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Model Year Start: 2023	Model: Prius	Prod Date Range: [12/2022 -]
Title: NETWORKING: CAN COMMUNICATION SYSTEM (for HEV Model): ECM Communication Stop Mode; 2023 - 2024 MY Prius [12/2022 -]		

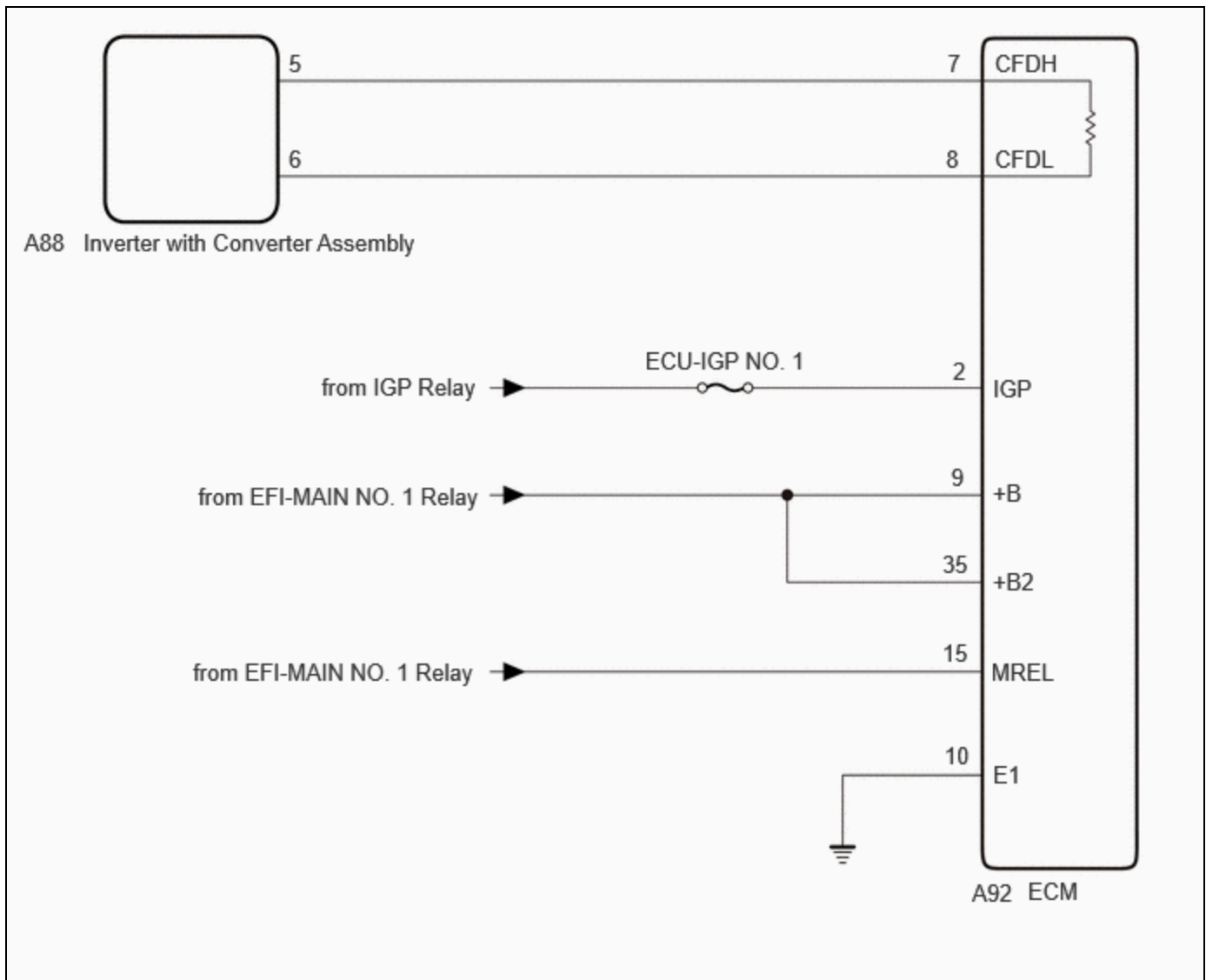
ECM Communication Stop Mode

DESCRIPTION

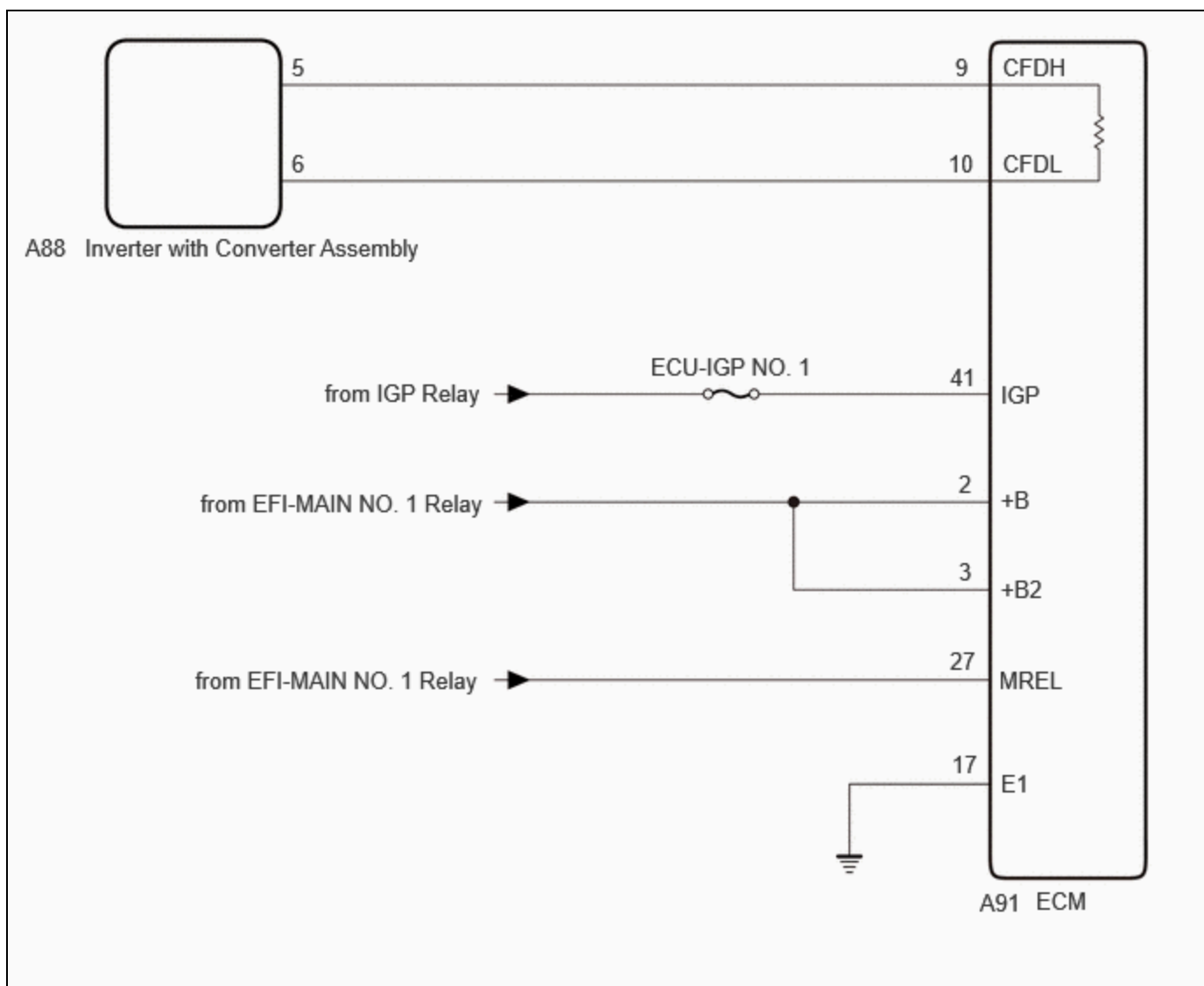
DETECTION ITEM	SYMPTOM	TROUBLE AREA
ECM Communication Stop Mode	Communication stop for "ECM (Engine)" is indicated on the "Communication Bus Check" screen of the GTS. Click here INFO	<ul style="list-style-type: none"> • ECM main line or connector • Power source circuit of ECM • ECM ground circuit • ECM

WIRING DIAGRAM

for M20A-FXS:



for 2ZR-FXE:



CAUTION / NOTICE / HINT

CAUTION:

When performing the confirmation driving pattern, obey all speed limits and traffic laws.

NOTICE:

- Because the order of diagnosis is important to allow correct diagnosis, make sure to begin troubleshooting using How to Proceed with Troubleshooting when CAN communication system related DTCs are output.

Click here [INFO](#)

- Before measuring the resistance of the CAN bus, turn the ignition switch off and leave the vehicle for 1 minute or more without operating the key or any switches, or opening or closing the doors. After that, disconnect the cable from the negative (-) auxiliary battery terminal and leave the vehicle for 10 minutes or more before measuring the resistance.
- After the ignition switch is turned off, there may be a waiting time before disconnecting the negative (-) auxiliary battery terminal.

Click here [INFO](#)

- When disconnecting and reconnecting the auxiliary battery.

HINT:

When disconnecting and reconnecting the auxiliary battery, there is an automatic learning function that completes learning when the respective system is used.

[Click here](#) **INFO**

- Some parts must be initialized and set when replacing or removing and installing parts.

[Click here](#) **INFO**

- After performing repairs, perform the DTC check procedure and confirm that the DTCs are not output again.

DTC check procedure: Turn the ignition switch to ON and wait for 1 minute or more. Then operate the suspected malfunctioning system and drive the vehicle at 60 km/h (37 mph) or more for 5 minutes or more.

- After the repair, perform the CAN bus check and check that all the ECUs and sensors connected to the CAN communication system are displayed as normal.

[Click here](#) **INFO**

- Inspect the fuses for circuits related to this system before performing the following procedure.

HINT:

- Before disconnecting related connectors for inspection, push in on each connector body to check that the connector is not loose or disconnected.
- When a connector is disconnected, check that the terminals and connector body are not cracked, deformed or corroded.

PROCEDURE

1.	CHECK VEHICLE TYPE
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(a) Check vehicle type.

RESULT	PROCEED TO
for M20A-FXS	A
for 2ZR-FXE	B

B **GO TO STEP 4**

A



2.	CHECK FOR OPEN IN CAN BUS LINES (ECM MAIN LINE)
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(a) Disconnect the cable from the negative (-) auxiliary battery terminal.

(b) Disconnect the A92 ECM connector.

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

Standard Resistance:



[Click Location & Routing\(A92\)](#)

[Click Connector\(A92\)](#)

TESTER CONNECTION	CONDITION	SPECIFIED CONDITION
A92-7 (CFDH) - A92-8 (CFDL)	Cable disconnected from negative (-) auxiliary battery terminal	108 to 132 Ω

NG ► **REPAIR OR REPLACE CAN MAIN BUS LINES OR CONNECTOR (ECM)**

OK



3.	CHECK ECM POWER SOURCE CIRCUIT
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(a) Check the ECM power source circuit.

Click here [INFO](#)

OK ► **REPLACE ECM**

Click here [INFO](#)

NG ► **REPAIR OR REPLACE HARNESS OR CONNECTOR (POWER SOURCE CIRCUIT)**

4.	CHECK FOR OPEN IN CAN BUS LINES (ECM MAIN LINE)
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(a) Disconnect the cable from the negative (-) auxiliary battery terminal.

(b) Disconnect the A91 ECM connector.

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

Standard Resistance:

[Click Location & Routing\(A91\)](#)[Click Connector\(A91\)](#)

TESTER CONNECTION	CONDITION	SPECIFIED CONDITION
A91-9 (CFDH) - A91-10 (CFDL)	Cable disconnected from negative (-) auxiliary battery terminal	108 to 132 Ω

NG ▶ **REPAIR OR REPLACE CAN MAIN BUS LINES OR CONNECTOR (ECM)**

OK
▼

5.	CHECK ECM POWER SOURCE CIRCUIT
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(a) Check the ECM power source circuit.

Click here [INFO](#)

OK ▶ **REPLACE ECM**

NG ▶ **REPAIR OR REPLACE HARNESS OR CONNECTOR (POWER SOURCE CIRCUIT)**

