

SUBJECT: AILERON AND AILERON TAB CONTROLS, IMPROVEMENT OF CABLE GUARD

AIRCRAFT AFFECTED: Beech Musketeers Model A24R, Serials MC-2 through MC-70 except MC-22, MC-23, MC-39, MC-43, MC-63 and MC-64.

REASON FOR CHANGE: To provide access for, and request inspection of aileron cable guard pins for proper alignment and location.

ACCOMPLISHMENT: At next 100 hour or annual inspection, whichever occurs first.

DESCRIPTION: On the BEECHCRAFT Musketeer, Model and Serials noted above it is recommended that three inspection holes be installed in each wing in the area of the control cable pulleys described below.

To accomplish the intent of this instruction the following procedure is recommended:

1. Locate and mark the center for each new hole in the following location in the bottom of each wing 1.75 inches aft of the rivet centerline in the rear spar:
 - a. 7 5/16 inches inboard of the inboard surface of the outboard flap bracket.
 - b. 15 5/16 inches inboard of the inboard surface of the outboard flap bracket.
 - c. 30 inches inboard of the inboard surface of the outboard flap bracket.
2. At each of the three hole locations on each wing, cut a 1.38 inch diameter hole.
3. Inspect the adjacent pulley to determine that the cable guard pin is installed properly.
4. Remove the large rectangular access plates located just aft of the main gear on both wings and inspect the pulley guards forward of the rear spar for the cables coming off the forward side of the pulleys at the 7 5/16 inch and 30 inch locations measured in substeps a and c to determine that the pulley guard is close enough to the pulley to prevent the cable from slipping off of the pulley (not more than .030).
5. In the event the guards do not provide adequate cable security, accomplish the following:
 - a. Cut a 5.0 inch diameter access hole in the bottom of the wing 10.0 inches forward of wing skin trailing edge and 28 7/8 inches inboard from the inboard surface of the outboard flap bracket.
 - b. Remove the 169-110001-123 retainer (cable guard) from the rear spar.
 - c. Install a .40 x 2.00 inch aluminum shim, .090 to .125 inch thick as necessary to provide not more than .030 inch clearance between the guard and pulley flange. Attach the shim to the guard with MS20470AD3 rivets. The shim may be fabricated locally. In the event exact thickness requirements are not available, several thicknesses of thinner material may be used.
 - d. Re-install the 169-110001-123 guard on the spar with two MS20600AD4 Cherry lock rivets or 1/8 inch dia. explosive rivets or 832 machine screws, lock nuts and washers; or the equivalent of any of these.

AW-666

1270

Beech Aircraft Corporation issues service information for the benefit of owners and fixed base operators in the form of three classes of Service Instructions. CLASS I (Red Border) are changes, inspections, and modifications that could affect safety. The factory considers compliance mandatory. CLASS II (Green Border) covers changes, modifications, improvements or inspections the factory feels will benefit the owner and although highly recommended, they are not considered mandatory compliance, unless specified at the time of issuance. Class I and II are mailed to:

- (a) BEECHCRAFT Aero or Aviation Centers and International Distributors and Dealers
- (b) Owners of record on the FAA Registration list and the

BEECHCRAFT International Owner Notification Service List:
(c) Those having a publications subscription

CLASS III (No Border) covers changes which are optional maintenance aids, product improvement kits and miscellaneous service information. Compliance is at the owner or operator's prerogative. Copies of Class III are distributed per a and c above. Information on Owner Notification Service or Subscriptions can be obtained through any BEECHCRAFT Aero or Aviation Center, International Distributor and Dealer, or the Factory. As Service Instructions are issued, temporary notation in the index should be made until the index is revised. Warranty will be allowed only when specifically defined in the Service Instructions and in accordance with Beech Warranty Policy.



Service Instructions No. 0420-151

- e. Over the 5.0 inch cutout install a 169-110000-197 doubler with MS20470AD3 rivets and a 169-110000-199 door with AN525-8R6 screws.

6. Install A6914-1024 (P.N. Tinnerman) covers over all six 1.38 inch dia. inspection holes.

The parts required for this modification are shown below in the price list. In addition to the parts listed below which are available through the Beech Aircraft Corporation dealer organization, MS20470AD3 rivets of the appropriate length and the attaching parts mentioned in substep (d) will also be needed and should be obtained locally.

PLANNING INFORMATION

The following information is for planning purposes only.

Estimated man-hours: 8 hours
Suggested number of men: 1 man
Suggested selling price of parts:

P/N	Description	Quantity	*Suggested Selling Price	Discount
A6914-1024	Covers	6	\$4.60**	A
169-110000-197	Doubler	0-2	.80	Z
169-110000-199	Door	0-2	.60	Z

*Subject to change without notice.

**For minimum buy quantity of 10 parts.

Upon completion of these Service Instructions make an appropriate entry in the aircraft log book and return a completed Compliance Card to Beech Aircraft Corporation.

COMPLIANCE CARD RETURN REQUIRED