BRITISH GLIDING ASSOCIATION

TECHNICAL NEWS-SHEET 2/3/4/76

1. AIRWORTHINESS 'AGGRO'. Please add to 1976 Compendium.

1.1 Standard Jantar. Rudder shroud 'jack-knifed' into the leading-edge of the rudder causing hard-over rudder jamb. BGA Airworthiness Notice 1/76 sent to owners, U.K. Agent - C.A.A. Local modification carried out by Cleveland Sailplanes, Melmerby. (Reported to Daltrade and C.A.A.).

1.2 ASW 17 and 17S. B.G.A. Airworthiness Notice 2/76 sent to owners, repeating LBA 76-11, and ASW Technical Note No. 6.

Water Ballast Outlet pipes swell with heat, and leak into the rear fuselage, with potentially hazardous aft shift of C.G. Hose clips to be introduced and leak tested before water ballast system is used.

1.3 SF25B/SF25C/T.61 (possibly) Falke. Incorrect Fuel Gauge Readings. LTA 76-40 and Tech. Note 653-1/76. Check that the fuel gauge hose is not kinked where it leaves the fuel tank filler. BGA Compliance required at 50 hour inspections.

1.4 Cirrus Aileron Rod. Intermediate aileron rod may cause jamming, if the left aileron push rod is not connected. LBA 76-8 Technical Note 278-17 introduces a safety brace. Applies to Schempp-Hirth and Grob machines. BGA Compliance required not later than C of A renewal 1977.

1.5 Cirrus Seat.- Possible fouling of tow release lever. LBA 76-7 and Technical Note 278-18, requires re-enforcing of the seat. BGA Compliance required not later than C of A Renewal 1977.

1.6 SF25B & C. Aileron Operating Lever. - cracks developing at the welded seam between the operating lever and the aileron spar tube. LBA 75-169 and Technical Communication 653-5/75 requires inspection as soon as possible and gives details of repair schemes. Compliance required not later than 50 hour inspection.

1.7 Rudder Cable Wear - Blanik. This saga continues, and several cases of severely worn cables have been reported after 1 year/200 hrs of operation. Southdown Aero Services and others are now manufacturing cables to U.K. specification. U.K. agents will be asked to obtain non-metallic pulley modification.

1.8 Rudder Cable Wear - Pirat. (as for Blanik) - excessive wear reported. Daltrade Ltd., have non-metallic pulleys available to replace metallic pulleys - which may help to resolve this defect. (Reported to Daltrade and C.A.A.).

1.9 Rudder Cable Failure - Kestrel. It has been demonstrated to the manufacturer, and acknowledged by them, that the angle of entry and exit of the cable into the fair lead tube on the rudder pedals, is critical, if repeated damage to the cable is to be avoided, as the pedals move. (Libelle a/c have nylon tube inserted in a similar system).

TI 78 Refers. Restricting the rudder pedal adjustment will not prevent damage, if the conduit exits are incorrectly aligned.

1.10 Loravia Type Topaze LCA/LA 10-11 and 12. Bureau Veritas AD76-12(a) draws attention to Canopy Locking System Defects. (BGA have copy - but we have no such gliders!).

1.11 B.G.135 Air-Brake Jamming. Inadequate clearance between the airbrake and the fuselage can cause fouling at the root end. (Iain Barr - Portmoak 25.1.76).

1.12 T.61A. Falke - Rudder Pedals Fouling. Guard Plates on Rudder Pedals can become distorted and foul each other - Guard plates may be removed to eliminate this hazard. (R.W. Collins - Doncaster C.G.).

1.13 Cobra Rudder Cables. Can be incorrectly routed. STBD Cable found to be fouling the base of the instrument panel, because it had been routed over a split-pinned nut on the cable release mechanism. Should have been routed below. (From David Bath - Heron G.C.).

2. GENERAL - TECHNICAL MATTERS.

2.1 Tost Wheel on Standard Cirrus. Recurring failures have been fixed by machining a wheel out of L.65 (Anodised to DTD 910). Drawing available from Ray Jeffereys, 5, Belle Vue Road, Stoud, Glos.

2.2 IS 29D Sailplane exported to England. The attached list of service bulletins and Flight and Maintenance Manuals amendments has been received from the Ministry of National Defence - Bucharest Ref E.836/17/1/76. Copies of these amendments should be obtained from U.K. Agents.

2.3 Fabrics - Heat Shrink fabrics are available from several sources, and are becoming increasingly popular on gliders, and may have infinite life. Ceconite Fabrics type 101 (lightweight) 102 (medium weight) and 103 (Ultra-lightweight) together with tapes and adhesives, are available from Van Densen A/C Supplies. Murdock Road, Launton Industrial Estate, Bicester 43381.

2.4 Protection of Fabric against cracking. The light aircraft practice of re-enforcing all likely points of wear between fabric and ribs, trailing-edge hard-points etc, by covering such contact points with serrated tape before covering, is equally applicable to gliders. (Eric Rolfe recommendation).

2.5 Avionic Approvals. ASH - 360 - DDP ASH-02, and ASH 360P, are now C.A.A. approved Ref B-26/1/76.

2.6 Avionics - Kestrel Co-axial feeders. Co-axial feeder from fin aerial is sometimes extended by Belling-Lee co-axial connectors near wheel-well. Soldering may have been omitted on centre pin of the plug. Mini-Watts will become bottled-up and frustrated at this point, and resulting pressure drop may cause poor performance! (Defect report by T.McMullin and George Burton).

2.7 New Type Approvals by B.G.A. (Please amend 76 list).

(a) Astir C.S.
Restored to and ommitted from BGA approval list.

(b) Zlin Krajanek (BGA 655).

(c) Viking 1

2.8 Fabric Failure. A recent failure of fuselage of fabric in flight on a Ka7 may have been due to lack of ultra-violet protection. C.A.I.P. Leaflet BL6-26 specifies two coates of aluminium dope - the fabric was only one year old!

3. INFORMATION.

3.1 B.G.A. Technical Procedure Manual and Exposition for C.A.A. Approval Ref DAI 8378/73.

In order that we may continue to comply with CAA approval requirements and in so that all interested parties may be briefed on the B.G.A's terms of reference, responsibilities and modus operandi, the above document is being produced, and will become available shortly. (The B.G.A. operates the largest Private Airworthiness System in the World!)

3.2 Schleicher Technical Notes. The following have been received, and should be available from UK Agents:

TN16 - KA7 Installation of Removable Ballast.

TN19 - K 8 Installation of Removable Ballast.

TN 7 - ASK13 Installation of Removable Ballast.

TN4A - ASW17 Rear Fuselage constructed with carbon-fibre.

TN4B - ASW17 Drag Chute for a/c modified to 4A.

TN 5 - ASW17 Tubus-core replaced by poly-carbonate from ship 17043.

TN 6 - ASW17 and 17S. Sealing of Water-Ballast Pipes. (LBA 76-11).

3.3 Schemp - Hirth. The following have been received, and should be available from UK Agents:

TN286-8 Nimbus 2 Weight and Speed Increase - Authorised.

TN278-17 Standard Cirrus Ailerons. Ref LBA 76-8 (Item 1.4).

TN278-18 Standard Seat - Ref LBA 76-7 (Item 1.5).

3.4 Stamo. Crankshaft seals. Ted Moslin has a small supply. REF TNS 1/76 - 2.10 for address and phone.

3.5 Club Technical Officers. BGA Technical Newsheets are not top secret and are of interest to club members, private owners, tug fleet managers etc - Please put these in a durable cover, and make them available in the club house. Why not put the 1975 TNS on view to-day?

4. STOP PRESS AIRWORTHINESS AGGRO.

4.1 Pirat. Release Hook cable found frayed at Bowden Cable exit - Stan Easton - Swanton Morley has additional pulley modification Ref BGA/PIRAT/1/76 - if required.

4.2 Blanik Elevator. 'T' connection at Elevator, incorrectly assembled after repair - i.e. 180° out of alignment. Result - all elevator travel upwards - nil downwards! Please add 4.1 and 4.2 to 1976 Compendium.

R. B. Stratton.
Chief Technical Officer - B.G.A.

April, 1976.

L I S T

of Service Bulletins issued up to December 31,1975, applicable to the IS-29D sailplanes exported to England

Service Bulletin No.	Part Affected	Compliance	Date	Series affected
IS-29D/CR-1	Head rest	Recommended	-	27
IS-29D/CR-2	Flap control	Recommended	-	27,31
IS-29/CO-6	Elevator travel	Mandatory	June 15 1975	31
IS-29D/CO-7	Fuselage drain	Mandatory	March 1st, 1976	27;31;35 through 38;40 through 44
IS-29D/CR-8	Ventral release capability	Recommended	-	27,31
IS-29D/CR-9	Undercarriage stops	Recommended	-	27;31;35 through 38;40 through 44

L I S T

of amendments to the Flight and Maintenance Manuals, issue April 1973, issued up to December 31, 1975, applicable to IS-29 D sailplanes exported to England

Amend. no.	Part affected	Revised pages Flight Manual	Revised pages Maintenance Manual	Sailplane series	Remarks
0	1	2	3	4	5
1.	Canopy jettisoning	1.8.A 3.1.A	2.4.A	27-44	
2.	Levelling board	1.4.A 1.5.A 1.6.A	1.3.A 1.4.A 1.5.A 1.6.A levelling board	31-44	
3.	Wing spar lock	6.5.A	4.1.A	31-44	
4.	Flap control	4.5.A	2.4.B	27-40	For 27 and 31 series after incorporation of IS-29D/CR-2 Service Bulletin
5.	Balance limits	2.2.A 2.2.A.1 6.10.A	1.6.B levelling board	27-44	
6.	Aileron travel	1.4.B	1.5.B levelling board	31-44	
7.	Landing gear control	-	2.3.A	27-44	
8.	Winch launching	4.5.B 4.5.B.1	-	27-44	
9.	Ventral release winch launching	4.5.C.1	-	27-44	For 27 and 31 series after incorporation of IS-29D/CR-8 Service Bulletin
10.	Elevator travel	1.5.B	1.5.C levelling board	27-44	For 31 series after incorporation of IS-29D/CO-6 Service Bulletin

0	1	2	3	4	5
11.	Flap control	4.5.C	2.4.C	41-44	
12.	Trim tab cable stress	1.7.A	2.3B	27 - 44	
13.	Shock absorber pressure	1.6.B	1.4.B 2.10.A	27 - 44	
14.	Weight and levelling sheet	2:2:B 2:2:B.1 1.6.C	1.4.C	43;44	
15.	Instrument panel	1:10:A 1.12.A	1:8:A 2.5.A	27 - 44	
16.	Service life	-	3.4.A	27 - 44	

Appendix (3)
ASW 17 - 17S

Airworthiness Directive

76-11 Schleicher

Date of issue:
10.Februar 1976

Affected sailplane:
ASW 17 and ASW 17S; German Type Certificate No. 282;
serial nos. 17001 thru 17043.

Affected:
Water ballast system

Reason:
Water spillage at the dump hose connections inside the fuselage leading to a water accumulation in the tailcone with an unacceptable rearward shift of c.g.

Action:
1. Establish tight fit of the PVC-hoses on the brass tubes glued to the fuselage by means of hose clips.
2. Check correct installation by pulling the hose with approximately 5 kp.

Proceed in accordance with Technical Note of Messrs. SCHLEICHER.

Technical information of the manufacturer:
ASW 17 Technical Note No. 6 inclusive of later approved revisions. The Technical Note becomes herewith part of this airworthiness directive.

Compliance:
Prior to next use of the water ballast system.

Accomplishment and log book entry:
Action to be accomplished by an LBA approved repair station and to be entered and certificated in the glider's log.

BGA - IMMEDIATE

Luftfahrt-Bundesamt
I 13-303.61 -76-40

33 BRAUNSCHWEIG, den 17. Februar 1976
Flughafen

SF. 25B/C

Hinweis:

Durch diese Mitteilung unterrichtet Sie das LBA vorab über den Inhalt einer beabsichtigten Lufttüchtigkeitsanweisung (LTA), deren endgültiger Text demnächst in den Nachrichten für Luftfahrer, Teil II (NfL II) bekanntgemacht werden wird. Rechtsverbindlich ist die LTA ausschließlich in der Fassung ihrer Bekanntmachung in den NfL.

Lufttüchtigkeitsanweisung (Entwurf)

Nach § 14 der Betriebsordnung für Luftfahrtgerät (NfL II-26/70) wird nachstehende Lufttüchtigkeitsanweisung (LTA) erlassen.
Ein durch sie betroffenes Luftfahrtgerät darf nach dem in der LTA angegebenen Termin, außer für Zwecke der Durchführung der Maßnahmen, nur in Betrieb genommen werden, wenn die angeordneten Maßnahmen ordnungsgemäß durchgeführt worden sind.

76-40 Scheibe

Datum der Ausgabe:
17. Februar 1976

Betroffene Motorsegler:
SF 25B Falke,
Werk-Nr. 4601 bis einschließlich 46258
und 4801 bis einschließlich 4868.

SF 25C Falke,
Werk-Nr. 4401 bis einschließlich 44133
und 4201 bis einschließlich 4252.

(Geräte-Nr. 653).

Betrifft:
Kraftstoffvorratsanzeige.

Anlaß:
Falsche Vorratsanzeige infolge Durchhängen der Schlauchleitung zwischen Einfüllstutzen und Gepäckfachrückwand.

Maßnahmen:
1. Feststellen, ob der Schlauch der Kraftstoffvorratsanzeige von der Wand der Gepäckablage an bis zum Einfüllstutzen ständig ansteigt. Die Sichtkontrolle kann durchgeführt werden, indem man mit Hilfe eines angefertigten Winkels (s. Skizze) die Gepäckfachrückwand nach vorn zieht.
2. Wird festgestellt, daß die Leitung durchhängt, so ist sie auszuwechseln und zum Einfüllstutzen hin ständig ansteigend zu verlegen.

Alle Arbeiten sind entsprechend der Technischen Mitteilung des Herstellers auszuführen.

Technische Mitteilung des Herstellers:
Nr. 653-1/76.
Die technische Mitteilung wird hiermit zum Bestandteil dieser LTA.

Fristen:
1. Vor dem nächsten Flug.
2. Vor dem 31.3.1976.

Durchführung und Bescheinigung:
Die Maßnahme 1 kann vom Flugzeugführer oder von einer sachkundigen Person durchgeführt werden. Die Maßnahme 2 ist von einem anerkannten luftfahrttechnischen Betrieb mit entsprechender Berechtigung durchzuführen.
Ihre Durchführung ist im Bordbuch zu bescheinigen.

(5)

Airworthiness Directive

76-8 Schempp Hirth

Date of issue:
February 18, 1976

Affected sailplane:
Standard Cirrus;
German Type Certificate no. 278.
Serial nos. 1 thru 510, 528 and 529 (Manufacturer Schempp-Hirth).
All serial nos. with index letter G up to 544G (Manufacturer Grob).

Affected:
Fuselage frame.

Reason:
The intermediate rod may cause jamming of the aileron control, if the left aileron push rod is not connected.

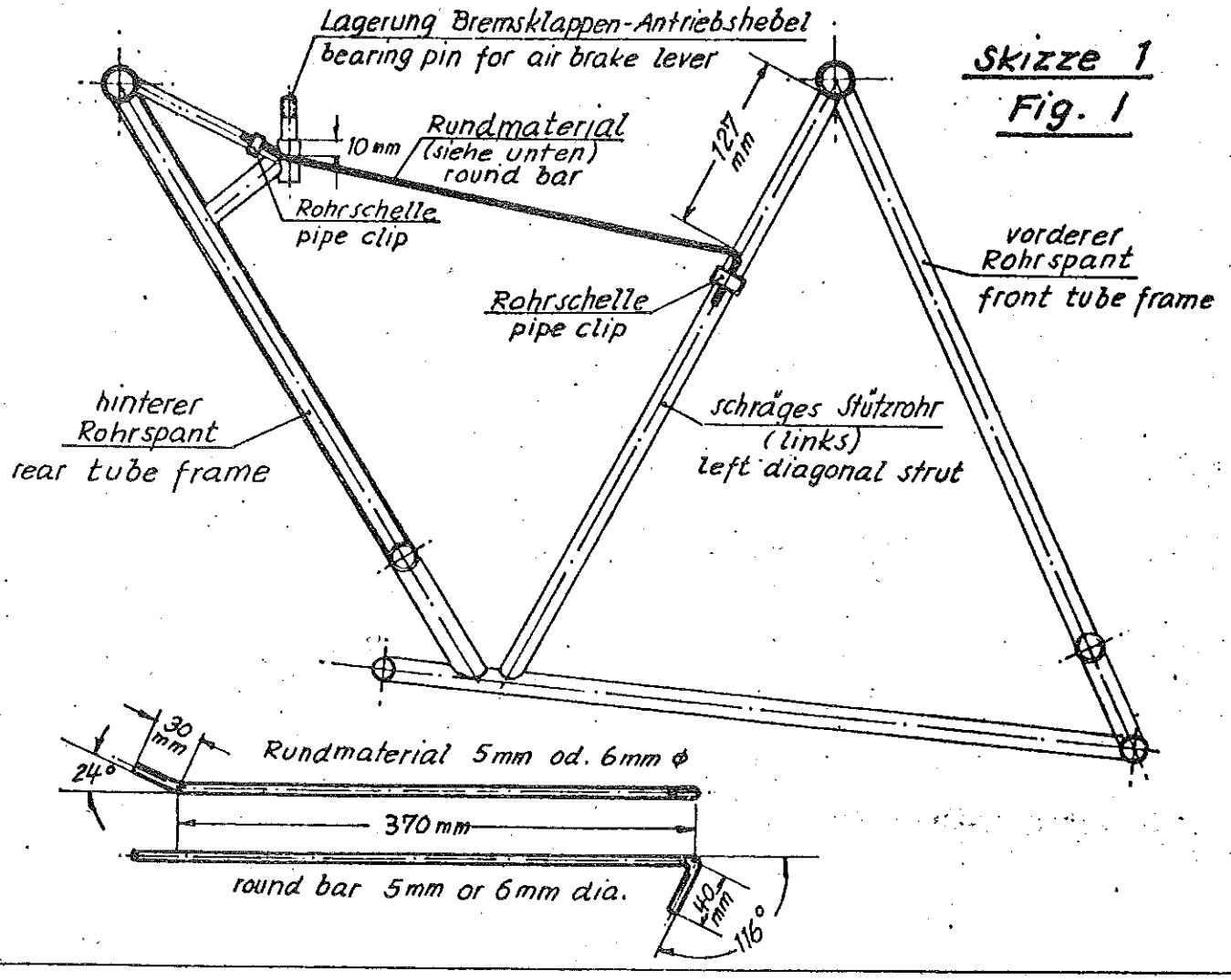
Action:
Install in accordance with Technical Note a safety brace in the fuselage frame between the airbrake lever bearing and the left diagonal strut.

Technical information of the manufacturer:
Technical Note No. 278-17.
This Technical Note becomes herewith part of this airworthiness directive.

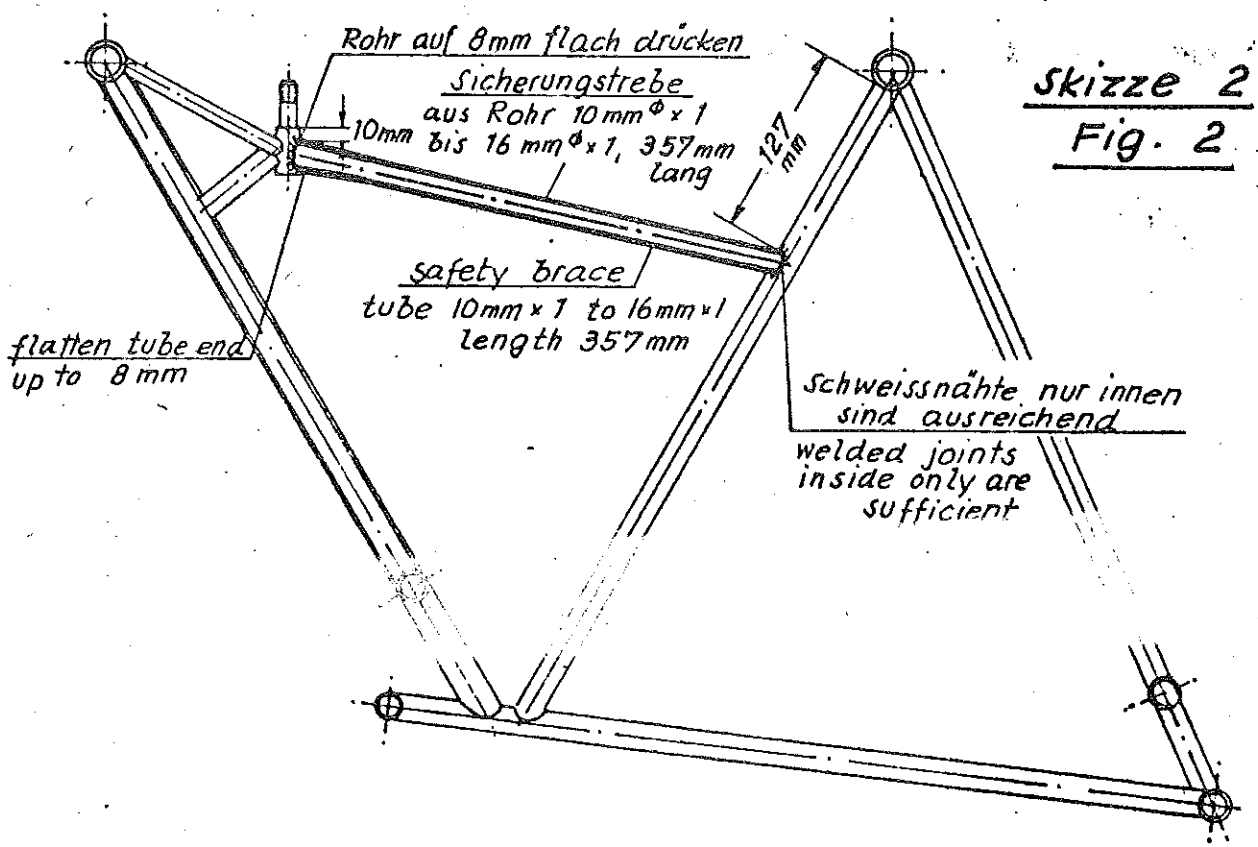
Compliance:
During the next annual inspection but not later than 30 April 1976.

Accomplishment and log book entry:
Action to be accomplished by an approved repair station and to be entered and certificated in the sailplane's log.

* BGM — 1977



Skizze 1
Fig. 1



Skizze 2
Fig. 2

(7)

Airworthiness Directive

76-7 Schempp-Hirth

Date of issue:
February 18, 1976

Affected Sailplane:
Standard Cirrus; German Type
Certificate no. 278
Serial nos. 1 thru 604 (Schempp Hirth).
Serial nos. G1 thru G200 (Grob).

Affected:
Seat.

Reason:
Possible jamming of the tow release lever due to warping of the seat.

Action:
1. Unless already accomplished, reinforce the seat in accordance with the instructions of the manufacturer.
2. Perform a funtional test.

Technical information of the manufacturer:
Technical Note no. 278-18.
This Technical Note becomes herewith part of this airworthiness directive.

Compliance:
During next annual inspection but not later than 30 April 1976. ✓ ✳

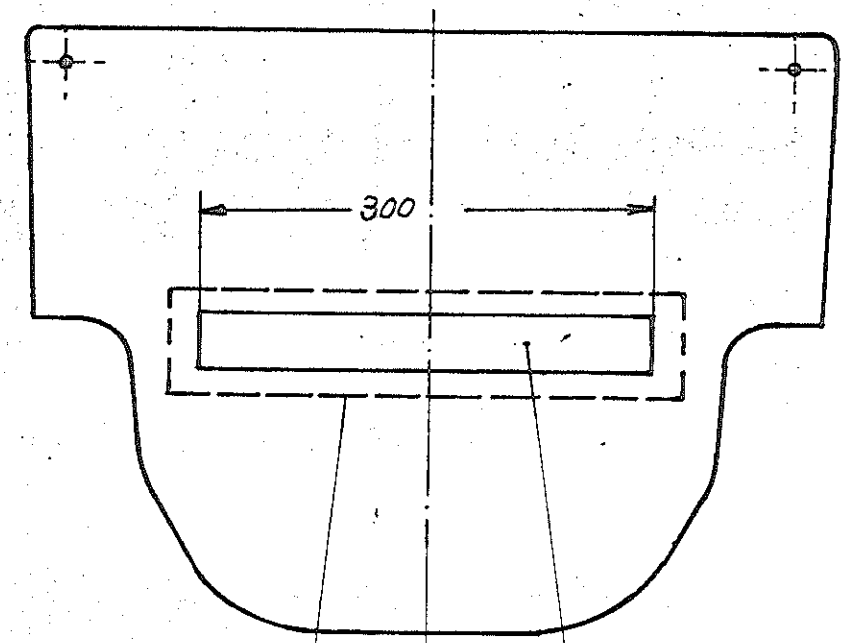
Accomplishment and log book entry:
Action to be accomplished by an approved repair station and to be entered and certificated in the sailplane's log.

BCA - 1977

Schempp-Hirth
K.G.
Kirchheim-Teck

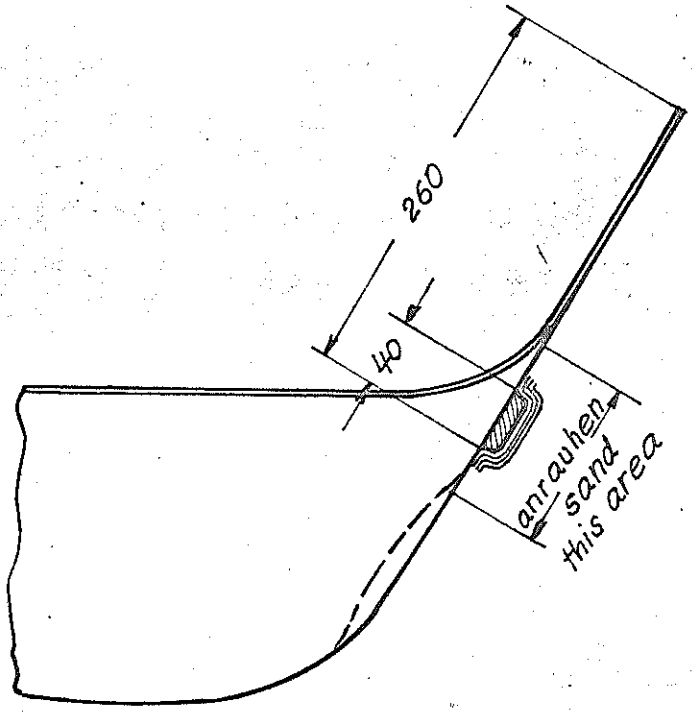
Technische Mitteilung Nr. 278 - 18
Technical Note No. 278 - 18

Blatt: 2
Blattz.: 2



Glasgewebe
glass cloth

Versteifung
stiffening material



Versteifung der Sitzwanne
Reinforcement of the seat

(9)

Technical Communication No: 653 - 5/75 LBA 75-169 SF25 B+C.

Subject: Aileron operating lever

Reference: Motorised glider SF 25 B and SF 25 C, all works numbers

Introduction: Before next flight

Reason: In some planes cracks have developed beside the welded seam between the operating lever and the aileron spar tube.

Action:

1. The ailerons are to be dismantled. In the region of the operating lever the covering is to be removed.

2. The welded seams with which the operating lever is welded to the spar tube are to be inspected with a magnifying glass having at least 5-fold magnification to see if cracks have developed.

3. A check must be made to see whether the metal cover plate (1mm metal) is laid round the entire spar tube (see Sheet 3 Figs: 1 and 2).

4. If cracks are observed or if the cover plate does not completely surround the the spar tube, then the reinforcement illustrated in Fig: 3 is to be fitted. (Material: Sheet metal 1 mm 1.7214.4).

Before fitting the reinforcement, the frise edge bar in the neighbourhood of the operating lever is to be removed (see Fig: 4). The paint beside the welded seams is to be removed and the surface cleaned. Cracks are to be welded. The reinforcement must be clean when fitted. It must only be autogen welded with welding wire G 1 DIN 8554.

5. Finally the frise edge bar is reassembled as shewn in Fig: 4, and the covering and paint replaced.

6. If no cracks are observed, and, furthermore, if the cover plate completely surrounds the tube, then covering and painting are to be refitted and the aileron reassembled.

In such cases, the reinforcement plate need not be welded on.

Weight and centre of Gravity: No effect

Instructions:

1. Items 1 to 3 are to be undertaken by a Grade III examiner with the corresponding authority or by a DAeC Foreman and to be entered in the log book.

2. Items 4 and 5 are to be carried out by technical aircraft company with the appropriate authority and be entered in the log book.

Timw limit:

1. Items 1 to 3 to be undertaken before the next flight
2. If cracks are observed, items 4 and 5 must be carried out before the next flight.
3. If no cracks are observed but the cover plate does not completely

cover the spar tube, then items 4 and 5 must be carried out before November 1st 1975 at the latest.

Scheibe Flugzeugbau GmbH
8060 Dachau, Aug. Pfaltzstrasse 23.

July 1st 1975

Diagrams

Items numbered:

1. = Fig: 1. 1.1 = Metal sheet 1 mm not laid completely round the spar tube.

2. = Fig: 2. 2.1 = Metal sheet 1 mm completely encircling the spar tube.

2.2 = Application of the sheet of reinforcing metal
Material: 1 mm sheet metal 1.7214.4

3. = Fig: 3. 3.1 = Operating lever with reinforcement.

4. = Fig: 4. 4.1 = Wooden plug 1 mm

4.2 = Frise edge bar

4.3 = Position of cut in frise edge bar

Blech 1 mm nicht vollständig um das Halterohr gelegt

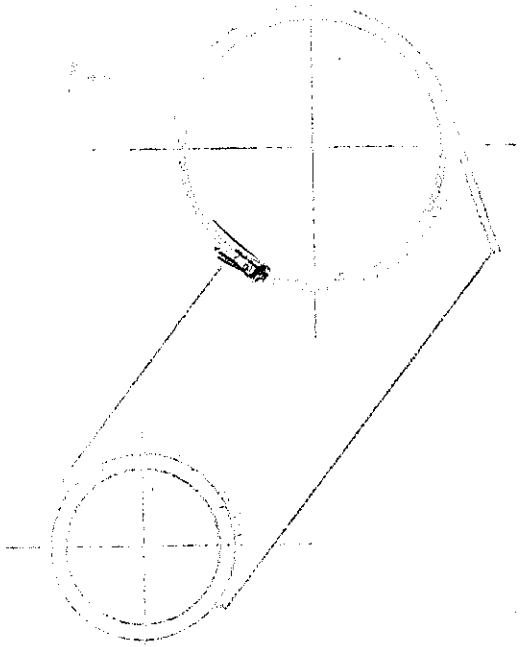


Abb. 1

Blech 1 mm vollständig um das Halterohr gelegt

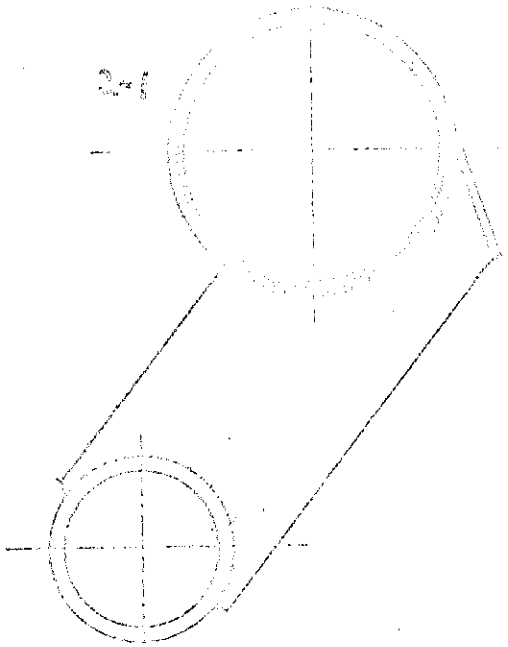


Abb. 2

Antriebshebel mit Verstärkung

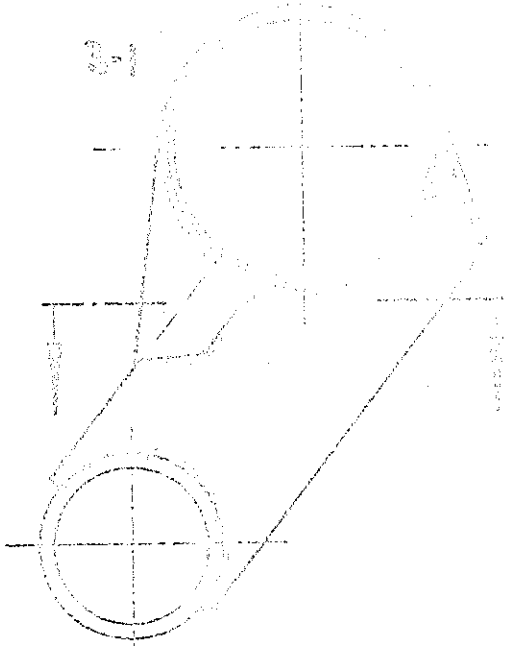
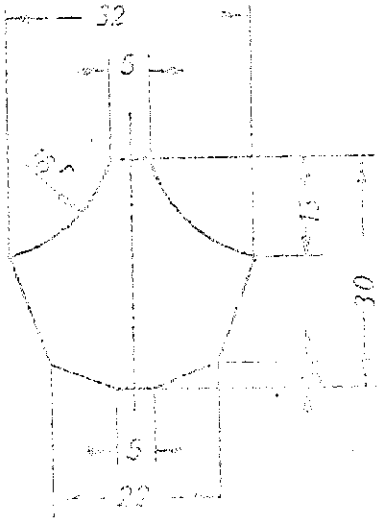


Abb. 3



3:2

Abwicklung des Verstärkungs-Bleches

Material:
Blech 1 mm
1.7214.4

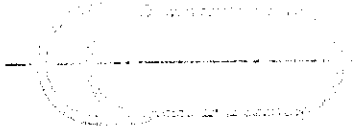
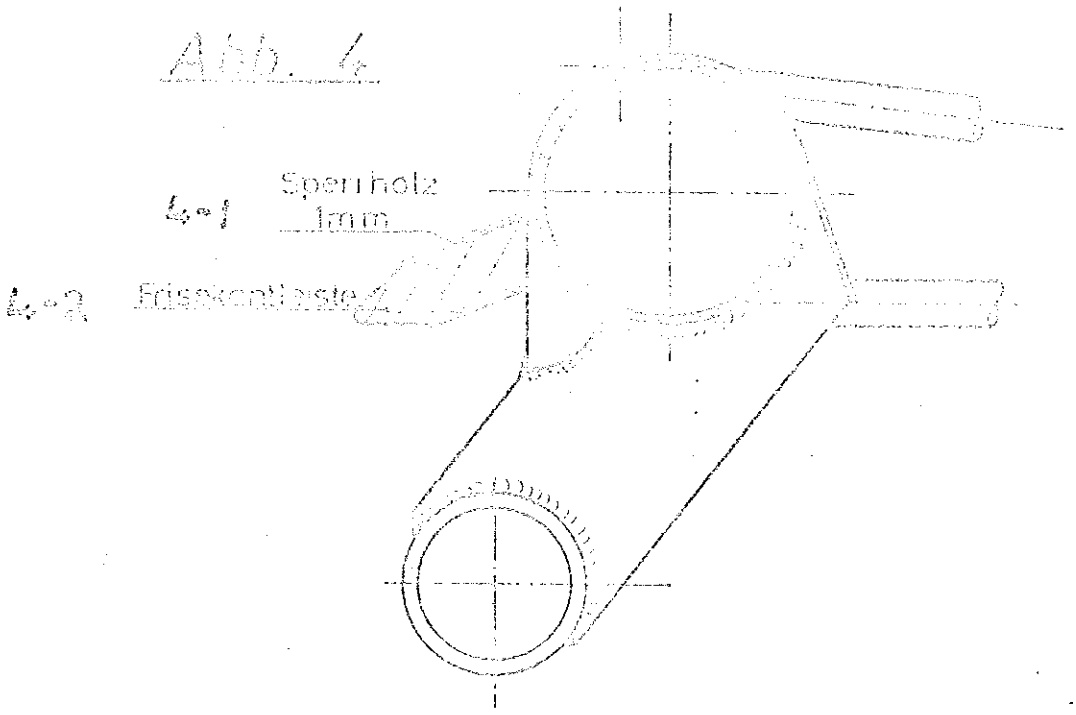
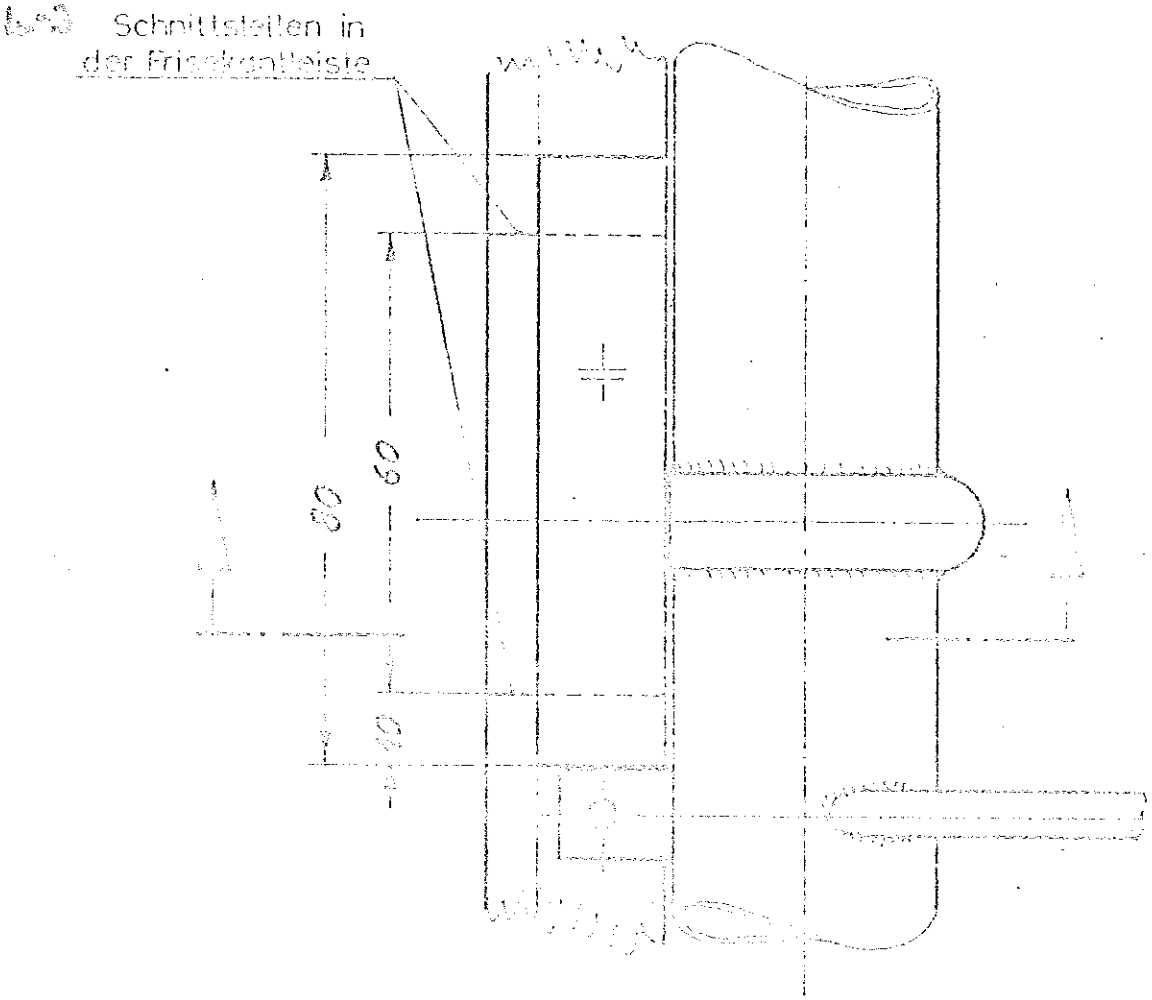


Abb. 4


4.1 Sperrholz 1mm
4.2 Frischkantleiste


4.3 Schnittstellen in der Frischkantleiste
s
s
s