

AIRBUS INDUSTRIE
PRODUCT SUPPORT DIRECTORATE
1 Rond Point Maurice Bellonte
31707 BLAGNAC CEDEX FRANCE
Tel : (33) 61-93-33-33
Telex : AIRBU 530526 F



SERVICE BULLETIN CHANGE NOTICE

S.B. No. A320-21-1025 REV. 2

DATED : Apr 19/90

MOD. No. 21729P1780
21732P1841

TITLE : AIR CONDITIONING - AVIONICS VENTILATION - IMPROVE INSULATION OF
TEMPERATURE SENSOR AND ACCURACY OF SKIN TEMPERATURE READING.

MODEL : All models listed on S.B.

DESCRIPTION :

This notice is issued to inform the affected operators that subject
Service Bulletin is changed as stated below.

SERVICE BULLETIN SUMMARY

Page 4, Para. MATERIAL INFORMATION

Equipment Data

Kit No. 211025A01

Read : Interchangeability code 02 (Ref. ATA 200)

Instead of : Interchangeability code 01 (Ref. ATA 200)

This change will be incorporated in the next revision of this Service
Bulletin ; however no revision is planned at the present time.

FILING INSTRUCTION

File this Change Notice in front of the Service Bulletin.

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Service Bulletin is changed as stated below.

SERVICE BULLETIN

Page 9 - Para. 2.B.(2)(i),

Read	: 7 rivets	ASNA2051DEJ4018	Item 6
Instead of	: 7 rivets	ASNA2051DCJ4018	Item 6

Page 15 - Para. 3.A.,

Read	: 6	ASNA2051DEJ4018	7 Rivets (6)	ASNA2051DEJ4018	**
Instead of	: 6	ASNA2051DCJ4018	7 Rivets (6)	ASNA2051DCJ4018	**

This change will be incorporated in the next Revision of this Service
Bulletin ; however no Revision is planned at the present time.

FILING INSTRUCTIONS

File this Change Notice in front of the Service Bulletin.

SERVICE BULLETIN No. : A320-21-1025

5 DATE : Dec 05/90

CHANGE NOTICE No. : 2.B.

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SERVICE BULLETIN

REVISION TRANSMITTAL SHEET

MODIFICATION No. 21729/P1780 21732/P1841

ATA SYSTEM : 21

TITLE : AIR CONDITIONING - AVIONICS VENTILATION - IMPROVE INSULATION OF
TEMPERATURE SENSOR AND ACCURACY OF SKIN TEMPERATURE READING.

This page transmits Revision No. 3 of Service Bulletin A320-21-1025.
No additional work is required by this Revision.

REASON

This revision is issued to inform the operators of an updating of the
effectivity paragraph and incorporates Change Notices No. 2.A. and 2.B.

SERVICE BULLETIN SUMMARY

Page 2 - Paragraph EFFECTIVITY modified.
Page 4 - Interchangeability code modified.

SERVICE BULLETIN

Pages 1 of 16 and 2 - Paragraph 1.A.(2) and NOTE modified.
Page 5 - Paragraph 1.F.(2) modified.
Page 9 - Paragraph 2.B.(2)(i) modified.
Page 15 - Paragraph 3.A. modified.

FILING INSTRUCTIONS

Replace pages SUMMARY 1 of 4, 2 and 4
SERVICE BULLETIN 1 of 16, 2, 5, 9 and 15.

File this Revision Transmittal Sheet in front of the Service Bulletin.

REVISION SEQUENCES

ORIGINAL : Nov 09/89

REVISION : No. 1 - Jan 26/90

REVISION : No. 2 - Apr 19/90

REVISION : No. 3 - Aug 11/92

5 DATE : NOV 09/89

SERVICE BULLETIN No. : A320-21-1025

REVISION No. : 3 - Aug 11/92

PAGE : 1 of 1

This summary is for information only and is not DGAC approved for modification of the aircraft.

MODIFICATION No. 21729/P1780 21732/P1841

ATA SYSTEM : 21

TITLE : AIR CONDITIONING - AVIONICS VENTILATION - IMPROVE INSULATION OF TEMPERATURE SENSOR AND ACCURACY OF SKIN TEMPERATURE READING.

REASON/DESCRIPTION/OPERATIONAL CONSEQUENCES

The avionics ventilation skin air valves should close on ground at an OAT of + 5°C and lower to prevent ice formation at the inlet. During ground operation with OAT lower than + 5°C, the skin air valves have been observed open, also under these conditions the skin air valve has been observed to be blocked with ice :

This Service Bulletin improves the accuracy of aircraft skin temperature reading by modifying the AEVC and adding a thermal insulation on the temperature sensor.

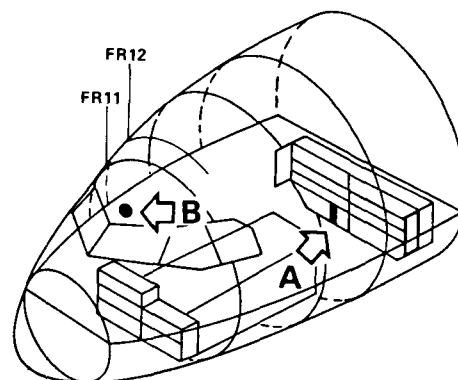
This modification consists in :

Kit No. 211025A01

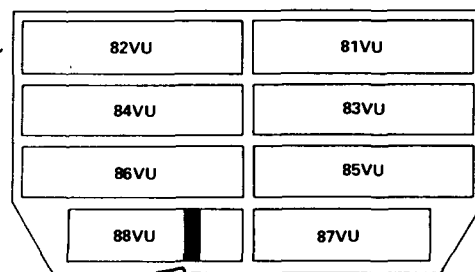
- (1) In zone 128, at shelf 88VU of electronics rack 80VU,
Replacement of Avionics Equipment Ventilation Computer (A.E.V.C.)
10HQ modified as per instructions in CROUZET Service Bulletin No. 87292325-21-002.

Kit No. 211025A02

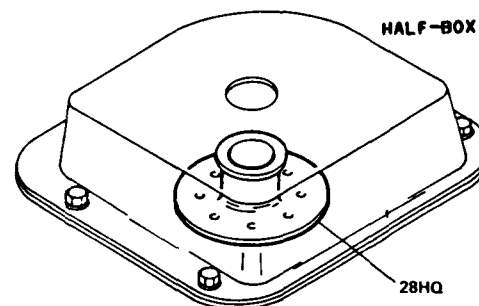
- (2) In zone 126, between STA579/FR11 and STA605/FR12, above the right lateral stringer, Installation of a box and a thermal insulation on the skin temperature sensor 28HQ.



A



B



SERVICE BULLETIN SUMMARY

EFFECTIVITYKit No. 211025A01

This Service Bulletin is applicable to the following operators :

AAA, ACA, ADR, AFR, AMC, BAW, HP, CYP, DLH, IAC, ITF, NWA, XP.

This modification is embodied prior to delivery on A/C MSN 002, 068, 073, 084, 087, 088 and subsequent.

Kit No. 211025A02

This Service Bulletin is applicable to the following operators :

AAA, ADR, AFR, AMC, BAW, BNF, CYP, DLH, IAC, ITF, NWA, RJA, TAR, XP.

This modification is embodied prior to delivery on A/C MSN 002, 059, 068, 073, 084, 118, 121, 122, 125 and subsequent.

NOTE : For information Service Bulletin A320-21-1015 introduces :

- AEVC improvement from 87292325V02 to 87292325V03,
- blowing duct modification in the frame of cabin noise reduction.

REFERENCES/REPERCUSSIONS

TFU	21-26-13-01	LIFE LIMIT	None
OEB	72/1	LINE MAINTENANCE AFFECTED	
AOT	None	NO	
SIL	None	OTHERS	None

NATURE OF THE MODIFICATION

AIRCRAFT	YES
EQUIPMENT	YES
HARD	NONE
SOFT	YES
OBRM	NONE

SERVICE BULLETIN SUMMARY

COMPLIANCE

Desirable.

MANPOWER

	<u>Aircraft</u>	<u>Bench</u>
<u>Kit No. 211025</u>	<u>A01</u>	
Manhours	2.0	Refer to CROUZET Service Bulletin No. 87292325-21-002
Elapsed Time (hours)	1.5	
<u>Kit No. 211025</u>	<u>A02</u>	
Manhours	5.5	
Elapsed Time (hours)	4.0	

MATERIAL INFORMATIONAircraft DataKit No. 211025A02

Quantity per A/C :
2 half boxes
1 compressed blanket

Equipment DataKit No. 211025A01

Designation : AEVC

Supplier : CROUZET

Service Bulletin No. : 87292325-21-002

Part Number Before : 87292325V02 or 87292325V03

DATE : Nov 09/89

SERVICE BULLETIN No. : A320-21-1025

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SERVICE BULLETIN SUMMARY

Part Number After 87292325V04

Interchangeability code 02 (Ref. ATA 200)

Intermixability : None

APPENDICES

None.

DATE : Nov 09/89

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SERVICE BULLETIN

MODIFICATION No. 21729/P1780 21732/P1841

ATA SYSTEM : 21

TITLE : AIR CONDITIONING - AVIONICS VENTILATION - IMPROVE INSULATION OF
 TEMPERATURE SENSOR AND ACCURACY OF SKIN TEMPERATURE READING.

1. PLANNING INFORMATION

A. EFFECTIVITY

(1) Aircraft models : 320-111, 320-211, 320-231.

(2) Aircraft

Customer and Fleet No.	MSN	Kit No. 211025	Qty of Kits
AAA001-008	022,023,024,025,026,027 029,030	A01	08
		A02	08
ACA201	059	A01	01
ADRO01-003	043,113,114	A01	03
		A02	03
AFRO01,002	005,007	A01	02
		A02	02
AFRO04-007	014,019,020,021	A01	04
		A02	04
AFRO31-036	061,062,063,100,101,102	A01	06
		A02	06
AMCO01	112	A01	01
		A02	01
BAW001-009	006,008,011,017,018,039 042,103,109	A01	09
		A02	09
BAW010	120	A02	01
HP620-622	052,053,054	A01	03
		A02	03
HP624-629	055,064,065,066,067,076	A01	06
		A02	06

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Customer and Fleet No.	MSN	Kit No. 211025	Qty of Kits
HP631-637	077,081,082,091,092,098 099	A01	07
		A02	07
CYP001-004	028,035,037,038	A01	04
		A02	04
DLH001-015	069,070,071,072,078,083 086,093,094,104,105,110 111,116,117	A01	15
		A02	15
IAC001-012	045,046,047,048,049,050 051,056,057,058,074,075	A01	12
		A02	12
IAC014-019	080,089,090,095,096,097	A01	06
		A02	06
ITF001-005	010,012,013 016,033	A01	03
		A02	02
ITF007-012	036,044,004,003,108,115	A01	06
		A02	06
NWA301-308	031,032,034,040,041,060 106,107	A01	08
		A02	08
NWA309	118	A01	01
RJA001-003	087,088,123	A02	03
TAR001,002	119,124	A02	02
XP001	085	A01	01
		A02	01

NOTE : Kit No. 211025A01 concerns Mod. No. 21729/P1780.

This modification is embodied prior to delivery on A/C
MSN 002, 068, 073, 084, 087, 088, 119 and subsequent and
corresponds to CROUZET Service Bulletin No. 87292325-21-002.

Kit No. 211025A02 concerns Mod. No. 21732/P1841.

This modification is embodied prior to delivery on A/C
MSN 002, 059, 068, 073, 084, 118, 121, 122, 125.

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(3) Spares

Avionics Equipment Ventilation Computer (A.E.V.C.) 10HQ
CROUZET 87292325V02 or 87292325V03.

B. REASON

The avionics ventilation skin air valves should close on ground at an OAT of + 5°C and lower to prevent ice formation at the inlet. During ground operation with OAT lower than + 5°C, the skin air valves have been observed open, also under these conditions the skin air valve has been observed to be blocked with ice :

This Service Bulletin improves the accuracy of aircraft skin temperature reading by modifying the AEVC and adding a thermal insulation on the temperature sensor.

C. DESCRIPTION

Accomplishment of this Service Bulletin consists in carrying out the following jobs :

In avionics compartment :

Kit No. 211025A01

- (1) In zone 128, at shelf 88VU of electronics rack 80VU,
Replacement of Avionics Equipment Ventilation Computer
(A.E.V.C.) 10HQ modified as per instructions in CROUZET Service
Bulletin No. 87292325-21-002

Kit No. 211025A02

- (2) In zone 126, between STA579/FR11 and STA605/FR12, above the
right lateral stringer.
Installation of a box and a thermal insulation on the skin
temperature sensor 28HQ.

D. APPROVAL

This Service Bulletin is approved by Direction Générale de l'Aviation
Civile - FRANCE (D.G.A.C.), for modification 21731 kit A02 only.

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E. MANPOWER

	<u>Manhours</u>	
	Kit No. 211025	
	<u>Aircraft</u>	<u>Bench</u>
	<u>A01</u>	<u>A02</u>
Gain access	0.5	1.0
Removal/Installation of A.E.V.C. (10HQ)	0.5	
Modification to A.E.V.C. (10HQ)		Refer to CROUZET Service Bulletin No. 87292325-21-002
Installation of insulation on (28HQ)		3.0
Test	0.5	0.5
Close-up	0.5	1.0
	<hr/>	
TOTAL MANHOURS	2.0	5.5
ELAPSED TIME (HOURS)	1.5	4.0

NOTE : This Service Bulletin assumes that the aircraft has been placed in a maintenance status. The manhours/elapsed time estimates do not include preparation for the modification, non-productive elapsed time, or administrative functions.

F. MATERIAL - COST AND AVAILABILITY

(1) Material

Operators with aircraft listed under paragraph 1.A.(2) above should submit a purchase order quoting this Service Bulletin to :

AIRBUS INDUSTRIE
SPARES SUPPORT CENTER
WEG BEIM JAEGER 150
D2000 HAMBURG 63
GERMANY

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(2) Cost and availability

Kit No.	Cost (US Dollars)	Availability *
211025A02	Free of charge	180

* Calendar days from receipt of order.

The sales terms (Cost and availability) are estimated in relation to economic conditions at the issue date of the Service Bulletin.

(3) Kit No. 211025A01

Terms of procurement for equipment should be negotiated directly with CROUZET as per instruction given in CROUZET Service Bulletin No. 87292325-21-002.

G. TOOLING - PRICE AND AVAILABILITY

None.

H. WEIGHT AND BALANCE

Kit No. 211025A01

None.

Kit No. 211025A02

MEW : + 0.40 kg (+ 0.88 lb.)

Effect on balance : + 2.38 kgm (+ 17.26 lb.ft)

I. REFERENCES

Aircraft Maintenance Manual : 12-34-24, 20-21-11, 21-26-00,
21-26-13, 21-26-34, 24-41-00,
52-41-00



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Consumable material list.

Crouzet Service Bulletin No. 87292325-21-002.

Service Bulletin No. A320-21-1015.

Structural Repair Manual : 51-46-00.

J. PUBLICATIONS AFFECTED

Aircraft Maintenance Manual : 21-26-00, 21-26-13

Illustrated part catalog : 21-26-01, 21-26-08, 21-26-34

Structural Repair Manual : 53-11-29.

2. ACCOMPLISHMENT INSTRUCTIONS**A. GENERAL****(1) Preparation****Kits No. 211025A01 and A02**

- (a) De-energize the aircraft electrical circuits (Ref. AMM 24-41-00, P. Block 201) and electrically ground the aircraft (Ref. AMM 12-34-24, P. Block 201).
- (b) Put the access platform in position.
- (c) Open the access doors 824 (Kit A01) and 822 (Kit A02) (Ref. AMM 52-41-00).
- (d) Open, safety and tag these circuit breakers :

PANEL	SERVICE	IDENT.	LOCATION
49VU	AIR COND/AVNCS VENT/CTL	5HQ	D07
49VU	AIR COND/AVNCS VENT/CTL	6HQ	D06
122VU	AIR COND/AVNCS/VENT/MONG	3HQ	Y17
123VU	AVNCS VENT/BLOWER/FAN	1HQ	AD10
123VU	AVNCS VENT/EXTC/FAN	2HQ	AE02

(2) Standard procedures**Kit No. 211025A02**

- (a) To torque the threaded components (Ref. AMM 20-21-11).
- (b) To renew the protective finish with Material No. 16-020, Material No. 16-001, Material No. 16-002 (the internal area), Material No. 16-018 (the external area) (Ref. CML).
- (c) To clean the surfaces that must be sealed with Material No. 11-003 (Ref. CML).
- (d) To apply Material No. 09-025 (Ref. CML) to install the rivets.
- (e) To decrease the length of the standard rivets as required.

B. MODIFICATION**Kit No. 211025A01**

(1) In zone 128,

At the shelf 88VU of the electronics rack 80VU, replace the Avionics Equipment Ventilation Computer (A.E.V.C.) 10HQ (Ref. AMM 21-26-34, P. Block 401).

Refer to Figure 1

(a) Remove :

1 A.E.V.C. (10HQ)

Item (1)

(b) Install :

1 modified A.E.V.C. (10HQ) 87292325V04 Item 1 (Ref. the instructions in CROUZET Service Bulletin No. 87292325-21-002).

Kit No. 211025A02

(2) In zone 126, between STA579/FR11 and STA605/FR12 above the right lateral stringer.

Install a box and a thermal insulation on the temperature sensor 28HQ.

Refer to Figure 2

(a) Unfasten temporarily the drain hose in the work area for access (only to release the tension of this hose but do not disconnect it).

(b) Remove the insulation blanket in the work area for access.

(c) Remove the temperature sensor (28HQ) (Ref. AMM 21-26-13), P. Block 401).

(d) Position the half box D5391461900000 Item 4.

At level of half box/rivet line interference, locate and remove 3 rivets Item 6 (discard) from fuselage.

(e) On half box Item 4, mask and drill two 9 mm (0.354 in.) dia. holes ensuring the passage of rivet heads.

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(f) On half box Item 4, drill 3 holes with a :

minimum dia. of 4.05 mm (0.160 in.)

maximum dia. of 4.20 mm (0.165 in.)

to match existing holes on fuselage.

(g) After up half box Item 4. Position with respect to right lateral stringer STA 605/FR12 and existing flange.

Drill 4 holes with a :

minimum dia. of 4.05 mm (0.160 in.)

maximum dia. of 4.20 mm (0.165 in.)

in accordance with the half box Item 4.

(h) On Item 4 and on the fuselage, countersink and deburr (Ref. SRM 51-46-00).

(i) Apply the Material No. 09-016 (Ref. CML) between the surfaces and attach Item 4 with :

7 washers ASNA0113-40CA Item 5

7 rivets ASNA2051DEJ4018 Item 6

(j) After installation, seal off the two 9 mm (0.354 in.) dia. holes with Material No. 09-025 (Ref. CML).

(k) Install the temperature sensor (28HQ) (Ref. AMM 21-26-13, P. Block 401). Lockwire with the lockwire MS20995C41.

(l) Install the compressed blanket :

1 blanket D2121121700000 Item 3

(m) On the half box Item 4, install :

1 half box D2121121600000 Item 2

with :

6 screws NAS1096-3-8 Item 8

6 washers ASN-A2397-10L Item 7

C. TESTS**Kits No. 211025A01 and A02**

- (1) Close these circuit breakers :

PANEL	SERVICE	IDENT.	LOCATION
49VU	AIR COND/AVNCS VENT/CTL	5HQ	D07
49VU	AIR COND/AVNCS VENT/CTL	6HQ	D06
122VU	AIR COND/AVNCS/VENT/MONG	3HQ	Y17
123VU	AVNCS VENT/BLOWER/FAN	1HQ	AD10
123VU	AVNCS VENT/EXTC/FAN	2HQ	AE02

Kit No. 211025A01

- (2) Do the operational test of the avionics equipment ventilation from the Multipurpose Control and Display Unit (M.C.D.U.) (Ref. AMM 21-26-00, P. Block 501).

Kit No. 211025A02

- (3) After the installation of the skin temperature sensor, do an operational test (Ref. AMM 21-26-13, P. Block 501).

D. CLOSE-UP**Kit No. 211025A02**

- (1) Install the insulation blanket and attach the drain hose in the work area.
- (2) Close the access door 822 (Ref. AMM 52-41-00).

Kit No. 211025A01

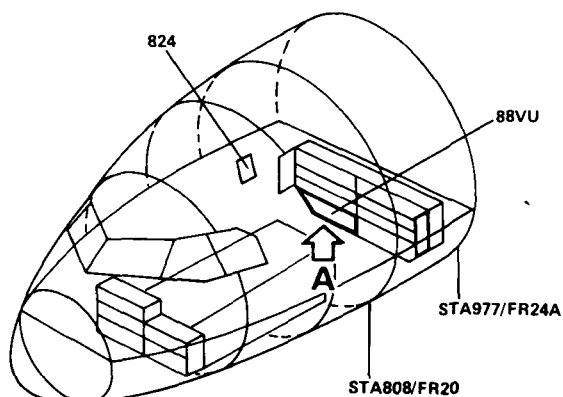
- (3) Close the access door 824 (Ref. AMM 52-41-00).

Kits No. 211025A01 and A02

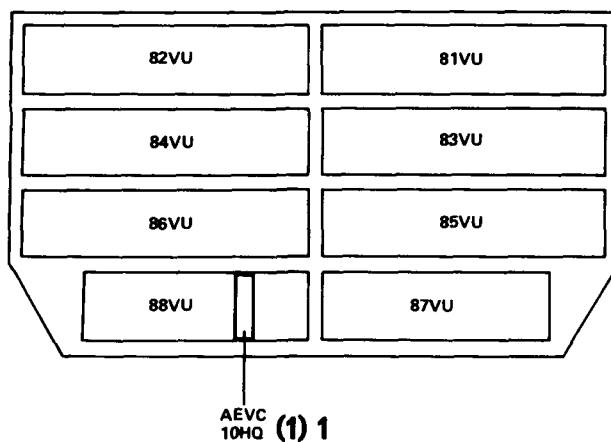
- (4) Disconnect the aircraft electrical ground connection (Ref. AMM 12-34-24, P. Block 201).
- (5) Remove the access platform.

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AFTER



A



KIT A01

At Shelf 88VU of electronics rack 80VU,
Replacement of Avionics Equipment Ventilation Computer (A.E.V.C.) 10HQ
Figure 1

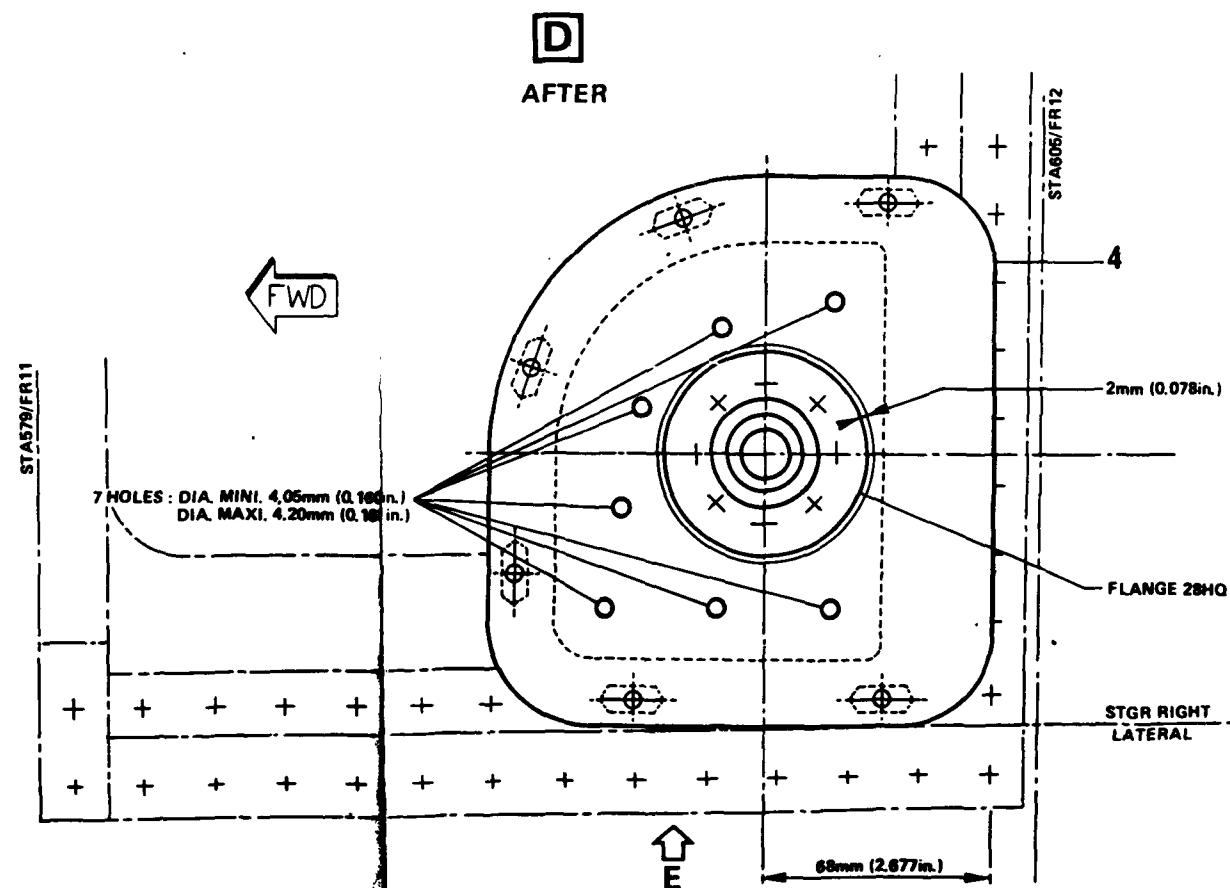
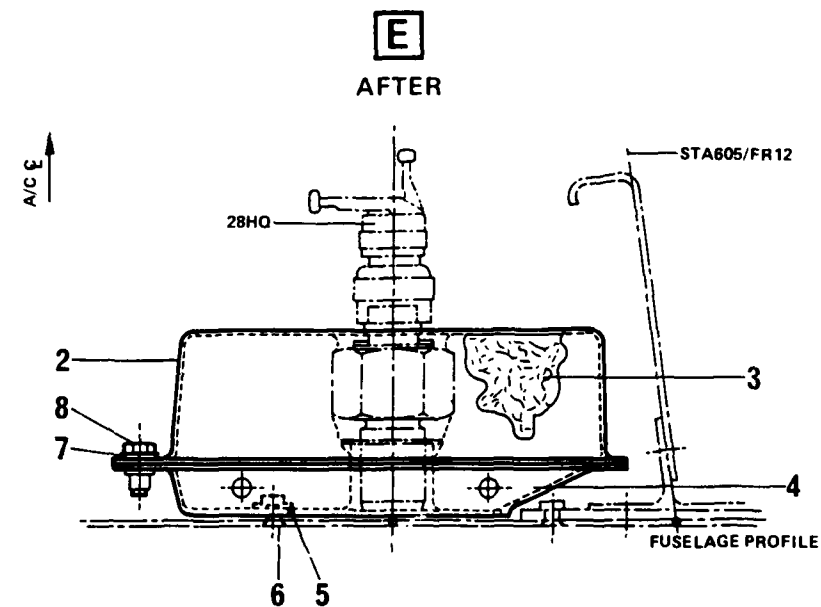
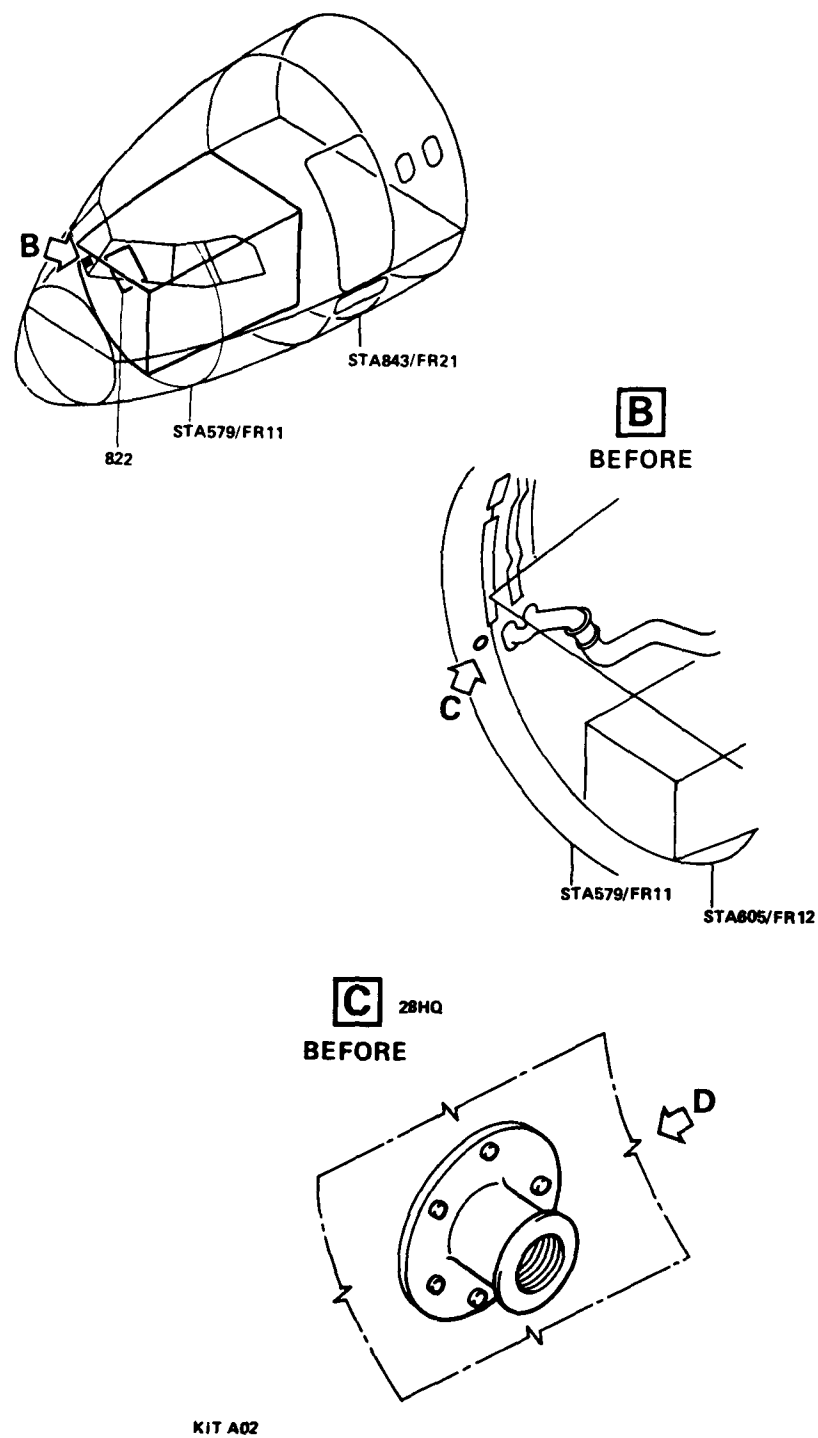
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Box and Insulation Installation
Figure 2

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3. MATERIAL INFORMATION
A. LIST OF COMPONENTS

I T E M	NEW PART No.	QTY	DESCRIPTION	I T E M	OLD PART No.	I N T	I D I S P O S I T I O N S T R U C T I O N
	<u>Kit No. 211025</u>	<u>A01</u>	<u>A02</u>				
1	87292325V04	1		(1)	87292325V03		*
2	D2121121600000		1 Box-half				
3	D2121121700000		1 Blanket				
4	D5391461900000		1 Box-half				
5	ASNA0113-40CA		7 Washer				
6	ASNA2051DEJ4018		7 Rivet	(6)	ASNA2051DEJ4018		**
7	ASN-A2397-10L		6 Washer				
8	NAS1096-3-8		6 Screw				

* Modification of removed equipment will be negotiated directly with the Vendor CROUZET as per instructions given in Service Bulletin No. 87292325-21-002.

** Discard

B. SPECIAL TOOLS

None.

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C. LIST OF MATERIALS - OPERATOR SUPPLIED

DESCRIPTION	REFERENCE CML	QTY PER A/C
Lockwire MS20995C41		As required
Polysulphide Sealant Dichromate Cured	Mat. No. 09-016	As required
Sealant	Mat. No. 09-025	As required
Methyl-Ethyl-Ketone	Mat. No. 11-003	As required
Polyurethane Primer	Mat. No. 16-001	As required
Polyurethane Top Coat Grey	Mat. No. 16-002	As required
Polyurethane Finish Paint	Mat. No. 16-018	As required
Wash Primer	Mat. No. 16-020	As required

D. PARTS TO BE RE-IDENTIFIED BY OPERATOR

None.

