

JAGUAR · POWERTRAIN

P1194

OBD-II DIAGNOSTIC TROUBLE CODE (DTC)

P1194 · Jaguar

O2 Sensor Heater Circuit Resistance Fault

P1194 on a Jaguar means the engine control module has measured a resistance outside the expected range in the heater circuit of one of the oxygen sensors. The heater is a small element inside the sensor that brings it up to operating temperature quickly after a cold start, and the module monitors the current flow through that circuit to verify the element and its wiring are intact.

SYSTEM	CODE TYPE	SEVERITY	FIX DIFFICULTY	AREA
Powertrain	Jaguar specific	Medium	Intermediate	Fuel and air metering

Symptoms you may notice

- Illumination of the check engine light, often with no other noticeable symptoms.
- A slightly longer period of rough running or poor driveability immediately after a cold start while the sensor warms up.
- Intermittent check engine light that comes and goes with damp or cold weather if the fault is a poor connection.
- Marginally increased fuel consumption if the sensor stays cold longer than normal.
- In rare cases, a stored pending code without the light being commanded on.
- No change in engine performance once the engine is fully warm.

Common causes, most likely first

- 1 Failed oxygen sensor heater element, typically an open circuit inside the sensor.
- 2 Corroded, loose or damaged connector pins at the oxygen sensor or the engine control module.
- 3 Chafed or broken heater circuit wiring between the sensor and the module.
- 4 Blown fuse or faulty relay supplying power to the oxygen sensor heater circuit.
- 5 Engine control module internal driver fault on the heater control circuit.
- 6 Contamination or mechanical damage to the sensor that has affected the heater element.



How to diagnose and fix it

- 1 Scan all modules and record freeze-frame data to identify which oxygen sensor heater circuit is flagged and under what conditions.
- 2 Inspect the oxygen sensor connector and the engine control module connector for corrosion, pushed-back pins or water ingress.
- 3 Check the heater circuit fuse and relay, then measure resistance across the heater element at the sensor connector and compare with the manufacturer's specification.
- 4 Measure voltage and ground at the sensor connector with the key on to confirm the supply and control sides of the circuit are intact.
- 5 Load-test the heater circuit wiring with a test light or by measuring voltage drop while the circuit is active.
- 6 If the wiring and supply are good but the heater resistance is out of specification, replace the affected oxygen sensor.
- 7 Clear the code and run a cold-start monitor to confirm the heater circuit passes before returning the vehicle.

What a heater resistance code really means

- A P1194 can be set by a heater circuit that is drawing too much current as well as one that is open, so never assume the sensor itself is at fault without measuring resistance.
- Jaguar oxygen sensor heater circuits are often fed through a fuse in the engine bay fuse box that also supplies other components, so a blown fuse may cause additional codes that point away from the sensor.
- Water ingress into the connector at the sensor or the module is a common cause on older Jaguar models, and the fault often appears only after rain or a car wash.
- The engine control module may set P1194 as a pending code during a cold start and only illuminate the light after a second failed cold-start cycle, so a single clear-and-drive may not prove the repair.
- A heater circuit that tests good when cold can still fail when hot, so resistance should be measured both cold and after the engine has reached operating temperature.

Can I keep driving with P1194?

The vehicle remains safe to drive because the heater circuit only affects how quickly the oxygen sensor reaches operating temperature, but prolonged driving with a failed heater can increase emissions and fuel consumption. Avoid extended idling from cold and have the fault diagnosed soon, especially if the check engine light is accompanied by poor cold-start driveability.



Tools that help

- OBD-II scan tool with manufacturer-specific capability
- Digital multimeter
- Test light
- Fuse puller and fuse kit
- Wiring diagram for the specific Jaguar model
- Back-probe pins or breakout leads

Reading P1194

P Powertrain: engine, transmission and emissions.

1 Manufacturer-specific code (Jaguar): its meaning depends on the make.

1 Fuel and air metering.

94 The exact fault within that area.

Often seen with

P1195 EGR Boost Sensor Circuit · **P1195** EGR Boost Or Pressure Sensor Circuit Fault · **P1195** O2 Sensor Heater Circuit Low Resistance Fault 1 · **P1195** O2 Sensor 1/1 (Bank 1 Sensor 1) Slow During Catalyst Monitor · **P1195** SCP HBCC Failed To Initialize · **P1195** O2 Sensor 1/1 (Bank 1 Sensor 1) Slow During Catalyst Monitor · **P0135** O2 Sensor Heater Circuit Malfunction (Bank 1 Sensor 1) · **P0141** O2 Sensor Heater Circuit Malfunction (Bank 1 Sensor 2) · **P0155** O2 Sensor Heater Circuit Malfunction (Bank 2 Sensor 1) · **P0161** O2 Sensor Heater Circuit Malfunction (Bank 2 Sensor 2)

See it working

Watch the animated explainer [How a Turbocharger Works, Step by Step](#) on Auto Veteran to see the parts involved moving.

Full guide, related articles and animations: <https://www.autoveteran.tech/dtc-codes/jaguar-p1194/>

