

GENERIC · BODY

B0164

OBD-II DIAGNOSTIC TROUBLE CODE (DTC)

B0164

Air Bag In-Vehicle Temperature Sensor Circuit

B0164 indicates that the air bag control module has detected an abnormal condition in the in-vehicle temperature sensor circuit, which is used to monitor the cabin temperature for proper air bag deployment logic. The computer compares the sensor signal to expected values and sets this code when the voltage or resistance falls outside the normal range.

SYSTEM

Body

CODE TYPE

Generic (all makes)

SEVERITY

Medium

FIX DIFFICULTY

Professional

AREA

Airbags, seats, doors, lights and comfort systems

Symptoms you may notice

- Air bag warning light illuminated on the dashboard
- Often no symptoms besides the warning light
- Air bag system may be disabled, offering no protection in a collision
- In some vehicles, a message on the driver information center indicating a service air bag system
- Passenger air bag indicator may show 'off' or 'disabled' when it should be active
- Intermittent warning light that comes and goes with temperature changes or vibration

Common causes, most likely first

- 1 Faulty in-vehicle temperature sensor
- 2 Damaged or corroded wiring or connector at the sensor
- 3 Open or short circuit in the sensor wiring harness
- 4 Failed air bag control module (less common)
- 5 Poor electrical connection at the air bag module connector
- 6 Aftermarket accessories or repairs that disturbed the sensor circuit



How to diagnose and fix it

- 1 Verify the code with a scan tool and check for any related air bag codes
- 2 Inspect the in-vehicle temperature sensor and its connector for damage, corrosion, or loose pins
- 3 Measure the sensor resistance and compare to the manufacturer's specification
- 4 Check the wiring harness for continuity, shorts to ground, and shorts to voltage between the sensor and the air bag module
- 5 If wiring and sensor are good, test the air bag module inputs and outputs according to service information
- 6 Replace the faulty sensor or repair the wiring as needed, then clear the code and verify the repair
- 7 Perform a complete air bag system verification with a scan tool to ensure no other codes remain

Temperature sensor circuit nuances for B0164

- The in-vehicle temperature sensor is often shared with the climate control system, so a fault may also cause inaccurate cabin temperature readings or HVAC performance issues.
- A common misdiagnosis is replacing the air bag module when the real problem is a chafed wire behind the dashboard or a corroded connector.
- The sensor circuit may be sensitive to temperature extremes, so intermittent codes can appear only in cold or hot weather.
- Always disconnect the battery and wait the recommended time before working on air bag circuits to avoid accidental deployment.
- Some vehicles require recalibration of the air bag system after sensor replacement, which may need a factory-level scan tool.

Can I keep driving with B0164?

It is generally safe to drive with B0164 set, but the air bag system may be partially or fully disabled, reducing occupant protection in a crash. Avoid rough roads or vibrations that could worsen an intermittent wiring fault, and have the system inspected promptly.

Tools that help

- OBD-II scan tool with air bag system capability
- Digital multimeter
- Wiring diagram and service information
- Socket set and trim removal tools
- Battery disconnect tool



Reading B0164

- B** Body: airbags, seats, doors, lights and comfort systems.
- 0** Generic (SAE) code: it means the same thing on every OBD-II vehicle.
- 1** Airbags, seats, doors, lights and comfort systems.
- 64** The exact fault within that area.

Often seen with

B0100 Restraints Control Module Internal Fault · **B0101** Front Crash Sensor Circuit Malfunction · **B0166** HVAC Discharge Air Temperature Sensor

See it working

Watch the animated explainer [How a Refrigerator Works: The Cooling Cycle](#) on Auto Veteran to see the parts involved moving.

Full guide, related articles and animations: <https://www.autoveteran.tech/dtc-codes/b0164/>

