TAYLORCRAFT

(See Universal for BC Series)

46-36-1 *See* Continental Engines.

47-16-3 Taylorcraft (Was Mandatory Note 11 of AD-700-1; Mandatory Note 12 of AD-699-1; and Mandatory Note 13 of AD-696-3.) Applies to All Models BC, BF, and BL Series Aircraft.

Compliance required immediately.

Inspect wing strut attachment fittings on lower fuselage longerons for cracks or evidence of poor weld. If cracks or defects are found, the fitting should be replaced or reinforced.

50-41-1 Taylorcraft Applies to All Model B Series Aircraft, Serial Numbers 1001 and Up.

Compliance required not later than November 15, 1950.

Reports have been received of interference between the elevator horn bolt and the fin cover plate apparently caused by improper field installation of the cover plate through bolt. Cases are known where the bolt has worn through the cover plate and such interference may result in jamming of the elevator control system. An inspection of the parts should be made and if evidence of interference is noted, suitable means of preventing the cover plates from interfering with the elevator horn bolt should be incorporated; a spacer bushing at least ¼ x 0.028 x 1¼ inches installed around the cover plate through bolt is considered satisfactory.

(Taylorcraft, Inc. Service Bulletin 65 covers this same subject.)

51-9-3 Taylorcraft Applies to All Series Aircraft Below Serial Number 13001 Incorporating a Pushpull Type Fuel Shutoff Control.

Compliance required not later than June 1, 1951.

To prevent accidental operation of the fuel shutoff valve during flight, a safety device must be installed on this control. The device is to prevent inadvertent operation of the fuel shutoff valve by requiring a definite and positive movement by the pilot before the control can be operated. Taylorcraft P/N B12-947-3 or equivalent is considered satisfactory. P/N B12-947 which was previously installed in some Taylorcraft airplanes must be replaced by this improved part.

(Taylorcraft Service Bulletin No. 66 dated December 6, 1950, covers this same subject.)

This supersedes AD 47-13-1.

TEMCO

49-40-1 Luscombe Applies to All Model 11A Aircraft.

Compliance required on or before the next periodic inspection but not later than December 1, 1949.

To preclude the possibility of the elevator trim tab actuating horn becoming disconnected from the trim tab, with consequent serious vibration of the horizontal tail surfaces, it is necessary to rework the attachment of the trim tab horn by adding more rigidity to the attachment.

This rework can be accomplished by fabricating two blocks from solid 24ST aluminum alloy that will fit inside the inboard end of the trim tab, one located at the extreme inboard end to which the steel trim tab horn attaches and other one located diagonally chordwise inside the trim tab, with the forward end located approximately 2½ inches and the aft end approximately 1 inch from the inboard end of the trim tab. These blocks, which actually are equivalent to solid ribs, should be approximately ⅜-inch wide and shaped in elevation to fit the inside contour of the trim tab. The attachment of these ribs should be effected by four AN 456AD4 rivets in each, drilled on assembly, with the rivets driven through both upper and bottom skins of the trim tab. The trim tab horn should be attached to the trim tab through their regular attaching holes, riveting the horn with two AN 456AD4 rivets to the chordwise end of the inboard revised solid rib and the two remaining holes as originally attached with two AN 456AD4 rivets. The aluminum alloy blocks or ribs should be finished with a protective coating of zinc chromate prior to assembly of the trim tab. An equivalent modification to that described above and in Luscombe Service Bulletin is acceptable.

(Luscombe Service Bulletin No. 1-1149, dated January 25, 1949, covers this same subject.)

49-45-1 Luscombe Applies to All Model 11A Aircraft.

Compliance required as soon as possible but not later than next 25 hours operation time and at each 25-hour period thereafter until reinforcement of main landing gear aft canted fuselage bulkhead is accomplished.

Inspect for buckling, cracks or other evidence of failure of permanent set of the main landing gear aft fuselage canted bulkhead in the web and/or flange in the area adjacent to the steel landing gear trunnion and fuel line. Inspect fuselage wing lift strut attach fitting for cracks in the radii of the flanges attaching it to each aft fuselage canted bulkhead. Usually evidence of failure of the aft canted bulkhead can be determined by a crack in the fuselage canted bulkhead web extending from the fuel line hole to the flange attaching the bulkhead to the belly skin and/or buckle in the cabin floor located approximately 1 inch directly aft of the bulkhead under the carpet flooring and/or loose rivets attaching the flange of the canted bulkhead to the belly skin. If the difficulties are not revealed as indicated, a 2-inch hole cut in the cabin floor located approximately 3 inches aft and inboard of that part of the canted bulkhead supporting the door will allow access for detailed examination of the aft side of the rear fuselage canted bulkhead. Removal of seat and floor carpet is necessary to accomplish this inspection.

If loose rivets in the bulkhead flange at the attachment to the belly skin, cracks or permanent set in excess of ⅛ inch are found in the web of the bulkhead adjacent to the steel trunnion, the bulkhead must either be satisfactorily repaired or replaced. If noticeable permanent set in the web is apparent (under ⅛ inch), the web of the bulkhead may be reworked by straightening. If cracks are found in the fuselage wing lift strut attach fitting it should be replaced or the cracks should be stop drilled and the full length of each cracked flange reinforced with a ¾ inch by ¾ inch by 0.064 inch 24ST angle.

In addition, the following modifications must be made:

A collar must be incorporated on the front end of the hinge pin that passes through the front and rear main landing gear steel trunnions which are riveted to the two fuselage canted bulkheads. This tubular collar should be fabricated of 4230 steel and be at least 5/8-inch long and of sufficient thickness to effect a snug bearing fit against the forward end of the steel tube composing the socket of the forward steel trunnion. A 1/4-inch bolt should be used to attach the collar to the hinge pin using the existing 1/4-inch hole in the extreme forward end of the hinge pin.

A curved doubler of 0.064 inch 24ST should be placed over the existing 0.040-inch floor skin connecting the flanges of the two main landing gear canted bulkheads. This doubler should pick up the existing floor skin and bulkhead top flange rivet pattern in the vicinity of the landing gear steel trunnion, extending in length at least 3 inches to either side of a vertical plane through the centerline of the landing gear hinge pin and picking up at least six of the existing rivets in each of the canted bulkheads. Blind type rivets may be used to attach this doubler.

The rivet pattern attaching the flange of the aft canted fuselage bulkhead to the belly skin between the openings in the fuselage skin which allow entrance of the main landing gear legs should be inspected for rivet size and pattern. The first 20 rivets inboard from these openings must be 5/32-inch A17ST spaced approximately 1/2-inch apart.

If the 2-inch inspection holes have been cut in the floor, they must be reinforced by at least a 4-inch diameter 0.040-inch 24ST doubler on the underneath side of the floor skin and a quick removable inspection cover placed on top side to be used for subsequent 25-hour inspections, if applicable.

Any equivalent structural modification to preclude a failure, or permanent set in the aft canted bulkhead at the attachment of the main landing gear trunnion will be considered satisfactory.

50-32-1 *See* Continental Engines.

51-21-3 Luscombe Applies to Model 11A Airplanes.

Compliance required prior to 50 hours additional flight time and not later than October 15, 1951, and each 50 hours thereafter unless Luscombe P/N 11-5417-D is installed.

Inspect rudder control system bellcrank, P/N 11-5417, located under forward cabin floor, for cracks, loose rivets, or deformation. If this bellcrank is damaged in any way, it must be repaired or replaced with the late type, P/N 11-5417-D.

The early type bellcrank may be identified by its having four rivets or four AN 3 bolts attaching the center bearing block to the bellcrank. The late type bellcrank has 10 rivets attaching the center bearing block to the bellcrank, and this bearing block is longer to accommodate the added rivets.

If the early type bellcrank is installed and is found undamaged, or is repaired and reinstalled, this inspection must be repeated each 50 hours of flight time. If the late type bellcrank is found to be installed, or is installed to replace the early type, only routine maintenance inspections are required.

In installing either type of bellcrank in the rudder system, the system must be rigged in accordance with Luscombe Airplane Corp., Drawing 11-5402. Care must be taken not to overtension the rudder cables, since this overtensioning can cause failure of the bellcrank.

TIMM

48-32-1 Timm Applies to Models N2T All Serial Numbers, and PT-220-C Aircraft. Compliance required as indicated.

Instances have been reported of throttle quadrants pulling off the fuselage skin to which they were glued and nailed during manufacture. Both front and rear cockpit throttle quadrants must therefore be inspected for looseness immediately and if found loose must be repaired prior to the next flight.

This inspection should be repeated frequently until such time as the throttles are reinforced as described below, or in an equivalent manner. Reinforcements must be installed *not later than January 1, 1949.*

1. Insert four AN 3 bolts through wood plate on outboard side of throttle quadrants through support blocks and fuselage skin using one bolt at each plate corner. Install large flat washers or metal backing plates beneath bolt heads and nuts to avoid crushing wood. Loose throttle quadrants should be reglued prior to making this reinforcement.

E. J. TRYTEK

47-30-8 Aeronca (Was Mandatory Note 9 of AD-675-2 and Mandatory Note 7 of AD-702-1.) Applies to Models 65-CA, S-65-CA and 65-LA.

Compliance required not later than September 30, 1947.

In order to prevent the seat belt anchorage from failing during a crash landing, it has been found necessary to modify the seat installation as follows:

1. If there is no need for an adjustable seat, the rear sliding lugs on each side of the seat should be bolted to the slide tube using $\frac{3}{16}$-inch AN bolts. Location of bolt approximately $1\frac{1}{8}$ inches below and $\frac{3}{8}$ inch forward of center of seat cross tube.

2. If the seat is to remain adjustable, the rear sliding lugs on the seat are to be reinforced with two 0.094 inch, 1025 steel gussets. Weld corner gussets between fore and aft sides of seat cross tube and back face of seat slide lugs. Gussets are "L" shaped approximately 1 inch wide, extending around bottom lip of lugs. (Aeronca Service Memorandum M-76 dated May 15, 1947, covers this same subject.)