ACN 008 622 008

Reference No 243

### TRANSMITTAL LETTER FOR SERVICE BULLETIN ANMD-27-41 Rev 2

### FLIGHT CONTROLS — REVISION OF FLAP AUTO-SELECT SWITCH SYSTEM (MOD N46)

### Reason

1. To improve the operation of microswitches by preventing dust contamination and also to provide greater separation between stall warning landing gear switches and other functions.

This modification is a prerequisite for Mod N608 (Alert Service Bulletin ANMD-27-40).

2. Revision 2 corrects the cam assembly part number.

### Instructions

3. Remove Service Bulletin ANMD-27-41 Rev 1, dated 17 Oct 89 from Service Bulletin binder and insert the attached Service Bulletin ANMD-27-41 Rev 2, dated 1 Jun 92. Annotate the Service Bulletin Index accordingly.

### **Revision Status**

Original 29 Aug 89
Revision 1 17 Oct 89
Revision 2 1 Jun 92

ANMD-27-41

1 Jun 92

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### FLIGHT CONTROLS — REVISION OF FLAP AUTO-SELECT SWITCH SYSTEM (MOD N46)

### 1. PLANNING INFORMATION

### A. Effectivity

All Nomad N22 Series aircraft whose log books do not record the embodiment of Mod N46 or compliance with Service Bulletin ANMD-27-41.

### B. Reason

(1) To improve the operation of microswitches by preventing dust contamination and also to provide greater seperation between stall warning landing gear switches and other functions.

### NOTE

This modification is a prerequisite for Mod N608 (Alert Service Bulletin ANMD-27-40).

(2) Reason for Revision 2.

Cam assembly part number correction.

### C. Description

A revised cam is fitted for the stall warning and landing gear switches and a new mounting plate is provided which permits the fitting of a cover.

### D. Compliance

Within 100 hours of receipt of this ASB. Alert Service Bulletin ANMD- 27-40 is to be incorporated concurrently.

### E. Approval

This modification is approved pursuant to CAR 35 and conforms with type certification requirements.

### F. Manpower

Three manhours.

### G. Material - Price and Availability

Material to be obtained from ASTA General Aviation, price and availability on request.

### H. Tooling - Price and Availability

None required.

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### I. Weight and Balance

The following information is to be used to amend the appropriate Flight Manual and Weight and Balance Manual.

	N22 Series				
	SI	Imperial			
Weight	0.05 kg	0.11 lb			
Arm	5438 mm	214.54 in			
Index Units	0.27 <u>kg mm</u> 1000	0.02 lb in 1000			

### J. References

Mod N46 data.

### K. Publications Affected

N22 Maintenance Manual Chapters 27-50-00, 27-50-03, 31-52-00 and 32-60-00.

N22 Illustrated Parts Catalogue 27-50-02.

### 2. ACCOMPLISHMENT INSTRUCTIONS

- A. Extend the flaps to the landing position as detailed in MM 27-50-00, observing all safety procedures.
- B. Open the trailing edge door to gain access to the microswitch assembly at WSta 62.528.
- C. Remove the securing nuts and washers at the flap idler arm mounting bolt and idler arm to control rod connection. Remove the tie plate and cam assembly (Ref Fig 1).

### NOTE

Do not remove the bolt from the control rod.

- D. Remove the screws, washers and nuts securing the microswitches and actuators to the mounting plate.
- E. Remove the mounting plate adjustment bolt and remove and discard the mounting plate 1/N-45-1294.
- F. Assemble microswitches and actuators to mounting plate 1/N-45-1354 with existing screws and washers and new locknuts MS21083N04.
- G. Install the mounting plate on the flaps idler bolt with the mounting plate located centrally within its range of adjustment. Loosely install the adjustment bolt with the washer under the bolt head.
- H. Place the cam assembly 2/N-45-1297 on the flap idler bolt and wet assemble. Depress the microswitch plungers and push the cam fully home. Allow the microswitch actuator rollers to rest on the cam face.

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- I. Using a new locknut, install the nut and washers attaching the cam assembly and idler arm to the control rod (Ref Fig 1).
- J. Torque tighten control rod bolt to 30-40 lb in and the flap idler attaching bolt to 60-85 lb in.
- K. Set the battery switch to ON, set the flaps circuit breakers and check the adjustment of the microswitches. Functionally test the operation of the AUTO switch and stall warning system (Ref MM Chap 27-50-00 and 31-52-00).
- L. With all adjustments completed, extend the flaps and install Cover Assembly 1/N-45-1356 over the microswitch and cam assembly (Ref Fig 1).
- M. Check the operation of the landing gear up warning system (Ref MM Chap 32-60-00).
- N. Set the battery switch to OFF, trip the flaps circuit breakers and disconnect the external electrical supply.

### 3. MATERIAL INFORMATION

Parts required per aircraft

New Part No	Qty	Description	Old Part No	Instruction/Disposition			
Parts to be obtained from ASTA General Aviation							
2/N-45-1297	1	Assembly, Cam	1/N-45-1297	Scrap			
1/N-45-1354	1	Assembly, Mounting Plate	1/N-45-1294	Scrap			
1/N-45-1359	1	Plate, Tie	1/N-45-1347	Scrap			
1/N-45-1356	1	Assembly, Cover					
AN960PD716L	1	Washer					

### 4. RECORDING ACTION

Record compliance with Service Bulletin ANMD-27-41 in the Airframe Log Book.

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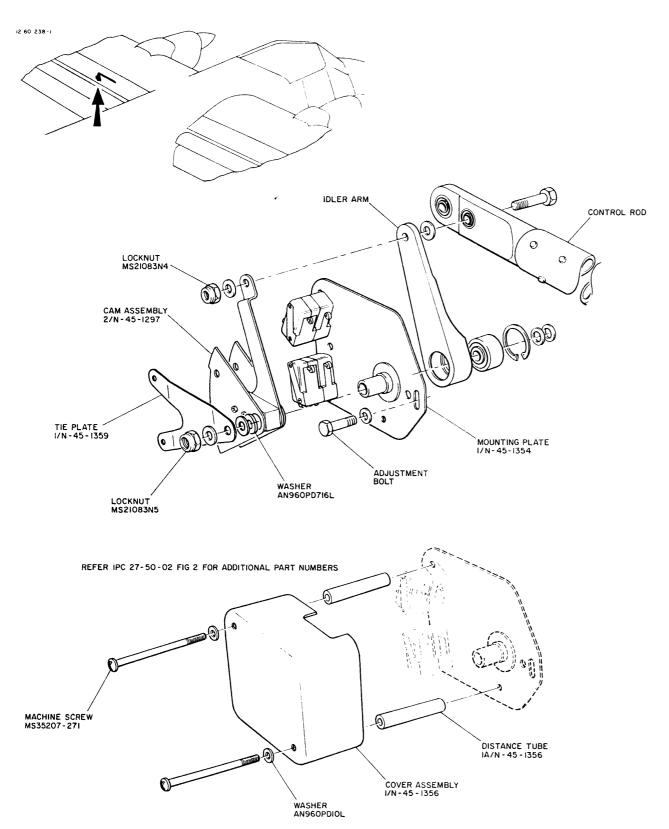


Figure 1 Flap Microswitch Assembly — Installation

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