



P1383 · Ford

Cam Timing Advance is Excessive

P1383 on a Ford means the powertrain control module (PCM) has detected that the camshaft timing is advancing more than the commanded value during its self-test. The PCM compares the actual cam position from the camshaft position sensor against the desired advance and flags the code when the measured advance exceeds the calibrated limit.

SYSTEM	CODE TYPE	SEVERITY	FIX DIFFICULTY	AREA
Powertrain	Ford specific	Medium	Intermediate	Ignition system and misfire

Symptoms you may notice

- Illuminated check engine light, often with no other noticeable symptoms
- Rough idle or idle surge when the cam phaser is stuck advanced
- Reduced engine power or poor acceleration from incorrect valve timing
- Decreased fuel economy due to inefficient combustion
- Occasional misfire or hesitation under light load
- Hard starting or extended crank when the cam is over-advanced at startup

Common causes, most likely first

- 1 Sticking or failed variable cam timing (VCT) solenoid
- 2 Sludge or debris blocking the VCT oil passage in the phaser or solenoid
- 3 Worn or damaged camshaft phaser assembly
- 4 Low engine oil level or degraded oil causing poor phaser response
- 5 Faulty camshaft position sensor or damaged wiring to it
- 6 PCM calibration issue or faulty PCM (rare)

How to diagnose and fix it

- 1 Check engine oil level and condition; top off or change oil if contaminated
- 2 Inspect the VCT solenoid for sludge and test its resistance and function
- 3 Remove and clean the VCT solenoid and oil passages, then retest
- 4 Verify camshaft position sensor signal with a scan tool or oscilloscope
- 5 Compare commanded versus actual cam timing using a scan tool to confirm the fault
- 6 Replace the VCT solenoid or phaser if cleaning does not resolve the over-advance
- 7 Clear the code and perform a road test to confirm the repair



Oil quality drives VCT codes on Fords

- A sticking VCT solenoid is the most common cause of P1383 on Ford engines, and it often sets no drivability symptoms beyond the light.
- Dirty or incorrect-viscosity oil can cause the phaser to over-advance without any mechanical wear, so an oil change sometimes clears the code.
- The code can be set by a camshaft position sensor that is slow to respond rather than by a true mechanical over-advance.
- Technicians who replace the phaser without checking the solenoid often see the code return because the solenoid was the real culprit.
- On some Ford engines, a PCM calibration update addresses false P1383 setting under specific operating conditions.

Can I keep driving with P1383?

You can usually drive the vehicle short distances to a repair shop, but avoid heavy acceleration or sustained high speeds because over-advanced cam timing can cause misfires and increased exhaust temperatures. If the engine runs rough or loses power, stop driving and have it towed.

Tools that help

- OBD-II scan tool with live data and Ford-specific PIDs
- Digital multimeter
- Oscilloscope for cam and crank sensor signals
- Basic hand tools (socket set, wrenches)
- Oil filter wrench and drain pan

Reading P1383

P	Powertrain: engine, transmission and emissions.
1	Manufacturer-specific code (Ford): its meaning depends on the make.
3	Ignition system and misfire.
83	The exact fault within that area.

Often seen with

P1381 CYP Sensor A Intermittent Interruption · **P1382** CYP Sensor A No Signal · **P1382** Camshaft Position Timing Solenoid 1 Circuit · **P1381** CYP Sensor A Intermittent Interruption · **P1382** CYP Sensor A No Signal · **P1381** Misfire Detected No Communication with Brake Control Module · **P1381** Cam Timing Advance is Excessive · **P1381** Misfire Detected No Communication with Brake Control Module · **P0011** 'A' Camshaft Position - Timing Over-Advanced or System Perfo · **P0012** 'A' Camshaft Position - Timing Over-Retarded (Bank 1) · **P0021** 'A' Camshaft Position - Timing Over-Advanced or System Perfo



See it working

Watch the animated explainer [Manual Car Driving Simulator: Learn Clutch Control](#) on Auto Veteran to see the parts involved moving.

Full guide, related articles and animations: <https://www.autoveteran.tech/dtc-codes/ford-p1383/>

