

MITSUBISHI · POWERTRAIN

P1494

OBD-II DIAGNOSTIC TROUBLE CODE (DTC)

P1494 · Mitsubishi

EVAP Ventilation Switch Or Mechanical Fault

P1494 on Mitsubishi vehicles indicates that the powertrain control module has detected a fault in the evaporative emission control system's ventilation switch or its mechanical operation. The computer monitors the vent solenoid circuit and the resulting pressure changes in the fuel tank; when the expected response is missing or implausible, it stores this code.

SYSTEM

Powertrain

CODE TYPE

Mitsubishi specific

SEVERITY

Low

FIX DIFFICULTY

Intermediate

AREA

Auxiliary emission controls

Symptoms you may notice

- Illuminated check engine light, often with no other noticeable symptoms
- A slight fuel odor around the rear of the vehicle after refueling
- Difficulty or hesitation when adding fuel at the pump, sometimes with the nozzle clicking off early
- Intermittent rough idle or stumble after a hot restart, though this is less common
- Failed state emissions inspection due to the check engine light
- Occasional hissing or clicking from the rear of the vehicle when the engine is off

Common causes, most likely first

- 1 Faulty EVAP vent solenoid (ventilation switch) that fails to open or close properly
- 2 Damaged, disconnected, or corroded wiring or connector at the vent solenoid
- 3 Blocked or kinked EVAP vent hose or charcoal canister port
- 4 Sticking or contaminated charcoal canister preventing proper venting
- 5 Leaking or stuck-open purge solenoid affecting system pressure
- 6 Mechanical binding in the vent valve linkage or diaphragm
- 7 PCM software issue or internal driver fault (rare, but possible after other causes are ruled out)



How to diagnose and fix it

- 1 Connect a scan tool and verify P1494 is active; check for related EVAP codes and freeze-frame data
- 2 Inspect the vent solenoid connector and wiring for corrosion, damage, or loose pins; repair as needed
- 3 Command the vent solenoid on and off with the scan tool and listen for a distinct click; no click indicates a faulty solenoid or circuit
- 4 Check the vent hose and canister for blockage or kinks; clear or replace obstructed components
- 5 Perform a smoke test on the EVAP system to confirm no leaks and verify the vent valve seals properly
- 6 If the solenoid fails to respond electrically, measure resistance across its terminals and compare to specification; replace if out of range
- 7 After repairs, clear codes and run the EVAP monitor to confirm the fix; if the code returns, recheck the canister and purge solenoid operation

What Mitsubishi EVAP Vent Codes Really Mean

- A P1494 is often set by a vent solenoid that clicks but does not actually seal or open, so a simple click test is not enough; you must verify pressure changes with a scan tool or smoke machine.
- Mitsubishi charcoal canisters are prone to becoming saturated with fuel if the tank is repeatedly overfilled, which can mimic a vent switch failure and set this code.
- The vent solenoid shares its ground with other components on some models, so a bad ground can cause P1494 without any fault in the solenoid itself.
- A leaking purge solenoid can cause the vent switch to appear faulty because the system cannot hold the expected pressure during the monitor test.
- After replacing the vent solenoid, the EVAP monitor may take several drive cycles to run; do not assume the repair failed if the light stays off but the monitor is incomplete.

Can I keep driving with P1494?

You can usually continue driving with P1494 because it does not affect engine performance or safety, but have it diagnosed soon to avoid a failed emissions test and to prevent fuel vapor leaks that harm the environment. Avoid topping off the fuel tank and park away from open flames until repaired.

Tools that help

- OBD-II scan tool with bidirectional control
- Digital multimeter
- Smoke machine
- Hand tools (screwdrivers, socket set)
- Flashlight and mirror



Reading P1494

- P** Powertrain: engine, transmission and emissions.
- 1** Manufacturer-specific code (Mitsubishi): its meaning depends on the make.
- 4** Auxiliary emission controls.
- 94** The exact fault within that area.

Often seen with

P1495 EVAP Ventilation Solenoid Circuit Fault · **P1495** Leak Detection Pump Solenoid Circuit Open Or Shorted · **P1495** Leak Detection Pump Solenoid Circuit Open Or Shorted · **P0441** EVAP System Incorrect Purge Flow · **P0442** EVAP System Leak Detected (Small) · **P0455** EVAP System Leak Detected (Large) · **P0456** Evaporative Emission System Leak Detected (very small leak)

See it working

Watch the animated explainer [How ABS Works: Anti-Lock Brakes in X-Ray](#) on Auto Veteran to see the parts involved moving.

Full guide, related articles and animations: <https://www.autoveteran.tech/dtc-codes/mitsubishi-p1494/>

