05HTW–01

INSPECTION

1. WIRELESS DOOR LOCK DIAGNOSTIC MODE

(a) Switch to self–diagnostic mode on the hand–held tester.

HINT:

This mode checks signal transmission/reception between the door control transmitter, door control receiver and theft warning ECU (theft deterrent ECU). If all of a customer's door control transmitters do not function, it is possible the door control transmitter(s) and/or wire harness is malfunctioning.

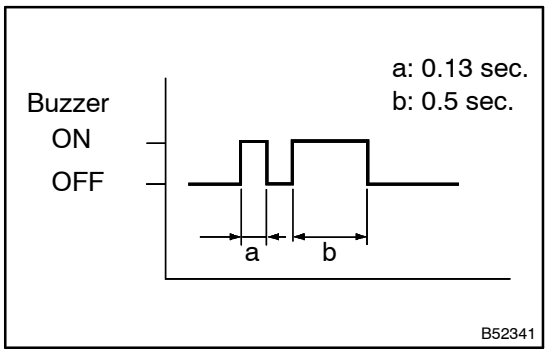
(1) Switch to self–diagnostic mode on the hand–held tester.

(2) Turn the ignition switch ON.

(3) Please refer to the hand–held tester operator's manual for further details.

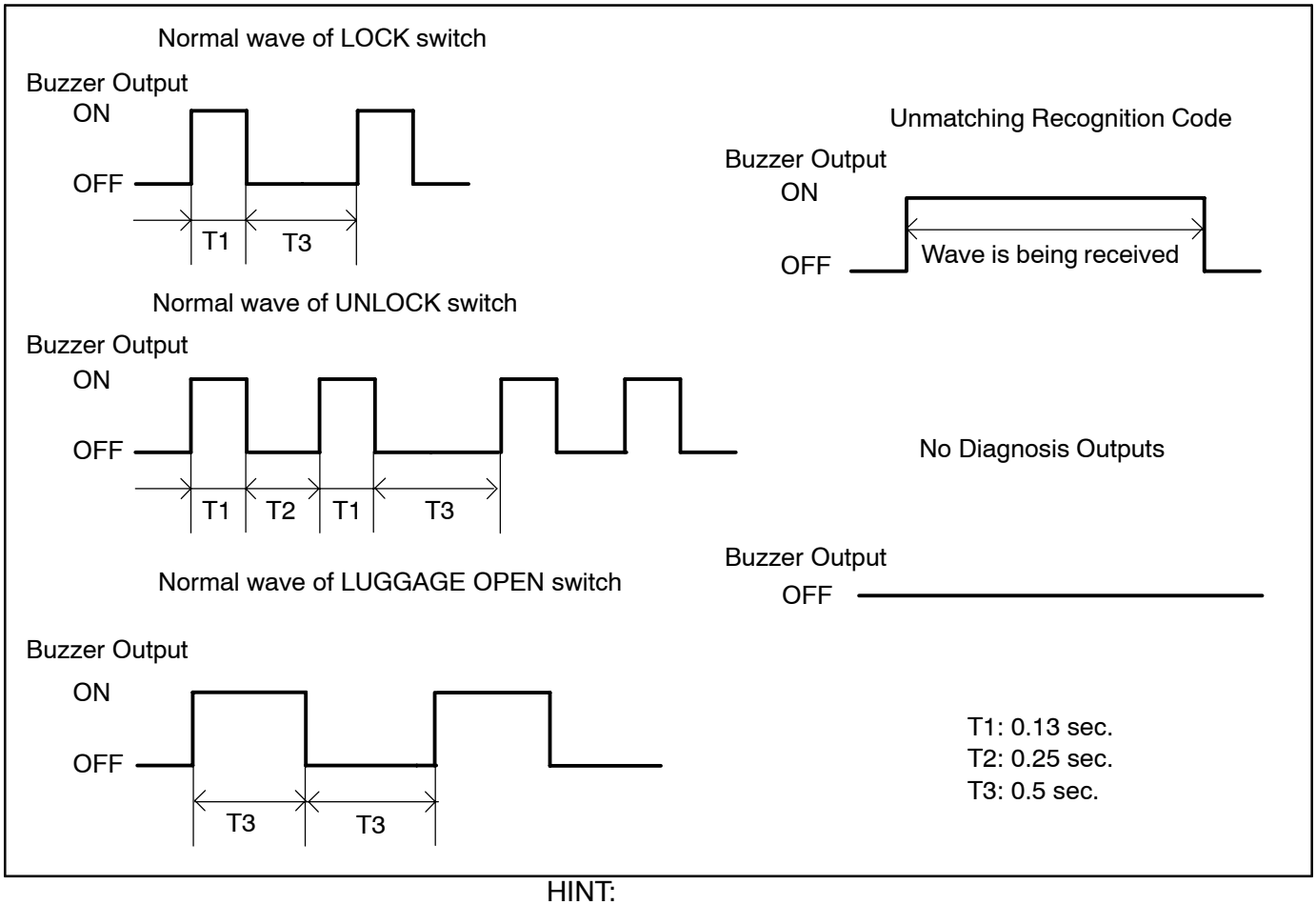
HINT:

Do not lock or unlock doors during self–diagnostic mode.



(b) Check that the system has switched to self–diagnostic mode by listening to the wireless door lock buzzer. The buzzer should sound according to the illustration on the left.

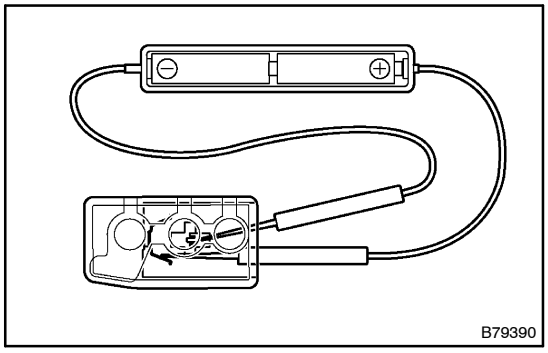
(c) Inspect the diagnosis outputs when the door control transmitter switch is held down (the diagnosis outputs can be checked with the sound of the wireless door lock buzzer).



HINT:

If "unmatching recognition code" or "no diagnosis output" is output, perform the inspections below.

- Wireless door lock transmitter.
- Door control receiver (inner mirror).
- Door control receiver (luggage).
- Wire harness between the door control receiver and theft warning ECU assy.



2. INSPECTION TRANSMITTER SUB–ASSY MODULE SET DOOR CONTROL

(a) Inspect operation of the transmitter.

(1) Remove the outer cover using a screwdriver.

(2) Remove the battery (lithium battery) from the transmitter.

(3) Install a new or normal battery (lithium battery).

HINT:

When a new or normal battery is not available, first connect 2 new 1.5 V batteries in series. Then connect leads to the batteries and use the leads to apply 3 V to the transmitter, as shown in the illustration.

(4) From outside the vehicle, approximately 1 m (3.28 ft) from the driver side outside door handle, test the transmitter by pointing its key plate at the vehicle and pressing a transmitter switch.

OK:

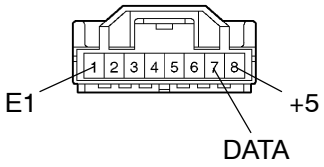
The door lock can be operated via the transmitter

HINT:

- The operational are differs depending on the user, the way the transmitter is held and the location.
- The transmitter's faint electric waves may be affected if the area has strong electric wave or noise. The transmitter's operation area may be shortened or the transmitter may not function.

Wire harness Side

I19
Door Control Receiver (Inner Mirror)



B79376

3. INSPECT DOOR CONTROL RECEIVER (INNER MIRROR)

(a) Disconnect the I19 receiver connector.

(b) Measure the resistance of each terminal of the wire harness side connector and body ground.

Standard:

Tester Connection	Specified Condition
I19–8 (+5) – Body ground	Below 1 Ω
I19–5 (E1) – Body ground.	Below 1 Ω

If the result is not as specified, repair or replace the wire harness and connector.

(c) Reconnect the I19 receiver connector.

(d) Measure the resistance of each terminal of the wire harness side connector.

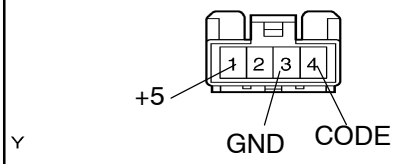
Standard:

Tester Connection	Condition	Specified Condition
I19–7 (DATA) – Body ground	No key in ignition key cylinder, all doors closed and each transmitter switch OFF → ON	Below 1 V → Approx. 6 to 7 V → Below 1 V

If the result is not as specified, replace the door control receiver.

Wire harness Side

D16
Door Control Receiver (Luggage)



B74813

4. INSPECT DOOR CONTROL RECEIVER (LUGGAGE)

(a) Disconnect the D16 receiver connector.

(b) Measure the resistance and voltage between the wire harness side connector and body ground.

Standard:

Tester Connection	Specified Condition
D16–1 (+5) – Body ground	Below 1 Ω
D16–3 (GND) – Body ground.	Below 1 Ω

If the result is not as specified, repair or replace the wire harness and connector.

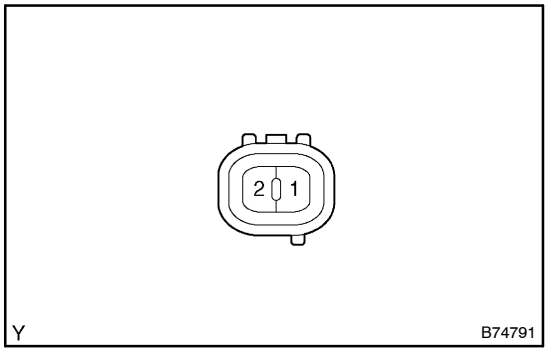
(c) Reconnect the D16 receiver connector.

(d) Measure the voltage between the terminal and body ground.

Standard:

Tester Connection	Condition	Specified Condition
D16–4 (CODE) – Body ground	No key in ignition key cylinder, all doors closed and each transmitter switch OFF → ON	Below 1 V → Approx. 6 to 7 V → Below 1 V

If the result is not as specified, replace the door control receiver.



5. INSPECT WIRELESS DOOR BUZZER

(a) Disconnect the K1 receiver connector.

(b) Measure the resistance of each terminal of the wire harness side connector and body ground.

Standard:

Tester Connection	Specified Condition
K1–1 – Body ground	Below 1 Ω
K1–2 – Body ground.	Below 1 Ω

If the result is not as specified, repair or replace the wire harness and connector.

(c) Reconnect the K1 receiver connector.

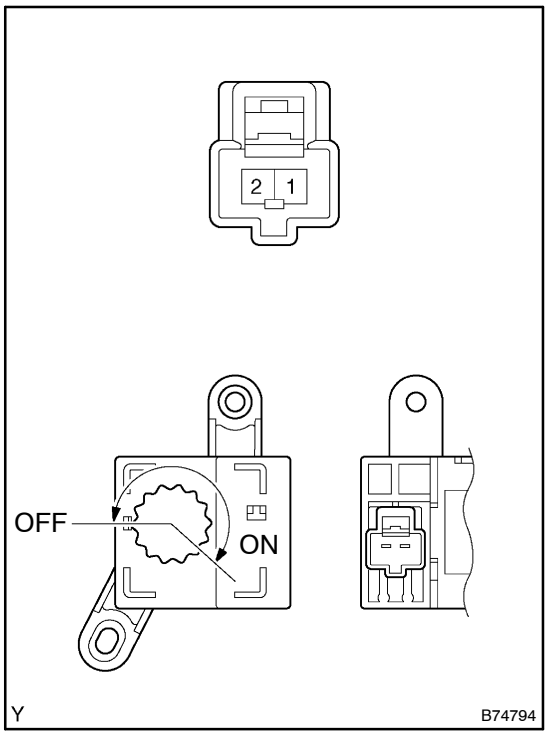
(d) Measure the resistance between terminals 1 and 2 of the buzzer.

Standard: Approximately 1 kΩ

NOTICE:

- **The buzzer circuit is built into the theft warning ECU, not into the buzzer itself.**
- **When battery voltage is directly applied to the buzzer, the buzzer does not sound.**

If the result is not as specified, replace the door control receiver.



6. INSPECT WIRELESS DOOR BUZZER CONTROLLER

(a) Measure the resistance between terminals 1 and 2 of the buzzer controller.

Standard:

Tester Connection	Condition	Specified Condition
1 – 2	OFF (knob turned fully counter-clockwise)	10 kΩ or higher
1 – 2	OFF → ON (knob turned clockwise)	10 kΩ or higher → 10 kΩ τo below 1 Ω

If the result is not as specified, replace the wireless door lock buzzer controller.