6. Diagnostics Chart with Symptom 5003619

A: SYMPTOM CHART 5003619F22

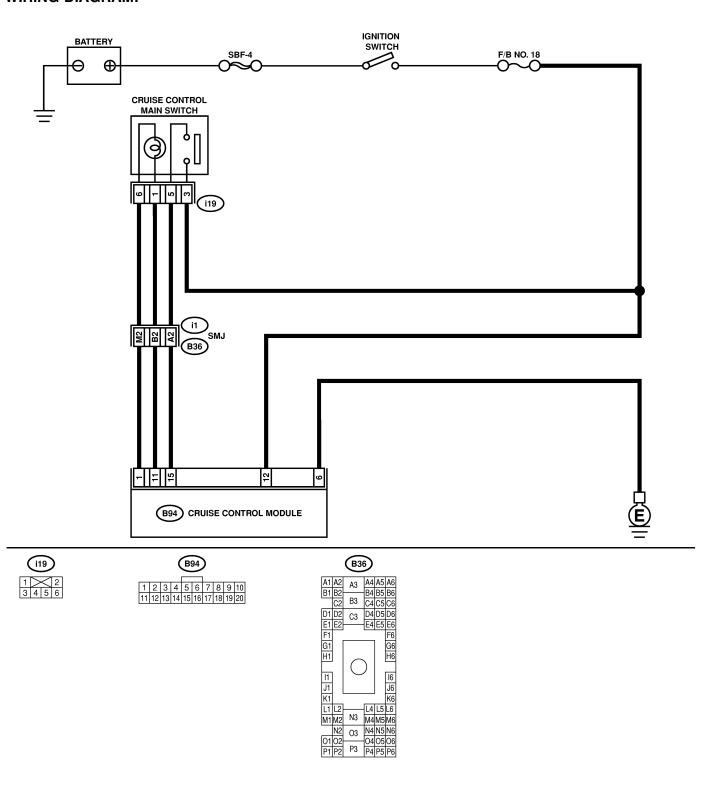
	Symptom	Repair area	Reference
1	Cruise control main switch is not turned ON.	(1) Check power supply.	<ref. cc-14,="" chart="" check="" diagnostics="" power="" supply,="" symptom.="" to="" with=""></ref.>
		(2) Check cruise control main switch.	<ref. cc-16,="" chart="" check="" control="" cruise="" diagnostics="" main="" switch,="" symptom.="" to="" with=""></ref.>
	Cruise control cannot be set.	(1) Check SET/COAST switch.	<ref. cc-19,="" chart="" check="" command="" control="" cruise="" diagnostics="" switch,="" symptom.="" to="" with=""></ref.>
		(2) Check stop light switch and brake switch.	<ref. cc-21,="" check="" light<br="" stop="" to="">SWITCH AND BRAKE SWITCH, Diag- nostics Chart with Symptom.></ref.>
		(3) Check clutch switch (MT).	<ref. cc-23,="" check="" clutch<br="" to="">SWITCH (MT), Diagnostics Chart with Symptom.></ref.>
2		(4) Check inhibitor switch (AT).	<ref. cc-25,="" check="" inhibitor<br="" to="">SWITCH (AT), Diagnostics Chart with Symptom.></ref.>
		(5) Check vehicle speed sensor.	<ref. 22="" cc-29,="" dtc="" to="" vehicle<br="">SPEED SENSOR, Diagnostics Chart with Trouble Code.></ref.>
		(6) Check motor drive system.	<ref. 35="" 36<br="" and="" cc-33,="" dtc="" to="">ACTUATOR MOTOR, Diagnostics Chart with Trouble Code.></ref.>
		(7) Check motor clutch drive system.	<ref. 37="" actuator<br="" cc-35,="" dtc="" to="">MOTOR CLUTCH, Diagnostics Chart with Trouble Code.></ref.>
	Vehicle speed is not held within set speed ±3 km/h (±2 MPH).	(1) Check vehicle speed sensor.	<ref. 22="" cc-29,="" dtc="" to="" vehicle<br="">SPEED SENSOR, Diagnostics Chart with Trouble Code.></ref.>
3		(2) Check motor drive system.	<ref. 35="" 36<br="" and="" cc-33,="" dtc="" to="">ACTUATOR MOTOR, Diagnostics Chart with Trouble Code.></ref.>
		(3) Check motor clutch drive system.	<ref. 37="" actuator<br="" cc-35,="" dtc="" to="">MOTOR CLUTCH, Diagnostics Chart with Trouble Code.></ref.>
	Vehicle speed does not increase or does not return to set speed after RESUME/ACCEL switch has been	(1) Check RESUME/ACCEL switch.	<ref. cc-19,="" chart="" check="" command="" control="" cruise="" diagnostics="" switch,="" symptom.="" to="" with=""></ref.>
4	pressed.	(2) Check motor drive system.	<ref. 35="" 36<br="" and="" cc-33,="" dtc="" to="">ACTUATOR MOTOR, Diagnostics Chart with Trouble Code.></ref.>
		(3) Check motor clutch drive system.	<ref. 37="" actuator<br="" cc-35,="" dtc="" to="">MOTOR CLUTCH, Diagnostics Chart with Trouble Code.></ref.>
	Vehicle speed does not decrease after SET/COAST switch has been pressed.	(1) Check SET/COAST switch.	<ref. cc-19,="" chart="" check="" command="" control="" cruise="" diagnostics="" switch,="" symptom.="" to="" with=""></ref.>
5		(2) Check motor drive system.	<ref. 35="" 36<br="" and="" cc-33,="" dtc="" to="">ACTUATOR MOTOR, Diagnostics Chart with Trouble Code.></ref.>
		(3) Check motor clutch drive system.	<ref. 37="" actuator<br="" cc-35,="" dtc="" to="">MOTOR CLUTCH, Diagnostics Chart with Trouble Code.></ref.>

Symptom		Repair area	Reference
	Cruise control is not released after CANCEL switch has been pressed.	(1) Check CANCEL switch.	<ref. cc-19,="" chart="" check="" command="" control="" cruise="" diagnostics="" switch,="" symptom.="" to="" with=""></ref.>
6		(2) Check motor drive system.	<ref. 35="" 36<br="" and="" cc-33,="" dtc="" to="">ACTUATOR MOTOR, Diagnostics Chart with Trouble Code.></ref.>
		(3) Check motor clutch drive system.	<ref. 37="" actuator<br="" cc-35,="" dtc="" to="">MOTOR CLUTCH, Diagnostics Chart with Trouble Code.></ref.>
	Cruise control is not released after brake pedal has been depressed.	(1) Check stop light switch and brake switch.	<ref. cc-21,="" check="" light<br="" stop="" to="">SWITCH AND BRAKE SWITCH, Diag- nostics Chart with Symptom.></ref.>
7		(2) Check motor drive system.	<ref. 35="" 36<br="" and="" cc-33,="" dtc="" to="">ACTUATOR MOTOR, Diagnostics Chart with Trouble Code.></ref.>
		(3) Check motor clutch drive system.	<ref. 37="" actuator<br="" cc-35,="" dtc="" to="">MOTOR CLUTCH, Diagnostics Chart with Trouble Code.></ref.>
	Cruise control is not released after clutch pedal has been depressed (MT).	(1) Check clutch switch.	<ref. cc-23,="" check="" clutch<br="" to="">SWITCH (MT), Diagnostics Chart with Symptom.></ref.>
8		(2) Check motor drive system.	<ref. 35="" 36<br="" and="" cc-33,="" dtc="" to="">ACTUATOR MOTOR, Diagnostics Chart with Trouble Code.></ref.>
		(3) Check motor clutch drive system.	<ref. 37="" actuator<br="" cc-35,="" dtc="" to="">MOTOR CLUTCH, Diagnostics Chart with Trouble Code.></ref.>

B: CHECK POWER SUPPLY 5003619F23

TROUBLE SYMPTOM:

Cruise control can be set normally, but indicator does not come on. (When main switch is pressed.) **WIRING DIAGRAM:**



No.	Step	Check	Yes	No
1	CHECK POWER SUPPLY. 1) Turn ignition switch OFF. 2) Disconnect cruise control module harness connector. 3) Turn ignition switch ON. 4) Measure voltage between harness connector terminal and chassis ground. Connector & terminal (B94) No. 12 (+) — Chassis ground (-):	Is the voltage more than 10 V?	Go to step 2.	 Check fuse No. 18 (in fuse & relay box). Check harness for open or short between cruise control module and fuse & relay box.
2	CHECK GROUND CIRCUIT. 1) Turn ignition switch OFF. 2) Measure resistance between harness connector terminal and chassis ground. Connector & terminal (B94) No. 6 (+) — Chassis ground (-):	Is the resistance less than 10 Ω ?	Power supply and ground circuit are OK.	Repair harness.

DIAGNOSTICS CHART WITH SYMPTOM

Cruise Control System (DIAGNOSTICS)

C: CHECK CRUISE CONTROL MAIN SWITCH S003619F24

TROUBLE SYMPTOM:

Cruise control main switch is not turned ON and cruise control cannot be set.

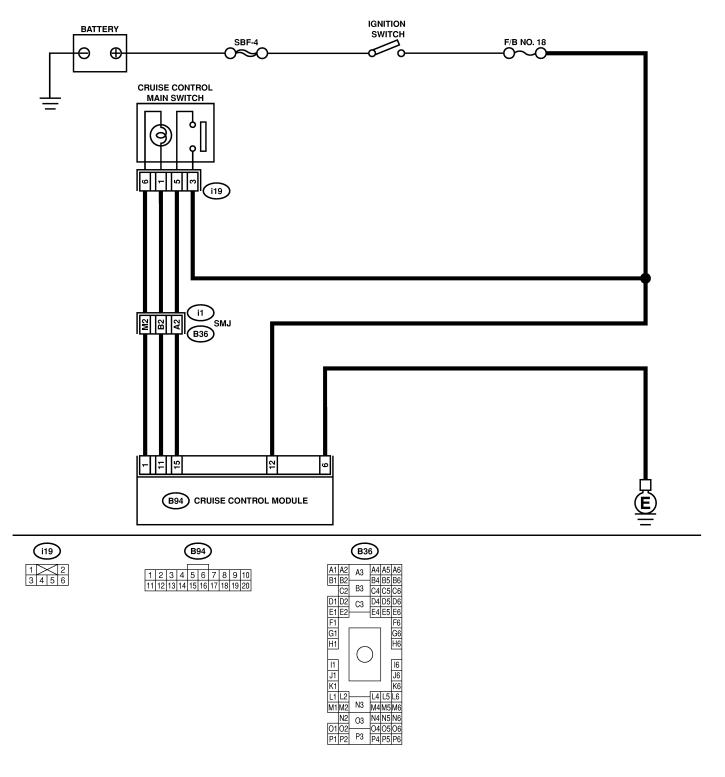
NOTE:

When the main relay (built-in cruise control module) operates, the main switch circuit is in normal condition.

The main relay operation can be checked by hearing the operation sounds.

This operation sounds will be heard when ignition switch and cruise control main switch are turned to ON.

WIRING DIAGRAM:



No.	Step	Check	Yes	No
1	CHECK CRUISE CONTROL MAIN SWITCH CIRCUIT. 1) Turn ignition switch OFF. 2) Disconnect cruise control main switch harness connector. 3) Turn ignition switch ON. 4) Measure voltage between harness connector terminal and chassis ground. Connector & terminal (i19) No. 3 (+) — Chassis ground (-):	Is the voltage more than 10 V?	Go to step 2.	 Check fuse No. 18 (in fuse & relay box). Check harness for open or short between cruise control main switch and fuse & relay box.
2	CHECK CRUISE CONTROL MAIN SWITCH CIRCUIT. 1) Turn ignition switch OFF. 2) Disconnect cruise control module harness connector. 3) Measure resistance between cruise control module harness connector terminal and cruise control main switch harness connector terminal. Connector & terminal (B94) No. 15 (+) — (i19) No. 5 (-): (B94) No. 1 (+) — (i19) No. 6 (-): (B94) No. 11(+) — (i19) No. 1 (-):	Is the resistance less than 10 Ω ?	Go to step 3.	Repair harness.
3	CHECK CRUISE CONTROL MAIN SWITCH. Remove and check cruise control main switch. <ref. cc-5,="" control="" cruise="" main="" switch.="" to=""></ref.>	Is cruise control main switch OK?	Replace cruise control module.	Replace cruise control main switch.

DIAGNOSTICS CHART WITH SYMPTOM

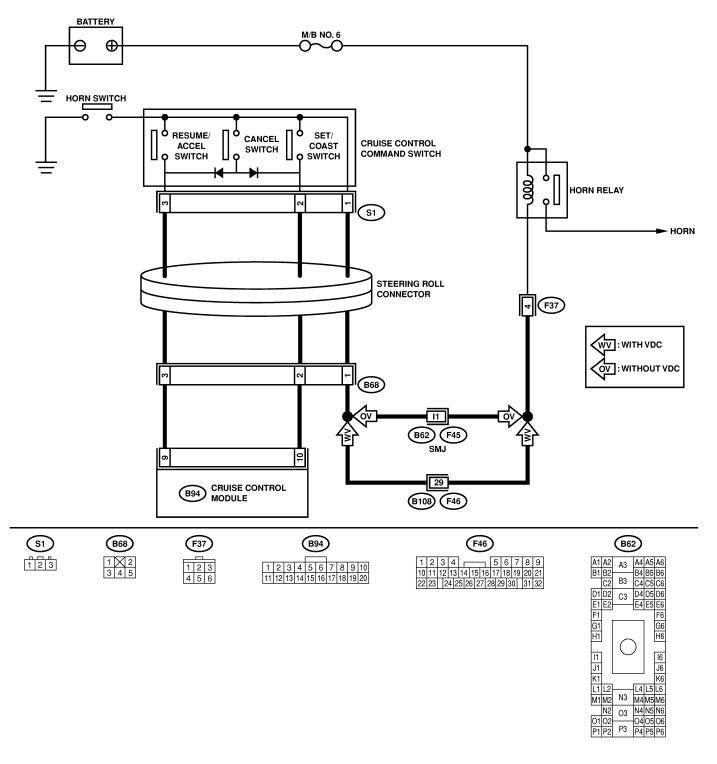
Cruise Control System (DIAGNOSTICS)

D: CHECK CRUISE CONTROL COMMAND SWITCH S003619F25

TROUBLE SYMPTOM:

Cruise control cannot be set. (Cancelled immediately.)

WIRING DIAGRAM:



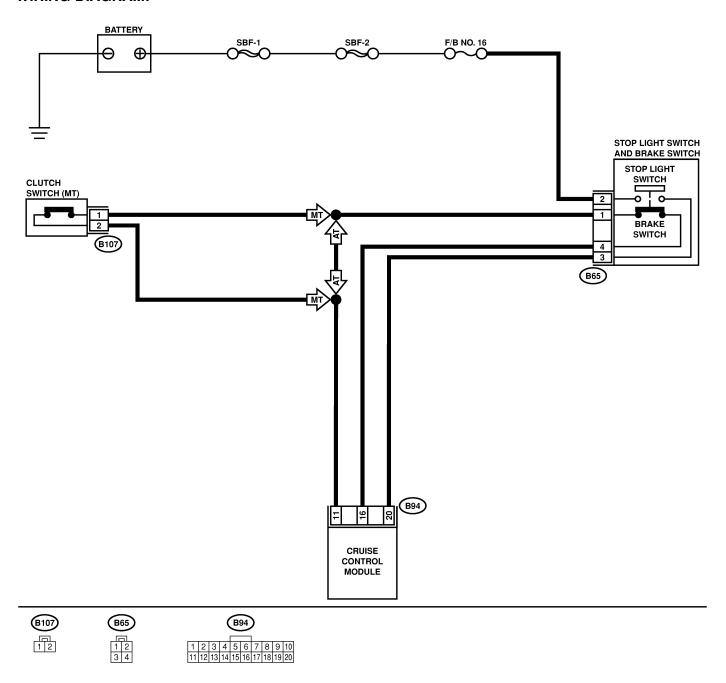
No.	Step	Check	Yes	No
1	CHECK SET/COAST SWITCH CIRCUIT. 1) Turn ignition switch OFF. 2) Disconnect cruise control module harness connector. 3) Measure voltage between harness connector terminal and chassis ground when SET/COAST switch is pressed and not pressed. Connector & terminal (B94) No. 10 (+) — Chassis ground (-):	Is the voltage 0 V when SET/COAST switch is not pressed? Is the voltage more than 10 V when SET/ COAST switch is pressed?	Go to step 2.	Go to step 4.
2	CHECK RESUME/ACCEL SWITCH CIRCUIT. Measure voltage between harness connector terminal and chassis ground when RESUME/ ACCEL switch is pressed and not pressed. Connector & terminal (B94) No. 9 (+) — Chassis ground (-):	Is the voltage 0 V when RESUME/ACCEL switch is not pressed? Is the voltage more than 10 V when RESUME/ACCEL switch is pressed?	Go to step 3.	Go to step 4.
3	CHECK CANCEL SWITCH CIRCUIT. Measure voltage between harness connector terminal and chassis ground when CANCEL switch is pressed and not pressed. Connector & terminal (B94) No. 9 (+) — Chassis ground (-): (B94) No. 10 (+) — Chassis ground (-):	Is the voltage 0 V when CANCEL switch is not pressed? Is the voltage more than 10 V when CANCEL switch is pressed?	Cruise control command switch circuit is OK.	Go to step 4.
4	CHECK POWER SUPPLY FOR COMMAND SWITCH. Check horn operation.	Does horn sound?	Go to step 5.	Check fuse No. 6 (in main fuse box). Check horn relay. <ref. com-4,="" horn="" inspection,="" relay,="" system.="" to=""> Check harness for open or short between cruise control command switch and fuse & relay box.</ref.>
5	CHECK CRUISE CONTROL COMMAND SWITCH. Remove and check cruise control command switch. <ref. cc-6,="" command="" control="" cruise="" switch.="" to=""></ref.>	Is cruise control command switch OK?	Check harness between cruise control command switch and cruise control module.	Replace cruise control command switch.

E: CHECK STOP LIGHT SWITCH AND BRAKE SWITCH S003619F26

TROUBLE SYMPTOM:

Cruise control cannot be set.

WIRING DIAGRAM:



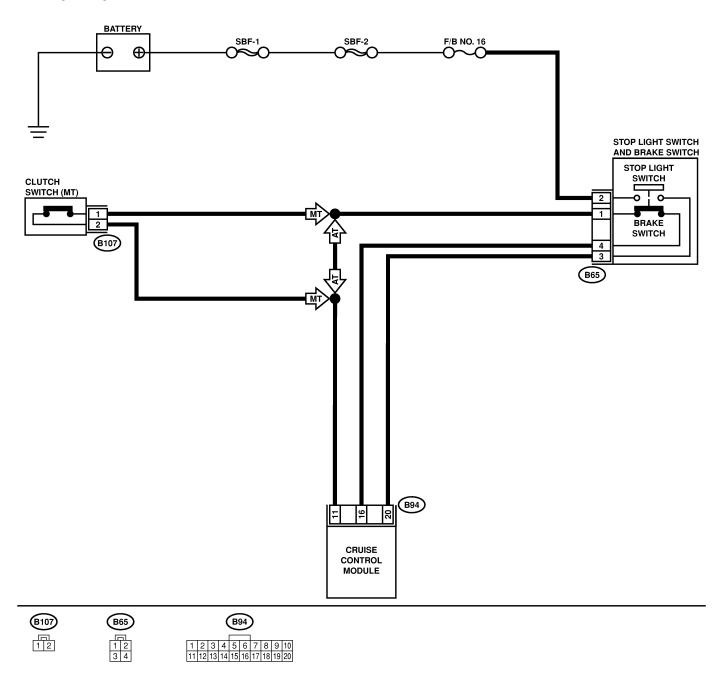
No.	Step	Check	Yes	No
1	CHECK STOP LIGHT SWITCH AND BRAKE SWITCH CIRCUIT. 1) Turn ignition switch OFF. 2) Disconnect stop light switch and brake switch harness connector. 3) Turn ignition switch ON. 4) Turn cruise control main switch ON. 5) Measure voltage between harness connector terminal and chassis ground. Connector & terminal (B65) No. 2 (+) — Chassis ground (-):	Is the voltage more than 10 V?	Go to step 2.	Check fuse No. 16 (in fuse & relay box). Check harness for open or short between stop light/brake switch and fuse & relay box.
2	CHECK STOP LIGHT SWITCH AND BRAKE SWITCH CIRCUIT. Measure voltage between harness connector terminal and chassis ground. Connector & terminal (B65) No. 1 (+) — Chassis ground (-):	Is the voltage more than 10 V?	Go to step 3.	 Check harness for open or short between stop light/brake switch and cruise control module (AT). Check clutch switch and the circuit (MT).
3	CHECK STOP LIGHT SWITCH AND BRAKE SWITCH CIRCUIT. 1) Turn cruise control main switch and ignition switch OFF. 2) Disconnect cruise control module harness connector. 3) Measure resistance between cruise control module harness connector terminal and stop light switch and brake switch harness connector terminal. Connector & terminal (B94) No. 20 (+) — (B65) No. 3 (-): (B94) No. 16 (+) — (B65) No. 4 (-):	Is the resistance less than 10 Ω ?	Go to step 4.	Repair harness.
4	CHECK STOP LIGHT SWITCH AND BRAKE SWITCH. Remove and check stop light switch and brake switch. <ref. and="" brake="" cc-7,="" stop="" switch.="" to=""></ref.>	Is stop light switch and brake switch OK?	Stop light switch and brake switch circuit are OK.	Replace stop light switch and brake switch.

F: CHECK CLUTCH SWITCH (MT) 5003619F27

TROUBLE SYMPTOM:

Cruise control cannot be set.

WIRING DIAGRAM:



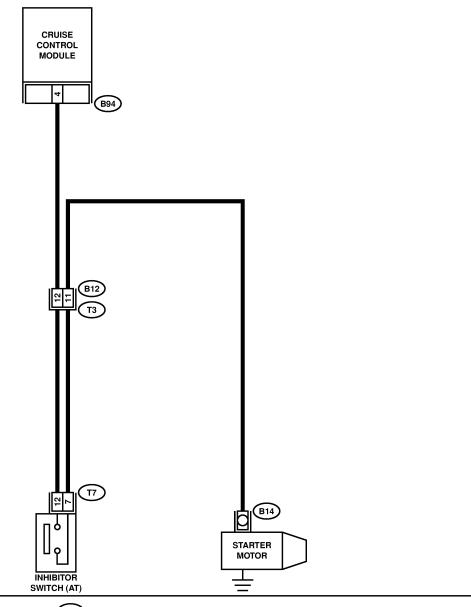
No.	Step	Check	Yes	No
1	CHECK CLUTCH SWITCH CIRCUIT. 1) Turn ignition switch OFF. 2) Disconnect clutch switch harness connector. 3) Turn ignition switch ON. 4) Turn cruise control main switch ON. 5) Measure voltage between harness connector terminal and chassis ground. Connector & terminal (B107) No. 2 (+) — Chassis ground (-):	Is the voltage more than 10 V?	Go to step 2.	Check harness for open or short between clutch switch and cruise control module.
2	CHECK CLUTCH SWITCH CIRCUIT. 1) Turn cruise control main switch and ignition switch OFF. 2) Disconnect stop light switch and brake switch harness connector. 3) Measure resistance between clutch switch harness connector terminal and stop light switch and brake switch harness connector terminal. Connector & terminal (B107) No. 1 (+) — (B65) No. 1 (-):	Is the resistance less than 10 Ω ?	Go to step 3.	Repair harness.
3	CHECK CLUTCH SWITCH. Remove and check clutch switch. <ref. cc-8,="" clutch="" switch.="" to=""></ref.>	Is clutch switch OK?	Clutch switch circuit is OK.	Replace clutch switch.

G: CHECK INHIBITOR SWITCH (A/T) 5003619F28

TROUBLE SYMPTOM:

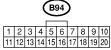
Cruise control cannot be set.

WIRING DIAGRAM:



T7 1 2 3 4 5 6 7 8 9 10 11 12





No.	Step	Check	Yes	No
1	CHECK INHIBITOR SWITCH CIRCUIT. 1) Turn ignition switch OFF. 2) Disconnect inhibitor switch harness connector. 3) Turn ignition switch ON. 4) Turn cruise control main switch ON. 5) Measure voltage between harness connector terminal and chassis ground. Connector & terminal (T7) No. 12 (+) — Chassis ground (-):	Is the voltage more than 10 V?	Go to step 2.	Check harness for open or short between inhibitor switch and cruise control module.
2	CHECK INHIBITOR SWITCH CIRCUIT. 1) Turn cruise control main switch and ignition switch OFF. 2) Disconnect starter motor harness connector. 3) Measure resistance between inhibitor switch harness connector terminal and chassis ground. Connector & terminal (T7) No. 7 (+) — (B14) No. 1 (-):	Is the resistance less than 10 Ω ?	Go to step 3.	Repair harness.
3	CHECK INHIBITOR SWITCH. Remove and check inhibitor switch. <ref. cc-9,="" inhibitor="" switch.="" to=""></ref.>	Is inhibitor switch OK?	Inhibitor switch circuit is OK.	Replace inhibitor switch.