

Stacy L. Balzer Operating Director Service Engineering Operations Ford Customer Service Division Ford Motor Company P. O. Box 1904 Dearborn, Michigan 48121

March 29, 2023

TO: All U.S. Ford and Lincoln Dealers

SUBJECT: NEW VEHICLE DEMONSTRATION / DELIVERY HOLD - Safety Recall 22S22

Certain 2020 Model Year Super Duty Vehicles with a 6.7L Diesel Engine and 10R140

Transmission

Transmission Output Planetary Four Assembly Replacement

REF: NEW VEHICLE DEMONSTRATION / DELIVERY HOLD - Advance Notice -

Safety Recall 22S22 Dated April 19, 2022

AFFECTED VEHICLES

| Vehicle | Model Year | Assembly Plant | Build Dates |
|------------|------------|----------------|--|
| Super Duty | 2020 | Kentucky Truck | October 1, 2019 through September 21, 2020 |
| | | Ohio | October 30, 2019 through July 23, 2020 |

US population of affected vehicles: 23,422. Affected vehicles are identified in OASIS and FSA VIN Lists.

REASON FOR THIS SAFETY RECALL

In some of the affected vehicles, the pinion thrust washer within the 10R140 transmission planetary 4 carrier assembly can disintegrate, causing metallic debris to contaminate the gearset and potentially damage the gear teeth. Metallic debris can subsequently get lodged in the transmission's mechanical park pawl mechanism and prevent the vehicle from achieving or holding park. Inability to achieve or hold park can result in unintended vehicle movement, increasing the risk of a crash.

SERVICE ACTION

Dealers are to replace the P4 Planetary Gearsets in transmissions. Additionally, an inspection of the removed gearset will be required and if broken teeth are found, replace the transmission. This service must be performed on all affected vehicles at no charge to the vehicle owner.

OWNER NOTIFICATION MAILING SCHEDULE

Owner letters are expected to be mailed the week of April 10, 2023. Dealers should repair any affected vehicles that arrive at their dealerships, whether or not the customer has received a letter.

PLEASE NOTE:

Federal law requires dealers to complete this recall service before a new vehicle is delivered to the buyer or lessee. Violation of this requirement by a dealer could result in a civil penalty of up to \$26,315 per vehicle. Correct all vehicles in your new vehicle inventory before delivery.

ATTACHMENTS

Attachment I: Administrative Information

Attachment II: Labor Allowances and Parts Ordering Information

Attachment III: Technical Information

Owner Notification Letters Recall Reimbursement Plan

QUESTIONS & ASSISTANCE

For questions and assistance, contact the Special Service Support Center (SSSC) via the SSSC Web Contact Site. The SSSC Web Contact Site can be accessed through the Professional Technician System (PTS) website using the SSSC link listed at the bottom of the OASIS VIN report screen or listed under the SSSC tab.

Sincerely,

Stacy L. Balzer

Certain 2020 Model Year Super Duty Vehicles with a 6.7L Diesel Engine and 10R140 Transmission Transmission Output Planetary Four Assembly Replacement

OASIS ACTIVATION

OASIS was activated on April 19, 2022.

FSA VIN LISTS ACTIVATION

FSA VIN Lists were available through https://web.fsavinlists.dealerconnection.com on December 20, 2022. Owner names and addresses will be available by April 28, 2023.

NOTE: Your FSA VIN Lists may contain owner names and addresses obtained from motor vehicle registration records. The use of such motor vehicle registration data for any purpose other than in connection with this recall is a violation of law in several states, provinces, and countries. Accordingly, you must limit the use of this listing to the follow-up necessary to complete this recall.

SOLD VEHICLES

- Ford has not issued instructions to stop selling/delivering or driving used vehicles under this safety recall. Owners should contact their dealer for an appointment to have their vehicles remedied as soon as practicable. Owners can continue to safely drive their vehicles if they make sure the parking brake is applied whenever the vehicle is parked.
- Immediately contact any of your affected customers whose vehicles are not on your VIN list but are identified in OASIS. Give the customer a copy of the Owner Notification Letter (when available) and schedule a service date.
- Correct other affected vehicles identified in OASIS which are brought to your dealership.
- Dealers are to prioritize repairs of customer vehicles over repairs of new and used vehicle inventory.

STOCK VEHICLES

- Correct all affected units in your new vehicle inventory before delivery.
- Use OASIS to identify any affected vehicles in your used vehicle inventory.

DEALER-OPERATED RENTAL VEHICLES

The Fixing America's Surface Transportation (FAST) Act law effective June 2016 prohibits a rental company from selling, renting or leasing vehicles subject to a safety or compliance recall. Please consult your legal counsel for legal advice.

TITLE BRANDED / SALVAGED VEHICLES

Affected title branded and salvaged vehicles are eligible for this recall.

OWNER REFUNDS

- This safety recall must still be performed, even if the owner has paid for a previous repair. Claiming a refund will not close the recall on the vehicle.
- Ford Motor Company is offering a refund for owner-paid repairs covered by this recall if the repair was performed prior to the date indicated in the reimbursement plan, which is posted with this bulletin. Owners are directed to seek reimbursement through authorized dealers or, at their option, directly through Ford Motor Company at P.O. Box 6251, Dearborn, MI 48121-6251.
- Dealers are also pre-approved to refund owner-paid emergency repairs that were performed away from an authorized servicing dealer after the end date specified in the reimbursement plan. Non-covered repairs, or those judged by Ford to be excessive, will not be reimbursed.
- Refunds will only be provided for the cost associated with transmission output planetary four assembly replacement.

PICK-UP AND DELIVERY

All customers affected by this program have the option of complimentary Vehicle Pick-up & Delivery service (at participating dealers). Refer to EFC12071, 2023 Remote Experience Program, Pickup & Delivery (PDL) Offset section for additional details.

RENTAL VEHICLES

For planetary gearset replacement, dealers are pre-approved for up to 3 days for a rental vehicle. For vehicles that require transmission replacement, dealers are pre-approved for up to 5 days for a rental vehicle. Follow Extended Service Plan (ESP) guidelines for dollar amounts. Rentals will only be reimbursed for the days the vehicle is at the dealership for part replacement. Prior approval for more rental days is required from the SSSC. Contact the SSSC via the SSSC Web Contact Site for consideration and approval if appropriate.

Certain 2020 Model Year Super Duty Vehicles with a 6.7L Diesel Engine and 10R140 Transmission
Transmission Output Planetary Four Assembly Replacement

ADDITIONAL REPAIR (LABOR TIME AND/OR PARTS)

Additional repairs identified as necessary to complete the FSA should be managed as follows:

- For related damage and access time requirements, refer to the Warranty and Policy Manual / Section 6 – Ford & Lincoln Program Policies / General Information & Special Circumstances for FSAs / Related Damage.
- For vehicles within new vehicle bumper-to-bumper warranty coverage, no SSSC approval is required, although related damage must be on a separate repair line with the "Related Damage" radio button checked.
 - o Ford vehicles 3 years or 36,000 miles
- For vehicles outside new vehicle bumper-to-bumper warranty coverage, submit an Approval Request to the SSSC Web Contact Site prior to completing the repair.

CLAIMS PREPARATION AND SUBMISSION

- Claim Entry: Enter claims using Dealer Management System (DMS) or One Warranty Solution (OWS) online.
 - When entering claims, select claim type 31: Field Service Action. The FSA number 22S22 is the sub code.
 - For additional claims preparation and submission information, refer to the Recall and Customer Satisfaction Program (CSP) Repairs in the OWS User Guide.
- Related Damage/Additional labor and/or parts: Must be claimed as Related Damage on a separate repair line from the FSA with same claim type and sub code as described in Claim Entry above.

IMPORTANT: Click the Related Damage Indicator radio button.

- Rentals: For rental vehicle claiming, follow Extended Service Plan (ESP) guidelines for dollar amounts. Enter the total amount of the rental expense under Miscellaneous Expense code RENTAL.
- **Refunds:** Submit refunds on a separate repair line.

- Program Code: 22S22
- Misc. Expense: ADMIN
- Misc. Expense: 0.2 Hrs.

 Multiple refunds should be submitted on one repair line and the invoice details for each repair should be detailed in the comments section of the claim.

Certain 2020 Model Year Super Duty Vehicles with a 6.7L Diesel Engine and 10R140 Transmission Transmission Output Planetary Four Assembly Replacement

LABOR ALLOWANCES

| Description | Labor Operation | Labor Time | | | | | |
|---|--------------------|------------|--|--|--|--|--|
| F-250/350 4x2 6.7L | | | | | | | |
| Inspect: PASS - Replace P4 carrier assembly (Includes adaptive drive cycle) | 22S22B | 9.0 Hours | | | | | |
| Inspect: FAIL - Re-assemble and replace transmission (Includes adaptive drive cycle) Note: SSSC Approval Required | 22S22C | 8.8 Hours | | | | | |
| F-250/350 4x4 6.7 L | T T | | | | | | |
| Inspect: PASS - Replace P4 carrier assembly (Includes adaptive drive cycle) | 22S22D | 10.1 Hours | | | | | |
| Inspect: FAIL - Re-assemble and replace transmission (Includes adaptive drive cycle) Note: SSSC Approval Required | 22S22E | 9.8 Hours | | | | | |
| F-450/550 4x2 6.7L | | | | | | | |
| Inspect: PASS - Replace P4 carrier assembly (Includes adaptive drive cycle) | 22S22F | 9.1 Hours | | | | | |
| Inspect: FAIL - Re-assemble and replace transmission (Includes adaptive drive cycle) Note: SSSC Approval Required | 22S22G | 8.9 Hours | | | | | |
| F-450/550 4x4 6.7L | | | | | | | |
| Inspect: PASS - Replace P4 carrier assembly (Includes adaptive drive cycle) | 22S22H | 10.2 Hours | | | | | |
| Inspect: FAIL - Re-assemble and replace transmission (Includes adaptive drive cycle) Note: SSSC Approval Required | 22S22J | 9.9 Hours | | | | | |
| All Models | | | | | | | |
| Extra time to flush the transmission cooler assembly (replace trans) Only to be used with C, E, G, or J labor operations. | 22S22K | 0.6 Hours | | | | | |
| Time allowed to submit photos of the damaged P4 gearset/teeth to the SSSC and request transmission replacement approval. Only to be used with C, E, G, or J labor operations. NOTE: If any aftermarket equipment is on the vehicle that requires additional labor time, add pics and information to this SSSC request for consideration for extra labor time. | 22S22ZZ | 0.2 Hours | | | | | |

PARTS REQUIREMENTS / ORDERING INFORMATION

Special Program Part Ordering:

To place an order for PC3Z-7060-C submit a Special Program order in the DOW system. **SSSC** contact is not required to order K-Coded parts on this program. More information can be found in EFC 10642.

| Part Number | Description | Order Quantity | Claim Quantity |
|-------------|--|-------------------|-------------------|
| PC3Z-7060-C | Transmission output P4 shaft and gear kit. All vehicles (transmission replacement not required). | | 1 |

NOTE: For additional required parts such as gaskets, fasteners, seals, etc. refer to the Workshop Manual (WSM) procedures and Ford Ecat, with a VIN, for additional parts requirements.

Dealers will be notified via a DOES II communication if circumstances warrant a change in part supply strategy and when open ordering resumes.

Certain 2020 Model Year Super Duty Vehicles with a 6.7L Diesel Engine and 10R140 Transmission
Transmission Output Planetary Four Assembly Replacement

PARTS REQUIREMENTS / ORDERING INFORMATION (SSSC Approval Required)

| Part Number | Description | Order Quantity | Claim Quantity |
|--------------|-----------------------|-------------------|-------------------|
| ****-7000-** | Transmission assembly | 1 if required. | |

NOTE: For additional required parts such as gaskets, fasteners, seals, etc. refer to the WSM procedures and Ford Ecat for additional parts requirements.

To place an order for a transmission assembly, photo submission for prior approval must be submitted in a VIN-specific Approval Request via the SSSC Web Contact Site. Ensure to include a photo of the VIN tag, along with at least one photo clearly showing the damaged P4 pinion gear teeth. An approval code will be provided for claiming the transmission and associated parts upon review.

Less than 1% of the affected vehicle population is expected to require transmission assembly replacement.

DEALER PRICE

For latest prices, refer to DOES II.

HANDLING ALLOWANCE

If transmission replacement is required, an allowance of \$330.00 per repair is being provided unless otherwise notified by the Company or as provided by state law, in addition to the dealer cost of the transmission.

PARTS RETENTION, RETURN, & SCRAPPING

Follow the provisions of the Warranty and Policy Manual, Section 1 - WARRANTY PARTS RETENTION AND RETURN POLICIES. If a replaced part receives a scrap disposition, the part must be scrapped in accordance with all applicable local, state and federal environmental protection and hazardous material regulations. Federal law prohibits selling motor vehicle parts or components that are under safety, compliance, or emissions recall.

EXCESS STOCK RETURN

Excess stock returned for credit must have been purchased from Ford Customer Service Division in accordance with Policy Procedure Bulletin 4000.

REPLACED FSA PARTS INSPECTION AND SIGN OFF

Effective March 1st 2021 all parts replaced as part of an FSA repair with a repair order open date of March 1st 2021 or later must be inspected and signed off on the repair order by a member of your dealers fixed operations management team or an employee the task has been delegated to. If the task is to be delegated to a non-management employee, the employee needs to be someone other than the technician who completed the repair and needs to understand the importance of completing this task consistently and accurately.

- All parts replaced as part of an FSA repair should be returned to the parts department following the Warranty Parts Retention and Return Policies.
- Inspect the replaced parts to verify the FSA repair was completed.
- If the FSA repair is found to be complete, the designated employee signs the repair order line or parts return stamp area (electronic or hand signed) for the FSA repair indicating the parts were inspected and validated to have been replaced.
- After the parts have been inspected, they should be handled based on the guidance in the parts status report in the Online Warranty System (Hold, Return, CORE, Scrap, etc.).
- This process is subject to review during warranty audits for FSA repairs with a repair order open date of March 1st 2021 or later. Any eligible FSA claims requiring parts replacement, found not to have been inspected and signed off during a warranty audit will be subject to chargeback and consideration for enrollment into the Dealer Incomplete Recall Repair Process

Note: Other approvals (electronic or handwritten) for add-on repair lines, dealer owned vehicle repairs, and repeat repairs do not qualify as FSA parts inspection approvals. The post repair FSA parts inspection process (electronic or handwritten) is independent from other warranty approval requirements. The approval by the designated employee implies that the FSA parts were found to be replaced and must be able to be clearly identified on the Repair Order. If multiple FSAs require approval on a single Repair Order, each applicable occurrence will require individual post repair approval by the designated employee.

CERTAIN 2020 MODEL YEAR SUPER DUTY VEHICLES EQUIPPED WITH A 6.7L DIESEL ENGINE AND 10R140 TRANSMISSION — OUTPUT PLANETARY FOUR ASSEMBLY REPLACEMENT

SERVICE PROCEDURE

- 1. Remove the Transmission. Follow the Workshop Manual (WSM) procedures, in Section 307-01B.
- 2. Mount the transmission to the General Equipment: Mounting Stand. See Figure 1.

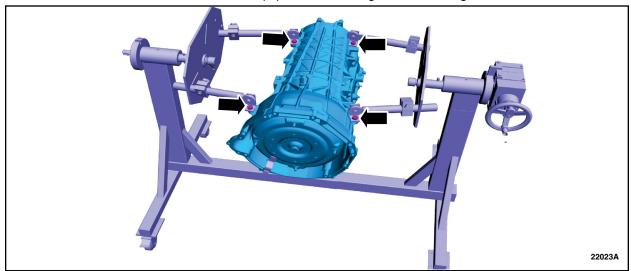


FIGURE 1

3. Rotate the transmission to a vertical position and remove the 12 mm combination wrench and bolt. See Figure 2.

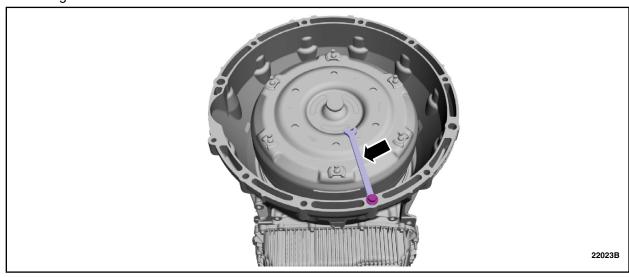


FIGURE 2

4. Using the Special Service Tool: 307-651 Bracket, Pump Remover/Installer and a floor crane, remove the torque converter. See Figure 3.

NOTE: Install the pin in the bottom hole.

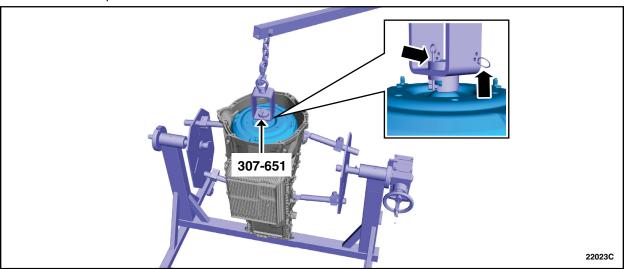


FIGURE 3

- 5. Remove the transmission fluid pan, gasket and filter. Follow the WSM procedures, in Section 307-01B.
- 6. Remove the main control valve body. Follow the WSM procedures, in Section 307-01B.
- 7. Remove the main control manifold seal and the fluid pump gasket. See Figure 4.

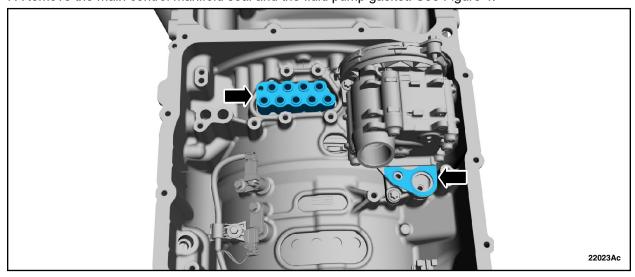


FIGURE 4

8. Clean and inspect the main control manifold seal and the fluid pump gasket for damage. See Figure 5.

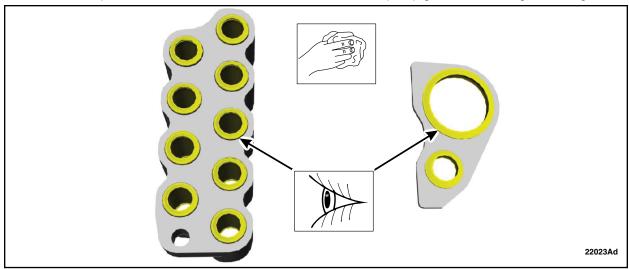


FIGURE 5

9. Unlock and disconnect the Intermediate Speed Sensor A (ISSA), Turbine Speed Sensor (TSS), Intermediate Speed Sensor B (ISSB) and Output Shaft Sensor (OSS). See Figure 6.

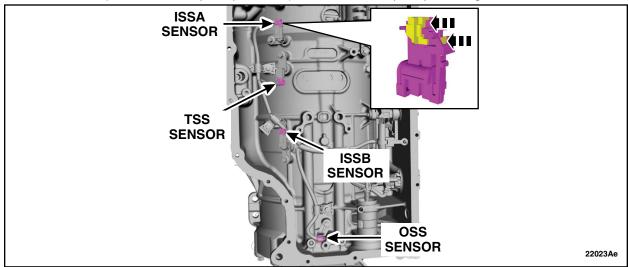


FIGURE 6

10. Remove the bolts and the transmission internal wiring harness. See Figure 7.

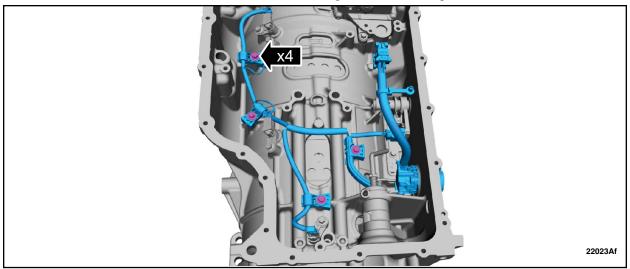


FIGURE 7

11. Remove the ISSA, TSS, ISSB, and OSS speed sensors. See Figure 8

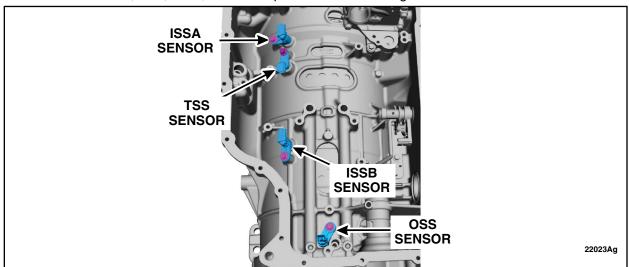


FIGURE 8

12. Remove the bolts and the transmission fluid pump. See Figure 9.

NOTE: Use a 10ep Torx Plus® socket to remove the bolts.

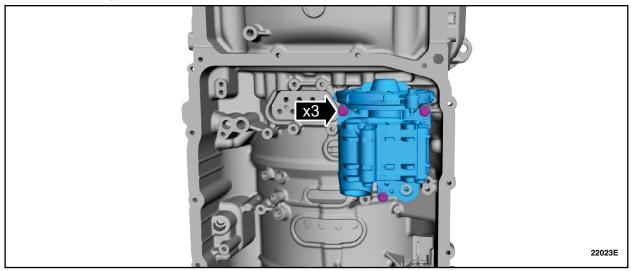


FIGURE 9

13. Remove the transmission fluid pump seal. See Figure 10.

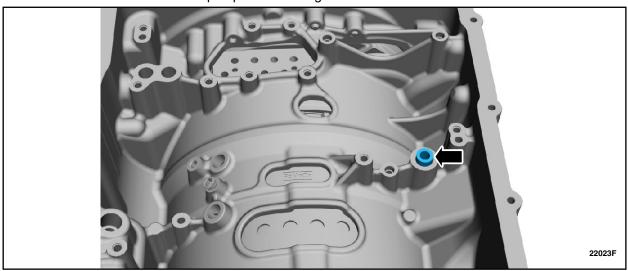


FIGURE 10

NOTE: Vehicles equipped with a fixed flange transmission only.

14. Rotate the manual control lever to Park (P,) and remove the output shaft flange bolt. See Figure 11.

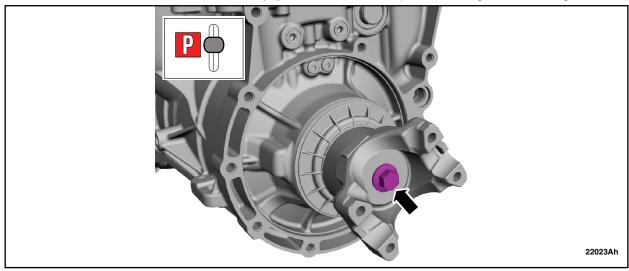


FIGURE 11

NOTE: Vehicles equipped with a fixed flange transmission only.

15. If ink marks are not present, index mark the output shaft flange to the output shaft. See Figure 12.

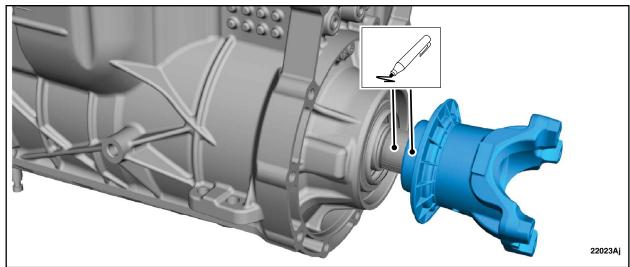


FIGURE 12

NOTE: Vehicles equipped with a fixed flange transmission only.

16. Using the Special Service Tool: 100-001(T50T-100-A) Slide Hammer., 307-309 Remover, Torque Converter Seal, remove and discard the output shaft seal. See Figure 13.

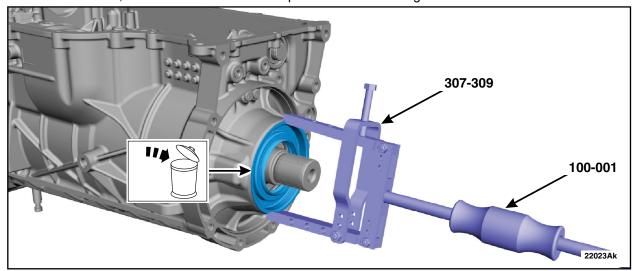


FIGURE 13

NOTE: Vehicles equipped with a fixed flange transmission only.

17. Remove the anti-ting washer. See Figure 14.

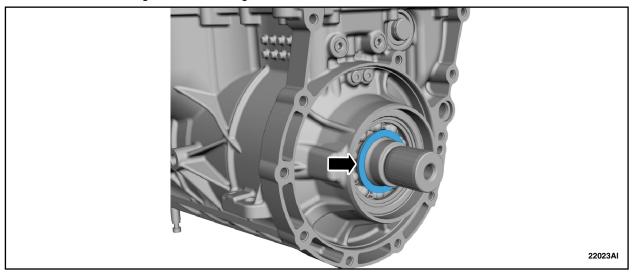


FIGURE 14

NOTE: Vehicles equipped with a Four-Wheel Drive (4WD) transmission only.

18. Using Special Service Tool: 100-001(T50T-100-A) Slide Hammer., 307-309 Remover, Torque Converter Seal, remove and discard the output shaft seal. See Figure 15.

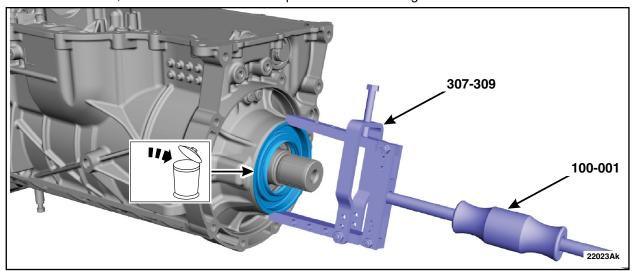


FIGURE 15

19. Remove the front support assembly bolts and discard the front support assembly bolt washers. See Figure 16.



FIGURE 16

20. Use the Special Service Tool: 307-741 Spring Compressor, F Clutch., 307-741-01 Remover, Front Support & Cover to separate the front support assembly from the transmission case and remove the front support assembly. See Figure 17.

NOTE: Install the 307-741-01 Remover, Front Support & Cover special tool with the beveled side down.

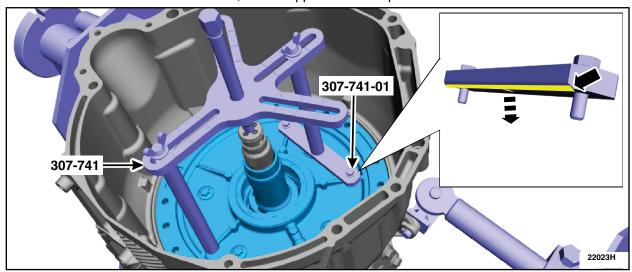


FIGURE 17

21. Using the Special Service Tool: 307-651 Bracket, Pump Remover/Installer., 307-651-04 Adapter, Lift Fixture and a floor crane, remove the clutch and planetary assembly. See Figure 18

NOTE: Install the pin in the top hole of the Special Service Tool: 307-651-04 Adapter, Lift Fixture with the splines facing down

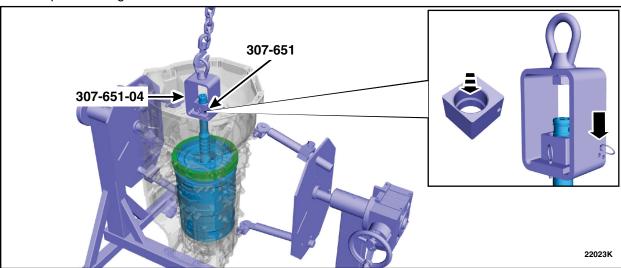


FIGURE 18

22. Remove the A clutch assembly. See Figure 19.

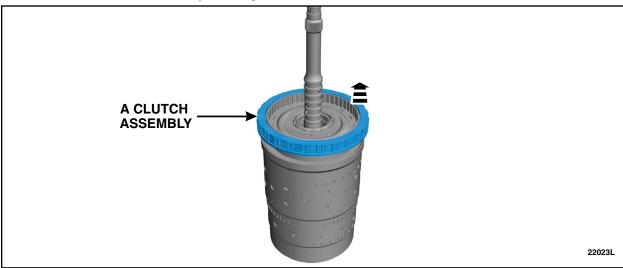


FIGURE 19

23. Using a magnet, remove the selective shim and the (T3) thrust bearing. See Figure 20.

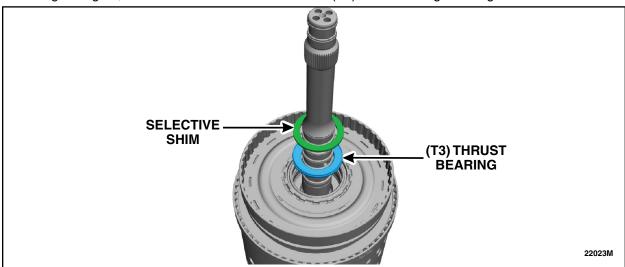


FIGURE 20

24. Remove the (T9) thrust bearing. See Figure 21.

NOTE: 3 pinion gear set planetary carrier No. 4 assembly shown, 4 pinion gear set planetary carrier

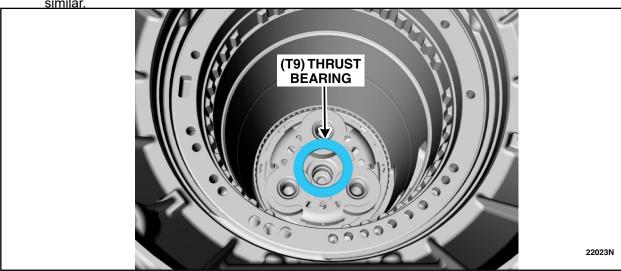


FIGURE 21

25. Remove the output shaft and planetary carrier No. 4 assembly. See Figure 22.

NOTE: 3 pinion gear set planetary carrier No. 4 assembly shown, 4 pinion gear set planetary carrier similar.

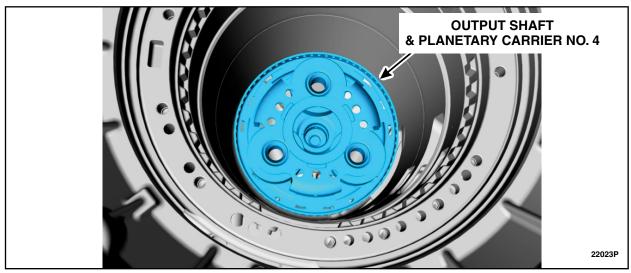


FIGURE 22

26. Using a punch, carefully tap the bearing from the rear race to release the clip, and remove the (T10) thrust bearing. See Figure 23.

NOTE: 3 pinion gear set planetary carrier No. 4 assembly shown, 4 pinion gear set planetary carrier similar.

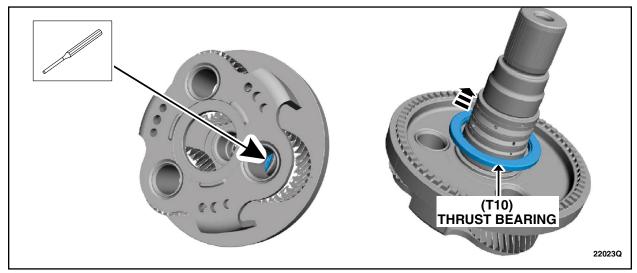


FIGURE 23

27. Inspect the No. 4 ring gear and the thrust bearing surfaces for damage. See Figure 24.

NOTE: Planetary assembly removed for clarification.

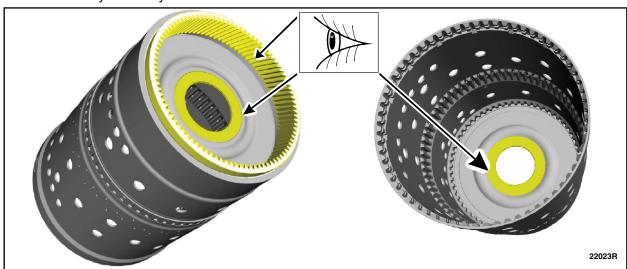


FIGURE 24

28. Inspect the No. 4 sun gear surfaces for damage. See Figure 25.

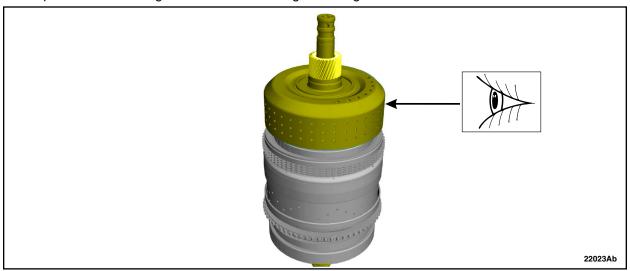


FIGURE 25

29. Inspect the output shaft and planetary carrier No. 4 assembly for damage. Are the output shaft and/or planetary carrier No. 4 assembly damaged? See Figure 26.

Yes: Inspection FAIL – TRANSMISSION ASSEMBLY REPLACEMENT IS REQUIRED.

Capture and submit clear photo(s) of the damaged output shaft and/or planetary carrier No. 4
assembly and the VIN tag to the Special Service Support Center (SSSC) for transmission
assembly replacement approval. Reverse the disassembly steps to reassemble the
transmission assembly. Install the *new* transmission assembly. Follow the Workshop
Manual (WSM) procedures, in Section 307-1B.

No: Inspection PASS - Proceed to Step 30.

NOTE: The planetary carrier No. 4 assemblies are equipped with 4 pinion gear sets.

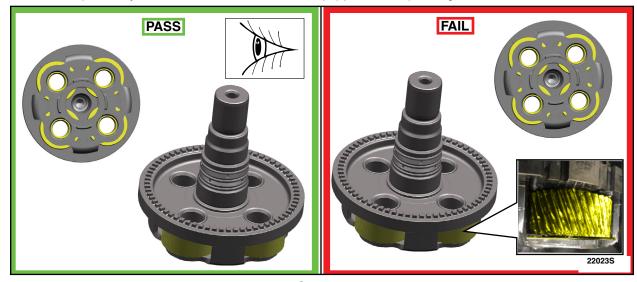


FIGURE 26

30. Install new (F10) seals on the new output shaft. See Figure 27.

NOTE: 3 pinion gear set planetary carrier No. 4 assembly shown, 4 pinion gear set planetary carrier similar.

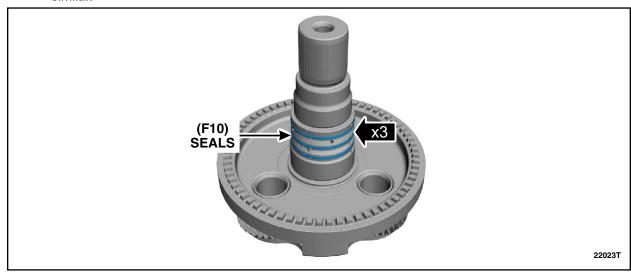


FIGURE 27

NOTICE: The (T10) thrust bearing must be installed with the inner bearing race towards the output shaft and planetary carrier or transmission damage can occur.

31. Snap the (T10) thrust bearing on evenly with the inner race towards the output shaft and planetary carrier. See Figure 28.

NOTE: When the (T10) thrust bearing is correctly installed, both the inner and outer bearing races will be visible.

32. Verify that the (T10) thrust bearing is correctly installed. See Figure 28.

NOTE: 3 pinion gear set planetary carrier No. 4 assembly shown, 4 pinion gear set planetary carrier similar.

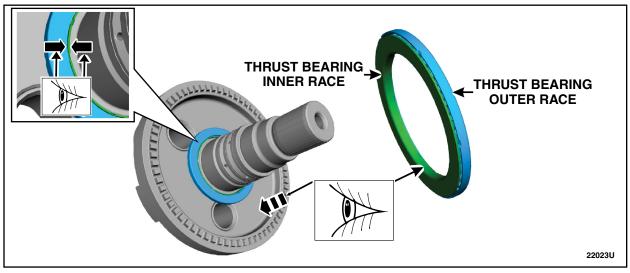


FIGURE 28

33. Rotate the manual lever to Neutral (N) and install the output shaft and planetary carrier assembly No. 4. See Figure 29.

NOTE: 3 pinion gear set planetary carrier No. 4 assembly shown, 4 pinion gear set planetary carrier similar.

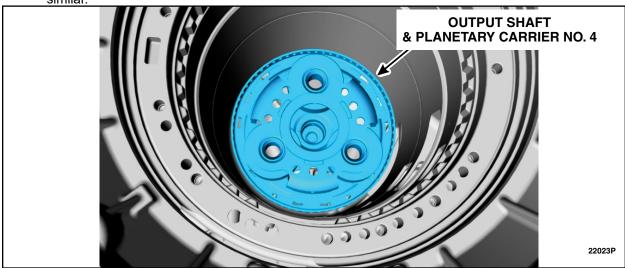


FIGURE 29

34. Install the (T9) thrust bearing. See Figure 30.

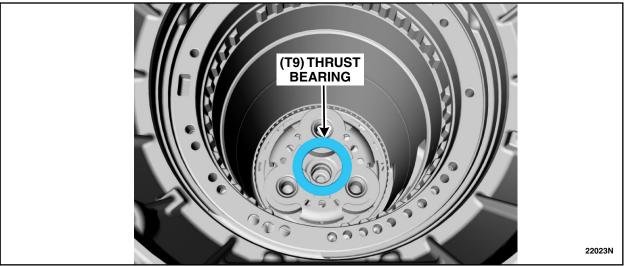


FIGURE 30

35. Lubricate the output shaft bushing with petroleum jelly. See Figure 31.

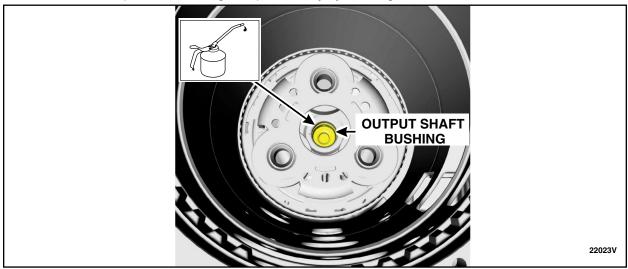


FIGURE 31

NOTICE: Use caution not to scratch or gouge the input shaft surface when removing the input shaft (F9) seals. The input shaft is not hardened in this area and damage to the input shaft can occur.

36. Inspect the input shaft (F9) Teflon® seals. Replace the input shaft (F9) Teflon® seals if any damage is found. See Figure 32.

NOTE: Input shaft removed for clarity.

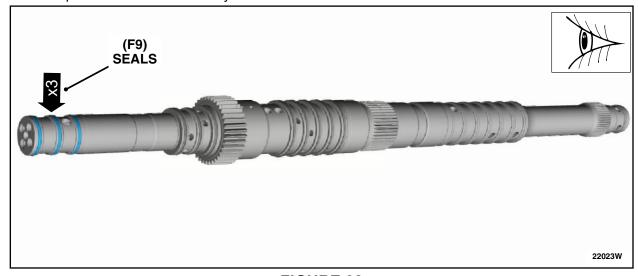


FIGURE 32

37. Install the Special Service Tool: 307-809 push & sizer, F0 Seal guide and adjust the special tool to align the bottom edge of the tool with the top edge of the bottom Teflon® seal groove. See Figure 33.

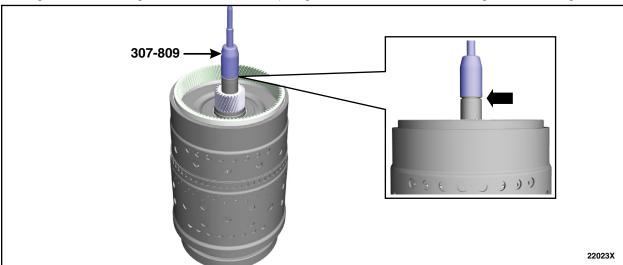


FIGURE 33

38. Install a *new* (F9) Teflon® seal on the Special Service Tool: 307-809 push & sizer, F0 Seal guide. See Figure 34.

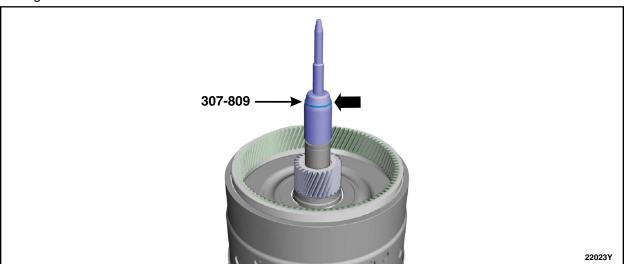


FIGURE 34

39. Using the top half of the Special Service Tool: 307-809 push & sizer, F0 Seal guide, slide the Teflon® seal into the groove. Remove the special tools and repeat the steps for the other 2 Teflon® seals. See Figure 35.

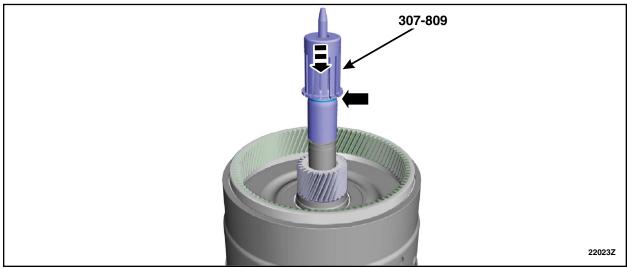


FIGURE 35

40. Using the Special Service Tool: 307-810 pusher & sizer, F9 Seal guide, size the Teflon® seal. Allow the special tool to stay on the input shaft until final assembly. See Figure 36.

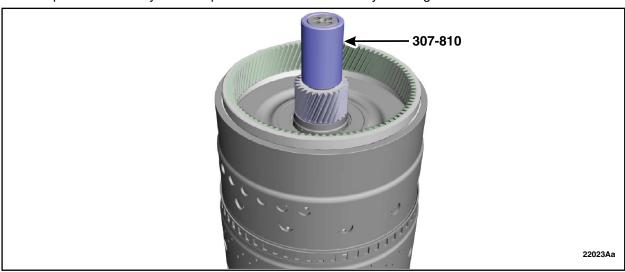


FIGURE 36

41. Flip the clutch and planetary assembly over.

NOTICE: Use caution not to scratch or gouge the input shaft surface when removing the torque converter (F0) seals. The input shaft is not hardened in this area and damage to the input shaft can occur.

- 42. Inspect the input shaft torque converter (F0) Teflon® seals. Replace the input shaft torque converter (F0) Teflon® seals if any damage is found. See Figure 37.
- 43. Inspect the input shaft front (F2) Teflon® seals. Replace the input shaft front (F2) Teflon® seals if any damage is found. See Figure 37.

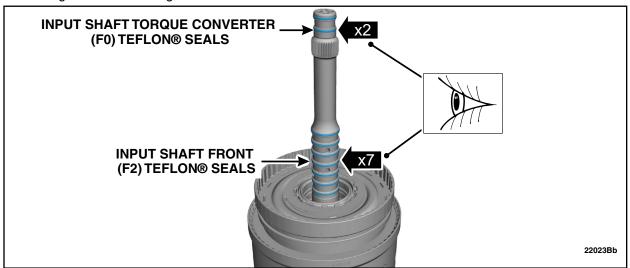


FIGURE 37

44. Install the Special Service Tool: 307-811 pusher & sizer, F2 Seal guide, and adjust the special tool to align the bottom edge of the tool with the top edge of the bottom Teflon® seal groove. See Figure 38.

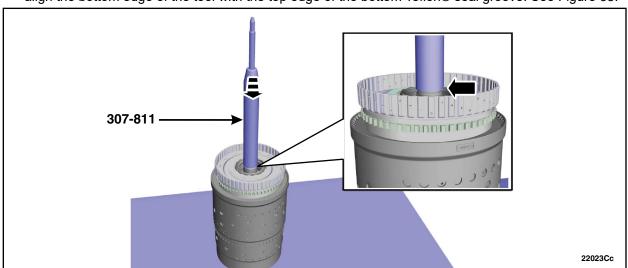


FIGURE 38

45. Install a *new* (F2) Teflon® seal on the Special Service Tool: 307-811 pusher & sizer, F2 Seal guide. See Figure 39.

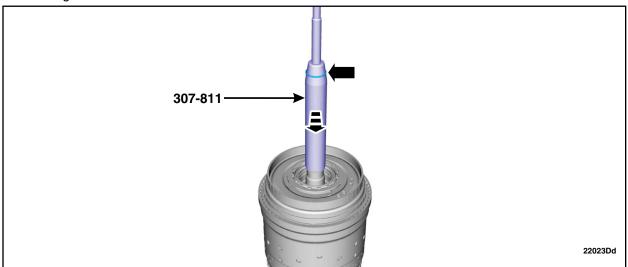


FIGURE 39

46. Using the top half of the Special Service Tool: 307-811 pusher & sizer, F2 Seal guide, slide the Teflon® seal into the groove. Remove the special tools and repeat the steps for the other 6 Teflon® seals. See Figure 40.

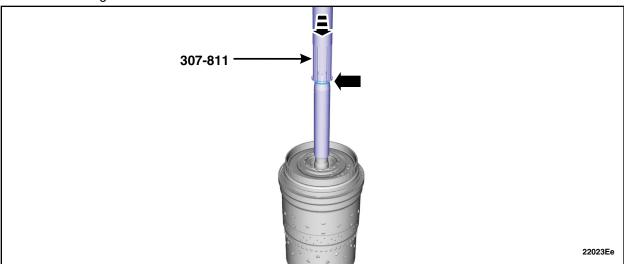


FIGURE 40

47. Install the Special Service Tool: 307-811 pusher & sizer, F2 Seal guide to size the 7 Teflon® seals. Allow the special tool to stay on the input shaft until final assembly. See Figure 41.

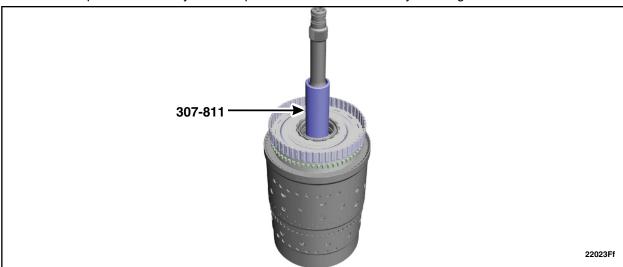


FIGURE 41

48. Remove the Special Service Tool: 307-810 pusher & sizer, F9 Seal guide. See Figure 42.

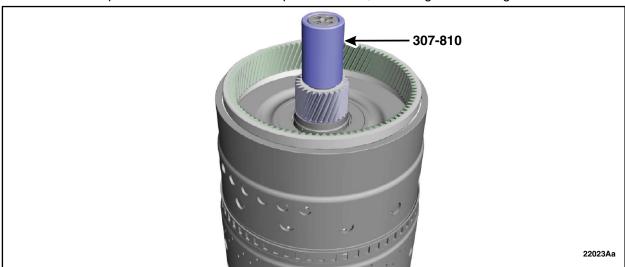


FIGURE 42

49. Using the Special Service Tool: 307-651 Bracket, Pump Remover/Installer., 307-651-04 Adapter, Lift Fixture and a floor crane, install the clutch and planetary assembly. See Figure 43.

NOTE: Install the pin in the top hole with the splines of the special tool facing down.

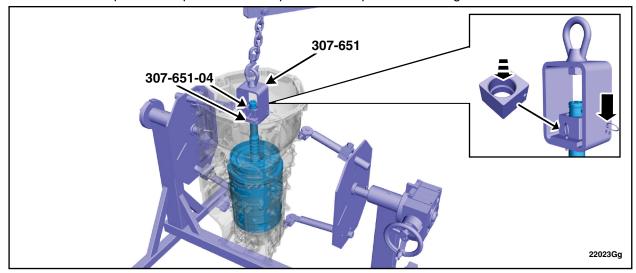


FIGURE 43

50. Install the (T3) thrust bearing. See Figure 44.

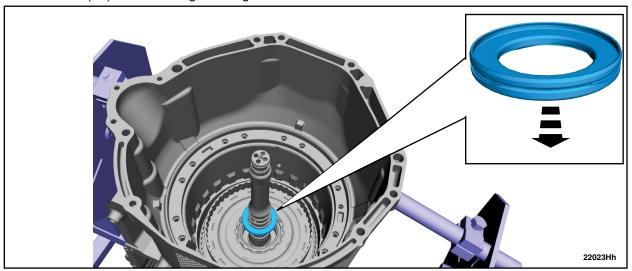


FIGURE 44

- 51. Perform the T3 end clearance check. Follow the WSM procedures in Section 307-01B.
- 52. Install the correct selective shim. See Figure 45.

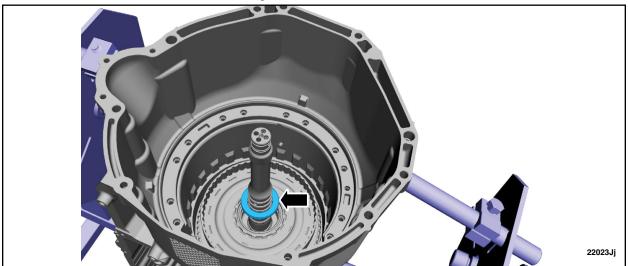


FIGURE 45

NOTE: Clutch plate quantity is model dependent based on engine displacement.

53. Soak the A clutch plates in clean Motorcraft® MERCON® ULV Automatic Transmission Fluid / XT-12-QULV (WSS-M2C949-A,) (MERCON® ULV) transmission fluid. Install the A clutch assembly. See Figure 46.

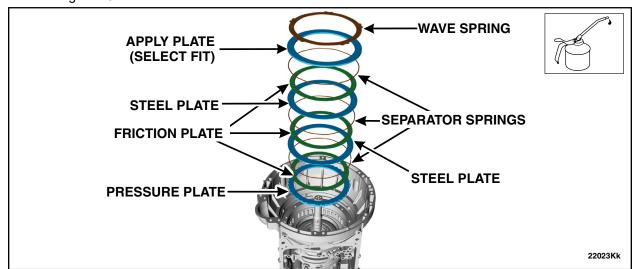


FIGURE 46

54. Remove Special Service Tool: 307-812 pusher & sizer, F1 Seal guide. See Figure 47.

NOTE: Support is shown installed, at this point the front support will not be installed in the transmission.



FIGURE 47

- 55. Install the *new* front support-to-case seal. Lubricate the seal with petroleum jelly. Follow the WSM procedures in Section 307-01B.
- 56. Install the new torque converter hub seal. Follow the WSM procedures in Section 307-01B.
- 57. Install the Special Service Tool: 307-797 Installer, Alignment Studs (3) & Alignment Pin (All 10R) in the location shown. See Figure 48.

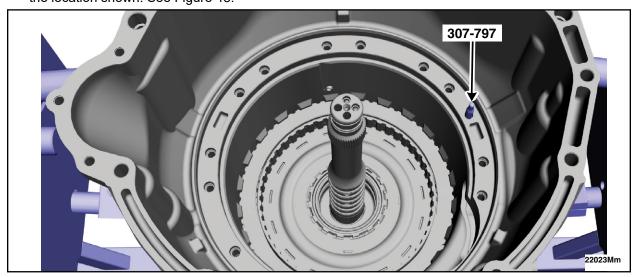


FIGURE 48

58. Install the Special Service Tool: 307-741 Spring Compressor, F Clutch., 307-741-01 Remover, Front Support & Cover on the front support assembly with the beveled side down. See Figure 49.

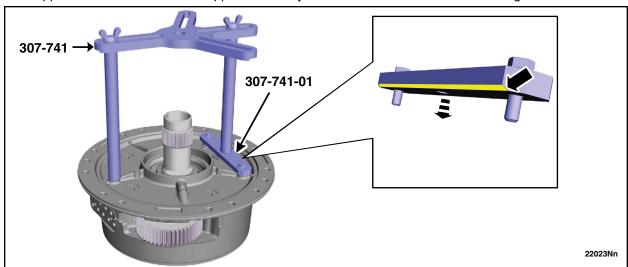


FIGURE 49

59. Remove Special Service Tool: 307-811 pusher & sizer, F2 Seal guide. See Figure 50.

NOTE: Planetary assembly and input shaft removed for clarity.

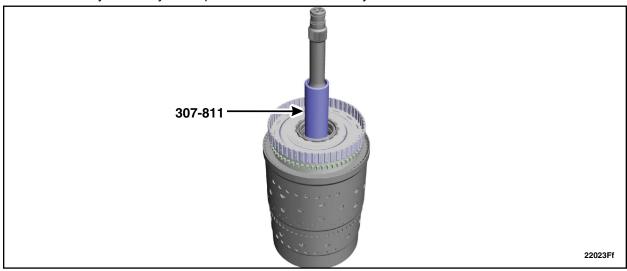


FIGURE 50

60. Lubricate the transmission case-to-front support sealing surface, and the Teflon seals with petroleum jelly. See Figure 51.

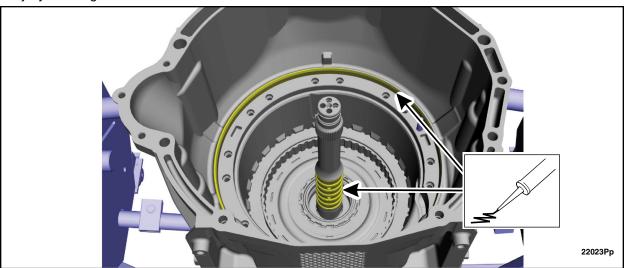


FIGURE 51

61. Using the Special Service Tool: 307-797 Installer, Alignment Studs (3) & Alignment Pin (All 10R), install the front support into the transmission case. Rotate the input shaft while aligning the front support to the special tool guide pin. See Figure 52.

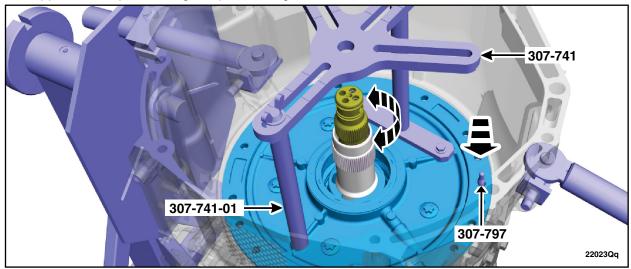


FIGURE 52

62. Install the Special Service Tool: 307-797 Installer, Alignment Studs (3) & Alignment Pin (All 10R) in the location shown, and tighten the nuts evenly to seat the front support assembly to the transmission case. See Figure 53.

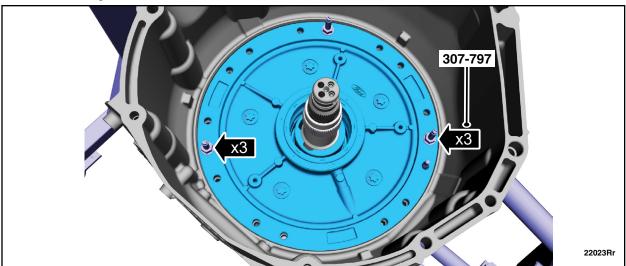


FIGURE 53

63. Install the new front support assembly bolt washers. See Figure 54.



FIGURE 54

64. With the Special Service Tool: 307-797 Installer, Alignment Studs (3) & Alignment Pin (All 10R) installed, hand tight the front support bolts in a crisscross pattern. Then remove the special tools and install the front support bolts hand tight. See Figure 55.



FIGURE 55

- 65. Tighten the bolts in the sequence shown. See Figure 56.
 - Torque: 26 lb.ft (35 Nm).

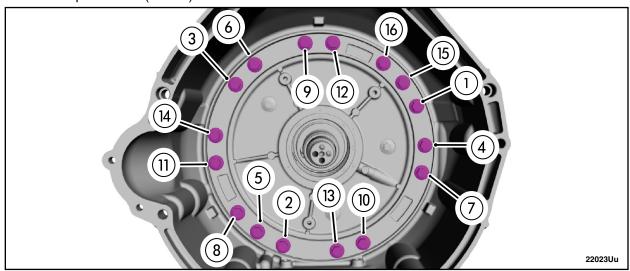


FIGURE 56

66. Install the Special Service Tool: 307-809 push & sizer, F0 Seal guide and adjust the special tool to align the bottom edge of the tool with the top edge of the bottom Teflon® seal groove. See Figure 57.

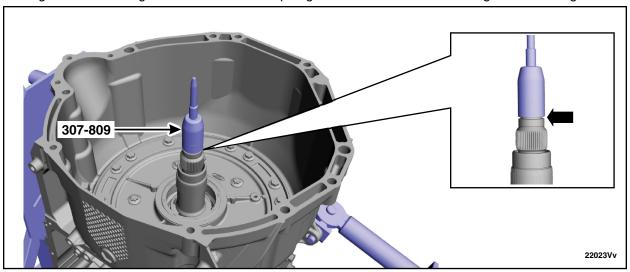


FIGURE 57

67. Install a *new* (F0) Teflon® seal on the Special Service Tool: 307-809 push & sizer, F0 Seal guide. See Figure 58.

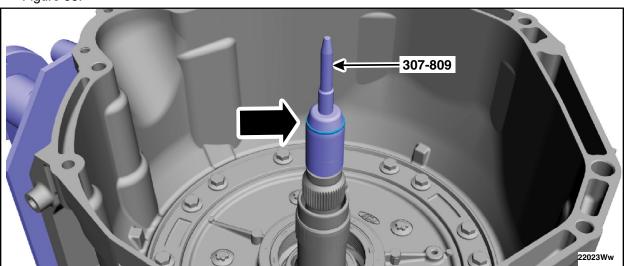


FIGURE 58

68. Using the top half of the Special Service Tool: 307-809 push & sizer, F0 Seal guide, slide the Teflon® seal into the groove. Remove the special tools and repeat the steps for the other 2 Teflon® seals. See Figure 59.

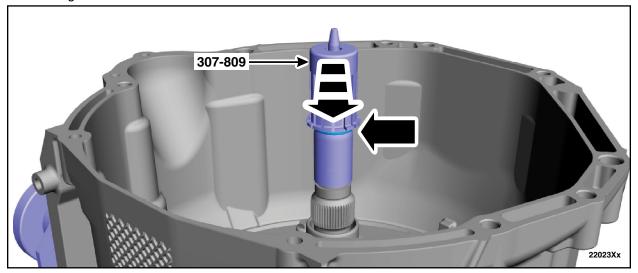


FIGURE 59

69. Using the Special Service Tool: 307-809 push & sizer, F0 Seal guide, pre-size the input shaft torque converter (F0) Teflon® seals, then using the Special Service Tool: 307-810 pusher & sizer, F9 Seal guide, final size the input shaft torque converter (F0) Teflon® seals. See Figure 60.

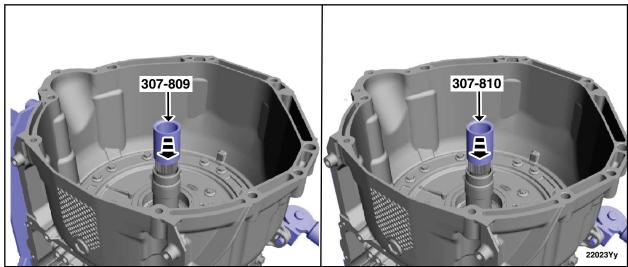


FIGURE 60

70. Using the Special Service Tool: 307-651Bracket, Pump Remover/Installer and a floor crane, install the torque converter. See Figure 61.

NOTE: Install the pin in the bottom hole.

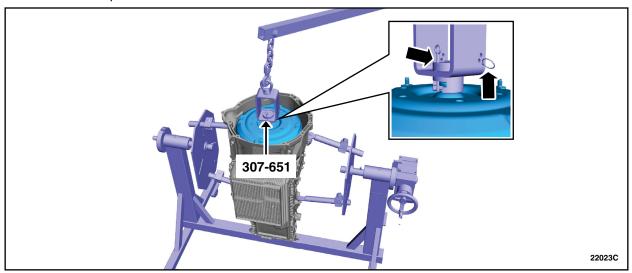


FIGURE 61

71. Rotate the transmission to a vertical position and install the 12 mm combination wrench. See Figure 62.

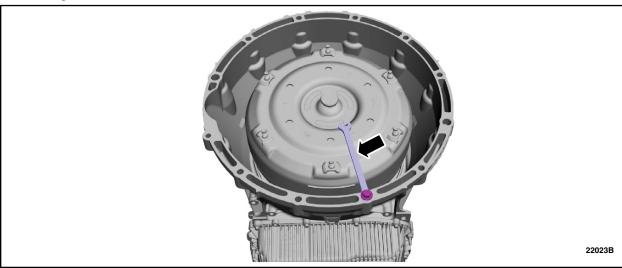


FIGURE 62

72. Install the transmission fluid pump seal. See Figure 63.



FIGURE 63

73. Install the transmission fluid pump and the bolts. See Figure 64.

• Torque: 97 lb.in (11 Nm).

NOTE: Use a 10ep Torx Plus® socket to install the bolts.

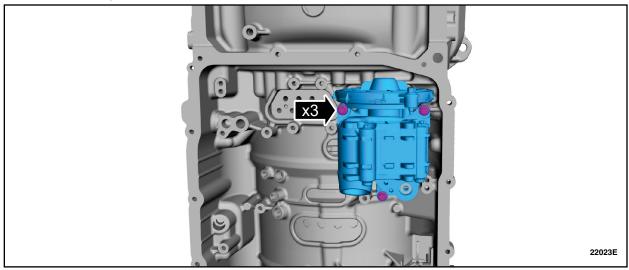


FIGURE 64

- 74. Install the ISSA, TSS, ISSB, and OSS speed sensors. See Figure 65.
 - Torque: 97 lb.in (11 Nm).

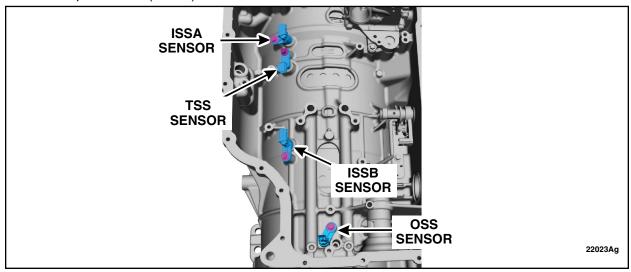


FIGURE 65

- 75. Lubricate the O-ring seals with petroleum jelly, route the wiring harness under the park pawl rod, and install the bolts. See Figure 66.
 - Torque: 80 lb.in (9 Nm).

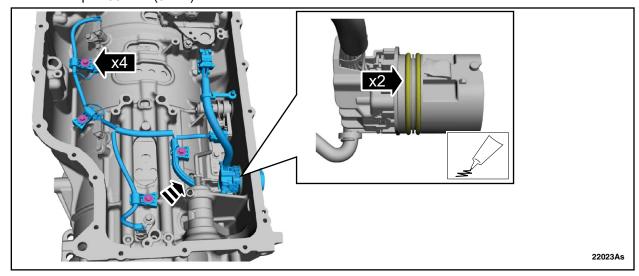


FIGURE 66

76. Connect and lock the ISSA, TSS, ISSB, and OSS speed sensors. See Figure 67.

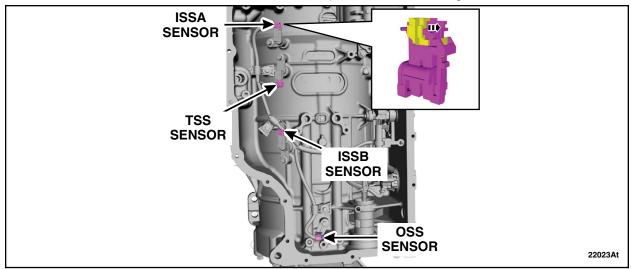


FIGURE 67

77. Guide pins into transmission case and install the main control manifold seal and the fluid pump gasket See Figure 68.

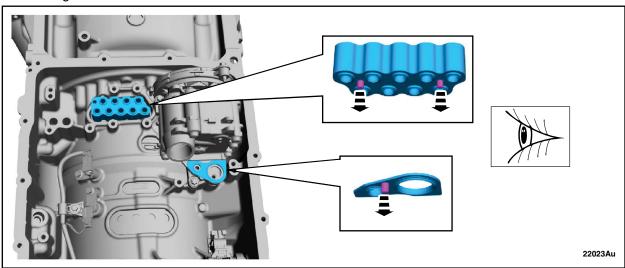


FIGURE 68

- 78. Install the main control valve body. Follow the WSM procedures, in Section 307-01B.
- 79. Install the transmission fluid pan, gasket and *new* filter. Follow the WSM procedures, in Section 307-01B. **NOTE:** Vehicles equipped with a fixed flange transmission only.
- 80. Install the anti-ting washer. See Figure 69.

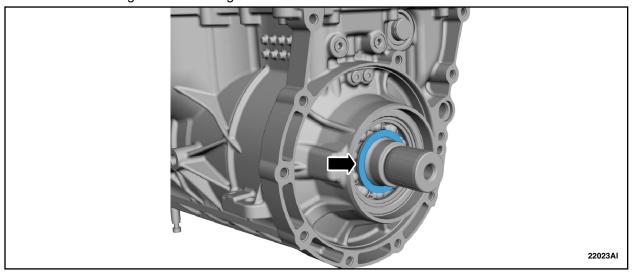


FIGURE 69

81. Position a *new* output shaft seal on the Special Service Tool: 205-1018 Installation Tube., 307-650 Installer, Output Shaft Seal. See Figure 70.

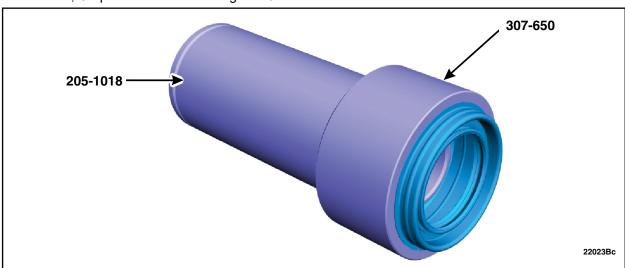


FIGURE 70

NOTE: Vehicles equipped with a fixed flange transmission only.

82. Using the Special Service Tool: 205-1018 Installation Tube., 307-650 Installer, Output Shaft Seal, install the *new* output shaft seal. See Figure 71.

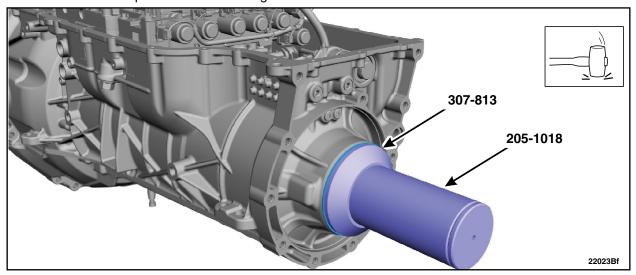


FIGURE 71

NOTE: Vehicles equipped with a fixed flange transmission only.

83. Align the output shaft flange marks to the output shaft. See Figure 72.

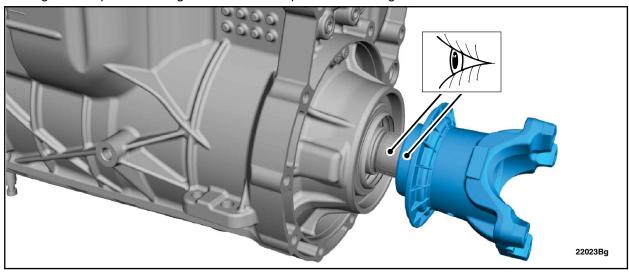


FIGURE 72

NOTE: Vehicles equipped with a fixed flange transmission only.

- 84. Rotate the manual control lever to P. and install and the output shaft flange bolt. See Figure 73.
 - Torque:129 lb.ft (175 Nm).

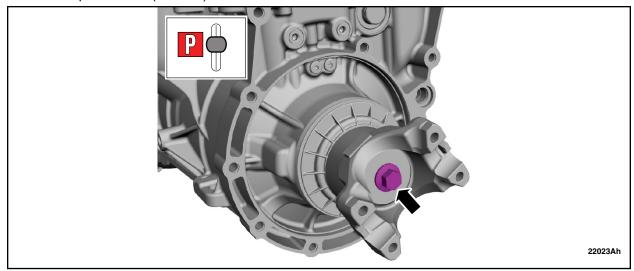


FIGURE 73

NOTE: Vehicles equipped with a Four-Wheel Drive (4WD) transmission only.

85. Position a *new* output shaft seal on the Special Service Tool: 205-1018 Installation Tube., 307-650 Installer, Output Shaft Seal. See Figure 74.

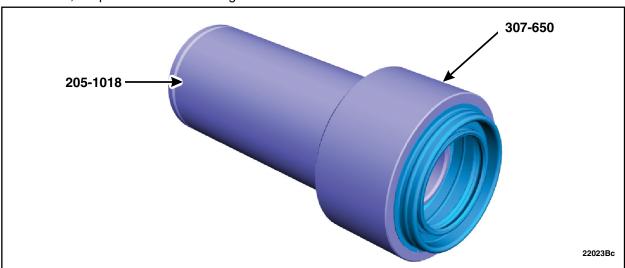


FIGURE 74

NOTE: Vehicles equipped with a Four-Wheel Drive (4WD) transmission only.

85. Using the Special Service Tool: 205-1018 Installation Tube., 307-650 Installer, Output Shaft Seal, install the *new* output shaft seal. See Figure 75.

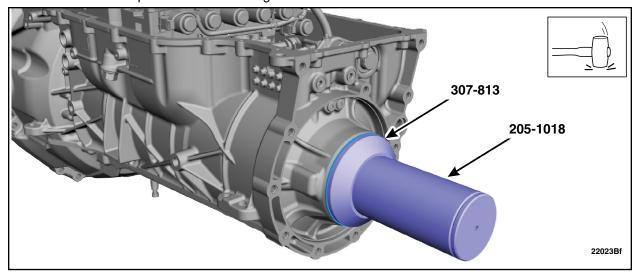


FIGURE 75

86. Remove the transmission from the mounting stand and install the transmission into the vehicle. Follow the WSM procedures, in Section 307-01B.

IMPORTANT NOTE: Federal law prohibits selling motor vehicle parts or components that are under safety, compliance, or emissions recall. Unless a part is requested to be returned to Ford, all parts replaced under this FSA must be scrapped in accordance with all applicable local, state and federal environmental protection and hazardous material regulations. Refer to the Parts Retention, Return, & Scrapping section of the FSA dealer bulletin for further information.

Ford Motor Company Recall Reimbursement Plan for 22S22

Ford and Lincoln dealers are in the best position to quickly and efficiently process reimbursement requests. However, federal legislation requires all motor vehicle manufacturers to establish processes through which customers may seek recall reimbursement directly from the manufacturer or the dealers.

Regarding the specific reimbursement plan for Recall #22S22, owners who have paid for service to remedy the defect or noncompliance must have had that service performed before April 21, 2023. After this date, if repairs related to this recall are performed by a non-Ford repair facility in an emergency, customers must submit any refund requests through their dealership. As required by this federal regulation, Ford Motor Company submitted the details of its latest General Recall Reimbursement Plan in a letter to the National Highway Traffic Safety Administration (NHTSA) in May 2021. The following is the text of that letter and the Plan:

General Recall Reimbursement Plan

(As submitted to the NHTSA)

Under the requirements outlined in 49 CFR Part 573 and Part 577 of the Code of Federal Regulations, Ford Motor Company (Ford) is submitting the required information about our general reimbursement plan for the cost of remedies paid for by vehicle owners before they are notified of a related safety recall.

Set forth below is Ford's general plan to reimburse owners and purchasers for costs incurred for remedies in advance of notification of potential safety-related defects or noncompliance according to Part 573.6 (c)(8)(i). This plan has not changed since our February 20, 2019 submission.

Reimbursement Notification

Ford's notice to a vehicle owner in accordance with 49 CFR Part 577 will indicate that Ford is offering a refund if the owner paid to have service to remedy the defect or noncompliance before a specified ending date. In accordance with Part 573.13 (c)(2), this ending date will be defined as a minimum of ten calendar days after the date on which Ford mailed the last of its Part 577 notifications to owners and will be indicated in the specific reimbursement plan available to owners for an individual recall. This notice will direct owners to seek eligible reimbursement through authorized dealers or, at their option, directly through Ford at the following address:

Ford Motor Company P.O. Box 6251 Dearborn, MI 48121-6251

Ford notes that this rule allows for the identification of a beginning date for reimbursement eligibility. Under the rule, an owner who paid to remedy the defect or noncompliance before the identified beginning date would not be eligible for reimbursement. Ford generally has not established such a beginning date for reimbursement eligibility and does not presently anticipate changing this general policy. However, in any case, where Ford determines a beginning date is appropriate, Ford will indicate that date in the owner's notice. As permitted by 577.11(e), Ford may not include a reimbursement notification when all vehicles are well within the warranty period, subject to approval by the agency.

Costs to be Reimbursed

For vehicles, reimbursement will not be less than the lesser of:

- The amount paid by the owner for the remedy that specifically addressed and was reasonably necessary to correct the defect or noncompliance that is the subject of the recall, or
- The cost of parts for the remedy (to be no more than the manufacturer's list retail price for authorized part(s), plus associated labor at local labor rates, miscellaneous fees (such as disposal of waste), and taxes.

For replacement equipment, reimbursement will be the amount paid by the owner for the replacement item (limited by the amount of the retail list price of the defective or noncompliant item that was replaced, plus taxes, where the brand or model purchased by the owner was different from the brand or model that was the subject of the recall). If the item of motor vehicle equipment was repaired, the reimbursement provisions identified above for vehicles will apply.

Ford notes that costs incurred by the owner within the period during which Ford's original or extended warranty would have provided for a free repair of the problem will not be eligible for reimbursement, as provided by Part 573.13 (d)(1).

Entities Authorized to Provide Reimbursement

Ford will continue to use authorized dealers to reimburse owners under the specific reimbursement plans for a particular recall and will encourage owners to pursue requests for reimbursement directly through dealers to expedite reimbursement. Ford will also provide a mailing address to which customers can, at their option, send requests for reimbursement directly to Ford, as previously noted. Requests for reimbursement sent directly to Ford may take up to 60 days to process. Whether the owner chooses to pursue reimbursement requests through a dealer or directly through Ford, the owner will be directed to submit the required documentation, upon which reimbursement eligibility will be determined.

Required Documentation

The reimbursement determination will depend upon the information provided by the customer. Consistent with Part 573.13 (d)(4) the following information must be submitted:

- · Claimant's name and address.
- Vehicle make, model, and model year.
- Vehicle identification number (VIN) and, for replacement equipment, a description of such equipment or, for tires, the model, size, and TIN (DOT code).
- Identification of the recall number (either the Ford recall number or the NHTSA recall number).
- Identification of the owner of the recalled vehicle at the time that the pre-notification remedy was obtained.
- An original receipt for the pre-notification remedy that includes a breakdown of the amount for parts, labor, other costs, and taxes, including costs for the replacement item. Where the receipt covers work other than to address the recall or noncompliance, Ford may require the claimant to separately identify costs that are eligible for reimbursement.
- If the remedy was obtained during the warranty period, documentation indicating that the warranty was not honored or the warranty repair did not correct the problem related to the recall.

Failure to submit all of the above information may result in the denial of the reimbursement request.

Additional Information

The Part 577 required owner notice will provide a toll-free telephone number through which specific information about the reimbursement plan can be requested from Ford. This general reimbursement plan will be incorporated into notifications according to Part 573.6 by reference. Information specific to an individual recall also may be incorporated into the Part 573.6 notification.