

SECTION **PG**

**POWER SUPPLY, GROUND & CIRCUIT ELEMENTS**

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# PRECAUTIONS

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## PRECAUTION

### PRECAUTIONS

#### Precaution for Supplemental Restraint System (SRS) "AIR BAG" and "SEAT BELT PRE-TENSIONER"

INFOID:000000011288263

The Supplemental Restraint System such as "AIR BAG" and "SEAT BELT PRE-TENSIONER", used along with a front 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, depending on the severity of a collision and whether the front occupants are belted or unbelted. Information necessary to service the system safely is included in the SR and SB section of this Service Manual.

#### **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 must be performed by an authorized NISSAN/INFINITI dealer.
- Improper maintenance, including incorrect removal and installation of the SRS, can lead to personal injury caused by unintentional activation of the system. For removal of Spiral Cable and Air Bag Module, see the SR section.
- 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 harnesses or harness connectors.

#### PRECAUTIONS WHEN USING POWER TOOLS (AIR OR ELECTRIC) AND HAMMERS

#### **WARNING:**

- When working near the Airbag Diagnosis Sensor Unit or other Airbag System sensors with the Ignition ON or engine running, DO NOT use air or electric power tools or strike near the sensor(s) with a hammer. Heavy vibration could activate the sensor(s) and deploy the air bag(s), possibly causing serious injury.
- When using air or electric power tools or hammers, always switch the Ignition OFF, disconnect the battery, and wait at least three minutes before performing any service.

#### Precaution Necessary for Steering Wheel Rotation After Battery Disconnect

INFOID:000000011288264

#### **NOTE:**

- This Procedure is applied only to models with Intelligent Key system and NATS (NISSAN ANTI-THEFT SYSTEM).
- Remove and install all control units after disconnecting both battery cables with the ignition knob in the "LOCK" position.
- Always use CONSULT to perform self-diagnosis as a part of each function inspection after finishing work. If DTC is detected, perform trouble diagnosis according to self-diagnostic results.

For models equipped with the Intelligent Key system and NATS, an electrically controlled steering lock mechanism is adopted on the key cylinder.

For this reason, if the battery is disconnected or if the battery is discharged, the steering wheel will lock and steering wheel rotation will become impossible.

If steering wheel rotation is required when battery power is interrupted, follow the procedure below before starting the repair operation.

#### OPERATION PROCEDURE

1. Connect both battery cables.

#### **NOTE:**

Supply power using jumper cables if battery is discharged.

2. Use the Intelligent Key or mechanical key to turn the ignition switch to the "ACC" position. At this time, the steering lock will be released.
3. Disconnect both battery cables. The steering lock will remain released and the steering wheel can be rotated.
4. Perform the necessary repair operation.

# PRECAUTIONS

## < PRECAUTION >

5. When the repair work is completed, return the ignition switch to the "LOCK" position before connecting the battery cables. (At this time, the steering lock mechanism will engage.)
6. Perform a self-diagnosis check of all control units using CONSULT.

### Precaution for Power Generation Variable Voltage Control System

INFOID:000000011288265

#### **CAUTION:**

For this model, the battery current sensor that is installed to the negative battery cable measures the charging/discharging current of the battery and performs various engine controls. If an electrical component is connected directly to the negative battery terminal, the current flowing through that component will not be measured by the battery current sensor. This condition may cause a malfunction of the engine control system and battery discharge may occur. Do not connect an electrical component or ground wire directly to the battery terminal.

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# PREPARATION

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## PREPARATION

### PREPARATION

#### Special Service Tool

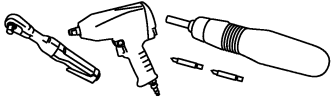
INFOID:000000011288266

The actual shape of the tools may differ from those illustrated here.

Tool number (TechMate No.) Tool name	Description
<p>— (—) Model GR8-1200 NI Multitasking battery and electrical diagnostic station</p>  <p style="text-align: right; font-size: small;">AWIIA12392Z</p>	<p>Tests batteries, starting and charging systems and charges batteries. For operating instructions, refer to diagnostic station instruction manual.</p>
<p>— (—) Model EXP-800 NI Battery and electrical diagnostic analyzer</p>  <p style="text-align: right; font-size: small;">JSMIA08062Z</p>	<p>Tests batteries and charging systems. For operating instructions, refer to diagnostic analyzer instruction manual.</p>

#### Commercial Service Tool

INFOID:000000011288267

Tool name	Description
<p>Power tool</p>  <p style="text-align: right; font-size: small;">PIIB1407E</p>	<p>Loosening nuts, screws and bolts</p>

# ELECTRICAL UNITS LOCATION

< SYSTEM DESCRIPTION >

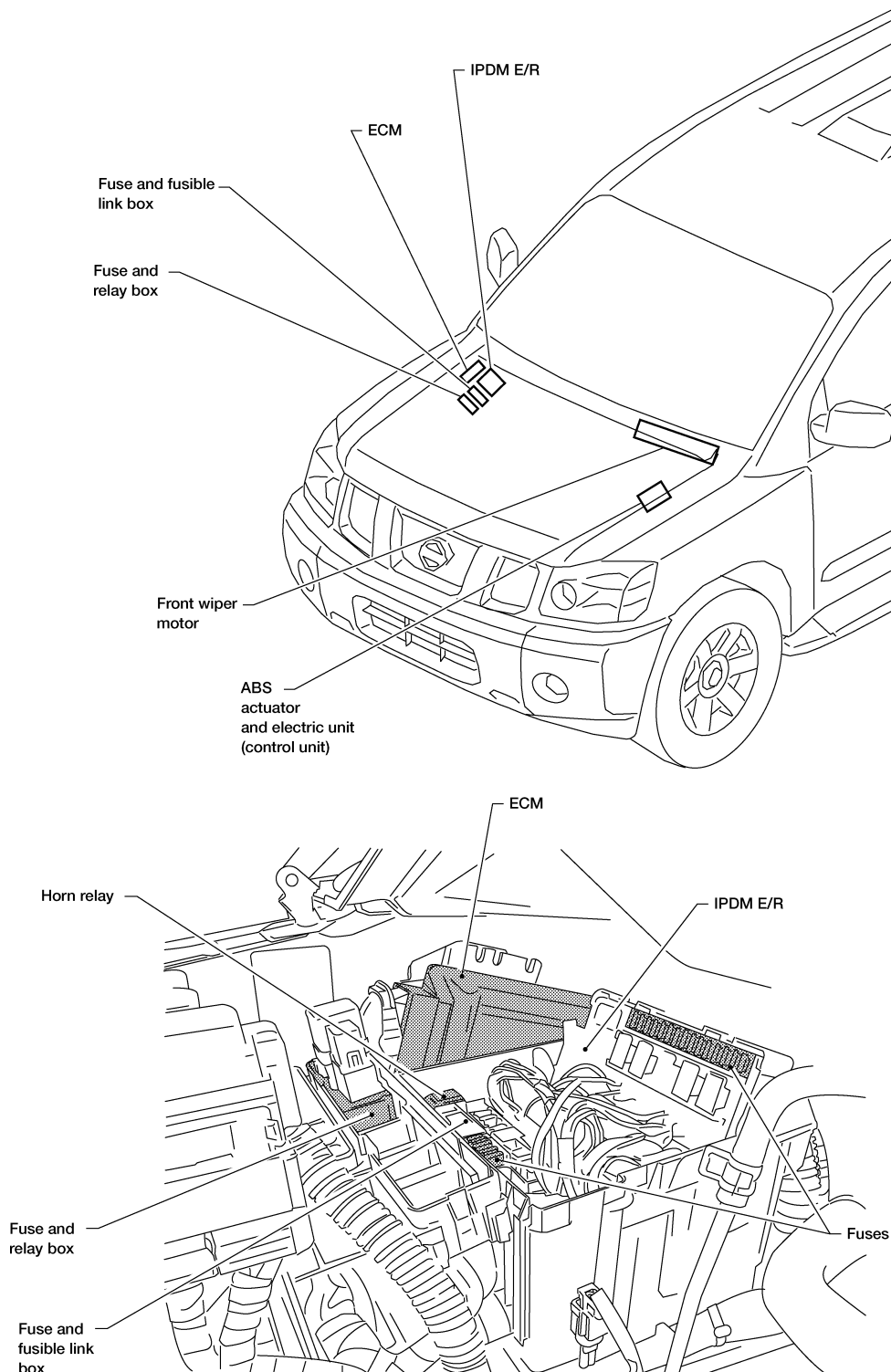
## SYSTEM DESCRIPTION

### ELECTRICAL UNITS LOCATION

#### Electrical Units Location

INFOID:000000011288279

#### ENGINE COMPARTMENT

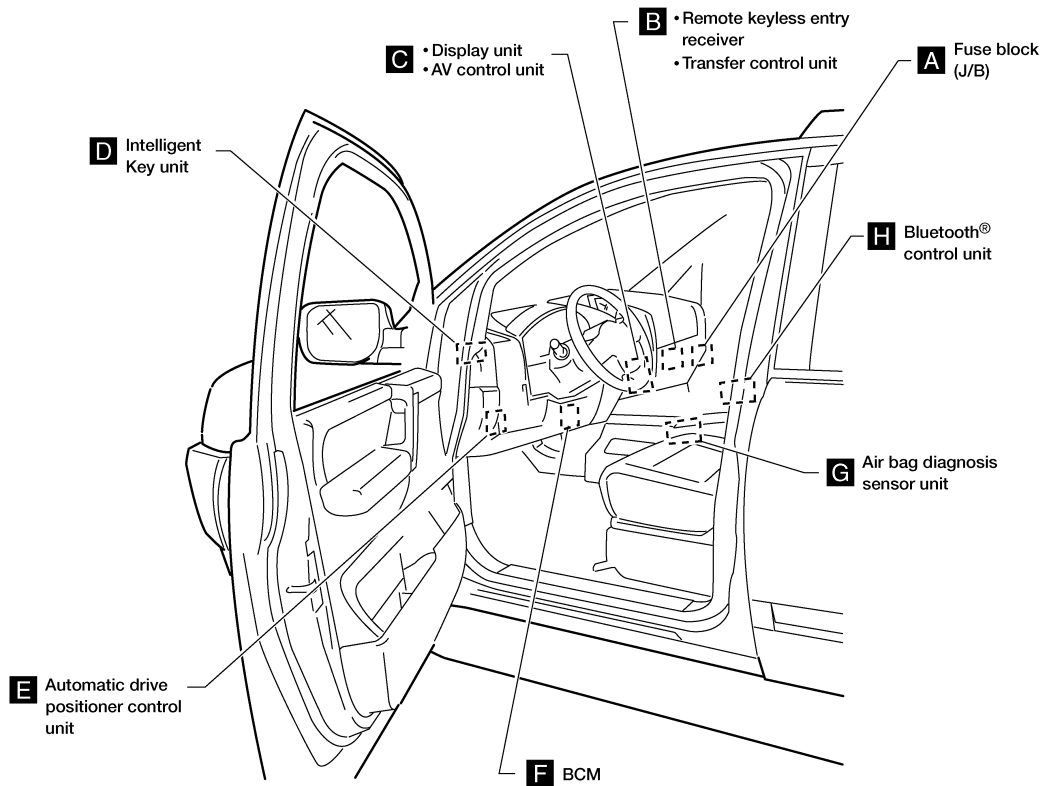


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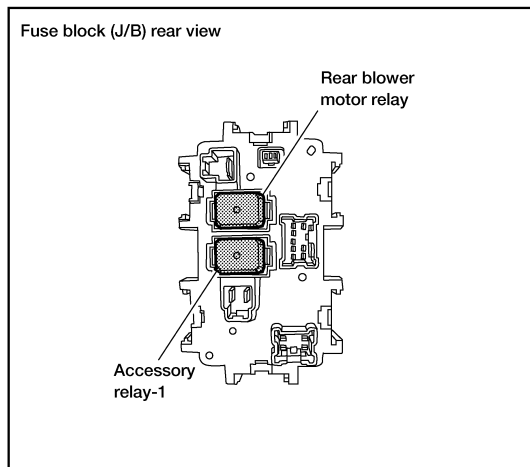
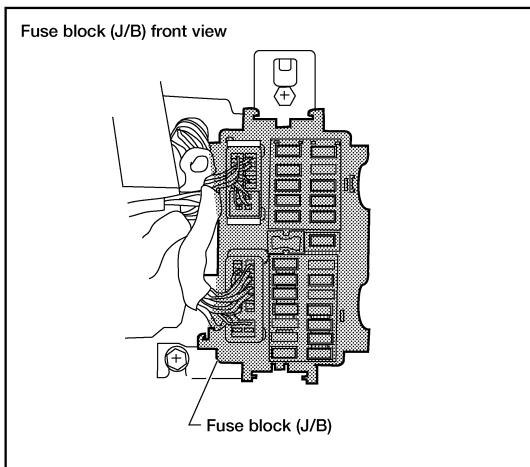
# ELECTRICAL UNITS LOCATION

< SYSTEM DESCRIPTION >

## PASSENGER COMPARTMENT



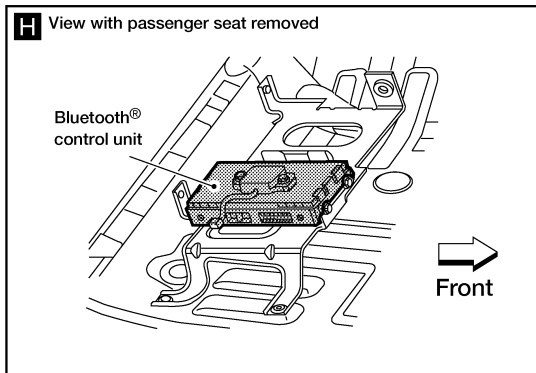
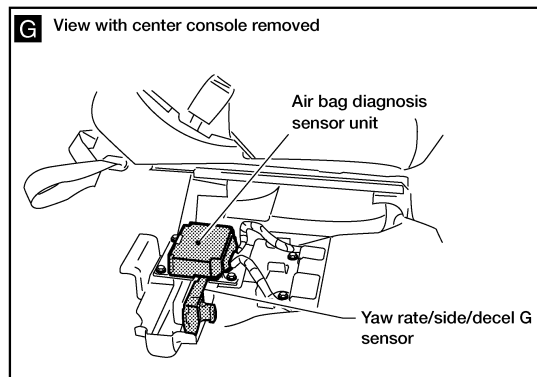
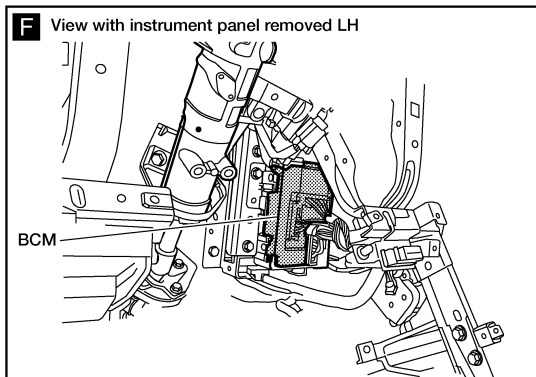
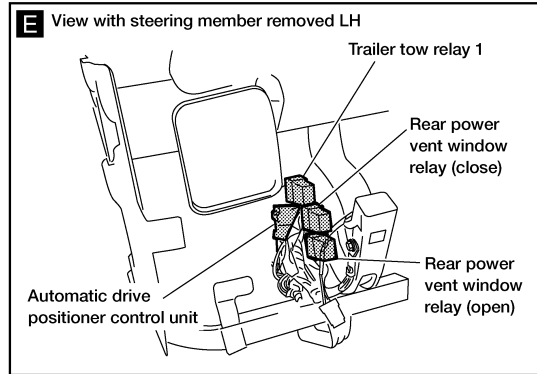
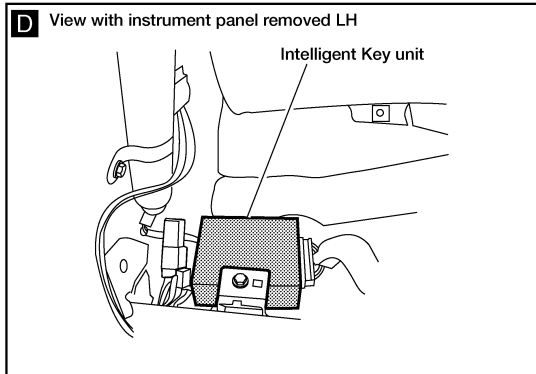
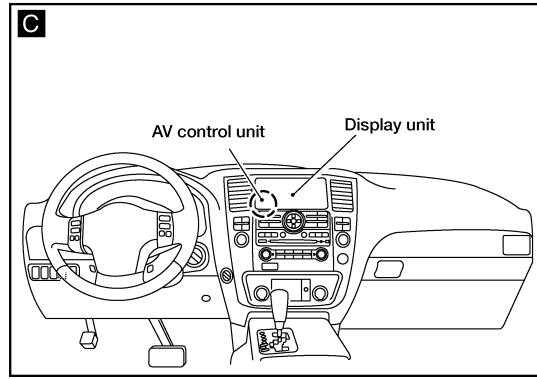
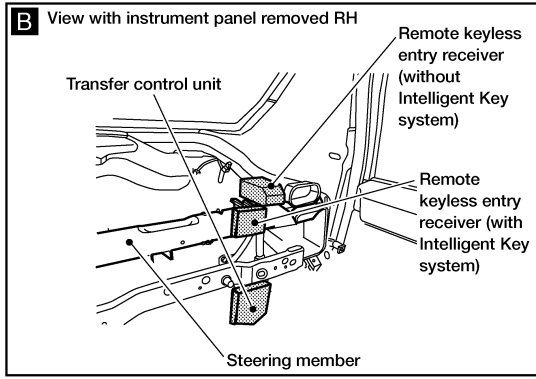
**A** Instrument panel side RH



ABMIA6732GB

# ELECTRICAL UNITS LOCATION

< SYSTEM DESCRIPTION >



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# COMPONENT PARTS

< SYSTEM DESCRIPTION >

## COMPONENT PARTS

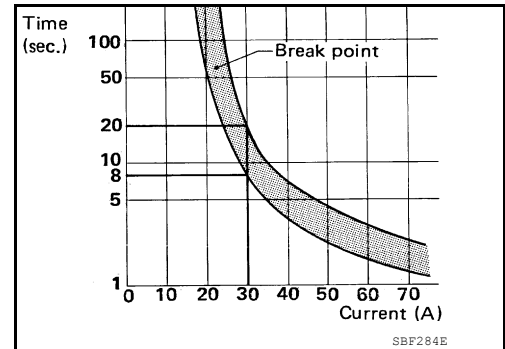
### Circuit Breaker (Built Into BCM)

INFOID:000000011376580

For example, when current is 30A, the circuit is broken within 8 to 20 seconds.

This circuit breaker is used for the following systems:

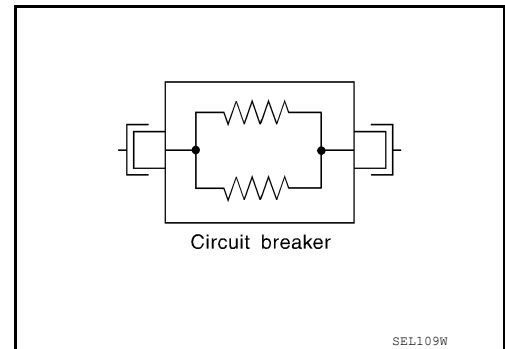
- Power windows
- Power moonroof



### Circuit Breaker (External to BCM)

INFOID:000000011288276

The PTC thermistor generates heat in response to current flow. The temperature (and resistance) of the thermistor element varies with current flow. Excessive current flow will cause the element's temperature to rise. When the temperature reaches a specified level, the electrical resistance will rise sharply to reduce the circuit current. This reduced current flow will cause the element to cool lowering the resistance accordingly. Once resistance falls to a specified level normal circuit current flow is allowed to resume.



### Harness Connector

INFOID:000000011288280

#### HARNESS CONNECTOR (TAB-LOCKING TYPE)

- The tab-locking type connectors help prevent accidental looseness or disconnection.
- The tab-locking type connectors are disconnected by pushing or lifting the locking tab(s). Refer to the figure below.

Refer to the next page for description of the slide-locking type connector.

#### **CAUTION:**

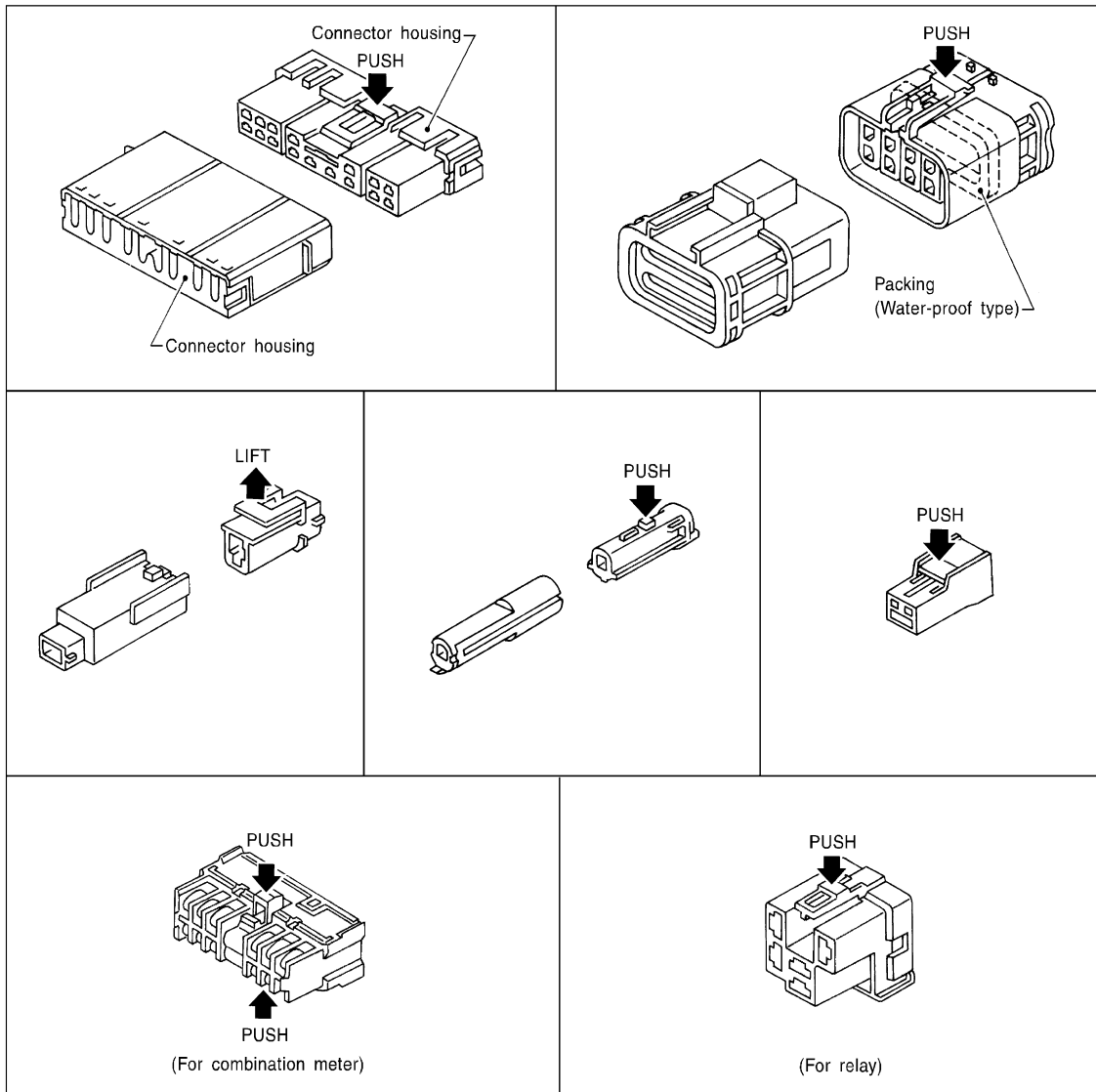
**Do not pull the harness or wires when disconnecting the connector.**



# COMPONENT PARTS

## < SYSTEM DESCRIPTION >

[Example]



SEL769DA

### HARNESS CONNECTOR (SLIDE-LOCKING TYPE)

- A new style slide-locking type connector is used on certain systems and components, especially those related to OBD.
- The slide-locking type connectors help prevent incomplete locking and accidental looseness or disconnection.
- The slide-locking type connectors are disconnected by pushing or pulling the slider. Refer to the figure below.

#### **CAUTION:**

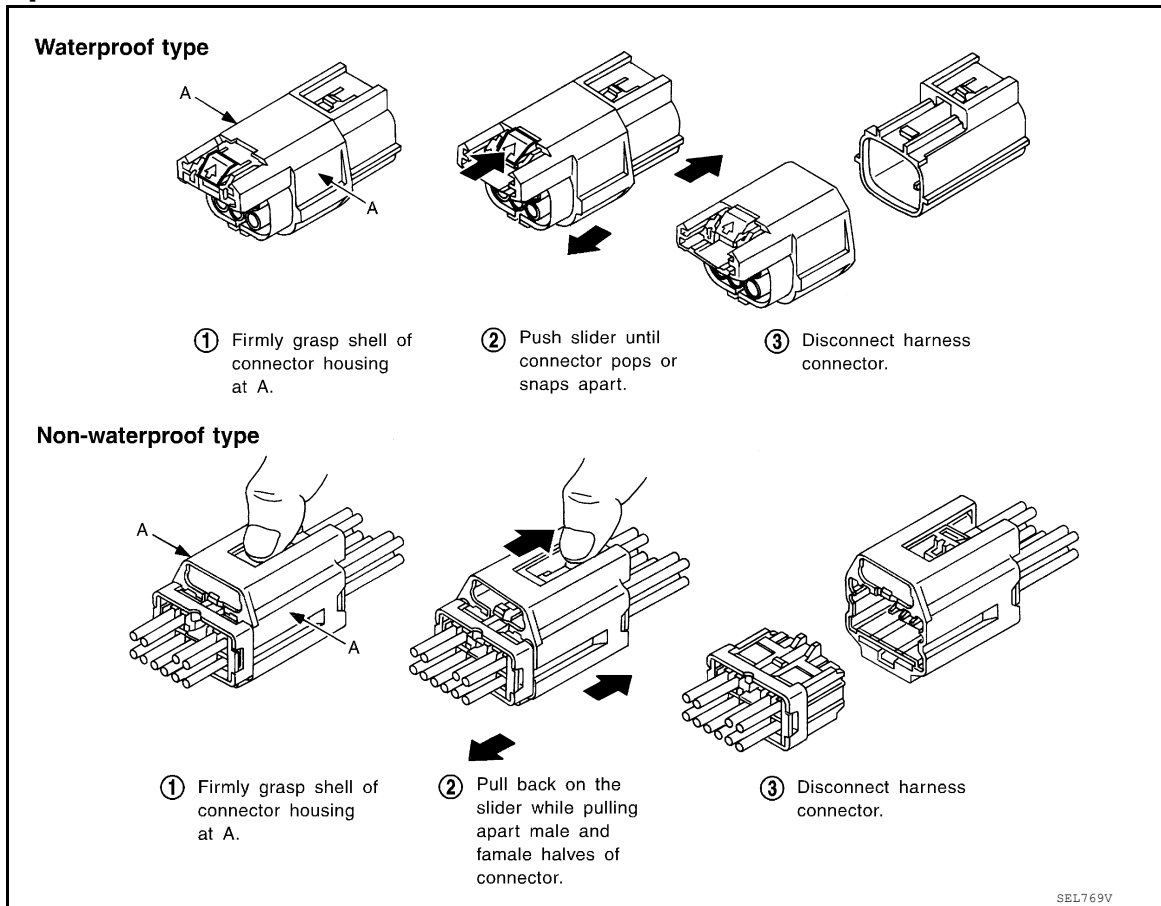
- **Do not pull the harness or wires when disconnecting the connector.**
- **Be careful not to damage the connector support bracket when disconnecting the connector.**

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# COMPONENT PARTS

## < SYSTEM DESCRIPTION >

[Example]



### HARNESS CONNECTOR (LEVER LOCKING TYPE)

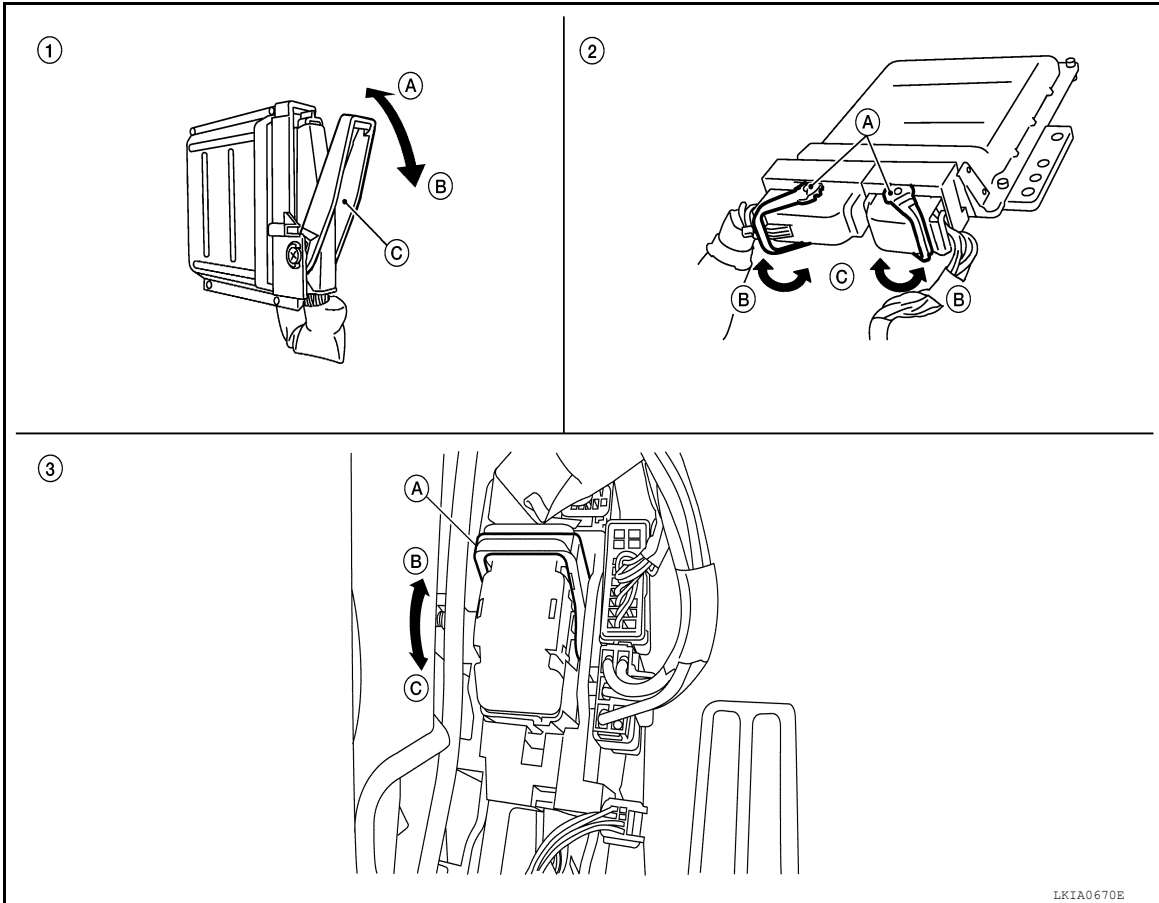
- Lever locking type harness connectors are used on certain control units and control modules such as ECM, ABS actuator and electric unit (control unit), etc.
- Lever locking type harness connectors are also used on super multiple junction (SMJ) connectors.
- Always confirm the lever is fully locked in place by moving the lever as far as it will go to ensure full connection.

**CAUTION:**

# COMPONENT PARTS

## < SYSTEM DESCRIPTION >

- Always confirm the lever is fully released (loosened) before attempting to disconnect or connect these connectors to avoid damage to the connector housing or terminals.



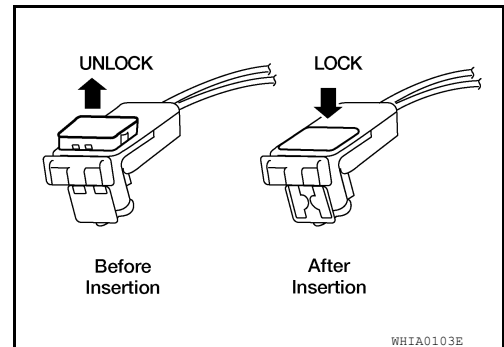
- |                                   |                                 |                  |
|-----------------------------------|---------------------------------|------------------|
| 1. Control unit with single lever | 2. Control unit with dual lever | 3. SMJ connector |
| A. Fasten                         | A. Lever                        | A. Lever         |
| B. Loosen                         | B. Fasten                       | B. Fasten        |
| C. Lever                          | C. Loosen                       | C. Loosen        |

## HARNESS CONNECTOR (DIRECT-CONNECT SRS COMPONENT TYPE)

- SRS direct-connect type harness connectors are used on certain SRS components such as air bag modules and seat belt pre-tensioners.
- Always pull up to release black locking tab prior to removing connector from SRS components.
- Always push down to lock black locking tab after installing connector to SRS components. When locked, the black locking tab is level with the connector housing.

### CAUTION:

- Do not pull the harness or wires when removing connectors from SRS components.



## Standardized Relay

## NORMAL OPEN, NORMAL CLOSED AND MIXED TYPE RELAYS

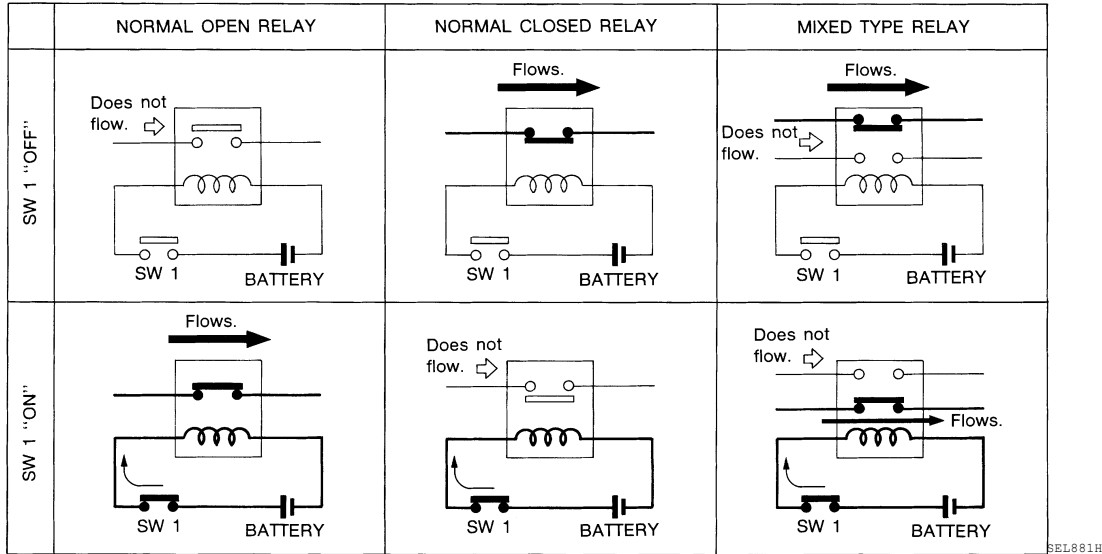
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# COMPONENT PARTS

## < SYSTEM DESCRIPTION >

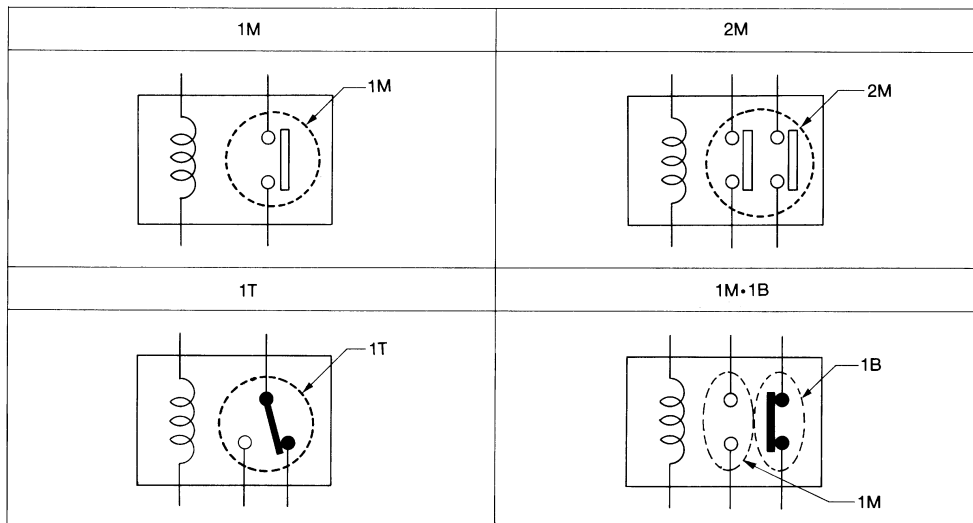
Relays can mainly be divided into three types: normal open, normal closed and mixed type relays.



SEL681H

## TYPE OF STANDARDIZED RELAYS

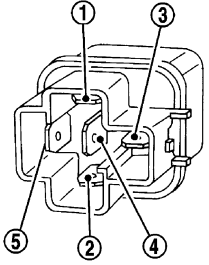
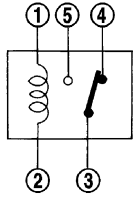
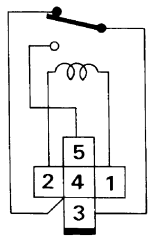
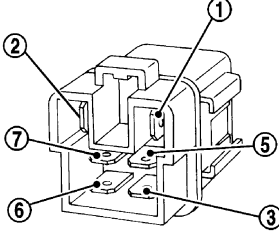
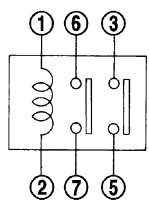
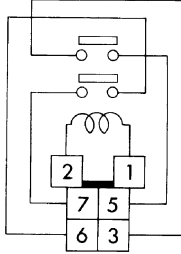
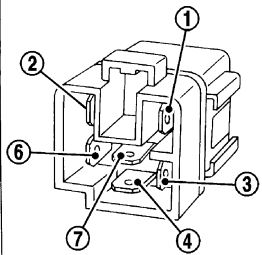
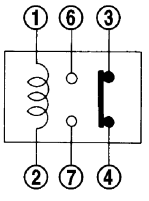
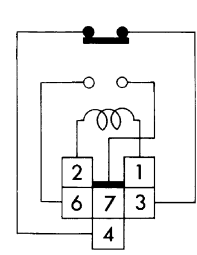
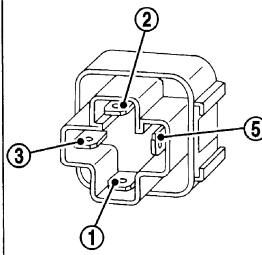
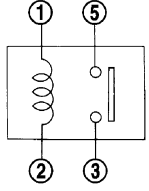
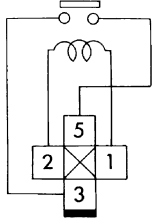
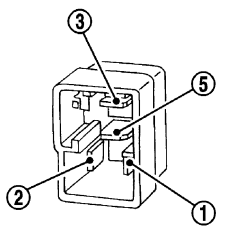
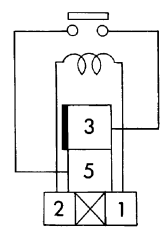
- 1M ..... 1 Make
- 1T ..... 1 Transfer
- 2M ..... 2 Make
- 1M·1B ..... 1 Make 1 Break



SEL882H

# COMPONENT PARTS

## < SYSTEM DESCRIPTION >

Type	Outer view	Circuit	Connector symbol and connection	Case color
1T				BLACK
2M				BROWN
1M•1B				GRAY
1M				BLUE
				

The arrangement of terminal numbers on the actual relays may differ from those shown above.

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# POWER SUPPLY ROUTING CIRCUIT

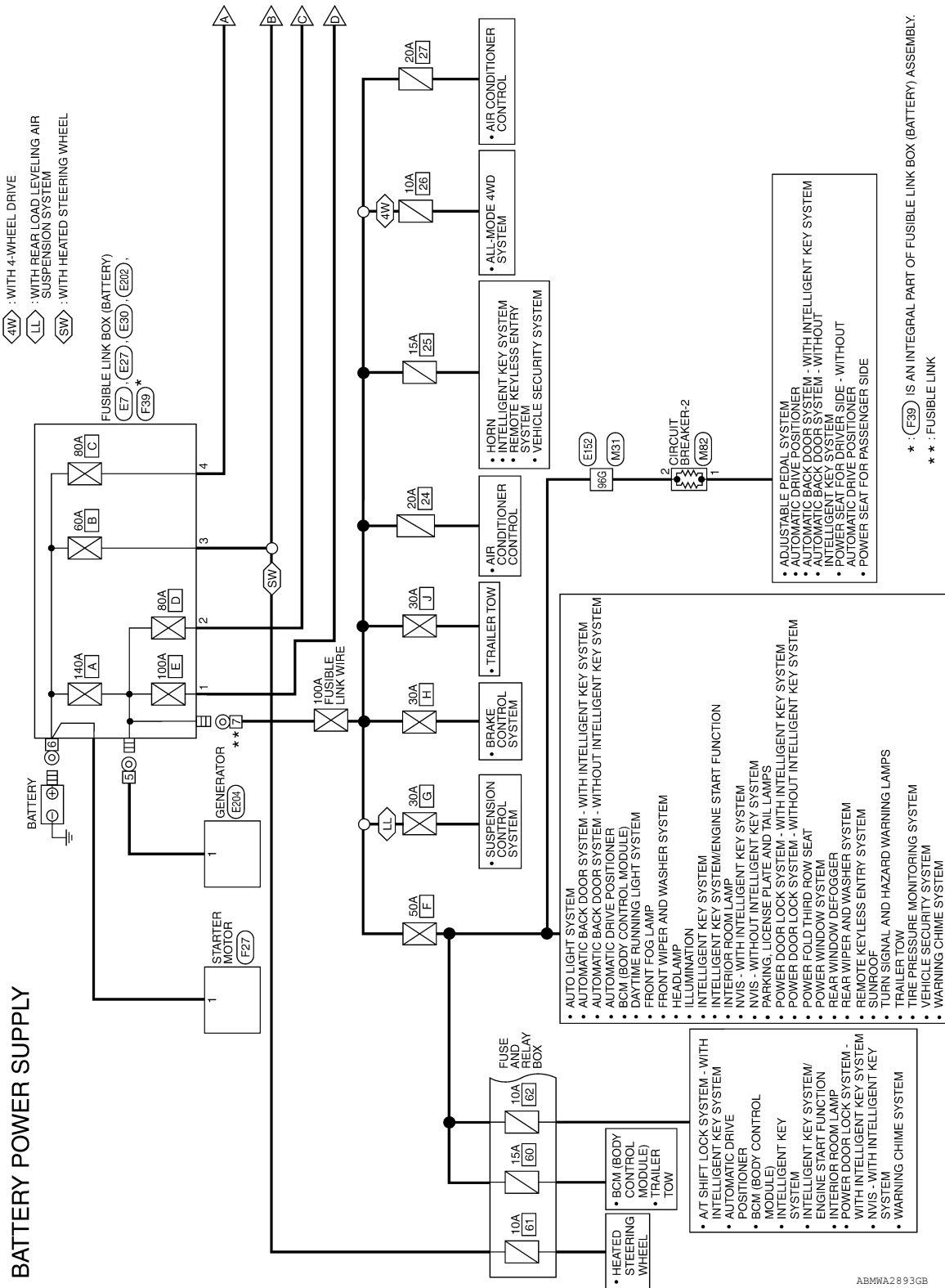
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## WIRING DIAGRAM

### POWER SUPPLY ROUTING CIRCUIT

Wiring Diagram —Battery Power Supply —

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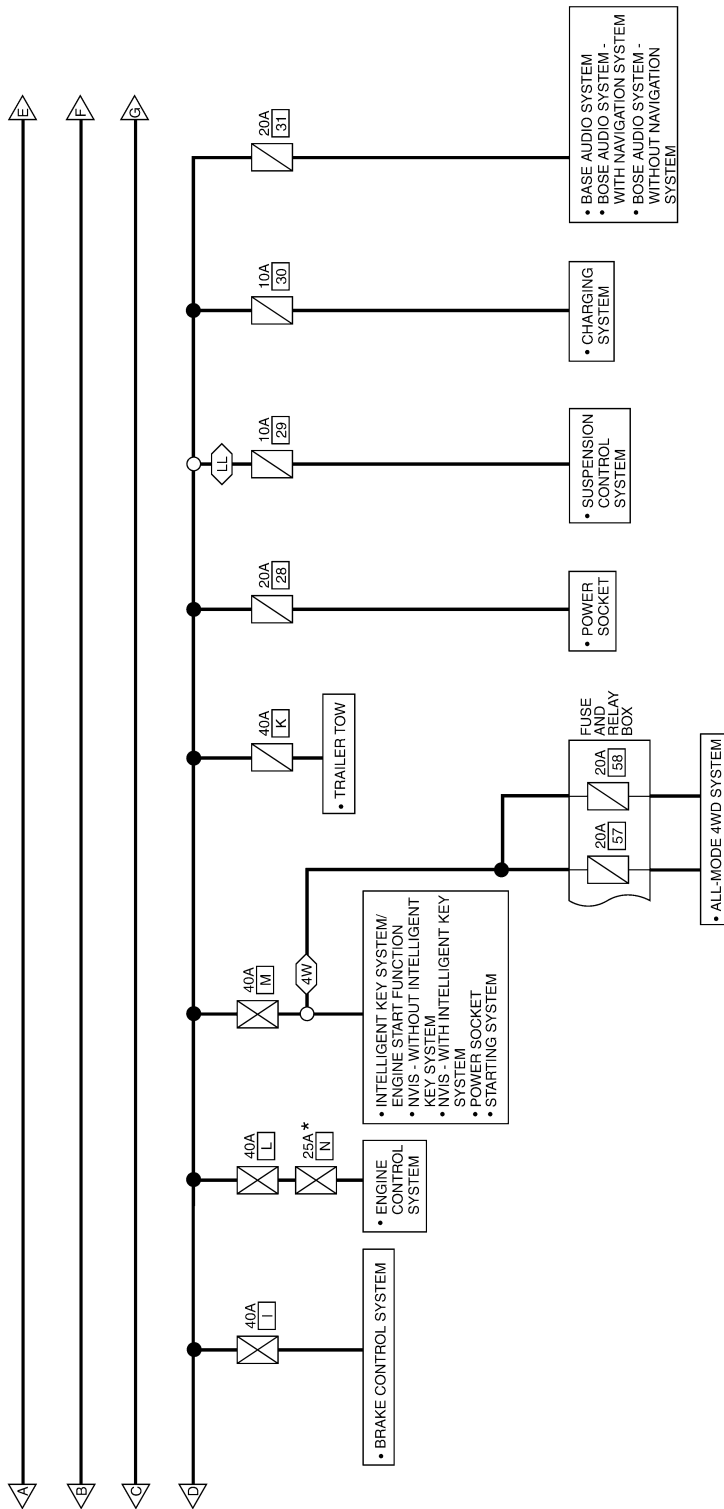


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# POWER SUPPLY ROUTING CIRCUIT

< WIRING DIAGRAM >

4W : WITH 4-WHEEL DRIVE  
LL : WITH REAR LOAD LEVELING AIR SUSPENSION SYSTEM



\* : THIS FUSE IS LOCATED IN THE IPDM E/R (INTELLIGENT POWER DISTRIBUTION MODULE ENGINE ROOM) BOX.

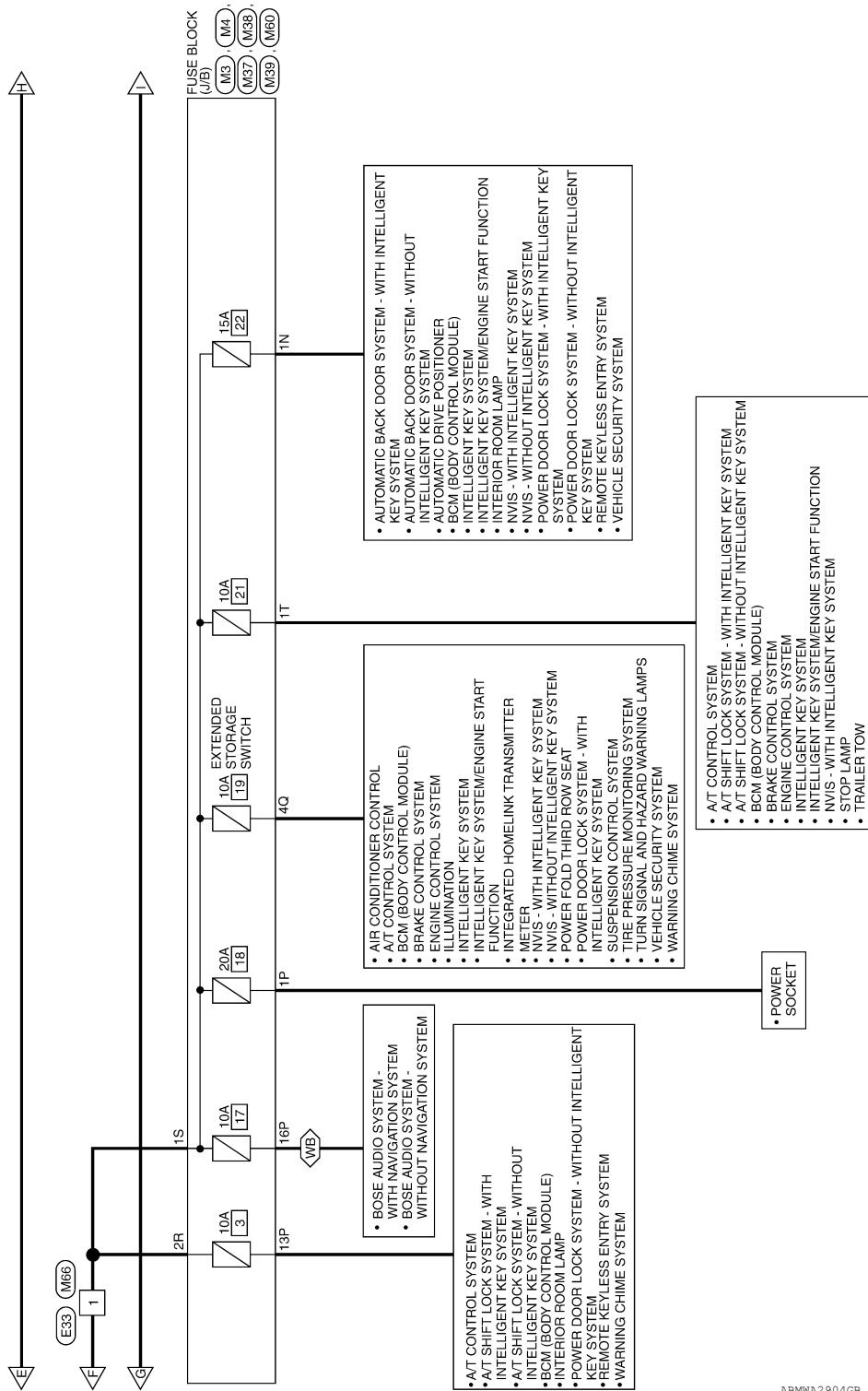
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# POWER SUPPLY ROUTING CIRCUIT

< WIRING DIAGRAM >

WB : WITH BOSE AUDIO SYSTEM

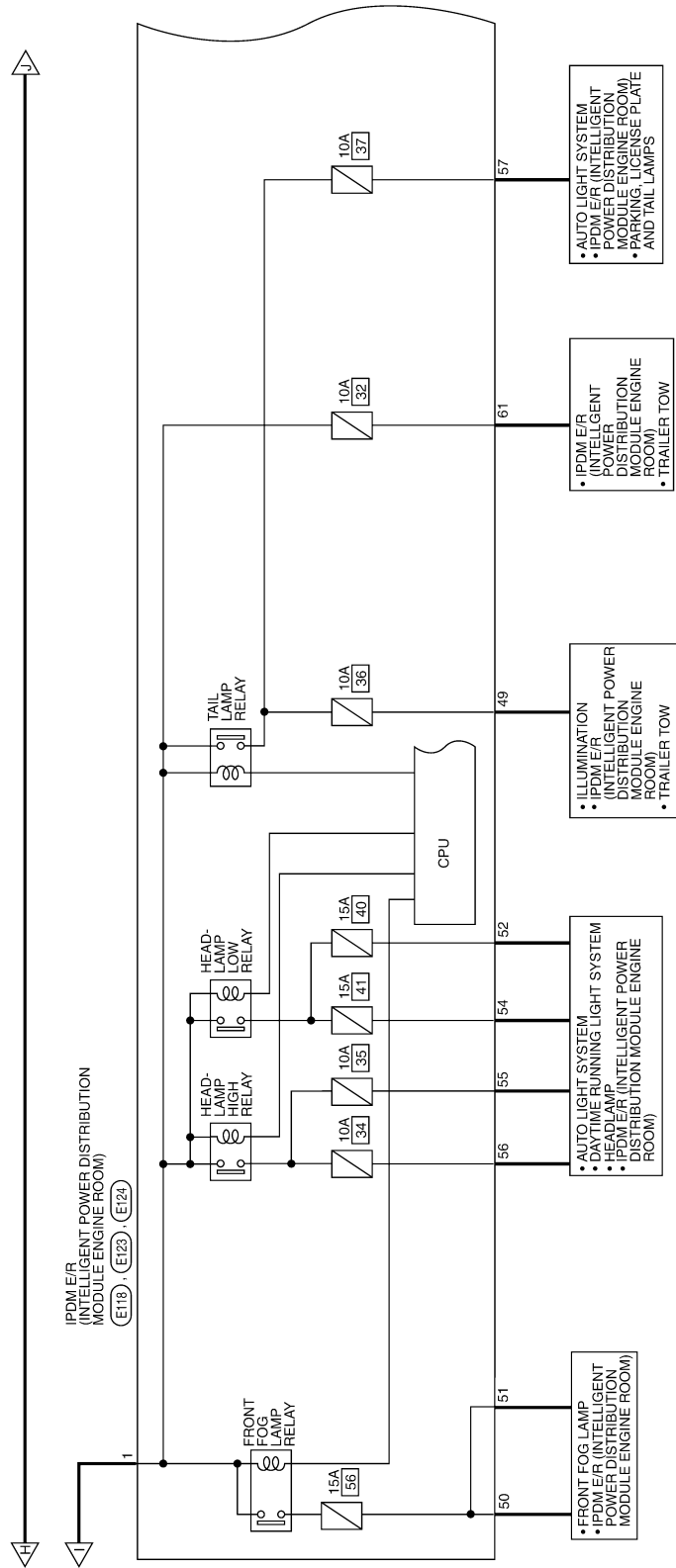


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# POWER SUPPLY ROUTING CIRCUIT

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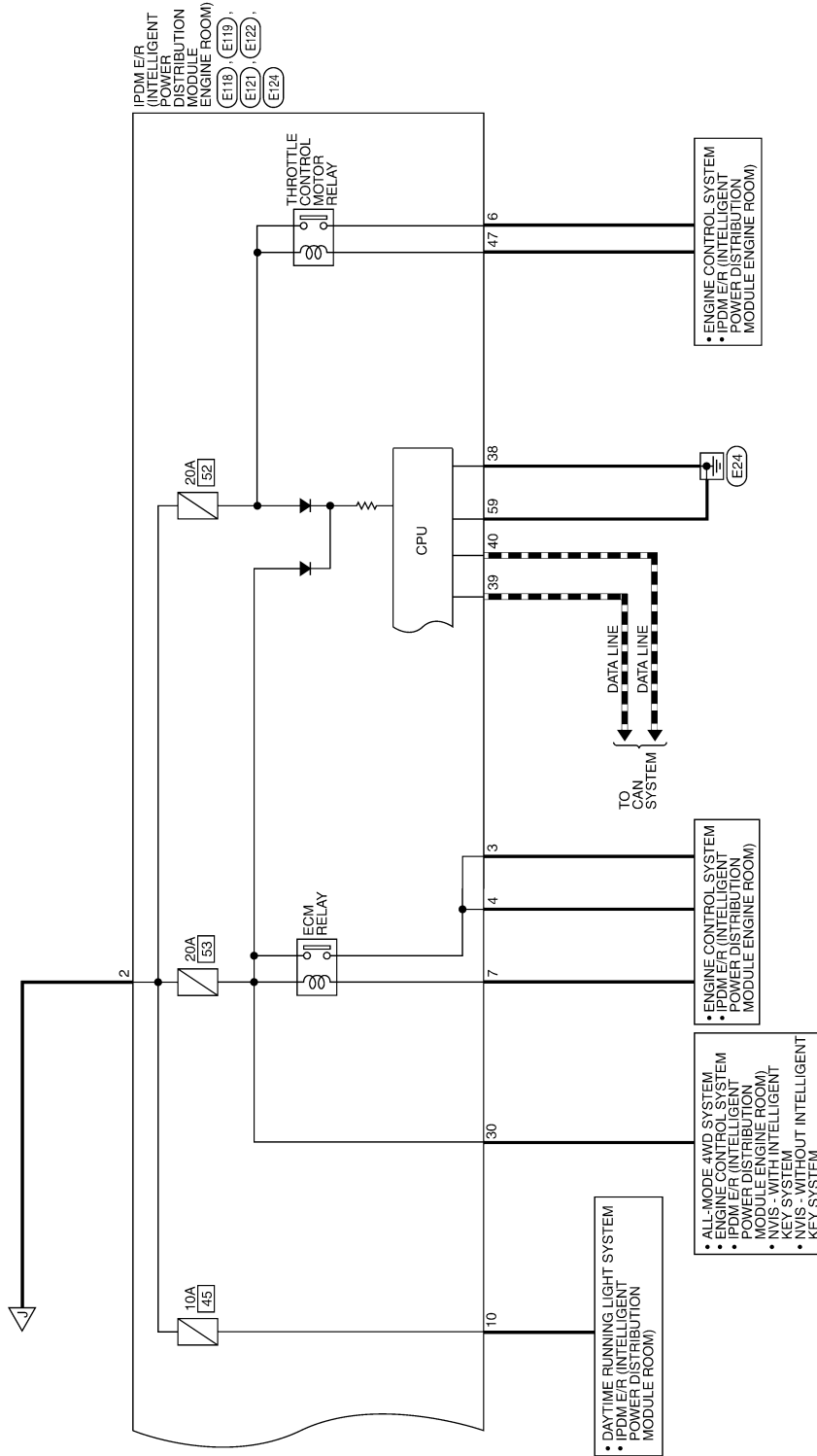


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# POWER SUPPLY ROUTING CIRCUIT

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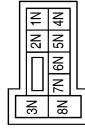
ABMWA2896GB

# POWER SUPPLY ROUTING CIRCUIT

< WIRING DIAGRAM >

## BATTERY POWER SUPPLY CONNECTORS

Connector No.	M3
Connector Name	FUSE BLOCK (J/B)
Connector Color	WHITE



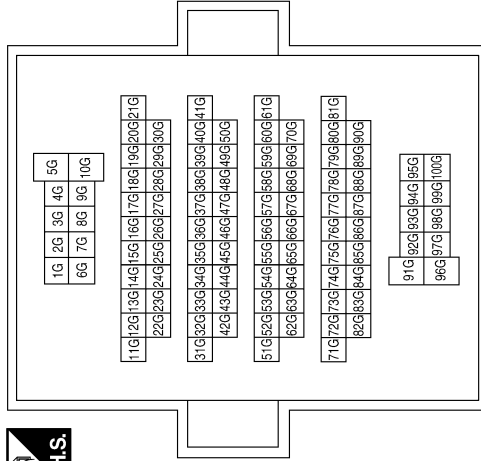
Terminal No.	Color of Wire	Signal Name
1N	Y/R	-

Connector No.	M4
Connector Name	FUSE BLOCK (J/B)
Connector Color	WHITE



Terminal No.	Color of Wire	Signal Name
1P	G	-
13P	P	-
16P	R	-

Connector No.	M31
Connector Name	WIRE TO WIRE
Connector Color	WHITE



Terminal No.	Color of Wire	Signal Name
96G	W/B	-

Connector No.	M37
Connector Name	FUSE BLOCK (J/B)
Connector Color	BLACK



Terminal No.	Color of Wire	Signal Name
1S	W	-

Connector No.	M38
Connector Name	FUSE BLOCK (J/B)
Connector Color	BLACK



Terminal No.	Color of Wire	Signal Name
2R	W	-

Connector No.	M39
Connector Name	FUSE BLOCK (J/B)
Connector Color	WHITE



Terminal No.	Color of Wire	Signal Name
4Q	Y/R	-

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# POWER SUPPLY ROUTING CIRCUIT

< WIRING DIAGRAM >

Connector No.	M82
Connector Name	CIRCUIT BREAKER-2
Connector Color	WHITE



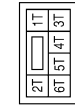
Terminal No.	Color of Wire	Signal Name
1	L/B	-
2	W/B	-

Connector No.	M66
Connector Name	WIRE TO WIRE
Connector Color	BLACK



Terminal No.	Color of Wire	Signal Name
1	W	-

Connector No.	M60
Connector Name	FUSE BLOCK (J/B)
Connector Color	WHITE



Terminal No.	Color of Wire	Signal Name
1T	R/Y	-

Connector No.	E30
Connector Name	FUSIBLE LINK BOX (BATTERY)
Connector Color	-



Terminal No.	Color of Wire	Signal Name
7	W	-

Connector No.	E27
Connector Name	FUSIBLE LINK BOX (BATTERY)
Connector Color	BROWN



Terminal No.	Color of Wire	Signal Name
1	B/R	-
2	B/Y	-

Connector No.	E7
Connector Name	FUSIBLE LINK BOX (BATTERY)
Connector Color	GRAY



Terminal No.	Color of Wire	Signal Name
3	W	-
4	R	-

ABMIA1119GB

# POWER SUPPLY ROUTING CIRCUIT

< WIRING DIAGRAM >

Connector No.	E119
Connector Name	IPDM E/R (INTELLIGENT POWER DISTRIBUTION MODULE ENGINE ROOM)
Connector Color	WHITE



9	8	7	6	5	4	3
18	17	16	15	14	13	12
11	10					

Terminal No.	Color of Wire	Signal Name
3	BR	IGN COIL
4	W/L	ECM
6	L	ETC
7	W/B	ECM RLY CONT
10	G	DTRL RLY SUPPLY

Connector No.	E118
Connector Name	IPDM E/R (INTELLIGENT POWER DISTRIBUTION MODULE ENGINE ROOM)
Connector Color	BLACK



1	2
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Terminal No.	Color of Wire	Signal Name
1	B/Y	F/L USM
2	R	F/L MAIN

Connector No.	E33
Connector Name	WIRE TO WIRE
Connector Color	BLACK



1
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Terminal No.	Color of Wire	Signal Name
1	W	-

Connector No.	E123
Connector Name	IPDM E/R (INTELLIGENT POWER DISTRIBUTION MODULE ENGINE ROOM)
Connector Color	BROWN



51	50	49
56	55	54
53	52	51

Terminal No.	Color of Wire	Signal Name
49	R/L	ILLUMINATION
50	W/R	FR FOG LAMP LH
51	W/R	FR FOG LAMP RH
52	L	H/LAMP LO LH
54	R/Y	H/LAMP LO RH
55	G	H/LAMP HI LH
56	L/W	H/LAMP HI RH (WITHOUT DAYTIME LIGHT SYSTEM)
56	Y	H/LAMP HI RH (WITH DAYTIME LIGHT SYSTEM)

Connector No.	E122
Connector Name	IPDM E/R (INTELLIGENT POWER DISTRIBUTION MODULE ENGINE ROOM)
Connector Color	WHITE



42	41	40	39	38	37
46	47	46	45	44	43

Terminal No.	Color of Wire	Signal Name
38	B	GND (SIGNAL)
39	L	CAN-H
40	P	CAN-L
47	O	ETC RLY CONT

Connector No.	E121
Connector Name	IPDM E/R (INTELLIGENT POWER DISTRIBUTION MODULE ENGINE ROOM)
Connector Color	BROWN



29	28	27	26	25
36	35	34	33	32
31	30			

Terminal No.	Color of Wire	Signal Name
30	W	ECM BAT

ABMIA4095GB

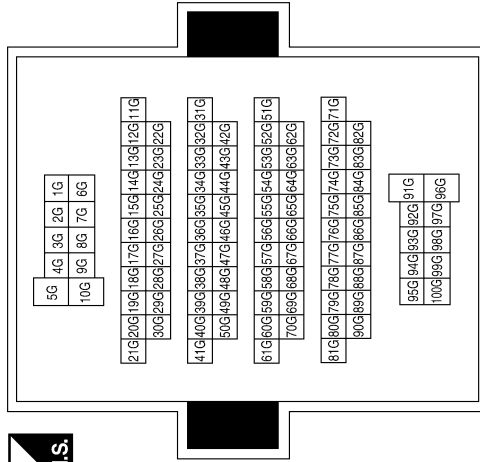
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# POWER SUPPLY ROUTING CIRCUIT

< WIRING DIAGRAM >

Terminal No.	Color of Wire	Signal Name
96G	W/B	-

Connector No.	E152
Connector Name	WIRE TO WIRE
Connector Color	WHITE



Connector No.	E124
Connector Name	IPDM E/R (INTELLIGENT POWER DISTRIBUTION MODULE ENGINE ROOM)
Connector Color	BLACK

59	58	57
62	61	60



Terminal No.	Color of Wire	Signal Name
57	R/L	TAIL LAMP
59	B	GND (POWER)
61	BR	TRAILER RLY SUPPLY

Connector No.	F27
Connector Name	STARTER MOTOR
Connector Color	-



Connector No.	E204
Connector Name	GENERATOR
Connector Color	-



Connector No.	E202
Connector Name	FUSIBLE LINK BOX (BATTERY)
Connector Color	-



Terminal No.	Color of Wire	Signal Name
1	B/R	-

Terminal No.	Color of Wire	Signal Name
1	B/R	-

Terminal No.	Color of Wire	Signal Name
5	B/R	-

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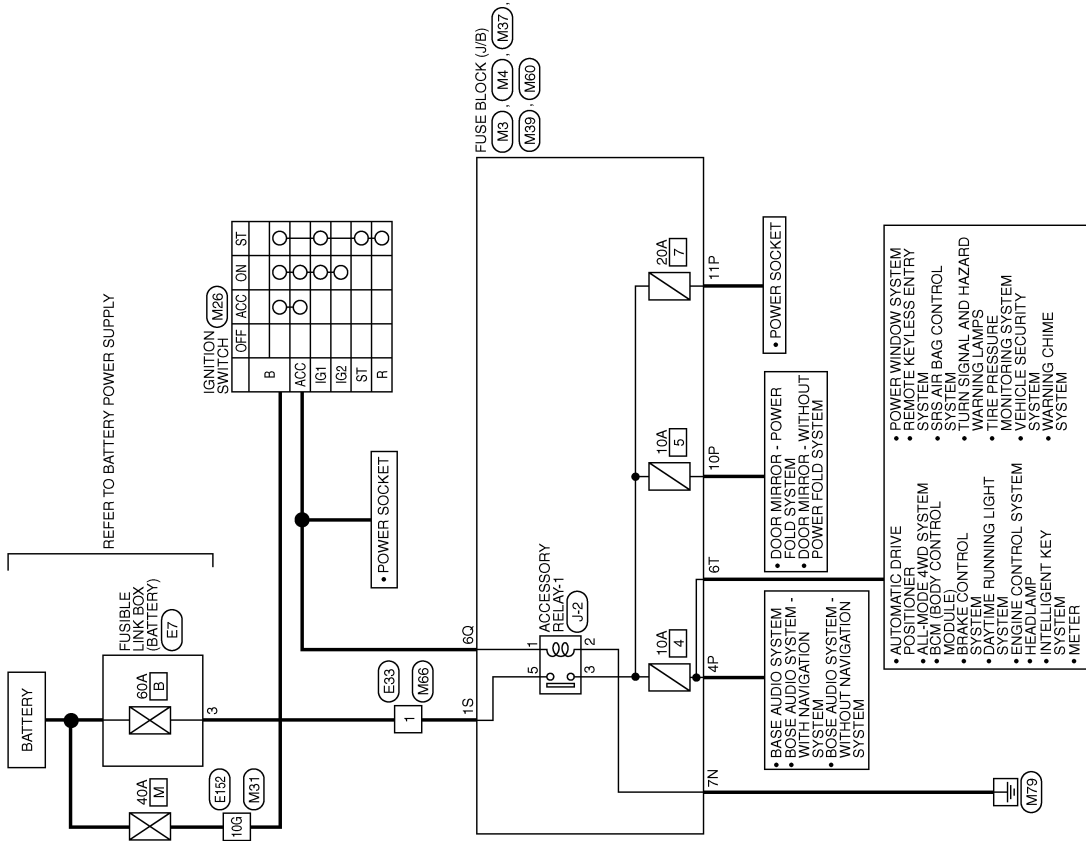
# POWER SUPPLY ROUTING CIRCUIT

< WIRING DIAGRAM >

## Wiring Diagram —Accessory Power Supply—

INFOID:000000011288272

### ACCESSORY POWER SUPPLY



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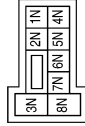
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# POWER SUPPLY ROUTING CIRCUIT

< WIRING DIAGRAM >

## ACCESSORY POWER SUPPLY CONNECTORS

Connector No.	M3
Connector Name	FUSE BLOCK (J/B)
Connector Color	WHITE



Terminal No.	Color of Wire	Signal Name
7N	B	-

Connector No.	M4
Connector Name	FUSE BLOCK (J/B)
Connector Color	WHITE



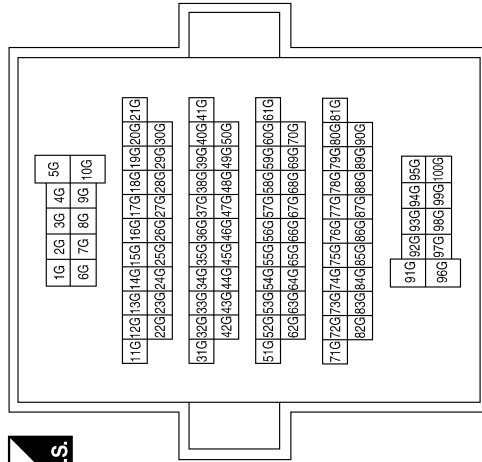
Terminal No.	Color of Wire	Signal Name
4P	V	-
10P	O	- (WITH AUTOMATIC DRIVE POSITIONER)
10P	GR	- (WITHOUT AUTOMATIC DRIVE POSITIONER)
11P	LW	-

Connector No.	M26
Connector Name	IGNITION SWITCH
Connector Color	WHITE



Terminal No.	Color of Wire	Signal Name
B	G	-
ACC	V	-

Connector No.	M31
Connector Name	WIRE TO WIRE
Connector Color	WHITE



Connector No.	M37
Connector Name	FUSE BLOCK (J/B)
Connector Color	BLACK



Terminal No.	Color of Wire	Signal Name
1S	W	-

ABMIA6045GB



# POWER SUPPLY ROUTING CIRCUIT

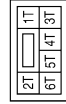
< WIRING DIAGRAM >

Connector No.	M66
Connector Name	WIRE TO WIRE
Connector Color	BLACK



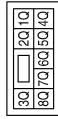
Terminal No.	1	Color of Wire	W	Signal Name	-
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Connector No.	M60
Connector Name	FUSE BLOCK (J/B)
Connector Color	WHITE



Terminal No.	6T	Color of Wire	O	Signal Name	-
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Connector No.	M39
Connector Name	FUSE BLOCK (J/B)
Connector Color	WHITE



Terminal No.	6Q	Color of Wire	V	Signal Name	-
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Connector No.	E33
Connector Name	WIRE TO WIRE
Connector Color	BLACK



Terminal No.	1	Color of Wire	W	Signal Name	-
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Connector No.	E7
Connector Name	FUSIBLE LINK BOX (BATTERY)
Connector Color	GRAY



Terminal No.	3	Color of Wire	W	Signal Name	-
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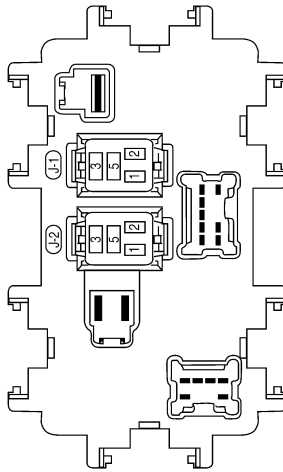
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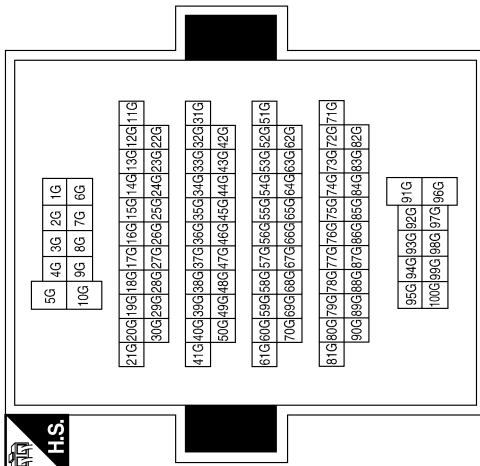
# POWER SUPPLY ROUTING CIRCUIT

< WIRING DIAGRAM >

Connector No.	J-2
Connector Name	FUSE BLOCK (J/B) (ACCESSORY RELAY-1)
Connector Color	-



Connector No.	E152
Connector Name	WIRE TO WIRE
Connector Color	WHITE



Terminal No.	Color of Wire	Signal Name
10G	G	-

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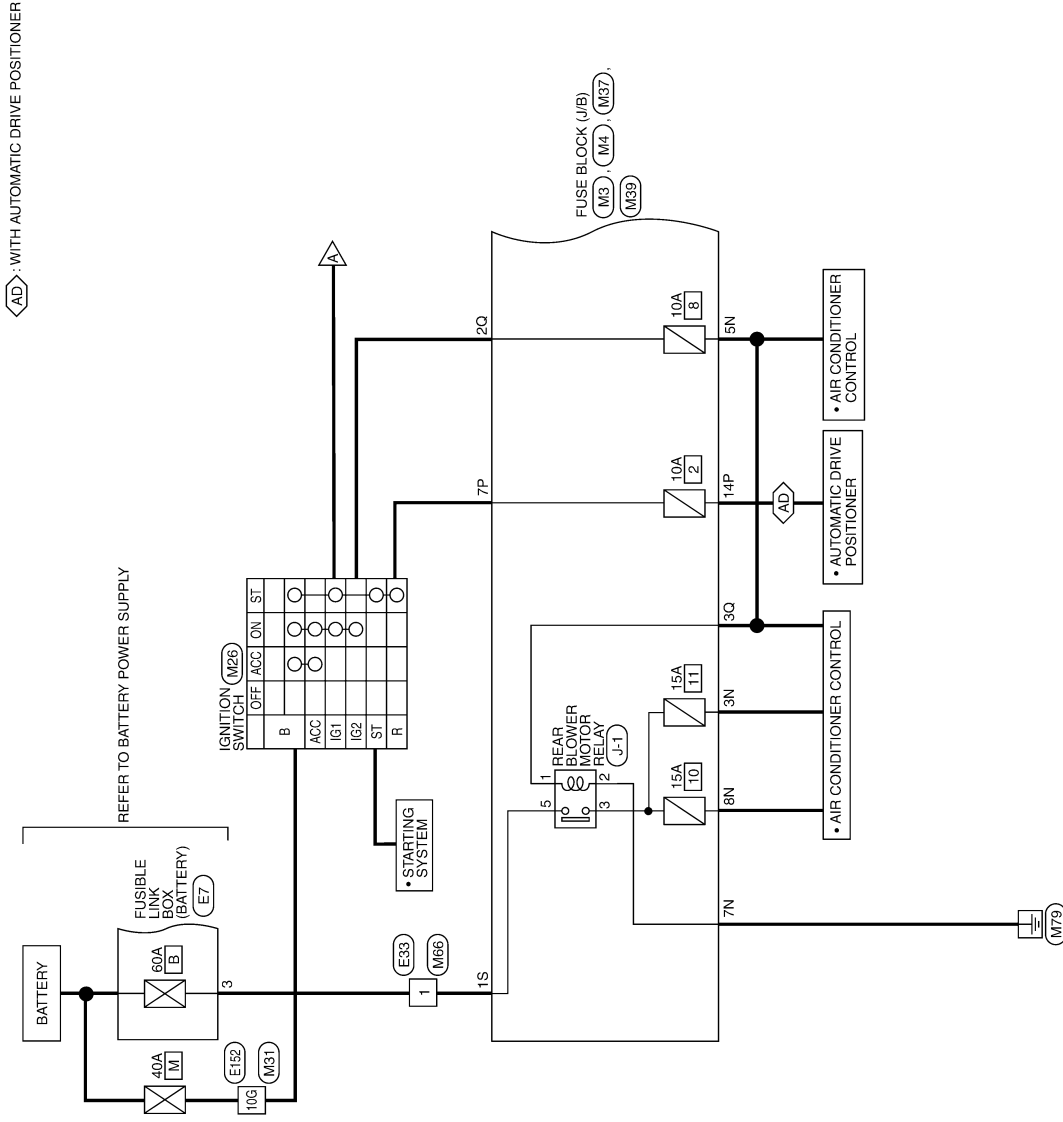
# POWER SUPPLY ROUTING CIRCUIT

< WIRING DIAGRAM >

## Wiring Diagram — Ignition Power Supply —

INFOID:000000011288273

IGNITION POWER SUPPLY



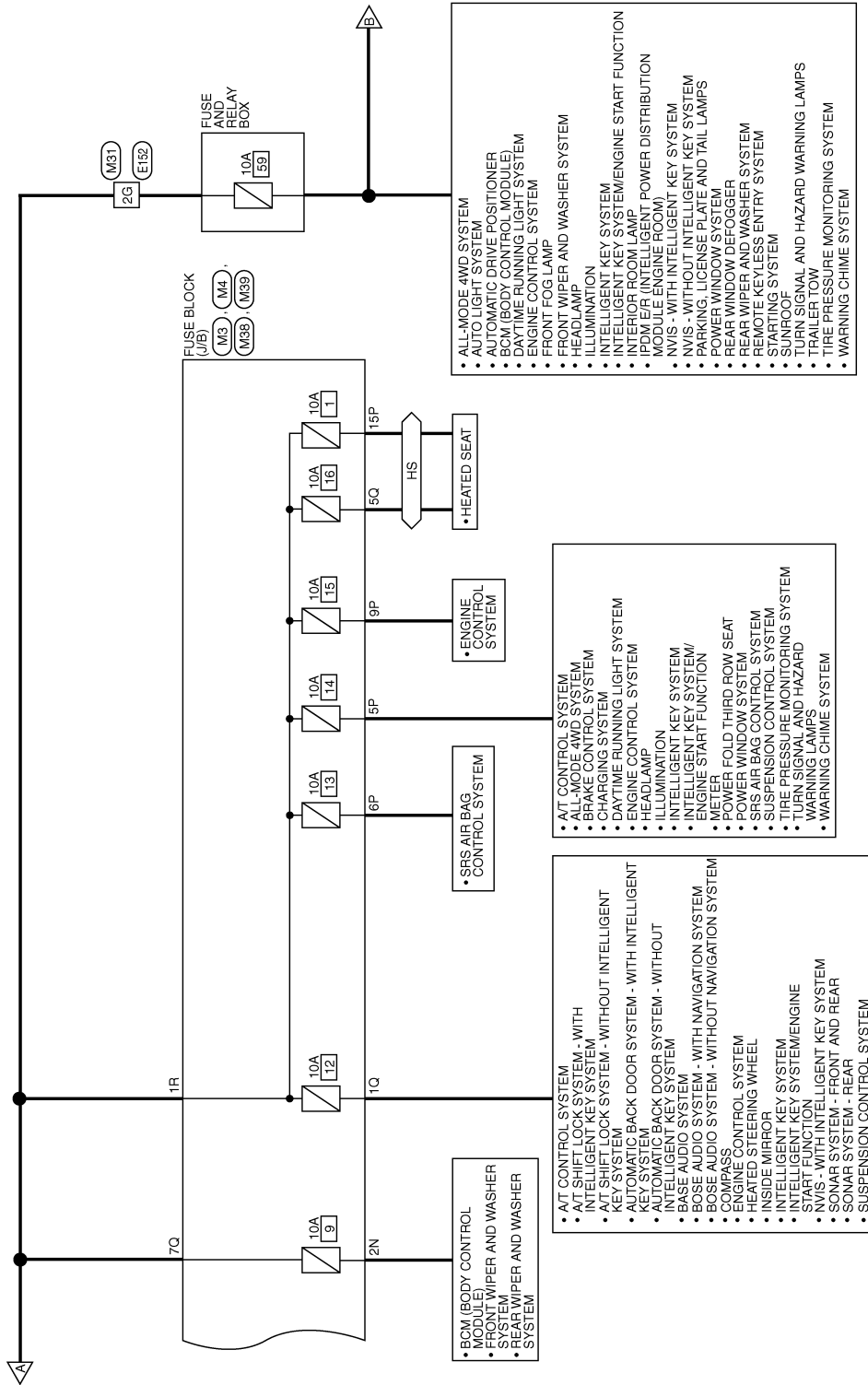
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# POWER SUPPLY ROUTING CIRCUIT

< WIRING DIAGRAM >

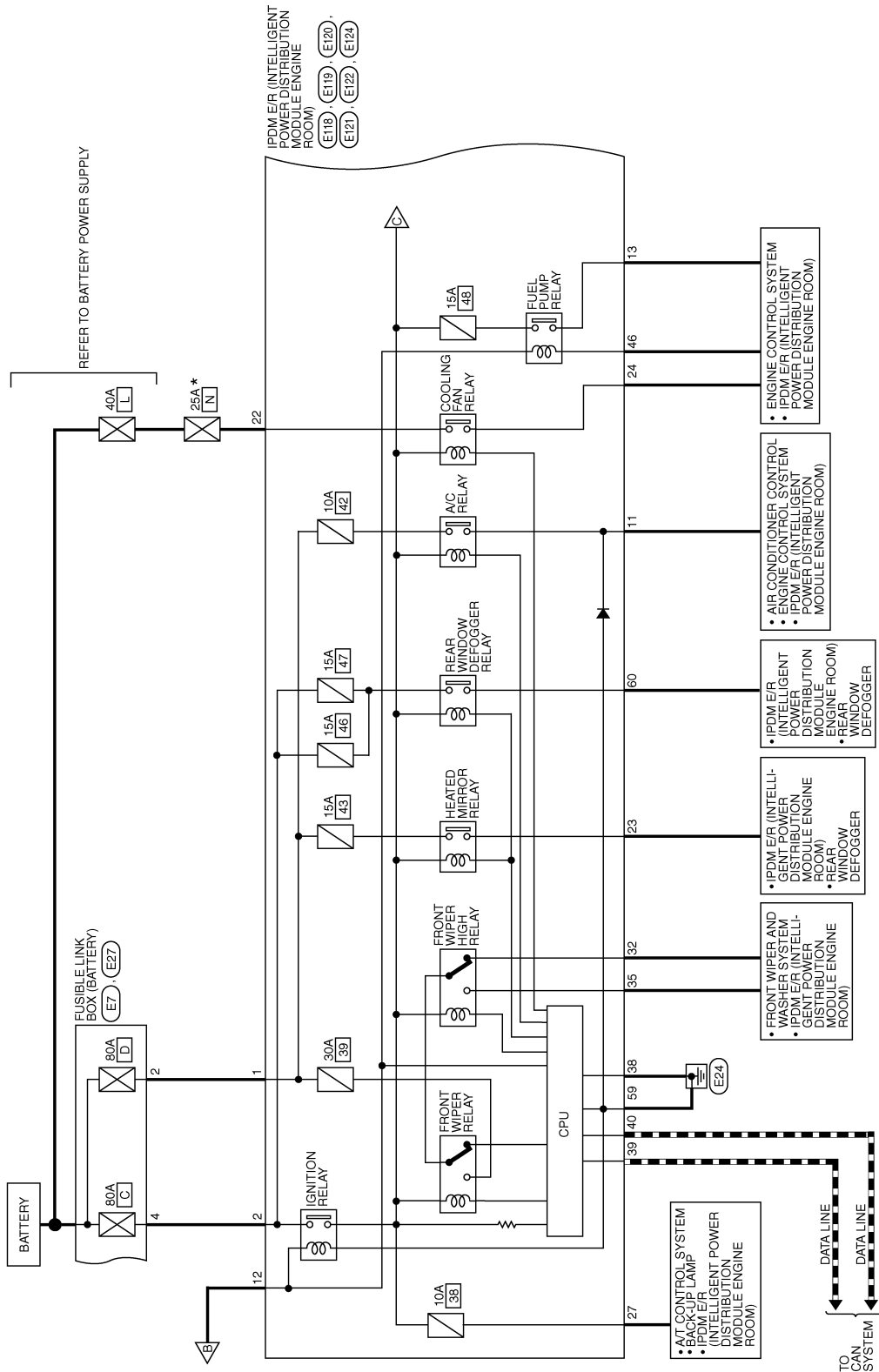
HS : WITH HEATED SEATS



ABMWA2891GB

# POWER SUPPLY ROUTING CIRCUIT

< WIRING DIAGRAM >



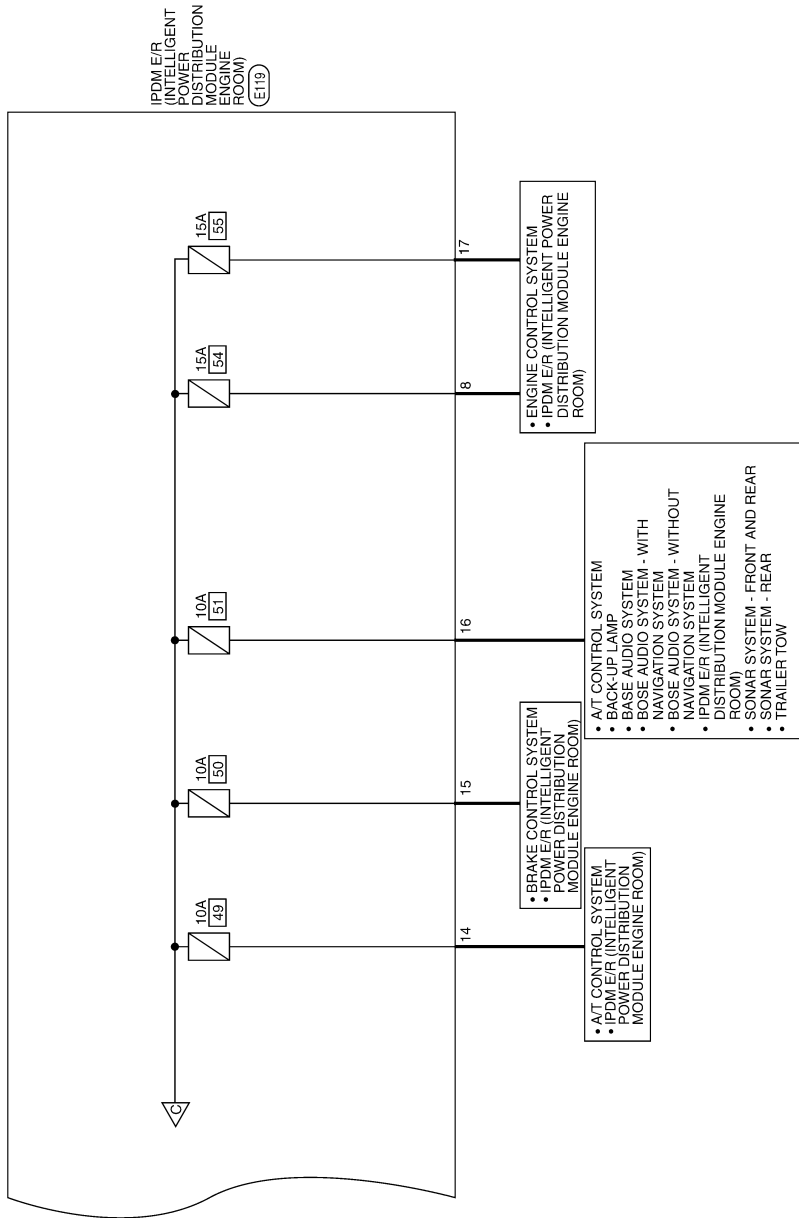
\*: THIS FUSE IS LOCATED IN THE IPDM E/R (INTELLIGENT POWER DISTRIBUTION MODULE ENGINE ROOM) BOX.

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# POWER SUPPLY ROUTING CIRCUIT

< WIRING DIAGRAM >



ABMWA1769GB

# POWER SUPPLY ROUTING CIRCUIT

< WIRING DIAGRAM >

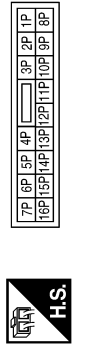
## IGNITION POWER SUPPLY CONNECTORS

Connector No.	M3
Connector Name	FUSE BLOCK (J/B)
Connector Color	WHITE



Terminal No.	Color of Wire	Signal Name
2N	R/L	-
3N	SB	-
5N	Y/G	-
7N	B	-
8N	L/R	-

Connector No.	M4
Connector Name	FUSE BLOCK (J/B)
Connector Color	WHITE



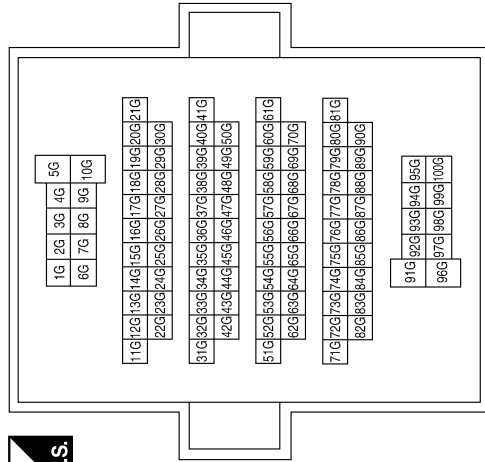
Terminal No.	Color of Wire	Signal Name
5P	O/L	-
6P	W/L	-
7P	LG	-
9P	R/B	-
14P	O	-
15P	O/B	-

Connector No.	M26
Connector Name	IGNITION SWITCH
Connector Color	WHITE



Terminal No.	Color of Wire	Signal Name
IG1	B/R	-
IG2	R	-
ST	BR	-
B	G	-
R	LG	-

Connector No.	M31
Connector Name	WIRE TO WIRE
Connector Color	WHITE



Connector No.	M37
Connector Name	FUSE BLOCK (J/B)
Connector Color	BLACK



Terminal No.	Color of Wire	Signal Name
1S	W	-

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# POWER SUPPLY ROUTING CIRCUIT

< WIRING DIAGRAM >

Connector No.	M66
Connector Name	WIRE TO WIRE
Connector Color	BLACK



Terminal No.	Color of Wire	Signal Name
1	W	-

Connector No.	M39
Connector Name	FUSE BLOCK (J/B)
Connector Color	WHITE



Terminal No.	Color of Wire	Signal Name
1Q	G/R	-
2Q	R	-
3Q	Y/G	-
5Q	G	-
7Q	B/R	-

Connector No.	M38
Connector Name	FUSE BLOCK (J/B)
Connector Color	BLACK



Terminal No.	Color of Wire	Signal Name
1R	B/R	-

Connector No.	E33
Connector Name	WIRE TO WIRE
Connector Color	BLACK



Terminal No.	Color of Wire	Signal Name
1	W	-

Connector No.	E27
Connector Name	FUSIBLE LINK BOX (BATTERY)
Connector Color	BROWN



Terminal No.	Color of Wire	Signal Name
2	B/Y	-

Connector No.	E7
Connector Name	FUSIBLE LINK BOX (BATTERY)
Connector Color	GRAY



Terminal No.	Color of Wire	Signal Name
3	W	-
4	R	-

ABMIA1126GB



# POWER SUPPLY ROUTING CIRCUIT

< WIRING DIAGRAM >

Connector No.	E120
Connector Name	IPDM E/R (INTELLIGENT POWER DISTRIBUTION MODULE ENGINE ROOM)
Connector Color	WHITE



21	20	19
24	23	22

Terminal No.	Color of Wire	Signal Name
22	G	F/L MOTOR FAN
23	GR/W	HEATED MIRROR
24	L	MOTOR FAN2

Connector No.	E119
Connector Name	IPDM E/R (INTELLIGENT POWER DISTRIBUTION MODULE ENGINE ROOM)
Connector Color	WHITE



9	8	7	6	5	4	3		
18	17	16	15	14	13	12	11	10

Terminal No.	Color of Wire	Signal Name
8	R/B	O2 SENSOR
11	Y/B	A/C COMPRESSOR
12	L/W	IGN SW (IG)
13	B/Y	FUEL PUMP
14	Y/R	A/T CU IGN SUPPLY
15	LG/B	ABS IGN SUPPLY
16	G	REVERSE LAMP
17	W	INJECTOR

Connector No.	E118
Connector Name	IPDM E/R (INTELLIGENT POWER DISTRIBUTION MODULE ENGINE ROOM)
Connector Color	BLACK



1	2
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Terminal No.	Color of Wire	Signal Name
1	B/Y	F/L USM
2	R	F/L MAIN

Connector No.	E124
Connector Name	IPDM E/R (INTELLIGENT POWER DISTRIBUTION MODULE ENGINE ROOM)
Connector Color	BLACK



59	58	57
62	61	60

Terminal No.	Color of Wire	Signal Name
59	B	GND (POWER)
60	B	RR DEF

Connector No.	E122
Connector Name	IPDM E/R (INTELLIGENT POWER DISTRIBUTION MODULE ENGINE ROOM)
Connector Color	WHITE



42	41	40	39	38	37
48	47	46	45	44	43

Terminal No.	Color of Wire	Signal Name
38	B	GND (SIGNAL)
39	L	CAN-H
40	P	CAN-L
46	GR	FUEL PUMP RLY CONT

Connector No.	E121
Connector Name	IPDM E/R (INTELLIGENT POWER DISTRIBUTION MODULE ENGINE ROOM)
Connector Color	BROWN



29	28	27	26	25		
36	35	34	33	32	31	30

Terminal No.	Color of Wire	Signal Name
27	W/B	TTOW REV LAMP
32	L	FR WIPER LO
35	L/B	FR WIPER HI

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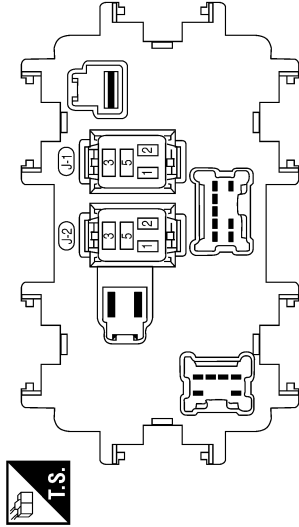
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# POWER SUPPLY ROUTING CIRCUIT

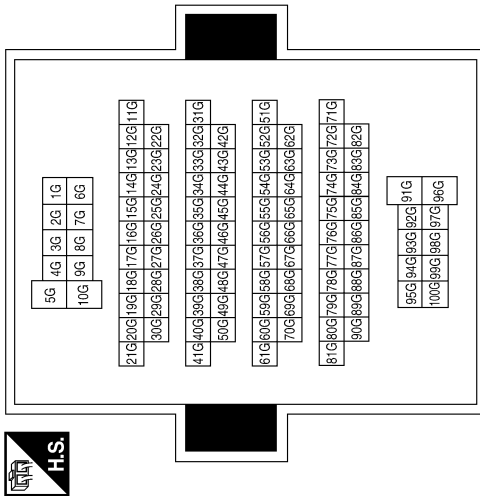
< WIRING DIAGRAM >

Connector No.	J-1
Connector Name	FUSE BLOCK (J/B) (REAR BLOWER MOTOR RELAY)
Connector Color	-



Terminal No.	Color of Wire	Signal Name
2G	B/R	-
10G	G	-

Connector No.	E152
Connector Name	WIRE TO WIRE
Connector Color	WHITE



ABMIA4076GB

# GROUND

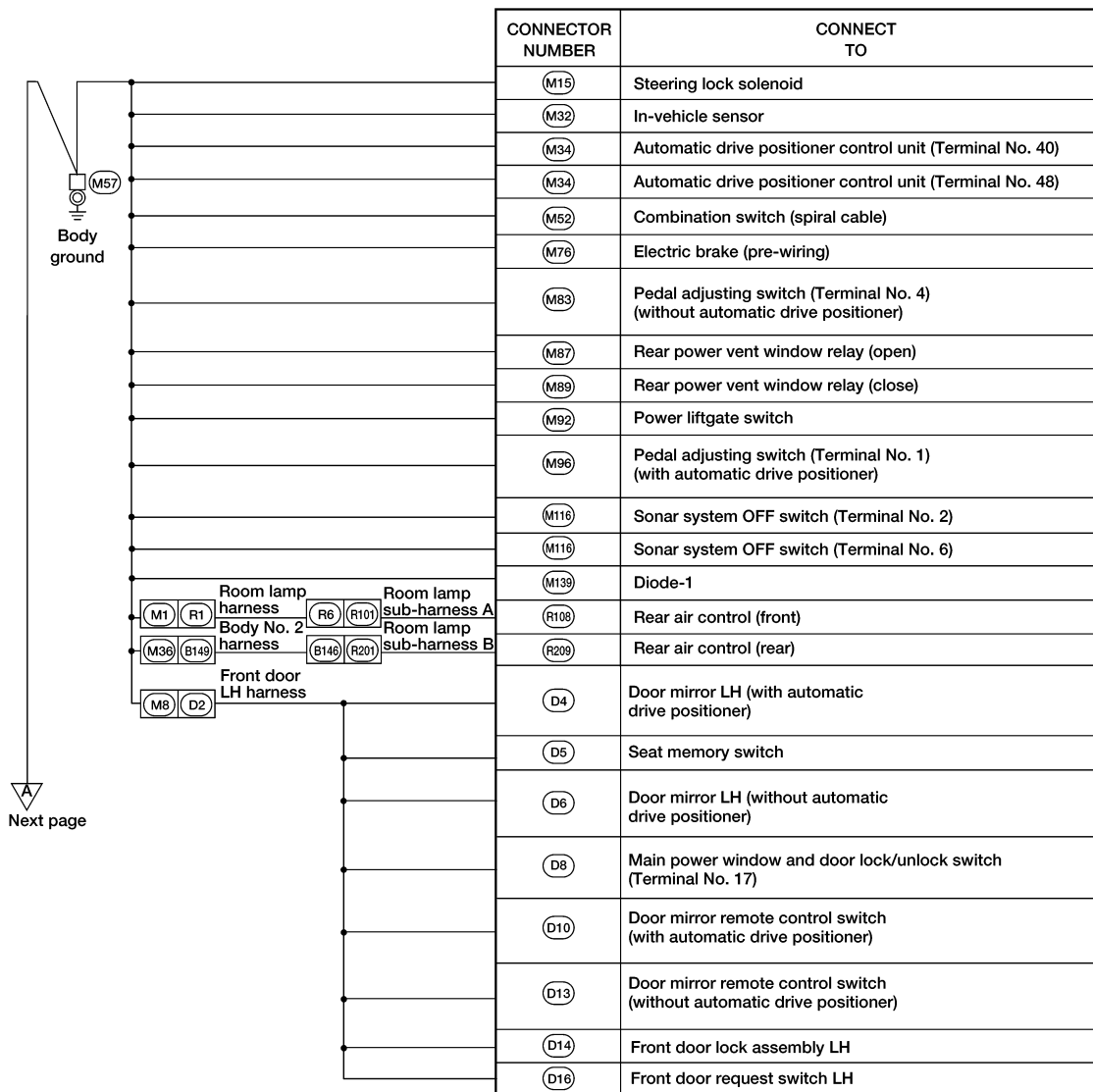
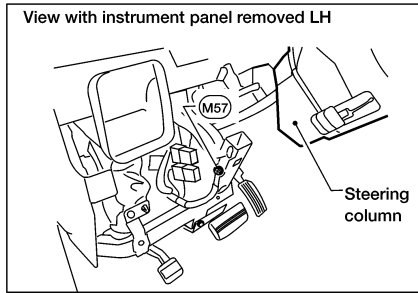
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## GROUND

### Ground Distribution

INFOID:000000011288277

### MAIN HARNESS

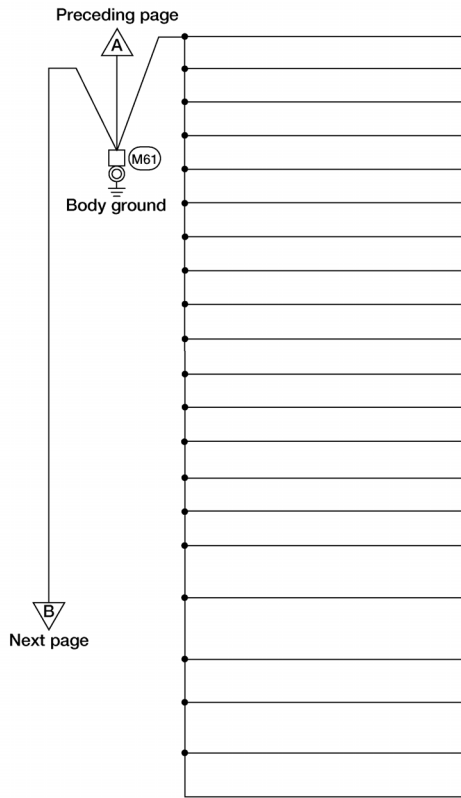
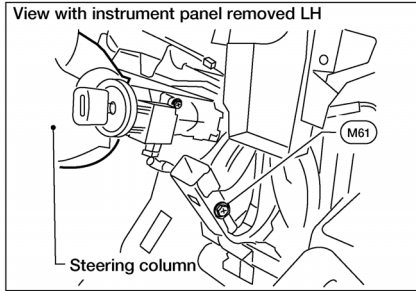


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# GROUND

< WIRING DIAGRAM >

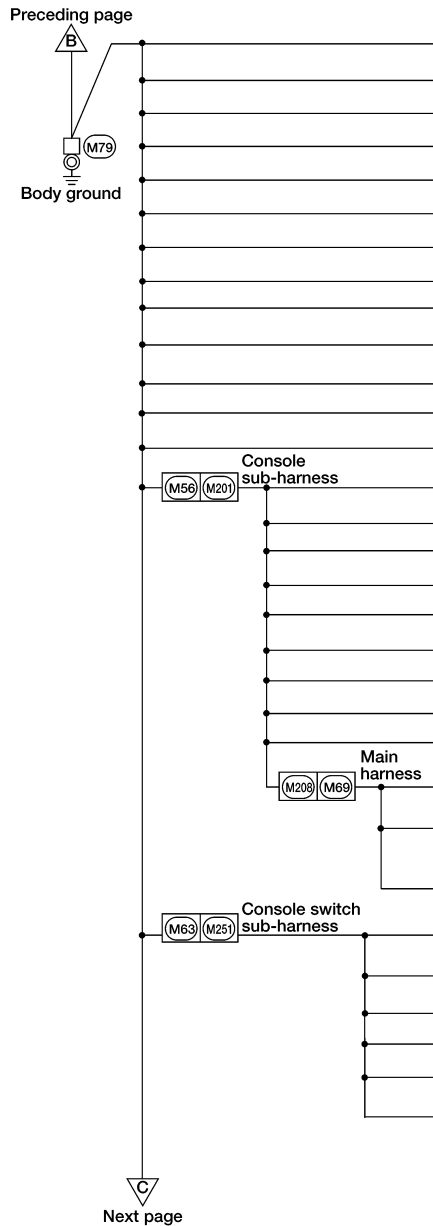
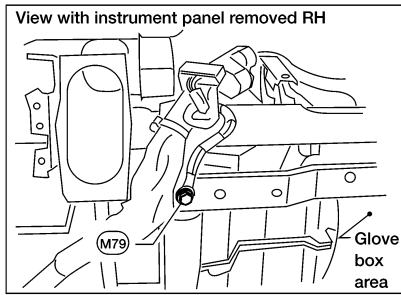


CONNECTOR NUMBER	CONNECT TO
M17	Steering angle sensor
M20	BCM (body control module) (Terminal No. 67)
M21	NATS antenna amp.
M22	Data link connector (Terminal No. 4)
M22	Data link connector (Terminal No. 5)
M23	Combination meter (Terminal No. 52)
M24	Combination meter (Terminal No. 9)
M28	Combination switch
M35	Air bag diagnosis sensor unit (Terminal No. 2)
M42	AV control unit (Terminal No. 20) (with base audio system)
M51	Trailer tow relay 1
M70	Intelligent Key unit (Terminal No. 12)
M107	Front blower relay
M112	BOSE speaker amp. (Terminal No. 12)
M122	Variable blower control (front)
M160	AV control unit (Terminal No. 20) (with BOSE audio system without NAVI)
M163	AV control unit (Terminal No. 93) (with BOSE audio system with NAVI)
M163	AV control unit (Terminal No. 99) (with BOSE audio system with NAVI)
M163	AV control unit (Terminal No. 100) (with BOSE audio system with NAVI)
M163	AV control unit (Terminal No. 102) (with BOSE audio system with NAVI)
M165	AV control unit (Terminal No. 54) (with BOSE audio system with NAVI)

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# GROUND

< WIRING DIAGRAM >



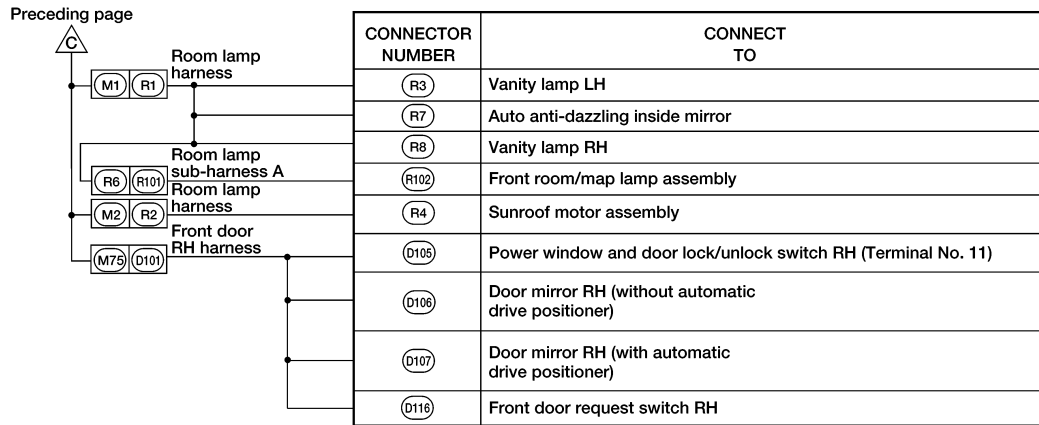
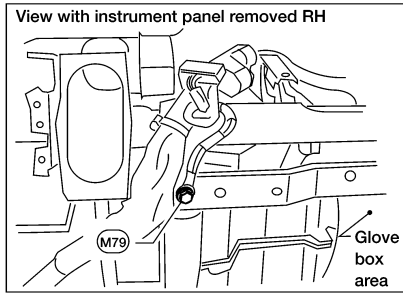
CONNECTOR NUMBER	CONNECT TO
M3	Fuse block (J/B)
M13	Front passenger air bag OFF indicator
M50	A/C auto amp. (Terminal No. 36)
M53	Front power socket LH
M54	Front power socket RH (for cigarette lighter)
M55	Hazard switch
M59	Glove box lamp
M81	Shift lock control unit (Terminal No. 8)
M93	Display unit (Terminal No. 1) (without NAVI)
M95	Rear power vent window switch
M98	A/C and AV switch assembly
M161	AV control unit (Terminal No. 20) (with BOSE audio system with NAVI)
M168	Display unit (Terminal No. 12) (with NAVI)
M203	A/T shift selector (Terminal No. 2) (with Intelligent Key system)
M203	A/T shift selector (Terminal No. 8) (with Intelligent Key system)
M204	A/T shift selector (Terminal No. 2) (without Intelligent Key system)
M204	A/T shift selector (Terminal No. 8) (without Intelligent Key system)
M207	Console power socket
M211	Second row heated seat switch LH (Terminal No. 4)
M211	Second row heated seat switch LH (Terminal No. 6)
M212	Second row heated seat switch RH (Terminal No. 4)
M212	Second row heated seat switch RH (Terminal No. 6)
M43	AV control unit (shield wire) (Terminal No. 73) (with base audio system)
M163	AV control unit (shield wire) (Terminal No. 94) (with BOSE audio system with NAVI)
M164	AV control unit (shield wire) (Terminal No. 73) (with BOSE audio system without NAVI)
M252	Front heated seat switch RH
M253	VDC OFF switch
M255	Front heated seat switch LH
M258	Tow mode switch (Terminal No. 2)
M258	Tow mode switch (Terminal No. 6)
M260	Heated steering wheel switch

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# GROUND

## < WIRING DIAGRAM >

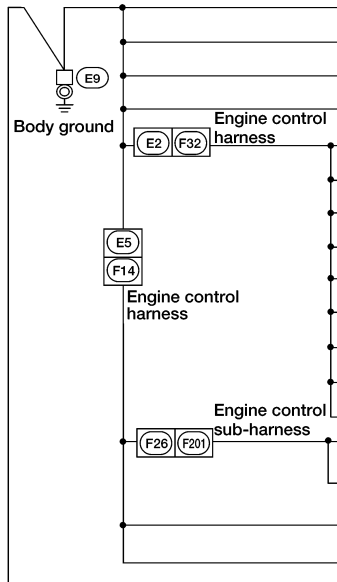
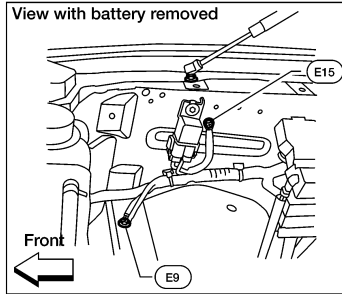


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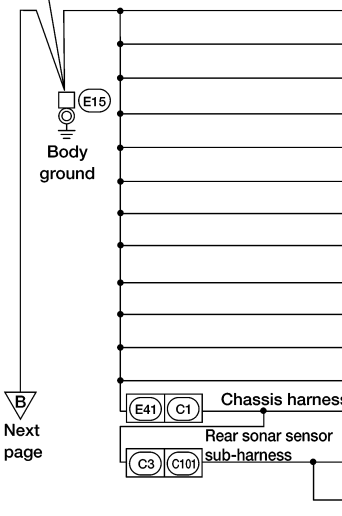
# GROUND

< WIRING DIAGRAM >

## ENGINE ROOM HARNESS



CONNECTOR NUMBER	CONNECT TO
E16	ECM (Terminal No. 115)
E16	ECM (Terminal No. 116)
E142	Transfer control unit (Terminal No. 6)
E143	Transfer control unit (Terminal No. 45)
F9	A/T assembly (Terminal No. 5)
F9	A/T assembly (Terminal No. 10)
F11	Crankshaft position sensor (POS)
F23	Camshaft position sensor (PHASE)
F50	Electric throttle control actuator shield
F54	ECM (Terminal No. 1)
F56	Transfer terminal cord assembly
F62	Intake valve timing control position sensor (bank 1)
F64	Intake valve timing control position sensor (bank 2)
F202	Knock sensor (bank 1) (shield wire)
F204	Knock sensor (bank 2) (shield wire)
F5	Air fuel ratio (A/F) sensor 1 (bank 2) shield
F65	Air fuel ratio (A/F) sensor 1 (bank 1) shield



CONNECTOR NUMBER	CONNECT TO
E3	Horn
E6	Front combination lamp LH (Terminal No. 4) (with daytime light system)
E8	Dropping resistor
E11	Front combination lamp LH (Terminal No. 3) (without daytime light system)
E11	Front combination lamp LH (Terminal No. 4) (without daytime light system)
E17	Fuel pump control module (FPCM)
E21	Brake fluid level switch
E55	Accessory relay-2
E102	Front fog lamp RH
E103	Daytime running light relay
E113	Cooling fan motor
E116	Condenser-2
C5	Fuel level sensor unit and fuel pump
C106	License plate lamp LH
C107	License plate lamp RH

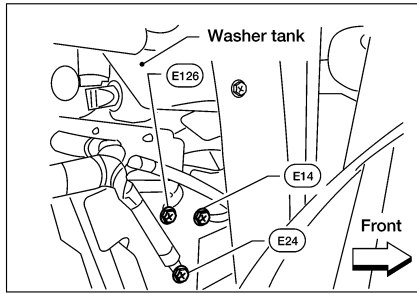
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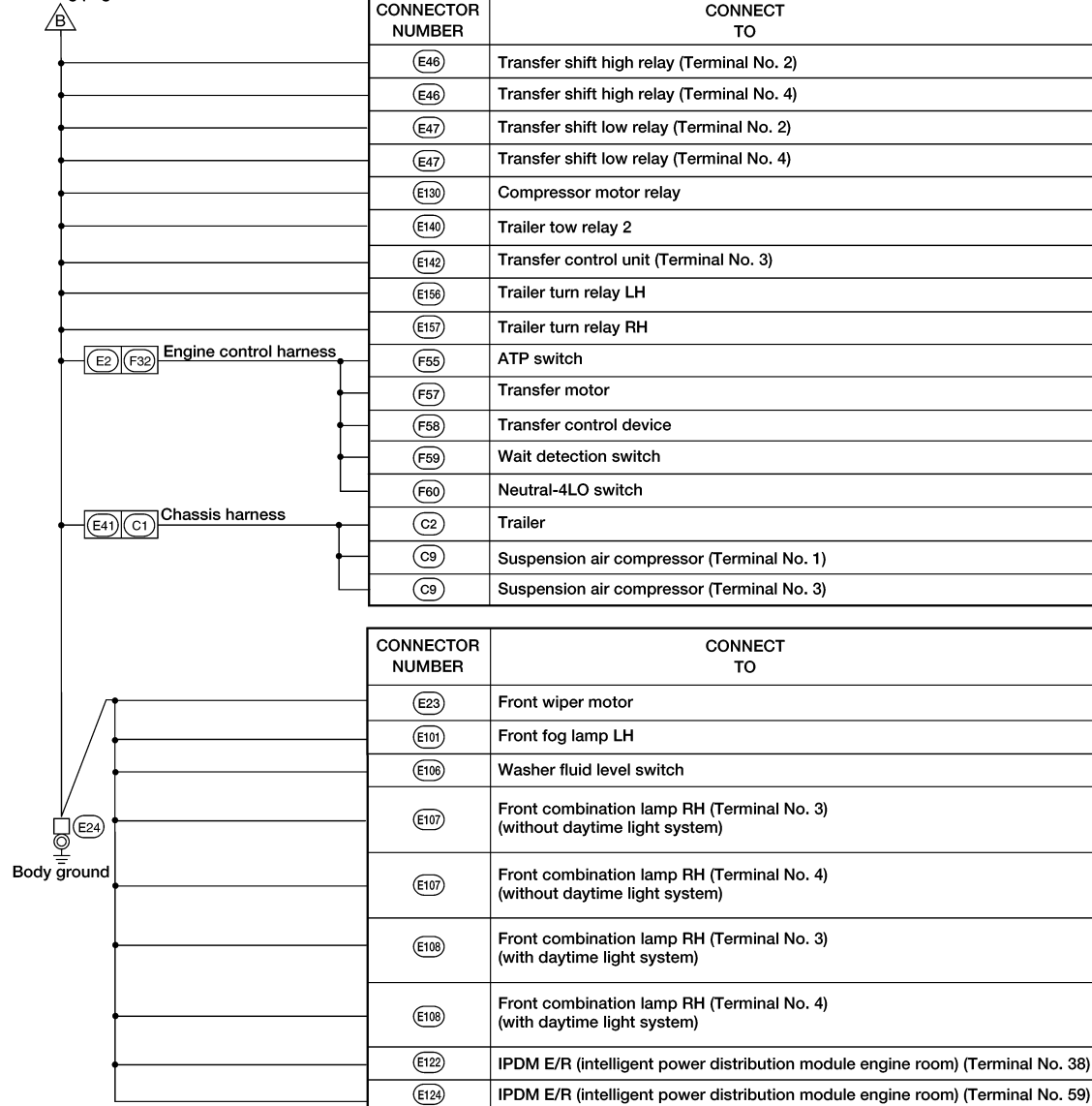
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# GROUND

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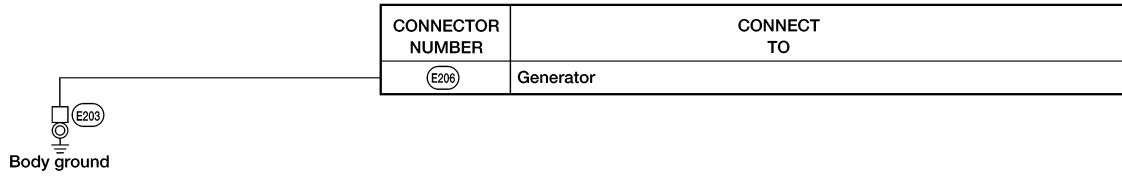
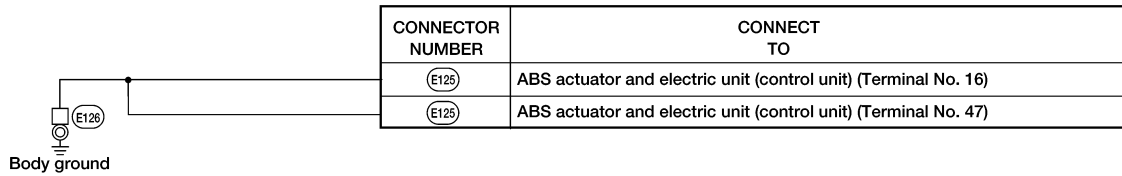
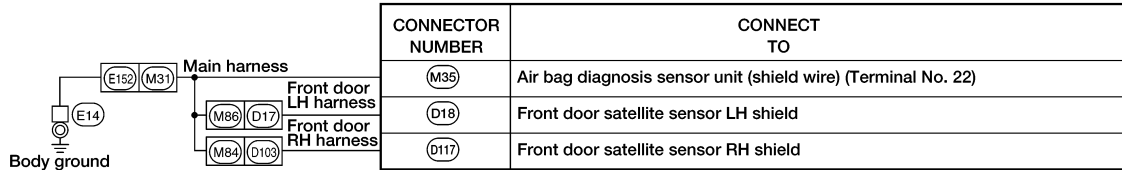
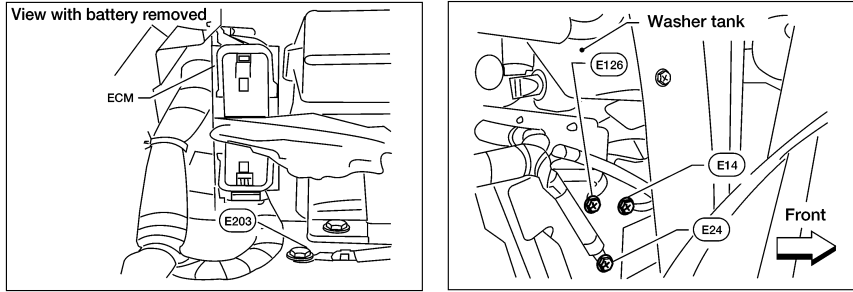


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# GROUND

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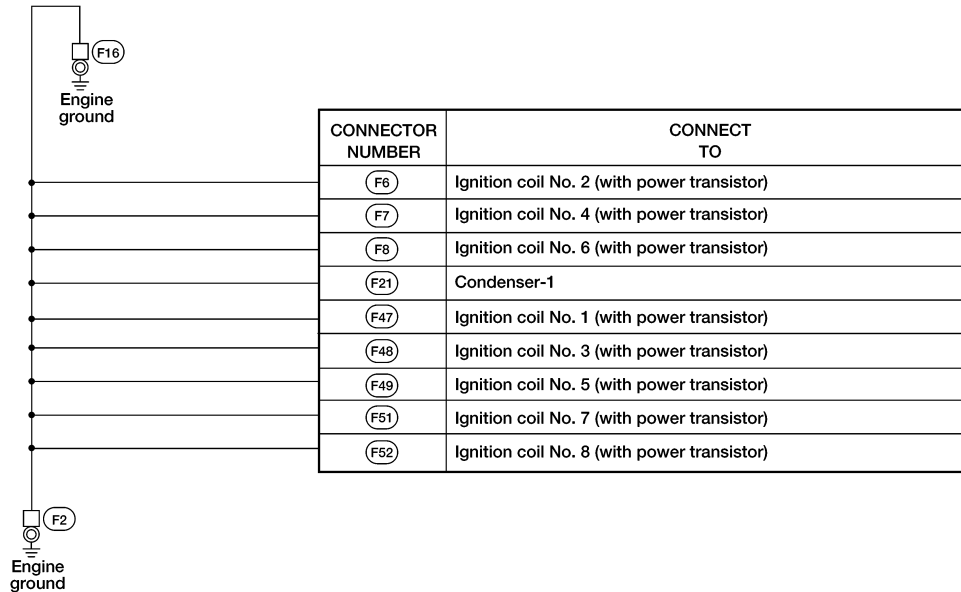
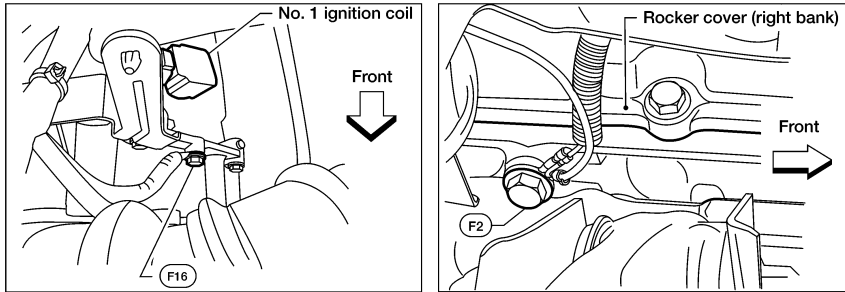
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# GROUND

< WIRING DIAGRAM >

## ENGINE CONTROL HARNESS

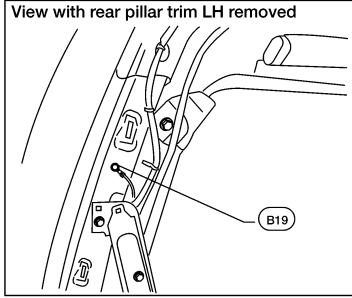
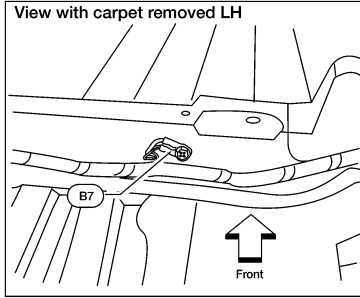


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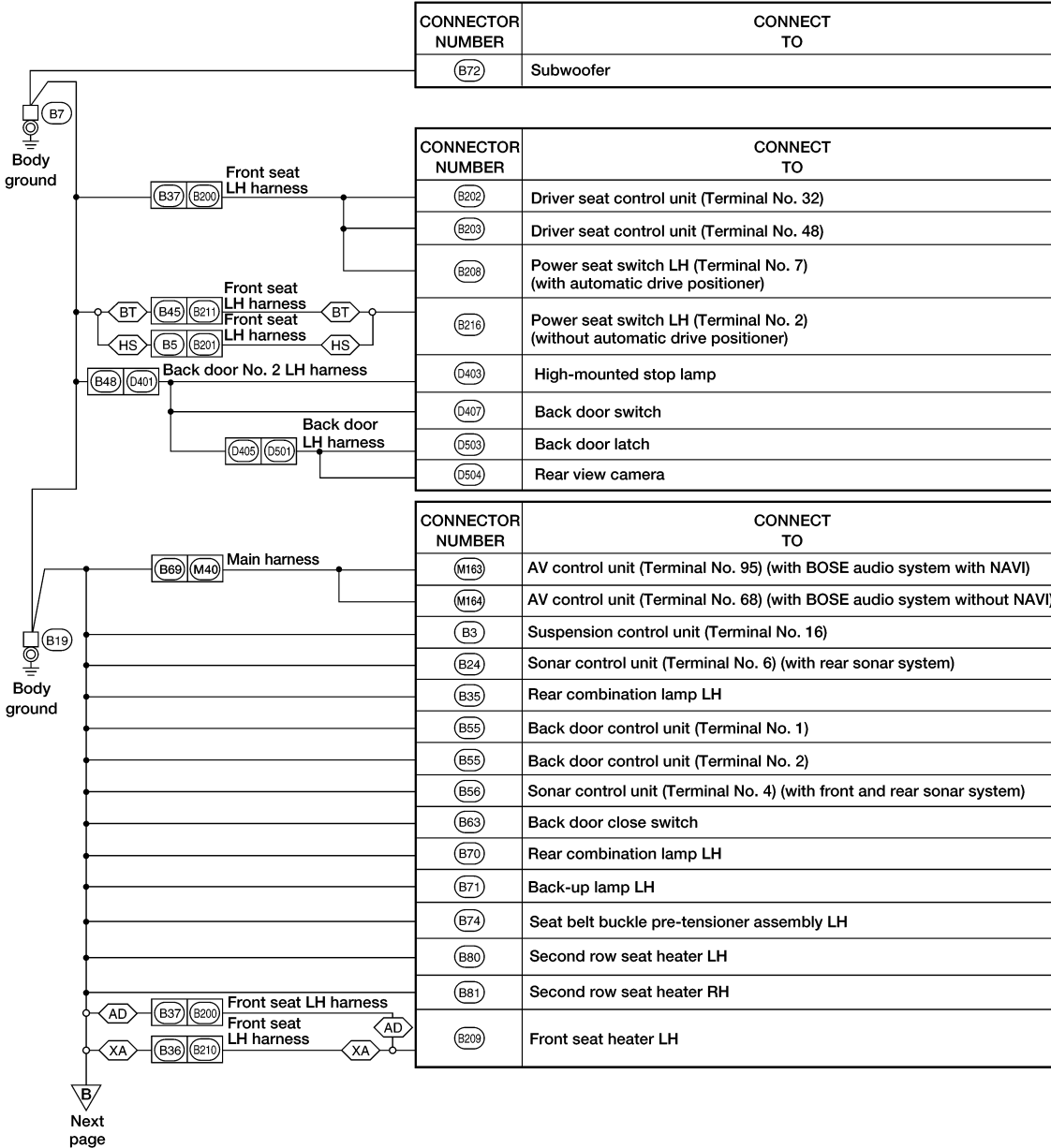
# GROUND

< WIRING DIAGRAM >

## BODY HARNESS



- AD : WITH AUTOMATIC DRIVE POSITIONER
- BT : WITHOUT HEATED SEATS
- HS : WITH HEATED SEATS
- XA : WITHOUT AUTOMATIC DRIVE POSITIONER

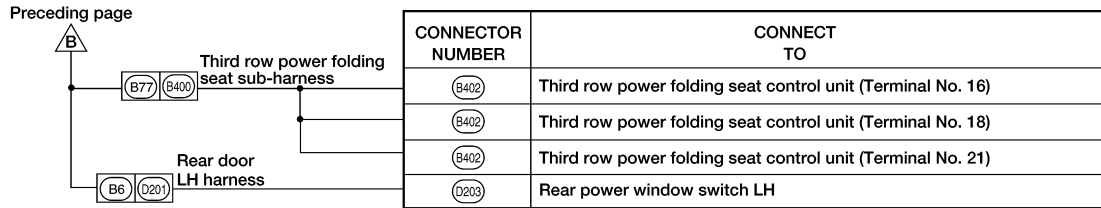
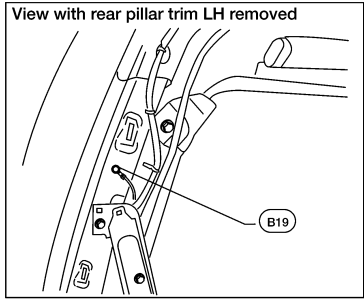


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# GROUND

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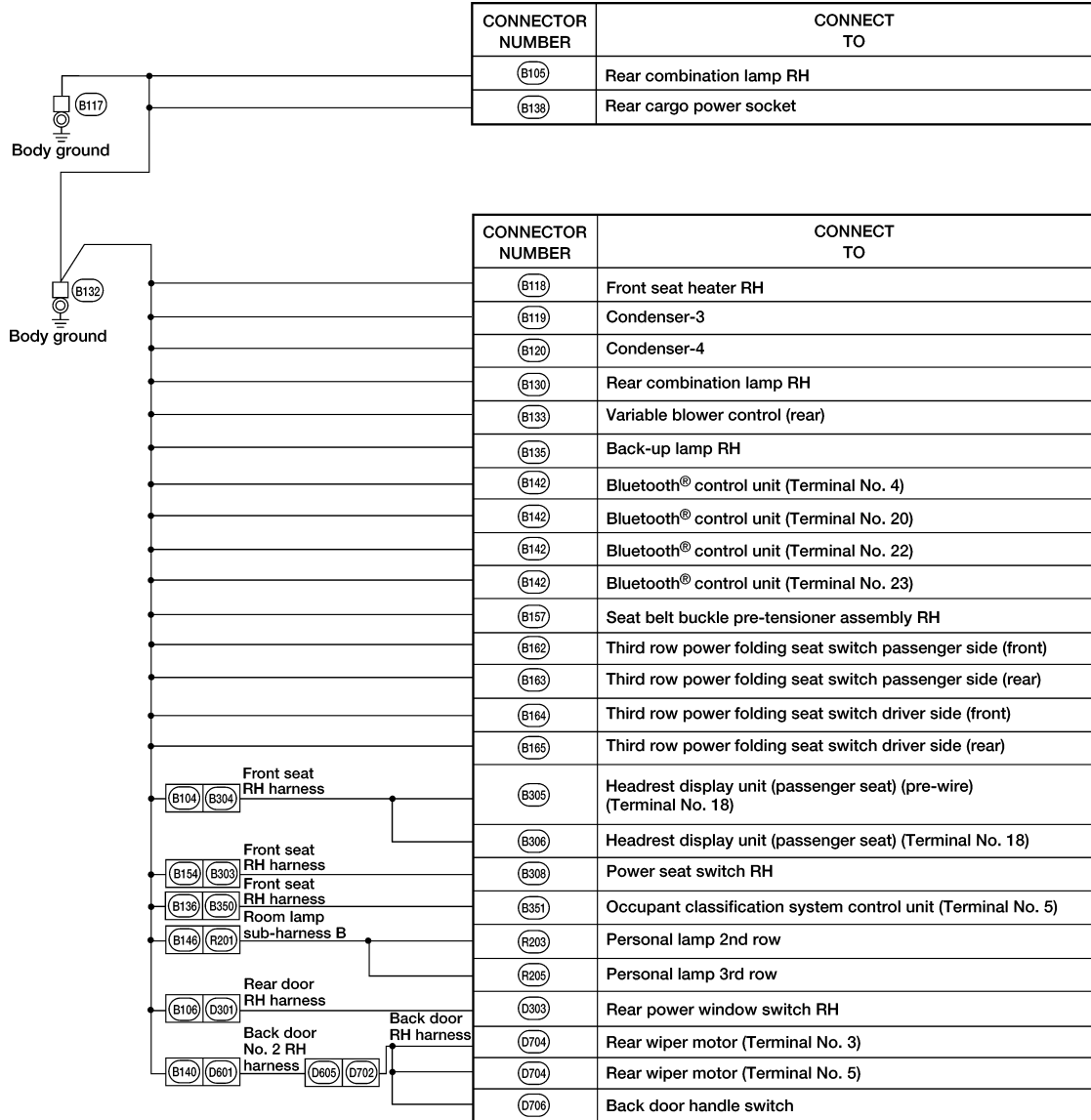
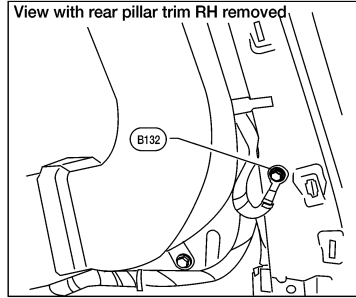
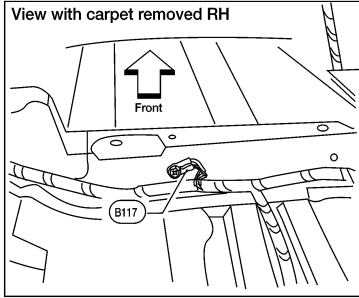


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# GROUND

< WIRING DIAGRAM >

## BODY NO. 2 HARNESS



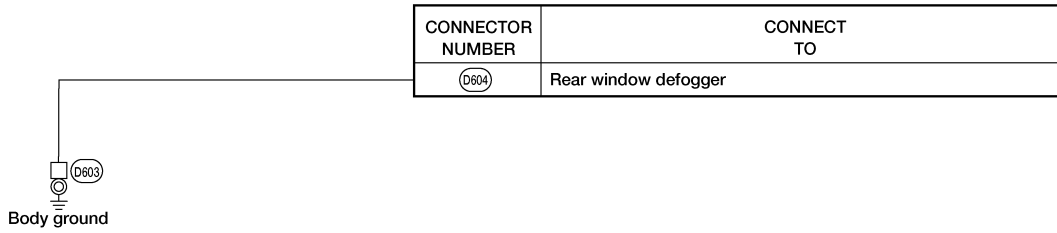
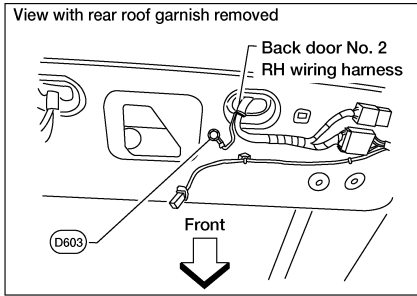
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# GROUND

< WIRING DIAGRAM >

## BACK DOOR NO. 2 RH HARNESS



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# HARNESS

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## HARNESS

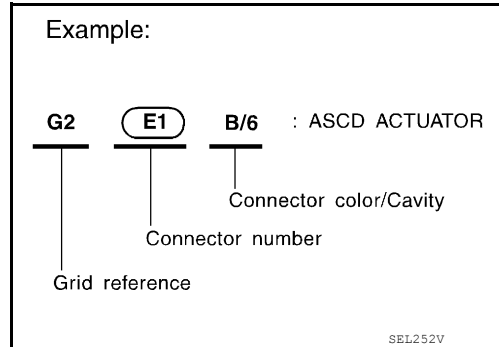
### Harness Layout

INFOID:000000011288278

#### HOW TO READ HARNESS LAYOUT

The following Harness Layouts use a map style grid to help locate connectors on the drawings:

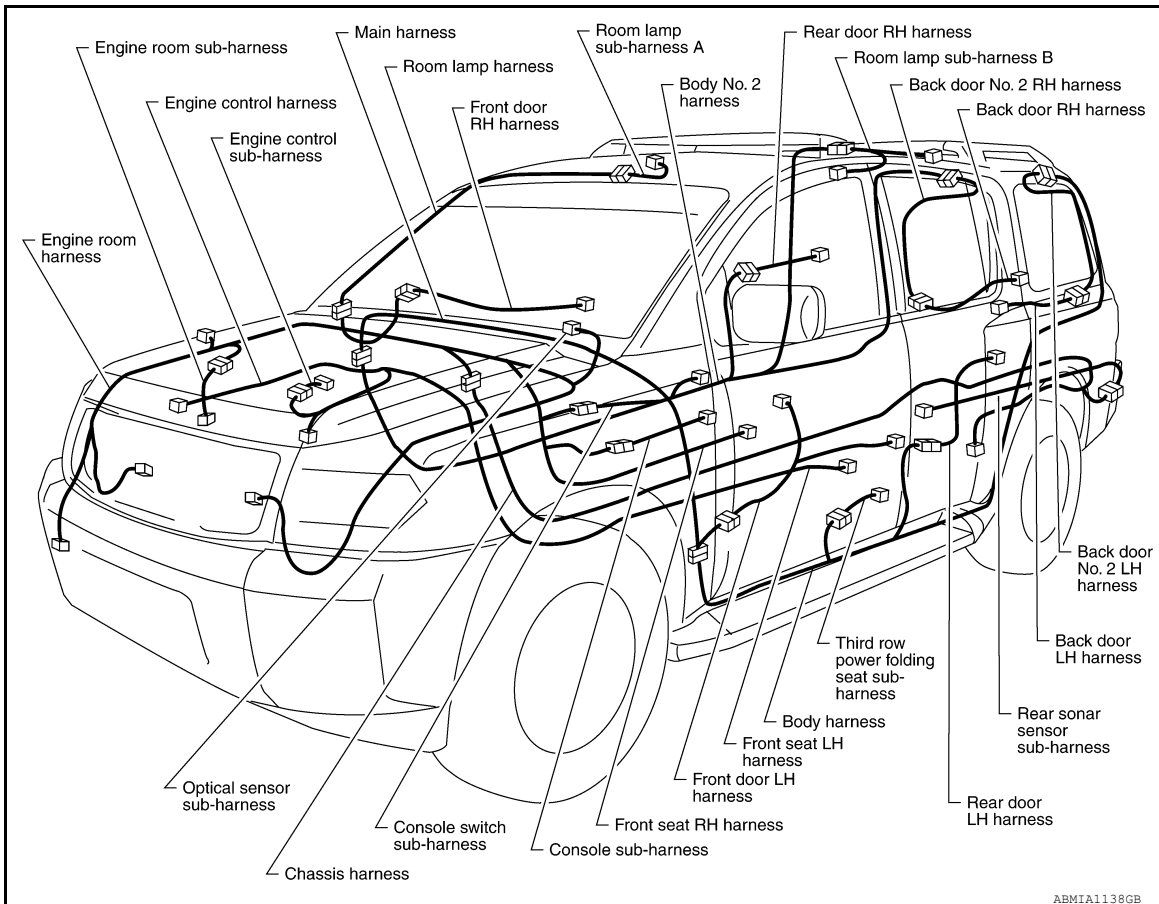
- Main Harness, Console Sub-harness, Console Switch Sub-harness and Optical Sensor Sub-harness
- Engine Room Harness and Engine Room Sub-harness
- Engine Room Harness (Passenger Compartment)
- Engine Control Harness and Engine Control Sub-harness
- Chassis Harness and Rear Sonar Sensor Sub-harness
- Body Harness, Front Seat LH Harness and Third Row Power Folding Seat Sub-harness
- Body No. 2 Harness and Front Seat RH Harness
- Room Lamp Harness, Room Lamp Sub-harness A and Room Lamp Sub-harness B
- Back Door Harness, Back Door No. 2 LH Harness, Back Door RH Harness, Back Door LH Harness and Back Door No. 2 RH Harness



#### To use the grid reference

1. Find the desired connector number on the connector list.
2. Find the grid reference.
3. On the drawing, find the crossing of the grid reference letter column and number row.
4. Find the connector number in the crossing zone.
5. Follow the line (if used) to the connector.

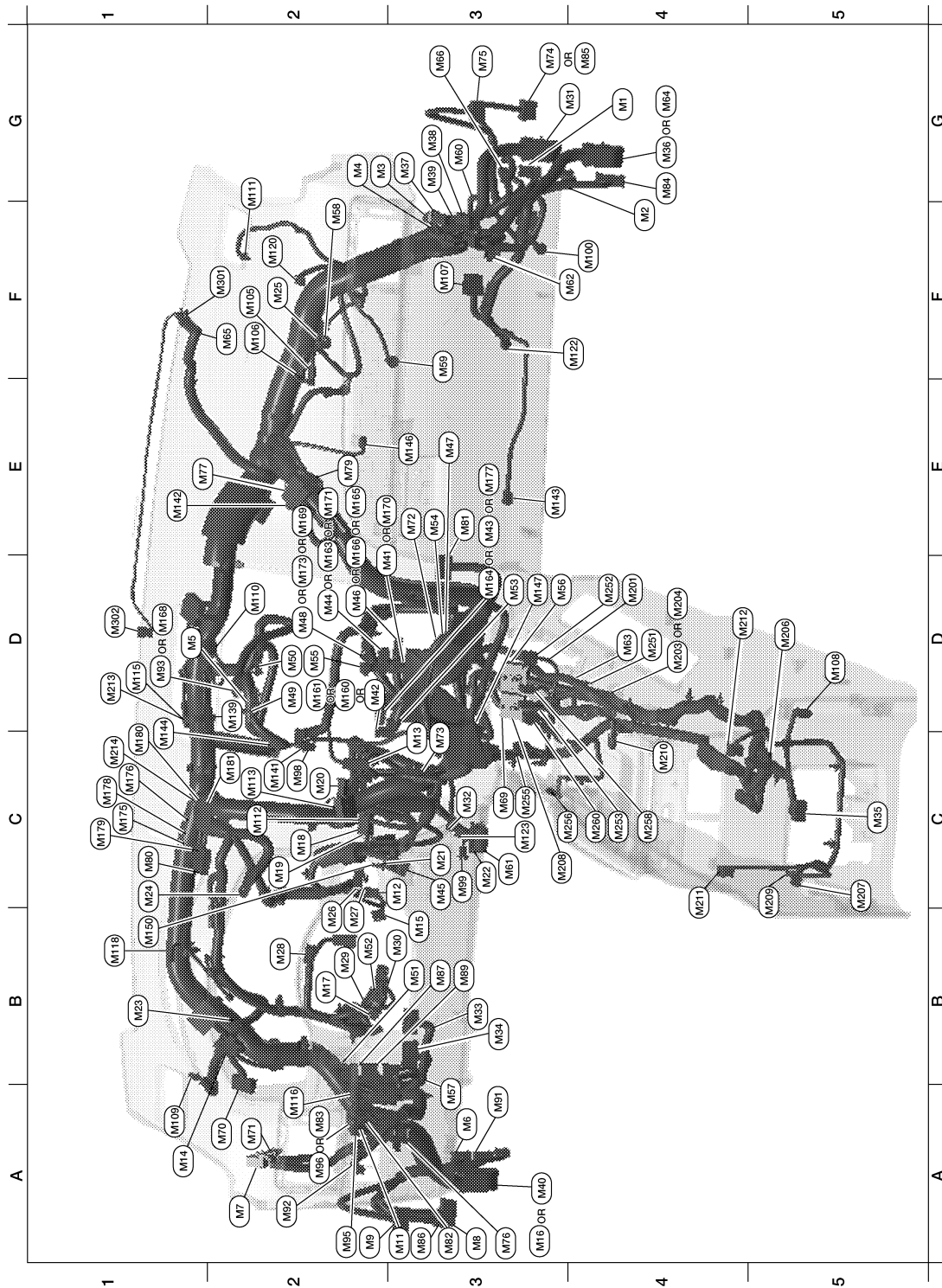
#### OUTLINE



# HARNESS

< WIRING DIAGRAM >

## MAIN HARNESS



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G4	M1	W/16	: To R1	G4	M84	Y/4	: To D103
F4	M2	W/12	: To R2	G3	M85	BR/20	: To D108
G2	M3	W/8	: Fuse block (J/B)	A3	M86	Y/4	: To D17
G2	M4	W/16	: Fuse block (J/B)	B3	M87	B/5	: Rear power vent window relay (open)



# HARNESS

## < WIRING DIAGRAM >

D1	M5	L/20	: Joint connector-M02	B3	M89	B/5	: Rear power vent window relay (close)	A
A3	M6	W/10	: To E10	A3	M91	W/16	: To E26	
A2	M7	B/5	: Passenger select unlock relay	A2	M92	GR/6	: Power liftgate switch	
A3	M8	W/16	: To D2	D1	M93	W/24	: Display unit (without NAVI)	B
A2	M9	W/32	: To D1	A2	M95	W/6	: Rear power vent window switch	
A3	M11	B/1	: Parking brake switch	A2	M96	BR/6	: Pedal adjusting switch (with automatic drive positioner)	C
C3	M12	GR/6	: Key switch and ignition knob switch	C2	M98	W/16	: A/C and AV switch assembly	
D3	M13	BR/2	: Front passenger air bag OFF indicator	C3	M99	BR/2	: Foot lamp LH	D
A1	M14	B/2	: Diode-3	F4	M100	BR/2	: Foot lamp RH	
B3	M15	W/4	: Steering lock solenoid	F2	M105	Y/2	: Front passenger air bag module	E
A3	M16	SMJ	: To B11	F2	M106	O/2	: Front passenger air bag module	
B2	M17	W/8	: Steering angle sensor	F3	M107	B/5	: Front blower relay	F
C2	M18	W/40	: BCM (body control module)	D5	M108	B/4	: Yaw rate/side/decel G sensor	
C2	M19	W/15	: BCM (body control module)	A1	M109	BR/2	: Front tweeter LH	G
C2	M20	B/15	: BCM (body control module)	D2	M110	BR/2	: Center speaker	
C3	M21	W/4	: NATS antenna amp.	F2	M111	BR/2	: Front tweeter RH	H
C3	M22	W/16	: Data link connector	C2	M112	BR/14	: BOSE speaker amp.	
B1	M23	W/12	: Combination meter	C2	M113	BR/23	: BOSE speaker amp.	I
C1	M24	W/40	: Combination meter	D1	M115	GR/7	: To M213	
F2	M25	B/4	: Remote keyless entry receiver	A2	M116	GR/8	: Sonar system OFF switch	J
B2	M26	W/6	: Ignition switch	B1	M118	B/2	: Front sonar buzzer	
B2	M27	W/4	: Key switch and key lock solenoid	F2	M120	W/4	: Remote keyless entry receiver	K
B2	M28	W/16	: Combination switch	F4	M122	W/4	: Variable blower control (front)	
B2	M29	Y/6	: Combination switch (spiral cable)	C3	M123	W/2	: Tire pressure warning check connector	L
B3	M30	GR/8	: Combination switch (spiral cable)	D2	M139	B/2	: Diode-1	
G4	M31	SMJ	: To E152	C2	M141	GR/8	: 4WD shift switch	
C3	M32	W/4	: In-vehicle sensor	E1	M142	B/6	: Mode door motor (front)	PG
B3	M33	W/32	: Automatic drive positioner control unit	E3	M143	B/6	: Air mix door motor (passenger)	
B3	M34	W/16	: Automatic drive positioner control unit	C1	M144	B/6	: Defroster door motor	N
C5	M35	Y/28	: Air bag diagnosis sensor unit	E3	M146	GR/2	: Intake sensor	
G4	M36	SMJ	: To B149	D3	M147	B/6	: Air mix door motor (driver)	O
G3	M37	B/1	: Fuse block (J/B)	B1	M150	W/2	: Ignition keyhole illumination	
G3	M38	B/2	: Fuse block (J/B)	D2	M160	W/20	: AV control unit (with BOSE audio system without NAVI)	P
G3	M39	W/8	: Fuse block (J/B)	D2	M161	W/20	: AV control unit (with BOSE audio system with NAVI)	
A3	M40	SMJ	: To B69	D2	M163	W/40	: AV control unit (with BOSE audio system with NAVI)	
D3	M41	W/12	: AV control unit (with base audio system)	D3	M164	W/16	: AV control unit (with BOSE audio system without NAVI)	
D2	M42	W/20	: AV control unit (with base audio system)	D2	M165	W/32	: AV control unit (with BOSE audio system with NAVI)	
E3	M43	W/16	: AV control unit (with base audio system)	D2	M166	W/32	: AV control unit (with BOSE audio system without NAVI)	
D2	M44	W/24	: AV control unit (with base audio system)	D1	M168	W/24	: Display unit (with NAVI)	

# HARNESS

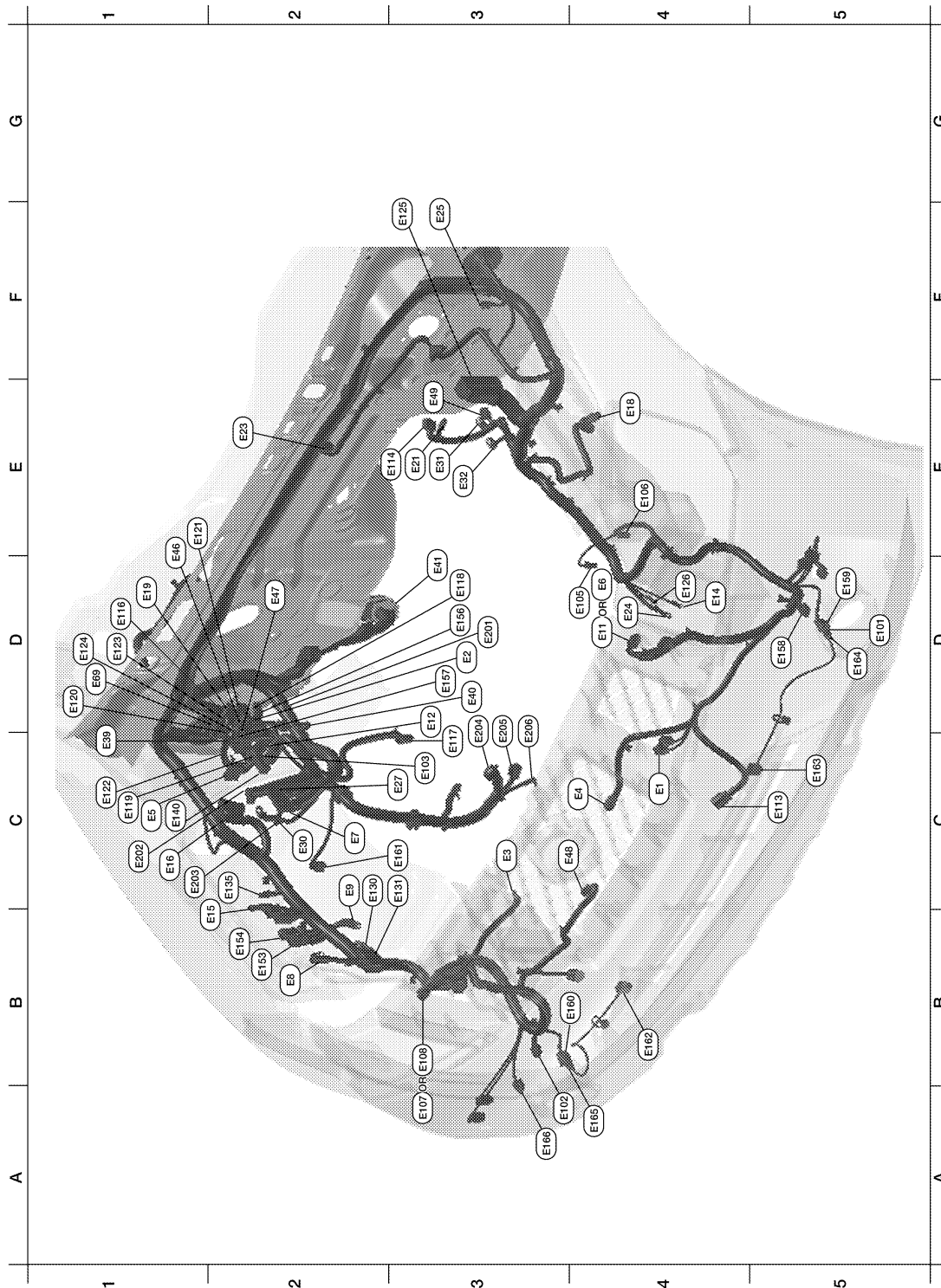
## < WIRING DIAGRAM >

C3	M45	W/16	: Satellite radio tuner	E2	M169	L/5	: AV control unit (with BOSE audio system without NAVI)
D2	M46	W/32	: AV control unit (with base audio system)	D2	M170	W/12	: AV control unit (with BOSE audio system without NAVI)
E3	M47	B/2	: Sonar buzzer	D2	M171	W/24	: AV control unit (with BOSE audio system without NAVI)
D2	M48	L/5	: AV control unit (with base audio system)	D2	M173	L/5	: AV control unit (with BOSE audio system with NAVI)
D2	M49	B/26	: A/C auto amp.	C1	M175	L/20	: Joint connector-M10
D2	M50	L/26	: A/C auto amp.	C1	M176	L/20	: Joint connector-M11
B3	M51	L/4	: Trailer tow relay 1	E3	M177	W/28	: AV control unit (with BOSE audio system with NAVI)
B2	M52	W/2	: Combination switch (spiral cable)	C1	M178	L/20	: Joint connector-M06
D3	M53	B/3	: Front power socket LH	C1	M179	G/20	: Joint connector-M01
E3	M54	B/3	: Front power socket RH (for cigarette lighter)	C1	M180	L/20	: Joint connector-M03
D2	M55	W/4	: Hazard switch	C2	M181	L/20	: Joint connector-M04
D4	M56	W/16	: To M201	Console sub-harness			
A3	M57	—	: Body ground	D4	M201	W/16	: To M56
F2	M58	B/6	: Intake door motor	D4	M203	W/12	: A/T shift selector (with Intelligent Key system)
F3	M59	BR/2	: Glove box lamp	D4	M204	W/12	: A/T shift selector (without Intelligent Key system)
G3	M60	W/6	: Fuse block (J/B)	D5	M206	W/8	: Front auxiliary input jacks
C3	M61	—	: Body ground	C5	M207	B/3	: Console power socket
F4	M62	B/2	: Front blower motor	C4	M208	BR/20	: To M69
D4	M63	BR/20	: To M251	C5	M209	W/2	: Center console area antenna (rear)
G4	M64	SMJ	: To B112	C4	M210	GR/2	: Center console area antenna (front)
F2	M65	W/4	: To M301	B4	M211	W/6	: Second row heated seat switch LH
G3	M66	B/1	: To E33	D4	M212	BR/6	: Second row heated seat switch RH
C3	M69	BR/20	: To M208	D1	M213	GR/7	: To M115
A2	M70	W/40	: Intelligent Key unit	C1	M214	GR/5	: USB interface
A2	M71	L/4	: Heated steering relay	Console switch sub-harness			
E3	M72	W/12	: AV control unit (with BOSE audio system without NAVI)	D4	M251	BR/20	: To M63
D3	M73	BR/6	: Back-up lamp relay	D4	M252	BR/6	: Front heated seat switch RH
G3	M74	BR/20	: To D102	C4	M253	GR/6	: VDC OFF switch
G3	M75	W/10	: To D101	C3	M255	W/6	: Front heated seat switch LH
A3	M76	W/6	: Electric brake (pre-wiring)	C4	M256	B/2	: A/T shift selector
E2	M77	Y/4	: Front passenger air bag module (service replacement)	C4	M258	GR/8	: Tow mode switch
E2	M79	—	: Body ground	C4	M260	W/6	: Heated steering wheel switch
C1	M80	B/2	: Resistor	Optical sensor sub-harness			
E3	M81	GR/10	: Shift lock control unit	F2	M301	W/4	: To M65
A3	M82	W/2	: Circuit breaker-2	F2	M302	W/4	: Optical sensor
A2	M83	BR/6	: Pedal adjusting switch (without automatic drive positioner)				

# HARNESSES

< WIRING DIAGRAM >

## ENGINE ROOM HARNESS



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C4	E1	GR/2	: Ambient sensor	B3	E108	B/6	: Front combination lamp RH (with daytime light system)
D3	E2	W/16	: To F32	C5	E113	W/2	: Cooling fan motor
C3	E3	B/2	: Horn	E3	E114	B/6	: Delta stroke sensor
C3	E4	Y/2	: Crash zone sensor	D1	E116	W/2	: Condenser-2
C1	E5	W/24	: To F14	D3	E117	GR/2	: Front wheel sensor RH

# HARNESSES

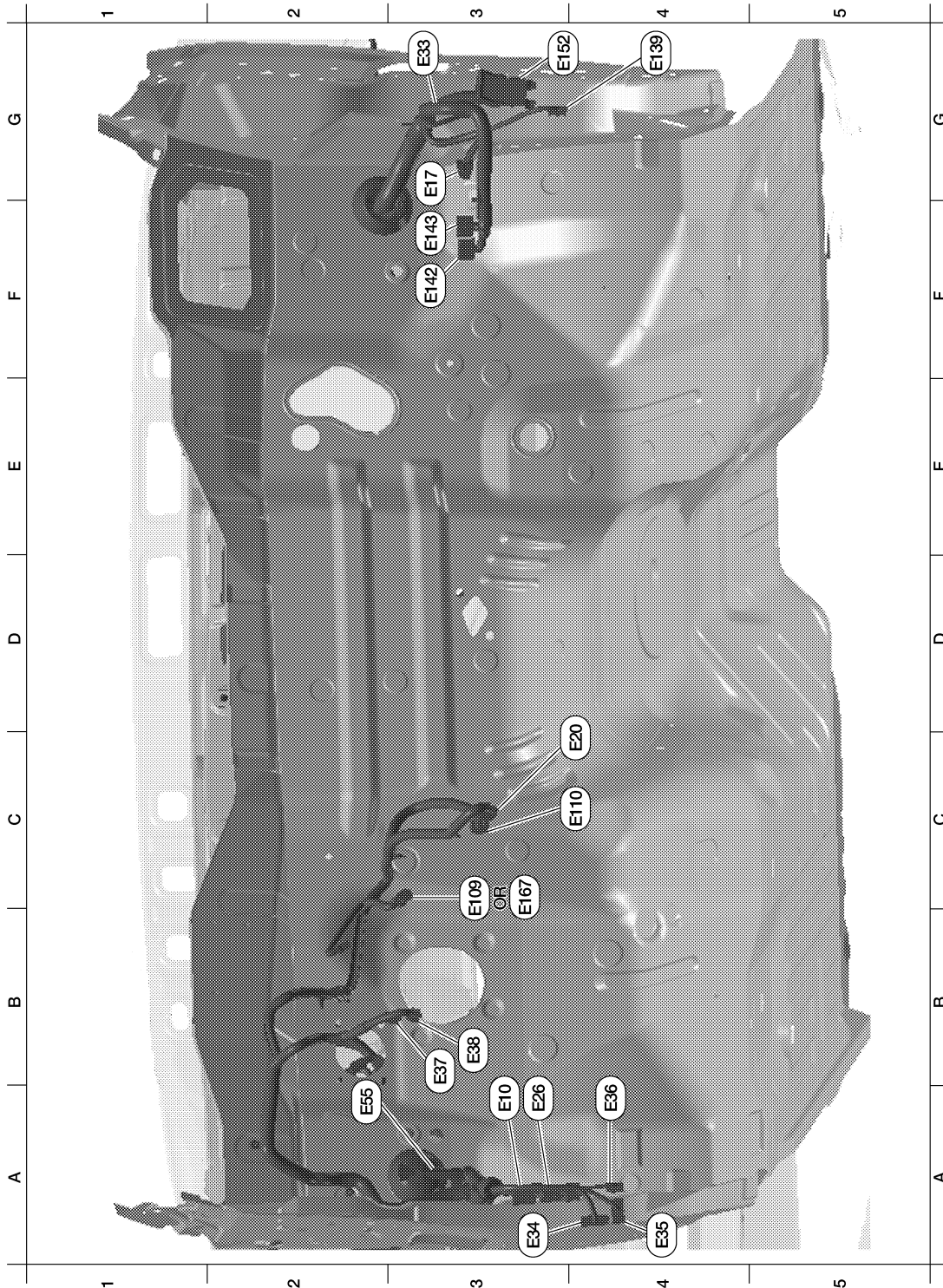
## < WIRING DIAGRAM >

D4	E6	B/6	: Front combination lamp LH (with daytime light system)	D3	E118	B/2	: IPDM E/R (intelligent power distribution module engine room)
C2	E7	GR/2	: Fusible link box (battery)	C1	E119	W/16	: IPDM E/R (intelligent power distribution module engine room)
B2	E8	GR/2	: Dropping resistor	D1	E120	W/6	: IPDM E/R (intelligent power distribution module engine room)
C2	E9	—	: Body ground	E1	E121	BR/12	: IPDM E/R (intelligent power distribution module engine room)
D4	E11	B/6	: Front combination lamp LH (without daytime light system)	C1	E122	W/12	: IPDM E/R (intelligent power distribution module engine room)
D3	E12	B/5	: Stop lamp relay	D1	E123	BR/8	: IPDM E/R (intelligent power distribution module engine room)
D4	E14	—	: Body ground	D1	E124	B/6	: IPDM E/R (intelligent power distribution module engine room)
B2	E15	—	: Body ground	F3	E125	B/47	: ABS actuator and electric unit (control unit)
C1	E16	B/40	: ECM	D4	E126	—	: Body ground
E4	E18	GR/2	: Front wheel sensor LH	C2	E130	W/2	: Compressor motor relay
D1	E19	W/16	: To F33	C3	E131	W/2	: Compressor motor relay
E3	E21	GR/2	: Brake fluid level switch	C2	E135	GR/2	: Transfer dropping resistor
E2	E23	GR/6	: Front wiper motor	C1	E140	BR/6	: Trailer tow relay 2
D4	E24	—	: Body ground	B2	E153	W/2	: Transfer motor relay
F3	E25	BR/3	: Intelligent Key warning buzzer	B2	E154	W/2	: Transfer motor relay
C3	E27	BR/2	: Fusible link box (battery)	D3	E156	L/4	: Trailer turn relay LH
C2	E30	/1	: Fusible link box (battery)	D3	E157	L/4	: Trailer turn relay RH
E3	E31	GR/3	: Front pressure sensor	D5	E158	B/3	: Front sonar sensor LH outer
E3	E32	GR/3	: Rear pressure sensor	D5	E159	GR/3	: To E164
C1	E39	W/2	: To F34	B4	E160	GR/3	: To E165
D3	E40	B/3	: To E201	C3	E161	B/3	: Battery current sensor
D3	E41	SMJ	: To C1	B4	E162	B/3	: Front sonar sensor LH inner
E1	E46	B/5	: Transfer shift high relay	C5	E163	B/3	: Front sonar sensor RH inner
D2	E47	B/5	: Transfer shift low relay	D5	E164	GR/3	: To E159
C3	E48	B/3	: Refrigerant pressure sensor	A4	E165	GR/3	: To E160
E3	E49	B/6	: Active booster	A3	E166	B/3	: Front sonar sensor RH outer
D1	E69	L/4	: Transfer shut off relay	Engine room sub-harness			
D5	E101	B/2	: Front fog lamp LH	D3	E201	B/3	: To E40
A3	E102	B/2	: Front fog lamp RH	C1	E202	/1	: Fusible link box (battery)
C3	E103	B/5	: Daytime running light relay	C1	E203	—	: Body ground
D4	E105	BR/2	: Front and rear washer motor	C3	E204	/1	: Generator
E4	E106	BR/2	: Washer fluid level switch	C3	E205	B/3	: Generator
B3	E107	B/6	: Front combination lamp RH (without daytime light system)	C3	E206	/1	: Generator

# HARNESS

< WIRING DIAGRAM >

## ENGINE ROOM HARNESS (PASSENGER COMPARTMENT)



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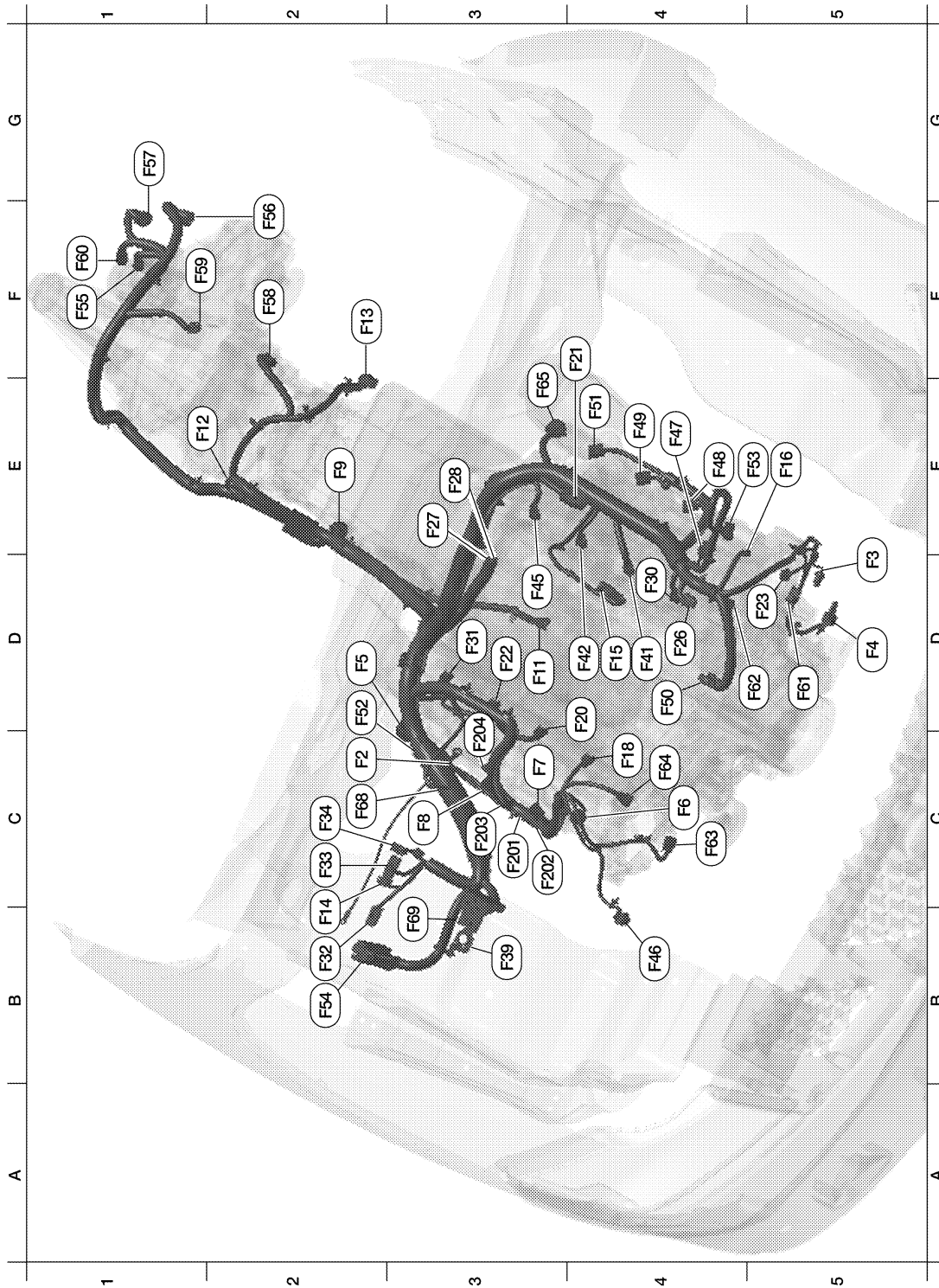
A3	E10	W/10	: To M6	B3	E38	B/2	: Stop lamp switch
G3	E17	W/4	: Fuel pump control module (FPCM)	A2	E55	L/4	: Accessory relay-2
C4	E20	B/8	: Accelerator pedal position (APP) sensor	B3	E109	GR/2	: Pedal adjusting motor assembly (with automatic drive positioner)
A3	E26	W/16	: To M91	C4	E110	GR/3	: Pedal adjusting motor assembly

# HARNESS

## < WIRING DIAGRAM >

G3	E33	B/1	: To M66	G4	E139	W/8	: To B107
A3	E34	W/24	: To B40	F3	E142	W/24	: Transfer control unit
A4	E35	W/12	: To B41	F3	E143	GR/24	: Transfer control unit
A4	E36	W/2	: To B42	G3	E152	SMJ	: To M31
B3	E37	BR/2	: Brake pedal position switch	B3	E167	GR/2	: Pedal adjusting motor (without automatic drive positioner)

## ENGINE CONTROL HARNESS



ABMIA4104GB

# HARNESS

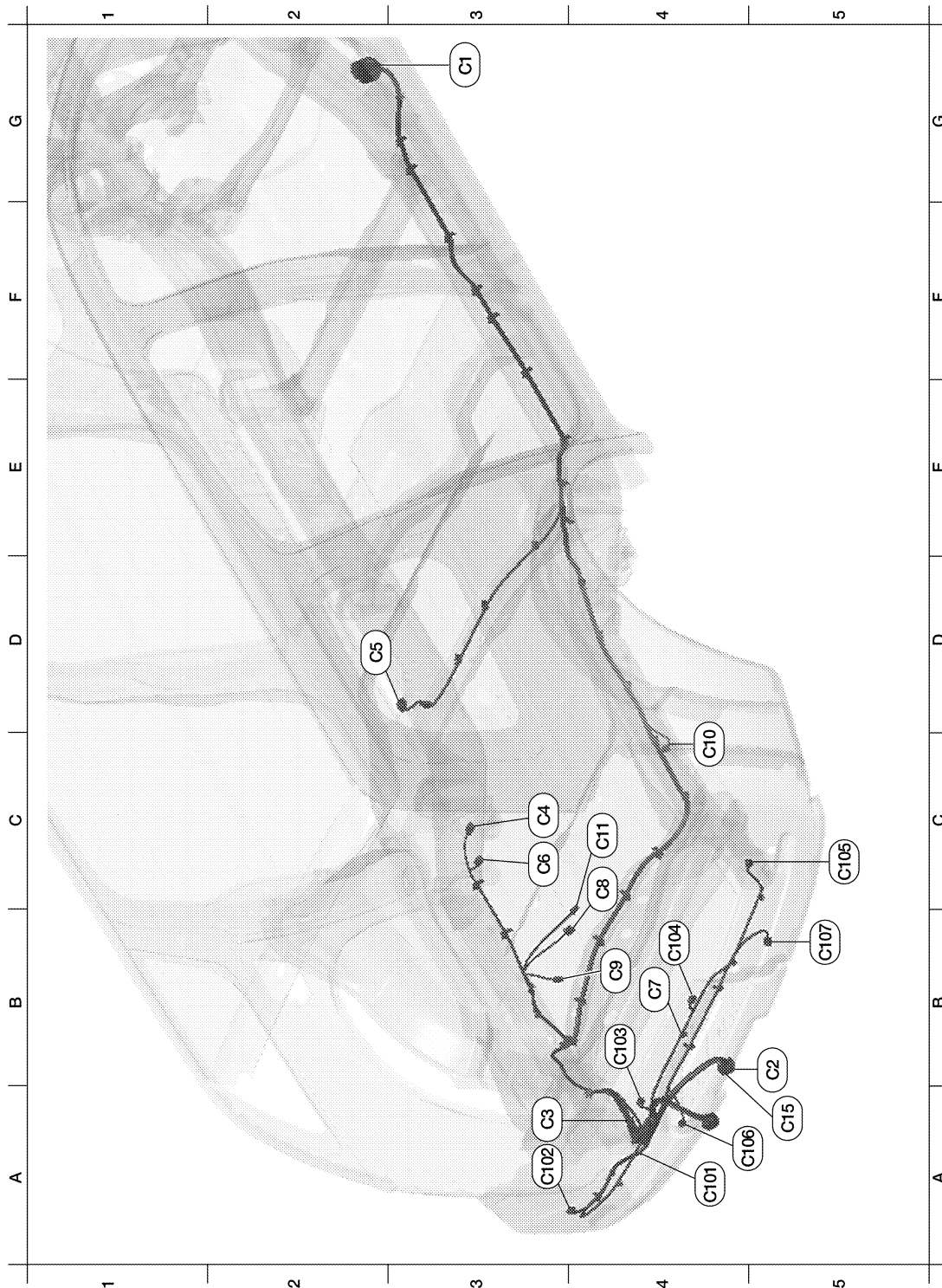
## < WIRING DIAGRAM >

C2	F2	—	: Engine ground	D4	F42	GR/2	: Fuel injector No. 5	A
D5	F3	B/1	: A/C Compressor	D3	F45	GR/2	: Fuel injector No. 7	
D5	F4	GR/1	: Oil pressure switch	B4	F46	B/3	: Power steering pressure sensor	B
D2	F5	BR/4	: Air fuel ratio (A/F) sensor 1 (bank 2)	E4	F47	GR/3	: Ignition coil No. 1 (with power transistor)	
C4	F6	GR/3	: Ignition coil No. 2 (with power transistor)	E4	F48	GR/3	: Ignition coil No. 3 (with power transistor)	C
C3	F7	GR/3	: Ignition coil No. 4 (with power transistor)	E4	F49	GR/3	: Ignition coil No. 5 (with power transistor)	
C3	F8	GR/3	: Ignition coil No. 6 (with power transistor)	D4	F50	W/6	: Electric throttle control actuator	D
E2	F9	G/10	: A/T assembly	E4	F51	GR/3	: Ignition coil No. 7 (with power transistor)	
D3	F11	B/3	: Crankshaft position sensor (POS)	D2	F52	GR/3	: Ignition coil No. 8 (with power transistor)	E
E1	F12	G/4	: Heated oxygen sensor 2 (bank 2)	E5	F53	B/6	: Mass air flow sensor	
F2	F13	G/4	: Heated oxygen sensor 2 (bank 1)	B2	F54	B/81	: ECM	F
B2	F14	W/24	: To E5	F1	F55	B/2	: ATP switch	
D4	F15	GR/2	: EVAP canister purge volume control solenoid valve	F2	F56	B/8	: Transfer terminal cord assembly	G
E5	F16	—	: Engine ground	G1	F57	B/2	: Transfer motor	
C4	F18	GR/2	: Fuel injector No. 2	F2	F58	GR/6	: Transfer control device	H
D4	F20	GR/2	: Fuel injector No. 4	F1	F59	B/2	: Wait detection switch	
F4	F21	W/2	: Condenser-1	F1	F60	GR/2	: Neutral-4LO switch	I
D3	F22	GR/2	: Fuel injector No. 6	D5	F61	G/2	: Intake valve timing control solenoid valve (bank 1)	J
D5	F23	B/3	: Camshaft position sensor (PHASE)	D5	F62	B/3	: Intake valve timing control position sensor (bank 1)	
D4	F26	B/6	: To F101	C4	F63	G/2	: Intake valve timing control solenoid valve (bank 2)	K
E3	F27	/1	: Starter motor	C4	F64	B/3	: Intake valve timing control position sensor (bank 2)	
E3	F28	GR/1	: Starter motor	E3	F65	BR/4	: Air fuel ratio (A/F) sensor 1 (bank 1)	L
D4	F30	GR/2	: Fuel injector No. 1	C2	F68	GR/2	: Water valve	
D3	F31	GR/2	: Fuel injector No. 8	D1	F69	GR/6	: Joint connector-F01	PG
B2	F32	W/16	: To E2	Engine control sub-harness				
C2	F33	W/16	: To E19	C3	F201	B/6	: To F26	
C2	F34	W/2	: To E39	C3	F202	B/2	: Knock sensor (bank 1)	
B3	F39	—	: Fusible link box (battery)	C3	F203	GR/2	: Engine coolant temperature sensor	
D4	F41	GR/2	: Fuel injector No. 3	D3	F204	B/2	: Knock sensor (bank 2)	

# HARNESS

< WIRING DIAGRAM >

## CHASSIS HARNESS



ABMIA4084GB

G2	C1	SMJ	: To E41	C4	C11	BR/2	: Rear wheel sensor LH
B5	C2	B/7	: Trailer	A5	C15	B/7	: Trailer receptacle
A3	C3	GR/8	: To C101	Rear sonar sensor sub-harness			
C3	C4	GR/3	: Evap control system pressure sensor	A4	C101	GR/8	: To C3
D2	C5	GR/5	: Fuel level sensor unit and fuel pump	A3	C102	B/3	: Rear sonar sensor LH outer

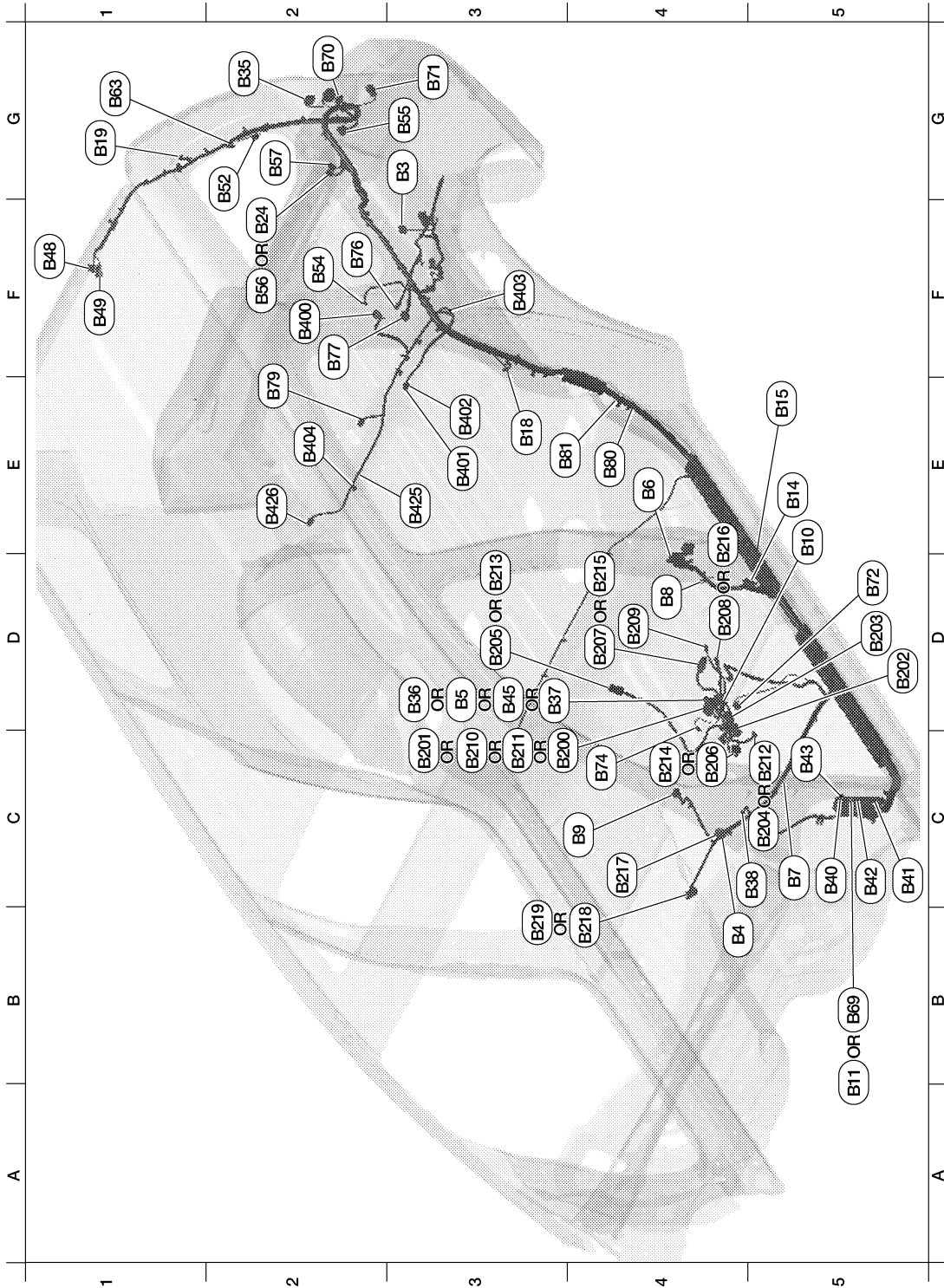


# HARNESSES

## < WIRING DIAGRAM >

C3	C6	B/2	: Evap canister vent control valve	B4	C103	B/3	: Rear sonar sensor LH inner
B4	C7	GR/2	: Rear bumper antenna	B4	C104	B/3	: Rear sonar sensor RH inner
C4	C8	B/3	: Height sensor	C5	C105	B/3	: Rear sonar sensor RH outer
B4	C9	B/4	: Suspension air compressor	A5	C106	GR/2	: License plate lamp LH
C4	C10	BR/2	: Rear wheel sensor RH	B5	C107	GR/2	: License plate lamp RH

## BODY HARNESS



ABMIA6060GB

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# HARNESS

## < WIRING DIAGRAM >

G3	B3	W/16	: Suspension control unit	C4	B74	Y/4	: Seat belt buckle pre-tensioner assembly LH
B4	B4	W/16	: To B217	F2	B76	GR/2	: Luggage area antenna
D3	B5	W/6	: To B201	F2	B77	W/10	: To B400
D4	B6	W/18	: To D201	E2	B79	W/24	: To B125
C5	B7	—	: Body ground	E4	B80	W/3	: Second row seat heater LH
D4	B8	W/3	: Front door switch LH	E4	B81	W/3	: Second row seat heater RH
C4	B9	Y/22	: Air bag diagnosis sensor unit	Front seat LH harness			
E5	B10	Y/2	: Front LH side air bag module	C3	B200	W/16	: To B37 (with automatic drive positioner)
B5	B11	SMJ	: To M16	C3	B201	W/6	: To B5
E5	B14	Y/2	: Front LH seat belt pre-tensioner	D5	B202	W/32	: Driver seat control unit
E5	B15	Y/2	: LH side air bag (satellite) sensor	D5	B203	W/16	: Driver seat control unit
E3	B18	W/3	: Rear door switch LH	C4	B204	GR/5	: Sliding motor LH (with automatic drive positioner)
G1	B19	—	: Body ground	D3	B205	W/4	: Reclining motor LH (with automatic drive positioner)
F2	B24	W/16	: Sonar control unit (with rear sonar system)	C4	B206	GR/5	: Lifting motor (front) (with automatic drive positioner)
G2	B35	B/3	: Rear combination lamp LH	D4	B207	GR/5	: Lifting motor (rear) (with automatic drive positioner)
D3	B36	W/6	: To B210 (with automatic drive positioner)	D4	B208	W/10	: Power seat switch LH (with automatic drive positioner)
D3	B37	W/16	: To B200 (with automatic drive positioner)	D4	B209	W/3	: Front seat heater LH (with automatic drive positioner)
C4	B38	Y/2	: LH side front curtain air bag module	D4	B210	W/6	: To B36 (without automatic drive positioner)
C5	B40	W/24	: To E34	D3	B211	W/2	: To B45 (without automatic drive positioner)
C5	B41	W/12	: To E35	C5	B212	GR/2	: Sliding motor LH (without automatic drive positioner)
C5	B42	W/2	: To E36	D3	B213	W/2	: Reclining motor LH (without automatic drive positioner)
C5	B43	W/16	: To B111	C4	B214	GR/2	: Lifting motor (front) (without automatic drive positioner)
D3	B45	W/2	: To B211 (without automatic drive positioner)	D4	B215	GR/2	: Lifting motor (rear) (without automatic drive positioner)
F1	B48	W/18	: To D401	D4	B216	W/10	: Power seat switch LH (without automatic drive positioner)
F1	B49	W/2	: To D402	C4	B217	W/16	: To B4
G2	B52	W/2	: Rear power vent window motor LH	B4	B218	-/24	: Headrest display unit (driver seat) (pre-wire)
F2	B54	Y/2	: LH side rear curtain air bag module	B3	B219	W/24	: Headrest display unit (driver seat)
G3	B55	W/26	: Back door control unit	Third row power folding seat sub-harness			
F2	B56	GR/16	: Sonar control unit (with front and rear sonar system)	F2	B400	W/10	: To B77
G2	B57	GR/10	: Sonar control unit (with front and rear sonar system)	E3	B401	GR/12	: Third row power folding seat control unit
G1	B63	W/6	: Back door close switch	E3	B402	W/10	: Third row power folding seat control unit
B5	B69	SMJ	: To M40	E3	B403	GR/4	: Third row power folding seat motor LH
G2	B70	B/3	: Rear combination lamp LH	E2	B404	W/4	: To B425



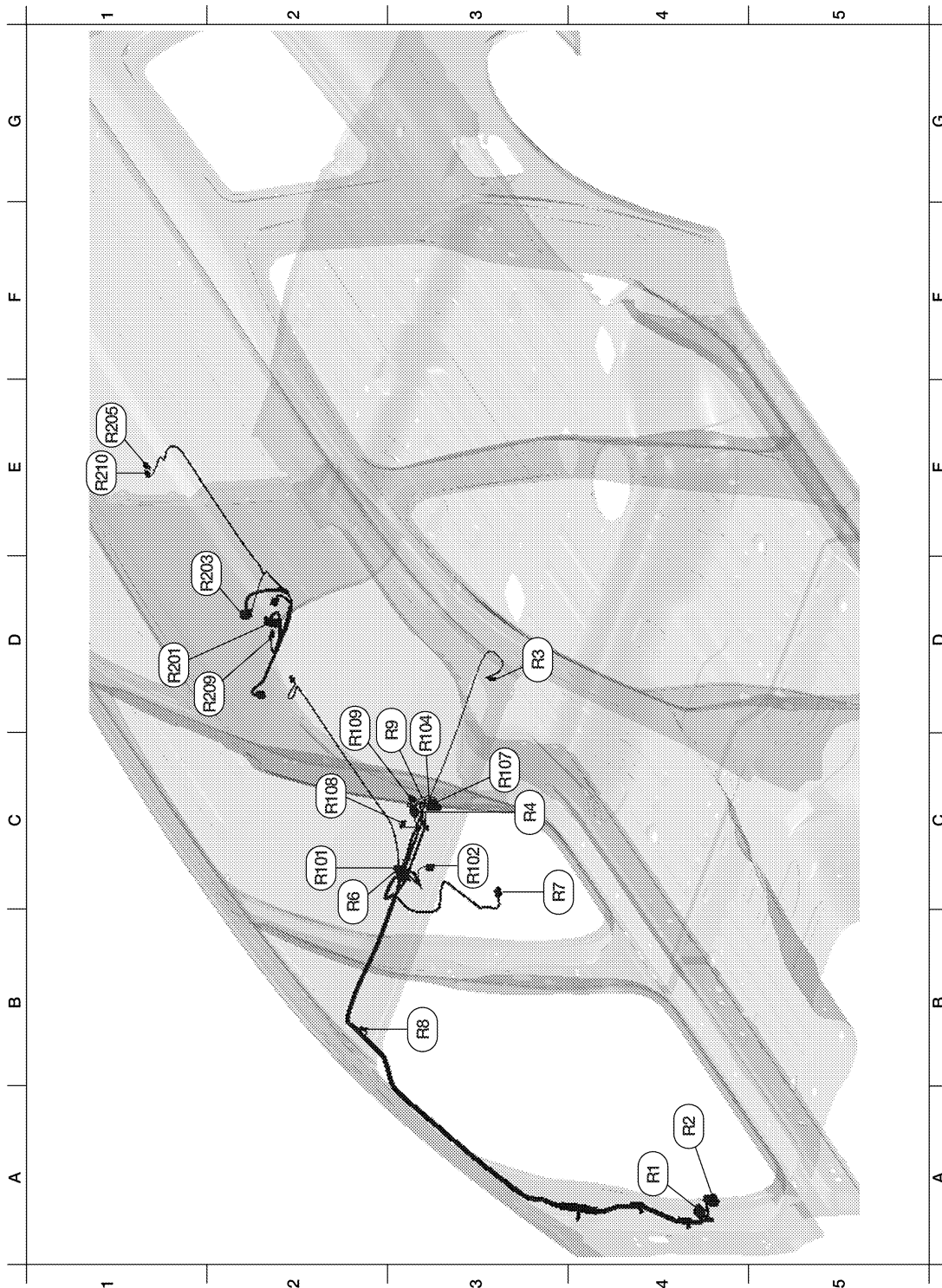
# HARNESS

## < WIRING DIAGRAM >

F4	B107	W/8	: To E139	E2	B146	BR/24	: To R201
E4	B108	W/3	: Front door switch RH	F4	B149	SMJ	: To M36
F4	B111	W/16	: To B43	B3	B150	W/2	: Rear power vent window motor RH
F4	B112	SMJ	: To M64	B2	B153	W/2	: Cargo lamp
E3	B113	Y/22	: Air bag diagnosis sensor unit	E5	B154	W/2	: To B303
D5	B114	Y/2	: RH side air bag (satellite) sensor	B3	B155	B/6	: Air mix door motor (rear)
C4	B116	W/3	: Rear door switch RH	B3	B156	B/6	: Mode door motor (rear)
F5	B117	—	: Body ground	E4	B157	Y/4	: Seat belt buckle pre-tensioner assembly RH
E5	B118	W/3	: Front seat heater RH	C3	B162	BR/6	: Third row power folding seat switch passenger side (front)
A3	B119	W/2	: Condenser-3	A3	B163	W/6	: Third row power folding seat switch passenger side (rear)
A2	B120	W/2	: Condenser-4	C3	B164	W/6	: Third row power folding seat switch driver side (front)
B3	B125	W/24	: To B79	A3	B165	BR/6	: Third row power folding seat switch driver side (rear)
E4	B126	Y/2	: Front RH side air bag module	B2	B166	B/2	: Rear sonar buzzer
D4	B127	Y/2	: Front RH seat belt pre-tensioner	Front seat RH harness			
C3	B128	Y/2	: RH side rear curtain air bag module	E4	B303	W/2	: To B154
F4	B129	Y/2	: RH side front curtain air bag module	E3	B304	W/24	: To B104
A3	B130	B/3	: Rear combination lamp RH	E1	B305	-/24	: Headrest display unit (passenger seat) (pre-wire)
A3	B132	—	: Body ground	E2	B306	W/24	: Headrest display unit (passenger seat)
A4	B133	W/4	: Variable blower control (rear)	F4	B308	W/6	: Power seat switch RH
B4	B134	W/2	: Rear blower motor	E4	B309	GR/2	: Sliding motor RH
A4	B135	B/2	: Back-up lamp RH	E4	B350	W/8	: To B136
D4	B136	W/8	: To B350	E4	B351	B/18	: Occupant classification system control unit
D4	B137	W/3	: Belt tension sensor	E4	B352	B/3	: Occupant classification system sensor
B3	B138	B/3	: Rear cargo power socket	E4	B372	W/2	: Reclining motor RH
A2	B139	W/16	: To D602				

# HARNESS

## < WIRING DIAGRAM > ROOM LAMP HARNESS



ABMIA4087GB

A4	R1	W/16	: To M1	D3	R104	GR/6	: Sunroof switch
A4	R2	W/12	: To M2	C3	R107	W/8	: To R9
D3	R3	W/2	: Vanity lamp LH	C2	R108	B/6	: Rear air control (front)
C3	R4	W/10	: Sunroof motor assembly	D2	R109	W/4	: Microphone
C2	R6	W/16	: To R101	Room lamp sub-harness B			

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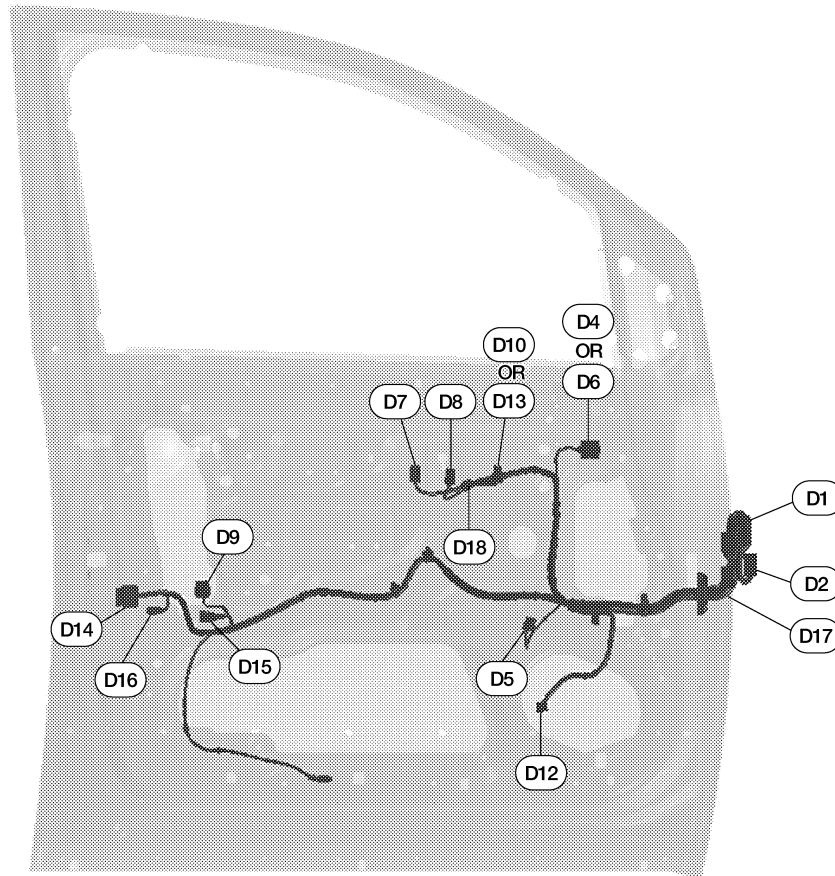
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# HARNESS

## < WIRING DIAGRAM >

C3	R7	GR/10	: Auto anti-dazzling inside mirror	D1	R201	BR/24	: To B146
B3	R8	W/2	: Vanity lamp RH	D1	R203	W/3	: Personal lamp 2ND row
D3	R9	W/8	: To R107	E1	R205	W/3	: Personal lamp 3RD row
Room lamp sub-harness A				D2	R209	B/6	: Rear air control (rear)
C2	R101	W/16	: To R6	E1	R210	W/2	: Over head console area antenna
C3	R102	GR/8	: Front room/map lamp assembly				

## FRONT DOOR LH HARNESS



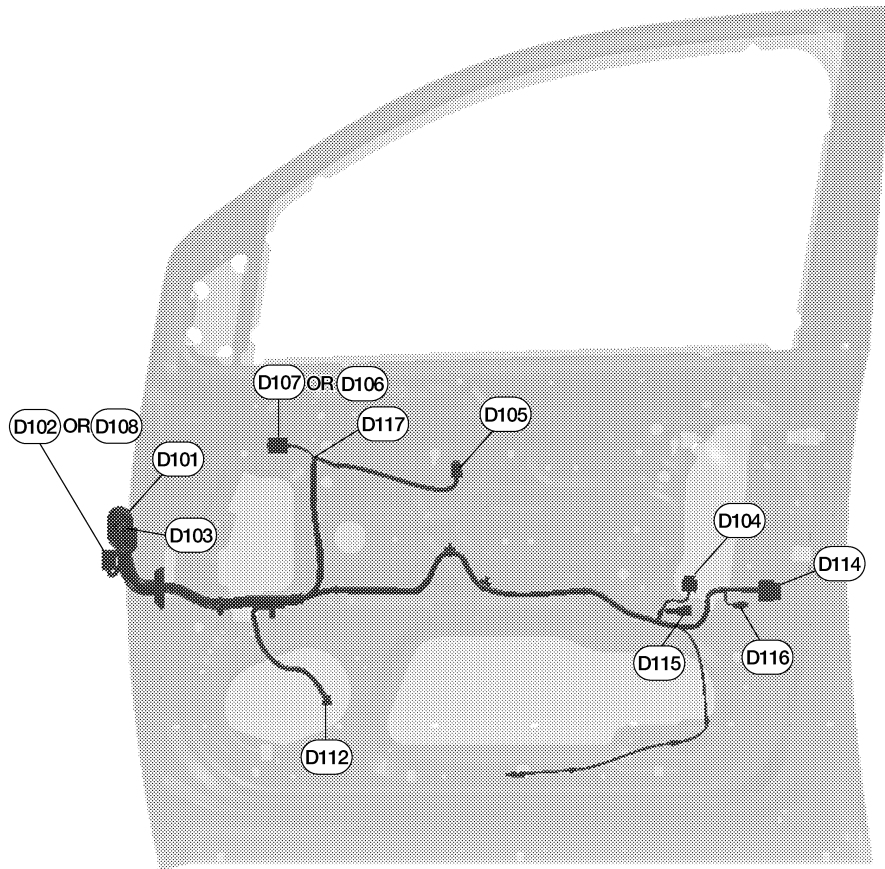
ABMIA6725GB

D1	W/32	: To M9	D10	BR/16	: Door mirror remote control switch (with automatic drive positioner)
D2	W/16	: To M8	D12	W/2	: Front door speaker LH
D4	W/16	: Door mirror LH (with automatic drive positioner)	D13	W/16	: Door mirror remote control switch (without automatic drive positioner)
D5	W/16	: Seat memory switch	D14	B/6	: Front door lock assembly LH
D6	W/6	: Door mirror LH (without automatic drive positioner)	D15	GR/2	: Front outside antenna LH
D7	W/16	: Main power window and door lock/unlock switch	D16	GR/2	: Front door request switch LH
D8	W/3	: Main power window and door lock/unlock switch	D17	Y/4	: To M86
D9	GR/6	: Front power window motor LH	D18	Y/2	: Front door satellite sensor LH

# HARNESS

< WIRING DIAGRAM >

## FRONT DOOR RH HARNESS



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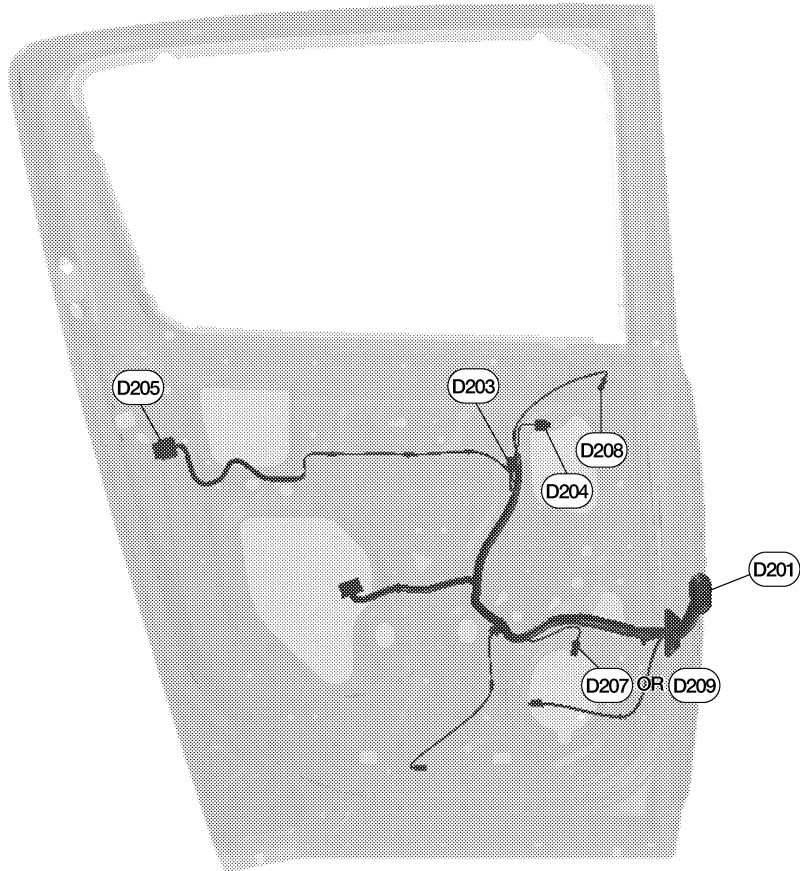
D101	W/10	: To M75	D108	BR/20	: To M85
D102	BR/20	: To M74	D112	W/2	: Front door speaker RH
D103	Y/4	: To M84	D114	B/6	: Front door lock actuator RH
D104	GR/6	: Front power window motor RH	D115	GR/2	: Front outside antenna RH
D105	W/16	: Power window and door lock/unlock switch RH	D116	GR/2	: Front door request switch RH
D106	W/6	: Door mirror RH (without automatic drive positioner)	D117	Y/2	: Front door satellite sensor RH
D107	W/16	: Door mirror RH (with automatic drive positioner)			

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# HARNESS

< WIRING DIAGRAM >

## REAR DOOR LH HARNESS



ABMIA6727GB

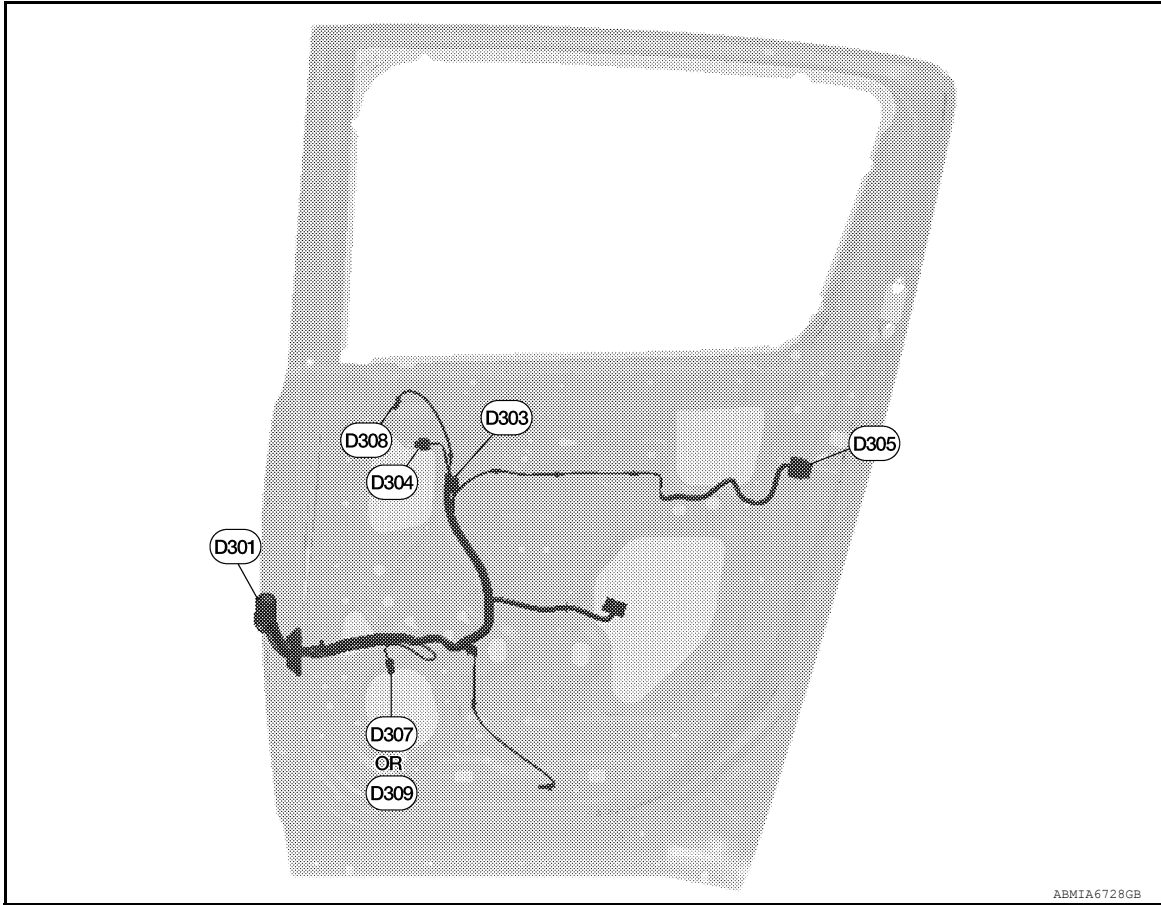
D201	W/18	: To B6	D207	BR/2	: Rear door speaker LH (with BOSE audio system)
D203	W/8	: Rear power window switch LH	D208	BR/2	: Rear door tweeter LH
D204	GR/2	: Rear power window motor LH	D209	W/2	: Rear door speaker LH (with base audio system)
D205	B/6	: Rear door lock actuator LH			



# HARNESS

< WIRING DIAGRAM >

## REAR DOOR RH HARNESS



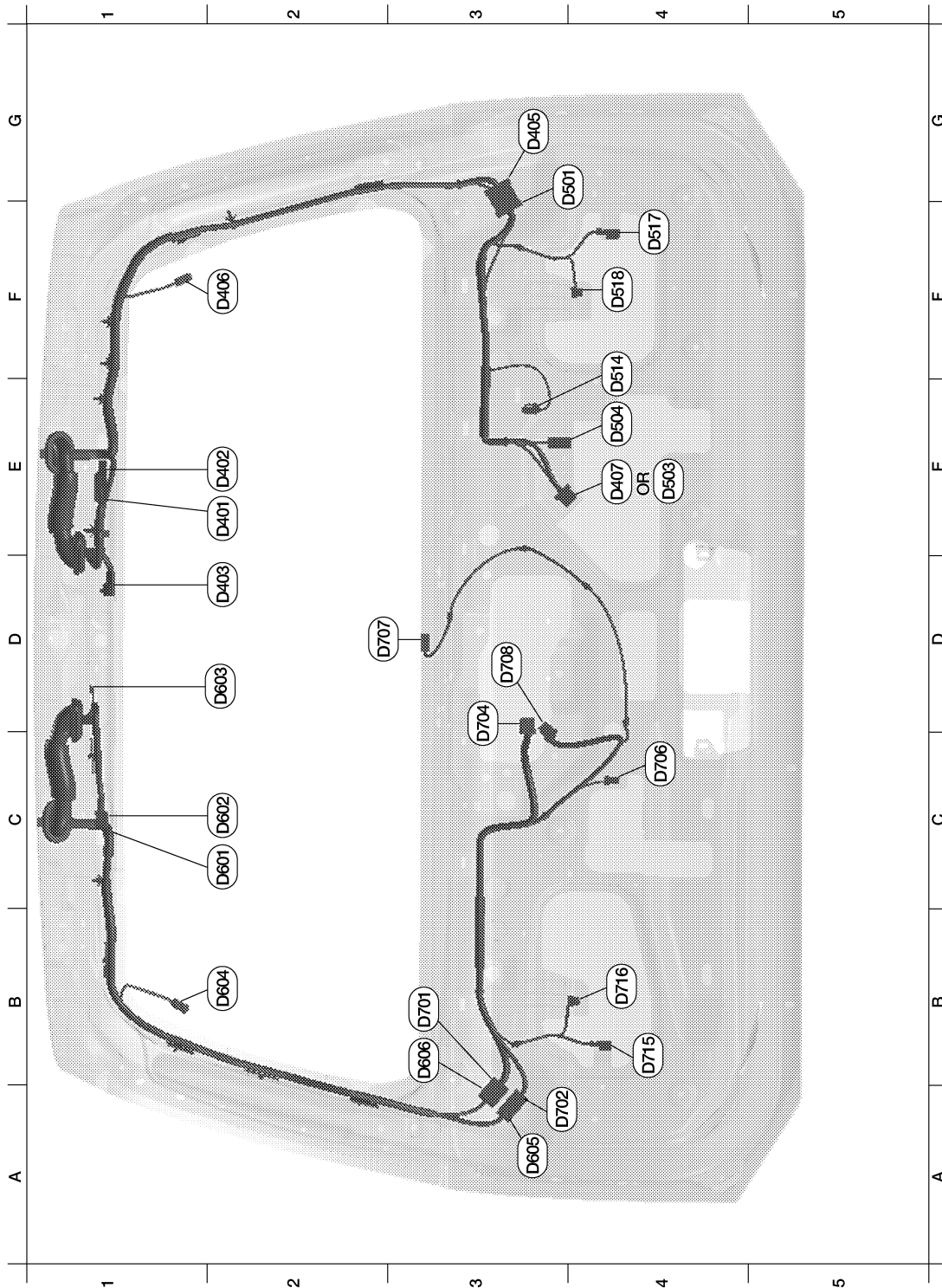
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D301	W/18	: To B106	D307	BR/2	: Rear door speaker RH (with BOSE audio system)
D303	W/8	: Rear power window switch RH	D308	BR/2	: Rear door tweeter RH
D304	GR/2	: Rear power window motor RH	D309	W/2	: Rear door speaker RH (with base audio system)
D305	B/6	: Rear door lock actuator RH			

# HARNESS

## < WIRING DIAGRAM > BACK DOOR HARNESS



ABMIA6062GB

Back door No. 2 LH harness				C2	D601	W/6	: To B140
E2	D401	W/18	: To B48	C2	D602	W/16	: To B139
E2	D402	W/2	: To B49	D2	D603	—	: Body ground
D2	D403	GR/2	: High-mounted stop lamp	B2	D604	B/1	: Rear window defogger
G3	D405	W/18	: To D501	A3	D605	W/6	: To D702

# HARNESS

## < WIRING DIAGRAM >

F2	D406	B/1	: Rear window defogger	B3	D606	W/16	: To D701
E4	D407	W/3	: Back door switch	Back door RH harness			
Back door LH harness				B3	D701	W/16	: To D606
G3	D501	W/18	: To D405	A3	D702	W/6	: To D605
E4	D503	W/8	: Back door latch	D3	D704	W/6	: Rear wiper motor
E4	D504	W/8	: Rear view camera	C4	D706	GR/2	: Back door handle switch
F4	D514	BR/2	: Back door warning chime	D2	D707	B/1	: Glass hatch ajar switch
F4	D517	BR/2	: Pinch strip LH	D3	D708	W/4	: Back door lock actuator
F4	D518	BR/2	: Back door speaker LH	B4	D715	BR/2	: Pinch strip RH
Back door No. 2 RH harness				B4	D716	BR/2	: Back door speaker RH

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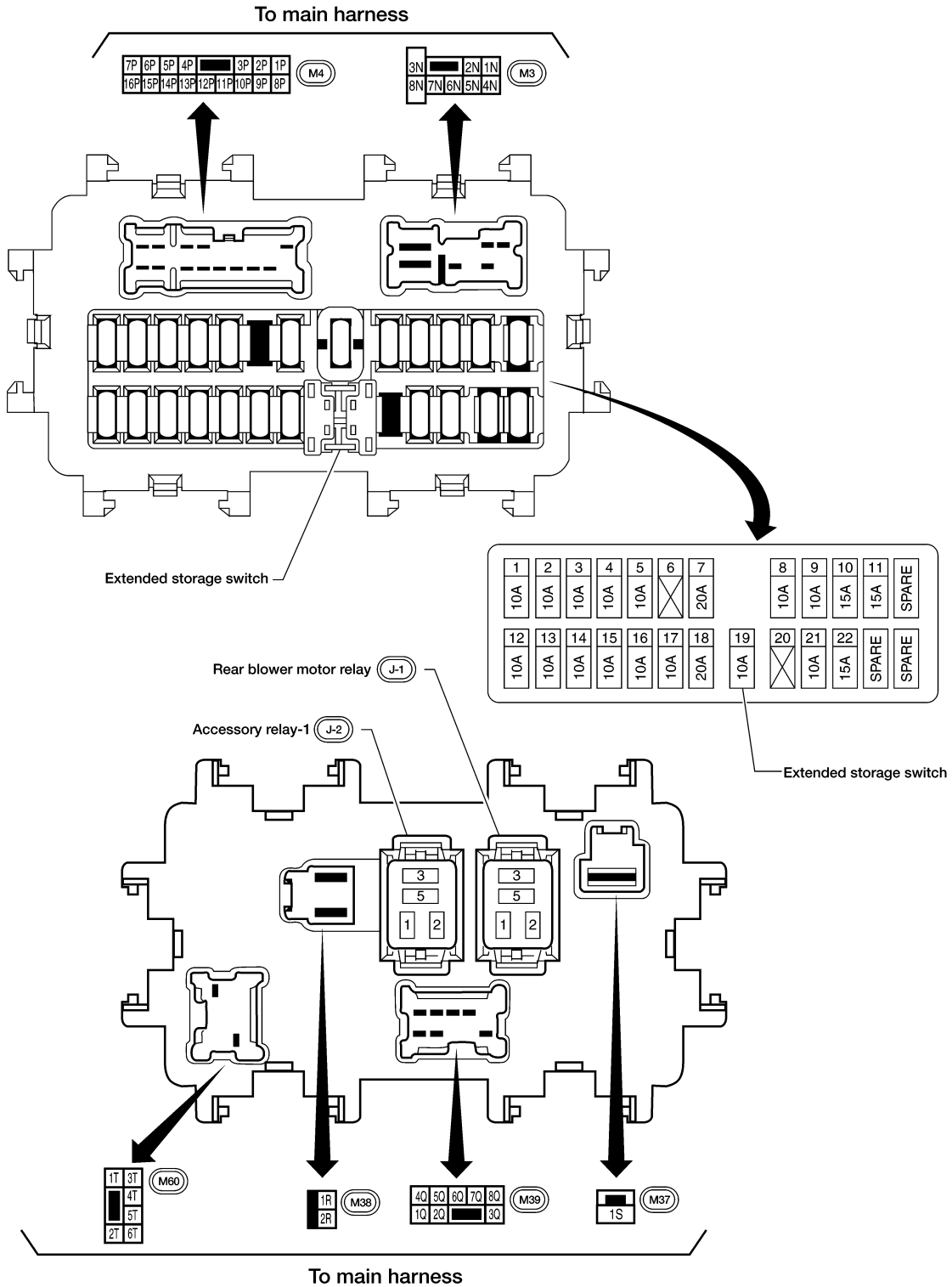
# FUSE BLOCK - JUNCTION BOX (J/B)

< WIRING DIAGRAM >

## FUSE BLOCK - JUNCTION BOX (J/B)

### Terminal Arrangement

INFOID:000000011288282



ABMIA671.9GB

# FUSE, FUSIBLE LINK AND RELAY BOX

< WIRING DIAGRAM >

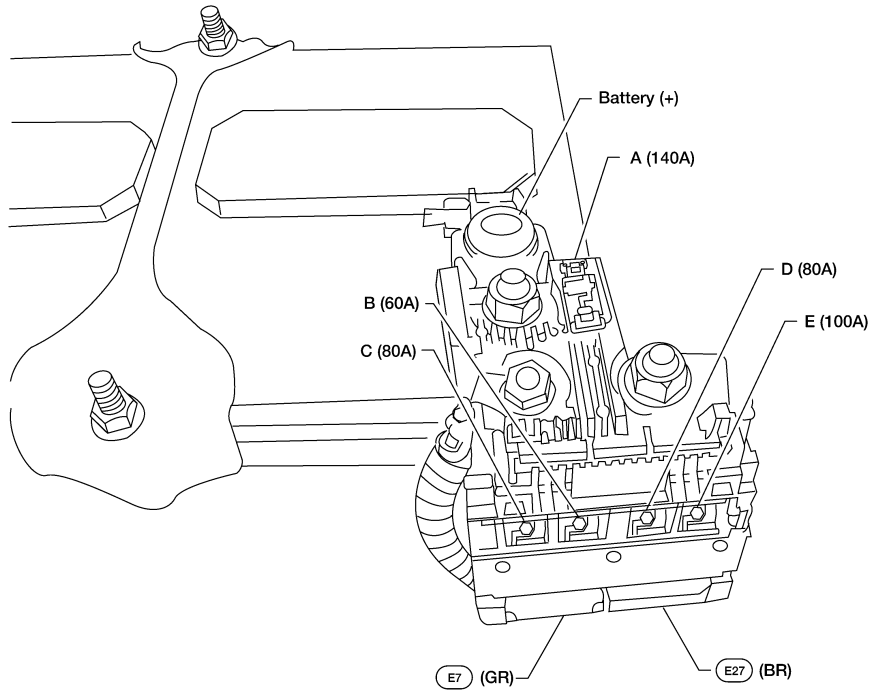
## FUSE, FUSIBLE LINK AND RELAY BOX

### Terminal Arrangement

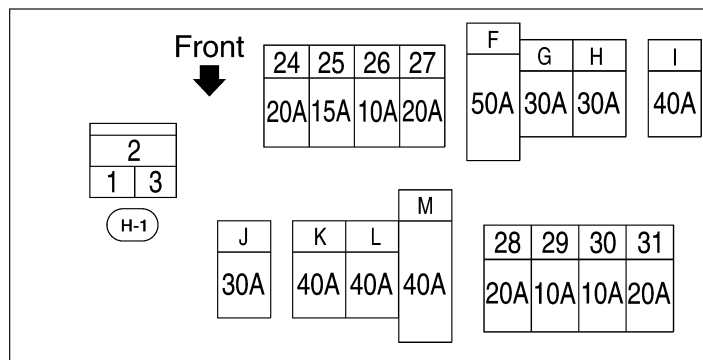
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### FUSE AND FUSIBLE LINK BOX

FUSIBLE LINK BOX (BATTERY)



FUSE AND FUSIBLE LINK BOX



24 - 31 : FUSE F - M : FUSIBLE LINK

ABMIA2509GB

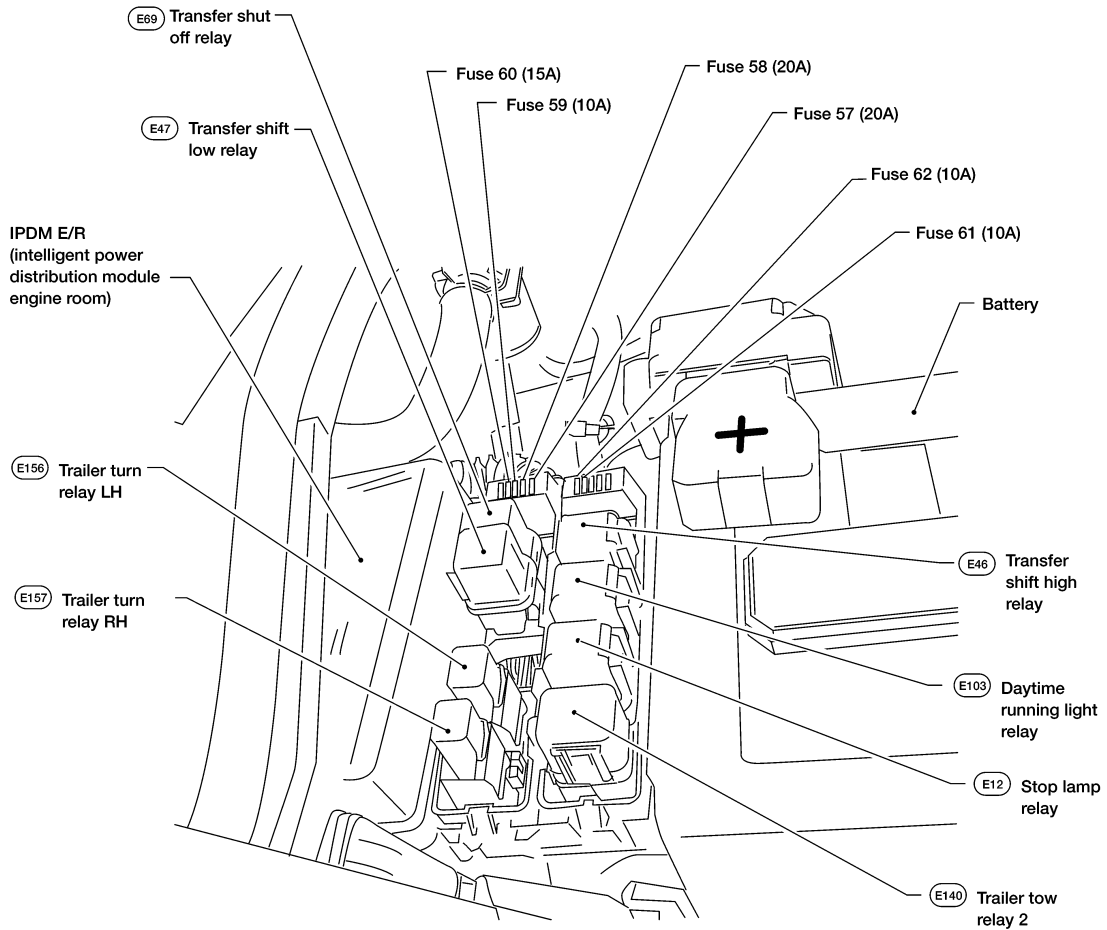
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# FUSE, FUSIBLE LINK AND RELAY BOX

< WIRING DIAGRAM >

## FUSE AND RELAY BOX



ABMIA6720GB

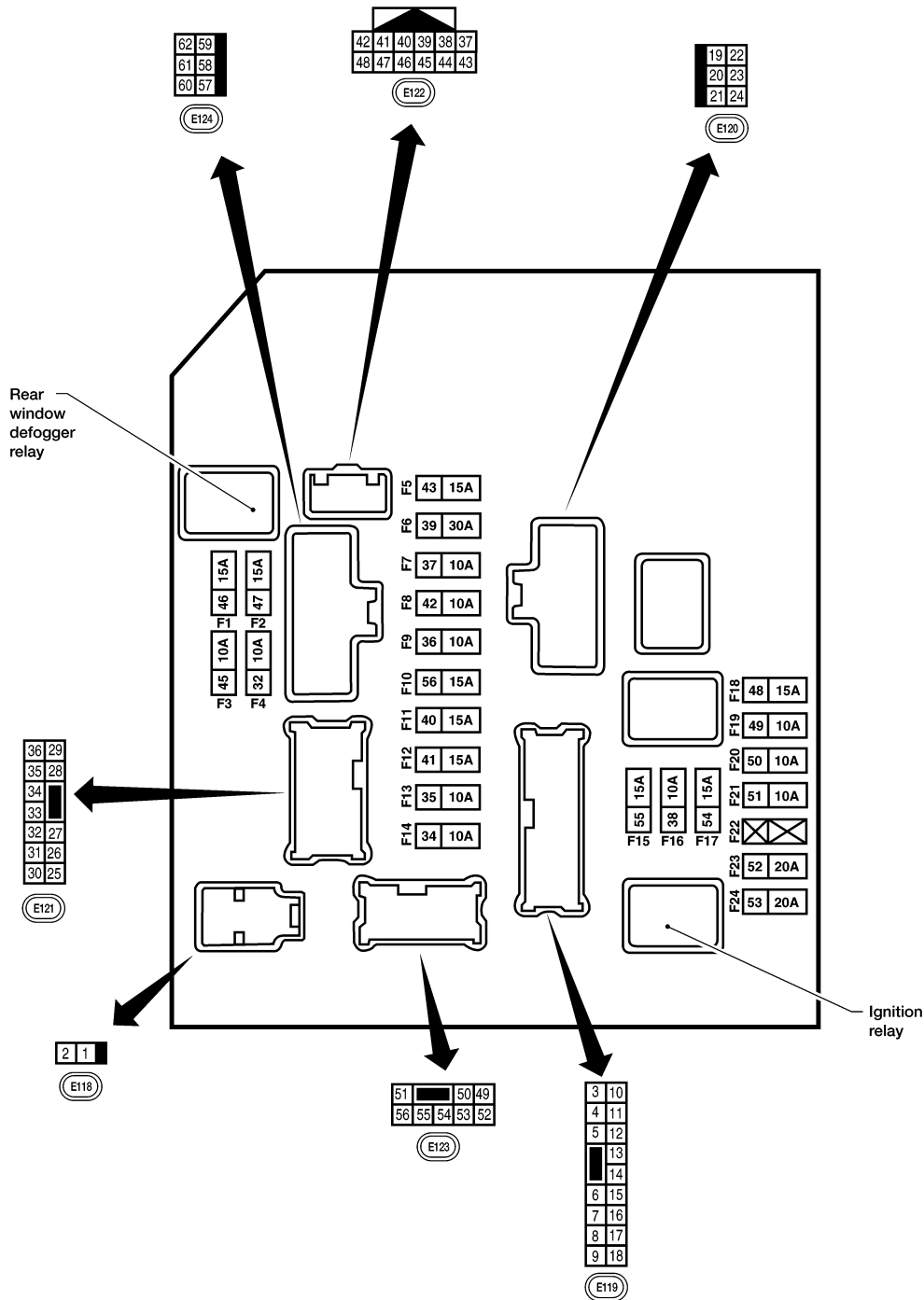
# IPDM E/R (INTELLIGENT POWER DISTRIBUTION MODULE ENGINE ROOM)

< WIRING DIAGRAM >

## IPDM E/R (INTELLIGENT POWER DISTRIBUTION MODULE ENGINE ROOM)

### IPDM E/R Terminal Arrangement

INFOID:000000011288284



**NOTE:**

Numbers preceded by an "F" represent the fuse numbers imprinted on the IPDM E/R. The other numbers represent the fuse numbers as they appear in the wiring diagrams.

ABMIA6721GB

# BATTERY

< BASIC INSPECTION >

## BASIC INSPECTION

### BATTERY

#### How to Handle Battery

INFOID:000000011288268

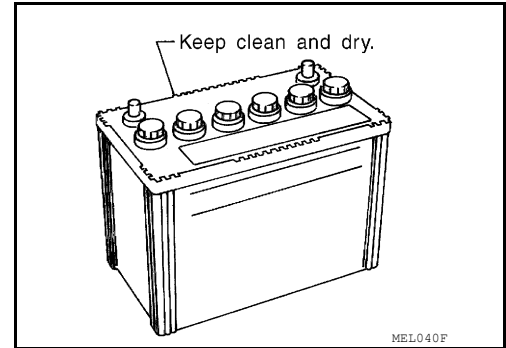
#### CAUTION:

- If it becomes necessary to start the engine with a booster battery and jumper cables, use a 12-volt booster battery.
- After connecting battery cables, ensure that they are tightly clamped to battery terminals for good contact.
- Never add distilled water through the hole used to check specific gravity.

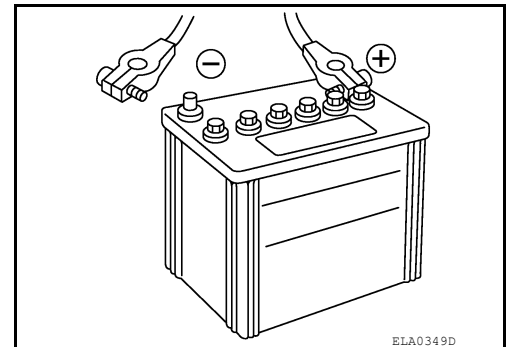
#### METHODS OF PREVENTING OVER-DISCHARGE

The following precautions must be taken to prevent over-discharging a battery.

- The battery surface (particularly its top) should always be kept clean and dry.
- The terminal connections should be clean and tight.
- At every routine maintenance, check the electrolyte level.  
This also applies to batteries designated as "low maintenance" and "maintenance-free".



- When the vehicle is not going to be used over a long period of time, disconnect the battery cable from the negative terminal. (If the vehicle has an extended storage switch, turn it off.)



#### Work Flow

INFOID:000000011288269

#### BATTERY DIAGNOSIS WITH EXP-800 NI OR GR8-1200 NI

To diagnose and confirm the condition of the battery, use the following special service tools:

- EXP-800 NI Battery and electrical diagnostic analyzer
- GR8-1200 NI Multitasking battery and electrical diagnostic station

#### NOTE:

Refer to the applicable Instruction Manual for proper battery diagnosis procedures.

#### BATTERY DIAGNOSIS WITHOUT EXP-800 NI OR GR8-1200 NI

##### Checking Electrolyte Level

#### WARNING:

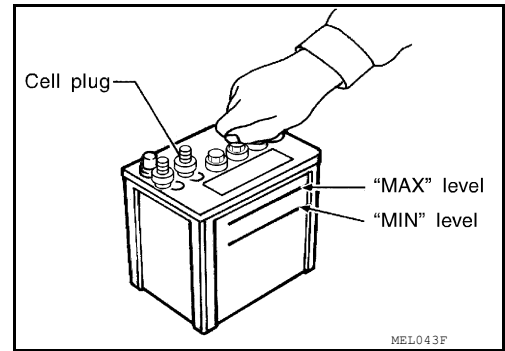
Never allow battery fluid to come in contact with skin, eyes, fabrics, or painted surfaces. After touching a battery, never touch or rub your eyes until you have thoroughly washed your hands. If acid contacts eyes, skin or clothing, immediately flush with water for 15 minutes and seek medical attention. Failure to do this may cause personal injury or damage to clothing or the painted surfaces.



# BATTERY

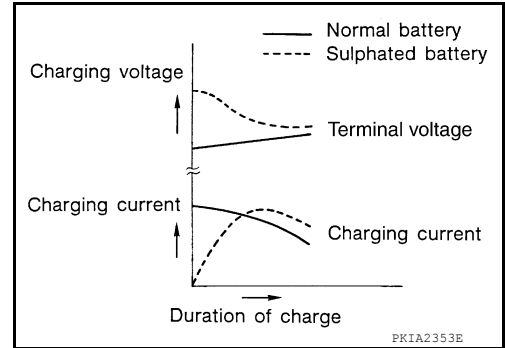
## < BASIC INSPECTION >

- Remove the cell plug using a suitable tool.
- Add distilled water up to the MAX level.



## SULFATION

- **A battery will be completely discharged if it is left unattended for a long time and the specific gravity will become less than 1.100. This may result in sulfation on the cell plates.**
- **To determine if a battery has been “sulfated”, note its voltage and current when charging it. As shown in the figure, less current and higher voltage are observed in the initial stage of charging sulfated batteries.**
- **A sulfated battery may sometimes be brought back into service by means of a long, slow charge, 12 hours or more, followed by a battery capacity test.**



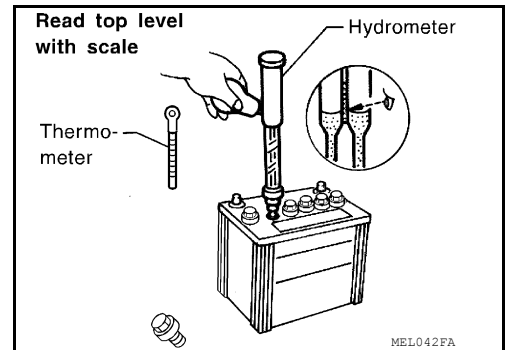
## Specific Gravity Check

### NOTE:

Check the charge condition of the battery.

Periodically check the specific gravity of the electrolyte. Keep a close check on charge condition to prevent over-discharge.

1. Read hydrometer and thermometer indications at eye level.
2. Use the chart below to correct your hydrometer reading according to electrolyte temperature.



## Hydrometer Temperature Correction

Battery electrolyte temperature [°C (°F)]	Add to specific gravity reading
71 (160)	0.032
66 (150)	0.028
60 (140)	0.024
54 (130)	0.020
49 (120)	0.016
43 (110)	0.012
38 (100)	0.008
32 (90)	0.004
27 (80)	0
21 (70)	-0.004
16 (60)	-0.008
10 (50)	-0.012

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# BATTERY

## < BASIC INSPECTION >

Battery electrolyte temperature [°C (°F)]	Add to specific gravity reading
4 (40)	-0.016
-1 (30)	-0.020
-7 (20)	-0.024
-12 (10)	-0.028
-18 (0)	-0.032

Corrected specific gravity	Approximate charge condition
1.260 - 1.280	Fully charged
1.230 - 1.250	3/4 charged
1.200 - 1.220	1/2 charged
1.170 - 1.190	1/4 charged
1.140 - 1.160	Almost discharged
1.110 - 1.130	Completely discharged

### Charging The Battery

#### **CAUTION:**

- **Never “quick charge” a fully discharged battery.**
- **Keep the battery away from open flame while it is being charged.**
- **When connecting the charger, connect the leads first, then turn on the charger. Never turn on the charger first, as this may cause a spark.**
- **If battery electrolyte temperature rises above 55 °C (131 °F), stop charging. Always charge battery at a temperature below 55 °C (131 °F).**

#### Charging Rates (Standard Charge)

Approximate charge condition	Charge current (A)	Charge time (h)
Fully charged	7	2
3/4 charged		2.5
1/2 charged		5
1/4 charged		7.5
Almost discharged		9
Completely discharged		10

#### Charging Rates (Quick Charge)

Approximate charge condition	Charge current (A)	Charge time (h)
Fully charged	—	—
3/4 charged	16	0.5
1/2 charged	33	
1/4 charged		
Almost discharged	—	—
Completely discharged	—	

#### **NOTE:**

The ammeter reading on your battery charger will automatically decrease as the battery charges. This indicates that the voltage of the battery is increasing normally as the state of charge improves. The charging amps indicated above refer to initial charge rate.

- If, after charging, the specific gravity of any two cells varies more than 0.050, the battery should be replaced.

# INSPECTION AND ADJUSTMENT

< BASIC INSPECTION >

## INSPECTION AND ADJUSTMENT

### ADDITIONAL SERVICE WHEN REMOVING BATTERY NEGATIVE TERMINAL

### ADDITIONAL SERVICE WHEN REMOVING BATTERY NEGATIVE TERMINAL : Special Repair Requirement

INFOID:000000011288270

#### Required Procedure After Battery Disconnection

System	Item	Reference
Engine Control System	Idle Air Volume Learning	<a href="#">EC-129</a>
Brake Control System	Steering Angle Sensor Neutral Position	<a href="#">BRC-8</a>
Door & Lock	Automatic Back Door Initialization	<a href="#">DLK-11</a> (with Intelligent Key) <a href="#">DLK-247</a> (without Intelligent Key)
Roof	Sunroof Memory Reset/Initialization	<a href="#">RF-5</a>
Automatic Drive Positioner	Automatic Drive Positioner System Initialization	Refer to Owner's Manual.
Audio, Visual & Navigation System	Audio (Radio Preset)	Refer to Owner's Manual.
	Navigation System	Refer to Owner's Manual.

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# FUSE INSPECTION

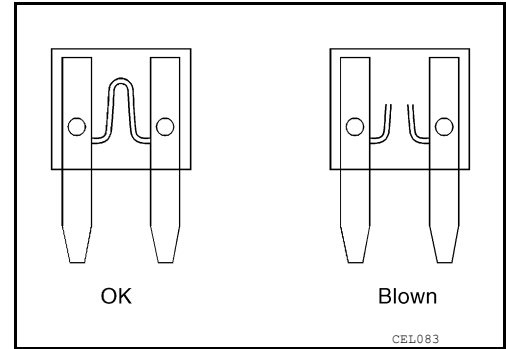
< BASIC INSPECTION >

## FUSE INSPECTION

### How To Check

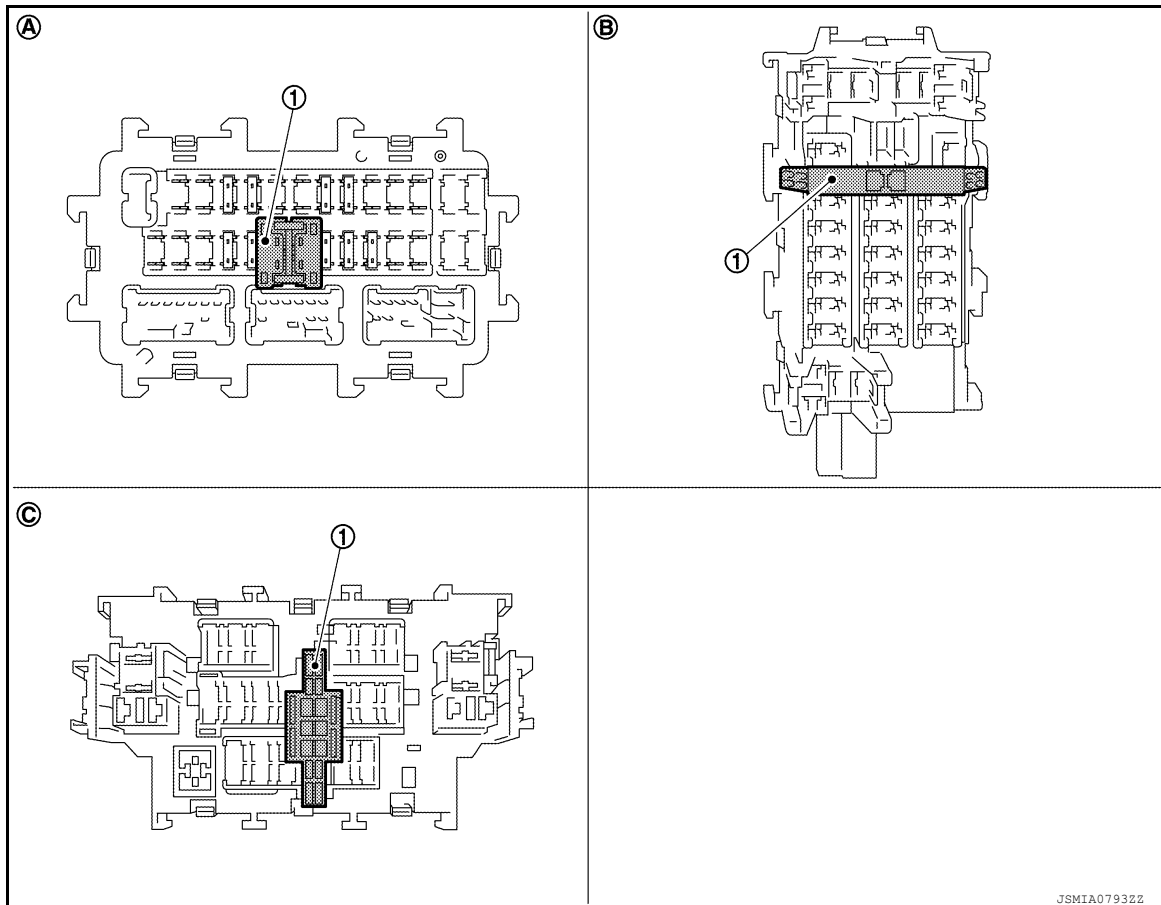
INFOID:000000011376584

- If fuse is blown, be sure to eliminate cause of malfunction before installing new fuse.
- Use fuse of specified rating. Never use fuse of more than specified rating.
- Do not partially install fuse; always insert it into fuse holder properly.
- Remove fuse for "ELECTRICAL PARTS (BAT)" if vehicle is not used for a long period of time.



### EXTENDED STORAGE SWITCH (IF EQUIPPED)

The following switch may be mounted on the fuse block (Junction Box) for transportation and storage.



① Extended storage switch

Ⓐ Type A

Ⓑ Type B

Ⓒ Type C

Remove the extended storage switch if it causes the interference when checking fuses.

How To Extended Storage Switch ON/OFF

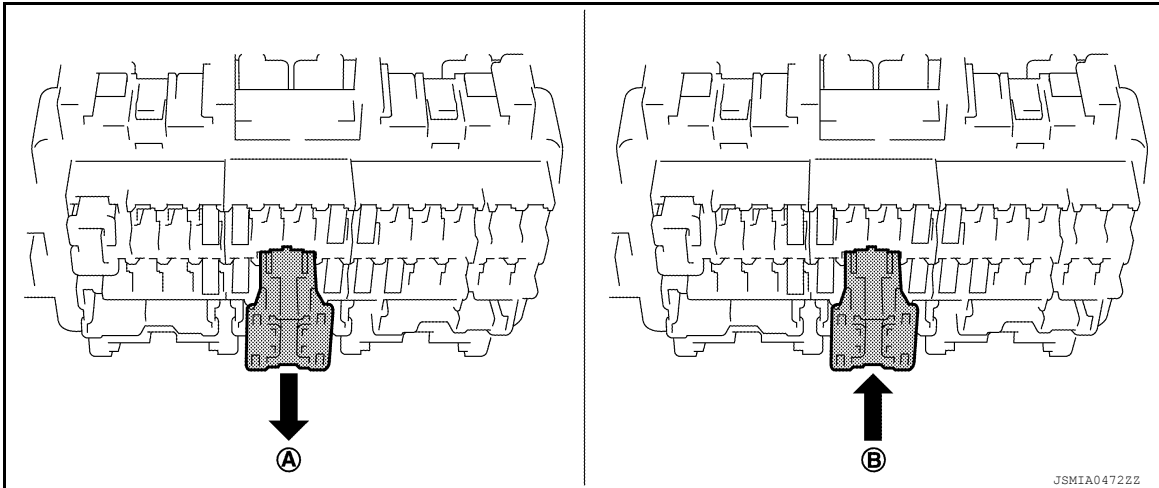
#### CAUTION:

- Turn the ignition switch OFF when operating the extended storage switch.
- Under normal conditions, keep the extended storage switch in ON state. Never operate the extended storage switch except when necessary.

# FUSE INSPECTION

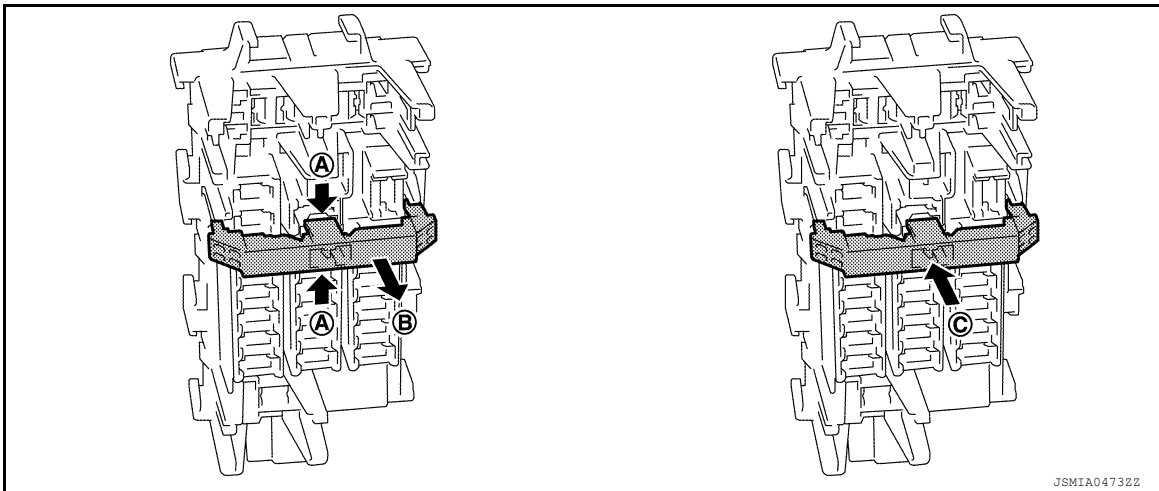
## < BASIC INSPECTION >

### • Type A



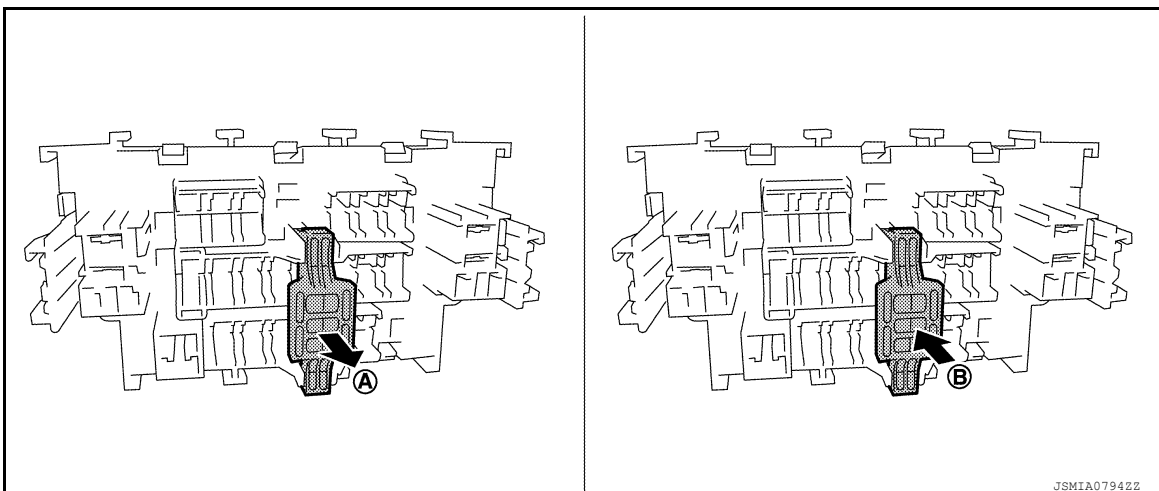
- To turn the extended storage switch OFF, pull it up in (A) direction as shown in the figure.
- To turn the extended storage switch ON, press it in (B) direction as shown in the figure.

### • Type B



- To turn the extended storage switch OFF, hold (A) of the switch and pull up in (B) direction as shown in the figure.
- To turn the extended storage switch ON, press it in (C) direction as shown in the figure.

### • Type C



- To turn the extended storage switch OFF, pull it up in (A) direction as shown in the figure.
- To turn the extended storage switch ON, press it in (B) direction as shown in the figure.

## How To Remove Extended Storage Switch

### Type A

Revision: August 2014

PG-77

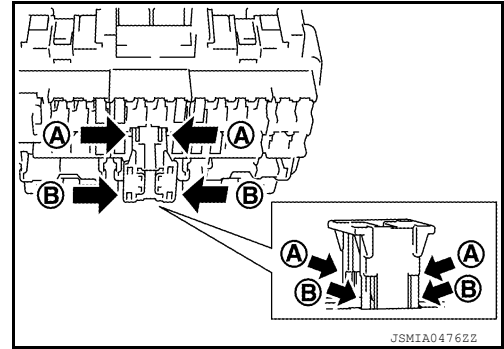
2015 Armada NAM

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# FUSE INSPECTION

## < BASIC INSPECTION >

1. Turn the ignition switch OFF.
2. Turn the extended storage switch OFF.
3. Press pawl (A) and tilt to disengage the extended storage switch. Press pawl (B) and tilt to remove the extended storage switch.



### CAUTION:

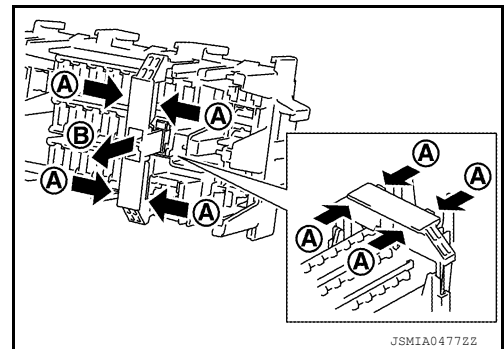
Never use fuse for bus bar.

### NOTE:

- Extended storage switch and bus bar are removed together. Remove bus bar from extended storage switch, if necessary.
- Install removed bus bar to fuse block.
- Extended storage switch is for transportation and storage. Reinstallation is not required after the removal.

### Type B

1. Turn the ignition switch OFF.
2. Turn the extended storage switch OFF.
3. Hold (A) and pull up the extended storage switch hard in (B) direction.



### CAUTION:

Never use fuse for bus bar.

### NOTE:

- Extended storage switch and bus bar may be removed together. Remove bus bar from extended storage switch, if necessary.
- Install removed bus bar to fuse block.
- Extended storage switch is for transportation and storage. Reinstallation is not required after the removal.

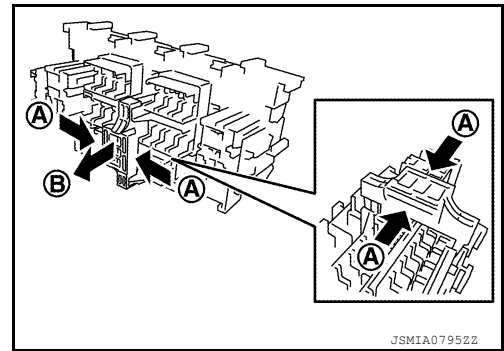
### Type C

1. Turn the ignition switch OFF.
2. Turn the extended storage switch OFF.

# FUSE INSPECTION

## < BASIC INSPECTION >

3. Hold (A) and pull up the extended storage switch hard in (B) direction.



### CAUTION:

Never use fuse for bus bar.

### NOTE:

- Extended storage switch and bus bar are removed together. Remove bus bar from extended storage switch, if necessary.
- Install removed bus bar to fuse block.
- Extended storage switch is for transportation and storage. Reinstallation is not required after the removal.

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# FUSIBLE LINK INSPECTION

< BASIC INSPECTION >

## FUSIBLE LINK INSPECTION

### Fusible Link

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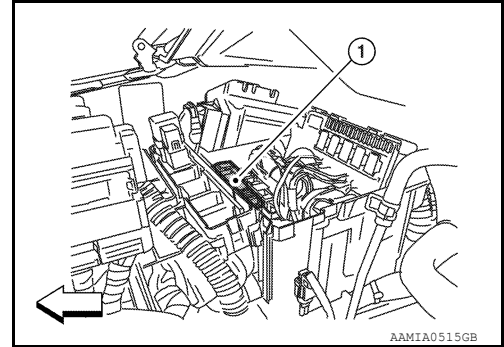
A melted fusible link can be detected either by visual inspection or by feeling with finger tip. If its condition is questionable, use circuit tester or test lamp.

1 : Fusible link

←: Vehicle front

#### CAUTION:

- If fusible link should melt, it is possible that critical circuit (power supply or large current carrying circuit) is shorted. In such a case, carefully check and eliminate cause of malfunction.
- Never wrap outside of fusible link with vinyl tape. Important: Never let fusible link touch any other wiring harness, vinyl or rubber parts.



AAMIA0515GB



# BATTERY

< REMOVAL AND INSTALLATION >

## REMOVAL AND INSTALLATION

### BATTERY

#### Removal and Installation

INFOID:000000011288285

#### REMOVAL

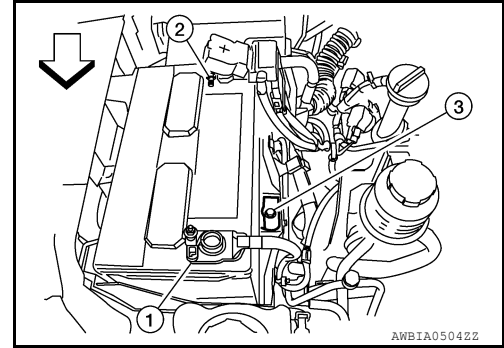
1. Disconnect the negative battery terminal (1) and positive battery terminal (2).

**CAUTION:**

**Remove negative battery terminal first.**

⇐ : **Front**

2. Remove the battery cover.
3. Remove the battery clamp bolt (3) and battery clamp.
4. Remove the battery.



#### INSTALLATION

Installation is in the reverse order of removal.

**CAUTION:**

**When installing, install the positive battery terminal first.**

**Battery clamp bolt : 14.7 N·m (1.5 kg-m, 11 ft-lb)**

**Battery terminal nut : 3.5 N·m (0.36 kg-m, 31 in-lb)**

Reset electronic systems as necessary. Refer to [PG-75. "ADDITIONAL SERVICE WHEN REMOVING BATTERY NEGATIVE TERMINAL : Special Repair Requirement"](#).

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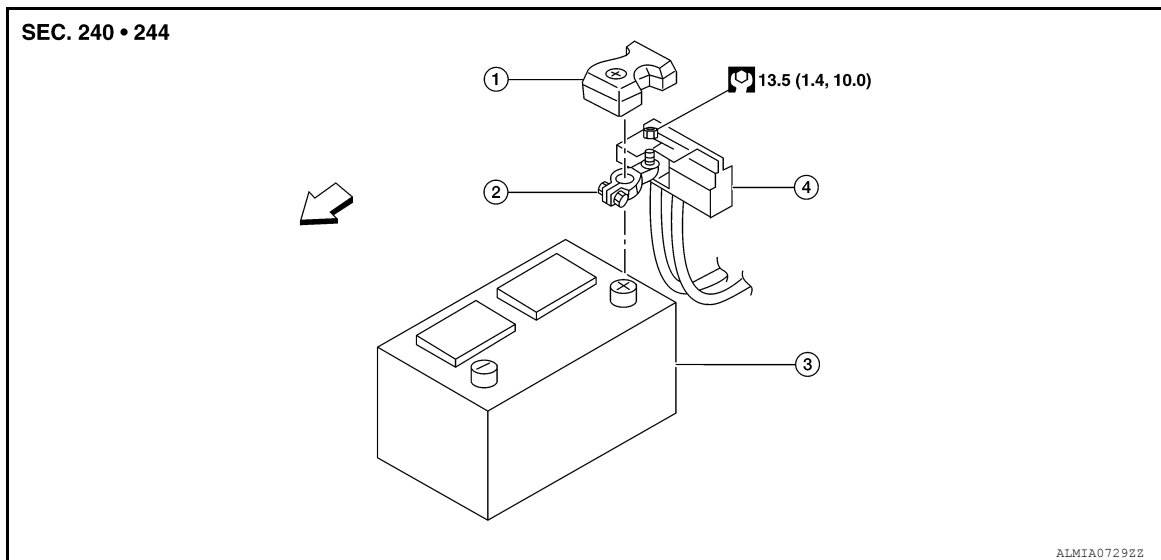
# BATTERY TERMINAL WITH FUSIBLE LINK

< REMOVAL AND INSTALLATION >

## BATTERY TERMINAL WITH FUSIBLE LINK

Exploded View

INFOID:000000011288286



1. Cover
4. Fusible link box

2. Terminal
- ↔ Front

3. Battery

## Removal and Installation

INFOID:000000011288287

### REMOVAL

1. Disconnect both battery negative and positive terminals. Refer to [PG-81, "Removal and Installation"](#).  
**CAUTION:**  
**To prevent damage to the parts, disconnect the battery negative terminal first.**
2. Disconnect positive cable from fusible link box (battery).
3. Disconnect harness connectors and separate positive terminal from fusible link box (battery).

### INSTALLATION

Installation is in the reverse order of removal.

#### **CAUTION:**

**Replace the fusible link box battery if it has been dropped or sustained and impact.**

**To install the battery, carefully read the following instructions:**

- **To prevent damage to the parts, connect the battery cable to the positive terminal first.**
- **After connecting battery cables, to securely supply battery voltage, ensure that they are tightly clamped to battery terminals for good contact.**
- **To securely supply battery voltage, check battery terminal for poor connection caused by corrosion.**

Reset electronic systems as necessary. Refer to [PG-75, "ADDITIONAL SERVICE WHEN REMOVING BATTERY NEGATIVE TERMINAL : Special Repair Requirement"](#).

# SERVICE DATA AND SPECIFICATIONS (SDS)

< SERVICE DATA AND SPECIFICATIONS (SDS)

## SERVICE DATA AND SPECIFICATIONS (SDS)

SERVICE DATA AND SPECIFICATIONS (SDS)

Battery

INFOID:000000011288288

Application	United States SV (Non FFV) and Mexico	United States SV (FFV), SL, Platinum and Canada
Type*	Gr. 24F	Gr. 27F
Capacity (20 HR) minimum V-AH	12 - 70	12 - 80
Cold cranking current A (For reference value)	650	710

\*: Always check with the Parts Department for the latest parts information.

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