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#### **ASSEMBLY**

#### **AUTOMATIC TRANSMISSION - 42RLE**

NOTE:

If the transmission assembly is being reconditioned (clutch/seal replacement) or replaced, it is necessary to perform the <u>TCM QUICK LEARN</u> Procedure using the scan tool.

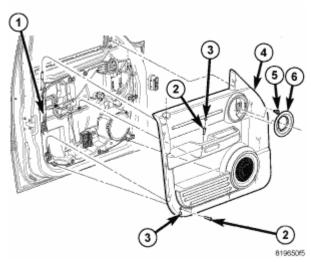


Fig. 18: 42RLE Bearing Orientation Courtesy of CHRYSLER LLC

1 - THRUST BEARING NO.1	5 - THRUST BEARING NO.5
2 - THRUST BEARING NO.2	6 - NEEDLE BEARING NO.6
3 - THRUST BEARING NO.3	7 - NEEDLE BEARING NO.7
4 - THRUST BEARING NO.4	<u>-                                      </u>

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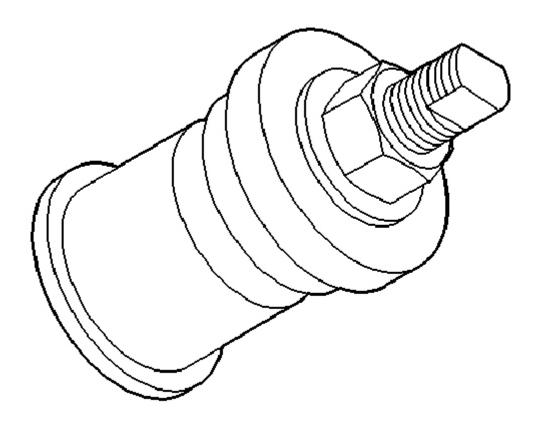
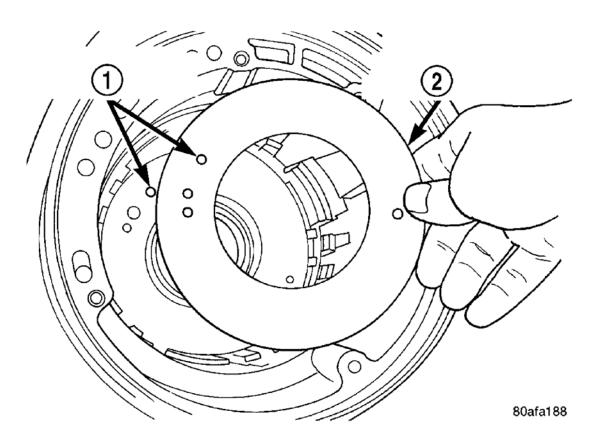


Fig. 19: Bearing Cup Installation Special Tool - 5050A Courtesy of CHRYSLER LLC

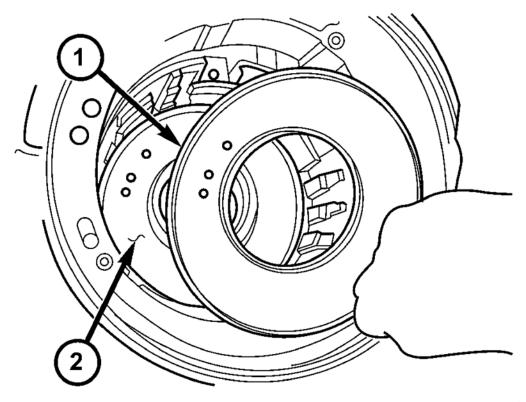
1. Install the output bearing cups using Installer 5050A. See Fig. 19



<u>Fig. 20: Removing/Installing Piston Retainer Gasket</u> Courtesy of CHRYSLER LLC

- 1 GASKET HOLES MUST LINE UP
- 2 LOW/REVERSE CLUTCH PISTON RETAINER GASKET
- 2. Install low/reverse piston retainer gasket (2). See Fig. 20.

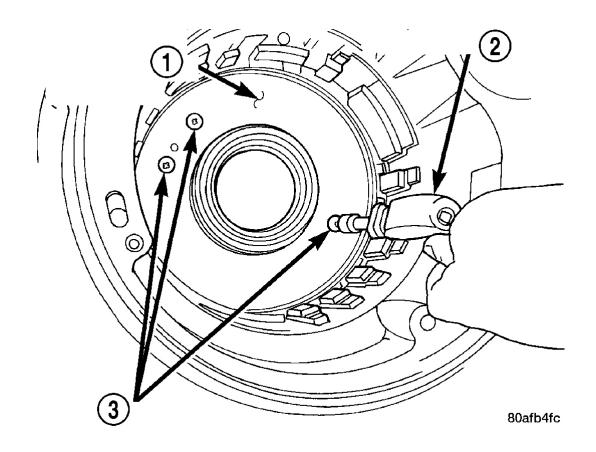
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<u>Fig. 21: Installing Low/Reverse Piston Retainer</u> Courtesy of CHRYSLER LLC

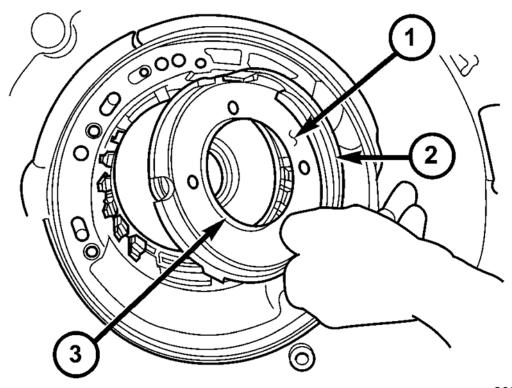
- 1 LOW/REVERSE CLUTCH PISTON RETAINER
- 2 GASKET
- 3. Install low/reverse piston retainer (1). See  $\underline{Fig. 21}$ .



<u>Fig. 22: Installing Low/Reverse Piston Retainer-To-Case Screws</u> Courtesy of CHRYSLER LLC

- 1 LOW/REVERSE CLUTCH PISTON RETAINER
- 2 SCREWDRIVER
- 3 TORX-LOC SCREWS
- 4. Install low/reverse piston retainer-to-case screws (3) and torque to 5 N.m (45 in. lbs.). See <u>Fig. 22</u>.

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Fig. 23: Installing Low/Reverse Clutch Piston Courtesy of CHRYSLER LLC

- 1 LOW/REVERSE CLUTCH PISTON
- 2 D-RING SEAL
- 3 D-RING SEAL

NOTE: The Low/Reverse Clutch Piston has bonded seals which are not individually serviceable. Seal replacement requires replacement of the piston assembly.

5. Install low/reverse clutch piston (1). See <u>Fig. 23</u>.

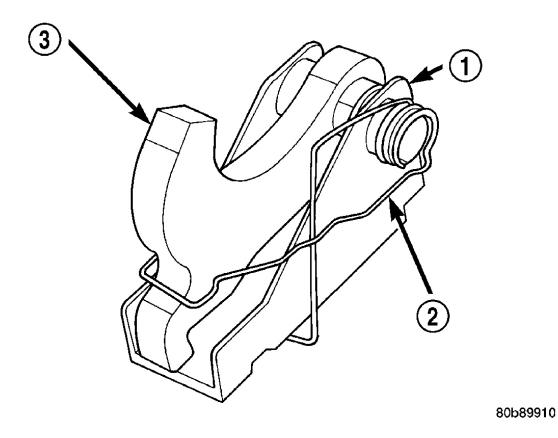


Fig. 24: Assembled Guide Bracket Courtesy of CHRYSLER LLC

- 1 GUIDE BRACKET
- 2 ANTIRATCHET SPRING (MUST BE ASSEMBLED AS SHOWN)
- 3 PAWL
- 6. Assemble guide bracket (1) assembly as shown, if necessary. See <u>Fig. 24</u>.

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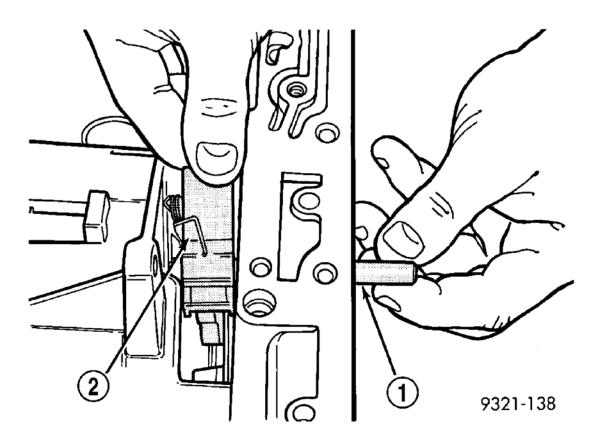
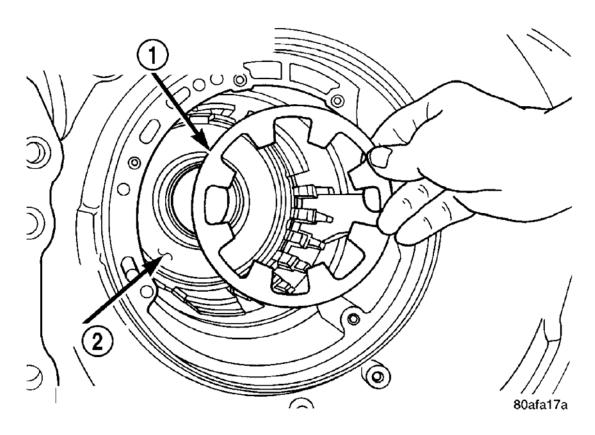


Fig. 25: Installing Guide Bracket Pivot Pin Courtesy of CHRYSLER LLC

- 1 PIVOT PIN
- 2 GUIDE BRACKET ASSEMBLY

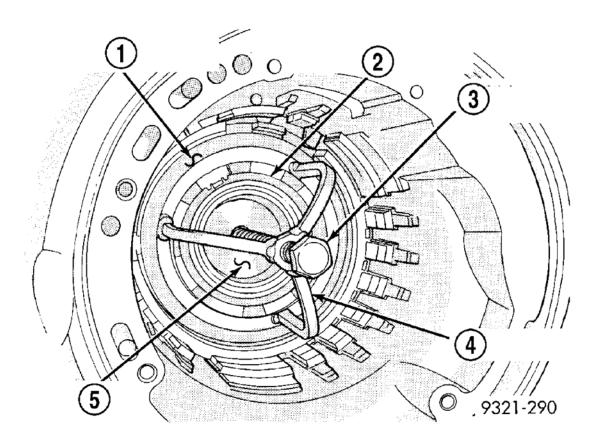
CAUTION: When installing, be sure guide bracket and split sleeve touch the rear of the transmission case.

- 7. Install guide bracket pivot pin (1). See **Fig. 25**.
- 8. Install park sprag pivot retaining screw and torque to 4.5 N.m (40 in. lbs.).



<u>Fig. 26: Installing Low/Reverse Piston Belleville Spring</u> Courtesy of CHRYSLER LLC

- 1 LOW/REVERSE PISTON RETURN SPRING
- 2 PISTON
- 9. Install low/reverse piston belleville spring (1) into position. See Fig. 26



<u>Fig. 27: Installing And Loading Low/Reverse Spring With Compressor Tool 5058A-3, 5059A And Disc 6057 To Facilitate Snap Ring Installation</u>
Courtesy of CHRYSLER LLC

- 1 LOW/REVERSE CLUTCH RETURN SPRING
- 2 SNAP RING (INSTALL AS SHOWN)
- 3 COMPRESSOR 5058A-3
- 4 COMPRESSOR 5059A
- 5 DISC 6057
- 10. Install and load low/reverse spring with compressor tool 5058A-3 (3), 5059A (4) and disc 6057 (5) as shown in **Fig. 27** to facilitate snap ring (2) installation.

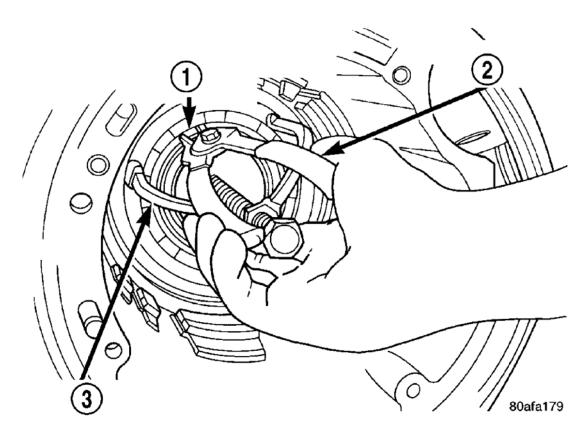
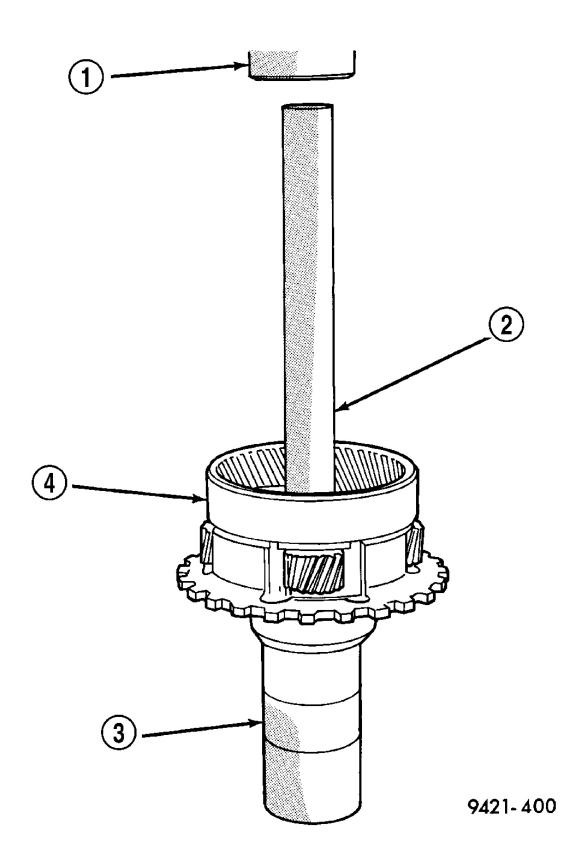


Fig. 28: Installing Low/Reverse Clutch Snap Ring Courtesy of CHRYSLER LLC

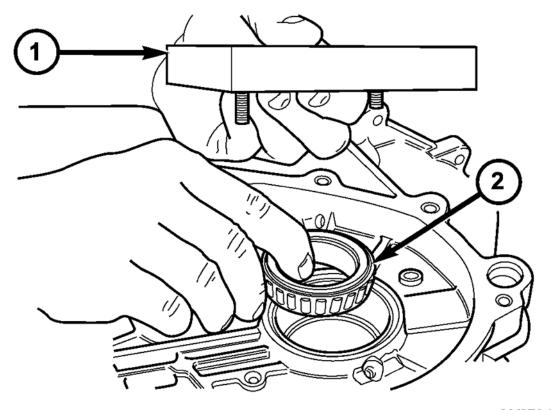
- 1 SNAP RING OPENING MUST BE BETWEEN SPRING LEVERS (AS SHOWN)
- 2 SNAP RING PLIERS
- 3 DISC 6057
- 11. Install snap ring (1) and remove compressor tool. See  $\underline{\text{Fig. 28}}$



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#### Fig. 29: Installing Rear Carrier Front Bearing Cone Courtesy of CHRYSLER LLC

- 1 ARBOR PRESS
- 2 UNIVERSAL HANDLE C-4171
- **3 INSTALLER 6052**
- 4 REAR CARRIER
- 12. Install rear carrier (4) front bearing cone. See Fig. 29



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Fig. 30: Installing Rear Output Shaft Bearing Cone And Support Plate 6618A Courtesy of CHRYSLER LLC

- 1 SUPPORT PLATE 6618-A
- 2 REAR OUTPUT SHAFT BEARING

Check output bearing preload. Output bearing preload must be checked and/or adjusted if any of the following items have been replaced:

Output shaft (rear carrier assembly)

Output shaft bearings

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Transmission case

13. **PRELOAD CHECK/SHIM SELECTION:** Install rear output shaft bearing cone and Support Plate 6618A (1). See <u>Fig. 30</u>.

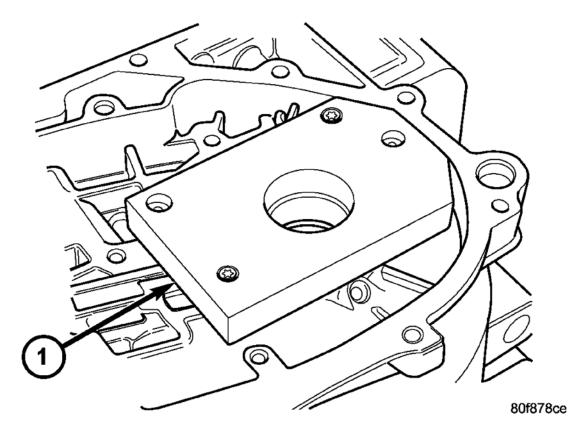
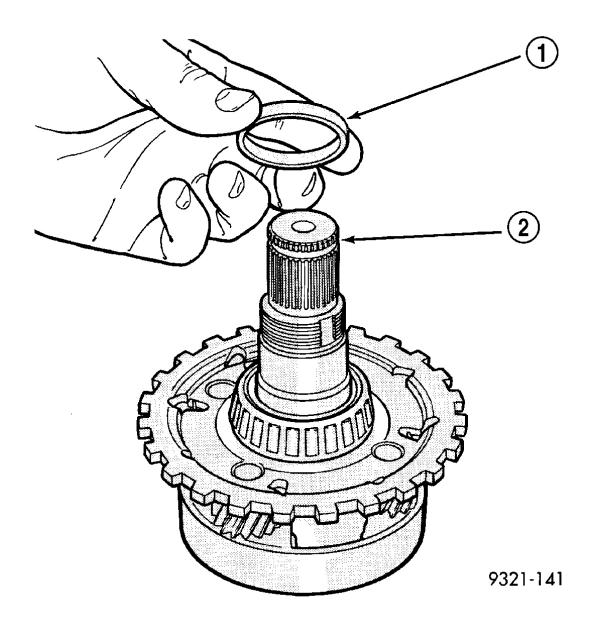


Fig. 31: Installing Support Plate Courtesy of CHRYSLER LLC

#### 1 - SUPPORT PLATE 6618-A

- 14. Install Support Plate 6618A (1). See <u>Fig. 31</u>. Lightly tighten retaining screws. Screws should be below the plate surface, but do not snug screws.
- 15. Turn case over on arbor press so that the plate is resting on the press base. CAUTION: The output shaft will extend through the hole of Support Plate 6618A. Ensure your press table has clearance for the output shaft.

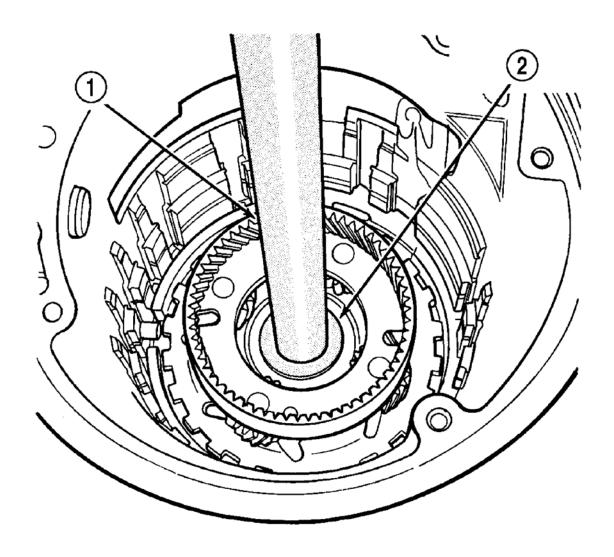


<u>Fig. 32: Installing Shim On Output Shaft</u> Courtesy of CHRYSLER LLC

- 1 SHIM
- 2 OUTPUT SHAFT

16. Install shim (1) on output shaft (2). See **Fig. 32**. Apply small amount of petrolatum onto the shim to hold it in place. Use the original shim as a starting point. If original shim is not available, use the thickest shim available.

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<u>Fig. 33: Install Output Shaft/Rear Carrier Into Rear Bearing</u> Courtesy of CHRYSLER LLC

1 - UNIVERSAL HANDLE C-4171 AND HANDLE EXTENSION C-4171-2 2 - DISC MD-998911

17. Install output shaft/rear carrier into rear bearing. The shaft must be pressed into position. Use Disc MD-998911 (2) and Universal Handle C-4171 and Handle Extension C4171-2 (1) to press shaft into rear bearing. See **Fig. 33**.

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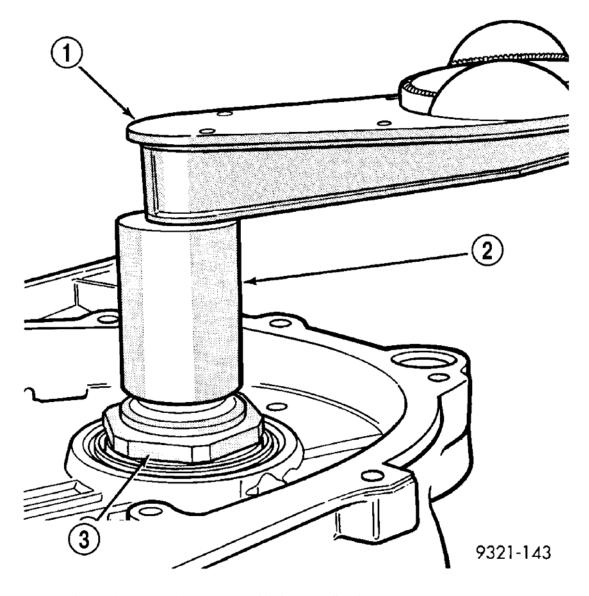


Fig. 34: Checking Turning Torque Of Output Shaft Courtesy of CHRYSLER LLC

- 1 TORQUE WRENCH
- 2 WRENCH 6498-A
- 3 OUTPUT SHAFT NUT

CAUTION: Do not re-use old output shaft nut because the removed stake weakens the nut flange. Using Wrenches 6497 and 6498-A, install new output shaft nut. Tighten new output shaft nut to 271 N.m (200 ft. lbs.).

18. Check the turning torque (1) of the output shaft. See Fig. 34. The shaft should have 1 to 8 in. lbs. of

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turning torque. If the turning torque is **higher than** 8 in. lbs, install a thicker shim. If turning torque is **less than** 1 in. lb, install a thinner shim. Make sure there is no end play.

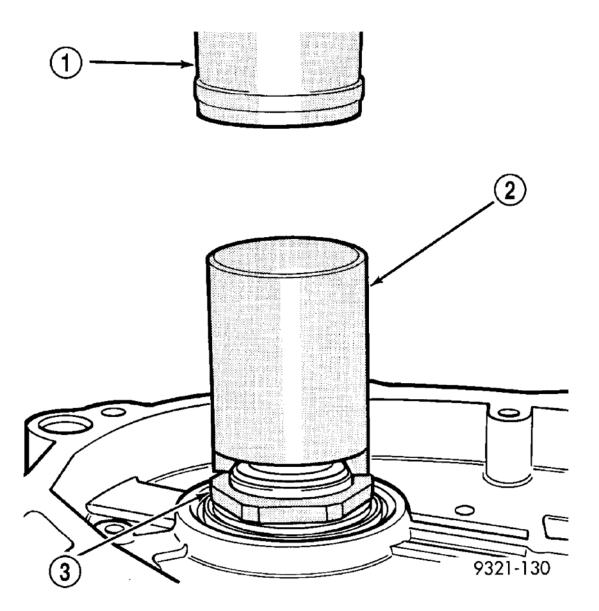


Fig. 35: Identifying Arbor Press, Staking Tool - 6639 & New Nut Courtesy of CHRYSLER LLC

- 1 ARBOR PRESS
- 2 STAKING TOOL 6639
- 3 NEW NUT

CAUTION: Failure to stake nut could allow the nut to back-off during use.

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19. The new nut (3) must be staked after the correct turning torque is obtained. See <u>Fig. 35</u>. Use Staking Tool 6639 (2) to stake output shaft nut.

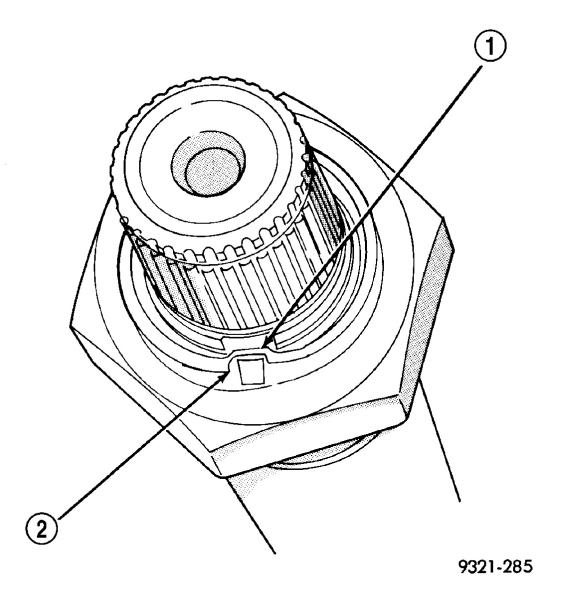


Fig. 36: Identifying Bottomed In Slot & Correctly Staked Nut Courtesy of CHRYSLER LLC

- 1 BOTTOMED IN SLOT
- 2 CORRECTLY STAKED NUT

20. Verify that the nut has been properly staked to the output shaft. See <u>Fig. 36</u>.

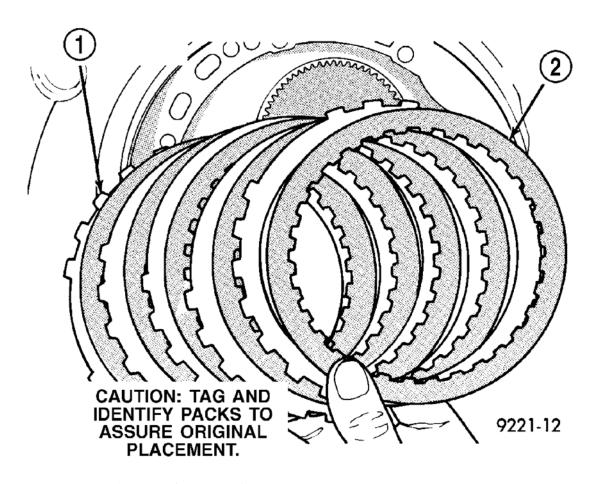
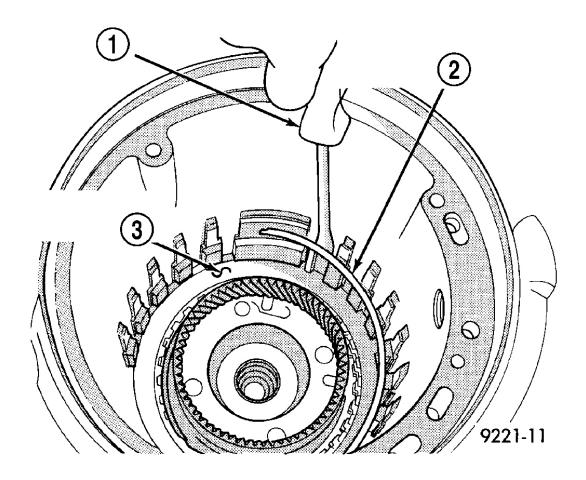


Fig. 37: Installing Low/Reverse Clutch Pack Courtesy of CHRYSLER LLC

- 1 CLUTCH PLATES (5)
- 2 CLUTCH DISCS (5)
- 21. Install low/reverse clutch pack (1, 2). See <u>Fig. 37</u>. Leave uppermost disc out to facilitate snap ring installation.



<u>Fig. 38: Installing Low/Reverse Reaction Plate Snap Ring</u> Courtesy of CHRYSLER LLC

- 1 SCREWDRIVER
- 2 LOW/REVERSE REACTION PLATE FLAT SNAP RING
- 3 DO NOT SCRATCH CLUTCH PLATE
- 22. Install low/reverse reaction plate snap ring (2). See Fig. 38.

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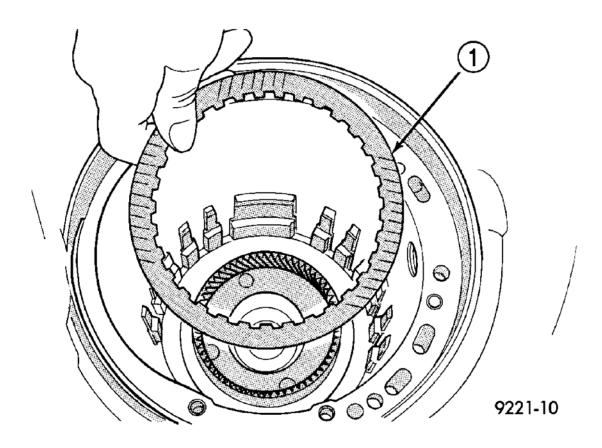


Fig. 39: Installing One Low/Reverse Clutch Disc Courtesy of CHRYSLER LLC

1 - ONE DISC FROM LOW/REVERSE CLUTCH

23. Install one low/reverse clutch disc (1). See **Fig. 39**.

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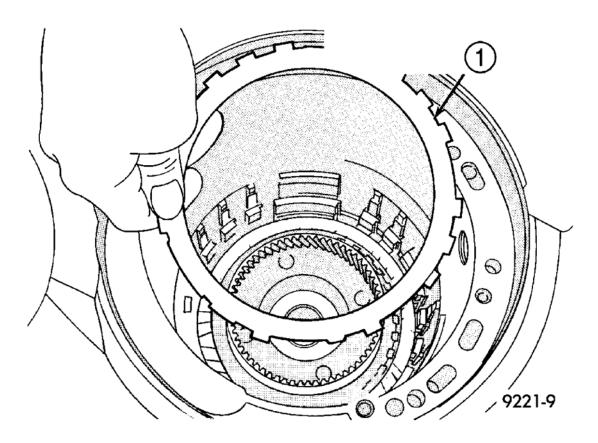


Fig. 40: Installing Low/Reverse Reaction Plate With Flat Side Up Courtesy of CHRYSLER LLC

1 - LOW/REVERSE REACTION PLATE (FLAT SIDE UP)

24. Install low/reverse reaction plate (1) with flat side up. See Fig. 40

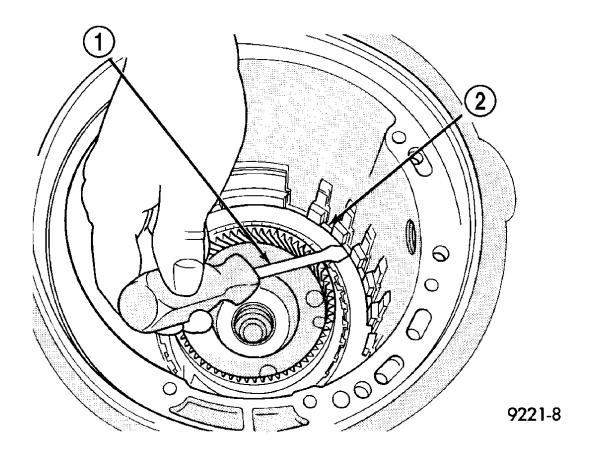


Fig. 41: Installing New Tapered Snap Ring (Tapered Side Out) Courtesy of CHRYSLER LLC

- 1 SCREWDRIVER
- 2 TAPERED SNAP RING (INSTALL AS SHOWN)
- 25. Install a new tapered snap ring (2) (tapered side out). See Fig. 41.

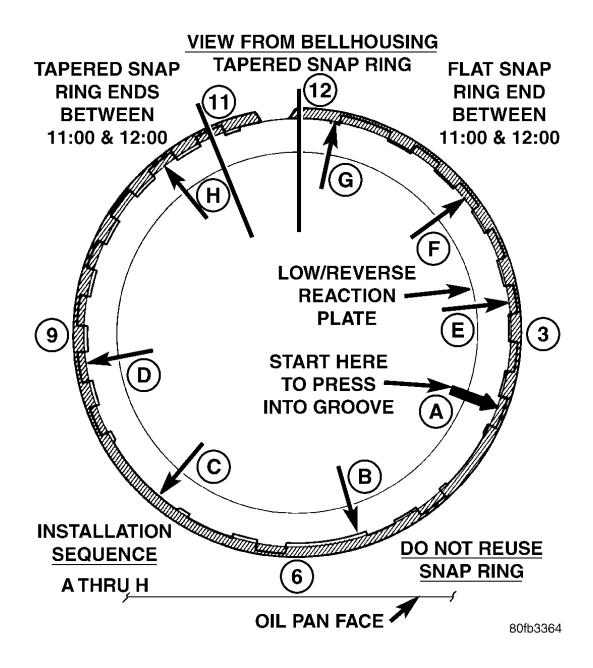


Fig. 42: Proper Snap Ring Orientation Courtesy of CHRYSLER LLC

26. Make sure that the snap ring ends are oriented as shown. See Fig. 42.

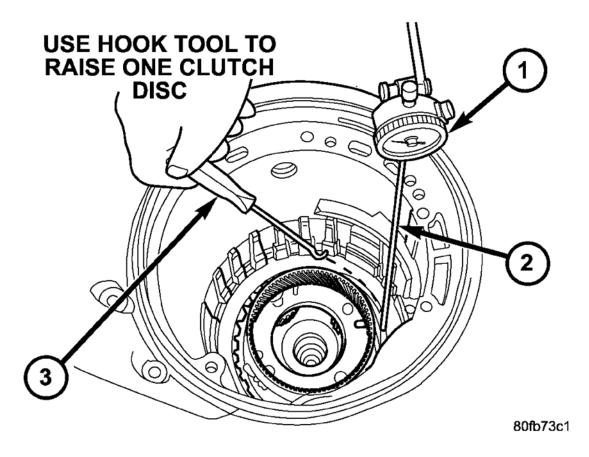


Fig. 43: Checking Low/Reverse Clutch Clearance Courtesy of CHRYSLER LLC

- 1 DIAL INDICATOR
- 2 DIAL INDICATOR TIP TOOL 6268
- 3 HOOK TOOL
- 27. Measure low/reverse clutch pack. Set up dial indicator (1) as shown. Press down clutch pack with finger and zero dial indicator. Record measurement in four (4) places and take average reading. See <u>Fig.</u> <u>43</u>.Low/Reverse clutch pack clearance is 0.84 to 1.60 mm (0.033 to 0.063 inch).
- 28. Select the proper low/reverse reaction plate to achieve specifications.

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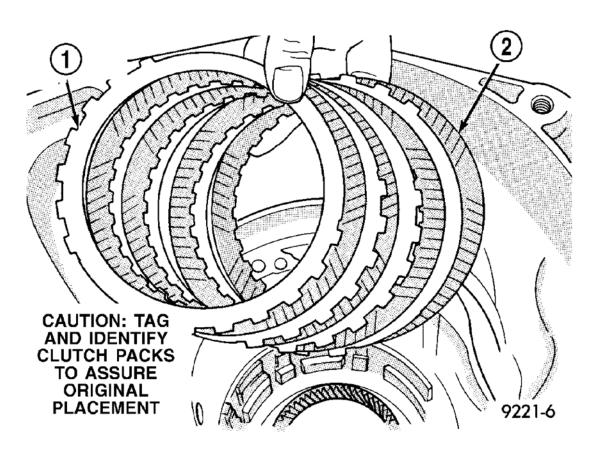


Fig. 44: Installing 2/4 Clutch Pack Courtesy of CHRYSLER LLC

- 1 CLUTCH PLATE (4)
- 2 CLUTCH DISC (4)

29. Install 2/4 clutch pack (1, 2). See **Fig. 44**.

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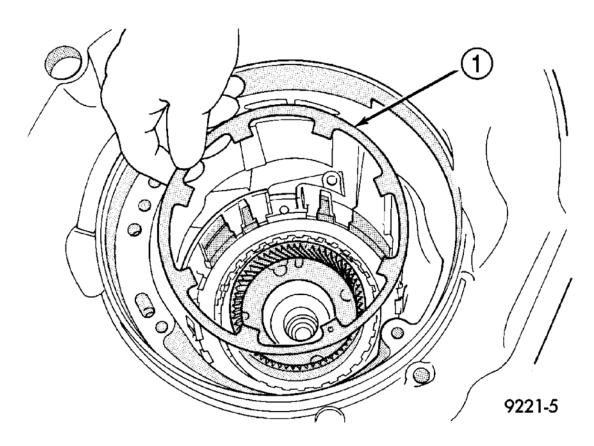


Fig. 45: Installing 2/4 Clutch Belleville Spring Courtesy of CHRYSLER LLC

#### 1 - 2/4 CLUTCH RETURN SPRING

NOTE: The 2/4 Clutch Piston has bonded seals which are not individually serviceable. Seal replacement requires replacement of the piston assembly.

30. Install 2/4 clutch belleville spring (1). See <u>Fig. 45</u>.

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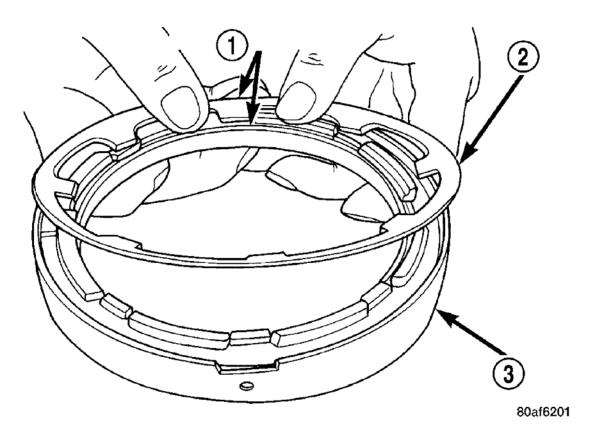
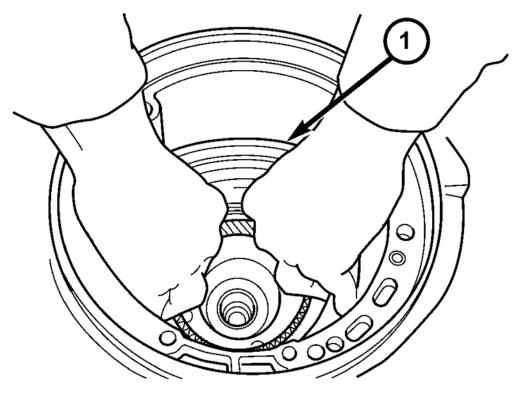


Fig. 46: Verifying Proper Orientation Of Return Spring To 2/4 Retainer Courtesy of CHRYSLER LLC

- 1 NOTE POSITION
- 2 RETURN SPRING
- 3 2/4 CLUTCH RETAINER

31. Verify the proper orientation of the return spring (2) to the 2/4 retainer (3). See **Fig. 46**.

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Fig. 47: Installing 2/4 Clutch Retainer Courtesy of CHRYSLER LLC

## 1 - 2/4 CLUTCH RETAINER

32. Install 2/4 clutch retainer (1). See Fig. 47.

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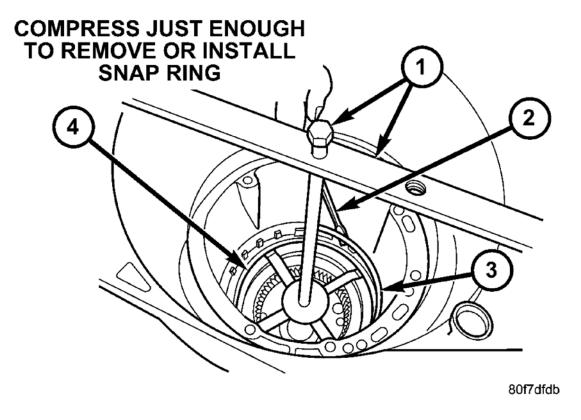


Fig. 48: Compressing 2/4 Clutch Courtesy of CHRYSLER LLC

- 1 TOOL 5058
- 2 SCREWDRIVER
- 3 SNAP RING
- 4 2/4 CLUTCH RETAINER

NOTE:

Verify that Compressor 5058A (1) is centered properly over the 2/4 clutch retainer (4) before compressing. If necessary, fasten the bar from Compressor 5058A to the bellhousing flange with any combination of locking pliers and bolts to center the tool properly.

33. Set up Compressor 5058 (1) as shown. Compress 2/4 clutch just enough to facilitate snap ring installation. See **Fig. 48**.

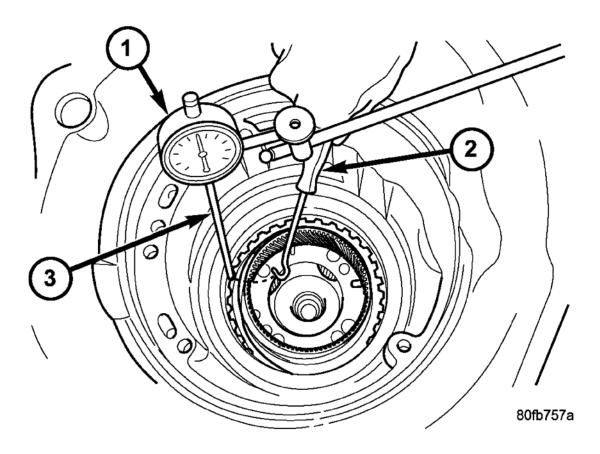
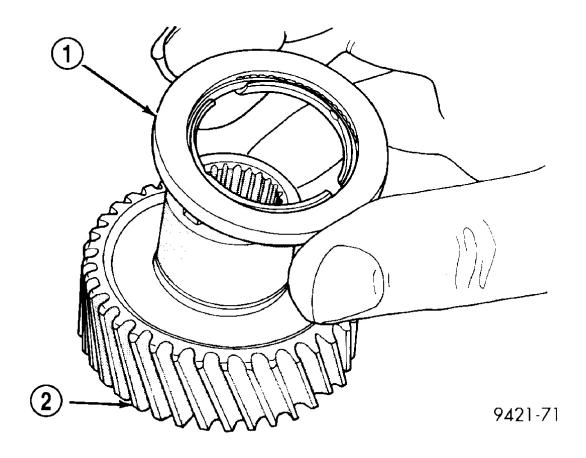


Fig. 49: Checking 2/4 Clutch Clearance Courtesy of CHRYSLER LLC

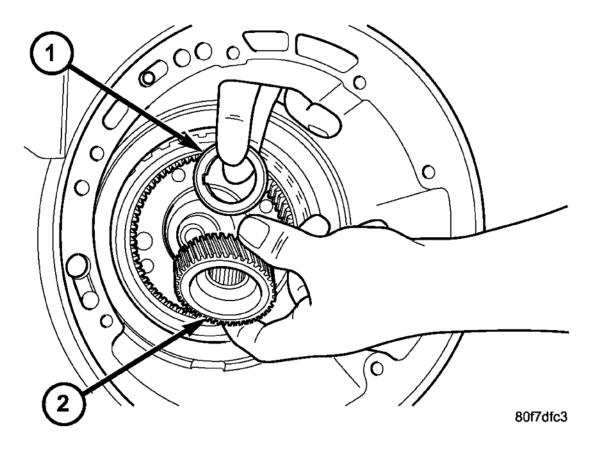
- 1 DIAL INDICATOR
- 2 HOOK TOOL
- 3 DIAL INDICATOR TIP TOOL 6268
- 34. **Measure 2/4 clutch clearance:** Set up dial indicator (1) as shown. Press down clutch pack with finger and zero dial indicator. Record measurement in four (4) places and take average reading. See <u>Fig. 49</u>. The **2/4 clutch pack clearance is 0.76 to 2.64 mm (0.030 to 0.104 inch).** If not within specifications, the clutch is not assembled properly or is excessively worn. **There is no adjustment for the 2/4 clutch clearance.**



<u>Fig. 50: Identifying Rear Sun Gear & No. 7 Needle Bearing</u> Courtesy of CHRYSLER LLC

- 1 #7 BEARING
- 2 REAR SUN GEAR
- 35. Install the #7 needle bearing (1) to the rear sun gear (2). See <u>Fig. 50</u>. The number 7 needle bearing has three antireversal tabs and is common with the number 5 and number 2 position. The orientation should allow the bearing to seat flat against the rear sun gear. A small amount of petrolatum can be used to hold the bearing to the rear sun gear.

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<u>Fig. 51: Installing Rear Sun Gear And #7 Needle Bearing</u> Courtesy of CHRYSLER LLC

- 1 #7 NEEDLE BEARING
- 2 REAR SUN GEAR

36. Install rear sun gear (2) and #7 needle bearing (1). See Fig. 51.

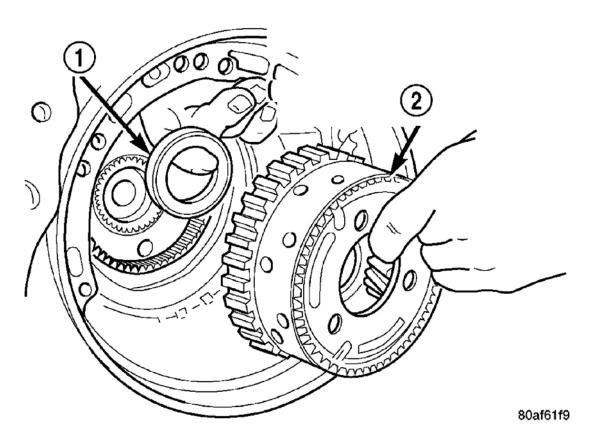
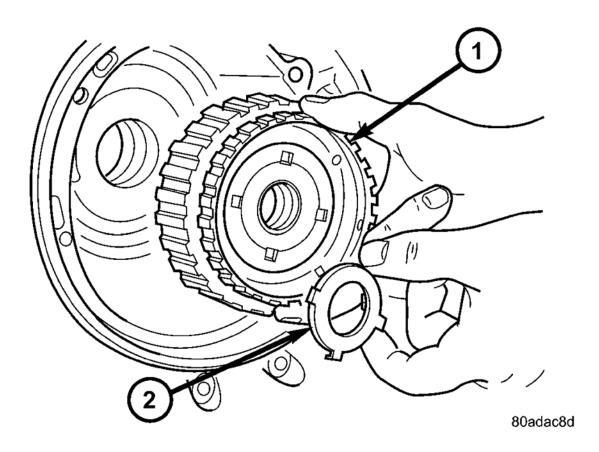


Fig. 52: Installing Front Carrier/Rear Annulus Assembly And #6 Needle Bearing Courtesy of CHRYSLER LLC

- 1 #6 NEEDLE BEARING
- 2 FRONT CARRIER AND REAR ANNULUS ASSEMBLY (TWIST AND PULL OR PUSH TO REMOVE OR INSTALL).
- 37. Install front carrier/rear annulus assembly (2) and #6 needle bearing (1). See Fig. 52.



<u>Fig. 53: Installing Front Sun Gear Assembly And #4 Thrust Washer</u> Courtesy of CHRYSLER LLC

- 1 FRONT SUN GEAR ASSEMBLY
- 2 #4 THRUST WASHER (FOUR TABS)
- 38. Install front sun gear assembly (1) and #4 thrust washer (2). See  $\underline{Fig. 53}$ .

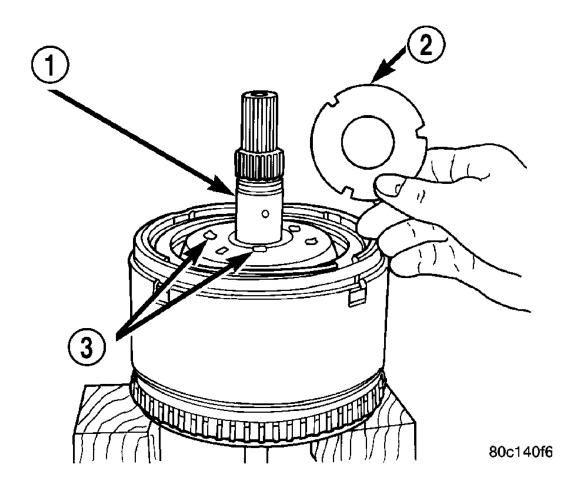


Fig. 54: Installing #4 Thrust Plate Using Petrolatum To Hold Into Position Courtesy of CHRYSLER LLC

- 1 OVERDRIVE SHAFT ASSEMBLY
- 2 #4 THRUST PLATE (SELECT)
- 3 PETROLATUM FOR RETENTION
- 39. Determine proper #4 thrust plate thickness. Select the thinnest available #4 thrust plate.
- 40. Install #4 thrust plate (2) using petrolatum to hold into position. See <u>Fig. 54</u>.
- 41. Install input clutch assembly. Ensure the input clutch assembly is completely seated by viewing position through input speed sensor hole. If the speed sensor tone wheel is not centered in the opening, the input clutches assembly is not seated properly.

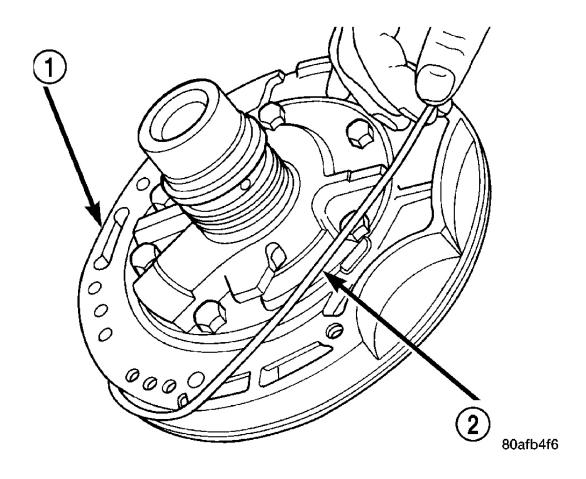
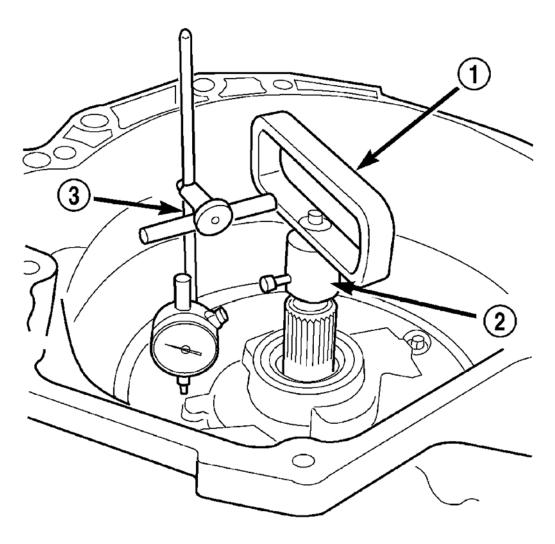


Fig. 55: Removing Oil Pump O-Ring And Installing Oil Pump And Gasket To Transmission Courtesy of CHRYSLER LLC

- 1 OIL PUMP ASSEMBLY
- 2 O-RING
- 42. Remove the oil pump o-ring (2) and install oil pump and gasket to transmission. See <u>Fig. 55</u>.Use screwin dowels or Phillips head screwdrivers to align pump to case. Be sure to reinstall O-ring on oil pump after selecting the proper No. 4 thrust plate.

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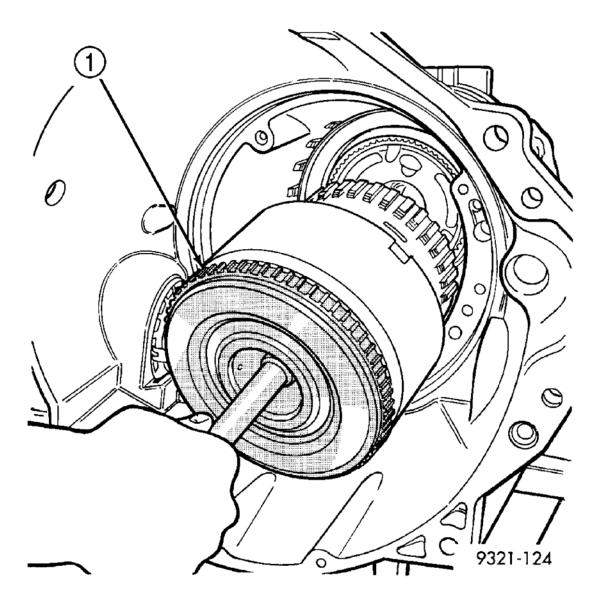


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<u>Fig. 56: Measuring Input Shaft End Play Using End Play Set 8266</u> Courtesy of CHRYSLER LLC

- 1 TOOL 8266-8 2 - TOOL 8266-2 3 - TOOL C-3339A
- 43. Measure the input shaft end play with the transmission in the vertical position. This will ensure that the measurement will be accurate.
- 44. Set up and measure endplay using End Play Set 8266 (1, 2) and Dial Indicator Set C3339A (3) as shown. See **Fig. 56**.
- 45. Measure input shaft end play. **Input shaft end play must be 0.127 to 0.635 mm (0.005 to 0.025 inch).** For example, if end play reading is 0.055 inch, select No. 4 Thrust Plate which is 0.071 to 0.074 thick. This should provide an input shaft end play reading of 0.020 inch, which is within specifications.

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<u>Fig. 57: Installing Input Clutch Assembly With Proper Thrust Plate</u> Courtesy of CHRYSLER LLC

## 1 - INPUT CLUTCH ASSEMBLY

- 46. Remove oil pump, gasket, and input clutch assembly to gain access to and install proper #4 thrust plate.
- 47. Install input clutch assembly (1) with proper thrust plate. See <u>Fig. 57</u>.

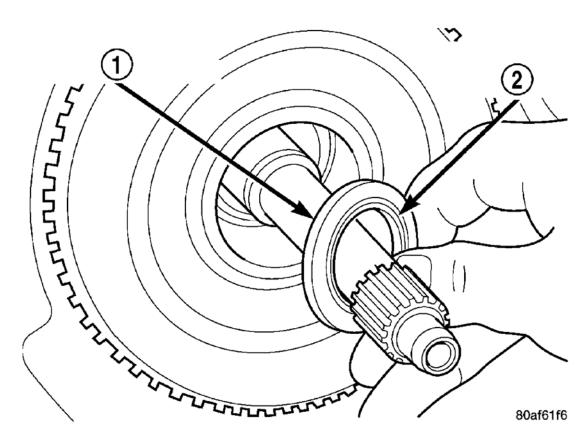
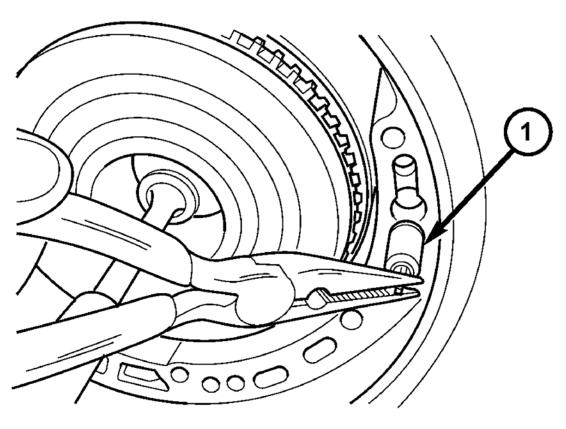


Fig. 58: Installing #1 Caged Needle Bearing Courtesy of CHRYSLER LLC

- 1 #1 CAGED NEEDLE BEARING
- 2 NOTE: TANGED SIDE OUT
- 48. Install #1 caged needle bearing (1). See **Fig. 58**.

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Fig. 59: Replacing Cooler By-Pass Valve Courtesy of CHRYSLER LLC

1 - BYPASS VALVE

**CAUTION:** By-pass valve MUST be replaced if transmission failure occurs.

49. Replace cooler by-pass valve (1) if transmission failure has occurred. See **Fig. 59**.

NOTE: To align oil pump, gasket, and case during installation, use threaded dowels or Phillips screwdrivers.

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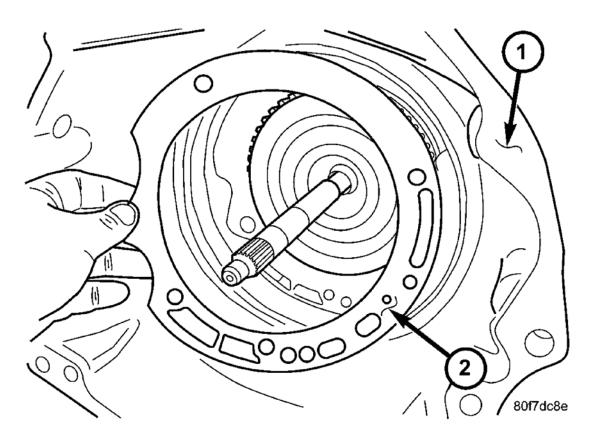
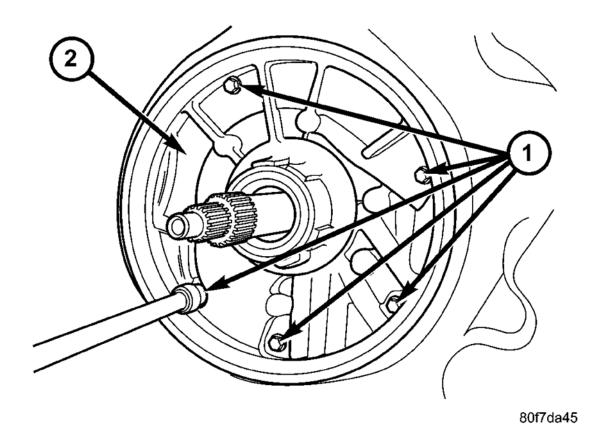


Fig. 60: Installing Oil Pump Gasket Courtesy of CHRYSLER LLC

- 1 BELLHOUSING
- 2 OIL PUMP GASKET

50. Install oil pump gasket (2). See **Fig. 60**.

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<u>Fig. 61: Installing Oil Pump And Torque Oil Pump-To-Case Bolts</u> Courtesy of CHRYSLER LLC

- 1 BOLTS 2 - OIL PUMP
- 51. Install oil pump (2) and torque oil pump-to-case bolts (1) to 30 N.m (265 in. lbs.). Do not reuse original oil pump bolts. See **Fig. 61**.

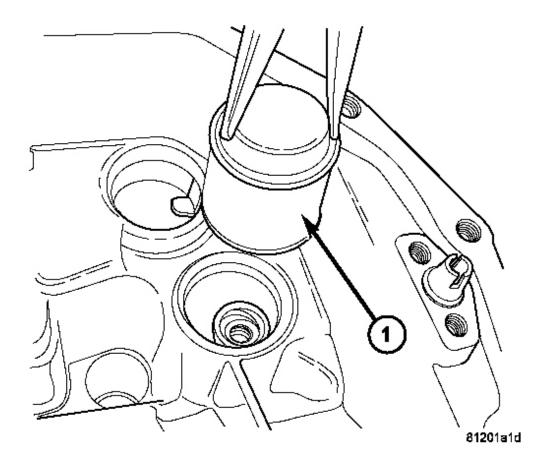
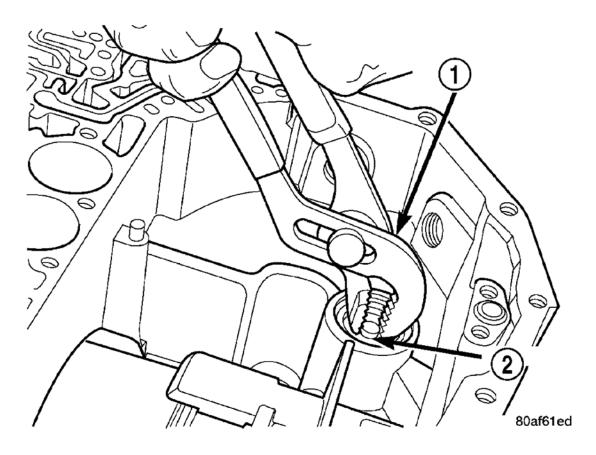


Fig. 62: Installing Low/Reverse Accumulator Courtesy of CHRYSLER LLC

#### 1 - ACCUMULATOR PISTON

52. Install low/reverse accumulator (1) as shown. See Fig. 62.

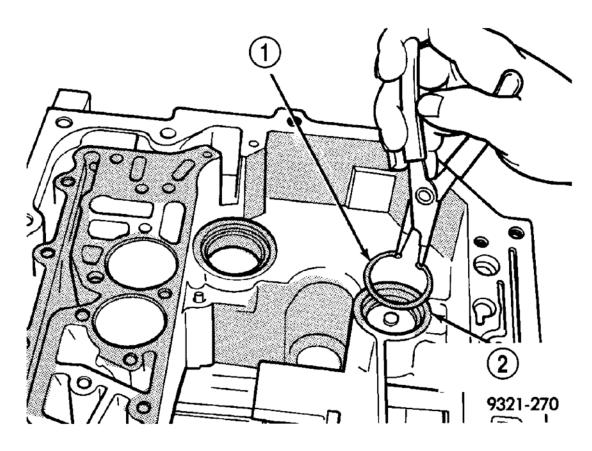
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<u>Fig. 63: Installing Low/Reverse Accumulator Plug</u> Courtesy of CHRYSLER LLC

- 1 ADJUSTABLE PLIERS
- 2 PLUG

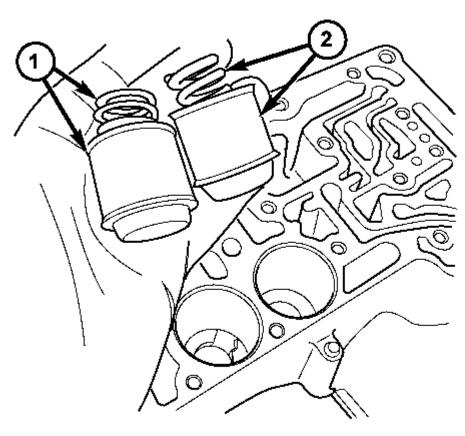
53. Install low/reverse accumulator plug (2). See **Fig. 63**.



<u>Fig. 64: Installing Low/Reverse Accumulator Snap Ring</u> Courtesy of CHRYSLER LLC

- 1 SNAP RING
- 2 LOW/REVERSE ACCUMULATOR
- 54. Install low/reverse accumulator snap ring (1). See <u>Fig. 64</u>.

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Fig. 65: Installing Underdrive And Overdrive Accumulators And Springs Courtesy of CHRYSLER LLC

- 1 OVERDRIVE PISTON AND SPRING
- 2 UNDERDRIVE PISTON AND SPRING
- 55. Install underdrive (2) and overdrive (1) accumulators and springs. See **Fig. 65**.

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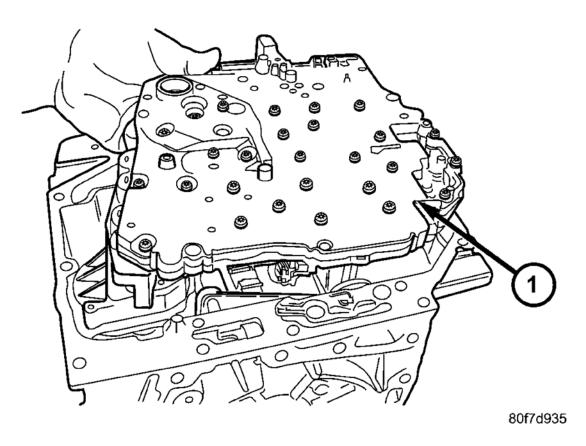


Fig. 66: Removing/Installing Valve Body Courtesy of CHRYSLER LLC

1 - VALVE BODY

CAUTION: Do not handle the valve body by the manual shaft. Damage could result.

56. Install valve body (1) into place as shown. See **Fig. 66**.

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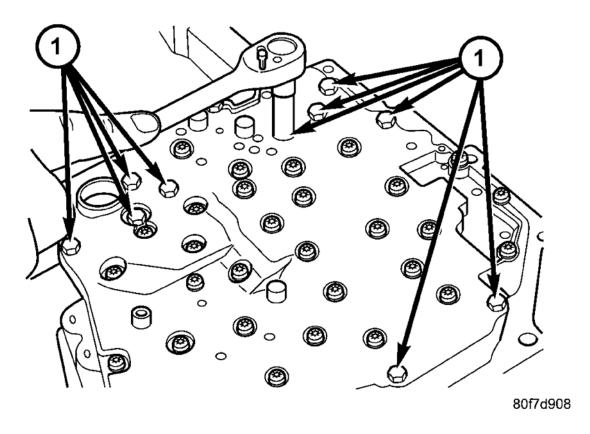


Fig. 67: Removing/Installing Valve Body Bolts Courtesy of CHRYSLER LLC

1 - BOLTS

57. Install seven (7) valve body-to-case bolts (1) and torque to 12 N.m (105 in. lbs.). See Fig. 67.

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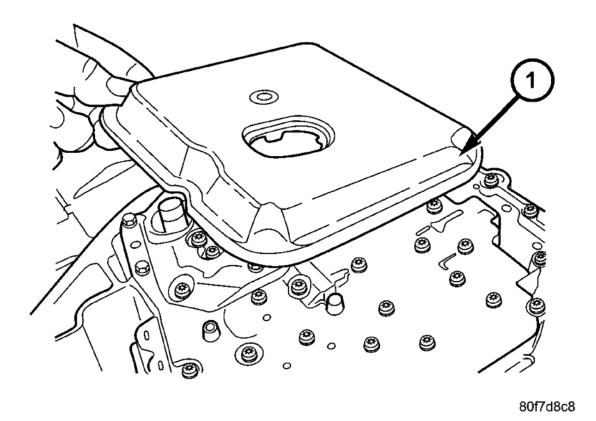
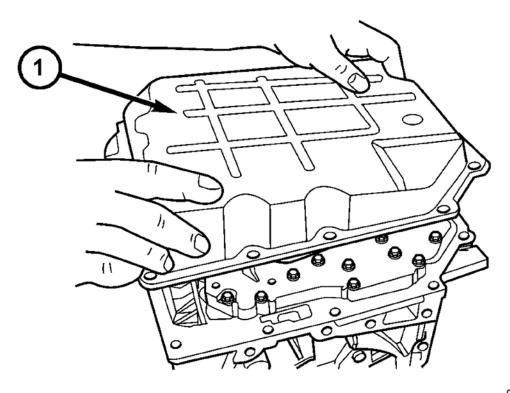


Fig. 68: Removing/Installing Transmission Oil Filter Courtesy of CHRYSLER LLC

1 - TRANSMISSION FILTER

58. Install transmission oil filter (1). See **Fig. 68**. Tighten the bolts to 5 N.m (45 in. lbs.).

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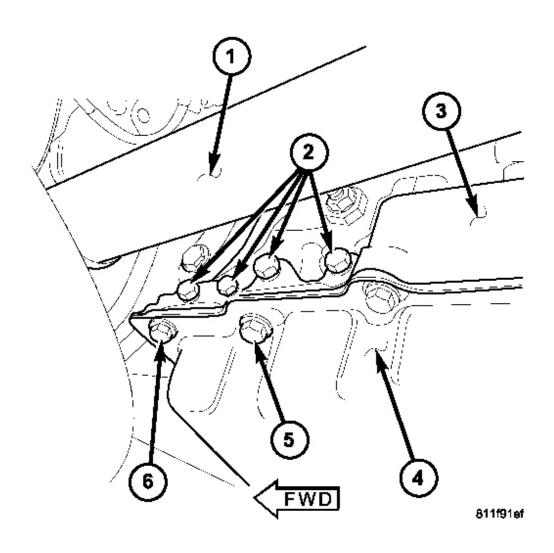


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<u>Fig. 69: Removing/Installing Transmission Oil Pan</u> Courtesy of CHRYSLER LLC

1 - TRANSMISSION OIL PAN

59. Install transmission oil pan (1) with a bead of Mopar® ATF RTV. See Fig. 69.



<u>Fig. 70: Locating Oil Pan Bolts & Pressure Ports</u> Courtesy of CHRYSLER LLC

- 1 FRONT DRIVESHAFT
- 2 PRESSURE PORTS
- 3 TRANSMISSION CASE
- 4 TRANSMISSION OIL PAN
- 5 SECOND TRANSMISSION OIL PAN BOLT ON LEFT SIDE
- 6 FIRST TRANSMISSION OIL PAN BOLT

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NOTE:

Before installing the oil pan bolt in the bolt hole located between the torque converter clutch on and U/D clutch pressure tap circuits, it will be necessary to replenish the sealing patch on the bolt using Mopar® Lock & Seal Adhesive. See Fig. 70.

60. Install and torque the oil pan-to-case bolts to 20 N.m (14.5 ft. lbs.).

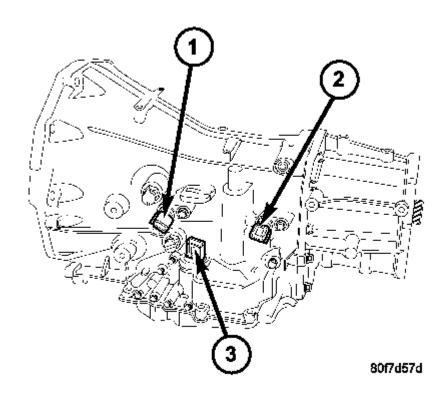


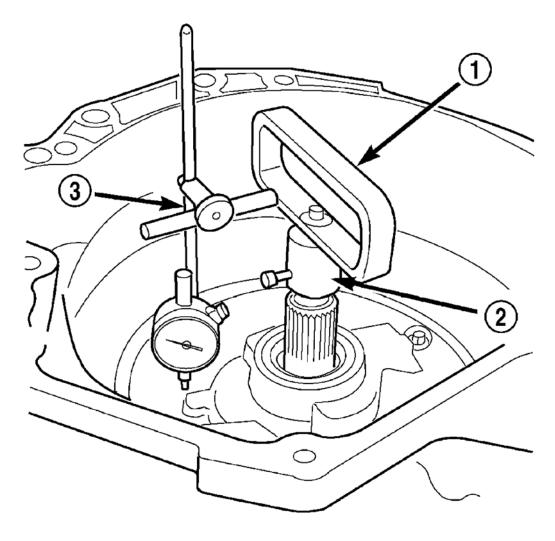
Fig. 71: Locating Input Speed, Output Speed and Transmission Range Sensors Courtesy of CHRYSLER LLC

- 1 INPUT SPEED SENSOR
- 2 OUTPUT SPEED SENSOR
- 3 TRANSMISSION RANGE SENSOR

NOTE: Before installing either speed sensor bolt, it will be necessary to replenish the sealing patch on the bolt using Mopar® Lock & Seal Adhesive.

61. Install both speed sensors (1, 2) into the transmission case. Torque the speed sensor bolts to 9 N.m (80 in.

lbs.). See **Fig. 71**.



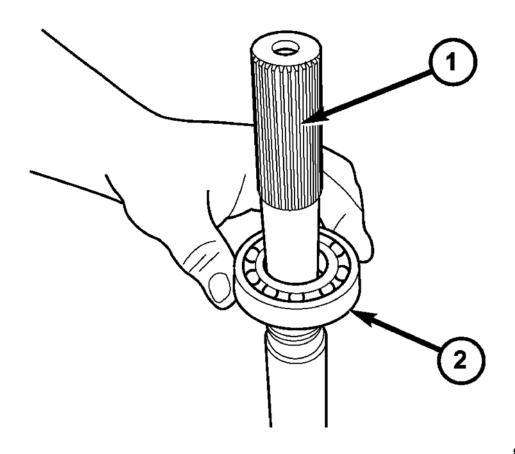
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<u>Fig. 72: Measuring Input Shaft End Play Using End Play Set 8266</u> Courtesy of CHRYSLER LLC

- 1 TOOL 8266-8 2 - TOOL 8266-2 3 - TOOL C-3339A
- 62. As a final check of the transmission, measure the input shaft end play. This will indicate when a #4 thrust plate change is required. The #4 thrust plate is located behind the overdrive clutch hub. Attach a dial indicator C-3339A to transmission bell housing with its plunger seated against end of input shaft. See <u>Fig. 72</u>. Install tool 8266-2 (2), 8266-8 (1) and move input shaft in and out to obtain end play reading. **Input shaft end play must be 0.127 to 0.635 mm (0.005 to 0.025 inch).** If not within specifications, make the necessary thrust plate adjustment.

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63. On 4X2 transmissions, perform the following, if necessary:

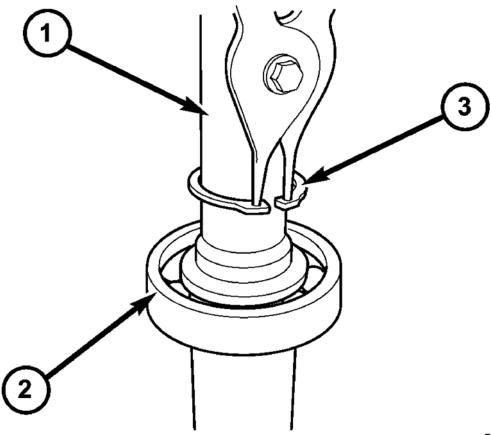


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Fig. 73: Removing/Installing Extension Shaft Bearing Courtesy of CHRYSLER LLC

- 1 EXTENSION SHAFT
- 2 BEARING
  - Install the extension shaft bearing (2) onto the extension shaft. See <u>Fig. 73</u>.

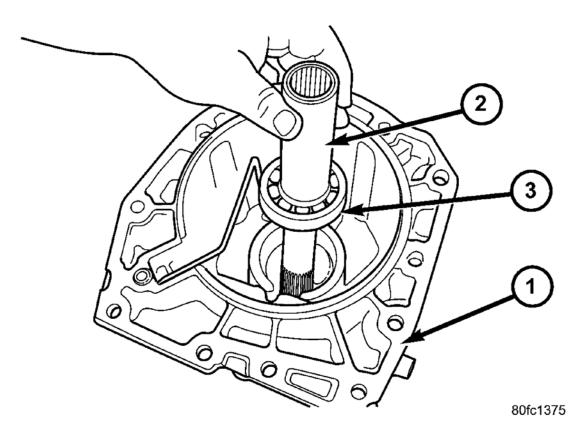
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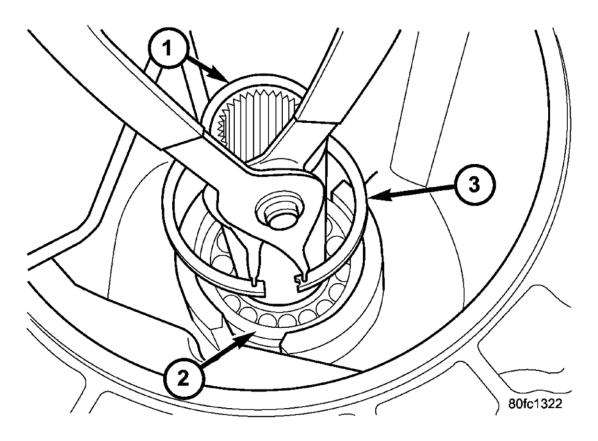
 $\frac{\textbf{Fig. 74: Removing/Installing Extension Shaft Bearing Retaining Ring}}{\textbf{Courtesy of CHRYSLER LLC}}$ 

- 1 EXTENSION SHAFT
- 2 BEARING
- 3 RETAINING RING
- Install the extension shaft bearing retaining ring (3) onto the extension shaft (1). See <u>Fig. 74</u>.



<u>Fig. 75: Installing Extension Shaft And Bearing Assembly Into Extension Housing</u> Courtesy of CHRYSLER LLC

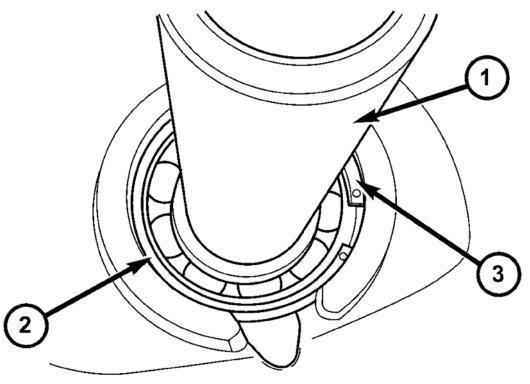
- 1 EXTENSION HOUSING
- 2 EXTENSION SHAFT
- 3 BEARING
- Install the extension shaft (2) and bearing assembly (3) into the extension housing (1). See <u>Fig. 75</u>.



<u>Fig. 76: Installing Extension Shaft Bearing Snap Ring Into Extension Housing</u> Courtesy of CHRYSLER LLC

- 1 EXTENSION SHAFT
- 2 BEARING
- 3 SNAP RING
- Install the extension shaft bearing snap ring (3) into the extension housing. See <u>Fig. 76</u>.

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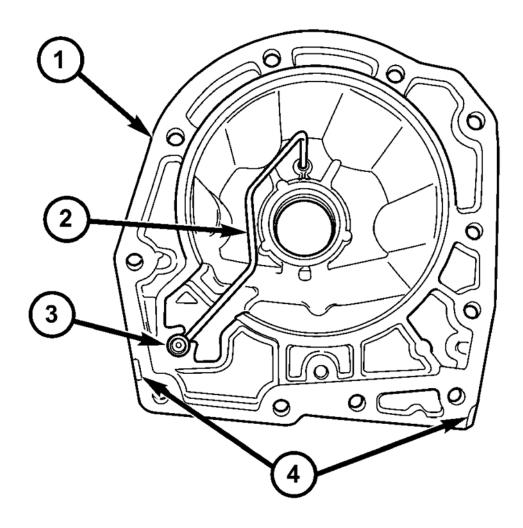


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<u>Fig. 77: Identifying Extension Shaft, Bearing & Snap Ring</u> Courtesy of CHRYSLER LLC

- 1 EXTENSION SHAFT
- 2 BEARING
- 3 SNAP RING
- Verify that the extension shaft snap ring (3) is fully engaged in the snap ring groove. See <u>Fig. 77</u>.

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Fig. 78: Inspecting Lube Tube Grommet For Damage Courtesy of CHRYSLER LLC

- 1 HOUSING
- 2 LUBE TUBE
- 3 GROMMET
- 4 PRY SLOTS
- 64. Inspect the lube tube grommet (2) for damage. If the grommet lip is damaged, it will need to be replaced. See **Fig. 78**.

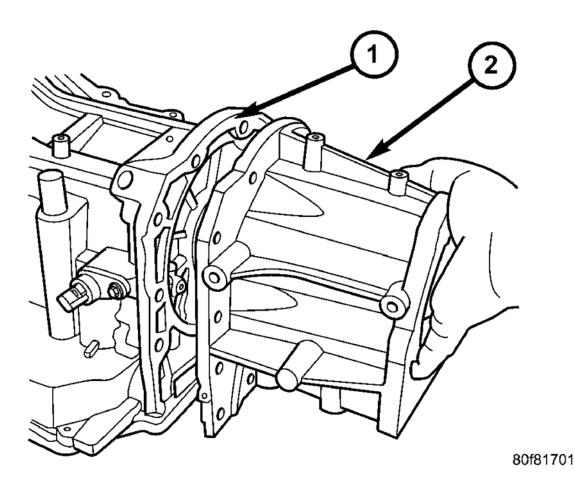
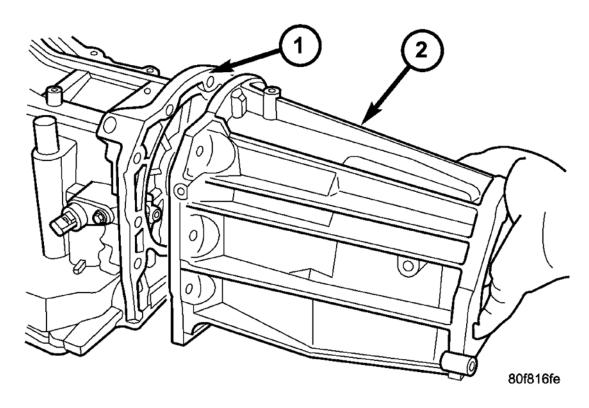


Fig. 79: Installing Adapter Housing Onto Transmission Case Courtesy of CHRYSLER LLC

- 1 TRANSMISSION CASE
- 2 ADAPTER HOUSING
- 65. Install the 4X4 stub shaft onto the transmission output shaft.
- 66. Place a bead of Mopar® ATF RTV on the rear surface of the transmission case for the adapter/extension housing.
- 67. Install the adapter housing (2) onto the transmission case, 4X4 vehicles only. See Fig. 79.

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<u>Fig. 80: Installing Extension Housing Onto Transmission Case</u> Courtesy of CHRYSLER LLC

- 1 TRANSMISSION CASE
- 2 EXTENSION HOUSING

68. Install the extension housing (2) onto the transmission case, 4X2 vehicles only. See **Fig. 80**.

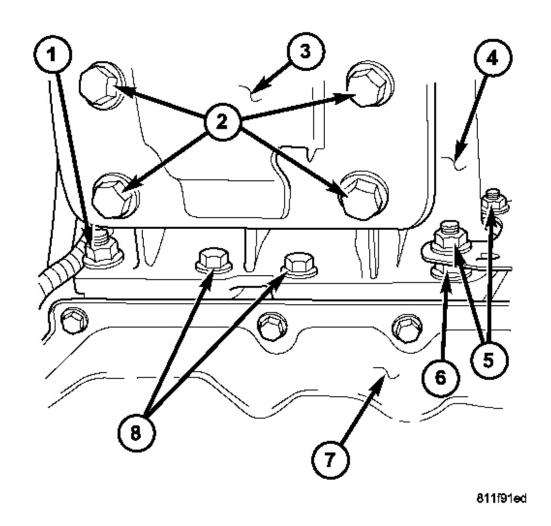


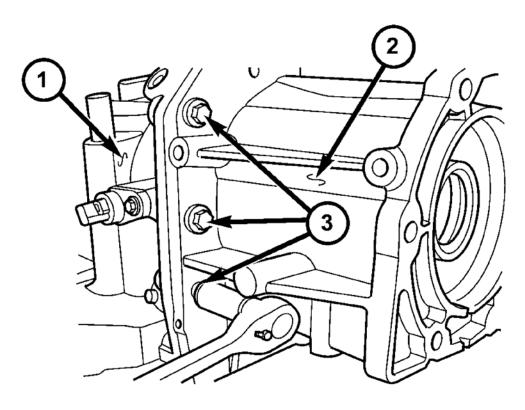
Fig. 81: Adapter Housing Fasteners Courtesy of CHRYSLER LLC

- 1 STUD, ADAPTER/EXTENSION
- 2 TRANSMISSION MOUNT FASTENERS (4)
- 3 TRANSMISSION MOUNT
- 4 TRANSMISSION CASE
- 5 NUT, EXHAUST HANGER BRACKET (2)
- 6 STUD, ADAPTER/EXTENSION
- 7 TRANSMISSION OIL PAN
- 8 BOLT, ADAPTER/EXTENSION (2)

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NOTE:

Before installing the lowermost four adapter/extension housing bolts, it will be necessary to replenish the sealing patch on the bolts using Mopar® Lock & Seal Adhesive.



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Fig. 82: Installing Adapter Housing Bolts Courtesy of CHRYSLER LLC

- 1 TRANSMISSION CASE
- 2 ADAPTER HOUSING
- 3 BOLTS
- 69. Install the bolts that hold the adapter or extension housing onto the transmission case. Be sure to install any stud bolts to their original locations. Tighten the bolts to 54 N.m (40 ft.lbs.). See **Fig. 82**.