

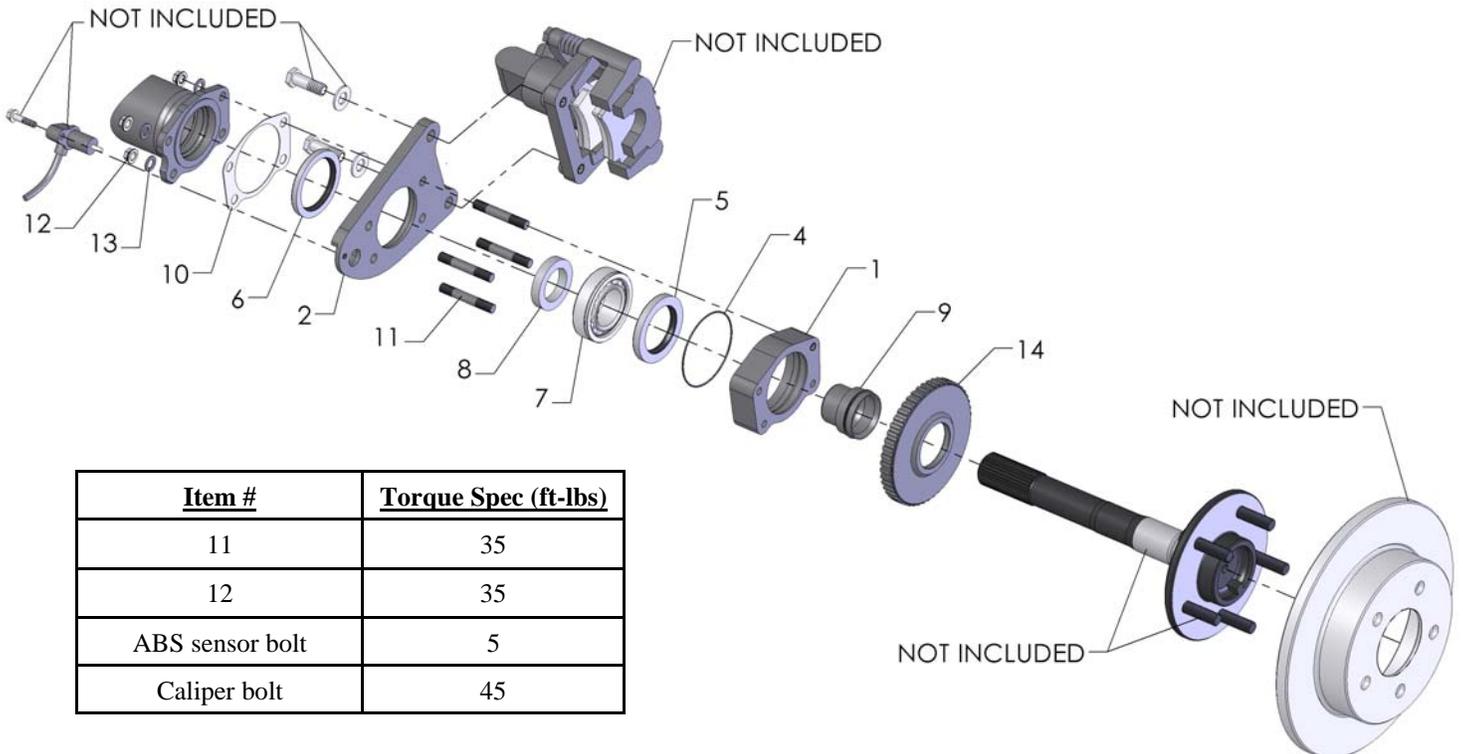
Installation instructions for A1096 and A1097 safety hub (C-clip eliminator) kit for stock axles with factory 8.8 Ford housing ends using '94-'04 factory Mustang GT or Cobra disc brakes.

Before you begin installation: Read these instructions thoroughly and save for future reference. If after reading these installation instructions, you have any questions or comments, please do not hesitate to call us.

KIT CONTENTS

| <u>Item#</u> | <u>Part#</u> | <u>Qty.</u> | <u>Description</u> |
|--------------|--------------|-------------|---|
| 1 | A1094A | 2 | Safety hub outer half |
| 2 | A1094B | 1 | LH caliper mount for GT brakes (A1096 kit) |
| 2a | A1094BC | 1 | LH caliper mount for Cobra brakes (A1097 kit) |
| 3 | A1094C | 1 | RH caliper mount for GT brakes (A1096 kit) |
| 3a | A1094CC | 1 | RH caliper mount for Cobra brakes (A1097 kit) |
| 4 | A1094D | 2 | O-ring for safety hub outer half |
| 5 | A1090F | 2 | Outboard axle seal |
| 6 | A1100F | 2 | Inboard axle seal |
| 7 | A1011 | 2 | Timken tapered axle bearing |
| 8 | A1032D | 2 | Wedding ring |
| 9 | A1096A | 2 | Bearing sleeve |
| 10 | A1092E | 2 | Housing end gasket |
| 11 | A1092C | 8 | Housing end studs |
| 12 | F1282 | 8 | 3/8"-24 jet nut |
| 13 | S3402N | 8 | 3/8" AN washer |
| 14 | A1094E* | 2 | Reluctor ring (Optional for use with ABS) |

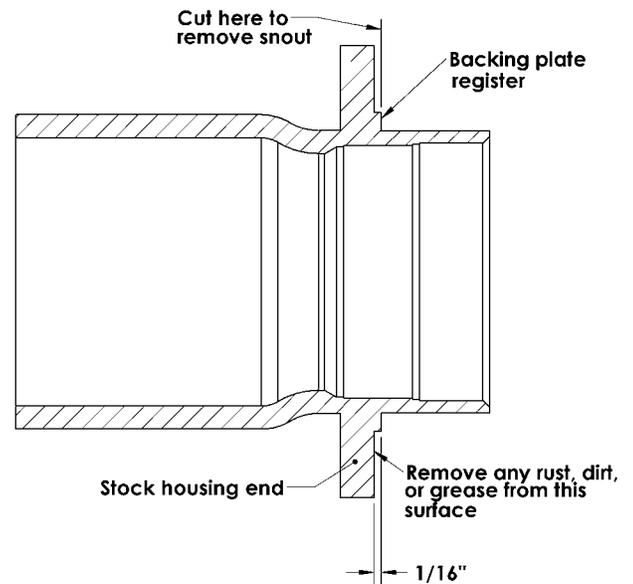
***NOTE: If using the optional reluctor ring for ABS, axle studs must be installed before the ring is pressed on the axle**



| <u>Item #</u> | <u>Torque Spec (ft-lbs)</u> |
|-----------------|-----------------------------|
| 11 | 35 |
| 12 | 35 |
| ABS sensor bolt | 5 |
| Caliper bolt | 45 |

Figure #1: Exploded view of assembly (Driver's side shown with GT brakes)
Note: Some components come already assembled from Strange Engineering

Figure #2: Modification to housing

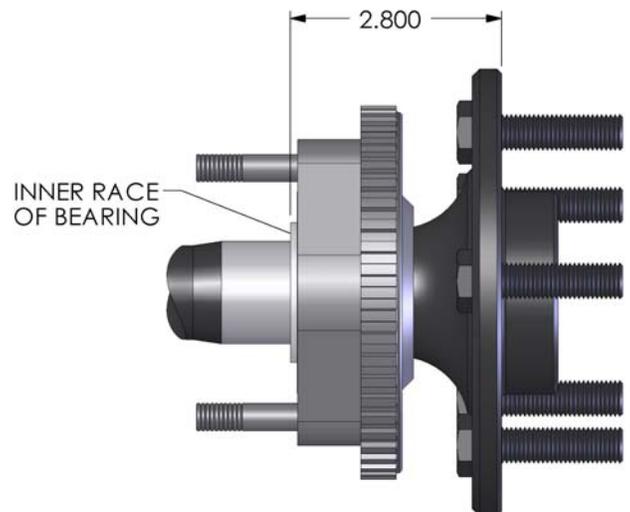


- 1.) Raise and support rear of vehicle on a level surface using suitable equipment.
- 2.) Remove wheel and tire, anti-moan bracket, brake caliper, and brake rotor. The brake line does not need to be disconnected from the caliper, however, do not let the caliper hang from the brake line.
- 3.) The stock c-clip axles must be removed by taking off the differential cover, removing the differential cross pin, pushing the axles inward, then removing the axle c-clips, and finally sliding the axles out of the housing.
- 4.) Unbolt the stock caliper bracket from the housing.
- 5.) Remove the stock bearing and seal from the housing snout. This is best accomplished using a slide hammer.
- 6.) Using a hacksaw, shorten the housing snout leaving the 1/16" tall backing plate register (See Figure #2). File the end of snout to remove any burrs.
- 7.) Remove any rust, dirt, oil, or grease from outside face of housing flange (See Figure #2).

- 8.) Now press the safety hub outer half assembly (1,4,5,7,9) onto the axle pressing only on the inner race of the bearing (7) to the dimension shown in Figure #3. The side of the safety hub outer half (1) with the o-ring (4) must face inboard. To aid in installation, slightly oil the ID of the seal and bearing. If using ABS, the optional reluctor ring (14) will already be pressed onto the bearing sleeve (9) which is assembled in the safety hub outer half (1). **NOTE: If using the optional reluctor ring, the axle studs must be installed in the axle flange before the reluctor ring is installed.**
- 9.) Press the wedding ring (8) onto the axle until it seats flush against the bearing (7).
- 10.) Install the four housing end studs (11) into the safety hub outer half (1) with red loctite and torque to 35 ft-lbs.
- 11.) Slide the caliper mount with inboard seal (2,6) over the housing end studs (11). Apply a slight coating of oil to the ID of the seal before installing to aid installation and to prevent it from running dry.
- 12.) Apply a thin coating of RTV sealer to both sides of housing end gasket (10) and place on the housing end flange.
- 13.) Slide the axle, safety hub, and caliper mount assembly into the housing. Make sure the studs line up with the holes in the housing end flange and the housing end gasket.

- 14.) Install the four 3/8" washers (13) and 3/8"-24 jet nuts (12) on the housing end studs.
- 15.) Torque the 3/8"-24 jet nuts to 35 ft-lbs. Ensure all components are properly seated with no gaps between parts. **NOTE: Due to the many brands of differentials and variety of gear ratios you must ensure that the axle shafts do NOT contact the differential cross pin. If either axle is contacting the cross pin, the axle must be cut (should not exceed 0.220") to clear the pin; otherwise bearing failure may occur.**
- 16.) If using ABS, install the factory sensor in the caliper mount (2,3) using the stock 6mm bolt. Torque to 5 ft-lbs.
- 17.) Slide the factory rotor over the wheel studs making sure the rotor will seat flush against the face of the flange.
- 18.) Install the factory brake caliper and anti-moan bracket using the factory 12mm bolts and washers. Torque to 45 ft-lbs.
- 19.) Mount wheel and tire and torque lugs nuts to the recommended specification of the wheel manufacturer.

Figure #3: Press dimension for bearing



WARNING – RACING IS HAZARDOUS

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