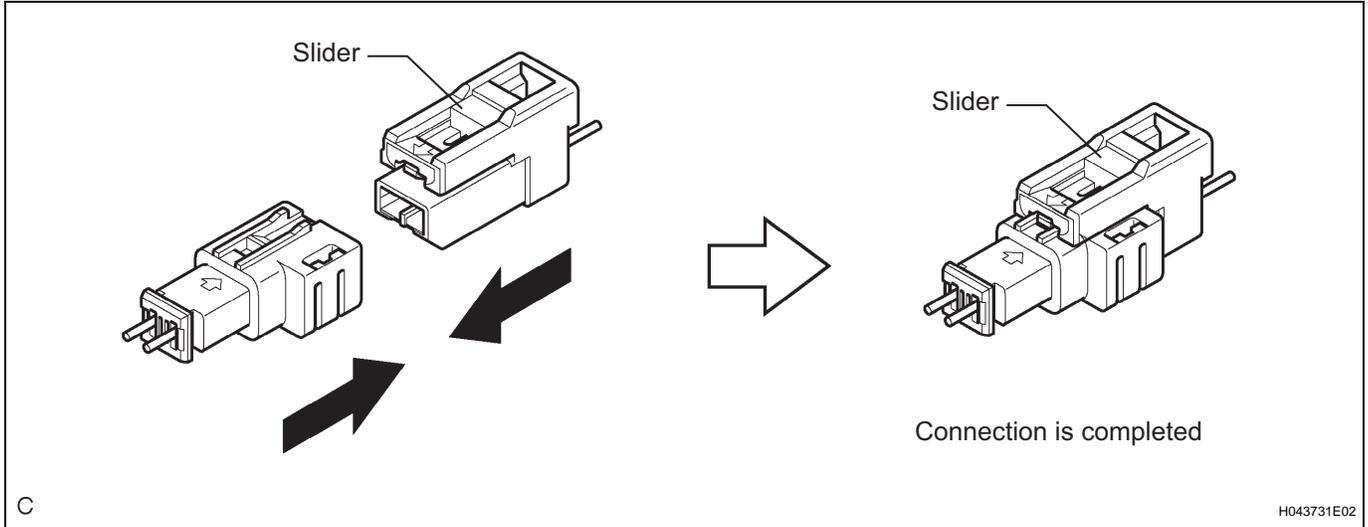
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**7. CONNECTION OF CONNECTOR FOR FRONT PASSENGER AIRBAG ASSEMBLY (INSTRUMENT PANEL WIRE SIDE) AND CURTAIN SHIELD AIRBAG ASSEMBLY**

- (a) Connect the connector as shown in the illustration.  
(When locking, make sure that the slider returns to its original position and a click sound can be heard.)

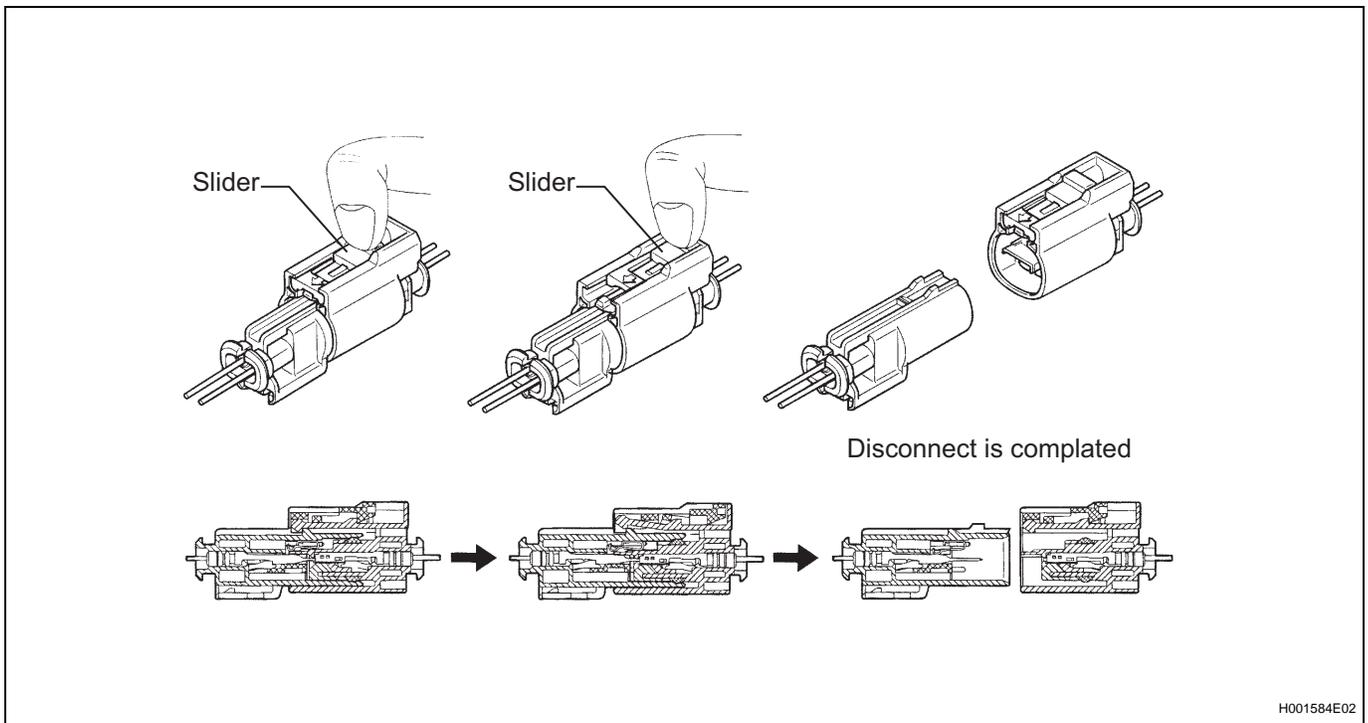


**HINT:**

When connecting, the slider will side. Be sure not to touch the slider while connecting, as it may result in an insecure fit.

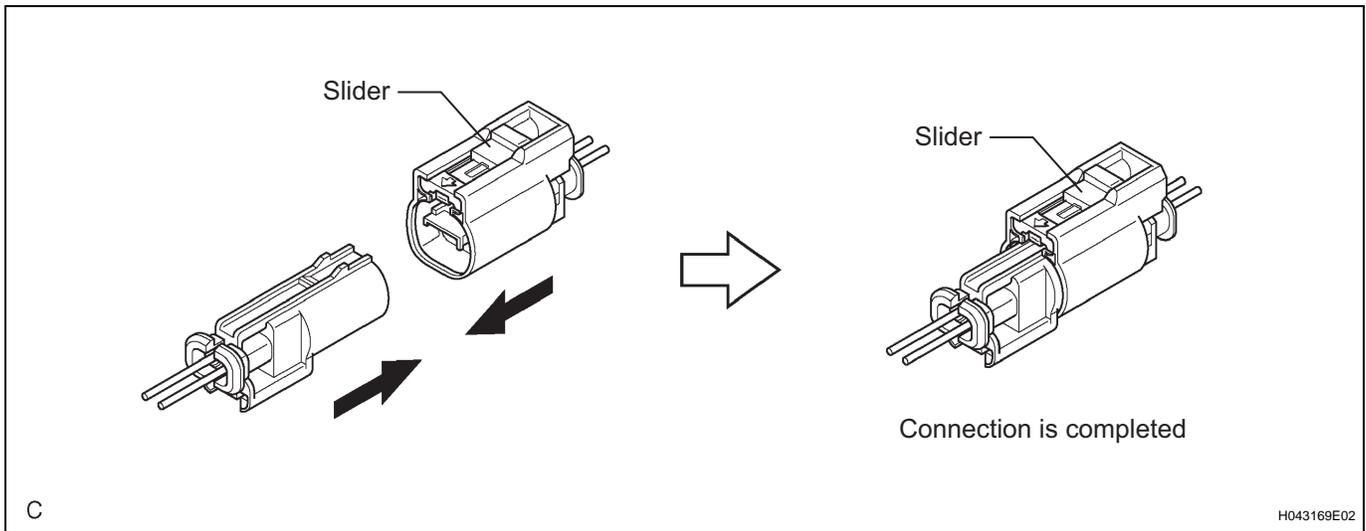
**8. DISCONNECTION OF CONNECTORS FOR FRONT SEAT AIRBAG ASSEMBLY**

- (a) Place a finger on the slider, slide the slider to release the lock, and then disconnect the connector.



### 9. CONNECTION OF CONNECTORS FOR FRONT SEAT AIRBAG ASSEMBLY

- (a) Connect the connector as shown in the illustration.  
(When locking, make sure that the slider returns to its original position and a click sound can be heard.)

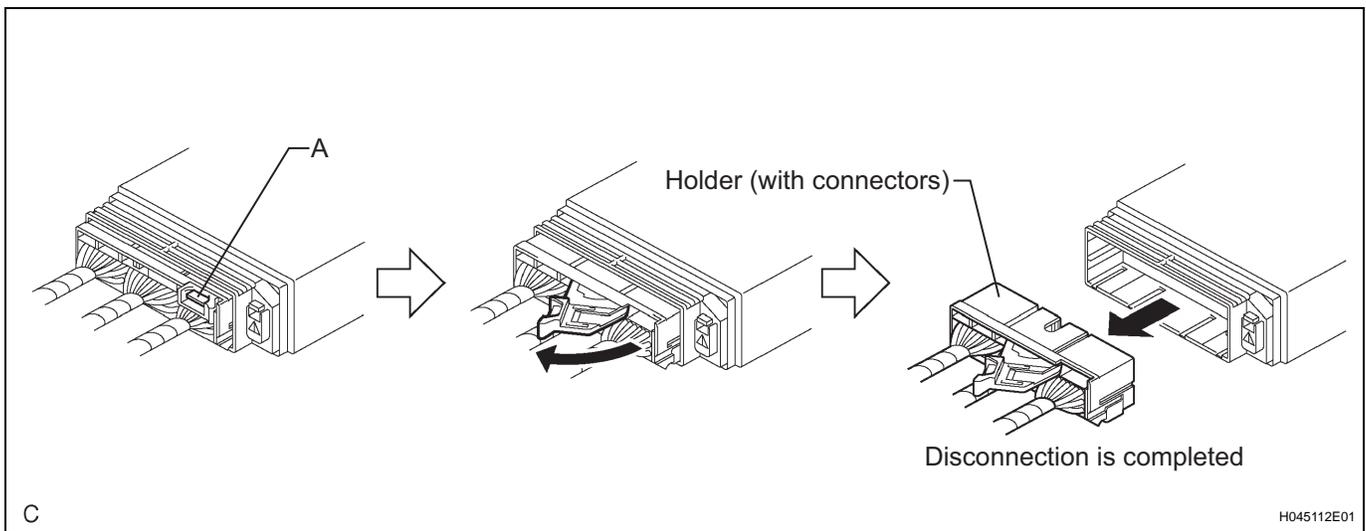


**HINT:**

When connecting, the slider will slide. Be sure not to touch the slider while connecting, as it may result in an insecure fit.

### 10. DISCONNECTION OF CONNECTOR FOR CENTER AIRBAG SENSOR ASSEMBLY

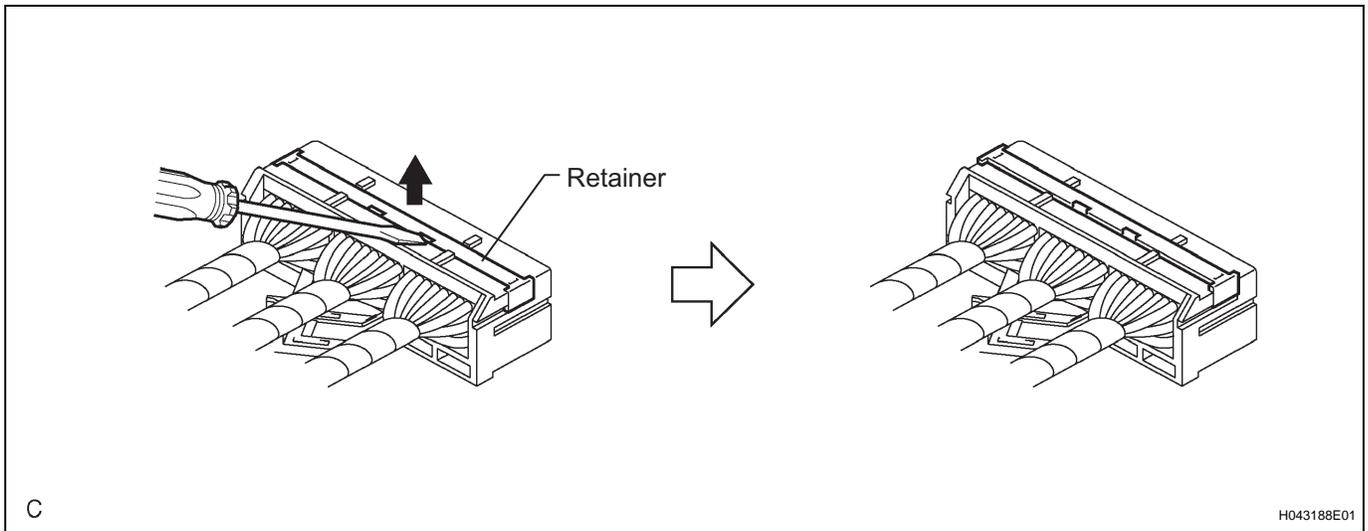
- (a) Pull the lever by pushing part A as shown in the illustration and disconnect the holder (with connectors).



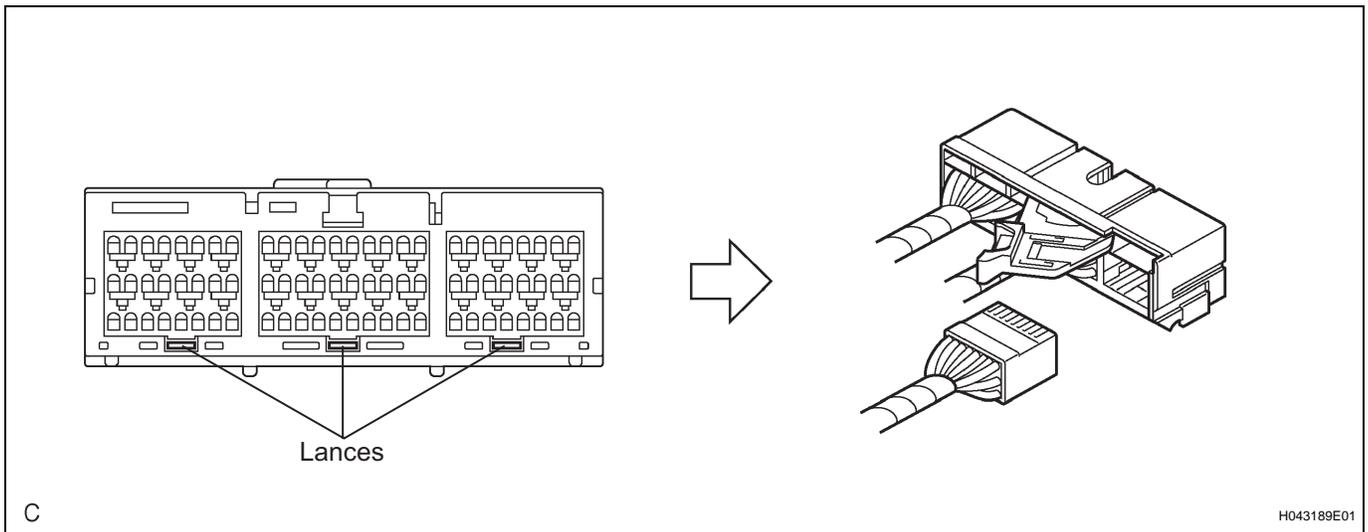
**HINT:**

Perform the following procedures when replacing the holder.

- (b) Remove the holder.
  - (1) Using a screwdriver, unlock the retainer.



- (2) Release the fitting lance and remove the holder.

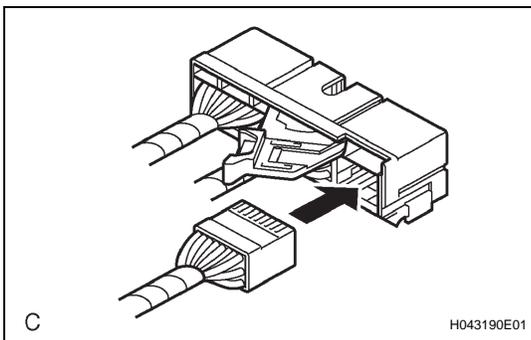


RS

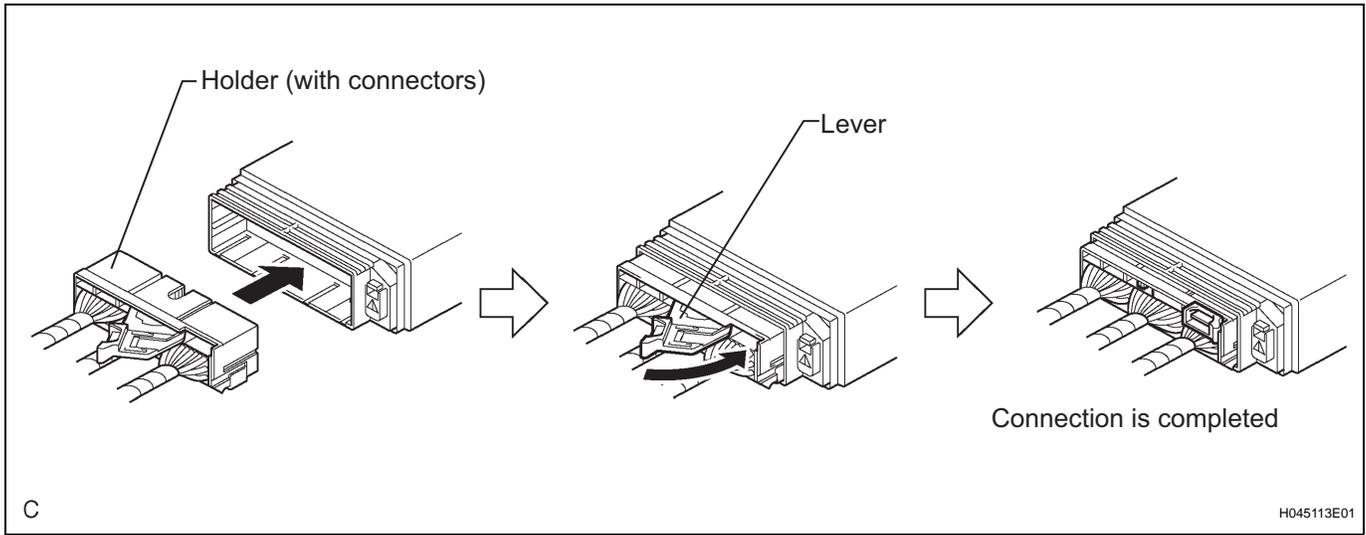
- (c) Install the holder.
  - (1) Install the connectors to the holder. (When locking, a click sound can be heard.)
  - HINT:  
The retainer is locked when the holder is connected.

**11. CONNECTION OF CONNECTOR FOR CENTER AIRBAG SENSOR ASSEMBLY**

- (a) Firmly insert the holder (with connectors) into the center airbag sensor assembly until it cannot be pushed any further.



- (b) Push the lever to connect the holder (with connectors). (When locking, a click sound can be heard.)

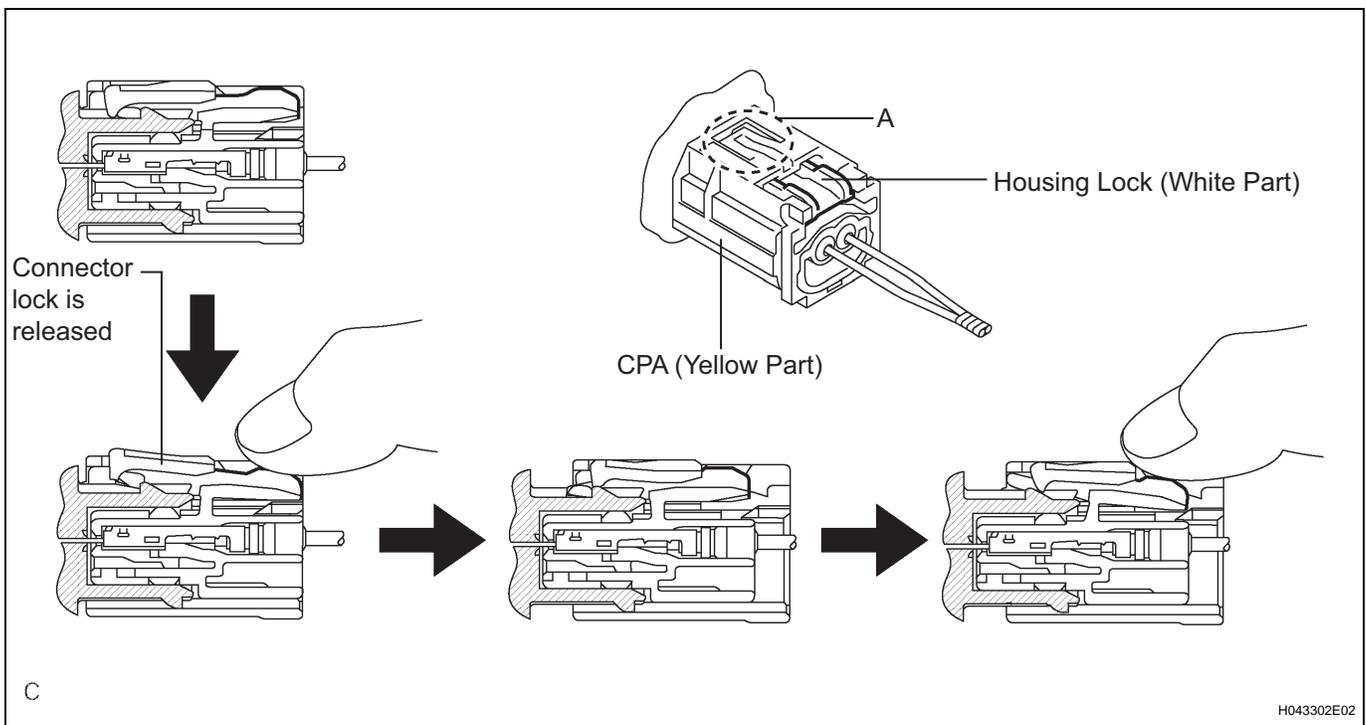


**HINT:**

The holder slides in to the center airbag sensor assembly when it is being connected. Be sure not to hold the holder while connecting, as it may result in an insecure fit.

**12. DISCONNECTION OF CONNECTOR FOR FRONT AIRBAG SENSOR**

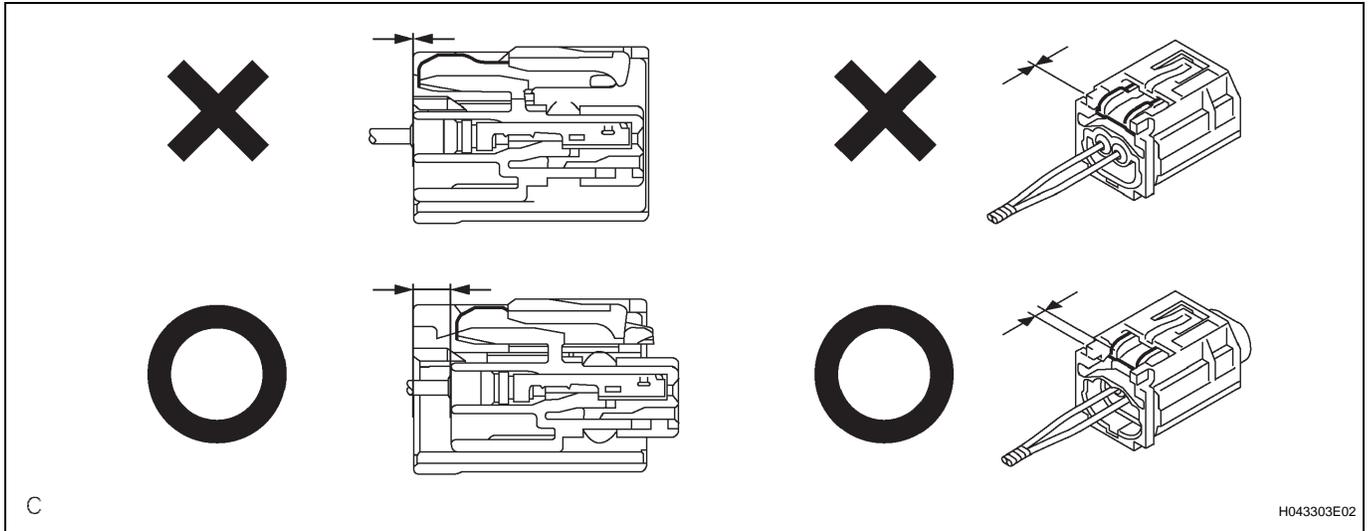
- (a) Push down the housing lock (white part) and slide the CPA (yellow part). (At this time, the connector cannot be disconnected yet.)
- (b) Push down the housing lock (white part) again and disconnect the connector.



HINT:

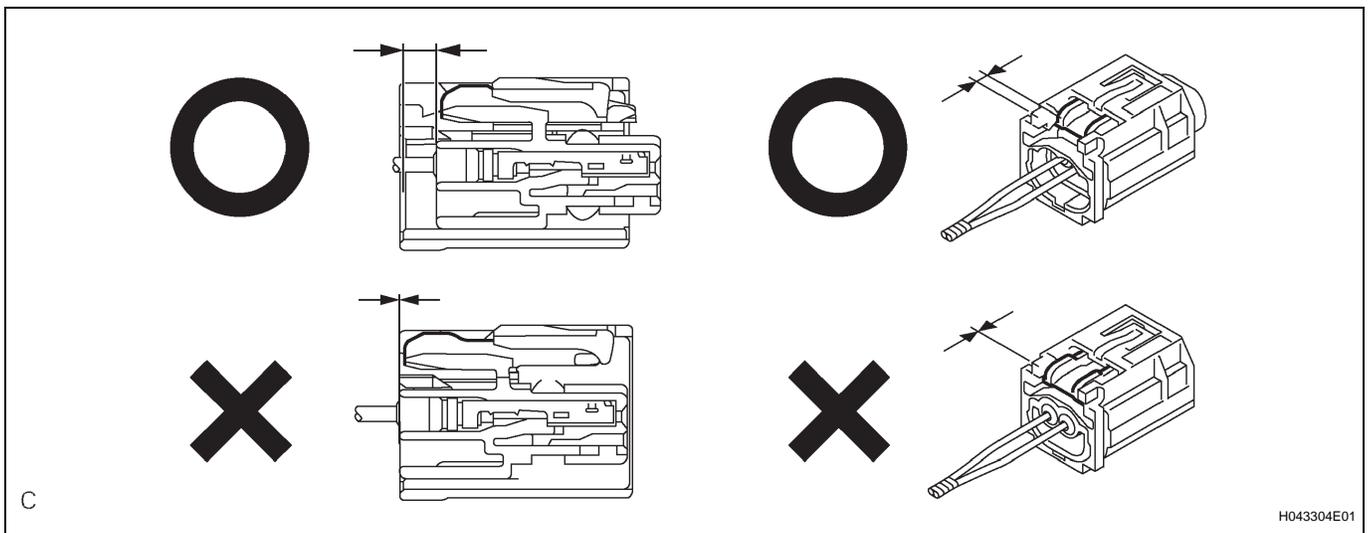
Do not push down the A part shown in the illustration when disconnecting.

- (c) After disconnecting the connector, check that the position of the housing lock (white part) is as shown in the illustration.

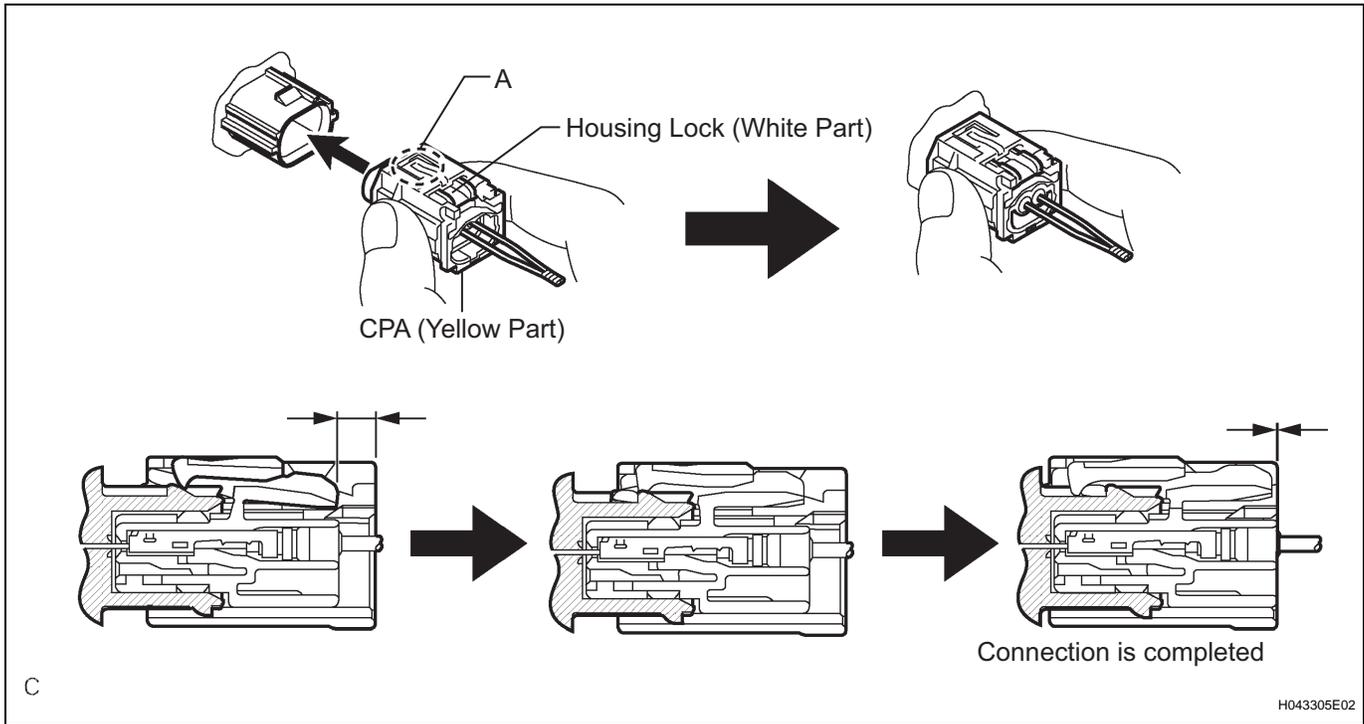


**13. CONNECTION OF CONNECTOR FOR FRONT AIRBAG SENSOR**

- (a) Before connecting the connectors, check that the position of the housing lock (white part) is as shown in the illustration.



- (b) Be sure to engage the connectors until they are locked. (When locking, make sure that a click sound can be heard.)



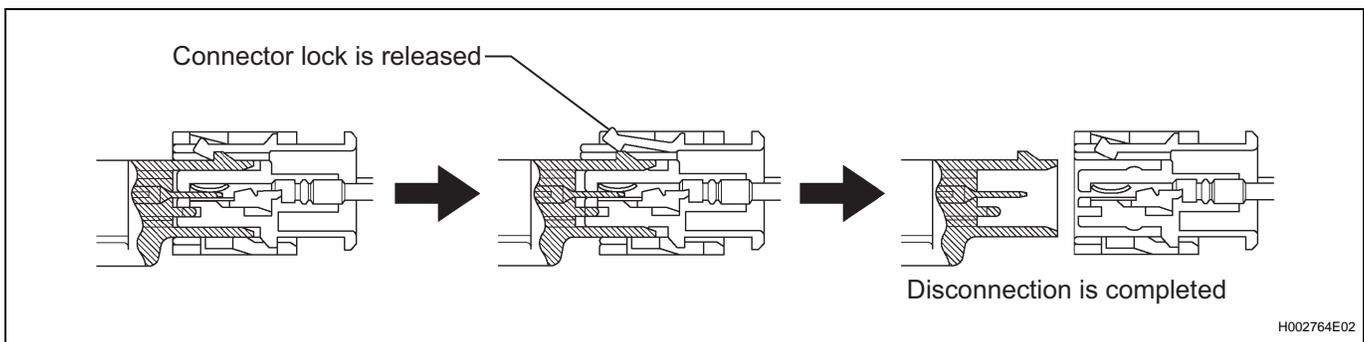
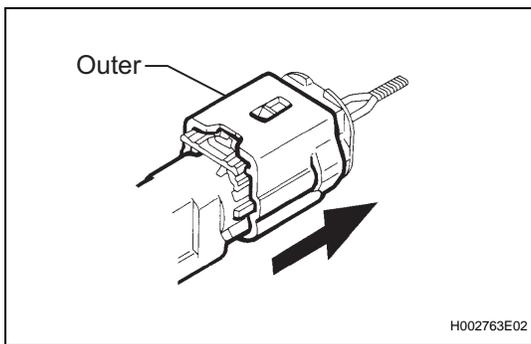
**HINT:**

When connecting them, the housing lock (white part) slides. Be sure not to hold the housing lock (white part) and A part, as it may result in an insecure fit.

**RS**

**14. DISCONNECTION OF CONNECTORS FOR SIDE AIRBAG SENSOR ASSEMBLY AND REAR AIRBAG SENSOR**

- (a) While holding both the sides of the outer connector locking sleeve, slide the outer in the direction shown by the arrow.
- (b) When the connector lock is released, the connectors are disconnected.

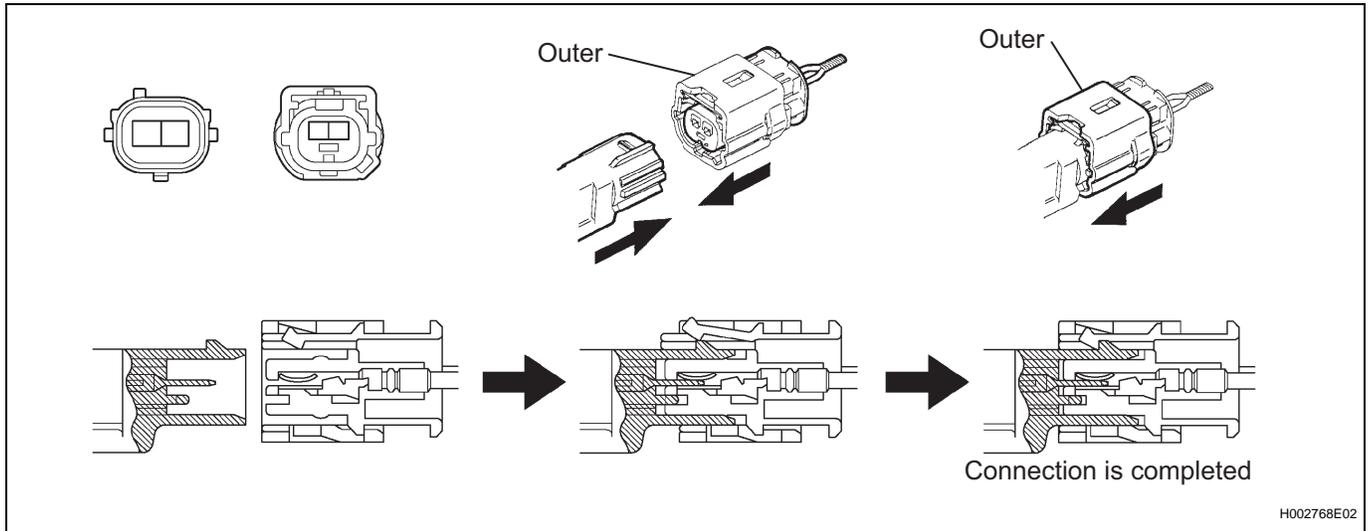


**HINT:**

Be sure to hold both outer flank sides. Holding the top and bottom will make disconnection difficult.

**15. CONNECTION OF CONNECTORS FOR SIDE AIRBAG SENSOR ASSEMBLY AND REAR AIRBAG SENSOR**

- (a) Connect the connector as shown in the illustration.  
(When locking, make sure that the outer returns to its original position and a click sound can be heard.)

**HINT:**

When connecting, the outer will slide. Be sure not to hold the outer while connecting, as it may result in an insecure fit.

<b>DTC</b>	<b>B1635/24</b>	<b>Front Passenger Side Rear Airbag Sensor Circuit Malfunction</b>
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**DESCRIPTION**

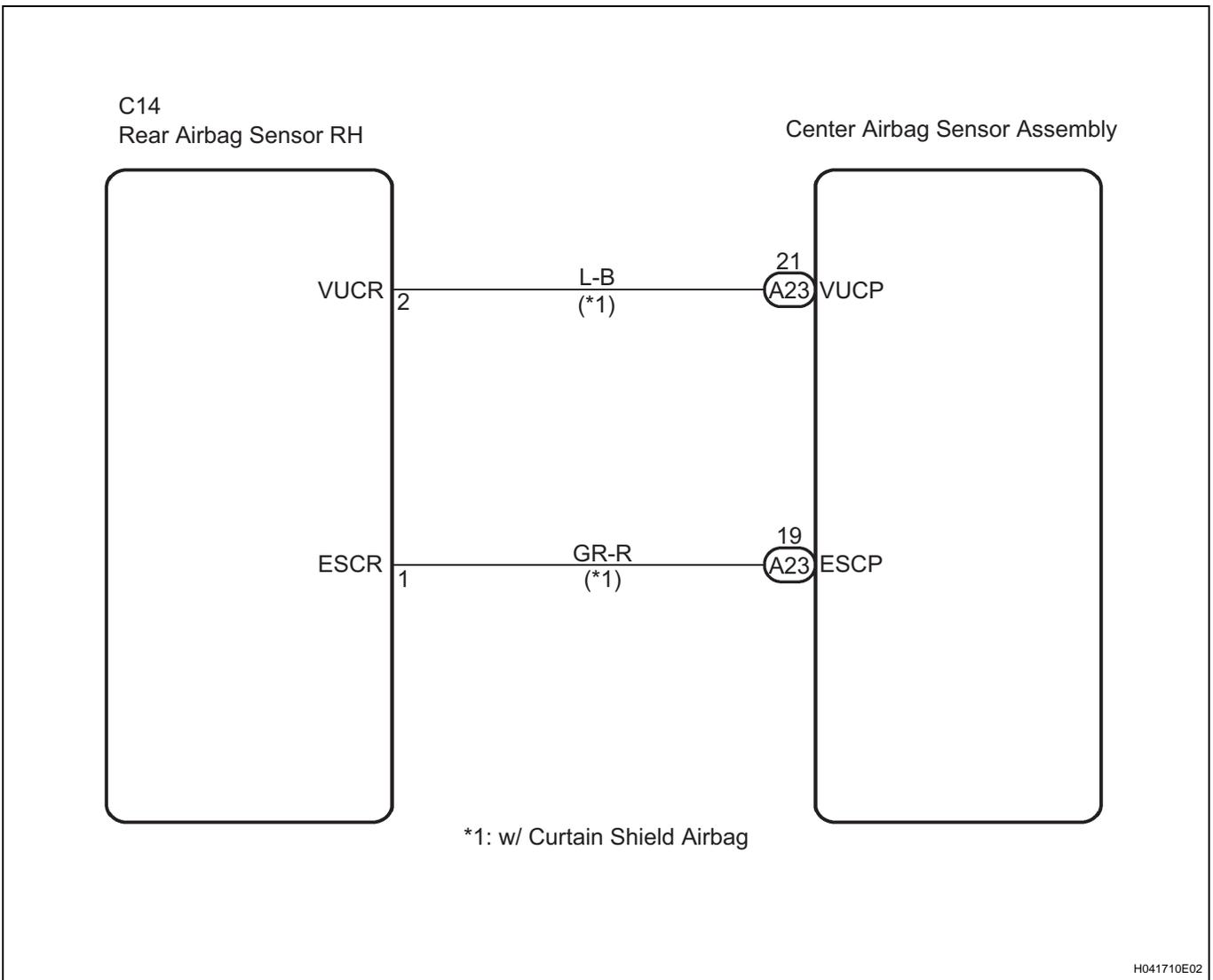
The rear airbag sensor RH consists of the safing sensor, the diagnostic circuit, the lateral deceleration sensor, etc.

If the center airbag sensor assembly receives signals from the lateral deceleration sensor, it determines whether or not the SRS should be activated.

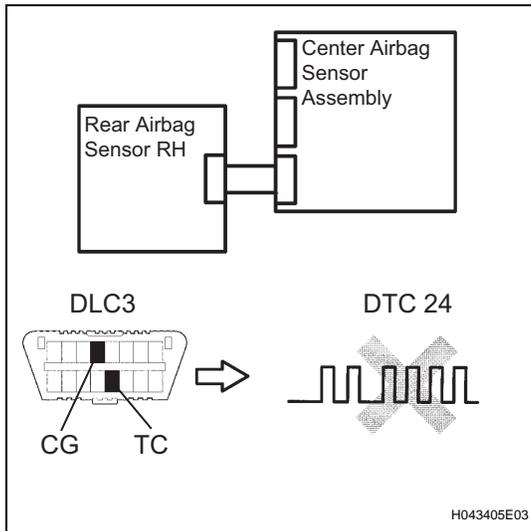
DTC B1635/24 is recorded when a malfunction is detected in the front passenger side rear airbag sensor circuit.

DTC No.	DTC Detecting Condition	Trouble Area
B1635/24	<ul style="list-style-type: none"> <li>The center airbag sensor assembly receives a line short circuit signal, an open circuit signal, a short circuit to ground signal or a short circuit to B+ signal in the front passenger side rear airbag sensor circuit for 2 seconds.</li> <li>Rear airbag sensor RH malfunction</li> <li>Center airbag sensor assembly malfunction</li> </ul>	<ul style="list-style-type: none"> <li>Floor wire No.2</li> <li>Rear airbag sensor RH</li> <li>Center airbag sensor assembly</li> </ul>

**WIRING DIAGRAM**



**RS**

**1 CHECK DTC**

- (a) Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- (b) Clear the DTCs stored in memory (See page RS-36).
- (c) Turn the ignition switch to the LOCK position.
- (d) Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- (e) Check the DTCs (See page RS-36).

**OK:****DTC B1635/24 is not output.****HINT:**

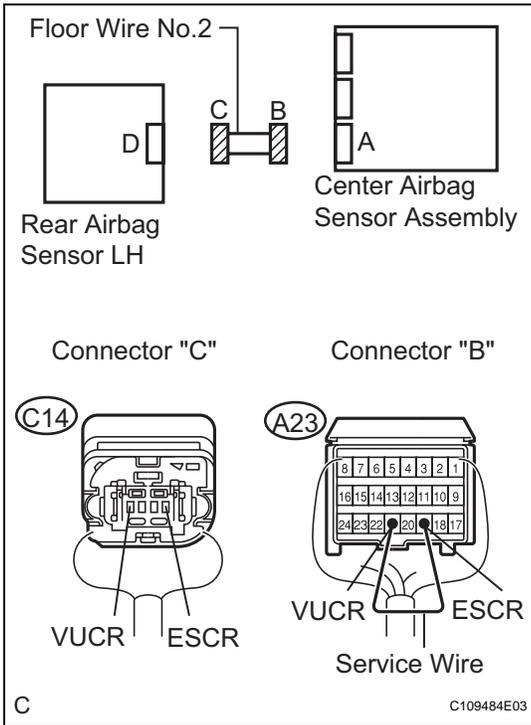
Codes other than DTC B1635/24 may be output at this time, but they are not related to this check.

**OK****USE SIMULATION METHOD TO CHECK****NG****2 CHECK CONNECTION OF CONNECTORS**

- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery, and wait for at least 90 seconds.
- (c) Check that the connectors are properly connected to the center airbag sensor assembly and the rear airbag sensor RH.

**OK:****The connectors are connected.****NG****CONNECT CONNECTORS, THEN GO TO STEP 1****OK**

**3 CHECK FLOOR WIRE NO.2 (OPEN)**



(a) Disconnect the connectors from the center airbag sensor assembly and the rear airbag sensor RH.

(b) Using a service wire, connect A23-21 (VUCP) and A23-19 (ESCP) of connector "B".

**NOTICE:**

**Do not forcibly insert a service wire into the terminals of the connector when connecting.**

(c) Measure the resistance according to the value(s) in the table below.

**Resistance**

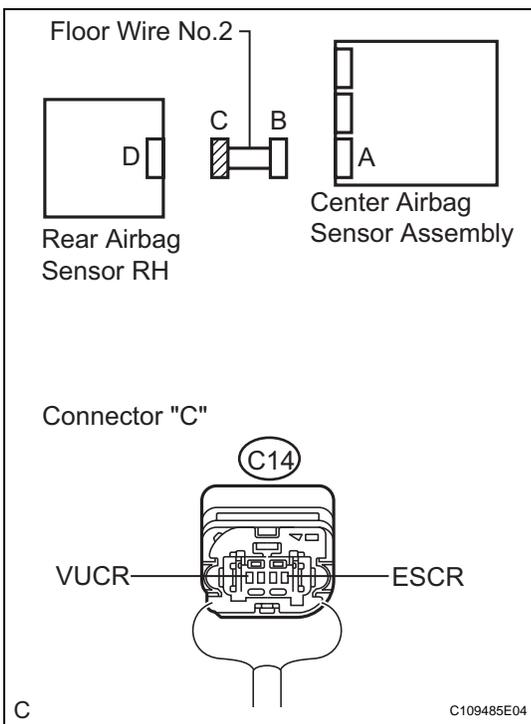
Tester connection	Condition	Specified condition
C14-2 (VUCR) - C14-1 (ESCR)	Always	Below 1 Ω

**NG** → **REPAIR OR REPLACE FLOOR WIRE NO.2**

**OK**

**RS**

**4 CHECK FLOOR WIRE NO.2 (SHORT)**



(a) Disconnect the service wire from connector "B".

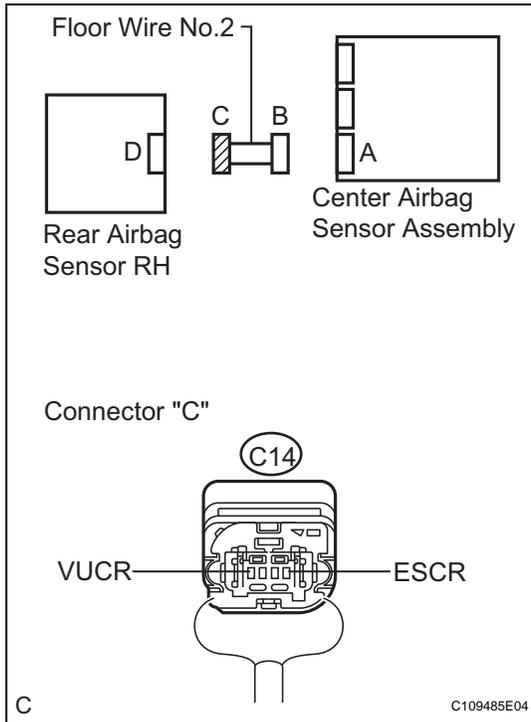
(b) Measure the resistance according to the value(s) in the table below.

**Resistance**

Tester connection	Condition	Specified condition
C14-2 (VUCR) - C14-1 (ESCR)	Always	1 MΩ or higher

**NG** → **REPAIR OR REPLACE FLOOR WIRE NO.2**

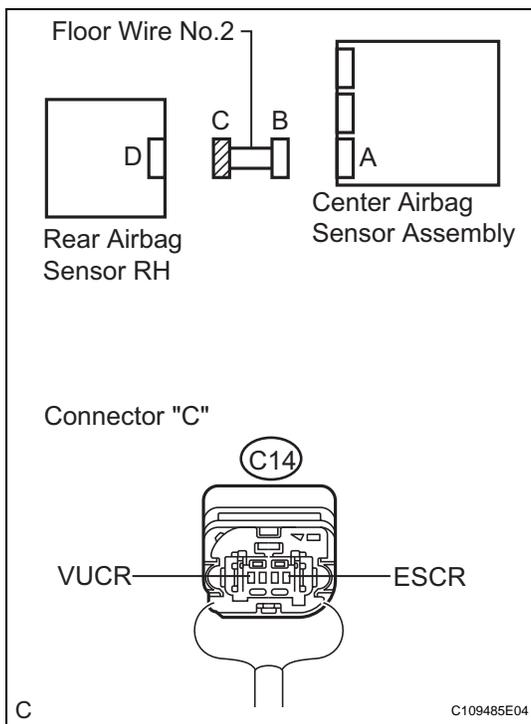
**OK**

**5 CHECK FLOOR WIRE NO.2 (SHORT TO B+)**

- Connect the negative (-) terminal cable to the battery, and wait for at least 2 seconds.
- Turn the ignition switch to the ON position.
- Measure the voltage according to the value(s) in the table below.

**Voltage**

Tester connection	Condition	Specified condition
C14-2 (VUCR) - Body ground	Ignition switch ON	Below 1 V
C14-1 (ESCR) - Body ground	Ignition switch ON	Below 1 V

**NG****REPAIR OR REPLACE FLOOR WIRE NO.2****OK****RS****6 CHECK FLOOR WIRE NO.2 (SHORT TO GROUND)**

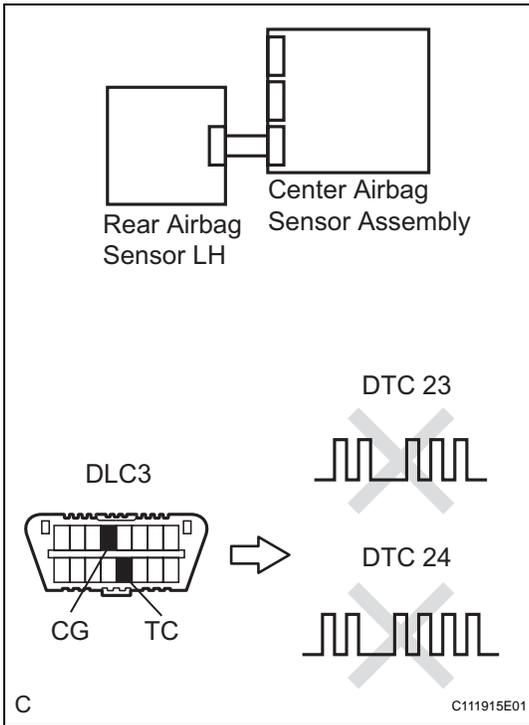
- Turn the ignition switch to the LOCK position.
- Disconnect the negative (-) terminal cable from the battery, and wait for at least 90 seconds.
- Measure the resistance according to the value(s) in the table below.

**Resistance**

Tester connection	Condition	Specified condition
C14-2 (VUCR) - Body ground	Always	1 M $\Omega$ or higher
C14-1 (ESCR) - Body ground	Always	1 M $\Omega$ or higher

**NG****REPAIR OR REPLACE FLOOR WIRE NO.2****OK**

**7 CHECK REAR AIRBAG SENSOR RH**



- (a) Connect the connectors to the center airbag sensor assembly.
- (b) Interchange the rear airbag sensor LH with RH and connect the connectors to them.
- (c) Connect the negative (-) terminal cable to the battery, and wait for at least 2 seconds.
- (d) Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- (e) Clear the DTCs stored in memory (See page RS-36).
- (f) Turn the ignition switch to the LOCK position.
- (g) Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- (h) Check the DTCs (See page RS-36).

**Result**

Result	Proceed to
DTC B1635/24 is output.	A
DTC B1630/23 is output.	B
DTC B1630/23 and B1635/24 are not output.	C

- A** → REPLACE CENTER AIRBAG SENSOR ASSEMBLY
- B** → REPLACE REAR AIRBAG SENSOR RH

**C**

**USE SIMULATION METHOD TO CHECK**

<b>DTC</b>	<b>B1650/32</b>	<b>Occupant Classification System Malfunction</b>
------------	-----------------	---

**DESCRIPTION**

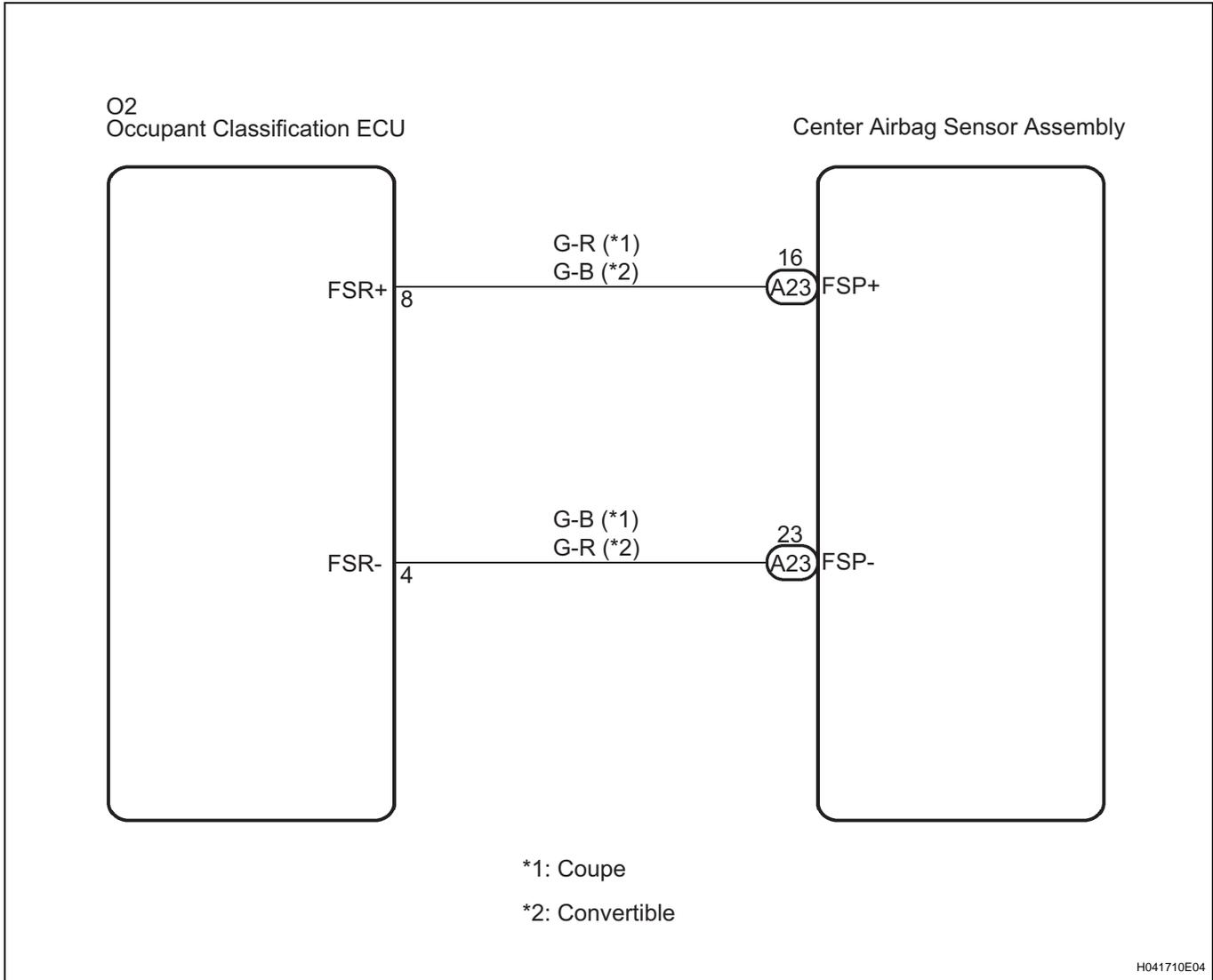
The occupant classification system circuit consists of the center airbag sensor assembly and the occupant classification system.

If the center airbag sensor assembly receives signals from the occupant classification ECU, it determines whether or not the front passenger airbag assembly and the front passenger side - side airbag assembly should be operated.

DTC B1650/32 is recorded when a malfunction is detected in the occupant classification system circuit.

DTC No.	DTC Detecting Condition	Trouble Area
B1650/32	<ul style="list-style-type: none"> <li>Occupant classification system malfunction</li> <li>The center airbag sensor assembly receives a line short circuit signal, an open circuit signal, a short circuit to ground signal or a short circuit to B+ signal in the occupant classification system circuit for 2 seconds.</li> <li>Center airbag sensor assembly malfunction</li> </ul>	<ul style="list-style-type: none"> <li>Floor wire No.2</li> <li>Occupant classification system</li> <li>Center airbag sensor assembly</li> </ul>

**WIRING DIAGRAM**



RS

**1 CHECK DTC (OCCUPANT CLASSIFICATION ECU)**

- (a) Turn the ignition switch to the ON position, and wait for at least 10 seconds.
- (b) Using the intelligent tester, check the DTCs of the occupant classification ECU (See page RS-192).

**OK:**

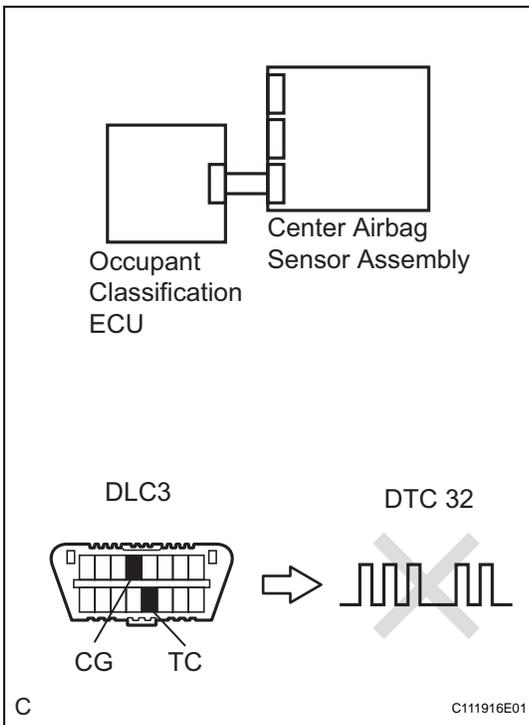
**DTC is not output.**

**NG** →

**GO TO OCCUPANT CLASSIFICATION SYSTEM**

**OK**

**2 CHECK DTC (CENTER AIRBAG SENSOR ASSEMBLY)**



- (a) Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- (b) Clear the DTCs stored in memory (See page RS-36).
- (c) Turn the ignition switch to the LOCK position.
- (d) Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- (e) Check the DTCs (See page RS-36).

**OK:**

**DTC B1650/32 is not output.**

**HINT:**

Codes other than DTC B1650/32 may be output at this time, but they are not related to this check.

**OK** →

**USE SIMULATION METHOD TO CHECK**

**RS**

**NG**

**3 CHECK CONNECTION OF CONNECTORS**

- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery, and wait for at least 90 seconds.
- (c) Check that the connectors are properly connected to the center airbag sensor assembly and the occupant classification ECU.

**OK:**

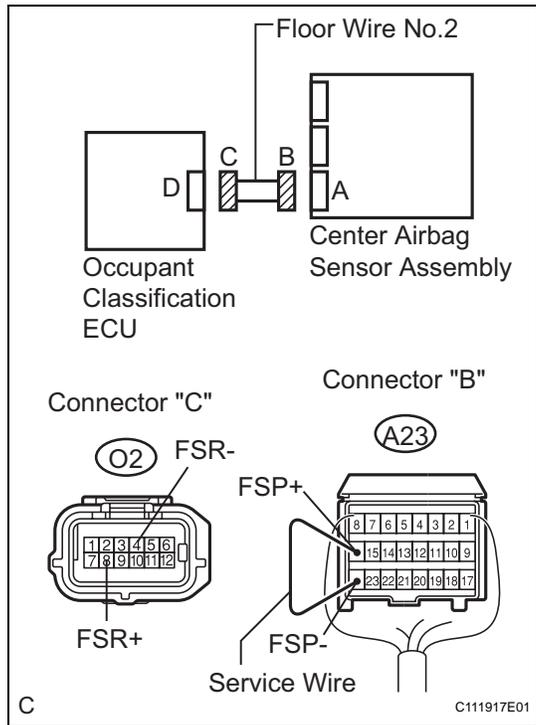
**The connectors are connected.**

NG

**CONNECT CONNECTORS, THEN GO TO STEP 1**

OK

**4 CHECK FLOOR WIRE NO.2 (OPEN)**



- (a) Disconnect the connectors from the center airbag sensor assembly and the occupant classification ECU.
- (b) Using a service wire, connect A23-16 (FSP+) and A23-24 (FSP-) of connector "B".

**NOTICE:**

**Do not forcibly insert a service wire into the terminals of the connector when connecting.**

- (c) Measure the resistance according to the value(s) in the table below.

**Resistance**

Terminal connection	Condition	Specified condition
O2-8 (FSR+) - O2-4 (FSR-)	Always	Below 1 Ω

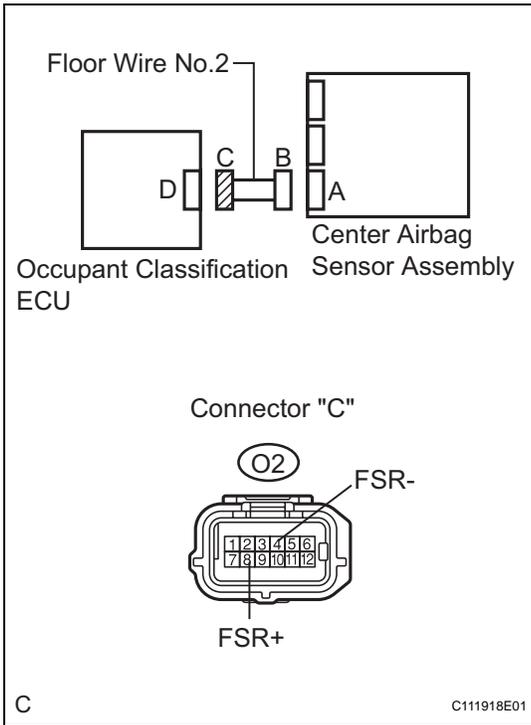
NG

**REPAIR OR REPLACE FLOOR WIRE NO.2**

RS

OK

**5 CHECK FLOOR WIRE NO.2 (SHORT)**



- (a) Disconnect the service wire from connector "B".
- (b) Measure the resistance according to the value(s) in the table below.

**Resistance**

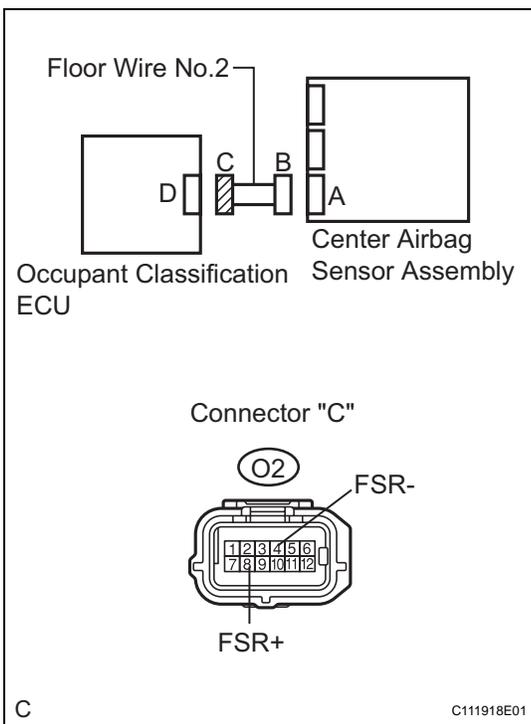
Terminal connection	Condition	Specified condition
O2-8 (FSR+) - O2-4 (FSR-)	Always	1 MΩ or higher

**NG REPAIR OR REPLACE FLOOR WIRE NO.2**

**OK**

**RS**

**6 CHECK FLOOR WIRE NO.2 (SHORT TO B+)**



- (a) Connect the negative (-) terminal cable to the battery, and wait for at least 2 seconds.
- (b) Turn the ignition switch to the ON position.
- (c) Measure the voltage according to the value(s) in the table below.

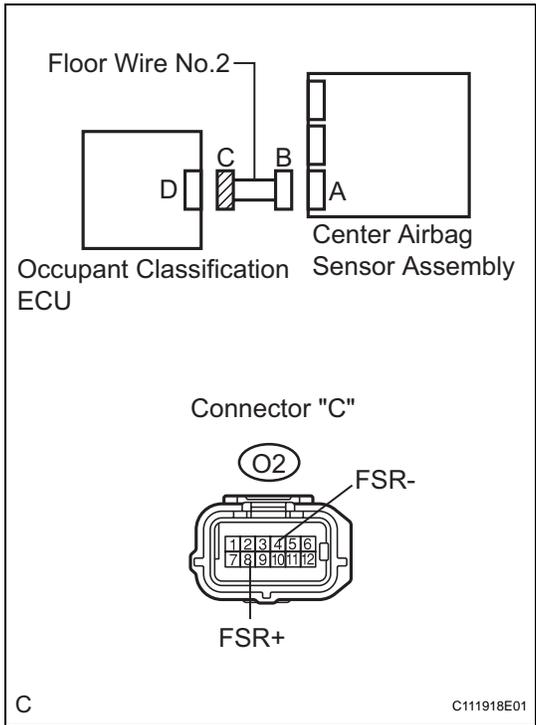
**Voltage**

Tester connection	Condition	Specified condition
O2-8 (FSR+) - Body ground	Ignition switch ON	Below 1 V
O2-4 (FSR-) - Body ground	Ignition switch ON	Below 1 V

**NG REPAIR OR REPLACE FLOOR WIRE NO.2**

**OK**

**7 CHECK FLOOR WIRE NO.2 (SHORT TO GROUND)**



- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery, and wait for at least 90 seconds.
- (c) Measure the resistance according to the value(s) in the table below.

**Resistance**

Tester connection	Condition	Specified condition
O2-8 (FSR+) - Body ground	Always	1 MΩ or higher
O2-4 (FSR-) - Body ground	Always	1 MΩ or higher

**NG** REPAIR OR REPLACE FLOOR WIRE NO.2

OK

REPLACE CENTER AIRBAG SENSOR ASSEMBLY

RS

<b>DTC</b>	<b>B1653/35</b>	<b>Seat Position Airbag Sensor Circuit Malfunction</b>
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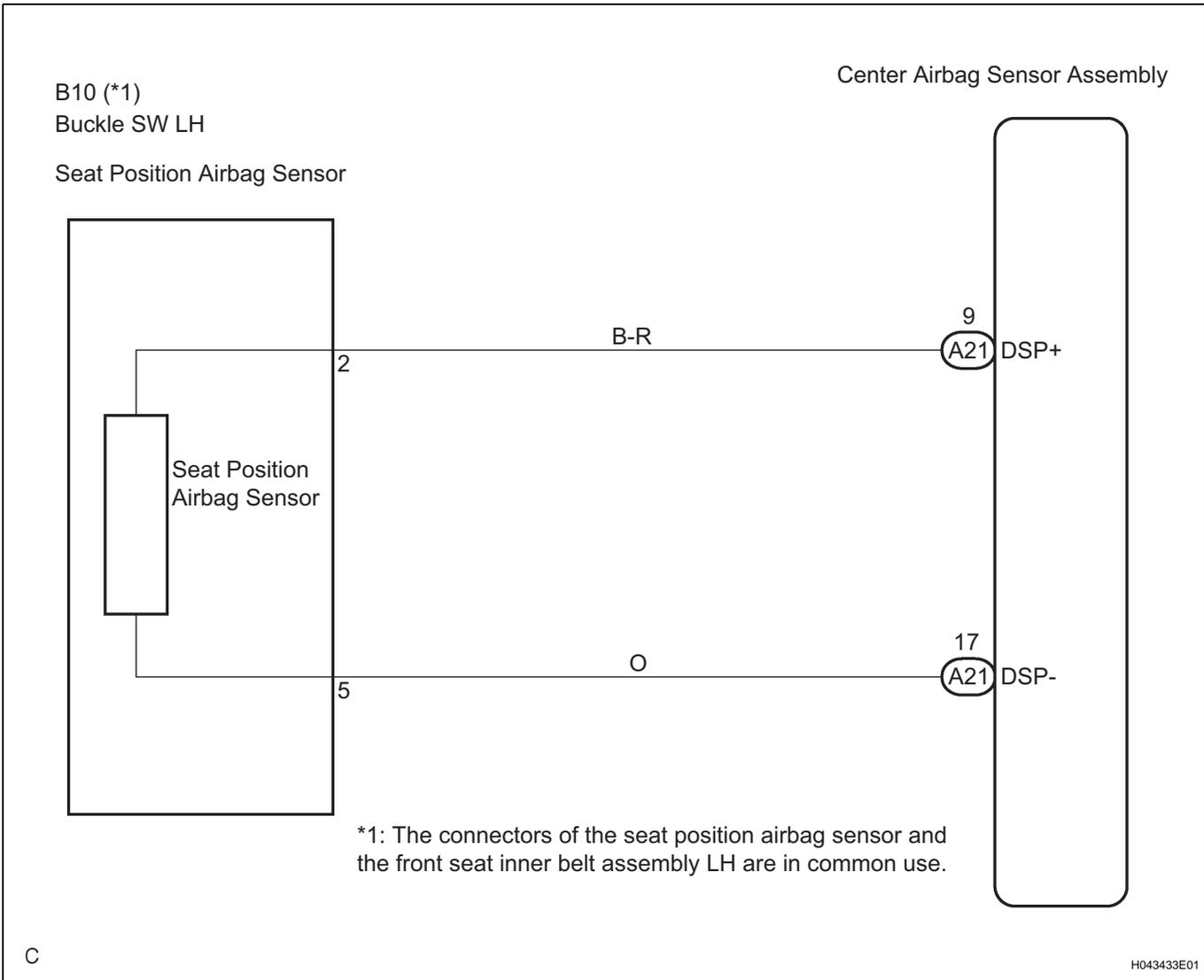
**DESCRIPTION**

The seat position airbag sensor circuit consists of the center airbag sensor assembly and the seat position airbag sensor.

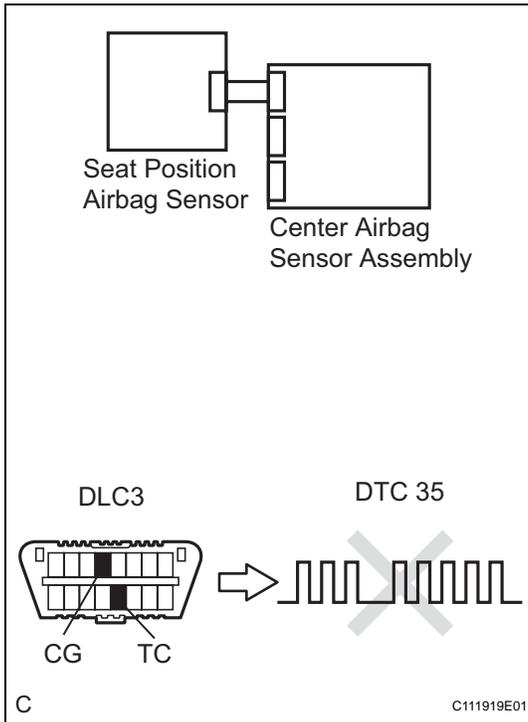
DTC B1653/35 is recorded when a malfunction is detected in the seat position airbag sensor circuit.

DTC No.	DTC Detecting Condition	Trouble Area
B1653/35	<ul style="list-style-type: none"> <li>• The center airbag sensor assembly receives a line short circuit signal, an open circuit signal, a short circuit to ground signal or a short circuit to B+ signal in the seat position airbag sensor circuit for 2 seconds.</li> <li>• Seat position airbag sensor malfunction</li> <li>• Center airbag sensor assembly malfunction</li> </ul>	<ul style="list-style-type: none"> <li>• Floor wire</li> <li>• Seat position airbag sensor</li> <li>• Center airbag sensor assembly</li> </ul>

**WIRING DIAGRAM**



**RS**

**1 CHECK DTC**

- (a) Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- (b) Clear the DTCs stored in memory (See page RS-36).
- (c) Turn the ignition switch to the LOCK position.
- (d) Turn the ignition switch to the ON position and wait for at least 60 seconds.
- (e) Check the DTCs (See page RS-36).

**OK:****DTC B1653/35 is not output.****HINT:**

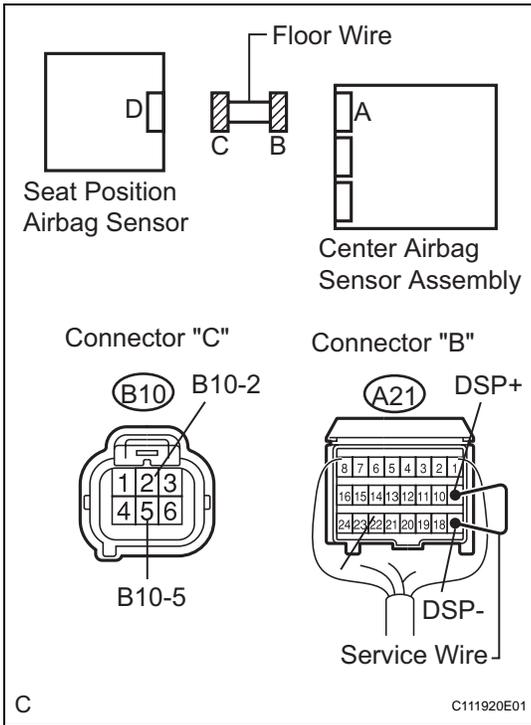
Codes other than DTC B1653/35 may be output at this time, but they are not related to this check.

**OK****USE SIMULATION METHOD TO CHECK****NG****RS****2 CHECK CONNECTION OF CONNECTORS**

- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery, and wait for at least 90 seconds.
- (c) Check that the connectors are properly connected to the center airbag sensor assembly and the seat position airbag sensor.

**OK:****The connectors are connected.****NG****CONNECT CONNECTORS, THEN GO TO STEP 1****OK**

**3 CHECK FLOOR WIRE (OPEN)**



- (a) Disconnect the connectors from the center airbag sensor assembly and the seat position airbag sensor.
- (b) Using a service wire, connect A21-9 (DSP+) and A21-17 (DSP-) of connector "B".

**NOTICE:**

**Do not forcibly insert a service wire into the terminals of the connector when connecting.**

- (c) Measure the resistance according to the value(s) in the table below.

**Resistance**

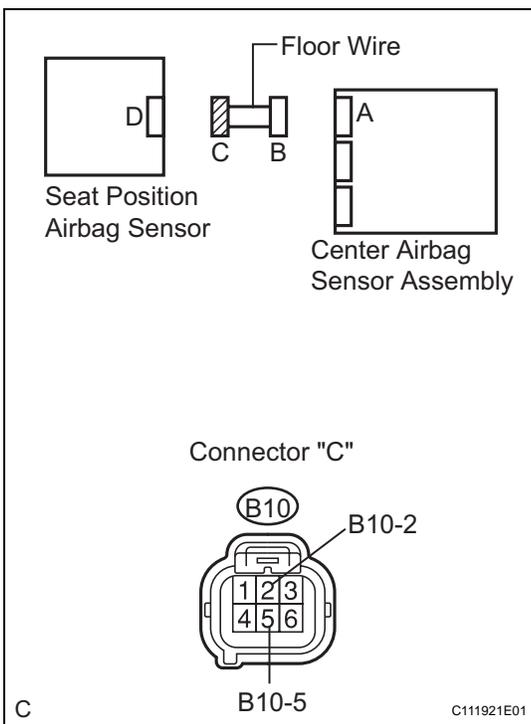
Tester connection	Condition	Specified condition
B10-2 - B10-5	Always	Below 1 Ω

**NG REPAIR OR REPLACE FLOOR WIRE**

**OK**

**RS**

**4 CHECK FLOOR WIRE (SHORT)**



- (a) Disconnect the service wire from connector "B".
- (b) Measure the resistance according to the value(s) in the table below.

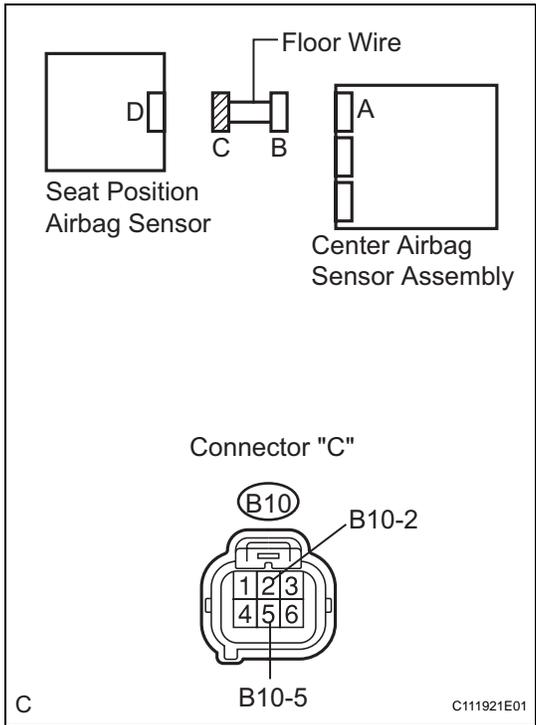
**Resistance**

Tester connection	Condition	Specified condition
B10-2 - B10-5	Always	1 MΩ or higher

**NG REPAIR OR REPLACE FLOOR WIRE**

**OK**

**5 CHECK FLOOR WIRE (SHORT TO B+)**



- (a) Connect the negative (-) terminal cable to the battery, and wait for at least 2 seconds.
- (b) Turn the ignition switch to the ON position.
- (c) Measure the voltage according to the value(s) in the table below.

**Voltage**

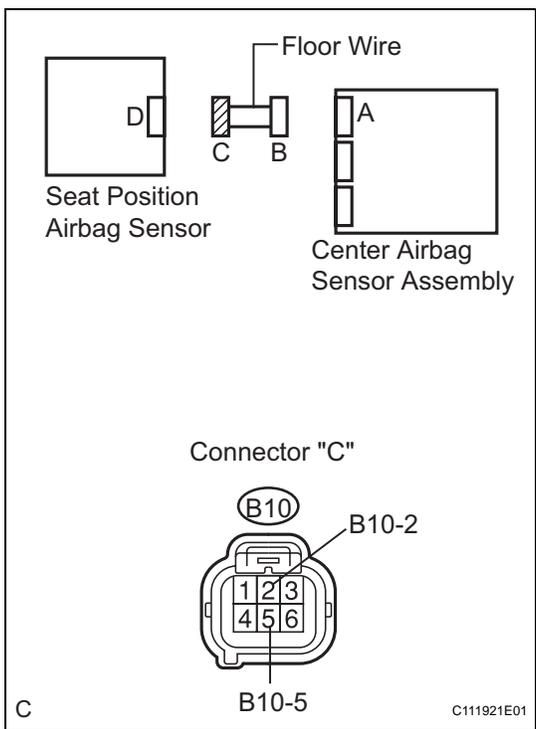
Tester connection	Condition	Specified condition
B10-2 - Body ground	Ignition switch ON	Below 1 V
B10-5 - Body ground	Ignition switch ON	Below 1 V

**NG** REPAIR OR REPLACE FLOOR WIRE

**OK**

**RS**

**6 CHECK FLOOR WIRE (SHORT TO GROUND)**



- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery, and wait for at least 90 seconds.
- (c) Measure the resistance according to the value(s) in the table below.

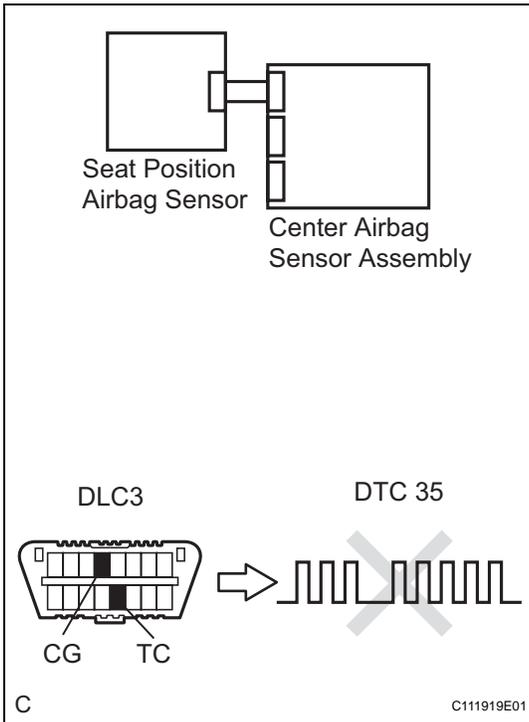
**Resistance**

Tester connection	Condition	Specified condition
B10-2 - Body ground	Always	1 MΩ or higher
B10-5 - Body ground	Always	1 MΩ or higher

**NG** REPAIR OR REPLACE FLOOR WIRE

**OK**

**7 CHECK SEAT POSITION AIRBAG SENSOR**



- (a) Connect the connectors to the center airbag sensor assembly and the seat position airbag sensor.
- (b) Connect the negative (-) terminal cable to the battery, and wait for at least 2 seconds.
- (c) Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- (d) Clear the DTCs stored in memory (See page RS-36).
- (e) Turn the ignition switch to the LOCK position.
- (f) Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- (g) Check the DTCs (See page RS-36).

**OK:**

**DTC B1653/35 is not output.**

**HINT:**

Codes other than DTC B1653/35 may be output at this time, but they are not related to this check.

**OK USE SIMULATION METHOD TO CHECK**

**NG**

**RS**

**8 REPLACE SEAT POSITION AIRBAG SENSOR**

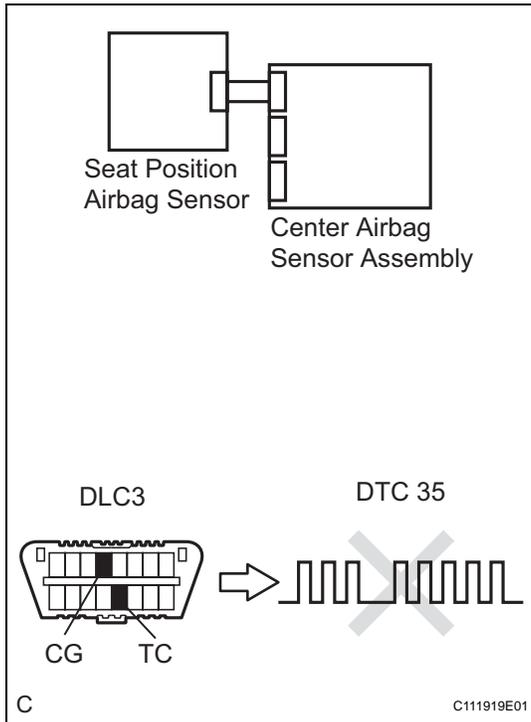
- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery, and wait for at least 90 seconds.
- (c) Replace the seat position airbag sensor (See page RS-315).

**HINT:**

Perform the inspection using parts from a normal vehicle if possible.

**NEXT**

## 9 CHECK CENTER AIRBAG SENSOR ASSEMBLY



- Connect the negative (-) terminal cable to the battery, and wait for at least 2 seconds.
- Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- Clear the DTCs stored in memory (See page [RS-36](#)).
- Turn the ignition switch to the LOCK position.
- Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- Check the DTCs (See page [RS-36](#)).

**OK:**

**DTC B1653/35 is not output.**

**HINT:**

Codes other than DTC B1653/35 may be output at this time, but they are not related to this check.

**NG**

**REPLACE CENTER AIRBAG SENSOR ASSEMBLY**

**OK****RS****END**

<b>DTC</b>	<b>B1655/37</b>	<b>Driver Side Seat Belt Buckle Switch Circuit Malfunction</b>
------------	-----------------	--

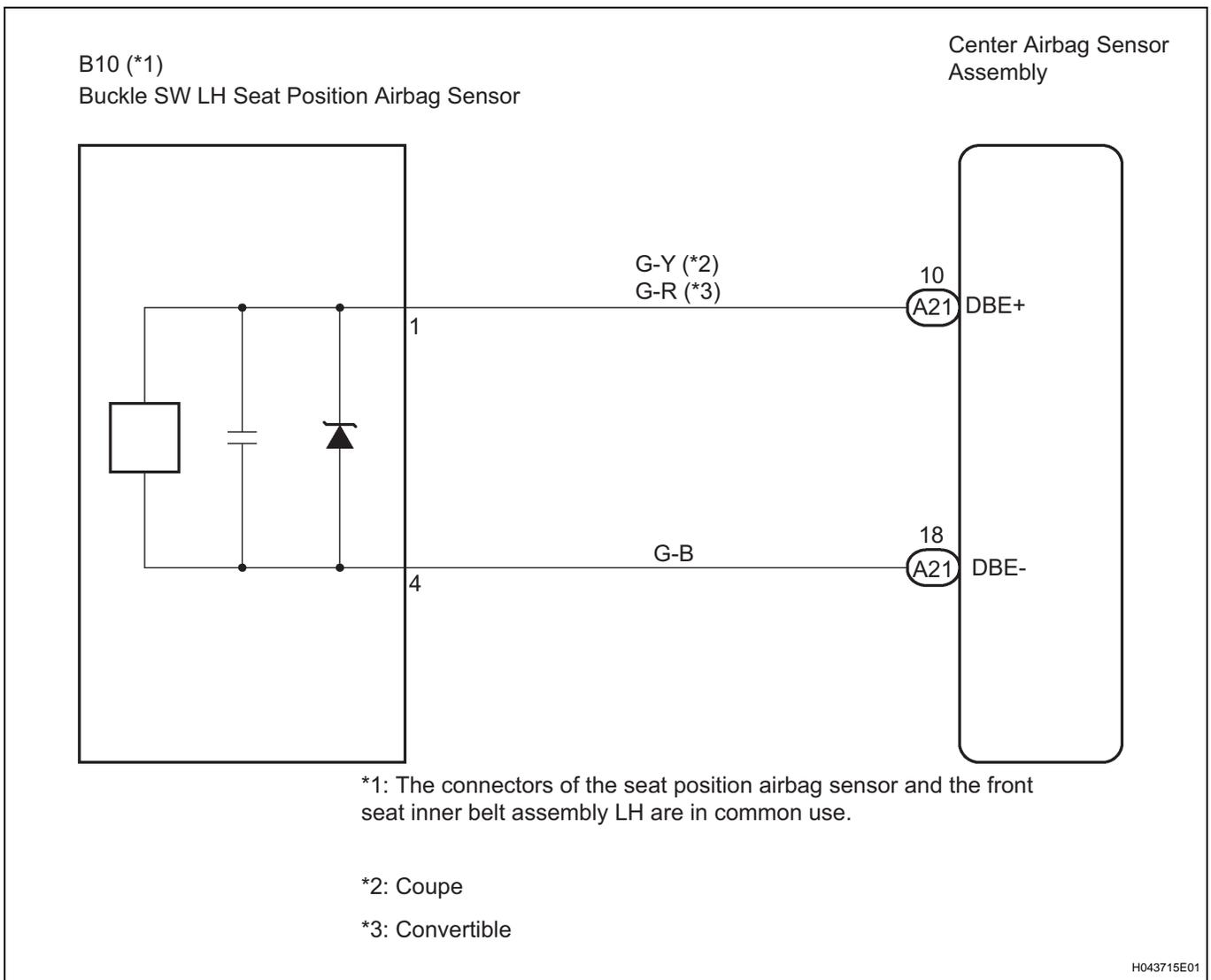
**DESCRIPTION**

The driver side seat belt buckle switch circuit consists of the center airbag sensor assembly and the front seat inner belt assembly LH.

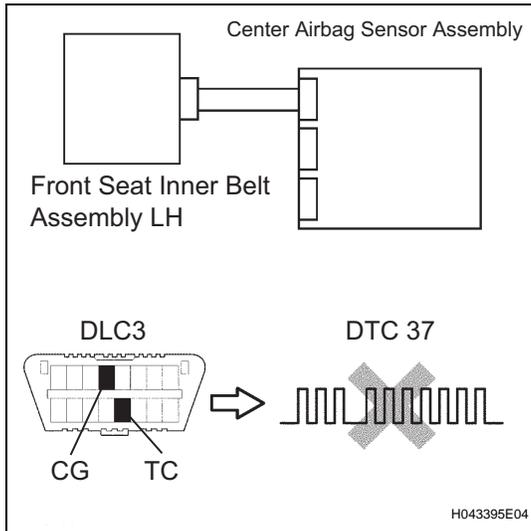
DTC B1655/37 is recorded when a malfunction is detected in the driver side seat belt buckle switch circuit.

DTC No.	DTC Detecting Condition	Trouble Area
B1655/37	<ul style="list-style-type: none"> <li>The center airbag sensor assembly receives a line short circuit signal, an open circuit signal, a short circuit to ground signal or a short circuit to B+ signal in the driver side seat belt buckle switch circuit for 2 seconds.</li> <li>Front seat inner belt assembly LH malfunction</li> <li>Center airbag sensor assembly malfunction</li> </ul>	<ul style="list-style-type: none"> <li>Floor wire</li> <li>Front seat inner belt assembly LH</li> <li>Center airbag sensor assembly</li> </ul>

**WIRING DIAGRAM**



**RS**

**1 CHECK DTC**

- Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- Clear the DTCs stored in memory (See page RS-36).
- Turn the ignition switch to the LOCK position.
- Turn the ignition switch to the ON position and wait for at least 60 seconds.
- Check the DTCs (See page RS-36).

**OK:****DTC B1655/37 is not output.****HINT:**

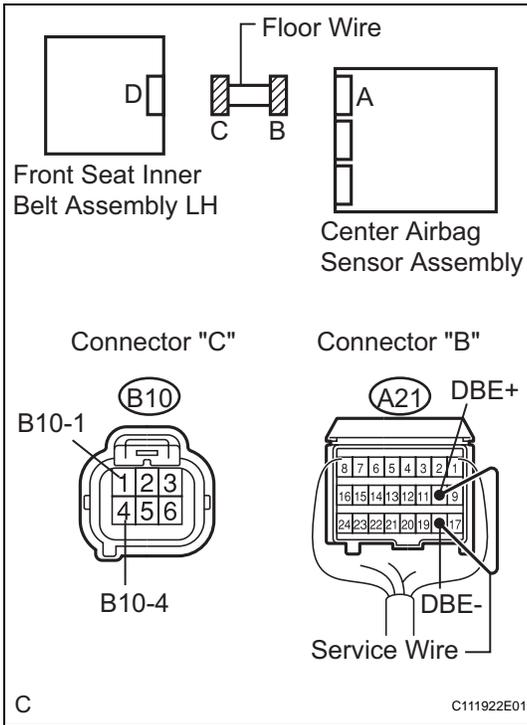
Codes other than DTC B1655/37 may be output at this time, but they are not related to this check.

**OK****USE SIMULATION METHOD TO CHECK****NG****2 CHECK CONNECTION OF CONNECTORS**

- Turn the ignition switch to the LOCK position.
- Disconnect the negative (-) terminal cable from the battery, and wait for at least 90 seconds.
- Check that the connectors are properly connected to the center airbag sensor assembly and the front seat inner belt assembly LH.

**OK:****The connectors are connected.****NG****CONNECT CONNECTORS, THEN GO TO STEP 1****OK**

**3 CHECK FLOOR WIRE (OPEN)**



(a) Disconnect the connectors from the center airbag sensor assembly and the front seat inner belt assembly LH.

(b) Using a service wire, connect A21-10 (DBE+) and A21-18 (DBE-) of connector "B".

**NOTICE:**

**Do not forcibly insert a service wire into the terminals of the connector when connecting.**

(c) Measure the resistance according to the value(s) in the table below.

**Resistance**

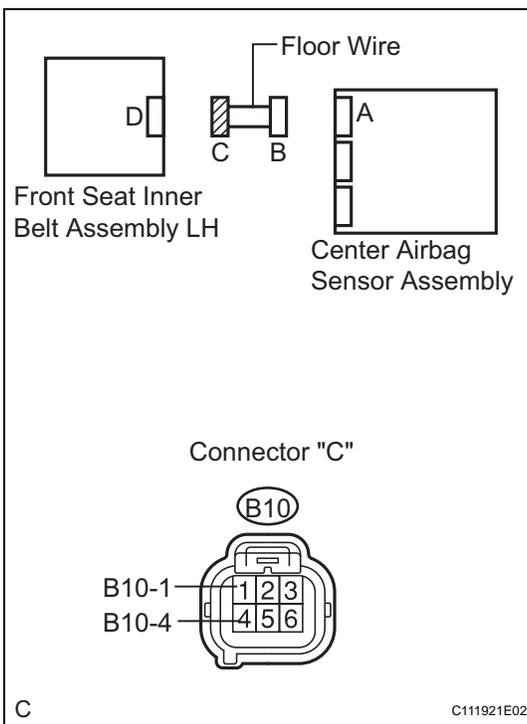
Tester connection	Condition	Specified condition
B10-1 - B10-4	Always	Below 1 Ω

**NG REPAIR OR REPLACE FLOOR WIRE**

**OK**

**RS**

**4 CHECK FLOOR WIRE (SHORT)**



(a) Disconnect the service wire from connector "B".

(b) Measure the resistance according to the value(s) in the table below.

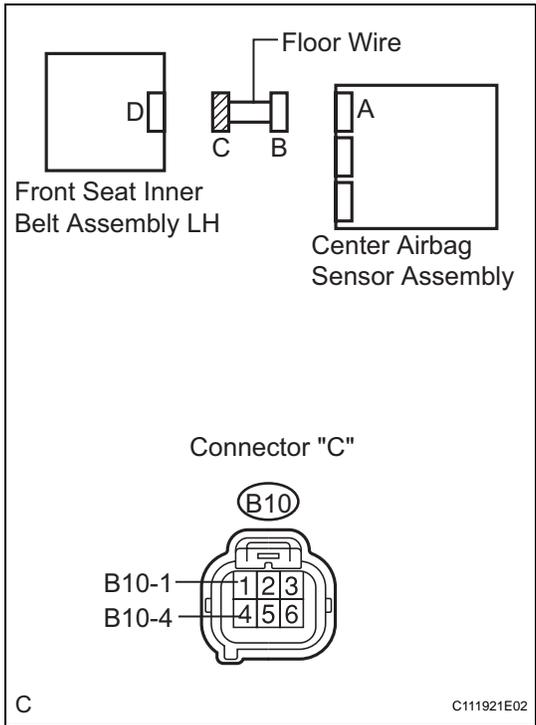
**Resistance**

Tester connection	Condition	Specified condition
B10-1 - B10-4	Always	1 MΩ or higher

**NG REPAIR OR REPLACE FLOOR WIRE**

**OK**

**5 CHECK FLOOR WIRE (SHORT TO B+)**



- (a) Connect the negative (-) terminal cable to the battery, and wait for at least 2 seconds.
- (b) Turn the ignition switch to the ON position.
- (c) Measure the voltage according to the value(s) in the table below.

**Voltage**

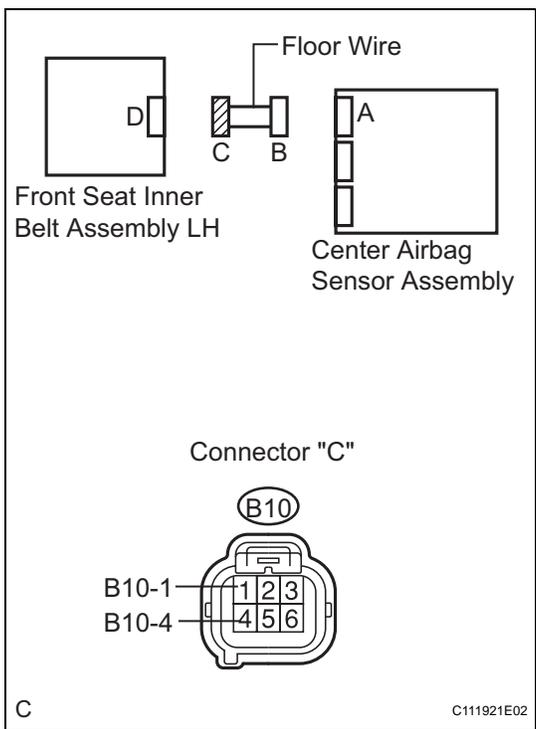
Tester connection	Condition	Specified condition
B10-1 - Body ground	Ignition switch ON	Below 1 V
B10-4 - Body ground	Ignition switch ON	Below 1 V

**NG** REPAIR OR REPLACE FLOOR WIRE

OK

RS

**6 CHECK FLOOR WIRE (SHORT TO GROUND)**



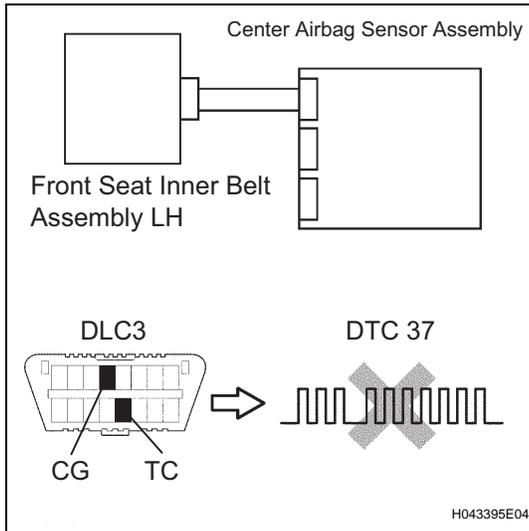
- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery, and wait for at least 90 seconds.
- (c) Measure the resistance according to the value(s) in the table below.

**Resistance**

Tester connection	Condition	Specified condition
B10-1 - Body ground	Always	1 MΩ or higher
B10-4 - Body ground	Always	1 MΩ or higher

**NG** REPAIR OR REPLACE FLOOR WIRE

OK

**7 CHECK FRONT SEAT INNER BELT ASSEMBLY LH**

- Connect the connectors to the center airbag sensor assembly and the front seat inner belt assembly LH.
- Connect the negative (-) terminal cable to the battery, and wait for at least 2 seconds.
- Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- Clear the DTCs stored in memory (See page [RS-36](#)).
- Turn the ignition switch to the LOCK position.
- Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- Check the DTCs (See page [RS-36](#)).

**OK:**

**DTC B1655/37 is not output.**

**HINT:**

Codes other than DTC B1655/37 may be output at this time, but they are not related to this check.

OK

**USE SIMULATION METHOD TO CHECK**

NG

**8 REPLACE FRONT SEAT INNER BELT ASSEMBLY LH**

- Turn the ignition switch to the LOCK position.
- Disconnect the negative (-) terminal cable from the battery, and wait for at least 90 seconds.
- Replace the front seat inner belt assembly LH (See page [SB-6](#) for coupe or [SB-8](#) for convertible).

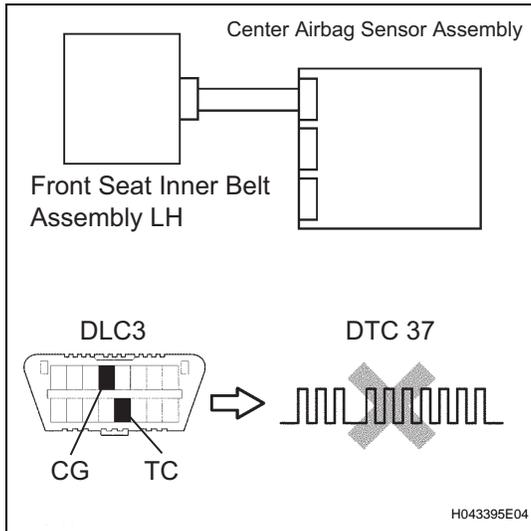
**HINT:**

Perform the inspection using parts from a normal vehicle if possible.

NEXT

RS

## 9 CHECK CENTER AIRBAG SENSOR ASSEMBLY



- Connect the negative (-) terminal cable to the battery, and wait for at least 2 seconds.
- Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- Clear the DTCs stored in memory (See page [RS-36](#)).
- Turn the ignition switch to the LOCK position.
- Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- Check the DTCs (See page [RS-36](#)).

**OK:**

**DTC B1655/37 is not output.**

**HINT:**

Codes other than DTC B1655/37 may be output at this time, but they are not related to this check.

**NG**

**REPLACE CENTER AIRBAG SENSOR ASSEMBLY**

**OK****END**

<b>DTC</b>	<b>B1660/43</b>	<b>Passenger Airbag ON / OFF Indicator Circuit Malfunction</b>
------------	-----------------	--

**DESCRIPTION**

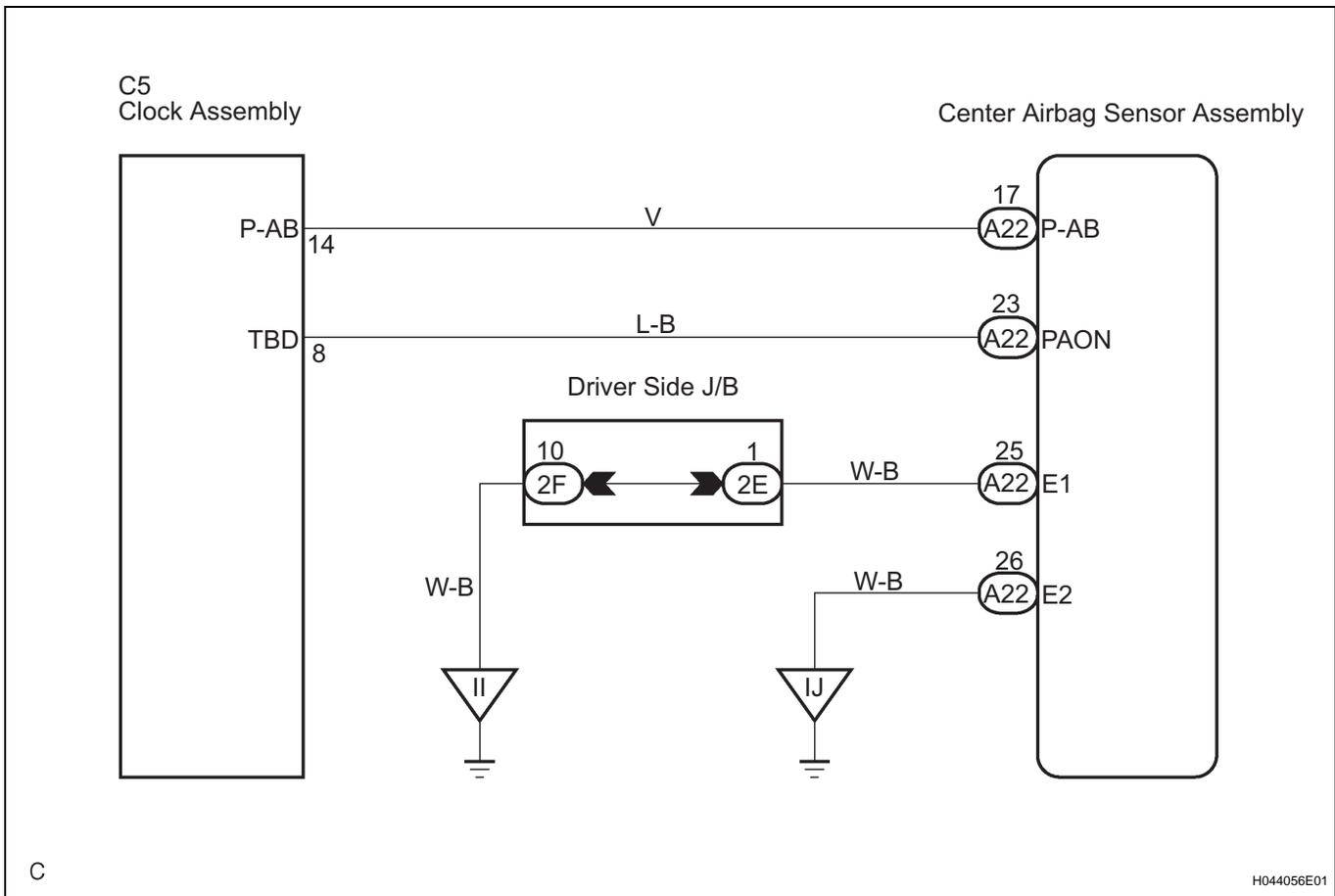
The passenger airbag ON/OFF indicator circuit consists of the center airbag sensor assembly and the clock assembly.

This circuit indicates the operation condition of the front passenger airbag assembly and the front passenger side - side airbag and front passenger side front seat belt pretensioner.

DTC B1660/43 is recorded when a malfunction is detected in the passenger airbag ON/OFF indicator circuit.

DTC No.	DTC Detecting Condition	Trouble Area
B1660/43	<ul style="list-style-type: none"> <li>The center airbag sensor assembly receives a line short circuit signal, an open circuit signal, a short circuit to ground signal or a short circuit to B+ signal in the passenger airbag ON/OFF indicator circuit for 2 seconds.</li> <li>Clock assembly malfunction</li> <li>Center airbag sensor assembly malfunction</li> </ul>	<ul style="list-style-type: none"> <li>Instrument panel wire</li> <li>Clock assembly</li> <li>Center airbag sensor assembly</li> </ul>

**WIRING DIAGRAM**

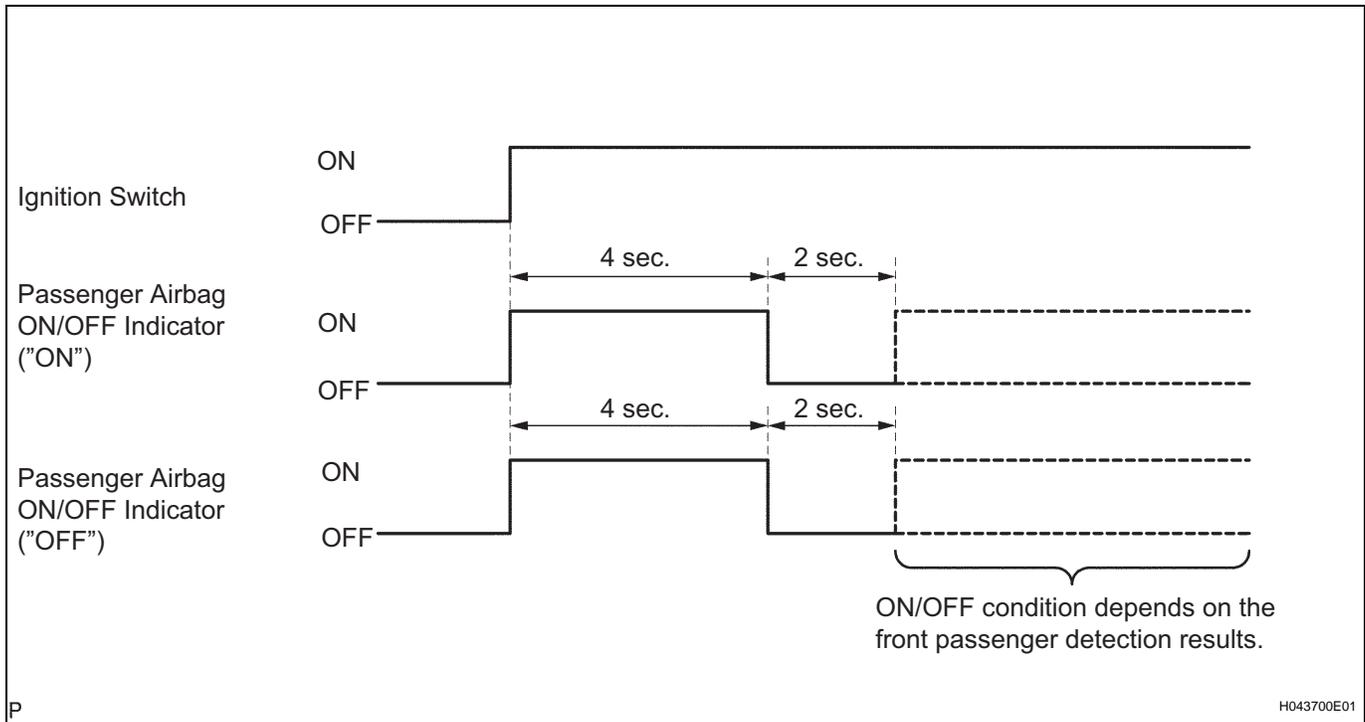


**RS**

<b>1</b>	<b>CHECK PASSENGER AIRBAG ON/OFF INDICATOR OPERATION</b>
----------	--

(a) Turn the ignition switch to the ON position.

- (b) Check the passenger airbag ON/OFF indicator operation.



**HINT:**

Refer to the normal condition of the passenger airbag ON/OFF indicator (See page [RS-189](#)).

**Result:**

**A:**

The passenger airbag ON/OFF indicator always comes on.

**B:**

The passenger airbag ON/OFF indicator does not come on.

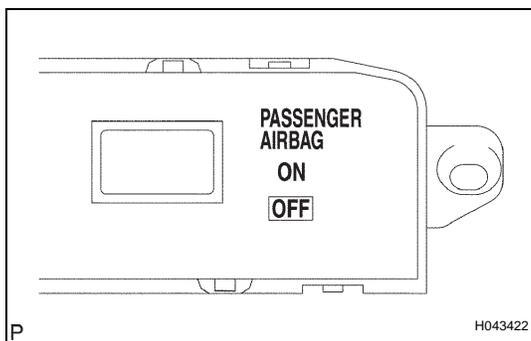
**B**

Go to step 6

**A**

**2**

**CHECK CLOCK ASSEMBLY (PASSENGER AIRBAG ON/OFF INDICATOR)**



- Turn the ignition switch to the LOCK position.
- Disconnect the negative (-) terminal cable from the battery, and wait for at least 90 seconds.
- Disconnect the connector from the clock assembly.
- Connect the negative (-) terminal cable to the battery, and wait for at least 2 seconds.
- Turn the ignition switch to the ON position.
- Check the passenger airbag ON/OFF indicator operation.

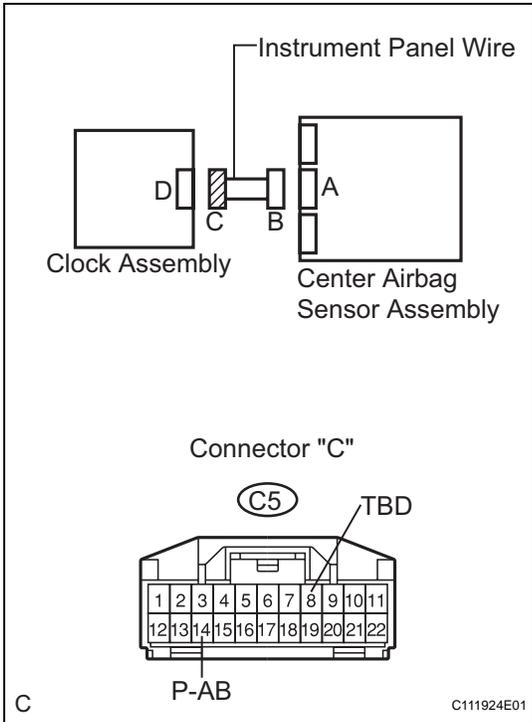
**OK:**

The passenger airbag ON/OFF indicator ("ON" and "OFF") do not come on.

**NG** **REPLACE CLOCK ASSEMBLY**

**OK**

**3 CHECK INSTRUMENT PANEL WIRE (SHORT TO GROUND)**



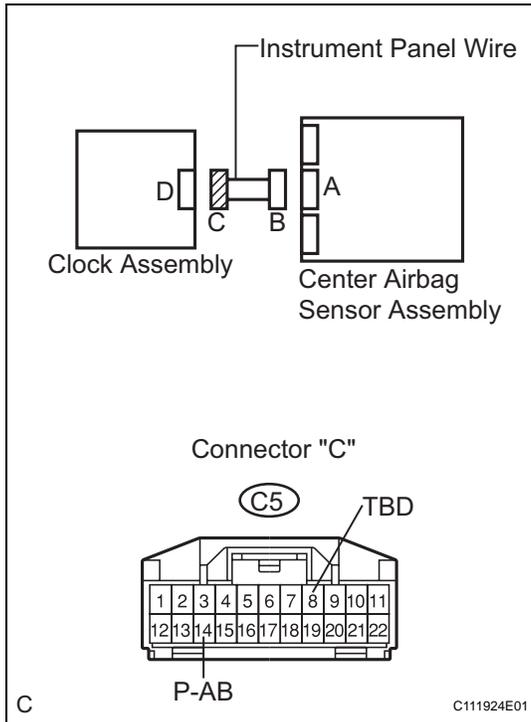
- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery, and wait for at least 90 seconds.
- (c) Disconnect the connectors from the center airbag sensor assembly.
- (d) Measure the resistance according to the value(s) in the table below.

**Resistance**

Terminal connection	Condition	Specified condition
C5-8 (TBD) - Body ground	Always	1 MΩ or higher
C5-14 (P-AB) - Body ground	Always	1 MΩ or higher

**NG** **REPAIR OR REPLACE INSTRUMENT PANEL WIRE**

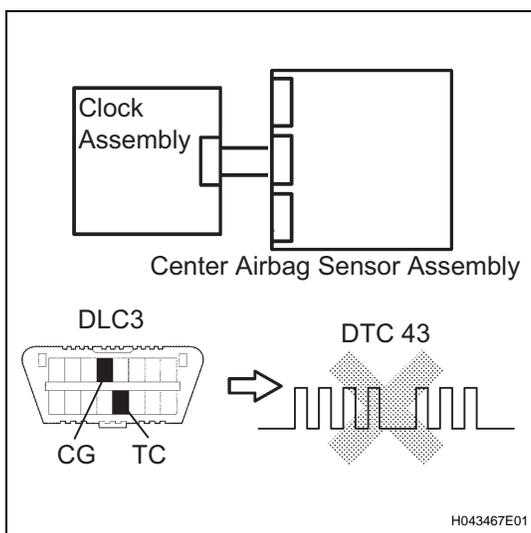
**OK**

**4 CHECK INSTRUMENT PANEL WIRE (SHORT)**

- (a) Measure the resistance according to the value(s) in the table below.

**Resistance**

Terminal connection	Condition	Specified condition
C5-8 (TBD) - Body ground	Always	1 M $\Omega$ or higher
C5-14 (P-AB) - Body ground	Always	1 M $\Omega$ or higher

**NG****REPAIR OR REPLACE INSTRUMENT PANEL WIRE****OK****RS****5 CHECK CENTER AIRBAG SENSOR ASSEMBLY**

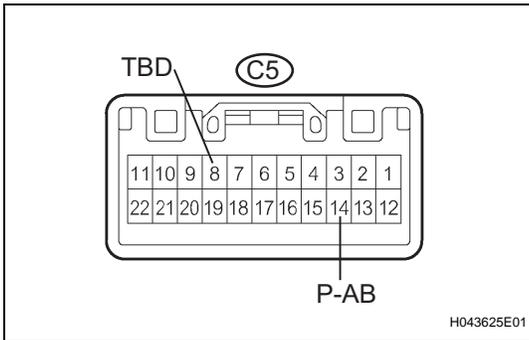
- (a) Connect the connectors to the center airbag sensor assembly and the clock assembly.
- (b) Connect the negative (-) terminal cable to the battery, and wait for at least 2 seconds.
- (c) Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- (d) Clear the DTCs stored in memory (See page [RS-36](#)).
- (e) Turn the ignition switch to the LOCK position.
- (f) Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- (g) Check the DTCs (See page [RS-36](#)).

**OK:****DTC B1660/43 is not output.****HINT:**

Codes other than DTC B1660/43 may be output at this time, but they are not related to this check.

**NG****REPLACE CENTER AIRBAG SENSOR ASSEMBLY****OK****USE SIMULATION METHOD TO CHECK**

**6 CHECK WIRE HARNESS (SOURCE VOLTAGE OF CLOCK ASSEMBLY)**



- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery, and wait at least 90 seconds.
- (c) Disconnect the connector from the clock assembly.
- (d) Connect the negative (-) terminal cable to the battery, and wait for at least 2 seconds.
- (e) Turn the ignition switch to the ON position.
- (f) Measure the voltage according to the value(s) in the table below.

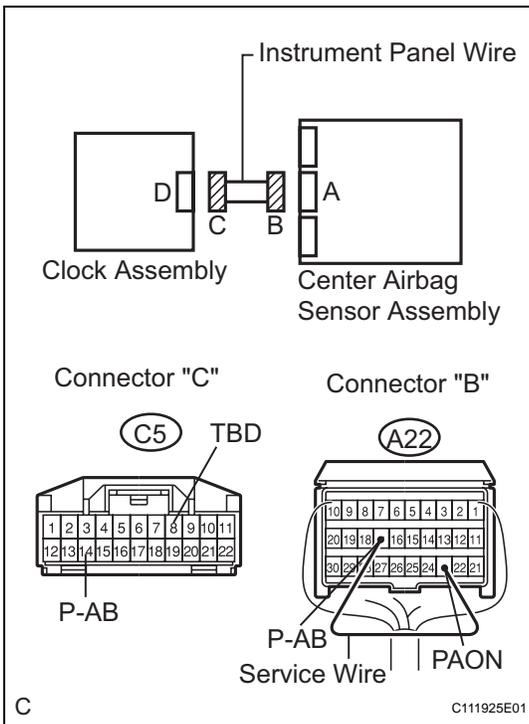
**Voltage**

Terminal connection	Condition	Specified condition
C5-8 (TBD) - Body ground	Ignition switch ON	10 to 14 V
C5-14 (P-AB) - Body ground	Ignition switch ON	10 to 14 V

**NG** **REPLACE CLOCK ASSEMBLY OR WIRE HARNESS (CLOCK ASSEMBLY - BATTERY) OR BATTERY**

**OK**

**7 CHECK INSTRUMENT PANEL WIRE (OPEN)**



- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery, and wait for at least 90 seconds.
- (c) Disconnect the connectors from the center airbag sensor assembly.
- (d) Using a service wire, connect A22-23 (PAON) and A22 - 17 (P-AB) of connector "B".

**NOTICE:**

**Do not forcibly insert a service wire into the terminals of connector when connecting.**

- (e) Measure the resistance according to the value(s) in the table below.

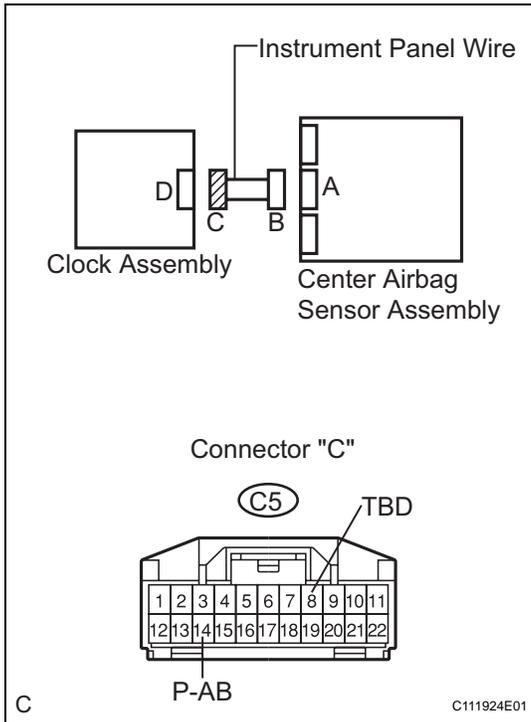
**Resistance**

Tester connection	Condition	Specified condition
C5-8 (TBD) - C5-14 (P-AB)	Always	Below 1 Ω

**NG** **REPAIR OR REPLACE INSTRUMENT PANEL WIRE**

**OK**

**8 CHECK INSTRUMENT PANEL WIRE (SHORT TO B+)**



- (a) Disconnect the service wire from connector "B".
- (b) Connect the negative (-) terminal cable to the battery, and wait for at least 2 seconds.
- (c) Turn the ignition switch to the ON position.
- (d) Measure the voltage according to the value(s) in the table below.

**Voltage**

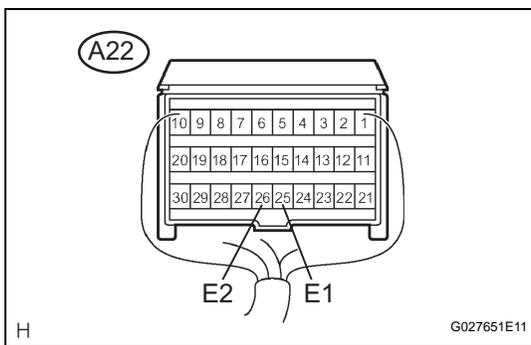
Tester connection	Condition	Specified condition
C5-8 (TBD) - Body ground	Ignition switch ON	Below 1 V
C5-14 (P-AB) - Body ground	Ignition switch ON	Below 1 V

**NG** REPAIR OR REPLACE INSTRUMENT PANEL WIRE

**OK**

**RS**

**9 CHECK INSTRUMENT PANEL WIRE (CENTER AIRBAG SENSOR ASSEMBLY - BODY GROUND)**



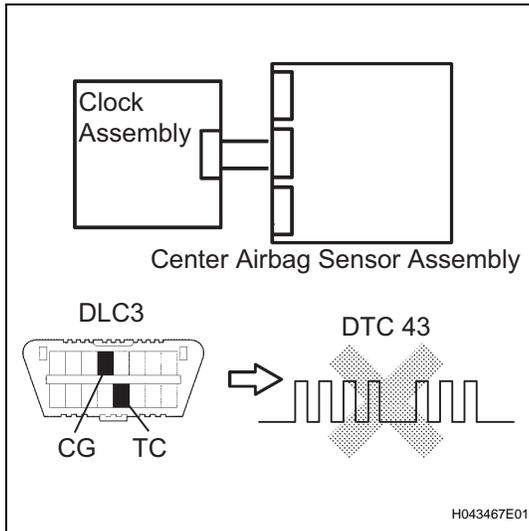
- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery, and wait for at least 90 seconds.
- (c) Measure the resistance according to the value(s) in the table below.

**Resistance**

Tester connection	Condition	Specified condition
A22-25 (E1) - Body ground	Always	Below 1 Ω
A22-26 (E2) - Body ground	Always	Below 1 Ω

**NG** REPAIR OR REPLACE INSTRUMENT PANEL WIRE

**OK**

**10 CHECK CENTER AIRBAG SENSOR ASSEMBLY**

- (a) Connect the connectors to the center airbag sensor assembly and the clock assembly.
- (b) Connect the connector to the clock assembly.
- (c) Connect the negative (-) terminal cable to the battery, and wait for at least 2 seconds.
- (d) Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- (e) Clear the DTCs stored in memory (See page [RS-36](#)).
- (f) Turn the ignition switch to the LOCK position.
- (g) Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- (h) Check the DTCs (See page [RS-36](#)).

**OK:**

**DTC B1660/43 is not output.**

**HINT:**

Codes other than DTC B1660/43 may be output at this time, but they are not related to this check.

**NG**

**REPLACE CENTER AIRBAG SENSOR ASSEMBLY**

**OK**

**USE SIMULATION METHOD TO CHECK**

**RS**

<b>DTC</b>	<b>B1800/51</b>	<b>Short in Driver Side Squib Circuit</b>
<b>DTC</b>	<b>B1801/51</b>	<b>Open in Driver Side Squib Circuit</b>
<b>DTC</b>	<b>B1802/51</b>	<b>Short to GND in Driver Side Squib Circuit</b>
<b>DTC</b>	<b>B1803/51</b>	<b>Short to B+ in Driver Side Squib Circuit</b>

## DESCRIPTION

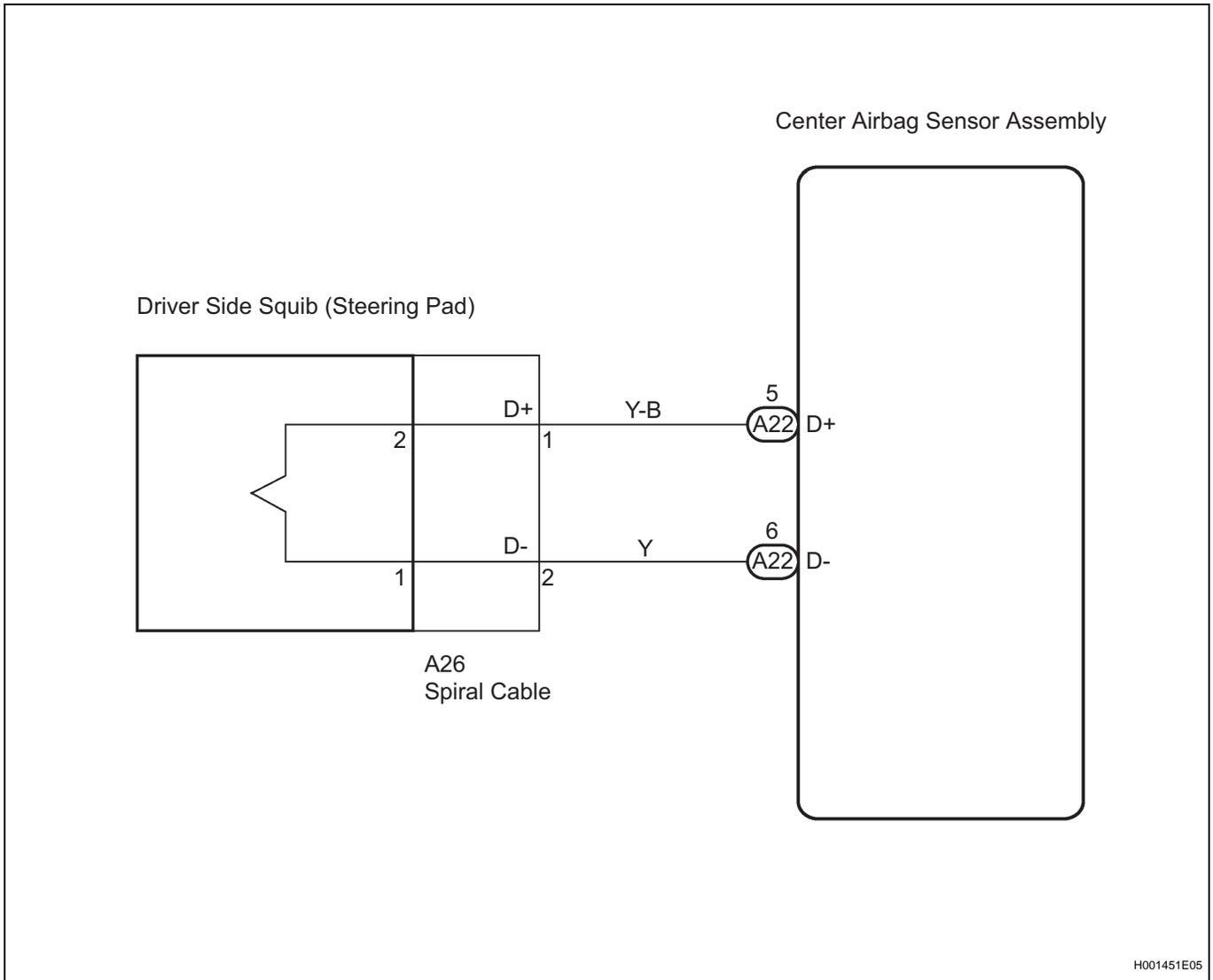
The driver side squib circuit consists of the center airbag sensor assembly, the spiral cable and the steering pad.

The circuit instructs the SRS to deploy when deployment conditions are met.

These DTCs are recorded when a malfunction is detected in the driver side squib circuit.

<b>DTC No.</b>	<b>DTC Detecting Condition</b>	<b>Trouble Area</b>
B1800/51	<ul style="list-style-type: none"> <li>The center airbag sensor assembly receives a line short circuit signal 5 times in the driver side squib circuit during primary check.</li> <li>Driver side squib malfunction</li> <li>Spiral cable malfunction</li> <li>Center airbag sensor assembly malfunction</li> </ul>	<ul style="list-style-type: none"> <li>Instrument panel wire</li> <li>Spiral cable</li> <li>Steering pad (Driver side squib)</li> <li>Center airbag sensor assembly</li> </ul>
B1801/51	<ul style="list-style-type: none"> <li>The center airbag sensor assembly receives an open circuit signal in the driver side squib circuit for 2 seconds.</li> <li>Driver side squib malfunction</li> <li>Spiral cable malfunction</li> <li>Center airbag sensor assembly malfunction</li> </ul>	<ul style="list-style-type: none"> <li>Instrument panel wire</li> <li>Spiral cable</li> <li>Steering pad (Driver side squib)</li> <li>Center airbag sensor assembly</li> </ul>
B1802/51	<ul style="list-style-type: none"> <li>The center airbag sensor assembly receives a short circuit to ground signal in the driver side squib circuit for 0.5 seconds.</li> <li>Driver side squib malfunction</li> <li>Spiral cable malfunction</li> <li>Center airbag sensor assembly malfunction</li> </ul>	<ul style="list-style-type: none"> <li>Instrument panel wire</li> <li>Spiral cable</li> <li>Steering pad (Driver side squib)</li> <li>Center airbag sensor assembly</li> </ul>
B1803/51	<ul style="list-style-type: none"> <li>The center airbag sensor assembly receives a short circuit to B+ signal in the driver side squib circuit for 0.5 seconds.</li> <li>Driver side squib malfunction</li> <li>Spiral cable malfunction</li> <li>Center airbag sensor assembly malfunction</li> </ul>	<ul style="list-style-type: none"> <li>Instrument panel wire</li> <li>Spiral cable</li> <li>Steering pad (Driver side squib)</li> <li>Center airbag sensor assembly</li> </ul>

**WIRING DIAGRAM**

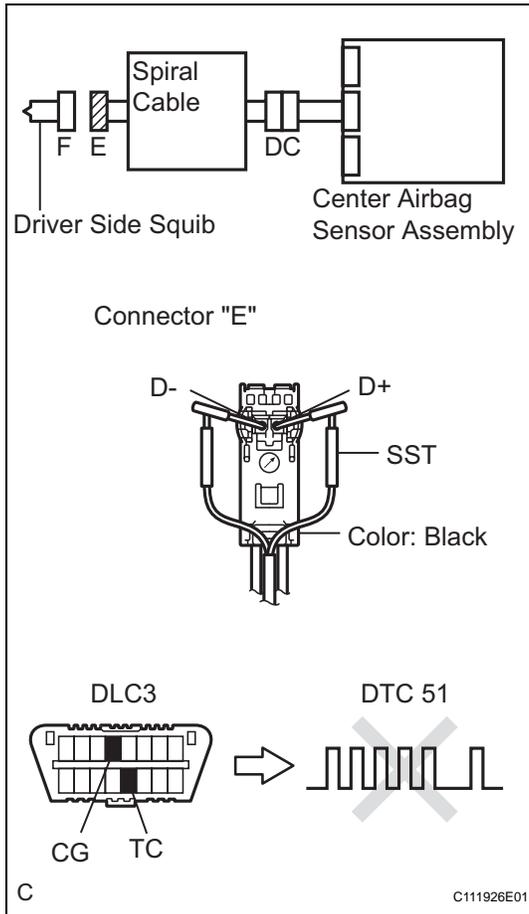


**RS**

**HINT:**

- Perform the simulation method by selecting the "check mode" (signal check) with the intelligent tester (See page [RS-39](#)).
- After selecting the "check mode" (signal check), perform the simulation method by wiggling each connector of the airbag system or driving the vehicle on a city or rough road (See page [RS-39](#)).

## 1 CHECK STEERING PAD (DRIVER SIDE SQUIB)



- Turn the ignition switch to the LOCK position.
- Disconnect the negative (-) terminal cable from the battery, and wait for at least 90 seconds.
- Disconnect the connectors from the steering pad.
- Connect the white wire side of SST (resistance 2.1  $\Omega$ ) to connector "E" (black connector).

### CAUTION:

**Never connect a tester to the steering pad (Driver side squib) for measurement, as the may lead to a serious injury due to airbag deployment.**

### NOTICE:

- Do not forcibly insert the SST into the terminals of the connector when connecting.
- Insert straight the SST into the terminals of the connector.

### SST 09843-18060

- Connect the negative (-) terminal cable to the battery, and wait for at least 2 seconds.
- Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- Clear the DTCs stored in memory (See page RS-36).
- Turn the ignition switch to the LOCK position.
- Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- Check the DTCs (See page RS-36).

### OK:

**DTC B1800, B1801, B1802, B1803 or 51 is not output.**

### HINT:

Codes other than DTC B1800, B1801, B1802, B1803 and 51 may be output at this time, but they are not related to this check.

OK

REPLACE STEERING PAD

NG

## 2 CHECK CONNECTOR

- Turn the ignition switch to the LOCK position.
- Disconnect the negative (-) terminal cable from the battery, and wait for at least 90 seconds.
- Disconnect the SST from connector "E".
- Check that the spiral cable connectors (on the steering pad side) are not damaged.

### OK:

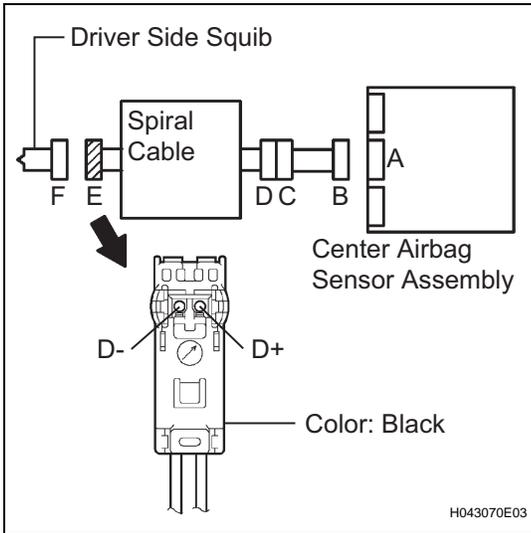
**The lock button is not disengaged, or the claw of the lock is not deformed or damaged.**

NG

REPLACE SPIRAL CABLE

OK

**3 CHECK DRIVER SIDE SQUIB CIRCUIT**



- (a) Disconnect the connectors from the center airbag sensor assembly.
- (b) Check the short to B+ in the circuit.
  - (1) Connect the negative (-) terminal cable to the battery, and wait for at least 2 seconds.
  - (2) Turn the ignition switch to the ON position.
  - (3) Measure the voltage according to the value(s) in the table below.

**Voltage**

Tester connection	Condition	Specified condition
D+ - Body ground	Ignition switch ON	Below 1 V
D- - Body ground	Ignition switch ON	Below 1 V

- (c) Check the open in the circuit.
  - (1) Turn the ignition switch to the LOCK position.
  - (2) Disconnect the negative (-) terminal cable from the battery, and wait for at least 90 seconds.
  - (3) Measure the resistance according to the value(s) in the table below.

**Resistance**

Tester connection	Condition	Specified condition
D+ - D-	Always	Below 1 Ω

- (d) Check the short to ground in the circuit.
  - (1) Measure the resistance according to the value(s) in the table below.

**Resistance**

Tester connection	Condition	Specified condition
D+ - Body ground	Always	1 MΩ or higher
D- - Body ground	Always	1 MΩ or higher

- (e) Check for short in the circuit.
  - (1) Release the activation prevention mechanism built into connector "B" (See page RS-30).
  - (2) Measure the resistance according to the value(s) in the table below.

**Resistance**

Tester connection	Condition	Specified condition
D+ - D-	Always	1 MΩ or higher

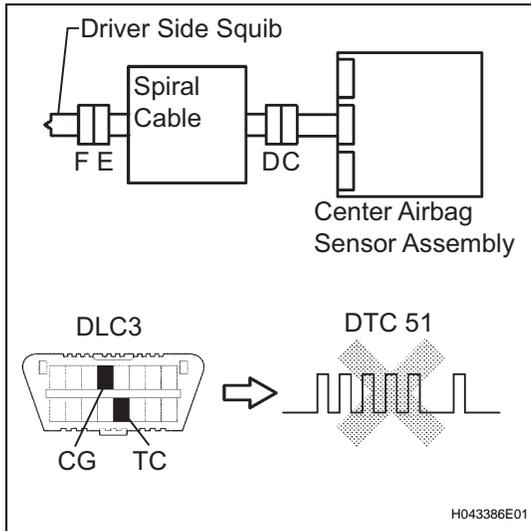
RS

NG

Go to step 5

OK

#### 4 CHECK CENTER AIRBAG SENSOR ASSEMBLY



- Connect the connectors to the steering pad and the center airbag sensor assembly.
- Connect the negative (-) terminal cable to the battery, and wait for at least 2 seconds.
- Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- Clear the DTCs stored in memory (See page RS-36).
- Turn the ignition switch to the LOCK position.
- Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- Check the DTCs (See page RS-36).

#### OK:

**DTC B1800, B1801, B1802, B1803 or 51 is not output.**

#### HINT:

Codes other than DTC B1800, B1801, B1802, B1803 and 51 may be output at this time, but they are not related to this check.

**NG**

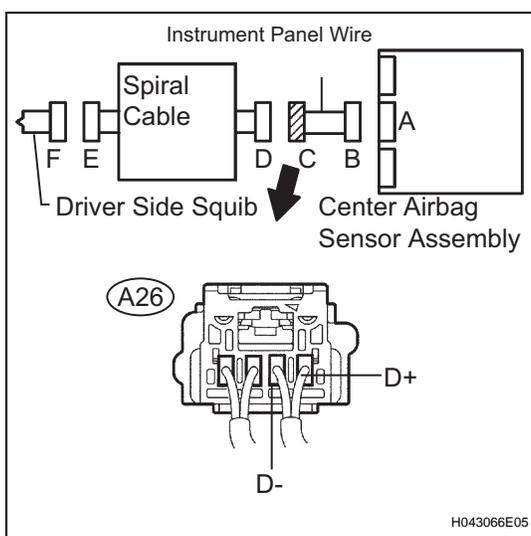
**REPLACE CENTER AIRBAG SENSOR ASSEMBLY**

**OK**

**RS**

#### USE SIMULATION METHOD TO CHECK

#### 5 CHECK INSTRUMENT PANEL WIRE



- Restore the released activation prevention mechanism of connector "B" to the original condition.
- Disconnect the instrument panel wire connector from the spiral cable.
- Check the short to B+ in the circuit.
  - Connect the negative (-) terminal cable to the battery, and wait for at least 2 seconds.
  - Turn the ignition switch to the ON position.
  - Measure the voltage according to the value(s) in the table below.

#### Voltage

Tester connection	Condition	Specified condition
A26-1 (D+) - Body ground	Ignition switch ON	Below 1 V
A26-2 (D-) - Body ground	Ignition switch ON	Below 1 V

- Check the open in the circuit.
  - Turn the ignition switch to the LOCK position.
  - Disconnect the negative (-) terminal cable from the battery, and wait for at least 90 seconds.

- (3) Measure the resistance according to the value(s) in the table below.

**Resistance**

Tester connection	Condition	Specified condition
A26-1 (D+) - A26-2 (D-)	Always	Below 1 Ω

- (e) Check the short to ground in the circuit.

- (1) Measure the resistance according to the value(s) in the table below.

**Resistance**

Tester connection	Condition	Specified condition
A26-1 (D+) - Body ground	Always	1 MΩ or higher
A26-2 (D-) - Body ground	Always	1 MΩ or higher

- (f) Check the short in the circuit.

- (1) Release the activation prevention mechanism built into connector "B" (See page RS-30).
- (2) Measure the resistance according to the value(s) in the table below.

**Resistance**

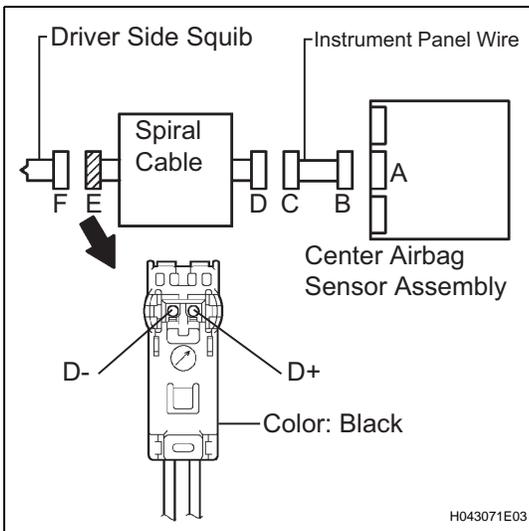
Tester connection	Condition	Specified condition
A26-1 (D+) - A26-2 (D-)	Always	1 MΩ or higher

**NG** REPAIR OR REPLACE INSTRUMENT PANEL WIRE

**RS**

**OK**

**6 CHECK SPIRAL CABLE**



- (a) Check the short to B+ in the circuit.

- (1) Connect the negative (-) terminal cable to the battery, and wait for at least 2 seconds.
- (2) Turn the ignition switch to the ON position.
- (3) Measure the voltage according to the value(s) in the table below.

**Voltage**

Tester connection	Condition	Specified condition
D+ - Body ground	Ignition switch ON	Below 1 V
D- - Body ground	Ignition switch ON	Below 1 V

- (b) Check the open in the circuit.

- (1) Turn the ignition switch to the LOCK position.
- (2) Disconnect the negative (-) terminal cable from the battery, and wait for at least 90 seconds.
- (3) Measure the resistance according to the value(s) in the table below.

**Resistance**

Tester connection	Condition	Specified condition
D+ - D-	Always	Below 1 Ω

- (c) Check the short to ground in the circuit.

- (1) Measure the resistance according to the value(s) in the table below.

**Resistance**

Tester connection	Condition	Specified condition
D+ - Body ground	Always	1 M $\Omega$ or higher
D- - Body ground	Always	1 M $\Omega$ or higher

- (d) Check the short in the circuit.
- (1) Release the activation prevention mechanism built into connector "D" (See page [RS-30](#)).
- (2) Measure the resistance according to the value(s) in the table below.

**Resistance**

Tester connection	Condition	Specified condition
D+ - D-	Always	1 M $\Omega$ or higher

NG

REPLACE SPIRAL CABLE

OK

USE SIMULATION METHOD TO CHECK

<b>DTC</b>	<b>B1805/52</b>	<b>Short in Front Passenger Side Squib Circuit</b>
<b>DTC</b>	<b>B1806/52</b>	<b>Open in Front Passenger Side Squib Circuit</b>
<b>DTC</b>	<b>B1807/52</b>	<b>Short to GND in Front Passenger Side Squib Circuit</b>
<b>DTC</b>	<b>B1808/52</b>	<b>Short to B+ in Front Passenger Side Squib Circuit</b>

**DESCRIPTION**

The front passenger side squib circuit consists of the center airbag sensor assembly and the front passenger airbag assembly.

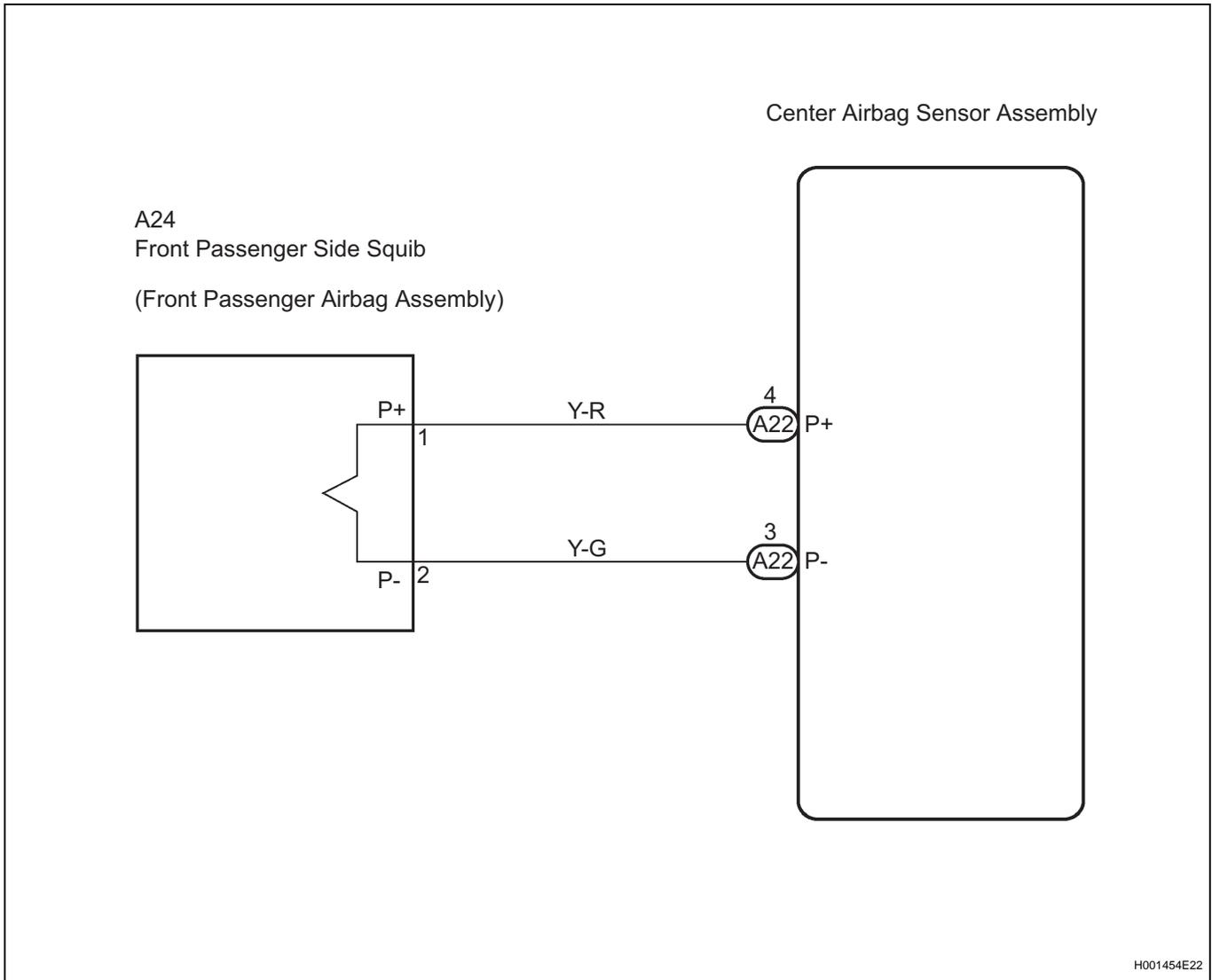
The circuit instructs the SRS to deploy when deployment conditions are met.

These DTCs are recorded when a malfunction is detected in the front passenger side squib circuit.

<b>DTC No.</b>	<b>DTC Detection Condition</b>	<b>Trouble Area</b>
B1805/52	<ul style="list-style-type: none"> <li>The center airbag sensor assembly receives a line short circuit signal 5 times in the front passenger side squib circuit during primary check.</li> <li>Front passenger side squib malfunction</li> <li>Center airbag sensor assembly malfunction</li> </ul>	<ul style="list-style-type: none"> <li>Instrument panel wire</li> <li>Instrument panel wire assembly</li> <li>Front passenger airbag assembly (Front passenger side squib)</li> <li>Center airbag sensor assembly</li> </ul>
B1806/52	<ul style="list-style-type: none"> <li>The center airbag sensor assembly receives an open circuit signal in the front passenger side squib circuit for 2 seconds.</li> <li>Front passenger side squib malfunction</li> <li>Center airbag sensor assembly malfunction</li> </ul>	<ul style="list-style-type: none"> <li>Instrument panel wire</li> <li>Instrument panel wire assembly</li> <li>Front passenger airbag assembly (Front passenger side squib)</li> <li>Center airbag sensor assembly</li> </ul>
B1807/52	<ul style="list-style-type: none"> <li>The center airbag sensor assembly receives a short circuit to ground signal in the front passenger side squib circuit for 0.5 seconds.</li> <li>Front passenger side squib malfunction</li> <li>Center airbag sensor assembly malfunction</li> </ul>	<ul style="list-style-type: none"> <li>Instrument panel wire</li> <li>Instrument panel wire assembly</li> <li>Front passenger airbag assembly (Front passenger side squib)</li> <li>Center airbag sensor assembly</li> </ul>
B1808/52	<ul style="list-style-type: none"> <li>The center airbag sensor assembly receives a short circuit to B+ signal in the front passenger side squib circuit for 0.5 seconds.</li> <li>Front passenger side squib malfunction</li> <li>Center airbag sensor assembly malfunction</li> </ul>	<ul style="list-style-type: none"> <li>Instrument panel wire</li> <li>Instrument panel wire assembly</li> <li>Front passenger airbag assembly (Front passenger side squib)</li> <li>Center airbag sensor assembly</li> </ul>

**RS**

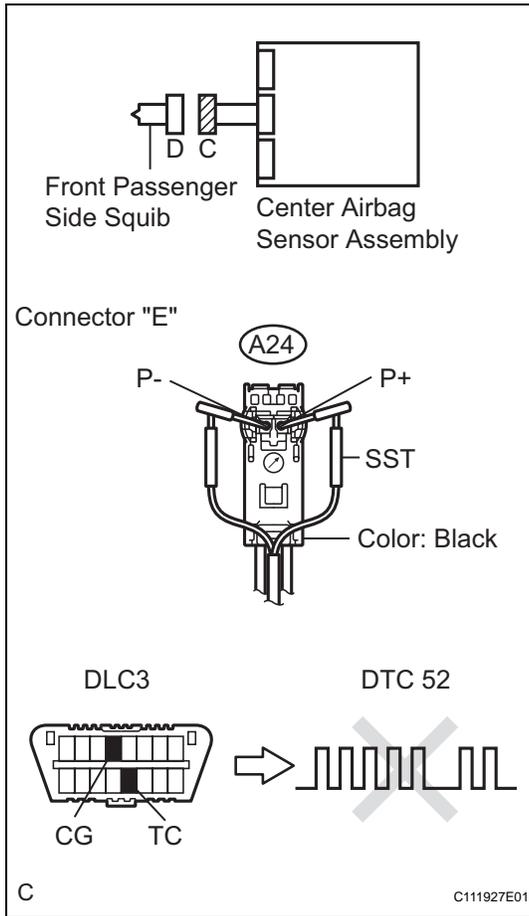
## WIRING DIAGRAM



## HINT:

- Perform the simulation method by selecting the "check mode" (signal check) with the intelligent tester (See page [RS-39](#)).
- After selecting the "check mode" (signal check), perform the simulation method by wiggling each connector of the airbag system or driving the vehicle on a city or rough road (See page [RS-39](#)).

**1 CHECK FRONT PASSENGER AIRBAG ASSEMBLY (FRONT PASSENGER SIDE SQUIB)**



- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery, and wait for at least 90 seconds.
- (c) Disconnect the connectors from the front passenger airbag assembly.
- (d) Connect the white wire side of SST (resistance 2.1 Ω) to connector "E" (black connector).

**CAUTION:**

**Never connect a tester to the front passenger airbag assembly (Front passenger side squib) for measurement, as the may lead to a serious injury due to airbag deployment.**

**NOTICE:**

- Do not forcibly insert the SST into the terminals of the connector when connecting.
- Insert straight the SST into the terminals of the connector.

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- (e) Connect the negative (-) terminal cable to the battery, and wait for at least 2 seconds.
- (f) Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- (g) Clear the DTCs stored in memory (See page RS-36).
- (h) Turn the ignition switch to the LOCK position.
- (i) Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- (j) Check the DTCs (See page RS-36).

**OK:**

**DTC B1805, B1806, B1807, B1808 or 52 is not output.**

**HINT:**

Codes other than DTC B1805, B1806, B1807, B1808 and 52 may be output at this time, but they are not related to this check.

**OK** → **REPLACE FRONT PASSENGER AIRBAG ASSEMBLY**

**NG**

**2 CHECK CONNECTOR**

- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery, and wait for at least 90 seconds.
- (c) Disconnect the SST from connector "E".
- (d) Check that the instrument panel wire connectors (on the front passenger airbag assembly side) are not damaged.

**OK:**

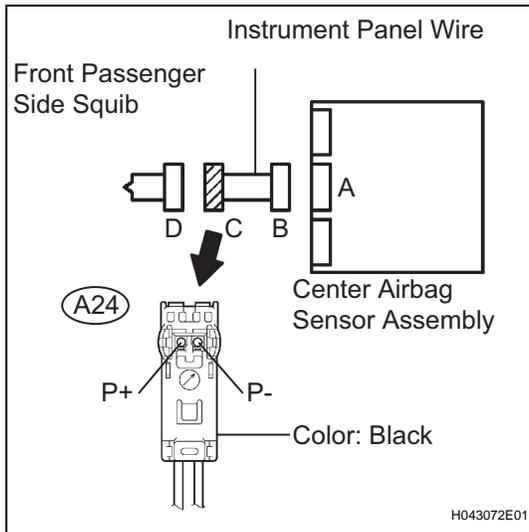
**The lock button is not disengaged, or the claw of the lock is not deformed or damaged.**

**RS**

NG

REPAIR OR REPLACE INSTRUMENT PANEL WIRE

OK

**3 CHECK INSTRUMENT PANEL WIRE (FRONT PASSENGER SIDE SQUIB CIRCUIT)**

- (a) Disconnect the connectors from the center airbag sensor assembly.
- (b) Check the short to B+ in the circuit.
  - (1) Connect the negative (-) terminal cable to the battery, and wait for at least 2 seconds.
  - (2) Turn the ignition switch to the ON position.
  - (3) Measure the voltage according to the value(s) in the table below.

**Voltage**

Tester connection	Condition	Specified condition
A24-1 (P+) - Body ground	Ignition switch ON	Below 1 V
A24-2 (P-) - Body ground	Ignition switch ON	Below 1 V

- (c) Check the open in the circuit.
  - (1) Turn the ignition switch to the LOCK position.
  - (2) Disconnect the negative (-) terminal cable from the battery, and wait for at least 90 seconds.
  - (3) Measure the resistance according to the value(s) in the table below.

**Resistance**

Tester connection	Condition	Specified condition
A24-1 (P+) - A24-2 (P-)	Always	Below 1 $\Omega$

- (d) Check the short to ground in the circuit.
  - (1) Measure the resistance according to the value(s) in the table below.

**Resistance**

Tester connection	Condition	Specified condition
A24-1 (P+) - Body ground	Always	1 M $\Omega$ or higher
A24-2 (P-) - Body ground	Always	1 M $\Omega$ or higher

- (e) Check for short in the circuit.
  - (1) Release the activation prevention mechanism built into connector "B" (See page RS-30).
  - (2) Measure the resistance according to the value(s) in the table below.

**Resistance**

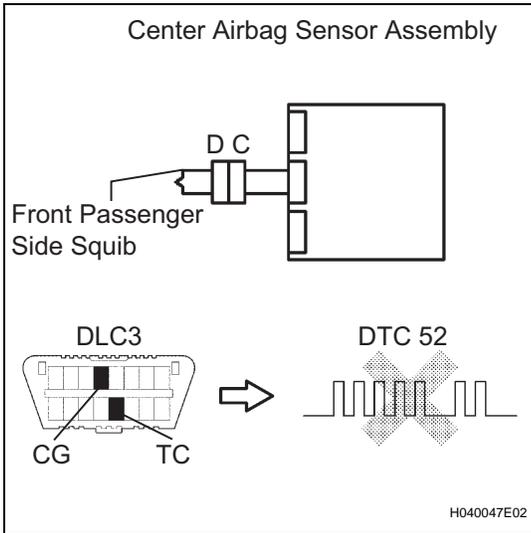
Tester connection	Condition	Specified condition
A24-1 (P+) - A24-2 (P-)	Always	1 M $\Omega$ or higher

NG

REPAIR OR REPLACE INSTRUMENT PANEL WIRE

OK

**4 CHECK CENTER AIRBAG SENSOR ASSEMBLY**



- (a) Connect the connectors to the front passenger airbag assembly and the center airbag sensor assembly.
- (b) Connect the negative (-) terminal cable to the battery, and wait for at least 2 seconds.
- (c) Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- (d) Clear the DTCs stored in memory (See page RS-36).
- (e) Turn the ignition switch to the LOCK position.
- (f) Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- (g) Check the DTCs (See page RS-36).

**OK:**

**DTC B1805, B1806, B1807, B1808 or 52 is not output.**

**HINT:**

Codes other than DTC B1805, B1806, B1807, B1808 and 52 may be output at this time, but they are not related to this check.

NG

**REPLACE CENTER AIRBAG SENSOR ASSEMBLY**

OK

**USE SIMULATION METHOD TO CHECK**

RS

<b>DTC</b>	<b>B1810/53</b>	<b>Short in Driver Side Squib 2nd Step Circuit</b>
<b>DTC</b>	<b>B1811/53</b>	<b>Open in Driver Side Squib 2nd Step Circuit</b>
<b>DTC</b>	<b>B1812/53</b>	<b>Short to GND in Driver Side Squib 2nd Step Circuit</b>
<b>DTC</b>	<b>B1813/53</b>	<b>Short to B+ in Driver Side Squib 2nd Step Circuit</b>

## DESCRIPTION

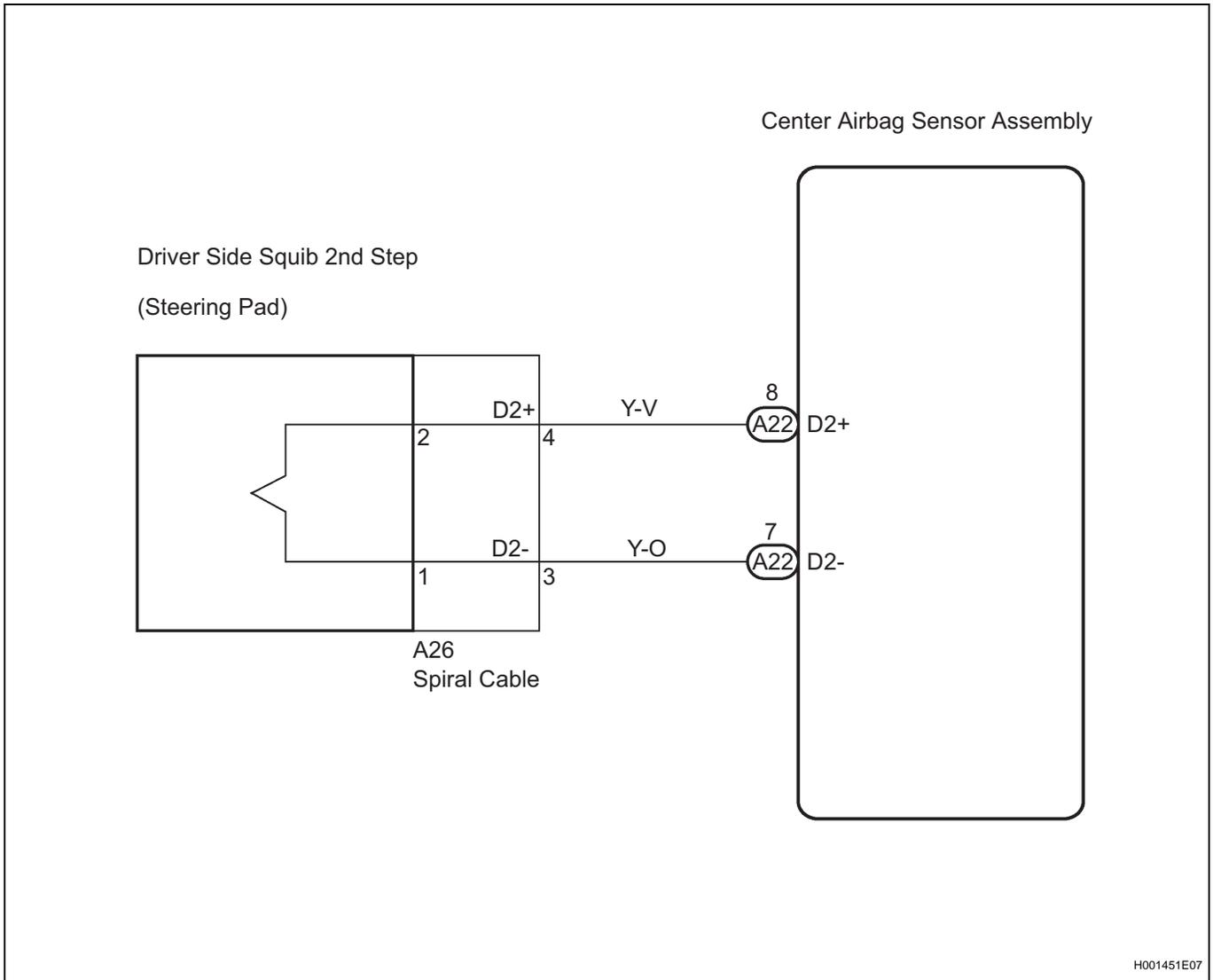
The driver side squib 2nd step circuit consists of the center airbag sensor assembly, the spiral cable and the steering pad.

The circuit instructs the SRS to deploy when deployment conditions are met.

These DTCs are recorded when a malfunction is detected in the driver side squib 2nd step circuit.

<b>DTC No.</b>	<b>DTC Detecting Condition</b>	<b>Trouble Area</b>
B1810/53	<ul style="list-style-type: none"> <li>The center airbag sensor assembly receives a line short circuit signal 5 times in the driver side squib 2nd step circuit during primary check.</li> <li>Driver side squib 2nd step malfunction</li> <li>Spiral cable malfunction</li> <li>Center airbag sensor assembly malfunction</li> </ul>	<ul style="list-style-type: none"> <li>Instrument panel wire</li> <li>Spiral cable</li> <li>Steering pad (Driver side squib 2nd step)</li> <li>Center airbag sensor assembly</li> </ul>
B1811/53	<ul style="list-style-type: none"> <li>The center airbag sensor assembly receives an open circuit signal in the driver side squib 2nd step circuit for 2 seconds.</li> <li>Driver side squib 2nd step malfunction</li> <li>Spiral cable malfunction</li> <li>Center airbag sensor assembly malfunction</li> </ul>	<ul style="list-style-type: none"> <li>Instrument panel wire</li> <li>Spiral cable</li> <li>Steering pad (Driver side squib 2nd step)</li> <li>Center airbag sensor assembly</li> </ul>
B1812/53	<ul style="list-style-type: none"> <li>The center airbag sensor assembly receives a short circuit to ground signal in the driver side 2nd step circuit for 0.5 seconds.</li> <li>Driver side squib 2nd step malfunction</li> <li>Spiral cable malfunction</li> <li>Center airbag sensor assembly malfunction</li> </ul>	<ul style="list-style-type: none"> <li>Instrument panel wire</li> <li>Spiral cable</li> <li>Steering pad (Driver side squib 2nd step)</li> <li>Center airbag sensor assembly</li> </ul>
B1813/53	<ul style="list-style-type: none"> <li>The center airbag sensor assembly receives a short circuit to B+ signal in the driver side squib 2nd step circuit for 0.5 seconds.</li> <li>Driver side squib 2nd step malfunction</li> <li>Spiral cable malfunction</li> <li>Center airbag sensor assembly malfunction</li> </ul>	<ul style="list-style-type: none"> <li>Instrument panel wire</li> <li>Spiral cable</li> <li>Steering pad (Driver side squib 2nd step)</li> <li>Center airbag sensor assembly</li> </ul>

**WIRING DIAGRAM**

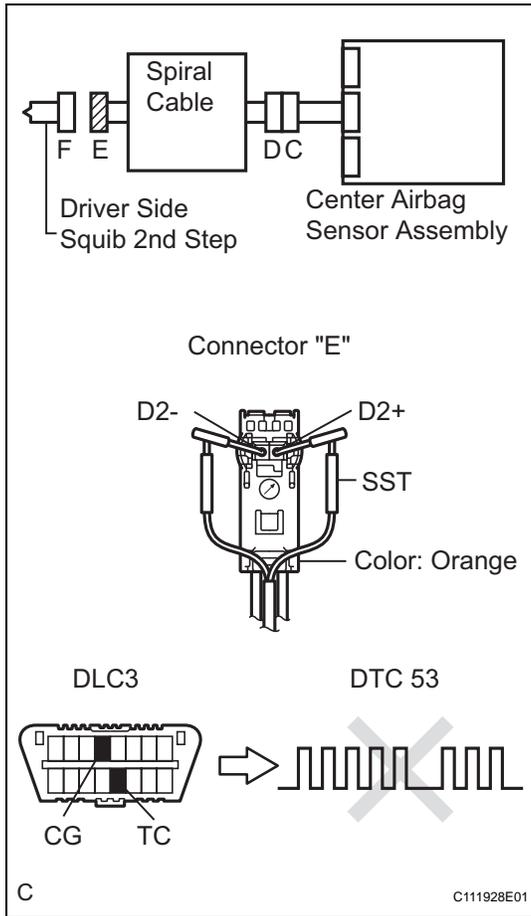


**RS**

**HINT:**

- Perform the simulation method by selecting the "check mode" (signal check) with the intelligent tester (See page [RS-39](#)).
- After selecting the "check mode" (signal check), perform the simulation method by wiggling each connector of the airbag system or driving the vehicle on a city or rough road (See page [RS-39](#)).

## 1 CHECK STEERING PAD (DRIVER SIDE SQUIB 2ND STEP)



- Turn the ignition switch to the LOCK position.
- Disconnect the negative (-) terminal cable from the battery, and wait for at least 90 seconds.
- Disconnect the connectors from the steering pad.
- Connect the white wire side of SST (resistance 2.1  $\Omega$ ) to connector "E" (orange connector).

**CAUTION:**

**Never connect a tester to the steering pad (Driver side squib 2nd step) for measurement, as the may lead to a serious injury due to airbag deployment.**

**NOTICE:**

- Do not forcibly insert the SST into the terminals of the connector when connecting.
- Insert straight the SST into the terminals of the connector.

**SST 09843-18060**

- Connect the negative (-) terminal cable to the battery, and wait for at least 2 seconds.
- Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- Clear the DTCs stored in memory (See page RS-36).
- Turn the ignition switch to the LOCK position.
- Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- Check the DTCs (See page RS-36).

**OK:**

**DTC B1810, B1811, B1812, B1813 or 53 is not output.**

**HINT:**

Codes other than DTC B1810, B1811, B1812, B1813, and 53 may be output at this time, but they are not related to this check.

OK

REPLACE STEERING PAD

NG

## 2 CHECK CONNECTOR

- Turn the ignition switch to the LOCK position.
- Disconnect the negative (-) terminal cable from the battery, and wait for at least 90 seconds.
- Disconnect the SST from connector "E".
- Check that the spiral cable connectors (on the steering pad side) are not damaged.

**OK:**

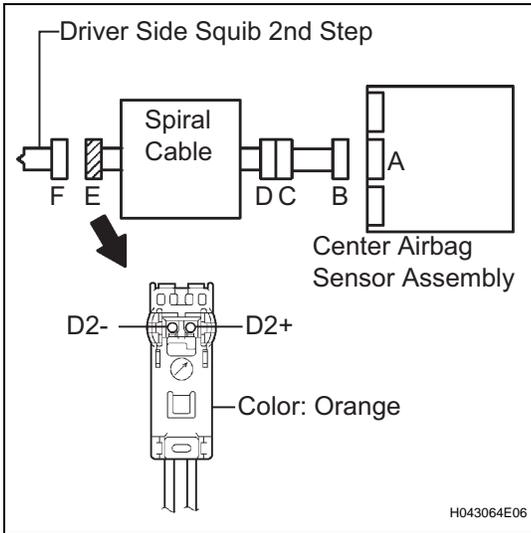
**The lock button is not disengaged, or the claw of the lock is not deformed or damaged.**

NG

REPLACE SPIRAL CABLE

OK

**3 CHECK DRIVER SIDE SQUIB 2ND STEP CIRCUIT**



- (a) Disconnect the connectors from the center airbag sensor assembly.
- (b) Check the short to B+ in the circuit.
  - (1) Connect the negative (-) terminal cable to the battery, and wait for at least 2 seconds.
  - (2) Turn the ignition switch to the ON position.
  - (3) Measure the voltage according to the value(s) in the table below.

**Voltage**

Tester connection	Condition	Specified condition
D2+ - Body ground	Ignition switch ON	Below 1 V
D2- - Body ground	Ignition switch ON	Below 1 V

- (c) Check the open in the circuit.
  - (1) Turn the ignition switch to the LOCK position.
  - (2) Disconnect the negative (-) terminal cable from the battery, and wait for at least 90 seconds.
  - (3) Measure the resistance according to the value(s) in the table below.

**Resistance**

Tester connection	Condition	Specified condition
D2+ - D2-	Always	Below 1 Ω

- (d) Check the short to ground in the circuit.
  - (1) Measure the resistance according to the value(s) in the table below.

**Resistance**

Tester connection	Condition	Specified condition
D2+ - Body ground	Always	1 MΩ or higher
D2- - Body ground	Always	1 MΩ or higher

- (e) Check the short in the circuit.
  - (1) Release the activation prevention mechanism built into connector "B" (See page RS-30).
  - (2) Measure the resistance according to the value(s) in the table below.

**Resistance**

Tester connection	Condition	Specified condition
D2+ - D2-	Always	1 MΩ or higher

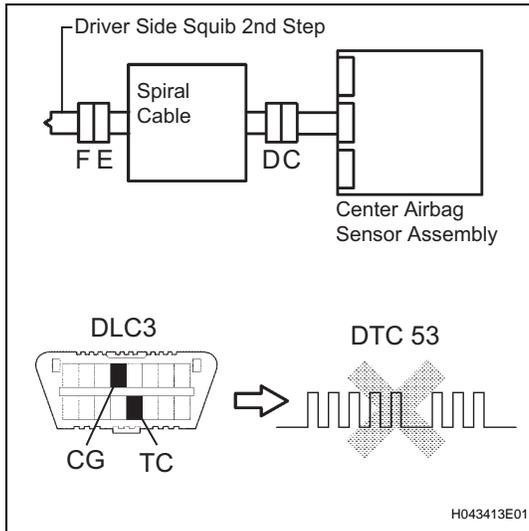
RS

NG

Go to step 5

OK

#### 4 CHECK CENTER AIRBAG SENSOR ASSEMBLY



- (a) Connect the connectors to the steering pad and center airbag sensor assembly.
- (b) Connect the negative (-) terminal cable to the battery, and wait for at least 2 seconds.
- (c) Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- (d) Clear the DTCs stored in memory (See page RS-36).
- (e) Turn the ignition switch to the LOCK position.
- (f) Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- (g) Check the DTCs (See page RS-36).

**OK:**

**DTC B1810, B1811, B1812, B1813 or 53 is not output.**

**HINT:**

Codes other than DTC B1810, B1811, B1812, B1813 and 53 may be output at this time, but they are not related to this check.

**NG**

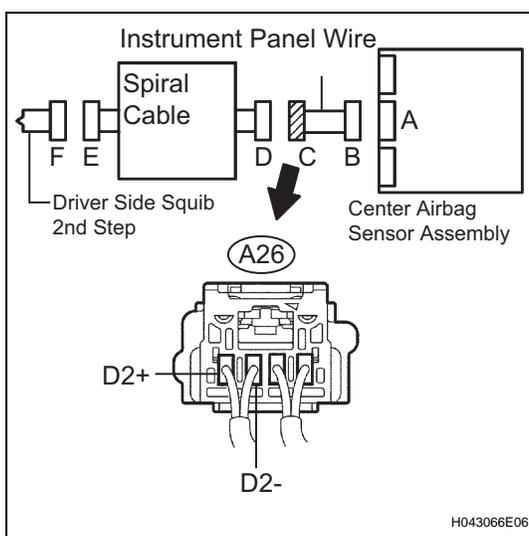
**REPLACE CENTER AIRBAG SENSOR ASSEMBLY**

**OK**

**RS**

#### USE SIMULATION METHOD TO CHECK

#### 5 CHECK INSTRUMENT PANEL WIRE



- (a) Check the short to B+ in the circuit.
  - (1) Restore the released activation prevention mechanism of connector "B" to the original condition.
  - (2) Disconnect the instrument panel wire connector from the spiral cable.
  - (3) Connect the negative (-) terminal cable to the battery, and wait for at least 2 seconds.
  - (4) Turn the ignition switch to the ON position.
  - (5) Measure the voltage according to the value(s) in the table below.

**Voltage**

Tester connection	Condition	Specified condition
A26-4 (D2+) - Body ground	Ignition switch ON	Below 1 V
A26-3 (D2-) - Body ground	Ignition switch ON	Below 1 V

- (b) Check the open in the circuit.
  - (1) Turn the ignition switch to the LOCK position.
  - (2) Disconnect the negative (-) terminal cable from the battery, and wait for at least 90 seconds.

- (3) Measure the resistance according to the value(s) in the table below.

**Resistance**

Tester connection	Condition	Specified condition
A26-4 (D2+) - A26-3 (D2-)	Always	Below 1 Ω

- (c) Check the short to ground in the circuit.

- (1) Measure the resistance according to the value(s) in the table below.

**Resistance**

Tester connection	Condition	Specified condition
A26-4 (D2+) - Body ground	Always	1 MΩ or higher
A26-3 (D2-) - Body ground	Always	1 MΩ or higher

- (d) Check the short in the circuit.

- (1) Release the activation prevention mechanism built into connector "B" (See page RS-30).

- (2) Measure the resistance according to the value(s) in the table below.

**Resistance**

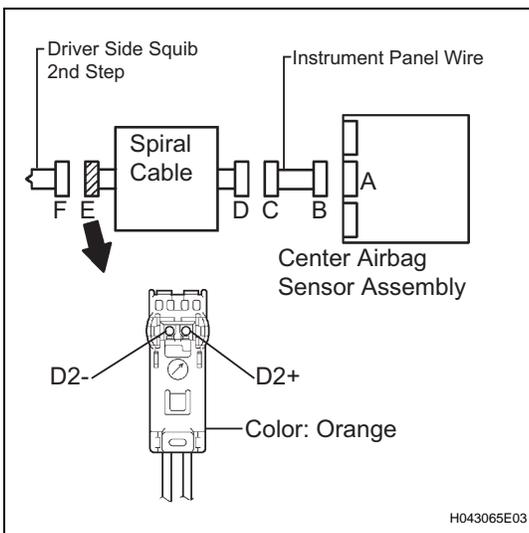
Tester connection	Condition	Specified condition
A26-4 (D2+) - A26-3 (D2-)	Always	1 MΩ or higher

**NG** REPAIR OR REPLACE INSTRUMENT PANEL WIRE ASSEMBLY

**RS**

**OK**

**6 CHECK SPIRAL CABLE**



- (a) Check the short to B+ in the circuit.

- (1) Connect the negative (-) terminal cable from the battery, and wait for at least 2 seconds.
- (2) Turn the ignition switch to the ON position.
- (3) Measure the voltage according to the value(s) in the table below.

**Voltage**

Tester connection	Condition	Specified condition
D2+ - Body ground	Ignition switch ON	Below 1 V
D2- - Body ground	Ignition switch ON	Below 1 V

- (b) Check the open in the circuit.

- (1) Turn the ignition switch to the LOCK position.
- (2) Disconnect the negative (-) terminal cable from the battery, and wait for at least 90 seconds.
- (3) Measure the resistance according to the value(s) in the table below.

**Resistance**

Tester connection	Condition	Specified condition
D2+ - D2-	Always	Below 1 Ω

- (c) Check the short to ground in the circuit.  
 (1) Measure the resistance according to the value(s) in the table below.

**Resistance**

Tester connection	Condition	Specified condition
D2+ - Body ground	Always	1 M $\Omega$ or higher
D2- - Body ground	Always	1 M $\Omega$ or higher

- (d) Check the short in the circuit.  
 (1) Release the activation prevention mechanism built into connector "D" (See page [RS-30](#)).  
 (2) Measure the resistance according to the value(s) in the table below.

**Resistance**

Tester connection	Condition	Specified condition
D2+ - D2-	Always	1 M $\Omega$ or higher

**NG****REPLACE SPIRAL CABLE****OK****USE SIMULATION METHOD TO CHECK**

<b>DTC</b>	<b>B1815/54</b>	<b>Short in Front Passenger Side Squib 2nd Step Circuit</b>
<b>DTC</b>	<b>B1816/54</b>	<b>Open in Front Passenger Side Squib 2nd Step Circuit</b>
<b>DTC</b>	<b>B1817/54</b>	<b>Short to GND in Front Passenger Side Squib 2nd Step Circuit</b>
<b>DTC</b>	<b>B1818/54</b>	<b>Short to B+ in Front Passenger Side Squib 2nd Step Circuit</b>

## DESCRIPTION

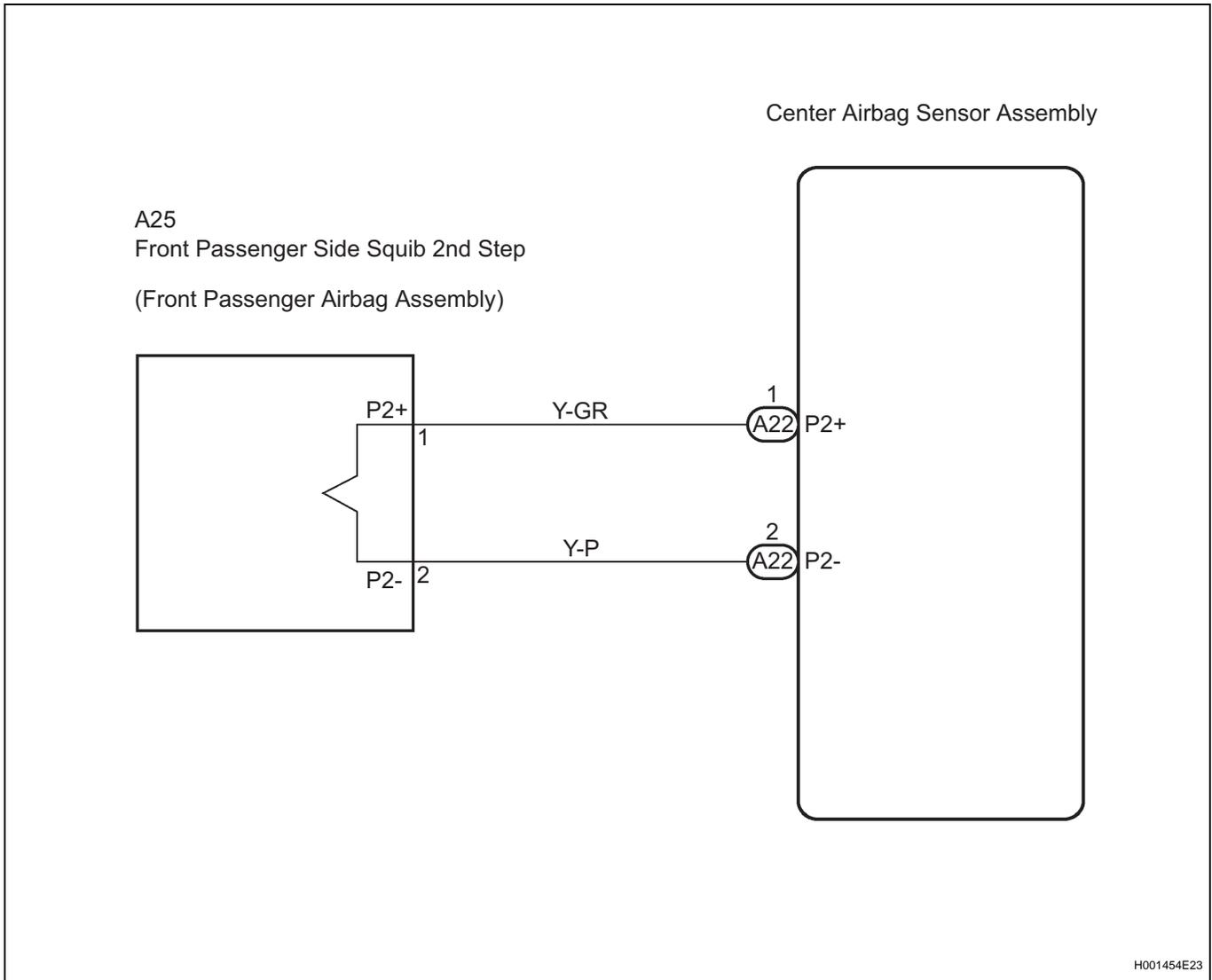
The front passenger side squib 2nd step circuit consists of the center airbag sensor assembly and the front passenger airbag assembly.

The circuit instructs the SRS to deploy when deployment conditions are met.

These DTCs are recorded when a malfunction is detected in the front passenger side squib 2nd step circuit.

<b>DTC No.</b>	<b>DTC Detecting Condition</b>	<b>Trouble Area</b>
B1815/54	<ul style="list-style-type: none"> <li>The center airbag sensor assembly receives a line short circuit signal 5 times in the front passenger side squib 2nd step circuit during primary check.</li> <li>Front passenger side squib 2nd step malfunction</li> <li>Center airbag sensor assembly malfunction</li> </ul>	<ul style="list-style-type: none"> <li>Instrument panel wire</li> <li>Instrument panel wire assembly</li> <li>Front passenger airbag assembly (Front passenger side squib 2nd step)</li> <li>Center airbag sensor assembly</li> </ul>
B1816/54	<ul style="list-style-type: none"> <li>The center airbag sensor assembly receives an open circuit signal in the front passenger side squib 2nd step circuit for 2 seconds.</li> <li>Front passenger side squib 2nd step malfunction</li> <li>Center airbag sensor assembly malfunction</li> </ul>	<ul style="list-style-type: none"> <li>Instrument panel wire</li> <li>Instrument panel wire assembly</li> <li>Front passenger airbag assembly (Front passenger side squib 2nd step)</li> <li>Center airbag sensor assembly</li> </ul>
B1817/54	<ul style="list-style-type: none"> <li>The center airbag sensor assembly receives a short circuit to ground signal in the front passenger side squib 2nd step circuit for 0.5 seconds.</li> <li>Front passenger side squib 2nd step malfunction</li> <li>Center airbag sensor assembly malfunction</li> </ul>	<ul style="list-style-type: none"> <li>Instrument panel wire</li> <li>Instrument panel wire assembly</li> <li>Front passenger airbag assembly (Front passenger side squib 2nd step)</li> <li>Center airbag sensor assembly</li> </ul>
B1818/54	<ul style="list-style-type: none"> <li>The center airbag sensor assembly receives a short circuit to B+ signal in the front passenger side squib 2nd step circuit for 0.5 seconds.</li> <li>Front passenger side squib 2nd step malfunction</li> <li>Center airbag sensor assembly malfunction</li> </ul>	<ul style="list-style-type: none"> <li>Instrument panel wire</li> <li>Instrument panel wire assembly</li> <li>Front passenger airbag assembly (Front passenger side squib 2nd step)</li> <li>Center airbag sensor assembly</li> </ul>

## WIRING DIAGRAM

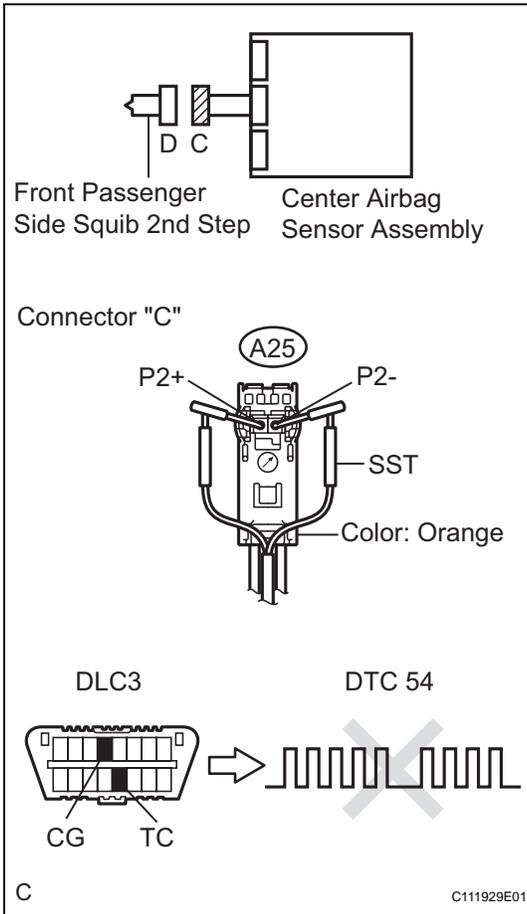


RS

## HINT:

- Perform the simulation method by selecting the "check mode" (signal check) with the intelligent tester (See page [RS-39](#)).
- After selecting the "check mode" (signal check), perform the simulation method by wiggling each connector of the airbag system or driving the vehicle on a city or rough road (See page [RS-39](#)).

**1 CHECK FRONT PASSENGER AIRBAG ASSEMBLY (FRONT PASSENGER SIDE SQUIB 2ND STEP)**



- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery, and wait for at least 90 seconds.
- (c) Disconnect the connectors from the front passenger airbag assembly.
- (d) Connect the white wire side of SST (resistance 2.1 Ω) to connector "E" (orange connector).

**CAUTION:**

**Never connect a tester to the front passenger airbag assembly (Front passenger side squib 2nd step) for measurement, as the may lead to a serious injury due to airbag deployment.**

**NOTICE:**

- Do not forcibly insert the SST into the terminals of the connector when connecting.
- Insert straight the SST into the terminals of the connector.

**SST 09843-18060**

- (e) Connect the negative (-) terminal cable to the battery, and wait for at least 2 seconds.
- (f) Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- (g) Clear the DTCs stored in memory (See page RS-36).
- (h) Turn the ignition switch to the LOCK position.
- (i) Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- (j) Check the DTCs (See page RS-36).

**OK:**

**DTC B1815, B1816, B1817, B1818 or 54 is not output.**

**HINT:**

Codes other than DTC B1815, B1816, B1817, B1818 and 54 may be output at this time, but they are not related to this check.

**OK** → **REPLACE FRONT PASSENGER AIRBAG ASSEMBLY**

**RS**

**NG**

**2 CHECK CONNECTOR**

- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery, and wait for at least 90 seconds.
- (c) Disconnect the SST from connector "E".
- (d) Check that the instrument panel wire connectors (on the front passenger airbag assembly side) are not damaged.

OK:

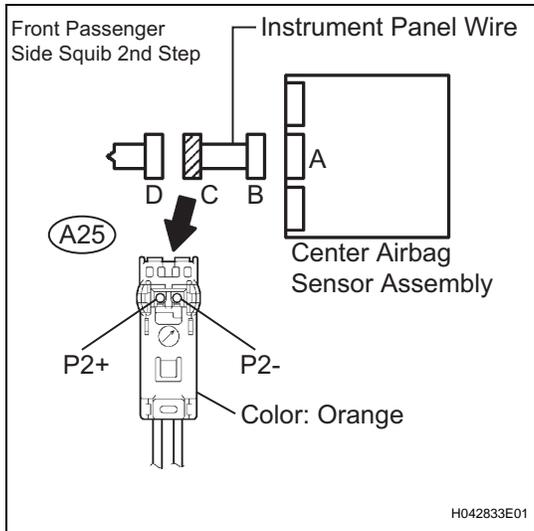
The lock button is not disengaged, or the claw of the lock is not damaged or deformed.

NG

**REPAIR OR REPLACE INSTRUMENT PANEL WIRE**

OK

### 3 CHECK INSTRUMENT PANEL WIRE (FRONT PASSENGER SIDE SQUIB 2ND STEP CIRCUIT)



- (a) Disconnect the connectors from the center airbag sensor assembly.
- (b) Check the short to B+ in the circuit.
  - (1) Connect the negative (-) terminal cable to the battery, and wait for at least 2 seconds.
  - (2) Turn the ignition switch to the ON position.
  - (3) Measure the voltage according to the value(s) in the table below.

#### Voltage

Tester connection	Condition	Specified condition
A25-1 (P2+) - Body ground	Ignition switch ON	Below 1 V
A25-2 (P2-) - Body ground	Ignition switch ON	Below 1 V

- (c) Check the open in the circuit.
  - (1) Turn the ignition switch to the ON position.
  - (2) Disconnect the negative (-) terminal cable from the battery, and wait for at least 90 seconds.
  - (3) Measure the resistance according to the value(s) in the table below.

#### Resistance

Tester connection	Condition	Specified condition
A25-1 (P2+) - A25-2 (P2-)	Always	Below 1 $\Omega$

- (d) Check the short to ground in the circuit.
  - (1) Measure the resistance according to the value(s) in the table below.

#### Resistance

Tester connection	Condition	Specified condition
A25-1 (P2+) - Body ground	Always	1 M $\Omega$ or higher
A25-2 (P2-) - Body ground	Always	1 M $\Omega$ or higher

- (e) Check the short in the circuit.
  - (1) Release the activation prevention mechanism built into connector "B" (See page [RS-30](#)).
  - (2) Measure the resistance according to the value(s) in the table below.

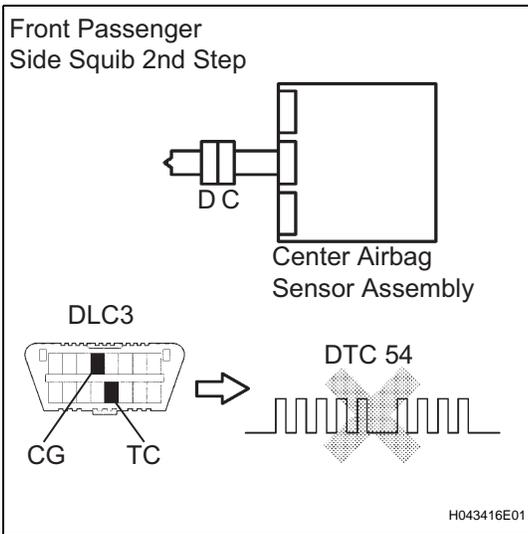
Resistance

Tester connection	Condition	Specified condition
A25-1 (P2+) - A25-2 (P2-)	Always	1 MΩ or higher

**NG** REPAIR OR REPLACE INSTRUMENT PANEL WIRE

**OK**

**4 CHECK CENTER AIRBAG SENSOR ASSEMBLY**



- Connect the connectors to the front passenger airbag assembly and the center airbag sensor assembly.
- Connect the negative (-) terminal cable to the battery, and wait for at least 2 seconds.
- Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- Clear the DTCs stored in memory (See page RS-36).
- Turn the ignition switch to the LOCK position.
- Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- Check the DTCs (See page RS-36).

**OK:**

**DTC B1815, B1816, B1817, B1818 or 54 is not output.**

**HINT:**

Codes other than DTC B1815, B1816, B1817, B1818 and 54 may be output at this time, but they are not related to this check.

**RS**

**NG** REPLACE CENTER AIRBAG SENSOR ASSEMBLY

**OK**

**USE SIMULATION METHOD TO CHECK**

## PROBLEM SYMPTOMS TABLE

### HINT:

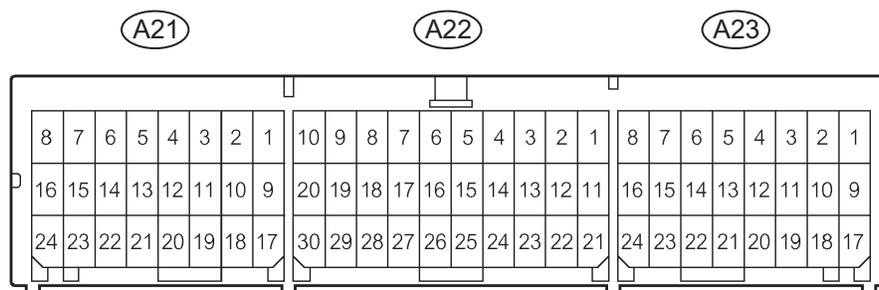
Proceed to the troubleshooting for each circuit in the table below.

### AIRBAG SYSTEM:

Symptom	Suspected area	See page
1. The SRS warning light goes off after the primary check, but comes on.	SRS Warning Light Remains ON	<a href="#">RS-170</a>
2. With the ignition switch in the ON position, the SRS warning light sometimes comes on after approximately 6 seconds.	SRS Warning Light Remains ON	<a href="#">RS-170</a>
3. The SRS warning light always comes on even when DTC is not output.	SRS Warning Light Remains ON	<a href="#">RS-170</a>
1. With the ignition switch in the ON position, the SRS warning light does not come on.	SRS Warning Light does not Come On	<a href="#">RS-174</a>
1. Although an SRS warning light operates normally, DTC or a normal system code is not displayed.	TC and CG Terminal Circuit	<a href="#">RS-176</a>
2. Although terminals TC and CG of DLC3 are not connected, DTC or a normal system code is displayed.	TC and CG Terminal Circuit	<a href="#">RS-176</a>

# TERMINALS OF ECU

## 1. CENTER AIRBAG SENSOR ASSEMBLY



H

C109532E02

Terminal No.	Terminal Symbol	Destination
A21-1	SFD+	Front seat airbag assembly LH (Driver side - side squib)
A21-2	SFD-	Front seat airbag assembly LH (Driver side - side squib)
A21-3 (*1)	ICD-	Curtain shield airbag assembly LH (Driver side curtain shield squib)
A21-4 (*1)	ICD+	Curtain shield airbag assembly LH (Driver side curtain shield squib)
A21-5	PD+	Front seat outer belt LH (Driver side front pretensioner squib)
A21-6	PD-	Front seat outer belt LH (Driver side front pretensioner squib)
A21-9	DSP+	Seat position airbag sensor
A21-10	DBE+	Front seat inner belt LH
A21-17	DSP-	Seat position airbag sensor
A21-18	DBE-	Front seat inner belt LH
A21-19	VUPD	Side airbag sensor assembly LH
A21-20 (*1)	VUCD	Rear airbag sensor LH
A21-21	ESD	Side airbag sensor assembly LH
A21-22 (*1)	ESCD	Rear airbag sensor LH
A22-1	P2+	Front passenger airbag assembly (Front passenger side squib 2nd step)
A22-2	P2-	Front passenger airbag assembly (Front passenger side squib 2nd step)
A22-3	P-	Front passenger airbag assembly (Front passenger side squib)
A22-4	P+	Front passenger airbag assembly (Front passenger side squib)
A22-5	D+	Steering pad (Driver side squib)
A22-6	D-	Steering pad (Driver side squib)
A22-7	D2-	Steering pad (Driver side squib 2nd step)
A22-8	D2+	Steering pad (Driver side squib 2nd step)

RS

<b>DTC</b>	<b>B1820/55</b>	<b>Short in Driver Side - Side Squib Circuit</b>
<b>DTC</b>	<b>B1821/55</b>	<b>Open in Driver Side - Side Squib Circuit</b>
<b>DTC</b>	<b>B1822/55</b>	<b>Short to GND in Driver Side - Side Squib Circuit</b>
<b>DTC</b>	<b>B1823/55</b>	<b>Short to B+ in Driver Side - Side Squib Circuit</b>

## DESCRIPTION

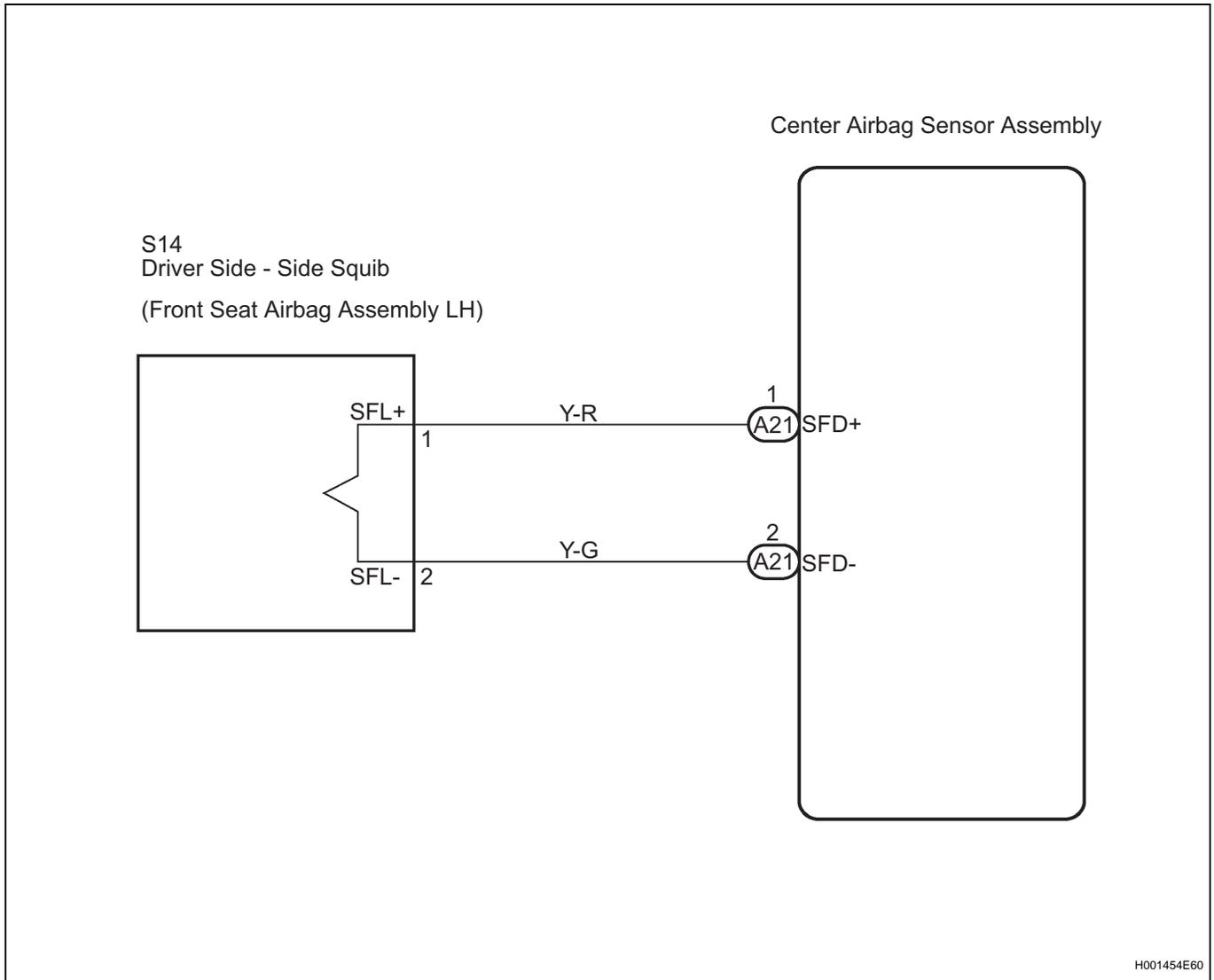
The driver side - side squib circuit consists of the center airbag sensor assembly and the front seat airbag assembly LH.

This circuit instructs the SRS to deploy when deployment conditions are met.

These DTCs are recorded when a malfunction is detected in the driver side - side squib circuit.

DTC No.	DTC Detecting Condition	Trouble Area
B1820/55	<ul style="list-style-type: none"> <li>The center airbag sensor assembly receives a line short circuit signal 5 times in the driver side - side squib circuit during primary check.</li> <li>Driver side - side squib circuit malfunction</li> <li>Center airbag sensor assembly malfunction</li> </ul>	<ul style="list-style-type: none"> <li>Floor wire</li> <li>Front seat airbag assembly LH (Driver side - side squib)</li> <li>Center airbag sensor assembly</li> </ul>
B1821/55	<ul style="list-style-type: none"> <li>The center airbag sensor assembly receives an open circuit signal in the driver side - side squib circuit for 2 seconds.</li> <li>Driver side - side squib circuit malfunction</li> <li>Center airbag sensor assembly malfunction</li> </ul>	<ul style="list-style-type: none"> <li>Floor wire</li> <li>Front seat airbag assembly LH (Driver side - side squib)</li> <li>Center airbag sensor assembly</li> </ul>
B1822/55	<ul style="list-style-type: none"> <li>The center airbag sensor assembly receives a short circuit to ground signal in the driver side - side squib circuit for 0.5 seconds.</li> <li>Driver side - side squib circuit malfunction</li> <li>Center airbag sensor assembly malfunction</li> </ul>	<ul style="list-style-type: none"> <li>Floor wire</li> <li>Front seat airbag assembly LH (Driver side - side squib)</li> <li>Center airbag sensor assembly</li> </ul>
B1823/55	<ul style="list-style-type: none"> <li>The center airbag sensor assembly receives a short circuit to B+ signal in the driver side - side squib circuit for 0.5 seconds.</li> <li>Driver side - side squib circuit malfunction</li> <li>Center airbag sensor assembly malfunction</li> </ul>	<ul style="list-style-type: none"> <li>Floor wire</li> <li>Front seat airbag assembly LH (Driver side - side squib)</li> <li>Center airbag sensor assembly</li> </ul>

## WIRING DIAGRAM



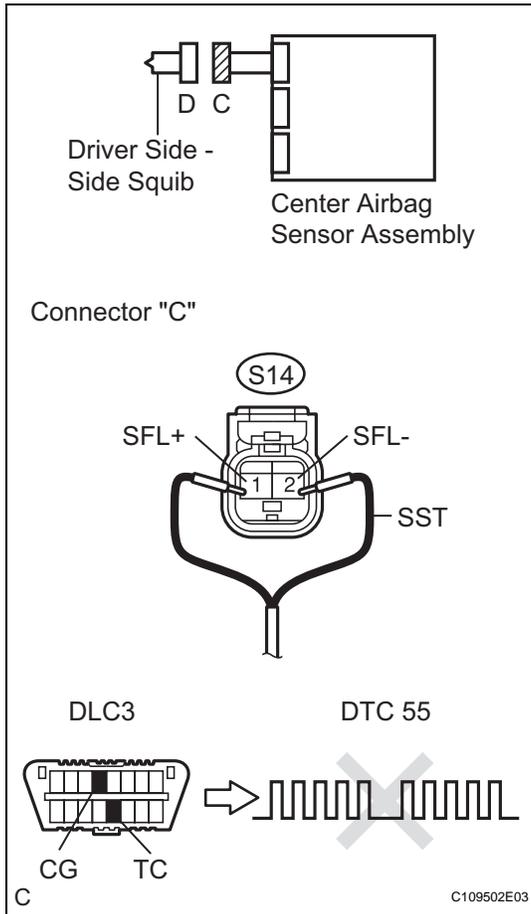
RS

## HINT:

- Perform the simulation method by selecting the "check mode" (signal check) with the intelligent tester (See page [RS-39](#)).
- After selecting the "check mode" (signal check), perform the simulation method by wiggling each connector of the airbag system or driving the vehicle on a city or rough road (See page [RS-39](#)).

1

## CHECK FRONT SEAT AIRBAG ASSEMBLY LH (DRIVER SIDE - SIDE SQUIB)



- Turn the ignition switch to the LOCK position.
- Disconnect the negative (-) terminal cable from the battery, and wait for at least 90 seconds.
- Disconnect the connector from the front seat airbag assembly LH.
- Connect the black wire side of SST (resistance 2.1  $\Omega$ ) to connector "C".

**CAUTION:**

**Never connect a tester to the front seat airbag assembly LH (Driver side - side squib) for measurement, as the may lead to a serious injury due to airbag deployment.**

**NOTICE:**

- Do not forcibly insert the SST into the terminals of the connector when connecting.
- Insert straight the SST into the terminals of the connector.

**SST 09843-18060**

- Connect the negative (-) terminal cable to the battery, and wait for at least 2 seconds.
- Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- Clear the DTCs stored in memory (See page RS-36).
- Turn the ignition switch to the LOCK position.
- Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- Check the DTCs (See page RS-36).

**OK:**

**DTC B1820, B1821, B1822, B1823 or 55 is not output.**

**HINT:**

Codes other than DTC B1820, B1821, B1822, B1823 and 55 may be output at this time, but they are not related to this check.

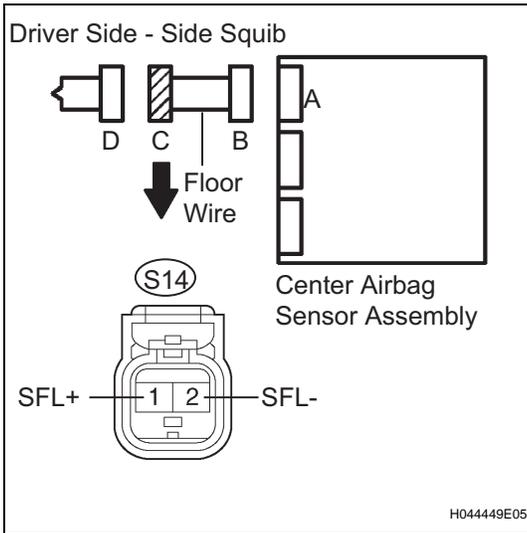
OK

**REPLACE FRONT SEAT AIRBAG ASSEMBLY LH**

NG

RS

**2 CHECK FLOOR WIRE (DRIVER SIDE - SIDE SQUIB)**



- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery, and wait for at least 90 seconds.
- (c) Disconnect the SST from connector "C".
- (d) Disconnect the connectors from the center airbag sensor assembly.
- (e) Check the short to B+ in the circuit.
  - (1) Connect the negative (-) terminal cable to the battery, and wait for at least 2 seconds.
  - (2) Turn the ignition switch to the ON position.
  - (3) Measure the voltage according to the value(s) in the table below.

**Voltage**

Tester connection	Condition	Specified condition
S14-1 (SFL+) - Body ground	Ignition switch ON	Below 1 V
S14-2 (SFL-) - Body ground	Ignition switch ON	Below 1 V

- (f) Check the open in the circuit.
  - (1) Turn the ignition switch to the LOCK position.
  - (2) Disconnect the negative (-) terminal cable from the battery, and wait for at least 90 seconds.
  - (3) Measure the resistance according to the value(s) in the table below.

**Resistance**

Tester connection	Condition	Specified condition
S14-1 (SFL+) - S14-2 (SFL-)	Always	Below 1 Ω

- (g) Check the short to ground in the circuit.
  - (1) Measure the resistance according to the value(s) in the table below.

**Resistance**

Tester connection	Condition	Specified condition
S14-1 (SFL+) - Body ground	Always	1 MΩ or higher
S14-2 (SFL-) - Body ground	Always	1 MΩ or higher

- (h) Check the short in the circuit.
  - (1) Release the activation prevention mechanism built into connector "B" (See page RS-30).
  - (2) Measure the resistance according to the value(s) in the table below.

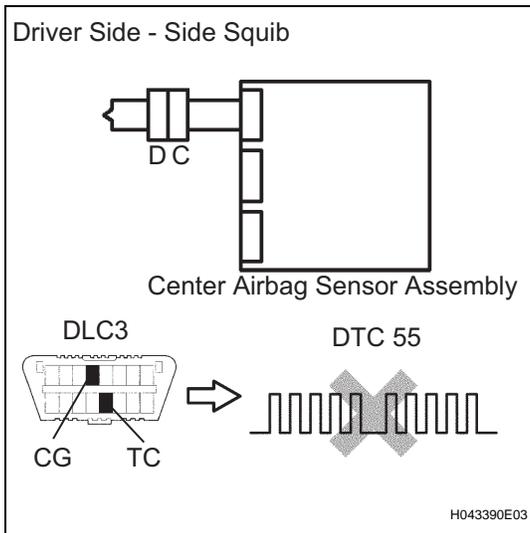
**Resistance**

Tester connection	Condition	Specified condition
S14-1 (SFL+) - S14-2 (SFL-)	Always	1 MΩ or higher

**NG** **REPAIR OR REPLACE FLOOR WIRE**

**RS**

OK

**3 CHECK CENTER AIRBAG SENSOR ASSEMBLY**

- Connect the connectors to the center airbag sensor assembly and the front seat airbag assembly LH.
- Connect the negative (-) terminal cable to the battery, and wait for at least 2 seconds.
- Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- Clear the DTCs stored in memory (See page [RS-36](#)).
- Turn the ignition switch to the LOCK position.
- Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- Check the DTCs (See page [RS-36](#)).

**OK:**

**DTC B1820, B1821, B1822, B1823 or 55 is not output.**

**HINT:**

Codes other than DTC B1820, B1821, B1822, B1823 and 55 may be output at this time, but they are not related to this check.

NG

**REPLACE CENTER AIRBAG SENSOR ASSEMBLY**

RS

OK

**USE SIMULATION METHOD TO CHECK**

<b>DTC</b>	<b>B1825/56</b>	<b>Short in Front Passenger Side - Side Squib Circuit</b>
<b>DTC</b>	<b>B1826/56</b>	<b>Open in Front Passenger Side - Side Squib Circuit</b>
<b>DTC</b>	<b>B1827/56</b>	<b>Short to GND in Front Passenger Side - Side Squib Circuit</b>
<b>DTC</b>	<b>B1828/56</b>	<b>Short to B+ in Front Passenger Side - Side Squib Circuit</b>

**DESCRIPTION**

The front passenger side - side squib circuit consists of the center airbag sensor assembly and the front seat airbag assembly RH.

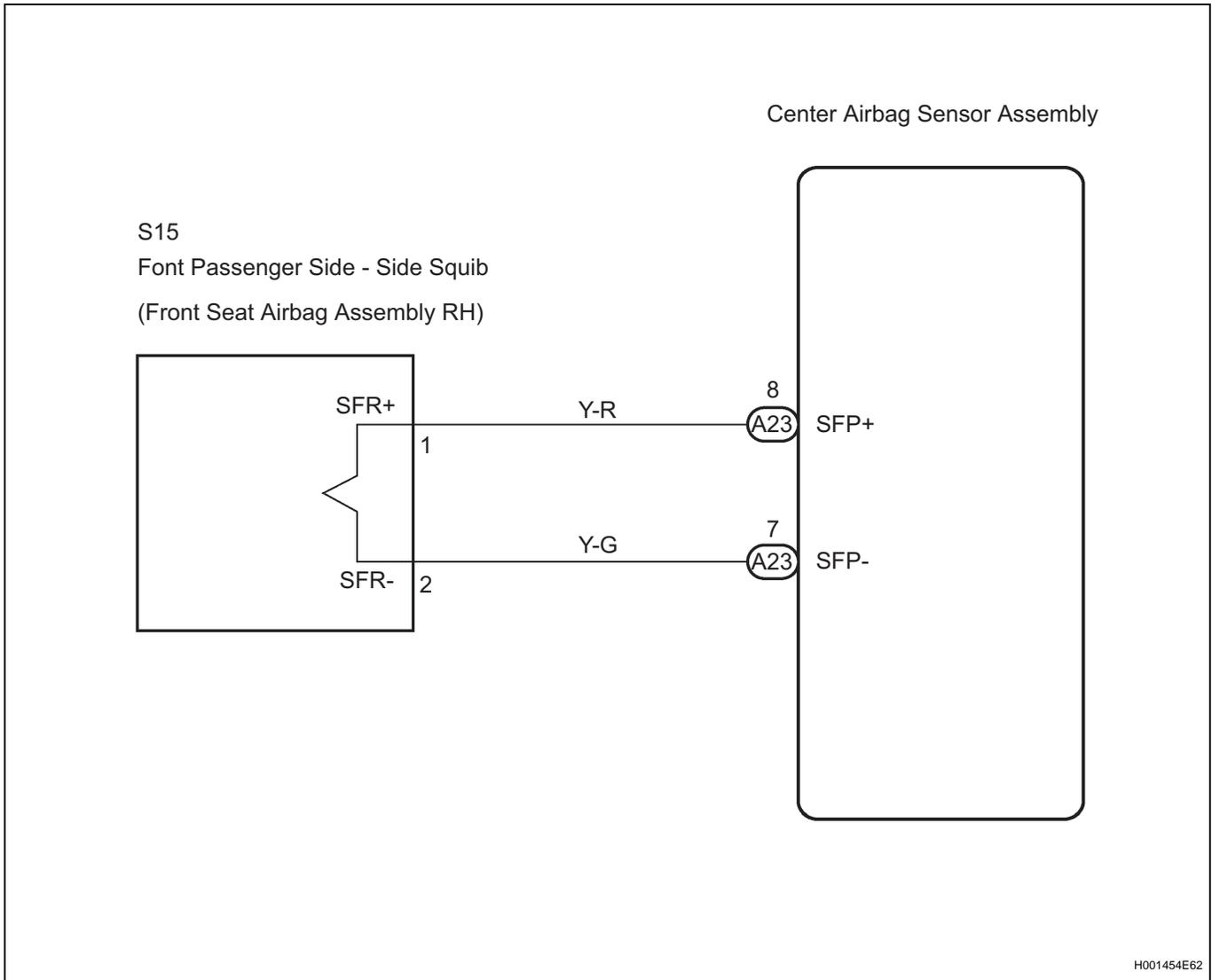
The circuit instructs the SRS to deploy when deployment conditions are met.

These DTCs are recorded when a malfunction is detected in the front passenger side - side squib circuit.

DTC No.	DTC Detecting Condition	Trouble Area
B1825/56	<ul style="list-style-type: none"> <li>The center airbag sensor assembly receives a line short circuit signal 5 times in the front passenger side - side squib circuit during primary check.</li> <li>Front passenger side - side squib circuit malfunction</li> <li>Center airbag sensor assembly malfunction</li> </ul>	<ul style="list-style-type: none"> <li>Floor wire No.2</li> <li>Front seat airbag assembly RH (Front passenger side - side squib)</li> <li>Center airbag sensor assembly</li> </ul>
B1826/56	<ul style="list-style-type: none"> <li>The center airbag sensor assembly receives an open circuit signal in the front passenger side - side squib circuit for 2 seconds.</li> <li>Front passenger side - side squib circuit malfunction</li> <li>Center airbag sensor assembly malfunction</li> </ul>	<ul style="list-style-type: none"> <li>Floor wire No.2</li> <li>Front seat airbag assembly RH (Front passenger side - side squib)</li> <li>Center airbag sensor assembly</li> </ul>
B1827/56	<ul style="list-style-type: none"> <li>The center airbag sensor assembly receives a short circuit to ground signal in the front passenger side - side squib circuit for 0.5 seconds.</li> <li>Front passenger side - side squib circuit malfunction</li> <li>Center airbag sensor assembly malfunction</li> </ul>	<ul style="list-style-type: none"> <li>Floor wire No.2</li> <li>Front seat airbag assembly RH (Front passenger side - side squib)</li> <li>Center airbag sensor assembly</li> </ul>
B1828/56	<ul style="list-style-type: none"> <li>The center airbag sensor assembly receives a short circuit to B+ signal in the front passenger side - side squib circuit for 0.5 seconds.</li> <li>Front passenger side - side squib circuit malfunction</li> <li>Center airbag sensor assembly malfunction</li> </ul>	<ul style="list-style-type: none"> <li>Floor wire No.2</li> <li>Front seat airbag assembly RH (Front passenger side - side squib)</li> <li>Center airbag sensor assembly</li> </ul>

**RS**

## WIRING DIAGRAM

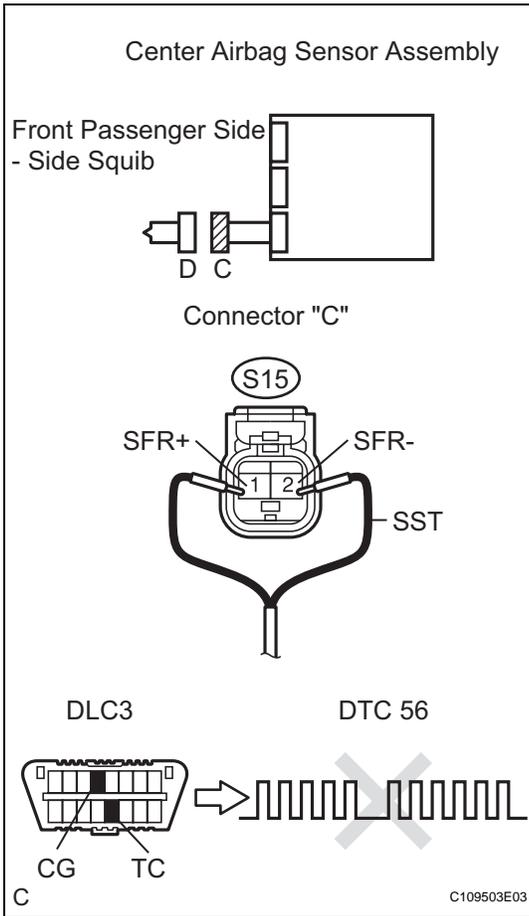


RS

## HINT:

- Perform the simulation method by selecting the "check mode" (signal check) with the intelligent tester (See page [RS-39](#)).
- After selecting the "check mode" (signal check), perform the simulation method by wiggling each connector of the airbag system or driving the vehicle on a city or rough road (See page [RS-39](#)).

**1 CHECK FRONT SEAT AIRBAG ASSEMBLY RH (FRONT PASSENGER SIDE - SIDE SQUIB)**



- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery, and wait for at least 90 seconds.
- (c) Disconnect the connector from the front seat airbag assembly RH.
- (d) Connect the black wire side of SST (resistance 2.1 Ω) to connector "C".

**CAUTION:**

**Never connect a tester to the front seat airbag assembly RH (Front passenger side - side squib) for measurement, as the may lead to a serious injury due to airbag deployment.**

**NOTICE:**

- Do not forcibly insert the SST into the terminals of the connector when connecting.
- Insert straight the SST into the terminals of the connector.

**SST 09843-18060**

- (e) Connect the negative (-) terminal cable to the battery, and wait for at least 2 seconds.
- (f) Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- (g) Clear the DTCs stored in memory (See page RS-36).
- (h) Turn the ignition switch to the LOCK position.
- (i) Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- (j) Check the DTCs (See page RS-36).

**OK:**

**DTC B1825, B1826, B1827, B1828 or 56 is not output.**

**HINT:**

Codes other than DTC B1825, B1826, B1827, B1828 and 56 may be output at this time, but they are not related to this check.

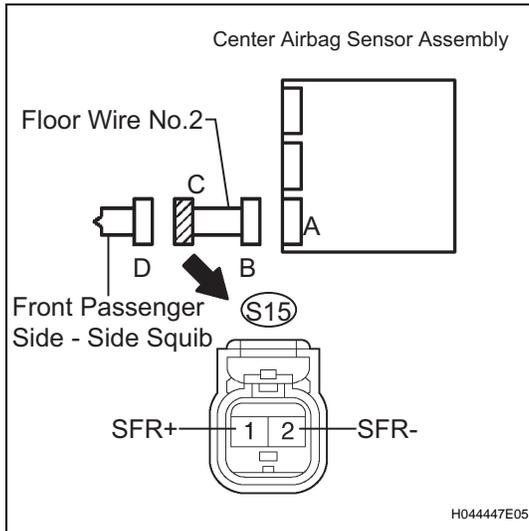
**OK** → **REPLACE FRONT SEAT AIRBAG ASSEMBLY RH**

**NG**

**RS**

## 2

## CHECK FLOOR WIRE NO.2 (FRONT PASSENGER SIDE - SIDE SQUIB CIRCUIT)



- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery, and wait for at least 90 seconds.
- (c) Disconnect the SST from connector "C".
- (d) Disconnect the connectors from the center airbag sensor assembly.
- (e) Check the short to B+ in the circuit.
  - (1) Connect the negative (-) terminal cable to the battery, and wait for at least 2 seconds.
  - (2) Turn the ignition switch to the ON position.
  - (3) Measure the voltage according to the value(s) in the table below.

**Voltage**

Tester connection	Condition	Specified condition
S15-1 (SFR+) - Body ground	Ignition switch ON	Below 1 V
S15-2 (SFR-) - Body ground	Ignition switch ON	Below 1 V

- (f) Check the open in the circuit.
  - (1) Turn the ignition switch to the LOCK position.
  - (2) Disconnect the negative (-) terminal cable from the battery, and wait for at least 90 seconds.
  - (3) Measure the resistance according to the value(s) in the table below.

**Resistance**

Tester connection	Condition	Specified condition
S15-1 (SFR+) - S15-2 (SFR-)	Always	Below 1 $\Omega$

- (g) Check the short to ground in the circuit.
  - (1) Measure the resistance according to the value(s) in the table below.

**Resistance**

Tester connection	Condition	Specified condition
S15-1 (SFR+) - Body ground	Always	1 M $\Omega$ or higher
S15-2 (SFR-) - Body ground	Always	1 M $\Omega$ or higher

- (h) Check the short in the circuit.
  - (1) Release the activation prevention mechanism built into connector "B" (See page RS-30).
  - (2) Measure the resistance according to the value(s) in the table below.

**Resistance**

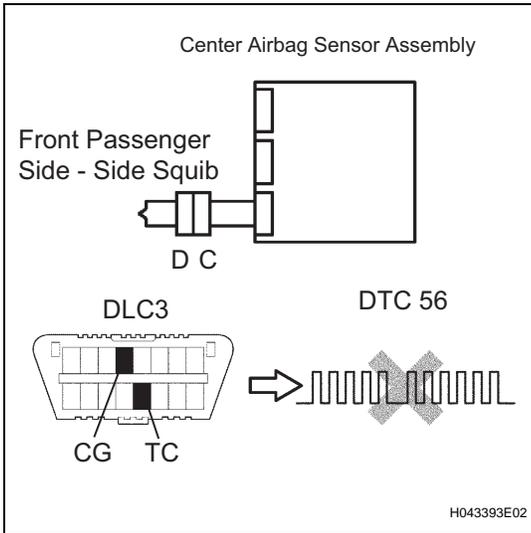
Tester connection	Condition	Specified condition
S15-1 (SFR+) - S15-2 (SFR-)	Always	1 M $\Omega$ or higher

NG

REPAIR OR REPLACE FLOOR WIRE NO.2

OK

**3 CHECK CENTER AIRBAG SENSOR ASSEMBLY**



- (a) Connect the connectors to the center airbag sensor assembly and the front seat airbag assembly RH.
- (b) Connect the negative (-) terminal cable to the battery, and wait for at least 2 seconds.
- (c) Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- (d) Clear the DTCs stored in memory (See page RS-36).
- (e) Turn the ignition switch to the LOCK position.
- (f) Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- (g) Check the DTCs (See page RS-36).

**OK:**

**DTC B1825, B1826, B1827, B1828 or 56 is not output.**

**HINT:**

Codes other than DTC B1825, B1826, B1827, B1828 and 56 may be output at this time, but they are not related to this check.

NG

**REPLACE CENTER AIRBAG SENSOR ASSEMBLY**

OK

RS

**USE SIMULATION METHOD TO CHECK**

<b>DTC</b>	<b>B1830/57</b>	<b>Short in Driver Side Curtain Shield Squib Circuit</b>
<b>DTC</b>	<b>B1831/57</b>	<b>Open in Driver Side Curtain Shield Squib Circuit</b>
<b>DTC</b>	<b>B1832/57</b>	<b>Short to GND in Driver Side Curtain Shield Squib Circuit</b>
<b>DTC</b>	<b>B1833/57</b>	<b>Short to B+ in Driver Side Curtain Shield Squib Circuit</b>

## DESCRIPTION

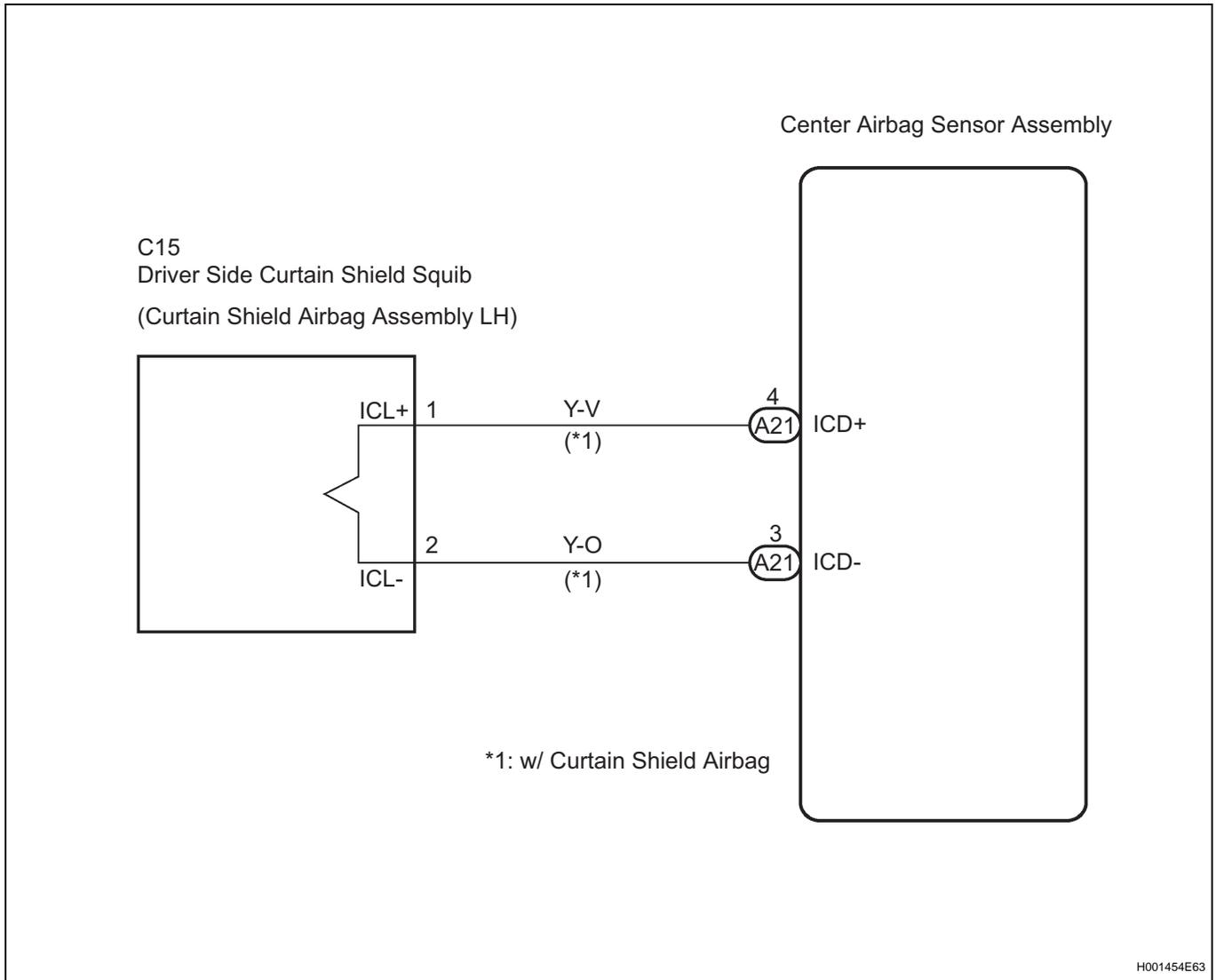
The driver side curtain shield squib circuit consists of the center airbag sensor assembly and the curtain shield airbag assembly LH.

The circuit instructs the SRS to deploy when deployment conditions are met.

These DTCs are recorded when a malfunction is detected in the driver side curtain shield squib circuit.

DTC No.	DTC Detecting Condition	Trouble Area
B1830/57	<ul style="list-style-type: none"> <li>The center airbag sensor assembly receives a line short circuit signal 5 times in the driver side curtain shield squib circuit during primary check.</li> <li>Driver side curtain shield squib circuit malfunction</li> <li>Center airbag sensor assembly malfunction</li> </ul>	<ul style="list-style-type: none"> <li>Floor wire</li> <li>Curtain shield airbag assembly LH (Driver side curtain shield squib)</li> <li>Center airbag sensor assembly</li> </ul>
B1831/57	<ul style="list-style-type: none"> <li>The center airbag sensor assembly receives an open circuit signal in the driver side curtain shield squib circuit for 2 seconds.</li> <li>Driver side curtain shield squib circuit malfunction</li> <li>Center airbag sensor assembly malfunction</li> </ul>	<ul style="list-style-type: none"> <li>Floor wire</li> <li>Curtain shield airbag assembly LH (Driver side curtain shield squib)</li> <li>Center airbag sensor assembly</li> </ul>
B1832/57	<ul style="list-style-type: none"> <li>The center airbag sensor assembly receives a short circuit to ground signal in the driver side curtain shield squib circuit for 0.5 seconds.</li> <li>Driver side curtain shield squib circuit malfunction</li> <li>Center airbag sensor assembly malfunction</li> </ul>	<ul style="list-style-type: none"> <li>Floor wire</li> <li>Curtain shield airbag assembly LH (Driver side curtain shield squib)</li> <li>Center airbag sensor assembly</li> </ul>
B1833/57	<ul style="list-style-type: none"> <li>The center airbag sensor assembly receives a short circuit to B+ signal in the driver side curtain shield squib circuit for 0.5 seconds.</li> <li>Driver side curtain shield squib circuit malfunction</li> <li>Center airbag sensor assembly malfunction</li> </ul>	<ul style="list-style-type: none"> <li>Floor wire</li> <li>Curtain shield airbag assembly LH (Driver side curtain shield squib)</li> <li>Center airbag sensor assembly</li> </ul>

## WIRING DIAGRAM

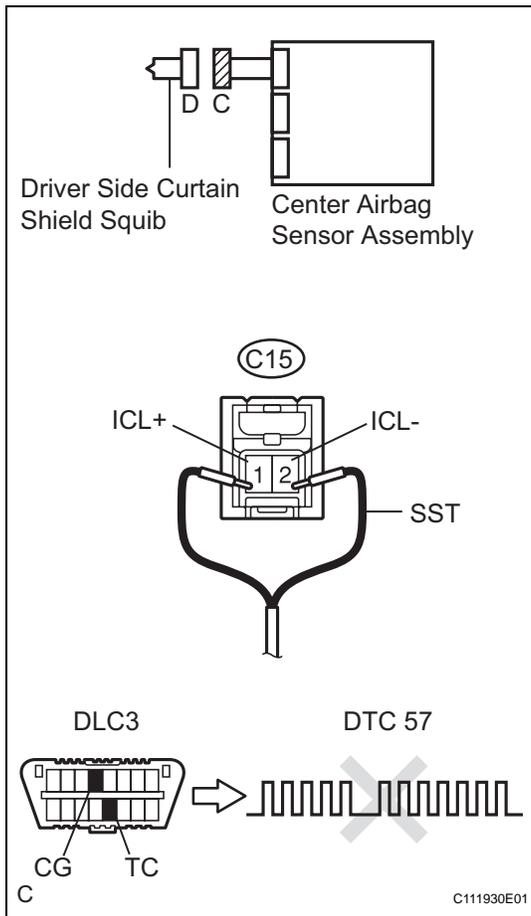


RS

## HINT:

- Perform the simulation method by selecting the "check mode" (signal check) with the intelligent tester (See page [RS-39](#)).
- After selecting the "check mode" (signal check), perform the simulation method by wiggling each connector of the airbag system or driving the vehicle on a city or rough road (See page [RS-39](#)).

1

**CHECK CURTAIN SHIELD AIRBAG ASSEMBLY LH (DRIVER SIDE CURTAIN SHIELD SQUIB)**

- Turn the ignition switch to the LOCK position.
- Disconnect the negative (-) terminal cable from the battery, and wait for at least 90 seconds.
- Disconnect the connector from the curtain shield airbag assembly LH.
- Connect the black wire side of SST (resistance 2.1  $\Omega$ ) to connector "C".

**CAUTION:**

**Never connect a tester to the curtain shield airbag assembly LH (Driver side curtain shield squib) for measurement, as this may lead to a serious injury due to airbag deployment.**

**NOTICE:**

- Do not forcibly insert the SST into the terminals of the connector when connecting.
- Insert straight the SST into the terminals of the connector.

**SST 09843-18060**

- Connect the negative (-) terminal cable to the battery, and wait for at least 2 seconds.
- Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- Clear the DTCs stored in memory (See page RS-36).
- Turn the ignition switch to the LOCK position.
- Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- Check the DTCs (See page RS-36).

**OK:**

**DTC B1830, B1831, B1832, B1833 or 57 is not output.**

**HINT:**

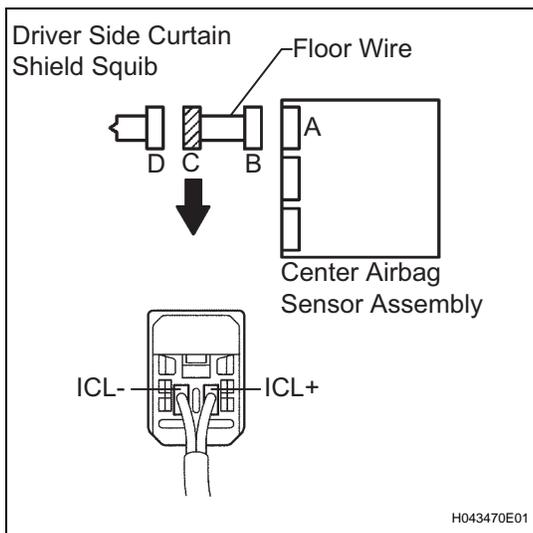
Codes other than DTC B1830, B1831, B1832, B1833 and 57 may be output at this time, but they are not related to this check.

OK

**REPLACE CURTAIN SHIELD AIRBAG ASSEMBLY LH**

NG

**2 CHECK FLOOR WIRE (DRIVER SIDE CURTAIN SHIELD SQUIB CIRCUIT)**



- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery, and wait for at least 90 seconds.
- (c) Disconnect the SST from connector "C".
- (d) Disconnect the connectors from the center airbag sensor assembly.
- (e) Check the short to B+ in the circuit.
  - (1) Connect the negative (-) terminal cable to the battery, and wait for at least 2 seconds.
  - (2) Turn the ignition switch to the ON position.
  - (3) Measure the voltage according to the value(s) in the table below.

**Voltage**

Tester connection	Condition	Specified condition
C15-1 (ICL+) - Body ground	Ignition switch ON	Below 1 V
C15-2 (ICL-) - Body ground	Ignition switch ON	Below 1 V

- (f) Check the open in the circuit.
  - (1) Turn the ignition switch to the LOCK position.
  - (2) Disconnect the negative (-) terminal cable from the battery, and wait for at least 90 seconds.
  - (3) Measure the resistance according to the value(s) in the table below.

**Resistance**

Tester connection	Condition	Specified condition
C15-1 (ICL+) - C15-2 (ICL-)	Always	Below 1 Ω

- (g) Check the short to ground in the circuit.
  - (1) Measure the resistance according to the value(s) in the table below.

**Resistance**

Tester connection	Condition	Specified condition
C15-1 (ICL+) - Body ground	Always	1 MΩ or higher
C15-2 (ICL-) - Body ground	Always	1 MΩ or higher

- (h) Check the short in the circuit.
  - (1) Release the activation prevention mechanism built into connector "B" (See page RS-30).
  - (2) Measure the resistance according to the value(s) in the table below.

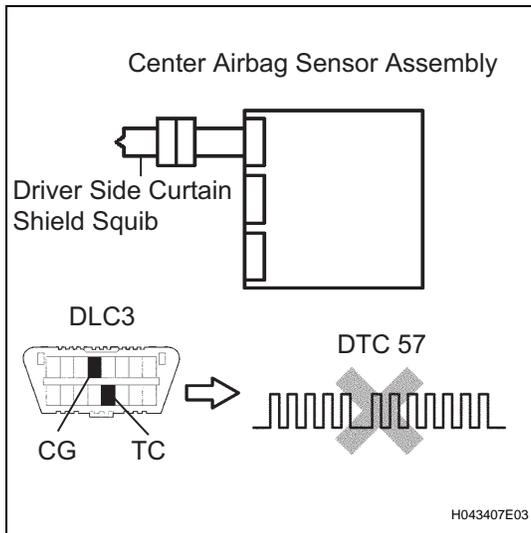
**Resistance**

Tester connection	Condition	Specified condition
C15-1 (ICL+) - C15-2 (ICL-)	Always	1 MΩ or higher

**NG** REPAIR OR REPLACE FLOOR WIRE

**RS**

OK

**3 CHECK CENTER AIRBAG SENSOR ASSEMBLY**

- (a) Connect the connectors to the center airbag sensor assembly and the curtain shield airbag assembly LH.
- (b) Connect the negative (-) terminal cable to the battery, and wait for at least 2 seconds.
- (c) Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- (d) Clear the DTCs stored in memory (See page [RS-36](#)).
- (e) Turn the ignition switch to the LOCK position.
- (f) Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- (g) Check the DTCs (See page [RS-36](#)).

**OK:**

**DTC B1830, B1831, B1832, B1833 or 57 is not output.**

**HINT:**

Codes other than DTC B1830, B1831, B1832, B1833 and 57 may be output at this time, but they are not related to this check.

NG

**REPLACE CENTER AIRBAG SENSOR ASSEMBLY**

RS

OK

**USE SIMULATION METHOD TO CHECK**

<b>DTC</b>	<b>B1835/58</b>	<b>Short in Front Passenger Side Curtain Shield Squib Circuit</b>
<b>DTC</b>	<b>B1836/58</b>	<b>Open in Front Passenger Side Curtain Shield Squib Circuit</b>
<b>DTC</b>	<b>B1837/58</b>	<b>Short to GND in Front Passenger Side Curtain Shield Squib Circuit</b>
<b>DTC</b>	<b>B1838/58</b>	<b>Short to B+ in Front Passenger Side Curtain Shield Squib Circuit</b>

## DESCRIPTION

The front passenger side curtain shield squib RH circuit consists of the center airbag sensor assembly and the curtain shield airbag assembly RH.

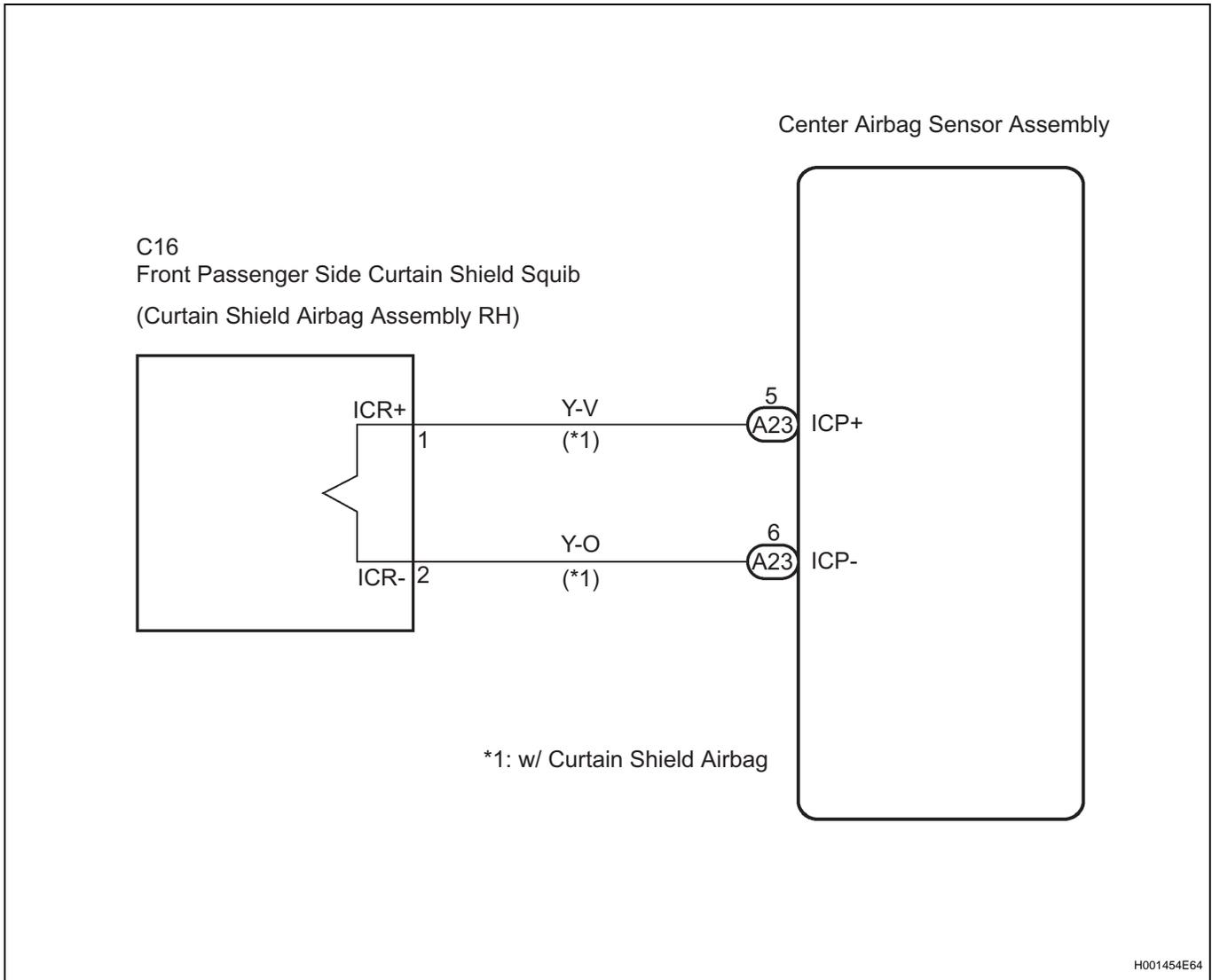
The circuit instructs the SRS to deploy when deployment conditions are met.

These DTCs are recorded when a malfunction is detected in the front passenger side curtain squib circuit.

DTC No.	DTC Detecting Condition	Trouble Area
B1835/58	<ul style="list-style-type: none"> <li>The center airbag sensor assembly receives a line short circuit signal 5 times in the front passenger side curtain shield squib circuit during primary check.</li> <li>Front passenger side curtain shield squib circuit malfunction</li> <li>Center airbag sensor assembly malfunction</li> </ul>	<ul style="list-style-type: none"> <li>Floor wire No.2</li> <li>Curtain shield airbag assembly RH (Front passenger side curtain shield squib)</li> <li>Center airbag sensor assembly</li> </ul>
B1836/58	<ul style="list-style-type: none"> <li>The center airbag sensor assembly receives an open circuit signal in the front passenger side curtain shield squib circuit for 2 seconds.</li> <li>Front passenger side curtain shield squib circuit malfunction</li> <li>Center airbag sensor assembly malfunction</li> </ul>	<ul style="list-style-type: none"> <li>Floor wire No.2</li> <li>Curtain shield airbag assembly RH (Front passenger side curtain shield squib)</li> <li>Center airbag sensor assembly</li> </ul>
B1837/58	<ul style="list-style-type: none"> <li>The center airbag sensor assembly receives a short circuit to ground signal in the front passenger side curtain shield squib circuit for 0.5 seconds.</li> <li>Front passenger side curtain shield squib circuit malfunction</li> <li>Center airbag sensor assembly malfunction</li> </ul>	<ul style="list-style-type: none"> <li>Floor wire No.2</li> <li>Curtain shield airbag assembly RH (Front passenger side curtain shield squib)</li> <li>Center airbag sensor assembly</li> </ul>
B1838/58	<ul style="list-style-type: none"> <li>The center airbag sensor assembly receives a short circuit to B+ signal in the front passenger side curtain shield squib circuit for 0.5 seconds.</li> <li>Front passenger side curtain shield squib circuit malfunction</li> <li>Center airbag sensor assembly malfunction</li> </ul>	<ul style="list-style-type: none"> <li>Floor wire No.2</li> <li>Curtain shield airbag assembly RH (Front passenger side curtain shield squib)</li> <li>Center airbag sensor assembly</li> </ul>

RS

## WIRING DIAGRAM

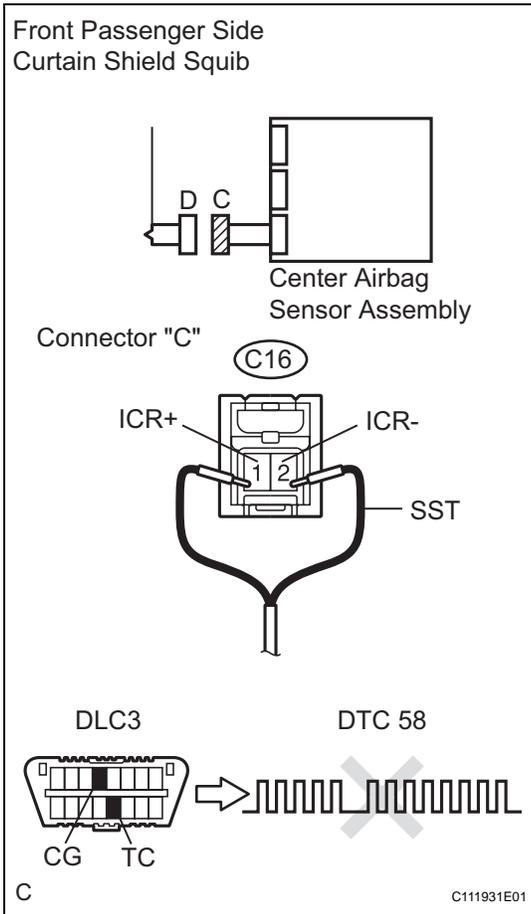


RS

## HINT:

- Perform the simulation method by selecting the "check mode" (signal check) with the intelligent tester (See page [RS-39](#)).
- After selecting the "check mode" (signal check), perform the simulation method by wiggling each connector of the airbag system or driving the vehicle on a city or rough road (See page [RS-39](#)).

**1 CHECK CURTAIN SHIELD AIRBAG ASSEMBLY RH (FRONT PASSENGER SIDE CURTAIN SHIELD SQUIB)**



- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery, and wait for at least 90 seconds.
- (c) Disconnect the connector from the curtain shield airbag assembly RH.
- (d) Connect the black wire side of SST (resistance 2.1 Ω) to connector "C".

**CAUTION:**

**Never connect a tester to the curtain shield airbag assembly RH (Front passenger side curtain shield squib) for measurement, as the may lead to a serious injury due to airbag deployment.**

**NOTICE:**

- Do not forcibly insert the SST into the terminals of the connector when connecting.
- Insert straight the SST into the terminals of the connector.

**SST 09843-18060**

- (e) Connect the negative (-) terminal cable to the battery, and wait for at least 2 seconds.
- (f) Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- (g) Clear the DTCs stored in memory (See page RS-36).
- (h) Turn the ignition switch to the LOCK position.
- (i) Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- (j) Check the DTCs (See page RS-36).

**OK:**

**DTC B1835, B1836, B1837, B1838 or 58 is not output.**

**HINT:**

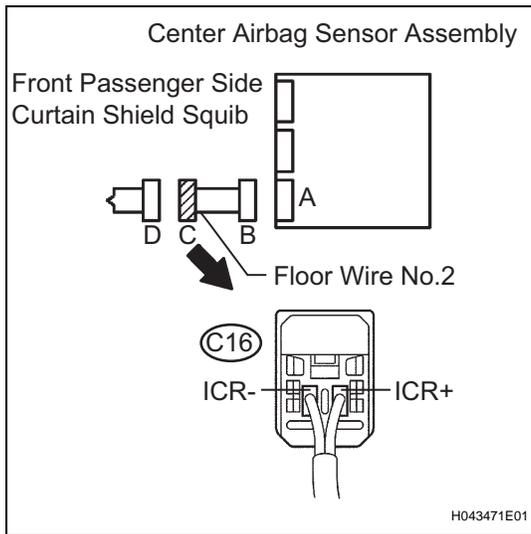
Codes other than DTC B1835, B1836, B1837, B1838 and 58 may be output at this time, but they are not related to this check.

**OK** → **REPLACE CURTAIN SHIELD AIRBAG ASSEMBLY RH**

**RS**

**NG**

## 2

**CHECK FLOOR WIRE NO.2 (FRONT PASSENGER SIDE CURTAIN SHIELD SQUIB CIRCUIT)**

- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery, and wait for at least 90 seconds.
- (c) Disconnect the SST from connector "C".
- (d) Disconnect the connectors from the center airbag sensor assembly.
- (e) Check the short to B+ in the circuit.
  - (1) Connect the negative (-) terminal cable to the battery, and wait for at least 2 seconds.
  - (2) Turn the ignition switch to the ON position.
  - (3) Measure the voltage according to the value(s) in the table below.

**Voltage**

Tester connection	Condition	Specified condition
C16-1 (ICR+) - Body ground	Ignition switch ON	Below 1 V
C16-2 (ICR-) - Body ground	Ignition switch ON	Below 1 V

- (f) Check the open in the circuit.
  - (1) Turn the ignition switch to the LOCK position.
  - (2) Disconnect the negative (-) terminal cable from the battery, and wait for at least 90 seconds.
  - (3) Measure the resistance according to the value(s) in the table below.

**Resistance**

Tester connection	Condition	Specified condition
C16-1 (ICR+) - C16-2 (ICR-)	Always	Below 1 $\Omega$

- (g) Check the short to ground in the circuit.
  - (1) Measure the resistance according to the value(s) in the table below.

**Resistance**

Tester connection	Condition	Specified condition
C16-1 (ICR+) - Body ground	Always	1 M $\Omega$ or higher
C16-2 (ICR-) - Body ground	Always	1 M $\Omega$ or higher

- (h) Check the short in the circuit.
  - (1) Release the activation prevention mechanism built into connector "B" (See page RS-30).
  - (2) Measure the resistance according to the value(s) in the table below.

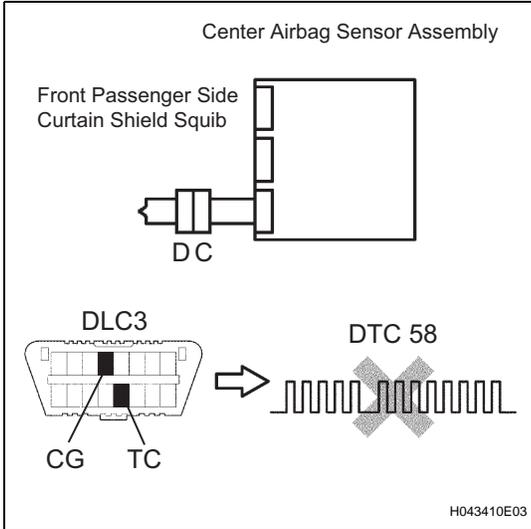
**Resistance**

Tester connection	Condition	Specified condition
C16-1 (ICR+) - C16-2 (ICR-)	Always	1 M $\Omega$ or higher

**NG** REPAIR OR REPLACE FLOOR WIRE NO.2

**OK**

**3 CHECK CENTER AIRBAG SENSOR ASSEMBLY**



- (a) Connect the connectors to the center airbag sensor assembly and the curtain shield airbag assembly RH.
- (b) Connect the negative (-) terminal cable to the battery, and wait for at least 2 seconds.
- (c) Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- (d) Clear the DTCs stored in memory (See page RS-36).
- (e) Turn the ignition switch to the LOCK position.
- (f) Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- (g) Check the DTCs (See page RS-36).

**OK:**

**DTC B1835, B1836, B1837, B1838 or 58 is not output.**

**HINT:**

Codes other than DTC B1835, B1836, B1837, B1838 and 58 may be output at this time, but they are not related to this check.

**NG** REPLACE CENTER AIRBAG SENSOR ASSEMBLY

**OK**

**USE SIMULATION METHOD TO CHECK**

**RS**

<b>DTC</b>	<b>B1900/73</b>	<b>Short in Driver Side Front Pretensioner Squib Circuit</b>
<b>DTC</b>	<b>B1901/73</b>	<b>Open in Driver Side Front Pretensioner Squib Circuit</b>
<b>DTC</b>	<b>B1902/73</b>	<b>Short to GND in Driver Side Front Pretensioner Squib Circuit</b>
<b>DTC</b>	<b>B1903/73</b>	<b>Short to B+ in Driver Side Front Pretensioner Squib Circuit</b>

## DESCRIPTION

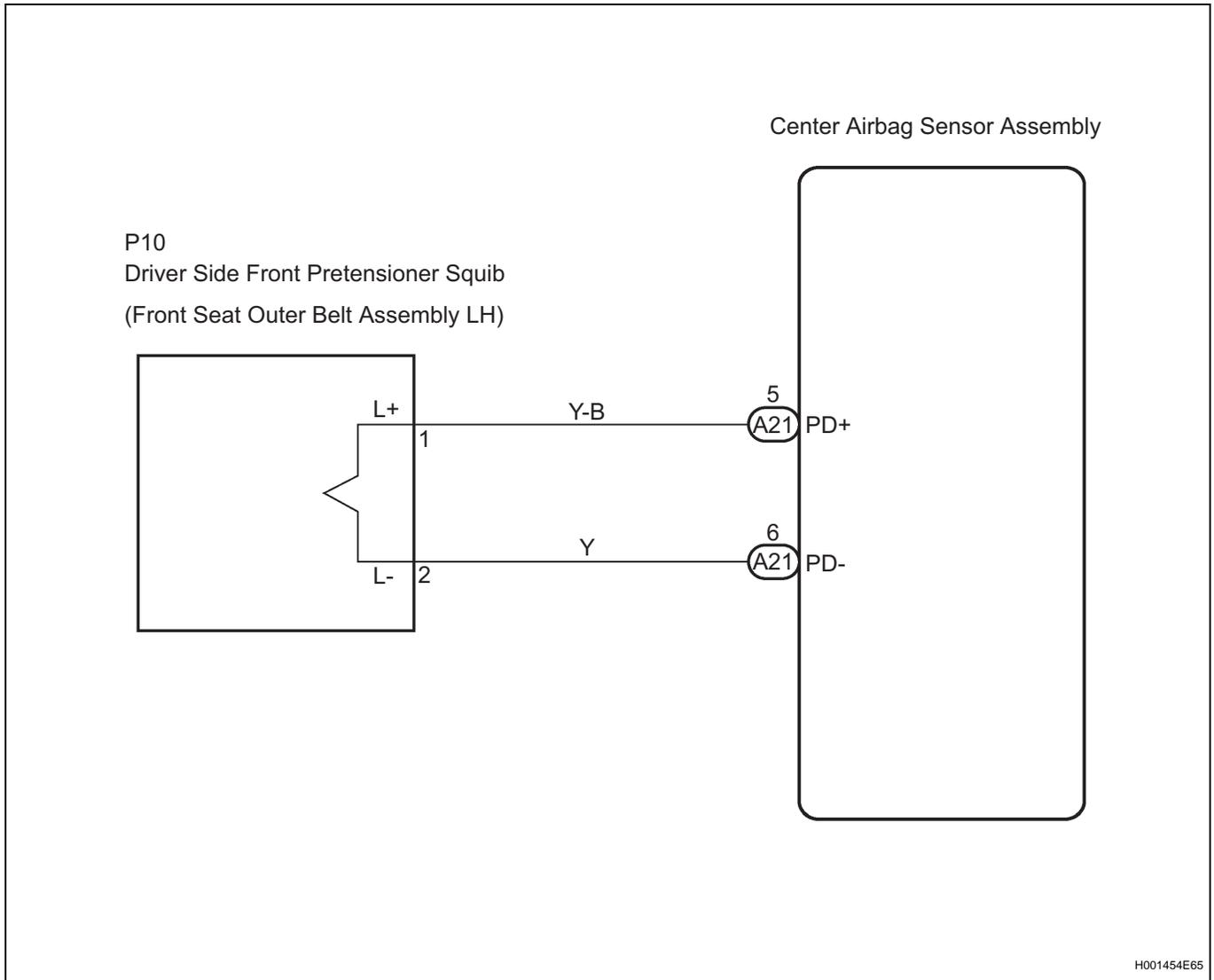
The driver side front pretensioner squib circuit consists of the center airbag sensor assembly and the front seat outer belt assembly LH.

This circuit instructs the SRS to deploy when deployment conditions are met.

These DTCs are recorded when a malfunction is detected in the driver side front pretensioner squib circuit.

DTC No.	DTC Detecting Condition	Trouble Area
B1900/73	<ul style="list-style-type: none"> <li>The center airbag sensor assembly receives a line short circuit signal 5 times in the driver side front pretensioner squib circuit during primary check.</li> <li>Driver side front pretensioner squib circuit malfunction</li> <li>Center airbag sensor assembly malfunction</li> </ul>	<ul style="list-style-type: none"> <li>Floor wire</li> <li>Front seat outer belt assembly LH (Driver side front pretensioner squib)</li> <li>Center airbag sensor assembly</li> </ul>
B1901/73	<ul style="list-style-type: none"> <li>The center airbag sensor assembly receives an open circuit signal in the driver side front pretensioner squib circuit for 2 seconds.</li> <li>Driver side front pretensioner squib circuit malfunction</li> <li>Center airbag sensor assembly malfunction</li> </ul>	<ul style="list-style-type: none"> <li>Floor wire</li> <li>Front seat outer belt assembly LH (Driver side front pretensioner squib)</li> <li>Center airbag sensor assembly</li> </ul>
B1902/73	<ul style="list-style-type: none"> <li>The center airbag sensor assembly receives a short circuit to ground signal in the driver side front pretensioner squib circuit for 0.5 seconds.</li> <li>Driver side front pretensioner squib circuit malfunction</li> <li>Center airbag sensor assembly malfunction</li> </ul>	<ul style="list-style-type: none"> <li>Floor wire</li> <li>Front seat outer belt assembly LH (Driver side front pretensioner squib)</li> <li>Center airbag sensor assembly</li> </ul>
B1903/73	<ul style="list-style-type: none"> <li>The center airbag sensor assembly receives a short circuit to B+ signal in the driver side front pretensioner squib circuit for 0.5 seconds.</li> <li>Driver side front pretensioner squib circuit malfunction</li> <li>Center airbag sensor assembly malfunction</li> </ul>	<ul style="list-style-type: none"> <li>Floor wire</li> <li>Front seat outer belt assembly LH (Driver side front pretensioner squib)</li> <li>Center airbag sensor assembly</li> </ul>

## WIRING DIAGRAM

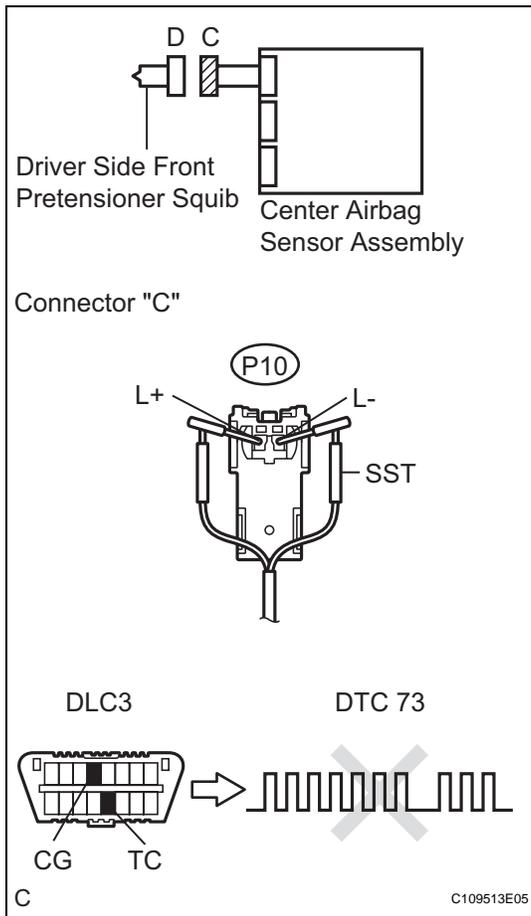


RS

## HINT:

- Perform the simulation method by selecting the "check mode" (signal check) with the intelligent tester (See page [RS-39](#)).
- After selecting the "check mode" (signal check), perform the simulation method by wiggling each connector of the airbag system or driving the vehicle on a city or rough road (See page [RS-39](#)).

## 1 CHECK FRONT SEAT OUTER BELT ASSEMBLY LH (DRIVER SIDE FRONT PRETENSIONER)



- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery, and wait for at least 90 seconds.
- (c) Disconnect the connector from the front seat outer belt assembly LH.
- (d) Connect the white wire side of SST (resistance 2.1  $\Omega$ ) to connector "C".

### CAUTION:

**Never connect a tester to the front seat outer belt assembly LH (Driver side front pretensioner squib) for measurement, as this may lead to a serious injury due to airbag deployment.**

### NOTICE:

- Do not forcibly insert the SST into the terminals of the connector when connecting.
- Insert straight the SST into the terminals of the connector.

### SST 09843-18060

- (e) Connect the negative (-) terminal cable to the battery, and wait for at least 2 seconds.
- (f) Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- (g) Clear the DTCs stored in memory (See page RS-36).
- (h) Turn the ignition switch to the LOCK position.
- (i) Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- (j) Check the DTCs (See page RS-36).

### OK:

**DTC B1900, B1901, B1902, B1903 or 73 is not output.**

### HINT:

Codes other than DTC B1900, B1901, B1902, B1903 and 73 may be output at this time, but they are not related to this check.

OK

**REPLACE FRONT SEAT OUTER BELT ASSEMBLY LH**

NG

## 2 CHECK CONNECTOR

- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery, and wait for at least 90 seconds.
- (c) Disconnect the SST from connector "C".
- (d) Check that the floor wire connector (on the front seat outer belt assembly LH side) is not damaged.

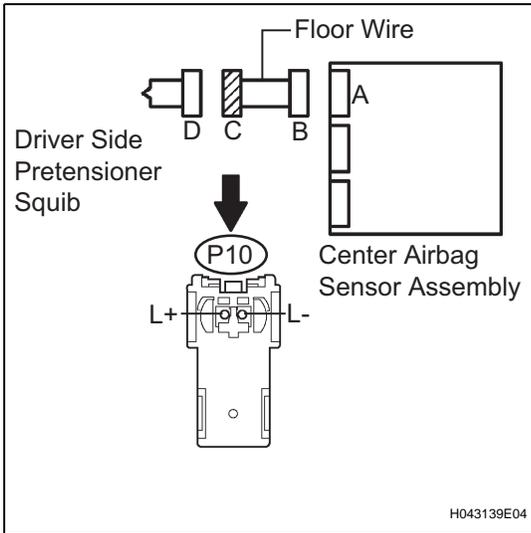
OK:

The lock button is not disengaged, or the claw of the lock is not deformed or damaged.

NG REPAIR OR REPLACE FLOOR WIRE

OK

**3 CHECK FLOOR WIRE (DRIVER SIDE FRONT PRETENSIONER SQUIB CIRCUIT)**



- (a) Disconnect the connectors from the center airbag sensor assembly.
- (b) Check the short to B+ in the circuit.
  - (1) Connect the negative (-) terminal cable to the battery, and wait for at least 2 seconds.
  - (2) Turn the ignition switch to the ON position.
  - (3) Measure the voltage according to the value(s) in the table below.

**Voltage**

Tester connection	Condition	Specified condition
P10-1 (L+) - Body ground	Ignition switch ON	Below 1 V
P10-2 (L-) - Body ground	Ignition switch ON	Below 1 V

- (c) Check the open in the circuit.
  - (1) Turn the ignition switch to the LOCK position.
  - (2) Disconnect the negative (-) terminal cable from the battery, and wait for at least 90 seconds.
  - (3) Measure the resistance according to the value(s) in the table below.

**Resistance**

Tester connection	Condition	Specified condition
P10-1 (L+) - P10-2 (L-)	Always	Below 1 Ω

- (d) Check the short to ground in the circuit.
  - (1) Measure the resistance according to the value(s) in the table below.

**Resistance**

Tester connection	Condition	Specified condition
P10-1 (L+) - Body ground	Always	1 MΩ or higher
P10-2 (L-) - Body ground	Always	1 MΩ or higher

- (e) Check the short in the circuit.
  - (1) Release the activation prevention mechanism built into connector "B" (See page RS-30).
  - (2) Measure the resistance according to the value(s) in the table below.

**Resistance**

Tester connection	Condition	Specified condition
P10-1 (L+) - P10-2 (L-)	Always	1 MΩ or higher

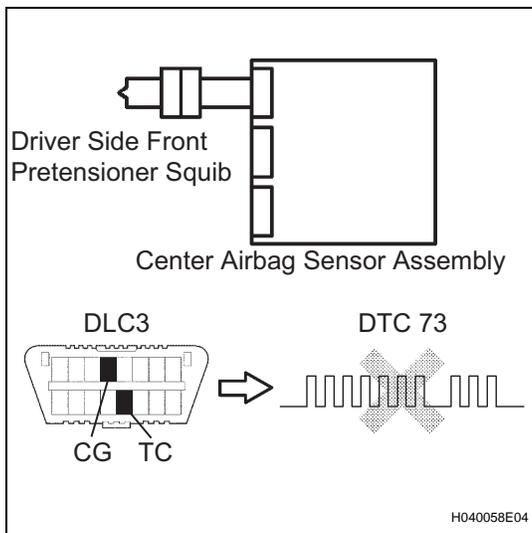
RS

NG

REPAIR OR REPLACE FLOOR WIRE

OK

## 4 CHECK CENTER AIRBAG SENSOR ASSEMBLY



- Connect the connectors to the center airbag sensor assembly and the front seat outer belt assembly LH.
- Connect the negative (-) terminal cable to the battery, and wait for at least 2 seconds.
- Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- Clear the DTCs stored in memory (See page RS-36).
- Turn the ignition switch to the LOCK position.
- Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- Check the DTCs (See page RS-36).

**OK:**

**DTC B1900, B1901, B1902, B1903 or 73 is not output.**

**HINT:**

Codes other than DTC B1900, B1901, B1902, B1903 or 73 may be output at this time, but they are not related to this check.

NG

REPLACE CENTER AIRBAG SENSOR ASSEMBLY

OK

USE SIMULATION METHOD TO CHECK

<b>DTC</b>	<b>B1905/74</b>	<b>Short in Front Passenger Side Front Pretensioner Squib Circuit</b>
<b>DTC</b>	<b>B1906/74</b>	<b>Open in Front Passenger Side Front Pretensioner Squib Circuit</b>
<b>DTC</b>	<b>B1907/74</b>	<b>Short to GND in Front Passenger Side Front Pretensioner Squib Circuit</b>
<b>DTC</b>	<b>B1908/74</b>	<b>Short to B+ in Front Passenger Side Front Pretensioner Squib Circuit</b>

## DESCRIPTION

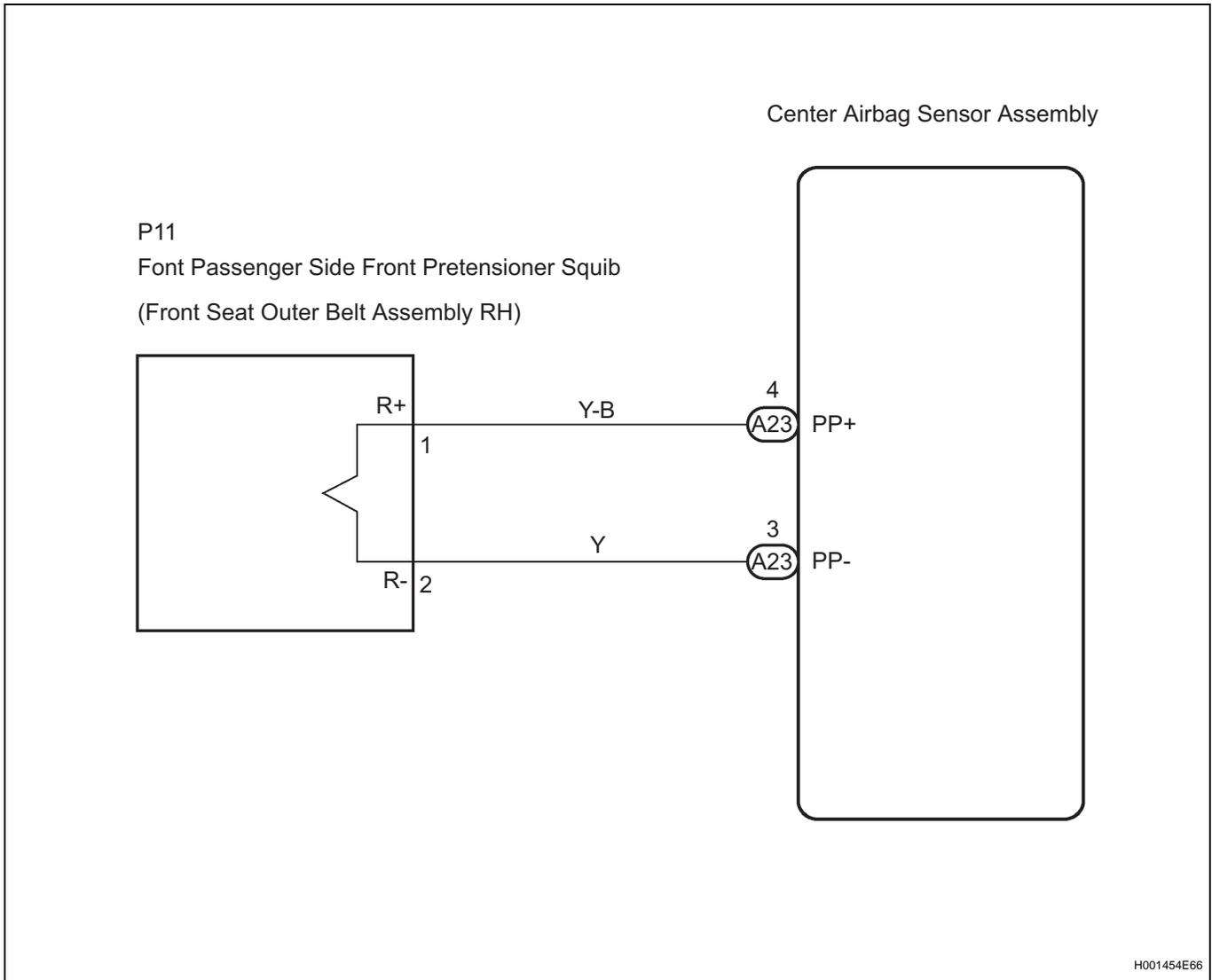
The front passenger side front pretensioner squib circuit consists of the center airbag sensor assembly and the front seat outer belt assembly RH.

This circuit instructs the SRS to deploy when deployment conditions are met.

These DTCs are recorded when a malfunction is detected in the front passenger side front pretensioner squib circuit.

DTC No.	DTC Detecting Condition	Trouble Area
B1905/74	<ul style="list-style-type: none"> <li>The center airbag sensor assembly receives a line short circuit signal 5 times in the driver side front pretensioner squib circuit during primary check.</li> <li>Driver side front pretensioner squib circuit malfunction</li> <li>Center airbag sensor assembly malfunction</li> </ul>	<ul style="list-style-type: none"> <li>Floor wire No.2</li> <li>Front seat outer belt assembly RH (Front passenger side front pretensioner squib)</li> <li>Center airbag sensor assembly</li> </ul>
B1906/74	<ul style="list-style-type: none"> <li>The center airbag sensor assembly receives an open circuit signal in the front passenger side front pretensioner squib circuit for 2 seconds.</li> <li>Front passenger side front pretensioner squib circuit malfunction</li> <li>Center airbag sensor assembly malfunction</li> </ul>	<ul style="list-style-type: none"> <li>Floor wire No.2</li> <li>Front seat outer belt assembly RH (Front passenger side front pretensioner squib)</li> <li>Center airbag sensor assembly</li> </ul>
B1907/74	<ul style="list-style-type: none"> <li>The center airbag sensor assembly receives a short circuit to ground signal in the front passenger side front pretensioner squib circuit for 0.5 seconds.</li> <li>Front passenger side front pretensioner squib circuit malfunction</li> <li>Center airbag sensor assembly malfunction</li> </ul>	<ul style="list-style-type: none"> <li>Floor wire No.2</li> <li>Front seat outer belt assembly RH (Front passenger side front pretensioner squib)</li> <li>Center airbag sensor assembly</li> </ul>
B1908/74	<ul style="list-style-type: none"> <li>The center airbag sensor assembly receives a short circuit to B+ signal in the front passenger side front pretensioner squib circuit for 0.5 seconds.</li> <li>Front passenger side front pretensioner squib circuit malfunction</li> <li>Center airbag sensor assembly malfunction</li> </ul>	<ul style="list-style-type: none"> <li>Floor wire No.2</li> <li>Front seat outer belt assembly RH (Front passenger side front pretensioner squib)</li> <li>Center airbag sensor assembly</li> </ul>

## WIRING DIAGRAM

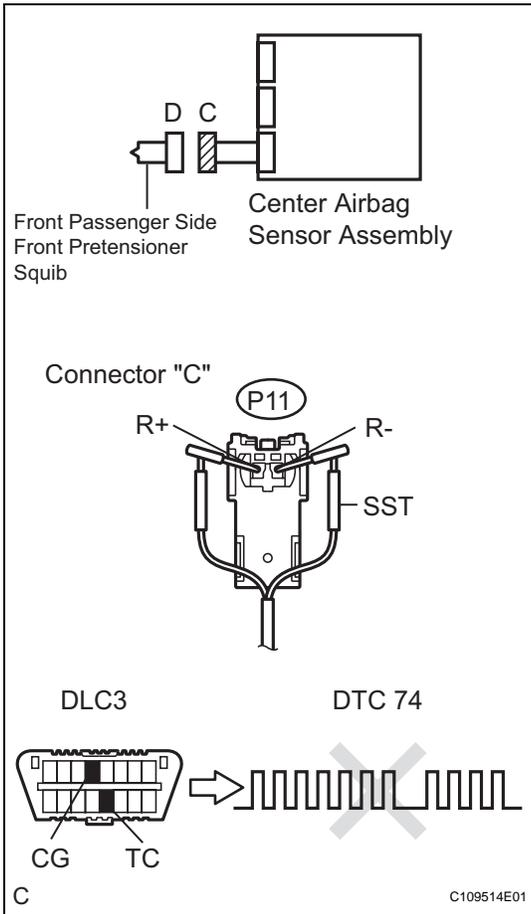


RS

## HINT:

- Perform the simulation method by selecting the "check mode" (signal check) with the intelligent tester (See page [RS-39](#)).
- After selecting the "check mode" (signal check), perform the simulation method by wiggling each connector of the airbag system or driving the vehicle on a city or rough road (See page [RS-39](#)).

**1 CHECK FRONT SEAT OUTER BELT ASSEMBLY RH (FRONT PASSENGER SIDE FRONT PRETENSIONER SQUIB)**



- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery, and wait for at least 90 seconds.
- (c) Disconnect the connector from the front seat outer belt assembly RH.
- (d) Connect the white wire side of SST (resistance 2.1 Ω) to connector "C".

**CAUTION:**

**Never connect a tester to the front seat outer belt assembly RH (Front passenger side front pretensioner squib) for measurement, as this may lead to a serious injury due to airbag deployment.**

**NOTICE:**

- Do not forcibly insert the SST into the terminals of the connector when connecting.
- Insert straight the SST into the terminals of the connector.

**SST 09843-18060**

- (e) Connect the negative (-) terminal cable to the battery, and wait for at least 2 seconds.
- (f) Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- (g) Clear the DTCs stored in memory (See page RS-36).
- (h) Turn the ignition switch to the LOCK position.
- (i) Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- (j) Check the DTCs (See page RS-36).

**OK:**

**DTC B1905, B1906, B1907, B1908 or 74 is not output.**

**HINT:**

Codes other than DTC B1905, B1906, B1907, B1908 and 74 may be output at this time, but they are not related to this check.

**OK** → **REPLACE FRONT SEAT OUTER BELT ASSEMBLY RH**

**NG**

**2 CHECK CONNECTOR**

- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery, and wait for at least 90 seconds.
- (c) Disconnect the SST from connector "C".
- (d) Check that the floor wire No.2 connector (on the front seat outer belt assembly RH side) is not damaged.

**RS**

OK:

The lock button is not disengaged, or the claw of the lock is not deformed or damaged.

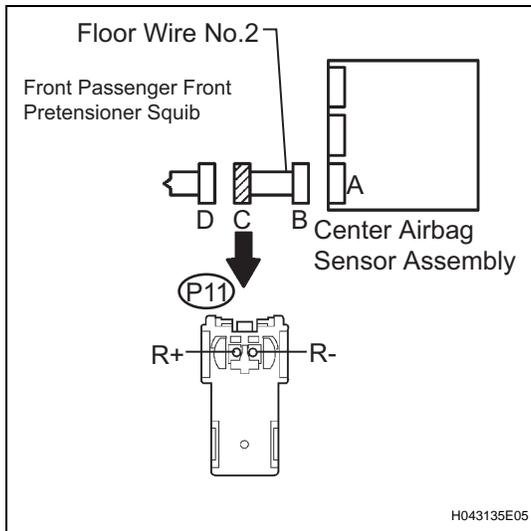
NG

REPAIR OR REPLACE FLOOR WIRE NO.2

OK

3

### CHECK FLOOR WIRE NO.2 (FRONT PASSENGER SIDE FRONT PRETENSIONER SQUIB CIRCUIT)



- (a) Disconnect the connectors from the center airbag sensor assembly.
- (b) Check the short to B+ in the circuit.
  - (1) Connect the negative (-) terminal cable to the battery, and wait for at least 2 seconds.
  - (2) Turn the ignition switch to the ON position.
  - (3) Measure the voltage according to the value(s) in the table below.

#### Voltage

Tester connection	Condition	Specified condition
P11-1 (R+) - Body ground	Ignition switch ON	Below 1 V
P11-2 (R-) - Body ground	Ignition switch ON	Below 1 V

- (c) Check the open in the circuit.
  - (1) Turn the ignition switch to the LOCK position.
  - (2) Disconnect the negative (-) terminal cable from the battery, and wait for at least 90 seconds.
  - (3) Measure the resistance according to the value(s) in the table below.

#### Resistance

Tester connection	Condition	Specified condition
P11-1 (R+) - P11-2 (R-)	Always	Below 1 $\Omega$

- (d) Check the short to ground in the circuit.
  - (1) Measure the resistance according to the value(s) in the table below.

#### Resistance

Tester connection	Condition	Specified condition
P11-1 (R+) - Body ground	Always	1 M $\Omega$ or higher
P11-2 (R-) - Body ground	Always	1 M $\Omega$ or higher

- (e) Check the short in the circuit.
  - (1) Release the activation prevention mechanism built into connector "B" (See page RS-30).
  - (2) Measure the resistance according to the value(s) in the table below.

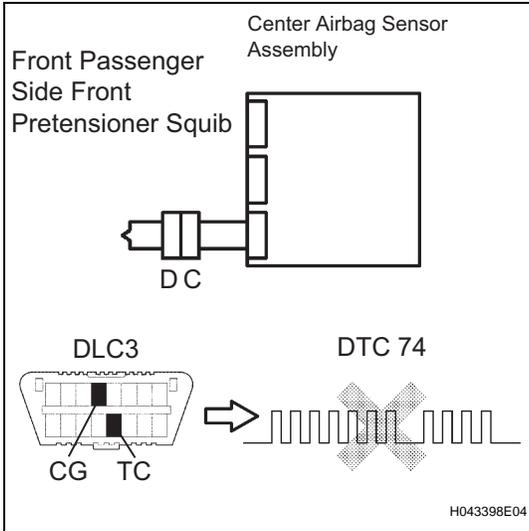
Resistance

Tester connection	Condition	Specified condition
P11-1 (R+) - P11-2 (R-)	Always	1 MΩ or higher

**NG** REPAIR OR REPLACE FLOOR WIRE NO.2

**OK**

**4 CHECK CENTER AIRBAG SENSOR ASSEMBLY**



- Connect the connectors to the center airbag sensor assembly and the front seat outer belt assembly RH.
- Connect the negative (-) terminal cable to the battery, and wait for at least 2 seconds.
- Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- Clear the DTCs stored in memory (See page RS-36).
- Turn the ignition switch to the LOCK position.
- Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- Check the DTCs (See page RS-36).

**OK:**

**DTC B1905, B1906, B1907, B1908 or 74 is not output.**

**HINT:**

Codes other than DTC B1905, B1906, B1907, B1908 and 74 may be output at this time, but they are not related to this check.

**RS**

**NG** REPLACE CENTER AIRBAG SENSOR ASSEMBLY

**OK**

**USE SIMULATION METHOD TO CHECK**

## SRS Warning Light Remains ON

### DESCRIPTION

The SRS warning light is located on the combination meter.

When the SRS is normal, the SRS warning light comes on for approximately 6 seconds after the ignition switch is turned from LOCK to ON position, and then goes off automatically.

If there is a malfunction in the SRS, the SRS warning light comes on to inform the driver of a problem.

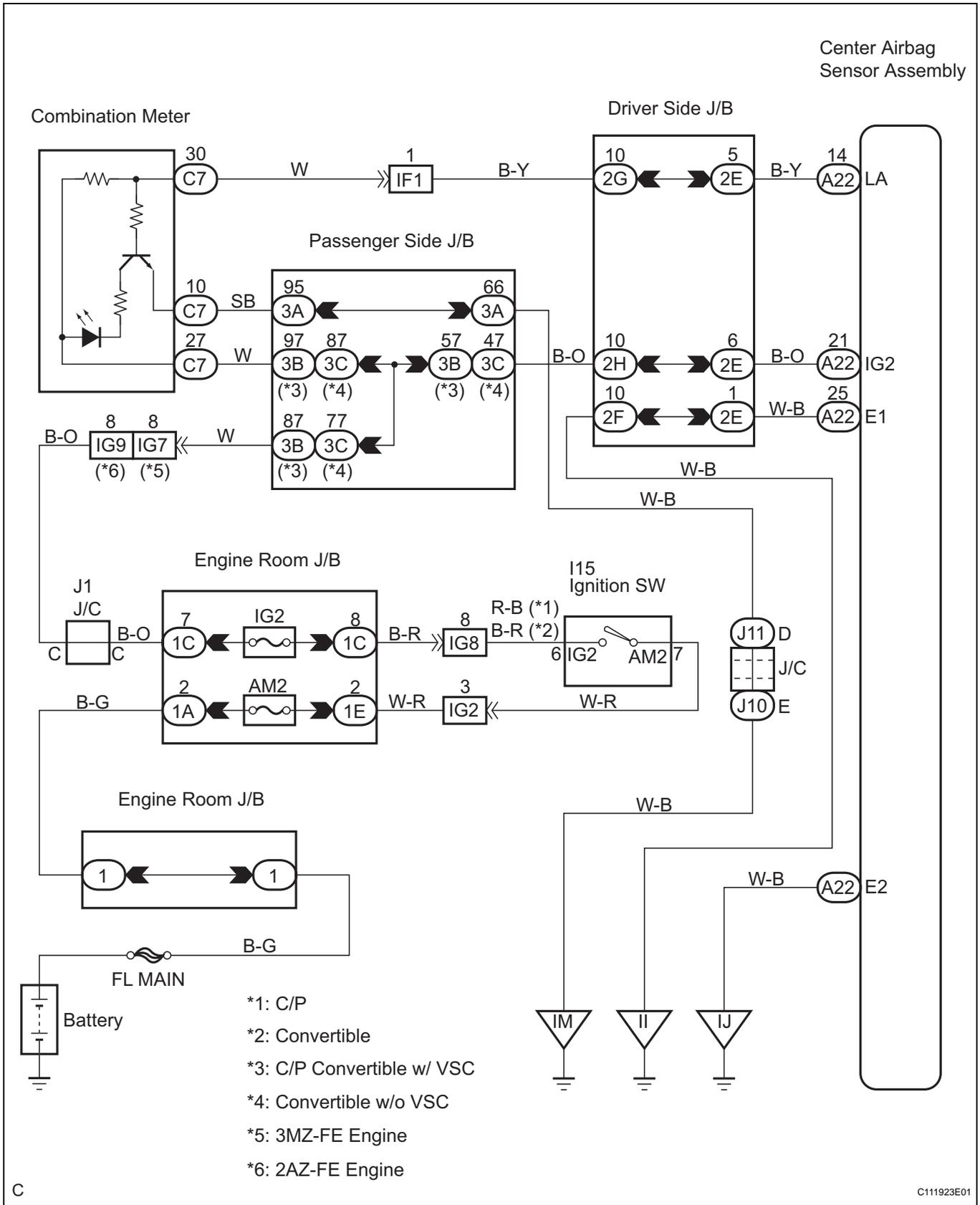
When terminals TC and CG of the DLC3 are connected, the DTC is displayed blinking the SRS warning light.

The SRS is equipped with a voltage-increase circuit (DC-DC converter) in the center airbag sensor assembly in case the source voltage drops.

When the battery voltage drops, the voltage-increase circuit (DC-DC converter) functions to increase the voltage of the SRS to normal voltage.

A malfunction in this circuit is not recorded in the center airbag sensor assembly. The SRS warning light automatically goes off when the source voltage returns to normal.

WIRING DIAGRAM



RS

**1 CHECK BATTERY**

(a) Measure the voltage of the battery.

**Voltage:**  
11 to 14 V

**NG** **CHECK AND REPLACE BATTERY OR CHARGING SYSTEM**

**OK**

**2 CHECK CONNECTORS**

- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery, and wait for at least 90 seconds.
- (c) Check that the connectors are properly connected to the center airbag sensor assembly and combination meter.

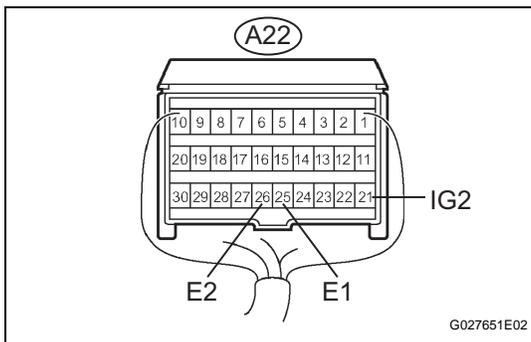
**OK:**  
The connectors are connected.

**NG** **CONNECT CONNECTORS, THEN GO TO STEP 1**

**OK**

**RS**

**3 CHECK WIRE HARNESS (SOURCE VOLTAGE OF CENTER AIRBAG SENSOR ASSEMBLY)**



- (a) Disconnect the connectors from the center airbag sensor assembly.
- (b) Connect the negative (-) terminal cable to the battery, and wait for at least 2 seconds.
- (c) Turn the ignition switch to the ON position.
- (d) Operate all components of the electrical system (defogger, wipers, headlight, heater blower, etc.).
- (e) Measure the voltage according to the value(s) in the table below.

**Voltage**

Tester connection	Condition	Specified condition
A22-21 (IG2) - Body ground	Ignition switch ON	10 to 14 V

- (f) Turn the ignition switch to the LOCK position.
- (g) Measure the resistance according to the value(s) in the table below.

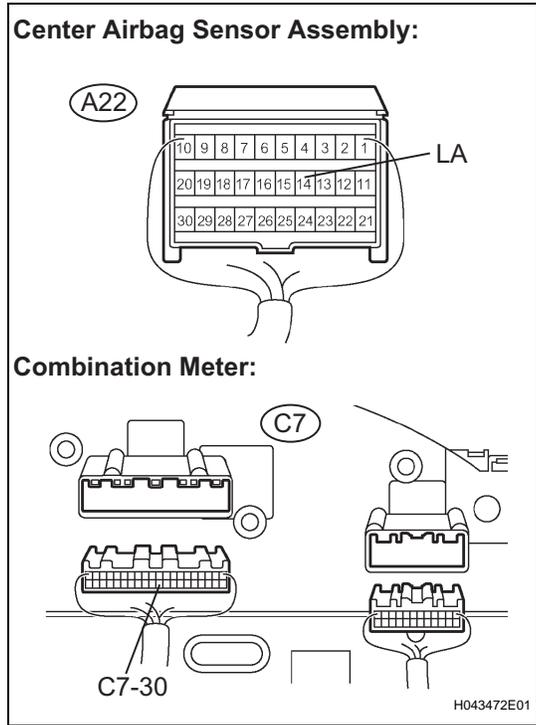
**Resistance**

Tester connection	Condition	Specified condition
A22-25 (E1) - Body ground	Always	Below 1 Ω
A22-26 (E2) - Body ground	Always	Below 1 Ω

**NG** REPAIR OR REPLACE WIRE HARNESS

**OK**

**4 CHECK WIRE HARNESS (CENTER AIRBAG SENSOR ASSEMBLY - COMBINATION METER)**



- (a) Disconnect the negative (-) terminal cable from the battery, and wait for at least 90 seconds.
- (b) Disconnect the connectors from the combination meter.
- (c) Measure the resistance according to the value(s) in the table below.

**Resistance**

Tester connection	Condition	Specified condition
A22-14 (LA) - C7-30	Always	Below 1 Ω
A22-14 (LA) - Body ground	Always	1 MΩ or higher

- (d) Connect the negative (-) terminal cable to the battery, and wait for at least 2 seconds.
- (e) Turn the ignition switch to the ON position.

**Voltage**

Tester connection	Condition	Specified condition
A22-14 (LA) - Body ground	Ignition switch ON	Below 1 V

**NG** REPAIR OR REPLACE WIRE HARNESS

**RS**

**OK**

**5 CHECK COMBINATION METER**

- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery, and wait for at least 90 seconds.
- (c) Connect the connector to the combination meter.
- (d) Connect the negative (-) terminal cable to the battery, and wait for at least 2 seconds.
- (e) Turn the ignition switch to the ON position.
- (f) Measure the voltage according to the value(s) in the table below.

**Voltage**

Tester connection	Condition	Specified condition
A22-14 (LA) - Body ground	Ignition switch ON	8 to 14 V

**NG** REPLACE COMBINATION METER

**OK**

**REPLACE CENTER AIRBAG SENSOR ASSEMBLY**

## SRS Warning Light does not Come ON

### DESCRIPTION

Refer to "SRS Warning Light Remains ON" (See page [RS-170](#)).

### WIRING DIAGRAM

Refer to "SRS Warning Light Remains ON" (See page [RS-170](#)).

#### 1 CHECK BATTERY

- (a) Measure the voltage of the battery.

**Voltage:**  
11 to 14 V

NG

**CHECK AND REPLACE BATTERY OR CHARGING SYSTEM**

OK

#### 2 CHECK COMBINATION METER

- (a) Connect the negative (-) terminal cable to the battery, and wait for at least 2 seconds.  
(b) Turn the ignition switch to the ON position.  
(c) Check the SRS warning light operation.

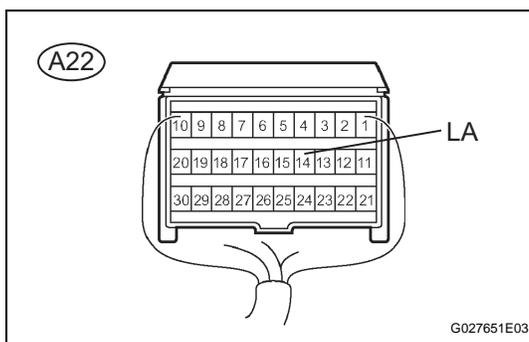
**OK:**  
The SRS warning light does not come on.

NG

**REPLACE CENTER AIRBAG SENSOR ASSEMBLY**

OK

#### 3 CHECK WIRE HARNESS (COMBINATION METER - CENTER AIRBAG SENSOR ASSEMBLY)



- (a) Turn the ignition switch to the LOCK position.  
(b) Disconnect the negative (-) terminal cable from the battery, and wait for at least 90 seconds.  
(c) Disconnect the connector from the combination meter.  
(d) Connect the negative (-) terminal cable to the battery, and wait for at least 2 seconds.  
(e) Measure the voltage according to the value(s) in the table below.

**Voltage**

Tester connection	Condition	Specified condition
A22-14 (LA) - Body ground	Ignition switch ON	Below 1 V

NG

**REPAIR OR REPLACE WIRE HARNESS**

OK

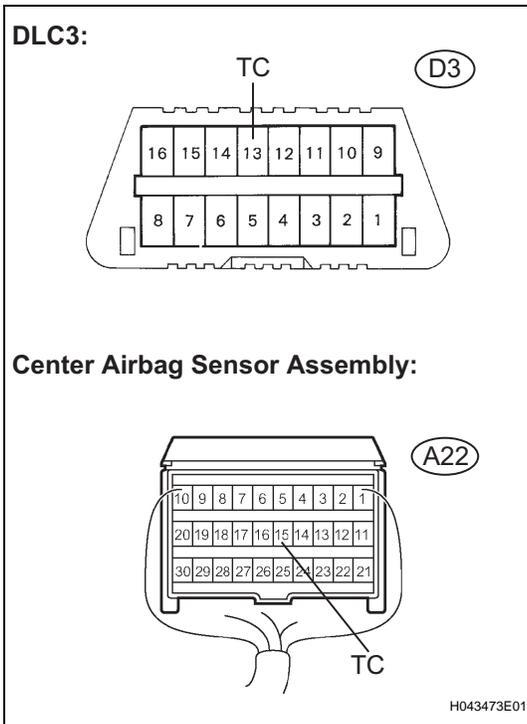
REPLACE COMBINATION METER



**HINT:**

When each warning light keeps blinking, a ground short in the wiring of terminal TC of the DLC3 or an internal ground short in each ECU is suspected.

**1 WIRE HARNESS (DLC3 - CENTER AIRBAG SENSOR ASSEMBLY)**



(a) Measure the resistance according to the value(s) in the table below.

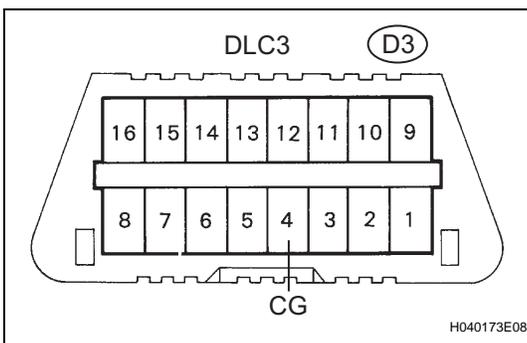
**Resistance**

Tester connection	Condition	Specified condition
D3-13 (TC) - A22-15 (TC)	Always	Below 1 Ω

**NG** → **REPAIR OR REPLACE WIRE HARNESS (TC of DLC3 - TC of CENTER AIRBAG SENSOR ASSEMBLY)**

**OK**

**2 CHECK WIRE HARNESS (CG of DLC3 - BODY GROUND)**



(a) Measure the resistance according to the value(s) in the table below.

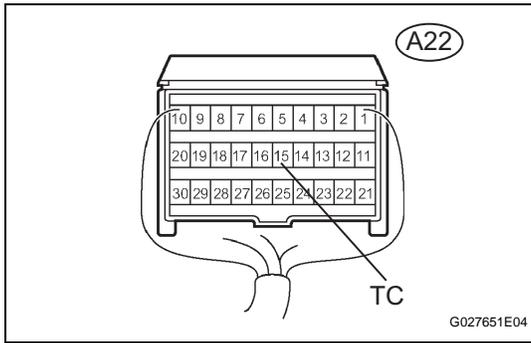
**Resistance**

Tester connection	Condition	Specified condition
D3-4 (CG) - Body ground	Always	Below 1 Ω

**NG** → **REPAIR OR REPLACE WIRE HARNESS (CG of DLC3 - BODY GROUND)**

**OK**

**3 CHECK WIRE HARNESS (TC of CENTER AIRBAG SENSOR ASSEMBLY - BODY GROUND)**



(a) Measure the resistance according to the value(s) in the table below.

**Resistance**

Tester connection	Condition	Specified condition
A22-15 (TC) - Body ground	Always	1 MΩ or higher

**NG**

**REPAIR OR REPLACE WIRE HARNESS OR EACH ECU**

**OK**

**REPLACE CENTER AIRBAG SENSOR ASSEMBLY**

Terminal No.	Terminal Symbol	Destination
A22-13	PBEW	Clock assembly (Passenger seat belt warning light)
A22-14	LA	Combination meter assembly (SRS warning light)
A22-15	TC	DLC3
A22-16	SIL	DLC3
A22-17	P-AB	Clock assembly (Passenger airbag ON/OFF indicator)
A22-21	IG2	IG2 Fuse (Power Source)
A22-22	GSW2	ECM
A22-23	PAON	Clock assembly (Passenger airbag ON/OFF indicator)
A22-25	E1	Ground
A22-26	E2	Ground
A22-27	-SR	Front airbag sensor RH
A22-28	-SL	Front airbag sensor LH
A22-29	+SR	Front airbag sensor RH
A22-30	+SL	Front airbag sensor LH
A23-3	PP-	Front seat outer belt RH (Front passenger side front pretensioner squib)
A23-4	PP+	Front seat outer belt RH (Front passenger side front pretensioner squib)
A23-5 (*1)	ICP+	Curtain shield airbag assembly RH (Front passenger side curtain shield squib)
A23-6 (*1)	ICP-	Curtain shield airbag assembly RH (Front passenger side curtain shield squib)
A23-7	SFP-	Front seat airbag assembly RH (Front passenger side - side squib)
A23-8	SFP+	Front seat airbag assembly RH (Front passenger side - side squib)
A23-16	FSP+	Occupant classification ECU
A23-19 (*1)	ESCP	Rear airbag sensor RH
A23-20	ESP	Side airbag sensor assembly RH
A23-21 (*1)	VUCP	Rear airbag sensor RH
A23-22	VUPP	Side airbag sensor assembly RH
A23-24	FSP-	Occupant classification ECU

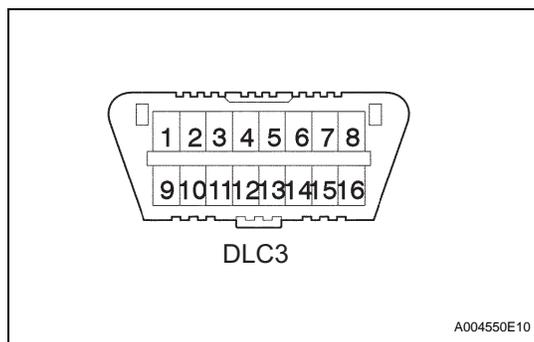
RS

\*1: w/ Curtain Shield Airbag

## DIAGNOSIS SYSTEM

### 1. CHECK DLC3

- (a) The vehicle's ECM uses CAN and conforms to ISO 14230 and ISO 9141-2 for communication protocol. The terminal arrangement of the DLC3 complies with ISO J15031-3 and meets the ISO 14230 and ISO 9141-2 format.



Symbols (Terminals No.)	Terminal Description	Condition	Specified condition
SIL (7) - SG (5)	Bus "+" line	During transmission	Pulse generation
CG (4) - Body ground	Chassis ground	Always	Below 1 $\Omega$
SG (5) - Body ground	Signal ground	Always	Below 1 $\Omega$
BAT (16) - Body ground	Battery positive	Always	11 to 14 V
CANH (6) - CANL (14)	HIGH-level CAN bus line	Ignition switch OFF	54 to 67 $\Omega$
CANH (6) - Battery positive	HIGH-level CAN bus line	Ignition switch OFF	1 M $\Omega$ or higher

Symbols (Terminals No.)	Terminal Description	Condition	Specified condition
CANH (6) - CG (4)	HIGH-level CAN bus line	Ignition switch OFF	3 MΩ or higher
CANL (14) - Battery positive	LOW-level CAN bus line	Ignition switch OFF	1 MΩ or higher
CANL (14) - CG (4)	LOW-level CAN bus line	Ignition switch OFF	3 MΩ or higher

**HINT:**

If the display shows a communication error message when connecting the cable of the intelligent tester to the DLC3, turning the ignition switch to the ON position and operating the intelligent tester, there is a problem on the vehicle side or tool side.

- If communication is normal when the tool is connected to another vehicle, inspect the DLC3 on the original vehicle.
- If communication is still not possible when the tool is connected to another vehicle, the problem is probably in the tool itself. Consult the Service Department listed in the tool's instruction manual.

**2. SYMPTOM SIMULATION**

**HINT:**

The most difficult case in troubleshooting is when no symptoms occur. In such cases, a thorough customer problem analysis must be carried out. Then the same or similar conditions and environment in which the problem occurred in the customer's vehicle should be simulated. No matter how experienced or skilled a technician may be, if he proceeds to troubleshoot without confirming the problem symptoms, he will likely overlook something important and make a wrong guess at some points in the repair operation.

**RS**

This leads to a standstill in troubleshooting.

(a) **Vibration method:**

When vibration seems to be the major cause.

**HINT:**

Perform the simulation method only during the primary check period (for approximately 6 seconds after the ignition switch is turned to the ON position).

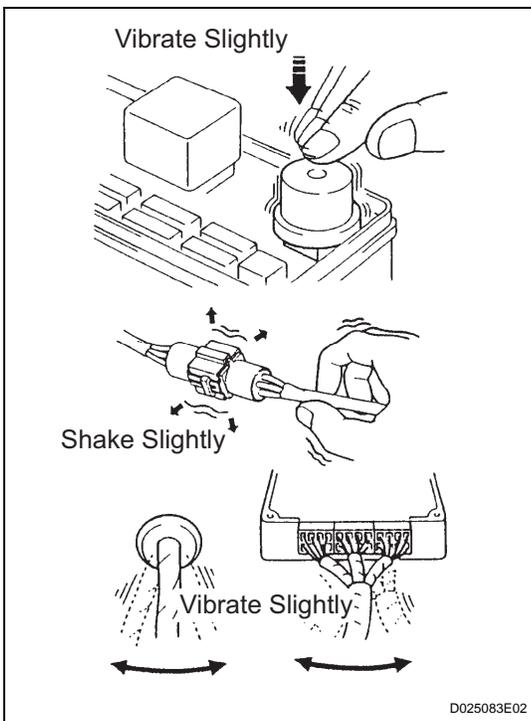
- (1) Slightly vibrate the part of the sensor considered to be the problem cause with your fingers and check whether the malfunction occurs.

**HINT:**

Shaking the relays too strongly may result in open relays.

- (2) Slightly shake the connector vertically and horizontally.
- (3) Slightly shake the wire harness vertically and horizontally.

The connector joint and fulcrum of the vibration are the major areas to be checked thoroughly.



- (b) Simulation method for DTC B1795:  
Turn the ignition switch from the LOCK to ON, hold for 10 seconds, and back to LOCK again 50 times in a row.

HINT:

DTC B1795 is output if the occupant classification ECU receives the ignition switch LOCK-ON-LOCK signal 50 times in a row when a malfunction occurs in the power circuit for the occupant classification system.

### 3. FUNCTION OF SRS WARNING LIGHT

- (a) Primary check.

- (1) Turn the ignition switch to the LOCK position.

Wait for at least 2 seconds, then turn the ignition switch to the ON position. The SRS warning light comes on for approximately 6 seconds and the diagnosis of the airbag system (including the seat belt pretensioners) is performed.

HINT:

If trouble is detected during the primary check, the SRS warning light remains on even after the primary check period (for approximately 6 seconds) has elapsed.

- (b) Constant check.

- (1) After the primary check, the center airbag sensor assembly constantly monitors the airbag system for trouble.

HINT:

If trouble is detected during the constant check, the center airbag sensor assembly functions as follows:

- The SRS warning light comes on.
- The SRS warning light goes off, and then comes on. This blinking pattern indicates a source voltage drop. The SRS warning light goes off 10 seconds after the source voltage returns to normal.

- (c) Review.

- (1) When the airbag system is normal:

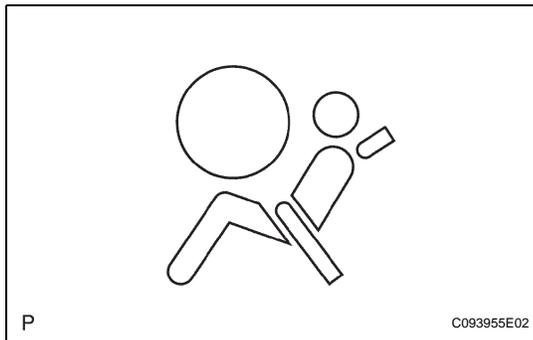
The SRS warning light comes on only during the primary check period (for approximately 6 seconds after the ignition switch is turned to the ON position).

- (2) When the airbag system has trouble:

- The SRS warning light remains on even after the primary check period has elapsed.
- The SRS warning light goes off after the primary check, but comes on again during the constant check.
- The SRS warning light does not come on when turning the ignition switch from LOCK to ON position.

**HINT:**

The center airbag sensor assembly keeps the SRS warning light on if the airbag has been deployed.

**4. SRS WARNING LIGHT CHECK**

- (a) Turn the ignition switch to the ON position, and check that the SRS warning light comes on for approximately 6 seconds (primary check).
- (b) Check that the SRS warning light goes off approximately 6 seconds after the ignition switch is turned to the ON position (constant check).

**HINT:**

When any of the following symptoms occur, refer to the "Problem Symptoms Table" (See page RS-28).

- The SRS warning light comes on occasionally, after the primary check period has elapsed.
- The SRS warning light comes on, but a DTC is not output.
- The ignition switch is turned from LOCK to ON position, but the SRS warning light does not come on.

**5. ACTIVATION PREVENTION MECHANISM****(a) FUNCTION OF ACTIVATION PREVENTION MECHANISM**

- (1) An activation prevention mechanism is built into the connector (on the center airbag sensor assembly side) of the airbag system squib circuit to prevent accidental airbag activation.
- (2) This mechanism closes the circuit when the connector is disconnected by bringing the short spring into contact with the terminals and shutting off external electricity of prevent accidental airbag activation.

**(b) RELEASE METHOD OF ACTIVATION PREVENTION MECHANISM**

- (1) To release the activation prevention mechanism, insert a piece of paper with the same thickness as the male terminal (approximately 0.5 mm (0.020 in.)) between the terminals and the short spring to break the connection.
- (2) Refer to the illustrations on the next 2 pages concerning connectors utilizing the activation prevention mechanism and its release method.

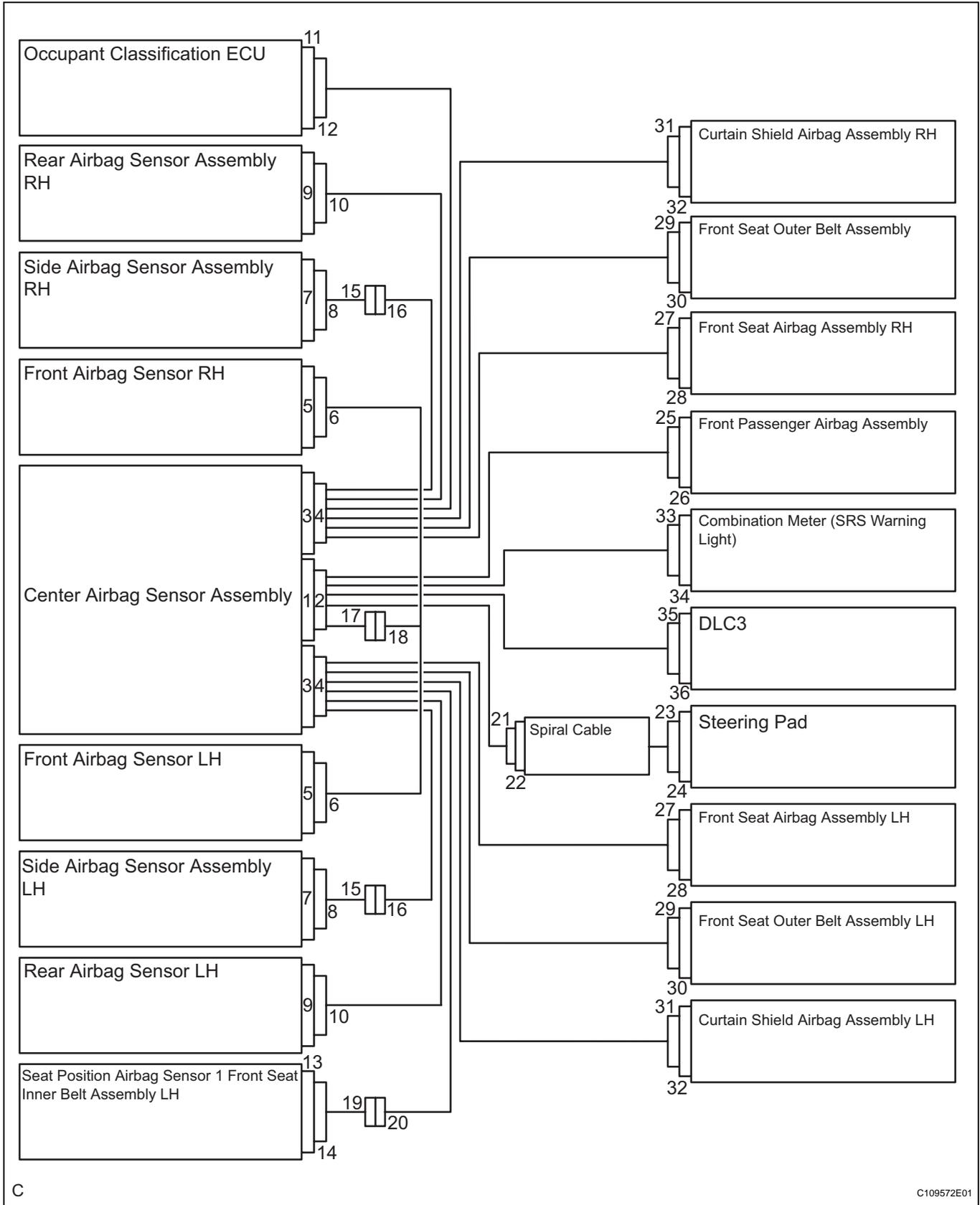
**CAUTION:**

**Never release the activation prevention mechanism on the squib connector even when inspecting with the squib disconnected.**

**NOTICE:**

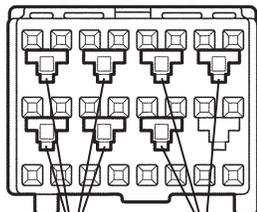
- **Do not release the activation prevention mechanism unless specially directed by the troubleshooting procedure.**

- To prevent the terminal and the short spring from being damaged, always use a piece of paper of the same thickness as the male terminal.



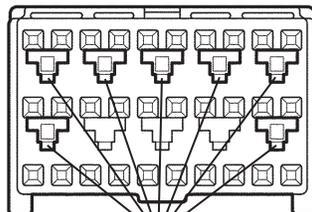
Center Airbag Sensor Assembly Connector

Connector "4"



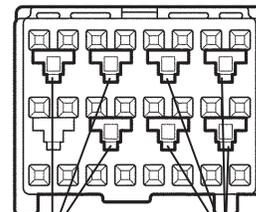
Short Spring Short Spring

Connector "2"



Short Spring

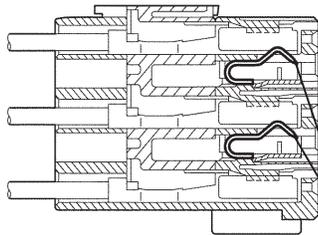
Connector "4"



Short Spring Short Spring

Before Release

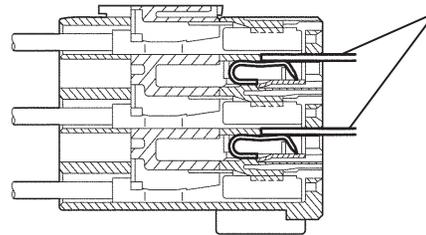
Paper



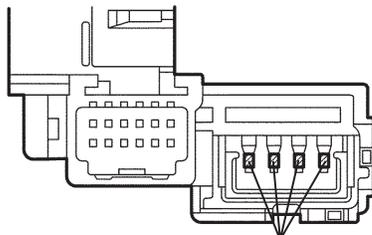
Short Spring

After Release

Paper

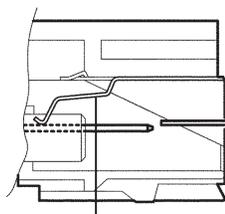


Connector "22"



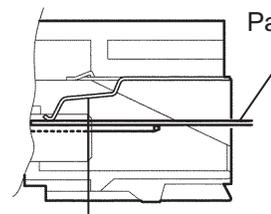
Short Spring

Before Release



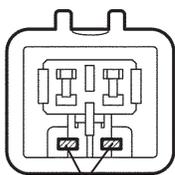
Short Spring

After Release



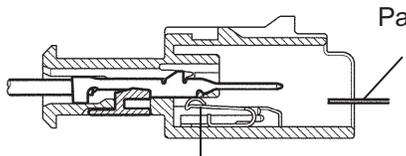
Short Spring

Connector "26"



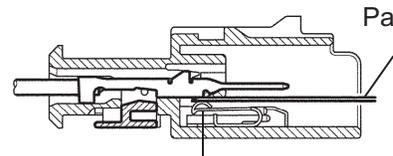
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Before Release



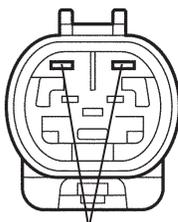
Short Spring

After Release



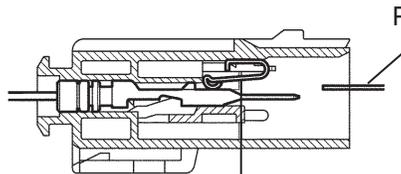
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Connector "30"



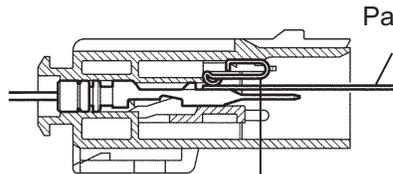
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Before Release



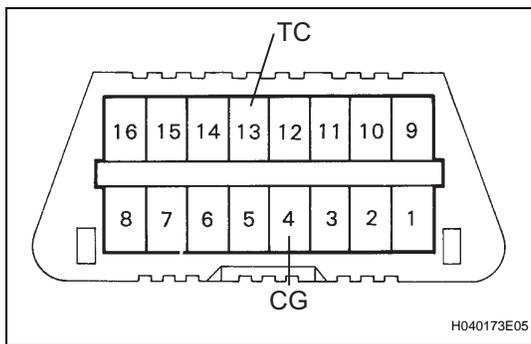
Short Spring

After Release



Short Spring

RS



## DTC CHECK / CLEAR

### 1. DTC CHECK (USING SST CHECK WIRE)

#### (a) Check the DTCs (Present trouble code).

- (1) Turn the ignition switch to the ON position, and wait for approximately 60 seconds.
- (2) Using SST, connect terminals TC and CG of the DLC3.

**SST 09843-18040**

**NOTICE:**

**Connect the terminals to the correct positions to avoid a malfunction.**

#### (b) Check the DTCs (Past trouble code).

- (1) Using SST, connect terminals TC and CG of the DLC3.

**SST 09843-18040**

**NOTICE:**

**Connect the terminals to the correct positions to avoid a malfunction.**

- (2) Turn the ignition switch to the ON position, and wait for approximately 60 seconds.

#### (c) Read the DTCs.

- (1) Read the blinking patterns of the DTCs. As examples, the blinking patterns for the normal system code and trouble codes 11 and 31 are shown in the illustration to the left.

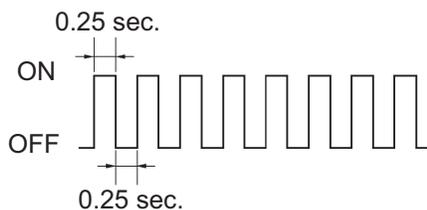
- Normal system code indication (w/o past trouble code)  
The light blinks twice per second.
- Normal system code indication (w/ past trouble code)  
When the past trouble code is stored in the center airbag sensor assembly, the light blinks only once per second.
- Trouble code indication  
The first blinking indicates the first DTC. The second blinking occurs after a 1.5-second pause.

If there are more than 1 code, there will be a 2.5-second pause between each code. After all codes are shown, there will be a 4.0-second pause, and they all will be repeated.

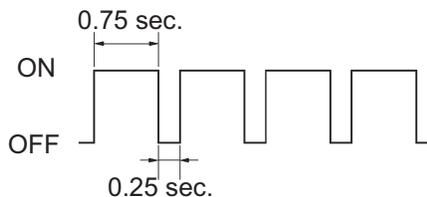
**HINT:**

- If 2 or more malfunctions are found, the indication begins with the smaller numbered code.
- If DTCs are indicated without connecting the terminals, proceed to the "TC and CG Terminal Circuit" (See page [RS-176](#)).

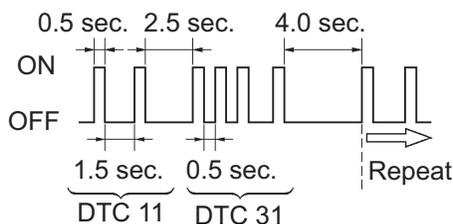
#### Normal System Code (w/o Past Trouble Code)



#### Normal System Code (w/ Past Trouble Code)



#### Trouble Code (Example Codes 11 and 31)



N

H013050E02

**2. DTC CLEAR (USING SST CHECK WIRE)**

(a) Clear the DTCs.

(1) When the ignition switch is turned to LOCK position, the DTCs are cleared.

HINT:

Depending on the DTC, the code may not be cleared by turning off the ignition switch. In this case, proceed to the next procedure.

(2) Using SST, connect terminals TC and CG of the DLC3, and then turn the ignition switch to the ON position.

**SST 09843-18040**

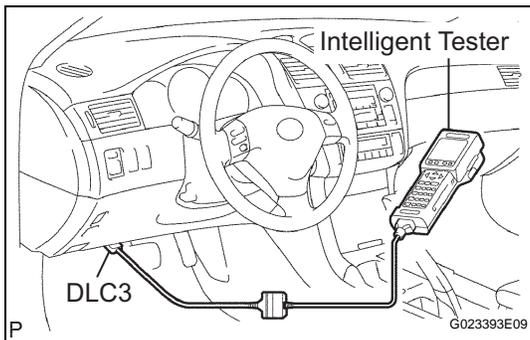
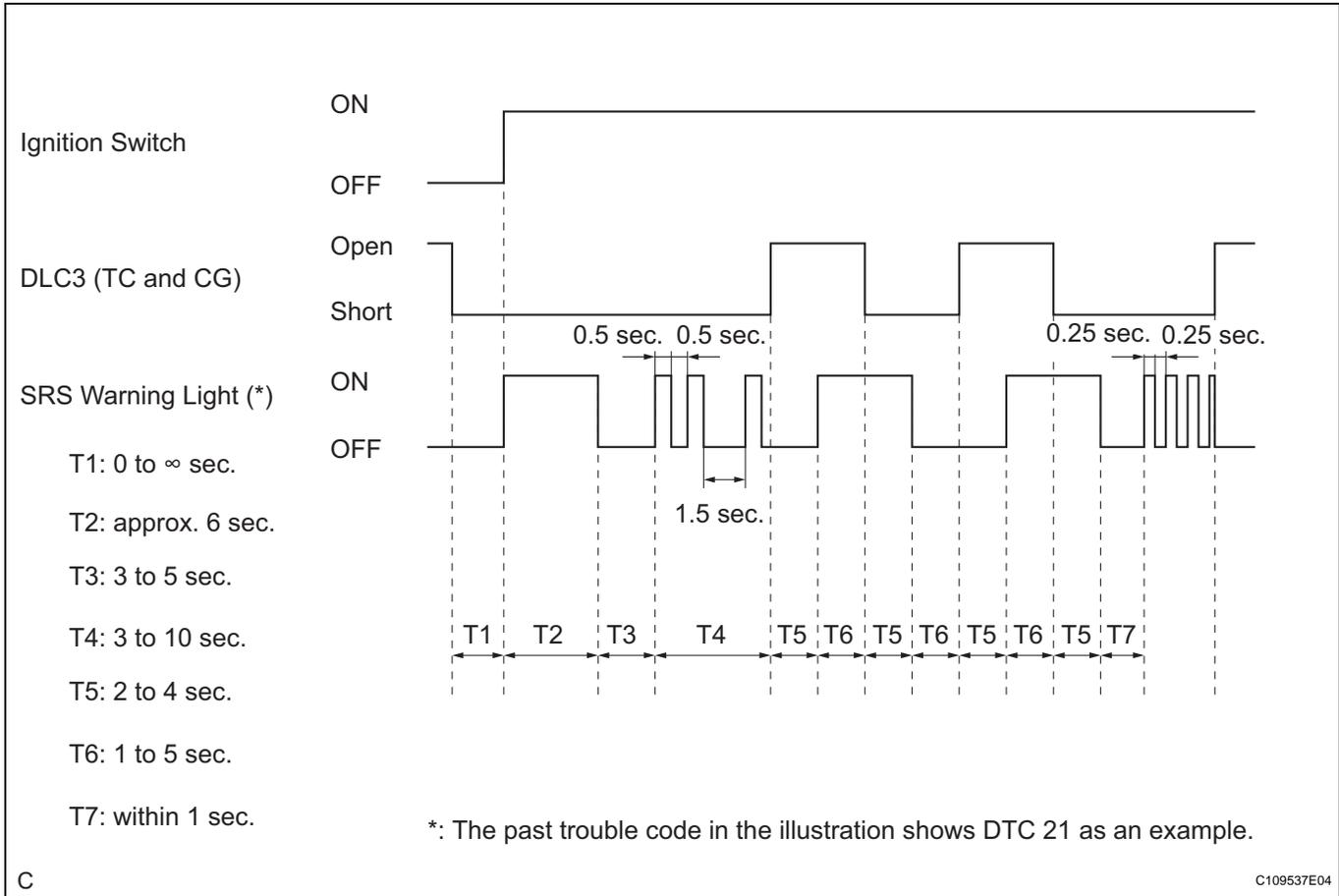
(3) Disconnect terminal TC of the DLC3 within 3 to 10 seconds after the DTCs are output, and check if the SRS warning light comes on after 3 seconds.

(4) Within 2 to 4 seconds after the SRS warning light comes on, connect terminals TC and CG of the DLC3.

(5) The SRS warning light should go off within 2 to 4 seconds after connecting terminals TC and CG of the DLC3. Then, disconnect terminal TC within 2 to 4 seconds after the SRS warning light goes off.

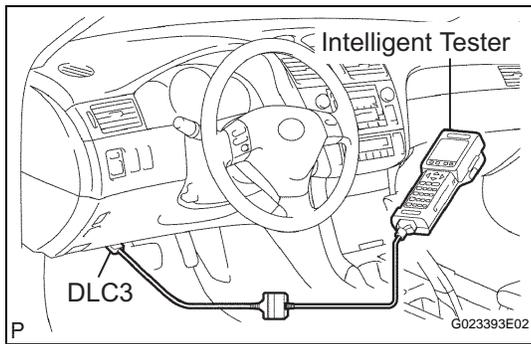
(6) The SRS warning light comes on again within 2 to 4 seconds after disconnecting terminal TC. Then, reconnect terminals TC and CG within 2 to 4 seconds after the SRS warning light comes on, connect terminals TC and CG of the DLC3.

- (7) Check if the SRS warning light goes off within 2 to 4 seconds after connecting terminals TC and CG of the DLC3. Also check if the normal system code is output within 1 second after the SRS warning light goes off.  
If DTCs are not cleared, repeat this procedure until the codes are cleared.



### 3. DTC CHECK

- (a) Check the DTCs.
- (1) Connect the intelligent tester to the DLC3.
  - (2) Turn the ignition switch to the ON position.
  - (3) Check the DTCs by following the prompts on the tester screen.
- HINT:  
Refer to the intelligent tester operator's manual for further details.
- (b) Clear the DTCs.
- (1) Connect the intelligent tester to the DLC3.
  - (2) Turn the ignition switch to the ON position.
  - (3) Clear the DTCs by following the prompts on the tester screen.
- HINT:  
Refer to the intelligent tester operator's manual for further details.



## CHECK MODE PROCEDURE

### 1. CHECK MODE (SIGNAL CHECK): DTC CHECK

- (a) Connect the intelligent tester to the DLC3.
- (b) Turn the ignition switch to the ON position.
- (c) Select the "SIGNAL CHECK", and proceed checking with the intelligent tester.

#### NOTICE:

Select the "SIGNAL CHECK" from the "DTC CHECK" screen displayed on the intelligent tester to clear the output DTCs (both present and past).

#### HINT:

- DTCs can be detected more sensitivity in check mode than in normal diagnosis mode.
- Perform check mode inspection when a malfunction in each squib circuit is suspected even after the normal system code is output through normal diagnosis mode inspection.

## DATA LIST / ACTIVE TEST

### HINT:

By accessing the DATA LIST displayed on the intelligent tester, you can perform such functions as reading the values of switches and sensors without removing any parts. Reading the DATA LIST is the first step of troubleshooting and is one method to shorten labor time.

### 1. DATA LIST FOR CENTER AIRBAG SENSOR ASSEMBLY

- (a) Connect the intelligent tester to the DLC3.
- (b) Turn the ignition switch to the ON position.
- (c) Following the display on the tester screen, read the "DATA LIST".

Item	Measurement Item/ Range (Display)	Normal Condition	Diagnostic Note
D SEAT POSITION	Seat position (Driver side)/ FORWARD: Seat position is forward BKWARD: Seat position is rearward FAIL: Failure detected	FORWARD/BKWARD/FAIL	-
PASSENGER CLASS	Passenger classification/ NG: Data is not determined OFF: Vacant CHILD: Child (Less than 36 kg (79.37 lb)) is seated AF05: Adult (36 to 54 kg (79.37 to 119.05 lb)) is seated AM50: Adult (More than 54 kg (119.05 lb)) is seated FAIL: Failure detected	NG/OFF/CHILD/AF05/AM50/ FAIL	-
D BUCKLE SW	Buckle switch (Driver side)/ UNSET: The seat belt is not fastened SET: The seat belt is fastened NG: Data is not determined	UNSET/SET/NG	-
P BUCKLE SW	Buckle switch (Passenger side)/ UNSET: The seat belt is not fastened SET: The seat belt is fastened NG: Data is not determined	UNSET/SET/NG	-
DISPLAY TYPE	Display type identification information/ LR: The display is indicated by LH/RH DP: The display is indicated by Driver/Passenger	DP	-
#CODES	Number of past DTC recorded/ Min.: 0, Max.: 255	0	-

## DIAGNOSTIC TROUBLE CODE CHART

If a trouble code is displayed during the DTC check, check the circuit listed from the code in the table below (refer to the appropriate page).

**HINT:**

- When the SRS warning light remains on and the DTC output is the normal system code, a voltage source drop is likely to occur. This malfunction is not stored in the memory by the center airbag sensor assembly. If the power source voltage returns to normal, the SRS warning light will automatically go off.
- When 2 or more codes are indicated, the code with the lower number appears first.
- If a code is not listed on the display chart, the center airbag sensor may have failed.
- In case of any malfunction concerning an open circuit, short to ground, or short to B+ due to a squib, other trouble codes may not be detected. In this case, repair the malfunction currently indicated and then perform malfunction diagnosis again.
- Mark in the check mode column:  
\*1: DTC is not corresponding to the check mode.  
\*2: DTC is corresponding to the check mode.

### AIRBAG SYSTEM

DTC No.	Detection Item	Trouble Area	Check Mode	See page
B1000/31	Center Airbag Sensor Assembly Malfunction	1. Center airbag sensor assembly	*1	RS-45
B1610/13	Front Airbag Sensor RH Circuit Malfunction	1. Instrument panel wire 2. Engine room main wire 3. Front airbag sensor RH 4. Center airbag sensor assembly	*1	RS-46
B1615/14	Front Airbag Sensor LH Circuit Malfunction	1. Instrument panel wire 2. Engine room main wire 3. Front airbag sensor LH 4. Center airbag sensor assembly	*1	RS-55
B1620/21	Driver Side - Side Airbag Sensor Assembly Circuit Malfunction	1. Floor wire 2. Front door wire LH 3. Side airbag sensor assembly LH 4. Center airbag sensor assembly	*1	RS-64
B1625/22	Front Passenger Side - Side Airbag Sensor Assembly Circuit Malfunction	1. Floor wire No.2 2. Front door wire RH 3. Side airbag sensor assembly RH 4. Center airbag sensor assembly	*1	RS-73
B1630/23	Driver Side Rear Airbag Sensor Circuit Malfunction	1. Floor wire 2. Rear airbag sensor LH 3. Center airbag sensor assembly	*1	RS-82
B1635/24	Front Passenger Side Rear Airbag Sensor Circuit Malfunction	1. Floor wire No.2 2. Rear airbag sensor RH 3. Center airbag sensor assembly	*1	RS-87
B1650/32	Occupant Classification System Malfunction	1. Floor wire No.2 2. Occupant classification system 3. Center airbag sensor assembly	*1	RS-92
B1653/35	Seat Position Airbag Sensor Circuit Malfunction	1. Floor wire 2. Seat position airbag sensor 3. Center airbag sensor assembly	*1	RS-97
B1655/37	Driver Side Seat Belt Buckle Switch Circuit Malfunction	1. Floor wire 2. Front seat inner belt assembly LH 3. Center airbag sensor assembly	*1	RS-103

**RS**

DTC No.	Detection Item	Trouble Area	Check Mode	See page
B1660/43	Passenger Airbag ON / OFF Indicator Circuit Malfunction	1. Instrument panel wire 2. Clock assembly 3. Center airbag sensor assembly	*1	RS-109
B1800/51	Short in Driver Side Squib Circuit	1. Instrument panel wire 2. Spiral cable 3. Steering pad (Driver side squib) 4. Center airbag sensor assembly	*2	RS-116
B1801/51	Open in Driver Side Squib Circuit	1. Instrument panel wire 2. Spiral cable 3. Steering pad (Driver side squib) 4. Center airbag sensor assembly	*2	RS-116
B1802/51	Short to GND in Driver Side Squib Circuit	1. Instrument panel wire 2. Spiral cable 3. Steering pad (Driver side squib) 4. Center airbag sensor assembly	*2	RS-116
B1803/51	Short to B+ in Driver Side Squib Circuit	1. Instrument panel wire 2. Spiral cable 3. Steering pad (Driver side squib) 4. Center airbag sensor assembly	*2	RS-116
B1805/52	Short in Front Passenger Side Squib Circuit	1. Instrument panel wire 2. Instrument panel wire assembly 3. Front passenger airbag assembly (Front passenger side squib) 4. Center airbag sensor assembly	*2	RS-123
B1806/52	Open in Front Passenger Side Squib Circuit	1. Instrument panel wire 2. Instrument panel wire assembly 3. Front passenger airbag assembly (Front passenger side squib) 4. Center airbag sensor assembly	*2	RS-123
B1807/52	Short to GND in Front Passenger Side Squib Circuit	1. Instrument panel wire 2. Instrument panel wire assembly 3. Front passenger airbag assembly (Front passenger side squib) 4. Center airbag sensor assembly	*2	RS-123
B1808/52	Short to B+ in Front Passenger Side Squib Circuit	1. Instrument panel wire 2. Instrument panel wire assembly 3. Front passenger airbag assembly (Front passenger side squib) 4. Center airbag sensor assembly	*2	RS-123
B1810/53	Short in Driver Side Squib 2nd Step Circuit	1. Instrument panel wire 2. Spiral cable 3. Steering pad (Driver side squib 2nd step) 4. Center airbag sensor assembly	*2	RS-128
B1811/53	Open in Driver Side Squib 2nd Step Circuit	1. Instrument panel wire 2. Spiral cable 3. Steering pad (Driver side squib 2nd step) 4. Center airbag sensor assembly	*2	RS-128
B1812/53	Short to GND in Driver Side Squib 2nd Step Circuit	1. Instrument panel wire 2. Spiral cable 3. Steering pad (Driver side squib 2nd step) 4. Center airbag sensor assembly	*2	RS-128
B1813/53	Short to B+ in Driver Side Squib 2nd Step Circuit	1. Instrument panel wire 2. Spiral cable 3. Steering pad (Driver side squib 2nd step) 4. Center airbag sensor assembly	*2	RS-128
B1815/54	Short in Front Passenger Side Squib 2nd Step Circuit	1. Instrument panel wire 2. Instrument panel wire assembly 3. Front passenger airbag assembly (Front passenger side squib 2nd step) 4. Center airbag sensor assembly	*2	RS-135

DTC No.	Detection Item	Trouble Area	Check Mode	See page
B1816/54	Open in Front Passenger Side Squib 2nd Step Circuit	1. Instrument panel wire 2. Instrument panel wire assembly 3. Front passenger airbag assembly (Front passenger side squib 2nd step) 4. Center airbag sensor assembly	*2	RS-135
B1817/54	Short to GND in Front Passenger Side Squib 2nd Step Circuit	1. Instrument panel wire 2. Instrument panel wire assembly 3. Front passenger airbag assembly (Front passenger side squib 2nd step) 4. Center airbag sensor assembly	*2	RS-135
B1818/54	Short to B+ in Front Passenger Side Squib 2nd Step Circuit	1. Instrument panel wire 2. Instrument panel wire assembly 3. Front passenger airbag assembly (Front passenger side squib 2nd step) 4. Center airbag sensor assembly	*2	RS-135
B1820/55	Short in Driver Side - Side Squib Circuit	1. Floor wire 2. Front seat airbag assembly LH (Driver side - side squib) 3. Center airbag sensor assembly	*2	RS-140
B1821/55	Open in Driver Side - Side Squib Circuit	1. Floor wire 2. Front seat airbag assembly LH (Driver side - side squib) 3. Center airbag sensor assembly	*2	RS-140
B1822/55	Short to GND in Driver Side - Side Squib Circuit	1. Floor wire 2. Front seat airbag assembly LH (Driver side - side squib) 3. Center airbag sensor assembly	*2	RS-140
B1823/55	Short to B+ in Driver Side - Side Squib Circuit	1. Floor wire 2. Front seat airbag assembly LH (Driver side - side squib) 3. Center airbag sensor assembly	*2	RS-140
B1825/56	Short in Front Passenger Side - Side Squib Circuit	1. Floor wire No.2 2. Front seat airbag assembly RH (Front passenger side - side squib) 3. Center airbag sensor assembly	*2	RS-145
B1826/56	Open in Front Passenger Side - Side Squib Circuit	1. Floor wire No.2 2. Front seat airbag assembly RH (Front passenger side - side squib) 3. Center airbag sensor assembly	*2	RS-145
B1827/56	Short to GND in Front Passenger Side - Side Squib Circuit	1. Floor wire No.2 2. Front seat airbag assembly RH (Front passenger side - side squib) 3. Center airbag sensor assembly	*2	RS-145
B1828/56	Short to B+ in Front Passenger Side - Side Squib Circuit	1. Floor wire No.2 2. Front seat airbag assembly RH (Front passenger side - side squib) 3. Center airbag sensor assembly	*2	RS-145
B1830/57	Short in Driver Side Curtain Shield Squib Circuit	1. Floor wire 2. Curtain shield airbag assembly LH (Driver side curtain shield squib) 3. Center airbag sensor assembly	*2	RS-150
B1831/57	Open in Driver Side Curtain Shield Squib Circuit	1. Floor wire 2. Curtain shield airbag assembly LH (Driver side curtain shield squib) 3. Center airbag sensor assembly	*2	RS-150
B1832/57	Short to GND in Driver Side Curtain Shield Squib Circuit	1. Floor wire 2. Curtain shield airbag assembly LH (Driver side curtain shield squib) 3. Center airbag sensor assembly	*2	RS-150
B1833/57	Short to B+ in Driver Side Curtain Shield Squib Circuit	1. Floor wire 2. Curtain shield airbag assembly LH (Driver side curtain shield squib) 3. Center airbag sensor assembly	*2	RS-150

RS

DTC No.	Detection Item	Trouble Area	Check Mode	See page
B1835/58	Short in Front Passenger Side Curtain Shield Squib Circuit	1. Floor wire No.2 2. Curtain shield airbag assembly RH (Front passenger side curtain shield squib) 3. Center airbag sensor assembly	*2	RS-155
B1836/58	Open in Front Passenger Side Curtain Shield Squib Circuit	1. Floor wire No.2 2. Curtain shield airbag assembly RH (Front passenger side curtain shield squib) 3. Center airbag sensor assembly	*2	RS-155
B1837/58	Short to GND in Front Passenger Side Curtain Shield Squib Circuit	1. Floor wire No.2 2. Curtain shield airbag assembly RH (Front passenger side curtain shield squib) 3. Center airbag sensor assembly	*2	RS-155
B1838/58	Short to B+ in Front Passenger Side Curtain Shield Squib Circuit	1. Floor wire No.2 2. Curtain shield airbag assembly RH (Front passenger side curtain shield squib) 3. Center airbag sensor assembly	*2	RS-155
B1900/73	Short in Driver Side Front Pretensioner Squib Circuit	1. Floor wire 2. Front seat outer belt assembly LH (Driver side front pretensioner squib) 3. Center airbag sensor assembly	*2	RS-160
B1901/73	Open in Driver Side Front Pretensioner Squib Circuit	1. Floor wire 2. Front seat outer belt assembly LH (Driver side front pretensioner squib) 3. Center airbag sensor assembly	*2	RS-160
B1902/73	Short to GND in Driver Side Front Pretensioner Squib Circuit	1. Floor wire 2. Front seat outer belt assembly LH (Driver side front pretensioner squib) 3. Center airbag sensor assembly	*2	RS-160
B1903/73	Short to B+ in Driver Side Front Pretensioner Squib Circuit	1. Floor wire 2. Front seat outer belt assembly LH (Driver side front pretensioner squib) 3. Center airbag sensor assembly	*2	RS-160
B1905/74	Short in Front Passenger Side Front Pretensioner Squib Circuit	1. Floor wire No.2 2. Front seat outer belt assembly RH (Front passenger side front pretensioner squib) 3. Center airbag sensor assembly	*2	RS-165
B1906/74	Open in Front Passenger Side Front Pretensioner Squib Circuit	1. Floor wire No.2 2. Front seat outer belt assembly RH (Front passenger side front pretensioner squib) 3. Center airbag sensor assembly	*2	RS-165
B1907/74	Short to GND in Front Passenger Side Front Pretensioner Squib Circuit	1. Floor wire No.2 2. Front seat outer belt assembly RH (Front passenger side front pretensioner squib) 3. Center airbag sensor assembly	*2	RS-165
B1908/74	Short to B+ in Front Passenger Side Front Pretensioner Squib Circuit	1. Floor wire No.2 2. Front seat outer belt assembly RH (Front passenger side front pretensioner squib) 3. Center airbag sensor assembly	*2	RS-165

<b>DTC</b>	<b>B1000/31</b>	<b>Center Airbag Sensor Assembly Malfunction</b>
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**DESCRIPTION**

The center airbag sensor assembly consists of the airbag sensor, the safing sensor, the drive circuit, the diagnostic circuit, the ignition control, etc.

If the center airbag sensor assembly receives signals from the airbag sensor, it determines whether or not the SRS should be activated.

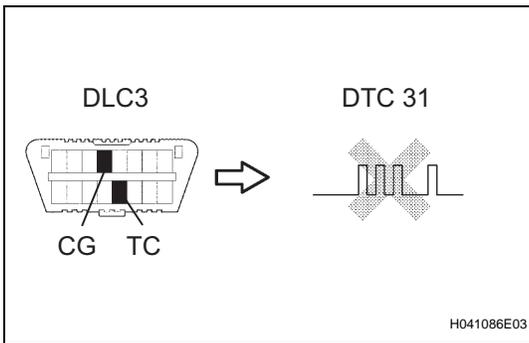
DTC B1000/31 is recorded when a malfunction is detected in the center airbag sensor assembly.

DTC No.	DTC Detecting Condition	Trouble Area
B1000/31	<ul style="list-style-type: none"> <li>• Center airbag sensor assembly malfunction</li> </ul>	<ul style="list-style-type: none"> <li>• Center airbag sensor assembly</li> </ul>

**HINT:**

When a trouble code is displayed simultaneously with B1000/31, repair the malfunction indicated by this code (except B1000/31) first.

<b>1</b>	<b>CHECK CENTER AIRBAG SENSOR ASSEMBLY</b>
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- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery, and wait for at least 90 seconds.
- (c) Connect the negative (-) terminal cable to the battery, and wait for at least 2 seconds.
- (d) Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- (e) Clear the DTCs stored in memory (See page RS-36).
- (f) Turn the ignition switch to the LOCK position.
- (g) Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- (h) Check the DTCs (See page RS-36).

**OK:**

DTC B1000/31 is not output.



<b>REPLACE CENTER AIRBAG SENSOR ASSEMBLY</b>
--



<b>USE SIMULATION METHOD TO CHECK</b>
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<b>DTC</b>	<b>B1610/13</b>	<b>Front Airbag Sensor RH Circuit Malfunction</b>
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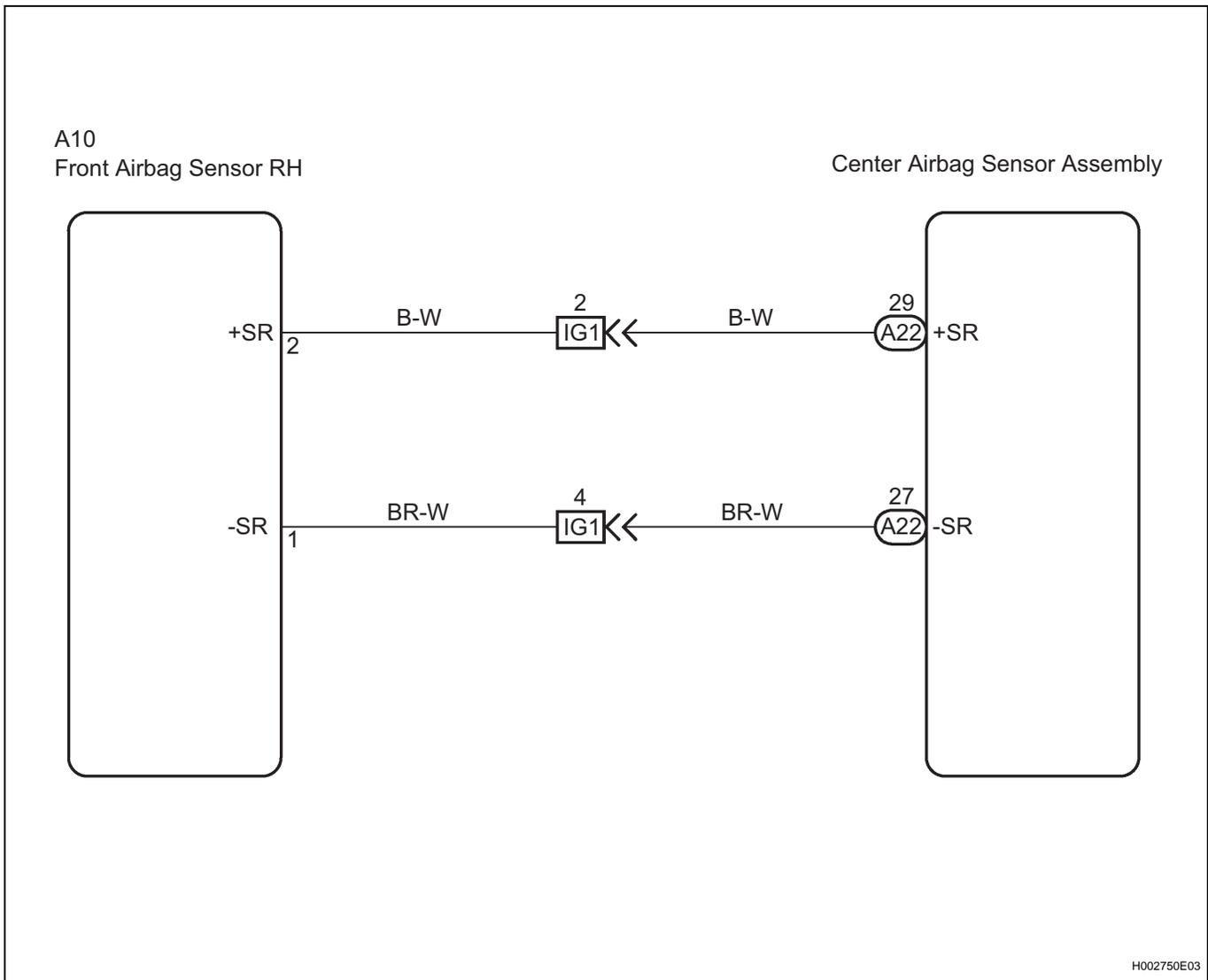
**DESCRIPTION**

The front airbag sensor RH consists of the diagnostic circuit, the frontal deceleration sensor, etc. If the center airbag sensor assembly receives signals from the frontal deceleration sensor, it determines whether or not the SRS should be activated.

DTC B1610/13 is recorded when a malfunction is detected in the front airbag sensor RH circuit.

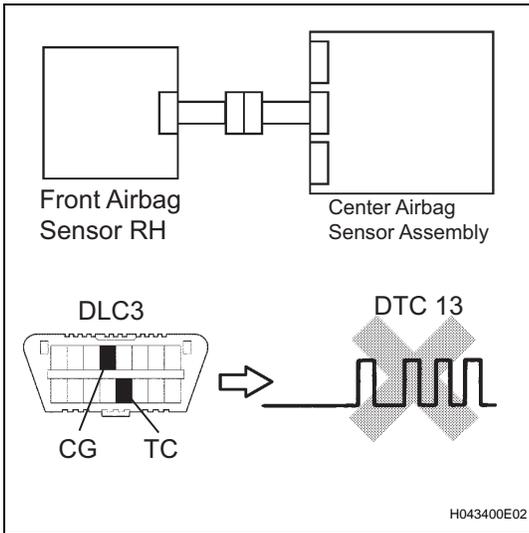
DTC No.	DTC Detecting Condition	Trouble Area
B1610/13	<ul style="list-style-type: none"> <li>The center airbag sensor assembly receives a line short circuit signal, an open circuit signal, a short circuit to ground signal or a short circuit to B+ signal in the front airbag sensor RH circuit for 2 seconds.</li> <li>Front airbag sensor RH malfunction</li> <li>Center airbag sensor assembly malfunction</li> </ul>	<ul style="list-style-type: none"> <li>Instrument panel wire</li> <li>Engine room main wire</li> <li>Front airbag sensor RH</li> <li>Center airbag sensor assembly</li> </ul>

**WIRING DIAGRAM**



RS

**1 CHECK DTC**



- (a) Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- (b) Clear the DTCs stored in memory (See page RS-36).
- (c) Turn the ignition switch to the LOCK position.
- (d) Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- (e) Check the DTCs (See page RS-36).

**OK:**

**DTC B1610/13 is not output.**

**HINT:**

Codes other than DTC B1610/13 may be output at this time, but they are not related to this check.

**OK** → **USE SIMULATION METHOD TO CHECK**

**NG**

**2 CHECK CONNECTION OF CONNECTORS**

- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery, and wait for at least 90 seconds.
- (c) Check that the connectors are properly connected to the center airbag sensor assembly and the front airbag sensor RH.

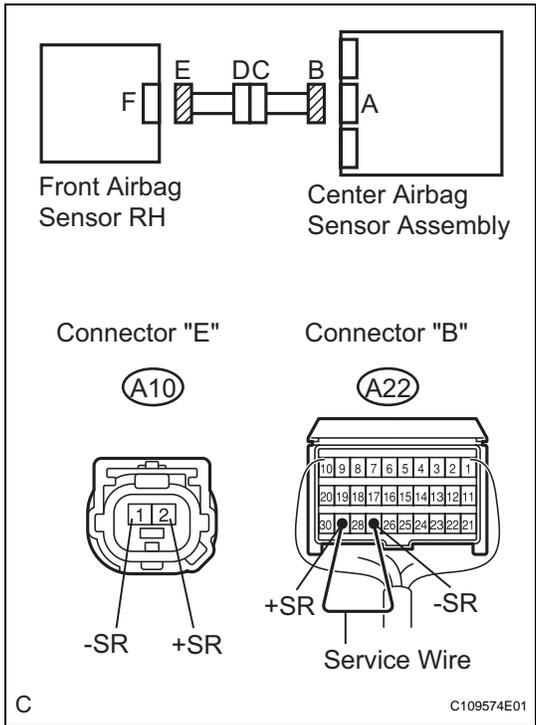
**OK:**

**The connectors are connected.**

**NG** → **CONNECT CONNECTORS, THEN GO TO STEP 1**

**OK**

**3 CHECK FRONT AIRBAG SENSOR RH CIRCUIT (OPEN)**



- (a) Disconnect the connectors from the center airbag sensor assembly and the front airbag sensor RH.
- (b) Using a service wire, connect A22-29 (+SR) and A22-27 (-SR) of connector "B".

**NOTICE:**

**Do not forcibly insert a service wire into the terminals of the connector when connecting.**

- (c) Measure the resistance according to the value(s) in the table below.

**Resistance**

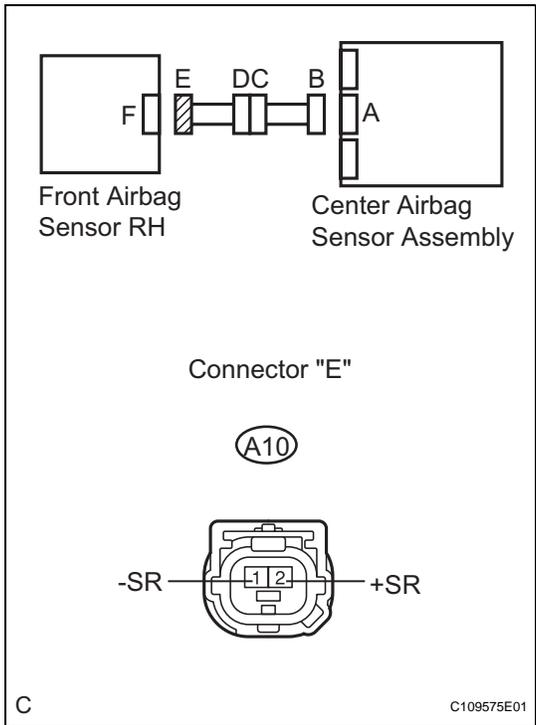
Tester connection	Condition	Specified condition
A10-2 (+SR) - A10-1 (-SR)	Always	Below 1 Ω

**NG** → **Go to step 8**

**OK**

**RS**

**4 CHECK FRONT AIRBAG SENSOR RH CIRCUIT (SHORT)**



- (a) Disconnect the service wire from connector "B".
- (b) Measure the resistance according to the value(s) in the table below.

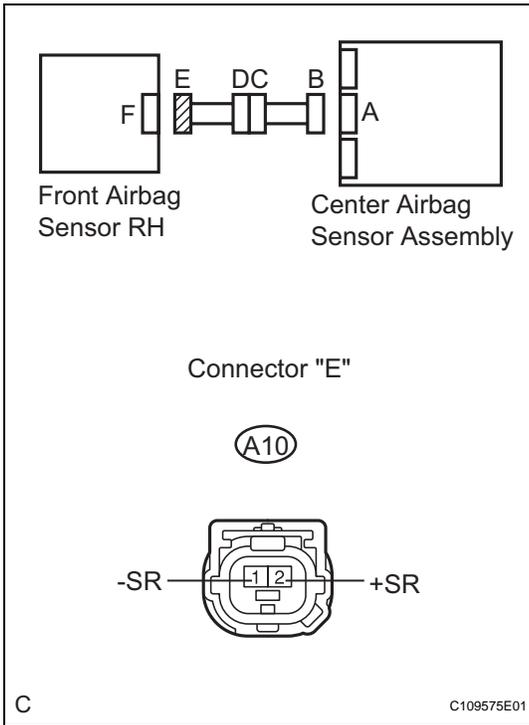
**Resistance**

Tester connection	Condition	Specified condition
A10-2 (+SR) - A10-1 (-SR)	Always	1 MΩ or higher

**NG** → **Go to step 9**

**OK**

**5 CHECK FRONT AIRBAG SENSOR RH CIRCUIT (SHORT TO B+)**



- (a) Connect the negative (-) terminal cable to the battery, and wait for at least 2 seconds.
- (b) Turn the ignition switch to the ON position.
- (c) Measure the voltage according to the value(s) in the table below.

**Voltage**

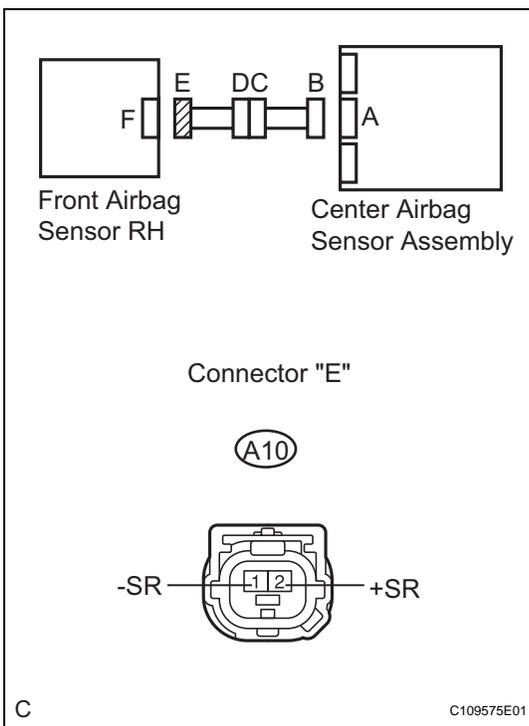
Tester connection	Condition	Specified condition
A10-2 (+SR) - Body ground	Ignition switch ON	Below 1 V
A10-1 (-SR) - Body ground	Ignition switch ON	Below 1 V

**NG** → **Go to step 10**

**OK**

**RS**

**6 CHECK FRONT AIRBAG SENSOR RH CIRCUIT (SHORT TO GROUND)**



- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery, and wait for at least 90 seconds.
- (c) Measure the resistance according to the value(s) in the table below.

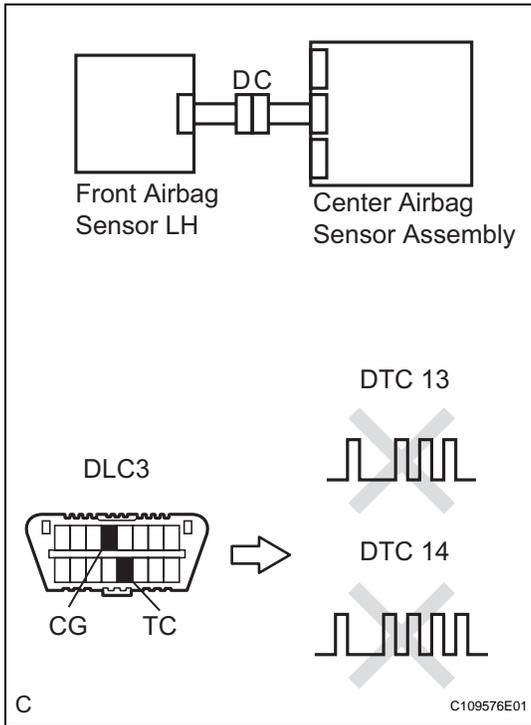
**Resistance**

Tester connection	Condition	Specified condition
A10-2 (+SR) - Body ground	Always	1 MΩ or higher
A10-1 (-SR) - Body ground	Always	1 MΩ or higher

**NG** → **Go to step 11**

**OK**

**7 CHECK FRONT AIRBAG SENSOR RH**



- (a) Connect the connectors to the center airbag sensor assembly.
- (b) Interchange the front airbag sensor RH with LH and connect the connectors to them.
- (c) Connect the negative (-) terminal cable to the battery, and wait for at least 2 seconds.
- (d) Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- (e) Clear the DTCs stored in memory (See page RS-36).
- (f) Turn the ignition switch to the LOCK position.
- (g) Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- (h) Check the DTCs (See page RS-36).

**Result**

Result	Proceed to
DTC B1610/13 is output.	A
DTC B1615/14 is output.	B
DTC B1610/13 and B1615/14 are not output.	C

**A** → **REPLACE CENTER AIRBAG SENSOR ASSEMBLY**

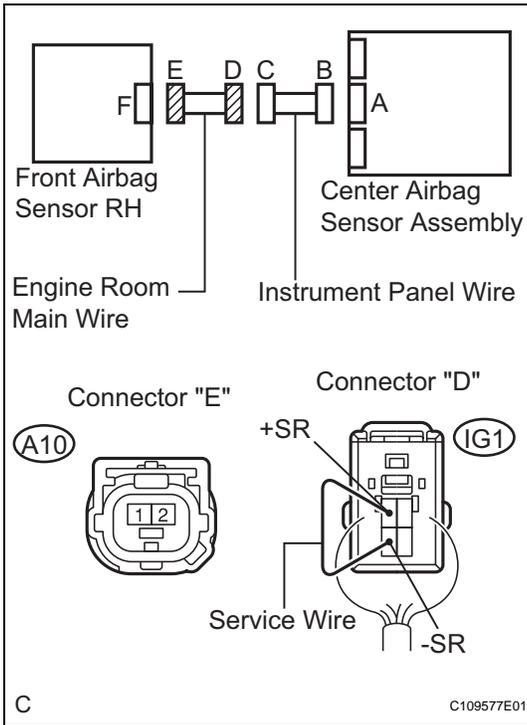
**B** → **REPLACE FRONT AIRBAG SENSOR RH**

**C**

**RS**

**USE SIMULATION METHOD TO CHECK**

**8 CHECK ENGINE ROOM MAIN WIRE (OPEN)**



- (a) Disconnect the service wire from connector "B".
- (b) Disconnect the engine room main wire connector from the instrument panel wire.
- (c) Using a service wire, connect IG1-2 (+SR) and IG1-4 (-SR) of connector "D".

**NOTICE:**

**Do not forcibly insert a service wire into the terminals of the connector when connecting.**

- (d) Measure the resistance according to the value(s) in the table below.

**Resistance**

Tester connection	Condition	Specified condition
A10-2 (+SR) - A10-1 (-SR)	Always	Below 1 Ω

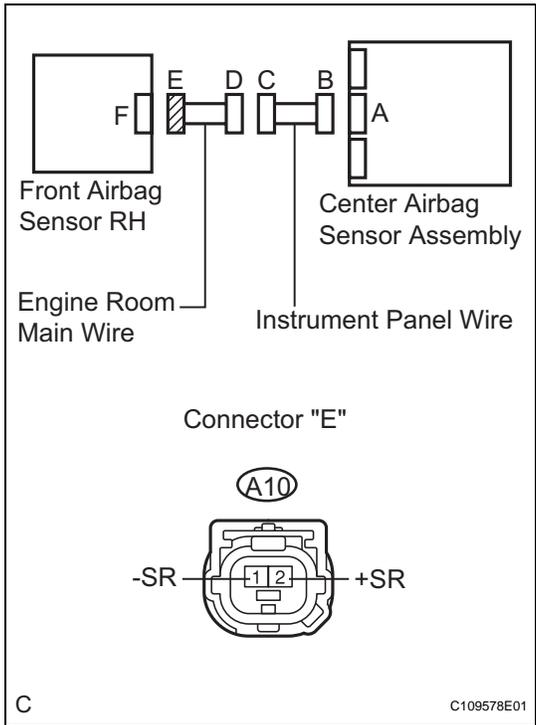
**NG** **REPAIR OR REPLACE ENGINE ROOM MAIN WIRE**

**OK**

**REPAIR OR REPLACE INSTRUMENT PANEL WIRE**

**RS**

**9 CHECK ENGINE ROOM MAIN WIRE (SHORT)**



- (a) Disconnect the engine room main wire connector from the instrument panel wire.
- (b) Measure the resistance according to the value(s) in the table below.

**Resistance**

Tester connection	Condition	Specified condition
A10-2 (+SR) - A10-1 (-SR)	Always	1 MΩ or higher

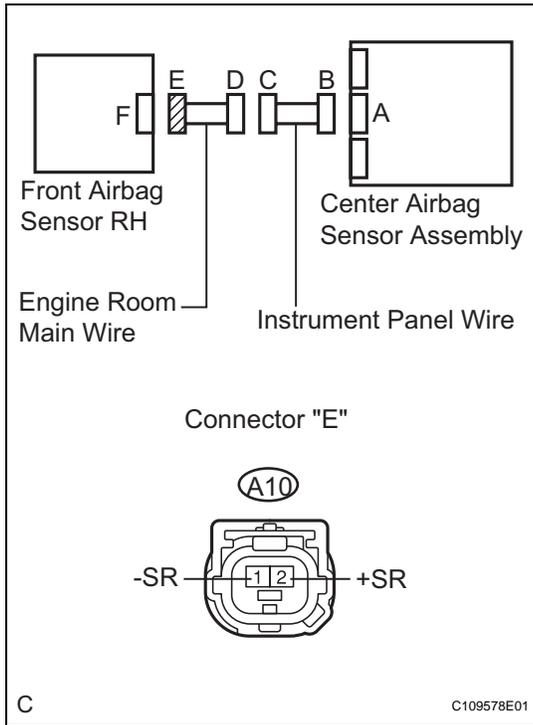
**NG** REPAIR OR REPLACE ENGINE ROOM MAIN WIRE

**OK**

**RS**

**REPAIR OR REPLACE INSTRUMENT PANEL WIRE**

**10 CHECK ENGINE ROOM MAIN WIRE (SHORT TO B+)**



- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery, and wait for at least 90 seconds.
- (c) Disconnect the engine room main wire connector from the instrument panel wire.
- (d) Connect the negative (-) terminal cable to the battery, and wait for at least 2 seconds.
- (e) Turn the ignition switch to the ON position.
- (f) Measure the voltage according to the value(s) in the table below.

**Voltage**

Tester connection	Condition	Specified condition
A10-2 (+SR) - Body ground	Ignition switch ON	Below 1 V
A10-1 (-SR) - Body ground	Ignition switch ON	Below 1 V

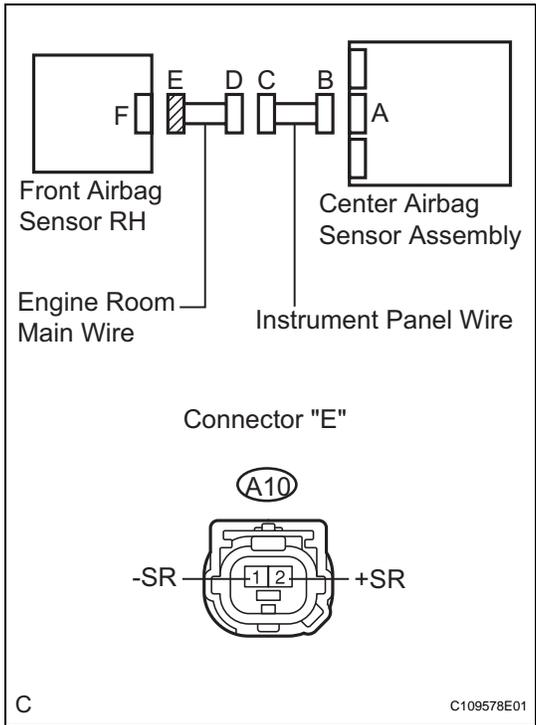
**NG** REPAIR OR REPLACE ENGINE ROOM MAIN WIRE

**OK**

**REPAIR OR REPLACE INSTRUMENT PANEL WIRE**

**RS**

**11 CHECK ENGINE ROOM MAIN WIRE (SHORT TO GROUND)**



- (a) Disconnect the engine room main wire connector from the instrument panel wire.
- (b) Measure the resistance according to the value(s) in the table below.

**Resistance**

Tester connection	Condition	Specified condition
A10-2 (+SR) - Body ground	Always	1 MΩ or higher
A10-1 (-SR) - Body ground	Always	1 MΩ or higher

**NG** REPAIR OR REPLACE ENGINE ROOM MAIN WIRE

**OK**

**RS**

**REPAIR OR REPLACE INSTRUMENT PANEL WIRE**

<b>DTC</b>	<b>B1615/14</b>	<b>Front Airbag Sensor LH Circuit Malfunction</b>
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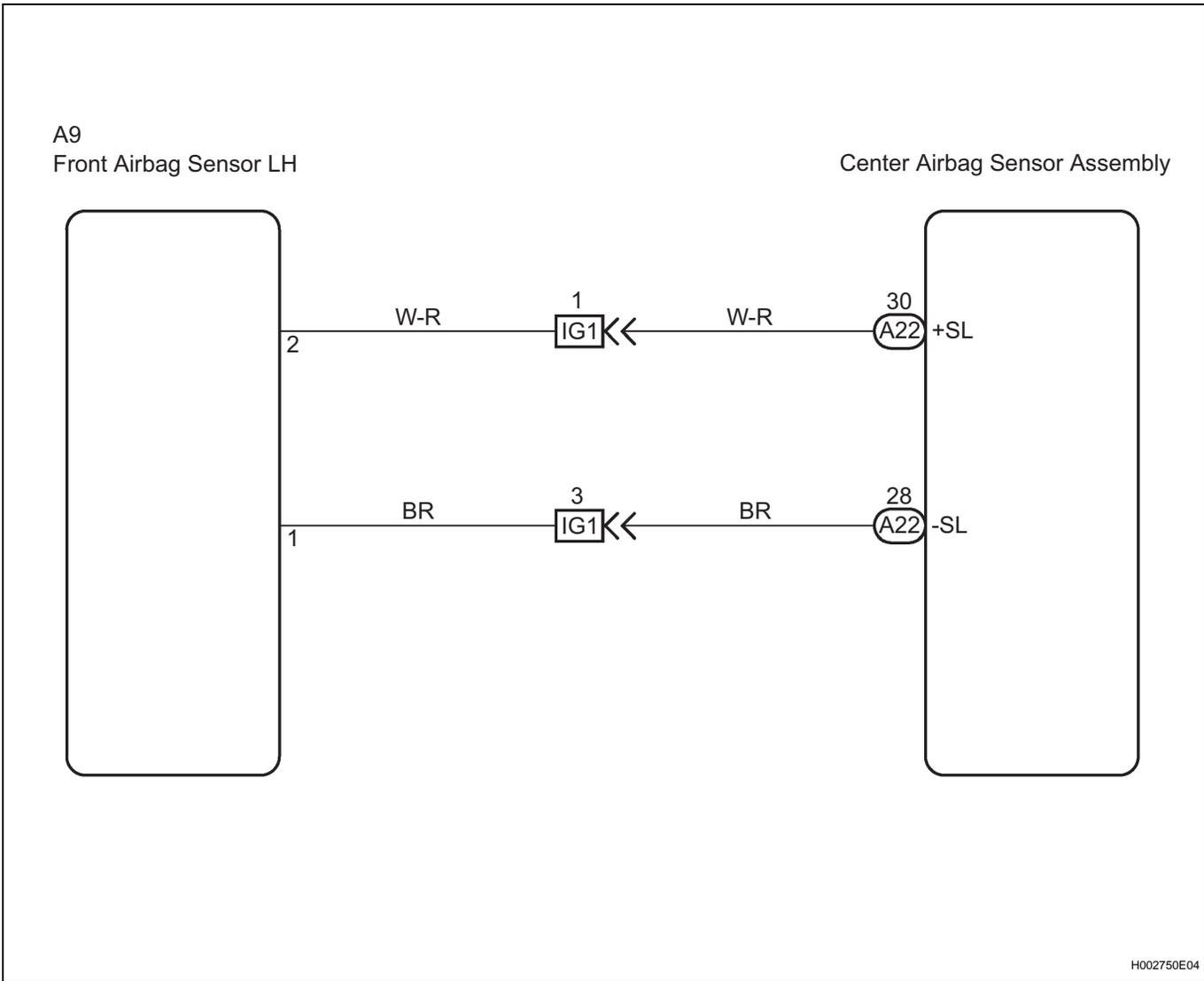
**DESCRIPTION**

The front airbag sensor LH consists of the diagnostic circuit, the frontal deceleration sensor, etc. If the center airbag sensor assembly receives signals from the frontal deceleration sensor, it determines whether or not the SRS should be activated.

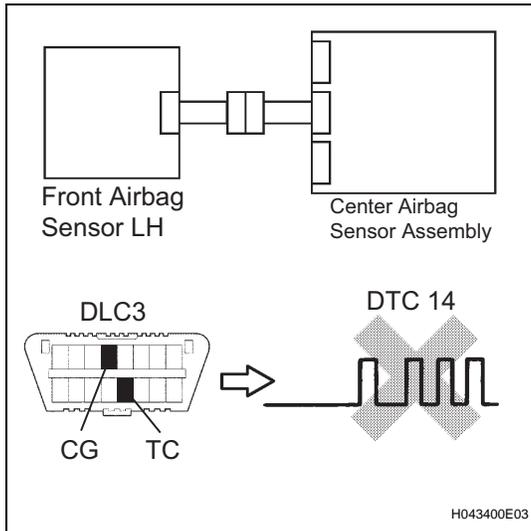
DTC B1615/14 is recorded when a malfunction is detected in the front airbag sensor LH circuit.

DTC No.	DTC Detecting Condition	Trouble Area
B1615/14	<ul style="list-style-type: none"> <li>The center airbag sensor assembly receives a line short circuit signal, an open circuit signal, a short circuit to ground signal or a short circuit to B+ signal in the front airbag sensor LH circuit for 2 seconds.</li> <li>Front airbag sensor LH malfunction</li> <li>Center airbag sensor assembly malfunction</li> </ul>	<ul style="list-style-type: none"> <li>Instrument panel wire</li> <li>Engine room main wire</li> <li>Front airbag sensor LH</li> <li>Center airbag sensor assembly</li> </ul>

**WIRING DIAGRAM**



**RS**

**1 CHECK DTC**

- Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- Clear the DTCs stored in memory (See page RS-36).
- Turn the ignition switch to the LOCK position.
- Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- Check the DTCs (See page RS-36).

**OK:****DTC B1615/14 is not output.****HINT:**

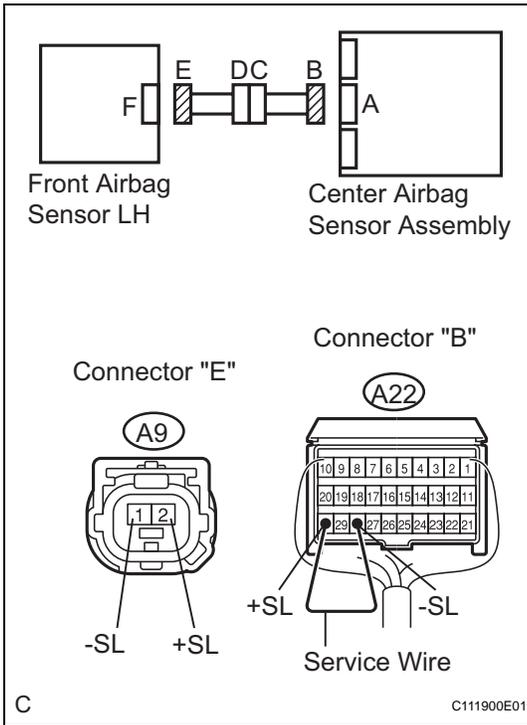
Codes other than DTC B1615/14 may be output at this time, but they are not related to this check.

**OK****USE SIMULATION METHOD TO CHECK****NG****2 CHECK CONNECTION OF CONNECTORS**

- Turn the ignition switch to the LOCK position.
- Disconnect the negative (-) terminal cable from the battery, and wait for at least 90 seconds.
- Check that the connectors are properly connected to the center airbag sensor assembly and the front airbag sensor LH.

**OK:****The connectors are connected.****NG****CONNECT CONNECTORS, THEN GO TO STEP 1****OK**

**3 CHECK FRONT AIRBAG SENSOR LH CIRCUIT (OPEN)**



- (a) Disconnect the connectors from the center airbag sensor assembly and the front airbag sensor LH.
- (b) Using a service wire, connect A22-30 (+SL) and A22-28 (-SL) of connector "B".

**NOTICE:**

**Do not forcibly insert a service wire into the terminals of the connector when connecting.**

- (c) Measure the resistance according to the value(s) in the table below.

**Resistance**

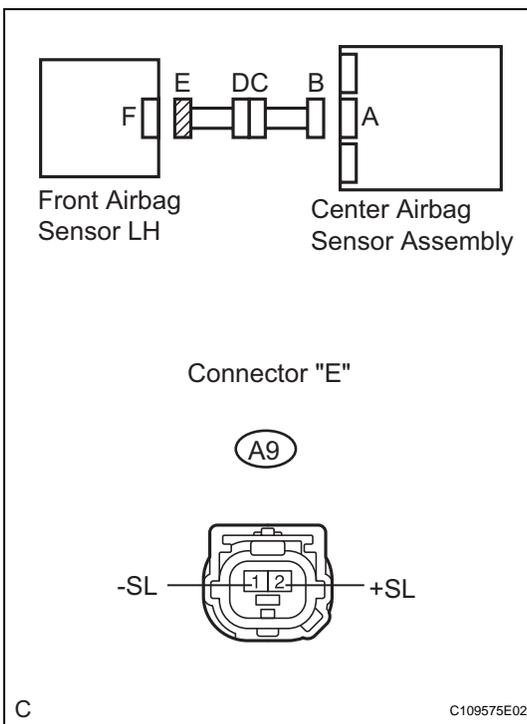
Tester connection	Condition	Specified condition
A9-2 (+SL) - A9-1 (-SL)	Always	Below 1 Ω

**NG** → **Go to step 8**

**OK**

**RS**

**4 CHECK FRONT AIRBAG SENSOR LH CIRCUIT (SHORT)**



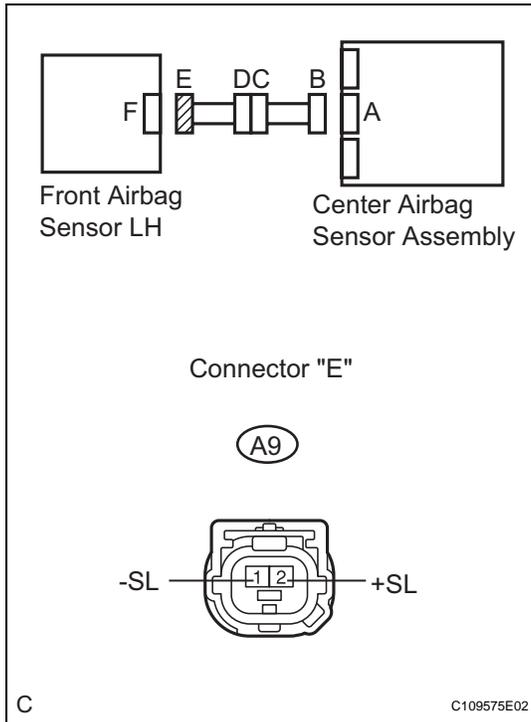
- (a) Disconnect the service wire from connector "B".
- (b) Measure the resistance according to the value(s) in the table below.

**Resistance**

Tester connection	Condition	Specified condition
A9-2 (+SL) - A9-1 (-SL)	Always	1 MΩ or higher

**NG** → **Go to step 9**

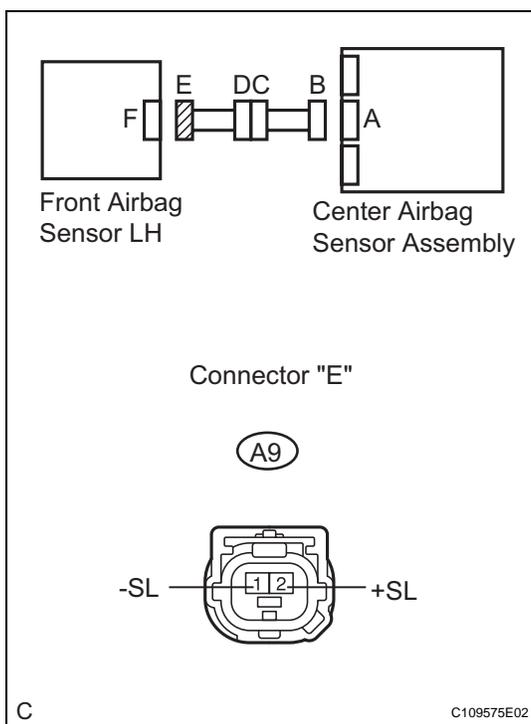
**OK**

**5 CHECK FRONT AIRBAG SENSOR LH CIRCUIT (SHORT TO B+)**

- Connect the negative (-) terminal cable to the battery, and wait for at least 2 seconds.
- Turn the ignition switch to the ON position.
- Measure the voltage according to the value(s) in the table below.

**Voltage**

Tester connection	Condition	Specified condition
A9-2 (+SL) - Body ground	Ignition switch ON	Below 1 V
A9-1 (-SL) - Body ground	Ignition switch ON	Below 1 V

**NG****Go to step 10****OK****RS****6 CHECK FRONT AIRBAG SENSOR LH CIRCUIT (SHORT TO GROUND)**

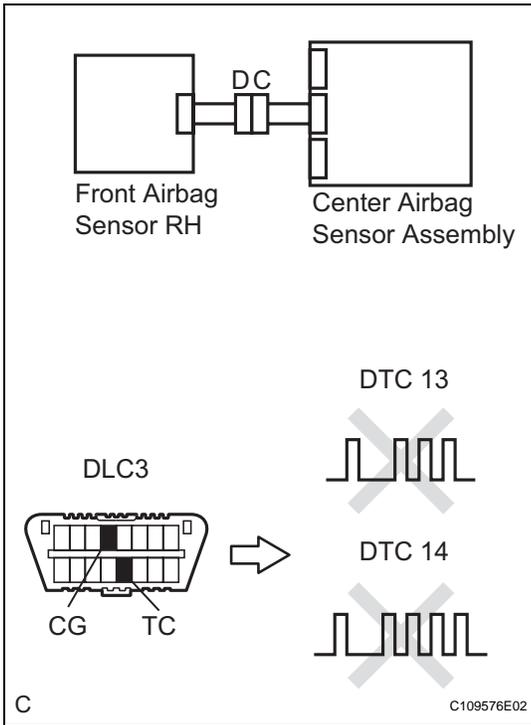
- Turn the ignition switch to the LOCK position.
- Disconnect the negative (-) terminal cable from the battery, and wait for at least 90 seconds.
- Measure the resistance according to the value(s) in the table below.

**Resistance**

Tester connection	Condition	Specified condition
A9-2 (+SL) - Body ground	Always	1 M $\Omega$ or higher
A9-1 (-SL) - Body ground	Always	1 M $\Omega$ or higher

**NG****Go to step 11****OK**

**7 CHECK FRONT AIRBAG SENSOR LH**



- (a) Connect the connectors to the center airbag sensor assembly.
- (b) Interchange the front airbag sensor LH with RH and connect the connectors to them.
- (c) Connect the negative (-) terminal cable to the battery, and wait for at least 2 seconds.
- (d) Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- (e) Clear the DTCs stored in memory (See page RS-36).
- (f) Turn the ignition switch to the LOCK position.
- (g) Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- (h) Check the DTCs (See page RS-36).

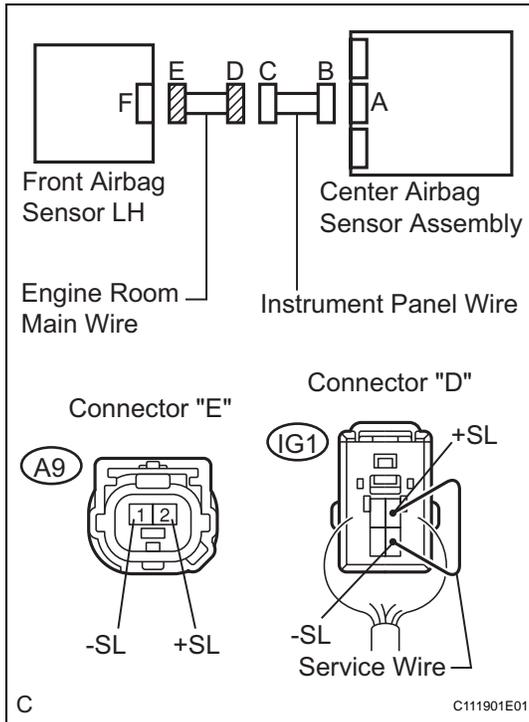
**Result**

Result	Proceed to
DTC B1615/14 is output.	A
DTC B1610/13 is output.	B
DTC B1610/13 and B1615/14 are not output.	C

- A** → REPLACE CENTER AIRBAG SENSOR ASSEMBLY
- B** → REPLACE FRONT AIRBAG SENSOR LH

**C**

**USE SIMULATION METHOD TO CHECK**

**8 CHECK ENGINE ROOM MAIN WIRE (OPEN)**

- Disconnect the service wire from connector "B".
- Disconnect the engine room main wire connector from the instrument panel wire.
- Using a service wire, connect IG1-1 (+SL) and IG1-3 (-SL) of connector "D".

**NOTICE:**

**Do not forcibly insert a service wire into the terminals of the connector when connecting.**

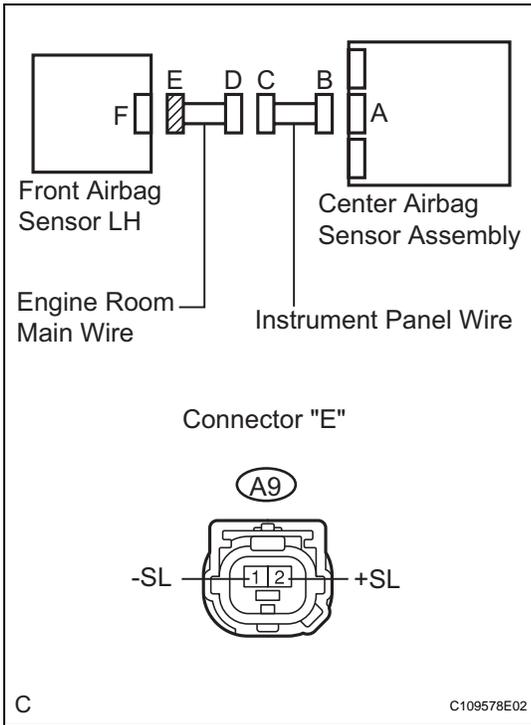
- Measure the resistance according to the value(s) in the table below.

**Resistance**

Tester connection	Condition	Specified condition
A9-2 (+SL) - A9-1 (-SL)	Always	Below 1 $\Omega$

**NG****REPAIR OR REPLACE ENGINE ROOM MAIN WIRE****OK****RS****REPAIR OR REPLACE INSTRUMENT PANEL WIRE**

**9 CHECK ENGINE ROOM MAIN WIRE (SHORT)**



- (a) Disconnect the engine room main wire connector from the instrument panel wire.
- (b) Measure the resistance according to the value(s) in the table below.

**Resistance**

Tester connection	Condition	Specified condition
A9-2 (+SL) - A9-1 (-SL)	Always	1 MΩ or higher

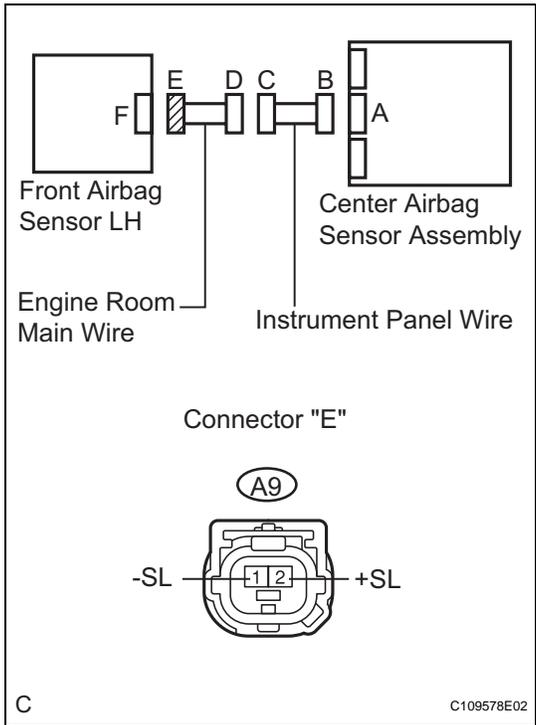
**NG REPAIR OR REPLACE ENGINE ROOM MAIN WIRE**

**OK**

**REPAIR OR REPLACE INSTRUMENT PANEL WIRE**

**RS**

**10 CHECK ENGINE ROOM MAIN WIRE (SHORT TO B+)**



- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery, and wait for at least 90 seconds.
- (c) Disconnect the engine room main wire connector from the instrument panel wire.
- (d) Connect the negative (-) terminal cable to the battery, and wait for at least 2 seconds.
- (e) Turn the ignition switch to the ON position.
- (f) Measure the voltage according to the value(s) in the table below.

**Voltage**

Tester connection	Condition	Specified condition
A9-2 (+SL) - Body ground	Ignition switch ON	Below 1 V
A9-1 (-SL) - Body ground	Ignition switch ON	Below 1 V

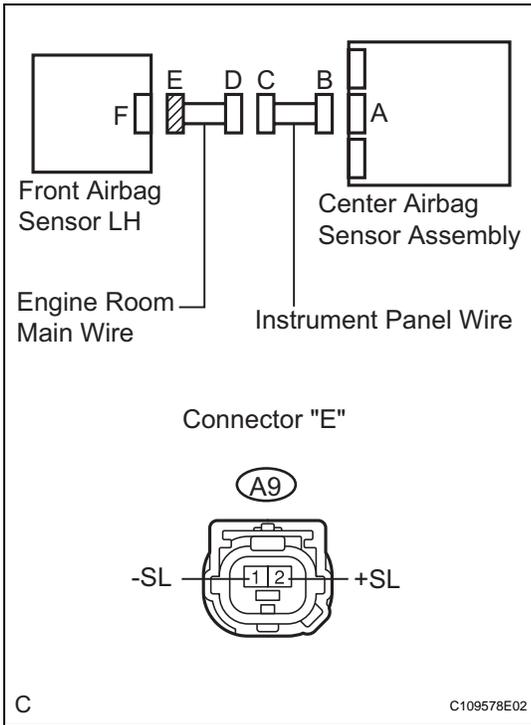
**NG** REPAIR OR REPLACE ENGINE ROOM MAIN WIRE

**OK**

**REPAIR OR REPLACE INSTRUMENT PANEL WIRE**

**RS**

**11 CHECK ENGINE ROOM MAIN WIRE (SHORT TO GROUND)**



- (a) Disconnect the engine room main wire connector from the instrument panel wire.
- (b) Measure the resistance according to the value(s) in the table below.

**Resistance**

Tester connection	Condition	Specified condition
A9-2 (+SL) - Body ground	Always	1 MΩ or higher
A9-1 (-SL) - Body ground	Always	1 MΩ or higher

**NG** REPAIR OR REPLACE ENGINE ROOM MAIN WIRE

**OK**

**REPAIR OR REPLACE INSTRUMENT PANEL WIRE**

**RS**

<b>DTC</b>	<b>B1620/21</b>	<b>Driver Side - Side Airbag Sensor Assembly Circuit Malfunction</b>
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**DESCRIPTION**

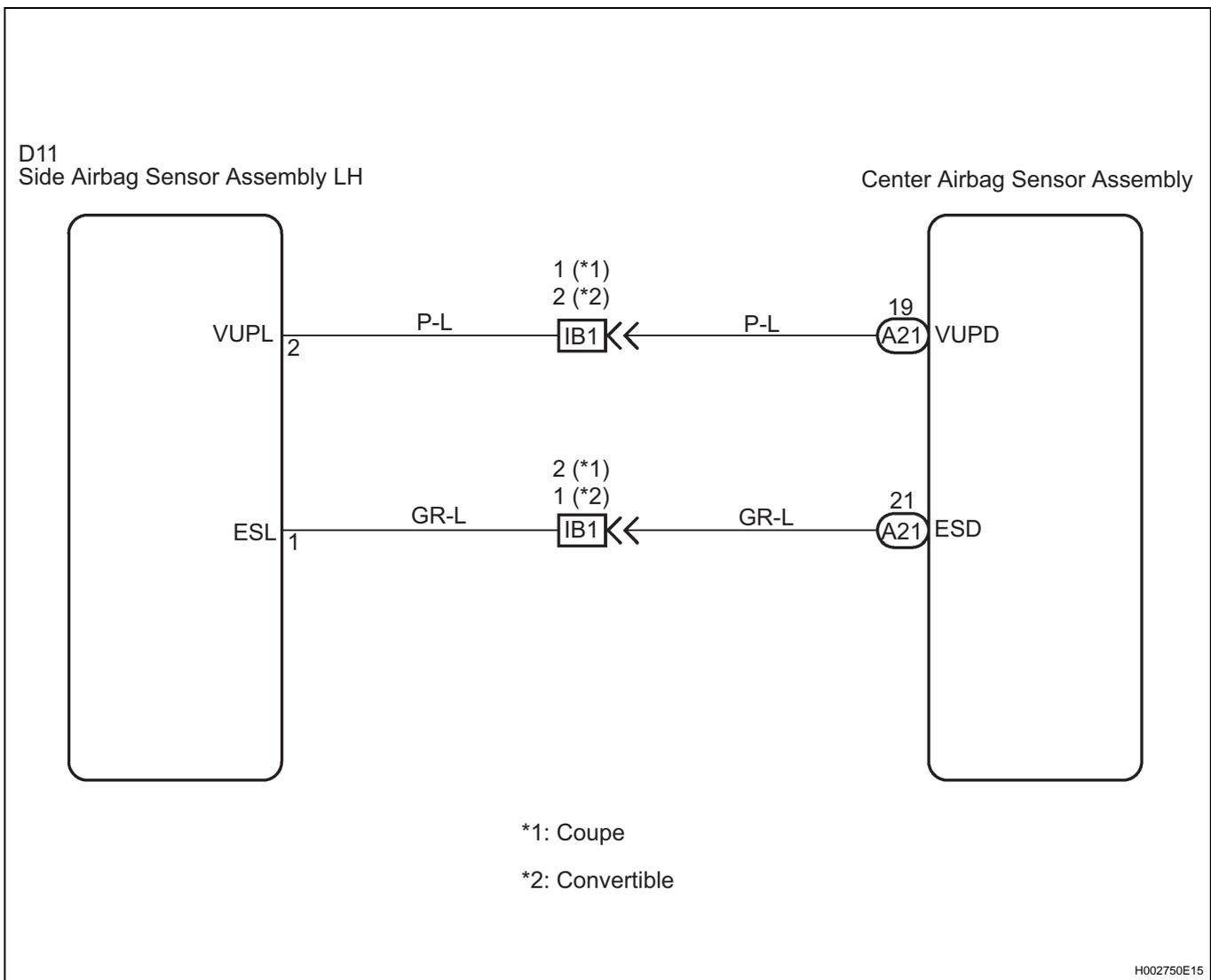
The side airbag sensor assembly LH consists of the safing sensor, the diagnostic circuit, the lateral deceleration sensor, etc.

If the center airbag sensor assembly receives signals from the lateral deceleration sensor, it determines whether or not the SRS should be activated.

DTC B1620/21 is recorded when a malfunction is detected in the driver side - side airbag sensor assembly circuit.

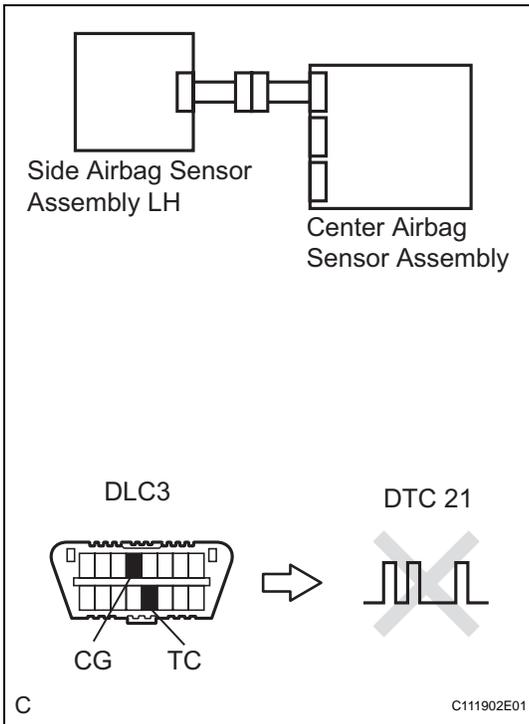
DTC No.	DTC Detecting Condition	Trouble Area
B1620/21	<ul style="list-style-type: none"> <li>The center airbag sensor assembly receives a line short circuit signal, an open circuit signal, a short circuit to ground signal or a short circuit to B+ signal in the driver side - side airbag sensor assembly circuit for 2 seconds.</li> <li>Side airbag sensor assembly LH malfunction</li> <li>Center airbag sensor assembly malfunction</li> </ul>	<ul style="list-style-type: none"> <li>Floor wire</li> <li>Front door wire LH</li> <li>Side airbag sensor assembly LH</li> <li>Center airbag sensor assembly</li> </ul>

**WIRING DIAGRAM**



**RS**

**1 CHECK DTC**



- (a) Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- (b) Clear the DTCs stored in memory (See page RS-36).
- (c) Turn the ignition switch to the LOCK position.
- (d) Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- (e) Check the DTCs (See page RS-36).

**OK:**

**DTC B1620/21 is not output.**

**HINT:**

Codes other than DTC B1620/21 may be output at this time, but they are not related to this check.

**OK** → **USE SIMULATION METHOD TO CHECK**

**NG**

**RS**

**2 CHECK CONNECTION OF CONNECTORS**

- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery, and wait for at least 90 seconds.
- (c) Check that the connectors are properly connected to the center airbag sensor assembly and the side airbag sensor assembly LH.

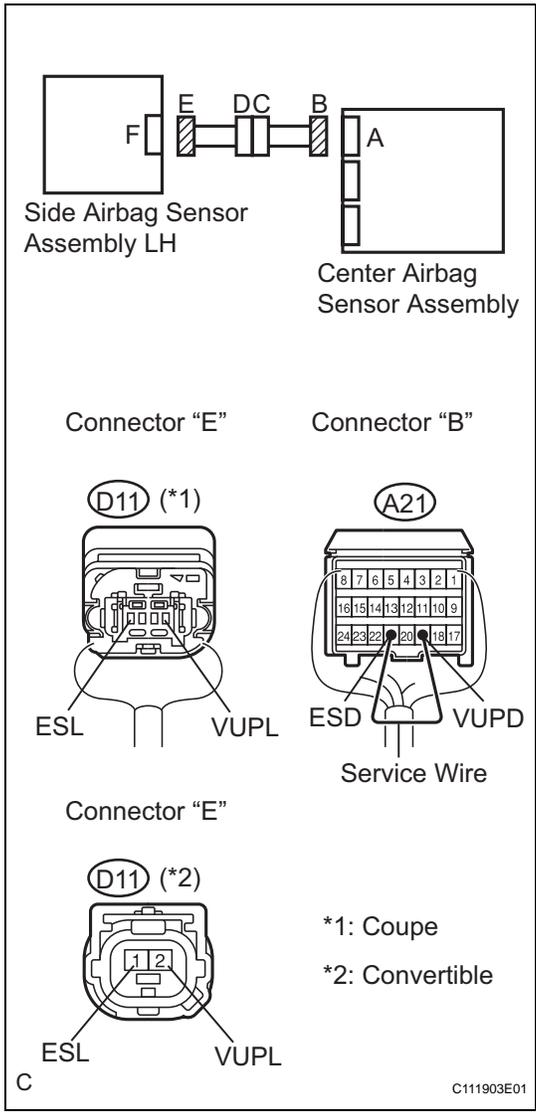
**OK:**

**The connectors are connected.**

**NG** → **CONNECT CONNECTORS, THEN GO TO STEP 1**

**OK**

**3 CHECK DRIVER SIDE - SIDE AIRBAG SENSOR ASSEMBLY CIRCUIT (OPEN)**



(a) Disconnect the connectors from the center airbag sensor assembly and the side airbag sensor assembly LH.

(b) Using a service wire, connect A21-19 (VUPD) and A21-21 (ESD) of connector "B".

**NOTICE:**

**Do not forcibly insert a service wire into the terminals of the connector when connecting.**

(c) Measure the resistance according to the value(s) in the table below.

**Resistance**

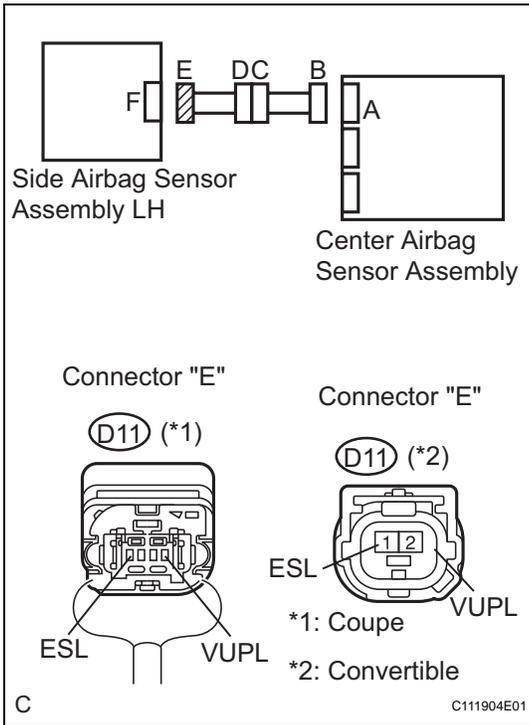
Tester connection	Condition	Specified condition
D11-2 (VUPL) - D11-1 (ESL)	Always	Below 1 Ω

**NG** → **Go to step 8**

**OK**

RS

**4 CHECK DRIVER SIDE - SIDE AIRBAG SENSOR ASSEMBLY CIRCUIT (SHORT)**



- (a) Disconnect the service wire from connector "B".
- (b) Measure the resistance according to the value(s) in the table below.

**Resistance**

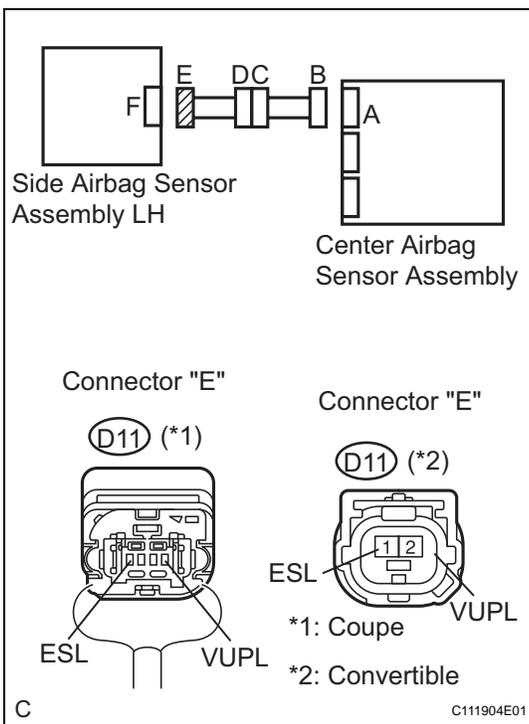
Tester connection	Condition	Specified condition
D11-2 (VUPL) - D11-1 (ESL)	Always	1 MΩ or higher

**NG** → **Go to step 9**

**OK**

**RS**

**5 CHECK DRIVER SIDE - SIDE AIRBAG SENSOR ASSEMBLY CIRCUIT (SHORT TO B+)**



- (a) Connect the negative (-) terminal cable to the battery, and wait for at least 2 seconds.
- (b) Turn the ignition switch to the ON position.
- (c) Measure the voltage according to the value(s) in the table below.

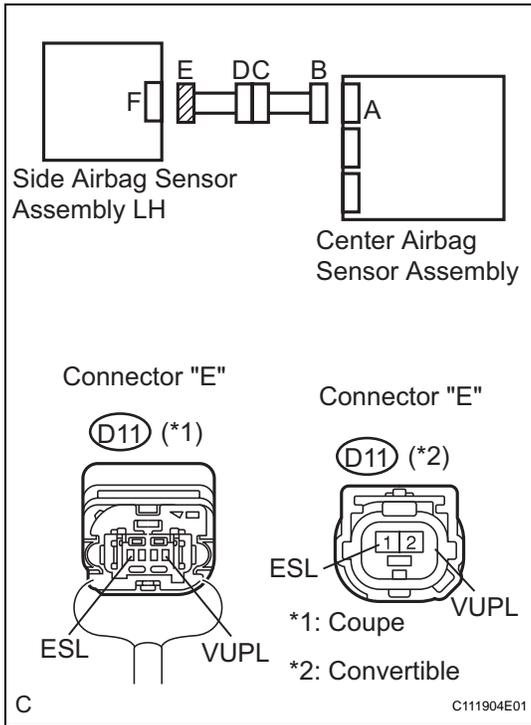
**Voltage**

Tester connection	Condition	Specified condition
D11-2 (VUPL) - Body ground	Ignition switch ON	Below 1 V
D11-1 (ESL) - Body ground	Ignition switch ON	Below 1 V

**NG** → **Go to step 10**

**OK**

**6 CHECK DRIVE SIDE - SIDE AIRBAG SENSOR ASSEMBLY CIRCUIT (SHORT TO GROUND)**



- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery, and wait for at least 90 seconds.
- (c) Measure the resistance according to the value(s) in the table below.

**Resistance**

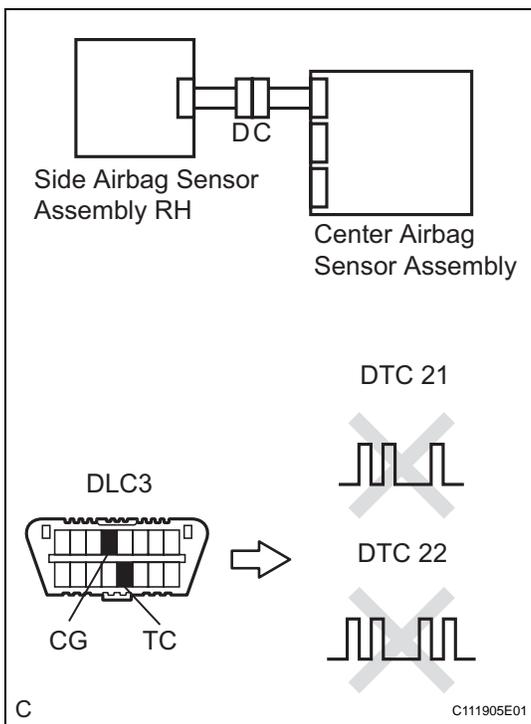
Tester connection	Condition	Specified condition
D11-2 (VUPL) - Body ground	Always	1 MΩ or higher
D11-1 (ESL) - Body ground	Always	1 MΩ or higher

**NG** → **Go to step 11**

**OK**

**RS**

**7 CHECK SIDE AIRBAG SENSOR ASSEMBLY LH**



- (a) Connect the connectors to the center airbag sensor assembly.
- (b) Interchange the side airbag sensor assembly RH with LH and connect the connectors to them.
- (c) Connect the negative (-) terminal cable to the battery, and wait for at least 2 seconds.
- (d) Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- (e) Clear the DTCs stored in memory (See page RS-36).
- (f) Turn the ignition switch to the LOCK position.
- (g) Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- (h) Check the DTCs (See page RS-36).

**Result**

Result	Proceed to
DTC B1620/21 is output.	A
DTC B1625/22 is output.	B
DTC B1620/21 and B1625/22 are not output.	C

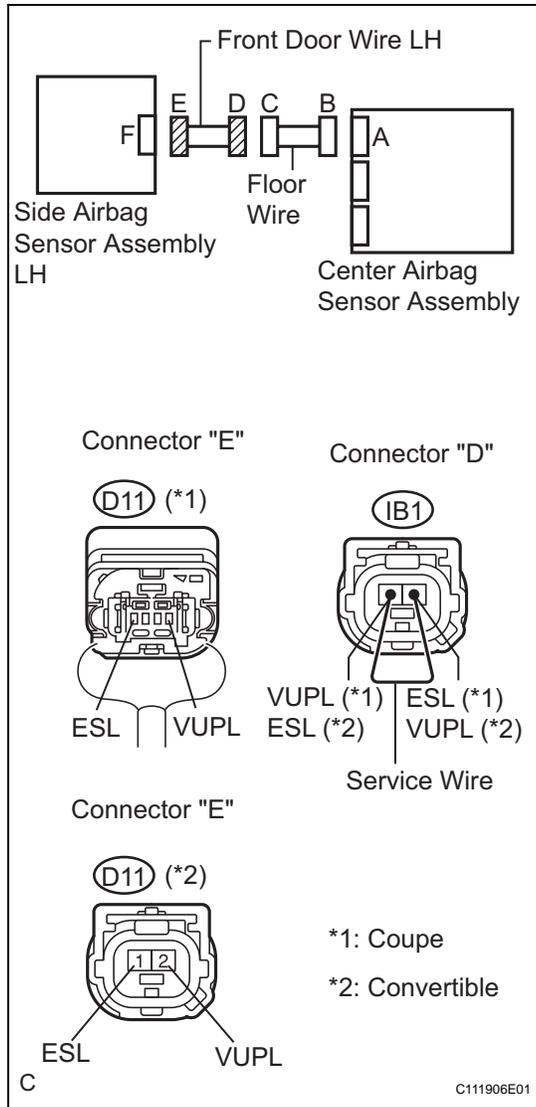
**A** → **REPLACE CENTER AIRBAG SENSOR ASSEMBLY**

**B** REPLACE SIDE AIRBAG SENSOR ASSEMBLY LH

**C**

USE SIMULATION METHOD TO CHECK

**8** CHECK FRONT DOOR WIRE LH (OPEN)



- (a) Disconnect the service wire from connector "B".
- (b) Disconnect the front door wire LH connector from the floor wire.
- (c) Coupe:  
Using a service wire, connect IB1-1 (VUPL) and IB1-2 (ESL) of connector "D".
- (d) Convertible:  
Using a service wire, connect IB1-2 (VUPL) and IB1-1 (ESL) of connector "D".
- (e) Measure the resistance according to the value(s) in the table below.

**Resistance**

Tester connection	Condition	Specified condition
D11-2 (VUPL) - D11-1 (ESL)	Always	Below 1 Ω

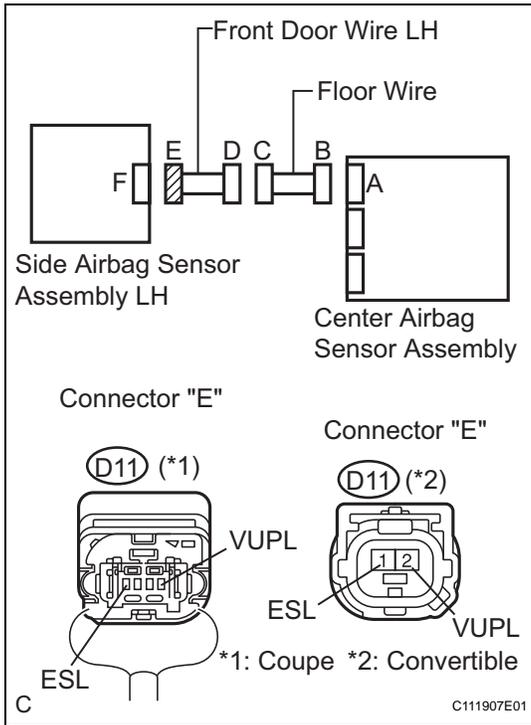
**NG** REPAIR OR REPLACE FRONT DOOR WIRE LH

**OK**

REPAIR OR REPLACE FLOOR WIRE

RS

**9 CHECK FRONT DOOR WIRE LH (SHORT)**



- (a) Disconnect the front door wire LH connector from the floor wire.
- (b) Measure the resistance according to the value(s) in the table below.

**Resistance**

Tester connection	Condition	Specified condition
D11-2 (VUPL) - D11-1 (ESL)	Always	1 MΩ or higher

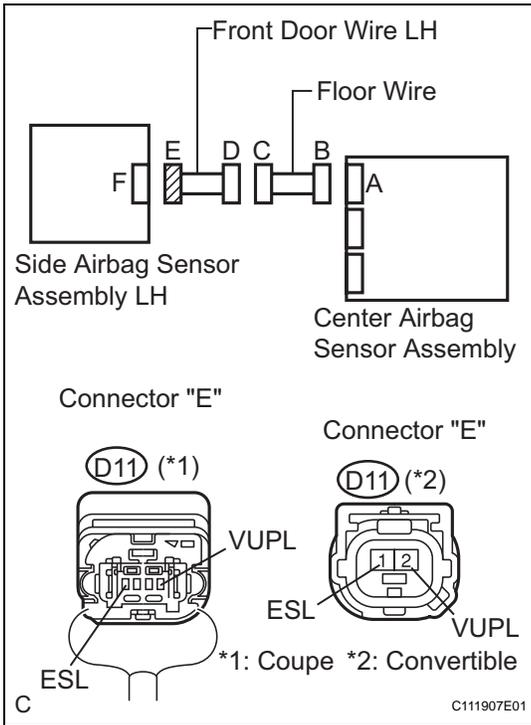
**NG** **REPAIR OR REPLACE FRONT DOOR WIRE LH**

**OK**

**RS**

**REPAIR OR REPLACE FLOOR WIRE**

**10 CHECK FRONT DOOR WIRE LH (SHORT TO B+)**



- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery, and wait for at least 90 seconds.
- (c) Disconnect the front door wire LH connector from the floor wire.
- (d) Connect the negative (-) terminal cable to the battery, and wait for at least 2 seconds.
- (e) Turn the ignition switch to the ON position.
- (f) Measure the voltage according to the value(s) in the table below.

**Voltage**

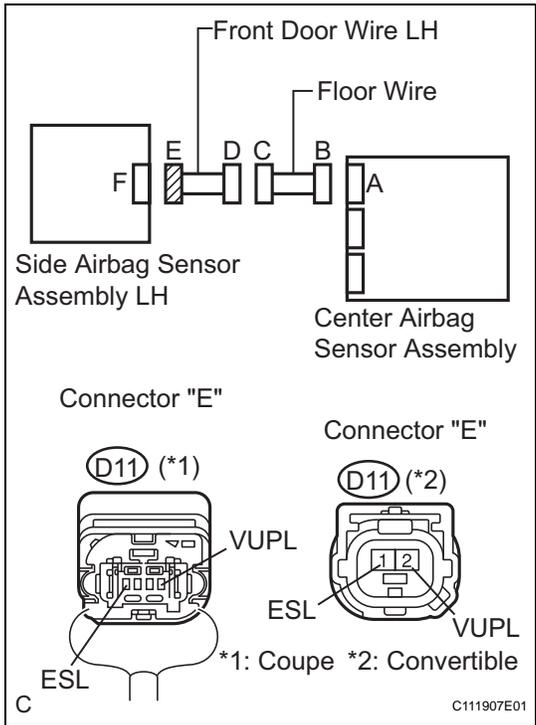
Tester connection	Condition	Specified condition
D11-2 (VUPL) - Body ground	Ignition switch ON	Below 1 V
D11-1 (ESL) - Body ground	Ignition switch ON	Below 1 V

**NG** → **REPAIR OR REPLACE FRONT DOOR WIRE LH**

**OK**

**REPAIR OR REPLACE FLOOR WIRE**

**11 CHECK FRONT DOOR WIRE LH (SHORT TO GROUND)**



- (a) Disconnect the front door wire LH connector from the floor wire.
- (b) Measure the resistance according to the value(s) in the table below.

**Standard**

Tester connection	Condition	Specified condition
D11-2 (VUPL) - Body ground	Always	1 MΩ or higher
D11-1 (ESL) - Body ground	Always	1 MΩ or higher

**NG** REPAIR OR REPLACE FRONT DOOR WIRE LH

**OK**

**RS**

**REPAIR OR REPLACE FLOOR WIRE**

<b>DTC</b>	<b>B1625/22</b>	<b>Front Passenger Side - Side Airbag Sensor Assembly Circuit Malfunction</b>
------------	-----------------	---

**DESCRIPTION**

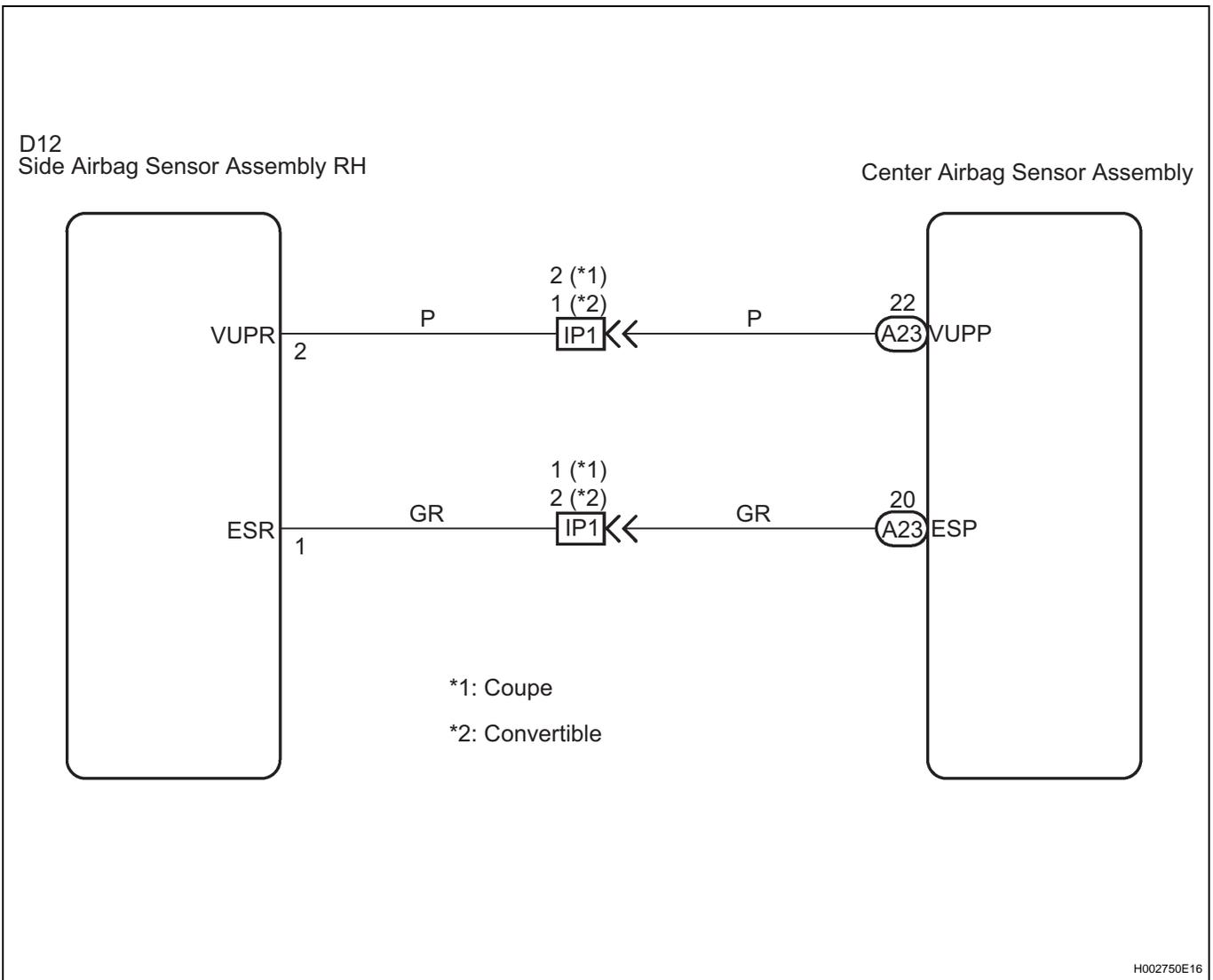
The side airbag sensor assembly RH consists of the safing sensor, the diagnostic circuit, the lateral deceleration sensor, etc.

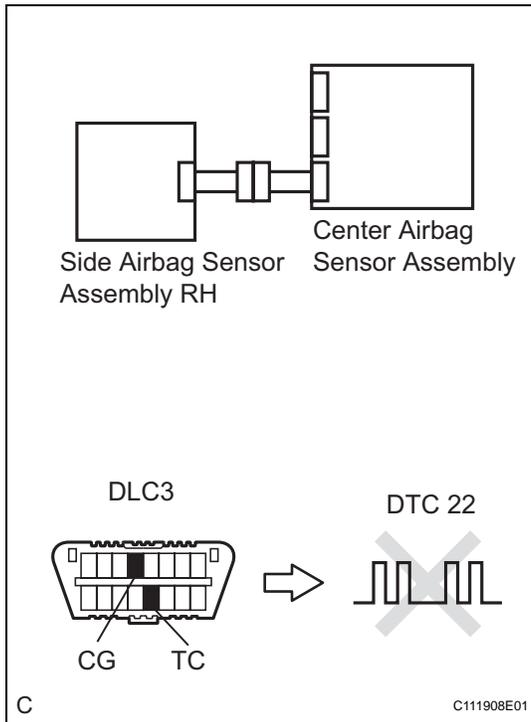
If the center airbag sensor assembly receives signals from the lateral deceleration sensor, it determines whether or not the SRS should be activated.

DTC B1625/22 is recorded when a malfunction is detected in the front passenger side - side airbag sensor assembly circuit.

DTC No.	DTC Detecting Condition	Trouble Area
B1625/22	<ul style="list-style-type: none"> <li>The center airbag sensor assembly receives a line short circuit signal, an open circuit signal, a short circuit to ground signal or a short circuit to B+ signal in the front passenger side - side airbag sensor assembly circuit for 2 seconds.</li> <li>Side airbag sensor assembly RH malfunction</li> <li>Center airbag sensor assembly malfunction</li> </ul>	<ul style="list-style-type: none"> <li>Floor wire No.2</li> <li>Front door wire RH</li> <li>Side airbag sensor assembly RH</li> <li>Center airbag sensor assembly</li> </ul>

**WIRING DIAGRAM**



**1 CHECK DTC**

- Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- Clear the DTCs stored in memory (See page RS-36).
- Turn the ignition switch to the LOCK position.
- Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- Check the DTCs (See page RS-36).

**OK:****DTC B1625/22 is not output.****HINT:**

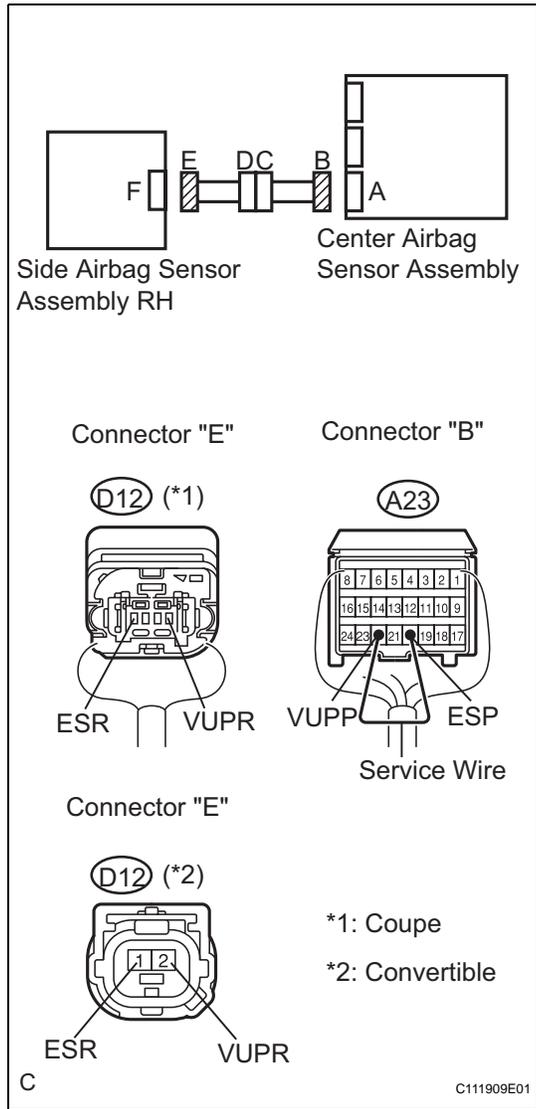
Codes other than DTC B1625/22 may be output at this time, but they are not related to this check.

**OK****USE SIMULATION METHOD TO CHECK****RS****NG****2 CHECK CONNECTION OF CONNECTORS**

- Turn the ignition switch to the LOCK position.
- Disconnect the negative (-) terminal cable from the battery, and wait for at least 90 seconds.
- Check that the connectors are properly connected to the center airbag sensor assembly and the side airbag sensor assembly RH.

**OK:****The connectors are connected.****NG****CONNECT CONNECTORS, THEN GO TO STEP 1****OK**

**3 CHECK FRONT PASSENGER SIDE - SIDE AIRBAG SENSOR ASSEMBLY CIRCUIT (OPEN)**



- (a) Disconnect the connectors from the center airbag sensor assembly and the side airbag sensor assembly RH.
- (b) Using a service wire, connect A23-22 (VUPP) and A23-20 (ESP) of connector "B".

**NOTICE:**

**Do not forcibly insert a service wire into the terminals of the connector when connecting.**

- (c) Measure the resistance according to the value(s) in the table below.

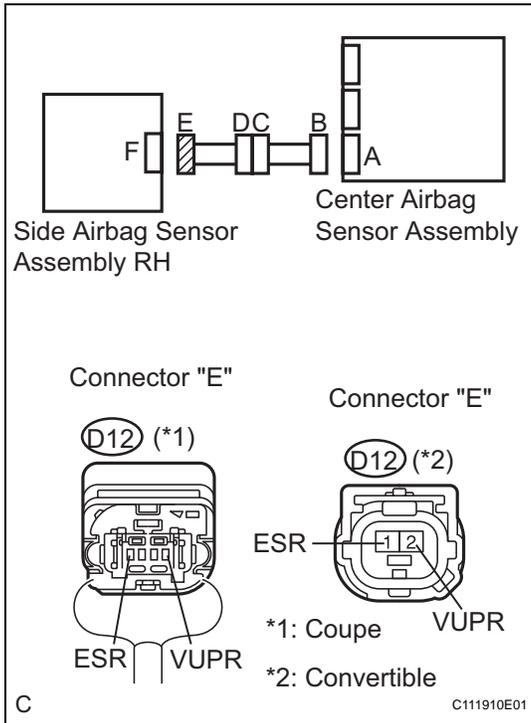
**Resistance**

Tester connection	Condition	Specified condition
D12-2 (VUPR) - D12-1 (ESR)	Always	Below 1 Ω

**NG** → **Go to step 8**

**OK**

**4 CHECK FRONT PASSENGER SIDE - SIDE AIRBAG SENSOR ASSEMBLY CIRCUIT (SHORT)**



- (a) Disconnect the service wire from connector "B".
- (b) Measure the resistance according to the value(s) in the table below.

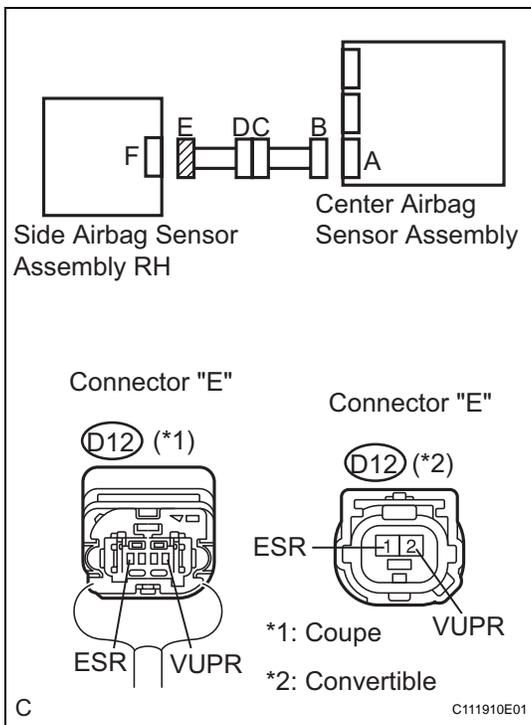
**Resistance**

Tester connection	Condition	Specified condition
D12-2 (VUPR) - D12-1 (ESR)	Always	1 MΩ or higher

**NG** → **Go to step 9**

**RS** **OK**

**5 CHECK FRONT PASSENGER SIDE - SIDE AIRBAG SENSOR ASSEMBLY CIRCUIT (SHORT TO B+)**



- (a) Connect the negative (-) terminal cable to the battery, and wait for at least 2 seconds.
- (b) Turn the ignition switch to the ON position.
- (c) Measure the voltage according to the value(s) in the table below.

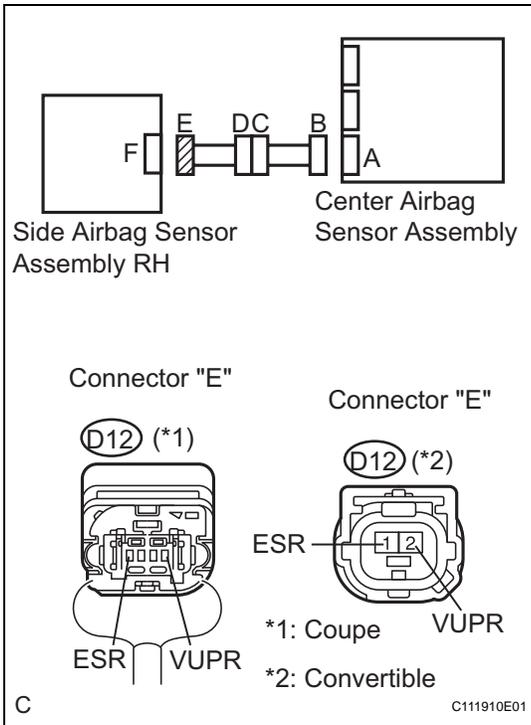
**Voltage**

Tester connection	Condition	Specified condition
D12-2 (VUPR) - Body ground	Ignition switch ON	Below 1 V
D12-1 (ESR) - Body ground	Ignition switch ON	Below 1 V

**NG** → **Go to step 10**

OK

**6 CHECK FRONT PASSENGER SIDE - SIDE AIRBAG SENSOR ASSEMBLY CIRCUIT (SHORT TO GROUND)**



- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery, and wait for at least 90 seconds.
- (c) Measure the resistance according to the value(s) in the table below.

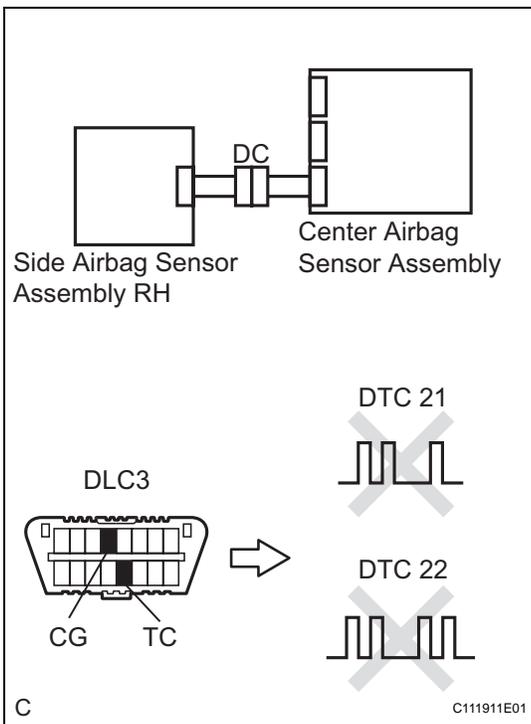
**Resistance**

Tester connection	Condition	Specified condition
D12-2 (VUPR) - Body ground	Always	1 MΩ or higher
D12-1 (ESR) - Body ground	Always	1 MΩ or higher

**NG** → **Go to step 11**

OK

**7 CHECK SIDE AIRBAG SENSOR ASSEMBLY RH**



- (a) Connect the connectors to the center airbag sensor assembly.
- (b) Interchange the side airbag sensor assembly RH with LH and connect the connectors to them.
- (c) Connect the negative (-) terminal cable to the battery, and wait for at least 2 seconds.
- (d) Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- (e) Clear the DTCs stored in memory (See page RS-36).
- (f) Turn the ignition switch to the LOCK position.
- (g) Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- (h) Check the DTCs (See page RS-36).

**Result**

Result	Proceed to
DTC B1625/22 is output.	A
DTC B1620/21 is output.	B
DTC B1620/21 and B1625/22 are not output.	C

RS

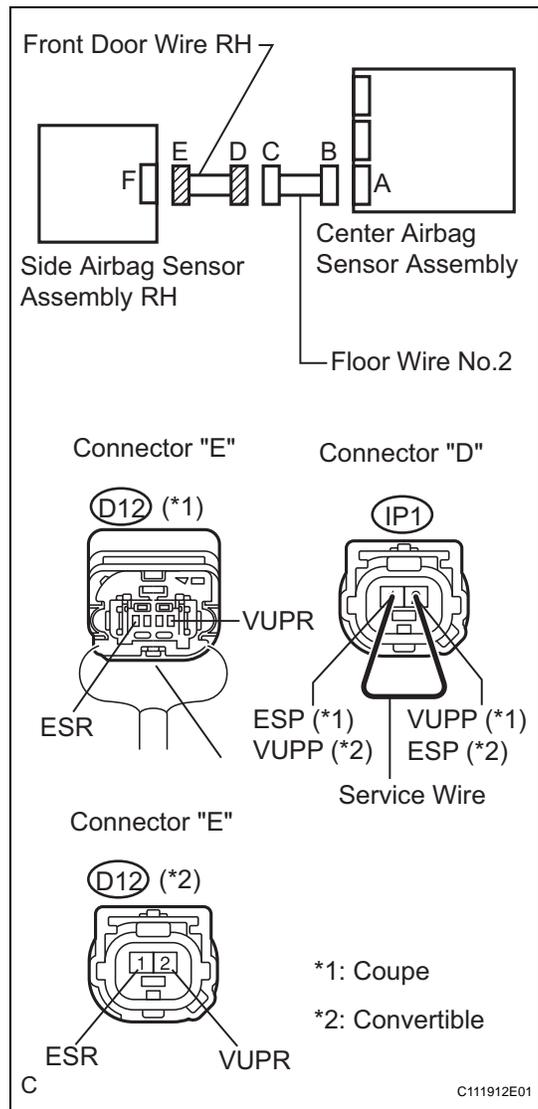
**A** REPLACE CENTER AIRBAG SENSOR ASSEMBLY

**B** REPLACE SIDE AIRBAG SENSOR ASSEMBLY RH

**C**

USE SIMULATION METHOD TO CHECK

**8 CHECK FRONT DOOR WIRE RH (OPEN)**



- (a) Disconnect the service wire from connector "B".
- (b) Disconnect the front door wire RH connector from the floor wire No.2.
- (c) Coupe:  
Using a service wire, connect IP1-2 (VUPP) and IP1-1 (ESP) of connector "D".
- (d) Convertible:  
Using a service wire, connect IP1-1 (VUPP) and IP1-2 (ESP) of connector "D".

**NOTICE:**

**Do not forcibly insert a service wire into the terminals of the connector when connecting.**

- (e) Measure the resistance according to the value(s) in the table below.

**Resistance**

Tester connection	Condition	Specified condition
D12-2 (VUPR) - D12-1 (ESR)	Always	Below 1 Ω

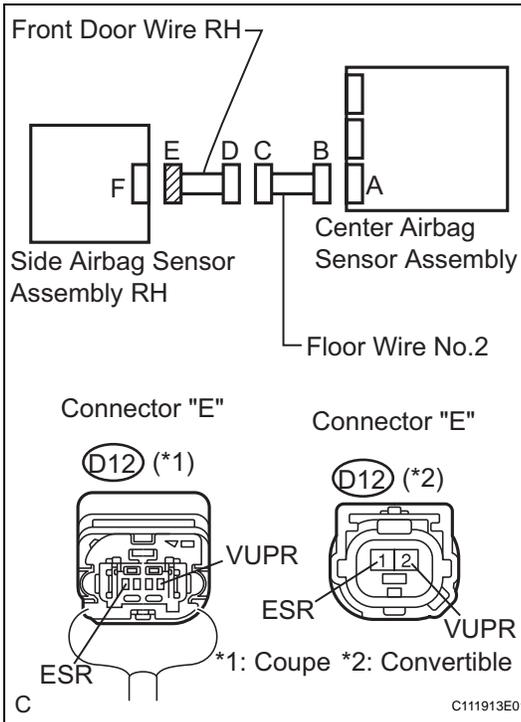
**NG** REPAIR OR REPLACE FRONT DOOR WIRE RH

**OK**

REPAIR OR REPLACE FLOOR WIRE NO.2

RS

**9 CHECK FRONT DOOR WIRE RH (SHORT)**



- (a) Disconnect the front door wire RH connector from the floor wire No.2.
- (b) Measure the resistance according to the value(s) in the table below.

**Resistance**

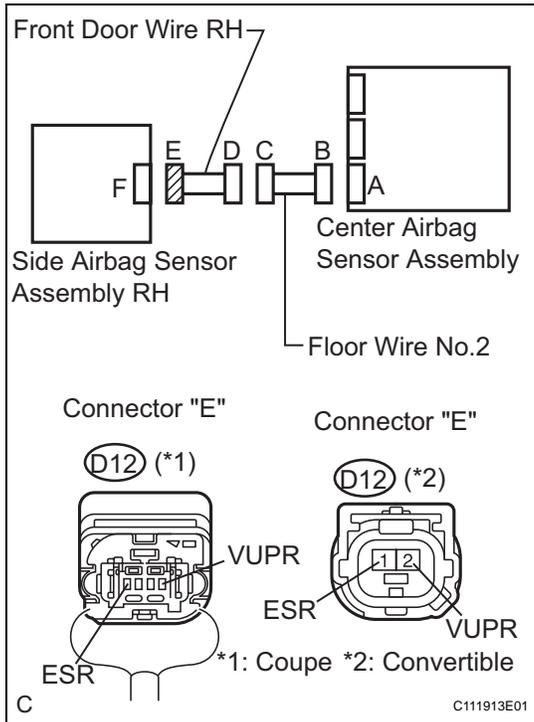
Tester connection	Condition	Specified condition
D12-2 (VUPR) - D12-1 (ESR)	Always	1 MΩ or higher

**NG** **REPAIR OR REPLACE FRONT DOOR WIRE RH**

**OK**

**REPAIR OR REPLACE FLOOR WIRE NO.2**

**RS**

**10 CHECK FRONT DOOR WIRE RH (SHORT TO B+)**

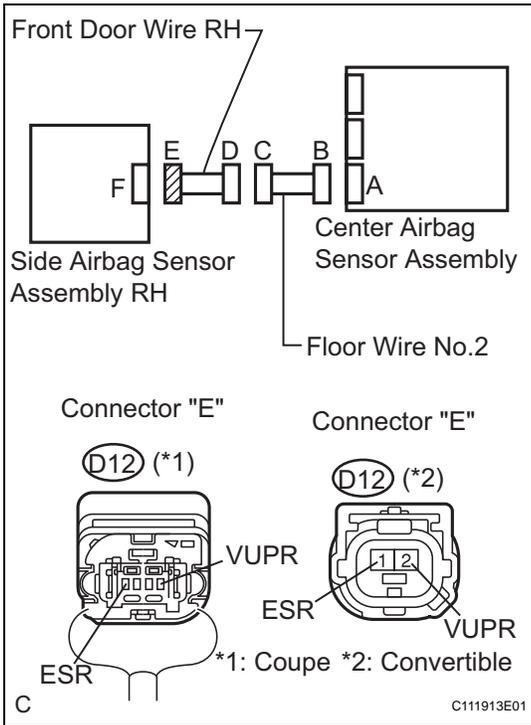
- Turn the ignition switch to the LOCK position.
- Disconnect the negative (-) terminal cable from the battery, and wait for at least 90 seconds.
- Disconnect the front door wire RH connector from the floor wire No.2.
- Connect the negative (-) terminal cable to the battery, and wait for at least 2 seconds.
- Turn the ignition switch to the ON position.
- Measure the voltage according to the value(s) in the table below.

**Voltage**

Tester connection	Condition	Specified condition
D12-2 (VUPR) - Body ground	Ignition switch ON	Below 1 V
D12-1 (ESR) Body ground	Ignition switch ON	Below 1 V

**NG****REPAIR OR REPLACE FRONT DOOR WIRE RH****OK****RS****REPAIR OR REPLACE FLOOR WIRE NO.2**

**11 CHECK FRONT DOOR WIRE RH (SHORT TO GROUND)**



- (a) Disconnect the front door wire RH connector from the floor wire No.2.
- (b) Measure the resistance according to the value(s) in the table below.

**Resistance**

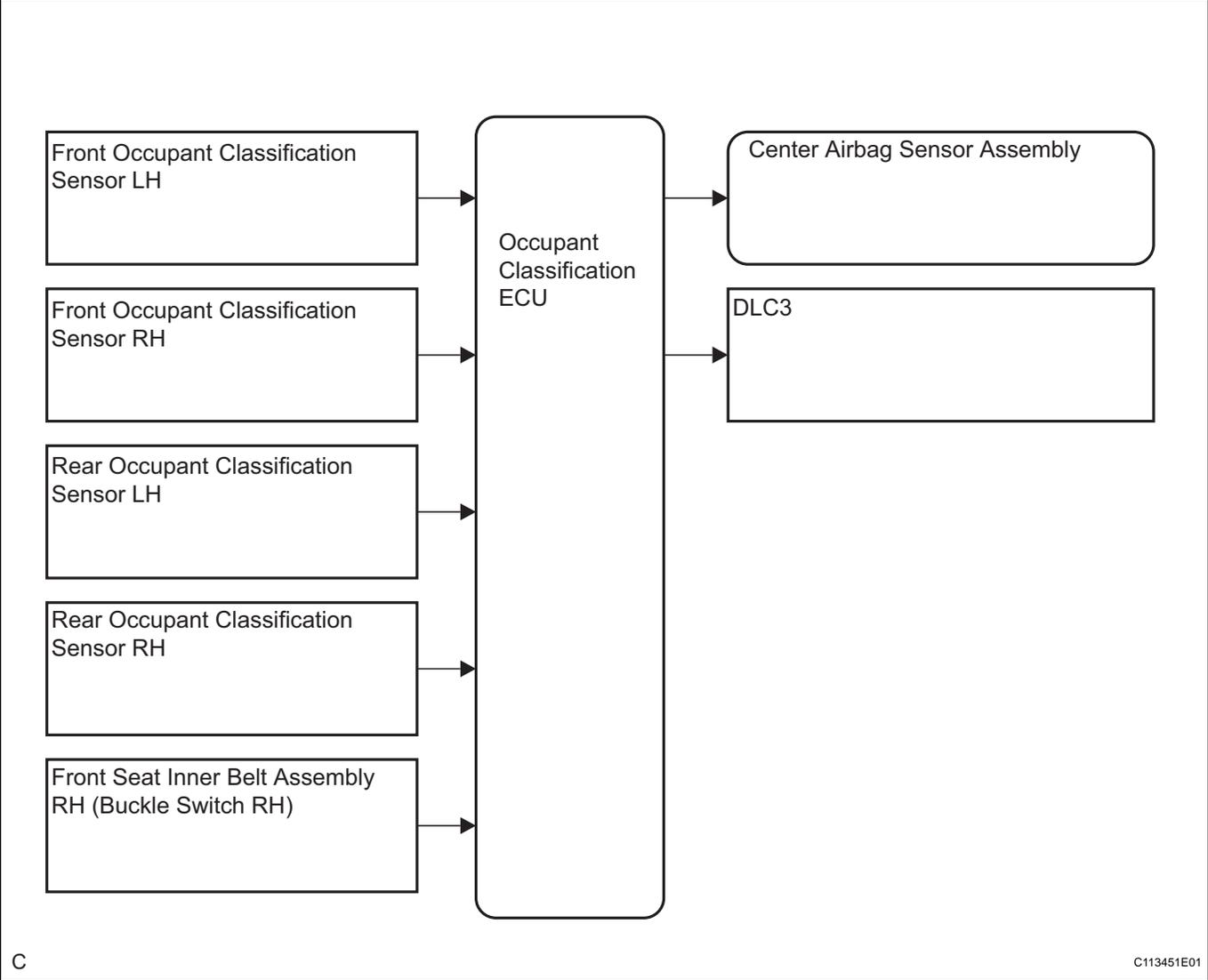
Tester connection	Condition	Specified condition
D12-2 (VUPR) - Body ground	Always	1 MΩ or higher
D12-1 (ESR) Body ground	Always	1 MΩ or higher

**NG REPAIR OR REPLACE FRONT DOOR WIRE RH**

**OK**

**REPAIR OR REPLACE FLOOR WIRE NO.2**

# SYSTEM DIAGRAM



RS

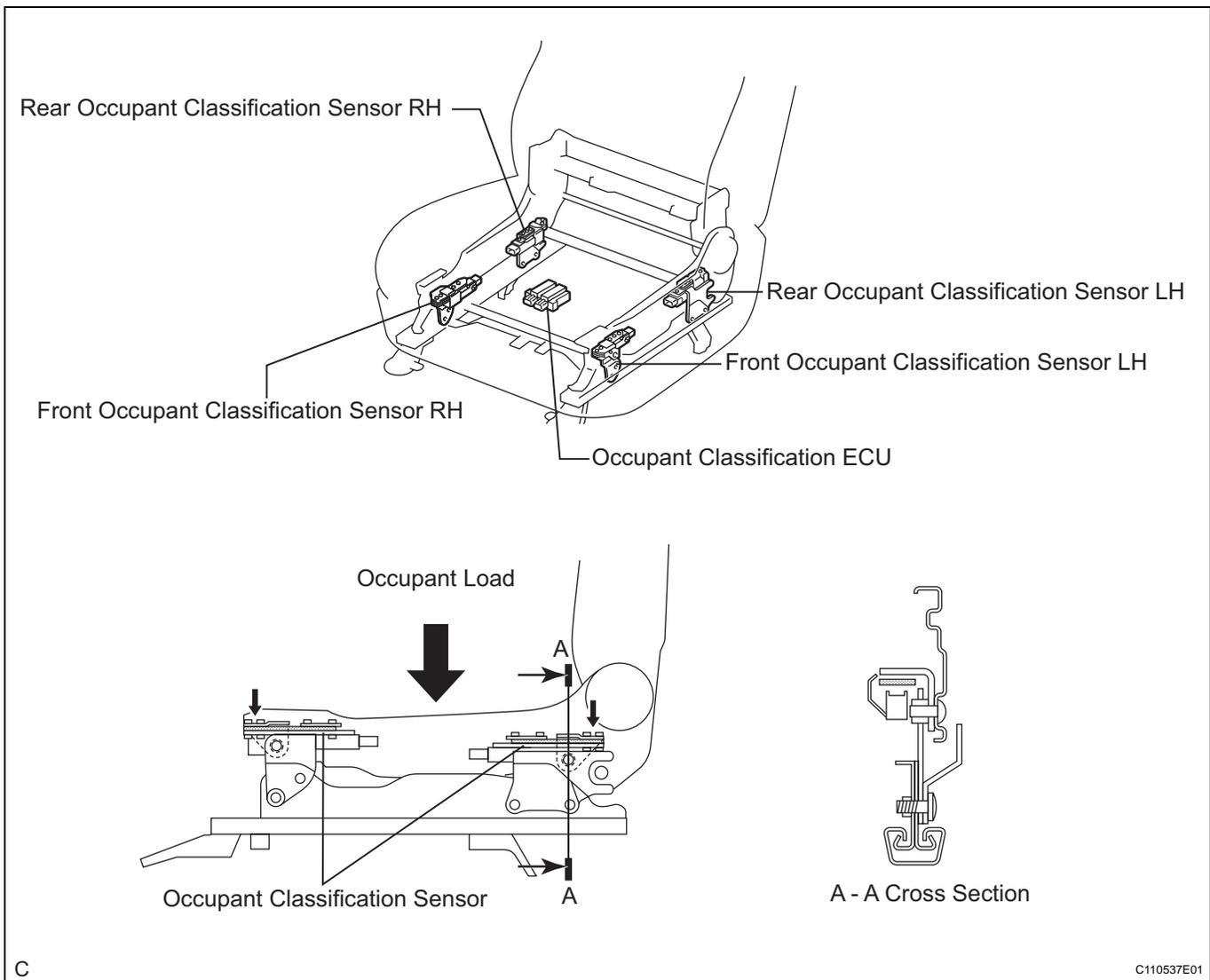
## SYSTEM DESCRIPTION

### 1. DESCRIPTION OF OCCUPANT CLASSIFICATION SYSTEM

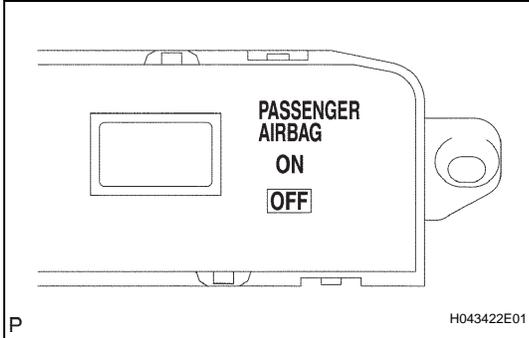
#### (a) GENERAL DESCRIPTION.

- (1) In the occupant classification system, the occupant classification ECU calculates the weight of the occupant based on a signal from the occupant classification sensors. This system recognizes the occupant to be a child if it detects a weight of less than 36 kg (79.37 lb), and disables the front passenger airbag and front passenger side-side airbag.
- (2) This system is mainly comprised of 4 occupant classification sensors that detect the load on the front passenger seat. The occupant classification ECU controls the system, and the passenger airbag ON/OFF indicator indicates the ON/OFF condition of the front passenger airbag and front passenger side-side airbag.

#### (b) OCCUPANT CLASSIFICATION SENSOR.



RS



- (1) The occupant classification sensors are installed on 4 brackets connecting the seat rail and seat frame. Accordingly, when load is applied to the front passenger seat by an occupant sitting in it, the occupant classification sensors register a distortion.
- (c) DESCRIPTION FOR PASSENGER AIRBAG ON/OFF INDICATOR.
- (1) The passenger airbag ON/OFF indicator is installed on the clock assembly. This indicator informs the driver by ON/OFF indication, whether the occupant classification ECU puts the front passenger airbag assembly into an active state or inactive state.
  - (2) If a malfunction occurs in the occupant classification system, "OFF" indication of the passenger airbag ON/OFF indicator and the SRS warning light turn on.

## HOW TO PROCEED WITH TROUBLESHOOTING

The intelligent tester can be used in steps 4, 6, 8 and 9.

**1** VEHICLE BROUGHT TO WORKSHOP

NEXT

**2** CUSTOMER PROBLEM ANALYSIS

NEXT

**3** PASSENGER AIRBAG ON/OFF INDICATOR CHECK

NEXT

**4** DTCs CHECK (Present and Past DTCs)

(a) Check for DTCs.

Result

Result	Proceed to
DTC is output.	A
DTC is not output.	B

B

GO TO PROBLEM SYMPTOMS TABLE

A

**5** DTCs CHART

NEXT

**6** CIRCUIT INSPECTION

NEXT

**7** REPAIR

NEXT

**8** CLEAR DTCs (Present and Past DTCs)

(a) Clear for DTCs.

NEXT

**9** DTCs CHECK (Present and Past DTCs)

(a) Check for DTCs.

Result

Result	Proceed to
DTC is not output.	A
DTC is output.	B

**B** Go to step 5

A

**10** SYMPTOM SIMULATION

(a) Check the passenger airbag ON/OFF indicator condition.

Result

Result	Proceed to
Passenger airbag ON/OFF indicator is operate normally.	A
Passenger airbag ON/OFF indicator ("OFF") and SRS warning light comes on.	B

**B** Go to step 5

A

**11** CONFIRMATION TEST

NEXT

END

RS

## INITIALIZATION

### 1. ZERO POINT CALIBRATION

#### NOTICE:

**Make sure that the front passenger seat is not occupied before performing the operation.**

#### HINT:

Perform the zero point calibration and sensitivity check if any of the following conditions occur.

- The occupant classification ECU is replaced.
- Accessories (seatback tray and seat cover, etc.) are installed.
- The front passenger seat is removed from the vehicle.
- The passenger airbag ON/OFF indicator ("OFF") comes on when the front passenger seat is not occupied.
- The vehicle is brought to the workshop for repair due to an accident or a collision.

- (a) Zero point calibration and sensitivity check procedures.

#### HINT:

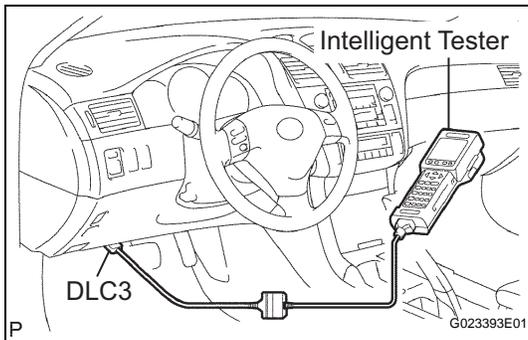
Make sure that zero point calibration has finished normally, and then perform the sensitivity check.

- (1) Adjust the seat position according to the table below.

Adjustment Component	Position
Slide Direction	Rearmost position
Reclining Angle	Upright position
Headrest Height	Lowest position

- (2) Connect the intelligent tester to the DLC3.

- (3) Turn the ignition switch to the ON position.



(4) Perform the zero point calibration by following the prompts on the tester screen.

**ZERO POINT CALIBRATION PROCEDURE**

“1: DIAGNOSIS” - “1: OBD/MOBD” - “MODEL YEAR” - “MODEL SELECTION” - “CAMRY SOLARA” -  
 Select the option parts” - “9: OCCUPANT DETECT”  
 Refer to the following screen flow.

DIAGNOSTIC MENU  
 OCCUPANT DETECT

1: DATA LIST  
 2: DTC INFO

4: SNAPSHOT  
**5: ZERO CALIBRATION**  
 6: SENSITIVITY CHK



NOTICE

Please confirm seat position.

Slide: Max rear  
 Recline: Max upright  
 Headrest: Max down  
 Lifter: Max down

PRESS [ENTER] or [EXIT]



NOTICE

Confirm that nothing is placed on the passenger seat.

PRESS [ENTER] or [EXIT]



NOTICE

Do you wish to start "ZERO CALIBRATION"?

PRESS [YES] or [NO]



ZERO CALIBRATION

COMPLETED

Next, perform the SENSITIVITY CHECK.

PRESS [ENTER]

Perform sensitivity check.

ZERO CALIBRATION

FAILED

Failed to SECURITY ACCESS.

Try again  
 PRESS [ENTER]

ZERO CALIBRATION

FAILED

EEPROM writing error  
 Please check DTCs

PRESS [ENTER]

Perform DTC check up repaired.

ZERO CALIBRATION

FAILED

Sensor range over malfunction

Front Left ———[ ]  
 Front Right ———[ ]  
 Rear Left ———[ ]  
 Rear Right ———[ ]

PRESS [ENTER]

Sensor information is expressed as OK, MAX. or MIN. in [ ].

If MAX. or MIN. is eisplayd,, replce the front seat outer belt assemhby.

RS

C

C113452E01

**HINT:**  
 Refer to the intelligent tester operator's manual for further details.

**OK:**

**"COMPLETE" is displayed.**

- (5) Perform the sensitivity check by following the prompts on the tester screen.
- (6) Confirm that the beginning sensor reading within standard value.

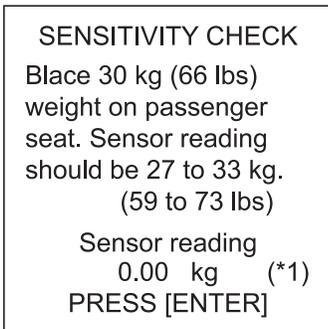
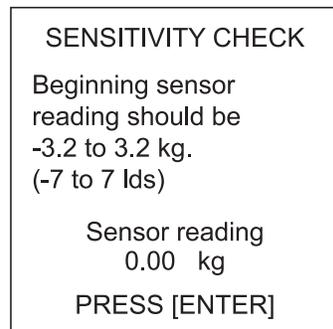
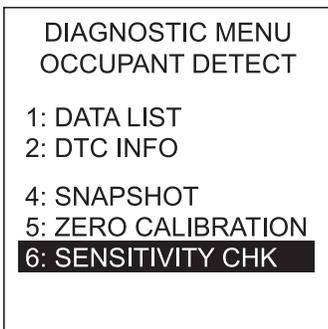
**Standard value:**

**-3.2 to 3.2 kg (-7 to 7 lb)**

- (7) Place a 30 kg (66.14 lb) weight (eg. a 30 kg (66.14 lb) of lead mass) onto the front passenger seat.
- (8) Confirm that the sensitivity is within the standard value.

**SENSITIVITY CHECK PROCEDURE**

“1: DIAGNOSIS” - “1: OBD/MOBD” - “MODEL YEAR” - “MODEL SELECTION = CAMRY SOLARA” -  
Select the option parts - “9: OCCUPANT DETECT” - Refer to the following screen flow.



\*1: kg = lb

Unit can be changed based on unit conversion setting.

**[System Selection Screen]**

“1: DIAGNOSIS” - “9: SETUP” - “4: UNIT CONVERSION”  
- “WEIGHT” (kg = lbs)

**RS**

**Standard value:**

**27 to 33 kg (59.52 to 72.75 lb)**

**HINT:**

- When performing the sensitivity check, use a solid metal weight (the check result may not appear properly if the weight made from liquid is used).

- When the sensitivity deviates from the standard value, retighten the bolts of the front passenger seat taking care not to deform the seat rail. After performing this procedure, if the sensitivity is not within the standard value, replace the front seat assembly RH.
- When zero point calibration has not finished normally, replace the front seat assembly RH.

<b>DTC</b>	<b>B1785</b>	<b>Front Occupant Classification Sensor LH Collision Detection</b>
------------	--------------	--

**DESCRIPTION**

DTC B1785 is output when the occupant classification ECU receives a collision detection signal sent by the front occupant classification sensor LH if an accident occurs.  
 DTC B1785 is also output when the front seat assembly RH is subjected to a strong impact, even if an actual accident does not occur.  
 However, when the occupant classification ECU outputs a collision detection signal, even if the vehicle is not in a collision, DTC B1785 can be cleared by "Zero point calibration" and "Sensitivity check".  
 Therefore, if DTC B1785 is output, first perform "Zero point calibration" and "Sensitivity check".

DTC No.	DTC Detecting Condition	Trouble Area
B1785	<ul style="list-style-type: none"> <li>• Front seat assembly RH malfunction</li> <li>• Occupant classification ECU malfunction</li> <li>• Front occupant classification sensor LH sensed large load</li> </ul>	<ul style="list-style-type: none"> <li>• Occupant classification ECU</li> <li>• Front seat assembly RH (Front occupant classification sensor LH)</li> </ul>

**WIRING DIAGRAM**

See page [RS-202](#).

<b>1</b>	<b>PERFORM ZERO POINT CALIBRATION</b>
----------	---------------------------------------

- (a) Connect the intelligent tester to the DLC3.
- (b) Turn the ignition switch to the ON position.
- (c) Using the intelligent tester, perform "Zero point calibration" (See page [RS-185](#)).

**OK:**

The "COMPLETED" is displayed.



<b>2</b>	<b>PERFORM SENSITIVITY CHECK</b>
----------	----------------------------------

- (a) Using the intelligent tester, perform "Sensitivity check" (See page [RS-185](#)).

**Standard value:**

27 to 33 kg (59.52 to 72.75 lb)



<b>3</b>	<b>CHECK DTC</b>
----------	------------------

- (a) Turn the ignition switch to the ON position.
- (b) Clear the DTCs stored in memory (See page [RS-192](#)).

**HINT:**

First clear DTCs stored in the occupant classification ECU and then in the center airbag sensor assembly.

- (c) Turn the ignition switch to the LOCK position.
- (d) Turn the ignition switch to the ON position.
- (e) Check the DTCs (See page [RS-192](#)).

**OK:**

**DTC B1785 is not output.**

**HINT:**

Codes other than DTC B1785 may be output at this time, but they are not related to this check.

OK

END

NG

#### 4 REPLACE FRONT SEAT ASSEMBLY RH

- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery.
- (c) Replace the front seat assembly RH (See page [SE-18](#) or [SE-30](#)).

**HINT:**

Perform the inspection using parts from a normal vehicle if possible.

NEXT

#### 5 PERFORM ZERO POINT CALIBRATION

- (a) Connect the negative (-) terminal cable to the battery.
- (b) Connect the intelligent tester to the DLC3.
- (c) Turn the ignition switch to the ON position.
- (d) Using the intelligent tester, perform "Zero point calibration" (See page [RS-185](#)).

**OK:**

**The "COMPLETED" is displayed.**

NG

Go to step 8

OK

#### 6 PERFORM SENSITIVITY CHECK

- (a) Using the intelligent tester, perform "Sensitivity check" (See page [RS-185](#)).

**Standard value:**

**27 to 33 kg (59.52 to 72.75 lb)**

NG

Go to step 8

OK

#### 7 CHECK DTC

- (a) Turn the ignition switch to the ON position.

- (b) Clear the DTCs stored in memory (See page [RS-192](#)).  
HINT:  
First clear DTCs stored in the occupant classification ECU and then in the center airbag sensor assembly.
- (c) Turn the ignition switch to the LOCK position.
- (d) Turn the ignition switch to the ON position.
- (e) Check the DTCs (See page [RS-192](#)).

**OK:**

**DTC B1785 is not output.**

HINT:

Codes other than DTC B1785 may be output at this time, but they are not related to this check.

OK → END

NG

**8 REPLACE OCCUPANT CLASSIFICATION ECU**

- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery.
- (c) Replace the occupant classification ECU (See page [RS-320](#)).

NEXT

**9 PERFORM ZERO POINT CALIBRATION**

**RS**

- (a) Connect the negative (-) terminal cable to the battery.
- (b) Connect the intelligent tester to the DLC3.
- (c) Turn the ignition switch to the ON position.
- (d) Using the intelligent tester, perform "Zero point calibration" (See page [RS-185](#)).

**OK:**

The "**COMPLETED**" is displayed.

NEXT

**10 PERFORM SENSITIVITY CHECK**

- (a) Using the intelligent tester, perform "Sensitivity check" (See page [RS-185](#)).

**Standard value:**

**27 to 33 kg (59.52 to 72.75 lb)**

NEXT

END

# OCCUPANT CLASSIFICATION SYSTEM

## PRECAUTION

### NOTICE:

When disconnecting the negative (-) battery cable, initialize the following systems after the cable is reconnected.

System Name	See procedure
Power Window Control System	IN-24
Sliding Roof System	IN-24

### 1. INSPECTION PROCEDURE FOR VEHICLE INVOLVED IN ACCIDENT

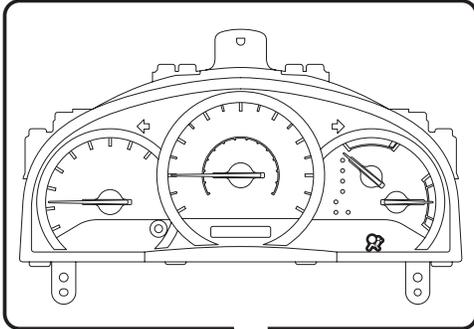
- (a) Perform the zero point calibration and sensitivity check if any of the following conditions occur.
- The occupant classification ECU is replaced.
  - Accessories (seatback tray and seat cover, etc.) are installed.
  - The front passenger seat is removed from the vehicle.
  - The passenger airbag ON/OFF indicator ("OFF") comes on when the front passenger seat is not occupied.
  - The vehicle is brought to the workshop for repair due to an accident or a collision.

### NOTICE:

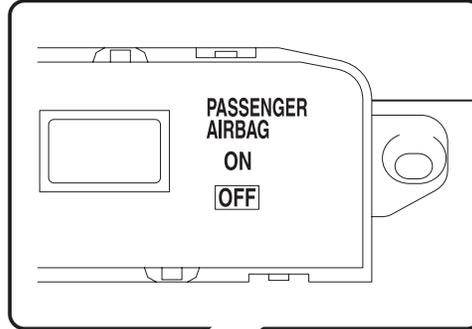
When an accident vehicle is brought into the workshop for repair, check the flatness of the body side that is equipped with the passenger seat. If the flatness is not within  $\pm 3.0$  mm (0.118 in.), adjust it to the specified range.

# PARTS LOCATION

COMBINATION METER:



CLOCK ASSEMBLY:



PASSENGER AIRBAG ON/OFF INDICATOR

FRONT OCCUPANT CLASSIFICATION SENSOR RH

REAR OCCUPANT CLASSIFICATION SENSOR RH

RS

DLC3

CENTER AIRBAG SENSOR ASSEMBLY

FRONT OCCUPANT CLASSIFICATION SENSOR LH

OCCUPANT CLASSIFICATION ECU

FRONT SEAT INNER BELT ASSEMBLY RH

REAR OCCUPANT CLASSIFICATION LH

<b>DTC</b>	<b>B1786</b>	<b>Front Occupant Classification Sensor RH Collision Detection</b>
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**DESCRIPTION**

DTC B1786 is output when the occupant classification ECU receives a collision detection signal sent by the front occupant classification sensor RH if an accident occurs.

DTC B1786 is also output when the front seat assembly RH is subjected to a strong impact, even if an actual accident does not occur.

However, when the occupant classification ECU outputs a collision detection signal, even if the vehicle is not in a collision, DTC B1786 can be cleared by "Zero point calibration" and "Sensitivity check".

Therefore, if DTC B1786 is output, first perform "Zero point calibration" and "Sensitivity check".

DTC No.	DTC Detection Condition	Trouble Area
B1786	<ul style="list-style-type: none"> <li>• Front seat assembly RH malfunction</li> <li>• Occupant classification ECU malfunction</li> <li>• Front occupant classification sensor RH sensed large load</li> </ul>	<ul style="list-style-type: none"> <li>• Occupant classification ECU</li> <li>• Front seat assembly RH (Front occupant classification sensor RH)</li> </ul>

**WIRING DIAGRAM**

See page [RS-208](#).

**1 PERFORM ZERO POINT CALIBRATION**

- (a) Connect the intelligent tester to the DLC3.  
 (b) Turn the ignition switch to the ON position.  
 (c) Using the intelligent tester, perform "Zero point calibration" (See page [RS-185](#)).

**OK:**

The "COMPLETED" is displayed.

NG

Go to step 4

OK

**2 PERFORM SENSITIVITY CHECK**

- (a) Using the intelligent tester, perform "Sensitivity check" (See page [RS-185](#) ).

**Standard value:**

27 to 33 kg (59.52 to 72.75 lb)

NG

Go to step 4

OK

**3 CHECK DTC**

- (a) Turn the ignition switch to the ON position.  
 (b) Clear the DTCs stored in memory (See page [RS-192](#)).

**HINT:**

First clear DTCs stored in the occupant classification ECU and then in the center airbag sensor assembly.

- (c) Turn the ignition switch to the LOCK position.
- (d) Turn the ignition switch to the ON position.
- (e) Check the DTCs (See page [RS-192](#)).

**OK:**

**DTC B1786 is not output.**

**HINT:**

Codes other than DTC B1786 may be output at this time, but they are not related to this check.

**OK** → **END**

**NG**

**4 REPLACE FRONT SEAT ASSEMBLY RH**

- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery.
- (c) Replace the front seat assembly RH (See page [SE-18](#) or [SE-30](#)).

**HINT:**

Perform the inspection using parts from a normal vehicle if possible.

**NEXT**

**5 PERFORM ZERO POINT CALIBRATION**

**RS**

- (a) Connect the negative (-) terminal cable to the battery.
- (b) Connect the intelligent tester to the DLC3.
- (c) Turn the ignition switch to the ON position.
- (d) Using the intelligent tester, perform "Zero point calibration" (See page [RS-185](#)).

**OK:**

**The "COMPLETED" is displayed.**

**NG** → **Go to step 8**

**OK**

**6 PERFORM SENSITIVITY CHECK**

- (a) Using the intelligent tester, perform "Sensitivity check" (See page [RS-185](#)).

**Standard value:**

**27 to 33 kg (59.52 to 72.75 lb)**

**NG** → **Go to step 8**

**OK**

**7 CHECK DTC**

- (a) Turn the ignition switch to the ON position.

- (b) Clear the DTCs stored in memory (See page [RS-192](#)).  
HINT:  
First clear DTCs stored in the occupant classification ECU and then in the center airbag sensor assembly.
- (c) Turn the ignition switch to the LOCK position.
- (d) Turn the ignition switch to the ON position.
- (e) Check the DTCs (See page [RS-192](#)).

**OK:****DTC B1786 is not output.****HINT:**

Codes other than DTC B1786 may be output at this time, but they are not related to this check.

OK

END

NG

**8 REPLACE OCCUPANT CLASSIFICATION ECU**

- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery.
- (c) Replace the occupant classification ECU (See page [RS-320](#)).

NEXT

**9 PERFORM ZERO POINT CALIBRATION**

- (a) Connect the negative (-) terminal cable to the battery.
- (b) Connect the intelligent tester to the DLC3.
- (c) Turn the ignition switch to the ON position.
- (d) Using the intelligent tester, perform "Zero point calibration" (See page [RS-185](#)).

**OK:****The "COMPLETED" is displayed.**

NEXT

**10 PERFORM SENSITIVITY CHECK**

- (a) Using the intelligent tester, perform "Sensitivity check" (See page [RS-185](#)).

**Standard value:****27 to 33 kg (59.52 to 72.75 lb)**

NEXT

END

<b>DTC</b>	<b>B1787</b>	<b>Rear Occupant Classification Sensor LH Collision Detection</b>
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**DESCRIPTION**

DTC B1787 is output when the occupant classification ECU receives a collision detection signal sent by the rear occupant classification sensor LH if an accident occurs.

DTC B1787 is also output when the front seat assembly RH is subjected to a strong impact, even if an actual accident does not occur.

However, when the occupant classification ECU outputs a collision detection signal, even if the vehicle is not in a collision, DTC B1787 can be cleared by "Zero point calibration" and "Sensitivity check". Therefore, if DTC B1787 is output, first perform "Zero point calibration" and "Sensitivity check".

DTC No.	DTC Detecting Condition	Trouble Area
B1787	<ul style="list-style-type: none"> <li>• Front seat assembly RH malfunction</li> <li>• Occupant classification ECU malfunction</li> <li>• Rear occupant classification sensor LH sensed large load</li> </ul>	<ul style="list-style-type: none"> <li>• Occupant classification ECU</li> <li>• Front seat assembly RH (Rear occupant classification sensor LH)</li> </ul>

**WIRING DIAGRAM**

See page [RS-214](#).

**1 PERFORM ZERO POINT CALIBRATION**

- (a) Connect the intelligent tester to the DLC3.
- (b) Turn the ignition switch to the ON position.
- (c) Using the intelligent tester, perform "Zero point calibration" (See page [RS-185](#)).

**OK:**

The "COMPLETED" is displayed.



**RS**

**2 PERFORM SENSITIVITY CHECK**

- (a) Using the intelligent tester, perform "Sensitivity check" (See page [RS-185](#)).

**Standard value:**

27 to 33 kg (59.52 to 72.75 lb)



**3 CHECK DTC**

- (a) Turn the ignition switch to the ON position.
  - (b) Clear the DTCs stored in memory (See page [RS-192](#)).
- HINT:**  
First clear DTCs stored in the occupant classification ECU and then in the center airbag sensor assembly.

- (c) Turn the ignition switch to the LOCK position.
- (d) Turn the ignition switch to the ON position.
- (e) Check the DTCs (See page [RS-192](#)).

**OK:**

**DTC B1787 is not output.**

**HINT:**

Codes other than DTC B1787 may be output at this time, but they are not related to this check.

OK

END

NG

#### 4 REPLACE FRONT SEAT ASSEMBLY RH

- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery.
- (c) Replace the front seat assembly RH (See page [SE-18](#) or [SE-30](#)).

**HINT:**

Perform the inspection using parts from a normal vehicle if possible.

NEXT

#### 5 PERFORM ZERO POINT CALIBRATION

- (a) Connect the negative (-) terminal cable to the battery.
- (b) Connect the intelligent tester to the DLC3.
- (c) Turn the ignition switch to the ON position.
- (d) Using the intelligent tester, perform "Zero point calibration" (See page [RS-185](#)).

**OK:**

**The "COMPLETED" is displayed.**

NG

Go to step 8

OK

#### 6 PERFORM SENSITIVITY CHECK

- (a) Using the intelligent tester, perform "Sensitivity check" (See page [RS-185](#)).

**Standard value:**

**27 to 33 kg (59.52 to 72.75 lb)**

NG

Go to step 8

OK

#### 7 CHECK DTC

- (a) Turn the ignition switch to the ON position.

- (b) Clear the DTCs stored in memory (See page [RS-192](#)).  
HINT:  
First clear DTCs stored in the occupant classification ECU and then in the center airbag sensor assembly.
- (c) Turn the ignition switch to the LOCK position.
- (d) Turn the ignition switch to the ON position.
- (e) Check the DTCs (See page [RS-192](#)).

**OK:**

**DTC B1787 is not output.**

HINT:

Codes other than DTC B1787 may be output at this time, but they are not related to this check.

OK → END

NG

**8 REPLACE OCCUPANT CLASSIFICATION ECU**

- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery.
- (c) Replace the occupant classification ECU (See page [RS-320](#)).

NEXT

**9 PERFORM ZERO POINT CALIBRATION**

**RS**

- (a) Connect the negative (-) terminal cable to the battery.
- (b) Connect the intelligent tester to the DLC3.
- (c) Turn the ignition switch to the ON position.
- (d) Using the intelligent tester, perform "Zero point calibration" (See page [RS-185](#)).

**OK:**

The **"COMPLETED"** is displayed.

NEXT

**10 PERFORM SENSITIVITY CHECK**

- (a) Using the intelligent tester, perform "Sensitivity check" (See page [RS-185](#)).

**Standard value:**

**27 to 33 kg (59.52 to 72.75 lb)**

NEXT

END

<b>DTC</b>	<b>B1788</b>	<b>Rear Occupant Classification Sensor RH Collision Detection</b>
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**DESCRIPTION**

DTC B1788 is output when the occupant classification ECU receives a collision detection signal sent by the rear occupant classification sensor RH if an accident occurs.

DTC B1788 is also output when the front seat assembly RH is subjected to a strong impact, even if an actual accident does not occur.

However, when the occupant classification ECU outputs a collision detection signal, even if the vehicle is not in a collision, DTC B1788 can be cleared by "Zero point calibration" and "Sensitivity check".

Therefore, if DTC B1788 is output, first perform "Zero point calibration" and "Sensitivity check".

DTC No.	DTC Detection Condition	Trouble Area
B1788	<ul style="list-style-type: none"> <li>• Front seat assembly RH malfunction</li> <li>• Occupant classification ECU malfunction</li> <li>• Rear occupant classification sensor RH sensed large load</li> </ul>	<ul style="list-style-type: none"> <li>• Occupant classification ECU</li> <li>• Front seat assembly RH (Rear occupant classification sensor RH)</li> </ul>

**WIRING DIAGRAM**

See page [RS-220](#).

**1 PERFORM ZERO POINT CALIBRATION**

- (a) Connect the intelligent tester to the DLC3.  
 (b) Turn the ignition switch to the ON position.  
 (c) Using the intelligent tester, perform "Zero point calibration" (See page [RS-185](#)).

**OK:**

The "COMPLETED" is displayed.

NG

Go to step 4

OK

**2 PERFORM SENSITIVITY CHECK**

- (a) Using the intelligent tester, perform "Sensitivity check" (See page [RS-185](#)).

**Standard value:**

27 to 33 kg (59.52 to 72.75 lb)

NG

Go to step 4

OK

**3 CHECK DTC**

- (a) Turn the ignition switch to the ON position.  
 (b) Clear the DTCs stored in memory (See page [RS-192](#)).

**HINT:**

First clear DTCs stored in the occupant classification ECU and then in the center airbag sensor assembly.

- (c) Turn the ignition switch to the LOCK position.
- (d) Turn the ignition switch to the ON position.
- (e) Check the DTCs (See page [RS-192](#)).

**OK:**

**DTC B1788 is not output.**

**HINT:**

Codes other than DTC B1788 may be output at this time, but they are not related to this check.

**OK** → **END**

**NG**

**4 REPLACE FRONT SEAT ASSEMBLY RH**

- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery.
- (c) Replace the front seat assembly RH (See page [SE-18](#) or [SE-30](#)).

**HINT:**

Perform the inspection using parts from a normal vehicle if possible.

**NEXT**

**5 PERFORM ZERO POINT CALIBRATION**

**RS**

- (a) Connect the negative (-) terminal cable to the battery.
- (b) Connect the intelligent tester to the DLC3.
- (c) Turn the ignition switch to the ON position.
- (d) Using the intelligent tester, perform "Zero point calibration" (See page [RS-185](#)).

**OK:**

**The "COMPLETED" is displayed.**

**NG** → **Go to step 8**

**OK**

**6 PERFORM SENSITIVITY CHECK**

- (a) Using the intelligent tester, perform "Sensitivity check" (See page [RS-185](#)).

**Standard value:**

**27 to 33 kg (59.52 to 72.75 lb)**

**NG** → **Go to step 8**

**OK**

**7 CHECK DTC**

- (a) Turn the ignition switch to the ON position.

- (b) Clear the DTCs stored in memory (See page [RS-192](#)).

HINT:

First clear DTCs stored in the occupant classification ECU and then in the center airbag sensor assembly.

- (c) Turn the ignition switch to the LOCK position.  
 (d) Turn the ignition switch to the ON position.  
 (e) Check the DTCs (See page [RS-192](#)).

**OK:**

**DTC B1788 is not output.**

HINT:

Codes other than DTC B1788 may be output at this time, but they are not related to this check.

OK

END

NG

## 8 REPLACE OCCUPANT CLASSIFICATION ECU

- (a) Turn the ignition switch to the LOCK position.  
 (b) Disconnect the negative (-) terminal cable from the battery.  
 (c) Replace the occupant classification ECU (See page [RS-320](#)).

NEXT

## 9 PERFORM ZERO POINT CALIBRATION

- (a) Connect the negative (-) terminal cable to the battery.  
 (b) Connect the intelligent tester to the DLC3.  
 (c) Turn the ignition switch to the ON position.  
 (d) Using the intelligent tester, perform "Zero point calibration" (See page [RS-185](#)).

**OK:**

The "**COMPLETED**" is displayed.

NEXT

## 10 PERFORM SENSITIVITY CHECK

- (a) Using the intelligent tester, perform "Zero point calibration" (See page [RS-185](#)).

**Standard value:**

**27 to 33 kg (59.52 to 72.75 lb)**

NEXT

END

<b>DTC</b>	<b>B1790</b>	<b>Center Airbag Sensor Assembly Communication Circuit Malfunction</b>
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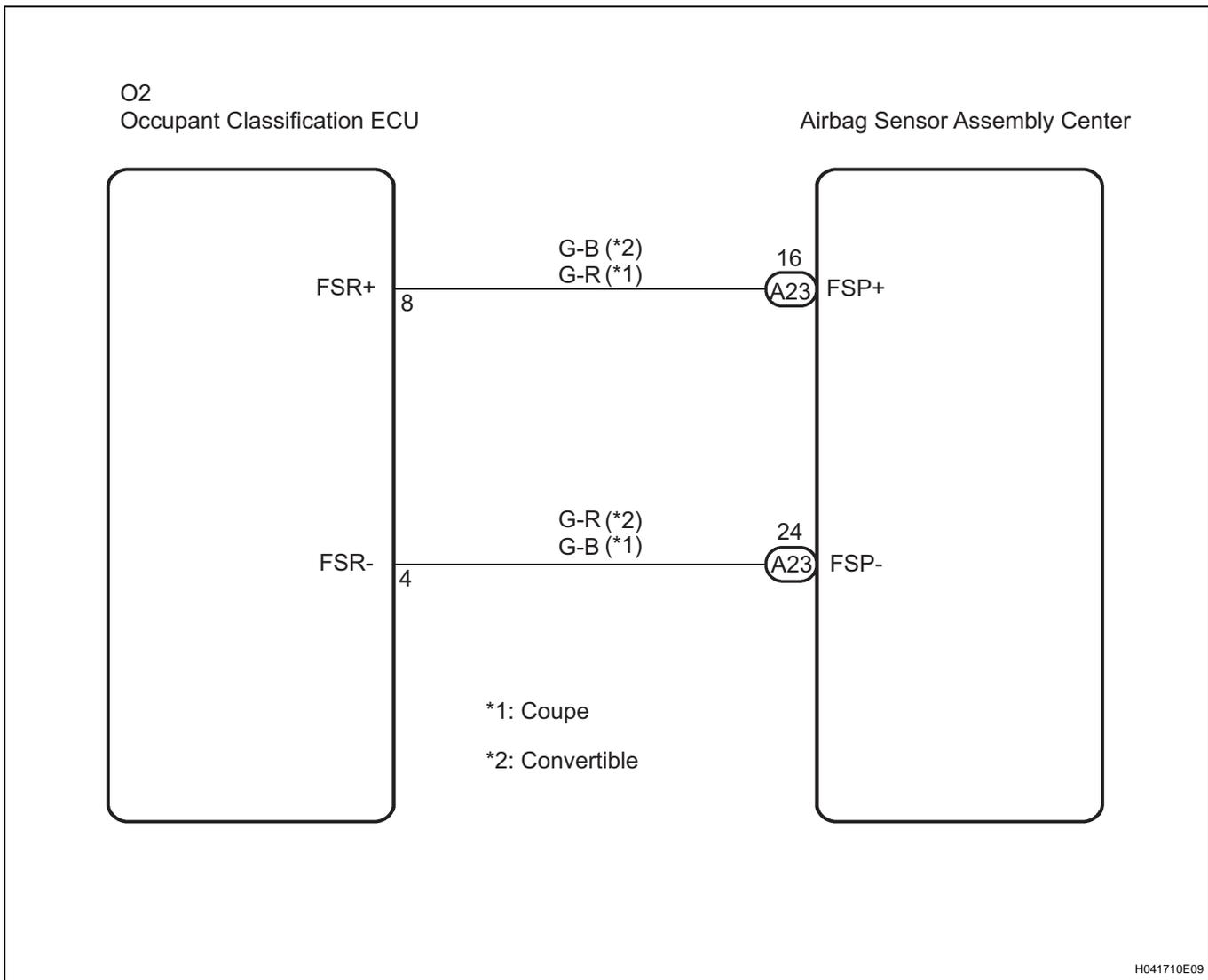
**DESCRIPTION**

The center airbag sensor assembly communication circuit consists of the occupant classification ECU and the center airbag sensor assembly.

DTC B1790 is recorded when a malfunction is detected in the center airbag sensor assembly communication circuit.

DTC No.	DTC Detecting Condition	Trouble Area
B1790	<ul style="list-style-type: none"> <li>• The occupant classification ECU receives a line short circuit signal, an open circuit signal, a short circuit to ground signal or a short circuit to B+ signal in the center airbag sensor assembly communication circuit for 2 seconds.</li> <li>• Center airbag sensor assembly malfunction</li> <li>• Occupant classification ECU malfunction</li> </ul>	<ul style="list-style-type: none"> <li>• Occupant classification ECU</li> <li>• Center airbag sensor assembly</li> <li>• Floor wire No.2</li> </ul>

**WIRING DIAGRAM**



**RS**

## HINT:

- If troubleshooting (wire harness inspection) is difficult to perform, remove the front passenger seat installation bolts to see the under surface of seat cushion.
- In the above case, hold the seat so that it does not fall down. Holding the seat for a long period of time may cause a problem, such as seat rail deformation. Hold the seat only as necessary.

**1 CHECK DTC**

- Turn the ignition switch to the ON position.
- Clear the DTCs stored in memory (See page [RS-192](#)).  
HINT:  
First clear DTCs stored in the occupant classification ECU and then in the center airbag sensor assembly.
- Turn the ignition switch to the LOCK position.
- Turn the ignition switch to the ON position.
- Check the DTCs (See page [RS-192](#)).

**OK:****DTC B1790 is not output.**

## HINT:

Codes other than DTC B1790 may be output at this time, but they are not related to this check.

OK

**USE SIMULATION METHOD TO CHECK**

NG

RS

**2 CHECK CONNECTION OF CONNECTORS**

- Turn the ignition switch to the LOCK position.
- Disconnect the negative (-) terminal cable from the battery.
- Check that the connectors are properly connected to the occupant classification ECU and the center airbag sensor assembly.

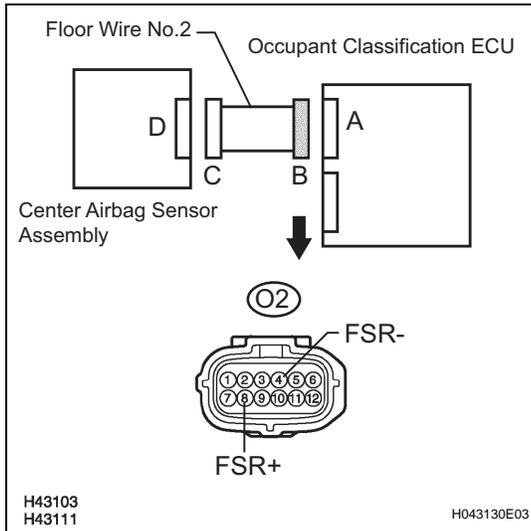
**OK:****The connectors are connected.**

NG

**CONNECT CONNECTORS, THEN GO TO STEP 1**

OK

**3 CHECK FLOOR WIRE NO.2 (SHORT TO B+)**



- (a) Disconnect the connectors from the occupant classification ECU and the center airbag sensor assembly.
- (b) Connect the negative (-) terminal cable to the battery.
- (c) Turn the ignition switch to the ON position.
- (d) Measure the voltage according to the value(s) in the table below.

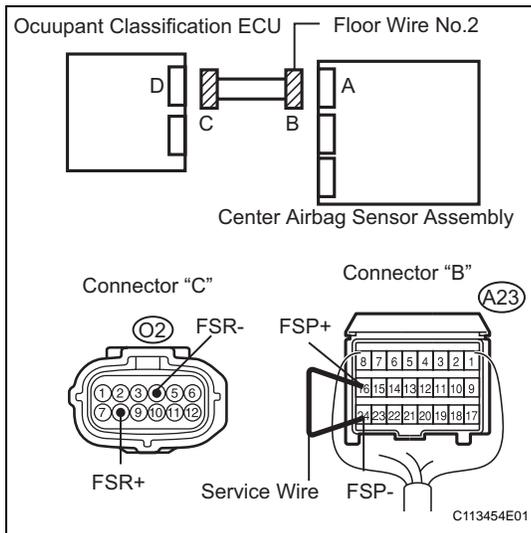
**Voltage**

Tester connection	Condition	Specified condition
O2-8 (FSR+) - Body ground	Ignition switch ON	Below 1 V
O2-4 (FSR-) - Body ground	Ignition switch ON	Below 1 V

**NG** REPAIR OR REPLACE FLOOR WIRE NO.2

**OK**

**4 CHECK FLOOR WIRE NO.2 (OPEN)**



- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery, and wait for at least 90 seconds.
- (c) Using a service wire, connect A23-16 (FSP+) and A23-24 (FSP-) of connector "C".

**NOTICE:**

**Do not forcibly insert a service wire into the terminals of the connector when connecting.**

- (d) Measure the resistance according to the value(s) in the table below.

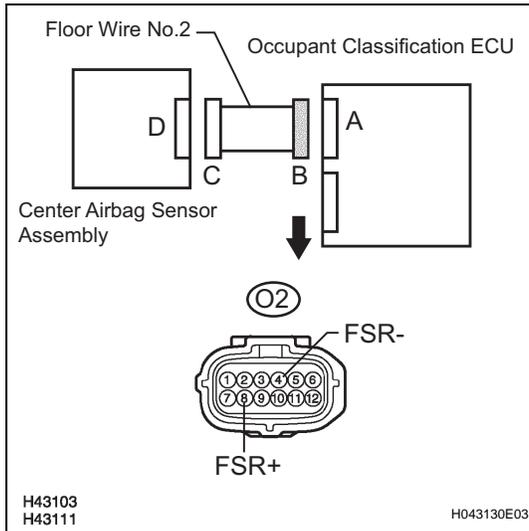
**Resistance**

Tester connection	Condition	Specified condition
O2-8 (FSR+) - O2-4 (FSR-)	Always	Below 1 Ω

**NG** REPAIR OR REPLACE FLOOR WIRE NO.2

**OK**

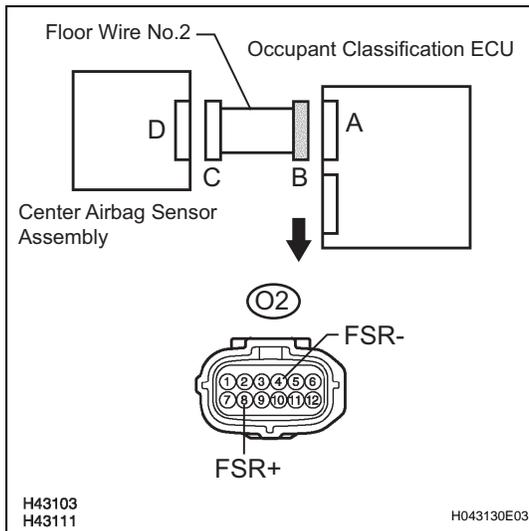
**RS**

**5 CHECK FLOOR WIRE NO.2 (SHORT)**

- (a) Disconnect the service wire from connector "C".  
 (b) Measure the resistance according to the value(s) in the table below.

**Resistance**

Tester connection	Condition	Specified condition
O2-8 (FSR+) - O2-4 (FSR-)	Always	1 M $\Omega$ or higher

**NG****REPAIR OR REPLACE FLOOR WIRE NO.2****OK****6 CHECK FLOOR WIRE NO.2 (SHORT TO GROUND)**

- (a) Measure the resistance according to the value(s) in the table below.

**Standard**

Tester connection	Condition	Specified condition
O2-8 (FSR+) - Body ground	Always	1 M $\Omega$ or higher
O2-4 (FSR-) - Body ground	Always	1 M $\Omega$ or higher

**NG****REPAIR OR REPLACE FLOOR WIRE NO.2****OK****7 CHECK DTC**

- (a) Connect the connectors to the occupant classification ECU and the center airbag sensor assembly.  
 (b) Connect the negative (-) terminal cable to the battery.  
 (c) Turn the ignition switch to the ON position.  
 (d) Clear the DTCs stored in memory (See page [RS-192](#)).  
**HINT:**  
 First clear DTCs stored in the occupant classification ECU and then in the center airbag sensor assembly.

- (e) Turn the ignition switch to the LOCK position.
- (f) Turn the ignition switch to the ON position.
- (g) Check the DTCs (See page [RS-192](#)).

**OK:**

**DTC B1790 is not output.**

**HINT:**

Codes other than DTC B1790 may be output at this time, but they are not related to this check.

OK

**USE SIMULATION METHOD TO CHECK**

NG

## 8 REPLACE OCCUPANT CLASSIFICATION ECU

- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery.
- (c) Replace the occupant classification ECU (See page [RS-320](#)).

**HINT:**

Perform the inspection using parts from a normal vehicle if possible.

NEXT

## 9 PERFORM ZERO POINT CALIBRATION

RS

- (a) Connect the negative (-) terminal cable to the battery.
- (b) Connect the intelligent tester to the DLC3.
- (c) Turn the ignition switch to the ON position.
- (d) Using the intelligent tester, perform "Zero point calibration" (See page [RS-185](#)).

**OK:**

**The "COMPLETED" is displayed.**

NEXT

## 10 PERFORM SENSITIVITY CHECK

- (a) Using the intelligent tester, perform "Sensitivity check" (See page [RS-185](#)).

**Standard value:**

**27 to 33 kg (59.52 to 72.75 lb)**

NEXT

## 11 CHECK DTC

- (a) Turn the ignition switch to the ON position.
- (b) Clear the DTCs stored in memory (See page [RS-192](#)).

## HINT:

First clear DTCs stored in the occupant classification ECU and then in the center airbag sensor assembly.

- (c) Turn the ignition switch to the LOCK position.
- (d) Turn the ignition switch to the ON position.
- (e) Check the DTCs (See page [RS-192](#)).

**OK:**

**DTC B1790 is not output.**

## HINT:

Codes other than DTC B1790 may be output at this time, but they are not related to this check.

**NG****REPLACE CENTER AIRBAG SENSOR ASSEMBLY****OK****END**

<b>DTC</b>	<b>B1793</b>	<b>Occupant Classification Sensor Power Supply Circuit Malfunction</b>
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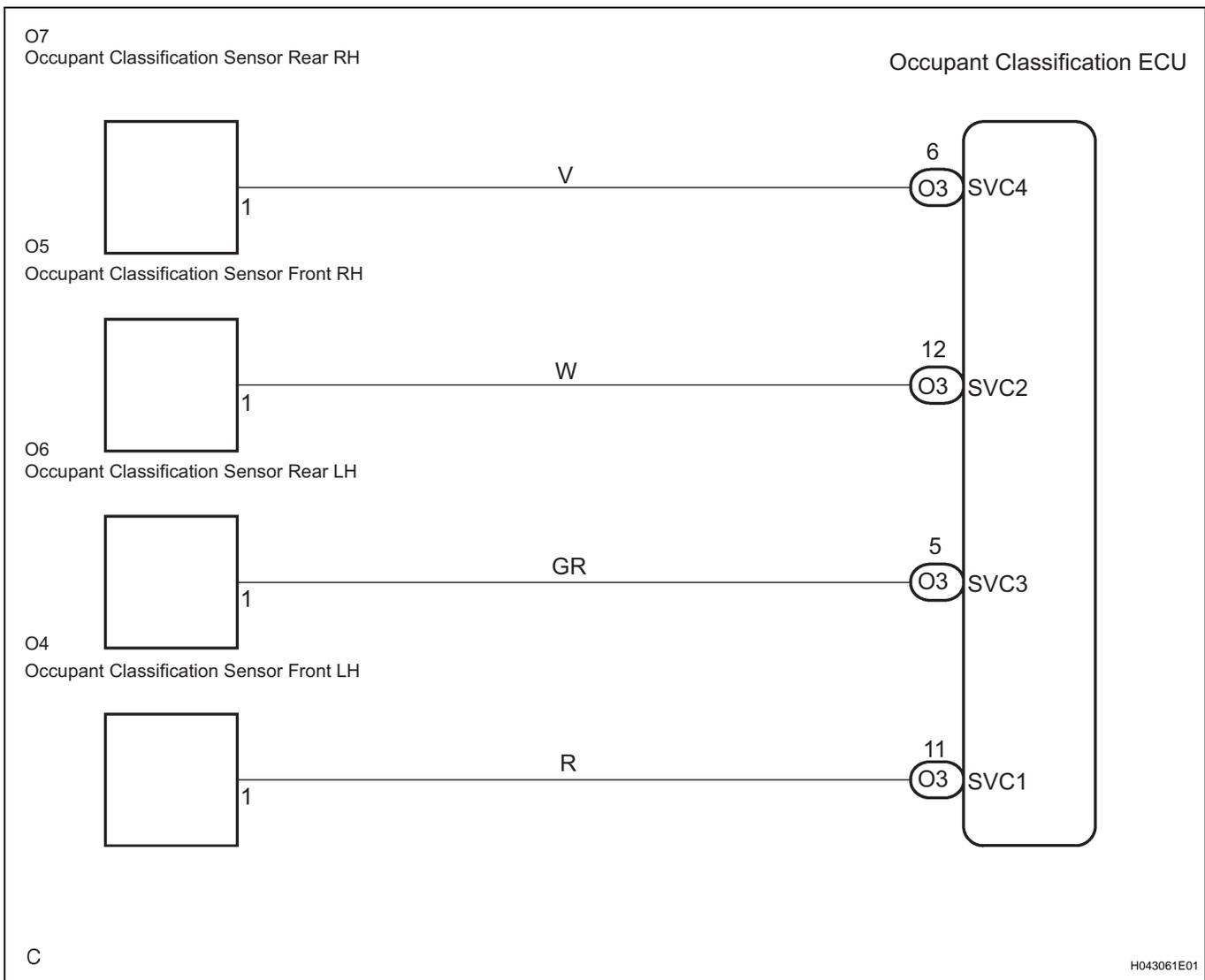
**DESCRIPTION**

The occupant classification sensor power supply circuit consists of the occupant classification ECU and the occupant classification sensors.

DTC B1793 is recorded when a malfunction is detected in the occupant classification sensor power supply circuit.

DTC No.	DTC Detecting Condition	Trouble Area
B1793	<ul style="list-style-type: none"> <li>• The occupant classification ECU receives a line short circuit signal, an open circuit signal, a short circuit to ground signal or a short circuit to B+ signal in the occupant classification sensor power supply circuit for 2 seconds.</li> <li>• Occupant classification ECU malfunction</li> </ul>	<ul style="list-style-type: none"> <li>• Front seat assembly RH (Occupant classification sensors)</li> <li>• Floor wire No.2</li> <li>• Occupant classification ECU</li> </ul>

**WIRING DIAGRAM**



**RS**

## HINT:

- If troubleshooting (wire harness inspection) is difficult to perform, remove the front passenger seat installation bolts to see the under surface of seat cushion.
- In the above case, hold the seat so that it does not fall down. Holding the seat for a long period of time may cause a problem, such as seat rail deformation. Hold the seat only as necessary.

**1 CHECK DTC**

- Turn the ignition switch to the ON position.
- Clear the DTCs stored in memory (See page [RS-192](#)).  
HINT:  
First clear DTCs stored in the occupant classification ECU and then in the center airbag sensor assembly.
- Turn the ignition switch to the LOCK position.
- Turn the ignition switch to the ON position.
- Check the DTCs (See page [RS-192](#)).

**OK:**

**DTC B1793 is not output.**

## HINT:

Codes other than DTC B1793 may be output at this time, but they are not related to this check.

**OK****USE SIMULATION METHOD TO CHECK****NG****RS****2 CHECK CONNECTION OF CONNECTORS**

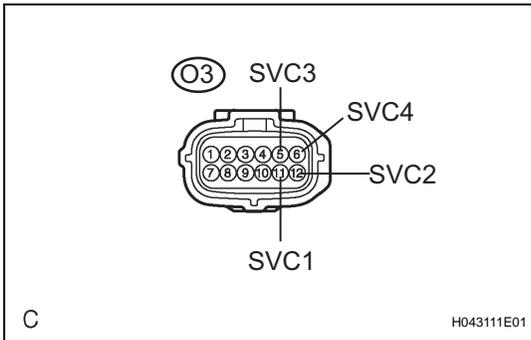
- Turn the ignition switch to the LOCK position.
- Disconnect the negative (-) terminal cable from the battery, and wait for at least 90 seconds.
- Check that the connectors are properly connected to the occupant classification ECU and the occupant classification sensors.

**OK:**

**The connectors are connected.**

**NG****CONNECT CONNECTORS, THEN GO TO STEP 1****OK**

**3 CHECK FLOOR WIRE NO.2 (SHORT TO B+)**



- (a) Disconnect the connectors from the occupant classification ECU and the 4 occupant classification sensors.
- (b) Connect the negative (-) terminal cable to the battery.
- (c) Turn the ignition switch to the ON position.
- (d) Measure the voltage according to the value(s) in the table below.

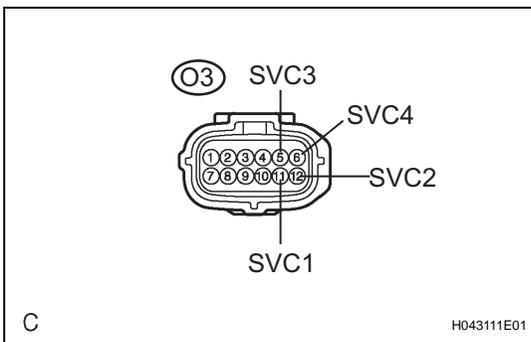
**Voltage**

Tester connection	Condition	Specified condition
O3-5 (SVC3) - Body ground	Ignition switch ON	Below 1 V
O3-6 (SVC4) - Body ground	Ignition switch ON	Below 1 V
O3-11 (SVC1) - Body ground	Ignition switch ON	Below 1 V
O3-12 (SVC2) - Body ground	Ignition switch ON	Below 1 V

**NG** REPAIR OR REPLACE FLOOR WIRE NO.2

**OK**

**4 CHECK FLOOR WIRE NO.2 (SHORT TO GROUND)**



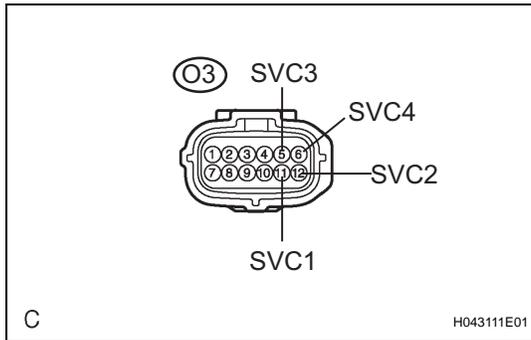
- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery, and wait for at least 90 seconds.
- (c) Measure the resistance according to the value(s) in the table below.

**Resistance**

Tester connection	Condition	Specified condition
O3-5 (SVC3) - Body ground	Always	1 MΩ or higher
O3-6 (SVC4) - Body ground	Always	1 MΩ or higher
O3-11 (SVC1) - Body ground	Always	1 MΩ or higher
O3-12 (SVC2) - Body ground	Always	1 MΩ or higher

**NG** REPAIR OR REPLACE FLOOR WIRE NO.2

**OK**

**5 CHECK FLOOR WIRE NO.2 (OPEN)**

- (a) Measure the resistance according to the value(s) in the table below.

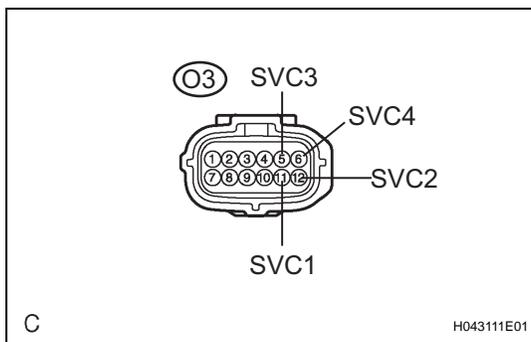
**Resistance**

Tester connection	Condition	Specified condition
O3-5 (SVC3) - O6-1 (SVC3)	Always	Below 1 $\Omega$
O3-6 (SVC4) - O7- 1 (SVC4)	Always	Below 1 $\Omega$
O3-11 (SVC1) - O4-1 (SVC1)	Always	Below 1 $\Omega$
O3-12 (SVC2) - O5-1 (SVC2)	Always	Below 1 $\Omega$

NG

**REPAIR OR REPLACE FLOOR WIRE NO.2**

OK

**6 CHECK FLOOR WIRE NO.2 (SHORT)**

- (a) Measure the resistance according to the value(s) in the table below.

**Resistance**

Tester connection	Condition	Specified condition
O3-5 (SVC3) - O3-6 (SVC4)	Always	1 M $\Omega$ or higher
O3-6 (SVC4) - O3-11 (SVC1)	Always	1 M $\Omega$ or higher
O3-11 (SVC1) - O3-12 (SVC2)	Always	1 M $\Omega$ or higher
O3-12 (SVC2) - O3-5 (SVC3)	Always	1 M $\Omega$ or higher
O3-12 (SVC2) - O3-6 (SVC4)	Always	1 M $\Omega$ or higher
O3-11 (SVC1) - O3-5 (SVC3)	Always	1 M $\Omega$ or higher

NG

**REPAIR OR REPLACE FLOOR WIRE NO.2**

OK

**7 CHECK DTC**

- (a) Connect the connectors to the occupant classification ECU and the 4 occupant classification sensors.  
 (b) Connect the negative (-) terminal cable to the battery.  
 (c) Turn the ignition switch to the ON position.  
 (d) Clear the DTCs stored in memory (See page RS-192).  
**HINT:**  
 First clear DTCs stored in the occupant classification ECU and then in the center airbag sensor assembly.

- (e) Turn the ignition switch to the LOCK position.
- (f) Turn the ignition switch to the ON position.
- (g) Check the DTCs (See page [RS-192](#)).

**OK:**

**DTC B1793 is not output.**

**HINT:**

Codes other than DTC B1793 may be output at this time, but they are not related to this check.

**OK** → **USE SIMULATION METHOD TO CHECK**

**NG**

**8 REPLACE OCCUPANT CLASSIFICATION ECU**

- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery.
- (c) Replace the occupant classification ECU (See page [RS-320](#)).

**HINT:**

Perform the inspection using parts from a normal vehicle if possible.

**NEXT**

**9 PERFORM ZERO POINT CALIBRATION**

**RS**

- (a) Connect the negative (-) terminal cable to the battery.
- (b) Connect the intelligent tester to the DLC3.
- (c) Turn the ignition switch to the ON position.
- (d) Using the intelligent tester, perform "Zero point calibration" (See page [RS-185](#)).

**OK:**

**The "COMPLETED" is displayed.**

**NG** → **Go to step 12**

**OK**

**10 PERFORM SENSITIVITY CHECK**

- (a) Using the intelligent tester, perform "Sensitivity check" (See page [RS-185](#)).

**Standard value:**

**27 to 33 kg (59.52 to 72.75 lb)**

**NG** → **Go to step 12**

**OK**

**11 CHECK DTC**

- (a) Connect the negative (-) terminal cable to the battery.

- (b) Turn the ignition switch to the ON position.
- (c) Clear the DTCs stored in memory (See page [RS-192](#)).  
HINT:  
First clear DTCs stored in the occupant classification ECU and then in the center airbag sensor assembly.
- (d) Turn the ignition switch to the LOCK position.
- (e) Turn the ignition switch to the ON position.
- (f) Check the DTCs (See page [RS-192](#)).

**OK:**

**DTC B1793 is not output.**

HINT:

Codes other than DTC B1793 may be output at this time, but they are related to this check.

OK

END

NG

## 12 REPLACE FRONT SEAT ASSEMBLY RH

- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery.
- (c) Replace the front seat assembly RH (See page [SE-18](#) or [SE-30](#)).

NEXT

RS

## 13 PERFORM ZERO POINT CALIBRATION

- (a) Connect the negative (-) terminal cable to the battery.
- (b) Connect the intelligent tester to the DLC3.
- (c) Turn the ignition switch to the ON position.
- (d) Using the intelligent tester, perform "Zero point calibration" (See page [RS-185](#)).

**OK:**

The "COMPLETED" is displayed.

NEXT

## 14 PERFORM SENSITIVITY CHECK

- (a) Using the intelligent tester, perform "Sensitivity check" (See page [RS-185](#)).

**Standard value:**

**27 to 33 kg (59.52 to 72.75 lb)**

NEXT

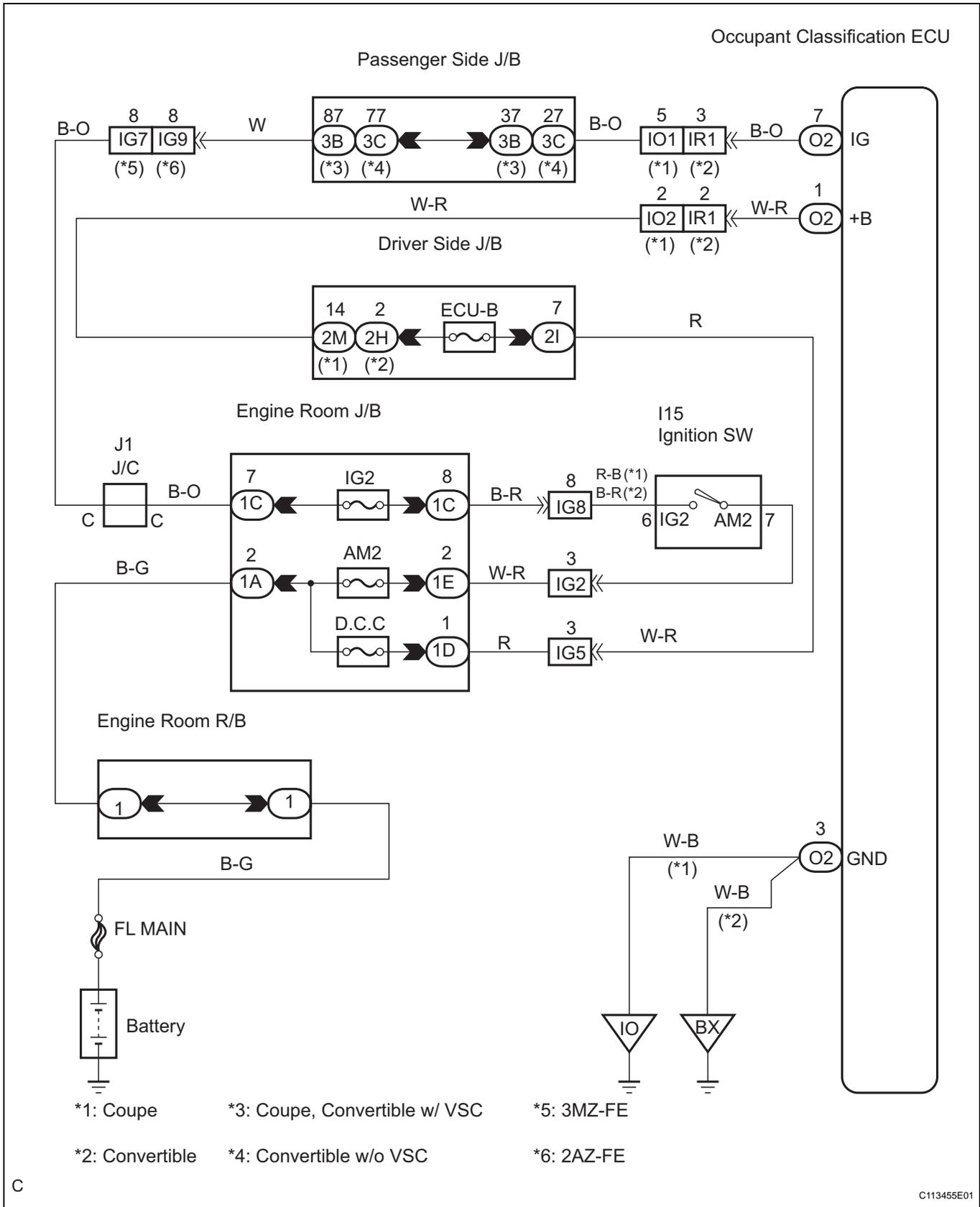
END

**DTC****B1795****Occupant Classification ECU Malfunction****DESCRIPTION**

DTC B1795 is recorded when a malfunction is detected in the occupant classification ECU.  
 Troubleshoot the DTC B1771 first when the DTC B1771 and B1795 are output simultaneously.

DTC No.	DTC Detecting Condition	Trouble Area
B1795	<ul style="list-style-type: none"> <li>• The occupant classification ECU receives the ignition switch LOCK to ON signal 50 times in a row when a malfunction occurs in the power circuit for the occupant classification ECU (LOCK to ON to LOCK should be counted as 1 time).</li> <li>• Occupant classification ECU circuit malfunction</li> <li>• The occupant classification ECU receives a short circuit to ground signal in the passenger side buckle switch circuit for 2 seconds.</li> <li>• Occupant classification ECU malfunction</li> </ul>	<ul style="list-style-type: none"> <li>• Battery</li> <li>• ECU-B Fuse</li> <li>• Floor wire No.2</li> <li>• Front seat inner belt assembly RH</li> <li>• Occupant classification ECU</li> </ul>

WIRING DIAGRAM



RS

**1 CHECK DTC**

- (a) Turn the ignition switch to the ON position, and wait for at least 10 seconds.
- (b) Check the DTCs (See page RS-192).

**Result:**

**A:**

**DTC B1771 and B1795 are output.**

**B:**

**DTC B1795 is output.**

**HINT:**

Codes other than DTC B1771 and B1795 may be output at this time, but they are not related to this check.

**A** → **GO TO DTC B1771**

**B**

**2 CHECK FUSE**

- (a) Check the ECU-B fuse.

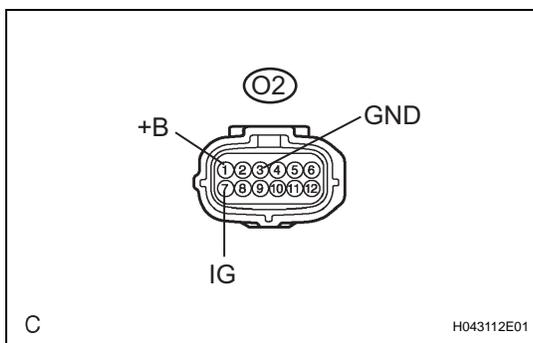
**Resistance:**

**Below 1 Ω**

**NG** → **REPLACE FUSE**

**OK**

**3 CHECK WIRE HARNESS (SOURCE VOLTAGE)**



- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery.
- (c) Disconnect the connector from the occupant classification ECU.
- (d) Connect the negative (-) terminal cable to the battery.
- (e) Turn the ignition switch to the ON position.
- (f) Measure the voltage according to the value(s) in the table below.

**Voltage**

Tester connection	Condition	Specified condition
O2-1 (+B) - Body ground	Always	10 to 14 V
O2-7 (IG) - Body ground	Ignition switch ON	10 to 14 V

- (g) Turn the ignition switch to the LOCK position.
- (h) Measure the resistance according to the value(s) in the table below.

**Resistance**

Tester connection	Condition	Specified condition
O2-3 (GND) - Body ground	Always	Below 1 Ω

**RS**

NG

REPAIR OR REPLACE WIRE HARNESS

OK

**4 REPLACE OCCUPANT CLASSIFICATION ECU**

- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery.
- (c) Replace the occupant classification ECU (See page [RS-320](#)).

**HINT:**

Perform the inspection using parts from a normal vehicle if possible.

NEXT

**5 PERFORM ZERO POINT CALIBRATION**

- (a) Connect the negative (-) terminal cable to the battery.
- (b) Connect the intelligent tester to the DLC3.
- (c) Turn the ignition switch to the ON position.
- (d) Using the intelligent tester, perform "Zero point calibration" (See page [RS-185](#)).

**OK:**

The "COMPLETED" is displayed.

RS

NEXT

**6 PERFORM SENSITIVITY CHECK**

- (a) Using the intelligent tester, perform "Sensitivity check" (See page [RS-185](#)).

**Standard value:**

**27 to 33 kg (59.52 to 72.75 lb)**

NEXT

END

<b>DTC</b>	<b>B1796</b>	<b>Sleep Operation Failure of Occupant Classification ECU</b>
------------	--------------	---

**DESCRIPTION**

During sleep mode, the occupant classification ECU reads the condition of each sensor while the ignition switch is off.

In this mode, if occupant classification ECU detects an internal malfunction, DTC B1796 is output.

DTC No.	DTC Detecting Condition	Trouble Area
B1796	<ul style="list-style-type: none"> <li>• Occupant classification ECU malfunction</li> </ul>	<ul style="list-style-type: none"> <li>• Occupant classification ECU</li> </ul>

<b>1</b>	<b>CHECK DTC</b>
----------	------------------

- (a) Turn the ignition switch to the ON position.
- (b) Clear the DTCs stored in memory (See page [RS-192](#)).  
HINT:  
First clear DTCs stored in the occupant classification ECU and then in the center airbag sensor assembly.
- (c) Turn the ignition switch to the LOCK position, and wait for at least 10 seconds.
- (d) Turn the ignition switch to the ON position.
- (e) Check the DTCs (See page [RS-192](#)).

**OK:**

**DTC B1796 is not output.**

## HINT:

Codes other than DTC B1796 may be output at this time, but they are not related to this check.

OK

USE SIMULATION METHOD TO CHECK

NG

<b>2</b>	<b>REPLACE OCCUPANT CLASSIFICATION ECU</b>
----------	--

- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery.
- (c) Replace the occupant classification ECU (See page [RS-320](#)).

## HINT:

Perform the inspection using parts from a normal vehicle if possible.

NEXT

<b>3</b>	<b>PERFORM ZERO POINT CALIBRATION</b>
----------	---------------------------------------

- (a) Connect the negative (-) terminal cable to the battery.
- (b) Connect the intelligent tester to the DLC3.
- (c) Turn the ignition switch to the ON position.

RS

- (d) Using the intelligent tester, perform "Zero point calibration" (See page [RS-185](#)).

**OK:**

The "**COMPLETED**" is displayed.

NEXT

<b>4</b>	<b>PERFORM SENSITIVITY CHECK</b>
----------	----------------------------------

- (a) Using the intelligent tester, perform "Sensitivity check" (See page [RS-185](#)).

**Standard value:**

**27 to 33 kg (59.52 to 72.75 lb)**

NEXT

<b>END</b>
------------

## Trouble in Passenger Airbag ON / OFF Indicator

### DESCRIPTION

The occupant classification system detects the front passenger seat condition. It then informs a passenger of the front passenger airbag assembly condition (activated/not activated) by the passenger airbag ON/OFF indicator.

The table below shows the normal indication condition of the passenger airbag ON/OFF indicator and the front passenger seat condition.

Front passenger seat condition	ON Indicator	OFF Indicator
Adult is seated.	ON	OFF
Child is seated.	OFF	ON
Vacant	OFF	OFF
Occupant classification system failure.	OFF	ON

### 1 CHECK SRS WARNING LIGHT

- (a) Turn the ignition switch to the ON position, and check the SRS warning light condition.

HINT:

If this trouble occurs, the SRS warning light is off. If it is on, a DTC is output. Troubleshoot for the output DTC.

OK:

The SRS warning light does not come on.



**RS**



### 2 CHECK PASSENGER AIRBAG ON/OFF INDICATOR CONDITION

- (a) Turn the ignition switch to the ON position.
- (b) Check if the passenger airbag ON/OFF indicator correctly indicates the front passenger seat condition.

OK

Front passenger seat condition	ON Indicator	OFF Indicator
Adult is seated.	ON	OFF
Child is seated.	OFF	ON
Vacant	OFF	OFF
Occupant classification system failure.	OFF	ON



### 3 PERFORM ZERO POINT CALIBRATION

- (a) Turn the ignition switch to the LOCK position.
- (b) Connect the intelligent tester to the DLC3.
- (c) Turn the ignition switch to the ON position.

- (d) Using the intelligent tester, perform "Zero point calibration" (See page [RS-185](#)).

**OK:**

The "COMPLETE" is displayed.

NG

Go to step 5

OK

#### 4 PERFORM SENSITIVITY CHECK

- (a) Using the intelligent tester, perform "Sensitivity check" (See page [RS-185](#)).

**Standard value:**

27 to 33 kg (59.52 to 72.75 lb)

NG

Go to step 5

OK

END

#### 5 RETIGHTEN FRONT SEAT ASSEMBLY RH BOLT

- (a) Turn the ignition switch to the LOCK position.  
 (b) Loosen the 4 installation bolts of the front seat assembly RH.  
 (c) Tighten the 4 installation bolts of the front seat assembly RH to the specified torque.

**Torque: 37 N\*m (380 kgf\*cm, 27 ft.\*lbf)**

NG

Go to step 8

OK

#### 6 PERFORM ZERO POINT CALIBRATION

- (a) Connect the intelligent tester to the DLC3.  
 (b) Turn the ignition switch to the ON position.  
 (c) Using the intelligent tester, perform "Zero point calibration" (See page [RS-185](#)).

**OK:**

The "COMPLETE" is displayed.

NG

Go to step 8

OK

#### 7 PERFORM SENSITIVITY CHECK

- (a) Using the intelligent tester, perform "Sensitivity check" (See page [RS-185](#)).

Standard value:  
27 to 33 kg (59.52 to 72.75 lb)

NG

Go to step 8

OK

8

CHECK CONNECTORS

- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery.
- (c) Check the connectors are properly connected to the occupant classification ECU and the 4 occupant classification sensors.

**OK:**

**The connectors are connected.**

- (d) Disconnect the connectors from the occupant classification ECU and the 4 occupant classification sensors.
- (e) Check the connectors are not damaged or deformed.

**OK:**

**The connectors are normal.**

NG

REPAIR OR REPLACE CONNECTOR, THEN GO TO STEP 1

OK

9

CHECK DTC

- (a) Connect the connectors to the occupant classification ECU and the 4 occupant classification sensors.
- (b) Connect the negative (-) terminal cable to the battery.
- (c) Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- (d) Turn the ignition switch to the LOCK position.
- (e) Clear the DTCs stored in memory (See page [RS-192](#)).
- (f) Turn the ignition switch to the ON position, and wait for at least 60 seconds.
- (g) Check the DTCs (See page [RS-192](#)).

**OK:**

**DTC is not output.**

NG

REPLACE CENTER AIRBAG SENSOR ASSEMBLY

OK

10

REPLACE OCCUPANT CLASSIFICATION ECU

- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery.

RS

- (c) Replace the occupant classification ECU (See page [RS-320](#)).

HINT:

Perform the inspection using parts from a normal vehicle if possible.

NEXT

## 11 PERFORM ZERO POINT CALIBRATION

- (a) Connect the negative (-) terminal cable to the battery.  
(b) Connect the intelligent tester to the DLC3.  
(c) Turn the ignition switch to the ON position.  
(d) Using the intelligent tester, perform "Zero point calibration" (See page [RS-185](#)).

**OK:**

The "COMPLETE" is displayed.

NEXT

## 12 PERFORM SENSITIVITY CHECK

- (a) Using the intelligent tester, perform "Sensitivity check" (See page [RS-185](#)).

**Standard value:**

27 to 33 kg (59.52 to 72.75 lb)

RS

NEXT

END

## PROBLEM SYMPTOMS TABLE

HINT:

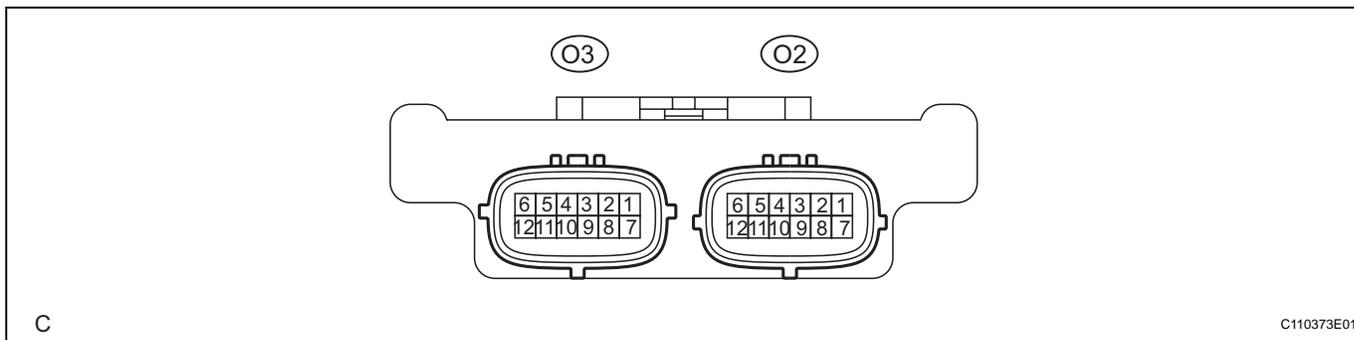
Proceed to the troubleshooting for each circuit in the table below.

### OCCUPANT CLASSIFICATION SYSTEM

Symptom	Suspected area	See page
The front passenger seat condition differs from the indication by the passenger airbag ON/OFF indicator (DTC is not output).	Trouble in Passenger Airbag ON/OFF Indicator	<a href="#">RS-256</a>

# TERMINALS OF ECU

## 1. OCCUPANT CLASSIFICATION ECU



C

C110373E01

Symbols (Terminal No.)	Wiring Color	Terminal Description	Condition	Specification
+B (O2-1) - GND (O2-3)	W-R - W-B	Power source (ECU-B Fuse)	Always	10 to 14 V
DIA (O2-2) - GND (O2-3)	W - W-B	Diagnosis (DLC3)	IG switch ON	Pulse generation
GND (O2-3) - Body ground	W-B - Body ground	Ground	Always	Below 1 Ω
FSR- (O2-4) - GND (O2-3)	G-B - W-B (*1) G-R - W-B (*2)	Center airbag sensor assembly communication line (-)	Always	Below 1 Ω
BGND (O2-5) - GND (O2-3)	GR - W-B (*1) B - W-B (*2)	Passenger side buckle switch ground line	Always	Below 1 Ω
IG (O2-7) - GND (O2-3)	B-O - W-B	Power source (IG2 Fuse)	IG switch ON	10 to 14 V
FSR+ (O2-8) - FSR- (O2-4)	G-R - G-B (*1) G-B - G-R (*2)	Center airbag sensor assembly communication line	IG switch ON	Pulse generation
BSW (O2-9) - BGND (O2-5)	B - GR (*1) B-L - B (*2)	Passenger side buckle switch line	Buckle switch ON Buckle switch OFF	Pulse generation
SGD1 (O3-1) - GND (O2-3)	G - W-B	Occupant classification sensor front LH ground line	Always	Below 1 Ω
SGD2 (O3-2) - GND (O2-3)	O - W-B	Occupant classification sensor front RH ground line	Always	Below 1 Ω
SGD3 (O3-3) - GND (O2-3)	W - W-B	Occupant classification sensor rear LH ground line	Always	Below 1 Ω
SGD4 (O3-4) - GND (O2-3)	BR - W-B	Occupant classification sensor rear RH ground line	Always	Below 1 Ω
SVC3 (O3-5) - SGD3 (O3-3)	GR - W	Occupant classification sensor rear LH power supply line	IG switch ON, load occupant classification sensor rear LH	4.5 to 5.1 V
SVC4 (O3-6) - SGD4 (O3-4)	V - BR	Occupant classification sensor rear RH power supply line	IG switch ON, load occupant classification sensor rear RH	4.5 to 5.1 V
SIG1 (O3-7) - SGD1 (O3-1)	SB - G	Occupant classification sensor front LH signal line	IG switch ON, load occupant classification sensor front LH	0.2 to 4.7 V
SIG2 (O3-8) - SGD2 (O3-2)	L - O	Occupant classification sensor front RH signal line	IG switch ON, load occupant classification sensor front RH	0.2 to 4.7 V
SIG3 (O3-9) - SGD3 (O3-3)	Y - W	Occupant classification sensor rear LH signal line	IG switch ON, load occupant classification sensor rear LH	0.2 to 4.7 V

RS

Symbols (Terminal No.)	Wiring Color	Terminal Description	Condition	Specification
SIG4 (O3-10) - SGD4 (O3-4)	R - BR	Occupant classification sensor rear RH signal line	IG switch ON, load occupant classification sensor rear RH	0.2 to 4.7 V
SVC1 (O3-11) - SGD1 (O3-1)	R - G	Occupant classification sensor front LH power supply line	IG switch ON, load occupant classification sensor front LH	4.5 to 5.1 V
SVC2 (O3-12) - SGD2 (O3-2)	W - O	Occupant classification sensor front RH power supply line	IG switch ON, load occupant classification sensor front RH	4.5 to 5.1 V

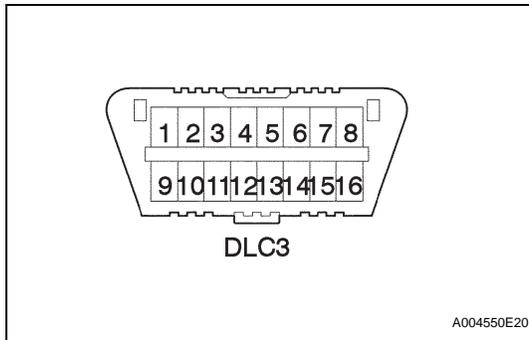
\*1: Coupe

\*2: Convertible

## DIAGNOSIS SYSTEM

### 1. CHECK DLC3

- (a) The vehicle's ECM conforms to the ISO 9141-2 for communication protocol. The terminal arrangement of the DLC3 complies with SAE J1962 and meets the ISO 9141-2 format.



Terminal No.	Connection/Voltage or Resistance	Condition
7	Bus + Line/Pulse generation	During Transmission
4	Chassis Ground - Body Ground/Below 1 Ω	Always
16	Battery Positive - Body Ground/10 to 14 V	Always

RS

#### HINT:

If the display shows a communication error message when connecting the cable of the intelligent tester to the DLC3, turning the ignition switch to the ON position and operating the intelligent tester, there is a problem on the vehicle side or tool side.

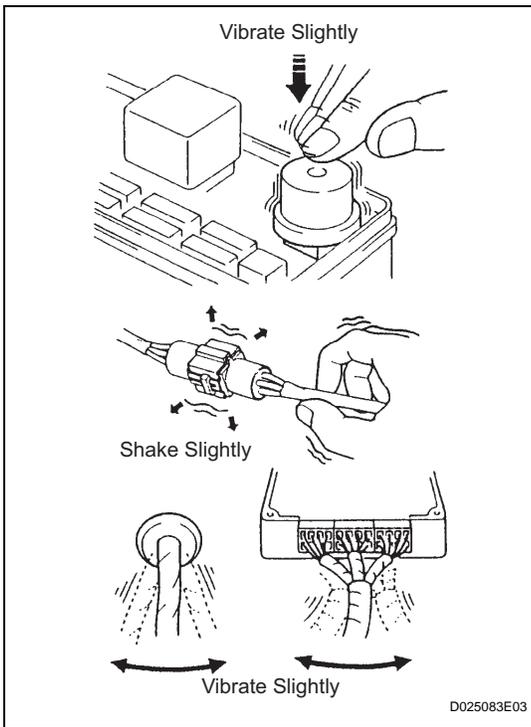
- If communication is normal when the tool is connected to another vehicle, inspect the DLC3 on the original vehicle.
- If communication is still not possible when the tool is connected to another vehicle, the problem is probably in the tool itself. Consult the Service Department listed in the tool's instruction manual.

### 2. SYMPTOM SIMULATION

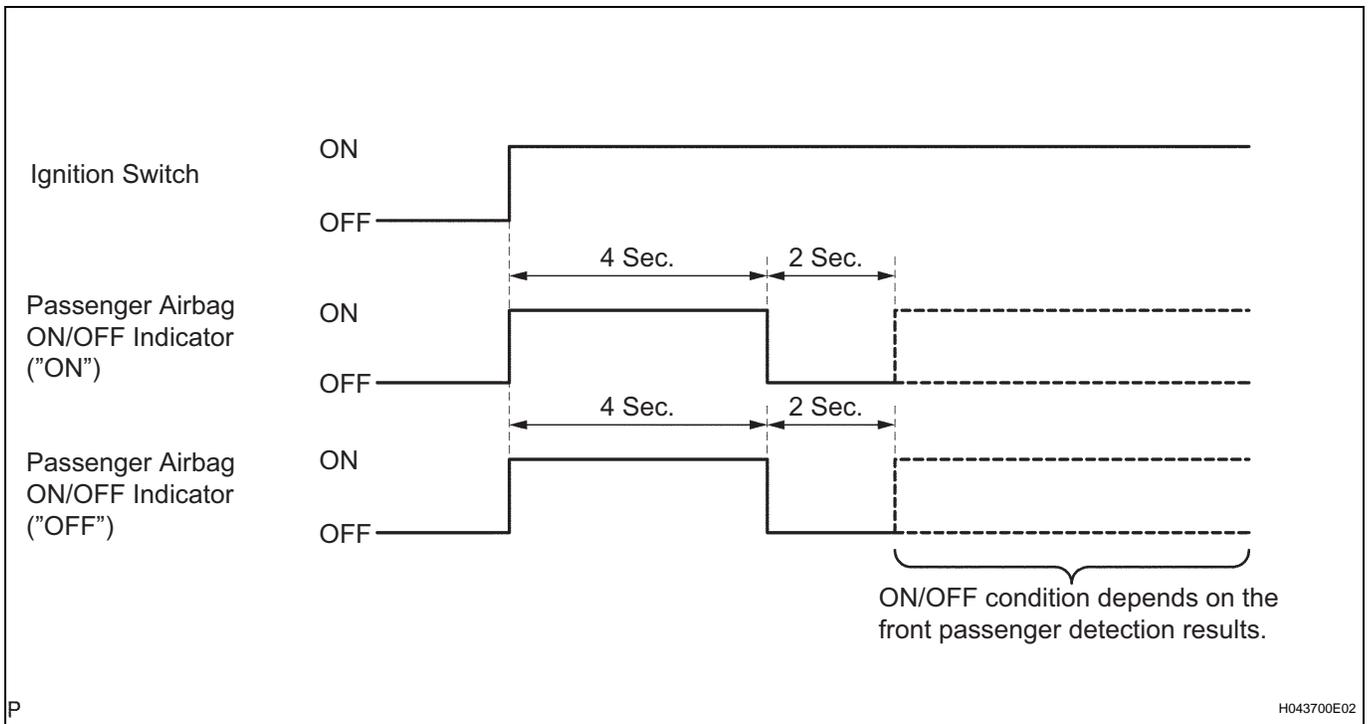
#### HINT:

The most difficult case in troubleshooting is when no symptoms occur. In such cases, a thorough customer problem analysis must be carried out. Then the same or similar conditions and environment in which the problem occurred in the customer's vehicle should be simulated. No matter how experienced or skilled a technician may be, if he proceeds to troubleshoot without confirming the problem symptoms, he will likely overlook something important and make a wrong guess at some points in the repair operation.

This leads to a standstill in troubleshooting.



- (a) Vibration method: When vibration seems to be the major cause.
- HINT:  
Perform the simulation method only during the primary check period (for approximately 6 seconds after the ignition switch is turned to the ON position).
- (1) Slightly vibrate the part of the sensor considered to be the problem cause with your fingers and check whether the malfunction occurs.  
HINT:  
Shaking the relays too strongly may result in open relays.
  - (2) Slightly shake the connector vertically and horizontally.



RS

- (3) Slightly shake the wire harness vertically and horizontally.  
The connector joint and fulcrum of the vibration are the major areas to be checked thoroughly.

- (b) Simulation method for DTC B1795: Turn the ignition switch from the LOCK to ON, hold for 10 seconds, and back to LOCK again 50 times in a row.

**HINT:**

DTC B1795 is output if the occupant classification ECU receives the ignition switch LOCK-ON-LOCK signal 50 times in a row when a malfunction occurs in the power circuit for the occupant classification system.

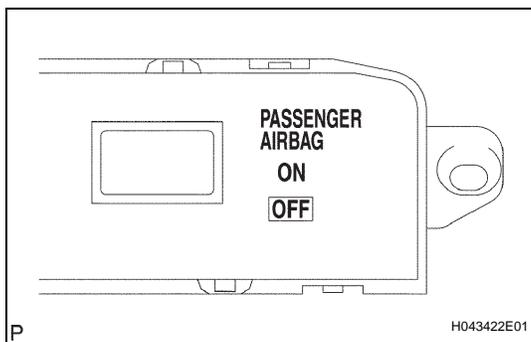
### 3. FUNCTION OF PASSENGER AIRBAG ON/OFF INDICATOR

- (a) Initial check.
- (1) Turn the ignition switch to the ON position.
  - (2) The passenger airbag ON/OFF indicator ("ON" and "OFF") come on for approximately 4 seconds, then goes off for approximately 2 seconds.
  - (3) Approximately 6 seconds after the ignition switch is turned to the ON position, the passenger airbag ON/OFF indicator will be ON/OFF depending on the conditions listed below.

Condition	ON Indicator	OFF Indicator
Vacant	OFF	OFF
Adult is seated.	ON	OFF
Child is seated.	OFF	ON
Child restraint system is set.	OFF	ON
Front passenger occupant classification system failure	OFF	ON

**HINT:**

- The passenger airbag ON/OFF indicator is based on the timing chart below in order to check the indicator light circuit.
- When the occupant classification system has trouble, both the SRS warning light and the passenger airbag ON/OFF indicator ("OFF") come on. In this case, check the DTCs in the "AIRBAG SYSTEM" first.



### 4. CHECK PASSENGER AIRBAG ON/OFF INDICATOR

- (a) Turn the ignition switch to the ON position.
- (b) Check that the passenger airbag ON/OFF indicator ("ON" and "OFF") come on for approximately 4 seconds, then goes off for approximately 2 seconds.

**HINT:**

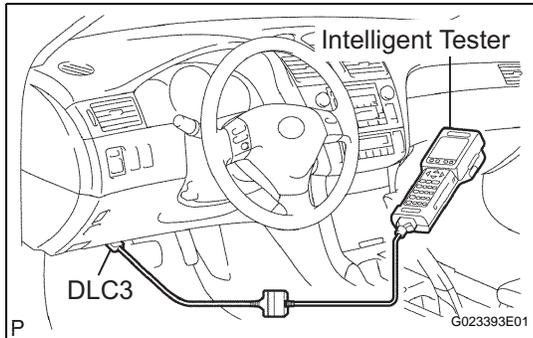
Refer to the table in step 3 regarding the passenger airbag ON/OFF indicator when the ignition switch is turned to the ON position and approximately 6 seconds pass.

## DTC CHECK / CLEAR

### 1. DTC CHECK

#### HINT:

When DTC B1650/32 is detected as a result of troubleshooting for "AIRBAG SYSTEM", perform troubleshooting for the occupant classification system.



#### (a) Check the DTCs.

- (1) Connect the intelligent tester to the DLC3.
- (2) Turn the ignition switch to the ON position.
- (3) Check the DTCs by following the prompts on the tester screen.

#### HINT:

Refer to the intelligent tester operator's manual for further details.

#### (b) Clear the DTCs.

- (1) Connect the intelligent tester to the DLC3.
- (2) Turn the ignition switch to the ON position.
- (3) Clear the DTCs by following the prompts on the tester screen.

#### HINT:

Refer to the intelligent tester operator's manual for further details.

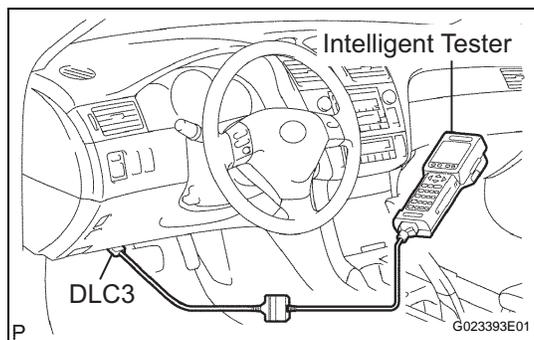
## DATA LIST / ACTIVE TEST

### HINT:

By accessing the DATA LIST displayed by the intelligent tester, you can perform such functions as reading the values of switches and sensors without removing any parts. Reading the DATA LIST is the first step of troubleshooting and is one method to shorten labor time.

### 1. DATA LIST FOR OCCUPANT CLASSIFICATION ECU

- (a) Connect the intelligent tester to the DLC3.
- (b) Turn the ignition switch to the ON position.
- (c) Following the display on the tester screen, read the "DATA LIST".



Item	Measurement Item/ Range (Display)	Normal Condition	Diagnostic Note
IG SW	Ignition switch condition/ ON: Ignition switch ON OFF: Ignition switch OFF	ON/OFF	-
P BUCKLE SW	Buckle switch (Passenger side)/ OFF: Unfasten the passenger side seat belt ON: Fasten the passenger side seat belt NG: Passenger side seat belt has trouble	OFF/ON	-
PASSENGER CLASS	Passenger classification/ AF05: Adult (36 to 54 kg (79.37 to 119.05 lb)) is seated AM50: Adult More than 54 kg (119.05 lb) is seated CHILD: Child (less than 36 kg (79.37 lb)) is seated CRS: Child restraint system (less than 7 kg (15.43 lb)) and passenger side buckle switch is ON, then 7 to 36 kg (15.43 to 79.37 lb) is set OFF: Vacant	AF05/AM50/CHILD/CRS/OFF	-
SENS RANGE INF	Sensor range information/ OK: The value of a sensor is within the range NG: The value of a sensor is over the range	OK	-
FL SENS RANGE	Front left sensor range information/ OK: Sensor range is -17 to 27 kg (-37.48 to 59.52 lb) Min.: Less than -17 kg (-37.48 lb) Max.: More than 27 kg (59.52 lb)	OK	-
FR SENS RANGE	Front right sensor range information/ OK: Sensor range is -17 to 27 kg (-37.48 to 59.52 lb) Min.: Less than -17 kg (-37.48 lb) Max.: More than 27 kg (59.52 lb)	OK	-

Item	Measurement Item/ Range (Display)	Normal Condition	Diagnostic Note
RL SENS RANGE	Rear left sensor range information/ OK: Sensor range is -17 to 37 kg (-37.48 to 81.57 lb) Min.: Less than -17 kg (-37.48 lb) Max.: More than 37 kg (81.57 lb)	OK	-
RR SENS RANGE	Rear right sensor range information/ OK: Sensor range is -17 to 37 kg (-37.48 to 81.57 lb) Min.: Less than -17 kg (-37.48 lb) Max.: More than 37 kg (81.57 lb)	OK	-
FL SENS VOL	Front left sensor voltage/ Min.: 0 V Max.: 19.8 V	0 to 4.7 V	-
FR SENS VOL	Front right sensor voltage/ Min.: 0 V Max.: 19.8 V	0 to 4.7 V	-
RL SENS VOL	Rear left sensor voltage/ Min.: 0 V Max.: 19.8 V	0 to 4.7 V	-
RR SENS VOL	Rear right sensor voltage/ Min.: 0 V Max.: 19.8 V	0 to 4.7 V	-
FL SENS WEIGHT	Front left sensor weight information/ Min.: -17 kg (-37.48 lb) Max.: 27 kg (59.52 lb)	-17 to 27 kg (-37.48 to 59.52 lb)	-
FR SENS WEIGHT	Front right sensor weight information/ Min.: -17 kg (-37.48 lb) Max.: 27 kg (59.52 lb)	-17 to 27 kg (-37.48 to 59.52 lb)	-
RL SENS WEIGHT	Rear left sensor weight information/ Min.: -17 kg (-37.48 lb) Max.: 37 kg (81.57 lb)	-17 to 37 kg (-37.48 to 81.57 lb)	-
RR SENS WEIGHT	Rear right sensor weight information/ Min.: -17 kg (-37.48 lb) Max.: 37 kg (81.57 lb)	-17 to 37 kg (-37.48 to 81.57 lb)	-
TOTAL WEIGHT	Total weight information/ Min.: -68 kg (-149.91 lb) Max.: 128 kg (282.19 lb)	-68 to 128 kg (-149.91 to 282.19 lb)	-
#CODES	Number of DTC recorded/ Min.: 0, Max.: 255	0	-

RS

## DIAGNOSTIC TROUBLE CODE CHART

### 1. DTCS FOR OCCUPANT CLASSIFICATION SYSTEM

If a trouble code is displayed during the DTC check, check the circuit listed for the code in the table below (Proceed to the page listed for that circuit).

#### OCCUPANT CLASSIFICATION SYSTEM

DTC No.	Detection Item	Trouble Area	See page
B1771	Passenger Side Buckle Switch Circuit Malfunction	1. Front seat inner belt assembly RH 2. Occupant classification ECU 3. Floor wire No.2	<a href="#">RS-196</a>
B1780	Front Occupant Classification Sensor LH Circuit Malfunction	1. Front seat assembly RH (Front occupant classification sensor LH) 2. Occupant classification ECU 3. Floor wire No.2	<a href="#">RS-202</a>
B1781	Front Occupant Classification Sensor RH Circuit Malfunction	1. Front seat assembly RH (Front occupant classification sensor RH) 2. Occupant classification ECU 3. Floor wire No.2	<a href="#">RS-208</a>
B1782	Rear Occupant Classification Sensor LH Circuit Malfunction	1. Front seat assembly RH (Rear occupant classification sensor LH) 2. Occupant classification ECU 3. Floor wire No.2	<a href="#">RS-214</a>
B1783	Rear Occupant Classification Sensor RH Circuit Malfunction	1. Front seat assembly RH (Rear occupant classification sensor RH) 2. Occupant classification ECU 3. Floor wire No.2	<a href="#">RS-220</a>
B1785	Front Occupant Classification Sensor LH Collision Detection	1. Front seat assembly RH (Front occupant classification sensor LH) 2. Occupant classification ECU	<a href="#">RS-226</a>
B1786	Front Occupant Classification Sensor RH Collision Detection	1. Front seat assembly RH (Front occupant classification sensor RH) 2. Occupant classification ECU	<a href="#">RS-229</a>
B1787	Rear Occupant Classification Sensor LH Collision Detection	1. Front seat assembly RH (Rear occupant classification sensor LH) 2. Occupant classification ECU	<a href="#">RS-232</a>
B1788	Rear Occupant Classification Sensor RH Collision Detection	1. Front seat assembly RH (Rear occupant classification sensor RH) 2. Occupant classification ECU	<a href="#">RS-235</a>
B1790	Center Airbag Sensor Assembly Communication Circuit Malfunction	1. Occupant classification ECU 2. Center airbag sensor assembly 3. Floor wire No.2	<a href="#">RS-238</a>
B1793	Occupant Classification Sensor Power Supply Circuit Malfunction	1. Front seat assembly RH (Occupant classification sensors) 2. Floor wire No.2 3. Occupant classification ECU	<a href="#">RS-244</a>
B1795	Occupant Classification ECU Malfunction	1. Occupant classification ECU 2. Floor wire No.2 3. Battery 4. ECU-B Fuse 5. Front seat inner belt assembly RH	<a href="#">RS-250</a>
B1796	Sleep Operation Failure of Occupant Classification ECU	1. Occupant classification ECU	<a href="#">RS-254</a>

<b>DTC</b>	<b>B1771</b>	<b>Passenger Side Buckle Switch Circuit Malfunction</b>
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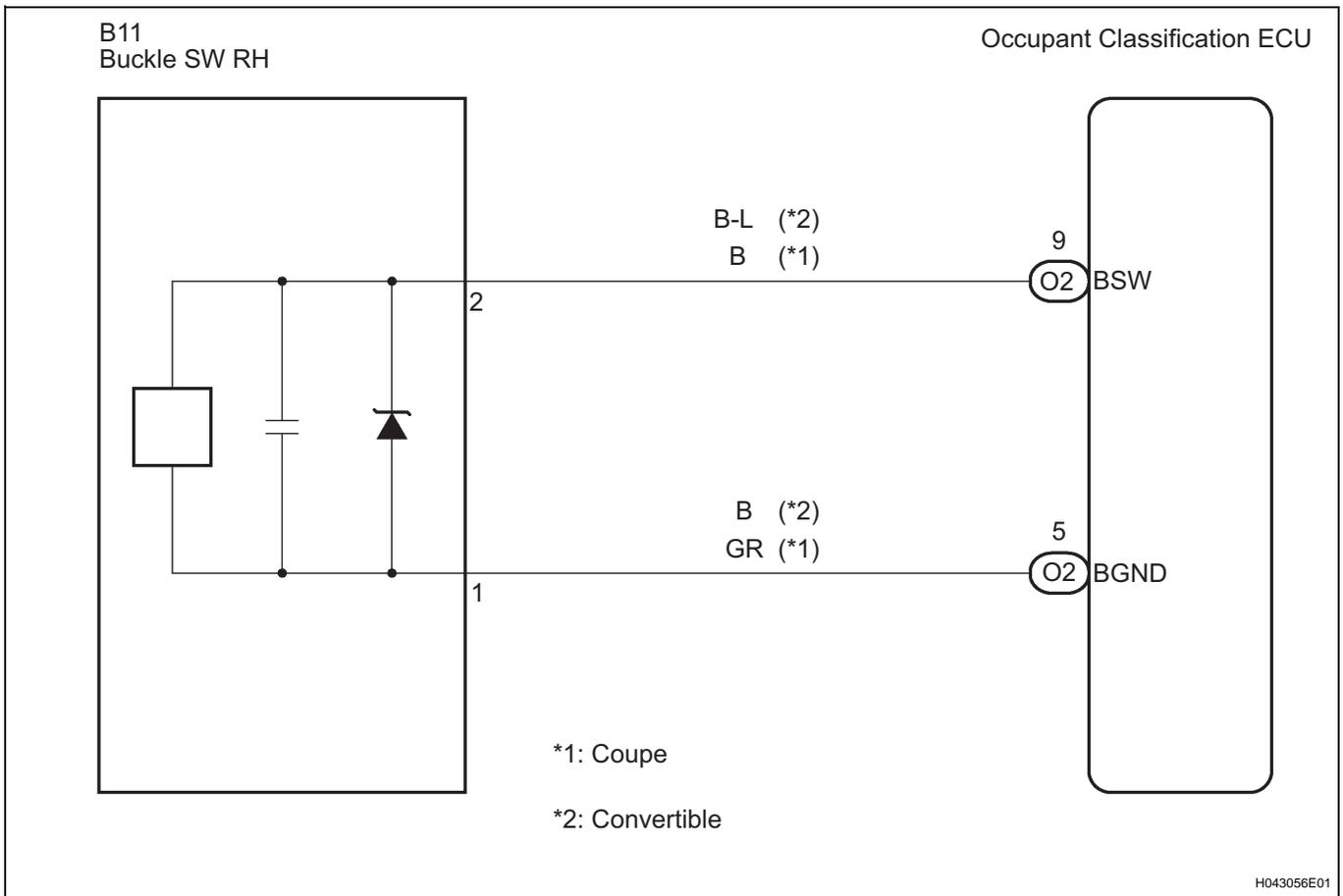
**DESCRIPTION**

The passenger side buckle switch circuit consists of the occupant classification ECU and the front seat inner belt assembly RH.

DTC B1771 is recorded when a malfunction is detected in the passenger side buckle switch circuit. Troubleshoot DTC B1771 first when the DTC B1771 and B1795 are output simultaneously.

DTC No.	DTC Detecting Condition	Trouble Area
B1771	<ul style="list-style-type: none"> <li>The occupant classification ECU receives a line short circuit signal, an open circuit signal, a short circuit to ground signal or a short circuit to B+ signal in the passenger side buckle switch circuit for 2 seconds.</li> <li>Passenger side buckle switch malfunction</li> <li>Occupant classification ECU malfunction</li> </ul>	<ul style="list-style-type: none"> <li>Front seat inner belt assembly RH</li> <li>Floor wire No.2</li> <li>Occupant classification ECU</li> </ul>

**WIRING DIAGRAM**



**RS**

**HINT:**

- If troubleshooting (wire harness inspection) is difficult to perform, remove the front passenger seat installation bolts to see the under surface of seat cushion.
- In the above case, hold the seat so that it does not fall down. Holding the seat for a long period of time may cause a problem, such as seat rail deformation. Hold the seat only as necessary.

1

## CHECK DTC

- (a) Turn the ignition switch to the ON position.
  - (b) Clear the DTCs stored in memory (See page [RS-192](#)).
- HINT:  
First clear DTCs stored in the occupant classification ECU and then in the center airbag sensor assembly.
- (c) Turn the ignition switch to the LOCK position.
  - (d) Turn the ignition switch to the ON position.
  - (e) Check the DTCs (See page [RS-192](#)).

**OK:****DTC B1771 is not output.****HINT:**

Codes other than DTC B1771 may be output at this time, but they are not related to this check.

OK

**USE SIMULATION METHOD TO CHECK**

NG

2

## CHECK CONNECTION OF CONNECTORS

- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery.
- (c) Check that the connectors are properly connected to the occupant classification ECU and the front seat inner belt assembly RH.

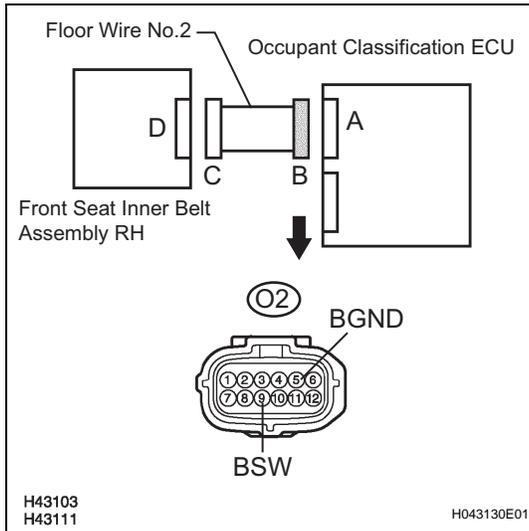
**OK:****The connectors are connected.**

NG

**CONNECT CONNECTORS, THEN GO TO STEP 1**

OK

**3 CHECK FLOOR WIRE NO.2 (SHORT TO B+)**



- (a) Disconnect the connectors from the occupant classification ECU and the front seat inner belt assembly RH.
- (b) Connect the negative (-) terminal cable to the battery.
- (c) Turn the ignition switch to the ON position.
- (d) Measure the voltage according to the value(s) in the table below.

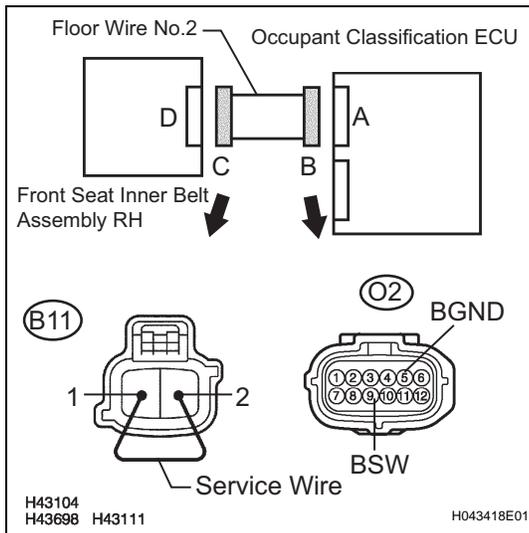
**Voltage**

Tester connection	Condition	Specified condition
O2-9 (BSW) - Body ground	Ignition switch ON	Below 1 V
O2-5 (BGND) - Body ground	Ignition switch ON	Below 1 V

**NG** REPAIR OR REPLACE FLOOR WIRE NO.2

**OK**

**4 CHECK FLOOR WIRE NO.2 (OPEN)**



- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery.
- (c) Using a service wire, connect B11-2 and B11-1 of connector "C".
- (d) Measure the resistance according to the value(s) in the table below.

**NOTICE:**

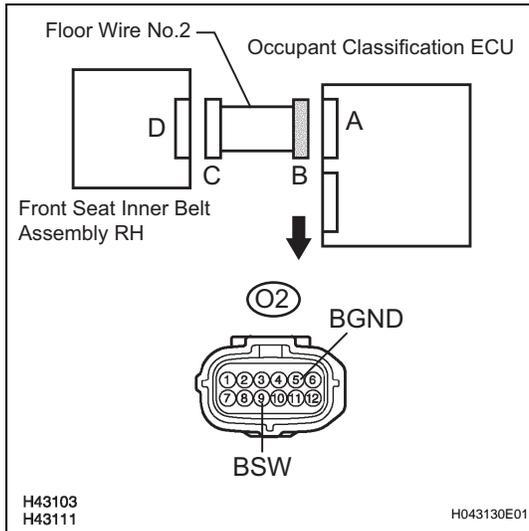
**Do not forcibly insert a service wire into the terminals of the connector when connecting.**

**Resistance**

Tester connection	Condition	Specified condition
O2-9 (BSW) - O2-5 (BGND)	Always	Below 1 Ω

**NG** REPAIR OR REPLACE FLOOR WIRE NO.2

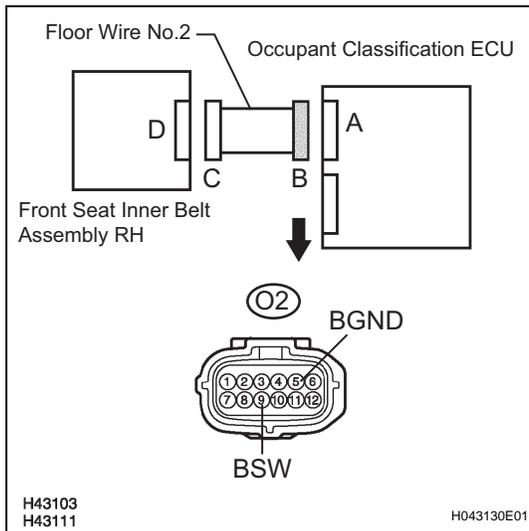
**OK**

**5 CHECK FLOOR WIRE NO.2 (SHORT)**

- (a) Disconnect the service wire from connector "C".  
 (b) Measure the resistance according to the value(s) in the table below.

**Resistance**

Tester connection	Condition	Specified condition
O2-9 (BSW) - O2-5 (BGND)	Always	1 M $\Omega$ or higher

**NG****REPAIR OR REPLACE FLOOR WIRE NO.2****OK****6 CHECK FLOOR WIRE NO.2 (SHORT TO GROUND)**

- (a) Measure the resistance according to the value(s) in the table below.

**Resistance**

Tester connection	Condition	Specified condition
O2-9 (BSW) - Body ground	Always	1 M $\Omega$ or higher
O2-5 (BGND) - Body ground	Always	1 M $\Omega$ or higher

**NG****REPAIR OR REPLACE FLOOR WIRE NO.2****OK****7 CHECK DTC**

- (a) Connect the connectors to the occupant classification ECU and the front seat inner belt assembly RH.  
 (b) Connect the negative (-) terminal cable to the battery.  
 (c) Turn the ignition switch to the ON position.  
 (d) Clear the DTCs stored in memory (See page RS-192).  
**HINT:**  
 First clear DTCs stored in the occupant classification ECU and then in the center airbag sensor assembly.

- (e) Turn the ignition switch to the LOCK position.
- (f) Turn the ignition switch to the ON position.
- (g) Check the DTCs (See page [RS-192](#)).

**OK:**

**DTC B1771 is not output.**

**HINT:**

Codes other than DTC B1771 may be output at this time, but they are not related to this check.

OK

USE SIMULATION METHOD TO CHECK

NG

8

REPLACE FRONT SEAT INNER BELT ASSEMBLY RH

- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery.
- (c) Replace the front seat inner belt assembly RH (See page [SB-6](#) or [SB-8](#)).

**HINT:**

Perform the inspection using parts from a normal vehicle if possible.

- (d) Connect the negative (-) terminal cable to the battery.
- (e) Turn the ignition switch to the ON position.
- (f) Clear the DTCs stored in memory (See page [RS-192](#)).

**HINT:**

First clear DTCs stored in the occupant classification ECU and then in the center airbag sensor assembly.

- (g) Turn the ignition switch to the LOCK position.
- (h) Turn the ignition switch to the ON position.
- (i) Check the DTCs (See page [RS-192](#)).

**OK:**

**DTC B1771 is not output.**

**HINT:**

Codes other than DTC B1771 may be output at this time, but they are not related to this check.

OK

END

NG

9

REPLACE OCCUPANT CLASSIFICATION ECU

- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery.
- (c) Replace the occupant classification ECU (See page [RS-320](#)).

NEXT

RS

**10** | **PERFORM ZERO POINT CALIBRATION**

- (a) Connect the negative (-) terminal cable to the battery.
- (b) Connect the intelligent tester to the DLC3.
- (c) Turn the ignition switch to the ON position.
- (d) Using the intelligent tester, perform "Zero point calibration" (See page [RS-185](#)).

**OK:**

The "**COMPLETED**" is displayed.

**NEXT**

**11** | **PERFORM SENSITIVITY CHECK**

- (a) Using the intelligent tester, perform "Sensitivity check" (See page [RS-185](#)).

**Standard value:**

**27 to 33 kg (59.52 to 72.75 lb)**

**NEXT**

**END**

<b>DTC</b>	<b>B1780</b>	<b>Front Occupant Classification Sensor LH Circuit Malfunction</b>
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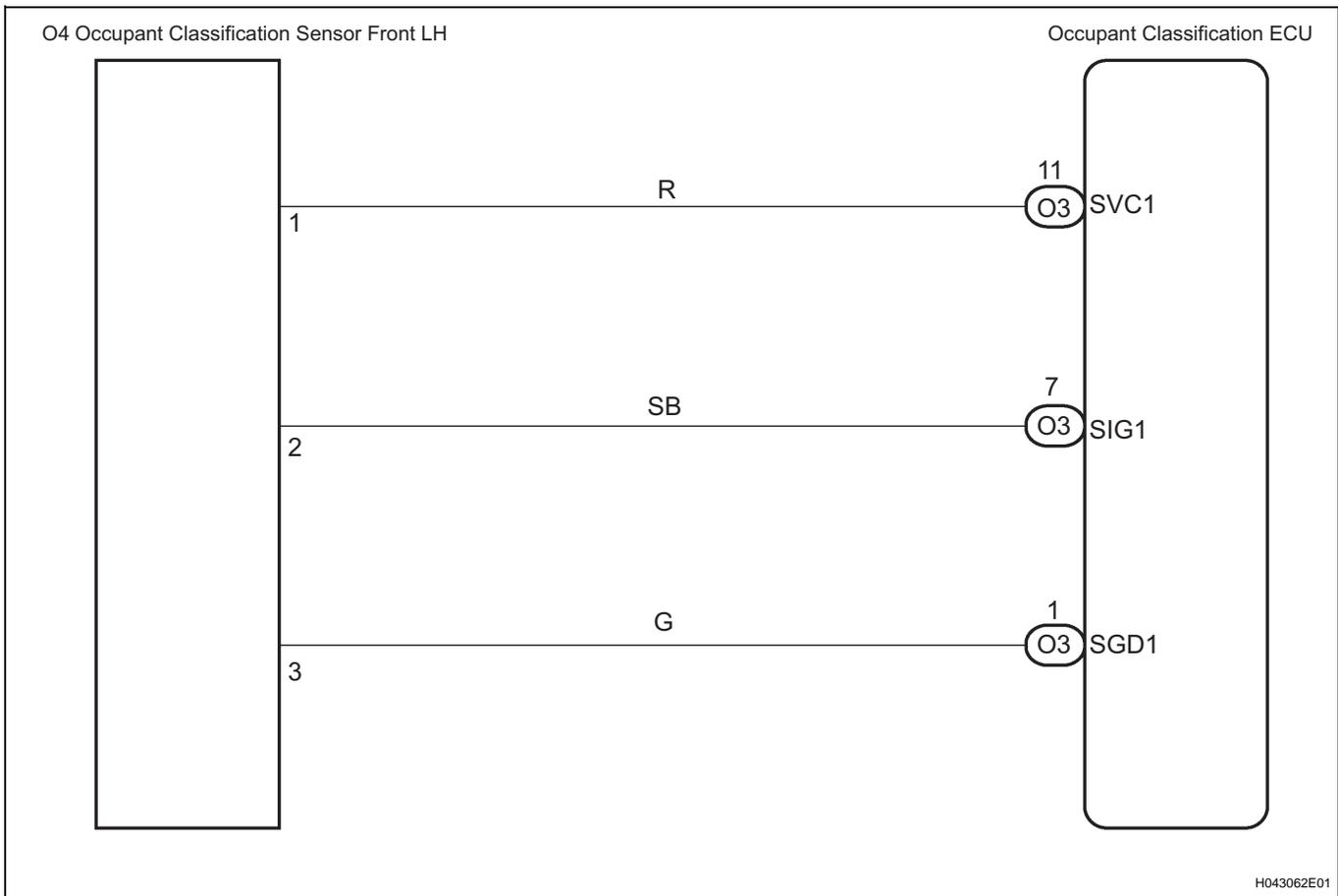
**DESCRIPTION**

The front occupant classification sensor LH circuit consists of the occupant classification ECU and the front occupant classification sensor LH.

DTC B1780 is recorded when a malfunction is detected in the front occupant classification sensor LH circuit.

DTC No.	DTC Detecting Condition	Trouble Area
B1780	<ul style="list-style-type: none"> <li>• The occupant classification ECU receives a line short circuit signal, an open circuit signal, a short circuit to ground signal or a short circuit to B+ signal in the front occupant classification sensor LH circuit for 2 seconds.</li> <li>• Front occupant classification sensor LH malfunction</li> <li>• Occupant classification ECU malfunction</li> </ul>	<ul style="list-style-type: none"> <li>• Front seat assembly RH (Front occupant classification sensor LH)</li> <li>• Floor wire No.2</li> <li>• Occupant classification ECU</li> </ul>

**WIRING DIAGRAM**



**RS**

**HINT:**

- If troubleshooting (wire harness inspection) is difficult to perform, remove the front passenger seat installation bolts to see the under surface of seat cushion.
- In the above case, hold the seat so that it does not fall down. Holding the seat for a long period of time may cause a problem, such as seat rail deformation. Hold the seat only as necessary.

1

## CHECK DTC

- (a) Turn the ignition switch to the ON position.
  - (b) Clear the DTCs stored in memory (See page [RS-192](#)).
- HINT:  
First clear DTCs stored in the occupant classification ECU and then in the center airbag sensor assembly.
- (c) Turn the ignition switch to the LOCK position.
  - (d) Turn the ignition switch to the ON position.
  - (e) Check the DTCs (See page [RS-192](#)).

**OK:****DTC B1780 is not output.**

## HINT:

Codes other than DTC B1780 may be output at this time, but they are not related to this check.

OK

USE SIMULATION METHOD TO CHECK

NG

2

## CHECK CONNECTION OF CONNECTORS

- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery.
- (c) Check that the connectors are properly connected to the occupant classification ECU and the front occupant classification sensor LH.

**OK:****The connectors are connected.**

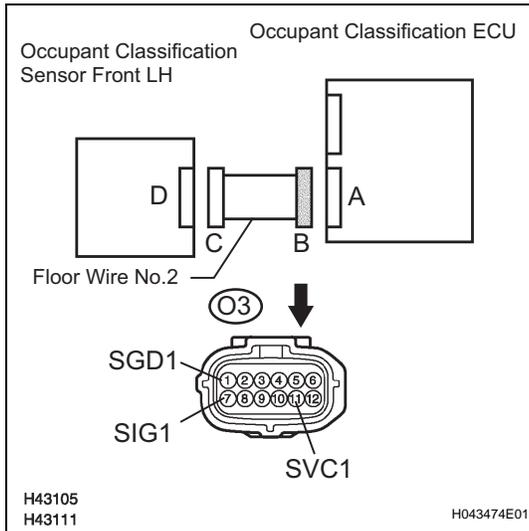
NG

CONNECT CONNECTOR, THEN GO TO STEP 1

OK

RS

**3 CHECK FLOOR WIRE NO.2 (SHORT TO B+)**



- (a) Disconnect the connectors from the occupant classification ECU and the front occupant classification sensor LH.
- (b) Connect the negative (-) terminal cable to the battery.
- (c) Turn the ignition switch to the ON position.
- (d) Measure the voltage according to the value(s) in the table below.

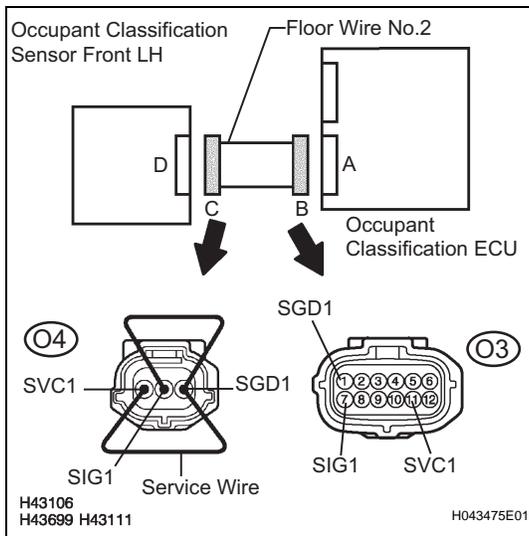
**Voltage**

Tester connection	Condition	Specified condition
O3-1 (SGD1) - Body ground	Ignition switch ON	Below 1 V
O3-7 (SIG1) - Body ground	Ignition switch ON	Below 1 V
O3-11 (SVC1) - Body ground	Ignition switch ON	Below 1 V

**NG** REPAIR OR REPLACE FLOOR WIRE NO.2

**OK**

**4 CHECK FLOOR WIRE NO.2 (OPEN)**



- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery.
- (c) Using a service wire, connect O4-1 (SVC1) and O4-3 (SGD1), and connect O4-2 (SIG1) and O4-3 (SGD1) of connector "C".
- (d) Measure the resistance according to the value(s) in the table below.

**NOTICE:**

**Do not forcibly insert a service wire into the terminals of the connector when connecting.**

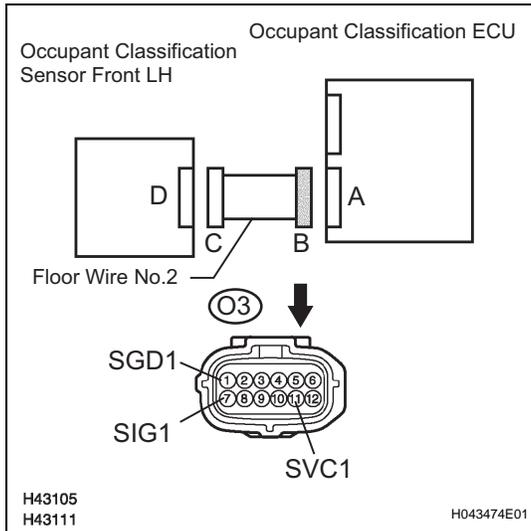
- (d) Measure the resistance according to the value(s) in the table below.

**Resistance**

Tester connection	Condition	Specified condition
O3-7 (SIG1) - O3-1 (SGD1)	Always	Below 1 Ω
O3-11 (SVC1) - O3-1 (SGD1)	Always	Below 1 Ω

**NG** REPAIR OR REPLACE FLOOR WIRE NO.2

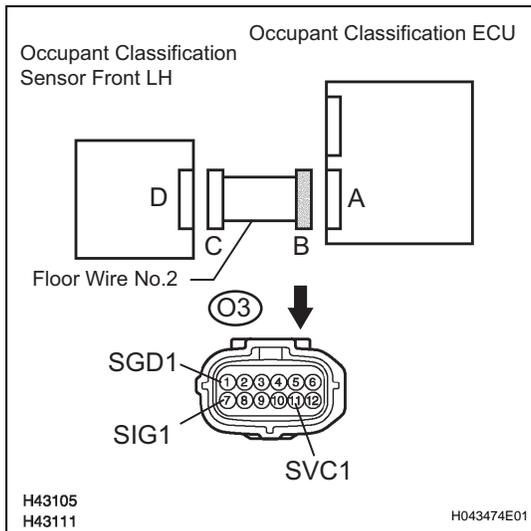
**OK**

**5 CHECK FLOOR WIRE NO.2 (SHORT)**

- (a) Disconnect the service wire from connector "C".  
 (b) Measure the resistance according to the value(s) in the table below.

**Resistance**

Tester connection	Condition	Specified condition
O3-7 (SIG1) - O3-1 (SGD1)	Always	1 MΩ or higher
O3-11 (SVC1) - O3-1 (SGD1)	Always	1 MΩ or higher
O3-7 (SIG1) - O3-11 (SVC1)	Always	1 MΩ or higher

**NG****REPAIR OR REPLACE FLOOR WIRE NO.2****OK****6 CHECK FLOOR WIRE NO.2 (SHORT TO GROUND)**

- (a) Measure the resistance according to the value(s) in the table below.

**Resistance**

Tester connection	Condition	Specified condition
O3-1 (SGD1) - Body ground	Always	1 MΩ or higher
O3-7 (SIG1) - Body ground	Always	1 MΩ or higher
O3-11 (SVC1) - Body ground	Always	1 MΩ or higher

**NG****REPAIR OR REPLACE FLOOR WIRE NO.2****OK****7 CHECK DTC**

- (a) Connect the connectors to the occupant classification ECU and the front occupant classification sensor LH.  
 (b) Connect the negative (-) terminal cable to the battery.  
 (c) Turn the ignition switch to the ON position.  
 (d) Clear the DTCs stored in memory (See page RS-192).  
**HINT:**  
 First clear DTCs stored in the occupant classification ECU and then in the center airbag sensor assembly.

- (e) Turn the ignition switch to the LOCK position.
- (f) Turn the ignition switch to the ON position.
- (g) Check the DTCs (See page [RS-192](#)).

**OK:**

**DTC B1780 is not output.**

**HINT:**

Codes other than DTC B1780 may be output at this time, but they are not related to this check.

**OK** → **USE SIMULATION METHOD TO CHECK**

**NG**

**8 REPLACE OCCUPANT CLASSIFICATION ECU**

- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery.
- (c) Replace the occupant classification ECU (See page [RS-320](#)).

**HINT:**

Perform the inspection using parts from a normal vehicle if possible.

**NEXT**

**9 PERFORM ZERO POINT CALIBRATION**

**RS**

- (a) Connect the negative (-) terminal cable to the battery.
- (b) Connect the intelligent tester to the DLC3.
- (c) Turn the ignition switch to the ON position.
- (d) Using the intelligent tester, perform "Zero point calibration" (See page [RS-185](#)).

**OK:**

**The "COMPLETED" is displayed.**

**NG** → **Go to step 12**

**OK**

**10 PERFORM SENSITIVITY CHECK**

- (a) Using the intelligent tester, perform "Sensitivity check" (See page [RS-185](#)).

**Standard value:**

**27 to 33 kg (59.52 to 72.75 lb)**

**NG** → **Go to step 12**

**OK**

**11 CHECK DTC**

- (a) Connect the negative (-) terminal cable to the battery.

- (b) Turn the ignition switch to the ON position.
- (c) Clear the DTCs stored in memory (See page [RS-192](#)).  
HINT:  
First clear DTCs stored in the occupant classification ECU and then in the center airbag sensor assembly.
- (d) Turn the ignition switch to the LOCK position.
- (e) Turn the ignition switch to the ON position.
- (f) Check the DTCs (See page [RS-192](#)).

**OK:**

**DTC B1780 is not output.**

HINT:

Codes other than DTC B1780 may be output at this time, but they are not related to this check.

OK

END

NG

## 12 REPLACE FRONT SEAT ASSEMBLY RH

- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery.
- (c) Replace the front seat assembly RH (See page [SE-18](#) or [SE-30](#)).

NEXT

RS

## 13 PERFORM ZERO POINT CALIBRATION

- (a) Connect the negative (-) terminal cable to the battery.
- (b) Connect the intelligent tester to the DLC3.
- (c) Turn the ignition switch to the ON position.
- (d) Using the intelligent tester, perform "Zero point calibration" (See page [RS-185](#)).

**OK:**

The "COMPLETED" is display.

NEXT

## 14 PERFORM SENSITIVITY CHECK

- (a) Using the intelligent tester, perform "Sensitivity check" (See page [RS-185](#)).

**Standard value:**

**27 to 33 kg (59.52 to 72.75 lb)**

NEXT

END

<b>DTC</b>	<b>B1781</b>	<b>Front Occupant Classification Sensor RH Circuit Malfunction</b>
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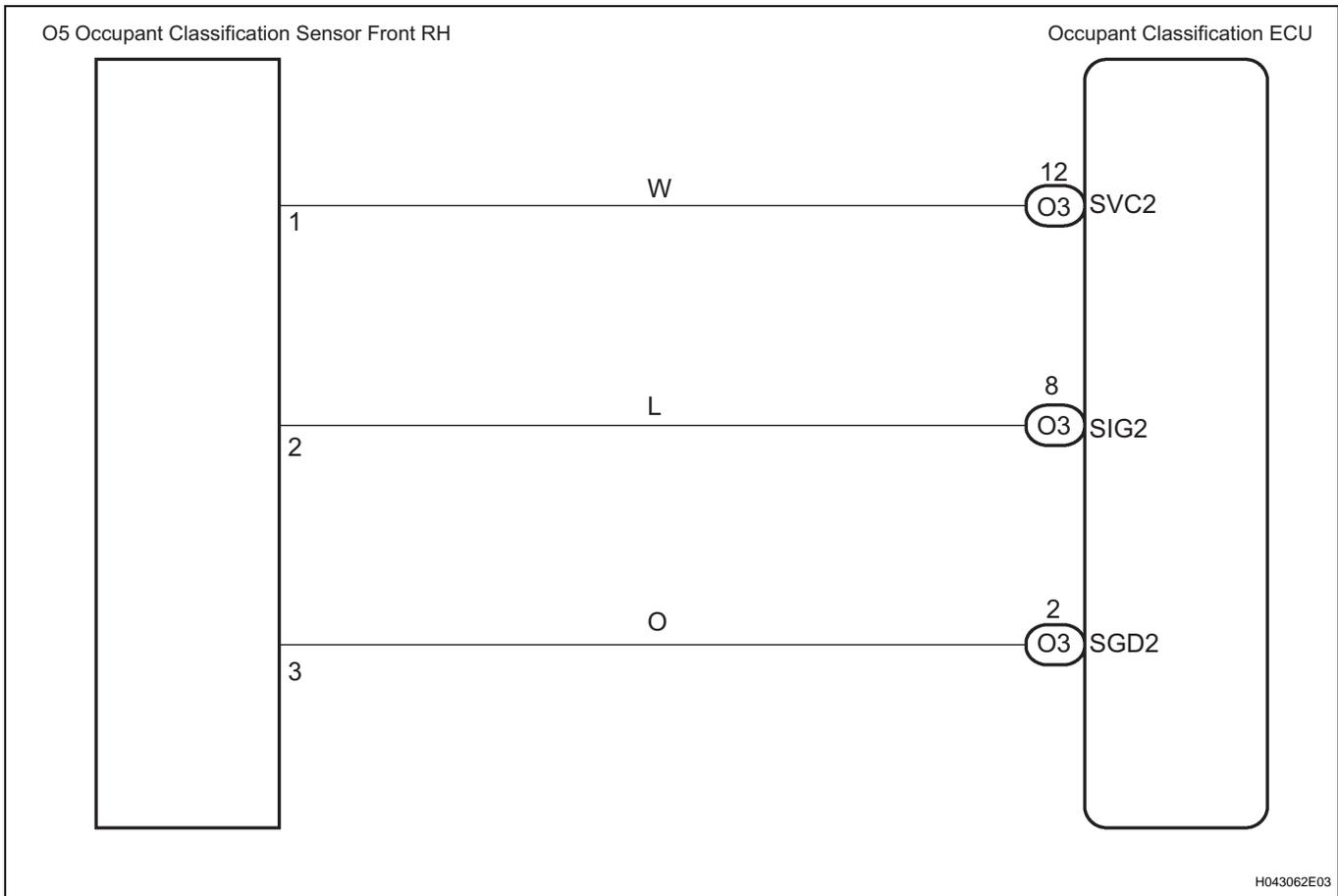
**DESCRIPTION**

The front occupant classification sensor RH circuit consists of the occupant classification ECU and the front occupant classification sensor RH.

DTC B1781 is recorded when a malfunction is detected in the front occupant classification sensor RH circuit.

DTC No.	DTC Detecting Condition	Trouble Area
B1781	<ul style="list-style-type: none"> <li>The occupant classification ECU receives a line short circuit signal, an open circuit signal, a short circuit to ground signal or a short circuit to B+ signal in the front occupant classification sensor RH circuit for 2 seconds.</li> <li>Front occupant classification sensor RH malfunction</li> <li>Occupant classification ECU malfunction</li> </ul>	<ul style="list-style-type: none"> <li>Front seat assembly RH (Front occupant classification sensor RH)</li> <li>Floor wire No.2</li> <li>Occupant classification ECU</li> </ul>

**WIRING DIAGRAM**



**RS**

**HINT:**

- If troubleshooting (wire harness inspection) is difficult to perform, remove the front passenger seat installation bolts to see the under surface of seat cushion.
- In the above case, hold the seat so that it does not fall down. Holding the seat for a long period of time may cause a problem, such as seat rail deformation. Hold the seat only as necessary.

1

## CHECK DTC

- (a) Turn the ignition switch to the ON position.
  - (b) Clear the DTCs stored in memory (See page [RS-192](#)).
- HINT:  
First clear DTCs stored in the occupant classification ECU and then in the center airbag sensor assembly.
- (c) Turn the ignition switch to the LOCK position.
  - (d) Turn the ignition switch to the ON position.
  - (e) Check the DTCs (See page [RS-192](#)).

**OK:****DTC B1781 is not output.****HINT:**

Codes other than DTC B1781 may be output at this time, but they are not related to this check.

OK

**USE SIMULATION METHOD TO CHECK**

NG

2

## CHECK CONNECTION OF CONNECTORS

- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery.
- (c) Check that the connectors are properly connected to the occupant classification ECU and the front occupant classification sensor RH.

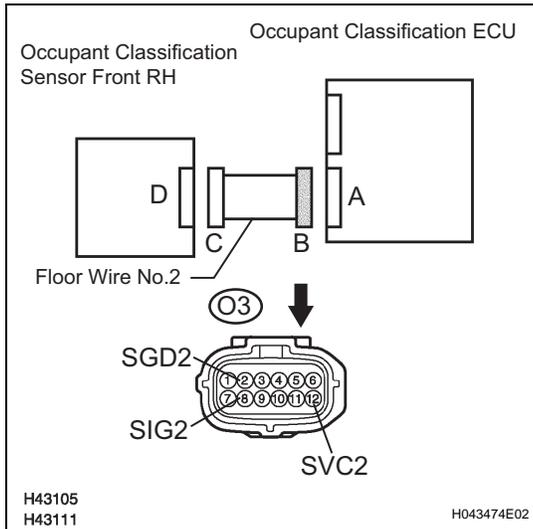
**OK:****The connectors are connected.**

NG

**CONNECT CONNECTORS, THEN GO TO STEP 1**

OK

**3 CHECK FLOOR WIRE NO.2 (SHORT TO B+)**



- (a) Disconnect the connectors from the occupant classification ECU and the front occupant classification sensor RH.
- (b) Connect the negative (-) terminal cable to the battery.
- (c) Turn the ignition switch to the ON position.
- (d) Measure the voltage according to the value(s) in the table below.

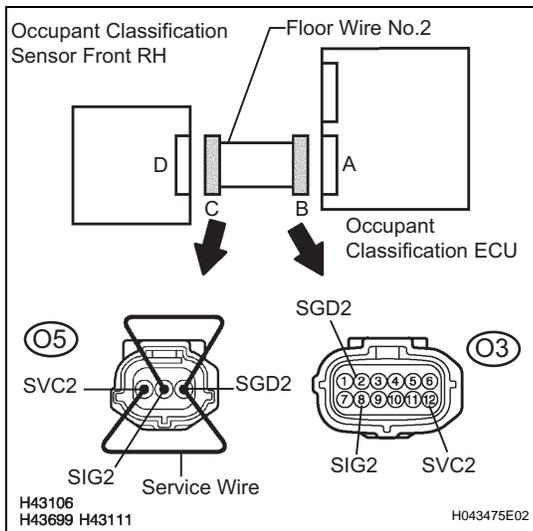
**Voltage**

Tester connection	Condition	Specified condition
O3-2 (SGD2) - Body ground	Ignition switch ON	Below 1 V
O3-8 (SIG2) - Body ground	Ignition switch ON	Below 1 V
O3-12 (SVC2) - Body ground	Ignition switch ON	Below 1 V

**NG** REPAIR OR REPLACE FLOOR WIRE NO.2

**OK**

**4 CHECK FLOOR WIRE NO.2 (OPEN)**



- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery.
- (c) Using a service wire, connect O5-1 (SVC2) and O5-3 (SGD2), and connect O5-2 (SIG2) and O5-3 (SGD2) of connector "C".
- (d) Measure the resistance according to the value(s) in the table below.

**NOTICE:**

**Do not forcibly insert a service wire into the terminals of the connector when connecting.**

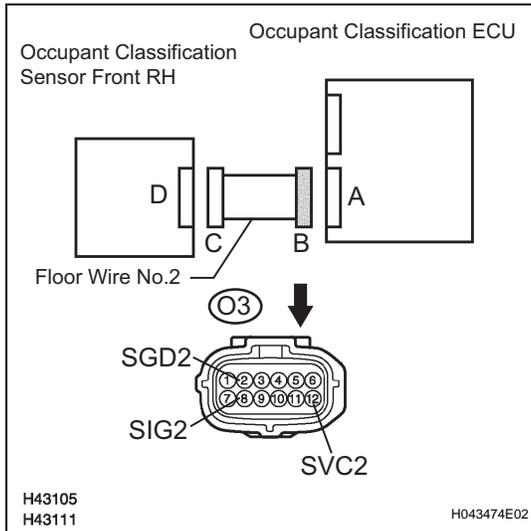
**Resistance**

Tester connection	Condition	Specified condition
O3-8 (SIG2) - O3-2 (SGD2)	Always	Below 1 Ω
O3-12 (SVC2) - O3-2 (SGD2)	Always	Below 1 Ω

**NG** REPAIR OR REPLACE FLOOR WIRE NO.2

**OK**

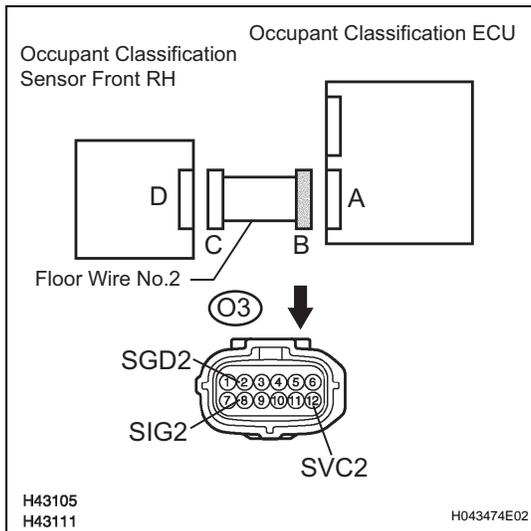
**RS**

**5 CHECK FLOOR WIRE NO.2 (SHORT)**

- (a) Disconnect the service wire from connector "C".  
 (b) Measure the resistance according to the value(s) in the table below.

**Resistance**

Tester connection	Condition	Specified condition
O3-8 (SIG2) - O3-2 (SGD2)	Always	1 MΩ or higher
O3-12 (SVC2) - O3-2 (SGD2)	Always	1 MΩ or higher
O3-8 (SIG2) - O3-12 (SVC2)	Always	1 MΩ or higher

**NG****REPAIR OR REPLACE FLOOR WIRE NO.2****OK****6 CHECK FLOOR WIRE NO.2 (SHORT TO GROUND)**

- (a) Measure the resistance according to the value(s) in the table below.

**Resistance**

Tester connection	Condition	Specified condition
O3-2 (SGD2) - Body ground	Always	1 MΩ or higher
O3-8 (SIG2) - Body ground	Always	1 MΩ or higher
O3-12 (SVC2) - Body ground	Always	1 MΩ or higher

**NG****REPAIR OR REPLACE FLOOR WIRE NO.2****OK****7 CHECK DTC**

- (a) Connect the connectors to the occupant classification ECU and the front occupant classification sensor RH.  
 (b) Connect the negative (-) terminal cable to the battery.  
 (c) Turn the ignition switch to the ON position.  
 (d) Clear the DTCs stored in memory (See page RS-192).  
**HINT:**  
 First clear DTCs stored in the occupant classification ECU and then in the center airbag sensor assembly.

- (e) Turn the ignition switch to the LOCK position.
- (f) Turn the ignition switch to the ON position.
- (g) Check the DTCs (See page [RS-192](#)).

**OK:**

**DTC B1781 is not output.**

**HINT:**

Codes other than DTC B1781 may be output at this time, but they are not related to this check.

**OK** → **USE SIMULATION METHOD TO CHECK**

**NG**

**8 REPLACE OCCUPANT CLASSIFICATION ECU**

- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery.
- (c) Replace the occupant classification ECU (See page [RS-320](#)).

**HINT:**

Perform the inspection using parts from a normal vehicle if possible.

**NEXT**

**9 PERFORM ZERO POINT CALIBRATION**

**RS**

- (a) Connect the negative (-) terminal cable to the battery.
- (b) Connect the intelligent tester to the DLC3.
- (c) Turn the ignition switch to the ON position.
- (d) Using the intelligent tester, perform "Zero point calibration" (See page [RS-185](#)).

**OK:**

**The "COMPLETED" is displayed.**

**NG** → **Go to step 12**

**OK**

**10 PERFORM SENSITIVITY CHECK**

- (a) Using the intelligent tester, perform "Sensitivity check" (See page [RS-185](#)).

**Standard value:**

**27 to 33 kg (59.52 to 72.75 lb)**

**NG** → **Go to step 12**

**OK**

**11 CHECK DTC**

- (a) Connect the negative (-) terminal cable to the battery.

- (b) Turn the ignition switch to the ON position.
- (c) Clear the DTCs stored in memory (See page [RS-192](#)).  
HINT:  
First clear DTCs stored in the occupant classification ECU and then in the center airbag sensor assembly.
- (d) Turn the ignition switch to the LOCK position.
- (e) Turn the ignition switch to the ON position.
- (f) Check the DTCs (See page [RS-192](#)).

**OK:**

**DTC B1781 is not output.**

HINT:

Codes other than DTC B1781 may be output at this time, but they are not related to this check.

OK

END

NG

## 12 REPLACE FRONT SEAT ASSEMBLY RH

- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery.
- (c) Replace the front seat assembly RH (See page [SE-18](#) or [SE-30](#)).

NEXT

RS

## 13 PERFORM ZERO POINT CALIBRATION

- (a) Connect the negative (-) terminal cable to the battery.
- (b) Connect the intelligent tester to the DLC3.
- (c) Turn the ignition switch to the ON position.
- (d) Using the intelligent tester, perform "Zero point calibration" (See page [RS-185](#)).

**OK:**

The "COMPLETED" is displayed.

NEXT

## 14 PERFORM SENSITIVITY CHECK

- (a) Using the intelligent tester, perform "Sensitivity check" (See page [RS-185](#)).

**Standard value:**

**27 to 33 kg (59.52 to 72.75 lb)**

NEXT

END

<b>DTC</b>	<b>B1782</b>	<b>Rear Occupant Classification Sensor LH Circuit Malfunction</b>
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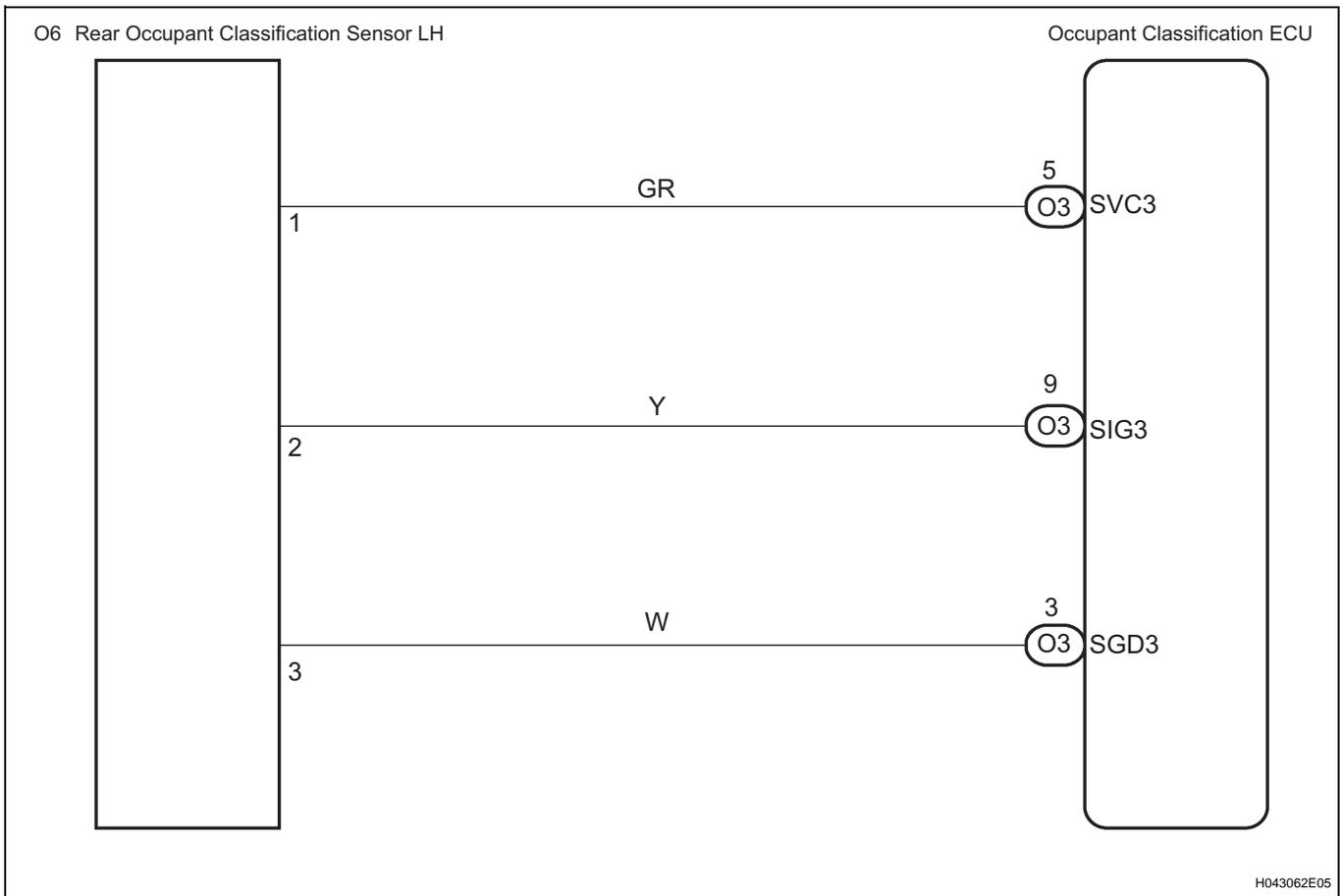
**DESCRIPTION**

The rear occupant classification sensor LH circuit consists of the occupant classification ECU and the rear occupant classification sensor LH.

DTC B1782 is recorded when a malfunction is detected in the rear occupant classification sensor LH circuit.

DTC No.	DTC Detecting Condition	Trouble Area
B1782	<ul style="list-style-type: none"> <li>The occupant classification ECU receives a line short circuit signal, an open circuit signal, a short circuit to ground signal or a short circuit to B+ signal in the rear occupant classification sensor LH circuit for 2 seconds.</li> <li>Rear occupant classification sensor LH malfunction</li> <li>Occupant classification ECU malfunction</li> </ul>	<ul style="list-style-type: none"> <li>Front seat assembly RH (Rear occupant classification sensor LH)</li> <li>Floor wire No.2</li> <li>Occupant classification ECU</li> </ul>

**WIRING DIAGRAM**



**RS**

**HINT:**

- If troubleshooting (wire harness inspection) is difficult to perform, remove the front passenger seat installation bolts to see the under surface of seat cushion.
- In the above case, hold the seat so that it does not fall down. Holding the seat for a long period of time may cause a problem, such as seat rail deformation. Hold the seat only as necessary.

1

## CHECK DTC

- (a) Turn the ignition switch to the ON position.
  - (b) Clear the DTCs stored in memory (See page [RS-192](#)).
- HINT:  
First clear DTCs stored in the occupant classification ECU and then in the center airbag sensor assembly.
- (c) Turn the ignition switch to the LOCK position.
  - (d) Turn the ignition switch to the ON position.
  - (e) Check the DTCs (See page [RS-192](#)).

**OK:****DTC B1782 is not output.****HINT:**

Codes other than DTC B1782 may be output at this time, but they are not related to this check.

OK

**USE SIMULATION METHOD TO CHECK**

NG

2

## CHECK CONNECTION OF CONNECTORS

- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery.
- (c) Check that the connectors are properly connected to the occupant classification ECU and the rear occupant classification sensor LH.

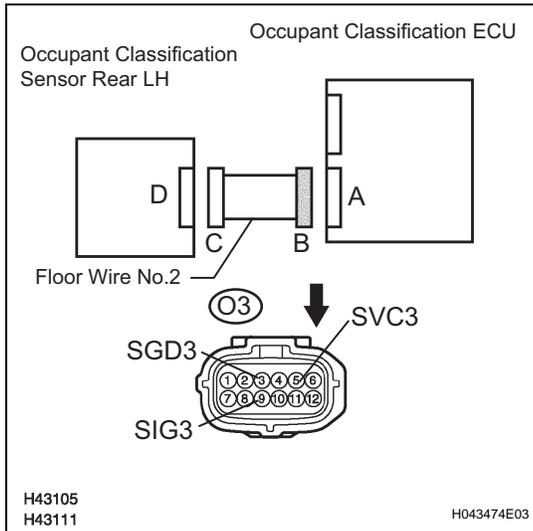
**OK:****The connectors are connected.**

NG

**CONNECT CONNECTORS, THEN GO TO STEP 1**

OK

**3 CHECK FLOOR WIRE NO.2 (SHORT TO B+)**



- (a) Disconnect the connectors from the occupant classification ECU and the rear occupant classification sensor LH.
- (b) Connect the negative (-) terminal cable to the battery.
- (c) Turn the ignition switch to the ON position.
- (d) Measure the voltage according to the value(s) in the table below.

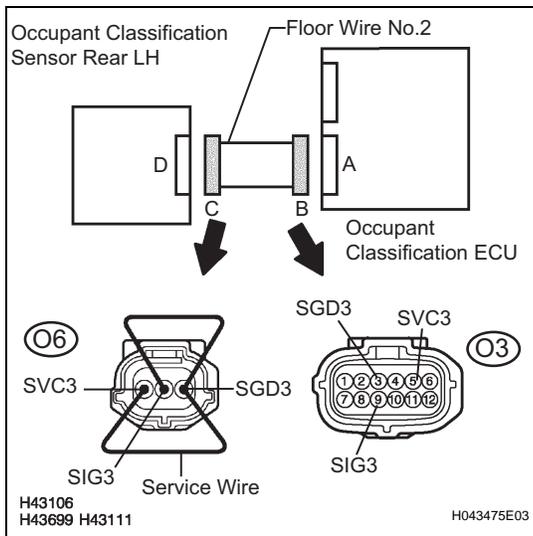
**Voltage**

Tester connection	Condition	Specified condition
O3-3 (SGD3) - Body ground	Ignition switch ON	Below 1 V
O3-5 (SVC3) - Body ground	Ignition switch ON	Below 1 V
O3-9 (SIG3) - Body ground	Ignition switch ON	Below 1 V

**NG** REPAIR OR REPLACE FLOOR WIRE NO.2

**OK**

**4 CHECK FLOOR WIRE NO.2 (OPEN)**



- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery.
- (c) Using a service wire, connect O6-1 (SVC3) and O6-3 (SGD3), and connect O6-2 (SIG3) and O6-3 (SGD3) of connector "C".

**NOTICE:**

**Do not forcibly insert a service wire into the terminals of the connector when connecting.**

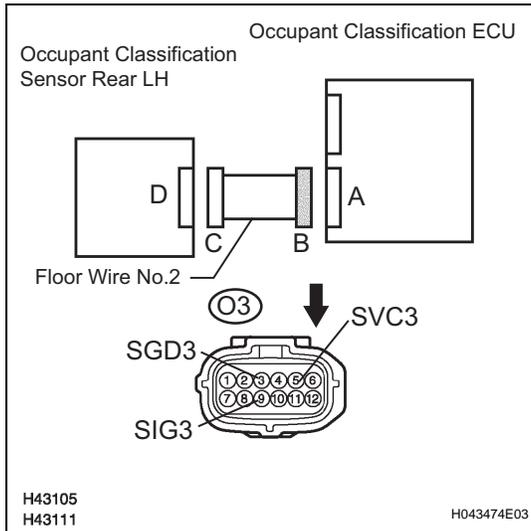
- (d) Measure the resistance according to the value(s) in the table below.

**Resistance**

Tester connection	Condition	Specified condition
O3-5 (SVC3) - O3-3 (SGD3)	Always	Below 1 Ω
O3-9 (SIG3) - O3-3 (SGD3)	Always	Below 1 Ω

**NG** REPAIR OR REPLACE FLOOR WIRE NO.2

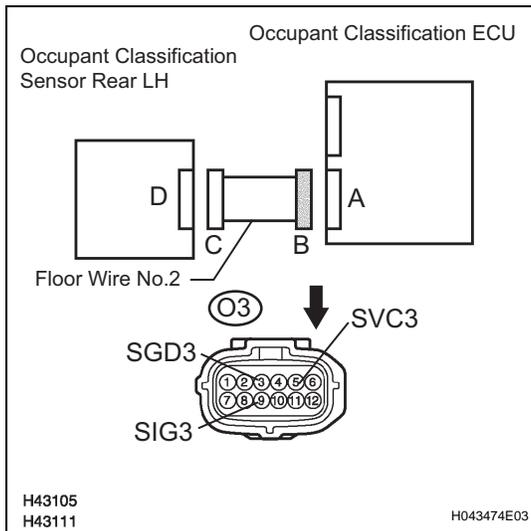
**OK**

**5 CHECK FLOOR WIRE NO.2 (SHORT)**

- (a) Disconnect the service wire from connector "C".  
 (b) Measure the resistance according to the value(s) in the table below.

**Resistance**

Tester connection	Condition	Specified condition
O3-5 (SVC3) - O3-3 (SGD3)	Always	1 MΩ or higher
O3-9 (SIG3) - O3-3 (SGD3)	Always	1 MΩ or higher
O3-5 (SVC3) - O3-9 (SIG3)	Always	1 MΩ or higher

**NG****REPAIR OR REPLACE FLOOR WIRE NO.2****OK****6 CHECK FLOOR WIRE NO.2 (SHORT TO GROUND)**

- (a) Measure the resistance according to value(s) in the table below.

**Resistance**

Tester connection	Condition	Specified condition
O3-3 (SGD3) - Body ground	Always	1 MΩ or higher
O3-5 (SVC3) - Body ground	Always	1 MΩ or higher
O3-9 (SIG3) - Body ground	Always	1 MΩ or higher

**NG****REPAIR OR REPLACE FLOOR WIRE NO.2****OK****7 CHECK DTC**

- (a) Connect the connectors to the occupant classification ECU and the rear occupant classification sensor LH.  
 (b) Connect the negative (-) terminal cable to the battery.  
 (c) Turn the ignition switch to the ON position.  
 (d) Clear the DTCs stored in memory (See page RS-192).

**HINT:**

First clear DTCs stored in the occupant classification ECU and then in the center airbag sensor assembly.

- (e) Turn the ignition switch to the LOCK position.
- (f) Turn the ignition switch to the ON position.
- (g) Check the DTCs (See page [RS-192](#)).

**OK:**

**DTC B1782 is not output.**

**HINT:**

Codes other than DTC B1782 may be output at this time, but they are not related to this check.

**OK** → **USE SIMULATION METHOD TO CHECK**

**NG**

**8 REPLACE OCCUPANT CLASSIFICATION ECU**

- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery.
- (c) Replace the occupant classification ECU (See page [RS-320](#)).

**HINT:**

Perform the inspection using parts from a normal vehicle if possible.

**NEXT**

**9 PERFORM ZERO POINT CALIBRATION**

**RS**

- (a) Connect the negative (-) terminal cable to the battery.
- (b) Connect the intelligent tester to the DLC3.
- (c) Turn the ignition switch to the ON position.
- (d) Using the intelligent tester, perform "Zero point calibration" (See page [RS-185](#)).

**OK:**

**The "COMPLETED" is displayed.**

**NG** → **Go to step 12**

**OK**

**10 PERFORM SENSITIVITY CHECK**

- (a) Using the intelligent tester, perform "Sensitivity check" (See page [RS-185](#)).

**Standard value:**

**27 to 33 kg (59.52 to 72.75 lb)**

**NG** → **Go to step 12**

**OK**

**11 CHECK DTC**

- (a) Connect the negative (-) terminal cable to the battery.

- (b) Turn the ignition switch to the ON position.
- (c) Clear the DTCs stored in memory (See page [RS-192](#)).  
HINT:  
First clear DTCs stored in the occupant classification ECU and then in the center airbag sensor assembly.
- (d) Turn the ignition switch to the LOCK position.
- (e) Turn the ignition switch to the ON position.
- (f) Check the DTCs (See page [RS-192](#)).

**OK:**

**DTC B1782 is not output.**

HINT:

Codes other than DTC B1782 may be output at this time, but they are not related to this check.

OK

END

NG

## 12 REPLACE FRONT SEAT ASSEMBLY RH

- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery.
- (c) Replace the front seat assembly RH (See page [SE-18](#) or [SE-30](#)).

NEXT

RS

## 13 PERFORM ZERO POINT CALIBRATION

- (a) Connect the negative (-) terminal cable to the battery.
- (b) Connect the intelligent tester to the DLC3.
- (c) Turn the ignition switch to the ON position.
- (d) Using the intelligent tester, perform "Zero point calibration" (See page [RS-185](#)).

**OK:**

The "COMPLETED" is displayed.

NEXT

## 14 PERFORM SENSITIVITY CHECK

- (a) Using the intelligent tester, perform "Sensitivity check" (See page [RS-185](#)).

**Standard value:**

**27 to 33 kg (59.52 to 72.75 lb)**

NEXT

END

<b>DTC</b>	<b>B1783</b>	<b>Rear Occupant Classification Sensor RH Circuit Malfunction</b>
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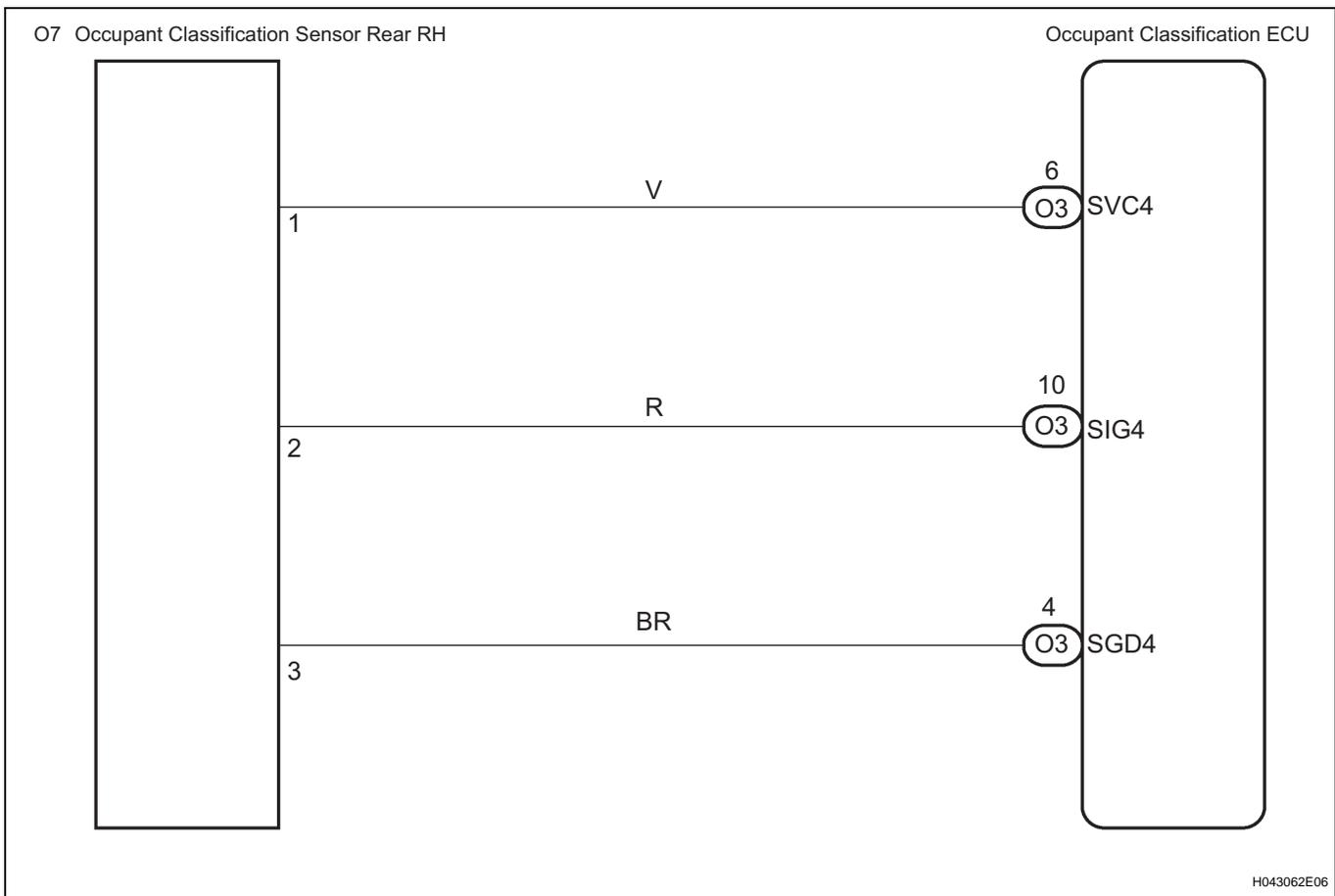
**DESCRIPTION**

The rear occupant classification sensor RH circuit consists of the occupant classification ECU and the rear occupant classification sensor RH.

DTC B1783 is recorded when a malfunction is detected in the rear occupant classification sensor RH circuit.

DTC No.	DTC Detecting Condition	Trouble Area
B1783	<ul style="list-style-type: none"> <li>The occupant classification ECU receives a line short circuit signal, an open circuit signal, a short circuit to ground signal or a short circuit to B+ signal in the rear occupant classification sensor RH circuit for 2 seconds.</li> <li>Rear occupant classification sensor RH malfunction.</li> <li>Occupant classification ECU malfunction.</li> </ul>	<ul style="list-style-type: none"> <li>Front seat assembly RH (Rear occupant classification sensor RH)</li> <li>Floor wire No.2</li> <li>Occupant classification ECU</li> </ul>

**WIRING DIAGRAM**



**RS**

**HINT:**

- If troubleshooting (wire harness inspection) is difficult to perform, remove the front passenger seat installation bolts to see the under surface of seat cushion.
- In the above case, hold the seat so that it does not fall down. Holding the seat for a long period of time may cause a problem, such as seat rail deformation. Hold the seat only as necessary.

1

## CHECK DTC

- (a) Turn the ignition switch to the ON position.
  - (b) Clear the DTCs stored in memory (See page [RS-192](#)).
- HINT:  
First clear DTCs stored in the occupant classification ECU and then in the center airbag sensor assembly.
- (c) Turn the ignition switch to the LOCK position.
  - (d) Turn the ignition switch to the ON position.
  - (e) Check the DTCs (See page [RS-192](#)).

**OK:****DTC B1783 is not output.****HINT:**

Codes other than DTC B1783 may be output at this time, but they are not related to this check.

OK

**USE SIMULATION METHOD TO CHECK**

NG

2

## CHECK CONNECTION OF CONNECTORS

- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery.
- (c) Check that the connectors are properly connected to the occupant classification ECU and the rear occupant classification sensor RH.

**OK:****The connectors are connected.**

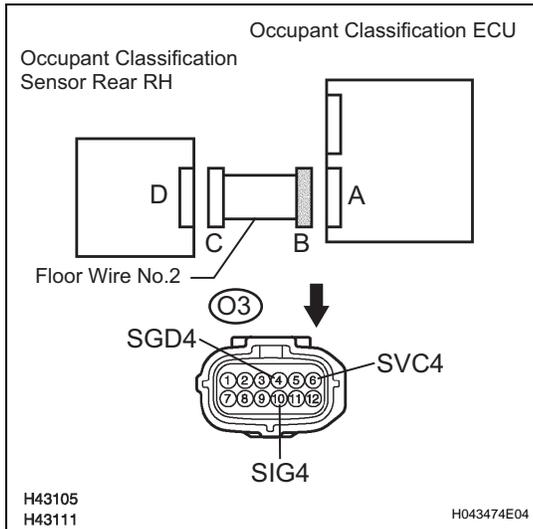
NG

**CONNECT CONNECTORS, THEN GO TO STEP 1**

OK

RS

**3 CHECK FLOOR WIRE NO.2 (SHORT TO B+)**



- (a) Disconnect the connectors from the occupant classification ECU and the rear occupant classification sensor RH.
- (b) Connect the negative (-) terminal cable to the battery.
- (c) Turn the ignition switch to the ON position.
- (d) Measure the voltage according to the value(s) in the table below.

**Voltage**

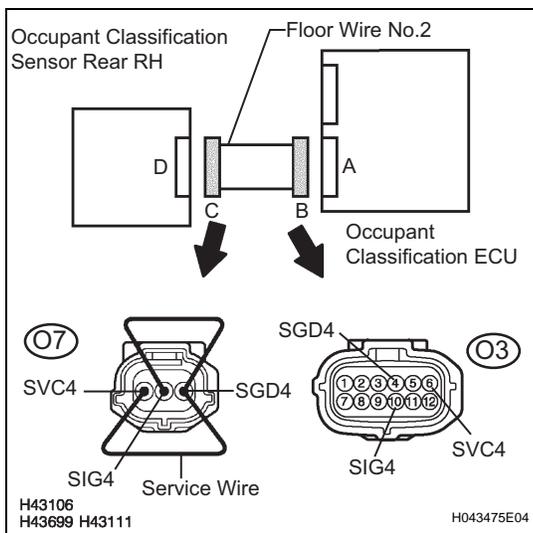
Tester connection	Condition	Specified condition
O3-4 (SGD4) - Body ground	Ignition switch ON	Below 1 V
O3-6 (SVC4) - Body ground	Ignition switch ON	Below 1 V
O3-10 (SIG4) - Body ground	Ignition switch ON	Below 1 V

NG

**REPAIR OR REPLACE FLOOR WIRE NO.2**

OK

**4 CHECK FLOOR WIRE NO.2 (OPEN)**



- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery.
- (c) Using a service wire, connect O7-1 (SVC4) and O7-3 (SGD4), and connect O7-2 (SIG4) and O7-3 (SGD4) of connector "C".

**NOTICE:**

**Do not forcibly insert a service wire into the terminals of the connector when connecting.**

- (d) Measure the resistance according to the value(s) in the table below.

**Resistance**

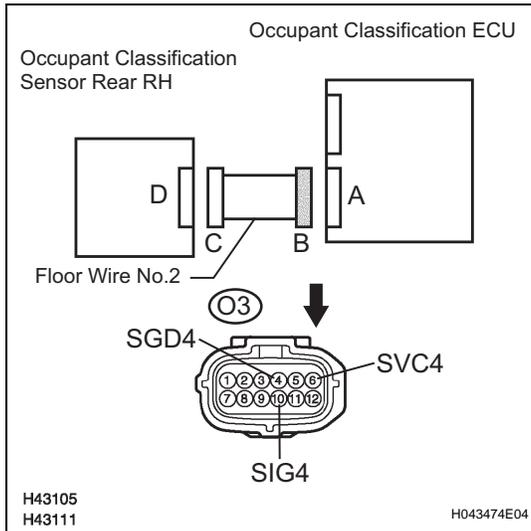
Tester connection	Condition	Specified condition
O3-6 (SVC4) - O3-4 (SGD4)	Always	Below 1 Ω
O3-10 (SIG4) - O3-4 (SGD4)	Always	Below 1 Ω

NG

**REPAIR OR REPLACE FLOOR WIRE NO.2**

OK

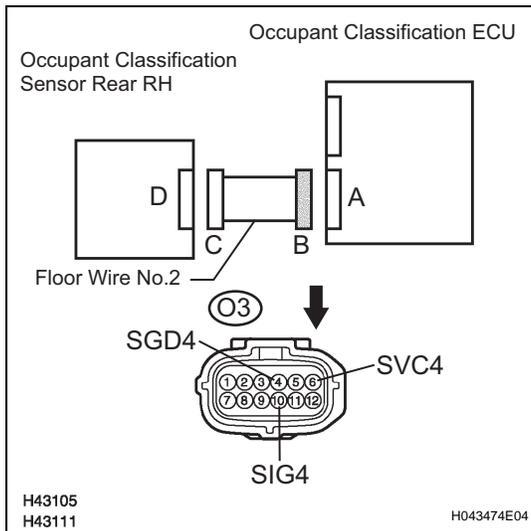
RS

**5 CHECK FLOOR WIRE NO.2 (SHORT)**

- (a) Disconnect the service wire from connector "C".  
 (b) Measure the resistance according to the value(s) in the table below.

**Resistance**

Tester connection	Condition	Specified condition
O3-6 (SVC4) - O3-4 (SGD4)	Always	1 MΩ or higher
O3-10 (SIG4) - O3-4 (SGD4)	Always	1 MΩ or higher
O3-6 (SVC4) - O3-10 (SIG4)	Always	1 MΩ or higher

**NG****REPAIR OR REPLACE FLOOR WIRE NO.2****OK****6 CHECK FLOOR WIRE NO.2 (SHORT TO GROUND)**

- (a) Measure the resistance according to the value(s) in the table below.

**Resistance**

Tester connection	Condition	Specified condition
O3-4 (SGD4) - Body ground	Always	1 MΩ or higher
O3-6 (SVC4) - Body ground	Always	1 MΩ or higher
O3-10 (SIG4) - Body ground	Always	1 MΩ or higher

**NG****REPAIR OR REPLACE FLOOR WIRE NO.2****OK****7 CHECK DTC**

- (a) Connect the connectors to the occupant classification ECU and the rear occupant classification sensor RH.  
 (b) Connect the negative (-) terminal cable to the battery.  
 (c) Turn the ignition switch to the ON position.  
 (d) Clear the DTCs stored in memory (See page RS-192).  
**HINT:**  
 First clear DTCs stored in the occupant classification ECU and then in the center airbag sensor assembly.

- (e) Turn the ignition switch to the LOCK position.
- (f) Turn the ignition switch to the ON position.
- (g) Check the DTCs (See page )[RS-192](#).

**OK:**

**DTC B1783 is not output.**

**HINT:**

Codes other than DTC B1783 may be output at this time, but they are not related to this check.

**OK** → **USE SIMULATION METHOD TO CHECK**

**NG**

**8 REPLACE OCCUPANT CLASSIFICATION ECU**

- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery.
- (c) Replace the occupant classification ECU (See page [RS-320](#)).

**HINT:**

Perform the inspection using parts from a normal vehicle if possible.

**NEXT**

**9 PERFORM ZERO POINT CALIBRATION**

**RS**

- (a) Connect the negative (-) terminal cable to the battery.
- (b) Connect the intelligent tester to the DLC3.
- (c) Turn the ignition switch to the ON position.
- (d) Using the intelligent tester, perform "Zero point calibration" (See page [RS-185](#)).

**OK:**

**The "COMPLETED" is displayed.**

**NG** → **Go to step 12**

**OK**

**10 PERFORM SENSITIVITY CHECK**

- (a) Using the intelligent tester, perform "Sensitivity check" (See page [RS-185](#)).

**Standard value:**

**27 to 33 kg (59.52 to 72.75 lb)**

**NG** → **Go to step 12**

**OK**

**11 CHECK DTC**

- (a) Connect the negative (-) terminal cable to the battery.

- (b) Turn the ignition switch to the ON position.
- (c) Clear the DTCs stored in memory (See page [RS-192](#)).  
HINT:  
First clear DTCs stored in the occupant classification ECU and then in the center airbag sensor assembly.
- (d) Turn the ignition switch to the LOCK position.
- (e) Turn the ignition switch to the ON position.
- (f) Check the DTCs (See page [RS-192](#)).

**OK:**

**DTC B1783 is not output.**

HINT:

Codes other than DTC B1783 may be output at this time, but they are not related to this check.

OK

END

NG

## 12 REPLACE FRONT SEAT ASSEMBLY RH

- (a) Turn the ignition switch to the LOCK position.
- (b) Disconnect the negative (-) terminal cable from the battery.
- (c) Replace the front seat assembly RH (See page [SE-18](#) or [SE-30](#)).

NEXT

RS

## 13 PERFORM ZERO POINT CALIBRATION

- (a) Connect the negative (-) terminal cable to the battery.
- (b) Connect the intelligent tester to the DLC3.
- (c) Turn the ignition switch to the ON position.
- (d) Using the intelligent tester, perform "Zero point calibration" (See page [RS-185](#)).

**OK:**

The "COMPLETED" is displayed.

NEXT

## 14 PERFORM SENSITIVITY CHECK

- (a) Using the intelligent tester, perform "Sensitivity check" (See page [RS-185](#)).

**Standard value:**

**27 to 33 kg (59.52 to 72.75 lb)**

NEXT

END

## REMOVAL

HINT:

Installation is in the reverse order of removal.

### 1. DISCONNECT BATTERY NEGATIVE TERMINAL

HINT:

(See page [RS-1](#)).

### 2. REMOVE STEERING WHEEL COVER LOWER NO.2

- (a) Using a screwdriver, remove the steering wheel cover lower No.2.

HINT:

Tape up the screwdriver tip before use.

### 3. REMOVE STEERING WHEEL COVER LOWER NO.3

- (a) Using a screwdriver, remove the steering wheel cover lower No.3.

HINT:

Tape up the screwdriver tip before use.

### 4. REMOVE STEERING PAD

- (a) Place the front wheels facing straight ahead.  
 (b) Using a torx socket wrench (T30), loosen the 2 torx screws until the groove along the screw circumference catches on the screw case.

- (c) Pull out the steering pad from the steering wheel assembly and support the steering pad with one hand as shown in the illustration.

**NOTICE:**

**When removing the steering pad, do not pull the airbag wire harness.**

- (d) Disconnect the horn connector.  
 (e) Disconnect the connectors from the steering pad.

**NOTICE:**

**When handling the airbag connector, take care not to damage the airbag wire harness.**

- (f) Remove the steering pad.

## INSPECTION

### 1. INSPECT STEERING PAD

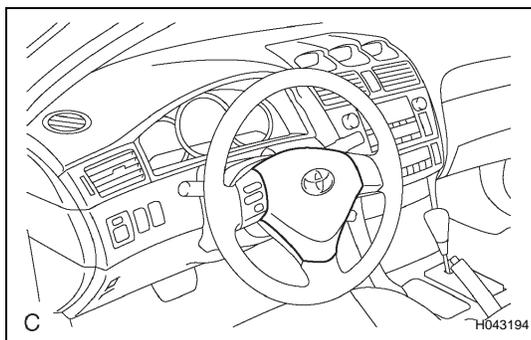
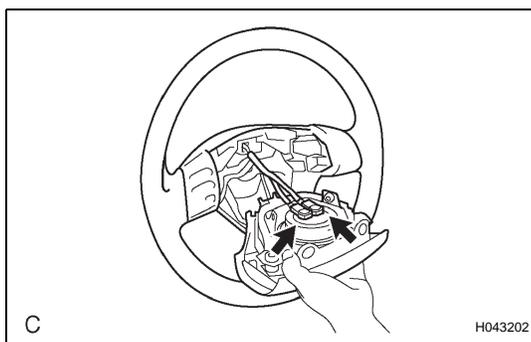
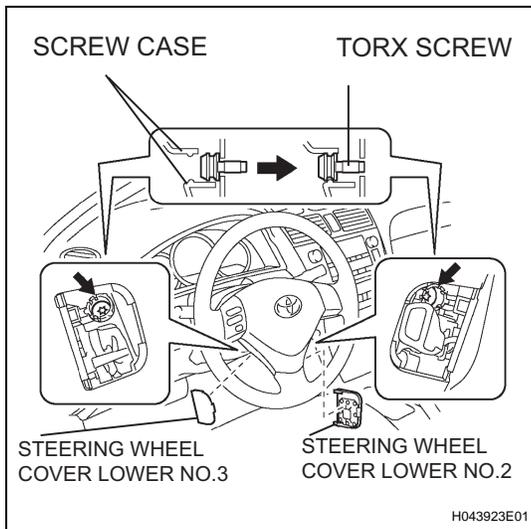
- (a) With the steering pad installed on the vehicle, perform a visual check including the following:  
 Cuts, minute cracks or marked discoloration on the steering pad top surface and in the grooved portion.  
 (b) Make sure that the horn sounds.

HINT:

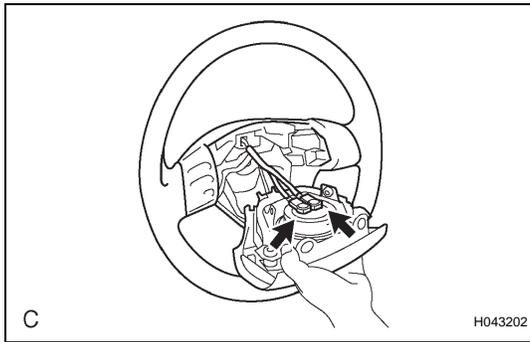
If the horn does not sound, inspect the horn system.  
 (See page [HO-3](#)).

### 2. INSPECT SRS WARNING LIGHT

- (a) Inspect SRS warning light (See page ).



RS



## INSTALLATION

### 1. INSTALL STEERING PAD

(a) Support the steering pad with one hand as shown in the illustration.

(b) Connect the connectors to the steering pad.

**NOTICE:**

**When handling the airbag connector, take care not to damage the airbag wire harness.**

(c) Connect the horn connector.

(d) Confirm that the circumference groove of the torx screw fits in the screw case, and place the steering pad onto the steering wheel assembly.

(e) Using a torx socket wrench (T30), tighten the 2 torx screws.

**Torque: 8.8 N\*m (90 kgf\*cm, 78 in.\*lbf)**

### 2. CONNECT BATTERY NEGATIVE TERMINAL

**NOTICE:**

**When disconnecting the negative (-) battery terminal, initialize the following systems after the terminal is reconnected.**

System Name	See Procedure
Power Window Control System	<a href="#">IN-24</a>
Sliding Roof System	

## DISPOSAL

### HINT:

When scrapping a vehicle equipped with the SRS or disposing of the steering pad, be sure to deploy the airbag first in accordance with the procedure described below. If any abnormality occurs with the airbag deployment, contact the SERVICE DEPT. of TOYOTA MOTOR SALES, U.S.A., INC.

### CAUTION:

- **Never dispose of a steering pad that has an undeployed airbag.**
- **The airbag produces an exploding sound when it is deployed, so perform the operation outdoors and where it will not create a nuisance to nearby residents.**
- **When deploying the airbag, always use the specified SST (SRS Airbag Deployment Tool). Perform the operation in a place away from electrical noise.**
- **When deploying the airbag, perform the operation at least 10 m (33 ft) away from the steering pad.**
- **The steering pad becomes extremely hot when the airbag is deployed, so do not touch it for at least 30 minutes after deployment.**
- **Use gloves and safety glasses when handling a steering pad with a deployed airbag.**
- **Do not apply water, etc. to a steering pad with a deployed airbag.**
- **Always wash your hands with water after completing the operation.**

### 1. DISPOSE OF STEERING PAD (WHEN INSTALLED IN VEHICLE)

#### HINT:

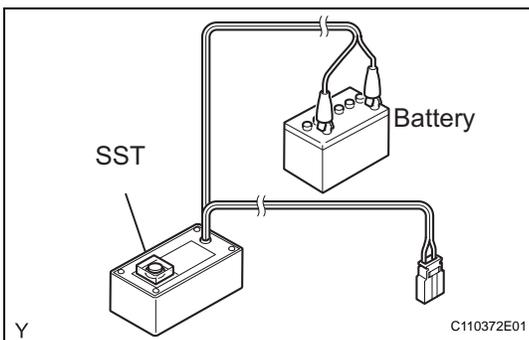
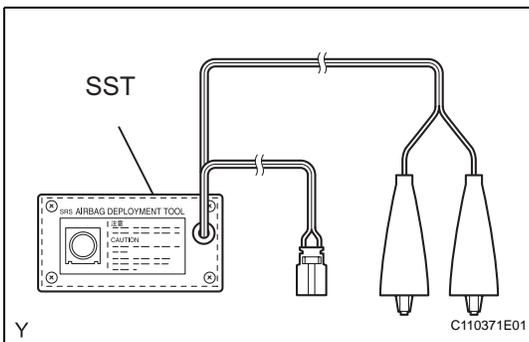
Prepare a battery as the power source to deploy the airbag.

- (a) Check the function of the SST.

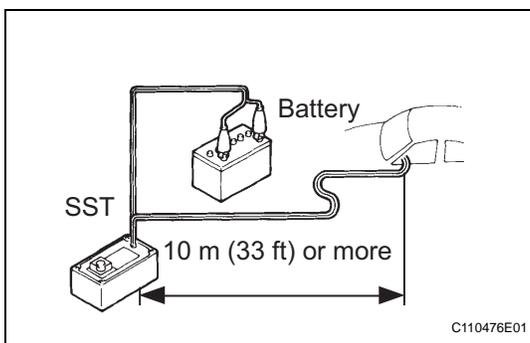
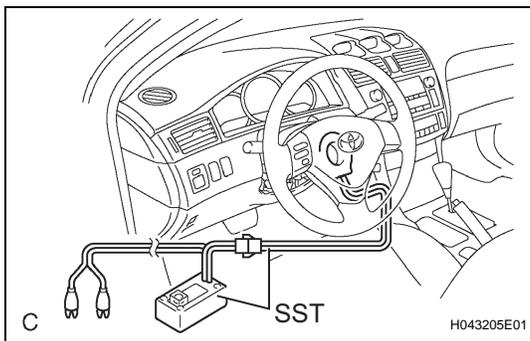
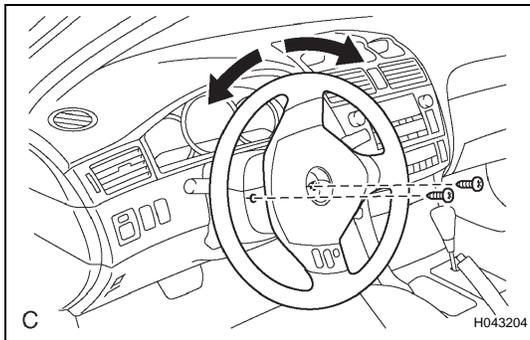
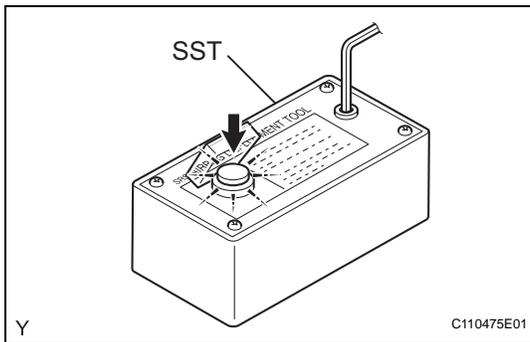
**SST 09082-00700**

#### CAUTION:

**When deploying the airbag, always use the specified SST:  
SRS Airbag Deployment Tool.**



- (1) Connect the SST to the battery.  
Connect the red clip of the SST to the battery positive (+) terminal and the black clip of the SST to the battery negative (-) terminal.



- (2) Check the function of the SST.  
Press the SST activation switch, and check that the LED of the SST activation switch comes on.

**CAUTION:**

- Do not connect the SST connector (yellow colored one) to the airbag.
- If the LED comes on when the activation switch is not being pressed, SST malfunction is possible, so replace the SST with a new one.

- (3) Disconnect the SST from the battery.

(b) Precaution (See page RS-1).

- (c) Disconnect the cable from the negative battery terminal.

Wait for 90 seconds after disconnecting the cable to prevent the airbag working.

- (d) Remove the steering column cover lower.

- (1) While turning the steering wheel assembly to the right and left, remove the 2 screws and steering column cover lower.

- (e) Install the SST.

**CAUTION:**

**Check that there is no looseness in the steering wheel assembly and steering pad.**

- (1) Disconnect the airbag connector (yellow colored one) from the spiral cable with steering sensor.

**NOTICE:**

**When handling the airbag connector, take care not to damage the airbag wire harness.**

- (2) Connect the SST connector to the airbag connector of the spiral cable with steering sensor.

**SST 09082-00700, 09082-00780**

**NOTICE:**

**To avoid damaging the SST connector and wire harness, do not lock the secondary lock of the twin lock.**

- (3) Move the SST at least 10 m (33 ft) away from the vehicle front side window.
- (4) Maintaining enough clearance for the SST wire harness in the front side window, close all doors and windows of the vehicle.

**NOTICE:**

**Take care not to damage the SST wire harness.**

- (5) Connect the red clip of the SST to the battery positive (+) terminal and the black clip of the SST to the negative (-) terminal.

- (f) Deploy the airbag.
  - (1) Check that no one is inside the vehicle or within a 10 m (33 ft) radius of the vehicle.
  - (2) Press the SST activation switch and deploy the airbag.

**CAUTION:**

- When deploying the airbag, make sure that no one is near the vehicle.
- The steering pad becomes extremely hot when the airbag is deployed, so do not touch it for at least 30 minutes after deployment.
- Use gloves and safety glasses when handling a steering pad with a deployed airbag.
- Do not apply water, etc. to a steering pad with a deployed airbag.
- Always wash your hands with water after completing the operation.

**HINT:**

The airbag is deployed as the LED of the SST activation switch comes on.

**2. DISPOSE OF STEERING PAD (WHEN NOT INSTALLED IN VEHICLE)**

**NOTICE:**

- When disposing of the steering pad, never use the customer's vehicle to deploy the airbag.
- Be sure to follow the procedure detailed below when deploying the airbag.

**HINT:**

Prepare a battery as the power source to deploy the airbag.

- (a) Check the function of the SST.
- (b) Remove the steering pad (See page [RS-262](#)).

**CAUTION:**

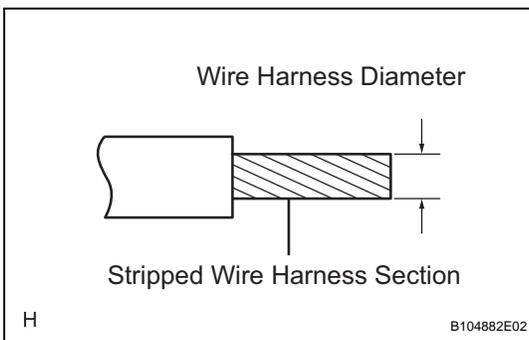
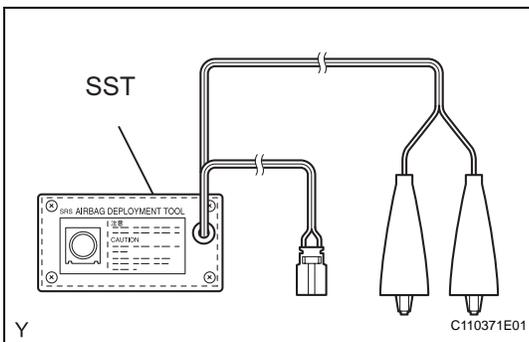
- When removing the steering pad, work must be started 90 seconds after the engine switch is turned off and the negative (-) terminal cable is disconnected from the battery.
- When storing the steering pad, keep the airbag deployment side facing upward.

- (c) Using a service-purpose wire harness for the vehicle, tie down the steering pad to the disc wheel.

**Wire harness:**

**Stripped wire harness section**

**1.25 mm<sup>2</sup> or more (0.0019 in.<sup>2</sup> or more)**



**CAUTION:**

If the wire harness is too thin or an alternative object is used to tie down the steering pad, it may be snapped by the shock when the airbag is deployed. Always use a wire harness for vehicle use with an area of at least 1.25 mm<sup>2</sup> (0.0019 in.<sup>2</sup>).

**HINT:**

To calculate the area of the stripped wire harness section:

$$\text{Area} = 3.14 \times (\text{Diameter})^2 \text{ divided by } 4$$

**Area:**

$$3.14 \times (\text{Diameter})^2 \text{ divided by } 4$$

- (1) Install the 2 bolts with washers into the 2 bolt holes on the steering pad.

**Bolt:****L:**

35.0 mm (1.378 in.)

**M:**

6.0 mm (0.236 in.)

**Pitch:**

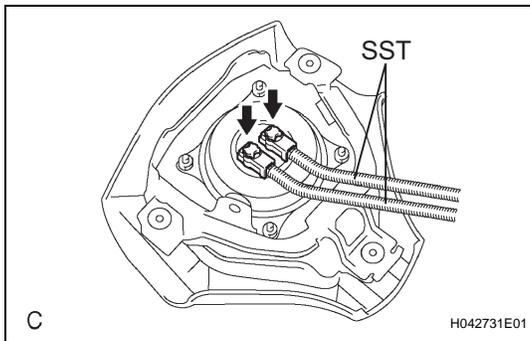
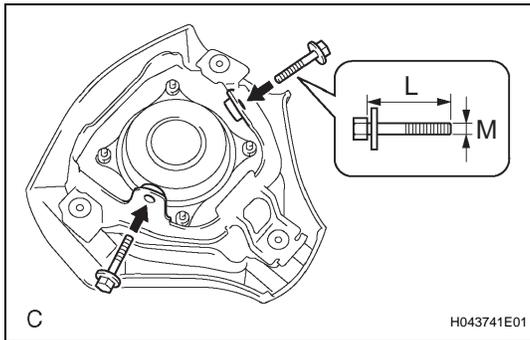
1.0 mm (0.039 in.)

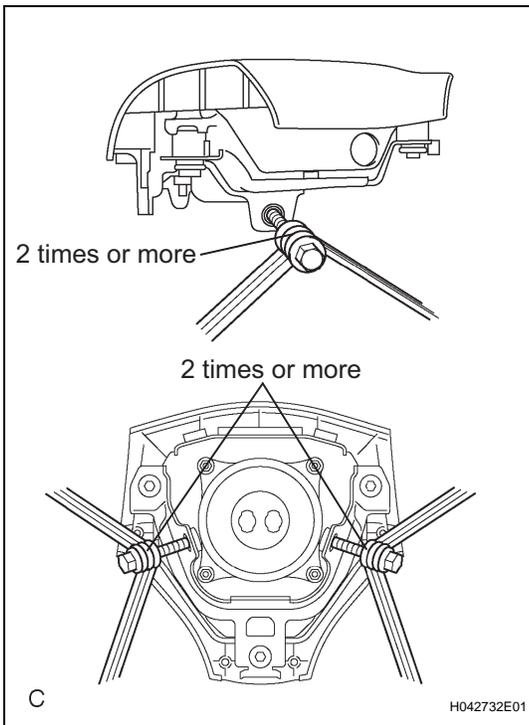
**NOTICE:**

- Tighten the bolts by hand until they become difficult to turn.
- Do not tighten the bolts excessively.

- (2) After connecting the SST below to each other, connect them to the steering pad.

**SST 09082-00802 (09082-10801, 09082-30801)**

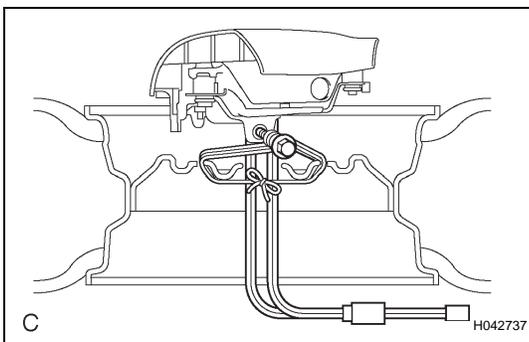




- (3) Using 3 wire harnesses, wind wire harness at least 2 times each around the bolts installed on the left and right sides of the steering pad.

**CAUTION:**

- Tightly wind the wire harness around the bolts so that there is no slack.
- Make sure that the wire harness is tight. If there is slack in wire harness, the steering pad may become loose due to the shock when the airbag is deployed.



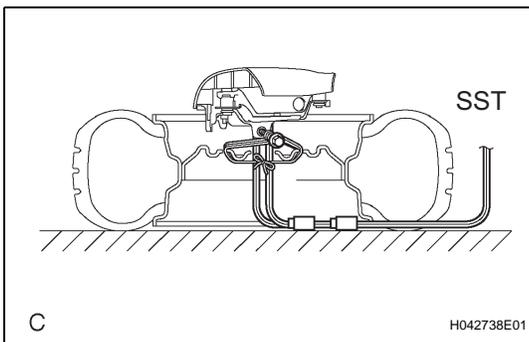
- (4) Face the airbag deployment side of the steering pad upward. Separately tie the left and right sides of the steering pad to the disc wheel through the hub nut holes. Position the SST connector so that it hangs downward through the hub hole of the disc wheel.

**CAUTION:**

- Make sure that the wire harness is tight. If there is slack in wire harness, the steering pad may become loose due to the shock when the airbag is deployed.
- Always tie down the steering pad with the airbag deployment side facing upward.

**NOTICE:**

The disc wheel will be marked by the airbag deployment, so use an extra disc wheel.



- (d) Install the SST.

**CAUTION:**

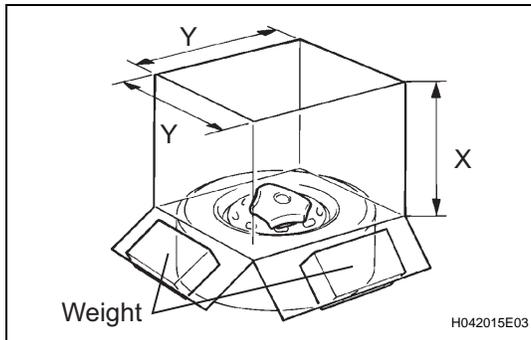
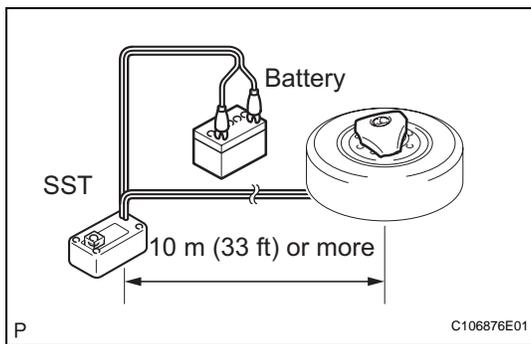
Place the disc wheel on level ground.

- (1) Connect the SST connector.

**SST 09082-00700**

**NOTICE:**

To avoid damaging the SST connector and wire harness, do not lock the secondary lock of the twin lock. Also, secure some slack for the SST wire harness inside the disc wheel.



- (2) Move the SST at least 10 m (33 ft) away from the steering pad tied down to the disc wheel.

- (e) Cover the steering pad with a cardboard box or tires.

- (1) Covering method using a cardboard box:  
Cover the steering pad with the cardboard box and place the weights on the cardboard box in 4 place with at least 190 N (20 kg, 44 lb).

**Cardboard box size:**

**Must exceed the following dimensions**

**X:**

**460 mm (18.11 in.)**

**Y:**

**650 mm (25.59 in.)**

**NOTICE:**

- When the dimension Y of the cardboard box exceeds the diameter of the disc wheel with tire which the steering pad is tied to, X should be the following size.  
 $X = 460 \text{ mm (18.11 in.)} + \text{width of tire}$
- If a cardboard box which is smaller than the specified size is used, the cardboard box will be broken by the shock from the airbag deployment.

- (2) Covering method using tires:  
Place at least 3 tires without disc wheels on the tire with disc wheel which the steering pad is tied to.

Place the tire with disc wheel on them.

**Tire size:**

**Must exceed the following dimensions**

**Width:**

**185 mm (7.28 in.)**

**Inner diameter:**

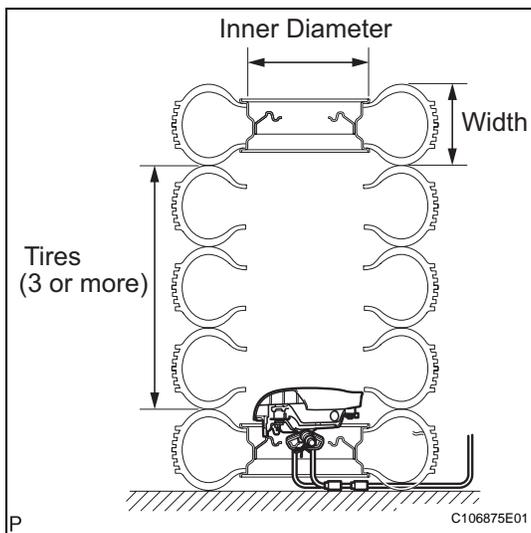
**360 mm (14.17 in.)**

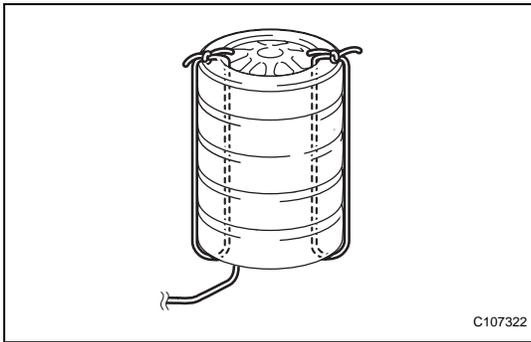
**CAUTION:**

**Do not use tires with disc wheels except on the top and bottom.**

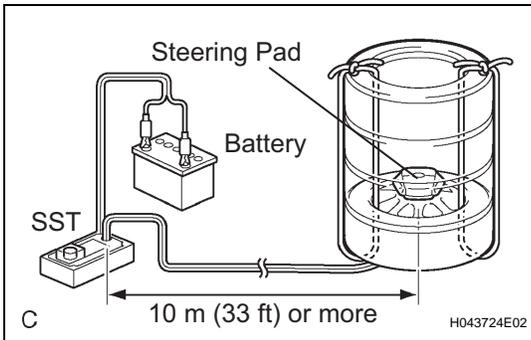
**NOTICE:**

- The tires may be marked by the airbag deployment, so use an extra tire.
- Do not place the SST connector under the tire because it could be damaged.





- (3) Tie the tires together with 2 wire harnesses.  
**CAUTION:**  
**Make sure that the wire harness is tight. Looseness in the wire harness results in the tires coming free due to the shock when the airbag is deployed.**



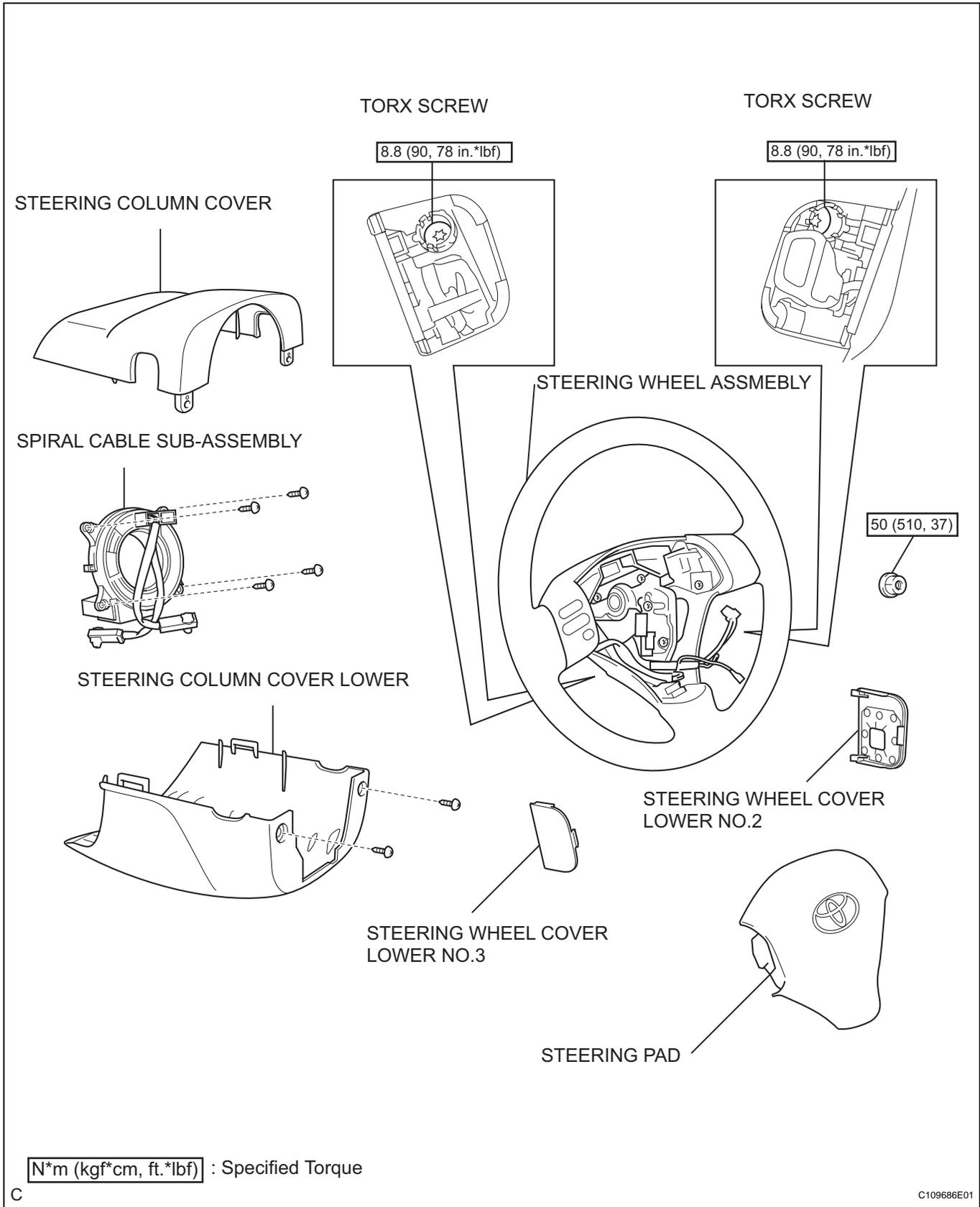
- (f) Deploy the airbag.
- (1) Connect the red clip of the SST to the battery positive (+) terminal and the black clip of the SST to the battery negative (-) terminal.
  - (2) Check that no one is within a 10 m (33 ft) radius of the disc wheel which the steering pad is tied to.
  - (3) Press the SST activation switch and deploy the airbag.  
**CAUTION:**  
**When deploying the airbag, make sure that no one is near the tire.**  
**HINT:**  
 The airbag is deployed as the LED of the SST activation switch comes on.



- (g) Dispose of the steering pad.  
**CAUTION:**
- The steering pad becomes extremely hot when the airbag is deployed, so do not touch it for at least 30 minutes after deployment.
  - Use gloves and safety glasses when handling a steering pad with a deployed airbag.
  - Do not apply water, etc. to a steering pad with a deployed airbag.
  - Always wash your hands with water after completing the operation.
- (1) Remove the steering pad from the disc wheel.
  - (2) Place the steering pad in a plastic bag, tie it tightly and dispose of it as other general part disposal.

# STEERING PAD

## COMPONENTS



RS

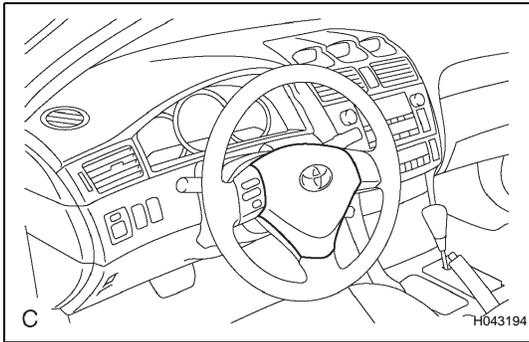
**N\*m (kgf\*cm, ft.\*lbf)** : Specified Torque

## ON-VEHICLE INSPECTION

### CAUTION:

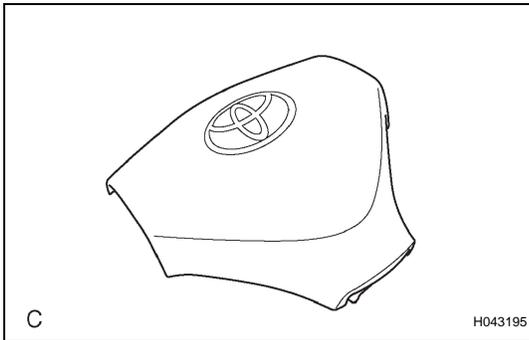
Be sure to perform the initialization of the occupant classification ECU if any of the following conditions occur (See page [RS-1](#)). If the initialization is not performed, the SRS may not operate properly.

- The occupant classification ECU is replaced.
- Accessories (seatback tray or seat cover, etc.) are installed to the vehicle.
- The passenger seat is removed from the vehicle.
- Both the SRS warning light and passenger airbag ON/OFF indicator light ("OFF") come on.
- The vehicle is brought to the workshop for repair due to an accident or collision.



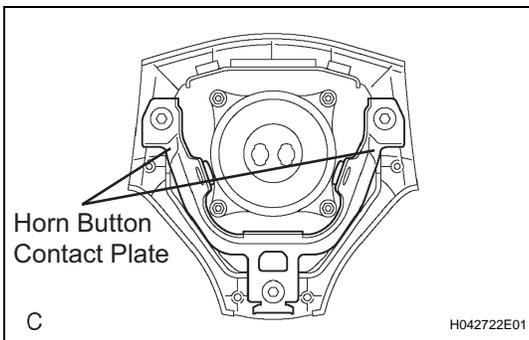
### 1. INSPECT STEERING PAD (VEHICLE NOT INVOLVED IN COLLISION)

- Perform a diagnostic system check (See page [RS-36](#)).
- With the steering pad installed on the vehicle, perform a visual check including the following: Cuts, minute cracks or marked discoloration on the steering pad top surface or in the grooved portion.



### 2. INSPECT STEERING PAD (VEHICLE INVOLVED IN COLLISION AND AIRBAG IS NOT DEPLOYED)

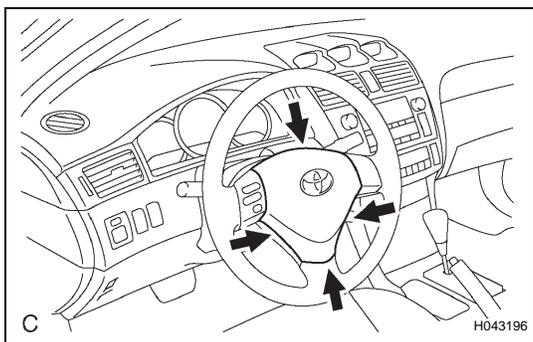
- Perform a diagnostic system check (See page [RS-36](#)).



- With the steering pad removed from the vehicle, perform a visual check including the following:
  - Cuts, minute cracks or marked discoloration on the steering pad top surface or in the grooved portion.
  - Cracks or other damage to the connectors.
  - Deformation of the steering wheel assembly.
  - Deformation of the horn button contact plate of the steering pad.

### HINT:

- If the horn button contact plate of the steering pad is deformed, never repair it. Always replace the steering pad with a new one.



- There should be no interference between the steering pad and steering wheel assembly, and the clearance should be uniform all the way around when the new steering pad is installed on the steering wheel assembly.

**CAUTION:**

**For removal and installation procedures of the steering pad, See page , and be sure to follow the correct procedure.**

## INSTALLATION

### 1. PLACE FRONT WHEELS FACING STRAIGHT AHEAD

- (a) Check that the front wheels are facing straight ahead.

### 2. INSTALL SPIRAL CABLE SUB-ASSEMBLY

- (a) Set the turn signal switch to the neutral position.

**NOTICE:**

**Make sure that the turn signal switch is in the neutral position or the pin of the turn signal switch may be snapped.**

- (b) Install the spiral cable sub-assembly with the 4 screws.

**NOTICE:**

**When replacing the spiral cable sub-assembly with a new one, remove the lock pin before installing the steering wheel assembly.**

- (c) Connect the connectors to the spiral cable sub-assembly.

**NOTICE:**

**When handling the airbag connector, take care not to damage the airbag wire harness.**

### 3. INSTALL STEERING COLUMN COVER

### 4. INSTALL STEERING COLUMN COVER LWR

- (a) Install the steering column cover lower with the 2 screws.

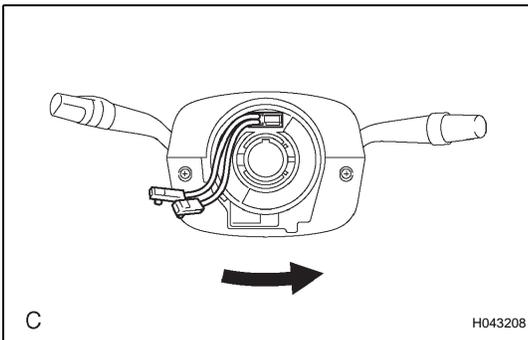
### 5. ADJUST SPIRAL CABLE SUB-ASSEMBLY

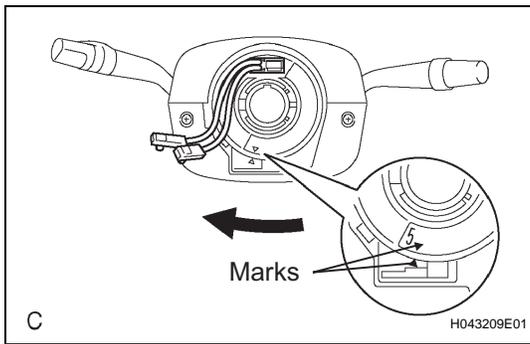
- (a) Check that the ignition switch is off.
- (b) Check that the battery negative (-) terminal is disconnected.

**CAUTION:**

**After removing the terminal wait for at least 90 seconds before starting the operation.**

- (c) Turn the spiral cable sub-assembly counterclockwise slowly by hand until it feels firm.





(d) Rotate the spiral cable sub-assembly clockwise approximately 2.5 turns to align the marks.

HINT:

The spiral cable sub-assembly will rotate approximately 2.5 turns to both left and right of the center.

**6. INSTALL STEERING WHEEL ASSEMBLY**

HINT:

(See page [SR-11](#)).

**7. INSPECT STEERING WHEEL CENTER POINT**

**8. INSTALL STEERING PAD**

HINT:

(See page [RS-263](#)).

**9. CONNECT BATTERY NEGATIVE TERMINAL**

**NOTICE:**

**When disconnecting the negative (-) battery terminal, initialize the following systems after the terminal is reconnected.**

System Name	See Procedure
Power Window Control System	<a href="#">IN-24</a>
Sliding Roof System	<a href="#">IN-24</a>

**10. INSPECT STEERING PAD**

HINT:

(See page [RS-263](#)).

**11. INSPECT SRS WARNING LIGHT**

HINT:

(See page [ME-11](#)).

# SPIRAL CABLE

## REMOVAL

HINT:

- COMPONENTS: See page [RS-260](#).
- Installation is in the reverse order of removal.

### 1. DISCONNECT BATTERY NEGATIVE TERMINAL

HINT:

(See page [RS-1](#)).

### 2. PLACE FRONT WHEELS FACING STRAIGHT AHEAD

### 3. REMOVE STEERING WHEEL COVER LOWER NO.2

HINT:

(See page [RS-262](#)).

### 4. REMOVE STEERING WHEEL COVER LOWER NO.3

HINT:

(See page [RS-262](#)).

### 5. REMOVE STEERING PAD

### 6. REMOVE STEERING WHEEL ASSEMBLY

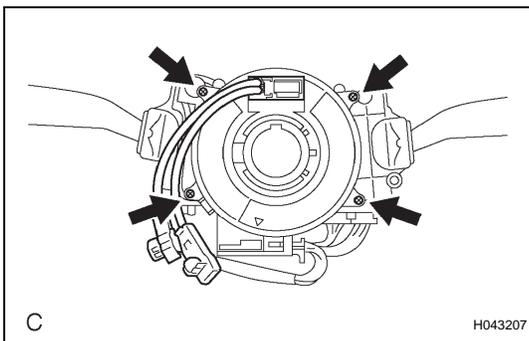
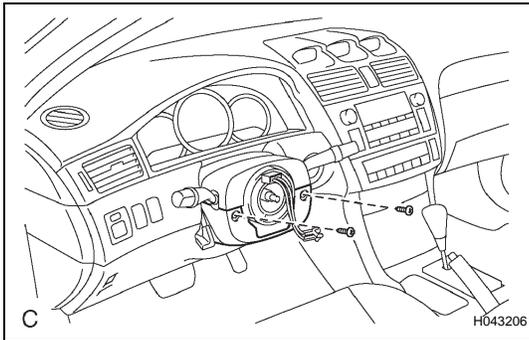
SST 09950-50013 (09951-05010, 09952-05010,  
09953-05020, 09954-05021)

### 7. REMOVE STEERING COLUMN COVER LWR

- (a) Remove the 2 screws and the steering column cover lower.

### 8. REMOVE STEERING COLUMN COVER

RS



### 9. REMOVE SPIRAL CABLE SUB-ASSEMBLY

- (a) Disconnect the connectors from the spiral cable sub-assembly.

**NOTICE:**

**When handling the airbag connector, take care not to damage the airbag wire harness.**

- (b) Remove the 4 screws and remove the spiral cable sub-assembly.

## INSPECTION

### 1. INSPECT SPIRAL CABLE SUB-ASSEMBLY

- (a) If any of the following conditions occur, replace the spiral cable sub-assembly with a new one.

**Condition:**

**Scratches or cracks on the connector**

**Cracks, dents or chips in the spiral cable sub-assembly**

## REMOVAL

HINT:

Installation is in the reverse order of removal.

**1. DISCONNECT BATTERY NEGATIVE TERMINAL**

HINT:

(See page [IN-24](#)).

**2. PLACE FRONT WHEELS FACING STRAIGHT AHEAD**

**3. REMOVE STEERING WHEEL COVER LOWER NO.2**

HINT:

(See page [RS-262](#)).

**4. REMOVE STEERING WHEEL COVER LOWER NO.3**

HINT:

(See page [RS-262](#)).

**5. REMOVE STEERING PAD**

HINT:

(See page [RS-262](#)).

**6. REMOVE STEERING WHEEL ASSEMBLY**

HINT:

(See page [SR-6](#)).

**SST 09950-50013 (09951-05010, 09952-05010,  
09953-05020, 09954-05021)**

**7. REMOVE STEERING COLUMN COVER LOWER**

HINT:

(See page [SR-6](#)).

**8. REMOVE STEERING COLUMN COVER**

HINT:

(See page [SR-6](#)).

**9. REMOVE SPIRAL CABLE SUB-ASSEMBLY**

HINT:

(See page [RS-271](#)).

**10. REMOVE INSTRUMENT PANEL UNDER COVER SUB-ASSEMBLY NO.1**

HINT:

(See page [RS-301](#)).

**11. REMOVE INSTRUMENT PANEL FINISH LOWER PANEL RH**

HINT:

(See page [IP-11](#)).

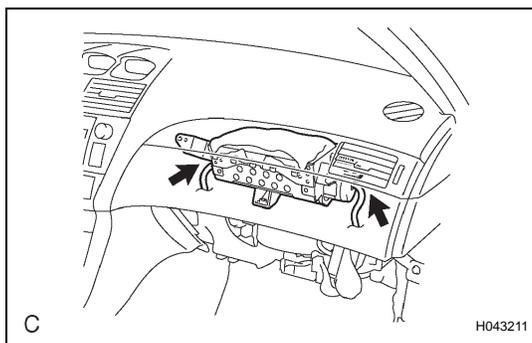
**12. DISCONNECT FRONT PASSENGER AIRBAG ASSEMBLY CONNECTOR**

- (a) Disconnect the connectors from the front passenger airbag assembly.

**NOTICE:**

**When handling the airbag connector, take care not to damage the airbag wire harness.**

RS



**13. REMOVE INSTRUMENT PANEL SAFETY PAD SUB-ASSEMBLY**

HINT:  
(See page IP-12).

**14. REMOVE DEFROSTER NOZZLE ASSEMBLY**

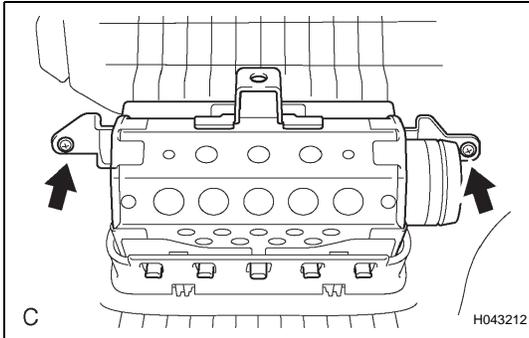
HINT:  
(See page IP-13).

**15. REMOVE HEATER TO REGISTER DUCT NO.1**

HINT:  
(See page IP-13).

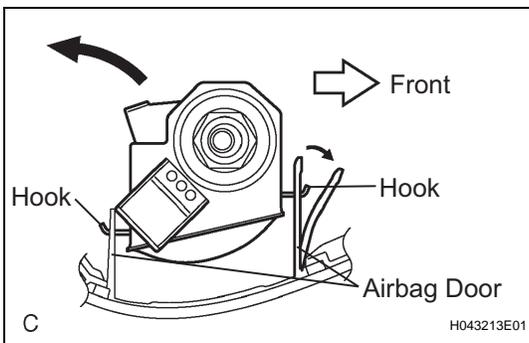
**16. REMOVE FRONT PASSENGER AIRBAG ASSEMBLY**

(a) Remove the 2 screws.



(b) Release the front side wall of the airbag door from the hook by slightly deflecting it and roll the front passenger airbag assembly rearward.

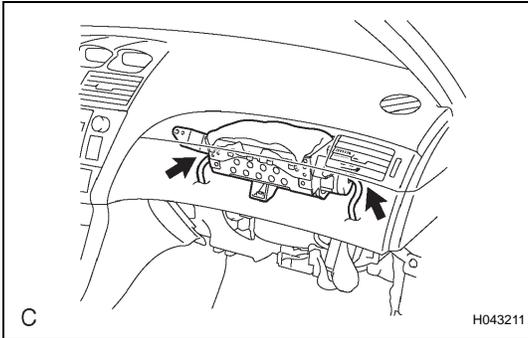
(c) Release the rear side wall of the airbag door from the other hook and remove the front passenger airbag assembly.



## INSTALLATION

1. **INSTALL FRONT PASSENGER AIRBAG ASSEMBLY**
2. **INSPECT FRONT PASSENGER AIRBAG ASSEMBLY**  
HINT:  
(See page [RS-274](#)).

3. **INSTALL INSTRUMENT PANEL SAFETY PAD SUB-ASSEMBLY**  
HINT:  
(See page [IP-14](#)).



4. **CONNECT FRONT PASSENGER AIRBAG ASSEMBLY CONNECTOR**

(a) Connect the connectors to the front passenger airbag assembly.

**NOTICE:**

**When handling the airbag connector, take care not to damage the airbag wire harness.**

5. **INSTALL SPIRAL CABLE SUB-ASSEMBLY**  
HINT:  
(See page [RS-272](#)).

6. **ADJUST SPIRAL CABLE SUB-ASSEMBLY**  
HINT:  
(See page [RS-271](#)).

7. **INSTALL STEERING WHEEL ASSEMBLY**  
HINT:  
(See page [SR-12](#)).

8. **INSPECT STEERING WHEEL CENTER POINT**

9. **INSTALL STEERING PAD**  
HINT:  
(See page [RS-263](#)).

10. **CONNECT BATTERY NEGATIVE TERMINAL**  
**NOTICE:**

**When disconnecting the negative (-) battery terminal, initialize the following systems after the terminal is reconnected.**

System Name	See Procedure
Power Window Control System	<a href="#">IN-24</a>
Sliding Roof System	<a href="#">IN-24</a>

11. **INSPECT STEERING PAD**  
HINT:  
(See page [RS-263](#)).

12. **INSPECT SRS WARNING LIGHT**  
HINT:  
(See page [RS-28](#)).

## DISPOSAL

### HINT:

When scrapping a vehicle equipped with the SRS or disposing of the front passenger airbag assembly, be sure to deploy the airbag first in accordance with the procedure described below. If any abnormality occurs with the airbag deployment, contact the SERVICE DEPT. of the TOYOTA MOTOR SALES, U.S.A., INC.

### CAUTION:

- **Never dispose of a front passenger airbag assembly that has an undeployed airbag.**
- **The airbag produces an exploding sound when it is deployed, so perform the operation outdoors and where it will not create a nuisance to nearby residents.**
- **When deploying the airbag, always use the specified SST (SRS Airbag Deployment Tool). Perform the operation in a place away from electrical noise.**
- **When deploying the airbag, perform the operation at least 10 m (33 ft) away from the front passenger airbag assembly.**
- **The front passenger airbag assembly becomes extremely hot when the airbag is deployed, so do not touch it for at least 30 minutes after deployment.**
- **Use gloves and safety glasses when handling a front passenger airbag assembly with a deployed airbag.**
- **Do not apply water, etc. to a front passenger airbag assembly with a deployed airbag.**
- **Always wash your hands with water after completing the operation.**

### 1. DISPOSE OF FRONT PASSENGER AIRBAG ASSEMBLY (WHEN INSTALLED IN VEHICLE)

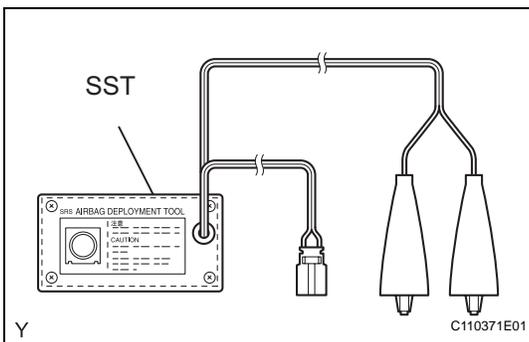
#### HINT:

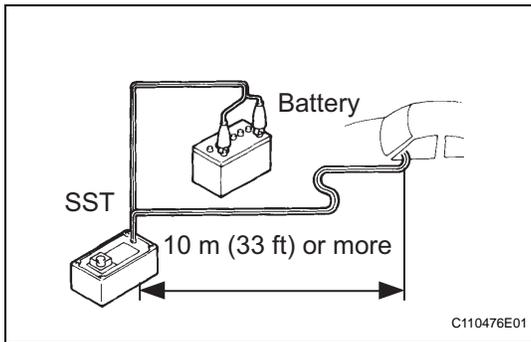
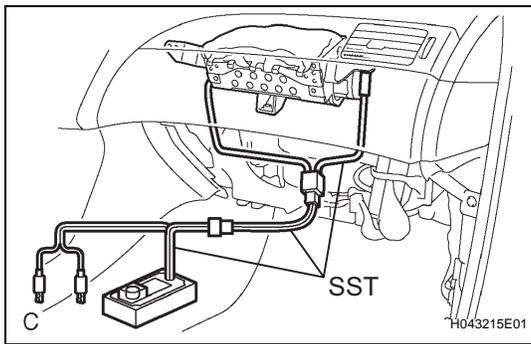
Prepare a battery as the power source to deploy the airbag.

- (a) Check the function of the SST (See page [RS-264](#)).
- (b) Precaution (See page [RS-1](#)).
- (c) Disconnect the cable from the negative battery terminal.

Wait for 90 seconds after disconnecting the cable to prevent the airbag working.

- (d) Remove the instrument panel under cover sub-assembly No.1 (See page [IP-6](#)).
- (e) Remove the instrument panel finish lower panel RH (See page [IP-11](#)).





- (f) Install the SST.
- (1) Disconnect the connectors from the front passenger airbag assembly..
 

**NOTICE:**  
When handling the airbag connector, take care not to damage the airbag wire harness.
  - (2) Connect the SST connector to the instrument panel wire assembly.
 

**SST 09082-00700, 09082-00802 (09082-10801, 09082-30801)**

**NOTICE:**  
To avoid damaging the SST connector and wire harness, do not lock the secondary lock of the twin lock.
  - (3) Move the SST at least 10 m (33 ft) away from the vehicle front side window.
  - (4) Maintaining enough clearance for the SST wire harness in the front side window, close all doors and windows of the vehicle.
 

**NOTICE:**  
Take care not to damage the SST wire harness.
  - (5) Connect the red clip of the SST to the battery positive (+) terminal and the black clip of the SST to the negative (-) terminal.
- (g) Deploy the airbag.
- (1) Check that no one is inside the vehicle or within a 10 m (33 ft) radius of the vehicle.
  - (2) Press the SST activation switch and deploy the airbag.
 

**CAUTION:**

    - When deploying the airbag, make sure that no one is near the vehicle.
    - The front passenger airbag assembly becomes extremely hot when the airbag is deployed, so do not touch it for at least 30 minutes after deployment.
    - Use gloves and safety glasses when handling a front passenger airbag assembly with a deployed airbag.
    - Do not apply water, etc. to a front passenger airbag assembly with a deployed airbag.
    - Always wash your hands with water after completing the operation.

**HINT:**  
The airbag is deployed as the LED of the SST activation switch comes on.

## 2. DISPOSE OF FRONT PASSENGER AIRBAG ASSEMBLY (WHEN NOT INSTALLED IN VEHICLE)

**NOTICE:**

- When disposing of the front passenger airbag assembly, never use the customer's vehicle to deploy the airbag.

- **Be sure to follow the procedure detailed below when deploying the airbag.**

HINT:

Prepare a battery as the power source to deploy the airbag.

- (a) Check the function of the SST (See page RS-264).
- (b) Remove the front passenger airbag assembly (See page RS-275).

**CAUTION:**

- **When removing the front passenger airbag assembly, work must be started 90 seconds after the ignition switch is turned to the "LOCK" position and the negative (-) terminal cable is disconnected from the battery.**
- **When storing the front passenger airbag assembly, keep the upper surface of the airbag deployment side facing upward.**

- (c) Using a service-purpose wire harness for the vehicle, tie down the front passenger airbag assembly to the tire.

**Wire harness:**

**Stripped wire harness section**

1.25 mm<sup>2</sup> or more (0.0019 in.<sup>2</sup> or more)

**CAUTION:**

If the wire harness is too thin or an alternative object is used to tie down the front passenger airbag assembly, it may be snapped by the shock when the airbag is deployed. Always use a wire harness for vehicle use with an area of at least 1.25 mm<sup>2</sup> (0.0019 in.<sup>2</sup>).

HINT:

To calculate the area of the stripped wire harness section:

$$\text{Area} = 3.14 \times (\text{Diameter})^2 \text{ divided by } 4$$

- (1) Position the front passenger airbag assembly inside the tire with the airbag deployment side facing inside.

**Tire size:**

**Must exceed the following dimensions**

**Width:**

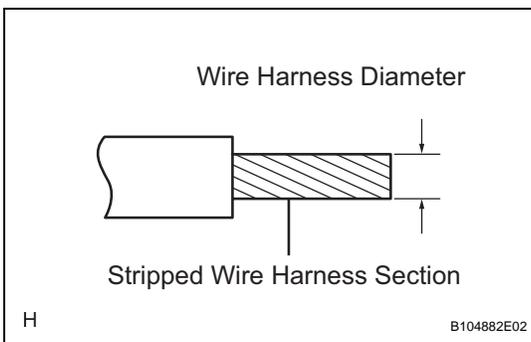
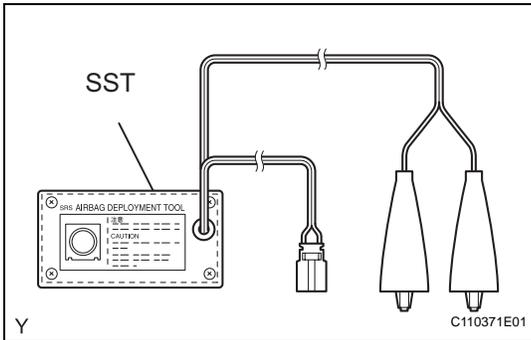
185 mm (7.28 in.)

**Inner diameter:**

360 mm (14.17 in.)

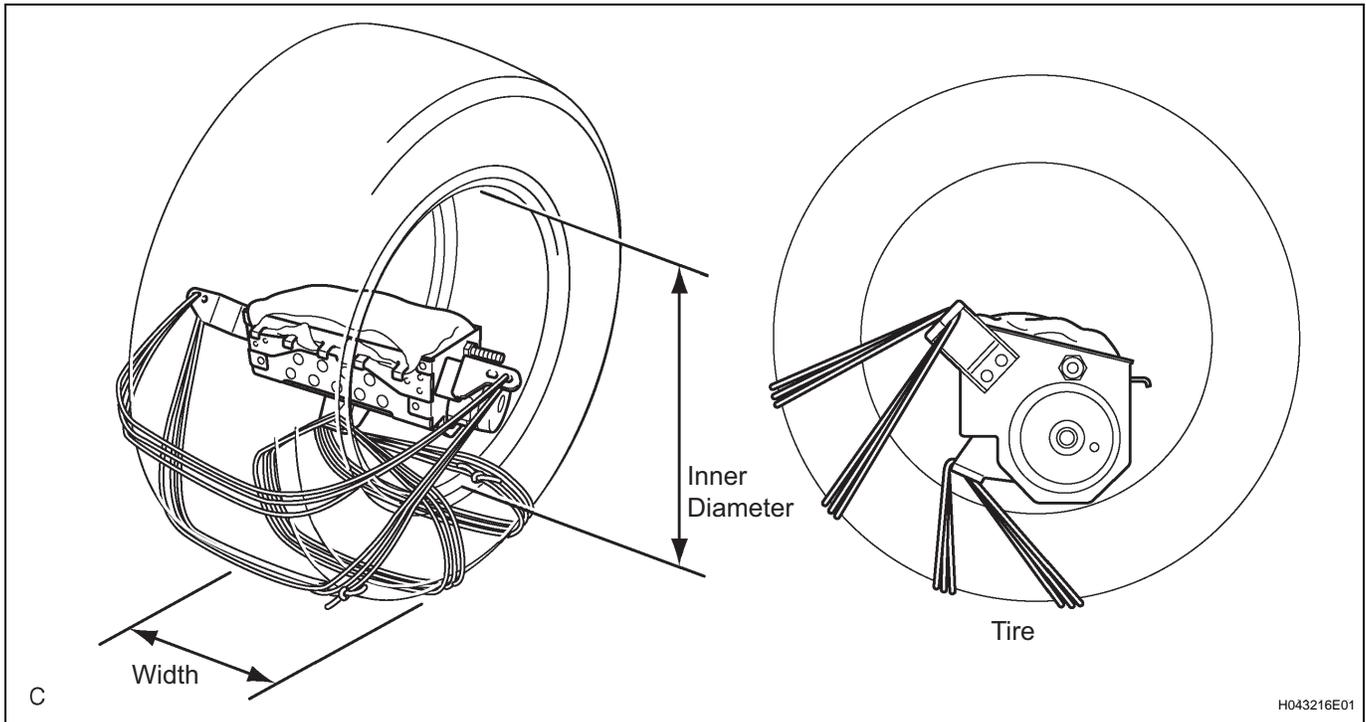
**CAUTION:**

- **Make sure that the wire harness is tight. If there is slack in the wire harness, the front passenger airbag assembly may become loose due to the shock when the airbag is deployed. This is highly dangerous.**
- **Always tie down the front passenger airbag assembly with the airbag deployment side facing inside the tire.**

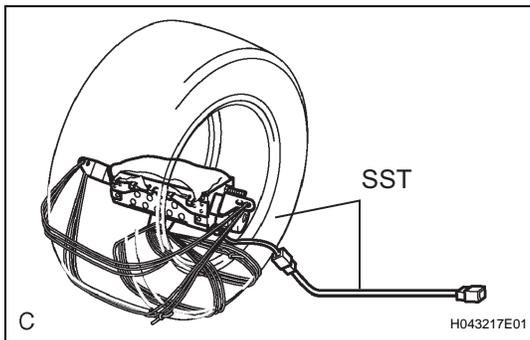


**NOTICE:**

The tire will be marked by the airbag deployment, so use an extra tire.



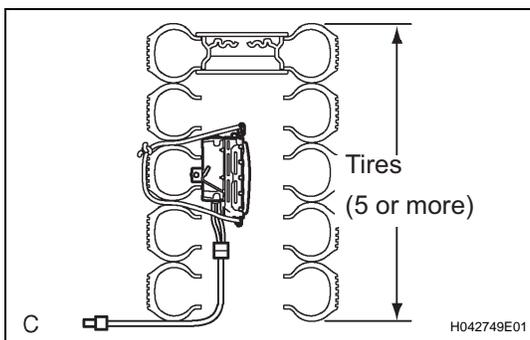
RS



## (d) Install the SST.

After connecting the SST below to each other, connect them to the front passenger airbag assembly.

**SST 09082-00700, 09082-00802 (09082-10801, 09082-30801)**

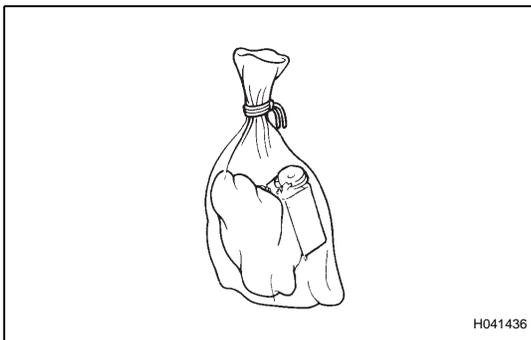
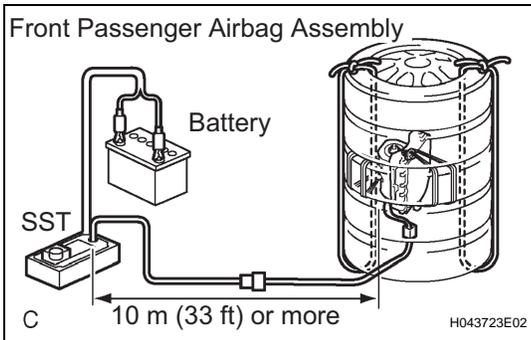
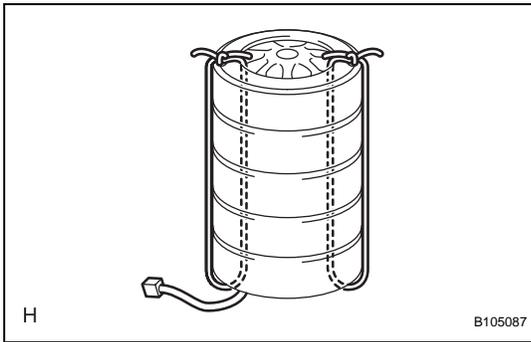


## (e) Place the tires.

- (1) Place at least 2 tires under the tire which the front passenger airbag assembly is tied to.
- (2) Place at least 2 tires over the tire which the front passenger airbag assembly is tied to. The top tire should have a disc wheel installed.

**NOTICE:**

Do not place the SST connector under the tire because it could be damaged.

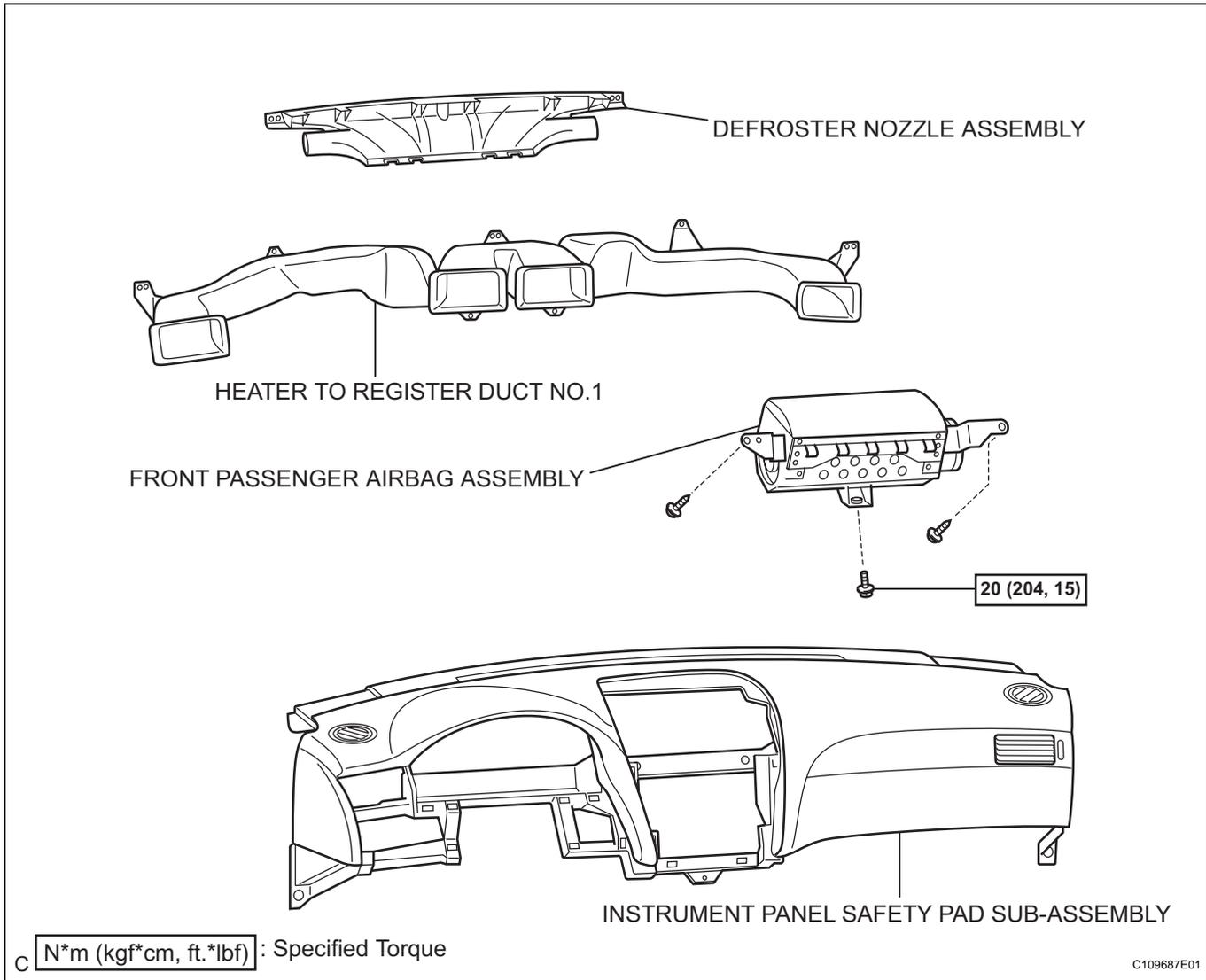


- (3) Tie the tires together with 2 wire harnesses.  
**CAUTION:**  
**Make sure that the wire harness is tight. Looseness in the wire harness results in the tires coming free due to the shock when the airbag is deployed.**

- (f) Install the SST.
  - (1) Connect the connector of the SST.  
**SST 09082-00700**  
**NOTICE:**  
**To avoid damaging the SST connector and wire harness, do not lock the secondary lock of the twin lock. Also, secure some slack for the SST wire harness inside the tire.**
- (g) Deploy the airbag.
  - (1) Connect the red clip of the SST to the battery positive (+) terminal and the black clip of the SST to the battery negative (-) terminal.
  - (2) Check that no one is within a 10 m (33 ft) radius of the tire which the front passenger airbag assembly is tied to.
  - (3) Press the SST activation switch and deploy the airbag.  
**CAUTION:**  
**When deploying the airbag, make sure that no one is near the tire.**  
**HINT:**  
The airbag is deployed as the LED of the SST activation switch comes on.
- (h) Dispose of the front passenger airbag assembly.  
**CAUTION:**
  - **The front passenger airbag assembly becomes extremely hot when the airbag is deployed, so do not touch it for at least 30 minutes after deployment.**
  - **Use gloves and safety glasses when handling a front passenger airbag assembly with a deployed airbag.**
  - **Do not apply water, etc. to a front passenger airbag assembly with a deployed airbag.**
  - **Always wash your hands with water after completing the operation.**
  - (1) Remove the front passenger airbag assembly from the tire.
  - (2) Place the front passenger airbag assembly in a plastic bag, tie it tightly and dispose of it as other general part disposal.

# FRONT PASSENGER AIRBAG ASSEMBLY

## COMPONENTS

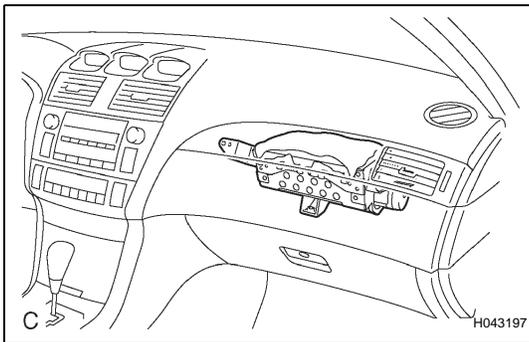


## ON-VEHICLE INSPECTION

### CAUTION:

Be sure to perform the initialization of the occupant classification ECU if any of the following conditions occur (See page [IN-24](#)). If the initialization is not performed, the SRS may not operate properly.

- The occupant classification ECU is replaced.
- Accessories (seatback tray or seat cover, etc.) are installed to the vehicle.
- The passenger seat is removed from the vehicle.
- Both the SRS warning light and passenger airbag ON/OFF indicator light ("OFF") come on.
- The vehicle is brought to the workshop for repair due to an accident or collision.



1. **INSPECT FRONT PASSENGER AIRBAG ASSEMBLY (VEHICLE NOT INVOLVED IN COLLISION)**
  - (a) Perform a diagnostic system check (See page [RS-36](#)).
  - (b) With the front passenger airbag assembly installed on the vehicle, perform a visual check including the following: Cuts, minute cracks or marked discoloration on the instrument panel around the front passenger airbag assembly.

2. **INSPECT FRONT PASSENGER AIRBAG ASSEMBLY (VEHICLE INVOLVED IN COLLISION AND AIRBAG IS NOT DEPLOYED)**

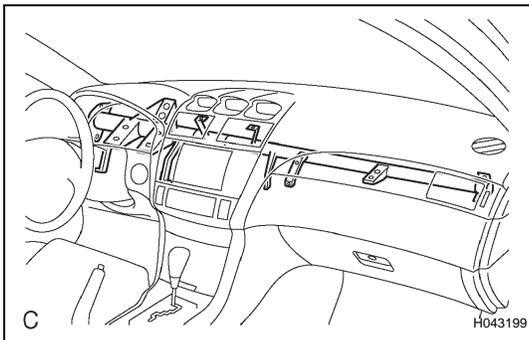
### CAUTION:

For removal and installation procedures of the front passenger airbag assembly, (See page [RS-276](#) (removal), [RS-277](#) (installation) and be sure to follow the correct procedure.

- (a) Perform a diagnostic system check (See page [RS-36](#)).
- (b) With the front passenger airbag assembly removed from the vehicle, perform a visual check including the following:
  - Cuts, minute cracks or marked discoloration on the front passenger airbag assembly.
  - Cracks or other damage to the connectors.
  - Deformation or cracks on the instrument panel or instrument panel reinforcement.

### HINT:

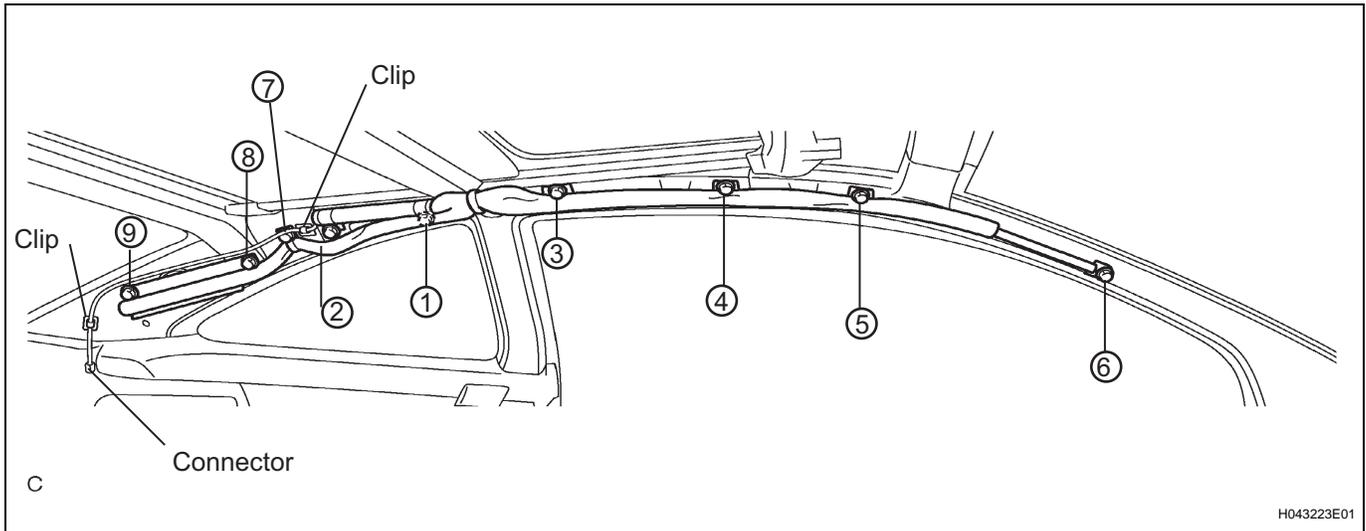
If the instrument panel or instrument panel reinforcement is deformed or cracked, never repair it. Always replace it with a new one.





## INSTALLATION

1. **INSTALL CURTAIN SHIELD AIRBAG ASSEMBLY LH**
  - (a) Install the curtain shield airbag assembly LH with the 9 bolts and the 2 clips in the order shown in the illustration.  
**Torque: 9.8 N\*m (100 kgf\*cm, 87 in.\*lbf)**
  - (b) Connect the connector to the curtain shield airbag assembly LH.



### NOTICE:

When handling the airbag connector, take care not to damage the airbag wire harness.

2. **INSPECT CURTAIN SHIELD AIRBAG ASSEMBLY LH**  
HINT:  
(See page [RS-283](#)).
3. **INSTALL ROOF HEADLINING ASSEMBLY**  
HINT:  
(See page [IR-9](#) for coupe, [IR-4](#) for convertible ).
4. **CONNECT BATTERY NEGATIVE TERMINAL**  
**NOTICE:**  
When disconnecting the negative (-) battery terminal, initialize the following systems after the terminal is reconnected.

System Name	See Procedure
Power Window Control System	<a href="#">IN-24</a>
Sliding Roof System	

5. **INSPECT SRS WARNING LIGHT**  
HINT:  
(See page [RS-28](#)).

## DISPOSAL

### HINT:

When scrapping a vehicle equipped with the SRS or disposing of the curtain shield airbag assembly, be sure to deploy the airbag first in accordance with the procedure described below. If any abnormality occurs with the airbag deployment, contact the SERVICE DEPT. of TOYOTA MOTOR SALES, U.S.A., INC.

### CAUTION:

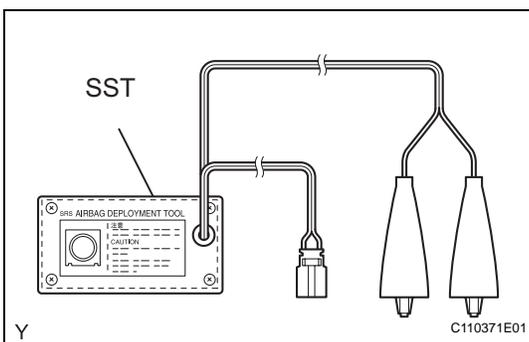
- **Never dispose of a curtain shield airbag assembly that has an undeployed airbag.**
- **The airbag produces an exploding sound when it is deployed, so perform the operation outdoors and where it will not create a nuisance to nearby residents.**
- **When deploying the airbag, always use the specified SST (SRS Airbag Deployment Tool). Perform the operation in a place away from electrical noise.**
- **When deploying the airbag, perform the operation at least 10 m (33 ft) away from the curtain shield airbag assembly.**
- **The curtain shield airbag assembly becomes extremely hot when the airbag is deployed, so do not touch it for at least 30 minutes after deployment.**
- **Use gloves and safety glasses when handling a curtain shield airbag assembly with a deployed airbag.**
- **Do not apply water, etc. to a curtain shield airbag assembly with a deployed airbag.**
- **Always wash your hands with water after completing the operation.**

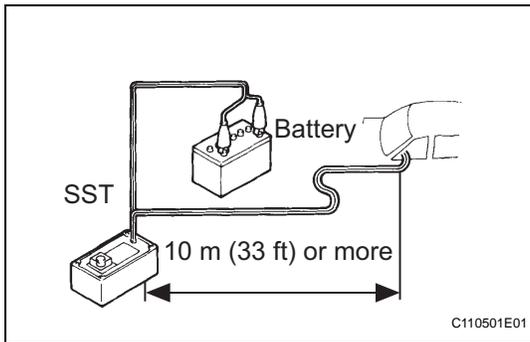
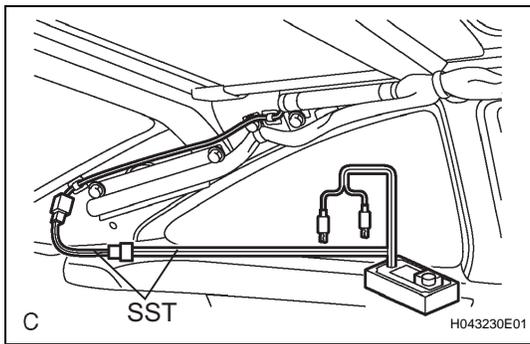
### 1. DISPOSE OF CURTAIN SHIELD AIRBAG ASSEMBLY (WHEN INSTALLED IN VEHICLE)

#### HINT:

Prepare a battery as the power source to deploy the airbag.

- (a) Check the function of the SST (See page [RS-263](#)).
- (b) Precaution (See page [RS-1](#)).
- (c) Disconnect the cable from the negative battery terminal. Wait for 90 seconds after disconnecting the cable to prevent the airbag working.
- (d) Remove the roof headlining assembly (See page [IR-9](#) for coupe, [IR-4](#) for convertible).





- (e) Install the SST.
- (1) Disconnect the connector from the curtain shield airbag assembly.  
**NOTICE:**  
**When handling the airbag connector, take care not to damage the airbag wire harness.**
  - (2) After connecting the SST below to each other, connect them to the curtain shield airbag assembly.  
**SST 09082-00700, 09082-00760**  
**NOTICE:**  
**To avoid damaging the SST connector and wire harness, do not lock the secondary lock of the twin lock.**
  - (3) Move the SST at least 10 m (33 ft) away from the vehicle rear side window.
  - (4) Maintaining enough clearance for the SST wire harness in the rear side window, close all doors and windows of the vehicle.  
**NOTICE:**  
**Take care not to damage the SST wire harness.**
  - (5) Connect the red clip of the SST to the battery positive (+) terminal and the black clip of the SST to the battery negative (-) terminal.
- (f) Deploy the airbag.
- (1) Check that no one is inside the vehicle or within a 10 m (33 ft) radius of the vehicle.
  - (2) Press the SST activation switch and deploy the airbag.  
**CAUTION:**
    - **When deploying the airbag, make sure that no one is near the vehicle.**
    - **The curtain shield airbag assembly becomes extremely hot when the airbag is deployed, so do not touch it for at least 30 minutes after deployment.**
    - **Use gloves and safety glasses when handling a curtain shield airbag assembly with a deployed airbag.**
    - **Do not apply water, etc. to a curtain shield airbag assembly with a deployed airbag.**
    - **Always wash your hands with water after completing the operation.**
- HINT:**  
The airbag is deployed as the LED of the SST activation switch comes on.

## 2. DISPOSE OF CURTAIN SHIELD AIRBAG ASSEMBLY (WHEN NOT INSTALLED IN VEHICLE)

### NOTICE:

- **When disposing of the curtain shield airbag assembly, never use the customer's vehicle to deploy the airbag.**

- **Be sure to follow the procedure detailed below when deploying the airbag.**

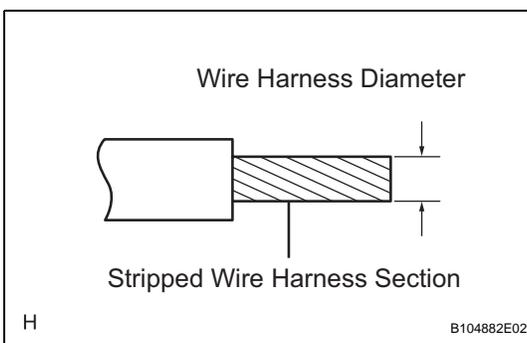
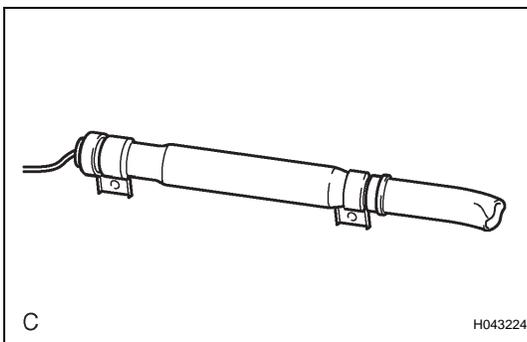
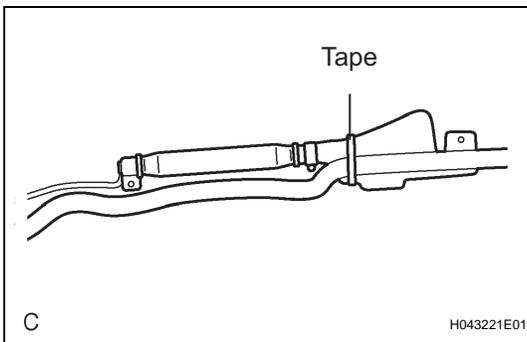
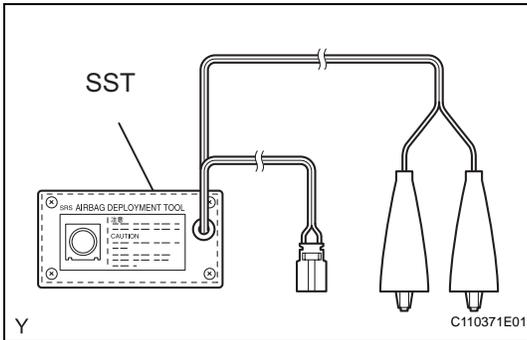
HINT:

Prepare a battery as the power source to deploy the airbag.

- Check the function of the SST (See page RS-263).
- Remove the curtain shield airbag assembly (See page RS-284).

**CAUTION:**

**When removing the curtain shield airbag assembly, work must be started 90 seconds after the ignition switch is turned to the "LOCK" position and the negative (-) terminal cable is disconnected from the battery.**



- Remove the tape from the curtain shield airbag assembly LH.

- Cut off the deployment section of the curtain shield airbag assembly.

**RS**

- Using a service-purpose wire harness for the vehicle, tie down the curtain shield airbag assembly to the tire.

**Wire harness:**

**Stripped wire harness section**

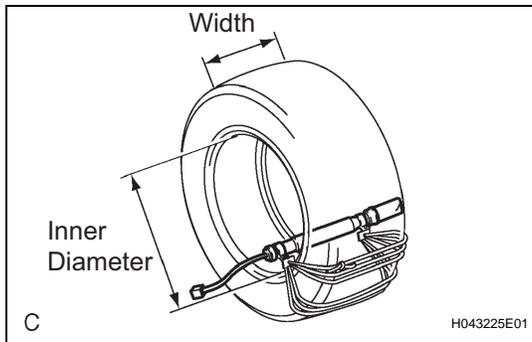
**1.25 mm<sup>2</sup> or more (0.0019 in.<sup>2</sup> or more)**

**CAUTION:**

**If the wire harness is too thin or an alternative object is used to tie down the curtain shield airbag assembly, it may be snapped by the shock when the airbag is deployed. Always use a wire harness for vehicle use with an area of at least 1.25 mm<sup>2</sup> (0.0019 in.<sup>2</sup>).**

HINT:

To calculate the area of the stripped wire harness section:



$$\text{Area} = 3.14 \times (\text{Diameter})^2 \text{ divided by } 4$$

- (1) Position the curtain shield airbag assembly inside the tire as shown in the illustration.

**Tire size:**

**Must exceed the following dimensions**

**Width:**

185 mm (7.28 in.)

**Inner diameter:**

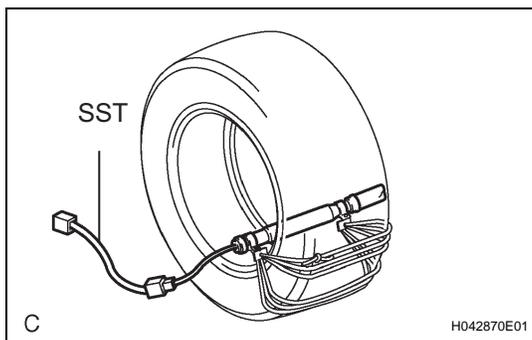
360 mm (14.17 in.)

**CAUTION:**

**Make sure that the wire harness is tight. If there is slack in the wire harness, the curtain shield airbag assembly may become loose due to the shock when the airbag is deployed.**

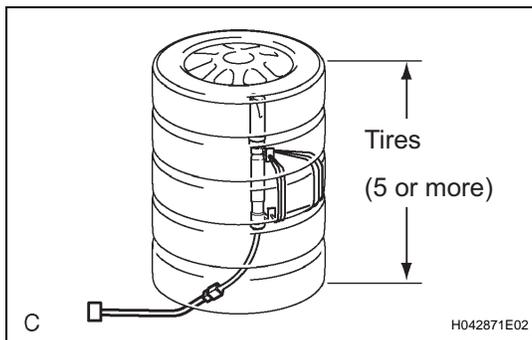
**NOTICE:**

**The tire will be marked by the airbag deployment, so use an extra tire.**



- (f) Install the SST.
- (1) After connecting the SST below to each other, connect them to the curtain shield airbag assembly.

**SST 09082-00760**



- (g) Place the tires.

**CAUTION:**

**Do not place the deployment direction of the curtain shield airbag assembly facing toward the ground.**

- (1) Place at least 2 tires under the tire which the curtain shield airbag assembly is tied to.
- (2) Place at least 2 tires over the tire which the curtain shield airbag assembly is tied to. The top tire should have the disc wheel installed.

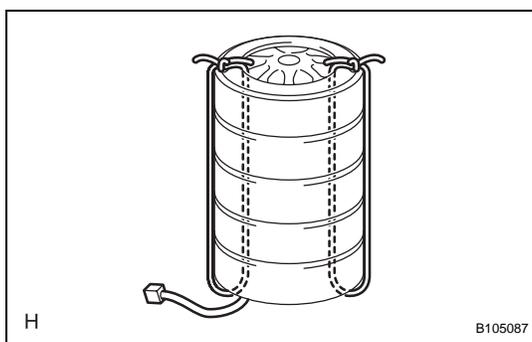
**NOTICE:**

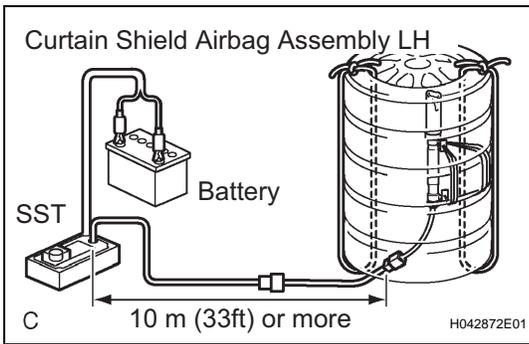
**Do not place the SST connector under the tire because it could be damaged.**

- (3) Tie the tires together with 2 wire harnesses.

**CAUTION:**

**Make sure that the wire harness is tight. Looseness in the wire harness results in the tires coming free due to the shock when the airbag is deployed.**





(h) Install the SST.

(1) Connect the SST connector.

**SST 09082-00700**

**NOTICE:**

**To avoid damaging the SST connector and wire harness, do not lock the secondary lock of the twin lock. Also, secure some slack for the SST wire harness inside the tire.**

(i) Deploy the airbag.

(1) Connect the red clip of the SST to the battery positive (+) terminal and the black clip of the SST to the battery negative (-) terminal.

(2) Check that no one is within a 10 m (33 ft) radius of the tire which the curtain shield airbag assembly is tied to.

(3) Press the SST activation switch and deploy the airbag.

**CAUTION:**

**When deploying the airbag, make sure that no one is near the tire.**

**HINT:**

The airbag is deployed as the LED of the SST activation switch comes on.

(j) Dispose of the curtain shield airbag assembly.

**CAUTION:**

- **The curtain shield airbag assembly becomes extremely hot when the airbag is deployed, so do not touch it for at least 30 minutes after deployment.**
- **Use gloves and safety glasses when handling a curtain shield airbag assembly with a deployed airbag.**
- **Do not apply water, etc. to a curtain shield airbag assembly with a deployed airbag.**
- **Always wash your hands with water after completing the operation.**

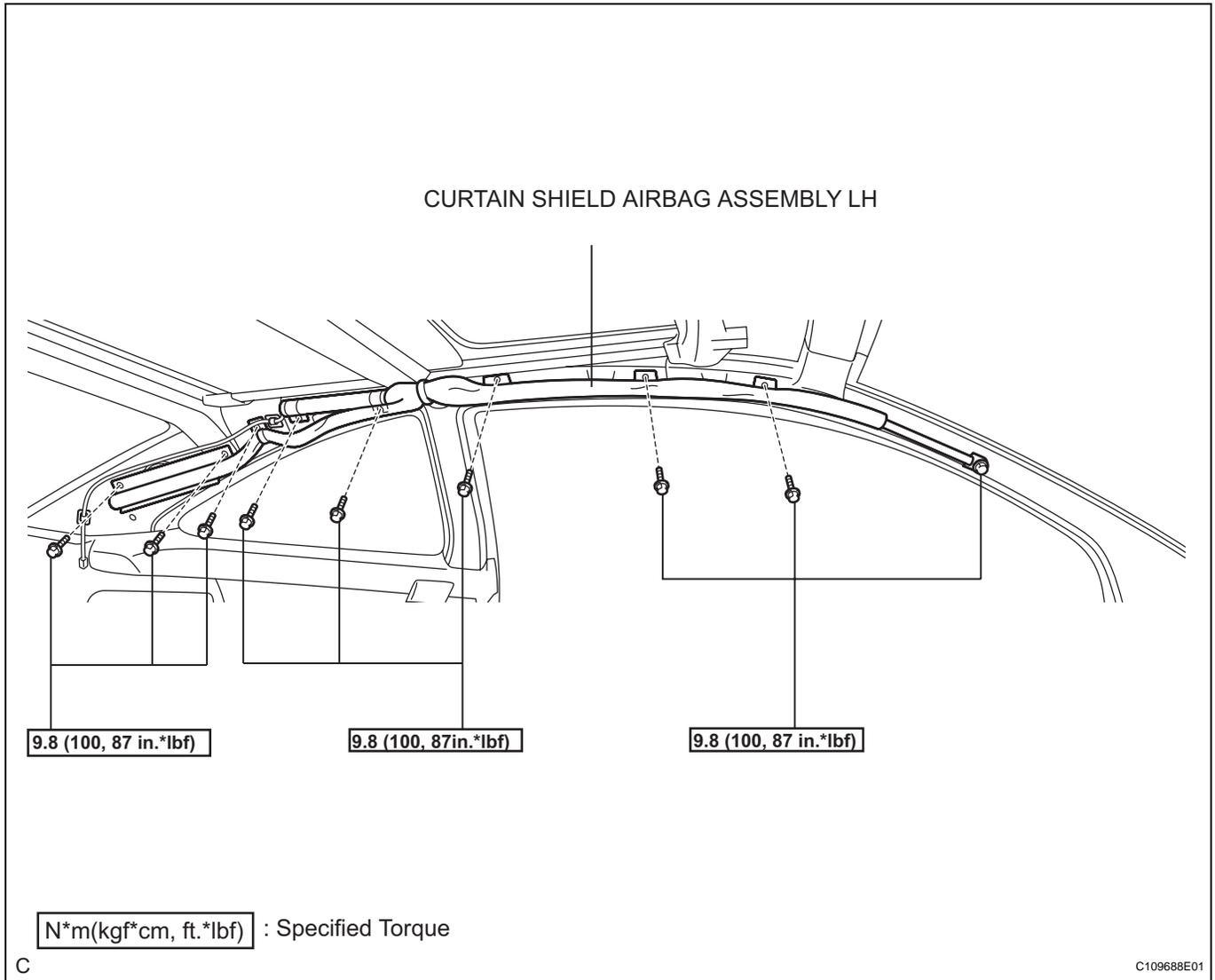
(1) Remove the curtain shield airbag assembly from the tire.

(2) Place the curtain shield airbag assembly in a plastic bag, tie it tightly and dispose of it as other general part disposal.



# CURTAIN SHIELD AIRBAG ASSEMBLY

## COMPONENTS



RS

## ON-VEHICLE INSPECTION

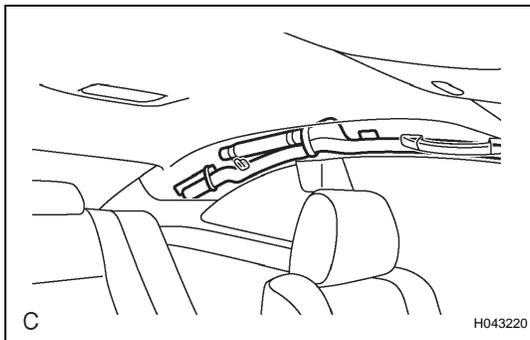
### CAUTION:

Be sure to perform the initialization of the occupant classification ECU if any of the following conditions occur (See page [RS-1](#)). If the initialization is not performed, the SRS may not operate properly.

- The occupant classification ECU is replaced.
- Accessories (seatback tray or seat cover, etc.) are installed to the vehicle.
- The passenger seat is removed from the vehicle.
- Both the SRS warning light and passenger airbag ON/OFF indicator light ("OFF") come on.
- The vehicle is brought to the workshop for repair due to an accident or collision.

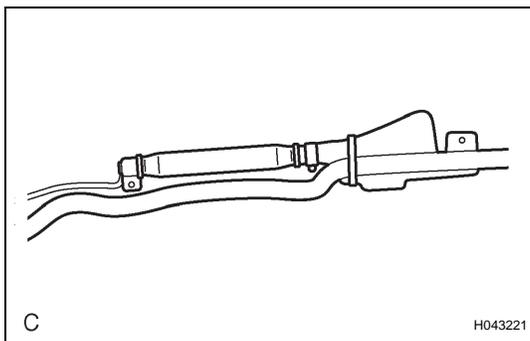
### HINT:

The curtain shield airbag assembly and airbag sensor rear are mounted in the coupe model only.



### 1. INSPECT CURTAIN SHIELD AIRBAG ASSEMBLY (VEHICLE NOT INVOLVED IN COLLISION)

- (a) Perform a diagnostic system check (See page [RS-36](#)).
- (b) With the curtain shield airbag assembly installed on the vehicle, perform a visual check including the following:
  - Cuts, minute cracks or marked discoloration on the front pillar garnish or roof headlining assembly around the curtain shield airbag assembly.



### 2. INSPECT CURTAIN SHIELD AIRBAG ASSEMBLY (VEHICLE INVOLVED IN COLLISION AND AIRBAG IS NOT DEPLOYED)

- (a) Perform a diagnostic system check (See page [RS-36](#)).
- (b) With the curtain shield airbag assembly removed from the vehicle, perform a visual check including the following:
  - Cuts, minute cracks or marked discoloration on the curtain shield airbag assembly.
  - Cracks or other damage to the wire harness or connector.

# FRONT SEAT SIDE AIRBAG ASSEMBLY

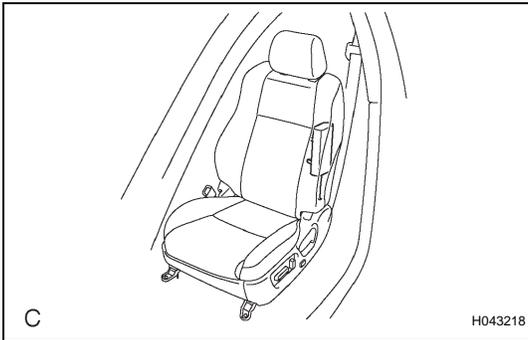
## ON-VEHICLE INSPECTION

IN-24

### CAUTION:

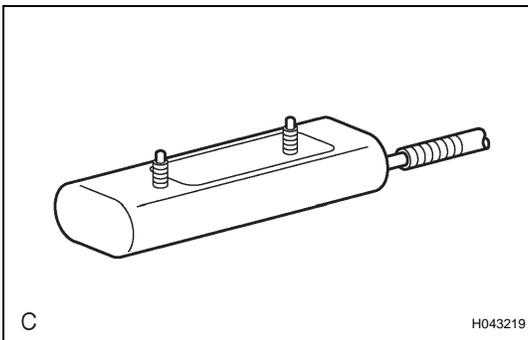
Be sure to perform the initialization of the occupant classification ECU if any of the following conditions occur (See page ). If the initialization is not performed, the SRS may not operate properly.

- The occupant classification ECU is replaced.
- Accessories (seatback tray or seat cover, etc.) are installed to the vehicle.
- The passenger seat is removed from the vehicle.
- Both the SRS warning light and passenger airbag ON/OFF indicator light ("OFF") come on.
- The vehicle is brought to the workshop for repair due to an accident or collision.



### 1. INSPECT FRONT SEAT SIDE AIRBAG ASSEMBLY (VEHICLE NOT INVOLVED IN COLLISION)

- (a) Perform a diagnostic system check (See page RS-1).
- (b) With the front seat airbag assembly removed from the vehicle, perform a visual check including the following:  
Cuts, Minute cracks or marked discoloration on the front seatback assembly around the front seat airbag assembly.



### 2. INSPECT FRONT SEAT SIDE AIRBAG ASSEMBLY (VEHICLE INVOLVED IN COLLISION AND AIRBAG IS NOT DEPLOYED)

- (a) Perform a diagnostic system check (See page RS-1).
- (b) With the front seat airbag assembly installed on the vehicle, perform a visual check including the following:  
Cuts, minute cracks or marked discoloration on the front seat back assembly around the front seat airbag assembly.
  - Cuts, minute cracks or marked discoloration on the front seat airbag assembly.
  - Cracks or other damage to the wire harness or connector.

## DISPOSAL

### HINT:

When scrapping a vehicle equipped with the SRS or disposing of the front seat airbag assembly, be sure to deploy the airbag first in accordance with the procedure described below. If any abnormality occurs with the airbag deployment, contact the SERVICE DEPT. of TOYOTA MOTOR SALES, U.S.A., INC.

### CAUTION:

- **Never dispose of a front seat airbag assembly that has an undeployed airbag.**
- **The airbag produces an exploding sound when it is deployed, so perform the operation outdoors and where it will not create a nuisance to nearby residents.**
- **When deploying the airbag, always use the specified SST (SRS Airbag Deployment Tool). Perform the operation in a place away from electrical noise.**
- **When deploying the airbag, perform the operation at least 10 m (33 ft) away from the airbag assembly.**
- **The front seat airbag assembly becomes extremely hot when the airbag is deployed, so do not touch it for at least 30 minutes after deployment.**
- **Use gloves and safety glasses when handling a front seat airbag assembly with a deployed airbag.**
- **Do not apply water, etc. to a front seat airbag assembly with a deployed airbag.**
- **Always wash your hands with water after completing the operation.**

### 1. DISPOSE OF FRONT SEAT SIDE AIRBAG ASSEMBLY (WHEN INSTALLED IN VEHICLE)

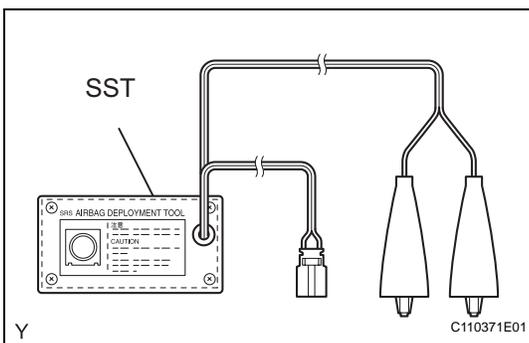
#### HINT:

Prepare a battery as the power source to deploy the airbag.

- (a) Check the function of the SST (See page [RS-263](#)).
- (b) Precaution (See page [RS-1](#)).
- (c) Disconnect the cable from the negative battery terminal. Wait for 90 seconds after disconnecting the cable to prevent the airbag working.
- (d) Loosen the front seat assembly (See page [SE-18](#) manual seat, [SE-30](#) w/ power seat).

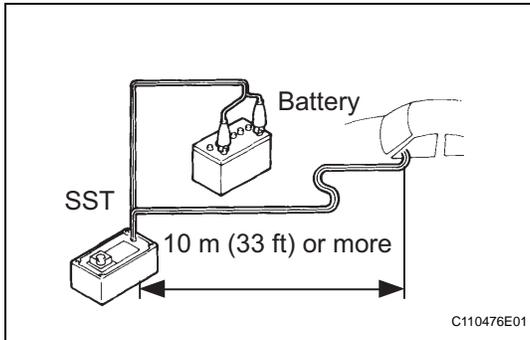
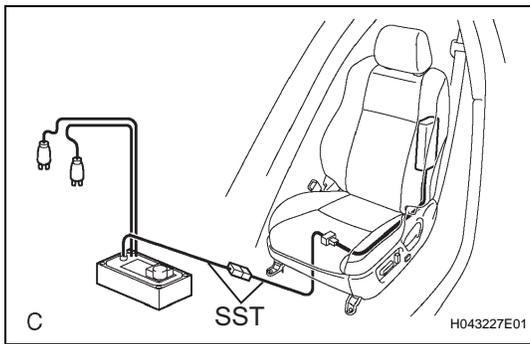
#### HINT:

Keep the front seat assembly in the cabin.



Y

RS



- (e) Install the SST.
- (1) Disconnect the connector (yellow colored one) from the front seat airbag assembly.

**NOTICE:**

**When handling the airbag connector, take care not to damage the airbag wire harness.**

- (2) Connect the SST connector to the front seat airbag assembly connector.

**SST 09082-00700, 09082-00750**

**NOTICE:**

**To avoid damaging the SST connector and wire harness, do not lock the secondary lock of the twin lock.**

- (3) Install the front seat assembly with the 4 bolts (See page [SE-25](#) manual seat, [SE-37](#) w/ power seat).

**Torque: 36.7 N\*m (374 kgf\*cm, 27 ft.\*lbf)**

- (4) Move the SST at least 10 m (33 ft) away from the vehicle front side window.
- (5) Maintaining enough clearance for the SST wire harness in the front side window, close all doors and windows of the vehicle.

**NOTICE:**

**Take care not to damage the SST wire harness.**

- (6) Connect the red clip of the SST to the battery positive (+) terminal and the black clip of the SST to the battery negative (-) terminal.

- (f) Deploy the airbag.

- (1) Check that no one is inside the vehicle or within a 10 m (33 ft) radius of the vehicle.

- (2) Press the SST activation switch and deploy the airbag.

**CAUTION:**

- **When deploying the airbag, make sure that no one is near the vehicle.**
- **The front seat airbag assembly becomes extremely hot when the airbag is deployed, so do not touch it for at least 30 minutes after deployment.**
- **Use gloves and safety glasses when handling a front seat airbag assembly with a deployed airbag.**
- **Do not apply water, etc. to a front seat airbag assembly with a deployed airbag.**
- **Always wash your hands with water after completing the operation.**

**HINT:**

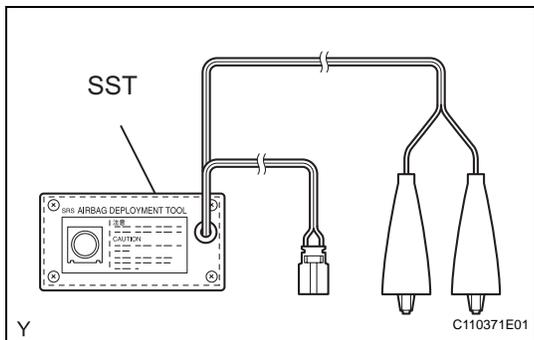
The airbag is deployed as the LED of the SST activation switch comes on.

**2. DISPOSE OF FRONT SEAT SIDE AIRBAG ASSEMBLY (WHEN NOT INSTALLED IN VEHICLE)  
NOTICE:**

- When disposing of the front seat airbag assembly, never use the customer's vehicle to deploy the airbag.
- Be sure to follow the procedure detailed below when deploying the airbag.

**HINT:**

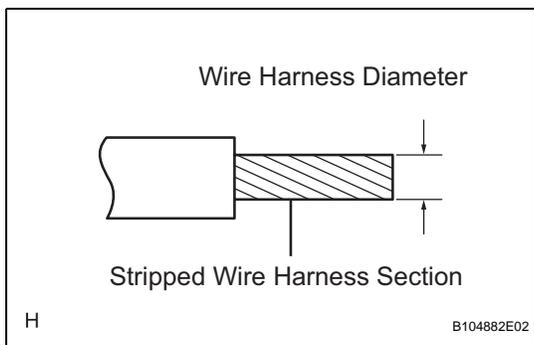
Prepare a battery as the power source to deploy the airbag.



- (a) Check the function of the SST (See page RS-263).
- (b) Remove the front seat airbag assembly.
  - (1) Remove the front seat assembly (See page SE-18 manual seat, SE-30 w/ power seat).
  - (2) Remove the 2 nuts and the front seat airbag assembly from the seatback assembly.

**CAUTION:**

- When removing the front seat airbag assembly, work must be started 90 seconds after the ignition switch is turned to the "LOCK" position and the negative (-) terminal cable is disconnected from the battery.
- When storing the front seat airbag assembly, keep the upper surface of the airbag deployment side facing upward.



- (c) Using a service-purpose wire harness for the vehicle, tie down the front seat airbag assembly to the tire.

**Wire harness:**

**Stripped wire harness section**

1.25 mm<sup>2</sup> or more (0.0019 in.<sup>2</sup> or more)

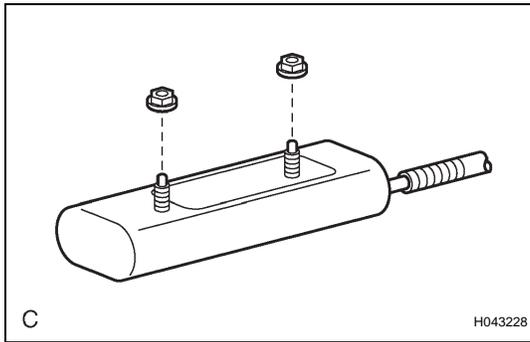
**HINT:**

To calculate the area of the stripped wire harness section:

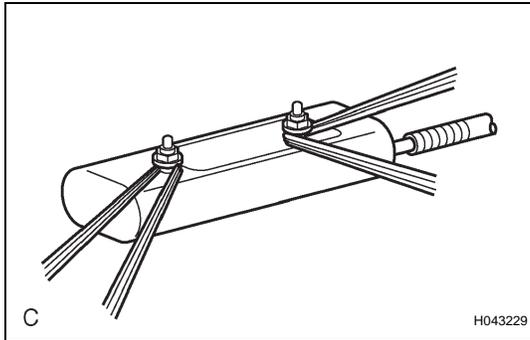
$$\text{Area} = 3.14 \times (\text{Diameter})^2 \text{ divided by } 4$$

**CAUTION:**

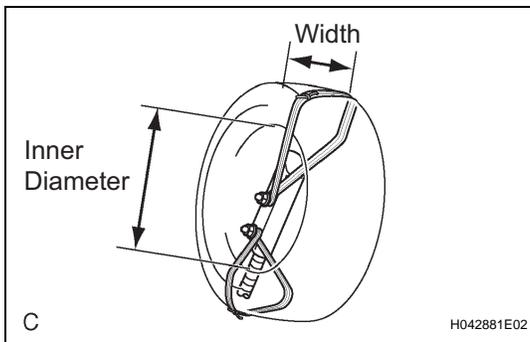
If the wire harness is too thin or an alternative object is used to tie down the front seat airbag assembly, it may be snapped by the shock when the airbag is deployed. Always use a wire harness for vehicle use with an area of at least 1.25 mm<sup>2</sup> (0.0019 in.<sup>2</sup>).



- (1) Install the 2 nuts to the front seat airbag assembly.



- (2) Wind the wire harness around the stud bolts of the front seat airbag assembly as shown in the illustration.



- (3) Position the front seat airbag assembly inside the tire with the airbag deployment direction facing inside.

**Tire size:**

**Must exceed the following dimensions**

**Width:**

**185 mm (7.28 in.)**

**Inner diameter:**

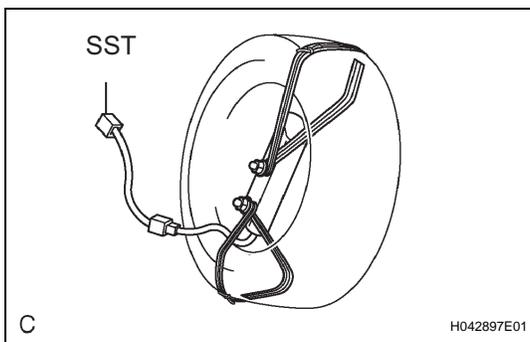
**360 mm (14.17 in.)**

**CAUTION:**

- **Make sure that the wire harness is tight. If there is slack in wire harness, the front seat airbag assembly may become loose due to the shock when the airbag is deployed.**
- **Always tie down the front seat airbag assembly with the airbag deployment direction facing inside the tire.**

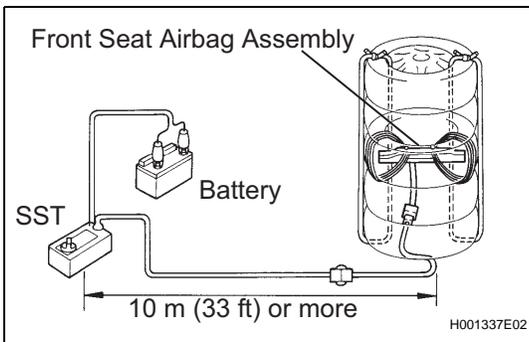
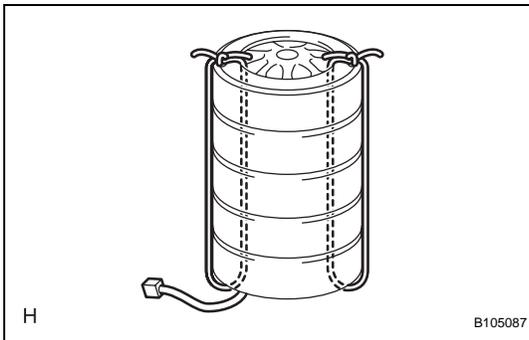
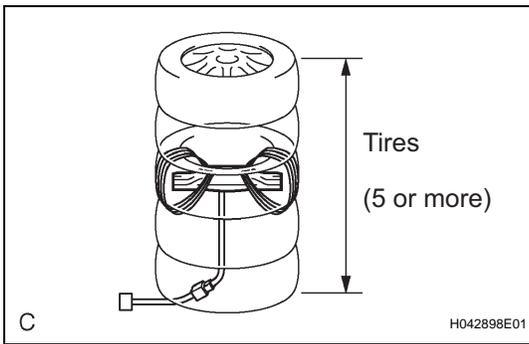
**NOTICE:**

**The tire will be marked by the airbag deployment, so use an extra tire.**



- (d) Install the SST.  
 (1) Connect the SST connector to the front seat airbag assembly connector.

**SST 09082-00750**



- (e) Place the tires.
  - (1) Place at least 2 tires under the tire which the front seat airbag assembly is tied to.
  - (2) Place at least 2 tires over the tire which the front seat airbag assembly is tied to. The top tire should have the disc wheel installed.

**NOTICE:**

**Do not place the SST connector under the tire because it could be damaged.**

- (3) Tie the tires together with 2 wire harnesses.

**CAUTION:**

**Make sure that the wire harness is tight. Looseness in the wire harness results in the tires coming free due to the shock when the airbag is deployed.**

- (f) Install the SST.

- (1) Connect the SST connector.

**SST 09082-00700**

**NOTICE:**

**To avoid damaging the SST connector and wire harness, do not lock the secondary lock of the twin lock. Also, secure some slack for the SST wire harness inside the tire.**

- (g) Deploy the airbag.

- (1) Connect the red clip of the SST to the battery positive (+) terminal and the black clip of the SST to the battery negative (-) terminal.
- (2) Check that no one is within a 10 m (33 ft) radius of the tire which the front seat airbag assembly is tied to.
- (3) Press the SST activation switch and deploy the airbag.

**CAUTION:**

**When deploying the airbag, make sure that no one is near the tire.**

**HINT:**

The airbag is deployed as the LED of the SST activation switch comes on.



(h) Dispose of the front seat airbag assembly.

**CAUTION:**

- **The front seat airbag assembly becomes extremely hot when the airbag is deployed, so do not touch it for at least 30 minutes after deployment.**
- **Use gloves and safety glasses when handling a front seat airbag assembly with a deployed airbag.**
- **Do not apply water, etc. to a front seat airbag assembly with a deployed airbag.**
- **Always wash your hands with water after completing the operation.**

- (1) Remove the front seat airbag assembly from the tire.
- (2) Place the front seat airbag assembly in a plastic bag, tie it tightly and dispose of it as other general parts disposal.

# INSTALLATION

## 1. INSTALL CENTER AIRBAG SENSOR ASSEMBLY

- (a) Check that the ignition switch is off.
- (b) Check that the battery negative (-) terminal is disconnected.

**CAUTION:**

**After removing the terminal, wait for at least 90 seconds before starting the operation.**

- (c) Temporarily install the center airbag sensor assembly with the 3 bolts.

**NOTICE:**

- If the center airbag sensor assembly has been dropped, or there are any cracks, dents or other defects in the case, bracket or connector, replace it with a new one.
- When installing the center airbag sensor assembly, be careful that the SRS wiring does not interfere with other parts and that it is not pinched between other parts.

- (d) Tighten the 3 bolts to the specified torque.  
**Torque: 17.5 N\*m (178 kgf\*cm, 13 in.\*lbf)**
- (e) Connect the holder (with connectors) to the center airbag sensor assembly.
- (f) Check that there is no looseness in the installation parts of the center airbag sensor assembly.
- (g) Check that the water-proof sheet is properly set.

## 2. CONNECT BATTERY NEGATIVE TERMINAL

**NOTICE:**

**When disconnecting the negative (-) battery terminal, initialize the following systems after the terminal is reconnected.**

**RS**

System Name	See Procedure
Power Window Control System	<a href="#">IN-24</a>
Sliding Roof System	

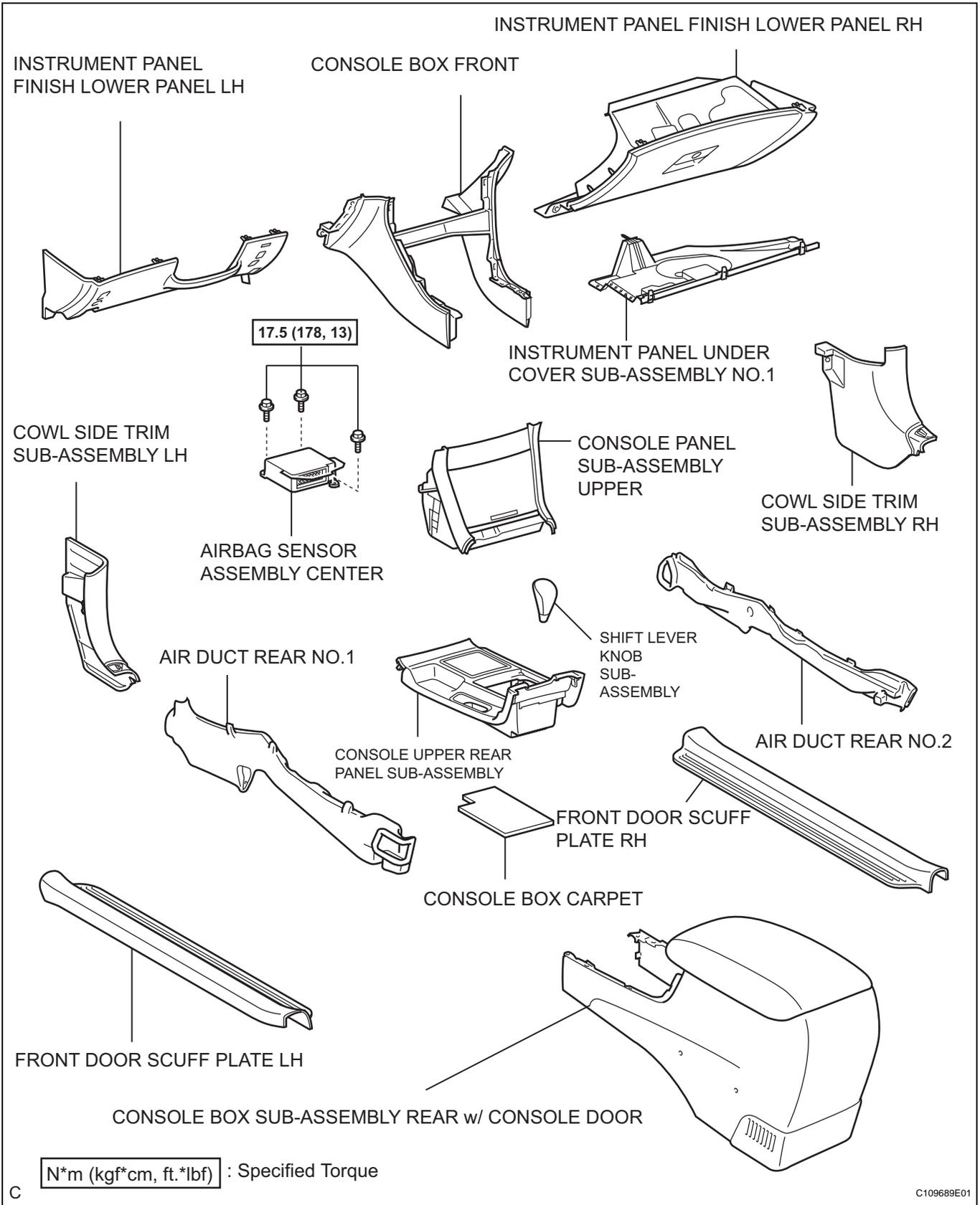
## 3. INSPECT SRS WARNING LIGHT

HINT:

See page [RS-30](#)

# CENTER AIRBAG SENSOR ASSEMBLY

## COMPONENTS



**RS**

**N\*m (kgf\*cm, ft.\*lbf)** : Specified Torque

C

C109689E01

## ON-VEHICLE INSPECTION

### CAUTION:

Be sure to perform the initialization of the occupant classification ECU if any of the following conditions occur (See page [IN-24](#)). If the initialization is not performed, the SRS may not operate properly.

- The occupant classification ECU is replaced.
- Accessories (seatback tray or seat cover, etc.) are installed to the vehicle.
- The passenger seat is removed from the vehicle.
- Both the SRS warning light and passenger airbag ON/OFF indicator light ("OFF") come on.
- The vehicle is brought to the workshop for repair due to an accident or collision.

1. **INSPECT CENTER AIRBAG SENSOR ASSEMBLY (VEHICLE NOT INVOLVED IN COLLISION)**
  - (a) Perform a diagnostic system check (See page [RS-36](#)).
2. **INSPECT CENTER AIRBAG SENSOR ASSEMBLY (VEHICLE INVOLVED IN COLLISION AND AIRBAG IS NOT DEPLOYED)**
  - (a) Perform a diagnostic system check (See page [RS-36](#)).
3. **INSPECT CENTER AIRBAG SENSOR ASSEMBLY (VEHICLE INVOLVED IN COLLISION AND AIRBAG IS DEPLOYED)**
  - (a) Replace the center airbag sensor assembly (See page [RS-300](#)).

## REMOVAL

HINT:

Installation is in the reverse order of removal.

1. **DISCONNECT BATTERY NEGATIVE TERMINAL**  
HINT:  
See page [RS-1](#)
2. **REMOVE FRONT DOOR SCUFF PLATE LH**  
HINT:  
See page [IP-6](#)
3. **REMOVE FRONT DOOR SCUFF PLATE RH**  
HINT:  
See page [IP-6](#)
4. **REMOVE COWL SIDE TRIM SUB-ASSEMBLY LH**  
HINT:  
See page [IP-6](#)
5. **REMOVE COWL SIDE TRIM SUB-ASSEMBLY RH**  
HINT:  
See page [IP-6](#)
6. **REMOVE INSTRUMENT PANEL FINISH LOWER PANEL LH**  
HINT:  
See page [IP-6](#)
7. **REMOVE SHIFT LEVER KNOB SUB-ASSEMBLY**  
HINT:  
See page [IP-6](#)
8. **REMOVE CONSOLE BOX CARPET**
9. **REMOVE CONSOLE UPPER REAR PANEL SUB-ASSEMBLY**  
HINT:  
See page [IP-6](#)
10. **REMOVE REAR CONSOLE BOX ASSEMBLY**  
HINT:  
See page [IP-6](#)
11. **REMOVE CONSOLE PANEL SUB-ASSEMBLY UPPER**  
HINT:  
See page [IP-6](#)
12. **REMOVE INSTRUMENT PANEL UNDER COVER SUB-ASSEMBLY NO.1**  
HINT:  
See page [IP-6](#)
13. **REMOVE INSTRUMENT PANEL FINISH LOWER PANEL RH**  
HINT:  
See page [IP-6](#)
14. **REMOVE CONSOLE BOX FRONT**  
HINT:  
See page [IP-6](#)

**15. REMOVE AIR DUCT REAR NO.1**

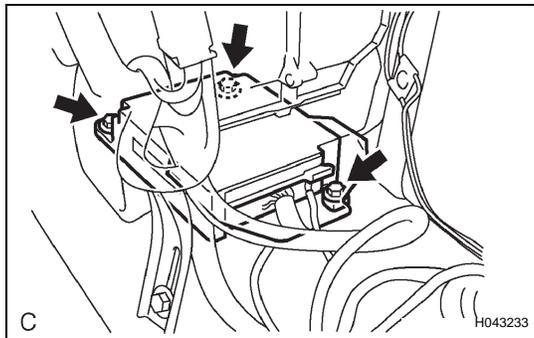
HINT:

See page [AC-123](#)**16. REMOVE AIR DUCT REAR NO.2**

HINT:

See page [AC-123](#)**17. REMOVE CENTER AIRBAG SENSOR ASSEMBLY**

- (a) Disconnect the holder (with connectors) from the center airbag sensor assembly.
- (b) Remove the 3 bolts and the center airbag sensor assembly.



## REMOVAL

### HINT:

- Use the same procedures for the RH side and LH side.
- The procedures listed below are for the LH side.
- Installation is in the reverse order of removal.

### 1. DISCONNECT BATTERY NEGATIVE TERMINAL

#### HINT:

See page [RS-1](#)

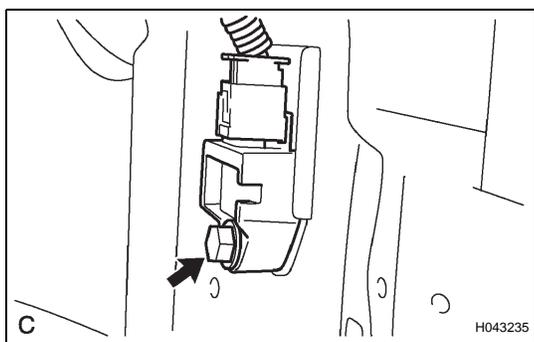
### 2. REMOVE ENGINE UNDER COVER LH

#### HINT:

See page [EM-61](#)

### 3. REMOVE FRONT AIRBAG SENSOR RH AND LH

- (a) Disconnect the connector from the front airbag sensor LH.
- (b) Remove the bolt and the front airbag sensor LH.



## INSTALLATION

### 1. INSTALL FRONT AIRBAG SENSOR RH AND LH

- (a) Check that the ignition switch is off.
- (b) Check that the battery negative (-) terminal is disconnected.

**CAUTION:**

**After removing the terminal, wait for at least 90 seconds before starting the operation.**

- (c) Install the front airbag sensor LH with the bolt.  
**Torque: 17.5 N\*m (178 kgf\*cm, 13 ft.\*lbf)**

**NOTICE:**

- If the front airbag sensor LH has been dropped, or there are any cracks, dents or other defects in the case, bracket or connector, replace it with a new one.
  - When installing the front airbag sensor LH, be careful that the SRS wiring does not interfere with other parts and that it is not pinched between other parts.
- (d) Connect the connector to the front airbag sensor LH.
  - (e) Check that there is no looseness in the installation parts of the front airbag sensor LH.

### 2. CONNECT BATTERY NEGATIVE TERMINAL

**NOTICE:**

**When disconnecting the negative (-) battery terminal, initialize the following systems after the terminal is reconnected.**

System Name	See Procedure
Power Window Control System	<a href="#">IN-24</a>
Sliding Roof System	

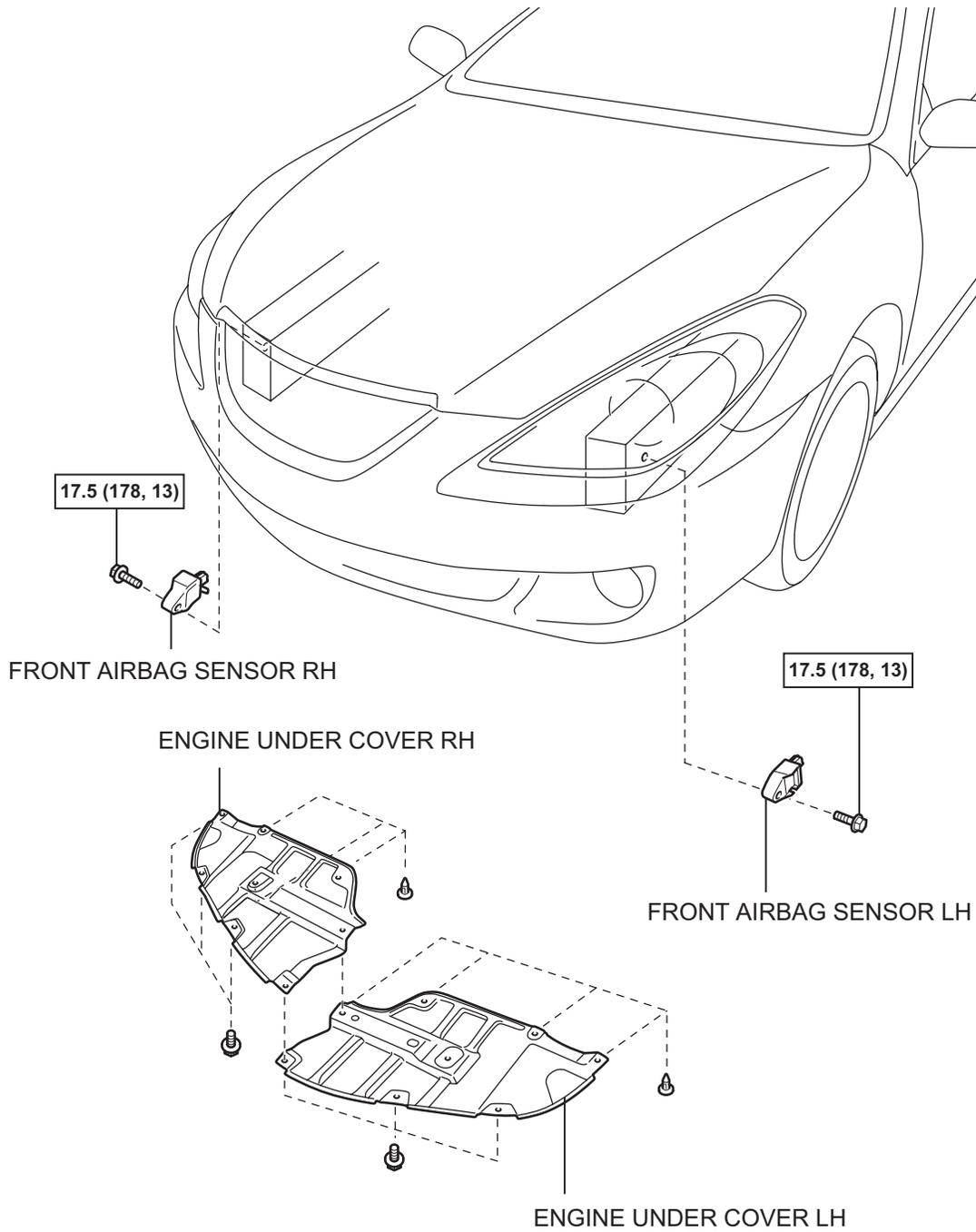
### 3. INSPECT SRS WARNING LIGHT

**HINT:**

See page [RS-28](#)

# FRONT AIRBAG SENSOR

## COMPONENTS



$\boxed{N*m (kgf*cm, ft.*lbf)}$  : Specified Torque

## ON-VEHICLE INSPECTION

### CAUTION:

Be sure to perform the initialization of the occupant classification ECU if any of the following conditions occur (See page [IN-24](#)). If the initialization is not performed, the SRS may not operate properly.

- The occupant classification ECU is replaced.
- Accessories (seatback tray or seat cover, etc.) are installed to the vehicle.
- The passenger seat is removed from the vehicle.
- Both the SRS warning light and passenger airbag ON/OFF indicator light ("OFF") come on.
- The vehicle is brought to the workshop for repair due to an accident or collision.

### 1. INSPECT FRONT AIRBAG SENSOR (VEHICLE NOT INVOLVED IN COLLISION)

- (a) Perform a diagnostic system check (See page [RS-30](#)).

### 2. INSPECT FRONT AIRBAG SENSOR (VEHICLE INVOLVED IN COLLISION AND AIRBAG IS NOT DEPLOYED)

- (a) Perform a diagnostic system check (See page [RS-30](#)).
- (b) When the front bumper of the vehicle or its periphery is damaged, check if there is any damage to the airbag sensor front. If there are any defects as mentioned below, replace the airbag sensor front with a new one:
  - Cracks, dents or chips in the case.
  - Cracks or other damage to the connector.
  - Peeling off of the label or damage to the serial number.

### 3. INSPECT FRONT AIRBAG SENSOR (VEHICLE INVOLVED IN COLLISION AND AIRBAG IS DEPLOYED)

- (a) Replace the airbag sensor front (See page [RS-304](#)).

## INSTALLATION

### 1. INSTALL SIDE AIRBAG SENSOR ASSEMBLY LH

- (a) Check that the ignition switch is off.
- (b) Check that the battery negative (-) terminal is disconnected.

**CAUTION:**

**After removing the terminal, wait for at least 90 seconds before starting the operation.**

- (c) Install the side airbag sensor assembly LH with the 2 nuts.

**Torque: 17.5 N\*m (178 kgf\*cm, 13 ft.\*lbf)**

**NOTICE:**

- If the side airbag sensor assembly LH has been dropped, or there are any cracks, dents or other defects in the case, bracket or connector, replace it with a new one.
  - When installing the side airbag sensor assembly LH, be careful that the SRS wiring does not interfere with other parts and that it is not pinched between other parts.
- (d) Connect the connector to the side airbag sensor assembly LH.
  - (e) Check that there is no looseness in the installation parts of the side airbag sensor assembly LH.

### 2. CONNECT BATTERY NEGATIVE TERMINAL

**NOTICE:**

**When disconnecting the negative (-) battery terminal, initialize the following systems after the terminal is reconnected.**

**RS**

System Name	See Procedure
Power Window Control System	<a href="#">IN-24</a>
Sliding Roof System (coupe model only)	

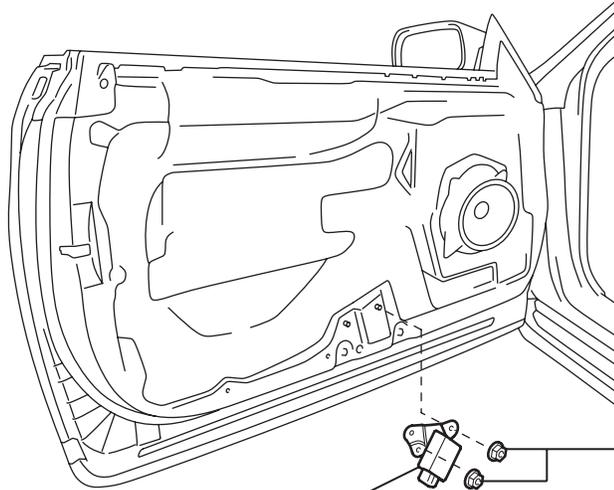
### 3. INSPECT SRS WARNING LIGHT

**HINT:**

See page [RS-28](#)

# SIDE AIRBAG SENSOR

## COMPONENTS



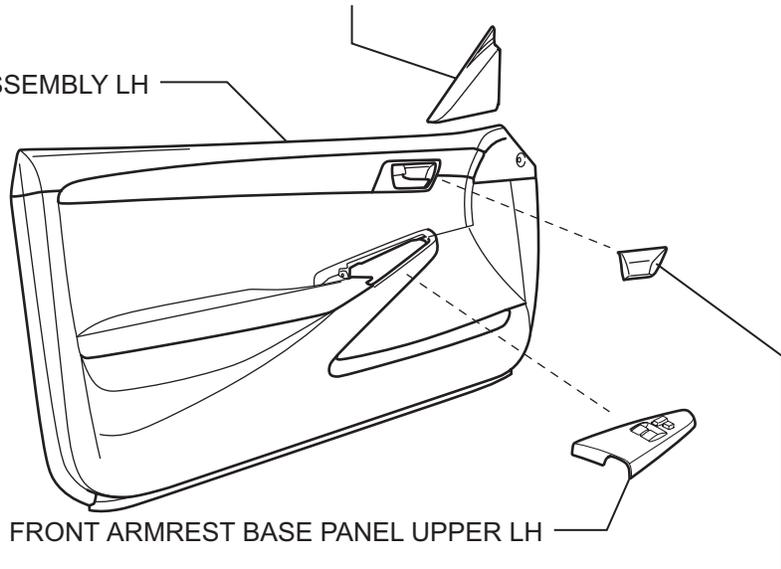
17.5 (178, 73)

SIDE AIRBAG SENSOR ASSEMBLY LH

FRONT DOOR LOWER FRAME BRACKET GARNISH LH

RS

FRONT DOOR TRIM BOARD SUB-ASSEMBLY LH



FRONT ARMREST BASE PANEL UPPER LH

FRONT DOOR INSIDE HANDLE BEZEL PLUG LH

$\boxed{\text{N}\cdot\text{m (kgf}\cdot\text{cm, ft.}\cdot\text{lbf)}}$ : Specified torque

## ON-VEHICLE INSPECTION

### CAUTION:

Be sure to perform the initialization of the occupant classification ECU if any of the following conditions occur. If the initialization is not performed, the SRS may not operate properly.

- The occupant classification ECU is replaced.
- Accessories (seatback tray or seat cover, etc.) are installed to the vehicle.
- The passenger seat is removed from the vehicle.
- Both the SRS warning light and passenger airbag ON/OFF indicator light ("OFF") come on.
- The vehicle is brought to the workshop for repair due to an accident or collision.

### 1. INSPECT SIDE AIRBAG SENSOR (VEHICLE NOT INVOLVED IN COLLISION)

- (a) Perform a diagnostic system check (See page [RS-36](#)).

### 2. INSPECT SIDE AIRBAG SENSOR (VEHICLE INVOLVED IN COLLISION AND AIRBAG IS NOT DEPLOYED)

- (a) Perform a diagnostic system check (See page [RS-36](#)).
- (b) When the door of the vehicle or its periphery is damaged, check if there is any damage to the side airbag sensor assembly. If there are any defects as mentioned below, replace the side airbag sensor assembly with a new one:
  - Cracks, dents or chips in the case.
  - Cracks or other damage to the connector.
  - Peeling off of the label or damage to the serial number.

### 3. INSPECT SIDE AIRBAG SENSOR (VEHICLE INVOLVED IN COLLISION AND AIRBAG IS DEPLOYED)

- (a) Replace the side airbag sensor assembly (See page [RS-307](#)).

## REMOVAL

### HINT:

- Use the same procedures for the RH side and LH side.
- The procedures listed below are for the LH side.
- Installation is in the reverse order of removal.

#### 1. DISCONNECT BATTERY NEGATIVE TERMINAL

##### HINT:

See page [RS-1](#)

#### 2. REMOVE FRONT DOOR LOWER FRAME BRACKET GARNISH LH

##### HINT:

See page [ED-10](#)

#### 3. REMOVE FRONT DOOR INSIDE HANDLE BEZEL PLUG LH

##### HINT:

See page [ED-10](#)

#### 4. REMOVE FRONT ARMREST BASE PANEL UPPER LH

##### [ED-10](#)

##### HINT:

See page

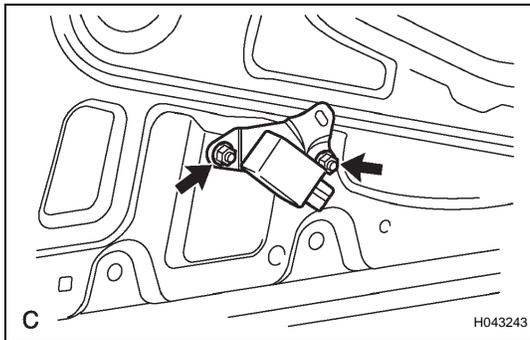
#### 5. REMOVE FRONT DOOR TRIM BOARD SUB-ASSEMBLY LH

##### HINT:

See page [ED-11](#)

#### 6. REMOVE SIDE AIRBAG SENSOR ASSEMBLY LH

- (a) Disconnect the connector from the side airbag sensor assembly LH.
- (b) Remove the 2 nuts and the side airbag sensor assembly LH.

**RS**

## INSTALLATION

### 1. INSTALL REAR AIRBAG SENSOR LH

- (a) Check that the ignition switch is off.
- (b) Check that the battery negative (-) terminal is disconnected.

**CAUTION:**

**After removing the terminal, wait for at least 90 seconds before starting the operation.**

- (c) Install the rear airbag sensor LH with the 2 bolts.  
**Torque: 17.5 N\*m (178 kgf\*cm, 13 ft.\*lbf)**

**NOTICE:**

- If the rear airbag sensor LH has been dropped, or there are any cracks, dents or other defects in the case, bracket or connector, replace it with a new one.
  - When installing the rear airbag sensor LH, be careful that the SRS wiring does not interfere with other parts and that it is not pinched between other parts.
- (d) Connect the connector to the rear airbag sensor LH.
  - (e) Check that there is no looseness in the installation parts of the rear airbag sensor LH.

### 2. INSTALL REAR SEATBACK ASSEMBLY LH

**HINT:**

See page [SE-44](#) coupe, [SE-48](#) convertible

### 3. CONNECT BATTERY NEGATIVE TERMINAL

**NOTICE:**

**When disconnecting the negative (-) battery terminal, initialize the following systems after the terminal is reconnected.**

**RS**

System Name	See Procedure
Power Window Control System	<a href="#">IN-24</a>
Sliding Roof System	

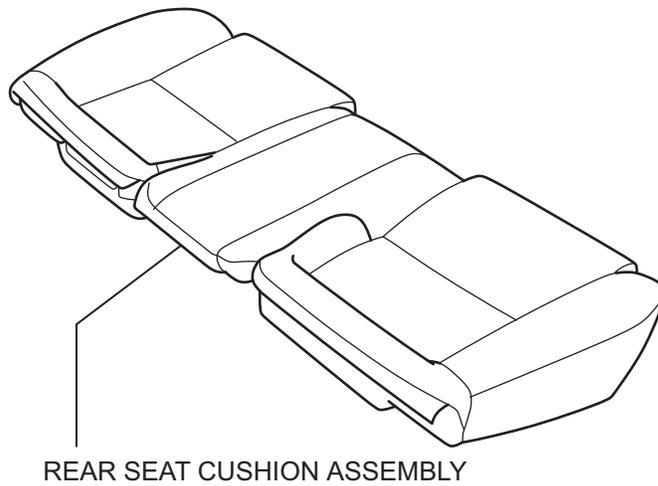
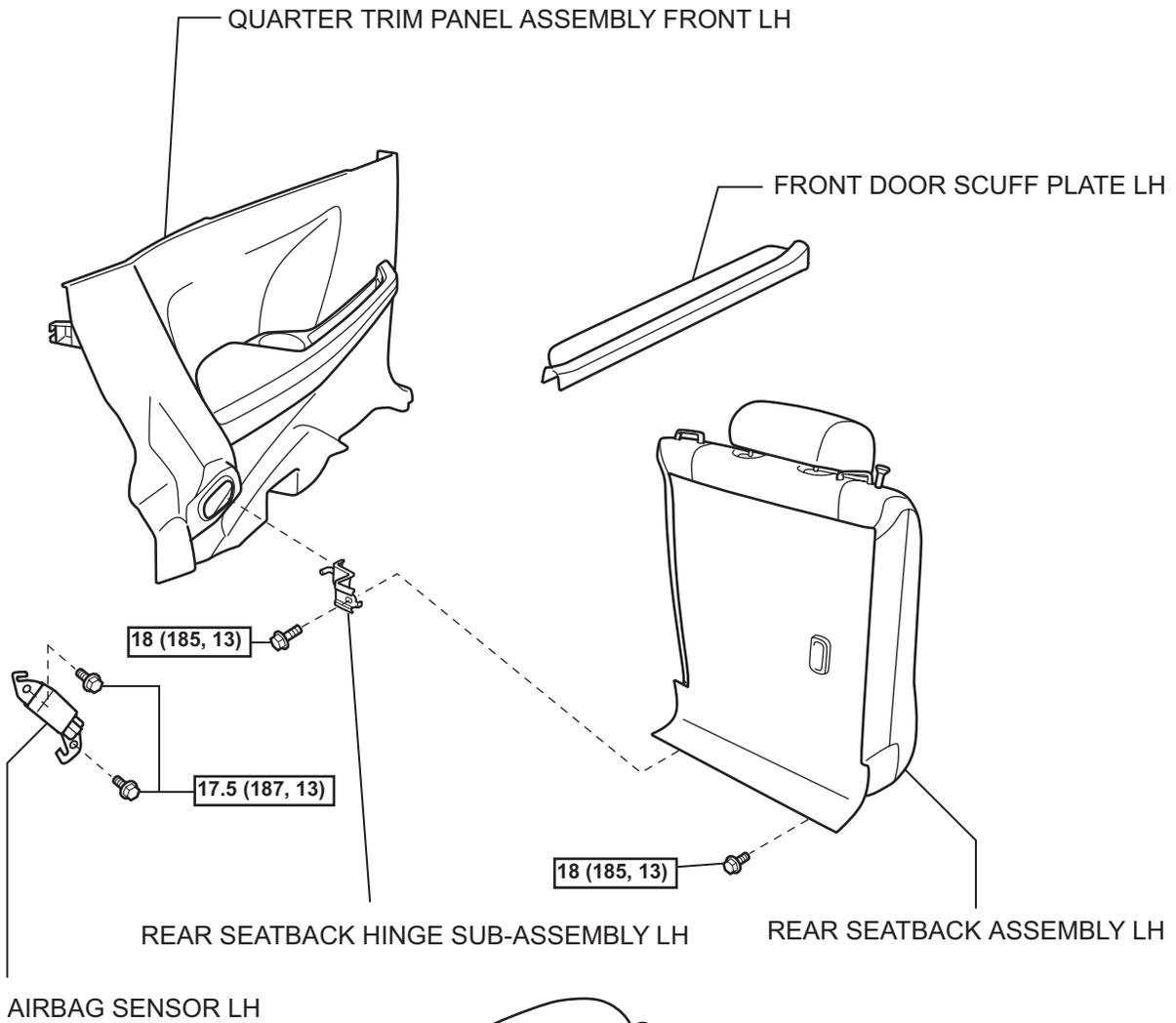
### 4. INSPECT SRS WARNING LIGHT

**HINT:**

See page [RS-28](#)

# REAR AIRBAG SENSOR

## COMPONENTS



**N\*m (kgf\*cm, ft.\*lbf)** : Specified torque

RS

## ON-VEHICLE INSPECTION

### CAUTION:

Be sure to perform the initialization of the occupant classification ECU if any of the following conditions occur. If the initialization is not performed, the SRS may not operate properly.

- The occupant classification ECU is replaced.
- Accessories (seatback tray or seat cover, etc.) are installed to the vehicle.
- The passenger seat is removed from the vehicle.
- Both the SRS warning light and passenger airbag ON/OFF indicator light ("OFF") come on.
- The vehicle is brought to the workshop for repair due to an accident or collision.

### HINT:

The curtain shield airbag assembly and airbag sensor rear are mounted in the coupe model only.

#### 1. INSPECT REAR AIRBAG SENSOR (VEHICLE NOT INVOLVED IN COLLISION)

- (a) Perform a diagnostic system check (See page [RS-36](#)).

#### 2. INSPECT REAR AIRBAG SENSOR (VEHICLE INVOLVED IN COLLISION AND AIRBAG IS NOT DEPLOYED)

- (a) Perform a diagnostic system check (See page [RS-36](#)).
- (b) When the quarter panel of the vehicle or its periphery is damaged, check if there is any damage to the airbag sensor rear. If there are any defects as mentioned below, replace the airbag sensor rear with a new one:
  - Cracks, dents or chips in the case.
  - Cracks or other damage to the connector.
  - Peeling off of the label or damage to the serial number.

#### 3. INSPECT REAR AIRBAG SENSOR (VEHICLE INVOLVED IN COLLISION AND AIRBAG IS DEPLOYED)

- (a) Replace the airbag sensor rear (See page [RS-28](#)).

## REMOVAL

### HINT:

- Use the same procedures for the RH side and LH side.
- The procedures listed below are for the LH side.
- Installation is in the reverse order of removal.
- The airbag sensor rear LH is mounted in the coupe model only.

### 1. DISCONNECT BATTERY NEGATIVE TERMINAL

#### HINT:

See page [RS-1](#)

### 2. REMOVE FRONT DOOR SCUFF PLATE LH

#### HINT:

See page [IP-6](#)

### 3. REMOVE REAR SEAT CUSHION ASSEMBLY

#### HINT:

See page [SE-40](#) coupe, [SE-46](#) convertible

### 4. REMOVE REAR SEATBACK ASSEMBLY

#### HINT:

See page [SE-40](#) coupe, [SE-46](#) convertible

### 5. REMOVE REAR SEATBACK HINGE SUB-ASSEMBLY LH

#### HINT:

See page [SE-40](#) coupe, [SE-46](#) convertible

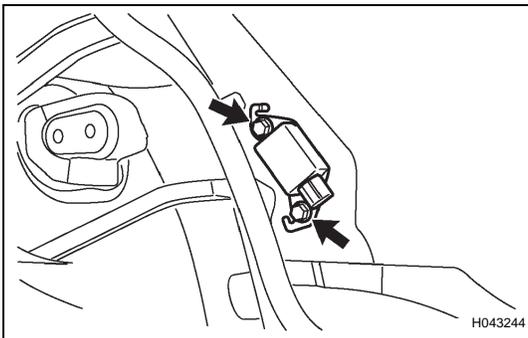
### 6. REMOVE QUARTER TRIM PANEL ASSEMBLY FRONT LH

#### HINT:

See page [SE-40](#) coupe, [SE-46](#) convertible

### 7. REMOVE REAR AIRBAG SENSOR LH

- Disconnect the connector from the rear airbag sensor LH.
- Remove the 2 bolts and the rear airbag sensor LH.



## REMOVAL

HINT:

Installation is in the reverse order of removal.

**1. DISCONNECT BATTERY NEGATIVE TERMINAL**

[RS-1](#)

HINT:

See page

**2. REMOVE FRONT LH SEAT ASSEMBLY**

HINT:

See page [SE-18](#) Power Seat, [SE-30](#) Manual Seat

**3. REMOVE SLIDE & VERTICAL POWER SEAT SWITCH KNOB (for Power Seat)**

HINT:

See page [SE-30](#)

**4. REMOVE RECLINING POWER SEAT SWITCH KNOB (for Power Seat)**

HINT:

See page [SE-31](#)

**5. REMOVE RECLINING ADJUSTER RELEASE HANDLE LH (for Power Seat)**

HINT:

See page [SE-19](#)

**6. REMOVE FRONT SEAT CUSHION SHIELD INNER NO.1 LH (for Power Seat)**

HINT:

See page [SE-31](#)

**7. REMOVE FRONT SEAT CUSHION SHIELD LH (for Power Seat)**

HINT:

See page [SE-31](#)

**8. REMOVE RECLINING ADJUSTER RELEASE HANDLE LH (for Manual Seat)**

HINT:

See page [SE-19](#)

**9. REMOVE VERTICAL SEAT ADJUSTER KNOB (for Manual Seat)**

HINT:

See page [SE-18](#)

**10. REMOVE VERTICAL SEAT ADJUSTER KNOB CAP (for Manual Seat)**

HINT:

See page [SE-18](#)

**11. REMOVE VERTICAL ADJUSTING HANDLE NO.2 (for Manual Seat)**

HINT:

See page [SE-19](#)

**12. REMOVE FRONT SEAT CUSHION SHIELD LH (for Manual Seat)**

SE-19

HINT:

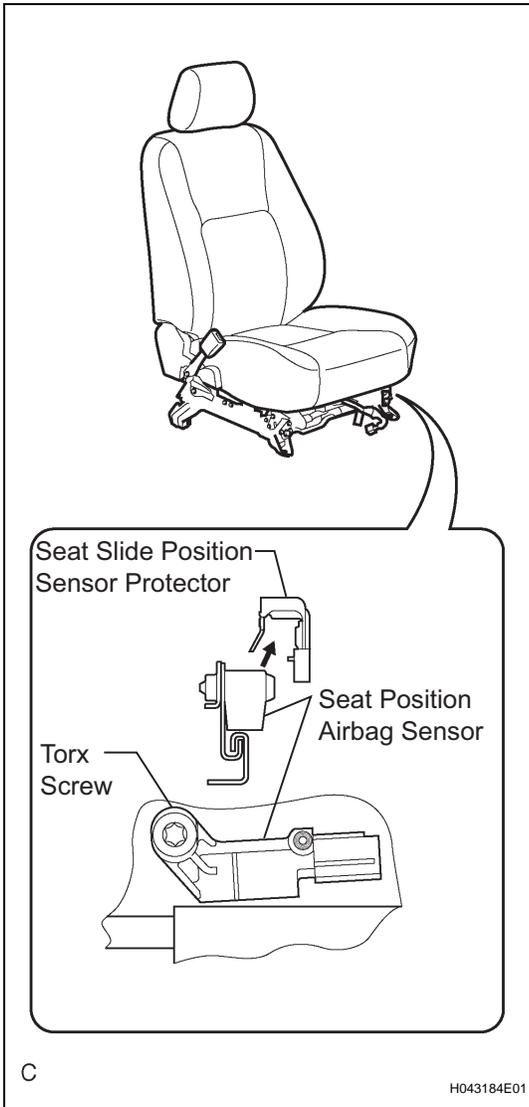
(See page ).

**13. REMOVE SEAT SLIDE POSITION SENSOR PROTECTOR**

- (a) Remove the seat slide position sensor protector from the seat position airbag sensor.

**14. REMOVE SEAT POSITION AIRBAG SENSOR**

- (a) Disconnect the connector from the seat position airbag sensor.
- (b) Using a torx socket wrench (T30), remove the torx screw and the seat position airbag sensor.



## INSTALLATION

### 1. INSTALL SEAT POSITION AIRBAG SENSOR

- Check that the ignition switch is off.
- Check that the battery negative (-) terminal is disconnected.

**CAUTION:**

**After removing the terminal, wait for at least 90 seconds before starting the operation.**

- Using a feeler gauge 1 mm (0.039 in.), install the seat position airbag sensor.

**NOTICE:**

- If the seat position airbag sensor has been dropped, or there are any cracks, dents or other defects in the case, bracket or connector, replace the seat position airbag sensor with a new one.
- When installing the seat position airbag sensor, be careful that the SRS wiring does not interfere with other parts and is not pinched between other parts.

**HINT:**

Be sure to maintain a clearance between the seat position airbag sensor and the seat rail is within 0.6 mm (0.023 in.) to 2 mm (0.079 in.).

- Using a torx socket wrench, tighten the torx screw to install the seat position airbag sensor.

**Torque: 8.0 N\*m (82 kgf\*cm, 71 in.\*lbf)**

- Make sure that a clearance between the seat position airbag sensor and the seat rail is within 0.6 mm (0.023 in.) to 2 mm (0.079 in.).
- Connect the connector to the seat position airbag sensor.
- Check that there is no looseness in the installation parts of the seat position airbag sensor.

### 2. INSTALL FRONT LH SEAT ASSEMBLY

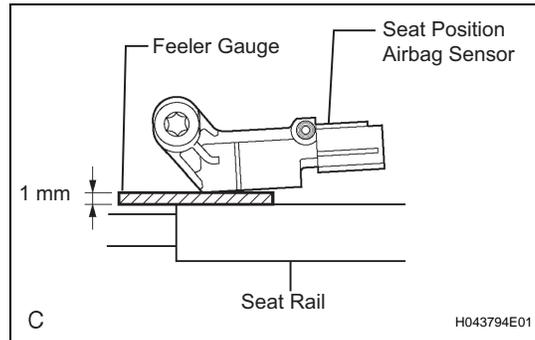
**HINT:**

See page [SE-30](#) Power Seat, [SE-18](#) Manual Seat

### 3. CONNECT BATTERY NEGATIVE TERMINAL

**NOTICE:**

**When disconnecting the negative (-) battery terminal, initialize the following systems after the terminal is reconnected.**



RS

System Name	See Procedure
Power Window Control System	<a href="#">IN-24</a>
Sliding Roof System	

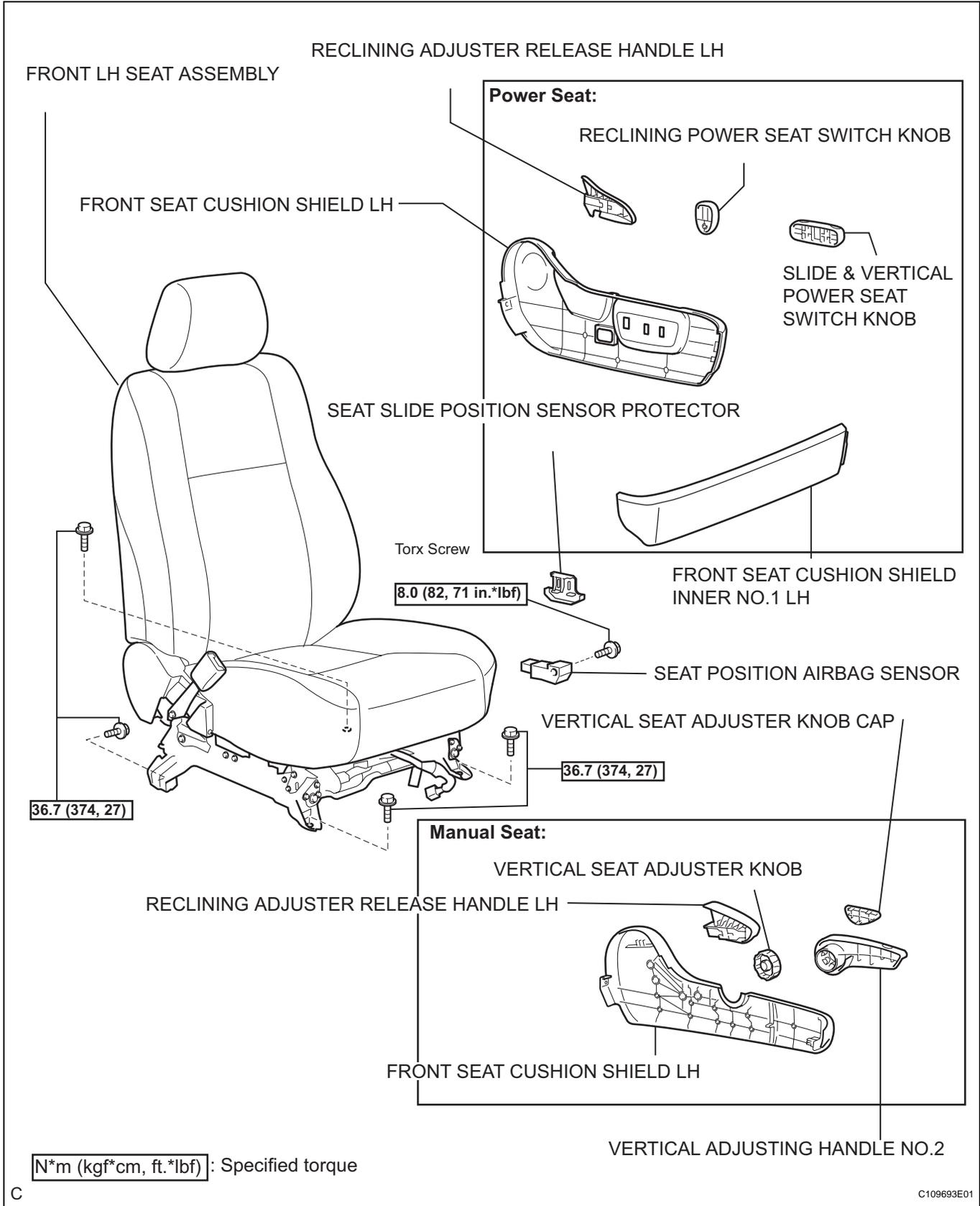
### 4. INSPECT SRS WARNING LIGHT

**HINT:**

See page [RS-28](#)

# SEAT POSITION SENSOR

## COMPONENTS



RS

## ON-VEHICLE INSPECTION

### CAUTION:

Be sure to perform the initialization of the occupant classification ECU if any of the following conditions occur. If the initialization is not performed, the SRS may not operate properly.

- The occupant classification ECU is replaced.
- Accessories (seatback tray or seat cover, etc.) are installed to the vehicle.
- The passenger seat is removed from the vehicle.
- Both the SRS warning light and passenger airbag ON/OFF indicator light ("OFF") come on.
- The vehicle is brought to the workshop for repair due to an accident or collision.

### 1. INSPECT SEAT POSITION AIRBAG SENSOR (VEHICLE NOT INVOLVED IN COLLISION)

- (a) Perform a diagnostic system check (See page [RS-36](#)).

### 2. INSPECT SEAT POSITION AIRBAG SENSOR (VEHICLE INVOLVED IN COLLISION)

- (a) Perform a diagnostic system check (See page [RS-36](#)).
- (b) Even if the airbag was not deployed, perform a visual check for damage to the seat position airbag sensor including the following:
  - Cracks, dents or chips in the case.
  - Cracks or other damage to the connector.

## REMOVAL

### 1. DISCONNECT BATTERY NEGATIVE TERMINAL

HINT:

See page [RS-1](#)

### 2. REMOVE FRONT RH SEAT ASSEMBLY

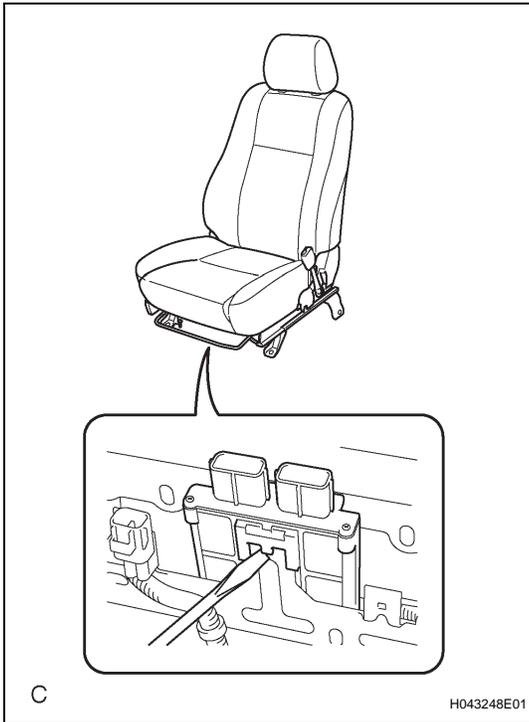
HINT:

See page [SE-18](#) power seat, [SE-30](#) manual seat

### 3. REMOVE OCCUPANT CLASSIFICATION ECU

(a) Disconnect the connectors from the occupant classification ECU.

(b) Using a screwdriver, remove the occupant classification ECU.



## INSTALLATION

### 1. INSTALL OCCUPANT CLASSIFICATION ECU

- (a) Check that the ignition switch is off.
- (b) Check that the battery negative (-) terminal is disconnected.

**CAUTION:**

**After removing the terminal, wait for at least 90 seconds before starting the operation.**

- (c) Install the occupant classification ECU.
- (d) Connect the connectors to the occupant classification ECU.

**NOTICE:**

- If the occupant classification ECU has been dropped, or there are cracks, dents or other defects in the case, bracket or connector, replace it with a new one.
- When installing the occupant classification ECU, be careful that the SRS wiring does not interfere with other parts and that it is not pinched between other parts.

### 2. INSTALL FRONT RH SEAT ASSEMBLY

**HINT:**

See page [SE-18](#) power seat, [SE-30](#) manual seat.

### 3. CONNECT BATTERY NEGATIVE TERMINAL

**NOTICE:**

**When disconnecting the negative (-) battery terminal, initialize the following systems after the terminal is reconnected.**

System Name	See Procedure
Power Window Control System	<a href="#">IN-24</a>
Sliding Roof System	

### 4. OCCUPANT CLASSIFICATION ECU INITIALIZATION

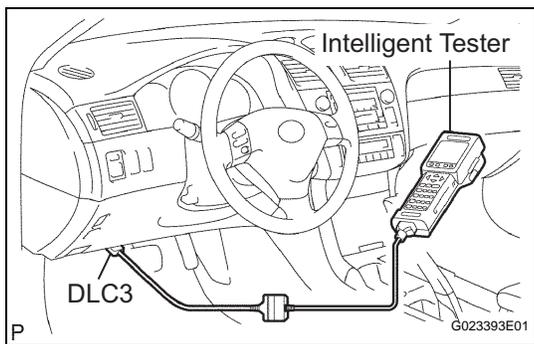
**CAUTION:**

**In the case of removing the front seat assembly, perform the zero point calibration and sensitivity check of the occupant classification ECU after the front seat assembly is installed.**

**HINT:**

Perform the zero point calibration or sensitivity check if any of the following conditions occur:

- The occupant classification ECU is replaced.
- Accessories (seatback tray or seat cover, etc.) are installed.
- The passenger seat is removed from the vehicle.
- Both the SRS warning light and passenger occupant classification indicator ("OFF") come on.
- The vehicle is brought to the workshop for repair due to an accident or collision.



- (a) Zero point calibration procedure.
  - (1) Adjust the seat position according to the conditions below.

Adjustment Component	Position
Slide Direction	Rearmost position
Reclining Angle	Upright position
Headrest Height	Lowest position

- (2) Connect the intelligent tester to the DLC3.
    - (3) Turn the ignition switch to the ON position.
    - (4) Perform the zero point calibration by following the prompts on the tester screen.

**HINT:**

Refer to the intelligent tester operator's manual for further details.

- (b) Sensitivity check procedure.
  - (1) Connect the intelligent tester to the DLC3.
  - (2) Apply a 30 kg (66.14 lb) weight (eg. a 30 kg (66.14 lb) of lead mass) onto the passenger seat.
  - (3) Turn the ignition switch to the ON position.
  - (4) Using the intelligent tester, perform the sensitivity check, and confirm that the sensitivity is within the standard value.

**Standard value:**

**27 to 33 kg (59.52 to 72.75 lb)**

**HINT:**

- When proceeding the sensitivity check, use a solid weight made from metal (the check result may not appear properly if the weight made from liquid is used).
- When the sensitivity deviates from the standard value, retighten the bolts of the passenger seat taking care not to deform the seat rail. After performing this procedure, if the sensitivity does not stay within the standard value, replace the front RH seat assembly.

**NOTICE:**

**Do not place any objects on the seat (perform the initialization by attaching a mass heavier than 2 kg (4.41 lb) in the seatback pocket, seatback table installed by the use, etc.).**

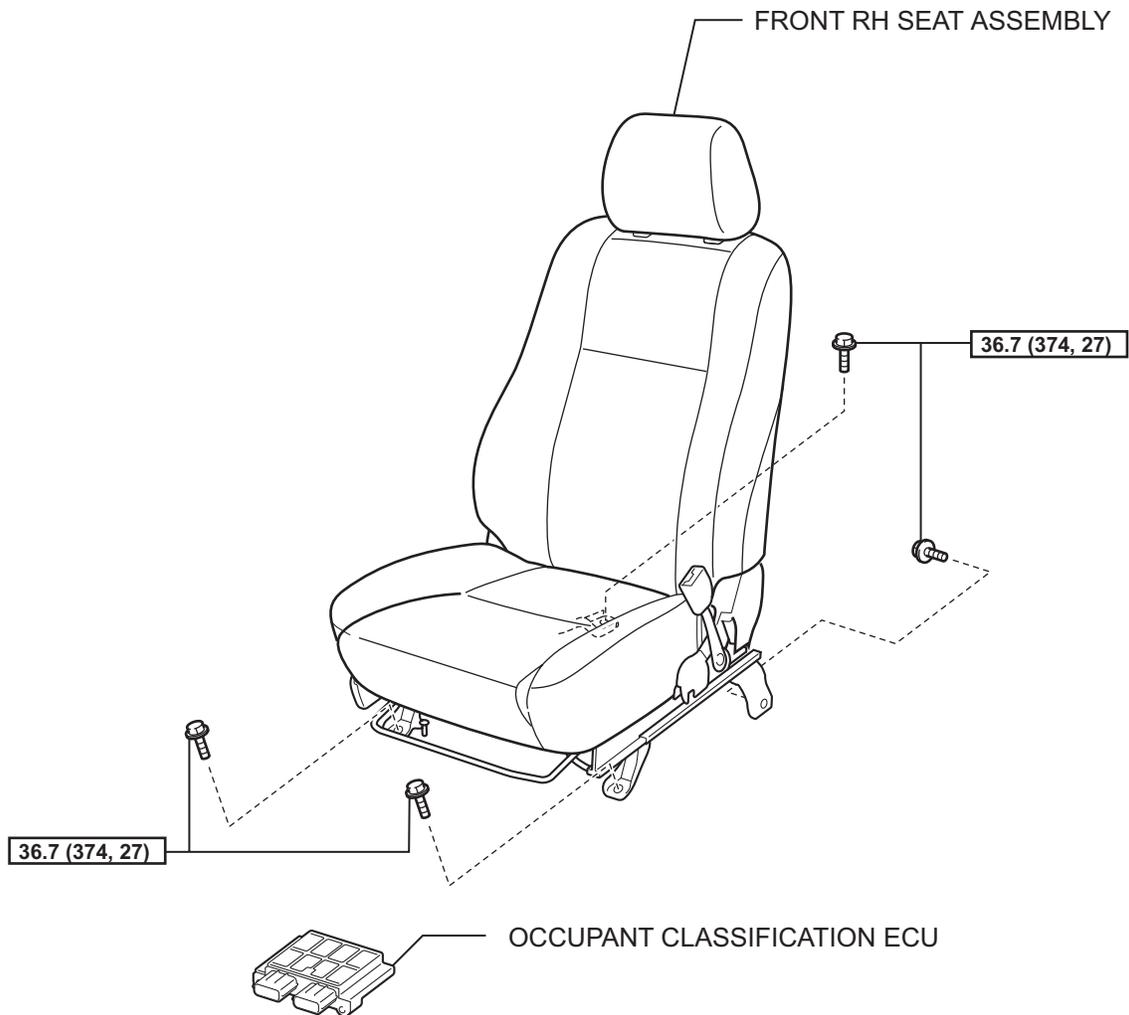
**5. INSPECT SRS WARNING LIGHT**

**HINT:**

See page [RS-28](#)

# OCCUPANT CLASSIFICATION ECU

## COMPONENTS



RS

$\boxed{\text{N*m (kgf*cm, ft.*lbf)}}$  : Specified torque

C

## ON-VEHICLE INSPECTION

### CAUTION:

Be sure to perform the initialization of the occupant classification ECU if any of the following conditions occur. If the initialization is not performed, the SRS may not operate properly.

- The occupant classification ECU is replaced.
- Accessories (seatback tray or seat cover, etc.) are installed to the vehicle.
- The passenger seat is removed from the vehicle.
- Both the SRS warning light and passenger airbag ON/OFF indicator light ("OFF") come on.
- The vehicle is brought to the workshop for repair due to an accident or collision.

### 1. INSPECT OCCUPANT CLASSIFICATION ECU (VEHICLE NOT INVOLVED IN COLLISION)

- (a) Perform a diagnostic system check (See page [RS-36](#)).

### 2. INSPECT OCCUPANT CLASSIFICATION ECU (VEHICLE INVOLVED IN COLLISION)

- (a) Perform a diagnostic system check (See page [RS-36](#)).
- (b) Even if the airbag was not deployed, perform a visual check for damage to the occupant classification ECU including the following:
  - Cracks, dents or chips in the case.
  - Cracks or other damage to the connector.