

## CADILLAC P1B0F: DRIVE MOTOR 1 POSITION LEARN INCORRECT

### OVERVIEW

Severity	:	High
DIY Difficulty Level	:	Advanced
Repair Cost	:	\$500-\$3500
Can I Still Drive?	:	No

### What Does The Cadillac P1B0F Code Mean?

Condition 1, 2, 3 and 4 Hybrid wake-up signal is not active because the ignition has been transitioned from RUN to OFF. The motor control module has learned a valid drive motor position sensor offset value at least once. Condition 2 Motor speed is less than 20 RPM.

### What Are The Potential Causes Of The Cadillac P1B0F Code?

- Condition 1: Position sensor offset value not learned because drive motor speed is greater than 50 RPM.
- Condition 2: Position sensor offset value not learned because hybrid battery voltage as observed at the motor control module is less than 192V.
- Condition 3: Position sensor offset value not learned because drive motor phase to phase current difference is less than 15 A.
- Condition 4: Position sensor offset value not learned because the offset learn value is greater than the maximum allowed offset of 25 degrees.

### Reference Sources

[Cadillac P1B0F](#), DTCDECODE.