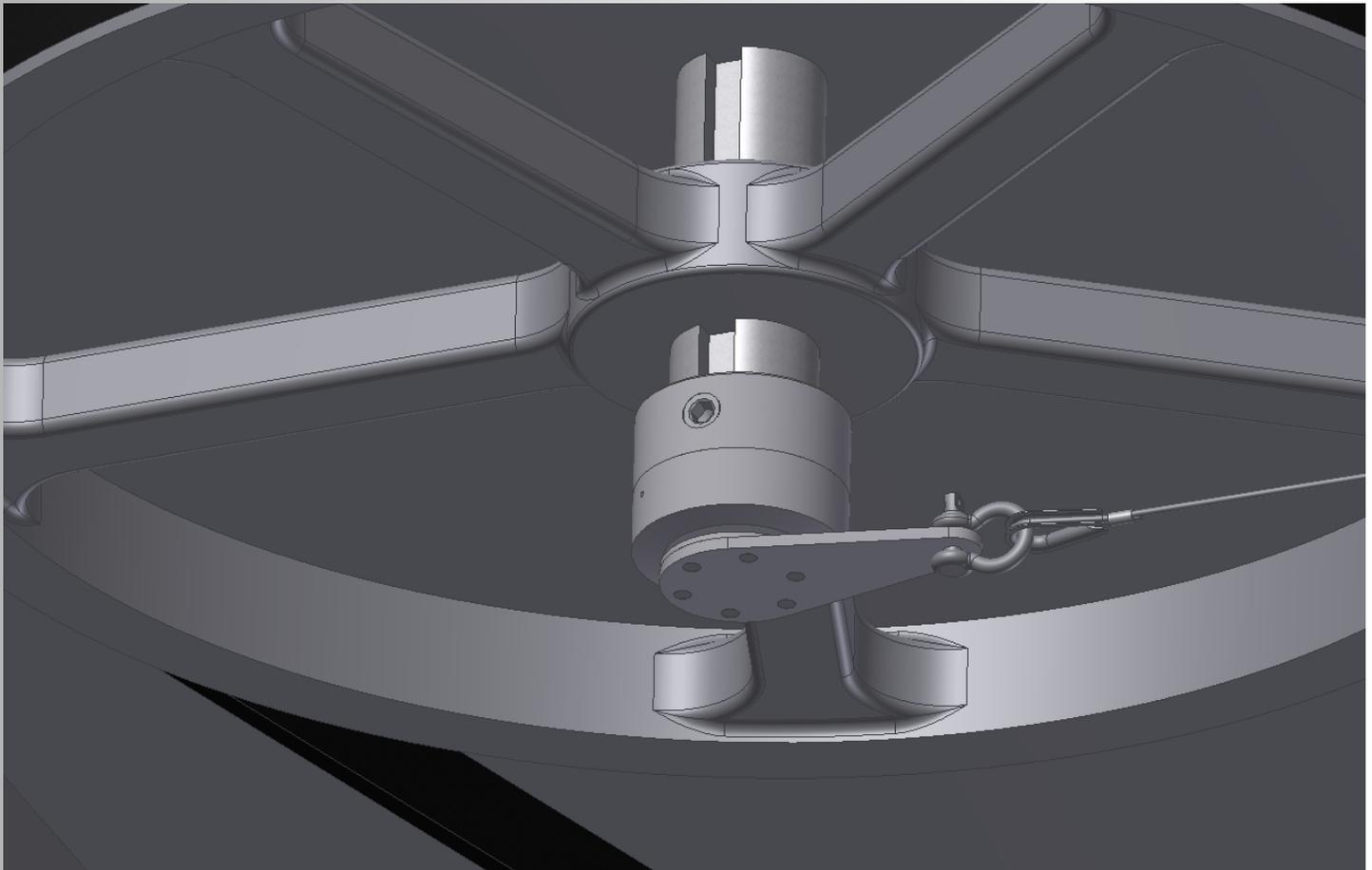




# Introducing the AirBrake®

*Moore Fans Anti Windmilling Device*

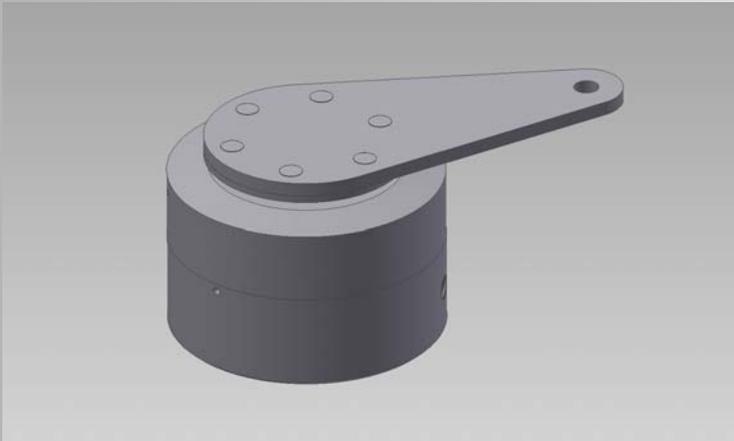
- ***Over 280 lb.ft (37.7 kg.m) of Holding Torque***
- ***Temperature Range of -40 °F to 212 °F (-40 °C to 100 °C)***
- ***Easily Installs on the Fan Shaft***
- ***Low Profile Design***
- ***Maintenance Free***
- ***Available for shaft diameters up to 3 inches (76.2 mm)***
- ***Bushing adapters available for QD bushing sizes SF, E, F, and J***
- ***Max speed 600 RPM***



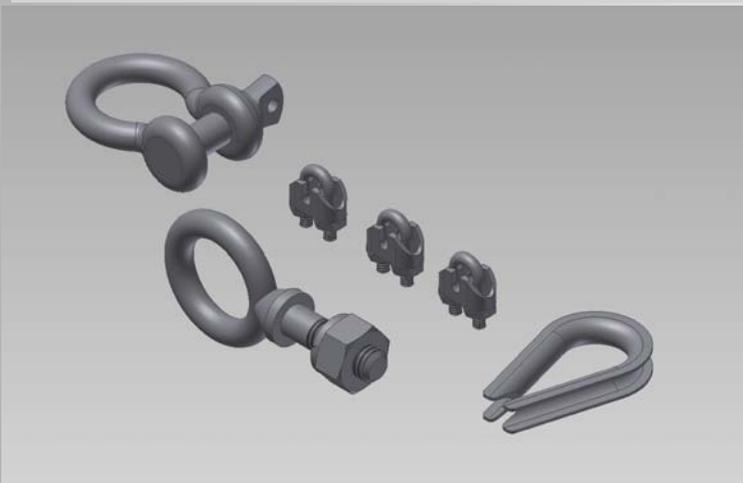
# AirBrake® Installation Instructions



Prior to installation please confirm that the following parts are present.



- Qty(1) AirBrake® assembly
- Qty(1) Shackle with screw pin
- Qty(3) Wire rope clips
- Qty(1) Thimble
- Qty(1) 1/2"-13 Eye bolt, washer, and nut
- Qty(1) Stainless steel restraining cable assembly
- Qty(1) Package of Loctite 262



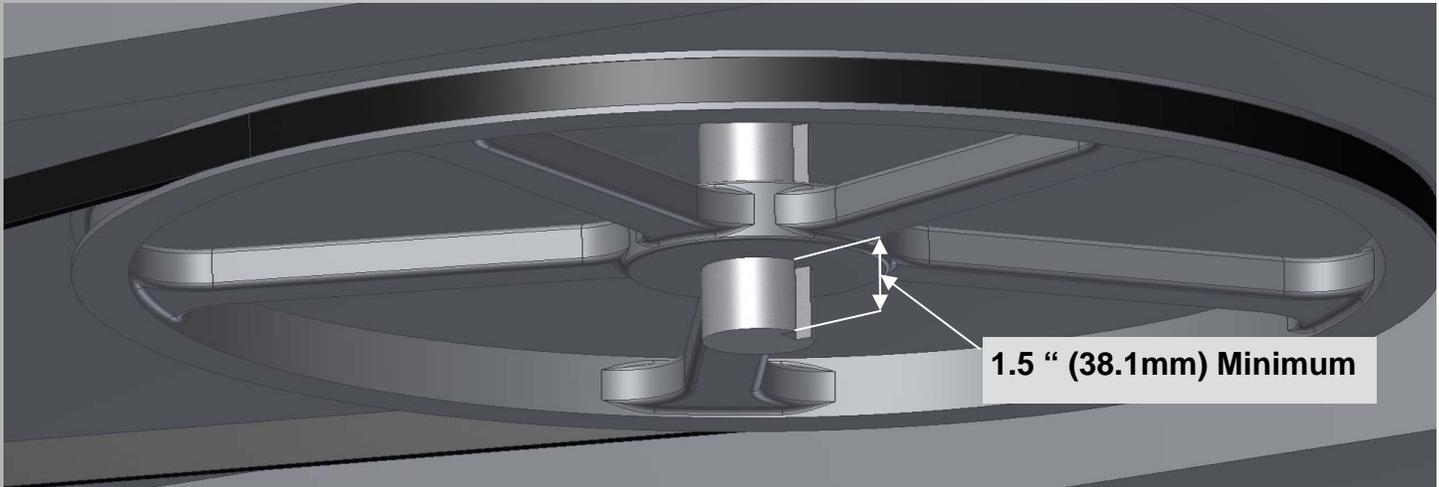
**CAUTION:** Prior to installation confirm the operation direction of the fan, and ensure this coincides with the direction of free rotation of the AirBrake.



## STEP 1.

### NOTE:

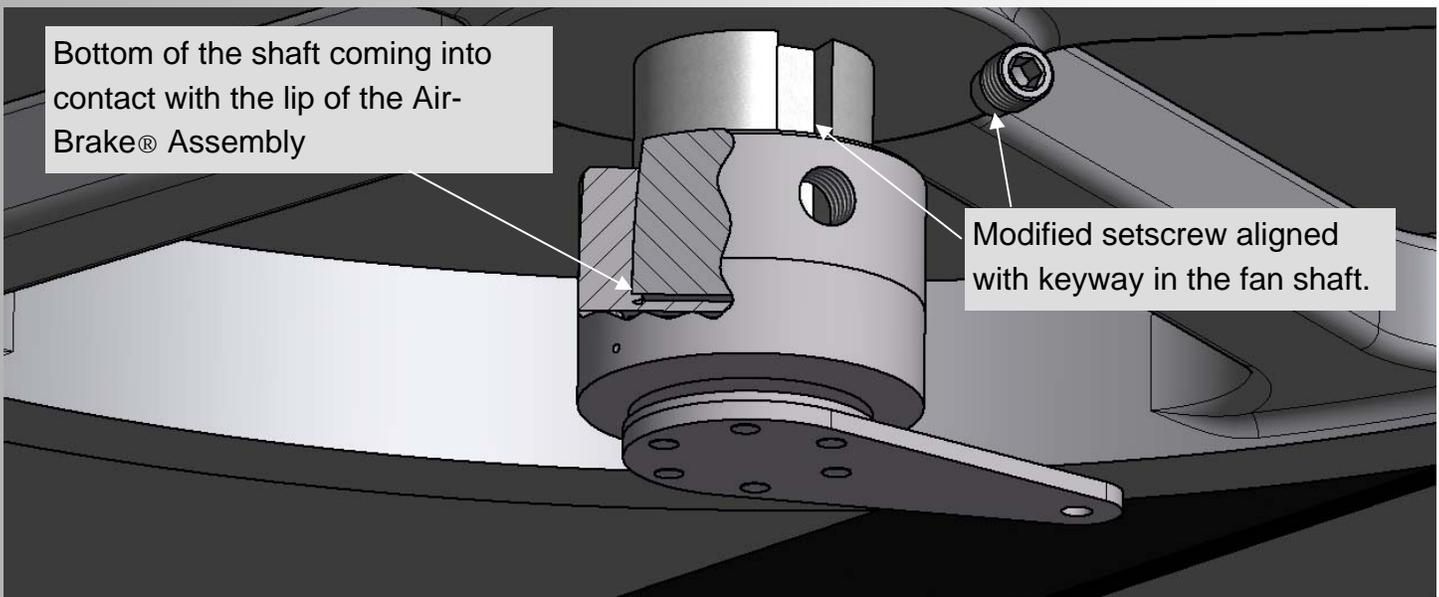
Confirm there is at least 1.5 inches (38.1 mm) of available shaft and that there is at least 3 inches (76.2 mm) of clearance between the bottom of the shaft and the nearest obstacle.



**Figure 1.** Minimum shaft extension necessary to install the AirBrake®.

## STEP 2.

Install the AirBrake® assembly onto the fan shaft by aligning the modified setscrew with the keyway of the fan shaft and sliding the assembly onto the shaft until the bottom of the shaft comes into contact with the lip of the AirBrake® assembly as seen in Figure 2.



**Figure 2.** Proper installation of the AirBrake® onto the fan shaft.

**Table 1.** Torque values for the modified set screw.

| Keyway Width (in) | Torque (ft-lbs) | Keyway Width (mm) | Torque (kg-m) |
|-------------------|-----------------|-------------------|---------------|
| 3/4               | 150             | 20                | 19.4          |
| 5/8               | 100             | 18                | 15.3          |
| 1/2               | 50              | 16                | 11.4          |
| 3/8               | 20              | 14                | 7.6           |
| 1/4               | 6               |                   |               |



**STEP 3.**

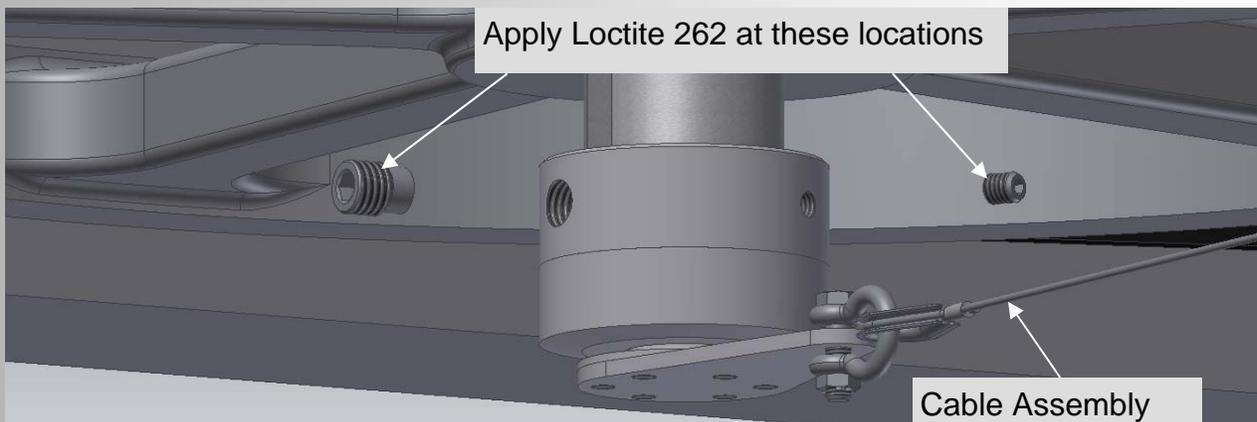
Apply Loctite 262 to the threads of the modified setscrew and tighten using a hex wrench to the proper torque value (see Table 1).

**STEP 4.**

Apply Loctite 262 to the threads of the plain setscrew and tighten using a hex wrench to 45 ft-lbs (6.2 kg-m).

**STEP 5.**

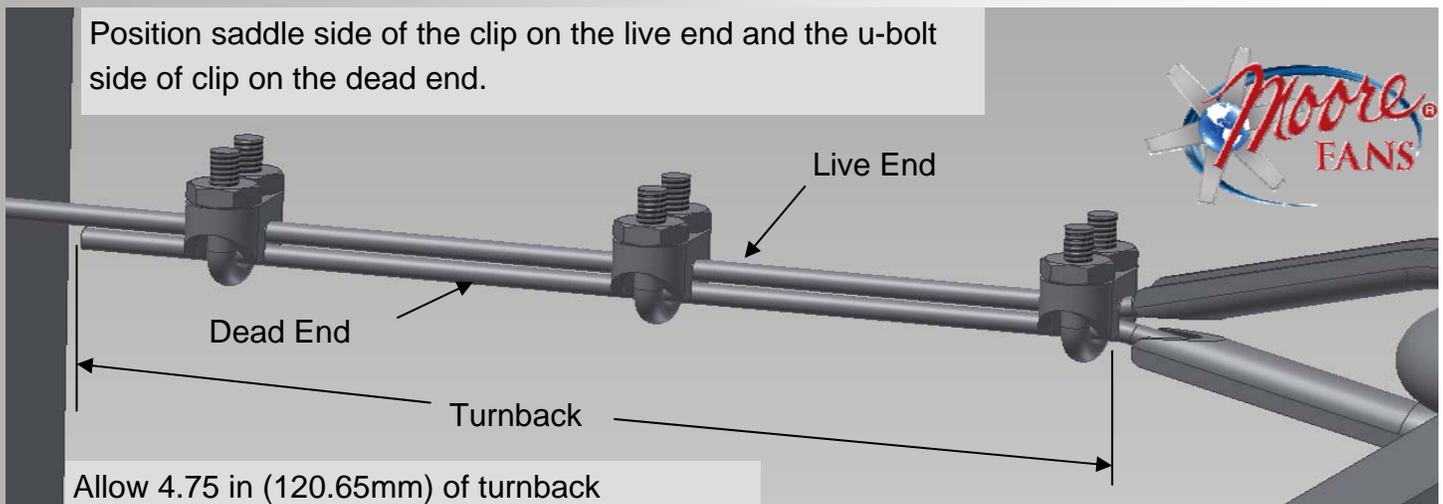
Insert the thimble portion of the cable assembly onto the shackle. Install the shackle on the arm of the AirBrake® assembly with the head of the bolt on the upper part of the shackle as shown in Figure 3. Tighten the nut of the bolt to 20 ft-lbs (2.8 kg-m) and install the cotter pin in the bolt.



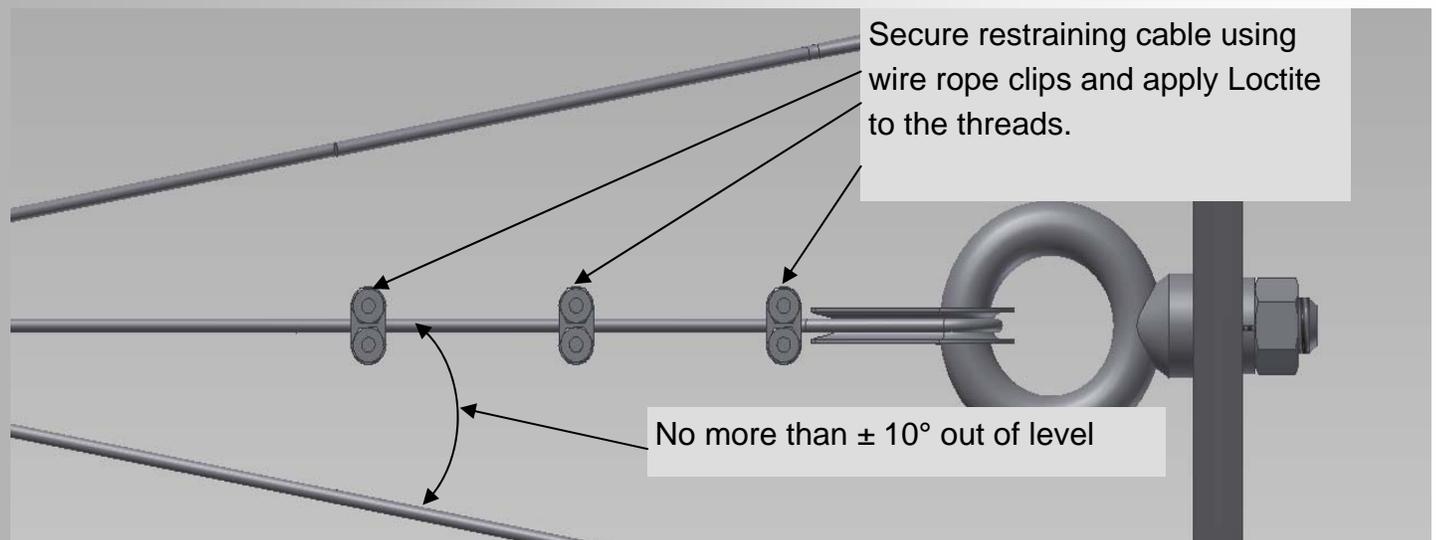
**Figure 3.** Installation of shackle and cable assembly.

**STEP 6.**

Attach the supplied 1/2"-13 eye bolt to a nearby support using the supplied lock washer and nut. Insert one end of the thimble through the eye bolt. Secure the free end of the restraining cable to the attached eyebolt using the supplied wire rope clips as shown in Figure 4. Ensure that the attachment to the support will not make the cable more than plus or minus 10° out of level as shown in Figure 5. Remove all of the slack out of the cable, apply Loctite 262 to the threads of the rope clips and tighten the clips.



**Figure 4.** Proper installation of the supplied wire rope clips.



**Figure 6.** Restraining cable angle tolerance.

### **STEP 7.**

After the installation of the restraining cable, attempt to rotate the fan in the backwards direction by hand and ensure that the AirBrake® is working properly and that there is no slack in the restraining cable. Also, ensure that the restraining cable will not rub on any sharp edges that might lead to fraying of the cable.

### **STEP 8.**

Install all required guards and confirm there is sufficient clearance for the AirBrake®.

### **STEP 9.**

After all of the necessary guards have been installed, run the fan at full speed and ensure that the cable is taut and positioned properly, and that everything is working correctly.