DTC	B2796	NO COMMUNICATION IN IMMOBILISER SYSTEM

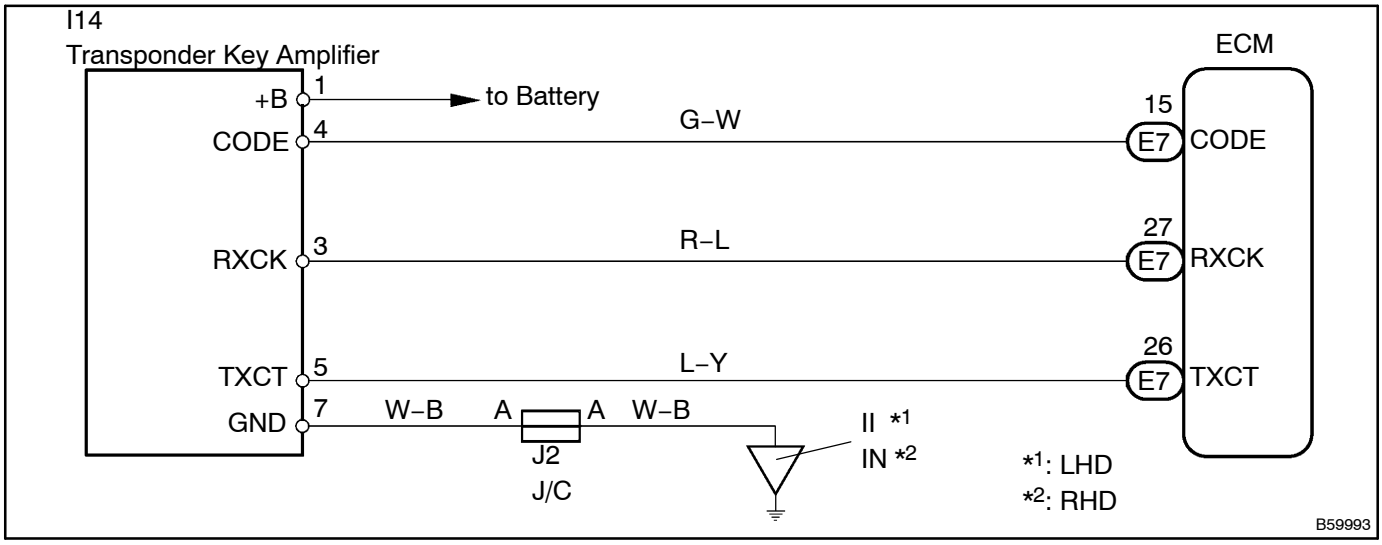
DTC	B2798	COMMUNICATION MALFUNCTION NO.2

CIRCUIT DESCRIPTION

This DTC is output if no communication exists between the key and amplifier when the key is inserted.

DTC No.	DTC detection condition	Trouble area
B2796	No communication	• Key • Transponder key amplifier • Wire harness • ECM
B2798	Communication error	• Key • Transponder key amplifier • Wire harness • ECM

WIRING DIAGRAM



INSPECTION PROCEDURE

1	READ VALUE OF HAND–HELD TESTER

(a) Connect the hand–held tester to the DLC3.
(b) Turn the ignition switch ON and push the hand–held tester main switch ON.
(c) Select the item ”KEY TYPE” in the DATA LIST and read its value displayed on the hand–held tester.
OK:
Key type / MASTER or SUB

OK	MALFUNCTION OCCURS IN ENGINE INCLUDING ECM

NG

2 CHECK WHETHER ENGINE STARTS WITH OTHER KEYS

(a) Check whether the engine starts with the other keys for the vehicle.

NG → **Go to step 4**

OK

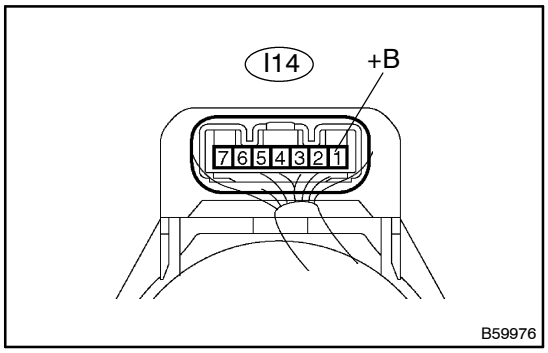
3 REREGISTER OR REPLAE KEY THAT DOES NOT START ENGINE

(a) Check whether the engine starts, after registering of the key that does not start the engine has been done.

OK → **END**

NG → **TRANSPONDER CHIP OF A SPECIFIC KEY IS DETECTIVE AND REPLACE KEY**

4 CHECK TRANSPONDER KEY AMPLIFIER (+B)



(a) Insert the already registered master key in the key cylinder.

(b) Check the voltage between the terminal of the I14 transponder key amplifier connector and the body ground.

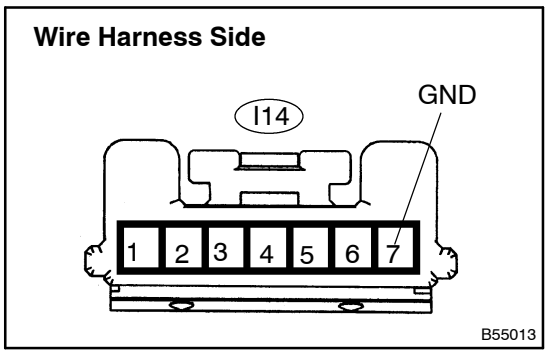
Standard:

Symbols (Terminal No.)	Specified condition
+B (I14–1) ⇔ Body ground	10 – 14 V

NG → **REPAIR OR REPLACE WIRE HARNESS AND CONNECTOR**

OK

5 CHECK TRANSPONDER KEY AMPLIFIER (GND)



(a) Disconnect the I14 transponder key amplifier connector.

(b) Check the continuity between the terminal of the transponder key amplifier connector and the body ground.

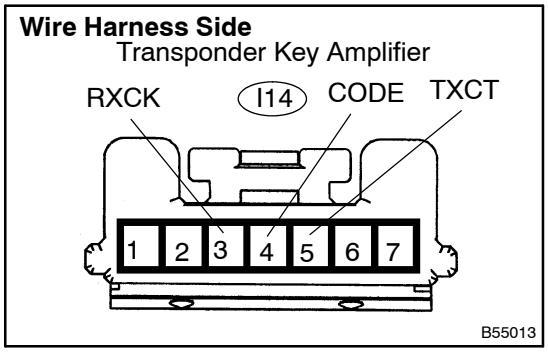
Standard:

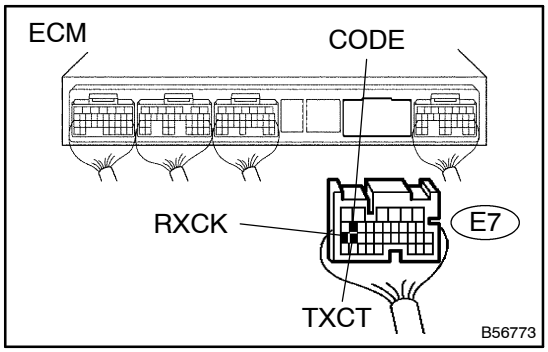
Symbols (Terminal No.)	Specified condition
GND (I14–7) ⇔ Body ground	Continuity

NG → **REPAIR OR REPLACE WIRE HARNESS AND CONNECTOR**

OK

6 CHECK WIRE HARNESS





(a) Disconnect the I14 transponder key amplifier and E7 ECM connectors.

(b) Check the continuity between each terminal of the transponder key amplifier wire harness side connector and the ECM wire harness side connector.

Standard (Check for open):

Symbols (Terminal No.) (ECM ⇔ Amplifier)	Specified condition
CODE (E7–15) ⇔ CODE (I14–4)	Continuity
RXCK (E7–27) ⇔ RXCK (I14–3)	Continuity
TXCT (E7–26) ⇔ TXCT (I14–5)	Continuity

Standard (Check for short):

Symbols (Terminal No.) (ECM or Amplifier ⇔ Body ground)	Specified condition
CODE (E7–15) or CODE (I14–4) ⇔ Body ground	No continuity
RXCK (E7–27) or RXCK (I14–3) ⇔ Body ground	No continuity
TXCT (E7–26) or TXCT (I14–5) ⇔ Body ground	No continuity

NG → **REPAIR OR REPLACE WIRE HARNESS AND CONNECTOR**

OK

7 CHECK TRANSPONDER KEY AMPLIFIER

(a) Check that the engine will start when connected to a new or normal transponder key amplifier.

OK → **NORMAL**

NG

REPLACE ECM