

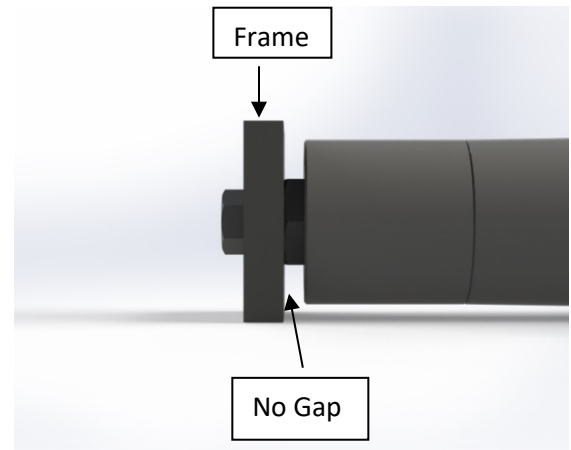
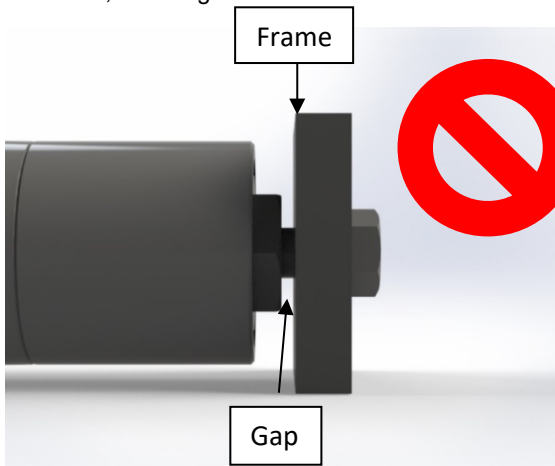
READ THESE INSTRUCTIONS CAREFULLY BEFORE STARTING INSTALLATION

1. MOUNTING

PPI recommends a frame design that puts minimal axial load on the bearing when mounting.

In particular it is important to reduce the amount of axial load that is applied to the inner bearing, this is done by having minimal or no tension pulling outward on the roller. This can be achieved by having a flexible attachment point or a frame that applies a small amount of inward pressure on the roller. Excessive inward pressure will seize the bearing, while outward pull will remove clearance, reducing the roller life.

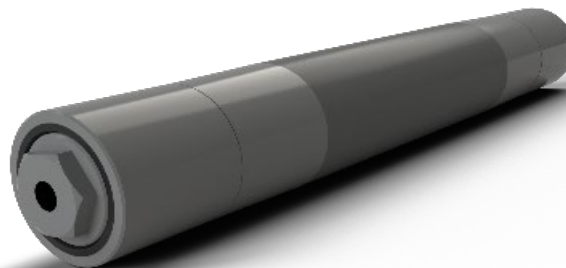
It is very important that, if the roller is being mounted rigidly in a rigid frame that if there is a gap between the end of the roller and the frame to insert shims or washers to remove this clearance before tightening the mounting bolts. Note that there is a gap that is just over a 1/4" between the face of the roller and the end of the hex section of the TTR.



2. INSTALLATION

PPI offers the TTR standard with a 1-1/8" hex end on the roller to allow for the mounting bolt to be tightened and secure the roller in the frame. The shaft can be easily held with a 1/4" thick custom wrench.

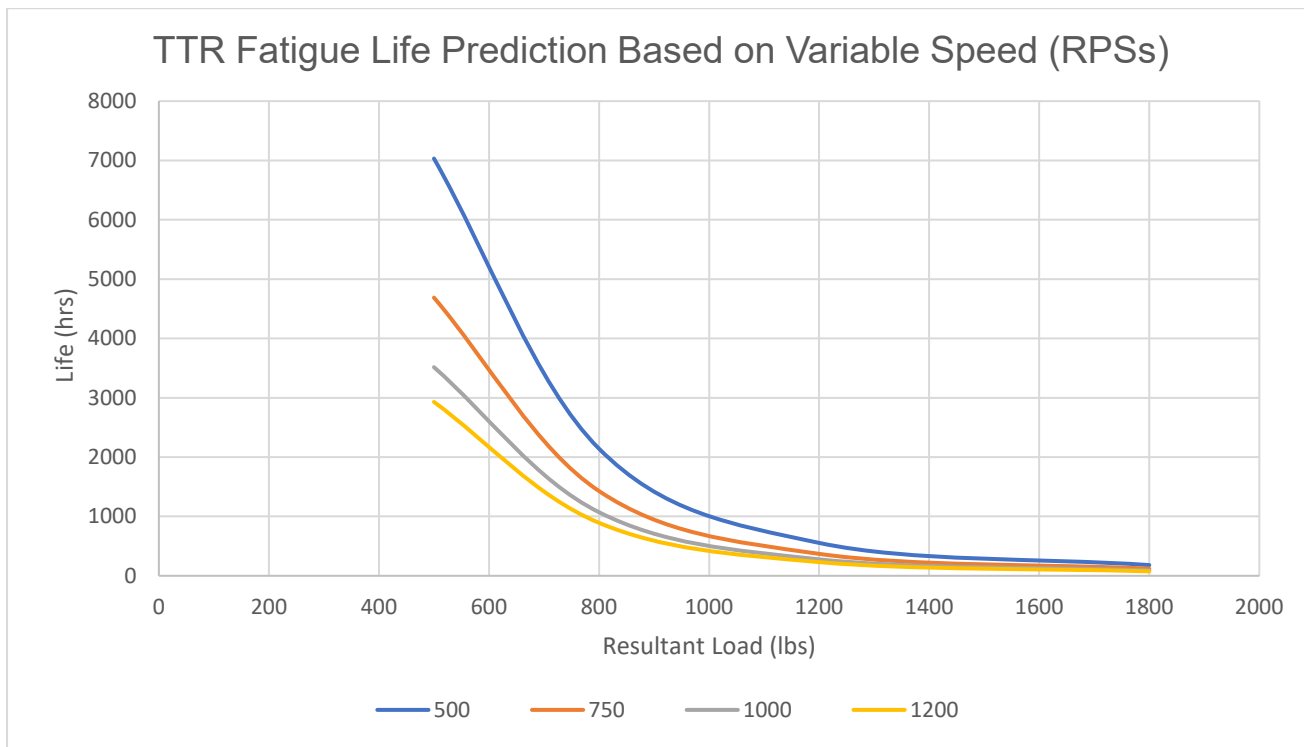
The standard tapped hole offered is a 1/2 UNC, other options can be special ordered. For the standard 1/2 UNC bolt after ensuring there is minimal or no gap tighten the bolt to 60 ft-lbs



3. MAINTENANCE

The TTR is greased and sealed at the factory, there is no need to do further maintenance other than keeping the area around it free of debris that could compromise the seal on the roller. The rubber seal will protect against airborne contaminants and falling particles, but is not intended to protect against large objects which may damage the seal. Fabric thread from woven conveyor belts is a typical example of this.

Due to the sealed for life nature of the roller, the TTR has a finite life based highly on the environment and loads in a given application. By monitoring conveyor cleanliness, the reliability of the entire conveyor system can be drastically improved. The approximate bearing life expectancy can be estimated using the graph below.



The above graph is based on a C90, L10 life expectancy, for 4 different speeds (500, 750, 1000, and 1200 rpm). This is the estimated fatigue life where 90 percent of the bearings will reach 90 million cycles. Please note this does not address other factors which will reduce life, such as:

- Contamination
- Misalignment
- Wear
- Lack of lubrication

PPI in house testing has been used to assemble this data and has been used as a guide to set load limits for the TTR. The TTR is a sealed for life stub shaft roller, and care must be taken during installation to prevent excessive bearing preload.



CORPORATE OFFICE • P.O. Box 287 • Pella, IA 50219
800.247.1228 • 641.628.3115 • 641.628.3658 FAX