

Clydesdale Steering Linkage Date 12/10/17 rev. 0

You have 4 forgings, 2 driver/left side (1 for tie rod and 1 for drag link). Those are the same. You have 1 passenger/right side tie rod forging (the one with the hole). You have 1 passenger/right side drag link forging. Right sides will use the right hand jam nut and left sides will use left jam nuts.

1. Apply anti-seize to all forging threads and thread jam nuts onto forgings.

INSTALLING CARTRIDGES: Apply anti-seize to all cartridge threads. Identify pitman arm cartridge. It will be the only one with a machined housing that looks different from the rest.

2. Locate a driver/left side forging and lock the pre-installed jam nut in a heavy vise. Install the pitman arm cartridge into the forging from either side and torque to 120 ft/lbs using a 2" socket or use the Clydesdale wrench and when the cartridge is tightened down give it a couple good smacks with a five lb hammer. The point is it needs to be tight.

3. Locate the lower drag link cartridge and install it in the passenger/right side forging (the one without the hole). Use the same procedure as above.

4. Now you can thread the drag link sleeve onto the driver and passenger side forgings. NOTE: the forgings are for specific ends of the sleeve. Driver side with the driver/left/pitman arm cartridge will thread into the left hand threads of the sleeve. Passenger/right will thread into the right hand threads of the sleeve. Set the drag link aside for later.

5. Locate a driver/left side forging and using the same procedure as above install a tie rod cartridge into the forging from either side.

6. Now you are left with the passenger side forging (the one with the hole). Note the orientation of the tapered hole in the forging. This is the only forging you need to make sure the cartridge installs from the correct side. The larger side of the hole will face the front of the vehicle as the drag link will be installed from the front. This is important because some will be doing a TRO (tie rod over). Most will be installing in the tie rod under knuckle configuration (like stock). Follow the same procedure for installing the cartridge once you have the orientation correct.

7. Now you can thread the tie rod sleeve onto the driver and passenger side forgings. NOTE: the forgings are for specific ends of the sleeve. Driver side (no hole) will thread into the left hand threads of the sleeve. Passenger/right (with hole) will thread into the right hand threads of the sleeve.

INSTALLATION INTO VEHICLE

1. Set the center to center tie rod to 48" for 66-75 Bronco knuckles, 50" for 76-77 Bronco knuckles, 56" for Full size front end. Tires should be straight ahead and steering box centered. In a perfect world with the steering box centered right to left, the pitman arm would be pointed straight back or forward (depends on vehicle) in line with the frame. That may or may not be possible but that is why the drag link is adjustable.

2. Install dust seals on tie rod ends. Now install ends into right and left steering knuckles. If the tapered section of the cartridge comes through the knuckle a washer can be used before the castle nut. If only the threads can be seen no washer is necessary. Torque castle nuts to 75 ft/lbs and install cotter pin. You may need to tighten more to expose the cotter pin hole.

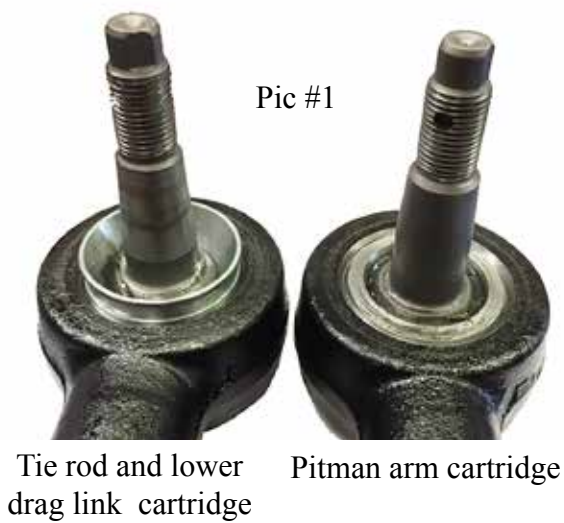
3. Install the lower dust seal to drag link cartridge then install cartridge into the right side tie rod. Torque castle nut to 75 ft/lbs and install cotter pin. You may need to tighten more to expose the cotter pin hole.

4. With tires pointing forward and steering box centered, adjust drag link longer or shorter by rotating the sleeve until pitman arm cartridge lines up with the pitman arm and install cartridge into pitman arm. If the tapered section of the cartridge comes through the pitman arm a washer can be used before the castle nut. If only the threads can be seen no washer is necessary. Torque castle nuts to 75 ft/lbs and install cotter pin. You may need to tighten more to expose the cotter pin hole.

5. Perform front end alignment (toe adjustment), and tighten all four jam nuts.



Clydesdale shown in “stock” tie rod under configuration. Photo may vary slightly from what you receive. This photo is here to show basic info. Center to center measurement should be taken like in pic above.



Most of the time washers will not be needed, but on occasion they will be. Make sure you use the washer if the cartridge comes through the knuckle or pitman arm as shown in Pic #3 above. Pic #4 and #5 shows placement of washer, castle nut and cotter pin.