











#### **Installation Instructions**

Product: SS4+ 13" C-10 Rear Instruction Part Number: 6000427

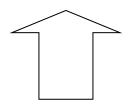
Vehicle Revised: 17 Oct 2019

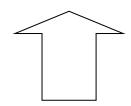
Make: GM

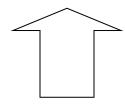
Model: GM Axle with Bearings in Housing

Year(s): All C-clip rears

ATTENTION: Read this before going any farther! Returns will not be accepted for ANY installed PART or ASSEMBLY. Use great care to prevent cosmetic damage when performing wheel fit check.







#### Notices - Read and Follow BEFORE ATTEMPTING INSTALLATION

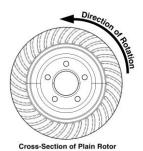
- All installations require proper safety procedures and protective eyewear.
- All installations assume basic mechanical skill and a factory service manual for the vehicle on which the installation is to be performed.
- All references to LEFT side of vehicle always refer to the Driver's side of the vehicle.
- Any installation requiring you to remove a wheel or gain access under the vehicle requires use of
  jack stands appropriate to the weight of the vehicle. In all cases Baer recommends jack stands
  rated for at least 2-tons.
- 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 FIT PRIOR TO BEGINNING INSTALLATION OF ANY BRAKE SYSTEM OR "UPSIZED" ROTOR UPGRADE! In addition to already having checked fit using the Baer Brake Fit Templates available online at <a href="www.baer.com">www.baer.com</a>, always place the actual corner assembly or a combination of the caliper assembly fit onto the rotor into the actual wheel to reconfirm proper clearance is available between the caliper and the wheel before proceeding with the actual installation. Returns will not be accepted for systems that have been partially or completely installed. Use extreme car when performing wheel fit check to prevent cosmetic damage.

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• When installing rotors on any Baer Products be sure to follow the direction of rotation indicated on the rotor hat area with either an arrow, or an "L" for left, or an "R" for right, or both. "L" or left always indicates the driver's side of US spec vehicles. Images shown are "L" left rotors:



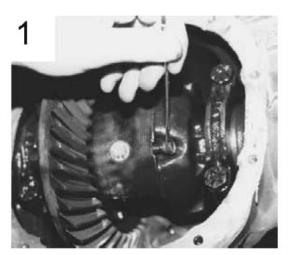


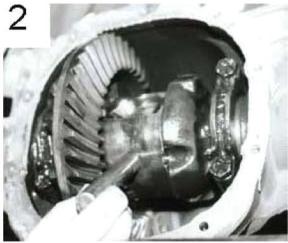
- A proper professional wheel alignment is required for any system requiring replacement of the front spindles, or tie rod ends. Follow factory prescribed procedures and specifications unless otherwise indicated.
- At all times stop the installation if anything is unclear, or the parts require force to install. Consult
  directly with Baer Technical Staff in such instances to confirm details. Please have these
  instructions, as well as the part number machined on the component that is proving difficult to
  install, as well as the make, model, and year (date of vehicle production is preferred) of your
  vehicle available when you call. Baer's Tech Staff is available from 8:30-am to 5-pm Mountain
  Standard Time (Arizona does not observe Daylight Savings Time) at 602 233-1411 Monday
  through Friday.

# **INSTALLATION:**

- 1. Support the vehicle with properly rated jack stands and remove the rear wheels. Place a drain pan under the differential and remove the cover.
- 2. Remove the drums. Sometimes the drums will adhere to the axles from rust. If this is the case, tapping on the outer edge of the drum with a hammer will shock this loose and allow removal of the drum.
- 3. Remove the differential pin lock bolt from the carrier (photo 1). Most GM vehicles use 5/16" or ½" bolt head. It is best to use a 6 point wrench on this as it may be very tight.

Remove the pin (photo 2) and slide axles inward to remove c-clips.





- 4. Remove the axles, taking care not to damage the seals. This is a good time to inspect the seals, axles and bearings, replacing as necessary. Also, measure the outside diameter of the axle flange. To properly seat in the rotor, the flange diameter can not exceed 5.9". If yours is larger, a machine shop can turn these down for proper fit.
- 5. Disconnect the fluid lines from the backing plate and cap with supplied vinyl caps. Leaving all drum brake components attached, remove the brake backing plate. Save the fasteners as these will be reused for the intermediate bracket. Disengage the park cable from the frame and front primary cable. \*\*Note: Be sure to take note of factory routing because many vehicles use an adjustment equalizer. This can easily be re-installed incorrectly if not noted. The new cable, if supplied, will attach to the frame and primary cable just as the OE unit did.
- 6. Install the bracket/park brake assembly using the original bolts that secured your brake backing plate. These are left and right specific, the left (driver's side) carries a part number engraved beginning with the numbers 671, and the right side will begin with the numbers 672. The park shoe actuator will be at the bottom, the retainer at the top. Torque the fasteners to 45 ft·lbs. See Figures 3 and 4 for reference.



Figure 3: Park brake assembly correctly installed



Figure 4: Park assembly installed on driver's side (Actuator is shown at the bottom)

- 7. Repeat these procedures for the other side.
- 8. Install axles, c-clips, differential pin and retaining bolt. Install the cover and refill with proper gear lube.
- 9. Install the correct side rotor and secure with three lug nuts and washers to avoid scratching the rotor hat.

10. Install the correct side caliper onto the bracket. The 12mm bolts insert through the stainless steel slider pins and into the caliper. The slider pins seat into the relief machined into the caliper mounting tabs. Snug the bolts as they may need to be shimmed. See Figure 5 for reference.



Figure 5: Caliper installed on intermediate bracket

- 11. Perform the Shimming Procedure which is located on the last page. When the procedure has been completed continue with the Step 12.
- 12. Attach the banjo bolt to the steel braided hose and into the caliper using copper washers on either side of the banjo fitting. A hardline retainer kit was provided with this system. Follow the instructions contained with this to connect your original hard lines to the stainless steel braid hoses supplied with your rear brake system. Install the Hardline retainer assembly, bending the original hardline to fit into the bracket provided with this set. Attach the hardline to the steel braided hose and install the hose lock provided. \*\*\*IMPORTANT: Position the hose to avoid contact with wheels and frame, and suspension components. Torque banjo bolt to 15-20 ft·lbs.
- 13. If park cables were included in your system, install first into the caliper, then to frame bracket, and then connect to primary cable.
- 14. Recheck all attachment points and fluid connections.

## **Shimming Procedure**

- 1. Measure the gap from the rotor to caliper body at 4 points, top inside and outside, bottom inside and outside. Write down all measurements. Subtract the top inside measurement from top outside. This will require a shim at the top bracket bolt equal to half of this difference to center the caliper. For instance, inside measurement of .865", outside of .905" has a difference of .040 which would require a .020" shim installed to center. Do the same with the bottom measurements to center this also. Getting these gaps as close as possible within .005" will keep the possibility of excessive noise to a minimum. This may require different thickness shims top and bottom.
- 2. Select the required shims from the kit provided.
- 3. Remove the caliper.
- 4. Loosen the bolts from the intermediate bracket that are connected to the park bracket/plate assembly.
- 5. Install the appropriate shims, removing one bolt at a time, and snug the same bolts for fit check. See Figure 6 for reference.
- 6. Reinstall the caliper and recheck gap measurements.
- 7. Re-shim if necessary. When proper shimming has been achieved, torque the bracket bolts and caliper bolts to 85 ft·lbs.

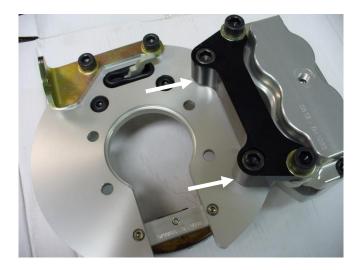


Figure 6: Shim locations

Refer to Bleeding and Rotor Seasoning procedures contained on a separate sheet, or on www.baer.com

For service components and replacement parts contact your Baer Brake Systems Tech Representative.