WCS В SECTION WARNING CHIME SYSTEM

А

С

D

Е

CONTENTS

BASIC INSPECTION 3
DIAGNOSIS AND REPAIR WORKFLOW
SYSTEM DESCRIPTION5
WARNING CHIME SYSTEM5
WARNING CHIME SYSTEM
5 WARNING CHIME SYSTEM : Component Parts Location
LIGHT REMINDER WARNING CHIME
SEAT BELT WARNING CHIME
SEAT BELT WARNING CHIME : Component Parts Location
PARKING BRAKE RELEASE WARNING CHIME10 PARKING BRAKE RELEASE WARNING CHIME : System Diagram11

PARKING BRAKE RELEASE WARNING CHIME : System Description	F
DIAGNOSIS SYSTEM (UNIFIED METER AND A/C AMP.)13	Η
CONSULT-III Function (METER/M&A)13	
DIAGNOSIS SYSTEM (BCM)17	1
COMMON ITEM	J
BUZZER	K
DTC/CIRCUIT DIAGNOSIS20	L
POWER SUPPLY AND GROUND CIRCUIT20	
COMBINATION METER20 COMBINATION METER : Diagnosis Procedure20	Μ
UNIFIED METER AND A/C AMP	WC
BCM (BODY CONTROL MODULE)21 BCM (BODY CONTROL MODULE) : Diagnosis Procedure21	0
METER BUZZER CIRCUIT23Description23Component Function Check23Diagnosis Procedure23	Ρ
SEAT BELT BUCKLE SWITCH SIGNAL CIR- CUIT24	

Description 2	
Component Function Check 2	4
Diagnosis Procedure 2	
Component Inspection	
	.0
WARNING CHIME SYSTEM 2	6
Wiring Diagram - WARNING CHIME 2	
	.0
ECU DIAGNOSIS INFORMATION	2
COMBINATION METER 3	2
Reference Value 3	32
Wiring Diagram - METER 3	5
Fail-safe	
DTC Index	
DTO INdex	.0
UNIFIED METER AND A/C AMP 4	7
Reference Value 4	
Wiring Diagram - METER 5	
Fail-safe	
DTC Index6	5
	-
BCM (BODY CONTROL MODULE)6	
Reference Value	
Wiring Diagram - BCM 9	
Fail-safe9	
DTC Inspection Priority Chart 9	7
DTC Index9	8

SYMPTOM DIAGNOSIS	101
THE PARKING BRAKE RELEASE WARNING CONTINUES SOUNDING, OR DOES NOT	3
SOUND	101
Description	
Diagnosis Procedure	. 101
THE LIGHT REMINDER WARNING DOES	400
NOT SOUND	
Description	
Diagnosis Procedure	102
THE SEAT BELT WARNING CONTINUES	
SOUNDING, OR DOES NOT SOUND	
Description	
Diagnosis Procedure	103
PRECAUTION	104
PRECAUTIONS Precaution for Supplemental Restraint System (SRS) "AIR BAG" and "SEAT BELT PRE-TEN- SIONER" Precaution for Battery Service	104

< BASIC INSPECTION >

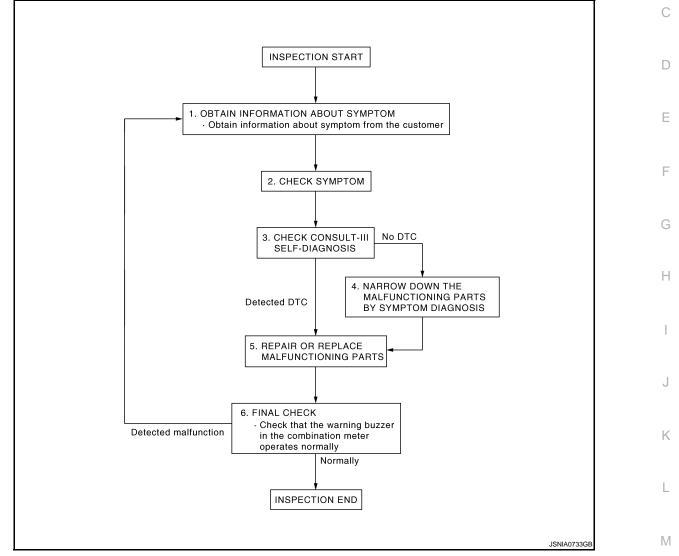
BASIC INSPECTION DIAGNOSIS AND REPAIR WORKFLOW

Work Flow

INFOID:000000005807911 B

А





DETAILED FLOW

1.OBTAIN INFORMATION ABOUT SYMPTOM

Interview the customer to obtain as much information as possible about the conditions and environment under which the malfunction occurred.

2.CHECK SYMPTOM

• Check the symptom based on the information obtained from the customer.

• Check that any other malfunctions are present.

>> GO TO 3.

3.CHECK CONSULT-III SELF-DIAGNOSIS RESULTS

WCS

DIAGNOSIS AND REPAIR WORKFLOW

< BASIC INSPECTION >

Connect CONSULT-III and perform "Self Diagnostic Result" of "METER/M&A". Refer to WCS-13. "CONSULT-III Function (METER/M&A)".

Are self-diagnosis results normal?

YES >> GO TO 4. NO >> GO TO 5.

4.NARROW DOWN MALFUNCTIONING PARTS BY SYMPTOM DIAGNOSIS

Perform symptom diagnosis and narrow down the malfunctioning parts.

>> GO TO 5.

5. REPAIR OR REPLACE MALFUNCTIONING PARTS

Repair or replace malfunctioning parts. **NOTE:**

If DTC is displayed, erase DTC after repair or replace malfunctioning parts.

>> GO TO 6.

6.FINAL CHECK

Check that the warning buzzer in the combination meter operates normally.

Does it operate normally?

YES >> INSPECTION END NO >> GO TO 1.

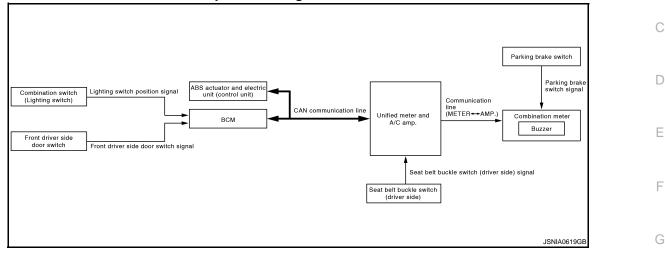
< SYSTEM DESCRIPTION >

SYSTEM DESCRIPTION

WARNING CHIME SYSTEM

WARNING CHIME SYSTEM

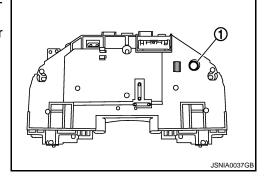
WARNING CHIME SYSTEM : System Diagram



WARNING CHIME SYSTEM : System Description

COMBINATION METER

- The buzzer (1) for warning chime system is installed in the combination meter.
- The buzzer sounds when the combination meter receives buzzer output signal from each unit through unified meter and A/C amp.



UNIFIED METER AND A/C AMP.

The unified meter and A/C amp. transmits the buzzer output signal received from BCM with CAN communication line to the combination meter.

BCM

BCM receives signals from various units and transmits a buzzer output signal to the unified meter and A/C amp. with CAN communication line if it judges that the warning buzzer should be activated.

BCM warning function list

Warning functions	Signal name	
Light reminder warning chime	Lighting switch position signalDriver side door switch signal	0
Seat belt warning chime	Ignition switch signalSeat belt buckle switch (driver side) signal	P

В

INFOID:000000005807912

INFOID:000000005807913

Н

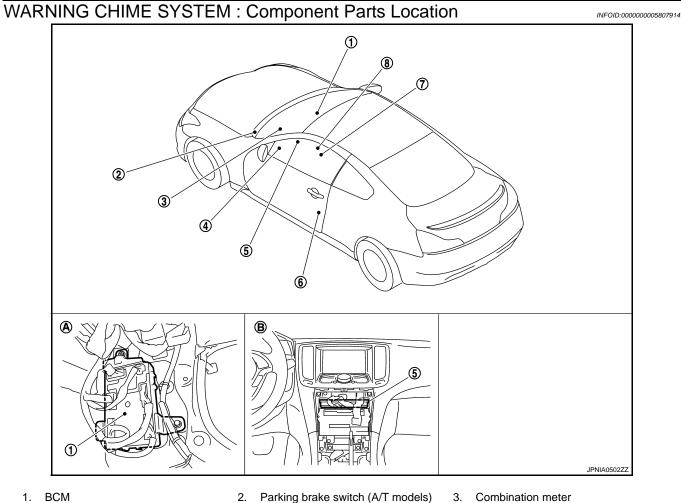
Κ

Μ

WCS

А

< SYSTEM DESCRIPTION >



- 1. BCM
- Combination switch 4.
- (Lighting switch)
- 7. Seat belt buckle switch (driver side) A. Dash side lower (passenger side)
- 5. Unified meter and A/C amp.
- Parking brake switch (M/T models) 8.
- B. Behind cluster lid C (back)

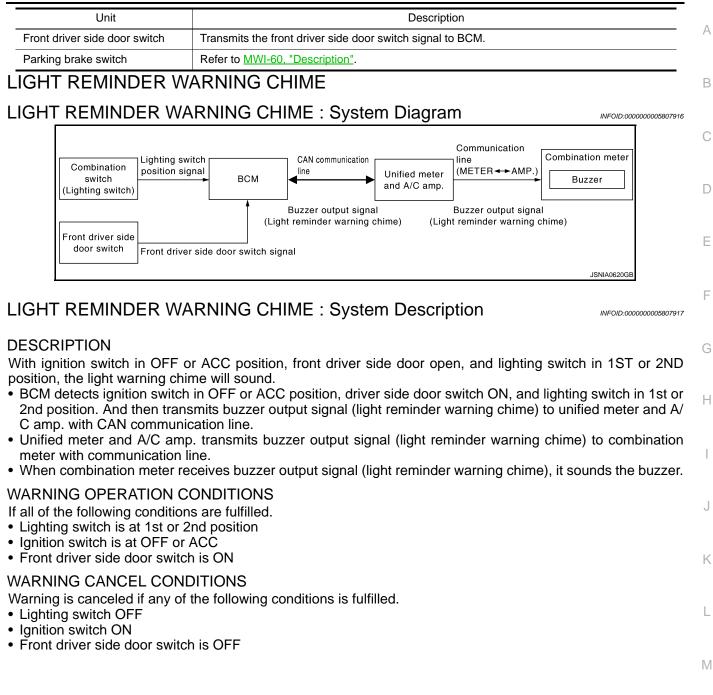
WARNING CHIME SYSTEM : Component Description

INFOID:000000005807915

6. Front driver side door switch

Unit	Description		
Combination meter	 Receives a buzzer output signal from the unified meter and A/C amp. and sounds the buzzer. Judges whether the parking brake is released from the vehicle speed signal received from the unified meter and A/C amp. with CAN communication line and the parking brake switch signal from the parking brake switch, and sounds the buzzer if necessary. 		
Unified meter and A/C amp.	 Receives the seat belt buckle switch signal from the seat belt buckle switch and transmits it to BCM with CAN communication line. Receives a buzzer output signal from BCM with CAN communication line and transmits it to the combination meter by means of communication line. 		
BCM	Transmits signals provided by various units to the unified meter and A/C amp. with CAN com- munication line.		
ABS actuator and electric unit (control unit)	Transmits the vehicle speed signal to BCM with CAN communication line.		
Seat belt buckle switch (driver side)	Transmits a seat belt buckle switch (driver side) signal to the unified meter and A/C amp.		
Combination switch (Lighting switch)	Transmits the lighting switch position signal to BCM.		

< SYSTEM DESCRIPTION >

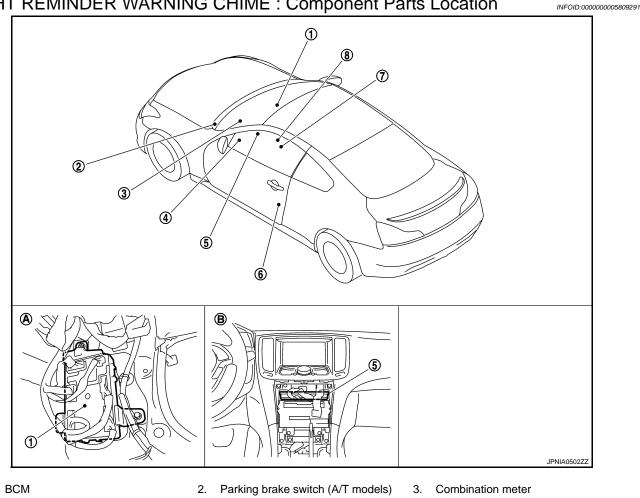


WCS

0

< SYSTEM DESCRIPTION >

LIGHT REMINDER WARNING CHIME : Component Parts Location



- 1. Combination switch
- 4. (Lighting switch)

7. Seat belt buckle switch (driver side)

A. Dash side lower (passenger side)

- - Unified meter and A/C amp.
- Parking brake switch (M/T models) 8.
- B. Behind cluster lid C (back)

LIGHT REMINDER WARNING CHIME : Component Description

5.

INFOID:000000005807919

6. Front driver side door switch

Unit	Description		
Combination meter	Receives a buzzer output signal from the unified meter and A/C amp. and sounds the buzzer.		
Unified meter and A/C amp.	Receives a buzzer output signal from BCM via CAN communication line and transmits it to the co bination meter by means of communication line.		
ВСМ	Judges the light warning chime conditions from the signals provided by various switches and trans- mits a buzzer output signal to the unified meter and A/C amp. via CAN communication line if nec- essary.		
Combination switch (Lighting switch)	Transmits the lighting switch position signal to BCM.		
Front driver side door switch	Transmits the front driver side door switch signal to BCM.		

SEAT BELT WARNING CHIME

< SYSTEM DESCRIPTION > SEAT BELT WARNING CHIME : System Diagram INFOID:000000005807920 Combination meter Communication line (METER ← AMP.) CAN communication line Unified meter всм Buzzer and A/C amp. Buzzer output signal Buzzer output signal (Seat belt warning chime) (Seat belt warning chime) Seat belt buckle switch signal Seat belt buckle switch Seat belt buckle switch (driver side) signal (driver side) JSNIA0621GE

SEAT BELT WARNING CHIME : System Description

DESCRIPTION

With ignition switch turned ON and driver seat belt unfastened, seat belt warning chime will sound for approximately 6 seconds.

- BCM receives seat belt buckle switch signal from unified meter and A/C amp. with CAN communication line.
- BCM detects ignition switch turned ON and seat belt buckle switch (driver side) ON. And then transmits
- buzzer output signal (seat belt warning chime) to unified meter and A/C amp. with CAN communication line.
 Unified meter and A/C amp. transmits buzzer output signal (seat belt warning chime) to combination meter with communication line.
- When combination meter receives buzzer output signal (seat belt warning chime), it sounds the buzzer.

WARNING OPERATION CONDITIONS

- If all of the following conditions are fulfilled.
- Ignition switch $OFF \rightarrow ON$
- Seat buckle switch (driver side) is ON (driver seat belt unfastened)

WARNING CANCEL CONDITIONS

Warning is canceled if any of the following conditions is fulfilled.

- Ignition switch OFF
- Seat buckle switch (driver side) is OFF (driver seat belt fastened)

Μ

Κ

А

D

Е

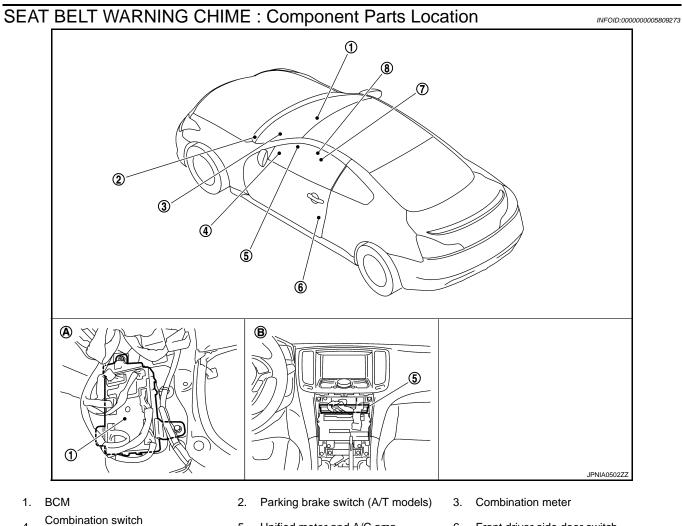
Н

INFOID:00000000580792

WCS

Ο

< SYSTEM DESCRIPTION >



4. (Lighting switch)

7. Seat belt buckle switch (driver side)

A. Dash side lower (passenger side)

- 5. Unified meter and A/C amp.
- 8. Parking brake switch (M/T models)
- B. Behind cluster lid C (back)

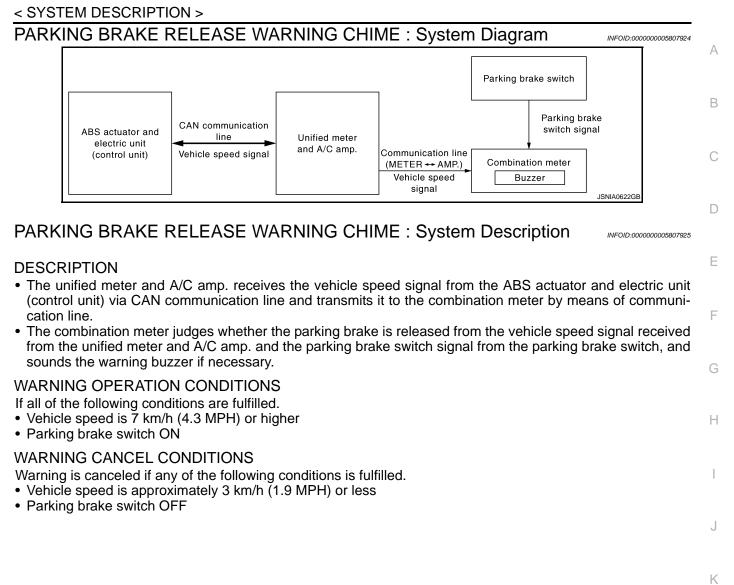
SEAT BELT WARNING CHIME : Component Description

INFOID:000000005807923

6. Front driver side door switch

Unit	Description		
Combination meter	Receives a buzzer output signal from the unified meter and A/C amp. and sounds the buzzer.		
Unified meter and A/C amp.	 Receives the seat belt buckle switch (driver side) signal from the seat belt buckle switch (driver side) and transmits it to BCM via CAN communication line. Receives a buzzer output signal from BCM via CAN communication line and transmits it to the combination meter by means of communication line. 		
ВСМ	Judges the seat belt warning chime condition from the seat belt buckle switch signal received from the unified meter and A/C amp. and transmits a buzzer output signal to the unified meter and A/C amp via CAN communication line if necessary.		
Seat belt buckle switch (driver side)	Refer to WCS-24, "Description".		

PARKING BRAKE RELEASE WARNING CHIME



Μ

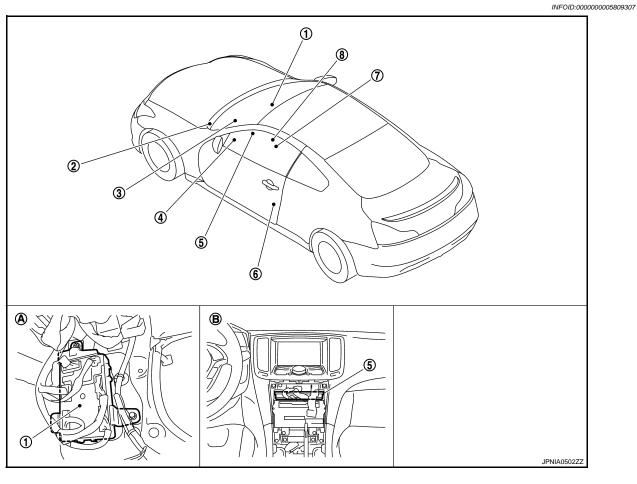
L

WCS

0

< SYSTEM DESCRIPTION >

PARKING BRAKE RELEASE WARNING CHIME : Component Parts Location



- BCM 1.
- Combination switch 4. (Lighting switch)
- Parking brake switch (A/T models) 2. Unified meter and A/C amp.
- 3. Combination meter
- 6. Front driver side door switch

- 7. Seat belt buckle switch (driver side) A. Dash side lower (passenger side)
- 8. Parking brake switch (M/T models)
- B. Behind cluster lid C (back)

5.

Unit	Description		
Combination meter	Judges whether the parking brake is released from the vehicle speed signal received from unified meter and A/C amp. via CAN communication line and the parking brake switch signal the parking brake switch, and sounds the buzzer if necessary.		
Unified meter and A/C amp.	Receives a vehicle speed signal from ABS actuator and electric unit (control unit) via CAN munication line and transmits it to the combination meter by means of communication line.		
ABS actuator and electric unit (control unit)	Transmits the vehicle speed signal to combination meter via CAN communication line.		
Parking brake switch	Refer to <u>MWI-60</u> , "Description".		

< SYSTEM DESCRIPTION >

DIAGNOSIS SYSTEM (UNIFIED METER AND A/C AMP.)

CONSULT-III Function (METER/M&A)

CONSULT-III APPLICATION ITEMS

CONSULT-III can perform the following diagnosis modes with CAN communication with the unified meter and A/C amp.

			С
System	Diagnosis mode	Description	
METER/M&A	Self Diagnostic Result	Unified meter and A/C amp. checks the conditions and displays memorized error.	
	Data Monitor	Displays unified meter and A/C amp. input/output data in real time.	D

SELF DIAG RESULT Refer to <u>WCS-65, "DTC Index"</u>.

DATA MONITOR

Display Item List

Display item [Unit]	MAIN SIGNALS	Description
SPEED METER [km/h]	x	Value of vehicle speed signal received from ABS actuator and electric unit (control unit) with CAN communication line. NOTE: 655.35 is displayed when the malfunction signal is received.
SPEED OUTPUT [km/h]	x	Vehicle speed signal value transmitted to other units with CAN communication line. NOTE: 655.35 is displayed when the malfunction signal is received.
ODO OUTPUT [km]		Odometer signal value transmitted to other units with CAN communication line.
TACHO METER [rpm]	x	Value of the engine speed signal received from ECM with CAN communication line. NOTE: 8191.875 is displayed when the malfunction signal is received.
FUEL METER [L]	х	Fuel level indicated on combination meter.
W TEMP METER [°C]	x	Value of engine coolant temperature signal received from ECM with CAN commu- nication line. NOTE: 215 is displayed when the malfunction signal is input.
ABS W/L [On/Off]		Status of ABS warning lamp judged from ABS warning lamp signal received from ABS actuator and electric unit (control unit) with CAN communication line.
VDC/TCS IND [On/Off]		Status of VDC OFF indicator lamp judged from VDC OFF indicator lamp signal re- ceived from ABS actuator and electric unit (control unit) with CAN communication line.
SLIP IND [On/Off]		Status of SLIP indicator lamp judged from slip indicator lamp signal received from ABS actuator and electric unit (control unit) with CAN communication line.
BRAKE W/L [On/Off]		Status of brake warning lamp judged from brake warning lamp signal received from ABS actuator and electric unit (control unit) with CAN communication line. NOTE: Displays "Off" if the brake warning lamp is illuminated when the valve check starts, the parking brake switch is turned ON or the brake fluid level switch is turned ON.
DOOR W/L [On/Off]		Status of door warning judged from door switch signal received from BCM with CAN communication line.
TRUNK/GLAS-H [On/Off]		Status of trunk warning judged from trunk switch signal received from BCM with CAN communication line.

А

В

Е

F

X: Applicable

INFOID:000000005809311

< SYSTEM DESCRIPTION >

Display item [Unit]	MAIN SIGNALS	Description
HI-BEAM IND [On/Off]		Status of high beam indicator lamp judged from high beam request signal received from BCM with CAN communication line.
TURN IND [On/Off]		Status of turn indicator lamp judged from turn indicator signal received from BCM with CAN communication line.
FR FOG IND [On/Off]		Status of front fog lamp indicator lamp judged from front fog light request signal received from BCM with CAN communication line.
RR FOG IND [Off]		This item is displayed, but cannot be monitored.
LIGHT IND [On/Off]		Status of tail lamp indicator lamp judged from position light request signal received from BCM with CAN communication line.
OIL W/L [On/Off]		Status of oil pressure warning lamp judged from oil pressure switch signal re- ceived from IPDM E/R with CAN communication line.
MIL [On/Off]		Status of malfunction indicator lamp judged from malfunctioning indicator lamp signal received from ECM with CAN communication line.
GLOW IND [On/Off]		This item is displayed, but cannot be monitored.
C-ENG2 W/L [On/Off]		This item is displayed, but cannot be monitored.
CRUISE IND [On/Off]		Status of CRUISE indicator judged from ASCD status signal received from ECM with CAN communication line.
SET IND [On/Off]		Status of SET indicator judged from ASCD SET indicator signal received from ECM with CAN communication line.
CRUISE W/L [On/Off]		Status of CRUISE warning lamp judged from ASCD status signal received from ECM with CAN communication line.
BA W/L [Off]		This item is displayed, but cannot be monitored.
ATC/T-AMT W/L [On/Off]		Status of A/T check warning lamp judged from A/T check indicator signal received from TCM with CAN communication line.
4WD W/L [On/Off]		Status of AWD warning lamp judged from AWD warning lamp signal received from AWD control unit with CAN communication line.
4WD LOCK IND [Off]		This item is displayed, but cannot be monitored.
FUEL W/L [On/Off]		Low-fuel warning lamp status judged by the identified fuel level.
WASHER W/L [On/Off]		Status of washer warning lamp judged from washer level switch input to combina- tion meter.
AIR PRES W/L [On/Off]		Status of low tire pressure warning lamp judged from tire pressure signal received from BCM with CAN communication line.
KEY G/Y W/L [On/Off]		Status of key warning lamp (G/Y) judged from key warning signal received from BCM with CAN communication line.
AFS OFF IND [On/Off]		Status of AFS OFF indicator lamp judged from AFS OFF indicator lamp signal re- ceived from AFS control unit with CAN communication line.
4WAS/RAS W/L [On/Off]		Status of 4WAS warning lamp judged from 4WAS warning lamp signal received from 4WAS main control unit with CAN communication line.
DDS W/L [On/Off]		This item is displayed, but cannot be monitored.
LANE W/L [On/Off]		This item is displayed, but cannot be monitored.
LDP IND [On/Off]		This item is displayed, but cannot be monitored.

< SYSTEM DESCRIPTION >

Display item [Unit]	MAIN SIGNALS	Description		
LCD [B&P N, B&P I, ID NG, ROTAT, SFT P, INSRT, BATT, NO KY,OUTKY, LK WN, C&P N, C&P I]		Displays status of Intelligent Key system warning judged from meter display signal received from BCM with CAN communication line.		
ACC TARGET [On/Off]		Status of vehicle ahead detection indicator judged from meter display signal re- ceived from ICC sensor integrated unit with CAN communication line.		
ACC DISTANCE [Off, SHOR, MID, LONG]		Status of set distance indicator judged from meter display signal received from ICC sensor integrated unit with CAN communication line.		
ACC OWN VHL [On/Off]		Status of own vehicle indicator judged from meter display signal received from ICC sensor integrated unit with CAN communication line.		
ACC SET SPEED		Display ICC set vehicle speed from meter display signal received from ICC sensor integrated unit with CAN communication line.		
ACC UNIT [On/Off]		Status of display unit judged from meter display signal received from ICC sensor integrated unit with CAN communication line.		
O/D OFF SW [On/Off]		This item is displayed, but cannot be monitored.		
SHIFT IND [P, R, N, D, M1, M2, M3, M4, M5, M6, M7]		Status of shift position indicator judged from shift position signal and manual mode ndicator signal received from TCM with CAN communication line.		
AT S MODE SW [On/Off]		Status of snow mode switch.		
AT P MODE SW [On/Off]		This item is displayed, but cannot be monitored.		
M RANGE SW [On/Off]		Status of manual mode switch.		
NM RANGE SW [On/Off]		Status of not manual mode switch.		
AT SFT UP SW [On/Off]		Status of A/T shift up switch.		
AT SFT DWN SW [On/Off]		Status of A/T shift down switch.		
ST SFT UP SW [On/Off]		Status of paddle shifter up switch.		
ST SFT DWN SW [On/Off]		Status of paddle shifter down switch.		
COMP F/B SIG [On/Off]		A/C compressor activation condition that ECM judges according to the water tem- perature and the acceleration degree.		
4WD LOCK SW [Off]		This item is displayed, but cannot be monitored.		
PKB SW [On/Off]		Status of parking brake switch.		
BUCKLE SW [On/Off]		Status of seat belt buckle switch.		
BRAKE OIL SW [On/Off]		Status of brake fluid level switch.		
DISTANCE [km]		Value of possible driving distance calculated by unified meter and A/C amp.		
OUTSIDE TEMP [°C or °F]		Ambient air temperature value converted from ambient sensor signal received from ambient sensor. NOTE: This may not match with the temperature value indicated on the information display. (Because the information display value is a corrected value from the ambient sensor input value.)		

< SYSTEM DESCRIPTION >

Display item [Unit]	MAIN SIGNALS	Description
FUEL LOW SIG [On/Off]		Status of fuel level low warning signal to output to AV control unit with CAN com- munication line.
BUZZER [On/Off]	x	Buzzer status (in the combination meter) is judged with the buzzer output signal received from each unit with CAN communication line and the warning output condition of the combination meter.

NOTE:

Some items are not available according to vehicle specification.

< SYSTEM DESCRIPTION > DIAGNOSIS SYSTEM (BCM) COMMON ITEM

COMMON ITEM : CONSULT-III Function (BCM - COMMON ITEM)

В

С

INFOID:000000005890580

А

APPLICATION ITEM

CONSULT-III performs the following functions via CAN communication with BCM.

Diagnosis mode	Function Description	
Work Support	Changes the setting for each system function.	
Self Diagnostic Result	Displays the diagnosis results judged by BCM.	
CAN Diag Support Monitor	Monitors the reception status of CAN communication viewed from BCM. Refer to CONSULT-III opera- tion manual.	
Data Monitor	The BCM input/output signals are displayed.	
Active Test	The signals used to activate each device are forcibly supplied from BCM.	
Ecu Identification	The BCM part number is displayed.	
Configuration	This function is not used even though it is displayed.	

SYSTEM APPLICATION

BCM can perform the following functions for each system.

NOTE:

It can perform the diagnosis modes except the following for all sub system selection items.

				\times : Applicable item	1
System	Sub system selection item	Diagnosis mode			
System	Sub system selection item	Work Support	Data Monitor	Active Test	-
Door lock	DOOR LOCK	×	×	×	-
Rear window defogger	REAR DEFOGGER		×	×	-
Warning chime	BUZZER		×	×	-
Interior room lamp timer	INT LAMP	×	×	×	-
Exterior lamp	HEAD LAMP	×	×	×	-
Wiper and washer	WIPER	×	×	×	-
Turn signal and hazard warning lamps	FLASHER	×	×	×	-
	AIR CONDITONER*				-
Intelligent Key systemEngine start system	INTELLIGENT KEY	×	×	×	-
Combination switch	COMB SW		×		-
Body control system	BCM	×			-
IVIS - NATS	IMMU		×	×	
Interior room lamp battery saver	BATTERY SAVER	×	×	×	1
Trunk lid open	TRUNK		×	×	- 11
Vehicle security system	THEFT ALM	×	×	×	-
RAP system	RETAINED PWR		×		-
Signal buffer system	SIGNAL BUFFER		×	×	-
TPMS	AIR PRESSURE MONITOR	×	×	×	-

NOTE:

*: This item is displayed, but is not used.

FREEZE FRAME DATA (FFD)

The BCM records the following vehicle condition at the time a particular DTC is detected, and displays on CONSULT-III.

DIAGNOSIS SYSTEM (BCM)

< SYSTEM DESCRIPTION >

CONSULT screen item	Indication/Unit	Description				
Vehicle Speed	km/h	Vehicle speed of the moment a particular DTC is detected				
Odo/Trip Meter	km	Total mileage (Odometer	r value) of the moment a particular DTC is detected			
	SLEEP>LOCK		While turning BCM status from low power consumption mode to normal mode (Power supply position is "LOCK")			
	SLEEP>OFF		While turning BCM status from low power consumption mode to normal mode (Power supply position is "OFF".)			
	LOCK>ACC		While turning power supply position from "LOCK" to "ACC"While turning power supply position from "ACC" to "IGN"			
	ACC>ON					
	RUN>ACC		While turning power supply position from "RUN" to "ACC" (Vehicle is stopping and selector lever is except P position.)			
	CRANK>RUN		While turning power supply position from "CRANKING" to "RUN" (From cranking up the engine to run it)			
	RUN>URGENT	Power position status of the moment a particular DTC is detected	While turning power supply position from "RUN" to "ACC" (Emer- gency stop operation)			
	ACC>OFF		While turning power supply position from "ACC" to "OFF"			
	OFF>LOCK		While turning power supply position from "OFF" to "LOCK"			
Vehicle Condition	OFF>ACC		While furning power supply position from " OEE " to "ACC"			
	ON>CRANK		While turning power supply position from "IGN" to "CRANKING"			
	OFF>SLEEP		While turning BCM status from normal mode (Power supply position is "OFF".) to low power consumption mode			
	LOCK>SLEEP		While turning BCM status from normal mode (Power supply position is "LOCK".) to low power consumption mode			
	LOCK		Power supply position is "LOCK" (Ignition switch OFF with steer- ing is locked.)			
	OFF		Power supply position is "OFF" (Ignition switch OFF with steering is unlocked.)			
	ACC		Power supply position is "ACC" (Ignition switch ACC)			
	ON		Power supply position is "IGN" (Ignition switch ON with engine stopped)			
	ENGINE RUN		Power supply position is "RUN" (Ignition switch ON with engine running)			
	CRANKING		Power supply position is "CRANKING" (At engine cranking)			
IGN Counter	0 - 39	 The number is 0 when The number increases whenever ignition swit 	t ignition switch is turned ON after DTC is detected a malfunction is detected now. s like $1 \rightarrow 2 \rightarrow 338 \rightarrow 39$ after returning to the normal condition ch OFF \rightarrow ON. 9 39 until the self-diagnosis results are erased if it is over 39.			

BUZZER

BUZZER : CONSULT-III Function (BCM - BUZZER)

INFOID:000000005807930

CONSULT-III APPLICATION ITEMS

Test item	Diagnosis mode	Description		
BUZZER Data Monitor		Displays BCM input data in real time.		
DOZZER	Active Test	Operation of electrical loads can be checked by sending driving signal to them.		

DATA MONITOR

DIAGNOSIS SYSTEM (BCM)

< SYSTEM DESCRIPTION >

Display item [Unit]	Description		
VEH SPEED 1 [Km/h]	Value of vehicle speed signal received from ABS actuator and electric unit (control unit) with CAN communication line.		
PUSH SW [On/Off]	Status of push button ignition switch judged by BCM.		
UNLK SEN-DR [On/Off]	Status of unlock sensor judged by BCM.		
KEY SW-SLOT [On/Off]	Status of key slot judged by BCM.		
AIL LAMP SW Status of each switch judged by BCM using the combination switch readout function.			
FR FOG SW [On/Off]	Status of front fog lamp switch judged by BCM.		
DOOR SW-DR [On/Off]	Status of driver side door switch judged by BCM.		

ACTIVE TEST

Display item [Unit]	Description	(
IGN KEY WARN ALM	The key warning chime operation can be checked by operating the relevant function (On/Off).	
SEAT BELT WARN TEST	The seat belt warning chime operation can be checked by operating the relevant function (On/Off).	ŀ
ID REGIST WARNING	The ID regist warning chime operation can be checked by operating the relevant function (On/Off).	
LIGHT WARN ALM	The light warning chime operation can be checked by operating the relevant function (On/Off).	
RUN FLAT/T WARN BUZZER	The run-flat tire warning chime operation can be checked by operating the relevant function (On/Off).	

Κ

L

J

M

WCS

0

POWER SUPPLY AND GROUND CIRCUIT

< DTC/CIRCUIT DIAGNOSIS >

DTC/CIRCUIT DIAGNOSIS POWER SUPPLY AND GROUND CIRCUIT COMBINATION METER

COMBINATION METER : Diagnosis Procedure

1.CHECK FUSE

Check for blown fuses.

Power source	Fuse No.
Battery	11
Ignition switch ON or START	4

Is the inspection result normal?

YES >> GO TO 2.

NO >> Be sure to eliminate cause of malfunction before installing new fuse.

2.CHECK POWER SUPPLY CIRCUIT

Check voltage between combination meter harness connector terminal and ground.

	Terminals				
((+)		Ignition switch	Voltage (Approx.)	
Combina	Combination meter		ignition switch		
Connector	Terminals	Ť			
M53	1	Ground	OFF	Pottory voltage	
CCIVI	21	Giouna	ON	Battery voltage	

Is the inspection result normal?

YES >> GO TO 3.

NO >> Check harness between combination meter and fuse.

3.CHECK GROUND CIRCUIT

- 1. Turn ignition switch OFF.
- 2. Disconnect combination meter connector.

3. Check continuity between combination meter harness connector terminal and ground.

Combina	tion meter		Continuity
Connector	Terminals	*	Continuity
	5	Ground	
M53	15		Existed
_	22		

Is the inspection result normal?

YES >> INSPECTION END

NO >> Repair harness or connector.

UNIFIED METER AND A/C AMP.

UNIFIED METER AND A/C AMP. : Diagnosis Procedure

1.CHECK FUSE

Check for blown fuses.

INFOID:000000005809313

INFOID:000000005809312

POWER SUPPLY AND GROUND CIRCUIT

< DTC/CIRCUIT DIAGNOSIS >

2.CHECK POV	n result normal?	CC or ON			11 19	
YES >> GO NO >> Be 2.CHECK POV	Ignition switch Of result normal?				19	
YES >> GO NO >> Be 2.CHECK POV	n result normal?	N or START				
YES >> GO NO >> Be 2.CHECK POV			Ignition switch ON or START		3	
NO >> Be 2.CHECK POV		2				
eneer renage a	sure to eliminat				ng new fuse. tor terminal and g	jround.
			1			
	Terminals		-			
(+	·		Ignition sv		ltage prox.)	
Unified meter		()		(~	pl0x.)	
Connector	Terminals		0.55			
M07	54		OFF	D		
M67	41	Ground	ACC	Batter	y voltage	
	53 result normal?		ON			
. Turn ignition		and A/C amp. c		o. harness	connector termina	I and ground.
Unified meter	and A/C amp.					
Connector	Terminals		Continu	У		
M67 -	55 71	Ground	Existe			
NO >> Rep BCM (BOD)	PECTION END pair harness or CONTRO	connector. L MODULE	,			
		MODULE)	: Diagno	ISIS Proc	eaure	INFOID:000000005890544
.CHECK FUS	E AND FUSIBI	LE LINK				
Check that the f	ollowing fuse a	nd fusible link a	are not blo	/n.		
	Signal nar	ne			Fuse and fusible	link No.
					К	
	Battery power	supply			10	
	<u>a?</u>		I			

POWER SUPPLY AND GROUND CIRCUIT

< DTC/CIRCUIT DIAGNOSIS >

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

	Terminals		
(+)	(-)	Voltage
B	CM		(Approx.)
Connector	Terminal	Ground	
M118	1	Ground	Potton voltago
M119	11	1	Battery voltage

Is the measurement value normal?

YES >> GO TO 3.

NO >> Repair harness or connector.

 $3. {\sf CHECK} \, {\sf GROUND} \, {\sf CIRCUIT}$

Check continuity between BCM harness connector and ground.

BC	CM		Continuity
Connector	Connector Terminal		Continuity
M119	13	-	Existed

Does continuity exist?

YES >> INSPECTION END

NO >> Repair harness or connector.

METER BUZZER CIRCUIT

< DTC/CIRCUIT DIAGNOSIS >	
METER BUZZER CIRCUIT	Λ
Description INFOID:00000005807934	A
 The buzzer for warning chime system is installed in the combination meter. The combination meter sounds the alarm buzzer based on the signals transmitted from various units. 	В
Component Function Check	
1. CHECK OPERATION OF METER BUZZER	С
 Connect the CONSULT-III. Perform "LIGHT WARN ALM" in "ACTIVE TEST" of "BCM (BUZZER)". 	D
Does meter buzzer beep?	
YES >> INSPECTION END NO >> GO TO 2.	Е
2. CHECK UNIFIED METER AND A/C AMP. INPUT SIGNAL	
Select the "Data Monitor" of "METER/M&A" and check the "BUZZER" monitor value.	F
	1
"BUZZER" Under the condition of buzzer input : On	
Except above : Off	G
Is the inspection result normal?	
YES >> Replace combination meter. NO >> Replace BCM. Refer to <u>BCS-79, "Removal and Installation"</u> .	Н
Diagnosis Procedure	
1.CHECK POWER SUPPLY OF COMBINATION METER	
Check power supply of combination meter. Refer to <u>WCS-20, "COMBINATION METER : Diagnosis Proce-</u> dure".	J
Is the inspection result normal?	
YES >> GO TO 2.	K
NO >> Repair power supply circuit of combination meter.	
2. CHECK BATTERY POWER SUPPLY OF UNIFIED METER AND A/C AMP.	
Check battery power supply of unified meter and A/C amp. Refer to <u>WCS-20, "UNIFIED METER AND A/C</u> AMP. : Diagnosis Procedure".	L
Is the inspection result normal?	
YES >> INSPECTION END	M
NO >> Repair power supply circuit of unified meter and A/C amp.	
	WC

0

SEAT BELT BUCKLE SWITCH SIGNAL CIRCUIT

< DTC/CIRCUIT DIAGNOSIS >

SEAT BELT BUCKLE SWITCH SIGNAL CIRCUIT

Description

Transmits a seat belt buckle switch signal to the unified meter and A/C amp.

Component Function Check

1.CHECK UNIFIED METER AND A/C AMP. INPUT SIGNAL

1. Connect the CONSULT-III.

2. Select the "Data Monitor" of the "METER/M&A" and check the "BUCKLE SW" monitor value.

"BUCKLE SW" When seat belt is fastened : Off When seat belt is unfastened : On

>> INSPECTION END

Diagnosis Procedure

1.CHECK UNIFIED METER AND A/C AMP. INPUT SIGNAL

- 1. Turn ignition switch ON.
- 2. Check voltage between unified meter and A/C amp. harness connector terminal and ground.

	Terminal				
(·	(+) Unified meter and A/C amp.		Condition	Voltage (Approx.)	
Unified meter			Condition		
Connector	Terminal	-			
M66	9	Ground	When seat belt is fastened	12 V	
IVIOO	9	Gibullu	When seat belt is unfastened	0 V	

Is the inspection result normal?

YES >> Replace unified meter and A/C amp.

NO >> GO TO 2.

2.CHECK SEAT BELT BUCKLE SWITCH (DRIVER SIDE) SIGNAL CIRCUIT

- 1. Turn ignition switch OFF.
- 2. Disconnect unified meter and A/C amp. connector and seat belt buckle switch (driver side) connector.
- 3. Check continuity between unified meter and A/C amp. harness connector terminal and seat belt buckle switch (driver side) harness connector terminal.

Unified meter	and A/C amp.	Seat belt buckle s	Continuity		
Connector	Terminal	Connector	Terminal	Continuity	
M66	9	B13	1	Existed	

4. Check harness continuity between unified meter and A/C amp. harness connector terminal and ground.

Unified meter and A/C amp.			Continuity
Connector	Terminal	Ground	Continuity
M66	9	1	Not existed
			1

Is the inspection result normal?

YES >> GO TO 3.

NO >> Repair harness or connector.

 ${f 3.}$ CHECK SEAT BELT BUCKLE SWITCH (DRIVER SIDE) GROUND CIRCUIT

WCS-24

INFOID:000000005807937

INFOID:000000005807938

INFOID:000000005807939

SEAT BELT BUCKLE SWITCH SIGNAL CIRCUIT

< DTC/CIRCUIT DIAGNOSIS >

Check harness continuity between seat belt buckle switch (driver side) harness connector terminal and ground.

Seat belt buckle	switch (driver side)		Orationity		
Connector	Terminal	Ground	Continuity		E
B13	2	-	Existed		
s the inspectio	n result normal	?			(
	SPECTION ENI pair harness or	-			
Component	Inspection			INFOID:00000005807940	
CHECK SE	AT BELT BUCK	LE SWITCH (DRIVER SIDE)			
	n switch OFF.				E
		uckle switch (driver side) conne terminals 1 and 2.	ctor.		
					F
Terr	minal	Seat belt buckle switch (driver side)	Continuity		
	2	When seat belt is fastened	Not existed		
1	2	M/han anothalt is unfactored	Existed		0
1		When seat belt is unfastened	Existed		(
1 s the inspectio	n result normal'		Existed		(
-	<u>n result normal</u> SPECTION ENI	<u>?</u>	Existed		
YES >> INS NO >> Re	SPECTION ENI place the seat b	<u>?</u>)		SEAT BELT BUCKLE : Removal	
YES >> INS NO >> Re	SPECTION END	<u>?</u>)		SEAT BELT BUCKLE : Removal	ŀ

Μ

J

Κ

L

А

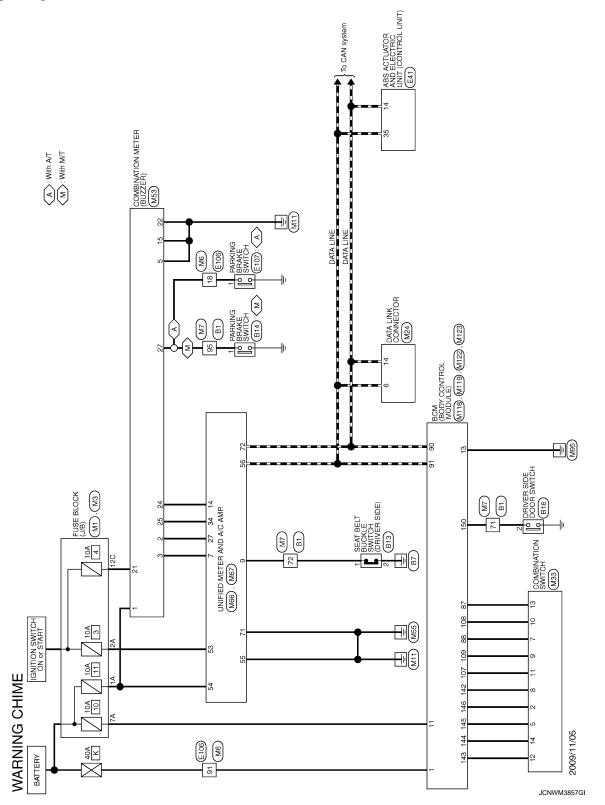
WCS

0

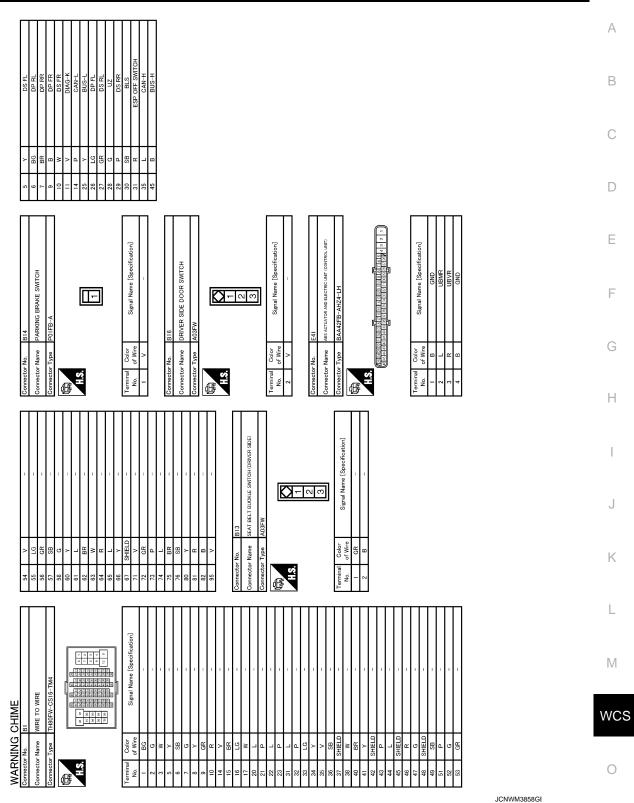
< DTC/CIRCUIT DIAGNOSIS >

WARNING CHIME SYSTEM

Wiring Diagram - WARNING CHIME -

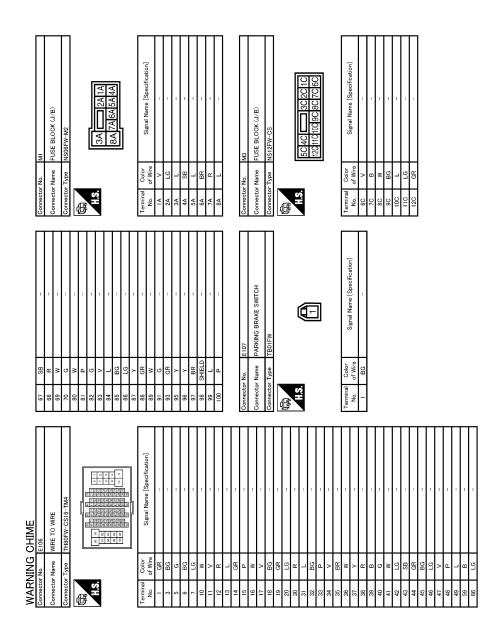


< DTC/CIRCUIT DIAGNOSIS >



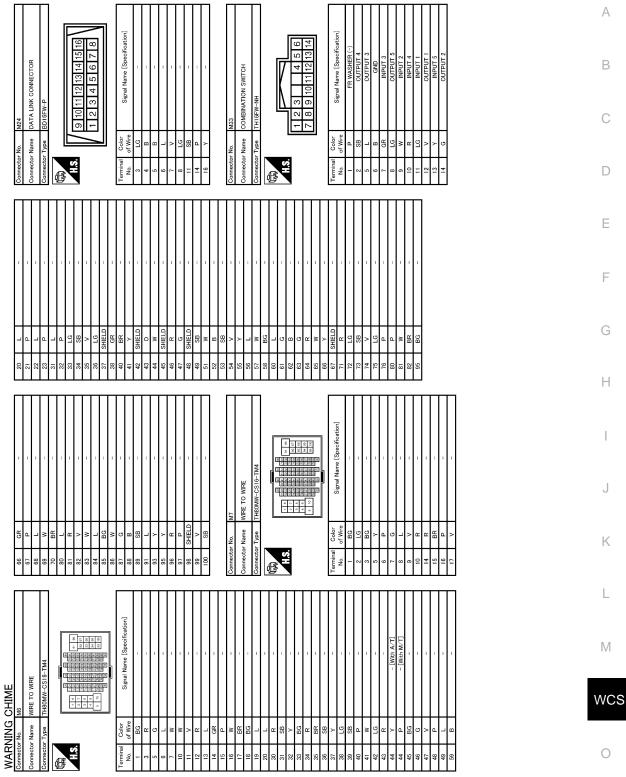
Ρ

Revision: 2009 November



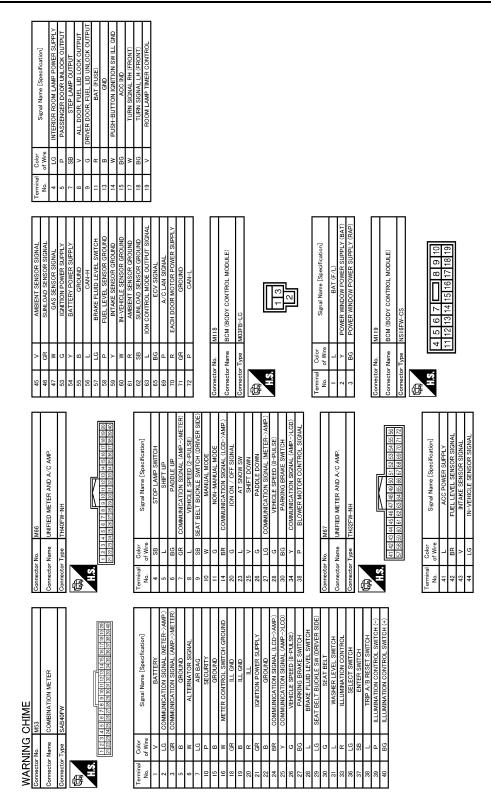
JCNWM3859GI

< DTC/CIRCUIT DIAGNOSIS >



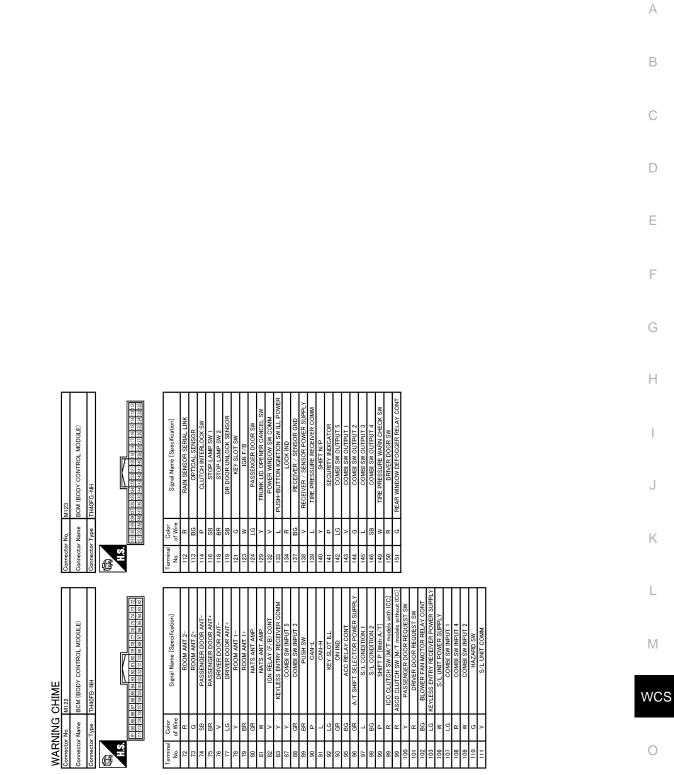
JCNWM3860GI

< DTC/CIRCUIT DIAGNOSIS >



JCNWM3861GE

< DTC/CIRCUIT DIAGNOSIS >



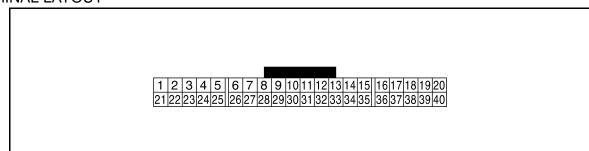
JCNWM3862GI

ECU DIAGNOSIS INFORMATION COMBINATION METER

Reference Value

VALUES ON THE DIAGNOSIS TOOL Refer to <u>WCS-47, "Reference Value"</u>.

TERMINAL LAYOUT



PHYSICAL VALUES

	nal No. e color)	Description				Value
+	-	Signal name	Input/ Output	•	Condition	(Approx.)
1 (V)	Ground	Battery power supply	Input	Ignition switch OFF	_	Battery voltage
2 (LG)	Ground	Communication signal (METER→ AMP.)	Output	Ignition switch ON	_	(V) 6 2 0 ↓ 2 0 ↓ ↓ ↓ ↓ ↓ ↓ ↓ ↓ ↓ ↓ ↓ ↓ ↓
3 (GR)	Ground	Communication signal (AMP.→ METER)	Input	Ignition switch ON	_	(V) 6 2 0 2 2 0 2 2 0 4 2 0 5 5 5 5 5 5 5 5 5 5 5 5 5 5 5 5 5 5
5 (B)	Ground	Ground	_	Ignition switch ON	_	0 V
6	Ground	Alternator signal	Input	Ignition switch	Charge warning lamp ON	0 V
(W)	Ground	Alternator signal	Input	ON	Charge warning lamp OFF	12 V
7	Crown d		lanut	Ignition	Air bag warning lamp ON	4 V
(LG)	Ground	Air bag signal	Input	switch ON	Air bag warning lamp OFF	0 V
10				Ignition	Security warning lamp ON	0 V
(P)	Ground	Security signal	Input	switch OFF	Security warning lamp OFF	12 V

INFOID:000000005809321

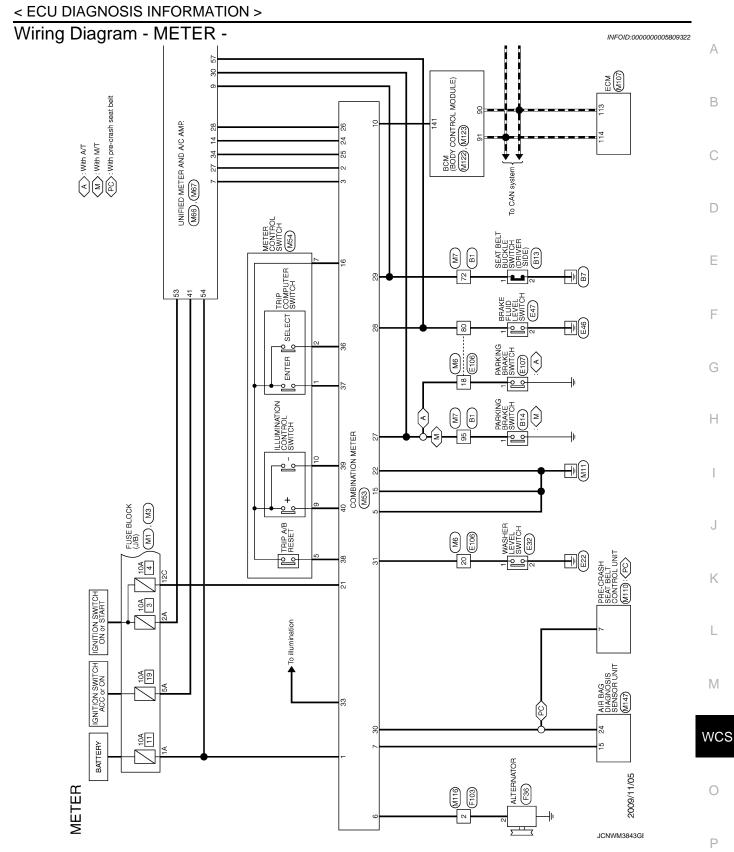
JSNIA0457ZZ

< ECU DIAGNOSIS INFORMATION >

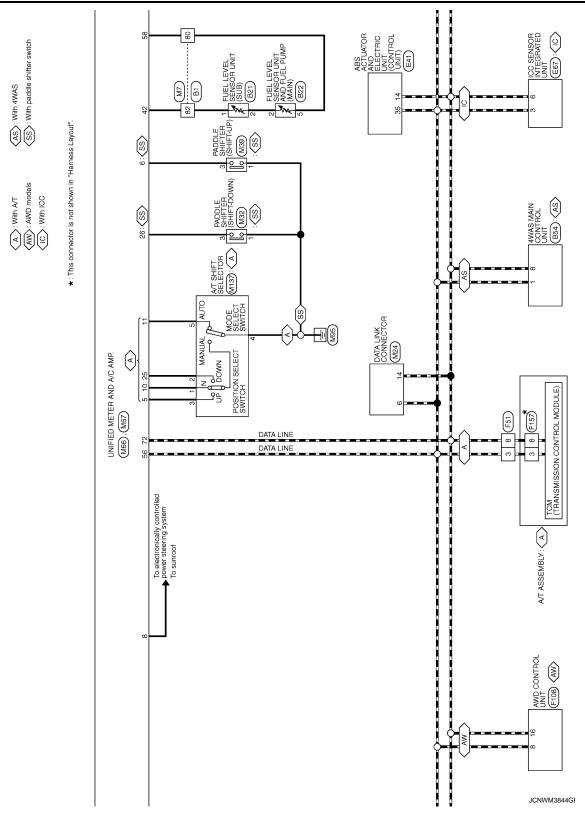
	nal No. e color)	Description			Condition	Value	А
+	-	Signal name	Input/ Output		Condition	(Approx.)	
15 (B)	Ground	Ground	_	Ignition switch ON	_	0 V	В
16 (W)	Ground	Meter control switch ground	_	Ignition switch ON	_	0 V	С
21 (GR)	Ground	Ignition signal	Input	Ignition switch ON	_	12 V	D
22 (B)	Ground	Ground	_	Ignition switch ON	_	0 V	Ε
24 (BR)	Ground	Communication signal (LCD \rightarrow AMP.)	Output	lgnition switch ON		(V) 15 10 5 0 ↓ ↓ ↓ ↓ ↓ ↓ ↓ ↓ ↓ ↓ ↓ ↓ ↓ ↓ ↓ ↓ ↓ ↓ ↓	F
25 (Y)	Ground	Communication signal (AMP.→ LCD)	Input	Ignition switch ON		(V) 6 2 0 → ₹200 µs JSNIA0027GB	H I J
26 (G)	Ground	Vehicle speed signal (8-pulse)	Input	Ignition switch ON	Speedometer operated [When vehicle speed is ap- prox. 40 km/h (25 MPH)]	NOTE: The maximum voltage varies depending on the specification (destination unit).	K L M
					Parking brake applied	0 V	WC
27 (BG)	Ground	Parking brake switch signal	Input	Ignition switch ON	Parking brake released	(V) 8 4 0 10 ms JSNIA0007GB	0 P

< ECU DIAGNOSIS INFORMATION >

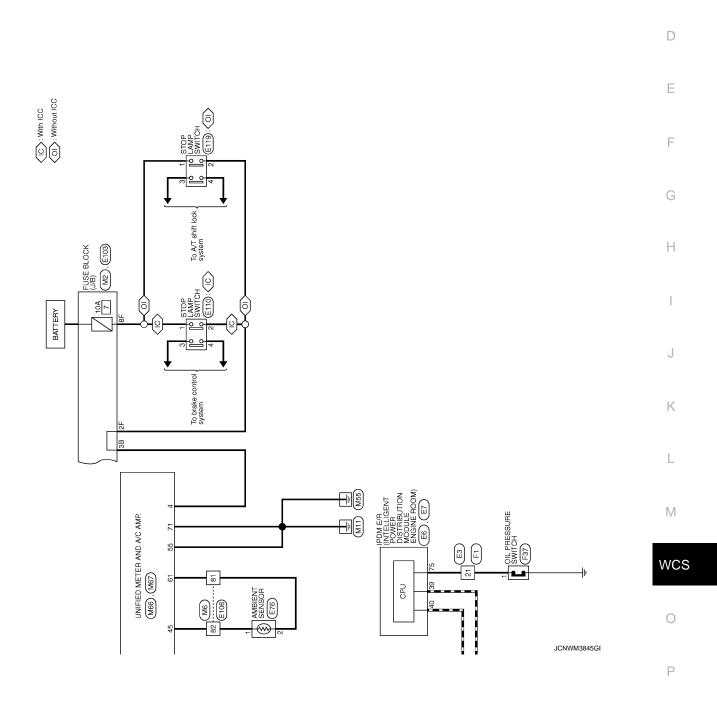
- Signal name Input/ Output Condition Value (Appreciation) + - Signal name Input/ Output Condition (Appreciation) 28 (L) Ground Brake fluid level switch sig- nal Input Ignition switch ON Brake fluid level is normal. (V) 10 0 28 (L) Ground Brake fluid level switch sig- nal (driver side) Input Ignition switch ON Brake fluid level is low- er than the low level 0 V 29 (LG) Ground Seat belt buckle switch sig- nal (driver side) Input Ignition switch ON When driver seat belt is fas- tened 12 V 0 V When driver seat belt is un- fastened 0 V 29 (LG) Ground Seat belt buckle switch sig- nal (driver side) Input Ignition switch ON Vhen driver seat belt is un- fastened 0 V	JSNIA0008GB V V
28 (L) Ground Brake fluid level switch signal Input Ignition switch ON Brake fluid level is normal. 10 0 10 0 10 0 10 0 10 0 10 0 10 0 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10 10	JSNIA0008GB V V
29 (LG) Ground Seat belt buckle switch signal (driver side) Input Ignition switch ON When driver seat belt is fastened 12 minut 0 V When driver seat belt is fastened 0 V 0 V When driver seat belt is fastened 12 minut 0 V When driver seat belt is fastened 0 V	V
29 (LG) Ground Seat belt buckle switch signal (driver side) Input Ignition switch ON tened 12 V When driver seat belt is unfastened 0 V • When getting in the passencer seat	
(LG) nal (driver side) ON When driver seat belt is unfastened 0 V • • • • • • • • • • • • • • • • • •	V
sender seat	
30 Ground Seat belt buckle switch sig- Ignition Seat belt buckle switch sig- Ignition Seat belt is fastened	V
(G) Ground nal (passenger side) Input Switch ON • When getting in the pas- senger seat • When getting in the pas- senger seat • When passenger seat • When passenger seat • When passenger seat • When passenger seat	V
31 (1) Ground Washer level switch signal Input Switch Washer level switch ON 0 V	J
(L) Ground Washer level switch signal input Switch ON Washer level switch OFF 5 V	J
33 (R) Ground Illumination control signal Output Ignition switch ON then independent of the illumination control signal Output ON Control switch.	level is midway
36 16 Select switch signal Input Input Switch When ● is pressed 0 V	J
ON Other than the above 5 V	/
37 16 (SB) (W) Enter switch signal Input Input Input When I is pressed 0 V Other then the shown 0 V	
	/
38 16 Trip A/B reset switch signal Input Ignition switch When trip A/B reset switch is pressed 0 V (L) (W) Trip A/B reset switch signal Input Ignition switch When trip A/B reset switch is pressed 0 V	
39 16 Illumination control switch signal (-) Input Ignition switch on the shore When I = switch is pressed 0 V	
Ignition When \mathcal{C}^+ switch is	
40 (BG) 16 (W) Illumination control switch signal (+) Input Ignition switch ON When 67 * switch is pressed 0 V 0 V ON ON ON 0 V	



< ECU DIAGNOSIS INFORMATION >



< ECU DIAGNOSIS INFORMATION >

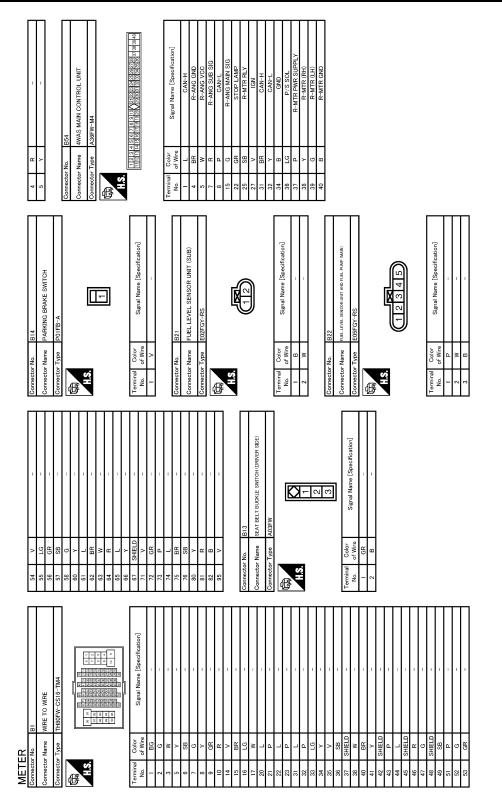


А

В

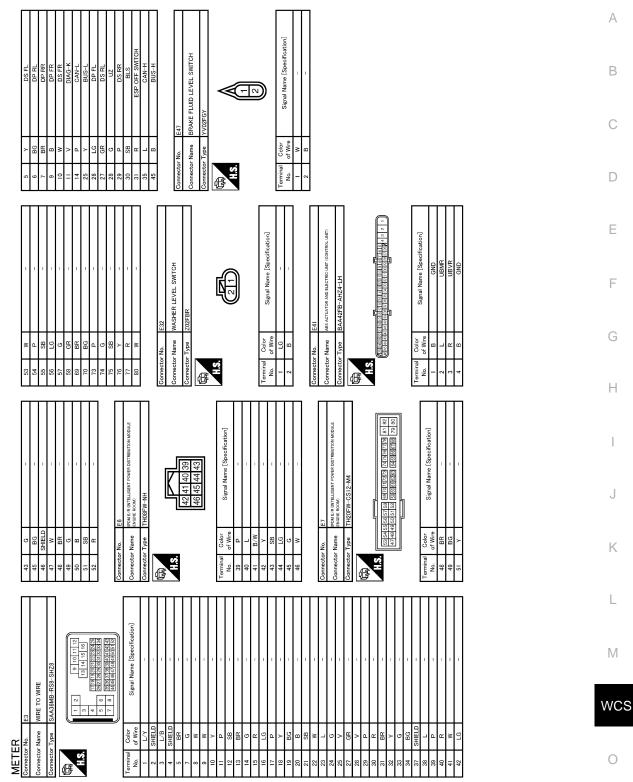
С

< ECU DIAGNOSIS INFORMATION >



JCNWM3846GE

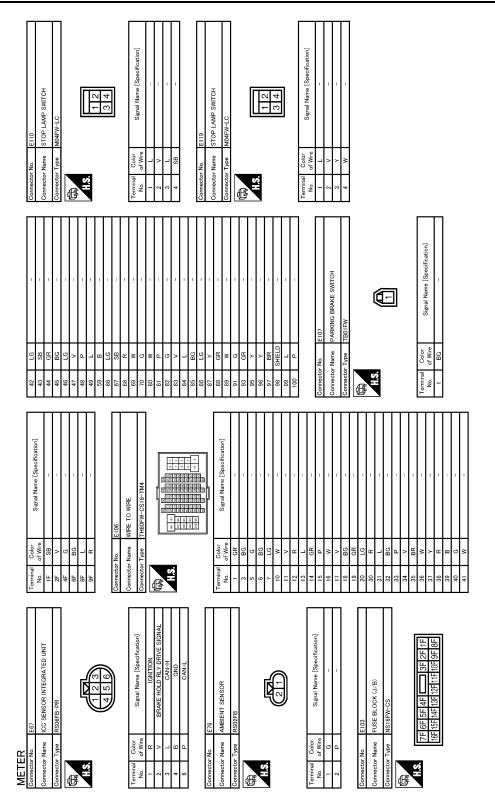
< ECU DIAGNOSIS INFORMATION >



JCNWM3847GI

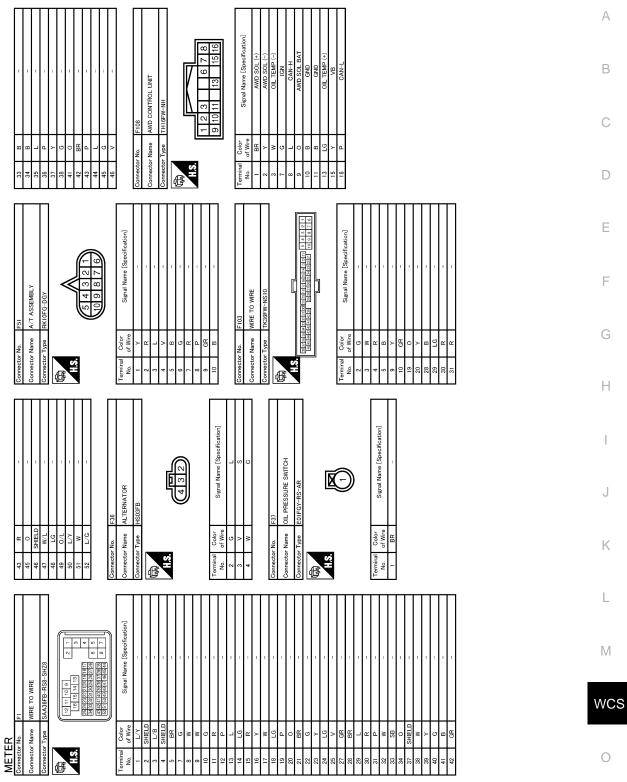
Ρ

< ECU DIAGNOSIS INFORMATION >



JCNWM3848GI

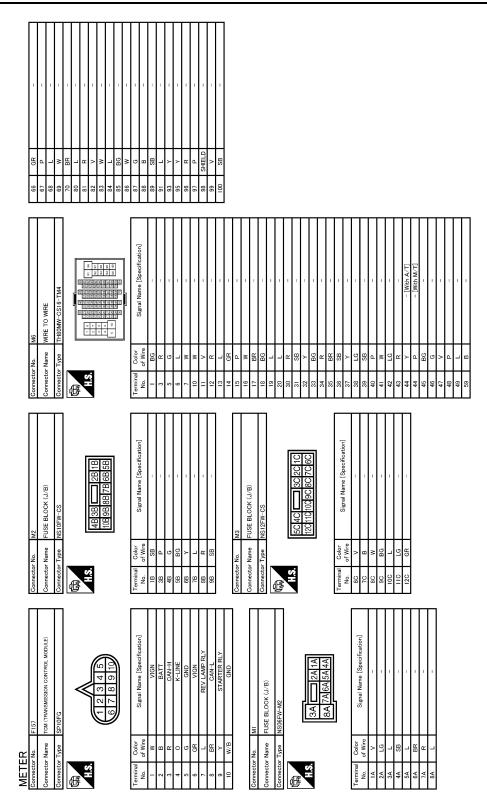
< ECU DIAGNOSIS INFORMATION >



JCNWM3849GI

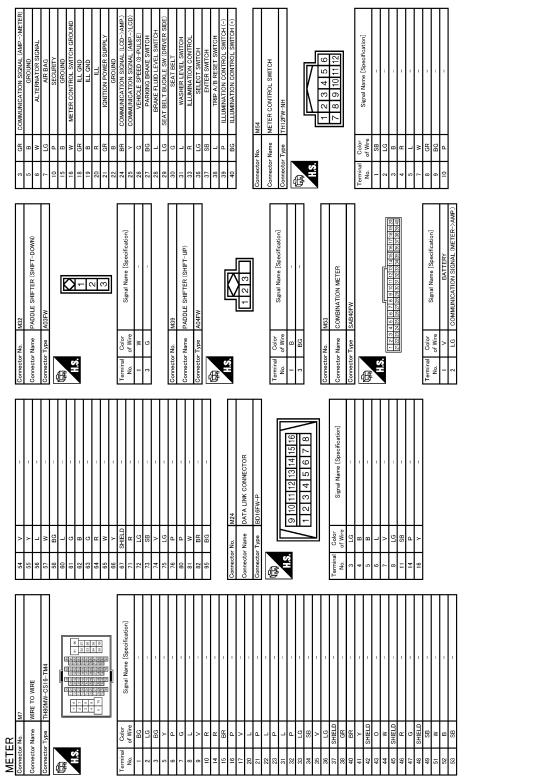
Ρ

< ECU DIAGNOSIS INFORMATION >



JCNWM3850GE

< ECU DIAGNOSIS INFORMATION >



JCNWM3851GI

Ο

А

В

С

D

Ε

F

G

Н

J

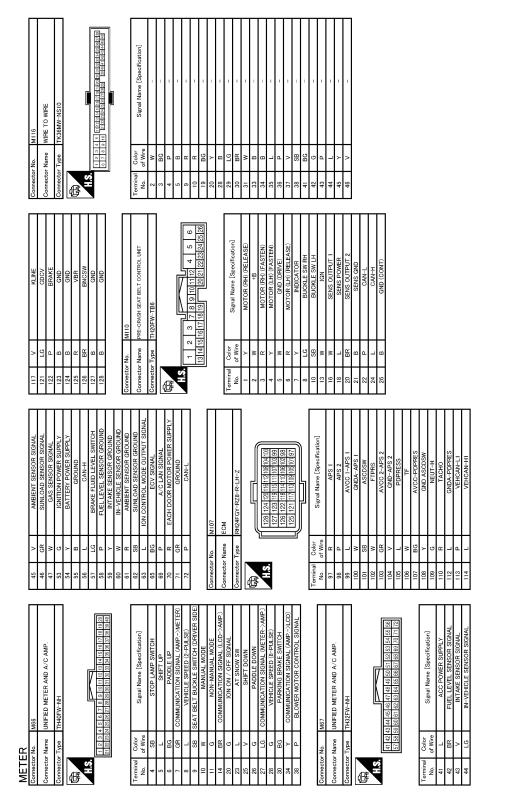
Κ

L

Μ

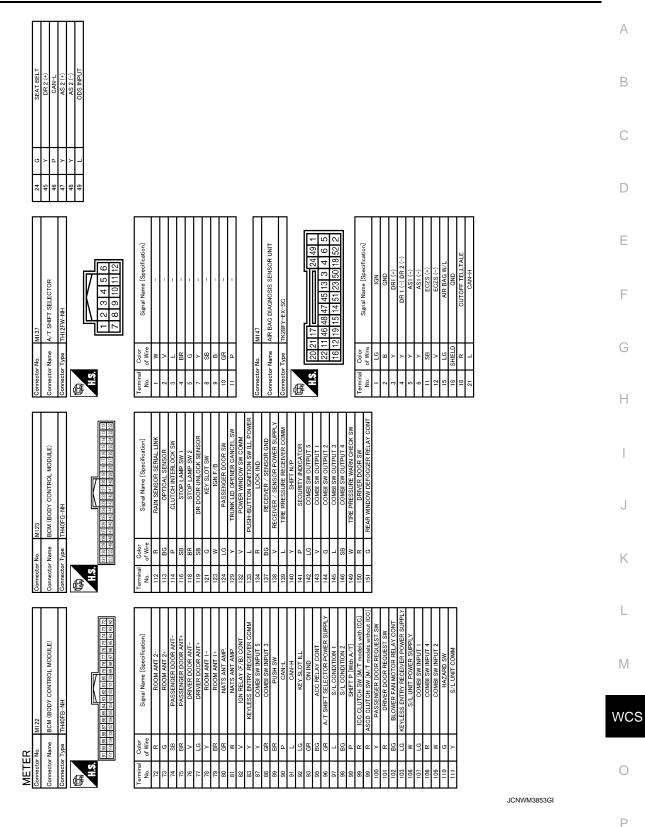
WCS

< ECU DIAGNOSIS INFORMATION >



JCNWM3852GE

< ECU DIAGNOSIS INFORMATION >



INFOID:000000005809323

Fail-safe

FAIL SAFE

Combination meter performs fail-safe operation when unified meter and A/C amp. communication is malfunction.

Solution for communication error between the unified meter and A/C amp. and combination meter.

Revision: 2009 November

WCS-45

< ECU DIAGNOSIS INFORMATION >

	Function	Specifications	
Speedometer			
Tachometer		 Reset to zero by suspending communication. 	
Fuel gauge		Reset to zero by suspending communication.	
Water temperature gauge			
Illumination control		When suspending communication, change to nighttime mode.	
Information display		The display turns off by suspending communication.	
Buzzer		The buzzer turns off by suspending communication.	
	ABS warning lamp		
	VDC OFF indicator lamp		
	SLIP indicator lamp		
	Brake warning lamp	 The lamp turns on by suspending communication. 	
	CRUISE warning lamp	—	
	Malfunction indicator lamp		
	High beam indicator		
	Turn signal indicator lamp		
Warning lamp/indicator	Oil pressure warning lamp		
lamp	A/T CHECK warning lamp		
	Low tire pressure warning lamp		
	Key warning lamp	The lamp turns off by suspending communication	
	AFS OFF indicator lamp	— The lamp turns off by suspending communication.	
	4WAS warning lamp		
	Master warning lamp		
	AWD warning lamp		
	Tail lamp indicator lamp		
	Front fog lamp indicator lamp		

DTC Index

Refer to WCS-65, "DTC Index".

Revision: 2009 November

INFOID:000000005809324

< ECU DIAGNOSIS INFORMATION >

UNIFIED METER AND A/C AMP.

Reference Value

VALUES ON THE DIAGNOSIS TOOL

CONSULT-III MONITOR ITEM

Monitor Item		Condition	Value/Status
SPEED METER [km/h]	Ignition switch ON	While driving	Equivalent to speedometer reading NOTE: 655.35 is displayed when the malfunc- tion signal is received
SPEED OUTPUT [km/h]	Ignition switch ON	While driving	Equivalent to speedometer reading NOTE: 655.35 is displayed when the malfunc- tion signal is received
ODO OUTPUT [km]	Ignition switch ON	_	Equivalent to odometer reading in combination meter
TACHO METER [rpm]	Ignition switch ON	While driving	Equivalent to tachometer reading NOTE: 8191.875 is displayed when the mal- function signal is received
FUEL METER [L]	Ignition switch ON	_	Values according to fuel level
W TEMP METER [°C]	Ignition switch ON	_	Values according to engine coolant temperature NOTE: 215 is displayed when the malfunction signal is input
ABS W/L	Ignition switch	ABS warning lamp ON	On
ADS W/L	ON	ABS warning lamp OFF	Off
VDC/TCS IND	Ignition switch	VDC OFF indicator lamp ON	On
	ON	VDC OFF indicator lamp OFF	Off
SLIP IND	Ignition switch	SLIP indicator lamp ON	On
	ON	SLIP indicator lamp OFF	Off
BRAKE W/L	Ignition switch	Blake warning lamp ON	On
	ON	Blake warning lamp OFF	Off
DOOR W/L	Ignition switch	Door warning displayed	On
	ON	Door warning not displayed	Off
TRUNK/GLAS-H	Ignition switch	Trunk warning displayed	On
	ON	Trunk warning not displayed	Off
HI-BEAM IND	Ignition switch	Hi-beam indicator lamp ON	On
	ON	Hi-beam indicator lamp OFF	Off
TURN IND	Ignition switch	Turn indicator lamp ON	On
	ON	Turn indicator lamp OFF	Off
FR FOG IND	Ignition switch	Front fog lamp indicator lamp ON	On
	ON	Front fog lamp indicator lamp OFF	Off
RR FOG IND	Ignition switch ON	NOTE: This item is displayed, but cannot be monitored.	Off
LIGHT IND	Ignition switch	Tail lamp indicator lamp ON	On
	ON	Tail lamp indicator lamp OFF	Off

А

В

INFOID:000000005809325

Monitor Item		Condition	Value/Status
OIL W/L	Ignition switch	Oil pressure warning lamp ON	On
	ON	Oil pressure warning lamp OFF	Off
MIL	Ignition switch	Malfunction warning lamp ON	On
	ON	Malfunction warning lamp OFF	Off
GLOW IND	Ignition switch ON	NOTE: This item is displayed, but cannot be monitored.	Off
C-ENG2 W/L	Ignition switch ON	NOTE: This item is displayed, but cannot be moni- tored.	Off
CRUISE IND	Ignition switch	Cruise indicator displayed	On
	ON	Cruise indicator not displayed	Off
SET IND	Ignition switch	Set indicator lamp ON	On
SETIND	ON	Set indicator lamp OFF	Off
CRUISE W/L	Ignition switch	Cruise warning lamp ON	On
GRUISE W/L	ON	Cruise warning lamp OFF	Off
BA W/L	Ignition switch ON	NOTE: This item is displayed, but cannot be moni- tored.	Off
ATC/T-AMT W/L	Ignition switch	A/T check warning lamp ON	On
ATC/T-AIVIT VV/L	ON	A/T check warning lamp OFF	Off
	Ignition switch	AWD warning lamp ON	On
4WD W/L	ŎN	AWD warning lamp OFF	Off
4WD LOCK IND	Ignition switch ON	NOTE: This item is displayed, but cannot be moni- tored.	Off
	Ignition switch	Low-fuel warning lamp displayed	On
FUEL W/L	ÖN	Low-fuel warning lamp not displayed	Off
	Ignition switch	Washer warning displayed	On
WASHER W/L	ŎN	Washer warning not displayed	Off
	Ignition switch	Low tire pressure lamp ON	On
AIR PRES W/L	ÖN	Low tire pressure lamp OFF	Off
	Ignition switch	Key warning lamp ON	On
KEY G/Y W/L	ÖN	Key warning lamp OFF	Off
	Ignition switch	AFS OFF indicator lamp ON	On
AFS OFF IND	ON	AFS OFF indicator lamp OFF	Off
	Ignition switch	4WAS warning lamp ON	On
4WAS/RAS W/L	ÖN	4WAS warning lamp OFF	Off
DDS W/L	Ignition switch ON	NOTE: This item is displayed, but cannot be moni- tored.	Off
LANE W/L	Ignition switch ON	NOTE: This item is displayed, but cannot be moni- tored.	Off
LDP IND	Ignition switch ON	NOTE: This item is displayed, but cannot be moni- tored.	Off

Monitor Item		Condition	Value/Status	Λ
	Ignition switch	Engine start information display (A/T model)	B&P I	- A
	ŎN	Engine start information display (M/T model)	C&P I	_
	Ignition switch	Engine start information display (A/T model)	B&P N	В
	ACC	Engine start information display (M/T model)	C&P N	
	Ignition switch LOCK	Key ID warning display	ID NG	С
	Ignition switch LOCK	Steering lock information display	ROTAT	_
LCD	Ignition switch LOCK	P position warning display	SFT P	D
	Ignition switch LOCK	Intelligent Key insert information display	INSRT	E
	Ignition switch LOCK	Intelligent Key low battery warning display	BATT	_
	Ignition switch ON	Take away warning display	NO KY	F
	Ignition switch LOCK	Key warning display	OUTKY	G
	Ignition switch ON	ICC sensor integrated unit warning display	LK WN	_
	Ignition switch	Vehicle ahead detection indicator displayed	On	Н
ACC TARGET	ON	Vehicle ahead detection indicator not dis- played	Off	
		When following distance set to "LONG"	LONG	
ACC DISTANCE	Ignition switch	When following distance set to "MIDDLE"	MID	_
ACC DISTANCE	ON	When following distance set to "SHORT"	SHORT	_
		Set distance indicator not displayed	Off	J
ACC OWN VHL	Ignition switch	Own vehicle indicator displayed	On	_
	ON	Own vehicle indicator not displayed	Off	K
ACC SET SPEED	Ignition switch ON	ICC set vehicle speed display	Vehicle speed	_
ACC UNIT	Ignition switch	Set vehicle speed indicator unit display ON	On	L
	ON	Set vehicle speed indicator unit display OFF	Off	_
O/D OFF SW	Ignition switch ON	NOTE: This item is displayed, but cannot be monitored.	Off	M
		Shift position indicator P display	Р	
		Shift position indicator R display	R	WC
		Shift position indicator N display	Ν	
		Shift position indicator D display	D	0
		Shift position indicator M1 display	M1	0
SHIFT IND	Ignition switch ON	Shift position indicator M2 display	M2	_
		Shift position indicator M3 display	M3	P
		Shift position indicator M4 display	M4	_
		Shift position indicator M5 display	M5	_
		Shift position indicator M6 display	M6	_
		Shift position indicator M7 display	M7	-

< ECU DIAGNOSIS INFORMATION >

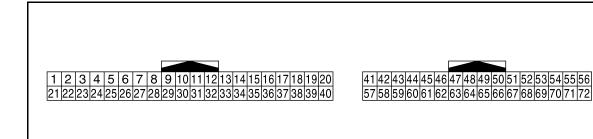
Monitor Item		Condition	Value/Status
	Ignition switch	Snow mode switch ON	On
AT S MODE SW	ON	Snow mode switch OFF	Off
AT P MODE SW	Ignition switch ON	NOTE: This item is displayed, but cannot be monitored.	Off
M RANGE SW	Ignition switch	Selector lever DS position	On
M RANGE SW	ŌN	Other than the above	Off
NM RANGE SW	Ignition switch	Selector lever DS position	Off
INIVI RAINGE SW	ŌN	Other than the above	On
	Ignition switch	Selector lever up position	On
AT SFT UP SW	ON	Other than the above	Off
	Ignition switch	Selector lever – position	On
AT SFT DWN SW	ON	Other than the above	Off
	Ignition switch	Paddle shifter up operation	On
ST SFT UP SW	ŎN	Other than the above	Off
	Ignition switch	Paddle shifter down operation	On
ST SFT DWN SW	ŎN	Other than the above	Off
	Ignition switch	A/C compressor activation condition	On
COMP F/B SIG	ON	A/C compressor deactivation condition	Off
4WD LOCK SW	Ignition switch ON	NOTE: This item is displayed, but cannot be moni- tored.	Off
	Ignition switch	Parking brake applied	On
PKB SW	ON	Parking brake released	Off
	Ignition switch	Seat belt (driver side) unfastened	On
BUCKLE SW	ON	Seat belt (driver side) fastened	Off
	Ignition switch	Brake fluid level is lower than the low level	On
BRAKE OIL SW	ON	Brake fluid level is normal	Off
DISTANCE [km]	Ignition switch ON	_	Possible driving distance calculated by unified meter and A/C amp.
OUTSIDE TEMP [°C] or [°F]	Ignition switch ON	_	Equivalent to ambient temperature NOTE: This may not match the indicated val- ue on the information display.
	Ignition switch	Low-fuel warning signal output	On
FUEL LOW SIG	ON	Low-fuel warning signal not output	Off
	Ignition switch	Buzzer ON	On
BUZZER	ON	Buzzer OFF	Off

NOTE:

Some items are not available according to vehicle specification.

TERMINAL LAYOUT

< ECU DIAGNOSIS INFORMATION >



PHYSICAL VALUES

	nal No. color)	Description			Condition	Value	
+	_	Signal name	Input/ Output		Condition	(Approx.)	
4	Oracial	Oten lann switch simpl	la avat	Ignition	Brake pedal is depressed	12 V	
(SB)	Ground	Stop lamp switch signal	Input	switch OFF	Other than the above	0 V	
5	Oraciand	Manual mode shift up sig-	la a st	Ignition	Selector lever up position	0 V	
(L)	Ground	nal	Input	switch ON	Other than the above	12 V	
6	Oraciand	Daddla akittanın sinnal	la a cat	Ignition	Paddle shifter up operation	0 V	
(BG)	Ground	Paddle shifter up signal	Input	switch ON	Other than the above	12 V	
7 (GR)	Ground	Communication signal (AMP. \rightarrow METER)	Output	Ignition switch ON		(V) 6 4 2 0 • • 1 ms SKIA3362E	
8 (L)	Ground	Vehicle speed signal output (2-pulse)	Output	Ignition switch ON	Speedometer operated [When vehicle speed is ap- prox. 40 km/h (25 MPH)]	NOTE: The maximum voltage varies depending on the specification (destination unit).	V
9 (SB)	Ground	Seat belt buckle switch sig- nal (driver side)	Input	Ignition switch ON	When seat belt (driver side) is fastened When seat belt (driver side) is unfastened	12 V 0 V	
				Ignition	Selector lever DS position	0 V	
10 (W)	Ground	Manual mode signal	Input	switch	Other than the above	12 V	
				Ignition	Selector lever DS position	12 V	
11 (G)	Ground	Not manual mode signal	Input	switch	Other than the above	0 V	

А

В

D

JSNIA0097ZZ

	nal No. e color)	Description			Condition	Value
+	-	Signal name	Input/ Output		Condition	(Approx.)
14 (BR)	Ground	Communication signal (LCD \rightarrow AMP.)	Input	Ignition switch ON		(V) 15 10 50 ▲ 400 µs JSNIA0028GB
23 (L)	Ground	A/T snow switch signal	Input	Ignition switch ON	Snow mode switch ON Snow mode switch OFF	12 V 0 V
25 (V)	Ground	Manual mode shift down signal	Input	Ignition switch ON	Selector lever down posi- tion Other than the above	0 V 12 V
26 (G)	Ground	Paddle shift down signal	Input	Ignition switch	Paddle shifter down opera- tion	0 V
				ON	Other than the above	12 V
27 (LG)	Ground	Communication signal (METER → AMP.)	Input	Ignition switch ON		(V) 4 2 0 • • 1 ms SKIA3361E
28 (G)	Ground	Vehicle speed signal output (8-pulse)	Output	Ignition switch ON	Speedometer operated [When vehicle speed is ap- prox. 40 km/h (25 MPH)]	NOTE: The maximum voltage varies de- pending on the specification (destination unit). 0 0 0 20 ms JSNIA0012GB
					Parking brake applied	0 V
30 (BG)	Ground	Parking brake switch signal	Input	Ignition switch ON	Parking brake released	(V) 8 4 0 10 ms JSNIA0007GB
34 (Y)	Ground	Communication signal (AMP. → LCD)	Output	lgnition switch ON		(V) 6 4 2 0 ▲ 200 μs JSNIA0027GB

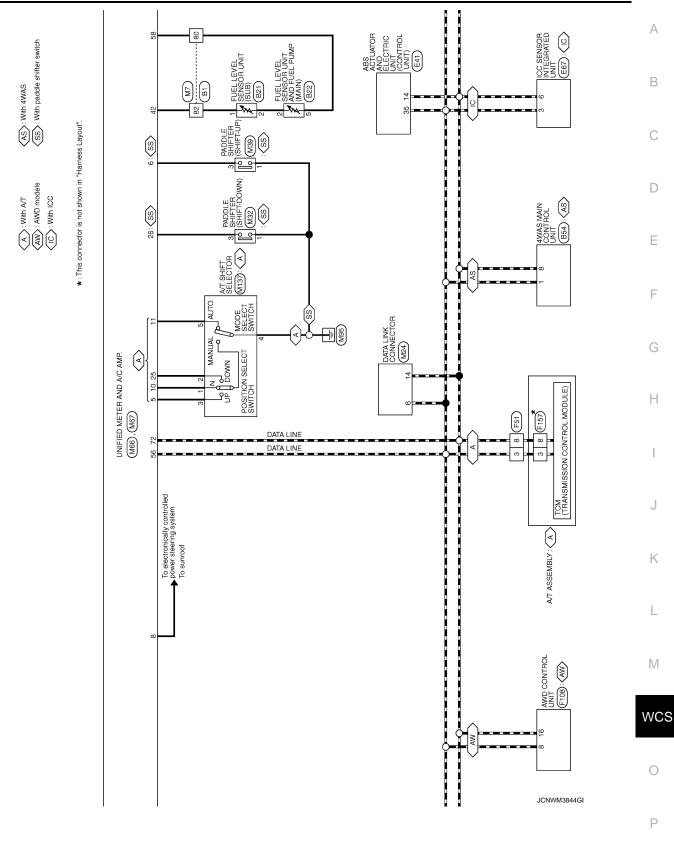
	nal No. e color)	Description			O a a dition	Value	А
+	_	Signal name	Input/ Output	•	Condition	(Approx.)	
41 (L)	Ground	ACC power supply	Input	Ignition switch ACC	_	Battery voltage	В
42 (BR)	Ground	Fuel level sensor signal	Input	Ignition switch ON	_	(V) 4 3 2 1 0 E 1/4 1/2 3/4 F JSNIA0013GB	C D E
45 (V)	Ground	Ambient sensor signal	Input	_		(V) 3 4 1 0 (14) (32) (50) (68) (68) (104) [(F]] JSNIA0014GB	F
53 (G)	Ground	Ignition signal	Input	Ignition switch ON	_	Battery voltage	Η
54 (Y)	Ground	Battery power supply	Input	Ignition switch OFF	_	Battery voltage	I
55 (B)	Ground	Ground	_	Ignition switch ON	_	0 V	J
56 (L)	Ground	CAN-H	_	_	_	_	LZ.
57 (LG)	Ground	Brake fluid level switch sig- nal	Input	Ignition switch ON	Brake fluid level is normal.	(V) 10 0 10 ms JSNIA0008GB	K L M
					The brake fluid level is low- er than the low level	0 V	WC
58 (P)	Ground	Fuel level sensor signal ground	_	Ignition switch ON	_	0 V	
61 (R)	Ground	Ambient sensor signal ground	_	Ignition switch ON	_	0 V	0
71 (GR)	Ground	Ground	_	Ignition switch ON	_	0 V	Ρ
72 (P)	Ground	CAN-L	_	_	_	_	

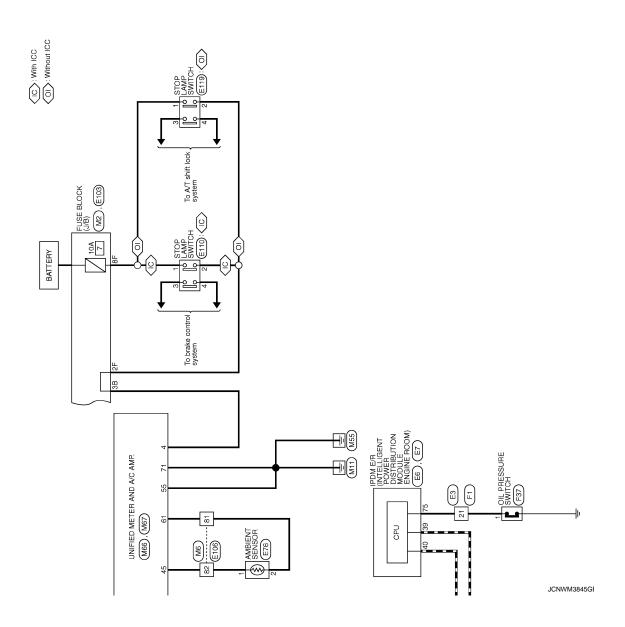
UNIFIED METER AND A/C AMP. < ECU DIAGNOSIS INFORMATION > Wiring Diagram - METER -INFOID:000000005809326 8 ECM M107 BCM (BODY CONTROL MODULE) (M122), (M123) ę 8 UNIFIED METER AND A/C AMP. (M66), (M67) 0 83 14 6 44 24 34 25 27 To CAN system. METER CONTROL SWITCH M54 SEAT BELT BUCKLE SWITCH (DRIVER SIDE) B13 LM TRIP COMPUTER SWITCH 72 29 53 41 54 BRAKE IEVEL SWITCH E47 SELECT 80 -2 PARKING BRAKE SWITCH SWITCH enter 🛛 M6 ω -lı ല് PARKING BRAKE SWITCH B14 ILLUMINATION CONTROL SWITCH LW [◄] COMBINATION METER (M53) 95 00 ഘ + FUSE BLOCK (J/B) M1 , M3 ൎ TRIP A/B RESET 1 WASHER LEVEL SWITCH 2 E32 20 E100 M6 PRE-CRASH SEAT BELT CONTROL UNIT (M110): CPC 6 40 4 $\overline{}$ IGNITION SWITCH ON or START 10A $\overline{\ }$ To illumination IGNITION SWITCH ACC or ON AIR BAG DIAGNOSIS SENSOR UNIT (M147) 10A $\overline{}$ ပြ 24 10A 11 BATTERY ъ ALTERNATOR (F36) 2009/11/05 METER E103

Revision: 2009 November

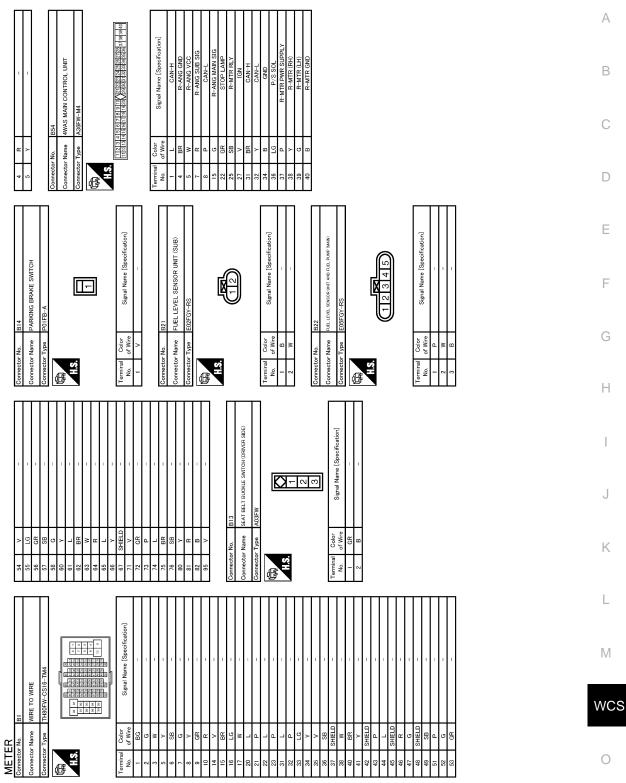
JCNWM3843GI

 Σ^{\perp}





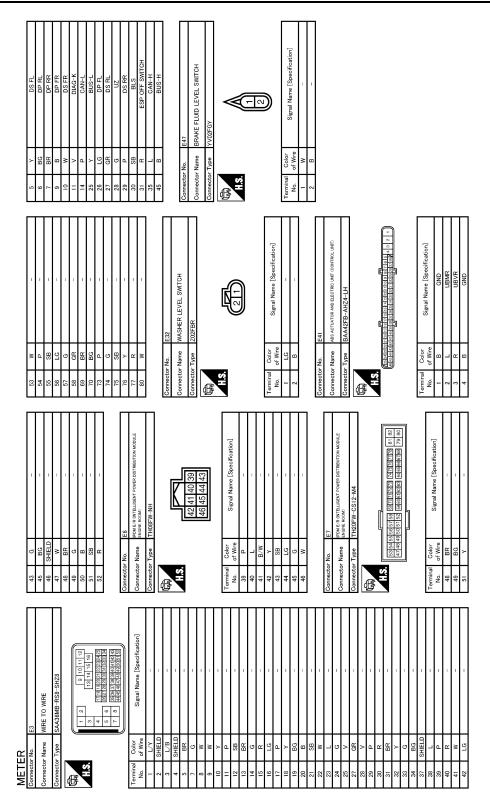
< ECU DIAGNOSIS INFORMATION >



JCNWM3846GI

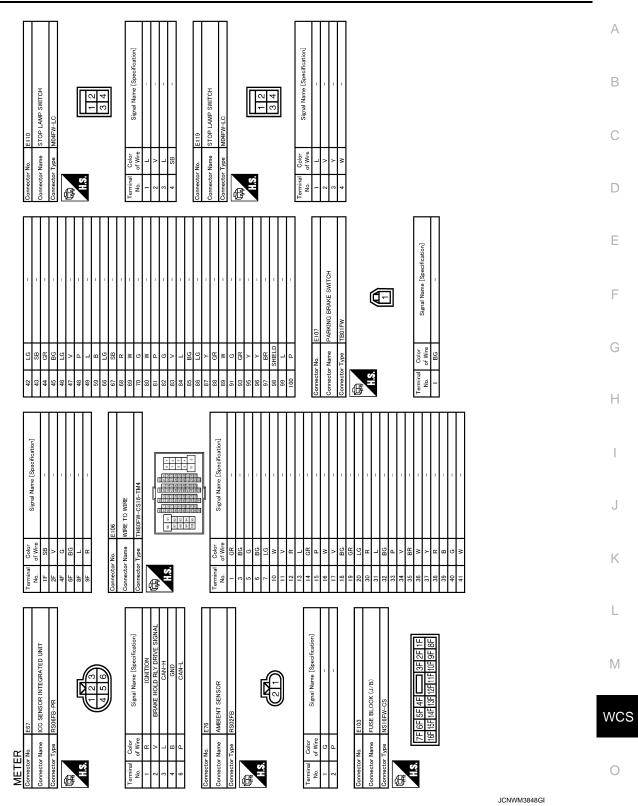
Ρ

< ECU DIAGNOSIS INFORMATION >



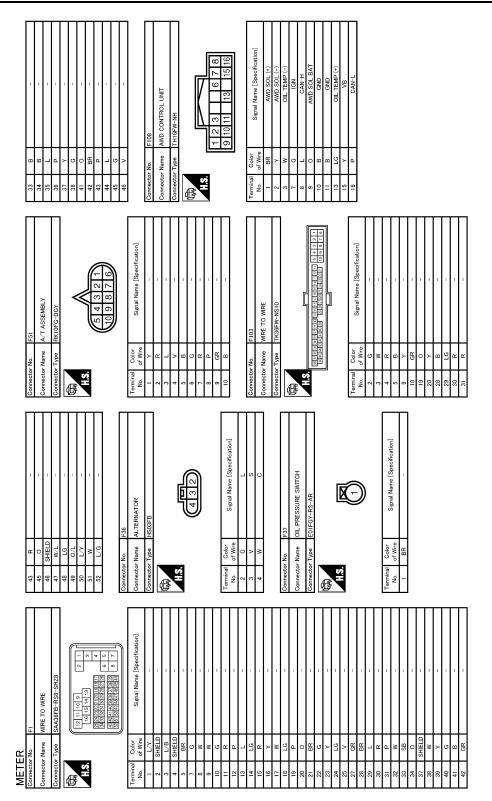
JCNWM3847G

< ECU DIAGNOSIS INFORMATION >



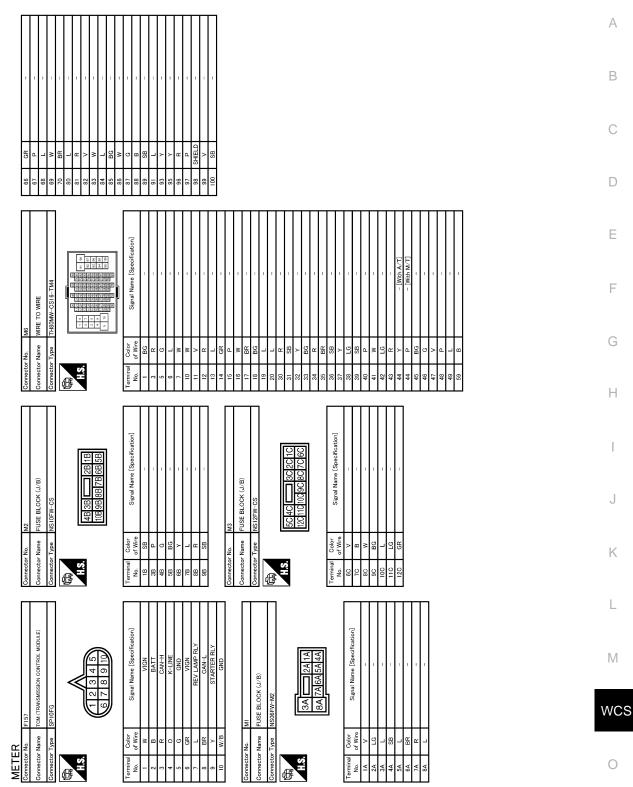
Ρ

< ECU DIAGNOSIS INFORMATION >



JCNWM3849G

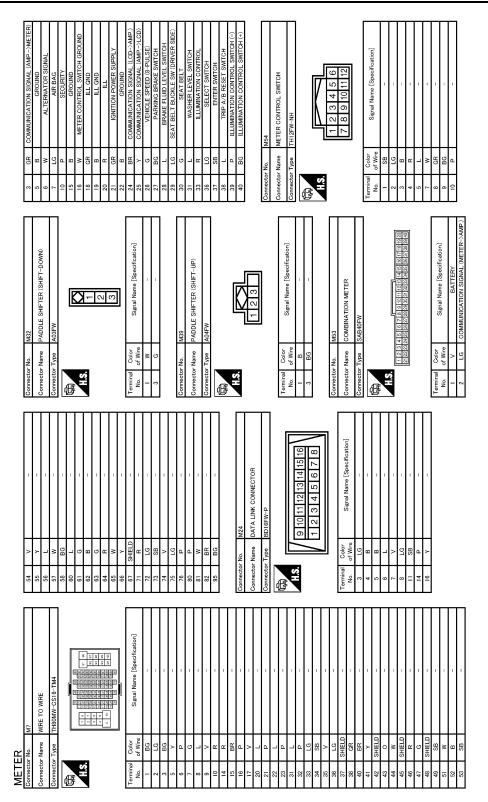
< ECU DIAGNOSIS INFORMATION >



JCNWM3850GE

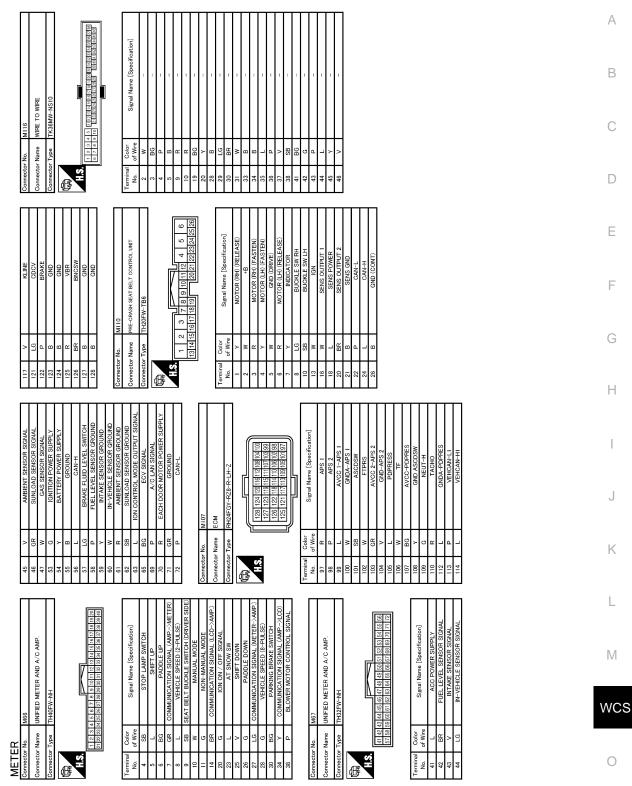
Ρ

< ECU DIAGNOSIS INFORMATION >



JCNWM3851GE

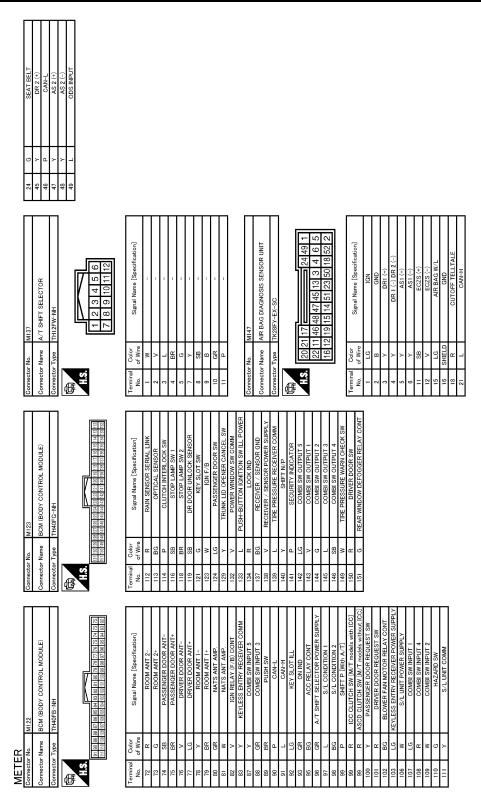
< ECU DIAGNOSIS INFORMATION >



JCNWM3852GI

Ρ

< ECU DIAGNOSIS INFORMATION >



JCNWM3853GI

Fail-safe

INFOID:000000005809327

FAIL SAFE

The unified meter and A/C amp. activates the fail-safe control if CAN communication with each unit is malfunctioning.

< ECU DIAGNOSIS INFORMATION >

	Function	Specifications	
Speedometer		Depart to more by over an ding communication	
Tachometer		 Reset to zero by suspending communication. 	
Fuel gauge		Indicates fuel level	
Water temperature gauge		Reset to zero by suspending communication.	
Illumination control		When suspending communication, change to nighttime mode	
Information display		The display turns off by suspending communication.	
Buzzer		The buzzer turns off by suspending communication.	
	ABS warning lamp		
	VDC OFF indicator lamp	The lamp turns on by suspending communication.	
	SLIP indicator lamp		
	Brake warning lamp		
	AWD warning lamp		
	4WAS warning lamp		
	CRUISE warning lamp		
	Malfunction indicator lamp		
Warning lamp/indicator	Low tire pressure warning lamp		
lamp	AFS OFF indicator lamp	The lamp blinking caused by communication malfunction	
	High beam indicator		
	Turn signal indicator lamp		
	Oil pressure warning lamp		
	A/T CHECK warning lamp	The lamp turns off by suspending communication.	
	Key warning lamp		
	Master warning lamp		
	Tail lamp indicator lamp		
	Front fog lamp indicator lamp		

DTC Index

INFOID:000000005809328

Display contents of CONSULT-III	Ti	me	Diagnostic item is detected when	Refer to	
U1000: CAN COMM CIRCUIT	CRNT	PAST	When unified meter and A/C amp. is not transmitting or receiving CAN communication signal for 2 seconds or more.	<u>MWI-41</u>	M
U1010: CONTROL UNIT (CAN)	CRNT	PAST	When detecting error during the initial diagnosis of CAN control- ler of unified meter and A/C amp.	<u>MWI-42</u>	111
B2201: COMM ERROR 1	CRNT	PAST	If a communication error is present in the communication line between unified meter and A/C amp. and combination meter for 2 seconds or more.	<u>MWI-43</u>	WCS
B2202: COMM ERROR 2	CRNT	PAST	If a communication error is present in the communication line between unified meter and A/C amp. and combination meter for 2 seconds or more.	<u>MWI-45</u>	0
B2205: VEHICLE SPEED	CRNT	PAST	The abnormal vehicle speed signal is input from ABS actuator and electric unit (control unit) for 2 seconds or more.	<u>MWI-47</u>	Р
B2267: ENGINE SPEED	CRNT	PAST	If ECM continuously transmits abnormal engine speed signals for 2 seconds or more.	<u>MWI-48</u>	_
B2268: WATER TEMP	CRNT	PAST	If ECM continuously transmits abnormal engine coolant temper- ature signals for 60 seconds or more.	<u>MWI-49</u>	_

NOTE:

The details of TIME display are as follows.

- CRNT: The malfunctions that are detected now.
- PAST: The malfunctions was detected in the past. IGN counter is displayed on FFD (Freeze Frame data).
- 1 39: The number is indicated when it is normal at present and a malfunction was detected in the past. It increases like $0 \rightarrow 1 \rightarrow 2 \cdots 38 \rightarrow 39$ after returning to the normal condition whenever IGN OFF \rightarrow ON. It is fixed to 39 until the self-diagnosis results are erased if it is over 39. It returns to 0 when a malfunction is detected again in the process.

< ECU DIAGNOSIS INFORMATION >

BCM (BODY CONTROL MODULE)

Reference Value

VALUES ON THE DIAGNOSIS TOOL

CONSULT-III MONITOR ITEM

Monitor Item	Condition	Value/Status	
FR WIPER HI	Other than front wiper switch HI	Off	(
	Front wiper switch HI	On	
FR WIPER LOW	Other than front wiper switch LO	Off	[
	Front wiper switch LO	On	
FR WASHER SW	Front washer switch OFF	Off	
TR WASHER SW	Front washer switch ON	On	E
FR WIPER INT	Other than front wiper switch INT/AUTO	Off	
	Front wiper switch INT/AUTO	On	
FR WIPER STOP	Front wiper is not in STOP position	Off	
FR WIPER STOP	Front wiper is in STOP position	On	
INT VOLUME	Wiper volume dial is in a dial position 1 - 7	Wiper volume dial posi- tion	(
	Other than turn signal switch RH	Off	
TURN SIGNAL R	Turn signal switch RH	On	
	Other than turn signal switch LH	Off	
TURN SIGNAL L	Turn signal switch LH	On	
	Other than lighting switch 1ST and 2ND	Off	
TAIL LAMP SW	Lighting switch 1ST or 2ND	On	
	Other than lighting switch HI	Off	
HI BEAM SW	Lighting switch HI	On	
	Other than lighting switch 2ND	Off	
HEAD LAMP SW 1	Lighting switch 2ND	On	
	Other than lighting switch 2ND	Off	
HEAD LAMP SW 2	Lighting switch 2ND	On	
	Other than lighting switch PASS	Off	
PASSING SW	Lighting switch PASS	On	
	Other than lighting switch AUTO	Off	
AUTO LIGHT SW	Lighting switch AUTO	On	
	Front fog lamp switch OFF	Off	V
FR FOG SW	Front fog lamp switch ON	On	
RR FOG SW	NOTE: The item is indicated, but not monitored.	Off	
	Driver door closed	Off	
DOOR SW-DR	Driver door opened	On	
	Passenger door closed	Off	
DOOR SW-AS	Passenger door opened	On	
DOOR SW-RR	NOTE: The item is indicated, but not monitored.	Off	
DOOR SW-RL	NOTE: The item is indicated, but not monitored.	Off	

А

В

INFOID:000000005890545

< ECU DIAGNOSIS INFORMATION >

Monitor Item	Condition	Value/Status
DOOR SW-BK	NOTE: The item is indicated, but not monitored.	Off
	Other than power door lock switch LOCK	Off
CDL LOCK SW	Power door lock switch LOCK	On
	Other than power door lock switch UNLOCK	Off
CDL UNLOCK SW	Power door lock switch UNLOCK	On
	Other than driver door key cylinder LOCK position	Off
KEY CYL LK-SW	Driver door key cylinder LOCK position	On
	Other than driver door key cylinder UNLOCK position	Off
KEY CYL UN-SW	Driver door key cylinder UNLOCK position	On
KEY CYL SW-TR	NOTE: The item is indicated, but not monitored.	Off
	Hazard switch is OFF	Off
IAZARD SW	Hazard switch is ON	On
REAR DEF SW	NOTE: The item is indicated, but not monitored.	Off
H/L WASH SW	NOTE: The item is indicated, but not monitored.	Off
FR CANCEL SW	Trunk lid opener cancel switch OFF	Off
IR CANCEL SW	Trunk lid opener cancel switch ON	On
R/BD OPEN SW	Trunk lid opener switch OFF	Off
R/BD OPEN 3W	While the trunk lid opener switch is turned ON	On
RNK/HAT MNTR	Trunk lid closed	Off
	Trunk lid opened	On
RKE-LOCK	LOCK button of the Intelligent Key is not pressed	Off
	LOCK button of the Intelligent Key is pressed	On
	UNLOCK button of the Intelligent Key is not pressed	Off
	UNLOCK button of the Intelligent Key is pressed	On
RKE-TR/BD	TRUNK OPEN button of the Intelligent Key is not pressed	Off
	TRUNK OPEN button of the Intelligent Key is pressed	On
KE-PANIC	PANIC button of the Intelligent Key is not pressed	Off
	PANIC button of the Intelligent Key is pressed	On
KE-P/W OPEN	UNLOCK button of the Intelligent Key is not pressed	Off
KE-P/W OPEN	UNLOCK button of the Intelligent Key is pressed and held	On
RKE-MODE CHG	LOCK/UNLOCK button of the Intelligent Key is not pressed and held simulta- neously	Off
	LOCK/UNLOCK button of the Intelligent Key is pressed and held simultaneously	On
OPTICAL SENSOR	Bright outside of the vehicle	Close to 5 V
OF NUAL JENJUK	Dark outside of the vehicle	Close to 0 V
REQ SW -DR	Driver door request switch is not pressed	Off
	Driver door request switch is pressed	On
REQ SW -AS	Passenger door request switch is not pressed	Off
	Passenger door request switch is pressed	On
REQ SW -RR	NOTE: The item is indicated, but not monitored.	Off
REQ SW -RL	NOTE: The item is indicated, but not monitored.	Off

Revision: 2009 November

Monitor Item	Condition	Value/Status	
	Trunk lid opener request switch is not pressed	Off	— A
REQ SW -BD/TR	Trunk lid opener request switch is pressed	On	
PUSH SW	Push-button ignition switch (push switch) is not pressed	Off	В
	Push-button ignition switch (push switch) is pressed	On	
IGN RLY2 -F/B	Ignition switch in OFF or ACC position	Off	
	Ignition switch in ON position	On	С
ACC RLY -F/B	NOTE: The item is indicated, but not monitored.	Off	
CLUCH SW	The clutch pedal is not depressed	Off	D
	The clutch pedal is depressed	On	
	The brake pedal is depressed when No. 7 fuse is blown	Off	E
BRAKE SW 1	The brake pedal is not depressed when No. 7 fuse is blown, or No. 7 fuse is nor- mal	On	
BRAKE SW 2	The brake pedal is not depressed	Off	F
	The brake pedal is depressed	On	
DETE/CANCL SW	Selector lever in P position (Except M/T models) The clutch pedal is depressed (M/T models)	Off	G
	 Selector lever in any position other than P (Except M/T models) The clutch pedal is not depressed (M/T models) 	On	
SFT PN/N SW	Selector lever in any position other than P and N	Off	Н
SFT FIN/IN SW	Selector lever in P or N position	On	
S/L -LOCK	Steering is unlocked	Off	_
	Steering is locked	On	
	Steering is locked	Off	
S/L -UNLOCK	Steering is unlocked	On	J
S/L RELAY-F/B	Ignition switch in OFF or ACC position	Off	
	Ignition switch in ON position	On	LZ.
UNLK SEN -DR	Driver door is unlocked	Off	— K
	Driver door is locked	On	
	Push-button ignition switch (push-switch) is not pressed	Off	L
PUSH SW -IPDM	Push-button ignition switch (push-switch) is pressed	On	
	Ignition switch in OFF or ACC position	Off	
IGN RLY1 -F/B	Ignition switch in ON position	On	M
	Selector lever in any position other than P	Off	_
DETE SW -IPDM	Selector lever in P position	On	WC
SFT PN -IPDM	Selector lever in any position other than P and N (Except M/T models) The clutch pedal is not depressed (M/T models)	Off	
	Selector lever in P or N position The clutch pedal is depressed	On	0
SFT P -MET	Selector lever in any position other than P	Off	-
יייי∪, ייי∟	Selector lever in P position	On	Р
SFT N -MET	Selector lever in any position other than N	Off	-
	Selector lever in N position	On	

< ECU DIAGNOSIS INFORMATION >

Monitor Item	Condition	Value/Status	
ENGINE STATE	Engine stopped	Stop	
	While the engine stalls	Stall	
	At engine cranking	Crank	
	Engine running	Run	
S/L LOCK-IPDM	Steering is unlocked	Off	
	Steering is locked	On	
S/L UNLK-IPDM	Steering is locked	Off	
	Steering is unlocked	On	
S/L RELAY-REQ	Steering lock system is not the LOCK condition and the changing condition from LOCK to UNLOCK	Off	
	Steering lock system are not the LOCK condition or the changing condition from LOCK to UNLOCK	On	
VEH SPEED 1	While driving	Equivalent to speed- ometer reading	
VEH SPEED 2	While driving	Equivalent to speed- ometer reading	
	Driver door is locked	LOCK	
DOOR STAT-DR	Wait with selective UNLOCK operation (60 seconds)	READY	
	Driver door is unlocked	UNLOCK	
	Passenger door is locked	LOCK	
DOOR STAT-AS	Wait with selective UNLOCK operation (60 seconds)	READY	
	Passenger door is unlocked	UNLOCK	
	Steering is locked	Reset	
ID OK FLAG	Steering is unlocked	Set	
PRMT ENG STRT	The engine start is prohibited	Reset	
	The engine start is permitted	Set	
PRMT RKE STRT	NOTE: The item is indicated, but not monitored.	Reset	
KEY SW -SLOT	The Intelligent Key is not inserted into key slot	Off	
RET 3W -3LOT	The Intelligent Key is inserted into key slot	On	
RKE OPE COUN1	During the operation of the Intelligent Key	Operation frequency o the Intelligent Key	
RKE OPE COUN2	NOTE: The item is indicated, but not monitored.	_	
	The key ID that the key slot receives is not recognized by any key ID registered to BCM.	Yet	
CONFRM ID ALL	The key ID that the key slot receives is recognized by any key ID registered to BCM.	Done	
CONFIRM ID4	The key ID that the key slot receives is not recognized by the fourth key ID registered to BCM.	Yet	
	The key ID that the key slot receives is recognized by the fourth key ID registered to BCM.	Done	
CONFIRM ID3	The key ID that the key slot receives is not recognized by the third key ID registered to BCM.	Yet	
	The key ID that the key slot receives is recognized by the third key ID registered to BCM.	Done	

Revision: 2009 November

< ECU DIAGNOSIS INFORMATION >

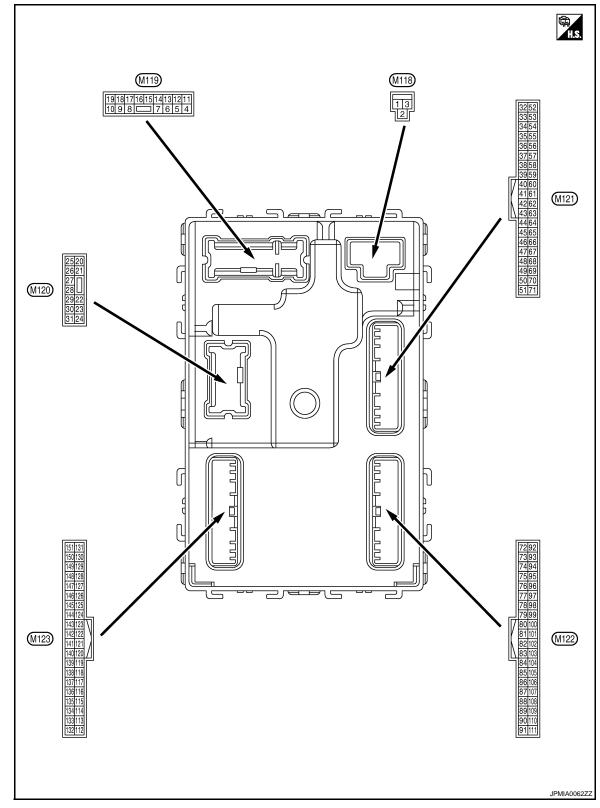
Monitor Item	Condition	Value/Status
CONFIRM ID2	The key ID that the key slot receives is not recognized by the second key ID reg- istered to BCM.	Yet
	The key ID that the key slot receives is recognized by the second key ID regis- tered to BCM.	Done
CONFIRM ID1	The key ID that the key slot receives is not recognized by the first key ID regis- tered to BCM.	Yet
	The key ID that the key slot receives is recognized by the first key ID registered to BCM.	Done
TP 4	The ID of fourth Intelligent Key is not registered to BCM	Yet
	The ID of fourth Intelligent Key is registered to BCM	Done
	The ID of third Intelligent Key is not registered to BCM	Yet
TP 3	The ID of third Intelligent Key is registered to BCM	Done
TP 2	The ID of second Intelligent Key is not registered to BCM	Yet
	The ID of second Intelligent Key is registered to BCM	Done
TP 1	The ID of first Intelligent Key is not registered to BCM	Yet
	The ID of first Intelligent Key is registered to BCM	Done
AIR PRESS FL	Ignition switch ON (Only when the signal from the transmitter is received)	Air pressure of front LH tire
AIR PRESS FR	Ignition switch ON (Only when the signal from the transmitter is received)	Air pressure of front RH tire
AIR PRESS RR	Ignition switch ON (Only when the signal from the transmitter is received)	Air pressure of rear RH tire
AIR PRESS RL	Ignition switch ON (Only when the signal from the transmitter is received)	Air pressure of rear LH tire
ID REGST FL1	ID of front LH tire transmitter is registered	Done
	ID of front LH tire transmitter is not registered	Yet
ID REGST FR1	ID of front RH tire transmitter is registered	Done
	ID of front RH tire transmitter is not registered	Yet
	ID of rear RH tire transmitter is registered	Done
D REGST RR1	ID of rear RH tire transmitter is not registered	Yet
	ID of rear LH tire transmitter is registered	Done
ID REGST RL1	ID of rear LH tire transmitter is not registered	Yet
WARNING LAMP	Tire pressure indicator OFF	Off
	Tire pressure indicator ON	On
BUZZER	Tire pressure warning alarm is not sounding	Off
	Tire pressure warning alarm is sounding	On

0

Ρ

< ECU DIAGNOSIS INFORMATION >

TERMINAL LAYOUT



PHYSICAL VALUES

	nal No. e color)	Description			Condition	Value
+	-	Signal name	Input/ Output		Condition	(Approx.)
1 (L)	Ground	Battery power supply	Input	Ignition switch (DFF	Battery voltage
2 (Y)	Ground	P/W power supply (BAT)	Output	Ignition switch (DFF	12 V
3 (BG)	Ground	P/W power supply (RAP)	Output	Ignition switch (NC	12 V
					mp battery saver is activated. or room lamp power supply)	0 V
4 (LG)	Ground	Interior room lamp power supply	Output	vated.	mp battery saver is not acti- erior room lamp power sup-	12 V
5		Passenger door UN-		Passenger	UNLOCK (Actuator is activated)	12 V
(P)	Ground	LOCK	Output	door	Other than UNLOCK (Ac- tuator is not activated)	0 V
7	Ground	Stoplama	Output	Stop Jame	ON	0 V
(SB)	Ground	Step lamp	Output	Step lamp	OFF	12 V
8	Ground	All doors, fuel lid	Output	All doors, fuel	LOCK (Actuator is activated)	12 V
(V)		Output	lid	Other than LOCK (Actuator is not activated)	0 V	
9	Cround	Driver door, fuel lid	Output	Driver door,	UNLOCK (Actuator is activated)	12 V
(G)	Ground	UNLOCK	Output	fuel lid	Other than UNLOCK (Actuator is not activated)	0 V
11 (R)	Ground	Battery power supply	Input	Ignition switch (DFF	Battery voltage
13 (B)	Ground	Ground	_	Ignition switch (NC	0 V
					OFF	0 V
14 (W)	Ground	Push-button ignition switch illumination ground	Output	Tail lamp	ON	NOTE: When the illumination brighten- ing/dimming level is in the neutral position.
15 (BG)	Ground	ACC indicator lamp	Output	Ignition switch	OFF (LOCK indicator is not illuminated)	Battery voltage
()	G)				ACC	0 V

	Terminal No. Description (Wire color)					
(Wire +	color) –	Signal name	Input/ Output		Condition	Value (Approx.)
					Turn signal switch OFF	0 V
17 (W)	Ground	Turn signal RH (Front)	Output	Ignition switch ON	Turn signal switch RH	(V) 15 0 0 15 0 15 0 0 0 0 0 0 0 0 0 0 0 0 0
					Turn signal switch OFF	0 V
18 (BG)	Ground	Turn signal LH (Front)	Output	Ignition switch ON	Turn signal switch LH	(V) 15 0 1 s 1 s PKID0926E 6.5 V
19	Ground	Room lamp timer	Output	Interior room	OFF	12 V
(V)	Giouna	control	Output	lamp	ON	0 V
					Turn signal switch OFF	0 V
20 (V)	Ground	Turn signal RH (Rear)	Output	Ignition switch ON	Turn signal switch RH	(V) 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 15 15 15 15 15 15 15 15 15
23	Ground	Trunk lid open	Output	Trunk lid	OPEN (Trunk lid opener actuator is activated)	12 V
(L)	Ground	Trunk lid open	Output		Other than OPEN (Trunk lid opener actuator is not activated)	0 V
					Turn signal switch OFF	0 V
25 (Y)	Ground	Turn signal LH (Rear)	Output	Ignition switch ON	Turn signal switch LH	(V) 15 10 5 0 1 s 1 s 1 s 1 s 1 s 1 s 1 s 1 s
30	Ground	Trunk room lomo	Output	Trunk room	ON	0 V
(P)	Ground	Trunk room lamp	Output	lamp	OFF	12 V

	nal No.	Description				Value	Λ
(vvire +	color)	Signal name	Input/ Output		Condition	(Approx.)	A
34	Ground	Trunk room antenna	0.4014	Ignition switch	When Intelligent Key is in the passenger compart- ment	(V) 15 0 5 0 15 1 5 0 5 0 5 0 5 0 5 0 5 5 0 5 5 0 5 5 0 5 5 0 5 5 0 5 5 0 5 5 0 5 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 5 0 1 5 0 1 5 0 1 5 0 1 5 0 1 5 0 1 5 0 1 5 0 1 5 0 1 5 0 1 5 0 1 5 1 5	B C D
(SB)	Ground	(-)	Output	OFF	When Intelligent Key is not in the passenger compart- ment	(V) 15 0 5 0 1 s JMKIA0063GB	E
35	Ground	Trunk room antenna	Output	Ignition switch	When Intelligent Key is in the passenger compart- ment	(V) 15 10 5 0 1 s JMKIA0062GB	G H
(V)	Ground	(+)	Output	OFF	When Intelligent Key is not in the passenger compart- ment	(V) 15 10 5 0 1 s JMKIA0063GB	J K L
38	Ground	Rear bumper anten-	Output	When the trunk lid opener re- quest switch is	When Intelligent Key is in the antenna detection area	(V) 15 10 5 0 1 s JMKIA0062GB	M
(B)	Ground	na (–)	Juput	operated with ignition switch OFF	When Intelligent Key is not in the antenna detection area	(V) 15 10 5 0 1 s JMKIA0063GB	P

	nal No.	Description				Value
(Wire +	color)	Signal name	Input/ Output		Condition	(Approx.)
39	Ground	Rear bumper anten-	Output	When the trunk lid opener re-	When Intelligent Key is in the antenna detection area	(V) 15 0 1 1 1 1 1 1 1 1 1 1 1 1 1
(W)	Giound	na (+)	Guiput	quest switch is operated with ignition switch OFF	When Intelligent Key is not in the antenna detection area	(V) 15 0 1 s JMKIA0063GB
47	Onested	Ignition relay (IPDM	Outrast	len itien en itek	OFF or ACC	12 V
(Y)	Ground	E/R) control	Output	Ignition switch	ON	0 V
50 (G)	Ground	Trunk room lamp switch	Input	Trunk room lamp switch	OFF (Trunk lid is closed)	(V) 15 10 50 10 ms JPMIA0011GB 11.8 V
					ON (Trunk lid is opened)	0 V
				Ignition switch ON (A/T mod-	When selector lever is in P or N position	12 V
52	Ground	Starter relay control	Output	els)	When selector lever is not in P or N position	0 V
(SB)		,,		Ignition switch ON (M/T mod-	When the clutch pedal is depressed	Battery voltage
				els)	When the clutch pedal is not depressed	0 V
					ON (Pressed)	0 V
61 (SB)	Ground	Trunk lid opener re- quest switch	Input	Trunk lid open- er request switch	OFF (Not pressed)	(V) 15 0 5 0 10 ms JPMIA0016GB
		Intelligent Kousser		Intollizant V-	Sounding	1.0 V
64 (P)	Ground	Intelligent Key warn- ing buzzer (Engine	Output	Intelligent Key warning buzzer	Sounding	0 V
(1)		room)		(Engine room)	Not sounding	12 V

< ECU DIAGNOSIS INFORMATION >

	nal No. color)	Description	1			Value
+		Signal name	Input/ Output		Condition	(Approx.)
					Pressed	0 V
67 (GR)	Ground	Trunk lid opener switch	Input	Trunk lid open- er switch	Not pressed	(V) 15 10 10 10 ms JPMIA0011GB 11.8 V
72		Room antenna 2 (–)			When Intelligent Key is in the passenger compart- ment	(V) 15 0 15 0 15 0 15 15 15 15 15 15 15 15 15 15
(R)	Ground	(Center console)	nna 2 (-) Isole) Output OFF	OFF	When Intelligent Key is not in the passenger compart- ment	(V) 15 10 5 0 •••••••••••••••••••••••••••••
73	Ground	Room antenna 2 (+)	Output	tout Ignition switch	When Intelligent Key is in the passenger compart- ment	(V) 15 10 5 0 1 s JMKIA0062GB
(G)		(Center console)	e) OrF	When Intelligent Key is not in the passenger compart- ment	(V) 15 10 5 0 1 s JMKIA0063GB	

Ρ

	nal No.	Description				Value
(vvire +	color)	Signal name	Input/ Output		Condition	(Approx.)
74	When the pas- senger door ap		When Intelligent Key is in the antenna detection area	(V) 15 10 0 1 s JMKIA0062GB		
(SB)	Ground	tenna (–)	Output	quest switch is – operated with ignition switch OFF	When Intelligent Key is not in the antenna detection area	(V) 15 10 5 0 1 s JMKIA0063GB
75	Ground	Passenger door an-	Output	When the pas- senger door re- quest switch is	When Intelligent Key is in the antenna detection area	(V) 15 0 0 1 s JMKIA0062GB
(BR)		tenna (+)	Cutput	quest switch is - operated with ignition switch OFF	When Intelligent Key is not in the antenna detection area	(V) 15 10 5 0 1 s JMKIA0063GB
76	Ground	Driver door antenna	Output	When the driv- er door request	When Intelligent Key is in the antenna detection area	(V) 15 0 1 s JMKIA0062GB
(V)	Ground	()	Output	switch is oper- ated with igni- tion switch OFF	When Intelligent Key is not in the antenna detection area	(V) 15 10 5 0 1 s JMKIA0063GB

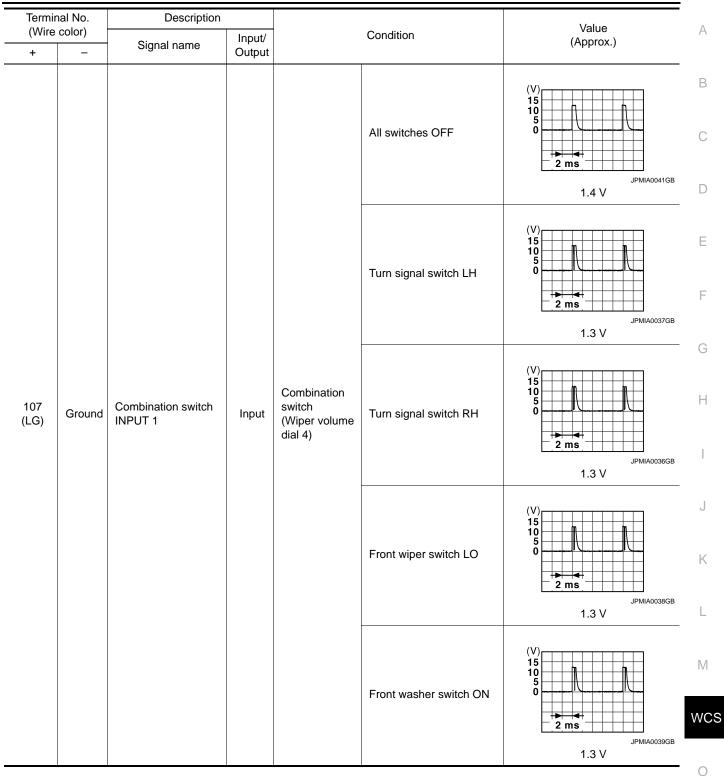
	nal No.	Description		Condition		Value	А
(vvire +	color)	Signal name	Input/ Output		Condition	(Approx.)	A
77		Driver door antenna		When the driv- er door request	When Intelligent Key is in the antenna detection area	(V) 15 10 5 0 15 10 5 0 15 15 10 5 0 15 15 10 5 0 15 15 10 15 15 10 15 15 10 15 15 10 15 15 10 15 15 10 15 15 10 15 15 10 15 15 15 15 15 15 15 15 15 15 15 15 15	B C D
(LG)	Ground	(+)	Output	switch is oper- ated with igni- tion switch OFF	When Intelligent Key is not in the antenna detection area	(V) 15 10 5 0 1 s JMKIA0063GB	E
78	Ground	Room antenna 1 (-)	Output	Ignition switch	When Intelligent Key is in the passenger compart- ment	(V) 15 10 5 0 1 s JMKIA0062GB	G H
(Y)	Ground	(Instrument panel)	Cutput	OFF	When Intelligent Key is not in the passenger compart- ment	(V) 15 0 1 s JMKIA0063GB	J K L
79	Ground	Room antenna 1 (+)	Output	Ignition switch	When Intelligent Key is in the passenger compart- ment	(V) 15 10 5 0 1 s JMKIA0062GB	M WC
(BR)		(Instrument panel)	Catput	OFF	When Intelligent Key is not in the passenger compart- ment	(V) 15 10 5 0 1 s JMKIA0063GB	P

	nal No.	Description				Value
(Wire +	color) –	Signal name	Input/ Output		Condition	(Approx.)
80 (GR)	Ground	NATS antenna amp.	Input/ Output	During waiting	Ignition switch is pressed while inserting the Intelli- gent Key into the key slot.	Just after pressing ignition switch. Pointer of tester should move.
81 (W)	Ground	NATS antenna amp.	Input/ Output	During waiting	Ignition switch is pressed while inserting the Intelli- gent Key into the key slot.	Just after pressing ignition switch. Pointer of tester should move.
82 (V)	Ground	Ignition relay [Fuse block (J/B)] control	Output	Ignition switch	OFF or ACC ON	0 V 12 V
83		Remote keyless entry receiver communica-	Input/	During waiting		(V) 15 10 5 0 1 ms JMKIA0064GB
(Y)	Ground	tion	Output	When operating either button on the Intelli- gent Key		(V) 15 10 5 0 1 ms JMKIA0065GB
					All switches OFF (Wiper volume dial 4)	(V) 15 10 5 0 2 ms JPMIA0041GB 1.4 V
87 (Y)	Ground	Combination switch INPUT 5	Input	Combination switch	Front fog lamp switch ON (Wiper volume dial 4)	(V) 15 0 2 ms JPMIA0037GB 1.3 V
					Any of the conditions be- low with all switches OFF • Wiper volume dial 1 • Wiper volume dial 2 • Wiper volume dial 6 • Wiper volume dial 7	(V) 15 0 2.ms JPMIA0040GB 1.3 V

Terminal No. Description Value А (Wire color) Condition Input/ (Approx.) Signal name + _ Output В (V 15 10 All switches OFF С (Wiper volume dial 4) 2 ms JPMIA0041GB D 1.4 V $(\setminus$ 15 10 Ε Lighting switch HI ſ (Wiper volume dial 4) F 2 ms JPMIA0036GB 1.3 V 88 Combination switch Combination Ground Input (GR) **INPUT 3** switch 15 10 Н Lighting switch 2ND ٢ (Wiper volume dial 4) 2 ms JPMIA0037GB 1.3 V 15 Any of the conditions be-10 low with all switches OFF C · Wiper volume dial 1 Κ · Wiper volume dial 2 · Wiper volume dial 3 2 ms JPMIA0040GB 1.3 V L Push-button ig-0 V Pressed 89 Push-button ignition Ground Input nition switch (BR) switch (Push switch) Not pressed Battery voltage (push switch) Μ 90 Input/ Ground CAN-L (P) Output 91 Input/ WCS CAN-H Ground (L) Output OFF 0 V (V 15 10 Ρ 92 Key slot illumi-Ground Key slot illumination Output Blinking (LG) nation 1 s JPMIA0015GB 6.5 V ON 12 V

BCM (BODY CONTROL MODULE)

	nal No.	Description				Value
(Wire +	color) –	Signal name	Input/ Output		Condition	(Approx.)
93 (GR)	Ground	ON indicator lamp	Output	Ignition switch	OFF (LOCK indicator is not illuminated)	Battery voltage
					ON	0 V
95	Ground	ACC relay control	Output	Ignition switch	OFF	0 V
(BG)	Croana	All the relay control	Output	Ignition Switch	ACC or ON	12 V
96 (GR)	Ground	A/T shift selector (De- tention switch) power supply	Output		_	12 V
97	Ground	Steering lock condi-	Input	Steering lock	LOCK status	0 V
(L)		tion No. 1			UNLOCK status	12 V
98	Ground	Steering lock condi-	Input	Steering lock	LOCK status	12 V
(BG)	Croana	tion No. 2	mput	electing leck	UNLOCK status	0 V
		Selector lever P posi-		Selector lever	P position	0 V
		tion switch			Any position other than P	12 V
99		ASCD clutch switch (M/T models without	Input	ASCD clutch	OFF (Clutch pedal is de- pressed)	0 V
(P)* ¹ (R)* ²	Ground	ICC)		t switch	ON (Clutch pedal is not depressed)	12 V
()		ICC clutch switch (M/		ICC clutch	OFF (Clutch pedal is de- pressed)	0 V
		T models with ICC)		switch	ON (Clutch pedal is not depressed)	12 V
					ON (Pressed)	0 V
100 (Y)	Ground	Passenger door re- quest switch	Input	Passenger door request switch	OFF (Not pressed)	(V) 15 0 10 10 10 10 10 10 10 V JPMIA0016GB 1.0 V
. <u> </u>					ON (Pressed)	0 V
101 (R)	Ground	Driver door request switch	Input	Driver door re- quest switch	OFF (Not pressed)	(V) 15 0 10 ms JPMA0016GB 1.0 V
102 (BG)	Ground	Blower fan motor re- lay control	Output	Ignition switch	OFF or ACC	0 V
103 (LG)	Ground	Remote keyless entry receiver power sup- ply	Output	Ignition switch C	ON DFF	12 V 12 V
106	Ground	Steering lock unit	0	Ignition outlet	OFF or ACC	12 V
(W)	Ground	power supply	Output	Ignition switch	ON	0 V



< ECU DIAGNOSIS INFORMATION >

Ρ

	nal No.	Description		0		Value	
(vvire +	color) —	Signal name	Input/ Output	Condition		(Approx.)	
					All switches OFF (Wiper volume dial 4)	(V) 15 0 2 ms JPMIA0041GB 1.4 V	
108	Ground	Combination switch	Input	Combination	Lighting switch AUTO (Wiper volume dial 4)	(V) 15 10 2 ms JPMIA0038GB 1.3 V	
(R)		INPUT 4		switch	Lighting switch 1ST (Wiper volume dial 4)	(V) 15 0 2 ms JPMIA0036GB 1.3 V	
					Any of the conditions be- low with all switches OFF • Wiper volume dial 1 • Wiper volume dial 5 • Wiper volume dial 6	(V) 15 10 2 ms JPMIA0039GB 1.3 V	

Terminal No. Description Value А (Wire color) Condition Input/ (Approx.) Signal name + _ Output В (V 15 10 ٢ All switches OFF С 2 m s JPMIA0041GB D 1.4 V (V) 15 10 Е C Lighting switch PASS F 2 ms JPMIA0037GB 1.3 V (V 15 10 Combination Н 109 switch Combination switch Lighting switch 2ND n Ground Input **INPUT 2** (Wiper volume (W) dial 4) 2 ms JPMIA0036GB 1.3 V J (V 15 10 Front wiper switch INT/ 0 Κ AUTO 2 ms JPMIA0038GB L 1.3 V (V 15 Μ 10 5 Front wiper switch HI 0 WCS 2 ms JPMIA0040GB 1.3 V Ο ON 0 V Ρ 10 110 Ground Hazard switch Input Hazard switch 5 (G) ò OFF 10 ms JPMIA0012GB 1.1 V

BCM (BODY CONTROL MODULE)

< ECU DIAGNOSIS INFORMATION >

Revision: 2009 November

	nal No.	Description				Value
(Wire +	color)	Signal name	Input/ Output		Condition	(Approx.)
					LOCK status	12 V
111 (Y)	Ground	ound Steering lock unit communication	Input/ Output	Steering lock	LOCK or UNLOCK	(V) 15 0 50 ms JMKIA0066GB
					For 15 seconds after UN- LOCK	12 V
					15 seconds or later after UNLOCK	0 V
112 (R)	Ground	Rain sensor serial link	Input/ Output	Ignition switch ON		(V) 15 0 0 0 0 0 0 0 0 0 0 0 0 0
					When bright outside of the	8.7 V Close to 5 V
113 (BG)	Ground	Optical sensor	Input	Ignition switch ON	vehicle When dark outside of the vehicle	Close to 0 V
114	Oneveral	Clutch interlock	Input	Clutchinterlock	OFF (Clutch pedal is not depressed)	0 V
(P)	Ground	switch	Input	switch	ON (Clutch pedal is de- pressed)	Battery voltage
116 (SB)	Ground	Stop lamp switch 1	Input		_	Battery voltage
		Stop lamp switch 2		Stop lamp	OFF (Brake pedal is not depressed)	0 V
118	Ground	(Without ICC)	Input	switch	ON (Brake pedal is de- pressed)	Battery voltage
(BR)	Cround	Stop lamp switch 2	mpar		h OFF (Brake pedal is not ICC brake hold relay OFF	0 V
		(With ICC)			h ON (Brake pedal is de- brake hold relay ON	Battery voltage
119 (SB)	Ground	Driver side door lock assembly (Unlock sensor)	Input	Driver door	LOCK status (Unlock sensor switch OFF)	(V) 10 10 10 1.1 V JPMIA0012GB
					UNLOCK status (Unlock switch sensor ON)	0 V

Terminal No. (Wire color)		Description				Value	
(VVire +	color)	Signal name	Input/ Output		Condition	(Approx.)	
121	Ground	Key slot switch	Input	When the Intellig	gent Key is inserted into key	12 V	
(G)	Ground	Ney slot switch	mput	When the Intelligent Key is not inserted in key slot		0 V	
123 (W)	Ground	IGN feedback	Input	Ignition switch	OFF or ACC	0 V	
124 (LG)	Ground	Passenger door switch	Input	Passenger door switch	ON OFF (Door close)	Battery voltage	
129 (Y)	Ground	Trunk lid opener can- cel switch	Input	Trunk lid open- er cancel switch	ON (Door open) CANCEL ON	0 V (V) 15 10 10 ms JPMIA0012GB 1.1 V 0 V	
132 (V)	Ground	Power window switch communication	Input/ Output	Ignition switch ON		(V) 15 10 10 10 10 10 10 10 10 10 10	
				Ignition switch C		12 V	
133 (L)	Ground	Push-button ignition switch illumination	Output	Push-button ig- nition switch il- lumination	ON (Tail lamps OFF)	9.5 V NOTE: The pulse width of this wave is varied by the illumination bright- ening/dimming level. (V) 15 10 5 0 U JPMIA0159GB 0 V	
134	_		_	LOCK indicator	OFF OFF	0 V Battery voltage	
(R)	Ground	LOCK indicator lamp	Output	lamp	ON	0 V	
(13)		1		Ignition switch ON		+	

Terminal No. (Wire color)		Description				Value							
(Wire +	color)	Signal name	Input/ Output		Condition	(Approx.)							
138		Receiver and sensor	0.1.1		OFF	0 V							
(V)	Ground	power supply	Output	Ignition switch	ACC or ON	5.0 V							
139	Ground	Tire pressure receiv- er communication	Input/	Ignition switch ON	Standby state	(V) 6 4 2 0 • • 0.2s OCC3881D							
(L)		er communication	Output	ON	When receiving the signal from the transmitter	(V) 6 2 0 + 0.2s OCC3880D							
140	Ground	Selector lever P/N	Input	Selector lever	P or N position	12 V							
(Y)	Ciouna	position (A/T models)	mput		Except P and N positions	0 V							
					ON	0 V							
141 (P)	Ground	Security indicator	Output	Security indica- tor	Blinking	(V) 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 0 15 15 15 15 15 15 15 15 15 15							
					OFF	12 V							
					All switches OFF	0 V							
					Lighting switch 1ST								
			Output								Combination	Lighting switch HI	(V) 15
142	Ground	Combination switch		switch	Lighting switch 2ND								
(LG)		OUTPUT 5	Calpar	(Wiper volume dial 4)	Turn signal switch RH	0 2 ms JPMIA0031GB 10.7 V							
					All switches OFF (Wiper volume dial 4)	0 V							
					Front wiper switch HI (Wiper volume dial 4)	(V)							
143 (V)	Ground	Combination switch OUTPUT 1	Output	Combination switch	Any of the conditions be- low with all switches OFF • Wiper volume dial 1 • Wiper volume dial 2 • Wiper volume dial 3 • Wiper volume dial 6 • Wiper volume dial 7	10 0 2 ms JPMIA0032GB 10.7 V							

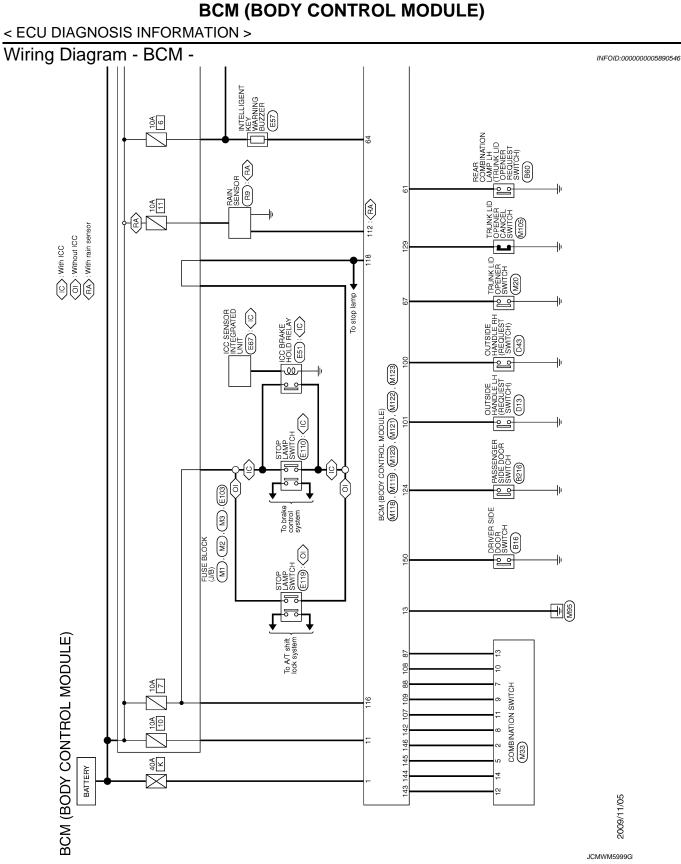
< ECU DIAGNOSIS INFORMATION >

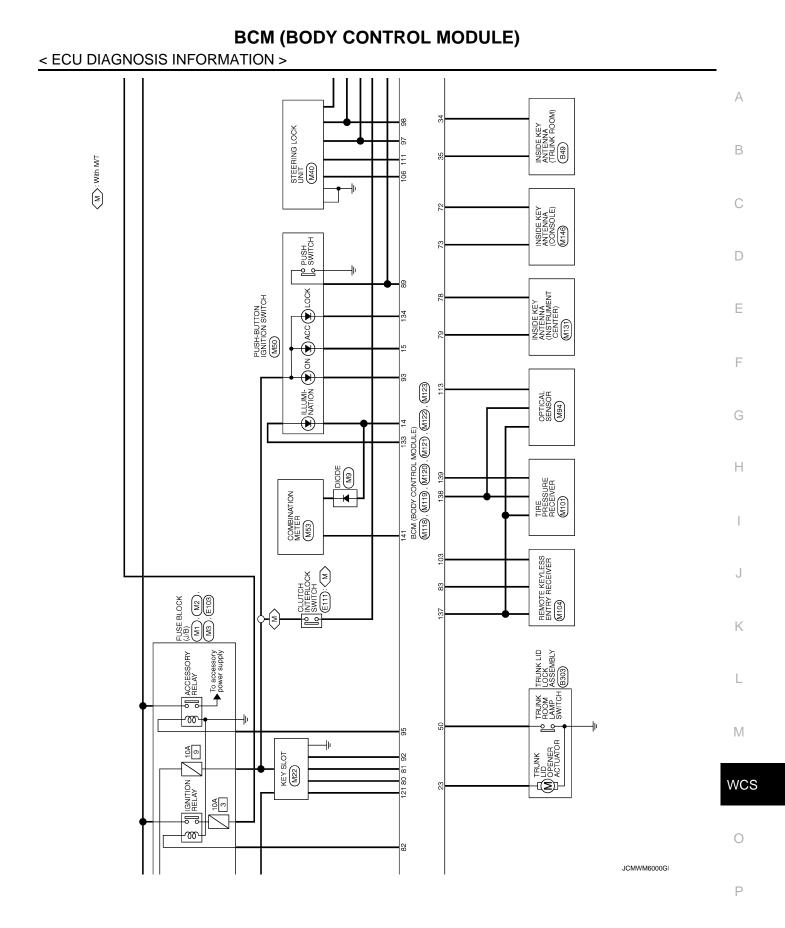
	nal No. color)	Description			Condition	Value
+	-	Signal name	Input/ Output		Condition	(Approx.)
					All switches OFF (Wiper volume dial 4)	0 V
					Front washer switch ON (Wiper volume dial 4)	
144 (G)	Ground	Combination switch OUTPUT 2	Output	Combination switch	Any of the conditions be- low with all switches OFF • Wiper volume dial 1 • Wiper volume dial 5 • Wiper volume dial 6	15 10 10 10 10 10 10 10 10 10 10 10 10 10
					All switches OFF	0 V
					Front wiper switch INT/ AUTO	(V)
145		Combination switch		Combination switch	Front wiper switch LO	15
(L)	Ground	OUTPUT 3	Output	(Wiper volume dial 4)	Lighting switch AUTO	10 0 2 ms 10.7 V
					All switches OFF	0 V
					Front fog lamp switch ON	
				Combination	Lighting switch 2ND	(V) 15
146 (SB)	Ground	Combination switch OUTPUT 4	Output	switch (Wiper volume dial 4)	Lighting switch PASS	10 5 0 2 ms
						JPMIA0035GB 10.7 V
149 (W)	Ground	Tire pressure warning check switch	Input			12 V
150 (R)	Ground	Driver door switch	Input	Driver door switch	OFF (Door close)	(V) 15 0 10 10 ms 10 ms JPMIA0011GB 11.8 V
					ON (Door open)	0 V
151	Ground	Rear window defog-	Output	Rear window	Active	0 V
(G)	Ground	ger relay control	Culpul	defogger	Not activated	Battery voltage

• *1: A/T models

• *2: M/T models

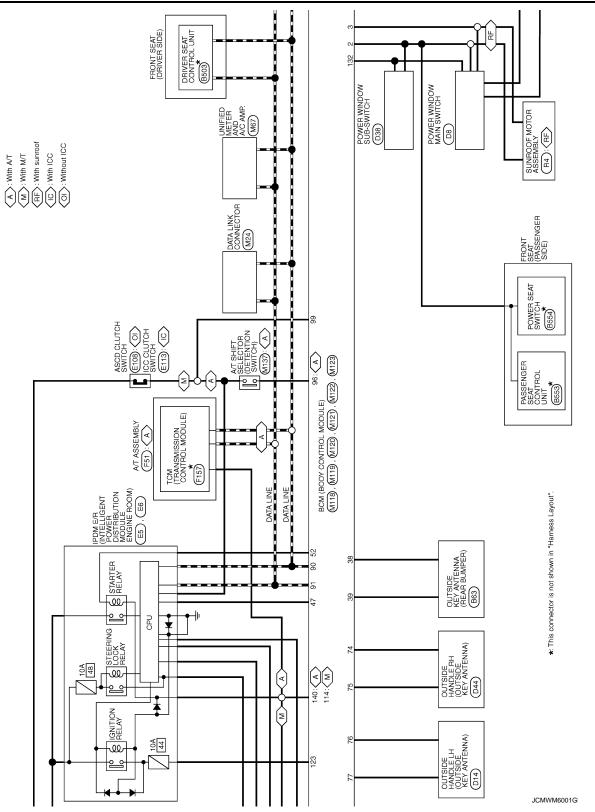
Ρ



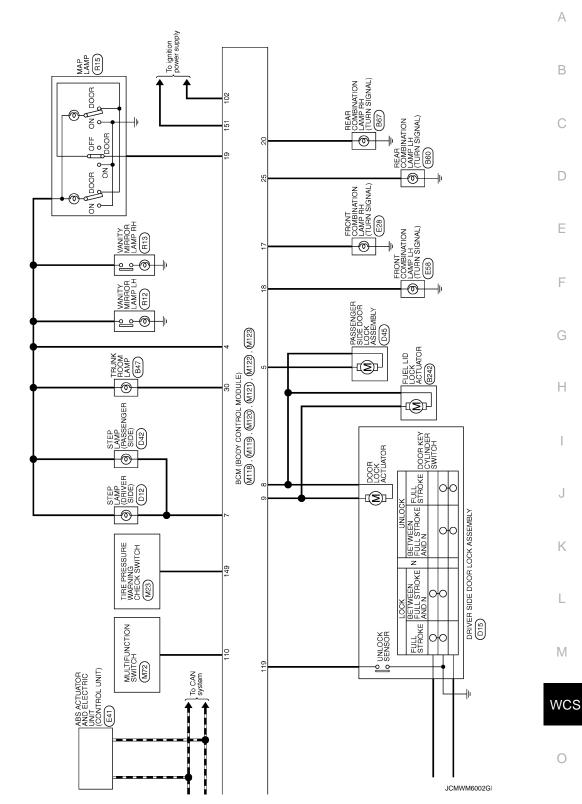


Revision: 2009 November

2010 G37 Coupe



< ECU DIAGNOSIS INFORMATION >



Ρ

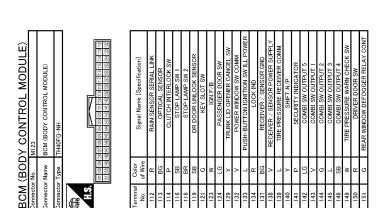
BCM (BODY CONTROL MODULE) < ECU DIAGNOSIS INFORMATION >

COMBI SW INPUT 1 COMBI SW INPUT 4 COMBI SW INPUT 2 HAZARD SW CAN-L CAN-H KEY SLOT IL ON IND ACC RELAY CON DRIVER DOOR REQUE DWER FAN MOTOR RE L UNIT POWER OMBI g R BG 62 80 51 50 49 48 47 46 45 44 43 42 41 40 39 39 37 36 55 34 53 22 27 17 70 69 68 67 66 55 64 53 22 61 60 59 58 57 56 55 54 53 52 91 90 89 88 87 86 85 84 83 82 81 80 79 78 77 76 75 74 73 72 111 110 109 108 107 106 105 104 103 102 101 100 99 98 97 86 95 94 93 92 92 Signal Name [Specification] Signal Name [Specification] BCM (BODY CONTROL MODULE) BCM (BODY CONTROL MODULE) AVL... ROOM ANT 1-ROOM ANT 1-NATS ANT AMP NATS ANT AMP IGN RELAY (F/B) TRUNK ROOM ANT-TRUNK ROOM ANT+ REAR BUMPER ANT-REAR BUMPEH GN RELAY (IPDM B TRUNK ROOM I STARTER REL/ 9 88 88 a 85 < ≤ GR BR ≺ Color of Wire of Wire R BR BR <u>د</u> < Connector Name ß Connector Name Twine H.S. Terminal No. H.S. Terminal No. 47 75 52 5 8 Æ Æ ð ERIOR ROOM LAMP POWER SUPPLY ASSENGER DOOR UNLOCK OUTPUT STEP LAMP OUTPUT Signal Name [Specification] Signal Name [Specification] BCM (BODY CONTROL MODULE) BCM (BODY CONTROL MODULE) JRN SIGNAL LH (REAF TRUNK ROOM LAMP FUEL LID LUCK 0 8 8 GND I**∐**® 6 7 13 14 4 5 11 12 1 M120 25 Color of Wire Color of Wire Connector Name actor No. nector Name /be g 8 - BG nnector No. σ **Fvbe** 稳 H.S. 。 HS. erminal No. 8 erminal No. Conn BAT (F/L) POWER WINDOW POWER SUPPLY (BAT) BCM (BODY CONTROL MODULE) Signal Name [Specification] Signal Name [Specification] BCM (BODY CONTROL MODULE) 9 WASHER GND INPUT 3 DUTPUT INPUT 2 INPUT 4 INPUT 1 COMBINATION SWITCH σ M118 Color of Wire < [2] x < [3] 8 H Color of Wire Connector Name Connector Name inector No. Ċ BG H.S. ALS. erminal No. erminal No. E ß

JCMWM6003G

ő

< ECU DIAGNOSIS INFORMATION >



Fail-safe

FAIL-SAFE CONTROL BY DTC

BCM performs fail-safe control when any DTC are detected.

	С
	D
	Е
	F
	G
	Н
	I
	J
	K
	L
	Μ
	WCS
	0
JCMWM6004Gi INFOID:000000005890547	Ρ

А

В

Display contents of CONSULT	Fail-safe	Cancellation
B2013: ID DISCORD BCM-S/L	Inhibit engine cranking	Erase DTC
B2014: CHAIN OF S/L-BCM	Inhibit engine cranking	Erase DTC
B2190: NATS ANTENNA AMP	Inhibit engine cranking	Erase DTC
B2191: DIFFERENCE OF KEY	Inhibit engine cranking	Erase DTC
B2192: ID DISCORD BCM-ECM	Inhibit engine cranking	Erase DTC
B2193: CHAIN OF BCM-ECM	Inhibit engine cranking	Erase DTC
B2195: ANTI-SCANNING	Inhibit engine cranking	Ignition switch $ON \rightarrow OFF$
B2557: VEHICLE SPEED	Inhibit steering lock	When normal vehicle speed signals are received from ABS actua- tor and electric unit (control unit) for 500 ms
B2560: STARTER CONT RELAY	Inhibit engine cranking	500 ms after the following CAN signal communication status be- comes consistentStarter control relay signalStarter relay status signal
B2601: SHIFT POSITION	Inhibit steering lock	 500 ms after the following signal reception status becomes consistent Selector lever P position switch signal P range signal (CAN)
B2602: SHIFT POSITION	Inhibit steering lock	 5 seconds after the following BCM recognition conditions are fulfilled Ignition switch is in the ON position Selector lever P position switch signal: Except P position (12 V) Vehicle speed: 4 km/h (2.5 MPH) or more
B2603: SHIFT POSI STATUS	Inhibit steering lock	 500 ms after the following BCM recognition conditions are fulfilled Ignition switch is in the ON position Selector lever P position switch signal: Except P position (12 V) Selector lever P/N position signal: Except P and N positions (0 V)
B2604: PNP/CLUTCH SW	Inhibit steering lock	 500 ms after any of the following BCM recognition conditions are fulfilled Status 1 Ignition switch is in the ON position Selector lever P/N position signal: P and N position (12 V) P range signal or N range signal (CAN): ON Status 2 Ignition switch is in the ON position Selector lever P/N position signal: Except P and N positions (0 V) P range signal and N range signal (CAN): OFF
B2605: PNP/CLUTCH SW	Inhibit steering lock	 500 ms after any of the following BCM recognition conditions are fulfilled Status 1 Ignition switch is in the ON position Selector lever P/N position signal: Except P and N positions (0 V) Interlock/PNP switch signal (CAN): OFF Status 2 Ignition switch is in the ON position Selector lever P/N position signal: P or N position (12 V) PNP switch signal (CAN): ON
B2606: S/L RELAY	Inhibit engine cranking	 500 ms after the following CAN signal communication status be- comes consistent Steering lock relay signal (Request signal) Steering lock relay signal (Condition signal)
B2607: S/L RELAY	Inhibit engine cranking	 500 ms after the following CAN signal communication status has becomes consistent Steering lock relay signal (Request signal) Steering lock relay signal (Condition signal)

< ECU DIAGNOSIS INFORMATION >

Display contents of CONSULT	Fail-safe	Cancellation
B2608: STARTER RELAY	Inhibit engine cranking	 500 ms after the following signal communication status becomes consistent Starter motor relay control signal Starter relay status signal (CAN)
B2609: S/L STATUS	Inhibit engine crankingInhibit steering lock	 When the following steering lock conditions agree BCM steering lock control status Steering lock condition No. 1 signal status Steering lock condition No. 2 signal status
B260A: IGNITION RELAY	Inhibit engine cranking	 500 ms after the following conditions are fulfilled IGN relay (IPDM E/R) control signal: OFF (12 V) Ignition ON signal (CAN to IPDM E/R): OFF (Request signal) Ignition ON signal (CAN from IPDM E/R): OFF (Condition signal)
B260F: ENG STATE SIG LOST	Maintains the power supply position attained at the time of DTC detection	When any of the following conditions are fulfilledPower position changes to ACCReceives engine status signal (CAN)
B2612: S/L STATUS	Inhibit engine crankingInhibit steering lock	 When any of the following conditions are fulfilled Steering lock unit status signal (CAN) is received normally The BCM steering lock control status matches the steering lock status recognized by the steering lock unit status signal (CAN from IPDM E/R)
B2617: BCM	Inhibit engine cranking	1 second after the starter motor relay control inside BCM becomes normal
B2618: BCM	Inhibit engine cranking	1 second after the ignition relay (IPDM E/R) control inside BCM be- comes normal
B2619: BCM	Inhibit engine cranking	1 second after the steering lock unit power supply output control in- side BCM becomes normal
B261E: VEHICLE TYPE	Inhibit engine cranking	BCM initialization
B26E8: CLUTCH SW	Inhibit engine cranking	 When any of the following BCM recognition conditions are fulfilled Status 1 Clutch switch signal (CAN from ECM): ON Clutch interlock switch signal: OFF (0 V) Status 2 Clutch switch signal (CAN from ECM): OFF Clutch interlock switch signal: ON (Battery voltage)
B26E9: S/L STATUS	Inhibit engine crankingInhibit steering lock	 When BCM transmits the LOCK request signal to steering lock unit, and receives LOCK response signal from steering lock unit, the following conditions are fulfilled Steering condition No. 1 signal: LOCK (0 V) Steering condition No. 2 signal: LOCK (12 V)

DTC Inspection Priority Chart

INFOID:000000005890548

WCS

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

Priority	DTC	
1	B2562: LOW VOLTAGE	
2	U1000: CAN COMM U1010: CONTROL UNIT(CAN)	
3	 B2190: NATS ANTENNA AMP B2191: DIFFERENCE OF KEY B2192: ID DISCORD BCM-ECM B2193: CHAIN OF BCM-ECM B2195: ANTI-SCANNING 	

< ECU DIAGNOSIS INFORMATION >

Priority	DTC
4	 B2013: ID DISCORD BCM-S/L B2014: CHAIN OF S/L-BCM B2555: IGNITION RELAY B2555: VEHICLE SPEED B2560: STARTER CONT RELAY B2501: SHIFT POSITION B2602: SHIFT POSITION B2603: SHIFT POSITION B2604: PNP/CLUTCH SW B2605: SNR RELAY B2605: S/L RELAY B2606: S/L RELAY B2606: S/L RELAY B2607: S/L RELAY B2609: S/L STATUS B2609: S/L STATUS B2609: S/L STATUS B26009: S/L STATUS B2609: S/L STATUS B2609: S/L STATUS B2609: S/L STATUS B26000: STEERING LOCK UNIT B26000: STEERING LOCK UNIT B26000: STEERING LOCK UNIT B26010: STEERING LOCK UNIT B26010: STEERING LOCK UNIT B26011: SLOM B2614: BCM B2614: BCM B2616: BCM B2616: BCM B2616: BCM B2617: BCM B2618: BCM B2618: BCM B2619: SL STATUS B2619: BCM B2619: SL STATUS B2619: BCM B2619: BCM B2619: BCM B2619: BCM B2619: SL STATUS B2
5	 C1704: LOW PRESSURE FL C1705: LOW PRESSURE FR C1706: LOW PRESSURE RR C1707: LOW PRESSURE RL C1708: [NO DATA] FL C1709: [NO DATA] FR C1770: [NO DATA] RR C1711: [NO DATA] RL C1716: [PRESSDATA ERR] FL C1717: [PRESSDATA ERR] FR C1718: [PRESSDATA ERR] RR C1719: [PRESSDATA ERR] RL C1734: CONTROL UNIT
6	B2621: INSIDE ANTENNA B2622: INSIDE ANTENNA B2623: INSIDE ANTENNA

DTC Index

NOTE:

The details of time display are as follows.

- CRNT: A malfunction is detected now.
- PAST: A malfunction was detected in the past.

IGN counter is displayed on Freeze Frame Data. For details of Freeze Frame Data, refer to <u>BCS-14, "COM-MON ITEM : CONSULT-III Function (BCM - COMMON ITEM)"</u>.

INFOID:000000005890549

< ECU DIAGNOSIS INFORMATION >

CONSULT display	Fail-safe	Freeze Frame Data •Vehicle Speed •Odo/Trip Meter •Vehicle condition	Intelligent Key warning lamp ON	Tire pressure monitor warning lamp ON	Refer- ence page
No DTC is detected. further testing may be required.	_	_	_	_	_
U1000: CAN COMM		_	_		BCS-33
U1010: CONTROL UNIT(CAN)	_	_	_	_	BCS-34
U0415: VEHICLE SPEED	_	_	_	_	BCS-35
B2013: ID DISCORD BCM-S/L	×	×	_	_	<u>SEC-55</u>
B2014: CHAIN OF S/L-BCM	×	×	_	_	SEC-56
B2190: NATS ANTENNA AMP	×	_	_	_	<u>SEC-47</u>
B2191: DIFFERENCE OF KEY	×	_	_	_	<u>SEC-50</u>
B2192: ID DISCORD BCM-ECM	×	_	_	_	SEC-51
B2193: CHAIN OF BCM-ECM	×	_	_	_	SEC-53
B2195: ANTI-SCANNING	×	_	_		<u>SEC-54</u>
B2553: IGNITION RELAY		×			PCS-48
B2555: STOP LAMP	_	×	_		SEC-59
B2556: PUSH-BTN IGN SW	_	×	×	_	SEC-61
B2557: VEHICLE SPEED	×	×	×	_	SEC-63
B2560: STARTER CONT RELAY	×	×	×	_	SEC-64
B2562: LOW VOLTAGE		×			BCS-36
B2601: SHIFT POSITION	×	×	×		<u>SEC-65</u>
B2602: SHIFT POSITION	×	×	×		<u>SEC-68</u>
B2603: SHIFT POSI STATUS	×	×	×		<u>SEC-70</u>
B2604: PNP/CLUTCH SW	×	×	×		<u>SEC-73</u>
B2605: PNP/CLUTCH SW	×	×	×		<u>SEC-75</u>
B2606: S/L RELAY	×	×	×		<u>SEC-77</u>
B2607: S/L RELAY	×	×	×		<u>SEC-78</u>
B2608: STARTER RELAY	× ×	×	×		<u>SEC-80</u>
B2609: S/L STATUS	× ×	×	×		<u>SEC-82</u>
B260A: IGNITION RELAY	× ×	×	~ ×		PCS-50
B260B: STEERING LOCK UNIT	<u> </u>		×		<u>SEC-86</u>
B260C: STEERING LOCK UNIT		×			<u>SEC-80</u> SEC-87
B260D: STEERING LOCK UNIT			×		
B260F: ENG STATE SIG LOST		×	×		<u>SEC-88</u>
	×	×	×		<u>SEC-89</u>
B2612: S/L STATUS	×	×	×	—	<u>SEC-94</u>
B2614: BCM	_	×	×	_	PCS-52
B2615: BCM	_	×	×	—	PCS-54
B2616: BCM	—	×	×	—	PCS-56
B2617: BCM	×	×	×	—	<u>SEC-98</u>
B2618: BCM	×	×	×		PCS-58
B2619: BCM	×	×	×	—	<u>SEC-100</u>
B261A: PUSH-BTN IGN SW	_	×	×		PCS-59
B261E: VEHICLE TYPE	×	×	× (Turn ON for 15 seconds)	_	<u>SEC-101</u>

Revision: 2009 November

CONSULT display	Fail-safe	Freeze Frame Data •Vehicle Speed •Odo/Trip Meter •Vehicle condition	Intelligent Key warning lamp ON	Tire pressure monitor warning lamp ON	Refer- ence page
B2621: INSIDE ANTENNA	—	×	_	_	DLK-55
B2622: INSIDE ANTENNA	—	×	_	_	<u>DLK-57</u>
B2623: INSIDE ANTENNA	—	×	_	_	DLK-59
B26E8: CLUTCH SW	×	×	×	_	<u>SEC-90</u>
B26E9: S/L STATUS	×	×	imes (Turn ON for 15 seconds)	_	<u>SEC-92</u>
B26EA: KEY REGISTRATION	_	×	imes (Turn ON for 15 seconds)	_	<u>SEC-93</u>
C1704: LOW PRESSURE FL	_	—	_	×	
C1705: LOW PRESSURE FR	_	—	_	×	
C1706: LOW PRESSURE RR	_	—	_	×	<u>WT-26</u>
C1707: LOW PRESSURE RL	—	—	—	×	
C1708: [NO DATA] FL	—	—	_	×	
C1709: [NO DATA] FR	—	—	_	×	
C1710: [NO DATA] RR	—	—	_	×	<u>WT-28</u>
C1711: [NO DATA] RL	_	—	_	×	
C1716: [PRESSDATA ERR] FL	—	—	_	×	
C1717: [PRESSDATA ERR] FR	—	—	—	×	M/T 24
C1718: [PRESSDATA ERR] RR	—	—	—	×	<u>WT-31</u>
C1719: [PRESSDATA ERR] RL	_	—	—	×	
C1729: VHCL SPEED SIG ERR	—	—	—	×	<u>WT-33</u>
C1734: CONTROL UNIT	_	—	_	×	<u>WT-35</u>

THE PARKING BRAKE RELEASE WARNING CONTINUES SOUNDING, OR DOES NOT SOUND

< SYMPTOM DIAGNOSIS >	
SYMPTOM DIAGNOSIS	٨
THE PARKING BRAKE RELEASE WARNING CONTINUES SOUNDING, OR DOES NOT SOUND	A
Description	
 The parking brake warning chime sounds continuously during vehicle travel though the parking brake is released. The parking brake warning chime does not sound at all even though driving the vehicle with the parking brake applied. 	С
Diagnosis Procedure	D
1. CHECK UNIFIED METER AND A/C AMP. INPUT SIGNAL	Е
 Connect the CONSULT-III. Select the "Data Monitor" of the "METER/M&A" and check the "PKB SW" monitor value. Refer to <u>MWI-60</u>, <u>"Component Function Check"</u>. 	F
Is the inspection result normal? YES >> Replace combination meter. NO >> GO TO 2. 2.CHECK PARKING BRAKE SWITCH SIGNAL CIRCUIT	G
Check the parking brake switch signal circuit. Refer to <u>MWI-60, "Diagnosis Procedure (A/T models)</u> " (A/T models) or <u>MWI-61, "Diagnosis Procedure (M/T models)</u> " (M/T models).	Н
Is the inspection result normal? YES >> GO TO 3. NO >> Repair harness or connector. 3. CHECK PARKING BRAKE SWITCH	I
Check the parking brake switch. Refer to <u>MWI-61, "Component Inspection"</u> .	J
Is the inspection result normal? YES >> Replace combination meter. NO >> Replace parking brake switch. Refer to <u>PB-6. "PEDAL TYPE : Exploded View"</u> (pedal type) or <u>PB-7. "LEVER TYPE : Exploded View"</u> (lever type).	K
	L

Μ

WCS

Ο

Ρ

THE LIGHT REMINDER WARNING DOES NOT SOUND

< SYMPTOM DIAGNOSIS >

THE LIGHT REMINDER WARNING DOES NOT SOUND

Description

Light reminder warning chime does not sound even though headlamp is illuminated.

Diagnosis Procedure

INFOID:000000005807958

INFOID:000000005807957

1.CHECK COMBINATION SWITCH (LIGHT SWITCH) OPERATION

Check that the headlamps operate normally by operating the combination switch (light switch).

Do they operate normally?

YES >> GO TO 2.

NO >> Refer to <u>BCS-76, "Symptom Table"</u>.

2. CHECK FRONT DRIVER SIDE DOOR SWITCH SIGNAL CIRCUIT

Check the front driver side door switch signal circuit. Refer to DLK-62, "Diagnosis Procedure".

Is the inspection result normal?

YES >> GO TO 3.

NO >> Repair harness or connector.

3.CHECK FRONT DRIVER SIDE DOOR SWITCH

Check the front driver side door switch. Refer to DLK-63, "Component Inspection".

Is the inspection result normal?

YES >> Replace BCM. Refer to <u>BCS-78, "Removal and Installation"</u>.

NO >> Replace front driver side door switch. Refer to <u>DLK-241, "Removal and Installation"</u>.

THE SEAT BELT WARNING CONTINUES SOUNDING, OR DOES NOT SOUND < SYMPTOM DIAGNOSIS >

THE SEAT BELT WARNING CONTINUES SOUNDING, OR DOES NOT SOUND

Description	В
 Seat belt warning chime does not sound even though driver seat belt is unfastened. Seat belt warning chime sounds even though driver seat belt is fastened. 	D
Diagnosis Procedure	С
1.CHECK SEAT BELT WARNING LAMP	
 Turn ignition switch ON. Check the operation of the seat belt warning lamp in the combination meter. 	D
Seat belt fastened : OFF	Ε
Seat belt unfastened : ON	
<u>Is the inspection result normal?</u> YES >> Replace BCM. NO >> GO TO 2.	F
2. CHECK UNIFIED METER AND A/C AMP. INPUT SIGNAL	G
 Connect the CONSULT-III. Select the "Data Monitor" of the "METER/M&A" and check the "BUCKLE SW" monitor value. Refer to WCS-24, "Component Function Check". Is the inspection result normal? 	Н
YES >> Replace combination meter. NO >> GO TO 3.	I
3. CHECK SEAT BELT BUCKLE SWITCH (DRIVER SIDE) SIGNAL CIRCUIT	
Check the seat belt buckle switch (driver side) signal circuit. Refer to <u>WCS-24, "Diagnosis Procedure"</u> . <u>Is the inspection result normal?</u> YES >> GO TO 4.	J
NO >> Repair harness or connector.	LZ.
4. CHECK SEAT BELT BUCKLE SWITCH (DRIVER SIDE)	K
Check the seat belt buckle switch (driver side). Refer to WCS-25, "Component Inspection".	
Is the inspection result normal?	L
 YES >> Replace unified meter and A/C amp. NO >> Replace seat belt buckle switch (driver side). Refer to <u>SB-8. "SEAT BELT BUCKLE : Removal and Installation"</u>. 	Μ

А

Ο

Ρ

< PRECAUTION >

PRECAUTION PRECAUTIONS

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

The Supplemental Restraint System such as "AIR BAG" and "SEAT BELT PRE-TENSIONER", used along with a front seat belt, helps to reduce the risk or severity of injury to the driver and front passenger for certain types of collision. This system includes seat belt switch inputs and dual stage front air bag modules. The SRS system uses the seat belt switches to determine the front air bag deployment, and may only deploy one front air bag, depending on the severity of a collision and whether the front occupants are belted or unbelted. Information necessary to service the system safely is included in the "SRS AIR BAG" and "SEAT BELT" 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 AIR BAG".
- Do not use electrical test equipment on any circuit related to the SRS unless instructed to in this Service Manual. SRS wiring harnesses can be identified by yellow and/or orange harnesses or harness connectors.

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

WARNING:

- When working near the Air Bag Diagnosis Sensor Unit or other Air Bag System sensors with the ignition ON or engine running, DO NOT use air or electric power tools or strike near the sensor(s) with a hammer. Heavy vibration could activate the sensor(s) and deploy the air bag(s), possibly causing serious injury.
- When using air or electric power tools or hammers, always switch the ignition OFF, disconnect the battery, and wait at least 3 minutes before performing any service.

Precaution for Battery Service

INFOID:000000005809241

Before disconnecting the battery, lower both the driver and passenger windows. This will prevent any interference between the window edge and the vehicle when the door is opened/closed. During normal operation, the window slightly raises and lowers automatically to prevent any window to vehicle interference. The automatic window function will not work with the battery disconnected.