U.S. Department of Transportation

National Highway Traffic Safety Administration

ODI RESUME

OFFICE OF DEFECTS INVESTIGATION
NHTSA
NATIONAL HIGHWAY TRAFFIC SAFETY ADMINISTRATION

Investigation: EQ19002
Prompted By: 19E-080
Date Opened: 12/16/2019 **Date Closed:** 12/11/2023
Investigator: Choon Lee **Reviewer:** Alexander Ansley
Approver: Tanya Topka
Subject: Takata Non-Azide Driver Air Bag Inflator Ruptures

MANUFACTURER & PRODUCT INFORMATION

Manufacturer: Takata (TK Global, LLC)
Affected Manufacturers: VW, BMW, Honda, Mitsubishi, and Toyota
Products: Takata Non-Azide Driver Air Bag Inflators
Population: 2,788,186

Problem Description: Takata (TK Global LLC) is recalling certain Non-Azide Driver air bag Inflators (NADI). These inflators were used in some brands of 1995-2000 vehicles and do not contain phase stabilized ammonium nitrate (PSAN) propellant. Due to a manufacturing issue, the NADI inflators may absorb moisture, causing the inflators to rupture or the air bag cushion to underinflate.

ACTION/SUMMARY INFORMATION

Action: This (EQ) Equipment Query is closed with 20V026, 20V027, 20V033, 20V035, 20V056, 21V470, 22V471, 21V401, and 21E082.

Summary:

In a Part 573 Defect Information Report (DIR) originally filed November 26, 2019, TK Global LLC (Takata) notified the National Highway Traffic Safety Administration (NHTSA) of a safety-related defect in certain NADI inflators produced between May 1, 1995, and August 31, 1999 (NHTSA Recall No. 19E-080). According to Takata, NADI inflators produced during this period have the potential to experience moisture ingress due to a defect with the foil seal applied (for hermiticity purposes) at the exit orifices of the inflator housing. NADI inflators do not contain PSAN propellant. When deployed, the presence of elevated moisture in the inflator can result in slow deployment, which could lead to insufficient protection of the driver by the air bag. In the event of propellant degradation, abnormal propellant combustion can create excessive internal pressure. High internal pressure can result in the body of the inflator rupturing, potentially injuring or killing the driver. The Part 573 DIR named five automobile manufacturers which purchased the defective NADI inflators: VW, BMW, Honda, Mitsubishi, and Toyota.

Takata's Part 573 DIR was followed by BMW filing three Part 573 DIRs on December 3, 2019, designated NHTSA Recall Nos. 19V-851, 19V-852 and 19V-853. The Part 573 DIRs stated that BMW had determined Takata-produced NADI inflators manufactured before March 15, 1999 were defective due to a tape seal issue. BMW also discussed field incidents that occurred in foreign markets as part of the company's rationale for reaching the defect determination. One of BMW's recalls addressed vehicles originally manufactured with

known defective NADI inflators, another recall addressed a distinct population of vehicles manufactured with NADI inflators believed to be at higher risk (BMW issued a “Do Not Drive” recommendation for this population), and the third recall addressed vehicles originally manufactured with NADI inflators not deemed to be defective, but they may have subsequently had an air bag with a defective NADI inflator installed as part of a service repair procedure. The BMW recalls involved certain model year 1999-2000 3-Series vehicles.

On December 16, 2019, NHTSA’s Office of Defects Investigation (ODI) opened this Equipment Query to: 1) obtain information from the remaining four vehicle manufacturers to establish the specific makes, models and model years that were produced with defective Takata driver air bag inflators; 2) ensure that, if they are not already, all vehicles manufactured with defective inflators are recalled on a timely basis; and 3) confirm that any vehicle which could have had a defective NADI air bag installed in conjunction with a service repair procedure is inspected to ensure it does not contain a defective air bag inflator. On December 18, 2019, ODI sent Information Request (IR) letters to the four remaining vehicle manufacturers listed in Takata’s Part 573 DIR that had not yet submitted their own Part 573 DIR.

In response to the IRs, each manufacturer researched and determined the scope of its affected vehicles and filed its Part 573 DIRs accordingly. On January 17, 2020, Honda filed two Part 573 DIRs, 20V-026 and 20V-027, recalling 2,315,807 model year 1996-2003 Acura and Honda vehicles. On January 22, 2020, Toyota filed Part 573 DIR 20V-033, recalling 138,842 model year 1998-2000 RAV4, RAV4EV, Celica and Supra vehicles. On January 23, 2020, Mitsubishi filed Part 573 DIR 20V-035, recalling 18,123 model year 1998-2000 Montero vehicles. On January 31, 2020, June 23, 2021, and July 1, 2022, VW filed three Part 573 DIRs, 20V-056, 21V-470 and 22V-471 respectively, recalling 198,293 model year 1997-2002 Audi TT coupe, TT roadster, A8, A6, A4, and S4 vehicles. On May 27, 2021, BMW filed DIR 21V-401, expanding its recall population of vehicles previously only inspected under 19V-851, 19V-852, and 19V-853 but now receiving a replacement air bag inflator. On August 30, 2021, Takata also submitted DIR 21E-082, at NHTSA’s request, to cover BMW’s DIR 21V-401 and VW’s DIR 21V-470 recall expansions.

All manufacturers except Mitsubishi confirmed their recalls included those vehicles that may have received the NADI air bags in conjunction with a service repair procedure. Mitsubishi responded that it does not intend to expand its recall to include vehicles equipped with service air bags. Mitsubishi stated that Takata’s records show Mitsubishi received 80 air bags containing defective NADI inflators for service parts. Mitsubishi noted that service records are no longer available to confirm the use of the 80 NADI-containing air bags, however, they believe the NADI-containing air bags “were likely utilized as service parts in the early-production vehicles that already are included in campaign 20V-035.” Due to the absence of further information regarding the use of the limited quantity of NADI inflators in Mitsubishi vehicles, NHTSA has not determined further action is warranted at this time.

This Equipment Query is closed based on the recalls filed by the five manufacturers named in Takata’s Part 573 DIR. NHTSA will continue to monitor reports and other data for like conditions and may re-open this query or take further action, as appropriate.