

GENERIC · NETWORK

U0310

OBD-II DIAGNOSTIC TROUBLE CODE (DTC)

U0310

Software Incompatibility with Fuel Pump Control Module

U0310 is a network communication code indicating that a control module, typically the engine control module (ECM), has detected a software incompatibility with the fuel pump control module (FPCM). The computer is not reporting a hardware failure but rather that the software versions, calibration data, or configuration files between the two modules do not match or are not compatible.

SYSTEM	CODE TYPE	SEVERITY	FIX DIFFICULTY	AREA
Network	Generic (all makes)	Medium	Professional	Software and configuration mismatches

Symptoms you may notice

- Illumination of the malfunction indicator lamp (MIL) on the dashboard.
- Often no symptoms besides the warning light, with the vehicle running normally.
- Intermittent or complete failure of the fuel pump, leading to engine stalling or a no-start condition.
- Rough running or hesitation if the FPCM defaults to a limited operating strategy.
- Other dashboard warning lights, such as stability control or transmission, may illuminate due to shared network data.

Common causes, most likely first

- 1 Software or calibration mismatch between the ECM and FPCM, often after a module replacement or reprogramming.
- 2 Failed or incomplete software update during a service procedure.
- 3 Corrupted configuration data in either module due to a low-voltage event or electrical glitch.
- 4 Aftermarket performance tuner or piggyback device that alters fuel pump control signals.
- 5 Faulty FPCM with internal memory corruption that prevents proper software handshake.
- 6 Wiring or connector issues in the controller area network (CAN) bus between the modules, causing data corruption.
- 7 Incorrect module installed that is not compatible with the vehicle's software architecture.



How to diagnose and fix it

- 1 Perform a full scan of all modules to retrieve all stored codes and verify U0310 is current and not history.
- 2 Check for technical service bulletins (TSBs) or manufacturer communications regarding software updates for the FPCM and ECM.
- 3 Verify battery voltage and charging system performance; low voltage can cause software corruption and communication errors.
- 4 Inspect the CAN bus wiring and connectors between the ECM and FPCM for damage, corrosion, or loose pins.
- 5 Reprogram or update the FPCM and ECM with the latest software using a factory scan tool or equivalent.
- 6 If reprogramming fails or is unavailable, replace the FPCM and perform programming and configuration.
- 7 After repair, clear codes and perform a road test to confirm the code does not return.

Software Mismatch Isn't Always a Bad Module

- A common cause of U0310 is a replaced FPCM that was not properly programmed or configured to match the vehicle's ECM software, so the new part is fine but the software is not.
- The code can set after a battery replacement or jump-start if voltage spikes corrupt the module's memory, and a simple reprogramming may resolve it.
- Some aftermarket fuel pump control modules or performance tuners alter the software handshake and trigger U0310 even though the vehicle runs normally.
- U0310 does not always mean the FPCM is defective; the fault may lie in the ECM's software or in the communication bus, so swapping parts without diagnosis is costly.
- On some vehicles, the FPCM is part of the fuel pump assembly, and replacing the entire assembly without programming will not fix the incompatibility.

Can I keep driving with U0310?

If the vehicle is running normally, you can drive it to a repair shop, but avoid long trips or heavy load conditions because the fuel pump may default to a limited strategy. If the engine stalls, hesitates, or fails to start, stop driving and have the vehicle towed to prevent a safety hazard.

Tools that help

- Factory-level scan tool with reprogramming capability
- Digital multimeter for voltage and continuity checks
- CAN bus analyzer or oscilloscope for network diagnostics
- Battery charger and power supply to maintain voltage during reprogramming
- Socket and wrench set for module access



Reading U0310

- U** Network: communication between the vehicle's control modules.
- 0** Generic (SAE) code: it means the same thing on every OBD-II vehicle.
- 3** Software and configuration mismatches.
- 10** The exact fault within that area.

Often seen with

P0230 Fuel Pump Primary Circuit Malfunction · **P0231** Fuel Pump Secondary Circuit Low · **P0232** Fuel Pump Secondary Circuit High · **U0100** Lost Communication With ECM/PCM A · **U0109** Lost Communication With Fuel Pump Control Module

See it working

Watch the animated explainer [How a MAF Sensor Works: Hot-Wire Airflow Explained](#) on Auto Veteran to see the parts involved moving.

Full guide, related articles and animations: <https://www.autoveteran.tech/dtc-codes/u0310/>

