



Communications Systems Division 815 Broadhollow Rd, Farmingdale, N.Y. 11735

# SERVICE BULLETIN

SAAB-340

COMMUNICATIONS, DIGITAL AUDIO DISTRIBUTION SYSTEM, AUDIO CONTROL PANEL (ACP) ; ACTIVATE HF RADIO SELECTOR

## 1. PLANNING INFORMATION:

A. Effectivity: Audio Control Panel (ACP) P/N 502-0011-003, used in the Digital Audio Distribution System aboard SAAB 340 aircraft are affected if the operator chooses to add the HF radio capability.

B. Reason: To enable use of HF radio for extended range flights.

C. Description: The effort to accomplish this modification entails the following:

- (1) Removing a screw-mounted plate, which locks out XMIT SELECT switches S3, S4 and S5.
- (2) Installing blocking inserts in actuating mechanism of switches S3 and S5.
- (3) Installing a lamp holder and lamp in XMIT SELECT switch S4 (HF).
- (4) Re-identifying the A1 circuit card assembly number from P/N 502-0035-004 to -005 and the unit assembly number from 502-0011-003 to -004.

To accomplish the described changes, the cover assembly and Encoder Card Assembly A1 are removed from the unit.

D. Approval: This modification enables use of approved but previously unused circuitry. Approval is not required.

E. Manpower: It is estimated that 1.3 man-hour will be required per unit.

F. Material - Cost and Availability:

- (1) Kits: Kits, P/N SBK502-0011-3, for performance of this bulletin, will be supplied at the current price listed in the Telephonics Spare Parts Catalog. For kit contents, refer to MATERIAL INFORMATION section of this bulletin.

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- (2) Telephonics Performance: When authorized, Telephonics will perform this modification at a charge based on the current Service Center labor rate.
  - (3) Kit price and Telephonics performance charges are subject to adjustment at each revision of the Telephonics Spare Parts Price Catalog and following each Labor Rate Review.
- G. Tooling: - Cost and Availability: No special tooling required.
- H. Weight and Balance: None
- I. References:
- (1) Component Maintenance Manual with Illustrated Parts List,. Audio Control Panel P/N's 502-0011-002 (ATA 23-51-10).
- J. Publications Affected: The changes detailed in this bulletin shall be reflected in Reference (1), at the next scheduled revision.
- K. Expiration: None



## 2. ACCOMPLISHMENT INSTRUCTIONS:

### A. Disassembly: Item references are per IPL Figure 1 of Reference (I).

- (1) Release two 1/4 turn fasteners (25) at rear of unit and remove cover assembly (15).
- (2) Remove four each pan head screws (60) and flat washers (65). Carefully disengage AI circuit card assembly (55) from unit.
- (3) Remove four each pan head screws (95), lock washers (100) and flat washers (105) and disengage connectors P1 and P2 (90) from AI card assembly.

### B. Modification: Item references are per Figure 1 of this bulletin.

- (1) Remove push button assembly (20) from plunger of XMIT SELECT switch S4.
- (2) Remove two each pan head screws (40), internal toothed lock washer, (45) and remove button stop (50). Discard stop, both screws and one washer, saving other washer for reuse.
- (3) Install switch blocking insert (55) in plungers of XMIT SELECT switches S3 and S5, as shown in Figure 1. To do so, compress spring back to switch body and seat insert in channel of plunger. Allow spring to extend to normal position, thereby trapping and retaining insert.
- (4) Using #28 AWG Teflon sleeving MIL-I-22129 (contained in kit), insulate both leads of 5V, .06A lamp (25) and install in lamp holder (30).
- (5) Using pan head screw (35) and internal toothed lock washer (45), install lamp holder (30), in S4 position as shown. DO NOT OVER TIGHTEN SCREW.
- (6) Connect and solder lamp leads, to insulated pin terminals located between switches S3 and S4.
- (7) Install push button (20) on plunger of switch S4 Ensure that all buttons are fully seated on their respective switch plungers.

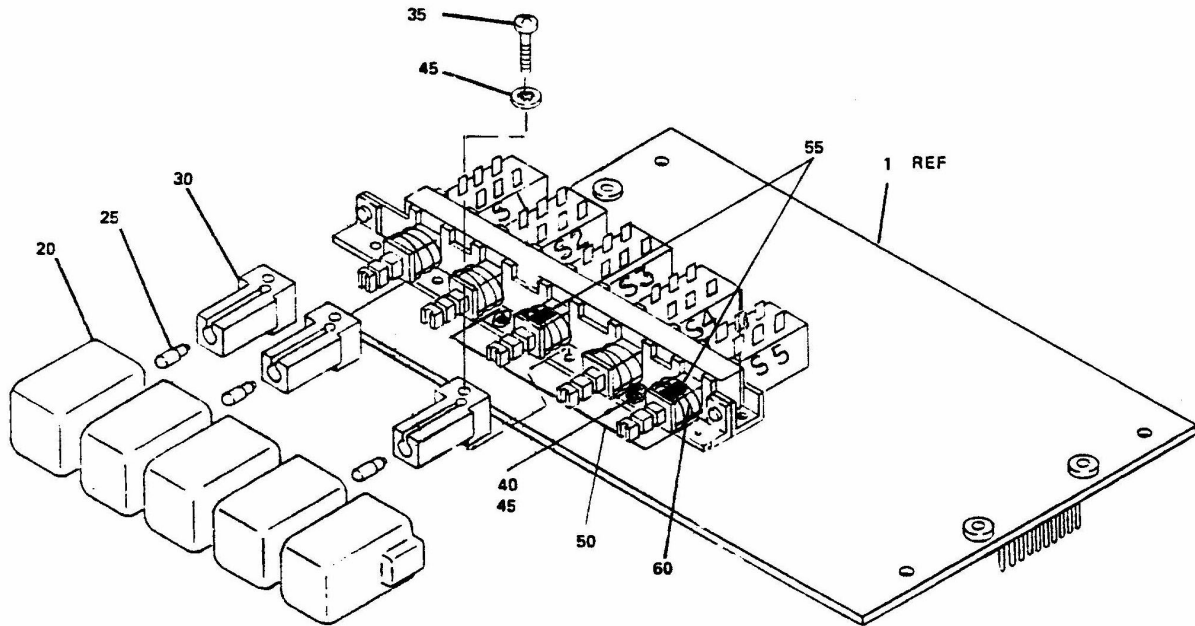
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- (8) Using white epoxy ink, change AI circuit card assembly number from 502-0035-004 to read 502-0035-005.

C. Assembly and Test: Item references are per IPL Figure 1 of Reference 1.

- (1) Engage harness connector plugs PI and P2 (90) and secure with four each pan head screws (95), lock washers (100) and flat washers (105).
- (2) Seat AI circuit card assembly (55) in unit and secure with four each pan head screws (60) and flat washers (65).
- (3) Check for proper mechanical operation of XMIT SELECT switches, to ensure complete lock out of S3 and S5.
- (4) Using black epoxy ink, change unit assembly number on side of chassis (190), from 502-0011-003 to read 502-0011-004
- (5) Install cover assembly (15) and secure by locking two 1/4 turn captive fasteners (20).
- (6) On manufacturer's identification plate (5), change unit part number 502-0011-003 to read 502-0011-004. To do so, use black ink to obliterate numeral 3 . When dry, use white epoxy to print numeral 4 .
- (7) Test unit in accordance with instructions contained in Reference (1).



ITEM	PART NUMBER	DESCRIPTION	REMARKS.
1	502-0035-005	Card Assembly	Ref
20	502-0022-001	Button Assembly	Ref
25	L235AO17-16	Lamp, 5V, .06A	
30	502-0039-005	Lamp Holder, Ventilated	
35	MS51957-6	Screw, Pan Hd. #2-56x7/16"	
40	MS35333-69	Washer, Lock, I.T. #2	
45	MS51957-2	Screw, Pan Hd. #2-56x3/16"	Discard
50	502-0038-001	Button Stop	Discard
55	502-0077-001	Insert, Switch Blocking	

ENCODER CIRCUIT CARD ASSY - A1, P/N 502-0035-005  
FIGURE 1

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3. Material Information: Material information is provided on a unit basis.

A. Kit: Each kit, P/N SBK 502-0011-3 contains the following:

<u>QTY</u>	<u>NEW PART NO.</u>	<u>KEY WORD</u>	<u>OLD PART NO.</u>	<u>DISPOSITION</u>
1	502-0039-005	Lamp Holder, Vented	None	N/A
1	L235AO17-16	Lamp 5V, .06A	None	N/A
1	MS51957-6	Screw Pan Hd. #2-56x7/16	None	N/A
3"	MIL-I-22129	#28AWG Sleeving, Teflon	None	N/A
2	502-0077-001	Insert, Switch Blocking	502-0038-001	Scrap

B. Identification:

<u>NEW PART NO.</u>	<u>EQUIPMENT</u>	<u>OLD PART NO.</u>
502-0035-005	Card Assy. AI	502-0035-004
502-0011-004	Unit, ACP	502-0011-003

C. Interchangeability: Modified units retain all capabilities of unmodified units and can be used to replace unmodified units in airplanes not equipped with HF radio.

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