

GENERIC · NETWORK

U3574

OBD-II DIAGNOSTIC TROUBLE CODE (DTC)

U3574

Coolant Mixing Valve

U3574 indicates that the vehicle's control module has detected a fault in the coolant mixing valve circuit, which is responsible for regulating coolant flow between different cooling loops to manage temperature. The computer monitors the valve's electrical circuit and expected response, and it sets this code when the signal or feedback does not match commanded values.

SYSTEM	CODE TYPE	SEVERITY	FIX DIFFICULTY	AREA
Network	Generic (all makes)	Medium	Intermediate	Network communication

Symptoms you may notice

- Illumination of the malfunction indicator lamp (MIL) on the dashboard
- Often no symptoms besides the warning light
- Inconsistent cabin heater performance, such as blowing warm air on one side and cold on the other
- Engine temperature gauge fluctuating or reading higher than normal
- Reduced fuel economy or altered engine performance due to incorrect coolant temperature
- Cooling fan running excessively or not engaging as expected

Common causes, most likely first

- 1 Faulty coolant mixing valve (sticking, seized, or electrically failed)
- 2 Damaged or corroded wiring harness or connector at the valve
- 3 Blown fuse or poor ground connection for the valve circuit
- 4 Failed control module driver or internal fault in the module controlling the valve
- 5 Coolant contamination or debris obstructing valve movement
- 6 Air pockets in the cooling system causing erratic valve operation

How to diagnose and fix it

- 1 Scan all modules for stored codes and freeze-frame data to confirm U3574 is active and not historical
- 2 Inspect the coolant mixing valve connector and wiring for corrosion, damage, or loose pins
- 3 Check the fuse and ground circuits associated with the valve using a multimeter
- 4 Command the valve with a scan tool and observe its operation and feedback signal
- 5 Test the valve's resistance and compare to manufacturer specifications
- 6 Flush and bleed the cooling system if contamination or air pockets are suspected
- 7 Replace the coolant mixing valve if electrical and mechanical tests indicate failure



What the coolant mixing valve code hides

- A coolant mixing valve that sticks intermittently may not set a code until the fault occurs multiple times, so a history code can still indicate a real problem.
- Wiring issues at the valve connector are often misdiagnosed as a failed valve because the connector is exposed to heat and coolant vapors.
- Some vehicles use the mixing valve for cabin heater control, so a fault can cause heater performance complaints without any engine overheating.
- Air trapped in the cooling system after a repair can cause the valve to appear faulty because the valve cannot move coolant effectively.
- The control module may set U3574 even when the valve is mechanically sound, if the feedback signal is outside expected range due to a poor ground.

Can I keep driving with U3574?

You can usually drive with this code, but monitor engine temperature closely and avoid long trips or heavy loads until repaired. If the temperature gauge climbs above normal or you notice coolant loss, stop driving and seek service immediately.

Tools that help

- OBD-II scan tool with bidirectional control
- Digital multimeter
- Socket and ratchet set
- Coolant refractometer or hydrometer
- Wiring diagram for the specific vehicle

Reading U3574

U	Network: communication between the vehicle's control modules.
3	Generic (SAE) code: it means the same thing on every OBD-II vehicle.
5	Network communication.
74	The exact fault within that area.

Often seen with

P0128 Coolant Thermostat (Coolant Temperature Below Thermostat Reg · **P0597** Thermostat Heater Control Circuit/Open · **P0598** Thermostat Heater Control Circuit Low · **P0599** Thermostat Heater Control Circuit High · **P2181** Cooling System Performance



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/u3574/>

