

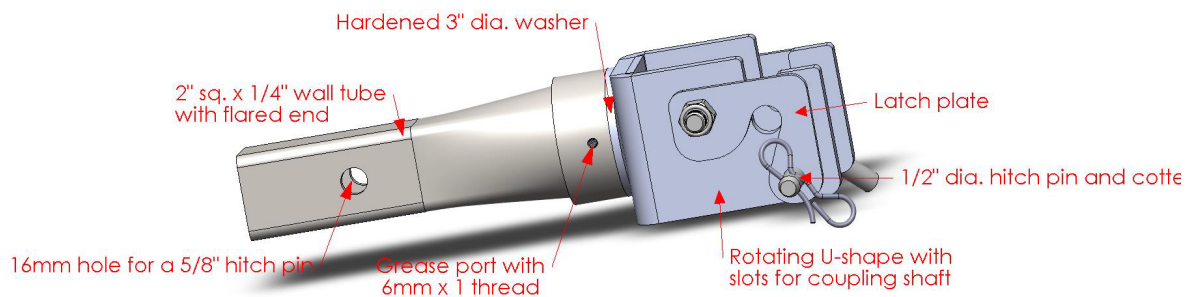
## GENERAL INSTRUCTION:

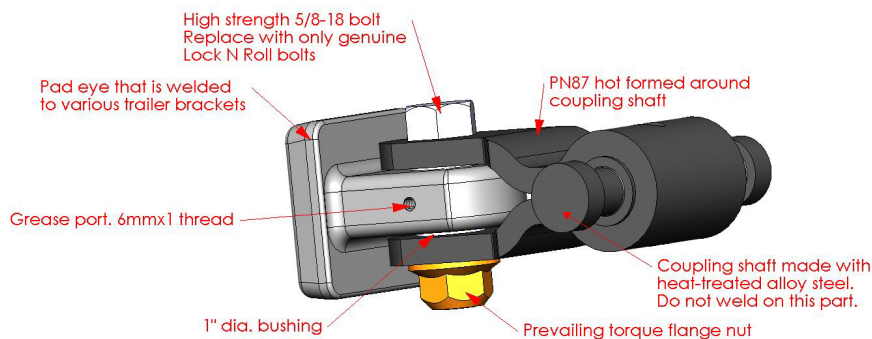
### 1 .Basics of coupling and uncoupling the Lock N Roll system:

The first step is to remove the ½” diameter hitch pin and swing the latch plates out of the way. It is best to have the trailer and vehicle straight in line and the coupling shaft directly over the slots of the vehicle side hitch. Some misalignment is allowable as long as either the trailer and vehicle are straight in line or if the coupling shaft is directly over the slots. The trailer and vehicle can be at an angle if the coupling shaft can be lowered directly into the slots. The vehicle or trailer can be moved slightly forward or back to let the coupling shaft drop down if the trailer and vehicle are in a straight line. In this case the coupling shaft can rest in front of or just above the slots and easily fall into place. This is not recommended if the trailer and vehicle are not in a straight line. Once the coupling shaft is touching the bottom of the slots it is time to swing the latch plates over the coupling shaft and secure them in place with either the hitch pin and cotter pin provided with your Lock N Roll hitch or with a ½” diameter bolt and lock nut or a locking hitch pin. If you lose your hitch pin the quickest fix is to use a ½” bolt. Replacement hitch pins are available on the lock n roll website. After the latch plates are secured, you can completely raise your jack stand.

Safety chains are required by law for any public road. They must crisscross under the hitch and have a secure attachment point on the vehicle. The attachment points on the trailer side must be independent of the lock n roll coupler. In other words, they must attach directly to the trailer frame. The safety chain attachment points on the trailer must be far enough away from the lock n roll so the hitch and coupler cannot hit the chain attachment points if the trailer is turned to an extreme angle (jack knifed).

### 2. line drawing with names of the different parts





This document may be out-of-date because  
it has file references that may have been updated. (more...)

### 3. Line drawing with dimensions coming soon

### 4. Greasing instructions.

Lock N Roll uses low profile grease fittings instead of the Zerks fittings you may be more familiar with. The reason for this is the zerks are easily snapped off and then become useless and a nuisance to replace. To insert grease, a needle filler or flush nozzle should be attached to your grease gun. Attach them directly to the grease gun or a stiff pipe coming out of the grease gun. Attaching them to a flexible hose will make squirting in the grease more difficult. The nozzle must be pressed squarely and firmly against the grease fitting. The low-profile grease fittings have a spring-loaded ball bearing that is pushed out of the way with the proper grease nozzle. Pump grease in until you see clean grease coming out. This will help clean road dirt out of the joint. Wipe away any excess grease. Keeping the Lock N Roll clean and greased will prolong the life of it. Remember, grease is cheaper than parts. Dirt and rust will make it wear out or not perform as well as it should.

### 5. Torque loads for bolts:

The 5/8" high strength bolt and prevailing torque nut that attaches the T-shape to the trailer must be torqued to 180-220 ft lbs. This bolt is a Grade 9 with much higher shear strength than a grade 8 bolt. Contact Lock N Roll if you need a replacement. The T-shape clamps down against a 1 inch diameter bushing that rotates inside of the pad eye that is part on the bracket that is attached to the trailer tongue. This creates a rigid structure consisting of the 5/8" bolt, torque nut, T-shape, and bushing.

The two bolts for the height adjustment channels should be tightened to 120 ft lbs. or until they start to close in the outer channel that is found on a VS505, VS515, VS519, TS504, or TS540.

The 1/2" bolt that holds the latch plates should be loose with about 1/16 to 1/8" gap. Make sure the nut is a prevailing torque nut like the nylon insert nut provided with your Lock N Roll or a deformed nut.

It's hard to rotate my new Lock N Roll. Is it defective?

The hitch will rotate under load and will work free. The hitch is assembled by hot riveting. We try to initially make the fit as tight as possible with the expectation that it will loosen up after some use and the paint is worked free.

#### 6. trailer and tongue weights

The weight rating of any combination of parts is limited by the least strong component in each combination. Gross trailer weight and tongue weights are listed in the individual part descriptions.

#### 7. How to determine which vehicle side Lock N Roll is the right choice

To select the correct vehicle side unit, first measure from the ground to the center of the vehicle's receiver tube. Compare that measurement with the distance from the ground to the center of the Lock N Roll coupling shaft. If you haven't yet installed a Lock N Roll, measure the height of the trailer tongue minus 1-1/2 inch. If the difference is within 1-1/2 inches select VS501, 1-1/2 to 3" difference choose VS511, 3" to 5-1/2 " use VS517, anything more than 5-1/2" use the combination of VS503 and either VS505, VS515, or VS519.