

DTC**P0560****System Voltage****DESCRIPTION**

The battery supplies electricity to the ECM even when the ignition switch is in the OFF position. This power allows the ECM to store data such as DTC history, freeze frame data and fuel trim values. If the battery voltage falls below a minimum level, the memory is cleared and the ECM determines that there is a malfunction in the power supply circuit. When the engine is next started, the ECM illuminates the MIL and sets the DTC.

DTC No.	DTC Detection Conditions	Trouble Areas
P0560	Open in ECM back up power source circuit (1 trip detection logic)	<ul style="list-style-type: none"> • Open in back up power source circuit • Battery • Battery terminals • EFI MAIN fuse • ECM

HINT:

If DTC P0560 is set, the ECM does not store other DTCs or the data stored in the ECM are partly erased.

MONITOR STRATEGY

Related DTCs	P0560: ECM system voltage
Required Sensors/Components (Main)	ECM
Required Sensors/Components (Related)	-
Frequency of Operation	Continuous
Duration	3 seconds
MIL Operation	Immediate (MIL illuminated after next engine start)
Sequence of Operation	None

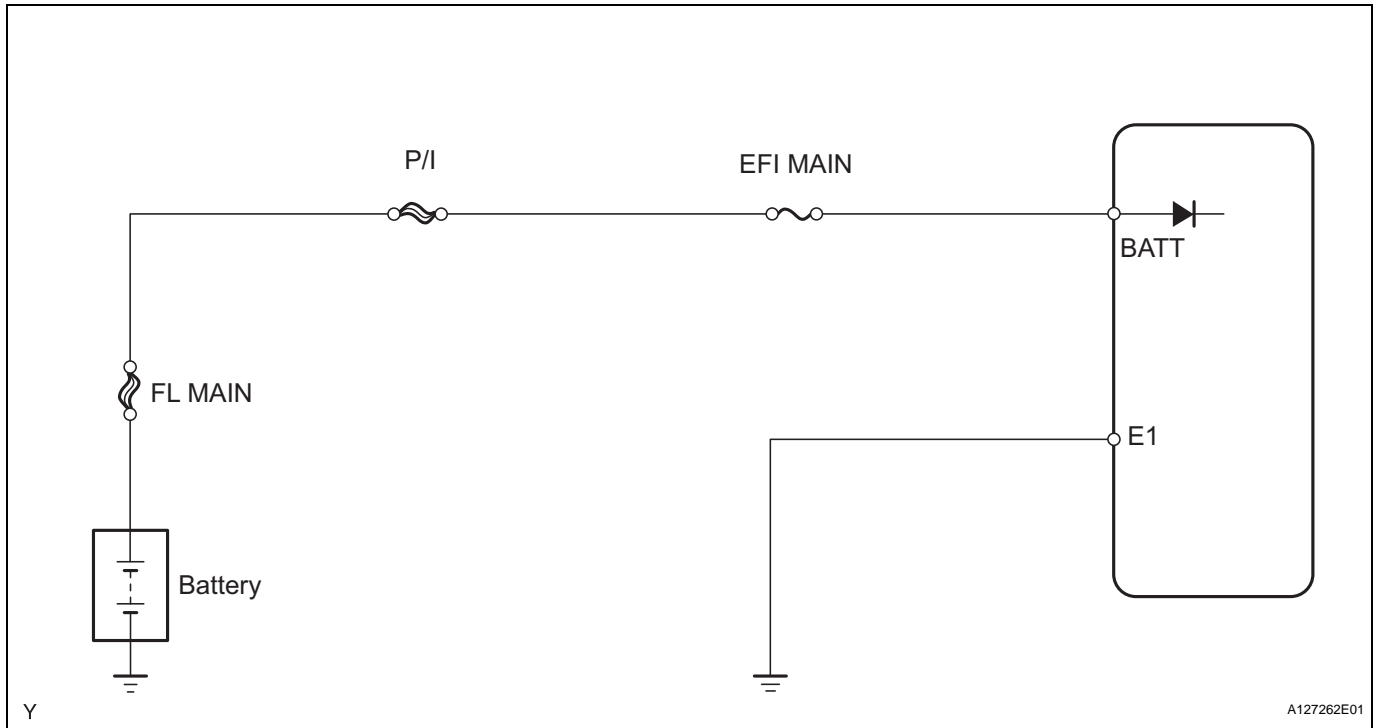
TYPICAL ENABLING CONDITIONS

Monitor runs whenever following DTCs not present	None
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TYPICAL MALFUNCTION THRESHOLDS

ECM power source	Less than 3.5 V
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WIRING DIAGRAM



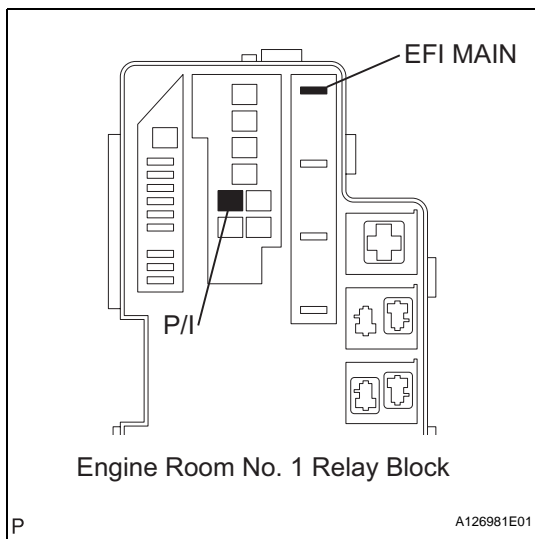
INSPECTION PROCEDURE

HINT:

Read freeze frame data using the intelligent tester. Freeze frame data records the engine condition when malfunctions are detected. When troubleshooting, freeze frame data can help determine if the vehicle was moving or stationary, if the engine was warmed up or not, if the air-fuel ratio was lean or rich, and other data from the time the malfunction occurred.

1

CHECK FUSE (EFI MAIN AND P/I)



(a) Remove the EFI MAIN fuse and P/I fuse from the engine room No. 1 relay block.

(b) Measure the resistance of the EFI MAIN fuse and P/I fuse.

Standard resistance:

Below 1 Ω

(c) Reinstall the EFI MAIN fuse and P/I fuse.

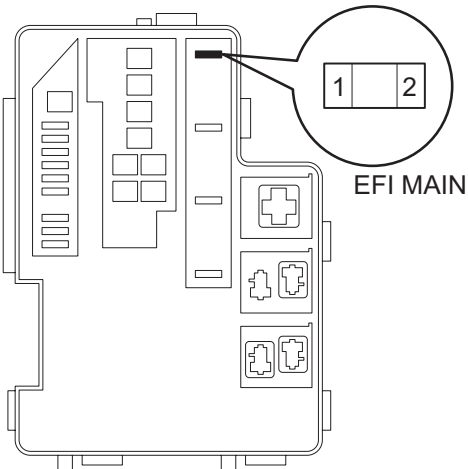
NG

CHECK FOR SHORTS IN ALL HARNESSSES AND CONNECTORS CONNECTED TO FUSE AND REPLACE FUSE

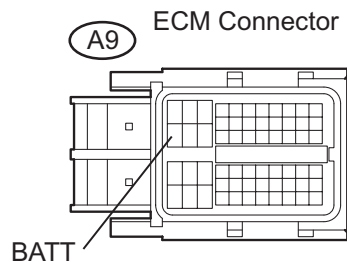
OK

2**CHECK HARNESS AND CONNECTOR (ECM - EFI MAIN FUSE, EFI MAIN FUSE - BATTERY)**

Engine Room No. 1 Relay Block:



Wire Harness Side:



A127761E01

- (a) Check the harness and the connector between the EFI MAIN fuse and ECM.

- (1) Remove the EFI MAIN fuse from the engine No. 1 room relay block.
- (2) Disconnect the A9 ECM connector.
- (3) Measure the resistance.

Standard resistance (Check for open)

Tester Connections	Specified Conditions
2 (EFI MAIN fuse) - A9-20 (BATT)	Below 1 Ω

Standard resistance (Check for short)

Tester Connections	Specified Conditions
2 (EFI MAIN fuse) or A9-20 (BATT) - Body ground	10 k Ω or higher

- (4) Reconnect the ECM connector.
 - (5) Reinstall the EFI MAIN fuse.
- (b) Check the harness and the connector between the EFI MAIN fuse and battery.

- (1) Remove the EFI MAIN fuse from the engine room No. 1 relay block.
- (2) Disconnect the positive battery terminal.
- (3) Check the resistance.

Standard resistance (Check for open)

Tester Connections	Specified Conditions
Battery positive terminal - 1 (EFI MAIN fuse)	Below 1 Ω

Standard resistance (Check for short)

Tester Connections	Specified Conditions
Battery positive terminal or 1 (EFI MAIN fuse) - Body ground	10 k Ω or higher

- (4) Reconnect the positive battery terminal.
- (5) Reinstall the EFI MAIN fuse.

NG**REPAIR OR REPLACE HARNESS OR CONNECTOR****OK****3****INSPECT BATTERY**

- (a) Check that the battery is not depleted.

OK:**Battery is not depleted****NG****REPLACE BATTERY****OK****ES**

4 CHECK BATTERY TERMINAL

- (a) Check that the battery terminals are not loose or corroded.

OK:

Battery terminals are not loose or corroded

NG

REPAIR OR REPLACE BATTERY TERMINAL

OK

5 CHECK WHETHER DTC OUTPUT RECURS**ES**

- (a) Connect the intelligent tester to the DLC3.
(b) Turn the ignition switch ON and turn the tester ON.
(c) Clear DTCs (see page [ES-35](#)).
(d) Turn the ignition switch OFF and turn the tester OFF.
(e) Start the engine and turn the tester ON.
(f) Select the following menu items: DIAGNOSIS / ENHANCED OBD II / DTC INFO / CURRENT CODES.
(g) Read DTCs.

Result

Display (DTC Output)	Proceed To
P0560	A
No output	B

B

CHECK FOR INTERMITTENT PROBLEMS

A

REPLACE ECM