Mazda North American Operations Irvine, CA 92618-2922



Subject:

WATER PUMP COOLANT LEAK

Service Alert No.: SA-081/23

Last Issued : 12/05/2023

BULLETIN NOTES

This bulletin supersedes the previously issued bulletin(s) listed below: The changes are noted in Red.

Previous TSBs:	Date(s) Issued:
01-022/19	12/13/2019
01-016/16	08/26/2016
01-004/09	02/03/2009

APPLICABLE MODEL(S)/VINS

2020-2024 CX-30 2018-2021 CX-3 2018-2024 CX-5 2023-2024 CX-50 2018-2023 CX-9 2024 CX-90 2018-2024 MX-5 2018-2024 Mazda3 2018-2021 Mazda6

DESCRIPTION

There is a concern that some water pumps are being replaced that are not faulty, due to signs of a very small coolant leak from the bleed hole. This Service Alert is to inform you about the water pump sealing mechanism and the criteria if replacement is necessary or not.

Normal Water Pump Coolant Seepage

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A mechanical seal (A) is used for the water pump. This mechanical seal can seal coolant (B) by sliding a mating ring (C) against a seal ring (D). When the sliding surface temperature of the mechanical seal is more than 248 °F (120 °C) while driving, a small amount of steam (E) is leaked and bleeds through the bleeding hole (F). After drying, the steam leaves a green coolant deposit near the water pump bleed hole (F). This is a normal condition and does not require water pump replacement. The water pump should only be replaced if there is an accumulation of crystallized coolant near the bleed hole.



Bleed hole (F) is located under water pump

Dried coolant steam shows as green-color deposit at bleed

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Water Pump Samples:	
GOOD	NO GOOD
No accumulation of crystallized coolant near the bleed hole (F).	Accumulation of crystallized coolant near the bleed hole (F)
DO NOT replace the water pump.	REPLACE the water pump.
	F

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NOTE:

- Regarding the following engines, diagnose whether the water pump requires replacement as with the other engines in this service information.
- Refer to the following images regarding the location of the bleeding hole (white dotted circle).

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SKYACTIV-G 2.5 (PYUL)



SKYACTIV-G 3.3 (H3T)

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REPAIR PROCEDURE

1. Verify customer concern.

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2. Verify repair.

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