ALERT SERVICE BULLETIN

WW-ASB-61-001 Hub Inspection

1. Planning Information

A. Effectivity

(1) All Whirlwind Propeller GA-200L-() models are affected by this Alert Service Bulletin.

WARNING:

DO NOT USE OBSOLETE OR OUTDATED INFORMATION.
PERFORM ALL INSPECTIONS OR WORK IN ACCORDANCE
WITH THE MOST RECENT REVISION OF THIS ALERT SERVICE
BULLETIN. INFORMATION CONTAINED IN THIS ALERT SERVICE
BULLETIN MAY BE SIGNIFICANTLY CHANGED FROM EARLIER
REVISIONS. FAILURE TO COMPLY WITH THIS ALERT SERVICE
BULLETIN OR THE USE OF OBSOLETE INFORMATION MAY
CREATE AN UNSAFE CONDITION THAT MAY RESULT IN DEATH,
SERIOUS BODILY INJURY, AND/OR SUBSTANTIAL PROPERTY
DAMAGE. REFER TO THE ALERT SERVICE BULLETIN INDEX FOR
THE MOST RECENT REVISION LEVEL OF THIS ALERT SERVICE
BULLETIN.

B. Concurrent Requirements

(1) Additional service documents may apply to the components/propellers affected by this Alert Service Bulletin. Compliance with additional service documents may be necessary in conjunction with the completion of the Accomplishment Instructions in this Alert Service Bullletin.

C. Reason

- (1) Whirlwind Propeller has received reports of cracking around the bolt holes in the hubs on affected propellers.
- (2) Whirlwind Propeller has received reports of broken hub clamping bolts on affected propellers.
- (3) Whirlwind Propeller has received reports of torque loss on the aft mounting bolts on affected propellers.

Apr 07/25 WW-ASB-61-001 Page 1 of 10

ALERT SERVICE BULLETIN

WW-ASB-61-001 Hub Inspection

D. Description

- (1) This Alert Service Bullletin provides Instructions for Continued Airworthiness (ICA).
- (2) This Alert Service Bullletin provides instructions for inspecting the hub and the hub hardware on affected propellers.
- (3) This Alert Service Bulletin provides instructions for inspecting the spinner backing plate on affected propellers.
- (4) This Alert Service Bulletin requires recurring inspections of the hub on affected propellers.
- (5) This Alert Service Bulletin requires recurring replacement of the hub hardware on affected propellers.

E. Compliance

- (1) Initial Inspection
 - (a) Before further flight, examine the hub on the affected propeller in accordance with the "Hub Inspection" procedure in the Accomplishment Instructions section of this Alert Service Bulletin.
 - Spinner Backing Plate Inspection
 - When the hub is removed during the Initial Hub Inspection, examine the spinner backing plate in accordance with the "Spinner Backing Plate Inspection" in the Accomplishment Instructions section of this Alert Service Bulletin.

(2) Recurring Inspections

(a) At recurring intervals of 25 flight-hours or 6 months, whichever occurs first, examine the hub on the affected propeller in accordance with the "Hub Inspection" procedure in the Accomplishment Instructions section of this Alert Service Bulletin.

Apr 07/25

ALERT SERVICE BULLETIN

WW-ASB-61-001 **Hub Inspection**

- (3) Recurring Hardware Replacement
 - After every eight "torque-up events" on the hub clamping/mounting bolts, replace all of the washers in accordance with the section, "Washer Replacement" in the Accomplishment Instructions section of this Alert Service Buletin.

Any occurance that requires the hub clamping/mounting bolts NOTE: to be loosened/tightened is considered a "torque-up event". Examples include: Torque checks, blade pitch adjustments, inspections, etc.

(b) At recurring intervals of 200 flight-hours or 24 months, whichever occurs first, replace the hub mounting hardware on the affected propeller in accordance with the section, "Hub Hardware Replacement" in the Accomplishment Instructions section of this Alert Service Buletin.

F. Approval

(1) This technical document is approved by Whirlwind Propeller.

CAUTION: DO NOT USE OBSOLETE OR OUTDATED INFORMATION. PERFORM ALL INSPECTIONS OR WORK IN ACCORDANCE WITH THE MOST RECENT REVISION OF A DOCUMENT.

G. References

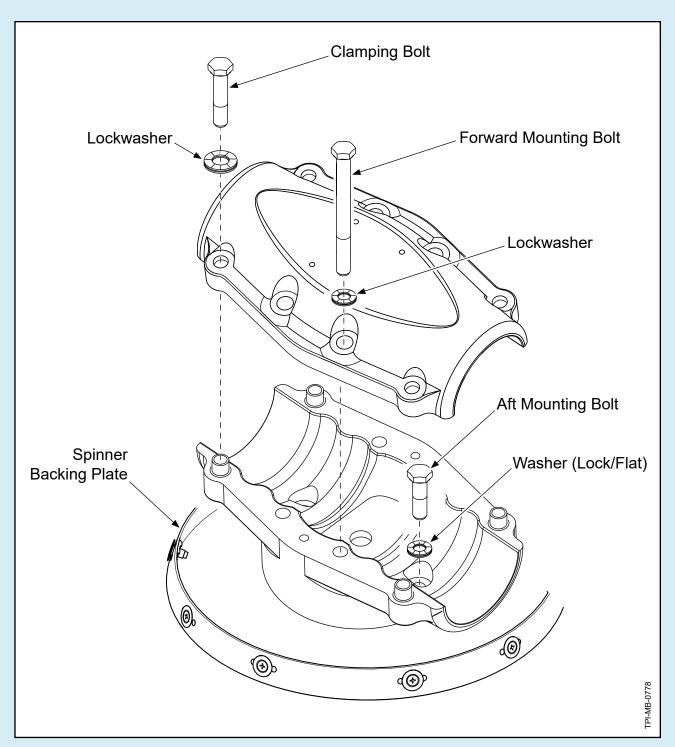
(1) Applicable Whirlwind Propeller Owner's Manual

- available on the Whirlwind Propeller website at www.whirlwindpropellers.com

Apr 07/25 WW-ASB-61-001

ALERT SERVICE BULLETIN

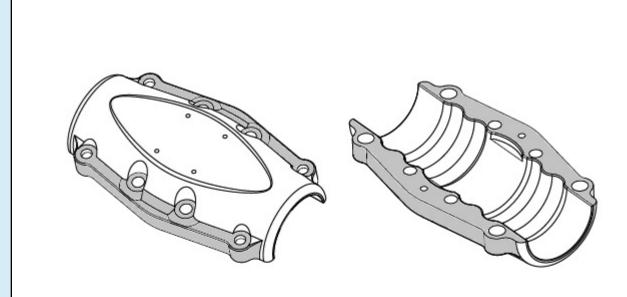
WW-ASB-61-001 Hub Inspection



Hub Clamping/Mounting Bolts Figure 1

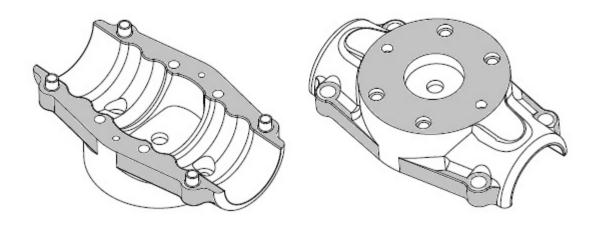
ALERT SERVICE BULLETIN

WW-ASB-61-001
Hub Inspection



<u>CAUTION</u>: IN FIELD REPORTS, HUB CRACKING HAS

OCCURED ON SURFACES AROUND THE BOLT HOLES. EXAMINE THE SHADED AREAS CLOSELY.



91-MB-0779

Hub Inspection Figure 2

ALERT SERVICE BULLETIN

WW-ASB-61-001 Hub Inspection

2. Accomplishment Instructions

A. Hub Inspection

- (1) Remove the spinner dome in accordance with the applicable Whirlwind Propeller Owner's Manual.
- (2) Using a marker, torque seal, or equivalent, make marks to indicate the pitch location of the blades.

NOTE: Marking the pitch location will assist with reassembly. Whirlwind recommends multiple marks per blade to add precision.

- (3) Remove the hub clamping/mounting hardware in accordance with Figure 1 and the following steps:
 - (a) Remove four clamping bolts/lockwashers, and four forward mounting bolts/lockwashers from the hub.
 - (b) Remove the forward hub half.
 - (c) Remove the blade assemblies.
 - (d) Remove two aft mounting bolts and washers (lock/flat).
 - (e) Remove the aft hub half from the aircraft.
- (4) Examine the bolts and washers for cracks or other damage.
 - (a) Discard any cracked, damaged, or excessively worn bolts/washers.
 - Contact Whirlwind Propeller for information about replacement hardware.

CAUTION: IN FIELD REPORTS, HUB CRACKING HAS OCCURED ON SURFACES AROUND THE BOLT HOLES. EXAMINE THESE AREAS CLOSELY.

<u>ATTENTION</u>: PENETRANT INSPECTION CAN BE USED IF A HAIRLINE CRACK IS SUSPECTED.

- (5) Carefully examine all hub surfaces for cracks, fretting, or other damage. Refer to Figure 2.
 - (a) If no cracks, fretting, or other damage is found, go to Step (5).
 - (b) If cracks, fretting, or other damage is found, retire the damaged hub.
 - 1 A new or serviceable hub must be installed before further flight.
 - Contact Whirlwind Propeller to report the cracked/damaged hub.

ALERT SERVICE BULLETIN

WW-ASB-61-001 Hub Inspection

- (6) Perform the "Spinner Backing Plate Inspection" procedure in this section.
- (7) Install the aft hub half onto the aircraft.
 - (a) Torque the two mounting bolts in accordance with the applicable Whirlwind Propeller Owner's Manual.
- (8) Install the blades and the forward hub half, then set the blade pitch in accordance with the applicable Whirlwind Propeller Owner's Manual.
 - (a) Torque the four clamping bolts and four forward mounting bolts in accordance with the applicable Whirlwind Propeller Owner's Manual.
- B. Spinner Backing Plate Inspection

<u>CAUTION</u>: PAINT IS <u>NOT</u> PERMITTED ON THE HUB/ENGINE MOUNTING SURFACES OF THE SPINNER BACKING PLATE.

- (1) Examine both sides of the spinner backing plate for paint on the mounting surfaces (hub/engine). Refer to Figure 3.
 - (a) If the mounting surface is painted, remove the paint in accordance with the "Paint Removal" procedure in this section.
 - <u>1</u> After removing the paint from the mounting surface(s), reinstall the spinner backing plate.
 - (b) If the mounting surfaces are <u>not</u> painted, reinstall the spinner backing plate.

Apr 07/25 WW-ASB-61-001

ALERT SERVICE BULLETIN

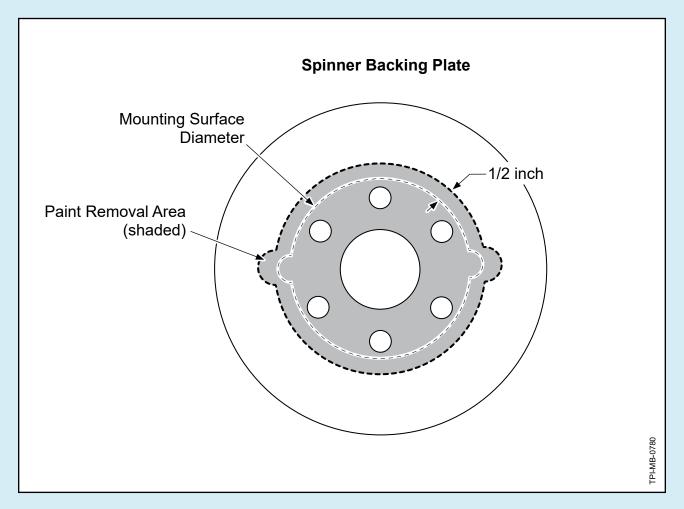
WW-ASB-61-001 Hub Inspection

C. Paint Removal

- (1) Locate the diameter of the hub/engine mounting surface.
- (2) Mark the paint removal area at least 1/2 inch <u>larger</u> than the diameter of the mouting surface as shown in Figure 3.

CAUTION: REMOVE ONLY THE PAINT LAYER WHEN SANDING.

(3) Using 220 grit sandpaper or equivalent, remove the paint in the marked area.



Paint Removal Figure 3

ALERT SERVICE BULLETIN

WW-ASB-61-001 **Hub Inspection**

D. Washer Replacement

NOTE: Refer to Figure 1 for the location/type of bolts and washers.

- Remove the all of the hub clamping/mounting bolts and washers.
 - Discard all of the washers.
- (2) Install new washers on the hub clamping/mounting bolts.
 - Install (and torque) the hub clamping/mounting bolts and washers in accordance with the applicable Whirlwind Propeller Owner's Manual.

E. Hub Hardware Replacement

NOTE: Refer to Figure 1 for the location/type of bolts and washers.

- (1) Remove and discard all of the hub clamping/mounting bolts and washers.
- (2) Install new hub clamping/mounting bolts and washers.
 - Install (and torque) the hub clamping/mounting bolts and washers in accordance with the applicable Whirlwind Propeller Owner's Manual.

3. Contact Information

Whirlwind Propeller

Attn.: Product Support Department

One Propeller Place

Piqua, Ohio 45356-2634 USA Phone: (001) 937.778.4379 Fax: (001) 937.778.4391

E-mail: techsupport@whirlwindpropellers.com

WW-ASB-61-001 Apr 07/25

WHIRLWIND PROPELLER ALERT SERVICE BULLETIN

WW-ASB-61-001
Hub Inspection

(Blank Page)

Apr 07/25