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December 20, 2018

Mr. Stephen Ridella, Director
Office of Defects Investigation
National Highway Traffic Safety Administration
1200 New Jersey Avenue SE, W45-302
Washington, DC 20590

Dear Mr. Ridella:

Subject: PE18-011:NEF-106rr

The Ford Motor Company (Ford) response to the Agency's letter (received November 7, 2018) concerning reports of allegations of uncommanded opening of the power tailgate in certain model year 2017 through 2018 F-Super Duty vehicles, while the vehicle is in motion, is attached.

If you have any questions concerning this response, please feel free to contact me.

Sincerely,



Desi Ujkashevic

Attachement

FORD MOTOR COMPANY (FORD) RESPONSE TO PE18-011

Ford's response to this Preliminary Evaluation information request was prepared pursuant to a diligent search for the information requested. While we have employed our best efforts to provide responsive information, the breadth of the Agency's request and the requirement that information be provided on an expedited basis make this a difficult task. We nevertheless have made substantial effort to provide thorough and accurate information, and we would be pleased to meet with Agency personnel to discuss any aspect of this Preliminary Evaluation.

The scope of Ford's investigation conducted to locate responsive information focused on Ford employees most likely to be knowledgeable about the subject matter of this inquiry and on review of Ford files in which responsive information ordinarily would be expected to be found and to which Ford ordinarily would refer. Ford notes that although electronic information was included within the scope of its search, Ford has not attempted to retrieve from computer storage electronic files that were overwritten or deleted. As the Agency is aware, such files generally are unavailable to the computer user even if they still exist and are retrievable through expert means. To the extent that the Agency's definition of Ford includes suppliers, contractors, and affiliated enterprises for which Ford does not exercise day-to-day operational control, we note that information belonging to such entities ordinarily is not in Ford's possession, custody or control.

Ford has construed this request as pertaining to vehicles manufactured for sale in the United States, its protectorates, and territories.

Ford notes that some of the information being produced pursuant to this inquiry may contain personal information such as customer names, addresses, telephone numbers, and complete Vehicle Identification Numbers (VINs). Ford is producing such personal information in an unredacted form to facilitate the Agency's investigation with the understanding that the Agency will not make such personal information available to the public under FOIA Exemption 6, 5 U.S.C. 552(b)(6).

Ford also notes that the numbering in the original information request did not fit the usual sequence, so we have renumbered the specific questions to better organize the included information.

Answers to your specific questions are set forth below. As requested, after each numeric designation, we have set forth verbatim the request for information, followed by our response. Unless otherwise stated, Ford has undertaken to provide responsive documents dated up to and including November 7, 2018, the date we received your inquiry. Ford has searched within the following offices for responsive documents: Ford Customer Service Division, Office of the General Counsel, and North American Product Development.

Request 1

State, by model and model year, the number of subject and peer vehicles Ford has manufactured for sale or lease in the United States. Separately, for each subject vehicle manufactured to date by Ford, state the following:

- a. Vehicle identification number (VIN);
- b. Make;
- c. Model;
- d. Model Year;

- e. Tailgate part number and design version installed as original equipment;
- e. Date of manufacture;
- f. Date warranty coverage commenced.; and
- g. The State in the United States where the vehicle was originally sold or leased (or delivered for sale or lease).

Provide the table in Microsoft Access 2010, or a compatible format, entitled "PRODUCTION DATA." See Enclosure I, Data Collection Disc, for a pre-formatted table which provides further details regarding this submission.

Answer

Ford records indicate that the approximate total number of 2017 and 2018 F-250 and F350 vehicles equipped with remote tailgate release ("subject vehicles") sold in the United States (the 50 states and the District of Columbia), protectorates, and territories (American Samoa, Guam, Northern Mariana Islands, Puerto Rico, and Virgin Islands) is 109,026. The approximate total number of 2015-2018 MY F-150 vehicles equipped with remote tailgate release ("peer vehicles") sold in the United States (the 50 states and the District of Columbia), protectorates, and territories (American Samoa, Guam, Northern Mariana Islands, Puerto Rico, and Virgin Islands) is 511,401.

The number of subject and peer vehicles sold in the United States by model and model year is shown below:

Model	2015 MY	2016 MY	2017 MY	2018 MY
F-250	-	-	48,549	17,119
F-350	-	-	31,216	12,142
F-150	144,081	124,832	101,131	141,357

The requested data for each subject vehicle is provided in Appendix A – Production on the included disc. Ford notes that request 1e; Tailgate part number is for sheet metal only and has not been included with this information. The wiring assembly and tailgate release handle part numbers and changes can be found in Appendix H.

2. State the number of each of the following, received by Ford, or of which Ford is otherwise aware, which relate to, or may relate to, the Alleged Defect in the subject and peer vehicles:
 - a. Consumer complaints, including those from fleet operators;
 - b. Field reports, including dealer field reports;
 - c. Reports involving a crash, injury or fatality;
 - d. Property damage claims;
 - e. Third-party arbitration proceedings where Ford is or was a party to the arbitration; and
 - f. Lawsuits, both pending and closed, in which Ford is or was a defendant or codefendant.

For subparts "a" through "f" state the total number of each item (e.g., consumer complaints, field reports, etc.) separately. Multiple incidents involving the same vehicle are to be counted separately. Multiple reports of the same incident are also to be counted separately (i.e., a consumer complaint and a field report involving the same incident in which a crash occurred are to be counted as a crash report, a field report and a consumer complaint).

In addition, for items "c" through "f" provide a summary description of the alleged problem and causal and contributing factors and Ford's assessment of the problem, with a summary of the significant underlying facts and evidence. For items "e" and "f" identify the parties to the action, as well as the caption, court, docket number, and date on which the complaint or other document initiating the action was filed.

Answer

For purposes of identifying reports of incidents that may be related to the alleged defect and any related documents, Ford has gathered "owner reports" and "field reports" maintained by Ford Customer Service Division (FCSD), and claim and lawsuit information maintained by Ford's Office of the General Counsel (OGC).

Descriptions of the FCSD owner and field report systems and the criteria used to search each of these are provided in Appendix B.

The following categorizations were used in the review of reports located in each of these searches:

Category	Definition
A	Allegation of uncommanded tailgate opening while driving
B	Allegation of uncommanded tailgate opening – unsure if vehicle was in motion

We are providing electronic copies of reports categorized as B as "non-specific allegations" for your review because of the broad scope of the request. Based on our engineering judgment, the information in these reports is insufficient to support a determination that they pertain to the alleged defect.

Owner Reports: Records identified in a search of the FMC360 database, as described in Appendix B, were reviewed for relevance and sorted in accordance with the categories described above. The number and copies of relevant owner reports identified in this search for the alleged defect are provided in the FMC360 portion of the two databases, separated by subject and peer vehicles, in the respective Appendix C. The categorization of each report is identified in the "Category" field.

When we were able to identify that responsive (i.e., non-ambiguous) duplicate owner reports for an alleged incident were received, each of these duplicate reports was marked accordingly, and the group counted as one report. In other cases, certain vehicles may have experienced more than one incident and have more than one report associated with their VINs. These reports have been counted separately.

Legal Contacts: Ford is providing, in Appendix B, a description of Legal Contacts and the activity that is responsible for this information. Ford has not identified any Legal Contacts that are responsive to the Agency's request.

Field Reports: Records identified in a search of the Common Quality Indicator System (CQIS) database, as described in Appendix B, were reviewed for relevance and sorted in accordance with the categories described above. The number and copies of relevant field

reports identified in this search that allege uncommanded tailgate opening while driving in a subject or peer vehicle are provided in the CQIS portion of the database contained in Appendix C. The categorization of each report is identified in the "Category" field.

When we were able to identify that responsive duplicate field reports for an alleged incident were received, each of these duplicate reports was marked accordingly, and the group counted as one report. In other cases, certain vehicles may have experienced more than one incident and have more than one report associated with their VINs. These reports have been counted separately. In addition, field reports that are duplicative of owner reports are provided in Appendix C but are not included in the field report count.

VOQ Data: Of the 5 VOQs provided, 4 were for subject vehicles and 1 for a peer vehicle. One of the subject vehicle records did not have a VIN reported so Ford is unable to search its databases for corresponding reports. For the remaining, Ford made inquiries of its FMC360 database for customer contacts, its CQIS database for field reports, and its AWS system for warranty repairs regarding the vehicles identified on the VOQs with full VINs. Reports were identified are provided in the database contained in Appendix C. For VOQ [REDACTED] we were able to find the vehicle in our systems, but found no records indicating a visit to the dealership for this issue.

Crash/Injury/Fatality Incident Claims: NHTSA identified no reports of accident allegations in the VOQs provided by the Agency. Ford identified no reports of accident, injury or fatality pertaining to the alleged defect in subject or peer vehicles.

Claims, Lawsuits, and Arbitrations: For purposes of identifying incidents that may relate to the alleged defect in a subject or peer vehicle, Ford has gathered claim and lawsuit information maintained by Ford's OGC. Ford's OGC is responsible for handling various legal matters, including product liability lawsuits, claims, and consumer breach of warranty lawsuits and arbitrations against the Company.

Lawsuits and claims gathered in this manner were reviewed for relevance and categorized in accordance with the categories described above.

We are providing the requested detailed information, where available, on the responsive and ambiguous lawsuits and claims in our Log of Lawsuits and Claims, provided in Appendix C in the Legal Claim/Lawsuits tab. The number of relevant lawsuits and claims identified is also provided in this log. To the extent available, copies of complaints, first notices, or FMC360 reports relating to matters shown on the log are provided in Appendix D. With regard to these lawsuits and claims, Ford has not undertaken to contact outside law firms to obtain additional documentation.

3. Separately, for each item (complaint, report, claim, notice, or matter) within the scope of your response to Request No. 2, state the following information:
 - a. Ford's file number or other identifier used;
 - b. The category of the item, as identified in Request No. 3 (i.e., consumer complaint, field report, etc.);
 - c. Vehicle owner or fleet name (and fleet contact person), street address, email address and telephone number;
 - d. Vehicle's VIN;
 - e. Vehicle's make, model and model year;

- f. Vehicle's mileage at time of incident;
- g. Incident date;
- h. Report or claim date;
- i. Whether a crash is alleged;
- j. Whether property damage is alleged;
- k. Number of alleged injuries, if any; and
- l. Number of alleged fatalities, if any.

Provide this information in Microsoft Access 2010, or a compatible format, entitled "REQUEST NUMBER THREE DATA." A pre-formatted data collection file, which provides further details regarding this submission, will be provided to you.

Answer

Ford is providing owner and field reports in the database contained in Appendix C in response to Request 3. To the extent information sought in Request 3 is available for owner and field reports, it is provided in the database. To the extent information sought in Request 3 is available for lawsuits and claims, it is provided in the Log of Lawsuits and Claims provided in Appendix D in the Legal Claim/Lawsuits tab.

- 4. Produce copies of all documents related to each item within the scope of Request No. 2. Organize the documents separately by category (i.e., consumer complaints, field reports, etc.) and describe the method Ford used for organizing the documents. Describe in detail the search methods and search criteria used by Ford to identify the items in response to Request No. 2.

Answer

Ford is providing owner and field reports in the database contained in Appendix C in response to Request 3. Copies of complaints, first notices, or FMC360 reports relating to matters shown on the Log of Lawsuits and Claims provided in Appendix C in the Legal Claim/Lawsuits tab are provided in Appendix D. To the extent information sought in Request 4 is available, it is provided in the referenced appendices.

- 5. State, by model and model year, a total count for all of the following categories of claims, collectively, that have been paid by Ford to date that relate to, or may relate to, the Alleged Defect in the subject and peer vehicles: warranty claims; extended warranty claims; claims for good will services that were provided; field, zone, or similar adjustments and reimbursements; and warranty claims or repairs made in accordance with a procedure specified in a technical service bulletin or customer satisfaction campaign.

Separately, for each such claim, state the following information:

- a. Ford's Motor Company's claim number;
- b. Vehicle owner or fleet name (and fleet contact person), street address, email address and telephone number;
- c. VIN;
- d. Repair date;
- e. Vehicle mileage at time of repair;
- f. Repairing dealer's or facility's name, telephone number, city and state or ZIP code;

- g. Labor operation number(s);
- h. Problem code(s);
- i. Diagnostic trouble code(s);
- j. Replacement part number(s) and description(s);
- k. Concern stated by customer;
- l. Cause as stated on the repair order;
- m. Correction as stated on the repair order; and
- n. Additional comments, if any, by dealer/technician relating to claim and/or repair.

Provide this information in Microsoft Access 2010, or a compatible format, entitled "WARRANTY DATA." A pre-formatted data collection file, which provides further details regarding this submission, will be provided to you.

Answer

Records identified in a search of the AWS database, as described in Appendix B, were reviewed for relevance and sorted in accordance with the categories described in the response to Question 2. The number and copies of relevant warranty claims identified in this search that may relate to the alleged defect in a subject or peer vehicle are provided in the AWS portion of the two databases contained in the respective Appendix C. The categorization of each report is identified in the "Category" field.

When we were able to identify that duplicate claims for an alleged incident were received, each of these duplicate claims was marked accordingly and the group counted as one report. In other cases, certain vehicles may have experienced more than one incident and have more than one claim associated with their VINs. These claims have been counted separately. Warranty claims that are duplicative of owner and field reports are provided in Appendix C but are not included in the report count above.

Requests for "goodwill, field, or zone adjustments" received by Ford to date that relate to the alleged defect that were not honored, if any, would be included in the FMC360 reports identified above in response to Request 3. Such claims that were honored are included in the warranty data provided. Ford assumes that providing the warranty claims in the electronic database format meets the requirements of this request because the Agency can review or order the claims as desired.

- 6. Describe in detail the search methods and search criteria used by Ford to identify the claims in response to Request No. 5, including the labor operations, problem codes, diagnostic trouble codes, part numbers and any other pertinent parameters used.

Answer

Detailed description of the search criteria, including all pertinent parameters, used to identify the claims provided in response to Request 5 are described in Appendix B.

- 7. Provide a list of all labor operations, labor operation descriptions, problem codes, and problem code descriptions, diagnostic trouble codes and diagnostic trouble code descriptions applicable to the Alleged Defect in the subject vehicles. State whether the diagnostic trouble codes are automatically reported to the warranty database electronically or manually entered into the warranty database by a claims administrator.

Answer

There are no specific DTC codes applicable to the alleged defect in the subject or peer vehicles. Information applicable to specific claims as requested above can be found in Appendix C.

8. State, by make and model year, the terms of the new vehicle warranty coverage offered by Ford on the subject vehicles (i.e., the number of months and mileage for which coverage is provided and the vehicle systems that are covered). Describe any extended warranty coverage option(s) that Ford offered for the subject vehicles and state by option, model, and model year, the number of vehicles that are covered under each such extended warranty.

Answer

For 2017-2018 model year Ford Super Duty, the New Vehicle Limited Warranty, Bumper-to-Bumper Coverage began at the warranty start date and lasted for three years or 36,000 miles, whichever occurred first.

Optional Extended Service Plans (ESPs) are available to cover various vehicle systems, time in service, and mileage increments. Ford offers Premium Care coverage at the time of sale that could potentially cover the alleged defect in the subject vehicles. Ford has sold 64,194 Premium care plans for the 2017-18 MY F-Super Duty vehicles. Ford is unable to determine how many of the Premium Care plans are applicable to the subject vehicles. Details of the Premium Care plan can be found in Appendix I.

9. Produce copies of all service, warranty, and other documents that relate to, or may relate to, the Alleged Defect in the subject vehicles, that Ford has issued to any dealers, regional or zone offices, field offices, fleet purchasers, or other entities. This includes, but is not limited to, bulletins, advisories, informational documents, training documents, or other documents or communications, with the exception of standard shop manuals. Also include the latest draft copy of any communication that Ford is planning to issue within the next 120 days.

Answer

For purposes of identifying communications to dealers, zone offices, or field offices pertaining, at least in part to the alleged defect, Ford has reviewed the following FCSD databases and files: The On-Line Automotive Service Information System (OASIS) containing Technical Service Bulletins (TSBs) and Special Service Messages (SSMs), Internal Service Messages (ISMs) contained in CQIS, and Field Review Committee (FRC) files. We assume this request does not seek information related to electronic communications between Ford and its dealers regarding the order, delivery, or payment for replacement parts, so we have not included these kinds of information in our answer.

A description of Ford's OASIS messages, ISMs, and the Field Review Committee files and the search criteria used are provided in Appendix B.

OASIS Messages: Ford identified one TSB, TSB17-2196 for vehicles built on or before June 7, 2017 to aid technicians in the potential diagnosis and repair of an intermittent electrical concern, and offers a service procedure.

Internal Service Messages: Ford identified one ISM #17-05-004, issued 05/03/2017 for all

2017 MY Super Duty vehicles.

Field Review Committee: Ford has not identified any field service action communications that may relate to the Agency's request.

Ford currently has no plans to issue communications related to the alleged defect that is the subject of NHTSA's investigation. A copy of Ford's TSB and ISM described above are provided in Appendix F.

10. Describe all assessments, analyses, tests, test results, studies, surveys, simulations, investigations, inquiries and/or evaluations (collectively, "actions") that relate to, or may relate to, the Alleged Defect in the subject or peer vehicles that have been conducted, are being conducted, are planned, or are being planned by, or for, Ford. For each such action, provide the following information:
 - a. Action title or identifier;
 - b. The actual or planned start date;
 - c. The actual or expected end date;
 - d. Brief summary of the subject and objective of the action;
 - e. Engineering group(s)/supplier(s) responsible for designing and for conducting the action; and
 - f. A brief summary of the findings and/or conclusions resulting from the action.

For each action identified, provide copies of all documents related to the action, regardless of whether the documents are in interim, draft, or final form. Organize the documents chronologically by action.

Answer

Ford is construing this request broadly and is providing not only studies, surveys, and investigations related to the alleged defect, but also notes, correspondence, and other communications that were located pursuant to a diligent search for the requested information. Ford is providing the responsive non-confidential documentation in Appendix F.

To the extent that the information requested is available, it is included in the documents provided. If the Agency should have questions concerning any of the documents, please advise.

Ford is submitting additional responsive documentation in Appendix G with a request for confidentiality under separate cover to the Agency's Office of the Chief Counsel pursuant to 49 CFR Part 512. Redacted copies of the confidential documents will be provided under separate cover, on separate media, to the Agency's Office of Chief Counsel as Appendix G – Redacted.

In the interest of ensuring a timely and meaningful submission, Ford is not producing materials or items containing little or no substantive information. Examples of the types of materials not being produced are meeting notices, raw data lists (such as part numbers or VINs) without any analytical content, duplicate copies, non-responsive elements of responsive materials, and draft electronic files for which later versions of the materials are being submitted.

Through this method, Ford is seeking to provide the Agency with substantive responsive materials in our possession in the timing set forth for our response. We believe our response meets this goal. If the Agency would like additional materials, please advise.

11. Provide the name, contact information, and part numbers for all suppliers Ford Motor Company has purchased the subject component from.

Answer

The supplier for the tailgate release switch located in the tailgate handle can be found in Appendix J.

12. Describe all modifications or changes made by, or on behalf of, Ford in the design, material composition, manufacture, quality control, supply, or installation of the Subject Component, from the start of production to date, which relate to, or may relate to, the Alleged Defect in the subject or peer vehicles. For each such modification or change, provide the following information:

- a. The date or approximate date on which the modification or change was incorporated into vehicle production;
- b. A detailed description of the modification or change;
- c. The reason(s) for the modification or change;
- d. The part number(s) (service and engineering) of the original component;
- e. The part number(s) (service and engineering) of the modified component;
- f. Whether the original unmodified component was withdrawn from production and/or sale, and if so, when;
- g. When the modified component was made available as a service component; and
- h. Whether the modified component can be interchanged with earlier production components.

Also, provide the above information for any modification or change that Ford is aware of which may be incorporated into vehicle production within the next 120 days.

Answer

Ford is providing a tables with the requested information summarizing the requested information in Appendix H.

13. State the number of each of the following that Ford has sold that may be used in the subject vehicles by component name, part number (both service and engineering/production), model and model year of the vehicle in which it is used and month/year of sale (*including the cut-off date for sales, if applicable*):

- a. Subject component; and
- b. Any kits that have been released, or developed, by Ford for use in service repairs to the subject component/assembly.

For each component part number, provide the supplier's name, address, and appropriate point of contact (name, title, and telephone number). Also identify by make, model and model year, any other vehicles of which Ford is aware that contain the identical component,

whether installed in production or in service, and state the applicable dates of production or service usage.

Answer

As the Agency is aware, Ford service parts are sold in the U.S. to authorized Ford and Lincoln dealers. Ford has no means to determine how many of the parts were actually installed on vehicles, the vehicle model or model year on which a particular part was installed, the reason for any given installation, or the purchaser's intended use of the components sold.

Ford is providing the total number of Ford service replacement switch and electrical connector assemblies by part number (both service and engineering), year of sale, where available, and supplier point of contact information in Appendix J.

Ford notes that the same switch was used on F-150 tailgate release, and is also the switch used for the LED pickup box lighting feature.

14. Furnish Ford's assessment of the Alleged Defect in the subject vehicle, including:

- a. The causal or contributory factor(s);
- b. The failure mechanism(s);
- c. The failure mode(s);
- d. The risk to motor vehicle safety that it poses;
- e. What warnings, if any, the operator and the other persons both inside and outside the vehicle would have that the Alleged Defect was occurring or Subject Component was malfunctioning; and
- f. The reports included with this inquiry.

Answer

The remote tailgate release on the subject and peer vehicles referenced by the Agency is an electrically controlled switch that is used to unlatch the tailgate in lieu of a mechanical handle. This electronic tailgate release feature is included in several trim levels on the subject and peer vehicles. The switch is located underneath the tailgate handle.

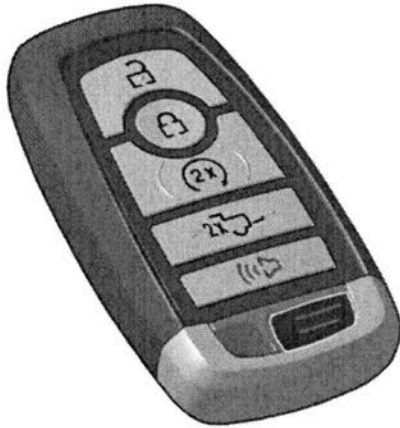
A user can activate this switch in several different ways:

- Direct activation by pressing the switch at the rear of the tailgate
- Pressing a dedicated Key FOB release button 2x (depicted below)
- Entering a code in the keyless entry keypad located on the driver side B-pillar (depicted below)
- Pressing a dedicated release button in the instrument panel (Super Duty only, depicted below)

By design, commanded electronic tailgate release via the above options is controlled through the body control module (BCM) and will only function at vehicles speeds under 3 mph.

Key FOB

The Key FOB design that is available with most trim levels is shown below.

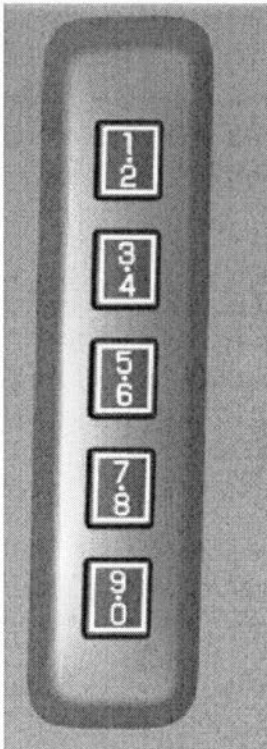


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When the customer is in the proximity of, or inside, the vehicle, a double-click of the Remote Tailgate Release button will release the tailgate latches.

Keypad

Similar to the Key FOB, the remote tailgate release can also be activated using the keypad located on the B-Pillar of the driver's door (if equipped).



The driver can enter a five-digit code that will lock or unlock the doors and tailgate. Following entry of this five-digit code, the driver can then subsequently press the 5/6 button to command the tailgate latches to open.

Dash Switch (Super Duty Only)

The F-250/F-350 Super Duty also has a lower dash mounted tailgate release switch located next to the brake pedal adjustment switch and just above the parking brake release handle.



Tailgate release

Pressing this button will command the tailgate latches to open. This feature will function only if the vehicle speed is under 3 mph.

Interviews of drivers, and review of customer comments to Ford or online has found instances where drivers have acknowledged inadvertently commanding the tailgate latch release to function using each of the above described methods:

- **Key FOB:** Inadvertent double-press of the tailgate button instead of the engine remote start button, or while the FOB is in a pocket, for example.
- **B-Pillar Key Pad:** Inadvertent press of the 5/6 button after entering their 5-digit code.
- **Dash Switch:** Inadvertent press of the switch when entering/exiting the vehicle or when releasing the parking brake release lever.

In each of the above examples, a driver could be unaware that they have commanded the opening of the tailgate latches.

Tonneau Cover

Ford's investigation into this subject found that a truck bed tonneau cover may partially inhibit a released tailgate from opening, potentially contributing to driver unawareness of an unlatched tailgate. A tonneau cover is typically designed to extend at least partially over the top surface of the tailgate. Upon tailgate release, a tonneau cover may partially "hold" the tailgate in the upright position until the tailgate is pulled slightly by the driver. Should a driver inadvertently command the tailgate to release (as described above) and the tailgate be held in the upright position while the vehicle is stationary, it may subsequently open following sufficient road vibration while being driven.

Super Duty Analysis

As part of Ford's normal, ongoing monitoring of field performance of its vehicles, causes of inadvertent tailgate release in Super Duty vehicles other than those described above were identified and analyzed.

Analysis of returned parts in early 2017 found evidence of water in a small number of wire

harness connectors. Engineering analysis suggested that water could enter a ground eyelet in the harness and wick through the wiring into the surrounding connectors. If this were to occur, there was a potential for water and corrosion to result in an electrical short-to-ground in the connector, which could affect the operation of the remote tailgate release feature. Additional investigation of this condition associated with this PE indicated that a connector short could potentially bypass the BCM control and release the tailgate latches. Despite a relatively low number of reports relating to this condition, Ford issued TSB 17-2196 on June 7, 2017 to proactively assist dealer technicians in the diagnosis and repair of vehicle electrical systems potentially exhibiting this intermittent concern. Based on review of reports provided in this response that allege inadvertent tailgate opening while driving in the subject vehicles, approximately 0.9 R/1000 were attributed to this condition. This condition could occur and be observed by the driver while the vehicle is parked as well, as noted in some of the reports provided in this response.

The majority of reports that allege inadvertent tailgate opening while driving in these subject vehicles are unclear as to cause, with some technicians specifically noting that no water was found in the electrical system or connectors. These reports may relate to a variety of potential causes, including drivers that were unfamiliar with or inadvertently activated this feature as described above. Nevertheless, the overall rate of reports of inadvertent tailgate opening while driving from any cause in the subject vehicles is low at 2.5 R/1000.

F-150 (Peer) Vehicle Analysis

Similar to Super Duty vehicles, reports of inadvertent tailgate release were also identified and reviewed as part of Ford's normal, ongoing analysis of field performance in F-150 (Peer) vehicles.

Despite basic design similarities between F-150 and Super Duty tailgates, Ford's investigation into F-150 reports identified a different causal factor of unintended tailgate release in these vehicles. Analysis of returned parts from F-150 vehicles through early 2017 found evidence of water ingress into some of the returned tailgate release switches. Identical in design for both Super Duty and F-150, this switch incorporates a breather hole to allow for proper air flow in the otherwise sealed switch. When the switch button is pressed and released, a vacuum is created within the switch. In the presence of water, this can draw water into the switch, over time potentially resulting in corrosion on the connector pins or in the switch itself. Based on review of reports provided in this response that allege inadvertent tailgate opening while driving in the peer vehicles, approximately 0.04 R/1000 were attributed to this condition. This condition could also occur and be observed by the driver while the vehicle is parked as well, as noted in some of the reports provided in this response.

While the identical switch is used on both F-150 and Super Duty vehicles, switch packaging is different in the two vehicle applications, potentially affecting water interaction with the switch. Based on the switch field return analysis, Ford added robustness to the switch used in F-150 vehicles in March 2018. This updated switch incorporated a revised location of the breather hole to a location on the backside of the button and added a Gortex patch over the breather hole, allowing air to pass-through and inhibiting water from entering the switch.

Though the switch was identified as a cause of some reports of unintended tailgate opening in F-150 vehicles, the majority of reports that allege inadvertent tailgate opening while driving are related to a variety of other issues or are unclear as to cause. These also may include those presented at the beginning of this discussion. Nevertheless, the overall rate of reports of

mentioning a tailgate open while driving from any cause, including drivers inadvertently or unknowingly activating the tailgate latch, in F-150 (peer) vehicles is low at 0.21 R/1000.

Conclusion

Ford's normal processes involve monitoring vehicle field performance information and proactively addressing customer satisfaction concerns where warranted. As described above, Ford identified robustness opportunities in electrical wiring and switches in these vehicles, and incorporated these improvements into production. Despite a low number of reports, Ford also published a TSB for Super Duty vehicles to assist technicians in the diagnosis, inspection, and, if necessary, warranty repair of what might be an intermittent electrical issue that might otherwise be challenging to diagnose.

Ford's analysis of the reports and data provided in this response has found an overall low rate of reports of unexpected tailgate opening while driving on both subject and peer vehicles, with neither relating to a single primary cause. It is our assessment that there is no unreasonable safety risk in either the subject or peer vehicles relating to this issue, and we will continue to monitor this subject through our normal processes.