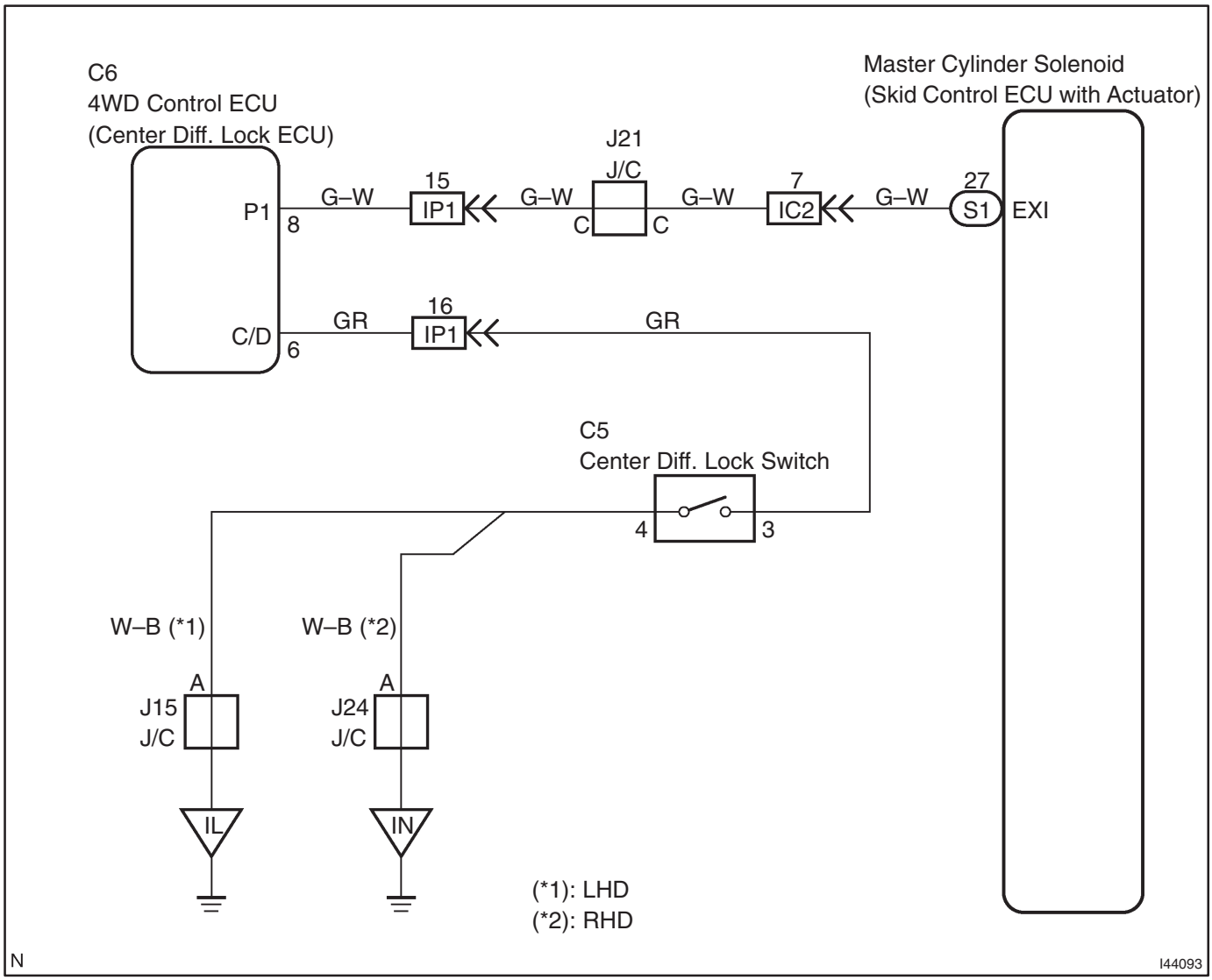
DTC	C1340/47	OPEN CIRCUIT IN CENTER DIFFERENTIAL LOCK SIGNAL (DURING CENTER DIFFERENTIAL LOCK ON)

CIRCUIT DESCRIPTION

When the center differential is locked, VSC control turns off and the VSC OFF indicator illuminates.

DTC No.	DTC Detection Condition	Trouble Area
C1340/47	When the terminal IG1 voltage is between 10 and 14 V, there is an open in the center differential lock circuit for 2 seconds or more.	• Center diff. lock switch • Center diff. lock switch circuit • 4WD control ECU

WIRING DIAGRAM



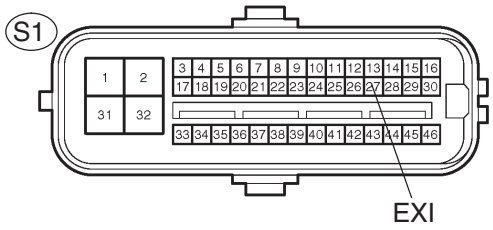
INSPECTION PROCEDURE

NOTICE:

When replacing the master cylinder solenoid, perform zero point calibration (see page 05–744).

1 INSPECT SKID CONTROL ECU (EXI TERMINAL VOLTAGE)

Skid Control ECU (Wire Harness Side) Connector Front View:



(a) Disconnect the skid control ECU connector.
(b) Turn the ignition switch to the ON position.
(c) Measure the voltage according to the value(s) in the table below.

Standard:

Tester Connection	Condition	Specified Condition
S1–27 (EXI) – Body ground	Center diff. locked	Below 1.5 V
S1–27 (EXI) – Body ground	Center diff. free	10 to 14 V

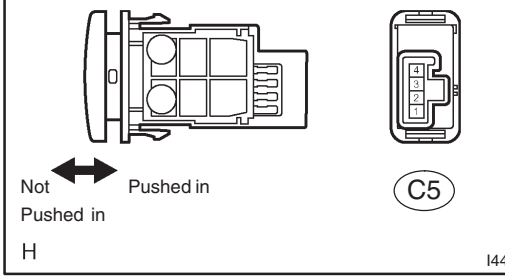
NG → **Go to step 2**

OK

REPLACE MASTER CYLINDER SOLENOID (SEE PAGE 32–12)

2 INSPECT CENTER DIFFERENTIAL LOCK SWITCH

Push–lock Type:



(a) Disconnect the center diff. lock switch connector.
(b) Measure the resistance according to the value(s) in the table below.

Standard:

Tester Connection	Condition	Specified Condition
C5–3 – C5–4	Switch is pushed in	Below 1 Ω
C5–3 – C5–4	Switch is not pushed in	10 kΩ or higher

NG → **REPLACE CENTER DIFFERENTIAL LOCK SWITCH**

OK

3 INSPECT FOUR WHEEL DRIVE CONTROL ECU

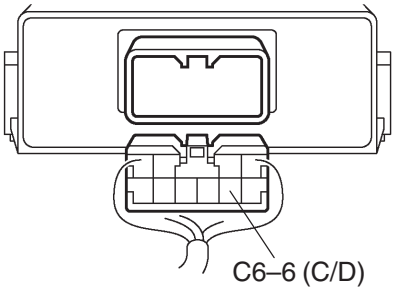
(a) Check the center diff. lock system (see Pub. No. RM990E, page 31–76).

NG → **REPLACE FOUR WHEEL DRIVE CONTROL ECU**

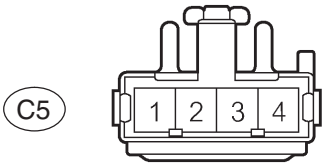
OK

4	CHECK HARNESS AND CONNECTOR (BETWEEN FOUR WHEEL DRIVE CONTROL ECU, BODY GROUND AND CENTER DIFFERENTIAL LOCK SWITCH) (SEE PAGE 01–26)

4WD Control ECU
Wire Harness View:



Center Diff. Lock Switch (Wire Harness Side)
Connector Front View:



H I44045 I44042 I45557

(a) Disconnect the 4WD control ECU connector.
(b) Measure the resistance according to the value(s) in the table below.

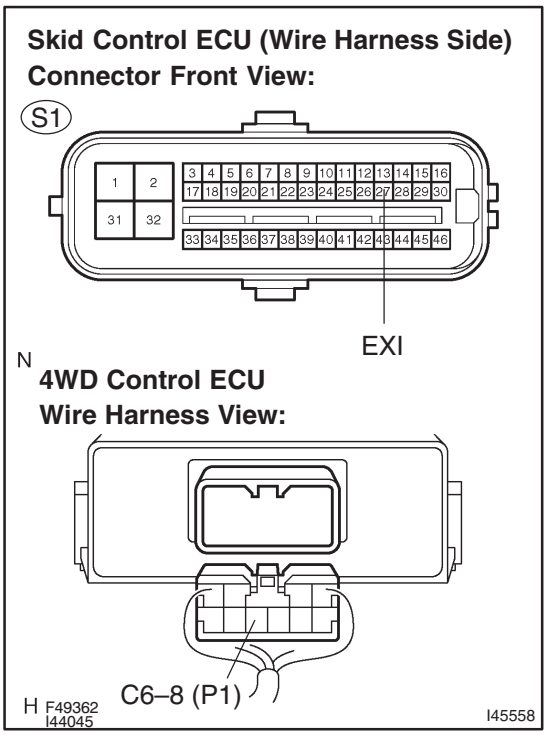
Standard:

Tester Connection	Specified Condition
C6–6 (C/D) – C5–3	Below 1 Ω
C6–6 (C/D) – Body ground	10 kΩ or higher
C5–4 – Body ground	Below 1 Ω

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

OK

5	CHECK HARNESS AND CONNECTOR (BETWEEN SKID CONTROL ECU AND FOUR WHEEL DRIVE CONTROL ECU) (SEE PAGE 01–26)



(a) Measure the resistance according to the value(s) in the table below.

Standard:

Tester Connection	Specified Condition
S1–27 (EXI) – C6–8 (P1)	Below 1 Ω
S1–27 (EXI) – Body ground	10 kΩ or higher

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

OK

REPLACE MASTER CYLINDER SOLENOID (SEE PAGE 32–12)