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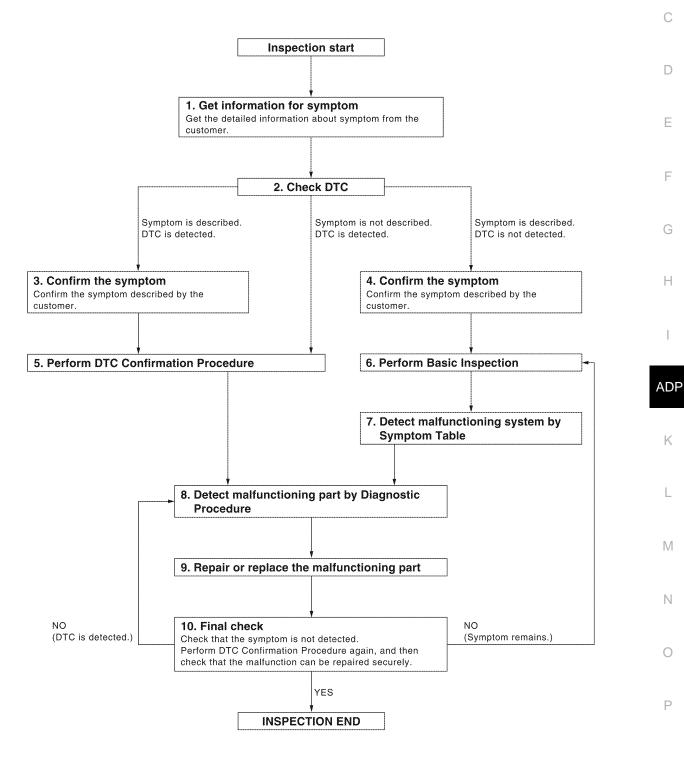
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DAL AD HISTING MOTOR 162 Removal and Installation

BASIC INSPECTION

DIAGNOSIS AND REPAIR WORKFLOW

Work Flow

WORK FLOW



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DIAGNOSIS AND REPAIR WORKFLOW

< BASIC INSPECTION >

1. GET INFORMATION FOR SYMPTOM

Get the detailed information from the customer about the symptom (the condition and the environment when the incident/malfunction occurred).

>> GO TO 2

2. CHECK DTC WITH AUTOMATIC DRIVE POSITIONER SYSTEM

Check "Self Diagnostic Result" with CONSULT-III.

Refer to ADP-116, "DTC Index".

Is any symptom described and any DTC is displayed?

Symptom is described, DTC is displayed.>>GO TO 3

Symptom is not described, DTC is displayed.>>GO TO 7

Symptom is described, DTC is not displayed.>>GO TO 4

3. CONFIRM THE SYMPTOM

Try to confirm the symptom described by the customer.

>> GO TO 7

4. CONFIRM THE SYMPTOM

Try to confirm the symptom described by the customer.

>> GO TO 5

5. CHECK NORMAL OPERATING CONDITION

Check normal operating condition. Refer to ADP-152, "Description".

Is the incident normal operation?

YES >> Inspection End.

NO >> GO TO 6

6. PERFORM BASIC INSPECTION

Isolate the malfunctioning point with the basic inspection. Refer to ADP-8, "Preliminary Check".

>> GO TO 8

7. PERFORM DTC CONFIRMATION PROCEDURE

Perform the confirmation procedure for the detected DTC.

Is the DTC displayed?

YES >> GO TO 9

NO >> Check intermittent incident. Refer to GI-49, "Intermittent Incident".

8. PERFORM COMPONENT FUNCTION CHECK

Perform the component function check for the isolated malfunctioning point.

>> GO TO 9

9. DETECT MALFUNCTIONING PART BY DIAGNOSTIC PROCEDURE

Isolate the malfunctioning point by performing the diagnosis procedure relevant to the symptom during the component diagnosis.

>> GO TO 10

10. REPAIR OR REPLACE

Repair or replace the malfunctioning part.

DIAGNOSIS AND REPAIR WORKFLOW

< BASIC INSPECTION > >> GO TO 11

11. FINAL CHECK

Perform the DTC confirmation procedure (if DTC is detected) or component function check (if no DTC is detected) again, and then check that the malfunction can be repaired securely.

Are all malfunctions corrected?

YES >> Inspection End.
Symptom is detected.>> GO TO 4
DTC is detected.>> GO TO 7

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INSPECTION AND ADJUSTMENT

< BASIC INSPECTION >

INSPECTION AND ADJUSTMENT

Preliminary Check

INFOID:0000000003935451

1. FOREIGN OBJECTS

Check the following:

- · objects on or behind the seats that could cause binding
- objects under the seats that may be interfering with the seat's moving parts
- objects under pedals that may interfere with movement

Are there any foreign objects that could be causing interference?

YES >> Remove objects.

NO >> GO TO 2

2. WIRING CONNECTIONS

- 1. Disconnect harness connectors.
- 2. Check terminals for damage or loose connections.
- 3. Reconnect harness connectors.

Are any connectors damaged or loose?

YES >> Repair or replace damaged parts.

NO >> GO TO 3

3. POWER AND GROUND

Check power supply and ground circuits for control unit. Refer to <u>ADP-42, "DRIVER SEAT CONTROL UNIT : Diagnosis Procedure"</u>.

Is the inspection result normal?

YES >> Refer to ADP-116, "DTC Index".

NO >> Repair or replace as necessary.

Special Repair Requirement

INFOID:0000000003935452

Refer to Owner's Manual for Automatic Drive Positioner system operating instructions.

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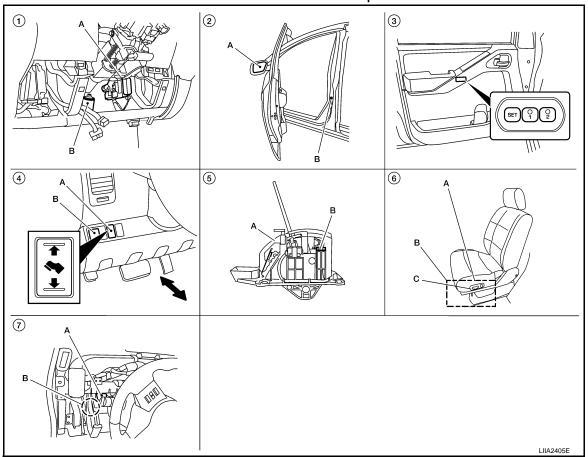
FUNCTION DIAGNOSIS

AUTOMATIC DRIVE POSITIONER SYSTEM AUTOMATIC DRIVE POSITIONER SYSTEM

AUTOMATIC DRIVE POSITIONER SYSTEM: System Diagram

C Combination meter control unit BCM D To CAN ¥ Е Lifting sensor (front) Lifting motor (front) Lifting sensor (rear) Lifting motor (rear) Reclining sensor Reclining motor CAN communication Sliding sensor Sliding motor F Driver seat control unit Н Lifting switch (front) Lifting switch (rear) Power seat switch Reclining switch Sliding switch ADP K UART communication Pedal adjusting motor Pedal adjusting motor Pedal adjusting sensor Pedal adjusting switch Park position switch Mirror motor Mirror sensor Door mirror A/T device Backward M positioner control unit Automatic Ν drive 0 Door mirror remote control Seat memory switch Changeover switch Memory switch Mirror switch Set switch Indicator Ρ

AUTOMATIC DRIVE POSITIONER SYSTEM: Component Parts Location INFOID:000000003935454



- A. BCM M18, M19, M20
 B. Pedal adjusting motor E109, E110
 (view with lower instrument panel LH removed)
- A. Pedal adjusting switch M96
 B. Door mirror remote control switch
 M163
- A. Door mirror LH D18, RH D118 B. Front door switch LH B8
- A. A/T device
 B. A/T device (park position switch)
 M156
- 3. Seat memory switch D5
- A. Sliding motor LH B204, reclining motor LH B232, lifting motor (front) B206, lifting motor (rear) B207
 B. Driver seat control unit B202, B203
 C. Power seat switch LH B208
 - C. Power seat switch LH B208 (front seat LH view)

 A. Automatic drive positioner control unit M33, M34
 B. Circuit breaker-2 M82 (view with instrument panel removed)

AUTOMATIC DRIVE POSITIONER SYSTEM : System Description

INFOID:0000000003935455

OUTLINE

The system automatically moves the driver seat, pedal assembly and door mirror position by the driver seat control unit and the automatic drive positioner control unit. The driver seat control unit corresponds with the automatic drive positioner control unit by UART communication.

Function	Description
Manual function	The driving position (seat, pedal assembly and door mirror position) can be adjusted by using the power seat switch, pedal adjusting switch or door mirror remote control switch.
Memory function	The seat, pedal assembly and outside mirror move to the stored driving position by pressing seat memory switch (1 or 2).

< FUNCTION DIAGNOSIS >

Function		Description
Entry/Exit assist function		On exit, the seat moves backward.
Entry	On entry, the seat returns from exiting position to the previous driving position.	
Keyfob interlock function	·	Perform memory operation, exiting operation and entry operation by key unlock operation.
Intelligent Key interlock function		Perform memory operation, exiting operation and entry operation by Intelligent Key unlock operation or driver side door request switch unlock operation.

AUTOMATIC DRIVE POSITIONER SYSTEM : Component Description

INFOID:0000000003935456

CONTROL UNITS

Item	Function
Driver seat control unit	 Main unit of automatic drive positioner system It is connected to the CAN. It communicates with the automatic drive positioner control unit via UART communication.
Automatic drive positioner control unit	 It communicates with the driver seat control unit via UART communication. Perform various controls with the instructions of driver seat control unit. Perform the controls of the pedal adjusting, door mirror and the seat memory switch.
ВСМ	Transmit the following status to the driver seat control unit via CAN communication. Front door LH: OPEN/CLOSE Ignition switch position: ACC/ON Door lock: UNLOCK (with Intelligent Key or remote keyless entry request switch operation) Key ID Key switch: Insert/Pull out Intelligent Key or ignition key Starter: CRANKING/OTHER
Combination meter	Transmit the vehicle speed signal to the driver seat control unit via CAN communication.
AV control unit	The setting change of auto drive positioner system can be performed on the display.
A/T device (park position switch)	Transmit the shift position signal (P range) to the driver seat control unit.

INPUT PARTS

Switches

Item	Function
Key switch and ignition knob switch	The key switch is installed to detect the key inserted/removed status.
Front door switch LH	Detect front door (driver side) open/close status.
A/T device (park position switch)	Detect the P range position of A/T selector lever.
Set switch	The registration and system setting can be performed with its operation.
Seat memory switch 1/2	The registration and operation can be performed with its operation.
Power seat switch	The following switch is installed. Reclining switch Lifting switch (front) Lifting switch (rear) Sliding switch The specific parts can be operated with the operation of each switch.

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< FUNCTION DIAGNOSIS >

Item	Function
Pedal adjusting switch	The following switch is installed. • Pedal forward • Pedal backward The specific parts can be operated with the operation of each switch.
Door mirror remote control switch	The following switch is installed. • Mirror switch • Changeover switch The specific parts can be operated with the operation of each switch.

Sensors

Item	Function
Door mirror sensor (LH/RH)	Detect the up/down and left/right position of outside mirror face.
Pedal adjusting sensor	Detect the forward/backward position of pedal assembly.
Lifting sensor (front)	Detect the up/down position of seat lifting (front).
Lifting sensor (rear)	Detect the up/down position of seat lifting (rear).
Reclining sensor	Detect the tilt of seatback.
Sliding sensor	Detect the front/rear position of seat.

OUTPUT PARTS

Item	Function
Door mirror motor (LH/RH)	Move the outside mirror face up/down and left/right.
Pedal adjusting motor	Move the pedal assembly forward/backward.
Lifting motor (front)	Move the seat lifting (front) up/down.
Lifting motor (rear)	Move the seat lifting (rear) up/down.
Reclining motor	Tilt and raise up the seatback.
Sliding motor	Slide the seat forward/backward.
Seat memory indicator	Illuminates or flashes according to the registration/operation status.

MANUAL FUNCTION

< FUNCTION DIAGNOSIS >

MANUAL FUNCTION: System Diagram

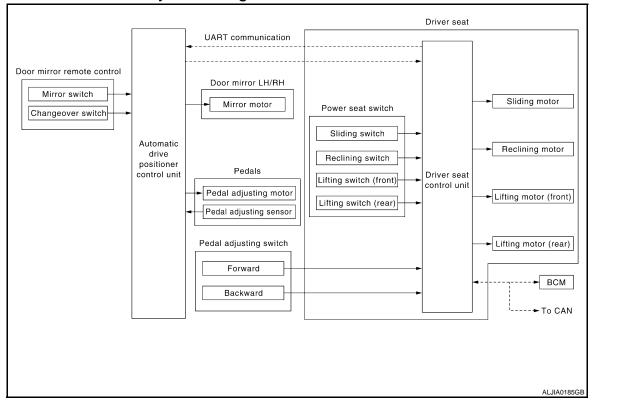


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MANUAL FUNCTION: System Description

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OUTLINE

The driving position (seat, pedal assembly and door mirror position) can be adjusted manually with power seat switch, pedal adjusting switch and door mirror remote control switch.

OPERATION PROCEDURE

- 1. Turn ignition switch ON.
- 2. Operate power seat switch, pedal adjusting switch or door mirror remote control switch.
- 3. The driver seat, pedal assembly or door mirror operates according to the operation of each switch.

DETAIL FLOW

Seat

Order	Input	Output	Control unit condition
1	Power seat switch (sliding, lifting, reclining)	_	The power seat switch signal is input to the driver seat control unit when the power seat switch is operated.
2	_	Motors (sliding, lifting, reclining)	The driver seat control unit outputs signals to each motor according to the power seat switch input signal.

Adjustable pedals

Order	Input	Output	Control unit condition
1	Pedal adjusting switch	_	The pedal adjusting switch signal is input to the automatic drive positioner control unit when the pedal adjusting switch is operated.

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< FUNCTION DIAGNOSIS >

Order	Input	Output	Control unit condition
2	_	Motor	The automatic drive positioner control unit actuates the motor according to the operation of the pedal adjusting switch signal from the driver seat control unit.
3	Sensors (forward, backward)	_	The automatic drive positioner control unit recognizes any operation limit of each actuator via each sensor and will not operate the actuator anymore at that time.

Door Mirror

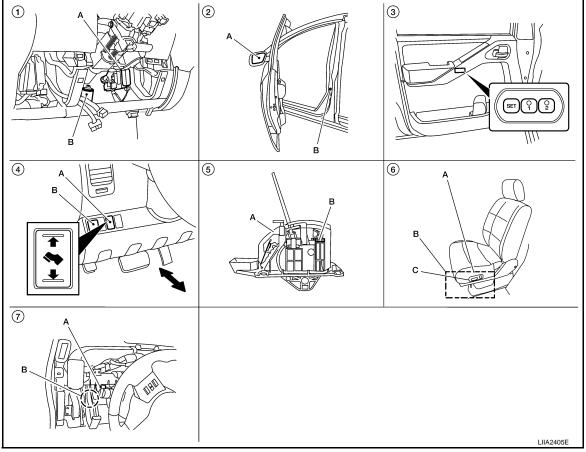
Order	Input	Output	Control unit condition
1	Door mirror remote control switch	_	The door mirror remote control switch signal is input to the automatic drive positioner control unit when the door mirror remote control switch is operated.
2	_	Motors (Door mirror motor)	The automatic drive positioner control unit actuates each motor according to the operation of the door mirror remote control switch.

NOTE:

The door mirrors can be operated manually when ignition switch is in either ACC or ON position. The ignition switch signal (ACC/ON) is transmitted from BCM to the driver seat control unit via CAN communication and from the driver seat control unit to the automatic drive positioner control unit via UART communication.

MANUAL FUNCTION: Component Parts Location





< FUNCTION DIAGNOSIS >

- A. BCM M18, M19, M20
 B. Pedal adjusting motor E109, E110 (view with lower instrument panel LH removed)
- A. Door mirror LH D18, RH D118 B. Front door switch LH B8
- 3. Seat memory switch D5
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- A. Pedal adjusting switch M96
 B. Door mirror remote control switch
- A. A/T device
 B. A/T device (park position switch)
- A. Sliding motor LH B204, reclining motor LH B232, lifting motor (front) B206, lifting motor (rear) B207 B. Driver seat control unit B202,
- B203 C. Power seat switch LH B208

- A. Automatic drive positioner control unit M33, M34
 - B. Circuit breaker-2 M82 (view with instrument panel removed)

(front seat LH view)

INFOID:0000000003935460

MANUAL FUNCTION: Component Description

CONTROL UNITS

Priver seat control unit

Operates the specific seat motor with the signal from the power seat switch.
Transmits the ignition switch signal (ACC/ON) via UART communication to the automatic drive positioner control unit.
Transmits the pedal adjusting switch signal via UART communication to the automatic drive positioner control unit.

Operates the specific motor with the signal from driver seat control unit or door mirror remote control switch.

Recognizes the following status and transmits it to the driver seat control unit via CAN communication.
Ignition position: ACC/ON

INPUT PARTS

Switches

Item	Function
Power seat switch	The following switch is installed. Reclining switch Lifting switch (front) Lifting switch (rear) Sliding switch The specific parts can be operated with the operation of each switch.
Pedal adjusting switch	The following switch is installed. • Pedal forward • Pedal backward The specific parts can be operated with the operation of each switch.
Door mirror remote control switch	The following switch is installed. • Mirror switch • Changeover switch The specific parts can be operated with the operation of each switch.

Sensors

Item	Function
Pedal adjusting sensor	Detect the forward/backward position of pedal assembly.

OUTPUT PARTS

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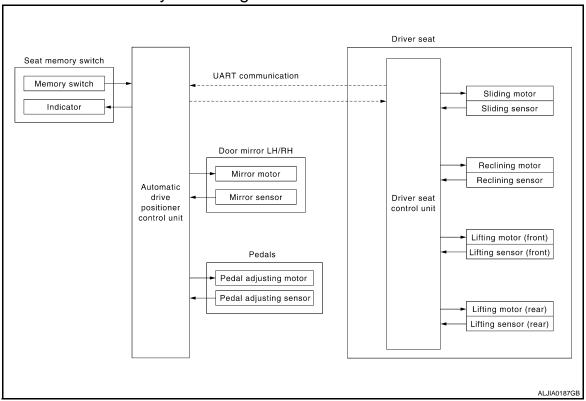
< FUNCTION DIAGNOSIS >

Item	Function
Door mirror motor (LH/RH)	Move the outside mirror face up/down and left/right.
Pedal adjusting motor	Move the pedal assembly forward/backward.
Lifting motor (front)	Move the seat lifter (front) up/down.
Lifting motor (rear)	Move the seat lifter (rear) up/down.
Reclining motor	Tilt and raise up the seatback.
Sliding motor	Slide the seat forward/backward.

MEMORY FUNCTION

MEMORY FUNCTION: System Diagram

INFOID:0000000003935461



MEMORY FUNCTION: System Description

INFOID:0000000003935462

OUTLINE

The driver seat control unit can store the optimum driving positions (seat, pedal assembly and door mirror position) for 2 people. If the front seat position is changed, one-touch (pressing desired memory switch for more than 0.5 second) operation allows changing to the other driving position.

NOTE:

Further information for the memory storage procedure. Refer to Owner's Manual.

OPERATION PROCEDURE

- 1. Turn ignition switch ON
- 2. Press desired memory switch for more than 0.5 second.
- 3. Front seat LH, pedal assembly and door mirror will move to the memorized position.

OPERATION CONDITION

Satisfy all of the following items. The memory function is not performed if these items are not satisfied.

< FUNCTION DIAGNOSIS >

Item	Request status
Ignition position	ON
Switch inputs	
Power seat switch	
Pedal adjusting switch	OFF
Door mirror control switch	(Not operated)
Set switch	, ,
Seat memory switch	
A/T selector lever	P position

DETAIL FLOW

Order	Input	Output	Control unit condition
1	Memory switch	_	The memory switch signal is inputted to the automatic drive positioner control unit when memory switch 1 or 2 is operated. Memory switch signal is input to driver seat control unit via UART communication.
2	2 —	Motors (seat, pedal adjusting, door mirror)	Driver seat control unit operates each motor of seat when it recognizes the memory switch pressed for 0.5 second or more and requests each motor operation to automatic drive positioner control unit via UART communication. The automatic drive positioner control unit operates each motor.
		Memory switch Indicator	Driver seat control unit requests the flashing of memory indicator to automatic drive positioner control unit via UART communication while either of the motors is operating. The automatic drive positioner control unit illuminates the memory indicator.
3	Sensors (seat, pedal adjust- ing, door mirror)	_	Driver seat control unit judges the operating seat position with each seat sensor input. The positions of the adjustable pedals and outside mirror are monitored with each sensor signal that is input from auto drive positioner control unit via UART communication. Driver seat control unit stops the operation of each motor when each part reaches the recorded address.
4	_	Memory switch Indicator	Driver seat control unit requests the illumination of memory indicator to auto drive positioner control unit via UART communication after all motors stop. The auto driving positioner control unit illuminates the memory indicator for 5 seconds.

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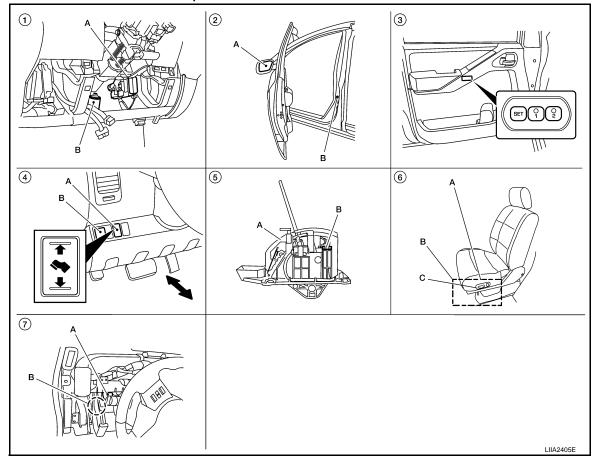
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< FUNCTION DIAGNOSIS >

MEMORY FUNCTION: Component Parts Location

INFOID:0000000004449387



- A. BCM M18, M19, M20
 B. Pedal adjusting motor E109, E110
 (view with lower instrument panel LH removed)
- A. Pedal adjusting switch M96
 B. Door mirror remote control switch
 M163
- A. Door mirror LH D18, RH D118 B. Front door switch LH B8
- A. A/T device
 B. A/T device (park position switch)
- 3. Seat memory switch D5
- A. Sliding motor LH B204, reclining motor LH B232, lifting motor (front) B206, lifting motor (rear) B207
 B. Driver seat control unit B202, B203
 - C. Power seat switch LH B208 (front seat LH view)

 A. Automatic drive positioner control unit M33, M34
 B. Circuit breaker-2 M82 (view with instrument panel removed)

MEMORY FUNCTION: Component Description

INFOID:0000000003935464

CONTROL UNITS

Item	Function
Driver seat control unit	 The address of each part is recorded. Operates each motor of seat to the registered position. Requests the operations of pedal assembly and door mirror to automatic drive positioner control unit
Automatic drive positioner control unit	Operates the pedal adjusting motor and door mirror with the instructions from the driver seat control.

INPUT PARTS

< FUNCTION DIAGNOSIS >

Switches

Item	Function
Memory switch 1/2	The registration and memory function can be performed with its operation.

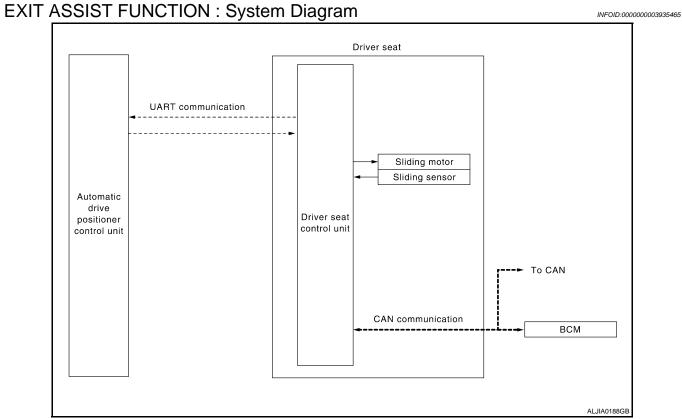
Sensors

Item	Function
Door mirror sensor (LH/RH)	Detect the up/down and left/right position of outside mirror face.
Pedal adjusting sensor	Detect the forward/backward position of pedal assembly.
Lifting sensor (front)	Detect the up/down position of seat lifting (front).
Lifting sensor (rear)	Detect the up/down position of seat lifting (rear).
Reclining sensor	Detect the tilt of seatback.
Sliding sensor	Detect the front/rear position of seat.

OUTPUT PARTS

Item	Function
Door mirror motor (LH/RH)	Move the outside mirror face up/down and left/right.
Pedal adjusting motor	Move the pedal assembly forward/backward.
Lifting motor (front)	Move the seat lifter (front) up/down.
Lifting motor (rear)	Move the seat lifter (rear) up/down.
Reclining motor	Tilt and raise up the seatback.
Sliding motor	Slide the seat forward/backward.
Memory indicator	Illuminates or blinks according to the registration/operation status.

EXIT ASSIST FUNCTION



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< FUNCTION DIAGNOSIS >

EXIT ASSIST FUNCTION: System Description

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OUTLINE

When exiting, if the conditions are satisfied, the seat is moved backward from normal sitting position. The seat slide amount at entry/exit operation can be changed.

NOTE:

- This function is set to OFF before delivery (initial setting).
- Further information for the system setting procedure. Refer to Owner's Manual.

OPERATION PROCEDURE

- 1. Open the driver door with ignition switch in OFF position.
- 2. Front seat LH will move to the exiting position.

OPERATION CONDITION

Satisfy all of the following items. The exit assist function is not performed if these items are not satisfied.

Item	Request status
Ignition switch	OFF
System setting [Entry/exit assist function]	ON
Initialization	Done
Switch inputs Power seat switch Pedal adjusting switch Door mirror remote control switch Set switch Seat memory switch	OFF (Not operated)
A/T selector lever	P position

DETAIL FLOW

Order	Input	Output	Control unit condition
1	Front door switch LH	_	Driver seat control unit receives front door switch LH signal (open) from BCM via CAN communication.
2	_	Motor (seat sliding)	Driver seat control unit operates the seat sliding motor, which recognizes that the front door LH is opened with ignition switch OFF.

< FUNCTION DIAGNOSIS >

EXIT ASSIST FUNCTION: Component Parts Location

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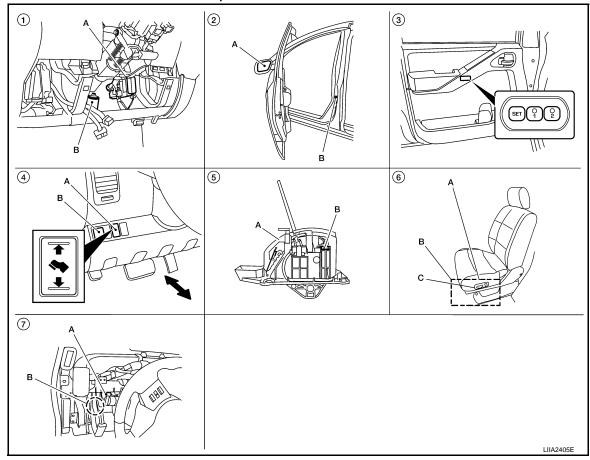
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- A. BCM M18, M19, M20
 B. Pedal adjusting motor E109, E110 (view with lower instrument panel LH removed)
- A. Pedal adjusting switch M96
 B. Door mirror remote control switch M163
- A. Door mirror LH D18, RH D118 B. Front door switch LH B8
 - A. A/T device
 B. A/T device (park position switch)
 M156
- 3. Seat memory switch D5
- 6. A. Sliding motor LH B204, reclining motor LH B232, lifting motor (front) B206, lifting motor (rear) B207
 B. Driver seat control unit B202, B203
 - C. Power seat switch LH B208 (front seat LH view)

- A. Automatic drive positioner control unit M33, M34
 B. Circuit breaker-2 M82 (view with
 - instrument panel removed)

EXIT ASSIST FUNCTION : Component Description

INFOID:0000000003935468

CONTROL UNITS

Item	Function
Driver seat control unit	Operates the seat sliding motor for a constant amount.
BCM	Recognizes the following status and transmits it to the driver seat control unit via CAN communication. • Front door LH: OPEN/CLOSE

INPUT PARTS

Switches

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< FUNCTION DIAGNOSIS >

Item	Function
Front door switch LH	Detect front door LH open/close status.

Sensors

Item	Function
Sliding sensor	Detect the front/rear position of seat.

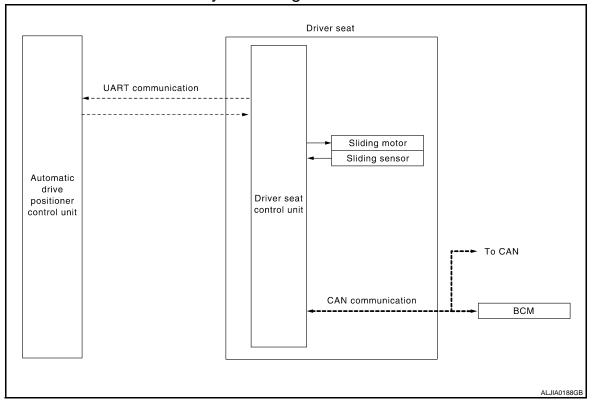
OUTPUT PARTS

Item	Function
Sliding motor	Slide the seat forward/backward.

ENTRY ASSIST FUNCTION

ENTRY ASSIST FUNCTION: System Diagram

INFOID:0000000003935469



ENTRY ASSIST FUNCTION: System Description

INFOID:0000000003935470

OUTLINE

The seat is in the exiting position when either following condition (A or B) is satisfied, the seat returns from exiting position to the previous driving position.

NOTE:

- This function is set to OFF before delivery (initial setting).
- Further information for the system setting procedure. Refer to Owner's Manual.

OPERATION PROCEDURE

- 1. A: Turn the ignition switch ON.
 - B: Turn the ignition switch from OFF to ACC after closing the driver door.
- 2. Front seat LH will return from the exiting position to entry position.

OPERATION CONDITION

Satisfy all of the following items. The entry assist function is not performed if these items are not satisfied.

< FUNCTION DIAGNOSIS >

Item	Request status
Seat	The vehicle is not moved after performing the exit assist function.
Switch inputs Power seat switch Pedal adjusting switch Door mirror control switch Set switch Memory switch	OFF (Not operated)
A/T selector lever	P position

DETAIL FLOW

Order	Input	Output	Control unit condition
1	Door switch/Ignition switch	_	Driver seat control unit receives the signals of ignition switch signal and front door switch from BCM via CAN communication.
2	_	Motor (sliding)	Driver seat control unit operates the sliding motor when the operating conditions are satisfied.
2 8	Sensor (sliding)	_	Sensor monitors the operating positions of seat and then stops the operation of motor when seat reaches the recorded address.

ENTRY ASSIST FUNCTION: Component Parts Location

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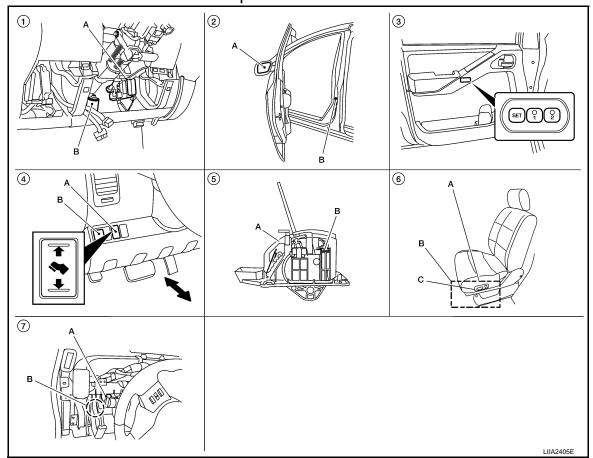
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ADP-23

< FUNCTION DIAGNOSIS >

- 1. A. BCM M18, M19, M20 B. Pedal adjusting motor E109, E110 (view with lower instrument panel LH
- A. Door mirror LH D18, RH D118 B. Front door switch LH B8
- 3. Seat memory switch D5

- removed)
- A. Pedal adjusting switch M96 B. Door mirror remote control switch
- A. A/T device B. A/T device (park position switch)
- A. Sliding motor LH B204, reclining motor LH B232, lifting motor (front) B206, lifting motor (rear) B207 B. Driver seat control unit B202, B203 C. Power seat switch LH B208

(front seat LH view)

7. A. Automatic drive positioner control unit M33, M34 B. Circuit breaker-2 M82 (view with instrument panel removed)

ENTRY ASSIST FUNCTION: Component Description

INFOID:0000000003935472

CONTROL UNITS

Item	Function
Driver seat control unit	According to the ignition signal and front door switch LH signal from BCM, Operates the seat sliding motor for a constant amount.
ВСМ	Recognizes the following status and transmits it to the driver seat control unit via CAN communication. • Front door LH: OPEN/CLOSE • Ignition switch position: ACC/ON

INPUT PARTS

Switches

Item	Function
Front door switch LH	Detect front door LH open/close status.

Sensors

Item	Function
Sliding sensor	Detect the front/rear position of seat.

OUTPUT PARTS

Item	Function
Sliding motor	Slide the seat forward/backward.

DIAGNOSIS SYSTEM (DRIVER SEAT C/U)

< FUNCTION DIAGNOSIS >

DIAGNOSIS SYSTEM (DRIVER SEAT C/U)

Diagnosis Description

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The auto drive positioner system can be checked and diagnosed for component operation with CONSULT-III. DIAGNOSTIC MODE

Diagnostic mode [AUTO DRIVE POS.]	Description	
WORK SUPPORT	Changes the setting of each function.	
SELF-DIAG RESULTS	Performs self-diagnosis for the auto drive positioner system and displays the results.	
DATA MONITOR	Displays input signals transmitted from various switches and sensors to driver seat control unit in real time.	
CAN DIAG SUPPORT MNTR	The result of transmit/receive diagnosis of CAN communication can be read.	
ACTIVE TEST	Drive each output device.	
ECU PART NUMBER	Displays part numbers of driver seat control unit parts.	

CONSULT-III Function

INFOID:0000000003935474

SELF-DIAGNOSIS RESULTS Refer to <u>ADP-116</u>, "DTC <u>Index"</u>.

DATA MONITOR

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Monitor Item	Unit	Main Signals	Selection From Menu	Contents
SET SW	"ON/OFF"	×	×	ON/OFF status judged from the setting switch signal.
MEMORY SW1	"ON/OFF"	×	×	ON/OFF status judged from the seat memory switch 1 signal.
MEMORY SW2	"ON/OFF"	×	×	ON/OFF status judged from the seat memory switch 2 signal.
SLIDE SW-FR	"ON/OFF"	×	×	ON/OFF status judged from the sliding switch (forward) signal.
SLIDE SW-RR	"ON/OFF"	×	×	ON/OFF status judged from the sliding switch (backward) signal.
RECLN SW-FR	"ON/OFF"	×	×	ON/OFF status judged from the reclining switch (forward) signal.
RECLN SW-RR	"ON/OFF"	×	×	ON/OFF status judged from the reclining switch (backward) signal.
LIFT FR SW-UP	"ON/OFF"	×	×	ON/OFF status judged from the lifting switch front (up) signal.
LIFT FR SW-DN	"ON/OFF"	×	×	ON/OFF status judged from the lifting switch front (down) signal.
LIFT RR SW-UP	"ON/OFF"	×	×	ON/OFF status judged from the lifting switch rear (up) signal.
LIFT RR SW-DN	"ON/OFF"	×	×	ON/OFF status judged from the lifting switch rear (down) signal.
MIR CON SW-UP	"ON/OFF"	×	×	ON/OFF status judged from the mirror switch (up) signal.
MIR CON SW-DN	"ON/OFF"	×	×	ON/OFF status judged from the mirror switch (down) signal.
MIR CON SW-RH	"ON/OFF"	×	×	ON/OFF status judged from the door mirror remote control switch (passenger side) signal.
MIR CON SW-LH	"ON/OFF"	×	×	ON/OFF status judged from the door mirror remote control switch (driver side) signal.

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DIAGNOSIS SYSTEM (DRIVER SEAT C/U)

< FUNCTION DIAGNOSIS >

Monitor Item	Unit	Main Signals	Selection From Menu	Contents
MIR CHNG SW-R	"ON/OFF"	×	×	ON/OFF status judged from the door mirror remote control switch (switching to right) signal.
MIR CHNG SW-L	"ON/OFF"	×	×	ON/OFF status judged from the door mirror remote control switch (switching to left) signal.
PEDAL SW-FR	"ON/OFF"	×	×	ON/OFF status judged from the pedal adjusting switch (forward) signal.
PEDAL SW-RR	"ON/OFF"	×	×	ON/OFF status judged from the pedal adjusting switch (backward) signal.
DETENT SW	"ON/OFF"	×	×	The selector lever position "OFF (P position) / ON (other than P position)" judged from the detention switch signal.
STARTER SW	"ON/OFF"	×	×	Ignition key switch ON (START, ON) /OFF (ACC, OFF) status judged from the ignition switch signal.
SLIDE PULSE	_	_	×	Value (32768) when battery connections are standard. If it moves backward, the value increases. If it moves forward, the value decreases.
RECLN PULSE	_	-	×	Value (32768) when battery connections are standard. If it moves backward, the value increases. If it moves forward, the value decreases.
LIFT FR PULSE	_	-	×	Value (32768) when battery connections are standard. If it moves DOWN, the value increases. If it moves UP, the value decreases.
LIFT RR PULSE	_	-	×	Value (32768) when battery connections are standard. If it moves DOWN, the value increases. If it moves UP, the value decreases.
MIR/SEN RH U-D	"V"	-	×	Voltage input from door mirror sensor (passenger side) up/down is displayed.
MIR/SEN RH R-L	"V"	_	×	Voltage input from door mirror sensor (passenger side) left/right is displayed.
MIR/SEN LH U-D	"V"	_	×	Voltage input from door mirror sensor (driver side) up/down is displayed.
MIR/SEN LH R-L	"V"	_	×	Voltage input from door mirror sensor (driver side) left/right is displayed.
PEDAL SEN	"V"	_	×	Pedal position (voltage) judged from the pedal adjusting sensor signal is displayed.

ACTIVE TEST

CAUTION:

When driving vehicle, do not perform active test.

Test item	Description
SEAT SLIDE	Activates/deactivates the sliding motor.
SEAT RECLINING	Activates/deactivates the reclining motor.
SEAT LIFTER FR	Activates/deactivates the lifting motor (front).
SEAT LIFTER RR	Activates/deactivates the lifting motor (rear).
ADJ PEDAL MOTOR	Activates/deactivates the pedal adjusting motor.
MIRROR MOTOR RH	Activates/deactivates the mirror motor (passenger side).
MIRROR MOTOR LH	Activates/deactivates the mirror motor (driver side).
MEMORY SW INDCTR	Turns ON/OFF the memory indicator.

WORK SUPPORT

DIAGNOSIS SYSTEM (DRIVER SEAT C/U)

< FUNCTION DIAGNOSIS >

Work item	Content	Item
SEAT SLIDE VOLUME SET		40 mm
	The amount of seat sliding for entry/exit assist can be selected from 3 items.	80 mm
		150 mm
EXIT SEAT SLIDE SETTING	Entry/exit assist (seat) can be selected:	ON
	ON (operated) – OFF (not operated)	OFF

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U1000 CAN COMM CIRCUIT

< COMPONENT DIAGNOSIS >

COMPONENT DIAGNOSIS

U1000 CAN COMM CIRCUIT

Description INFOID:000000003935475

Refer to LAN-4, "System Description".

DTC Logic

DTC DETECTION LOGIC

DTC	Trouble diagnosis name	DTC detecting condition	Possible cause
U1000	CAN COMM CIR- CUIT	 Driver seat control unit cannot communicate to other control units. Driver seat control unit cannot communicate for more than the specified time. 	Harness or connectors (CAN communication line is open or shorted)

DTC CONFIRMATION PROCEDURE

1. STEP 1

Turn ignition switch ON and wait at least 3 seconds.

>> GO TO 2

2. STEP 2

Check "Self diagnostic result" with CONSULT-III.

Is the DTC detected?

YES >> Perform diagnosis procedure. Refer to ADP-28, "Diagnosis Procedure".

NO >> Inspection End.

Diagnosis Procedure

Refer to LAN-14, "Trouble Diagnosis Flow Chart".

Special Repair Requirement

Refer to Owner's Manual.

INFOID:0000000003935477

INFOID:0000000003935478

B2112 SLIDING MOTOR < COMPONENT DIAGNOSIS > **B2112 SLIDING MOTOR** Α Description INFOID:0000000003935479 The seat sliding motor is installed to the seat frame assembly. В The seat sliding motor is installed with the driver seat control unit. Slides the seat frontward/rearward by changing the rotation direction of sliding motor. **DTC** Logic INFOID:0000000003935480 DTC DETECTION LOGIC D Trouble diagnosis DTC No. DTC detecting condition Possible cause name Е The driver seat control unit detects the output of slid-B2112 SEAT SLIDE ing motor output terminal for 0.1 second or more · Driver seat control unit even if the sliding switch is not input. DTC CONFIRMATION PROCEDURE 1. STEP 1 Turn ignition switch ON. >> GO TO 2 Н 2. STEP 2 Check "Self diagnostic result" with CONSULT-III. Is the DTC detected? >> Perform diagnosis procedure. Refer to ADP-29, "Diagnosis Procedure". YES NO >> Inspection End. NOTE: ADP First perform diagnosis for B2126 if B2126 is detected. Refer to ADP-37, "Diagnosis Procedure". Diagnosis Procedure INFOID:0000000003935481 1. PERFORM DTC CONFIRMATION PROCEDURE Turn ignition switch ON. Check "Self diagnostic result" with CONSULT-III. Erase the DTC. Perform DTC confirmation procedure. Refer to ADP-29, "DTC Logic". Is the DTC displayed again? YES >> GO TO 2 NO >> Check intermittent incident. Refer to GI-49, "Intermittent Incident".

Refer to ADP-67, "Component Function Check" and ADP-81, "Component Function Check".

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2. CHECK COMPONENTS

B2113 RECLINING MOTOR

< COMPONENT DIAGNOSIS >

B2113 RECLINING MOTOR

Description

- The seat reclining motor is installed to the seat frame assembly.
- The seat reclining motor is activated with the driver seat control unit.
- Tilts the seatback frontward/rearward by changing the rotation direction of reclining motor.

DTC Logic

DTC DETECTION LOGIC

DTC No.	Trouble diagnosis name	DTC detecting condition	Possible cause
B2113	SEAT RECLINING	The driver seat control unit detects the output of re- clining motor output terminal for 0.1 second or more even if the reclining switch is not input.	

DTC CONFIRMATION PROCEDURE

1. STEP 1

Turn ignition switch ON.

>> GO TO 2

2. STEP 2

Check "Self diagnostic result" with CONSULT-III.

Is the DTC detected?

YES >> Perform diagnosis procedure. Refer to <u>ADP-30, "Diagnosis Procedure"</u>.

NO >> Inspection End.

NOTE:

First perform diagnosis for B2126 if B2126 is detected. Refer to ADP-37, "Diagnosis Procedure".

Diagnosis Procedure

INFOID:0000000003935484

1. PERFORM DTC CONFIRMATION PROCEDURE

- 1. Turn ignition switch ON.
- 2. Check "Self diagnostic result" with CONSULT-III.
- Erase the DTC.
- Perform DTC confirmation procedure. Refer to <u>ADP-30, "DTC Logic"</u>.

Is the DTC displayed again?

YES >> GO TO 2

NO >> Check intermittent incident. Refer to GI-49. "Intermittent Incident".

2. CHECK COMPONENTS

Refer to ADP-69, "Component Function Check" and ADP-83, "Component Function Check".

B2114 SEAT LIFTER FR < COMPONENT DIAGNOSIS > **B2114 SEAT LIFTER FR** Α Description INFOID:0000000003935485 The lifting motor (front) is installed to the seat frame assembly. В • The lifting motor (front) is activated with the driver seat control unit. • Tilts the seat front up/down by changing the rotation direction of lifting motor (front). **DTC** Logic INFOID:0000000003935486 DTC DETECTION LOGIC D Trouble diagnosis DTC No. DTC detecting condition Possible cause name The driver seat control unit detects the output of lift-Е B2114 SEAT LIFTER FR ing motor (front) output terminal for 0.1 second or · Driver seat control unit more even if the lifting switch is not input. DTC CONFIRMATION PROCEDURE F 1. STEP 1 Turn ignition switch ON. >> GO TO 2 $\mathbf{2}$. STEP 2 Н Check "Self diagnostic result" with CONSULT-III. Is the DTC detected? YES >> Perform diagnosis procedure. Refer to ADP-31, "Diagnosis Procedure". NO >> Inspection End. NOTE: ADP First perform diagnosis for B2126 if B2126 is detected. Refer to ADP-37, "Diagnosis Procedure". Diagnosis Procedure INFOID:0000000003935487 K PERFORM DTC CONFIRMATION PROCEDURE Turn ignition switch ON. 2. Check "Self diagnostic result" with CONSULT-III. L Erase the DTC. Perform DTC confirmation procedure. Refer to ADP-31, "DTC Logic". Is the DTC displayed again? M YES >> GO TO 2 NO >> Check intermittent incident. Refer to GI-49, "Intermittent Incident". 2. CHECK COMPONENTS Ν

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Refer to ADP-71, "Component Function Check" and ADP-85, "Component Function Check".

B2115 SEAT LIFTER RR

< COMPONENT DIAGNOSIS >

B2115 SEAT LIFTER RR

Description

- The lifting motor (rear) is installed to the seat frame assembly.
- The lifting motor (rear) is activated with the driver seat control unit.
- Tilts the seat rear up/down by changing the rotation direction of lifting motor (rear).

DTC Logic

DTC DETECTION LOGIC

DTC No.	Trouble diagnosis name	DTC detecting condition	Possible cause
B2115	SEAT LIFTER RR	The driver seat control unit detects the output of lifting motor (rear) output terminal for 0.1 second or more even if the lifting switch is not input.	Driver seat control unit

DTC CONFIRMATION PROCEDURE

1. STEP 1

Turn ignition switch ON.

>> GO TO 2

2. STEP 2

Check "Self diagnostic result" with CONSULT-III.

Is the DTC detected?

YES >> Perform diagnosis procedure. Refer to <u>ADP-32, "Diagnosis Procedure"</u>.

NO >> Inspection End.

NOTE:

First perform diagnosis for B2126 if B2126 is detected. Refer to ADP-37, "Diagnosis Procedure".

Diagnosis Procedure

INFOID:0000000003935490

1. PERFORM DTC CONFIRMATION PROCEDURE

- Turn ignition switch ON.
- 2. Check "Self diagnostic result" with CONSULT-III.
- Erase the DTC.
- 4. Perform DTC confirmation procedure. Refer to ADP-32, "DTC Logic".

Is the DTC displayed again?

YES >> GO TO 2

NO >> Check intermittent incident. Refer to GI-49. "Intermittent Incident".

2. CHECK COMPONENTS

Refer to ADP-73, "Component Function Check" and ADP-87, "Component Function Check".

B2117 ADJ PEDAL MOTOR

< COMPONENT DIAGNOSIS >

B2117 ADJ PEDAL MOTOR

Description INFOID:0000000003935491

- The pedal adjusting sensor is installed to pedal adjusting motor assembly.
- The resistance of pedal adjusting sensor is changed according to the forward/backward position of pedal assembly.
- The terminal voltage of automatic drive positioner control unit will be changed according to a change of pedal adjusting sensor resistance. Automatic drive positioner control unit calculates the pedal position from the voltage.

DTC Logic

DTC DETECTION LOGIC

DTC No.	Trouble diagnosis name	DTC detecting condition	Possible cause
B2117	ADJ PEDAL SENSOR	When any manual or automatic operations are not performed, if motor operation is detected for 0.1 second or more, status is judged "Output error".	Harness and connectors (pedal adjusting sensor circuit is opened/shorted, pedal adjusting sensor power supply circuit is opened/shorted.) Pedal adjusting sensor

DTC CONFIRMATION PROCEDURE

1. STEP 1

Turn ignition switch ON.

>> GO TO 2

2. STEP 2

Check "Self diagnostic result" with CONSULT-III.

Is the DTC detected?

YES >> Perform diagnosis procedure. Refer to ADP-33, "Diagnosis Procedure".

NO >> Inspection End.

Diagnosis Procedure

1. CHECK PEDAL ADJUSTING MECHANISM

Check the following.

- Operation malfunction caused by pedal adjusting mechanism deformation or pinched harness or other foreign materials
- Operation malfunction and interference with other parts by poor installation

Is the inspection result normal

YES >> GO TO 2

NO >> Repair or replace the malfunctioning part and check again.

2. CHECK FUNCTION

- 1. Turn ignition switch ON.
- Check "ADJ PEDAL MOTOR" in "Active test" mode with CONSULT-III.

Test item	Description
ADJ PEDAL MOTOR	The pedal adjusting motor is activated by receiving the drive signal.

Is the inspection result normal?

YES >> Pedal adjusting motor circuit is OK.

NO >> GO TO 3

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B2117 ADJ PEDAL MOTOR

< COMPONENT DIAGNOSIS >

${f 3.}$ CHECK PEDAL ADJUSTING MOTOR CIRCUIT HARNESS CONTINUITY

- 1. Turn ignition switch OFF.
- Disconnect automatic drive positioner control unit and pedal 2. adjusting motor assembly.
- Check continuity between automatic drive positioner control unit 3. connector M34 terminals 37, 45 and pedal adjusting motor assembly connector E109 terminals 1, 2.

37 - 1 : Continuity should exist. 45 - 2 : Continuity should exist.

Check continuity between automatic drive positioner control unit connector M34 terminals 37, 45 and ground.



Is the inspection result normal?

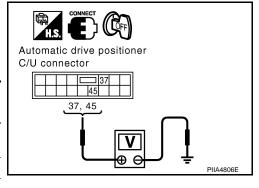
YES >> GO TO 4

NO >> Repair or replace harness.

$oldsymbol{4}.$ CHECK AUTOMATIC DRIVE POSITIONER CONTROL UNIT OUTPUT SIGNAL

- Connect the automatic drive positioner control unit and pedal adjusting motor assembly.
- Check voltage between automatic drive positioner control unit 2. connector and ground.

0	Terminals			\
Connec- tor	(+)	(-)	Condition	Voltage (V) (Approx.)
	37 M34 ——— Ground	Cround	Pedal adjusting switch ON (FORWARD operation)	Battery voltage
M34 –			Other than above	0
		Giodila	Pedal adjusting switch ON (BACKWARD operation)	Battery voltage
			Other than above	0



Pedal adjusting

1 2

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C/U connector

Automatic drive positioner

45 37, 45

motor connector

Is the inspection result normal?

YES >> Replace pedal adjusting motor assembly. Refer to BR-23, "Removal and Installation".

NO >> GO TO 5

CHECK INTERMITTENT INCIDENT

Refer to GI-49, "Intermittent Incident".

Is the inspection result normal?

YES >> Replace automatic drive positioner control unit. Refer to ADP-159, "Removal and Installation".

NO >> Repair or replace the malfunctioning part.

B2120 ADJ PEDAL SENSOR

< COMPONENT DIAGNOSIS >

B2120 ADJ PEDAL SENSOR

Description INFOID:000000003935494

- The pedal adjusting sensor is installed in the pedal adjusting motor assembly.
- The resistance of pedal adjusting sensor is changed according to the forward/backward position of pedal assembly.
- The terminal voltage of automatic drive positioner control unit will be changed according to a change of pedal adjusting sensor resistance. Automatic drive positioner control unit calculates the pedal assembly position from the voltage.

DTC Logic

DTC DETECTION LOGIC

DTC No.	Trouble diagnosis name	DTC detecting condition	Possible cause
B2120	ADJ PEDAL SENSOR	The input voltage of pedal adjusting sensor is 0.5V or less or 4.5V or higher, for 0.5 seconds or more.	Harness and connectors (Pedal adjusting sensor circuit is opened/shorted, pedal adjusting sensor power supply circuit is opened/shorted.) Pedal adjusting sensor

DTC CONFIRMATION PROCEDURE

1. STEP 1

Turn ignition switch ON.

>> GO TO 2

2. STEP 2

Check "Self diagnostic result" with CONSULT-III.

Is the DTC is detected?

YES >> Perform diagnosis procedure. Refer to ADP-35, "Diagnosis Procedure".

NO >> Inspection End.

Diagnosis Procedure

1. CHECK PEDAL ADJUSTING SENSOR SIGNAL

- 1. Turn ignition switch ON.
- 2. Select "PEDAL SEN" in "Data monitor" mode with CONSULT-III.
- 3. Check the pedal adjusting sensor signal under the following condition.

Monitor item	Condition		Value
PEDAL SEN	Pedal position	Forward	0.5V
FEDAL SEN		Backward	4.5V

Is the value normal?

YES >> Pedal adjusting circuit is OK.

NO >> GO TO 2

CHECK PEDAL ADJUSTING SENSOR CIRCUIT HARNESS CONTINUITY

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B2120 ADJ PEDAL SENSOR

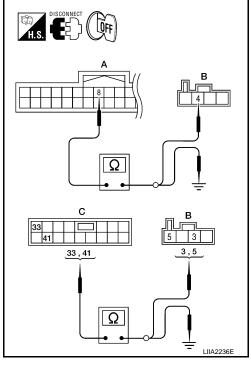
< COMPONENT DIAGNOSIS >

- 1. Disconnect automatic drive positioner control unit and pedal adjusting motor assembly.
- 2. Check continuity between automatic drive positioner connector and pedal adjusting motor connector.

Connector	Terminal	Connector	Terminal	Continuity
А		В		Continuity
Automatic drive positioner control unit: M33	8	Pedal adjust-	4	Yes
С		ing motor as-		
Automatic drive positioner	33	sembly: E110	5	Yes
control unit: M34	41		3	Yes

3. Check continuity between automatic drive positioner control unit connector and ground.

Connector	Terminal	Ground	Continuity
Α			
Automatic drive positioner control unit: M33	8		No
В			
Automatic drive positioner control	33		No
unit: M34	41		No



Is the inspection result normal?

YES >> Replace pedal adjusting motor assembly. Refer to <u>BR-23, "Removal and Installation"</u>.

NO >> Repair or replace harness.

B2126 DETENT SW

Description INFOID:0000000003935497

- Park position switch is installed on A/T device. It is turned OFF when the A/T selector lever is in P position.
- The driver seat control unit judges that the A/T selector lever is in P position if continuity does not exist in this circuit.

DTC Logic INFOID:0000000003935498

DTC DETECTION LOGIC

DTC No.	Trouble diagnosis name	DTC detecting condition	Possible cause
B2126	DETENT SW	A/T selector lever is in P position and the vehicle speed of 7±4km/h is detected.	Harness and connectors (Park position switch circuit is opened/shorted.) Park position switch Combination meter (CAN communication)

DTC CONFIRMATION PROCEDURE

1. STEP 1

Drive the vehicle at 7+4km/h or more.

>> GO TO 2

2. STEP 2

Check "Self diagnostic result" with CONSULT-III.

Is the DTC detected?

YES >> Perform diagnosis procedure. Refer to ADP-37, "Diagnosis Procedure".

>> Inspection End. NO

Diagnosis Procedure

1. CHECK DTC

Check "Self diagnostic result" for BCM with CONSULT-III.

Are other DTCs detected?

YES >> Check The DTC.

NO >> GO TO 2

2. CHECK DETENTION SWITCH SIGNAL

- Turn ignition switch ON.
- Select "DETENT SW" in "Data Monitor" mode with CONSULT-III.
- Check detention switch signal under the following condition.

Monitor item	Condition		Status
DETENT SW	A/T selector lever	P position	OFF
		Other than above	ON

Is the status normal?

YES >> A/T device (park position switch) circuit is OK.

NO >> GO TO 3

3. CHECK A/T DEVICE (PARK POSITION SWITCH) HARNESS

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B2126 DETENT SW

< COMPONENT DIAGNOSIS >

- 1. Turn ignition switch OFF.
- 2. Disconnect A/T device and driver seat control unit.
- 3. Check continuity between A/T device connector M158 terminal 4 and driver seat control unit connector B203 terminal 21.

4 - 21 : Continuity should exist.

4. Check continuity between A/T device connector M158 terminal 4 and ground.

4 - Ground : Continuity should not exist.

A/T device connector A/T divice connector A/T divice connector

Driver seat

Is the inspection result normal?

YES >> GO TO 4

NO >> Repair or replace harness.

4. CHECK PARK POSITION SWITCH

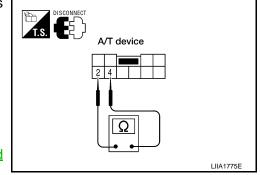
Check continuity between A/T device (park position switch) terminals as follows.

Term	inals	Condition	Continuity
2	4	P position	Yes
	4	Other than P position	No

Is the inspection result normal?

YES >> GO TO 5

NO >> Replace A/T device. Refer to <u>TM-195, "Removal and Installation".</u>



5. CHECK INTERMITTENT INCIDENT

Refer to GI-49, "Intermittent Incident".

Is the inspection result normal?

YES >> Replace driver seat control unit. Refer to <u>SE-25, "Exploded View"</u>.

NO >> Repair or replace the malfunctioning part.

B2128 UART COMMUNICATION LINE

< COMPONENT DIAGNOSIS >

B2128 UART COMMUNICATION LINE

Description INFOID:0000000003935500

Driver seat control unit performs UART communication with the automatic drive positioner control unit using 2 communication lines, TX and RX line. Driver seat control unit receives the operation signals of pedal adjusting switch, door mirror remote control switch, set switch and memory switch and the position signals of adjustable pedal sensor and door mirror sensor from the automatic drive positioner control unit and transmits the operation request signal.

DTC Logic INFOID:0000000003935501

DTC DETECTION LOGIC

DTC No.	Trouble diagnosis name	DTC detecting condition	Possible cause
B2128	UART COMM	The communication between driver seat control unit and automatic drive positioner control unit is interrupted for a period of time.	UART communication line (UART communication line is open or shorted) Driver seat control unit Automatic drive positioner control unit

DTC CONFIRMATION PROCEDURE

1. STEP 1

Turn ignition switch ON.

>> GO TO 2

2. STEP 2

Operate pedal adjusting switch for more than 2 seconds.

>> GO TO 3

3. PROCEDURE 3

Check "Self diagnostic result" with CONSULT-III.

Is the DTC detected?

>> Perform diagnosis procedure. Refer to ADP-39, "Diagnosis Procedure". YES

NO >> Inspection End.

Diagnosis Procedure

1. CHECK UART COMMUNICATION LINE CONTINUITY

- Turn ignition switch OFF.
- Disconnect driver seat control unit and automatic drive positioner control unit.
- 3. Check continuity between driver seat control unit harness connector and automatic drive positioner control unit harness connector.

Driver seat control unit connector	Terminal	Automatic drive positioner control unit connector	Terminal	Continuity
B202	1	M33	10	Yes
D202	17	· IVIOO	26	162

Automatic drive positioner C/U Driver seat C/U connector connector 1, 17 10, 26

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Check continuity between driver seat control unit harness connector and ground.

B2128 UART COMMUNICATION LINE

< COMPONENT DIAGNOSIS >

Driver seat control unit con- nector	Terminal	0	Continuity
B202	1	Ground	No
DZUZ	17	1	NO

Is the inspection result normal?

YES >> Check intermittent incident. Refer to GI-49, "Intermittent Incident".

NO >> Repair or replace harness.

POWER SUPPLY AND GROUND CIRCUIT

< COMPONENT DIAGNOSIS >

POWER SUPPLY AND GROUND CIRCUIT

BCM

BCM : Diagnosis Procedure

INFOID:0000000004428648

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1. CHECK FUSES AND FUSIBLE LINK

Check that the following fuses and fusible link are not blown.

Terminal No.	Signal name	Fuses and fusible link No.	
57	Detter review comply	18 (10A)	
70	Battery power supply	G (50A)	
11	Ignition ACC or ON	4 (10A)	
38	Ignition ON or START	1 (10A)	

Is the fuse blown?

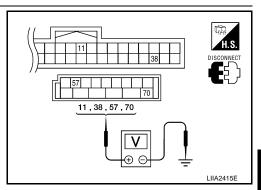
YES >> Replace the blown fuse or fusible link after repairing the affected circuit.

NO >> GO TO 2

2. CHECK POWER SUPPLY CIRCUIT

- 1. Turn ignition switch OFF.
- 2. Disconnect BCM.
- 3. Check voltage between BCM harness connector and ground.

Connector	Terminals		Power	Condition	Voltage (V) (Ap-	
Connector	(+)	(-)	source	Condition	prox.)	
M18	11	Ground	ACC power supply	Ignition switch ACC or ON	Battery voltage	
	38	Ground	Ignition power supply	Ignition switch ON or START	Battery voltage	
M20	57	Ground	Battery power supply	Ignition switch OFF	Battery voltage	
M20	70	Ground	Battery power supply	Ignition switch OFF	Battery voltage	



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Is the measurement value normal?

YES >> GO TO 3

NO >> Repair or replace harness.

3. CHECK GROUND CIRCUIT

Check continuity between BCM harness connector and ground.

В	СМ		Continuity
Connector	Terminal	Ground	Continuity
M20	67		Yes

Does continuity exist?

YES >> Inspection End.

NO >> Repair or replace harness.

BCM connector H.S. DISCONNECT OFF LIIA0915E

DRIVER SEAT CONTROL UNIT

POWER SUPPLY AND GROUND CIRCUIT

< COMPONENT DIAGNOSIS >

DRIVER SEAT CONTROL UNIT: Diagnosis Procedure

INFOID:0000000003935505

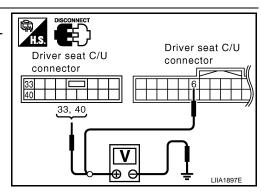
NOTE:

Do not disconnect the battery negative terminal and the driver seat control unit connector until DTC is confirmed with CONSULT-III.

1. CHECK POWER SUPPLY CIRCUIT

- Turn ignition switch OFF.
- Check voltage between driver seat control unit harness connector and ground.

	Terminals					
(+)	(+)		Power		Voltage (V)	
Driver seat control unit connector	Terminal	(–)	source	Condition	(Approx.)	
B202	6	Ground	START power sup- ply	Ignition switch START	Battery	
D000	33	Ground	Battery	Ignition	voltage	
B203	40		power sup- ply	switch OFF		



Is the inspection result normal?

YES >> GO TO 2.

NO >>

- >> Check the following.
 - Repair or replace harness between driver seat control unit and fuse block (J/B).
 - · Circuit breaker.

2. CHECK GROUND CIRCUIT

Check continuity between the driver seat control unit harness connector and ground.

Ground	connector	Continuity
B202 32 Sistant	B202	Yes
B203 48	B203	res

Driver seat C/U connector Driver seat C/U connector Driver seat C/U connector Driver seat C/U connector

Is the inspection result normal?

YES >> Driver seat control unit power supply and ground circuit are OK.

NO >> Repair or replace harness.

DRIVER SEAT CONTROL UNIT: Special Repair Requirement

INFOID:0000000003935506

1. PERFORM ADDITIONAL SERVICE

Perform additional service when removing battery negative terminal.

>> Refer to Owner's Manual.

AUTOMATIC DRIVE POSITIONER CONTROL UNIT

AUTOMATIC DRIVE POSITIONER CONTROL UNIT: Diagnosis Procedure

INFOID:0000000003935507

NOTE:

Do not disconnect the battery negative terminal and the driver seat control unit connector until DTC is confirmed with CONSULT-III.

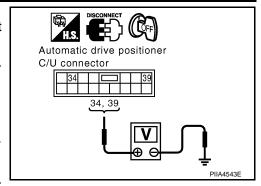
1. CHECK POWER SUPPLY CIRCUIT

POWER SUPPLY AND GROUND CIRCUIT

< COMPONENT DIAGNOSIS >

- Turn ignition switch OFF.
- Check voltage between automatic drive positioner control unit harness connector and ground.

Te				
(+)	Voltage (V)			
Automatic drive positioner control unit connector	Terminal	(–)	(Approx.)	
M33	34	Ground	Battery voltage	
INIOO	39	Giodila	Battery voltage	



Is the inspection result normal?

YES >> GO TO 2.

NO >> Repair or replace harness.

2. CHECK GROUND CIRCUIT

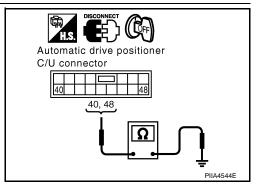
Check continuity between the automatic drive positioner control unit harness connector and ground.

Automatic drive positioner control unit connector	Terminal		Continuity
M33	40	Ground	Yes
IVIOO	48		163

Is the inspection result normal?

>> Automatic drive positioner control unit power supply and YES ground circuit are OK.

NO >> Repair or replace harness.



AUTOMATIC DRIVE POSITIONER CONTROL UNIT: Special Repair Requirement

1.PERFORM ADDITIONAL SERVICE

Perform additional service when removing battery negative terminal.

>> Refer to Owner's Manual.

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SLIDING SWITCH

Description INFOID:000000003935509

Sliding switch is equipped to the power seat switch LH on the seat cushion trim. The operation signal is input to the driver seat control unit when the sliding switch is operated.

Component Function Check

INFOID:0000000003935510

1. CHECK FUNCTION

- 1. Select "SLIDE SW-FR", "SLIDE SW-RR" in "Data monitor" mode with CONSULT-III.
- 2. Check sliding switch signal under the following conditions.

Monitor item	Condition		Status
SLIDE SW-FR	Sliding switch (forward)	Operate	ON
SLIDE SW-FR	Silding Switch (lorward)	Release	OFF
SLIDE SW-RR Sliding switch (backward)		Operate	ON
SLIDE SW-KK	Sliding switch (backward)	Release	OFF

Is the indication normal?

YES >> Inspection End.

NO >> Perform diagnosis procedure. Refer to <u>ADP-44, "Diagnosis Procedure"</u>.

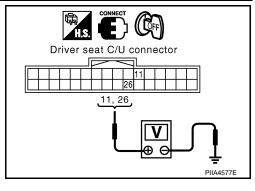
Diagnosis Procedure

INFOID:0000000003935511

1. CHECK SLIDING SWITCH SIGNAL

- 1. Turn ignition switch ON.
- 2. Check voltage between driver seat control unit harness connector and ground.

Driver seat control unit connector	Termi		Condition		Voltage (V) (Approx.)
unit connector	(+)	(-)			(дрргох.)
	11			Operate (backward)	0
B202	""	Ground	Sliding	Release	Battery voltage
BZOZ	26 Silvana switch	switch	Operate (forward)	0	
			Release	Battery voltage	



Is the inspection result normal?

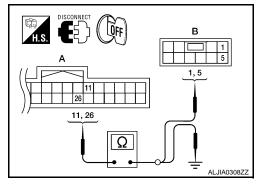
YES >> GO TO 5

NO >> GO TO 2

2. CHECK SLIDING SWITCH CIRCUIT

- Turn ignition switch OFF.
- 2. Disconnect driver seat control unit and power seat switch LH.
- 3. Check continuity between driver seat control unit harness connector and power seat switch LH harness connector.

Driver seat control unit connector	Terminal	Power seat switch LH connector	Terminal	Continuity
B202 (A)	11	B208 (B)	1	Yes
D202 (A)	26	D200 (D)	5	163



SLIDING SWITCH

< COMPONENT DIAGNOSIS >

4. Check continuity between driver seat control unit harness connector and ground.

Driver seat control unit connector	Terminal		Continuity	
B202 (A)	11	Ground	No	
B202 (A)	26	_	INO	

Is the inspection result normal?

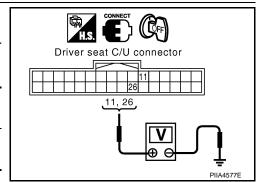
YES >> GO TO 3

NO >> Repair or replace harness.

3. CHECK DRIVER SEAT CONTROL UNIT OUTPUT

- Connect the driver seat control unit.
- 2. Turn ignition switch ON.
- Check voltage between driver seat control unit harness connector and ground.

Driver seat control unit	Terminals		Voltage (V)	
connector	(+)	(–)	(Approx.)	
B202	11	Ground	Battery voltage	
B202	26	Ground	Ballery Vollage	



Is the inspection result normal?

YES >> GO TO 4

NO >> Replace driver seat control unit. Refer to <u>SE-25, "Exploded View"</u>.

4. CHECK SLIDING SWITCH

Refer to ADP-45, "Component Inspection".

Is the inspection result normal?

YES >> GO TO 5

NO >> Replace power seat switch LH. Refer to <u>SE-25, "Exploded View"</u>.

${f 5.}$ CHECK INTERMITTENT INCIDENT

Refer to GI-49, "Intermittent Incident".

Is the inspection result normal?

YES >> Replace driver seat control unit. Refer to <u>SE-25, "Exploded View"</u>.

NO >> Repair or replace malfunctioning part.

Component Inspection

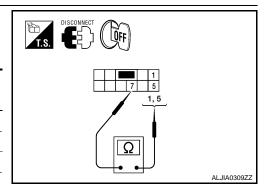
1. CHECK SLIDING SWITCH

1. Turn ignition switch OFF.

Disconnect power seat switch LH.

3. Check continuity between power seat switch LH terminals.

Terr	minal	Condition		Continuity
Power sea	at switch LH			
	1	Sliding switch (backward)	Operate	Yes
7	'	Silding Switch (backward)	Release	No
,	5	Sliding switch (forward)	Operate	Yes
	3	Silding Switch (lorward)	Release	No



Is the inspection result normal?

YES >> Inspection End.

NO >> Replace power seat switch LH. Refer to <u>SE-25, "Exploded View"</u>.

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RECLINING SWITCH

Description INFOID:000000003935513

Reclining switch is equipped to the power seat switch LH on the seat cushion trim. The operation signal is input to the driver seat control unit when the reclining switch is operated.

Component Function Check

INFOID:0000000003935514

1. CHECK FUNCTION

- 1. Select "RECLN SW-FR", "RECLN SW-RR" in "Data monitor" mode with CONSULT-III.
- 2. Check reclining switch signal under the following conditions.

Monitor item	Condition	Condition	
RECLN SW-FR	Reclining switch (forward)	Operate	ON
REGLIN SW-FR	Reclining Switch (lorward)	Release	OFF
RECLN SW-RR	Reclining switch (backward)	Operate	ON
RECLIN SW-RR	Reclining Switch (backward)	Release	OFF

Is the indication normal?

YES >> Inspection End.

NO >> Perform diagnosis procedure. Refer to <u>ADP-46, "Diagnosis Procedure"</u>.

Diagnosis Procedure

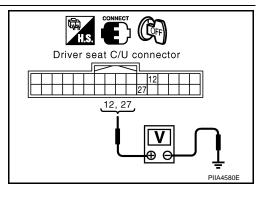
INFOID:0000000003935515

1. CHECK RECLINING SWITCH SIGNAL

1. Turn ignition switch ON.

2. Check voltage between driver seat control unit harness connector and ground.

Driver seat	Tern	ninals	Condition		Voltage (V)		
control unit connector	(+)	(-)			(Approx.)		
	12			Operate (forward)	0		
B202	Ground 27	B202 Ground switch	Ground	Ground	Reclining	Release	Battery voltage
D202					0.000	switch	Operate (backward)
				Release	Battery voltage		



Is the inspection result normal?

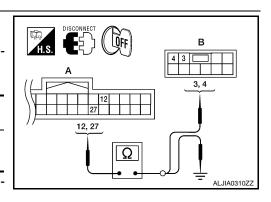
YES >> GO TO 5 NO >> GO TO 2

2. CHECK RECLINING SWITCH CIRCUIT

- 1. Turn ignition switch OFF.
- 2. Disconnect driver seat control unit and power seat switch LH.
- Check continuity between driver seat control unit harness connector and power seat switch LH harness connector.

Driver seat control unit connector	Terminal	Power seat switch LH connector	Terminal	Continuity
B202 (A)	12	B208 (B)	3	Yes
B202 (A)	27	D200 (B)	4	163

 Check continuity between driver seat control unit harness connector and ground.



RECLINING SWITCH

< COMPONENT DIAGNOSIS >

Driver seat control unit connector	Terminal		Continuity
B202 (A)	12	Ground	No
	27		INO

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Is the inspection result normal?

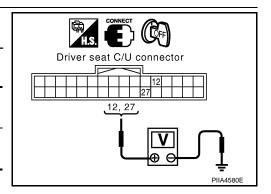
YES >> GO TO 3

NO >> Repair or replace harness.

${f 3.}$ CHECK DRIVER SEAT CONTROL UNIT OUTPUT

- 1. Connect the driver seat control unit connector.
- Turn ignition switch ON.
- Check voltage between driver seat control unit harness connector and ground.

Driver seat control	Termin	Voltage (V)	
unit connector	(+)	(-)	(Approx.)
B202	12	Ground	Pottony voltago
B202	27	Giodila	Battery voltage



Is the inspection result normal?

YES >> GO TO 4

NO >> Replace driver seat control unit. Refer to <u>SE-25, "Exploded View"</u>.

4. CHECK RECLINING SWITCH

Refer to ADP-47, "Component Inspection".

Is the inspection result normal?

YES >> GO TO 5

NO >> Replace power seat switch LH. Refer to <u>SE-25, "Exploded View"</u>.

CHECK INTERMITTENT INCIDENT

Refer to GI-49, "Intermittent Incident".

Is the inspection result normal?

YES >> Replace driver seat control unit. Refer to <u>SE-25, "Exploded View"</u>.

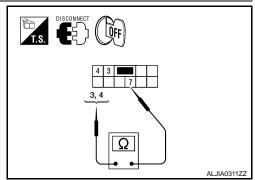
NO >> Repair or replace the malfunctioning part. Refer to <u>SE-25, "Exploded View"</u>.

Component Inspection

1. CHECK RECLINING SWITCH

- 1. Turn ignition switch OFF.
- Disconnect power seat switch LH.
- 3. Check continuity between power seat switch LH terminals.

Terr	ninals	Condition		Continuity
Power sea	at switch LH			Continuity
	3	Reclining switch	Operate	Yes
7	3	(backward)	Release	No
,	4	Reclining switch	Operate	Yes
4	(forward)	Release	No	



Is the inspection result normal?

YES >> Inspection End.

NO >> Replace power seat switch LH. Refer to <u>SE-25, "Exploded View"</u>.

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LIFTING SWITCH (FRONT)

< COMPONENT DIAGNOSIS >

LIFTING SWITCH (FRONT)

Description INFOID.000000003935517

Lifting switch (front) is equipped to the power seat switch LH on the seat cushion trim. The operation signal is input to the driver seat control unit when the lifting switch (front) is operated.

Component Function Check

INFOID:0000000003935518

1. CHECK FUNCTION

- 1. Select "LIFT FR SW-UP", "LIFT FR SW-DN" in "DATA MONITOR" mode with CONSULT-III.
- 2. Check lifting switch (front) signal under the following conditions.

Monitor item	Condition		Status
LIFT FR SW-UP	Lifting switch front (up)	Operate	ON
LIFT FR SW-OF	Litting Switch Horit (up)	Release	OFF
LIFT FR SW-DN	Lifting switch front (down)	Operate	ON
LIFT FR 3W-DIN	Lifting switch front (down)	Release	OFF

Is the indication normal?

YES >> Inspection End.

NO >> Perform diagnosis procedure. Refer to <u>ADP-48, "Diagnosis Procedure"</u>.

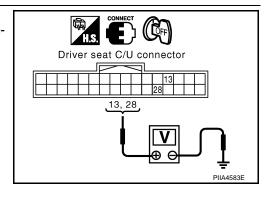
Diagnosis Procedure

INFOID:0000000003935519

1. CHECK LIFTING SWITCH SIGNAL

- 1. Turn ignition switch ON.
- 2. Check voltage between driver seat control unit harness connector and ground.

Driver seat	Term	ninals	Condition		Voltage (V)								
control unit connector	(+)	(-)			(Approx.)								
	13			Operate (down)	0V								
B202		Ground	Lifting switch	Release	Battery voltage								
		(front)	1									Operate (up)	0V
			Release	Battery voltage									



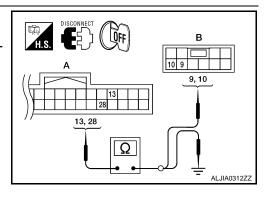
Is the inspection result normal?

YES >> GO TO 5 NO >> GO TO 2

$2.\,$ CHECK LIFTING SWITCH (FRONT) CIRCUIT

- 1. Turn ignition switch OFF.
- 2. Disconnect driver seat control unit and power seat switch LH.
- Check continuity between driver seat control unit harness connector and power seat switch LH harness connector.

Driver seat control unit connector	Terminal	Power seat switch LH connector	Terminal	Continuity	
B202 (A)	13	B208 (B)	9	Yes	
B202 (A)	28	B200 (B)	10		



LIFTING SWITCH (FRONT)

< COMPONENT DIAGNOSIS >

4. Check continuity between driver seat control unit harness connector and ground.

Driver seat control unit connector	Terminal	01	Continuity	
B202 (A)	13	Ground	No	
D202 (A)	28		INO	

Is the inspection result normal?

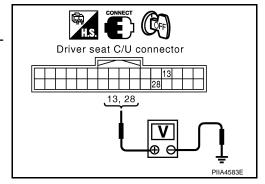
YES >> GO TO 3

NO >> Repair or replace harness.

3. CHECK DRIVER SEAT CONTROL UNIT OUTPUT

- Connect the driver seat control unit.
- 2. Turn ignition switch ON.
- Check voltage between driver seat control unit harness connector and ground.

Driver seat control unit	Term	Voltage (V)	
connector	(+)	(-)	(Approx.)
B202	13	Ground	Pattory voltage
DZUZ	28	Ground	Battery voltage



Is the inspection result normal?

YES >> GO TO 4

NO >> Replace driver seat control unit. Refer to <u>SE-25, "Exploded View"</u>.

4. CHECK LIFTING SWITCH (FRONT)

Refer to ADP-49, "Component Inspection".

Is the inspection result normal?

YES >> GO TO 5

NO >> Replace power seat switch LH. Refer to <u>SE-25, "Exploded View"</u>.

${f 5.}$ CHECK INTERMITTENT INCIDENT

Refer to GI-49, "Intermittent Incident".

Is the inspection result normal?

YES >> Replace driver seat control unit. Refer to <u>SE-25, "Exploded View"</u>.

NO >> Repair or replace the malfunctioning part.

Component Inspection

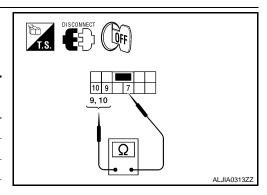
1. CHECK LIFTING SWITCH (FRONT)

1. Turn ignition switch OFF.

Disconnect power seat switch LH.

3. Check continuity between power seat switch LH terminals.

Terr	ninal	Condition		Continuity
Power sea	t switch LH	Condition		Continuity
	9	Lifting switch front (down)	Operate	Yes
7	9	Litting Switch from (down)	Release	No
,	10 Lifting switch front (up)	Operate	Yes	
		Litting Switch front (up)	Release	No



Is the inspection result normal?

YES >> Inspection End.

NO >> Replace power seat switch LH. Refer to <u>SE-25, "Exploded View"</u>.

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INFOID:0000000003935520

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LIFTING SWITCH (REAR)

Description

Lifting switch (rear) is equipped to the power seat switch LH on the seat cushion trim. The operation signal is input to the driver seat control unit when the lifting switch (rear) is operated.

Component Function Check

INFOID:0000000003935522

1. CHECK FUNCTION

- 1. Select "LIFT RR SW-UP", "LIFT RR SW-DN" in "Data monitor" mode with CONSULT-III.
- 2. Check lifting switch (rear) signal under the following conditions.

Monitor item	Condition		Status
LIFT RR SW-UP	Lifting quitch root (up)	Operate	ON
LIFT KK SW-OF	Lifting switch rear (up)	Release	OFF
LIFT RR SW-DN	Lifting switch rear (down)	Operate	ON
LII I IXIX SW-DIN	Litting Switch real (dOWII)	Release	OFF

Is the indication normal?

YES >> Inspection End.

NO >> Perform diagnosis procedure. Refer to <u>ADP-50, "Diagnosis Procedure"</u>.

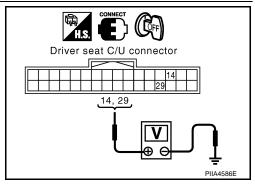
Diagnosis Procedure

INFOID:0000000003935523

1. CHECK LIFTING SWITCH (REAR) SIGNAL

- 1. Turn ignition switch ON.
- 2. Check voltage between driver seat control unit harness connector and ground.

Driver seat	Term	ninals	Condition		Voltage (V)
control unit connector	(+)	(-)			(Approx.)
	4.4	Ground swit		Operate (down)	0
B202	14		Lifting	Release	Battery voltage
D202			(rear)	Operate (up)	0
				Release	Battery voltage



Is the inspection result normal?

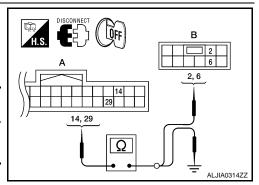
YES >> GO TO 5 NO >> GO TO 2

2. CHECK LIFTING SWITCH (REAR) CIRCUIT

- 1. Turn ignition switch OFF.
- 2. Disconnect driver seat control unit and power seat switch LH.
- Check continuity between driver seat control unit harness connector and power seat switch LH harness connector.

Driver seat control unit connector	Terminal	Power sear switch LH connector	Terminal	Continuity
B202 (A)	14	B208 (B)	2	Yes
D202 (A)	29	D200 (D)	6	165

 Check continuity between driver seat control unit harness connector and ground.



LIFTING SWITCH (REAR)

< COMPONENT DIAGNOSIS >

Driver seat control unit connector	Terminal	0 1	Continuity
B202 (A)	14	Ground	No
	29		No

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Is the inspection result normal?

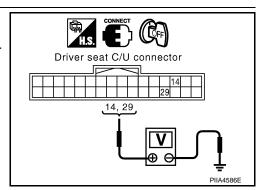
YES >> GO TO 3

NO >> Repair or replace harness.

${f 3.}$ CHECK DRIVER SEAT CONTROL UNIT OUTPUT

- Connect the driver seat control unit.
- Turn ignition switch ON.
- Check voltage between driver seat control unit harness connector and ground.

Driver seat control unit	Ter	minals	Voltage (V)	
connector	(+)	(–)	(Approx.)	
B202	14	Ground	Battery voltage	
D202	29	Giouna	Dattery Voltage	



Is the inspection result normal?

YES >> GO TO 4

NO >> Replace driver seat control unit. Refer to SE-25, "Exploded View".

4. CHECK LIFTING SWITCH (REAR)

Refer to ADP-51, "Component Inspection".

Is the inspection result normal?

YES >> GO TO 5

NO >> Replace power seat switch LH. Refer to <a>SE-25, "Exploded View".

5. CHECK INTERMITTENT INCIDENT

Refer to GI-49, "Intermittent Incident".

Is the inspection result normal?

YES >> Replace driver seat control unit. Refer to SE-25, "Exploded View".

>> Repair or replace the malfunctioning part. NO

Component Inspection

1. CHECK LIFTING SWITCH (REAR)

- Turn ignition switch OFF.
- Disconnect power seat switch LH.
- Check continuity between power seat switch LH terminals.

Terr	minal	Condition	Condition	
Power sea	t switch LH	Condition		Continuity
	2	Lifting switch rear (up)	Operate	Yes
7	2	Litting Switch rear (up)	Release	No
,	6 Lifting switch rear (do	Lifting switch rear (down)	Operate	Yes
	0	Litting switch rear (down)	Release	No

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Is the inspection result normal?

YES >> Inspection End.

NO >> Replace power seat switch LH. Refer to <u>SE-25, "Exploded View".</u> ADP

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INFOID:0000000003935524

PEDAL ADJUSTING SWITCH

< COMPONENT DIAGNOSIS >

PEDAL ADJUSTING SWITCH

Description INFOID:000000003935525

Pedal adjusting switch is on the instrument panel. The operation signal is input to the driver seat control unit when the pedal adjusting switch is operated. The pedal adjusting switch signal is sent to the automatic drive positioner control unit via UART communication.

Component Function Check

INFOID:0000000003935526

1. CHECK FUNCTION

- 1. Select "PEDAL SW-FR", "PEDAL SW-RR" in "Data monitor" mode with CONSULT-III.
- 2. Check pedal adjusting switch signal under the following conditions.

Monitor item	Condition		Status
PEDAL SW-FR	Dadal adjusting quitab (faminad)	Operate	ON
PEDAL SW-FR	Pedal adjusting switch (forward)	Release	OFF
PEDAL SW-RR	Pedal adjusting switch (backward)	Operate	ON
FEDAL SW-KK	redai adjusting switch (backward)	Release	OFF

Is the indication normal?

YES >> Inspection End.

NO >> Perform diagnosis procedure. Refer to <u>ADP-52. "Diagnosis Procedure"</u>.

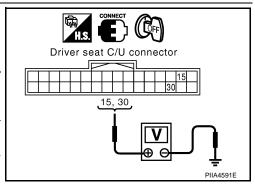
Diagnosis Procedure

INFOID:0000000003935527

1. CHECK PEDAL ADJUSTING SWITCH SIGNAL

- 1. Turn ignition switch ON.
- 2. Check voltage between driver seat control unit harness connector and ground.

Driver seat	Terminals		Condition		Voltage (V)
control unit connector	(+)	(-)	Cond	dition	(Approx.)
	15			Operate (backward)	0
B202	13	Ground	Pedal ad- justing	Release	Battery voltage
B202 =	30	Glound	switch	Operate (forward)	0
	30			Release	Battery voltage



Is the inspection result normal?

YES >> GO TO 5 NO >> GO TO 2

2. CHECK PEDAL ADJUSTING SWITCH CIRCUIT

PEDAL ADJUSTING SWITCH

< COMPONENT DIAGNOSIS >

- 1. Turn ignition switch OFF.
- 2. Disconnect driver seat control unit and pedal adjusting switch.
- 3. Check continuity between driver seat control unit harness connector and pedal adjusting switch harness connector.

Driver seat control unit connector	Terminal	Pedal adjusting switch connector	Terminal	Continuity
B202	15	M96	2	Yes
5202	30	IVISO	3	163

Check continuity between driver seat control unit harness connector and ground.

Driver seat C/U connector 2, 3 15, 30 \[\tilde{\Omega} \] LIIA0726E	H.S. DISCONNECT OFF	Pedal adjusting switch connector
15, 30 Ω	Driver seat C/U connector	
	30	

Driver seat control unit connector	Terminal		Continuity
B202	15	Ground	No
	30		INO

Is the inspection result normal?

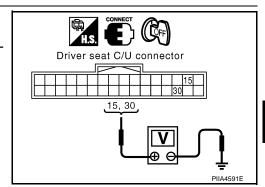
YES >> GO TO 3

NO >> Repair or replace harness.

3. CHECK DRIVER SEAT CONTROL UNIT OUTPUT

- 1. Connect the driver seat control unit.
- 2. Turn ignition switch ON.
- 3. Check voltage between driver seat control unit harness connector and ground.

Driver seat control unit	Terminals		Voltage (V)	
connector	(+)	(-)	(Approx.)	
B202	15	Ground	Battery voltage	
5202	30	Giodila	Battery voltage	



Is the inspection result normal?

YES >> GO TO 4

NO >> Replace driver seat control unit. Refer to <u>SE-25, "Exploded View"</u>.

4. CHECK PEDAL ADJUSTING SWITCH

Refer to ADP-54, "Component Inspection".

Is the inspection result normal?

YES >> GO TO 5

NO >> Replace pedal adjusting switch.

${f 5.}$ CHECK PEDAL ADJUSTING SWITCH GROUND CIRCUIT

Check continuity between pedal adjusting switch connector M96 terminal 1 and ground.

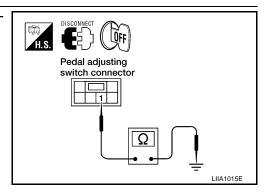
1 - Ground

: Continuity should exist.

Is the inspection result normal?

YES >> GO TO 6

NO >> Replace or replace harness.



6. CHECK INTERMITTENT INCIDENT

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PEDAL ADJUSTING SWITCH

< COMPONENT DIAGNOSIS >

Refer to GI-49, "Intermittent Incident".

Is the inspection result normal?

YES >> Replace automatic drive positioner control unit. Refer to ADP-159, "Removal and Installation".

NO >> Repair or replace the malfunctioning part.

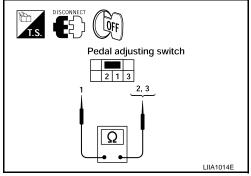
Component Inspection

INFOID:0000000003935528

1. CHECK PEDAL ADJUSTING SWITCH

- 1. Turn ignition switch OFF.
- 2. Disconnect pedal adjusting switch.
- 3. Check continuity between pedal adjusting switch terminals.

Ter	minal	Condition		Continuity
Pedal adju	sting switch			
	2	Pedal adjusting switch	Operate	Yes
1	2	(backward)	Release	No
1	3	Pedal adjusting switch	Operate	Yes
	3	(forward)	Release	No



Is the inspection result normal?

YES >> Inspection End.

NO >> Replace pedal adjusting switch.

SEAT MEMORY SWITCH

< COMPONENT DIAGNOSIS >

SEAT MEMORY SWITCH

Description INFOID:0000000003935529

Memory switch is equipped on the seat memory switch installed to the front door LH trim. The operation signal is input to the automatic drive positioner control unit when the memory switch is operated.

Component Function Check

1. CHECK FUNCTION

- Select "MEMORY SW 1", "MEMORY SW 2", "SET SW" in "Data monitor" mode with CONSULT-III.
- Check seat memory switch signal under the following conditions.

Monitor item	Condition		Status
MEMORY SW1	Memory switch 1	Push	ON
		Release	OFF
MEMORY SW2	Memory switch 2	Push	ON
		Release	OFF
SET SW	Set switch	Push	ON
		Release	OFF

Is the indication normal?

YES >> Inspection End.

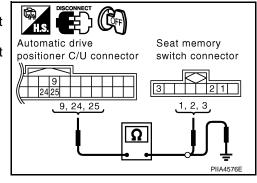
NO >> Perform diagnosis procedure. Refer to ADP-55, "Diagnosis Procedure".

Diagnosis Procedure

1. CHECK MEMORY SWITCH CIRCUIT

- Turn ignition switch OFF.
- Disconnect automatic drive positioner control unit and seat memory switch.
- Check continuity between automatic drive positioner control unit harness connector and seat memory switch harness connector.

Automatic drive positioner control unit connector	Terminal	Seat memory switch connector	Terminal	Continuity
	9		1	
M33	24	D5	3	Yes
	25		2	



Check continuity between automatic drive positioner control unit harness connector and ground.

Automatic drive positioner control unit connector	Terminal		Continuity
	9	Ground	
M33	24		No
	25		

Is the inspection result normal?

YES >> GO TO 2

NO >> Repair or replace harness.

2 . CHECK MEMORY SWITCH GROUND CIRCUIT

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INFOID:0000000003935531

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SEAT MEMORY SWITCH

< COMPONENT DIAGNOSIS >

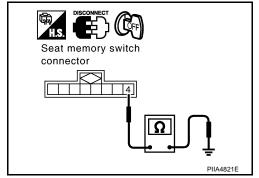
Check continuity between seat memory switch harness connector and ground.

Seat memory switch connector	Terminal	Ground	Continuity
D5	4		Yes

Is the inspection result normal?

YES >> GO TO 3

NO >> Repair or replace harness.



3. CHECK SEAT MEMORY SWITCH

Refer to ADP-56, "Component Inspection".

Is the inspection result normal?

YES >> GO TO 4

NO >> Replace seat memory switch. Refer to INT-14, "Removal and Installation".

4. CHECK INTERMITTENT INCIDENT

Refer to GI-49, "Intermittent Incident".

Is the inspection result normal?

YES >> Replace automatic drive positioner control unit. Refer to ADP-159, "Removal and Installation".

NO >> Repair or replace the malfunctioning part.

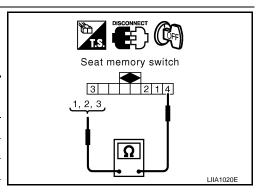
Component Inspection

INFOID:0000000003935532

1. CHECK SEAT MEMORY SWITCH

- 1. Turn ignition switch OFF.
- 2. Disconnect seat memory switch.
- 3. Check continuity between seat memory switch terminals.

Terminal Seat memory switch		Condition		Continuity	
	1	Memory switch 1	Push	Yes	
	1	Wemory Switch i	Release	No	
1	4 2 Memory switch 2 3 Set switch	Push	Yes		
7		Memory Switch 2	2 Wichiory Switch 2	Release	No
		Push	Yes		
		Release	No		



Is the inspection result normal?

YES >> Inspection End.

NO >> Replace seat memory switch.

< COMPONENT DIAGNOSIS >

DOOR MIRROR REMOTE CONTROL SWITCH CHANGEOVER SWITCH

INFOID:0000000003935533

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CHANGEOVER SWITCH: Description

Changeover switch is integrated into door mirror remote control switch.

Changeover switch has three positions (L, N and R).

It changes door mirror motor operation by transmitting control signal to automatic drive positioner control unit.

CHANGEOVER SWITCH: Component Function Check

INFOID:0000000003935534

1. CHECK CHANGEOVER SWITCH FUNCTION

Check the operation on "MIR CHNG SW-R" or "MIR CHNG SW-L" in "DATA MONITOR" mode with CONSULT-III.

Refer to ADP-25, "CONSULT-III Function".

Is the inspection result normal?

YES >> Changeover switch function is OK.

NO >> Refer to ADP-57, "CHANGEOVER SWITCH: Diagnosis Procedure".

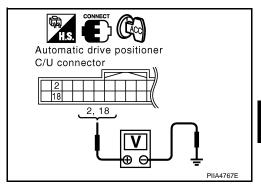
INFOID:0000000003935535

CHANGEOVER SWITCH : Diagnosis Procedure

1. CHECK CHANGEOVER SWITCH SIGNAL

- 1. Turn ignition switch ON.
- 2. Check voltage between automatic drive positioner control unit connector and ground.

Te	erminals			
(+)	(+)		Change over switch	Voltage (V)
Automatic drive positioner control unit connector	Terminal	(-)	condition	(Approx.)
	2	2 Ground	RIGHT	0
M33	2		Other than above	5
IVIOO	18	Ground	LEFT	0
	10		Other than above	5



Is the inspection result normal?

YES >> GO TO 6 NO >> GO TO 2

2. CHECK HARNESS CONTINUITY

- 1. Turn ignition switch OFF.
- 2. Disconnect automatic drive positioner control unit and door mirror remote control switch.
- 3. Check continuity between automatic drive positioner control unit connector and door mirror remote control switch connector.

•	Automatic drive positioner control unit connector	Terminal	Door mirror re- mote control switch connector	Terminal	Continuity
-	M33	2	M163	3	Yes
	WISS	18	WITOS	2	163

Door mirror remote control switch connector

Automatic drive positioner C/U connector

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4. Check continuity between automatic drive positioner control unit connector and ground.

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< COMPONENT DIAGNOSIS >

Automatic drive positioner control unit connector	Terminal		Continuity
M33	2	Ground	No
IVIOO	18		110

Is the inspection result normal?

YES >> GO TO 3

NO >> Repair or replace harness.

3. CHECK DOOR MIRROR REMOTE CONTROL SWITCH GROUND CIRCUIT

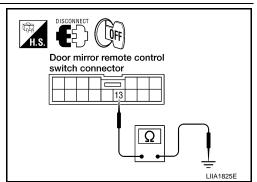
Check continuity between door mirror remote control switch connector and ground.

Door mirror remote control switch connector	Terminal	Ground	Continuity
M163	13		Yes

Is the inspection result normal?

YES >> GO TO 4

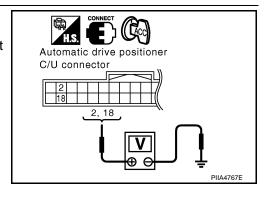
NO >> Repair or replace harness.



4. CHECK AUTOMATIC DRIVE POSITIONER CONTROL UNIT OUTPUT SIGNAL

- 1. Connect automatic drive positioner control unit.
- 2. Turn ignition switch ON.
- 3. Check voltage between automatic drive positioner control unit connector and ground.

Termi			
(+)		Voltage (V)	
Automatic drive positioner control unit connector	Terminal	(-)	(Approx.)
M33	2	Ground	5
IVIOS	18	Giodila	3



Is the inspection result normal?

YES >> GO TO 5.

NO >> Replace automatic drive positioner control unit. Refer to ADP-159, "Removal and Installation".

5. CHECK CHANGEOVER SWITCH

Check changeover switch.

Refer to ADP-58, "CHANGEOVER SWITCH: Component Inspection".

Is the inspection result normal?

YES >> Refer to GI-49, "Intermittent Incident".

NO >> Replace door mirror remote control switch. Refer to INT-14, "Removal and Installation".

6. CHECK INTERMITTENT INCIDENT

Check intermittent incident.

Refer to GI-49, "Intermittent Incident".

Is the inspection result normal?

YES >> Replace automatic drive positioner control unit. Refer to ADP-159. "Removal and Installation".

NO >> Repair or replace the malfunctioning parts.

CHANGEOVER SWITCH: Component Inspection

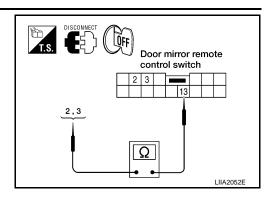
INFOID:0000000003935536

1. CHECK CHANGEOVER SWITCH

< COMPONENT DIAGNOSIS >

Check door mirror remote control switch.

Terminal Door mirror remote control switch		Change over switch	Continuity	
		condition	Continuity	
2	2	LEFT	Yes	
2	13	Other than above	No	
3		RIGHT	Yes	
3		Other than above	No	



Is the inspection result normal?

YES >> Inspection End.

NO >> Replace door mirror remote control switch. Refer to ADP-161, "Removal and Installation".

MIRROR SWITCH

MIRROR SWITCH: Description

It operates angle of the door mirror face.

It transmits mirror face adjust operation to automatic drive positioner control unit.

MIRROR SWITCH: Component Function Check

1. CHECK MIRROR SWITCH FUNCTION

Check the operation on "MIR CON SW-UP/DN" and "MIR CON SW-RH/LH" in "DATA MONITOR" mode with CONSULT-III.

Refer to ADP-25, "CONSULT-III Function".

Is the inspection result normal?

YES >> Mirror switch function is OK.

NO >> Refer to ADP-59, "MIRROR SWITCH: Diagnosis Procedure".

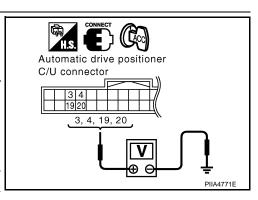
MIRROR SWITCH: Diagnosis Procedure

1. CHECK MIRROR SWITCH FUNCTION

1. Turn ignition switch ON.

Check voltage between automatic drive positioner control unit connector and ground.

Terminals				
(+)			Mirror switch	Voltage (V)
Automatic drive positioner control unit connector	Terminal	(-)	Condition	(Approx.)
	3		UP	0
	3		Other than above	5
	4		LEFT	0
M33	4	Ground	Other than above	5 0 5 0 5 0
IVISS	19	Ground	DOWN	0
	19		Other than above	5
	00		RIGHT	0
	20		Other than above	5



Is the inspection result normal?

YES >> GO TO 6 NO >> GO TO 2

2. CHECK HARNESS CONTINUITY

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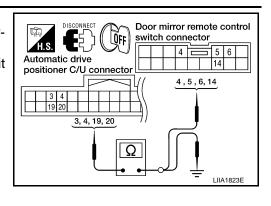
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< COMPONENT DIAGNOSIS >

- 1. Turn ignition switch OFF.
- Disconnect automatic drive positioner control unit and door mirror remote control switch.
- 3. Check continuity between automatic drive positioner control unit connector and door mirror remote control switch connector.

Automatic drive positioner control unit connector	Terminal	Door mirror remote control switch connector	Terminal	Continuity
M33	3		6	
	4	M163	5	Yes
	19	IVITOS	14	res
	20		4	



4. Check continuity between automatic drive positioner control unit connector and ground.

Automatic drive positioner control unit connector	Terminal		Continuity	
M33	3	Ground		
	4		No	
	19		INO	
	20			

Is the inspection result normal?

YES >> GO TO 3

NO >> Repair or replace harness.

3. CHECK DOOR MIRROR REMOTE CONTROL SWITCH GROUND CIRCUIT

Check continuity between door mirror remote control switch connector and ground.

Door mirror remote control switch connector	Terminal	Ground	Continuity
M163	13		Yes

Door mirror remote control switch connector \[\text{\Omega} \text{\Ome

Is the inspection result normal?

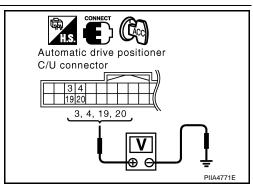
YES >> GO TO 4

NO >> Repair or replace harness.

4. CHECK AUTOMATIC DRIVE POSITIONER CONTROL UNIT OUTPUT SIGNAL

- 1. Connect automatic drive positioner control unit.
- 2. Turn ignition switch ON.
- 3. Check voltage between automatic drive positioner control unit and ground.

Te			
(+)		Voltage (V)	
Automatic drive positioner control unit connector	Terminal	(-)	(Approx.)
	3		
M33	4	Ground	E
IVIOO	19	Ground	5
	20		



Is the inspection result normal?

< COMPONENT DIAGNOSIS >

YES >> GO TO 5

NO >> Replace automatic drive positioner control unit. Refer to ADP-159, "Removal and Installation".

5. CHECK MIRROR SWITCH

Check mirror switch.

Refer to ADP-61, "MIRROR SWITCH: Component Inspection".

Is the inspection result normal?

YES >> Refer to GI-49, "Intermittent Incident".

NO >> Replace door mirror remote control switch. Refer to ADP-161, "Removal and Installation".

6. CHECK INTERMITTENT INCIDENT

Check intermittent incident.

Refer to GI-49, "Intermittent Incident".

Is the inspection result normal?

YES >> Replace automatic drive positioner control unit. Refer to ADP-159, "Removal and Installation".

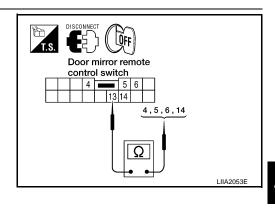
NO >> Repair or replace the malfunctioning parts.

MIRROR SWITCH: Component Inspection

1. CHECK MIRROR SWITCH

Check door mirror remote control switch.

Termir	nal		
Door mirror control s		Mirror switch condition	Continuity
4		RIGHT	Yes
4		Other than above	No
5		LEFT	Yes
3	13	Other than above	No
6		UP	Yes
b		Other than above	No
14		DOWN	Yes
14		Other than above	No



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Is the inspection result normal?

YES >> Inspection End.

NO >> Replace door mirror remote control switch. Refer to ADP-161, "Removal and Installation".

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POWER SEAT SWITCH GROUND CIRCUIT

< COMPONENT DIAGNOSIS >

POWER SEAT SWITCH GROUND CIRCUIT

Diagnosis Procedure

1. CHECK POWER SEAT SWITCH LH GROUND CIRCUIT

- 1. Turn ignition switch OFF.
- 2. Disconnect power seat switch LH.
- 3. Check continuity between power seat switch LH connector and ground.

Power seat switch LH connector	Terminal	Ground	Continuity
B208	7		Yes

DISCONNECT OFF

INFOID:0000000003935541

Is the inspection result normal?

YES >> Check intermittent incident. Refer to <u>GI-49, "Intermittent Incident"</u>.

NO >> Repair or replace harness.

DETENTION SWITCH

< COMPONENT DIAGNOSIS >

DETENTION SWITCH

Description INFOID:000000003935542

Park position switch is installed on A/T device. It is turned OFF when the A/T selector lever is in P position. The driver seat control unit judges that the A/T selector lever is in P position if continuity does not exist in this circuit.

Component Function Check

1. CHECK FUNCTION

- 1. Select "DETENT SW" signal in "Data monitor" mode with CONSULT-III.
- 2. Check park position switch signal under the following conditions.

Monitor item	Condition		Status
		P position	OFF
DETENT SW	A/T selector lever	Other than above	ON

Is the indication normal?

YES >> Inspection End.

NO >> Perform diagnosis procedure. Refer to <u>ADP-63, "Diagnosis Procedure"</u>.

Diagnosis Procedure

1. CHECK DTC WITH "BCM"

Check "Self Diagnostic Result" for BCM with CONSULT-III.

Is any other DTC detected?

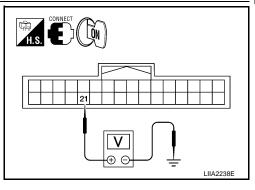
YES >> Check the DTC.

NO >> GO TO 2

2. CHECK PARK POSITION SWITCH INPUT SIGNAL

- 1. Turn ignition switch ON.
- 2. Mechanical key must be removed from the key switch.
- 3. Check voltage between driver seat control unit harness connector and ground.

Driver seat	Terr	minal	0-	1:4:	Voltage (V)
control unit connector	(+)	(-)	Condition		(Approx.)
B202	B202 21 Ground A/T selec-		A/T selec-	P position	Battery volt- age
5202	21	Ciodila	tor lever	Other than above	0V



Is the inspection result normal?

YES >> GO TO 4 NO >> GO TO 3

$3.\,$ CHECK PARK POSITION SWITCH CIRCUIT

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DETENTION SWITCH

< COMPONENT DIAGNOSIS >

- 1. Turn ignition switch OFF.
- 2. Disconnect driver seat control unit and A/T device.
- 3. Check continuity between driver seat control unit harness connector and A/T device harness connector.

Driver seat cont	river seat control unit		A/T device		
Connector	Terminal	Connector	Terminal	Continuity	
B202	21	M158	4	Yes	

4. Check continuity between A/T device harness connector and ground.

H.S. PED OFF	Driver seat C/U connector
A/T device connector	21 21 LIIA1774E

A/T dev	vice		Continuity
Connector	Terminal	Ground	Continuity
M158	4		No

Is the inspection result normal?

YES >> GO TO 4

NO >> Repair or replace harness.

4. CHECK INTERMITTENT INCIDENT

Refer to GI-49, "Intermittent Incident".

Is the inspection result normal?

YES >> Replace driver seat control unit. Refer to <u>SE-25, "Exploded View"</u>.

NO >> Repair or replace the malfunctioning part.

FRONT DOOR SWITCH (DRIVER SIDE)

< COMPONENT DIAGNOSIS >

FRONT DOOR SWITCH (DRIVER SIDE)

Description

Detects front door LH open/close condition.

Component Function Check

1. CHECK FUNCTION

- 1. Select "DOOR SW-DR" in "Data monitor" mode with CONSULT-III.
- 2. Check the front door switch LH signal under the following conditions.

Monitor item	Condition		Status
DOOR SW-DR	Front door switch LH	Open	ON
DOOK SW-DK	Front door switch LH	Close	OFF

Is the inspection result normal?

YES >> Inspection End.

NO >> Perform diagnosis procedure. Refer to <u>ADP-65, "Diagnosis Procedure"</u>.

Diagnosis Procedure

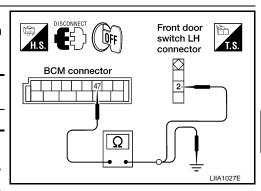
1. CHECK FRONT DOOR SWITCH LH CIRCUIT

- 1. Disconnect BCM.
- Check continuity between BCM connector and front door switch LH connector.

BCM connector	Terminal	Front door switch LH connector	Terminal	Continuity
M19	47	B8	2	Yes

3. Check continuity between BCM connector and ground.

BCM connector	Terminal	Ground	Continuity
M19	47	Giodila	No



Is the inspection result normal?

YES >> GO TO 2

NO >> Repair or replace harness.

2. CHECK FRONT DOOR SWITCH LH

Refer to ADP-65, "Component Inspection".

Is the inspection result normal?

YES >> GO TO 3

NO >> Replace front door switch LH.

3. CHECK INTERMITTENT INCIDENT

Refer to GI-49, "Intermittent Incident".

Is the inspection result normal?

YES >> Replace BCM. Refer to BCS-59, "Removal and Installation".

NO >> Repair or replace the malfunctioning part.

Component Inspection

1. CHECK FRONT DOOR SWITCH LH

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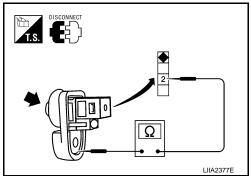
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FRONT DOOR SWITCH (DRIVER SIDE)

< COMPONENT DIAGNOSIS >

- Turn ignition switch OFF.
- Disconnect front door switch LH.
 Check continuity between front door switch LH terminals.

Terminal		Condition		Continuity
Front o	door switch LH	Condition	/I I	Continuity
2	Ground part of	Front door switch	Pushed	No
	door switch	LH	Released	Yes



Is the inspection result normal?

YES >> Inspection End.

>> Replace front door switch LH. NO

SLIDING SENSOR

< COMPONENT DIAGNOSIS >

SLIDING SENSOR

Description INFOID:000000003935549

- The sliding sensor is installed to the seat frame assembly.
- The pulse signal is input to the driver seat control unit when sliding is performed.
- The driver seat control unit counts the pulse and calculates the sliding amount of the seat.

Component Function Check

1. CHECK FUNCTION

- 1. Select "SLIDE PULSE" in "Data monitor" mode with CONSULT-III.
- 2. Check sliding sensor signal under the following conditions.

Monitor item	Condition		Valve
		Operate (forward)	Change (increase)
SLIDE PULSE	Seat sliding	Operate (backward)	Change (decrease)
		Release	No change

Is the indication normal?

YES >> Inspection End.

NO >> Perform diagnosis procedure. Refer to <u>ADP-67. "Diagnosis Procedure"</u>.

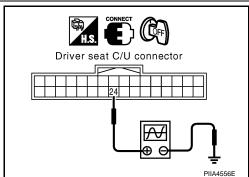
Diagnosis Procedure

1. CHECK SLIDING SENSOR SIGNAL

1. Turn ignition switch ON.

2. Read voltage signal between driver seat control unit harness connector and ground with osiloscope.

	Terminals					
(+)						
Driver's seat control unit	Termi- nal	(–)	Condition		Voltage signal	
B202	24	Ground	Seat sliding	Operate	(V) 6 4 2 0 50 ms	
				Other than above	0 or 5	



Is the inspection result normal?

YES >> GO TO 4 NO >> GO TO 2

2. CHECK SLIDING SENSOR CIRCUITS

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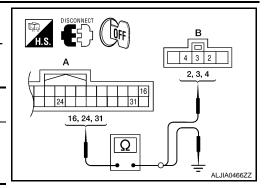
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SLIDING SENSOR

< COMPONENT DIAGNOSIS >

- 1. Turn ignition switch OFF.
- 2. Disconnect driver seat control unit and sliding motor LH.
- Check continuity between driver seat control unit harness connector and sliding motor LH harness connector.

Driver seat control unit connector	Terminal	Sliding motor LH connector	Terminal	Continuity
	16		3	
B202 (A)	24	B204 (B)	4	Yes
	31		2	



4. Check continuity between driver seat control unit harness connector and ground.

Driver seat control unit connector	Terminal		Continuity
	16	Ground	
B202 (A)	24		No
	31		

Is the inspection result normal?

YES >> GO TO 3

NO >> Repair or replace harness.

3. CHECK SEAT OPERATION

- 1. Connect driver seat control unit and sliding motor LH.
- 2. Check seat operation (except sliding operation) with memory function.

Is the inspection result normal?

YES >> Replace sliding motor LH. Refer to <u>SE-25, "Exploded View"</u>.

NO >> Replace driver seat control unit. Referr to <u>SE-25</u>, "Exploded View".

4. CHECK INTERMITTENT INCIDENT

Refer to GI-49, "Intermittent Incident".

Is the inspection result normal?

YES >> Replace driver seat control unit. Refer to <u>SE-25, "Exploded View"</u>.

NO >> Repair or replace the malfunctioning part.

RECLINING SENSOR

< COMPONENT DIAGNOSIS >

RECLINING SENSOR

Description

- The reclining motor is installed to the seat frame assembly.
- The pulse signal is inputted to the driver seat control unit when the reclining is operated.
- The driver seat control unit counts the pulse and calculates the reclining amount of the seat.

Component Function Check

1. CHECK FUNCTION

- 1. Select "RECLN PULSE" in "Data monitor" mode with CONSULT-III.
- 2. Check reclining sensor signal under the following conditions.

Monitor item	Condition		Value
		Operate (forward)	Change (increase)
RECLN PULSE	Seat reclining	Operate (backward)	Change (decrease)
		Release	No change

Is the indication normal?

YES >> Inspection End.

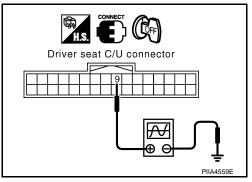
NO >> Perform diagnosis procedure. Refer to <u>ADP-69</u>, "<u>Diagnosis Procedure</u>".

Diagnosis Procedure

1. CHECK RECLINING SENSOR SIGNAL

- 1. Turn ignition switch ON.
- 2. Read voltage signal between driver seat control unit harness connector and ground with oscilloscope.

٦	erminals					
(+)			0 150			
Driver seat con- trol unit	Termi- nal	(–)	Condition		Voltage signal	
B202	9	Ground	Seat reclin- ing	Operate	(V) 6 4 2 0 + 50ms SIIA0692J	
				Other than above	0 or 5	



Is the inspection result normal?

YES >> GO TO 4 NO >> GO TO 2

 $2.\,$ CHECK RECLINING SENSOR CIRCUIT

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RECLINING SENSOR

< COMPONENT DIAGNOSIS >

- Turn ignition switch OFF.
- 2. Disconnect driver seat control unit and reclining motor LH.
- 3. Check continuity between driver seat control unit harness connector and reclining motor LH harness connector.

Driver seat control unit connector	Terminal	Reclining motor connector	Terminal	Continuity
B202 (A)	9	B232 (B)	1	Yes
D202 (A)	31	D232 (B)	4	165

Check continuity between driver seat control unit harness connector and ground.

H.S. DISCONNECT OFF	B
A 16 31	1,4
9, 16, 31 Ω	ALJĪĀ0467ZZ

Driver seat control unit connector	Terminal		Continuity	
B202 (A)	9	Ground	No	
B202 (A)	31		NO	

Is the inspection result normal?

YES >> GO TO 3

NO >> Repair or replace harness.

3. CHECK SEAT OPERATION

- 1. Connect driver seat control unit and reclining motor LH connector.
- 2. Check seat operation (except reclining operation) with memory function.

Is the operation normal?

YES

>> Replace reclining motor LH. Refer to <u>SE-25, "Exploded View"</u>.
>> Replace driver seat control unit. Refer to <u>SE-25, "Exploded View"</u>. NO

4. CHECK INTERMITTENT INCIDENT

Refer to GI-49, "Intermittent Incident".

Is the inspection result normal?

>> Replace driver seat control unit. Refer to SE-25, "Exploded View".

>> Repair or replace the malfunctioning part. NO

LIFTING SENSOR (FRONT)

< COMPONENT DIAGNOSIS >

LIFTING SENSOR (FRONT)

Description

- The lifting sensor (front) is installed to the seat frame assembly.
- The pulse signal is input to the driver seat control unit when the lifting (front) is operated.
- The driver seat control unit counts the pulse and calculates the lifting (front) amount of the seat.

Component Function Check

1. CHECK FUNCTION

- 1. Select "LIFT FR PULSE" in "Data monitor" mode with CONSULT-III.
- 2. Check the lifting sensor (front) signal under the following conditions.

Monitor item	Condition		Value
			Change (increase)
LIFT FR PULSE	Seat lifting (front)	Operate (down)	Change (decrease)
		Release	No change

Is the indication normal?

YES >> Inspection End.

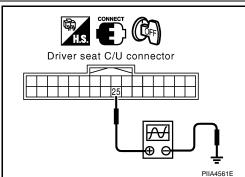
NO >> Perform diagnosis procedure. Refer to <u>ADP-71. "Diagnosis Procedure"</u>.

Diagnosis Procedure

1. CHECK LIFTING SENSOR (FRONT) SIGNAL

- 1. Turn ignition switch ON.
- 2. Read the voltage signal between driver seat control unit harness connector and ground with an oscilloscope.

Terminals						
(+)						
Driver seat con- trol unit connector	Termi- nal	(–)	Condition		Voltage signal	
B202	25	Ground	Seat lifting (front)	Oper- ate	(V) 6 4 2 0 *********************************	
			Other than above		0 or 5	



Is the inspection result normal?

YES >> GO TO 4 NO >> GO TO 2

2. CHECK LIFTING SENSOR (FRONT) CIRCUIT

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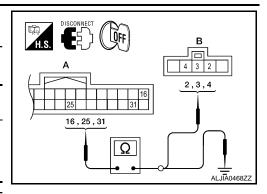
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LIFTING SENSOR (FRONT)

< COMPONENT DIAGNOSIS >

- 1. Turn ignition switch OFF.
- 2. Disconnect driver seat control unit and lifting motor (front).
- Check continuity between driver seat control unit harness connector and lifting motor (front) harness connector.

Driver seat control unit connector	Terminal	Lifting motor (front) connector	Terminal	Continuity
	16		3	
B202 (A)	25	B206 (B)	4	Yes
	31		2	



Check continuity between driver seat control unit harness connector and ground.

Driver seat control unit connector	Terminal		Continuity
	16	Ground	
B202 (A)	25		No
	31		

Is the inspection result normal?

YES >> GO TO 3

NO >> Repair or replace harness.

3. CHECK SEAT OPERATION

- 1. Connect driver seat control unit and lifting motor (front).
- 2. Check seat operation [except lifting (front) operation] with memory function.

Is the operation normal?

YES >> Replace lifting motor (front). Refer to <u>SE-25, "Exploded View"</u>.

NO >> Replace driver seat control unit. Refer to <u>SE-25</u>, "Exploded View".

4. CHECK INTERMITTENT INCIDENT

Refer to GI-49, "Intermittent Incident".

Is the inspection result normal?

YES >> Replace driver seat control unit. Refer to <u>SE-25, "Exploded View"</u>.

NO >> Repair or replace the malfunctioning part.

LIFTING SENSOR (REAR)

< COMPONENT DIAGNOSIS >

LIFTING SENSOR (REAR)

Description

- The lifting sensor (rear) is installed to the seat frame assembly.
- The pulse signal is input to the driver seat control unit when the lifting (rear) is operated.
- The driver seat control unit counts the pulse and calculates the lifting (rear) amount of the seat.

Component Function Check

1. CHECK FUNCTION

- 1. Select "LIFT RR PULSE" in "Data monitor" mode with CONSULT-III.
- 2. Check lifting sensor (rear) signal under the following conditions.

Monitor item	Condition		itor item Condition		Value
		Operate (up)	Change (increase)		
LIFT RR PULSE	Seat lifting (rear)	Operate (down)	Change (decrease)		
		Release	No change		

Is the indication normal?

YES >> Inspection End.

NO >> Perform diagnosis procedure. Refer to <u>ADP-73. "Diagnosis Procedure"</u>.

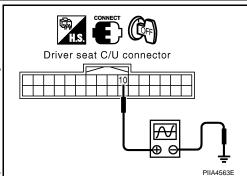
Diagnosis Procedure

1. CHECK LIFTING SENSOR (REAR) SIGNAL

1. Turn ignition switch OFF.

2. Read voltage signal between driver seat control unit harness connector and ground with oscilloscope.

Т	erminals					
(+))					
Driver seat con- trol unit connector	Termi- nal	(-)	Condition		Voltage signal	
B202	10	Ground	Seat lifting (rear)	Oper- ate	(V) 6 4 2 0 ***50ms	
				Other than above	0 or 5	



Is the inspection result normal?

YES >> GO TO 4 NO >> GO TO 2

2. CHECK LIFTING SENSOR (REAR) CIRCUIT

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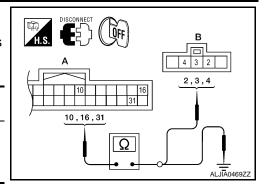
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LIFTING SENSOR (REAR)

< COMPONENT DIAGNOSIS >

- 1. Turn ignition switch OFF.
- Disconnect driver seat control unit and lifting motor (rear).
- 3. Check the continuity between driver seat control unit harness connector and lifting motor (rear) harness connector.

Driver seat control unit connector	Terminal	Lifting motor (rear) connector	Terminal	Continuity
	10		4	
B202 (A)	16	B207 (B)	3	Yes
	31		2	



4. Check the continuity between driver seat control unit harness connector and ground.

Driver seat control unit connector	Terminal	Terminal	
	10	Ground	
B202 (A)	16		No
	31		

Is the inspection result normal?

YES >> GO TO 3

NO >> Repair or replace harness.

3. CHECK SEAT OPERATION

- 1. Connect driver seat control unit and lifting motor (rear) connector.
- 2. Check the seat operation [except lifting (rear) operation] with memory function.

Is the operation normal?

YES >> Replace lifting motor (rear). Refer to <u>SE-25, "Exploded View"</u>.

NO >> Replace driver seat control unit. Refer to <u>SE-25</u>, "Exploded View".

4. CHECK INTERMITTENT INCIDENT

Refer to GI-49, "Intermittent Incident".

Is the inspection result normal?

YES >> Replace driver seat control unit. Refer to <u>SE-25, "Exploded View"</u>.

PEDAL ADJUSTING SENSOR

< COMPONENT DIAGNOSIS >

PEDAL ADJUSTING SENSOR

Description INFOID:000000003935561

- The pedal adjusting sensor is installed to the pedal adjusting motor assembly.
- The resistance of pedal adjusting sensor is changed according to the forward/backward position of pedal assembly.
- The terminal voltage of automatic drive positioner control unit will be changed according to a change of pedal adjusting sensor resistance. Automatic drive positioner control unit calculates the pedal assembly position from the voltage.

Component Function Check

1. CHECK FUNCTION

- 1. Select "PEDAL SEN" in "Data monitor" mode with CONSULT-III.
- 2. Check the pedal sensor signal under the following condition.

Monitor item	Con	Value	
PEDAL SEN	Pedal position	Forward	0.5V
	r euai position	Backward	4.5V

Is the indication normal?

YES >> Inspection End.

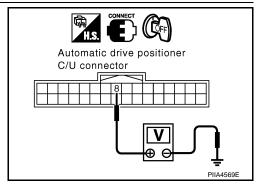
NO >> Perform diagnosis procedure. Refer to <u>ADP-75, "Diagnosis Procedure"</u>.

Diagnosis Procedure

1. CHECK PEDAL ADJUSTING SENSOR SIGNAL

- Turn ignition switch ON.
- 2. Check voltage between automatic drive positioner control unit harness connector and ground.

Terminal						
(+)	(+)					
Automatic drive position- er control unit	Terminal	(-)	Cor	dition	Voltage (V) (Approx.)	
1400	•	01	Pedal as-	Forward	0.5	
M33	8	Ground	sembly position	Backward	4.5	



Is the inspection result normal?

YES >> GO TO 4 NO >> GO TO 2

2. CHECK PEDAL ADJUSTING SENSOR CIRCUIT

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PEDAL ADJUSTING SENSOR

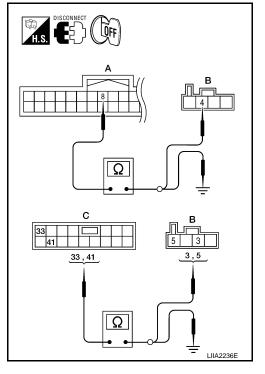
< COMPONENT DIAGNOSIS >

- 1. Turn ignition switch OFF.
- 2. Disconect automatic drive positioner control unit and pedal adjusting motor assembly.
- 3. Check continuity between automatic drive positioner control unit harnnes connector and pedal adjusting motor assembly harness connector.

Automatic drive positioner control unit connector	Terminal	Pedal adjusting motor assembly connector	Terminal	Continuity
M33 (A)	8		4	
M24 (C)	33	E110 (B)	5	Yes
M34 (C)	41		3	

4. Check continuity between automatic drive positioner control unit harness connector and ground.

Automatic drive positioner control unit connector	Terminal		Continuity
M33 (A)	8	Ground	
M34 (C)	33		No
IVI34 (C)	41		



Is the inspection result normal?

YES >> GO TO 3

NO >> Repair or replace harness.

3. CHECK DOOR MIRROR OPERATION

- 1. Connect automatic drive positioner control unit and pedal adjusting motor assembly.
- 2. Turn ignition switch ON.
- 3. Check door mirror operation with memory function.

Is the operation normal?

YES >> Replace pedal adjusting motor assembly. Refer to <u>BR-23</u>. "Removal and Installation".

NO >> Replace automatic drive positioner control unit. Refer to ADP-159, "Removal and Installation".

4. CHECK INTERMITTENT INCIDENT

Refer to GI-49, "Intermittent Incident".

Is the inspection result normal?

YES >> Replace automatic drive positioner control unit. Refer to ADP-159, "Removal and Installation".

< COMPONENT DIAGNOSIS >

MIRROR SENSOR **DRIVER SIDE**

DRIVER SIDE: Description

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- The mirror sensor LH is installed to the door mirror LH. The resistance of 2 sensors (horizontal and vertical) is changed when the door mirror LH is operated.
- · Automatic drive positioner control unit calculates the door mirror position according to the change of the voltage of 2 sensor input terminals.

DRIVER SIDE: Component Function Check

INFOID:0000000003935565

1. CHECK FUNCTION

- Select "MIR/SEN LH U-D", "MIR/SEN LH R-L" in "Data monitor" with CONSULT-III.
- 2. Check mirror sensor (driver side) signal under the following condition.

Monitor item	Cor	Value	
MID/SENTILLED		Close to peak	3.4V
MIR/SEN LH U-D	Dana mimaa III	Close to valley	0.6V
MIR/SEN LH R-L	Door mirror LH	Close to right edge	3.4V
		Close to left edge	0.6V

Is the indication normal?

YES >> Inspection End.

NO >> Perform diagnosis procedure. Refer to ADP-77, "DRIVER SIDE: Diagnosis Procedure".

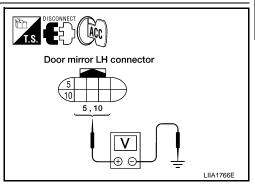
DRIVER SIDE: Diagnosis Procedure

INFOID:0000000003935566

${f 1}$. CHECK DOOR MIRROR LH SENSOR SIGNAL

- Turn ignition switch to ACC.
- 2. Check voltage between door mirror LH harness connector and ground.

T	Terminals													
(+)					Voltage (V)									
Door mirror LH connector	Terminal	(–)	GS/IGING!		(Approx.)									
	10	Ground	Crownd		Close to peak	3.4								
D18	10			Cround	Cround	Cround	Cround	Cround	Cround	Cround	Craunal		Door I mirror	Close to valley
DIO			LH	Close to right edge	3.4									
	5	5		Close to left edge	0.6									



Is the inspection result normal?

YES >> GO TO 5 NO >> GO TO 2

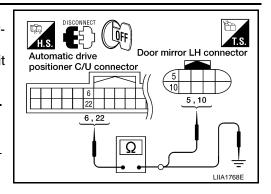
2. CHECK DOOR MIRROR LH SENSOR CIRCUIT 1

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< COMPONENT DIAGNOSIS >

- 1. Turn ignition switch OFF.
- Disconnect automatic drive positioner control unit and door mirror LH.
- 3. Check continuity between automatic drive positioner control unit harness connector and door mirror LH harness connector.

Automatic drive positioner control unit connector	Terminal	Door mirror LH connector	Terminal	Continuity
M33	6	D18	10	Yes
WIOO	22	510	5	163



4. Check continuity between automatic drive positioner control unit harness connector and ground.

Automatic drive positioner control unit connector	Terminal	01	Continuity	
M33	6	Ground	No	
IVIOO	22		INO	

Is the inspection result normal?

YES >> GO TO 3

NO >> Repair or replace harness.

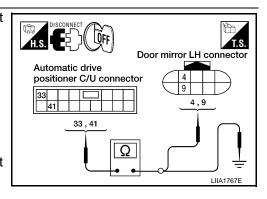
${f 3.}$ CHECK DOOR MIRROR LH SENSOR CIRCUIT 2

1. Check continuity between automatic drive positioner control unit harness connector and door mirror LH harness connector.

Automatic drive positioner control unit connector	Terminal	Door mirror LH connector	Terminal	Continuity
M34	33	D18	4	Yes
10134	41	016	9	165

Check continuity between automatic drive positioner control unit harness connector and ground.

Automatic drive positioner control unit connector	Terminal		Continuity
M34	33	Ground	No
IVI34	41		INO



Is the inspection result normal?

YES >> GO TO 4

NO >> Repair or replace harness.

4. CHECK PEDAL ADJUSTING OPERATION

- 1. Connect driver seat control unit connector and door mirror LH connector.
- 2. Turn ignition switch ON.
- Check pedal adjusting operation with memory function.

Is the operation normal?

YES >> Replace door mirror actuator LH. Refer to MIR-15, "Door Mirror Assembly".

NO >> Replace automatic drive positioner control unit. Refer to ADP-159, "Removal and Installation".

5. CHECK INTERMITTENT INCIDENT

Refer to GI-49, "Intermittent Incident".

Is the inspection result normal?

YES >> Replace automatic drive positioner control unit. Refer to ADP-159, "Removal and Installation".

< COMPONENT DIAGNOSIS >

PASSENGER SIDE

PASSENGER SIDE: Description

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- The mirror sensor RH is installed to the door mirror RH.
- The resistance of 2 sensors (horizontal and vertical) is changed when the door mirror RH is operated.
- Automatic drive positioner control unit calculates the door mirror position according to the change of the voltage of 2 sensor input terminals.

PASSENGER SIDE: Component Function Check

INFOID:0000000003935568

1. CHECK FUNCTION

- 1. Select "MIR/SEN RH U-D", "MIR/SEN RH R-L" in "Data monitor" with CONSULT-III.
- 2. Check the mirror sensor RH signal under the following conditions.

Monitor item	Con	Value	
MIR/SEN RH U-D		Close to peak	3.4V
	Da an animan DU	Close to valley	0.6V
MIR/SEN RH R-L	Door mirror RH	Close to right edge	3.4V
		Close to left edge	0.6V

Is the indication normal?

YES >> Inspection End.

NO >> Perform diagnosis procedure. Refer to <u>ADP-79</u>, "PASSENGER SIDE : <u>Diagnosis Procedure"</u>.

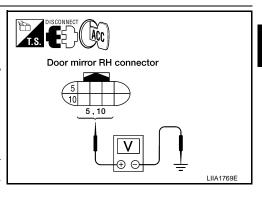
PASSENGER SIDE: Diagnosis Procedure

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1. CHECK DOOR MIRROR RH SENSOR SIGNAL

- 1. Turn ignition switch to ACC.
- Check voltage between door mirror RH harness connector and ground.

	Terminals				
(+)	(+)		.		Voltage (V)
Door mirror RH con- nector	Terminal	(–)	Condition		(Approx.)
	10			Close to peak	3.4
D118	10	Ground	Door mirror	Close to valley	0.6
DIIO	5	Giodila	RH	Close to right edge	3.4
	5			Close to left edge	0.6



Is the inspection result normal?

YES >> GO TO 5 NO >> GO TO 2

2. CHECK DOOR MIRROR RH SENSOR HARNESS CONTINUITY

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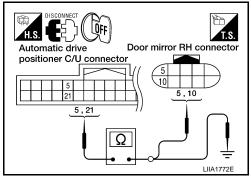
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< COMPONENT DIAGNOSIS >

- 1. Turn ignition switch OFF.
- Disconnect automatic drive positioner control unit and door mirror RH.
- 3. Check continuity between automatic drive positioner control unit harness connector and door mirror RH harness connector.

Automatic drive posi- tioner control unit connector	Terminal	Door mirror RH connector	Terminal	Continuity
M33	5	D118	10	Yes
WIJJ	21	DIIIO	5	103



4. Check continuity between automatic drive positioner control unit harness connector and ground.

Automatic drive positioner control unit connector	Terminal		Continuity
M33	5	Ground	No
IVIOS	21		INO

Is the inspection result normal?

YES >> GO TO 3

NO >> Repair or replace harness.

3. Check door mirror RH sensor power supply circuit

1. Check continuity between automatic drive positioner control unit harness connector and door mirror RH harness connector.

Automatic drive posi- tioner control unit connector	Terminal	Door mirror RH connector	Terminal	Continuity
M34	33	D118	4	Yes
IVIO	41	DIIO	9	165

Check continuity between automatic drive positioner control unit harness connector and ground.

H.S. DISCONNECT OFF	T.S.
Automatic drive positioner C/U connect	Door mirror RH connector
33,41	LIIA1771E

Automatic drive positioner control unit connector	Terminal		Continuity
M34	33	Ground	No
IVI34	41		INO

Is the inspection result normal?

YES >> GO TO 4

NO >> Repair or replace harness.

4. CHECK PEDAL ADJUSTING OPERATION

- 1. Connect driver seat control unit connector and door mirror RH connector.
- 2. Turn ignition switch ON.
- Check pedal adjusting operation with memory function.

Is the operation normal?

YES >> Replace door mirror actuator RH. Refer to MIR-15, "Door Mirror Assembly".

NO >> Replace automatic drive positioner control unit. Refer to ADP-159, "Removal and Installation".

5. CHECK INTERMITTENT INCIDENT

Refer to GI-49, "Intermittent Incident".

Is the inspection result normal?

YES >> Replace automatic drive positioner control unit. Refer to ADP-159, "Removal and Installation".

SLIDING MOTOR

< COMPONENT DIAGNOSIS >

SLIDING MOTOR

Description

- The sliding motor LH is installed to the seat frame assembly.
- The sliding motor LH is installed with the driver seat control unit.
- The seat is slid forward/backward by changing the rotation direction of sliding motor LH.

Component Function Check

1. CHECK FUNCTION

- 1. Select "SEAT SLIDE" in "Active test" mode with CONSULT-III.
- 2. Check the sliding motor LH operation.

Test Item		Desc	ription
	OFF		Stop
SEAT SLIDE	FR	Seat sliding	Forward
	RR		Backward

Is the operation of relevant parts normal?

YES >> Inspection End.

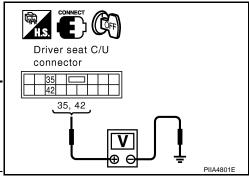
NO >> Perform diagnosis procedure. Refer to <u>ADP-81, "Diagnosis Procedure"</u>.

Diagnosis Procedure

1. CHECK SLIDING MOTOR LH POWER SUPPLY

- 1. Turn the ignition switch to ACC.
- 2. Perform "Active test" ("SEAT SLIDE") with CONSULT-III
- 3. Check voltage between driver seat control unit harness connector and ground.

	Terminal										
(+)			_		Voltage (V)						
Driver seat control unit connector	Terminal	(-)	Test Item		(Approx.)						
	35			OFF	0						
				FR (forward)	Battery voltage						
B203		Ground	SEAT	RR (backward)	0						
D203		Giodila	SLIDE	OFF	0						
	42							42	F	FR (forward)	0
				RR (backward)	Battery voltage						
1 41 1		1.	_								



Is the inspection result normal?

YES >> Replace sliding motor LH. Refer to <u>SE-25, "Exploded View"</u>.

NO >> GO TO 2

$2.\,$ CHECK SLIDING MOTOR LH CIRCUIT

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SLIDING MOTOR

< COMPONENT DIAGNOSIS >

- 1. Turn ignition switch OFF.
- 2. Disconnect driver seat control unit and sliding motor LH.
- 3. Check continuity between driver seat control unit harness connector and sliding motor LH harness connector.

Driver seat control unit connector	Terminal	Sliding motor LH connector	Terminal	Continuity
B203 (A)	35	B204 (B)	5	Yes
B203 (A)	42	B204 (B)	1	res

4. Check continuity between driver seat control unit harness connector and ground.

H.S. (E)
A B 5 1
35, 42 Ω ALJIA0470ZZ

Driver seat control unit connector	Terminal		Continuity
B203 (A)	35	Ground	No
	42		NO

Is the inspection result normal?

YES >> GO TO 3

NO >> Repair or replace harness.

3. CHECK INTERMITTENT INCIDENT

Refer to GI-49, "Intermittent Incident".

Is the inspection result normal?

YES >> Replace driver seat control unit. Refer to <u>SE-25, "Exploded View"</u>.

RECLINING MOTOR

< COMPONENT DIAGNOSIS >

RECLINING MOTOR

Description

- The reclining motor LH is installed to the seat back frame.
- The reclining motor LH is activated with the driver seat control unit.
- The seatback is reclined forward/backward by changing the rotation direction of reclining motor LH.

Component Function Check

1. CHECK FUNCTION

- 1. Select "SEAT RECLINING" in "Active test" mode with CONSULT-III.
- 2. Check the reclining motor LH operation.

Test Item		Description	
	OFF		Stop
SEAT RECLINING	FR	Seat reclining	Forward
	RR		Backward

Is the operation of relevant parts normal?

YES >> Inspection End.

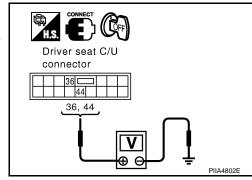
NO >> Perform diagnosis procedure. Refer to <u>ADP-83, "Diagnosis Procedure"</u>.

Diagnosis Procedure

1. CHECK RECLINING MOTOR LH POWER SUPPLY

- 1. Turn the ignition switch to ACC.
- 2. Perform "Active test" ("SEAT RECLINING") with CONSULT-III
- Check voltage between driver seat control unit harness connector and ground.

	Terminal													
(+	-)		Test Item											
Driver seat con- trol unit connector	Terminal	(-)			Voltage (V) (Approx.)									
				OFF	0									
	36	0	Cround	Ground	Ground	Cround	Cround SEAT RE-						FR (forward)	Battery voltage
B203								RR (backward)	0					
B203		Ground	CLINING	OFF	0									
	44				FR (forward)	0								
													RR (backward)	Battery voltage
la tha inan			-10											



Is the inspection result normal?

YES >> Replace reclining motor LH. Refer to <u>SE-25, "Exploded View"</u>.

NO >> GO TO 2

2. CHECK RECLINING MOTOR LH CIRCUIT

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RECLINING MOTOR

< COMPONENT DIAGNOSIS >

- 1. Turn ignition switch OFF.
- 2. Disconnect driver seat control unit and reclining motor LH.
- 3. Check continuity between driver seat control unit harness connector and reclining motor harness connector.

Driver seat control unit connector	Terminal	Reclining motor LH connector	Terminal	Continuity
B203 (A)	36	B232 (B)	2	Yes
D203 (A)	44	D232 (D)	3	163

4. Check continuity between driver seat control unit harness connector and ground.

H.S. DISCONNECT OFF	В
A 36 44 44	2 3
36, 44 \(\overline{\Omega}\)	2,3
	ALJIA0471ZZ

Driver seat control unit connector	Terminal		Continuity
D202 (A)	36	Ground	No
B203 (A)	44		INO

Is the inspection result normal?

YES >> GO TO 3

NO >> Repair or replace harness.

3. CHECK INTERMITTENT INCIDENT

Refer to GI-49, "Intermittent Incident".

Is the inspection result normal?

YES >> Replace driver seat control unit. Refer to <u>SE-25, "Exploded View"</u>.

LIFTING MOTOR (FRONT)

< COMPONENT DIAGNOSIS >

LIFTING MOTOR (FRONT)

Description INFOID:000000003935576

- The lifting motor (front) is installed to the seat frame assembly.
- The lifting motor (front) is activated with the driver seat control unit.
- The lifter (front) is moved upward/downward by changing the rotation direction of lifting motor (front).

Component Function Check

1. CHECK FUNCTION

- 1. Select "SEAT LIFTER FR" in "Active test" mode with CONSULT-III.
- 2. Check the lifting motor (front) operation.

Test Item		Description	
	OFF		Stop
SEAT LIFTER FR	UP	Seat lifting (front)	Upward
	DWN		Downward

Is the operation of relevant parts normal?

YES >> Inspection End.

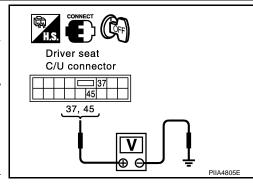
NO >> Perform diagnosis procedure. Refer to <u>ADP-85, "Diagnosis Procedure"</u>.

Diagnosis Procedure

1. CHECK LIFTING MOTOR (FRONT) POWER SUPPLY

- Turn the ignition switch to ACC.
- 2. Perform "Active test" ("SEAT LIFTER FR") with CONSULT-III.
- Check voltage between driver seat control unit harness connector and ground.

	Terminal				_							
(+)					Voltage (V)							
Driver seat control unit connector	Terminal	(-)	Test Item		(Approx.)							
				OFF	0							
	37	Ground									UP	0
B203	ĺ		SEAT LIFTER	DWN (down)	Battery voltage							
D203	D203	Giodila	FR	OFF	0							
	45						UP	Battery voltage				
				DWN (down)	0							
la tha inana	. (!	10										



Is the inspection result normal?

YES >> Replace lifting motor (front). Refer to <u>SE-25</u>, "Exploded View".

NO >> GO TO 2

$2.\,$ CHECK LIFTING MOTOR (FRONT) CIRCUIT

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LIFTING MOTOR (FRONT)

< COMPONENT DIAGNOSIS >

- 1. Turn ignition switch OFF.
- 2. Disconnect driver seat control unit and lifting motor (front).
- Check continuity between driver seat control unit harness connector and lifting motor (front) harness connector.

Driver seat control unit connector	Terminal	Lifting motor (front) connector	Terminal	Continuity
B203 (A)	37	B206 (B)	1	Yes
B203 (A)	45	B200 (B)	5	163

4. Check continuity between driver seat control unit harness connector and ground.

H.S. DISCONNECT OFF	
A 37 45 37, 45	B 5 1
Ω •	ALJIA0472ZZ

Driver seat control unit connector	Terminal		Continuity
B203 (A)	37	Ground	No
	45		INO

Is the inspection result normal?

YES >> GO TO 3

NO >> Repair or replace harness.

3. CHECK INTERMITTENT INCIDENT

Refer to GI-49, "Intermittent Incident".

Is the inspection result normal?

YES >> Replace driver seat control unit. Refer to <u>SE-25, "Exploded View"</u>.

LIFTING MOTOR (REAR)

< COMPONENT DIAGNOSIS >

LIFTING MOTOR (REAR)

Description INFOID:000000003935579

- The lifting motor (rear) is installed to the seat frame assembly.
- The lifting motor (rear) is activated with the driver seat control unit.
- The seat lifter (rear) is moved upward/downward by changing the rotation direction of lifting motor (rear).

Component Function Check

1. CHECK FUNCTION

- 1. Select "SEAT LIFTER RR" in "Active test" mode with CONSULT-III.
- 2. Check the lifting motor (rear) operation.

Test Item		Description	
	OFF		Stop
SEAT LIFTER RR	UP	Seat lifting (rear)	Upward
	DWN		Downward

Is the operation of relevant parts normal?

YES >> Inspection End.

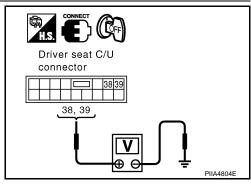
NO >> Perform diagnosis procedure. Refer to <u>ADP-87</u>, "<u>Diagnosis Procedure</u>".

Diagnosis Procedure

1. CHECK LIFTING MOTOR (REAR) POWER SUPPLY

- Turn the ignition switch OFF.
- 2. Perform "Active test" ("SEAT LIFTER RR") with CONSULT-III
- Check voltage between driver seat control unit harness connector and ground.

Terminal						
(+)					Voltage (V)	
Driver seat control unit connector	Terminal	(-)	Test Item		(Approx.)	
				OFF	0	
	38	Ground	SEAT LIFTER RR	UP	Battery voltage	
B203				DWN (down)	0	
D203				OFF	0	
	39			UP	0	
				DWN (down)	Battery voltage	
La dia a la ancia	e 14					



Is the inspection result normal?

YES >> Replace lifting motor (rear). Refer to <u>SE-25, "Exploded View"</u>.

NO >> GO TO 2

2. CHECK LIFTING MOTOR (REAR) CIRCUIT

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LIFTING MOTOR (REAR)

< COMPONENT DIAGNOSIS >

- 1. Disconnect driver seat control unit and lifting motor (rear).
- 2. Check continuity between driver seat control unit harness connector and lifting motor (rear) harness connector.

Driver seat control unit connector	Terminal	Lifting motor (rear) connector	Terminal	Continuity
B203 (A)	38	B207 (B)	5	Yes
	39	D207 (D)	1	163

Check continuity between driver seat control unit harness connector and ground.

H.S. DISCONNECT OFF
A B 5 1 1 38,39 5 1,5
Ω ALJIA0473ZZ

Driver seat control unit connector	Terminal		Continuity
B203 (A)	38	Ground	No
B203 (A)	39		NO

Is the inspection result normal?

YES >> GO TO 3

NO >> Repair or replace harness.

3. CHECK INTERMITTENT INCIDENT

Refer to GI-49, "Intermittent Incident".

Is the inspection result normal?

YES >> Replace driver seat control unit. Refer to <u>SE-25, "Exploded View"</u>.

PEDAL ADJUSTING MOTOR

< COMPONENT DIAGNOSIS >

PEDAL ADJUSTING MOTOR

Description

- The pedal adjusting motor is installed to the pedal adjusting motor assembly.
- The pedal adjusting motor is activated with the automatic drive positioner control unit.
- The pedal assembly is adjusted forward/backward by changing the rotation direction of pedal adjusting motor.

Component Function Check

1. CHECK FUNCTION

- 1. Select "ADJ PEDAL MOTOR" in "Active test" mode with CONSULT-III.
- 2. Check the pedal adjusting motor operation.

Test ite	em	Descripti	ion
	OFF		Stop
ADJ PEDAL MOTOR	FR	Pedal adjusting motor	Forward
	RR		Backward

Is the operation of relevant parts normal?

YES >> Inspection End.

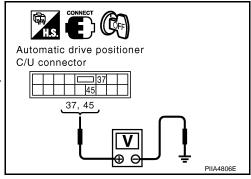
NO >> Perform diagnosis procedure. Refer to ADP-89, "Diagnosis Procedure".

Diagnosis Procedure

1. Check pedal adjusting motor power supply

- Turn the ignition switch OFF.
- 2. Perform "Active test" ("ADJ PEDAL MOTOR") with CONSULT-III.
- 3. Check voltage between automatic drive positioner control unit harness connector and ground.

	Terminal					
(+)						
Automatic drive posi- tioner con- trol unit connector	Terminal	(-)	Test Item		Voltage (V) (Approx.)	
			ADJ PED- AL MOTOR	OFF	0	
	37			RR (backward)	0	
M34		Ground		FR (forward)	Battery voltage	
10134				OFF	0	
	45			RR (backward)	Battery voltage	
				FR (forward)	0	



Is the inspection result normal?

YES >> Replace pedal adjusting motor assembly. Refer to BR-23, "Removal and Installation".

NO >> GO TO 2

2. CHECK PEDAL ADJUSTING MOTOR CIRCUIT

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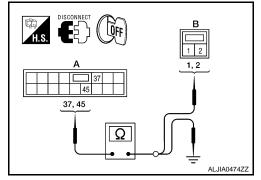
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PEDAL ADJUSTING MOTOR

< COMPONENT DIAGNOSIS >

- Disconnect automatic drive positioner control unit and pedal adjusting motor assembly.
- Check continuity between automatic drive positioner control unit harness connector and pedal adjusting motor harness connector

Automatic drive positioner control unit connector	Terminal	Pedal adjusting motor assembly connector	Terminal	Continuity
M34 (A)	37	E109 (B)	2	Yes
	45	L 109 (B)	1	163



3. Check continuity between automatic drive positioner control unit harness connector and ground.

Automatic drive positioner control unit connector	· lerminai		Continuity	
M34 (A)	37	Ground	No	
1VI34 (A)	45		INO	

Is the inspection result normal?

YES >> GO TO 3

NO >> Repair or replace harness.

3. CHECK INTERMITTENT INCIDENT

Refer to GI-49, "Intermittent Incident".

Is the inspection result normal?

YES >> Replace automatic drive positioner control unit. Refer to ADP-159, "Removal and Installation".

DOOR MIRROR MOTOR

< COMPONENT DIAGNOSIS >

DOOR MIRROR MOTOR

Description INFOID:0000000003935585

It makes mirror face operate from side to side and up and down with the electric power that automatic drive positioner control unit supplies.

Component Function Check

1. CHECK DOOR MIRROR MOTOR FUNCTION

Check the operation with "MIRROR MOTOR RH" and "MIRROR MOTOR LH" in "ACTIVE TEST" mode with CONSULT-III

Refer to ADP-25, "CONSULT-III Function".

Is the inspection result normal?

YES >> Door mirror motor function is OK.

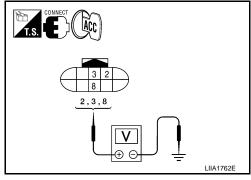
>> Refer to ADP-91, "Diagnosis Procedure". NO

Diagnosis Procedure

1. CHECK DOOR MIRROR MOTOR INPUT SIGNAL

- Turn ignition switch ON.
- Check voltage between door mirror connector and ground.

Terminals					
(+)			Door mirror re- mote control	Voltage (V)	
Door mirror connector	Terminal	(–)	switch condition	(Approx.)	
	3		UP	Battery voltage	
	3	Ground	Other than above	0	
D18 (LH)	2		LEFT	Battery voltage	
D118 (RH)	2		Other than above	0	
	8		DOWN / RIGHT	Battery voltage	
	0		Other than above	0	



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Is the inspection result normal?

YES >> Refer to ADP-93, "Component Inspection".

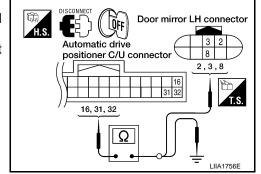
NO >> GO TO 2

$2.\,$ CHECK HARNESS CONTINUITY

- Turn ignition switch OFF.
- Disconnect automatic drive positioner control unit connector and door mirror.
- 3. Check continuity between automatic drive positioner control unit connector and door mirror connector.

Door mirror LH

Automatic drive positioner control unit connector	Terminal	Door mirror LH connector	Terminal	Continuity
	16		8	
M33	31	D18	3	Yes
	32		2	



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DOOR MIRROR MOTOR

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Yes

< COMPONENT DIAGNOSIS >

Door mirror RH				
Automatic drive posi- tioner control unit con- nector	Terminal	Door mirror RH connector	Terminal	Continuity
	14		3	

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4. Check continuity between automatic drive positioner control unit connector and ground.

D118

Door mirror LH

M33

Automatic drive position- er control unit connector	Terminal		Continuity	
	16	Ground	No	
M33	31			
	32			
Door mirror RH				
Automatic drive position- er control unit connector	Terminal		Continuity	
	14	Ground		
M33	15		No	
	30			

Is the inspection result normal?

YES >> GO TO 3

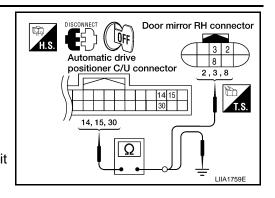
NO >> Repair or replace harness.

3. Check automatic drive positioner control unit output signal

- 1. Connect automatic drive positioner control unit.
- 2. Turn ignition switch ON.
- 3. Check voltage between automatic drive positioner control unit connector and ground.

Door mirror LH

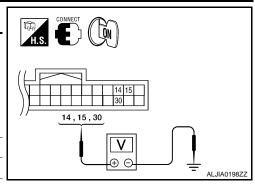
Terminals					
(+)			Mirror switch	Voltage (V)	
Automatic drive positioner control unit connector	Terminal	(-)	condition	(Approx.)	
	16		DOWN / RIGHT	Battery voltage	
		Ground	Other than above	0	
M33			UP	Battery voltage	
IVIOO	31	Giodila	Other than above	0	
	32		LEFT	Battery voltage	
			Other than above	0	
	_		_	•	



DOOR MIRROR MOTOR

< COMPONENT DIAGNOSIS >

Door mirror RH					
	Terminals				
(+)					
Automatic drive positioner con- trol unit connec- tor	Terminal	(-)	Mirror switch con- dition	Voltage (V) (Approx.)	
	14		UP	Battery voltage	
	14	Ground	Other than above	0	
M33	15		LEFT	Battery voltage	
IVI33	15		Other than above	0	
	00		DOWN / RIGHT	Battery voltage	
	30		Other than above	0	
s the inspection result normal?					



Is the inspection result normal?

YES >> GO TO 4

NO >> Replace automatic drive positioner control unit. Refer to ADP-159, "Removal and Installation".

4. CHECK DOOR MIRROR MOTOR

Check door mirror motor.

Refer to ADP-93, "Component Inspection".

Is the inspection result normal?

YES >> Refer to GI-49, "Intermittent Incident".

NO >> Replace door mirror actuator. Refer to MIR-15, "Door Mirror Assembly".

Component Inspection

1. CHECK DOOR MIRROR MOTOR-I

Check that door mirror motor does not trap foreign objects and does not have any damage. Refer to MIR-15, "Door Mirror Assembly".

Is the inspection result normal?

YES >> GO TO 2

NO >> Replace door mirror actuator. Refer to MIR-15, "Door Mirror Assembly".

2. CHECK DOOR MIRROR MOTOR-II

- Turn ignition switch OFF.
- 2. Disconnect door mirror.
- 3. Apply 12V to each power supply terminal of door mirror motor.

Door mirror connector	Terminal		Operational direction	
Door militor confidencial	(+)	(-)	Operational direction	
D18 (LH) D118 (RH)	8	2	RIGHT	
	2	8	LEFT	
	3	8	UP	
	8	3	DOWN	

Is the inspection result normal?

YES >> Inspection End.

NO >> Replace door mirror actuator. Refer to MIR-15, "Door Mirror Assembly".

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SEAT MEMORY INDICATOR LAMP

< COMPONENT DIAGNOSIS >

SEAT MEMORY INDICATOR LAMP

Description

 Memory switch is equipped on the seat memory switch installed to the driver side door trim. The operation signal is inputted to the automatic drive positioner control unit when the memory switch is operated.

• The status of automatic drive positioner system can be checked according to the illuminating/flashing status.

Component Function Check

INFOID:0000000003935590

1. CHECK FUNCTION

- Select "MEMORY SW INDCTR" in "Active test" mode with CONSULT-III.
- 2. Check the memory indicator operation.

Test item		Description	
	OFF		OFF
MEMORY SW INDCTR	ON-1	Memory switch indicator	Indicator 1: ON
	ON-2		Indicator 2: ON

Is the operation of relevant parts normal?

YES >> INSPECTION END

NO >> Perform diagnosis procedure. Refer to <u>ADP-94, "Diagnosis Procedure"</u>.

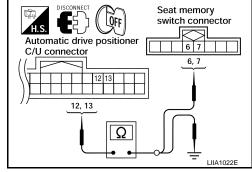
Diagnosis Procedure

INFOID:0000000003935591

1. CHECK SEAT MEMORY INDICATOR CIRCUIT

- Turn ignition switch OFF.
- 2. Disconnect automatic drive positioner control unit and seat memory switch.
- 3. Check continuity between automatic drive positioner control unit harness connector and seat memory switch harness connector.

Automatic drive positioner control unit connector	Terminal	Seat memory switch connector	Terminal	Continuity
M33	12	D5	6	Yes
IVISS	13	D3	7	163



4. Check continuity between automatic drive positioner control unit harness connector and ground.

Automatic drive position- er connector	Terminal		Continuity	
M33	12	Ground	No	
WISS	13			

Is the inspection result normal?

YES >> GO TO 2

NO >> Repair or replace harness.

$2.\,$ CHECK MEMORY INDICATOR POWER SUPPLY

SEAT MEMORY INDICATOR LAMP

< COMPONENT DIAGNOSIS >

Check voltage between seat memory switch harness connector and ground.

Seat memory switch	Termin	Voltage (V) (Approx.)	
connector	(+) (-)		
D5	5	Ground	Battery voltage

Seat memory switch connector

Is the inspection result normal?

YES >> GO TO 3

NO >> Check the following.

- Fuse
- Harness for open or short between memory indicator and fuse.

3. CHECK MEMORY INDICATOR

Refer to ADP-95, "Component Inspection".

Is the inspection result normal?

YES >> GO TO 4

NO >> Replace seat memory switch. Refer to INT-14, "Removal and Installation".

4. CHECK INTERMITTENT INCIDENT

Refer to GI-49, "Intermittent Incident".

Is the inspection result normal?

YES >> Replace automatic drive positioner control unit. Refer to ADP-159, "Removal and Installation".

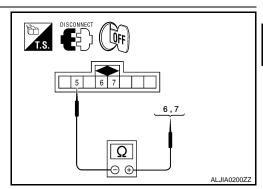
NO >> Repair or replace the malfunctioning part.

Component Inspection

1. CHECK SEAT MEMORY INDICATOR

- 1. Disconnect seat memory switch.
- 2. Check continuity between seat memory switch terminals.

Terr		
Seat men	Continuity	
(+)	(-)	
6	5	Yes
7	3	163



Is the inspection result normal?

YES >> INSPECTION END

NO >> Replace seat memory switch. Refer to INT-14, "Removal and Installation".

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ECU DIAGNOSIS

DRIVER SEAT CONTROL UNIT

Reference Value

VALUES ON THE DIAGNOSIS TOOL

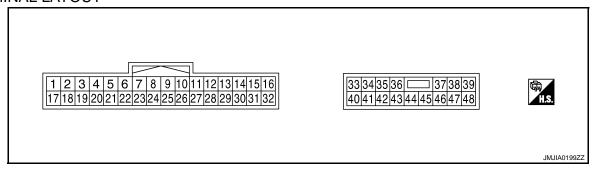
CONSULT-III MONITOR ITEM

Monitor Item	Cond	dition	Value/Status
CET CW	Cot quitab	Push	ON
SET SW	Set switch	Release	OFF
145140DV 0VV		Push	ON
MEMORY SW1	Memory switch 1	Release	OFF
MEMORY OWO		Push	ON
MEMORY SW2	Memory switch 2	Release	OFF
	Sliding switch (front)	Operate	ON
SLIDE SW-FR		Release	OFF
01105 014 00	0	Operate	ON
SLIDE SW-RR	Sliding switch (rear)	Release	OFF
		Operate	ON
RECLN SW-FR	Reclining switch (front)	Release	OFF
		Operate	ON
RECLN SW-RR	Reclining switch (rear)	Release	OFF
		Operate	ON
LIFT FR SW-UP	Lifting switch front (up)	Release	OFF
	Lifting switch front (down)	Operate	ON
LIFT FR SW-DN		Release	OFF
LIFT RR SW-UP	Lifting switch rear (up)	Operate	ON
		Release	OFF
		Operate	ON
LIFT RR SW-DN	Lifting switch rear (down)	Release	OFF
		Up	ON
MIR CON SW-UP	Mirror switch	Other than above	OFF
		Down	ON
MIR CON SW-DN	Mirror switch	Other than above	OFF
		Right	ON
MIR CON SW-RH	Mirror switch	Other than above	OFF
		Left	ON
MIR CON SW-LH	Mirror switch	Other than above	OFF
MD 01112 011 -	Q1	Right	ON
MIR CHNG SW-R	Changeover switch	Other than above	OFF
MID OUNO OW	01	Left	ON
MIR CHNG SW-L	Changeover switch	Other than above	OFF
DED 41 014 ==	B. I. I. I. I. I.	Forward	ON
PEDAL SW-FR	Pedal adjusting switch	Other than above	OFF
DEDAL OW SS	B. D. B.	Backward	ON
PEDAL SW-RR	Pedal adjusting switch	Other than above	OFF

< ECU DIAGNOSIS >

Monitor Item	Condit	ion	Value/Status
DETENT SW	AT selector lever	P position	OFF
DETERM OW	At selector level	Other than above	ON
STARTER SW	Ignition position	Cranking	ON
STARTER SW	ignition position	Other than above	OFF
		Forward	The numeral value decreases
SLIDE PULSE	Seat sliding	Backward	The numeral value increases
		Other than above	No change to numeral value
		Forward	The numeral value decreases
RECLN PULSE	Seat reclining	Backward	The numeral value increases
		Other than above	No change to numeral value
LIFT FR PULSE	Seat lifter (front)	Up	The numeral value decreases
		Down	The numeral value increases
		Other than above	No change to numeral value
LIFT RR PULSE	Seat lifter (rear)	Up	The numeral value decreases
		Down	The numeral value increases
		Other than above	No change to numeral value
MID/CEN DILLI D	Door mirror (noncon ror cido)	Close to peak	3.4
MIR/SEN RH U-D	Door mirror (passenger side)	Close to valley	0.6
MID/OFN DIL D	Di(id-)	Close to left edge	3.4
MIR/SEN RH R-L	Door mirror (passenger side)	Close to right edge	0.6
MID/CENTILL D	Door mirror (driver side)	Close to peak	3.4
MIR/SEN LH U-D	Door mirror (driver side)	Close to valley	0.6
MID/OFN LL D	Door mirror (dairea aida)	Close to left edge	0.6
MIR/SEN LH R-L	Door mirror (driver side)	Close to right edge	3.4
DEDAL CEN	De del mesition	Forward	0.5
PEDAL SEN	Pedal position	Backward	4.5

TERMINAL LAYOUT



PHYSICAL VALUES

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Torm	ninal No.		Description				
	miai INU.	Wire	-	Input/	Condition	1	Voltage (V)
+	-	color	Signal name	Output			(Approx)
1	Ground	R	UART LINE (RX)	Input	Ignition switch ON		(V) 6 4 2 0 1 ms
3	_	L	CAN-H				_
6	Ground	BR/W	Ignition switch (START)	Input	Ignition switch	OFF START	0 Battery voltage
9	Ground	L	Reclining sensor sig- nal	Input	Seat reclining	Operate	(V) 6 4 2 0 **50ms
						Stop	0 or 5
10	Ground	L/Y	Lifting sensor (rear) signal	Input	Seat lifting (rear)	Operate	(V) 6 4 2 0 •••50ms
						Stop	0 or 5
11	Ground	R/B	Sliding switch back- ward signal	Input	Sliding switch	Operate (back- ward)	0
						Release	Battery voltage
12	Ground	O/B	Reclining switch back- ward signal	Input	Reclining switch	Operate (back- ward)	0
						Release	Battery voltage
13	Ground	L/B	Lifting switch (front) down signal	Input	Lifting switch (front)	Operate (down)	0
					. ,	Release	Battery voltage
14	Ground	G/W	Lifting switch (rear) down signal	Input	Lifting switch (rear)	Operate (down)	0
						Release	Battery voltage
15	Ground	L	Pedal switch backward signal	Input	Pedal switch	Operate (back- ward)	0
						Release	Battery voltage
16	Ground	L	Sensor power supply	Output	_		5

< ECU DIAGNOSIS >

Term	ninal No.		Description				
+	-	Wire color	Signal name	Input/ Output	Condition	า	Voltage (V) (Approx)
17	Ground	R/W	UART LINE (TX)	Output	Ignition switch ON		(V) 6 4 2 0 2 ms
19	_	Р	CAN-L	_	_		_
21	Ground	L	A/T device (park position switch)	Input	A/T selector lever	P position Except P	0 Battery voltage
			,			position	Dattery voltage
24	Ground	Y/G	Sliding sensor signal	Input	Seat sliding	Operate	(V) 6 4 2 0 50 ms
						Stop	0 or 5
25	Ground	R/L	Lifting sensor (front) signal	Input	Seat lifting (front)	Operate	(V) 6 4 2 0 **50ms
						Stop	0 or 5
26	Ground	P/B	Sliding switch forward signal	Input	Sliding switch	Operate (forward)	0
			Signal			Release	Battery voltage
27	Ground	G/B	Reclining switch for- ward signal	Input	Reclining switch	Operate (forward)	0
			o.ga.			Release	Battery voltage
28	Ground	Y/B	Lifting switch (front) up signal	Input	Seat lifting switch (front)	Operate (up)	0
			3		(,	Release	Battery voltage
29	Ground	R/W	Lifting switch (rear) up signal	Input	Seat lifting switch (rear)	Operate (up)	0
			3			Release	Battery voltage
30	Ground	L/W	Pedal switch forward signal	Input	Pedal switch	Operate (forward)	0
			_			Release	Battery voltage
31	Ground	Υ	Sensor ground	_	_		0
32	Ground	В	Ground (signal)	_	_		0
33	Ground	W/L	Battery power source (C/B)	Input	_		Battery voltage

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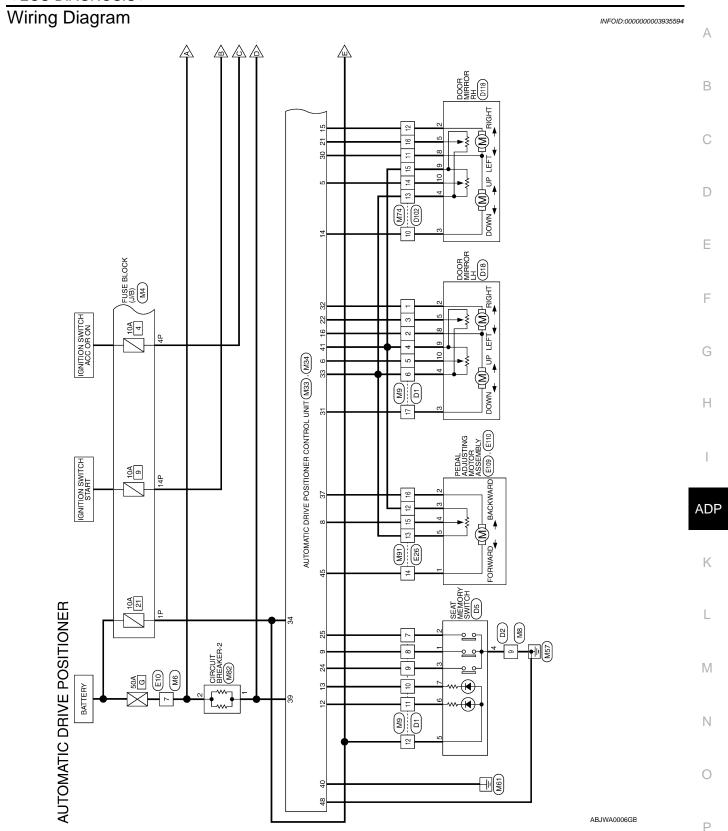
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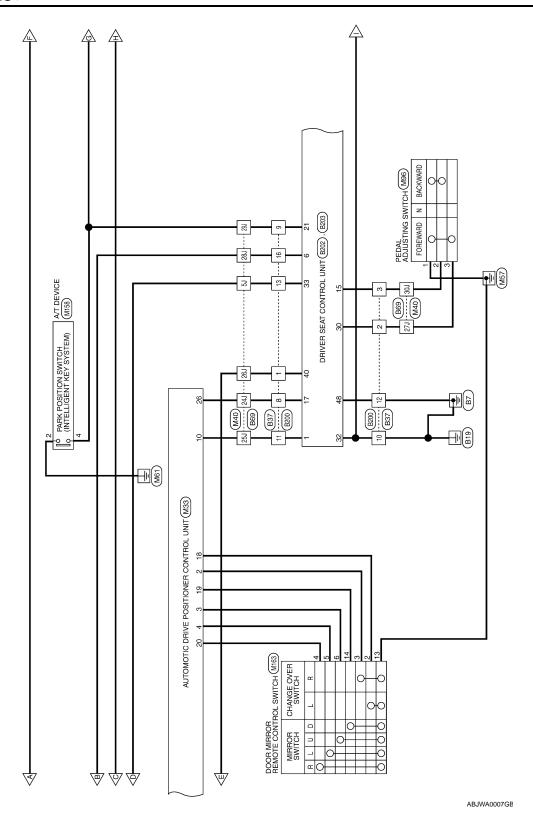
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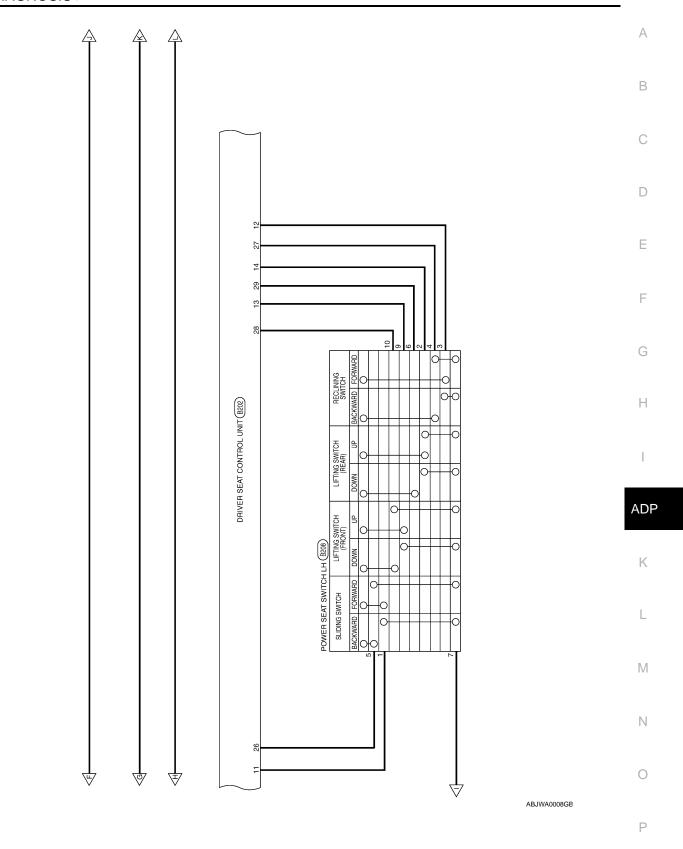
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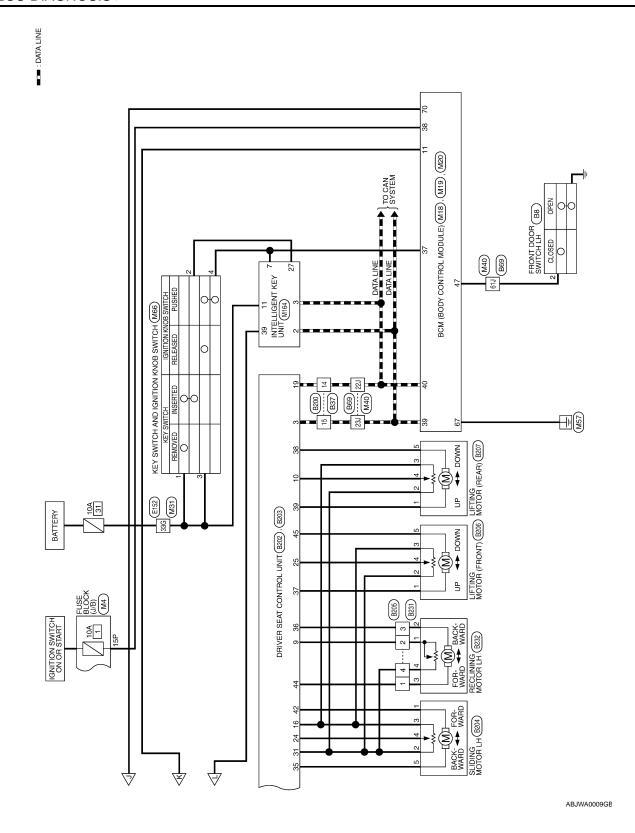
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	I NI .		D				
lerm	ninal No.	Wire	Description				Voltage (V)
+	-	color	Signal name	Input/ Output	Condition	1	(Approx)
35	Ground	R	Sliding motor forward output signal	Output	Seat sliding	Operate (forward)	Battery voltage
			output signal			Release	0
36	Ground	R/W	Reclining motor for- ward output signal	Output	Seat reclining	Operate (forward)	Battery voltage
			wara output signal			Release	0
37	Ground	В	Lifting motor (front) down output signal	Output	Seat lifting (front)	Operate (down)	Battery voltage
			down output signal			Stop	0
38	Ground	L	Lifting motor (rear) up	Output	Seat lifting (rear)	Operate (up)	Battery voltage
			output signal			Stop	0
39	Ground	L/W	Lifting motor (rear) down output signal	Output	Seat lifting (rear)	Operate (down)	Battery voltage
			down output signal			Stop	0
40	Ground	Y/R	Power source (Fuse)	Input	_		Battery voltage
42	Ground	G	Sliding motor back- ward output signal	Output	Seat sliding	Operate (back- ward)	Battery voltage
						Stop	0
44	Ground	G/W	Reclining motor back- ward output signal	Output	Seat reclining	Operate (back- ward)	Battery voltage
						Stop	0
45	Ground	Υ	Lifting motor (front) up output signal	Output	Seat lifting (front)	Operate (up)	Battery voltage
			output signal			Stop	0
48	Ground	В	Ground (power)	_	_		0









AUTOMATIC DRIVE POSITIONER CONNECTORS

	onnector No. M4	Connector No. M6	M6
Connector Nam	Connector Name FUSE BLOCK (J/B)	Connector Name	Connector Name WIRE TO WIRE
Connector Color WHITE	r WHITE	Connector Color WHITE	WHITE
	7P 68 59 4P () 3P 2P 1P	管	2 E 1 L 2 E 1

ÖÖ		<u> </u>		1 2		F											
M9 WIRE TO WIRE	WHITE	- C C C C C C C C C C C C C C C C C C C	19 18 17 16 15	Signal Name	1	_	_	-	1	_	_	_	1	_	_	1	-
<u>e</u>		-	22 21	Color of Wire	В	0	9	\	_	Μ	Ь	ГG	GR	Υ	M	Ж	В
Connector No. Connector Name	Connector Color		H.S.	Terminal No.	-	2	3	4	2	9	7	8	6	10	11	12	17

Signal Name ACC SW KEY SW IGN SW CAN-H CAN-L

Color of Wire G/B

rminal No.

W/R m

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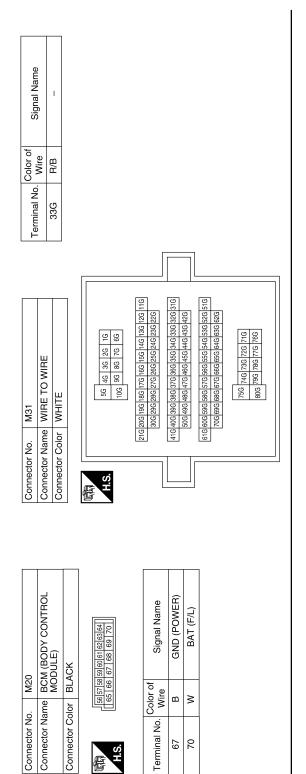
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Signal Name	MIRROR SW (DOWN)	MIRROR SW (RIGHT)	SENSOR HORIZ (RH)	SENSOR HORIZ (LH)	ı	SET SW	ADDRESS 2	RX	ı	I	-	MOTOR COMMON	MOTOR VERT (LH)	MOTOR HORIZ (LH)
Color of Wire	BB	GR	۵	g	1	GR	۵	В	ı	ı	ı	g	Œ	В
Terminal No.	19	20	21	22	23	24	25	56	22	28	59	08	31	32

Signal Name	SENSOR VERT (RH)	SENSOR VERT (LH)	-	PEDAL SENSOR	ADDRESS 1	Ϋ́	_	I QNI	IND 2	MOTOR VERT (RH)	(HR) ZIROH ROTOM	MOTOR COMMON	-	MIRROR SELECT SW (LH)
Color of Wire	Œ	_	1	0	ГG	SB	1	Μ	>	GR	>	0	_	>
Terminal No.	5	9	7	8	6	10	11	12	13	14	15	16	17	18

Connector No.	<u>e</u>	M33 AUTOMATIC DRIVE POSITIONER CONTROL UNIT
Connector Color	lor WHITE	TE
H.S. 17 18 19 20	21 22 23 22 23 22 23 22 23 22 23 23 23 23	8 9 10 11 12 13 14 15 16 24 25 26 27 28 29 30 31 32
Terminal No.	Color of Wire	Signal Name
-	ı	I
2	_	MIRROR SELECT SW (RH)
3	SB	MIRROR SW (UP)
4	^	MIRROR SW (LEFT)

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																	Connector No. M66	COLLIGECTOL NATION COLLIGECTOL N	Connector Color GRAY			±		3	Terminal No. Wire Signal Name	-			- SB -						A B C D
							I	1	I				I _																						F
Signal Name	PWR	BAT	I	1	PEDAL MOTOR (FR)	ı	BAT	GND	GND	ı	ı	1	PEDAL MOTOR (RR)	1	I	GND	Signal Name	ı	1	1	1	1	1	1	ı	ı	1	I							G H
Color of Wire	×	В	ı	-	g	ı	SB	В	>	ı	ı	ı	BB	I	I	В	Color of Wire	ŋ	۵	٦	ŋ	SB	æ	۵	0	>	GR	GR							I
Terminal No.	33	34	35	36	37	38	39	40	41	42	43	44	45	46	47	48	Terminal No.	5.	227	23J	24J	25J	26J	27.1	287	297	307	61)						A	ADP
																			•	•	•	•			F										K
	ROL																							120 110		32) 31)		52,151,1							L
M34	POSITIONER CONTROL		WHITE		35 36 37 38 39 42 43 44 45 46 47 48	14 04 64 44 64 34											M40		1		54 33 23 13	1 2		21.1 20.1 19.1 18.1 17.1 16.1 15.1 14.1 13.1 12.1 11.1	2 2 2 2 2 2 2 2 2 2 2 2 2 2 2 2 2 2 2 2	41.0 40.0 39.0 38.0 37.0 36.0 35.0 34.0 33.0 32.0 31.0	1001 1001 1001 1001 1001 1001	61.1 60.1 59.1 58.1 57.1 56.1 55.1 54.1 53.1 52.1 51.1 70.1 69.1 68.1 67.1 66.1 65.1 64.1 63.1 67.1		75J 74J 73J 72J 71J	807				M
Connector No.	Connector Name		Connector Color		33 34	2											Connector No.	Connector Color			ď	5		21.12	<u>]</u>	4114	<u>"</u> [61.16							Ν
Conr	Conr		Con	4		S. T.											Con		5		U				تــا					ΔR	JIAnr)13GB			0
																														7100					Р

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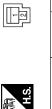
Connector No.	. M91	
Connector Name WIRE TO WIRE	me WIR	E TO WIRE
Connector Color	lor WHITE	11
	7 6 5 4 16 15 14 13	6 5 4 3 2 1 15 14 13 12 11 10 9 8
i.		
Terminal No.	Color of Wire	Signal Name
12	>	ı
13	Μ	I
14	BR	I
15	0	I
16	В	I

Signal Name	I	1	1	1	1
Color of Wire	\	W	BR	0	G
Terminal No. Wire	12	13	14	15	16

Connector No.	M163
Connector Name	DOOR MIRROR REMOTE CONTROL SWITCH (WITH AUTOMATIC DRIVE POSITIONER)
Connector Color WHITE	WHITE

CONTROL SWITCH (WITH AUTOMATIC DRIVE POSITIONER)	里	14 (2 13 14 15 16	Signal Name	-	-	_	-	_	_	-
	lor WHITE	8 9 2 3 10 10 11	Color of Wire	\	_	GR	^	SB	В	BR
Connector Name	Connector Color	H.S.	Terminal No.	7	3	7	9	9	13	14

M82	Connector Name AUTOMATIC DRIVE POSITIONER)	/HITE	
Connector No.	Connector Name	Connector Color WHITE	



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Color of Wire	SB	Ь	
Terminal No.	-	7	

Connector No.	M158
Connector Name	AT DEVICE (WITH MANUAL MODE SWITCH AND INTELLIGENT KEY SYSTEM)
Connector Color WHITE	WHITE



Signal	ı	1
Color of Wire	В	>
Terminal No.	2	4

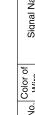
Sonnector Color WHITE	Connector Color WHITE	Sonnector No. M74	
			Connector No. M74



Signal Name	ı	ı	ı	1	I	I	_
Color of Wire	GR	ŋ	>	Μ	н	٨	Ь
Terminal No.	10	11	12	13	14	15	16

Connector No.	96W
Connector Name	Connector Name (WITH AUTOMATIC DRIVE POSITIONER)
Connector Color BROWN	BROWN





Signal Nan	_	I	I
Color of Wire	В	GR	Ь
Terminal No.	1	2	3

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DRIVER SEAT CONTROL UNIT

Connector No. E10
Connector Name WIRE TO WIRE
Connector Color WHITE

Connector No. M164
Connector Name INTELLIGENT KEY UNIT

Connector Color WHITE

	Connector No.	. E26		
	Connector Name	me WIF	WIRE TO WIRE	
	Connector Color WHITE	lor WH	ITE	
		1 2 3	4 5 6 7 11 12 13 14 15 16	
_				
	Terminal No. Wire	Color of Wire	Signal Name	
	12	>	ı	
	13	Ν	ı	
	14	BR	1	
	15	0	I	
	16	g	I	

Signal Name

Terminal No. Wire

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Connector No.). E110	0
Connector Name		PEDAL ADJUSTING MOTOR ASSEMBLY
Connector Color	olor BLACK	CK
H.S.		4 3
Terminal No.	Color of Wire	Signal Name
3	>	_
4	0	I
ĸ	≥	_

19 20 39 40								
14 15 16 17 18 34 35 36 37 38		Signal Name	CAN-H	CAN-L	KEY SW INPUT	BAT	PUSH	P RANGE SW
6 7 8 26 27 28		Color of Wire	Г	Ь	SB	B/B	ŋ	SB
1 2 3 4 5 21 22 23 24 25		Terminal No.	2	3	7	11	27	39
	22 23 24 25 26 27 28 29 30 31 32 33 34 35 36 37 38 39 39 39	2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17 18 19 19 2 2 2 2 2 2 2 2 2 2 2 2 2 2 2 2 2	26 7 8 9 10 11 12 13 14 15 16 17 18 19 19 28 27 28 29 30 31 32 33 34 35 38 37 38 39 37 38 39 39 37 38 39 39 39 39 39 39 39 39 39 39 39 39 39	6 7 8 9 10 11 12 13 14 15 16 17 18 19 19 28 27 28 29 30 31 32 33 34 35 36 37 38 39 38 37 38 39 38 37 38 39 38 38 38 38 38 38 38 38 38 38 38 38 38	Color of Signal Name CAN-H CAN-L CAN-L	1 1 1 1 1 1 1 1 1 1	S 7 8 9 10 11 12 13 14 15 15 17 18 13 18 18 18 18 18 18	S 7 8 9 10 11 12 13 14 15 15 17 18 13 18 18 18 18 18 18

Connector No.	. E109	
Connector Name		PEDAL ADJUSTING MOTOR ASSEMBLY
Connector Color GRAY	lor GRAY	
H.S.		
Terminal No.	Color of Wire	Signal Name
-	BR	_
2	G	-

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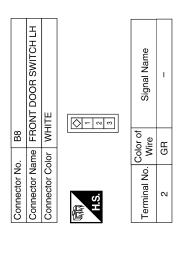
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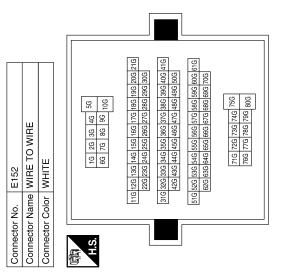
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Terminal No.	Color of Wire	Signal Name
33G	B/B	ſ



Signal Name	ı	ı	-	ı	I	_	1
Color of Wire	В	SB	В	ŋ	Д	٦	0
Terminal No.	10	11	12	13	14	15	16

TS 14 13 12 11 10 9 8

Signal Name	ı	ı	I	ı	ı
Color of Wire	œ	Ь	GR	ŋ	>
Terminal No.	-	2	3	80	6

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																											В
																											С
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				<u> </u>													T									7	F
Signal Name	ı	1	1	1	1	1	ı	ı	ı	ı	1		Signal Name	1	1	ı	1	I	1	ı	-	1	I	I	1		G
Color of Wire	ŋ	۵	_	5	SB	Œ	<u>a</u>	0	>	GR	GR		Color of Wire	Y/R	E M		W/A	_	В	œ	В	M/L	<u>_</u>	_	BR/W	_	
Terminal No.	5.1	223	23.1	24J	25J	26J	27.1	283	29.1	307	61)		Terminal No.	-	. 2	8	80	6	10	1	12	13	14	15	16		ADF
			ſF												•		•	•	•	•							K
							17.1 18.1 19.1 20.1 21.1	300	37.1 38.1 39.1 40.1 41.1	30 500	57J 58J 59J 60J 61J	30 700 B															
IIRE				31 41	8 8		16.1 17.1 18.1 19	260 270 280 23	36J 37J 38J 36	46J 47J 48J 4	56J 57J 58J 59	63 64 65 66 67 68 66 67 68 66 66	IIIE	!			5 6 7										L
B69 WIRE TO WIRE	WHITE	1		1.1	8 8		11.0 12.0 13.0 14.0 15.0 16.0 17.0	22. 23. 24. 25.	31, 32, 33, 34, 35, 36, 3	420 430 440 450	511 521 531 541 551 561 5	62J 63J 64J 65J 71J 72J 7	B200 WIRE TO M		AHII E		3 4 5 6 7 10 11 12 13 14 15 16										M
9	Connector Color V						=	_ 	311		517	_	4		Connector Color WHITE		8 -]									Ν
Connector No.	Connect		E		į.								Connector No.		Connect	·											0
																										ABJIA0017GB	Б

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	_		_				_		_	
Signal Name	1	PULSE SLIDE	PULSE FR LIFTING	SLIDE FWD SW	RECLINE FWD SW	FR LIFTER UP SW	RR LIFTER UP SW	PEDAL FORWARD	SENSOR GND	GND (SIGNAL)
Color of Wire	ı	Y/G	R/L	P/B	G/B	Y/B	B/W	Γ/M	٨	В
Terminal No.	23	24	25	26	27	28	29	30	31	32

Signal Name	-	ı	PULSE RECLINING	PULSE RR LIFTING	SLIDE BACKWD SW	RECLINE BACKWD SW	FRONT LIFT DN SW	REAR LIFT DN SW	PEDAL BACK	POWER SUPPLY	XT	-	CAN-L	=	P RANGE SW	_
Color of Wire	1	1	٦	$\Gamma \lambda$	B/B	O/B	L/B	G/W	٦	٦	B/W	ı	Ь	-	Γ	ı
Terminal No.	7	8	6	10	11	12	13	14	15	16	17	18	19	20	21	22

Connector No.	B202
Connector Name	DRIVER SEAT CONTROL UNIT
Connector Color	WHITE
原列 H.S.	
1 2 3 4 5 6	6 7 8 9 10 11 12 13 14 15 16
17 18 19 20 21 2	22 23 24 25 26 27 28 29 30 31 32
Terminal No. V	Color of Signal Name Wire

Signal Name	XA	I	CAN-H	ı	ı	ST SW
Color of Wire	œ	-	٦	_	-	BR/W
Terminal No.	-	2	3	4	5	9

Connector No.	B204
Connector Name	SLIDING MOTOR LH (WITH AUTOMATIC DRIVE POSITIONER)
Connector Color GRAY	GRAY
(南) H.S.	5 4 3 2 1

COLLIBECTOL INO.		D204	
Connector Name		SLIDING MOT (WITH AUTON POSITIONER)	SLIDING MOTOR LH (WITH AUTOMATIC DR POSITIONER)
Connector Color		GRAY	
 H.S.		5 4 3 2 1	
Terminal No.	Color of Wire		Signal Name
-	Œ		ı
2	Y/G		1
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	æ			æ		MTR	æ			
Signal Name	RR LIFTER DN MTR	BAT (FUSE)	ı	SLIDE BACKWD MTR	ı	RECLINE BACKWD MTR	FR LIFTER UP MTR	1	1	GND (POWER)
Color of Wire	M	Y/R	1	മ	ı	G/W	>	1	ı	В
Terminal No.	39	40	41	42	43	44	45	46	47	48

B203	Connector Name DRIVER SEAT CONTROL UNIT	or WHITE	39 34 38 36 6 37 38 39 39 40 41 42 43 44 45 46 47 48	Color of
Connector No.	Connector Nan	Connector Color WHITE	原 H.S.)

I_E	94 35 36 78 38 39 41 42 43 44 45 46 47 48	Signal Name	BAT (PTC)	ı	SLIDING FWD MTR	RECLINING FWD MTR	FR LIFTER DN MTR	RR LIFTER UP MTR
lor WH	33 34 35 36 40 41 42 43	Color of Wire	T/M	_	В	B/W	В	Т
Connector Color WHITE	南南 H.S.	Terminal No.	33	34	35	36	37	38

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DRIVER SEAT CONTROL UNIT

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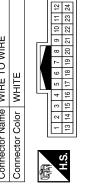
	Connector Color GRAY	al No. Wire Signa	2 L/Y -	\ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \	- N	Connector No R931	9				H.S.	Terminal No. Wire Signal Name		2 G/W -	3 R/W –	4 L –				
(EZ									<u> </u>											
LIFTING MOTOR (FRONT) (WITH AUTOMATIC DRIVE	[12	Signal Name	1 1	1 1	1		Signal Name	1	1	1	1 1									
	GRAY	Color of Wire	<u>≻ </u>	٦ >	- B	Color of	Wire	B/W	В	ı	8 //8									
Connector Name	Connector Color	al No.	1 2	3	5 4		Terminal No.	9	7	80	10									
										7		Г							ı	
O WIRE		Signal Name	1 1	1			H HULLING TVES	(WITH AUTOMATIC DRIVE POSITIONER)	(1)		6 5 1]	Signal Name	1	1	1	I	1		
Connector Name WIRE TO WIRE	4 3 2	Color of Wire	√ G/W	B/W -	_	R208	DOWED	WITH A			10 9 8 7		Color of Wire	B/B	G/W	O/B	G/B	P/B		
Connector Name	ý	a No.	2 0	8 4	+	Connector No	lector No.	Connector Name	Connector Color				Terminal No.	-	2	3	4	2		
Con	H.S.	Term					5	Conr	Con				Term						ı	

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Signal Name	1	ı	ı	1	i	ı	1
Color of Wire	P/L	LG/B	W/N	Y/G	GR/R	₽\Y	щ
Terminal No.	7	80	6	10	-	12	21





Signal Name

Color of Wire

Terminal No.

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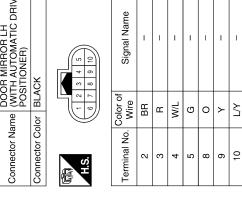
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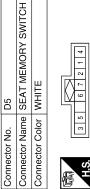
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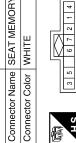
Connector No.		B232	2
Connector Name		NEC POS	RECLINING MOTOR LH (WITH AUTOMATIC DRIVE POSITIONER)
Connector Color		BLACK	CK
H.S.		2 4	[o]
Terminal No.	Color of Wire	Jo e	Signal Name
-	G/W	>	1
2	R/W	>	-
3	λ		_
4	7		-



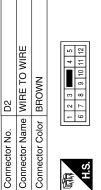


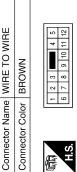


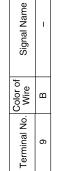




Signal Name	ı	1	ı	I	1	1	1
Color of Wire	LG/B	P/L	W/N	В	R/Υ	GR/R	Y/G
Terminal No. Wire	-	2	က	4	5	9	7







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Connector No.). D118	8
Connector Name		DOOR MIRROR RH (WITH AUTOMATIC DRIVE POSITIONER)
Connector Color		BLACK
所 H.S.	1 2 8 7	8 9 10
Terminal No.	Color of Wire	Signal Name
2	W//	ı
ဗ	GR/R	ı
4	M/L	ı
5	L/W	ı
8	\	-
6	Υ	_
10	B/B	-

						lame							
12	WIRE TO WIRE	ITE		4 5 6 7 8	± 2	Signal Name	_	_	_	_	1	1	I
D102		lor WHITE		1 2 3 4	2	Color of Wire	GR/R	У	MΛ	M/L	B/B	Υ	L/W
Connector No.	Connector Name	Connector Color		H.S.	<u>-</u>	Terminal No.	10	11	12	13	14	15	16

Fail Safe

The fail-safe mode may be activated if the following symptoms are observed.

FAIL-SAFE MODE

When any manual and automatic operations are not performed, if any motor operations of front seat LH or pedals are detected for T2 or more, status is judged "Output error".

ADP-115

DRIVER SEAT CONTROL UNIT

< ECU DIAGNOSIS >

OPERATED PORTION	T2
Seat sliding	Approx. 0.1 sec.
Seat reclining	Same as above
Seat lifting (Front)	Same as above
Seat lifting (Rear)	Same as above
Pedal adjust	Same as above

NOTE:

The front seat LH position and pedal adjustment functions (see the following table) operate simultaneously in the order of priority.

Priority	Function	Priority	Function
1	Seat sliding, (door mirror LH/RH)*	4	Seat lifter-FR
2	Pedal	5	Seat lifter-RR
3	Seat reclining		

^{*:} In conjunction with sliding the seat, the door mirrors are positioned.

CANCEL OF FAIL-SAFE MODE

The mode is cancelled when the A/T selector lever is shifted to P position from any other position.

DTC Index

CONSULT-III	Tim	ing ^{*1}		
display	Current mal- function	Previous mal- function	Item	Reference page
CAN COMM CIRCUIT [U1000]	0	1-39	CAN communication	ADP-28
SEAT SLIDE [B2112]	0	1-39	Seat slide motor output	ADP-29
SEAT RECLINING [B2113]	0	1-39	Seat reclining motor output	ADP-30
SEAT LIFTER FRONT [B2114]	0	1-39	Seat lifting motor front output	ADP-33
SEAT LIFTER REAR [B2115]	0	1-39	Seat lifting motor rear output	ADP-33
ADJ PEDAL MOTOR [B2117]	0	1-39	Pedal adjusting motor output	ADP-33
ADJ PEDAL SENSOR [B2120]	0	1-39	Pedal adjusting sensor input	ADP-33
DETENT SW [B2126]	0	1-39	Park position switch condition	ADP-37
UART COMM [B2128]	0	1-39	UART communication	ADP-39

^{*1:}

^{• 0:} Current malfunction is present

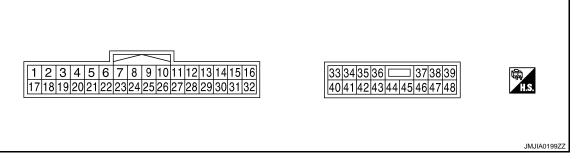
^{• 1-39:} Displayed if any previous malfunction is present when current condition is normal. The numeral value increases by one at each IGN ON to OFF cycle from 1 to 39. The counter remains at 39 even if the number of cycles exceeds it. However, the counter is reset to 1 if any malfunction is detected again, the normal operation is resumed and the ignition switch is turned from OFF to ON.

< ECU DIAGNOSIS >

AUTOMATIC DRIVE POSITIONER CONTROL UNIT

Reference Value INFOID:0000000003935597

TERMINAL LAYOUT



PHYSICAL VALUES

Teri	minal No.		Description				
+	-	Wire color	Signal name	Input/ Out- put	Condition	on	Voltage (V) (Approx.)
			Changeover quitab DH		Changeover	RH	0
2	Ground	L	Changeover switch RH signal	Input	switch position	Neutral or LH	5
3	Ground	SB	Mirror switch up signal	Innut	Mirror quitob	Operated (up)	0
3	Ground	20	Mirror switch up signal	а		Other than above	5
4	Ground	V	Mirror switch left signal	Innut	Mirror switch	Operated (left)	0
4	Giound	V	will of switch left signal	input	a		5
_	0	-	Door mirror sensor (RH)	1	Door mirror RH	Peak	3.4
5	Ground	R	up/down signal	Input position		Valley	0.6
	Craund		Door mirror sensor (LH)	lanus	Door mirror LH	Peak	3.4
6	Ground	L	up/down signal	Input I		Valley	0.6
0	Craund		Pedal sensor input sig-	lanus	Dadalaanaar	Forward	0.5
8	Ground	0	nal	Input	Pedal sensor	Backward	4.5
						Push	0
9	Ground	LG	Memory switch 1 signal	Input	Memory switch 1	Other than above	5
10	Ground	SB	UART LINE (TX)	Out- put	Ignition switch ON		(V) 6 4 2 0 1 ms
				a :		Illuminate	0
12	Ground	W	Memory indictor 1 signal	Out- put	Memory indictor 1	Other than above	Battery voltage

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	minal No.									
	minai NO.	Wire	Description	Innut/	_		Voltage (V)			
+	-	color	Signal name	Input/ Out- put	Condition	on	(Approx.)			
				04	Mamanindiatas	Illuminate	0			
13	Ground	Υ	Memory indictor 2 signal	Out- put	Memory indictor 2	Other than above	Battery voltage			
14	Ground	GR	Door mirror motor (RH)	Out-	Door mirror RH	Operate (up)	1.5 - Battery voltage			
	0.00		up output signal	put		Other than above	0			
15	Ground	V	Door mirror motor (RH)	Out-	Door mirror RH	Operate (left)	1.5 - Battery voltage			
			left output signal	put		Other than above	0			
			Door mirror motor (LH)			Operate (down)	1.5 - Battery voltage			
16	Ground	down output signal	down output signal	Out-	Door mirror (LH)	Other than above	0			
	o Ground G	Door mirror motor (LH)	put		Operate (right)	1.5 - Battery voltage				
			right output signal			Other than above	0			
		Chane	Changeover switch LH		Changeover	LH	0			
18	Ground	Y	signal	Input	switch position	Neutral or RH	5			
19	Ground	round BR Mirror switch down sig-		Input		Operate (down)	0			
13	Ground	ы	nal	mput	WIIITOI SWILCII	Other than above	5			
20	Ground	GR	Mirror switch right signal	Input	Mirror switch	Operate (right)	0			
20	Ground	Oit	Will of Switch Hight Signal	три	WIIITOI SWILOIT	Other than above	5			
21	Ground	Р	Door mirror sensor (RH)	Input	Door mirror RH	Left edge	3.4			
	Orodria	'	left/right signal	IIIput	position	Right edge	0.6			
22	Ground	G	Door mirror sensor (LH)	Input	Door mirror LH	Left edge	0.6			
			left/right signal		position	Right edge	3.4			
24	Ground	GR	Set switch signal	Input	Set switch	Push Other than	0			
						above Push	5			
25	Ground	Р	Memory switch 2 signal	Input	Memory switch 2	Other than above	5			
26	Ground	G	UART LINE (RX)	Input	Ignition switch ON		(V) 6 4 2 0 2 ms			

< ECU DIAGNOSIS >

Terr	minal No.		Description					
+	-	Wire color	Signal name	Input/ Out- put	Condition		Voltage (V) (Approx.)	
		Door mirror motor (RH)					1.5 - Battery voltage	
20	30 Ground G	down output signal	Out-	Door mirror (DU)	Other than above	0		
30		Door mirror motor (RH)	put	Door mirror (RH)	Operate (right)	1.5 - Battery voltage		
		right output signal			Other than above	0		
31	Ground	R	Door mirror motor (LH)	Out-	Door mirror (LH)	Operate (up)	1.5 - Battery voltage	
31	Ground	K	up output signal	put	Door Hillion (LH)	Other than above	0	
32	Ground	nd B Door mirror motor (LH) Out-		Door mirror (LH)	Operate (left)	1.5 - Battery voltage		
32	Giodila	Ь	left output signal	put Door Hillion (Ent)		Other than above	0	
33	Ground	W	Sensor power supply	Input	_		5	
34	Ground	R	Battery power source	Input	_		Battery voltage	
37	Ground	G	Pedal adjusting motor	Out-	Pedal adjusting	Operate (forward)	Battery voltage	
37	Ground	G	forward output signal put motor		motor	Other than above	0	
39	Ground	SB	Battery power source		_		Battery voltage	
40	Ground	В	Ground	_	_		0	
41	Ground	Υ	Sensor ground	_	_		0	
45	45 Ground	Ground BR		Pedal adjusting motor backward output signal	Out-	Pedal adjusting	Operate (back- ward)	Battery voltage
		packward output signal		put	motor	Other than above	0	
48	Ground	В	Ground	_	_		0	

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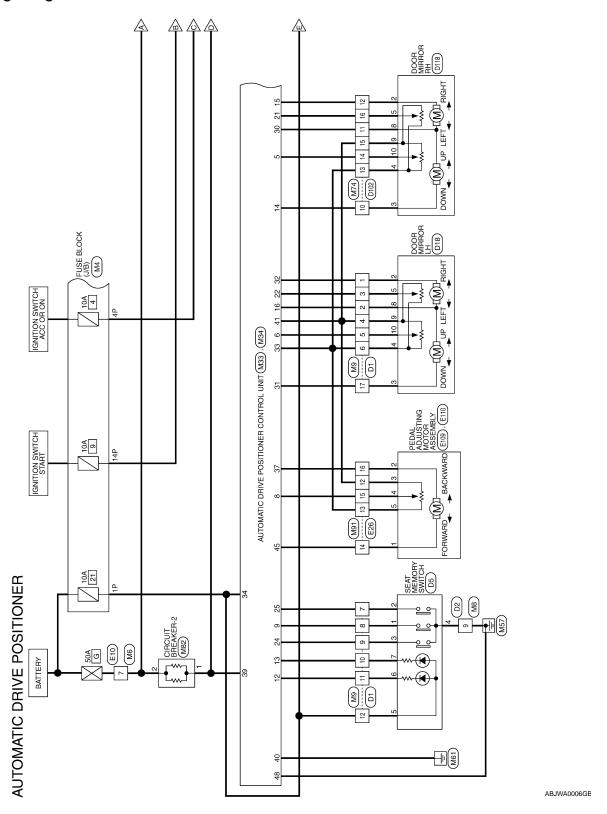
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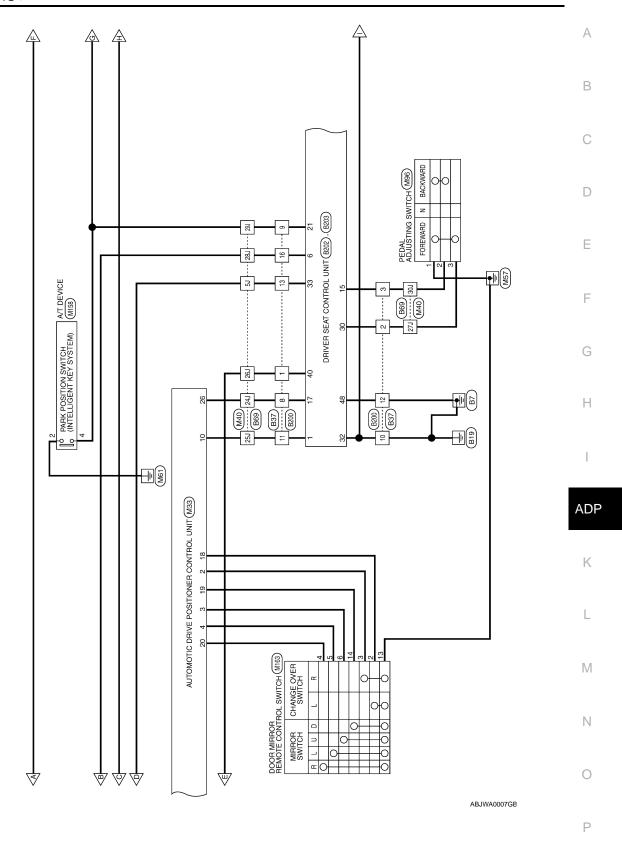
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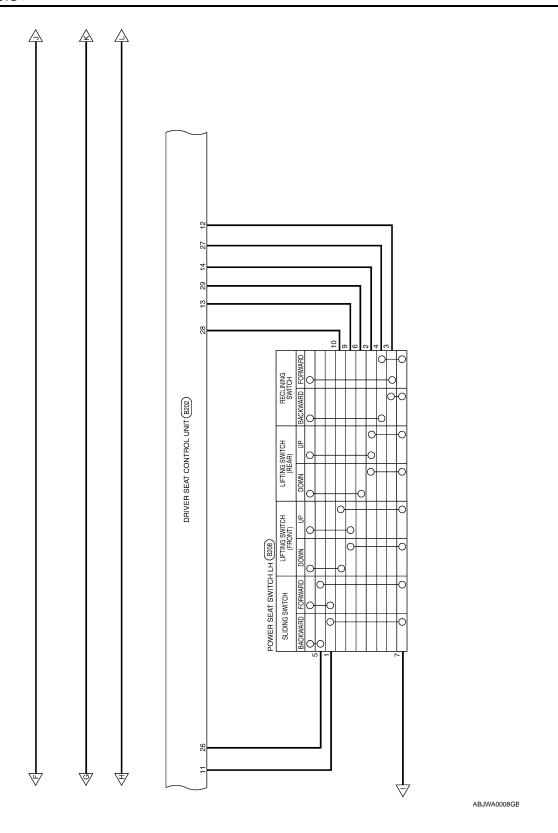
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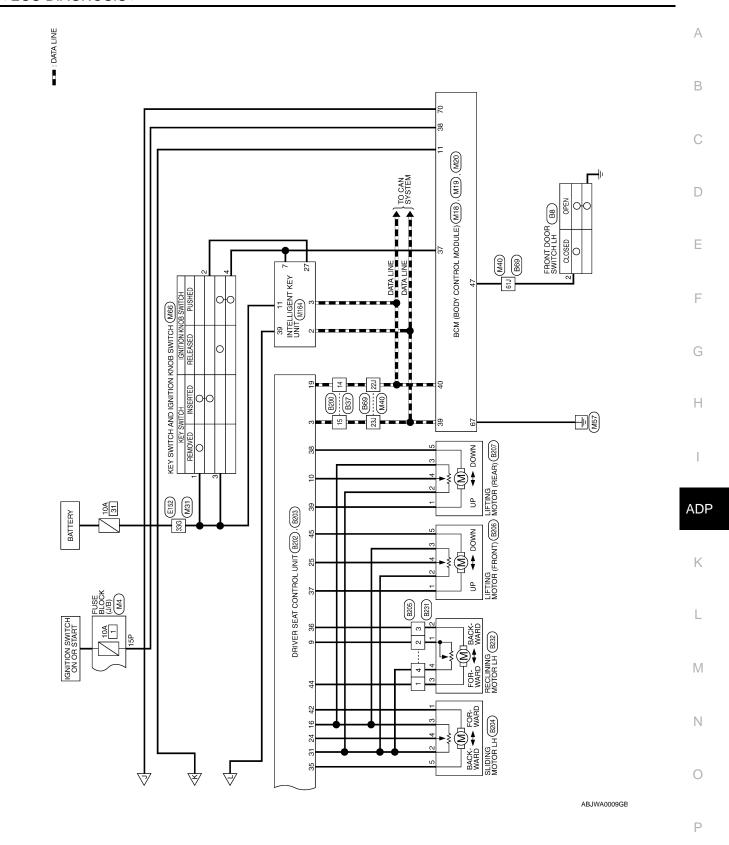
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Wiring Diagram







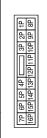


Connector No. M8
Connector Name WIRE TO WIRE

Connector Color WHITE

AUTOMATIC DRIVE POSITIONER CONNECTORS

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



_			_
	1	8 P	
	2P	96	
	ЗP	10P	
	П	11P	
	Ш	12P	
	4	13P	
	SP.	14P	
	В	15P	
	7P	16P	
[_

Signal Name	I	ı	_	1
Color of Wire	B/B	G/B	0	W/R
Terminal No.	1P	4P	14P	15P

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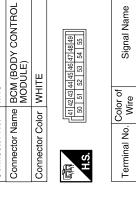
	RE TO WIRE	ITE	7 8 5 1	Signal Name
. M6	ıme WII	lor Wh	4 8	Color of Wire
Connector No.	Connector Name WIRE TO WIRE	Connector Color WHITE	雨 H.S.	Terminal No.

Signal Name

Color of Wire

Terminal No.

В



			1	19 20 39 40						
3	BCM (BODY CONTROL MODULE)	=		9 10 11 12 13 14 15 16 17 18 29 30 31 32 33 34 35 36 37 38	Signal Name	ACC SW	KEY SW	IGN SW	CAN-H	CAN-L
. M18	me BCI	lor WHITE		6 7 8	Color of Wire	g/B	B	W/R	_	۵
Connector No.	Connector Name	Connector Color	H.S.	1 2 3 4 5 21 22 23 24 25	Terminal No.	1	37	38	39	40
						_	_		_	

DOOR SW (DR)

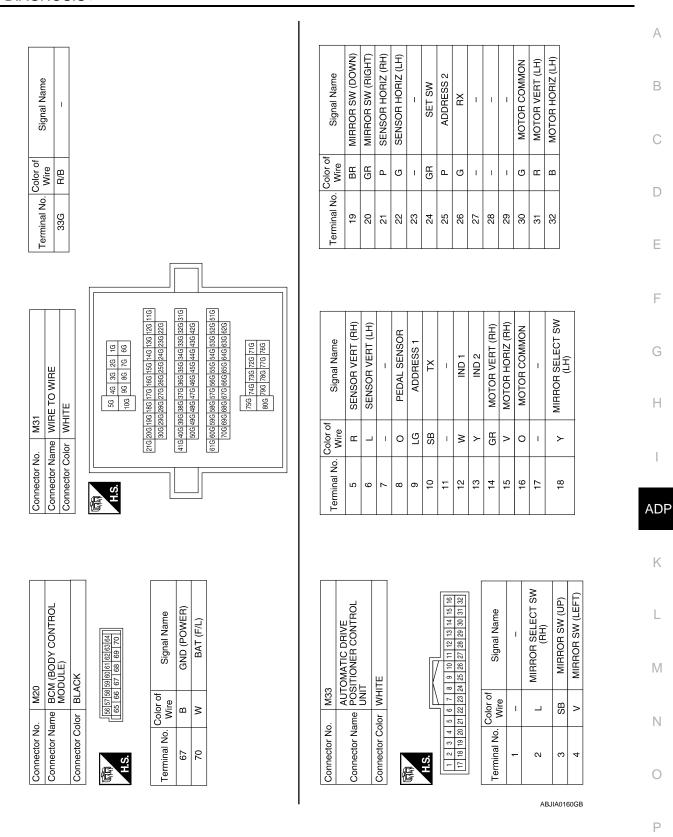
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	WIRE TO WIRE	WHITE		7 6 5 4 3 2 1 1 19 18 17 16 15 14 13	Signal Name	I	-	1	1	_	1	I	-	_	-	1	_	-
	<u>[</u>	11 10 9 8 23 22 21 20	Color of Wire	В	0	G	>	_	8	₾	2	GR	٨	8	۳	Œ		
Connector No.	Connector Name	Connector Color		S. 24	Terminal No.	-	2	င	4	2	9	7	8	6	10	11	12	17

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Connector No. M34		Terminal No.	Color of Wire	Signal Name			
Connector Name POSITIONER CONTROL		33	8	PWR			
_	ı	34	œ	BAT			
Connector Color WHITE		35	-	I			
		36	1	ı			
33 34 35 36 73 38 39		37	g	PEDAL MOTOR (FR)			
/+ 0+ 0+ ++	ı	38	1	ı			
		39	SB	BAT			
		40	В	GND			
	ı	41	>	GND			
		42	1	ı			
		43	1	ı			
		44	ı	ı			
		45	BB	PEDAL MOTOR (RR)			
		46	1	ı			
		47	ı	ı			
		48	В	GND			
li		-				ΙÌ	ſ
Connector Name WIRE TO WIRE	<u>'</u>	Terminal No.	Color of Wire	Signal Name	Connector No.		NOILINGION
Connector Color WHITE		5.	G	ı		KNOB SWITCH	
-	I	22.1	۵	1	Connector Color	lor GRAY	
		23J	_	ı	[4		
5 4 3 2 1		24J	ŋ	ı	E	1 2 3 4 5 6	
100 90 80 7.0		25J	SB	1	H.S.	0 4	
		26J	ш	ı			
301 200 130 180 173 160 155 140 130 123 113		27.1	۵	ı		30,000	
	<u> </u>	287	0	I	Terminal No.	Wire Signal	Signal Name
41J 40J 39J 38J 37J 36J 35J 34J 33J 32J 31J 50J 40J 48 J 47 J 46 J 44 J 43 J 42 J		29J	^	I	-		
	7	301	GR	ı	2		
611 601 594 584 571 564 554 554 534 524 514 701 691 684 674 664 654 654 624		61J	GR	I	3	8	
					4	SB	
75J 72J 72J 71J							
900							

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Connector Name AUTOMATIC DRIVE POSITIONER)

M82

Connector No.

Connector No. M74

Connector Color WHITE

Connector No.	. M91	
Connector Name		WIRE TO WIRE
Connector Color WHITE	lor WH	ΠE
	7 6 5 4 16 15 14 13	6 5 4 3 2 1 15 14 13 12 11 10 9 8
S.H.S.		
Terminal No.	Color of Wire	Signal Name
12	>	ı
13	8	I
14	BR	Ī
15	0	Î
16	В	1

Connector No.	o. M163	33
Connector Name		DOOR MIRROR REMOTE CONTROL SWITCH (WITH AUTOMATIC DRIVE POSITIONER)
Connector Color WHITE	olor WH	ПЕ
H.S.	8 9 10 1	11 12 13 14 15 16
Terminal No.	Color of Wire	Signal Name
2	>	ı
3	٦	ı
4	GR	1

Signal Name	-	ı			A/T DEVICE (WITH MANUAL MODE SWITCH AND INTELLIGENT KEY SYSTEM)	=	7 0 01 0		Signal Name	I
Color of Wire	SB	Ь		M158		or WHITE	1 3	5	Color of Wire	В
Terminal No.	-	2		Connector No.	Connector Name	Connector Color		H.S.	Terminal No.	2

Connector Name Connector Color		WIRE TO WIRE	
H.S.	8 7 6 4	5 4 3 2 1 1 1 0 9 1 1 1 0 9 1 1 1 0 1 1 1 0 1 1 1 1	
Terminal No.	Color of Wire	Signal Name	
10	GR	I	
11	ŋ	1	
12	>	1	
13	8	ı	
14	œ	ı	
15	>	ļ	
16	۵	1	
Connector No.	M96		
Connector Name	J eu	PEDAL ADJUSTING SWITCH (WITH AUTOMATIC DRIVE POSITIONER)	
Connector Co	Color BRC	BROWN	
E	ro 4	0 0	
H.S.			
Terminal No.	Color of Wire	Signal Name	
-	В	_	
2	GR	_	
က	۵	ı	

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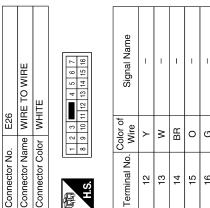
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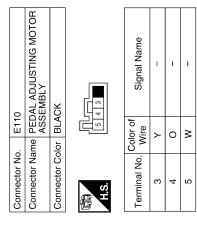
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(WIRE TO WIRE	ITE	3 4 4	Signal Name	ı
. E10		lor WHITE	2 9	Color of Wire	*
Connector No.	Connector Name	Connector Color	赋 H.S.	Terminal No.	7

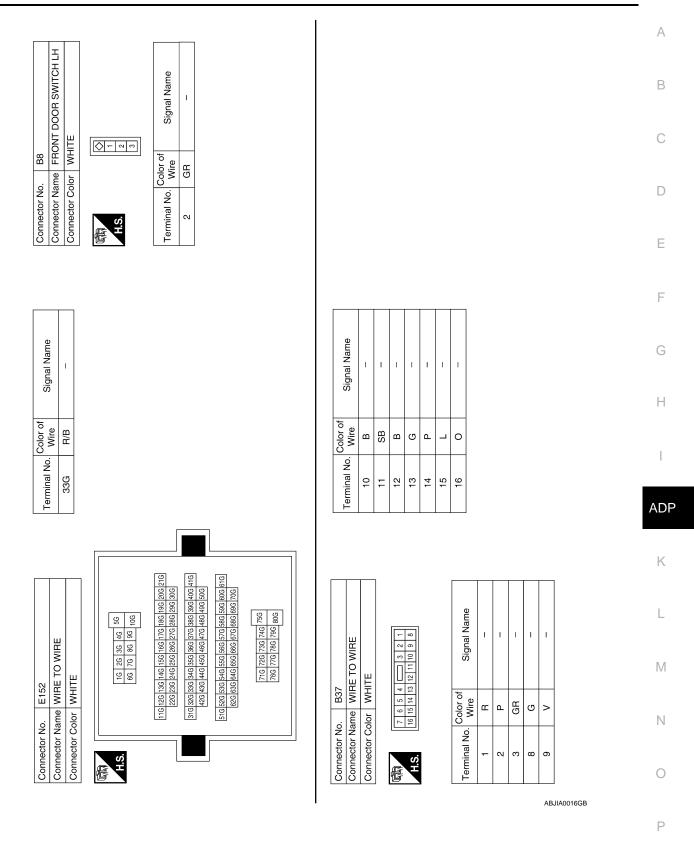


M164 Connector No. M164 Connector Name INTELLIGENT KEY UNIT Connector Color WHITE MHITE Connector Color WHITE Connector Color Color
SB KEY SW INPUT B/B BAT
L CAN-H
Color of Wire
5 6 7 8 9 10 11 12 13 14 15 16 17 18 19 25 26 27 28 29 30 31 32 33 34 35 36 37 38 39

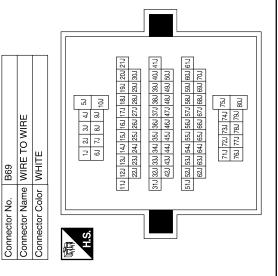
	PEDAL ADJUSTING MOT ASSEMBLY		<u> </u>	Signal Name	_	-
]		r GRAY	-	Color of Wire	BR	G
Collicator No.	Connector Name	Connector Color	原为 H.S.	Terminal No.	1	2

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Signal Name	ı	ı	1	1	ı	1	1	ı	1	ı	ı
Color of Wire	ŋ	Д	_	ŋ	SB	œ	۵	0	>	GR	GR
Terminal No.	5.1	22J	23J	24J	25J	26J	27J	28J	76Z	301	61J



Signal Name	_	1	ı	_	I	ı	-	_	I	I	_	I	
Color of Wire	Y/R	ΓW	٦	B/W	٦	В	В	В	M/L	Ъ	٦	BR/W	
Terminal No.	1	2	3	8	6	10	11	12	13	14	15	16	

Connector No. B200				
	00			
Connector Name WIRE TO WIRE	RE TO	WIF	믰	
Connector Color WHITE	HTE			
4				
1 2 3		4 5	9	7
H.S.	11 12 1	13 14	15	16

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Signal Name	1	PULSE SLIDE	PULSE FR LIFTING	SLIDE FWD SW	RECLINE FWD SW	FR LIFTER UP SW	RR LIFTER UP SW	PEDAL FORWARD	SENSOR GND	GND (SIGNAL)
Color of Wire	ı	Y/G	R/L	P/B	G/B	Y/B	B/W	Γ/M	٨	В
Terminal No.	23	24	25	26	27	28	29	30	31	32

Signal Name	ı	I	PULSE RECLINING	PULSE RR LIFTING	SLIDE BACKWD SW	RECLINE BACKWD SW	FRONT LIFT DN SW	REAR LIFT DN SW	PEDAL BACK	POWER SUPPLY	XT	ı	CAN-L	-	P RANGE SW	ı
Color of Wire	1	-	_	$\Gamma \lambda$	B/B	O/B	L/B	G/W	٦	٦	B/W	ı	Д	ı	Γ	1
Terminal No.	7	8	6	10	11	12	13	14	15	16	17	18	19	20	21	22

Connector Name DRIVER SEAT CONTROL UNIT Connector Color WHITE H.S. 1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17 18 19 20 21 22 24 25 25	Connector No.	B202								
WHITE	Connector Name	DRIV UNI	/ER ſ	SE	AT	ö	N	ΙB	OL	
3 4 5 6 7 8 9 10 11 12 13 14 15 15 20 23 24 25 26 27 28 29 30 31	Connector Color	MHI	Щ							
3 4 5 6 7 8 9 10 11 12 13 14 15 18 19 20 21 22 23 24 25 26 27 28 29 30 31										
3 4 5 6 7 8 9 10 11 12 13 14 15 19 19 19 22 23 24 25 26 27 28 29 30 31										
3 4 5 6 7 8 9 10 11 12 13 14 15 15 12 12 2 2 2 2 2 2 2 2 2 2 2 2 2 2	УII.									
7 8 9 10 11 12 13 14 15 23 24 25 26 27 28 29 30 31	CHO!	L	W	凥						
23 24 25 26 27 28 29 30 31	3 4 5	_		-	1 12	13	4		16	
	17 18 19 20 21 22	ន	25	6 2	7 28	29	30		32	

Signal Name	RX	ı	CAN-H	1	1	ST SW	
Color of Wire	œ	ı	7	-	1	BR/W	
Terminal No.	-	2	3	4	2	9	

74		
Connector No.	. B204	4
Connector Name		SLIDING MOTOR LH (WITH AUTOMATIC DRIVE POSITIONER)
Connector Color	lor GRAY	47
H.S.	4	3 2 1
Terminal No.	Color of Wire	Signal Name
-	н	ı
2	Y/G	ı
က		ı
4	\	ı
5	G	ı

Signal Name	RR LIFTER DN MTR	BAT (FUSE)	I	SLIDE BACKWD MTR	ı	RECLINE BACKWD MTR	FR LIFTER UP MTR	_	_	GND (POWER)
Color of Wire	L/W	Y/R	1	ŋ	ı	G/W	У	1	ı	В
Terminal No.	39	40	41	42	43	44	45	46	47	48

13	Connector Name DRIVER SEAT CONTROL UNIT	ITE	42 43 44 45 46 47 48	Signal Name	
. B203	me DRIVI UNIT	lor WH	33 34 35 36 (Color of Wire	
Connector No.	Connector Na	Connector Color WHITE	南 H.S.	Terminal No.	

UNIT	ПЕ	94 35 36 (TT) 37 38 39 41 42 44 45 46 47 48	Signal Name	BAT (PTC)	I	SLIDING FWD MTR	RECLINING FWD MTR	FR LIFTER DN MTR	RR LIFTER UP MTR
	lor WHITE	33 34 35 40 41 42	Color of Wire	M/L	1	œ	R/W	В	Т
	Connector Color	呵动 H.S.	Terminal No.	33	34	35	98	28	38

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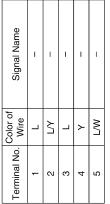
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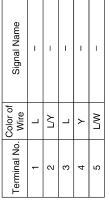
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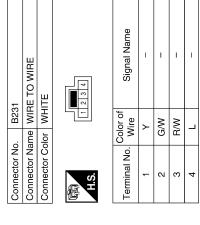


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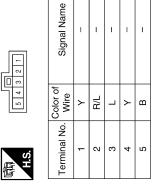
Signal Name	i	ı	I	I	1
Color of Wire	_	S	Γ	У	L/W
Terminal No. Wire	-	2	3	4	5



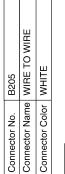






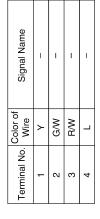


Signal Name	-	ı	I	I	I
Color of Wire	B/W	В	ı	L/B	Y/B
Terminal No.	9	7	8	6	10





E



Connector No.). B208	80
Connector Name		POWER SEAT SWITCH LH (WITH AUTOMATIC DRIVE POSITIONER)
Connector Color	olor WHITE	ITE
H.S.	4 1 0 0	8 7 6 5
Terminal No.	Color of Wire	Signal Name
1	B/B	I
2	M/S	1
ဇ	O/B	1
4	g/b	-
2	P/B	1

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< ECU DIAGNOSIS >

Connector No.		32 CLINING MOTOR LH	Con	Connector No.	Connector No. D1 Connector Name WIRE TO WIRE	TO WIRE		Terminal No.	Ŏ,	Signal Name	0
Connector Name		(WITH AUTOMATIC DRIVE	Con	nector Col	Connector Color WHITE	щ		7	P/L	ı	
	_	(nakioi lo						80	LG/B	ı	
COLINECTOR COLOR	OIOI DLACK	2	E	L		17		6	N/N	_	
	L		SH	(ý	1 2 3 4 5 6 7 8	6 7 8 9 10 11 12		10	Y/G	1	
S I	5			<u>-</u>	2	٠ ا		= :	GR/R	1	
	4	3						12	Ϋ́	ı	
Teriminal		N lengin	Tem	Terminal No.	Color of Wire	Signal Name		17	Œ	1	
3 .				-	BB	ı					
-	W/5	ı		2	0	ı					
7	W.	ı		က	ŋ	ı					
က	>	ı		4	>	1					
4	_	ı		2	5	ı					
				9	M/L	1					
Connector No.	Jo. D2		Con	Connector No.). D5			Connector No.	No. D18		
Connector N	lame WIF	Connector Name WIRE TO WIRE	Con	nector Na	me SEAT	Connector Name SEAT MEMORY SWITCH		7 20000		OR MIRROR LH	Ļ
Connector Color	-	BROWN	Con	Connector Color	olor WHITE	Ш				(WITH AUTOMATIC DRIVE POSITIONER)	JRIVE —
4			4	_		ſī		Connector Color	Color BLACK	CK	
中国 H.S.	6 7 2 8 3	8 9 10 11 12	H.S.	S;	3 5 6 7	7 2 1 4		E	1	6 4 5	
	Color of							Ŋ.	9	6	
Terminal No.	o. Wire	Signal Name	Ten	Terminal No.	Color of Wire	Signal Name		Terminal No.	Color of Wire	Signal Name	o o
				1	LG/B	1		2	BB	I	
				2	P/L	I		3	œ	ı	
				3	M/N	ı		4	M/L	1	
				4	В	ſ		2	9	ı	
				5	R/Υ	ı		∞	0	I	
				9	GR/R	I		6	>	1	
				7	Y/G	I		10	5	I	
				_							
0	Ν	L	ADF K			G	F	E	D	В	А

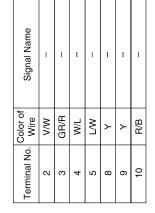
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Signal Name	ı	ı	ı	1	I	ı	ı
Color of Wire	GR/R	>	W/A	M/L	B/B	>	M
Terminal No.	10	1	12	13	14	15	16

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< ECU DIAGNOSIS >

BCM (BODY CONTROL MODULE)

Reference Value

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VALUES ON THE DIAGNOSIS TOOL

Monitor Item	Condition	Value/Status	
AID COND CW	A/C switch OFF	OFF	С
AIR COND SW	A/C switch ON	ON	
AUT LIGHT CVC	Outside of the room is dark	OFF	D
AUT LIGHT SYS	Outside of the room is bright	ON	
ALITO LICUIT CW	Lighting switch OFF	OFF	
AUTO LIGHT SW	Lighting switch AUTO	ON	Е
DACK DOOD CW	Back door closed	OFF	
BACK DOOR SW	Back door opened	ON	
ODL LOCK OW	Door lock/unlock switch does not operate	OFF	— F
CDL LOCK SW	Press door lock/unlock switch to the LOCK side	ON	
	Door lock/unlock switch does not operate	OFF	G
CDL UNLOCK SW	Press door lock/unlock switch to the UNLOCK side	ON	
	Front door RH closed	OFF	
DOOR SW-AS	Front door RH opened	ON	— Н
D00D 0W DD	Front door LH closed	OFF	
DOOR SW-DR	Front door LH opened	ON	
	Rear door LH closed	OFF	
DOOR SW-RL	Rear door LH opened	ON	
DOOD OW DD	Rear door RH closed	OFF	AD
DOOR SW-RR	Rear door RH opened	ON	
ENGINE DUN	Engine stopped	OFF	K
ENGINE RUN	Engine running	ON	/\
ED EOO 0W	Front fog lamp switch OFF	OFF	
FR FOG SW	Front fog lamp switch ON	ON	L
ED MA OUED OW	Front washer switch OFF	OFF	
FR WASHER SW	Front washer switch ON	ON	B. //
ED WIDED LOW	Front wiper switch OFF	OFF	M
FR WIPER LOW	Front wiper switch LO	ON	
ED WIDED III	Front wiper switch OFF	OFF	N
FR WIPER HI	Front wiper switch HI	ON	
ED WIDED INT	Front wiper switch OFF	OFF	
FR WIPER INT	Front wiper switch INT	ON	
ED WIDED OTOD	Any position other than front wiper stop position	OFF	
FR WIPER STOP	Front wiper stop position	ON	P
11474DD 0141	When hazard switch is not pressed	OFF	
HAZARD SW	When hazard switch is pressed	ON	
LICUT OW 40T	Lighting switch OFF	OFF	
LIGHT SW 1ST	Lighting switch 1st	ON	

< ECU DIAGNOSIS >

Monitor Item	Condition	Value/Status
HEADLAMP SW1	Headlamp switch OFF	OFF
HEADLAWF 3W1	Headlamp switch 1st	ON
HEADLAMP SW2	Headlamp switch OFF	OFF
HEADLAWP SWZ	Headlamp switch 1st	ON
LII DE AM CVA	High beam switch OFF	OFF
HI BEAM SW	High beam switch HI	ON
H/L WASH SW	NOTE: The item is indicated, but not monitored	OFF
IGN ON SW	Ignition switch OFF or ACC	OFF
IGN ON SW	Ignition switch ON	ON
IONI CIM CANI	Ignition switch OFF or ACC	OFF
IGN SW CAN	Ignition switch ON	ON
INT VOLUME	Wiper intermittent dial is in a dial position 1 - 7	1 - 7
	LOCK button of Intelligent Key is not pressed	OFF
I-KEY LOCK ¹	LOCK button of Intelligent Key is pressed	ON
	UNLOCK button of Intelligent Key is not pressed	OFF
I-KEY UNLOCK ¹	UNLOCK button of Intelligent Key is pressed	ON
14E) 4 ON OW	Mechanical key is removed from key cylinder	OFF
KEY ON SW	Mechanical key is inserted to key cylinder	ON
2	LOCK button of key fob is not pressed	OFF
KEYLESS LOCK ²	LOCK button of key fob is pressed	ON
2	UNLOCK button of key fob is not pressed	OFF
KEYLESS UNLOCK ²	UNLOCK button of key fob is pressed	ON
OIL PRESS SW	Ignition switch OFF or ACC Engine running	OFF
	Ignition switch ON	ON
DA COINIC CW	Other than lighting switch PASS	OFF
PASSING SW	Lighting switch PASS	ON
1	Return to ignition switch to LOCK position	OFF
PUSH SW ¹	Press ignition switch	ON
DE 4 D DE E 011/	Rear window defogger switch OFF	OFF
REAR DEF SW	Rear window defogger switch ON	ON
RKE LOCK AND	NOTE:	OFF
UNLOCK ²	The item is indicated, but not monitored	ON
	Rear washer switch OFF	OFF
RR WASHER SW	Rear washer switch ON	ON
	Rear wiper switch OFF	OFF
RR WIPER INT	Rear wiper switch INT	ON
DD WIDES ON	Rear wiper switch OFF	OFF
RR WIPER ON	Rear wiper switch ON	ON
DD WIDED OTCO	Rear wiper stop position	OFF
RR WIPER STOP	Other than rear wiper stop position	ON
TAIL LAND CO.	Lighting switch OFF	OFF
TAIL LAMP SW	Lighting switch 1ST	ON

< ECU DIAGNOSIS >

Monitor Item	Condition	Value/Status
TRNK OPNR SW	When back door opener switch is not pressed	OFF
TRINK OPINK SW	When back door opener switch is pressed	ON
TURN SIGNAL L	Turn signal switch OFF	OFF
TORN SIGNAL L	Turn signal switch LH	ON
TURN SIGNAL R	Turn signal switch OFF	OFF
TURN SIGNAL K	Turn signal switch RH	ON
VEHICLE SPEED	While driving	Equivalent to speedometer reading

^{1:} With Intelligent Key

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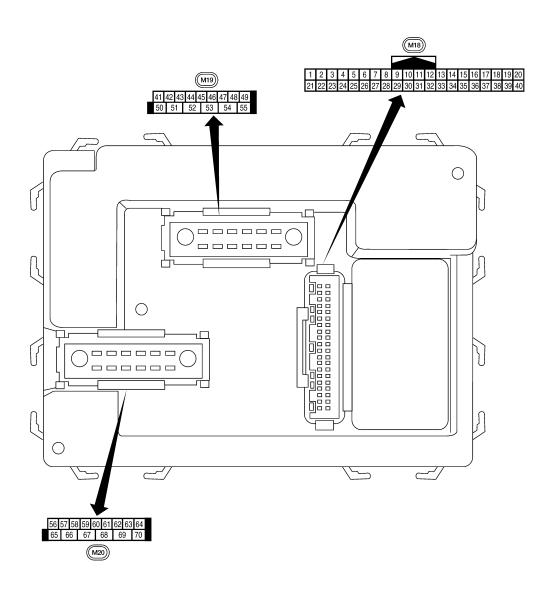
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^{2:} With remote keyless entry system

Terminal Layout



LIIA2443E

Physical Values

			Signal		Measuring condition	
Terminal	Wire color	Signal name	input/ output	Ignition switch	Operation or condition	Reference value or waveform (Approx.)
	DD	Ignition keyhole illumi-	0 1 1	OFF	Door is locked (SW OFF)	Battery voltage
1	BR	nation	Output	OFF	Door is unlocked (SW ON)	0V
2	Р	Combination switch input 5	Input	ON	Lighting, turn, wiper OFF Wiper dial position 4	(V) 6 4 2 0 ++5ms SKIA5291E
3	SB	Combination switch input 4	Input	ON	Lighting, turn, wiper OFF Wiper dial position 4	(V) 6 2 0 ***5ms SKIA5292E
4	V	Combination switch input 3	Input	ON	Lighting, turn, wiper OFF Wiper dial position 4	(V) 6 4 2 0 ++5ms SKIA5291E
5	L	Combination switch input 2				(V)
6	R	Combination switch input 1	Input	ON	Lighting, turn, wiper OFF Wiper dial position 4	***5ms SKIA5292E
	.,	Rear window defogger		011	Rear window defogger switch ON	OV
9	Y	switch	Input	ON	Rear window defogger switch OFF	5V
11	G/B	Ignition switch (ACC or ON)	Input	ACC or ON	Ignition switch ACC or ON	Battery voltage
12	LG	Front door switch RH	Input	OFF	ON (open)	0V
12	LG	I TOTIL GOOT SWILCH KIT	input	OFF	OFF (closed)	Battery voltage
13	L	Rear door switch RH	Input	OFF	ON (open)	0V
.5	_	. todi dooi owitori titi	pat	Ü. i	OFF (closed)	Battery voltage
15	W	Tire pressure warning check connector	Input	OFF	_	5V
18	BR	Remote keyless entry receiver and optical sensor (ground)	Output	OFF	_	OV

	Miro		Signal		Measuring condition	Deference value or waveform
Terminal	Wire color	Signal name	input/ output	Ignition switch	Operation or condition	Reference value or waveform (Approx.)
19	V	Remote keyless entry receiver (power sup- ply)	Output	OFF	Ignition switch OFF	(V) 6 4 2 0 **50 ms
20	G	Remote keyless entry receiver (signal)	Input	OFF	Stand-by (keyfob buttons re- leased)	(V) 6 4 2 0 *********************************
				When remote keyless entry receiver receives signal from keyfob (keyfob buttons pressed)	(V) 6 4 2 0 1 + 50 ms	
21	GR	NATS antenna amp.	Input	OFF → ON	Ignition switch (OFF \rightarrow ON)	Just after turning ignition switch ON: Pointer of tester should move for approx. 1 second, then return to battery voltage.
22	V	BUS	_	_	Ignition switch ON or power window timer operates	(V) 15 10 5 0 200 ms
23	G	Security indicator lamp	Output	OFF	Goes OFF \rightarrow illuminates (Every 2.4 seconds)	Battery voltage → 0V
25	BR	NATS antenna amp.	Input	OFF → ON	Ignition switch (OFF \rightarrow ON)	Just after turning ignition switch ON: Pointer of tester should move for approx. 1 second, then return to battery voltage.
27	W	Compressor ON signal	Input	ON	A/C switch OFF A/C switch ON	5V 0V
28	LG	Front blower monitor	Input	ON	Front blower motor OFF Front blower motor ON	Battery voltage 0V
29	G	Hazard switch	Input	OFF	ON OFF	0V 5V
30 ¹	G	Back door opener switch	Input	OFF	ON (open) OFF (closed)	0V Battery voltage
30 ²	SB	Back door opener switch	Input	OFF	ON (open) OFF (closed)	0V Battery voltage

< ECU DIAGNOSIS >

	14/:		Signal		Measuring condition	Reference value or waveform
Terminal	Wire color	Signal name	input/ output	Ignition switch	Operation or condition	(Approx.)
32	0	Combination switch output 5	Output	ON	Lighting, turn, wiper OFF Wiper dial position 4	(V) 4 2 0 *
33	GR	Combination switch output 4	Output	ON	Lighting, turn, wiper OFF Wiper dial position 4	(V) 6 4 2 0 ***5ms
34	G	Combination switch output 3	Output	ON	Lighting, turn, wiper OFF Wiper dial position 4	(V) 4 2 0 +-5ms SKIA5291E
35	BR	Combination switch output 2				(V)
36	LG	Combination switch output 1	Output	ON	Lighting, turn, wiper OFF Wiper dial position 4	5ms SKIA5292E
37 ¹	В	Key switch and key	Input	OFF	Key inserted	Battery voltage
		lock solenoid			Key inserted	0V
37 ²	В	Key switch and ignition knob switch	Input	OFF	Intelligent Key inserted	Battery voltage
38	W/R	Ignition switch (ON)	Input	ON	Intelligent Key inserted	0V Battery voltage
39	L VV/K	CAN-H	Input —	— —		— Dattery voltage
40	Р	CAN-L		_	_	
		Glass hatch ajar			Glass hatch open	0
42	LG	switch	Input	ON	Glass hatch closed	Battery
	_	5 1 1		0	ON (open)	0V
43	Р	Back door latch switch	Input	OFF	OFF (closed)	Battery voltage

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	14/:		Signal		Measuring condition	Defenses and a service of the service
Terminal	Wire color	Signal name	input/ output	Ignition switch	Operation or condition	Reference value or waveform (Approx.)
					Rise up position (rear wiper arm on stopper)	0V
					A Position (full clockwise stop position)	Battery voltage
44	0	Rear wiper auto stop switch	Input	ON	Forward sweep (counterclockwise direction)	Fluctuating
					B Position (full counterclockwise stop position)	0V
					Reverse sweep (clockwise direction)	Fluctuating
47	GR	Front door switch LH	Innut	OFF	ON (open)	0V
41	GIX	1 TOTAL GOOF SWILCH LIT	Input	Oil	OFF (closed)	Battery voltage
48	Р	Rear door switch LH	Innut	OFF	ON (open)	0V
40	Р	Real door switch Ln	Input	OFF	OFF (closed)	Battery voltage
49		Cargo lamp	Output	OFF	Any door open (ON)	0V
49	L	Cargo lamp	Output	OFF	All doors closed (OFF)	Battery voltage
51	G	Trailer turn signal (right)	Output	ON	Turn right ON	(V) 15 10 5 0 500 ms SKIA3009J
52	V	Trailer turn signal (left)	Output	ON	Turn left ON	(V) 15 10 5 0 5 0 SKIA3009J
53	L	Back door latch actua- tor	Output	OFF	OFF	0
					ON	Battery voltage
55	W	Rear wiper output cir- cuit 1	Output	ON	OFF	0
		Cuit i			ON	Battery voltage
56	V	Battery saver output	Output	OFF	30 minutes after ignition switch is turned OFF	0V
				ON	_	Battery voltage
57	R/Y	Battery power supply	Input	OFF	_	Battery voltage
58	W	Optical sensor	Input	ON	When optical sensor is illuminated	3.1V or more
					When optical sensor is not illuminated	0.6V or less
50	0.5	Front door lock as-	0	055	OFF (neutral)	0V
59	GR	sembly LH actuator (unlock)	Output	OFF	ON (unlock)	Battery voltage

< ECU DIAGNOSIS >

	Wire		Signal		Measuring cond	dition	Reference value or waveform									
Terminal	color	Signal name	input/ output	Ignition switch	Operation	or condition	(Approx.)									
60	LG	Turn signal (left)	Output	ON	Turn left ON		(V) 15 10 500 ms SKIA3009J									
61	G	Turn signal (right)	Output	ON	Turn right ON		(V) 15 10 500 ms SKIA3009J									
63	BR	Interior room/map	Output	OFF	Any door	ON (open)	0V									
		lamp			switch	OFF (closed)	Battery voltage									
65	V	All door lock actuators	Output	OFF	OFF (neutral)		0V									
		(lock)	<u>'</u>		ON (lock)		Battery voltage									
		Front door lock actua-			OFF (neutral)		0V									
66	L	tor RH, rear door lock actuators LH/RH and glass hatch lock actu- ator (unlock)	Output	OFF	ON (unlock)		Battery voltage									
67	В	Ground	Input	ON	_		0V									
					Ignition switch ON		Battery voltage									
		O Power window power supply (RAP)												Within 45 seco		Battery voltage
68	0		Output	t	More than 45 s	econds after ig-	OV									
					When front doo open or power operates		OV									
69	L	Power window power supply	Output	_	-	_	Battery voltage									
70	W	Battery power supply	Input	OFF	-	_	Battery voltage									

^{1:} With remote keyless entry system

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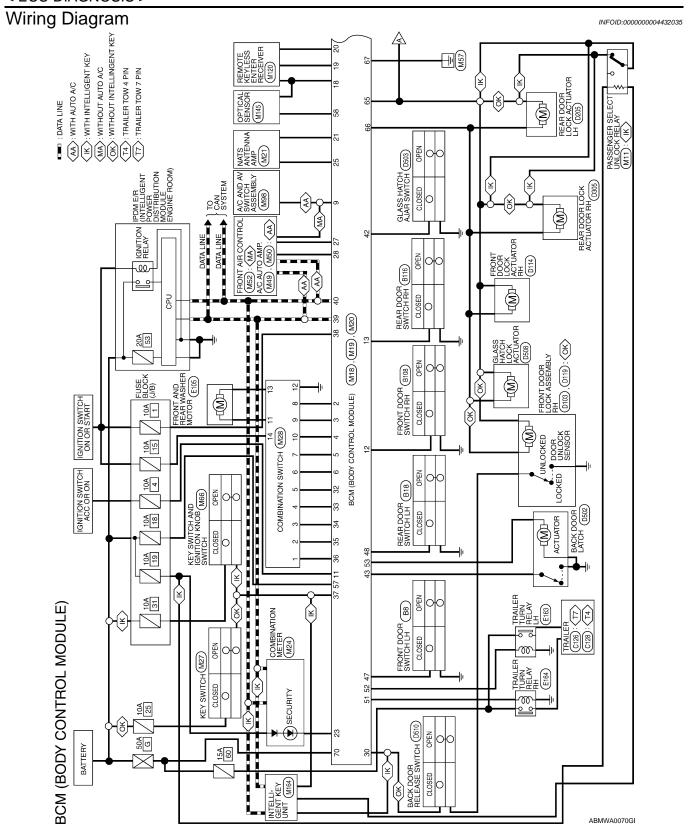
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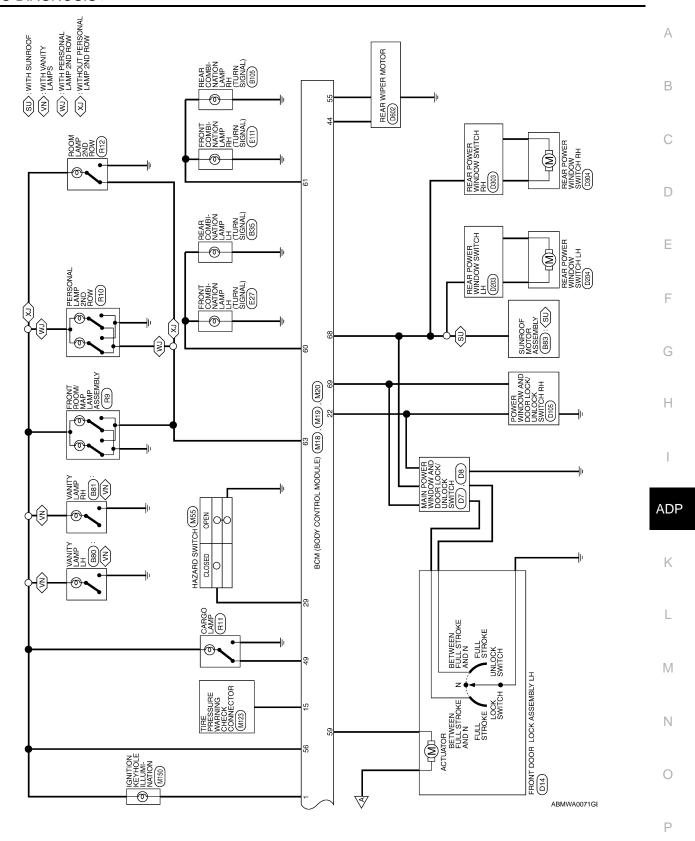
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^{2:} With Intelligent Key system





OUTPUT 2

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IMMOBILIZER ANTENNA SIG (CLOCK)

GR

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OUTPUT 1

<u>6</u>

KEY SW IGN SW

W/R

SECURITY INDICATOR OUTPUT

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23

ANTI-PINCH SERIAL LINK (RX,TX)

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22

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38 39 40

CAN-H

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LIFTGATE OPENER SW WITHOUT INTELLIGENT KEY SYSTEM)

33

KEYLESS TUNER POWER SUPPLY OUTPUT

>

19

KEYLESS AND AUTOLIGHT SENSOR GND

BB

OUTPUT 5
OUTPUT 4
OUTPUT 3

GR

33

KEYLESS TUNER SIGNAL

Q

20

0

BACK DOOR AUTO CLOSURE (WITH INTELLIGENT KEY SYSTEM)

SB

30

BLOWER FAN SW HAZARD SW

P

Q

TPMS MODE TRIGGER SW

≥ |

1

41 51 71 81 81

13

≥

26 27 28 29

AIRCON SW

IMMOBILIZER ANTENNA SIGNAL (TX,RX)

25

DOOR SW (AS)

Signal Name

Color of Wire

Terminal No.

Signal Name ACC SW

Color of Wire G/B LG

Terminal No.

12 | 1

BCM (BODY CONTROL MODULE) CONNECTORS

Jo. M18	Connector Name BCM (BODY CONTROL MODULE)	Sonnector Color WHITE
Connector No.	Connector N	Connector C

1		
	23	40
	19	33
	18	38
	17	37
	10 11 12 13 14 15 16 17 18 19 20	98
	15	35
	4	34
	13	33
117	12	32
IV.	Ξ	31
IN.	9	30
\	6	62
	-	28
	7	27
	9	21 22 23 24 25 26 27 28 29 30 31 32 33 34 35 36 37 38 39
	2	25
	4	24
(ó	က	23
T I	2	22
管	-	21

REAR DEFOGGER SW	>
ı	ı
1	1
INPUT 1	œ
INPUT 2	_
INPUT 3	>
INPUT 4	SB
INPUT 5	۵
KEY RING OUTPUT	BB
Color of Signal Name	•

Signal Name	TRAILER FLASHER OUTPUT (LEFT)	LIFT GATE OPENER OUTPUT	ı	REAR WIPE MOTOR OUTPUT1
Color of Wire	>		1	8
Terminal No. Wire	52	53	54	22

Signal Name	REAR WIPE AUTO STOP SW1	1	1	DOOR SW (DR)	DOOR SW (RL)	LUGGAGE LAMP OUTPUT	_	TRAILER FLASHER OUTPUT (RIGHT)
Color of Wire	0	ı	1	GR	۵	Т	_	G
Terminal No.	44	45	46	47	48	67	09	51

Connector No
Connector Name
Connector Color WHITE
Color of Wire
١.
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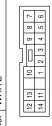
Signal Name	FLASHER OUTPUT (RIGHT)	ı	ROOM LAMP	I	DOOR LOCK OUTPUT (ALL)	DOOR UNLOCK OUTPUT (OTHER)	GND (POWER)	POWER WINDOW POWER SUPPLY OUT-PUT (LINKED TO RAP)	POWER WINDOW POWER SUPPLY OUTPUT (BAT)	BAT (F/L)
Color of Wire	ŋ	1	BR	ı	^	7	В	0	Г	M
Terminal No.	61	62	63	64	99	99	29	89	69	0/

Signal Name	INPUT 1	INPUT 2	INPUT 3	INPUT 4	INPUT 5	OUTPUT 1	OUTPUT 2	OUTPUT 5	OUTPUT 4	OUTPUT 3	WASHER MOTOR (RR+)	GND	WASHER MOTOR (RR-)	IGN
Color of Wire	LG	BR	σ	GR	0	œ	Г	Ь	SB	>	0	В	Τ	W/G
Terminal No.	-	2	က	4	5	9	7	8	6	10	11	12	13	14

Connector No.	M20
Connector Name	Connector Name BCM (BODY CONTROL MODULE)
Connector Color BLACK	BLACK
	56 57 58 59 60 61 62 63 64 66 67 68 69 70

Signal Name	BAT SAVER OUTPUT	BAT (FUSE)	AUTO LIGHT SENSOR INPUT 2	DOOR UNLOCK OUTPUT (DR)	FLASHER OUTPUT (LEFT)
Color of Wire	>	R/Y	W	GR	LG
Terminal No.	99	22	58	29	09

Connector No.	M28
Connector Name	Connector Name COMBINATION SWITCH
Connector Color WHITE	WHITE
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Fail Safe

Fail-safe index

BCM performs fail-safe control when any DTC listed below is detected.

BCM (BODY CONTROL MODULE)

< ECU DIAGNOSIS >

Display contents of CONSULT	Fail-safe	Cancellation
U1000: CAN COMM CIRCUIT	Inhibit engine cranking	When the BCM re-establishes communication with the other modules.
U1010: CONTROL UNIT (CAN)	Inhibit engine cranking	When the BCM re-start communicating with the other modules.

DTC Inspection Priority Chart

INFOID:0000000004432037

If some DTCs are displayed at the same time, perform inspections one by one based on the following priority chart.

Priority	DTC
1	U1000: CAN COMM CIRCUIT U1010: CONTROL UNIT (CAN)
2	 B2190: NATS ANTENNA AMP B2191: DIFFERENCE OF KEY B2192: ID DISCORD BCM-ECM B2193: CHAIN OF BCM-ECM B2013: STRG COMM 1 B2552: INTELLIGENT KEY B2590: NATS MALFUNCTION
3	C1729: VHCL SPEED SIG ERR C1735: IGNITION SIGNAL
4	 C1704: LOW PRESSURE FL C1705: LOW PRESSURE FR C1706: LOW PRESSURE RR C1707: LOW PRESSURE RL C1708: [NO DATA] FL C1709: [NO DATA] FR C1710: [NO DATA] RR C1711: [NO DATA] RR C1712: [CHECKSUM ERR] FL C1713: [CHECKSUM ERR] FR C1714: [CHECKSUM ERR] RR C1715: [CHECKSUM ERR] RR C1716: [PRESSDATA ERR] FL C1717: [PRESSDATA ERR] FR C1719: [PRESSDATA ERR] FR C1719: [PRESSDATA ERR] RR C1719: [CODE ERR] FL C1720: [CODE ERR] FR C1721: [CODE ERR] RR C1722: [CODE ERR] RR C1723: [CODE ERR] RL C1724: [BATT VOLT LOW] FR C1725: [BATT VOLT LOW] FR C1726: [BATT VOLT LOW] RR C1727: [BATT VOLT LOW] RR

DTC Index

NOTE:

Details of time display

- CRNT: Displays when there is a malfunction now or after returning to the normal condition until turning ignition switch OFF → ON again.
- 1 39: Displayed if any previous malfunction is present when current condition is normal. It increases like 1
 → 2 → 3...38 → 39 after returning to the normal condition whenever ignition switch OFF → ON. The counter
 remains at 39 even if the number of cycles exceeds it. It is counted from 1 again when turning ignition switch
 OFF → ON after returning to the normal condition if the malfunction is detected again.

CONSULT display	Fail-safe	Intelligent Key warning lamp ON	Tire pressure monitor warning lamp ON	Reference page	Α
No DTC is detected. further testing may be required.	_	_	_	_	Е
U1000: CAN COMM CIRCUIT	_	_	_	BCS-33	
U1010: CONTROL UNIT (CAN)	_	_	_	BCS-34	- C
B2013: STRG COMM 1	_	_	_	<u>SEC-27</u>	_
B2190: NATS ANTTENA AMP	_	_	_	SEC-30 (with I- Key), SEC-136 (without I-Key)	
B2191: DIFFERENCE OF KEY	_	_	_	SEC-33 (with I- Key), SEC-139 (without I-Key)	E
B2192: ID DISCORD BCM-ECM	_	_	_	SEC-34 (with I- Key), SEC-140 (without I-Key)	F
B2193: CHAIN OF BCM-ECM	_	_	_	SEC-36 (with I- Key), SEC-142 (without I-Key)	G
B2552: INTELLIGENT KEY	_	_	_	<u>SEC-38</u>	_
B2590: NATS MALFUNCTION	_	_	_	<u>SEC-39</u>	-
C1708: [NO DATA] FL	_	_	_	<u>WT-14</u>	_
C1709: [NO DATA] FR	_	_	_	<u>WT-14</u>	
C1710: [NO DATA] RR	_	_	_	<u>WT-14</u>	
C1711: [NO DATA] RL	_	_	_	<u>WT-14</u>	
C1712: [CHECKSUM ERR] FL	_	_	_	<u>WT-16</u>	ΑĽ
C1713: [CHECKSUM ERR] FR	_	_	_	<u>WT-16</u>	
C1714: [CHECKSUM ERR] RR	_	_	-	<u>WT-16</u>	_ 1/
C1715: [CHECKSUM ERR] RL	_	_	_	<u>WT-16</u>	- K
C1716: [PRESSDATA ERR] FL	_	_	_	<u>WT-18</u>	_
C1717: [PRESSDATA ERR] FR	_	_	_	<u>WT-18</u>	L
C1718: [PRESSDATA ERR] RR	_	_	_	<u>WT-18</u>	
C1719: [PRESSDATA ERR] RL	_	_	_	<u>WT-18</u>	
C1720: [CODE ERR] FL	_	_	_	<u>WT-16</u>	
C1721: [CODE ERR] FR	_	_	_	<u>WT-16</u>	=
C1722: [CODE ERR] RR	_	_	_	<u>WT-16</u>	
C1723: [CODE ERR] RL	_	_	_	<u>WT-16</u>	
C1724: [BATT VOLT LOW] FL	_	_	_	<u>WT-16</u>	-
C1725: [BATT VOLT LOW] FR		_		<u>WT-16</u>	
C1726: [BATT VOLT LOW] RR	_	_	_	<u>WT-16</u>	
C1727: [BATT VOLT LOW] RL	_	_	_	<u>WT-16</u>	- - F
C1729: VHCL SPEED SIG ERR	_	_	_	<u>WT-19</u>	- [
C1735: IGNITION SWITCH	_	_	_	_	-

SYMPTOM DIAGNOSIS

ADP SYSTEM SYMPTOMS

Symptom Table

NOTE:

Always perform the "Basic Inspection" before performing diagnosis in the following table. Refer to <u>ADP-5.</u> "Work Flow".

SYMPTOM 1

Sympton	า	Diagnosis procedure	Reference page
	Sliding operation	Check sliding switch.	<u>ADP-44</u>
	Reclining operation	Check reclining switch.	ADP-46
	Lifting operation (front)	Check lifting switch (front).	ADP-48
	Lifting operation (rear)	Check lifting switch (rear).	ADP-50
Manual functions (for specific part) do	Pedal operation	Check pedal adjusting switch.	ADP-52
not operate		2. Check pedal adjusting sensor.	ADP-75
	Dear mirror energian	1. Changeover switch.	ADP-57
	Door mirror operation	2. Mirror switch	ADP-59
	All parts of seat	Check power seat switch ground circuit.	ADP-62

SYMPTOM 2

Sympton	1	Diagnosis procedure	Reference page
	Sliding operation	Check sliding sensor.	ADP-67
	Reclining operation	Check reclining sensor.	ADP-69
	Lifting operation (front)	Check lifting sensor (front).	ADP-71
Mamory functions (for apositionart) do	Lifting operation (rear)	Check lifting sensor (rear).	ADP-73
Memory functions (for specific part) do not operate	Pedal operation	Check pedal adjusting sensor.	ADP-75
	Door mirror operation	Check door mirror sensor.	Driver side: ADP-77 Passenger side: ADP-79

SYMPTOM 3

Sympton	1	Diagnosis procedure	Reference page
	Sliding operation	Check sliding motor.	ADP-81
	Reclining operation	Check reclining motor.	ADP-83
Memory functions and manual func-	Lifting operation (front)	Check lifting motor (front).	ADP-85
tions (for specific part) do not operate	Lifting operation (rear)	Check lifting motor (rear).	ADP-87
	Pedal operation	Check pedal adjusting motor.	ADP-89
	Door mirror operation	Check door mirror motor.	ADP-91

SYMPTOM 4

ADP SYSTEM SYMPTOMS

< SYMPTOM DIAGNOSIS >

Symptom	Diagnosis procedure	Reference page
	Check system setting.	ADP-20
Entry/Exit assist function does not operate.	2. Perform initialization.	ADP-21
	3. Check front door switch (driver side).	ADP-65
Intelligent Key interlock function does not operate.	1. Check door lock function.	DLK-22
(Other automatic operations and Intelligent Key system are normal)	2. Perform memory storing.	ADP-10

SYMPTOM 5

Symptom	Diagnosis procedure	Reference page
Memory indicators 1 and/or 2 do not illuminate.	Check seat memory switch.	<u>ADP-55</u>
iviernory indicators 1 and/or 2 do not indiffinate.	2. Check seat memory indicator.	ADP-94

SYMPTOM 6

Symptom	Diagnosis procedure	Reference page
Memory operation does not operate.	Check A/T device (park position switch).	<u>ADP-63</u>

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NORMAL OPERATING CONDITION

NORMAL OPERATING CONDITION

Description INFOID:000000003935604

The following symptoms are normal operations, and they do not indicate a malfunction.

Symptom	Cause	Action to take	Reference page
	No initialization has been performed.	Perform initialization.	<u>ADP-19</u>
Entry/Exit assist function does not operate.	Entry/exit assist function is disabled. NOTE: The entry/exit assist function is disabled before delivery (initial setting).	Change the settings.	ADP-22
Entry assist function does not operate.	Manual operation with power seat switch was performed after exit assist function excution.	Perform the memory function.	ADP-22
			Memory function: ADP-16
Memory function, entry/exit assist function or Intelligent Key in-	The operating conditions are not fulfilled.	Fulfill the operation	Exit assist function: <u>ADP-20</u>
terlock function does not operate.		conditions.	Entry assist function: ADP-22
			Intelligent Key interlock function: ADP-10

PRECAUTION

PRECAUTIONS

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

The Supplemental Restraint System such as "AIR BAG" and "SEAT BELT PRE-TENSIONER", used along with a 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.

Precaution Necessary for Steering Wheel Rotation After Battery Disconnect

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NOTE:

- This Procedure is applied only to models with Intelligent Key system and NATS (NISSAN ANTI-THEFT SYS-
- Remove and install all control units after disconnecting both battery cables with the ignition knob in the "LOCK" position.
- Always use CONSULT-III 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.
- Disconnect both battery cables. The steering lock will remain released and the steering wheel can be rotated.
- 4. Perform the necessary repair operation.
- 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.)
- Perform a self-diagnosis check of all control units using CONSULT-III.

Precaution for Work

 When removing or disassembling each component, be careful not to damage or deform it. If a component may be subject to interference, be sure to protect it with a shop cloth.

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PRECAUTIONS

< PRECAUTION >

- When removing (disengaging) components with a screwdriver or similar tool, be sure to wrap the component with a shop cloth or vinyl tape to protect it.
- Protect the removed parts with a shop cloth and keep them.
- Replace a deformed or damaged clip.
- If a part is specified as a non-reusable part, always replace it with new one.
- Be sure to tighten bolts and nuts securely to the specified torque.
- After re-installation is completed, be sure to check that each part works normally.
- Follow the steps below to clean components.
- Water soluble foul: Dip a soft cloth into lukewarm water, and wring the water out of the cloth to wipe the fouled area.
 - Then rub with a soft and dry cloth.
- Oily foul: Dip a soft cloth into lukewarm water with mild detergent (concentration: within 2 to 3%), and wipe the fouled area.
 - Then dip a cloth into fresh water, and wring the water out of the cloth to wipe the detergent off. Then rub with a soft and dry cloth.
- Do not use organic solvent such as thinner, benzene, alcohol, or gasoline.
- For genuine leather seats, use a genuine leather seat cleaner.

PRE-INSPECTION FOR DIAGNOSTIC

< ON-VEHICLE MAINTENANCE > ON-VEHICLE MAINTENANCE Α PRE-INSPECTION FOR DIAGNOSTIC **Basic Inspection** INFOID:0000000003935607 $oldsymbol{1}_{ ext{-}}$ CHECK POWER SUPPLY AND DROUND CIRCUIT Check the power supply and ground circuit as shown below. Driver seat control unit :Refer to ADP-42, "DRIVER SEAT CONTROL UNIT : Diagnosis Procedure". Automatic drive positioner control unit: Refer to ADP-42, "AUTOMATIC DRIVE POSITIONER CONTROL UNIT: Diagnosis Procedure". D Is the inspection result normally? YES >> GO TO 2 NO >> Repair or replace the malfunctioning part. Е 2 . CHECK MANUAL FUNCTION Check the manual function operations by operating the relevant switches as shown below. Seat (slide, reclining, lifting front, lifting rear) F Pedal assembly (forward, backward) Door mirror Do all manual functions operate normally? YES >> GO TO 3 NO (Seat, pedal, door mirror)>>Go to SYMPTOM 1, refer to ADP-150, "Symptom Table". And, GO TO 4 if the result of SYMPTOM 1 is OK. Н $3.\,$ CHECK MEMORY FUNCTION 1 Register the seat positions (refer to Owner's Manual) and check that all parts of the seat, pedals, and door mirrors move to their memory positions correctly. Are the operations normal? YES >> Check each malfunction according to the instruction of the SYMPTOM 4, refer to ADP-150. ADP "Symptom Table". NO (memory indicator operates normally)>> Go to SYMPTOM 2, refer to ADP-150, "Symptom Table". NO (memory indicator does not operate normally either)>> GO TO 5 K f 4 . CHECK MEMORY FUNCTION 2 Register the seat positions (refer to Owner's Manual) and check that all parts of the seat, pedals, and door mirrors move to their memory positions correctly. L Are the operations normal? YFS >> Check intermittent incident. Refer to GI-49, "Intermittent Incident". NO >> GO TO 7 M ${f 5}$. CHECK SEAT MEMORY SWITCH/MEMORY INDICATOR Check the seat memory switch/memory switch indicator of the SYMPTOM 5, refer to ADP-150, "Symptom Table". N Is the inspection result normal? YES >> GO TO 6 NO >> Repair or replace the malfunctioning part. O. CHECK OPERATION CONDITION Check the memory operation conditions (refer to ADP-10, "AUTOMATIC DRIVE POSITIONER SYSTEM: System Description"). Are all operation conditions fulfilled? YES >> Go to SYMPTOM 6, refer to ADP-150, "Symptom Table".

NO

System Description".

1. CHECK MECHANISM

>> Fulfill the operation conditions. Refer to ADP-10, "AUTOMATIC DRIVE POSITIONER SYSTEM:

PRE-INSPECTION FOR DIAGNOSTIC

< ON-VEHICLE MAINTENANCE >

Check for the following.

- Mechanism deformation or pinched foreign materials.
- Interference with other parts because of poor installation.

Is any malfunction present in the relevant parts?

YES >> Go to SYMPTOM 3, refer to ADP-150, "Symptom Table".

NO >> Repair or replace the malfunctioning part.

PREPARATION

PREPARATION

PREPARATION

Special Service Tool

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

Tool number (Kent-Moore No.) Tool name		Description	(
	AAAAA	Locating the noise	
			E
	SIIA0993E		F
		Repairing the cause of noise	
(J-43980) NISSAN Squeak and Rattle Kit			ŀ
	SIIA0994E		

Commercial Service Tool

INFOID:0000000003935609

(Kent-Moore No.) Tool name		Description	I
(J-39565) Engine ear		Locating the noise	N
	SIIA0995E		1

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DRIVER SEAT CONTROL UNIT

< ON-VEHICLE REPAIR >

ON-VEHICLE REPAIR

DRIVER SEAT CONTROL UNIT

Removal and Installation

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Refer to SE-33, "Exploded View" for removal and installation of driver seat control unit.

AUTOMATIC DRIVE POSITIONER CONTROL UNIT

< ON-VEHICLE REPAIR >

AUTOMATIC DRIVE POSITIONER CONTROL UNIT

Removal and Installation

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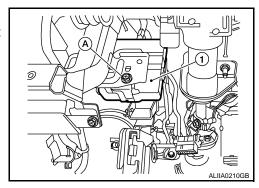
Н

REMOVAL

CAUTION:

When removing and installing, use shop cloths to protect parts from damage.

- 1. Remove the battery negative terminal.
- 2. Remove the instrument driver lower panel. Refer to IP-11, "Removal and Installation".
- 3. Remove the screw (A).
- 4. Remove automatic drive positioner control unit (1) from bracket and disconnect electrical connectors.



INSTALLATION

Installation is in the reverse order of removal.

CAUTION:

• Clamp the harness in position.

NOTE:

After installing the automatic drive positioner control unit, perform additional service when disconnecting battery negative terminal. Refer to <u>ADP-8</u>, "Special Repair Requirement".

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SEAT MEMORY SWITCH

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< ON-VEHICLE REPAIR >

SEAT MEMORY SWITCH

Removal and Installation

Refer to INT-14, "Removal and Installation" for removal and installation of seat memory switch.

DOOR MIRROR REMOTE CONTROL SWITCH

< ON-VEHICLE REPAIR >

DOOR MIRROR REMOTE CONTROL SWITCH

DOOK WINKTOK KEMOTE CONTINUE CWITCH

Removal and Installation

Refer to MIR-15, "Door Mirror Assembly" for removal and installation of door mirror remote control switch.

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PEDAL ADJUSTING MOTOR

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PEDAL ADJUSTING MOTOR

Removal and Installation

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Refer to <u>ACC-4, "Removal and Installation"</u> for accelerator pedal and <u>BR-23, "Removal and Installation"</u> for brake pedal when removing pedal adjusting motors.