



4859 Convair Drive  
Carson City, NV 89706  
Phone (775) 884-2292  
Fax (775) 884-3363

## INSTALLATION INSTRUCTIONS

Please follow these instructions to ensure the proper operation of your T & D MACHINE PRODUCTS Brodix Canted Valve Rocker Arm Assembly.

### 1. DETERMINE CORRECT STAND HEIGHT

Install the rocker stands on the cylinder head using the 7/16-14, 12 point attaching bolts. Be careful to keep the rocker arms in the order that they were removed from the stands. The stand marked with a "LOE" in the lower left hand corner of the stand is for the left-hand (looking at the head from the exhaust manifold side) outside exhaust valve. The stand marked with a "ROE" in the lower right hand corner of the stand is for the right-hand outside exhaust valve. The stand marked with a "ME" in the lower left-hand corner is for the paired exhaust valves in the middle of the head. The stands that are marked with an "IN" are for the intake valves, and are interchangeable. There is a "V" stamped in the middle of each stand to note that this is the side that faces the valves when installed on the head. Remove a rocker arm from one of the shafts and place that shaft on a stand. Take the shaft height gage supplied with the kit and place it on the valve stem as shown in Figure 1.

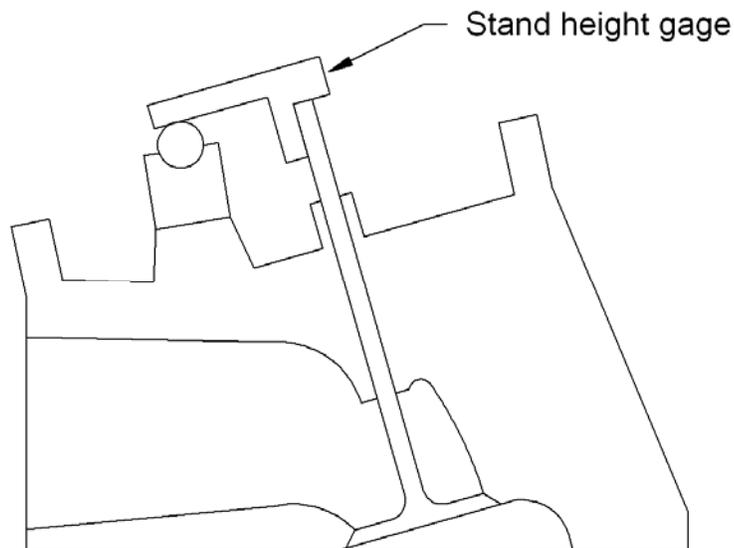


Figure 1

The gage should contact the top of the valve and the rocker shaft as shown in Figure 1.

If the gage contacts the shaft before touching the top of the valve stem, as shown in Figure 2, remove a corresponding amount of material from the stud bosses on the cylinder head. This will lower the rocker stand on the cylinder head.

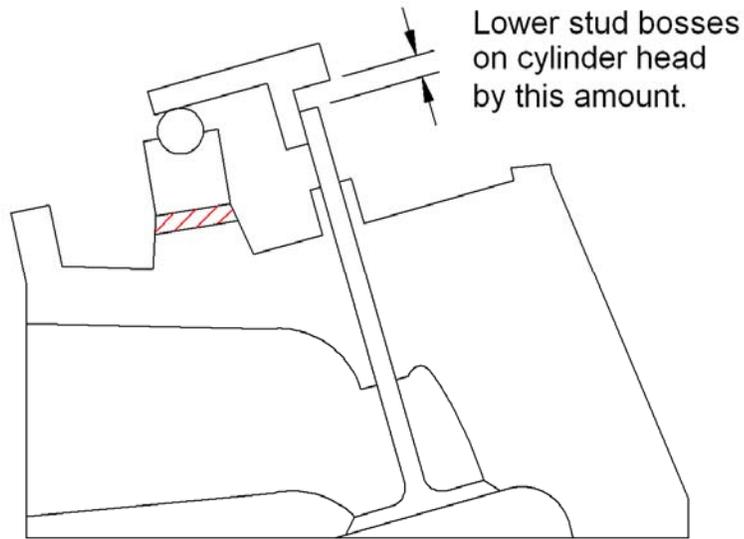


Figure 2

P/N 0588

If the gage contacts the top of the valve stem and does not touch the rocker shaft, as shown in Figure 3, add a corresponding amount of shims between the stand and the cylinder head. This will raise the rocker stand and shaft to the correct height.

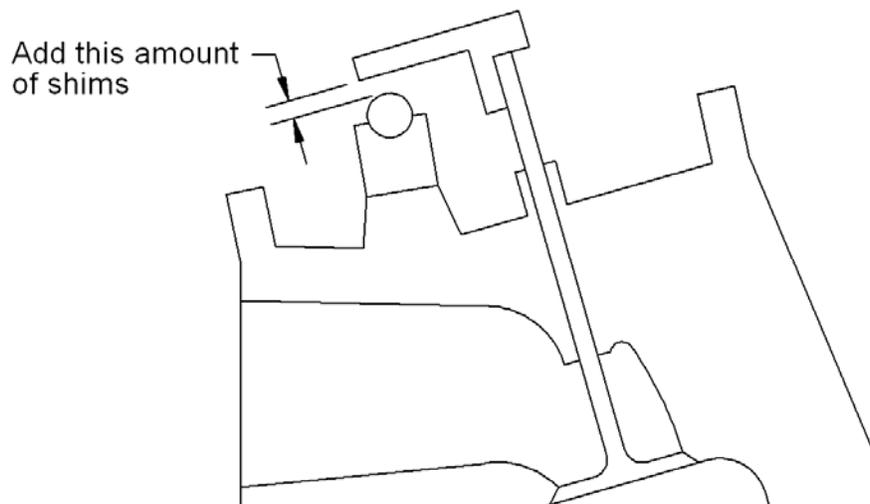


Figure 3

After all of the shaft heights have been set, install the stands to the head and torque the bolts to 55/65 ft-lbs. The outside exhaust stands have been set-up to index on the notch in the intake stands to keep them from rotating at high rpm's. Take care to be sure that the exhaust stands are held snug against the intake stands while tightening the stand bolts.

## 2. DETERMINE CORRECT PUSHROD LENGTH

Place the pushrod length checker into the lifter and install the rocker arm assembly. Be sure the cam is rotated to the base circle. Seat the bottom of the adjuster screw up against the recess in the rocker arm and turn the adjuster screw clockwise on full turn down. This is the initial adjuster position. Adjust the pushrod length tool to the proper length, remove from the engine, and measure its overall length.

The rocker arm should not be operated with the adjuster screw more than one turn up or down, from the initial adjuster position. Doing so can cut off the flow of oil to the rocker arm.

## 3. FINAL ASSEMBLY

Place the rocker arm and shaft assemblies on the stands, making sure that the correct rockers are on their corresponding stands. Align the roller tip so that it is centered on the valve stem and tighten the shaft hold down bolts to 25 ft-lbs. After all of the rockers have been tightened down, set valve lash and torque the adjuster screw jam nut to 5/20 ft-lbs.