

Field Alert Bulletin Windspire 1.2G 8.27.2009

## Replacement of aluminum pole pusher for Windspire unit.

**Description of Issue:** Mariah Power recommends replacement of the aluminum pole pusher that transmits the leveling force on the Windspire.

**Diagnosis:** In some cases (a minimum material condition), the aluminum pole pusher will come in contact with the spider plate, creating noise and drag on the rotor.

**Recommended Actions:** Replace the aluminum pole pusher with a Mariah Powersupplied replacement.

1.To install the aluminum pole pusher, first ensure there are calm or low-wind conditions. Lower the Windspire unit using the gin pole and supplied cabling, in reverse order of initial raising. Position a jack stand or similar support to support the Windspire on the base pole such that the rotor is above the ground surface. Use a vehicle with sufficient weight and traction. Be careful not to allow too much slack in the cable when initiating the Windspire lowering. Only after the cabling is attached to a vehicle should the foundation nuts be removed for lowering.

2.Remove the magnetic bearing from the bottom end of the Windspire. Use a 13mm socket with at least a 6 inch extension to remove the three M8 x 35mm screws that secure the magnetic bearing. Be sure to remove each screw evenly, in  $\frac{1}{4}$  turns, until the screw heads are free of the spider plate tabs.

3.Using a knife, break the silicone sealing bead at the base of the aluminum dust cover on the magnetic bearing, and use a flat head screwdriver or similar tool to evenly remove the aluminum dust cover.

4. Use a 13mm socket and ratchet to remove the M8 x 12mm screw that secures the aluminum pole pusher.

5. Replace the aluminum pole pusher, and assemble in reverse order of disassembly. Torque on the M8 x 12mm screw that secures the aluminum pole pusher should be 8 ft-lb. Be sure to apply a small amount of silicone at the base of the aluminum dust cover after it is pressed evenly into place.

6. In calm or low-wind conditions, raise the Windpire and attach the foundation nuts. Remove all cabling.

## Summary: Eliminates possible functionality issues with Windspire unit.

For service questions, contact Mariah Power Technical Support by email at <u>service@mariahpower.com</u>