



Fan Freewheeler

1. Before starting installation, lay out and identify all components, including fasteners, to determine if anything is missing.

2. Remove existing fan blade and spacer and determine pump shaft diameter. The "FREEWHEELER" is designed to fit a $\frac{3}{4}$ " diameter water pump shaft. If shaft diameter is $\frac{5}{8}$ ", use $\frac{5}{8}$ " to $\frac{3}{4}$ " bushing ALL99026 (not supplied).

3. Push water pump pulley(s) squarely against the flange on the pump shaft and measure distance the water pump shaft protrudes through pulley. The maximum acceptable distance here is $\frac{5}{16}$ ". If shaft length exceeds this dimension, carefully grind the shaft protrusion.

4. Install the "FREEWHEELER" drive mandrel and pulley(s) and bolt to the water pump with the $\frac{5}{16}$ "-24 x 1" socket head capscrews. Make sure that the capscrews fully engage the water pump flange by looking at the backside of the pulley. (Maximum pulley thickness with these bolts is $\frac{1}{4}$ ". If setup is thicker, proportionately longer bolts will have to be used.) Once proper bolt length has been determined, remove bolts and apply blue thread locker to the threads, re-install and torque to 19 ft. lbs.

5. Slide the "FREEWHEELER" housing assembly onto the mandrel. Apply thread locker to the $\frac{1}{4}$ "-20 x $\frac{1}{2}$ " bolt, install it and the $\frac{7}{8}$ " diameter flat washer to retain the housing on the mandrel. Torque the bolt to 4 ft. lbs., or 49 in/ lbs.

6. Apply anti-seize to the $\frac{5}{16}$ "-18 x 1" hex bolts and then install the cap and fan blade, using the lock washers and flat washers. Torque the bolts to 13 ft. lbs.

7. The "FREEWHEELER" is now ready to use. The knurled head lockbolt can be inserted and secured with the nut and washer when fan is to be used. Torque the locknut to 12 ft. lbs. When fan is not needed, remove the lockbolt. (A plastic hammer may be needed to gently tap the lockbolt for removal or installation.) Use WD-40 or equivalent occasionally to ease installation.



Allstar Performance 8300 Lane Drive, Watervliet MI 49098
Phone: (269) 463-8000 Fax: (800) 772-2618 www.allstarperformance.com