



Piper Aircraft Corporation
Vero Beach, Florida, U.S.A.

SERVICE No. 706B BULLETIN

* **PIPER CONSIDERS** *
* **COMPLIANCE MANDATORY** *

Date **October 9, 1991**

(Service Bulletin No. 706B supersedes Service Bulletin No. 706, dated February 23, 1981, and Service Bulletin No. 706A, dated September 10, 1981. Aircraft which have previously complied with Service Bulletin No. 706 or 706A are in compliance with this Service Bulletin No. 706B.)

SUBJECT: **Tail Brace Wire Support Installation**

REASON FOR REVISION: Add Vero Beach manufactured airplanes.

MODELS AFFECTED:

PA-18-150 Super Cub
PA-18-150 Super Cub

SERIAL NUMBERS AFFECTED:

18-8602 through 18-8109013 and
1809001 through 1809057 and 1809060

COMPLIANCE TIME: Within the next twenty five (25) hours of operation.

PURPOSE:

Reports have been received of failure of the lower horizontal stabilizer brace wire fuselage attachment tab. This tab connects the lower horizontal stabilizer brace wire to the lower fuselage. Separation of the tab and subsequent loss of brace wire support could result in damage to the stabilizer and possible loss of control.

This Service Bulletin provides instructions for the installation of an additional support plate to strengthen the attachment mechanism.

NOTE
Operations without original tab fitting installed,
(Piper Part Number 80292-15) are not permitted.

APPROVAL:

The technical contents of this Service Bulletin have been approved by the F.A.A.

INSTRUCTIONS:

1. a. For PA-18-150 Super Cub aircraft, Serial Numbers 18-8602 through 18-18-8109013 only, fabricate a support plate from .062" thick 4130 N Steel sheet (6.5" x 3.0") using the template shown on sketch "A", or procure one each, Piper Part Number 60764-02 or Piper Part Number 60764-03 Support Plate.
b. For PA-18-150 Super Cub aircraft, Serial Numbers 1809001 through 1809057 only, (Vero Beach manufactured aircraft), procure one each Piper Part Number 60764-03 Support Plate.
2. Support the aircraft tail on a stand.
3. Disconnect the lower horizontal stabilizer tail brace wires from the lower fuselage attachment tabs by removing the attachment bolt and nut.
4. Remove the rear left side fuselage access panel, beneath the horizontal stabilizer, and remove the forward tail wheel spring attachment bolt, washers and nut.
5. If aircraft is equipped with metal belly panels, disengage the rear 1/4 turn fastener on the rear belly panel.
6. Position the support plate between the tail wheel springs and the bottom of the fuselage. Align the slot in the support plate with the bolt hole for the tail wheel springs and align the tabs on the support plate with the lower fuselage attachment tabs. If metal belly panels are installed, support plate must be positioned between the belly panels and the fuselage. Reinstall the tail wheel spring attachment bolt, washers and nut. Torque nut 160 to 190 in. lbs. Note that a longer tail wheel spring attachment bolt (Piper Part Number 401-406 / AN6-26A) may be required to insure proper engagement of the self locking nut.
7. Using the existing holes in the lower fuselage attachment tabs as a guide, drill two .191 inch holes thru the new support plate for attachment of the lower horizontal stabilizer tail brace wires.
8. Reinstall the lower horizontal stabilizer tail brace wires to the lower fuselage attachment tabs and the new support plate using the existing bolt and nut previously removed. Torque 12 to 15 in. lbs.

NOTE:

Longer bolts (Piper Part Number 400-440 / AN3-5A) may be required to insure proper engagement of the self locking nuts. Also, the tail wheel spring bolt slot in the support plate may be relieved up to an additional .125" to compensate for alignment variances.

9. Check and adjust tail surfaces rigging as follows:
 - a. Level the aircraft as described in the aircraft Owners Handbook.
 - b. Adjust each tail brace wire so that a 10 pound load, exerted on the center of each wire, will allow a $7/16 \pm 1/16$ inch deflection at the center of each tail brace wire.
 - c. With the tail brace wires properly adjusted, the rear spar of the stabilizers shall be level and the elevator hinge line straight from tip to tip. The fin should be vertical at the rudder hinge centerline.
10. Re-engage the 1/4 turn fastener on the rear belly panel. NOTE: A longer 1/4 turn fastener (Piper Part Number 487-565 / Lion 5-0-200A) may be required to insure proper engagement of the 1/4 turn fastener.
11. Reinstall the rear left side access panel to the fuselage.
12. Remove the aircraft from the tail stand.
13. Make a proper entry of compliance with this Service Bulletin in the aircraft logbook.

MATERIAL REQUIRED:

For PA-18-150 aircraft, serial numbers 18-8602 through 18-8109013, one each per aircraft: .062" thick 4130 N steel sheet, 6.5" x 3.0". OR: - Piper Part Number 60764-02, Support Plate, OR: - Piper Part Number 60764-03, Support Plate

For PA-18-150 aircraft, serial numbers 1809001 through 1809057, one each per aircraft Piper Part Number 60764-03 Support Plate.

AVAILABILITY OF PARTS: Your Piper Field Service Facility

EFFECTIVITY DATE: This Service Bulletin is effective upon receipt.

SUMMARY: Please contact your Factory Piper Field Service Facility to make arrangements for compliance with this Service Bulletin in accordance with the compliance time indicated.

NOTE

If you are no longer in possession of this aircraft, please forward this information to the present owner/operator and notify the Factory of address/ownership corrections. Changes should include aircraft model, serial number, current owner's name and address.

Corrections/Changes should be directed to:

**Piper Aircraft Corporation
ATTN: Customer Services
2926 Piper Drive
Vero Beach, Florida 32980**

SKETCH A

