Aviation Safety Investigation Report 199700093

Alexander Schleicher Gmbh & Co ASW 17

13 January 1997

Aviation Safety Investigation Report 199700093

Readers are advised that the Australian Transport Safety Bureau investigates for the sole purpose of enhancing transport safety. Consequently, Bureau reports are confined to matters of safety significance and may be misleading if used for any other purposes.

Investigations commenced on or before 30 June 2003, including the publication of reports as a result of those investigations, are authorised by the Executive Director of the Bureau in accordance with Part 2A of the Air Navigation Act 1920.

Investigations commenced after 1 July 2003, including the publication of reports as a result of those investigations, are authorised by the Executive Director of the Bureau in accordance with the Transport Safety Investigation Act 2003 (TSI Act). Reports released under the TSI Act are not admissible as evidence in any civil or criminal proceedings.

NOTE: All air safety occurrences reported to the ATSB are categorised and recorded. For a detailed explanation on Category definitions please refer to the ATSB website at www.atsb.gov.au.

The Bureau did not conduct an on scene investigation of this occurrence. The information presented below was obtained from information supplied to the Bureau.

Occurrence Number: 199700093 Occurrence Type: Accident

Location: 3km NE Horsham, Aerodrome

State: VIC Inv Category: 4

Date: Monday 13 January 1997

Time: 1330 hours **Time Zone** ESuT

Highest Injury Level: None

Aircraft Manufacturer: Alexander Schleicher Gmbh & Co

Aircraft Model: ASW 17

Aircraft Registration: VH-GWN Serial Number:

Type of Operation: Non-commercial Pleasure/Travel

Damage to Aircraft:SubstantialDeparture Point:Horsham VicDeparture Time:1330 ESuTDestination:Horsham Vic

Crew Details:

	Hours on		
Role	Class of Licence	Type Hou	rs Total
Pilot-In-Command	None	18.0	650

Approved for Release: Thursday, April 10, 1997

The tug pilot released the glider from tow shortly after takeoff because the glider did not appear to be climbing. The tug pilot advised that he had lifted of at approximately 55 knots, allowed for drift, let the speed stabilise at 70 knots, then commenced to climb. After he had climbed to about 100 feet above the strip he noticed that the glider was very low behind him. He stated that he made a radio call to the glider telling him to "come up". He noticed the speed was deteriorating below 55 knots, he had full forward elevator applied and the stall warning had activated. The tug pilot considered that the glider was excessively out of station and that if the tow continued it would affect the safe operation of the tug. He therefore released the tow rope. The tug completed a circuit and landed safely.

The glider pilot stated that he selected negative flap during his preparation for launch. He stated that the tug commenced its tow and lifted off after a normal ground run. The glider was skipping and not lifting off. He moved the flap back two notches, looked at the airspeed indicator and it showed around 55 knots. He stated that the "tug went up like a rocket" and climbed well above the glider. He pulled back on the control column to try to catch up with the tug. Shortly after this he heard the tow rope release.

After being released he turned left, flew for a few hundred metres before turning right, and then outlanded into a small field covered in stubble. Once on the ground the glider ground looped in the stubble and slid backwards into a fence. The glider was substantially damaged.

After the accident the glider was found to be configured with the flaps in the "negative flap" setting. This setting is a feature that is used to reduce drag during high speed cruise. The negative flap setting can also be used in the first segment of a takeoff roll to increase the low speed effectiveness of the ailerons. When this procedure is employed the flaps are reconfigured to the takeoff setting as soon as the wings are levelled and under positive aileron control. The continued use of the negative flap setting during takeoff and climb seriously degrades the climb performance of the glider.

The pilot was not able to explain to the investigator from the Gliding Federation of Australia(GFA) why the flaps were still selected to an inappropriate setting.

There is no evidence of the flaps having moved as a function of the accident sequence therefore it can be concluded that the pilot did not apply landing flap during the approach into the stubble field. It is probable that the flap setting was not changed during the takoff run. This would explain the lack of climb performance experienced during the takeoff sequence.