





### 7. Atlee Dodge Aircraft Services, LLC.

6672 Wes Way • Anchorage, AK 99518 • Phone: (907) 344-1755 • Fax: (907) 344-6720

email: atleedodge@acsalaska.net • website: www.fadodge.com

# REINFORCING BRACKET INSTALLATION INSTRUCTIONS

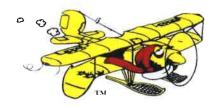
SHEET 2 OF 3

NOVEMBER 7, 1986

REV. A - MARCH 6, 2018

- 1. Remove the inspection cover nearest to the front lift strut attachment fitting on the aft side of the front spar, to gain access to the front lift strut fitting assembly.
- 2. On Piper PA-18 series airplanes, and on Piper PA-12 and PA-14 airplanes modified by installing leading edges that extend back to the lowest flange of the front spar, make a 4-inch round cutout in the leading-edge sheet metal forward of the front spar, on the bottom surface of the wing, in a location that will give access to the front lift strut fitting assembly.
  - On PA-12 and PA-14 airplanes whose leading edges have not been modified, make a 4-inch round cutout in the fabric forward of the front spar, on the bottom surface of the wing, in a location that will give access to the front lift strut fitting assembly. An inspection ring may then be installed to permit recurrent access to the lift strut fitting assembly forward of the front spar.
- 3. Remove the four lower bolts that penetrate the front lift strut attachment fittings. The two uppermost of these four bolts secure the lift strut attachment fittings to the front spar, the third secures the lift strut attachment fittings to the bottom inboard compression member of the strut point "N" brace, and the lowermost bolt attaches the front lift strut to the fittings.
- 4. Install the reinforcing bracket, P/N 3192-18 (PA-18) or P/N 3192-12 (PA-12 or PA-14) in the channel (lower portion) of the lift strut fitting assembly (Piper P/N 14192-00 on the PA-18; Piper P/N 10532-00 on the PA-12 or PA-14), located on the forward side of the front spar.
- 5. Check the length of all bolts removed in Step 3. Reinstall those whose length is still adequate to prevent any threads from bearing on the components they penetrate, and adequate to extend at least 3/64 inch through the nuts by which they are secured. Replace those bolts whose length is no longer adequate, with AN5 bolts of the next greater length. Be sure to use only steel AN5 bolts of the proper length as replacements. Use AN960-516 (NAS1149F0563P) or AN960-516L (NAS1149F0532P) washers as shims, where necessary, to permit proper installation of the bolts. Refer to AC 43.13-1B Chapter 5, Section 1, Paragraph 230, for procedures governing the re-use of AN365-524 or MS21042-5 self-locking nuts. NOTE: When reinstalling the bolt that penetrates the bottom inboard compression member of the strut point "N" brace, remember to reinstall the safety device that prevents rotation of the bolt head.







## 7. Atlee Dodge Aircraft Services, LLC.

6672 Wes Way • Anchorage, AK 99518 • Phone: (907) 344-1755 • Fax: (907) 344-6720

email: atleedodge@acsalaska.net • website: www.fadodge.com

# REINFORCING BRACKET INSTALLATION INSTRUCTIONS

DRAWING NO. 3192-1 SHEET 3 OF 3 NOVEMBER 7, 1986

REV. A - MARCH 6, 2018

#### Continued...

- 6. On airplanes where a hole was cut in the leading-edge sheet metal forward of the front spar in Step 2, install an inspection cover at that ring.
- 7. On airplanes where a hole was cut in the leading-edge sheet metal forward of the front spar in Step 2, install a round cover plate 5 inches in diameter, cut from .020-inch-thick 2024-T3 Alclad aluminum sheet, over the hole. Secure the plate with 8 equally spaced MS51861-12 PK screws, or with 8 equally spaced 3/32-inch-diameter blind rivets of a type FAA approved for this application. Drill #45 (.082-inch-diameter) holes for the PK screws or #41 (.096-inch-diameter) holes for the 3/32-inch rivets. The edge of each hole, measured from its center to the edge of the material penetrated, must be at least 3/16 inch.
- 8. Reinstall any inspection covers that were removed from locations aft of the front spar to gain access to the front lift strut fitting assembly in Step 1.
- 9. Repeat steps 1 through 8 to install the reinforcing bracket on the front lift strut fitting of the opposite wing.
- 10. Fill out FAA Form 337 and make an entry in the airplane's logbook, stating that the lift strut reinforcing brackets were installed in accordance with the STC applicable to the model designation of the airplane. Execution and disposition of Form 337 shall be in accordance with 14 CFR 43.9(a)(4) and Appendix B to 14 CFR 43. NOTE: The weight and balance change produced by this modification is negligible.

