

Part 573 Safety Recall Report

18V-057

Manufacturer Name : E-One Incorporated**Submission Date :** JAN 09, 2018**NHTSA Recall No. :** 18V-057**Manufacturer Recall No. :** NR**Manufacturer Information :**

Manufacturer Name : E-One Incorporated

Address : 1601 S.W. 37TH AVENUE

Ocala FL 34474

Company phone : (904) 237-1122

Population :

Number of potentially involved : 7

Estimated percentage with defect : 86 %

Vehicle Information :

Vehicle 1 : 2001-2002 E-ONE X-113

Vehicle Type : BUSES, MEDIUM & HEAVY VEHICLES

Body Style : ALL

Power Train : DIESEL

Descriptive Information : Emergency vehicles equipped with flat end cap pump manifolds with E-ONE part number 599699 or 621653.

Production Dates : JAN 19, 2001 - MAR 11, 2002

VIN Range 1 : Begin :

NR

End : NR

 Not sequential

Vehicle 2 : 2001-2002 E-ONE X-036

Vehicle Type : BUSES, MEDIUM & HEAVY VEHICLES

Body Style : ALL

Power Train : DIESEL

Descriptive Information : Emergency vehicles equipped with flat end cap pump manifolds with E-ONE part number 599699 or 621653.

Production Dates : JAN 19, 2001 - MAR 11, 2002

VIN Range 1 : Begin :

NR

End : NR

 Not sequential**Description of Defect :**

Description of the Defect : On affected vehicles with severe pump duty cycles, the flat end caps of the fire pump manifold may experience fatigue failure over time.

FMVSS 1 : NR

FMVSS 2 : NR

Description of the Safety Risk : . A failed pump manifold can result in sudden discharge of water, and subsequent total or partial loss of discharge pressure. Sudden discharge of water poses a risk of injury to firefighting personnel in close proximity, and

partial or total loss of discharge pressure could place firefighting personnel or the public at risk.

Description of the Cause : On affected vehicles with severe pump duty cycles, the flat end caps of the fire pump manifold may experience fatigue failure over time.

Identification of Any Warning that can Occur : Metal fatigue at the cap ends would normally occur from the inside out. Hence, while some leakage may precede failure, the typical failure would most likely occur without warning.

Supplier Identification :

Component Manufacturer

Name : NR
Address : NR
NR
Country : NR

Chronology :

Aug 14, 2017 - An incident was reported on a seventeen-year old E-ONE Industrial Pumper through our dealer network. It was reported that the fire pump manifold failed at one end of manifold during testing. The manifold is a welded component made from stainless steel, and is responsible for collection and distribution of firefighting agent (water and/or foam) from the fire pump, to the various discharges on the fire apparatus. A request was submitted to return failed parts for analysis.

Sep 2017 to Dec 2017 - In order to understand the failure mode, a root cause analysis was performed. No prior failures were discovered during warranty investigations. A population of seven vehicles which utilize a similar manifold design was identified. Failed parts were unfortunately discarded by customer before they could be returned for analysis. Through Finite Element Analysis, the failure was determined to be attributable to fatigue of the welds located on the end caps where they are welded to the manifold body. It was deemed that this failure could occur on vehicles with very high cyclic loading on the manifold. Redesign of the failed component to improve durability life was performed.

Jan 2, 2018 - Even though failure is dependent on duty cycle, and may not occur on other apparatus (as they are close to end of their useful life), out of an abundance of caution E-ONE recommended a recall to repair the manifolds on the seven trucks in question.

Description of Remedy :

Description of Remedy Program :	Vehicles subject to this recall are to be inspected and repaired by an E-ONE certified dealer or technician. E-ONE will provide a replacement domed end cap kit, (2 ea. E-ONE part 1075783) for replacement of the existing flat end caps on both ends of the manifold. Repair of each manifold will require approximately 80 hours of labor, including approximately 1 hour of weld time in accordance with attached repair instructions, depending on orientation of the manifold. E-ONE will not provide labor compensation for the replacement of the end cap kit.
How Remedy Component Differs from Recalled Component :	E-ONE will provide a replacement domed end cap kit, (2 ea. E-ONE part 1075783) for replacement of the existing flat end caps on both ends of the manifold. The original manifolds parts 599699 or 621653 have FLAT end caps.
Identify How/When Recall Condition was Corrected in Production :	The flat end caps for these manifolds were removed from production in March 11, 2002 based on suggested design improvements driven by the manifold manufacturer.

Recall Schedule :

Description of Recall Schedule :	1) Email dealers a copy of the recall approximately 1 week before customers. 2) Mail customers the recall
Planned Dealer Notification Date :	MAR 02, 2018 - MAR 05, 2018
Planned Owner Notification Date :	MAR 05, 2018 - MAR 09, 2018

* NR - Not Reported