2007 TRANSFER CASE MP140 - Service Information - Nitro

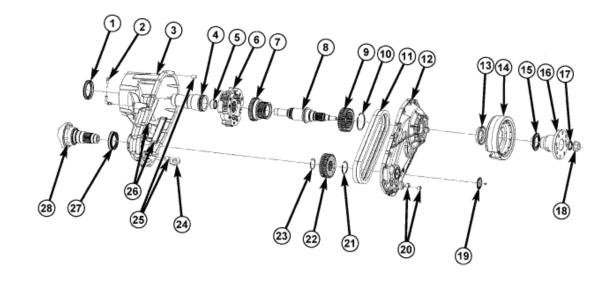
2007 TRANSFER CASE

MP140 - Service Information - Nitro

MP140 - SERVICE

DESCRIPTION

TRANSFER CASE - MP140



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Fig. 1: Transfer Case - MP140 Exploded View Courtesy of CHRYSLER LLC

1 - INPUT SEAL	15 - WEAR SLEEVE
2 - VENT	16 - FLANGE
3 - FRONT CASE	17 - FLANGE SEAL
4 - INPUT GEAR	18 - FLANGE NUT
5 - PILOT BEARING	19 - ID. TAG
6 - PLANETARY GEAR	20 - DRAIN/FILL PLUGS
7 - SPROCKET GEAR	21 - RETAINING RING
8 - MAINSHAFT	22 - DRIVEN SPROCKET
9 - DRIVE SPROCKET	23 - RETAINING RING
10 - SNAP RING	24 - MAGNET
11 - CHAIN	25 - DOWELS

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12 - REAR CASE	26 - CHAIN GUIDES
13 - SEAL	27 - FRONT OUTPUT SEAL
14 - DAMPENER	28 - FRONT OUTPUT SHAFT

With an automatic transmission, the MP 140 single-speed transfer case is used in Nitro's new Full-Time Four-Wheel Drive System. It provides convenient full-time four-wheel drive operation and functions seamlessly with Nitro's standard Traction Control and ESP (Electronic Stability Program) features to provide enhanced traction and stability on low-traction surfaces. The MP designation refers to Magna Powertrain, the successor to New Venture Gear.

The MP140 single-speed transfer case provides the following benefits:

Convenient operation: No shift lever or driver interaction required.

Smooth operation and vehicle stability under all conditions because torque is constantly being shared among all wheels.

Traction to maintain forward motion under most conditions through 48 front/52 rear percent torque distribution.

Enhanced traction and stability provided by the Traction Control and Electronic Stability Program (ESP) working in tandem with full-time four-wheel-drive. Traction Control and ESP provide resistance to any wheel that is slipping to allow additional torque transfer to wheels with traction.

Robust design and sealing for reliability.

No maintenance required.

OPERATION

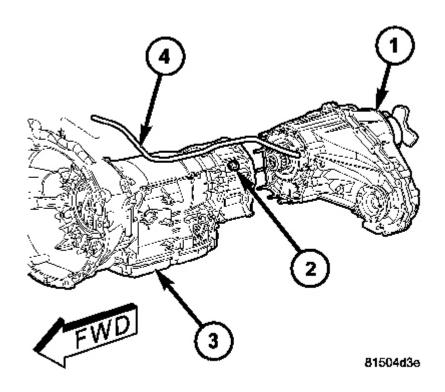
TRANSFER CASE - MP140

Full-time 4-wheel drive distributes torque to all wheels under normal driving conditions. The transfer case uses an open (unlocked) center differential to divide engine torque nearly evenly between the front and rear axles - 48 percent to the front axle and 52 percent to the rear axle. The open differential allows the front and rear drive shafts to rotate at different speeds to account for front and rear wheels traveling different distances when turning. Because the drive shafts can rotate at different speeds, the vehicle can remain in full-time 4-wheel drive mode continuously - even on dry pavement - without threat of damage to the drive train. The standard-equipment ESP, which combines ABS, Traction Control, and Electronic Roll Mitigation, enhances traction by modulating torque among all wheels as necessary - providing resistance to any wheel that is slipping while allowing torque to flow to the wheels with traction.

REMOVAL

TRANSFER CASE - MP140

2007 TRANSFER CASE MP140 - Service Information - Nitro



<u>Fig. 2: Identifying MP140 Transfer Case, Nuts, Transmission & Transfer Case Vent Tube</u> Courtesy of CHRYSLER LLC

- 1 MP140 TRANSFER CASE
- 2 NUTS
- 3 TRANSMISSION
- 4 TRANSFER CASE VENT TUBE
 - 1. Raise vehicle.

CAUTION: Do not allow propshafts to hang at attached end. Damage to joint can result.

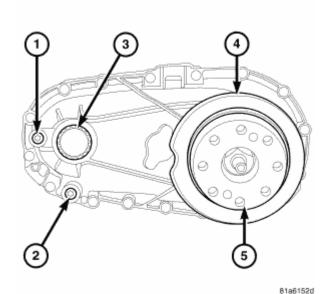
- 2. Remove the front and rear propeller shafts. Refer to **REMOVAL** .
- 3. Support transmission with jack stand.
- 4. Remove rear crossmember and skid plate, if equipped.
- 5. Disconnect transfer case vent hose (4). See <u>Fig. 2</u>.

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- 6. Disconnect the wiring connector from the shift motor, if necessary.
- 7. Support transfer case with transmission jack and secure with chains.
- 8. Remove nuts (2) attaching transfer case (1) to transmission (3).
- 9. Pull transfer case and jack rearward to disengage transfer case.
- 10. Remove transfer case from under vehicle.

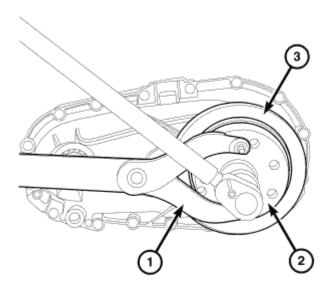
DISASSEMBLY

TRANSFER CASE-MP140



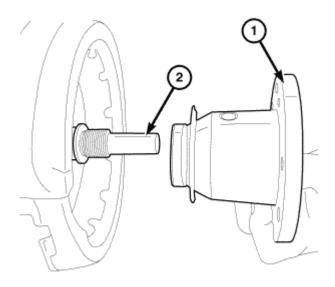
<u>Fig. 3: Identifying Fill Plug, Drain Plug, ID Tag, Dampener & Output Shaft Flange</u> Courtesy of CHRYSLER LLC

- 1 FILL PLUG
- 2 DRAIN PLUG
- 3 ID TAG
- 4 DAMPENER
- 5 OUTPUT SHAFT FLANGE
 - 1. Position transfer case on shallow drain pan. Remove drain plug (2) and drain lubricant.



<u>Fig. 4: Identifying Holder Tool, Output shaft Flange & Dampener</u> Courtesy of CHRYSLER LLC

- 1 HOLDER TOOL C-3281
- 2 OUTPUT SHAFT FLANGE
- 3 DAMPENER
- 2. Using Holder C-3281 (1), remove the rear output flange nut.

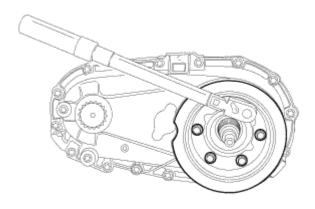


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<u>Fig. 5: Identifying Output Shaft Flange & Main Shaft</u> Courtesy of CHRYSLER LLC

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- 1 OUTPUT SHAFT FLANGE
- 2 MAIN SHAFT
- 3. Remove the rear output shaft flange (1) from the main shaft (2). If flange is difficult to remove by hand, remove it with bearing splitter, or with standard two jaw puller. Be sure puller tool is positioned securely on flange.



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<u>Fig. 6: Removing/Installing Rear Output Shaft Flange From Main Shaft Courtesy of CHRYSLER LLC</u>

- 1 DAMPENER BOLTS
- 2 REAR CASE
- 4. Remove the bolts holding the dampener to the rear case.

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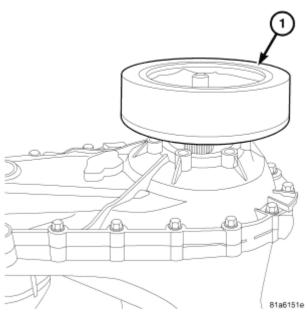


Fig. 7: Identifying Dampener Courtesy of CHRYSLER LLC

1 - DAMPENER

5. Remove the dampener (1) from the rear case.

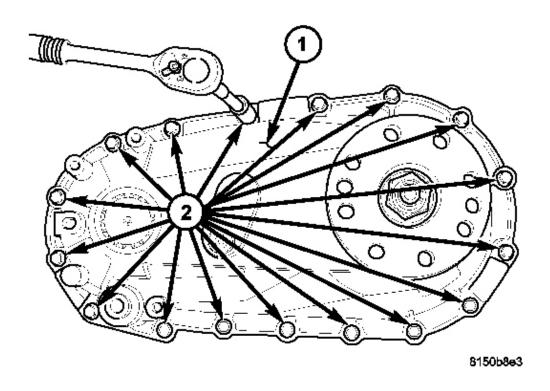


Fig. 8: Removing/Installing Rear Housing Bolts Courtesy of CHRYSLER LLC

- 1 REAR HOUSING
- 2 BOLTS
- 3 FRONT HOUSING
- 6. Support transfer case so rear case is facing upward and the input gear is not contacting the work surface.
- 7. Remove bolts (2) holding front case to rear case (1).

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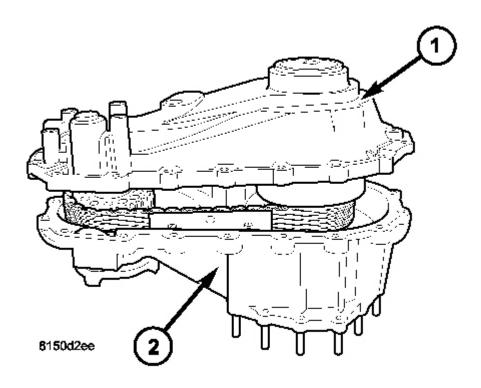


Fig. 9: Removing/Installing Rear & Front Housing Courtesy of CHRYSLER LLC

- 1 REAR HOUSING
- 2 FRONT HOUSING

NOTE: Be careful not to damage the front and rear case sealing surfaces.

- 8. Loosen rear case with a case splitter or suitable tool to break sealer bead. Insert case splitter or suitable tool only into notches provided at each end of case.
- 9. Remove rear case (1) from front case (2).

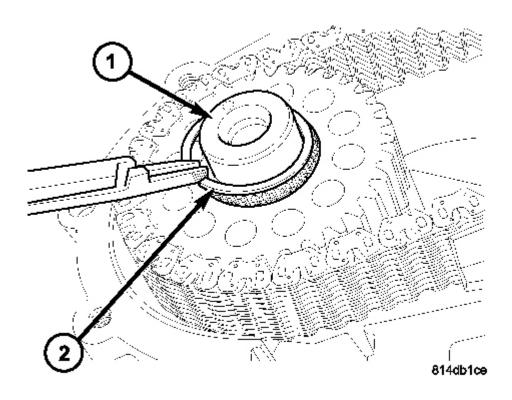
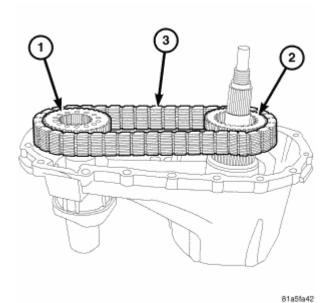


Fig. 10: Identifying Front Output Shaft & Retaining Ring Courtesy of CHRYSLER LLC

- 1 FRONT OUTPUT SHAFT
- 2 RETAINING RING
- 10. Remove mainshaft drive sprocket retaining ring.
- 11. Remove front output shaft drive sprocket retaining ring (2) from the front output shaft (1). See <u>Fig. 10</u>.



<u>Fig. 11: Identifying Front Drive Sprocket, Mainshaft Drive Sprocket & Drive Chain</u> Courtesy of CHRYSLER LLC

- 1 FRONT DRIVE SPROCKET
- 2 MAINSHAFT DRIVE SPROCKET
- 3 DRIVE CHAIN
- 12. Remove the drive sprockets (1, 2) and the drive chains (3) as one.

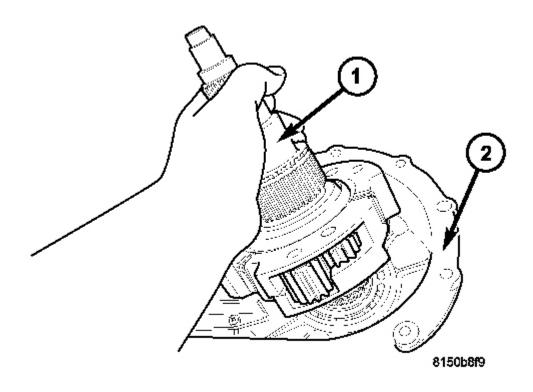
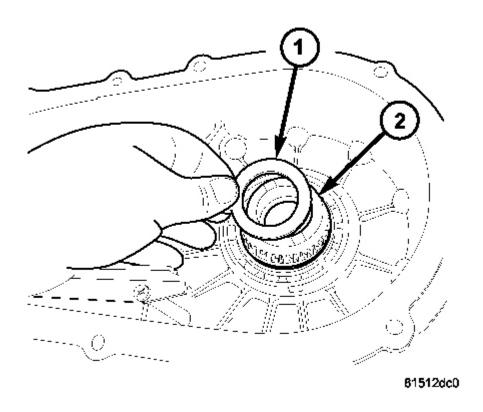


Fig. 12: Removing/Installing Mainshaft & Differential Assembly Courtesy of CHRYSLER LLC

- 1 MAINSHAFT AND DIFFERENTIAL ASSEMBLY
- 2 FRONT HOUSING
- 13. Remove the mainshaft and differential assembly (1) from the front case (2).

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<u>Fig. 13: Removing/Installing Input Gear Thrust Washer</u> Courtesy of CHRYSLER LLC

- 1 THRUST WASHER
- 2 INPUT GEAR

14. Remove the input gear thrust washer (1) from the input gear (2).

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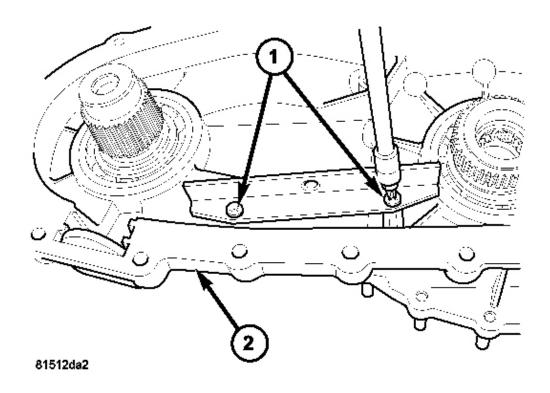


Fig. 14: Remove/Install Chain Guide Screws Courtesy of CHRYSLER LLC

- 1 SCREWS
- 2 FRONT CASE

15. Remove the screws (1) holding both chain guide rails to the front case (2).

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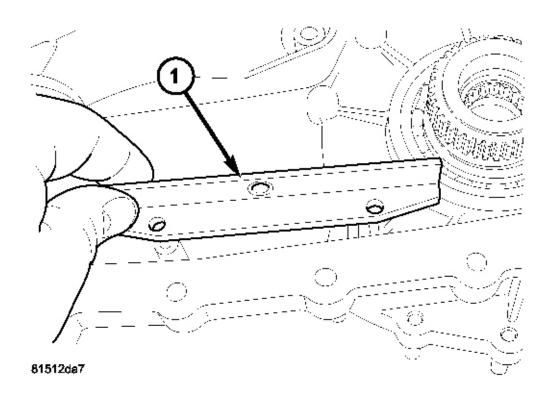


Fig. 15: Remove/Install Chain Guide Courtesy of CHRYSLER LLC

1 - DRIVE CHAIN GUIDE

16. Remove both drive chain guide rails(1) from the transfer case.

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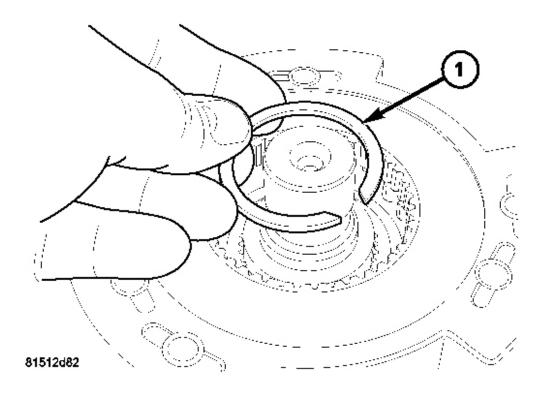


Fig. 16: Removing/Installing Differential Snap-Ring Courtesy of CHRYSLER LLC

1 - DIFFERENTIAL SNAP-RING

17. Remove the differential snap-ring (1).

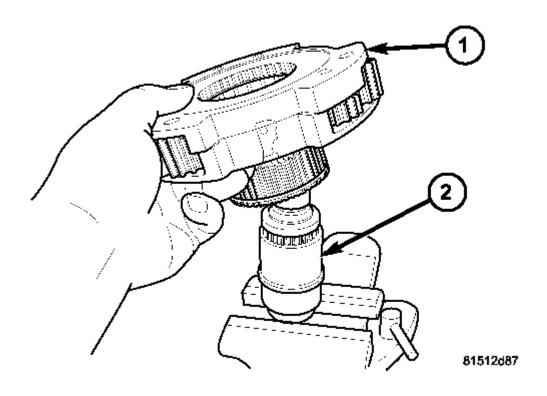
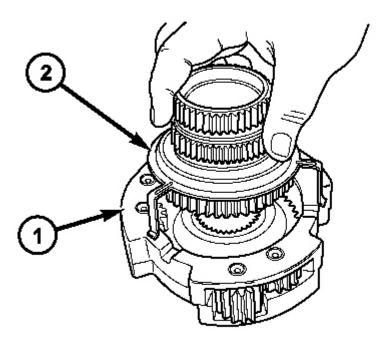


Fig. 17: Removing/Installing Differential Courtesy of CHRYSLER LLC

- 1 DIFFERENTIAL ASSEMBLY
- 2 MAINSHAFT
- 18. Remove the differential assembly (1) from the mainshaft (2).

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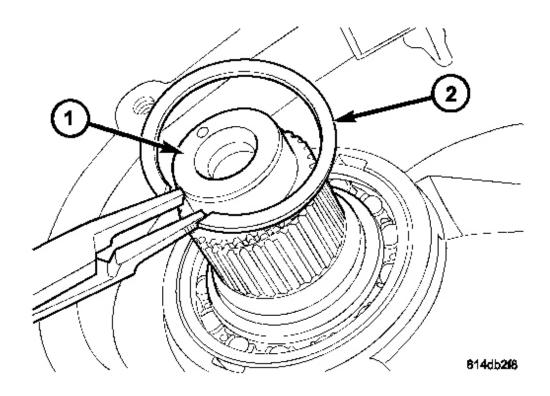


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<u>Fig. 18: Removing/Installing Mode Hub and Retainer</u> Courtesy of CHRYSLER LLC

1 - DIFFERENTIAL ASSEMBLY

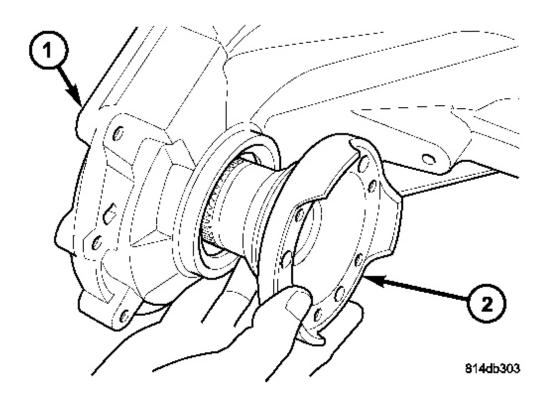
- 19. Remove the mode hub (2) and mode hub retainer from the differential assembly (1).
- 20. Remove the mode hub retainer (2) from the mode hub (1).



<u>Fig. 19: Remove/Install Front Output Shaft Retaining Ring</u> Courtesy of CHRYSLER LLC

- 1 FRONT OUTPUT SHAFT
- 2 RETAINING RING
- 21. Remove the retaining ring (2) from the front output shaft (1).

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<u>Fig. 20: Installing Front Output Shaft Assembly Into Front Case And Front Output Shaft Front Bearing</u>

Courtesy of CHRYSLER LLC

- 1 FRONT HOUSING
- 2 FRONT OUTPUT SHAFT
- 22. Remove the front output shaft assembly (2) from the front case (1) and the front output shaft front bearing.
- 23. Remove the front output shaft seal with a suitable pry tool or a screw mounted in a slide hammer.

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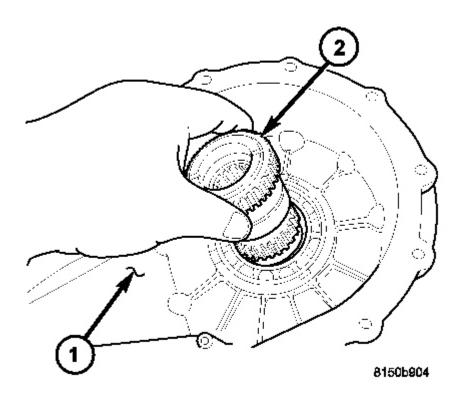


Fig. 21: Removing/Installing Input Gear Courtesy of CHRYSLER LLC

- 1 FRONT HOUSING
- 2 INPUT GEAR
- 24. Remove the input gear (2) from the front case (1).
- 25. Remove the input shaft seal with a suitable pry tool or a screw mounted in a slide hammer.

CLEANING

CLEANING-TRANSFER CASE MP140

The use of crocus cloth is permissible where necessary, providing it is used carefully. When used on shafts, or valves, use extreme care to avoid rounding off sharp edges. Sharp edges are vital as they prevent foreign matter from getting between the valve and valve bore.

Do not reuse oil seals, gaskets, seal rings, or O-rings during overhaul. Replace these parts as a matter of course.

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Also do not reuse snap rings or E-clips that are bent or distorted. Replace these parts as well.

Lubricate transfer case parts with Mopar® ATF+4 ATF, Automatic Transmission Fluid, during overhaul and assembly. Use petroleum jelly to prelubricate seals, O-rings, and thrust washers. Petroleum jelly can also be used to hold parts in place during reassembly.

Clean the case in a solvent tank. Flush the case bores and fluid passages thoroughly with solvent. Dry the case and all fluid passages with compressed air. Be sure all solvent is removed from the case and that all fluid passages are clear.

NOTE:

Do not use shop towels or rags to dry the case (or any other transmission component) unless they are made from lint-free materials. Lint will stick to case surfaces and transmission components and circulate throughout the transmission after assembly. A sufficient quantity of lint can block fluid passages and interfere with valve body operation.

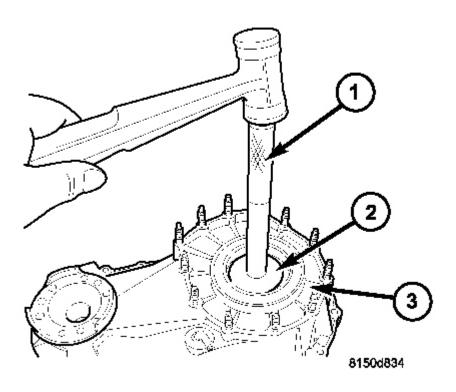
INSPECTION

INSPECTION-TRANSFER CASE MP140

Inspect the case for cracks, porous spots, worn bores, or damaged threads. Damaged threads can be repaired with Helicoil® thread inserts. However, the case will have to be replaced if it exhibits any type of damage or wear.

ASSEMBLY

ASSEMBLY-TRANSFER CASE - MP140



<u>Fig. 22: Removing Input Shaft Bearing From Front Case With Handle C-4171 And Installer 8693A</u> Courtesy of CHRYSLER LLC

- 1 HANDLE C-4171
- 2 INSTALLER 8693A
- 3 FRONT HOUSING
 - 1. Remove the input shaft bearing from the front case (3) with Handle C-4171 (1) and Installer 8693A (2).

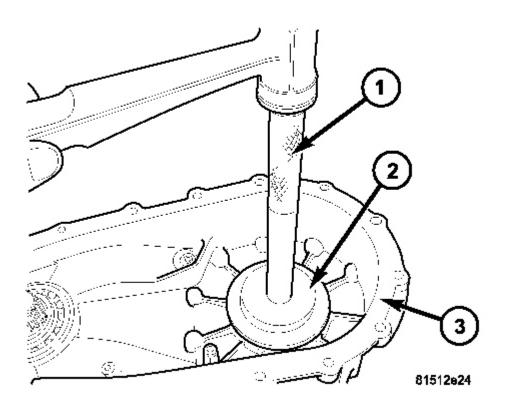
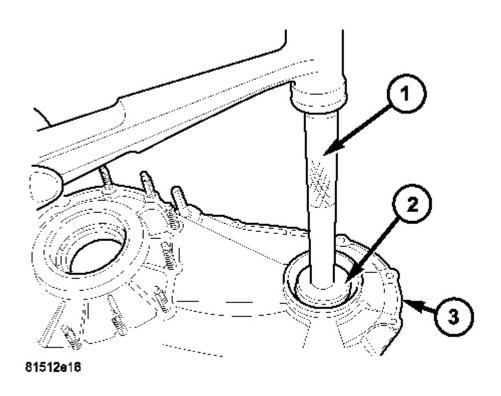


Fig. 23: Installing New Input Gear Bearing Into Front Case Using Installer 8152, Inverted, And **Handle C-4171 Courtesy of CHRYSLER LLC**

- 1 INPUT GEAR BEARING
- 2 FRONT CASE
- 2. Install the new input gear bearing into the front case (3) using Installer 8152 (2), inverted, and Handle C-4171 (1).

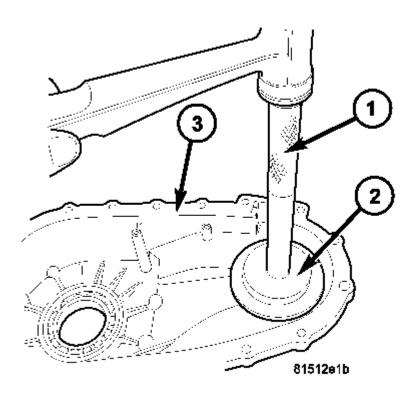
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<u>Fig. 24: Using Installer 7829A And Handle C-4171 To Remove Front Output Shaft Bearing From Front Case</u>

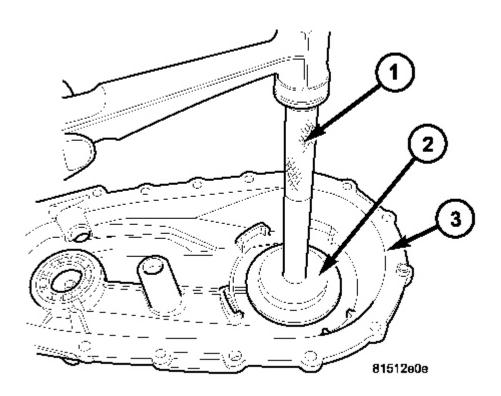
Courtesy of CHRYSLER LLC

- 1 HANDLE C-4171
- 2 INSTALLER 7829A
- 3 FRONT HOUSING
- 3. Using Installer 7829A (2) and Handle C-4171 (1), remove front output shaft bearing from the front case (3).



<u>Fig. 25: Using Installer 8152, Inverted, And Handle C-4171 To Seat Bearing In Front Case</u> Courtesy of CHRYSLER LLC

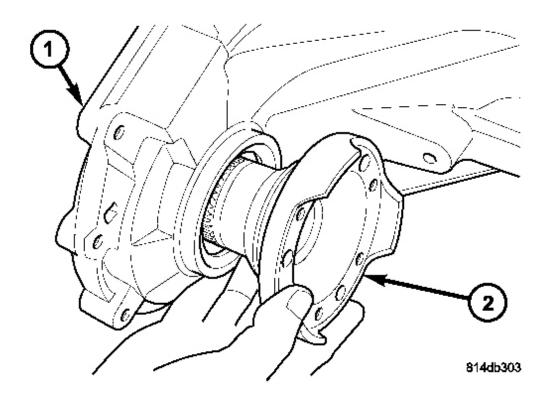
- 1 HANDLE C-4171
- 2 INSTALLER 8152
- 3 FRONT HOUSING
- 4. Start front output shaft bearing in the front case. Using Installer 8152 (2), inverted, and Handle C-4171 (1), seat the bearing in the front case (3).



<u>Fig. 26: Installing New Main Shaft Rear Bearing Into Rear Case Using Installer 8152, Inverted, And Handle C-4171</u>
Courtesy of CHRYSLER LLC

- 1 HANDLE C-4171
- 2 INSTALLER 8152
- 3 REAR HOUSING
- 5. Remove the main shaft rear bearing from the rear case using Installer 5066 and Handle C-4171.
- 6. Install the new main shaft rear bearing into the rear case (3) using Installer 8152 (2), inverted, and Handle C-4171 (1).
- 7. Install a new rear output seal into the rear case with Installer C-3972A.

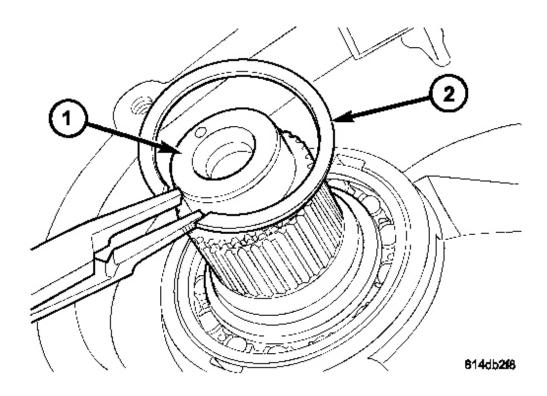
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<u>Fig. 27: Installing Front Output Shaft Assembly Into Front Case And Front Output Shaft Front Bearing</u>

Courtesy of CHRYSLER LLC

- 1 FRONT HOUSING
- 2 FRONT OUTPUT SHAFT
- 8. Install a new front output shaft seal with Installer 6560.
- 9. Install the front output shaft assembly (2) into the front case (1) and the front output shaft front bearing.



<u>Fig. 28: Remove/Install Front Output Shaft Retaining Ring</u> Courtesy of CHRYSLER LLC

- 1 FRONT OUTPUT SHAFT
- 2 RETAINING RING
- 10. Install the retaining ring (2) onto the front output shaft (1).

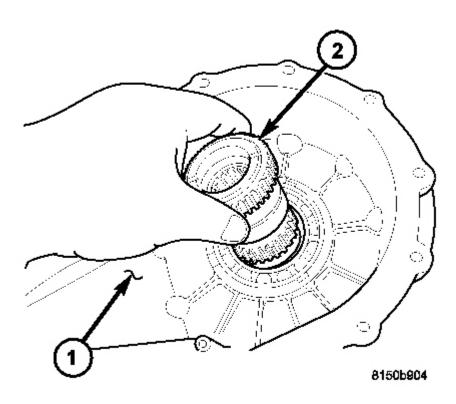
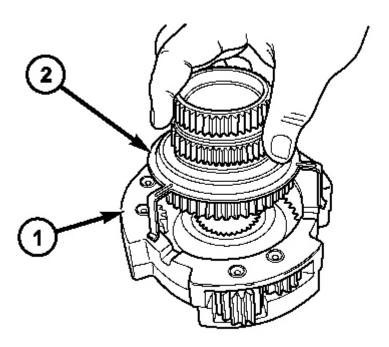


Fig. 29: Removing/Installing Input Gear Courtesy of CHRYSLER LLC

- 1 FRONT HOUSING
- 2 INPUT GEAR
- 11. Install the input gear (2) into the front case (1).
- 12. Install the new input shaft seal with Installer 9672 and Handle C-4171.

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<u>Fig. 30: Removing/Installing Mode Hub and Retainer</u> Courtesy of CHRYSLER LLC

1 - DIFFERENTIAL ASSEMBLY

13. Install the mode hub (2) onto the differential assembly (1).

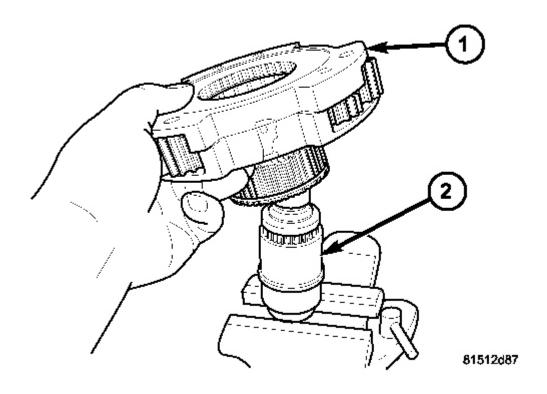
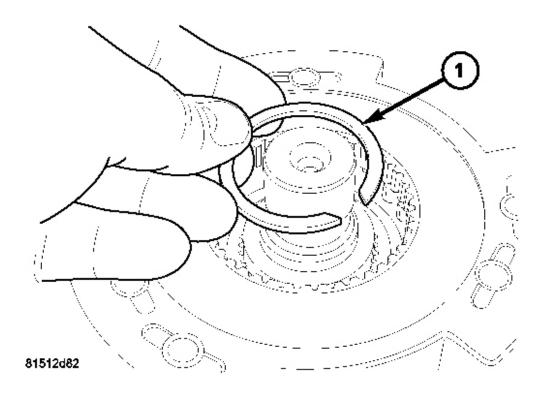


Fig. 31: Removing/Installing Differential Courtesy of CHRYSLER LLC

- 1 DIFFERENTIAL ASSEMBLY
- 2 MAINSHAFT
- 14. Install the differential assembly (1) onto the mainshaft (2).

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<u>Fig. 32: Removing/Installing Differential Snap-Ring</u> Courtesy of CHRYSLER LLC

1 - DIFFERENTIAL SNAP-RING

15. Install the differential snap-ring (1). See **Fig. 32**.

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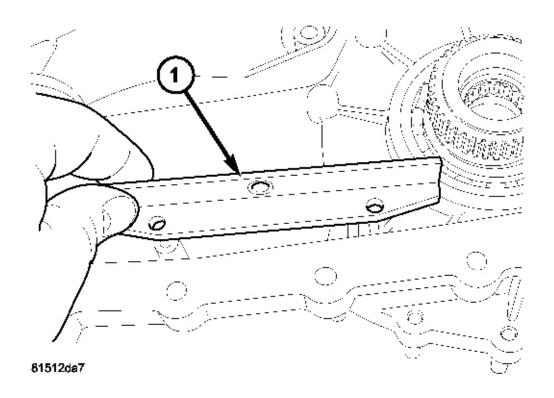


Fig. 33: Remove/Install Chain Guide Courtesy of CHRYSLER LLC

1 - DRIVE CHAIN GUIDE

16. Install both drive chain guide (1) onto the transfer case.

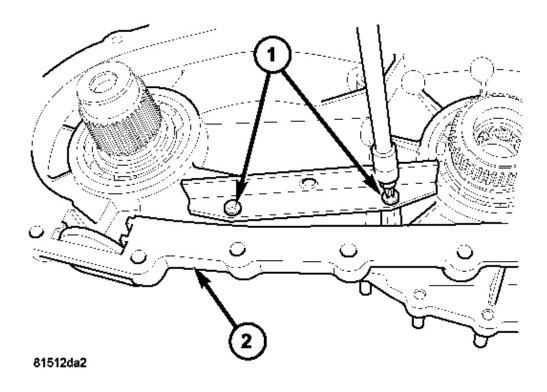
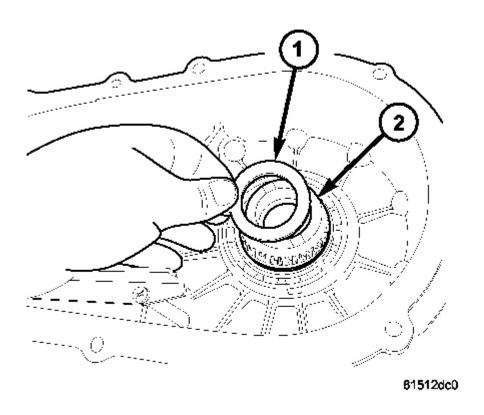


Fig. 34: Remove/Install Chain Guide Screws Courtesy of CHRYSLER LLC

- 1 SCREWS
- 2 FRONT CASE
- 17. Install the screws (1) to hold both chain guide rail to the front case (2). Tighten the screws to 5-8 N.m (44-71 in.lbs.).

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<u>Fig. 35: Removing/Installing Input Gear Thrust Washer</u> Courtesy of CHRYSLER LLC

- 1 THRUST WASHER
- 2 INPUT GEAR

18. Install the input gear thrust washer (1) onto the input gear (2).

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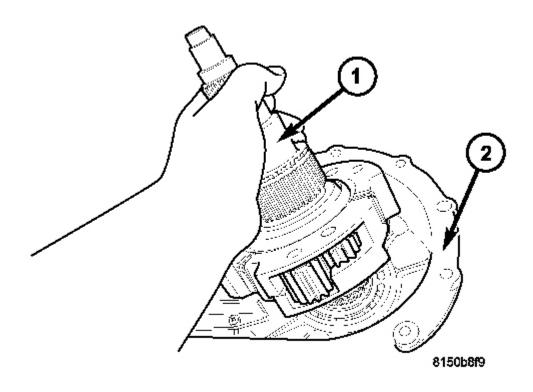
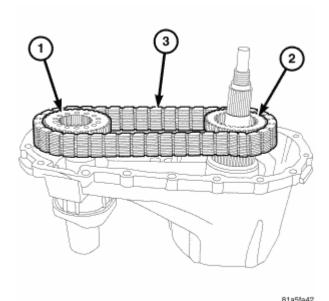


Fig. 36: Removing/Installing Mainshaft & Differential Assembly Courtesy of CHRYSLER LLC

- 1 MAINSHAFT AND DIFFERENTIAL ASSEMBLY
- 2 FRONT HOUSING

NOTE: Be sure that the input spline is engaged with the differential assembly.

19. Install the mainshaft and differential assembly (1) into the front case (2) and input gear.



<u>Fig. 37: Identifying Front Drive Sprocket, Mainshaft Drive Sprocket & Drive Chain</u> Courtesy of CHRYSLER LLC

- 1 FRONT DRIVE SPROCKET
- 2 MAINSHAFT DRIVE SPROCKET
- 3 DRIVE CHAIN
- 20. Install the drive sprockets (1, 2) and drive chains (3) as one.

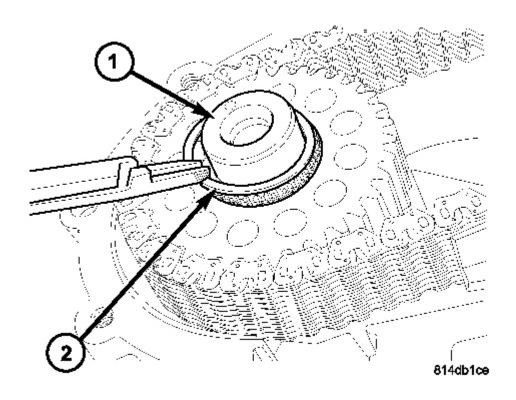


Fig. 38: Identifying Front Output Shaft & Retaining Ring Courtesy of CHRYSLER LLC

- 1 FRONT OUTPUT SHAFT
- 2 RETAINING RING
- 21. Install the front output shaft (1) drive sprocket retaining ring (2).

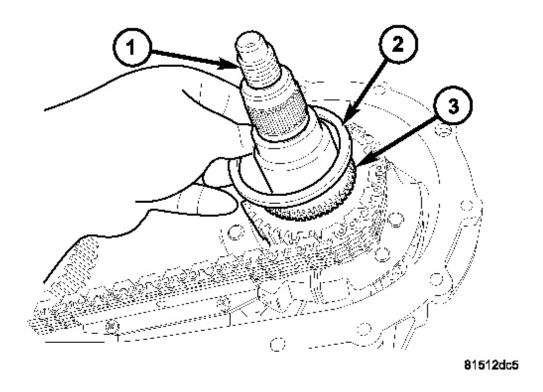


Fig. 39: Removing/Installing Mode Hub Spacer Courtesy of CHRYSLER LLC

- 1 OUTPUT SHAFT
- 2 MODE HUB SPACER
- 3 MODE HUB
- 22. Install the mode hub spacer (2) onto the output shaft (1) and the mode hub (3).
- 23. Install the mainshaft drive sprocket retaining ring onto the mainshaft.

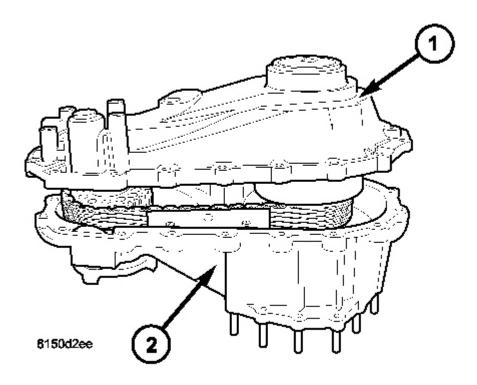


Fig. 40: Removing/Installing Rear Housing Courtesy of CHRYSLER LLC

- 1 REAR HOUSING
- 2 FRONT HOUSING
- 24. Install the transfer case magnet into the magnet pocket.
- 25. Apply bead of Mopar® Gasket Maker, or equivalent, to mating surface of front case. Keep sealer bead width to maximum of 3 mm (0.125 inch). Do not use excessive amount of sealer as excess will be displaced into case interior.
- 26. Install the rear case (1) onto the front case (2).

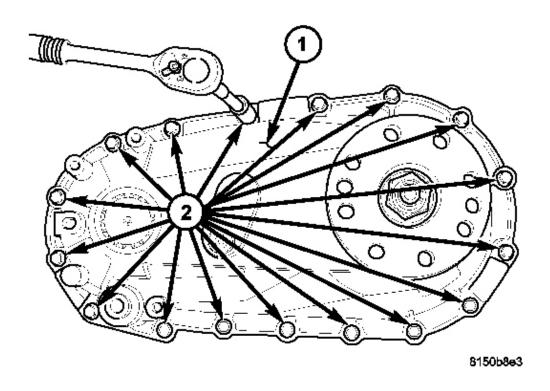


Fig. 41: Removing/Installing Rear Housing Bolts
Courtesy of CHRYSLER LLC

- 1 REAR HOUSING
- 2 BOLTS
- 3 FRONT HOUSING
- 27. Install the bolts (2) to hold the rear case (1) to the front case (3). Tighten the bolts at the alignment dowel locations first. Tighten the bolts to 27 N.m (20 ft.lbs.).

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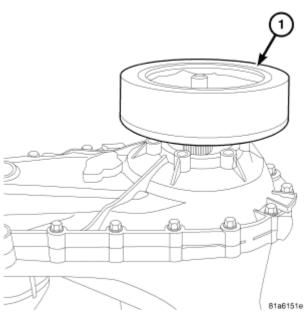
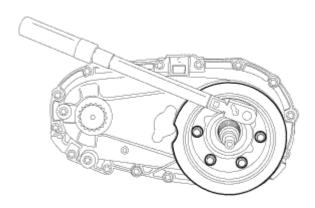


Fig. 42: Identifying Dampener Courtesy of CHRYSLER LLC

1 - DAMPENER

28. Install the dampener (1) onto the rear case.



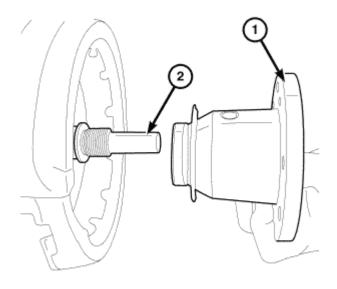
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<u>Fig. 43: Removing/Installing Rear Output Shaft Flange From Main Shaft Courtesy of CHRYSLER LLC</u>

- 1 DAMPENER BOLTS
- 2 REAR CASE

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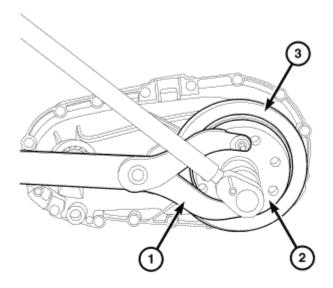
29. Install the bolts (1) to hold the damper (2) to the rear case (3). Tighten the bolts to 27 N.m (20 ft.lbs.).



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<u>Fig. 44: Identifying Output Shaft Flange & Main Shaft</u> Courtesy of CHRYSLER LLC

- 1 OUTPUT SHAFT FLANGE
- 2 MAIN SHAFT
- 30. Install the rear output flange (1) onto the output shaft (2).



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Fig. 45: Identifying Holder Tool, Output shaft Flange & Dampener Courtesy of CHRYSLER LLC

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- 1 HOLDER TOOL C-3281
- 2 OUTPUT SHAFT FLANGE
- 3 DAMPENER
- 31. Using Holder C-3281 (1), install the rear companion flange nut. Tighten the nut to 122-176 N.m (90-130 ft.lbs.).

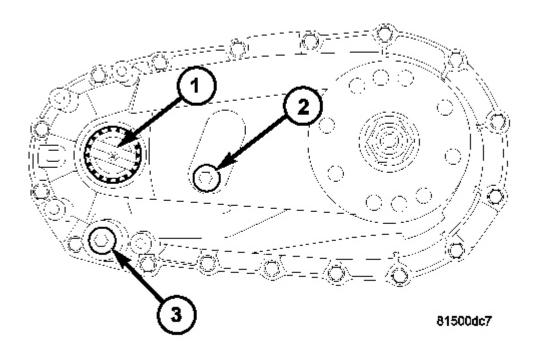
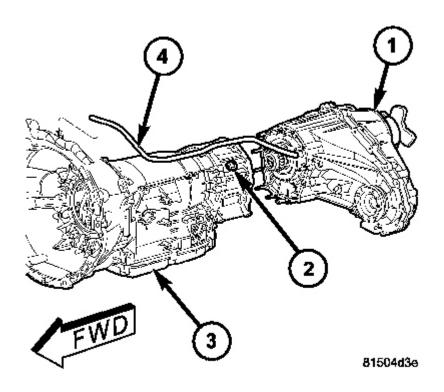


Fig. 46: Fill/Drain Plug And I.D. Tag Locations Courtesy of CHRYSLER LLC

- 1 I.D. TAG
- 2 FILL PLUG
- 3 DRAIN PLUG
- 32. Install and tighten drain plug (3) to 20-34 N.m (15-25 ft. lbs.)

INSTALLATION

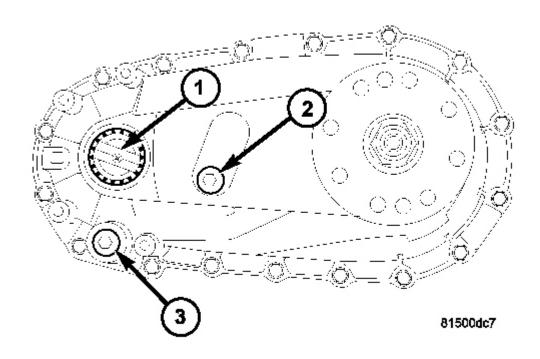
TRANSFER CASE - MP140



<u>Fig. 47: Identifying MP140 Transfer Case, Nuts, Transmission & Transfer Case Vent Tube</u> Courtesy of CHRYSLER LLC

- 1 MP140 TRANSFER CASE
- 2 NUTS
- 3 TRANSMISSION
- 4 TRANSFER CASE VENT TUBE
 - 1. Mount transfer case on a transmission jack.
 - 2. Secure transfer case to jack with chains.
 - 3. Position transfer case under vehicle.
 - 4. Align transfer case (1) and transmission (3) shafts and install transfer case onto the transmission. See <u>Fig.</u> 47.
 - 5. Install and tighten transfer case attaching nuts (2) to 35 N.m (26 ft. lbs.) torque.
 - 6. Connect the transfer case vent hose (4).
 - 7. Connect front propeller shaft and install rear propeller shaft. Refer to **INSTALLATION**.

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<u>Fig. 48: Fill/Drain Plug And I.D. Tag Locations</u> Courtesy of CHRYSLER LLC

- 1 I.D. TAG
- 2 FILL PLUG
- 3 DRAIN PLUG
- 8. For NV140, fill transfer case with correct fluid. Refer to **<u>DESCRIPTION</u>** . Correct as necessary.
- 9. Install the transfer case fill plug (1). Tighten the plug to 12 15N.m (9-11 ft.lbs.).
- 10. Install rear crossmember and skid plate, if equipped. Tighten crossmember bolts to 41 N.m (30 ft. lbs.) torque.
- 11. Remove transmission jack and support stand.
- 12. Lower vehicle and verify transfer case shift operation.

SPECIFICATIONS

TRANSFER CASE - MP140

SPECIFICATIONS

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DESCRIPTION	SPECIFICATION	
FLUID TYPE	MOPAR® AFT+4	
Capacity	.85L (180 pints)	

TORQUE SPECIFICATIONS

DESCRIPTION	N.m	Ft. Lbs.	In. Lbs.
Bolt, crossmember	41	30	-
Plugs, drain/fill	12 - 15	9 - 11	-
Bolts, case half	27	20	-
Nut, companion flange	122-176	90-130	-
Screws, Chain Guide Rail	5-8	-	44-71
Nuts, Transfer Case to Transmission	35	26	-
Bolt, Damper to Transfer Case	27	20	-

SPECIAL TOOLS

SPECIAL TOOLS-MP140

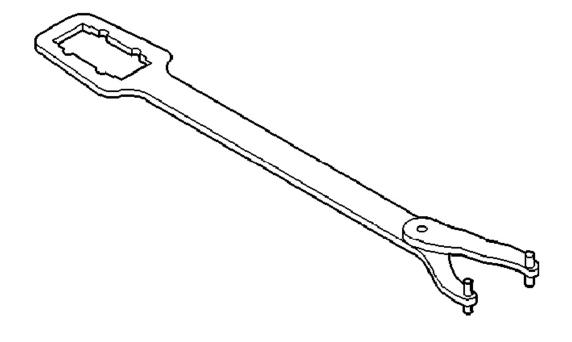


Fig. 49: Flange Wrench C-3281

2007 TRANSFER CASE MP140 - Service Information - Nitro

Courtesy of CHRYSLER LLC

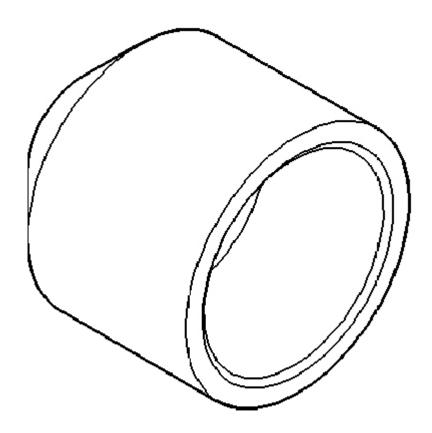


Fig. 50: Installer C-3972-A Courtesy of CHRYSLER LLC

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Fig. 51: Universal Driver Handle - C4171 Courtesy of CHRYSLER LLC

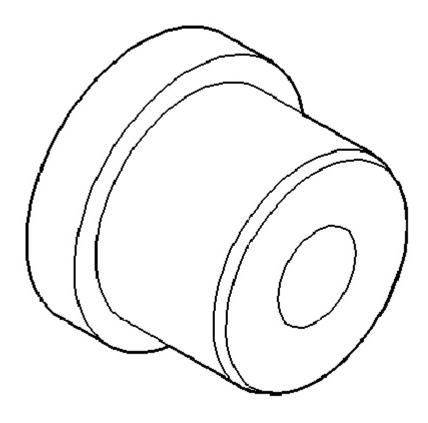


Fig. 52: Bearing & Bushing Installer 5066 Courtesy of CHRYSLER LLC

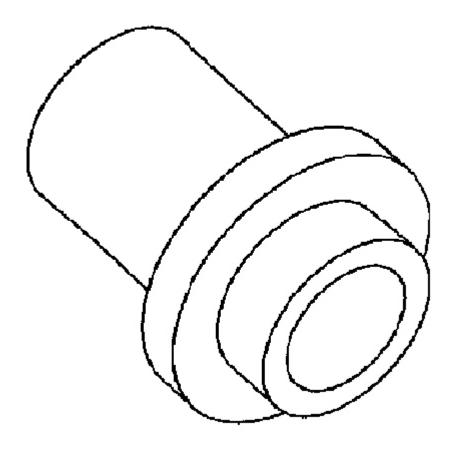
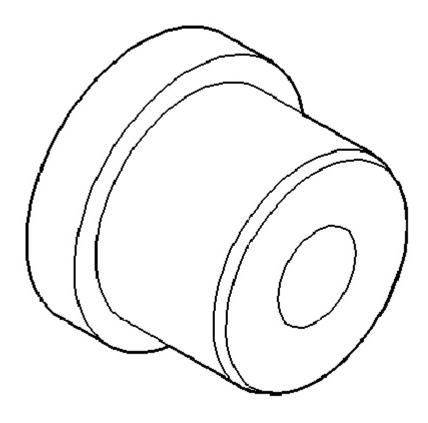


Fig. 53: Installer, Seal - 6560 Courtesy of CHRYSLER LLC



<u>Fig. 54: Installer - 7829A</u> Courtesy of CHRYSLER LLC

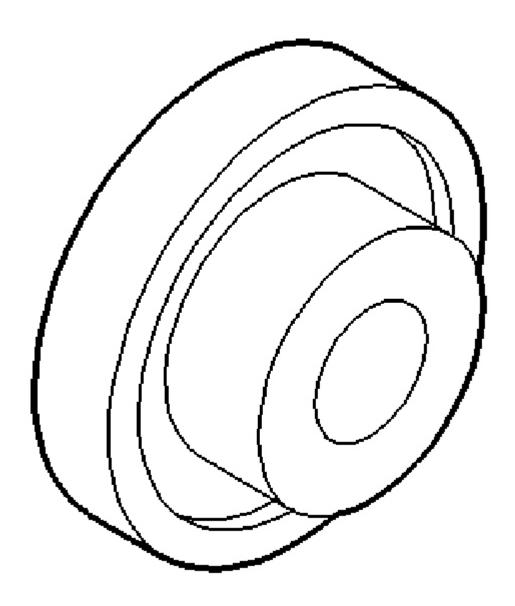
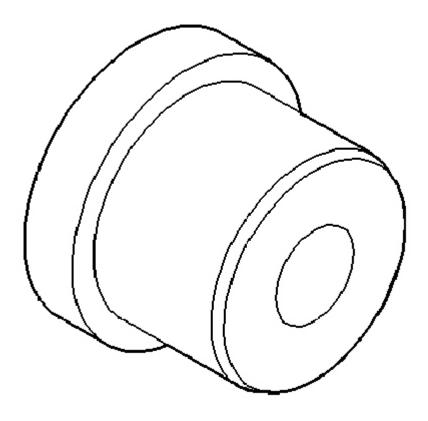


Fig. 55: Installer - 8152 Courtesy of CHRYSLER LLC



<u>Fig. 56: Installer - 8693A</u> Courtesy of CHRYSLER LLC

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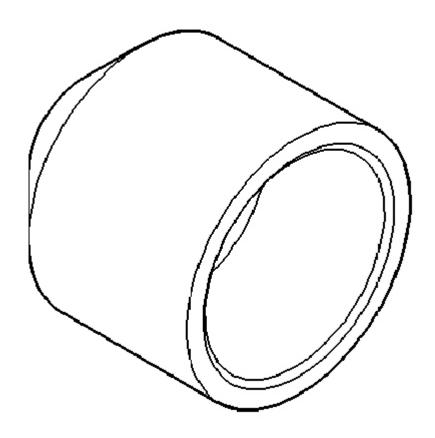


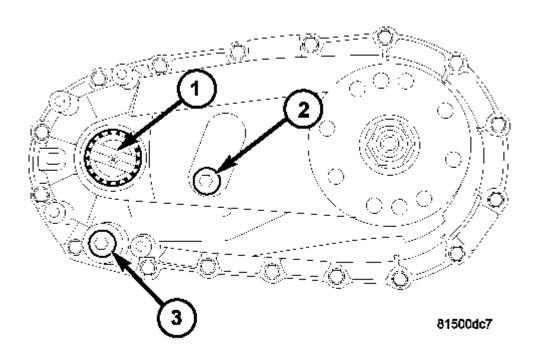
Fig. 57: Installer, Seal - 9672 Courtesy of CHRYSLER LLC

FLUID

STANDARD PROCEDURE

FLUID DRAIN/REFILL

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<u>Fig. 58: Fill/Drain Plug And I.D. Tag Locations</u> Courtesy of CHRYSLER LLC

- 1 I.D. TAG
- 2 FILL PLUG
- 3 DRAIN PLUG

NOTE: The fill (2) and drain (3) plugs are both in the rear case.

- 1. Position drain pan under transfer case.
- 2. Remove drain and fill plugs and drain lubricant completely.
- 3. Install drain plug. Tighten plug to 12 -15 N.m (9 -11ft. lbs.).
- 4. Remove drain pan.
- 5. Fill transfer case to bottom edge of fill plug opening with the required fluid. Refer to $\underline{\textbf{DESCRIPTION}}$.
- 6. Install and tighten fill plug to 12-15 N.m (9-1 1ft. lbs.).

SEAL-FRONT OUTPUT SHAFT

REMOVAL

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FRONT OUTPUT SHAFT SEAL

The front output shaft seal and wear sleeve cannot be serviced in the vehicle. The transfer case must be disassembled to remove the front output shaft assembly and seal.

SEAL-REAR OUTPUT SHAFT

REMOVAL

TRANSFER CASE - MP140

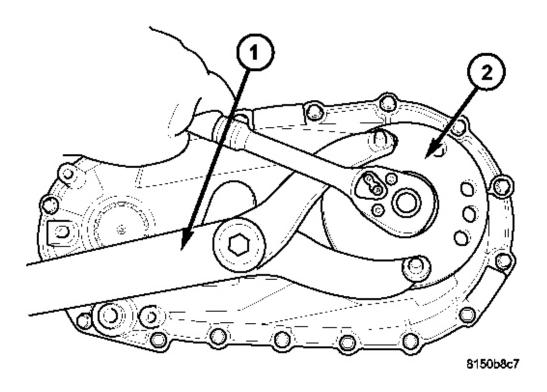
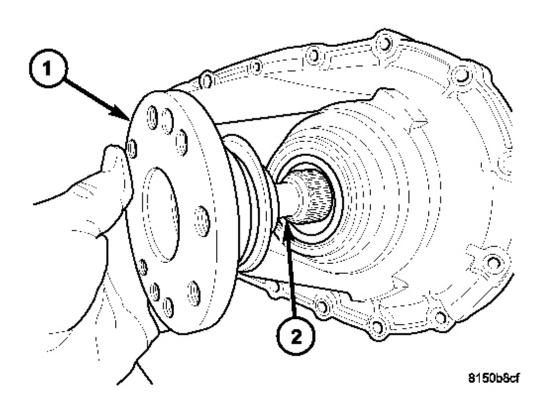


Fig. 59: Remove/Install Rear Output Shaft Nut Courtesy of CHRYSLER LLC

- 1 HOLDER C-3281
- 2 REAR OUTPUT SHAFT FLANGE
 - 1. Remove the rear propeller shaft. Refer to **<u>REMOVAL</u>** .
 - 2. Using Holder C-3281 (1), remove the rear companion flange (2) nut. See Fig. 59.

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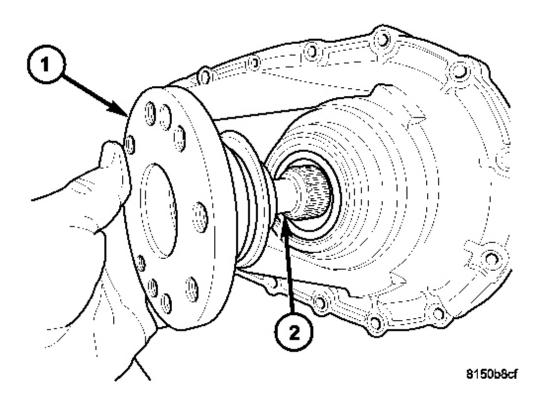


<u>Fig. 60: Remove/Install Rear Output Shaft Flange</u> Courtesy of CHRYSLER LLC

- 1 REAR OUTPUT SHAFT FLANGE
- 2 REAR OUTPUT SHAFT
- 3. Remove the rear output flange (1) from the main shaft (2). If necessary, use a suitable 2 or 3 jaw puller to remove the output shaft flange. See **Fig. 60**.
- 4. Remove the rear output seal with a suitable pry tool or a screw mounted in a slide hammer.

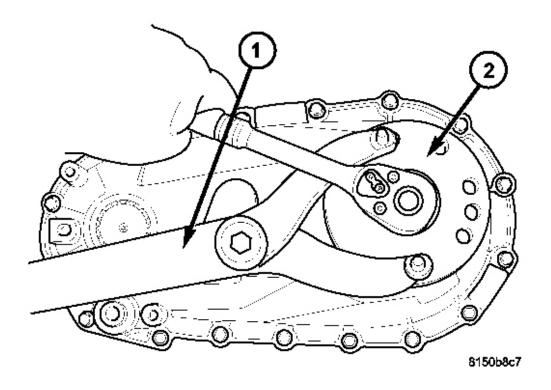
INSTALLATION

TRANSFER CASE -MP140



<u>Fig. 61: Remove/Install Rear Output Shaft Flange</u> Courtesy of CHRYSLER LLC

- 1 REAR OUTPUT SHAFT FLANGE
- 2 REAR OUTPUT SHAFT
 - 1. Install a new rear output seal into the rear cover with Installer C-3972A.
 - 2. Install the rear output flange (1) onto the main shaft (2). See **Fig. 61**.



<u>Fig. 62: Remove/Install Rear Output Shaft Nut</u> Courtesy of CHRYSLER LLC

- 1 HOLDER C-3281
- 2 REAR OUTPUT SHAFT FLANGE
- 3. Using Holder C-3281 (1), install the rear companion flange (2) nut. Tighten the nut to 122-176 N.m (90-130 ft.lbs.). See **Fig. 62**.
- 4. Install the rear propeller shaft. Refer to $\underline{REMOVAL}$.
- 5. Check the transfer case fluid level. See **STANDARD PROCEDURE**. Correct as necessary.