SECTION MIR
MIRRORS

CONTENTS

WITH ADP

BASIC INSPECTION

DIAGNOSIS AND REPAIR WORKFLOW

Work Flow

INFOID:0000000000962307

DETAILED FLOW

1. OBTAIN INFORMATION ABOUT SYMPTOM

Interview the customer to obtain the malfunction information (conditions and environment when the malfunction occurred) as much as possible when the customer brings the vehicle in.

>> GO TO 2.

2. REPRODUCE THE MALFUNCTION INFORMATION

Check the malfunction on the vehicle that the customer describes.
Inspect the relation of the symptoms and the condition when the symptoms occur.

>> GO TO 3.

3. PERFORM “BASIC INSPECTION”

Perform the basic inspection.Refer to MIR-65, "Basic Inspection".

>> GO TO 4.

4. IDENTIFY THE MALFUNCTIONING SYSTEM WITH “SYMPTOM DIAGNOSIS”

Use “Symptom diagnosis” from the symptom inspection result in step 2. Then identify where to start performing the diagnosis based on possible causes and symptoms.

>> GO TO 5.

5. IDENTIFY MALFUNCTIONING PARTS WITH “COMPONENT DIAGNOSIS”

Perform the diagnosis with “Component diagnosis” of the applicable system.

>> GO TO 6.

6. REPAIR OR REPLACE THE MALFUNCTIONING PARTS

Repair or replace the specified malfunctioning parts.

>> GO TO 7.

7. FINAL CHECK

Check that malfunctions are not reproduced when obtaining the malfunction information from the customer, referring to the symptom inspection result in step 2.

Is the malfunctioning part repaired or replaced?

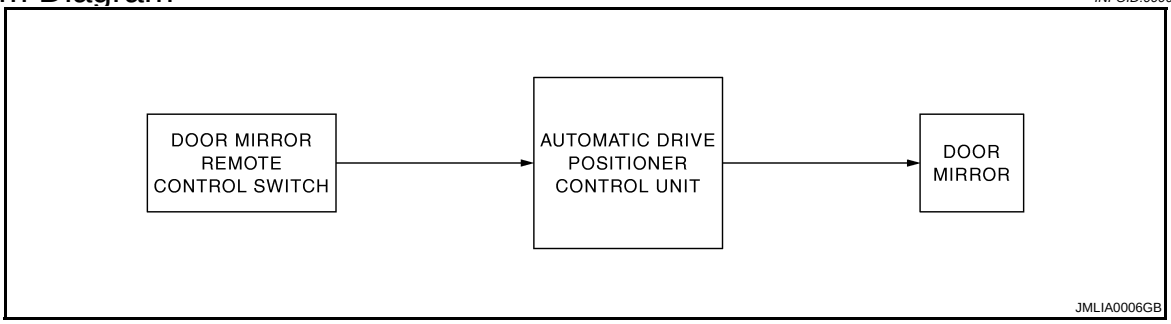
YES >> Trouble diagnosis is completed.
NO >> GO TO 3.

FUNCTION DIAGNOSIS

DOOR MIRROR SYSTEM

System Diagram

INFOID:0000000000962308



System Description

INFOID:0000000000962309

Automatic drive positioner linked operation

Refer to ADP-15, "AUTOMATIC DRIVE POSITIONER SYSTEM : System Description"

Manual operation

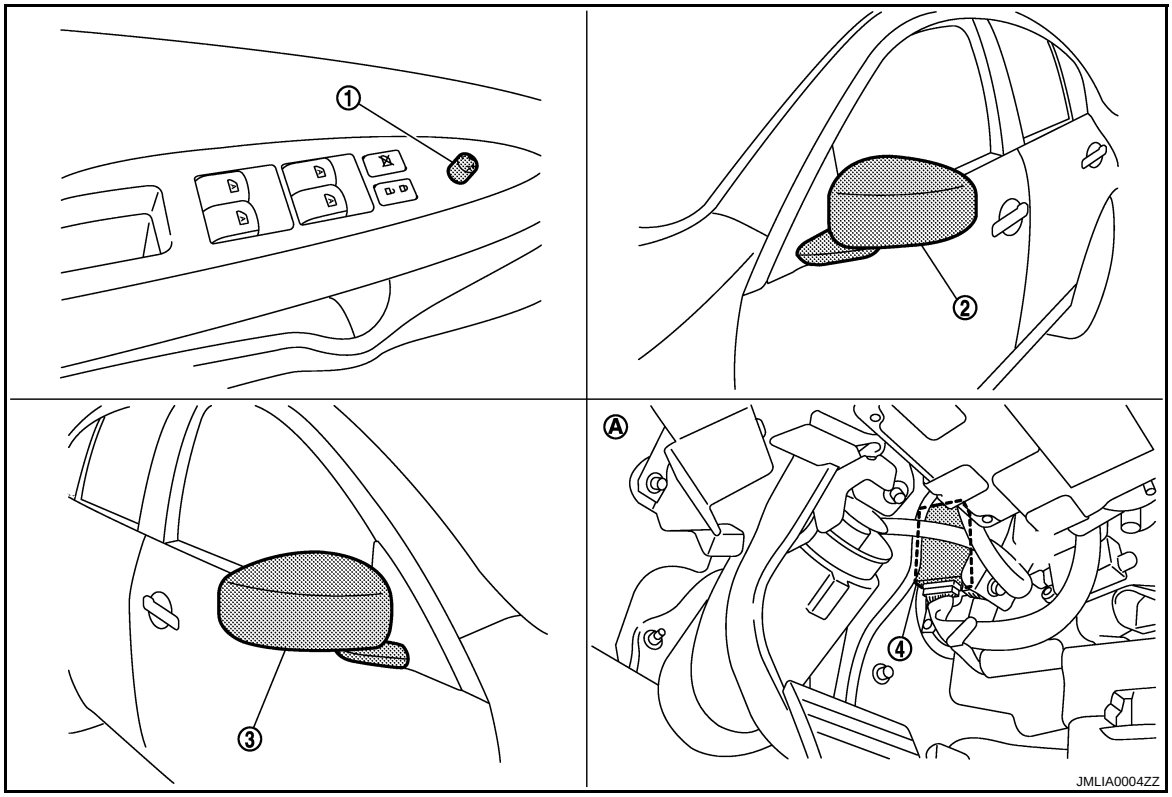
- Automatic drive positioner (ADP) control unit receives changeover switch signal and perform the LH/RH control of door mirror motor that supplies electric power when changeover switch is operated.
- Automatic drive positioner control unit receives mirror switch signal and supplies electric power to door mirror motor when mirror switch is operated.

INPUT/OUTPUT SIGNAL CHART

Switch	Input Signal to ADP	ADP function	Acutuator
Mirror switch	Mirror switch signal	Door mirror motor control	Door mirror motor
Changeover switch	Changeover switch signal		

Component Parts Location

INFOID:0000000000962310



1. Door mirror remote control switch D7
2. Door mirror (driver side) D3
3. Door mirror (passenger side) D33
4. Automatic drive positioner control unit M51,M52

A, View with instrument driver lower panel removed

Component Description

INFOID:0000000000962311

Component	Function
Automatic drive positioner control unit	Door mirror is supplied with power after receiving the input of the MIRROR SWITCH and CHANGEOVER SWITCH.
Mirror switch	It transmits mirror face adjust operation to AUTOMATIC DRIVE POSITIONER CONTROL UNIT.
Changeover switch	It transmits the LH/RH control of door mirror that supplies power to AUTOMATIC DRIVE POSITIONER CONTROL UNIT.
Door mirror	It makes mirror face operate from side to side and up and down via integrated motor.

INSIDE MIRROR SYSTEM

System Description

INFOID:0000000000962312

It senses the brightness of the headlight of the vehicle to the rear with the sensor integrated into the mirror. It automatically changes the light transmittance according to the sensed brightness of the light from the headlight.

Component Description

INFOID:0000000000962313

Component	Function
Auto anti-dazzling inside mirror	It automatically changes the light transmittance according to the brightness of the light from the headlight of the vehicle to the rear.

DIAGNOSIS SYSTEM (DRIVER SEAT C/U)

Diagnosis Description

INFOID:0000000000962314

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:0000000000962315

SELF-DIAGNOSIS RESULTS

Refer to ADP-156, "DTC Index".

DATA MONITOR

Monitor Item	Unit	Main Signals	Selection From Menu	Contents
SET SW	“ON/OFF”	×	×	ON/OFF status judged from the setting switch signal.
MEMORY SW 1	“ON/OFF”	×	×	ON/OFF status judged from the seat memory switch 1 signal.
MEMORY SW 2	“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.

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.
TILT SW-UP	“ON/OFF”	×	×	ON/OFF status judged from the tilt switch (up) signal.
TILT SW-DOWN	“ON/OFF”	×	×	ON/OFF status judged from the tilt switch (down) signal.
TELESCO SW-FR	“ON/OFF”	×	×	ON/OFF status judged from the telescoping switch (forward) signal.
TELESCO SW-RR	“ON/OFF”	×	×	ON/OFF status judged from the telescoping switch (backward) signal.
DETENT SW*1	“ON/OFF”	×	×	The selector lever position “OFF (P position) / ON (other than P position)” judged from the detention switch signal.
PARK BRAKE SW*2	“ON/OFF”	×	×	The parking brake condition “ON (applied) / OFF (release)” judged from the parking brake 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.
TILT SEN	“V”	–	×	Voltage input from tilt sensor is displayed.
TELESCO SEN	“V”	–	×	Voltage input from telescopic sensor is displayed.

*1:Only for AT models.

*2:Only for MT models.

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).
TILT MOTOR	Activates/deactivates the tilt motor.

Test item	Description
TELESCO MOTOR	Activates/deactivates the telescopic 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

NOTE:
This mode is only for AT model.

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

COMPONENT DIAGNOSIS

MIRROR SWITCH

Description

INFOID:0000000000962316

It operates angle of the door mirror face.
It transmits mirror face adjust operation to AUTOMATIC DRIVE POSITIONER CONTROL UNIT.

Component Function Check

INFOID:0000000000962317

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-48, "CONSULT-III Function".

Is the inspection result normal?

YES >> Mirror switch function is OK.
NO >> Refer to MIR-11, "Diagnosis Procedure".

Diagnosis Procedure

INFOID:0000000000962318

1. CHECK MIRROR SWITCH FUNCTION

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

Terminals			Mirror switch Condition	Voltage (V) (Approx.)
(+)		(–)		
Automatic drive positioner control unit connector	Terminal			
M51	3	Ground	UP	0
			Other than above	5
	4		LEFT	0
			Other than above	5
	19		DOWN	0
			Other than above	5
	20		RIGHT	0
			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 connector.
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
M51	3	D7	15	Existed
	4		13	
	19		12	
	20		4	

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

Automatic drive positioner control unit connector	Terminal		Continuity
M51	3	Ground	Not existed
	4		
	19		
	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
D7	7		Existed

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

Terminals			Voltage (V) (Approx.)
(+)		(-)	
Automatic drive positioner control unit connector	Terminal		
M51	3	Ground	5
	4		
	19		
	20		

Is the inspection result normal?

YES >> GO TO 5.
NO >> Replace automatic drive positioner control unit. Refer to ADP-218, "Removal and Installation".

5. CHECK MIRROR SWITCH

Check mirror switch
Refer to MIR-12, "Component Inspection".

Is the inspection result normal?

YES >> Refer to GI-39, "Intermittent Incident".
NO >> Replace door mirror remote control switch. Refer to MIR-68, "Removal and Installation".

6. CHECK INTERMITTENT INCIDENT

Check intermittent incident.
Refer to GI-39, "Intermittent Incident".

Is the inspection result normal?

YES >> Replace automatic drive positioner control unit. Refer to ADP-218, "Removal and Installation".
NO >> Repair or replace the malfunctioning parts.

Component Inspection

INFOID:0000000000962319

1. CHECK MIRROR SWITCH

Check door mirror remote control switch.

Terminal		Mirror switch condition	Continuity
Door mirror remote control switch			
4	7	RIGHT	Existed
		Other than above	Not existed
13		LEFT	Existed
		Other than above	Not existed
15		UP	Existed
		Other than above	Not existed
12		DOWN	Existed
		Other than above	Not existed

Is the inspection result normal?

YES >> INSPECTION END.
NO >> Replace door mirror remote control switch.Refer to MIR-68, "Removal and Installation".

CHANGE OVER SWITCH

Description

INFOID:0000000000962320

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.

Component Function Check

INFOID:0000000000962321

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-48, "CONSULT-III Function".

Is the inspection result normal?

YES >> Changeover switch function is OK.
NO >> Refer to MIR-14, "Diagnosis Procedure".

Diagnosis Procedure

INFOID:0000000000962322

1.CHECK CHANGEOVER SWITCH SIGNAL

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

Terminals			Change over switch condition	Voltage (V) (Approx.)
(+)		(-)		
Automatic drive positioner control unit connector	Terminal			
M51	2	Ground	RIGHT	0
			Other than above	5
	18		LEFT	0
			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 connector.
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
M51	2	D7	11	Existed
	18		10	

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

Automatic drive positioner control unit connector	Terminal	Ground	Continuity
M51	2		Not existed
	18		

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
D7	7		Existed

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

Terminals			Voltage (V) (Approx.)
(+)		(-)	
Automatic drive positioner control unit connector	Terminal		
M51	2	Ground	5
	18		

Is the inspection result normal?

YES >> GO TO 5.
NO >> Replace automatic drive positioner control unit. Refer to ADP-218, "Removal and Installation".

5.CHECK CHANGEOVER SWITCH

Check changeover switch.
Refer to MIR-15, "Component Inspection".

Is the inspection result normal?

YES >> Refer to GI-39, "Intermittent Incident".
NO >> Replace door mirror remote control switch. Refer to MIR-68, "Removal and Installation".

6.CHECK INTERMITTENT INCIDENT

Check intermittent incident.
Refer to GI-39, "Intermittent Incident".

Is the inspection result normal?

YES >> Replace automatic drive positioner control unit. Refer to ADP-218, "Removal and Installation".
NO >> Repair or replace the malfunctioning parts.

Component Inspection

INFOID:0000000000962323

1.CHECK CHANGEOVER SWITCH

Check door mirror remote control switch.

Terminal		Change over switch condition	Continuity
Door mirror remote control switch			
10	7	LEFT	Existed
		Other than above	Not existed
11		RIGHT	Existed
		Other than above	Not existed

Is the inspection result normal?

YES >> INSPECTION END.
NO >> Replace door mirror remote control switch. Refer to MIR-68, "Removal and Installation".

DOOR MIRROR MOTOR

Description

INFOID:0000000000962324

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

INFOID:0000000000962325

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-48, "CONSULT-III Function".

Is the inspection result normal?

YES >> Door mirror motor function is OK.
NO >> Refer to MIR-16, "Diagnosis Procedure".

Diagnosis Procedure

INFOID:0000000000962326

1.CHECK DOOR MIRROR MOTOR INPUT SIGNAL

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

Terminals			Door mirror remote control switch condition	Voltage (V) (Approx.)
(+)		(–)		
Door mirror connector	Terminal			
D3 (Driver side) D33 (Passenger side)	5	Ground	UP	Battery voltage
			Other than above	0
	6		LEFT	Battery voltage
			Other than above	0
	7		DOWN / RIGHT	Battery voltage
			Other than above	0

Is the inspection result normal?

YES >> Refer to MIR-18, "Component Inspection".
NO >> GO TO 2.

2.CHECK HARNESS CONTINUITY

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

[Door mirror driver side]

Automatic drive positioner control unit connector	Terminal	Door mirror (driver side) connector	Terminal	Continuity
M51	16	D3	7	Existed
	31		5	
	32		6	

[Door mirror passenger side]

Automatic drive positioner control unit connector	Terminal	Door mirror (passenger side) connector	Terminal	Continuity
M51	14	D33	5	Existed
	15		6	
	30		7	

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

[Door mirror driver side]

Automatic drive positioner control unit connector	Terminal	Ground	Continuity
M51	16		Not existed
	31		
	32		

[Door mirror passenger side]

Automatic drive positioner control unit connector	Terminal	Ground	Continuity
M51	14		Not existed
	15		
	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 connector.
2. Turn ignition switch ON.
3. Check voltage between automatic drive positioner control unit connector and ground.

[Door mirror driver side]

Terminals			Mirror switch condition	Voltage (V) (Approx.)
(+)		(-)		
Automatic drive positioner control unit connector	Terminal			
M51	16	Ground	DOWN / RIGHT	Battery voltage
			Other than above	0
	31		UP	Battery voltage
			Other than above	0
	32		LEFT	Battery voltage
			Other than above	0

[Door mirror passenger side]

Terminals			Mirror switch condition	Voltage (V) (Approx.)
(+)		(-)		
Automatic drive positioner control unit connector	Terminal			
M51	14	Ground	UP	Battery voltage
			Other than above	0
	15		LEFT	Battery voltage
			Other than above	0
	30		DOWN / RIGHT	Battery voltage
			Other than above	0

Is the inspection result normal?

YES >> Refer to MIR-18, "Component Inspection".
NO >> Replace automatic drive positioner control unit. Refer to ADP-218, "Removal and Installation".

4. CHECK DOOR MIRROR MOTOR

Check door mirror motor.
Refer to MIR-18, "Component Inspection".

Is the inspection result normal?

YES >> Refer to GI-39, "Intermittent Incident".
NO >> Replace door mirror. Refer to MIR-67, "Removal and Installation".

Component Inspection

INFOID:0000000000962327

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-69, "Exploded View".

Is the inspection result normal?

YES >> GO TO 2.
NO >> Replace door mirror.Refer to MIR-67, "Removal and Installation".

2. CHECK DOOR MIRROR MOTOR-II

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

Door mirror connector	Terminal		Operational direction
	(+)	(–)	
D3 (Driver side) D33 (Passenger side)	7	6	RIGHT
	6	7	LEFT
	5	7	UP
	7	5	DOWN

Is the inspection result normal?

YES >> INSPECTION END.
NO >> Replace door mirror. Refer to MIR-67, "Removal and Installation".

AUTO ANTI-DAZZLING INSIDE MIRROR CIRCUIT

Description

INFOID:0000000000962328

It automatically changes according to the brightness of the light that is reflected from the headlight of the vehicle to the rear.

Component Function Check

INFOID:0000000000962329

1.CHECK AUTO ANTI-DAZZLING INSIDE MIRROR FUNCTION

Check that glare-proof mirror can operate when mirror sensor is illuminated.

Is the inspection result normal?

YES >> Auto anti-dazzling inside mirror function is OK.
NO >> Refer to MIR-19, "Diagnosis Procedure".

Diagnosis Procedure

INFOID:0000000000962330

1.CHECK POWER SUPPLY CIRCUIT

Check voltage between auto anti-dazzling inside mirror connector and ground.

(+)		(-)	Condition of ignition switch	Voltage (V) (Approx.)
Auto anti-dazzling inside mirror connector	Terminal	Ground		
R3	6		ON or START	Battery voltage
	10		OFF	Battery voltage

Is the inspection result normal?

YES >> GO TO 2.
NO >> Repair or replace harness.

2.CHECK GROUND CIRCUIT

1. Disconnect auto anti-dazzling inside mirror connector.
2. Check continuity between auto anti-dazzling inside mirror connector and ground.

Auto anti-dazzling inside mirror connector	Terminal	Ground	Continuity
R3	8		Existed

Is the inspection result normal?

YES >> GO TO 3.
NO >> Repair or replace harness.

3.CHECK INTERMITTENT INCIDENT

Check intermittent incident.
Refer to GI-39, "Intermittent Incident".

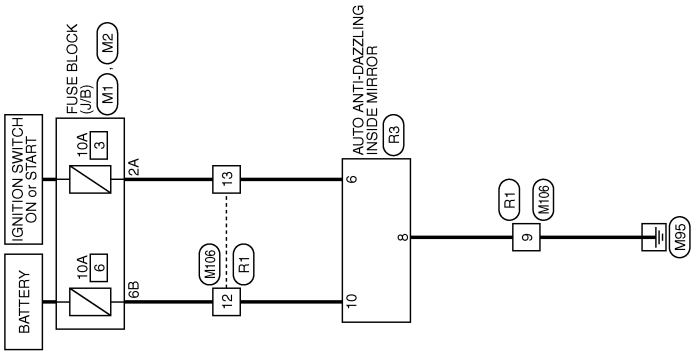
Is the inspection result normal?

YES >> Replace auto anti-dazzling inside mirror. Refer to MIR-66, "Removal and Installation".
NO >> Repair or replace the malfunctioning parts.

AUTO ANTI-DAZZLING INSIDE MIRROR SYSTEM

Wiring Diagram — INSIDE MIRROR SYSTEM —

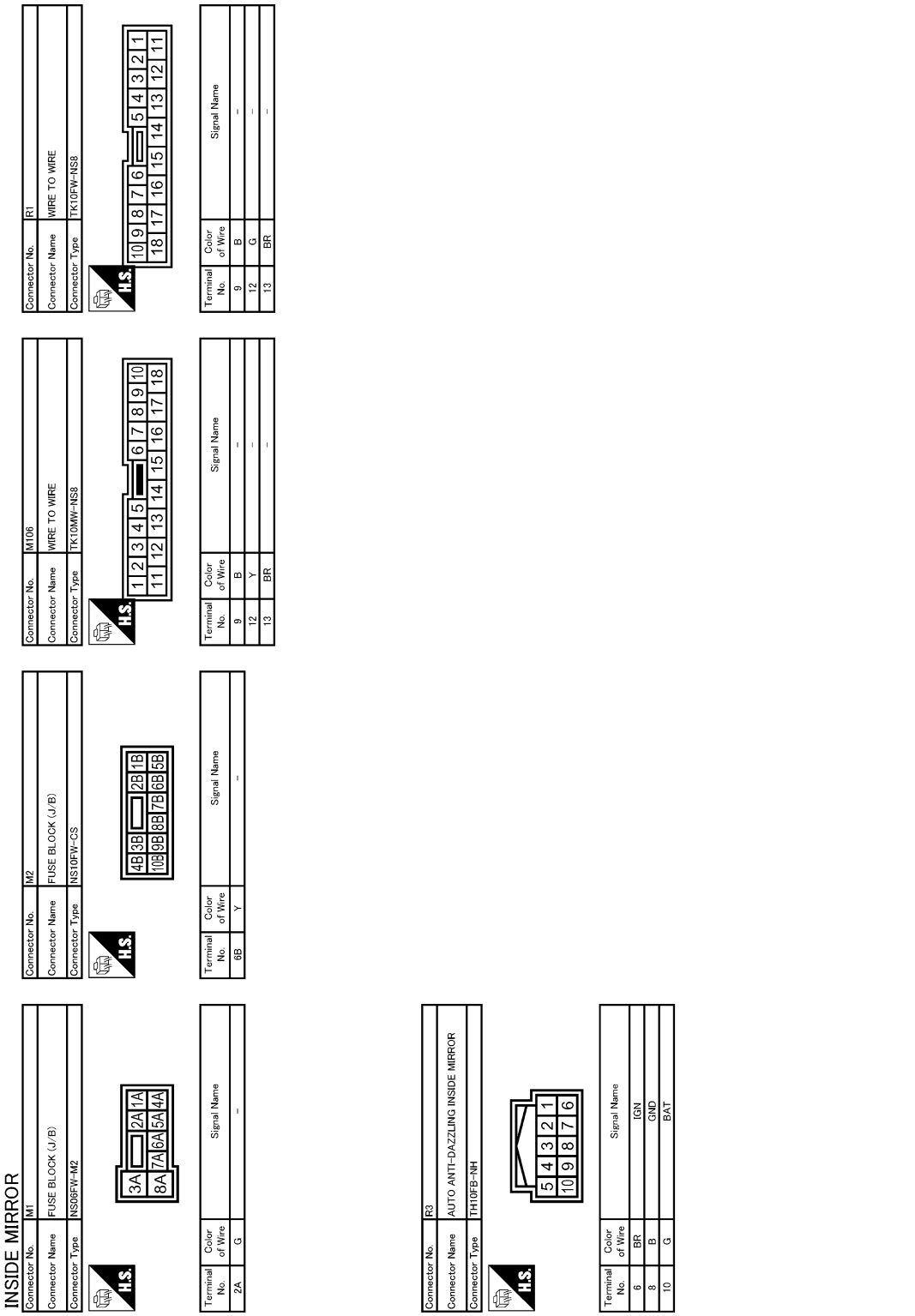
INFOID:0000000000962331



INSIDE MIRROR

2006/09/15

JCLWA0004GB


INSIDE MIRROR
Connector No. M1
Connector Name FUSE BLOCK (J/B)
Connector Type NS06FW-M2
H.S.
3A 2A 1A
8A 7A 6A 4A
Terminal No. Color of Wire Signal Name
2A G –
Connector No. M2
Connector Name FUSE BLOCK (J/B)
Connector Type NS10FW-CS
H.S.
4B 3B 2B 1B
10B 9B 8B 7B 6B 5B
Terminal No. Color of Wire Signal Name
6B Y –
Connector No. M106
Connector Name WIRE TO WIRE
Connector Type TK10MW-NS8
H.S.
1 2 3 4 5 6 7 8 9 10
11 12 13 14 15 16 17 18
Terminal No. Color of Wire Signal Name
9 B –
12 Y –
13 BR –
Connector No. R1
Connector Name WIRE TO WIRE
Connector Type TK10FW-NS8
H.S.
10 9 8 7 6 5 4 3 2 1
18 17 16 15 14 13 12 11
Terminal No. Color of Wire Signal Name
9 B –
12 G –
13 BR –
Connector No. R3
Connector Name AUTO ANTI-DAZZLING INSIDE MIRROR
Connector Type TH10FB-NH
H.S.
5 4 3 2 1
10 9 8 7 6
Terminal No. Color of Wire Signal Name
6 BR IGN
8 B GND
10 G BAT
JCLWA0005GB

ECU DIAGNOSIS

DRIVER SEAT CONTROL UNIT

Reference Value

INFOID:0000000000962332

VALUES ON THE DIAGNOSIS TOOL

Monitor Item	Condition		Value/Status
SET SW	Set switch	Push	ON
		Release	OFF
MEMORY SW1	Memory switch 1	Push	ON
		Release	OFF
MEMORY SW2	Memory switch 2	Push	ON
		Release	OFF
SLIDE SW–FR	Sliding switch (front)	Operate	ON
		Release	OFF
SLIDE SW–RR	Sliding switch (rear)	Operate	ON
		Release	OFF
RECLN SW–FR	Reclining switch (front)	Operate	ON
		Release	OFF
RECLN SW–RR	Reclining switch (rear)	Operate	ON
		Release	OFF
LIFT FR SW–UP	Lifting switch front (up)	Operate	ON
		Release	OFF
LIFT FR SW–DN	Lifting switch front (down)	Operate	ON
		Release	OFF
LIFT RR SW–UP	Lifting switch rear (up)	Operate	ON
		Release	OFF
LIFT RR SW–DN	Lifting switch rear (down)	Operate	ON
		Release	OFF
MIR CON SW–UP	Mirror switch	Up	ON
		Other than above	OFF
MIR CON SW–DN	Mirror switch	Down	ON
		Other than above	OFF
MIR CON SW–RH	Mirror switch	Right	ON
		Other than above	OFF
MIR CON SW–LH	Mirror switch	Left	ON
		Other than above	OFF
MIR CHNG SW–R	Changeover switch	Right	ON
		Other than above	OFF
MIR CHNG SW–L	Changeover switch	Left	ON
		Other than above	OFF
TILT SW-UP	Tilt switch	Up	ON
		Other than above	OFF
TILT SW-DOWN	Tilt switch	Down	ON
		Other than above	OFF

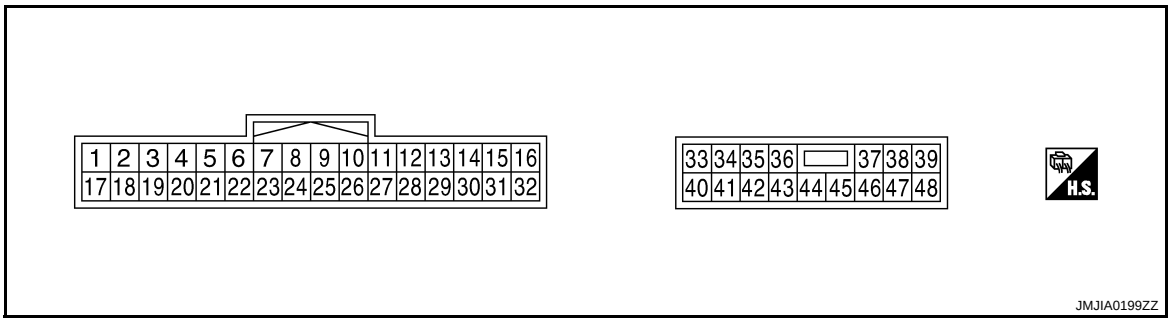
Monitor Item	Condition		Value/Status
TELESCO SW-FR	Telescopic switch	Forward	ON
		Other than above	OFF
TELESCO SW-RR	Tilt switch	Backward	ON
		Other than above	OFF
DETENT SW*1	AT selector lever	P position	OFF
		Other than above	ON
PARK BRAKE SW*2	Parking brake	Applied	ON
		Release	OFF
STARTER SW	Ignition position	Cranking	ON
		Other than above	OFF
SLIDE PULSE	Seat sliding	Forward	The numeral value decreases *3
		Backward	The numeral value increases *3
		Other than above	No change to numeral value*3
RECLN PULSE	Seat reclining	Forward	The numeral value decreases *3
		Backward	The numeral value increases *3
		Other than above	No change to numeral value*3
LIFT FR PULSE	Seat lifter (front)	Up	The numeral value decreases *3
		Down	The numeral value increases *3
		Other than above	No change to numeral value*3
LIFT RR PULSE	Seat lifter (rear)	Up	The numeral value decreases *3
		Down	The numeral value increases *3
		Other than above	No change to numeral value*3
MIR/SEN RH U–D	Door mirror (passenger side)	Close to peak	3.4
		Close to valley	0.6
MIR/SEN RH R–L	Door mirror (passenger side)	Close to left edge	3.4
		Close to right edge	0.6
MIR/SEN LH U–D	Door mirror (driver side)	Close to peak	3.4
		Close to valley	0.6
MIR/SEN LH R–L	Door mirror (driver side)	Close to left edge	0.6
		Close to right edge	3.4
TILT SEN	Tilt position	Top	1.2
		Bottom	3.4
TELESCO SEN	Telescopic position	Top	3.4
		Bottom	0.8

*1: Only for AT model

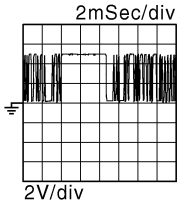
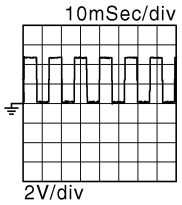
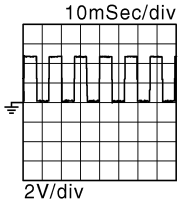
*2: Only for MT model

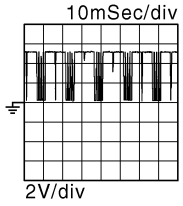
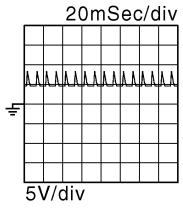
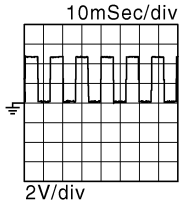
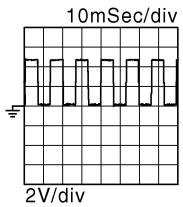
*3: The value at the position attained when the battery is connected is regarded as 32768.

TERMINAL LAYOUT



PHYSICAL VALUES

Terminal No. +	Terminal No. -	Wire color	Description: Signal name	Description: Input/ Output	Condition		Voltage (V) (Approx)
1	Ground	L/W	UART communication (RX)	Input	Ignition switch ON		
3	—	R/Y	CAN-H	—	—		—
8*1	Ground	LG	Parking brake switch signal	Input	Parking brake	Applied	0
						Release	Battery voltage
9	Ground	W/G	Reclining sensor signal	Input	Seat reclining	Operate	
						Stop	0 or 5
10	Ground	P/B	Lifting sensor (rear) signal	Input	Seat lifting (rear)	Operate	
						Stop	0 or 5
11	Ground	BR	Sliding switch backward signal	Input	Sliding switch	Operate (backward)	0
						Release	Battery voltage
12	Ground	SB	Reclining switch backward signal	Input	Reclining switch	Operate (backward)	0
						Release	Battery voltage

Terminal No. +	Terminal No. -	Wire color	Description: Signal name	Description: Input/ Output	Condition		Voltage (V) (Approx)
13	Ground	LG/R	Lifting switch (front) down signal	Input	Lifting switch (front)	Operate (down)	0
						Release	Battery voltage
14	Ground	GB	Lifting switch (rear) down signal	Input	Lifting switch (rear)	Operate (down)	0
						Release	Battery voltage
16	Ground	O	Sensor power supply	Output	—		5
17	Ground	Y/R	UART communication (TX)	Output	Ignition switch ON		 JMJIA0121ZZ
19	—	V	CAN-L	—	—		—
21*2	Ground	L/Y	Detention switch	Input	A/T selector lever	P position	0
						Except P position	 JMJIA0120ZZ
24	Ground	R	Sliding sensor signal	Input	Seat sliding	Operate	 JMJIA0119ZZ
						Stop	0 or 5
25	Ground	Y/B	Lifting sensor (front) signal	Input	Seat lifting (front)	Operate	 JMJIA0119ZZ
						Stop	0 or 5
26	Ground	Y	Sliding switch forward signal	Input	Sliding switch	Operate (forward)	0
						Release	Battery voltage
27	Ground	R/G	Reclining switch forward signal	Input	Reclining switch	Operate (forward)	0
						Release	Battery voltage
28	Ground	W/B	Lifting switch (front) up signal	Input	Seat lifting switch (front)	Operate (up)	0
						Release	Battery voltage

Terminal No.		Wire color	Description		Condition		Voltage (V) (Approx)
+	-		Signal name	Input/ Output			
29	Ground	P/L	Lifting switch (rear) up signal	Input	Seat lifting switch (rear)	Operate (up)	0
						Release	Battery voltage
31	Ground	GR	Sensor ground	—	—		0
32	Ground	B/W	Ground (signal)	—	—		0
33	Ground	R	Power source (C/B)	Input	—		Battery voltage
35	Ground	W/R	Sliding motor forward output signal	Output	Seat sliding	Operate (forward)	Battery voltage
						Release	0
36	Ground	G/Y	Reclining motor forward output signal	Output	Seat reclining	Operate (forward)	Battery voltage
						Release	0
37	Ground	G/W	Lifting motor (front) down output signal	Output	Seat lifting (front)	Operate (down)	Battery voltage
						Stop	0
38	Ground	L/Y	Lifting motor (rear) up output signal	Output	Seat lifting (rear)	Operate (up)	Battery voltage
						Stop	0
39	Ground	R/B	Lifting motor (rear) down output signal	Output	Seat lifting (rear)	Operate (down)	Battery voltage
						Stop	0
40	Ground	R/W	Power source (Fuse)	Input	—		Battery voltage
42	Ground	W/B	Sliding motor backward output signal	Output	Seat sliding	Operate (backward)	Battery voltage
						Stop	0
44	Ground	P	Reclining motor backward output signal	Output	Seat reclining	Operate (backward)	Battery voltage
						Stop	0
45	Ground	L/R	Lifting motor (front) up output signal	Output	Seat lifting (front)	Operate (up)	Battery voltage
						Stop	0
48	Ground	B	Ground (power)	—	—		0

*1: Only for MT models

*2: Only for AT models

Wiring Diagram—AUTOMATIC DRIVE POSITIONER CONTROL SYSTEM—

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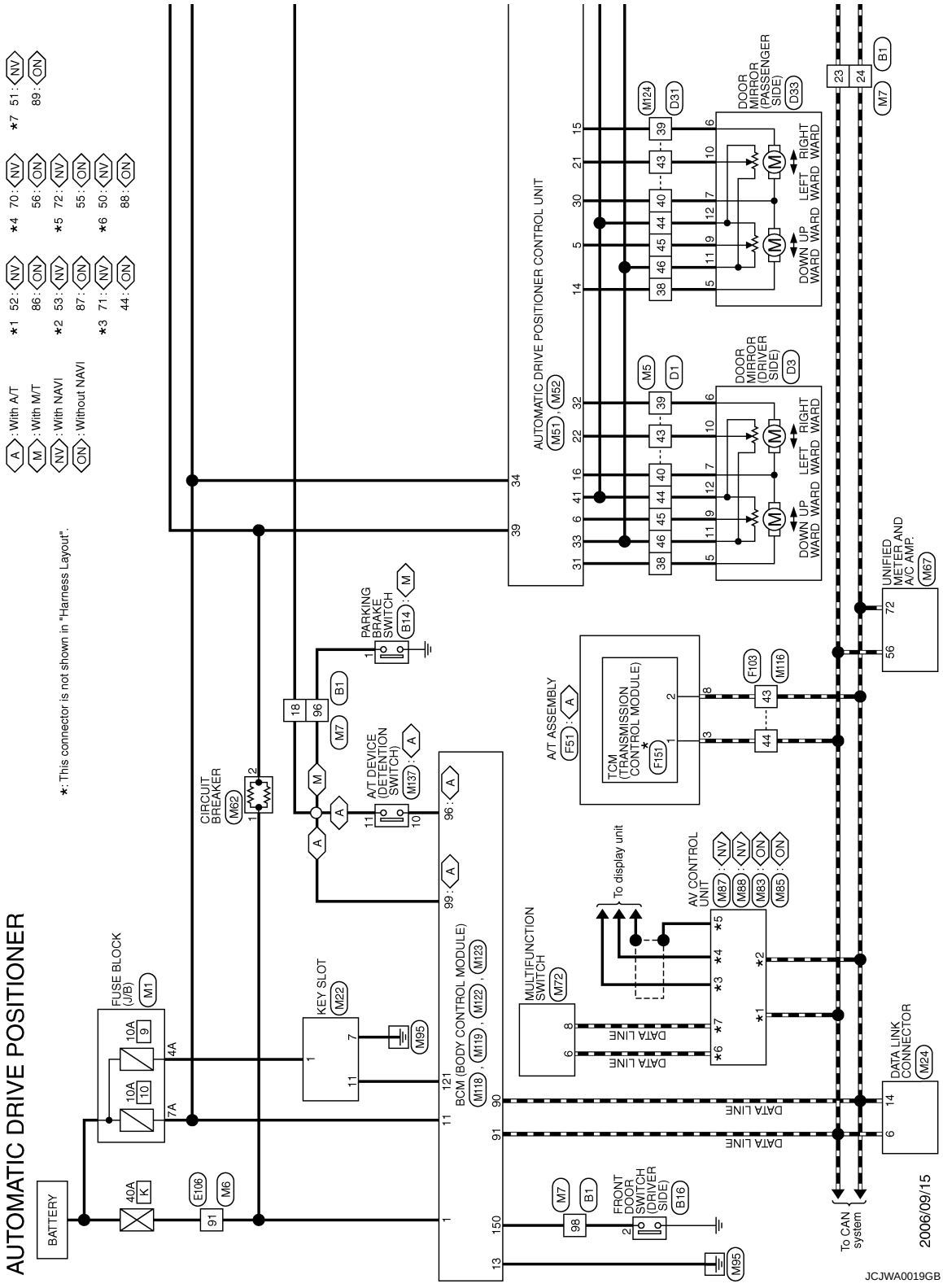
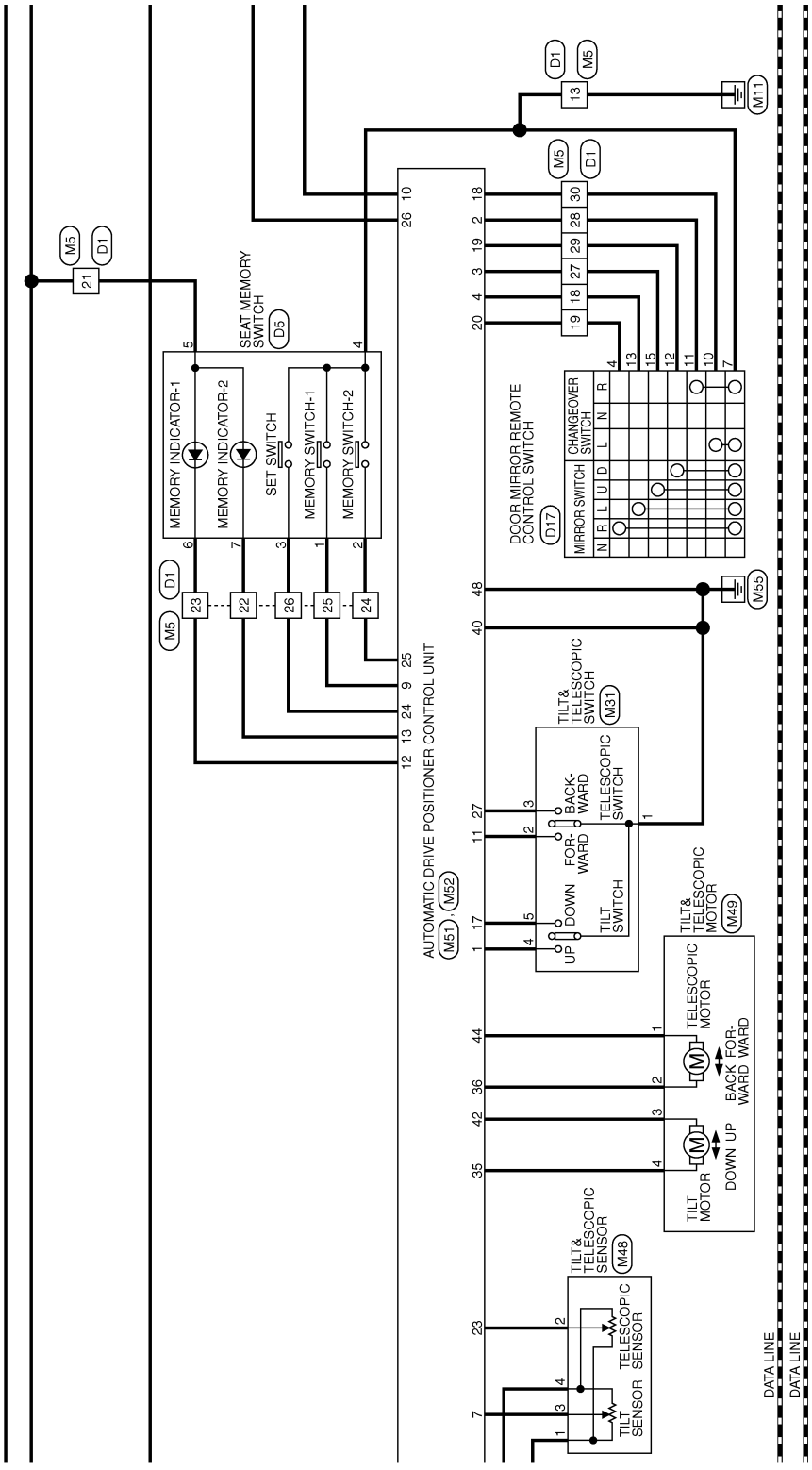
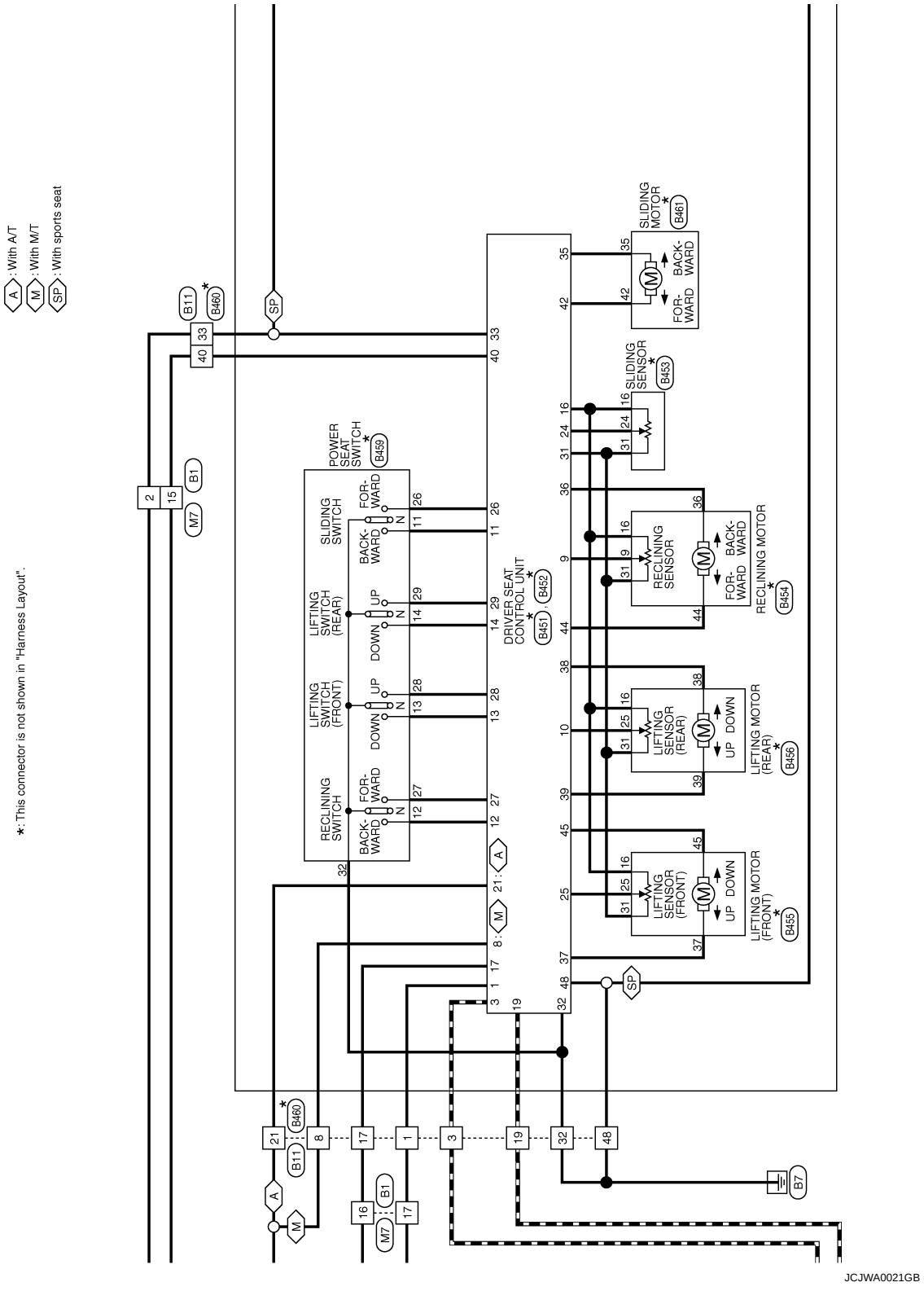
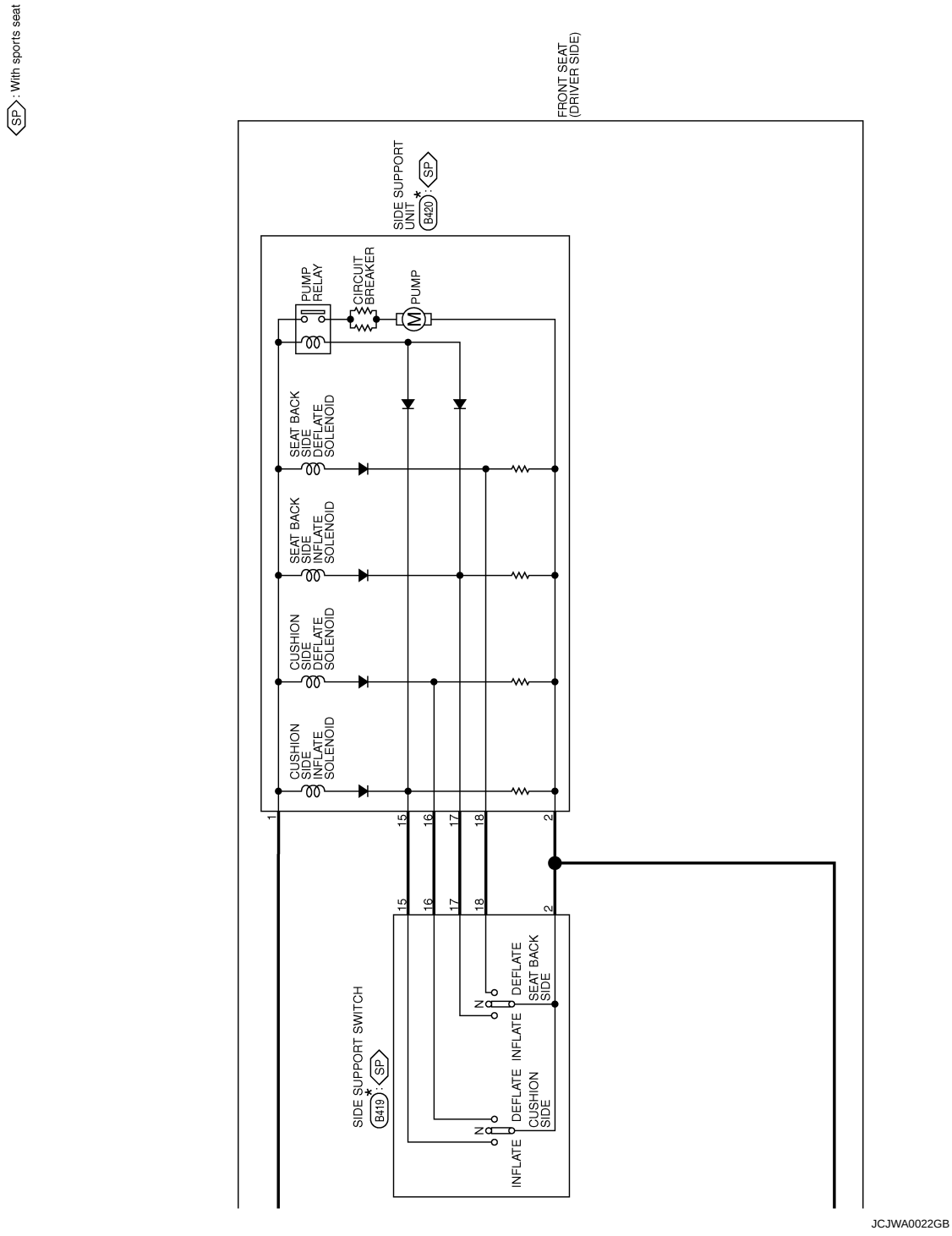



SEAT MEMORY SWITCH
D5
MEMORY INDICATOR-1
MEMORY INDICATOR-2
SET SWITCH
MEMORY SWITCH-1
MEMORY SWITCH-2
DOOR MIRROR REMOTE CONTROL SWITCH
D17
MIRROR SWITCH
CHANGEOVER SWITCH
AUTOMATIC DRIVE POSITIONER CONTROL UNIT
M51, M52
TILT& TELESCOPIC SWITCH
M31
TELESCOPIC SWITCH
BACK-WARD
FOR-WARD
TILT SWITCH
DOWN
UP
TILT& TELESCOPIC MOTOR
M49
TELESCOPIC MOTOR
BACK FOR-WARD
TILT MOTOR
DOWN UP
TILT& TELESCOPIC SENSOR
M48
TELESCOPIC SENSOR
TILT SENSOR
DATA LINE
DATA LINE
M11
M55
JCJWA0020GB


A : With A/T
M : With M/T
SP : With sports seat
*: This connector is not shown in "Harness Layout".
DRIVER SEAT CONTROL UNIT
B451, B452
POWER SEAT SWITCH
B459
SLIDING SWITCH
LIFTING SWITCH (REAR)
LIFTING SWITCH (FRONT)
RECLINING SWITCH
FOR-WARD
BACK-WARD
UP
DOWN
SLIDING MOTOR
B461
SLIDING SENSOR
B453
RECLINING SENSOR
RECLINING MOTOR
B454
LIFTING SENSOR (REAR)
LIFTING MOTOR (REAR)
B456
LIFTING SENSOR (FRONT)
LIFTING MOTOR (FRONT)
B455
B11
B460
B1
M7
B7
JCJWA0021GB


SP : With sports seat
FRONT SEAT (DRIVER SIDE)
SIDE SUPPORT UNIT (B420) : SP
PUMP RELAY
CIRCUIT BREAKER
PUMP
SEAT BACK SIDE DEFLATE SOLENOID
SEAT BACK SIDE INFLATE SOLENOID
CUSHION SIDE DEFLATE SOLENOID
CUSHION SIDE INFLATE SOLENOID
1
15
16
17
18
2
SIDE SUPPORT SWITCH (B419) : SP
N
DEFLATE SEAT BACK SIDE
INFLATE
DEFLATE CUSHION SIDE
INFLATE
JCJWA0022GB

AUTOMATIC DRIVE POSITIONER

Connector No.	B1
Connector Name	WIRE TO WIRE
Connector Type	TH80FW-CS16-TM4

Terminal No.	Color of Wire	Signal Name
2	SB	–
15	BR	–
16	LG	–
17	G	–
18	Y	–
23	L	–
24	P	–
96	V	–
98	V	–

Connector No.	B419
Connector Name	SIDE SUPPORT SWITCH
Connector Type	NS06FW-CS

Terminal No.	Color of Wire	Signal Name
2	B	–
15	G	– [With automatic drive positioner]
16	B/R	– [With automatic drive positioner]
17	V/W	– [With automatic drive positioner]
18	R/L	– [With automatic drive positioner]

Connector No.	B11
Connector Name	WIRE TO WIRE (With automatic drive positioner)
Connector Type	NS16FW-CS

Terminal No.	Color of Wire	Signal Name
1	G	–
3	L	–
8	Y	–
17	LG	–
19	P	–
21	Y	–
32	B	–
33	SB	–
40	BR	–
48	B	–

Connector No.	B420
Connector Name	SIDE SUPPORT UNIT
Connector Type	NS06FW-CS

Terminal No.	Color of Wire	Signal Name
1	R	–
2	B	–
15	G	– [With automatic drive positioner]
16	B/R	– [With automatic drive positioner]
17	V/W	– [With automatic drive positioner]
18	R/L	– [With automatic drive positioner]

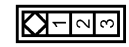
Connector No.	B14
Connector Name	PARKING BRAKE SWITCH
Connector Type	P01FB-A

Terminal No.	Color of Wire	Signal Name
1	V	–

Connector No.	B451
Connector Name	DRIVER SEAT CONTROL UNIT
Connector Type	TH32FW

Terminal No.	Color of Wire	Signal Name
1	L/W	RX
3	R/Y	CAN-H
8	LG	PARKING BRAKE SW
9	W/G	PULSE(RECLINING)
10	P/B	PULSE(RR LIFTING)
11	BR	SLIDING SW(BACKWARD)
12	SB	RECLINING SW(BACKWARD)
13	LG/R	FRONT LIFTING SW(DOWNWARD)
14	G/B	REAR LIFTING SW(DOWNWARD)
16	O	VCC
17	Y/R	TX
19	V	CAN-L
21	L/Y	P RANGE SW
24	R	PULSE(SLIDING)
25	Y/B	PULSE(FR LIFTING)
26	Y	SLIDING SW(FORWARD)
27	R/G	RECLINING SW(FORWARD)
28	W/B	FRONT LIFTING SW(UPWARD)
29	P/L	REAR LIFTING SW(UPWARD)
31	GR	SENSOR GND
32	B/W	GND(SIGNAL)

Connector No.	B16
Connector Name	FRONT DOOR SWITCH (DRIVER SIDE)
Connector Type	A03FW



Terminal No.	Color of Wire	Signal Name
2	V	–

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AUTOMATIC DRIVE POSITIONER

Connector No.	B452
Connector Name	DRIVER SEAT CONTROL UNIT
Connector Type	NS16FW-CS

Terminal No.	Color of Wire	Signal Name
33	R	BAT(C/B)
35	W/R	SLIDING MOTOR(FORWARD)
36	G/Y	RECLINING MOTOR(FORWARD)
37	G/W	FRONT LIFTING MOTOR(DOWNWARD)
38	L/Y	REAR LIFTING MOTOR(UPWARD)
39	R/B	REAR LIFTING MOTOR(BACKWARD)
40	R/W	BAT(FUSE)
42	W/B	SLIDING MOTOR(BACKWARD)
44	P	RECLINING MOTOR(BACKWARD)
45	L/R	FRONT LIFTING MOTOR(UPWARD)
48	B	GND(POWER)

Connector No.	B453
Connector Name	SLIDING SENSOR
Connector Type	6098-0241

Terminal No.	Color of Wire	Signal Name
16	O	–
24	R	–
31	GR	–

Connector No.	B454
Connector Name	RECLINING MOTOR
Connector Type	NS06FW-CS

Terminal No.	Color of Wire	Signal Name
9	W/G	–
16	O	–
31	GR	–
36	G/Y	–
44	P	–

Connector No.	B455
Connector Name	LIFTING MOTOR(FRONT)(DRIVER SIDE)
Connector Type	NS06FW-CS

Terminal No.	Color of Wire	Signal Name
16	O	–
25	Y/B	–
31	GR	–
37	G/W	–
45	L/R	–

Connector No.	B456
Connector Name	LIFTING MOTOR(REAR)(DRIVER SIDE)
Connector Type	NS06FBR-CS

Terminal No.	Color of Wire	Signal Name
16	O	–
25	P/B	–
31	GR	–
38	L/Y	–
39	R/B	–

Connector No.	B459
Connector Name	POWER SEAT SWITCH(DRIVER SIDE)
Connector Type	NS10FW-CS

Terminal No.	Color of Wire	Signal Name
11	BR	–
12	SB	–
13	LG/R	–
14	G/B	–
26	Y	–
27	R/G	–
28	W/B	–
29	P/L	–
32	B/W	–

Connector No.	B460
Connector Name	WIRE TO WIRE (With automatic drive positioner)
Connector Type	NS16MW-CS

Terminal No.	Color of Wire	Signal Name
1	L/W	–
3	R/Y	–
8	LG	–
17	Y/R	–
19	V	–
21	L/Y	–
32	B/W	–
33	R	–
40	R/W	–
48	B	–

Connector No.	B461
Connector Name	SLIDING MOTOR(DRIVER SIDE)
Connector Type	6098-0239

Terminal No.	Color of Wire	Signal Name
35	W/R	–
42	W/B	–

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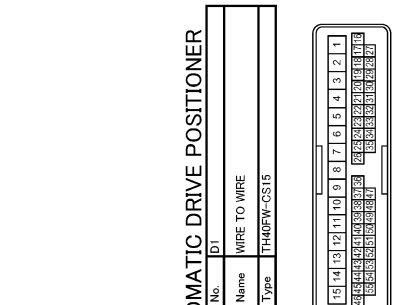
AUTOMATIC DRIVE POSITIONER

Connector No.	D1
Connector Name	WIRE TO WIRE
Connector Type	TH40FW-CS15



Terminal No.	Color of Wire	Signal Name
13	B	–
18	W	–
19	BR	–
21	R	–
22	P	–
23	O	–
24	BR	–
25	L	–
26	GR	–
27	Y	–
28	LG	–

Connector No.	D17
Connector Name	DOOR MIRROR REMOTE CONTROL SWITCH (With automatic drive positioner)
Connector Type	TK16FBR

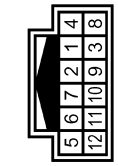
Terminal No.	Color of Wire	Signal Name
4	BR	–
7	B	–
10	GR	–
11	LG	–
12	G	–
13	W	–
15	Y	–

29	G	–
30	GR	–
38	O	–
39	GR	–
40	G	–
43	BR	–
44	V	–
45	P	–
46	W	–

Connector No.	D31
Connector Name	WIRE TO WIRE
Connector Type	TH40FW-CS15

Terminal No.	Color of Wire	Signal Name
38	W	– [with A/T]
38	O	– [with M/T]
39	G	– [with A/T]
39	GR	– [with M/T]
40	Y	– [with A/T]
40	G	– [with M/T]
43	BR	–
44	V	–
45	P	–
46	W	–

Connector No.	D3
Connector Name	DOOR MIRROR (DRIVER SIDE)
Connector Type	TH12MW-NH

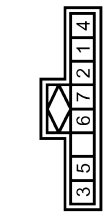


Terminal No.	Color of Wire	Signal Name
5	O	– [With automatic drive positioner]
6	GR	– [With automatic drive positioner]
7	G	– [With automatic drive positioner]
9	P	–
10	BR	–
11	W	–
12	V	–

Connector No.	D33
Connector Name	DOOR MIRROR (PASSENGER SIDE)
Connector Type	TH12MW-NH

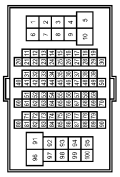
Terminal No.	Color of Wire	Signal Name
5	W	– [With automatic drive positioner]
6	G	– [With automatic drive positioner]
7	Y	– [With automatic drive positioner]
9	P	–
10	BR	–
11	W	–
12	V	–

Connector No.	D5
Connector Name	SEAT MEMORY SWITCH
Connector Type	A08FW



Terminal No.	Color of Wire	Signal Name
1	L	–
2	BR	–
3	GR	–
4	B	–
5	R	–
6	O	–
7	P	–

Connector No.	E106
Connector Name	WIRE TO WIRE
Connector Type	TH80FW-CS16-TM4



Terminal No.	Color of Wire	Signal Name
91	W	–

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AUTOMATIC DRIVE POSITIONER

Connector No.	F51
Connector Name	A/T ASSEMBLY
Connector Type	RK10FG-DGY

Terminal No.	Color of Wire	Signal Name
3	L	–
8	P	–

Connector No.	F103
Connector Name	WIRE TO WIRE
Connector Type	TK36FW-NS10

Terminal No.	Color of Wire	Signal Name
43	P	–
44	L	–

Connector No.	F151
Connector Name	TCM (TRANSMISSION CONTROL MODULE)
Connector Type	SP10FBGY

Terminal No.	Color of Wire	Signal Name
1	BR	CAN-H
2	L/Y	CAN-L

Connector No.	M1
Connector Name	FUSE BLOCK (J/B)
Connector Type	NS06FW-M2

Terminal No.	Color of Wire	Signal Name
4A	P	–
7A	R	–

Connector No.	M5
Connector Name	WIRE TO WIRE
Connector Type	TH40MW-CS15

Terminal No.	Color of Wire	Signal Name
13	B	–
18	V	–
19	BR	–
21	R	–
22	P	–
23	O	–
24	SB	–
25	L	–
26	R	–
27	G	–
28	LG	–

29	SB	–
30	P	–
38	LG	–
39	L	–
40	Y	–
43	G	–
44	R	–
45	GR	–
46	R	–

Connector No.	M6
Connector Name	WIRE TO WIRE
Connector Type	TH80MW-CS16-TM4

Terminal No.	Color of Wire	Signal Name
91	W	–

Connector No.	M7
Connector Name	WIRE TO WIRE
Connector Type	TH80MW-CS16-TM4

Terminal No.	Color of Wire	Signal Name
2	SB	– [With automatic drive positioner]
15	BR	–
16	Y	–
17	V	–
18	R	– [With A/T]
18	Y	– [With M/T]
19	–	–
23	L	–
24	P	–
96	V	–
98	GR	–

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AUTOMATIC DRIVE POSITIONER

Connector No.	M22
Connector Name	KEY SLOT
Connector Type	TH12FW-NH

H.S.

1 2 3 4 5 6
7 8 9 10 11 12

Terminal No.	Color of Wire	Signal Name
1	R	BAT
7	B	GND
11	R	KEY SWITCH SIGNAL

Connector No.	M24
Connector Name	DATA LINK CONNECTOR
Connector Type	BD16FW

H.S.

9 10 11 12 13 14 15 16
1 2 3 4 5 6 7 8

Terminal No.	Color of Wire	Signal Name
6	L	–
14	P	–

Connector No.	M31
Connector Name	TILT & TELESCOPIC SWITCH
Connector Type	TK06FGY

H.S.

3 4 1 5 2

Terminal No.	Color of Wire	Signal Name
1	B	–
2	GR	–
3	G	–
4	Y	–
5	W	–

Connector No.	M48
Connector Name	TILT & TELESCOPIC SENSOR
Connector Type	TK04FW

H.S.

4 3 2 1

Terminal No.	Color of Wire	Signal Name
1	W	–
2	P	–
3	O	–
4	Y	–

Connector No.	M49
Connector Name	TILT & TELESCOPIC MOTOR
Connector Type	NS04FW-CS

H.S.

4 3 2 1

Terminal No.	Color of Wire	Signal Name
1	G	–
2	GR	–
3	O	–
4	L	–

Connector No.	M51
Connector Name	AUTOMATIC DRIVE POSITIONER CONTROL UNIT
Connector Type	TH32FW-NH

H.S.

1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16
17 18 19 20 21 22 23 24 25 26 27 28 29 30 31 32

Terminal No.	Color of Wire	Signal Name
1	Y	TILT SW (UPWARD)
2	LG	MIRROR SELECT SW (RH)
3	G	MIRROR SW (UPWARD)
4	V	MIRROR SW (LEFTWARD)
5	R	MIRROR SENSOR (RH VERTICAL)
6	GR	MIRROR SENSOR (LH VERTICAL)
7	O	TILT SENSOR
9	L	ADDRESS1
10	V	TX (UART)
11	GR	TELESCOPIC SW (FRONTWARD)
12	O	IND1
13	P	IND2
14	W	MIRROR MOTOR (RH VERTICAL)
15	GR	MIRROR MOTOR (RH HORIZONTAL) [With A/T]
15	G	MIRROR MOTOR (RH HORIZONTAL) [With M/T]
16	Y	MIRROR MOTOR (LH COMMON)
17	W	TILT SW (DOWNWARD)
18	P	MIRROR SELECT SW (LH)
19	SB	MIRROR SW (DOWNWARD)
20	BR	MIRROR SW (RIGHTWARD)
21	L	MIRROR SENSOR (RH HORIZONTAL)
22	G	MIRROR SENSOR (LH HORIZONTAL)
23	P	TELESCOPIC SENSOR
24	R	SET SW
25	SB	ADDRESS2
26	Y	RX (UART)
27	G	TELESCOPIC SW (BACKWARD)
30	G	MIRROR MOTOR (RH COMMON) [With A/T]
30	R	MIRROR MOTOR (RH COMMON) [With M/T]
31	LG	MIRROR MOTOR (LH VERTICAL)
32	L	MIRROR MOTOR (LH HORIZONTAL)

Connector No.	M52
Connector Name	AUTOMATIC DRIVE POSITIONER CONTROL UNIT
Connector Type	INS16FW-CS

H.S.

33 34 35 36 37 38 39
40 41 42 43 44 45 46 47 48

Terminal No.	Color of Wire	Signal Name
33	R	POWER SUPPLY (SENSOR) [With automatic drive positioner]
34	R	BAT (FUSE)
35	L	TILT MOTOR (UPWARD)
36	GR	TELESCOPIC MOTOR (FORWARD)
39	W	BAT (C/B)
40	B	GND(SIGNAL)
41	R	GND(SENSOR) [With automatic drive positioner]
42	O	TILT MOTOR (DOWNWARD)
44	G	TELESCOPIC MOTOR (BACKWARD)
48	B	GND(POWER)

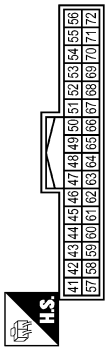
JCJWA0027GB

AUTOMATIC DRIVE POSITIONER

Connector No.	M62
Connector Name	CIRCUIT BREAKER
Connector Type	M02FW-P-LC

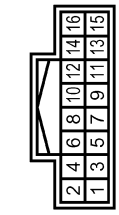
Terminal No.	Color of Wire	Signal Name
1	W	–
2	SB	– [With automatic drive positioner]

Connector No.	M67
Connector Name	UNIFIED METER AND A/C AMP.
Connector Type	TH32FW-NH



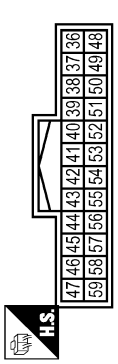
Terminal No.	Color of Wire	Signal Name
56	L	CAN-H
72	P	CAN-L

Connector No.	M72
Connector Name	MULTIFUNCTION SWITCH
Connector Type	TH16FW-NH



Terminal No.	Color of Wire	Signal Name
6	LG	AV COMM (H)
8	V	AV COMM (L)

Connector No.	M83
Connector Name	AV CONTROL UNIT
Connector Type	TH24FW-NH



Terminal No.	Color of Wire	Signal Name
44	BR	COMM (DISP->CONT)
50	SHIELD	SHIELD
51	–	–
52	–	–
53	–	–
55	SHIELD	SHIELD
56	Y	COMM (CONT->DISP)

Connector No.	M85
Connector Name	AV CONTROL UNIT
Connector Type	TH32FW-NH

Terminal No.	Color of Wire	Signal Name
86	L	CAN-H
87	P	CAN-L
88	G	AV COMM (H) [With BOSE system]
89	R	AV COMM (L) [With BOSE system]

Connector No.	M87
Connector Name	AV CONTROL UNIT
Connector Type	TH40FW-NH

Terminal No.	Color of Wire	Signal Name
44	–	–
50	V	AV COMM (H)
51	LG	AV COMM (L)
52	L	CAN-H
53	P	CAN-L
55	–	–
56	–	–

Connector No.	M88
Connector Name	AV CONTROL UNIT
Connector Type	TH12FW-NH

Terminal No.	Color of Wire	Signal Name
70	BR	COMM (CONT->DISP)
71	Y	COMM (DISP->CONT)
72	SHIELD	SHIELD

Connector No.	M116
Connector Name	WIRE TO WIRE
Connector Type	TK36MW-NS10

Terminal No.	Color of Wire	Signal Name
43	P	–
44	L	–

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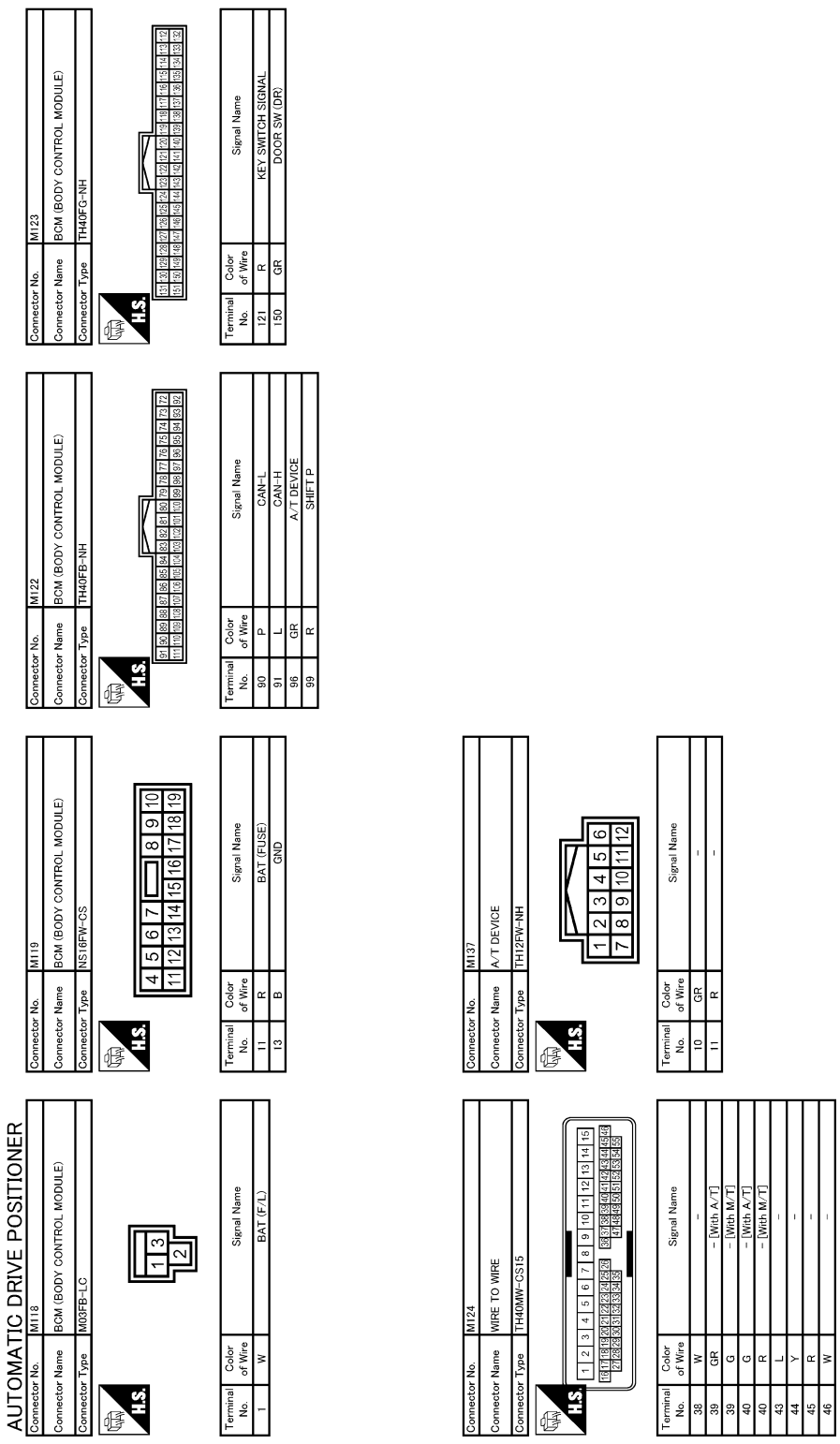


JCJWA0029GB

Fail Safe

INFOID:0000000000962334

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

Operating in fail-safe mode	Malfunction Item	Related DTC	Diagnosis
Only manual functions operate normally.	CAN communication	U1000	ADP-51
	Tilt sensor	B2118	ADP-54
	Telescopic sensor	B2119	ADP-57
	Detent switch	B2126	ADP-60
	Parking brake switch	B2127	ADP-62
Only manual functions, except door mirror, operate normally.	UART communication	B2128	ADP-64
Only manual functions, except seat sliding, operate normally.	Seat sliding output	B2112	ADP-52
Only manual functions, except seat reclining, operate normally.	Seat reclining output	B2113	ADP-52

DTC Index

INFOID:0000000000962335

CONSULT-III display	Timing*1		Item	Reference page
	Current malfunction	Previous malfunction		
CAN COMM CIRCUIT [U1000]	0	1-39	CAN communication	ADP-51
SEAT SLIDE [B2112]	0	1-39	Seat slide motor output	ADP-52
SEAT RECLINING [B2113]	0	1-39	Seat reclining motor output	ADP-53
TILT SENSOR [B2118]	0	1-39	Tilt sensor input	ADP-54
TELESCO SENSOR [B2119]	0	1-39	Telescopic sensor input	ADP-57
DETENT SW [B2126]	0	1-39	Detention switch condition	ADP-60
PARKING BRAKE [B2127]	0	1-39	Parking brake switch condition	ADP-62
UART COMM [B2128]	0	1-39	UART communication	ADP-64

*1:

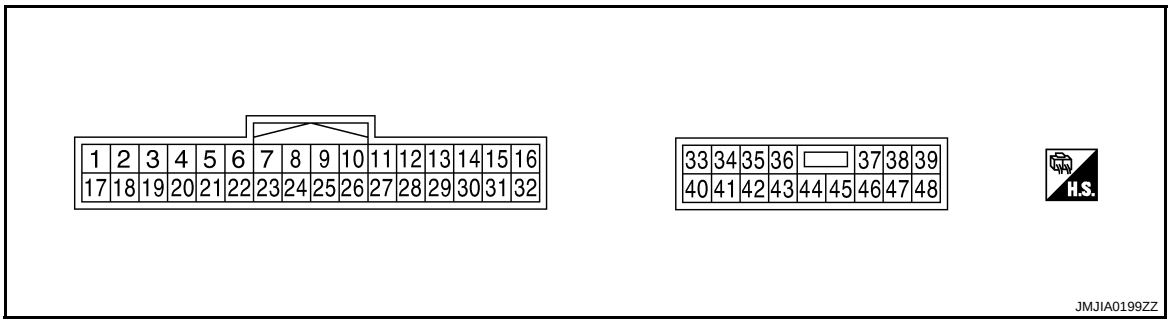
- 0: Current malfunction is present
- 1-39: Displayed if any previous malfunction is present when current condition is normal. The numeral value increases by one at each IGN ON to OFF cycle from 1 to 39. The counter remains at 39 even if the number of cycles exceeds it. However, the counter is reset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

AUTOMATIC DRIVE POSITIONER CONTROL UNIT

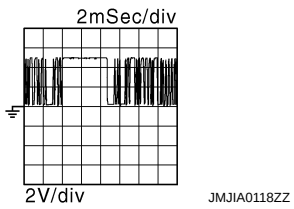
Reference Value

INFOID:0000000000962336

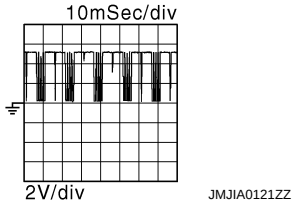
TERMINAL LAYOUT



PHYSICAL VALUES

Terminal No.		Wire color	Description		Condition		Voltage (V) (Approx.)
+	-		Signal name	Input/ Out-put			
1	Ground	Y	Tilt switch up signal	Input	Tilt switch	Operate (up)	0
						Other than above	5
2	Ground	LG	Changeover switch RH signal	Input	Changeover switch position	RH	0
						Neutral or LH	5
3	Ground	G	Mirror switch up signal	Input	Mirror switch	Operated (up)	0
						Other than above	5
4	Ground	V	Mirror switch left signal	Input	Mirror switch	Operated (left)	0
						Other than above	5
5	Ground	R	Door mirror sensor (RH) up/down signal	Input	Door mirror RH position	Peak	3.4
						Valley	0.6
6	Ground	GR	Door mirror sensor (LH) up/down signal	Input	Door mirror LH position	Peak	3.4
						Valley	0.6
7	Ground	O	Tilt sensor signal	Input	Tilt position	Top	1.2
						Bottom	3.4
9	Ground	L	Memory switch 1 signal	Input	Memory switch 1	Push	0
						Other than above	5
10	Ground	V	UART communication (TX)	Out-put	Ignition switch ON		

Terminal No.		Wire color	Description		Condition		Voltage (V) (Approx.)
+	-		Signal name	Input/ Output			
11	Ground	GR	Telescopic switch forward signal	Input	Telescopic switch	Operate (forward)	0
						Other than above	5
12	Ground	O	Memory indictor 1 signal	Output	Memory indictor 1	Illuminate	0
						Other than above	Battery voltage
13	Ground	P	Memory indictor 2 signal	Output	Memory indictor 2	Illuminate	0
						Other than above	Battery voltage
14	Ground	W	Door mirror motor (RH) up output signal	Output	Door mirror RH	Operate (up)	Battery voltage
						Other than above	0
15	Ground	GR[*1] G[*2]	Door mirror motor (RH) left output signal	Output	Door mirror RH	Operate (left)	Battery voltage
						Other than above	0
16	Ground	Y	Door mirror motor (LH) down output signal	Output	Door mirror (LH)	Operate (down)	Battery voltage
						Other than above	0
			Door mirror motor (LH) right output signal			Operate (right)	Battery voltage
						Other than above	0
17	Ground	W	Tilt switch down signal	Input	Tilt switch	Operate (down)	0
						Other than above	5
18	Ground	P	Changeover switch LH signal	Input	Changeover switch position	LH	0
						Neutral or RH	5
19	Ground	SB	Mirror switch down signal	Input	Mirror switch	Operate (down)	0
						Other than above	5
20	Ground	BR	Mirror switch right signal	Input	Mirror switch	Operate (right)	0
						Other than above	5
21	Ground	L	Door mirror sensor (RH) left/right signal	Input	Door mirror RH position	Left edge	3.4
						Right edge	0.6
22	Ground	G	Door mirror sensor (LH) left/right signal	Input	Door mirror LH position	Left edge	0.6
						Right edge	3.4
23	Ground	P	Telescopic sensor signal	Input	Telescopic position	Top	0.8
						Bottom	3.4

Terminal No.		Wire color	Description		Condition		Voltage (V) (Approx.)
+	-		Signal name	Input/ Output			
24	Ground	R	Set switch signal	Input	Set switch	Push	0
						Other than above	5
25	Ground	SB	Memory switch 2 signal	Input	Memory switch 2	Push	0
						Other than above	5
26	Ground	Y	UART communication (RX)	Input	Ignition switch ON		
27	Ground	G	Telescopic switch backward signal	Input	Telescopic switch	Operate (backward)	0
						Other than above	5
30	Ground	G*1 R*2	Door mirror motor (RH) down output signal	Output	Door mirror (RH)	Operate (down)	Battery voltage
						Other than above	0
			Door mirror motor (RH) right output signal			Operate (right)	Battery voltage
						Other than above	0
31	Ground	LG	Door mirror motor (LH) up output signal	Output	Door mirror (LH)	Operate (up)	Battery voltage
						Other than above	0
32	Ground	L	Door mirror motor (LH) left output signal	Output	Door mirror (LH)	Operate (left)	Battery voltage
						Other than above	0
33	Ground	R	Sensor power supply	Input	—		5
34	Ground	R	Power source (Fuse)	Input	—		Battery voltage
35	Ground	L	Tilt motor up output signal	Output	Steering tilt	Operate (up)	Battery voltage
						Other than above	0
36	Ground	GR	Telescopic motor forward output signal	Output	Steering telescopic	Operate (forward)	Battery voltage
						Other than above	0
39	Ground	W	Power source (C/B)		—		Battery voltage
40	Ground	B	Ground	—	—		0
41	Ground	R	Sensor ground	—	—		0

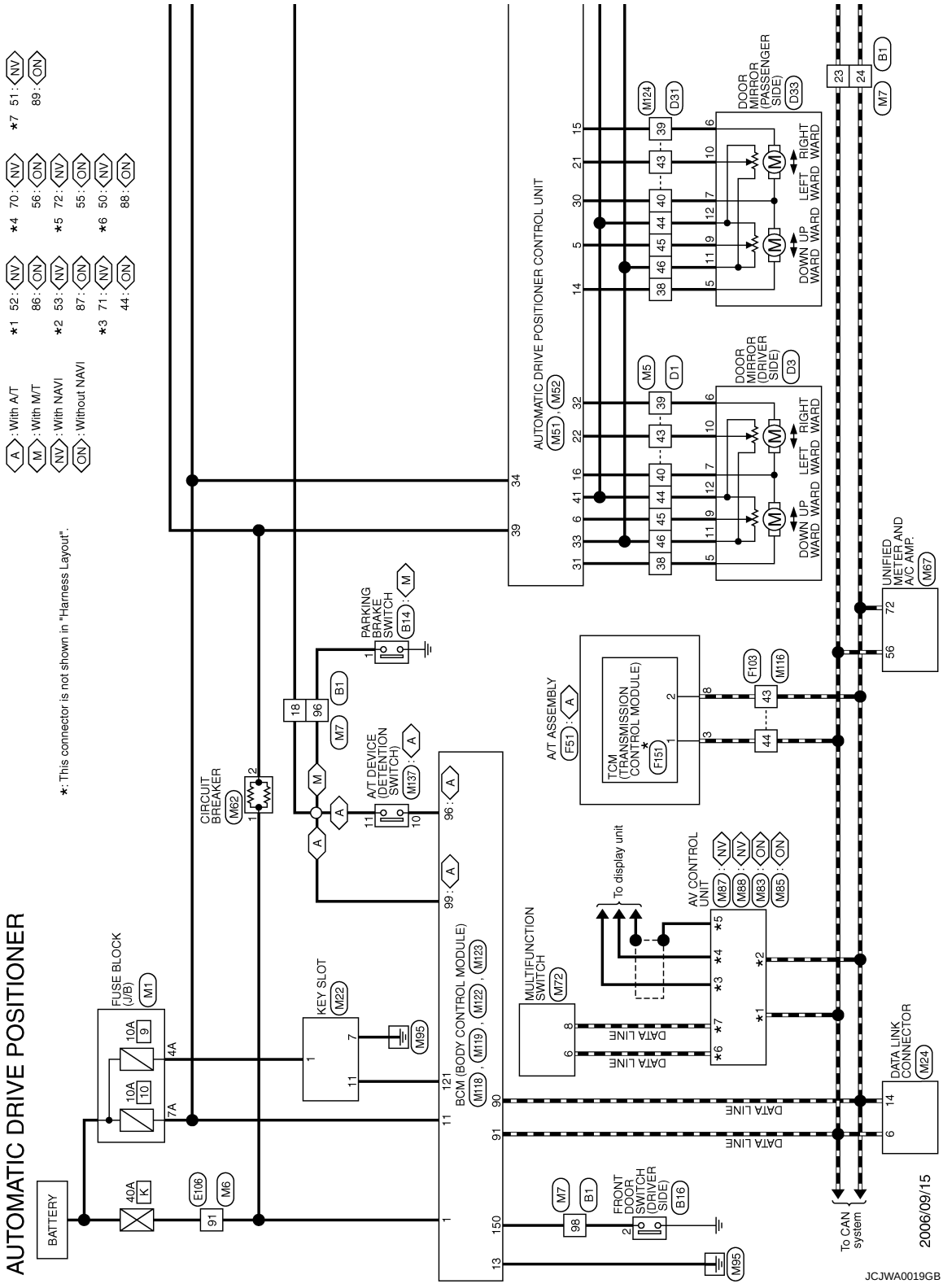
Terminal No.		Wire color	Description		Condition		Voltage (V) (Approx.)
+	-		Signal name	Input/ Output			
42	Ground	O	Tilt motor down output signal	Output	Steering tilt	Operate (down)	Battery voltage
						Other than above	0
44	Ground	G	Telescopic motor backward output signal	Output	Steering telescopic	Operate (backward)	Battery voltage
						Other than above	0
48	Ground	B	Ground	—	—		0

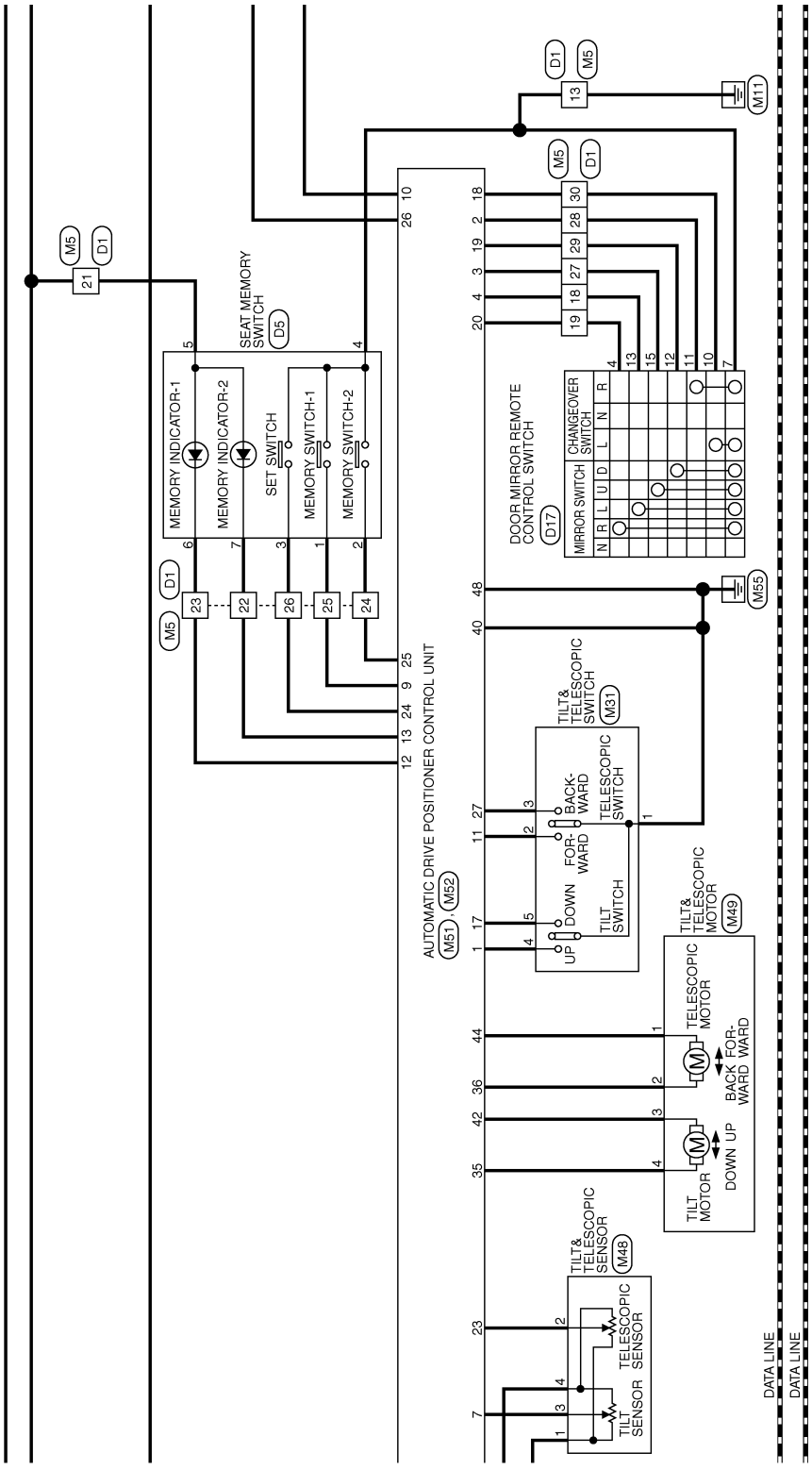
*1: For AT models

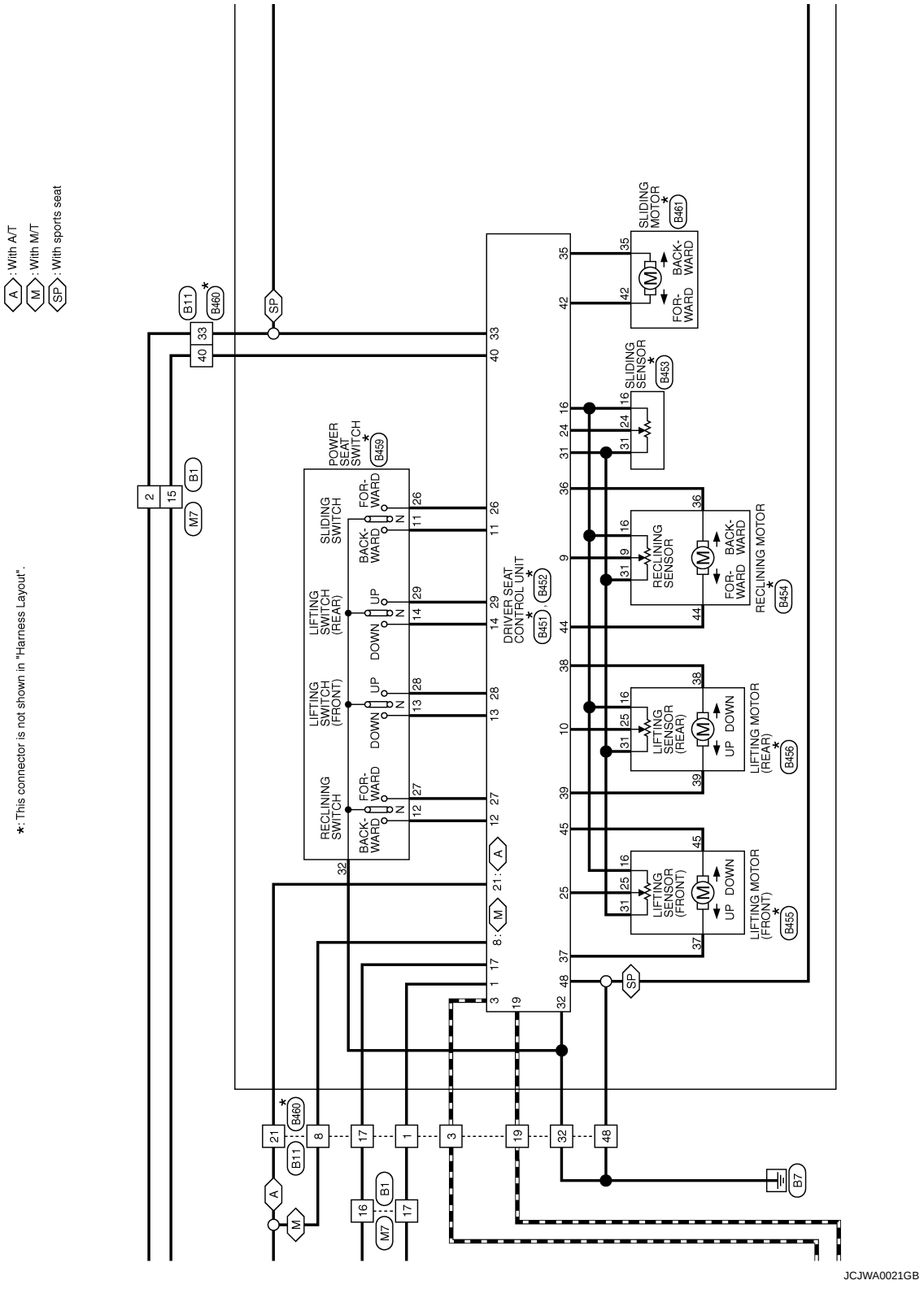
*2: For MT models

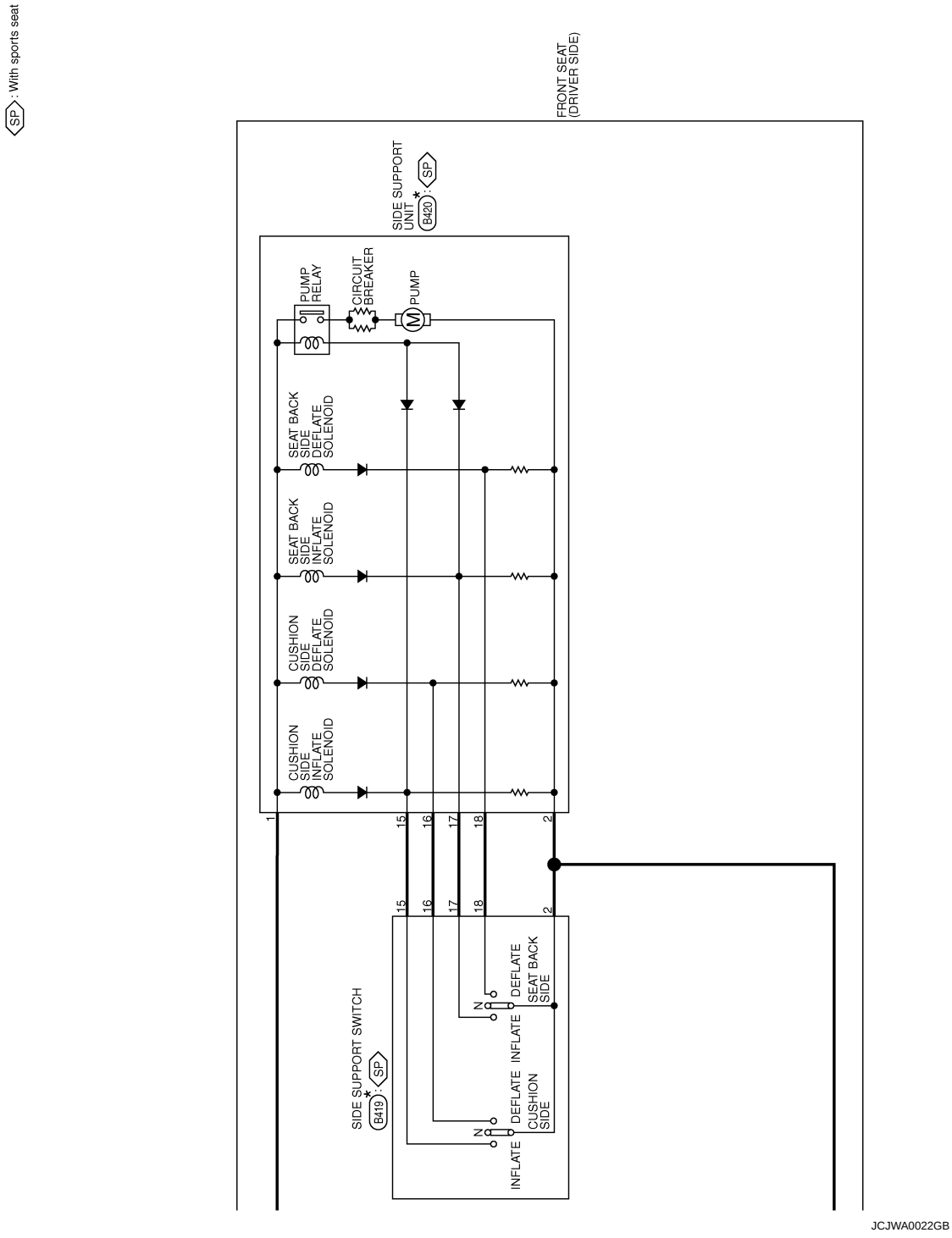
Wiring Diagram—AUTOMATIC DRIVE POSITIONER CONTROL SYSTEM—

INFOID:0000000000962337




AUTOMATIC DRIVE POSITIONER CONTROL UNIT
M51, M52
SEAT MEMORY SWITCH
D5
MEMORY INDICATOR-1
MEMORY INDICATOR-2
SET SWITCH
MEMORY SWITCH-1
MEMORY SWITCH-2
DOOR MIRROR REMOTE CONTROL SWITCH
D17
MIRROR SWITCH
CHANGEOVER SWITCH
TILT& TELESCOPIC SWITCH
M31
TELESCOPIC SWITCH
FOR-WARD
BACK-WARD
TILT SWITCH
UP
DOWN
TILT& TELESCOPIC MOTOR
M49
TELESCOPIC MOTOR
BACK FOR-WARD
TILT MOTOR
DOWN UP
TILT& TELESCOPIC SENSOR
M48
TELESCOPIC SENSOR
TILT SENSOR
DATA LINE
DATA LINE
M11
M55
JCJWA0020GB


A : With A/T
M : With M/T
SP : With sports seat
*: This connector is not shown in "Harness Layout".
SLIDING MOTOR
SLIDING SENSOR
POWER SEAT SWITCH
SLIDING SWITCH
LIFTING SWITCH (REAR)
LIFTING SWITCH (FRONT)
RECLINING SWITCH
DRIVER SEAT CONTROL UNIT
RECLINING SENSOR
RECLINING MOTOR
LIFTING SENSOR (REAR)
LIFTING MOTOR (REAR)
LIFTING SENSOR (FRONT)
LIFTING MOTOR (FRONT)
FOR-WARD
BACK-WARD
UP
DOWN
B1
B7
B11
B451
B452
B453
B454
B455
B456
B459
B460
B461
M7
JCJWA0021GB


SP : With sports seat
FRONT SEAT (DRIVER SIDE)
SIDE SUPPORT UNIT (B420) : SP
PUMP RELAY
CIRCUIT BREAKER
PUMP
SEAT BACK SIDE DEFLATE SOLENOID
SEAT BACK SIDE INFLATE SOLENOID
CUSHION SIDE DEFLATE SOLENOID
CUSHION SIDE INFLATE SOLENOID
1
15
16
17
18
2
SIDE SUPPORT SWITCH (B419) : SP
N
DEFLATE SEAT BACK SIDE
INFLATE
DEFLATE CUSHION SIDE
INFLATE
JCJWA0022GB

AUTOMATIC DRIVE POSITIONER

Connector No.	B1
Connector Name	WIRE TO WIRE
Connector Type	TH80FW-CS16-TM4

Terminal No.	Color of Wire	Signal Name
2	SB	–
15	BR	–
16	LG	–
17	G	–
18	Y	–
23	L	–
24	P	–
96	V	–
98	V	–

Connector No.	B11
Connector Name	WIRE TO WIRE (With automatic drive positioner)
Connector Type	NS16FW-CS

Terminal No.	Color of Wire	Signal Name
1	G	–
3	L	–
8	Y	–
17	LG	–
19	P	–
21	Y	–
32	B	–
33	SB	–
40	BR	–
48	B	–

Connector No.	B14
Connector Name	PARKING BRAKE SWITCH
Connector Type	P01FB-A

Terminal No.	Color of Wire	Signal Name
1	V	–

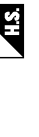
Connector No.	B16
Connector Name	FRONT DOOR SWITCH (DRIVER SIDE)
Connector Type	A03FW

Terminal No.	Color of Wire	Signal Name
2	V	–

Connector No.	B419
Connector Name	SIDE SUPPORT SWITCH
Connector Type	NS06FW-CS

Terminal No.	Color of Wire	Signal Name
2	B	–
15	G	– [With automatic drive positioner]
16	B/R	– [With automatic drive positioner]
17	V/W	– [With automatic drive positioner]
18	R/L	– [With automatic drive positioner]

Connector No.	B420
Connector Name	SIDE SUPPORT UNIT
Connector Type	NS06FW-CS



Terminal No.	Color of Wire	Signal Name
1	R	–
2	B	–
15	G	– [With automatic drive positioner]
16	B/R	– [With automatic drive positioner]
17	V/W	– [With automatic drive positioner]
18	R/L	– [With automatic drive positioner]

Connector No.	B451
Connector Name	DRIVER SEAT CONTROL UNIT
Connector Type	TH32FW

Terminal No.	Color of Wire	Signal Name
1	L/W	RX
3	R/Y	CAN-H
8	LG	PARKING BRAKE SW
9	W/G	PULSE(RECLINING)
10	P/B	PULSE(RR LIFTING)
11	BR	SLIDING SW(BACKWARD)
12	SB	RECLINING SW(BACKWARD)
13	LG/R	FRONT LIFTING SW(DOWNWARD)
14	G/B	REAR LIFTING SW(DOWNWARD)
16	O	VCC
17	Y/R	TX
19	V	CAN-L
21	L/Y	P RANGE SW
24	R	PULSE(SLIDING)
25	Y/B	PULSE(FR LIFTING)
26	Y	SLIDING SW(FORWARD)
27	R/G	RECLINING SW(FORWARD)
28	W/B	FRONT LIFTING SW(UPWARD)
29	P/L	REAR LIFTING SW(UPWARD)
31	GR	SENSOR GND
32	B/W	GND(SIGNAL)

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AUTOMATIC DRIVE POSITIONER

Connector No.	B452
Connector Name	DRIVER SEAT CONTROL UNIT
Connector Type	NS16FW-CS

Terminal No.	Color of Wire	Signal Name
33	R	BAT(C/B)
35	W/R	SLIDING MOTOR(FORWARD)
36	G/Y	RECLINING MOTOR(FORWARD)
37	G/W	FRONT LIFTING MOTOR(DOWNWARD)
38	L/Y	REAR LIFTING MOTOR(UPWARD)
39	R/B	REAR LIFTING MOTOR(BACKWARD)
40	R/W	BAT(FUSE)
42	W/B	SLIDING MOTOR(BACKWARD)
44	P	RECLINING MOTOR(BACKWARD)
45	L/R	FRONT LIFTING MOTOR(UPWARD)
48	B	GND(POWER)

Connector No.	B453
Connector Name	SLIDING SENSOR
Connector Type	6098-0241

Terminal No.	Color of Wire	Signal Name
16	O	–
24	R	–
31	GR	–

Connector No.	B454
Connector Name	RECLINING MOTOR
Connector Type	NS06FW-CS

Terminal No.	Color of Wire	Signal Name
9	W/G	–
16	O	–
31	GR	–
36	G/Y	–
44	P	–

Connector No.	B455
Connector Name	LIFTING MOTOR(FRONT)(DRIVER SIDE)
Connector Type	NS06FW-CS

Terminal No.	Color of Wire	Signal Name
16	O	–
25	Y/B	–
31	GR	–
37	G/W	–
45	L/R	–

Connector No.	B456
Connector Name	LIFTING MOTOR(REAR)(DRIVER SIDE)
Connector Type	NS06FBR-CS

Terminal No.	Color of Wire	Signal Name
16	O	–
25	P/B	–
31	GR	–
38	L/Y	–
39	R/B	–

Connector No.	B459
Connector Name	POWER SEAT SWITCH(DRIVER SIDE)
Connector Type	NS10FW-CS

Terminal No.	Color of Wire	Signal Name
11	BR	–
12	SB	–
13	LG/R	–
14	G/B	–
26	Y	–
27	R/G	–
28	W/B	–
29	P/L	–
32	B/W	–

Connector No.	B460
Connector Name	WIRE TO WIRE (With automatic drive positioner)
Connector Type	NS16MW-CS

Terminal No.	Color of Wire	Signal Name
1	L/W	–
3	R/Y	–
8	LG	–
17	Y/R	–
19	V	–
21	L/Y	–
32	B/W	–
33	R	–
40	R/W	–
48	B	–

Connector No.	B461
Connector Name	SLIDING MOTOR(DRIVER SIDE)
Connector Type	6098-0239

Terminal No.	Color of Wire	Signal Name
35	W/R	–
42	W/B	–

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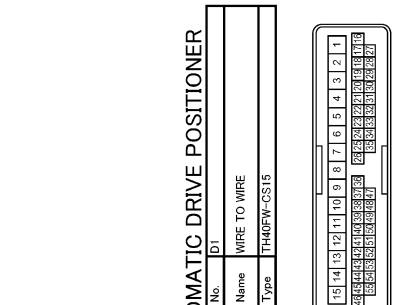
AUTOMATIC DRIVE POSITIONER

Connector No.	D1
Connector Name	WIRE TO WIRE
Connector Type	TH40FW-CS15

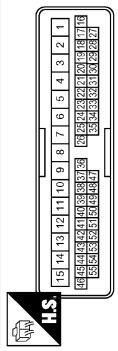


Terminal No.	Color of Wire	Signal Name
13	B	–
18	W	–
19	BR	–
21	R	–
22	P	–
23	O	–
24	BR	–
25	L	–
26	GR	–
27	Y	–
28	LG	–
29	G	–
30	GR	–
38	O	–
39	GR	–
40	G	–
43	BR	–
44	V	–
45	P	–
46	W	–

Connector No.	D17
Connector Name	DOOR MIRROR REMOTE CONTROL SWITCH (With automatic drive positioner)
Connector Type	TK16FBR

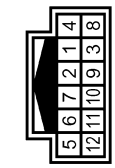
Terminal No.	Color of Wire	Signal Name
4	BR	–
7	B	–
10	GR	–
11	LG	–
12	G	–
13	W	–
15	Y	–

Connector No.	D31
Connector Name	WIRE TO WIRE
Connector Type	TH40FW-CS15



Terminal No.	Color of Wire	Signal Name
38	W	– [with A/T]
38	O	– [with M/T]
39	G	– [with A/T]
39	GR	– [with M/T]
40	Y	– [with A/T]
40	G	– [with M/T]
43	BR	–
44	V	–
45	P	–
46	W	–

Connector No.	D3
Connector Name	DOOR MIRROR (DRIVER SIDE)
Connector Type	TH12MW-NH

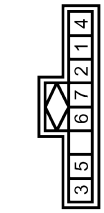


Terminal No.	Color of Wire	Signal Name
5	O	– [With automatic drive positioner]
6	GR	– [With automatic drive positioner]
7	G	– [With automatic drive positioner]
9	P	–
10	BR	–
11	W	–
12	V	–

Connector No.	D33
Connector Name	DOOR MIRROR (PASSENGER SIDE)
Connector Type	TH12MW-NH

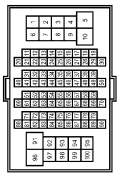
Terminal No.	Color of Wire	Signal Name
5	W	– [With automatic drive positioner]
6	G	– [With automatic drive positioner]
7	Y	– [With automatic drive positioner]
9	P	–
10	BR	–
11	W	–
12	V	–

Connector No.	D5
Connector Name	SEAT MEMORY SWITCH
Connector Type	A08FW



Terminal No.	Color of Wire	Signal Name
1	L	–
2	BR	–
3	GR	–
4	B	–
5	R	–
6	O	–
7	P	–

Connector No.	E106
Connector Name	WIRE TO WIRE
Connector Type	TH80FW-CS16-TM4



Terminal No.	Color of Wire	Signal Name
91	W	–

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AUTOMATIC DRIVE POSITIONER

Connector No.	F51
Connector Name	A/T ASSEMBLY
Connector Type	RK10FG-DGY

Terminal No.	Color of Wire	Signal Name
3	L	–
8	P	–

Connector No.	F103
Connector Name	WIRE TO WIRE
Connector Type	TK36FW-NS10

Terminal No.	Color of Wire	Signal Name
43	P	–
44	L	–

Connector No.	F151
Connector Name	TCM (TRANSMISSION CONTROL MODULE)
Connector Type	SP10FBGY

Terminal No.	Color of Wire	Signal Name
1	BR	CAN-H
2	L/Y	CAN-L

Connector No.	M1
Connector Name	FUSE BLOCK (J/B)
Connector Type	NS06FW-M2

Terminal No.	Color of Wire	Signal Name
4A	P	–
7A	R	–

Connector No.	M5
Connector Name	WIRE TO WIRE
Connector Type	TH40MW-CS15

Terminal No.	Color of Wire	Signal Name
13	B	–
18	V	–
19	BR	–
21	R	–
22	P	–
23	O	–
24	SB	–
25	L	–
26	R	–
27	G	–
28	LG	–
29	SB	–
30	P	–
38	LG	–
39	L	–
40	Y	–
43	G	–
44	R	–
45	GR	–
46	R	–

Connector No.	M6
Connector Name	WIRE TO WIRE
Connector Type	TH80MW-CS16-TM4

Terminal No.	Color of Wire	Signal Name
91	W	–

Connector No.	M7
Connector Name	WIRE TO WIRE
Connector Type	TH80MW-CS16-TM4

Terminal No.	Color of Wire	Signal Name
2	SB	– [With automatic drive positioner]
15	BR	–
16	Y	–
17	V	–
18	R	– [With A/T]
18	Y	– [With M/T]
19	–	–
23	L	–
24	P	–
96	V	–
98	GR	–

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AUTOMATIC DRIVE POSITIONER

Connector No.	M22
Connector Name	KEY SLOT
Connector Type	TH12FW-NH

Terminal No.	Color of Wire	Signal Name
1	R	BAT
7	B	GND
11	R	KEY SWITCH SIGNAL

Connector No.	M24
Connector Name	DATA LINK CONNECTOR
Connector Type	BD16FW

Terminal No.	Color of Wire	Signal Name
6	L	–
14	P	–

Connector No.	M31
Connector Name	TILT & TELESCOPIC SWITCH
Connector Type	TK06FGY

Terminal No.	Color of Wire	Signal Name
1	B	–
2	GR	–
3	G	–
4	Y	–
5	W	–

Connector No.	M48
Connector Name	TILT & TELESCOPIC SENSOR
Connector Type	TK04FW

Terminal No.	Color of Wire	Signal Name
1	W	–
2	P	–
3	O	–
4	Y	–

Connector No.	M49
Connector Name	TILT & TELESCOPIC MOTOR
Connector Type	NS04FW-CS

Terminal No.	Color of Wire	Signal Name
1	G	–
2	GR	–
3	O	–
4	L	–

Connector No.	M51
Connector Name	AUTOMATIC DRIVE POSITIONER CONTROL UNIT
Connector Type	TH32FW-NH

Terminal No.	Color of Wire	Signal Name
1	Y	TILT SW (UPWARD)
2	LG	MIRROR SELECT SW (RH)
3	G	MIRROR SW (UPWARD)
4	V	MIRROR SW (LEFTWARD)
5	R	MIRROR SENSOR (RH VERTICAL)
6	GR	MIRROR SENSOR (LH VERTICAL)
7	O	TILT SENSOR
9	L	ADDRESS1
10	V	TX (UART)
11	GR	TELESCOPIC SW (FRONTWARD)
12	O	IND1
13	P	IND2
14	W	MIRROR MOTOR (RH VERTICAL)
15	GR	MIRROR MOTOR (RH HORIZONTAL) [With A/T]
15	G	MIRROR MOTOR (RH HORIZONTAL) [With M/T]
16	Y	MIRROR MOTOR (LH COMMON)
17	W	TILT SW (DOWNWARD)
18	P	MIRROR SELECT SW (LH)
19	SB	MIRROR SW (DOWNWARD)
20	BR	MIRROR SW (RIGHTWARD)
21	L	MIRROR SENSOR (RH HORIZONTAL)
22	G	MIRROR SENSOR (LH HORIZONTAL)
23	P	TELESCOPIC SENSOR
24	R	SET SW
25	SB	ADDRESS2
26	Y	RX (UART)
27	G	TELESCOPIC SW (BACKWARD)
30	G	MIRROR MOTOR (RH COMMON) [With A/T]
30	R	MIRROR MOTOR (RH COMMON) [With M/T]
31	LG	MIRROR MOTOR (LH VERTICAL)
32	L	MIRROR MOTOR (LH HORIZONTAL)

Connector No.	M52
Connector Name	AUTOMATIC DRIVE POSITIONER CONTROL UNIT
Connector Type	INS16FW-CS

Terminal No.	Color of Wire	Signal Name
33	R	POWER SUPPLY (SENSOR) [With automatic drive positioner]
34	R	BAT (FUSE)
35	L	TILT MOTOR (UPWARD)
36	GR	TELESCOPIC MOTOR (FORWARD)
39	W	BAT (C/B)
40	B	GND(SIGNAL)
41	R	GND(SENSOR) [With automatic drive positioner]
42	O	TILT MOTOR (DOWNWARD)
44	G	TELESCOPIC MOTOR (BACKWARD)
48	B	GND(POWER)

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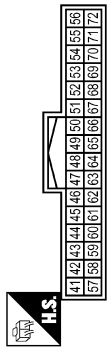
AUTOMATIC DRIVE POSITIONER

Connector No.	M62
Connector Name	CIRCUIT BREAKER
Connector Type	M02FW-P-LC

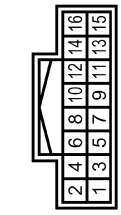
Terminal No.	Color of Wire	Signal Name
1	W	–
2	SB	– [With automatic drive positioner]

Connector No.	M67
Connector Name	UNIFIED METER AND A/C AMP.
Connector Type	TH32FW-NH



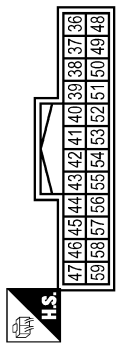
Terminal No.	Color of Wire	Signal Name
56	L	CAN-H
72	P	CAN-L

Connector No.	M72
Connector Name	MULTIFUNCTION SWITCH
Connector Type	TH16FW-NH



Terminal No.	Color of Wire	Signal Name
6	LG	AV COMM (H)
8	V	AV COMM (L)

Connector No.	M83
Connector Name	AV CONTROL UNIT
Connector Type	TH24FW-NH



Terminal No.	Color of Wire	Signal Name
44	BR	COMM (DISP->CONT)
50	SHIELD	SHIELD
51	–	–
52	–	–
53	–	–
55	SHIELD	SHIELD
56	Y	COMM (CONT->DISP)

Connector No.	M85
Connector Name	AV CONTROL UNIT
Connector Type	TH32FW-NH

Terminal No.	Color of Wire	Signal Name
86	L	CAN-H
87	P	CAN-L
88	G	AV COMM (H) [With BOSE system]
89	R	AV COMM (L) [With BOSE system]

Connector No.	M87
Connector Name	AV CONTROL UNIT
Connector Type	TH40FW-NH

Terminal No.	Color of Wire	Signal Name
44	–	–
50	V	AV COMM (H)
51	LG	AV COMM (L)
52	L	CAN-H
53	P	CAN-L
55	–	–
56	–	–

Connector No.	M88
Connector Name	AV CONTROL UNIT
Connector Type	TH12FW-NH

Terminal No.	Color of Wire	Signal Name
70	BR	COMM (CONT->DISP)
71	Y	COMM (DISP->CONT)
72	SHIELD	SHIELD

Connector No.	M116
Connector Name	WIRE TO WIRE
Connector Type	TK36MW-NS10

Terminal No.	Color of Wire	Signal Name
43	P	–
44	L	–

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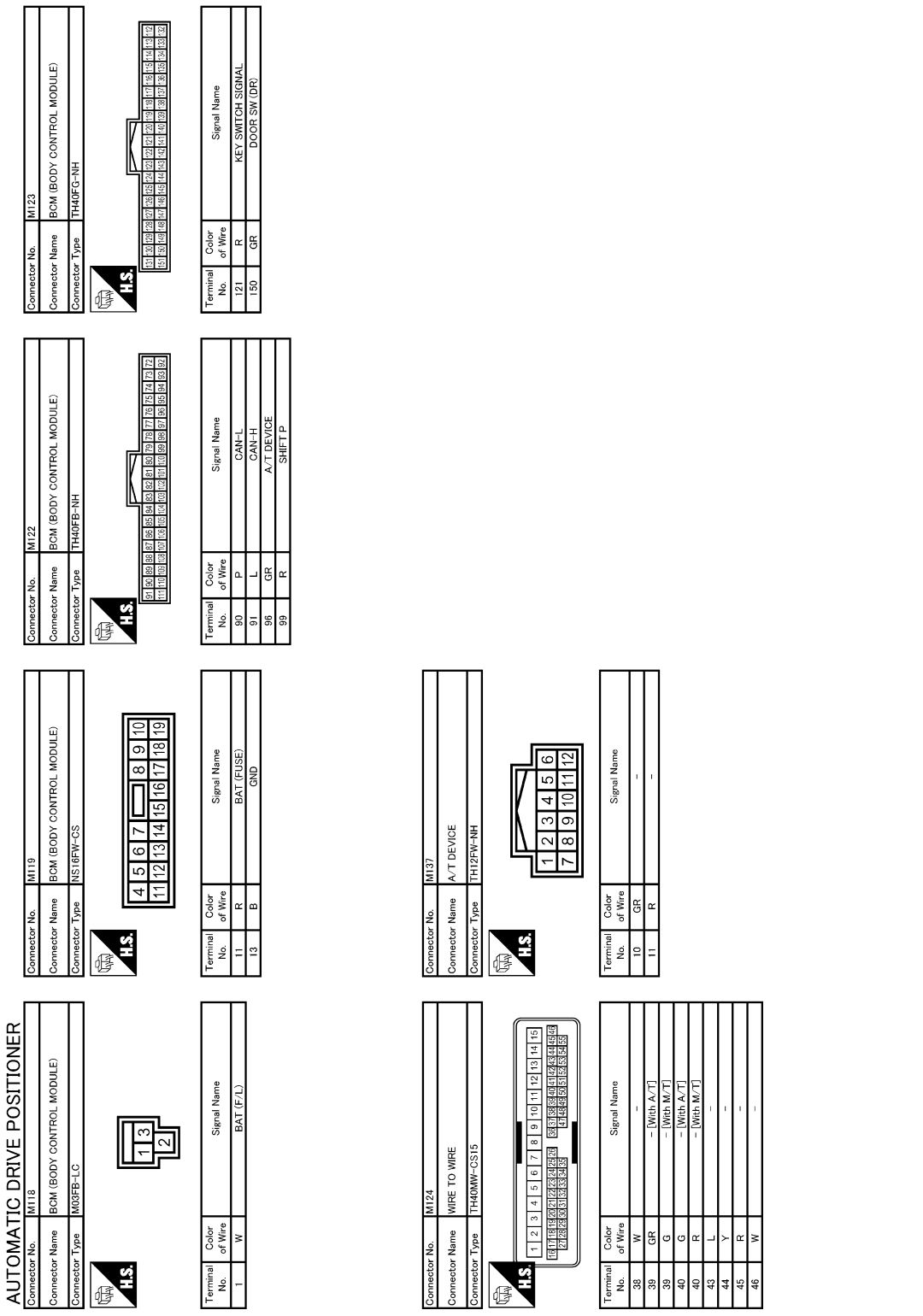

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SYMPTOM DIAGNOSIS

NONE OF THE DOOR MIRROR CAN BE OPERATED USING ANY SWITCH

Diagnosis Procedure

INFOID:0000000000962338

1.CHECK AUTOMATIC DRIVE POSITIONER SYSTEM

Check automatic drive positioner system operation.
Refer to ADP-5, "Work Flow".

Is the inspection result normal?

YES >> GO TO 2.
NO >> Repair or replace the malfunctioning parts.

2.CHECK MIRROR SWITCH

Check mirror switch.
Refer to MIR-11, "Component Function Check".

Is the inspection result normal?

YES >> GO TO 3.
NO >> Repair or replace the malfunctioning parts.

3.CHECK CHANGEOVER SWITCH

Check changeover switch.
Refer to MIR-14, "Component Function Check".

Is the inspection result normal?

YES >> Refer to GI-39, "Intermittent Incident".
NO >> Repair or replace the malfunctioning parts.

DOOR MIRROR DOES NOT OPERATE

Diagnosis Procedure

INFOID:0000000000962339

1.CHECK MIRROR SWITCH

Check mirror switch.
Refer to MIR-11, "Component Function Check".

Is the inspection result normal?

YES >> GO TO 2.
NO >> Repair or replace the malfunctioning parts.

2.CHECK CHANGEOVER SWITCH

Check changeover switch.
Refer to MIR-14, "Component Function Check".

Is the inspection result normal?

YES >> GO TO 3.
NO >> Repair or replace the malfunctioning parts.

3.CHECK DOOR MIRROR MOTOR

Check door mirror motor operation.
Refer to MIR-16, "Component Function Check".

Is the inspection result normal?

YES >> Refer to GI-39, "Intermittent Incident".
NO >> Repair or replace the malfunctioning parts.

AUTO ANTI-DAZZLING INSIDE MIRROR DOES NOT OPERATE

Diagnosis Procedure

INFOID:0000000000962340

1. CHECK AUTO ANTI-DAZZLING INSIDE MIRROR

Check auto anti-dazzling inside mirror.
Refer to MIR-19, "Component Function Check".

Is the inspection result normal?

YES >> Refer to GI-39, "Intermittent Incident".
NO >> Repair or replace the malfunctioning parts.

SQUEAK AND RATTLE TROUBLE DIAGNOSES

Work Flow

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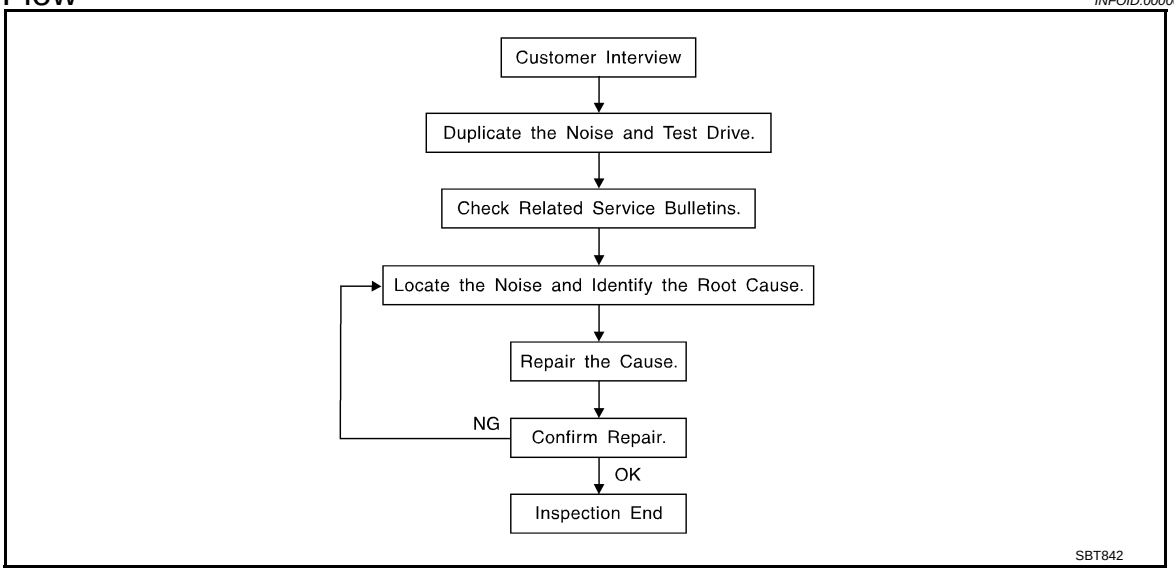


CUSTOMER INTERVIEW

Interview the customer if possible, to determine the conditions that exist when the noise occurs. Use the Diagnostic Worksheet during the interview to document the facts and conditions when the noise occurs and any of customer's comments; refer to MIR-91, "Diagnostic Worksheet". This information is necessary to duplicate the conditions that exist when the noise occurs.

- The customer may not be able to provide a detailed description or the location of the noise. Attempt to obtain all the facts and conditions that exist when the noise occurs (or does not occur).
- If there is more than one noise in the vehicle, perform a diagnosis and repair the noise that the customer is concerned about. This can be accomplished by performing a cruise test on the vehicle with the customer.
- After identifying the type of noise, isolate the noise in terms of its characteristics. The noise characteristics are provided so the customer, service adviser and technician are all speaking the same language when defining the noise.
- Squeak —(Like tennis shoes on a clean floor)
  Squeak characteristics include the light contact/fast movement/brought on by road conditions/hard surfaces=higher pitch noise/softer surfaces=lower pitch noises/edge to surface=chirping
- Creak—(Like walking on an old wooden floor)
  Creak characteristics include firm contact/slow movement/twisting with a rotational movement/pitch dependent on materials/often brought on by activity.
- Rattle—(Like shaking a baby rattle)
  Rattle characteristics include the fast repeated contact/vibration or similar movement/loose parts/missing clip or fastener/incorrect clearance.
- Knock —(Like a knock on a door)
  Knock characteristics include hollow sounding/sometimes repeating/often brought on by driver action.
- Tick—(Like a clock second hand)
  Tick characteristics include gentle contacting of light materials/loose components/can be caused by driver action or road conditions.
- Thump—(Heavy, muffled knock noise)
  Thump characteristics include softer knock/dead sound often brought on by activity.
- Buzz—(Like a bumblebee)
  Buzz characteristics include high frequency rattle/firm contact.
- Often the degree of acceptable noise level will vary depending up on the person. A noise that you may judge as acceptable may be very irritating to the customer.
- Weather conditions, especially humidity and temperature, may have a great effect on noise level.

DUPLICATE THE NOISE AND TEST DRIVE

If possible, drive the vehicle with the customer until the noise is duplicated. Note any additional information on the Diagnostic Worksheet regarding the conditions or location of the noise. This information can be used to duplicate the same conditions when you confirm the repair.

If the noise can be duplicated easily during the test drive, to help identify the source of the noise, try to duplicate the noise with the vehicle stopped by doing one or all of the following:

1) Close a door.
2) Tap or push/pull around the area where the noise appears to be coming from.
3) Rev the engine.
4) Use a floor jack to recreate vehicle “twist”.
5) At idle, apply engine load (electrical load, half-clutch on M/T models, drive position on A/T models).
6) Raise the vehicle on a hoist and hit a tire with a rubber hammer.

- Drive the vehicle and attempt to duplicate the conditions the customer states exist when the noise occurs.
- If it is difficult to duplicate the noise, drive the vehicle slowly on an undulating or rough road to stress the vehicle body.

CHECK RELATED SERVICE BULLETINS

After verifying the customer concern or symptom, check ASIST for Technical Service Bulletins (TSBs) related to that concern or symptom.
If a TSB relates to the symptom, follow the procedure to repair the noise.

LOCATE THE NOISE AND IDENTIFY THE ROOT CAUSE

1. Narrow down the noise to a general area. To help pinpoint the source of the noise, use a listening tool (Chassis Ear: J-39570, Engine Ear and mechanics stethoscope).
2. Narrow down the noise to a more specific area and identify the cause of the noise by:

- removing the components in the area that you suspect the noise is coming from.
  Do not use too much force when removing clips and fasteners, otherwise clips and fastener can be broken or lost during the repair, resulting in the creation of new noise.
- tapping or pushing/pulling the component that you suspect is causing the noise.
  Do not tap or push/pull the component with excessive force, otherwise the noise will be eliminated only temporarily.
- feeling for a vibration with your hand by touching the component(s) that you suspect is (are) causing the noise.
- placing a piece of paper between components that you suspect are causing the noise.
- looking for loose components and contact marks.
  Refer to MIR-89, "Inspection Procedure".

REPAIR THE CAUSE

- If the cause is a loose component, tighten the component securely.
- If the cause is insufficient clearance between components:

- separate components by repositioning or loosening and retightening the component, if possible.
- insulate components with a suitable insulator such as urethane pads, foam blocks, felt cloth tape or urethane tape. A Nissan Squeak and Rattle Kit (J-43980) is available through your authorized Nissan Parts Department.

CAUTION:
Do not use excessive force as many components are constructed of plastic and may be damaged.
NOTE:
Always check with the Parts Department for the latest parts information.
The following materials are contained in the Nissan Squeak and Rattle Kit (J-43980). Each item can be ordered separately as needed.
URETHANE PADS [1.5 mm (0.059 in) thick]
Insulates connectors, harness, etc.
76268-9E005: 100 × 135 mm (3.94 × 5.31 in)/76884-71L01: 60 × 85 mm (2.36 × 3.35 in)/76884-71L02:15 × 25 mm (0.59 × 0.98 in)
INSULATOR (Foam blocks)
Insulates components from contact. Can be used to fill space behind a panel.
73982-9E000: 45 mm (1.77 in) thick, 50 × 50 mm (1.97 × 1.97 in)/73982-50Y00: 10 mm (0.39 in) thick, 50 × 50 mm (1.97 × 1.97 in)
INSULATOR (Light foam block)
80845-71L00: 30 mm (1.18 in) thick, 30 × 50 mm (1.18 × 1.97in)
FELT CLOTHTAPE
Used to insulate where movement does not occur. Ideal for instrument panel applications.
68370-4B000: 15 × 25 mm (0.59 × 0.98 in) pad/68239-13E00: 5 mm (0.20 in) wide tape roll
The following materials, not found in the kit, can also be used to repair squeaks and rattles.
UHMW (TEFLON) TAPE

Insulates where slight movement is present. Ideal for instrument panel applications.
SILICONE GREASE
Used in place of UHMW tape that will be visible or not fit. Will only last a few months.
SILICONE SPRAY
Use when grease cannot be applied.
DUCT TAPE
Use to eliminate movement.

CONFIRM THE REPAIR

Confirm that the cause of a noise is repaired by test driving the vehicle.Operate the vehicle under the same conditions as when the noise originally occurred. Refer to the notes on the Diagnostic Worksheet.

Inspection Procedure

INFOID:0000000000962342

Refer to Table of Contents for specific component removal and installationinformation.

INSTRUMENT PANEL

Most incidents are caused by contact and movement between:

1. The cluster lid A and instrument panel
2. Acrylic lens and combination meter housing
3. Instrument panel to front pillar garnish
4. Instrument panel to windshield
5. Instrument panel mounting pins
6. Wiring harnesses behind the combination meter
7. A/C defroster duct and duct joint
   These incidents can usually be located by tapping or moving the components to duplicate the noise or by pressing on the components while driving to stop the noise. Most of these incidents can be repaired by applying felt cloth tape or silicon spray (in hard to reach areas). Urethane pads can be used to insulate wiring harness.
   CAUTION:
   Do not use silicone spray to isolate a squeak or rattle. If you saturatethe area with silicone, you will not be able to recheck the repair.

CENTER CONSOLE

Components to pay attention to include:

1. Shifter assembly cover to finisher
2. A/C control unit and cluster lid C
3. Wiring harnesses behind audio and A/C control unit

The instrument panel repair and isolation procedures also apply to thecenter console.

DOORS

Pay attention to the:

1. Finisher and inner panel making a slapping noise
2. Inside handle escutcheon to door finisher
3. Wiring harnesses tapping
4. Door striker out of alignment causing a popping noise on startsand stops

Tapping or moving the components or pressing on them while driving to duplicate the conditions can isolate many of these incidents. You can usually insulate the areas with felt cloth tape or insulator foam blocks from the Nissan Squeak and Rattle Kit (J-43980) to repair the noise.

TRUNK

Trunk noises are often caused by a loose jack or loose items put intothe trunk by the owner.
In addition look for:

1. Trunk lid dumpers out of adjustment
2. Trunk lid striker out of adjustment
3. The trunk lid torsion bars knocking together
4. A loose license plate or bracket

Most of these incidents can be repaired by adjusting, securing or insulatingthe item(s) or component(s) causing the noise.

SUNROOF/HEADLINING

Noises in the sunroof/headlining area can often be traced to one of the following:

1. Sunroof lid, rail, linkage or seals making a rattle or light knockingnoise
2. Sunvisor shaft shaking in the holder
3. Front or rear windshield touching headlining and squeaking

Again, pressing on the components to stop the noise while duplicatingthe conditions can isolate most of these incidents. Repairs usually consistof insulating with felt cloth tape.

SEATS

When isolating seat noise it's important to note the position the seatis in and the load placed on the seat when the noise is present. These conditionsshould be duplicated when verifying and isolating the cause of the noise.

Cause of seat noise include:

1. Headrest rods and holder
2. A squeak between the seat pad cushion and frame
3. The rear seatback lock and bracket

These noises can be isolated by moving or pressing on the suspectedcomponents while duplicating the conditions under which the noise occurs.Most of these incidents can be repaired by repositioning the component orapplying urethane tape to the contact area.

UNDERHOOD

Some interior noise may be caused by components under the hood or onthe engine wall. The noise is then transmitted into the passenger compartment.

Causes of transmitted underhood noise include:

1. Any component mounted to the engine wall
2. Components that pass through the engine wall
3. Engine wall mounts and connectors
4. Loose radiator mounting pins
5. Hood bumpers out of adjustment
6. Hood striker out of adjustment

These noises can be difficult to isolate since they cannot be reached from the interior of the vehicle. The best method is to secure, move or insulate one component at a time and test drive the vehicle. Also, engine RPM or load can be changed to isolate the noise. Repairs can usually be made by moving, adjusting, securing, or insulating the component causing the noise.

Diagnostic Worksheet

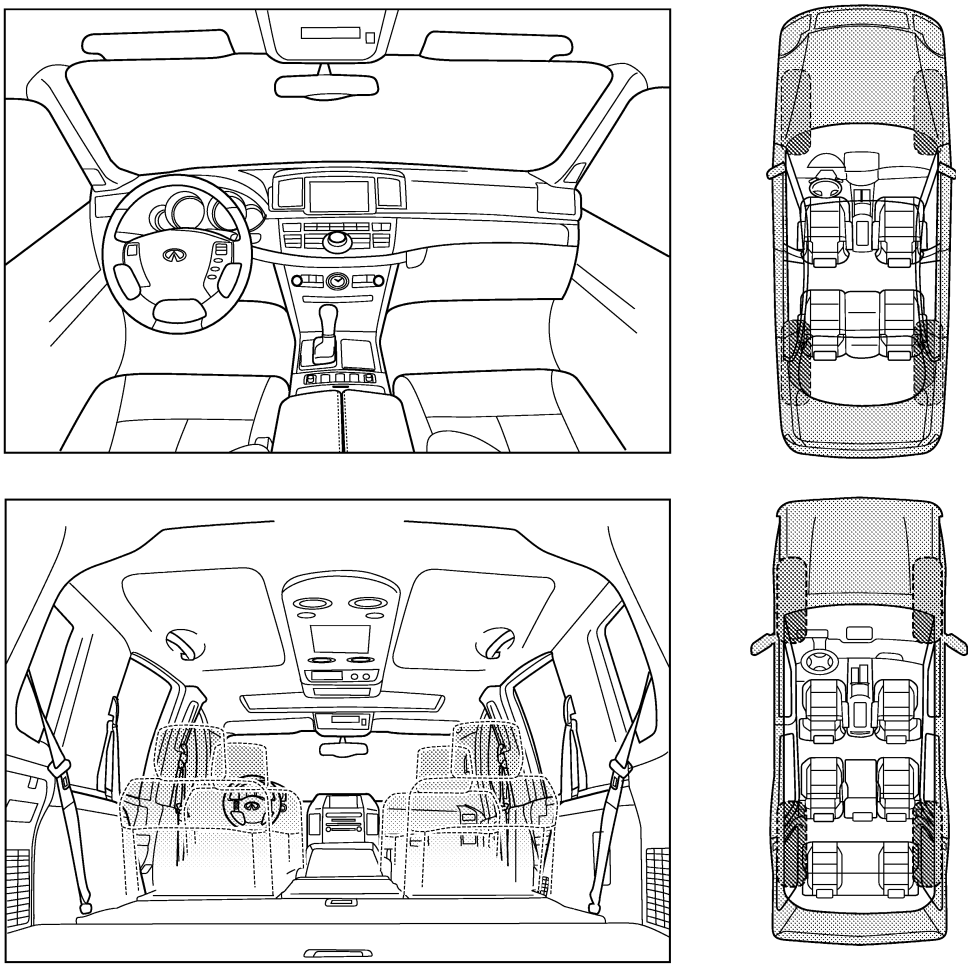
INFOID:0000000000962343

INFINITI.

SQUEAK & RATTLE DIAGNOSTIC WORKSHEET

Dear Infiniti Customer:
We are concerned about your satisfaction with your Infiniti vehicle. Repairing a squeak or rattle sometimes can be very difficult. To help us fix your Infiniti right the first time, please take a moment to note the area of the vehicle where the squeak or rattle occurs and under what conditions. You may be asked to take a test drive with a service consultant or technician to ensure we confirm the noise you are hearing.

I. WHERE DOES THE NOISE COME FROM? (circle the area of the vehicle)
The illustrations are for reference only, and may not reflect the actual configuration of your vehicle.



Continue to page 2 of the worksheet and briefly describe the location of the noise or rattle. In addition, please indicate the conditions which are present when the noise occurs.

PIIB8741E

SQUEAK & RATTLE DIAGNOSTIC WORKSHEET - page 2

Briefly describe the location where the noise occurs:

_____

_____

II. WHEN DOES IT OCCUR? (please check the boxes that apply)

- ☐ anytime
- ☐ 1st time in the morning
- ☐ only when it is cold outside
- ☐ only when it is hot outside
- ☐ after sitting out in the rain
- ☐ when it is raining or wet
- ☐ dry or dusty conditions
- ☐ other:

III. WHEN DRIVING:

- ☐ through driveways
- ☐ over rough roads
- ☐ over speed bumps
- ☐ only about ____ mph
- ☐ on acceleration
- ☐ coming to a stop
- ☐ on turns: left, right or either (circle)
- ☐ with passengers or cargo
- ☐ other: _____
- ☐ after driving _____ miles or _____ minutes

IV. WHAT TYPE OF NOISE

- ☐ squeak (like tennis shoes on a clean floor)
- ☐ creak (like walking on an old wooden floor)
- ☐ rattle (like shaking a baby rattle)
- ☐ knock (like a knock at the door)
- ☐ tick (like a clock second hand)
- ☐ thump (heavy, muffled knock noise)
- ☐ buzz (like a bumble bee)

TO BE COMPLETED BY DEALERSHIP PERSONNEL

Test Drive Notes:

_____

_____

_____

	YES	NO	Initials of person performing
Vehicle test driven with customer	☐	☐	_____
- Noise verified on test drive	☐	☐	_____
- Noise source located and repaired	☐	☐	_____
- Follow up test drive performed to confirm repair	☐	☐	_____

VIN: _____ Customer Name: _____

W.O.# _____ Date: _____

This form must be attached to Work Order

PIIB8742E

PRECAUTION

PRECAUTIONS

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

INFOID:0000000000962344

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 SRS and SB section of this Service Manual.

WARNING:

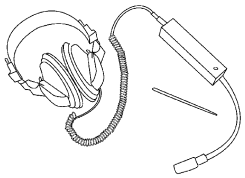
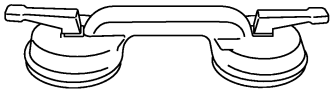
- **To avoid rendering the SRS inoperative, which could increase the risk of personal injury or death in the event of a collision which would result in air bag inflation, all maintenance must be performed by an authorized NISSAN/INFINITI dealer.**
- **Improper maintenance, including incorrect removal 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 SRS 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.**

PREPARATION

PREPARATION

Commercial Service Tools

INFOID:0000000000962345

Tool name	Description
Engine ear  SIIA0995E	Locating the noise
Suction lifter  PIIB1805J	Holding the door glass

ON-VEHICLE MAINTENANCE

PRE-INSPECTION FOR DIAGNOSTIC

Basic Inspection

INFOID:0000000000962346

BASIC INSPECTION

1. INSPECTION START

1. Check the service history.
2. Check the following parts.

- Fuse/circuit breaker blown.
- Poor connection, open or short circuit of harness connector.
- Battery voltage.

Is the inspection result normal?

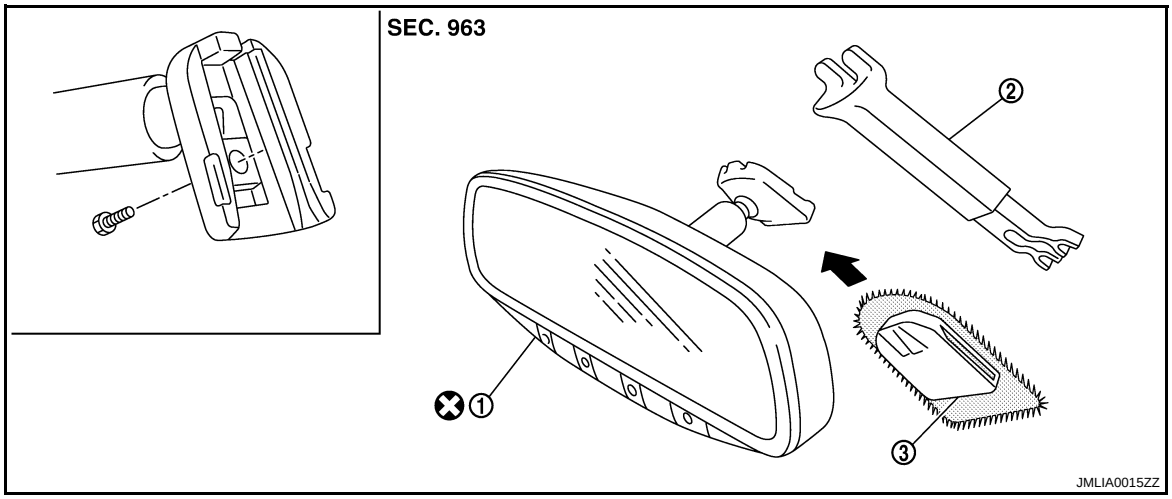
YES >> Inspection end.
NO >> Repair or replace the malfunctioning parts.

ON-VEHICLE REPAIR

INSIDE MIRROR

Exploded View

INFOID:0000000000962347



1. Inside mirror
2. Inside mirror finisher (if equipped)
3. Mirror base

Refer to GI-4, "Components" for symbols in the figure.

Removal and Installation

INFOID:0000000000962348

REMOVAL

1. Remove inside mirror finisher (if equipped).
2. Remove nut of mirror base.
3. Slide the mirror upward to remove.
4. Disconnect the connector (if equipped).

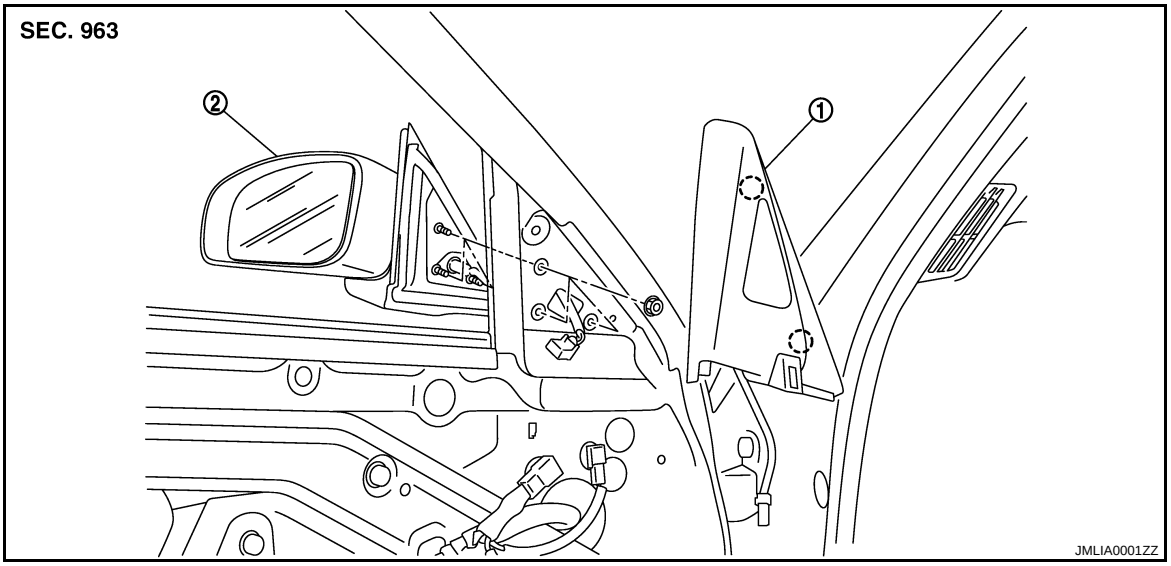
INSTALLATION

Install in the reverse order of removal.

DOOR MIRROR

Exploded View

INFOID:0000000000962349



1. Corner cover
2. Door mirror assembly

Clip

Removal and Installation

INFOID:0000000000962350

REMOVAL

1. Remove the front door finisher. Refer to INT-10, "Removal and Installation".
2. Remove the corner cover.
3. Disconnect the door mirror harness connector.
4. Remove the door mirror mounting nuts, and remove the door mirror assembly.

CAUTION:
Do not damage the mirror bodies.

INSTALLATION

Install in the reverse order of removal.

CAUTION:
Do not damage the mirror bodies.

DOOR MIRROR REMOTE CONTROL SWITCH

Exploded View

INFOID:0000000000962351

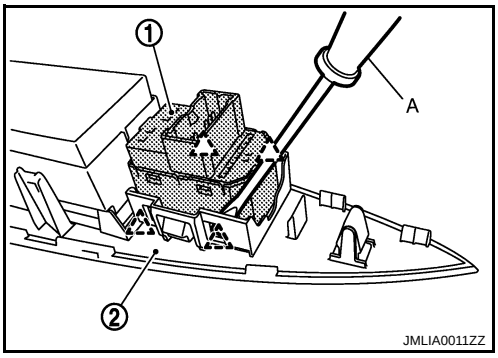
Refer to INT-10, "Exploded View".

Removal and Installation

INFOID:0000000000962352

REMOVAL

1. Remove the power window main switch finisher (2).
   Refer to INT-10, "Removal and Installation".
2. Remove door mirror remote control switch (1) from power window main switch finisher (2) using screw driver (A).



: **Pawl**

INSTALLATION

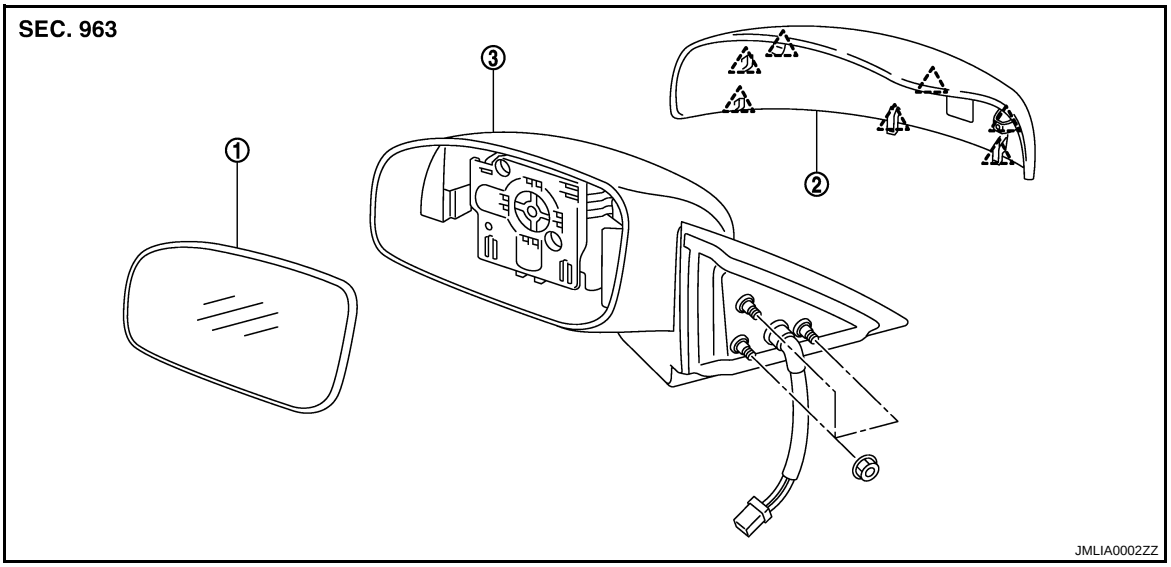
Install in the reverse order of removal.

DISASSEMBLY AND ASSEMBLY

DOOR MIRROR

Exploded View

INFOID:0000000000962353



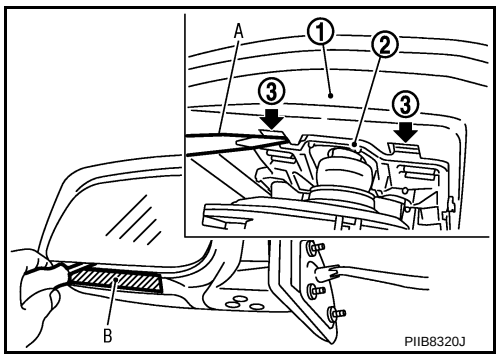
1. Mirror (mirror holder)
2. Mirror assembly
3. Mirror cover

Pawl

Disassembly

INFOID:0000000000962354

1. Place the mirror body with mirror glass facing upward.
2. Put a strip of protective tape B on mirror body.
3. As shown in the figure, insert a small slotted screwdriver A into the recess between mirror base (mirror holder)(1) and mirror holder bracket (2). Push up two pawls (3) to remove mirror holder lower half side.
   NOTE:
   When pushing up pawls do not attempt to use one recess only, be sure to push up with both recesses.
   Insert screwdriver into recesses, and push up while rotating (twisting) to make work easier.



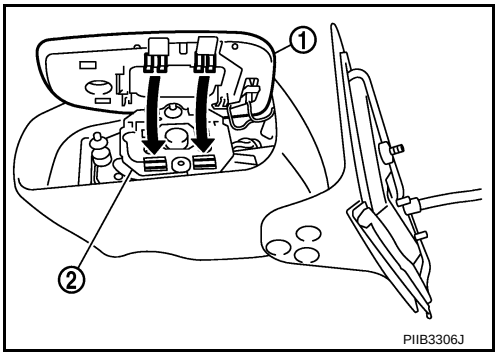
4. Remove two terminals of mirror heater attachment.
5. Lightly lift up lower side of mirror surface from mirror surface, and detach two pawls of upper side as if pulling it out. Remove mirror surface from mirror body.
   NOTE:
   Be careful not to allow grease on sealing agent in center of mirror body assembly (actuator) or back side of mirror surface (mirror holder).
6. Remove the clips and mirror cover from the housing.

Assembly

INFOID:0000000000962355

1. Install the mirror cover.
2. Place mirror holder bracket and mirror body assembly (actuator) in a horizontal position.

3. Connect two terminals of heater installed mirror.
4. Fit the upper two pawls on the mirror face (1) onto the mirror holder bracket (2) first, then press the lower side of mirror face until a click sound is heard to engage the lower pawls.
   NOTE:
   After installation, visually check that lower two pawls are securely engaged from the bottom of mirror face.



BASIC INSPECTION

DIAGNOSIS AND REPAIR WORKFLOW

Work Flow

INFOID:0000000000962356

DETAILED FLOW

1.OBTAIN INFORMATION ABOUT SYMPTOM

Interview the customer to obtain the malfunction information (conditions and environment when the malfunction occurred) as much as possible when the customer brings the vehicle in.

>> GO TO 2.

2.REPRODUCE THE MALFUNCTION INFORMATION

Check the malfunction on the vehicle that the customer describes.
Inspect the relation of the symptoms and the condition when the symptoms occur.

>> GO TO 3.

3.PERFORM “BASIC INSPECTION”

Perform the basic inspection.Refer to MIR-95, "Basic Inspection".

>> GO TO 4.

4.IDENTIFY THE MALFUNCTIONING SYSTEM WITH “SYMPTOM DIAGNOSIS”

Use “Symptom diagnosis” from the symptom inspection result in step 2. Then identify where to start performing the diagnosis based on possible causes and symptoms.

>> GO TO 5.

5.IDENTIFY MALFUNCTIONING PARTS WITH “COMPONENT DIAGNOSIS”

Perform the diagnosis with “Component diagnosis” of the applicable system.

>> GO TO 6.

6.REPAIR OR REPLACE THE MALFUNCTIONING PARTS

Repair or replace the specified malfunctioning parts.

>> GO TO 7.

7.FINAL CHECK

Check that malfunctions are not reproduced when obtaining the malfunction information from the customer, referring to the symptom inspection result in step 2.

Is the malfunctioning part repaired or replaced?

YES >> Trouble diagnosis is completed.
NO >> GO TO 3.

FUNCTION DIAGNOSIS

DOOR MIRROR SYSTEM

Component Description

INFOID:0000000000962357

Component	Function
Door mirror remote control switch	It supplies power to mirror motor by mirror switch and changeover switch.
Door mirror	It makes mirror face operate from side to side and up and down with the mirror control switch operation.

INSIDE MIRROR SYSTEM

System Description

INFOID:0000000000962358

It senses the brightness of the headlight of the vehicle to the rear with the sensor integrated into the mirror. It automatically changes the light transmittance according to the sensed brightness of the light from the headlight.

Component Description

INFOID:0000000000962359

Component	Function
Auto anti-dazzling inside mirror	It automatically changes the light transmittance according to the brightness of the light from the headlight of the vehicle to the rear.

COMPONENT DIAGNOSIS

DOOR MIRROR REMOTE CONTROL SWITCH

Description

INFOID:0000000000962360

It supplies electric power to mirror motor by mirror switch and changeover switch.

Component Function Check

INFOID:0000000000962361

1.CHECK DOOR MIRROR REMOTE CONTROL SWITCH FUNCTION

1. Turn ignition switch ON.
2. Check that door mirror can operate by door mirror remote control switch operation.

Is the inspection result normal?

YES >> Door mirror remote control switch function is OK.
NO >> Refer to MIR-74, "Diagnosis Procedure".

Diagnosis Procedure

INFOID:0000000000962362

1.CHECK DOOR MIRROR REMOTE CONTROL SWITCH OUTPUT SIGNAL

1. Turn ignition switch ON.
2. Check voltage between mirror control switch connector and ground.

[Driver side]

Terminals			Mirror switch condition	Voltage (V) (Approx.)
(+)		(-)		
Door mirror remote control switch connector	Terminal			
D7	10	Ground	DOWN / RIGHT	Battery voltage
			Other than above	0
	14		LEFT	Battery voltage
			Other than above	0
	16		UP	Battery voltage
			Other than above	0

[Passenger side]

Terminals			Mirror switch condition	Voltage (V) (Approx.)
(+)		(-)		
Door mirror remote control switch connector	Terminal			
D7	12	Ground	DOWN / RIGHT	Battery voltage
			Other than above	0
	13		LEFT	Battery voltage
			Other than above	0
	15		UP	Battery voltage
			Other than above	0

Is the inspection result normal?

YES >> Door mirror remote control switch is OK.
NO >> GO TO 2.

2.CHECK POWER SUPPLY CIRCUIT

1. Turn ignition switch ON.
2. Check voltage between door remote control switch and ground.

Terminals			Voltage (V) (Approx.)
(+)		(-)	
Door mirror remote control switch connector	Terminal		
D7	7	Ground	Battery voltage

Is the inspection result normal?

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

3. CHECK HARNESS CONTINUITY

1. Turn ignition switch OFF.
2. Disconnect door mirror remote control switch connector.
3. Check continuity between mirror control switch connector and fuse block.

Door mirror remote control switch connector	Terminal	Fuse block (J/B)	Terminal	Continuity
D7	7	M1	5A	Existed

4. Check continuity between mirror control switch connector and ground

Door mirror remote control switch connector	Terminal	Ground	Continuity
D7	7		Not existed

Is the inspection result normal?

YES >> GO TO 6.
NO >> Repair or replace harness.

4. CHECK GROUND CIRCUIT

1. Turn ignition switch OFF.
2. Disconnect door mirror remote control switch connector.
3. Check continuity between mirror control switch connector and ground.

Door mirror remote control switch connector	Terminal	Ground	Continuity
D7	1		Existed

Is the inspection result normal?

YES >> GO TO 5.
NO >> Repair or replace harness.

5. CHECK DOOR MIRROR REMOTE CONTROL SWITCH

Check door mirror remote control switch.
Refer to MIR-75, "Component Inspection".

Is the inspection result normal?

YES >> Refer to GI-39, "Intermittent Incident".
NO >> Replace door mirror remote control switch. Refer to MIR-98, "Removal and Installation".

6. CHECK INTERMITTENT INCIDENT

Check intermittent incident.
Refer to GI-39, "Intermittent Incident".

Is the inspection result normal?

YES >> Check the following.
- Battery power supply circuit
- Fuse block (J/B)

NO >> Repair or replace the malfunctioning parts.

Component Inspection

INFOID:0000000000962363

1.CHECK DOOR MIRROR REMOTE CONTROL SWITCH

Check door mirror remote control switch.

[Driver side]

Terminal		Mirror switch condition	Continuity
Door mirror remote control switch			
10	7	RIGHT / DOWN	Existed
		Other than above	Not existed
14		LEFT	Existed
		Other than above	Not existed
16		UP	Existed
		Other than above	Not existed

[Passenger side]

Terminal		Mirror switch condition	Continuity
Door mirror remote control switch			
12	7	RIGHT / DOWN	Existed
		Other than above	Not existed
13		LEFT	Existed
		Other than above	Not existed
15		UP	Existed
		Other than above	Not existed

Is the inspection result normal?

YES >> INSPECTION END.
NO >> Replace door mirror remote control switch. Refer to MIR-98, "Removal and Installation".

DOOR MIRROR MOTOR

Description

INFOID:0000000000962364

It supplies electric power to door mirror motor with mirror switch and LH/RH control switch.

Component Function Check

INFOID:0000000000962365

1.CHECK DOOR MIRROR MOTOR FUNCTION

Does motor operate normally during mirror switch operation.

Is the inspection result normal?

YES >> Door mirror motor function is OK.
NO >> Refer to MIR-77, "Diagnosis Procedure".

Diagnosis Procedure

INFOID:0000000000962366

1.CHECK DOOR MIRROR MOTOR INPUT SIGNAL

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

Terminals			Mirror switch Condition	Voltage (V) (Approx.)
(+)		(–)		
Door mirror connector	Terminal			
D3 (Driver side) D33 (Passenger side)	5	Ground	UP	Battery voltage
			Other than above	0
	6		LEFT	Battery voltage
			Other than above	0
	7		DOWN / RIGHT	Battery voltage
			Other than above	0

Is the inspection result normal?

YES >> GO TO 3.
NO >> GO TO 2.

2.CHECK HARNESS CONTINUITY

1. Turn ignition switch OFF.
2. Disconnect door mirror remote control switch connector and door mirror connector.
3. Check continuity between door mirror remote control switch connector and door mirror connector.

- [Driver side]

Door mirror remote control switch connector	Terminal	Door mirror (driver side) connector	Terminal	Continuity
D7	10	D3	7	Existed
	16		5	
	14		6	

[Passenger side]

Door mirror remote control switch connector	Terminal	Door mirror (passenger side) connector	Terminal	Continuity
D7	12	D33	7	Existed
	15		5	
	13		6	

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

[Driver side]

Door mirror remote control switch connector	Terminal		Continuity
D7	10	Ground	Not existed
	16		
	14		

[Passenger side]

Door mirror remote control switch connector	Terminal		Continuity
D7	12	Ground	Not existed
	15		
	13		

Is the inspection result normal?

YES >> Refer to GI-39, "Intermittent Incident".
NO >> Repair or replace harness.

3.CHECK DOOR MIRROR MOTOR

Check door mirror motor.
Refer to MIR-78, "Component Inspection".

Is the inspection result normal?

YES >> Refer to GI-39, "Intermittent Incident".
NO >> Replace door mirror. Refer to MIR-97, "Removal and Installation".

Component Inspection

INFOID:0000000000962367

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-97, "Exploded View".

Is the inspection result normal?

YES >> GO TO 2.
NO >> Replace door mirror. Refer to MIR-97, "Removal and Installation".

2.CHECK DOOR MIRROR MOTOR-II

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

Door mirror connector	Terminal		Operational direction
	(+)	(–)	
D3 (Driver side) D33 (Passenger side)	7	6	RIGHT
	6	7	LEFT
	5	7	UP
	7	5	DOWN

Is the inspection result normal?

YES >> INSPECTION END.
NO >> Replace door mirror. Refer to MIR-97, "Removal and Installation".

AUTO ANTI-DAZZLING INSIDE MIRROR CIRCUIT

Description

INFOID:0000000000962368

It automatically changes according to the brightness of the light that is reflected from the headlight of the vehicle to the rear.

Component Function Check

INFOID:0000000000962369

1.CHECK AUTO ANTI-DAZZLING INSIDE MIRROR FUNCTION

Check that glare-proof mirror can operate when mirror sensor is illuminated.

Is the inspection result normal?

YES >> Auto anti-dazzling inside mirror function is OK.
NO >> Refer to MIR-79, "Diagnosis Procedure".

Diagnosis Procedure

INFOID:0000000000962370

1.CHECK POWER SUPPLY CIRCUIT

Check voltage between auto anti-dazzling inside mirror connector and ground.

(+)		(-)	Condition of ignition switch	Voltage (V) (Approx.)
Auto anti-dazzling inside mirror connector	Terminal	Ground		
R3	6		ON or START	Battery voltage
	10		OFF	Battery voltage

Is the inspection result normal?

YES >> GO TO 2.
NO >> Repair or replace harness.

2.CHECK GROUND CIRCUIT

1. Disconnect auto anti-dazzling inside mirror connector.
2. Check continuity between auto anti-dazzling inside mirror connector and ground.

Auto anti-dazzling inside mirror connector	Terminal	Ground	Continuity
R3	8		Existed

Is the inspection result normal?

YES >> GO TO 3.
NO >> Repair or replace harness.

3.CHECK INTERMITTENT INCIDENT

Check intermittent incident.
Refer to GI-39, "Intermittent Incident".

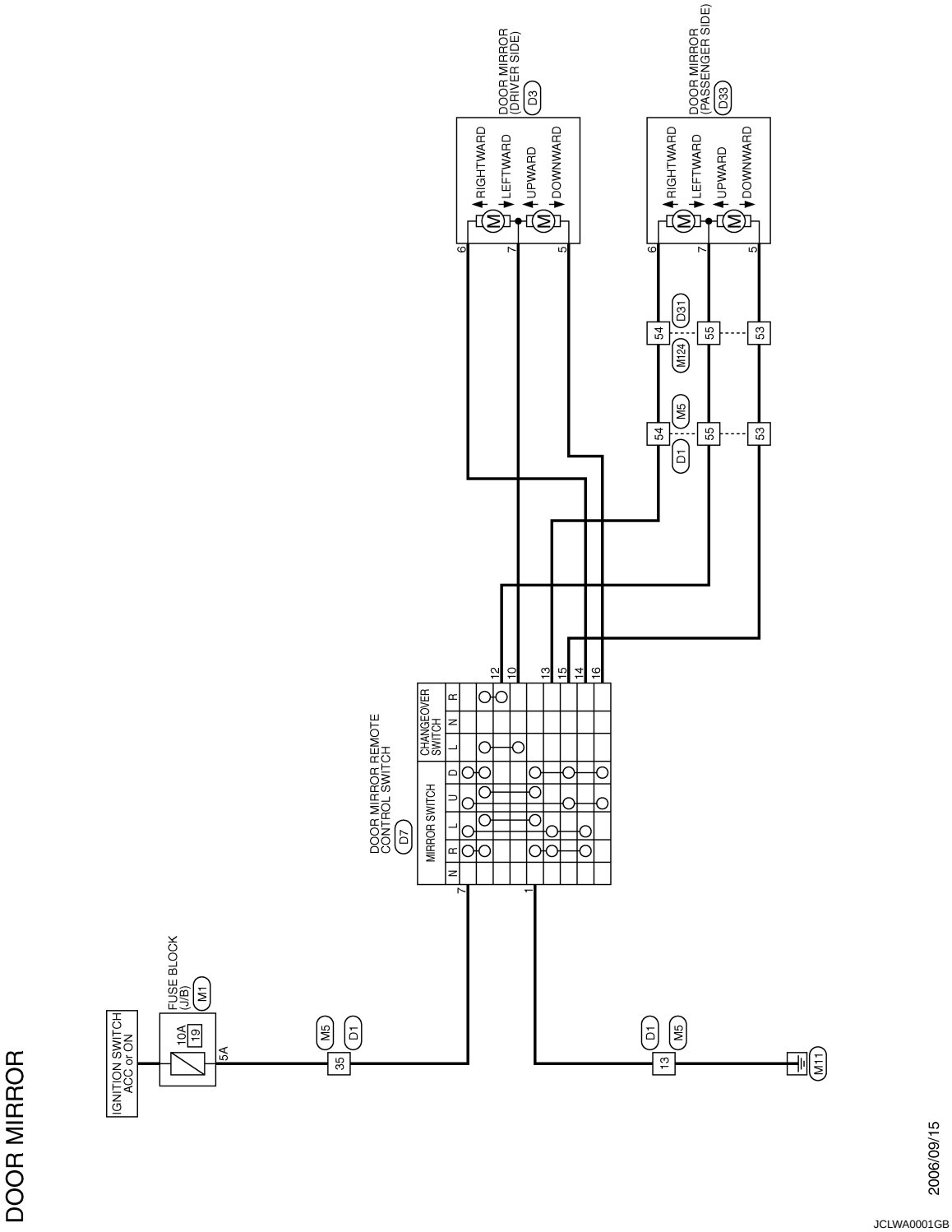
Is the inspection result normal?

YES >> Replace auto anti-dazzling inside mirror. Refer to MIR-66, "Removal and Installation".
NO >> Repair or replace the malfunctioning parts.

DOOR MIRROR

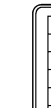
Wiring Diagram —DOOR MIRROR SYSTEM —

INFOID:0000000000962371



DOOR MIRROR

Connector No.	D1
Connector Name	WIRE TO WIRE
Connector Type	TH40FW-CS15



Terminal No.	Color of Wire	Signal Name
13	B	–
35	V	–
53	O	–
54	GR	–
55	G	–

Connector No.	D33
Connector Name	DOOR MIRROR (PASSENGER SIDE)
Connector Type	TH12MW-NH

Terminal No.	Color of Wire	Signal Name
5	O	– [Without automatic drive positioner]
6	GR	– [Without automatic drive positioner]
7	G	– [Without automatic drive positioner]

Connector No.	D3
Connector Name	DOOR MIRROR (DRIVER SIDE)
Connector Type	TH12MW-NH

Terminal No.	Color of Wire	Signal Name
5	BR	– [Without automatic drive positioner]
6	L	– [Without automatic drive positioner]
7	Y	– [Without automatic drive positioner]

Connector No.	M1
Connector Name	FUSE BLOCK (J/B)
Connector Type	NS06FW-M2

Terminal No.	Color of Wire	Signal Name
5A	V	–

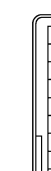
Connector No.	D7
Connector Name	DOOR MIRROR REMOTE CONTROL SWITCH (Without automatic drive positioner)
Connector Type	TK16FW

Terminal No.	Color of Wire	Signal Name
1	B	–
7	V	–
10	Y	–
12	G	–
13	GR	–
14	L	–
15	O	–
16	BR	–

Connector No.	M5
Connector Name	WIRE TO WIRE
Connector Type	TH40MW-CS15

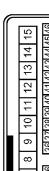
Terminal No.	Color of Wire	Signal Name
13	B	–
35	V	–
53	W	–
54	G	–
55	R	–

Connector No.	D31
Connector Name	WIRE TO WIRE
Connector Type	TH40FW-CS15



Terminal No.	Color of Wire	Signal Name
53	O	–
54	GR	–
55	G	–

Connector No.	M124
Connector Name	WIRE TO WIRE
Connector Type	TH40MW-CS15



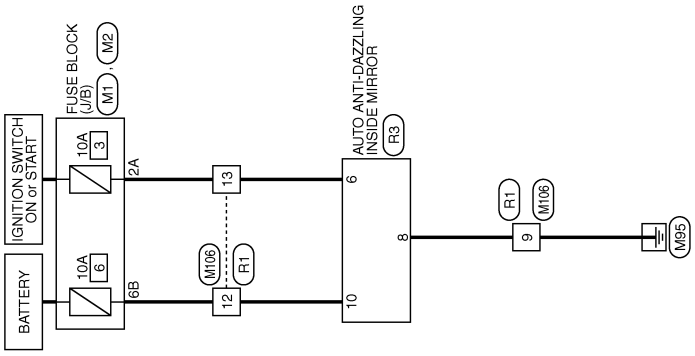
Terminal No.	Color of Wire	Signal Name
53	W	–
54	G	–
55	R	–

JCLWA0002GB

AUTO ANTI-DAZZLING INSIDE MIRROR SYSTEM

Wiring Diagram — INSIDE MIRROR SYSTEM —

INFOID:0000000000962372



INSIDE MIRROR

2006/09/15

JCLWA0004GB

INSIDE MIRROR

Connector No.	M1
Connector Name	FUSE BLOCK (J/B)
Connector Type	NS06FW-M2

H.S.

Terminal No.	Color of Wire	Signal Name
2A	G	–

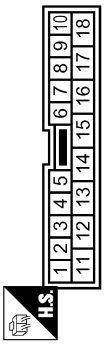
Connector No.	M2
Connector Name	FUSE BLOCK (J/B)
Connector Type	NS10FW-CS

H.S.

Terminal No.	Color of Wire	Signal Name
6B	Y	–

Connector No.	M106
Connector Name	WIRE TO WIRE
Connector Type	TK10MW-NS8

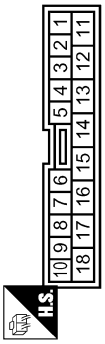
H.S.



Terminal No.	Color of Wire	Signal Name
9	B	–
12	Y	–
13	BR	–

Connector No.	R1
Connector Name	WIRE TO WIRE
Connector Type	TK10FW-NS8

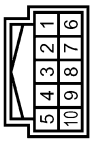
H.S.



Terminal No.	Color of Wire	Signal Name
9	B	–
12	G	–
13	BR	–

Connector No.	R3
Connector Name	AUTO ANTI-DAZZLING INSIDE MIRROR
Connector Type	TH10FB-NH

H.S.



Terminal No.	Color of Wire	Signal Name
6	BR	IGN
8	B	GND
10	G	BAT

JCLWA0005GB

SYMPTOM DIAGNOSIS

NONE OF THE DOOR MIRROR CAN BE OPERATED USING ANY SWITCH

Diagnosis Procedure

INFOID:0000000000962373

1. CHECK DOOR MIRROR REMOTE CONTROL SWITCH

Check door mirror remote control switch.
Refer to MIR-74, "Component Function Check".

Is the inspection result normal?

YES >> Refer to GI-39, "Intermittent Incident".
NO >> Repair or replace the malfunctioning parts.

DOOR MIRROR DOES NOT OPERATE

Diagnosis Procedure

INFOID:0000000000962374

1.CHECK DOOR MIRROR REMOTE CONTROL SWITCH

Check door mirror remote control switch.
Refer to MIR-74, "Component Function Check".

Is the inspection result normal?

YES >> GO TO 2.
NO >> Repair or replace the malfunctioning parts.

2.CHECK DOOR MIRROR MOTOR

Check the door mirror motor operation.
Refer to MIR-77, "Component Function Check".

Is the inspection result normal?

YES >> Refer to GI-39, "Intermittent Incident".
NO >> Repair or replace the malfunctioning parts.

AUTO ANTI-DAZZLING INSIDE MIRROR DOES NOT OPERATE

Diagnosis Procedure

INFOID:0000000000962375

1. CHECK AUTO ANTI-DAZZLING INSIDE MIRROR

Check auto anti-dazzling inside mirror.
Refer to MIR-79, "Component Function Check".

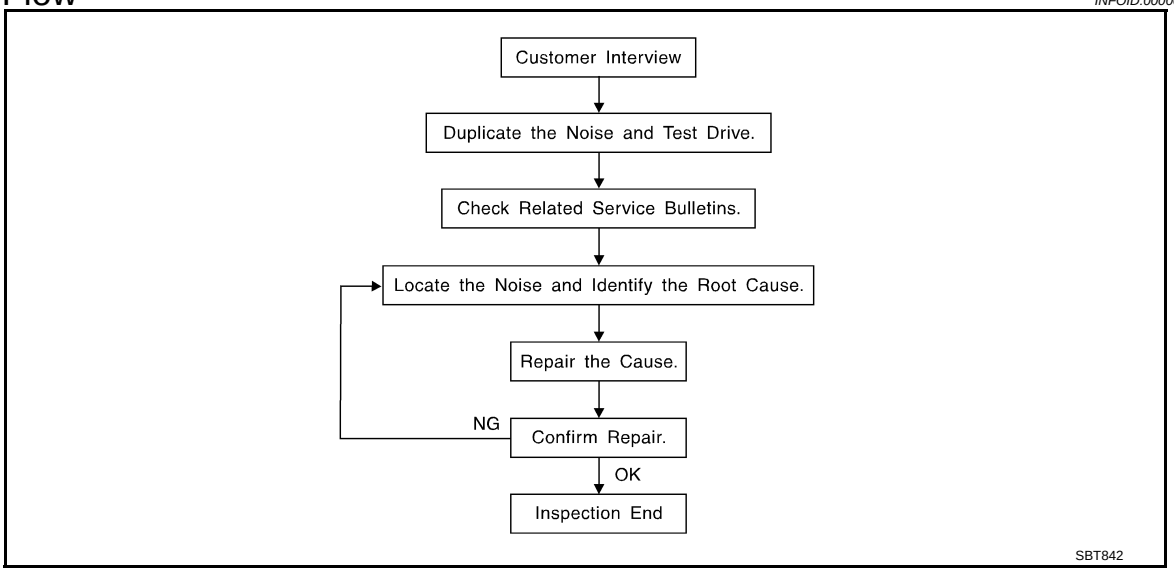
Is the inspection result normal?

YES >> Refer to GI-39, "Intermittent Incident".
NO >> Repair or replace the malfunctioning parts.

SQUEAK AND RATTLE TROUBLE DIAGNOSES

Work Flow

INFOID:0000000000962376



CUSTOMER INTERVIEW

Interview the customer if possible, to determine the conditions that exist when the noise occurs. Use the Diagnostic Worksheet during the interview to document the facts and conditions when the noise occurs and any of customer's comments; refer to MIR-91, "Diagnostic Worksheet". This information is necessary to duplicate the conditions that exist when the noise occurs.

- The customer may not be able to provide a detailed description or the location of the noise. Attempt to obtain all the facts and conditions that exist when the noise occurs (or does not occur).
- If there is more than one noise in the vehicle, perform a diagnosis and repair the noise that the customer is concerned about. This can be accomplished by performing a cruise test on the vehicle with the customer.
- After identifying the type of noise, isolate the noise in terms of its characteristics. The noise characteristics are provided so the customer, service adviser and technician are all speaking the same language when defining the noise.
- Squeak —(Like tennis shoes on a clean floor)
  Squeak characteristics include the light contact/fast movement/brought on by road conditions/hard surfaces=higher pitch noise/softer surfaces=lower pitch noises/edge to surface=chirping
- Creak—(Like walking on an old wooden floor)
  Creak characteristics include firm contact/slow movement/twisting with a rotational movement/pitch dependent on materials/often brought on by activity.
- Rattle—(Like shaking a baby rattle)
  Rattle characteristics include the fast repeated contact/vibration or similar movement/loose parts/missing clip or fastener/incorrect clearance.
- Knock —(Like a knock on a door)
  Knock characteristics include hollow sounding/sometimes repeating/often brought on by driver action.
- Tick—(Like a clock second hand)
  Tick characteristics include gentle contacting of light materials/loose components/can be caused by driver action or road conditions.
- Thump—(Heavy, muffled knock noise)
  Thump characteristics include softer knock/dead sound often brought on by activity.
- Buzz—(Like a bumblebee)
  Buzz characteristics include high frequency rattle/firm contact.
- Often the degree of acceptable noise level will vary depending up on the person. A noise that you may judge as acceptable may be very irritating to the customer.
- Weather conditions, especially humidity and temperature, may have a great effect on noise level.

DUPLICATE THE NOISE AND TEST DRIVE

If possible, drive the vehicle with the customer until the noise is duplicated. Note any additional information on the Diagnostic Worksheet regarding the conditions or location of the noise. This information can be used to duplicate the same conditions when you confirm the repair.

If the noise can be duplicated easily during the test drive, to help identify the source of the noise, try to duplicate the noise with the vehicle stopped by doing one or all of the following:

1) Close a door.
2) Tap or push/pull around the area where the noise appears to be coming from.
3) Rev the engine.
4) Use a floor jack to recreate vehicle “twist”.
5) At idle, apply engine load (electrical load, half-clutch on M/T models, drive position on A/T models).
6) Raise the vehicle on a hoist and hit a tire with a rubber hammer.

- Drive the vehicle and attempt to duplicate the conditions the customer states exist when the noise occurs.
- If it is difficult to duplicate the noise, drive the vehicle slowly on an undulating or rough road to stress the vehicle body.

CHECK RELATED SERVICE BULLETINS

After verifying the customer concern or symptom, check ASIST for Technical Service Bulletins (TSBs) related to that concern or symptom.
If a TSB relates to the symptom, follow the procedure to repair the noise.

LOCATE THE NOISE AND IDENTIFY THE ROOT CAUSE

1. Narrow down the noise to a general area. To help pinpoint the source of the noise, use a listening tool (Chassis Ear: J-39570, Engine Ear and mechanics stethoscope).
2. Narrow down the noise to a more specific area and identify the cause of the noise by:

- removing the components in the area that you suspect the noise is coming from.
  Do not use too much force when removing clips and fasteners, otherwise clips and fastener can be broken or lost during the repair, resulting in the creation of new noise.
- tapping or pushing/pulling the component that you suspect is causing the noise.
  Do not tap or push/pull the component with excessive force, otherwise the noise will be eliminated only temporarily.
- feeling for a vibration with your hand by touching the component(s) that you suspect is (are) causing the noise.
- placing a piece of paper between components that you suspect are causing the noise.
- looking for loose components and contact marks.
  Refer to MIR-89, "Inspection Procedure".

REPAIR THE CAUSE

- If the cause is a loose component, tighten the component securely.
- If the cause is insufficient clearance between components:

- separate components by repositioning or loosening and retightening the component, if possible.
- insulate components with a suitable insulator such as urethane pads, foam blocks, felt cloth tape or urethane tape. A Nissan Squeak and Rattle Kit (J-43980) is available through your authorized Nissan Parts Department.

CAUTION:
Do not use excessive force as many components are constructed of plastic and may be damaged.
NOTE:
Always check with the Parts Department for the latest parts information.
The following materials are contained in the Nissan Squeak and Rattle Kit (J-43980). Each item can be ordered separately as needed.
URETHANE PADS [1.5 mm (0.059 in) thick]
Insulates connectors, harness, etc.
76268-9E005: 100 × 135 mm (3.94 × 5.31 in)/76884-71L01: 60 × 85 mm (2.36 × 3.35 in)/76884-71L02:15 × 25 mm (0.59 × 0.98 in)
INSULATOR (Foam blocks)
Insulates components from contact. Can be used to fill space behind a panel.
73982-9E000: 45 mm (1.77 in) thick, 50 × 50 mm (1.97 × 1.97 in)/73982-50Y00: 10 mm (0.39 in) thick, 50 × 50 mm (1.97 × 1.97 in)
INSULATOR (Light foam block)
80845-71L00: 30 mm (1.18 in) thick, 30 × 50 mm (1.18 × 1.97in)
FELT CLOTHTAPE
Used to insulate where movement does not occur. Ideal for instrument panel applications.
68370-4B000: 15 × 25 mm (0.59 × 0.98 in) pad/68239-13E00: 5 mm (0.20 in) wide tape roll
The following materials, not found in the kit, can also be used to repair squeaks and rattles.
UHMW (TEFLON) TAPE

Insulates where slight movement is present. Ideal for instrument panel applications.
SILICONE GREASE
Used in place of UHMW tape that will be visible or not fit. Will only last a few months.
SILICONE SPRAY
Use when grease cannot be applied.
DUCT TAPE
Use to eliminate movement.

CONFIRM THE REPAIR

Confirm that the cause of a noise is repaired by test driving the vehicle.Operate the vehicle under the same conditions as when the noise originally occurred. Refer to the notes on the Diagnostic Worksheet.

Inspection Procedure

INFOID:0000000000962377

Refer to Table of Contents for specific component removal and installationinformation.

INSTRUMENT PANEL

Most incidents are caused by contact and movement between:

1. The cluster lid A and instrument panel
2. Acrylic lens and combination meter housing
3. Instrument panel to front pillar garnish
4. Instrument panel to windshield
5. Instrument panel mounting pins
6. Wiring harnesses behind the combination meter
7. A/C defroster duct and duct joint
   These incidents can usually be located by tapping or moving the components to duplicate the noise or by pressing on the components while driving to stop the noise. Most of these incidents can be repaired by applying felt cloth tape or silicon spray (in hard to reach areas). Urethane pads can be used to insulate wiring harness.
   CAUTION:
   Do not use silicone spray to isolate a squeak or rattle. If you saturatethe area with silicone, you will not be able to recheck the repair.

CENTER CONSOLE

Components to pay attention to include:

1. Shifter assembly cover to finisher
2. A/C control unit and cluster lid C
3. Wiring harnesses behind audio and A/C control unit

The instrument panel repair and isolation procedures also apply to thecenter console.

DOORS

Pay attention to the:

1. Finisher and inner panel making a slapping noise
2. Inside handle escutcheon to door finisher
3. Wiring harnesses tapping
4. Door striker out of alignment causing a popping noise on startsand stops

Tapping or moving the components or pressing on them while driving to duplicate the conditions can isolate many of these incidents. You can usually insulate the areas with felt cloth tape or insulator foam blocks from the Nissan Squeak and Rattle Kit (J-43980) to repair the noise.

TRUNK

Trunk noises are often caused by a loose jack or loose items put intothe trunk by the owner.
In addition look for:

1. Trunk lid dumpers out of adjustment
2. Trunk lid striker out of adjustment
3. The trunk lid torsion bars knocking together
4. A loose license plate or bracket

Most of these incidents can be repaired by adjusting, securing or insulatingthe item(s) or component(s) causing the noise.

SUNROOF/HEADLINING

Noises in the sunroof/headlining area can often be traced to one of the following:

1. Sunroof lid, rail, linkage or seals making a rattle or light knockingnoise
2. Sunvisor shaft shaking in the holder
3. Front or rear windshield touching headlining and squeaking

Again, pressing on the components to stop the noise while duplicatingthe conditions can isolate most of these incidents. Repairs usually consistof insulating with felt cloth tape.

SEATS

When isolating seat noise it's important to note the position the seatis in and the load placed on the seat when the noise is present. These conditionsshould be duplicated when verifying and isolating the cause of the noise.

Cause of seat noise include:

1. Headrest rods and holder
2. A squeak between the seat pad cushion and frame
3. The rear seatback lock and bracket

These noises can be isolated by moving or pressing on the suspectedcomponents while duplicating the conditions under which the noise occurs.Most of these incidents can be repaired by repositioning the component orapplying urethane tape to the contact area.

UNDERHOOD

Some interior noise may be caused by components under the hood or onthe engine wall. The noise is then transmitted into the passenger compartment.

Causes of transmitted underhood noise include:

1. Any component mounted to the engine wall
2. Components that pass through the engine wall
3. Engine wall mounts and connectors
4. Loose radiator mounting pins
5. Hood bumpers out of adjustment
6. Hood striker out of adjustment

These noises can be difficult to isolate since they cannot be reached from the interior of the vehicle. The best method is to secure, move or insulate one component at a time and test drive the vehicle. Also, engine RPM or load can be changed to isolate the noise. Repairs can usually be made by moving, adjusting, securing, or insulating the component causing the noise.

Diagnostic Worksheet

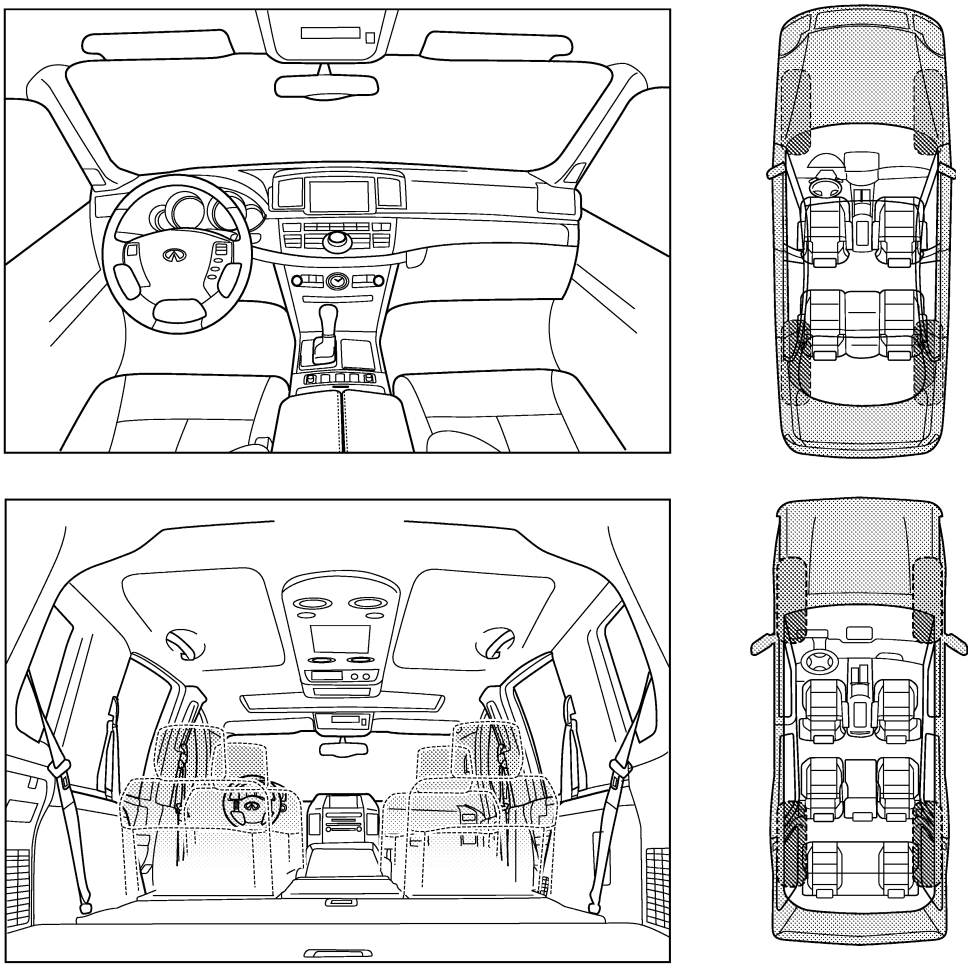
INFOID:0000000000962378

INFINITI.

SQUEAK & RATTLE DIAGNOSTIC WORKSHEET

Dear Infiniti Customer:
We are concerned about your satisfaction with your Infiniti vehicle. Repairing a squeak or rattle sometimes can be very difficult. To help us fix your Infiniti right the first time, please take a moment to note the area of the vehicle where the squeak or rattle occurs and under what conditions. You may be asked to take a test drive with a service consultant or technician to ensure we confirm the noise you are hearing.

I. WHERE DOES THE NOISE COME FROM? (circle the area of the vehicle)
The illustrations are for reference only, and may not reflect the actual configuration of your vehicle.



Continue to page 2 of the worksheet and briefly describe the location of the noise or rattle. In addition, please indicate the conditions which are present when the noise occurs.

PIIB8741E

SQUEAK & RATTLE DIAGNOSTIC WORKSHEET - page 2

Briefly describe the location where the noise occurs:

_____

_____

II. WHEN DOES IT OCCUR? (please check the boxes that apply)

- ☐ anytime
- ☐ 1st time in the morning
- ☐ only when it is cold outside
- ☐ only when it is hot outside
- ☐ after sitting out in the rain
- ☐ when it is raining or wet
- ☐ dry or dusty conditions
- ☐ other:

III. WHEN DRIVING:

- ☐ through driveways
- ☐ over rough roads
- ☐ over speed bumps
- ☐ only about ____ mph
- ☐ on acceleration
- ☐ coming to a stop
- ☐ on turns: left, right or either (circle)
- ☐ with passengers or cargo
- ☐ other: _____
- ☐ after driving _____ miles or _____ minutes

IV. WHAT TYPE OF NOISE

- ☐ squeak (like tennis shoes on a clean floor)
- ☐ creak (like walking on an old wooden floor)
- ☐ rattle (like shaking a baby rattle)
- ☐ knock (like a knock at the door)
- ☐ tick (like a clock second hand)
- ☐ thump (heavy, muffled knock noise)
- ☐ buzz (like a bumble bee)

TO BE COMPLETED BY DEALERSHIP PERSONNEL

Test Drive Notes:

_____

_____

_____

	YES	NO	Initials of person performing
Vehicle test driven with customer	☐	☐	_____
- Noise verified on test drive	☐	☐	_____
- Noise source located and repaired	☐	☐	_____
- Follow up test drive performed to confirm repair	☐	☐	_____

VIN: _____ Customer Name: _____

W.O.# _____ Date: _____

This form must be attached to Work Order

PIIB8742E

PRECAUTION

PRECAUTIONS

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

INFOID:0000000000962379

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 SRS and SB section of this Service Manual.

WARNING:

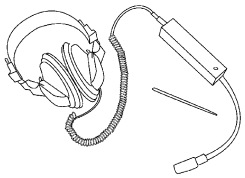
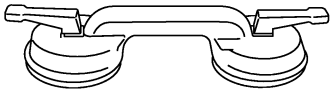
- **To avoid rendering the SRS inoperative, which could increase the risk of personal injury or death in the event of a collision which would result in air bag inflation, all maintenance must be performed by an authorized NISSAN/INFINITI dealer.**
- **Improper maintenance, including incorrect removal 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 SRS 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.**

PREPARATION

PREPARATION

Commercial Service Tools

INFOID:0000000000962380

Tool name	Description
Engine ear  SIIA0995E	Locating the noise
Suction lifter  PIIB1805J	Holding the door glass

ON-VEHICLE MAINTENANCE

PRE-INSPECTION FOR DIAGNOSTIC

Basic Inspection

INFOID:0000000000962381

BASIC INSPECTION

1. INSPECTION START

1. Check the service history.
2. Check the following parts.

- Fuse/circuit breaker blown.
- Poor connection, open or short circuit of harness connector.
- Battery voltage.

Is the inspection result normal?

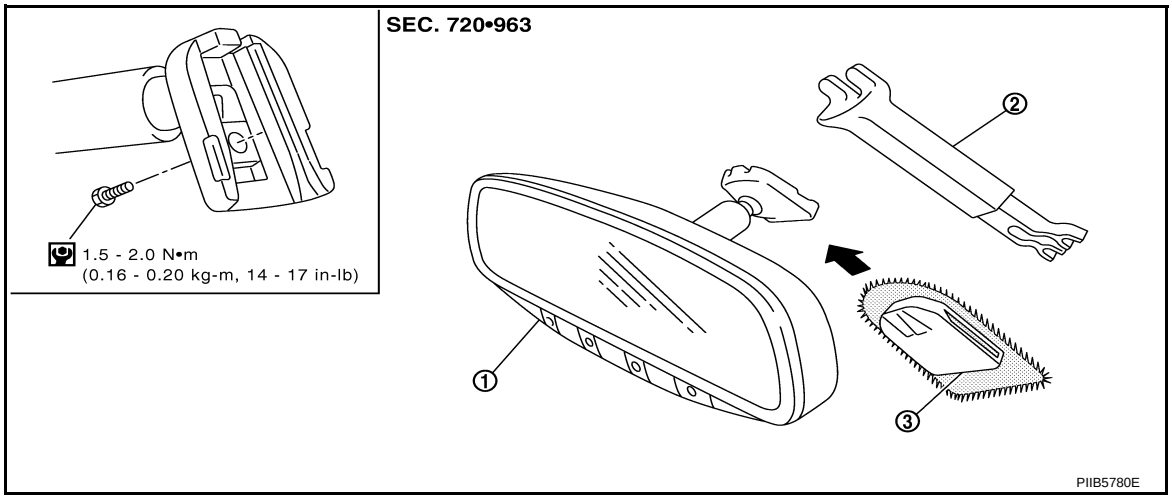
YES >> Inspection end.
NO >> Repair or replace the malfunctioning parts.

ON-VEHICLE REPAIR

INSIDE MIRROR

Exploded View

INFOID:0000000000962382



1. Inside mirror
2. Inside mirror finisher (if equipped)
3. Mirror base

Refer to GI-4, "Components" for symbols in the figure.

Removal and Installation

INFOID:0000000000962383

REMOVAL

1. Remove inside mirror finisher (if equipped).
2. Remove nut of mirror base.
3. Slide the mirror upward to remove.
4. Disconnect the connector (if equipped).

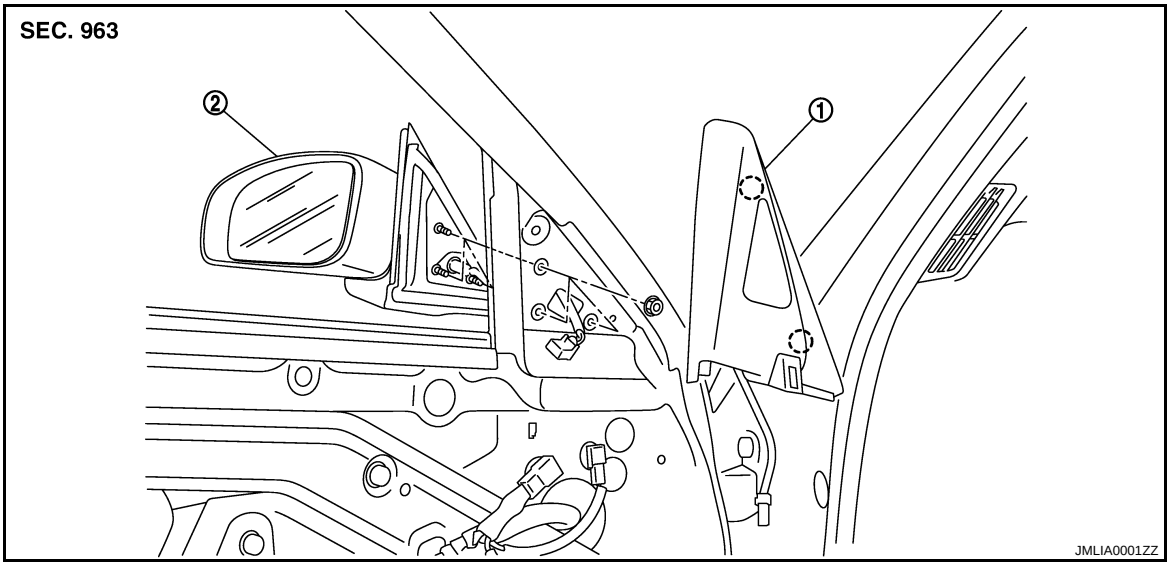
INSTALLATION

Install in the reverse order of removal.

DOOR MIRROR

Exploded View

INFOID:0000000000962384



1. Corner cover
2. Door mirror assembly

Clip

Removal and Installation

INFOID:0000000000962385

REMOVAL

1. Remove the front door finisher. Refer to INT-10, "Removal and Installation".
2. Remove the corner cover.
3. Disconnect the door mirror harness connector.
4. Remove the door mirror mounting nuts, and remove the door mirror assembly.

CAUTION:
Do not damage the mirror bodies.

INSTALLATION

Install in the reverse order of removal.

CAUTION:
Do not damage the mirror bodies.

DOOR MIRROR REMOTE CONTROL SWITCH

Exploded View

INFOID:0000000000962386

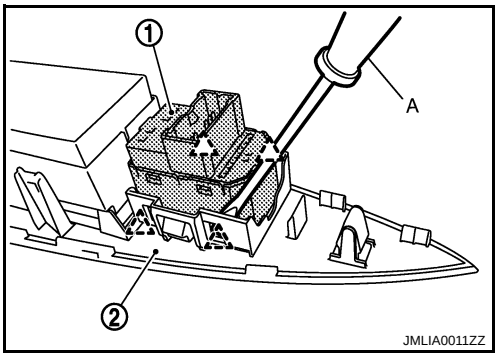
Refer to INT-10, "Exploded View".

Removal and Installation

INFOID:0000000000962387

REMOVAL

1. Remove the power window main switch finisher (2).
   Refer to INT-10, "Removal and Installation".
2. Remove door mirror remote control switch (1) from power window main switch finisher (2) using screw driver (A).



: **Pawl**

INSTALLATION

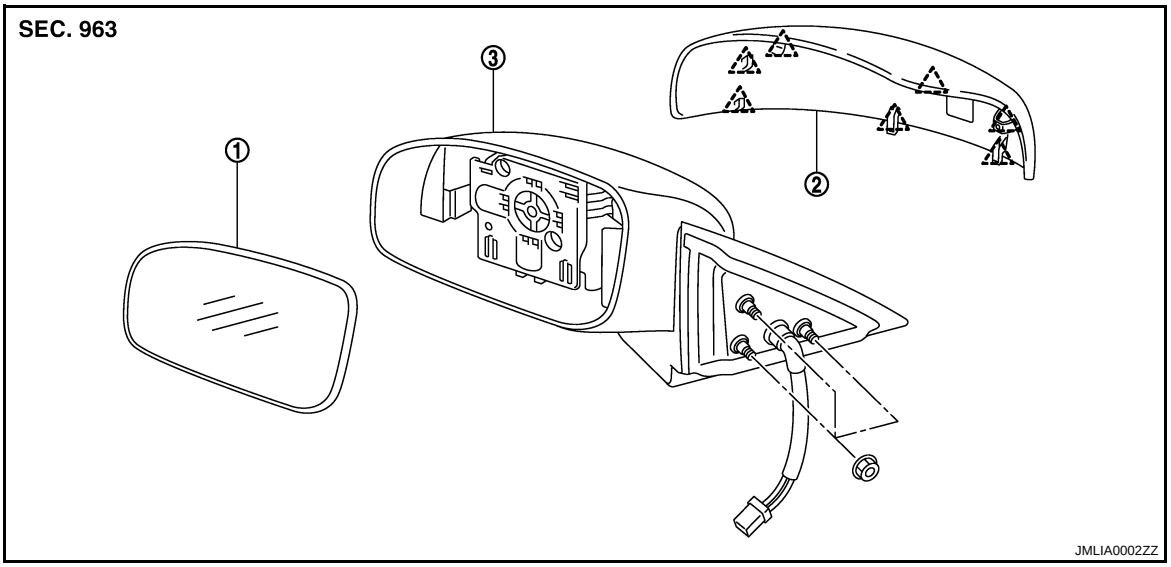
Install in the reverse order of removal.

DISASSEMBLY AND ASSEMBLY

DOOR MIRROR

Exploded View

INFOID:0000000000962388



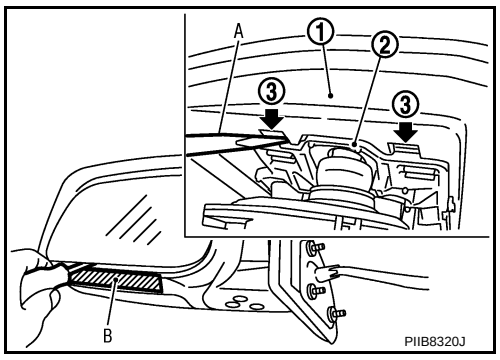
1. Mirror (mirror holder)
2. Mirror assembly
3. Mirror cover

Pawl

Disassembly

INFOID:0000000000962389

1. Place the mirror body with mirror glass facing upward.
2. Put a strip of protective tape B on mirror body.
3. As shown in the figure, insert a small slotted screwdriver A into the recess between mirror base (mirror holder)(1) and mirror holder bracket (2). Push up two pawls (3) to remove mirror holder lower half side.
   NOTE:
   When pushing up pawls do not attempt to use one recess only, be sure to push up with both recesses.
   Insert screwdriver into recesses, and push up while rotating (twisting) to make work easier.



4. Remove two terminals of mirror heater attachment.
5. Lightly lift up lower side of mirror surface from mirror surface, and detach two pawls of upper side as if pulling it out. Remove mirror surface from mirror body.
   NOTE:
   Be careful not to allow grease on sealing agent in center of mirror body assembly (actuator) or back side of mirror surface (mirror holder).
6. Remove the clips and mirror cover from the housing.

Assembly

INFOID:0000000000962390

1. Install the mirror cover.
2. Place mirror holder bracket and mirror body assembly (actuator) in a horizontal position.

3. Connect two terminals of heater installed mirror.
4. Fit the upper two pawls on the mirror face (1) onto the mirror holder bracket (2) first, then press the lower side of mirror face until a click sound is heard to engage the lower pawls.
   NOTE:
   After installation, visually check that lower two pawls are securely engaged from the bottom of mirror face.