



U.S. Department
of Transportation
**National Highway
Traffic Safety
Administration**

ODI RESUME

OFFICE OF DEFECTS INVESTIGATION



Investigation: PE20006

Prompted By: EWR Field Reports and Fleet Interviews

Date Opened: 05/01/2020

Date Closed: 03/27/2024

Investigator: Robert Nguyen

Reviewer: Joshua Neff

Approver: Tanya Topka

Subject: Intermittent Loss of Power Steering Assist

MANUFACTURER & PRODUCT INFORMATION

Manufacturer: ZF North America, Inc.

Affected Manufacturers: Daimler Trucks North America, PACCAR, Volvo Trucks North America.

Products: 2010-2020 Freightliner Cascadia, M2, WST; Volvo Trucks of North America VN, VAH and VHD; Paccar 337, 365, 389, 567, 579

Population: 1,367,086

Problem Description: Alleged intermittent loss of power steering assist in vehicles equipped with a ZF/TRW THP60 steering gear in certain model year 2010-2020 Daimler Trucks of North America (DTNA), Volvo Trucks of North America (VTNA), and PACCAR vehicles.

FAILURE REPORT SUMMARY

	ODI	Manufacturer	EWR D&I	Other	Total	EWR Field Reports
All Incidents:	6	0	0	0	6	CONF
Crashes/Fires:	1	0	0	0	1	0
Injury Incidents:	1	0	0	0	1	0
Number of Injuries:	1	0	0	0	1	0
Fatality Incidents:	0	0	0	0	0	0
Number of Fatalities:	0	0	0	0	0	0

Description of Other:

ACTION/SUMMARY INFORMATION

Action: This (PE) Preliminary Evaluation is closed without a manufacturer action.

Summary:

On May 1, 2020, the Office of Defects Investigation (ODI) opened PE20006 to investigate complaints of intermittent loss of power steering assist in Daimler Truck North America (DTNA), Volvo Trucks of North America (Volvo) and PACCAR vehicles equipped with a ZF/TRW (TRW) THP60 steering gear. The

investigation focused on 2010-2020 DTNA Freightliner Cascadia, M2 and WST; Volvo VN, VAH and VHD and PACCAR 337, 365, 389, 567, 579 model vehicles. Field reports and interviews with fleet drivers allege that high power steering fluid temperatures could result in internal seal and bearing failures causing pressure fluctuation, affecting left and right-hand turns. The inability of the driver to steer the vehicle as intended can increase the risk of a crash and injury.

ODI analyzed data provided by TRW, DTNA, Volvo, and PACCAR in response to individual information request letters. ODI found that most failures occurred within the first two years and/or 50,000 miles of service. The claim rate decreased with time and miles in service and remained less than 0.5%. ODI normalized data from each of the manufacturers and determined that there was not a substantial difference in the failures. Additionally, TRW improved a seal in the steering gear in December 2015. Trucks built on or after 2016 (as 2017 and newer model years) show a decreasing trend of failures.

In view of the overall low failure rate, the nature of early-life failure, and failure rate trending downward for model years 2017 and newer, this Preliminary Evaluation (PE) is closed. The closing of this investigation does not constitute a finding by NHTSA that a safety-related defect does not exist. The Agency reserves the right to take additional action if warranted by future circumstances. To review the ODI reports cited in the Closing Resume ODI Report Identification Number document, go to [NHTSA.gov](https://www.nhtsa.gov).