



SERVICE LETTER

No. 544

Piper Aircraft Corporation

Lock Haven, Pennsylvania, U.S.A.
January 15, 1970

(Supersedes and Voids Service Spares Letter No. SP-D-41, dated October 30, 1968 and Item No. IV Gyro Service Procedure, in Section No. VIII, General Service Procedures of the Distributor and Dealer Service Operating Procedure Manuals.)

Subject: Revised Gyro Service Procedure

Models Affected: All Three Inch Directional Gyro and Attitude Horizon Instruments installed by the Factory or a Piper Field Service Facility.

Serial Numbers Affected: Not applicable.

Compliance Time: Not applicable.

Purpose: As a result of the excellent cooperation of the Piper Distribution Organization, continual product improvement efforts and a progressive relationship with Gyro Instrument manufacturers, a new and simplified gyro service procedure has been established. This new procedure will result in the reduction of service administrative labor costs and, providing gyro warranty replacements continue to be evaluated carefully by distribution, the factory will be able to effectively control new equipment costs, thereby providing a progressive customer relationship.

To insure the success of the new gyro program, it must be definitely ascertained that a gyro that is being returned for warranty is actually faulty. If the factory is exposed to the return of large quantities of good gyros (replaced due to faulty installation, etc.), it will become necessary to re-establish an in-field instrument testing program.

NOTE

1. The use of the three different "gyro inspection report forms" (form numbers 230 213, 230 214 and 230 215) is terminated immediately, and static bench tests are no longer mandatory. However, the gyro instrument bench test equipment is still recommended for all approved service centers.

(over)

Purpose: (Continued)

2. The following procedures apply to standard warranty applications and will also assure the installation of a properly functioning gyro instrument when field replacement is required. The "Distributor and Dealer Service Operating Procedure Manuals" will contain this revised procedure in the near future.

Instructions:

I. Gyro Instrument Handling Procedures

All gyro instruments shipped from the factory are packaged in specially constructed cartons containing shock absorbing material.

Gyro instruments received from the factory are to remain in these containers WITHOUT EXCEPTION until the time the instrument is actually installed in an airframe. This includes storage, handling over the parts counter, and carrying the instrument to the airplane. The one case where removal is authorized would be to mount the instrument in a test stand for a performance evaluation test, and upon completion of the test, the instrument is immediately replaced into the container.

Gyro instruments being returned to the factory are to be placed in the approved container with all ports properly sealed, immediately following removal from an airframe WITHOUT EXCEPTION, and are to remain inside the protective container until received and removed by authorized personnel at our factory facility. The one case where removal is authorized would be to mount the instrument in a test stand for a performance evaluation test and upon completion of the test, the instrument is immediately replaced into the container.

If the gyro handling procedures outlined above are not followed by a dealer or distributor, the factory reserves the right to void warranty coverage on any instrument/instruments (by serial no.) based on receiving a non-compliance report from a Distribution Service Administrator, Factory Regional Service Representative, or Factory Product Specialist.

To avoid unnecessary problems, it is recommended that all facilities have at least two (2) approved gyro shipping cartons on hand. These special cartons are available under Piper P/N 753 385 and the cost is \$2.00 per carton. (We suggest any dealers who do not have at least one (1) gyro carton on hand, place their order promptly to insure an early delivery.) Should any gyro instruments be received by the factory in an unapproved container or if the ports are not sealed, warranty will be immediately voided and the instrument will be returned to the dealer for disposition or scrap value will be issued at the dealer's discretion.

Instructions: (Continued)

II. Dealer and Distributor Inspection Responsibilities

To insure credit for the unit, the following should be considered by the dealer prior to returning the unit.

A. Visual Examination

1. Has instrument been modified?
2. Has instrument been damaged?
3. Does instrument show signs of abuse?

B. Inspection of Installation

1. Are vacuum lines free from BENDS, RESTRICTIONS, LEAKS?
2. Was CENTRAL AIR FILTER REPLACED before removal of instrument?
3. Is instrument physically touching other instruments, tubing, airframe members (when engines are started or stopped)?
4. Are unused ports correctly sealed against air leaks?
5. Is vacuum or pressure reading correct?
6. Does vacuum or pressure gauge installed in aircraft give correct readings?
7. Is vacuum regulator functioning properly and adjusted correctly (4.8 - 5.1 Hg.)?

C. Instrument Malfunction and Warranty Claim

1. Does warranty claim state whether instrument has electrical or mechanical malfunction?
2. Does your warranty claim properly explain why the instrument is being rejected in clear, accurate, concise language?
3. Does the warranty claim properly represent your dealership in defining your reasons for rejection?

Material Required:

Not applicable.

Availability of Parts:

Not applicable.

Material Allowance:

Not applicable.

Labor Allowance:

Not applicable.

Material/Labor Allowance
Termination Date:

Not applicable.

Disposition of Parts in Stock:

Not applicable.

Disposition of Replaced Parts:

Not applicable.