

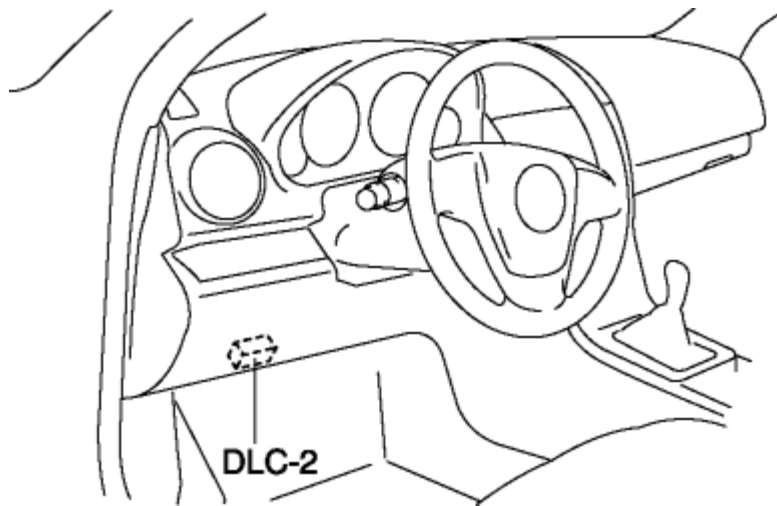
2012 - Mazda6 - Brakes

FRONT ABS WHEEL-SPEED SENSOR INSPECTION

Sensor Output Value Inspection

CAUTION:

- Performing the resistance inspection using a tester may cause damage to the ABS wheel-speed sensor internal circuit. Be sure to use the M-MDS to inspect the ABS wheel-speed sensor.
1. Switch the ignition to off.
 2. Connect the M-MDS (IDS) to the DLC-2.



3. Select the following PIDs using the M-MDS:
 - WSPD_LF
(LF wheel-speed sensor)
 - WSPD_RF
(RF wheel-speed sensor)
4. Start the engine and drive the vehicle.
5. Verify that the display of the M-MDS shows the same value as the speedometer.
 - If there is any malfunction, replace the ABS wheel-speed sensor.

Installation Visual Inspection

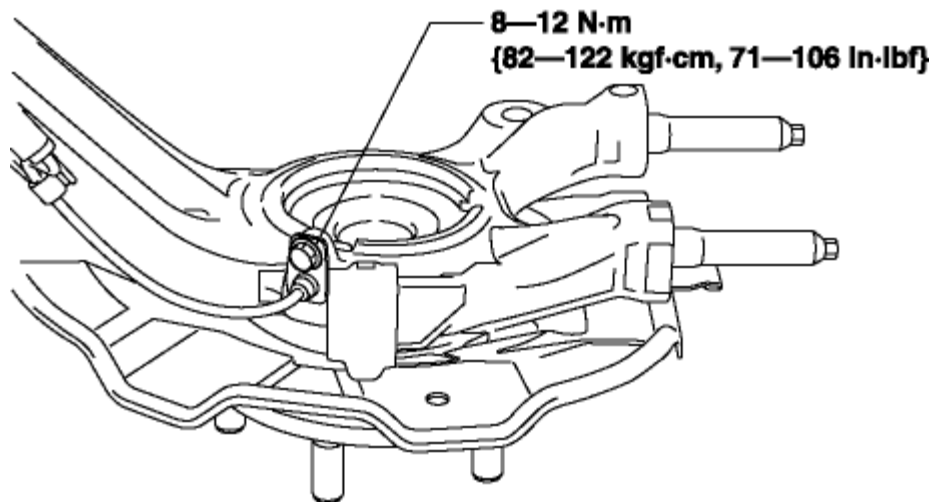
1. Inspect the following items:

- If there is any malfunction, replace the applicable part.
- a. Is there any looseness or play?
- b. Has the sensor been deformed?

Clearance Inspection

Preparation prior to inspection

1. Remove the ABS wheel-speed sensor. (See **FRONT ABS WHEEL-SPEED SENSOR REMOVAL/ INSTALLATION**.)
2. Remove the wheel hub, steering knuckle component. (See **WHEEL HUB, STEERING KNUCKLE REMOVAL/ INSTALLATION**.)
3. Install the ABS wheel-speed sensor to the removed wheel hub, steering knuckle component, and tighten to the specified torque.

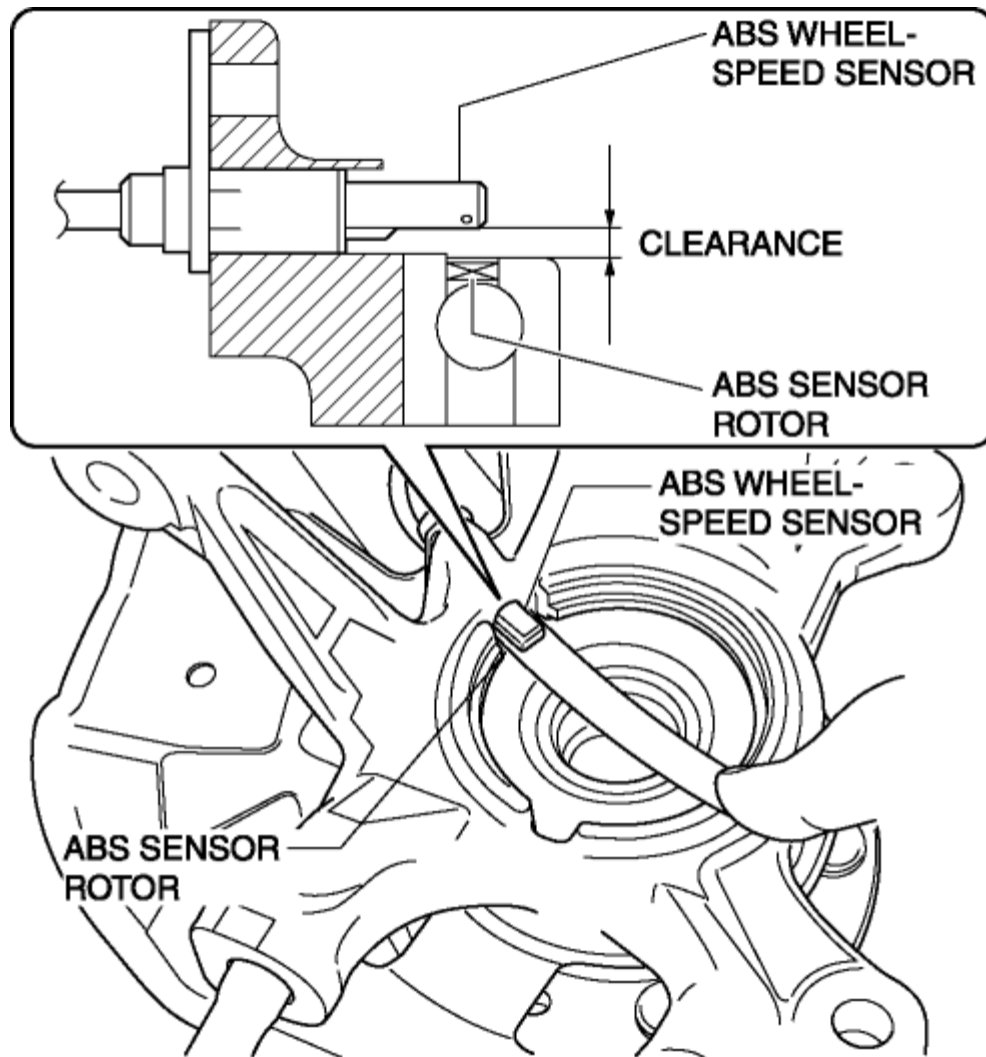


Tightening torque

- 8—12 N·m {82—122 kgf·cm, 71—106 in·lbf}

Clearance Inspection

1. Measure the gap between the ABS sensor rotor and ABS wheel-speed sensor using a feeler gauge.



- If not within the specification, verify the following items and repair or replace if necessary.
 - Is there deformation or damage to the ABS sensor rotor?
 - Is there deformation or damage to the ABS wheel speed sensor?
 - Is there foreign material adhering?

Clearance

- 0.6—1.5 mm {0.03—0.05 in}

Servicing after inspection

1. Remove the ABS wheel-speed sensor from the wheel hub, steering knuckle component.
2. Install the wheel hub, steering knuckle component. (See [WHEEL HUB, STEERING KNUCKLE REMOVAL/ INSTALLATION.](#))
3. Install the ABS wheel-speed sensor. (See [FRONT ABS WHEEL-SPEED SENSOR REMOVAL/ INSTALLATION.](#))
4. Inspect the front wheel alignment. (See [FRONT WHEEL ALIGNMENT.](#))

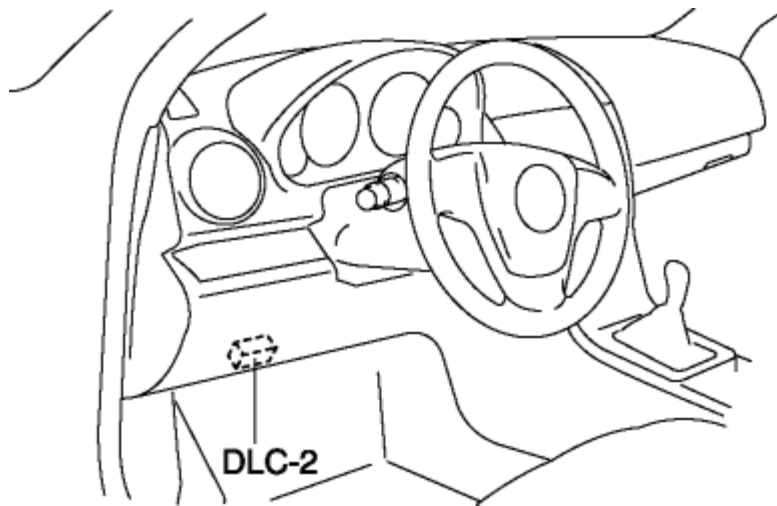
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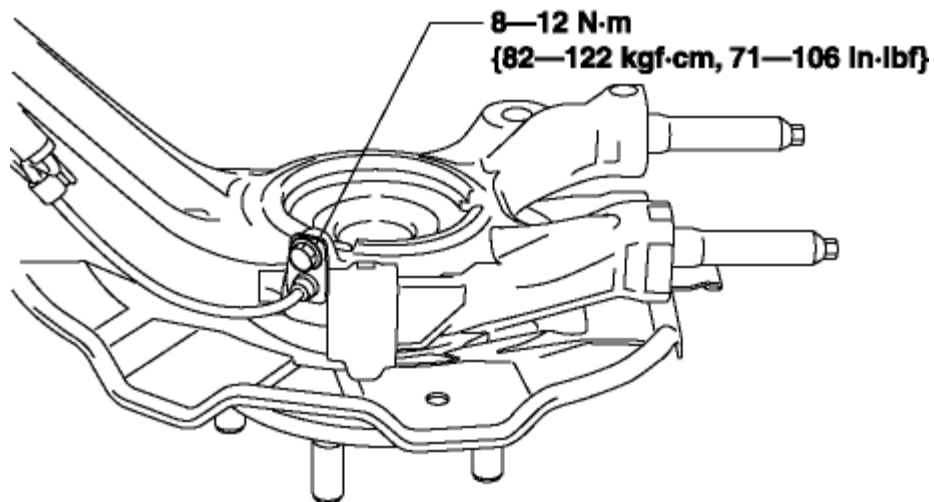
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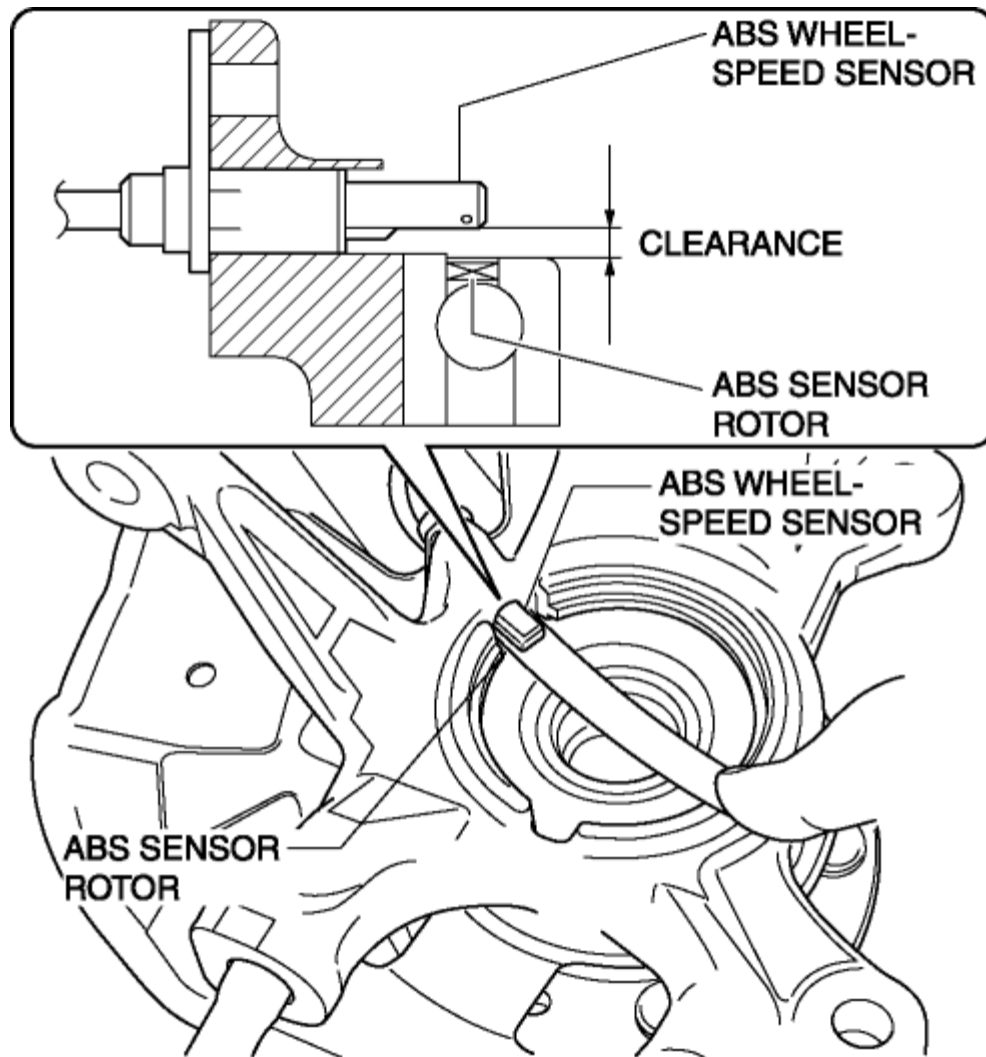


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