EA17-002

FORD

9/30/2019

APPENDIX H

TECHNICAL SERVICE BULLETINS

ISM

13-07-010

ArticleType :	ArticleNumber :	Entered Date :	Times Recommended :
ISM	18-02-009	02/13/2018	13

Date is displayed in **MM/DD/CCYY format**

2011-2017 EXPLORER/2013-2017 POLICE INTERCEPTOR UTILITY - CUSTOMER COMPLAINTS OF CARBON MONOXIDE (CO) AND/OR EXHAUST ODOR AFTER FSA 17B25 OR 17N03 :

If a dealer contact is received by the Technical Assistance Center seeking diagnostic

epair guidance for customer complaints of Carbon Monoxide (CO) readings or exhaust odor after 17B25 or 17N03 have the technician to confirm the following:

The following items apply to both 2013-2017 Police Interceptor Utility (17B25) and 2011-2017 Explorer (17N03):

1. All lift gate drain plugs properly glued in place.

2. Make sure the latest HVAC calibration was successfully flashed.

a. Verify the latest calibration by attempting to reprogram the HVAC module. First, verify the IDS is at the latest update, then make sure it is connected to the Internet, and finally, request an HVAC module update.
NOTE: It is recommended to connect a battery charger to the vehicle during any module reprogramming procedure.

b. A way to verify the HVAC calibration is to put the vehicle in park, set the parking brake, start the engine, chock the wheels, then set the A/C to recirculation mode. Then monitor the recirculation door parameter, and depress the accelerator pedal to the floor. The parameter should change state after 2 seconds. It will change from recirculation, to unknown, to fresh air.

3. With the vehicle raised on a hoist, inspect for visible damage to the exhaust system that could result in leaks. 4. If the vehicle is equipped with a 3.5L GTDI engine, verify if TSB 17-0063 (11-15) or 17-2255 (16-17) has been completed. Perform the TSB if it has not been completed. 5. If the vehicle is AWD equipped, inspect the PTU for leaks and/or odors from the PTU vent. The following 5 items only apply to 2013-2017 Police Interceptor Utility vehicles after FSA 17B25: 1. Verify the FSA exhaust tips installed. a. If exhaust tips are not installed, follow the FSA instructions for installation. b. The tips differ between TiVCT and GTDI models. 2. Check the lift gate bulb seal integrity. a. Check for any wires crossing the seal to aftermarket equipment. b. Inspect the accordion harness protection for damaged. 3. Verify the lift gate spoiler is properly seated on the glass. a. Inspect for any aftermarket lights installed on/under the spoiler. 4. Inspect for any auxiliary batteries located inside the passenger compartment or cargo area. Auxiliary batteries may interfere with measuring devices.	

EA17-002

FORD

9/30/2019

APPENDIX H

TECHNICAL SERVICE BULLETINS

ISM

13-07-101

ArticleType :	ArticleNumber :	Entered Date :	Times Recommended :
ISM	18-03-003	03/07/2018	94

Date is displayed in **MM/DD/CCYY format**

2011-2017 EXPLORER/2013-2017 POLICE INTERCEPTOR UTILITY - CUSTOMER COMPLAINTS OF CARBON MONOXIDE (CO) AND/OR EXHAUST ODOR AFTER FSA 17B25 OR 17N03 :

If a dealer contact is received by the Technical Assistance Center seeking diagnostic

epair guidance for customer complaints of Carbon Monoxide (CO) readings or exhaust odor after 17B25 or 17N03 have the technician to confirm the following:

The following items apply to both 2013-2017 Police Interceptor Utility (17B25) and 2011-2017 Explorer (17N03):

1. All lift gate drain plugs properly glued in place.

2. Check the lift gate weather strip seal integrity.

3. Make sure the latest HVAC calibration was successfully flashed.

a. Verify the latest calibration by attempting to reprogram the HVAC module. First, verify the IDS is at the latest update, then make sure it is connected to the Internet, and finally, request an HVAC module update.
NOTE: It is recommended to connect a battery charger to the vehicle during any module reprogramming procedure.

b. A way to verify the HVAC calibration is to put the vehicle in park, set the parking brake, start the engine, chock the wheels, then set the A/C to recirculation mode. Then monitor the recirculation door parameter, and depress the accelerator pedal to the floor. The parameter should change state after 2

seconds. It will change from recirculation, to unknown, to fresh air.

4. With the vehicle raised on a hoist, inspect for visible damage to the exhaust system that could result in leaks.

5. If the vehicle is equipped with a 3.5L GTDI engine, verify if TSB 17-0063 (11-15) or 17-2255 (16-17) has been completed. Perform the TSB if it has not been completed.

6. If the vehicle is AWD equipped, inspect the PTU for leaks and/or odors from the PTU vent.

The following 5 items only apply to 2013-2017 Police Interceptor Utility vehicles after FSA 17B25:

1. Verify the FSA exhaust tips are installed.

a. If exhaust tips are not installed, follow the FSA instructions for installation.

b. The tips differ between TiVCT and GTDI models.

2. Check the lift gate weather strip seal integrity.

a. Check for any wires crossing the seal to aftermarket equipment.

b. Inspect the accordion harness protection for damaged.

3. Verify the lift gate spoiler is properly seated on the glass.

a. Inspect for any aftermarket lights installed on/under the spoiler.

4. Inspect for any auxiliary batteries located inside the passenger compartment or cargo area. Auxiliary

batteries may interfere with measuring devices.Explorer 3.5L TiVCT 2016-2017 Explorer 3.5L TiVCT 1. For 2016-2017 retail Explorers with the 3.5L TiVCT engine, if the unit returns with the same complaint and they do not have the downturned exhaust tips installed, they should be referred to TSB 17-0044 Procedure 2 to have the revised exhaust installed. 2. For customers that have retail units AND CO complaints, there is a CO facts sheet that dealers can be referred to for their reference. It is Attachment 6 on the police program 17B25.	

EA17-002

FORD

9/30/2019

APPENDIX H

TECHNICAL SERVICE BULLETINS

ISM

15-07-013

ArticleType :	ArticleNumber :	Entered Date :	Times Recommended :
ISM	15-07-013	07/17/2015	892

Date is displayed in **MM/DD/CCYY format**

SOME 2016-2017 EXPLORER VEHICLES MAY EXHIBIT A CUSTOMER'S CONCERN OF EXHAUST ODOR INSIDE THE VEHICLE :

Some 2016-2017 Explorer vehicles may exhibit a repeat customer concern of exhaust odor inside the vehicle when the windows are up and the HVAC is in recirculation. If this is verified, perform the following:

Pressure Test Procedure

- Remove the right and left rear lamp assemblies. See WSM Section 417-01
- Using masking tape, seal the rear air extractors and areas. Do not need to mask the rear lip molding for vehicle that do not have the rear lip molding removed
- Start vehicle, set A/C to fresh air mode and set blower speed to max
- Close all doors and ensure windows are fully closed
- Use soapy water in a spray bottle to help locate air leaks
- Spray around the following areas:
    - Under body seams
    - Underbody rubber grommet
    - Rear wheel well seams
    - Rear tail light seams
    - Rear liftgate seals
    - Side panel glass seals
    - License plate area
    - Third Brake Lamp assembly
- Air leaks can be identified by the presence of air bubbles
- Mark all areas identified to have air leaks
- Turn off A/C
- Turn off vehicle
- Clean and dry all areas marked earlier
- Seal using Motorcraft TA-2 seam sealer

- Allow sealant to dry and retest (May take up to 20 minutes)
- Remove the masking tape used in step (a) of the pressure test

• Inspect the air extractors for possible damage or improper sealing

• Inspect for evidence of body repairs and ensure that there are no missing or poorly seated body plugs in the floor pan or engine compartment bulkhead

• Inspect the lift gate seal for damage and proper fit/contact pattern. Adjusting the rear lift gate striker so that the rear hatch seals tighter to the lift gate seal is important. This can be done by loosening the striker and moving it to increase the lift gate to sealing pressure. Also, ensure that the lift gate plugs are in place in the drain holes

• For 3.5L TiVCT ONLY MY16-17 vehicles install Muffler assembly part # FB5Z-5230-B

Note: Selecting Fresh Air HVAC mode will increase cabin pressures which may assist with diagnostics and can help to reduce the overall concern. This can be done by picking panel mode on the HVAC control unit, deselecting the recirculation mode button, and increasing the blower speed.

Author: MDUNGEE (313) 317-4279

EA17-002

FORD

9/30/2019

APPENDIX H

TECHNICAL SERVICE BULLETINS

ISM

17-02-022

ArticleType :	ArticleNumber :	Entered Date :	Times Recommended :
ISM	17-02-022	02/23/2017	230

Date is displayed in **MM/DD/CCYY format**

2016-2017 EXPLORER - EXHAUST ODOR INSIDE THE VEHICLE UNDER CERTAIN HIGHER SPEED AND ACCELERATION CONDITIONS :

Some 2016-2017 Explorer vehicles may exhibit a sulfur/exhaust odor in the passenger compartment under certain higher speed and acceleration conditions.

This condition may be improved by updating the Heating, Ventilation and Air Conditioning (HVAC) Control Module. Reprogram the HVAC module to the latest level using IDS version 103.05 or higher. Make sure you are connected to the internet when entering module programming to obtain the latest updates.

If the concern is still present after the HVAC calibration update, perform the following:

Pressure Test Procedure

- Remove the right and left rear lamp assemblies. See WSM Section 417-01
- Using masking tape, seal the rear air extractors and areas. Do not need to mask the rear lip molding for vehicle that do not have the rear lip molding removed
- Start vehicle, set A/C to fresh air mode and set blower speed to max
- Close all doors and ensure windows are fully closed
- Use soapy water in a spray bottle to help locate air leaks

Spray around the following areas:

- Under body seams
- Underbody rubber grommet
- Rear wheel well seams
- Rear tail light seams

- Rear liftgate seals
- Side panel glass seals
- License plate area
- Third Brake Lamp assembly
- Air leaks can be identified by the presence of air bubbles
- Mark all areas identified to have air leaks
- Turn off A/C
- Turn off vehicle
- Clean and dry all areas marked earlier
- Seal using Motorcraft TA-2 seam sealer

Allow sealant to dry and retest (May take up to 20 minutes) and then remove the masking tape used in the beginning steps of the pressure test procedure

- Inspect the air extractors for possible damage or improper sealing
- Inspect for evidence of body repairs and ensure that there are no missing or poorly seated body plugs in the floor pan or engine compartment bulkhead
- Inspect the lift gate seal for damage and proper fit/contact pattern.
- Adjusting the rear lift gate striker so that the rear hatch seals tighter to the lift gate seal is important. This can be done by loosening the striker and moving it to increase the lift gate to sealing pressure. Also, ensure that the lift gate plugs are in place in the drain holes
- For 3.5L TiVCT ONLY MY16-17 vehicles install Muffler assembly part # FB5Z- 5230- B

Note: Selecting Fresh Air HVAC mode will increase cabin pressures which may assist with diagnostics and can help to reduce the overall concern. This can be done by picking panel mode on the HVAC control unit, deselecting the recirculation

mode button, and increasing the blower speed. Author: TKISER4 (313) 845-0930	

EA17-002

FORD

9/30/2019

APPENDIX H

TECHNICAL SERVICE BULLETINS

ISM

17-09-002

ArticleType :	ArticleNumber :	Entered Date :	Times Recommended :
ISM	17-09-002	09/06/2017	3

Date is displayed in **MM/DD/CCYY format**

2013-2017 POLICE INTERCEPTOR UTILITY - FSA 17B25 EXHAUST ODOR AND/OR CARBON MONOXIDE IN CABIN :

If a contact is received on a Police Interceptor Utility vehicle inquiring about FSA 17B25 or asking for repair direction for exhaust odor or carbon monoxide in the vehicle, forward the report via email to Travis Kiser (TKISER4). Additional direction will be provided shortly to update the dealer contact. Please contact Travis Kiser (TKISER4) by phone 313-845-0930 or instant message with any questions.

EA17-002

FORD

9/30/2019

APPENDIX H

TECHNICAL SERVICE BULLETINS

TECH INSTRUCTIONS

17B25-S5 Tech Instructions Police Utility Exhaust Fumes - Final

CERTAIN 2013-2017 MODEL YEAR POLICE INTERCEPTOR UTILITY VEHICLES — EXHAUST ODOR AND CARBON MONOXIDE COMPLAINTS

OVERVIEW

When an up-fitter installs customized emergency lighting, radios and other equipment, they may damage vehicle sealing systems and/or drill holes into the rear of the vehicle. This creates an opening where exhaust could enter the cabin if the sealing system is not properly repaired and holes are not properly sealed. This procedure provides information to identify and repair vehicle-sealing concerns that have been caused by these installations. Be aware that this technical information does not capture all possible sealing concerns caused by non-Ford equipment installations due to the variability that exists with after market equipment and installation practices. Dealer technicians should thoroughly inspect vehicles and correct all potential leak paths caused by after market up-fitter equipment using robust sealing methods.

Before removing aftermarket lighting and/or equipment from the liftgate spoiler, verify that Service Department Management obtained customer approval to conduct that part of the service. If the customer elected to keep aftermarket lighting and/or equipment on the spoiler, proceed with the following actions:

- Complete all other steps of this field service action EXCEPT the Liftgate Spoiler Sealing procedure.
- Document on the repair order that the service to reseal the spoiler and remove the aftermarket lighting and/or equipment from the spoiler was declined.
- Print and provide the customer with the Customer Information Form – Liftgate Spoiler – Aftermarket Lighting and/or Equipment (Attachment V).
- Release the vehicle to the customer.

SERVICE PROCEDURE

NOTE: To view a video demonstration of key inspection and repair procedures, click the video icon.

1. Inspect the rear half of the vehicle for police or aftermarket up-fitter equipment such as: interior or exterior lighting, radio/audio/video equipment, or up-fitter wiring that crosses from the interior to the exterior of the vehicle (inspect liftgate opening).

NOTE: Roof-mounted antennas, lights and other equipment that has been properly sealed for water intrusion will not allow exhaust odor to enter the vehicle. If the vehicle has roof-mounted equipment present, and there is no evidence of water leaks in the vehicle, no further inspection or repairs are necessary for that equipment.

NOTE: It is not necessary to inspect police or aftermarket up-fitter equipment installed in the front half of the vehicle.

2. Has the vehicle been modified with aftermarket equipment as described?

   No - Begin procedure at **Liftgate Trim Panel Sealing on Page 12**.
   Yes - Proceed to the Modified Vehicle Inspection and Sealing.

Modified Vehicle Inspection and Sealing

Air Extractor Replacement Recommended Tool List:

1/4" Drive Ratchet (Power Tool & Hand Tool)
1/4" Drive Torque Wrench
1/4" Drive Extension (6 in 152 mm)
1/4" Drive 5.5mm Shallow Socket
1/4" Drive 8mm Shallow Socket
Trim Tool
Pocket Screwdriver
Phillips Screwdriver

1. With the vehicle in NEUTRAL, position it on a hoist. Please follow the Workshop Manual (WSM) procedures in Section 100-02.

2. Inspect the rear underbody for damaged or missing body plugs, punctured/damaged floor pan sheet metal and baffle plates, damaged wiring harness grommets, aftermarket fasteners, and pass throughs (holes) created for aftermarket wiring/equipment. See Figures 1, 2a and 2b.

    - Seal all aftermarket wiring and equipment pass throughs using Motorcraft® TA-2 seam sealer or equivalent, and Foil-Backed Mastic Patch as needed.

NOTE: Do not use silicones, RTVs or caulks during this repair.

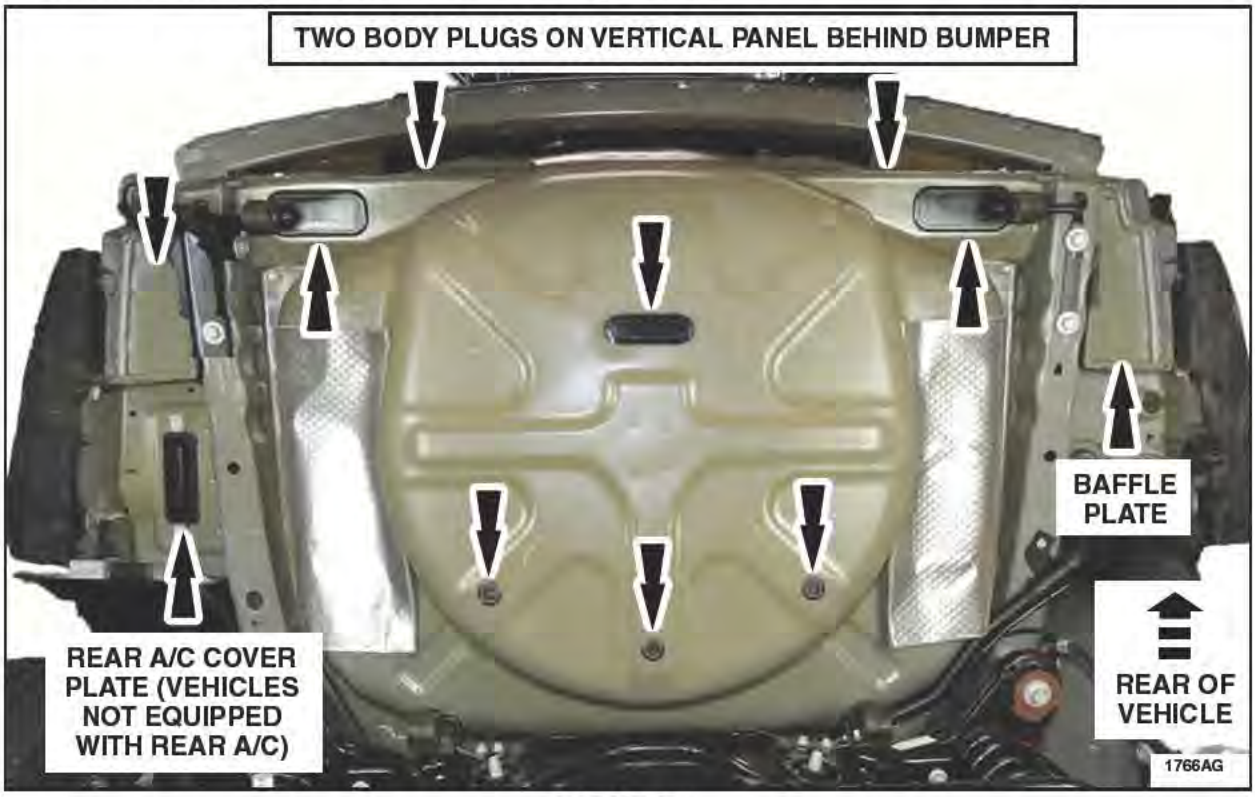

FIGURE 1

FIGURE 2a

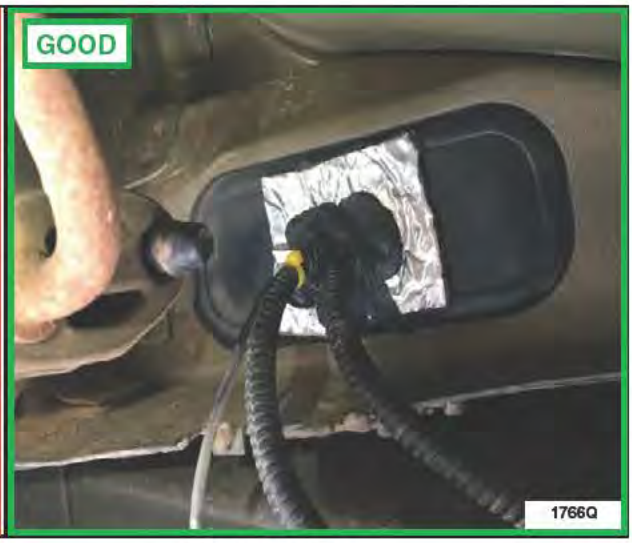

FIGURE 2b

3. Remove the three push-pins securing the LH and RH rear wheelhouse insulators, and remove the insulators. See Figure 3.

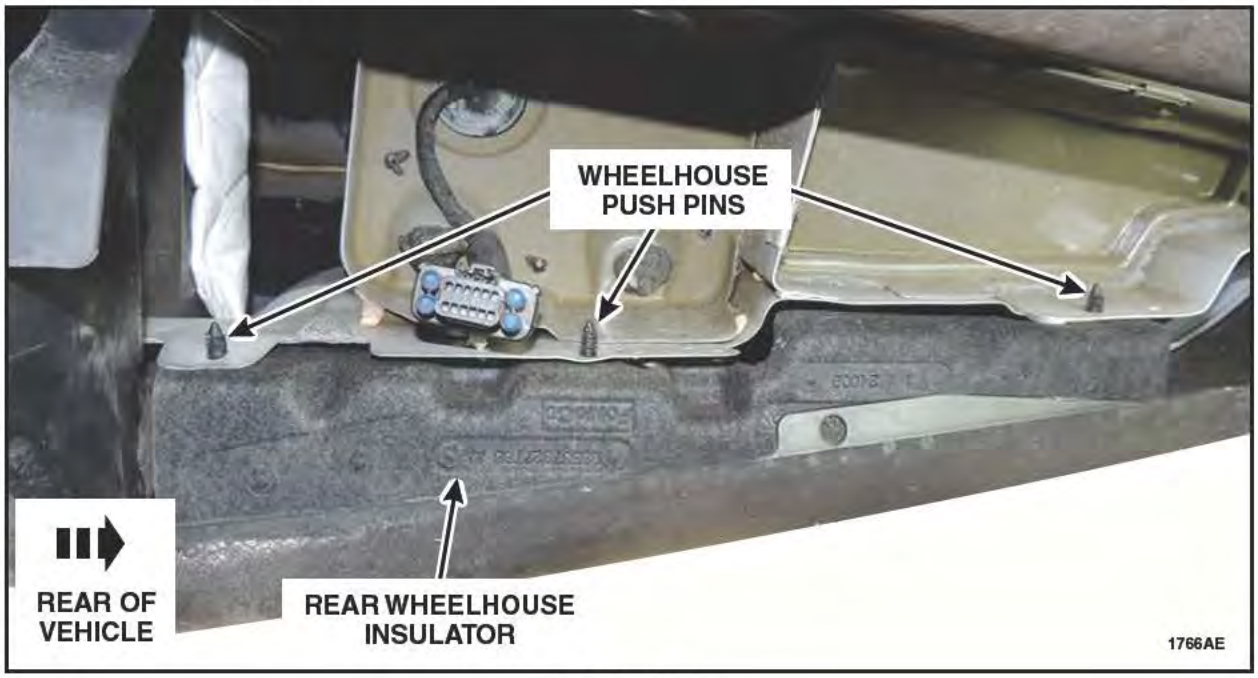

FIGURE 3

4. Using a telescoping mirror and flashlight, inspect the 4 body plugs and air extractor through the wheelhouse openings on each side of the vehicle to determine if aftermarket wiring has been routed through these components. Reroute aftermarket wiring as needed. See Figures 4a and 4b.

   - Replace body plugs or air extractors if any damage is present. Rear bumper cover removal is required to replace the air extractor. Please follow the WSM procedures in Section 501-19.

NOTE: Bumper removed for clarity.

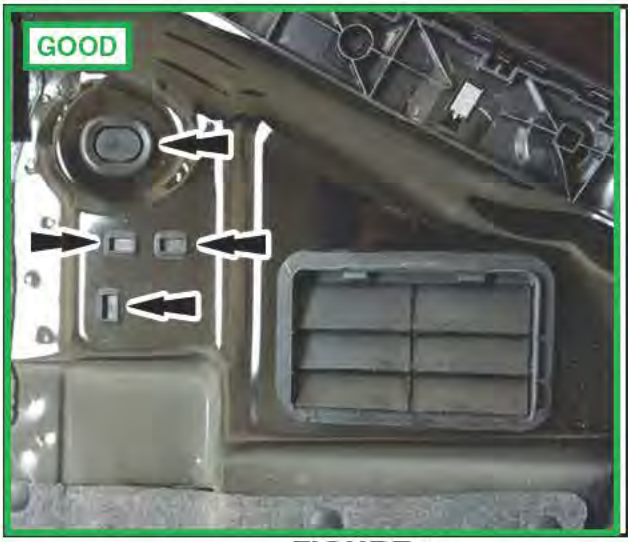

FIGURE 4a

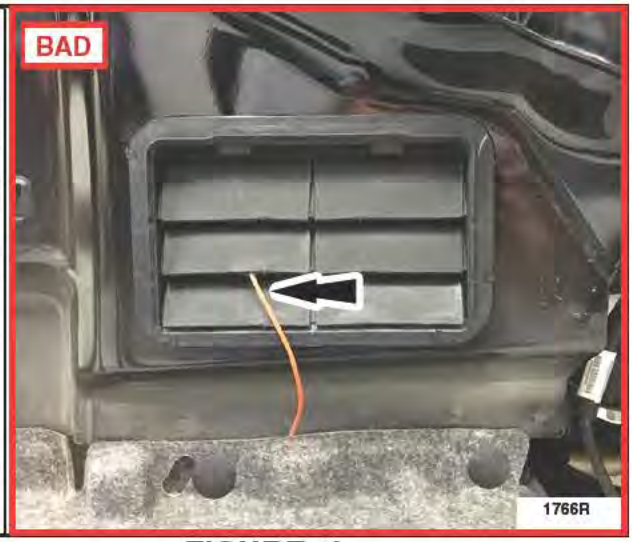

FIGURE 4b

5. Reinstall the wheelhouse insulators. The wheelhouse push pins can be reinstalled by removing the lower inner fender well fasteners to gain access to the fasteners. See Figure 5.

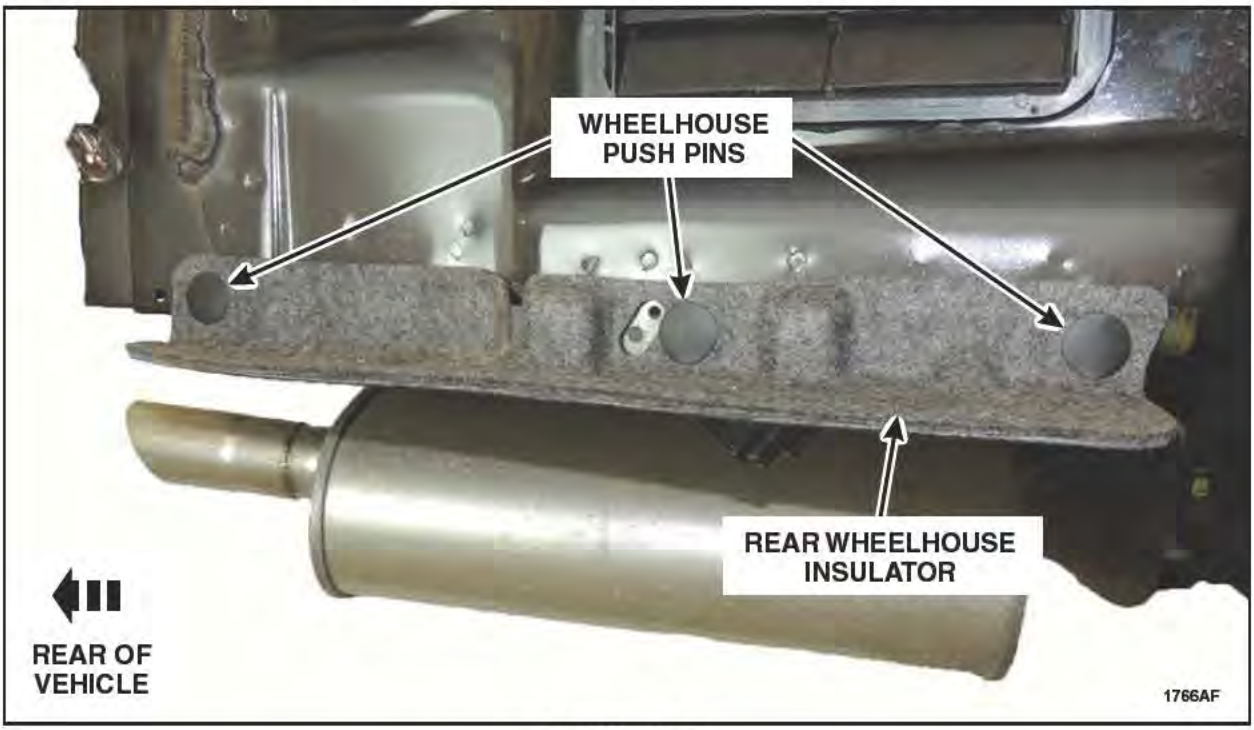

FIGURE 5

6. Remove the LH and RH rear tail lamp assemblies. Please follow the WSM procedures in Section 417-01.

7. Inspect the sheet metal, wiring harness grommets and factory equipped pass throughs for damage or holes created when installing aftermarket wiring and equipment. See Figure 6a. Seal all holes in the sheet metal and wiring harness grommets with Motorcraft® TA-2 seam sealer or equivalent. See Figure 6b.

FIGURE 6a

FIGURE 6b

8. For vehicles equipped with aftermarket lights on the D-pillars, seal all holes in the sheet metal and wiring harness grommets used as wiring pass throughs with Motorcraft® TA-2 seam sealer or equivalent. See Figures 7a and 7b.

FIGURE 7a

FIGURE 7b

9. Inspect the liftgate weather seal for damage and proper fitment to the vehicle. Replace the liftgate weatherseal if required. See Figure 8.

FIGURE 8

10. Reinstall the LH and RH rear lamp assemblies. Please follow the WSM procedures in Section 417-01.

NOTE: When installing the rear lamp assemblies, ensure the liftgate weather seal is not disturbed and remains in the correct position.

Liftgate Spoiler Inspection

NOTE: Aftermarket lighting and/or equipment mounted to the liftgate spoiler can compromise vehicle sealing and create a leak path for exhaust to enter the vehicle. Ford recommends removal of any aftermarket lighting and/or equipment mounted to the spoiler to prevent a potential path for exhaust to enter the vehicle. Any removed equipment must be returned to the customer.

NOTE: If the customer declines to allow removal of aftermarket lighting and/or equipment from the liftgate spoiler, have the customer sign a copy of the Customer Release Form – Liftgate Spoiler Aftermarket Lighting and/or Equipment (See Attachment V). Retain the signed document in your service records.

NOTE: Appearance may vary by lighting manufacturer.

IMPORTANT: Before removing aftermarket lighting and/or equipment from the liftgate spoiler, verify that the Service Department Management obtained customer approval to conduct this part of the service.

1. Inspect the rear spoiler for any of the following:

   a. Is there aftermarket lighting or other equipment mounted to the spoiler? See Figure 9.
   b. Has the spoiler or vehicle been painted?
      NOTE: All Police Interceptor Utility Spoilers are painted black from the factory.
   c. Is the spoiler damaged or have any holes drilled through it?
   d. Is any aftermarket wiring routed to the spoiler?

   Yes – Proceed to the Liftgate Spoiler Sealing Procedure.
   No – Proceed to the Liftgate Trim Panel Sealing Procedure.

FIGURE 9

Liftgate Spoiler Sealing

Recommended Tool List:

1/4" Drive Ratchet (Power Tool & Hand Tool)
1/4" Drive 6 in (152 mm) Extension
1/4" Drive 7mm Shallow Socket
1/4" Drive Torque Wrench
3/8" Drive Ratchet (Power Tool & Hand Tool)
3/8" Drive 6 in (152 mm) Extension
3/8" Drive 13mm Twelve Point Socket
3/8" Drive Torque Wrench
Flat Faced Sheet Metal Hammer
Applicator Brush (Anti Corrosion Application)

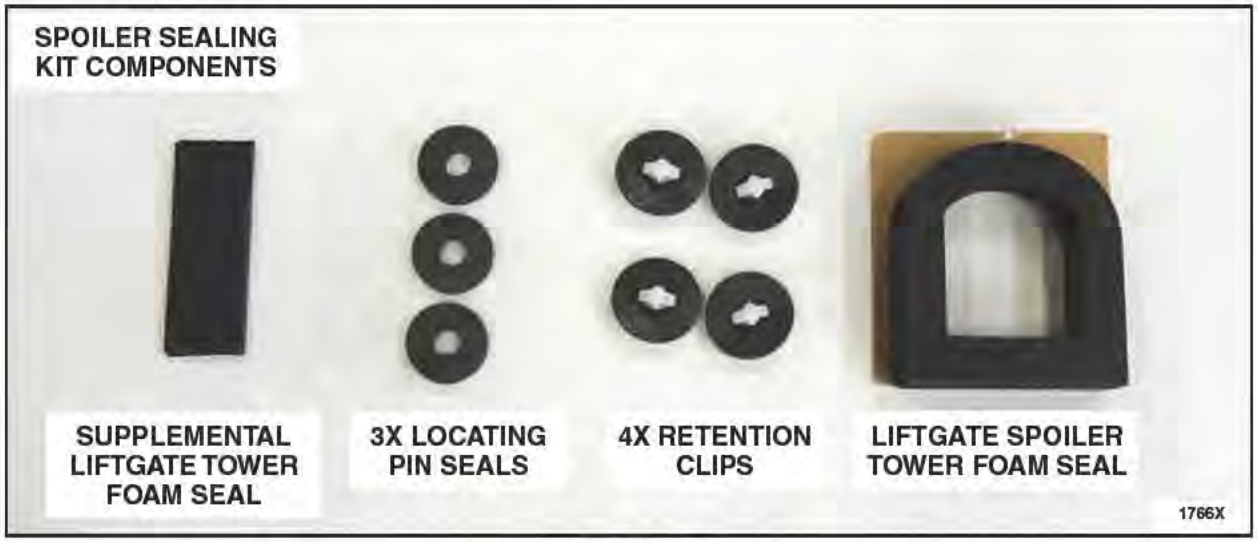

FIGURE 10

1. Remove the liftgate spoiler. Please follow the WSM procedures in Section 501-08.

NOTE: Remove and **do not** reinstall any aftermarket lighting or other accessories mounted to the liftgate spoiler.

2. Inspect for any aftermarket wiring pass throughs/holes that could affect the sealing ability of the spoiler. See Figures 11a and 11b.

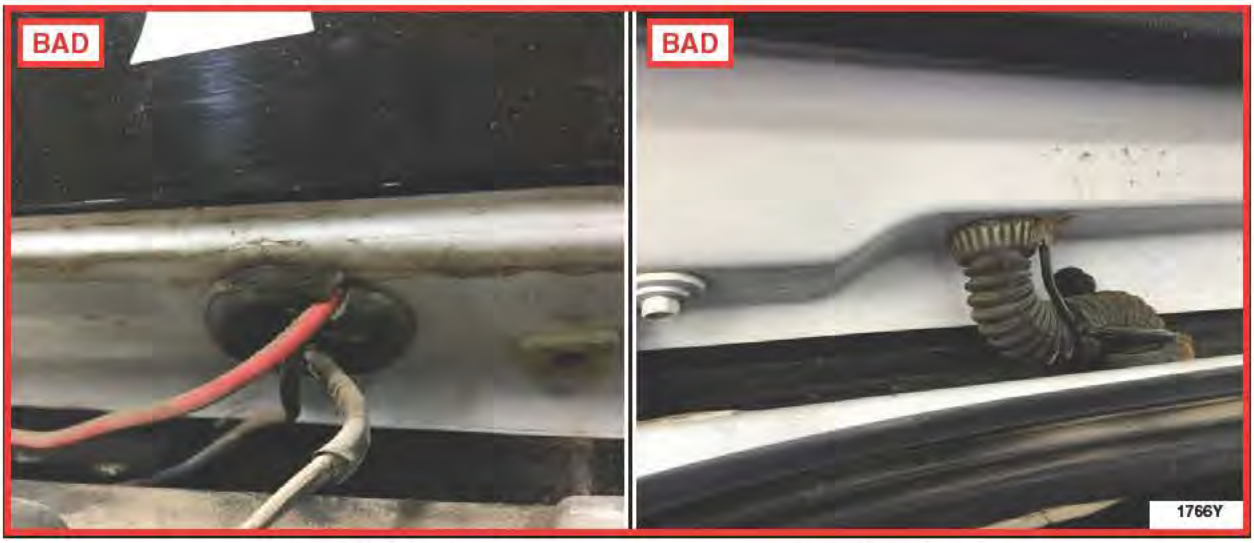

FIGURE 11a **FIGURE 11b**

3. Seal any leak paths created by the aftermarket wiring pass throughs/holes in the spoiler area with Motorcraft® TA-2 seam sealer or equivalent.

4. Remove the liftgate spoiler tower foam seal. See Figure 12.

FIGURE 12

5. Install a *new* supplemental liftgate spoiler tower seal underneath the wiring and washer line. Make sure the slot in the seal is aligned with the raised channel on the spoiler. See Figure 13.

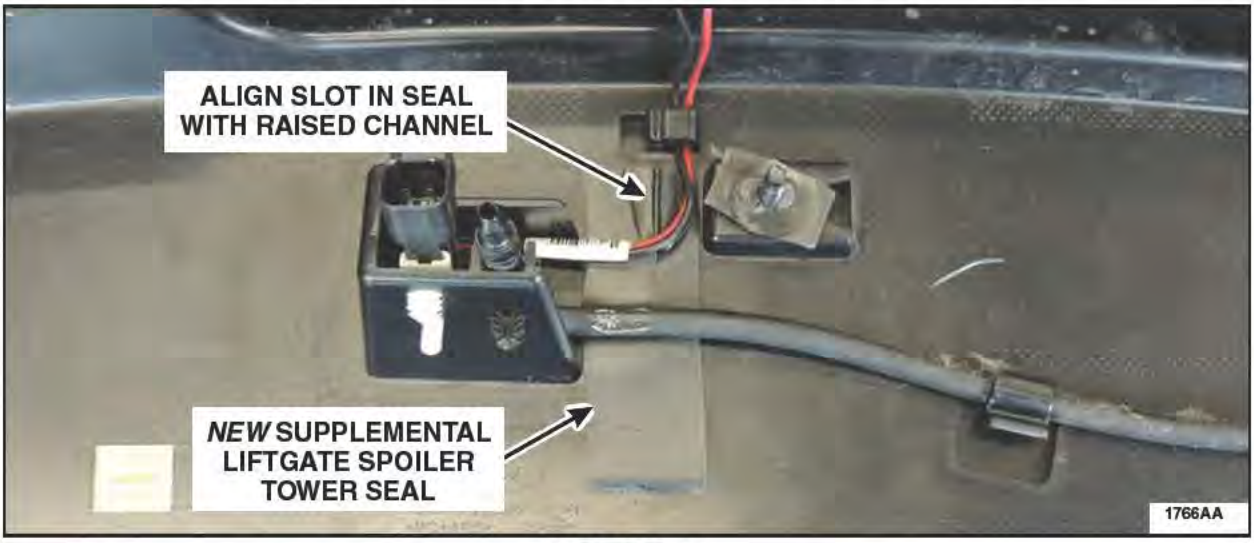

FIGURE 13

6. Install a *new* liftgate spoiler tower seal. The flat edge of the seal must be aligned with the raised channel on the spoiler. See Figures 14a and 14b.

NOTE: Make sure the wiring and washer line are properly routed under the seal.

NOTE: Make sure the tower seal is installed as flat as possible, using even pressure around the perimeter to ensure a smooth wrinkle free seal.

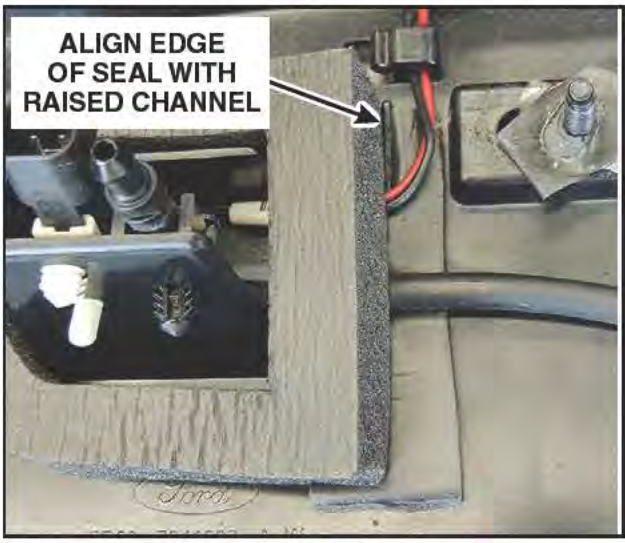

FIGURE 14a

FIGURE 14b

7. Install four *new* retention clips and three locating pin seals. See Figure 15.

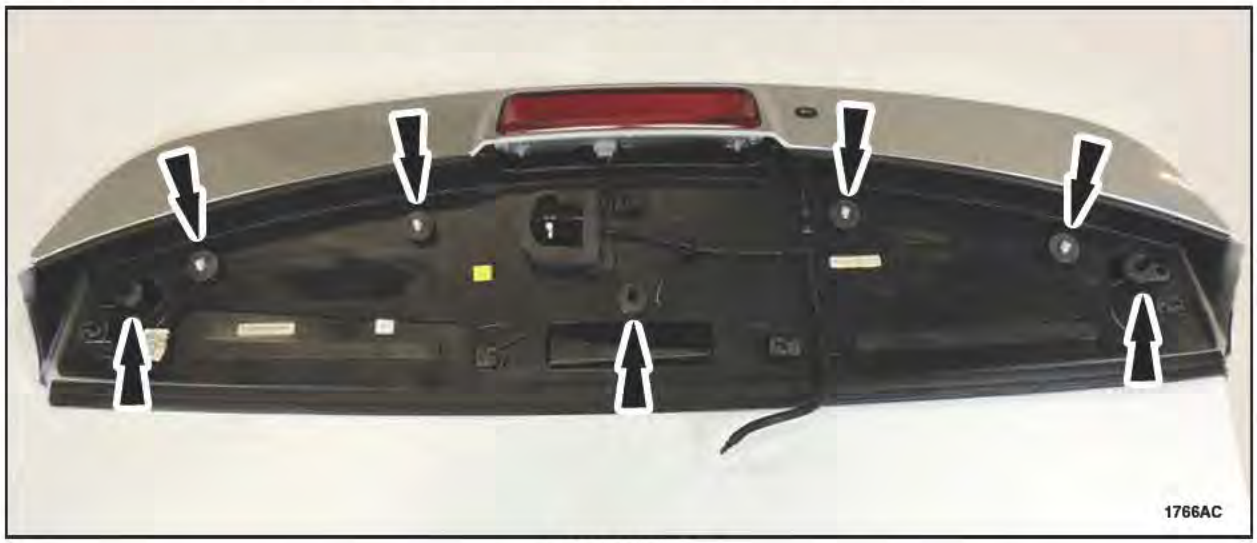

FIGURE 15

8. Using a flat faced hammer, carefully straighten any deformed spoiler retaining clip mounting holes and apply Motorcraft® PM13A sealer. See Figure 16.

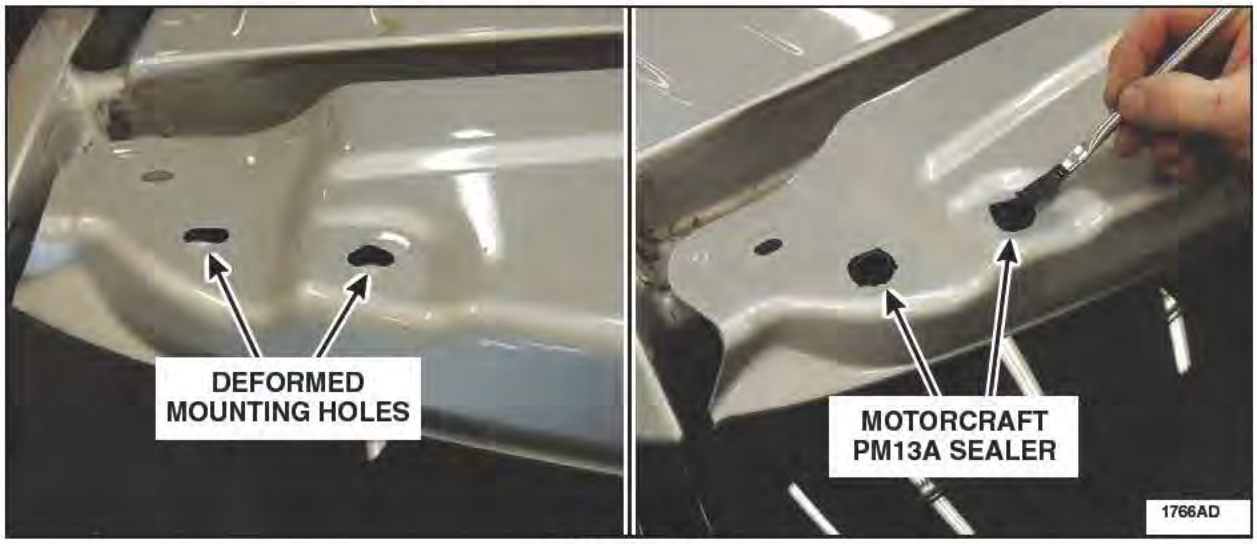

FIGURE 16

9. Leaving the liftgate trim panel, aftermarket light bar, and other accessories removed, install the liftgate spoiler. Please follow the WSM procedures in Section 501-08. Proceed to the Liftgate Trim Panel Sealing Procedure.

Liftgate Trim Panel Sealing

Recommended Tool List:

1/4" Drive Ratchet (Power Tool & Hand Tool)
1/4" Drive 6 in (152 mm) Extension
1/4" Drive 8mm Shallow Socket
Trim Tool
Pencil

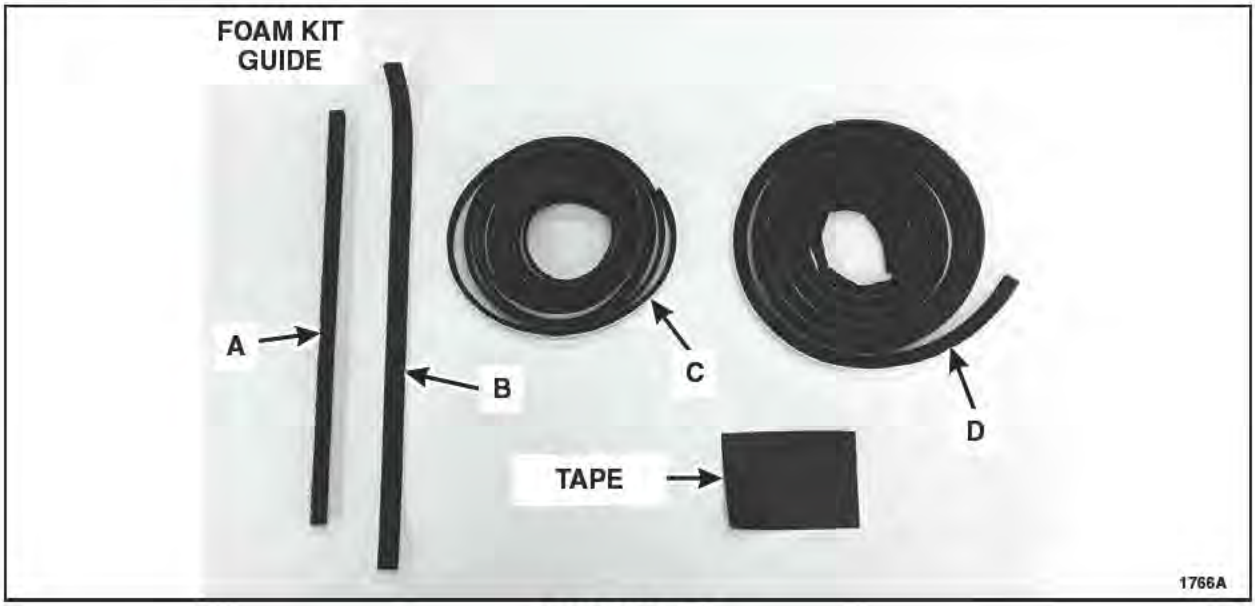

FIGURE 17

1. Using isopropyl alcohol and a clean cloth, clean the liftgate glass along the edge of the liftgate interior trim panel.

2. Use a pencil on the rear glass to trace along the edge of the liftgate trim panel. This pencil line will be used in Step 10.

3. Remove the liftgate trim panel. Please follow the WSM procedures in Section 501-05.

4. Inspect the liftgate trim panel clips for any damage to the clips or clip mounting towers. Replace any clips that are found to be damaged or deformed. If a clip mounting tower is found to be damaged, replace the trim panel.

5. Using isopropyl alcohol and a clean cloth, clean the liftgate trim panel where foam A and B will be installed. See Figure 18.

6. Install foam A and B on the liftgate trim panel. See Figure 18.

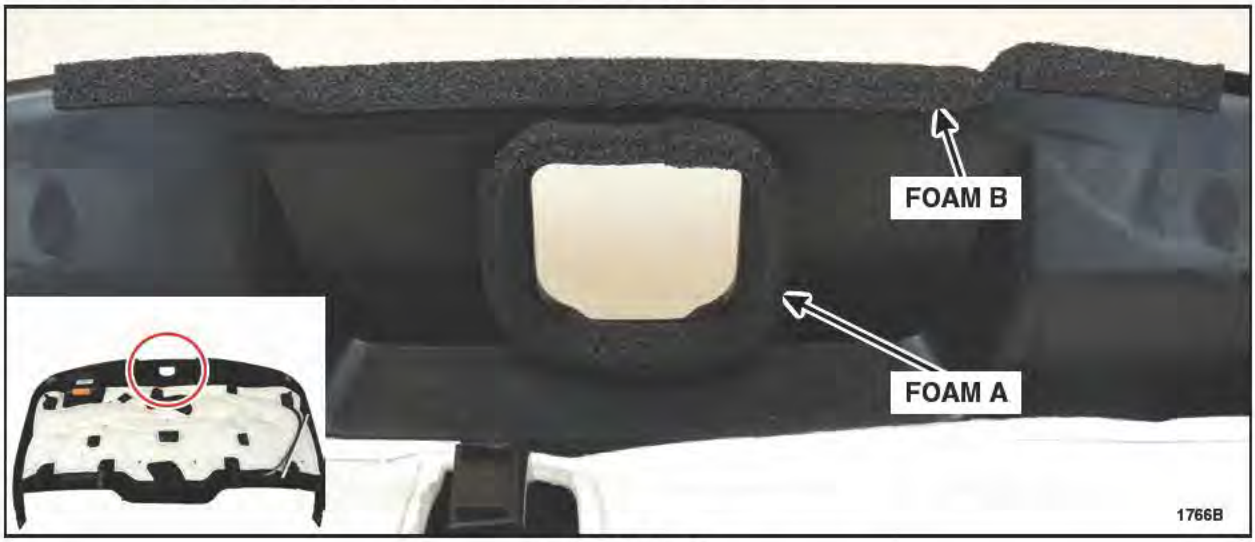

FIGURE 18

7. Using isopropyl alcohol and a clean cloth, clean the area around the liftgate latch. Install the tape pieces around three (3) sides of the liftgate latch. See Figure 19.

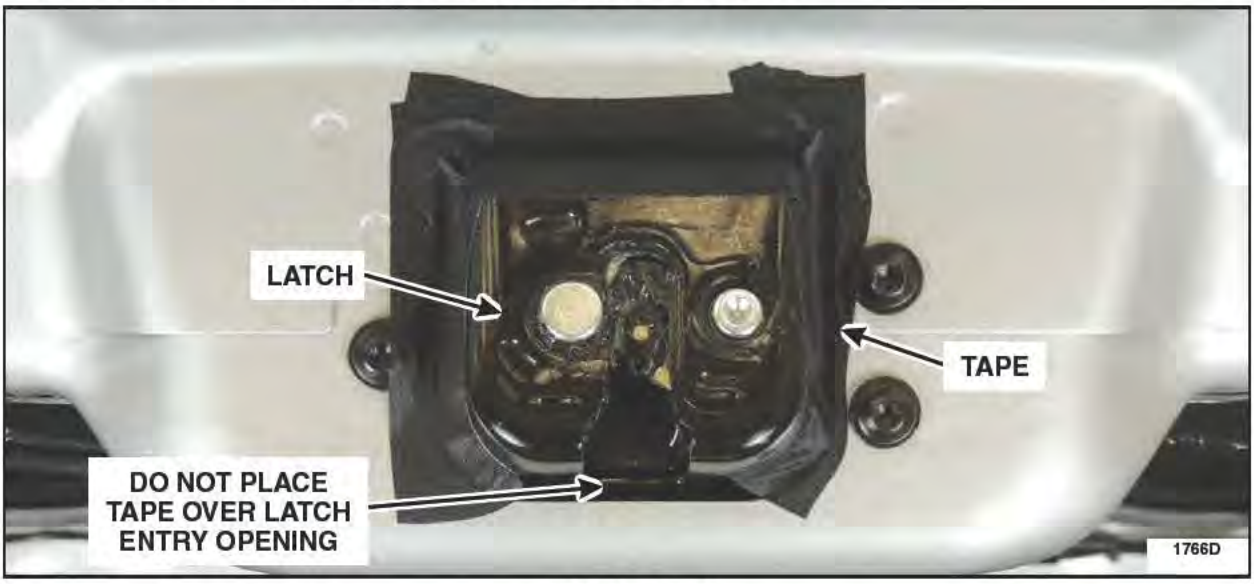

FIGURE 19

8. Using isopropyl alcohol and a clean cloth, clean the liftgate sheet metal surface in the area highlighted. See Figure 20.

FIGURE 20

9. Install foam piece C. The foam seal should be placed against the outer edge lip of the sheet metal to liftgate trim panel surface area. See Figures 21a and 21b

FIGURE 21a

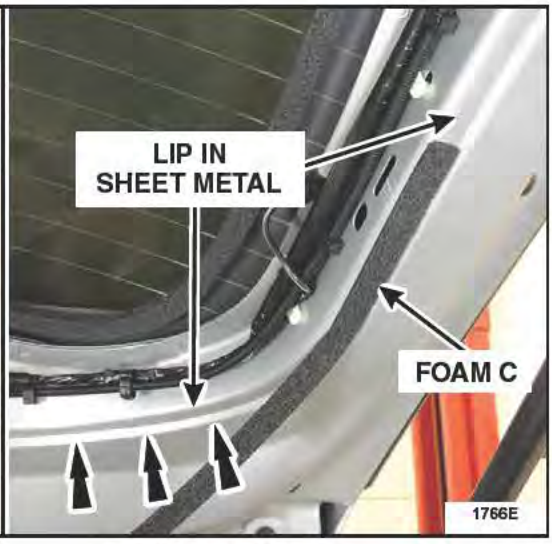

FIGURE 21b

10. Install foam piece D. See Figures 22 and 23.

- The foam should be centered over the pencil line from Step 2 to properly contact the liftgate trim panel.
- The top and sides of the foam seal must rest on the black silkscreen portion of the liftgate glass with the black dots still visible. See Figures 22 and 23.
- The bottom of the foam seal should cover up the black silkscreen dots on the liftgate glass. See Figures 22 and 23.

NOTE: There will be a gap between the foam seal and the top and sides of the liftgate body when foam D is installed properly.

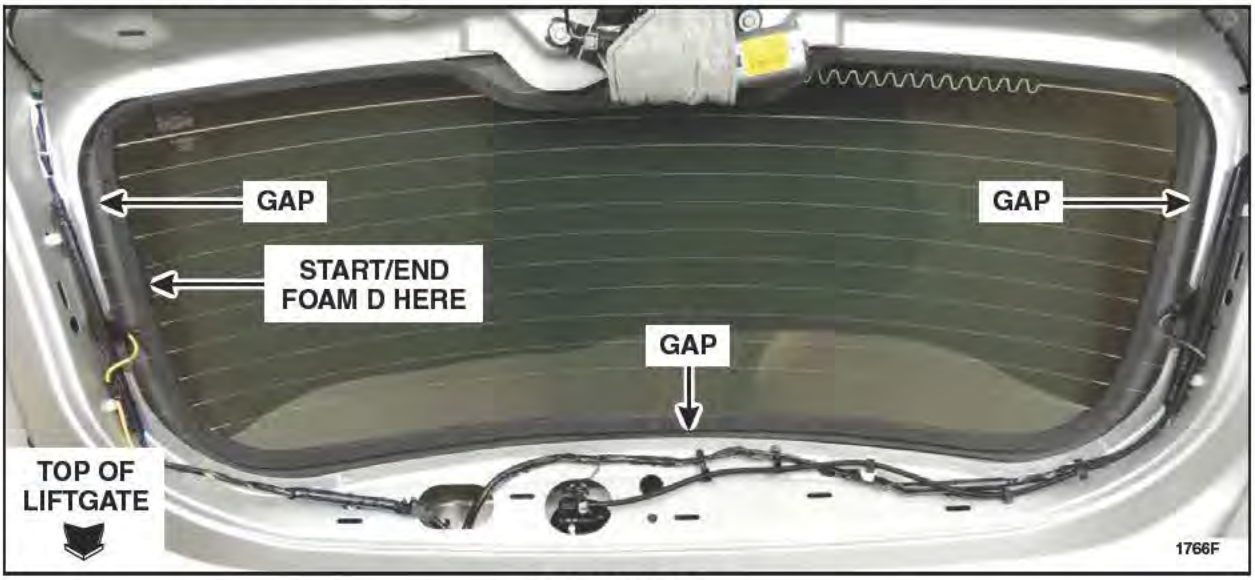

FIGURE 22

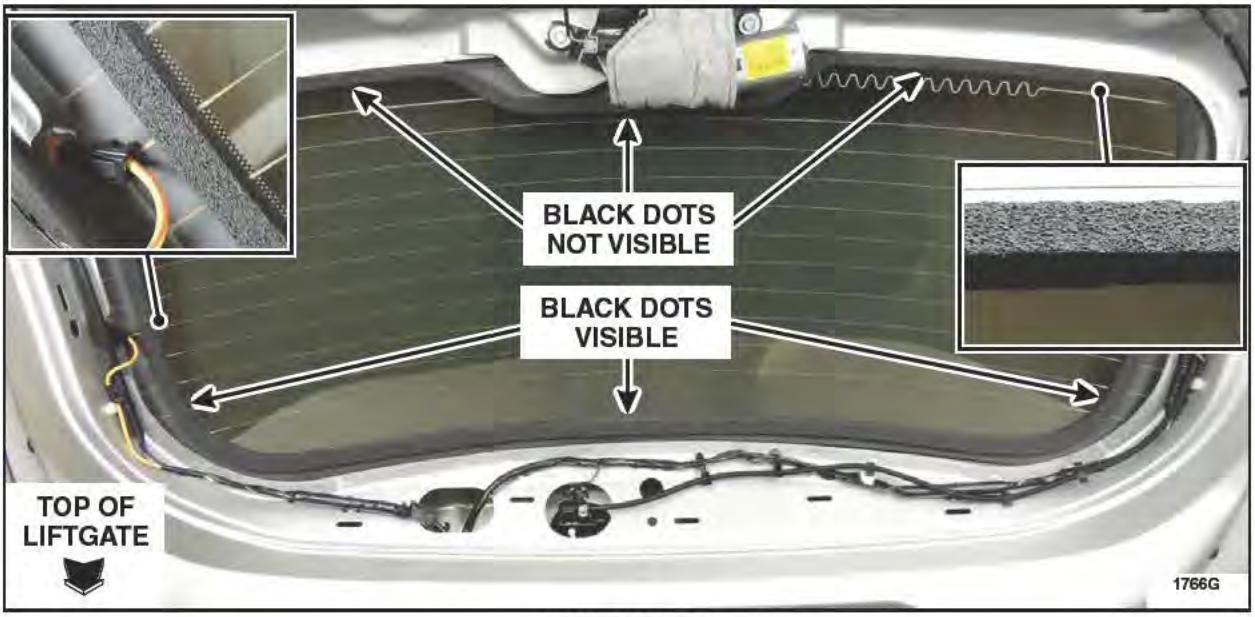

FIGURE 23

11. Inspect the liftgate trim panel for lights, pass throughs/holes and/or aftermarket equipment that could compromise the seal of the liftgate trim panel. Seal any breaches of the liftgate trim panel using mastic patch, left over foam tape, Dow Corning® 7091 Adhesive/Sealant, or other robust sealing methods.

12. Ensure the interior luggage compartment release access panel is properly installed in the lower liftgate trim panel. See Figure 24.

FIGURE 24

13. Install the liftgate trim panel. Please follow the WSM procedures in Section 501-05. See Figures 25a and 25b.

NOTE: The clips where the upper and lower liftgate trim panels are joined are easily damaged on installation. Use care when installing the upper liftgate trim panel.

FIGURE 25a

FIGURE 25b

Liftgate Drain Valve Inspection

1. With the liftgate open, remove all liftgate drain valves. 2013-2015 model year vehicles are equipped with two valves, 2016-2017 model year vehicles are equipped with three valves. See Figure 26.

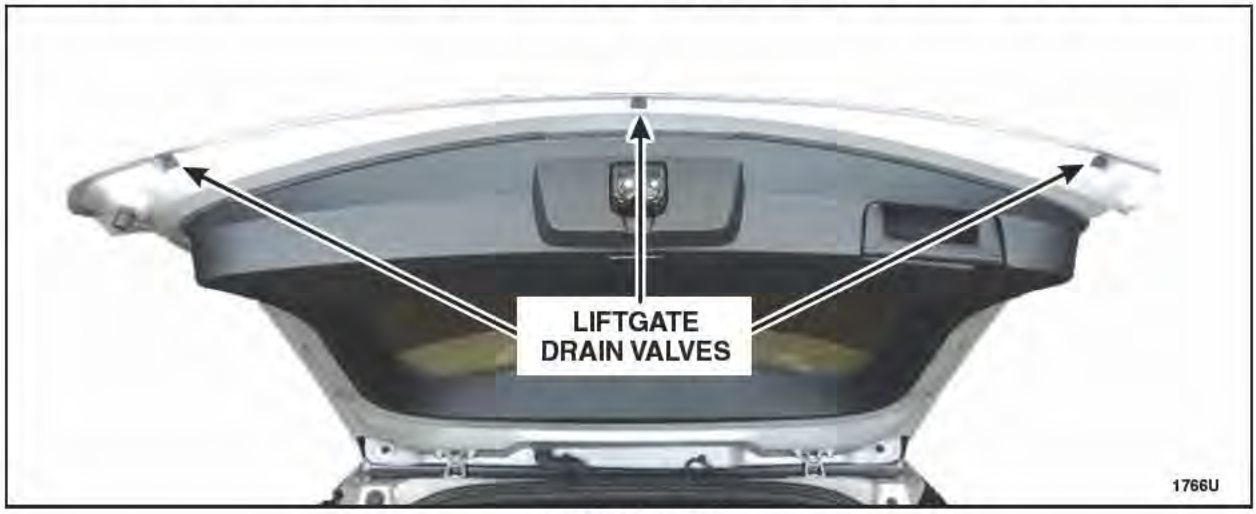

FIGURE 26

2. Clean the liftgate drain valves and the liftgate where the drains are fitted using isopropyl alcohol. Replace all drain valves that are damaged or missing.

3. Apply a drop of Motorcraft® Instant Gel Adhesive TA-19-C or equivalent on each side of the liftgate drain valve attaching clip. Install the liftgate drain valves and hold the part in place for the period of time listed in the instructions on the package to allow the adhesive time to set. See Figure 27.

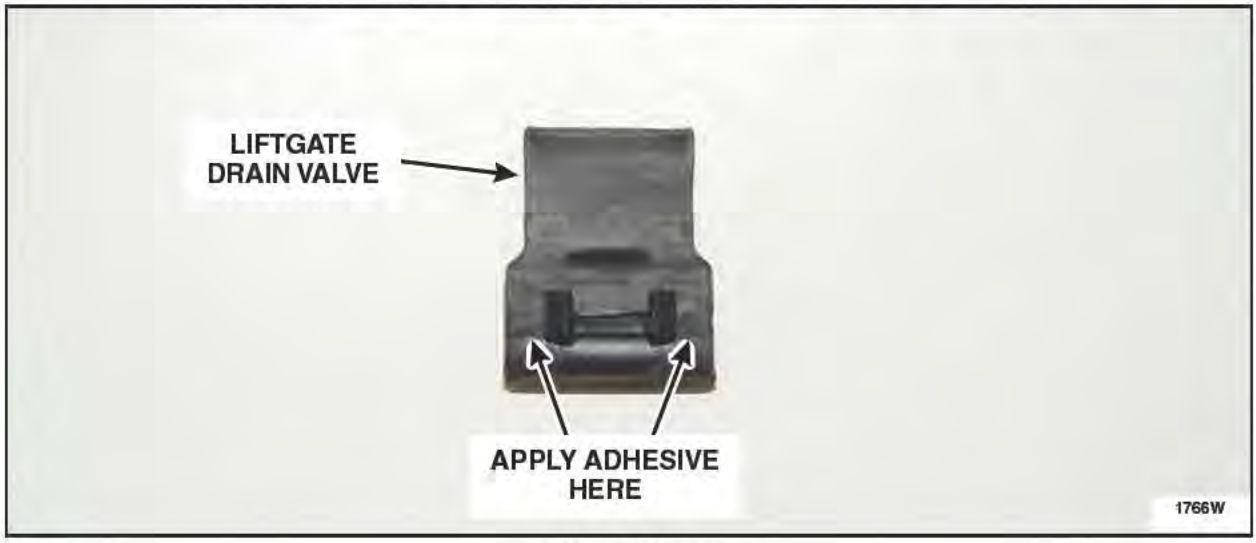

FIGURE 27

Exhaust Tip Replacement

NOTE: The following procedure modifies the appearance of the vehicle by replacing the straight facing exhaust tips with downward facing exhaust tips. See Figure 28.

Recommended Tool List:

Die Grinder
Abrasive Disc
Tape Measure
Level
Rubber Gloves
Welder

FIGURE 28

1. Using a pneumatic handheld grinder and an abrasive disc, remove the exhaust tip welds on both sides and remove both exhaust tips. See Figures 29a and 29b.

FIGURE 29a

FIGURE 29b

2. Remove the remaining weld material on the mufflers with an abrasive disc until there is a smooth surface. See Figure 30.

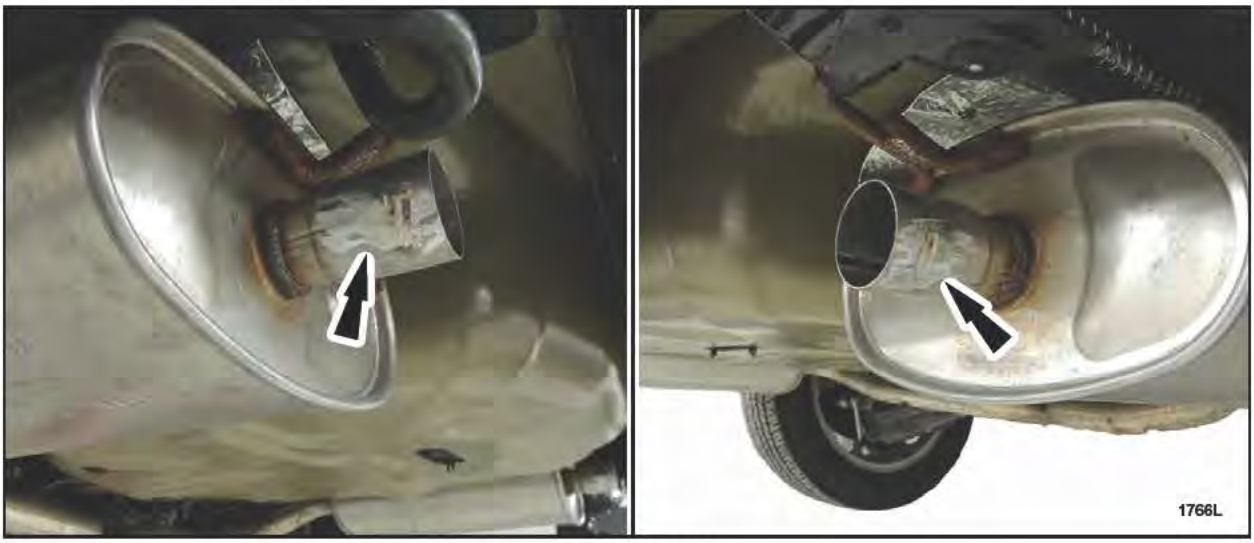

FIGURE 30

3. Install the *new* exhaust tips. Use a tape measure or ruler to position the exhaust tip prior to welding. See Figure 31.

    - 2013-2015 vehicles with 3.5L GTDI engine 7 5/8 in (193 mm).
    - 2016-2017 vehicles with 3.5L GTDI engine 8 1/16 in (206 mm).
    - All vehicles with 3.7L engine 6 7/8 in (174 mm).

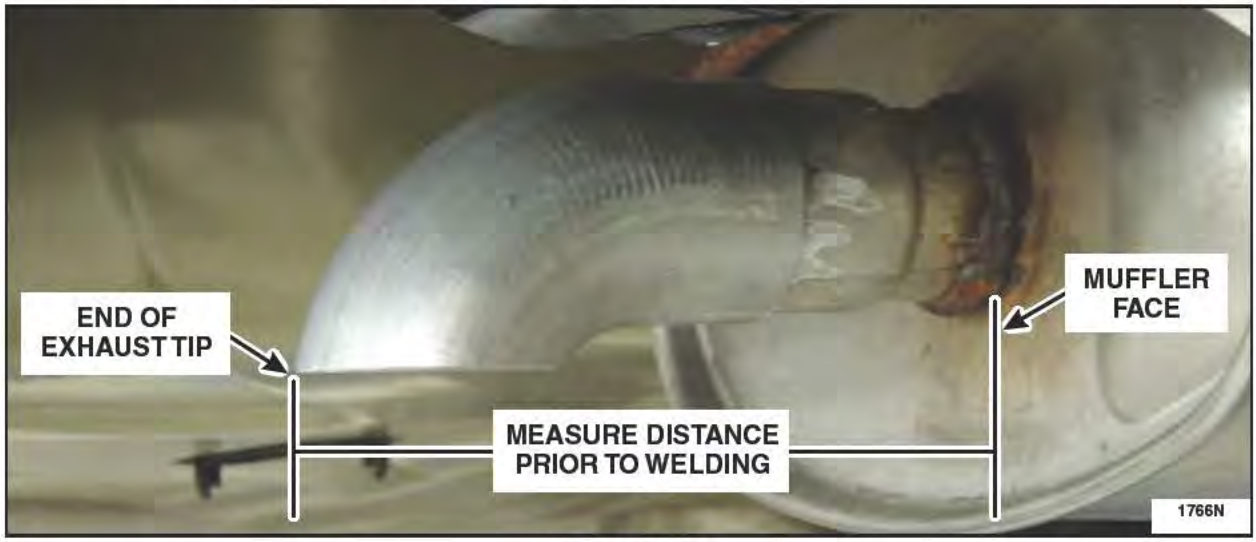

FIGURE 31

4. Level the exhaust tips and clamp in position as required. See Figure 32.

FIGURE 32

5. Apply 1 in (25 mm) long weld beads along both sides of each exhaust tip using 308L or 409SS MIG welding wire. See Figure 33.

NOTE: If tips are welded using wire other than 308L or 409SS MIG welding wire, the welds must be protected from corrosion with two coats of high-temperature exterior paint rated at 500°F (260°C) or higher.

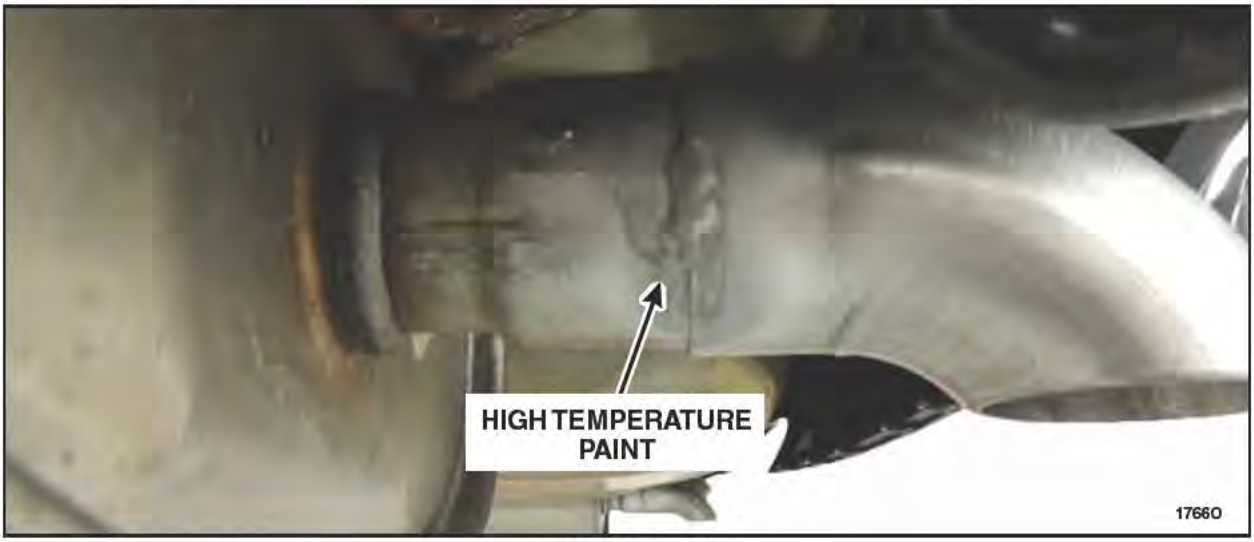

FIGURE 33

6. Clean the body plugs and surrounding sheet metal, then apply the mastic patches to the underbody plugs as shown in Figure 34.

NOTE: Make sure each patch completely covers the body plug.

NOTE: Apply firm pressure when applying the mastic patch to the underbody plugs and surrounding sheet metal to ensure proper adhesion.

FIGURE 34

Check For Catalyst Efficiency DTCs

Recommended Tool List (3.5L GTDI Engines):

3/8" Drive Impact Gun
3/8" Drive Ratchet
3/8" Drive 10mm Impact Socket
3/8" Drive 15mm Deep Impact Socket
3/8" Drive Impact Universal Swivel Joint
3/8" Drive 3 in (76 mm) & 11 in (279 mm) Impact Extensions
3/8" Drive Torque Wrench
1/2" Drive Impact Gun (RH Converter Only)
1/2" Drive 19mm Impact Socket (RH Converter Only)
Stud Remover / Installer
Trim Tool
Exhaust Gas Oxygen Sensor Socket 303-476 (LH Converter Only)

Recommended Tool List (3.7L TiVCT Engines):

1/4" Drive Ratchet (Power Tool)
1/4" Drive Flex Head Ratchet
1/4" Drive Shallow 10mm Socket
1/4" Drive 12 in (305 mm) Extension
1/4" Drive Torque Wrench
3/8" Drive Impact Gun
3/8" Drive Ratchet
3/8" Drive 13mm Deep Swivel Impact Socket
3/8" Drive 15mm Deep Swivel Impact Socket
3/8" Drive 7 in (178 mm) & 12 in (305 mm) Impact Extensions
3/8" Drive Torque Wrench
Long 10mm Ratchet Wrench
Stud Remover / Installer
Long Screwdriver (RH Converter Only)
Paint Stick (RH Converter Only)
Exhaust Gas Oxygen Sensor Socket 303-476 (RH Converter Only)

NOTE: For stock/unsold vehicles, proceed to HVAC Module Reprogramming. It is not necessary to check for catalyst efficiency DTCs on stock/unsold vehicles.

1. Perform a KOEO self-test on the PCM. Is DTC P0420 and/or P0430 present (including pending DTCs).

   Yes – Replace the catalyst as required. Please follow the WSM procedures in Section 309-00. Proceed to the HVAC module reprogramming procedure.
   No – Proceed to the HVAC module reprogramming procedure.

HVAC Module Reprogramming

1. Reprogram the HVAC module using Integrated Diagnostic Software (IDS) release 106.07 or higher.

Important Information for Module Programming

NOTE: When programming or reprogramming a module, use the following basic checks to ensure programming completes without errors.

- Make sure the 12V battery is fully charged before carrying out the programming steps and connect IDS/scan tool to a power source.
- Inspect Vehicle Communication Module (VCM) and cables for any damage. Make sure scan tool connections are not interrupted during programming.
- A hardwired connection is strongly recommended.
- Turn off all unnecessary accessories (radio, heated/cooled seats, headlamps, interior lamps, HVAC system, etc.) and close doors.
- Disconnect/depower any aftermarket accessories (remote start, alarm, power inverter, CB radio, etc.).
- Follow all scan tool on-screen instructions carefully.
- Disable IDS/scan tool sleep mode, screensaver, hibernation modes.
- Create all sessions key on engine off (KOEO). Starting the vehicle before creating a session will cause errors within the programming inhale process.

Recovering a module when programming has resulted in a blank module: NEVER DELETE THE ORIGINAL SESSION!

a. Obtain the original IDS that was used when the programming error occurred during module reprogramming (MR) or programmable module installation (PMI).

b. Disconnect the VCM from the data link connector (DLC) and the IDS.

c. Reconnect the VCM to IDS and then connect to the DLC. Once reconnected, the VCM icon should appear in the corner of the IDS screen. If it does not, troubleshoot the IDS to VCM connection.

d. Locate the original vehicle session when programming failed. This should be the last session used in most cases. If not, use the session created on the date that the programming failed.

NOTE: If the original session is not listed in the previous session list, click the Recycle Bin icon at the lower right of the previous session screen. This loads any deleted sessions and allows you to look through them. Double-click the session to restore it.

e. Once the session is loaded, the failed process should resume automatically.

f. If programming does not resume automatically, proceed to the Module Programming menu and select the previously attempted process, PMI or MR.

g. Follow all on-screen prompts/instructions.

h. The last screen on the IDS may list additional steps required to complete the programming process. Make sure all applicable steps listed on the screen are followed in order.

EA17-002

FORD

9/30/2019

APPENDIX H

TECHNICAL SERVICE BULLETINS

TECH INSTRUCTIONS

17N03-S2 Tech Instructions Explorer Exhaust Fumes - Final

CERTAIN 2011-2017 MODEL YEAR EXPLORER VEHICLES — CARBON MONOXIDE CONCERNS

OVERVIEW

Ford is aware that some 2011-2017 Explorer owners have concerns about exhaust or carbon monoxide. These vehicles are safe. However, for our customers' peace of mind, Ford is offering this no charge service that reduces the potential for exhaust to enter the vehicle. Customers can take their vehicles, regardless of mileage or warranty status, to a Ford dealer to have this service performed. To be clear, unlike Explorer vehicles, carbon monoxide concerns in Police Interceptor Utilities are related to unsealed holes from the installation of police equipment by third parties after the vehicle was purchased.

At the request of the customer, dealers are to reprogram the climate control module, inspect rear-of-vehicle sealing and repair as necessary.

Before removing aftermarket lighting and/or equipment from the liftgate spoiler, verify that Service Department Management obtained customer approval to conduct that part of the service. If the customer elected to keep aftermarket lighting and/or equipment on the spoiler, proceed with the following actions:

- Document on the repair order that the service to reseal the spoiler and remove the aftermarket lighting and/or equipment from the spoiler was declined.
- Print and provide the customer with the Customer Information Form – Liftgate Spoiler – Aftermarket Lighting and/or Equipment (Attachment V).
- Complete all other steps of this field service action EXCEPT the Liftgate Spoiler Sealing procedure.
- Release the vehicle to the customer.

SERVICE PROCEDURE

Underbody Inspection and Sealing

1. With the vehicle in NEUTRAL, position it on a hoist. Please follow the Workshop Manual (WSM) procedures in Section 100-02.

2. Inspect the rear underbody for damaged or missing body plugs. Replace damaged or missing body plugs as needed. See Figure 1.

3. Clean the two (2) rectangular-shaped body plugs located near the RH and LH muffler hangers as well as the surrounding sheet metal and apply the mastic patches to the underbody plugs as shown in Figure 1.

NOTE: Make sure each patch completely covers the body plug.

NOTE: Apply firm pressure when applying the mastic patch to the underbody plugs and surrounding sheet metal to ensure proper adhesion.

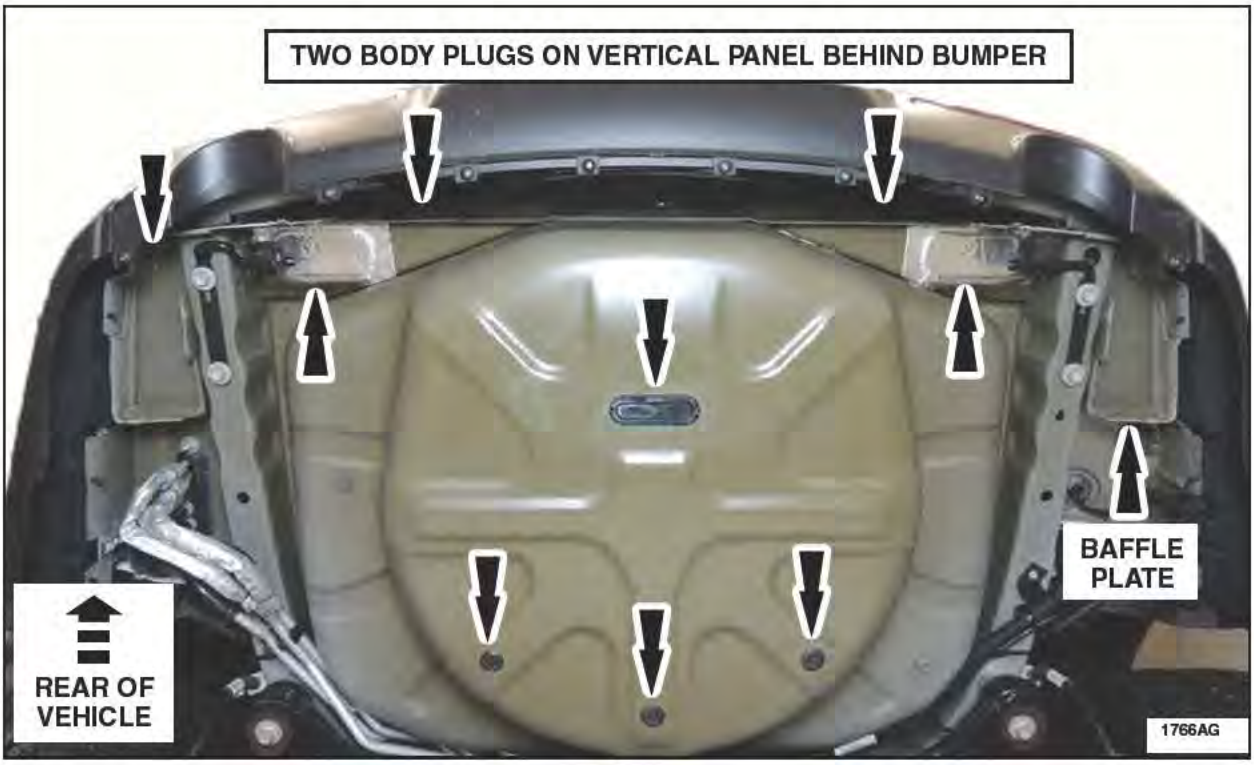

FIGURE 1

Air Extractor Inspection

Air Extractor Replacement Recommended Tool List:

1/4" Drive Ratchet (Power Tool & Hand Tool)
1/4" Drive Torque Wrench
1/4" Drive Extension (6 in 152 mm)
1/4" Drive 5.5mm Shallow Socket
1/4" Drive 8mm Shallow Socket
Trim Tool
Pocket Screwdriver
Phillips Screwdriver

1. Remove the three push-pins securing the LH and RH rear wheelhouse insulators, and remove the insulators. See Figure 2.

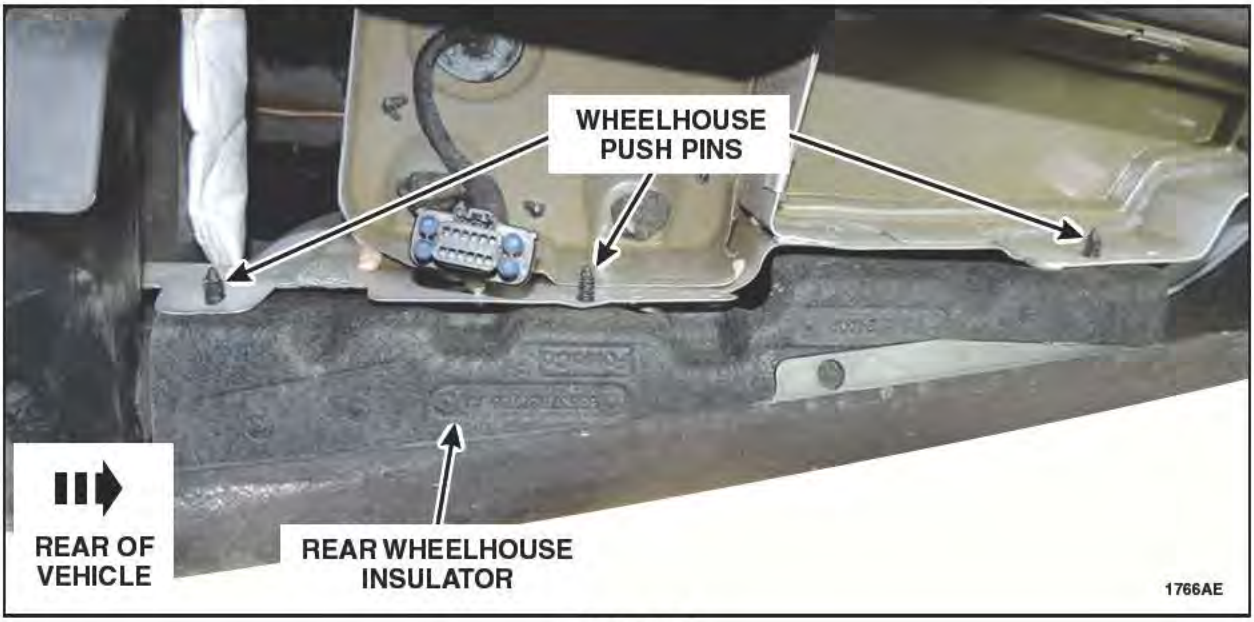

FIGURE 2

2. Using a telescoping mirror and flashlight, inspect the 4 body plugs and air extractor through the wheelhouse openings on each side of the vehicle. See Figure 3.

3. Replace body plugs or air extractors that are missing or damaged. Rear bumper cover removal is required to replace the air extractor. Please follow the WSM procedures in Section 501-19.

NOTE: Bumper removed for clarity.

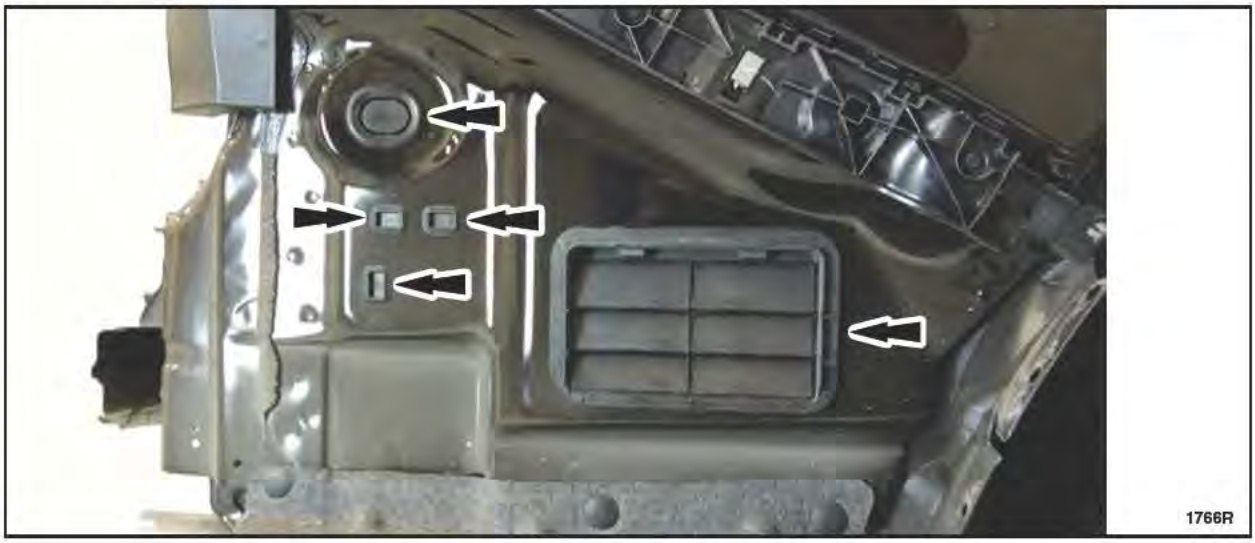

FIGURE 3

4. Reinstall the wheelhouse insulators. The wheelhouse push pins can be reinstalled by removing the lower inner fender well fasteners to gain access to the fasteners. See Figure 4.

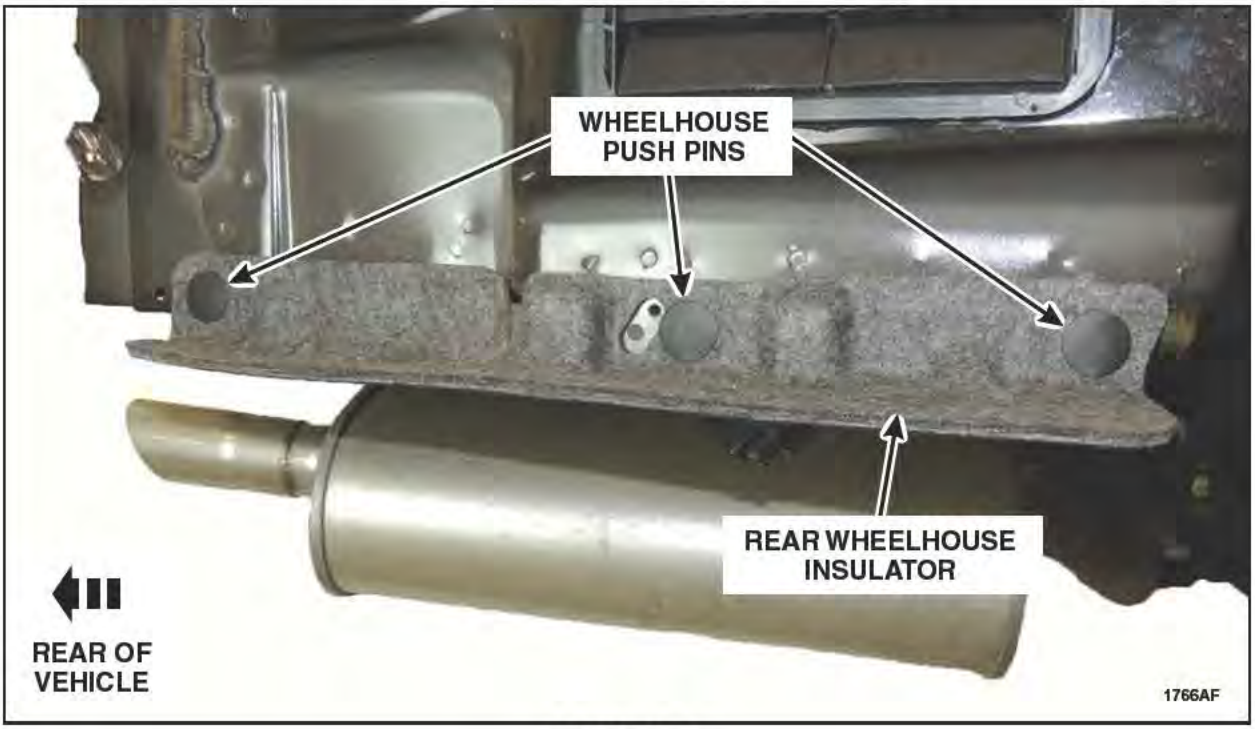

FIGURE 4

Liftgate Drain Valve Replacement

1. Remove and discard all liftgate drain valves. Clean the liftgate where the drains are fitted using isopropyl alcohol. 2011-2015 model year vehicles are equipped with two valves, 2016-2017 model year vehicles are equipped with three valves. See Figure 5.

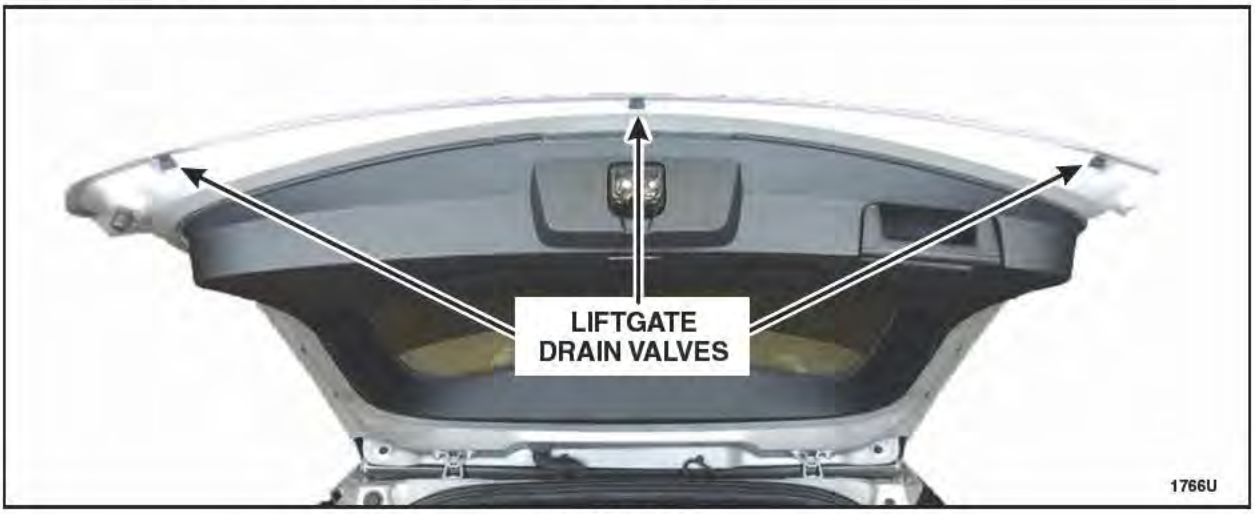

FIGURE 5

2. Apply a drop of Motorcraft® Instant Gel Adhesive TA-19-C or equivalent near the retention tab as shown. Install the *new* liftgate drain valves and hold the part in place for the period of time listed in the instructions on the package to allow the adhesive time to set. See Figure 6.

FIGURE 6

Liftgate Weather Seal Inspection

1. Inspect the liftgate weather seal for damage and proper fitment to the vehicle. Replace the liftgate weatherseal if required. See Figure 7.

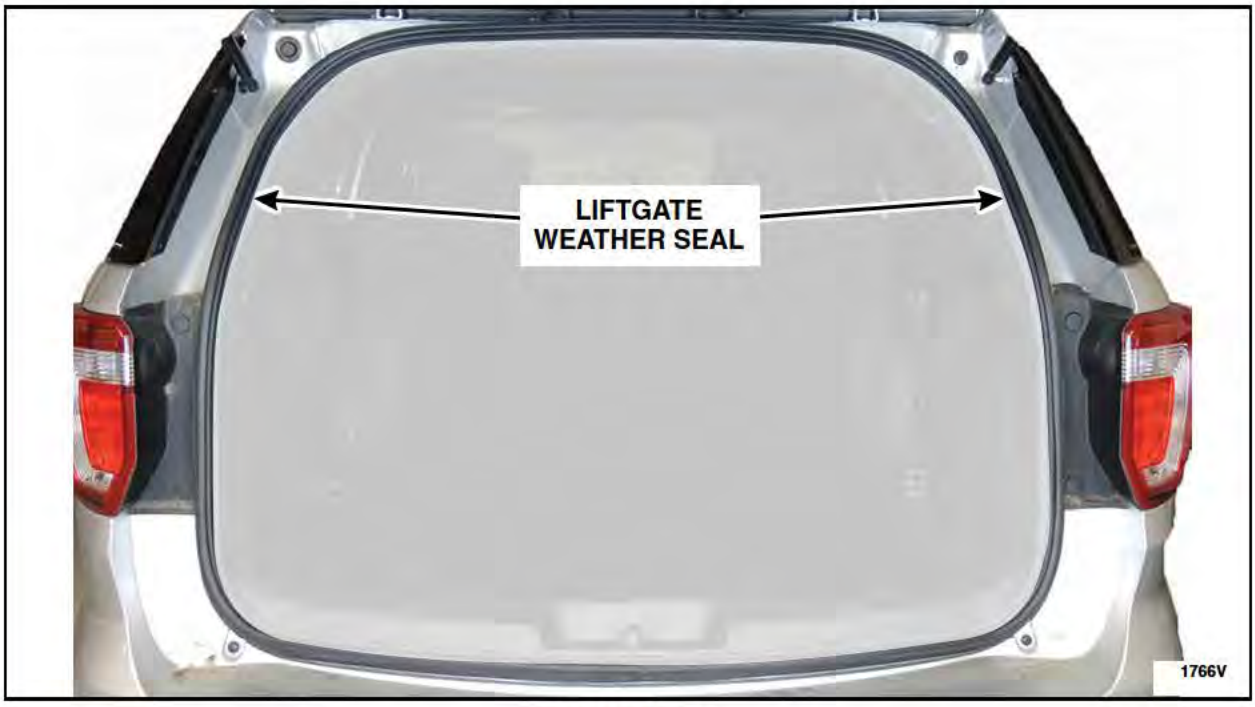

FIGURE 7

Before removing aftermarket lighting and/or equipment from the liftgate spoiler, verify that Service Department Management obtained customer approval to conduct that part of the service. If the customer elected to keep aftermarket lighting and/or equipment on the spoiler, proceed with the following actions:

- Document on the repair order that the service to reseal the spoiler and remove the aftermarket lighting and/or equipment from the spoiler was declined.
- Print and provide the customer with the Customer Information Form – Liftgate Spoiler – Aftermarket Lighting and/or Equipment (Attachment V).
- Complete all other steps of this field service action EXCEPT the Liftgate Spoiler Sealing procedure.
- Release the vehicle to the customer.

Liftgate Spoiler Inspection

1. Inspect the liftgate spoiler for any of the following:

    a. Is there aftermarket accessories mounted to the spoiler?
    b. Has the spoiler or vehicle been painted?
    c. Is the spoiler damaged or improperly mounted?

        Yes – Proceed to the Liftgate Spoiler Sealing Procedure.
        No – Proceed to HVAC Module Reprogramming.

Liftgate Spoiler Sealing Procedure

Recommended Tool List:

1/4" Drive Ratchet (Power Tool & Hand Tool)
1/4" Drive 6 in (152 mm) Extension
1/4" Drive 7mm Shallow Socket
1/4" Drive Torque Wrench
3/8" Drive Ratchet (Power Tool & Hand Tool)
3/8" Drive 6 in (152 mm) Extension
3/8" Drive 13mm Twelve Point Socket
3/8" Drive Torque Wrench
Flat Faced Sheet Metal Hammer
Applicator Brush (Anti Corrosion Application)

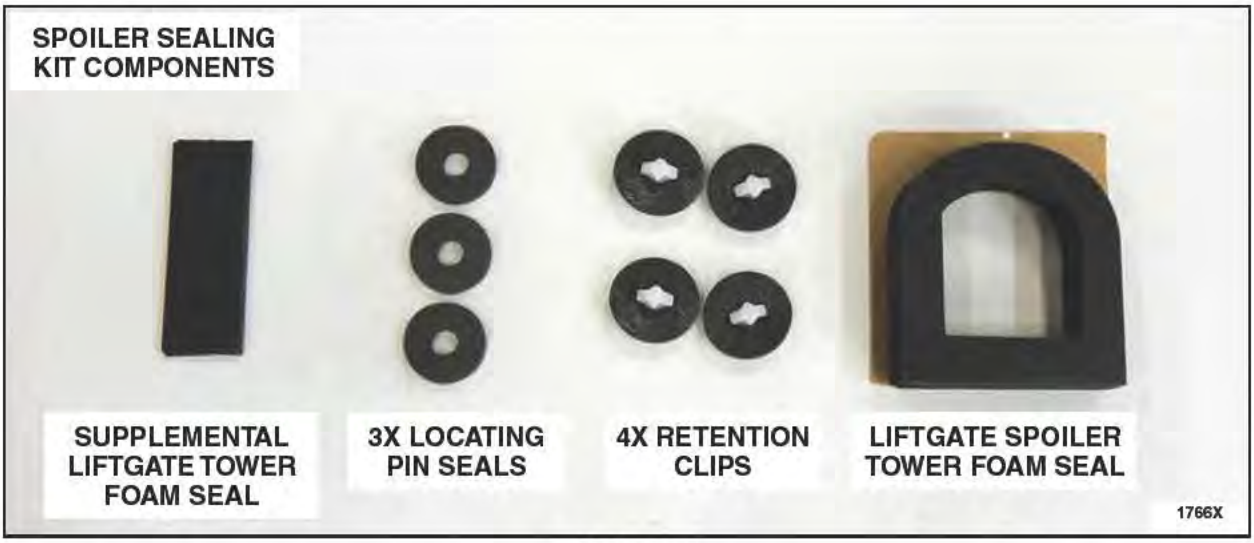

FIGURE 8

1. Remove the liftgate spoiler. Please follow the WSM procedures in Section 501-08.

NOTE: Remove and **do not** reinstall any aftermarket accessories mounted to the liftgate spoiler.

2. Inspect for any aftermarket wiring pass throughs/holes that could affect the sealing ability of the spoiler. See Figures 9a and 9b.

FIGURE 9a

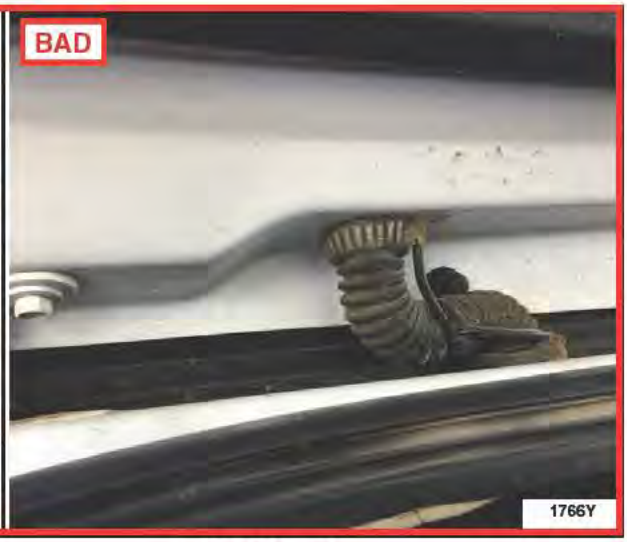

FIGURE 9b

3. Seal any leak paths created by the aftermarket wiring pass throughs/holes in the spoiler area with Motorcraft® TA-2 seam sealer or equivalent.

4. Remove the liftgate spoiler tower foam seal. See Figure 10.

FIGURE 10

5. Install a *new* supplemental liftgate spoiler tower seal underneath the wiring and washer line. Make sure the slot in the seal is aligned with the raised channel on the spoiler. See Figure 11.

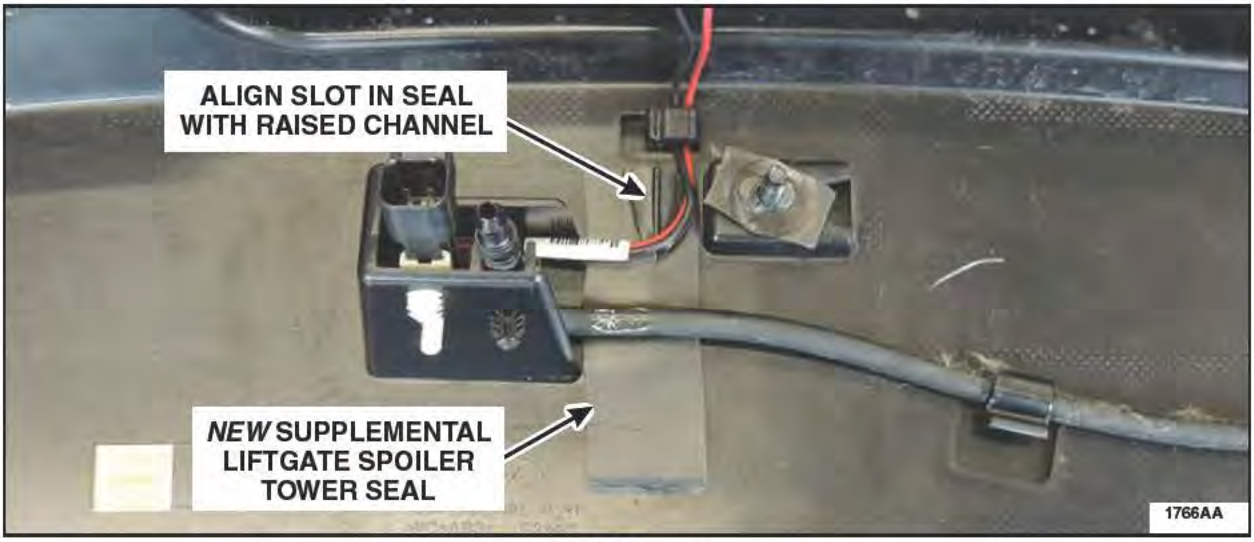

FIGURE 11

6. Install a *new* liftgate spoiler tower seal. The flat edge of the seal must be aligned with the raised channel on the spoiler. See Figures 12a and 12b.

NOTE: Make sure the wiring and washer line are properly routed under the seal.

NOTE: Make sure the tower seal is installed as flat as possible, using even pressure around the perimeter to ensure a smooth wrinkle free seal.

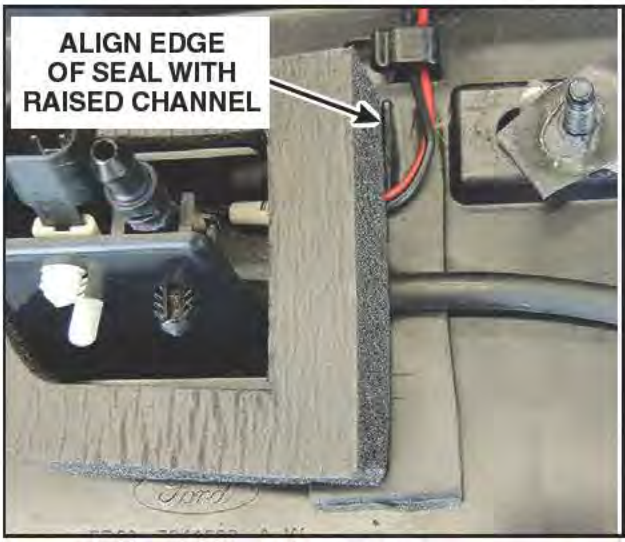

FIGURE 12a

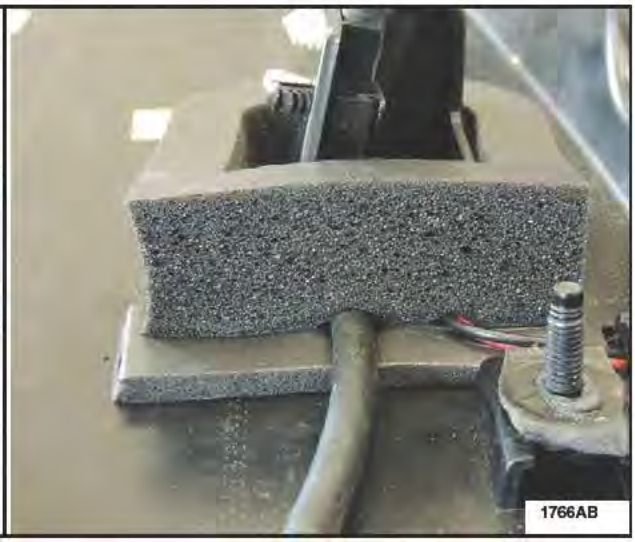

FIGURE 12b

7. Install four *new* retention clips and three locating pin seals. See Figure 13.

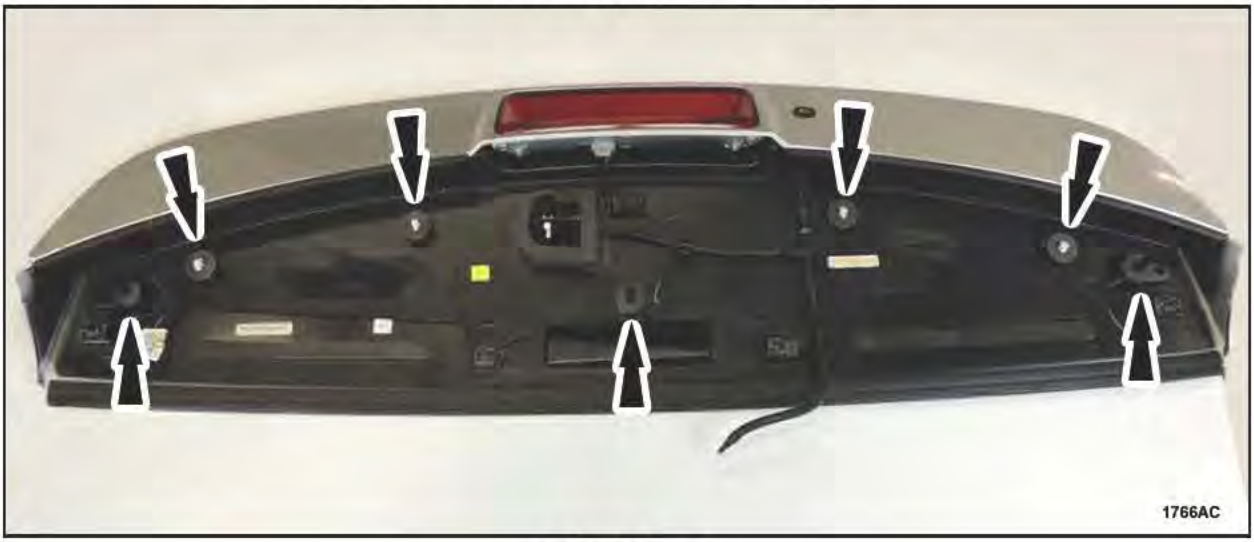

FIGURE 13

8. Using a flat faced hammer, carefully straighten any deformed spoiler retaining clip mounting holes and apply Motorcraft® PM13A sealer. See Figure 14.

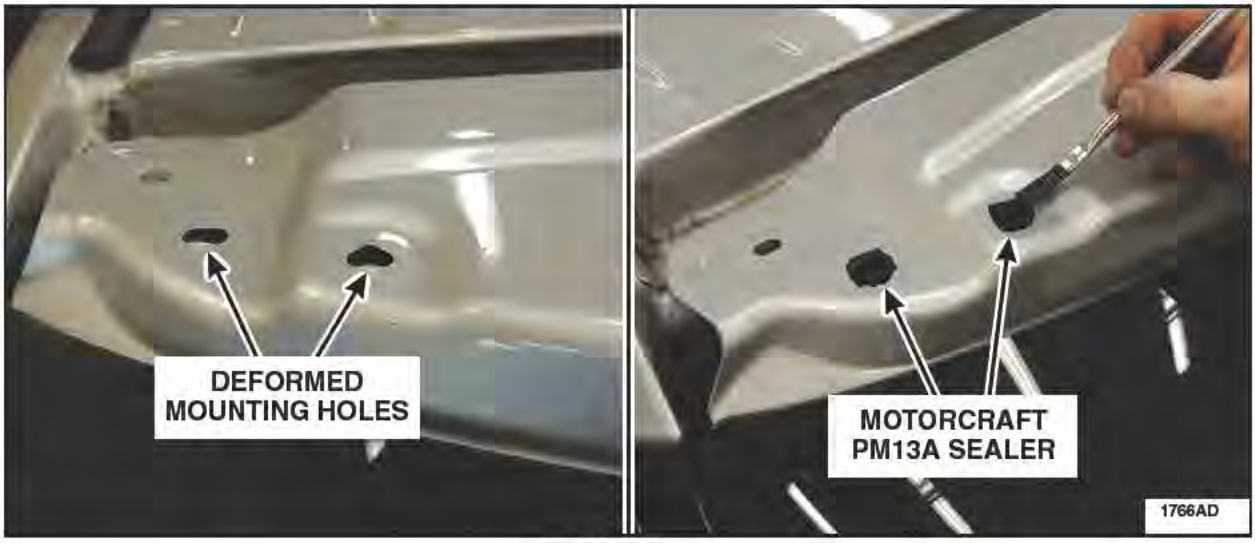

FIGURE 14

HVAC Module Reprogramming

1. Reprogram the HVAC module using Integrated Diagnostic Software (IDS) release 107.04 or higher.

Important Information for Module Programming

NOTE: When programming or reprogramming a module, use the following basic checks to ensure programming completes without errors.

- Make sure the 12V battery is fully charged before carrying out the programming steps and connect IDS/scan tool to a power source.
- Inspect Vehicle Communication Module (VCM) and cables for any damage. Make sure scan tool connections are not interrupted during programming.
- A hardwired connection is strongly recommended.
- Turn off all unnecessary accessories (radio, heated/cooled seats, headlamps, interior lamps, HVAC system, etc.) and close doors.
- Disconnect/depower any aftermarket accessories (remote start, alarm, power inverter, CB radio, etc.).
- Follow all scan tool on-screen instructions carefully.
- Disable IDS/scan tool sleep mode, screensaver, hibernation modes.
- Create all sessions key on engine off (KOEO). Starting the vehicle before creating a session will cause errors within the programming inhale process.

Recovering a module when programming has resulted in a blank module: NEVER DELETE THE ORIGINAL SESSION!

a. Obtain the original IDS that was used when the programming error occurred during module reprogramming (MR) or programmable module installation (PMI).

b. Disconnect the VCM from the data link connector (DLC) and the IDS.

c. Reconnect the VCM to IDS and then connect to the DLC. Once reconnected, the VCM icon should appear in the corner of the IDS screen. If it does not, troubleshoot the IDS to VCM connection.

d. Locate the original vehicle session when programming failed. This should be the last session used in most cases. If not, use the session created on the date that the programming failed.

NOTE: If the original session is not listed in the previous session list, click the Recycle Bin icon at the lower right of the previous session screen. This loads any deleted sessions and allows you to look through them. Double-click the session to restore it.

e. Once the session is loaded, the failed process should resume automatically.

f. If programming does not resume automatically, proceed to the Module Programming menu and select the previously attempted process, PMI or MR.

g. Follow all on-screen prompts/instructions.

h. The last screen on the IDS may list additional steps required to complete the programming process. Make sure all applicable steps listed on the screen are followed in order.

EA17-002

FORD

9/30/2019

APPENDIX H

TECHNICAL SERVICE BULLETINS

TECH INSTRUCTIONS

19N05 - Tech Instructions Explorer CO2 - Final

CERTAIN 2011-2017 MODEL YEAR EXPLORER VEHICLES — CARBON MONOXIDE CONCERN

OVERVIEW

Ford is aware that some 2011-2017 Explorer owners have concerns about exhaust or carbon monoxide. These vehicles are safe. However, for our customers' peace of mind, Ford is offering this no charge service that reduces the potential for exhaust to enter the vehicle. Customers can take their vehicles, regardless of mileage or warranty status, to a Ford dealer to have this service performed.

NOTE: This program does not apply to Police Interceptor units.

SERVICE PROCEDURE

Liftgate Drain Valve Replacement

1. Remove and discard all liftgate drain valves. Clean the liftgate where the drains are fitted using isopropyl alcohol. 2011-2015 model year vehicles are equipped with two valves, 2016-2017 model year vehicles are equipped with three valves. See Figure 1.

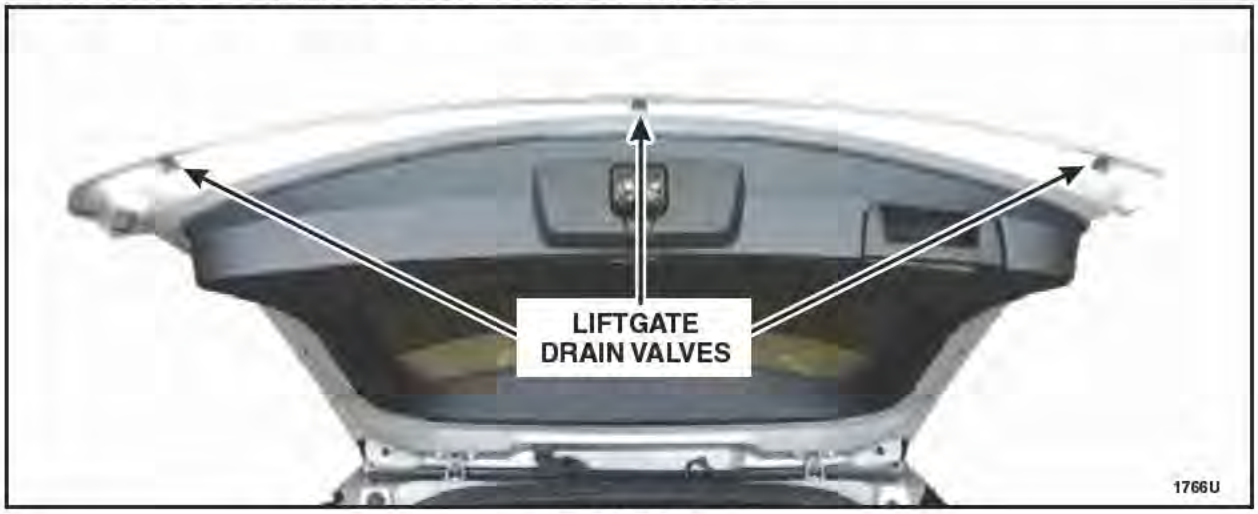

FIGURE 1

2. Apply a drop of Motorcraft® Instant Gel Adhesive TA-19-C or equivalent near the retention tab as shown. Install the *new* liftgate drain valves and hold the part in place for the period of time listed in the instructions on the package to allow the adhesive time to set. See Figure 2.

FIGURE 2

HVAC Module Reprogramming

1. Reprogram the HVAC module using Integrated Diagnostic Software (IDS) release 107.04 or higher.

Important Information for Module Programming

NOTE: When programming or reprogramming a module, use the following basic checks to ensure programming completes without errors.

- Make sure the 12V battery is fully charged before carrying out the programming steps and connect IDS/scan tool to a power source.
- Inspect Vehicle Communication Module (VCM) and cables for any damage. Make sure scan tool connections are not interrupted during programming.
- A hardwired connection is strongly recommended.
- Turn off all unnecessary accessories (radio, heated/cooled seats, headlamps, interior lamps, HVAC system, etc.) and close doors.
- Disconnect/depower any aftermarket accessories (remote start, alarm, power inverter, CB radio, etc.).
- Follow all scan tool on-screen instructions carefully.
- Disable IDS/scan tool sleep mode, screensaver, hibernation modes.
- Create all sessions key on engine off (KOEO). Starting the vehicle before creating a session will cause errors within the programming inhale process.

Recovering a module when programming has resulted in a blank module: NEVER DELETE THE ORIGINAL SESSION!

a. Obtain the original IDS that was used when the programming error occurred during module reprogramming (MR) or programmable module installation (PMI).

b. Disconnect the VCM from the data link connector (DLC) and the IDS.

c. Reconnect the VCM to IDS and then connect to the DLC. Once reconnected, the VCM icon should appear in the corner of the IDS screen. If it does not, troubleshoot the IDS to VCM connection.

d. Locate the original vehicle session when programming failed. This should be the last session used in most cases. If not, use the session created on the date that the programming failed.

NOTE: If the original session is not listed in the previous session list, click the Recycle Bin icon at the lower right of the previous session screen. This loads any deleted sessions and allows you to look through them. Double-click the session to restore it.

e. Once the session is loaded, the failed process should resume automatically.

f. If programming does not resume automatically, proceed to the Module Programming menu and select the previously attempted process, PMI or MR.

g. Follow all on-screen prompts/instructions.

h. The last screen on the IDS may list additional steps required to complete the programming process. Make sure all applicable steps listed on the screen are followed in order.

EA17-002

FORD

9/30/2019

APPENDIX H

TECHNICAL SERVICE BULLETINS

TBS SSM

SSM 22244

Article Number: 22244

Article Type: S

Author: SBUELOW

Global Concern Number: 074-2012-0001

Market(s):

Area Code	Geo Sales Area	Date of Activation	Date of Deactivation
NA	***	03/02/2012	04/10/2012
WD	***	03/02/2012	04/10/2012

Title:

2012-2013 EXPLORER FOUL ODOR FROM HVAC

Text:

SOME 2012 - 2013 EXPLORER VEHICLES EQUIPPED WITH THE 3.5L ENGINE MAY EXHIBIT A FOUL OR DECAY TYPE ODOR COMING FROM THE HEATER-A/C SYSTEM INTERMITTENTLY AFTER COMING TO A STOP WITH A HOT ENGINE AND THE RECIRCULATION DOOR IN THE FRESH AIR POSITION. THE ODOR MAY ALSO BE NOTICEABLE UNDER THE HOOD. ENGINEERING IS AWARE OF THIS ISSUE AND IT IS BEING INVESTIGATED. PLEASE CONTINUE TO SUBMIT VEHICLE REPORTS FOR THIS CONCERN. DO NOT REPLACE ANY COMPONENTS AT THIS TIME. CONTINUE TO MONITOR OASIS FOR UPDATES.

Vehicles:

2012-2013 EXPLORER 4DR (00134)

Symptom Code:

200000	ELECTRICAL
201000	ELECTRICAL LIGHTING SYSTEMS
203000	ELECTRICAL BASIC ELECTRICAL
203100	ELECTRICAL CHARGING SYSTEM
203200	ELECTRICAL WIRING-GENERAL
205000	ELECTRICAL ACCESSORIES
208000	ELECTRICAL CLIMATE CONTROL SYSTEMS
208999	ELECTRICAL OTHER CLIMATE CONTROL CONCERNS
400000	ENGINE
402000	ENGINE COOLING SYSTEM CONCERNS
403000	ENGINE EXHAUST SYSTEM CONCERNS
499000	ENGINE BASIC ENGINE

Global Customer Symptom Codes:

Category	Q1	Q2	Q3	Full Code
Comfort & Entertainment				1*****
Comfort & Entertainment	Interior Odor			114***
Comfort & Entertainment	Interior Odor	Musty/Organic		1141**
Comfort & Entertainment	Interior Odor	Musty/Organic	Always	114102
Comfort & Entertainment	Interior Odor	Musty/Organic	Intermittent	114139
Comfort & Entertainment	Interior Odor	Chemical		1142**
Comfort & Entertainment	Interior Odor	Chemical	Always	114202
Comfort & Entertainment	Interior Odor	Chemical	Intermittent	114239
Start/Run/Move				4*****
Start/Run/Move	Odor			447***
Start/Run/Move	Odor	Chemical		4471**
Start/Run/Move	Odor	Chemical	Intermittent	447139
Safe & Secure				8*****
Safe & Secure	Smoke/Odor			889***
Safe & Secure	Smoke/Odor	Underhood		8891**
Safe & Secure	Smoke/Odor	Underhood	Hot	889134

Safe & Secure	Smoke/Odor	Passenger Area		8892**
Safe & Secure	Smoke/Odor	Passenger Area	Hot	889234

Audit Comments:

Area Code	Geo Sales Area	Comment	Old Date of Deactivation	New Date of Deactivation	CDSID
NA	***	DEACTIVATING PER STEVE BUELOW	09/02/2012	04/10/2012	GSMITH
WD	***	DEACTIVATING PER STEVE BUELOW	09/02/2012	04/10/2012	GSMITH

EA17-002

FORD

9/30/2019

APPENDIX H

TECHNICAL SERVICE BULLETINS

TBS SSM

SSM 22386

Article Number: 22386

Article Type: S

Author: SBUELOW

Global Concern Number: 074-2012-0001

Market(s):

Area Code	Geo Sales Area	Date of Activation	Date of Deactivation
NA	***	06/06/2012	08/13/2012
WD	***	06/06/2012	08/13/2012

Title:

2012-2013 EXPLORER FOUL ODOR FROM HVAC

Text:

SOME 2012 - 2013 EXPLORER VEHICLES EQUIPPED WITH THE 3.5L ENGINE MAY EXHIBIT A FOUL OR DECAY TYPE ODOR COMING FROM THE HEATER-A/C SYSTEM INTERMITTENTLY AFTER COMING TO A STOP WITH A HOT ENGINE AND THE RECIRCULATION DOOR IN THE FRESH AIR POSITION. THE ODOR MAY ALSO BE NOTICEABLE UNDER THE HOOD. ENGINEERING IS AWARE OF THIS ISSUE AND A FIX SHOULD BE AVAIILABLE IN THE 3RD QUARTER. PLEASE CONTINUETO SUBMIT VEHICLE REPORTS FOR THIS CONCERN. DO NOT REPLACE ANY COMPONENTS AT THIS TIME. CONTINUE TO MONITOR OASIS FOR UPDATES.

Vehicles:

2012-2013 EXPLORER 4DR (00134)

Symptom Code:

200000	ELECTRICAL
201000	ELECTRICAL LIGHTING SYSTEMS
203000	ELECTRICAL BASIC ELECTRICAL
203100	ELECTRICAL CHARGING SYSTEM
203200	ELECTRICAL WIRING-GENERAL
205000	ELECTRICAL ACCESSORIES
208000	ELECTRICAL CLIMATE CONTROL SYSTEMS
208999	ELECTRICAL OTHER CLIMATE CONTROL CONCERNS
400000	ENGINE
402000	ENGINE COOLING SYSTEM CONCERNS
403000	ENGINE EXHAUST SYSTEM CONCERNS
499000	ENGINE BASIC ENGINE

Global Customer Symptom Codes:

Category	Q1	Q2	Q3	Full Code
Comfort & Entertainment				1*****
Comfort & Entertainment	Interior Odor			114***
Comfort & Entertainment	Interior Odor	Musty/Organic		1141**
Comfort & Entertainment	Interior Odor	Musty/Organic	Always	114102
Comfort & Entertainment	Interior Odor	Musty/Organic	Intermittent	114139
Comfort & Entertainment	Interior Odor	Chemical		1142**
Comfort & Entertainment	Interior Odor	Chemical	Always	114202
Comfort & Entertainment	Interior Odor	Chemical	Intermittent	114239
Start/Run/Move				4*****
Start/Run/Move	Odor			447***
Start/Run/Move	Odor	Chemical		4471**
Start/Run/Move	Odor	Chemical	Intermittent	447139
Safe & Secure				8*****
Safe & Secure	Smoke/Odor			889***
Safe & Secure	Smoke/Odor	Underhood		8891**
Safe & Secure	Smoke/Odor	Underhood	Hot	889134

Safe & Secure	Smoke/Odor	Passenger Area		8892**
Safe & Secure	Smoke/Odor	Passenger Area	Hot	889234

Audit Comments:

Area Code	Geo Sales Area	Comment	Old Date of Deactivation	New Date of Deactivation	CDSID
NA	***	THIS MESSAGE WAS SUPERCEDED BY 12-08-08	12/06/2012	08/13/2012	GSMITH53
WD	***	THIS MESSAGE WAS SUPERCEDED BY 12-08-08	12/06/2012	08/13/2012	GSMITH53

EA17-002

FORD

9/30/2019

APPENDIX H

TECHNICAL SERVICE BULLETINS

TBS SSM

TSB 12-12-04

EXPLORER EXHAUST ODOR IN VEHICLE | TSB 12-12-4

FORD:
2011-2013 Explorer

ISSUE
Some 2011-2013 Explorer vehicles may exhibit an exhaust odor in the vehicle with the auxiliary climate control system on. Customers may indicate the odor smells like sulfur.

ACTION
Follow the Service Procedure steps to correct the condition.

SERVICE PROCEDURE

1. Remove the rear bumper cover. Refer to Workshop Manual (WSM), Section 501-19.
2. Replace the left side rear air extractor. (Figure 1)

Figure 1 - Article 12-12-4

3. Open the liftgate and install a new drain valve in each of the two (2) drain holes on the left and right side of the liftgate. (Figure 2)

Figure 2 - Article 12-12-4

4. Raise vehicle on hoist. Refer to WSM, Section 100-02.
5. Lower and support rear section of the exhaust system.
6. Clean areas on underside of vehicle where seam sealer will be applied. (Figures 3-5)

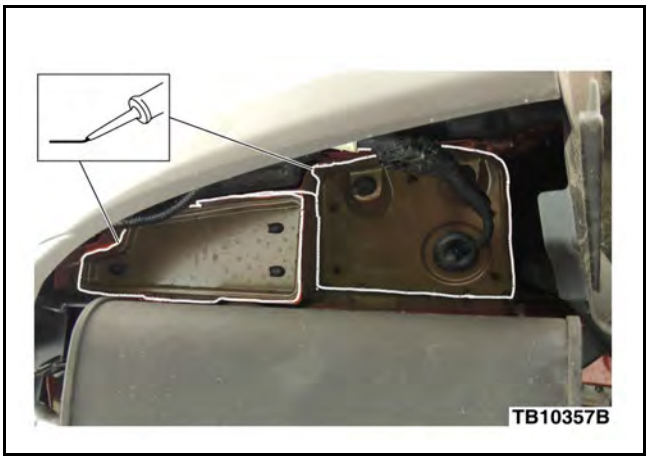

Figure 3 - Article 12-12-4

Figure 4 - Article 12-12-4

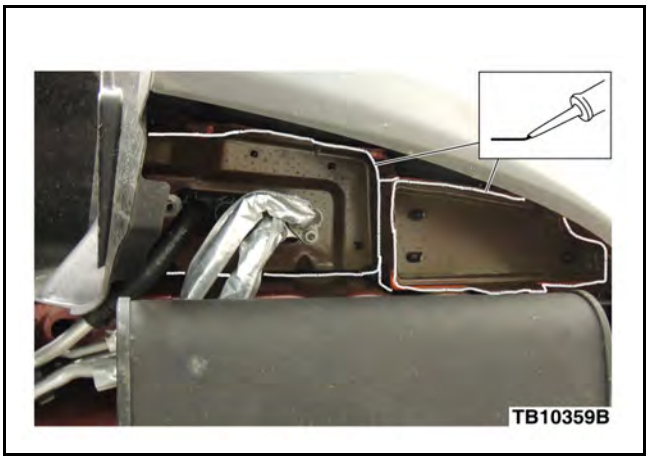

Figure 5 - Article 12-12-4

7. Cover exhaust system and auxiliary climate control drain.
8. Apply generous amount of Motorcraft® Seam Sealer to rear horizontal sheet metal lap joints on left and right sides of the vehicle, and the rear sheet metal overlap flange across the rear of the vehicle. (Figures 3-5)
9. Spray generous amount of 3M™ Rubberized Undercoating around auxiliary air conditioning lines and seam sealer areas. (Figure 6)

Figure 6 - Article 12-12-4

10. Install the rear exhaust system.
11. Install rear bumper cover. Refer to WSM, Section 501-19
12. Install the left hand and right hand rear fender mouldings. Refer to WSM, Section 501-08.
    a. Apply masking tape around the outer edge of the rear fender mouldings to protect the vehicle from damage.

Obtain Parts Locally	
Part Number	**Part Name**
08882	3M™ Rubberized Undercoating™

PART NUMBER	PART NAME
BB5Z-61280B62-A	Dual Rate Air Extractor
BB5Z-7829164-AA	Wheel Lip Moulding Right Hand
BB5Z-7829165-AA	Wheel Lip Moulding Left Hand
4M8Z-54280B62-A	Valve Assembly Auto Drain
TA-2	Motorcraft® Seam sealer

WARRANTY STATUS: Eligible Under Provisions Of New Vehicle Limited Warranty Coverage Warranty/ESP coverage limits/policies/prior approvals are not altered by a TSB. Warranty/ESP coverage limits are determined by the identified causal part and verified using the OASIS part coverage tool.

OPERATION	DESCRIPTION	TIME
121204A	2011-2013 Explorer: Seal Body Includes Time To Replace Air Extractor Both Rear Fender Mouldings Install Liftgate Drain Valves (Do Not Use With Any Other Labor Operations)	1.9 Hrs.

DEALER CODING

BASIC PART NO.	CONDITION CODE
54280B62	07

EA17-002

FORD

9/30/2019

APPENDIX H

TECHNICAL SERVICE BULLETINS

TBS SSM

TSB 14-0130

EXHAUST ODOR IN VEHICLE	TSB 14-0130

FORD:

2011-2015 Explorer

This article supersedes TSB **12-12-4** to update the vehicle model years and Service Procedure.

ISSUE

Some 2011-2015 Explorer vehicles may exhibit an exhaust odor in the vehicle with the auxiliary climate control system on. Customers may indicate the odor smells like sulfur.

ACTION

Follow the Service Procedure steps to correct the condition.

SERVICE PROCEDURE

1. Reprogram the Heating Ventilation Air Conditioning (HVAC) module to the latest calibration using IDS release 91.02 or higher. Calibration files may also be obtained at www.motorcraftservice.com.
   a. When reprogramming the HVAC, IDS will have additional questions that require a yes response to reprogram the module.
2. Remove the rear bumper cover. Refer to Workshop Manual (WSM), Section 501-19.
3. Replace the left side rear air extractor. (Figure 1)

Figure 1 - Article 14-0130

4. Install the rear bumper cover. Refer to WSM, Section 501-19.
   a. Apply masking tape around the outer edge of the rear fender mouldings to protect the vehicle from damage.
5. Open the liftgate and inspect for the presence of drain valves in the two (2) drain holes on the left and right side of the liftgate. Are the drain valves present? (Figure 2)
   a. Yes - no further action is required. Repair is complete.
   b. No - proceed to Step 6.
6. Install a new drain valve in each of the two (2) drain holes on the left and right side of the liftgate. (Figure 2)

Figure 2 - Article 14-0130

7. Raise the vehicle on hoist. Refer to WSM, Section 100-02.
8. Lower and support the rear section of the exhaust system.
9. Clean the areas on the underside of the vehicle where the seam sealer will be applied. (Figures 3-5)

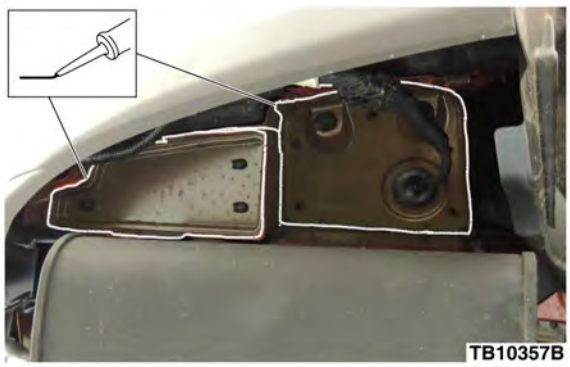

Figure 3 - Article 14-0130

Figure 4 - Article 14-0130

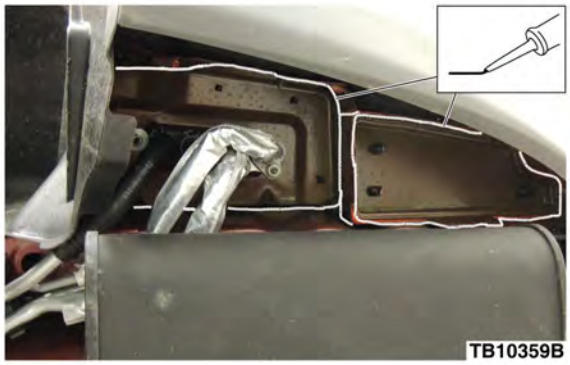

Figure 5 - Article 14-0130

10. Cover the exhaust system and auxiliary climate control drain.
11. Apply a generous amount of Motorcraft® Seam Sealer to rear horizontal sheet metal lap joints on left and right sides of the vehicle, and the rear sheet metal overlap flange across the rear of the vehicle. (Figures 3-5)
12. Spray a generous amount of 3M™ Rubberized Undercoating around the auxiliary air conditioning lines and seam sealer areas. (Figure 6)

Figure 6 - Article 14-0130

13. Install the rear exhaust system.

Obtain Parts Locally	
Part Number	Part Description

(Continued)

08882	3M™ Rubberized Undercoating

PART NUMBER	PART NAME
BB5Z-61280B62-B	Dual Rate Air Extractor
BB5Z-7829164-AA	Wheel Lip Moulding Right Hand
BB5Z-7829165-AA	Wheel lip Moulding Left Hand
4M8Z-54280B62-A	Valve Assembly Auto Drain
TA-2	Motorcraft® Seam Sealer

OPERATION	DESCRIPTION	TIME
140130A	2011-2015 Explorer: Reprogram The HVAC Module, Replace Air Extractors And Both Rear Fender Mouldings (Do Not Use With Any Other Labor Operations)	1.3 Hrs.
140130B	2011-2015 Explorer: Reprogram The HVAC Module, Replace Air Extractors Both Rear Fender Mouldings, Seal The Body And Install Liftgate Drain Valves (Do Not Use With Any Other Labor Operations)	2.0 Hrs.

WARRANTY STATUS:
Eligible Under Provisions Of New Vehicle Limited Warranty Coverage
Warranty/ESP coverage limits/policies/prior approvals are not altered by a TSB. Warranty/ESP coverage limits are determined by the identified causal part and verified using the OASIS part coverage tool.

DEALER CODING

BASIC PART NO.	CONDITION CODE
61280B62	07

EA17-002

FORD

9/30/2019

APPENDIX H

TECHNICAL SERVICE BULLETINS

TBS SSM

TSB16-0165

EXHAUST ODOR IN VEHICLE	TSB 16-0165

FORD:

2011-2015 Explorer

This article supersedes TSB **14-0130** to update the Issue Statement, Action Statement, Service Procedure and Part List.

ISSUE

Some 2011-2015 Explorer vehicles may exhibit an exhaust odor in the vehicle with the auxiliary climate control system on. Customers may indicate the odor smells like sulfur, or that exhaust odors are entering the vehicle cabin. This condition may be worsened when the climate control system is in recirculate mode and the vehicle is heavily accelerated for an extended period. Whether and to what extent any customer or occupant of a 2011-2015 Explorer vehicle experiences the exhaust odor will be affected by driving habits, weather and individual sensitivities.

ACTION

Follow each and every step of the Service Procedure in procedure 1 to improve the condition.

SERVICE PROCEDURES

Note: The Service Procedure consists of 2 separate repair routines. Most vehicles will not require the second procedure.

Procedure 2 does not apply to vehicles equipped with the 2.0L Gasoline Turbocharged Direct Injection (GTDI) and 3.5L GTDI engines.

Note: The body sealing steps in this procedure are critical elements in helping to manage subjective odor concerns.

1. Is the customer returning with the exhaust odor complaint after Procedure 1 was completed?
    a. No - proceed to Procedure 1.
    b. Yes - Is the vehicle equipped with the 3.5L Twin Independent Variable Cam Timing (Ti-VCT) engine?
        (1) Yes - proceed to Procedure 2.
        (2) No - the procedure does not apply. Continue with normal diagnostics.

PROCEDURE 1

1. Reprogram the heating ventilation air conditioning (HVAC) module to the latest calibration using IDS release 101.03 or higher. Make sure you are connected to the internet when entering module programming to obtain the latest updates. Calibration files may also be obtained at www.motorcraftservice.com.
    a. When reprogramming the HVAC, IDS will have additional questions which will require a yes response to reprogram the module.
2. Remove the rear bumper cover. Refer to Workshop Manual (WSM), Section 501-19.
3. Remove the left and right tail lamps. Refer to WSM, Section 417-01.
4. Remove the wheel lip mouldings. Refer to WSM, Section 501-08.
5. Open the liftgate and inspect for presence of drain valves in the two (2) drain holes on the left and right side of the liftgate. Are the drain valves present? (Figure 1)

Figure 1 - Article 16-0165

a. Yes - proceed to Step 7.

b. No - proceed to Step 6.

6. Install a new drain valve in each of the two (2) drain holes on the left and right side of the liftgate. (Figure 1)

7. Inspect the liftgate seal for damage and proper fit/contact pattern. Adjusting the rear liftgate striker so that the rear hatch seals tighter to the liftgate seal is important. This can be done by loosening the striker and moving it to increase the liftgate sealing pressure.

8. Inspect the left and right side air extractors for proper fit to the body and operation/sealing of the rubber flaps.

   a. Replace the air extractor if it is warped or damaged or flaps do not lay flush to their sealing surface. (Figure 2)

Figure 2 - Article 16-0165

9. Inspect and verify proper installation of the wire harness grommets and body plugs in the liftgate opening, quarter panels under the tail lamps, license plate and bumper cover and the rear underbody area.
10. Using masking tape, seal the left and right air extractor vents and the rear auxiliary climate control drain tube.
    a. Make sure to tape off only the vents and not the area around the air extractor where it seals to the body of the vehicle.
11. Start the vehicle and set the front climate control to fresh air mode and front blower speed to HI. Turn the rear climate control off.
12. Make sure all windows are up and all doors are closed in order to pressurize the cabin.
13. Use soapy water (dish soap or bubble bath works best-not bar soap) in a spray bottle to help locate air leaks.
    a. Spray the underbody seams, rubber grommets, rear wheel well seams, tail lamp seams, liftgate seals, quarter glass seals, license plate area, liftgate hinge area, auxiliary a/c seals and the area where air extractors mount in the body.
14. Air leaks will be identified by the presence of air bubbles. Mark the location of any leaks.
15. Turn off the a/c and shut the vehicle off.
16. Clean and dry all marked areas and seal using Motorcraft® Seam Sealer.
17. Raise the vehicle on a hoist. Refer to WSM, Section 100-02.
18. Lower and support the rear section of the exhaust system.
19. Clean areas on the underside of the vehicle where seam sealer will be applied. (Figures 3-5)

Figure 3 - Article 16-0165

Figure 4 - Article 16-0165

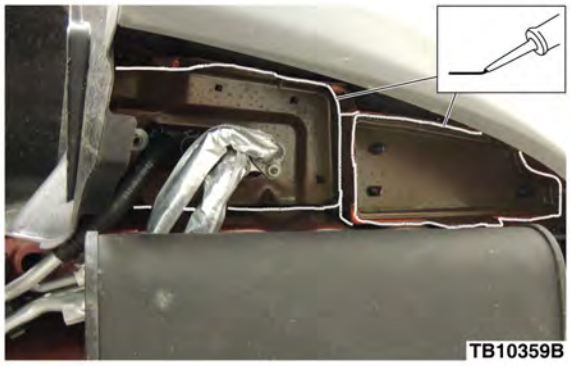

Figure 5 - Article 16-0165

20. Cover the exhaust system and verify the auxiliary climate control drain tape is still in place.
21. Apply a generous amount of Motorcraft® Seam Sealer to the following areas:
    a. The rear horizontal sheet metal lap joints on left and right sides of the vehicle.
    b. The rear sheet metal overlap flange across the rear of the vehicle. (Figures 3-5)
22. Spray a generous amount of 3M™ Rubberized Undercoating around the auxiliary air conditioning lines and seam sealer areas. (Figure 6)

Figure 6 - Article 16-0165

23. Remove the tape from the air extractors and auxiliary climate control drain.
24. Install the rear exhaust system.
25. Install the wheel lip mouldings. Refer to WSM, Section 501-08.
26. Install the rear bumper cover. Refer to WSM, Section 501-19.
    a. Apply masking tape around the outer edge of the rear fender mouldings to protect the vehicle from damage.
27. Install the tail lamps. Refer to WSM, Section 417-01.
28. Is the vehicle equipped with the 3.5L Ti-VCT engine?
    a. Yes - return the vehicle to the customer for evaluation, close out the repair order and submit the claim for payment.
        (1) Procedure 2 can be performed if the customer returns with the same complaint.
    b. No - return the vehicle to the customer, close out the repair order and submit claim for payment.
        (1) Procedure 2 does not apply to the vehicle.

PROCEDURE 2

1. Click here to access Guided Routine. Does the vehicle meet necessary conditions?
   a. Yes - proceed to Step 2.
   b. No - return vehicle to the customer. No additional repairs are available.
2. Inform the customer of the redesigned exhaust tips and that appearance will remain the same but the exhaust will exit the tip from bottom. Upon acceptance, replace the muffler assembly with the updated part containing the down turned exhaust tips. (Figures 7-8)

Figure 7 - Article 16-0165

Figure 8 - Article 16-0165

3. Return the vehicle to customer.

Obtain Locally	
Part Number	Part Description
08883	3M™ Rubberized Undercoating

PART NUMBER	PART NAME
BB5Z-61280B62-B	Dual Rate Air Extractor
BB5Z-7829164-AA	Wheel Lip Moulding Passenger Side
BB5Z-7829165-AA	Wheel Lip Moulding Driver Side
4M8Z-54280B62-A	Valve Assembly Auto Drain
TA-2-B	Motorcraft® Seam Sealer
EB5Z-5230- A	Muffler Assembly

OPERATION	DESCRIPTION	TIME
160165A	2011-2015 Explorer 3.5L Ti-VCT: Perform Web Assessment, Obtain Repair Verification Code (RVC) And Replace The Muffler Assembly Following Procedure 2 (Do Not Use With Any Labor Operations Outside Of This Article)	0.7 Hr.
MT160165	2011-2015 Explorer: Reseal The Body Following Procedure 1 Includes Time To Reprogram The HVAC Module (Do Not Use With Any Labor Operations Outside Of This Article)	Actual Time

WARRANTY STATUS:
Eligible Under Provisions Of New Vehicle Limited Warranty Coverage
Warranty/ESP coverage limits/policies/prior approvals are not altered by a TSB. Warranty/ESP coverage limits are determined by the identified causal part and verified using the OASIS part coverage tool.

EA17-002

FORD

9/30/2019

APPENDIX H

TECHNICAL SERVICE BULLETINS

TBS SSM

TSB16-0166

EXHAUST ODOR IN VEHICLE	TSB 16-0166

FORD:

2011-2015 Explorer

This article supersedes TSB **16-0165** to add a causal basic part number and condition code.

ISSUE

Some 2011-2015 Explorer vehicles may exhibit an exhaust odor in the vehicle with the auxiliary climate control system on. Customers may indicate the odor smells like sulfur, or that exhaust odors are entering the vehicle cabin. This condition may be worsened when the climate control system is in recirculate mode and the vehicle is heavily accelerated for an extended period. Whether and to what extent any customer or occupant of a 2011-2015 Explorer vehicle experiences the exhaust odor will be affected by driving habits, weather and individual sensitivities.

ACTION

Follow each and every step of the Service Procedure in procedure 1 to improve the condition.

SERVICE PROCEDURES

Note: The Service Procedure consists of 2 separate repair routines. Most vehicles will not require the second procedure.

Procedure 2 does not apply to vehicles equipped with the 2.0L Gasoline Turbocharged Direct Injection (GTDI) and 3.5L GTDI engines.

Note: The body sealing steps in this procedure are critical elements in helping to manage subjective odor concerns.

1. Is the customer returning with the exhaust odor complaint after Procedure 1 was completed?
    a. No - proceed to Procedure 1.
    b. Yes - Is the vehicle equipped with the 3.5L Twin Independent Variable Cam Timing (Ti-VCT) engine?
        (1) Yes - proceed to Procedure 2.
        (2) No - the procedure does not apply. Continue with normal diagnostics.

PROCEDURE 1

1. Reprogram the heating ventilation air conditioning (HVAC) module to the latest calibration using IDS release 101.03 or higher. Make sure you are connected to the internet when entering module programming to obtain the latest updates. Calibration files may also be obtained at www.motorcraftservice.com.
    a. When reprogramming the HVAC, IDS will have additional questions which will require a yes response to reprogram the module.
2. Remove the rear bumper cover. Refer to Workshop Manual (WSM), Section 501-19.
3. Remove the left and right tail lamps. Refer to WSM, Section 417-01.
4. Remove the wheel lip mouldings. Refer to WSM, Section 501-08.
5. Open the liftgate and inspect for presence of drain valves in the two (2) drain holes on the left and right side of the liftgate. Are the drain valves present? (Figure 1)

 Online Publication Date December 15, 2016

Figure 1 - Article 16-0166

a. Yes - proceed to Step 7.

b. No - proceed to Step 6.

6. Install a new drain valve in each of the two (2) drain holes on the left and right side of the liftgate. (Figure 1)

7. Inspect the liftgate seal for damage and proper fit/contact pattern. Adjusting the rear liftgate striker so that the rear hatch seals tighter to the liftgate seal is important. This can be done by loosening the striker and moving it to increase the liftgate sealing pressure.

8. Inspect the left and right side air extractors for proper fit to the body and operation/sealing of the rubber flaps.

   a. Replace the air extractor if it is warped or damaged or flaps do not lay flush to their sealing surface. (Figure 2)

Figure 2 - Article 16-0166

9. Inspect and verify proper installation of the wire harness grommets and body plugs in the liftgate opening, quarter panels under the tail lamps, license plate and bumper cover and the rear underbody area.
10. Using masking tape, seal the left and right air extractor vents and the rear auxiliary climate control drain tube.
    a. Make sure to tape off only the vents and not the area around the air extractor where it seals to the body of the vehicle.
11. Start the vehicle and set the front climate control to fresh air mode and front blower speed to HI. Turn the rear climate control off.
12. Make sure all windows are up and all doors are closed in order to pressurize the cabin.
13. Use soapy water (dish soap or bubble bath works best-not bar soap) in a spray bottle to help locate air leaks.
    a. Spray the underbody seams, rubber grommets, rear wheel well seams, tail lamp seams, liftgate seals, quarter glass seals, license plate area, liftgate hinge area, auxiliary a/c seals and the area where air extractors mount in the body.
14. Air leaks will be identified by the presence of air bubbles. Mark the location of any leaks.
15. Turn off the a/c and shut the vehicle off.
16. Clean and dry all marked areas and seal using Motorcraft® Seam Sealer.
17. Raise the vehicle on a hoist. Refer to WSM, Section 100-02.
18. Lower and support the rear section of the exhaust system.
19. Clean areas on the underside of the vehicle where seam sealer will be applied. (Figures 3-5)

Figure 3 - Article 16-0166

Figure 4 - Article 16-0166

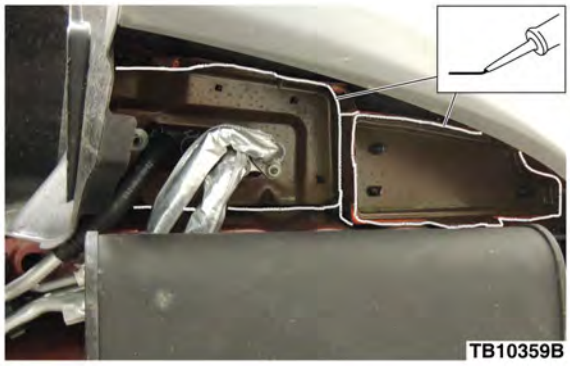

Figure 5 - Article 16-0166

20. Cover the exhaust system and verify the auxiliary climate control drain tape is still in place.
21. Apply a generous amount of Motorcraft® Seam Sealer to the following areas:
    a. The rear horizontal sheet metal lap joints on left and right sides of the vehicle.
    b. The rear sheet metal overlap flange across the rear of the vehicle. (Figures 3-5)
22. Spray a generous amount of 3M™ Rubberized Undercoating around the auxiliary air conditioning lines and seam sealer areas. (Figure 6)

Figure 6 - Article 16-0166

23. Remove the tape from the air extractors and auxiliary climate control drain.
24. Install the rear exhaust system.
25. Install the wheel lip mouldings. Refer to WSM, Section 501-08.
26. Install the rear bumper cover. Refer to WSM, Section 501-19.
    a. Apply masking tape around the outer edge of the rear fender mouldings to protect the vehicle from damage.
27. Install the tail lamps. Refer to WSM, Section 417-01.
28. Is the vehicle equipped with the 3.5L Ti-VCT engine?
    a. Yes - return the vehicle to the customer for evaluation, close out the repair order and submit the claim for payment.
        (1) Procedure 2 can be performed if the customer returns with the same complaint.
    b. No - return the vehicle to the customer, close out the repair order and submit claim for payment.
        (1) Procedure 2 does not apply to the vehicle.

PROCEDURE 2

1. Click here to access Guided Routine. Does the vehicle meet necessary conditions?
   a. Yes - proceed to Step 2.
   b. No - return vehicle to the customer. No additional repairs are available.
2. Inform the customer of the redesigned exhaust tips and that appearance will remain the same but the exhaust will exit the tip from bottom. Upon acceptance, replace the muffler assembly with the updated part containing the down turned exhaust tips. (Figures 7-8)

Figure 7 - Article 16-0166

Figure 8 - Article 16-0166

3. Return the vehicle to customer.

Obtain Locally	
Part Number	Part Description
08883	3M™ Rubberized Undercoating

PART NUMBER	PART NAME
BB5Z-61280B62-B	Dual Rate Air Extractor
BB5Z-7829164-AA	Wheel Lip Moulding Right Side
BB5Z-7829165-AA	Wheel Lip Moulding Left Side
4M8Z-54280B62-A	Valve Assembly Auto Drain
TA-2-B	Motorcraft® Seam Sealer
EB5Z-5230- A	Muffler Assembly

OPERATION	DESCRIPTION	TIME
160166A	2011-2015 Explorer 3.5L Ti-VCT: Perform Web Assessment, Obtain Repair Verification Code (RVC) And Replace The Muffler Assembly Following Procedure 2 (Do Not Use With Any Labor Operations Outside Of This Article)	0.7 Hr.
MT160166	2011-2015 Explorer: Reseal The Body Following Procedure 1 Includes Time To Reprogram The HVAC Module (Do Not Use With Any Labor Operations Outside Of This Article)	Actual Time

WARRANTY STATUS:
Eligible Under Provisions Of New Vehicle Limited Warranty Coverage
Warranty/ESP coverage limits/policies/prior approvals are not altered by a TSB. Warranty/ESP coverage limits are determined by the identified causal part and verified using the OASIS part coverage tool.

DEALER CODING

BASIC PART NO.	CONDITION CODE
61280B62	42