

**SUBJECT: PC-12, PC-12/45 AND PC-12/47 AIRCRAFT - HONEYWELL ELECTRONIC DISPLAY -
SERVICE BULLETIN ED-551/A-31-09**

To all Customers, Operators and Service Centers:

Date: May 11/10

This Service Letter is issued to draw attention to the following information:

Honeywell have issued SB ED-551/A-31-09 to introduce Hardware MOD 9 to ED 551 and 551A units. The modification replaces 11 aluminum electrolytic capacitors on the LVPS and adds Room Temperature Vulcanizing (RTV) insulation to prevent dielectric leakage.

SB ED-551/A-31-09 is applicable to ED 551 and 551A units, P/N 066-03137-XXXX, with a Serial Number 5907 and lower, that have been in service for 10 years or more.

Pilatus recommends that operators accomplish Honeywell SB ED-551/A-31-09 if applicable.

Operators requiring further information on this subject, please contact one of the addresses given below:

PILATUS AIRCRAFT LTD.,
CUSTOMER SUPPORT MANAGER,
CH-6371 STANS,
SWITZERLAND.

General Aviation
Tel : + 41 41 619 3333
Fax: + 41 41 619 7311
eMail: SupportPC12@pilatus-aircraft.com

PILATUS BUSINESS AIRCRAFT LTD.,
PRODUCT SUPPORT DEPARTMENT,
11755 AIRPORT WAY,
BROOMFIELD, CO 80021.
USA

Tel : 303 465 9099
Fax: 303 465 6040
eMail: Productsupport@PilBal.com

PILATUS AUSTRALIA (Pty.) LTD.,
17 James Schofield Drive,
Adelaide Airport SA 5950,
AUSTRALIA

Tel : +61 (08) 8234 4433
Fax: +61 (08) 8234 4499
Free Call: 1800 445 007
eMail: SupportPC12@pilatus.com.au

Attachments: HONEYWELL SERVICE BULLETIN ED-551/A-31-09

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Honeywell

Honeywell International Inc.
23500 W. 105th Street
Olathe, Kansas 66061-8425
U.S.A.
CAGE: 22373
Telephone: (800) 601-3099 (Toll Free U.S.A./Canada)
Telephone: (602) 365-3099 (International Direct)
Telephone: 00-800-601-30999 (EMEA Toll Free)
Telephone: 420-234-625-500 (EMEA Direct)

Web site: <http://portal.honeywell.com/wps/portal/aero>

SERVICE BULLETIN

INDICATING/RECORDING SYSTEMS - ED 551/551A ELECTRONIC DISPLAY (ED 551/551A) - Hardware Modification (MOD) 9 to the ED 551/551A, PN 066-03137-XXXX; Prevent End-of-Capacitor-Life Dielectric Leakage That Can Cause Shorts Between Board Traces on the Low Voltage Power Supply (LVPS) Resulting in Excessive Current Draw

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ECCN: 7E994, NLR Eligible.

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SERVICE BULLETIN

ED-551/A

Transmittal Information

ATA Number ED-551/A-31-09 (Publication Number D200911000043)

Summary

This is the INITIAL release.

Revision History

This service bulletin has had no revision(s) as shown in Table 1.

Table 1. Revision History

Revision Number	Revision Date
Initial Release	12 Feb 2010

Honeywell

SERVICE BULLETIN

ED-551/A

1. Planning Information

A. Effectivity

- (1) This service bulletin is applicable to the ED 551/551A, PN 066-03137-XXX, with Serial Number 5907 and lower, without MOD 9 installed.

B. Concurrent Requirements

- (1) No other modification must be done before the modification given in this service bulletin.

C. Reason

- (1) The modification given in this service bulletin replaces 11 aluminum electrolytic capacitors on the LVPS. Room temperature vulcanizing (RTV) insulation is added to prevent possible end-of-capacitor-life dielectric leakage that can cause shorts between board traces. The RTV coating is used as an insulator and prevents conductive dielectric material from causing excessive current to be drawn by the LVPS.

D. Description

- (1) A summary of the work necessary to do this modification is given below:
 - The ED 551/551A is disassembled and the LVPS is removed.
 - Eleven capacitors are replaced on the LVPS.
 - RTV is put between the new capacitors and the printed circuit board.
 - The ED 551/551A is assembled.
 - The modification is identified on the ED 551/551A unit serial tag.
 - A test is done on the ED 551/551A.

E. Compliance

- (1) It is recommended that this modification be done if the ED 551/551A has been in service for 10 years or more.

F. Approval

- (1) This service bulletin includes approved modification instructions from the manufacturer. The configuration created by this modification is approved by the applicable regulatory agency.

G. Manpower

- (1) This modification can be completed in the approximate times that follow:
 - 3.0 hour(s) for the labor to do the modification and test of the ED 551/551A.
- (2) If the ED 551/551A is not under warranty, more hours can be applicable. The hours are for the labor necessary to prepare, package, and inspect the ED 551/551A.

H. Weight and Balance

- (1) Not affected.

I. Electrical Load Data

- (1) Not affected.

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J. Software Accomplishment Summary

- (1) Not applicable.

K. References

- (1) To find, see, and download Honeywell Technical Publications, go to <http://portal.honeywell.com/wps/portal/aero>.
- (2) The document(s) that follow(s) is/are necessary to complete this modification. Unless specified differently, you can use subsequent revisions.
 - Maintenance Manual (MM), Publication Number 006-05240-0000, ED 551/551A Electronic Display, Revision 0.

L. Other Publications Affected

- (1) MM, Publication Number 006-05240-0000, ED 551/551A Electronic Display, will be revised because of this service bulletin.
- (2) This service bulletin has no effect on the test procedure.

M. Interchangeability or Intermixability of Parts

- (1) Not affected.

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2. Material Information

A. **Material - Price and Availability**

- (1) Speak to Honeywell personnel at the location identified below for the necessary documentation, applicable material and labor prices, available parts, and supply times.

Honeywell
Global Customer Care Center
Telephone: (800) 601-3099 (U.S.A.)
Telephone: (602) 365-3099 (International)

NOTE: Identified Global Material System (GMS) users can make an order for the material at <http://www.avionicservices.com/gms/login>. Customers who are not yet identified GMS users can use the same address to apply for identification.

- (2) This modification can be done at a Honeywell service center or Honeywell-authorized repair location. If the ED 551/551A is under warranty, there will be no cost to approved customers.
- (3) If the ED 551/551A is not under warranty, this modification will be done for the price given at the time of the order.
- (4) Honeywell can supply the parts necessary to do this modification. If the ED 551/551A is under warranty, there is no cost to approved customers. If the ED 551/551A is not under warranty, the price for parts will be given at the time of the order.
- (5) If there is no charge for parts, send a no-charge purchase order that refers to this Service Bulletin, ATA Number ED-551/A-31-09 (Publication Number D200911000043) - free of charge (FOC). The purchase order must include only the applicable parts specified in Table 2 of this service bulletin.
- (6) If there is a charge for parts, send a purchase order that refers to this Service Bulletin, ATA Number ED-551/A-31-09 (Publication Number D200911000043). The purchase order must include only the applicable parts specified in Table 2 of this service bulletin.

B. **Industry Support Information**

- (1) The maximum labor hours that will be reimbursed by Honeywell to do this modification are given below. Reimbursement will only be given if the ED 551/551A is under warranty. Reimbursement will not be more than Honeywell's applicable reimbursement labor rate or as specified in the agreement or contract.
 - 3.0 hour(s) for the labor to do the modification and test of the ED 551/551A.
- (2) If the ED 551/551A is not under warranty, more hours for the labor necessary to prepare, package and inspect the ED 551/551A can be applicable.
- (3) To get reimbursement after the modification of each ED 551/551A is completed, send a labor claim to Honeywell. The labor claim must be sent before 60 days after the approved work was completed. Use the data given below to send the labor claim to Honeywell.

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Honeywell
 Attn: Warranty Administration
 P.O. Box 21111
 Phoenix, AZ 85036-1111
 U.S.A.
 Fax: (602) 436-1500
 Website: <https://portal.honeywell.com/wps/portal/aero/serviceprograms/warranty>.

C. Material Necessary for Each Component

- (1) The parts identified in Table 2 are necessary to do this service bulletin.

Table 2. Operator-Purchased Material

New PN	Keyword/ Nomenclature	Old PN	Qty	List Price	Instructions/ Disposition Codes
097-00078-0036	Capacitor, aluminum (AL) 3.3 microfarad (UF) 100 volt (V) (C101)	097-00078-0036	1	Not applicable (N/A)	¹ ²
097-00214-0000	Capacitor AL 1800UF 10V (C129, C130)	097-00214-0000	2	N/A	¹ ²
097-00214-0004	Capacitor AL 1500UF 16V (C126, C127, C132, C133)	097-00214-0004	4	N/A	¹ ²
097-00214-0005	Capacitor AL 220UF 35V (C123, C124, C135, C136)	097-00214-0005	4	N/A	¹ ²

NOTES:

1. Refer to the Honeywell Global Customer Care Center (Paragraph 2.A.) when you need data about available parts, supply times, or minimum order quantities.
2. This part is necessary complete the modification in Paragraph 3.C.

- (2) The item(s) specified in Table 3 is/are necessary to do this service bulletin. The item(s) is/are available from commercial sources and should not be ordered as part of this service bulletin. Equivalent alternatives are permitted for the materials specified in Table 3.

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Table 3. Operator-Supplied Material

Part/Specification Number	Qty	Keyword/Nomenclature
016-01071-0000	AR	Rubber coating, RTV silicone (MIL-A-46146, Type II) - No. 3140 CAGE: 71984

D. Material Necessary for Each Spare

(1) Same as Paragraph 2.C.

E. Reidentified Parts

(1) Not applicable.

F. Tooling - Price and Availability

(1) Not applicable.

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3. Accomplishment Instructions

A. General Information

WARNING: TO AVOID INJURY TO PERSONNEL, BE AWARE THAT VOLTAGES ARE PRESENT IN THE UNIT AND IN THE TEST EQUIPMENT. VOLTAGES AS LOW AS 28 VOLTS CAN CAUSE SERIOUS INJURY UNDER SOME CONDITIONS. DO NOT BE MISLED BY THE TERM "LOW VOLTAGE."

WARNING: BEFORE YOU USE A MATERIAL, REFER TO THE MANUFACTURER'S MATERIAL SAFETY DATA SHEETS. SOME MATERIALS CAN BE DANGEROUS.

CAUTION: DO NOT USE A MATERIAL THAT IS NOT EQUIVALENT TO THE MATERIAL SPECIFIED BY HONEYWELL. A MATERIAL THAT IS NOT EQUIVALENT CAN CAUSE DAMAGE TO THE EQUIPMENT AND CAN MAKE THE WARRANTY NOT APPLICABLE.

CAUTION: THE ED 551/551A CONTAINS ELECTROSTATIC DISCHARGE SENSITIVE ITEMS. USE INDUSTRY APPROVED PRECAUTIONS.

- (1) Obey the precautions.
- (2) Refer to the ED 551/551A Electronic Display MM, Publication Number 006-05240-0000, for procedures and precautions. Use all CAUTIONS and WARNINGS. Refer to the bill of materials in the MM for the location of the parts, unless specified differently.
- (3) Keep all hardware for use in assembly unless specified differently.
- (4) Obey standard established shop practices during modification of the ED 551/551A unless specified differently.

B. Disassembly

- (1) Disassemble the ED 551/551A and remove the LVPS. Refer to the instructions in the Section 5.3.4 and Section 5.3.4.5 of the DISASSEMBLY section of the MM.

C. Modification

NOTE: To complete the work in this section, refer to Figure 6-6, LOW VOLTAGE POWER SUPPLY BD ASSEMBLY drawing of the MM for the location of the parts.

- (1) Carefully replace the capacitors identified below on the LVPS board.
 - (a) Replace capacitor C101 with new capacitor, PN 097-00078-0036.
 - (b) Replace capacitors C123, C124, C135, and C136 with new capacitors, PN 097-00214-0005.
 - (c) Replace capacitors C126, C127, C132, and C133 with new capacitors, PN 097-00214-0004.
 - (d) Replace capacitors C129 and C130 with new capacitors, PN 097-00214-0000.
- (2) Put RTV, PN 016-01071-0000, between the bottom of new capacitors and the surface of the LVPS board.

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D. Assembly

- (1) Assemble the ED 551/551A. Refer to the instructions in the Section 5.3.4, ASSEMBLY, of the MM.

E. Modification Status Marking

- (1) Use a permanent procedure to identify MOD 9 in the modification section of the ED 551/551A serial tag.

F. Testing

- (1) Do a test of the ED 551/551A. Refer to the instructions in Section 5.2, TEST AND ALIGNMENT, of the MM.

G. Feedback

- (1) If a location other than a Honeywell service center did the modification given in this service bulletin:
 - (a) Complete and return the ED-551/A-31-09 Feedback Sheet to Honeywell. Refer to Paragraph 4.A.

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4. Appendix

A. **Appendix A, Service Bulletin, ATA Number ED-551/A-31-09 Feedback Sheet**

- (1) If the modification given in this service bulletin is done at a location other than a Honeywell service center, complete and return the Service Bulletin, ATA Number ED-551/A-31-09 Feedback Sheet below to Honeywell.

Table 4. Service Bulletin, ATA Number ED-551/A-31-09 Feedback Sheet

Unit Information	
ED 551/551A PN	066-03137-
ED 551/551A Serial Number:	
Aircraft information (if known)	
Aircraft Type:	
Aircraft Serial Number:	
Aircraft Tail Number:	
Aircraft Owner:	
Aircraft Operator:	
Service Center performing modification:	_____

Date of modification:	
Please scan and email the completed sheet to:	paul.f.jones@honeywell.com
Or fax to	Fax: 1-913-712-0306