

GENERIC · CHASSIS

C065E

OBD-II DIAGNOSTIC TROUBLE CODE (DTC)

C065E

Right Front Wheel Speed Sensor B Incorrect Component Installed

The anti-lock braking system (ABS) module has detected that the right front wheel speed sensor circuit is receiving a signal inconsistent with the expected sensor type, meaning the installed sensor is not the correct component for that position. The module compares the sensor's electrical signature against its programmed calibration and flags the mismatch as a stored fault.

SYSTEM	CODE TYPE	SEVERITY	FIX DIFFICULTY	AREA
Chassis	Generic (all makes)	Medium	Intermediate	Brakes, steering and suspension

Symptoms you may notice

- The ABS warning light illuminates steadily on the dashboard.
- The traction control and stability control warning lights may also come on because those systems rely on the same wheel speed signal.
- The ABS system may be disabled, which can be felt as a lack of pedal pulsation during hard braking on slippery surfaces.
- A scan tool may show no live wheel speed reading for the right front position, or a fixed implausible value.
- Often no symptoms besides the warning light, with normal braking performance in everyday driving.

Common causes, most likely first

- An aftermarket or incorrect-specification wheel speed sensor was installed in the right front position.
- A right front sensor from a different trim level or model year was fitted, even though it physically bolts in place.
- The sensor connector or harness was repaired with a pigtail that does not match the original sensor's electrical characteristics.
- The ABS module was replaced or reflashed with calibration for a different sensor type than what is physically installed.
- A sensor that was correct when new has been superseded by a later part number that the module does not recognize.
- Corrosion or terminal damage in the right front sensor connector mimics a wrong-component signal by altering resistance.
- A wiring harness repair introduced incorrect resistance or shielding that the module interprets as an incompatible sensor.



How to diagnose and fix it

- 1 Connect a scan tool and read the ABS module for stored and pending codes, then record the right front wheel speed live data while spinning that wheel by hand.
- 2 Visually inspect the right front sensor, its connector, and the harness routing for aftermarket labels, mismatched part numbers, or recent repair work.
- 3 Compare the installed sensor's part number and connector keying against the factory parts catalog for the vehicle's exact trim and build date.
- 4 Measure the sensor's resistance and compare it with the specification for the correct original sensor, looking for a value that matches a different sensor family.
- 5 Check the ABS module calibration or part number against the vehicle build data to confirm the module expects the sensor that is installed.
- 6 Replace the right front sensor with the correct original-equipment or equivalent sensor, clear the code, and verify the live data reads smoothly while the wheel is rotated.
- 7 If the code returns with a known-correct sensor, perform a module relearn or calibration procedure and recheck the harness for induced resistance.

Why a new sensor still sets C065E

- A sensor that fits the bracket and plugs in does not guarantee it is the correct component, because wheel speed sensors can look identical while using different internal element types or resistance ranges.
- This code is frequently set after a brake or suspension repair where a sensor was replaced from a parts-store listing that covered multiple trim levels but not the exact build configuration.
- The ABS module may accept the wrong sensor at key-on and only set C065E once the vehicle exceeds a low speed, so a stationary scan can miss the mismatch.
- A harness repair using crimp connectors or the wrong gauge wire can change the circuit's electrical signature enough for the module to report an incorrect component rather than an open circuit.
- C065E does not always mean the sensor itself is wrong; a module with the wrong calibration loaded will reject a perfectly correct sensor.

Can I keep driving with C065E?

The vehicle remains safe to drive at normal speeds because base braking is unaffected, but the ABS and stability systems may be disabled, so avoid hard braking on wet, icy, or loose surfaces until the fault is corrected.



Tools that help

- OBD-II scan tool with ABS module capability and live wheel speed data
- Digital multimeter for resistance and voltage checks
- Factory or equivalent service information for sensor specifications and module calibration
- Jack and jack stands or a lift to raise the right front wheel
- Terminal pick and electrical contact cleaner for connector inspection

Reading C065E

C	Chassis: brakes, steering and suspension.
0	Generic (SAE) code: it means the same thing on every OBD-II vehicle.
6	Brakes, steering and suspension.
5E	The exact fault within that area.

Often seen with

C0035 Left Front Wheel Speed Sensor Circuit Range/Performance · **C0040** Left Rear Wheel Speed Sensor Circuit · **C0050** Right Rear Wheel Speed Sensor Circuit Malfunction · **C065D** Right Front Wheel Speed Sensor B Correlation · **C065F** Left Rear Wheel Speed Sensor B Circuit/Open

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/c065e/>

