

FO-S-550,555



BEARINGS

Bearings which are considered suitable for further service should be cleaned in a suitable solvent and immersed in clean lubricating oil until required.

Installation of a bearing can be classified in two ways: press fit on rotating parts such as shafts, and gears, and push fit into static locations such as reduction gear housings. Where possible, always install the bearing onto the rotating component first.

Use the correct tools or a press, to install a bearing or bushing. In the absence of the correct tools or press, heat the bearings and/or the casing in hot oil to assist the installation of the bearing.

When bearings or bushings are removed always carefully check that the bearing is free from discoloration and signs of over-heating. Also check for mechanical damage such as excessive clearance, nicks and scuffing. If in doubt replace the bearings or bushings.

Bearings should never be removed unless absolutely necessary. Always use the recommended puller to reduce the risk of bearing or related component damage.

The reliability and durability of a unit depends on the effective operation of the many types of bearings and bushings which are incorporated in the complete assembly.

These bearings and bushings are subjected, in normal operation, to high working loads and adverse conditions.

Be sure during normal routine servicing, maintenance or repair that bearings are given the right attention and are installed with care.

PRESSURE TESTING

Prior to pressure testing be sure all hoses are in good condition and all connections tight. Pressure readings must be taken with gauges of specified pressure ratings.

The correct procedure should be rigidly observed to prevent damage to the system or the equipment and to eliminate the possibility of personal injury.

WARNING: Service the engine compartment with the Loader bucket on the ground in the dumped position or in the raised position with the Loader lift cylinder "SAFETY BAR" installed (see Figure 1). Never work under or around a raised Loader without the "SAFETY BAR INSTALLED".

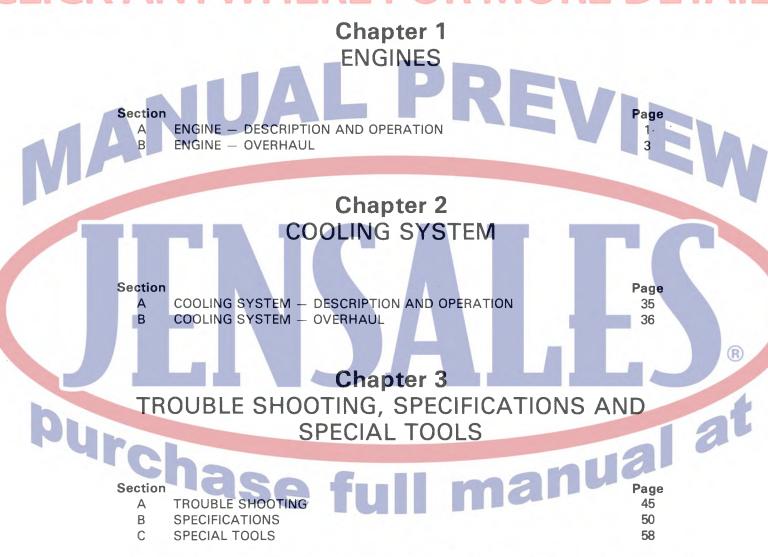


Loader Lift Cylinder "Safety Bar"
Installed in Raised Position



Loader Lift Cylinder "Safety Bar"
Installed in Storage Position

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Figure 28 Aligning The Timing Gears

- 1. Camshaft Gear
- 2. Crankshaft Gear
- 3. Camshaft Drive Gear
- 4. Injection Pump Drive Gear

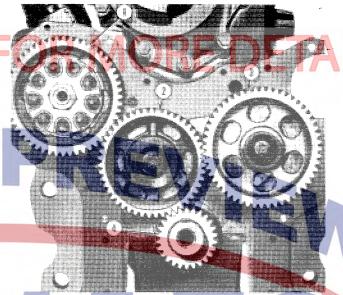


Figure 30
Timing Gears

- 1. Distributor Drive Gear
- 2. Camshaft Drive Gear
- 3. Camshaft Gear
- 4. Crankshaft Gear



Gasoline Engine:

Chapter 3.

Install the front timing gear with timing mark aligned with the governor drive gear, Figure 30 and tighten the self-locking retaining bolt to the specified torque. Install the governor outer race assembly.

- 5. Install a new dust seal in the front cover. Lubricate the oil seal with petroleum jelly and use Adapter No. 9210 to press the seal into the front cover.
- Locate the oil slinger onto the crankshaft with the dished face outwards.
- 7. Position a new gasket on the engine front plate and install the front cover. Be sure the cover aligns with the dowel pins. Tighten the bolts to the specified torque.

8. Lubricate the crankshaft pulley spacer and slide over the key. Replace the pulley hub and tap onto the crankshaft. Tighten the securing bolt to the specified torque, see "Specifications" —

- Figure 29
 Injection Pump Drive Gear To
 Camshaft Drive Gear Timing
- 1. Pump Drive Gear
- 2. Camshaft Drive Gear
- 3. 3-Cylinder Timing Mark

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- 1. Instrument Panel Harness (Yellow)
- 2. Instrument Panel Harness (Red-Blue)
- Transmission Oil Temperature Warning Light Delay Switch
- 4. Warning Light Harness Connector
- 5. Instrument Panel Harness
- 6. Flasher Warning Light Circuit (Green)
- 7. Flasher Assembly
- 8. Cab Circuit Relay
- 9. Deck or Cab Harness
- 10. Fuse Box (Model 550)
- 11. Engine Harness
- *12. 3 Amp. Cab Dome Light Switch (Green-White)
- *13. 3 Amp. Warning Light Circuit (Yellow-Black)

- *14. 5 Amp. Flasher Warning/Turn Signal Circuit (Yellow-Red)
- *15. 10 Amp. Horn Circuit (Yellow-White) (Model 555)
 - 15 Amp. Horn Circuit (Yellow-White) (Model 550)
- 16. 30 Amp. Light Switch Circuit Breaker
- 17. Light Switch
- 18. Fuse Link Wire
- 19. Starting Motor
- 20. 8 Amp. Cab Front Wiper Switch Circuit
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- 21. Front Wiper Switch
 - 22. 20 Amp. Cab Circuit Breaker

^{*}Fuse Box on 550 - In Line Fuses on 555

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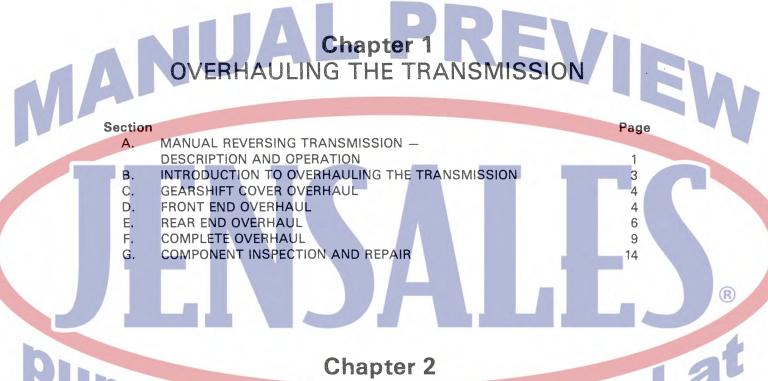
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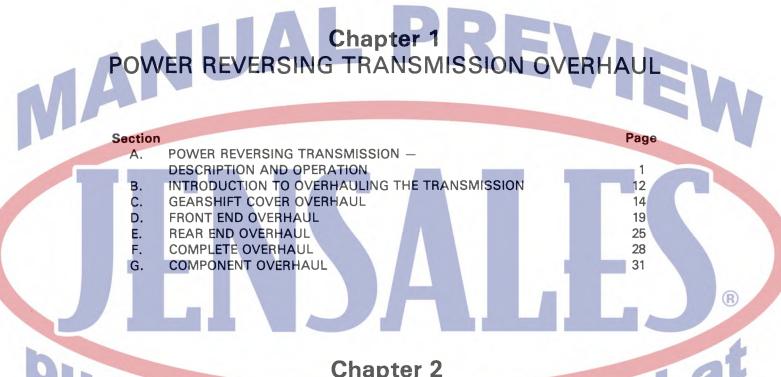
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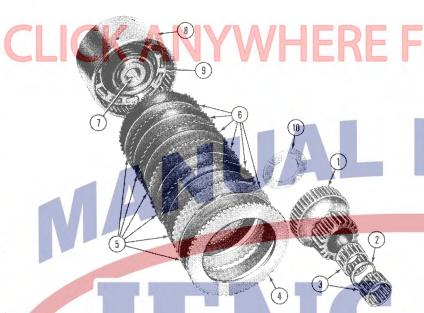
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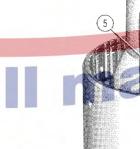
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- 5. Using a press and Tool No. 1312 along with a suitable size washer as shown in Figure 54, compress the spring enough to remove the snap ring with a screwdriver. Gradually, relieve pressure on the spring, then remove the spring seat and spring.
- 6. Turn the clutch housing over and remove the snap ring, spring seat, and spring from the other end of the housing by repeating Step 5.
- 7. Remove the piston (one in each end of the clutch housing) by directing compressed air into the oil passage in the hub of the clutch housing, Figure 53.
- 8. Remove the outer 'O' ring seal from each piston and the inner 'O' ring seals from the hub of the clutch housing.

Figure 53 Rear Clutch Assembly

- Rear Clutch Assembly
- 2. Spacer
- 3. Needle Bearings
- 4. Clutch Drive Plate
- 5. Internally Splined Bronze Clutch Plate
- 6. Externally Splined Steel Clutch Plate
- 7. Oil Passage
- 8. Clutch Housing
- 9. Piston
- Bronze Thrust Washer



2. Unlock the sealing rings by squeezing them together, then remove them from the shaft.

- If not previously removed, pull the bearings and spacer from the rear clutch hub (reverse idler input), Figure 53, and remove the gear from the clutch plates in the housing. Remove the bronze thrust washer.
- Remove the large snap ring, clutch drive plate and internal plates from the forward clutch and the snap ring, hub and internal plates from the rear clutch.

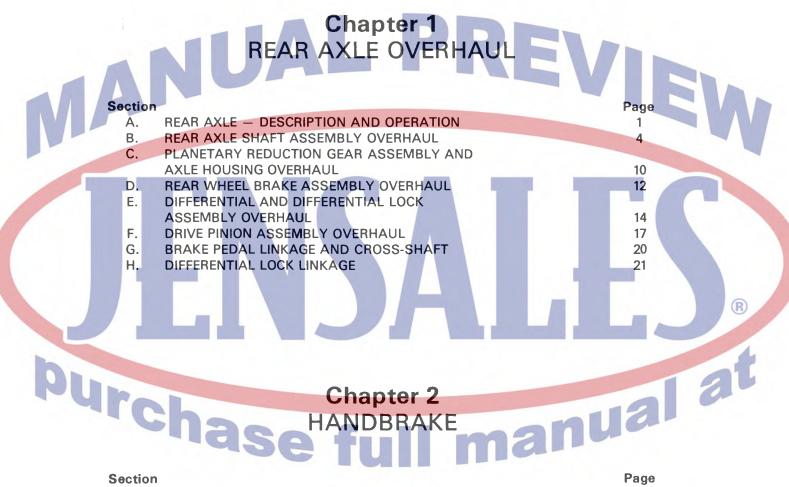


Figure 54

Clutch Housing Inner Snap Ring Removal

- Press Attachment Tool No. 1312
- 2. Screw Driver
- 3. Clutch Housing
- 4. Snap Ring
- 5. Washer Appropriate Size
- 6. Press

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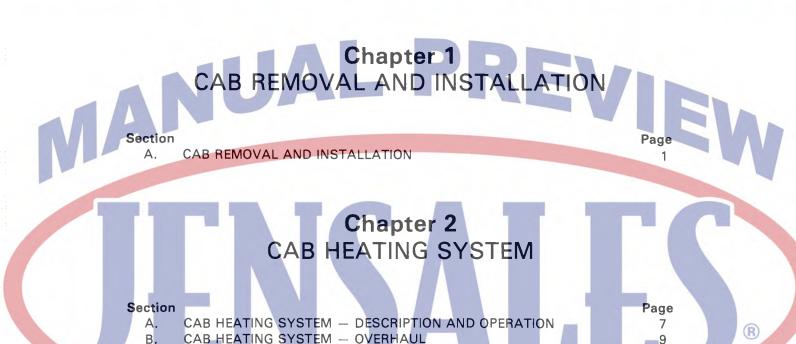
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