# **RESTRAINT SYSTEM**

SECTION RS

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## Precautions

### SUPPLEMENTAL RESTRAINT SYSTEM (SRS) "AIR BAG" AND "SEAT BELT PRE-TENSIONER"

The Supplemental Restraint System such as "AIR BAG" and "SEAT BELT PRE-TENSIONER" used along with GI a seat belt, helps to reduce the risk or severity of injury to the driver and front passenger for certain types of collision. This system includes seat belt switch inputs and dual stage front air bag modules. The SRS system uses the seat belt switches to determine the front air bag deployment, and may only deploy one front air bag, MA depending on the severity of a collision and whether the front occupants are belted or unbelted. The SRS composition which is available to INFINITI 135 is as follows:

For a frontal collision •

The Supplemental Restraint System consists of driver air bag module (located in the center of the steering wheel), front passenger air bag module (located on the instrument panel on passenger side), seat belt LC pre-tensioners, a diagnosis sensor unit, crash zone sensor, warning lamp, wiring harness and spiral cable.

For a side collision

The Supplemental Restraint System consists of front side air bag module (located in the outer side of front seat), satellite sensor, diagnosis sensor unit (one of components of air bags for a frontal collision), wiring harness, warning lamp (one of components of air bags for a frontal collision).

#### WARNING:

- To avoid rendering the SRS inoperative, which could increase the risk of personal injury or death in the event of a collision which would result in air bag inflation, all maintenance should be performed by an authorized INFINITI dealer.
- Improper maintenance, including incorrect removal and installation of the SRS, can lead to personal injury caused by unintentional activation of the system.
- AX Do not use electrical test equipment on any circuit related to the SRS unless instructed to in this • Service Manual. SRS wiring harnesses can be identified by yellow and/or orange harness connector.

#### PRECAUTION FOR SEAT BELT SERVICE

#### CAUTION:

- Before removing the seat belt pre-tensioner assembly, turn the ignition switch off, disconnect both battery cables and wait at least 3 minutes.
- Do not use electrical test equipment for seat belt pre-tensioner connector.
- After replacing or reinstalling seat belt pre-tensioner assembly, or reconnecting seat belt pre-tensioner connector, check the system function. RS

Refer to "SRS Operation Check" for details. (RS-42)

- Do not use disassemble buckle or seat belt assembly.
- Replace anchor bolts if they are deformed or worn out.
- Never oil tongue and buckle.
- If any component of seat belt assembly is questionable, do not repair. Replace the whole seat belt . assembly. HA
- If webbing is cut, frayed, or damaged, replace seat belt assembly.
- When replacing seat belt assembly, use a genuine seat belt assembly.

#### After A Collision

#### WARNING:

Inspect all seat belt assemblies including retractors and attaching hardware after any collision. NISSAN recommends that all seat belt assemblies in use during a collision be replaced unless the collision was minor and the belts show no damage and continue to operate properly. Failure to do so could result in serious personal injury in an accident. Seat belt assemblies not in use during a collision should also be replaced if either damage or improper operation is noted. Seat belt pre-tensioner should be replaced even if the seat belts are not in use during a frontal collision in which the air bags are deployed.

Replace any seat belt assembly (including anchor bolts) if:

- The seat belt was in use at the time of a collision (except for minor collisions and the belts, retractors and buckles show no damage and continue to operate properly).
- The seat belt was damaged in an accident. (i.e. torn webbing, bent retractor or guide, etc.)

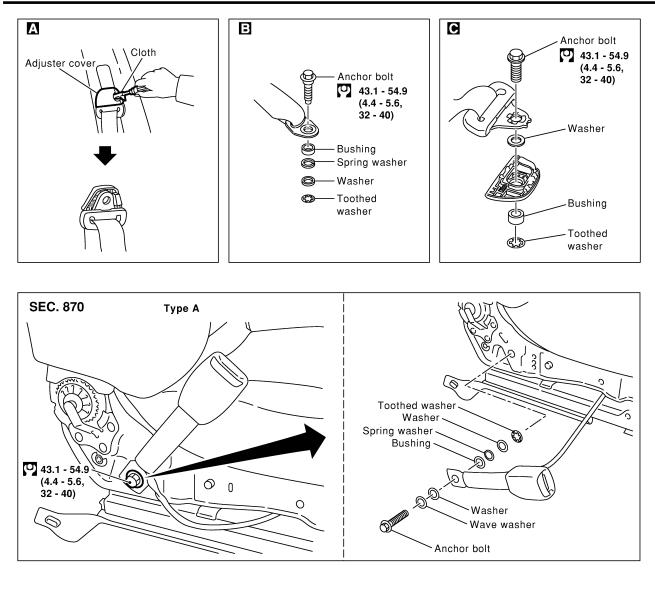
Precautions (Cont'd)

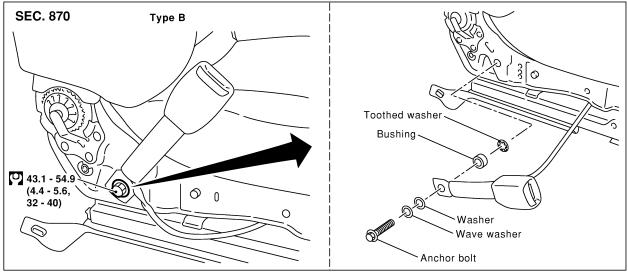
- The seat belt attaching point was damaged in an accident. Inspect the seat belt attaching area for damage or distortion and repair as necessary before installing a new seat belt assembly.
- Anchor bolts are deformed or worn out.
- The seat belt pre-tensioner should be replaced even if the seat belts are not in use during the collision in which the air bags are deployed.

# Front Seat Belt

RE	EMOVAL AND INSTALLATION	
1.	Slide the seat all the way forward and tilt the seatback toward the front.	03
2.	Remove adjuster cover.	GI
3.	Slide floor anchor cover.	
4.	Remove floor anchor bolt.	MA
5.	Remove shoulder anchor bolt.	
6.	Remove front and rear kicking plate, then remove center pillar upper and lower garnish. Refer to BT-33 "SIDE AND FLOOR TRIM" for details.	3, EM
7.		
8.	Remove the screw securing seat belt pre-tensioner retractor, then remove seat belt and seat belt pre-ter sioner retractor.	ו- LC
9.	Remove bolts securing seat belt adjuster, then remove seat belt adjuster.	
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	<b>9</b> 43.1 - 54.9 (4.4 - 5.6, 32 - 40)	FE
		AT
	<b>43.1 - 54.9</b> (4.4 - 5.6, 32 - 40)	AX
		SU
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• : N•m (kg-m, ft-lb)

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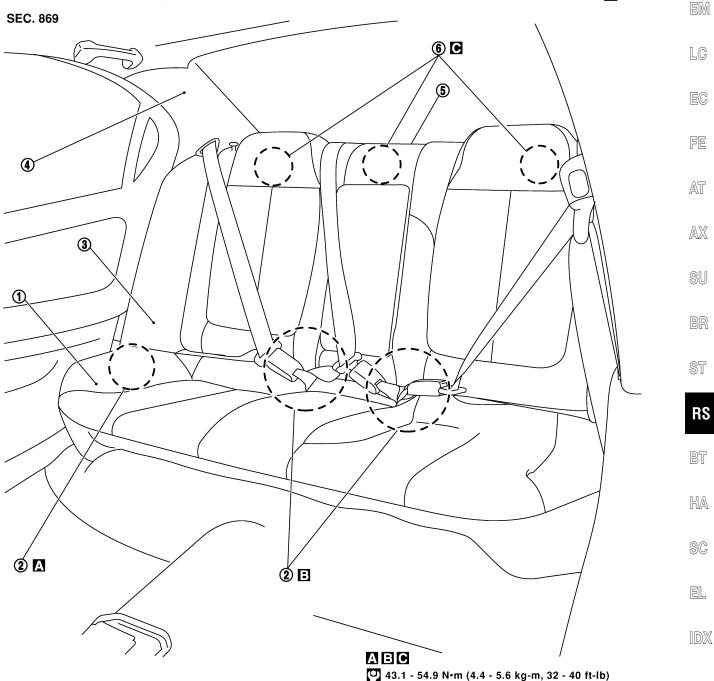
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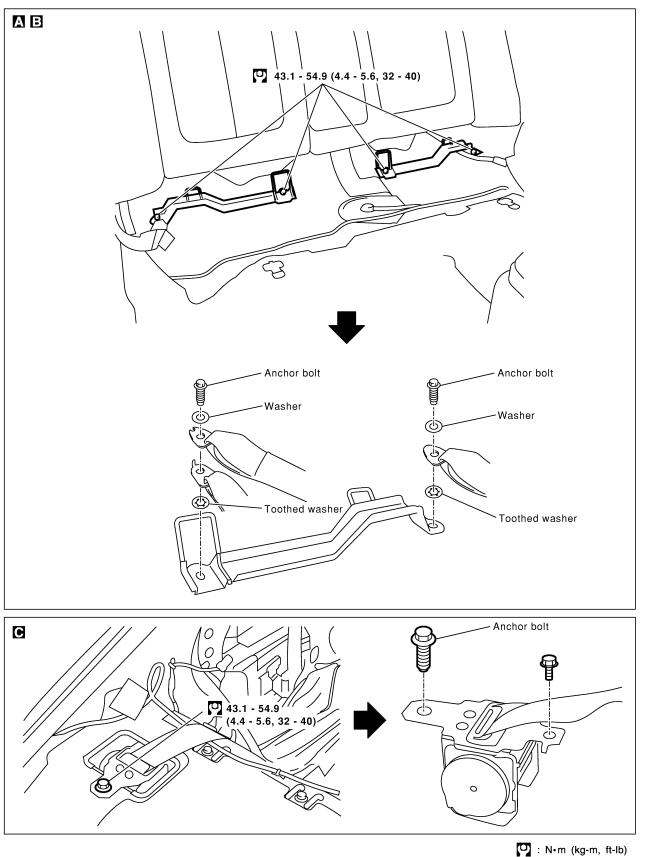
# **Rear Seat Belt**

#### **REMOVAL AND INSTALLATION**

- 1. Remove rear seat. Refer to BT-50, "REAR SEAT" for details.
- 2. Remove outer and floor anchor bolt. A B
- 3. Remove rear seatback. Refer to "REAR SEAT" for details.
- 4. Remove rear side garnish. Refer to BT-33, "SIDE AND FLOOR TRIM" for details.
- 5. Remove rear parcel shelf finisher. Refer to BT-33, "SIDE AND FLOOR TRIM" for details.
- 6. Remove bolts securing rear seat belt retractor, then remove seat belt and seat belt retractor.



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## Seat Belt Inspection

## AFTER A COLLISION

#### WARNING:

Inspect all seat belt assemblies including retractors and attaching hardware after any collision. NISSAN recommends that all seat belt assemblies in use during a collision be replaced unless the collision was minor and the belts show no damage and continue to operate properly. Failure to do so could result in serious personal injury in an accident. Seat belt assemblies not in use during a collision should also be replaced if either damage or improper operation is noted. Seat belt pre-tensioner should be replaced even if the seat belts are not in use during a frontal collision in which the air bags are deployed.

Replace any seat belt assembly (including anchor bolts) if:

- The seat belt was in use at the time of a collision (except for minor collisions and the belts, retractors and • LC buckles show no damage and continue to operate properly).
- The seat belt was damaged in an accident. (i.e. torn webbing, bent retractor or guide, etc.)
- The seat belt attaching point was damaged in an accident. Inspect the seat belt attaching area for damage or distortion and repair as necessary before installing a new seat belt assembly.
- Anchor bolts are deformed or worn out.
- The seat belt pre-tensioner should be replaced even if the seat belts are not in use during the collision in which the air bags are deployed.

#### PRELIMINARY CHECKS

- Check the seat belt warning lamp/chime for proper operation as follows:
- a. Switch ignition ON. The seat belt warning lamp should illuminate. Also, the seat belt warning chime should AX sound for about seven seconds.
- b. Fasten driver's seat belt. The seat belt warning lamp should go out and the chime (if sounding) should stop. SU
- If the air bag warning lamp is blinking, conduct self-diagnosis using CONSULT-II, and air bag warning lamp. 2. Refer to "SRS Operation Check", RS-42.
- Check that the seat belt retractor, seat belt anchor and buckle bolts are securely attached.
- 4. Check the shoulder seat belt guide and shoulder belt height adjuster for front seats. Ensure guide swivels freely and that belt lays flat and does not bind in guide. Ensure height adjuster operates properly and ST holds securely.
- 5. Check retractor operation:
- a. Fully extend the seat belt webbing and check for twists, tears or other damage.
- RS Allow the seat belt to retract. Ensure that belt returns smoothly and completely into the retractor. If the seat b. belt does not returns smoothly, wipe the inside of the loops with a clean paper cloth etc. because dirt built up in the loops of the upper anchors can cause the seat belts to retractor slowly.
- Fasten the seat belt. Check the seat belt returns smoothly and completely to the retractor. If the belt does C. not return smoothly, the cause may be an accumulation of dust or dirt. Use the "SEAT BELT TAPE SET" HA and perform the following steps. Inspect the front seat belt though-anchor
- Pull the seat belt out to a length of 500 mm (19.69 in) over more. i.
- Use a clip or other device to the fix the seat belt at the center pillar belt opening. ii.
- Pass a thin wire though the though-anchor belt opening. Hold both ends of the wire and pull taut while iii. moving it up and down several times along the belt opening surface to move matter stuck there. EL
- iv. Any dirt that can not be removed with the wire can be removed by cleaning the opening with a clean cloth.
- Apply tape at the point where the belt contacts the though-anchor belt opening. V.

#### NOTE:

Apply the tape so that there is no looseness or wrinkling.

- vi. Remove the clip fixing the seat belt and check that the belt returns smoothly.
- Repeat steps above as necessary to check the other seat belts.

#### SEAT BELT RETRACTOR ON-VEHICLE CHECK

# Emergency Locking Retractors (ELR) and Automatic Locking Retractors (ALR) NOTE:

All seat belt retractors are of the Emergency Locking Retractors (ELR) type. In an emergency (sudden stop) the retractor will lock and prevent the belt from extending any further. All 3-point type seat belt retractors except the driver's seat belt also have an Automatic Locking Retractors (ALR) mode. The ALR mode (also called child restraint mode) is used when installing child seats. The ALR mode is activated when the seat belt is fully extended. When the belt is then retracted partially, the ALR mode automatically locks the seat belt in a specific position so the belt cannot be extended any further. To cancel the ALR mode, allow the seat belt to fully wind back into the retractor.

Check the seat belt retractors using the following test(s) to determine if a retractor assembly is operating properly.

## ELR Function Stationary Check

Grasp the shoulder belt and pull forward quickly. The retractor should lock and prevent the belt from extending further.

#### ALR Function Stationary Check

- 1. Pull out entire length of seat belt from retractor until a click is heard.
- 2. Retract the belt partially. A clicking noise should be heard as the belt retracts indicating that the retractor is in the Automatic Locking Retractors (ALR) mode.
- 3. Grasp the seat belt and try to pull out the retractor. The belt must lock and not extend any further. If NG, replace the retractor assembly.
- 4. Allow the entire length of the belt to retract to cancel the automatic locking mode.

## ELR Function Moving Check

#### WARNING:

Perform the following test in a safe, open area clear of other vehicles and obstructions (for example, a large, empty parking lot). Road surface must be paved and dry. DO NOT perform the following test on wet or gravel roads or on public streets and highways. This could result in an accident and serious personal injury. The driver and passenger must be prepared to brace themselves in the event the retractor does not lock.

- 1. Fasten driver's seat belt. Buckle a passenger into the seat for the belt that is to be tested.
- 2. Proceed to the designated safe area.
- 3. Drive the vehicle at approximately 16 km/h (10 MPH). Notify any passengers of a pending sudden stop and the driver and passenger must be prepared to brace themselves in the event the retractor does not lock, apply brakes firmly and make a very hard stop.

During stop, seat belts should lock and not be extended. If the seat belt retractor assembly does not lock, perform the retractor off-vehicle check.

#### SEAT BELT RETRACTOR OFF-VEHICLE CHECK

- 1. Remove the seat belt retractor assembly.
- 2. Slowly pull out belt while tilting the retractor assembly forward from the mounted position without twisting the retractor assembly as shown in the illustration.

15 degrees or less tilt: Belt can be pulled out.

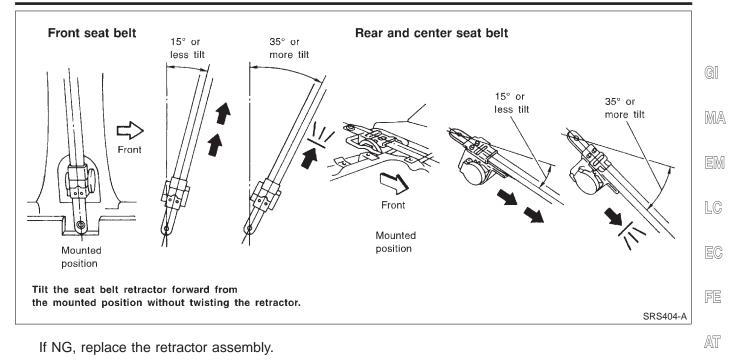
35 degrees or more tilt: Belt locks and cannot be pulled out.

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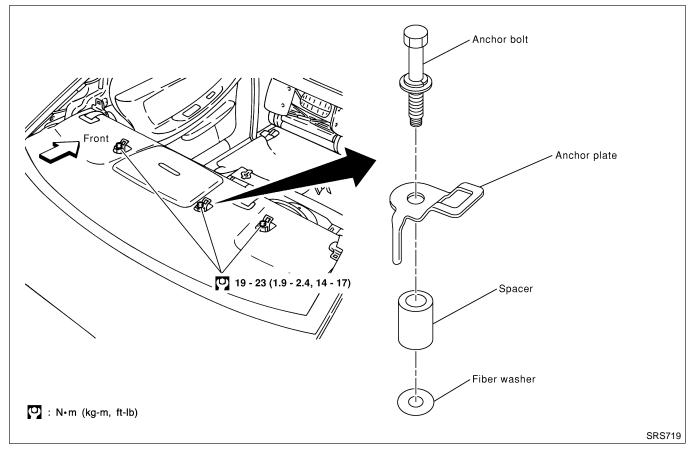
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# **Tether Anchor Plate**

# REMOVAL AND INSTALLATION CAUTION:

Replace anchor bolts if they are deformed or worn out.



1. Remove tether anchor plate cover. Refer to BT-33, "SIDE AND FLOOR TRIM" for details.

2. Remove tether anchor plate.

NOTE:

• To install, reverse the removal procedure sequence.

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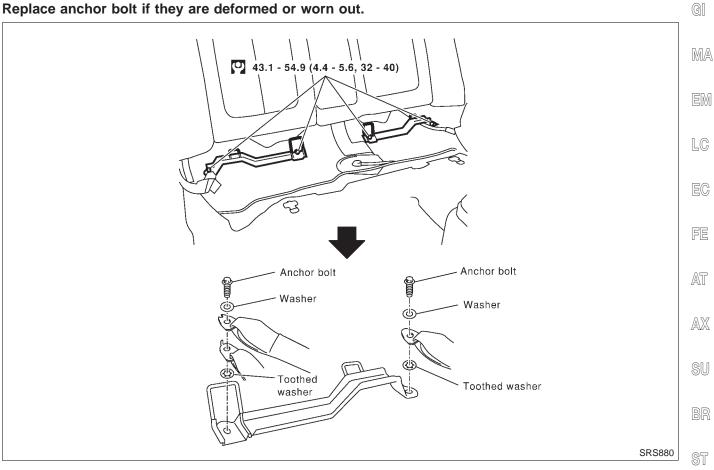
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# Isofix Child Restraint Anchorage

## **REMOVAL AND INSTALLATION**

#### CAUTION:

Replace anchor bolt if they are deformed or worn out.



- Remove rear seat cushion. Refer to BT-50, "REAR SEAT" for details. 1.
- 2. Remove anchor bolts.

#### NOTE:

To install, reverse the removal procedure sequence. •

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## Precautions

# SUPPLEMENTAL RESTRAINT SYSTEM (SRS) "AIR BAG" AND "SEAT BELT PRE-TENSIONER"

The Supplemental Restraint System such as "AIR BAG" and "SEAT BELT PRE-TENSIONER" used along with a seat belt, helps to reduce the risk or severity of injury to the driver and front passenger for certain types of collision. The SRS composition which is available to INFINITI I35 is as follows:

• For a frontal collision

The Supplemental Restraint System consists of driver air bag module (located in the center of the steering wheel), front passenger air bag module (located on the instrument panel on passenger side), seat belt pre-tensioners, a diagnosis sensor unit, crush zone sensor, warning lamp, wiring harness and spiral cable.

#### • For a side collision The Supplemental Restraint System consists of front side air bag module (located in the outer side of front seat), satellite sensor, diagnosis sensor unit (one of components of air bags for a frontal collision), wiring harness, warning lamp (one of components of air bags for a frontal collision).

#### WARNING:

- To avoid rendering the SRS inoperative, which could increase the risk of personal injury or death in the event of a collision which would result in air bag inflation, all maintenance should be performed by an authorized INFINITI dealer.
- Improper maintenance, including incorrect removal and installation of the SRS, can lead to personal injury caused by unintentional activation of the system.
- Do not use electrical test equipment on any circuit related to the SRS unless instructed to in this Service Manual. SRS wiring harnesses can be identified by yellow and/or orange harness connector.

#### PRECAUTIONS FOR SRS "AIR BAG" AND "SEAT BELT PRE-TENSIONER" SERVICE

- Do not use electrical test equipment to check SRS circuits unless instructed to in this Service Manual.
- Before servicing the SRS, turn ignition switch "OFF", disconnect both battery cables and wait at least 3 minutes.

For approximately 3 minutes after the cables are removed, it is still possible for the air bag and seat belt pre-tensioner to deploy. Therefore, do not work on any SRS connectors or wires until at least 3 minutes have passed.

- Diagnosis sensor unit must always be installed with their arrow marks "⇐" pointing towards the front of the vehicle for proper operation. Also check diagnosis sensor unit for cracks, deformities or rust before installation and replace as required.
- The spiral cable must be aligned with the neutral position since its rotations are limited. Do not attempt to turn steering wheel or column after removal of steering gear.
- Handle air bag module carefully. Always place driver and passenger air bag modules with the pad side facing upward and place side air bag module standing with stud bolt side setting bottom.

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- Conduct self-diagnosis to check entire SRS for proper function after replacing any components.
- After air bag inflates, the front instrument panel assembly should be replaced if damaged.

## WIRING DIAGRAMS AND TROUBLE DIAGNOSIS

When you read wiring diagrams, refer to the following:

- GI-11, "HOW TO READ WIRING DIAGRAMS"
- EL-11, "POWER SUPPLY ROUTING" for power distribution circuit

When you perform trouble diagnosis, refer to the following:

- GI-35, "HOW TO FOLLOW TEST GROUPS IN TROUBLE DIAGNOSES"
- GI-24, "HOW TO PERFORM EFFICIENT DIAGNOSIS FOR AN ELECTRICAL INCIDENT"

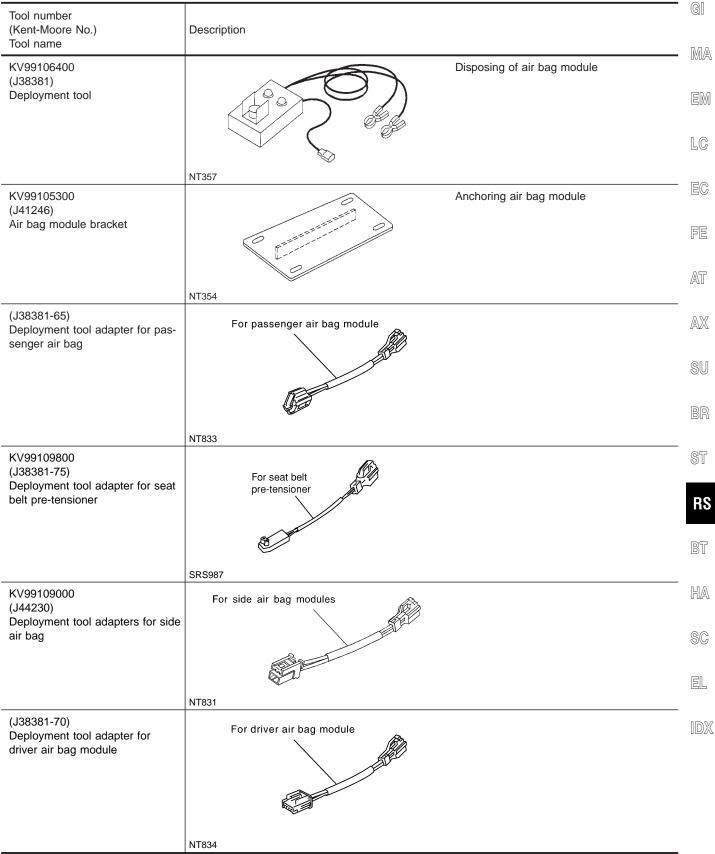
Preparation

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# Preparation

## SPECIAL SERVICE TOOLS

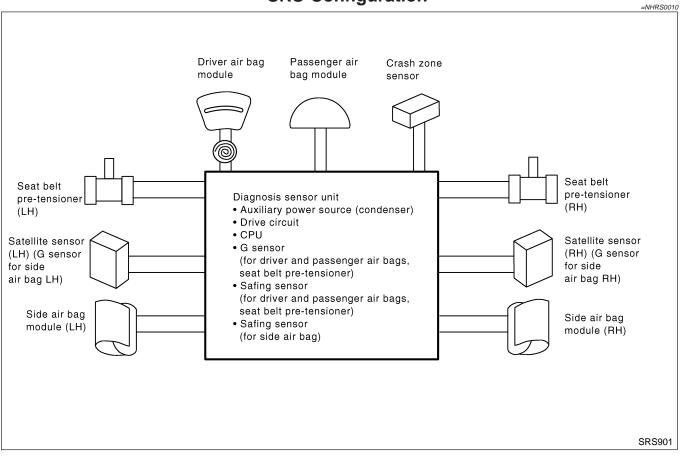
The actual shapes of Kent-Moore tools may differ from those of special service tools illustrated here.



\*: Special tool or commercial equivalent

SRS Configuration

## **SRS Configuration**



The air bag deploys if the diagnosis sensor unit activates while the ignition switch is in the "ON" or "START" position.

The collision modes for which supplemental restraint systems are activated are different among the SRS systems. For example, the driver air bag module and passenger air bag module are activated in a frontal collision but not in a side collision.

SRS configurations which are activated for some collision modes are as follows;

SRS configuration	Frontal collision	Left side collision	Right side collision
Driver air bag module	0	_	—
Passenger air bag module	0	—	—
Seat belt pre-tensioner (LH)	0	—	—
Seat belt pre-tensioner (RH)	0	—	—
Side air bag module (LH)	_	0	—
Side air bag module (RH)	_	_	0

Seat Belt Pre-tensioner with Load Limiter

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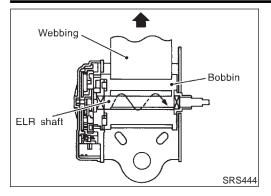
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## Seat Belt Pre-tensioner with Load Limiter

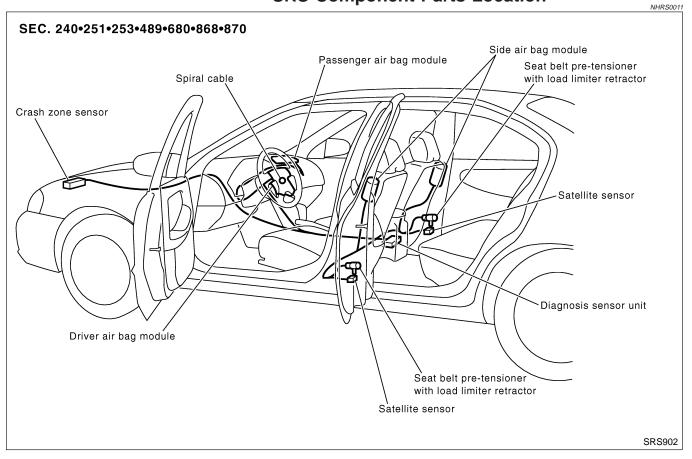
The seat belt pre-tensioner system with load limiter is installed to both the driver's seat and the front passenger's seat. It operates simultaneously with the SRS air bag system in the event of a frontal collision with an impact exceeding a specified level. When the frontal collision with an impact exceeding a specified level occurs, seat belt slack resulting from clothing or other factors is immediately taken up by the pre-tensioner. Vehicle passengers are securely restrained.

When passengers in a vehicle are thrown forward in a collision and the restraining force of the seat belt exceeds a specified level, the load limiter permits the specified extension of the seat belt by the twisting of the ELR shaft, and a relaxation of the chest-area seat belt web tension while maintaining force.

 Image: SRS988
 SRS988

SRS Component Parts Location

## **SRS Component Parts Location**

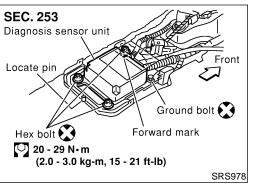


## Diagnosis Sensor Unit REMOVAL AND INSTALLATION CAUTION:

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- Before servicing SRS, turn the ignition switch off, disconnect both battery cables and wait at least 3 minutes.
- Do not use old bolts after removal; replace with new ones.
- Check diagnosis sensor unit for proper installation.
- Check diagnosis sensor unit to ensure it is free of deformities, dents, cracks or rust. If they show any visible signs of damage, replace them with new ones.
- Check diagnosis sensor unit brackets to ensure they are free of deformities or rust.
- Replace diagnosis sensor unit if it has been dropped or sustained an impact.
- After replacement of diagnosis sensor unit, perform selfdiagnosis for SRS. Refer to "SRS Operation Check" for details. (RS-42)

Diagnosis Sensor Unit (Cont'd)



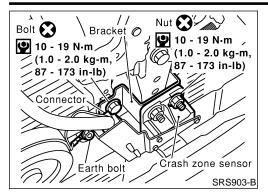
	<ol> <li>Disconnect driver, passenger and side air bag module connectors. Also, disconnect seat belt pre-tensioner connector.</li> </ol>	e-
nt	<ol> <li>Remove console box. Refer to BT-29, "INSTRUMENT PAN ASSEMBLY".</li> </ol>	
	<ol> <li>Disconnect diagnosis sensor unit connector.</li> </ol>	GI
	4. Remove ground bolt and also remove bolts from diagnos	sis
•	sensor unit. Then remove the diagnosis sensor unit.	MA
	NOTE:	
978	• To install, reverse the removal procedure sequence.	EM
1010	Seat Belt Pre-tensioner	LC
	REMOVAL AND INSTALLATION	
	CAUTION:	EA
	<ul> <li>Before servicing SRS, turn the ignition switch off, disconnect both battery cables and wait at least 3 minutes.</li> </ul>	n- <sup>EG</sup>
	<ul> <li>Check seat belt pre-tensioner with load limiter for propring installation.</li> </ul>	er <sub>FE</sub>
	<ul> <li>After replacement of seat belt pre-tensioner, check SI function and perform self-diagnosis for SRS. Refer to "SRS Operation Check" for details. (RS-42)</li> </ul>	RS AT
	• Do not attempt to disassemble seat belt pre-tensioner w load limiter.	ith AX
	• Replace seat belt pre-tensioner if it has been dropped sustained an impact.	or SU
	<ul> <li>Do not expose seat belt pre-tensioner to temperatur exceeding 80°C (176°F).</li> </ul>	es
	For removal of seat belt pre-tensioner, refer to "Front Seat Belt" details. (RS-5)	for BR
	NOTE: • To install, reverse the removal procedure sequence.	ST
	Onesh Zene Osnesn	RS
	Crash Zone Sensor	
	REMOVAL AND INSTALLATION	80054 BT
	<ul> <li>CAUTION:</li> <li>Before servicing SRS, turn the ignition switch off, disco</li> </ul>	
	nect both battery cables and wait at least 3 minutes.	
	• Do not use old bolts coated with bonding agent af	ter HA
	removal; replace with new ones.	
	• Check crash zone sensor for proper installation.	SC
	<ul> <li>Check crash zone sensor to ensure they are free deformities, dents, cracks or rust. If it shows any visit ciana of demage, replace it with new one</li> </ul>	
	<ul> <li>signs of damage, replace it with new one.</li> <li>After replacement of crash zone sensor, check SRS fur</li> </ul>	
	tion and perform self-diagnosis for SRS. Refer to "SI Operation Check" for details. (RS-42)	

• Do not attempt to disassemble crash zone sensor.

**RS-19** 

• Replace crash zone sensor if it has been dropped or sustained an impact.

Crash Zone Sensor (Cont'd)



- 1. Disconnect crash zone connector.
- 2. Remove earth bolt and remove nuts from crash zone sensor. Then remove the crash zone sensor from bracket.

#### NOTE:

• To install, reverse the removal procedure sequence.

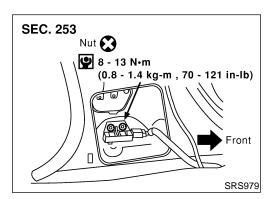
# Satellite Sensor

### **REMOVAL AND INSTALLATION**

#### **CAUTION:**

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- Before servicing SRS, turn the ignition switch off, disconnect both battery cables and wait at least 3 minutes.
- Do not use old bolts coated with bonding agent after removal; replace with new ones.
- Check satellite sensor for proper installation.
- Check satellite sensor to ensure they are free of deformities, dents, cracks or rust. If it shows any visible signs of damage, replace it with new one.
- After replacement of satellite sensor, check SRS function and perform self-diagnosis for SRS. Refer to "SRS Operation Check" for details. (RS-42)
- Do not attempt to disassemble satellite sensor.
- Replace satellite sensor if it has been dropped or sustained an impact.



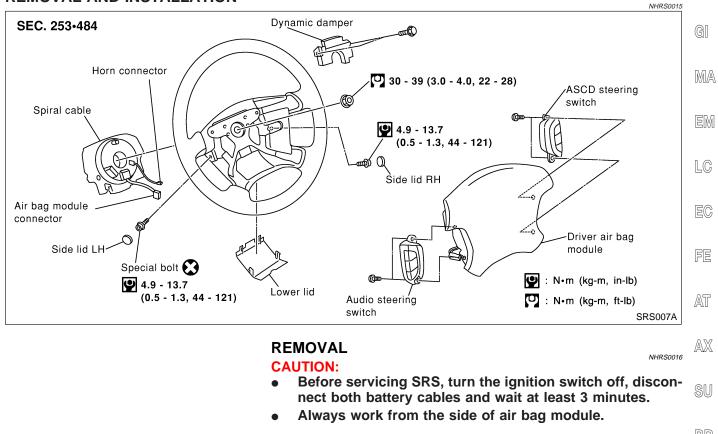
- 1. Remove seat belt pre-tensioner. Refer to "Front Seat Belt" for details. (RS-5)
- 2. Disconnect satellite sensor connector.
- 3. Remove bolt and nuts from satellite sensor unit. Then remove the satellite sensor.

#### NOTE:

• To install, reverse the removal procedure sequence.

## Driver Air Bag Module and Spiral Cable

## REMOVAL AND INSTALLATION



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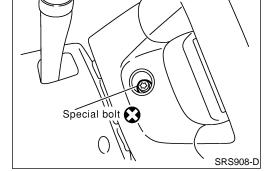
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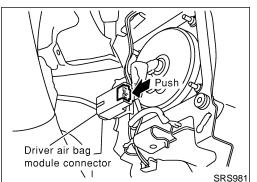
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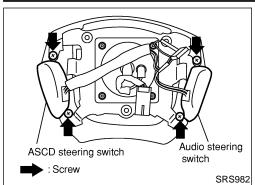
1. Remove side lids. Using the TAMPER RESISTANT TORX (Size T30), remove left and right special bolts.



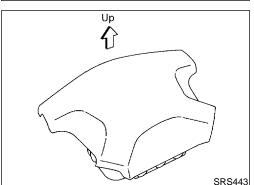


- 2. Remove lower lid from steering wheel, and disconnect air bag module connector. Air bag module can then be removed.

Driver Air Bag Module and Spiral Cable (Cont'd)



3. Remove steering switches from driver air bag module.



#### CAUTION:

- Always place air bag module with pad side facing upward.
- Do not attempt to disassemble air bag module.
- Do not use old bolts after removal; replace with new ones.
- Do not insert any foreign objects (screwdriver, etc.) into air bag module connector.



• Replace air bag module if it has been dropped or sustained an impact.

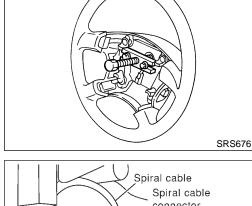
- Do not expose the air bag module to temperatures exceeding 90°C (194°F).
- Do not allow oil, grease or water to come in contact with the air bag module.
- 4. Set steering wheel in the neutral position.
- 5. Disconnect horn connector and remove nuts.
- 6. Remove dynamic damper. Then using steering wheel puller, remove steering wheel. Be careful not to over-tighten puller bolt on steering wheel.

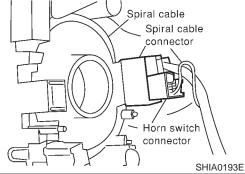
#### **CAUTION:**

- Do not tap or bump the steering wheel.
- 7. Remove steering column cover.
- 8. Remove the spiral cable fixing screws, and while pushing the upper plastic tab, remove the spiral cable.

#### **CAUTION:**

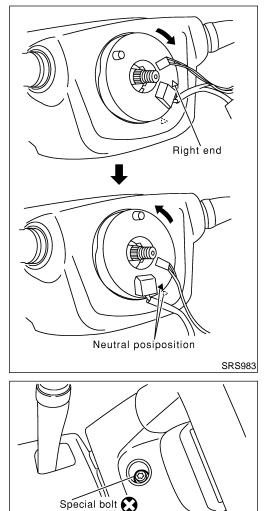
- Do not attempt to disassemble spiral cable.
- Do not apply lubricant to the spiral cable.
- 9. Remove the wiper washer switch and lighting switch from the spiral cable.





Driver Air Bag Module and Spiral Cable (Cont'd)

NHRS0017



### INSTALLATION

- 1. Set the front wheels in the straight-ahead position.
- 2. Make sure that the spiral cable is in the neutral position. The neutral position is detected by turning left about 2.5 revo-GI lutions from the right end position. Align the two marks ( $\mathbf{X}$ ).

#### CAUTION:

- The spiral cable may snap due to steering operation if the MA cable is installed in an improper position.
- Also, with the steering linkage disconnected, the cable EM may snap by turning the steering wheel beyond the limited number of turns. The spiral cable can be turned to the left about 2.5 turns from the right end position.
- LC 3. Connect spiral cable connector and tighten with screws. Install steering column cover.
- Install steering wheel, aligning with spiral cable pin guides, and 4. EC pull spiral cable through.
- Connect horn connector and engage spiral cable with pawls in 5. steering wheel. Move air bag module connector away from FE steering wheel lower lid opening.
- Tighten nut. 6.

## O : 30 - 39 N⋅m (3.0 - 4.0 kg-m, 22 - 28 ft-lb)

- 7. Install dynamic damper.
- AX 8. Position air bag module and tighten with new special bolts.
- 9. Connect air bag module connector.
- 10. Install steering switches and lids.
- SU 11. Conduct self-diagnosis to ensure entire SRS operates properly. (Use CONSULT-II or warning lamp check.) Before performing self-diagnosis, connect both battery cables.
- 12. Turn steering wheel to the left end and then to the right end fully to make sure that spiral cable is set in the neutral position.

If "AIR BAG" warning lamp blinks or stays ON (at the user mode), it shows the spiral cable may be snapped due to its RS improper position. Perform self-diagnosis again (use CON-SULT-II or warning lamp). If a malfunction is detected, replace the spiral cable with a new one.

BT 13. Perform self-diagnosis again to check that no malfunction is detected.

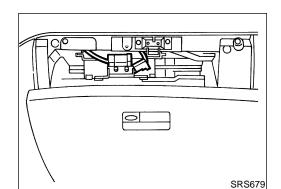
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# Front Passenger Air Bag Module REMOVAL

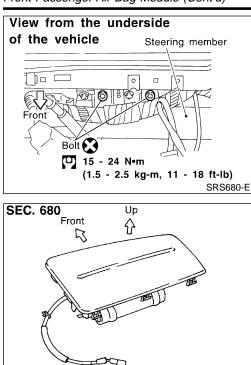
## CAUTION:

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SRS908-D

- Before servicing SRS, turn the ignition switch off, discon-• nect both battery cables and wait for at least 3 minutes.
  - Always work from the side of or under air bag module.
- 1. Open the glove box lid.
- 2. Open the connector cover.
- 3. Disconnect front passenger air bag module connector from air bag harness connector.

Front Passenger Air Bag Module (Cont'd)



- Remove glove box assembly. Refer to BT-29, "INSTRUMENT PANEL ASSEMBLY" for details.
- 5. Remove the Hex bolts from front passenger air bag module. Take out the air bag module from the instrument panel.
- The air bag module is heavy and should be supported using both hands during removal.

#### **CAUTION:**

SRS570

- Always place air bag module with pad side facing upward.
- Do not attempt to disassemble air bag module.
- Do not use old bolts after removal; replace with new ones.
- Do not insert any foreign objects (screwdriver, etc.) into air bag module connector.



• Replace air bag module if it has been dropped or sustained an impact.

- Do not expose the air bag module to temperatures exceeding 90°C (194°F).
- Do not allow oil, grease or water to come in contact with the air bag module.
- After air bag inflates, the front instrument panel assembly should be replaced if damaged.

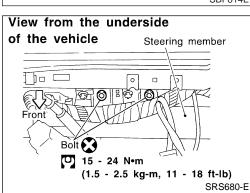
## INSTALLATION

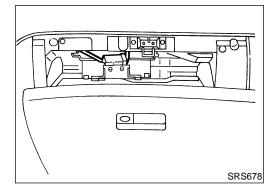
#### CAUTION:

• Always work from the side of or under air bag module.

NHRS0019

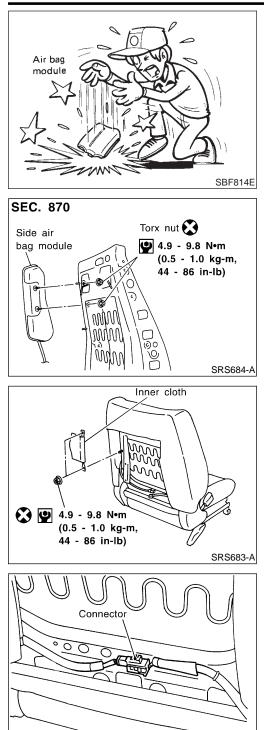
- 1. Install front passenger air bag module on steering member.
- Ensure harness is not caught between rear of air bag module and steering member.
- 2. Install glove box assembly. (Glove box lid is open.)
- 3. Connect air bag module connector to air bag harness connector.
- 4. Close the connector cover.
- 5. Close the glove box lid.
- 6. Connect the battery ground cable.
- 7. Conduct self-diagnosis to ensure entire SRS operates properly. (Use CONSULT-II or warning lamp check.)





PUINDAI	Side Air Bag Module REMOVAL	
Connector	WARNING: Removal of front side air bag module should only be done to allow deployment of front side air bag module prior to dis-	GI
	posal of seatback assembly. Only complete seatback assemblies can be replaced.	MA
Slide. Tab SRS682	<ul> <li>Before servicing SRS, turn the ignition switch OFF, disconnect both battery cables and wait at least 3 minutes.</li> <li>Always work from the rear of the air bag module.</li> </ul>	EM
	1. Remove seat back board.	LC
	<ul> <li>When using a clip removal tool to remove the seat back board, take care not to damage the harness for air bag.</li> <li>2. Disconnect side air bag module connector by sliding tab.</li> </ul>	EC
		FE
		AT
Inner cloth	<ol> <li>Pull up the seat back trim.</li> <li>Remove the nuts securing the inner cloth with seat back frame.</li> </ol>	AX
	<ul><li>Then pull up the inner cloth.</li><li>Remove the seat back trim. Refer to BT-47, "Front Seat" for detail.</li></ul>	SU
		BR
4.9 - 9.8 N•m (0.5 - 1.0 kg-m, 44 - 86 in-lb) SRS683-A		ST
SEC. 870	6. Remove the torx nuts coated with bonding agent from the side air bag module.	RS
Side air Torx nut bag module 4.9 - 9.8 N•m (0.5 - 1.0 kg-m,	<ol> <li>Remove side air bag connector. Side air bag module can then be removed.</li> </ol>	BT
44 - 86 in-lb)		HA
		SC
SRS684-A	CAUTION:	EL
	<ul> <li>Always place the air bag module standing with the stud bolt side setting bottom.</li> <li>Do not attempt to disassemble air bag module.</li> <li>The torx nuts are coated with bonding agent. Do not use old nuts after removal; replace with new coated nuts.</li> <li>Do not insert any foreign objects (screwdriver, etc.) into air bag module connector.</li> </ul>	IDX
SRS623		

Side Air Bag Module (Cont'd)



- Replace air bag module if it has been dropped or sustained an impact.
- Do not expose the air bag module to temperatures exceeding 90°C (194°F).
- Do not allow oil, grease or water to come in contact with the air bag module.
- After side air bag inflates, front seatback assembly must be replaced.

## INSTALLATION

- Install side air bag module on seatback frame with new torx nuts coated with bonding agent.
- 2. Install side air bag connector.

- 3. Install the seatback trim. Refer to BT-47, "Front Seat".
- 4. Secure the inner cloth which covers the side air bag module with nuts.

- 5. Connect side air bag module connector.
- 6. Install seatback board with new clips.
- 7. Connect both battery cables.
- 8. Go to "SRS Operation Check", RS-42 and perform self-diagnosis to ensure entire SRS operates properly. (Use CON-SULT-II or air bag warning lamp.)

## Disposal of Air Bag Module and Seat Belt Pretensioner

- Before disposing of air bag module and seat belt pre-tensioner, or vehicles equipped with such systems, deploy the systems. If such systems have already been deployed due to an accident, dispose of them as indicated in "DISPOSING OF AIR BAG MODULE AND SEAT BELT PRE-TENSIONER" (RS-32).
- When deploying the air bag module and seat belt pretensioner, always use the Special Service Tool; Deployment tool KV99106400 (J38381).

## **RS-26**

SRS725

Disposal of Air Bag Module and Seat Belt Pre-tensioner (Cont'd)

- When deploying the air bag module and seat belt pretensioner, stand at least 5 m (16 ft) away from the deployment component.
- When deploying air bag module and seat belt pre-tensioner, a fairly loud noise is made, followed by smoke being released.
   The smoke is not poisonous, however, be careful not to inhale smoke since it irritates the throat and can cause choking.
- Always activate one air bag module at a time.
- Due to heat, leave air bag module unattended for more than 30 minutes after deployment. Also leave seat belt pre-tensioner unattended for move than 10 minutes after deployment.
- Be sure to wear gloves when handling a deployed air bag module and seat belt pre-tensioner.
- Never apply water to the deployed air bag module and seat belt pre-tensioner.
- Wash your hands clean after finishing work.
- Place the vehicle outdoors with an open space of at least 6 m (20 ft) on all sides when deploying air bag module and seat belt pre-tensioner while mounted in vehicle.
- Use a voltmeter to make sure the vehicle battery is fully charged.
- Do not dispose of the air bag module and seat belt pre-tensioner un-deployed.

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NHRS0022S0101

Red Black [KV99106400 (J38381)] SRS019

## CHECKING DEPLOYMENT TOOL Connecting to Battery CAUTION:

The battery must show voltage of 9.6V or more.

Remove the battery from the vehicle and place it on dry wood blocks approximately 5 m (16 ft) away from the vehicle.  $\mathbb{HA}$ 

- Wait 3 minutes after the vehicle battery is disconnected before proceeding.
- Connect red clip of deployment tool to battery positive terminal and black clip to negative terminal.

Make sure the polarity is correct. The right side lamp in the tool, marked "deployment tool power", should glow with a green light. If the right side lamp glows red, reverse the connections to the battery.

**RS-27** 

Disposal of Air Bag Module and Seat Belt Pre-tensioner (Cont'd)

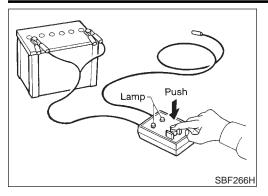
Air bag module

SRS232-C

Wire

bracket [KV99105300

(J41246)] -



## **Deployment Tool Check**

Press the deployment tool switch to the "ON" position. The left side lamp in the tool, marked "air bag connector voltage" should illuminate. If it does not illuminate, replace the tool.

### Air Bag Deployment Tool Lamp Illumination Chart (Battery connected)

	')	NHRS0022S0103
Switch operation	Left side lamp, green* "AIR BAG CONNECTOR VOLTAGE"	Right side lamp, green* "DEPLOYMENT TOOL POWER"
OFF	OFF	ON
ON	ON	ON

\*: If this lamp glows red, the tool is connected to the battery incorrectly. Reverse the connections and make sure the lamp glows green.



Unless the vehicle is being scrapped, deploying the air bag in the vehicle is not recommended. This may cause damage to the vehicle interior.

Anchor air bag module bracket [KV99105300 (J41246)] in a vise secured to a firm foundation during deployment.

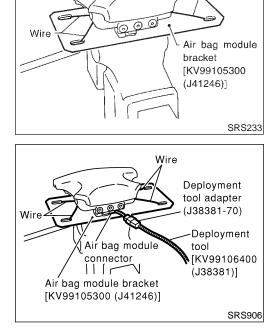
# Deployment of Driver Air Bag Module (Outside of vehicle)

 Using wire, secure air bag module to air bag module bracket [SST: KV99105300 (J41246)] at two places.

#### **CAUTION:**

#### Use wire of at least 1 mm (0.04 in) diameter.

2. Firmly secure air bag module bracket [SST: KV99105300 (J41246)] with air bag module attached, in a vise.



3. Connect deployment tool adapter (SST: J38381-70) to deployment tool [SST: KV99106400 (J38381)] to air bag module connector.

RS-28

Disposal of Air Bag Module and Seat Belt Pre-tensioner (Cont'd) 4. Connect red clip of deployment tool to battery positive termi-Air bag module nal and black clip to negative terminal. The lamp on the right side of the tool, marked "deployment tool 5. power", should glow green, not red. Press the button on the deployment tool. The left side lamp on 6. the tool, marked "air bag connector voltage", will illuminate and the air bag module will deploy. **CAUTION:** When deploying the air bag module, stand at least 5 m (16 ft) Deployment tool away from the air bag module. [KV99106400 (J38381)] SRS235 15 (0.59) vehicle) 15 (0.59) 8.5 (0.335) dia. figure at left. 78 (3.07) C -Air bag module bracket [KV99105300 (J41246)] Unit: mm (in) SRS685 2. (J41246)] in a vise. e Air bad 0 module bracket [KV99105300 (J41246)] SRS310-A Passenger air bag module CAUTION: stabilize the air bag module. Bolt [M8 x 25 - 30 mm (0.98 - 1.18 in)] Air bag module bračket [KV99105300 (J41246)] SRS686 4.

Deployment tool

SRS907

adapter (J38381-65)

- - 3. Match the two holes in air bag module bracket (held in vise) and passenger air bag module and fix them with two bolts [M8 × 25 - 30 mm (0.98 - 1.18 in)].

If a gap exists between passenger air bag module and air bag HA module bracket, use a piece of wood inserted in the gap to

- SC
- EL
- Connect deployment tool adapter (SST: J38381-65) to deployment tool [SST: KV99106400 (J38381)] connector and air bag module connector.
- 5. Connect red clip of deployment tool to battery positive terminal and black clip to negative terminal.
- The lamp on the right side of the tool, marked "deployment tool 6 power", should glow green, not red.
- Press the button on the deployment tool. The left side lamp on 7. the tool, marked "air bag connector voltage", will illuminate and the air bag module will deploy.



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#### Deployment of Passenger Air Bag Module (Outside of LC NHRS0022S0202

1. Make an 8.5 mm (0.335 in) diameter hole in air bag module bracket [SST: KV99105300 (J41246)] at the position shown in

FE



AX Firmly secure air bag module bracket [SST: KV99105300

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- ST
- RS

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Disposal of Air Bag Module and Seat Belt Pre-tensioner (Cont'd)

6.5 (0.256) dia.

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SRS490-B

Air bag module bracket [KV99105300 (J41246)]

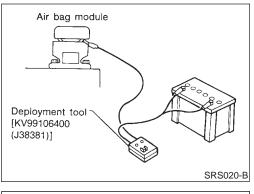
Air bag module bracket

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[KV99105300 (J41246)] SRS628-A

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Deployment tool [KV99106400 (J38381)]



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(3.15)

Front side air bag module

13 (0.51)

Unit: mm (in)

Ó

M6 nut

Deployment tool

adapter [KV99109000

ີ 70 ໌ (2.76)



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- When deploying the air bag module, do not stand on the deploying side.
- Stand at least 5 m (16 ft) away from the air bag module.

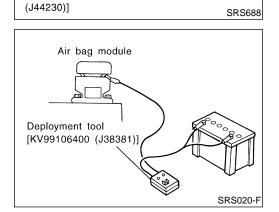
# Deployment of Side Air Bag Module (Outside of vehicle)

- Make 6.5 mm (0.256 in) diameter holes in air bag module bracket [SST: KV99105300 (J41246)] at the position shown in figure at left.
- 2. Firmly secure air bag module bracket [SST: KV99105300 (J41246)] in a vise.
- 3. Insert the stud bolts of side air bag module into the two holes in air bag module bracket (held in vise) and fix them with two M6 nuts.

## **CAUTION:**

Side air bag module should be secured to air bag module bracket [SST: KV99105300 (J41246)] in a vise with stud bolt side setting bottom.

4. Connect deployment tool adapter [SST: KV9910900 (J44230)] to deployment tool [SST: KV99106400 (J38381)] connector and connector on air bag module.

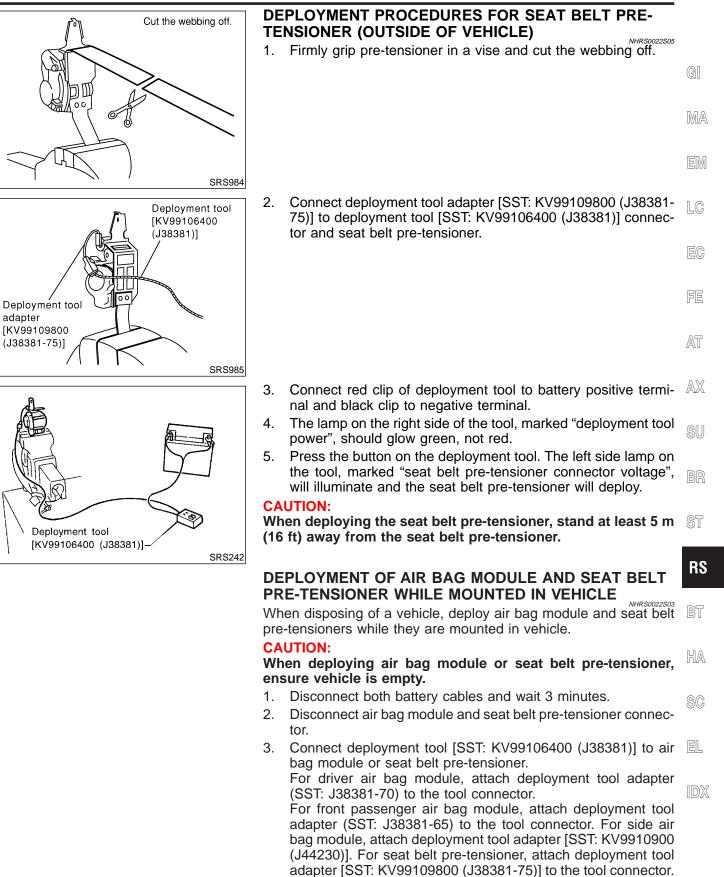


- 5. Connect red clip of deployment tool to battery positive terminal and black clip to negative terminal.
- 6. The lamp on the right side of the tool, marked "deployment tool power", should glow green, not red.
- 7. Press the button on the deployment tool. The left side lamp on the tool, marked "air bag connector voltage", will illuminate and the air bag module will deploy.

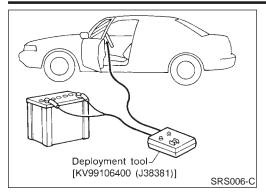
## **CAUTION:**

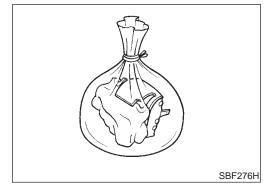
When deploying the air bag module, stand at least 5 m (16 ft) away from the air bag module.

Disposal of Air Bag Module and Seat Belt Pre-tensioner (Cont'd)



Disposal of Air Bag Module and Seat Belt Pre-tensioner (Cont'd)





- 4. Connect red clip of deployment tool to battery positive terminal and black clip to negative terminal.
- 5. The lamp on the right side of the tool, marked "deployment tool power", should glow green, not red.
- 6. Press the button on the deployment tool. The left side lamp on the tool, marked "air bag connector voltage", will illuminate and the air bag module or seat belt pre-tensioner will deploy.

#### **CAUTION:**

Activate only one air bag module or seat belt pre-tensioner at a time.

#### DISPOSING OF AIR BAG MODULE AND SEAT BELT PRE-TENSIONER

Deployed air bag module and seat belt pre-tensioner are very hot. Before disposing of air bag module, and seat belt pre-tensioner wait at least 30 minutes, and 10 minutes, respectively. Seal them in a plastic bag before disposal.

#### **CAUTION:**

- Never apply water to a deployed air bag module and seat belt pre-tensioner.
- Be sure to wear gloves when handling a deployed air bag module and seat belt pre-tensioner.
- No poisonous gas is produced upon air bag module deployment. However, be careful not to inhale gas since it irritates throat and can cause choking.
- Do not attempt to disassemble air bag module and seat belt pre-tensioner.
- Air bag module and seat belt pre-tensioner cannot be reused.
- Wash your hands clean after finishing work.

Trouble Diagnoses Introduction

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## **Trouble Diagnoses Introduction**

#### CAUTION:

- Do not use electrical test equipment on any circuit related to the SRS unless instructed to in this Service Manual. SRS wiring harnesses can be identified by yellow and/or orange harness connector.
- Do not attempt to repair, splice or modify the SRS wiring harness. If the harness is damaged, replace it with a new one.
- Keep ground portion clean.

## **DIAGNOSIS FUNCTION**

EM The SRS self-diagnosis results can be read by using "AIR BAG" warning lamp and/or CONSULT-II. The reading of these results is accomplished using one of two modes -- "User mode" and "Diagnosis mode". The User mode is exclusively prepared for the customer (driver). This mode warns the driver of a system LC malfunction through the operation of the "AIR BAG" warning lamp.

The Diagnosis mode allows the technician to locate and inspect the malfunctioning part.

The mode applications for the "AIR BAG" warning lamp and CONSULT-II are as follows:

	User mode	Diagnosis mode	Display type	-
"AIR BAG" warning lamp	Х	Х	ON-OFF operation	FE
CONSULT-II	—	Х	Monitoring	
				- AT

## DIAGNOSIS MODE FOR CONSULT-II

- NHRS0043S02 "SELF-DIAG [CURRENT]" AX A current Self-diagnosis result (also indicated by the number of warning lamp flashes in the Diagnosis mode) is displayed on the CONSULT-II screen in real time. This refers to a malfunctioning part requiring repairs.
- "SELF-DIAG [PAST]" • Diagnosis results previously stored in the memory are displayed on the CONSULT-II screen. The stored results are not erased until memory erasing is executed.
- **"TROUBLE DIAG RECORD"** With TROUBLE DIAG RECORD, diagnosis results previously erased by a reset operation can be displayed on the CONSULT-II screen.
- "ECU DISCRIMINATED NO."

The diagnosis sensor unit for each vehicle model is assigned with its own, individual classification number. This number will be displayed on the CONSULT-II screen, as shown below. When replacing the diag-RS nosis sensor unit, refer to the part number for the compatibility. After installation, replacement with a correct unit can be checked by confirming this classification number on the CONSULT-II screen. RT

ECU DISCRIMINATED NO. ECU No.	
FA50	
	SRS003A

For INFINITI 135, the diagnosis sensor unit classification numbers assigned is FA50.

Trouble Diagnoses Introduction (Cont'd)

## B HOW TO CHANGE SELF-DIAGNOSIS MODE WITH CONSULT-II

## From User Mode to Diagnosis Mode

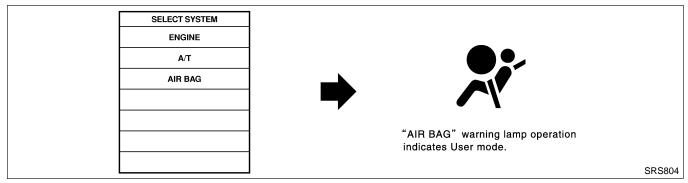
=NHRS0043S03

After selecting "AIR BAG" on the "SELECT SYSTEM" screen, User mode automatically changes to Diagnosis mode.



## From Diagnosis Mode to User Mode

To return to User mode from Diagnosis mode, touch "BACK" key of CONSULT-II until "SELECT SYSTEM" appears, Diagnosis mode automatically changes to User mode.



## **® HOW TO CHANGE SELF-DIAGNOSIS MODE WITHOUT CONSULT-II** From User Mode to Diagnosis Mode

NHRS0043S04

Diagnosis mode activates only when a malfunction is detected, by turning ignition switch as follows:

- 1) Turn ignition switch "ON".
- 2) After "AIR BAG" warning lamp lights for 7 seconds, turn ignition switch "OFF" within 1 second.
- 3) Wait more than 3 seconds.
- 4) Repeat steps 1 to 3 twice (Perform 3 times in total).
- 5) Turn ignition switch "ON".

SRS will not enter Diagnosis mode, if no malfunction is detected.

## From Diagnosis Mode to User Mode

After a malfunction is repaired, switch the ignition "OFF" for at least one second, then back "ON". Diagnosis mode is returned to User mode.

If switching Diagnosis mode to User mode is required while malfunction is being detected, by turning ignition switch as follows:

- 1) Turn ignition switch "ON".
- 2) After "AIR BAG" warning lamp lights for 7 seconds, turn ignition switch "OFF" within 1 second.
- 3) Wait more than 3 seconds.
- 4) Repeat steps 1 to 3 twice (Perform 3 times in total).
- 5) Turn ignition switch "ON".

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### HOW TO ERASE SELF-DIAGNOSIS RESULTS

#### **With CONSULT-II**

- "SELF-DIAG [CURRENT]"
   A current Self-diagnosis result is displayed on the CONSULT-II screen in real time. After the malfunction is repaired completely, no malfunction is detected on "SELF-DIAG [CURRENT]".
- "SELF-DIAG [PAST]" Return to the "SELF-DIAG [CURRENT]" CONSULT-II screen by pushing "BACK" key of CONSULT-II and select "SELF-DIAG [CURRENT]" in SELECT DIAG MODE. Touch "ERASE" in "SELF-DIAG [CURRENT]" mode.

#### NOTE:

If the memory of the malfunction in "SELF-DIAG [PAST]" is not erased, the User mode shows the system malfunction by the operation of the warning lamp even if the malfunction is repaired completely.

 "TROUBLE DIAG RECORD" The memory of "TROUBLE DIAG RECORD" cannot be erased.

#### **Without CONSULT-II**

After a malfunction is repaired, switch the ignition "OFF" for at least one second, then back "ON". Diagnosis Brender returns to the User mode. At that time, the self-diagnostic result is cleared.

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How to Perform Trouble Diagnoses for Quick and Accurate Repair

# How to Perform Trouble Diagnoses for Quick and Accurate Repair

A good understanding of the malfunction conditions can make troubleshooting faster and more accurate. In general, each customer feels differently about a malfunction. It is important to fully understand the symptoms or conditions for a customer complaint.

#### INFORMATION FROM CUSTOMER

WHAT ..... Vehicle model WHEN ..... Date, Frequencies WHERE ..... Road conditions HOW ..... Operating conditions, Symptoms

#### PRELIMINARY CHECK

Check that the following parts are in good order.

- Battery [Refer to SC-4, "BATTERY".]
- Fuse [Refer to EL-11, "Fuse", "POWER SUPPLY ROUTING".]
- System component-to-harness connections

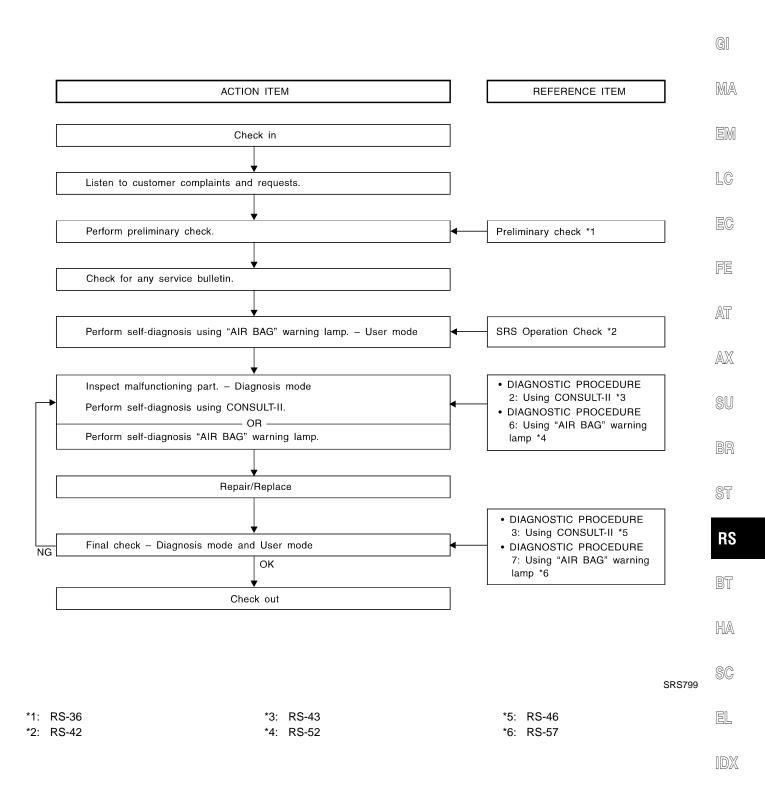
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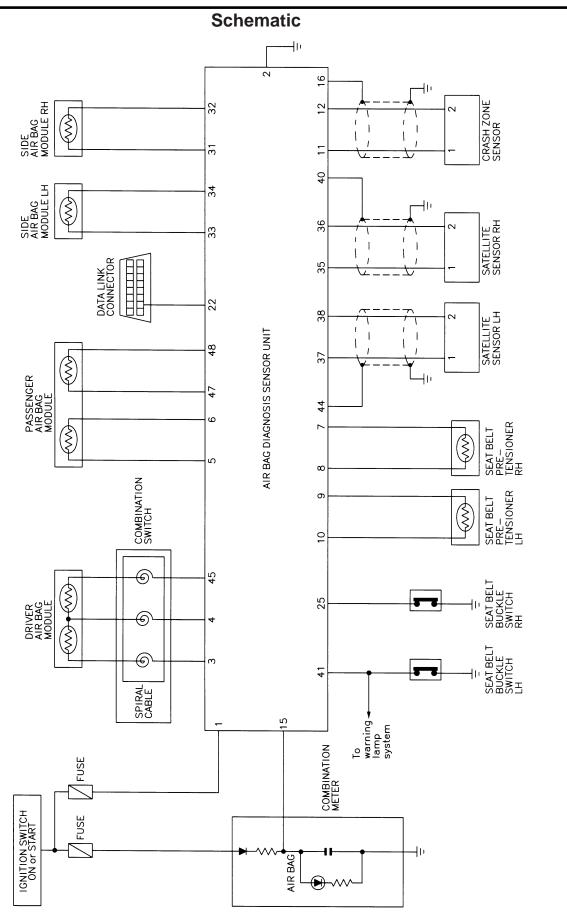
NHRS0044S02

How to Perform Trouble Diagnoses for Quick and Accurate Repair (Cont'd)

WORK FLOW

=NHRS0044S03

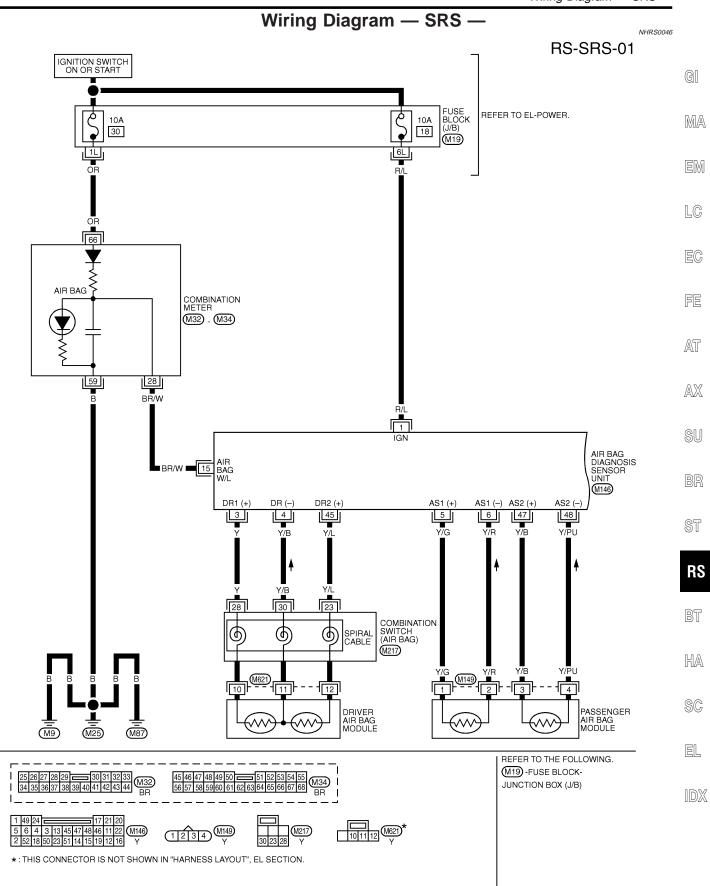




MRS382A

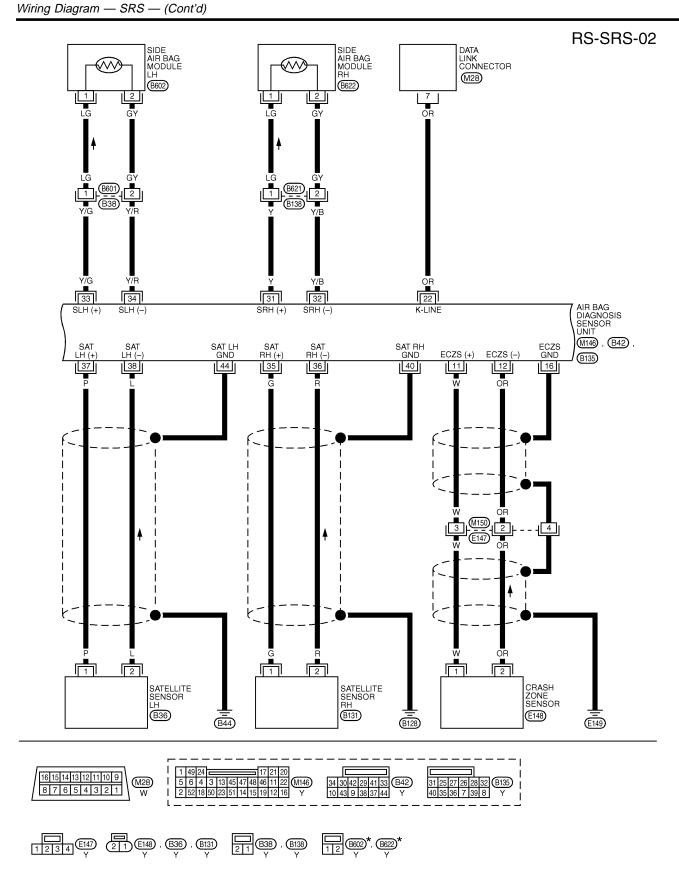
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Wiring Diagram - SRS -



MRS383A

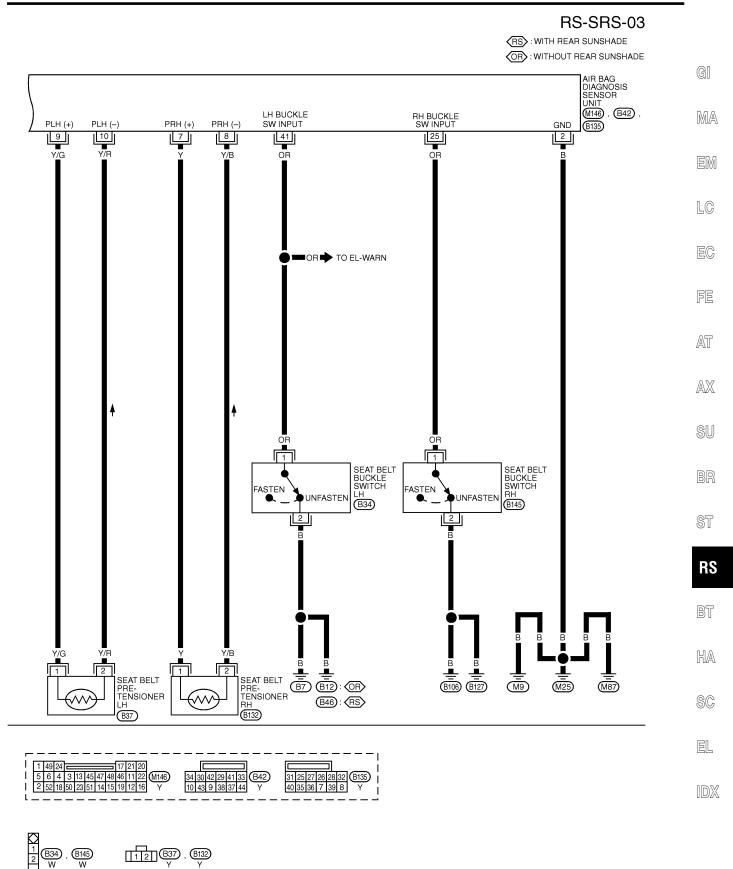
\* : THIS CONNECTOR IS NOT SHOWN IN "HARNESS LAYOUT", EL SECTION.



SUPPLEMENTAL RESTRAINT SYSTEM (SRS)

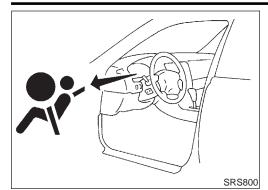
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#### **RS-40**



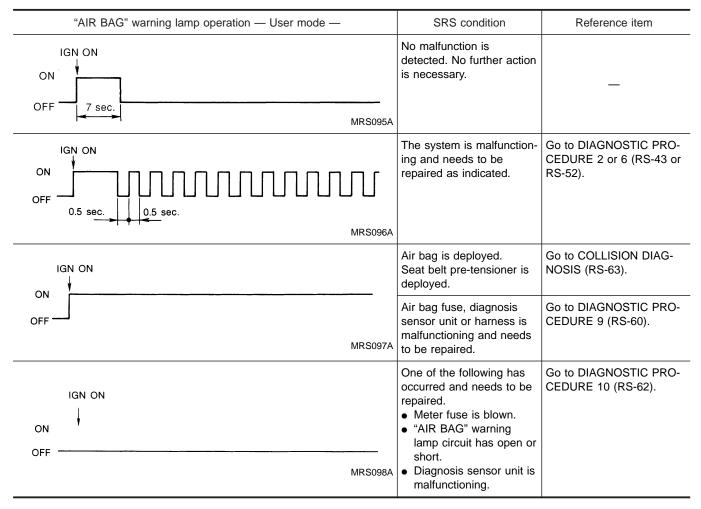
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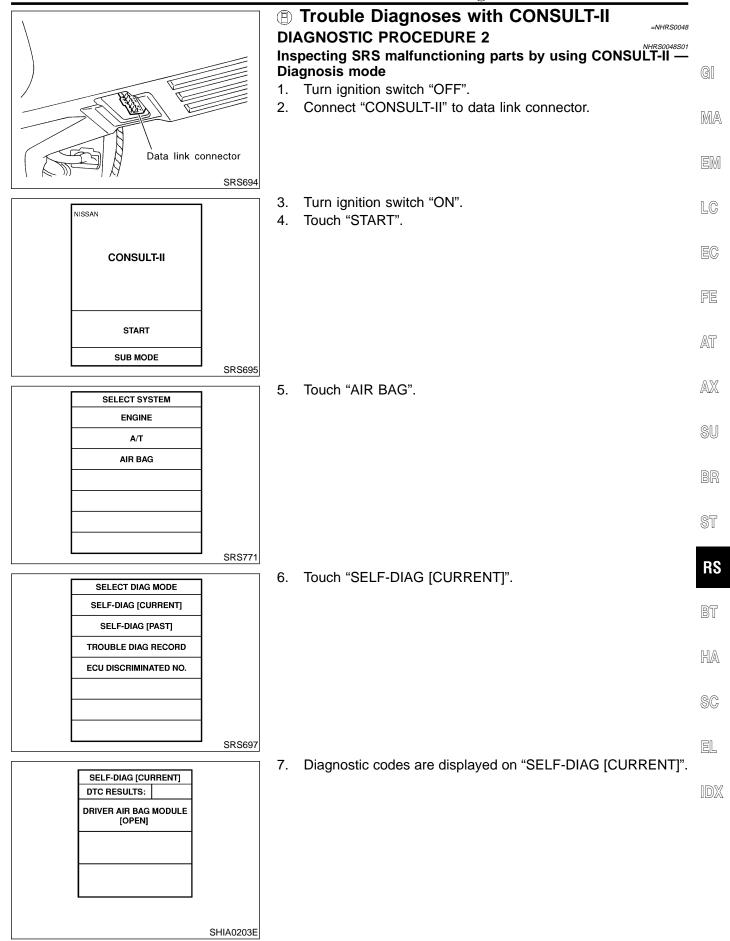
#### SRS Operation Check



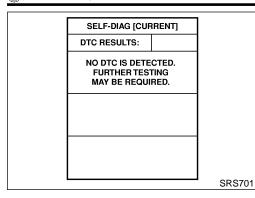
## SRS Operation Check DIAGNOSTIC PROCEDURE 1 Checking Air Bag Operation by Using "AIR BAG" Warning Lamp — User Mode

- 1. After turning ignition switch from "OFF" to "ON", "AIR BAG" warning lamp operates.
- 2. Compare "AIR BAG" warning lamp operation to the chart below.





(P) Trouble Diagnoses with CONSULT-II (Cont'd)



If no malfunction is detected on "SELF-DIAG [CURRENT]" even though malfunction is detected in "SRS Operation Check", check the battery voltage.

If the battery voltage is less than 9V, charge the battery. Then go to DIAGNOSTIC PROCEDURE 3, page RS-46.

If the battery voltage is OK, go to DIAGNOSTIC PROCEDURE 4, page RS-48, to diagnose the following cases:

- Self-diagnostic result "SELF-DIAG [PAST]" (previously stored in the memory) might not be erased after repair.
- The SRS system malfunctions intermittently.
- 8. Touch "PRINT".
- 9. Compare diagnostic codes to "CONSULT-II Diagnostic Code Chart", page RS-44.
- 10. Touch "BACK" key of CONSULT-II until "SELECT SYSTEM" appears in order to return to User mode from Diagnosis mode.
- 11. Turn ignition switch "OFF", then turn off and disconnect CONSULT-II, and disconnect both battery cables.
- 12. Repair the system as outlined by the "Repair order" in "CON-SULT-II Diagnostic Code Chart", that corresponds to the selfdiagnostic result. For replacement procedure of component parts, refer to RS-18.
- 13. After repairing the system, go to DIAGNOSTIC PROCEDURE 3, page RS-46 for final checking.

#### CONSULT-II Diagnostic Code Chart ("SELF-DIAG [CURRENT]")

			NHRS0048S0101
Diagnostic item		Explanation	Repair order "Recheck SRS at each replace- ment."
NO DTC IS DETECTED.	When malfunction is indicated by the "AIR BAG" warning lamp in User mode• Low battery voltage (Less than 9V)• Self-diagnostic result "SELF-DIAG [PAST]" (previously stored in the memory) might not be erased after repair. • Intermittent malfunction has been detected in the past.	• Low battery voltage (Less than 9V)	• Go to DIAGNOSTIC PROCEDURE 3 (RS-46) after charging battery.
		Go to DIAGNOSTIC PROCEDURE     4 (RS-48).	
	No malfunction is determined	ected.	• Go to DIAGNOSTIC PROCEDURE 3 (RS-46).
DRIVER AIRBAG MODULE [OPEN]	<ul> <li>Driver air bag module circuit is open. (including the spiral cable)</li> </ul>		<ol> <li>Visually check the wiring harness connection.</li> <li>Replace the harness if it has visible damage.</li> <li>Replace driver air bag module. (Before disposal, it must be deployed.)</li> <li>Replace the spiral cable.</li> <li>Replace the diagnosis sensor unit.</li> <li>Replace the related harness.</li> </ol>

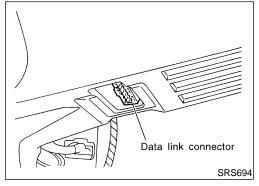
Trouble Diagnoses with CONSULT-II (Cont'd)

Diagnostic item	Explanation	Repair order "Recheck SRS at each replace- ment."
DRIVER AIRBAG MODULE [VB-SHORT]	• Driver air bag module circuit is shorted to a power supply cir- cuit. (including the spiral cable)	<ol> <li>Visually check the wiring harness connection.</li> <li>Replace the harness if it has visible</li> </ol>
DRIVER AIRBAG MODULE [GND-SHORT]	• Driver air bag module circuit is shorted to ground. (including the spiral cable)	<ul><li>damage.</li><li>3. Replace the spiral cable.</li><li>4. Replace driver air bag module.</li><li>(Before disposal, it must be</li></ul>
DRIVER AIRBAG MODULE [SHORT]	• Driver air bag module circuit is shorted between wires.	deployed.) 5. Replace the diagnosis sensor unit. 6. Replace the related harness.
ASSIST A/B MODULE [VB-SHORT]	• Front passenger air bag module circuit is shorted to a power supply circuit.	1. Visually check the wiring harness connection.
ASSIST A/B MODULE [OPEN]	• Front passenger air bag module circuit is open.	<ol> <li>Replace the harness if it has visible damage.</li> <li>Replace front passenger air bag</li> </ol>
ASSIST A/B MODULE [GND-SHORT]	• Front passenger air bag module circuit is shorted to ground.	module. (Before disposal, it must be deployed.) 4. Replace the diagnosis sensor unit.
ASSIST A/B MODULE [SHORT]	• Front passenger air bag module circuit is shorted between wires.	5. Replace the related harness.
CRASH ZONE SEN [UNIT FAIL] CRASH ZONE SEN [COMM FAIL]	Crash zone sensor	<ol> <li>Visually check the wiring harness connection.</li> <li>Replace the harness if it has visible damage.</li> <li>Replace the crash zone sensor.</li> <li>Replace the diagnosis sensor unit.</li> <li>Replace the related harness.</li> </ol>
SIDE MODULE LH [OPEN]	• Side air bag module (LH) circuit is open.	1. Visually check the wiring harness connection.
SIDE MODULE LH VB-SHORT]	• Side air bag module (LH) circuit is shorted to a power supply circuit.	<ol> <li>Replace the harness if it has visible damage.</li> <li>Replace side air bag module (LH).</li> </ol>
SIDE MODULE LH [GND-SHORT]	• Side air bag module (LH) circuit is shorted to ground.	<ul><li>(Before disposal, it must be deployed.)</li><li>4. Replace the diagnosis sensor unit.</li></ul>
SIDE MODULE LH [SHORT]	• Side air bag module (LH) circuit is shorted between wires.	5. Replace the related harness.
Side Module RH [open]	• Side air bag module (RH) circuit is open.	1. Visually check the wiring harness connection.
SIDE MODULE RH [VB-SHORT]	• Side air bag module (RH) circuit is shorted to a power supply circuit.	<ol> <li>Replace the harness if it has visible damage.</li> <li>Replace side air bag module (RH).</li> </ol>
SIDE MODULE RH [GND-SHORT]	• Side air bag module (RH) circuit is shorted to ground.	<ul><li>(Before disposal, it must be deployed.)</li><li>4. Replace the diagnosis sensor unit.</li></ul>
SIDE MODULE RH [SHORT]	• Side air bag module (RH) circuit is shorted between wires.	5. Replace the related harness.
SATELLITE SENS LH [UNIT FAIL] SATELLITE SENS LH [COMM FAIL]	<ul> <li>Satellite sensor (LH)</li> </ul>	<ol> <li>Visually check the wiring harness connection.</li> <li>Replace the harness if it has visible damage.</li> <li>Replace the satellite sensor (LH).</li> <li>Replace the diagnosis sensor unit.</li> <li>Replace the related harness.</li> </ol>

(E) Trouble Diagnoses with CONSULT-II (Cont'd)

Diagnostic item	Explanation	Repair order "Recheck SRS at each replace- ment."
SATELLITE SENS RH [UNIT FAIL] SATELLITE SENS RH [COMM FAIL]	<ul> <li>Satellite sensor (RH)</li> </ul>	<ol> <li>Visually check the wiring harness connection.</li> <li>Replace the harness if it has visible damage.</li> <li>Replace the satellite sensor (RH).</li> <li>Replace the diagnosis sensor unit.</li> <li>Replace the related harness.</li> </ol>
PRE-TEN FRONT LH [OPEN]	• The circuit for seat belt pre-tensioner (LH) is open.	1. Visually check the wiring harness connections.
PRE-TEN FRONT LH [VB-SHORT]	• The circuit for seat belt pre-tensioner (LH) is shorted to a power supply circuit.	<ol> <li>Replace the harness if it has visible damage.</li> <li>Replace seat belt (LH).</li> </ol>
PRE-TEN FRONT LH [GND-SHORT]	<ul> <li>The circuit for seat belt pre-tensioner (LH) is shorted to ground.</li> </ul>	<ul><li>(Before disposal, it must be deactivated.)</li><li>4. Replace the diagnosis sensor unit.</li></ul>
PRE-TEN FRONT LH [SHORT]	• The circuit for seat belt pre-tensioner (LH) is shorted between wires.	5. Replace the related harness.
PRE-TEN FRONT RH [OPEN]	• The circuit for seat belt pre-tensioner (RH) is open.	1. Visually check the wiring harness connections.
PRE-TEN FRONT RH [VB-SHORT]	<ul> <li>The circuit for seat belt pre-tensioner (RH) is shorted to a power supply circuit.</li> </ul>	<ol> <li>Replace the harness if it has visible damage.</li> <li>Replace seat belt (RH).</li> </ol>
PRE-TEN FRONT RH [GND-SHORT]	<ul> <li>The circuit for seat belt pre-tensioner (RH) is shorted to ground.</li> </ul>	<ul><li>(Before disposal, it must be deactivated.)</li><li>4. Replace the diagnosis sensor unit.</li></ul>
PRE-TEN FRONT RH [SHORT]	• The circuit for seat belt pre-tensioner (RH) is shorted between wires.	5. Replace the related harness.
CONTROL UNIT	<ul> <li>Diagnosis sensor unit is malfunctioning.</li> </ul>	<ol> <li>Visually check the wiring harness connection.</li> <li>Replace the diagnosis sensor unit.</li> </ol>

\* Follow the procedures in numerical order when repairing malfunctioning parts. Confirm whether malfunction is eliminated using the air bag warning lamp or CONSULT-II each time repair is finished. If malfunction is still observed, proceed to the next step. When malfunction is eliminated, further repair work is not required.



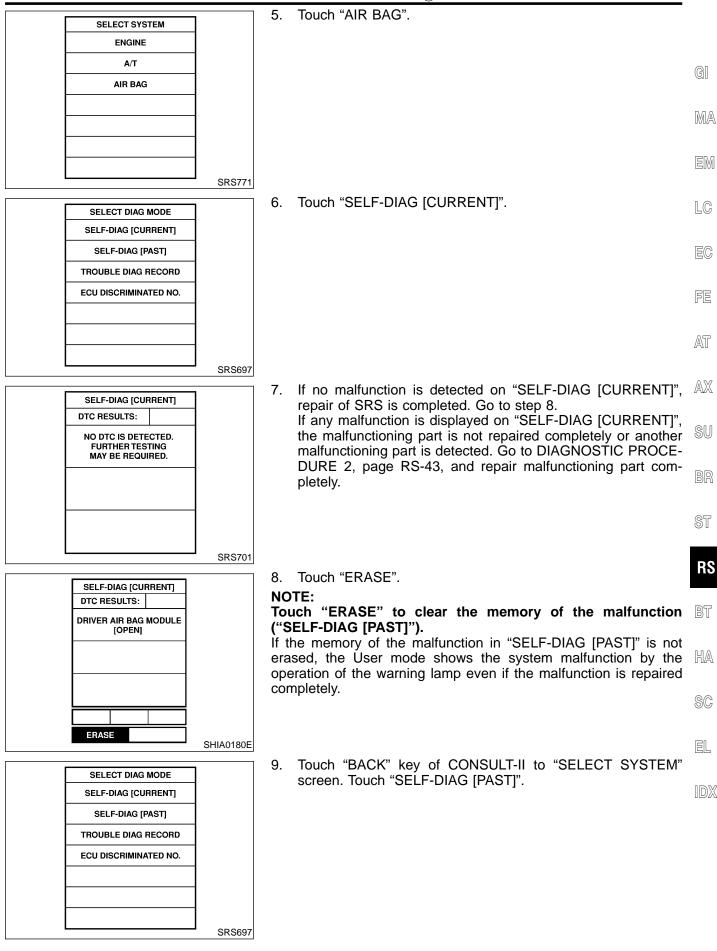
DIAGNOSTIC	PROCEDURE	3
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Final checking after repairing SRS by using CONSULT-II — Diagnosis mode

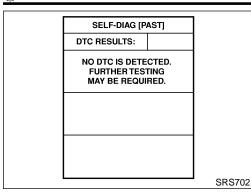
- 1. After repairing SRS, connect both battery cables.
- 2. Connect CONSULT-II to data link connector.
- 3. Turn ignition switch from "OFF" to "ON".

NISSAN CONSULT-II START SUB MODE SRS695 4. Touch "START".

(E) Trouble Diagnoses with CONSULT-II (Cont'd)



Trouble Diagnoses with CONSULT-II (Cont'd)



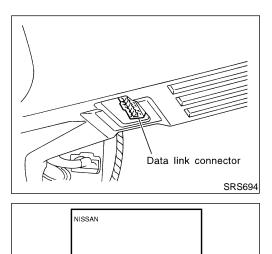
10. Check that no malfunction is detected on "SELF-DIAG [PAST]".

- 11. Touch "BACK" key of CONSULT-II until "SELECT SYSTEM" appears in order to return to User mode from Diagnosis mode.
- 12. Turn ignition switch "OFF", then turn off and disconnect CON-SULT-II.
- 13. Go to "SRS Operation Check", page RS-42 to check SRS operation by using "AIR BAG" warning lamp with User mode.

#### DIAGNOSTIC PROCEDURE 4 (CONTINUED FROM DIAGNOSTIC PROCEDURE 2) Inspecting SRS malfunctioning record

NHRS0048S03

1	CONSIDER POSSIBILITY OF NOT ERASING SELF-DIAGNOSTIC RESULT AFTER REPAIRING		
Is it th	Is it the first time for maintenance of SRS?		
	Yes or No		
Yes	►	Go to DIAGNOSTIC PROCEDURE 5 (RS-48).	
No	No Self-diagnostic result "SELF-DIAG [PAST]" (previously stored in the memory) might not be erased after repair. Go to DIAGNOSTIC PROCEDURE 3, step 8 (RS-46).		



CONSULT-II

START

SUB MODE

**SRS695** 

#### **DIAGNOSTIC PROCEDURE 5**

# Inspecting SRS intermittent malfunction by using CONSULT-II — Diagnosis mode

- 1. Turn ignition switch "OFF".
- 2. Connect "CONSULT-II" to data link connector.
- 3. Turn ignition switch "ON".
- 4. Touch "START".

(P) Trouble Diagnoses with CONSULT-II (Cont'd) 5. Touch "AIR BAG". SELECT SYSTEM ENGINE A/T GI AIR BAG MA SRS771 Touch "SELF-DIAG [PAST]". 6. LC SELECT DIAG MODE SELF-DIAG [CURRENT] SELF-DIAG [PAST] TROUBLE DIAG RECORD ECU DISCRIMINATED NO. FE AT SRS697 AX If diagnostic codes are displayed on "SELF-DIAG [PAST]", go 7. SELF-DIAG [PAST] to step 10. DTC RESULTS: SU DRIVER AIR BAG MODULE [OPEN] ST SHIA0181E RS If no malfunction is detected on "SELF-DIAG [PAST]", touch SELF-DIAG [PAST] "BACK" and go back to "SELECT DIAG MODE". DTC RESULTS: BT NO DTC IS DETECTED. FURTHER TESTING MAY BE REQUIRED. HA SC SRS702 EL Touch "TROUBLE DIAG RECORD". 8. SELECT DIAG MODE NOTE: IDX SELF-DIAG [CURRENT] With "TROUBLE DIAG RECORD", diagnosis results previously erased by a reset operation can be displayed. SELF-DIAG [PAST] TROUBLE DIAG RECORD ECU DISCRIMINATED NO.

SRS697

P Trouble Diagnoses with CONSULT-II (Cont'd)

TROUBLE DIAG RECORD		
DTC RESULTS:		
DRIVER AIR BAG N [OPEN]	NODULE	
		SHIA0182E

9. Diagnostic code is displayed on "TROUBLE DIAG RECORD".

- 10. Touch "PRINT".
- 11. Compare diagnostic codes to "Intermittent Malfunction Diagnostic Code Chart", page RS-50.
- 12. Touch "BACK" key of CONSULT-II until "SELECT SYSTEM" appears.
- 13. Turn ignition switch "OFF", then turn off and disconnect CONSULT-II, and disconnect both battery cables.
- 14. Repair the system as outlined by the "Repair order" in "Intermittent Malfunction Diagnostic Code Chart", that corresponds to the self-diagnostic result. For replacement procedure of component parts, refer to RS-18.
- 15. Go to DIAGNOSTIC PROCEDURE 3, page RS-46, for final checking.

#### Intermittent Malfunction Diagnostic Code Chart ("SELF-DIAG [PAST]" or "TROUBLE DIAG RECORD")

Diagnostic item		Explanation	Repair order	
NO DTC IS DETECTED.	When malfunction is indicated by the "AIR BAG" warning lamp in User mode	• Low battery voltage (Less than 9V)	Go to DIAGNOSTIC PROCEDURE     3 (RS-46) after charging battery.	
	<ul> <li>No malfunction is determined</li> </ul>	ected.	• Go to DIAGNOSTIC PROCEDURE 3 (RS-46).	
DRIVER AIRBAG MODULE [OPEN]	Driver air bag module cable)	circuit is open. (including the spiral	<ol> <li>Visually check the wiring harness connection.</li> <li>Replace the harness if it has visible</li> </ol>	
DRIVER AIRBAG MODULE [VB-SHORT]	Driver air bag module cuit. (including the spi	circuit is shorted to a power supply cir- iral cable)	<ul> <li>damage.</li> <li>3. If the harness check result is OK, replace driver air bag module</li> <li>(Before disposal, it must be</li> </ul>	
DRIVER AIRBAG MODULE [GND-SHORT]	• Driver air bag module the spiral cable)	circuit is shorted to ground. (including	deployed.), diagnosis sensor unit and spiral cable.	
DRIVER AIRBAG MODULE [SHORT]	Driver air bag module	circuit is shorted between wires.		
ASSIST A/B MODULE [VB-SHORT]	<ul> <li>Front passenger air b supply circuit.</li> </ul>	ag module circuit is shorted to a power	1. Visually check the wiring harness connection.	
ASSIST A/B MODULE [OPEN]	• Front passenger air b	ag module circuit is open.	<ol> <li>Replace the harness if it has visible damage.</li> <li>If the harness check result is OK,</li> </ol>	
ASSIST A/B MODULE [GND-SHORT]	• Front passenger air b	ag module circuit is shorted to ground.	replace front air bag module (Before disposal, it must be deployed.), and diagnosis sensor	
ASSIST A/B MODULE [SHORT]	<ul> <li>Front passenger air b wires.</li> </ul>	ag module circuit is shorted between	unit.	

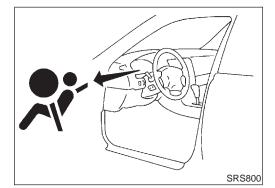
Trouble Diagnoses with CONSULT-II (Cont'd)

Diagnostic item	Explanation	Repair order	
CRASH ZONE SEN [UNIT FAIL] CRASH ZONE SEN [COMM FAIL]	Crash zone sensor	<ol> <li>Visually check the wiring harness connection.</li> <li>Replace the harness if it has visible damage.</li> <li>If the harness check is OK, replace the diagnosis sensor unit and crash zone sensor.</li> </ol>	GI MA
SIDE MODULE LH [OPEN]	• Side air bag module (LH) circuit is open.	1. Visually check the wiring harness connection.	EM
SIDE MODULE LH [VB-SHORT]	• Side air bag module (LH) circuit is shorted to a power supply circuit.	<ol> <li>Replace the harness if it has visible damage.</li> <li>If the harness check is OK, replace</li> </ol>	LC
SIDE MODULE LH [GND-SHORT]	• Side air bag module (LH) circuit is shorted to ground.	the diagnosis sensor unit and side air bag module (LH). (Before dis- posing of the side air bag module	EÇ
SIDE MODULE LH [SHORT]	• Side air bag module (LH) circuit is shorted between wires.	(LH), it must be deployed.)	
SIDE MODULE RH [OPEN]	• Side air bag module (RH) circuit is open.	1. Visually check the wiring harness connection.	FE
SIDE MODULE RH [VB-SHORT]	• Side air bag module (RH) circuit is shorted to a power supply circuit.	<ol> <li>Replace the harness if it has visible damage.</li> <li>If the harness check is OK, replace</li> </ol>	AT
SIDE MODULE RH [GND-SHORT]	• Side air bag module (RH) circuit is shorted to ground.	the diagnosis sensor unit and side air bag module (RH). (Before dis- posing of the side air bag module	AX
SIDE MODULE RH [SHORT]	• Side air bag module (RH) circuit is shorted between wires.	(RH), it must be deployed.)	SU
SATELLITE SENS LH [UNIT FAIL] SATELLITE SENS LH [COMM FAIL]	Satellite sensor (LH)	<ol> <li>Visually check the wiring harness connection.</li> <li>Replace the harness if it has visible damage.</li> <li>If the harness check is OK, replace the diagnosis sensor unit and satel- lite sensor (LH).</li> </ol>	BR ST
SATELLITE SENS RH [UNIT FAIL]	Satellite sensor (RH)	1. Visually check the wiring harness connection.	RS
SATELLITE SENS RH [COMM FAIL]		<ol> <li>Replace the harness if it has visible damage.</li> <li>If the harness check is OK, replace the diagnosis sensor unit and satel- lite sensor (RH).</li> </ol>	BT
PRE-TEN FRONT LH [OPEN]	• The circuit for seat belt pre-tensioner (LH) is open.	1. Visually check the wiring harness connections.	HA
PRE-TEN FRONT LH [VB-SHORT]	<ul> <li>The circuit for seat belt pre-tensioner (LH) is shorted to a power supply circuit.</li> </ul>	<ol> <li>Replace the harness if it has visible damage.</li> <li>If the harness check is OK, replace</li> </ol>	SC
PRE-TEN FRONT LH [GND-SHORT]	• The circuit for seat belt pre-tensioner (LH) is shorted to ground.	the diagnosis sensor unit and front LH seat belt. (Before disposing of the seat belt	EL
PRE-TEN FRONT LH [SHORT]	• The circuit for seat belt pre-tensioner (LH) is shorted between wires.	pre-tensioner (LH), it must be deployed.)	IDX

(E) Trouble Diagnoses with CONSULT-II (Cont'd)

Diagnostic item	Explanation	Repair order
PRE-TEN FRONT RH [OPEN]	• The circuit for front RH pre-tensioner is open.	1. Visually check the wiring harness connections.
PRE-TEN FRONT RH [VB-SHORT]	<ul> <li>The circuit for seat belt pre-tensioner (RH) is shorted to a power supply circuit.</li> </ul>	<ol> <li>Replace the harness if it has visible damage.</li> <li>If the harness check is OK, replace</li> </ol>
PRE-TEN FRONT RH [GND-SHORT]	<ul> <li>The circuit for seat belt pre-tensioner (RH) is shorted to ground.</li> </ul>	the diagnosis sensor unit and front RH seat belt. (Before disposing of the seat belt
PRE-TEN FRONT RH [SHORT]	<ul> <li>The circuit for seat belt pre-tensioner (RH) is shorted between wires.</li> </ul>	pre-tensioner (RH), it must be deployed.)
CONTROL UNIT	<ul> <li>Diagnosis sensor unit is malfunctioning.</li> </ul>	<ol> <li>Visually check the wiring harness connection.</li> <li>Replace the harness if it has visible damage.</li> <li>If the harness check is OK, replace the diagnosis sensor unit.</li> </ol>

\* Follow the procedures in numerical order when repairing malfunctioning parts, then make the final system check.



# Trouble Diagnoses without CONSULT-II DIAGNOSTIC PROCEDURE 6

Inspecting SRS malfunctioning parts by using "AIR BAG" warning lamp — Diagnosis mode

#### NOTE:

# SRS will not enter Diagnosis mode if no malfunction is detected in User mode.

- 1. Turn ignition switch "ON".
- 2. After "AIR BAG" warning lamp lights for 7 seconds, turn ignition switch "OFF" within 1 second.
- 3. Wait more than 3 seconds.
- 4. Repeat steps 1 to 3 two times. (Perform 3 times in total.)
- 5. Turn ignition switch "ON". SRS is now in Diagnosis mode.
- 6. "AIR BAG" warning lamp operates in Diagnosis mode as follows:

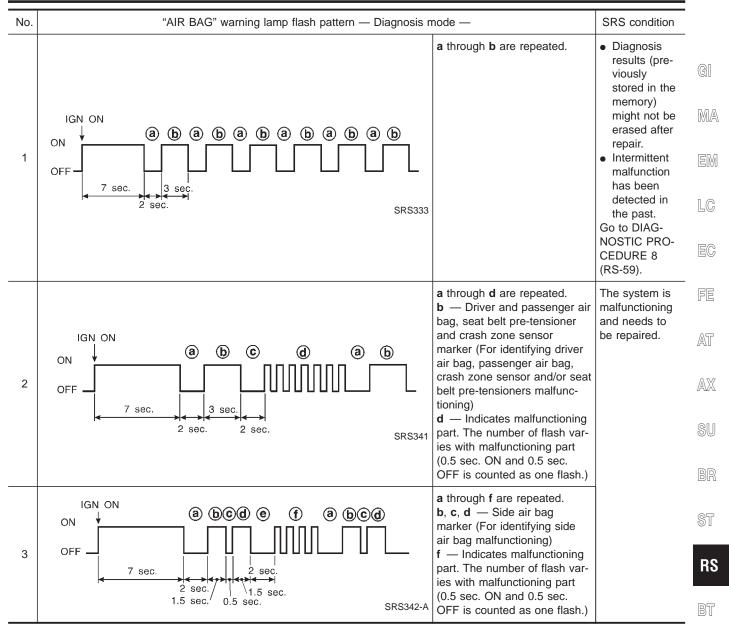
#### NOTE:

If SRS does not enter Diagnosis mode even though malfunction is detected in User mode, check the battery voltage.

If the battery voltage is less than 9V, charge the battery. Then go to DIAGNOSTIC PROCEDURE 7, page RS-57.

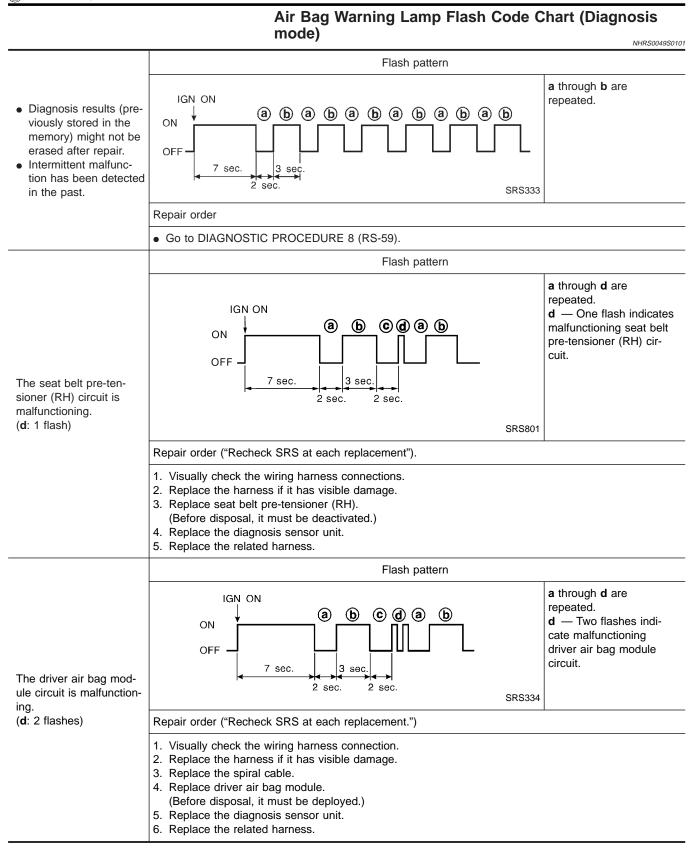
If the battery voltage is OK, replace the diagnosis sensor unit.

() Trouble Diagnoses without CONSULT-II (Cont'd)

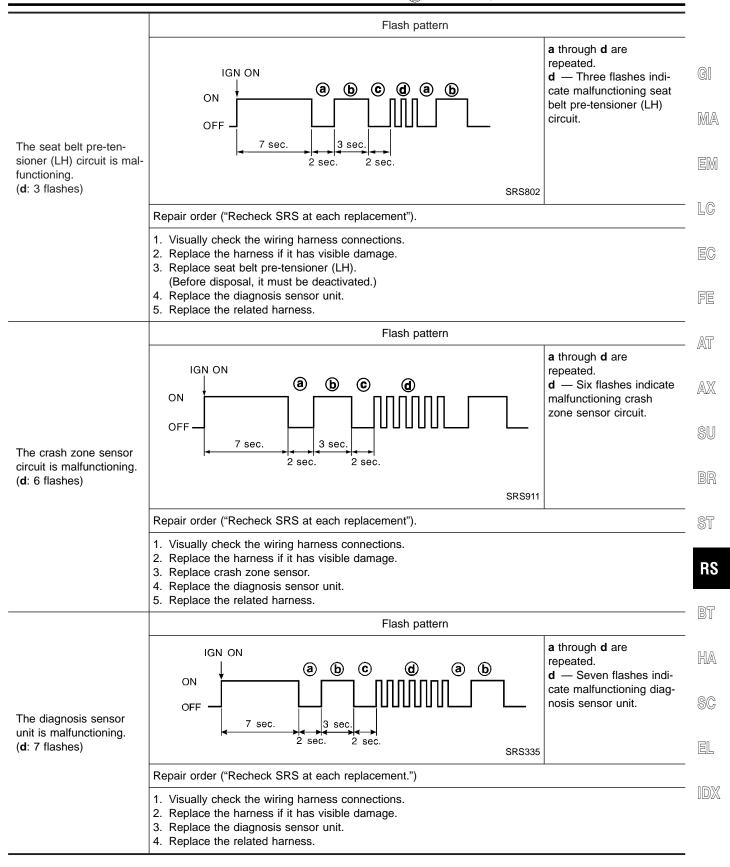


- Malfunctioning part is indicated by the number of flashes (part d or f). Compare the number of flashes to "Air Bag Warning Lamp Flash Code Chart", page RS-54, and locate malfunctioning part.
- 8. Turn ignition switch "OFF", and disconnect both battery cables. SC
- Repair the system as outlined by the "Repair order" in "Warning Lamp Flash Code Chart" that corresponds to the flash code. For replacement procedure of component parts, refer to RS-18.
- 10. After repairing the system, go to DIAGNOSTIC PROCEDURE 7, page RS-57.

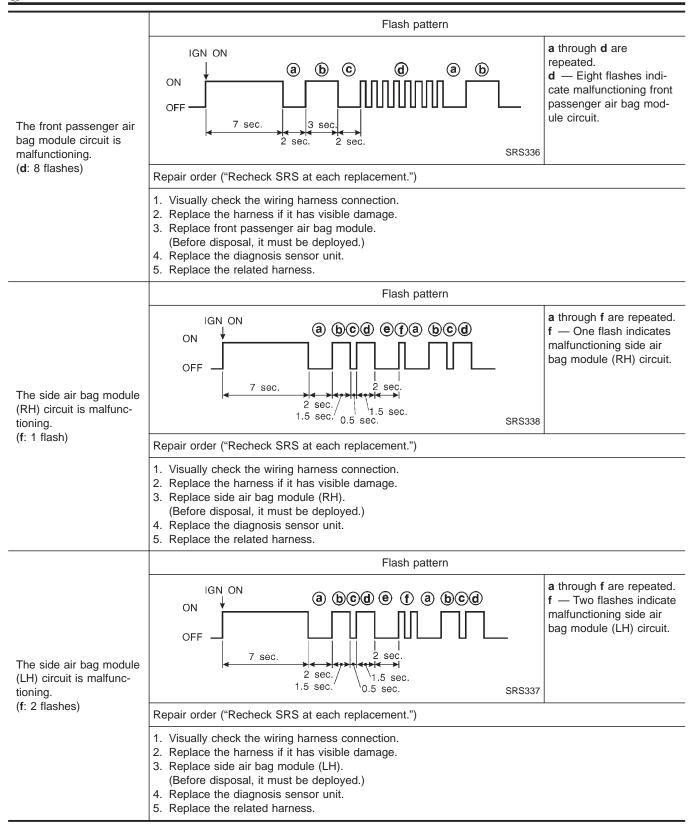
🕱 Trouble Diagnoses without CONSULT-II (Cont'd)



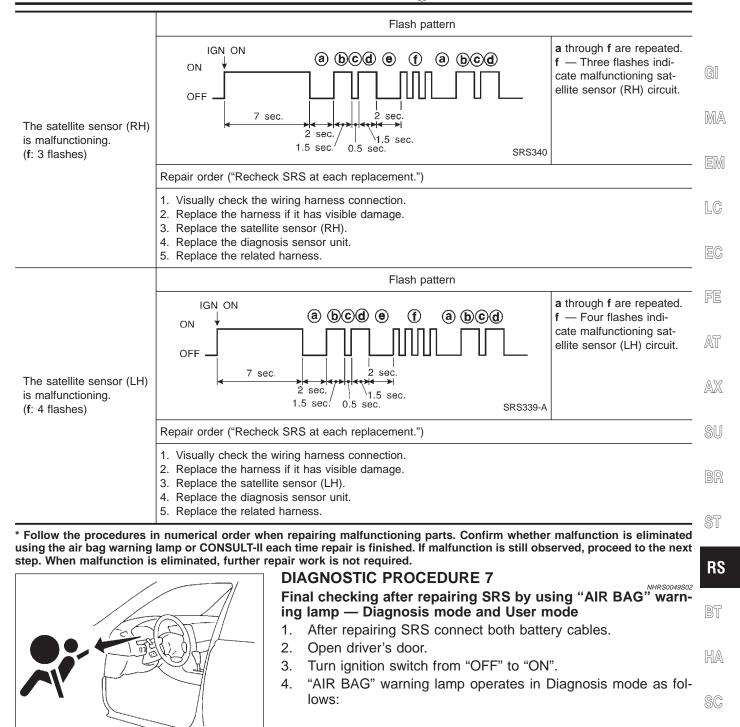
Trouble Diagnoses without CONSULT-II (Cont'd)



🕱 Trouble Diagnoses without CONSULT-II (Cont'd)



Trouble Diagnoses without CONSULT-II (Cont'd)

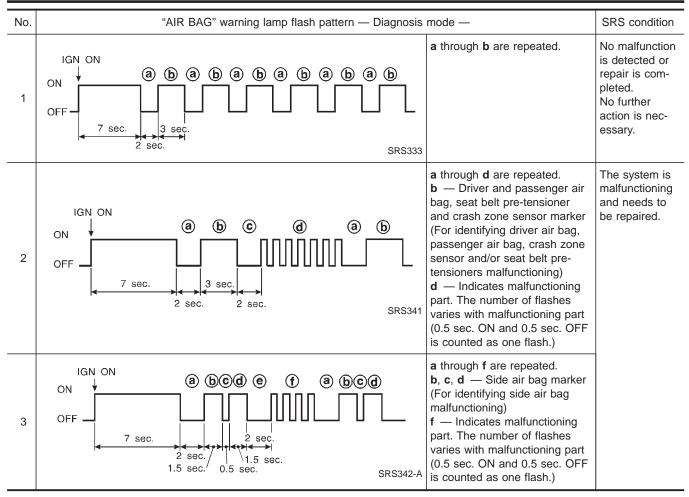


EL

DX

SRS800

🕱 Trouble Diagnoses without CONSULT-II (Cont'd)



#### NOTE:

When diagnosis sensor unit is replaced with new one, "AIR BAG" warning lamp will operate in User mode. Checking "AIR BAG" warning lamp operation in Diagnosis mode is not required. Go to step 6.

5. If "AIR BAG" warning lamp operates as shown in No. 1 in chart above, turn ignition switch "OFF" to reset from Diagnosis mode to User mode and to erase the memory of the malfunction. Then go to step 6.

If "AIR BAG" warning lamp operates as shown in No. 2 or No. 3 in chart above, the malfunctioning part is not repaired completely, or another malfunctioning part is detected. Go to DIAGNOSTIC PROCEDURE 6, page RS-52, and repair malfunctioning part completely.

6. Turn ignition switch "ON". "AIR BAG" warning lamp operates in User mode. Compare "AIR BAG" warning lamp operation to the chart below.

#### NOTE:

If switching Diagnosis mode to User mode is required while malfunction is being detected, by turning ignition switch as follows:

- 1) Turn ignition switch "ON".
- 2) After "AIR BAG" warning lamp lights for 7 seconds, turn ignition switch "OFF" within 1 second.
- 3) Wait more than 3 seconds.
- 4) Repeat steps 1 to 3 two times. (Perform 3 times in total.)
- 5) Turn ignition switch "ON".

SRS is now in User mode.

**RS-58** 

Trouble Diagnoses without CONSULT-II (Cont'd)

"AIR BAG" warning lam	p operation — User mode —	SRS condition	Reference item	
IGN ON ON OFF 7 sec.		No malfunction is detected. No further action is neces- sary.	_	GI MA
ORF 0.5 sec. 0.5 sec.		The system is malfunction- ing and needs to be repaired as indicated.	Go to DIAGNOSTIC PRO- CEDURE 6 (RS-52).	EM LC
IGN ON	MRS096A	Air bag is deployed. Seat belt pre-tensioner is deployed.	Go to COLLISION DIAG- NOSIS (RS-63).	EC
ON OFF	MRS097A	Air bag fuse, diagnosis sensor unit or harness is malfunctioning and needs to be repaired.	Go to DIAGNOSTIC PRO- CEDURE 9 (RS-60).	· FE AT
		<ul> <li>One of the following has occurred and needs to be repaired.</li> <li>Meter fuse is blown.</li> <li>"AIR BAG" warning lamp circuit has open or</li> </ul>	Go to DIAGNOSTIC PRO- CEDURE 10 (RS-62).	AX SU
	MRS098A	<ul> <li>short.</li> <li>Diagnosis sensor unit is malfunctioning.</li> </ul>		BR
	DIAGNOSTIC PI	ROCEDURE 8 (CON ROCEDURE 6) nalfunctioning record	TINUED FROM	ST
1 CONSIDER POSSIBILI	TY OF NOT ERASING SELF-DIAG	<u> </u>	R REPAIRING	RS
Is it the first time for maintenance	ce of SRS? Yes or No			BT
Yes 🕨	Go to DIAGNOSTIC PROCEDURE without CONSULT-II.)	5 (RS-48). (Further inspect	ion cannot be performed	HA
No	No Diagnosis results (previously stored in the memory) might not be erased after repair. G to DIAGNOSTIC PROCEDURE 7, step 5 (RS-57).		be erased after repair. Go	SC

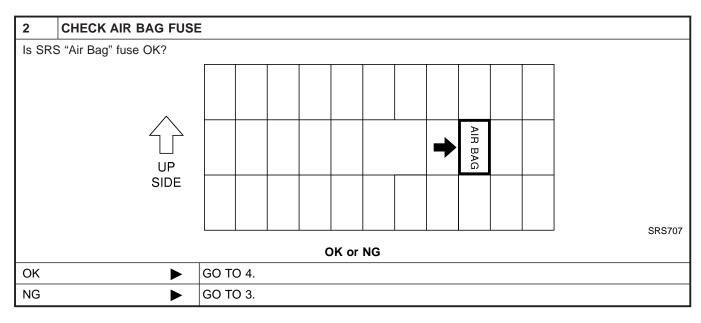
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Trouble Diagnoses: "AIR BAG" Warning Lamp Does Not Turn Off

# Trouble Diagnoses: "AIR BAG" Warning Lamp Does Not Turn Off

#### **DIAGNOSTIC PROCEDURE 9**

	NHRS0050511			
1	SEE THE DEPLOYMENT OF AIR BAG MODULE			
ls air b	Is air bag module deployed?			
	Yes or No			
Yes	Yes Refer to COLLISION DIAGNOSIS (RS-63).			
No		GO TO 2.		



3	CHECK AIR BAG FUSE AGAIN			
Replac	Replace "AIR BAG" fuse and turn ignition switch ON.			
	Is "AIR BAG" fuse blown again?			
Yes	Yes  Repair main harness.			
No	►	INSPECTION END		

Trouble Diagnoses: "AIR BAG" Warning Lamp Does Not Turn Off (Cont'd)

4	CHECK DIAGNOSIS SI	INSOR UNIT	
	ect CONSULT-II and touch		
● Is "	AIR BAG" displayed on CC	NSULT-II?	(
		SELECT SYSTEM	
		ENGINE	[
		A/T	
		AIR BAG	[
			[
			SRS771
		Yes or No	
Yes	►	GO TO 5.	[
No	• Visually check the wiring harness connection of diagnosis sensor unit. If the harness connection check result is OK, replace diagnosis sensor unit.		s

5	CHECK HARNESS CONNECTION		
Is harness connection between warning lamp and diagnosis sensor unit OK?			AX
OK or NG			<b>A</b> II
ОК	►	Replace diagnosis sensor unit.	SU
NG	►	Connect "AIR BAG" warning lamp and diagnosis sensor unit connector properly. If "AIR BAG" warning lamp still does not go off, replace harness.	BR

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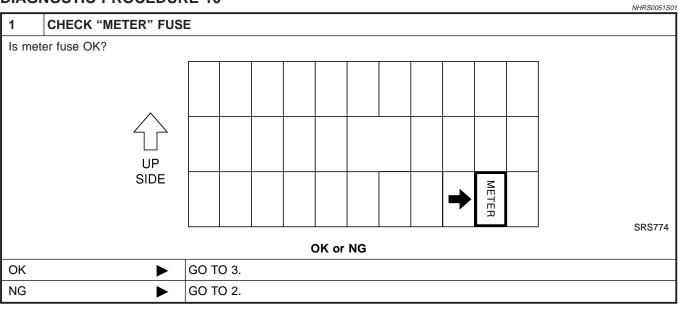
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Trouble Diagnoses: "AIR BAG" Warning Lamp Does Not Turn On

# Trouble Diagnoses: "AIR BAG" Warning Lamp Does Not Turn On

#### DIAGNOSTIC PROCEDURE 10



2	CHECK "METER" FUSE AGAIN		
Replace meter fuse and turn ignition switch ON.			
Is meter fuse blown again?			
Yes	Yes   Repair main harness.		
No	No INSPECTION END		

3	CHECK HARNESS CONNECTION BETWEEN DIAGNOSIS SENSOR UNIT AND COMBINATION METER			
<ul><li>Disconnect diagnosis sensor unit connector and turn ignition switch "ON".</li><li>Does "AIR BAG" warning lamp turn on?</li></ul>				
Yes or No				
Yes	Yes  Replace diagnosis sensor unit.			
No	•	Check the ground circuit of "AIR BAG" warning lamp.		

Collision Diagnosis

NHRS0033S0701

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#### **Collision Diagnosis** =NHRS0033 FOR FRONTAL COLLISION NHRS0033S07 To repair the SRS, perform the following steps. When SRS (except the side air bag) is activated in a collision: Replace the diagnosis sensor unit. 2) Remove the air bag modules (except the side air bag module), crash zone sensor assembly, bracket and MA seat belt pre-tensioner assemblies. 3) Check the SRS components using the table shown below: Replace any SRS components showing visible signs of damage (dents, cracks and deformation). • EM 4) Install new air bag modules (except the side air bag module) and seat belt pre-tensioner assemblies. 5) Conduct self-diagnosis using CONSULT-II or "AIR BAG" warning lamp. Refer to "SRS Operation Check" LC for details (RS-42). Ensure entire SRS operation properly. When SRS is not activated in a collision: 1) Check the SRS components using the table shown below:

- Replace any SRS components showing visible signs of damage (dents, cracks and deformation).
- 2) Conduct self-diagnosis using CONSULT-II or "AIR BAG" warning lamp. Refer to "SRS Operation Check" for details (RS-42). Ensure entire SRS operation properly.

#### SRS Inspection (For frontal collision)

Part	SRS is activated	SRS is NOT activated	AT.
Air bag module (driver and passenger side)	REPLACE Install with new bolts.	<ol> <li>Remove air bag module. Check harness cover and connectors for damage, terminals for deformities, and harness for binding.</li> <li>a. Install driver air bag module into the steering wheel to check fit and alignment with the wheel.</li> <li>b. Install passenger air bag module into the instrument panel to check fit with the instrument panel.</li> <li>No damage found, reinstall with new bolts.</li> <li>If damaged—REPLACE. Install air bag modules with new special bolts coated with bonding agent. Air bag must be deployed before disposal.</li> </ol>	AX SU BR
Crash zone sensor	REPLACE the crash zone sensor and bracket with new nuts and bolts.	<ol> <li>Remove the crash zone sensor. Check harness connectors for damage, terminals for deformities, and harness for binding.</li> <li>Check for visible signs of damage (dents, cracks, deformation) of the crash zone sensor and bracket.</li> <li>Install the crash zone sensor to check fit.</li> <li>If no damage is found, reinstall the crash zone sensor with new nuts.</li> <li>If damaged—REPLACE the crash zone sensor and bracket with new nuts and bolts.</li> </ol>	ST RS BT
Seat belt pre-ten- sioner assembly	REPLACE Install seat belt pre- tensioner with new bolts.	<ol> <li>Remove seat belt pre-tensioners. Check harness cover and connectors for damage, terminals for deformities, and harness for binding.</li> <li>Check belts for damage and anchors for loose mounting.</li> <li>Check retractor for smooth operation.</li> <li>If no damage is found, reinstall seat belt pre-tensioner assembly.</li> <li>If damaged—REPLACE. Install the seat belt pre-tensioners with new bolts. Seat belt pre-tensioners must be deployed before disposal.</li> </ol>	- HA SC EL
Diagnosis sensor unit	REPLACE Install with new bolts.	<ol> <li>Check case for dents, cracks or deformities.</li> <li>Check connectors for damage, and terminals for deformities.</li> <li>If no damage is found, reinstall with new bolts and ground bolt.</li> <li>If damaged—REPLACE. Install diagnosis sensor unit with new bolts and ground bolt.</li> </ol>	IDX
Steering wheel	<ol> <li>Visually check steering wheel for deformities.</li> <li>Check harness (built into steering wheel) and connectors for damage, and terminals for deformities.</li> <li>Install air bag module to check fit or alignment with steering wheel.</li> <li>Check steering wheel for excessive free play.</li> <li>If no damage is found, reinstall with bolts.</li> <li>If damaged—REPLACE.</li> </ol>		

Collision Diagnosis (Cont'd)

Part	SRS is activated	SRS is NOT activated	
Spiral cable	2. Check connectors a		
Harness and Connec- tors	<ol> <li>Check connectors for poor connection, damage, and terminals for deformities.</li> <li>Check harness for binding, chafing, cuts, or deformities.</li> <li>If no damage is found, reinstall the harness and connectors.</li> <li>Damaged—REPLACE damaged section of harness. Do not attempt to repair, splice or modify any S harness.</li> </ol>		
Instrument panel	<ol> <li>When passenger air</li> <li>Opening portion for particular pressure of the passenger and the passenger</li></ol>	r bag inflates, check the following points for bending, deformities or cracks. bassenger air bag	
	December di base	SRS794	
	<ul> <li>Passenger air bag m</li> </ul>	nodule brackets Back face of instrument panel	
		SRS795-A	
	• The portions securin		
		SRS796	
		nd, reinstall the instrument panel. ACE the instrument panel with bolts.	

#### FOR SIDE COLLISION

To repair the SRS for a side collision, perform the following steps.

When the side air bag is activated in the side collision:

- 1) Replace the following component:
- All parts of seatback (including seatback frame) with side air bag module (on the side on which side air bag is activated) MA
- Diagnosis sensor unit
- Satellite sensor
- Check the SRS components and the related parts using the table shown below. 2)
- Replace any SRS components and the related parts showing visible signs of damage (dents, cracks, deformation).
- Conduct self-diagnosis using CONSULT-II or "AIR BAG" warning lamp. Refer to "SRS Operation Check" 3) LC for details (RS-42). Ensure entire SRS operation properly.

#### When SRS is not activated in the side collision or when only one air bag module is activated in a collision.

- Check the SRS components and the related parts using the table shown below. 1)
- Replace any SRS components and the related parts showing visible signs of damage (dents, cracks, FE deformation).
- 2) Conduct self-diagnosis using CONSULT-II or "AIR BAG" warning lamp. Refer to "SRS Operation Check" for details (RS-42). Ensure entire SRS operation properly.

Only one front air bag my inflate in a crash, depending on the crash severity and whether the front occupants are belted or unbelted. This does not indicate improper performance of the system. Conduct self-diagnosis to make sure the entire SRS system operates properly.

#### SRS Inspection (For side collision)

Part	Side air bag is acti-	SRS is NOT activated	SI
	vated		
Side air bags module (LH or RH)	REPLACE all parts of seat back with deployed side air bag module.	<ol> <li>Check for visible signs of damage (dents, tears, deformation) of the seat back on the collision side.</li> <li>If damaged—REPLACE the damaged seat parts with new bolts and remove the side air bag module.</li> <li>Check for visible signs of damaged (tesrs etc.) of the side air bag module.</li> <li>Check harness and connectors for damage, and terminals for deformities.</li> </ol>	BF
		<ol> <li>If no damaged is found, reinstall the side air bag module with new torx nuts coated with bonding agent.</li> </ol>	R
		<ol> <li>If damaged—REPLACE the side air bag module with new torx nuts coated with bonding agent. Air bag must be deployed before disposal.</li> </ol>	BT
Satellite sensor (LH or RH)	REPLACE the satel- lite sensor on the col- lision side with new nuts coated with	<ol> <li>Remove the satellite sensor on the collision side. Check harness connectors for damage, terminals for deformities, and harness for binding.</li> <li>Check for visible signs of damage (dents, cracks, deformation) of the satellite sensor.</li> </ol>	HÆ
	bonding agent. (Repair the center pillar inner, etc. before installing new one if damaged.)	<ol> <li>Install the satellite sensor to check fit.</li> <li>If no damage is found, reinstall the satellite sensor with new nuts coated with bonding agent.</li> <li>If damaged—REPLACE the satellite sensor with new nuts coated with bonding agent.</li> </ol>	SC
Diagnosis sensor unit	REPLACE the diag- nosis sensor unit with the new bolts.	<ol> <li>Check case and bracket for dents, cracks or deformities.</li> <li>Check connectors for damage, and terminals for deformities.</li> <li>If no damage is found, reinstall the diagnosis sensor unit with new bolts and ground bolt.</li> <li>If damaged—REPLACE. Install the diagnosis sensor unit with new bolts and ground bolt.</li> </ol>	

Collision Diagnosis (Cont'd)

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Collision Diagnosis (Cont'd)

Part	Side air bag is acti- vated	SRS is NOT activated
Seat belt pre-ten- sioner assembly	<ol> <li>Check if the seat belt can be extended smoothly. If the seat belt cannot be extended smoothly.</li> <li>Check for deformities of the center pillar inner.</li> <li>If the center pillar inner has no damage, REPLACE the seat belt pre-tensioner assembly.</li> <li>Remove the seat belt pre-tensioner assembly on the collision side. Check harness cover and connectors for damage, terminals for deformities, and harness for binding.</li> <li>Check for visible signs of damage (dents, cracks, deformation) of the seat belt pre-tensioner assembly.</li> <li>If no damage is found, reinstall the seat belt pre-tensioner assembly.</li> <li>If damaged—REPLACE the seat belt pre-tensioner assembly with new bolts coated with bonding agent. The seat belt pre-tensioner assembly must be deployed before disposal.</li> </ol>	
Seat with side air bag	REPLACE front seat- back assembly	<ol> <li>Visually check the seat on the collision side.</li> <li>Remove the seat on the collision side and check the following for damage and deformities.</li> <li>Harness, connectors and terminals</li> <li>Frame and recliner (for front and rear seat), and also adjuster and slides (for front seat)</li> <li>If no damage is found, reinstall the seat.</li> <li>If damaged—REPLACE the damaged seat parts with new bolts.</li> </ol>
Center pillar inner	<ol> <li>Check the center pillar inner on the collision side for damage (dents, cracks, deformation).</li> <li>If damaged—REPAIR the center pillar inner.</li> </ol>	
Trim	<ol> <li>Check for visible signs of damage (dents, cracks, deformation) of the interior trim on the collision side.</li> <li>If damaged—REPLACE the damaged trim parts.</li> </ol>	