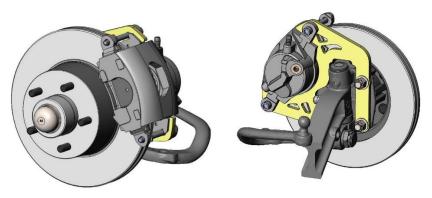


# Front Disc Brake Conversion Kit 48-56 Ford F1 & F100 Trucks P/N: DB1543B & DB1543BHP



\*\*\*DB1543B, Driver Side Pictured Above\*\*\*

Thanks for your purchase of our Legend Series Disc Brake Conversion Kit for the 48-56 Ford F1 & F-100 Trucks. This system does not require removal of the spindles from the vehicle. This system is a complete bolt-on and should be able to be completed without modifications to the vehicle and installed using simple hand tools.

## \*\*\*IMPORTANT\*\*\*

This kit requires the use of at least 15" wheels for clearance and this kit has a 5 x 4.500" bolt pattern

#### **Installation Notes:**

- Please read all instructions before attempting the installation.
- Proper operation of your brakes is essential for your safety and the safety of others. Any brake service should be performed by a professional technician experienced in the installation of brake systems.
- Any installation requiring you to remove a wheel or gain access under the vehicle requires use of jack stands or a lift appropriate to the weight of the vehicle. In all cases, recommended ratings for jack stands should be at least 2-tons. If using a floor jack, be sure to use the appropriate wheel chocks.
- All installations require proper safety procedures and protective eyewear.
- A selection of hand tools sufficient to engage in the installation of these products is assumed and is the
  responsibility of the installer to have in his/her possession prior to beginning this installation. All installations,
  which require removal of hydraulic hoses and/or bleeding of the brakes, require appropriate fitting/line
  wrenches, as well as a safety catch can and protective eyewear. Other than these items, if unique or special
  tools are required they are listed in the section for that step.
- ALWAYS CONFIRM WHEEL FITMENT PRIOR TO BEGINNING THE INSTALLATION OF ANY BRAKE SYSTEM!!
   Returns will not be accepted for ANY installed part or assembly. Use great care to prevent cosmetic damage when performing wheel fit check!
- Before starting the installation, verify that all parts are included with the brake kit. If items are missing, notify Master Power Brakes immediately.
- Master Power Brakes requires the use of a high quality DOT 3 or DOT 4 brake fluid. Synthetic DOT 4 fluids are
  acceptable. ALL WARRANTY IS VOID IF SILICONE DOT 5 FLUID IS USED.

Parts List		
Quantity	Description	
2	Caliper Mounting Bracket	
2	Brake Rotors	
1	Driver Side Caliper (w/brake pads)	
1	Passenger Side Caliper (w/brake pads)	
2	Bearing Adapter	
2	A2 (Outer Wheel Bearing)	
2	A17 (Inner Wheel Bearing)	
2	9406S (Inner Grease Seal)	
1	Hose Kit (18" Hoses w/10mm Banjo Bolt & Hardware)	
2	1/8" x 1 1/2" Cotter Pin	
2	Grease Caps	
6	Spacer Bushing (0.875" OD x 0.510" ID x 0.355" Length)	
6	1/2"-20 x 1.750" Grade 8 Hex Head Bolt	
6	1/2" SAE Flat Washer	
6	1/2"-20 Grade 8 Nyloc Lock Nut	

Replacement Parts			
Front Brake Pads	FMSI No: D52		

#### Installation:

- 1. With the vehicle properly supported, remove the front wheels and tires.
- 2. Removal of the factory drum brake assembly is required next. Remove all components from the spindle leaving a bare spindle. **NOTE:** It is not necessary to remove the spindle from the vehicle unless other work is required.
- 3. Before installing the disc brake kit, inspect the spindles for any excessive wear or damage. If any damage is present, replace the spindle(s) as necessary. If spindles are good, clean all attachment points along with the spindle pin to insure proper installation of the new components.
- 4. Due to manufacturing tolerances of the OE spindles, it **COULD** be necessary to drill the 3 mounting holes at each side so that the 1/2" bolts go thru properly. We have seen some OE spindle mounting holes be machined to .498" diameter, which is just barely too small for a 1/2" bolt. Refer to figure 1a and 1b below for reference on which holes and size to drill.

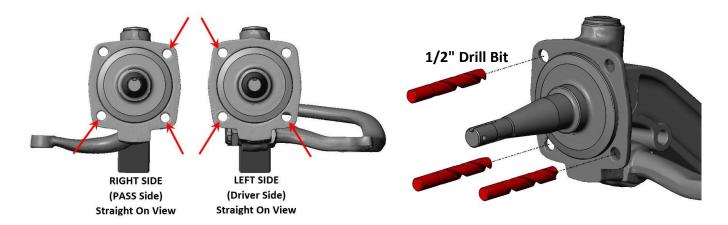


Figure 1a - Possible Drill Location Reference

Figure 1b - Possible Drill Bit Size Reference (Driver Side Shown)

5. Position the Caliper Mounting Bracket against the spindle. All 3 mounting holes with require the use of provided spacers that measure 0.875" OD x 0.510" ID x 0.355" Length. Insert these bushings between the bracket and the spindle and assemble using the 1/2"-20 x 1.750" Grade 8 Hex Head Bolts and 1/2"-20 Nyloc Lock Nuts. A washer is provided for nut side of the bolt along with the nut. The heads of the bolts will have to be indexed so they clear the machined step in the spindle. **NOTE: It could be possible that you may have to take a very small amount off one side of the bolt head to get them to set completely flat (See Figure 2c).** All hardware may be torqued to 85 ft/lbs. Figures 2a, 2b, and 2c below shows the proper assembly.

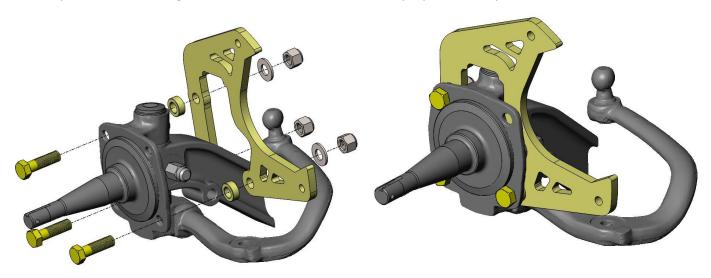


Figure 2a – Caliper Bracket Installation (Driver Side Shown)

Figure 2b - Caliper Bracket Properly Installed (Driver Side Shown)

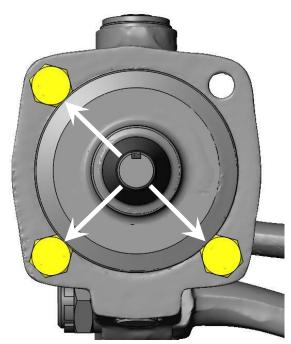


Figure 2c - Bolt Head Possible Material Removal (Driver Side Shown)

- 6. A bearing adapter must be installed on the spindle pin. This is required due to the diameter of the inner wheel bearing surface. To install the bearing, place the adapter on the spindle as shown in Figure 3a and 3b below. The bearing adapter can be installed using one of the two following methods:
  - a. **Heat** Using an oven, heat the bearing adapter for approximately 15-20 minutes. Once heated, the bearing adapter should slide over the spindle pin without any force. Once installed, let the adapter cool to allow for proper fitment.
  - b. **Hammer** Using a capped pipe, position the pipe over the spindle pin and flat against the bearing adapter. With protection between the pipe and the adapter, drive the adapter on by hitting the capped end of the pipe until the bearing adapter is flush against the spindle surface.

**NOTE:** The bearing adapter should be tight on the spindle. However, wear can cause the adapter to be loose. If it is loose, we recommend staking the spindle pin using a center punch. This will cause an interference fit.

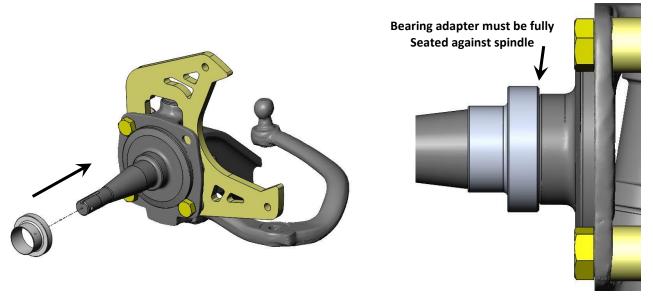


Figure 3a - Installing the Bearing Adapter (Driver Side Shown)

Figure 3b – Bearing Adapter Fully Seated

7. The wheel bearings can now be packed and installed. We recommend the use of Lucas Oil "Red-N-Tacky" Grease (Available At Master Power Brakes P/N: ACNLGI2) or other high quality NLGI rated wheel bearing grease. Once the inner bearing is installed, tap the inner seal in at this point. Figures 4 below shows the bearing and seal being installed.

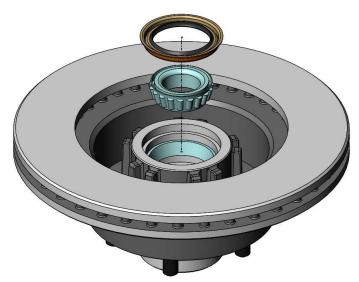


Figure 4 - Inner Wheel Bearing Installed

8. Slide the rotor onto the spindle. The inner wheel bearing and grease seal should be installed at this point. With the rotor fully pushed onto the spindle, install the outer wheel bearing followed by the keyed washer and re-use the original spindle nut. When tightening the spindle nut, tighten to 5-10 ft/lbs. Loosen the nut and tighten again using the same 5-10 ft/lbs. Do this a couple of times spinning the rotor to fully seat the wheel bearings onto the spindle. Loosen the nut a final time and re-tighten to remove all play. Tighten approximately an additional 1/16<sup>th</sup> of a turn to give the appropriate pre-load and line up the cotter pin hole. Install the cotter pin to secure the nut followed by the grease cap. Figure 5 shows the proper location of each component. **IMPORTANT:** If using slotted and drilled rotors, pay close attention to Figure 6 for proper rotor placement on the driver or passenger side.

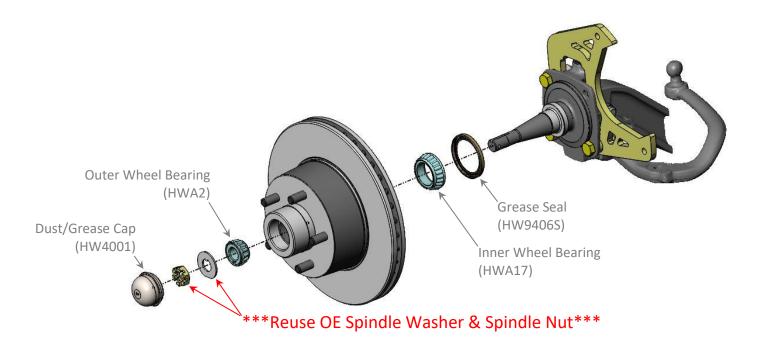


Figure 5 - Component Location (Driver Side Shown)

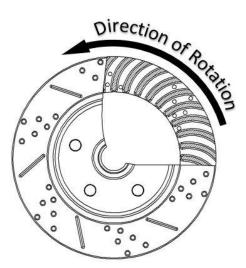


Figure 6 – Rotor Orientation

9. Mount the caliper to the caliper mounting bracket. With the pads installed in the caliper, slide the caliper over the rotor and line up the mounting ears of the caliper with the holes in the caliper mounting bracket. Tighten and torque the bolts to 45 ft/lbs. **NOTE:** When installing the calipers, make sure the brake bleeders are pointing upward. See Figure 7 on the next page for reference.

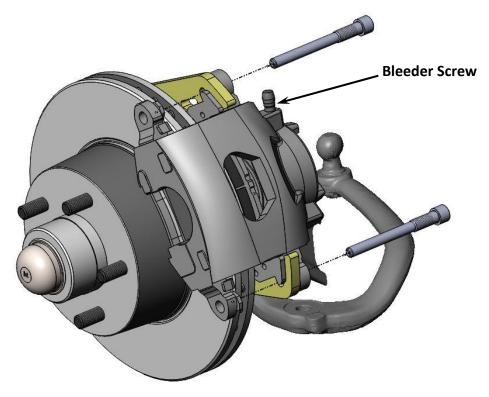


Figure 7 - Caliper Installed

- 10. Install the brake hoses onto the caliper and attach to the original plumbing on the vehicle. **NOTE:** Be sure the copper crush washer has been installed on the brake hose to prevent leaks before installing.
- 11. If the master cylinder has been removed or replaced, make sure it is properly bench bled and then installed on the vehicle. Then the remaining brake system can be bled to remove all of the air from the system. **REMEMBER:** Master Power Brakes requires the use of either DOT 3 or DOT 4 brake fluid. We Recommend the use of Pentosin Super Dot 4 fluid as seen below in Figure 8 (Available at Master Power Brakes P/N: ACJ1703).

\*\*\* ANY WARRANTY IS VOID IF DOT 5 FLUID IS USED\*\*\*



Figure 8 - Pentosin Super DOT 4

12. The installation is now complete.

\*\*\* CONTACT INFORMATION ON NEXT PAGE \*\*\*

### If you have any questions regarding installation, feel free to contact us!

