

SECTION 13

PROPELLER

TABLE OF CONTENTS

Page

PROPELLER . . . . .	13-1
Description . . . . .	13-1
Repair . . . . .	13-1

Removal . . . . .	13-1
Installation . . . . .	13-1

13-1. PROPELLER.

13-2. DESCRIPTION. An all-metal, fixed-pitch propeller, equipped with a spinner, is used on the aircraft.

13-3. REPAIR. Repair of a metal propeller first involves evaluating the damage and determining whether the repair is to be a major or minor one. Federal Aviation Regulations, Part 43 (FAR 43), and Federal Aviation Agency Advisory Circular No. 43.13 (FAA AC No. 43.13), define major and minor repairs, alterations and who may accomplish them. When making repairs or alterations to a propeller, FAR 43, FAA AC No. 43.13 and the propeller manufacturer's instructions must be observed. The propeller manufacturer's Service Manual may be obtained from the Cessna Service Parts Center.

13-4. REMOVAL. (Refer to figure 13-1.)

**WARNING**

Be sure magneto switch is in OFF position before turning propeller.

- a. Remove spinner (1).
- b. Remove safety wire from mounting bolt heads (3).
- c. Remove bolts and washers and remove forward bulkhead (5).

NOTE

The aft spinner bulkhead (7) is installed between propeller (6) and spacer (9), and is removed as the propeller is removed.

d. Using a punch through the holes in forward face of propeller, drive two dowel pins (8) aft to separate propeller and spacer, freeing aft spinner bulkhead.

13-5. INSTALLATION.

a. Clean mating surfaces of propeller, crankshaft flange and spinner bulkheads.

**WARNING**

Be sure magneto switch is in OFF position before turning crankshaft.

b. Position aft spinner bulkhead between propeller and spacer, and drive dowel pins into position to attach propeller, spacer and spinner bulkhead. Bulkhead must be positioned so that propeller blades emerge with ample clearance.

c. Locate top center of number one piston on its compression stroke. Align the top center mark on the crankshaft flange with parting surface of the crankcase below the crankshaft.

d. With propeller blades in vertical position, rotate blades 30 degrees clockwise (looking aft).

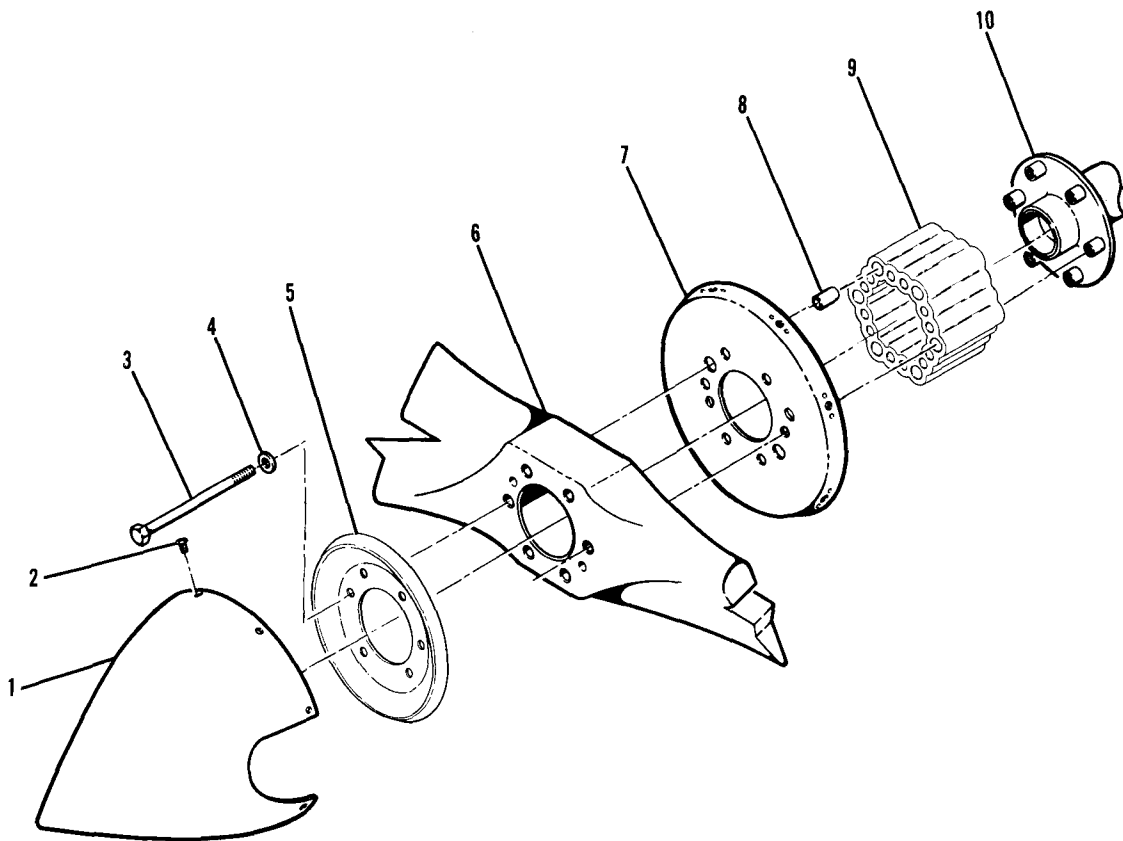
e. Install propeller on crankshaft flange.

f. Install forward spinner bulkhead, tighten bolts evenly and torque to 300-360 lb-in.

g. Safety wire propeller mounting bolts. Safety wire must be installed around bolt heads and not over bolt heads.

h. Install spinner.

INSTALL PROPELLER TO TRAIL TOP DEAD  
CENTER 30 DEGREES. TORQUE PROPELLER  
MOUNTING BOLTS TO 300-360 LB-IN.



1. Spinner
2. Screw
3. Bolt
4. Washer
5. Forward Spinner Bulkhead
6. Propeller
7. Rear Spinner Bulkhead
8. Dowel Pin
9. Spacer
10. Crankshaft

Figure 13-1. Propeller and Spinner Installation.