

# SERVICE BULLETIN REVISION



Citation

Revision 3

SB500-32-48

## TRANSMITTAL SHEET

This sheet transmits Revision 3 to SB500-32-48.

- A. Transmits Goodrich Service Bulletin 2-1528-32-2, Revision 5, Landing Gear - Brake Assembly Possible Cracked Stator Disks.

**NOTE:** This revision replaces the original issue and all previous revisions of SB500-32-48 in their entirety.

**NOTE:** Change bars and pointing hands are not used in this publication to denote revised material. This transmittal sheet provides a complete description of the changes made by this revision, except for editorial changes.

### REVISION COMPLIANCE

MANDATORY. Airplanes previously modified by this service bulletin must perform Steps 1 and 2.

### SUMMARY OF REVISIONS

Original Issue	Feb 22/2000
Revision 1	Sep 24/2001
Revision 2	Jan 10/2002
Revision 3	Apr 30/2003

# SERVICE BULLETIN REVISION



Citation

Revision 2

SB500-32-48

## TRANSMITTAL SHEET

This sheet transmits Revision 2 to SB500-32-48.

- A. Transmits Goodrich Service Bulletin 2-1528-32-2, Revision 3, Landing Gear - Brake Assembly Possible Cracked Stator Disks.

**NOTE:** This revision replaces the original issue and all previous revisions of SB500-32-48 in their entirety.

**NOTE:** Change bars and pointing hands are not used in this publication to denote revised material. This transmittal sheet provides a complete description of the changes made by this revision, except for editorial changes.

### REVISION COMPLIANCE

NO EFFECT. Airplanes previously modified by this service bulletin are not affected by this revision.

### SUMMARY OF REVISIONS

Original Issue	Feb 22/2000
Revision 1	Sep 24/2001
Revision 2	Jan 10/2002

# SERVICE BULLETIN REVISION



Citation

Revision 1

SB500-32-48

## TRANSMITTAL SHEET

This sheet transmits Revision 1 to SB500-32-48.

- A. To transmit Goodrich Service Bulletin 2-1528-32-2 Revision 2, Landing Gear - Brake Assembly Possible Cracked Stator Disks.

**NOTE:** This revision replaces the original issue of SB500-32-48 in its entirety.

**NOTE:** Change bars and pointing hands are not used in this publication to denote revised material. This transmittal sheet provides a complete description of the changes made by this revision, except for editorial changes.

### REVISION COMPLIANCE

NO EFFECT. Airplanes previously modified by this service bulletin are not affected by this revision.

### SUMMARY OF REVISIONS

Original Issue

Feb 22/2000

Revision 1

Sep 24/2001

**TITLE**

LANDING GEAR - TRANSMITTAL OF GOODRICH SERVICE BULLETIN 2-1528-32-2, LANDING GEAR - BRAKE ASSEMBLY POSSIBLE CRACKED STATOR DISKS

**EFFECTIVITY****MODEL****UNIT NUMBERS**

500/501

-0001 thru -0689 with Goodrich Brake Assemblies and Antiskid System.

**REASON**

To transmit Goodrich Service Bulletin 2-1528-32-2, Revision 5, Landing Gear - Brake Assembly Possible Cracked Stator Disks.

**DESCRIPTION**

This service bulletin transmits Goodrich Service Bulletin 2-1528-32-2, Revision 5, Landing Gear - Brake Assembly Possible Cracked Stator Disks, which gives instructions for examination of the brake assembly stator disks.

**COMPLIANCE**

MANDATORY. Refer to Goodrich Service Bulletin 2-1528-32-2, Revision 5, Landing Gear - Brake Assembly Possible Cracked Stator Disks.

**APPROVAL**

FAA approval has been obtained on technical data in this publication that affects airplane type design.

This information shall be considered an amendment to the Cessna Manufacturer's Maintenance Manual or Instructions for continued airworthiness, and must be accomplished for ongoing airworthiness compliance as required per 14 CFR Part 43.13.

**MANPOWER****WORK PHASE**

Installation

**MAN-HOURS**

\*

**MATERIAL - Cost and Availability****PART NUMBER**

SB500-32-48

**AVAILABILITY**

\*

**COST**

\*

\* Refer to the attached Service Bulletin Supplemental Data sheet for man-hours, material cost and availability, and warranty information.

**TOOLING**

None

**CHANGE IN WEIGHT AND BALANCE**

Negligible

**REFERENCES**

Goodrich Service Bulletin 2-1528-32-2, Revision 5, Landing Gear - Brake Assembly Possible Cracked Stator Disks

**PUBLICATIONS AFFECTED**

None

**ACCOMPLISHMENT INSTRUCTIONS**

1. Accomplish the attached Goodrich Service Bulletin 2-1528-32-2, Revision 5, Landing Gear - Brake Assembly Possible Cracked Stator Disks.
2. Make an entry in the airplane logbook stating the inspection results and any further action required for each brake assembly because of this service bulletin; or that the service bulletin has been complied with, and through inspection results or replacement of the brakes, no further action is required. Fill out and forward a Maintenance Transaction Report indicating compliance to: CESCO, PO Box 7706, Wichita, KS 67277.

# SERVICE BULLETIN

SUBJECT: Landing Gear - Brake Assembly - POSSIBLE CRACKED STATOR DISKS

1. PLANNING INFORMATION:

A. EFFECTIVITY:

This Service Bulletin applies to CESSNA CITATION 500 Series aircraft that use Goodrich brake assemblies, P/N 2-1528-6. This Service Bulletin replaces the Service Bulletin of the same number, revision number 4, dated Feb 7/03.

B. OTHER PROCEDURES THAT MUST BE DONE AT THE SAME TIME (CONCURRENT REQUIREMENTS):

Does not apply

C. REASON:

Reports have been received of broken stator disks, P/N 133-893-2, in brake assemblies.

D. DESCRIPTION:

This Service Bulletin gives instructions for examination of stator disks.

E. COMPLIANCE:

Brake assemblies in service:

This Service Bulletin applies only to brake assemblies that do not contain stator disks, P/N 133-893-2 CHG AI, CHG B, or higher. If the brake assembly was overhauled by Goodrich after March 2000, this Service Bulletin was completed and the latest stator disks are installed.

If the brake assembly was overhauled by Goodrich before March 2000, and the brake assembly has accumulated 200 or more landings (without thrust reversers) or 375 landings (with thrust reversers), remove the wheel at the next 1 to 25 landings after receipt of this Service Bulletin, and examine the brake assembly as follows:

- (1) Remove the wheel assembly from the aircraft.
- (2) Visually examine the outer diameter of each stator disk, P/N 133-893-2, (refer to Figure 3). If each of the two stator disks is impression stamped with an "I" after the CHG "A" (CHG AI), or is stamped with change letter "B" or higher, impression stamp "SB" on the piston housing (refer to paragraph 3.F.(2)). Install the wheel assembly again on the aircraft (no more action is necessary). Make an entry into the maintenance log that this Service Bulletin was completed.

# SERVICE BULLETIN

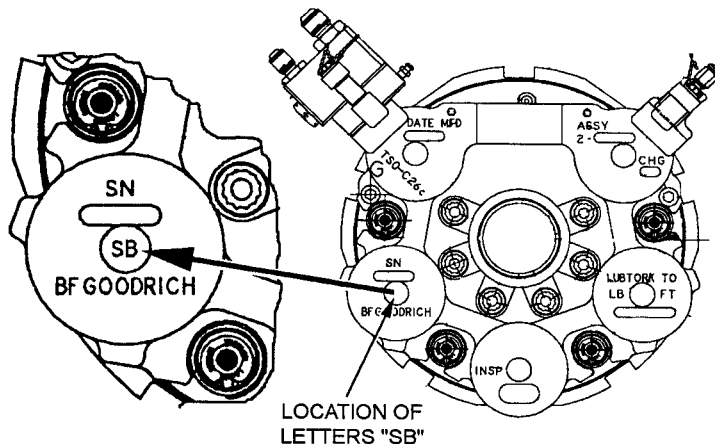


Figure 1. Identification of the Brake Assembly

- (3) If one or more stator disks is identified with no change letter or with change letter "A", examine each brake assembly as follows:

(a) Inspection schedule for aircraft that use thrust reversers.

- 1 0 - 375 landings - No examination is necessary until 376 landings are completed (refer to paragraph 1.E.(3)(a)2 that follows). If the brake assembly is examined before 375 landings, it will need to be examined again at another 375 landings, or removed at 700 total landings which ever occurs first.
- 2 376 - 500 landings - Effective March 1, 2000, do the examination given in this Service Bulletin before the next 50 landings after that date. If possible, do this examination at a tire change or scheduled maintenance procedure. If no cracked or broken stator disk is found, the brake assembly can be assembled and operated until 700 landings are completed (refer to paragraph 1.E.(3)(a)4).
- 3 501 - 699 landings - Do the examination given in this Service Bulletin before the next 50 landings. If possible, do this examination at a tire change or scheduled maintenance procedure. If no cracked or broken stator disk is found, the brake assembly can be assembled and operated until 700 landings are completed (refer to paragraph 1.E.(3)(a)4).
- 4 700 or more landings - Remove the brake assembly from service before the next 50 landings. If possible, remove the brake assembly at a tire change or scheduled maintenance procedure.

# SERVICE BULLETIN

(b) Inspection schedule for aircraft that do not use thrust reversers.

- 1    0 - 199 landings - No examination is necessary until 199 landings are completed (refer to paragraph 1.E.(3)(b)2 that follows).
- 2    200 - 699 landings - Do the examination given in this Service Bulletin before the next 25 landings after receipt of this Service Bulletin. If possible, do this examination at a tire change or scheduled maintenance procedure.

Repeat this examination every 200 landings until the brake assembly is removed from service.

If no cracked or broken stator disk is found, the brake assembly can be assembled and operated until 700 landings are completed (refer to paragraph 1.E.(3)(b)3).

- 3    700 or more landings - Remove the brake assembly from service before the next 50 landings. If possible, remove the brake assembly at a tire change or scheduled maintenance procedure.

F.    APPROVAL:

This Service Bulletin has Goodrich and CESSNA engineering approval and contains no modification information that revises the approved configuration and therefore no governmental or other regulatory agency approval is necessary.

G.    MANPOWER:

Approximately 0.75 man-hour is necessary for examination of a brake assembly at a tire change.

Approximately 3.75 man-hours are necessary for examination of a brake assembly if the inspection is not done at a tire change.

Approximately 4.5 man-hours are necessary to replace the brake assembly.

H.    WEIGHT AND BALANCE:

No effect

I.    ELECTRICAL LOAD DATA:

Not affected

J.    SOFTWARE ACCOMPLISHMENT DATA:

Does not apply



# SERVICE BULLETIN

K. REFERENCE:

Goodrich Component Maintenance Manual (CMM) 32-46-42.

L. OTHER PUBLICATIONS AFFECTED:

<u>Publication</u>	<u>Chapter and/or Section</u>
CMM 32-46-42	CHECK

M. INTERCHANGEABILITY OR INTERMIXABILITY OF PARTS:

Does not apply

2. MATERIAL INFORMATION:

A. MATERIAL - PRICE AND AVAILABILITY:

Does not apply

NOTE: To keep warranty coverage, use only Goodrich-approved replacement parts.

B. INDUSTRY SUPPORT DATA:

Does not apply

C. MATERIAL THAT IS NECESSARY FOR IN-SERVICE ASSEMBLIES:

Does not apply

D. MATERIAL THAT IS NECESSARY FOR SPARE ASSEMBLIES:

Does not apply

E. REIDENTIFIED PARTS:

No effect

F. TOOLING - PRICE AND AVAILABILITY:

Does not apply

# SERVICE BULLETIN

## 3. ACCOMPLISHMENT INSTRUCTIONS:

- A. With the tire and wheel assembly removed, remove the six tie bolts, P/N 43-1343, from the brake assembly and remove the torque plate assembly from the piston housing assembly. Keep the lining and carrier assemblies and stator disks on the torque plate assembly (refer to Figure 2).

**CAUTION:** WHEN THE BRAKE ASSEMBLY IS ASSEMBLED AGAIN, THE FRICTION SURFACES OF THE DISKS MUST TOUCH THE SAME FRICTION SURFACES OF MATING PARTS THAT THEY TOUCHED BEFORE THE DISKS WERE REMOVED. DRIVE SLOTS AND DRIVE LUGS ON DISKS MUST HAVE THE SAME ALIGNMENT AFTER REASSEMBLY.

- B. Use chalk, felt-tip marker, or tape to mark the disks for identification of position in the heat sink (1, 2, 3, 4, 5) and which way each disk faces. Apply the identification marks to all parts so that the marks are aligned in a straight line.

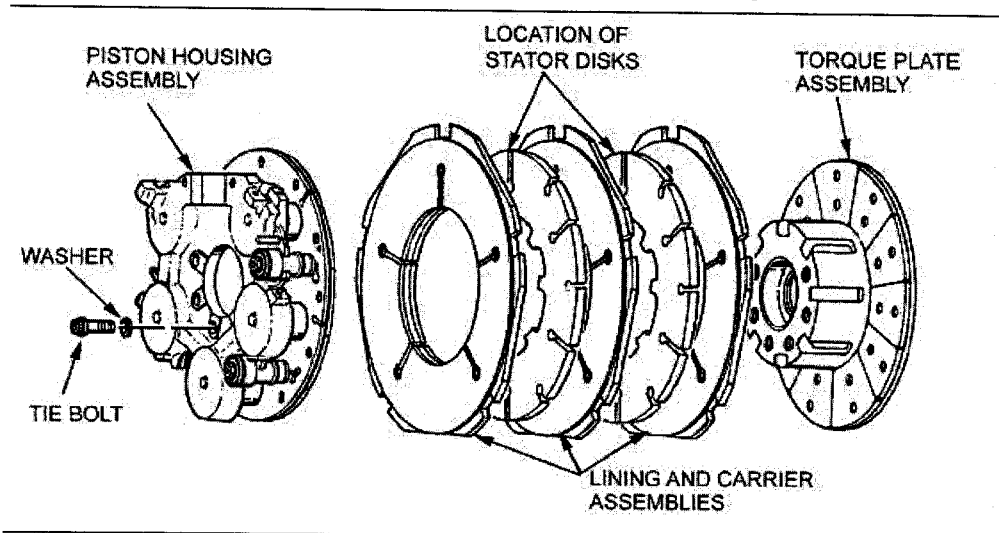


Figure 2. Brake Description

- C. Remove the stator disks, P/N 133-893-2, and use a rag or soft-bristle brush to clean the stop hole at the end of each long expansion slot (refer to Figure 3). It is not necessary to clean the stop holes at the end of the short expansion slots.
- D. Visually inspect each side of each stator disk for cracks that come from the stop hole at the end of each long expansion slot (magnification can help to find small cracks).

**NOTE:** The width of an expansion slot can be smaller or larger than usual, but this is not a reason to reject a stator disk.

# SERVICE BULLETIN

- E. If a cracked or broken stator disk is found, immediately remove the brake assembly from service.
- F. If no cracked or broken stator disk is found, continue to operate the brake assembly and obey the applicable inspection interval that is given in paragraph 1.E.(3).

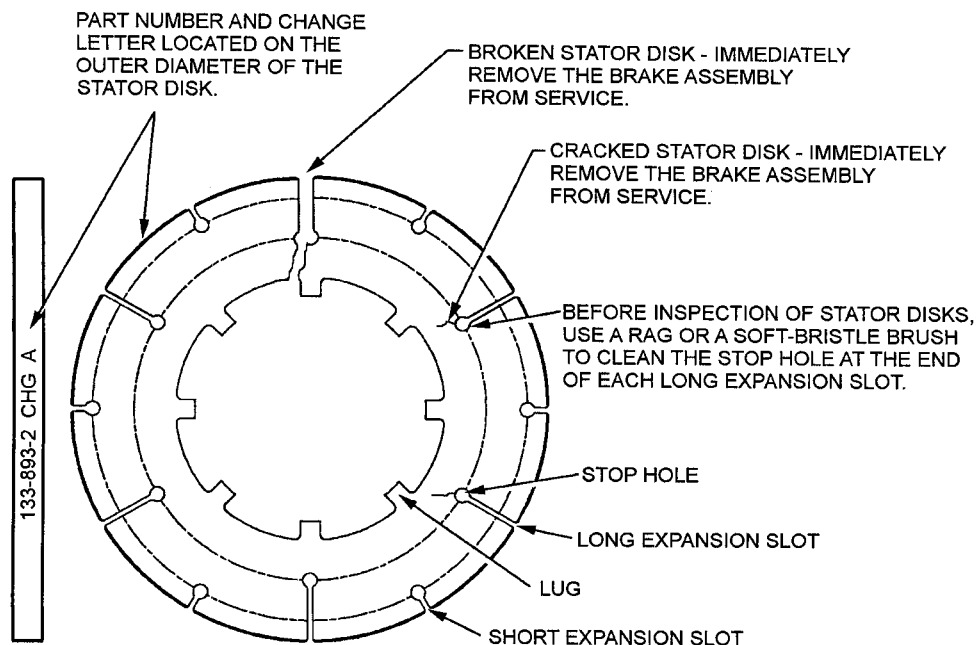


Figure 3. Stator Disk Examination

- G. Install the carrier and lining assemblies and stator disks on the torque plate assembly in their initial positions.
- H. Attach the assembly of torque plate and disks to the piston housing assembly with washers and tie bolts (refer to CMM 32-46-42 for the procedure to apply antiseize compound, to install washers and tie bolts, and to torque the tie bolts).
- I. Install the wheel assembly on the aircraft (refer to the Aircraft Maintenance Manual for the procedure).
- J. If the brake assembly has one or more stator disks that are identified with no change letter or with change letter "A", make an entry into the maintenance log to inspect the brake assembly at intervals that are given in paragraph 1.E.(3).