OMB Control No.: 2127-0004

Part 573 Safety Recall Report

20V-244

Manufacturer Name: Hino Motors Sales U.S.A., Inc.

Submission Date: APR 30, 2020 NHTSA Recall No.: 20V-244 Manufacturer Recall No.: AAHT0



Manufacturer Information:

Manufacturer Name: Hino Motors Sales U.S.A., Inc.

Address: 45501 Twelve Mile Road

Novi MI 48377

Company phone: 248-699-9300

Population:

Number of potentially involved: 13,700 Estimated percentage with defect: 20 %

Vehicle Information:

Vehicle 1: 2020-2021 HINO NV8J, NJ8J, NE8J, NJ8A, NV8A, NE8A, NE8G, NJ8C, NE8C, NV8G

Vehicle Type: BUSES, MEDIUM & HEAVY VEHICLES

Body Style : ALL Power Train : DIESEL

Descriptive Information: Beginning with 2020MY vehicle production the extension bracket on the negative

battery terminal was eliminated. Currently, production is suspended. When production resumes, the extension bracket on the negative battery terminal will be installed on all vehicles. The recall population includes all vehicles manufactured

without an extension bracket on the negative battery terminal.

The target vehicles may lack the extra length of ground cable due to the lack of an extension bracket on the negative battery terminal; while the non-targeted vehicles have the aforementioned bracket installed and therefore have no problem with

respect to this issue.

Production Dates: JAN 02, 2019 - APR 30, 2020

VIN Range 1 : Begin : NR End : NR Not sequential

Description of Defect:

Description of the Defect: The length of the ground cable that connects the negative battery terminal to

the frame may be insufficient and may break due to fatigue caused by bending

stress generated on the cable terminal.

FMVSS 1: NR FMVSS 2: NR

Description of the Safety Risk: Due to inability of the engine to re-start if the ground cable breaks, a vehicle

cannot be evacuated to a safe area. This could result in increased risk of an

accident or collision.

Description of the Cause: During the 2020MY vehicle development, the adverse effects that may result

from elimination of the extension bracket had not been considered.

Identification of Any Warning NR that can Occur:

Involved Components:

Component Name 1: Extension bracket

Component Description: Battery negative terminal extender

Component Part Number: SZ98055014

Component Name 2: Battery gound cable

Component Description: Ground cable between battery negative terminal and frame.

Component Part Number: 82124EW140

Supplier Identification:

Component Manufacturer

Name: NR Address: NR

NR

Country: NR

Chronology:

2020/2~2020/3 Hino received a Technical Report (TR) from the U.S. reporting that a vehicle failed to start. Dealer inspection found that the ground cable connecting the battery negative terminal to the frame was broken at the frame terminal. Investigation of the broken cable revealed that the fracture surface exhibited fatigue breakage that had resulted from bending load, while the material and dimensional properties contained no abnormality. During our investigation of production vehicles, it was determined that on some vehicles the frame side terminal was tightened in an upward direction, instead of the horizontal design angle, as the result of terminal rotation during tightening. Because the rotation may be a possible cause of insufficient length and bending stress on the cable, Hino provided an additional work instruction to insure that the frame terminal be tightened in the horizontal direction, this occurred on March 19. 2020/4 Hino recognized that the elimination of the extension bracket which had previously been installed between the negative battery terminal and the ground cable, without increasing the cable length, may have caused the frame side terminal to break due to bending stress if it is tightened in an upward direction. Hino confirmed that no failure has been reported on 2019MY and earlier vehicles and that the failure does not occur in those vehicles even if the frame side

terminal is tightened in the upward direction. Based on the aforementioned confirmatory result, Hino has determined to add the extension bracket. Hino confirmed that breakage of the ground cable terminal does not stop the engine immediately, and does not cause any foreseeable phenomenon including illumination of the battery warning lamp, but resulted in an inability to re-start the engine once stopped. 2020/4/24 Hino held a Safety Committee meeting and determined to implement a voluntary safety recall.

Description of Remedy:

Description of Remedy Program: Dealers will add an extension bracket to the negative battery terminal on all target vehicles. Further, dealers will inspect the ground cable terminal for damage, and if damage is found, the cable will be replaced.

> Due to the time required for parts preparation, an Interim Notice will be sent by Mid-June 2020.

Customers who have received the "Customer Notification Letter for Recall AHTO", who may have paid for repairs due to this defect may apply for reimbursement for those repair costs. All pre-notification reimbursement requests for repairs which were or will be performed until a date 10 days after the final customer notification is made will be considered by Hino for reimbursement. Hino will also reimburse all Parts, Labor, and

miscellaneous costs directly related to the remedy of this defect. Requests for reimbursement, including paid receipts, should be directed to Hino

Motors Sales

from Recalled Component: installation is the remedy.

How Remedy Component Differs Target vehicles were manufactured without the cable extension, extension

Identify How/When Recall Condition As of 4/30/2020 production is suspended, When production is resumed, was Corrected in Production: the extension bracket on the negative battery terminal will be installed on all subject vehicles.

Recall Schedule:

Description of Recall Schedule: NR

Planned Dealer Notification Date: NR - NR Planned Owner Notification Date: NR - NR

* NR - Not Reported