DIAGNOSTIC TROUBLE CODE CHART

HINT:
When DTC B1650/32 is detected as a result of troubleshooting the Supplemental Restraint System, perform troubleshooting for the occupant classification system by referring to the table below.

DTC No.	Detection Item	Trouble Area	Passenger Airbag ON/OFF Indicator (OFF Indicator)	See page
B1771	Passenger Side Buckle Switch Circuit Malfunction	1. No. 1 seat wire 2. Front seat inner belt assembly RH (Buckle switch RH) 3. Occupant classification ECU	ON	RS-490
B1772	Seat Position Sensor Circuit Malfunction	1. No. 1 seat wire 2. Seat position sensor 3. Occupant classification ECU	ON	RS-497
B1773	Belt Tension Sensor Circuit Malfunction	1. No. 1 seat wire 2. Front seat outer belt RH (Belt tension sensor) 3. Occupant classification ECU	ON	RS-504
B1774	Pressure Sensor Circuit Malfunction	1. No. 1 seat wire 2. Occupant classification sensor (Front seat cushion assembly) 3. Occupant classification ECU	ON	RS-510
B1775	Pressure Sensor Power Source Circuit Malfunction	1. No. 1 seat wire 2. Occupant classification sensor (Front seat cushion assembly) 3. Occupant classification ECU	ON	RS-510
B1776	Seat Belt Tension Sensor Power Source Circuit Malfunction	1. No. 1 seat wire 2. Front seat outer belt RH (Belt tension sensor) 3. Occupant classification ECU	ON	RS-504
B1790	Center Airbag Sensor Assembly Communication Circuit Malfunction	1. No. 1 seat wire 2. Floor wire 3. Occupant classification ECU 4. Center airbag sensor assembly	ON	RS-517
B1791	Collision Detection Signal Line Malfunction	1. No. 1 seat wire 2. Floor wire 3. Instrument panel wire 4. Occupant classification ECU 5. Center airbag sensor assembly	ON	RS-527
B1795	Occupant Classification ECU Malfunction	1. Occupant classification ECU	ON	RS-539
B1797	Calibration Malfunction	1. There is no malfunction if this DTC does not recur after occupant classification system zero point calibration is performed. 2. Occupant classification sensor (Front seat cushion assembly)	ON	RS-541

DTC	B1771	Passenger Side Buckle Switch Circuit Malfunction

DESCRIPTION

The passenger side buckle switch circuit consists of the occupant classification ECU and the front seat inner belt assembly RH.

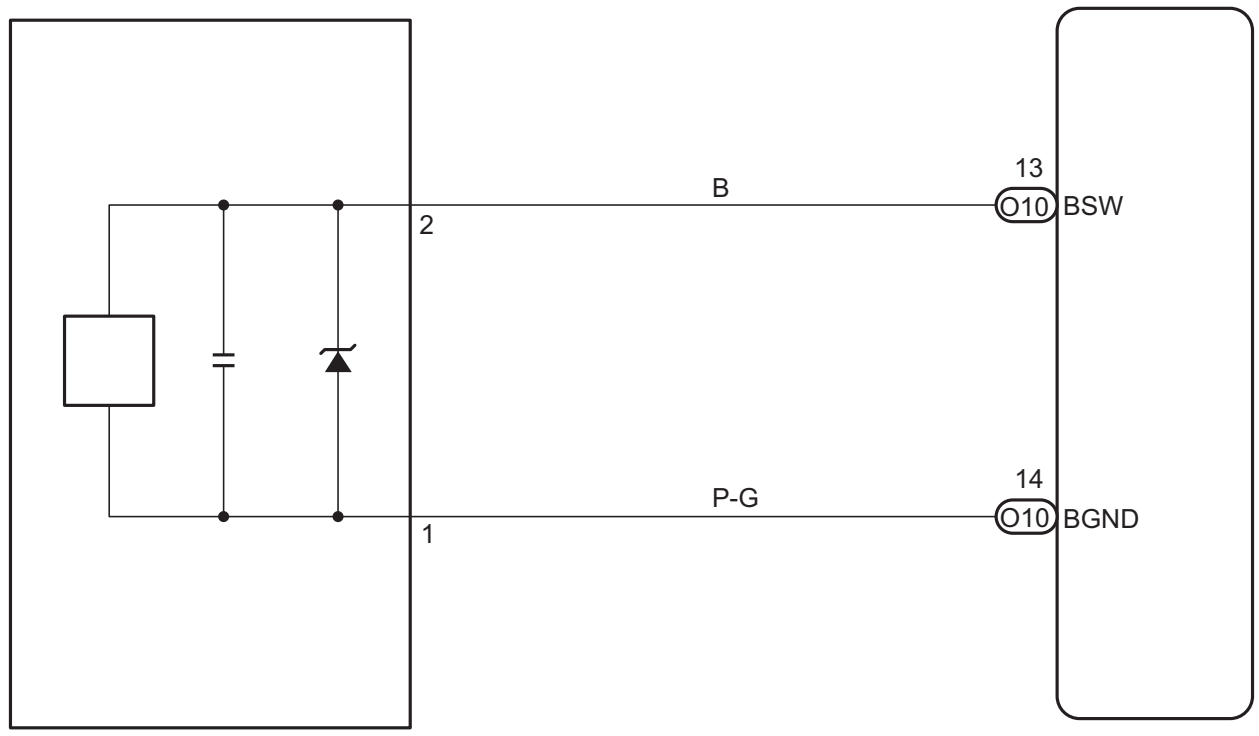
DTC B1771 is recorded when a malfunction is detected in the passenger side buckle switch circuit.

DTC No.	DTC Detecting Condition	Trouble Area
B1771	• Occupant classification ECU detects line short circuit signal, open circuit signal, short circuit to ground signal or short circuit to B+ signal in passenger side buckle switch circuit for 2 seconds • Passenger side buckle switch malfunction • Occupant classification ECU malfunction	• No. 1 seat wire • Front seat inner belt assembly RH (Buckle switch RH) • Occupant classification ECU

HINT:

- When DTC B1650/32 is detected as a result of troubleshooting the supplemental restraint system, check the DTCs stored in the occupant classification ECU, and perform troubleshooting for those DTCs first.
- Use the intelligent tester to check for DTCs of the occupant classification ECU, otherwise the DTC cannot be read.

WIRING DIAGRAM



HINT:

- If troubleshooting (wire harness inspection) is difficult to perform, remove the front passenger seat installation bolts to see the under surface of the seat cushion.
- In the above case, hold the seat so that it does not tip over. Holding the seat up for a long period of time may cause problems, such as seat rail deformation. Hold the seat up only for as long as necessary.

RS

1	**CHECK DTC**

(a) Turn the ignition switch to the ON position.
(b) Clear the DTCs stored in the memory (See page RS-487).
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-487).

OK:

DTC B1771 is not output.

HINT:

DTCs other than B1771 may be output at this time, but they are not related to this check.

OK	**USE SIMULATION METHOD TO CHECK**

NG

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 occupant classification ECU and the front seat inner belt assembly RH.

OK:

The connectors are properly connected.

(d) Disconnect the connectors from the occupant classification ECU and front seat inner belt assembly RH.

(e) Check that the terminals of connectors are not damaged.

OK:

The terminals are not deformed or damaged.

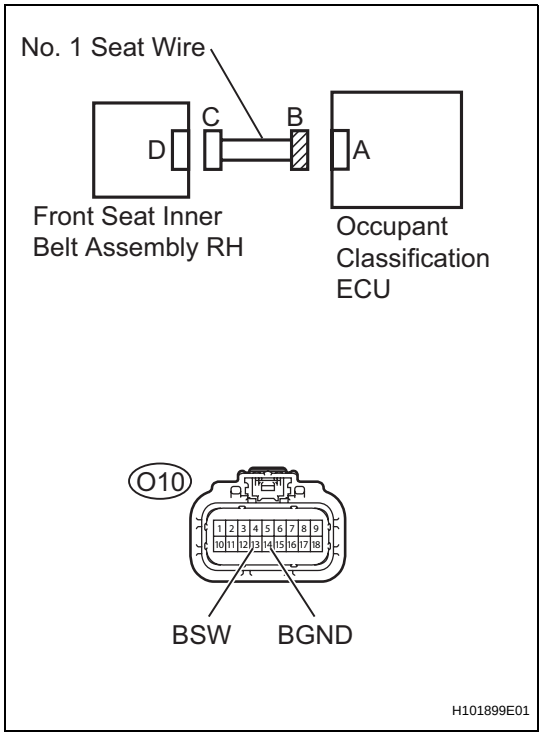
HINT:

If the connectors are not connected securely, reconnect the connectors and proceed to the next inspection.

NG	**REPAIR OR REPLACE WIRE HARNESS OR CONNECTORS**

OK

3	CHECK NO. 1 SEAT WIRE (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.

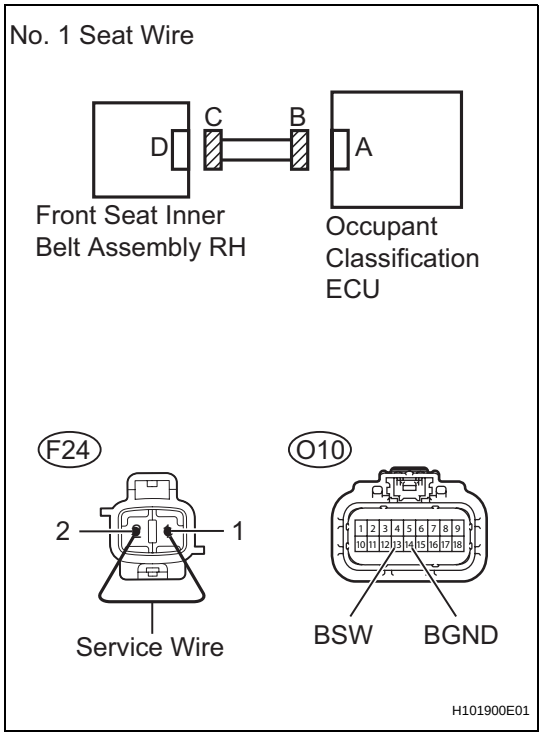
Standard voltage

Tester connection	Condition	Specified condition
O10-13 (BSW) - Body ground	Ignition switch ON	Below 1 V
O10-14 (BGND) - Body ground	Ignition switch ON	Below 1 V

NG → **REPAIR OR REPLACE NO. 1 SEAT WIRE**

OK

4	CHECK NO. 1 SEAT WIRE (FOR 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 F24-1 and F24-2 of connector C.

NOTICE:
Do not forcibly insert the service wire into the terminals of the connector when connecting.

(d) Measure the resistance.

Standard resistance

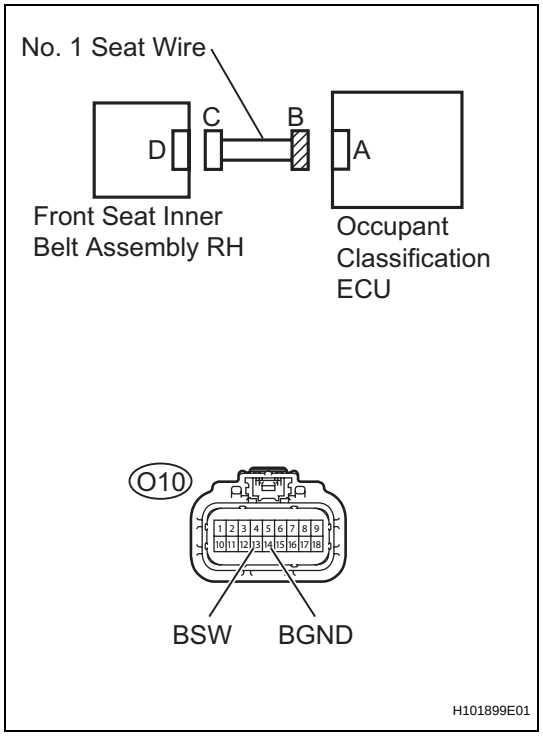
Tester connection	Condition	Specified condition
O10-13 (BSW) - O10-14 (BGND)	Always	Below 1 Ω

NG → **REPAIR OR REPLACE NO. 1 SEAT WIRE**

OK

RS

5 CHECK NO. 1 SEAT WIRE (TO GROUND)



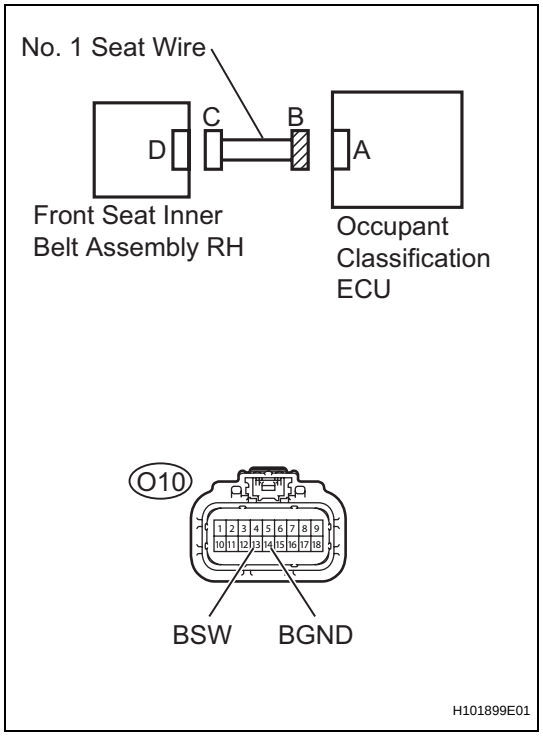
(a) Disconnect the service wire from connector C.
(b) Measure the resistance.
Standard resistance

Tester connection	Condition	Specified condition
O10-13 (BSW) - Body ground	Always	1 MΩ or higher
O10-14 (BGND) - Body ground	Always	1 MΩ or higher

NG → **REPAIR OR REPLACE NO. 1 SEAT WIRE**

OK

6 CHECK NO. 1 SEAT WIRE (FOR SHORT)



(a) Measure the resistance.
Standard resistance

Tester connection	Condition	Specified condition
O10-13 (BSW) - O10-14 (BGND)	Always	1 MΩ or higher

NG → **REPAIR OR REPLACE NO. 1 SEAT WIRE**

OK

RS

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 the memory (See page RS-487).
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-487).
OK:
DTC B1771 is not output.
HINT:
DTCs other than B1771 may be output at this time, but they are not related to this check.

OK	USE SIMULATION METHOD TO CHECK

NG

8	REPLACE BUCKLE SWITCH RH (WITH FRONT SEAT INNER BELT ASSEMBLY RH)

(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 front seat inner belt assembly RH (See page SB-12).
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 the memory (See page RS-487).
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-487).
OK:
DTC B1771 is not output.
HINT:
DTCs other than B1771 may be output at this time, but they are not related to this check.

OK	END

NG

9	REPLACE OCCUPANT CLASSIFICATION ECU

(a) Connect the intelligent tester to the DLC3.
(b) Turn the ignition switch to the ON position.
(c) Store the occupant classification ECU data into the intelligent tester (See page RS-476).
HINT:
If the ECU data cannot be stored in the intelligent tester, replace the front seat cushion assembly (with occupant classification ECU and occupant classification sensor).
(d) Turn the ignition switch to the LOCK position.
(e) Disconnect the negative (-) terminal cable from the battery, and wait for at least 90 seconds.
(f) Replace the occupant classification ECU (See page RS-634).
(g) Connect the negative (-) terminal cable to the battery.
(h) Turn the ignition switch to the ON position.
(i) Load the data from the previous ECU stored in the tester, into the newly installed ECU (See page RS-476).
(j) Turn the ignition switch to the LOCK position.
(k) Turn the ignition switch to the ON position.
(l) Clear the DTCs stored in the memory (See page RS-487).
HINT:
If DTC is not cleared at this time, past DTC will remain.

NEXT

10	PERFORM SENSITIVITY CHECK

(a) Perform the sensitivity check (See page RS-480).

NEXT

END

RS