

Q : DTC P0335, P0336; CRANKSHAFT POSITION (CKP) SENSOR CIRCUIT MALFUNCTION, ENGINE SPEED INPUT ERROR

NOTE:

The clearance between the CKP sensor and the reluctor ring should be checked at 90° intervals. The air gap between the two should be no greater than 4.5 mm at any point.

Q1 : CHECK THE CKP SENSOR FOR CORRECT INSTALLATION

1. Turn the ignition switch to the OFF position.
2. Check the CKP sensor for correct installation.

•Is the CKP sensor correctly installed?

-> **Yes**

Goto <<Q2>>

-> **No**

INSTALL the CKP sensor correctly. Reconnect the sensor. CLEAR the DTCs. TEST the system for normal operation.

Q2 : CHECK THE CKP SENSOR FOR DEBRIS

1. Remove the CKPS and inspect for debris.

•Is the CKP sensor free of debris?

-> **Yes**

Goto <<Q3>>

-> **No**

CLEAN the sensor and wheel. INSTALL the sensor. Reconnect the sensor. CLEAR the DTCs. TEST the system for normal operation.

Q3 : CHECK THE CKP SENSOR SENSE CIRCUIT FOR HIGH RESISTANCE

1. Disconnect the battery negative terminal.
2. Disconnect the ECM electrical connector, EM83.
3. Measure the resistance between EM83, pin 08 (Y) and PI17, pin 02 (Y).

•Is the resistance greater than 5 ohms?

-> **Yes**

REPAIR the high resistance circuit. For additional information, refer to the wiring diagrams. CLEAR the DTC. TEST the system for normal operation.

-> **No**

Goto <<Q4>>

Q4 : CHECK THE CKP SENSOR SENSE CIRCUIT FOR SHORT TO HIGH VOLTAGE

1. Reconnect the battery negative terminal.
2. Turn the ignition switch to the ON position.
3. Measure the voltage between PI17, pin 02 (Y) and GROUND.

•Is the voltage greater than 1 volt?

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-> **Yes**

REPAIR the short circuit to high voltage. For additional information, refer to the wiring diagrams.
CLEAR the DTC. TEST the system for normal operation.

-> **No**

Goto <<Q5>>

Q5 : CHECK THE CKP SENSOR SENSE CIRCUIT FOR SHORT TO GROUND

1. Turn the ignition switch to the OFF position.
2. Measure the resistance between EM83, pin 08 (Y) and GROUND.

•Is the resistance less than 10,000 ohms?

-> **Yes**

REPAIR the short circuit to GROUND. For additional information, refer to the wiring diagrams. CLEAR the DTC. TEST the system for normal operation.

-> **No**

INSTALL a new CKP sensor. CLEAR the DTC. TEST the system for normal operation.