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|------------|-----------------|---|
| DTC | P1125/41 | THROTTLE CONTROL MOTOR CIRCUIT MALFUNCTION |
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CIRCUIT DESCRIPTION

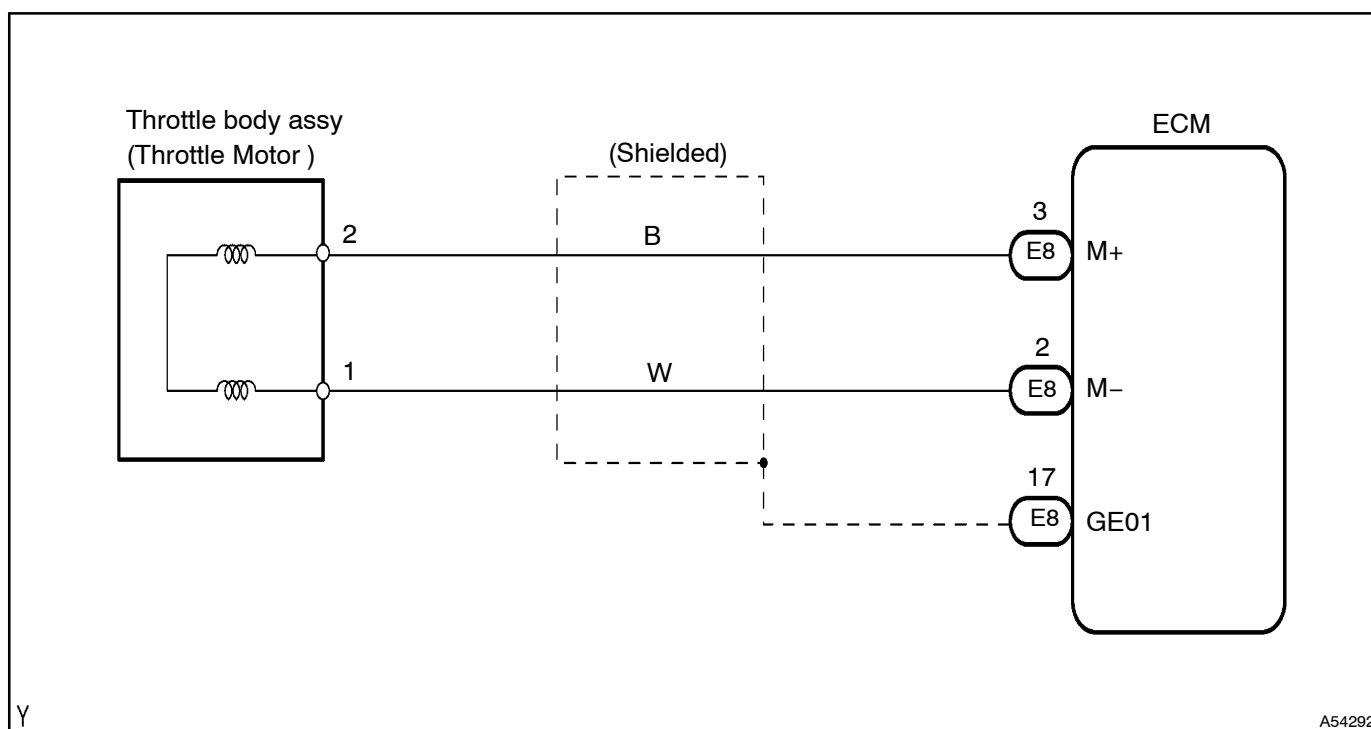
Throttle motor is operated by the ECM and it opens and closes the throttle valve.

The opening angle of the throttle valve is detected by the throttle position sensor which is mounted on the throttle body and it provides feedback to the ECM to control the throttle motor in order to control the throttle valve opening angle properly in response to driving condition.

If this DTC is stored, the ECM shuts down the power for the throttle motor, and the throttle valve is fully closed by the return spring.

| DTC No. | DTC Detection Condition | Trouble Area |
|----------|--|---|
| P1125/41 | Conditions (a) and (b) continue for 2.0 seconds: (a) Throttle control motor output duty \geq 80 % (b) Throttle control motor current $<$ 0.5 A | <ul style="list-style-type: none"> • Open or short in throttle control motor circuit • Throttle body assy (Throttle motor) • ECM |
| | Throttle control motor current \geq 16 A | |
| | Condition (a) continues for 0.6 seconds: (a) Throttle control motor current \geq high | |

WIRING DIAGRAM

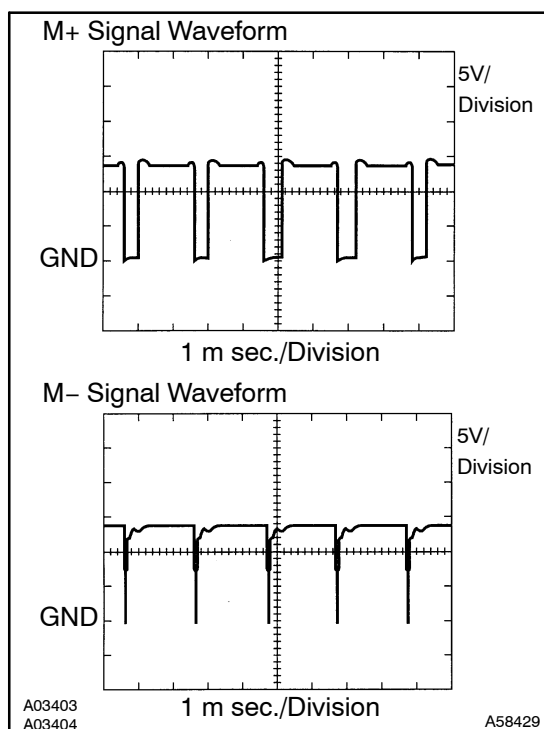


INSPECTION PROCEDURE

HINT:

Read freeze frame data using hand-held tester or OBD II scan tool, as freeze frame data records the engine conditions when a malfunction is detected. When troubleshooting, it is useful for determining whether the vehicle was running or stopped, the engine was warmed up or not, the air-fuel ratio was lean or rich, etc. at the time of the malfunction.

1 INSPECT THROTTLE BODY ASSY(THROTTLE CONTROL MOTOR CIRCUIT)



- (a) Check the waveform between E8 ECM terminals M+ or M- and E1 when the engine is idling.

HINT:

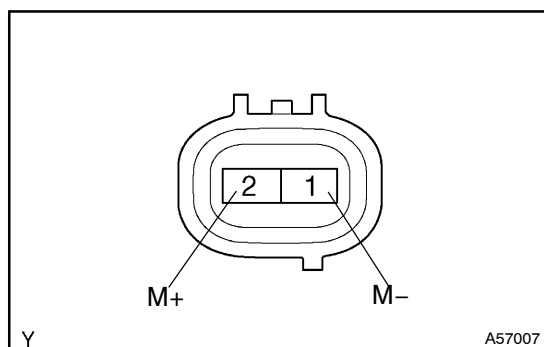
The waveform frequency changes depending on the throttle opening.

OK

CHECK AND REPLACE ECM

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2 INSPECT THROTTLE BODY ASSY(THROTTLE CONTROL MOTOR)



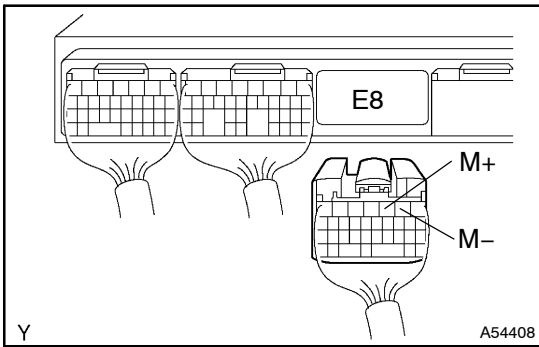
- (a) Disconnect the throttle control motor connector.
(b) Using an ohmmeter, measure the motor resistance between terminals 1 (M-) and 2 (M+).

Motor resistance: 0.3 – 100 Ω at 20°C (68°F)

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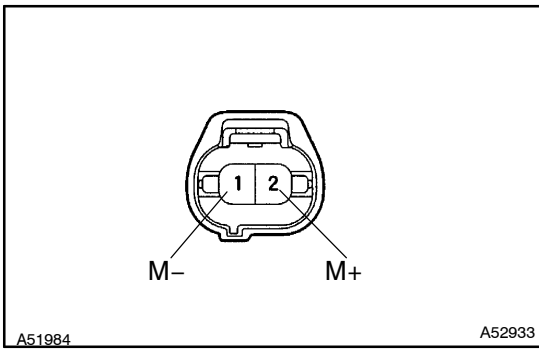
REPLACE THROTTLE BODY ASSY

OK

3 CHECK HARNESS AND CONNECTOR(ECM - THROTTLE CONTROL MOTOR)

- (a) Disconnect the ECM E8 connector.
- (b) Check the continuity of the throttle control motor and ECM.

Standard: Continuity



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REPAIR OR REPLACE HARNESS AND CONNECTOR

OK

CHECK AND REPLACE ECM