



GFA AIRWORTHINESS DIRECTIVE

TYPE AFFECTED: Cirrus and Cirrus VTC

SUBJECT: Fatigue life limits on the L'Hotellier coupling balls in the air brake circuit.

BACKGROUND: Overseas experience has shown that it is necessary to replace the air brake L'Hotellier coupling balls more frequently than was previously thought.

The replacement ball design has been modified by the manufacturer. The thread length is now slightly shorter and begins 2.5 mm below the flange and it is necessary to relieve the belcrank hole to allow the flange to sit flat on the belcrank surface.

Note: The general servicing requirement of AD 177 must be complied with.

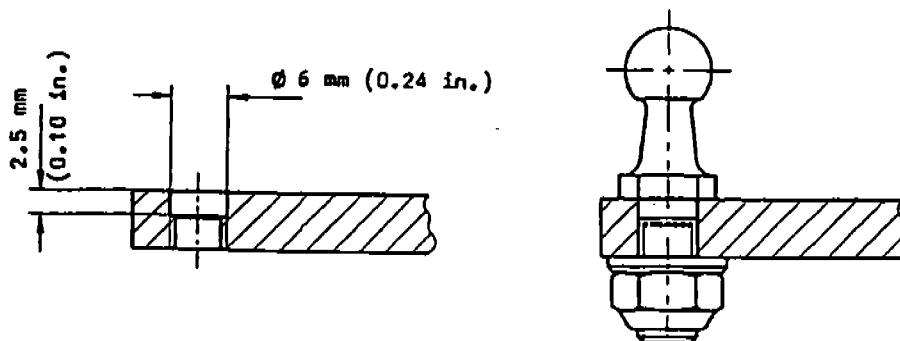
DOCUMENTATION: Schempp-Hirth Technical Note 265-10 which forms part of this AD.

ACTION REQUIRED: 1. The L'Hotellier coupling balls in the air brake circuit must be replaced each time they reach 500 hours in service.

The replacement part number is MS 961-150-150.L3.

2. At the first installation of the coupling ball with the new part number drill a recess 2.5 mm (0.1 in) deep and 6.0 mm (0.24 in) diameter into the side of the belcrank facing the coupling ball (drill bit included angle $\geq 115^\circ$) enabling the ball to tighten against the belcrank. See figure 1.

FIGURE 1



SIGNED:

CHIEF TECHNICAL OFFICER AIRWORTHINESS

For and on behalf of:

**THE GLIDING FEDERATION
OF AUSTRALIA**

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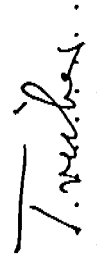
3. Update the Flight and Service Manuals by inserting pages 2 and 25. These pages are available from the GFA Secretariat on request.

WEIGHT AND BALANCE: Not affected.

IMPLEMENTATION: Replacement of the l'Hotellier coupling balls must be done persons rated "Inspection for Issue of Maintenance Release" any type.

Manual amendments may be incorporated by the owner.

COMPLIANCE: The requirements of this GFA Airworthiness Directive are mandatory. This Directive is issued pursuant to the Rules and Regulations of the Gliding Federation of Australia.

Schempp-Hirth Flugzeugbau GmbH Kreienstraße 25 - Postfach 14 43 D-7312 Kirchheim unter Teck LBA-Nr. 185	TECHNICAL NOTE NO. 265-10	Page No. 1	No. of pages 1
<u>Subject</u>	Control rod coupling balls on airbrake actuating lever inside the fuselage		
<u>Affected</u>	Sailplanes model "Cirrus" and "Cirrus VTC" (F.R.G. Type Certificate No. 265)		
<u>Urgency</u>	all serial numbers		
<u>Reason</u>	a) After reaching a service time of 500 hours. b) With a service time of more than 500 hours, on the occasion of the next annual inspection, but not later than March 31st, 1993. On a sailplane with a high service time, the coupling balls on the airbrake actuating lever inside the fuselage have broken at the thread end due to fatigue.		
<u>Actions</u>	1. Remove both coupling balls. 2. Make a recess with a depth of 2.5 mm/0.10 in. and a diameter of 6.0 mm/0.24 in. into the flank of the lever facing the flange on the coupling balls (drill bit angle > 115°). 3. Install replacement coupling balls. 4. Amendment of the Service Manual:	Page 25 - Maintenance (amended page dated November 1992)	
<u>Weight</u>	No alteration		
<u>C/G position</u>	No alteration		
<u>Material</u>	Replacement coupling balls (Part No. MS 961.150.150.L3) may be obtained from	Schempp-Hirth Flugzeugbau GmbH Kreienstraße 25 7312 Kirchheim u. Teck FED. REPUBLIC OF GERMANY	
<u>Note</u>	The actions may be carried out by a skilled person. Their accomplishment must be inspected by a licensed inspector and be entered in the aircraft log book.		
Kirchheim/Teck, Nov. 5, 1992	LBA-approved:	The German original of this Technical Note has been approved by the LBA under the date of Dec. 19, 1992 and is signed by Mr. Skov. The translation into English has been done by best knowledge and judgement. In any case of doubt the German original is authoritative.	
Issued:	 (H. Treiber)		