2012 - Mazda6 - Restraints

DTC B0094:11/ B0094:13/ B0094:87/ B0094:96

System Malfunction Location

DTC M-MDS display	System Malfunction Location
B0094:11	Crash zone sensor circuit short to power supply or body ground
B0094:13	Crash zone sensor circuit open line
B0094:87	Invalid signal from crash zone sensor
B0094:96	Crash zone sensor internal malfunction

Detection Condition

WARNING:

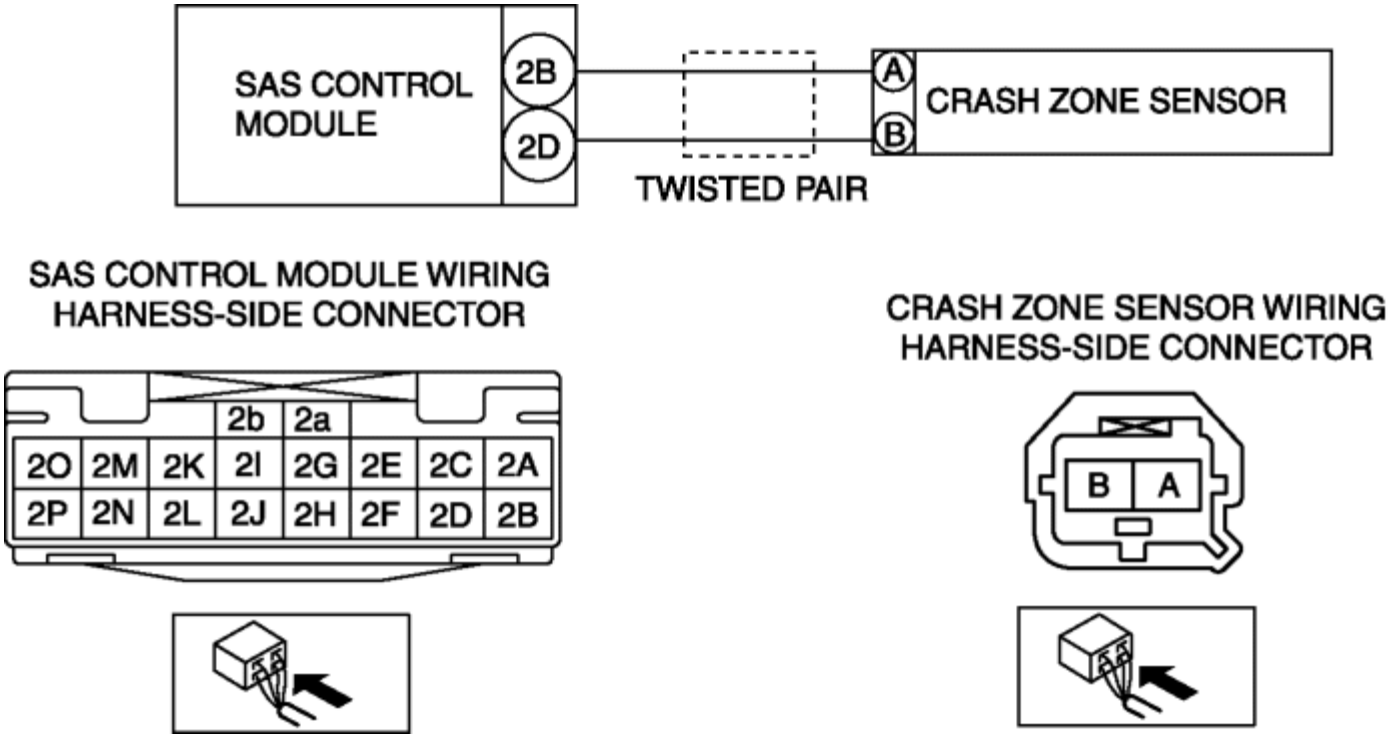
- Detection conditions are for understanding the DTC outline before performing an inspection. Performing an inspection according to only the detection conditions may cause injury due to an operating error, or damage the system. When performing an inspection, always follow the inspection procedure.
- Malfunction in the wiring harness between the crash zone sensor and SAS control module
- Malfunction in the crash zone sensor circuit

Possible Causes

- Crash zone sensor connector malfunction
- Open or short circuit or short to ground or short to power supply in the wiring harness between the crash zone sensor and SAS control module
- Crash zone sensor malfunction

- SAS control module malfunction

System Wiring Diagram



Diagnostic Procedure

Step	Inspection		Action
1	**INSPECT CRASH ZONE SENSOR CONNECTOR** **WARNING:** • Handling the component parts improperly can accidentally operate (deploy) the air bag module, which may seriously injure you. Read the service warnings/cautions and the workshop manual before handling the air bag system components. (See **AIR BAG SYSTEM SERVICE WARNINGS**.)(See **AIR BAG SYSTEM SERVICE CAUTIONS**.) • Switch the ignition to off. • Disconnect the negative battery cable and wait for **1 min or more**. • Disconnect the crash zone sensor connector. (See **CRASH ZONE SENSOR REMOVAL/ INSTALLATION**.) • Inspect the crash zone sensor connector. (Corrosion,	Yes	Replace the crash zone sensor wiring harness.
		No	Go to the next step.

	damage, and disconnected pins) • Is there any malfunction of the crash zone sensor connector?		
2	**INSPECT WIRING HARNESS BETWEEN SAS CONTROL MODULE AND CRASH ZONE SENSOR** • Disconnect all SAS control module connectors. • Inspect the wiring harnesses between SAS control module terminal 2B and crash zone sensor terminal A, SAS control module terminal 2D and crash zone sensor terminal B for the following: ▪ Short to body ground ▪ Open circuit ▪ Short circuit between terminals **NOTE:** • Inspect for continuity while shaking the wiring harness between the SAS control module and crash zone sensor. • Is the wiring harness normal?	Yes	Go to the next step.
		No	Replace the wiring harness between the SAS control module and the crash zone sensor.
3	**INSPECT THE WIRING HARNESS BETWEEN THE SAS CONTROL MODULE AND CRASH ZONE SENSOR FOR A SHORT CIRCUIT TO THE POWER SUPPLY** • Connect the negative battery cable. • Switch the ignition to ON with SAS control module and crash zone sensor connector disconnected. • Measure the voltage of SAS control module connector terminals 2B and 2D of SAS control module harness side connector. **NOTE:** • Measure the voltage while shaking the wiring harness between the SAS control module and crash zone sensor. • Is the voltage measured?	Yes	Replace the wiring harness between the SAS control module and the crash zone sensor.
		No	Go to the next step.
4	**PERFORM DTC INSPECTION** • Switch the ignition to off. • Disconnect the negative battery cable and wait for **1min or more**. • Connect the crash zone sensor connector. • Connect the SAS control module connectors. • Connect the negative battery cable.	Yes	Replace the crash zone sensor, then go to the next step. (See **CRASH ZONE SENSOR REMOVAL/ INSTALLATION**.)
		No	DTC troubleshooting completed.

	• Switch the ignition to ON. • Clear DTCs using the M-MDS. (See **CLEARING DTC**.) • Perform the DTC inspection for the SAS control module using the M-MDS. (See **DTC INSPECTION**.) • Are DTCs B0094:11, B0094:13, B0094:87 and/or B0094:96 displayed?		
5	**RE-PERFORM DTC INSPECTION** • Switch the ignition to ON. • Clear DTCs using the M-MDS. (See **CLEARING DTC**.) • Perform the DTC inspection for the SAS control module using the M-MDS. (See **DTC INSPECTION**.) • Are DTCs B0094:11, B0094:13, B0094:87 and/or B0094:96 displayed?	Yes	Replace the SAS control module. (See **SAS CONTROL MODULE REMOVAL/INSTALLATION**.)
		No	DTC troubleshooting completed.

< Previous **Next >**

Back to Top

2012 - Mazda6 - Restraints

DTC B0094:11/ B0094:13/ B0094:87/ B0094:96

System Malfunction Location

DTC M-MDS display	System Malfunction Location
B0094:11	Crash zone sensor circuit short to power supply or body ground
B0094:13	Crash zone sensor circuit open line
B0094:87	Invalid signal from crash zone sensor
B0094:96	Crash zone sensor internal malfunction

Detection Condition

WARNING:

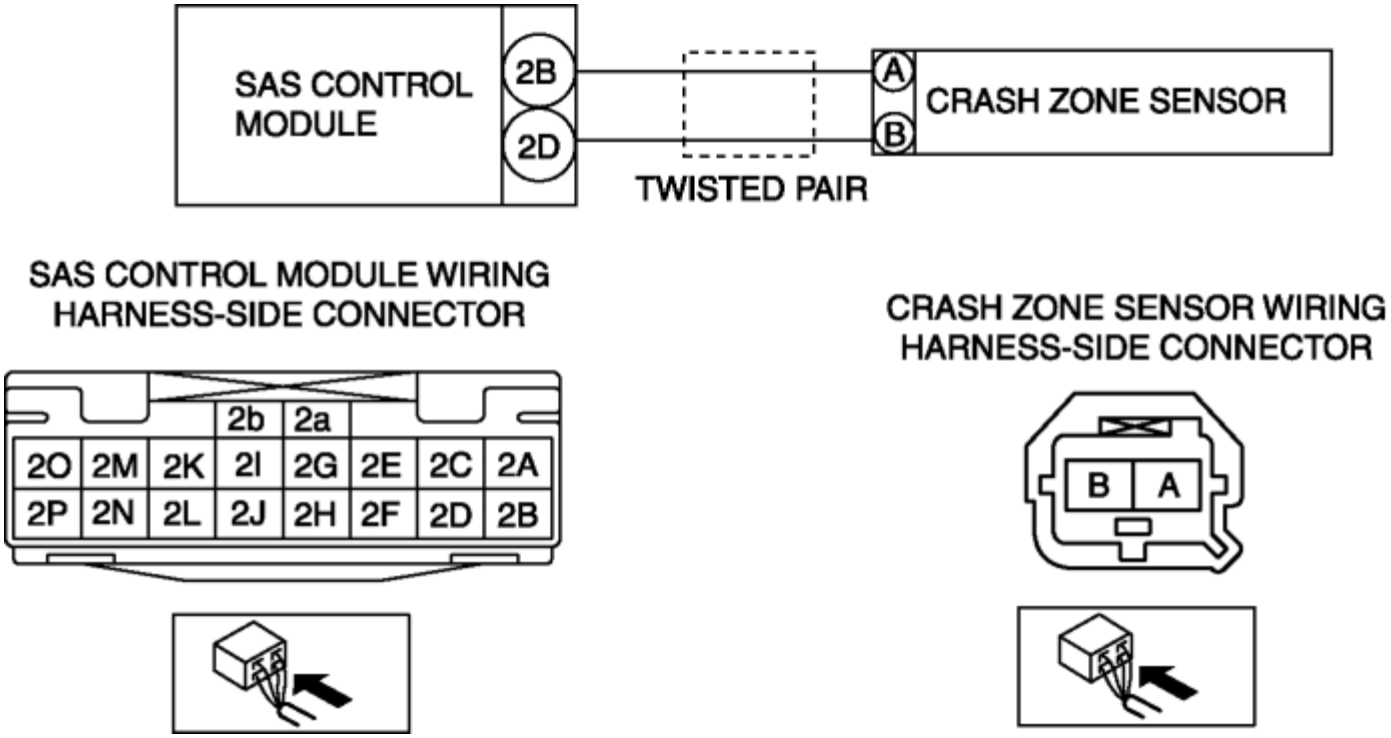
- Detection conditions are for understanding the DTC outline before performing an inspection. Performing an inspection according to only the detection conditions may cause injury due to an operating error, or damage the system. When performing an inspection, always follow the inspection procedure.
- Malfunction in the wiring harness between the crash zone sensor and SAS control module
- Malfunction in the crash zone sensor circuit

Possible Causes

- Crash zone sensor connector malfunction
- Open or short circuit or short to ground or short to power supply in the wiring harness between the crash zone sensor and SAS control module
- Crash zone sensor malfunction

- SAS control module malfunction

System Wiring Diagram



Diagnostic Procedure

Step	Inspection		Action
1	**INSPECT CRASH ZONE SENSOR CONNECTOR** **WARNING:** • Handling the component parts improperly can accidentally operate (deploy) the air bag module, which may seriously injure you. Read the service warnings/cautions and the workshop manual before handling the air bag system components. (See **AIR BAG SYSTEM SERVICE WARNINGS**.)(See **AIR BAG SYSTEM SERVICE CAUTIONS**.) • Switch the ignition to off. • Disconnect the negative battery cable and wait for **1 min or more**. • Disconnect the crash zone sensor connector. (See **CRASH ZONE SENSOR REMOVAL/ INSTALLATION**.) • Inspect the crash zone sensor connector. (Corrosion,	Yes	Replace the crash zone sensor wiring harness.
		No	Go to the next step.

	damage, and disconnected pins) • Is there any malfunction of the crash zone sensor connector?		
2	**INSPECT WIRING HARNESS BETWEEN SAS CONTROL MODULE AND CRASH ZONE SENSOR** • Disconnect all SAS control module connectors. • Inspect the wiring harnesses between SAS control module terminal 2B and crash zone sensor terminal A, SAS control module terminal 2D and crash zone sensor terminal B for the following: ▪ Short to body ground ▪ Open circuit ▪ Short circuit between terminals **NOTE:** • Inspect for continuity while shaking the wiring harness between the SAS control module and crash zone sensor. • Is the wiring harness normal?	Yes	Go to the next step.
		No	Replace the wiring harness between the SAS control module and the crash zone sensor.
3	**INSPECT THE WIRING HARNESS BETWEEN THE SAS CONTROL MODULE AND CRASH ZONE SENSOR FOR A SHORT CIRCUIT TO THE POWER SUPPLY** • Connect the negative battery cable. • Switch the ignition to ON with SAS control module and crash zone sensor connector disconnected. • Measure the voltage of SAS control module connector terminals 2B and 2D of SAS control module harness side connector. **NOTE:** • Measure the voltage while shaking the wiring harness between the SAS control module and crash zone sensor. • Is the voltage measured?	Yes	Replace the wiring harness between the SAS control module and the crash zone sensor.
		No	Go to the next step.
4	**PERFORM DTC INSPECTION** • Switch the ignition to off. • Disconnect the negative battery cable and wait for **1min or more**. • Connect the crash zone sensor connector. • Connect the SAS control module connectors. • Connect the negative battery cable.	Yes	Replace the crash zone sensor, then go to the next step. (See **CRASH ZONE SENSOR REMOVAL/ INSTALLATION**.)
		No	DTC troubleshooting completed.

	• Switch the ignition to ON. • Clear DTCs using the M-MDS. (See **CLEARING DTC**.) • Perform the DTC inspection for the SAS control module using the M-MDS. (See **DTC INSPECTION**.) • Are DTCs B0094:11, B0094:13, B0094:87 and/or B0094:96 displayed?		
5	**RE-PERFORM DTC INSPECTION** • Switch the ignition to ON. • Clear DTCs using the M-MDS. (See **CLEARING DTC**.) • Perform the DTC inspection for the SAS control module using the M-MDS. (See **DTC INSPECTION**.) • Are DTCs B0094:11, B0094:13, B0094:87 and/or B0094:96 displayed?	Yes	Replace the SAS control module. (See **SAS CONTROL MODULE REMOVAL/INSTALLATION**.)
		No	DTC troubleshooting completed.

< Previous **Next >**

Back to Top