

GENERIC · NETWORK

U045C

OBD-II DIAGNOSTIC TROUBLE CODE (DTC)

U045C

Invalid Data Received From Power Steering Control Module B

U045C is a communication fault indicating that a control module received invalid or corrupted data from the Power Steering Control Module B over the vehicle's network. The receiving module detected that the data frames from the steering module did not match the expected format or contained out-of-range values, so it flagged the signal as untrustworthy.

SYSTEM Network	CODE TYPE Generic (all makes)	SEVERITY Medium	FIX DIFFICULTY Professional	AREA Invalid data received from a module
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Symptoms you may notice

- A warning light for the power steering system or a general chassis fault indicator on the dashboard.
- Often no symptoms besides the warning light, with steering assist feeling normal.
- Intermittent or reduced power steering assist, especially at low speeds or during parking maneuvers.
- A message on the driver information center such as 'Power Steering Service Required' or 'Steering Assist Reduced'.
- The steering wheel may feel heavier than usual or require more effort to turn.
- Other unrelated warning lights may appear if the fault affects shared network communication.

Common causes, most likely first

- 1 A weak or failing 12-volt battery that causes voltage drops and corrupts data signals on the communication network.
- 2 Corroded, loose, or damaged wiring and connectors at the Power Steering Control Module B or along the network bus.
- 3 A faulty Power Steering Control Module B that is internally failing and transmitting invalid data frames.
- 4 Water intrusion or physical damage to the steering module or its connectors, common after collisions or undercarriage impacts.
- 5 A software glitch or outdated calibration in the Power Steering Control Module B or the receiving module.
- 6 A shorted or open communication circuit (CAN bus or dedicated serial line) between the steering module and the module that set the code.
- 7 A malfunctioning receiving module that misinterprets valid data from the steering module.



How to diagnose and fix it

- 1 Perform a battery and charging system test to rule out low voltage as the root cause of corrupted data.
- 2 Inspect the Power Steering Control Module B connectors and wiring for corrosion, looseness, or damage, and repair as needed.
- 3 Use a scan tool to check for other communication codes and to verify live data from the steering module, looking for implausible values.
- 4 Check for technical service bulletins (TSBs) or software updates for the Power Steering Control Module B and the receiving module.
- 5 Perform a wiggle test on the network wiring while monitoring data with the scan tool to catch intermittent faults.
- 6 If wiring and power are good, substitute a known-good Power Steering Control Module B and recheck for the code.
- 7 As a last step, reprogram or replace the receiving module if it continues to flag invalid data despite a healthy steering module.

What the code does not always mean

- U045C often appears after a low-voltage event such as a jump start or a dying battery, and clearing the code after restoring proper voltage may be the only fix needed.
- A faulty wheel speed sensor or steering angle sensor can sometimes cause the power steering module to broadcast invalid data, so always check for related chassis codes before condemning the module.
- The code can be set by a loose ground connection at the steering module or at the receiving module, which corrupts the reference voltage used for data transmission.
- Replacing the Power Steering Control Module B without checking for water intrusion or damaged harnesses often leads to a repeat failure.
- Some vehicles require a steering angle sensor calibration or module initialization after battery replacement, and skipping this step can trigger U045C.

Can I keep driving with U045C?

You can usually continue driving if the steering assist feels normal, but avoid high-speed maneuvers or heavy steering loads until the fault is repaired. If the steering assist is reduced or intermittent, limit driving to low speeds and seek service promptly.

Tools that help

- OBD-II scan tool with live data and module communication capabilities
- Digital multimeter for voltage and resistance checks
- Battery tester and charging system analyzer
- Wiring diagram and connector pinout for the vehicle
- Trim removal tools and socket set for module access
- Oscilloscope for network signal analysis (optional but helpful)



Reading U045C

- U** Network: communication between the vehicle's control modules.
- 0** Generic (SAE) code: it means the same thing on every OBD-II vehicle.
- 4** Invalid data received from a module.
- 5C** The exact fault within that area.

Often seen with

U0126 Lost Communication With Steering Angle Sensor Module · **U0131** Lost Communication With Power Steering Control Module · **U045A** Invalid Data Received From Parking Assist Control Module A · **U045B** Invalid Data Received From Anti-Lock Brake System (ABS) Cont · **U045D** Invalid Data Received From Automated Driving System Control

See it working

Watch the animated explainer [Four-Stroke Engine Cutaway: Intake to Exhaust](#) on Auto Veteran to see the parts involved moving.

Full guide, related articles and animations: <https://www.autoveteran.tech/dtc-codes/u045c/>

