



Bearing Change Instruction

Bearing Removal & Replacement

When a bearing becomes noisy it should be changed at once. You should change only one bearing at a time. **NEVER REMOVE BOTH BEARINGS AT THE SAME TIME. THIS WILL CHANGE INTERNAL SETTINGS AND DAMAGE TO ROTOR ASSEMBLY MAY RESULT.**

Procedure to replace bearing:

1. Remove the automatic lubricator and piping from the bearing. See Figure 1
2. Remove the 4 screws that hold the bearing cap to the flange bearing. The cap covers 2 set screws (internal hex head) located in the inner race of the bearing. These set screws hold the rotor in axial alignment. See Figure 2
3. Remove the 4 nuts holding the bearing to the head. With the hardware removed pull the bearing off shaft. See Figure 3
4. Install new bearing on the shaft and replace the 4 nuts that hold the bearing to the head and tighten them down to the required torque.
5. Remove the set screws from the inner race of the bearing and apply a small amount of medium strength threadlocker. Reinstall the set screws in the inner race and tighten them down to the required torque.
6. Install the bearing cap to cover the set screws.
7. Before reinstalling the automatic lubricator piping National Turbine recommends cleaning out any old grease from the piping and refilling the piping with the lithium grease recommended for the 4 bolt flange bearing.

NOTE: Bearings are approximately 33% filled with lubricant at the factory. No grease should be pumped into the bearing.

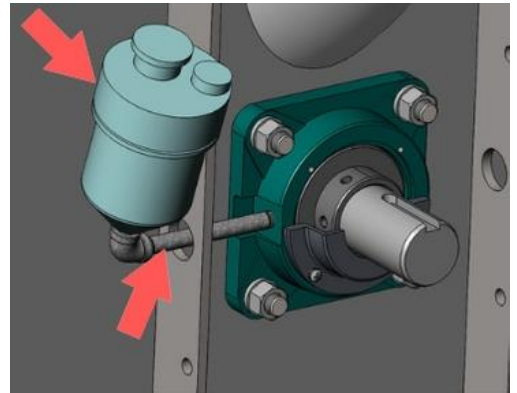


Figure 1

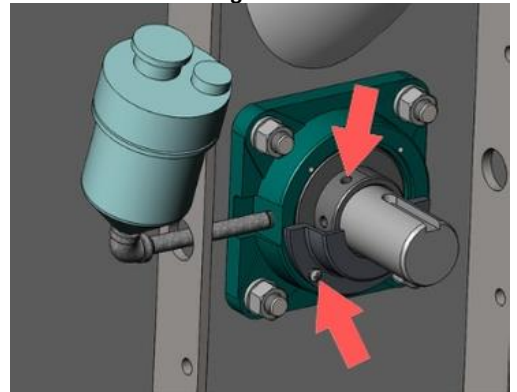


Figure 2

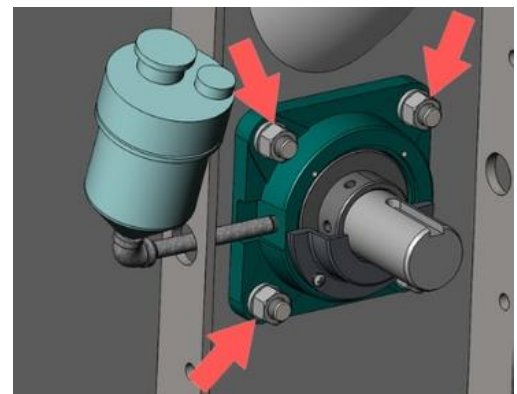


Figure 3

MANUAL LUBRICATION INTERVAL

Model	Interval	Grease Amount
M24B	Weekly	3.5 CC
M30B	Weekly	4.0 CC

GREASE SPECIFICATIONS - FOR 4 BOLT FLANGE BEARING

NGLI GRADE	NO. 2
THICKENER TYPE	LITHIUM COMPLEX
OIL	SYNTHETIC OIL
VISCOSITY	445 cSt @ 40° C
VISCOSITY INDEX	150
DROPPING POINT (ASTM D2265)	509°F (265°C)
CORROSION PROTECTION	PASS
TEMPERATURE RANGE	-40°F (-40°C) TO 302°F (150°C)
TEXTURE	SMOOTH
COLOR	RED

Recommended Torque

Series	Bearing Setscrew	Head Bolts
M24B	126-156 in-lbs	500 in-lbs
M30B	228-275 in-lbs	