

# 12V-005 (5 Pages)

Steve M. Kenner, Global Director Automotive Safety Office Sustainability, Environment & Safety Engineering Fairlane Plaza South, Suite 400 330 Town Center Drive Dearborn, MI 48126-2738 USA

January 4, 2012

Ms. Nancy Lewis Associate Administrator for Enforcement National Highway Traffic Safety Administration 1200 New Jersey Avenue SE, Room W45-306 Washington, DC 20590

Dear Ms. Lewis:

Subject: Ford Motor Company (Ford) Recall No. 11S24 – Certain 2001-2002 model year Ford Escape vehicles equipped with an antilock brake system (ABS) brake master cylinder reservoir cap leaking brake fluid on to ABS module electrical connectors

# Summary

- <u>Ford Action</u> Ford is conducting a voluntary safety recall involving certain 2001 and 2002 model year Ford Escape vehicles equipped with ABS to address brake fluid leaks from the brake master cylinder reservoir cap that can leak brake fluid on ABS module electrical connectors.
- <u>Number of Vehicles Involved</u> Approximately 244,530 vehicles in the United States and federalized territories are potentially affected.
- Effect on Vehicle Operation The 2001 and 2002 model year vehicles were originally equipped with a brake master cylinder reservoir cap that could leak brake fluid. If brake fluid leaks from the cap, it could come in contact with the ABS module wiring harness connector. In April 2007 Ford conducted safety recall 07S51 (agency number 07V156) to address potentially missing or misplaced seals in the wiring harness connector to the ABS module electronic control unit (ECU). Some of the vehicles repaired under the field service action (FSA) may not have received a complete inspection or application of electrical grease as instructed in the FSA. If a brake fluid leak from the reservoir cap is not addressed and if the ABS module wiring harness electrical connector was not correctly remedied under the prior FSA, corrosion can develop in the electrical connector leading to illumination of an ABS warning light, melting, smoking or fire.
- <u>Service Procedure</u> Owners will be notified by mail and instructed to take their vehicle(s) to a Ford or Lincoln dealer to have the brake master cylinder reservoir cap replaced and the ABS electrical system modified.

The detailed information required by the applicable portions of 49 CFR Part 573 – Defect and Non-Compliance Information Report is attached.

Sincerely,

Steven M. Kenner

Attachment

## <u>49 CFR Part 573 – DEFECT INFORMATION REPORT</u> <u>11S24 – CERTAIN 2001-2002 MODEL YEAR FORD ESCAPE VEHICLES BRAKE MASTER</u> <u>CYLINDER RESERVOIR CAP LEAKING BRAKE FLUID ON ANTILOCK BRAKE SYSTEM</u> <u>(ABS) ELECTRICAL CONNECTORS</u>

Pursuant to Part 573 of Title 49 of the Code of Federal Regulations, Defect and Non-Compliance Reports, Ford Motor Company submits the following information concerning a safety recall action that it is voluntarily initiating.

### 573.6 (c) (2) - Potentially Affected Vehicles

Vehicles potentially affected are certain 2001 and 2002 model year Ford Escape vehicles equipped with ABS built at the Kansas City Assembly Plant (KCAP) from October 22, 1999 to July 19, 2002.

These vehicles are not produced in VIN order. Information as to the applicability of this action to specific vehicles can best be obtained by either calling Ford's toll-free line (1-866-436-7332) or by contacting a local Ford of Lincoln dealer who can obtain specific information regarding the vehicles from the Ford On-line Automotive Service Information System (OASIS) database.

The brake master cylinder reservoir caps were supplied to Ford by Continental Automotive Systems and were manufactured at a facility in the United States that has subsequently closed. The contact at Continental Automotive Systems is:

Phil Headley Telephone number: 248-393-5990

Continental Automotive Systems One Continental Drive Auburn Hills, Michigan 48326

#### 573.6 (c) (3) - Estimated Population of Vehicles Potentially Affected

Approximately 244,530 vehicles in the United States and federalized territories are potentially affected.

# 573.6 (c) (4) - Estimated Percentage of Affected Vehicles with the Defect Condition

Unknown.

#### 573.6 (c) (5) - Description of the Defect

The 2001 and 2002 model year vehicles were originally equipped with a brake master cylinder reservoir cap that could leak brake fluid. If brake fluid leaks from the cap, it could come in contact with the ABS module wiring harness connector. In April 2007 Ford conducted safety recall 07S51 (agency number 07V156) to address potentially missing or misplaced seals in the wiring harness connector to the ABS module electronic control unit (ECU). Some of the vehicles repaired under the field service action (FSA) may not have received a complete inspection or application of electrical grease as instructed in the FSA. If a brake fluid leak from the reservoir cap is not addressed and if the ABS module wiring harness electrical connector

was not correctly remedied under the prior FSA, corrosion can develop in the electrical connector leading to illumination of an ABS warning light, melting, smoking or fire.

## 573.6 (c) (6) - Chronology of Events

In April 2007 Ford issued FSA 07S51 for 2001 through 2004 model year Ford Escapes equipped with ABS.

On May 7, 2009, NHTSA issued a Recall Query for reports of smoking/melting/burning of ABS modules in vehicles that had been previously repaired under FSA 07S51. Investigation into these reports identified two patterns:

- Evidence from photographs and field return parts indicated that some vehicles may not have been properly inspected for the missing/misplaced seals.

- Vehicles that had missing/misplaced seals that were not identified during the FSA and later came into contact with a source of contamination continued to experience a similar rate of failure as was seen on the population originally included in FSA 07S51.

On December 9, 2010, NHTSA upgraded the investigation to an Engineering Analysis. Ford continued to analyze post-recall remedy reports of electrical connector damage and discuss the results of these analyses with the agency. No patterns relating to time in service after the remedy or any other attribute were identified. Ford has received no reports of injuries attributed to this condition. There are reports of property damage as a result of a fire beyond vehicle-only damage.

Both Ford and the agency noted that the 2001 and 2002 model year vehicles have significantly higher rates; both before and after the FSA when compared to the 2003 and 2004 model years. The difference between the 2001/2002 and the 2003/2004 population is the master cylinder reservoir cap, which was identified as a potential source for brake fluid leaks. Vehicle evaluations identified that the original caps installed on the 2001 and 2002 model year vehicles could allow brake fluid to leak from the reservoir and potentially reach the ABS module.

On December 20, 2011, Ford's Field Review Committee reviewed the concern and approved a field action.

#### 573.6 (c) (8) - Service Program

Owners will be notified by mail and instructed to take their vehicle(s) to a Ford or Lincoln dealer to have the brake master cylinder reservoir cap replaced and the ABS electrical system modified.

Mailing of owner notification letters will begin the week of January 23, 2012. Because remedy parts will not be available for some time owners will be instructed to park the affected vehicles outside until parts are available. Timing for a final owner communication advising of part availability is still being considered. Notification to dealers will occur on January 5, 2012.

Ford's general reimbursement plan for the cost of remedies paid for by vehicle owners prior to notification of a safety recall was provided to the agency on February 24, 2011.

#### 573.6 (c) (10) - Press Statement and Dealer/Owner Letters

National media attention is likely, as with most Ford recalls, when posted to NHTSA's safercar.gov website. Ford will provide public comments when requested. A news release will not be issued.

Ford will forward a copy of the notification letters to dealers and owners to the agency when available.

#### 573.6 (c) (11) - Recall Number

Ford has assigned recall number 11S24 to this action.

#### 573.13 (c) (2) - Ending Date for Reimbursement Eligibility

The ending date for reimbursement eligibility for the cost of remedies paid for by vehicle owners per Ford's general reimbursement plan will be determined after the field service action remedy is finalized.

###