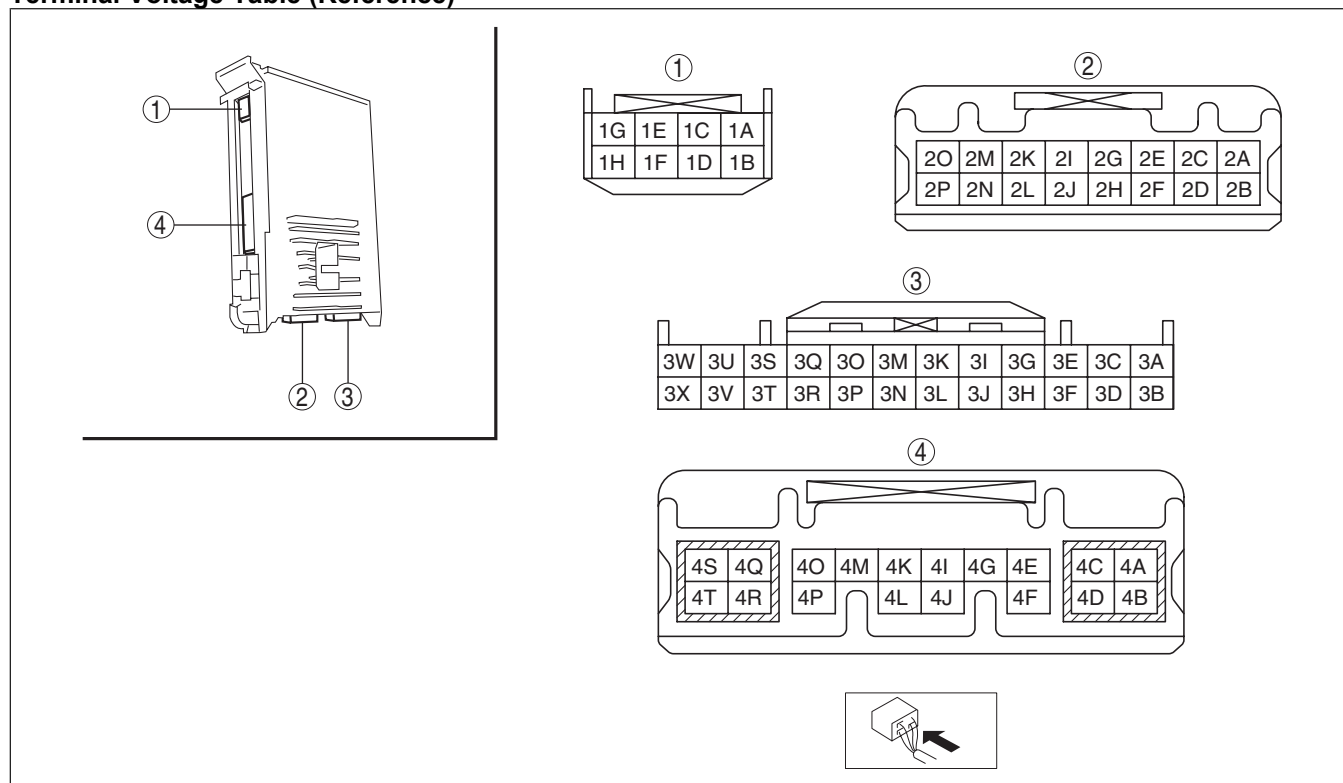


REAR BODY CONTROL MODULE (RBCM) INSPECTION

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1. Disconnect the negative battery cable. (See NEGATIVE BATTERY CABLE DISCONNECTION/CONNECTION [SKYACTIV-G 2.0, SKYACTIV-G 2.5].) (See NEGATIVE BATTERY CABLE DISCONNECTION/CONNECTION [SKYACTIV-G 2.0, SKYACTIV-G 2.5 (WITHOUT i-stop)].) (See NEGATIVE BATTERY CABLE DISCONNECTION/CONNECTION [SKYACTIV-D 2.2].)
2. Remove the following parts:
 - (1) Trunk board (See TRUNK BOARD REMOVAL/INSTALLATION.)
 - (2) Trunk end trim (See TRUNK END TRIM REMOVAL/INSTALLATION.)
 - (3) Rear scuff plate (LH) (See REAR SCUFF PLATE REMOVAL/INSTALLATION.)
 - (4) Trunk side trim (LH) (See TRUNK SIDE TRIM REMOVAL/INSTALLATION.)
3. Remove the rear body control module (RBCM) from the body with the connector connected. (See REAR BODY CONTROL MODULE (RBCM) REMOVAL/INSTALLATION.)
4. Connect the negative battery cable. (See NEGATIVE BATTERY CABLE DISCONNECTION/CONNECTION [SKYACTIV-G 2.0, SKYACTIV-G 2.5].) (See NEGATIVE BATTERY CABLE DISCONNECTION/CONNECTION [SKYACTIV-G 2.0, SKYACTIV-G 2.5 (WITHOUT i-stop)].) (See NEGATIVE BATTERY CABLE DISCONNECTION/CONNECTION [SKYACTIV-D 2.2].)
5. Verify that the voltages of each of the terminals are as indicated in the Terminal Voltage Table (Reference).
 - If the voltage is not as indicated in the table, inspect the parts under Inspection item(s).
 - If the system does not launch normally even though inspection items are normal, specify the location of the malfunction based on the instructions from the on-board diagnostic system and the symptom troubleshooting, and perform repairs.

Terminal Voltage Table (Reference)



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Terminal	Signal	Connected to	Measurement conditions	Voltage (V)	Inspection item(s)
1A*1	LIN communication ground	Intruder sensor	Under any condition	1.0 or less	<ul style="list-style-type: none"> • Intruder sensor • Related wiring harness
1B	Interior light ground	<ul style="list-style-type: none"> • Front map light • Rear map light • Vanity mirror illumination 	Under any condition	1.0 or less	<ul style="list-style-type: none"> • Front map light • Rear map light • Vanity mirror illumination • Related wiring harness
1C	—	—	—	—	—
1D	—	—	—	—	—
1E	Interior light control	Front map light	Under any condition	1.0 or less	<ul style="list-style-type: none"> • Front map light • Related wiring harness

Terminal	Signal	Connected to	Measurement conditions	Voltage (V)	Inspection item(s)
1F	—	—	—	—	—
1G*1	LIN communication	Intruder sensor	Terminal used for communication therefore determination based on terminal voltage is not possible.		
1H	Interior light power supply	<ul style="list-style-type: none"> • Front map light • Rear map light • Vanity mirror illumination (LH, RH) • Intruder sensor*1 	Under any condition	B+	<ul style="list-style-type: none"> • Front map light • Rear map light • Vanity mirror illumination (LH, RH) • Intruder sensor • Related wiring harness
2A	—	—	—	—	—
2B	Power supply	D.LOCK 25 A fuse	Under any condition	B+	<ul style="list-style-type: none"> • D.LOCK 25 A fuse • Related wiring harness
2C	Door lock control	Door lock actuator	Lock driver-side door lock switch from unlock	1.0 or less → B+ → 1.0 or less	<ul style="list-style-type: none"> • Door lock actuator • Related wiring harness
			Unlock driver-side door lock switch from lock	1.0 or less	
2D	—	—	—	—	—
2E	Door unlock control	Door lock actuator	Unlock driver-side door lock switch from lock	1.0 or less → B+ → 1.0 or less	<ul style="list-style-type: none"> • Door lock actuator • Related wiring harness
			Lock driver-side door lock switch from unlock	1.0 or less	
2F*1	Theft-deterrent horn relay control	Front body control module (FBCM)	Connected to M-MDS and using data monitor function, theft-deterrent sound activates	1.0 or less	<ul style="list-style-type: none"> • Front body control module (FBCM) • Related wiring harness
			Connected to M-MDS and using data monitor function, theft-deterrent sound does not activate	B+	
2G*2	Double locking system control	Door lock actuator	Press transmitter lock button two times (double locking system operation condition)	B+ → 1.0 or less	<ul style="list-style-type: none"> • Door lock actuator • Related wiring harness
			Except above	1.0 or less	
2H*5	Brake light control	Brake light relay	Connect the M-MDS and turn on the "STOP_LMP_CS" using the rear body control module (RBCM) simulation function	1.0 or less	<ul style="list-style-type: none"> • Brake light relay • Related wiring harness
			Connect the M-MDS and turn off the "STOP_LMP_CS" using the rear body control module (RBCM) simulation function	B+	
2I	Ignition power supply	METER1 10 A fuse	Ignition switched ON (engine off)	B+	<ul style="list-style-type: none"> • METER1 10 A fuse • Related wiring harness
			Ignition switched OFF (LOCK)	1.0 or less	
2J*5	Brake switch signal	<ul style="list-style-type: none"> • Brake switch • Start stop unit 	Brake pedal depressed	B+	<ul style="list-style-type: none"> • Brake switch • Start stop unit • Related wiring harness
			Brake pedal not depressed	1.0 or less	
2K*3	Rear fog light power supply	STOP 10 A fuse	Under any condition	B+	<ul style="list-style-type: none"> • STOP 10 A fuse • Related wiring harness
2L	—	—	—	—	—
2M	Power supply	R.WIPER 15 A fuse	Under any condition	B+	<ul style="list-style-type: none"> • R.WIPER 15 A fuse • Related wiring harness
2N	—	—	—	—	—
2O	—	—	—	—	—
2P	Power supply	ROOM 15 A fuse	Under any condition	B+	<ul style="list-style-type: none"> • ROOM 15 A fuse • Related wiring harness
3A*1	LIN communication	Theft-deterrent siren	Terminal used for communication therefore determination based on terminal voltage is not possible.		
3B	Serial communication	Start stop unit	Terminal used for communication therefore determination based on terminal voltage is not possible.		

Terminal	Signal	Connected to	Measurement conditions	Voltage (V)	Inspection item(s)
3C	Fuel sensor ground	<ul style="list-style-type: none">Fuel gauge sensor unitFuel gauge sensor unit (sub)	Under any condition	1.0 or less	<ul style="list-style-type: none">Fuel gauge sensor unitFuel gauge sensor unit (sub)Related wiring harness
3D	Serial communication	Power window main switch	Terminal used for communication therefore determination based on terminal voltage is not possible.		
3E	—	—	—	—	—
3F	Door lock switch signal	Door lock switch	Door lock switch unlocked	1.0 or less	<ul style="list-style-type: none">Door lock switchRelated wiring harness
			Other	4.5	
			Door lock switch locked	2.2	
3G	—	—	—	—	—
3H	Driver-side door key cylinder switch signal	Door key cylinder switch	Door key cylinder is turned to unlock side	1.0 or less	<ul style="list-style-type: none">Door key cylinder switchRelated wiring harness
			Other	4.5	
			Door key cylinder is turned to lock side	2.2	
3I	Fuel sensor signal	Fuel gauge sensor unit	Inspect the fuel gauge sender unit and related wiring harnesses because the terminal voltage at this terminal cannot be examined. (See FUEL GAUGE SENDER UNIT INSPECTION [2WD].) (See FUEL GAUGE SENDER UNIT INSPECTION [4WD].)		
3J*1	Lock input (lock-link switch (passenger's side, rear door))	Door lock-link switch	The passenger-side and rear doors are all locked	4.6	<ul style="list-style-type: none">Door lock-link switchRelated wiring harness
			Among the passenger-side and rear doors, at least one door is unlocked	1.0 or less	
3K*4	Fuel sensor signal (sub)	Fuel gauge sensor unit (sub)	Inspect the fuel gauge sender unit and related wiring harnesses because the terminal voltage at this terminal cannot be examined. (See FUEL GAUGE SENDER UNIT INSPECTION [4WD].)		
3L*1	Bonnet latch switch signal	Bonnet latch switch	Bonnet open (bonnet latch switch OFF)	4.6	<ul style="list-style-type: none">Bonnet latch switchRelated wiring harness
			Bonnet is closed (bonnet latch switch ON)	1.0 or less	
3M	Unlock input (front door lock-link switch (driver's door))	Door lock-link switch (driver's door)	Driver's door locked	4.6	<ul style="list-style-type: none">Door lock-link switch (driver's door)Related wiring harness
			Driver's door unlocked	1.0 or less	
3N	—	—	—	—	—
3O	Lock input (front door lock-link switch (driver's door))	Door lock-link switch (driver's door)	Driver's door locked	1.0 or less	<ul style="list-style-type: none">Door lock-link switch (driver's door)Related wiring harness
			Driver's door unlocked	4.6	
3P	—	—	—	—	—
3Q	Rear door switch (RH) signal	Door latch switch (RR)	Rear door (RH) open	1.0 or less	<ul style="list-style-type: none">Rear door switch (RH)Related wiring harness
			Rear door (RH) closed	B+	
3R	—	—	—	—	—
3S	Rear door switch (LH) signal	Door latch switch (LR)	Rear door (LH) open	1.0 or less	<ul style="list-style-type: none">Rear door switch (LH)Related wiring harness
			Rear door (LH) closed	B+	
3T	Rear seat belt (RH) switch signal	Rear buckle switch (RH)	Insert rear seat belt (RH) into buckle	B+	<ul style="list-style-type: none">Rear buckle switch (RH)Related wiring harness
			Rear seat belt (RH) not inserted into buckle	1.0 or less	
3U	Front door switch (passenger's door) signal	Door latch switch (passenger's door)	Front door (passenger's door) open	1.0 or less	<ul style="list-style-type: none">Front door switch (passenger's door)Related wiring harness
			Front door (passenger's door) closed	B+	
3V	Rear seat belt (center) switch	Rear center buckle switch	Insert rear seat belt (center) into buckle	B+	<ul style="list-style-type: none">Rear center buckle switchRelated wiring harness
			Rear seat belt (center) not inserted into buckle	1.0 or less	
3W	Front door switch (driver's door) signal	Door latch switch (driver's door)	Front door (driver's door) open	1.0 or less	<ul style="list-style-type: none">Front door switch (driver's door)Related wiring harness
			Front door (driver's door) closed	B+	

Terminal	Signal	Connected to	Measurement conditions		Voltage (V)	Inspection item(s)
3X	Rear seat belt (LH) switch	Rear buckle switch (LH)	Insert rear seat belt (LH) into buckle		B+	• Rear buckle switch (LH) • Related wiring harness
			Rear seat belt (LH) not inserted into buckle		1.0 or less	
4A	Rear window wiper motor power supply	Rear wiper motor	Ignition switched ON (engine off)		B+	• Rear wiper motor • Related wiring harness
4B	Power ground		Ignition switched OFF (LOCK)		1.0 or less	
4C	Liftgate lock actuator control	Liftgate lock actuator	Press liftgate opener switch		B+ → 1.0 or less	• Liftgate lock actuator • Related wiring harness
			Except above		1.0 or less	
4D	Brake light control	• Brake light • High-mount brake light	Brake pedal depressed		B+	• Brake light • High-mount brake light • Related wiring harness
			Brake pedal not depressed		1.0 or less	
4E	—	—	—		—	—
4F	Cargo compartment light power supply	Cargo compartment light	Under any condition		B+	• Cargo compartment light • Related wiring harness
4G	CAN_H	CAN system related module	Terminal used for communication therefore determination based on terminal voltage is not possible.			
4H	—	—	—		—	—
4I	CAN_H	CAN system related module	Terminal used for communication therefore determination based on terminal voltage is not possible.			
4J	CAN_L	CAN system related module	Terminal used for communication therefore determination based on terminal voltage is not possible.			
4K	Liftgate latch switch signal	Cargo compartment light switch	Liftgate open		1.0 or less	• Cargo compartment light switch • Related wiring harness
			Liftgate closed		B+	
4L	CAN_L	CAN system related module	Terminal used for communication therefore determination based on terminal voltage is not possible.			
4M	Liftgate opener switch signal	Liftgate opener switch	Liftgate opener switch pressed		1.0 or less	• Liftgate opener switch • Related wiring harness
			Liftgate opener switch not pressed		4.5	
4N	—	—	—		—	—
4O	—	—	—		—	—
4P	Cargo compartment light control	Cargo compartment light	Cargo compartment light switched ON	Liftgate open	1.0 or less	• Cargo compartment light • Related wiring harness
				Liftgate closed	B+	
4Q*3	Rear fog light control	Rear fog light	Light switch at TNS position	Rear fog light at OFF	1.0 or less	• Rear fog light • Related wiring harness
				Rear fog light at ON	B+	
4R	Signal ground	Body ground	Under any condition		1.0 or less	• Related wiring harness
4S	Back-up light control	• Back-up light (LH, RH) • Auto dimming mirror	Ignition switched ON (engine off)	• Selector lever at R position (AT vehicle) • Shift lever at R position (MT vehicle)	B+	• Back-up light switch • Auto dimming mirror • Related wiring harness
				Other	1.0 or less	
4T	Rear wiper motor control (LO)	Rear wiper motor	Rear wiper switch at ON		1.0 or less	• Rear wiper motor • Related wiring harness
			Rear wiper switch at OFF		B+	

- *1 : Vehicles with theft-deterrent system
*2 : Vehicles with double locking system
*3 : Vehicles with rear fog light
*4 : 4WD vehicles
*5 : Vehicles with smart city brake support