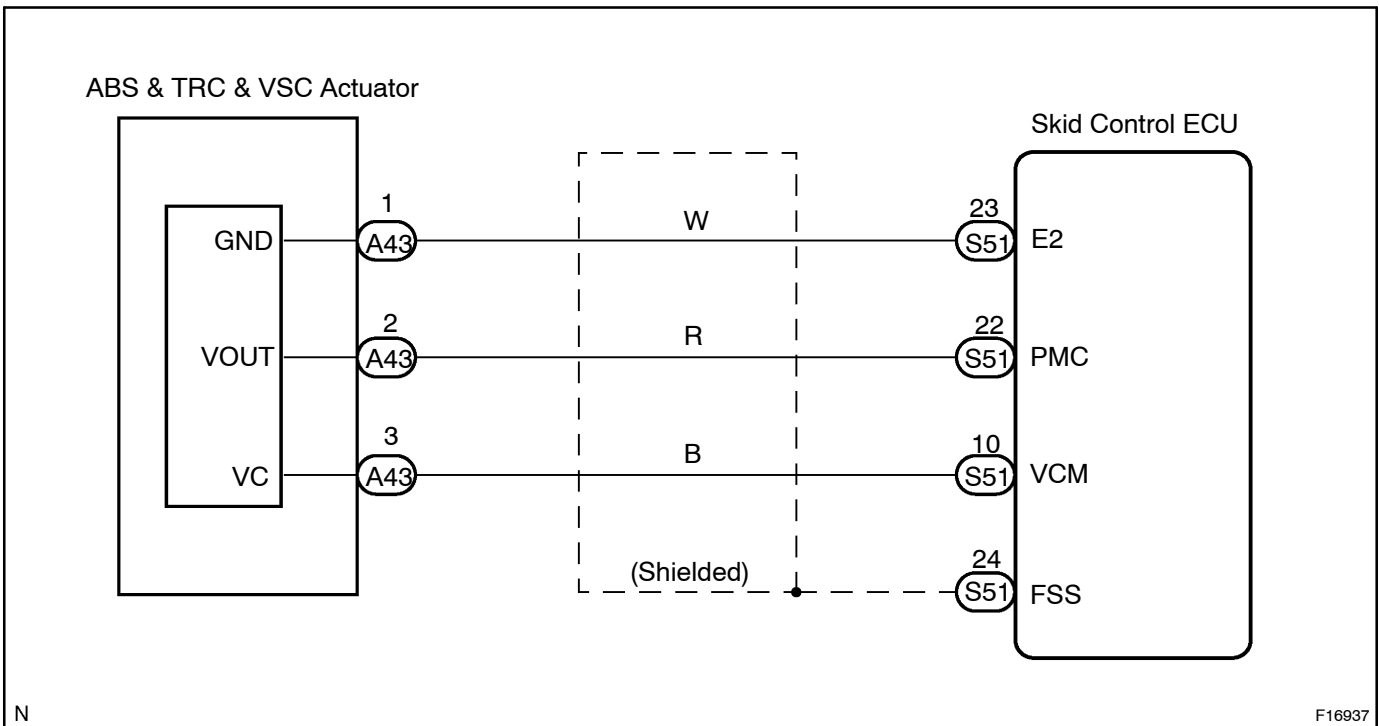


DTC	C1246 / 46	Master Cylinder Pressure Sensor Circuit
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CIRCUIT DESCRIPTION

DTC No.	DTC Detecting Condition	Trouble Area
C1246 / 46	Any of the following 1., 2., 3., 4. or 5. is detected: 1. When the vehicle speed is 7 km/h (4.3 mph) and ECU terminal PMC voltage is 0.86 V or more, the condition that the terminal voltage does not change by more than 0.005 V continues for 30 sec. 2. The noise to ECU terminal PMC occurs 7 times for 5 sec. 3. When ECU terminal STP is OFF, the condition that ECU terminal PMC voltage is 0.86 or more or 0.3 V or less continues for more than 5 sec. 4. When the ECU terminal IG1 is 9.5 V to 17.2 V the condition that ECU terminal VCM voltage is out of range of 4.4 V to 5.6 V continues for 1.2 sec. 5. When ECU terminal VCM voltage is 4.4 V to 5.6 V the condition that ECU terminal PMC voltage is out of range of 0.14 V to 4.85 V continues for more than 1.2 sec.	<ul style="list-style-type: none"> • Master cylinder pressure sensor • Master cylinder pressure sensor circuit

WIRING DIAGRAM



N

F16937

INSPECTION PROCEDURE

HINT:

Start the inspection from step 1 in case of using the hand-held tester and start from step 2 in case of not using the hand-held tester.

1 Check output value of the master cylinder pressure sensor.

PREPARATION:

- (a) Connect the hand-held tester to the DLC3.
- (b) Turn the ignition switch to ON, and push the hand-held tester main switch to ON.
- (c) Select the DATALIST mode on the hand-held tester.

CHECK:

Check that the brake fluid pressure value of the master cylinder pressure sensor displayed on the hand-held tester changes when depressing the brake pedal.

OK:

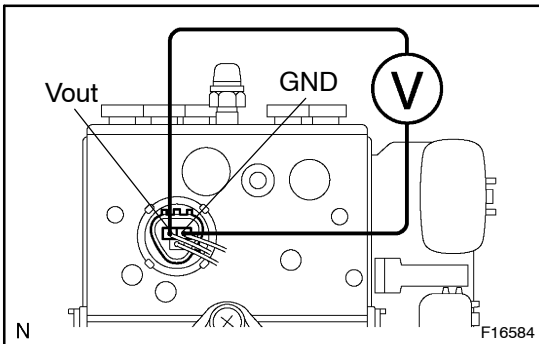
Brake fluid pressure value must be changing.

OK

Go to step 4.

NG

2 Check master cylinder pressure sensor.



PREPARATION:

Install LSPV gauge to the front brake caliper bleeder plug portion, and bleed air from LSPV gauge.

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CHECK:

Start the engine and depress the brake pedal, then check the relation between the fluid pressure and voltage of Vout and GND terminals of the master cylinder pressure sensor with the connector still connected.

OK:

Front brake caliper fluid pressure	Voltage
0 kPa (0 Kgf/cm ² , 0 psi)	0.37 - 0.63 V
5,883 kPa (60 kgf/cm ² , 853 psi)	1.57 - 1.83 V
11,768 kPa (120 kgf/cm ² , 1,706 psi)	2.77 - 3.03 V

HINT:

Voltage between terminals VC and GND: 4.7 - 5.3 V

NG

Replace brake actuator.

OK

3 Check for open and short circuit in harness and connector between master cylinder pressure sensor and skid control ECU (See page IN-31).

NG Repair or replace harness or connector.

OK

4 Check whether or not the ECU terminal STP input voltage is changed when the stop light switch is turned on and off.

NO Check stop light switch circuit.

YES

Check and replace skid control ECU.